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Tesis doctoral

Functional characterization of the yeast RNA binding protein Mip6

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La Dra. Susana Rodríguez Navarro, investigadora jefe del Instituto de Biomedicina de Valencia (IBV-CSIC) en Valencia, como directora de la tesis, y el Dr. Francisco Estruch Ros, catedrático del Dpto. de Bioquímica y Biología Molecular de la Universidad de Valencia (UV), como tutor de la tesis.

CERTIFICAN que el licenciado en Biología MANUEL MARTÍN EXPÓSITO ha realizado, bajo su dirección en el IBV y bajo su tutela en la UV respectivamente, el trabajo que lleva por título "Functional characterization of the yeast RNA binding protein Mip6", y autorizan su presentación para optar al grado de Doctor en Biomedicina y Biotecnología.

Y para que así conste, expiden y firman el presente certificado en Valencia, Abril de 2019.



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INDEX

AGRADECIMIENTOS	5
ABSTRACT	11
RESUMEN	15
ABBREVIATIONS	19
INTRODUCTION	25
<i>Saccharomyces cerevisiae</i> as a Model Organism	27
Genome Structure and Gene Expression.....	28
RNA Polymerase II-mediated Transcription	30
mRNA Maturation.....	34
mRNA Transport.....	36
mRNA Translation	41
Quality Control and mRNA Decay	44
Adaptation to Non-physiological Temperature Conditions: Heat Shock Response ...	47
<i>Heat Stress Transcription Factors: Hsf1 and Msn2/Msn4</i>	49
<i>Heat Shock and mRNA Metabolism</i>	50
RNA Binding Proteins as Modulators of mRNA Metabolism	53
<i>Mip6: a Mex67 Adaptor Protein?</i>	54
OBJECTIVES	57
MATERIAL AND METHODS	61
MATERIALS	63
Yeast strains.....	63
Plasmids.....	65
Primers.....	68
Commercial Kits.....	69
Antibodies	69
METHODS.....	70
<i>Microbiological Techniques</i>	70
Bacterial Culture and Transformation.....	70
Yeast Culture and Transformation	71
Yeast Growth Analysis.....	73
<i>Nucleic Acid Techniques</i>	73
Polymerase Chain Reaction	73
PCR/Digestion Product Purification	74
DNA Cloning.....	75
Plasmid Isolation and Purification	75
Genomic DNA Extraction	76

RNA Purification	77
cDNA synthesis.....	78
Quantitative PCR.....	78
Agarose DNA/RNA Electrophoresis	79
<i>Protein Techniques</i>	79
Protein Extraction	79
Pull-down Assays	81
Western Blotting	81
<i>Other Techniques</i>	84
PAR-CLIP	84
PAR-CLIP Bioinformatic Analysis	86
Metabolite Extraction.....	87
<i>In vivo</i> Protein Localization	88
Protein Localization in Fixed Cells.....	89
Fluorescence in situ hybridization.....	89
Stress Granule Purification	90
Statistics/Informatics Support	92
COLLABORATIONS	93
RESULTS	97
CHAPTER 1	99
Mip6 Interacts Physically and Genetically with the Mex67, an Essential RNA Export Factor.....	101
Mip6 Deletion does not Affect Mex67 Nuclear Pore Complex Localization or Protein Level	102
Deletion of <i>MIP6</i> Promotes Mex67 Δ C1 Mutant Accumulation in Cytoplasmic Granules in Response to Stress	103
Mip6 Shuttles Between the Nucleus and the Cytoplasm, Partially Via and Interaction with Mex67	105
Deletion of Mex67 UBA Domain Affects Interaction with Mip6 and Causes Mip6 Nuclear Retention.....	106
Mip6 RRM4 Mediates Interaction with Mex67 and Affects Mip6 Localization	107
Mex67 interaction and Mip6 localization Requires Mip6 Tryptophan-442.....	108
Mip6 Interacts with mRNA Export Machinery to Enhance Nuclear Export.....	109
Mip6 Accumulates in Stress Granules under Stressful Conditions	110
Mip6 Copurifies with Stress Granules and Affects their Metabolism.....	112
Deletion of <i>MIP6</i> Promotes Cell Survival after Severe Heat Shock Stress.....	114
CHAPTER 2	117

Mip6 Preferentially Binds to Msn2/Msn4-dependent Transcripts <i>in vivo</i>	119
Metabolism of Msn2/Msn4-dependent Transcripts Requires Mip6	121
Mip6 Collaborates with Rrp6 to Maintain Low Levels of Msn2/Msn4-dependent Transcripts	123
Msn2/Msn4 Disruption Provokes Mip6 Nuclear Retention Under Stress	125
CHAPTER 3	127
Deletion of Mip6 RRM4 Differentially Affect Mip6 Localization.....	129
Mip6 RRM4 Contains a Putative Nuclear Export Signal	131
Crm1/Xpo1 Exportin Does not Mediate Mip6-Nuclear Export Signal-dependent Export	132
Msn5 Karyopherin Regulates Nuclear Export Signal-dependent Mip6 Export	133
The Hmt1 Methyltransferase Collaborates in Mip6 Shuttling in Response to Stress	136
DISCUSSION	137
Characterization of the Mip6 and Mex67 Interaction: Structural and Functional Insights.....	139
Mip6 is a Shuttling Protein that Accumulates in Stress Granules under Stressful Conditions.....	142
Mip6 Binds to most Transcripts <i>in vivo</i> , but Preferentially to Msn2/Msn4-dependent Transcripts under Normal Conditions.....	146
Does Mip6 Repress the Translation of Unnecessary Transcripts? An Unexpected mRNA Buffering Protein	148
CONCLUSIONS	153
BIBLIOGRAPHY	157
MEMORIA DE LA TESIS	191

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ABSTRACT

RNA binding proteins (RBPs) participate in virtually every step of gene expression, demonstrating a potential role as a quality control system contributing to RNA homeostasis. One of the proteins with an essential role in mRNA export in yeast is the evolutionary conserved Mex67 transporter. Although Mex67 binds to RNAs, it requires adaptor proteins to interact with quality-controlled mRNAs and undergo export through the nuclear pore complex. During heat shock, Hsf1 and Msn2/Msn4 transcription factors produce stress-responsive mRNAs. The export of Hsf1-dependent mRNAs depends on direct interaction with Mex67, without quality control mechanisms. However, we know less regarding the export of Msn2/Msn4-dependent transcripts, although various relatively unstudied RBPs may participate in this process. Previous yeast two-hybrid assays revealed an interaction between Mex67 and the putative RBP Mip6. Mip6 contains four RNA recognition motifs (RRMs) and has been described as a modulator of mRNA metabolism during sporulation.

In this thesis, we report the functional characterization of Mip6 under optimal and stressful growth conditions through a study of the functional interaction with the essential exporter Mex67, its mRNA targets, and the required elements for its subcellular localization.

Mip6 directly interacts with the ubiquitin-associated domain of Mex67 through tryptophan-442 of Mip6 RRM4, whose mutation leads to the slow growth of yeast cells *in vivo*. Mip6 shuttles between the nucleus and the cytoplasm in a Mex67-dependent manner and concentrates in cytoplasmic foci in response to insult by various stressors. Mip6 copurifies with Pab1 in stress granules (SGs), and cells lacking *MIP6* display altered Pab1-SGs behavior. Confocal microscopy studies established that deletion of the Mip6 RRM4 leads to Mip6 nuclear retention. Moreover, the export of Mip6 is also regulated by a Crm1-independent Nuclear Export Signal (NES) in RRM4 that is controlled by the karyopherin Msn5. Photoactivatable ribonucleoside-enhanced crosslinking and immunoprecipitation (PAR-CLIP) experiments demonstrated enriched Mip6 binding to Msn2/Msn4 dependent transcripts under stress-free conditions; however, Mip6 enrichment changes during heat shock showing a preferential binding to ribosomal protein genes (RPGs). Consistent with PAR-CLIP results, *MIP6* deletion and the mutation of tryptophan-442 augment the expression

levels of Msn2/Msn4 targets (*HSP12* and *CTT1*). Deletion of both *MIP6* and the *RRP6* nuclear exosome component further increases *HSP12* and *CTT1* levels.

These results reveal a novel role for Mip6 in mRNA homeostasis through direct interaction with Mex67. We envision a model in which the initial interaction of Mip6 with RNA contributes to the Mex67- and/or NES-dependent export of Mip6. This transport helps to regulate the levels of Msn2/Msn4-dependent mRNAs under stress-free conditions. However, in response to stressors, Mip6 accumulates in SGs and the repression of RPG mRNAs.

RESUMEN

Las proteínas de unión a ARN participan en múltiples procesos de la expresión génica ejerciendo un posible papel en el control de calidad del ARN. Una de las proteínas más importantes en la exportación de ARNs mensajeros (ARNms) en levaduras es Mex67. Aunque Mex67 es capaz de unir a ARN, requiere de proteínas adaptadoras para interactuar con ARNms maduros y de esta manera ser exportados a través del complejo del poro nuclear. Bajo choque térmico, los ARNms de respuesta a estrés son rápidamente producidos por los factores de transcripción Hsf1 y Msn2/Msn4. La exportación de los ARNms controlados por Hsf1 depende de la interacción directa con Mex67 sin pasar el control de calidad. En cambio, los mecanismos que controlan la exportación de los ARNms dependientes de Msn2/Msn4 se desconocen sugiriendo que proteínas de unión a ARN no estudiadas participen. En ensayos previos de doble híbrido, se describió la interacción entre Mex67 y la proteína de unión a ARN Mip6. Mip6 contiene cuatro dominios de unión a ARN (RRMs) y ha sido descrita como modulador del metabolismo de ARNms relacionados con esporulación.

En esta tesis hemos trabajado en la caracterización funcional de Mip6 en condiciones óptimas de crecimiento y en estrés mediante el análisis de su interacción funcional con Mex67, la identificación y el efecto en el metabolismo de sus ARNms diana y el estudio de los elementos requeridos para su localización subcelular.

Mip6 interactúa de manera directa con el dominio asociado a ubiquitina (UBA) de Mex67 a través del triptófano 442 del RRM4 de Mip6, cuya interacción produce un crecimiento retardado en levaduras. Mip6 es transportado entre el núcleo y el citoplasma de manera dependiente de Mex67 y se concentra en gránulos citoplasmáticos en diversas condiciones de estrés. Mip6 se copurifica con Pab1 en gránulos de estrés (SGs) y células sin *MIP6* presentan anomalías en el metabolismo de los SGs que contienen Pab1. Ensayos de microscopía confocal muestran que la delección de los RRM4 de Mip6 produce su retención nuclear. Además, la exportación de Mip6 también está regulada por la presencia de una secuencia de exportación nuclear (NES) controlada por la carioferina Msn5. Ensayos de inmunoprecipitación de proteína con ARNs entrecruzados por ribonucleósidos fotoactivables (PAR-

CLIP) muestran un enriquecimiento en la unión de Mip6 con ARNms dependientes de Msn2/Msn4 bajo condiciones óptimas. En cambio, este enriquecimiento varía tras choque térmico produciendo la unión preferencial de Mip6 a ARNms de genes de proteínas ribosomales (RPGs). En relación con los resultados de PAR-CLIP, la delección de *MIP6* y la mutación del triptófano 442 aumentaron los niveles de expresión de los genes diana de Msn2/Msn4 *HSP12* y *CTT1*. La delección combinada de *MIP6* y el miembro del exosoma nuclear *RRP6* aumenta en mayor medida los niveles de ARNms de *HSP12* y *CTT1*.

Estos resultados revelan un posible papel de Mip6 en la homeostasis de ARNms producida por su interacción con Mex67. Proponemos un modelo en el cual, inicialmente, la interacción de Mip6 con ARN contribuye a la posterior exportación de Mip6 a través de Mex67 y/o gracias a la secuencia NES. Este transporte colaboraría en la regulación de los niveles de los ARNms dependientes de Msn2/Msn4 bajo condiciones no estresantes. En cambio, bajo estrés, Mip6 se acumularía en SGs para apoyar en la represión de ARNms de RPGs.

ABBREVIATIONS

ADP	Adenosine diphosphate
Amp	Ampicilline
APS	Ammonium persulfate
ATP	Adenosine triphosphate
bp	Base pair
BSA	Bovine Serum Albumin
CBC	Cap-binding complex
cDNA	Complementary DNA
CF	Cleavage factor
CHX	Cycloheximide
CID	Carboxy-terminal domain of Sac3
COMPASS	Complex of proteins associated with Set1
CPF	Cleavage and polyadenylation factor
CTD	Carboxy terminal domain of RNA polymerase II
C-terminal	Carboxy-terminal
DAPI	4' 6-diamidino-2-phenylindole
DNA	Deoxyribonucleic acid
dNTP	deoxyribonucleotide triphosphate
DTT	Dithiothreitol
ECL	Enhanced chemiluminescence
EDTA	Ethylene diaminetetraacetic acid
eEF	Translation elongation factor
eIF	Translation initiation factor
eRF	Translation release factor
ESR	Environmental stress response
FACT	Facilitator of chromatin transactions
FG	Phenylalanine-Glycine
FISH	Fluorescent <i>in situ</i> hybridization
FW	Forward
GDP	Guanosine diphosphate
GEO	Gene expression omnibus
GFP	Green fluorescent protein
G-protein	Guanine nucleotide-binding protein
GSEA	Gene set enrichment analysis
GST	Glutathione S-transferase
GTF	General transcription factor
GTP	Guanosine triphosphate
HA	Human influenza hemagglutinin
HMM	Hidden markov models
hnRNP	heterogeneous nuclear ribonucleoparticle
HSE	Heat shock element
HSF1	Heat shock factor 1
HSP	Heat shock protein
HSQC	Heteronuclear single quantum correlation
HSR	Heat shock response
HTB	Hexahistidine-Tev site-Biotinylation signal

HTseq	High technology sequencing
HU	High urea
I/W/E	Input/Wash/Eluate
IDR	Intrinsically disordered region
IMP	Importins/Karyopherins
IP	Immunoprecipitated
IP6	Inositol hexakisphosphate
IRES	Internal ribosome entry sites
ISWI	Imitation SWI
ITC	Isothermal titration calorimetry
kDa	Kilodalton
LB	Lysogeny broth
LBf	Loading buffer
LLPS	Liquid-liquid phase separation
LRR	Leucine-rich region
m7G	7-methylguanosine
MAP	Mitogen-activated protein
MAPK	Mitogen-activated protein kinase
Mb	Megabase
mRNA	Messenger ribonucleic acid
mRNP	Messenger ribonucleoparticle
NAC	Nucleotide-addition cycle
NDR	Nucleosome-depleted region
NES	Nuclear export signal
NGD	No-go decay
NLS	Nuclear localization signal
NMD	Nonsense-mediated decay
NMR	Nuclear magnetic resonance
NN	Neural networks algorithms
NP-40	Nonidet P-40
NPC	Nuclear pore complex
NRD	Nrd1, Nab3 and Sen1 complex
NSD	Non-stop decay
N-terminal	Amino-terminal
NTF2	Nuclear transcription factor 2
OD	Optical density
P/A/E sites	Peptidyl/Aminoacyl/Exit sites
PAF	Paf1, Cdc37, Ctr9, Rtf1 and Leo 1 complex
PAN	Polyadenylated nuclease
PAR-CLIP	Photoactivatable ribonucleoside-enhanced crosslinking and immunoprecipitation
PAS	Polyadenine signal
PB	P-body
PBS	Phosphate buffered saline
PCR	Polymerase chain reaction
PEG	Polyethylene glycol
PIC	Pre-initiation complex

PKA	Protein kinase A
PNK	Polynucleotide 5'-hydroxyl-kinase
poly (A)	Polyadenylated
PPi	Pyrophosphate
qPCR	Quantitative PCR
qRT-PCR	Quantitative retrotranscription-PCR
RBP	RNA binding protein
REMD	Ribosome-extension mediated decay
RFP	Red fluorescent protein
RNA	Ribonucleic acid
RNA Pol	Ribonucleic acid polymerase
RNA-seq	Ribonucleic acid sequencing
RNP	Ribonucleoparticle
RPG	Ribosomal protein gene
RRM	RNA recognition motif
rRNA	ribosomal ribonucleic acid
RV	Reverse
SAGA	Spt/Ada/Gcn5 acetyltransferase
SC	Synthetic complete
SD	Standard deviation
SDS	Sodium dodecyl sulfate
SEM	Standard error of the mean
SG	Stress granule
sHSP	Small heat shock protein
snRNP	Small nuclear ribonucleoprotein
SOC	Super optimal broth with catabolite repression
SR	Serine-Arginine
SSC	Saline-sodium citrate
STRE	Stress-response element
SWI/SNF	Switch/Sucrose non-fermentable
TAE	Tris-acetate-EDTA
TAF	TATA-binding protein-associated factor
TAP	Tandem affinity purification
TBP	TATA-binding protein
TBS	Tris-buffered saline
TCA	Trichloroacetic acid
TE	Tris-EDTA
TEMED	N,N,N',N'-Tetramethylethane-1,2-diamine
TES	Tris-EDTA-SDS
TF	Transcription factor
THO	Tho2, Hpr1, Mtf1 and Thp2 complex
TOR	Target of rapamycin
TRAMP	Trf4/5-Aim1/2-Mtr4 polyadenylation
TREX	Transcription-export
TREX-2	Transcription-export 2
tRNA	Transfer ribonucleic acid

TSAP	Thermosensitive alkaline phosphatase
TSS	Transcription start site
UAS	Upstream activating sequence
UBA	Ubiquitin-associated
UPS	Ubiquitin-proteasome system
URS	Upstream repressing sequence
UTR	Untranslated region
UV	Ultraviolet
v/v	Volume/volume
w/v	Weight/volume
WCE	Whole cell extraction
WT	Wild-type
X-tRNA	Aminoacyl transfer ribonucleic acid
YNB	Yeast nitrogen base
YPD	Yeast extract-peptone-dextrose

INTRODUCTION

Saccharomyces cerevisiae as a Model Organism

Results from experiments obtained using simple models can be extrapolated, enabling the understanding of similar processes in other organisms. One of the most useful and well-known model organisms is the budding yeast *Saccharomyces cerevisiae*, commonly known as brewer's or baker's yeast (Karathia *et al.*, 2011; Botstein and Fink, 2011). *S. cerevisiae* is a unicellular organism and a member of the lower eukaryotes in the fungus kingdom. Its diameter measures approximately 5 μm and it rapidly duplicates under optimized growth conditions in the laboratory - approximately 90 minutes at 28-30°C with agitation - following a specific cell cycle (**Figure 1**).

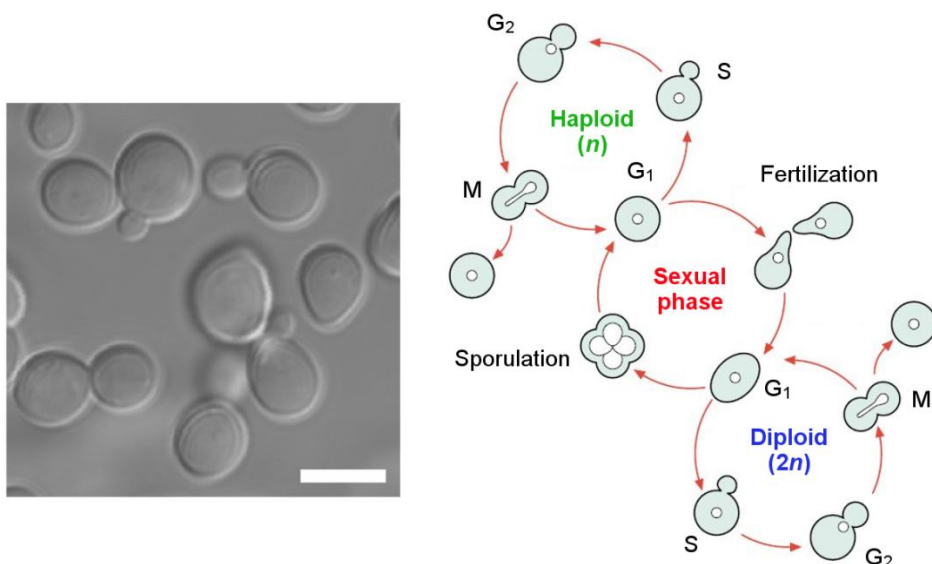


Figure 1. Yeast Morphology and Life Cycle. *Left*, a bright field microphotograph of wild-type yeast cells. Scale bar: 5 μm . *Right*, a schematic representation of the yeast cell cycle including the haploid phase, the diploid phase, with G₁, S and G₂ phases with a mitotic division (M), and a sexual phase which includes shmoosing and fertilization, produced by the union of two haploid cells, and sporulation and germination, produced by meiotic division and production of spores of a diploid cell when growth conditions are not optimal. Figure adapted from the work by Mell and Burgess (Mell and Burgess, 2003).

Yeasts are phenomenal tools in molecular experiments due to the relative ease of their genetic manipulation (Duina *et al.*, 2014; Burgess and Powers, 2017). We can easily alter, delete, or add sequences in their genome by taking advantage of their capacity for homologous recombination. Furthermore, the genome of *S. cerevisiae* was the first of the eukaryotes to be

sequenced and annotated (Goffeau *et al.*, 1996; Dujon, 1996; Johnston, 1996). This information confirmed *S. cerevisiae* as an incredibly useful organism for biochemical, genetic, and molecular studies that can contribute to various branches of science, including bioindustry, aging or, taking this thesis as an example, the analysis of gene expression.

Genome Structure and Gene Expression

To appropriately store the 12 megabases (Mb) and more than 6,000 genes possessed by *S. cerevisiae*, the haploid genome is packaged into sixteen compact chromosomes. The organization of each chromosome is essential for the optimal regulation of gene expression (Lanctôt *et al.*, 2007; Nguyen and Bosco, 2015). To allow for the expression of a specific gene, the chromatin structure of chromosomes adopts a less compact conformation. Chromatin is divided into decondensed and permissive *euchromatin* or condensed and generally inhibitory *heterochromatin* (van Steensel, 2011; Bi, 2014). The euchromatic conformation allows the genome to take on a more dynamic state to allow contact with the factors that regulate gene expression. Chromatin is composed of nucleosomes linked to 10-60 bp of naked DNA (Luger *et al.*, 1997). Nucleosomes are the basic structural unit of chromatin and comprise a histone protein octamer with 145-150 bp of coiled DNA. Histone proteins participate in DNA organization and undergo extensive modification at the post-translational level (Millar and Grunstein, 2006). Together with other variations in chromatin arrangement, histone modifications control several biological processes, including chromosome stability, chromosome segregation, and gene expression (Tessarz and Kouzarides, 2014; Lawrence *et al.*, 2016; Fenley *et al.*, 2018).

To produce a protein, DNA is transcribed into messenger ribonucleic acid (mRNA) that must leave the nucleus to permit protein production. In eukaryotes, DNA is contained and protected within the nucleus, a bilayer-membraned organelle. The appearance of the nucleus represents the main differences between eukaryotes and prokaryotes (Vellai and Vida, 1999). The regulated

transport of molecules between the nucleus and the cytoplasm occurs thanks to the presence of nuclear pores and the activity of the nuclear pore complex (NPC). Before nuclear export, an mRNA must be processed appropriately to allow translation by the ribosomes that reside in the cytoplasm (**Figure 2**).

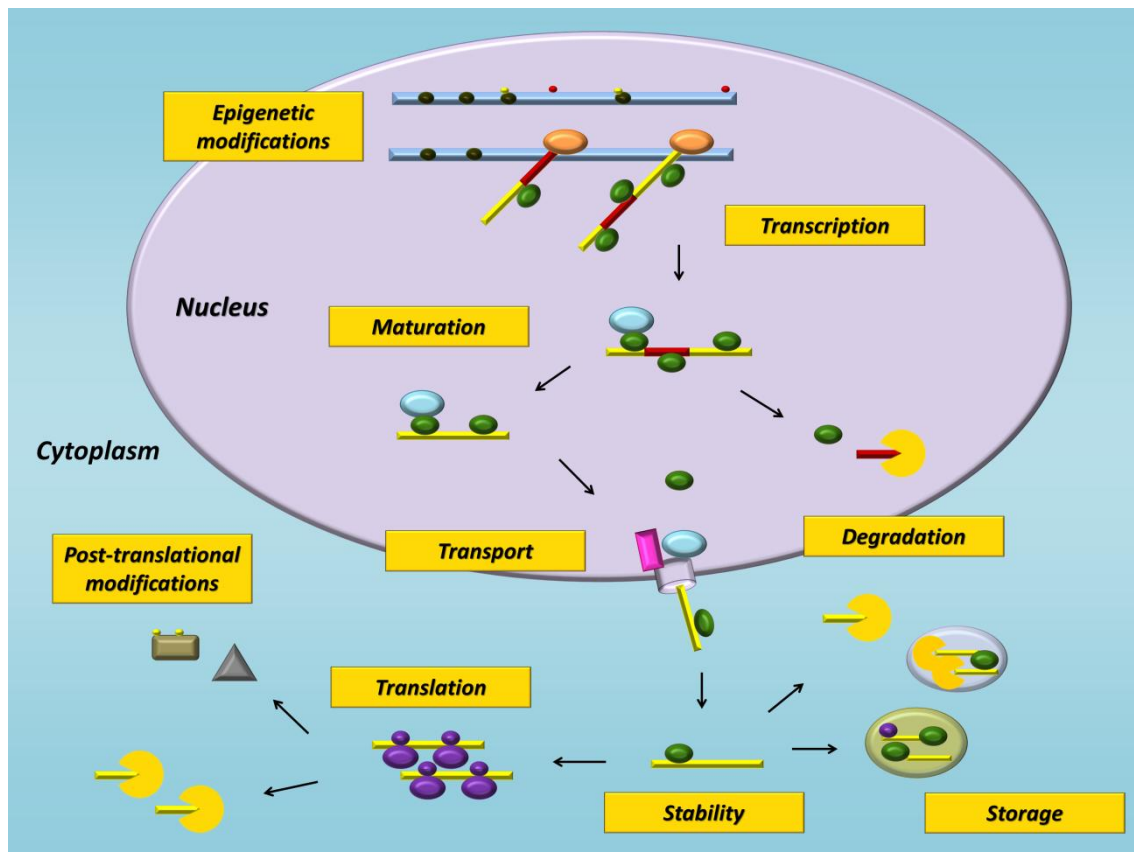


Figure 2. RNA life cycle and regulation of gene expression. Various mechanisms control gene expression. Epigenetic modifications are changes to residues in DNA and/or histones that can affect processes such as DNA replication or gene transcription. Transcription is the synthesis of RNA molecules from a specific DNA sequence. RNA must be modified by splicing to discard intron sequences and protected by 5' capping and 3' polyadenylation to elude exonucleases. After maturation, messenger RNA is sheltered by different RNA-binding proteins for export through the NPC and further stabilization in the cytoplasm. Once in the cytoplasm and depending on cellular needs, RNAs can be stored in specific foci, degraded by the mRNA decay machinery, or translated by ribosomes. Once mRNA translation has finished, RNAs undergo degradation.

Processes include the production of an mRNA molecule (transcription), capping, polyadenylation, splicing, and maturation before export of mRNAs (**Figure 2**). Other processes affecting mRNA that can modulate gene expression include its storage and/or degradation in both the nucleus and cytoplasm. RNA-independent processes that contribute to the regulation of gene expression include epigenetic modifications, including histone and DNA

modifications (Grunstein and Gasser, 2013; Fahrenkrog, 2015), and post-translational modifications of other proteins (Brookes and Pombo, 2009; Kaganovich and Snyder, 2012). Throughout the following sections, we will focus on the mRNA life cycle, from production to degradation, briefly explaining the different steps and regulatory factors involved.

RNA Polymerase II-mediated Transcription

In eukaryotes, DNA-dependent RNA polymerases produce RNAs. Yeasts and animals possess three different RNA polymerases (RNA Pol I, II and III), while plants have two additional enzymes (RNA Pol IV and V). RNA polymerases are similar in structure and function but vary in cofactor requirements or the group of genes transcribed (Vannini and Cramer, 2012; Carter and Drouin, 2009). RNA polymerases perform RNA transcription in three phases: initiation, elongation, and termination (**Figure 3**; Shandilya and Roberts, 2012; Liu *et al.*, 2012). In this section, we focus on the RNA Pol II-mediated transcription of a *protein-coding gene*.

The transcription initiation of an mRNA involves the coordination of the RNA Pol II together with the Mediator complex and General Transcription Factors (GTFs), which include TFIIA, TFIIB, TFIID, TFIIIE, TFIIF, and TFIIH. The assembly of these complexes generates the transcription preinitiation complex (PIC) (Luse, 2014; Sainsbury *et al.*, 2015). GTFs interact with upstream gene sequences called promoters in response to regulatory factors. Regulatory factors bind to DNA at upstream promoter sequences, acting as activators and binding to upstream activating sequences (UAS), or repressors and binding to upstream repressing sequences (URS). Regulatory factors interact simultaneously with specific DNA sequences (DNA binding domain) and other proteins (coactivators or corepressors) to aid in gene transcription. The promoters and UAS/URS are mainly encountered in conserved nucleosome-depleted regions (NDRs) of the genome (Tsui *et al.*, 2011) and facilitate the binding of different regulators (Lee *et al.*, 2007; Mavrich *et al.*, 2008). DNA regulatory regions become exposed to the transcriptional machinery thanks to

the activities of chromatin-remodeling complexes, histone modifying enzymes, and histone chaperones (Narlikar *et al.*, 2002).

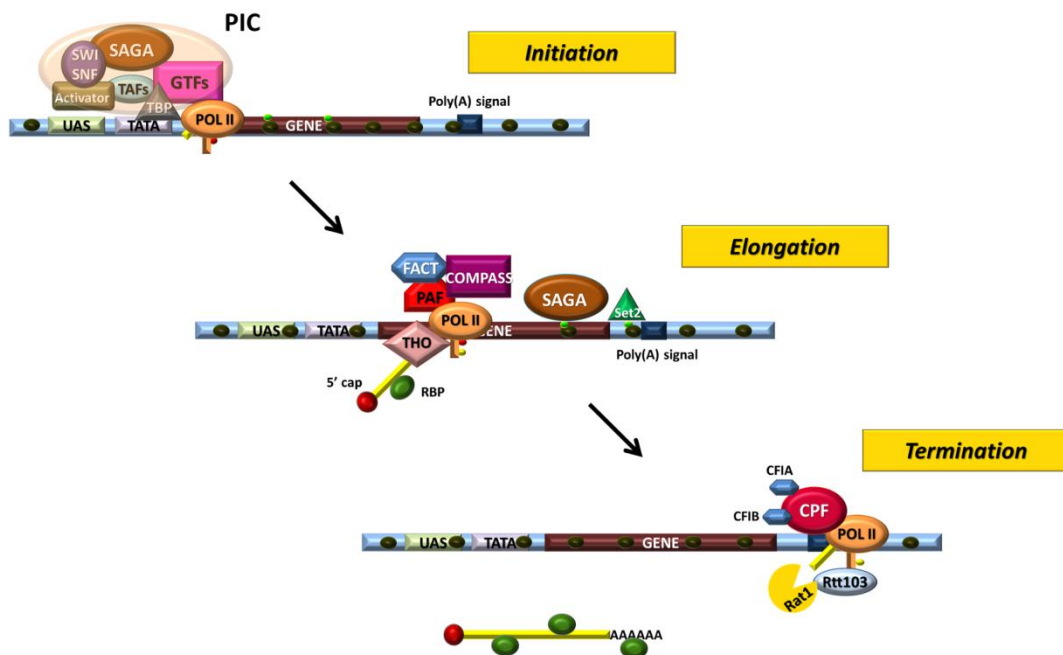


Figure 3. Production of an mRNA molecule: RNA Pol II transcription. Transcription starts with the formation of the preinitiation complex (PIC) and the binding of RNA Pol II to the transcription start site (TSS). Following the production of the first chain of 30 ribonucleotides, the PIC disassembles, and elongation factors interact with RNA Pol II to allow concatenated cycles to elongate the RNA molecule. When the RNA Pol II arrives at the 3' untranslated region (UTR), the cleavage and polyadenylation factor (CPF) and cleavage factor (CF) complex permit termination and cleavage of the new RNA molecule. The Rat1 exonuclease degrades residual RNAs remaining after mRNA cleavage thanks to the recruitment of Rtt103 or allosteric alterations. RNA Pol II C-terminal domain (CTD) kinases/phosphorylases and histone remodelers have essential roles during the entire process and are essential for optimal gene transcription.

Despite the fact that many transcription regulatory factors affect gene expression (Hahn and Young, 2011; Teixeira *et al.*, 2018), there are two main pathways for transcriptional activation that depend on the activities of two different protein complexes: SAGA (Spt/Ada/Gcn5 Acetyltransferase complex) and TFIID (Transcription Factor IID) (Sterner *et al.*, 1999; Horikoshi *et al.*, 1990). TFIID represents the main factor that regulates 90% of the yeast genes expressed during cell maintenance (housekeeping genes), while the SAGA complex controls the remaining genes, which are mostly related to stress responses (Huisinga and Pugh, 2004). SAGA-dependent genes are characterized by the presence of TATA-box regions (adenine/thymine rich sequences) in their promoters, while TFIID-controlled genes showed TATA-like

or TATA-less sequences (Bhaumik and Green, 2002; Yella and Bansal, 2017). However, during the last few years, some studies have discovered that both complexes can control any RNA Pol II transcript independently of the presence of TATA-box or TATA-less sequences (Bonnet *et al.*, 2014; Baptista *et al.*, 2017; Warfield *et al.*, 2017; García-Molinero *et al.*, 2018). These results established that the control of gene expression is more complicated than at first expected. Following recruitment of the TATA-binding protein (TBP) to TATA-box promoters and the association of TBP-associated factors (TAFs) on promoter sequences, the assembly of the remaining proteins that form the PIC complex required for transcription initiation occurs (Shandilya and Roberts, 2012). A nascent mRNA of 30 bases is synthesized that, together with the transcription machinery, continues to the elongation phase.

The elongation phase is a dynamic process with many proteins participating; these include transcription initiation factors, such as RNA Pol II and SAGA complexes, and the elongation machinery. This machinery includes mRNA processing, mRNA export, and histone-modifying proteins such as PAF (Paf1, Cdc73, Ctr9, Rtf1 and Leo1), FACT (facilitator of chromatin transactions), THO (Tho2, Hpr1, Mft1 and Thp2), and COMPASS (complex of proteins associated with Set1) complexes amongst others (Li *et al.*, 2007; Buratowski, 2009; Chávez *et al.*, 2000; Kaplan, 2012). In this step, robust transcription requires the controlled phosphorylation of the RNA Pol II CTD (C-terminal domain) by kinases and phosphatases (Kobor and Greenblatt, 2002; Egloff *et al.*, 2012). Moreover, the activity of specific histone-modifying proteins, such as histone deubiquitinase Ubp8 from the SAGA complex or the Set2 methyltransferase (Krogan *et al.*, 2003; Oliete-Calvo *et al.*, 2018), are essential for the coordination of transcription elongation. The function and cooperation of these complexes promote the addition of nucleotides to the nascent RNA chain in a cyclic process known as the nucleotide-addition cycle (NAC) (Brueckner *et al.*, 2009). RNA Pol II elongation can pause when physical obstacles disturb its advance or once RNA Pol II reaches DNA sequences that provoke backward movement. This pause can lead to RNA Pol II backtracking to correct mistakes and/or recover RNA production (Cheung and Cramer, 2011; Nudler, 2012).

Once the RNA polymerase arrives at the termination sequences, transcription elongation finishes (transcriptional termination).

Transcription termination occurs when RNA Pol II arrives at the 3' downstream sequences, also known as 3' UTRs, through the recognition of specific termination signals. There exist two termination mechanisms: the deceleration of RNA Pol II transcription and the instability of the RNA:DNA hybrid (Mischo and Proudfoot, 2013). Both effects cause the exchange of factors involved in the excision of the produced mRNA from RNA Pol II. Two pathways control the 3' end processing of RNAs performed by RNA Pol II: NRD-dependent (Nrd1-Nab3-Sen1, binds specific DNA sequences) for short and non-coding RNAs or PAS-dependent (CPF-CF complex that binds poly(A) sites) for most protein-coding genes (Grzechnik *et al.*, 2014). Focusing on mRNA translation termination, the CPF-CF complex recognizes specific 3' UTR sequences and interacts with the RNA Pol II CTD (Porrúa and Libri, 2015). This structure is also called the polyAosome and will bind to poly(A) signals to cleave the transcript at the poly(A) site through its endonucleolytic activity. These regions are present at many sites throughout the 3' UTR of some genes, giving rise to alternative polyadenylation sites (Ozsolak *et al.*, 2010; Chen *et al.*, 2017). The 3' end of mRNA is protected by the addition of a poly(A) tail by the CPF-associated poly(A) polymerase Pap1, while the Rat1 exonuclease degrades the residual RNA (Chen and Moore, 1992; Kim *et al.*, 2004). Two alternative models have been proposed for the mechanism of Rat1 exonuclease activity: the instability of the elongation complex brought about by conformational changes (allosteric model; Richard and Manley, 2009) and the recruitment of Rat1 to the RNA Pol II environment through the CTD-interacting protein Rtt103 that causes the dissociation of the elongation structure (Torpedo model; Tollervey, 2004). Throughout this whole process, mRNAs are modified and protected for their subsequent export to the cytoplasm.

al., 1987; Tsukamoto *et al.*, 1997; Gu *et al.*, 2010). Cet1 removes a phosphate residue from the first triphosphorylated nucleotide in the mRNA sequence, while Ceg1 adds a guanosine triphosphate (GTP) molecule to this nucleotide, thereby producing a three-phosphate bridge and a residual pyrophosphate (PPi). Once the guanine has been added to the 5' end, the Abd1 guanine-7-methyltransferase independently transfers a methyl group from S-adenosylmethionine (which is converted to S-adenosylhomocysteine) to the nitrogen-7 of the guanine, finishing the 5' capping process (Mao *et al.*, 1995). At the end of this process, proteins interact with the 5' cap to produce the cap-binding complex (CBC), which is implicated in processes such as splicing and translation (Lewis and Izaurralde, 1997).

In yeast, though less than 300 genes contain one or more introns, splicing events are essential due to the relevance of these intron-containing mRNAs (generally highly expressed genes) to cell growth and maintenance (Parenteau *et al.*, 2008). Yeast introns have been well characterized with sequences for spliceosome recruitment that allow the proper removal of introns identified. These sequences are the 5' splice site, the branch site, and the 3' splice site (Izquierdo and Valcarcel, 2006; Meyer and Vilardell, 2009). Mutations of these sequences alter gene expression (Rodríguez-Navarro *et al.*, 2002; AbuQattam *et al.*, 2016). Although these regions are essential for optimal splicing, there are also cases in which exons play an important role in the excision of these sequences (AbuQattam *et al.*, 2018). The complex responsible for intron cleavage is the spliceosome - one of the largest multiprotein complexes in eukaryotes - requiring the recruitment of approximately 300 proteins and 5 RNAs (Nilsen, 2003; Jurica and Moore, 2003). The formation and activity of the spliceosome take place during transcription thanks to recruitment by the 5' CBC, intron-specific sequences and, in some cases, the RNA binding protein Npl3 (Kress *et al.*, 2008). The mode of complex assembly is still under discussion, with two models proposed: the piece-by-piece formation of the complex and the recruitment of a preassembled small nuclear ribonucleoprotein of five units (penta-snRNP) (Stevens *et al.*, 2002; Nilsen, 2005). Briefly, splicing-related proteins, especially the snRNP complexes, act in two consecutive reactions following spliceosome

construction: first, the RNA branch site nucleophilically attacks the 5' splice site, producing cleavage of the 5' exon and, second, the 5' exon induces the breakage of the 3' splice site, yielding a spliced mRNA and excised intronic products (Collins and Penny, 2005; Konarska and Query, 2005). Introns and unspliced mRNAs are predominantly degraded by the Trf4/5-Air1/2-Mtr4 polyadenylation (TRAMP) complex and the nuclear mRNA decay machinery, a process that generally does not affect cell growth (Parenteau *et al.*, 2008; Kong *et al.*, 2014). However, the stabilization of some introns can alter gene expression and cell growth; the accumulation of excised introns contributes to the control of yeast growth under saturated conditions (Morgan *et al.*, 2019). This regulating mechanism also represses ribosomal protein expression and promotes resistance to starvation conditions (Parenteau *et al.*, 2019).

The last process in the mRNA maturation process is the addition of the 3' poly(A) tail, through the activity of the Pap1 CPF-associated poly(A) polymerase during transcription termination (Chen and Moore, 1992; Zhao *et al.*, 1999). Adenine-rich sequences can reach around 200 adenines unless the PAN poly(A) nuclease complex acts to control length to the commonly observed 60-80 adenines (Brown and Sachs, 1998). The PAN nuclease complex is recruited by the poly(A) binding protein 1 (Pab1) to maintain poly(A) tails and protect them from degradation in conjunction with other RNA binding proteins, such as Nab2 (Dunn *et al.*, 2005; Viphakone *et al.*, 2008).

The interaction of other RBPs with these proteins also has relevance in the following step: mRNA transport.

mRNA Transport

mRNA export from the nucleus represents a crucial step in gene expression that ensures efficient protein production (Stewart, 2019). In eukaryotic cells, mRNA export is connected to transcription and later events that modulate mRNA fate through the activity of a repertoire of factors and multiprotein complexes (Garcia-Oliver *et al.*, 2012; Reed, 2003; Rodriguez-Navarro and Hurt, 2011; Rondon *et al.*, 2010). Among these factors, the yeast

Mex67-Mtr2 export receptor heterodimer (Segref *et al.*, 1997) is crucial for mRNA export and is loaded onto transcripts early during transcription (Dieppois *et al.*, 2006; Kelly and Corbett, 2009). Mex67 (TAP-p15 in humans; Katahira *et al.*, 1999) confers competence to messenger ribonucleoproteins (mRNPs) for docking at the NPC. Mex67 is an RNA export factor that shuttles between the nucleus and the cytoplasm thanks to its interaction with nucleoporins with multiple phenylalanine-glycine repeats (FG-nucleoporins) and NPC components (Terry and Wentz, 2007). Mex67 has an architectural organization composed of four domains (**Figure 5**). In the N-terminal domain, Mex67 contains an RNA recognition motif (RRM) and a leucine-rich region (LRR) that mediate the interaction of RNA with RBPs that act as mRNA adaptor proteins. In the central section, Mex67 contains a nuclear transport factor 2 (NTF2)-like domain, which is necessary for interaction with Mtr2 and the optimal binding of Mex67 to the NPC. At the C-terminal region, Mex67 contains a ubiquitin-associated domain (UBA) that provides an overlapping binding site for both FG-nucleoporins and RNA binding proteins, especially for ubiquitylated proteins, which defines the selectivity of the Mex67 UBA domain (Gwizdek *et al.*, 2006; Hobeika *et al.*, 2007; Hobeika *et al.*, 2009).

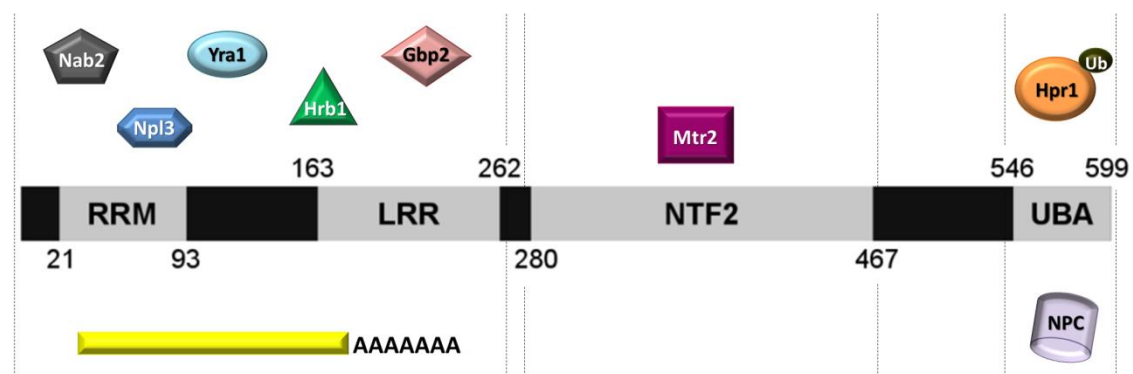


Figure 5. Mex67 protein and its interactions. The Mex67 protein contains four domains: an RNA Recognition Motif (RRM) and a leucine-rich region (LRR) that interact with most adaptor proteins and RNA, an NTF2-like domain that interacts with the Mtr2 protein, and a ubiquitin-associated (UBA) domain that allows Mex67 interaction with FG-nucleoporins and ubiquitylated proteins.

The low affinity of Mex67 for RNA necessitates RNA-binding adaptors to interface with mRNAs and positively or negatively modulate their metabolism during mRNA export (Stutz *et al.*, 2000; Zenklusen *et al.*, 2001; Dunn *et al.*,

2005). These proteins include the Yra1, Npl3, and Nab2 RNA-binding proteins (Hackmann *et al.*, 2014; Iglesias *et al.*, 2010; Lei *et al.*, 2001). Yra1 (Aly/REF in higher eukaryotes; Strässer and Hurt, 2000) is an RBP from the heterogeneous nuclear ribonucleoproteins (hnRNP)-like protein family. Yra1 and the functionally redundant Yra2 bind to RNA and directly interact with the Mex67 export receptor to facilitate the recruitment of Mex67 to the mRNP (Strässer and Hurt, 2000; Zenklusen *et al.*, 2001; Ma *et al.*, 2013). Moreover, co-transcriptional Yra1 recruitment aids RNA maturation and 3' end formation (Johnson *et al.*, 2009). The recruitment of Yra1 together with the Sub2 RNA helicase is associated with transcriptionally active genes linked to the THO complex (composed by Hpr1, Tho2, Thp2, Mft1, and Tex1 proteins; Jimeno and Aguilera, 2010; Gewartowski *et al.*, 2012). This Yra1-Sub2-THO multiprotein, assembly, the TREX (Transcription – Export) complex, participates in mRNP biogenesis and mRNA export by coupling transcription with export (Strässer *et al.*, 2002). Hpr1, a member of THO/TREX complex, is also involved in the early recruitment of the Mex67 export receptor through an interaction mediated by the ubiquitinated Hpr1 and the Mex67 UBA domain, thereby acting as a Mex67 adaptor protein (Gwizdek *et al.*, 2006; Hobeika *et al.*, 2007). Npl3 is a member of the SR-like family that also acts as a Mex67 adaptor protein and plays roles in many RNA processes, including transcription, splicing, and mRNA export (Dermody *et al.*, 2008; Kress *et al.*, 2008; Lee *et al.*, 1996). Chromatin modification and translation mechanisms are also affected by the Npl3 protein (Moehle *et al.*, 2012; Windgassen *et al.*, 2004), which itself is post-translationally modified through phosphorylation to control mRNP dissociation (Sky1 kinase; Gilbert *et al.*, 2001) or methylation to regulate transport (Hmt1 methyltransferase; McBride *et al.*, 2005). The Gbp2 and Hrb1 SR-like proteins are also Mex67 adaptor proteins and are recruited co-transcriptionally by the TREX complex to control the quality of spliced mRNA (Hurt *et al.*, 2004; Häcker and Krebber, 2004). These proteins bind to the spliceosome and pre-mRNAs to stabilize the binding of the TRAMP complex to pre-mRNAs and then recruit Mex67 for RNP transport after splicing (Hackmann *et al.*, 2014). The Nab2 poly(A) RBP is a shuttling protein that interacts with Mex67 and Yra1. Nab2 participates in poly(A) tail length control and mRNA export (Hector *et al.*, 2002; Anderson *et al.*, 1993). Other than globally protecting nascent mRNAs from

nuclear exosome degradation (Schmid *et al.*, 2015), Nab2 also participates in RNA Pol III transcription by stabilizing recruitment at promoter sequences (Reuter *et al.*, 2015). The Pab1 poly(A) binding protein is another poly(A) RBP involved in similar events to those of Nab2, such as 3' end termination and mRNA export. However, Pab1 does not function as a Mex67 adaptor and, due to its maintained RNA interaction after leaving the NPC, is crucial for mRNA translation (Dunn *et al.*, 2005; Brune *et al.*, 2005; Cosson *et al.*, 2002). All these RBPs are co-transcriptionally recruited to active genes and nascent transcripts contributing to distinct steps of mRNA transcription and maturation together with Mex67 and mRNA export.

Once different RBPs and complexes shelter mature mRNAs, they dock at the NPC for export through the nuclear envelope. Docking mainly occurs thanks to the activity of the TREX-2 (Transcription – Export 2) complex, a conserved multiprotein complex composed of Sac3, Thp1, Sem1, Cdc31, and Sus1 proteins that are necessary for efficient mRNA export (Fischer *et al.*, 2002; Faza *et al.*, 2009; Fischer *et al.*, 2004; Rodríguez-Navarro *et al.*, 2004). Sac3 represents the scaffold of the TREX-2 complex; its N-terminal region is required for interaction with the Thp1 and Sem1 TREX-2 members and the proper docking of Mex67 and mRNA (Fischer *et al.*, 2002; Lei *et al.*, 2003; Ellisdon *et al.*, 2012). Meanwhile, the Sac3 C-terminal region (CID domain) recruits Sus1 and Cdc31 to stabilize TREX-2 on the inner side of the NPC (Jani *et al.*, 2009). The Sus1 TREX-2 member also belongs to the SAGA complex and is involved in histone modifications and transcription activation, possibly acting to coordinate transcription with export (Rodríguez-Navarro *et al.*, 2004; García-Oliver *et al.*, 2012). Although TREX-2 complex recruitment transports most mRNAs, small mRNAs and other RNAs are exported via the Crm1/Xpo1 pathway (Hutten and Kehlenbach, 2007; Neville and Rosbash, 1999). Exportin 1, a member of the importin β superfamily, recognizes specific sequences in leucine-rich proteins, also called nuclear export signals (NESs), to promote export (Stade *et al.*, 1997). RNA export promoted by Crm1/Xpo1 occurs through the transport of different proteins with NES sequences such as, for example, the Pab1 RBP or the truncated Mex67 C-terminal domain (Brune *et al.*, 2005;

Strässer *et al.*, 2000). Both Mex67 and Crm1 pathways follow the same procedure; interaction with the NPC to transport mRNPs (Figure 6).

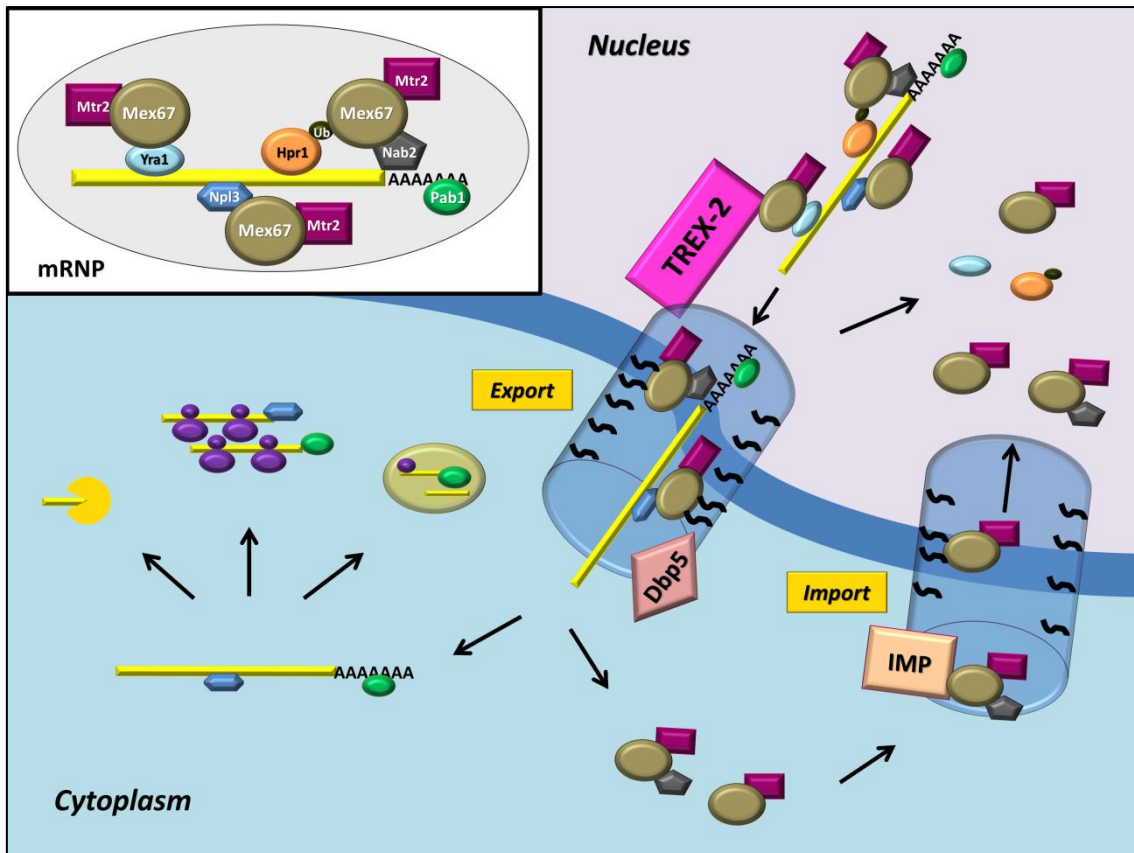


Figure 6. Mature mRNA transport through Mex67-dependent pathway. Mex67 is the essential mRNA export factor in *S. cerevisiae*. Mex67, together with Mex67 adaptor proteins and other RBPs, promotes the formation of the mature ribonucleoparticle (mRNP). The mRNP interacts with the TREX-2 complex in a Mex67-Sac3-dependent manner to dock at the nuclear basket of the NPC. At this stage, Yra1 and other components of the THO/TREX complex, such as Hpr1, dissociate from mRNP. Although the mechanism remains undefined, the mRNP passes through the NPC thanks to the interaction of Mex67 with FG-nucleoporins. Once the mRNP arrives at the cytoplasmic fibrils of the NPC, the Dbp5 helicase, previously activated by ATP binding and Gle1-IP₆, promotes mRNP release. Mex67 and Nab2 are then separated from the mRNP and return to the nucleus through the action of importins and/or karyopherins (IMP). mRNAs protected by RBPs are then stabilized for translation, storage in specific structures, or degradation by the cytoplasmic RNA decay machinery.

NPCs form the gate that allows for the transport of molecules above 40 kDa between the nucleus and the cytoplasm. The NPC consists of a central symmetric channel located within the nuclear envelope, two outer rings (in the nucleus and the cytoplasm), the nuclear basket, and the cytoplasmic filaments (Alber *et al.*, 2007; D'Angelo and Hetzer, 2008). Although more than 400 proteins make up the NPC, there are only around 30 different types of nucleoporins that form two main groups: scaffolding nucleoporins, which include

structural proteins and play architectural roles, and FG-nucleoporins, which contain intrinsically disordered domains that interact with the transport machinery (e.g., Mex67 and Sac3) (Beck and Hurt, 2017). The NPC nuclear basket coordinates the first steps of mRNP docking to the NPC. FG-nucleoporins interact with Mex67 or Crm1 to mediate the translocation of their cargoes through the NPC central channel.

Although different models have been proposed, how mRNPs are transported through the NPC remains unclear (Fernandez-Martinez *et al.*, 2016; Niño *et al.*, 2013). However, mRNP release from NPC structures has been studied and mainly occurs through the activity of the Dbp5 DEAD-box protein 5 helicase in collaboration with the inositol hexakisphosphate (IP₆) and the Nup159, Nup42, and Gle1 nucleoporins (Tieg and Krebber, 2013). Dbp5 is a shuttling protein that catalyzes mRNP remodeling and RNA rearrangements using adenosine triphosphate (ATP) binding and hydrolysis (Snay-Hodge *et al.*, 1998). Nup159 recruits Dbp5 to the cytoplasmic filaments of the NPC. Then Gle1, activated by the cofactor IP₆, interacts with Nup42 and ATP to promote the enzymatic activity of Dbp5 (Noble *et al.*, 2011). This reaction leads to the release of mRNPs into the cytoplasm while RNA export factors, including Mex67 or Nab2, return to the nucleus (Folkmann *et al.*, 2011; Ling and Song, 2010; Tran *et al.*, 2007). Finally, Nup159 again recruits Dbp5-adenosine diphosphate (ADP) in preparation for a new mRNA export cycle. Free mRNAs, together with RBPs that maintain their RNA binding capacity, are prepared for subsequent processes in the cytoplasm, which include translation, storage, or degradation (**Figure 6**).

mRNA Translation

Once the mRNA transport process has completed, mRNA molecules are prepared for translation to generate a new protein. Ribosomes read and translate these sequences in groups of three nucleotides (codon) that select a specific conjugated aminoacyl transfer RNA (X-tRNA) to construct polypeptide

chains. Each amino acid is assigned by one or more codons in mRNA according to the genetic code (Crick, 1968; Shu, 2017). Eukaryotic 80S ribosomes (Yusupova and Yusupov, 2017; Tesina *et al.*, 2019) are organelles composed of two main subunits: the 40S small subunit, composed of the 18S rRNA and about 30 proteins; and the 60S large subunit, which contains the 28S, 5.8S, and 5S rRNAs and approximately 45 proteins. The ribosome contains three tRNA binding sites for sequence recognition and protein production: peptidyl (P), aminoacyl (A), and exit (E) sites.

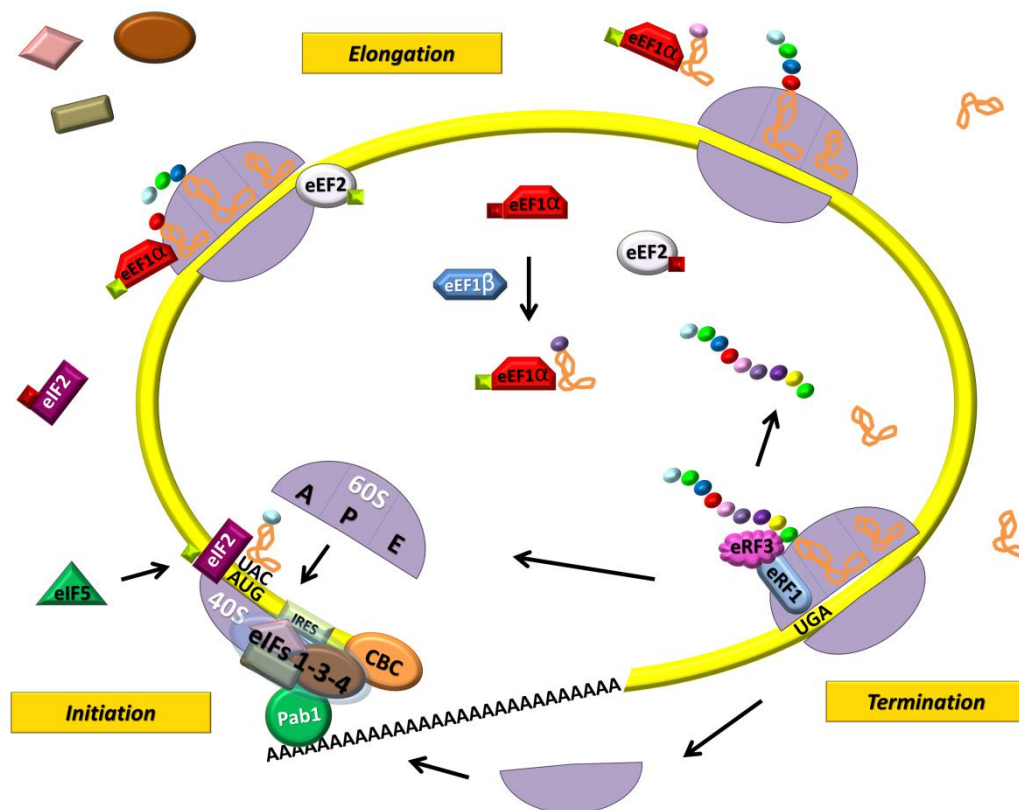


Figure 7. mRNA translation and polypeptide production by ribosomes and translation factors. To initiate translation, the small ribosomal subunit is recruited by interactions with translation initiation factors (eIFs) and mRNP structures. Following addition of the first aminoacyl tRNA, the large ribosomal subunit is recruited, and eIF5 hydrolyzes the eIF2 GTP to release the methionyl tRNA and start an elongation cycle. Different aminoacyl tRNAs with new amino acids are bound to the polypeptide frame with the collaboration of elongation factor 1 α (eEF1 α) and elongation factor 2 (eEF2). During each elongation cycle, eEF1 α is reloaded with a new aminoacyl tRNA thanks to the activity of eEF1 β . When the ribosome reaches a stop codon, release factors (eRFs) coordinate the final steps of the translation cycle with the ribosome and a new protein is created. GTP hydrolysis is required for the proper activity of the translation mechanisms (shown in green (GTP) and red (GDP) boxes).

Proper translation involves the interaction between three groups of RNAs: mRNAs, tRNAs, and rRNAs, with different proteins for polypeptide synthesis, ribosome structure, and tRNA recruitment. Although each ribosome produces a unique polypeptide, more than one ribosome can translate the same mRNA, thereby producing considerable amounts of the same protein. These structures are called polyribosomes or polysomes.

mRNA translation and protein production occur in three steps; transcription initiation, elongation, and termination (**Figure 7**).

Translation initiation is the first step in this process, consisting of the recruitment of the 40S ribosome subunit to the mRNA and the addition of the first amino acid in the polypeptide chain (methionine, the AUG codon). The CBC, internal ribosome entry sites (IRES) in 5' UTRs, and the poly(A) tail, together with RBPs such as Pab1, promote the recruitment of the small ribosome subunit through interactions with eukaryotic translation initiation factors (eIF4A, eIF4B, eIF4E, eIF4G, eIF3, eIF1, and eIF1A) (Sachs *et al.*, 1997). eIF2 in conjunction with GTP then recruits the methionyl tRNA to the pre-initiation complex to search for the AUG codon in the sequence, after which, eIF5 hydrolyzes the eIF2 GTP, and the initiation factors disassemble from the 40S subunit to enable the binding of the 60S subunit (Huang *et al.*, 1997).

The 80S ribosome contains the first methionyl tRNA in the P position, and the elongation factor eEF1 α adds a new aminoacyl tRNA in the A site, which is paired with the second mRNA codon. Following proper accommodation of the aminoacyl tRNA, eEF1 α is released by GTP hydrolysis and methionine will bind by a peptide bond to this new amino acid in the A site (Dever and Green, 2012). eEF1 β elongation factor activity recovers eEF1 α , which exchanges GDP for GTP, and adds a new aminoacyl tRNA. After formation of the peptide bond, GTP hydrolysis of the eEF2 leads to ribosome translocation, which leads to the progression of the ribosome to a new codon. This process also correlates with the movement of the empty tRNA to the exit site, the peptidyl tRNA to the P site, and a free A site that awaits a new aminoacyl tRNA to begin a new elongation cycle.

Once the ribosome arrives at stop codons that signals translation termination (UAA, UGA, or UAG), no more aminoacyl tRNAs will be added to the A site. Eukaryotic release factor 1 (eRF1) then binds to these sequences to promote the hydrolysis of the bond between the polypeptide chain and the last tRNA with the help of eRF3, triggering their release (Loh and Song, 2010). This effect also produces the dissociation of the ribosomal subunits and the mRNA, ending the translation process. After translation, proteins can be modified by different post-translation modifications while mRNAs are targeted for decay.

Quality Control and mRNA Decay

Following the production of an aberrant mRNA or the sufficient translation of a mature mRNA, eukaryotic cells employ a quality control mechanism to target mRNAs for degradation to regulate mRNA and protein levels (Parker, 2012). Each step in gene expression is controlled by proteins and protein complexes that deliver aberrant or unwanted mRNAs to these regulatory mechanisms. Quality control occurs in both the nucleus and the cytoplasm with the participation of both common proteins and compartment-specific proteins (Doma and Parker, 2007).

The cytoplasmic mRNA decay machinery must be recruited and arranged for mRNA degradation. Canonical mRNA degradation occurs in both directions: the 5' → 3' direction by the Xrn1 exonuclease, and the 3' → 5' direction by the exosome complex. Before cytoplasmic decay, targeted mRNAs require modification to expose their 5' and 3' ends for Xrn1- and exosome-mediated degradation, respectively. First, the Ccr4/Not and Pan2/Pan3 complexes deadenylate poly(A) tails to shorten the tail to 10-12 adenines (Collart, 2016; Wolf and Passmore, 2014). These complexes are controlled by translation termination factors and Pab1 mRNA binding that inhibit or activate the function of one or both deadenylase complexes (Funakoshi *et al.*, 2007; Webster *et al.*, 2018). Once the poly(A) tail has been largely discarded, the cytoplasmic exosome and the Dcs1 scavenger decapping enzyme can directly degrade mRNAs (Liu and Kiledjian, 2005). However, mRNAs are preferentially

targeted for mRNA decapping by the Dcp1/Dcp2 complex after deadenylation (LaGrandeur and Parker, 1998; Dunckley and Parker 1999). Cofactors including Dhh1, Edc3, Pat1, Scd6, and Lsm1-7 aid the decapping complex by promoting recruitment and activation (Nissan *et al.*, 2010; Collier and Parker, 2004). After decapping and prior deadenylation, mRNAs are finally prepared for decay by the cytoplasmic exonucleases Xrn1 and the exosome complex. Xrn1 is the exoribonuclease in charge of the degradation of decapped mRNAs in the 5' → 3' direction (Nagarajan *et al.*, 2013). This enzyme is not only involved in cytoplasmic mRNA turnover but also other mRNA decay mechanisms in collaboration with decapping enzymes such as nonsense-mediated decay (NMD), no-go decay (NGD), and degradation of aberrant mRNAs exported from the nucleus (Doma and Parker, 2007). Meanwhile, the exosome complex is responsible for the decay of deadenylated mRNAs in the 3' → 5' direction (Liu *et al.*, 2006; Bonneau *et al.*, 2009), in particular the enzymatically active exosome Dis3 (cytoplasm and nucleus) and Rrp6 (nucleus) core proteins (Dziembowski *et al.*, 2007; Burkard and Buttler, 2000). Optimal mRNA decay via cytoplasmic exosome degradation requires the Ski proteins (Anderson and Parker, 1998; Araki *et al.*, 2001).

As previously mentioned, the cell often produces aberrant mRNAs that are eliminated in the nucleus and the cytoplasm by different quality control mechanisms. In the nucleus, aberrant mRNAs are produced by the decapping of mRNAs, defects in pre-mRNA splicing, non-polyadenylation of the 3' region, RBP-uncovered mRNAs, or from mature mRNAs whose export has been blocked, as occurs for some mRNAs under stressful conditions (Bond, 2006). One or more quality control processes regulate each situation (Fasken and Corbett, 2009). Decapped mRNAs are mainly produced at the end of transcription as a residual RNA or after splicing as introns (**Figure 3**). While residual RNA is mostly degraded by the 5' → 3' exonuclease, introns are exported for cytoplasmic degradation by Xrn1 or are eliminated in the nucleus by the Rrp6-containing exosome with the help of the TRAMP polyadenylase complex (Harigaya and Parker, 2012; LaCava *et al.*, 2005). Unspliced or misspliced pre-mRNAs are also exported to the cytoplasm for decapping and Xrn1 degradation; however, in some cases, they are retained at the NPC by

Mlp1 and Mlp2 activity (Galy *et al.*, 2004; Soheilypour and Mofrad, 2018). The Rrp6 exosome eliminates these retained mRNAs with the help of the TRAMP complex; alternatively, the Rat1 exonuclease also eliminates retained mRNAs with the collaboration of the Dcp1/Dcp2 complex and the Lsm2-8 decapping cofactors (Kufel *et al.*, 2004). Nuclear retention also occurs for unnecessary mature mRNAs under specific conditions such as stress (Saavedra *et al.*, 1996). Problems with 3' end processing, including hypo- or hyper-adenylation, provoke a nuclear mRNA decay through Rrp6-containing exosomes (Hilleren *et al.*, 2001).

Although quality control retains and degrades almost every aberrant mRNA, some arrive at the ribosome and start a translation cycle. There are four different quality control mechanisms related to translation impairments (**Figure 8**; Shoemaker and Green, 2012).

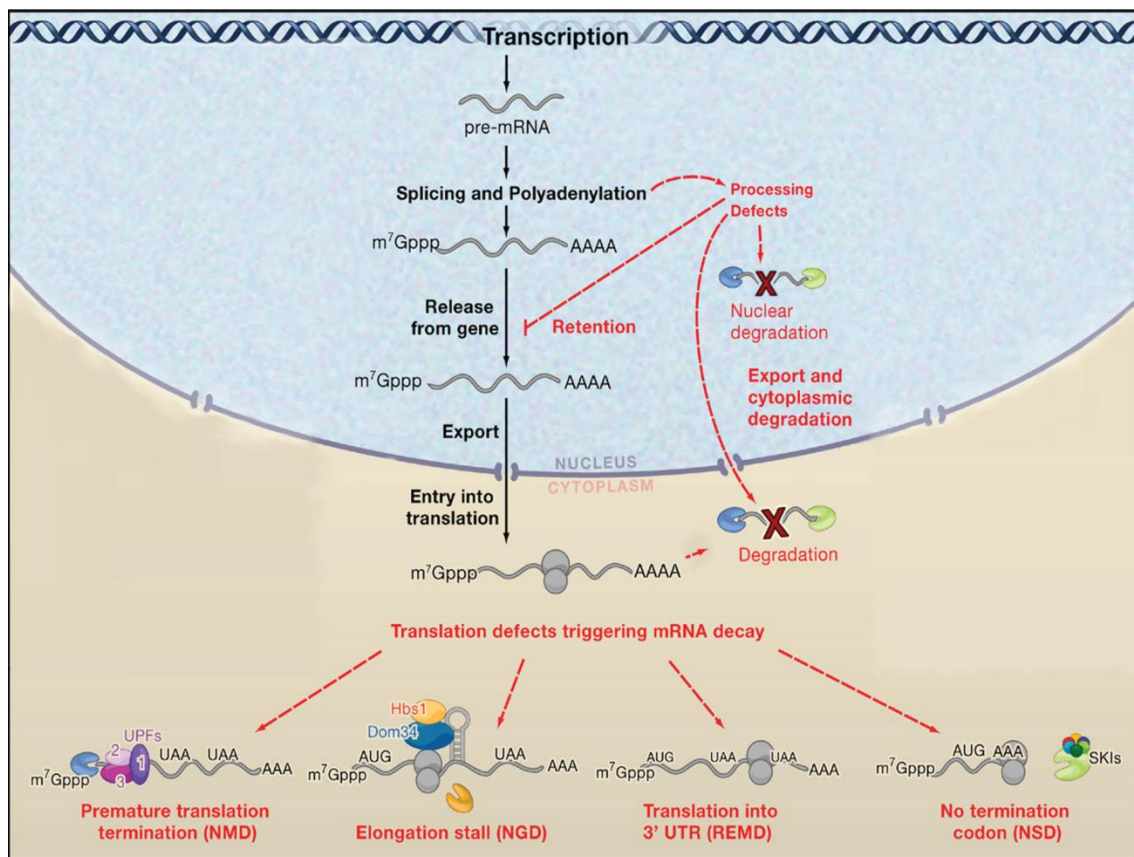


Figure 8. mRNA quality control and decay mechanism. Schematic representation of the known mRNA quality control mechanisms in eukaryotic cells (adapted from Doma and Parker, 2007).

When ribosomes find a premature stop codon in the mRNA sequence and/or produce incomplete peptides, NMD promotes the interaction of Upf1-3 proteins with release transcription factors to stop translation and separate ribosomes from aberrant mRNAs (Baker and Parker, 2004). Endonucleolytic cleavage and/or elimination by the cytoplasmic mRNA decay machinery allow the release of mRNAs.

In some cases, RNA structures or rare sequences lead to translation elongation stalling; however, NGD helps to overcome this problem through the recruitment of the paralogs of translation termination factors Dom34 (eRF1) and Hbs1 (eRF3) that act to trigger mRNA endonucleolytic cleavage followed by degradation by Xrn1 and the exosome complex (Doma and Parker, 2006). In other cases, ribosomes bypass the mRNA stop codon and resume translation. To stop progression, two different quality mechanisms exist. If a ribosome finishes in the 3'UTR after 3' end arrival, ribosome-extension mediated decay (REMD) has been proposed, at least for human cells (Kong and Liebhaber, 2007), to produce accelerated deadenylation and exosome-dependent degradation. However, when ribosomes arrived at the end of an mRNA without any codon sequence at the A site, non-stop decay (NSD) is activated via the recruitment of Ski7 to promote the association of the exosome complex without previous mRNA deadenylation (Klauer and van Hoof, 2012). Excluding mRNA control, aberrant peptides are also quality controlled through mechanisms dependent on ribosomes and translation (Brandman and Hegde, 2016; Karamyshev and Karamysheva, 2018).

Adaptation to Non-physiological Temperature Conditions: Heat Shock Response

Eukaryotic cells must adapt to non-optimal environmental conditions to ensure survival. One of the most studied adaptation mechanisms in yeast is the heat shock response (HSR) - a highly conserved gene expression programme that represses housekeeping protein biosynthesis and induces cytoprotective gene expression, including genes coding for the heat shock proteins (HSPs), to adapt their metabolism and survive (Morano *et al.*, 2012; Verghese *et al.*,

2012). In a similar manner to other stressors, heat shock provokes impairments to cell structure and growth that trigger the stress response activation and cell cycle arrest in G1 phase to avoid proteotoxic effects produced by the accumulation of misfolded proteins (Johnston and Singer, 1980; Trotter *et al.*, 2001). Additionally, these conditions activate the cell wall integrity response through the putative Mid2 and Wsc1-4 membrane sensors to activate a signal transduction pathway. This cascade involves the G-protein Rho1 and the Mpk1 mitogen-activated protein (MAP) kinase (MAPK) to produce alterations to the expression of cell wall-related genes to maintain cell integrity (Levin, 2005). Yeasts produce elevated levels of the trehalose disaccharide to aid in protein stability and disaggregation of misfolded proteins and to buffer against the desiccation effect by retaining water molecules (Singer and Lindquist, 1998; Tapia and Koshland, 2014). Sphingolipids are also crucial for the HSR, and they may act as signaling molecules affecting cell cycle and gene expression (Jenkins, 2003).

Stressors such as heat shock lead to reversible protein misfolding, aggregation, and/or denaturation (Weids *et al.*, 2016; Wallace *et al.*, 2015). Protein misfolding also affects the mitochondrial electron transport chain, inducing additional oxidative stress that affects protein functionality and cell membrane stability (Davidson and Schiestl, 2001). To “renature” misfolded proteins and recover their original structure, cells initiate the expression of chaperone proteins. While these proteins are expressed under non-stress conditions, they become highly overexpressed after the induction of stress. There are various classes of chaperones with different functions: the Hsp100 group possess disaggregase activity (Grimminger-Marquardt and Lashuel, 2010), the Hsp90 chaperones participate in optimal protein maturation (Prodromou and Pearl, 2003), the Hsp70 chaperones participate in protein folding and translocation (Sharma and Masison, 2009), the Hsp40 group (also so-called J proteins) help in substrate binding and activation of Hsp70 (Li *et al.*, 2009) and also participate in protein folding and protection (Kabir *et al.*, 2011), the small Hsps 42 and 26 (sHSP) display antiaggregase effect (Ungelenk *et al.*, 2016), and the Hsp12 chaperone stabilizes cytoplasmic membranes (Welker *et*

al., 2010). Other than chaperones, additionally cytoprotective proteins collaborate with chaperones and the HSR.

Heat Stress Transcription Factors: Hsf1 and Msn2/Msn4

To rapidly express cytoprotective proteins, heat stress modifies mRNA metabolism at various levels (Gasch *et al.*, 2000; Castells-Roca *et al.*, 2011). The transcription factors Hsf1 and Msn2/Msn4 play an essential role in gene transcription expression changes. The essential heat shock factor 1 (Hsf1) (Hahn *et al.*, 2004) is a transcription factor that activates the expression of stress-responsive mRNAs through interactions with heat shock transcription elements (HSEs) present in gene promoter regions (Amin *et al.*, 1988). These sequences consist of continuous or discontinuous nGAAn regions bound by active Hsf1 trimers (Bonner *et al.*, 1994). This binding allows for the preferred and rapid expression of genes controlled by HSE regions that coalesce genomically in active nuclear transcription foci (Chowdhary *et al.*, 2019).

The second group of genes expressed under heat stress is controlled by the Msn2/Msn4 transcription factors, a mode of regulation also known as the environmental stress response (ESR) due to the induction of Msn2/Msn4-dependent expression under other stressful conditions (Causton *et al.*, 2001; Gasch, 2003). Despite having shown that Msn2 and Msn4 have functional redundancy, they regulate the expression of a different subset of stress-induced genes (Gasch *et al.*, 2000). The regulatory domain in promoters for Msn2/Msn4 activity is the stress-response element (STRE), which consists of a CCCCT (or AGGGG in the reverse orientation) sequence (Martínez-Pastor *et al.*, 1996). Both Hsf1 and Msn2/4 pathways are post-translationally regulated by phosphorylation (Hashikawa and Sakurai, 2004; Lee *et al.*, 2013). In both pathways, protein kinase A (PKA) plays a repressive role, probably by the inhibition of their transport, while the Yak1 kinase activates the nuclear import of Hsf1 and Msn2/Msn4 and also produces the downregulation of PKA activity (Ferguson *et al.*, 2005; Lee *et al.*, 2008). However, other regulatory routes independently affect each pathway, including Hsf1 inhibition by Hsp70/Hsp90

chaperones (Voellmy and Boellmann, 2007), Msn2/Msn4 repression by the target of rapamycin (TOR) signaling (Beck and Hall, 1999), or Msn2/Msn4 shuttling by the Msn5 karyopherin (Alepez *et al.*, 1999).

Heat Shock and mRNA Metabolism

Chromatin remodelers and histone modifiers function alongside heat stress transcription factors to mediate the preferential expression of stress-responsive genes (Vinayachandran *et al.*, 2018). Recruitment of the switch/sucrose non-fermentable (SWI/SNF) and imitation SWI (ISWI) families to the regulatory regions of heat shock genes enables nucleosome remodeling and facilitate Hsf1 interactions (Erkina *et al.*, 2009). Changes in histone modifications by Rpd3 and SAGA complexes also affect the expression of these mRNAs (Kremer and Gross, 2009). Rpd3 induces the expression of specific Msn2/Msn4-dependent transcripts under stressful conditions (Ruiz-Roig *et al.*, 2010). During transcription, stress-related genes are mainly controlled by the recruitment of SAGA to the PIC complex, while housekeeping genes seem to be mainly expressed by the TFIID complex (Zanton and Pugh, 2004; de Jonge *et al.*, 2017). However, studies have described how the SAGA and TFIID complexes may help in both housekeeping and inducible gene expression (Baptista *et al.*, 2017; Watanabe and Kokubo, 2017). Alterations to stress-responsive gene levels also affect mRNA stability and decay (Castells-Roca *et al.*, 2011).

Stressful conditions disrupt the splicing of most housekeeping genes, thereby blocking mRNA export to the cytoplasm (Bond, 2006; Galy *et al.*, 2004) and promoting storage or degradation. Simultaneously, a Mex67 adaptor-independent transport mechanism enhances the export and translation of stress-responsive genes (Rollenhagen *et al.*, 2007; Zid and O'Shea, 2014). Recently, studies demonstrated that Mex67 is directly recruited to stress-responsive transcripts through an interaction with the Hsf1 transcription factor during the early steps of transcription (**Figure 9**; Zander *et al.*, 2016). This recruitment is independent of adaptor proteins, whose function is inhibited by

various mechanisms (Krebber *et al.*, 1999; Carmody *et al.*, 2010) to facilitate the export of stress-responsive transcripts and bypass quality control. However, the independence from adaptors or so-called “guard proteins” observed for Hsf1 targets might not be universal for all types of stress-responsive mRNAs and, furthermore, this mode of regulation cannot be assumed for the variety of stresses in which Hsf1 is not directly involved (**Figure 9**).

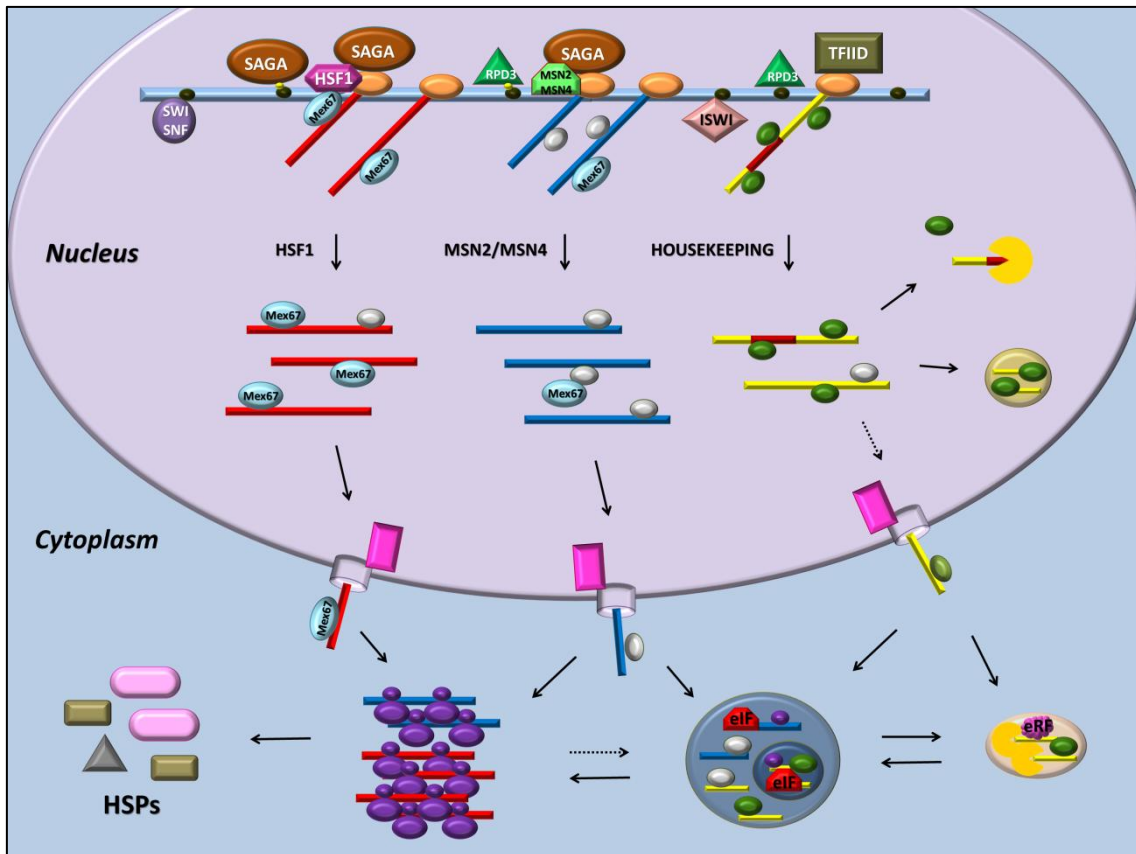


Figure 9. mRNA metabolism during heat shock stress. Heat shock conditions and chromatin modifications activate the Hsf1 and Msn2/Msn4 transcription factors, thereby enabling the expression of HSE- (red) and STRE- (blue) containing genes, respectively, These genes are transcribed by RNA Pol II in collaboration with SAGA and Rpd3 complexes. At the same time, housekeeping genes transcribed by RNA Pol II and TFIID are repressed, and their splicing is disrupted. Housekeeping mRNAs are mainly degraded by the nuclear RNA decay machinery or stored in nuclear dots with known RBPs (green). However, some of these mRNAs, together with part of the Msn2/Msn4-dependent genes, are retained in the cytoplasm in stress granules or p-bodies to be stored or degraded. Alternately, Hsf1-dependent mRNAs are rapidly exported via direct interaction with Mex67 or probably together with unknown RBPs (grey). Msn2/Msn4-dependent transcripts would be exported by unknown RBPs (grey) in a mechanism that remains unknown. Most of these mRNAs are translated to produce cytoprotective proteins such as chaperones (HSPs), while some Msn2/Msn4-dependent mRNAs localize to cytoplasmic granules.

This is the case for Msn2/Msn4-dependent transcripts involved in ESR. Although some transcripts are controlled by both stress transcription factors and

exported by direct interaction with Mex67 (Amorós and Estruch, 2001; Zander *et al.*, 2016), we currently do not know whether exclusively Msn2/Msn4 controlled transcripts are independent of adaptor proteins or whether they require specific factors for their metabolism. Studies have revealed essential data regarding the localization and metabolism of Msn2/Msn4-dependent transcripts in which their promoter sequences signal for the mRNA accumulation in cytoplasmic granules (Zid and O'Shea, 2014).

Even though stress inhibits general translation and the production of polysomes (Bregues *et al.*, 2005; Shalgi *et al.*, 2013), heat shock-related mRNAs are rapidly and efficiently translated. This inhibition of general translation also leads to the accumulation of non-translated mRNAs together with RBPs and mRNA metabolism proteins in membrane-less granules in the cytoplasm. These granules are mainly produced in wait for the re-establishment of optimal conditions and the restart of mRNA translation or to eliminate unnecessary RNAs by the cytoplasmic decay machinery. Although their role in stressful conditions is still in debate (Decker and Parker, 2012; Mitchell *et al.*, 2013; Anderson *et al.*, 2015; Chantarachot and Bailey-Serres, 2018), cells accumulate mRNPs in two different granules: stress-granules (SGs) (Protter and Parker, 2016) or p-bodies (PBs) (Rao and Parker, 2017). PBs contain untranslated mRNPs and translation repression and mRNA decay machinery (Parker and Sheth, 2007), while SGs are composed of translationally repressed mRNPs but differ by the presence of translation initiation factors, 40S ribosomal subunits, and poly(A) binding proteins (Buchan and Parker, 2009). The initial formation of these granules is prompted by translational impairment and the resulting accumulation of untranslated mRNPs due to binding by RNA-protein or protein-protein interactions, especially through intrinsically disordered regions (IDRs) and/or by liquid-liquid phase separation (Protter and Parker, 2016; Rao and Parker, 2017; Riback *et al.*, 2017). P-body assembly, RNA-RNA interactions, and cellular levels of ATP also affect the formation of stress-granules (Buchan *et al.*, 2008; Jain *et al.*, 2016; Van Treeck *et al.*, 2018). Although no specific structures have been described in PBs, SGs are split into two different phases: a stable core maintained by strong interactions (Wheeler

et al., 2017; Khong *et al.*, 2017) and a transient shield supported by weak links between mRNPs (Wheeler *et al.*, 2016). SGs and PBs are dynamic structures that exchange their content not only between each other but also with the cytoplasm. This allows repressed mRNAs to be translated after release (Balagopal and Parker, 2009). Then, these structures collaborate in the control of additional mRNAs to optimize the stress response.

RNA Binding Proteins as Modulators of mRNA Metabolism

Several proteins and protein complexes participate in the metabolism of mRNAs. The association of RBPs with mRNAs begins at the transcriptional level and finishes after mRNA degradation, participating in steps such as splicing, maturation, transport, and translation (**Figure 2**). Therefore, RBPs are one of the most important markers and modulators of mRNA fate under different growth conditions. Although there exist many proteins that interact with RNAs in *S. cerevisiae* (Hogan *et al.*, 2008; Scherrer *et al.*, 2010), the most critical RBPs controlling nucleocytoplasmic transport are the Npl3, Gbp2, and Hrb1 SR-like proteins and the Nab2 and Pab1 poly(A) binding proteins. These proteins function as quality control markers during mRNA processing. Four of these proteins commonly function as Mex67 adaptor proteins or guard proteins, which can bind to pre-mRNA and signal their processed/unprocessed state (Zander and Krebber, 2017). This mechanism prevents unwanted contacts between Mex67 and RNA, thereby functioning as a mechanism for blocking uncontrolled RNA export (Ling and Song, 2010; Hackmann *et al.*, 2014; Zander *et al.*, 2016). Cells use this quality control process to regulate export routes during cellular growth depending on specific circumstances; however, this mechanism is impaired during stressful conditions, with the Mex67-RNA direct interaction essential for the rapid export and translation of cytoprotective mRNAs (Zander *et al.*, 2016). While we know of the vital role of Mex67 adaptor proteins in mRNA protection and shelter, it remains unclear how Mex67 alone protects and sends different stress-responsive transcripts through the hydrophobic interior of the NPC. Studies have suggested the existence of additional guard proteins that may aid these processes together with Mex67 (Zander and Krebber, 2017).

Mip6: a Mex67 Adaptor Protein?

A yeast two-hybrid (Y2H) screen using Mex67 as bait (Segref *et al.*, 1997) led to the first discovery of the Mex67 Interacting Protein 6 (Mip6). This putative RNA binding protein bears four RRMs and is proposed to interact with the C-terminal domain of Mex67. Recent additional functional characterization has begun to draw more attention to Mip6. A recent screen in yeast for dosage-sensitive proteins with a propensity for liquid-liquid phase separation (LLPS) demonstrated that, at least for Mip6, liquid-liquid demixing associates with toxicity when the protein is highly overexpressed (Bolognesi *et al.*, 2016). Under these conditions, Mip6 alters cellular localization and accumulates in liquid-like cytoplasmic foci colocalizing with p-bodies. Although this study increased our knowledge-base regarding the physiological consequences of liquid-liquid demixing in the cell, the authors did not address the functional role of Mip6 in yeast. A more recent study proposed a specific role for Mip6 during sporulation (Jin *et al.*, 2017) suggesting that Mip6, together with its also relatively undescribed paralogue Pes4, act as regulators of late mRNA translation, protection, and localization of the *NDT80* regulon that is translated at different times during sporulation. In collaboration with our laboratory, recent structural studies performed by Dr. Bravo and Dr. Pérez-Cañadillas (Martín-Expósito *et al.*, under revision) established that this interaction takes place between the Mex67 UBA domain and Mip6 RRM4, and more precisely through the tryptophan-442 (W442) residue in Mip6 (**Figure 10**). Moreover, they demonstrated that each Mip6 RRM binds to RNA *in vitro* and that the Mip6 RRM4-RNA excludes the interaction of Mip6 with Mex67 (**Figure 10**).

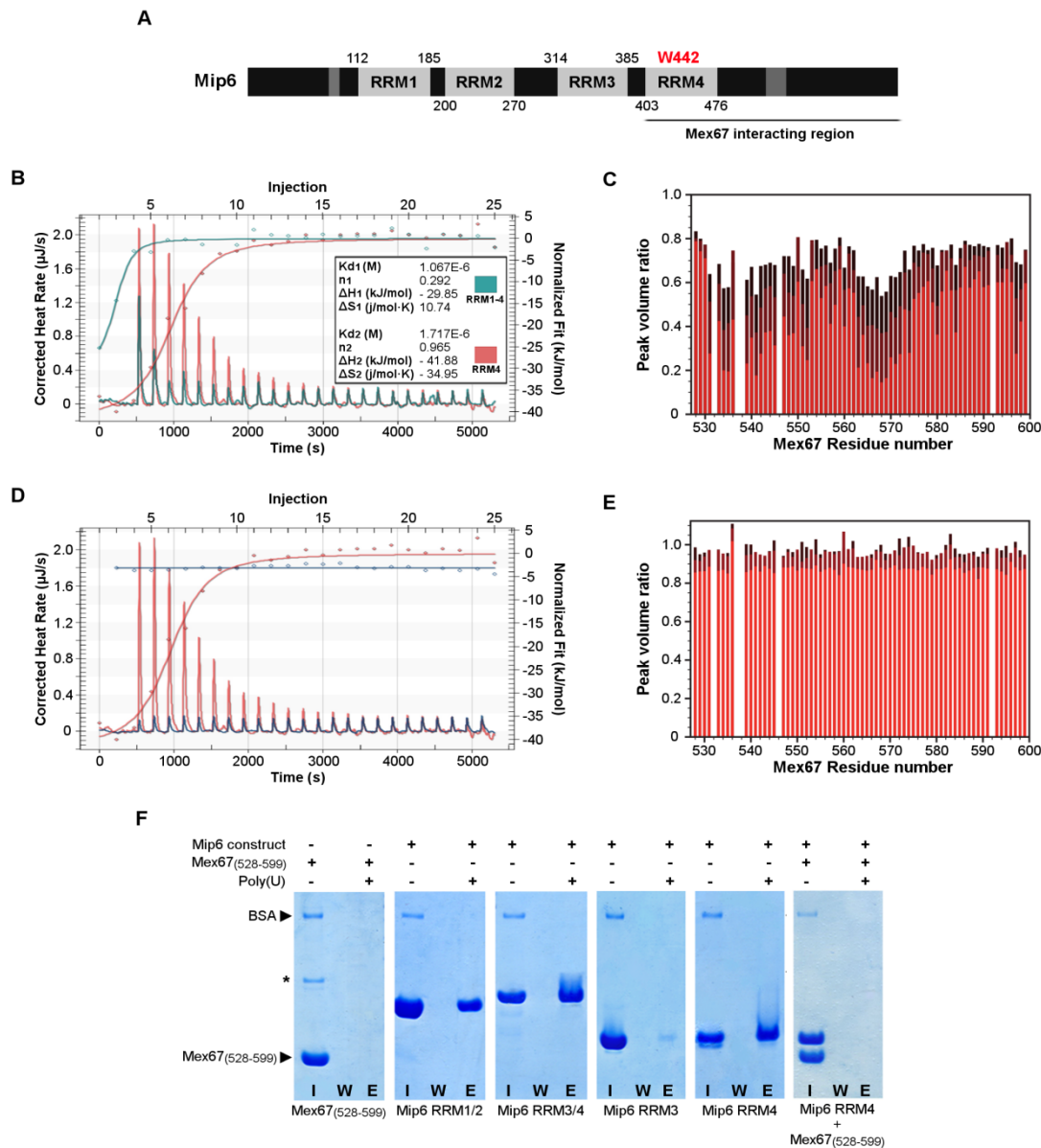


Figure 10. Mip6 binds to RNA and interacts with Mex67 *in vitro* (Martín-Expósito *et al.*, under revision). (A) Scheme of Mip6 structure showing the Mex67 interacting region suggested in Segref *et al.*, 1997. The proposed tryptophan-442 necessary for the *in vitro* interaction with Mex67 is shown in red. (B) Biophysical characterization of the interaction between Mex67₍₅₂₈₋₅₉₉₎ and Mip6. The comparison between isothermal titration calorimetry (ITC) binding isotherms of Mex67₍₅₂₈₋₅₉₉₎ titrated into Mip6 RRM1-4₍₁₁₁₋₄₈₀₎ (green) or Mip6 RRM4₍₄₀₁₋₄₈₀₎ (red). (C) Analysis of Mip6 RRM4-Mex67₍₅₂₈₋₅₉₉₎ binding by NMR titration experiments monitored on Mex67₍₅₂₈₋₅₉₉₎ ¹H-¹⁵N HSQC spectrum. Spectrum peak intensities at three different percentages of saturation of unlabeled Mip6 RRM4 (5% dark red, 10% medium red, and 15% light red) were plotted against the Mex67 sequence. (D) ITC binding isotherms of Mex67₍₅₂₈₋₅₉₉₎ titrated into Mip6 RRM4 (red) and the Mip6 W442A mutant (blue). (E) ¹H-¹⁵N heteronuclear single quantum correlation (HSQC) nuclear magnetic resonance (NMR) titration experiments of the binding of Mip6 RRM4 wild type or its W442A mutant monitored on the Mex67₍₅₂₈₋₅₉₉₎ spectrum. Different percentages of saturation of unlabeled Mip6 constructs color-coded as in (C) were plotted against the Mex67 sequence. (F) Pull-downs of Mex67₍₅₂₈₋₅₉₉₎ and different Mip6 constructs with poly(U) agarose beads. Input (I), wash (W), and eluate (E) are shown for each pull-down. Bovine Serum Albumin (BSA) was used as a negative control. Mex67₍₅₂₈₋₅₉₉₎ shows no binding. Asterisk indicates Glutathione S-transferase (GST) from the purification.

OBJECTIVES

This thesis was centered on the studying of putative factors implicated in gene expression and mRNA metabolism. To this end, I focused on the study of *MEX67* Interacting Protein 6, or Mip6, a relatively unstudied RNA binding protein. The discovery of an interaction between Mip6 with the essential RNA export factor Mex67 and the presence of four different RNA Recognition Motifs (RRMs) in Mip6 protein structure were amongst the decisive factors that led to the initiation of our study into this protein of unknown function. The primary purpose of this thesis was the functional and structural characterization of Mip6 in *Saccharomyces cerevisiae* to evaluate any role in gene expression and RNA metabolism. We uncovered a wealth of data regarding the possible function of Mip6 in yeast through following these objectives:

1. The characterization of the interaction between Mip6 and Mex67 and the RNA export machinery.
2. The identification of Mip6 RNA targets following effects in RNA metabolism.
3. The exploration of the structural domains in the Mip6 protein and their influence on localization.

MATERIAL AND METHODS

MATERIALS

Yeast strains

The following table describes the different yeast strains employed.

Strain	Genotype	Origin/Reference
BY4741 (WT)	MATa, <i>his3, ura3, leu2, met15</i>	Brachmann <i>et al.</i> , 1998
<i>mip6Δ</i>	MATa, <i>his3, ura3, leu2, met15, mip6::KANMX4</i>	EUROSCARF
<i>mip6Δpes4Δ</i>	MATa, <i>his3, ura3, leu2, met15, mip6::KANMX4, pes4::KANMX4</i>	Dr. Bernardo Cuenca-Bono (SRN lab)
<i>mex67-5</i>	MATa, <i>leu2, ura3, trp1, mex67-5::NAT</i>	Scarcelli <i>et al.</i> , 2007
<i>mex67-5mip6Δ</i>	MATa, <i>leu2, ura3, trp1, mex67-5::NAT, mip6::KANMX4</i>	This work
Mex67-HA	MATa, <i>ade2, his3, leu2, trp1, ura3, mex67::HIS3, (pRS314-TRP1-MEX67-3HA)</i>	Gwizdek <i>et al.</i> , 2006
Mex67ΔUBA-HA	MATa, <i>ade2, his3, leu2, trp1, ura3, mex67::HIS3, (pRS314-TRP1-MEX67ΔUBA-3HA)</i>	Gwizdek <i>et al.</i> , 2006
Mex67-GFP	MATa, <i>ade2, his3, leu2, trp1, ura3, MEX67-GFP-KANMX4</i>	Dieppois <i>et al.</i> , 2006
Mex67-GFP <i>mip6Δ</i>	MATa, <i>ura3, leu2, his3, trp1, ade2, Mex67-GFP-KANMX4, mip6::URA3</i>	Carme Nuño-Cabanes (SRN lab)
XPO1	MATa <i>ade2, his3, leu2, trp1, ura3</i>	Brune <i>et al.</i> , 2005
<i>xpo1-1</i>	MATa <i>ade2, his3, leu2, trp1, ura3, xpo1::TRP1, xpo1-1::HIS3</i>	Brune <i>et al.</i> , 2005
<i>msn2Δ</i>	MATa, <i>his3, ura3, leu2, met15, msn2::KANMX4</i>	EUROSCARF
<i>msn2Δmip6Δ</i>	MATa, <i>his3, ura3, leu2, met15, msn2::KANMX4, mip6::HIS3</i>	This work
<i>msn4Δ</i>	MATa, <i>his3, ura3, leu2, met15, msn4::KANMX4</i>	EUROSARF

<i>msn4Δmip6Δ</i>	MATa, <i>his3, ura3, leu2, met15, msn4::KANMX4 mip6::HIS3</i>	This work
<i>msn2Δmsn4Δ</i>	MATa, <i>his3, ura3, leu2, met15, msn2::NAT msn4::KANMX4</i>	Zapater <i>et al.</i> , 2007
<i>msn2Δmsn4Δ mip6Δ</i>	MATa, <i>his3, ura3, leu2, met15, msn2::NAT msn4::KANMX4 mip6::HIS3</i>	This work
<i>msn5Δ</i>	MATa, <i>his3, ura3, leu2, met15, msn5::KANMX4</i>	EUROSCARF
<i>msn5Δmip6Δ</i>	MATa, <i>his3, ura3, leu2, met15, msn5::KANMX4 mip6::LEU2</i>	This work
<i>rrp6Δ</i>	MATa, <i>his3, ura3, leu2, met15, rrp6::URA3</i>	This work
<i>rrp6Δmip6Δ</i>	MATa, <i>his3, ura3, leu2, met15, rrp6::URA3 mip6::KANMX4</i>	This work
<i>rat8-2</i>	MATa <i>leu2, ura3, trp1, rat8-2</i>	Snay-Hodge <i>et al.</i> , 1998
<i>sac3Δ</i>	MATa, <i>his3, ura3, leu2, met15, sac3::KANMX4</i>	EUROSCARF
<i>tom1Δ</i>	MATa, <i>his3, ura3, leu2, met15, tom1::KANMX4</i>	EUROSCARF
<i>hmt1Δ</i>	MATa, <i>his3, ura3, leu2, met15, hmt1::KANMX4</i>	EUROSCARF
<i>akl1Δ</i>	MATa, <i>his3, ura3, leu2, met15, akl1::KANMX4</i>	EUROSCARF
<i>rim15Δ</i>	MATa, <i>his3, ura3, leu2, met15, rim15::KANMX4</i>	EUROSCARF
Mip6-TAP	MATa, <i>his3, leu2, ura3, met15, MIP6-TAP-HIS3</i>	OPEN BIOSYSTEM
Mip6-TAP Sus1-MYC	MATa, <i>his3, leu2, ura3, met15, MIP6-TAP-HIS3, SUS1-MYC-URA3</i>	Dr. Pau Pascual-García (SRN lab)
Mip6-TAP Sac3-MYC	MATa, <i>his3, leu2, ura3, met15, MIP6-TAP-HIS3, SAC3-MYC-URA3</i>	Dr. Pau Pascual-García (SRN lab)
Mip6-TAP Dbp5-MYC	MATa, <i>his3, leu2, ura3, met15, MIP6-TAP-HIS3, DBP5-MYC-URA3</i>	Dr. Pau Pascual-García (SRN lab)
Mip6-GFP	MATa, <i>his3, leu2, ura3, met15, MIP6-GFP-HIS3</i>	Dr. Pau Pascual-García (SRN lab)

Mip6-HTB	MATa, <i>his3</i> , <i>leu2</i> , <i>ura3</i> , <i>met15</i> , MIP6-HTB-KANMX4	Carme Nuño-Cabanes (SRN lab)
Mip6₍₁₋₄₄₁₎	MATa, <i>his3</i> , <i>leu2</i> , <i>ura3</i> , <i>met15</i> , <i>mip6</i> ₍₄₄₂₋₆₅₉₎ ::KANMX4	This work
Mip6W₄₄₂A-GFP	MATa, <i>his3</i> , <i>leu2</i> , <i>ura3</i> , <i>met15</i> , MIP6W ₄₄₂ A-GFP-HIS3	This work
ADH1_{pr}-Mip6-GFP	MATa, <i>his3</i> , <i>leu2</i> , <i>ura3</i> , <i>met15</i> , MIP6-GFP-HIS3, MIP6 _{pr} ::KANMX4-ADH1 _{pr}	Dr. María Eugenia Gas-López (SRN lab)
Tif4631-TAP	MATa, <i>his3</i> , <i>ura3</i> , <i>leu2</i> , <i>met15</i> , TIF4631-TAP-KANMX6	This work
Ctt1-TAP	MATa, <i>his3</i> , <i>leu2</i> , <i>ura3</i> , <i>met15</i> , CTT1-TAP-HIS3	OPEN BIOSYSTEM
Ctt1-TAP <i>mip6</i>Δ	MATa, <i>his3</i> , <i>leu2</i> , <i>ura3</i> , <i>met15</i> , <i>mip6</i> ::LEU2, CTT1-TAP-HIS3	This work
Ctt1-TAP Mip6-GFP	MATa, <i>his3</i> , <i>leu2</i> , <i>ura3</i> , <i>met15</i> , MIP6-GFP-HIS3, CTT1-TAP-URA3	This work
Ctt1-TAP Mip6W₄₄₂A-GFP	MATa, <i>his3</i> , <i>leu2</i> , <i>ura3</i> , <i>met15</i> , MIP6W ₄₄₂ A-GFP-HIS3, CTT1-TAP-URA3	This work

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Plasmids

This table below describes the plasmids employed for different approaches, including C-terminal or N-terminal tagging, gene deletion, promoter exchange, and protein expression.

Plasmid	Description	Origin/Reference
pFA6a-KANMX4	KANMX4 marker integration for gene deletion	Wach <i>et al.</i> , 1994
pFA6a-URA3	URA3 marker integration for gene deletion	Longtine <i>et al.</i> , 1998
pFA6a-HIS3	HIS3 marker integration for gene deletion	Longtine <i>et al.</i> , 1998
pFA6a-LEU2	LEU2 marker integration for gene deletion	Longtine <i>et al.</i> , 1998

CBP-T7-TEV-ProteinA-KANMX6	TAP epitope C-terminal integration with <i>KANMX6</i> marker	Pamblanco <i>et al.</i> , 2014
pBS1539	TAP epitope C-terminal integration with <i>URA3</i> marker	Puig <i>et al.</i> , 2001
pFA6a-GFP(S65T)-HIS3	GFP epitope C-terminal integration with <i>HIS3</i> marker	Longtine <i>et al.</i> , 1998
pYM-N6	<i>ADH1</i> promoter integration with <i>KANMX4</i> marker	Janke <i>et al.</i> , 2004
p423-GAL1	<i>GAL1</i> promoter integration with <i>HIS3</i> marker	Mumberg <i>et al.</i> , 1994
pFA6a-HTB-KANMX6	HTB epitope integration with <i>KANMX6</i> marker	Tagwerker <i>et al.</i> , 2006
pRS315-GFP-Mex67	Expression of Mex67 tagged with N-terminal GFP epitope controlled by <i>NOP1</i> promoter (<i>LEU2</i> marker)	Strässer <i>et al.</i> , 2,000
pRS315-GFP-Mex67ΔC1	Expression of Mex67 ₍₁₋₅₂₄₎ tagged with N-terminal GFP epitope controlled by <i>NOP1</i> promoter (<i>LEU2</i> marker)	Strässer <i>et al.</i> , 2,000
pRS315-GFP-Mex67ΔC2	Expression of Mex67 ₍₁₋₄₉₃₎ tagged with N-terminal GFP epitope controlled by <i>NOP1</i> promoter (<i>LEU2</i> marker)	Strässer <i>et al.</i> , 2,000
pRS316	Yeast vector for new plasmids (<i>URA3</i> marker)	Sikorski and Hieter, 1989
p-ADH1pr-GFP	Yeast vector for protein expression tagged with C-terminal GFP epitope controlled by <i>ADH1</i> promoter (<i>URA3</i> marker)	Taberner <i>et al.</i> , 2009
p-ADH1pr-Mip6-GFP	Expression of Mip6 tagged with C-terminal GFP epitope controlled by <i>ADH1</i> promoter (<i>URA3</i> marker)	This work

p-ADH1pr-Mip6W₄₄₂A-GFP	Expression of Mip6W ₄₄₂ A mutant tagged with C-terminal GFP epitope controlled by <i>ADH1</i> promoter (<i>URA3</i> marker)	Dr. María Eugenia Gas-López (SRN lab)
p-ADH1pr-Mip6ΔNES-GFP	Expression of Mip6NESΔ mutant tagged with C-terminal GFP epitope controlled by <i>ADH1</i> promoter (<i>URA3</i> marker)	Dr. María Eugenia Gas-López (SRN lab)
p-ADH1pr-Mip6I₄₂₇R-GFP	Expression of Mip6I ₄₂₇ R mutant tagged with C-terminal GFP epitope controlled by <i>ADH1</i> promoter (<i>URA3</i> marker)	Dr. María Eugenia Gas-López (SRN lab)
p-ADH1pr-Mip6I₄₃₂R-GFP	Expression of Mip6I ₄₃₂ R mutant tagged with C-terminal GFP epitope controlled by <i>ADH1</i> promoter (<i>URA3</i> marker)	Dr. María Eugenia Gas-López (SRN lab)
p-ADH1pr-Mip6ΔRRM1-GFP	Expression of Mip6RRM1Δ mutant tagged with C-terminal GFP epitope controlled by <i>ADH1</i> promoter (<i>URA3</i> marker)	Dr. María Eugenia Gas-López (SRN lab)
p-ADH1pr-Mip6ΔRRM2-GFP	Expression of Mip6RRM2Δ mutant tagged with C-terminal GFP epitope controlled by <i>ADH1</i> promoter (<i>URA3</i> marker)	Dr. María Eugenia Gas-López (SRN lab)
p-ADH1pr-Mip6ΔRRM3-GFP	Expression of Mip6RRM3Δ mutant tagged with C-terminal GFP epitope controlled by <i>ADH1</i> promoter (<i>URA3</i> marker)	Dr. María Eugenia Gas-López (SRN lab)
p-ADH1pr-Mip6ΔRRM4-GFP	Expression of Mip6RRM4Δ mutant tagged with C-terminal GFP epitope controlled by <i>ADH1</i> promoter (<i>URA3</i> marker)	Dr. María Eugenia Gas-López (SRN lab)
pRS315	Yeast vector for new plasmids (<i>LEU2</i> marker)	Sikorski and Hieter, 1989
pRS313	Yeast vector for new plasmids (<i>HIS3</i> marker)	Sikorski and Hieter, 1989
Pab1-GFP	Expression of Pab1 tagged with C-terminal GFP epitope (<i>HIS3</i> marker)	Wheeler <i>et al.</i> , 2017
Pab1-RFP	Expression of Pab1 tagged with C-terminal RFP epitope (<i>LEU2</i> marker)	Scarcelli <i>et al.</i> , 2008

Dcp2-GFP	Expression of Dcp2 tagged with C-terminal GFP epitope (<i>URA3</i> marker)	Coller and Parker, 2005
Dcp2-RFP	Expression of Dcp2 tagged with C-terminal RFP epitope (<i>LEU2</i> marker)	Teixeira <i>et al.</i> , 2005
Pbp1-mCherry	Expression of Pbp1 tagged with C-terminal RFP epitope (<i>URA3</i> marker)	Rajyaguru <i>et al.</i> , 2012
pRS316-FLAG-Mip6	Expression of Mip6 tagged with N-terminal FLAG epitope (<i>URA3</i> marker)	Dr. María Eugenia Gas-López (SRN lab)

*SRN lab: Susana Rodríguez-Navarro laboratory

Primers

The table below lists the primers designed for PAR-CLIP experiments or quantitative/semi-quantitative PCR.

Primer	5' → 3' Sequence	Assay
3' adaptor PAR-CLIP	AppAGATCGGAAGAGCACACGTCTddC	PAR-CLIP
5' adaptor PAR-CLIP	GUUCAGAGUUCUACAGUCCGACGAUC	PAR-CLIP
RT PAR-CLIP	AGACGTGTGCTCTTCCGATCT	PAR-CLIP
Multiplex FW	AATGATACGGCGACCACCGAGATCTACACGTT GAGAGTTCTACAGTCCG*A	PAR-CLIP
Multiplex RV 1	CAAGCAGAAGACGGCATACGAGATATTGGCGT GACTGGAGTTCAGACGTGTGCTCTTCCGATC*T	PAR-CLIP
Multiplex RV 2	CAAGCAGAAGACGGCATACGAGATTACAAGGT GACTGGAGTTCAGACGTGTGCTCTTCCGATC*T	PAR-CLIP
SCR1 FW	GAGTTTTATCCAGCGTCAGC	qRT-PCR
SCR1 RV	GGTTCAGGACACACTCCATC	qRT-PCR
HSP12 FW	CTTCCAAGGTGTCCACGACT	qRT-PCR

HSP12 RV	ACATATTTCGACGGCATCGTT	qRT-PCR
CTT1 FW	GAACCATGACTGGGTCTTCA	qRT-PCR
CTT1 RV	GAAGGAATGACCAGAGTACG	qRT-PCR

* Phosphorylation sites

Commercial Kits

The table below lists the different commercial kits employed.

Name	Company
REAL Total RNA Spin Plus kit	Real
Wizard[™] Plus SV Minipreps DNA Purification System[™]	Promega
Wizard[™] SV Gel and PCR Clean-Up System[™]	Promega
Amersham Western Blotting Detection Kit[™] (ECL Select)	GE Healthcare
Maxima SYBR[®] Premix EX Taq[™]	Takara
GFP-TRAP[®]	ChromoTek

Antibodies

A varied range of primary and secondary antibodies was used for protein detection by Western blotting assays using chemiluminescent (ECL) or fluorescent (IRDye) signals.

Primary Antibodies

Antibody	Host	Dilution	Origin/Company
α-TAP	Rabbit	1:5,000	Thermo-Fischer
α-GFP	Mouse	1:7500	Roche
α-Mex67	Rabbit	1:10,000	Dr. C. Dargemont (Paris, France)
α-Pgk1	Mouse	1:15,000	Invitrogen

α-MYC	Mouse	1:2,000	Clontech
α-Hsp12	Rabbit	1:1,000	Dr. J. Buchner (Munich, Germany)
α-streptavidin -HRP	Mouse	1:5,000	Thermo-Fischer

Secondary antibodies

Antibody	Dilution	Origin/Company
α-Mouse-IgG-ECLTMHRP	1:10,000 (GFP, Pgk1, MYC)	GE Healthcare
α-Rabbit-IgG-ECLTMHRP	1:10,000 (Mex67); 1:20,000 (TAP)	GE Healthcare
α-Rabbit IRDye 800CW	1:10,000 (TAP, Mex67, Hsp12)	LI-COR
α-Mouse IRDye 680LT	1:10,000 (GFP, Pgk1, MYC, HRP)	LI-COR

METHODS

Microbiological Techniques

Bacterial Culture and Transformation

DH5α competent *Escherichia coli* cells were used for plasmid packaging and production. Cells were cultured in Lysogeny broth (LB) Miller media (Miller, 1972): 1% (w/v) tryptone, 0.5% (w/v) yeast extract and 1% (w/v) NaCl. Bacteria were grown in either liquid medium at 37°C at 160 rpm or on solid plates of 2% (w/v) agar at 37°C. For DH5α plasmid-transformed selection growth with Ampicillin (Amp) selection marker, 0.0075% (w/v) Ampicillin was added to liquid or solid media. To collect and store each new *E. coli* transformed strain, 700 μl of an overnight bacterial culture with 300 μl sterilized 50% glycerol were mixed and stored in our -80°C bacteria collection for future use.

Bacteria cells were transformed following two different approaches depending on their origin and treatment. For heat-shock dependent transformation, Library Efficiency DH5α competent cells (Invitrogen) were used following the manufacturer's instructions. 100 μl of competent cells were placed

on ice for 30 minutes after adding 10 ng of DNA plasmid. Cells were treated at 42°C for 45 seconds and placed again on ice for 2 minutes. 900 µl of SOC (Super Optimal broth with Catabolite repression) medium at room temperature (RT) was added to the mixture and incubated at 37°C at 700 rpm for 1 hour. Home-made DH5α electrocompetent cells were used to obtain electrocompetent cells. First, a bacterial culture was prepared in LB until reaching an OD₅₅₀ of 0.8. Cells were centrifuged for 15 minutes at 3500 rpm in a 4°C, washed twice with cold, sterile milli-Q water and another twice with cold 10% glycerol. After a second wash with 10% glycerol, a small amount of supernatant was maintained for cell resuspension. 50 µl aliquots were prepared, frozen in liquid N₂, and stored at -80°C. Once needed for use, 50 ng of DNA plasmid was added to 50 µl thawed electrocompetent cells on ice. Cells were placed into a 4°C electroporation cuvette (Bio-Rad) avoiding bubble formation. Electroporation was performed in Electroporator 2510 (Eppendorf) set to 1.7 kV. Immediately after the pulse, 900 µl of LB medium was added and briefly mixed to be placed in a 1.5 ml tube at 37°C at 700 rpm for 1 hour. Different volumes (50-100-200 µl) of cell solution were spread onto LB agar plates with 0.0075% (w/v) Ampicillin and grown for 1 day at 37°C. Selected colonies were reseeded for plasmid confirmation by sequencing or PCR procedures and stored for future experiments.

Yeast Culture and Transformation

Saccharomyces cerevisiae was cultured in rich medium Yeast extract-Peptone-Dextrose (YPD; 1% (w/v) yeast extract, 2% (w/v) peptone and 2% (w/v) dextrose) or Synthetic Complete (SC; 0.5% (w/v) ammonium sulfate (NH₄)₂SO₄, 0.2% (w/v) Drop-out mix, 0.17% (w/v) Yeast Nitrogen Bases (YNB) without amino acids and 2% (w/v) dextrose) medium depending on experimental necessities. Yeast strains containing *KANMX* resistance markers were selected in YPD + 0.02% (w/v) Geneticin G418 media. Amino acid selection was added to SC media for specific yeast growth after plasmid transformation, gene deletion, promoter exchange, or protein tagging. Yeast strains were grown in both liquid media at 30°C at 140 rpm or on solid plates adding 2% (w/v) agar at 30°C. To preserve new *S. cerevisiae* strains, 600 µl

from an overnight yeast culture was mixed with 400 μ l of sterilized 50% glycerol and kept in a -80°C freezer for future approaches. For plasmid transformation, a modified LiAc/SS carrier DNA/PEG method was followed (Gietz and Schiestl, 2007). 50 ml of yeast cells were grown until OD_{600} 0.5-0.8. Cells were centrifuged at 3,000 rpm for 2 minutes and washed with sterile milli-Q water. The yeast strains were resuspended in 1 ml sterile water and transferred to a 1.5 ml tube. 100 μ l aliquots per transformation were distributed into new 1.5 ml tubes for centrifugation to discard supernatant. The cells were resuspended in 360 μ l of transformation mix: 240 μ l 50% (w/v) poly(ethylene glycol), 36 μ l LiAc 1 M, 34 μ l milli-Q water, and 50 μ l salmon sperm DNA carrier (2 mg/ml dissolved in TE (1M Tris-HCl pH 8.0, 0.5 M EDTA pH 8.0)). 100-200 ng of plasmid DNA was added to each tube (except for the negative control) and incubated at 42°C for 40 minutes at 700 rpm. For thermosensitive strains, the cells were incubated at 30°C for 35 minutes and then 10 minutes at 42°C . After centrifugation at 13,000 rpm for 1 minute, the cells were diluted with 100 μ l of sterile water and spread into selection agar plates.

For gene deletion, promoter exchange or protein tagging, a modified transformation protocol was employed (Guldener *et al.*, 1996). This protocol comprises the amplification by PCR of a specific DNA sequence of interest flanked with 50 nucleotides at each end that are targeted for homologous recombination to allow the pairing of this exogenous DNA in a specific locus in the yeast genome (Gavin *et al.*, 2002; Longtine *et al.*, 1998). This cassette includes a selectable marker for positive selection following the transformation protocol. PCR procedures are described in the following chapters.

For yeast transformation, 50 ml of yeast cultured to an OD_{600} of 0.6-1, were centrifuged at 3,000 rpm for 2 minutes. After washing with sterile milli-Q water, the yeast cells were resuspended in 1 ml sterile water and transferred to a sterile 1.5 ml tube. 100 μ l of yeast cells were transferred to new 1.5 ml tubes. The yeast strains were resuspended in 360 μ l of the previously described transformation mix substituting milli-Q water for TE 10x solution. 1-2 μ g of PCR cassette was added to each tube (not for negative control) and first incubated at 30°C for 30 minutes and then at 42°C for 20 minutes, both with a 700-rpm agitation. For thermosensitive strains, the cells were incubated at 30°C for 40

minutes and then shifted for 10 minutes at 42°C. The cells were centrifuged at 13,000 rpm for 1 minute and resuspended in 5 ml of YPD medium. The yeast strains were incubated at 30°C for at least 2 hours before centrifugation and next spread into selection agar plates. All deletions, promoter exchanges, and genomically tagged strains were confirmed by PCR analysis, sequencing, and/or Western blotting.

Yeast Growth Analysis

To perform growth analysis, yeast cells were grown in liquid culture at 30°C in YPD or SC media. For specific cases, different conditions of stress were applied, including heat-shock (42°C 30 minutes, 52°C 3 minutes), freezing (N₂ liquid), oxidative stress (H₂O₂), saline stress (NaCl), or metal stress (Cu₂SO₄). The cultures were diluted to 0.2-0.4 OD₆₀₀, and serial dilutions (1:10) were spotted onto YPD or SC plates with or without stressors. The cells were incubated at different temperatures, usually 30°C, 33°C, and 37°C, and photographed after 2–5 days of incubation.

Nucleic Acid Techniques

Polymerase Chain Reaction

Amplification of DNA sequences was performed to obtain transformation cassettes and to corroborate all newly created strains and plasmids. cDNA libraries were amplified by PCR protocols, as detailed later. To test strains or plasmids, a PCR mix reaction was set to 20 µl. The PCR mix includes 10% (v/v) Taq Polymerase Buffer 10x (Roche) including MgCl₂, 10% (v/v) 4 mM dNTPs (Invitrogen), 10% (v/v) 10 µM primers, 1% (v/v) Taq Polymerase (Roche), 5% (v/v) DNA template (10 ng plasmid/20 µl PCR mix or 100 ng genomic DNA/20 µl PCR mix), and 64% sterile deionized water. The PCR programs were set according to the PCR fragment. For cassette amplification, the PCR program consists of 3 minutes at 95°C (initial denaturation), 9 cycles of 15 seconds at 95°C with 30 seconds at 54°C, and 2 minutes at 72°C (first denaturation, annealing, and amplification cycles), 25 cycles of 15 seconds at 95°C with 30 seconds at 54°C and 2 minutes + 5 seconds/cycle at 72°C (more cycles of

denaturation, annealing and amplification), 7 minutes at 72°C (final extension), and finally a holding temperature at 4°C. To test yeast transformation, the program employs 3 minutes at 95°C, 30 cycles of 15 seconds at 95°C, followed by 30 seconds at an appropriate annealing temperature and an estimated extension time at 72°C of 1-10 minutes depending on PCR product length (normally 500-1,000 nucleotides per minute), and finishing at 4°C. PCR products were confirmed by electrophoresis in agarose gels. For the cDNA libraries from the PAR-CLIP experiments (see PAR-CLIP), similar procedures to PCR were followed with modifications. A different number of cycles were performed (16-20-24-28 cycles), to optimize the minimal cycles required to achieve detectable bands in agarose gels. The annealing temperature was set to 60°C and the extension time was 15 seconds. Agarose gel electrophoresis was used to run samples and cut out the bands over 73 base pairs 5'-3' adaptor ligation was performed for DNA purification, as explained below.

PCR/Digestion Product Purification

PCR amplicons, digestion products, or cDNA libraries were purified by columnar centrifugation using the Wizard SV Gel and PCR Clean-Up System (Promega). Briefly, PCR or digestion products were mixed with the same volume of Membrane Binding Solution and transferred to an SV Minicolumn in a collection tube. For cDNA libraries, an agarose gel electrophoresis was performed, and specific bands were recovered from the gel. The recovered gel was then mixed with 10 µl of Membrane Binding Solution per 10 mg of gel slice and incubated at 65°C. Once the agarose gel was melted, the solution was placed in an SV Minicolumn. After a 1-minute incubation at RT in the SV Minicolumn, centrifugation at 16,000 x *g* for 1 minute was carried out and the flow through discarded. The column membrane was first washed with 700 µl of Wash solution and centrifuged at 16,000 x *g* for 1 minute and then with 500 µl and centrifuged at 16,000 x *g* for 5 minutes. Once the collection tube was emptied, the Minicolumn was centrifuged at 16,000 x *g* for 1 minute to allow for total ethanol evaporation. The column was placed into a new 1.5 ml tube, and 40-50 µl nuclease-free water and 15 µl for cDNA libraries were poured over the membrane for incubation at RT for 1 minute. The purified DNA product was

recovered after centrifugation at 16,000 x *g* for 1 minute, discarding the SV Minicolumn.

DNA Cloning

The Mip6 plasmids were constructed using various different procedures. For p-*ADH1pr*-Mip6-GFP, a PCR based cloning including restriction sites was used. First, the digestion of p-*ADH1pr*-GFP plasmid (Taberner *et al.*, 2009) with KpnI and BamHI was performed and confirmed by agarose electrophoresis. This DNA fragment was purified using Wizard SV Gel and PCR Clean-Up System (Promega), and a lack of transformation capacity was corroborated by electroporation-based procedures. Second, the *MIP6* coding sequence without stop codon was amplified by PCR adding restriction sites for KpnI and BamHI at 5' and 3' ends, respectively. The PCR product was digested and corroborated by agarose gel electrophoresis. The DNA fragment was purified using the same procedures as for plasmid. Then, the ligation assay with both digested DNA fragments was performed with T4 DNA ligase (Promega) and transformed into electrocompetent cells. Once colonies were obtained, clones were checked by plasmid DNA isolation and sequencing confirming the proper PCR product insertion.

For the p-*ADH1pr*-GFP-Mip6 mutant plasmids, Quick-Change mutagenesis (Agilent) using the p-*ADH1pr*-GFP-Mip6 plasmid was used. Plasmid amplification including the specific mutations was obtained by high-efficiency PCR. The methylated and/or hemimethylated parental plasmid was digested using the DpnI enzyme (Thermo Scientific). The resulting product was then transformed into commercial high-efficiency competent cells. The creation of the new plasmid was confirmed by plasmid extraction and sequencing from selected colonies.

Plasmid Isolation and Purification

Plasmids were stored in transformed *E. coli* strains at -80°C. Bacterial cultures were grown overnight in LB-Miller media at 37°C at 160 rpm. 1-5 ml of these cultures were centrifuged for 1 minute at 13,000 rpm, and the supernatant

was removed. To purify plasmid DNA, the Wizard Plus SV Minipreps DNA Purification System (Promega) was used following the company's guidelines. The bacterial pellet was resuspended in 250 μ l of Cell Resuspension solution and then mixed by inverting 4 times with 250 μ l of Cell Lysis solution. After incubation at RT for 1-5 minutes, 10 μ l Alkaline Protease was added and mixed by inverting other 4 times. After 5 minutes of incubation at RT, 300 μ l of Neutralization solution was added and vigorously mixed by inverting the tube 4 times. The cell lysate was centrifuged at 14,000 x *g* for 10 minutes at RT, and the supernatant was recovered and transferred to a pre-prepared Spin Column with a collection tube. This column was then centrifuged at 14,000 x *g* for 1 minute at RT, and the flow-through was discarded. Two washes of 750 μ l of Wash Solution, with the same centrifugation conditions than before, and an extra wash with 250 μ l, at 14,000 x *g* for 2 minutes, were conducted. The Spin Column was then transferred to a 1.5 ml tube and 50 μ l Nuclease-Free water were added for elution at 14,000 x *g* for 1 minute at RT. Purified plasmids were stored at -20°C for future approaches.

Genomic DNA Extraction

To obtain genomic DNA from yeast, a 10 ml culture was grown overnight in YPD. The cell pellet was obtained by centrifugation at 13,000 rpm for 1 minute, and the growth medium was discarded. After washing the pellet with deionized water, cells were resuspended with 200 μ l of Breaking Buffer solution (10 mM Tris-HCl pH 8.0, 1 mM ethylenediaminetetraacetic acid (EDTA) pH 8.0, 100 mM NaCl, 2% (v/v) Triton X-100 and 1% (w/v) sodium dodecyl sulfate (SDS) in milli-Q water), 200 μ l of acid-washed glass beads, and 200 μ l of phenol:chloroform:isoamyl alcohol (25:24:1). Cell disruption was carried out by vortexing for 5 minutes. Then, after centrifugation at 14,000 rpm for 5 minutes at RT, the aqueous phase was recovered and mixed with 300 μ l EtOH 100% (v/v) and 60 μ l sodium acetate 3 M pH 5.3. The tube was incubated at -20°C to precipitate DNA for 30 minutes. To collect genomic DNA, centrifugation at 14,000 rpm for 15 minutes at 4°C was performed, followed by a 500 μ l EtOH 70% (v/v) wash. Once the pellet was air-dried after discarding EtOH, genomic DNA was resuspended in 20-30 μ l of milli-Q water and stored at -20°C until use.

RNA Purification

RNA purification was performed using a modified hot acidic phenol protocol (Collart and Oliviero, 2001). From a 20 ml yeast culture at OD₆₀₀ 0.5-0.8, a pellet was obtained and washed with RNase-Free water before being frozen with liquid nitrogen. The resuspension of frozen cells was carried out by acid phenol addition (pH 4.3) and then immediately placed at 65°C with 1400 rpm for up to 5 minutes allowing for cell dissolution. 450 µl of TES buffer (10 mM Tris-HCl pH 7.5, 10 mM EDTA and 0.5% (w/v) SDS diluted in RNase-Free water) were added to the solution, which was then vortexed under the same conditions for 1 minute. Incubation at 65°C for 30 minutes, with periods of 1400 rpm vortexing every 5 minutes, was followed. Next, tubes were incubated at 4°C on ice for 10 minutes before centrifugation at RT for 5 minutes at 14,000 rpm. 400 µl of the aqueous phase was recovered for the following phenolization with 450 µl acid phenol. After vortexing and incubating at 4°C for 5 minutes on ice, the RNA extract was centrifuged again at 14,000 rpm for 5 minutes at RT. After recovering 350 µl, 400 µl chloroform:isoamyl alcohol (24:1) was added to the extract, which was vortexed and centrifuged for 5 minutes at 14,000 rpm. 250 µl was isolated and mixed with 25 µl of 3 M sodium acetate pH 5.3 and 625 µl of EtOH 100% (v/v) for the overnight nucleic acid precipitation at -20°C. The next day, the tubes were centrifuged at 14,000 rpm for 15 minutes at 4°C, and the supernatant was removed. The pellets were washed with EtOH 70% (v/v) and centrifuged under the same conditions for 5 minutes. The supernatant was discarded again, and the pellets were left to dry at 37°C for less than 10 minutes. 50 µl of RNase-Free water was added, incubated at 4°C for 1 hour and placed into a -80°C refrigerator. Once the pellet was well thawed and properly resuspended, both RNA quantity and quality were checked by Nanodrop (Thermo Scientific) and agarose gel electrophoresis. 5 µg of RNA was treated with DNase I (Sigma-Aldrich) at 30°C for 30 minutes following the manufacturer's recommendations (10% (v/v) 10x DNase I buffer and 10% (v/v) DNase I enzyme in a 25 µl total volume in water). Purification of DNase-treated RNA was performed in some cases with REAL Total RNA Spin Plus kit following manufacturers' protocol or, for other RNAs, by phenol-chloroform-

based procedures. In the latter case, 50 μ l of 3 M sodium acetate pH 5.3 and 425 μ l of RNase-Free water were added and mixed. 450 μ l of phenol:chloroform:isoamyl alcohol (25:24:1) was added to the mixture and vortexed, and centrifugation carried out at 14,000 rpm for 5 minutes at RT. After recovering 450 μ l of the aqueous phase, another phenolization with same volumes and procedures was performed, obtaining 400 μ l of the RNA enriched fraction. 400 μ l of chloroform:isoamyl alcohol (24:1) was then added and centrifuged at 14,000 rpm for 5 minutes at RT recovering at this level 250 μ l of the aqueous solution. The addition of 1 μ l glycogen and 625 μ l EtOH 100% (v/v) led to RNA precipitation overnight at -20°C. This solution was first centrifuged at 14,000 rpm for 15 minutes at 4°C, then the supernatant was discarded, and the pellet finally washed with 500 μ l of EtOH 70% (v/v) including centrifugation at 14,000 rpm for 5 minutes at 4°C. The pellet was air-dried at RT and resuspended in 20 μ l of Nuclease-Free water. Subsequent quantity and quality checking by Nanodrop and PCR test were performed to confirm DNA and RNA integrity and quantity.

cDNA synthesis

To obtain cDNA, 1 μ g of DNase-treated RNA in a volume of 11 μ l (excess of water) was mixed with 1 μ l of Random Primers (Invitrogen) and 1 μ l of 4 mM dNTP mix. This reaction was incubated at 65°C for 5 minutes. Immediately, samples were placed on ice, and 7 μ l of Reverse Transcription mix (4 μ l of 5x First-Strand buffer (Invitrogen), 1 μ l of 0.1 M DTT, 1 μ l of RNaseOUT (Invitrogen) and 1 μ l of SuperScript III reverse transcriptase (Invitrogen)) were added. Samples were incubated at 25°C for 5 minutes, 50 minutes at 50°C and, finally, 15 minutes at 70°C for retrotranscription and enzyme inactivation. Then, the products were diluted 1/5 with RNase-Free water obtaining a final volume of 100 μ l for future approaches.

Quantitative PCR

RNA abundance was measured by quantitative (q)PCR using the LightCycler 480 II instrument or LightCycler 96 system. The qPCR mix for both

machines contained 5 μ l of TB Green Premix Ex Taq (Tli RNase H Plus) (Takara), 1 μ l of 10 μ M primer mix, including both forward and reverse oligos, 2 μ l of RNase-Free water, and 2 μ l of the cDNA sample. Calibration lines were obtained for each pair of primers to measure their efficiency. Samples were checked by qPCR in a 96-well plate according to this programme: preincubation of 10 minutes at 95°C, 40 cycles of 3-step amplification (95°C for 10 seconds, 58°C for 10 seconds and 72°C for 12 seconds), and a melting cycle consisting of 95°C for 5 seconds, 50°C for 1 minute and 95°C for 1 second. Cq values obtained were used for qPCR calculations following $\Delta\Delta C_t$ method (Livak and Schmittgen, 2001) and normalized with WT/Mip6-GFP 25°C values, depending on the experimental comparisons.

Agarose DNA/RNA Electrophoresis

Nucleic acids fragments were separated in 0.6-2% (w/v) agarose gels depending on DNA/RNA products. Agarose gels were prepared and used for electrophoresis in 1x TAE buffer (40 mM Tris-Acetate and 1 mM EDTA pH 8.0 in deionized water). To see DNA/RNA bands, 5 μ l of 10 mg/ml ethidium bromide or GreenSafe Premium (Nzytech) per 100 μ l of agarose gel were added before agarose polymerization. To load DNA/RNA samples, 1 μ l of commercial Loading Buffer 5x (Bio-Rad) or laboratory-made Loading Buffer 6x for DNA/RNA (30% (v/v) Glycerol, 0.25% (w/v) Blue xylene cyanol and 0.25% (w/v) Bromophenol blue in water) was mixed with 4 μ l or 5 μ l of DNA/RNA sample respectively. Agarose gels were run at 100-120 V for a desired period depending on DNA/RNA bands size and imaged in a Gel Doc XR system (Bio-Rad) or an Ultima 16si-Plus (Isogen).

Protein Techniques

Protein Extraction

Modified yeast NaOH (Kushnirov, 2,000), Trichloroacetic acid (TCA) (Keogh *et al.*, 2006), and High Urea (HU) (Knop *et al.*, 1999) whole cell extraction (WCE) protocols were followed for total protein extraction. In all

protocols, 5 ml of yeast culture (OD_{600} of 0.6-0.8) were centrifuged at 3,000 rpm for 2 minutes at 4°C and washed with 1 ml of deionized water in a 1.5 ml tube. Using the NaOH protocol, the cell pellets were resuspended in 1 ml of cold milli-Q water and, 150 μ l of NaOH/ β -mercaptoethanol (1.85 M NaOH and 7.5% (v/v) β -mercaptoethanol) was added and mixed. The tubes were then incubated on ice for 10 minutes and centrifuged at 12,000 rpm for 1 minute at RT. The supernatant was discarded, and the pellet was resuspended in 60 μ l of 2x Loading Buffer (LB). After a 2-minute incubation at 95°C, samples were harvested at 12,000 rpm for 5 minutes at RT, and the supernatant was stored (protein extract).

For the TCA-based protocol, the cell pellets were resuspended in 1 ml of 20% (v/v) TCA and placed on ice. Samples were centrifuged at 13,000 rpm for 1 minute at 4°C, and the supernatant was removed. Two washes with 1 ml of 1 M Tris-base were performed by centrifuging at 13,000 rpm for 1 minute at RT. Pellets were resuspended in 100 μ l of 2x LB and heated at 95°C for 2 minutes. 200 μ l of acid-washed glass beads were added, and the tubes were vortexed by two 1-min on/1-min off cycles. The tubes were again incubated at 95°C for 2 minutes and, with the help of a pre-burnt needle, a hole was drilled to allow the protein extraction to leak without glass beads into a new tube after a short spinning. These extracts were harvested at 5,000 rpm for 5 minutes at RT, and the supernatant was stored.

To obtain protein extracts using the HU-buffer protocol, the cell pellets were resuspended with 1 ml of cold water and mixed with 150 μ l of NaOH/ β -mercaptoethanol, being placed on ice for 15 minutes. 150 μ l of 55% (w/v) TCA was added, and the solutions were incubated on ice for 10 minutes. This mixture was centrifuged at 14,000 rpm for 10 minutes at 4°C, and the supernatant was discarded. The cells were resuspended in 200-300 μ l of HU-buffer (8 M Urea, 5% (w/v) SDS, 200 mM Tris-HCl pH 6.8, 1 mM EDTA, 0.25% (w/v) Bromophenol blue and 1.5% (w/v) DTT in water) with 2-5 μ l of 1 M Tris-Base (to recover the blue color) and incubated at 65°C for 10 minutes at 800 rpm. The final supernatant was recovered after centrifugation at 14,000 rpm for 5 minutes at RT.

Pull-down Assays

50 ml of Mip6-TAP or Mip6-GFP yeast cultures were grown in YPD or SC medium to an OD₆₀₀ of 0.5. The cells were harvested at 3,000 rpm for 2 minutes at 4°C, washed with 10 ml of Lysis Buffer (50 mM HEPES–KOH pH 7.5, 140 mM NaCl, 1 mM EDTA, 10% (v/v) glycerol, 0.5% (v/v) NP-40, 1 mM PMSF and 1x Complete protease cocktail inhibitor (Roche)) and resuspended in 250 µl of Lysis Buffer containing 0.5 mM DTT. An equal volume of glass beads was added, and the cells were disrupted by vortex for 4 minutes using 1-min on/1-min off cycles at 4°C. The cell lysate was centrifuged at 3,000 rpm for 2 minutes at 4°C, and the supernatant was recovered. An aliquot (30 µl) of the lysate was saved as an “Input” sample, which was mixed with an equal volume of 4x Loading Buffer for protein (LB; 250 mM Tris-HCl pH 6.8, 140 mM SDS, 30 mM Bromophenol blue, 27 mM Glycerol and 0.1 mM DTT). The rest of the clarified extracts were immunoprecipitated in a turning wheel for 2 hours at 4 °C using Dynabeads[®] Pan mouse IgG (Invitrogen) or GFP-TRAP beads (Chromotek). Three washes of 10 minutes in the turning wheel at 4°C with 1 ml of Lysis Buffer plus 0.5 mM DTT were performed recovering the beads with the help of a magnetic strip. Beads were resuspended in 25 µl of 4x LB and heat-treated at 95°C for 3 minutes. After placing the tube in the magnetic strip, the supernatant was recovered and stored in a 1.5 ml tube (IP sample). The resuspension with other 25 µl of 4x LB and subsequent treatments were repeated, thus, obtaining a total IP volume of 50 µl.

Western Blotting

Purified proteins were run on gels of different percentages of polyacrylamide concentration, usually 6%, 10% or 15% (w/v), following previous specifications (Sambrook and Russell, 2006). Before gel preparation, gel thickness was chosen between 0.75 mm and 1.5 mm and 10 or 15 wells were selected depending on the concentration and the number of the samples. Polyacrylamide gels were composed by separating and stacking gels differing in Tris-HCl solution. The separating gel mix was prepared as a first mixture of

specific volumes of 30% (w/v) acrylamide/bisacrylamide stock and water with 1.875 μ l of 1.5 M Tris-HCl pH 8.8, depending on the gel concentration, to which 25 μ l of 10% (w/v) Ammonium persulfate (APS) and 5 μ l of N,N,N',N'-tetramethylethane-1,2-diamine (TEMED) were added for gel polymerization. To eliminate bubbles from the separating gel before polymerization, 200-300 μ l of 2-isopropanol was poured over the separating gel and washed with water following acrylamide polymerization. The stacking gel mix (325 μ l of 30% (w/v) acrylamide/bisacrylamide, 625 μ l of 0.5 M Tris-HCl pH 6.8, 1.525 ml of water, 12.5 μ l of 10% (w/v) APS and 2.5 μ l of TEMED) was poured over the separating gel and a 10-15 comb was placed before gel polymerization. Vertical gel electrophoresis was performed in Mini-Protean Tetra Cell cuvettes (Bio-Rad) in which gels were placed, and different sample volumes were loaded together with protein markers. Protein gels were run in 1x Running buffer (25 mM Tris-Base, 190 mM Glycine and 0.01% (w/v) SDS in water) at a constant voltage of 100-120 V to reach the desired protein separation. Once the polyacrylamide electrophoresis was finished, proteins from the gel were transferred to a nitrocellulose membrane following the wet transfer assay or Trans-blot[®] Turbo[™] system (Bio-Rad).

For standard protein detection, the Trans-blot Turbo blotting system was used with 1x Bjerrum-Schafer-Nielsen buffer pH 9.2 (48 mM Tris-HCl, 39 mM Glycine and 20% (v/v) Methanol in deionized water) as transfer buffer at 4°C. A pre-impregnated 9 cm x 6 cm sandwich composed of three transfer papers (top), a 0.45 μ m Hybond-ECL Amersham nitrocellulose membrane (GE Healthcare), the polyacrylamide gel and other three transfer papers (bottom) were placed in the Trans-blot Turbo machine. Bio-Rad preprogrammed protocols for Mini-gels were followed with a fixed amperage of 1.3 A for 10 minutes. For specific protein detection, the wet transfer assay was followed using 1x Transfer wet buffer (25 mM Tris-HCl pH 8.3, 192 mM Glycine, 0.1% (w/v) SDS and 20% (v/v) Methanol in deionized water) at 4°C. Over the black side of the sandwich, a pre-impregnated 9 x 6 cm sandwich composed by a sponge, three Whatman[®] blotting papers, a polyacrylamide gel, a nitrocellulose membrane, three blotting papers, and a second sponge were included in the Mini Trans-blot[®] Cell. Transfer assays were developed at a fixed voltage of 100

V for 1 hour in the presence of an icebox. Once transfer assays were finished, nitrocellulose membranes were incubated with Ponceau solution (1% (w/v) Ponceau with 1% (v/v) Acetic acid in water) for 2 minutes to verify adequate protein transfer. The membrane was washed with deionized water until protein bands were visible. Nitrocellulose membranes were blocked with Tris-buffered saline (TBS; 0.02 M Tris-HCl pH 7.6 and 0.8% (w/v) NaCl in water) with 0.01% Tween-20 and 5% (w/v) milk powder at RT for 45 minutes with gentle rocking. Depending on the protein of interest, overnight incubation at 4°C was also performed. After removing the blocking solution, incubation with 10 ml of primary antibody solution in TBS-Tween with 5% (w/v) milk powder was performed for 1 hour at RT with gentle rocking. Primary and secondary antibody concentrations are displayed in the antibody section within this document. Three washes with TBS-Tween of 10 minutes each at RT with intense rocking were carried out before a secondary antibody incubation with TBS-Tween with 5% (w/v) milk powder for 1 hour at RT with gentle rocking. Three washes with TBS-Tween and one wash with TBS for 10 minutes at RT with intense rocking were performed.

For immunodetection, two different approaches were followed depending on the secondary antibody. For ECLTMHRP antibodies, the Amersham Western Blotting Detection Kit™ (ECL Select) (GE Healthcare) was used for chemiluminescent detection. 500 µl of each reagent (1 ml total) were mixed and poured over the membrane for incubation at RT for 5 minutes protected from light exposition. The excess solution was removed, and the membrane visualized in Amersham Hyperfilm™ ECL™ using Curix 60 film processor (AGFA Healthcare) or directly imaged using ImageQuant LAS 400 mini machine (GE Healthcare). For fluorescent antibodies, direct visualization of nitrocellulose membrane in Odyssey Imaging system (Li-Cor) was used to obtain pictures of the detected proteins.

Other Techniques

PAR-CLIP

Photoactivatable-Ribonucleoside-Enhanced Crosslinking and Immunoprecipitation (PAR-CLIP) experiments were performed as previously described (Schaughency *et al.*, 2014) (**Figure 11**). Briefly, 50 ml of Mip6-HTB cells were grown overnight at 30°C in YPD. An OD₆₀₀ of 0.1 was seeded in sterile cross-linking media (SC without uracil supplemented with 2% (w/v) glucose, 40 mg/l adenine, 60 µM uracil and 1 µM biotin) and incubated until an OD₆₀₀ of 0.75. Addition of 4 mM 4-thiouracil to optimize RNA-protein crosslinking and incubation at 30°C for 15 minutes was performed. Incubation of 30 minutes at 30°C (non-stressed) or 10 minutes at 30°C plus 20 minutes at 39°C (heat-stressed) was carried out. Irradiation with 365 nm ultraviolet (UV) light from an LC-L5 LED UV lamp (Hamamatsu) was carried out for 15 minutes with gentle stirring. Cultures were filtered using 0.8-micron nitrocellulose filters (GE Healthcare), scraped into 5 ml Buffer 1 (300 mM NaCl, 0.5% (v/v) NP-40, 50 mM NaPO₄ pH 7.2, 10 mM imidazole, 6 M Guanidine HCl, Protease inhibitor Cocktail VII (RPI)), and frozen in liquid nitrogen. Cell lysis (15 cycles at 15 cycles per second (cps) of 1-minute grinding and 2 minutes cool down) in a SamplePrep 6870 freezer mill (SPEX SamplePrep) were performed, and samples then resuspended in 30 ml of Buffer 1 with 500 µl of Protease Inhibitor Cocktail VII. After brief centrifugation at 3,000 rpm for 3 minutes to reduce foam levels, lysates were sonicated in a Soniprep 150 (Sanyo) for 3 bursts of 10 seconds at 50% duty cycle at power level 2. The sonicated solution was transferred to Nalgene ultracentrifuge tubes (Beckmann) for centrifugation at 4,0000 rpm for 30 minutes at RT. During ultracentrifugation, Ni-NTA agarose nickel beads (Qiagen) were equilibrated three times with 1 ml Buffer 1. The ultracentrifuged supernatants were incubated with 1 ml of pre-equilibrated Ni-NTA beads for 2 hours at RT. The Ni-NTA agarose was added to a 10 ml plastic column and washed first with 20 column volumes of Buffer 1 and then with 10 volumes of Buffer 2 (20 mM NaPO₄ pH 7.2, 300 mM NaCl, 0.5% (v/v) NP-40, 10 mM imidazole and 4 M Urea). During washes, 500 µl of hydrophilic streptavidin magnetic beads (New England Biolabs) were washed with 10 ml of water and equilibrated with 5 ml of Buffer 2 in a 15 ml tube. Five elutions, each with 1 ml Buffer 2 + 250 mM imidazole, were performed before incubation with

streptavidin beads and 120 µl Protease Inhibitor Cocktail VII for 4 hours at RT. Beads were resuspended in 500 µl of Buffer 3 (50 mM Tris-HCl pH 7.4, 200 mM NaCl and 4 M Urea) and transferred to a single siliconized 1.5 ml tube. Three washes with 1 ml of Buffer 3 and three washes with 1 ml of T1 Buffer (50 mM Tris-HCl pH 7.4, 150 mM NaCl, 2 mM EDTA) were performed. Resuspension of the magnetic beads in 200 µl of T1 Buffer + 0.15 U/µl RNase T1 (Thermo Scientific) was followed by incubation at 25°C for 15 minutes precisely. Triplicate washes were carried out with 1 ml of RNase T1 Wash Buffer (50 mM Tris-HCl pH 7.4, 500 mM NaCl, 1% (v/v) NP-40, and 0.5% (w/v) sodium deoxycholate) and also with 1 ml of PNK buffer (50 mM Tris-HCl pH 7.2, 50 mM NaCl and 10 mM MgCl₂).

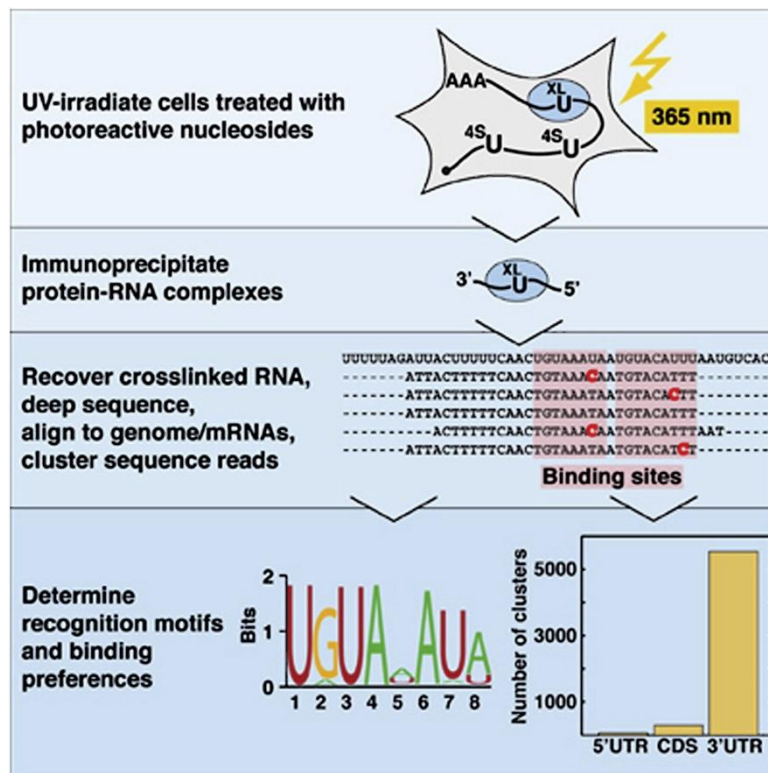


Figure 11. Schematic representation of PAR-CLIP method (Hafner *et al.*, 2010). This figure represents the different steps of a PAR-CLIP experiment. Photoreactive nucleosides were added to a growing yeast culture, and cells were then exposed to UV light for optimal RNA-protein cross-linking. These complexes were immunoprecipitated and unprotected RNA products were degraded. Then, proteins were degraded, and RNA protected sequences were obtained. cDNA synthesis and deep sequencing were performed to obtain the reads necessary for the final study of bound RNAs by bioinformatic approaches.

The magnetic beads were resuspended in 200 µl of TSAP reaction buffer (0.15 U/µl Thermosensitive Alkaline Phosphatase (Promega), 1 U/µl SUPERase

inhibitor (Thermo Scientific), and 1mM DTT in PNK Buffer) and incubated for 30 minutes at 37°C. Serial washes were carried out once with 1 ml Buffer 3, twice with 1 ml RNase T1 Wash Buffer, and three times with 1 ml PNK Buffer. The beads were resuspended in 200 µl Kinase Reaction Buffer (1 U/µl T4 PNK (New England Biolabs), ³²P γ-ATP and 5 mM DTT in PNK Buffer) and incubated for 30 minutes at 37°C. An incubation of 10 minutes at 37°C was followed by the addition of 2 µl of 100 mM cold ATP. The beads were repeatedly washed with 1 ml of Buffer 3, 1 ml of RNase T1 Wash Buffer, and three times with 1 ml of T4 RNA ligase Buffer (50 mM Tris-HCl pH 7.4 and 10 mM MgCl₂). The resuspension of the streptavidin beads was carried out in 44 µl of 3' adaptor ligase reaction (25% (v/v) PEG 8,000, 10 U/µl T4 RNA ligase 2 truncated K227Q (New England Biolabs), 2 U/µl RNase inhibitor (Ambion), 5µM 3' adaptor (see Primers), and 1 mM DTT in T4 RNA ligase buffer) and incubated for 4 hours at 25°C. More washes were carried out with 1 ml of Buffer 3 and five times with T4 RNA ligase Buffer. The beads were resuspended in 51 µl of 5' adaptor ligase reaction (1.2 U/µl RNase inhibitor, 1 mM ATP, 0.5 U/µl T4 RNA Ligase (Promega), 5 µM 5' adaptor (see Primers) and 1 mM DTT in T4 RNA ligase Buffer) and incubated overnight at 16°C. Then, beads were washed five times with 1 ml of Proteinase K Buffer (100 mM Tris-HCl pH 7.4, 150 mM NaCl and 12.5 mM EDTA) and resuspended in 200 µl of Proteinase K Buffer + 2% (w/v) SDS + 12 µl Proteinase K (New England Biolabs), incubating at 37°C for 30 minutes. The suspension was saved, and the pellet treatment with Proteinase K was repeated with the supernatant recovered. The obtained RNA was purified by acid phenol/chloroform extraction and ethanol precipitation (see RNA purification). The RNA was resuspended in 15 µl of Nuclease-Free water and frozen at -80°C. Reverse transcription, PCR amplification and gel extraction of cDNA libraries were carried out as previously described.

PAR-CLIP Bioinformatic Analysis

The cDNA libraries were sent for strand-specific sequencing. The demultiplexed sequencing data were pre-processed as described in Jamonnak *et al.*, 2011. The raw reads were trimmed of the 3' adaptor (Schaughency *et al.*, 2014) and the sequences were condensed to eliminate PCR artifacts and

aligned to the SacCer3 genome (R64-1-1) using Bowtie 1.1.1 (Langmead *et al.*, 2009). Subsequent filtering of mapped reads was carried out to discard sequences without PAR-CLIP specific T to C mismatches. Consequently, only reads coming from mRNA-RBP crosslinking events remained for further analysis. In-house scripts and a Pysam python library (Li *et al.*, 2009) were used to find PAR-CLIP specific mismatches. Then, the read coverage over gene bodies was calculated by using `geneBody_coverage.py` function from RSeqQC toolkit (Wang *et al.*, 2012). The gene models described in gtf file version 2.2 were used for gene coverage and binding level computation. The binding levels per gene were computed using HTSeq count tool (Anders *et al.*, 2015). RPKM (Mortazavi *et al.*, 2008) and Trimmed Mean of M-values (Robinson & Oshlack, 2010) normalization approaches were applied for correction of binding values both within and between samples. To further correct the binding estimates by gene expression levels, RNA-Seq data from McKinlay *et al.*, 2011 was used. The RNA-seq reads were aligned to the reference genome with Tophat2 (Kim *et al.*, 2013) and gene quantification and normalization were computed following the same pipeline applied for PAR-CLIP data. The corrected Mip6 binding levels were obtained by dividing the nominal binding values by gene expression values. Differential binding for both absolute and relative binding estimations was performed using the non-parametric `noiseq` function from NOISeq package (Tarazona *et al.*, 2015). A probability of 0.9 was set as a threshold to differentially call bound genes to Mip6 between conditions. Overrepresentation analysis and gene set enrichment analysis were computed using GOseq (Young *et al.*, 2010) and Mdgsea (Montaner & Dopazo, 2010) packages, respectively. The Gene Ontology functional annotation was retrieved from Ensembl Biomart web site (Kinsella *et al.*, 2011). tRNA or rRNA genes were discarded in all bioinformatics analyses. The PAR-CLIP datasets have been submitted to GEO as GSE126236.

Metabolite Extraction

The metabolic profile of glycerol, trehalose, glutamic and aspartic acid was profiled from WT and *mip6Δpes4Δ* strains following a previously described protocol (Palomino-Schätzlein *et al.*, 2013). Three biological replicates were

growth in YPD medium at 30°C with 140 rpm up to an OD₆₀₀ between 0.4-0.6 and a heat-shock at 39°C was performed for 20 minutes (see *In vivo* protein localization). The cells were pelleted after centrifugation at 3,000 rpm for 2 minutes at RT and washed three times with 1 ml of phosphate buffer (100 mM Na₂HPO₄ pH 7.4) under the same centrifugation conditions. The pellet was resuspended in 160 µl of methanol at -20°C and centrifuged at 13,000 rpm for 1 minute at 4°C. After the supernatant was discarded, the cells were frozen in liquid nitrogen and stored at -80°C. The metabolite extractions were performed by adding 80 µl of chloroform at 4°C and incubated for 5 minutes on ice. The cell disruption included 3 freeze-thaw cycles in liquid nitrogen and 2 minutes on ice. The pellet was resuspended in 125 µl of Milli-Q water and 125 µl of chloroform by vortexing and then harvested at 13,000 rpm for 15 minutes at 4°C. The upper (aqueous) phase was recovered by pipetting and transferred to a new 1.5 ml tube while the lower (lipophilic) phase was collected with a glass Pasteur pipette and transferred to another 1.5 ml tube. Centrifugation at 13,000 rpm for 2 minutes at 4°C was performed to verify correct phase separation. The aqueous phase was frozen in liquid nitrogen and lyophilized to discard water and methanol residues. Both aqueous phase and lipophilic phase were frozen with liquid nitrogen and stored at -80°C. NMR experiments and analyses were performed by the NMR service in the Centro de Investigación Príncipe Felipe (CIPF).

In vivo Protein Localization

Fluorescent proteins were visualized in living cells from growth cultures at 30°C with 140 rpm in SC-selected medium at an OD₆₀₀ of 0.5-0.8. In some cases, incubation with 0.5 µg/ml of DAPI solution was performed for 2 hours to mark nuclei. For stress-induced experiments (39°C for 0-135 minutes, 42°C for 30 minutes), yeast cultures were harvested at 3,000 rpm for 2 minutes at RT and resuspended in pre-heated medium at specific temperature conditions for a determined period to perform heat shock stress. For glucose depletion assays, yeast cells were collected by centrifugation at 3,000 rpm for 2 minutes at RT, washed 3 times in 10 ml of fresh SC medium +/- 2% (w/v) glucose, resuspended in fresh SC liquid medium +/- 2% (w/v) glucose and incubated at

30°C for 30 minutes. For sodium azide stress, 1 ml of 10% (w/v) NaN₃ was directly added to 20 ml of grown culture and incubated at 140 rpm for 30 minutes at 30°C. After stress conditions and DAPI treatment were applied, 1 ml of yeast culture was harvested at 13,000 rpm for 1 minute at RT, and the pellet was resuspended in 10-20 µl of 1x phosphate buffered saline (PBS; 13.7 mM NaCl, 0.27 mM KCl, 0.43 mM Na₂HPO₄ and 0.14 mM KH₂PO₄ in water). The resuspended cells were placed on a microscope slide with a coverslip, and the residual medium was removed with a paper. Samples were imaged using a Leica SP8 confocal system with inverted DMI 6,000 microscope running LAS X software (Leica Microsystems). For protein colocalization pictures, images were obtained with DAPI, mCherry and/or red fluorescent protein (RFP) imaging together with green fluorescent protein (GFP) imaging and bright-field pictures. ImageJ (<http://rsbweb.nih.gov/ij/>) was used to equal contrast and adjust all images.

Protein Localization in Fixed Cells

Cell fixation with methanol was performed for protein visualization. Cell growth and treatments were followed as for *in vivo* protein localization. The yeast cells were harvested at 3,000 rpm for 2 minutes at 4°C and then washed with 10 ml 1x PBS using the same centrifugation parameters. The pellet was resuspended in 1 ml of fresh methanol and incubated on ice for 10 minutes, vortexing every 2 minutes, for cell fixation. Cells were centrifuged at 13,000 rpm for 1 minute at 4°C and resuspended in 10-20 µl of 1x PBS. Cycloheximide treatments (100 µg/ml) were performed with minor modifications as previously described (Teixeira *et al.*, 2005). The same procedures as *in vivo* protein visualization were followed for slides preparation and confocal visualization.

Fluorescence in situ hybridization

In situ hybridization using a probe targeting SSA4 mRNA or poly(A)+ RNA was done as previously described with minor modifications (Oliete-Calvo *et al.*, 2018; Thomsen *et al.*, 2005). Briefly, yeast cells were grown in 50 ml of YPD medium at 30°C for poly(A)+ RNA FISH, or, for SSA4 mRNA FISH, at

25°C at 0.1-0.2 OD₆₀₀ and then temperature shifted to 42°C for 30 minutes by diluting with an equal volume of 59°C media. Cells were immediately fixed in 4% formaldehyde for 15 minutes at 42°C followed by 30 minutes at room temperature. The fixative was removed by two rounds of centrifugation and the cells were washed with 0.1 M potassium phosphate pH 6.4. Cells were resuspended in ice-cold washing buffer (1.2 M sorbitol and 0.1 M potassium phosphate pH 6.4), and subsequently the cell wall was digested with 0.5 mg/ml of zymolyase 100T. Following digestion, cell samples were applied onto poly-Lysine- coated slide wells. Non-adhering cells were removed by aspiration, the cells were washed twice in wash buffer, once in 0.1 M KH₂PO₄/K₂HPO₄ pH 6.5, 0.1% NP-40 and once in 0.1 M KH₂PO₄/K₂HPO₄ pH 6.5, and were finally incubated with cold 70% ethanol for 30 minutes at -20°C. Prior to probe addition, the ethanol was drained from the cells and the cells were washed twice at 20°C for 5 minutes per wash in 2 × SSC and once for 10 minutes in 40% formamide/2 × SSC, 0.1% Triton X-100, before overnight incubation at 37°C with 10 µL of the probe mix. For each well, 300 ng of probe was mixed with 5 µL of solution I (80% formamide, 10 mM NaHPO₄ pH 7.0, 2 µg/µl salmon sperm DNA, 2 µg/µl yeast tRNA), denatured for 5 minutes at 95°C, and finally mixed with 5 µL of solution II (4 × SSC, 20 mM Vanadyl-ribonucleoside, 4 µg/µL BSA, 0.1 U/µL RNasin). Probe removal was followed by the following washing steps: (1) twice in 40% formamide/2 × SSC for 10 minutes per wash at 37°C; (2) once in 2 × SSC/0.1% Triton X-100 for 10 minutes at 20°C; (3) twice in 1 × SSC for 10 minutes per wash at 20°C; and (4) twice in 1 × PBS for 5 minutes per wash at 20°C. Slides were mounted using VECTASHIELD® Mounting Medium with DAPI. Samples were detected using the DMI 6000 inverted fluorescence microscope. Pictures were taken using a Leica TCS-SP4-AOBS confocal microscope.

Stress Granule Purification

The purification of stress granules was performed as previously described with minor modifications (Jain *et al.*, 2016). 100 ml of yeast culture were grown in appropriated selection media until an OD₆₀₀ of 0.5-0.8. Similar steps to the *in vivo* protein visualization stress treatments were followed. After

stress induction, the cells were pelleted at 3,000 rpm for 3 minutes at RT and washed under the same conditions with 10 ml of cold water. The yeast cells were frozen in liquid nitrogen, and cell pulverization with a pestle in a mortar was carried out adding liquid nitrogen. The cell pellets were resuspended in 300-500 μ l of SG Lysis buffer (50 mM Tris-HCl pH 7.4, 100 mM Potassium Acetate, 2 mM Magnesium Acetate, 0.5 mM DTT, 50 μ g/ml Heparin, 0.5% (v/v) NP-40 and 1 Complete mini EDTA free protease inhibitor tablet (Roche) per 50 ml in water) and transferred to a 1.5 ml tube. Successive centrifugations were performed to achieve the enriched stress-granules fraction (**Figure 12**). The cell lysates were centrifuged at 850 x g for 2 minutes at 4°C, and the supernatant was recovered. Next centrifugation at 18,000 x g for 10 minutes at 4°C was performed, and the supernatant was removed while the pellet was resuspended in 100-300 μ l of SG Lysis buffer. Centrifugation at 850 x g for 2 minutes at 4°C was performed, and the supernatant was kept as Stress-granule cores enriched fraction. To confirm the stress granule purification, aliquots were obtained for confocal microscopy imaging and Western blotting.

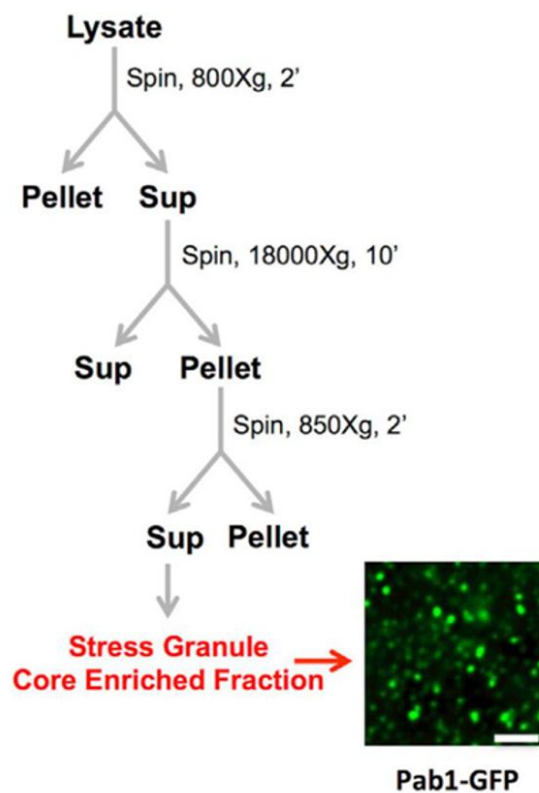


Figure 12. Centrifugation steps for stress granules purification (Jain *et al.*, 2016). Three consecutive centrifugations are necessary to obtain the stress granule-enriched fraction. This product was verified by confocal and Western blotting procedures.

Statistics/Informatics Support

qRT-PCR data, normalized to WT 25°C or Mip6-GFP 25°C levels, were shown as mean \pm SD. Unpaired students' t-tests with one-tailed (* = p-value < 0.05; ** = p-value < 0.01; *** = p-value < 0.001) were used to test significant differences from at least 3 biological replicates by using GraphPad Prism 5 software. Mip6 nuclear retention was calculated using Fiji (Schindelin *et al.*, 2012) from at least 3 different experiments (at least $n > 100$ cells) and represented as a percentage of cells with nuclear retention \pm SEM. Binomial statistical tests were performed to confirm differences (* = p-value < 0.05; ** = p-value < 0.01; *** = p-value < 0.001). Real-time luciferase assay results were shown as curves with error bars representing luminescence produced by luciferin metabolism over time in seconds. Preparation of figures and tables was carried out using Microsoft Excel, Microsoft Word, Fiji, GraphPad Prism 5, and GIMP 2 software packages.

COLLABORATIONS

Some of the results presented in this thesis were performed in collaboration with other lab members and most of them are incorporated in a manuscript which is currently under revision (Martín-Expósito *et al.*, EMBO reports under review). Since we considered that their inclusion in this work was important to be able to understand fully all my results, they have been incorporated. The figure legends in which any panel was authored by a collaborator are amended to acknowledge their participation. My main collaborators are: Dr. María Eugenia Gas (MGL), Dr. Pau Pascual (PPG), Carme Nuño (CNC), Joan Serrano (JSQ) and Ana Tejada (ATC), all members of the laboratory of Dr. Susana Rodríguez-Navarro (SRN) (Príncipe Felipe Research Center (CIPF) and Instituto de Biomedicina de Valencia (IBV-CSIC)). In addition, Jonathan Merran from the laboratory of Dr. Jeffrey Corden (Johns Hopkins Medical School) and Lorena de la Fuente (LFL) from the laboratory of Dr. Ana Conesa (CIPF and University of Florida (UF)) are also acknowledged for their participation in PAR-CLIP experiments and bioinformatic analyses respectively.

RESULTS

CHAPTER 1

*Functional Characterization of Mip6 Interaction with
Mex67 and RNA Metabolism Machinery Under
Standard and Stressful Growth Conditions*

The essential factor Mex67 plays a crucial and diverse role in RNA export in yeast (Santos-Rosa *et al.*, 1998; Hurt *et al.*, 2000). Although Mex67 binds RNA with a low affinity and plays an important role in stress-related mRNA transport (Zander *et al.*, 2016), the transport of various kinds of RNAs requires the interaction of RNAs with other RBPs (Lund and Guthrie, 2005; Batisse *et al.*, 2009). Mip6 is a poorly characterized protein with four RNA Recognition Motifs (RRMs) that interacts with Mex67, as evidenced by yeast two-hybrid experiments (Segref *et al.*, 1997). These studies suggest a role for Mip6 in RNA transport (Segref *et al.*, 1997).

In this chapter, we describe our findings that confirm a functional relation between Mip6 and the mRNA metabolism machinery, especially with Mex67, under standard and non-optimal growth conditions.

Mip6 Interacts Physically and Genetically with the Mex67, an Essential RNA Export Factor

Corroborating previous results from a yeast two-hybrid screening that described Mip6 as a Mex67 interacting protein (Segref *et al.*, 1997), we confirmed the Mex67-Mip6 physical interaction by detecting co-purified Mex67 in a Mip6-TAP pull-down (**Figure 13A**). In addition to the physical interaction, we created a double mutant strain to assess the possible genetic interaction between the *mip6* Δ mutant and a strain expressing *mex67-5*, a thermosensitive allele of Mex67 that impairs growth at 37°C (Segref *et al.*, 1997; Scarcelli *et al.*, 2007). We employed a Mex67 thermosensitive allele due to the essential nature of this protein in yeast. Although the lack of *MIP6* did not impair cell growth at 30°C, 33°C, and 37°C, we found that deletion of *MIP6* led to a negative synthetic growth phenotype when combined with *mex67-5* at 30°C and 33°C (**Figure 13B**). However, the introduction of a Mip6 expression plasmid recovered this phenotype (**Figure 13C**).

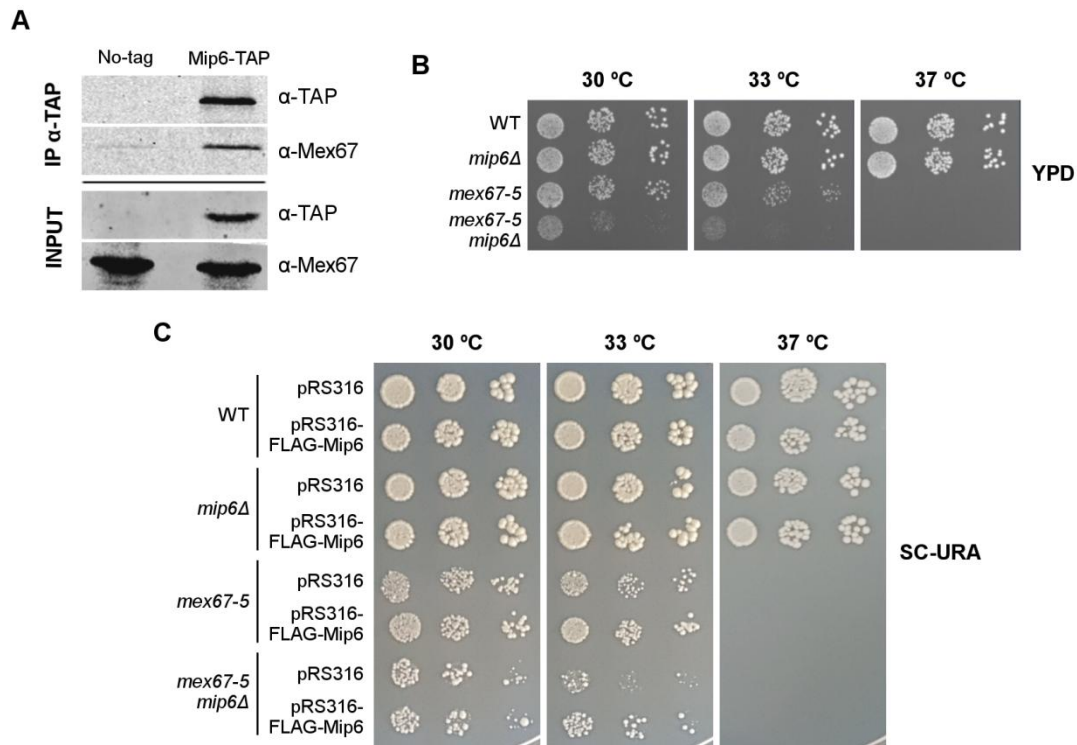


Figure 13. Mip6 Interacts Physically and Genetically with the Mex67 Essential RNA Export Factor
 (A) Immunoprecipitation of cells expressing Mip6-TAP and no-tag cells. Mex67 and TAP-tagged proteins analyzed before (INPUT) and after (IP) purification with the indicated antibodies by Western blot. (B) Growth of wild-type (WT), *mip6* Δ , *mex67-5*, and *mex67-5mip6* Δ mutants. Precultures diluted in liquid YPD medium, and ten-fold dilutions of cells spotted onto YPD plates and incubated for two days at the indicated temperatures. (C) Dot spot growth assay from strains used in (B) after transformation with empty (pRS316) and Mip6 (pRS316-FLAG-Mip6) plasmids. Cultures dilutions carried out in SC-URA plates incubated for three days at 30°C, 33°C, and 37°C.

Mip6 Deletion does not Affect Mex67 Nuclear Pore Complex Localization or Protein Level

Mex67 localizes to the nucleus and in particular, to nuclear pores where it functions as a shuttling protein involved in RNA transport through the NPC (Oeffinger and Zenklusen, 2012). To address whether Mip6 influences Mex67 localization, we performed *in vivo* localization studies of Mex67-GFP in WT and *mip6* Δ yeast strains. To this end, we obtained *in vivo* confocal images of cells growing at 30°C and after heat shock treatment at 39°C for 20 minutes. Previous studies indicated that stressful conditions such as these lead to changes in the localization of RNA metabolism proteins (Buchan and Parker, 2009; Wallace *et al.*, 2015). We failed to see any alteration to Mex67-GFP localization upon *MIP6* deletion under any tested condition (**Figure 14A**). Whole

cell extracts and dot spot assays also failed to demonstrate any effect on protein levels and cell growth, respectively, indicating that Mip6 does not affect Mex67 abundance or cell growth before or after heat stress (**Figure 14B** and **Figure 14C**).

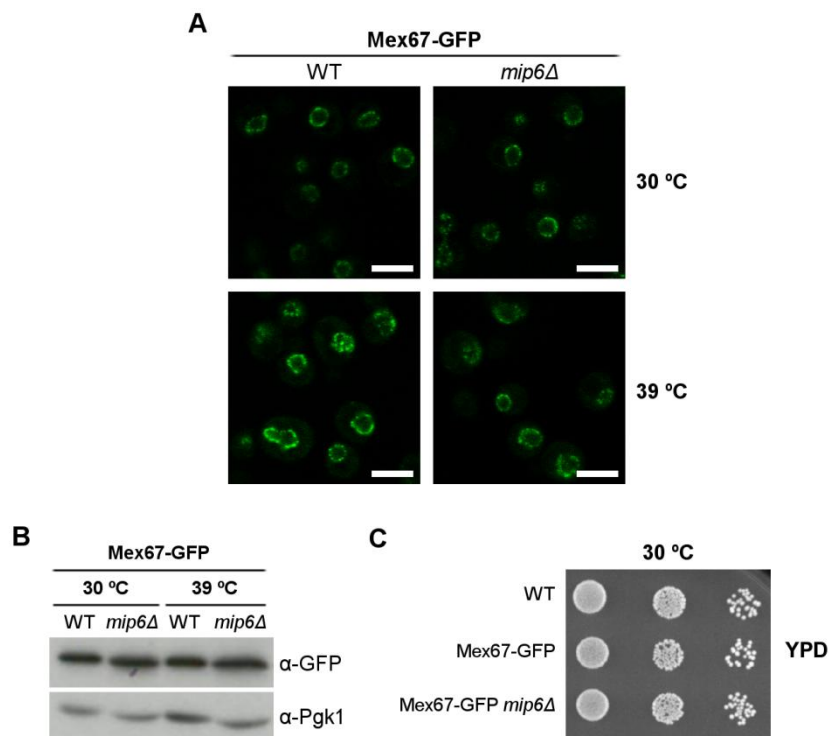


Figure 14. Mex67 NPC Localization and Protein Levels are not Affected by Mip6 Deletion (A) Confocal images displaying Mex67-GFP localization in wild-type (WT) and *mip6Δ* cells grown at 30°C and after treatment at 39°C for 20 minutes. Scale bar: 5 μm. (B) Western blot displaying Mex67-GFP levels from WT and *mip6Δ* lysates at 30°C and after heat shock at 39°C for 20 minutes. Pgk1 used as a loading control. (C) Dot spot assay of Mex67-GFP strains and no-tag WT at 30°C. Images obtained after three days of incubation.

Deletion of MIP6 Promotes Mex67ΔC1 Mutant Accumulation in Cytoplasmic Granules in Response to Stress

Although Mex67 exhibits a perinuclear localization profile, it has also been purified from cytoplasmic granules induced under stress conditions, otherwise known as stress granules (SGs) (Buchan and Parker, 2009). To allow the localization of Mex67 in SGs, we used Mex67 mutants which impair mRNA export. These mutants include the *mex67-5-GFP* thermosensitive strain and a Mex67 protein lacking the C-terminal region (Mex67ΔC1) (Scarcelli *et al.*, 2008; Segref *et al.*, 1997). To assess whether Mip6 influences the presence of Mex67

in these structures, we employed the Mex67 Δ C1-GFP mutant, which shows nuclear retention at 30°C and retention in cytoplasmic granules in response to stressful conditions (Strässer *et al.*, 2000) and compared results to those obtained with *mip6* Δ cells. As expected, we observed some aggregation of mutant Mex67 in cytoplasmic granules after heat shock in WT cells (**Figure 15, upper panel**). To assess Mex67 Δ C1 kinetics during heat shock in *mip6* Δ cells, we obtained confocal images for Mex67 Δ C1-GFP. **Figure 15, lower panel** displays a representative example of four different experiments undertaken; cells lacking *MIP6* display increased levels of Mex67 Δ C1 in cytoplasmic granules (**Figure 15**) with significant differences observed at 20 and 105 minutes.

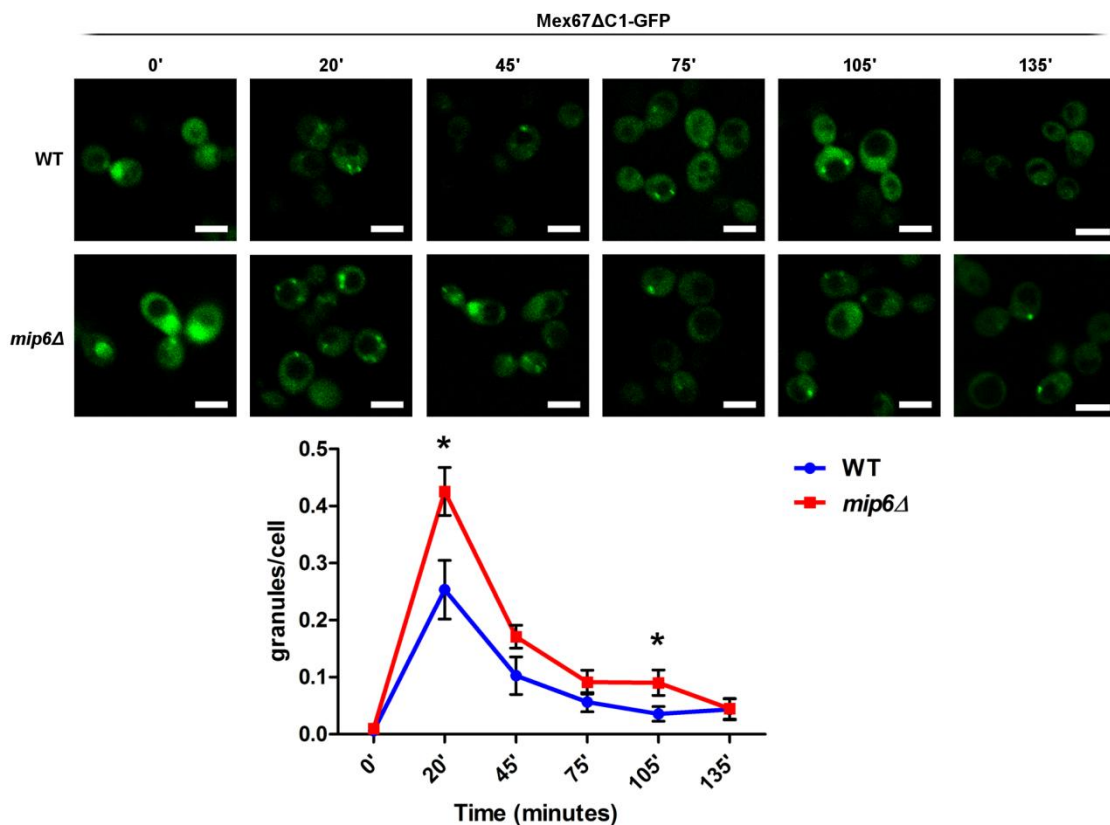


Figure 15. Deletion of *MIP6* Enhances the Presence of the Mex67 Δ C1 Mutant in Cytoplasmic Granules in Response to Stressful Conditions. Mex67 Δ C1-GFP kinetics during heat shock at 39°C in WT and *mip6* Δ cells. Scale bar: 5 μ m (upper images). Quantification of the number of granules per cell from four different experiments ($n > 100$ cells per experiment) calculated and represented along the timeline (graph below). Means \pm SD shown.

Mip6 Shuttles Between the Nucleus and the Cytoplasm, Partially Via and Interaction with Mex67

To gain insight into the cellular role of Mip6, we investigated whether Mip6 shuttles between the nucleus and the cytoplasm in an analogous manner to Mex67. Unfortunately, we did not detect the endogenous Mip6-GFP protein by confocal microscopy, perhaps due to the reported low abundance of Mip6 (Ghaemmaghami *et al.*, 2003, Jin *et al.*, 2017). We therefore expressed Mip6 under the control of the alcohol dehydrogenase 1 promoter (*ADH1pr*) either as a plasmid (p-*ADH1pr*-Mip6-GFP) or at its normal genomic locus (g-*ADH1pr*-Mip6-GFP), both of which resulted in increased Mip6 expression levels (**Figure 16A**). While one study correlated overexpression of Mip6 from the *GAL1* promoter with toxicity (Bolognesi *et al.*, 2016), we failed to observe a similar result after overexpression of Mip6 from the *ADH1* promoter and the p-*ADH1pr*-Mip6-GFP plasmid, allowing the use of this plasmid for functional studies (**Figure 16B**).

Following overexpression, Mip6-GFP became homogeneously distributed between the nucleus and the cytoplasm (**Figure 16C**). To analyze how Mex67 functionality impacts Mip6 shuttling, we analyzed Mip6 localization in yeast cells expressing the *mex67-5* conditional heat-inactivated allele. At a permissive temperature (30°C) in *mex67-5* cells, we observed Mip6-GFP distributed in the nucleus and the cytoplasm, although with lower nuclear accumulation (**Figure 16C**). Shifting cells to 39°C for 2 hours, which completely inactivates the *mex67-5* mutant, resulted in the nuclear accumulation of Mip6-GFP (**Figure 16C**), thereby suggesting the requirement of Mex67 function for the transport of Mip6 from the nucleus to the cytoplasm.

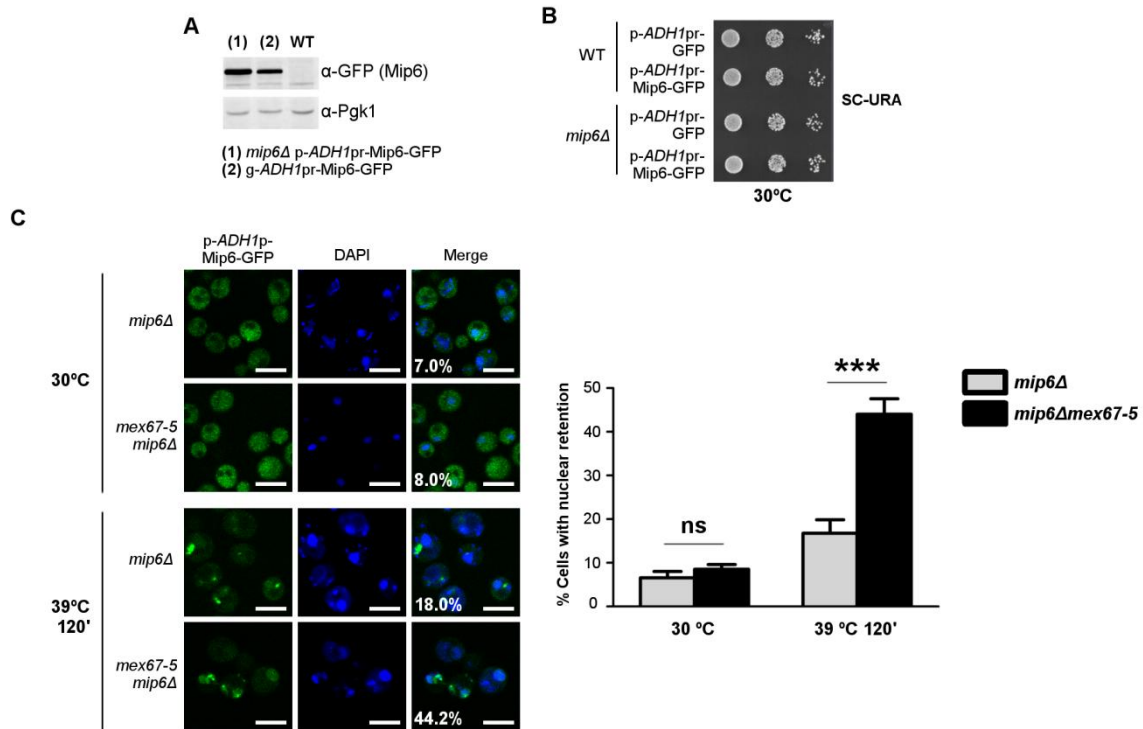


Figure 16. Mex67 Partially Controls Mip6 Shuttling (A) Western blotting of whole cell extracts obtained from strains expressing Mip6-GFP under the control of the *ADH1* promoter from a plasmid (1) or at the *MIP6* genomic locus (2). A wild-type (WT) strain used as negative control, and Pgk1 levels used as loading control. (B) Dot spot growth assay of wild-type (WT) and *mip6Δ* transformed strains. Culture dilutions undertaken in SC-URA plates and incubated for three days at 30°C. (C) Mip6-GFP localization at 30°C and 120 minutes heat shock at 39°C in *mip6Δ* and *mex67-5mip6Δ* transformed strains (left). The quantification of the percentage of cells with nuclear retention from five different experiments ($n > 75$ cells per experiment) obtained and drawn (right). Means \pm SEM represented. Scale bar: 5 μ m.

Deletion of Mex67 UBA Domain Affects Interaction with Mip6 and Causes Mip6 Nuclear Retention

Yeast two-hybrid experiments performed by researchers at the Hurt laboratory established that the Mex67-Mip6 interaction takes place between the C-terminal regions of each protein (Segref *et al.*, 1997). Thanks to work carried out in collaboration with laboratories of Dr. Jerónimo Bravo (Instituto de Biomedicina de Valencia (IBV-CSIC), Valencia, Spain) and Dr. José Manuel Pérez (Instituto de Química-Física Rocasolano (IQFR), Madrid, Spain), we discovered that this interplay occurs due to interactions between the Mip6 RRM4 domain and the Mex67 UBA domain (Martín-Expósito *et al.*, under revision). A mutant expressing Mex67 Δ UBA failed to interact *in vitro* and *in vivo* with Mip6-GFP (Martín-Expósito *et al.*, under revision). Localization experiments

demonstrated that both GFP-fluorescence intensity and the percentage of cells displaying Mip6 nuclear localization increased in cells lacking the Mex67 UBA domain (**Figure 17A**). As previously demonstrated, growth assays failed to uncover any effect on cell growth following Mip6 overexpression (**Figure 17B**). These results suggest that the Mex67 UBA domain is partially necessary for the Mip6-Mex67 interaction and proper Mip6 shuttling.

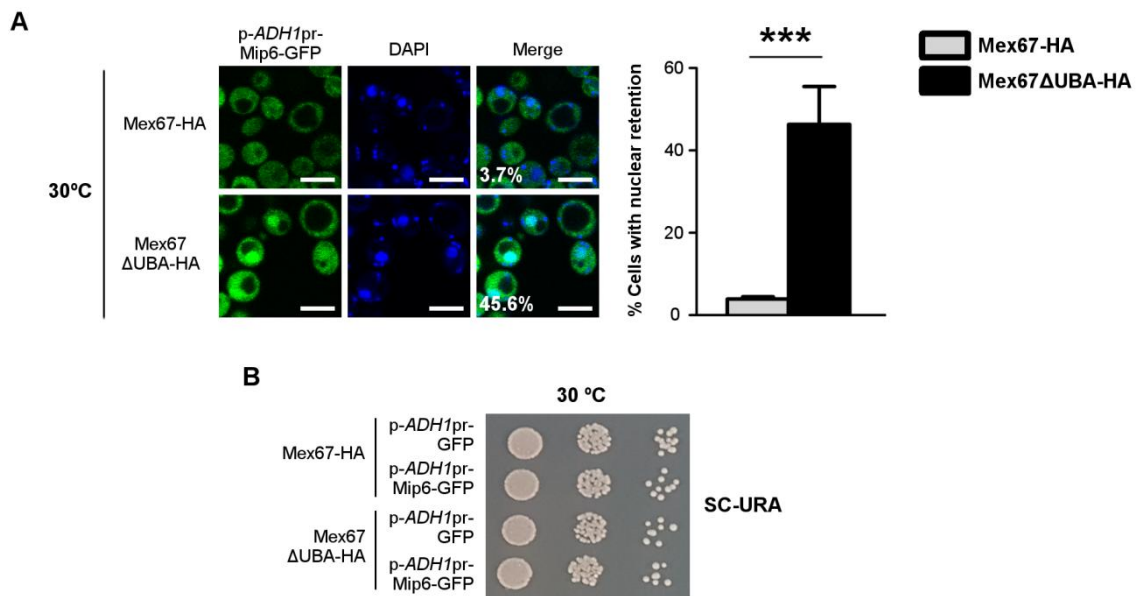


Figure 17. Deletion of the Mex67 UBA domain Affects Interaction with Mip6 and Causes Mip6 Nuclear Retention (A) Mip6-GFP confocal images from Mex67-HA and Mex67 Δ UBA-HA transformed strains at 30°C (left). Scale bar: 5 μ m. Bar graph displays the percentage of cells with nuclear retention from three different experiments ($n > 75$ cells per experiment) with significant differences observed (right). Means \pm SEM represented. (B) Dot spot assay of Mex67-HA and Mex67 Δ UBA-HA transformed strains. Cultures diluted and spotted in SC-URA plates. Images obtained after three days of growth at 30°C.

Mip6 RRM4 Mediates Interaction with Mex67 and Affects Mip6 Localization

A caveat of the previous experiments is the fact that deletion of the Mex67 UBA domain or its complete inactivation in *mex67-5* cells after two hours of treatment at 39°C affects many other cellular processes, including, for example, mRNA export or the interaction of Mex67 with other essential proteins (Segref *et al.*, 1997; Gwizdek *et al.*, 2006). To circumvent these indirect effects, we generated a deletion of RRM4 in p-ADH1pr-Mip6-GFP and studied interactions with Mex67. This mutation reduced the interaction of Mip6 with Mex67 *in vivo* (**Figure 18A**); Mip6 Δ RRM4 localization demonstrated partial nuclear accumulation (**Figure 18B**), and dot spot assays confirmed that RRM4

deletion did not affect cell growth (**Figure 18C**). From these findings, we conclude that Mip6 RRM4 is necessary for Mex67 interaction and Mip6 shuttling.

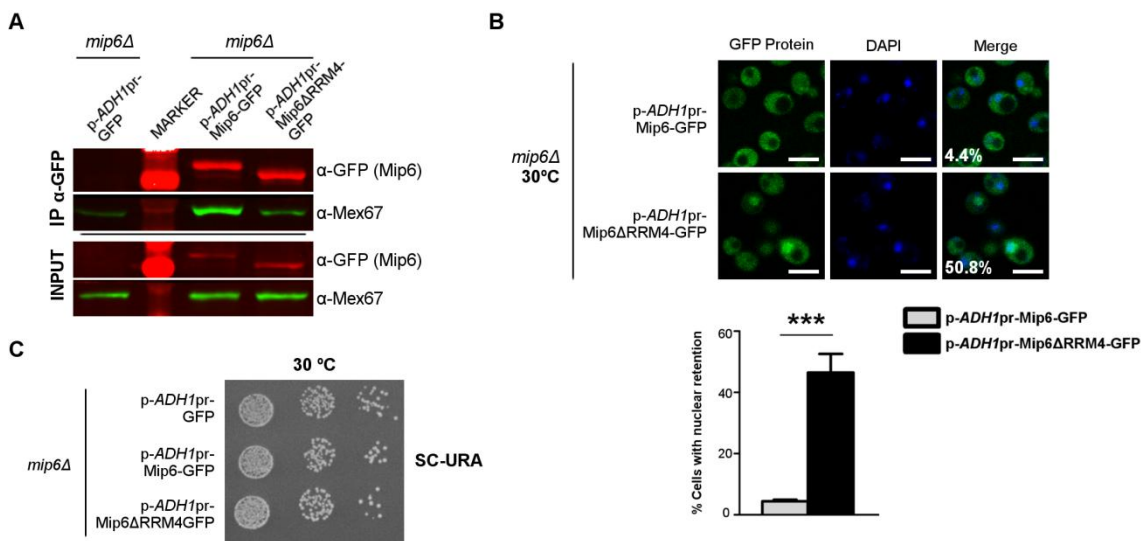


Figure 18. Mip6 RRM4 mediates the interaction with Mex67 and affects Mip6 localization. (A) Mip6 and Mip6ΔRRM4 GFP-Trap pull-downs from cultures grown at 30°C (in collaboration with SRN and ATC). GFP and Mex67 antibodies used for detection. (B) Subcellular localization of Mip6 and Mip6ΔRRM4 constructs grown at 30°C (up). Scale bar: 5 μm. Quantification using percentages of cells with nuclear GFP signal retention represented in bar graphs (down). (C) Growth of serial dilutions of *mip6Δ* transformed strains in SC-URA plates after incubation at 30°C. Image obtained after three days.

Mex67 interaction and Mip6 localization Requires Mip6 Tryptophan-442

Thanks to our collaborators, we uncovered the specific elements of Mip6 RRM4 crucial for Mex67 recognition through ^1H - ^{15}N heteronuclear single quantum correlation (HSQC) nuclear magnetic resonance (NMR) titration. While we identified various residues in the spectra, only the mutation of tryptophan-442 to alanine ($W_{442}A$) affected physical binding to Mex67 *in vitro* (Martín-Expósito *et al.*, under revision). To analyze the *in vivo* relevance of this mutation, we created a Mip6 $W_{442}A$ construct. Mip6 $W_{442}A$ pull-down experiments demonstrated a clear reduction in the levels of Mex67 co-purifying with Mip6 (**Figure 19A**). This effect correlates with the partial nuclear retention of Mip6 $W_{442}A$ construct depicted in **Figure 19B**. To assess any alterations to cell growth, we generated a genomic mutant version of Mip6 $W_{442}A$. The dot spot assay of Mip6 $W_{442}A$ -GFP strain displayed a growth defect at all tested

temperatures suggesting the relevance of tryptophan-442 to cell growth (**Figure 19C**).

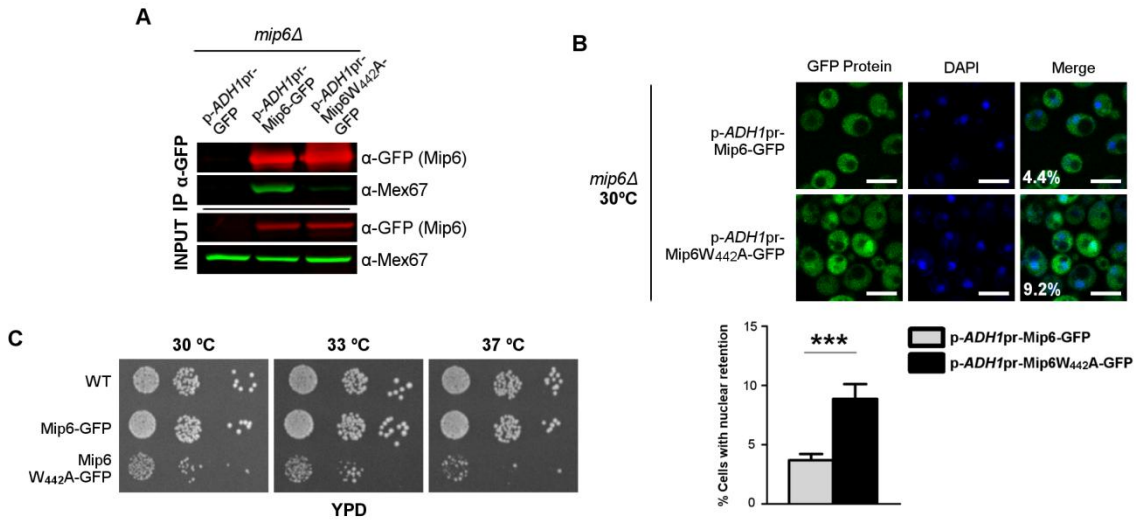


Figure 19. Mip6 Tryptophan 442 is Required for Mex67 Interaction and Mip6 Localization (A) Immunoprecipitation of Mip6 and Mip6W442A-GFP mutant expressed from plasmids in a *mip6Δ* strain. An empty plasmid used as negative control. Mip6-GFP and Mex67 detected by Western blotting using the indicated antibodies (in collaboration with SRN and ATC). (B) Confocal images from *mip6Δ* strain transformed with Mip6W₄₄₂A-GFP plasmid at 30°C (upper section). Bar graph showing the percentage of cells with nuclear retention from six different experiments ($n > 170$ cells per experiment) with significant differences (lower section). Means \pm SEM represented. Scale bar: 5 μ m. (C) Dot spot assay of wild-type, Mip6-GFP, and Mip6W₄₄₂A-GFP strains. Cultures diluted and placed in YPD plates. Photos obtained after growing for three days at 30°C, 33°C, and 37°C.

Mip6 Interacts with mRNA Export Machinery to Enhance Nuclear Export

Mip6 shuttling and its interaction with Mex67 suggest that Mip6 plays roles in RNA transport. To evaluate this idea, we performed pull-down assays with components of the mRNA export machinery (Sus1, Sac3, and Dbp5). More precisely, Sus1 and Sac3 are members of the TREX-2 complex involved in the docking of mRNPs to the inner part of the NPC (Fischer *et al.*, 2002), while Dbp5 (also called Rat8) is a cytoplasmic RNA helicase that releases RNAs from some RBPs at the outer part of the NPC (Lund and Guthrie, 2005). Mip6-TAP pull-downs confirmed the physical interactions between Mip6 and these proteins (**Figure 20A**). To determine Mip6 localization when Sac3 is absent or Dbp5 function is impaired, we detected Mip6-GFP in *sac3Δ* and *rat8-2* mutant strains (Snay-Hodge *et al.*, 1998; Lei *et al.*, 2003). In both cases, Mip6 was

partially retained in the nucleus, suggesting that Dbp5 and Sac3 collaborate in Mip6 transport from the nucleus to the cytoplasm (**Figure 20B**).

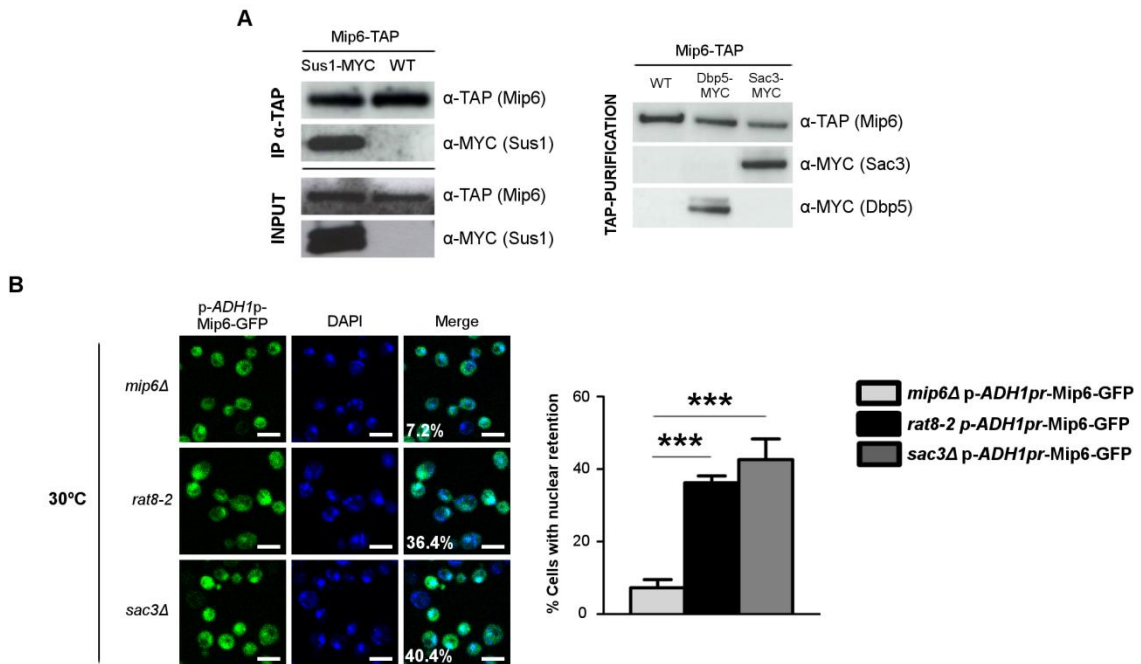


Figure 20. Mip6 Interacts with the RNA Export Machinery to Enhance Nuclear Export (A) Pull-downs from Mip6-TAP wild type (WT) and Sus1-MYC expressing cells (left). TAP-purifications from WT, Dbp5-MYC, and Sac3-MYC Mip6-TAP strains (right). Cultures grown at 30°C with detection of TAP-tagged and co-precipitating MYC-tagged proteins performed using specific antibodies (in collaboration with SRN and PPG). (B) Mip6-GFP confocal images from *mip6Δ*, *rat8-2*, and *sac3Δ* fixed cells incubated at 30°C (left). DAPI used to mark nuclei. Bar graphs represent cells percentages with Mip6 nuclear retention (right). Scale bar: 5 μm.

Mip6 Accumulates in Stress Granules under Stressful Conditions

Mip6 partially localizes to p-body-like assemblies when overexpressed at levels that inhibit growth (Bolognesi *et al.*, 2016) and the prospore membrane in diploids cells (Jin *et al.*, 2017). We noticed that increasing the temperature to 39°C for 20 minutes led to the partial accumulation of Mip6 into cytoplasmic granules in WT cells (**Figure 21A**). This accumulation was not linked to toxicity, as we failed to observe a growth defect associated with Mip6 mislocalization under stress conditions (**Figure 21B**).

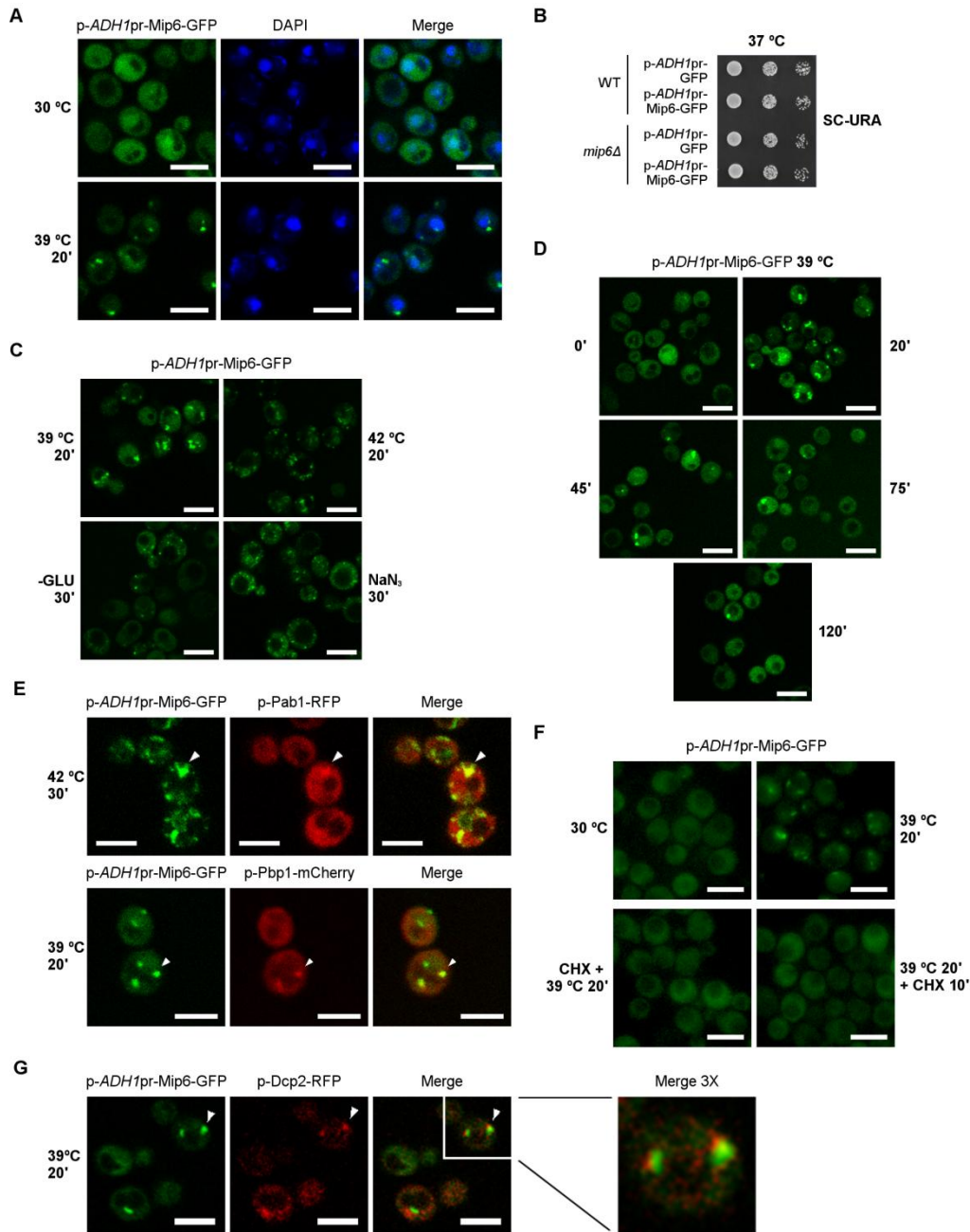


Figure 21. Mip6 Accumulates in Stress Granules in Response to Treatment with Stressors (A) Confocal images of Mip6-GFP localization in yeast cells incubated at 30°C or after incubation at 39°C for 20 minutes. DAPI used to stain the nuclei. Scale bar: 5 μ m. (B) Growth assay of wild type (WT) and *mip6* Δ cells expressing p-*ADH1*pr-GFP or p-*ADH1*pr-Mip6-GFP plasmids. SC-URA plates incubated for three days at 37°C. (C) Localization of Mip6-GFP in *mip6* Δ cells grown under different stressful conditions. Scale bar: 5 μ m. (D) Mip6-GFP kinetics at different time points of growth at 39°C. (E) Confocal analysis of the colocalization of Mip6-GFP with Pab1-RFP (upper) or Pbp1-mCherry (lower) after incubation at 42°C for 30 min or at 39°C for 20 minutes, respectively. Scale bar: 5 μ m. Merge shows the composite images of both colors. (F) Effect of cycloheximide (CHX) on Mip6 granule formation when added during heat shock at 39°C for 20 minutes (CHX + 39°C 20') or when incubated for 10 minutes after 20 minutes heat shock (39°C 20' + CHX 10'). Scale bar: 5 μ m (in collaboration with PPG). (G) Colocalization assay with Mip6-GFP and Dcp2-RFP at 39°C for 20 minutes. The arrow shows partial colocalization between both fluorescent signals. 3-times zoom used in the merged image. Scale bar: 5 μ m.

To assess whether the granules into which Mip6 accumulates were stress-induced granules (SG) (Khong & Parker, 2018), we monitored Mip6-granule formation following treatment with various stressors. **Figure 21C** demonstrates that Mip6 accumulated in cytoplasmic granules following heat shock, sodium azide treatment, and glucose starvation, therefore demonstrating that various stressors affect Mip6 localization. Further study of the kinetics of temperature-induced Mip6 granule formation established the reversible nature of the granule formation when stressful conditions were maintained over a long period (**Figure 21D**). This finding is consistent with our supposition that Mip6-containing granules are SGs, as such granules disassemble when cells adapt to stress (Wallace *et al.*, 2015; Yamamoto & Izawa, 2013). Furthermore, Mip6 partially colocalized with the well-known SG components Pbp1 at 39°C and Pab1 at 42°C (**Figure 21E**). Lastly, Mip6-containing granules exhibited sensitivity to the addition of cycloheximide, another known property of SGs (Teixeira *et al.*, 2005) (**Figure 21F**). This localization also correlates with the partial colocalization demonstrated with p-body markers such as Edc3 or Dcp2 (Bolognesi *et al.*, 2016; **Figure 21G**). In conclusion, following the non-toxic expression of Mip6 under the control of the *ADH1* promoter, Mip6 accumulates in cytoplasmic stress-induced granules in response to treatment with various stressors.

Mip6 Copurifies with Stress Granules and Affects their Metabolism

SGs are dynamic structures produced by the accumulation of proteins and RNAs when translation becomes blocked. SGs contain translation preinitiation complexes to allow for the rapid re-initiation of translation after cells become stress adapted (Buchan & Parker, 2009). SGs consist of two different components: the “core”, the nucleus of the SG, and the “shield”, which contains components that transiently interact following a liquid-liquid phase separation (Jain *et al.*, 2016; Wheeler *et al.*, 2016). Recently, the Parker laboratory defined a method that allows the enrichment of Pab1 SGs to determine protein and RNA content (Jain *et al.*, 2016; Khong *et al.*, 2017; Khong *et al.*, 2018).

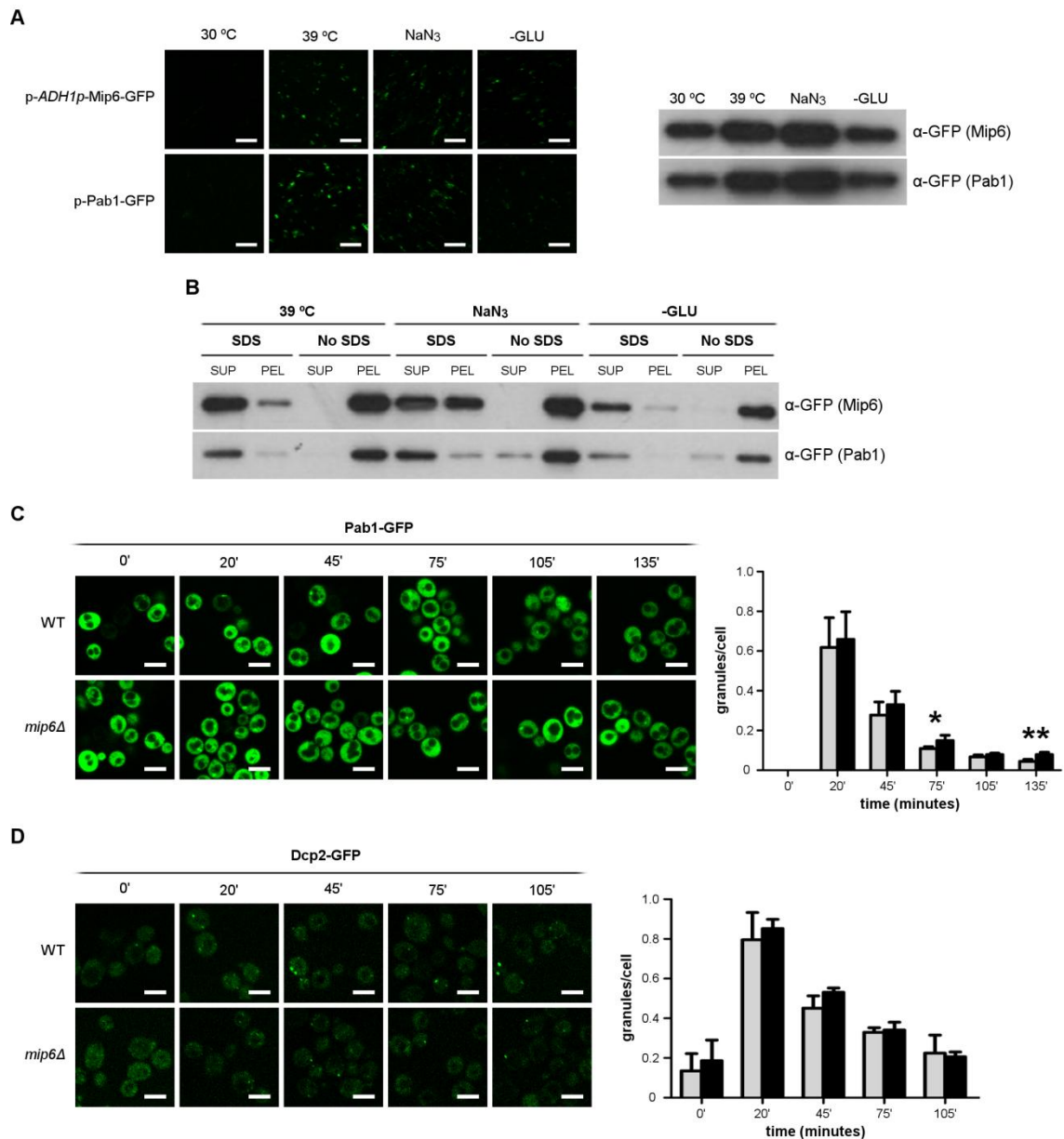


Figure 22. Mip6 Copurifies with Stress Granules and Affects Metabolism (A) Confocal images from lysates of Mip6-GFP (up) and Pab1-GFP (down), obtained following SG purification protocol after inducing *mip6Δ* transformed cells under different conditions (30°C, 20 minutes at 39°C, 30 minutes incubation with sodium azide (NaN₃) and 30 minutes upon glucose starvation). Scale bar: 5 μm (left). GFP immunodetection of samples depicted in the confocal images (right). (B) Western blot of 2% SDS treated and non-treated samples from SG purification samples. SUP: Supernatant, PEL: Pellet. (C) Pab1-GFP kinetics performed in WT and *mip6Δ* strains under maintained heat shock at 39°C (left). Images obtained at indicated times by confocal microscopy. Scale bar: 5 μm. The number of granules per cell obtained from three different experiments ($n > 130$ cells) during the indicated times (* = p -value < 0.05; ** = p -value < 0.01) (right). (D) Dcp2-GFP confocal images at various times under 39°C heat shock treatment (left). Same scale than (C). Bar graphs represent Dcp2-GFP granules per cell at measured times from two different experiments ($n > 85$ cells) (right).

To biochemically study the presence of Mip6 in these structures, we followed the Parker protocol after applying different stressors (heat shock, glucose starvation, and sodium azide treatment). We detected Mip6 and Pab1 after SGs purification by confocal and Western blot experiments (**Figure 22A**). Treatment of the SGs solution with SDS breaks apart the interactions between SG proteins to generate the enrichment of soluble proteins in the supernatant phase when samples are centrifuged at 18000 x *g* for 10 minutes at room temperature (Jain *et al.*, 2016). The treatment of SGs with SDS also produces partial SG disaggregation and solubilization. As shown in **Figure 22B**, Mip6 localization is sensitive to this treatment, in a similar manner to Pab1. To determine the role of Mip6 in stress granule behavior, we developed kinetics experiments for Pab1 in a *mip6Δ* strain during heat shock stress at 39°C. During the stress adaptation phase, which correlates with a decrease in SGs, we observed the maintenance of Pab1 granules in Mip6 lacking cells (**Figure 22C**). This phenotype does not correlate with effects in the behavior of p-bodies as there is no observed effect on Dcp2-GFP kinetics under the same conditions (**Figure 22D**).

Deletion of MIP6 Promotes Cell Survival after Severe Heat Shock Stress

Although stress affected Mip6 localization, we failed to detect differences between WT and *mip6Δ* strains in culture with diverse stressors except for severe heat shock treatment (**Figure 23A**). Pursuing a molecular explanation for this phenotype, we performed a metabolite extraction using *mip6Δ* mutant with a deletion of its paralogue, *PES4*. After metabolite extraction, we discovered significantly higher trehalose levels, with trehalose known to play a protective role in stress resistance and cell survival (Tereshina, 2005; Conlin & Nelson, 2007), in *mip6Δpes4Δ* mutants compared to WT (**Figure 23B**). This result suggests that *mip6Δ* survival after severe heat shock may be due to elevated levels of trehalose.

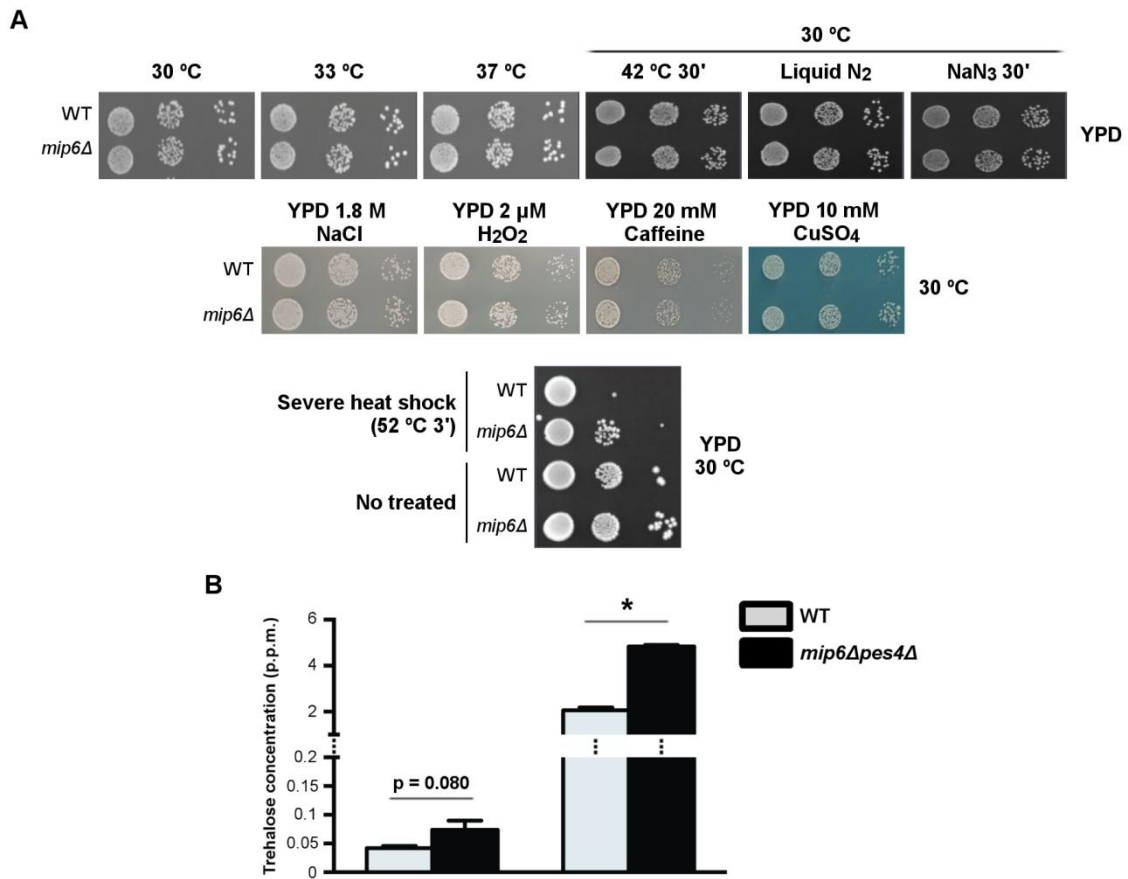


Figure 23. Deletion of *MIP6* Promotes Cell Survival after Severe Heat Shock (A) Growth assays of wild-type (WT) and *mip6Δ* strains under different stressful conditions. Images obtained after growing cells for 2-5 days. (B) Bar graphs representing trehalose levels in WT and *mip6Δpes4Δ* cells grown at 30°C and after heat shock treatment at 39°C for 20 minutes (* = p-value < 0.05).

CHAPTER 2

*Identification of Mip6 RNA Targets and the Role of
Mip6 in mRNA Metabolism*

A critical aim of this thesis was to discern whether Mip6 binds to RNA and if so, we also wished to identify Mip6 RNA targets. Mip6 is described as a putative RNA binding protein with four RRM domains that interacts with Mex67. Many Mex67-interacting proteins, such as Npl3, Yra1, and Hrb1, contain RRM domains (Gilbert & Guthrie, 2004; Zenklusen *et al.*, 2001; Zander *et al.*, 2016). Encouragingly, a fruitful collaboration with Dr. Jerónimo Bravo (Instituto de Biomedicina de Valencia (IBV-CSIC), Valencia, Spain) allowed us to confirm that Mip6 binds RNA *in vitro* (Martín-Expósito *et al.*, under revision). The *in vivo* confirmation of this interaction took place during a research internship at the laboratory of Professor Jeffry Corden (Johns Hopkins University Medical School, Baltimore, USA). We performed PAR-CLIP experiments to identify Mip6 targets (Schaughency *et al.*, 2014; Merran & Corden, 2017), which will be discussed thoroughly in the following chapter.

Mip6 Preferentially Binds to Msn2/Msn4-dependent Transcripts *in vivo*

As Mip6 binds to RNA *in vitro* (Martín-Expósito *et al.*, under revision), we explored whether Mip6 also bound RNAs *in vivo* using the PAR-CLIP technique (Schaughency *et al.*, 2014). PAR-CLIP, or photoactivatable-ribonucleoside-enhanced crosslinking and immunoprecipitation, combines the UV crosslinked purification of RNA-protein complexes by the addition of a photoreactive ribonucleoside analog with the isolation and sequencing of crosslinked reads to identify RBP bound sequences (Hafner *et al.*, 2010). Aggregating reads across genes (metagene analysis) revealed a significant enrichment of Mip6 at the 3' end region of coding sequences (**Figure 24A**). This profile is similar to other mRNP-associated factors that bind co-transcriptionally (Santos-Pereira *et al.*, 2014). Analysis of PAR-CLIP reads (**Annex 1**) and gene set enrichment analysis data (GSEA; **Annex 2**) revealed that (in the top 50 Mip6 RNA targets) Mip6 binds to genes expressed at low levels, such as heat shock-induced *HSP12*, *HSP31*, and *HSP10*. This finding may indicate a role for Mip6 in the metabolism of stress-responsive transcripts, as has been recently suggested for Mex67 (Zander *et al.*, 2016). To evaluate this possibility, we repeated the PAR-CLIP experiments after 20 minutes of heat shock treatment at 39°C, conditions

that also affect Mip6 localization. Although the binding pattern of Mip6 at 39°C was similar to that observed at 30°C (**Figure 24A; Annex 1**), we sought to determine whether Mip6 associates preferentially with specific gene classes under these two conditions. For this purpose, we ranked genes by the magnitude of their binding to Mip6 at 30°C and 39°C. To avoid any binding bias caused by the differential expression levels of these genes at 30°C versus 39°C, we normalized binding values by their expression levels under each condition (McKinlay *et al.*, 2011). After this normalization, we examined differential binding of Mip6 at 30°C versus 39°C using NOISeq, a non-parametric approach for the identification of differentially expressed genes from next-generation sequencing count data (Tarazona *et al.*, 2015).

We discovered differential binding for 488 genes: a total of 110 genes displayed higher binding at 30°C whereas we observed preferential binding at 39°C for 378 genes (**Figure 24B; Annex 3**). We also performed GSEA analysis in which specific groups of genes related to heat stress that are under the control of the transcription factors Hsf1 (Amin *et al.*, 1988) (HSE) and Msn2/Msn4 (Martinez-Pastor *et al.*, 1996) (STRE) were also included. These analyses revealed that, while Mip6 binding at 39°C includes binding to genes related to the terms “ribosome” and to “cytoplasmic translation”, Mip6 binding at 30°C displayed significant enrichment of two sets of genes: “ketone metabolism” and “Msn2/Msn4-dependent genes” (**Figure 24C, Annex 4**). Ketone metabolism is linked with the β -oxidation of lipids controlled by Msn2/Msn4 transcription factors suggesting that Mip6 has specificity in the binding of Msn2/Msn4-dependent mRNAs (Rajvanshi *et al.*, 2017). The latter finding suggests that normal, stress-free conditions permit Mip6 association with Msn2/Msn4 targets. Moreover, we found that the percentage enrichment of Msn2/Msn4-dependent genes in Mip6 targets at 30°C to be above 50% (**Figure 24D**). These findings suggest a possible role for Mip6 in the metabolism of Msn2/Msn4 transcripts.

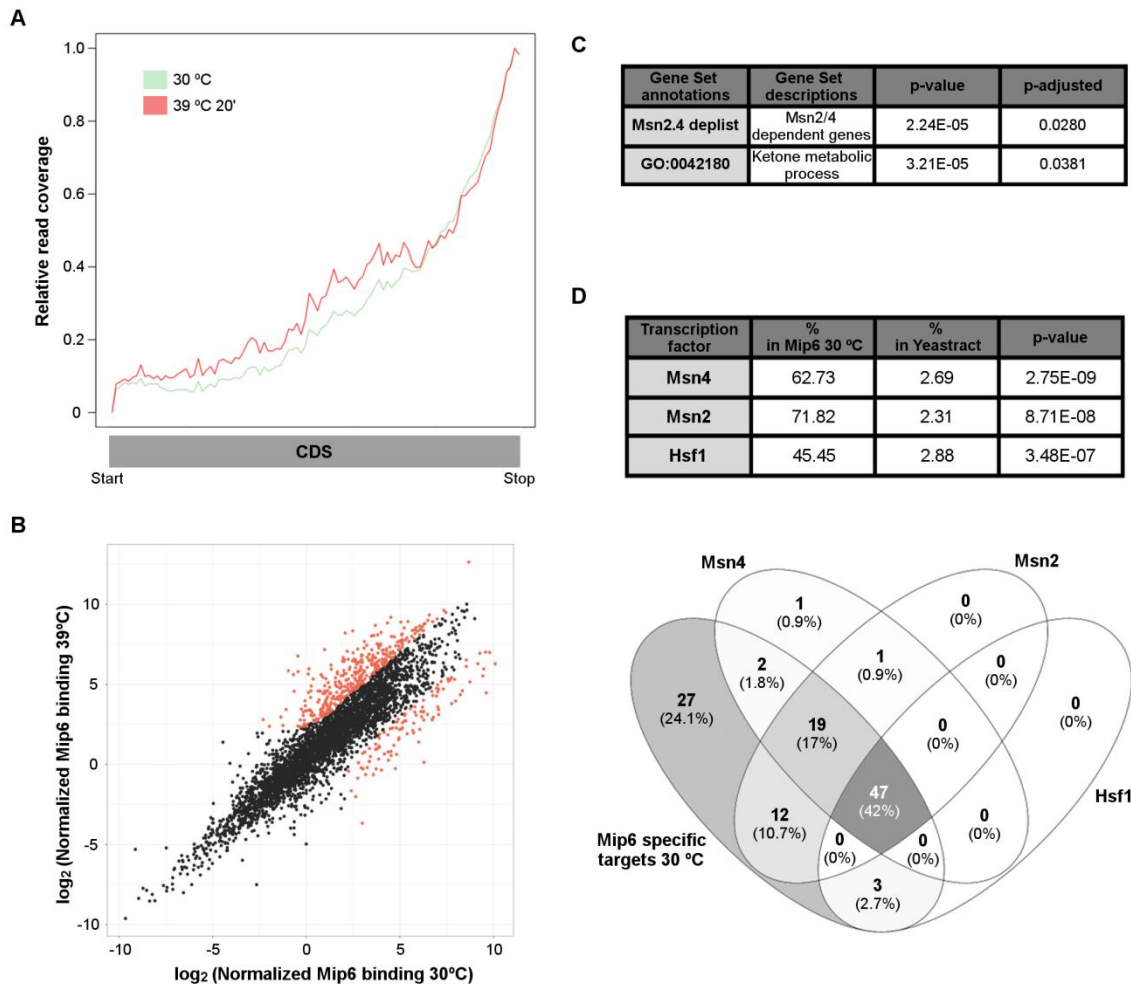


Figure 24. Mip6 Binds Preferentially to Msn2/Msn4-dependent Transcripts *in vivo* (A) Read coverage profiles throughout the coding sequence (CDS) for the binding of Mip6 to RNA at 30°C (green) and after heat shock induction for 20 minutes (red). (B) Scatter plot describing the relationship between the binding of Mip6 to RNA at 30°C and after incubation at 39°C for 20 minutes. Red points mark genes presenting statistically significant differences ($\text{diffNoiseq_rna_prob} > 0.9$; **Annex 2**). (C) Significant GSEA results obtained from 110 genes that present preferential binding at 30°C ($p\text{-adjusted} < 0.05$) (in collaboration with LFL). (D) Table obtained using YEASTRACT (Teixeira *et al.*, 2018) displaying percentages of Mip6 targets significantly enriched at 30°C ranked by the dependence of transcription factors Msn2, Msn4, and Hsf1 (upper) (in collaboration with SRN). Venn diagram representing the intersection of Mip6 specific targets at 30°C controlled by Msn2, Msn4, and Hsf1 transcription factors (lower).

Metabolism of Msn2/Msn4-dependent Transcripts Requires Mip6

The PAR-CLIP results established that Mip6 preferentially associates with Msn2/Msn4-dependent transcripts under normal, non-stress conditions. Given the low expression of these genes at 30°C, it remains possible that Mip6 modulates their expression levels. To assess the role of Mip6 in the expression of specific Msn2/Msn4-dependent genes, we measured the expression levels of

HSP12 and *CTT1* at 25°C in WT and *mip6Δ* cells. We observed the overexpression of both genes in the absence of Mip6 in cells growing at 25°C (Figure 25A). After the induction of stress, we found the maintenance of overexpression (Figure 25A).

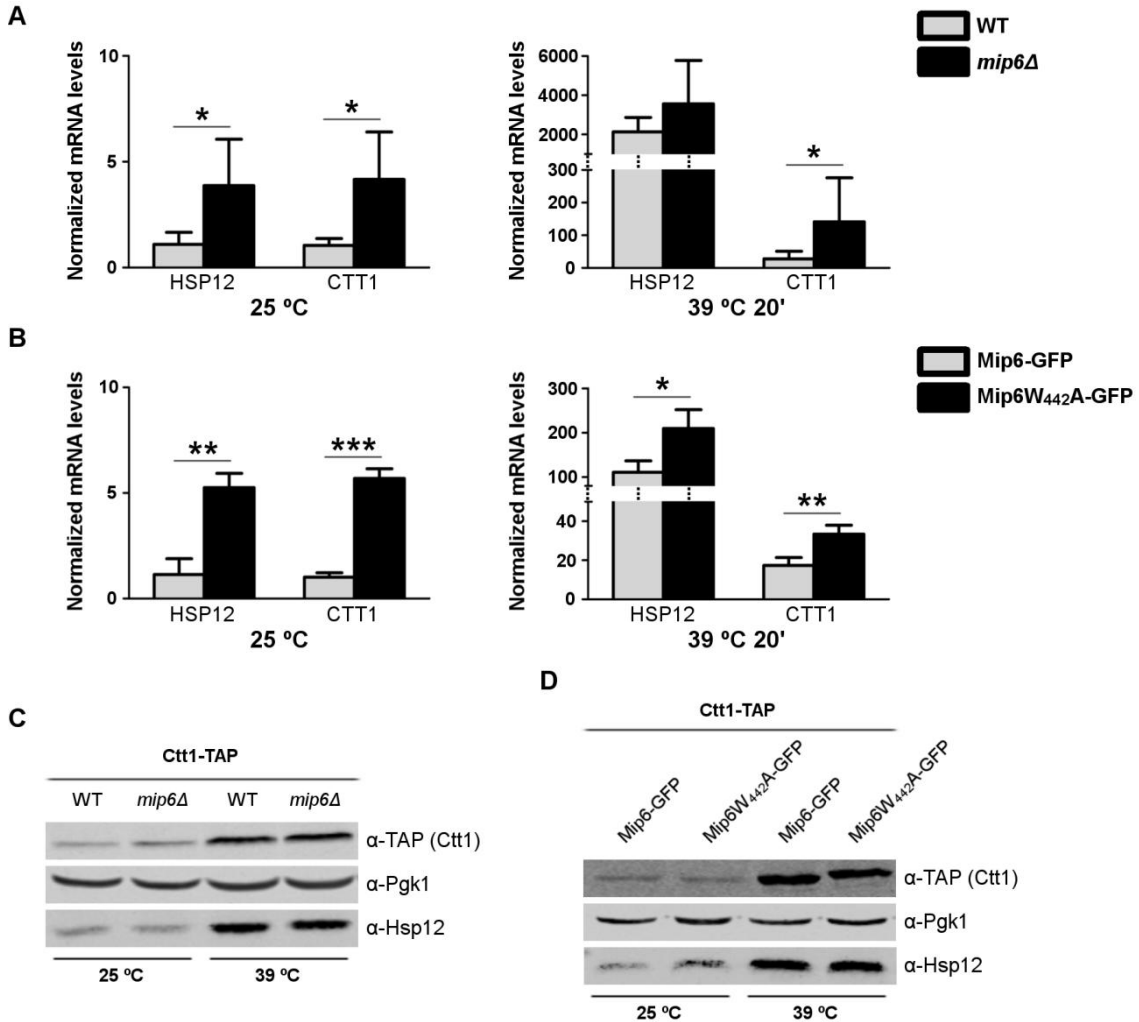


Figure 25. Metabolism of Msn2/Msn4-dependent Transcripts Requires Mip6 (A) *HSP12* and *CTT1* expression measured by qRT-PCR experiments from wild-type (WT) and *mip6Δ* strains. Total RNA obtained from yeast cultures at 25°C and after 20 minutes at 39°C. Values calculated by using $\Delta\Delta Ct$ method (* p-value < 0.05). (B) qRT-PCR experiments from cells expressing Mip6-GFP or Mip6W_{442A}-GFP measuring *HSP12* and *CTT1* mRNA levels (* p-value < 0.05; ** p-value < 0.01; *** p-value < 0.001). (C) Western blot from Ctt1-TAP WT and *mip6Δ* cultures grown at 25°C and after heat shock at 39°C for 20 minutes. Ctt1-TAP, Hsp12, and Pgk1 (as a loading control) detected using specific antibodies. (D) Ctt1-TAP and Hsp12 protein levels from Ctt1-TAP Mip6-GFP and Mip6W_{442A}-GFP cell extracts obtained after growing at 25°C and after 20 minutes at 39°C.

As Mip6 binds to Mex67, we hypothesized that the effect of Mip6 on the expression of Msn2/Msn4 targets might depend on interactions with Mex67. To evaluate this hypothesis, we measured the expression of *HSP12* and *CTT1* in

the Mip6W_{442A} mutant. These results demonstrated the requirement of tryptophan-442 of Mip6 for the correct expression of Msn2/Msn4 targets, suggesting the requirement of the Mip6-Mex67 interaction to maintain wild type levels of Msn2/Msn4 targets (**Figure 25B**).

Interestingly, heightened mRNA levels did not correlate with heightened protein production, as Hsp12 and Ctt1-TAP protein levels remained similar in WT and *mip6Δ* under all conditions tested (**Figure 25C**). We performed similar experiments with the Mip6W_{442A}-GFP mutant and discovered comparable results (**Figure 25D**). These results suggest that the principal function of Mip6 relates to mRNA metabolism, with possible compensation by other mechanisms to regulate protein homeostasis.

Mip6 Collaborates with Rrp6 to Maintain Low Levels of Msn2/Msn4-dependent Transcripts

The higher *HSP12* and *CTT1* expression levels in *mip6Δ* and Mip6W_{442A} mutants may be a consequence of a higher expression rate or a lower degradation rate. Notably, Mex67 adaptor proteins may form part of the nuclear mRNA surveillance mechanisms that prevent the nuclear export of aberrant or unnecessary transcripts through degradation by Rrp6 (Zander & Krebber, 2017). Rrp6 is the nuclear-specific catalytic component of the RNA exosome complex which has 3' → 5' exoribonuclease activity and participates in a multitude of cellular RNA processing and degradation events (Fox *et al.*, 2015; Hilleren *et al.*, 2001). To determine if the increase in *HSP12* and *CTT1* expression depends on Rrp6, we analyzed their levels in *rrp6Δ* and the double mutant *mip6Δrrp6Δ* via qPCR. As shown in **Figure 26A**, we detected a significant enrichment of both *HSP12* and *CTT1* in the *mip6Δrrp6Δ* double mutant at 25°C and 39°C (**Figure 26A**). The synergistic effect observed in the double mutant did not correlate with a genetic interaction between *MIP6* and *RRP6*, as depicted in **Figure 26B**. The additive effect in mRNA levels of the double mutant suggests the involvement of both Mip6 and Rrp6 in the regulation of the expression levels of Msn2/Msn4 targets.

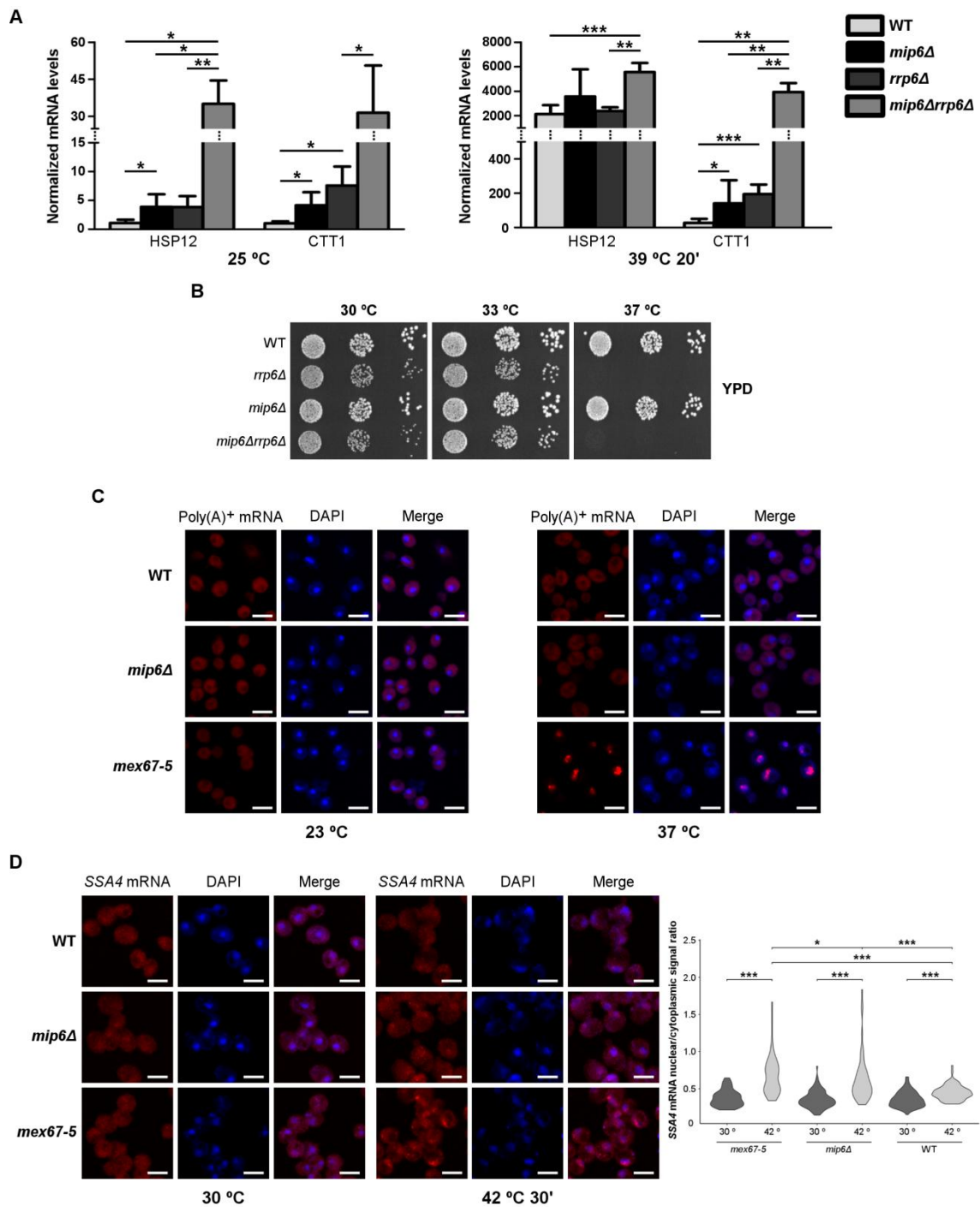


Figure 26. Mip6 Collaborates with Rrp6 to Maintain Low Levels of Msn2/Msn4-dependent Transcripts (A) *HSP12* and *CTT1* mRNA levels from qRT-PCR experiments from wild-type (WT), *mip6Δ*, *rrp6Δ*, and *mip6Δrrp6Δ* yeast strains (* p-value < 0.05; ** p-value < 0.01; *** p-value < 0.001). (B) Growth of wild-type (WT), *mip6Δ*, *rrp6Δ*, and *mip6Δrrp6Δ* mutants. Precultures diluted in liquid YPD medium, and ten-fold dilutions of cells spotted onto YPD plates and incubated for two days at the indicated temperatures. (C) Poly (A) RNA FISH experiments in WT and *mip6Δ* cells at 30°C. DAPI used to stain nuclei. Scale bar: 5 μm (in collaboration with PPG). (D) FISH analysis using a Cy3-labelled specific oligo targeting *SSA4* expression in WT, *mip6Δ* and *mex67-5* cells at 30°C and after incubation at 42°C for 30 minutes. DAPI used to stain nuclei. Scale bar: 5 μm (in collaboration with MGL and JSQ).

Otherwise, incorrectly degraded mRNAs are retained in the nucleus thanks to the activity of surveillance mechanisms (Fasken & Corbett, 2009). We sought to analyze the export of the Msn2/Msn4-dependent mRNA *SSA4* in cells lacking *MIP6*. *In situ* experiments revealed the dispensable nature of Mip6 for the correct mRNA export of bulk poly(A) RNA (**Figure 26C**). In contrast, deletion of *MIP6* lowered the export efficiency of *SSA4*, an Msn2/Msn4 and Hsf1 target that depends on Mex67 for transport (Jensen *et al.*, 2001), at 42°C when compared to WT (**Figure 26D**). We conclude that Mip6 is also required for the export of the Msn2/Msn4 target *SSA4* in yeast cells.

Msn2/Msn4 Disruption Provokes Mip6 Nuclear Retention Under Stress

To assess the effect of Msn2/Msn4 in Mip6 localization, we performed Mip6-GFP confocal experiments using strains that combine the deletion of *MSN2*, *MSN4*, and *MIP6* (Zapater *et al.*, 2007). We observed that Mip6 localization is not affected under standard growth conditions (**Figure 27A**); however, after heat shock at 39°C for 20 minutes, Mip6 displayed partial retention in the nucleus (**Figure 27A**), suggesting that Msn2/Msn4 function affects Mip6 shuttling under stress. Dot spot assays revealed a lack of genetic interaction between Msn2/Msn4 and Mip6 in response to various temperatures (**Figure 27B**).

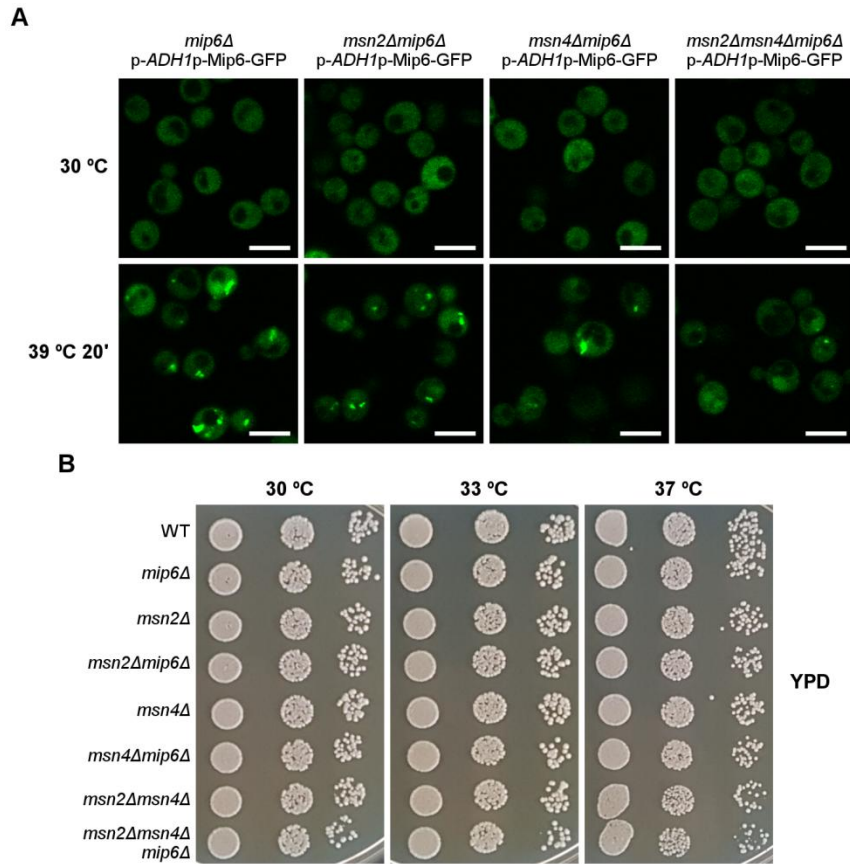


Figure 27. Msn2/Msn4 Disruption Provokes Mip6 Nuclear Retention Under Stressful Conditions (A) Mip6-GFP localization in Msn2/Msn4 mutants under standard conditions and after 20 minutes heat shock at 39°C. Scale bar: 5 μm. (B) Dot spot assays of WT, *msn2Δ*, *msn4Δ* and *msn2Δmsn4Δ* cells combined with *MIP6* deletion. Images obtained after two days growing at indicated temperatures.

CHAPTER 3

*Study of Mip6 Elements and the Post-translational
Modifications Important for Localization*

Mip6 functions in the transport and metabolism of specific mRNAs and contains four RRMs that can bind to RNA (Afroz *et al.*, 2015); however, how these domains impact Mip6 transport remains unknown. In Chapter 1, we discovered the requirement of the Mip6 RRM4 for the direct interaction with Mex67 and the proper shuttling of Mip6. However, since the phenotype of nuclear retention was not evident for all cells, we speculate that other transport Mip6 mechanisms exist.

Importins/exportins and the presence of NES/NLS sequences (Dunn *et al.*, 2005; Maurer *et al.*, 2001) or interactions with other proteins or complexes involved in RNA transport may play a role (Suntharalingam *et al.*, 2004; Fasken *et al.*, 2008). In both cases, post-translational modifications, such as ubiquitination, methylation or phosphorylation, may also play essential roles in Mip6 transport as is the case for other RNA binding proteins (Gwizdek *et al.*, 2006; Yu *et al.*, 2004; Lund *et al.*, 2008).

In this chapter, we studied the different mechanisms implicated in the transport of Mip6, focusing on the characterization of Mip6 domains and possible post-translational modification.

Deletion of Mip6 RRMs Differentially Affect Mip6 Localization

To determine the effect of each RRM on Mip6 localization, we created various deletion mutants for the four RRMs present in the Mip6 protein. As a first conclusion, deletion of any RRM drastically augmented the nuclear presence of Mip6 at both at 30°C and 39°C (**Figure 28A**). Notably, deletion of RRM1 or RRM2 leads to the Mip6 nuclear retention in almost all cells at both conditions (around 80% of cells), while Mip6 Δ RRM4 displayed partial nuclear retention at 30°C (as indicated in **Figure 18B**) and after heat shock (**Figure 28A**). We observed lower nuclear retention following deletion of RRM3 and culture at 30°C; however, the Mip6 Δ RRM3 nuclear signal increased following heat shock (**Figure 28A**). The impairment in Mip6 localization did not lead to adverse effects on cell growth, as shown by dot spot assays (**Figure 28B**). Overall, these results suggest that the presence and action of each RRM differentially affect the proper localization and function of the Mip6 protein.

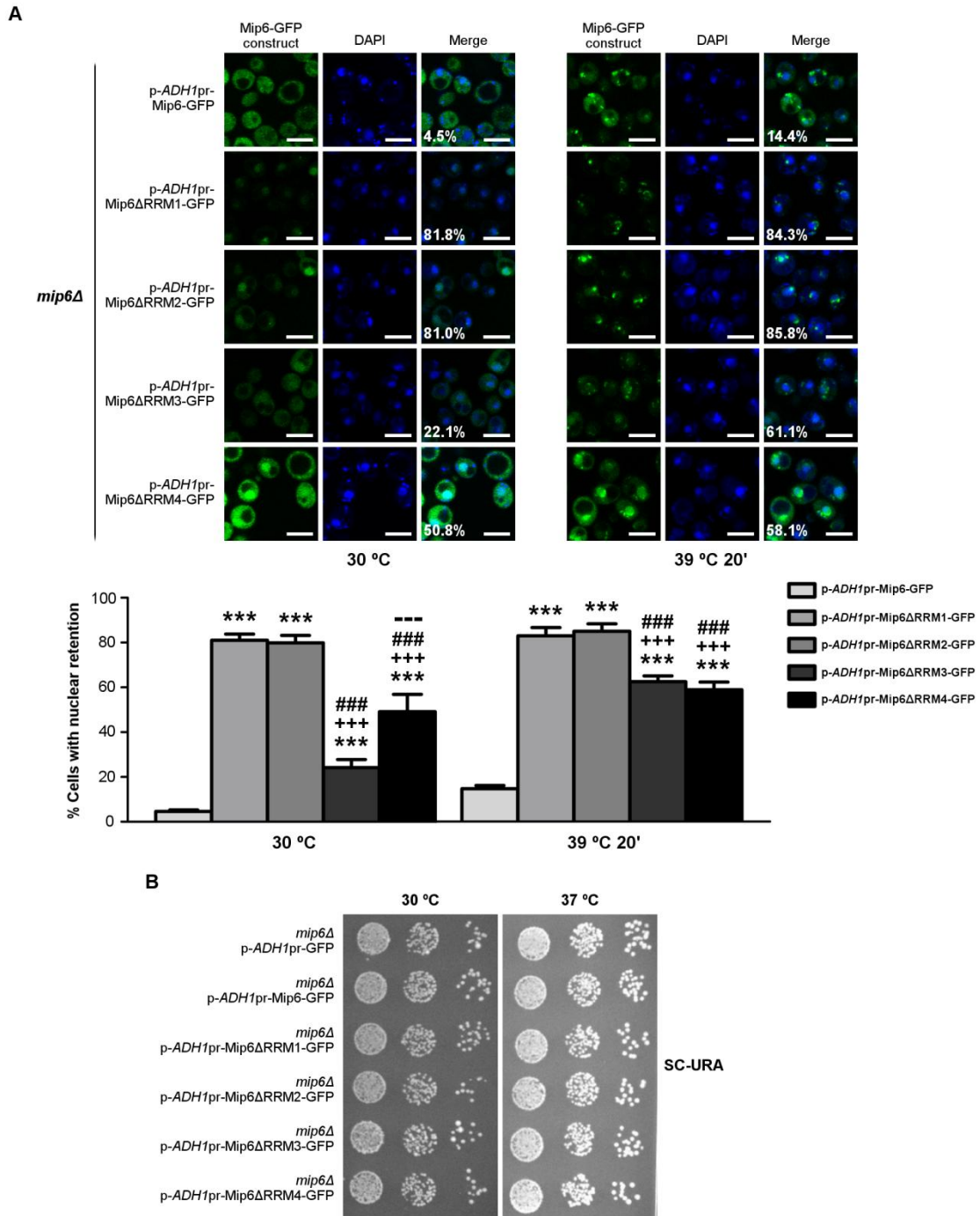


Figure 28. Deletion of Mip6 RRM s Differentially Affects Mip6 localization. (A) Confocal experiments from *mip6Δ* transformed strains grown at 30°C and after heat shock induction at 39°C for 20 minutes. Nuclei stained with DAPI. Scale bar: 5 μm (up). Bar graphs represent differences between Mip6 and Mip6ΔRRM mutants. Significant different comparisons versus Mip6ΔRRM1 (*), Mip6ΔRRM2 (+), Mip6ΔRRM3 (#), and Mip6ΔRRM4 (-) shown (p-values < 0.001; binomial test). (B) Growth assays performed in SC-URA plates at 30°C and 37°C from *mip6Δ* cells transformed with the indicated plasmids. Images obtained after two days.

Mip6 RRM4 Contains a Putative Nuclear Export Signal

We demonstrated that the transport of Mip6 partially depends on its interaction with Mex67, the presence of all RRMs, and components of the mRNA transport machinery.

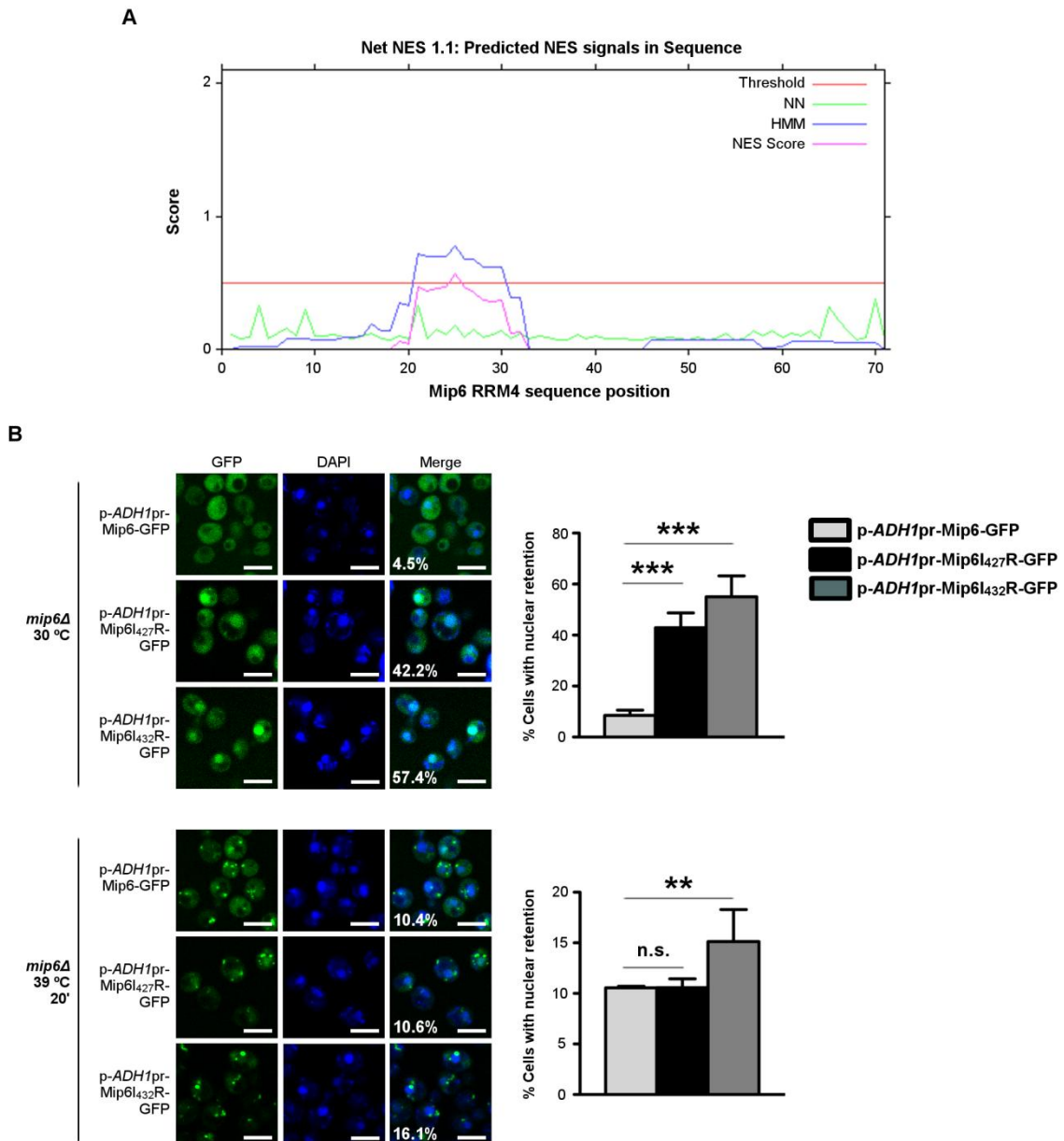


Figure 29. Mip6 RRM4 Contains a Putative Nuclear Export Signal (A) Depiction of the Mip6 RRM4 putative NES sequence probabilities by NetNES 1.1 Server (La Cour *et al.*, 2004). NN: Neural Networks algorithms, HMM: Hidden Markov Models. (B) Confocal images displaying Mip6-GFP NES single mutants grown at 30°C and after 20 minutes at 39°C. DAPI staining marks nuclei. Scale bar: 5 μm (left). Bar graphs represent the percentage of cells with Mip6 nuclear retention (** p-value < 0.01; *** p-value < 0.001; binomial test).

However, further mechanisms that allow Mip6 to leave the nucleus may exist, such as the presence of a putative nuclear export signal (NES) (Murphy *et al.*, 2004; Shirley *et al.*, 1998; Li and Yen, 2002). Interestingly, we found a predicted NES in RRM4 of Mip6, between positions 427 and 434, using the NetNES 1.1 server (La Cour *et al.*, 2004) (**Figure 29A**). This putative NES sequence (I₄₂₇RFSEIKI₄₃₄) fits with the unconventional class 2 hydrophobic spacing (I₄₂₇-X-F-XX-I-X-I₄₃₄) described by Kosugi *et al.*, 2008. To determine the functionality of this sequence, we created mutants by replacing two hydrophobic isoleucine residues of the putative NES with positively charged arginines (I₄₂₇R and I₄₃₂R). As shown in **Figure 29B**, mutations in both I427 and I432 produced the partial nuclear retention of Mip6 under standard growth conditions; however, when exposed to heat shock, the I₄₃₂R mutation partially affected Mip6 export (**Figure 29B**). This phenotype suggests the requirement of the Mip6 NES sequence for Mip6 transport from the nucleus to the cytoplasm, primarily under optimal growth conditions.

Crm1/Xpo1 Exportin Does not Mediate Mip6-Nuclear Export Signal-dependent Export

Proteins containing NES sequences are often transported by the Crm1/Xpo1 exportin (Kutay and Güttinger, 2005; Stade *et al.*, 1997). To verify if the export of Mip6 depends on Crm1/Xpo1 activity, we performed localization experiments using the thermosensitive strain *xpo1-1* (Brune *et al.*, 2005). This strain suffers from a defect in Crm1/Xpo1 activity when incubated at high temperatures (such as 37°C) for short periods (Peiró-Chova and Estruch, 2009; Mirón-García *et al.*, 2013). We performed confocal experiments using *lwr1* control plasmids as a positive control (Peiró-Chova and Estruch, 2009). Following exposure of cells to 37°C for 1 hour, we failed to see an effect on Mip6 in the *xpo1-1* mutant; however, we observed nuclear retention in the *lwr1* control (**Figure 30A**). We also confirmed that the Mip6 I₄₃₂R NES mutant exhibited no differences in localization between the *xpo1-1* mutant and the XPO1 control strain (**Figure 30B**). These results suggest that Mip6 does not depend on the Crm1/Xpo1 export pathway.

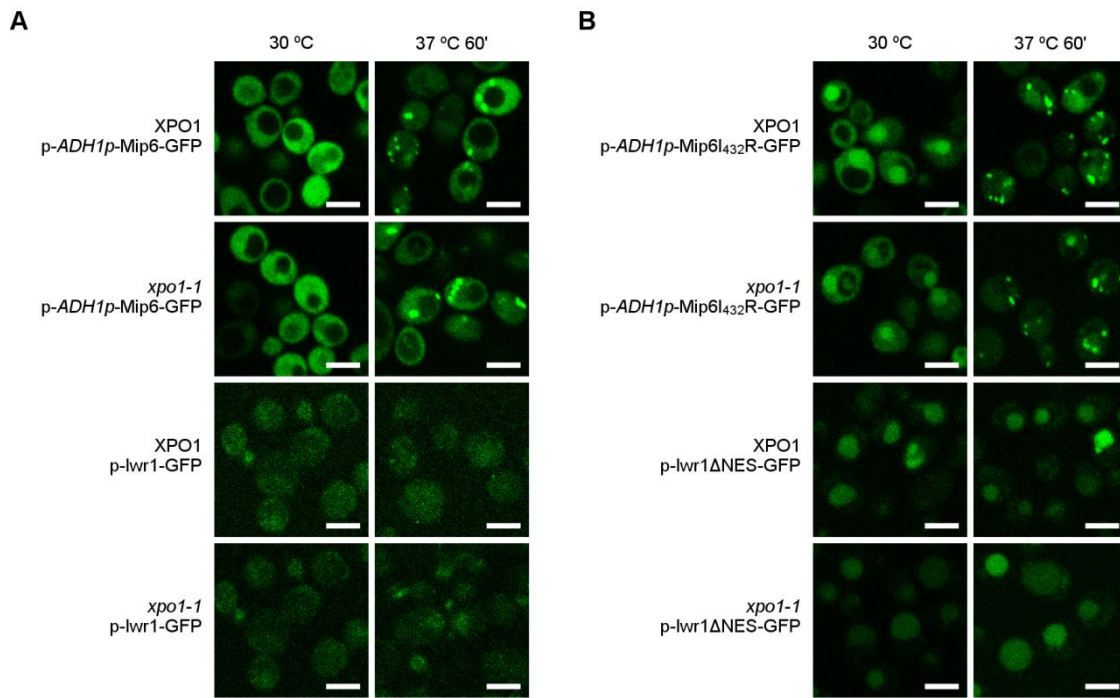


Figure 30. Crm1/Xpo1 Exportin Does not Mediate Mip6 NES-dependent Export (A) Subcellular localization of Mip6-GFP and lwr1-GFP in XPO1 and *xpo1-1* transformed strains grown at 30°C and after 1 hour at 37°C. Scale bar: 5 μm. (B) Same experiments as in (A) using NES mutant versions of Mip6 and lwr1 plasmids.

Msn5 Karyopherin Regulates Nuclear Export Signal-dependent Mip6 Export

Other than Crm1/Xpo1, there exist other proteins and complexes involved in nuclear protein transport. An interesting option was the Msn5 karyopherin, which is involved in the transport of Msn2/Msn4 (Görner *et al.*, 2002; Kaffman *et al.*, 1998). The activity of the Msn5 protein also serves as an alternative export pathway for proteins with unconventional NES sequences (Bakhrat *et al.*, 2008; DeVit and Johnston, 1999). To determine the relation between Mip6 transport and Msn5, we performed Mip6 localization experiments using the *msn5Δ* mutant (Alepez *et al.*, 1999) under standard and stressful conditions. We discovered the partial retention of Mip6 in the nucleus in *msn5Δ* mutant under both conditions (**Figure 31A**). The comparison of Mip6 with Mip6^{I427R} NES mutant established the lack of difference in their localization profiles following depletion of Msn5 (**Figure 31B**). Our earlier results demonstrated that Mip6 RRM4 interacts directly with Mex67. As the NES sequence localizes to

near to the critical residue mediating Mex67 interaction (W442), we studied whether NES mutants affected the Mip6-Mex67 interaction. As shown in the IP fractions, Mip6 NES mutants did not copurify with Mex67 as Mip6 did (**Figure 31C**). To assess the combined effect on Mip6 localization, we transformed the *msn5Δ* strain with Mip6ΔRRM4 and Mip6W₄₄₂A plasmids; two mutants that mitigate any interaction with Mex67. As expected, the Mip6ΔRRM4 mutant presented no accumulative effect on Mip6 nuclear retention (**Figure 31D upper panels**); however, in the W₄₄₂A mutant, we observed an increment in Mip6 nuclear signal in the *msn5Δ* strain (**Figure 31D lower panels**). These differences were less pronounced upon stress. These results indicate that Msn5-dependent export occurs under optimal growth conditions. We performed further localization experiments to determine the effect of RRM mutants in the *msn5Δ* mutant. We observed that enrichment in a nuclear signal appeared in the Mip6ΔRRM3 mutant, similar to Mip6ΔRRM4 and Mip6W₄₄₂A (**Figure 31E**). Mip6ΔRRM1 and Mip6ΔRRM2 mutants displayed no increase in their nuclear signal, possibly due to their initial severe phenotype (**Figure 31E**). Owing to the presence of these phenotypes, we performed growth assays to determine any Mip6-Msn5 genetic interaction. Investigating the *msn5Δmip6Δ* strain by dot spot assays revealed observed no effect in cell growth under both standard and stressful conditions (**Figure 31F**).

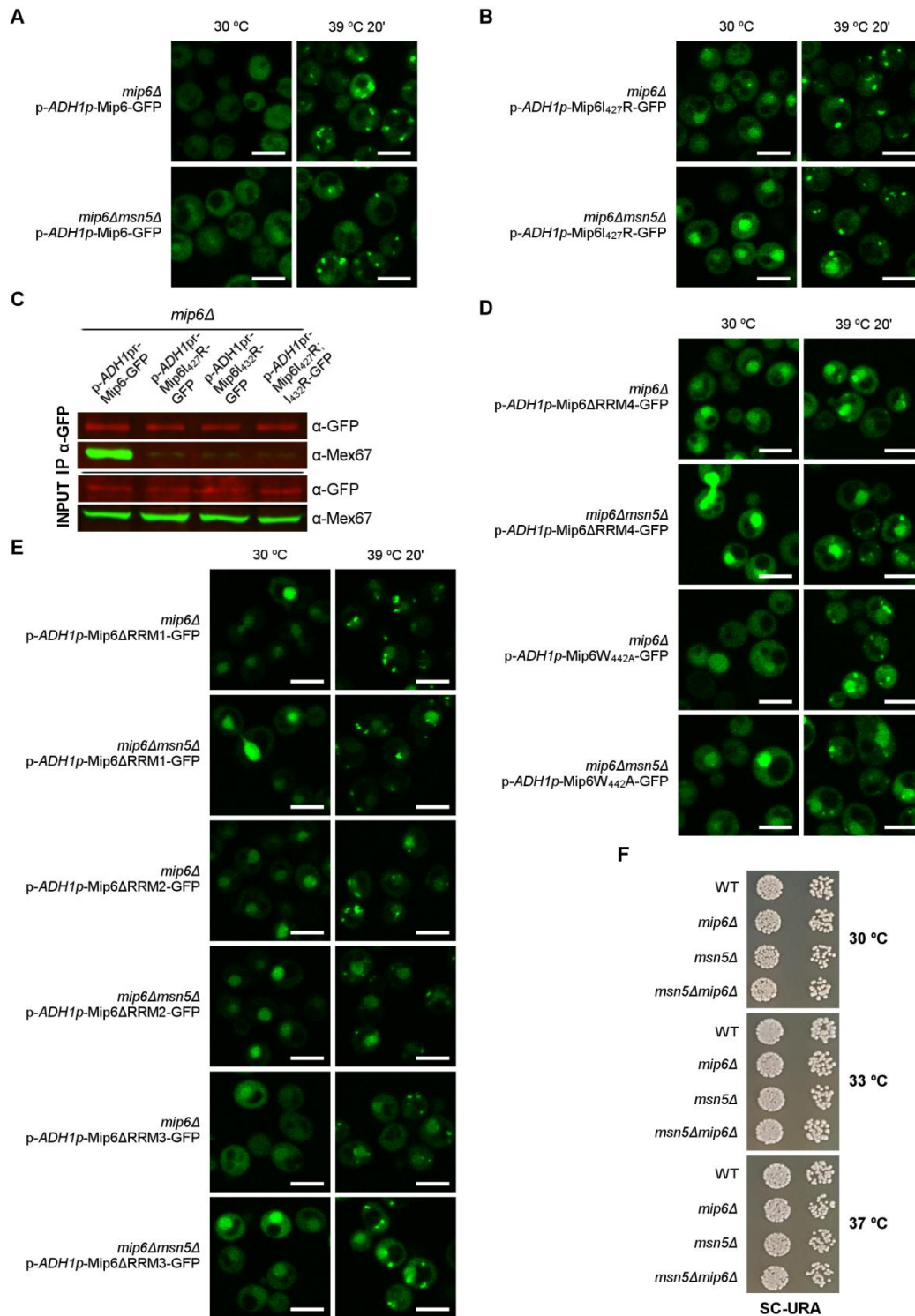


Figure 31. Msn5 Karyopherin Regulates NES-dependent Mip6 Export (A) Localization of Mip6-GFP in *mip6Δ* and *msn5Δmip6Δ* transformed strains at 30°C and after a 39°C heat shock treatment of 20 minutes. Scale bar: 5 μm. (B) Same localization experiments as in (A) using the Mip6L427R NES mutant. (C) Pull-down experiments from *mip6Δ* cells expressing Mip6-GFP constructs. Mex67 and GFP-tagged proteins detected before (INPUT) and after (IP) purification with the indicated antibodies by Western blotting (in collaboration with ATC). (D) and (E) Confocal experiments from *mip6Δ* and *mip6Δmsn5Δ* transformed strains with Mip6ΔRRM4 and W442A mutants (D) or transformed with Mip6ΔRRM1, Mip6ΔRRM2 and Mip6ΔRRM3 mutants (E). Scale bar: 5 μm. (F) Dot spot assays of WT, *mip6Δ*, *msn5Δ*, and *msn5Δmip6Δ* strains grown at 30°C and placed for two days at 30°C, 33°C, and 37°C.

The Hmt1 Methyltransferase Collaborates in Mip6 Shuttling in Response to Stress

Post-translational modification represents a common mechanism to regulate the transport of proteins (Lund *et al.*, 2008; Gwizdek *et al.*, 2006). To assess if such modifications affected Mip6 shuttling, we performed localization experiments with strains lacking enzymes linked to various post-translational modifications. We selected i) the protein kinase Ak1, involved in endocytosis and detected as a Mip6 modifier in a global phosphorylation assay (Henry *et al.*, 2003; Ptacek *et al.*, 2005), ii) the kinase Rim15, mediates the activation of Msn2/4 and Hsf1 transcription factors and meiosis progression (Lee *et al.*, 2013; Vidan and Mitchell, 1997); iii) the ubiquitin ligase Tom1, implicated in transcriptional regulation (SAGA) and mRNA export (Nab2) (Saleh *et al.*, 1998; Duncan *et al.*, 2000); and iv) the methyltransferase Hmt1, modifies some RBPs (such as Nab2, Hrp1, and Npl3) and influences function and shuttling (Green *et al.*, 2002; Shen *et al.*, 1998; Henry and Silver, 1996). As depicted in **Figure 32**, phosphorylating and ubiquitin-ligating proteins had no effect on Mip6 shuttling. However, we observed the partial nuclear retention of Mip6 under heat shock situations in an *hmt1* Δ strain (**Figure 32**). This phenotype suggests the implication of the Hmt1 methyltransferase in Mip6 transport under stressful conditions.

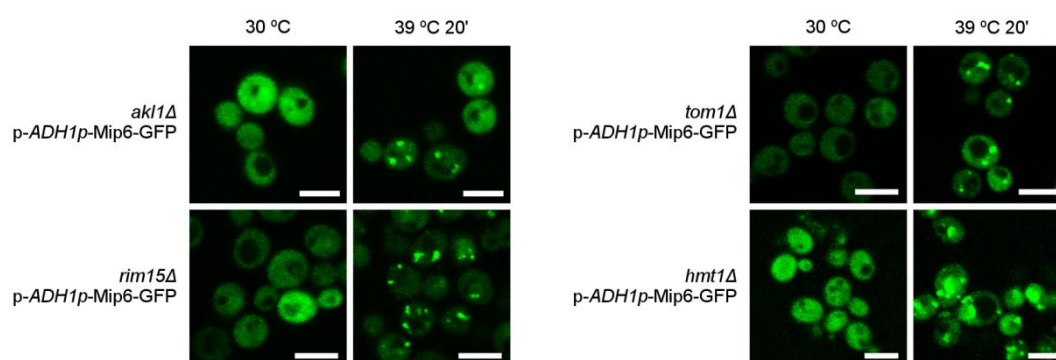


Figure 32. The Hmt1 Methyltransferase Collaborates in Mip6 Shuttling in Response to Stress. Mip6-GFP confocal experiments at indicated strains after growing at 30°C and heat shock treated for 20 minutes at 39°C. Scale bar: 5 μ m.

DISCUSSION

mRNA metabolism is an essential process that allows for the proper growth and survival of eukaryotic cells. The coordinated action of multiple factors operating at the various stages of the RNA life cycle serves as a mechanism to regulate RNA homeostasis. RNA Binding Proteins (RBPs) represent just a fraction of the crucial factors required for the control of RNA metabolism. While studies have made significant advances regarding the contribution of RBPs to each of the steps involved in gene expression (Glisovic *et al.*, 2008; Hogan *et al.*, 2008; Scherrer *et al.*, 2010), the contributions of certain RBPs such as Mip6 remain poorly understood.

In this study, we explored the role played by Mip6 in mRNA metabolism, especially in the context of Msn2/Msn4-dependent transcripts.

Characterization of the Mip6 and Mex67 Interaction: Structural and Functional Insights

Yeast two-hybrid assays revealed an interaction between Mex67 and Mip6 through their C-terminal regions (Segref *et al.*, 1997); however, details regarding Mex67-Mip6 functional interaction and a possible role in mRNA metabolism remained scarce. While cell growth requires Mex67 protein functions, the deletion of the C-terminal domain is not lethal to the cell, but instead influences RNA export (Strässer *et al.*, 2000; Terry and Wentz, 2007; Faza *et al.*, 2012). The Mex67 C-terminal domain interacts with Sac3, one of the partners of Sus1 in the NPC associated complex TREX-2 (Dimitrova *et al.*, 2015; Fischer *et al.*, 2002; Lei *et al.*, 2003; Rodríguez-Navarro *et al.*, 2004). The interaction of Mip6 with the Mex67 C-terminal, and the likely indirect contact of Mip6 with Sac3, Dbp5, and Sus1 (**Figure 20**), might occur near to the NPC. This might explain why we discovered Mip6 co-precipitating with Sus1-TAP following TAP immunoprecipitation using a mutant strain that promotes the binding of Sus1 with TREX-2 and the NPC, as occurs in the *ubp8Δ* strain (Martín-Expósito *et al.*, under revision; Pascual-García *et al.*, 2008).

The UBA domain present in the Mex67 C-terminal has particular relevance and has been implicated in the interaction of Mex67 with

nucleoporins and ubiquitinated proteins such as the THO/TREX subunit Hpr1 (Strässer *et al.*, 2000; Gwizdek *et al.*, 2006; Hobeika *et al.*, 2007; Hobeika *et al.*, 2009). The deletion of the UBA domain produces a defect in global mRNA export and affects Mex67 recruitment to transcribed genes (Gwizdek *et al.*, 2006). *In vitro* experiments have described the interaction of Mip6 with the Mex67 UBA domain (Martín-Expósito *et al.*, under revision). This interaction suggests that Mip6 may become ubiquitylated and recognized by Mex67, as occurs for Hpr1. The ubiquitylation of Hpr1 allows the interaction with Mex67 UBA and avoids degradation by the ubiquitin-proteasome system (UPS) (Gwizdek *et al.*, 2005). However, heat shock conditions disrupt the stabilization of Mex67-Hpr1 complex producing the release of Mex67, which then would interact with other proteins, and allowing degradation of Hpr1 by the UPS. The interaction of Mex67 with ubiquitylated Hpr1 aids mRNA export; the UBA domain of Mex67 also interacts *in vitro* with Mip6 and nucleoporins (Nada Mohamad thesis), as does Hpr1. These findings suggest the existence of putative competitiveness in Mex67 UBA binding between Hpr1 and Mip6. Protein abundance and/or growth conditions may influence this situation. First, the Hpr1 protein (≈ 1400 molecules/cell) is more abundant than Mip6, which itself is one of the least-expressed proteins in *Saccharomyces cerevisiae* with only around 100 copies per cell in YPD media (Ghaemmaghami *et al.*, 2003; Ho *et al.*, 2018), showing a preferential binding of Mex67 with Hpr1. However, as mentioned previously, stress conditions impair the Mex67-Hpr1 interaction that can promote Mip6 binding with the Mex67 UBA. This competition could modulate Mex67 UBA interactions with different proteins to regulate mRNA transport under specific conditions (Batisse *et al.*, 2009; Hackmann *et al.*, 2011; Chatterjee *et al.*, 2017). We believe that the study of the Mip6-Mex67 interaction in cells lacking *HPR1* may be of specific interest.

The forth RNA recognition motif (RRM4) of Mip6 directly binds to the Mex67 UBA domain (**Figure 10**). Although RRM4s are well known for their RNA-binding properties, they serve as dual recognition motifs that interact with proteins and function as protein recognition modules with no RNA binding activity (Muto & Yokoyama, 2012; Martínez-Lumbreras *et al.*, 2016; Safaei *et al.*, 2012; Santiveri *et al.*, 2011). In other cases, RRM4s that interact with proteins

employ the opposite side of the RNA interface, allowing for the coordinated and simultaneous interaction with both protein and RNA (Safaei *et al.*, 2012). In the case of Mip6, the interaction with Mex67 UBA avoids the binding of the RRM4 to RNA, perhaps promoting a different role in these conditions (**Figure 10**). Interestingly, the point mutation W₄₄₂A disrupts the interaction of Mip6 RRM4 with Mex67 UBA but not with RNA (Martín-Expósito *et al.*, under revision). This mutation leads to a growth defect phenotype at high temperatures, similar to the mutant *mex67-5mip6Δ*, which could indicate the greater importance of the Mex67-Mip6 interaction under heat shock conditions (**Figure 13** and **Figure 19**). Apart from the Mex67 and RNA interaction, another fascinating feature of the Mip6 RRM4 is the presence of a putative unconventional NES (**Figure 29**; Kosugi *et al.*, 2008). The complexity of the possible interactions that occur within the Mip6 RRM4 suggests that this domain would mediate the specific role of Mip6 in mRNA metabolism. As Mip6 possesses four RRMs, RNA binding would be carried out mostly by RRM1-3, with the first two RRMs displaying higher *in vitro* RNA binding affinity when compared to RRM3 (**Figure 10**). Mip6 RRM1 and RRM2 can bind to RNA as a tandem, in a comparable manner to the Pab1 RRM1-RRM2 (Sachs *et al.*, 1987; Melamed *et al.*, 2013). This interaction can then produce conformational changes in the Mip6 structure allowing the exposure of RRM4 for protein or RNA interaction. Mip6 can also undergo post-translational modifications that affect Mex67 interaction. Phosphorylation, methylation, or ubiquitylation, can affect the structure and function of RBPs (Carmody *et al.*, 2010; Low *et al.*, 2016; Iglesias *et al.*, 2010). Phosphorylation has particular relevance to this study given the identification of Mip6 as a possible target of Akl1 (Ptacek *et al.*, 2005), a serine/threonine kinase involved in cytoskeleton organization and membrane stress (Henry *et al.*, 2003; Takahashi *et al.*, 2006). Additionally, the possible methylation of arginine residues on Mip6 by the Hmt1 methyltransferase could play a role and will be discussed in detail at a later point (**Figure 32**).

Mip6 is a Shuttling Protein that Accumulates in Stress Granules under Stressful Conditions

As described in this thesis, Mip6 is a shuttling RBP that travels between the nucleus and the cytoplasm through the NPC (**Figure 16**). Although Mip6 localization possesses similarities to the Pab1 subcellular signal (Brune *et al.*, 2005), it differs from other RBPs such as the Mex67 adaptor proteins Nab2, Npl3 or Yra1, which remain mostly nuclear (Suntharalingam *et al.*, 2004; Strässer and Hurt, 2000). As demonstrated in **Figure 16**, Mex67 inactivation for 2 hours at 39°C leads to nuclear retention of Mip6 in almost 50% of cells, indicating that Mex67 functionality affects Mip6 shuttling. Moreover, the deletion of the Mex67 UBA domain, which prevents direct interaction with Mip6 RRM4, resulted in a similar phenotype (**Figure 17**). However, mutations in *MEX67*, such as *mex67-5* or Mex67 Δ UBA mutants, produce defective mRNA export (Segref *et al.*, 1997; Gwizdek *et al.*, 2006). Thus, although our results suggest that Mex67 regulates directly Mip6 transport, we failed to distinguish between an indirect effect of Mex67 mutation on mRNA export or a direct consequence of impeding the Mip6-Mex67 interaction. Of note, when we assessed localization of the Mip6 Δ RRM4 mutant, we observed a similar nuclear retention profile for Mip6 as in Mex67 mutants (**Figure 18**). Additionally, the Mip6 tryptophan mutant, which affects direct interaction with Mex67, displays lower nuclear retention when compared to the Mip6 RRM4 mutation under optimal growth conditions (**Figure 19**). These results suggest that there exist other export pathways for Mip6, including an interaction with RNA or other factors (**Figure 33**).

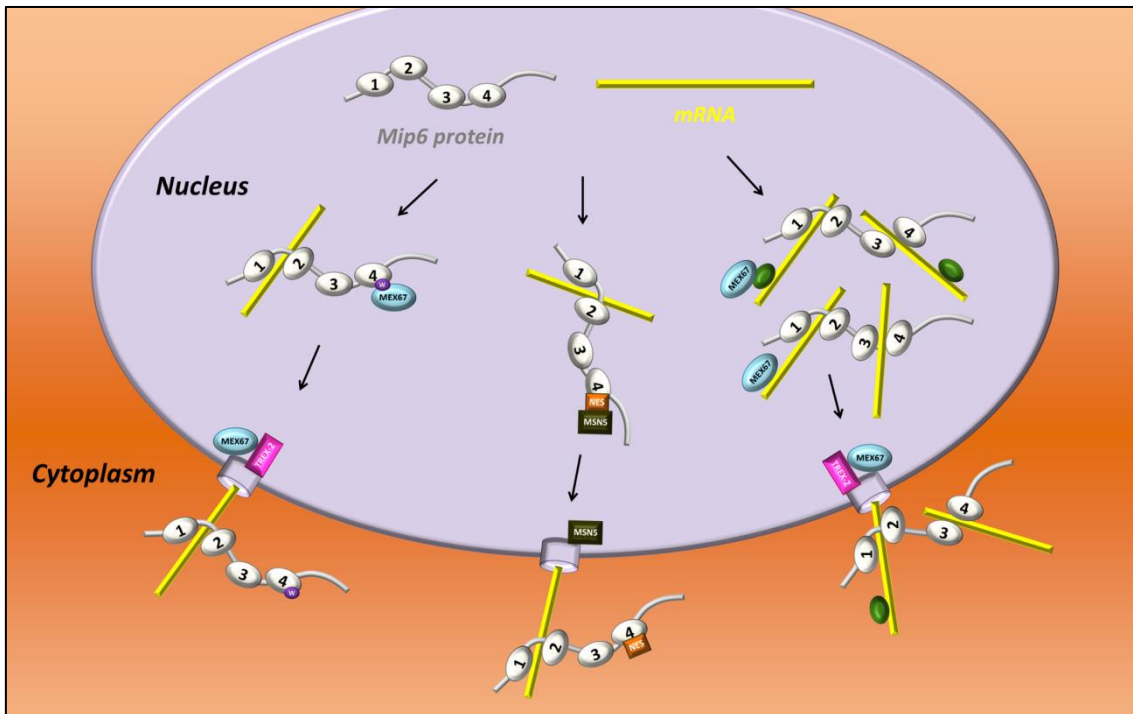


Figure 33. Possible Model for Mip6 Role in mRNA Export. The export of Mip6 requires the interaction of the RRM1-RRM2 tandem with mRNA. Once this tandem binds to RNA, Mip6 export depends on the interaction of Mip6 RRM4 with its partners. If the RRM4 binds to RNA, alone or together with RRM3 as another tandem, Mip6 undergoes exportation in a non-specific manner alongside other messenger ribonucleoproteins (mRNPs). The interaction of Mip6 RRM4 represents an additional possibility; specifically, through the nuclear export signal (NES) and the Msn5 karyopherin. The direct interaction between the Mip6 RRM4 and the Mex67 UBA domain through the Mip6 tryptophan remains as a third option.

Specific RRM-containing proteins mislocalize following disruption to their RNA binding domain, highlighting the importance of RNA-protein interaction in transport (Dunn *et al.*, 2005; Lee *et al.*, 1996). Notably, Mip6 mutants lacking RRMs lead to the nuclear retention of Mip6 constructs, with retention in nuclear dots that may colocalize with the NPC in some cases (**Figure 28**). This hypothetical NPC accumulation phenotype suggests that Mip6 may be targeted to the NPC but lacks the required signal for export. The most likely explanation is that the formation of the Mip6-RNA complex is needed before passing through the NPC by the interaction with Mex67 through RRM4. Another fascinating feature of the Mip6 protein is the presence of a putative unconventional NES within the RRM4 domain (Kosugi *et al.*, 2008). Certain RBPs also contain these sequences that serve as an alternative means to leave the nucleus (Dunn *et al.*, 2005; Kirli *et al.*, 2015). The mutation of the putative

Mip6 NES sequence leads to Mip6 nuclear retention (**Figure 29**). We demonstrated that transport is not mediated by the conventional NES cargo pathway, namely, through the Crm1/Xpo1 exportin (**Figure 30**). Proteins with unconventional NES undergo export in a Crm1/Xpo1-independent manner through an interaction with the Msn5 karyopherin (Yoshida and Blobel, 2001; Taberner *et al.*, 2012). Msn5 is the importin/exportin responsible for the transport of the transcription factors Msn2 and Msn4 (Chi *et al.*, 2001; Sadeh *et al.*, 2011). Msn5 is also necessary for the export of proteins such as the Mig1 glucose repressor and the Ho endonuclease (DeVit and Johnston, 1999; Bakhrat *et al.*, 2008). As depicted in **Figure 31**, Msn5 deletion affects the transport of Mip6 and, as described in this work, post-translational modifications can also affect Mip6 localization, such as those prompted by the activity of the methyltransferase Hmt1. Studies have indicated that methylation affects the localization of different RBPs, including as Nab2, Npl3, or Hpr1 (Henry and Silver, 1996; Shen *et al.*, 1998; Green *et al.*, 2002). However, other RBPs are not affected by Hmt1 function, such as Mex67 or Gbp2 (Windgassen and Krebber, 2003; Messier *et al.*, 2013). We demonstrated that *HMT1* disruption provokes the nuclear retention of Mip6 under heat shock conditions (**Figure 32**). Both direct and indirect effects explain this phenotype. Hmt1 controls the expression of genes that indirectly affect Mip6 export (Yu *et al.*, 2004). The direct methylation of the Mip6 protein under these conditions represents another possibility; however, Mip6 methylation has yet to be described, and further work with Hmt1 will be required to answer related questions.

In summary, our results demonstrate the control of Mip6 transport via various export routes that vary during cell growth.

Several stressors drastically affect Mip6 localization (**Figure 21**). Our results demonstrate that Mip6 accumulates in cytoplasmic dots with evidence of colocalization with factors present in both stress granules (SGs) and p-bodies (PBs), cytoplasmic membrane-less structures produced by the accumulation of ribonucleoparticles (RNPs) and other RNA metabolism proteins when cells are exposed to non-optimal conditions (Teixeira and Parker, 2007; Buchan and Parker, 2009; Guzikowski *et al.*, 2019). These structures play roles in the storage and/or degradation of bulk mRNAs that are not needed under stress

(Decker and Parker, 2012). We observed the presence of Mip6 in both types of granules, as demonstrated by our colocalization experiments and previous works (**Figure 21**; Bolognesi *et al.*, 2016). While *GAL1*-mediated overexpression of Mip6 leads to SG accumulation and toxicity (Bolognesi *et al.*, 2016), we discovered the presence of Mip6 in SGs only as a response to various stressors and a lack of impact on cell growth following Mip6 overexpression from the *ADH1* promoter (**Figure 16** and **Figure 21**). Recent studies have shown that Mip6-3xsfGFP colocalizes to specific foci in the cell without a negative impact on cell growth during yeast sporulation triggered by a lack of nutrients (Jin *et al.*, 2017). These results suggest that the accumulation and impairment in cell growth described by Bolognesi *et al.*, 2016 could be produced by the high overexpression levels of Mip6 and not just the accumulation of Mip6 in cytoplasmic granules. SGs and PBs are dynamic structures that exchange mRNPs between themselves and the cytoplasm to optimize mRNA metabolism (Buchan *et al.*, 2011). Although we observed Mip6 in PBs, most Mip6 associated with SGs (**Figure 21**; Bolognesi *et al.*, 2016). SGs, but not PBs, possess a defined structures: a stable core composed of substantial interactions of RNAs and proteins, and a fluid shield that contains transient proteins that would be exchanged with the cytoplasm or other structures such as PBs (Buchan and Parker, 2009; Balagopal and Parker, 2009; Jain *et al.*, 2016). Although Mip6 exhibits behavior similar to Pab1 and copurifies with SGs (**Figure 22**), studies of purified SG cores failed to detect Mip6, perhaps due to its reported low abundance (Jain *et al.*, 2016). As a component of SGs, we suggested the importance of Mip6, as has been shown for Pab1, to SG metabolism (Swisher and Parker, 2010; Buchan *et al.*, 2011; Martani *et al.*, 2015). Pab1 SG kinetics are affected in the *mip6* Δ strain to a lesser extent (**Figure 22**), suggesting a putative role of Mip6 in SG metabolism less relevant than Pab1 (**Figure 34**). As an RBP, Mip6 may bind to different mRNAs related to the stress response and recovery, as we will explain below.

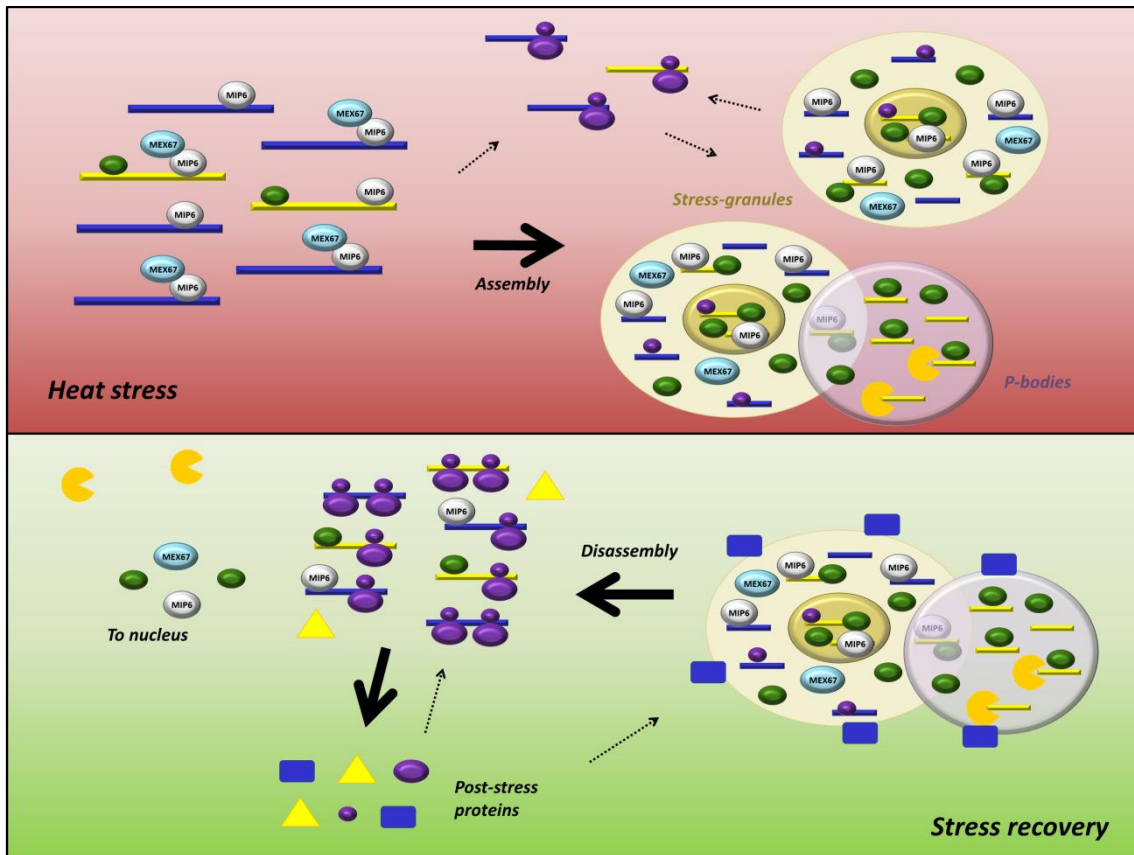


Figure 34. Mip6 Participates in Stress Granules Metabolism. Mip6-bound mRNA accumulates in SGs. During stress, exchanges between active translation and RNA degradation with PBs take place near SGs. Once the cell adapts to stress, PBs and SGs disassemble. Stored mRNAs are then released and translated to recover optimal cell growth conditions (yellow proteins) and collaborate in the total disassembly of SGs and PBs (blue proteins). Certain RBPs return to the nucleus to aid mRNA transport. Ribosome subunits in purple; other RBPs in green; mRNA decay in dark yellow.

Mip6 Binds to most Transcripts *in vivo*, but Preferentially to Msn2/Msn4-dependent Transcripts under Normal Conditions

Protein domain identification predicted four RRM in the Mip6 protein. Recently, our *in vitro* studies confirmed the capacity of Mip6 RRMs to bind to RNA (**Figure 10**). We also used PAR-CLIP to identify Mip6 targets *in vivo* (**Figure 11**). PAR-CLIP allows the detection of RNA sequences bound to a specific protein. Our Mip6 PAR-CLIP results demonstrated that Mip6 binds to most yeast mRNAs under optimal and stressful growth conditions, suggesting that the binding of Mip6 to RNA is not sequence-specific (**Annex 1**). Although Mip6 is a low abundance protein (Ghaemmaghami *et al.*, 2003; Ho *et al.*, 2018), it can bind to several types of mRNAs. This binding profile could be explained

by the presence of the four RRM domains contained in the Mip6 protein that binds to RNA independently or cooperatively (**Figure 10**). As we observed the accumulation of Mip6 at 3' end sequences of RNAs, we suggest that Mip6 binds to mature mRNAs (**Figure 24**). The primary goal of this work was to discriminate between Mip6 targets at 30°C and after heat stress, a condition that promotes Mip6 localization changes. However, heat stress affects the expression levels of most transcripts and interferes with our binding analysis. To overcome this problem, we normalized Mip6 binding to the expression levels of each transcript in both conditions (McKinlay *et al.*, 2011). Under stress-free conditions, Mip6 preferentially binds to genes regulated by the Msn2/Msn4 transcription factors, whereas under heat shock, Mip6 preferentially binds to ribosomal protein genes (RPG) (**Annex 4**). RPG mRNAs are constitutively expressed genes required to produce ribosomal proteins. Mex67 and its adaptors export RPG transcripts under optimal growth conditions; however, in response to stressful conditions, RPG mRNAs are retained in the nucleus to prevent the export or accumulate in cytoplasmic granules together with some of the bound RBPs (Saavedra *et al.*, 1996; Buchan *et al.*, 2011). Under stressful conditions, Mip6 shows preferential binding to RPG mRNAs, probably acting as other RBPs, such as Pab1, to collaborate in translational repression through SG assembly in the cytoplasm (**Figure 21**).

In contrast, different stressors induce stress-responsive transcripts. Under thermal stress, the action of the heat shock factor 1 (Hsf1) and the environmental stress response (via Msn2 and Msn4) influence newly produced mRNAs. Following stress, Hsf1 dependent transcripts are mostly transported directly by binding to Mex67 (Zander *et al.*, 2016); however, the mechanisms behind the export of Msn2/Msn4-dependent transcripts remain unclear. Under non-stress conditions, stress-responsive transcripts are expressed at low levels and repressed at the transcriptional level. Under these conditions, Mip6 preferentially binds to repressed Msn2/Msn4-dependent transcripts (**Figure 24** and **Annex 4**). As quality control mechanisms in the nucleus and the cytoplasm repress unnecessary or untranslated mRNAs (Niño *et al.*, 2013; Zander and Krebber, 2017), Mip6 may modulate the metabolism of Msn2/Msn4-dependent transcripts by promoting their export and degradation in the cytoplasm when

they are not required. Results obtained in this thesis support a functional link between Mip6 and Msn2/Msn4. Although we failed to discover a genetic interaction, the *msn2Δmsn4Δ* mutant augmented the nuclear retention of Mip6 under stress (**Figure 27**). The absence of Msn2/Msn4 affects the expression of their target genes allowing that Mip6 would not bind to these mRNAs with concomitant nuclear enrichment. However, we cannot exclude the existence of a physical interaction between Mip6 and Msn2/Msn4 factors required for Mip6 transport.

Does Mip6 Repress the Translation of Unnecessary Transcripts? An Unexpected mRNA Buffering Protein

Recent advances have contributed to the detailed description of mRNA metabolism (Reed and Cheng, 2005; Fasken and Corbett, 2009; Zander and Krebber, 2017). Many proteins participate at different levels during gene expression, such as Sus1, Dbp5, and Xrn1 (Rodríguez-Navarro *et al.*, 2004; Tieg and Krebber, 2013; Medina *et al.*, 2014). Additionally, the binding of different RBPs during mRNA processing and export represents a crucial step of quality control of gene expression. RBPs represent signaling markers of the mRNA maturation state, and such proteins include the Gbp2, Hrb1, Npl3, and Nab2 Mex67 adaptor proteins, also known as the “guard proteins”. Many have proposed guard proteins as signaling proteins that avoid the direct interaction of Mex67 with mRNAs to control mature mRNP transport (Zander and Krebber, 2017). Under optimal growth conditions, Mip6 binds to mRNAs and may function as a Mex67 adaptor protein or an RBP covering mRNAs to help in mRNA transport (**Figure 35**). In this thesis, we discovered that Mip6 preferentially binds to Msn2/Msn4-dependent transcripts under optimal conditions (**Annex 4**). These genes remain repressed until activation during stress. Although we did not observe alterations to the protein levels of Ctt1 and Hsp12 in *mip6Δ* and Mip6^{W₄₄₂A}-GFP strains, high levels of their mRNAs were produced (**Figure 25**). Therefore, we propose that Mip6 regulates the metabolism of Msn2/Msn4-dependent mRNAs rather than their protein levels under optimal growth conditions. Two mechanisms may produce the higher

mRNA levels of Msn2/Msn4 dependent transcripts observed for *mip6Δ*: the activation of their transcription or the repression of their decay. Our results demonstrated that the combinatorial defect of Mip6 and the nuclear exosome member Rrp6 increases *HSP12* and *CTT1* mRNA levels (**Figure 26**), which led us to propose that Mip6 would export Msn2/Msn4-dependent mRNAs that were not previously eliminated by the nuclear exosome for further cytoplasmic degradation (**Figure 35**). An aspiration of future studies is the identification of the possible Mip6-dependent mRNA decay mechanisms behind the Msn2/Msn4-dependent mRNAs metabolism.

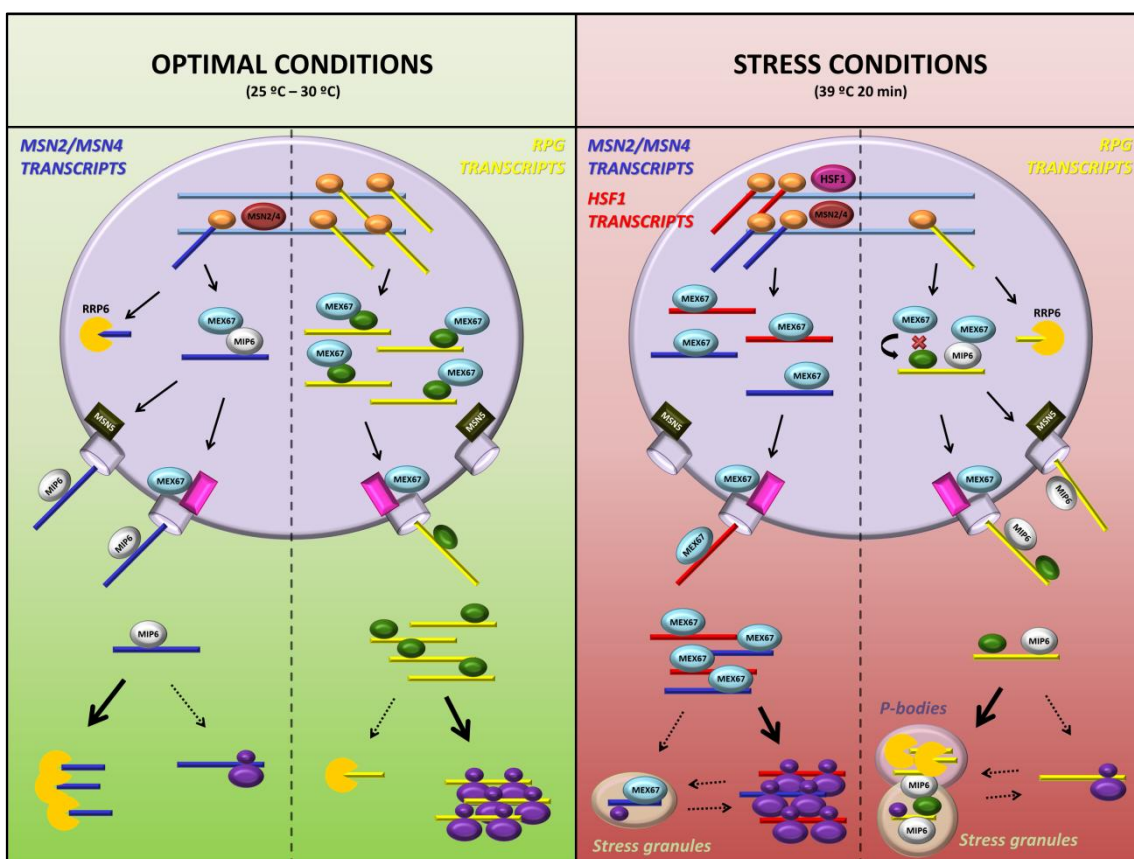


Figure 35. Mip6 Role in the Regulation of mRNA Metabolism under Optimal and Stressful Growth Conditions. We propose that Mip6 collaborates in the repression of non-essential genes. Under optimal conditions, Mex67 transports housekeeping mRNAs, including RPG, for optimal cell growth together with Mex67 adaptor proteins. However, Mip6 preferentially binds to Msn2/Msn4-dependent mRNAs, not previously eliminated by the Rrp6 nuclear exosome, to transport them for degradation by the cytoplasmic mRNA decay machinery. Under stressful conditions, Mex67 focuses on the transport of stress-responsive mRNAs by directly binding to these mRNAs and thereby excluding any interaction with guard proteins or quality control mechanisms. These mRNAs are preferentially translated despite a certain level of accumulation of Msn2/Msn4-dependent mRNAs in SGs (Zid and O’Shea, 2014). In these conditions, Mip6 preferentially binds to RPG mRNAs to coordinate the export of non-previously degraded transcripts. Mip6 transport and the subsequent accumulation in SGs aid the regulation of levels of RPG mRNAs and, indirectly, facilitate the interaction of Mex67 with stress-responsive mRNAs. RNA Pol II in orange; ribosome subunits in purple; other RBPs in green; mRNA decay in dark yellow.

Although our hypothesis focuses on mRNA decay, we cannot exclude the possibility that Mip6 affects the transcription of Msn2/Msn4-dependent genes, as occurs for other mRNAs and RNA metabolism proteins (Medina *et al.*, 2014; Zander *et al.*, 2016; Timmers and Tora, 2018). Mip6 may interact with the chromatin remodelers (SWI/SNF complex), or histone deacetylase proteins (Rpd3 complex) confirmed as regulators of the Msn2/Msn4 pathway (Erkina *et al.*, 2008; Ruiz-Roig *et al.*, 2010). Interestingly, we found a genetic interaction between *MIP6* and *RPD3* in our laboratory (Carme Nuño thesis) that was also described in a genome-wide analysis (Kaluarachchi Duffy *et al.*, 2012). Moreover, we discovered Rpd3 in Mip6-TAP purification and increased histone acetylation levels in a *mip6Δ* strain (unpublished results). These data suggest a link between Mip6 and Rpd3 function. Notably, Rpd3 plays a role in divergent transcription. Genome-wide screens demonstrated that cells lacking *MIP6* have higher rates of non-coding gene transcription (Marquardt *et al.*, 2014). Current experiments in our laboratory aim to understand the Rpd3-Mip6 interaction and any role in the regulation of gene expression.

Mip6 appears to play a repressive role in the metabolism of Msn2/Msn4-dependent mRNAs under optimal growth conditions. During stress, changes in the regulation of gene expression allow cell survival (Verghese *et al.*, 2012; Morano *et al.*, 2012; Barraza *et al.*, 2017). Two relevant factors induce the expression of needed proteins during heat stress, Hsf1 (Nieto-Sotelo *et al.*, 1990; Hahn *et al.*, 2004) and Msn2/Msn4 (Martínez-Pastor *et al.*, 1996; Schmitt and McEntee, 1996; Sadeh *et al.*, 2011; Morano *et al.*, 2012). Hsf1-dependent mRNAs are transported via direct interaction with Mex67, avoiding guard proteins interaction and quality control checking, for rapid translation (Zander *et al.*, 2016). Under heat shock, we discovered that the preferential targets of Mip6 change and RPG mRNAs are then more abundant (**Annex 4**). RPG transcripts should be repressed under these conditions and degraded in the nucleus or, if exported, they should be stored and/or degraded in SGs and PBs (Bond, 2006; Grousl *et al.*, 2013). As our colocalization assays revealed, Mip6 is transported under stress conditions and accumulates in SGs (**Figure 21**). Even though the RPG mRNAs and stress-responsive genes are excluded from SG cores (Khong

et al., 2017), they might take on a transient localization profile between SG shields, PBs, and the cytoplasm. Studies have validated the presence of Msn2/Msn4-dependent mRNAs in cytoplasmic dots (Zid and O'Shea, 2014) and the presence of RPG mRNAs in SGs (Chantarachot and Bailey-Serres, 2018). Taking all these data into consideration, we propose that Mip6 functions as a shuttling protein which binds to repressed RPG mRNAs under stress conditions to accumulate in SGs (**Figure 35**).

As a summary of the possible role of Mip6 in mRNA homeostasis, we propose that Mip6 is an mRNA binding protein controlling the decay and repression of specific targets under different conditions by their transport to the cytoplasm. Mip6 collaborates with mRNA export of important mRNAs with Mex67 to maintain the optimal equilibrium between gene expression and protein synthesis (**Figure 35**; Castells-Roca *et al.*, 2011; Pérez-Ortín *et al.*, 2013).

CONCLUSIONS

The main conclusions of this thesis are the following:

1. Mip6 physically and genetically interacts with the essential export factor Mex67. Although Mip6 interaction does not affect Mex67 function, the interaction affects Mex67 presence in SGs.
2. Mip6 is a shuttling protein whose export partially depends on a direct interaction between the tryptophan-442 of the RRM4 with the Mex67 UBA domain. Mex67 disruption and/or impairments to the mRNA export machinery cause Mip6 nuclear retention.
3. Mip6 accumulates and copurifies with SGs under stressful conditions. Cells lacking *MIP6* display an altered metabolism of Pab1-containing SGs.
4. *MIP6* mutant cells are resistant to severe heat shock, perhaps because of the production of elevated levels of the cytoprotective trehalose.
5. Mip6 binds to most mature mRNAs, with an enrichment for Msn2/Msn4-dependent mRNAs under optimal growth conditions. However, under heat shock, Mip6 preferentially binds to RPG mRNAs.
6. Mip6, together with the Rrp6 exonuclease, regulates the levels of Msn2/Msn4-dependent mRNAs. Cells lacking *MIP6* or displaying an impaired Mex67-Mip6 interaction through a *W₄₄₂A* mutation produce elevated levels of Msn2/Msn4-dependent mRNAs. However, we failed to observe an effect at the protein level for Ctt1 or Hsp12.
7. Heat shock affects Mip6 shuttling in cells lacking both Msn2 and Msn4.
8. Deletion of any RRM in Mip6 protein leads to nuclear retention to different extents.
9. Mip6 contains a putative NES that does not depend on the Crm1/Xpo1 exportin; the Msn5 karyopherin controls the Mip6 NES export pathway.
10. The absence of the methyltransferase Hmt1 produces Mip6 nuclear retention during heat stress. In contrast, the Akl1 or Rim15 kinases or the Tom1 ubiquitin ligase do not affect Mip6 localization.

BIBLIOGRAPHY

AbuQattam A, Gallego J, Rodriguez-Navarro S (2016) An intronic RNA structure modulates expression of the mRNA biogenesis factor Sus1. *RNA* **22**: 75-86

AbuQattam A, Serrano-Quilez J, Rodriguez-Navarro S, Gallego J (2018) An exon three-way junction structure modulates splicing and degradation of the SUS1 yeast pre-mRNA. *Biochimica et biophysica acta Gene regulatory mechanisms* **1861**: 673-686

Afroz T, Cienikova Z, Clery A, Allain FHT (2015) One, Two, Three, Four! How Multiple RRMs Read the Genome Sequence. *Methods in enzymology* **558**: 235-278

Alber F, Dokudovskaya S, Veenhoff LM, Zhang W, Kipper J, Devos D, Suprpto A, Karni-Schmidt O, Williams R, Chait BT, Sali A, Rout MP (2007) The molecular architecture of the nuclear pore complex. *Nature* **450**: 695-701

Alepuz PM, Matheos D, Cunningham KW, Estruch F (1999) The *Saccharomyces cerevisiae* RanGTP-binding protein msn5p is involved in different signal transduction pathways. *Genetics* **153**: 1219-1231

Amin J, Ananthan J, Voellmy R (1988) Key features of heat shock regulatory elements. *Mol Cell Biol* **8**: 3761-3769

Amoros M, Estruch F (2001) Hsf1p and Msn2/4p cooperate in the expression of *Saccharomyces cerevisiae* genes HSP26 and HSP104 in a gene- and stress type-dependent manner. *Molecular microbiology* **39**: 1523-1532

Anders S, Pyl PT, Huber W (2015) HTSeq--a Python framework to work with high-throughput sequencing data. *Bioinformatics* **31**: 166-169

Anderson JS, Parker RP (1998) The 3' to 5' degradation of yeast mRNAs is a general mechanism for mRNA turnover that requires the SKI2 DEVH box protein and 3' to 5' exonucleases of the exosome complex. *EMBO J* **17**: 1497-1506

Anderson JT, Wilson SM, Datar KV, Swanson MS (1993) NAB2: a yeast nuclear polyadenylated RNA-binding protein essential for cell viability. *Mol Cell Biol* **13**: 2730-2741

Anderson P, Kedersha N, Ivanov P (2015) Stress granules, P-bodies and cancer. *Biochimica et biophysica acta* **1849**: 861-870

Araki Y, Takahashi S, Kobayashi T, Kajihio H, Hoshino S, Katada T (2001) Ski7p G protein interacts with the exosome and the Ski complex for 3'-to-5' mRNA decay in yeast. *EMBO J* **20**: 4684-4693

- Baker KE, Parker R (2004) Nonsense-mediated mRNA decay: terminating erroneous gene expression. *Current opinion in cell biology* **16**:293-299
- Bakhrat A, Baranes-Bachar K, Reshef D, Voloshin O, Krichevsky O, Raveh D (2008) Nuclear export of Ho endonuclease of yeast via Msn5. *Current genetics* **54**: 271-281
- Balagopal V, Parker R (2009) Polysomes, P bodies and stress granules: states and fates of eukaryotic mRNAs. *Current opinion in cell biology***21**: 403-408
- Banerjee AK (1980) 5'-terminal cap structure in eucaryotic messenger ribonucleic acids. *Microbiological reviews* **44**: 175-205
- Baptista T, Grunberg S, Minoungou N, Koster MJE, Timmers HTM, Hahn S, Devys D, Tora L (2017) SAGA Is a General Cofactor for RNA Polymerase II Transcription. *Mol Cell* **68**: 130-143 e135
- Barraza CE, Solari CA, Marcovich I, Kershaw C, Galello F, Rossi S, Ashe MP, Portela P (2017) The role of PKA in the translational response to heat stress in *Saccharomyces cerevisiae*. *PLoS one* **12**: e0185416
- Batisse J, Batisse C, Budd A, Bottcher B, Hurt E (2009) Purification of nuclear poly(A)-binding protein Nab2 reveals association with the yeast transcriptome and a messenger ribonucleoprotein core structure. *J Biol Chem* **284**: 34911-34917
- Beck M, Hurt E (2017) The nuclear pore complex: understanding its function through structural insight. *Nature reviews Molecular cell biology* **18**: 73-89
- Beck T, Hall MN (1999) The TOR signalling pathway controls nuclear localization of nutrient-regulated transcription factors. *Nature* **402**:689-692
- Bentley DL (2014) Coupling mRNA processing with transcription in time and space. *Nature reviews Genetics* **15**: 163-175
- Bhaumik SR, Green MR (2002) Differential requirement of SAGA components for recruitment of TATA-box-binding protein to promoters in vivo. *Mol Cell Biol* **22**: 7365-7371
- Bi X (2014) Heterochromatin structure: lessons from the budding yeast. *IUBMB life* **66**: 657-666
- Bolognesi B, Lorenzo Gotor N, Dhar R, Cirillo D, Baldrighi M, Tartaglia GG, Lehner B (2016) A Concentration-Dependent Liquid Phase Separation Can Cause Toxicity upon Increased Protein Expression. *Cell reports* **16**: 222-231

- Bond U (2006) Stressed out! Effects of environmental stress on mRNA metabolism. *FEMS yeast research* **6**: 160-170
- Bonneau F, Basquin J, Ebert J, Lorentzen E, Conti E (2009) The yeast exosome functions as a macromolecular cage to channel RNA substrates for degradation. *Cell* **139**: 547-559
- Bonner JJ, Ballou C, Fackenthal DL (1994) Interactions between DNA-bound trimers of the yeast heat shock factor. *Mol Cell Biol* **14**: 501-508
- Bonnet J, Wang CY, Baptista T, Vincent SD, Hsiao WC, Stierle M, Kao CF, Tora L, Devys D (2014) The SAGA coactivator complex acts on the whole transcribed genome and is required for RNA polymerase II transcription. *Genes & development* **28**: 1999-2012
- Botstein D, Fink GR (2011) Yeast: an experimental organism for 21st Century biology. *Genetics* **189**: 695-704
- Boy-Marcotte E, Lagniel G, Perrot M, Bussereau F, Boudsocq A, Jacquet M, Labarre J (1999) The heat shock response in yeast: differential regulations and contributions of the Msn2p/Msn4p and Hsf1p regulons. *Molecular microbiology* **33**: 274-283
- Brachmann CB, Davies A, Cost GJ, Caputo E, Li J, Hieter P, Boeke JD (1998) Designer deletion strains derived from *Saccharomyces cerevisiae* S288C: a useful set of strains and plasmids for PCR-mediated gene disruption and other applications. *Yeast* **14**: 115-132
- Brandman O, Hegde RS (2016) Ribosome-associated protein quality control. *Nature structural & molecular biology* **23**: 7-15
- Bregues M, Teixeira D, Parker R (2005) Movement of eukaryotic mRNAs between polysomes and cytoplasmic processing bodies. *Science* **310**: 486-489
- Brookes E, Pombo A (2009) Modifications of RNA polymerase II are pivotal in regulating gene expression states. *EMBO reports* **10**: 1213-1219
- Brown CE, Sachs AB (1998) Poly(A) tail length control in *Saccharomyces cerevisiae* occurs by message-specific deadenylation. *Mol Cell Biol* **18**: 6548-6559
- Brueckner F, Armache KJ, Cheung A, Damsma GE, Kettenberger H, Lehmann E, Sydow J, Cramer P (2009) Structure-function studies of the RNA polymerase II elongation complex. *Acta crystallographica Section D, Biological crystallography* **65**: 112-120
- Brune C, Munchel SE, Fischer N, Podtelejnikov AV, Weis K (2005) Yeast poly(A)-binding protein Pab1 shuttles between the nucleus and the cytoplasm and functions in mRNA export. *RNA* **11**: 517-531

- Buchan JR, Muhlrad D, Parker R (2008) P bodies promote stress granule assembly in *Saccharomyces cerevisiae*. *The Journal of cell biology* **183**: 441-455
- Buchan JR, Parker R (2009) Eukaryotic stress granules: the ins and outs of translation. *Mol Cell* **36**: 932-941
- Buchan JR, Yoon JH, Parker R (2011) Stress-specific composition, assembly and kinetics of stress granules in *Saccharomyces cerevisiae*. *Journal of cell science* **124**: 228-239
- Buratowski S (2009) Progression through the RNA polymerase II CTD cycle. *Mol Cell* **36**: 541-546
- Burgess, Sean M and Powers, Ted (2017) Budding Yeast *Saccharomyces cerevisiae* as a Model Genetic Organism. In: eLS. John Wiley & Sons, Ltd: Chichester
- Burkard KT, Butler JS (2000) A nuclear 3'-5' exonuclease involved in mRNA degradation interacts with Poly(A) polymerase and the hnRNA protein Npl3p. *Mol Cell Biol* **20**: 604-616
- Carmody SR, Tran EJ, Apponi LH, Corbett AH, Wente SR (2010) The mitogen-activated protein kinase Slt2 regulates nuclear retention of non-heat shock mRNAs during heat shock-induced stress. *Mol Cell Biol* **30**: 5168-5179
- Carter R, Drouin G (2009) Structural differentiation of the three eukaryotic RNA polymerases. *Genomics* **94**: 388-396
- Castells-Roca L, Garcia-Martinez J, Moreno J, Herrero E, Belli G, Perez-Ortin JE (2011) Heat shock response in yeast involves changes in both transcription rates and mRNA stabilities. *PLoS one* **6**: e17272
- Causton HC, Ren B, Koh SS, Harbison CT, Kanin E, Jennings EG, Lee TI, True HL, Lander ES, Young RA (2001) Remodeling of yeast genome expression in response to environmental changes. *Molecular biology of the cell* **12**: 323-337
- Chantarachot T, Bailey-Serres J (2018) Polysomes, Stress Granules, and Processing Bodies: A Dynamic Triumvirate Controlling Cytoplasmic mRNA Fate and Function. *Plant physiology* **176**: 254-269
- Chatterjee K, Majumder S, Wan Y, Shah V, Wu J, Huang HY, Hopper AK (2017) Sharing the load: Mex67-Mtr2 cofunctions with Los1 in primary tRNA nuclear export. *Genes & development* **31**: 2186-2198
- Chavez S, Beilharz T, Rondon AG, Erdjument-Bromage H, Tempst P, Svejstrup JQ, Lithgow T, Aguilera A (2000) A protein complex containing Tho2, Hpr1, Mft1 and a novel protein, Thp2,

connects transcription elongation with mitotic recombination in *Saccharomyces cerevisiae*. *EMBO J* **19**: 5824-5834

Chen J, Moore C (1992) Separation of factors required for cleavage and polyadenylation of yeast pre-mRNA. *Mol Cell Biol* **12**: 3470-3481

Chen W, Jia Q, Song Y, Fu H, Wei G, Ni T (2017) Alternative Polyadenylation: Methods, Findings, and Impacts. *Genomics, proteomics & bioinformatics* **15**: 287-300

Cheung AC, Cramer P (2011) Structural basis of RNA polymerase II backtracking, arrest and reactivation. *Nature* **471**: 249-253

Chi Y, Huddleston MJ, Zhang X, Young RA, Annan RS, Carr SA, Deshaies RJ (2001) Negative regulation of Gcn4 and Msn2 transcription factors by Srb10 cyclin-dependent kinase. *Genes & development* **15**: 1078-1092

Chowdhary S, Kainth AS, Pincus D, Gross DS (2019) Heat Shock Factor 1 Drives Intergenic Association of Its Target Gene Loci upon Heat Shock. *Cell reports* **26**: 18-28 e15

Collart MA (2016) The Ccr4-Not complex is a key regulator of eukaryotic gene expression. *Wiley interdisciplinary reviews RNA* **7**: 438-454

Collart MA, Oliviero S (2001) Preparation of yeast RNA. *Curr Protoc Mol Biol* **Chapter 13**: Unit13 12

Coller J, Parker R (2004) Eukaryotic mRNA decapping. *Annual review of biochemistry* **73**: 861-890

Coller J, Parker R (2005) General translational repression by activators of mRNA decapping. *Cell* **122**: 875-886

Collins L, Penny D (2005) Complex spliceosomal organization ancestral to extant eukaryotes. *Molecular biology and evolution* **22**: 1053-1066

Conlin LK, Nelson HC (2007) The natural osmolyte trehalose is a positive regulator of the heat-induced activity of yeast heat shock transcription factor. *Mol Cell Biol* **27**: 1505-1515

Cosson B, Couturier A, Chabelskaya S, Kiktev D, Inge-Vechtomov S, Philippe M, Zhouravleva G (2002) Poly(A)-binding protein acts in translation termination via eukaryotic release factor 3 interaction and does not influence [PSI(+)] propagation. *Mol Cell Biol* **22**: 3301-3315

Crick FH (1968) The origin of the genetic code. *Journal of molecular biology* **38**: 367-379

D'Angelo MA, Hetzer MW (2008) Structure, dynamics and function of nuclear pore complexes. *Trends in cell biology* **18**: 456-466

Davidson JF, Schiestl RH (2001) Mitochondrial respiratory electron carriers are involved in oxidative stress during heat stress in *Saccharomyces cerevisiae*. *Mol Cell Biol* **21**: 8483-8489

de Jonge WJ, O'Duibhir E, Lijnzaad P, van Leenen D, Groot Koerkamp MJ, Kemmeren P, Holstege FC (2017) Molecular mechanisms that distinguish TFIID housekeeping from regulatable SAGA promoters. *EMBO J* **36**: 274-290

Decker CJ, Parker R (2012) P-bodies and stress granules: possible roles in the control of translation and mRNA degradation. *Cold Spring Harbor perspectives in biology* **4**: a012286

Dermody JL, Dreyfuss JM, Villen J, Ogundipe B, Gygi SP, Park PJ, Ponticelli AS, Moore CL, Buratowski S, Bucheli ME (2008) Unphosphorylated SR-like protein Npl3 stimulates RNA polymerase II elongation. *PloS one* **3**: e3273

Dever TE, Green R (2012) The elongation, termination, and recycling phases of translation in eukaryotes. *Cold Spring Harbor perspectives in biology* **4**: a013706

DeVit MJ, Johnston M (1999) The nuclear exportin Msn5 is required for nuclear export of the Mig1 glucose repressor of *Saccharomyces cerevisiae*. *Current biology* : **CB 9**: 1231-1241

Diepouis G, Iglesias N, Stutz F (2006) Cotranscriptional recruitment to the mRNA export receptor Mex67p contributes to nuclear pore anchoring of activated genes. *Mol Cell Biol* **26**: 7858-7870

Dimitrova L, Valkov E, Aibara S, Flemming D, McLaughlin SH, Hurt E, Stewart M (2015) Structural Characterization of the *Chaetomium thermophilum* TREX-2 Complex and its Interaction with the mRNA Nuclear Export Factor Mex67:Mtr2. *Structure* **23**: 1246-1257

Dolz-Edo L, Rienzo A, Poveda-Huertes D, Pascual-Ahuir A, Proft M (2013) Deciphering dynamic dose responses of natural promoters and single cis elements upon osmotic and oxidative stress in yeast. *Mol Cell Biol* **33**: 2228-2240

Doma MK, Parker R (2006) Endonucleolytic cleavage of eukaryotic mRNAs with stalls in translation elongation. *Nature* **440**: 561-564

Doma MK, Parker R (2007) RNA quality control in eukaryotes. *Cell* **131**: 660-668

Duina AA, Miller ME, Keeney JB (2014) Budding yeast for budding geneticists: a primer on the *Saccharomyces cerevisiae* model system. *Genetics* **197**: 33-48

- Dujon B (1996) The yeast genome project: what did we learn? *Trends in genetics* : **TIG 12**: 263-270
- Duncan K, Umen JG, Guthrie C (2000) A putative ubiquitin ligase required for efficient mRNA export differentially affects hnRNP transport. *Current biology* : **CB 10**: 687-696
- Dunckley T, Parker R (1999) The DCP2 protein is required for mRNA decapping in *Saccharomyces cerevisiae* and contains a functional MutT motif. *EMBO J* **18**: 5411-5422
- Dunn EF, Hammell CM, Hodge CA, Cole CN (2005) Yeast poly(A)-binding protein, Pab1, and PAN, a poly(A) nuclease complex recruited by Pab1, connect mRNA biogenesis to export. *Genes & development* **19**: 90-103
- Dziembowski A, Lorentzen E, Conti E, Seraphin B (2007) A single subunit, Dis3, is essentially responsible for yeast exosome core activity. *Nature structural & molecular biology* **14**: 15-22
- Egloff S, Dienstbier M, Murphy S (2012) Updating the RNA polymerase CTD code: adding gene-specific layers. *Trends in genetics* : **TIG28**: 333-341
- Ellisdon AM, Dimitrova L, Hurt E, Stewart M (2012) Structural basis for the assembly and nucleic acid binding of the TREX-2 transcription-export complex. *Nature structural & molecular biology* **19**: 328-336
- Erkina TY, Tschetter PA, Erkin AM (2008) Different requirements of the SWI/SNF complex for robust nucleosome displacement at promoters of heat shock factor and Msn2- and Msn4-regulated heat shock genes. *Mol Cell Biol* **28**: 1207-1217
- Erkina TY, Zou Y, Freeling S, Vorobyev VI, Erkin AM (2010) Functional interplay between chromatin remodeling complexes RSC, SWI/SNF and ISWI in regulation of yeast heat shock genes. *Nucleic Acids Res* **38**: 1441-1449
- Fahrenkrog B (2015) Histone modifications as regulators of life and death in *Saccharomyces cerevisiae*. *Microb Cell* **3**: 1-13
- Fasken MB, Corbett AH (2009) Mechanisms of nuclear mRNA quality control. *RNA biology* **6**: 237-241
- Fasken MB, Stewart M, Corbett AH (2008) Functional significance of the interaction between the mRNA-binding protein, Nab2, and the nuclear pore-associated protein, Mlp1, in mRNA export. *J Biol Chem* **283**: 27130-27143
- Faza MB, Chang Y, Occhipinti L, Kemmler S, Panse VG (2012) Role of Mex67-Mtr2 in the nuclear export of 40S pre-ribosomes. *PLoS genetics* **8**: e1002915

Faza MB, Kemmler S, Jimeno S, Gonzalez-Aguilera C, Aguilera A, Hurt E, Panse VG (2009) Sem1 is a functional component of the nuclear pore complex-associated messenger RNA export machinery. *The Journal of cell biology* **184**: 833-846

Fenley AT, Anandakrishnan R, Kidane YH, Onufriev AV (2018) Modulation of nucleosomal DNA accessibility via charge-altering post-translational modifications in histone core. *Epigenetics & chromatin* **11**: 11

Ferguson SB, Anderson ES, Harshaw RB, Thate T, Craig NL, Nelson HC (2005) Protein kinase A regulates constitutive expression of small heat-shock genes in an Msn2/4p-independent and Hsf1p-dependent manner in *Saccharomyces cerevisiae*. *Genetics* **169**: 1203-1214

Fernandez-Martinez J, Kim SJ, Shi Y, Upla P, Pellarin R, Gagnon M, Chemmama IE, Wang J, Nudelman I, Zhang W, Williams R, Rice WJ, Stokes DL, Zenklusen D, Chait BT, Sali A, Rout MP (2016) Structure and Function of the Nuclear Pore Complex Cytoplasmic mRNA Export Platform. *Cell* **167**: 1215-1228 e1225

Fischer T, Rodriguez-Navarro S, Pereira G, Racz A, Schiebel E, Hurt E (2004) Yeast centrin Cdc31 is linked to the nuclear mRNA export machinery. *Nat Cell Biol* **6**: 840-848

Fischer T, Strasser K, Racz A, Rodriguez-Navarro S, Oppizzi M, Ihrig P, Lechner J, Hurt E (2002) The mRNA export machinery requires the novel Sac3p-Thp1p complex to dock at the nucleoplasmic entrance of the nuclear pores. *EMBO J* **21**: 5843-5852

Folkmann AW, Noble KN, Cole CN, Wentz SR (2011) Dbp5, Gle1-IP6 and Nup159: a working model for mRNP export. *Nucleus* **2**: 540-548

Fox MJ, Gao H, Smith-Kinnaman WR, Liu Y, Mosley AL (2015) The exosome component Rrp6 is required for RNA polymerase II termination at specific targets of the Nrd1-Nab3 pathway. *PLoS genetics* **11**: e1004999

Funakoshi Y, Doi Y, Hosoda N, Uchida N, Osawa M, Shimada I, Tsujimoto M, Suzuki T, Katada T, Hoshino S (2007) Mechanism of mRNA deadenylation: evidence for a molecular interplay between translation termination factor eRF3 and mRNA deadenylases. *Genes & development* **21**: 3135-3148

Galy V, Gadal O, Fromont-Racine M, Romano A, Jacquier A, Nehrbass U (2004) Nuclear retention of unspliced mRNAs in yeast is mediated by perinuclear Mlp1. *Cell* **116**: 63-73

Garcia-Molinero V, Garcia-Martinez J, Reja R, Furio-Tari P, Antunez O, Vinayachandran V, Conesa A, Pugh BF, Perez-Ortin JE, Rodriguez-Navarro S (2018) The SAGA/TREX-2 subunit

Sus1 binds widely to transcribed genes and affects mRNA turnover globally. *Epigenetics & chromatin* **11**: 13

Garcia-Oliver E, Garcia-Molinero V, Rodriguez-Navarro S (2012) mRNA export and gene expression: the SAGA-TREX-2 connection. *Biochimica et biophysica acta* **1819**: 555-565

Gasch AP (2003) Gasch, A.P. (2003) The environmental stress response: a common yeast response to environmental stresses. *In: Yeast Stress Responses, ed S. Hohmann and P. Mager, Springer Verlag: (in press).*

Gasch AP, Spellman PT, Kao CM, Carmel-Harel O, Eisen MB, Storz G, Botstein D, Brown PO (2000) Genomic expression programs in the response of yeast cells to environmental changes. *Molecular biology of the cell* **11**: 4241-4257

Gavin AC, Bosche M, Krause R, Grandi P, Marzioch M, Bauer A, Schultz J, Rick JM, Michon AM, Cruciat CM, Remor M, Hofert C, Schelder M, Brajenovic M, Ruffner H, Merino A, Klein K, Hudak M, Dickson D, Rudi T, Gnau V, Bauch A, Bastuck S, Huhse B, Leutwein C, Heurtier MA, Copley RR, Edlmann A, Querfurth E, Rybin V, Drewes G, Raida M, Bouwmeester T, Bork P, Seraphin B, Kuster B, Neubauer G, Superti-Furga G (2002) Functional organization of the yeast proteome by systematic analysis of protein complexes. *Nature* **415**:141-147

Gewartowski K, Cuellar J, Dziembowski A, Valpuesta JM (2012) The yeast THO complex forms a 5-subunit assembly that directly interacts with active chromatin. *Bioarchitecture* **2**: 134-137

Ghaemmaghami S, Huh WK, Bower K, Howson RW, Belle A, Dephoure N, O'Shea EK, Weissman JS (2003) Global analysis of protein expression in yeast. *Nature* **425**: 737-741

Gietz RD, Schiestl RH (2007) High-efficiency yeast transformation using the LiAc/SS carrier DNA/PEG method. *Nat Protoc* **2**: 31-34

Gilbert W, Guthrie C (2004) The Glc7p nuclear phosphatase promotes mRNA export by facilitating association of Mex67p with mRNA. *Mol Cell* **13**: 201-212

Gilbert W, Siebel CW, Guthrie C (2001) Phosphorylation by Sky1p promotes Npl3p shuttling and mRNA dissociation. *RNA* **7**: 302-313

Glisovic T, Bachorik JL, Yong J, Dreyfuss G (2008) RNA-binding proteins and post-transcriptional gene regulation. *FEBS letters* **582**: 1977-1986

Goffeau A, Barrell BG, Bussey H, Davis RW, Dujon B, Feldmann H, Galibert F, Hoheisel JD, Jacq C, Johnston M, Louis EJ, Mewes HW, Murakami Y, Philippsen P, Tettelin H, Oliver SG (1996) Life with 6000 genes. *Science* **274**: 546, 563-547

Gorner W, Durchschlag E, Wolf J, Brown EL, Ammerer G, Ruis H, Schuller C (2002) Acute glucose starvation activates the nuclear localization signal of a stress-specific yeast transcription factor. *EMBO J* **21**: 135-144

Green DM, Marfatia KA, Crafton EB, Zhang X, Cheng X, Corbett AH (2002) Nab2p is required for poly(A) RNA export in *Saccharomyces cerevisiae* and is regulated by arginine methylation via Hmt1p. *J Biol Chem* **277**: 7752-7760

Grimminger-Marquardt V, Lashuel HA (2010) Structure and function of the molecular chaperone Hsp104 from yeast. *Biopolymers* **93**: 252-276

Grousl T, Ivanov P, Malcova I, Pompach P, Frydlova I, Slaba R, Senohrabkova L, Novakova L, Hasek J (2013) Heat shock-induced accumulation of translation elongation and termination factors precedes assembly of stress granules in *S. cerevisiae*. *PLoS one* **8**: e57083

Grunstein M, Gasser SM (2013) Epigenetics in *Saccharomyces cerevisiae*. *Cold Spring Harbor perspectives in biology* **5**

Grzechnik P, Tan-Wong SM, Proudfoot NJ (2014) Terminate and make a loop: regulation of transcriptional directionality. *Trends in biochemical sciences* **39**: 319-327

Gu M, Rajashankar KR, Lima CD (2010) Structure of the *Saccharomyces cerevisiae* Cet1-Ceg1 mRNA capping apparatus. *Structure* **18**: 216-227

Guldener U, Heck S, Fielder T, Beinhauer J, Hegemann JH (1996) A new efficient gene disruption cassette for repeated use in budding yeast. *Nucleic Acids Res* **24**: 2519-2524

Guzikowski AR, Chen YS, Zid BM (2019) Stress-induced mRNP granules: Form and function of processing bodies and stress granules. *Wiley interdisciplinary reviews RNA* **10**: e1524

Gwizdek C, Hobeika M, Kus B, Ossareh-Nazari B, Dargemont C, Rodriguez MS (2005) The mRNA nuclear export factor Hpr1 is regulated by Rsp5-mediated ubiquitylation. *J Biol Chem* **280**: 13401-13405

Gwizdek C, Iglesias N, Rodriguez MS, Ossareh-Nazari B, Hobeika M, Divita G, Stutz F, Dargemont C (2006) Ubiquitin-associated domain of Mex67 synchronizes recruitment of the mRNA export machinery with transcription. *Proceedings of the National Academy of Sciences of the United States of America* **103**: 16376-16381

Hacker S, Krebber H (2004) Differential export requirements for shuttling serine/arginine-type mRNA-binding proteins. *J Biol Chem* **279**:5049-5052

Hackmann A, Gross T, Baierlein C, Krebber H (2011) The mRNA export factor Npl3 mediates the nuclear export of large ribosomal subunits. *EMBO reports* **12**: 1024-1031

Hackmann A, Wu H, Schneider UM, Meyer K, Jung K, Krebber H (2014) Quality control of spliced mRNAs requires the shuttling SR proteins Gbp2 and Hrb1. *Nature communications* **5**: 3123

Hafner M, Landthaler M, Burger L, Khorshid M, Hausser J, Berninger P, Rothballer A, Ascano M, Jungkamp AC, Munschauer M, Ulrich A, Wardle GS, Dewell S, Zavolan M, Tuschl T (2010) PAR-CLIP--a method to identify transcriptome-wide the binding sites of RNA binding proteins. *J Vis Exp*

Hahn JS, Hu Z, Thiele DJ, Iyer VR (2004) Genome-wide analysis of the biology of stress responses through heat shock transcription factor. *Mol Cell Biol* **24**: 5249-5256

Hahn S, Young ET (2011) Transcriptional regulation in *Saccharomyces cerevisiae*: transcription factor regulation and function, mechanisms of initiation, and roles of activators and coactivators. *Genetics* **189**: 705-736

Harigaya Y, Parker R (2012) Global analysis of mRNA decay intermediates in *Saccharomyces cerevisiae*. *Proceedings of the National Academy of Sciences of the United States of America* **109**: 11764-11769

Hashikawa N, Sakurai H (2004) Phosphorylation of the yeast heat shock transcription factor is implicated in gene-specific activation dependent on the architecture of the heat shock element. *Mol Cell Biol* **24**: 3648-3659

Hector RE, Nykamp KR, Dheur S, Anderson JT, Non PJ, Urbinati CR, Wilson SM, Minvielle-Sebastia L, Swanson MS (2002) Dual requirement for yeast hnRNP Nab2p in mRNA poly(A) tail length control and nuclear export. *EMBO J* **21**: 1800-1810

Hellmuth K, Lau DM, Bischoff FR, Kunzler M, Hurt E, Simos G (1998) Yeast Los1p has properties of an exportin-like nucleocytoplasmic transport factor for tRNA. *Mol Cell Biol* **18**: 6374-6386

Henry KR, D'Hondt K, Chang JS, Nix DA, Cope MJ, Chan CS, Drubin DG, Lemmon SK (2003) The actin-regulating kinase Prk1p negatively regulates Scd5p, a suppressor of clathrin deficiency, in actin organization and endocytosis. *Current biology : CB* **13**: 1564-1569

Henry MF, Silver PA (1996) A novel methyltransferase (Hmt1p) modifies poly(A)⁺-RNA-binding proteins. *Mol Cell Biol* **16**: 3668-3678

- Hilleren P, McCarthy T, Rosbash M, Parker R, Jensen TH (2001) Quality control of mRNA 3'-end processing is linked to the nuclear exosome. *Nature* **413**: 538-542
- Ho B, Baryshnikova A, Brown GW (2018) Unification of Protein Abundance Datasets Yields a Quantitative *Saccharomyces cerevisiae* Proteome. *Cell systems* **6**: 192-205 e193
- Hobeika M, Brockmann C, Gruessing F, Neuhaus D, Divita G, Stewart M, Dargemont C (2009) Structural requirements for the ubiquitin-associated domain of the mRNA export factor Mex67 to bind its specific targets, the transcription elongation THO complex component Hpr1 and nucleoporin FXFG repeats. *J Biol Chem* **284**: 17575-17583
- Hobeika M, Brockmann C, Iglesias N, Gwizdek C, Neuhaus D, Stutz F, Stewart M, Divita G, Dargemont C (2007) Coordination of Hpr1 and ubiquitin binding by the UBA domain of the mRNA export factor Mex67. *Molecular biology of the cell* **18**: 2561-2568
- Hocine S, Singer RH, Grunwald D (2010) RNA processing and export. *Cold Spring Harbor perspectives in biology* **2**: a000752
- Hogan DJ, Riordan DP, Gerber AP, Herschlag D, Brown PO (2008) Diverse RNA-binding proteins interact with functionally related sets of RNAs, suggesting an extensive regulatory system. *PLoS biology* **6**: e255
- Horikoshi M, Yamamoto T, Ohkuma Y, Weil PA, Roeder RG (1990) Analysis of structure-function relationships of yeast TATA box binding factor TFIID. *Cell* **61**: 1171-1178
- Huang HK, Yoon H, Hannig EM, Donahue TF (1997) GTP hydrolysis controls stringent selection of the AUG start codon during translation initiation in *Saccharomyces cerevisiae*. *Genes & development* **11**: 2396-2413
- Huisinga KL, Pugh BF (2004) A genome-wide housekeeping role for TFIID and a highly regulated stress-related role for SAGA in *Saccharomyces cerevisiae*. *Mol Cell* **13**: 573-585
- Hurt E, Luo MJ, Rother S, Reed R, Strasser K (2004) Cotranscriptional recruitment of the serine-arginine-rich (SR)-like proteins Gbp2 and Hrb1 to nascent mRNA via the TREX complex. *Proceedings of the National Academy of Sciences of the United States of America* **101**: 1858-1862
- Hurt E, Strasser K, Segref A, Bailer S, Schlaich N, Presutti C, Tollervy D, Jansen R (2000) Mex67p mediates nuclear export of a variety of RNA polymerase II transcripts. *J Biol Chem* **275**: 8361-8368
- Hutten S, Kehlenbach RH (2007) CRM1-mediated nuclear export: to the pore and beyond. *Trends in cell biology* **17**: 193-201

Iglesias N, Tutucci E, Gwizdek C, Vinciguerra P, Von Dach E, Corbett AH, Dargemont C, Stutz F (2010) Ubiquitin-mediated mRNP dynamics and surveillance prior to budding yeast mRNA export. *Genes & development* **24**: 1927-1938

Itoh N, Yamada H, Kaziro Y, Mizumoto K (1987) Messenger RNA guanylyltransferase from *Saccharomyces cerevisiae*. Large scale purification, subunit functions, and subcellular localization. *J Biol Chem* **262**: 1989-1995

Izquierdo JM, Valcarcel J (2006) A simple principle to explain the evolution of pre-mRNA splicing. *Genes & development* **20**: 1679-1684

Jain S, Wheeler JR, Walters RW, Agrawal A, Barsic A, Parker R (2016) ATPase-Modulated Stress Granules Contain a Diverse Proteome and Substructure. *Cell* **164**: 487-498

Jamonnak N, Creamer TJ, Darby MM, Schaughency P, Wheelan SJ, Corden JL (2011) Yeast Nrd1, Nab3, and Sen1 transcriptome-wide binding maps suggest multiple roles in post-transcriptional RNA processing. *RNA* **17**: 2011-2025

Jani D, Lutz S, Marshall NJ, Fischer T, Kohler A, Ellisdon AM, Hurt E, Stewart M (2009) Sus1, Cdc31, and the Sac3 CID region form a conserved interaction platform that promotes nuclear pore association and mRNA export. *Mol Cell* **33**: 727-737

Janke C, Magiera MM, Rathfelder N, Taxis C, Reber S, Maekawa H, Moreno-Borchart A, Doenges G, Schwob E, Schiebel E, Knop M (2004) A versatile toolbox for PCR-based tagging of yeast genes: new fluorescent proteins, more markers and promoter substitution cassettes. *Yeast* **21**: 947-962

Jenkins GM (2003) The emerging role for sphingolipids in the eukaryotic heat shock response. *Cellular and molecular life sciences : CMLS* **60**: 701-710

Jensen TH, Patricio K, McCarthy T, Rosbash M (2001) A block to mRNA nuclear export in *S. cerevisiae* leads to hyperadenylation of transcripts that accumulate at the site of transcription. *Mol Cell* **7**: 887-898

Jimeno S, Aguilera A (2010) The THO complex as a key mRNP biogenesis factor in development and cell differentiation. *Journal of biology* **9**: 6

Jin L, Zhang K, Sternglanz R, Neiman AM (2017) Predicted RNA Binding Proteins Pes4 and Mip6 Regulate mRNA Levels, Translation, and Localization during Sporulation in Budding Yeast. *Mol Cell Biol* **37**

Johnson SA, Cubberley G, Bentley DL (2009) Cotranscriptional recruitment of the mRNA export factor Yra1 by direct interaction with the 3' end processing factor Pcf11. *Mol Cell* **33**: 215-226

- Johnston GC, Singer RA (1980) Ribosomal precursor RNA metabolism and cell division in the yeast *Saccharomyces cerevisiae*. *Molecular & general genetics* : **MGG 178**: 357-360
- Johnston M (1996) The complete code for a eukaryotic cell. Genome sequencing. *Current biology* : **CB 6**: 500-503
- Jurica MS, Moore MJ (2003) Pre-mRNA splicing: awash in a sea of proteins. *Mol Cell* **12**: 5-14
- Kabir MA, Uddin W, Narayanan A, Reddy PK, Jairajpuri MA, Sherman F, Ahmad Z (2011) Functional Subunits of Eukaryotic Chaperonin CCT/TRiC in Protein Folding. *Journal of amino acids* **2011**: 843206
- Kaffman A, Rank NM, O'Neill EM, Huang LS, O'Shea EK (1998) The receptor Msn5 exports the phosphorylated transcription factor Pho4 out of the nucleus. *Nature* **396**: 482-486
- Kaganovich M, Snyder M (2012) Phosphorylation of yeast transcription factors correlates with the evolution of novel sequence and function. *Journal of proteome research* **11**: 261-268
- Kaluarachchi Duffy S, Friesen H, Baryshnikova A, Lambert JP, Chong YT, Figeys D, Andrews B (2012) Exploring the yeast acetylome using functional genomics. *Cell* **149**: 936-948
- Kaplan CD (2013) Basic mechanisms of RNA polymerase II activity and alteration of gene expression in *Saccharomyces cerevisiae*. *Biochimica et biophysica acta* **1829**: 39-54
- Karamyshev AL, Karamysheva ZN (2018) Lost in Translation: Ribosome-Associated mRNA and Protein Quality Controls. *Frontiers in genetics* **9**: 431
- Karathia H, Vilaprinyo E, Sorribas A, Alves R (2011) *Saccharomyces cerevisiae* as a model organism: a comparative study. *PloS one* **6**:e16015
- Katahira J, Strasser K, Podtelejnikov A, Mann M, Jung JU, Hurt E (1999) The Mex67p-mediated nuclear mRNA export pathway is conserved from yeast to human. *EMBO J* **18**: 2593-2609
- Kelly SM, Corbett AH (2009) Messenger RNA export from the nucleus: a series of molecular wardrobe changes. *Traffic* **10**: 1199-1208
- Keogh MC, Kim JA, Downey M, Fillingham J, Chowdhury D, Harrison JC, Onishi M, Datta N, Galicia S, Emili A, Lieberman J, Shen X, Buratowski S, Haber JE, Durocher D, Greenblatt JF, Krogan NJ (2006) A phosphatase complex that dephosphorylates gammaH2AX regulates DNA damage checkpoint recovery. *Nature* **439**: 497-501
- Khong A, Jain S, Matheny T, Wheeler JR, Parker R (2018) Isolation of mammalian stress granule cores for RNA-Seq analysis. *Methods* **137**:49-54

- Khong A, Matheny T, Jain S, Mitchell SF, Wheeler JR, Parker R (2017) The Stress Granule Transcriptome Reveals Principles of mRNA Accumulation in Stress Granules. *Mol Cell* **68**: 808-820 e805
- Khong A, Parker R (2018) mRNP architecture in translating and stress conditions reveals an ordered pathway of mRNP compaction. *The Journal of cell biology* **217**: 4124-4140
- Kim D, Pertea G, Trapnell C, Pimentel H, Kelley R, Salzberg SL (2013) TopHat2: accurate alignment of transcriptomes in the presence of insertions, deletions and gene fusions. *Genome Biol* **14**: R36
- Kim M, Krogan NJ, Vasiljeva L, Rando OJ, Nedeja E, Greenblatt JF, Buratowski S (2004) The yeast Rat1 exonuclease promotes transcription termination by RNA polymerase II. *Nature* **432**: 517-522
- Kinsella RJ, Kahari A, Haider S, Zamora J, Proctor G, Spudich G, Almeida-King J, Staines D, Derwent P, Kerhornou A, Kersey P, Flicek P (2011) Ensembl BioMart: a hub for data retrieval across taxonomic space. *Database (Oxford)* **2011**: bar030
- Kirli K, Karaca S, Dehne HJ, Samwer M, Pan KT, Lenz C, Urlaub H, Gorlich D (2015) A deep proteomics perspective on CRM1-mediated nuclear export and nucleocytoplasmic partitioning. *eLife* **4**
- Klauer AA, van Hoof A (2012) Degradation of mRNAs that lack a stop codon: a decade of nonstop progress. *Wiley interdisciplinary reviews RNA* **3**: 649-660
- Knop M, Siegers K, Pereira G, Zachariae W, Winsor B, Nasmyth K, Schiebel E (1999) Epitope tagging of yeast genes using a PCR-based strategy: more tags and improved practical routines. *Yeast* **15**: 963-972
- Kobor MS, Greenblatt J (2002) Regulation of transcription elongation by phosphorylation. *Biochimica et biophysica acta* **1577**: 261-275
- Konarska MM, Query CC (2005) Insights into the mechanisms of splicing: more lessons from the ribosome. *Genes & development* **19**: 2255-2260
- Kong J, Liebhaber SA (2007) A cell type-restricted mRNA surveillance pathway triggered by ribosome extension into the 3' untranslated region. *Nature structural & molecular biology* **14**: 670-676
- Kong KY, Tang HM, Pan K, Huang Z, Lee TH, Hinnebusch AG, Jin DY, Wong CM (2014) Cotranscriptional recruitment of yeast TRAMP complex to intronic sequences promotes optimal pre-mRNA splicing. *Nucleic Acids Res* **42**: 643-660

- Kosugi S, Hasebe M, Tomita M, Yanagawa H (2008) Nuclear export signal consensus sequences defined using a localization-based yeast selection system. *Traffic* **9**: 2053-2062
- Krebber H, Taura T, Lee MS, Silver PA (1999) Uncoupling of the hnRNP Npl3p from mRNAs during the stress-induced block in mRNA export. *Genes & development* **13**: 1994-2004
- Kremer SB, Gross DS (2009) SAGA and Rpd3 chromatin modification complexes dynamically regulate heat shock gene structure and expression. *J Biol Chem* **284**: 32914-32931
- Kress TL, Krogan NJ, Guthrie C (2008) A single SR-like protein, Npl3, promotes pre-mRNA splicing in budding yeast. *Mol Cell* **32**: 727-734
- Krogan NJ, Dover J, Wood A, Schneider J, Heidt J, Boateng MA, Dean K, Ryan OW, Golshani A, Johnston M, Greenblatt JF, Shilatifard A (2003) The Paf1 complex is required for histone H3 methylation by COMPASS and Dot1p: linking transcriptional elongation to histone methylation. *Mol Cell* **11**: 721-729
- Kufel J, Bousquet-Antonelli C, Beggs JD, Tollervey D (2004) Nuclear pre-mRNA decapping and 5' degradation in yeast require the Lsm2-8p complex. *Mol Cell Biol* **24**: 9646-9657
- Kushnirov VV (2000) Rapid and reliable protein extraction from yeast. *Yeast* **16**: 857-860
- Kutay U, Guttinger S (2005) Leucine-rich nuclear-export signals: born to be weak. *Trends in cell biology* **15**: 121-124
- la Cour T, Kiemer L, Molgaard A, Gupta R, Skriver K, Brunak S (2004) Analysis and prediction of leucine-rich nuclear export signals. *Protein engineering, design & selection : PEDS* **17**: 527-536
- LaCava J, Houseley J, Saveanu C, Petfalski E, Thompson E, Jacquier A, Tollervey D (2005) RNA degradation by the exosome is promoted by a nuclear polyadenylation complex. *Cell* **121**: 713-724
- LaGrandeur TE, Parker R (1998) Isolation and characterization of Dcp1p, the yeast mRNA decapping enzyme. *EMBO J* **17**: 1487-1496
- Lanctot C, Cheutin T, Cremer M, Cavalli G, Cremer T (2007) Dynamic genome architecture in the nuclear space: regulation of gene expression in three dimensions. *Nature reviews Genetics* **8**: 104-115
- Langmead B, Trapnell C, Pop M, Salzberg SL (2009) Ultrafast and memory-efficient alignment of short DNA sequences to the human genome. *Genome Biol* **10**: R25

- Lawrence M, Daujat S, Schneider R (2016) Lateral Thinking: How Histone Modifications Regulate Gene Expression. *Trends in genetics : TIG* **32**: 42-56
- Lee MS, Henry M, Silver PA (1996) A protein that shuttles between the nucleus and the cytoplasm is an important mediator of RNA export. *Genes & development* **10**: 1233-1246
- Lee P, Cho BR, Joo HS, Hahn JS (2008) Yeast Yak1 kinase, a bridge between PKA and stress-responsive transcription factors, Hsf1 and Msn2/Msn4. *Molecular microbiology* **70**: 882-895
- Lee P, Kim MS, Paik SM, Choi SH, Cho BR, Hahn JS (2013) Rim15-dependent activation of Hsf1 and Msn2/4 transcription factors by direct phosphorylation in *Saccharomyces cerevisiae*. *FEBS letters* **587**: 3648-3655
- Lee W, Tillo D, Bray N, Morse RH, Davis RW, Hughes TR, Nislow C (2007) A high-resolution atlas of nucleosome occupancy in yeast. *Nature genetics* **39**: 1235-1244
- Lei EP, Krebber H, Silver PA (2001) Messenger RNAs are recruited for nuclear export during transcription. *Genes & development* **15**: 1771-1782
- Lei EP, Stern CA, Fahrenkrog B, Krebber H, Moy TI, Aebi U, Silver PA (2003) Sac3 is an mRNA export factor that localizes to cytoplasmic fibrils of nuclear pore complex. *Molecular biology of the cell* **14**: 836-847
- Levin DE (2005) Cell wall integrity signaling in *Saccharomyces cerevisiae*. *Microbiology and molecular biology reviews : MMBR* **69**: 262-291
- Lewis JD, Izaurralde E (1997) The role of the cap structure in RNA processing and nuclear export. *European journal of biochemistry* **247**:461-469
- Li B, Carey M, Workman JL (2007) The role of chromatin during transcription. *Cell* **128**: 707-719
- Li B, Yen TS (2002) Characterization of the nuclear export signal of polypyrimidine tract-binding protein. *J Biol Chem* **277**: 10306-10314
- Li H, Handsaker B, Wysoker A, Fennell T, Ruan J, Homer N, Marth G, Abecasis G, Durbin R (2009) The Sequence Alignment/Map format and SAMtools. *Bioinformatics* **25**: 2078-2079
- Li J, Qian X, Sha B (2009) Heat shock protein 40: structural studies and their functional implications. *Protein and peptide letters* **16**: 606-612
- Ling SH, Song H (2010) Mechanistic insights into mRNA export through structures of Dbp5. *RNA biology* **7**: 23-27

- Liu H, Kiledjian M (2005) Scavenger decapping activity facilitates 5' to 3' mRNA decay. *Mol Cell Biol* **25**: 9764-9772
- Liu Q, Greimann JC, Lima CD (2006) Reconstitution, activities, and structure of the eukaryotic RNA exosome. *Cell* **127**: 1223-1237
- Liu X, Bushnell DA, Kornberg RD (2013) RNA polymerase II transcription: structure and mechanism. *Biochimica et biophysica acta* **1829**:2-8
- Livak KJ, Schmittgen TD (2001) Analysis of relative gene expression data using real-time quantitative PCR and the 2^{(-Delta Delta C(T))} Method. *Methods* **25**: 402-408
- Loh PG, Song H (2010) Structural and mechanistic insights into translation termination. *Current opinion in structural biology* **20**: 98-103
- Longtine MS, McKenzie A, 3rd, Demarini DJ, Shah NG, Wach A, Brachat A, Philippsen P, Pringle JR (1998) Additional modules for versatile and economical PCR-based gene deletion and modification in *Saccharomyces cerevisiae*. *Yeast* **14**: 953-961
- Low JK, Im H, Erce MA, Hart-Smith G, Snyder MP, Wilkins MR (2016) Protein substrates of the arginine methyltransferase Hmt1 identified by proteome arrays. *Proteomics* **16**: 465-476
- Luger K, Mader AW, Richmond RK, Sargent DF, Richmond TJ (1997) Crystal structure of the nucleosome core particle at 2.8 Å resolution. *Nature* **389**: 251-260
- Lund MK, Guthrie C (2005) The DEAD-box protein Dbp5p is required to dissociate Mex67p from exported mRNPs at the nuclear rim. *Mol Cell* **20**: 645-651
- Lund MK, Kress TL, Guthrie C (2008) Autoregulation of Npl3, a yeast SR protein, requires a novel downstream region and serine phosphorylation. *Mol Cell Biol* **28**: 3873-3881
- Luse DS (2014) The RNA polymerase II preinitiation complex. Through what pathway is the complex assembled? *Transcription* **5**: e27050
- Ma WK, Cloutier SC, Tran EJ (2013) The DEAD-box protein Dbp2 functions with the RNA-binding protein Yra1 to promote mRNP assembly. *Journal of molecular biology* **425**: 3824-3838
- Mao X, Schwer B, Shuman S (1995) Yeast mRNA cap methyltransferase is a 50-kilodalton protein encoded by an essential gene. *Mol Cell Biol* **15**: 4167-4174
- Marquardt S, Escalante-Chong R, Pho N, Wang J, Churchman LS, Springer M, Buratowski S (2014) A Chromatin-Based Mechanism for Limiting Divergent Noncoding Transcription. *Cell* **158**: 462

- Martani F, Marano F, Bertacchi S, Porro D, Branduardi P (2015) The *Saccharomyces cerevisiae* poly(A) binding protein Pab1 as a target for eliciting stress tolerant phenotypes. *Scientific reports* **5**: 18318
- Martinez-Lumbreras S, Taverniti V, Zorrilla S, Seraphin B, Perez-Canadillas JM (2016) Gbp2 interacts with THO/TREX through a novel type of RRM domain. *Nucleic Acids Res* **44**: 437-448
- Martinez-Pastor MT, Marchler G, Schuller C, Marchler-Bauer A, Ruis H, Estruch F (1996) The *Saccharomyces cerevisiae* zinc finger proteins Msn2p and Msn4p are required for transcriptional induction through the stress response element (STRE). *EMBO J* **15**: 2227-2235
- Maurer P, Redd M, Solsbacher J, Bischoff FR, Greiner M, Podtelejnikov AV, Mann M, Stade K, Weis K, Schlenstedt G (2001) The nuclear export receptor Xpo1p forms distinct complexes with NES transport substrates and the yeast Ran binding protein 1 (Yrb1p). *Molecular biology of the cell* **12**: 539-549
- Mavrich TN, Ioshikhes IP, Venters BJ, Jiang C, Tomsho LP, Qi J, Schuster SC, Albert I, Pugh BF (2008) A barrier nucleosome model for statistical positioning of nucleosomes throughout the yeast genome. *Genome research* **18**: 1073-1083
- McBride AE, Cook JT, Stemmler EA, Rutledge KL, McGrath KA, Rubens JA (2005) Arginine methylation of yeast mRNA-binding protein Npl3 directly affects its function, nuclear export, and intranuclear protein interactions. *J Biol Chem* **280**: 30888-30898
- McKinlay A, Araya CL, Fields S (2011) Genome-Wide Analysis of Nascent Transcription in *Saccharomyces cerevisiae*. *G3 (Bethesda)* **1**:549-558
- Medina DA, Jordan-Pla A, Millan-Zambrano G, Chavez S, Choder M, Perez-Ortin JE (2014) Cytoplasmic 5'-3' exonuclease Xrn1p is also a genome-wide transcription factor in yeast. *Frontiers in genetics* **5**: 1
- Melamed D, Young DL, Gamble CE, Miller CR, Fields S (2013) Deep mutational scanning of an RRM domain of the *Saccharomyces cerevisiae* poly(A)-binding protein. *RNA* **19**: 1537-1551
- Mell, Joshua C and Burgess, Sean M (2017) Yeast as a Model Genetic Organism. In: eLS. John Wiley & Sons, Ltd: Chichester
- Merran J, Corden JL (2017) Yeast RNA-Binding Protein Nab3 Regulates Genes Involved in Nitrogen Metabolism. *Mol Cell Biol* **37**
- Messier V, Zenklusen D, Michnick SW (2013) A nutrient-responsive pathway that determines M phase timing through control of B-cyclin mRNA stability. *Cell* **153**: 1080-1093

- Meyer M, Vilardell J (2009) The quest for a message: budding yeast, a model organism to study the control of pre-mRNA splicing. *Briefings in functional genomics & proteomics* **8**: 60-67
- Millar CB, Grunstein M (2006) Genome-wide patterns of histone modifications in yeast. *Nature reviews Molecular cell biology* **7**: 657-666
- Miller, JH (1972) Experiments in Molecular Genetics. *Cold Spring Harbor Laboratory, Cold Spring Harbor.*
- Miron-Garcia MC, Garrido-Godino AI, Garcia-Molinero V, Hernandez-Torres F, Rodriguez-Navarro S, Navarro F (2013) The prefoldin bud27 mediates the assembly of the eukaryotic RNA polymerases in an rpb5-dependent manner. *PLoS genetics* **9**: e1003297
- Mischo HE, Proudfoot NJ (2013) Disengaging polymerase: terminating RNA polymerase II transcription in budding yeast. *Biochimica et biophysica acta* **1829**: 174-185
- Mitchell SF, Jain S, She M, Parker R (2013) Global analysis of yeast mRNPs. *Nature structural & molecular biology* **20**: 127-133
- Moehle EA, Ryan CJ, Krogan NJ, Kress TL, Guthrie C (2012) The yeast SR-like protein Npl3 links chromatin modification to mRNA processing. *PLoS genetics* **8**: e1003101
- Montaner D, Dopazo J (2010) Multidimensional gene set analysis of genomic data. *PLoS one* **5**: e10348
- Morano KA, Grant CM, Moye-Rowley WS (2012) The response to heat shock and oxidative stress in *Saccharomyces cerevisiae*. *Genetics* **190**: 1157-1195
- Morgan JT, Fink GR, Bartel DP (2019) Excised linear introns regulate growth in yeast. *Nature* **565**: 606-611
- Mortazavi A, Williams BA, McCue K, Schaeffer L, Wold B (2008) Mapping and quantifying mammalian transcriptomes by RNA-Seq. *Nat Methods* **5**: 621-628
- Mumberg D, Muller R, Funk M (1994) Regulatable promoters of *Saccharomyces cerevisiae*: comparison of transcriptional activity and their use for heterologous expression. *Nucleic Acids Res* **22**: 5767-5768
- Murphy MW, Olson BL, Siliciano PG (2004) The yeast splicing factor Prp40p contains functional leucine-rich nuclear export signals that are essential for splicing. *Genetics* **166**: 53-65
- Muto Y, Yokoyama S (2012) Structural insight into RNA recognition motifs: versatile molecular Lego building blocks for biological systems. *Wiley interdisciplinary reviews RNA* **3**: 229-246

Nagarajan VK, Jones CI, Newbury SF, Green PJ (2013) XRN 5'→3' exoribonucleases: structure, mechanisms and functions. *Biochimica et biophysica acta* **1829**: 590-603

Narlikar GJ, Fan HY, Kingston RE (2002) Cooperation between complexes that regulate chromatin structure and transcription. *Cell* **108**: 475-487

Neuber A, Franke J, Wittstruck A, Schlenstedt G, Sommer T, Stade K (2008) Nuclear export receptor Xpo1/Crm1 is physically and functionally linked to the spindle pole body in budding yeast. *Mol Cell Biol* **28**: 5348-5358

Neville M, Rosbash M (1999) The NES-Crm1p export pathway is not a major mRNA export route in *Saccharomyces cerevisiae*. *EMBO J* **18**:3746-3756

Nguyen HQ, Bosco G (2015) Gene Positioning Effects on Expression in Eukaryotes. *Annual review of genetics* **49**: 627-646

Nieto-Sotelo J, Wiederrecht G, Okuda A, Parker CS (1990) The yeast heat shock transcription factor contains a transcriptional activation domain whose activity is repressed under nonshock conditions. *Cell* **62**: 807-817

Nilsen TW (2003) The spliceosome: the most complex macromolecular machine in the cell? *BioEssays : news and reviews in molecular, cellular and developmental biology* **25**: 1147-1149

Nilsen TW (2005) Spliceosome assembly in yeast: one ChIP at a time? *Nature structural & molecular biology* **12**: 571-573

Nino CA, Herissant L, Babour A, Dargemont C (2013) mRNA nuclear export in yeast. *Chemical reviews* **113**: 8523-8545

Nissan T, Rajyaguru P, She M, Song H, Parker R (2010) Decapping activators in *Saccharomyces cerevisiae* act by multiple mechanisms. *Mol Cell* **39**: 773-783

Noble KN, Tran EJ, Alcazar-Roman AR, Hodge CA, Cole CN, Wentz SR (2011) The Dbp5 cycle at the nuclear pore complex during mRNA export II: nucleotide cycling and mRNP remodeling by Dbp5 are controlled by Nup159 and Gle1. *Genes & development* **25**: 1065-1077

Nudler E (2012) RNA polymerase backtracking in gene regulation and genome instability. *Cell* **149**: 1438-1445

Oeffinger M, Zenklusen D (2012) To the pore and through the pore: a story of mRNA export kinetics. *Biochimica et biophysica acta* **1819**:494-506

- Oliete-Calvo P, Serrano-Quilez J, Nuno-Cabanes C, Perez-Martinez ME, Soares LM, Dichtl B, Buratowski S, Perez-Ortin JE, Rodriguez-Navarro S (2018) A role for Mog1 in H2Bub1 and H3K4me3 regulation affecting RNAPII transcription and mRNA export. *EMBO reports* **19**
- Ozsolak F, Kapranov P, Foissac S, Kim SW, Fishilevich E, Monaghan AP, John B, Milos PM (2010) Comprehensive polyadenylation site maps in yeast and human reveal pervasive alternative polyadenylation. *Cell* **143**: 1018-1029
- Palomino-Schatzlein M, Molina-Navarro MM, Tormos-Perez M, Rodriguez-Navarro S, Pineda-Lucena A (2013) Optimised protocols for the metabolic profiling of *S. cerevisiae* by 1H-NMR and HRMAS spectroscopy. *Anal Bioanal Chem* **405**: 8431-8441
- Pamblanco M, Oliete-Calvo P, Garcia-Oliver E, Luz Valero M, Sanchez del Pino MM, Rodriguez-Navarro S (2014) Unveiling novel interactions of histone chaperone Asf1 linked to TREX-2 factors Sus1 and Thp1. *Nucleus* **5**: 247-259
- Parenteau J, Durand M, Veronneau S, Lacombe AA, Morin G, Guerin V, Cecez B, Gervais-Bird J, Koh CS, Brunelle D, Wellinger RJ, Chabot B, Abou Elela S (2008) Deletion of many yeast introns reveals a minority of genes that require splicing for function. *Molecular biology of the cell* **19**: 1932-1941
- Parenteau J, Maignon L, Berthoumieux M, Catala M, Gagnon V, Abou Elela S (2019) Introns are mediators of cell response to starvation. *Nature* **565**: 612-617
- Parker R (2012) RNA degradation in *Saccharomyces cerevisiae*. *Genetics* **191**: 671-702
- Parker R, Sheth U (2007) P bodies and the control of mRNA translation and degradation. *Mol Cell* **25**: 635-646
- Pascual-Garcia P, Govind CK, Queralt E, Cuenca-Bono B, Llopis A, Chavez S, Hinnebusch AG, Rodriguez-Navarro S (2008) Sus1 is recruited to coding regions and functions during transcription elongation in association with SAGA and TREX2. *Genes & development* **22**:2811-2822
- Peiro-Chova L, Estruch F (2009) The yeast RNA polymerase II-associated factor Iwr1p is involved in the basal and regulated transcription of specific genes. *J Biol Chem* **284**: 28958-28967
- Perez-Ortin JE, Alepuz P, Chavez S, Choder M (2013) Eukaryotic mRNA decay: methodologies, pathways, and links to other stages of gene expression. *Journal of molecular biology* **425**: 3750-3775

- Phillips S, Butler JS (2003) Contribution of domain structure to the RNA 3' end processing and degradation functions of the nuclear exosome subunit Rrp6p. *RNA* **9**: 1098-1107
- Porrua O, Libri D (2015) Transcription termination and the control of the transcriptome: why, where and how to stop. *Nature reviews Molecular cell biology* **16**: 190-202
- Prodromou C, Pearl LH (2003) Structure and functional relationships of Hsp90. *Current cancer drug targets* **3**: 301-323
- Protter DSW, Parker R (2016) Principles and Properties of Stress Granules. *Trends in cell biology* **26**: 668-679
- Proudfoot NJ, Furger A, Dye MJ (2002) Integrating mRNA processing with transcription. *Cell* **108**: 501-512
- Ptacek J, Devgan G, Michaud G, Zhu H, Zhu X, Fasolo J, Guo H, Jona G, Bretkreutz A, Sopko R, McCartney RR, Schmidt MC, Rachidi N, Lee SJ, Mah AS, Meng L, Stark MJ, Stern DF, De Virgilio C, Tyers M, Andrews B, Gerstein M, Schweitzer B, Predki PF, Snyder M (2005) Global analysis of protein phosphorylation in yeast. *Nature* **438**: 679-684
- Puig O, Caspary F, Rigaut G, Rutz B, Bouveret E, Bragado-Nilsson E, Wilm M, Seraphin B (2001) The tandem affinity purification (TAP) method: a general procedure of protein complex purification. *Methods* **24**: 218-229
- Rajvanshi PK, Arya M, Rajasekharan R (2017) The stress-regulatory transcription factors Msn2 and Msn4 regulate fatty acid oxidation in budding yeast. *J Biol Chem* **292**: 18628-18643
- Rajyaguru P, She M, Parker R (2012) Scd6 targets eIF4G to repress translation: RGG motif proteins as a class of eIF4G-binding proteins. *Mol Cell* **45**: 244-254
- Rao BS, Parker R (2017) Numerous interactions act redundantly to assemble a tunable size of P bodies in *Saccharomyces cerevisiae*. *Proceedings of the National Academy of Sciences of the United States of America* **114**: E9569-E9578
- Reed R (2003) Coupling transcription, splicing and mRNA export. *Current opinion in cell biology* **15**: 326-331
- Reed R, Cheng H (2005) TREX, SR proteins and export of mRNA. *Current opinion in cell biology* **17**: 269-273
- Reuter LM, Meinel DM, Strasser K (2015) The poly(A)-binding protein Nab2 functions in RNA polymerase III transcription. *Genes & development* **29**: 1565-1575

- Riback JA, Katanski CD, Kear-Scott JL, Pilipenko EV, Rojek AE, Sosnick TR, Drummond DA (2017) Stress-Triggered Phase Separation Is an Adaptive, Evolutionarily Tuned Response. *Cell* **168**: 1028-1040 e1019
- Richard P, Manley JL (2009) Transcription termination by nuclear RNA polymerases. *Genes & development* **23**: 1247-1269
- Rienzo A, Pascual-Ahuir A, Proft M (2012) The use of a real-time luciferase assay to quantify gene expression dynamics in the living yeast cell. *Yeast* **29**: 219-231
- Robinson MD, Oshlack A (2010) A scaling normalization method for differential expression analysis of RNA-seq data. *Genome Biol* **11**: R25
- Rodriguez-Navarro S, Fischer T, Luo MJ, Antunez O, Brettschneider S, Lechner J, Perez-Ortin JE, Reed R, Hurt E (2004) Sus1, a functional component of the SAGA histone acetylase complex and the nuclear pore-associated mRNA export machinery. *Cell* **116**: 75-86
- Rodriguez-Navarro S, Hurt E (2011) Linking gene regulation to mRNA production and export. *Current opinion in cell biology* **23**: 302-309
- Rodriguez-Navarro S, Strasser K, Hurt E (2002) An intron in the YRA1 gene is required to control Yra1 protein expression and mRNA export in yeast. *EMBO reports* **3**: 438-442
- Rollenhagen C, Hodge CA, Cole CN (2007) Following temperature stress, export of heat shock mRNA occurs efficiently in cells with mutations in genes normally important for mRNA export. *Eukaryot Cell* **6**: 505-513
- Rondon AG, Jimeno S, Aguilera A (2010) The interface between transcription and mRNP export: from THO to THSC/TREX-2. *Biochimica et biophysica acta* **1799**: 533-538
- Ruiz-Roig C, Vieitez C, Posas F, de Nadal E (2010) The Rpd3L HDAC complex is essential for the heat stress response in yeast. *Molecular microbiology* **76**: 1049-1062
- Saavedra C, Tung KS, Amberg DC, Hopper AK, Cole CN (1996) Regulation of mRNA export in response to stress in *Saccharomyces cerevisiae*. *Genes & development* **10**: 1608-1620
- Sachs AB, Davis RW, Kornberg RD (1987) A single domain of yeast poly(A)-binding protein is necessary and sufficient for RNA binding and cell viability. *Mol Cell Biol* **7**: 3268-3276
- Sachs AB, Sarnow P, Hentze MW (1997) Starting at the beginning, middle, and end: translation initiation in eukaryotes. *Cell* **89**: 831-838

- Sadeh A, Movshovich N, Volokh M, Gheber L, Aharoni A (2011) Fine-tuning of the Msn2/4-mediated yeast stress responses as revealed by systematic deletion of Msn2/4 partners. *Molecular biology of the cell* **22**: 3127-3138
- Safaei N, Kozlov G, Noronha AM, Xie J, Wilds CJ, Gehring K (2012) Interdomain allostery promotes assembly of the poly(A) mRNA complex with PABP and eIF4G. *Mol Cell* **48**: 375-386
- Sainsbury S, Bernecky C, Cramer P (2015) Structural basis of transcription initiation by RNA polymerase II. *Nature reviews Molecular cell biology* **16**: 129-143
- Saleh A, Collart M, Martens JA, Genereaux J, Allard S, Cote J, Brandl CJ (1998) TOM1p, a yeast hect-domain protein which mediates transcriptional regulation through the ADA/SAGA coactivator complexes. *Journal of molecular biology* **282**: 933-946
- Sambrook J, Russell DW (2006) Preparation of denaturing polyacrylamide gels. *CSH Protoc* **2006**
- Santiveri CM, Mirassou Y, Rico-Lastres P, Martinez-Lumbreras S, Perez-Canadillas JM (2011) Pub1p C-terminal RRM domain interacts with Tif4631p through a conserved region neighbouring the Pab1p binding site. *PLoS one* **6**: e24481
- Santos-Pereira JM, Garcia-Rubio ML, Gonzalez-Aguilera C, Luna R, Aguilera A (2014) A genome-wide function of THSC/TREX-2 at active genes prevents transcription-replication collisions. *Nucleic Acids Res* **42**: 12000-12014
- Santos-Rosa H, Moreno H, Simos G, Segref A, Fahrenkrog B, Pante N, Hurt E (1998) Nuclear mRNA export requires complex formation between Mex67p and Mtr2p at the nuclear pores. *Mol Cell Biol* **18**: 6826-6838
- Scarcelli JJ, Hodge CA, Cole CN (2007) The yeast integral membrane protein Apq12 potentially links membrane dynamics to assembly of nuclear pore complexes. *The Journal of cell biology* **178**: 799-812
- Scarcelli JJ, Viggiano S, Hodge CA, Heath CV, Amberg DC, Cole CN (2008) Synthetic genetic array analysis in *Saccharomyces cerevisiae* provides evidence for an interaction between RAT8/DBP5 and genes encoding P-body components. *Genetics* **179**: 1945-1955
- Schaughency P, Merran J, Corden JL (2014) Genome-wide mapping of yeast RNA polymerase II termination. *PLoS genetics* **10**: e1004632
- Scherrer T, Mittal N, Janga SC, Gerber AP (2010) A screen for RNA-binding proteins in yeast indicates dual functions for many enzymes. *PLoS one* **5**: e15499

Schindelin J, Arganda-Carreras I, Frise E, Kaynig V, Longair M, Pietzsch T, Preibisch S, Rueden C, Saalfeld S, Schmid B, Tinevez JY, White DJ, Hartenstein V, Eliceiri K, Tomancak P, Cardona A (2012) Fiji: an open-source platform for biological-image analysis. *Nat Methods* **9**:676-682

Schmid M, Olszewski P, Pelechano V, Gupta I, Steinmetz LM, Jensen TH (2015) The Nuclear PolyA-Binding Protein Nab2p Is Essential for mRNA Production. *Cell reports* **12**: 128-139

Schmitt AP, McEntee K (1996) Msn2p, a zinc finger DNA-binding protein, is the transcriptional activator of the multistress response in *Saccharomyces cerevisiae*. *Proceedings of the National Academy of Sciences of the United States of America* **93**: 5777-5782

Segref A, Sharma K, Doye V, Hellwig A, Huber J, Luhrmann R, Hurt E (1997) Mex67p, a novel factor for nuclear mRNA export, binds to both poly(A)+ RNA and nuclear pores. *EMBO J* **16**: 3256-3271

Shalgi R, Hurt JA, Krykbaeva I, Taipale M, Lindquist S, Burge CB (2013) Widespread regulation of translation by elongation pausing in heat shock. *Mol Cell* **49**: 439-452

Shandilya J, Roberts SG (2012) The transcription cycle in eukaryotes: from productive initiation to RNA polymerase II recycling. *Biochimica et biophysica acta* **1819**: 391-400

Sharma D, Masison DC (2009) Hsp70 structure, function, regulation and influence on yeast prions. *Protein and peptide letters* **16**: 571-581

Shen EC, Henry MF, Weiss VH, Valentini SR, Silver PA, Lee MS (1998) Arginine methylation facilitates the nuclear export of hnRNP proteins. *Genes & development* **12**: 679-691

Shirley RL, Lelivelt MJ, Schenkman LR, Dahlseid JN, Culbertson MR (1998) A factor required for nonsense-mediated mRNA decay in yeast is exported from the nucleus to the cytoplasm by a nuclear export signal sequence. *Journal of cell science* **111 (Pt 21)**: 3129-3143

Shoemaker CJ, Green R (2012) Translation drives mRNA quality control. *Nature structural & molecular biology* **19**: 594-601

Shu JJ (2017) A new integrated symmetrical table for genetic codes. *Bio Systems* **151**: 21-26

Shuman S (2001) Structure, mechanism, and evolution of the mRNA capping apparatus. *Progress in nucleic acid research and molecular biology* **66**: 1-40

Sikorski RS, Hieter P (1989) A system of shuttle vectors and yeast host strains designed for efficient manipulation of DNA in *Saccharomyces cerevisiae*. *Genetics* **122**: 19-27

Singer MA, Lindquist S (1998) Thermotolerance in *Saccharomyces cerevisiae*: the Yin and Yang of trehalose. *Trends in biotechnology* **16**:460-468

Snay-Hodge CA, Colot HV, Goldstein AL, Cole CN (1998) Dbp5p/Rat8p is a yeast nuclear pore-associated DEAD-box protein essential for RNA export. *EMBO J* **17**: 2663-2676

Soheilypour M, Mofrad MRK (2018) Quality control of mRNAs at the entry of the nuclear pore: Cooperation in a complex molecular system. *Nucleus* **9**: 202-211

Stade K, Ford CS, Guthrie C, Weis K (1997) Exportin 1 (Crm1p) is an essential nuclear export factor. *Cell* **90**: 1041-1050

Sterner DE, Grant PA, Roberts SM, Duggan LJ, Belotserkovskaya R, Pacella LA, Winston F, Workman JL, Berger SL (1999) Functional organization of the yeast SAGA complex: distinct components involved in structural integrity, nucleosome acetylation, and TATA-binding protein interaction. *Mol Cell Biol* **19**: 86-98

Stevens SW, Ryan DE, Ge HY, Moore RE, Young MK, Lee TD, Abelson J (2002) Composition and functional characterization of the yeast spliceosomal penta-snRNP. *Mol Cell* **9**: 31-44

Stewart M (2019) Polyadenylation and nuclear export of mRNAs. *J Biol Chem* **294**: 2977-2987

Strasser K, Bassler J, Hurt E (2000) Binding of the Mex67p/Mtr2p heterodimer to FXFG, GLFG, and FG repeat nucleoporins is essential for nuclear mRNA export. *The Journal of cell biology* **150**: 695-706

Strasser K, Hurt E (2000) Yra1p, a conserved nuclear RNA-binding protein, interacts directly with Mex67p and is required for mRNA export. *EMBO J* **19**: 410-420

Strasser K, Masuda S, Mason P, Pfannstiel J, Oppizzi M, Rodriguez-Navarro S, Rondon AG, Aguilera A, Struhl K, Reed R, Hurt E (2002) TREX is a conserved complex coupling transcription with messenger RNA export. *Nature* **417**: 304-308

Stutz F, Bachi A, Doerks T, Braun IC, Seraphin B, Wilm M, Bork P, Izaurralde E (2000) REF, an evolutionary conserved family of hnRNP-like proteins, interacts with TAP/Mex67p and participates in mRNA nuclear export. *RNA* **6**: 638-650

Suntharalingam M, Alcazar-Roman AR, Wentz SR (2004) Nuclear export of the yeast mRNA-binding protein Nab2 is linked to a direct interaction with Gfd1 and to Gle1 function. *J Biol Chem* **279**: 35384-35391

Swisher KD, Parker R (2010) Localization to, and effects of Pbp1, Pbp4, Lsm12, Dhh1, and Pab1 on stress granules in *Saccharomyces cerevisiae*. *PLoS one* **5**: e10006

Taberner FJ, Quilis I, Igual JC (2009) Spatial regulation of the start repressor Whi5. *Cell Cycle* **8**: 3010-3018

Taberner FJ, Quilis I, Sendra J, Bano MC, Igual JC (2012) Regulation of cell cycle transcription factor Swi5 by karyopherin Msn5. *Biochimica et biophysica acta* **1823**: 959-970

Tagwerker C, Zhang H, Wang X, Larsen LS, Lathrop RH, Hatfield GW, Auer B, Huang L, Kaiser P (2006) HB tag modules for PCR-based gene tagging and tandem affinity purification in *Saccharomyces cerevisiae*. *Yeast* **23**: 623-632

Takahashi T, Furuchi T, Naganuma A (2006) Endocytic Ark/Prk kinases play a critical role in adriamycin resistance in both yeast and mammalian cells. *Cancer research* **66**: 11932-11937

Tapia H, Koshland DE (2014) Trehalose is a versatile and long-lived chaperone for desiccation tolerance. *Current biology : CB* **24**: 2758-2766

Tarazona S, Furio-Tari P, Turra D, Pietro AD, Nueda MJ, Ferrer A, Conesa A (2015) Data quality aware analysis of differential expression in RNA-seq with NOISeq R/Bioc package. *Nucleic Acids Res* **43**: e140

Teixeira D, Parker R (2007) Analysis of P-body assembly in *Saccharomyces cerevisiae*. *Molecular biology of the cell* **18**: 2274-2287

Teixeira D, Sheth U, Valencia-Sanchez MA, Brengues M, Parker R (2005) Processing bodies require RNA for assembly and contain nontranslating mRNAs. *RNA* **11**: 371-382

Teixeira MC, Monteiro PT, Palma M, Costa C, Godinho CP, Pais P, Cavalheiro M, Antunes M, Lemos A, Pedreira T, Sa-Correia I (2018) YEASTRACT: an upgraded database for the analysis of transcription regulatory networks in *Saccharomyces cerevisiae*. *Nucleic Acids Res* **46**: D348-D353

Tereshina VM (2005) [Thermal resistance in fungi: the role of heat shock proteins and trehalose]. *Mikrobiologija* **74**: 293-304

Terry LJ, Wentz SR (2007) Nuclear mRNA export requires specific FG nucleoporins for translocation through the nuclear pore complex. *The Journal of cell biology* **178**: 1121-1132

Tesina P, Heckel E, Cheng J, Fromont-Racine M, Buschauer R, Kater L, Beatrix B, Berninghausen O, Jacquier A, Becker T, Beckmann R (2019) Structure of the 80S ribosome-Xrn1 nuclease complex. *Nature structural & molecular biology* **26**: 275-280

Tessarz P, Kouzarides T (2014) Histone core modifications regulating nucleosome structure and dynamics. *Nature reviews Molecular cell biology* **15**: 703-708

- Thomsen R, Nielsen PS, Jensen TH (2005) Dramatically improved RNA in situ hybridization signals using LNA-modified probes. *RNA* **11**:1745-1748
- Tieg B, Krebber H (2013) Dbp5 - from nuclear export to translation. *Biochimica et biophysica acta* **1829**: 791-798
- Timmers HTM, Tora L (2018) Transcript Buffering: A Balancing Act between mRNA Synthesis and mRNA Degradation. *Mol Cell* **72**: 10-17
- Tollervey D (2004) Molecular biology: termination by torpedo. *Nature* **432**: 456-457
- Tran EJ, Zhou Y, Corbett AH, Wentz SR (2007) The DEAD-box protein Dbp5 controls mRNA export by triggering specific RNA:protein remodeling events. *Mol Cell* **28**: 850-859
- Trotter EW, Berenfeld L, Krause SA, Petsko GA, Gray JV (2001) Protein misfolding and temperature up-shift cause G1 arrest via a common mechanism dependent on heat shock factor in *Saccharomyces cerevisiae*. *Proceedings of the National Academy of Sciences of the United States of America* **98**: 7313-7318
- Tsui K, Dubuis S, Gebbia M, Morse RH, Barkai N, Tirosh I, Nislow C (2011) Evolution of nucleosome occupancy: conservation of global properties and divergence of gene-specific patterns. *Mol Cell Biol* **31**: 4348-4355
- Tsukamoto T, Shibagaki Y, Imajoh-Ohmi S, Murakoshi T, Suzuki M, Nakamura A, Gotoh H, Mizumoto K (1997) Isolation and characterization of the yeast mRNA capping enzyme beta subunit gene encoding RNA 5'-triphosphatase, which is essential for cell viability. *Biochemical and biophysical research communications* **239**: 116-122
- Ungelenk S, Moayed F, Ho CT, Grousl T, Scharf A, Mashaghi A, Tans S, Mayer MP, Mogk A, Bukau B (2016) Small heat shock proteins sequester misfolding proteins in near-native conformation for cellular protection and efficient refolding. *Nature communications* **7**: 13673
- van Steensel B (2011) Chromatin: constructing the big picture. *EMBO J* **30**: 1885-1895
- Van Treeck B, Protter DSW, Matheny T, Khong A, Link CD, Parker R (2018) RNA self-assembly contributes to stress granule formation and defining the stress granule transcriptome. *Proceedings of the National Academy of Sciences of the United States of America* **115**: 2734-2739
- Vannini A, Cramer P (2012) Conservation between the RNA polymerase I, II, and III transcription initiation machineries. *Mol Cell* **45**: 439-446

- Vellai T, Vida G (1999) The origin of eukaryotes: the difference between prokaryotic and eukaryotic cells. *Proceedings Biological sciences* **266**: 1571-1577
- Verghese J, Abrams J, Wang Y, Morano KA (2012) Biology of the heat shock response and protein chaperones: budding yeast (*Saccharomyces cerevisiae*) as a model system. *Microbiology and molecular biology reviews* : *MMBR* **76**: 115-158
- Vidan S, Mitchell AP (1997) Stimulation of yeast meiotic gene expression by the glucose-repressible protein kinase Rim15p. *Mol Cell Bio* **17**: 2688-2697
- Vinayachandran V, Reja R, Rossi MJ, Park B, Rieber L, Mittal C, Mahony S, Pugh BF (2018) Widespread and precise reprogramming of yeast protein-genome interactions in response to heat shock. *Genome research*
- Viphakone N, Voisinet-Hakil F, Minvielle-Sebastia L (2008) Molecular dissection of mRNA poly(A) tail length control in yeast. *Nucleic Acids Res* **36**: 2418-2433
- Voellmy R, Boellmann F (2007) Chaperone regulation of the heat shock protein response. *Advances in experimental medicine and biology* **594**: 89-99
- Wach A, Brachat A, Pohlmann R, Philippsen P (1994) New heterologous modules for classical or PCR-based gene disruptions in *Saccharomyces cerevisiae*. *Yeast* **10**: 1793-1808
- Wallace EW, Kear-Scott JL, Pilipenko EV, Schwartz MH, Laskowski PR, Rojek AE, Katanski CD, Riback JA, Dion MF, Franks AM, Airoidi EM, Pan T, Budnik BA, Drummond DA (2015) Reversible, Specific, Active Aggregates of Endogenous Proteins Assemble upon Heat Stress. *Cell* **162**: 1286-1298
- Wang L, Wang S, Li W (2012) RSeQC: quality control of RNA-seq experiments. *Bioinformatics* **28**: 2184-2185
- Warfield L, Ramachandran S, Baptista T, Devys D, Tora L, Hahn S (2017) Transcription of Nearly All Yeast RNA Polymerase II-Transcribed Genes Is Dependent on Transcription Factor TFIID. *Mol Cell* **68**: 118-129 e115
- Watanabe K, Kokubo T (2017) SAGA mediates transcription from the TATA-like element independently of Taf1p/TFIID but dependent on core promoter structures in *Saccharomyces cerevisiae*. *PLoS one* **12**: e0188435
- Webster MW, Chen YH, Stowell JAW, Alhusaini N, Sweet T, Graveley BR, Collier J, Passmore LA (2018) mRNA Deadenylation Is Coupled to Translation Rates by the Differential Activities of Ccr4-Not Nucleases. *Mol Cell* **70**: 1089-1100 e1088

- Weids AJ, Ibstedt S, Tamas MJ, Grant CM (2016) Distinct stress conditions result in aggregation of proteins with similar properties. *Scientific reports* **6**: 24554
- Welker S, Rudolph B, Frenzel E, Hagn F, Liebisch G, Schmitz G, Scheuring J, Kerth A, Blume A, Weinkauff S, Haslbeck M, Kessler H, Buchner J (2010) Hsp12 is an intrinsically unstructured stress protein that folds upon membrane association and modulates membrane function. *Mol Cell* **39**: 507-520
- Wheeler JR, Jain S, Khong A, Parker R (2017) Isolation of yeast and mammalian stress granule cores. *Methods* **126**: 12-17
- Wheeler JR, Matheny T, Jain S, Abrisch R, Parker R (2016) Distinct stages in stress granule assembly and disassembly. *eLife* **5**
- Windgassen M, Krebber H (2003) Identification of Gbp2 as a novel poly(A)⁺ RNA-binding protein involved in the cytoplasmic delivery of messenger RNAs in yeast. *EMBO reports* **4**: 278-283
- Windgassen M, Sturm D, Cajigas IJ, Gonzalez CI, Seedorf M, Bastians H, Krebber H (2004) Yeast shuttling SR proteins Npl3p, Gbp2p, and Hrb1p are part of the translating mRNPs, and Npl3p can function as a translational repressor. *Mol Cell Biol* **24**: 10479-10491
- Wolf J, Passmore LA (2014) mRNA deadenylation by Pan2-Pan3. *Biochemical Society transactions* **42**: 184-187
- Yamamoto Y, Izawa S (2013) Adaptive response in stress granule formation and bulk translational repression upon a combined stress of mild heat shock and mild ethanol stress in yeast. *Genes Cells* **18**: 974-984
- Yella VR, Bansal M (2017) DNA structural features of eukaryotic TATA-containing and TATA-less promoters. *FEBS open bio* **7**: 324-334
- Yoshida K, Blobel G (2001) The karyopherin Kap142p/Msn5p mediates nuclear import and nuclear export of different cargo proteins. *The Journal of cell biology* **152**: 729-740
- Young MD, Wakefield MJ, Smyth GK, Oshlack A (2010) Gene ontology analysis for RNA-seq: accounting for selection bias. *Genome Bio* **11**: R14
- Yu MC, Bachand F, McBride AE, Komili S, Casolari JM, Silver PA (2004) Arginine methyltransferase affects interactions and recruitment of mRNA processing and export factors. *Genes & development* **18**: 2024-2035

Yusupova G, Yusupov M (2017) Crystal structure of eukaryotic ribosome and its complexes with inhibitors. *Philosophical transactions of the Royal Society of London Series B, Biological sciences* **372**

Zander G, Hackmann A, Bender L, Becker D, Lingner T, Salinas G, Krebber H (2016) mRNA quality control is bypassed for immediate export of stress-responsive transcripts. *Nature*

Zander G, Krebber H (2017) Quick or quality? How mRNA escapes nuclear quality control during stress. *RNA biology* **14**: 1642-1648

Zanton SJ, Pugh BF (2004) Changes in genomewide occupancy of core transcriptional regulators during heat stress. *Proceedings of the National Academy of Sciences of the United States of America* **101**: 16843-16848

Zapater M, Sohrmann M, Peter M, Posas F, de Nadal E (2007) Selective requirement for SAGA in Hog1-mediated gene expression depending on the severity of the external osmostress conditions. *Mol Cell Biol* **27**: 3900-3910

Zenklusen D, Vinciguerra P, Strahm Y, Stutz F (2001) The yeast hnRNP-Like proteins Yra1p and Yra2p participate in mRNA export through interaction with Mex67p. *Mol Cell Biol* **21**: 4219-4232

Zhao J, Hyman L, Moore C (1999) Formation of mRNA 3' ends in eukaryotes: mechanism, regulation, and interrelationships with other steps in mRNA synthesis. *Microbiology and molecular biology reviews: MMBR* **63**: 405-445

Zid BM, O'Shea EK (2014) Promoter sequences direct cytoplasmic localization and translation of mRNAs during starvation in yeast. *Nature* **514**: 117-121

Doctoral thesis:

Study of the SAGA deubiquitination module: Identification of new modulators and its implication on spinocerebellar ataxia type 7. **Paula Oliete Calvo**. *Universitat Politècnica de València, 2017*

The RNA binding protein Mip6, a novel cellular partner of Mex67 export factor with implications in mRNA export. **Nada Mohamad**. *Universitat Politècnica de València, 2017*

Study of SAGA and SLIK complexes and Mip6 protein in the regulation of gene expression in eukaryotes. **Carne Nuño Cabanes**. *Universitat Politècnica de València, in progress*

MEMORIA DE LA TESIS

Resumen

Las proteínas de unión a ARN participan en múltiples procesos de la expresión génica ejerciendo un papel importante en el control de calidad del ARN. Una de las proteínas más importantes en la exportación de ARNs mensajeros (ARNms) en levaduras es Mex67. Aunque Mex67 es capaz de unir ARN, requiere de proteínas adaptadoras para interactuar con la mayoría de ARNms maduros que serán exportados a través del complejo del poro nuclear. En respuesta a choque térmico, los ARNms dependientes de estrés son rápidamente producidos por los factores de transcripción Hsf1 y Msn2/Msn4. La exportación de los ARNms controlados por Hsf1 depende de la interacción directa con Mex67 sin pasar el control de calidad. En cambio, los mecanismos que controlan la exportación de los ARNms dependientes de Msn2/Msn4 se desconocen sugiriendo que participen proteínas de unión a ARN no descritas hasta la fecha. En ensayos previos de doble híbrido, se describió la interacción entre Mex67 y la proteína de unión a ARN Mip6. Mip6 contiene cuatro dominios de unión a ARN (RRMs) y ha sido descrita como modulador del metabolismo de ARNms relacionados con esporulación.

En esta tesis hemos trabajado en la caracterización funcional de Mip6 en condiciones óptimas de crecimiento y en estrés mediante el análisis de su interacción funcional con Mex67, la identificación y el efecto en el metabolismo de sus ARNms diana y el estudio de los elementos requeridos para su localización subcelular.

Mip6 interactúa de manera directa con el dominio asociado a ubiquitina (UBA) de Mex67 a través del triptófano 442 del RRM4 de Mip6, cuya interacción produce un crecimiento retardado en levaduras. Mip6 transita entre el núcleo y el citoplasma de manera dependiente de Mex67 y se concentra en gránulos citoplasmáticos en diversas condiciones de estrés. Mip6 se copurifica con Pab1 en gránulos de estrés (SGs) y células sin *MIP6* presentan anomalías en el metabolismo de estos gránulos. Ensayos de microscopía confocal muestran que la delección de los RRM4 de Mip6 produce su retención nuclear. Además, la exportación de Mip6 también está regulada por la presencia de una

secuencia de exportación nuclear (NES) controlada por la carioferina Msn5. Ensayos de inmunoprecipitación de proteína con ARNs entrecruzados por ribonucleósidos fotoactivables (PAR-CLIP) muestran un enriquecimiento en la unión de Mip6 con ARNms dependientes de Msn2/Msn4 bajo condiciones óptimas. En cambio, este enriquecimiento varía tras choque térmico produciendo la unión preferencial de Mip6 a ARNms de genes de proteínas ribosomales (RPGs). En relación con los resultados de PAR-CLIP, la delección de *MIP6* y la mutación del triptófano 442 aumentaron los niveles de expresión de los genes diana de Msn2/Msn4 *HSP12* y *CTT1*. Este aumento fue mayor tras la delección combinada de *MIP6* y el miembro del exosoma nuclear *RRP6*.

Estos resultados revelan un posible papel de Mip6 en la homeostasis de ARNms producida por su interacción con Mex67. Proponemos un modelo en el cual, inicialmente, la interacción de Mip6 con ARN contribuye a la posterior exportación de Mip6 a través de Mex67 y/o gracias a la secuencia NES. Este transporte colaboraría en la regulación de los niveles de los ARNms dependientes de Msn2/Msn4 bajo condiciones no estresantes. En cambio, bajo estrés, Mip6 se acumularía en SGs para apoyar en la represión de ARNms de RPGs.

Introducción

La información genética que presenta cada individuo viene almacenada en su genoma. El genoma está estructurado permitiendo el mayor o menor empaquetamiento del ADN y de los diferentes genes que lo componen. Debido a esta disposición del genoma, la célula necesita controlar qué zonas son más o menos necesarias para acceder y requerir de la información que contiene. La obtención de la información del ADN a través de la síntesis de los ARNs mensajeros para su futura producción proteica, junto a los mecanismos que lo controlan es lo que se denomina como expresión génica. La expresión génica es un proceso esencial en los seres vivos, el cual depende de la acción coordinada de numerosos complejos multiprotéicos que actúan a distintos niveles tanto en el núcleo celular como en el citoplasma (Cho *et al.*, 1998,

Pijnappel and Timmers, 2008, Umlauf *et al.*, 2013). Estas etapas, en células eucariotas, engloban desde la remodelación de la cromatina, a nivel epigenético, como el transporte de ARN desde el núcleo al citoplasma, hasta las diferentes modificaciones post-traduccionales a nivel de proteína (Emiliani *et al.*, 1998, Bachi *et al.*, 2000, Thapar, 2015). Todos estos procesos son de vital importancia para la adaptación y supervivencia de la célula en diferentes ambientes y estados en los que se encuentra ya que, la no adaptación, por ejemplo, de una célula frente a una situación de estrés conllevaría la muerte celular (Voellmy, 2005; Harvey *et al.*, 2017). Los diferentes mecanismos que actúan en la expresión génica se han conservado evolutivamente desde eucariotas sencillos hasta eucariotas más complejos como el ser humano. Debido a esta conservación, hemos realizado nuestros estudios con uno de los modelos *in vivo* más utilizados para el estudio de la expresión génica y su regulación como es la levadura *Saccharomyces cerevisiae*.

En levaduras, existen múltiples complejos que regulan la expresión génica a diferentes niveles (Rodríguez-Navarro *et al.*, 2004, Cabal *et al.*, 2006). Uno de los procesos más importantes en el control de la expresión génica es el transporte de ARN desde el núcleo al citoplasma, el cual depende principalmente de la proteína Mex67 (Segref *et al.*, 1997). Mex67, TAP en humanos (Katahira *et al.*, 1999), es el principal exportador de ARNs en la célula (Smith *et al.*, 2015). Esta proteína interacciona con ARNs de todo tipo controlando su metabolismo tanto en situaciones estándar de crecimiento como bajo condiciones de estrés (Yao *et al.*, 2007, Zander *et al.*, 2016, Zander and Krebber, 2017). Aunque sea un factor esencial para el transporte de ARNs, se ha demostrado que Mex67 presenta baja afinidad por unirse al mismo o no lo hace tan fuertemente como otras proteínas (Strässer and Hurt, 2000). Este déficit requiere que Mex67 interactúe con otras proteínas, denominadas adaptadoras, que son capaces de unirse con mayor afinidad a estos ARNs y a su vez con Mex67 y, en conjunto, formar lo que se denomina como ribonucleopartícula la cual, a través del poro nuclear, es exportada al citoplasma. Ejemplos de proteínas adaptadoras son las proteínas de unión a ARN, Nab2 e Yra1, entre otras (Anderson *et al.*, 1993, Portman *et al.*, 1997). En

condiciones óptimas de crecimiento, los complejos ribonucleoproteicos de Mex67, junto a las proteínas adaptadoras y los ARNs que llevan asociados, viajan hacia el citoplasma a través del complejo del poro nuclear (NPC) con la ayuda del complejo de Transcripción - Exportación 2 (TREX-2) (Lund and Guthrie, 2005, Rodríguez-Navarro and Hurt, 2011). En cambio, en condiciones de estrés como, por ejemplo, situaciones de choque térmico, Mex67 es capaz de interactuar con las proteínas adaptadoras pero le imposibilitan el transporte desde el núcleo al citoplasma (Zander *et al.*, 2016). En este caso, los ARNs que son producidos principalmente por factores de transcripción como Hsf1, Msn2, Msn4, entre otros (Hahn *et al.*, 2004, Martínez-Pastor *et al.*, 1996, Amorós and Estruch, 2001), son transportados únicamente por Mex67 de manera directa, como es el caso de los ARNs mensajeros controlados por Hsf1, o a través de una proteína adaptadora desconocida hasta la fecha (Zander *et al.*, 2016). Este hecho abre la posibilidad de que ARNs mensajeros controlados por otros factores de respuesta a estrés como Msn2 y Msn4 cuyo transporte se desconoce pueda estar mediado por nuevas proteínas de unión a ARN.

Además de las proteínas adaptadoras ya descritas, se descubrió, allá por 1997 en el laboratorio del Dr. Ed Hurt, una posible proteína adaptadora a la que se denominó Mip6 (*MEX67* interacting protein 6). La proteína Mip6 contiene cuatro dominios con estructura similar a los de unión a ARN (RRM, RNA Recognition Motif) y la única evidencia que apoyaba una posible relación con la regulación de la expresión génica fue que se aisló en un screening de doble híbrido usando el factor de exportación Mex67 como cebo (Segref *et al.*, 1997). Recientemente, la función de Mip6 ha sido relacionada, por un lado, con funciones a nivel del metabolismo de ARNs que participan en la meiosis en levaduras (Jin *et al.*, 2017) y, por otro lado, su sobreexpresión produce defectos en traducción y, por consiguiente, afecta negativamente al crecimiento celular (Bolognesi *et al.*, 2016). Los estudios realizados hasta la fecha no determinan con claridad la posible función de Mip6 en la regulación de la expresión génica tanto en condiciones óptimas de crecimiento como en condiciones de estrés y es por ello, que en nuestro laboratorio en colaboración

con otros laboratorios hemos estado interesados en su caracterización tanto estructural como funcional en estas situaciones. Gracias a la colaboración con el Dr. Jerónimo Bravo y el Dr. Pérez-Cañadillas, expertos en el estudio de la estructura de proteínas, se ha estudiado con detalle la estructura de Mip6 y su interacción con Mex67. En trabajos realizados en estos laboratorios (Martín-Expósito *et al.*, en revisión), se ha descubierto que la interacción entre Mip6 y Mex67 se da entre el dominio RRM4 de Mip6 y el dominio UBA de Mex67. Más detalladamente, se ha comprobado que la mutación del triptófano en la posición 442 de Mip6 impide la interacción directa entre Mip6 y Mex67 *in vitro*. También se ha confirmado la interacción de los RRM4 de Mip6 con ARNs *in vitro*.

Objetivos

Con el fin de caracterizar funcionalmente la proteína Mip6, se plantearon los siguientes objetivos:

1. Descifrar las interacciones físicas y genéticas de Mip6 y más concretamente su interacción con Mex67.
2. Caracterizar los ARNs asociados a Mip6 en situaciones estándar y bajo estrés y descubrir las etapas en las que participa dentro del metabolismo de las ARNs a los que se une en ambas situaciones.
3. Realizar estudios de localización subcelular de Mip6 y sus mutantes en condiciones óptimas y de estrés.

Materiales y Métodos

Para la realización de esta tesis, utilizamos como organismo modelo la levadura *Saccharomyces cerevisiae*. A partir de una cepa wild-type (WT) BY4741, se obtuvieron diferentes cepas mutantes para la realización de todos los experimentos mostrados en esta tesis. Algunas de estas cepas fueron

facilitadas por otros laboratorios o creadas por otros miembros de nuestro laboratorio. La misma situación se produjo para la creación de plásmidos y el diseño de oligos.

Ensayos de crecimiento

Las levaduras fueron crecidas en medio líquido YPD (Yeast extract-Peptone-Dextrose) o SC (Synthetic Complete) selectivo a 30°C a 140 revoluciones por minuto (rpm). Para casos especiales se realizaron diferentes tipos de incubaciones con diferentes estresantes. Los cultivos fueron sembrados en forma de gotas en diluciones seriadas (1:10) en placas de YPD o SC incluyendo en algunos casos algún agente estresante. Estas placas fueron incubadas durante varios días a 30°C, 33°C o 37°C.

Análisis de qRT-PCR

En primer lugar, se realizó la extracción y purificación de ARNs provenientes de cultivos de levadura crecidos a OD₆₀₀ 0.5-0.8. Para ello, se resuspendió el pellet de células, que previamente fue congelado en nitrógeno líquido, en fenol ácido a 65°C y se puso en agitación para su disolución. Tras varias incubaciones con y sin agitación, se pasó a precipitar el ARN en hielo. Una vez precipitado este ARN, se pasó a realizar una serie de pases primero con fenol ácido y posteriormente con cloroformo. Tras esto, se precipitó con etanol y acetato de sodio durante toda la noche a -20°C. Una vez precipitado, se lavó con etanol 70%, se dejó secar y se resuspendió en agua. Una parte del ARN obtenido se trató con DNaseI para eliminar las trazas de ADN remanente. Tras este tratamiento, el ARN libre de ADN se purificó y precipitó siguiendo los mismos pasos anteriores con fenol-cloroformo y etanol. Para obtener el cDNA, se realizó un ensayo de retrotranscripción utilizando la enzima SuperScript III (Sigma-Aldrich). Este cDNA fue utilizado posteriormente para realizar experimentos de PCR cuantitativa (qPCR) para determinar, utilizando oligos específicos, los niveles de expresión de los genes *HSP12* y *CTT1*, utilizando como gen normalizador *SCR1*.

Ensayos de extracción y co-purificación de proteínas

A partir de cultivos crecidos de levadura a una OD_{600} de 0.5-0.8, se obtuvo el pellet de células y se congeló con nitrógeno líquido. Para la obtención de un extracto proteico, se incubó el pellet bien con ácido tricloroacético (método TCA) o con hidróxido de hidrógeno más β -mercaptoetanol (método NaOH) o ambos consecutivamente (método *high urea* o HU). Tras la rotura celular mediante el uso de estos agentes, se limpió y purificó el extracto mediante centrifugación y se resuspendió en tampón de carga. Para los ensayos de pull-down o co-purificación de proteínas, las células fueron incubadas con tampón de lisis y rompieron con agitación tras añadir perlas de vidrio. Tras descartar los restos celulares de la muestra, una alícuota fue tomada como muestra previa a la purificación (INPUT). El resto del extracto se incubó con moléculas (*beads*) que son capaces de purificar nuestra proteína de interés. Una vez realizada la inmunoprecipitación tras varios lavados, se resuspendió en tampón de carga. Posteriormente, tanto para el caso de la extracción proteica como para la co-purificación de proteínas, las muestras fueron cargadas en geles de acrilamida para su posterior transferencia a membrana de nitrocelulosa y análisis por western-blot utilizando anticuerpos específicos para la detección de nuestras proteínas de interés.

Estudios de interacción proteína-ARN por metodología PAR-CLIP

Cultivos celulares fueron crecidos a 30°C en medio SC suplementado con biotina hasta una OD_{600} de 0.75. Posteriormente se incubó durante 45 minutos con 4-tiouracilo a 30°C y, en algunos casos, pasando 20 de esos 45 minutos a 39°C . Se irradió con luz ultravioleta para fijar la unión proteína-ARN y se obtuvieron los pellets de células que fueron congelados con nitrógeno líquido. Tras la rotura celular en un molino con nitrógeno, se resuspendió y lavó varias veces en un tampón con altas concentraciones de agentes desnaturizantes de proteína. Tras una doble purificación por cromatografía de afinidad con níquel y con bolas magnéticas, se obtuvo purificado Mip6 unido a ARN. Esta

solución fue posteriormente tratada con enzimas de degradación de ARN para que únicamente quedaran las secuencias protegidas por la unión de Mip6. Tras esto, se trató con fosfatasa alcalina y se añadió ^{32}P γ -ATP para controlar los pasos de purificación y lavado posteriores mediante señal radioactiva. Una vez ligados a unos adaptadores en ambos extremos de los ARNs en 3' y 5', se pasó a purificar las secuencias de ARN descartando con ayuda de la proteinasa K la proteína Mip6 y tras varios pasos con fenol-cloroformo. El ARN obtenido fue resuspendido en agua para su posterior retrotranscripción. Una vez obtenido el cDNA, se pasó a obtener librerías de ADN copia utilizando un número de ciclos de determinado y purificando las bandas a analizar tras correr las muestras en un gel de agarosa. Estas librerías fueron enviadas para secuenciar y los datos obtenidos se analizaron a través de metodologías bioinformáticas. Este análisis consistió en la eliminación de las secuencias adaptadoras, descarte de las secuencias repetidas, de ARNs ribosomales y transferentes, y mapeo de cada una de las secuencias en el genoma de levadura. Una vez obtenidos estos resultados, se normalizaron por la cantidad de ARNs de cada gen en cada condición (McKinlay *et al.*, 2011) y se realizó un análisis de enriquecimiento diferencial.

Ensayos *in vivo* de localización de proteína

Proteínas fluorescentes fueron expresadas en células transformadas con plásmidos que contenían nuestra proteína de interés con diferentes fluoróforos verdes (GFP) o rojos (m-CHERRY o RFP). Se obtuvieron cultivos crecidos en medio SC selectivo hasta una OD_{600} de 0.5-0.8 a 30°C y dependiendo del experimento, se indujeron diferentes condiciones de estrés. Se obtuvo un pellet de células que se resuspendió en tampón fosfato salino. Una alícuota de esta solución fue utilizada para su visualización en un microscopio confocal Leica SP8. Las imágenes obtenidas fueron analizadas utilizando los software LAS X (Leica) e ImageJ (<http://rsbweb.nih.gov/ij/>).

Resultados

Mip6 interacciona genética y físicamente con el exportador de ARNs Mex67

Tal y como ya fue descrito por ensayos de doble híbrido, Mip6 interacciona físicamente con la proteína Mex67 (Segref *et al.*, 1997). En ese mismo trabajo se sugieren las regiones que serían necesarias para la interacción entre ambas proteínas. Gracias a colaboraciones realizadas por nuestro laboratorio con expertos en estructura de proteínas, logramos determinar que los dominios RRM4 de Mip6 y el dominio UBA de Mex67 eran necesarios para que se diera la interacción *in vitro* entre ambas proteínas (Martín-Expósito *et al.*, en revisión). También determinamos que el triptófano en posición 442 de Mip6, dentro del dominio RRM4, era necesario para su interacción con Mex67. Partiendo de estos resultados, decidimos comprobar si este aminoácido tenía también un papel relevante en la interacción *in vivo* entre Mip6 y Mex67. Mediante ensayos de co-inmunoprecipitación, confirmamos la interacción física entre Mip6 y Mex67 (**Figura 1A**). Además, descubrimos que la mutación del triptófano en la posición 442 de Mip6 afectaba negativamente a la interacción entre Mip6 y Mex67 (**Figura 1A**). Por otro lado, estudiamos la interacción genética entre *MIP6* y *MEX67*. Debido a que Mex67 es un factor esencial en la célula, decidimos usar un mutante que expresa un alelo termosensible; *mex67-5* (Scarcelli *et al.*, 2007) como mutante condicional en nuestros estudios. Construimos el doble mutante *mex67-5mip6Δ* y comprobamos su crecimiento a diferentes temperaturas. Mientras que el mutante *mex67-5* es incapaz de crecer a 37 °C, la delección de Mip6 no afecta al crecimiento en las condiciones analizadas (**Figura 1B**). Sin embargo, el doble mutante *mex67-5mip6Δ* presenta un leve defecto del crecimiento a 30°C, que es más evidente en los ensayos realizados a 33°C (**Figura 1B**). Estos resultados demuestran una interacción genética entre ambos genes. Además de corroborar la existencia de interacción genética entre *MIP6* y *MEX67*, decidimos comprobar si la mutación del triptófano 442 de Mip6 afectaba al crecimiento celular utilizando la misma metodología. En ensayos realizados a 30°C y 33°C, pudimos observar pequeñas diferencias en el crecimiento (**Figura**

1C). En cambio, a 37°C, se muestra un defecto de crecimiento más claro en el mutante Mip6W₄₄₂A-GFP (**Figura 1C**). Con estos resultados, demostramos que Mip6 interacciona genética y físicamente con el exportador de ARNs Mex67.

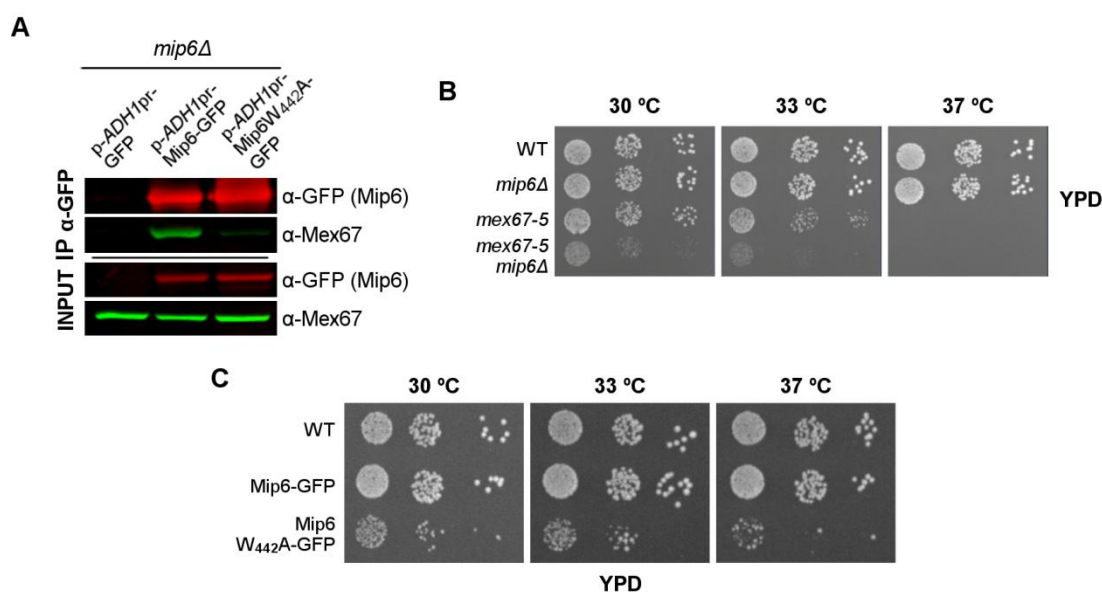


Figura 1. Mip6 interacciona genética y físicamente con el exportador de ARNs Mex67. (A) Ensayos de co-inmunoprecipitación utilizando como cebo Mip6-GFP y Mip6W₄₄₂A-GFP. Se detectó la presencia de Mex67 y Mip6 utilizando anticuerpos frente a Mex67 y GFP, respectivamente. (B) Ensayos de crecimiento de cepas silvestres (WT) y cepas mutantes *mip6Δ*, *mex67-5* y *mex67-5mip6Δ*. (C) Ensayos de crecimiento de cepas silvestres y cepas con Mip6 y Mip6W₄₄₂A etiquetadas con GFP. En ambos ensayos (B) y (C), se realizaron diluciones seriadas de cada una de las cepas y se crecieron en placas de YPD durante 3 días a 30°C, 33°C y 37°C.

Mip6 transita entre el núcleo y el citoplasma dependiente de Mex67

La interacción entre Mip6 y Mex67 podría ocurrir en el contexto de las ribonucleopartículas (mRNPs) que permiten el transporte de los ARNs del núcleo al citoplasma al igual que ocurre con algunas de las proteínas adaptadoras de Mex67 (Santos-Pereira *et al.*, 2014; Suntharalingam *et al.*, 2004). Debido a los bajos niveles endógenos de Mip6 no podemos discriminar, una vez etiquetado con GFP, su localización subcelular mediante microscopía confocal. Se ha descrito la localización en agregados citoplasmáticos de Mip6-GFP bajo el control de diferentes promotores de sobreexpresión que resultan tóxicos para la célula (Bolognesi *et al.*, 2016). Para evitar esta toxicidad, decidimos expresar *MIP6* bajo el control del promotor del gen de la alcohol deshidrogenasa 1 (*ADH1pr*) tanto a nivel genómico (g-*ADH1pr*-Mip6-GFP) como en plásmido (p-*ADH1pr*-Mip6-GFP). Estas construcciones producían

niveles detectables de proteína (**Figura 2A**) y no resultaban tóxicas (**Figura 2B**). Mip6-GFP se localiza distribuida entre el núcleo y el citoplasma (**Figura 2C**), algo que contrasta con la localización perinuclear de la proteína Mex67 (Carmody *et al.*, 2010; Lei *et al.*, 2003) sugiriendo que no todo Mip6 está unido a Mex67 en el NPC. Para analizar el papel que podía ejercer Mex67 sobre la localización de Mip6, utilizamos la cepa termosensible *mex67-5* (Scarcelli *et al.*, 2007; Strässer *et al.*, 2000). A temperatura permisiva (30°C), Mip6 se encuentra localizada entre el núcleo y el citoplasma, con una leve acumulación nuclear, en la cepa *mex67-5* (**Figura 2C**). Cuando pasamos a condiciones en las que inactivamos *mex67-5*, (2 horas a 39 °C), Mip6 muestra una evidente retención nuclear (**Figura 2C**). Por otro lado, también se demostró, en colaboración con expertos en estructura, que el dominio UBA de Mex67 era necesario para la interacción con Mip6. Utilizando la cepa *mex67Δ* shuffle con plásmidos Mex67 y Mex67ΔUBA, estudiamos la localización de Mip6 (Gwizdek *et al.*, 2006). En este caso, Mip6 se acumula en el núcleo (**Figura 2D**). Como ya comenté en el primer apartado de resultados, la mutación del triptófano 442 de Mip6 impide la interacción *in vitro* entre Mex67 y Mip6 (Martín-Expósito *et al.*, en revisión) y, además, hemos comprobado que produce un defecto en su interacción *in vivo* (**Figura 1A**). Esta mutación produce una leve retención nuclear de Mip6 (**Figura 2E**) sugiriendo que la interacción con Mex67 es parcialmente necesaria para su exportación. En conclusión, estos resultados demuestran que Mex67 participa en la salida de Mip6 del núcleo al citoplasma.

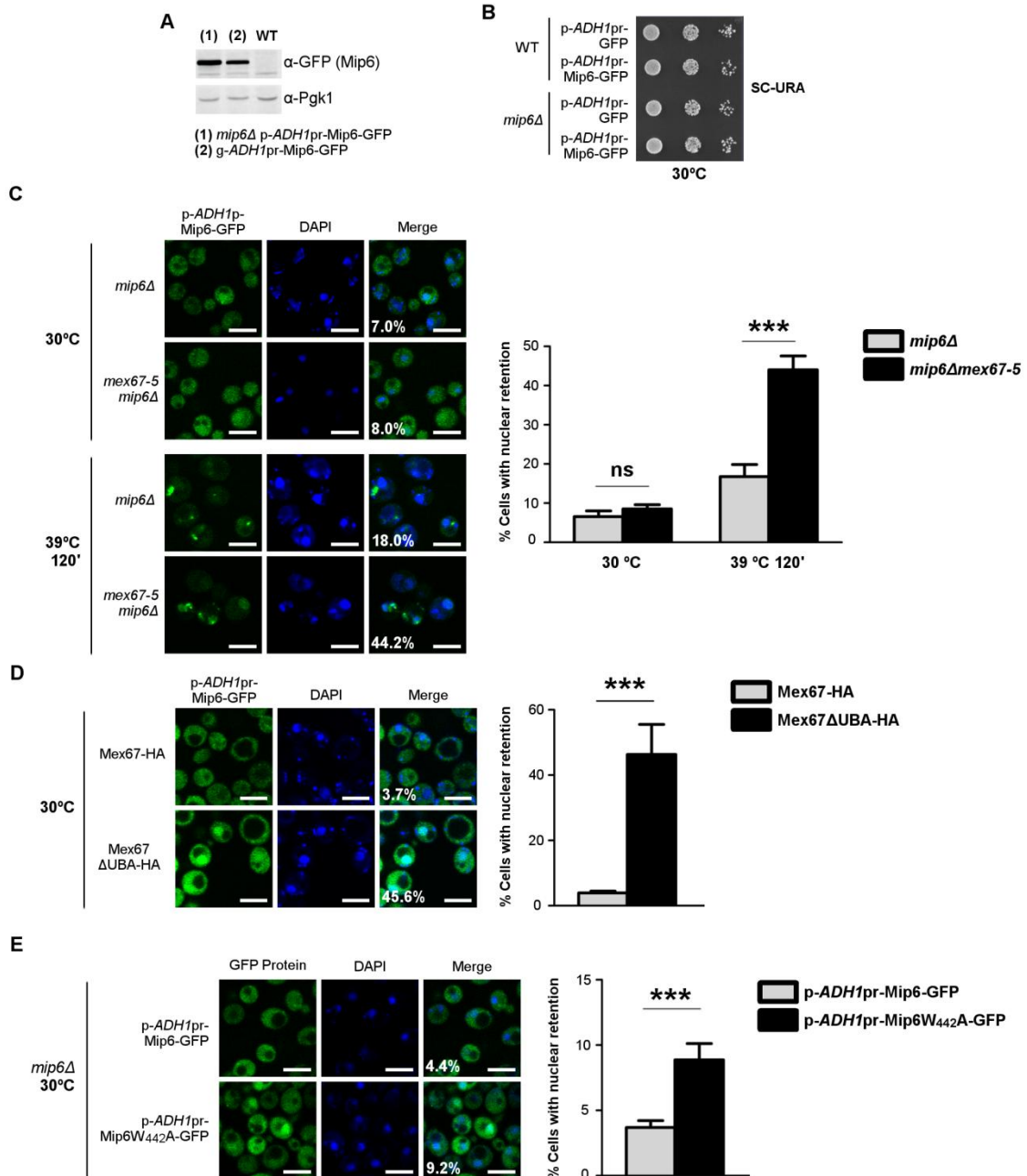


Figura 2. Mip6 viaja entre el núcleo y el citoplasma dependiente de Mex67. (A) Extractos de proteína total de cepas Mip6-GFP controladas por el promotor *ADH1* a nivel de plásmido (1) y a nivel genómico (2). Mip6-GFP bajo su promotor endógeno fue usado como control negativo (tercera columna) y los niveles de proteína Pgk1 fueron usados como control de carga. (B) Ensayo de crecimiento de cepas wild-type y *mip6* Δ transformadas con los plásmidos p-*ADH1*pr-GFP y p-*ADH1*pr-Mip6-GFP. Las diluciones fueron realizadas en placas de SC-URA e incubadas durante 3 días a 30°C. (C) Fotografías de microscopia confocal de cepas *mip6* Δ y *mex67-5mip6* Δ expresando Mip6-GFP a 30°C y tras incubación a 39°C durante 120 minutos. DAPI fue usado como marcador de núcleos. Escala: 5 μ m. (D) Imágenes de localización de Mip6-GFP en cepas Mex67-HA y Mex67 Δ UBA-HA en condiciones estándar de crecimiento a 30°C. Escala: 5 μ m. (E) Localización subcelular de Mip6W₄₄₂A-GFP a 30°C. Escala: 5 μ m.

Mip6 se acumula en gránulos citoplasmáticos inducidos por estrés

Mip6 muestra colocalización parcial con gránulos citoplasmáticos como los P-bodies (PBs) cuando se sobreexpresa a niveles que inhiben el crecimiento como es el caso del control de Mip6 bajo el promotor *GAL1* (Bolognesi *et al.*, 2016). Hemos descubierto que, en nuestra construcción con *ADH1* como promotor, Mip6 se acumula en gránulos citoplasmáticos únicamente cuando estresamos las células a 39°C durante 20 minutos (**Figura 3A**). En estas condiciones, Mip6 se acumula en el citoplasma, pero no produce toxicidad (**Figura 3B**). Además, descubrimos que la presencia de Mip6 en este tipo de estructuras era reversible mediante la adaptación al estrés (**Figura 3C**). También se realizó el seguimiento de la formación de los gránulos de Mip6 bajo diferentes condiciones de estrés; i) estrés térmico a 39°C y 42°C, ii) 30 minutos en azida sódica y iii) 30 minutos en privación de glucosa. En todos los casos Mip6 se acumuló en gránulos citoplasmáticos (**Figura 3D**). Además, confirmamos la presencia de Mip6 en gránulos de estrés mediante ensayos de colocalización con Pbp1 y Pab1, así como parcialmente con Dcp2, marcador de PBs (**Figura 3E**).

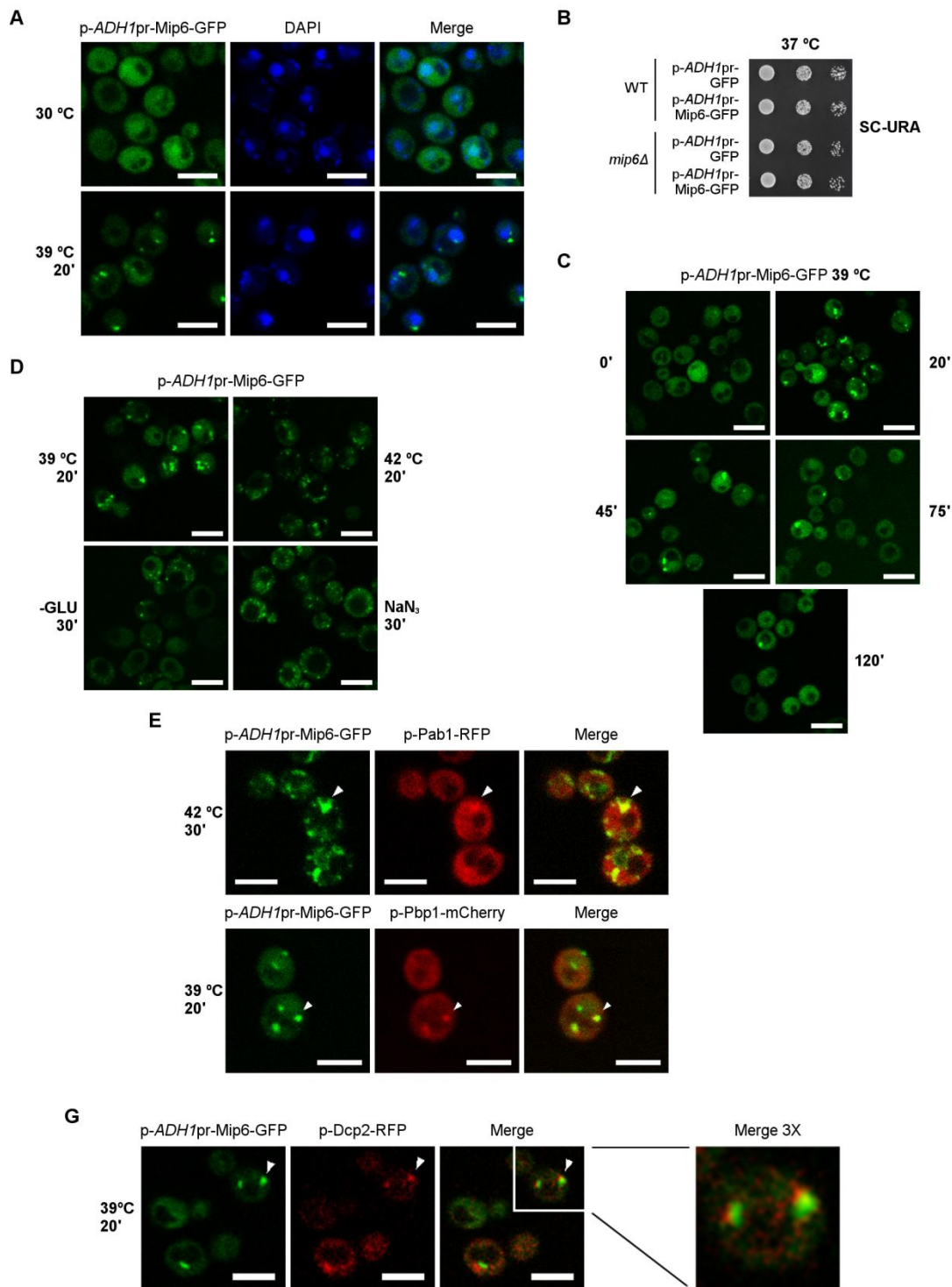


Figura 3. Mip6 se acumula en gránulos citoplasmáticos inducidos por estrés. (A) Localización de Mip6-GFP en levaduras incubadas a 30°C y tras incubación a 39°C durante 20 minutos. DAPI fue utilizado para marcar núcleos. Escala: 5 μ m. (B) Ensayos de crecimiento por goteo de células WT y *mip6Δ* transformadas con los plásmidos p-ADH1pr-GFP y p-ADH1pr-Mip6-GFP. Se pusieron a crecer diluciones seriadas en placas de SC-URA durante 3 días a 37°C. (C) Localización subcelular de Mip6-GFP a 39 °C a diferentes tiempos. (D) Fotografías de microscopía confocal de células *mip6Δ* transformadas con plásmido Mip6-GFP bajo diferentes condiciones de estrés. Escala: 5 μ m. (E) Ensayos de colocalización de Mip6-GFP con Pab1-RFP, Pbp1-mCHERRY y Dcp2-RFP tras incubación a 42 °C 30 minutos para Pab1 y 39 °C 20 minutos para Pbp1 y Dcp2, respectivamente. Escala: 5 μ m.

Mip6 se une preferentemente a ARNs controlados por los factores de transcripción Msn2/Msn4 *in vivo*

Debido a la relación de Mip6 con diferentes proteínas relacionadas con el metabolismo del ARN y a la presencia de varios dominios de unión a ARN, decidimos comprobar si Mip6 era capaz de unirse a ARNs. Se ha demostrado en colaboración con el laboratorio del Dr. Jerónimo Bravo la interacción *in vitro* entre Mip6 y ARNs (Martín-Expósito *et al.*, en revisión). Por otro lado, y gracias a una estancia de colaboración en el laboratorio del Dr. Jeffry Corden en School of Medicine Johns Hopkins University en Baltimore (USA), confirmamos la interacción directa *in vivo* entre diferentes ARNs mensajeros y la proteína Mip6 mediante la metodología PAR-CLIP (Schaughency *et al.*, 2014). La purificación de los ARNs asociados a Mip6 permitió su secuenciación y tras su mapeo confirmamos la unión de Mip6 a la mayoría de ARNs mensajeros en condiciones estándar. Agrupando la unión de Mip6 a todos los genes y fusionándolo en un único e hipotético gen (modelo del metagen), observamos que hay una mayor unión de Mip6 en las regiones 3' de las secuencias codificantes (CDS) (**Figura 4A**). Además, observamos que hay alta unión en genes de baja expresión como los genes inducidos por estrés *HSP12*, *HSP31* y *HSP10* (**Anexo 1**), lo que indicaría un posible papel de Mip6 en el metabolismo de transcritos inducidos por estrés como se sugirió recientemente para Mex67 (Zander *et al.*, 2016). Para evaluar esta posibilidad, se realizaron ensayos de PAR-CLIP tras incubación a 39°C durante 20 minutos en los cuales la localización de Mip6 se veía afectada (**Figura 3A**). El patrón de unión de Mip6 fue similar al de 30°C, haciéndolo también en estas condiciones a regiones 3' de las secuencias codificantes (**Figura 4A y Anexo 1**). Para comparar el grupo de genes que se asocian a Mip6 en cada situación, se realizó un análisis funcional de cada set de datos (GSEA) el cual nos mostró que genes relacionados con la respuesta a estrés estaban sobrerrepresentados en el set de datos a 39°C (**Anexo 2**). Debido a que existía la posibilidad de que esta unión se debía a una mayor inducción en la expresión de este grupo de genes, decidimos normalizar los datos obtenidos respecto a los niveles de ARNs (RNA-seq) definidos para estas condiciones (McKinlay *et al.*, 2011) y eliminar la

unión no específica debida indirectamente a una mayor abundancia de esos ARNs (**Anexo 3**). Tras la normalización, se realizó un análisis diferencial entre ambas condiciones, 30°C y 39°C. Un total de 110 genes mostraron mayor unión a 30°C frente a 39°C mientras que 378 mostraron el comportamiento inverso (**Figura 4B**).

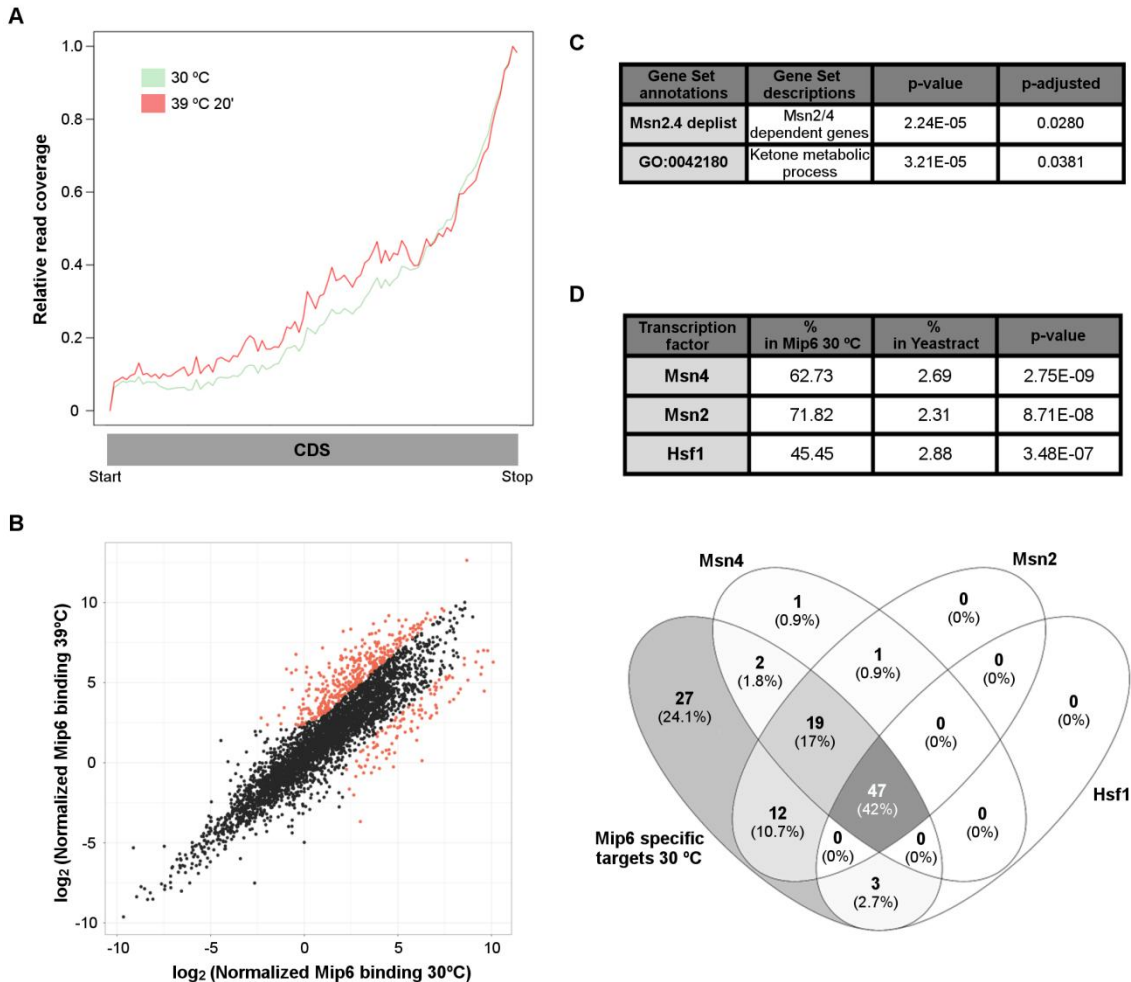


Figura 4. Mip6 se une *in vivo* a ARNs, preferentemente los controlados por los factores de transcripción Msn2/Msn4. (A) Perfil de unión de Mip6 a lo largo de las secuencias codificantes de los genes a 30 °C (verde) y tras incubación a 39 °C 20 minutos (rojo). (B) Diagrama de dispersión de los genes a los que se une Mip6 a 30 °C y a 39 °C. Puntos rojos son aquellos que presentan diferencias estadísticamente significativas ($p\text{-value} < 0.1$). (C) Tabla de datos del análisis funcional (GSEA) para los ARNs enriquecidos en la unión con Mip6 a 30°C. (D) Tabla de datos obtenida utilizando YEASTRACT filtrando por los factores más relevantes en la respuesta a estrés térmico ($p\text{-value} < 0.05$).

Se realizaron análisis funcionales GSEA de estos grupos de genes diferencialmente unidos. Estos resultados mostraron un enriquecimiento de unión a 39 °C de genes relacionados con proteínas ribosomales y traducción

mientras que a 30°C aparecían enriquecidos transcritos relacionados con la respuesta a estrés dependientes de Msn2/Msn4 (**Figura 4C**). Utilizando la aplicación de YEASTRACT (Teixeira *et al.*, 2018), pudimos comprobar que del set de genes enriquecidos a 30°C, más del 50% pertenecía al pool de genes controlados por los factores de transcripción Msn2/Msn4 (**Figura 4D**). Esto nos permite confirmar la unión de Mip6 a ARNs relacionados con los factores de transcripción Msn2/Msn4.

Mip6 participa en la regulación de transcritos dependientes de Msn2/Msn4

Nuestros resultados sugieren que Mip6 se asocia a transcritos dependientes de Msn2/Msn4. Para comprobar si Mip6 podría estar involucrado en la inducción de este grupo de genes, medimos los niveles de expresión de *HSP12* y *CTT1* tras inducción de 20 minutos a 39°C en células wild-type y *mip6Δ*. Como muestra la **Figura 5A**, ambos genes están sobreexpresados en ausencia de *MIP6* en condiciones estándar de crecimiento y tras un estrés. Por otro lado, quisimos ver si este efecto era dependiente de la interacción con Mex67 y, por ello, realizamos los mismos ensayos utilizando el mutante termosensible Mip6W₄₄₂A-GFP, que impide parcialmente la interacción *in vivo* con Mex67. Pudimos comprobar que se comportaba de manera similar al mutante *mip6Δ* (**Figura 5B**). Para determinar si esta subida en los niveles de expresión tenía relación con un defecto en la maquinaria de degradación nuclear, analizamos los niveles de estos mismos ARNs en el mutante *mip6Δrrp6Δ*. Rrp6 es miembro del exosoma nuclear, principal complejo encargado en la degradación de ARNs en el núcleo, y presenta actividad catalítica exonucleasa (Fox *et al.*, 2015; Hilleren *et al.*, 2001). La delección de ambos genes produjo un mayor incremento en los niveles de *HSP12* y *CTT1* que las mutaciones sencillas (**Figura 5C**), indicando que ambas proteínas están involucradas en el metabolismo de estos ARNs mensajeros.

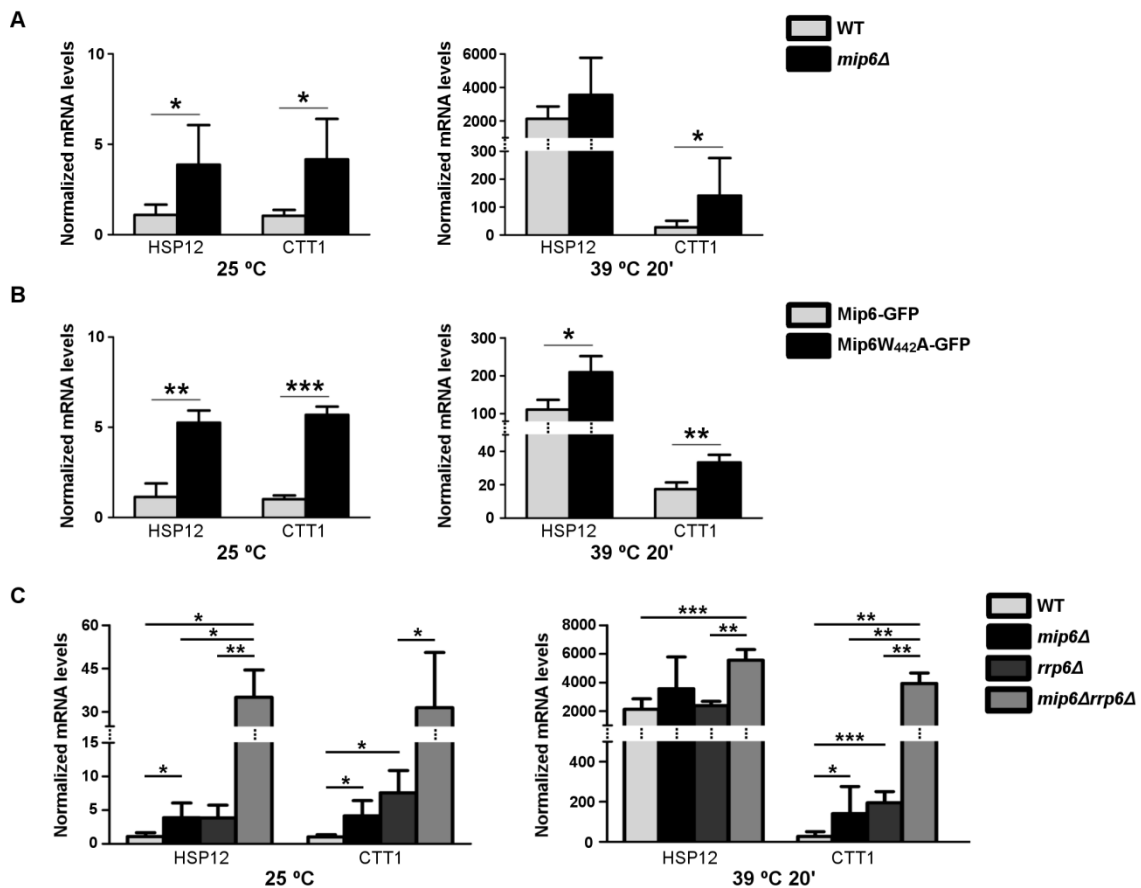


Figura 5. Mip6 participa en la regulación de la expresión de transcritos dependientes de Msn2/Msn4. (A) Ensayos de qRT-PCR para medir los niveles de *HSP12* y *CTT1* en cepas wild-type y *mip6Δ*. El ARN total se obtuvo de cultivos de levadura a 25°C y tras incubación a 39°C durante 20 minutos. (B) Mismos ensayos que en (A) utilizando las cepas Mip6-GFP y Mip6W_{442A}-GFP. (C) Niveles de *HSP12* y *CTT1* en cepas WT, *mip6Δ*, *rrp6Δ* y *mip6Δrrp6Δ* cuantificados por qRT-PCR.

La presencia de los RRM de Mip6 es necesaria para su exportación al citoplasma

Una vez demostrada la capacidad de unión de Mip6 a ARN y su papel en el metabolismo de los ARNs dependientes de Msn2/Msn4, quisimos comprobar cómo se veía afectada su localización si eliminamos algunos de sus dominios RRM. Para ello, se crearon construcciones Mip6 mutantes en las que se delecionaron cada uno de los dominios RRM. En todos los casos, el resultado obtenido fue la retención, en mayor o menos medida de Mip6 en el núcleo (**Figura 6**). El fenotipo más claro se produce cuando afectamos el primer o segundo de los RRM produciendo la retención de Mip6 en más del 80% de las células. La retención producida por la delección del RRM4 es algo menos severa, mientras que la delección del RRM3 afecta en menor medida que

el resto (**Figura 6**). Estos resultados sugieren que la presencia y acción de cada RRM es necesaria para la correcta localización, y probablemente función, de la proteína Mip6.

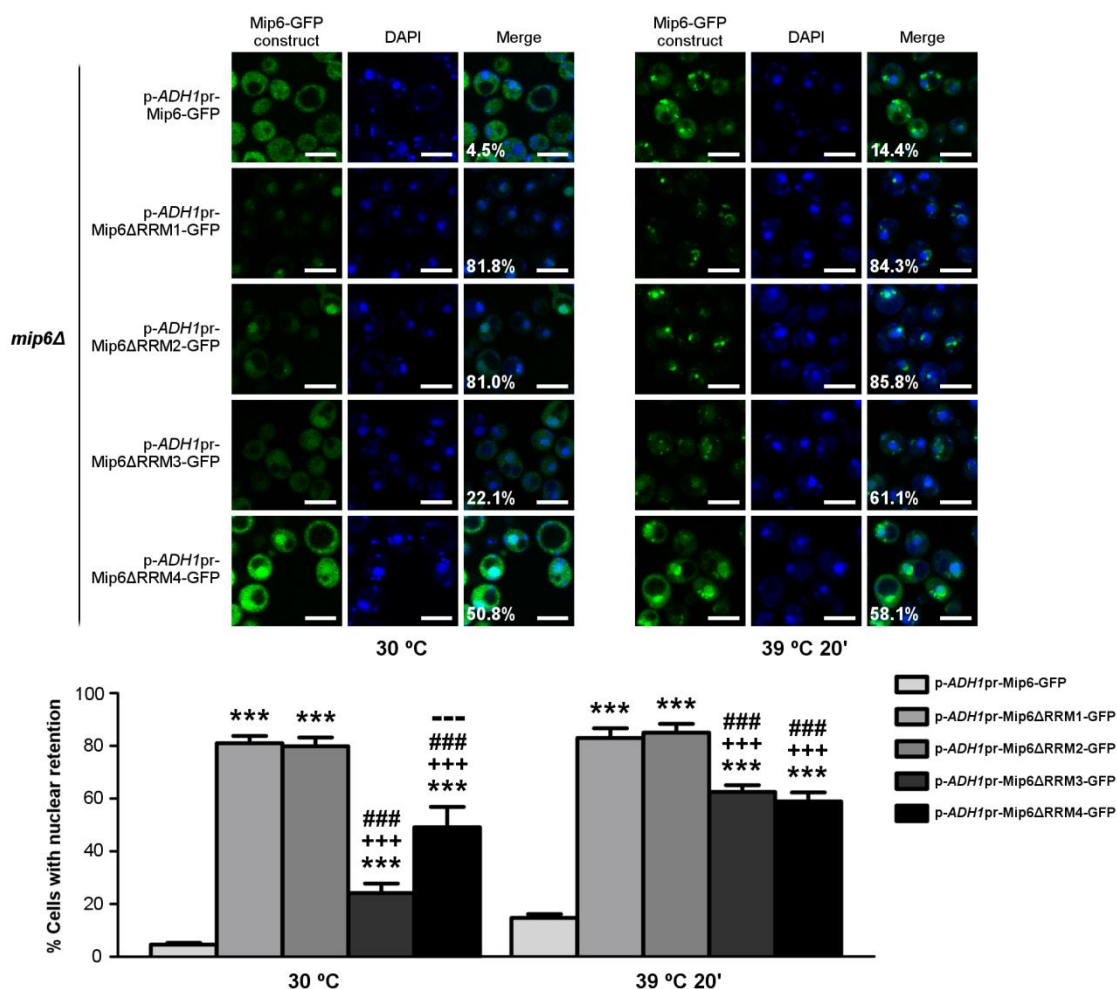


Figura 6. La delección de los dominios RRM de Mip6 afecta a su localización. Ensayos de localización realizados en la cepa *mip6Δ* transformada con los plásmidos Mip6-GFP y los mutantes de los RRM tras crecer a 30°C y después de exposición a choque térmico a 39°C durante 20 minutos (arriba). Los núcleos fueron teñidos con DAPI. Escala: 5 μm. Gráficos de barras mostrando las diferencias existentes entre Mip6 y cada uno de los mutantes: Mip6ΔRRM1 (*); Mip6ΔRRM2 (+); Mip6ΔRRM3 (#) y Mip6ΔRRM4 (-) (abajo).

Mip6 contiene una secuencia de exportación nuclear (NES)

A lo largo de esta tesis se han mostrado diversos mecanismos a través de los cuales Mip6 es capaz de salir del núcleo al citoplasma. Pese a eliminar los distintos elementos descritos en los mutantes construidos, una proporción de Mip6 sigue siendo citoplasmática. Uno de los mecanismos que podría estar involucrado podría ser la presencia de una secuencia de exportación nuclear

(NES), tal y como ocurre con otras proteínas de unión a ARN (Li and Yen, 2002; Murphy *et al.*, 2004). Utilizando la herramienta bioinformática NetNES 1.1 (La Cour *et al.*, 2004) identificamos una posible secuencia NES (I₄₂₇-X-F-XX-I-X-I₄₃₄) en el dominio RRM4 de Mip6 (**Figura 7A**).

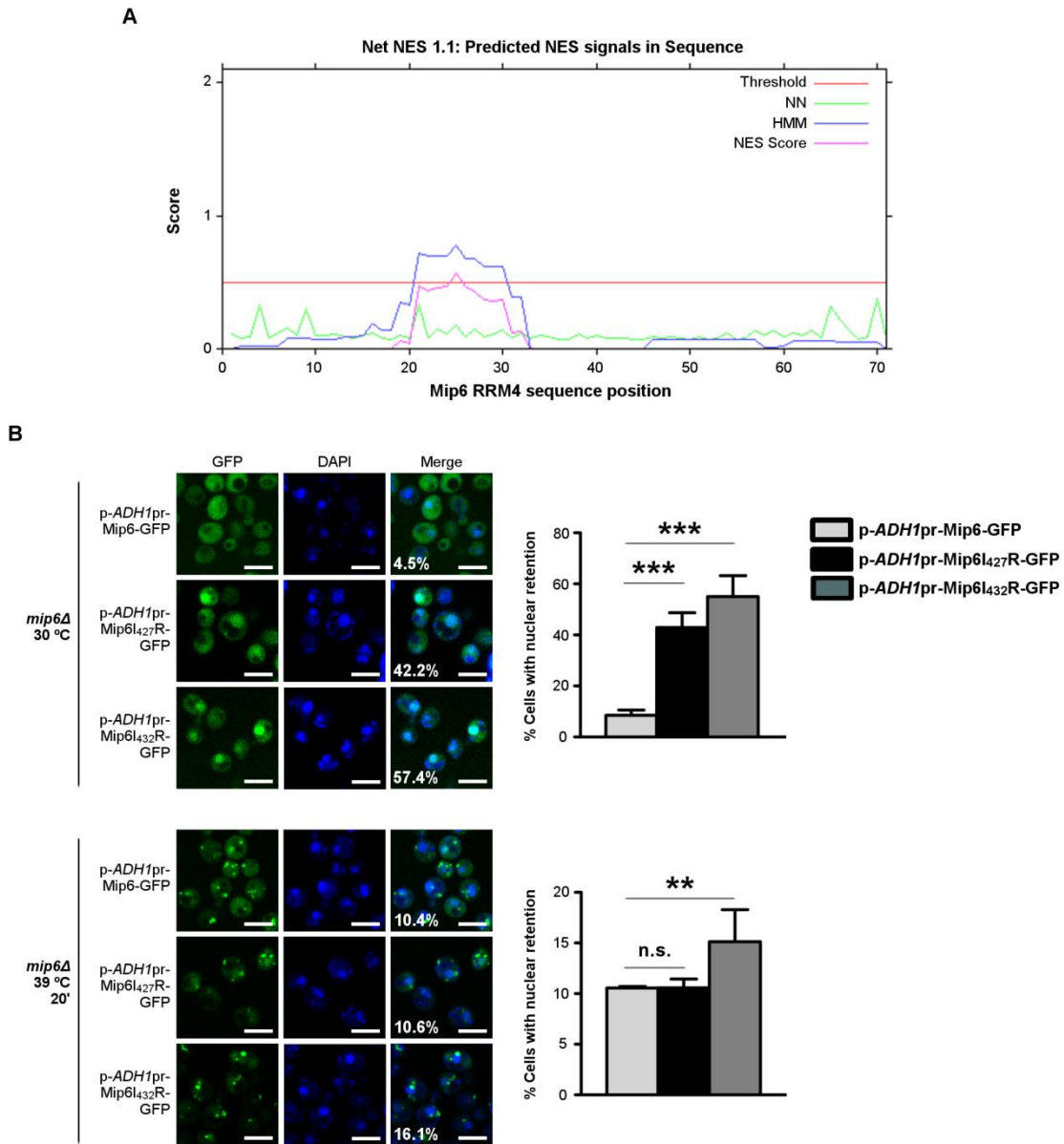


Figura 7. El dominio RRM4 de Mip6 contiene una secuencia de exportación nuclear (NES). (A) Análisis de la secuencia NES obtenida utilizando NetNES 1.1 (La Cour *et al.*, 2004). NN: algoritmos de redes neuronales, HMM: modelos ocultos de Markov. (B) Imágenes de confocal mostrando la localización de los mutantes puntuales de la secuencia NES en una cepa *mip6Δ* tras crecer a 30°C y tras 20 minutos a 39°C. Los núcleos fueron teñidos con DAPI. Escala: 5 μm (izquierda). Gráficos de barras mostrando las diferencias existentes entre Mip6 y cada uno de los mutantes en el porcentaje de células con retención nuclear.

Para determinar el papel de esta secuencia, se crearon mutantes puntuales de dos residuos hidrofóbicos, las isoleucinas (I) 427 y 432, los cuales fueron intercambiados por residuos de arginina (R). Ensayos de localización subcelular determinaron que la mutación de cada residuo producía la retención parcial de Mip6 en el núcleo, principalmente a 30°C (**Figura 7B**). Este fenotipo sugiere que esta secuencia es necesaria para el transporte de Mip6 especialmente en condiciones óptimas de crecimiento.

Msn5 controla la exportación mediada por la secuencia NES de Mip6

Las proteínas que contienen secuencias NES son principalmente transportadas por la exportina Crm1/Xpo1 (Kutay and Güttinger, 2005; Stade *et al.*, 1997). Para comprobar si la exportación de Mip6 se ve afectada por esta ruta, se realizaron ensayos de localización de Mip6 utilizando la cepa termosensible *xpo1-1* (Brune *et al.*, 2005). Esta cepa presenta un defecto en la exportación de proteínas que contienen NES tras incubación a 37°C durante 30 o 60 minutos (Peiró-Chova and Estruch, 2009; Mirón-García *et al.*, 2013). Ensayos realizados tras la inactivación de Xpo1 mostraron que la localización de Mip6 no se veía afectada (**Figura 8A**). Además, pudimos observar que, utilizando uno de los mutantes puntuales de la secuencia NES, la localización de Mip6 tampoco se veía alterada en la cepa *xpo1-1* indicando que el transporte de Mip6 desde el núcleo al citoplasma es independiente de la exportina Crm1/Xpo1 (**Figura 8B**). Además de la ruta dependiente de Crm1/Xpo1, otras proteínas que presentan NES pueden ser transportadas por la carioferina Msn5 (Bakhrat *et al.*, 2008; DeVit and Johnston, 1999), la cual también se encarga del transporte de los factores de transcripción Msn2/Msn4 (Görner *et al.*, 2002). Se realizaron ensayos de localización en la cepa *msn5Δ* para determinar si la localización de Mip6 dependía de la acción de esta carioferina. Tal y como se muestra en la **Figura 8C**, Mip6 se encuentra parcialmente retenido en el núcleo cuando se deletiona *MSN5*. Además, cuando comparamos la localización del mutante NES entre *mip6Δ* y *mip6Δmsn5Δ*, observamos que en ambos casos se muestra un valor similar de células con retención nuclear (**Figura 8D**). Estos resultados indican que la

exportación de Mip6 podría también estar controlada por Msn5 y no por Crm1/Xpo1.

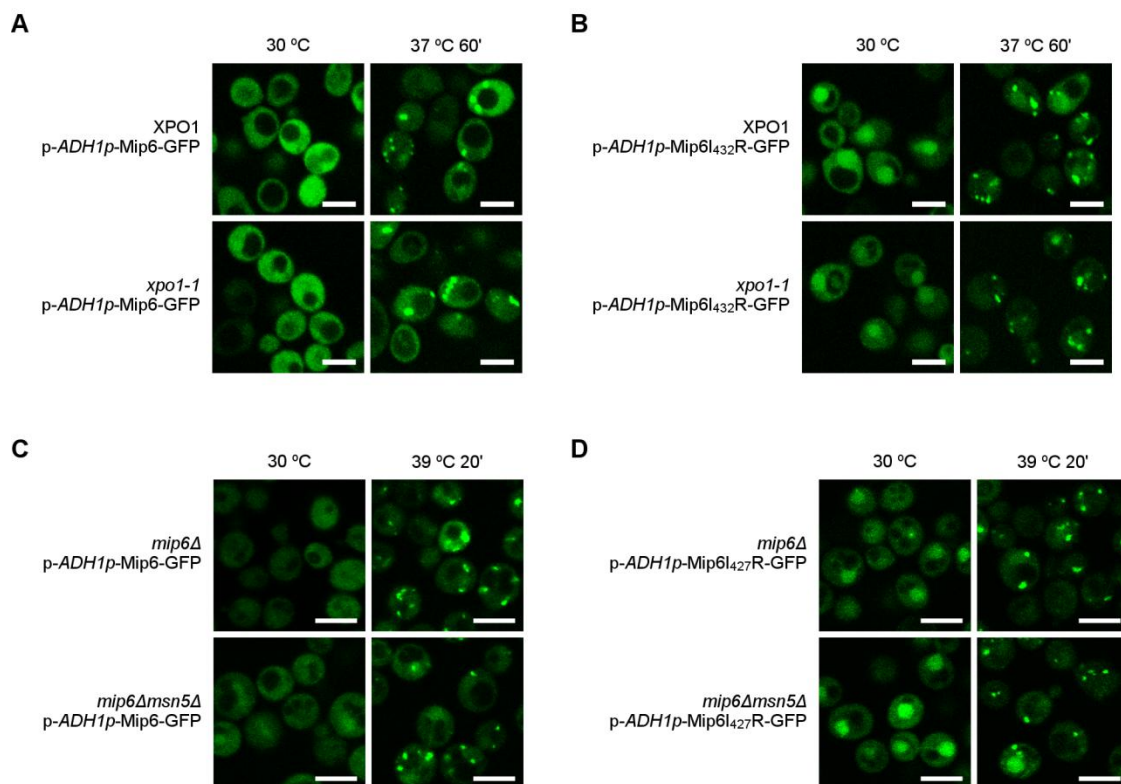


Figura 8. Msn5 y no Crm1/Xpo1 participa parcialmente en la exportación de Mip6. (A) Localización de Mip6-GFP en las cepas XPO1 y *xpo1-1* tras crecimiento a 30°C y tras inducción a 37°C durante una hora. Escala: 5 μ m. (B) Imágenes de confocal mostrando la localización de Mip6 y del mutante puntual Mip6I₄₃₂R en una cepa *xpo1-1* tras crecer a 30°C y tras 20 minutos a 39°C. Escala: 5 μ m. (C) Imágenes de confocal de Mip6-GFP en las cepas *mip6* Δ y *mip6* Δ *msn5* Δ a 30°C y tras choque térmico a 39°C durante 20 minutos. Escala: 5 μ m. (D) Localización subcelular de Mip6 y del mutante Mip6I₄₂₇R en la cepa *mip6* Δ *msn5* Δ tras crecimiento a 30°C y después de una incubación a 39°C por 20 minutos. Escala: 5 μ m.

Discusión

En este trabajo, proponemos una nueva función de Mip6 en el metabolismo de ARNs en levadura. Mip6 inicialmente fue descrita como una proteína que interactuaba con Mex67, de ahí su nombre, *Mex67 Interacting Protein 6* (Segref *et al.*, 1997). Se sugirió que, debido a la presencia de dominios de unión a ARN y su interacción con Mex67, podría tener algún tipo de función relacionada con el metabolismo del ARN, como así se ha confirmado en un artículo más recientemente (Jin *et al.*, 2017). Gracias al

trabajo realizado durante mi tesis, hemos definido qué regiones son necesarias para la interacción directa entre Mex67 y Mip6 y los efectos que se producen cuando no se da dicha interacción. Parte de este trabajo, realizado en colaboración con los doctores Jerónimo Bravo y José Manuel Cañadillas, nos ha permitido concluir que los dominios RRM4 de Mip6 y el dominio UBA de Mex67 son necesarios para su interacción directa siendo de especial relevancia el residuo triptófano en posición 442 de Mip6. Mutantes en este residuo que impiden la interacción entre Mex67 y Mip6 afectan negativamente al crecimiento celular y provocan la retención parcial de Mip6 en el núcleo. El dominio UBA de Mex67 es una región necesaria no únicamente para esta interacción sino que también lo es para el adecuado paso de Mex67 a través del poro nuclear. Es a través de este dominio por el cual interacciona Mex67 con las repeticiones FXFG de las nucleoporinas y también con otras proteínas poliubiquitinadas o que forman parte de otros complejos como Hpr1, componente del complejo de elongación de la transcripción THO (Hobeika *et al.*, 2007, Gwizdek *et al.*, 2006). Este dominio es capaz de interaccionar simultáneamente con las repeticiones FXFG y con la proteína Hpr1 pero no con otras proteínas poliubiquitinadas (Hobeika *et al.*, 2009). En datos experimentales obtenidos por el laboratorio del doctor Jerónimo Bravo, se ha comprobado que la interacción entre Mex67 y Mip6 es compatible con su interacción con las repeticiones FXFG de las nucleoporinas lo que sugiere que Mip6 sale del núcleo junto a Mex67 (Tesis Nada Mohamad). El hecho de que Hpr1 se una también al UBA plantea la posible existencia de asociación excluyente entre ambos factores y Mex67. Futuros experimentos nos permitirán determinar tales mecanismos.

Por otro lado, se ha demostrado que dominios proteicos que presentan un tipo de función bastante definida a nivel estructural, como es el dominio de unión a ARN (RRM), son utilizados en otro tipo de interacciones más allá de ARN-proteína como las de proteína-proteína (Muto and Yokoyama, 2012). Este es el caso del RRM4 de Mip6. Estos datos sugieren que podría existir una plasticidad funcional a la hora de la interacción entre Mip6 y Mex67 o ARN, ya que, en datos obtenidos por el laboratorio del doctor Bravo, la unión del cuarto RRM de Mip6 con ARN no permite su interacción con Mex67 y viceversa

(Martín-Expósito *et al.*, en revisión). Además, el propio dominio RRM4 de Mip6, posee una posible secuencia de exportación nuclear (NES). Estas secuencias también están presentes en otras proteínas relacionadas con el metabolismo de ARN como Pab1 (Dunn *et al.*, 2005; Kirli *et al.*, 2015). Aunque la exportación mediada para la mayoría de proteínas con NES está relacionada con la participación de Crm1/Xpo1, Mip6 no depende de esta vía y sí de la carioferina Msn5, la cual también participa en el transporte de otras proteínas (Yoshida and Blobel, 2001; Taberner *et al.*, 2012). La capacidad de interacción del RRM4 con Msn5 o con Mex67 para la exportación de Mip6 sugiere que podría existir cierta especificidad dependiendo de su interacción con una u otra vía. Parece por los datos mostrados en este trabajo que la capacidad de Mip6 de unir ARNs es importante para su transporte. Este papel sería ejercido principalmente por los RRM1 y RRM2 cuya delección genera la mayor retención nuclear de Mip6 y podrían actuar en tandem. Este hecho se ha definido para otra proteína de unión a ARN como es Pab1 (Sachs *et al.*, 1987; Melamed *et al.*, 2013).

La complejidad de fenotipos de localización de Mip6 asociados a las distintas mutaciones estudiadas en este trabajo nos lleva a proponer el siguiente modelo de trabajo. Mip6 podría ser transportado por 3 vías dependiendo de la interacción i) del RRM4 con Mex67 (a través del triptófano 442), ii) del NES con Msn5 o iii) a través de su interacción con ARN formando parte de una ribonucleopartícula independientemente de las otras dos rutas (**Figura 9**).

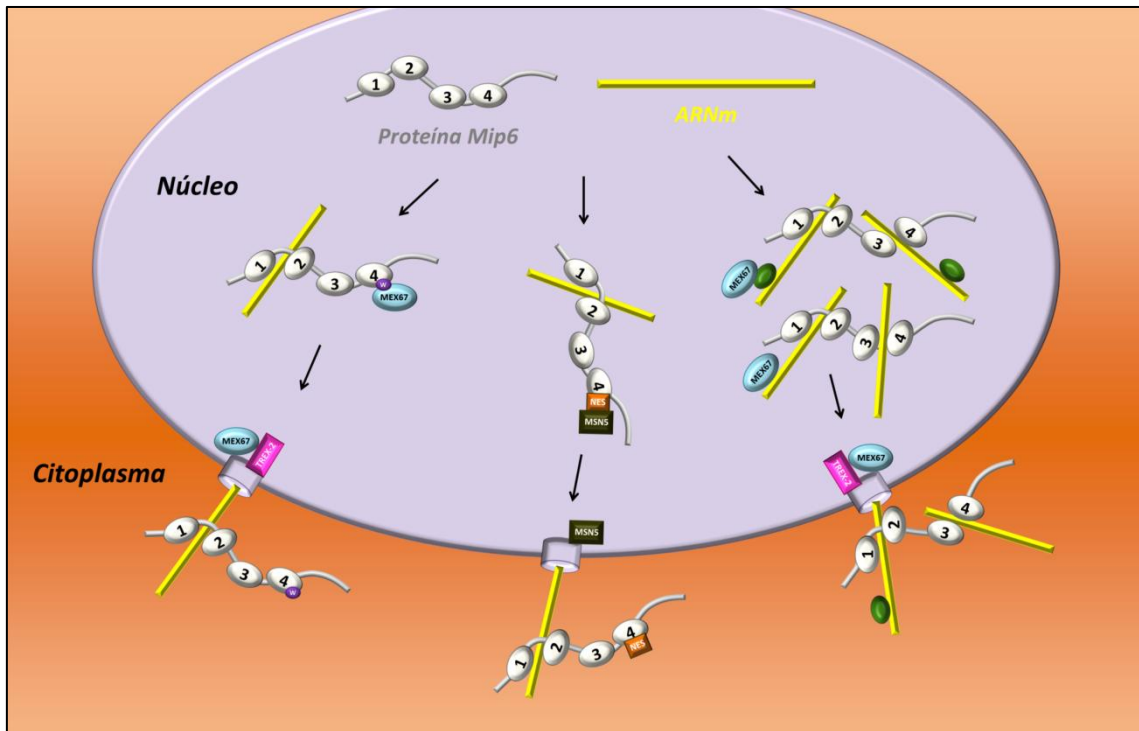


Figura 9. Posibles vías de exportación de Mip6. La interacción del tándem RRM1-RRM2 con ARN sería esencial para el futuro transporte de Mip6. Una vez unido, Mip6 sería exportado por una vía específica dependiendo de la interacción del dominio RRM4. Si este dominio une ARN, sólo o junto al dominio RRM3 como otro tándem, Mip6 podría ser transportado de manera inespecífica junto a la ribonucleopartícula. Otra posibilidad sería la interacción de la secuencia NES del RRM4 con la carioferina Msn5. Por último, también existe la posibilidad de que Mip6 interactuara directamente con Mex67 a través del triptófano 442 de Mip6. Otras proteínas de unión a ARN en verde.

Tal y como se muestra en esta tesis, la localización de Mip6 varía notablemente cuando se expone a la célula a algún tipo de estrés mostrando su acumulación en SGs. Además, también hemos visto junto a otros laboratorios que Mip6 colocaliza parcialmente con PBs (Bolognesi *et al.*, 2016). Estas estructuras presentan un comportamiento dinámico y son capaces de intercambiar su contenido entre ambas y el citoplasma (Buchan *et al.*, 2011). Hemos comprobado que la ausencia de Mip6 produce alteraciones leves en el metabolismo de SGs y no de los PBs sugiriendo que Mip6 podría ejercer algún papel en este tipo de situaciones. Como ya hemos demostrado, Mip6 es capaz de interactuar con diferentes ARNs mensajeros dependiendo de las condiciones ambientales. En condiciones de estrés, Mip6 se une preferentemente a ARNms relacionados con proteínas ribosomales, transcritos que en esas condiciones se reprimen a nivel de transcripción y traducción mientras que para los genes de respuesta a estrés ocurre lo contrario. Además,

en estas situaciones Mip6 se encuentra mayoritariamente localizado en SGs, siendo esta localización compatible con la represión de sus targets. Por otro lado, en condiciones óptimas de crecimiento, Mip6 se une preferentemente a genes dependientes de los factores de transcripción Msn2/Msn4, genes relacionados con la respuesta a estrés y que en principio son reprimidos en estas condiciones. Mip6 se encargaría de la represión de estos genes en colaboración con los mecanismos de degradación de ARN ya que en ausencia de *MIP6* y también de *RRP6*, como miembro del exosoma nuclear, los niveles de algunos ARNs diana de Msn2/Msn4 aumentan. Además, este control podría estar mediado por Mex67 ya que se produce un efecto similar en el mutante *Mip6W_{442A}*. Por otro lado, en estas mismas condiciones, Mex67 presenta diversas interacciones con proteínas de unión a ARNs de expresión constitutiva, para su transporte controlado al citoplasma. Estas proteínas se denominan proteínas adaptadoras entre las cuales se encuentran Nab2, Gbp2, Hrb2 y Npl3 (Hackmann *et al.*, 2014; Iglesias *et al.*, 2010; Lei *et al.*, 2001). Su papel es señalar el estado maduro del ARNm para que posteriormente sea transportado por Mex67 (Zander and Krebber, 2017).

Como resumen global del papel que Mip6 podría ejercer en la célula, proponemos el siguiente modelo en el cual Mip6 ejercería un papel más bien represor de los ARNs a los que se une los cuales varían dependiendo de las condiciones ambientales en las que se encuentra (**Figura 10**).

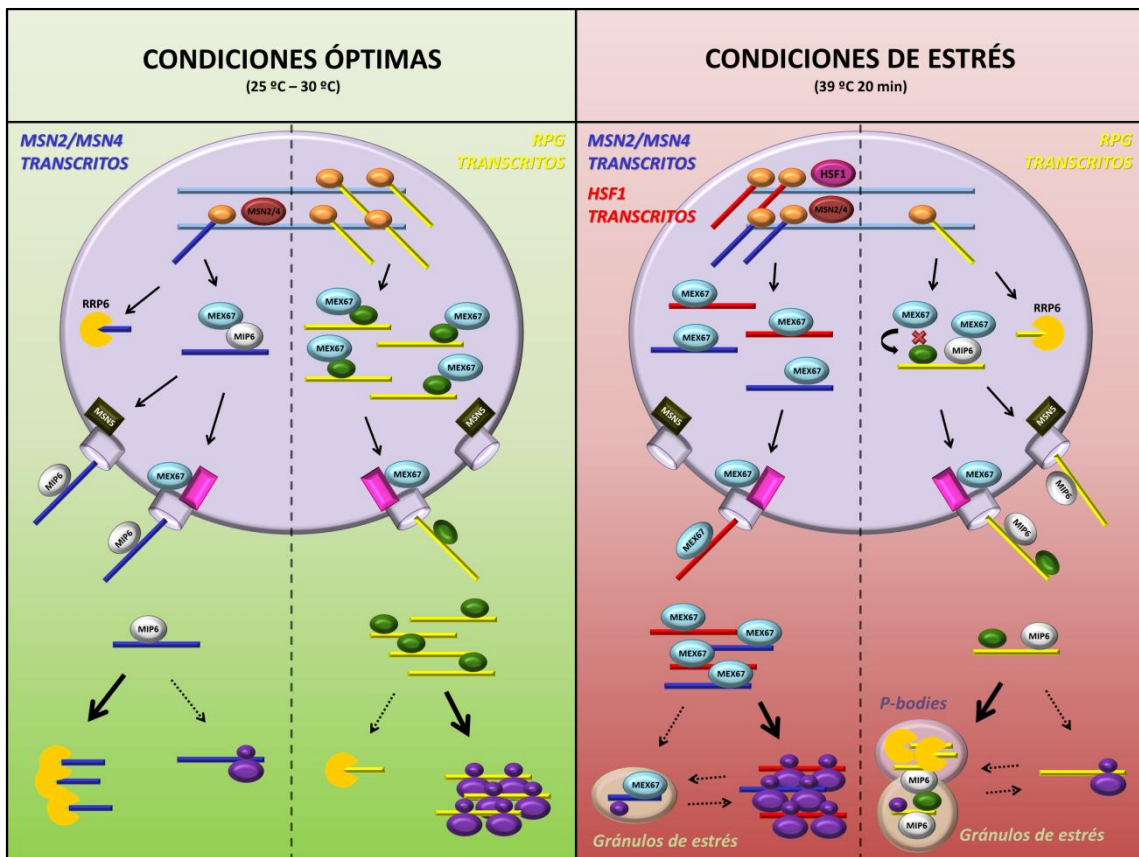


Figura 10. Papel de Mip6 en la regulación del metabolismo de los ARNs en condiciones óptimas de crecimiento y en estrés. En condiciones óptimas de crecimiento, Mex67 se encarga de transportar junto a otras proteínas adaptadoras los ARNs de genes constitutivos, entre los que se encuentran los RPGs. En cambio, Mip6 se uniría a ARNs dependientes de los factores de transcripción Msn2/Msn4, que no hayan sido previamente degradados por el exosoma nuclear con Rrp6, y los exportaría para su posterior degradación en el citoplasma. Bajo condiciones de estrés, Mex67 se encargaría del transporte de genes relacionados con la respuesta a estrés de manera independiente, sin proteínas adaptadoras, lo cual facilita una mayor brevedad en su exportación. Estos ARNs son preferentemente traducidos aunque existen casos como algunos ARNs dependientes de Msn2/Msn4 los cuales se pueden almacenar en SGs (Zid and O'Shea, 2014). En estas condiciones, Mip6 se uniría preferentemente a ARNs de RPGs que no han sido degradados o bloqueados en el núcleo para transportarlos al citoplasma. Una vez allí, quedarían acumulados en SGs ayudando en la represión de estos genes y facilitando de manera indirecta la interacción de Mex67 con los genes de respuesta a estrés. RNA Pol II en naranja; subunidades ribosomales en morado; otras proteínas de unión a ARN en verde; proteínas de degradación de ARNs en amarillo oscuro.

Conclusiones

1. Mip6 interacciona genética y físicamente con el exportador de ARNs mensajeros Mex67. Su interacción física se produce entre el dominio RRM4 de Mip6, en concreto el triptófono 442, y el dominio UBA de

- Mex67. La interacción entre ambas proteínas es necesaria para la correcta salida al citoplasma de Mip6.
2. Mip6 se acumula en gránulos de estrés y parcialmente en p-bodies en situaciones de estrés. La ausencia de *MIP6* produce anomalías en el metabolismo de los gránulos de estrés que contienen Pab1. Dicho efecto no se produce en el metabolismo de los p-bodies.
 3. Mip6 se une preferentemente a ARNs mensajeros dependientes de los factores de transcripción Msn2/Msn4 en condiciones óptimas de crecimiento para colaborar en su metabolismo. En cambio, en condiciones de estrés Mip6 se asocia mayoritariamente a ARNs de genes de proteínas ribosomales.
 4. La delección de los dominios de unión a ARN de Mip6 produce defectos en la exportación de Mip6 al citoplasma. Además, Mip6 presenta una posible secuencia de exportación nuclear que media su salida a través de la interacción con Msn5.



Universitat de València
Programa de Doctorado en Biomedicina y Biotecnología

ANNEXES

Functional characterization of the yeast RNA binding protein Mip6

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Valencia, Abril 2019



Annex 1. PAR-CLIP results obtained after reads normalization with RPKM.

Columns	<i>SystNAME</i>	Systematic gene name
	<i>geneNAME</i>	Standard gene name
	<i>total_612_mean</i>	Reads value of normalized PAR-CLIP at 30 °C
	<i>total_634_mean</i>	Reads value of normalized PAR-CLIP after heat shock treatment during 20 minutes at 39 °C
	<i>prob</i>	NOIseq value (p-value) obtained after comparison between both conditions
	<i>Length</i>	Gene length
	<i>parclipSTATE</i>	Mip6 binding state between 39 °C (reference) and 30 °C significantly different (UP: 39° > 30° / FLAT: 39° = 30° / DOWN: 39° < 30°)
	Fc 30/39	Fold change enrichment of Mip6 binding at 30 °C
	log2(FC 30/39)	Logarithm base 2 of Fold change 30/39
	Fc 39/30	Fold change enrichment of Mip6 binding at 39 °C
	log2(FC 39/30)	Logarithm base 2 of Fold change 30/39

SystNAME	geneNAME	total_612_mean	total_634_mean	prob	Length	parclipSTATE	Fc 30/39	log2(FC 30/39)	Fc 39/30	log2(FC 39/30)
YAL001C	TFC3	75.66746772	78.39197887	0.183014354	3483	flat	0.965245026	-0.051032879	1.036006374	0.051032879
YAL002W	VPS8	33.60673692	34.87798402	0.120784399	3825	flat	0.963551589	-0.053566184	1.037827151	0.053566184
YAL003W	EFB1	840.1013817	770.839618	0.557010294	621	flat	1.089852366	0.124132718	0.91755547	-0.124132718
YAL004W	YAL004W	0.546106263	0.23421728	0.070798898	648	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YAL005C	SSA1	1029.068033	1716.157727	0.912998405	1929	up	0.59963488	-0.737843789	1.667681506	0.737843789
YAL007C	ERP2	236.7370648	165.5916168	0.872140061	648	flat	1.42964402	0.515655962	0.699474824	-0.515655962
YAL008W	FUN14	158.2665345	165.2467643	0.275866319	597	flat	0.957758751	-0.062265793	1.044104269	0.062265793
YAL009W	SPO7	136.219906	116.3591446	0.668421053	780	flat	1.170685006	0.227352945	0.854200741	-0.227352945
YAL010C	MDM10	80.58936546	75.78398787	0.304494708	1482	flat	1.063408877	0.088696415	0.940372063	-0.088696415
YAL011W	SWC3	40.74859988	36.69054845	0.333790054	1878	flat	1.110602092	0.151342019	0.900412494	-0.151342019
YAL012W	CYS3	98.62264337	84.40360628	0.615006525	1185	flat	1.168464805	0.22461428	0.855823809	-0.22461428
YAL013W	DEP1	15.54385214	11.58856334	0.368036828	1218	flat	1.341309676	0.423642359	0.745539988	-0.423642359
YAL014C	SYN8	178.6663434	164.6181513	0.485428447	768	flat	1.085338051	0.118144469	0.921371917	-0.118144469
YAL015C	NTG1	117.4428823	141.5281335	0.718856024	1200	flat	0.829820046	-0.269129586	1.205080553	0.269129586
YAL016C-A	YAL016C-A	2.246837194	4.818184042	0.310345078	315	flat	0.466324485	-1.100593911	2.144429536	1.100593911
YAL016C-B	YAL016C-B	0.475640938	2.447948344	0.262715673	186	flat	0.194301869	-2.363628317	5.146630887	2.363628317
YAL016W	TPD3	206.6600048	220.7387383	0.442786719	1908	flat	0.936219924	-0.095080627	1.0681251	0.095080627
YAL017W	PSK1	52.5686637	59.98585874	0.472879513	4071	flat	0.87635094	-0.190419373	1.1410937	0.190419373
YAL018C	LDS1	0.814133876	1.086308365	0.064129332	978	flat	0.749450066	-0.416095737	1.334311711	0.416095737
YAL019W	FUN30	48.37671713	44.24472007	0.324931129	3396	flat	1.093389608	0.128807569	0.914587072	-0.128807569
YAL019W-A	YAL019W-A	1.552091483	2.662680655	0.154791939	570	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YAL020C	ATS1	189.2111045	209.1798734	0.551855879	1002	flat	0.90453781	-0.144747286	1.105536982	0.144747286
YAL021C	CCR4	23.26099873	21.61283272	0.181129477	2514	flat	1.076258676	0.106024868	0.929144658	-0.106024868
YAL022C	FUN26	55.84832655	56.25555423	0.038168769	1554	flat	0.992761112	-0.010481492	1.007291672	0.010481492
YAL023C	PMT2	76.75092383	55.05092254	0.77138611	2280	flat	1.39418052	0.479417375	0.71726723	-0.479417375
YAL024C	LTE1	14.41629262	11.37943675	0.303863999	4308	flat	1.266872248	0.341271049	0.789345573	-0.341271049
YAL025C	MAK16	168.0050556	90.96480362	0.908554444	921	down	1.846923743	0.885124301	0.541440871	-0.885124301
YAL026C	DRS2	28.53284402	24.54928728	0.350318979	4068	flat	1.162267714	0.216942415	0.860386972	-0.216942415
YAL026C-A	YAL026C-A	46.86040587	24.25592651	0.828744382	438	flat	1.931915725	0.950032162	0.517620923	-0.950032162
YAL027W	SAW1	46.37317606	50.78402761	0.336276642	786	flat	0.913144905	-0.131084278	1.095116443	0.131084278
YAL028W	FRT2	41.14069333	51.73855284	0.60508192	1587	flat	0.795165135	-0.330673594	1.257600411	0.330673594
YAL029C	MYO4	74.46559565	56.15868452	0.731528201	4416	flat	1.325985398	0.407064888	0.754156118	-0.407064888
YAL030W	SNC1	278.6530345	243.9511912	0.672270552	354	flat	1.142249124	0.191877336	0.875465762	-0.191877336
YAL031C	GIP4	27.00965507	37.95981922	0.63969117	2283	flat	0.711532763	-0.490997906	1.40541666	0.490997906
YAL031W-A	YAL031W-A	3.435697652	4.420569913	0.139183707	309	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YAL032C	PRP45	39.96635569	40.60587999	0.058895172	1140	flat	0.984250451	-0.022902627	1.0166001567	0.022902627
YAL033W	POP5	450.1422103	347.44922	0.843497173	522	flat	1.295562587	0.373578712	0.771865451	-0.373578712
YAL034C	FUN19	46.44277606	103.3814706	0.939720168	1242	up	0.449236945	-1.154451515	2.225996795	1.154451515
YAL034C-B	YAL034C-B	1.249565177	2.572420294	0.188241264	354	flat	0.485754672	-1.041700222	2.058652355	1.041700222
YAL034W-A	MTW1	81.65606812	48.49751455	0.852269103	870	flat	1.683716555	0.751649288	0.593924195	-0.751649288
YAL035W	FUN12	124.9859192	96.23878276	0.784123532	3009	flat	1.29870636	0.377075271	0.769996999	-0.377075271
YAL036C	RBG1	334.3498693	245.707853	0.861432507	1110	flat	1.360761837	0.444414586	0.734882456	-0.444414586
YAL037C-A	YAL037C-A	5.70769126	13.0557245	0.595048572	93	flat	0.437179205	-1.193703316	2.287391505	1.193703316
YAL037C-B	YAL037C-B	2.086966086	0.933986445	0.174430912	975	flat	2.234471493	1.159933639	0.447533121	-1.159933639
YAL037W	YAL037W	40.27329915	48.13689468	0.516369436	804	flat	0.836640989	-0.257319415	1.195255807	0.257319415
YAL038W	CDC19	590.147934	602.3451338	0.177961433	1503	flat	0.97975048	-0.02951372	1.020668038	0.02951372
YAL039C	CYC3	93.05650713	89.56468781	0.222393794	810	flat	1.038986563	0.055176996	0.962476355	-0.055176996
YAL040C	CLN3	41.36684443	47.28205907	0.425453096	1743	flat	0.874895156	-0.192817955	1.142994099	0.192817955

YAL041W	CDC24	76.50086465	85.85665845	0.50215311	2565	flat	0.891030073	-0.16645397	1.122296576	0.16645397
YAL042C-A	YAL042C-A	1.872364329	1.204546011	0.110207337	378	flat	1.554414951	0.636371683	0.643328861	-0.636371683
YAL042W	ERV46	125.2604985	96.07412652	0.785580687	1248	flat	1.303790136	0.382711665	0.766994605	-0.382711665
YAL043C	PTA1	19.4722317	18.40840544	0.118290561	2358	flat	1.057790245	0.081053575	0.945367009	-0.081053575
YAL044C	GCV3	752.7643692	1215.661646	0.909525881	513	up	0.619221945	-0.691471493	1.614929844	0.691471493
YAL044W-A	YAL044W-A	76.77958858	49.22360995	0.823807453	333	flat	1.559812226	0.641372364	0.641102809	-0.641372364
YAL045C	YAL045C	2.290465101	3.43821871	0.157945484	309	flat	0.666177836	-0.586020738	1.501100675	0.586020738
YAL046C	AIM1	337.521205	266.5589466	0.823604466	357	flat	1.266216007	0.340523539	0.789754666	-0.340523539
YAL047C	SPC72	39.57210452	54.08276245	0.695519791	1869	flat	0.731695326	-0.450685051	1.366689063	0.450685051
YAL047W-A	YAL047W-A	6.166036164	10.11818649	0.381093229	330	flat	0.609401316	-0.714535479	1.640954775	0.714535479
YAL048C	GEM1	17.96961421	30.52243285	0.692989706	1989	flat	0.588734663	-0.764310523	1.698558048	0.764310523
YAL049C	AIM2	129.6593347	109.7843716	0.675888067	741	flat	1.18103636	0.240053381	0.846713983	-0.240053381
YAL051W	OAF1	33.56990233	50.97712277	0.750855444	3144	flat	0.658528777	-0.602681608	1.518536523	0.602681608
YAL053W	FLC2	33.40164222	43.621177338	0.608054226	2352	flat	0.765710324	-0.385129386	1.305976907	0.385129386
YAL054C	ACS1	21.51842239	36.77408115	0.737052342	2142	flat	0.585151871	-0.773116982	1.708958049	0.773116982
YAL055W	PEX22	185.7364725	141.9900203	0.820755401	543	flat	1.308095259	0.387467606	0.764470319	-0.387467606
YAL056C-A	YAL056C-A	4.536882796	11.67483056	0.588958968	351	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YAL056W	GPB2	124.6870314	129.0327187	0.217703349	2643	flat	0.966321044	-0.049425515	1.034852761	0.049425515
YAL058W	CNE1	36.29055255	42.91458605	0.471458605	1509	flat	0.845008362	-0.242962477	1.183420242	0.242962477
YAL059C-A	YAL059C-A	4.182941585	6.817217847	0.288386255	423	flat	0.613584849	-0.704665235	1.629766447	0.704665235
YAL059W	ECM1	716.3375837	396.4143955	0.92092939	639	down	1.807042307	0.853630283	0.553390475	-0.853630283
YAL060W	BDH1	275.6482054	360.6089963	0.847056691	1149	flat	0.764396363	-0.38760718	1.308221818	0.38760718
YAL061W	BDH2	56.01639261	108.5647522	0.909214151	1254	up	0.515972187	-0.954634794	1.938088961	0.954634794
YAL062W	GDH3	29.36096203	45.39928654	0.737958533	1374	flat	0.646727389	-0.628770386	1.54624656	0.628770386
YAL063C	FLO9	2.072974792	3.212122695	0.157133536	3969	flat	0.645359779	-0.631824428	1.549182428	0.631824428
YAL063C-A	YAL063C-A	27.96964858	49.54782044	0.803052052	291	flat	0.564498061	-0.824959469	1.771485269	0.824959469
YAL064C-A	TDA8	2.322026628	2.788476591	0.087965782	381	flat	0.832722295	-0.264092643	1.20088054	0.264092643
YAL064W	YAL064W	4.966692745	7.988041965	0.317783094	285	flat	0.621765981	-0.685556412	1.608322152	0.685556412
YAL064W-B	YAL064W-B	74.76925742	142.61066	0.913484124	381	up	0.524289401	-0.931564715	1.907343538	0.931564715
YAL065C	YAL065C	3.429039323	6.274844334	0.308684935	387	flat	0.546474006	-0.871775221	1.829913204	0.871775221
YAL066W	YAL066W	7.444011578	14.24404894	0.544236625	309	flat	0.522605027	-0.936207093	1.913490971	0.936207093
YAL067C	SEO1	5.709292744	18.65221247	0.758431202	1782	flat	0.306091985	-1.707962825	3.26699178	1.707962825
YAL067W-A	YAL067W-A	NA	NA	NA	228	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YAL068C	PAU8	0.731150533	0.41810688	0.069327244	363	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YAL068W-A	YAL068W-A	NA	NA	NA	255	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YAL069W	YAL069W	1.123418597	0.481818404	0.113708859	315	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YAR002C-A	ERP1	321.1700576	222.370144	0.881571698	660	flat	1.444303861	0.530374297	0.692375079	-0.530374297
YAR002W	NUP60	24.73861369	18.081574	0.504472959	1620	flat	1.368167046	0.452244386	0.730904902	-0.452244386
YAR003W	SWD1	145.9293133	104.9732228	0.83816152	1281	flat	1.390157502	0.475248347	0.719342951	-0.475248347
YAR007C	RFA1	85.81418987	75.72372686	0.523720458	1866	flat	1.13325365	0.180470808	0.882414983	-0.180470808
YAR008W	SEN34	236.9863742	142.4244729	0.903102798	828	down	1.66394419	0.734607045	0.600981695	-0.734607045
YAR009C	YAR009C	38.33419599	48.5199586	0.597774395	3591	flat	0.790070666	-0.339946398	1.265709567	0.339946398
YAR010C	YAR010C	19.72669561	27.99135491	0.567362621	1323	flat	0.704742434	-0.50483201	1.41895812	0.50483201
YAR014C	BUD14	72.10448658	79.73415973	0.449920255	2130	flat	0.904311111	-0.145108905	1.105814125	0.145108905
YAR015W	ADE1	142.5497441	155.2334149	0.47569958	921	flat	0.918292909	-0.122973689	1.088977155	0.122973689
YAR018C	KIN3	170.2423647	92.59533049	0.90861969	1308	down	1.838563173	0.878578749	0.543902986	-0.878578749
YAR019C	CDC15	15.15318854	21.06658315	0.475808322	2925	flat	0.719299776	-0.47533494	1.390240945	0.47533494
YAR019W-A	YAR019W-A	2.125386535	4.101967496	0.245643033	333	flat	0.518138317	-0.948590818	1.929986583	0.948590818
YAR020C	PAU7	3.686217272	8.130685572	0.446991446	168	flat	0.453371028	-1.141235896	2.205698951	1.141235896

YAR023C	YAR023C	119.5972715	154.8644654	0.799637524	540	flat	0.772270586	-0.372821671	1.294882931	0.372821671
YAR027W	UIP3	218.0491234	233.2327733	0.448339858	708	flat	0.934899158	-0.097117336	1.069634079	0.097117336
YAR028W	YAR028W	56.21873491	89.55671446	0.846585472	705	flat	0.6277445	-0.671750612	1.593004798	0.671750612
YAR029W	YAR029W	27.91695214	72.17639696	0.930324779	225	up	0.386787833	-1.370385683	2.585396737	1.370385683
YAR030C	YAR030C	12.15804995	21.74522535	0.628961867	342	flat	0.559113541	-0.838786809	1.788545485	0.838786809
YAR031W	PRM9	16.66811288	19.45805094	0.278026678	897	flat	0.856617805	-0.223276431	1.167381759	0.223276431
YAR033W	MST28	66.5087712	67.59809697	0.079215601	705	flat	0.98388526	-0.023438016	1.016378678	0.023438016
YAR035C-A	YAR035C-A	0.546106263	1.873738239	0.195802523	81	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YAR035W	YAT1	3.34331334	3.23546661	0.027809192	2064	flat	1.033332667	0.047304784	0.96774256	-0.047304784
YAR042W	SWH1	31.10187693	28.93341805	0.213781354	3567	flat	1.074946516	0.10426488	0.930278842	-0.10426488
YAR047C	YAR047C	5.512100594	4.255312075	0.164934029	321	flat	1.295345793	0.373337277	0.771994633	-0.373337277
YAR050W	FLO1	2.454282501	3.092033582	0.105937364	4614	flat	0.793743805	-0.333254668	1.259852352	0.333254668
YAR053W	YAR053W	29.48973818	34.74932734	0.416804408	297	flat	0.848641986	-0.236772037	1.1783532	0.236772037
YAR060C	YAR060C	8.952241946	8.582390326	0.058532695	336	flat	1.043094244	0.060869511	0.958686146	-0.060869511
YAR061W	YAR061W	NA	NA	NA	204	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YAR062W	YAR062W	1.037327474	1.271128956	0.059040162	597	flat	0.81606785	-0.293238989	1.225388306	0.293238989
YAR064W	YAR064W	1.179589527	0.505909324	0.117514862	300	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YAR066W	YAR066W	2.602035721	0.495989534	0.276627519	612	flat	5.246150461	2.391259185	0.190615959	-2.391259185
YAR068W	YAR068W	3.094602154	3.747476477	0.106597071	486	flat	0.825782943	-0.2716165476	1.210971973	0.2716165476
YAR069C	YAR069C	4.212819739	2.064936018	0.267000145	294	flat	2.040169624	1.028689106	0.490155323	-1.028689106
YAR070C	YAR070C	6.192845017	6.070911893	0.022683776	300	flat	1.020084812	0.028689106	0.980310645	-0.028689106
YAR071W	PHO11	36.98819724	34.59209056	0.226931999	1404	flat	1.069267472	0.096622782	0.935219695	-0.096622782
YAR073W	IMD1	21.38735962	15.52790996	0.471161375	1212	flat	1.377349539	0.461894728	0.726032116	-0.461894728
YAR075W	YAR075W	28.3698747	18.89155072	0.612200957	474	flat	1.501722919	0.586618648	0.665901803	-0.586618648
YBL001C	ECM15	2287.280264	1504.718876	0.899666522	315	flat	1.52007149	0.604139176	0.604139176	-0.604139176
YBL002W	HTB2	185.8747133	168.6364415	0.539596926	396	flat	1.102221511	0.140414188	0.90725865	-0.140414188
YBL003C	HTA2	1562.956123	921.2875066	0.91415833	399	down	1.696491174	0.762553924	0.589451932	-0.762553924
YBL004W	UTP20	63.53182166	79.67970435	0.689154705	7482	flat	0.797340078	-0.326732908	1.254169993	0.326732908
YBL005W	PDR3	20.43454733	23.61255394	0.302037118	2931	flat	0.865410298	-0.208543807	1.155521263	0.208543807
YBL005W-A	YBL005W-A	0.601831391	0.229437335	0.079505582	1323	flat	2.623075231	1.391259185	0.381231918	-1.391259185
YBL005W-B	YBL005W-B	49.55821034	62.63364871	0.651790634	5268	flat	0.791239395	-0.337813836	1.263840003	0.337813836
YBL006C	LDB7	331.3929693	266.0915342	0.812360447	543	flat	1.245409668	0.316620384	0.80294864	-0.316620384
YBL006W-A	YBL006W-A	4.128563345	10.11818649	0.536994345	150	flat	0.408033925	-1.293238989	2.450776613	1.293238989
YBL007C	SLA1	55.40280931	54.32937886	0.089422938	3735	flat	1.019757827	0.02822658	0.980624982	-0.02822658
YBL008W	HIR1	32.68066109	44.39489672	0.647774395	2523	flat	0.736135536	-0.441956678	1.358445492	0.441956678
YBL008W-A	YBL008W-A	7.741056271	7.588639867	0.025358852	240	flat	1.020084812	0.028689106	0.980310645	-0.028689106
YBL009W	ALK2	31.36279392	34.22547572	0.262396694	2031	flat	0.916358159	-0.126016508	1.1031276364	0.126016508
YBL010C	YBL010C	108.1990038	85.51848011	0.743257938	843	flat	1.265211959	0.339379098	0.7903814	-0.339379098
YBL011W	SCT1	58.59145348	74.88789342	0.696346237	2280	flat	0.782388859	-0.354042268	1.27813681	0.354042268
YBL012C	YBL012C	1.540508711	0.75088544	0.130020299	402	flat	2.040169624	1.028689106	0.490155323	-1.028689106
YBL013W	FMT1	12.17735457	9.56445489	0.273676961	1206	flat	1.273188562	0.348446102	0.785429613	-0.348446102
YBL014C	RRN6	106.9208943	125.0359135	0.657184283	2685	flat	0.855121471	-0.225798724	1.169424501	0.225798724
YBL015W	ACH1	63.17630816	69.69452933	0.411193272	1581	flat	0.906474422	-0.141661784	1.103175088	0.141661784
YBL016W	FUS3	71.64173681	37.58591874	0.871958823	1062	flat	1.906079171	0.930608044	0.52463718	-0.930608044
YBL017C	PEP1	38.67261867	25.0393096	0.703863999	4740	flat	1.544476237	0.627117674	0.647468686	-0.627117674
YBL018C	POP8	714.1358237	567.0714965	0.830998985	402	flat	1.259340009	0.332667849	0.794066727	-0.332667849
YBL019W	APN2	46.92321103	71.85660271	0.807865739	1563	flat	0.653011822	-0.614818985	1.531365845	0.614818985
YBL020W	RFT1	48.67088962	54.28627012	0.400507467	1725	flat	0.896559839	-0.157528218	1.11537452	0.157528218
YBL021C	HAP3	114.9082901	68.38498455	0.878374656	435	flat	1.680314632	0.748731397	0.595126639	-0.748731397

YBL022C	PIM1	150.6993234	158.6431709	0.309206902	3402	flat	0.949926319	-0.074112479	1.052713226	0.074112479
YBL023C	MCM2	103.9097564	86.45285924	0.677207482	2607	flat	1.201923884	0.265345535	0.831999441	-0.265345535
YBL024W	NCL1	73.87502293	62.40779258	0.589314195	2055	flat	1.183746771	0.24336049	0.844775272	-0.24336049
YBL025W	RRN10	95.74065682	80.39107074	0.646389735	438	flat	1.190936455	0.252096437	0.839675363	-0.252096437
YBL026W	LSM2	693.0088471	570.7289567	0.801051182	288	flat	1.214252123	0.280068008	0.823552194	-0.280068008
YBL027W	RPL19B	784.1166172	509.3708093	0.900819197	570	down	1.539382711	0.622351949	0.649611038	-0.622351949
YBL028C	YBL028C	1006.233963	668.0839958	0.898165869	321	flat	1.506148882	0.590864387	0.663944987	-0.590864387
YBL029C-A	YBL029C-A	519.6402285	355.7341355	0.890118892	285	flat	1.46075447	0.546713704	0.684577744	-0.546713704
YBL029W	YBL029W	45.75993855	38.51352152	0.494287371	1131	flat	1.188152543	0.248720071	0.841642772	-0.248720071
YBL030C	PET9	363.953289	194.9098933	0.924887632	957	down	1.867289971	0.90094598	0.535535464	-0.90094598
YBL031W	SHE1	41.66839111	27.75785674	0.705089169	1017	flat	1.501138633	0.586057218	0.666160992	-0.586057218
YBL032W	HEK2	56.20033872	48.8692515	0.478033928	1146	flat	1.150014314	0.201651818	0.869554394	-0.201651818
YBL033C	RIB1	87.02029676	99.57348265	0.567877338	1038	flat	0.873930433	-0.194409653	1.144255839	0.194409653
YBL034C	STU1	20.70514642	20.55047784	0.020726403	4542	flat	1.007526276	0.010817465	0.992529945	-0.010817465
YBL035C	POL12	30.95169403	21.64088045	0.601174424	2118	flat	1.430241903	0.516259177	0.699182424	-0.516259177
YBL036C	YBL036C	308.8421417	301.9768836	0.168167319	774	flat	1.022734383	0.032431507	0.97777098	-0.032431507
YBL037W	APL3	36.81905907	44.13146641	0.499289546	3078	flat	0.834304003	-0.261354928	1.198603863	0.261354928
YBL038W	MRPL16	358.8129087	295.0775845	0.788755981	699	flat	1.21599514	0.282137463	0.822371708	-0.282137463
YBL039C	URA7	231.4944447	182.5634855	0.809112658	1740	flat	1.268021609	0.342579331	0.788630093	-0.342579331
YBL039C-A	YBL039C-A	NA	NA	NA	84	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YBL039W-B	YBL039W-B	424.6522297	349.0774339	0.793112948	180	flat	1.216498658	0.282734728	0.822031322	-0.282734728
YBL040C	ERD2	449.0482859	470.4956717	0.356800058	660	flat	0.954415339	-0.067310866	1.04776187	0.067310866
YBL041W	PRE7	522.8944897	434.413048	0.789393939	726	flat	1.203680442	0.267452431	0.830785286	-0.267452431
YBL042C	FUI1	97.91514629	108.0590698	0.47985356	1920	flat	0.906126126	-0.142216218	1.103599125	0.142216218
YBL043W	ECM13	36.23351551	42.74737703	0.46646368	774	flat	0.847619621	-0.238511111	1.179774483	0.238511111
YBL044W	YBL044W	4.555325409	2.879158757	0.208974917	369	flat	1.582172361	0.661906775	0.63204239	-0.661906775
YBL045C	COR1	204.6253011	114.2162099	0.909873858	1374	down	1.791560946	0.841217123	0.558172471	-0.841217123
YBL046W	PSY4	84.59952038	75.42856218	0.498542845	1326	flat	1.121584688	0.165538559	0.891595624	-0.165538559
YBL047C	EDE1	50.12401952	49.93200568	0.024082935	4146	flat	1.003845506	0.005537253	0.996169225	-0.005537253
YBL048W	RRT1	19.28175188	86.58832669	0.972988256	312	up	0.222683041	-2.166936406	4.490687735	2.166936406
YBL049W	MOH1	44.55284185	197.6322037	0.988023778	417	up	0.225433108	-2.149228686	4.435905669	2.149228686
YBL050W	SEC17	355.3865717	338.9419809	0.348216616	879	flat	1.048517421	0.068350832	0.953727597	-0.068350832
YBL051C	PIN4	67.44289897	65.33716836	0.162041467	2007	flat	1.032228679	0.045762619	0.968777579	-0.045762619
YBL052C	SAS3	68.76212988	70.23140261	0.106821807	2496	flat	0.979079547	-0.030502016	1.02136747	0.030502016
YBL053W	YBL053W	0.471835811	0.809454919	0.072988256	375	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YBL054W	TOD6	19.56638522	22.0253299	0.24722343	1578	flat	0.888358327	-0.170786378	1.125671894	0.170786378
YBL055C	YBL055C	173.5601297	186.1842908	0.434399014	1257	flat	0.932195348	-0.101295782	1.072736527	0.101295782
YBL056W	PTC3	454.858776	446.0415899	0.172857764	1407	flat	1.019767632	0.028240452	0.980615552	-0.028240452
YBL057C	PTH2	265.8309413	213.4985762	0.803682761	627	flat	1.245118099	0.316282588	0.803136667	-0.316282588
YBL058W	SHP1	148.7006137	130.5341512	0.618109323	1272	flat	1.13917019	0.187983299	0.87783196	-0.187983299
YBL059C-A	CMC2	840.1894495	641.1250894	0.856176599	330	flat	1.310492232	0.390108802	0.763072054	-0.390108802
YBL059W	YBL059W	77.98059631	49.80859844	0.827062491	582	flat	1.565605111	0.646720371	0.638730669	-0.646720371
YBL060W	YEL1	141.876502	115.153198	0.745585037	2064	flat	1.232067406	0.301081188	0.811643904	-0.301081188
YBL061C	SKT5	100.0620241	116.7148054	0.638400754	2091	flat	0.857320746	-0.222093039	1.16642459	0.222093039
YBL062W	YBL062W	3.715242605	5.576953183	0.223183993	381	flat	0.666177836	-0.586020738	1.501100675	0.586020738
YBL063W	KIP1	33.86546371	35.75941808	0.175025373	3336	flat	0.947036209	-0.078508509	1.055925836	0.078508509
YBL064C	PRX1	279.2520626	281.1465559	0.069754966	786	flat	0.993261546	-0.009754437	1.006784169	0.009754437
YBL065W	YBL065W	3.333622576	10.99802879	0.616035958	345	flat	0.303110916	-1.722082288	3.299122363	1.722082288
YBL066C	SEF1	21.04576615	21.09056279	0.006901551	3447	flat	0.997875987	-0.003067563	1.002128534	0.003067563

YBL067C	UBP13	72.50217715	74.60133488	0.140010149	2244	flat	0.97186166	-0.041177127	1.02895303	0.041177127
YBL068W	PRS4	141.4064509	143.8824684	0.133188343	981	flat	0.982791389	-0.025042878	1.017509933	0.025042878
YBL068W-A	YBL068W-A	NA	NA	NA	237	flat	#jVALOR!	#jVALOR!	#iVALOR!	#iVALOR!
YBL069W	AST1	92.03541542	103.0643182	0.519240249	1290	flat	0.892990096	-0.16328392	1.119833248	0.16328392
YBL070C	YBL070C	4.134075445	2.836874717	0.1715311	321	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YBL071C	YBL071C	5.153546477	4.420566913	0.114107583	309	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YBL071C-B	YBL071C-B	16.97894016	6.132234236	0.708605191	99	flat	2.768801632	1.469261697	0.36116708	-1.469261697
YBL071W-A	KT11	130.0390864	127.3916251	0.136486878	249	flat	1.020782067	0.02967489	0.979641034	-0.02967489
YBL072C	RPS8A	440.292061	294.9879245	0.893446426	603	flat	1.492576558	0.577804933	0.669982384	-0.577804933
YBL073W	YBL073W	1.417775874	1.459353821	0.014122082	312	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YBL074C	AAR2	34.54275511	56.5595256	0.799057561	1068	flat	0.610732759	-0.711386863	1.637377372	0.711386863
YBL075C	SSA3	72.13643646	518.9073025	0.997136436	1950	up	0.139016036	-2.846676778	7.193414701	2.846676778
YBL076C	ILS1	264.9679084	162.8056754	0.902428592	3219	down	1.627510268	0.702666645	0.614435448	-0.702666645
YBL077W	YBL077W	0.819159394	2.810607358	0.261765985	432	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YBL078C	ATG8	364.1232926	437.7401867	0.785334203	354	flat	0.831825141	-0.265647805	1.202175734	0.265647805
YBL079W	NUP170	54.76105073	60.72258292	0.406067856	4509	flat	0.901823475	-0.149083031	1.10886446	0.149083031
YBL080C	PET112	71.43916278	58.61827597	0.632412643	1626	flat	1.218718251	0.285364636	0.820534196	-0.285364636
YBL081W	YBL081W	16.2233519	12.88766301	0.323676961	1107	flat	1.258828066	0.332081249	0.794389661	-0.332081249
YBL082C	ALG3	20.10956002	17.63518342	0.250072495	1377	flat	1.140309093	0.189424936	0.87695521	-0.189424936
YBL083C	YBL083C	8.3069685	9.619402648	0.165724228	426	flat	0.863563862	-0.211625224	1.15799195	0.211625224
YBL084C	CDC27	107.0411445	93.38326266	0.592830216	2277	flat	1.146256208	0.196929547	0.872405308	-0.196929547
YBL085W	BOI1	33.81850708	27.28094115	0.483253589	2943	flat	1.239638578	0.309919558	0.806686738	-0.309919558
YBL086C	YBL086C	38.01460895	40.62441042	0.238944469	1401	flat	0.935757801	-0.095792925	1.068652593	0.095792925
YBL087C	RPL23A	781.2643679	532.3045936	0.891800783	414	flat	1.467701721	0.553558801	0.681337349	-0.553558801
YBL088C	TEL1	26.21075007	34.8039485	0.56739162	8364	flat	0.753097025	-0.409092349	1.327850153	0.409092349
YBL089W	AVT5	49.10682488	57.51969058	0.520856894	1380	flat	0.853739378	-0.228132371	1.171317647	0.228132371
YBL090W	MRP21	552.3527364	393.6429294	0.880063796	534	flat	1.403182161	0.488702312	0.712665845	-0.488702312
YBL091C	MAP2	82.31969567	61.50035153	0.753443526	1266	flat	1.338523986	0.420642992	0.74709158	-0.420642992
YBL091C-A	SCS22	93.8309851	78.76088347	0.643475424	528	flat	1.191339926	0.252585118	0.83939099	-0.252585118
YBL092W	RPL32	565.482613	320.9241593	0.91768885	393	down	1.762044385	0.817250266	0.567522594	-0.817250266
YBL093C	ROX3	122.6292732	76.91653078	0.870704654	663	flat	1.594316228	0.627228139	0.672937812	-0.672937812
YBL094C	YBL094C	1.594039901	1.823096665	0.058090474	333	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YBL095W	YBL095W	156.9158762	164.6538835	0.307496013	813	flat	0.953004405	-0.069445213	1.049313093	0.069445213
YBL096C	YBL096C	2.290465101	4.911741014	0.314941279	309	flat	0.466324485	-1.100593911	2.144429536	1.100593911
YBL097W	BRN1	57.37804686	48.37967315	0.54338843	2265	flat	1.185994926	0.246097837	0.843173928	-0.246097837
YBL098W	BNA4	44.71437524	55.30982636	0.60000725	1383	flat	0.808434562	-0.306797094	1.236958496	0.306797094
YBL099W	ATP1	350.366175	136.299014	0.967942584	1638	down	2.570570137	1.362088376	0.389018757	-1.362088376
YBL100C	YBL100C	1.123418597	0.481818404	0.113708859	315	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YBL100W-A	YBL100W-A	0.335874011	0.345723912	0.007401769	1317	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YBL100W-B	YBL100W-B	22.14644369	26.13817233	0.353711759	5313	flat	0.84728356	-0.239083219	1.180242421	0.239083219
YBL100W-C	YBL100W-C	72.24985853	153.0375706	0.943707409	120	up	0.472105367	-1.082819209	2.118171215	1.082819209
YBL101C	ECM21	22.44701895	34.11946607	0.665622735	3354	flat	0.65789479	-0.604071208	1.519999878	0.604071208
YBL102W	SFT2	355.6517035	335.1649275	0.426127302	648	flat	1.061124462	0.085593884	0.942396519	-0.085593884
YBL103C	RTG3	67.51757303	51.00646372	0.711497753	1461	flat	1.323706215	0.404582964	0.755454638	-0.404582964
YBL104C	SEA4	70.36098262	72.55100033	0.142728723	3117	flat	0.969814093	-0.044219876	1.031125457	0.044219876
YBL105C	PKC1	43.82502757	42.86176221	0.08400754	3456	flat	1.022473769	0.032063833	0.9780202	-0.032063833
YBL106C	SRO77	12.98015182	16.11303684	0.307916485	3033	flat	0.805568308	-0.311921169	1.24135966	0.311921169
YBL107C	MIX23	529.3183461	393.6847687	0.865209511	591	flat	1.344523304	0.427094761	0.427094761	-0.427094761
YBL107W-A	YBL107W-A	127.2271561	106.9636857	0.68523271	105	flat	1.189442522	0.250285557	0.84072999	-0.250285557

YBL108C-A	PAU9	0.685807865	1.176533313	0.091025083	129	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YBL108W	YBL108W	2.602035721	2.975937203	0.075373351	306	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YBL109W	YBL109W	0.789903701	1.806819016	0.159221401	336	flat	0.437179205	-1.193703316	2.287391505	1.193703316
YBL111C	YBL111C	14.03852805	12.57199818	0.173959693	2004	flat	1.1166505	0.159177708	0.895535353	-0.159177708
YBL112C	YBL112C	9.7371777	7.636367162	0.235580687	318	flat	1.275106015	0.350617201	0.784248516	-0.350617201
YBL113C	YBL113C	13.72221108	8.357392371	0.462701174	2379	flat	1.641924954	0.715388188	0.609041234	-0.715388188
YBL113W-A	YBL113W-A	0.091583038	0.314229394	0.058561693	483	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YBR001C	NTH2	89.48870612	127.740485	0.838176019	2343	flat	0.700550856	-0.513438309	1.427448117	0.513438309
YBR002C	RER2	176.7329257	120.9246678	0.867717848	861	flat	1.4615126	0.547462267	0.684222633	-0.547462267
YBR003W	COQ1	70.11589646	68.62862777	0.107612005	1422	flat	1.021671258	0.030931057	0.978788424	-0.030931057
YBR004C	GPI18	65.8422956	103.5132443	0.855190663	1302	flat	0.636076051	-0.652728827	1.572139053	0.652728827
YBR005W	RCR1	179.6944794	195.0351368	0.493192692	642	flat	0.921344135	-0.118187971	1.085370777	0.118187971
YBR006W	UGA2	88.40999819	84.52139718	0.231926925	1494	flat	1.046007297	0.064892916	0.956016275	-0.064892916
YBR007C	DSF2	31.65045169	29.99760852	0.16014934	2211	flat	1.055099165	0.077378599	0.947778212	-0.077378599
YBR008C	FLR1	80.51933975	125.601896	0.867174134	1647	flat	0.641067868	-0.641450995	1.559897242	0.641450995
YBR009C	HHF1	1448.116278	970.9567419	0.896723213	312	flat	1.491432332	0.576698522	0.670496394	-0.576698522
YBR010W	HHT1	877.1582706	836.4121313	0.370494418	411	flat	1.048715385	0.068623193	0.953547563	-0.068623193
YBR011C	IPP1	139.154702	75.35940979	0.902443091	864	down	1.846547132	0.884830087	0.5415513	-0.884830087
YBR012C	YBR012C	82.3606259	79.8614005	0.151261418	420	flat	1.031294535	0.044456422	0.969655095	-0.044456422
YBR012W-A	YBR012W-A	0.267480618	0.573593338	0.070798898	1323	flat	0.466324485	-1.100593911	2.144429536	1.100593911
YBR012W-B	YBR012W-B	41.3393427	55.83142744	0.692532985	5271	flat	0.740431413	-0.433561992	1.350563986	0.433561992
YBR013C	YBR013C	167.8646635	226.1025519	0.846607221	390	flat	0.742427107	-0.429678709	1.346933579	0.429678709
YBR014C	GRX7	388.2815526	299.3296836	0.844802088	612	flat	1.297170224	0.375367812	0.770908846	-0.375367812
YBR015C	MNN2	59.81781339	64.54996899	0.333485573	1794	flat	0.926690041	-0.109841228	1.079109471	0.109841228
YBR016W	YBR016W	53.49301343	47.06133251	0.438074525	387	flat	1.136665933	0.184808308	0.879765964	-0.184808308
YBR017C	KAP104	107.5942243	101.5672148	0.309786864	2757	flat	1.059340108	0.083165851	0.943983894	-0.083165851
YBR018C	GAL7	13.98151074	24.67514144	0.657894737	1101	flat	0.566623327	-0.819538098	1.76484086	0.819538098
YBR019C	GAL10	9.689485401	11.13000514	0.175750326	2100	flat	0.870573309	-0.199962306	1.148668343	0.199962306
YBR020W	GAL1	4.738426739	1.817065627	0.342286501	1587	flat	2.607735609	1.382797606	0.383474458	-1.382797606
YBR021W	FUR4	39.39717387	65.27347435	0.823321734	1902	flat	0.603570964	-0.72840469	1.656806008	0.72840469
YBR022W	POA1	151.590508	179.9104508	0.72092939	534	flat	0.842588673	-0.247099573	1.186818707	0.247099573
YBR023C	CHS3	79.94602262	96.36574697	0.668189068	3498	flat	0.829610366	-0.269494174	1.205385131	0.269494174
YBR024W	SCO2	95.01163988	102.1869828	0.392656227	906	flat	0.929782222	-0.105035254	1.075520672	0.105035254
YBR025C	OLA1	301.3925899	453.9095306	0.895498043	1185	flat	0.663992645	-0.590760833	1.506040778	0.590760833
YBR026C	ETR1	202.2485193	167.3085955	0.752124112	1143	flat	1.208835199	0.273617575	0.827242622	-0.273617575
YBR027C	YBR027C	127.5231921	106.1953807	0.698020879	333	flat	1.200835585	0.264038635	0.83275347	-0.264038635
YBR028C	YPK3	66.37994297	66.07598971	0.03168769	1578	flat	1.004600056	0.00662126	0.995421008	-0.00662126
YBR029C	CDS1	120.0193711	125.2622651	0.256640568	1374	flat	0.958144666	-0.061684597	1.043683731	0.061684597
YBR030W	RKM3	87.72263888	89.01442544	0.085943164	1659	flat	0.985487896	-0.021089942	1.014725806	0.021089942
YBR031W	RPL4A	154.0290457	127.8013362	0.727707699	1089	flat	1.205222498	0.269299509	0.829722314	-0.269299509
YBR032W	YBR032W	2.627798451	3.005401927	0.076576773	303	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YBR033W	EDS1	20.48254641	27.49507198	0.515513992	2760	flat	0.744953365	-0.42477798	1.342365907	0.42477798
YBR034C	HMT1	189.444106	144.5248127	0.822234305	1047	flat	1.310806791	0.390455052	0.762888938	-0.390455052
YBR035C	PDX3	336.3633018	245.0015025	0.866296941	687	flat	1.372903016	0.457229715	0.72838357	-0.457229715
YBR036C	CSG2	185.6203228	229.5671265	0.790010149	1233	flat	0.808566651	-0.306561393	1.236756424	0.306561393
YBR037C	SCO1	118.3574627	88.19230116	0.799267798	888	flat	1.34203849	0.424426049	0.745135112	-0.424426049
YBR038W	CHS2	34.72080169	23.72105961	0.647187183	2892	flat	1.463712088	0.549631803	0.683194467	-0.549631803
YBR039W	ATP3	162.4771151	113.5052972	0.856372336	936	flat	1.431449626	0.517476901	0.698592519	-0.517476901
YBR040W	FIG1	5.030022231	4.399211517	0.10215311	897	flat	1.143391767	0.193319808	0.87459087	-0.193319808

YBR041W	FAT1	52.37729616	69.5436549	0.720537915	2010	flat	0.753157082	-0.408977304	1.327744271	0.408977304
YBR042C	CST26	156.7846381	172.873538	0.533427577	1194	flat	0.906932547	-0.14093284	1.102617833	0.14093284
YBR043C	QDR3	102.3165698	100.7419437	0.093033203	2070	flat	1.015630293	0.022375332	0.984610253	-0.022375332
YBR044C	TCM62	55.17102849	75.13592236	0.752646078	1719	flat	0.734282974	-0.445591948	1.361872788	0.445591948
YBR045C	GIP1	16.12720056	19.44588966	0.317580107	1920	flat	0.829337245	-0.26996921	1.205782093	0.26996921
YBR046C	ZTA1	186.9737429	254.615857	0.8561476	1005	flat	0.734336601	-0.445486586	1.361773333	0.445486586
YBR047W	FMP23	88.46921453	91.98351354	0.22292301	528	flat	0.961794251	-0.056199792	1.039723411	0.056199792
YBR048W	RPS11B	463.1955054	247.7988984	0.92599681	471	down	1.869239566	0.90245148	0.534976906	-0.90245148
YBR049C	REB1	97.70521144	96.00424788	0.114361317	2433	flat	1.017717586	0.025337273	0.982590862	-0.025337273
YBR050C	REG2	9.307970457	11.34191996	0.227598956	1017	flat	0.820669736	-0.285126343	1.21851697	0.285126343
YBR051W	YBR051W	4.032784708	18.16084754	0.790967087	351	flat	0.222059279	-2.170983239	4.503302026	2.170983239
YBR052C	RFS1	334.8692544	249.3581504	0.858271712	633	flat	1.34292484	0.425378563	0.744643311	-0.425378563
YBR053C	YBR053C	161.7417673	170.0926336	0.312730173	1077	flat	0.95090401	-0.072628381	1.051630858	0.072628381
YBR054W	YRO2	268.0574461	714.5785907	0.97016094	1035	up	0.375126613	-1.414550479	2.665766615	1.414550479
YBR055C	PRP6	78.18057254	84.88034221	0.396331738	2700	flat	0.921068065	-0.118620323	1.085696094	0.118620323
YBR056C-B	YBR056C-B	25.5948671	32.45456044	0.499434537	159	flat	0.788636997	-0.342566702	1.268010508	0.342566702
YBR056W	YBR056W	175.2935831	165.7810436	0.348941569	1506	flat	1.05738014	0.080494135	0.945733669	-0.080494135
YBR056W-A	YBR056W-A	221.8332543	257.4851935	0.712092214	201	flat	0.861537906	-0.215013822	1.160715035	0.215013822
YBR057C	MUM2	203.9372084	154.9433462	0.829976802	1101	flat	1.316205009	0.396384217	0.396384217	-0.396384217
YBR058C	UBP14	77.797097	88.95464465	0.549485283	2346	flat	0.874570376	-0.193353614	1.14341856	0.193353614
YBR058C-A	TSC3	867.5808157	780.0996867	0.632724373	243	flat	1.112140962	0.153339658	0.899166594	-0.153339658
YBR059C	AKL1	47.33249229	48.08191415	0.064977526	3327	flat	0.984413643	-0.022663442	1.015833138	0.022663442
YBR060C	ORC2	58.07721383	71.77232123	0.652747571	1863	flat	0.809186784	-0.305455337	1.235808616	0.305455337
YBR061C	TRM7	70.7374427	66.69544149	0.26569523	933	flat	1.06060386	0.084885904	0.942859099	-0.084885904
YBR062C	YBR062C	494.3196996	420.1003948	0.750964187	543	flat	1.1766704	0.23471026	0.849855661	-0.23471026
YBR063C	YBR063C	62.91144144	88.1906131	0.793990141	1215	flat	0.71335757	-0.487302687	1.40182153	0.487302687
YBR064W	YBR064W	4.949326687	3.184044699	0.216137451	429	flat	1.554414951	0.636371683	0.643328861	-0.636371683
YBR065C	ECM2	119.7364164	165.3561162	0.842235755	1095	flat	0.724112413	-0.465714412	1.381001045	0.465714412
YBR066C	NRG2	169.8662294	118.1218151	0.859446136	663	flat	1.438059763	0.524123632	0.695381392	-0.524123632
YBR067C	TIP1	156.9524928	285.0835008	0.917116137	633	up	0.550549198	-0.861056604	1.816368099	0.861056604
YBR068C	BAP2	339.0353014	441.1363437	0.847100188	1830	flat	0.768549919	-0.379789125	1.301151656	0.379789125
YBR069C	TAT1	141.9788201	184.9832965	0.816601421	1860	flat	0.76752238	-0.381719276	1.302893604	0.381719276
YBR070C	ALG14	132.4560089	77.37436727	0.889103958	714	flat	1.711884873	0.775585681	0.584151432	-0.775585681
YBR071W	YBR071W	132.1474116	58.46593608	0.949507032	636	down	2.26024623	1.176479948	0.442429673	-1.176479948
YBR072C-A	YBR072C-A	75.90877049	48.71719421	0.822234305	162	flat	1.558151526	0.639835538	0.641786106	-0.639835538
YBR072W	HSP26	938.3223203	4442.589789	0.991808032	645	up	0.21121066	-2.243245446	4.734609518	2.243245446
YBR073W	RDH54	171.1573334	164.2227035	0.275438596	2877	flat	1.042226986	0.059669516	0.959483887	-0.059669516
YBR074W	PFF1	63.68817559	83.00641219	0.733014354	2931	flat	0.767268141	-0.382197243	1.303325326	0.382197243
YBR076C-A	YBR076C-A	51.68987815	142.1093608	0.961041032	267	up	0.363733099	-1.459047882	2.749268636	1.459047882
YBR076W	ECM8	5.897947635	13.53841854	0.607017544	1065	flat	0.435645243	-1.198774305	2.295445701	1.198774305
YBR077C	SLM4	306.295256	301.3729779	0.12231405	489	flat	1.016332845	0.023372956	0.98392963	-0.023372956
YBR078W	ECM33	180.161726	140.7133842	0.803349282	1290	flat	1.280345342	0.356532995	0.781039277	-0.356532995
YBR079C	RPG1	75.78709915	58.14025293	0.718580542	2895	flat	1.303522006	0.382414939	0.762152373	-0.382414939
YBR080C	SEC18	34.54068147	42.72567549	0.538422503	2277	flat	0.808429149	-0.306806754	1.236966779	0.306806754
YBR081C	SPT7	48.73660405	55.67659257	0.458474699	3999	flat	0.875351774	-0.192065192	1.142397868	0.192065192
YBR082C	UBC4	518.9402248	632.8959603	0.806807308	447	flat	0.819945548	-0.286399991	1.219593182	0.286399991
YBR083W	TEC1	63.70267877	49.13657299	0.681339713	1461	flat	1.296441223	0.3745568	0.771342335	-0.3745568
YBR084C-A	RPL19A	494.8067648	282.7766856	0.916601421	570	down	1.749814571	0.807202047	0.571489126	-0.807202047
YBR084W	MIS1	63.17934685	54.42672036	0.524662897	2928	flat	1.16081488	0.215137918	0.861463802	-0.215137918

YBR085C-A	YBR085C-A	1327.038218	3054.28048	0.966093954	258	up	0.434484726	-1.202622633	2.301576879	1.202622633
YBR085W	AAC3	17.13851667	12.81198939	0.390097144	924	flat	1.337693636	0.419747742	0.747555324	-0.419747742
YBR086C	IST2	35.96689292	35.95321809	0.004008989	2841	flat	1.00038035	0.000548625	0.999619794	-0.000548625
YBR087W	RFC5	167.6346243	145.6448816	0.652015369	1065	flat	1.150981912	0.202865162	0.868823384	-0.202865162
YBR088C	POL30	226.922966	87.31330812	0.966217196	777	down	2.598950502	1.377929157	0.384770699	-1.377929157
YBR089C-A	NHP6B	332.939144	371.8433535	0.631528201	300	flat	0.895374735	-0.159436485	1.116850812	0.159436485
YBR089W	YBR089W	2.064281672	3.288410609	0.165571988	600	flat	0.6277445	-0.671750612	1.593004798	0.671750612
YBR090C	YBR090C	43.63522234	56.76055835	0.662324199	369	flat	0.768759568	-0.379395633	1.300796818	0.379395633
YBR091C	TIM12	405.0817671	259.3935082	0.900993185	330	down	1.561649596	0.643070776	0.640348515	-0.643070776
YBR092C	PHO3	122.8739091	46.48312169	0.955806873	1404	down	2.643409147	1.402399743	0.378299364	-1.402399743
YBR093C	PHO5	20.41597258	18.37704811	0.216217196	1404	flat	1.110949509	0.15179325	0.900130916	-0.15179325
YBR094W	PBY1	42.67016492	46.69932226	0.320545165	2262	flat	0.913721289	-0.130173926	1.094425633	0.130173926
YBR095C	RXT2	204.7176256	219.7360221	0.447571408	1293	flat	0.931652551	-0.102136076	1.073361522	0.102136076
YBR096W	YBR096W	314.3018848	421.5911037	0.859866609	693	flat	0.74551356	-0.4236935	1.341357224	0.4236935
YBR097W	VPS15	48.1159027	48.74810123	0.058271712	4365	flat	0.98703132	-0.018832231	1.013139077	0.018832231
YBR098W	MMS4	30.1289666	33.62981059	0.309011164	2076	flat	0.895900574	-0.158589462	1.116195289	0.158589462
YBR099C	YBR099C	3.686217272	8.300074854	0.458510947	384	flat	0.444118558	-1.170983239	2.251651013	1.170983239
YBR101C	FES1	541.9626109	1788.41554	0.978599391	873	up	0.303040652	-1.722416756	3.299887306	1.722416756
YBR102C	EXO84	56.4763686	55.89151428	0.054951428	2262	flat	1.010463021	0.015016525	0.989645321	-0.015016525
YBR103C-A	YBR103C-A	6.758064999	10.53977759	0.368094824	144	flat	0.641196167	-0.641162293	1.559585117	0.641162293
YBR103W	SIF2	165.0545047	158.0966639	0.275648833	1608	flat	1.044010042	0.062135589	0.957845193	-0.062135589
YBR104W	YMC2	260.7607757	180.5942982	0.876989996	990	flat	1.443903702	0.529974528	0.692566962	-0.529974528
YBR105C	VID24	41.43186355	77.62851067	0.875656082	1089	flat	0.533719676	-0.905845897	1.873642748	0.905845897
YBR106W	PHO88	782.0241679	594.7780523	0.855951863	567	flat	1.314816787	0.394861782	0.760562239	-0.394861782
YBR107C	IML3	55.38316682	72.10462312	0.710475569	738	flat	0.767243277	-0.382243995	1.302367562	0.382243995
YBR108W	AIM3	14.34047394	15.58286105	0.150935189	2844	flat	0.920272208	-0.119867435	1.08663501	0.119867435
YBR109C	CMD1	227.3499409	166.8133448	0.852240104	444	flat	1.3629002	0.446679922	0.73372944	-0.446679922
YBR109W-A	YBR109W-A	29.48973818	78.24730885	0.937103088	225	up	0.376878625	-1.407828121	2.653374146	1.407828121
YBR110W	ALG1	151.2495905	210.6831276	0.858960418	1350	flat	0.717900822	-0.478143545	1.39295007	0.478143545
YBR111C	YSA1	159.6513412	137.5986137	0.662599681	696	flat	1.16026853	0.214458738	0.861869451	-0.214458738
YBR111W-A	SUS1	948.8399262	926.8050202	0.183833551	291	flat	1.023775126	0.03389886	0.976777004	-0.03389886
YBR112C	CYC8	26.01318166	25.47857715	0.056408583	2901	flat	1.02098251	0.029958153	0.979448707	-0.029958153
YBR113W	YBR113W	2.93065721	1.885376364	0.148390605	483	flat	1.554414951	0.636371683	0.643328861	-0.636371683
YBR114W	RAD16	62.03656678	122.7997349	0.920980136	2373	up	0.505184859	-0.985116694	1.979473418	0.985116694
YBR115C	LYS2	88.29985494	51.24465591	0.863933594	4179	flat	1.723103675	0.785009508	0.580348132	-0.785009508
YBR116C	YBR116C	34.51639809	42.25492653	0.520733652	528	flat	0.816860918	-0.291837634	1.224198609	0.291837634
YBR117C	TKL2	22.22540384	32.19422974	0.619762215	2046	flat	0.690353645	-0.5345925	1.448532947	0.5345925
YBR118W	TEF2	1074.801372	1123.250964	0.333942294	1377	flat	0.956866637	-0.063610232	1.045077717	0.063610232
YBR119W	MUD1	65.29166111	52.28293688	0.645258808	897	flat	1.248813954	0.320558563	0.800759791	-0.320558563
YBR120C	CBP6	281.3284838	220.6757851	0.822502537	489	flat	1.274849815	0.350327299	0.784406122	-0.350327299
YBR121C	GRS1	170.5372134	110.8002009	0.879338843	2004	flat	1.539141736	0.622126092	0.649712744	-0.622126092
YBR121C-A	YBR121C-A	NA	NA	NA	159	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YBR122C	MRPL36	642.1473324	497.3827628	0.847491663	534	flat	1.291052647	0.368547832	0.774561752	-0.368547832
YBR123C	TFC1	55.25923246	54.63820704	0.05753226	1950	flat	1.011366138	0.016305381	0.988761599	-0.016305381
YBR124W	YBR124W	5.897947635	4.215911037	0.204893432	360	flat	1.398973456	0.48436859	0.714809845	-0.48436859
YBR125C	PTC4	129.7099397	74.85917161	0.88969842	1182	flat	1.732719411	0.79303805	0.577127487	-0.79303805
YBR126C	TPS1	288.3573189	289.4698917	0.060787299	1488	flat	0.996156516	-0.005555658	1.003858313	0.005555658
YBR126W-A	YBR126W-A	227.3701552	232.4250085	0.160316079	207	flat	0.978251681	-0.031722411	1.022231824	0.031722411
YBR126W-B	YBR126W-B	121.64517	142.2869975	0.672821517	144	flat	0.854928223	-0.226124793	1.169688838	0.226124793

YBR127C	VMA2	123.0257224	89.16896008	0.818819777	1554	flat	1.379692241	0.464346491	0.724799321	-0.464346491
YBR128C	ATG14	69.9205966	69.80082274	0.012418443	1035	flat	1.001715938	0.002473453	0.998287002	-0.002473453
YBR129C	OPY1	392.5093115	400.5756201	0.171320864	987	flat	0.979863206	-0.029347739	1.020550617	0.029347739
YBR130C	SHE3	112.351749	121.2519766	0.419131506	1278	flat	0.926597257	-0.109985683	1.079217526	0.109985683
YBR131C-A	YBR131C-A	0.982991273	0.843182207	0.043910396	90	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YBR131W	CCZ1	50.57176377	62.00080232	0.609627374	2115	flat	0.815663054	-0.293954789	1.22599644	0.293954789
YBR132C	AGP2	68.21663052	109.1476063	0.864093084	1791	flat	0.624994288	-0.67808509	1.600014623	0.67808509
YBR133C	HSL7	21.44060674	30.9777811	0.608452951	2484	flat	0.692128551	-0.530888077	1.444818305	0.530888077
YBR134W	YBR134W	3.301090094	7.173341168	0.409736117	402	flat	0.460188637	-1.119702734	2.17302193	1.119702734
YBR135W	CKS1	49.01936611	50.92597173	0.165115268	453	flat	0.962561232	-0.055049776	1.038894947	0.055049776
YBR136W	MEC1	18.56023623	23.4055137	0.410867044	7107	flat	0.792985638	-0.334633357	1.261056886	0.334633357
YBR137W	YBR137W	189.5534837	185.5000856	0.153284037	540	flat	1.021851193	0.031185119	0.978616072	-0.031185119
YBR138C	YBR138C	57.91222868	47.02547625	0.602530086	1575	flat	1.231507542	0.300425463	0.812012891	-0.300425463
YBR139W	YBR139W	152.3153667	140.7401971	0.447187183	1527	flat	1.082244944	0.11402706	0.924005241	-0.11402706
YBR140C	IRA1	32.44538604	26.66124148	0.447063941	9279	flat	1.216949558	0.283269371	0.821726746	-0.283269371
YBR141C	BMT2	64.03984562	70.49801533	0.409620125	1014	flat	0.908392177	-0.138612813	1.100846116	0.138612813
YBR141W-A	YBR141W-A	139.154702	129.6392644	0.409424387	96	flat	1.073399349	0.102186918	0.931619719	-0.102186918
YBR142W	MAK5	64.35163796	63.00989519	0.101906626	2322	flat	1.02129416	0.03039846	0.979149827	-0.03039846
YBR143C	SUP45	520.5140773	419.0500066	0.817181383	1314	flat	1.242128789	0.312814766	0.805069498	-0.312814766
YBR144C	YBR144C	25.83862773	29.39092266	0.318442801	315	flat	0.879136325	-0.185841198	1.137480015	0.185841198
YBR145W	ADH5	84.95055259	77.32364107	0.437313325	1056	flat	1.098636218	0.135713758	0.910219401	-0.135713758
YBR146W	MRPS9	148.0828788	143.9756285	0.18031028	837	flat	1.028527399	0.040580227	0.972263841	-0.040580227
YBR147W	RTC2	79.23505409	155.6906137	0.925141366	891	up	0.508926339	-0.974471235	1.964920898	0.974471235
YBR148W	YSW1	11.02239394	16.75306288	0.475424097	1830	flat	0.657933061	-0.603987285	1.519911461	0.603987285
YBR149W	ARA1	126.2502704	90.33047648	0.8284544	1035	flat	1.397648671	0.71548739	0.483001754	-0.483001754
YBR150C	TBS1	96.38700724	94.20539841	0.127243729	3285	flat	1.023158002	0.033028952	0.977366152	-0.033028952
YBR151W	APD1	276.9430617	367.0635477	0.854168479	951	flat	0.754482605	-0.406440456	1.325411604	0.406440456
YBR152W	SPP381	35.04431215	41.06181846	0.445925765	876	flat	0.853452513	-0.228617213	1.171711355	0.228617213
YBR153W	RIB7	195.2341034	196.9948961	0.068660287	735	flat	0.991061734	-0.012953168	1.009018879	0.012953168
YBR154C	RPB5	1123.204055	808.51805	0.877330724	648	flat	1.389213333	0.474268163	0.719831847	-0.474268163
YBR155W	CNS1	99.6233642	81.26004693	0.694388865	1158	flat	1.225982115	0.293937933	0.815672584	-0.293937933
YBR156C	SLI15	12.48778612	14.76473565	0.243837901	2097	flat	0.845784606	-0.241637793	1.182334123	0.241637793
YBR157C	ICS2	145.8359708	113.4343563	0.788197767	768	flat	1.285641983	0.362488946	0.777821519	-0.362488946
YBR158W	AMN1	329.2663312	150.9449457	0.96092504	1650	down	2.181367051	1.125232548	0.458428122	-1.125232548
YBR159W	IFA38	316.1672791	305.4354858	0.261910976	1044	flat	1.035136039	0.049820382	0.966056597	-0.049820382
YBR160W	CDC28	188.9710313	230.7894042	0.775989561	897	flat	0.81880289	-0.2884119	1.221295151	0.2884119
YBR161W	CSH1	80.56878069	102.389606	0.741032333	1131	flat	0.786884371	-0.345776441	1.270834746	0.345776441
YBR162C	TOS1	175.70969	92.97193287	0.918935769	1368	down	1.889921878	0.9183266	0.5291224	-0.9183266
YBR162W-A	YSY6	1709.511186	1273.971662	0.866275192	198	flat	1.341875362	0.424250675	0.745225696	-0.424250675
YBR163W	EXO5	68.89326205	85.64198803	0.688697985	1758	flat	0.804433242	-0.313955395	1.243111234	0.313955395
YBR164C	ARL1	611.7517968	500.4103101	0.806524576	552	flat	1.222500385	0.28983492	0.817995652	-0.28983492
YBR165W	UBS1	251.9357128	287.349217	0.673408728	834	flat	0.876757958	-0.189749474	1.140565638	0.189749474
YBR166C	TYR1	162.7468994	153.6713533	0.345447296	1359	flat	1.059058152	0.082781809	0.944235213	-0.082781809
YBR167C	POP7	254.9502896	217.7921702	0.724082935	423	flat	1.170612742	0.227263888	0.854253472	-0.227263888
YBR168W	PEX32	118.2438777	152.5059993	0.797288676	1242	flat	0.775339189	-0.367100509	1.289758102	0.367100509
YBR169C	SSE2	178.3831713	352.3140872	0.938342758	2082	up	0.506318588	-0.981882644	1.975041057	0.981882644
YBR170C	NPL4	142.4745182	188.954085	0.830136291	1743	flat	0.754016608	-0.407331795	1.326230736	0.407331795
YBR171W	SEC66	327.3788325	289.1259569	0.663397129	621	flat	1.132305228	-0.179262908	0.883154096	-0.883154096
YBR172C	SMY2	66.38175881	62.74368005	0.253182543	2223	flat	1.057983191	0.081316706	0.945194601	-0.081316706

YBR173C	UMP1	151.8028804	103.5586201	0.859982601	447	flat	1.465864264	0.551751519	0.682191404	-0.551751519
YBR174C	YBR174C	0.842563948	1.927273617	0.166115702	315	flat	0.437179205	-1.193703316	2.287391505	1.193703316
YBR175W	SWD3	348.4641846	403.7668722	0.721132376	948	flat	0.863033123	-0.212512164	1.158704079	0.212512164
YBR176W	ECM31	191.5419735	178.9270358	0.434333768	939	flat	1.070503251	0.098289177	0.934140087	-0.098289177
YBR177C	EHT1	81.16202277	118.9782327	0.843555169	1356	flat	0.682158584	-0.551820928	1.465934789	0.551820928
YBR178W	YBR178W	3.538768581	5.261456974	0.210395824	375	flat	0.672583392	-0.572214939	1.486804478	0.572214939
YBR179C	FZO1	62.94129865	72.22210216	0.525286356	2568	flat	0.871496353	-0.198433468	1.147451732	0.198433468
YBR180W	DTR1	1.749827396	3.266779233	0.198231115	1719	flat	0.535642999	-0.900656341	1.866915126	0.900656341
YBR181C	RPS6B	804.93298	432.6912239	0.927076999	711	down	1.860294213	0.895530808	0.537549379	-0.895530808
YBR182C	SMP1	40.55652734	92.91756246	0.936950848	1359	up	0.436478597	-1.196017181	2.291063081	1.196017181
YBR182C-A	YBR182C-A	40.37825689	147.8811871	0.973205742	195	up	0.273045258	-1.872787994	3.662396511	1.872787994
YBR183W	YPC1	164.9378731	460.9041416	0.9715311	951	up	0.357857216	-1.482544022	2.794410604	1.482544022
YBR184W	YBR184W	14.46347846	17.7647549	0.318471799	1572	flat	0.81416707	-0.296603223	1.228249135	0.296603223
YBR185C	MBA1	72.19172464	79.96631258	0.453298536	837	flat	0.902776711	-0.147558894	1.107693617	0.147558894
YBR186W	PCH2	7.568162895	15.75929931	0.617420618	1695	flat	0.480234733	-1.058188345	2.082315025	1.058188345
YBR187W	GDT1	249.9806275	229.1895267	0.535551689	843	flat	1.090715754	0.125275178	0.916829152	-0.125275178
YBR188C	NTC20	137.200484	110.8694903	0.749420038	423	flat	1.237495398	0.30742316	0.808083813	-0.30742316
YBR189W	RPS9B	667.431013	429.7648088	0.903472524	588	down	1.553014578	0.635071372	0.643908959	-0.635071372
YBR190W	YBR190W	35.72795202	11.67483056	0.874952878	312	flat	3.060254436	1.613651606	1.613651606	-1.613651606
YBR191W	RPL21A	441.6134083	287.5198956	0.898513847	483	flat	1.535940348	0.619122186	0.651066952	-0.619122186
YBR191W-A	YBR191W-A	665.2884932	331.8765168	0.944816587	75	down	2.004626599	1.003333531	0.49884602	-1.003333531
YBR192W	RIM2	125.2923797	98.10358064	0.767717848	1134	flat	1.277143799	0.352920973	0.782997186	-0.352920973
YBR193C	MED8	55.02995785	67.07815597	0.620291431	672	flat	0.820385669	-0.285625805	1.218938894	0.285625805
YBR194W	AIM4	136.7467698	117.5015205	0.656662317	372	flat	1.163787236	0.218827328	0.859263592	-0.218827328
YBR195C	MS11	48.87070085	33.12928673	0.726837756	1269	flat	1.475151012	0.560862652	0.678789698	-0.560862652
YBR196C	PGI1	470.0823669	542.7358771	0.728287661	1665	flat	0.866134683	-0.207336715	1.154554851	0.207336715
YBR196C-A	YBR196C-A	4.128563345	11.13000514	0.583862549	150	flat	0.370939932	-1.430742513	2.695854274	1.430742513
YBR196C-B	YBR196C-B	7.583075531	23.1272834	0.79754241	105	flat	0.327884404	-1.608740815	3.04985534	1.608740815
YBR197C	YBR197C	21.37329648	22.04650726	0.068174569	654	flat	0.969464062	-0.044740676	1.031497752	0.044740676
YBR198C	TAF5	83.30205139	74.77833694	0.477562708	2397	flat	1.113986414	0.155731637	0.897677016	-0.155731637
YBR199W	KTR4	265.9149939	318.3420824	0.766818907	1395	flat	0.835312102	-0.259612756	1.197157324	0.259612756
YBR200W	BEM1	53.90424967	64.2468182	0.573270987	1656	flat	0.839018199	-0.253225991	1.191869261	0.253225991
YBR200W-A	YBR200W-A	3.217062346	8.278516218	0.487777294	165	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YBR201C-A	YBR201C-A	17.78057743	32.73530923	0.739147455	204	flat	0.543162043	-0.88054543	1.841071212	0.88054543
YBR201W	DER1	273.8928984	234.1023808	0.727946933	636	flat	1.169970581	0.226472253	0.854722346	-0.226472253
YBR202W	MCM7	58.70061358	39.04950223	0.770740902	2538	flat	1.503235899	0.588071425	0.665231585	-0.588071425
YBR203W	COS111	26.14225438	49.11422415	0.823118747	2775	flat	0.532274608	-0.909757352	1.878729486	0.909757352
YBR204C	LDH1	110.0375071	127.5537339	0.636131651	1128	flat	0.862675703	-0.213109772	1.159184148	0.213109772
YBR205W	KTR3	51.98931619	37.59968066	0.696701464	1215	flat	1.382706323	0.467494771	0.723219373	-0.467494771
YBR206W	YBR206W	39.59270403	22.48485886	0.763266638	324	flat	1.760860687	0.816280773	0.567904098	-0.816280773
YBR207W	FTH1	151.7519145	185.5362737	0.761809482	1398	flat	0.817909681	-0.289986555	1.222628883	0.289986555
YBR208C	DUR1,2	16.51168347	25.8465657	0.612244454	5508	flat	0.638834716	-0.64648538	1.565350121	0.64648538
YBR209W	YBR209W	3.616666003	8.113640109	0.451203422	318	flat	0.445751346	-1.165688939	2.243403207	1.165688939
YBR210W	ERV15	239.4236785	188.21242	0.815202262	429	flat	1.272092875	0.347204005	0.786106125	-0.347204005
YBR211C	AME1	302.6100825	279.7289403	0.495672031	975	flat	1.081797551	0.113430536	0.924387377	-0.113430536
YBR212W	NGR1	16.65096658	15.03445244	0.18554444	2019	flat	1.107520653	0.147333602	0.902917699	-0.147333602
YBR213W	MET8	31.84891723	35.3216692	0.304574453	825	flat	0.901682111	-0.149309196	1.109038306	0.149309196
YBR214W	SDS24	33.39936256	29.70300958	0.321980571	1584	flat	1.124443719	0.889328637	0.69211453	-0.69211453
YBR215W	HPC2	31.56249933	29.4979079	0.20708279	1878	flat	1.069991114	0.097598815	0.934587201	-0.097598815

YBR216C	YBP1	70.90643712	88.5153944	0.699949253	2025	flat	0.801063336	-0.320011781	1.248340743	0.320011781
YBR217W	ATG12	297.578267	349.8078912	0.740749601	561	flat	0.850690549	-0.233293669	1.175515587	0.233293669
YBR218C	PYC2	75.98414333	61.42878673	0.664238075	3543	flat	1.236946835	0.306783493	0.808442183	-0.306783493
YBR219C	YBR219C	0.921554318	1.185724979	0.062737422	384	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YBR220C	YBR220C	32.48602173	40.76132169	0.545664782	1683	flat	0.796981556	-0.327381751	1.254734175	0.327381751
YBR221C	PDB1	111.0485508	83.81277092	0.786211396	1101	flat	1.324959784	0.405948571	0.754739889	-0.405948571
YBR221W-A	YBR221W-A	2.527691844	4.336365638	0.220740902	105	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YBR222C	PCS60	33.12174637	31.80532885	0.131796433	1632	flat	1.041389841	0.058510239	0.96025519	-0.058510239
YBR223C	TDP1	25.16096927	31.28283346	0.466579672	1635	flat	0.804305956	-0.314183692	1.243307963	0.314183692
YBR223W-A	YBR223W-A	3.686217272	1.264773311	0.299463535	120	flat	2.914528034	1.543262279	0.343108726	-1.543262279
YBR224W	YBR224W	9.429858138	10.29466649	0.119783964	516	flat	0.915994525	-0.12658912	1.091709582	0.12658912
YBR225W	YBR225W	28.54056791	30.82621744	0.223488473	2703	flat	0.925853714	-0.111143831	1.080084234	0.111143831
YBR226C	YBR226C	70.38791521	45.79033302	0.806995795	411	flat	1.537178495	0.620284699	0.650542538	-0.620284699
YBR227C	MCX1	75.84692736	72.14791326	0.241373061	1563	flat	1.05126987	0.072123068	0.951230535	-0.072123068
YBR228W	SLX1	134.7826066	142.9815861	0.363585617	915	flat	0.942657095	-0.08519503	1.060831139	0.08519503
YBR229C	ROT2	57.49726962	57.00088305	0.042663477	2865	flat	1.008708401	0.012509179	0.99136678	-0.012509179
YBR230C	OM14	277.2035389	211.3576733	0.840140641	405	flat	1.311537615	0.391259185	0.762463835	-0.391259185
YBR230W-A	YBR230W-A	285.6543295	148.7524432	0.92938959	201	down	1.9203337	0.941357032	0.520742827	-0.941357032
YBR231C	SWC5	217.2928076	194.7085229	0.599122807	912	flat	1.115990222	0.158324386	0.896065199	-0.158324386
YBR232C	YBR232C	10.07566054	16.86364415	0.528758881	360	flat	0.597478247	-0.743041907	1.673701101	0.743041907
YBR233W	PBP2	34.11976953	25.1732659	0.581745687	1242	flat	1.355397018	0.438715502	0.737791206	-0.438715502
YBR233W-A	DAD3	586.3801623	362.6571052	0.908518196	285	down	1.616899693	0.693230182	0.618467555	-0.693230182
YBR234C	ARC40	82.64786361	53.21903283	0.831194722	1155	flat	1.552975678	0.635035235	0.643925088	-0.635035235
YBR235W	VHC1	27.06952773	34.79536924	0.533362331	3363	flat	0.777963514	-0.362225599	1.285407325	0.362225599
YBR236C	ABD1	256.1625769	252.0285124	0.119196752	1311	flat	1.016403162	0.023472769	0.98386156	-0.023472769
YBR237W	PRP5	77.71413355	90.23041599	0.593497173	2550	flat	0.861285329	-0.215436838	1.16105542	0.215436838
YBR238C	YBR238C	21.75472488	22.5309344	0.087458315	2196	flat	0.965549165	-0.050578373	1.035680043	0.050578373
YBR239C	ERT1	25.31666202	28.15910391	0.268740032	1590	flat	0.8990578	-0.153514225	1.11227554	0.153514225
YBR240C	THI2	7.846493528	14.58275215	0.532543135	1353	flat	0.538066714	-0.894143034	1.858505598	0.894143034
YBR241C	YBR241C	20.50411243	25.03682137	0.389212701	1467	flat	0.818958291	-0.288138117	1.221063406	0.288138117
YBR242W	YBR242W	318.5878827	228.1883899	0.871146875	717	flat	1.396161667	0.481466006	0.716249431	-0.481466006
YBR243C	ALG7	23.44729739	33.01368197	0.60508192	1347	flat	0.710229698	-0.493642407	1.407995191	0.493642407
YBR244W	GPX2	456.2768078	368.103349	0.814948528	489	flat	1.23953452	0.309798449	0.806754458	-0.309798449
YBR245C	ISW1	54.64735552	48.66579077	0.418566043	3390	flat	1.122911077	0.167243686	0.890542466	-0.167243686
YBR246W	RRT2	94.92959531	111.221818	0.642648978	1164	flat	0.853515947	-0.228509986	1.171624272	0.228509986
YBR247C	ENP1	80.06098339	65.32919996	0.658808177	1452	flat	1.225500748	0.293371364	0.815992974	-0.293371364
YBR248C	HIS7	209.2544893	145.2773973	0.870407424	1659	flat	1.440378842	0.526448313	0.694261795	-0.526448313
YBR249C	ARO4	36.40512152	15.54546172	0.844135131	1113	flat	2.341848841	1.227647958	0.427013043	-1.227647958
YBR250W	SPO23	21.49824424	37.75010417	0.752856314	1572	flat	0.569488342	-0.812261786	1.755962196	0.812261786
YBR251W	MRPS5	188.5236833	133.5403509	0.859003915	924	flat	1.411735719	0.497470038	0.708347877	-0.497470038
YBR252W	DUT1	752.5860884	383.8757915	0.939154705	444	down	1.960493746	0.97121704	0.510075588	-0.97121704
YBR253W	SRB6	603.8144751	474.8083414	0.838270262	366	flat	1.27170149	0.346760062	0.78634806	-0.346760062
YBR254C	TRS20	401.462572	319.0678126	0.822966507	528	flat	1.258235886	0.331402415	0.794763534	-0.331402415
YBR255C-A	YBR255C-A	226.6566653	132.9579877	0.905422648	363	down	1.704723944	0.769538134	0.586605241	-0.769538134
YBR255W	MTC4	79.8556651	91.9371909	0.573133246	2085	flat	0.868589352	-0.203253827	1.151292032	0.203253827
YBR256C	RIB5	827.6868773	490.0335088	0.9138466	717	down	1.689041387	0.756204679	0.592051804	-0.756204679
YBR257W	POP4	180.5193258	164.9625762	0.512991156	840	flat	1.094304721	0.130014528	0.913822248	-0.130014528
YBR258C	SHG1	411.6190028	333.6171279	0.805973612	429	flat	1.233806565	0.303116228	0.810499821	-0.303116228
YBR259W	YBR259W	62.36073806	81.28325431	0.729969552	2067	flat	0.767202772	-0.382320161	1.303436374	0.382320161

YBR260C	RGD1	42.53242597	53.62487142	0.615274757	2001	flat	0.793147374	-0.334339137	1.260799736	0.334339137
YBR261C	TAE1	61.51078435	48.63677626	0.648600841	699	flat	1.264696986	0.338791765	0.790703236	-0.338791765
YBR262C	MIC12	1147.619344	706.8546169	0.909960853	321	down	1.623557824	0.699158768	0.61593125	-0.699158768
YBR263W	SHM1	55.49596349	42.14193762	0.669240249	1473	flat	1.316882104	0.397126192	0.75936942	-0.397126192
YBR264C	YPT10	292.8331001	223.8648761	0.841431057	600	flat	1.308079701	0.387450446	0.764479412	-0.387450446
YBR265W	TSC10	81.85469381	56.89509848	0.797027693	963	flat	1.438695002	0.524760778	0.695074355	-0.524760778
YBR266C	SLM6	1.367073955	1.005117863	0.075779324	453	flat	1.360113083	0.443726605	0.735232984	-0.443726605
YBR267W	REI1	47.67757162	36.59496382	0.625909816	1182	flat	1.302845163	0.381665637	0.767550917	-0.381665637
YBR268W	MRPL37	560.8614355	292.0910439	0.932593881	318	down	1.920159646	0.941226264	0.52079003	-0.941226264
YBR269C	SDH8	175.0290215	119.380042	0.867572858	417	flat	1.466149773	0.552032488	0.682058558	-0.552032488
YBR270C	BIT2	31.48812703	32.05945536	0.0592359	1638	flat	0.9821791	-0.025941971	1.018144246	0.025941971
YBR271W	EFM2	140.6379656	138.5227912	0.102733072	1260	flat	1.015269505	0.021862744	0.984960146	-0.021862744
YBR272C	HSM3	118.2654988	135.6804633	0.626098304	1443	flat	0.871647221	-0.198183739	1.147253127	0.198183739
YBR273C	UBX7	71.93606612	68.18777851	0.256488328	1311	flat	1.05497008	0.077202083	0.947894181	-0.077202083
YBR274W	CHK1	112.876441	146.2154601	0.794881833	1584	flat	0.771987045	-0.373351457	1.295358524	0.373351457
YBR275C	RIF1	21.76733413	15.04268727	0.51446281	5751	flat	1.447037603	0.533102412	0.691067045	-0.533102412
YBR276C	PPS1	101.3527264	111.512934	0.480187038	2424	flat	0.908887631	-0.137826156	1.100246022	0.137826156
YBR277C	YBR277C	7.262398207	9.061062528	0.210127592	402	flat	0.801495209	-0.319234198	1.247668094	0.319234198
YBR278W	DPB3	128.3241577	110.4485208	0.647636654	606	flat	1.161845869	0.216418693	0.860699363	-0.216418693
YBR279W	PAF1	114.3223258	111.8445278	0.133188343	1338	flat	1.022153949	0.031612501	0.978326211	-0.031612501
YBR280C	SAF1	36.79283948	55.26940425	0.760649558	1914	flat	0.665699947	-0.587056042	1.502178278	0.587056042
YBR281C	DUG2	51.09541666	67.56968679	0.711004785	2637	flat	0.756188449	-0.403182283	1.322421681	0.403182283
YBR282W	MRPL27	425.0935727	335.207947	0.829309845	441	flat	1.268148851	0.342724094	0.788550965	-0.342724094
YBR283C	SSH1	196.2178709	197.1088671	0.056256343	1473	flat	0.995479675	-0.006536235	1.004540852	0.006536235
YBR284W	YBR284W	27.30941919	54.07777616	0.857148035	2394	flat	0.50500263	-0.985637193	1.980187707	0.985637193
YBR285W	YBR285W	99.65497728	100.4840589	0.054719443	435	flat	0.991749123	-0.011952879	1.008319521	0.011952879
YBR286W	APE3	202.9200943	119.8008326	0.902240104	1614	down	1.693812054	0.760273801	0.590384274	-0.760273801
YBR287W	YBR287W	83.57722525	145.2716261	0.896367986	1284	flat	0.575316925	-0.797571182	1.738172399	0.797571182
YBR288C	APM3	202.3459101	155.4312325	0.821973322	1452	flat	1.301835589	0.380547259	0.768146154	-0.380547259
YBR289W	SNF5	21.38494258	22.55931204	0.126953748	2718	flat	0.947943029	-0.077127739	1.054915717	0.077127739
YBR290W	BSD2	262.5685694	261.2817412	0.063868349	966	flat	1.00492506	0.00708792	0.995099077	-0.00708792
YBR291C	CTP1	143.5167258	186.5119043	0.816601421	900	flat	0.769477564	-0.378048833	1.29958305	0.378048833
YBR292C	YBR292C	11.17756205	9.791793377	0.169015514	372	flat	1.14152348	0.190960535	0.876022279	-0.190960535
YBR293W	VBA2	74.06580557	104.3770817	0.814383065	1425	flat	0.709598356	-0.494925428	1.40924791	0.494925428
YBR294W	SUL1	3.429039323	4.941439913	0.190749601	2580	flat	0.693935246	-0.527127049	1.441056648	0.527127049
YBR295W	PCA1	36.80765184	52.00431922	0.712853415	3651	flat	0.707780669	-0.498625736	1.41286707	0.498625736
YBR296C	PHO89	2.102746548	3.607353444	0.192822967	1725	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YBR296C-A	YBR296C-A	0.737243454	8.853413178	0.648267363	120	flat	0.08327223	-3.586020738	12.0088054	3.586020738
YBR297W	MAL33	14.52479641	11.86567712	0.274336668	1407	flat	1.224101774	0.291723512	0.816925538	-0.291723512
YBR298C	MAL31	27.85941119	13.98448539	0.742489488	1845	flat	1.992165633	0.994337601	0.501966294	-0.994337601
YBR298C-A	YBR298C-A	0.797019951	0.683661249	0.037936784	222	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YBR299W	MAL32	3.93196509	2.594406792	0.176199797	1755	flat	1.515554578	0.599845807	0.6598424473	-0.599845807
YBR300C	YBR300C	0.532947075	0.304764653	0.059170654	498	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YBR301W	PAU24	1.706017911	1.254320639	0.086334638	363	flat	1.360113083	0.443726605	0.735232984	-0.443726605
YBR302C	COS2	67.59358408	61.7741912	0.383456575	1140	flat	1.094204275	0.129882097	0.913906135	-0.129882097
YCL001W	RER1	214.6977763	191.1213003	0.618022329	567	flat	1.123358704	0.167818674	0.89018761	-0.167818674
YCL001W-A	YCL001W-A	18.57470521	35.80786777	0.78292736	462	flat	0.518732512	-0.946937299	1.92777583	0.946937299
YCL001W-B	YCL001W-B	15.26527623	26.18824738	0.660504567	255	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YCL002C	YCL002C	133.8208573	172.8523525	0.806901551	792	flat	0.774191704	-0.369237247	1.291669744	0.369237247

YCL004W	PGS1	24.63127556	33.33961832	0.5746194	1566	flat	0.738798967	-0.436746246	1.353548184	0.436746246
YCL005W	LDB16	130.9252578	102.3629762	0.775931564	771	flat	1.279029418	0.355049447	0.781842846	-0.355049447
YCL005W-A	VMA9	1014.207887	619.3970918	0.910671306	222	down	1.637411445	0.711416885	0.61072005	-0.711416885
YCL007C	YCL007C	3.826912588	6.565235508	0.297752646	393	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YCL008C	STP22	23.30147706	21.36352847	0.204371466	1158	flat	1.090712945	0.125271462	0.916831513	-0.125271462
YCL009C	ILV6	75.15126825	29.8649698	0.93122372	930	down	2.516368467	1.331343188	0.397398081	-1.331343188
YCL010C	SGF29	108.658343	94.56612757	0.597527911	780	flat	1.149019694	0.200403526	0.870307102	-0.200403526
YCL011C	GBP2	468.7352542	431.0867538	0.543112948	1284	flat	1.08733393	0.120795073	0.919680672	-0.120795073
YCL012C	YCL012C	139.8032032	133.7849102	0.266499928	405	flat	1.044984841	0.063482015	0.956951681	-0.063482015
YCL014W	BUD3	18.10457353	17.70837159	0.046280992	4911	flat	1.022373708	0.031922641	0.97811592	-0.031922641
YCL016C	DCC1	76.7816805	86.70834354	0.520740902	1143	flat	0.885516634	-0.175408687	1.129284264	0.175408687
YCL017C	NFS1	93.50260357	116.2169211	0.732224155	1494	flat	0.804552407	-0.313741697	1.242927113	0.313741697
YCL018W	LEU2	2.26222649	1.386052944	0.13215891	1095	flat	1.632135699	0.706761011	0.612694153	-0.706761011
YCL019W	YCL019W	22.59603315	26.25243756	0.332253154	5313	flat	0.860721337	-0.216381862	1.161816209	-0.216381862
YCL020W	YCL020W	0.403048813	0.230482608	0.049746266	1317	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YCL021W-A	YCL021W-A	38.1494232	58.21972385	0.775706829	378	flat	0.655266303	-0.609846752	1.526097093	0.609846752
YCL022C	YCL022C	0.857259831	1.764799969	0.143192692	516	flat	0.485754672	-1.041700222	2.058652355	1.041700222
YCL023C	YCL023C	1.271109404	2.18064364	0.135160215	348	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YCL024W	KCC4	47.78587631	38.01630762	0.585508192	3114	flat	1.256983629	0.32996586	-0.32996586	-0.32996586
YCL025C	AGP1	98.51619157	218.6422002	0.958880673	1902	up	0.450581779	-1.15013912	2.219352948	1.15013912
YCL026C-A	FRM2	10.1846003	16.42901414	0.504530955	582	flat	0.619915487	-0.689856549	1.613123114	0.689856549
YCL026C-B	HBN1	109.7504689	175.5035955	0.889372191	582	flat	0.625345985	-0.677273484	1.599114768	0.677273484
YCL027W	FUS1	33.91607315	14.89128811	0.827091489	1539	flat	2.277578199	1.187500589	0.439062861	-1.187500589
YCL028W	RNQ1	42.41873669	27.41380576	0.724546904	1218	flat	1.547349429	0.629799029	0.646266436	-0.629799029
YCL029C	BIK1	15.44700571	13.76624012	0.191677541	1323	flat	1.122093293	0.166192629	0.891191496	-0.166192629
YCL030C	HIS4	163.5574604	152.0889907	0.426939249	2400	flat	1.075406311	0.104881843	0.929881097	-0.104881843
YCL031C	RRP7	306.6734853	231.7336335	0.846607221	894	flat	1.323387894	0.404235987	0.755636352	-0.404235987
YCL032W	STE50	57.61971897	47.23764298	0.588792229	1041	flat	1.219783955	0.286625644	0.819817309	-0.286625644
YCL033C	MXR2	301.5282105	188.5934168	0.901942874	507	down	1.598826807	0.677013667	0.625458615	-0.677013667
YCL034W	LSB5	461.7843789	326.9171804	0.880520516	1065	flat	1.412542401	0.498294174	0.70794335	-0.498294174
YCL035C	GRX1	814.8200629	640.3627035	0.840394374	333	flat	1.272435229	0.34759222	0.78589462	-0.34759222
YCL036W	GFD2	164.7160508	110.3721048	0.870552414	1701	flat	1.492370296	0.577605551	0.670074982	-0.577605551
YCL037C	SRO9	68.74159657	46.75299964	0.784217776	1305	flat	1.470314143	0.55612443	0.680126764	-0.55612443
YCL038C	ATG22	96.94263646	183.7148984	0.920197187	1587	up	0.527679776	-0.922265403	1.895088736	0.922265403
YCL039W	GID7	27.55274465	22.04028558	0.441220821	2238	flat	1.250108332	0.322053122	0.799930673	-0.322053122
YCL040W	GLK1	481.077106	398.3657255	0.787929535	1503	flat	1.207626749	0.272174618	0.828070429	-0.272174618
YCL041C	YCL041C	7.327753122	27.59550406	0.853675511	495	flat	0.265545888	-1.912966908	3.765827478	1.912966908
YCL042W	YCL042W	15.48211254	15.59887084	0.018283312	360	flat	0.992514952	-0.010839258	1.007541496	0.010839258
YCL043C	PDI1	214.7732557	176.0525756	0.77122662	1569	flat	1.219938163	0.286808021	0.819713679	-0.286808021
YCL044C	MGR1	17.28465515	19.48598116	0.230034798	1254	flat	0.887030271	-0.172944755	1.127357242	0.172944755
YCL045C	EMC1	38.09252645	39.22293054	0.097854139	2283	flat	0.971180019	-0.042189354	1.02967522	0.042189354
YCL046W	YCL046W	2.457478181	3.747476477	0.171581847	324	flat	0.655768808	0.608740815	1.52492767	0.608740815
YCL047C	POF1	117.6173727	126.1843334	0.398673336	777	flat	0.932107572	-0.101431632	1.072837545	0.101431632
YCL048W	SPS22	6.16488061	10.13999293	0.383340583	1392	flat	0.607976816	-0.717911785	1.644799562	0.717911785
YCL048W-A	YCL048W-A	19.90557327	48.06138582	0.887668552	240	flat	0.414169773	-1.271705828	2.414468811	1.271705828
YCL049C	YCL049C	50.68843175	77.4219062	0.816797158	939	flat	0.654704001	-0.611085299	1.527407803	0.611085299
YCL050C	APA1	135.0849808	164.6562025	0.750478469	966	flat	0.820406269	-0.285589579	1.218908287	0.285589579
YCL051W	LRE1	106.1933551	100.921198	0.276736262	1752	flat	1.052232181	0.073453079	0.950360593	-0.073453079
YCL052C	PBN1	96.38971974	152.5007244	0.881158475	1251	flat	0.632060734	-0.661864904	1.582126443	0.661864904

YCL054W	SPB1	127.170118	104.7869195	0.71584747	2526	flat	1.213606799	0.279301074	0.82399011	-0.279301074
YCL055W	KAR4	214.3272042	180.0796286	0.736175149	1008	flat	1.190180177	0.251179994	0.840208919	-0.251179994
YCL056C	PEX34	369.7403035	390.0735343	0.390184138	435	flat	0.947873339	-0.077233805	1.054993277	0.077233805
YCL057C-A	MIC10	192.5860452	107.3766729	0.908583442	294	down	1.793555713	0.84282256	0.557551679	-0.84282256
YCL057W	PRD1	133.1794627	101.1818649	0.799891257	2139	flat	1.316238467	0.39642089	0.75974075	-0.39642089
YCL058C	FYV5	71.70053988	29.42871234	0.925438596	459	down	2.436414446	1.284759564	0.410439202	-1.284759564
YCL058W-A	ADF1	196.3395726	126.033551	0.887886037	342	flat	1.557835759	0.63954314	0.641916193	-0.63954314
YCL059C	KRR1	169.4031963	136.6114769	0.769892707	951	flat	1.240036343	0.310382404	0.806427977	-0.310382404
YCL061C	MRC1	32.66183399	24.30393929	0.563179643	3291	flat	1.343890536	0.426415631	0.744108224	-0.426415631
YCL063W	VAC17	52.92851592	44.02842942	0.54783964	1272	flat	1.202144083	0.265609821	0.831847042	-0.265609821
YCL064C	CHA1	39.94593343	46.24655875	0.449666522	1083	flat	0.863760126	-0.211297376	1.157728829	0.211297376
YCL065W	YCL065W	40.03891281	60.4623339	0.776685515	369	flat	0.662212492	-0.594633869	1.510089302	0.594633869
YCL066W	HMLALPHA1	0.837776653	2.299587838	0.208866174	528	flat	0.364316004	-1.456737721	2.744869806	1.456737721
YCL067C	HMLALPHA2	243.8843276	289.399315	0.752638828	633	flat	0.842726002	-0.246864456	1.186625307	0.246864456
YCL068C	YCL068C	2.485725057	3.876699804	0.181259968	783	flat	0.641196167	-0.641162293	1.559585117	0.641162293
YCL069W	VBA3	1.220708116	1.54307855	0.070363926	1377	flat	0.791086181	-0.338093225	1.264084779	0.338093225
YCL073C	GEX1	2.585139386	2.381715976	0.053472524	1848	flat	1.08541044	0.118240691	0.921310467	-0.118240691
YCL074W	YCL074W	1.717848826	1.637247005	0.025728578	927	flat	1.049230092	0.06933109	0.953079794	-0.06933109
YCL075W	YCL075W	1.032441855	1.032441855	0.059047412	441	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YCL076W	YCL076W	2.972755864	0.407991391	0.318268813	744	flat	7.286320085	2.865190373	0.13724349	-2.865190373
YCR001W	YCR001W	2.808546493	2.409092021	0.080890242	315	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YCR002C	CDC10	245.8695508	223.9784316	0.539335943	969	flat	1.097737622	0.134533267	0.910964497	-0.134533267
YCR003W	MRPL32	601.173956	449.5444269	0.863513122	552	flat	1.337295982	0.419318811	0.747777615	-0.419318811
YCR004C	YCP4	359.1089084	199.50779	0.918558794	744	down	1.799974369	0.847976363	0.555563467	-0.847976363
YCR005C	CIT2	887.5707531	1292.867191	0.891431057	1383	flat	0.686513479	-0.542640049	1.452640049	0.542640049
YCR006C	YCR006C	48.90070508	73.00463669	0.800260983	474	flat	0.669830127	-0.578132829	1.49291583	0.578132829
YCR007C	YCR007C	48.90381581	64.92502997	0.707974482	720	flat	0.753235167	-0.408827736	1.327606627	0.408827736
YCR008W	SAT4	74.84729905	76.72399689	0.132448891	1812	flat	0.975539624	-0.035727623	1.025073688	0.035727623
YCR009C	RVS161	543.1211553	546.2299172	0.075808322	798	flat	0.994308693	-0.008234274	1.005723883	0.008234274
YCR010C	ADY2	5.295692419	3.384604635	0.228519646	852	flat	1.564641366	0.645832012	0.639124097	-0.645832012
YCR011C	ADP1	173.0907204	243.8001125	0.866724663	3150	flat	0.709969813	-0.49417041	1.408510589	0.49417041
YCR012W	PGK1	1591.38508	1971.347869	0.823923445	1251	flat	0.807257362	-0.308899403	1.238762317	0.308899403
YCR013C	YCR013C	2.047898484	2.576390078	0.094519356	648	flat	0.794871282	-0.331206839	1.258065328	0.331206839
YCR014C	POL4	42.54008543	38.26861271	0.343402929	1749	flat	1.111618175	0.152661328	0.899589465	-0.152661328
YCR015C	YCR015C	293.6918264	258.3637556	0.659634624	954	flat	1.13673772	0.184899419	0.879710405	-0.184899419
YCR016W	YCR016W	255.0710343	139.6031572	0.916137451	873	down	1.827115084	0.869567507	0.547310899	-0.869567507
YCR017C	CWH43	47.54215651	64.48487825	0.724126432	2862	flat	0.737260545	-0.439753542	1.356372596	0.439753542
YCR018C	SRD1	139.611328	170.4595381	0.754175729	666	flat	0.819029135	-0.288013322	1.220957787	0.288013322
YCR018C-A	YCR018C-A	116.5712003	140.464236	0.717891837	255	flat	0.829899508	-0.268991443	1.204965168	0.268991443
YCR019W	MAK32	68.21527347	90.47993687	0.760736552	1092	flat	0.753927067	-0.407503126	1.326388245	0.407503126
YCR020C	PET18	101.1661851	108.2083833	0.376402784	648	flat	0.934920032	-0.097085125	1.069610198	0.097085125
YCR020C-A	MAK31	1209.410611	1129.4852	0.500891692	267	flat	1.07076269	0.098638775	0.933913751	-0.098638775
YCR020W-B	HTL1	1433.798536	1196.891807	0.789045962	237	flat	1.197934958	0.260549578	0.834769863	-0.260549578
YCR021C	HSP30	68.01236913	1872.624124	1	999	up	0.036319285	-4.783120391	27.53358173	4.783120391
YCR022C	YCR022C	3.590055082	3.079448062	0.091858779	345	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YCR023C	YCR023C	88.80651545	86.71550349	0.125337103	1836	flat	1.024113473	0.034375577	0.976454296	-0.034375577
YCR024C	SLM5	24.34548365	23.39702352	0.105951863	1479	flat	1.04053764	0.057329154	0.96104164	-0.057329154
YCR024C-A	PMP1	620.7230255	678.6588499	0.578650138	123	flat	0.914631888	-0.128736876	1.093336032	0.128736876
YCR024C-B	YCR024C-B	733.9300007	732.1474269	0.027062491	267	flat	1.00243472	0.003508289	0.997571194	-0.003508289

YCR025C	YCR025C	7.533874716	5.169876308	0.262519936	411	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YCR026C	NPP1	104.1468008	111.0549271	0.34615775	2229	flat	0.937795409	-0.092654878	1.066330663	0.092654878
YCR027C	RHB1	265.4076436	288.3683149	0.520972887	630	flat	0.920377274	-0.119702734	1.086510965	0.119702734
YCR028C	FEN2	149.2307218	217.8467247	0.875503842	1539	flat	0.685026236	-0.545768852	1.459798103	0.545768852
YCR028C-A	RIM1	353.0095129	181.1601772	0.93584892	408	down	1.948604369	0.962441206	0.513187805	-0.962441206
YCR030C	SY1	45.19954129	41.06520004	0.32985356	2613	flat	1.100677489	0.138391805	0.908531345	-0.138391805
YCR031C	RPS14A	588.2989072	408.3934692	0.887712049	414	flat	1.44051987	0.526589561	0.694193826	-0.526589561
YCR032W	BPH1	33.78805795	46.36724297	0.666195447	6504	flat	0.728705348	-0.456592515	1.372296776	0.456592515
YCR033W	SNT1	45.66463124	51.78664316	0.428019429	3681	flat	0.881783959	-0.181502862	1.13406463	0.181502862
YCR034W	ELO2	67.19931716	62.22103186	0.341097579	1044	flat	1.080009687	0.111044253	0.925917621	-0.111044253
YCR035C	RRP43	393.8186554	364.7670268	0.506676816	1185	flat	1.079644338	0.110556131	0.926230949	-0.110556131
YCR036W	RBK1	302.7554258	404.1215801	0.85891692	1002	flat	0.749169163	-0.416636579	1.334812016	0.416636579
YCR037C	PHO87	66.06467319	76.37916749	0.551776135	2772	flat	0.864956707	-0.209300171	1.156127228	0.209300171
YCR038C	BUD5	36.13983465	36.34993902	0.025605336	1929	flat	0.994219953	-0.008363038	1.00581365	0.008363038
YCR038W-A	YCR038W-A	11.23418597	6.022730053	0.464745542	126	flat	1.865297942	0.899406089	0.536107384	-0.899406089
YCR039C	MATALPHA2	242.4867096	275.2530353	0.655335653	633	flat	0.880959258	-0.182852796	1.135126274	0.182852796
YCR040W	MATALPHA1	2.513329958	2.874484798	0.073988691	528	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YCR041W	YCR041W	60.30784294	71.10076992	0.577736697	333	flat	0.848202389	-0.237519548	1.178963904	0.237519548
YCR042C	TAF2	71.1062934	80.01847057	0.49354067	4224	flat	0.8886235	-0.1703558	1.125335983	0.1703558
YCR043C	YCR043C	340.9750977	269.9500536	0.823611715	384	flat	1.26310439	0.336973876	0.791700202	-0.336973876
YCR044C	PER1	110.7100785	102.7363349	0.40615485	1074	flat	1.077613666	0.107840053	0.927976353	-0.107840053
YCR045C	RRT12	1.918031751	2.159369068	0.059264898	1476	flat	0.888237115	-0.170983239	1.125825506	0.170983239
YCR045W-A	YCR045W-A	19.91187449	23.78206226	0.349043062	351	flat	0.837264417	-0.256244782	1.194365818	0.256244782
YCR046C	IMG1	133.9181051	79.45752331	0.887190083	510	flat	1.685404975	0.753095289	0.593329208	-0.753095289
YCR047C	BUD23	167.7495976	133.6260498	0.781934174	828	flat	1.255365984	0.328108023	0.796580449	-0.328108023
YCR047W-A	YCR047W-A	0.42738751	0.73320192	0.069233	207	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YCR048W	ARE1	32.3373561	36.43209538	0.342243004	1833	flat	0.887606265	-0.172008244	1.126625667	0.172008244
YCR049C	YCR049C	1.781259353	0.679072919	0.168747281	447	flat	2.623075231	1.391259185	0.381231918	-1.391259185
YCR050C	YCR050C	3.149389514	3.929392811	0.119943454	309	flat	0.801495209	-0.319234198	1.247668094	0.319234198
YCR051W	YCR051W	116.6365429	75.54610092	0.859728868	669	flat	1.543912148	0.626590662	0.647705248	-0.626590662
YCR052W	RSC6	45.02668701	38.88393981	0.443627664	1452	flat	1.157976461	0.211605927	0.863575413	-0.211605927
YCR053W	THR4	137.4851677	86.54487667	0.877171234	1545	flat	1.58859973	0.667755663	0.629485188	-0.667755663
YCR054C	CTR86	62.95327086	70.50438458	0.456444831	1692	flat	0.892898665	-0.163431642	1.119947917	0.163431642
YCR057C	PWP2	71.23495196	67.78308914	0.234261273	2772	flat	1.050925133	0.071659896	0.951542568	-0.071659896
YCR059C	YIH1	64.10317603	61.13884886	0.217558359	777	flat	1.048485165	0.068306449	0.953756938	-0.068306449
YCR060W	TAH1	306.482636	190.6194062	0.903871248	336	down	1.607824944	0.685110338	0.621958257	-0.685110338
YCR061W	YCR061W	11.75856649	16.16988664	0.396549224	1896	flat	0.727189173	-0.459597376	1.375157988	0.459597376
YCR063W	BUD31	16.98459604	9.285677474	0.570436422	474	flat	1.829117594	0.871147829	0.546711706	-0.871147829
YCR064C	YCR064C	57.04219428	29.91142721	0.84723793	411	flat	1.907036862	0.93133273	0.524373713	-0.93133273
YCR065W	HCM1	35.12671468	27.66831527	0.52153835	1695	flat	1.269564639	0.34433385	0.787671592	-0.34433385
YCR066W	RAD18	47.25609683	61.06159674	0.670936639	1464	flat	0.773908632	-0.369764843	1.292142196	0.369764843
YCR067C	SED4	53.52968421	39.96019242	0.676931999	3198	flat	1.339575237	0.421775612	0.74650529	-0.421775612
YCR068W	ATG15	14.54676144	32.04416067	0.810185588	1563	flat	0.453959821	-1.139363481	2.202838123	1.139363481
YCR069W	CPR4	36.4230622	41.07539656	0.367703349	957	flat	0.886736715	-0.173422285	1.127730457	0.173422285
YCR071C	IMG2	318.7700269	232.305302	0.865195012	441	flat	1.372202977	0.456493901	0.72875516	-0.456493901
YCR072C	RSA4	181.2818789	139.9094198	0.810845295	1548	flat	1.295708889	0.37374162	0.771778297	-0.37374162
YCR073C	SSK22	19.63768601	32.39794698	0.69492533	3996	flat	0.606139828	-0.722277453	1.649784347	0.722277453
YCR073W-A	SOL2	61.40584721	49.47024723	0.625119617	948	flat	1.24126825	0.31181493	0.805627631	-0.31181493
YCR075C	ERS1	150.0474034	101.5695349	0.861468755	783	flat	1.477287492	0.562950613	0.676916311	-0.562950613

YCR075W-A	YCR075W-A	397.3354196	288.9008511	0.869254748	228	flat	1.375334888	0.459782951	0.72709564	-0.459782951
YCR076C	FUB1	241.0874213	247.7141672	0.200877193	753	flat	0.973248418	-0.039120001	1.027486901	0.039120001
YCR077C	PAT1	60.82952266	55.605592	0.365513992	2391	flat	1.093946139	0.129541708	0.914121788	-0.129541708
YCR079W	PTC6	48.6613964	54.35955721	0.403204292	1329	flat	0.895176468	-0.159755984	1.117098177	0.159755984
YCR081C-A	YCR081C-A	15.30480083	33.94075215	0.823002755	237	flat	0.450926979	-1.149034266	2.217653959	1.149034266
YCR081W	SRB8	26.86705138	28.66110949	0.176286791	4284	flat	0.937404443	-0.093256462	1.0667754	0.093256462
YCR082W	AHC2	655.8609211	764.7466532	0.74677396	387	flat	0.857618557	-0.221591972	1.166019546	0.221591972
YCR083W	TRX3	556.1580309	550.571632	0.080281282	384	flat	1.010146543	0.014564602	0.989955375	-0.014564602
YCR084C	TUP1	80.25008582	55.05483825	0.801341163	2142	flat	1.457639117	0.543633581	0.686040864	-0.543633581
YCR085W	YCR085W	16.99408641	5.573577303	0.725300855	354	flat	3.049044712	1.608357307	0.327971576	-1.608357307
YCR086W	CSM1	116.4149874	67.54286792	0.883311585	573	flat	1.723571873	0.78540146	0.580190485	-0.78540146
YCR087C-A	YCR087C-A	165.2574289	98.22525196	0.895672031	462	flat	1.68243324	0.750549259	0.594377225	-0.750549259
YCR087W	YCR087W	13.37325336	12.35359978	0.132340148	516	flat	1.082538984	0.11441898	0.923754262	-0.11441898
YCR088W	ABP1	81.55678011	49.39654281	0.847056691	1779	flat	1.651062513	0.723394745	0.605670586	-0.723394745
YCR089W	FIG2	4.597468498	6.3788567	0.21246919	4830	flat	0.720735504	-0.47245818	1.387471541	0.47245818
YCR090C	YCR090C	360.3227025	339.2080552	0.427453965	549	flat	1.062246892	0.087119123	0.94140073	-0.087119123
YCR091W	KIN82	12.02494178	13.75287484	0.196585472	2163	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YCR092C	MSH3	62.22074296	74.81897468	0.621248369	3057	flat	0.831617156	-0.266008573	1.202476395	0.266008573
YCR093W	CDC39	47.20595357	49.84730091	0.214520806	6327	flat	0.947011226	-0.078546567	1.0595953691	0.078546567
YCR094W	CDC50	88.31875668	106.6023219	0.684058286	1176	flat	0.828488114	-0.271447095	1.207017919	0.271447095
YCR095C	OCA4	314.7196851	355.9483236	0.666963897	1089	flat	0.884172404	-0.177600387	1.131001143	0.177600387
YCR095W-A	YCR095W-A	94.03331607	130.7727876	0.830078295	159	flat	0.719058741	-0.475818463	1.390706965	0.475818463
YCR096C	HMRA2	341.0979716	414.0024638	0.792257503	360	flat	0.823903241	-0.279453178	1.213734758	0.279453178
YCR097W	HMRA1	571.9151585	549.3298885	0.322248804	381	flat	1.04111422	0.058128355	0.960509405	-0.058128355
YCR097W-A	YCR097W-A	41.4181716	52.29624478	0.613041902	267	flat	0.791991314	-0.336443488	1.262640111	0.336443488
YCR098C	GIT1	26.30780111	47.17921253	0.798571843	1557	flat	0.557614248	-0.84266067	1.793354463	0.84266067
YCR099C	YCR099C	41.39905552	23.67396198	0.769457735	468	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YCR100C	YCR100C	18.51248548	17.23602746	0.152486588	951	flat	1.074057553	0.103071302	0.931048804	-0.103071302
YCR101C	YCR101C	72.19345739	92.05890986	0.727990431	549	flat	0.784209345	-0.350689261	1.275169706	0.350689261
YCR102C	YCR102C	93.90363782	151.9099001	0.886233145	1107	flat	0.618153509	-0.693962941	1.617721141	0.693962941
YCR102W-A	YCR102W-A	15.63849752	82.0186329	0.974097434	198	up	0.190670058	-2.390849786	5.244661951	2.390849786
YCR104W	PAU3	4.482440203	6.475639353	0.232448891	375	flat	0.692200408	-0.530738303	1.444668319	0.530738303
YCR105W	ADH7	15.55950274	15.65244319	0.015709729	1086	flat	0.99406224	-0.00859191	1.005973227	0.00859191
YCR106W	RDS1	35.22483732	46.400327	0.63107873	2499	flat	0.759150627	-0.397541929	1.317261641	0.397541929
YCR107W	AAD3	29.48973818	41.27886521	0.656546324	1092	flat	0.714402831	-0.485190297	1.399770488	0.485190297
YCR108C	YCR108C	1.382331477	0.790483319	0.101950123	192	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YDL001W	RMD1	118.9852777	99.77330065	0.678657387	1293	flat	1.192556294	0.25405737	0.838534839	-0.25405737
YDL002C	NHP10	558.7148924	281.4740604	0.942279252	612	down	1.984960502	0.9891103	0.503788362	-0.9891103
YDL003W	MCD1	148.0208022	40.7761131	0.973125997	1701	down	3.63008612	1.860003775	0.275475558	-1.860003775
YDL004W	ATP16	553.7110466	254.5258092	0.962411193	483	down	2.175461295	1.12132135	0.459672623	-1.12132135
YDL005C	MED2	108.4020931	91.2276305	0.663426127	1296	flat	1.18825944	0.248849863	0.841567057	-0.248849863
YDL006W	PTC1	301.7992354	241.4730322	0.80969262	846	flat	1.24982584	0.321727074	0.800111478	-0.321727074
YDL007C-A	YDL007C-A	1.028711797	3.529599938	0.307822242	258	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YDL007W	RPT2	419.6564796	403.456911	0.314013339	1314	flat	1.040151917	0.056794254	0.961398026	-0.056794254
YDL008W	APC11	349.2579835	240.1545468	0.885131216	498	flat	1.454305105	0.540329971	0.687613621	-0.540329971
YDL009C	YDL009C	6.280222019	7.494952955	0.158445701	324	flat	0.83792681	-0.25510386	1.193421655	0.25510386
YDL010W	GRX6	167.0237757	167.4734315	0.021922575	696	flat	0.997315062	-0.003878757	1.002692167	0.003878757
YDL011C	YDL011C	0.819159394	1.873738239	0.162490938	324	flat	0.437179205	-1.193703316	2.287391505	1.193703316
YDL012C	YDL012C	58.97947635	75.88639867	0.705437147	324	flat	0.777207476	-0.363628317	1.286657722	0.363628317

YDL013W	SLX5	53.84255422	69.27693814	0.688726983	1860	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YDL014W	NOP1	266.9360751	195.1144193	0.85784399	984	flat	1.368100195	0.452173892	0.730940617	-0.452173892
YDL015C	TSC13	128.5790513	157.4663106	0.748397854	933	flat	0.81654959	-0.29238759	1.224665363	0.29238759
YDL016C	YDL016C	74.45428945	64.61614144	0.536450631	303	flat	1.152255269	0.204460365	0.867863248	-0.204460365
YDL017W	CDC7	66.06165757	80.9654096	0.660867044	1524	flat	0.815924453	-0.293492516	1.225603665	0.293492516
YDL018C	ERP3	207.993994	201.9160224	0.197622155	678	flat	1.030101483	0.042786474	0.970778139	-0.042786474
YDL019C	OSH2	38.56173707	48.18746914	0.579628824	3852	flat	0.800244083	-0.32148799	1.249618736	0.32148799
YDL020C	RPN4	192.8473668	472.2454333	0.967478614	1596	up	0.408362587	-1.292077399	2.448804157	1.292077399
YDL021W	GPM2	204.5377994	232.3615583	0.644512107	936	flat	0.880256618	-0.184003927	1.136032357	0.184003927
YDL022C-A	YDL022C-A	3.197682453	3.657175839	0.085145716	249	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YDL022W	GPD1	181.5273934	201.7184373	0.573560969	1176	flat	0.899904817	-0.152155679	1.111228633	0.152155679
YDL023C	YDL023C	0.551210059	1.891249811	0.196875453	321	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YDL024C	DIA3	9.368808077	17.79851568	0.603595766	1407	flat	0.526381427	-0.92581951	1.899763079	0.92581951
YDL025C	RTK1	73.79557669	104.4405401	0.81707989	1863	flat	0.706579807	-0.501075575	1.415268296	0.501075575
YDL025W-A	YDL025W-A	0.421281974	1.445455213	0.15984486	105	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YDL026W	YDL026W	3.402662097	28.70062514	0.904095984	312	up	0.118557073	-3.076346365	8.434756175	3.076346365
YDL027C	YDL027C	87.55860503	80.39271688	0.406205597	1263	flat	1.089136037	0.123184163	0.91815895	-0.123184163
YDL028C	MPS1	57.05204248	58.65902886	0.12169059	2295	flat	0.97260462	-0.04007465	1.028167026	0.04007465
YDL029W	ARP2	253.6719314	238.5001101	0.411418008	1176	flat	1.063613477	0.088973963	0.94019117	-0.088973963
YDL030W	PRP9	75.52927292	74.886013	0.048825576	1593	flat	1.008589854	0.012339618	0.991483303	-0.012339618
YDL031W	DBP10	106.7374559	88.73730822	0.68183993	2988	flat	1.202847574	0.266453835	0.831360533	-0.266453835
YDL032W	YDL032W	1.984886223	4.864512735	0.338639988	312	flat	0.408033925	-1.293238989	2.450776613	1.293238989
YDL033C	SLM3	64.62344538	67.53526389	0.205437147	1254	flat	0.956884473	-0.06358334	1.045058237	0.06358334
YDL034W	YDL034W	1.025730024	0.439921152	0.107119037	345	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YDL035C	GPR1	193.675848	153.8763704	0.792815717	2886	flat	1.258645804	0.331872351	0.794504694	-0.331872351
YDL036C	PUS9	84.07441553	91.12923901	0.403675511	1389	flat	0.922584414	-0.116247176	1.083911656	0.116247176
YDL037C	BSC1	2.240861563	5.689557752	0.383260838	987	flat	0.39385514	-1.344262992	2.539004571	1.344262992
YDL039C	PRM7	2.700061864	6.730982428	0.422966507	2097	flat	0.401139342	-1.317824627	2.492899336	1.317824627
YDL040C	NAT1	73.4311726	64.31853049	0.512599681	2565	flat	1.141679887	0.191158193	0.875902266	-0.191158193
YDL041W	YDL041W	2.499130354	3.429893725	0.135239959	354	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YDL042C	SIR2	32.4229981	36.2134028	0.323669711	1689	flat	0.895331441	-0.159506246	1.116904818	0.159506246
YDL043C	PRP11	166.4458256	127.7089456	0.809707119	801	flat	1.303321587	0.382193104	0.767270342	-0.382193104
YDL044C	MTF2	105.3204935	87.98921811	0.670385675	1323	flat	1.196970444	0.259387529	0.835442516	-0.259387529
YDL045C	FAD1	93.36816126	110.7397609	0.664992026	921	flat	0.843131324	-0.246170735	1.186054855	0.246170735
YDL045W-A	MRP10	273.7016324	231.875107	0.739662172	288	flat	1.180383854	0.239256092	0.847182039	-0.239256092
YDL046W	NPC2	101.3497898	79.95693346	0.7353922	522	flat	1.267554738	0.342048049	0.788920565	-0.342048049
YDL047W	SIT4	160.8703025	196.8506153	0.766521676	936	flat	0.817220216	-0.291203201	1.223660379	0.291203201
YDL048C	STP4	11.65174991	27.20164189	0.789604176	1473	flat	0.428347302	-1.223147093	2.334554217	1.223147093
YDL049C	KNH1	37.71178414	30.27933131	0.517210381	807	flat	1.245462911	0.31668206	0.802914315	-0.31668206
YDL050C	YDL050C	19.50127847	9.791793377	0.653204292	372	flat	1.991594157	0.993923688	0.50211033	-0.993923688
YDL051W	LHP1	276.3060251	231.3252056	0.759627374	828	flat	1.194448415	0.256344549	0.83720652	-0.256344549
YDL052C	SLC1	53.15913329	56.0827113	0.226381035	912	flat	0.947870245	-0.077238515	1.054996721	0.077238515
YDL053C	PBP4	285.067469	270.6342892	0.343011454	558	flat	1.053330936	0.074958774	0.94936925	-0.074958774
YDL054C	MCH1	39.11780464	50.79869808	0.637342323	1461	flat	0.77005526	-0.376966117	1.298608103	0.376966117
YDL055C	PSA1	856.5058209	489.2786036	0.917725098	1086	down	1.750548286	0.807806857	0.571249595	-0.807806857
YDL056W	MBP1	82.21060103	67.21193423	0.66200522	2502	flat	1.223154816	0.290607019	0.817557996	-0.290607019
YDL057W	YDL057W	71.88683896	107.7940536	0.843373931	987	flat	0.66689058	-0.584478024	1.499496364	0.584478024
YDL058W	USO1	44.34163311	44.34163311	0.012418443	5373	flat	0.997309275	-0.003887127	1.002697984	0.003887127
YDL059C	RAD59	115.7379682	162.991707	0.849253299	717	flat	0.710085012	-0.493936339	1.408282083	0.493936339

YDL060W	TSR1	65.93142984	48.79556349	0.72431492	2367	flat	1.351176729	0.434216386	0.740095636	-0.434216386
YDL061C	RPS29B	979.8870896	726.9118188	0.868181818	171	flat	1.348013699	0.430835158	0.741832224	-0.430835158
YDL062W	YDL062W	2.699764763	3.919015894	0.164085834	426	flat	0.688888444	-0.537657717	1.45161384	0.537657717
YDL063C	SYO1	93.12298963	98.16759033	0.291112078	1863	flat	0.948612361	-0.076109427	1.054171378	0.076109427
YDL064W	UBC9	135.6901244	135.122617	0.045889517	474	flat	1.004199943	0.006046549	0.995817622	-0.006046549
YDL065C	PEX19	267.4710655	233.6327609	0.686392634	1029	flat	1.144835444	0.195140243	0.873487981	-0.195140243
YDL066W	IDP1	221.2074066	114.0359713	0.931317964	1287	down	1.939803767	0.955910715	0.515516063	-0.955910715
YDL067C	COX9	937.2821783	676.2321304	0.877018994	180	flat	1.38603615	0.470964886	0.721481904	-0.470964886
YDL068W	YDL068W	3.753239404	4.139258109	0.076337538	330	flat	0.906742055	-0.141235896	1.102849476	0.141235896
YDL069C	CBS1	258.8686147	327.3013369	0.82261853	690	flat	0.790918293	-0.338399432	1.264353105	0.338399432
YDL070W	BDF2	426.1474841	503.7716794	0.761591997	1917	flat	0.845913936	-0.241417206	1.182153358	0.241417206
YDL071C	YDL071C	3.538768581	6.070911893	0.280687255	375	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YDL072C	YET3	535.0074558	493.0135966	0.54661447	612	flat	1.085177893	0.117931562	0.921507899	-0.117931562
YDL073W	YDL073W	57.03345302	67.79698561	0.582021169	2955	flat	0.841238773	-0.249412748	1.188723144	0.249412748
YDL074C	BRE1	183.4589846	178.3312326	0.190800348	2103	flat	1.028754088	0.040898163	0.9720496	-0.040898163
YDL075W	RPL31A	995.4080044	461.5313135	0.96246194	342	down	2.156750745	1.108859454	0.46366044	-1.108859454
YDL076C	RXT3	136.6524477	141.4831162	0.224438162	885	flat	0.965856927	-0.050118598	1.035350032	0.050118598
YDL077C	VAM6	22.49645741	27.4154672	0.409315644	3150	flat	0.82057538	-0.285292226	1.218657085	0.285292226
YDL078C	MDH3	240.6328345	194.5691966	0.792677976	1032	flat	1.236746817	0.306550186	0.808572932	-0.306550186
YDL079C	MRK1	19.79689595	20.96197998	0.126953748	1506	flat	0.94441918	-0.082500753	1.058851854	0.082500753
YDL080C	THI3	71.64556062	91.0636784	0.724481659	1830	flat	0.786763305	-0.345998423	1.2710303	0.345998423
YDL081C	RPP1A	2083.849629	1243.496751	0.913005655	321	down	1.67579821	0.744848439	0.596730557	-0.744848439
YDL082W	RPL13A	262.0163237	153.7964346	0.90799623	600	down	1.703656683	0.768634636	0.586972722	-0.768634636
YDL083C	RPS16B	506.4452952	354.1365271	0.885131216	432	flat	1.430084887	0.516100785	0.69925919	-0.516100785
YDL084W	SUB2	393.3284541	257.9345303	0.896585472	1341	flat	1.524915852	0.608729634	0.65577389	-0.608729634
YDL085C-A	YDL085C-A	719.293179	315.2768254	0.96476729	207	down	2.281465433	1.189960795	0.438314771	-1.189960795
YDL085W	NDE2	20.79404615	22.2377725	0.164230825	1638	flat	0.935077744	-0.096841776	1.069429795	0.096841776
YDL086C-A	YDL086C-A	32.33702324	28.61004456	0.325938814	435	flat	1.130268189	0.176665134	0.884745771	-0.176665134
YDL086W	YDL086W	192.5443124	139.2173834	0.850826446	822	flat	1.383047919	0.467851142	0.723040747	-0.467851142
YDL087C	LUC7	71.02299538	63.72140346	0.450094244	786	flat	1.114586175	0.156508164	0.897193974	-0.156508164
YDL088C	ASM4	76.76251317	86.74097491	0.521516601	1587	flat	0.884962536	-0.176311713	1.129991337	0.176311713
YDL089W	NUR1	53.1423323	68.6367702	0.692757721	1455	flat	0.77425456	-0.369120121	1.291564883	0.369120121
YDL090C	RAM1	86.83089574	78.57989739	0.449507032	1296	flat	1.105001389	0.144048183	0.904976238	-0.144048183
YDL091C	UBX3	42.16515195	45.48746119	0.278483399	1368	flat	0.926962087	-0.109417762	1.078792773	0.109417762
YDL092W	SRP14	486.2797642	398.5326515	0.80292881	441	flat	1.220175467	0.287088629	0.819554258	-0.287088629
YDL093W	PMT5	23.66313668	23.7949779	0.019928955	2232	flat	0.994270421	-0.008289807	1.005762597	0.008289807
YDL094C	YDL094C	14.57140004	17.85562322	0.316695665	510	flat	0.81606785	-0.293238989	1.225388306	0.293238989
YDL095W	PMT1	83.49417312	73.65990286	0.518957518	2454	flat	1.13350914	0.180796024	0.882216089	-0.180796024
YDL096C	OPI6	0.541096113	0.92827399	0.08045527	327	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YDL097C	RPN6	327.505575	302.6151867	0.49984776	1305	flat	1.082250956	0.114035074	0.924000108	-0.114035074
YDL098C	SNU23	107.2216634	97.03081402	0.48062201	585	flat	1.105026939	0.144081541	0.904955313	-0.144081541
YDL099W	BUG1	186.5096599	124.9980641	0.875837321	1026	flat	1.492100388	0.577344602	0.670196193	-0.577344602
YDL100C	GET3	276.2897723	218.609832	0.817065391	1065	flat	1.263848793	0.337823869	0.791233893	-0.337823869
YDL101C	DUN1	38.55467715	46.26019115	0.511918225	1542	flat	0.833430995	-0.26286534	1.199859383	0.26286534
YDL102W	POL3	43.9928881	48.7018357	0.361881978	3294	flat	0.903310675	-0.146705836	1.107038837	0.146705836
YDL103C	QRI1	257.2640339	130.3933656	0.93584892	1434	down	1.972984075	0.980379311	0.506846463	-0.980379311
YDL104C	QRI7	81.38589506	73.65444577	0.439430187	1224	flat	1.104969214	0.144006175	0.905002589	-0.144006175
YDL105W	NSE4	32.41675933	34.39681263	0.188248514	1209	flat	0.942434977	-0.085535011	1.061081161	0.085535011
YDL106C	PHO2	67.24713509	79.6807186	0.604132231	1680	flat	0.843957438	-0.244757852	1.184893877	0.244757852

YDL107W	MSS2	108.4920765	109.9490435	0.090416123	1056	flat	0.986748707	-0.019245371	1.013429248	0.019245371
YDL108W	KIN28	85.87565449	102.3354041	0.65738727	921	flat	0.839158796	-0.252984253	1.191669568	0.252984253
YDL109C	YDL109C	17.79396239	38.25548904	0.836863854	1944	flat	0.465134882	-1.104278958	2.149914011	1.104278958
YDL110C	TMA17	740.3681949	627.1935466	0.767529361	453	flat	1.18044613	0.239332205	0.847137345	-0.239332205
YDL111C	RRP42	196.7830273	165.2763921	0.729831811	798	flat	1.190629979	0.251725126	0.839891501	-0.251725126
YDL112W	TRM3	49.76521578	43.05686178	0.462896912	4311	flat	1.155802205	0.208894527	0.865199942	-0.208894527
YDL113C	ATG20	241.9446694	305.67657	0.820508917	1923	flat	0.791505444	-0.337328821	1.263415188	0.337328821
YDL114W	YDL114W	3.626569743	27.99692378	0.898484848	927	flat	0.129534579	-2.948590818	7.71994633	2.948590818
YDL114W-A	YDL114W-A	2.328137224	2.662680655	0.070124692	114	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YDL115C	IWR1	188.9342548	205.507799	0.499275047	1062	flat	0.91935321	-0.121308852	1.087721225	0.121308852
YDL116W	NUP84	144.1630392	148.0846001	0.177801943	2181	flat	0.973518105	-0.038720286	1.027202263	0.038720286
YDL117W	CYK3	63.63925439	60.75479923	0.214636799	2658	flat	1.047476993	0.066918556	0.954674906	-0.066918556
YDL118W	YDL118W	1.161013314	0.796707598	0.075924315	381	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YDL119C	YDL119C	116.714256	155.2221791	0.817681601	924	flat	0.751917391	-0.411353925	1.32993333	0.411353925
YDL120W	YFH1	195.6433487	130.6691512	0.877925185	525	flat	1.497242056	0.582307478	0.667894677	-0.582307478
YDL121C	YDL121C	935.0212984	630.3630183	0.894591852	450	flat	1.483306081	0.56881633	0.674169689	-0.56881633
YDL122W	UBP1	104.8159953	95.49819223	0.455183413	2430	flat	1.097570466	0.134313566	0.911103233	-0.134313566
YDL123W	SNA4	18.40494297	15.78724133	0.266579672	423	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YDL124W	YDL124W	642.9328221	753.368486	0.757496013	939	flat	0.853410826	-0.228687683	1.171768589	0.228687683
YDL125C	HNT1	441.9751325	426.6820152	0.272045817	477	flat	1.035841955	0.050803898	0.96539824	-0.050803898
YDL126C	CDC48	448.3427897	369.9915801	0.793982891	2508	flat	1.211764845	0.277109757	0.825242624	-0.277109757
YDL127W	PCL2	52.10808105	36.0194341	0.728106423	927	flat	1.446665733	0.532731611	0.691244686	-0.532731611
YDL128W	VXC1	95.77007204	115.5487074	0.694642598	1236	flat	0.828828589	-0.270854328	1.206522089	0.270854328
YDL129W	YDL129W	22.6222649	23.38964343	0.08676236	876	flat	0.967191525	-0.048126491	1.033921383	0.048126491
YDL130W	RPP1B	620.9381319	354.6093396	0.917246629	321	down	1.751048443	0.808218997	0.571086428	-0.808218997
YDL130W-A	STF1	686.7380407	553.0112271	0.820559664	261	flat	1.24181573	0.312451112	0.805272454	-0.312451112
YDL131W	LYS21	95.75806138	62.17751788	0.84199652	1323	flat	1.54007533	0.62300092	0.649318887	-0.62300092
YDL132W	CDC53	89.264281	59.58074275	0.825134116	2448	flat	1.498206919	0.583236889	0.667464545	-0.583236889
YDL133C-A	RPL41B	8018.940342	7312.335543	0.589190953	78	flat	1.096631889	0.133079332	0.911883021	-0.133079332
YDL133W	SRF1	142.2644218	192.7768636	0.841938524	1314	flat	0.737974564	-0.438357004	1.355060254	0.438357004
YDL134C	PPH21	255.4448942	212.4819163	0.764709294	1110	flat	1.202195927	0.265672037	0.83181117	-0.265672037
YDL135C	RD11	262.9380596	243.235222	0.487458315	609	flat	1.081003226	0.112370828	0.92506662	-0.112370828
YDL136W	RPL35B	706.7788488	551.4829743	0.84338843	363	flat	1.281596861	0.357942519	0.780276568	-0.357942519
YDL137W	ARF2	706.9435586	441.4197842	0.907351022	546	down	1.601522143	0.679443745	0.624405978	-0.679443745
YDL138W	RG2T	37.59555626	59.86152216	0.797578657	2292	flat	0.628042103	-0.671066817	1.592249939	0.671066817
YDL139C	SCM3	26.19847275	17.39063303	0.592851965	672	flat	1.506470334	0.591172264	0.663803314	-0.591172264
YDL140C	RPO21	79.4216132	70.4305138	0.49522981	5202	flat	1.127659148	0.173331058	0.886792788	-0.173331058
YDL141W	BPL1	27.01447795	34.77669018	0.534399014	2073	flat	0.776798419	-0.36438783	1.287335267	0.36438783
YDL142C	CRD1	108.8212874	100.2911795	0.430208786	852	flat	1.085053421	0.117766073	0.92161361	-0.117766073
YDL143W	CCT4	196.5053442	164.0140816	0.73937944	1587	flat	1.198100445	0.260748865	0.83465456	-0.260748865
YDL144C	YDL144C	67.32251152	58.1016311	0.529701319	1071	flat	1.158702609	0.212510333	0.863034218	-0.212510333
YDL145C	COP1	70.7802784	56.82009884	0.659569378	3606	flat	1.245690871	0.316946095	0.802767383	-0.316946095
YDL146W	LDB17	103.993284	166.5798995	0.887552559	1476	flat	0.624284709	-0.679723967	1.601833244	0.679723967
YDL147W	RPN5	570.3553397	643.2761836	0.66784109	1338	flat	0.886641468	-0.173577257	1.127851602	0.173577257
YDL148C	NOP14	111.0501361	96.00424788	0.615571988	2433	flat	1.156721068	0.210041014	0.864512654	-0.210041014
YDL149W	ATG9	49.52384888	63.01055013	0.66030883	2994	flat	0.78596122	-0.347469964	1.272327405	0.347469964
YDL150W	RPC53	127.3008556	95.32144955	0.804987676	1269	flat	1.335490136	0.41736932	0.748788758	-0.41736932
YDL151C	BUD30	1.0412053758	1.043112009	0.841423807	582	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YDL152W	YDL152W	1.933753323	2.902758419	0.140387125	366	flat	0.666177836	-0.586020738	1.501100675	0.586020738

YDL153C	SAS10	227.8576987	166.0972348	0.855415398	1833	flat	1.371833185	0.456105061	0.728951603	-0.456105061
YDL154W	MSH5	43.94036376	36.62514289	0.499623025	2706	flat	1.199732214	0.262712425	0.833519338	-0.262712425
YDL155W	CLB3	107.8993691	114.1842073	0.313803103	1284	flat	0.944958779	-0.081676698	1.058247219	0.081676698
YDL156W	CMR1	47.64594409	44.6902692	0.239741917	1569	flat	1.066136878	0.092392673	0.937965866	-0.092392673
YDL157C	YDL157C	1100.537204	792.0244298	0.877287226	357	flat	1.389524316	0.474591081	0.719670745	-0.474591081
YDL158C	YDL158C	277.1462772	197.9431629	0.86984196	309	flat	1.400130589	0.485561392	0.714219093	-0.485561392
YDL159C-B	YDL159C-B	1.499478212	0.428736716	0.165680731	177	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YDL159W	STE7	63.2657755	71.96462096	0.503878498	1548	flat	0.879123306	-0.185862562	1.13749686	0.185862562
YDL159W-A	YDL159W-A	2.010663967	0.57489696	0.207394519	132	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YDL160C	DHH1	71.71764728	89.70660408	0.703487023	1521	flat	0.79946898	-0.322886037	1.25083027	0.322886037
YDL160C-A	MHF2	291.2566733	246.7088681	0.742931709	243	flat	1.180568318	0.23948153	0.847049667	-0.23948153
YDL161W	ENT1	39.79494338	44.03078956	0.342090764	1365	flat	0.903798087	-0.145927591	1.106441819	0.145927591
YDL162C	YDL162C	3.469380962	3.8262104975	0.072132811	357	flat	0.906742055	-0.141235896	1.102849476	0.141235896
YDL163W	YDL163W	1.167910423	0.500900321	0.117514862	303	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YDL164C	CDC9	62.21710634	55.20835882	0.449289546	2268	flat	1.12695084	0.172424583	0.887350153	-0.172424583
YDL165W	CDC36	171.4091031	154.9347306	0.555219661	576	flat	1.10633105	0.145783151	0.903888579	-0.145783151
YDL166C	FAP7	455.4526229	367.9340541	0.814745542	594	flat	1.237864823	0.307853779	0.807842651	-0.307853779
YDL167C	NRP1	226.9071521	118.1157742	0.92662027	2160	down	1.921057146	0.941900435	0.520546722	-0.941900435
YDL168W	SFA1	185.2443243	345.5086162	0.924604901	1161	up	0.536149652	-0.899292348	1.865150889	0.899292348
YDL169C	UGX2	47.39422207	51.0426372	0.292960708	672	flat	0.928522206	-0.106991682	1.076980167	0.106991682
YDL170W	UGA3	60.15014649	78.51636208	0.72523561	1587	flat	0.766084226	-0.384425079	1.305339499	0.384425079
YDL171C	GLT1	73.60066993	70.03991626	0.237603306	6438	flat	1.05083892	0.071541539	0.951620635	-0.071541539
YDL172C	YDL172C	2.396041227	1.264773311	0.161004785	480	flat	1.894443222	0.921773902	0.527859578	-0.921773902
YDL173W	PAR32	143.1647086	98.78905052	0.853871248	888	flat	1.449196119	0.535252848	0.69003773	-0.535252848
YDL174C	DLD1	57.22413479	49.30034743	0.503907496	1764	flat	1.160724777	0.215025931	0.861530674	-0.215025931
YDL175C	AIR2	67.35627154	67.30793621	0.007727998	1035	flat	1.000718122	0.00103566	0.999282393	-0.00103566
YDL176W	YDL176W	34.64732285	29.68381932	0.399028563	2127	flat	1.167212429	0.223067151	0.856742076	-0.223067151
YDL177C	YDL177C	360.4301333	328.3972808	0.560214586	513	flat	1.097542989	0.134277449	0.911126042	-0.134277449
YDL178W	DLD2	212.5371525	215.3211061	0.110200087	1593	flat	0.987070689	-0.018774688	1.013098668	0.018774688
YDL179W	PCL9	55.49872037	28.36409655	0.85522691	915	flat	1.956653908	0.968388595	0.511076586	-0.968388595
YDL180W	YDL180W	54.78203187	94.07328497	0.86784834	1644	flat	0.58233357	-0.780082306	1.717228839	0.780082306
YDL181W	INH1	417.9998934	232.9535959	0.917884588	258	down	1.79434832	0.843459974	0.557305395	-0.843459974
YDL182W	LYS20	64.47872823	50.47300486	0.668239814	1287	flat	1.277489391	0.35331131	0.782785366	-0.35331131
YDL183C	YDL183C	51.26253552	71.07947207	0.755052922	963	flat	0.721200285	-0.471528128	1.386577377	0.471528128
YDL184C	RPL41A	6931.222692	5886.06041	0.772292301	78	flat	1.177565674	0.235807522	0.849209536	-0.235807522
YDL185C-A	YDL185C-A	0.776045741	1.331340328	0.098492098	228	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YDL185W	VMA1	266.3979706	205.5728561	0.830593011	3216	flat	1.29588106	0.373933309	0.771675759	-0.373933309
YDL186W	YDL186W	1.803329313	1.819817714	0.008670436	834	flat	0.990939532	-0.01313107	1.009143311	0.01313107
YDL187C	YDL187C	41.55372197	56.10994326	0.693453676	330	flat	0.740576796	-0.433278749	1.350298856	0.433278749
YDL188C	PPH22	114.9943758	117.5101553	0.134058286	1134	flat	0.978590962	-0.031222137	1.021877413	0.031222137
YDL189W	RBS1	95.68067888	77.21192528	0.703871248	1374	flat	1.23919561	0.309403939	0.806975099	-0.309403939
YDL190C	UFD2	65.87676439	56.69129436	0.534667247	2886	flat	1.162026112	0.216642488	0.860565859	-0.216642488
YDL191W	RPL35A	714.5777879	498.8015075	0.886813107	363	flat	1.432589471	0.518625244	0.698036681	-0.518625244
YDL192W	ARF1	2044.513826	1449.902767	0.884399014	546	flat	1.410104093	0.495801665	0.709167504	-0.495801665
YDL193W	NUS1	258.7410804	321.5753419	0.806336088	1128	flat	0.804604852	-0.313647657	1.242846097	0.313647657
YDL194W	SNF3	19.49321676	22.98028796	0.324952878	2655	flat	0.848258159	-0.237424693	1.178886391	0.237424693
YDL195W	SEC31	50.13718437	49.43933351	0.062266203	3822	flat	1.014115297	0.020221684	0.986081172	-0.020221684
YDL196W	YDL196W	4.557504991	3.219429274	0.174198927	330	flat	1.415627902	0.501442103	0.706400318	-0.501442103
YDL197C	ASF2	29.71399474	29.7197683	0.004008989	1578	flat	0.999805733	-0.000280295	1.000194304	0.000280295

YDL198C	GGC1	107.8677798	59.3308942	0.888647238	903	flat	1.818071029	0.862408564	0.550033516	-0.862408564
YDL199C	YDL199C	17.05947063	22.28059961	0.435761925	2064	flat	0.76566479	-0.385215179	1.306054572	0.385215179
YDL200C	MGT1	464.9704749	426.1416109	0.567558359	567	flat	1.091117279	0.125806178	0.916491764	-0.125806178
YDL201W	TRM8	92.78478597	67.51333494	0.787857039	861	flat	1.374317919	0.458715779	0.727633676	-0.458715779
YDL202W	MRP1L1	178.4718954	141.6546108	0.787588807	750	flat	1.259908833	0.333319344	0.793708222	-0.333319344
YDL203C	ACK1	47.2119366	44.83459238	0.193562418	1872	flat	1.053024776	0.074539381	0.949645272	-0.074539381
YDL204W	RTN2	49.24935969	51.6181595	0.19306945	1182	flat	0.954109177	-0.067773734	1.048098083	0.067773734
YDL205C	HEM3	161.9238368	171.5156002	0.349601276	984	flat	0.944076437	-0.083024423	1.059236266	0.083024423
YDL206W	YDL206W	43.05579073	58.21604022	0.702994055	2289	flat	0.739586385	-0.435209429	1.352107097	0.435209429
YDL207W	GLE1	69.37474584	65.23320603	0.284746991	1617	flat	1.063488215	0.088804046	0.94030191	-0.088804046
YDL208W	NHP2	617.2183417	335.124648	0.921726838	471	down	1.841757523	0.881083136	0.542959639	-0.881083136
YDL209C	CWC2	350.2340081	205.0420733	0.911244019	1020	down	1.708108012	0.772399206	0.585443071	-0.772399206
YDL210W	UGA4	6.289769331	12.55928743	0.532477889	1716	flat	0.500806226	-0.997675598	1.996780289	0.997675598
YDL211C	YDL211C	25.93199496	17.63222847	0.573923445	1119	flat	1.470715685	0.556518375	0.679941072	-0.556518375
YDL212W	SHR3	719.2141832	566.3307224	0.835769175	633	flat	1.269954383	0.344776676	0.787429858	-0.344776676
YDL213C	NOP6	126.7014857	87.97449757	0.842431492	678	flat	1.440206983	0.526276167	0.694344641	-0.526276167
YDL214C	PRR2	5.01325549	10.33500477	0.488712484	2100	flat	0.485075295	-1.04371939	2.061535621	1.04371939
YDL215C	GDH2	102.3102353	130.8976733	0.776069305	3279	flat	0.781604689	-0.355488972	1.279419141	0.355488972
YDL216C	RR11	88.26860406	87.07146877	0.083137596	1323	flat	1.013748881	0.019700323	0.986437587	-0.019700323
YDL217C	TIM22	261.0125384	264.8727184	0.117833841	624	flat	0.985426283	-0.021180144	1.014789251	0.021180144
YDL218W	YDL218W	16.9705097	15.43182531	0.175960563	954	flat	1.099708516	0.13712118	0.909331869	-0.13712118
YDL219W	DTD1	555.8132109	374.2388844	0.893091199	453	flat	1.485182952	0.57064066	0.673317721	-0.57064066
YDL220C	CDC13	12.14658405	17.50172798	0.453139046	2775	flat	0.694021988	-0.526946724	1.440876539	0.526946724
YDL221W	YDL221W	5.769731382	6.048915836	0.050239234	552	flat	0.953845538	-0.068172434	1.048387773	0.068172434
YDL222C	FMP45	44.7102482	110.1576755	0.949093809	930	up	0.405875015	-1.300892562	2.463812659	1.300892562
YDL223C	HBT1	20.19497829	10.82365699	0.629135856	3141	flat	1.865818393	0.89980857	0.535957842	-0.89980857
YDL224C	WHI4	36.93022596	51.29142228	0.696324489	1950	flat	0.720007836	-0.473915487	1.388873773	0.473915487
YDL225W	SHS1	79.97488777	73.13689147	0.409670871	1656	flat	1.093495856	0.128947754	0.914498207	-0.128947754
YDL226C	GCS1	233.9129374	146.7566992	0.896440481	1059	flat	1.593882519	0.672545296	0.627398813	-0.672545296
YDL227C	HO	112.0308622	9.56659881	0.991902276	1761	down	11.71062615	3.549746312	0.08539253	-3.549746312
YDL228C	YDL228C	1.515827663	2.127656037	0.103305785	642	flat	0.712440186	-0.489159199	1.403626605	0.489159199
YDL229W	SSB1	244.1788744	142.5444839	0.907293026	1842	down	1.713001217	0.776526176	0.583770747	-0.776526176
YDL230W	PTP1	108.8311766	108.2585727	0.045889517	1008	flat	1.005289225	0.007610629	0.994738604	-0.007610629
YDL231C	BRE4	71.91724781	85.86080986	0.635508192	3378	flat	0.837602719	-0.255661969	1.193883421	0.255661969
YDL232W	OST4	290.1152621	302.1782722	0.303675511	111	flat	0.960079823	-0.058773736	1.04158006	0.058773736
YDL233W	MFG1	41.05434138	47.17411566	0.439147455	1377	flat	0.870272623	-0.200460682	1.149065216	0.200460682
YDL234C	GYP7	77.02072179	120.4159008	0.864593301	2241	flat	0.639622519	-0.644707363	1.563422128	0.644707363
YDL235C	YPD1	347.7331627	369.1933523	0.428186168	504	flat	0.941872763	-0.086395915	1.061714533	0.086395915
YDL236W	PHO13	317.4151052	321.486788	0.118899522	939	flat	0.987334836	-0.018388664	1.012827628	0.018388664
YDL237W	AIM6	94.50292055	91.73649899	0.157836741	1173	flat	1.030156171	0.042863066	0.970726602	-0.042863066
YDL238C	GUD1	61.44698506	106.4474517	0.878222416	1470	flat	0.577251818	-0.792727283	1.732346211	0.792727283
YDL239C	ADY3	48.72703893	58.90549783	0.578084674	2373	flat	0.827206979	-0.273679737	1.208887286	0.273679737
YDL240C-A	YDL240C-A	5.128650118	2.199605759	0.342496738	138	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YDL240W	LRG1	48.75366341	39.70742144	0.559873858	3054	flat	1.227822448	0.296101952	0.814450006	-0.296101952
YDL241W	YDL241W	9.037177828	14.68769006	0.476337538	372	flat	0.615289252	-0.700663304	1.625251859	0.700663304
YDL242W	YDL242W	2.749043389	8.574734313	0.533550819	354	flat	0.320598084	-1.641162293	3.119170234	1.641162293
YDL243C	AAD4	36.10258855	107.0074874	0.958025228	990	up	0.337383761	-1.56753756	2.963983795	1.56753756
YDL244W	THI13	4.496968871	5.044257194	0.938668899	1023	flat	0.891502693	-0.165688939	1.121701604	0.165688939
YDL245C	HXT15	0.726859744	1.157891059	0.084630999	1704	flat	0.6277445	-0.671750612	1.593004798	0.671750612

YDL246C	SOR2	23.97070896	33.06781618	0.58815427	1074	flat	0.724895434	-0.464155193	1.37950931	0.464155193
YDL247W	MPH2	5.849603802	11.1963539	0.476859504	1830	flat	0.522456136	-0.936618176	1.91403628	0.936618176
YDL247W-A	YDL247W-A	7.077537162	6.070911893	0.139778164	75	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YDL248W	COS7	61.36015834	59.94498506	0.105009424	1152	flat	1.023607868	0.033663142	0.97693661	-0.033663142
YDR001C	NTH1	116.4687798	158.5003149	0.830904741	2256	flat	0.73481734	-0.444542424	1.360882421	0.444542424
YDR002W	YRB1	761.4775957	635.3920575	0.785921415	606	flat	1.198437385	0.261154534	0.834419898	-0.261154534
YDR003W	RCR2	285.952627	385.3062959	0.861135276	633	flat	0.742143666	-0.4302296	1.347448002	0.4302296
YDR003W-A	YDR003W-A	638.7045732	920.5081855	0.889140206	123	flat	0.69386083	-0.52728177	1.441211202	0.52728177
YDR004W	RAD57	208.5391463	253.832596	0.774488908	1383	flat	0.821561729	-0.283559118	1.217193992	0.283559118
YDR005C	MAF1	86.23514345	87.7676025	0.108945919	1188	flat	0.982539582	-0.025412567	1.017770702	0.025412567
YDR006C	SOK1	62.7392545	94.39527639	0.833449326	2706	flat	0.664644004	-0.589346281	1.50456484	0.589346281
YDR007W	TRP1	424.3900987	426.9874698	0.073872698	675	flat	0.993916985	-0.008802736	1.006120244	0.008802736
YDR008C	YDR008C	7.057373239	8.64802264	0.192315499	351	flat	0.81606785	-0.293238989	1.225388306	0.293238989
YDR009W	GAL3	7.867703659	11.55531854	0.35814847	1563	flat	0.680872936	-0.554542507	1.468702819	0.554542507
YDR010C	YDR010C	6.641832922	7.292386659	0.100855444	333	flat	0.910790011	-0.134809627	1.097947923	0.134809627
YDR011W	SNQ2	44.17570632	93.43491785	0.924133681	4506	up	0.472796545	-1.080708603	2.115074678	1.080708603
YDR012W	RPL4B	133.9630255	113.7250713	0.677961433	1089	flat	1.17795508	0.236284525	0.848928806	-0.236284525
YDR013W	PSF1	285.020436	234.3158976	0.780078295	627	flat	1.216393932	0.282610524	0.822102095	-0.282610524
YDR014W	RAD61	75.22613766	112.736584	0.846694215	1944	flat	0.667273524	-0.583649834	1.498635814	0.583649834
YDR014W-A	HED1	10.49328107	13.65644802	0.314513557	489	flat	0.768375573	-0.38011644	1.301446891	0.38011644
YDR015C	YDR015C	2.58035209	1.897159967	0.110475569	240	flat	1.360113083	0.443726605	0.735232984	-0.443726605
YDR016C	DAD1	1175.554089	1066.137334	0.60984486	285	flat	1.102629137	0.140947631	0.906923249	-0.140947631
YDR017C	KCS1	47.92433188	45.10342883	0.233485573	3153	flat	1.062542984	0.087521206	0.941138396	-0.087521206
YDR018C	YDR018C	12.40500321	16.5663003	0.380129042	1191	flat	0.74880951	-0.417329337	1.335453124	0.417329337
YDR019C	GCV1	452.2004989	1155.012435	0.96922575	1203	up	0.391511368	-1.352873896	2.554204248	1.352873896
YDR020C	DAS2	114.9213831	61.01309879	0.902421343	699	down	1.883552637	0.913456351	0.53091163	-0.913456351
YDR021W	FAL1	115.0837032	107.3792541	0.387182833	1200	flat	1.071749885	0.099968262	0.933053518	-0.099968262
YDR022C	ATG31	86.6728853	128.6601886	0.853320284	591	flat	0.673657378	-0.569913072	1.484434124	0.569913072
YDR023W	SES1	434.3207875	312.5055438	0.872821517	1389	flat	1.389801865	0.474879222	0.719527024	-0.474879222
YDR024W	FVY1	48.42142194	20.92341033	0.88323184	486	flat	2.31422226	1.210527429	0.432110613	-1.210527429
YDR025W	RPS11A	380.1734399	227.4980784	0.909931854	471	down	1.671106159	0.740803385	0.598406029	-0.740803385
YDR026C	NSI1	90.01858781	80.62652982	0.493663912	1713	flat	1.116488431	0.158968303	0.895665348	-0.158968303
YDR027C	VPS54	84.45993552	100.49974	0.653204292	2670	flat	0.840399543	-0.250852718	1.189910214	0.250852718
YDR028C	REG1	70.86253341	62.20441743	0.503052052	3045	flat	1.139188121	0.188006008	0.877818142	-0.188006008
YDR029W	YDR029W	2.246837194	3.854547234	0.203327534	315	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YDR030C	RAD28	147.7395167	158.5581689	0.422009569	1521	flat	0.93176856	-0.101956444	1.073227884	0.101956444
YDR031W	MIX14	1829.814082	1709.310029	0.503276787	366	flat	1.070498652	0.098282979	0.9341441	-0.098282979
YDR032C	PST2	582.8298505	265.1575002	0.962751921	597	down	2.198051536	1.136225212	0.454948387	-1.136225212
YDR033W	MRH1	390.8079321	439.8731852	0.657974482	963	flat	0.888455912	-0.170627907	1.125548253	0.170627907
YDR034C	LYS14	97.75233059	107.769559	0.478077425	2373	flat	0.907049556	-0.140746722	1.102475597	0.140746722
YDR034C-A	YDR034C-A	4.498434637	12.00462804	0.604719443	177	flat	0.374725033	-1.416095737	2.668623423	1.416095737
YDR034C-C	YDR034C-C	0.201524407	0.057620652	0.043924895	1317	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YDR034C-D	YDR034C-D	14.66993751	17.71111113	0.299043062	5313	flat	0.828290064	-0.271792013	1.207306527	0.271792013
YDR034W-B	YDR034W-B	252.9312159	499.0990066	0.939734667	156	up	0.506775635	-0.980580932	1.973259824	0.980580932
YDR035W	ARO3	363.971728	212.0455524	0.912055966	1113	down	1.716478954	0.779452168	0.582587976	-0.779452168
YDR036C	EHD3	45.20582619	49.37917358	0.326569523	1503	flat	0.915483652	-0.127393971	1.092318795	0.127393971
YDR037W	KRS1	197.7605753	149.5508983	0.829251849	1776	flat	1.322363005	0.403118269	0.756222003	-0.403118269
YDR038C	ENAS	53.38938862	70.51227031	0.717754096	3276	flat	0.75716451	-0.401321304	1.320716946	0.401321304
YDR039C	ENA2	55.81986155	74.63552396	0.738110773	3276	flat	0.747899373	-0.419083922	1.337078271	0.419083922

YDR040C	ENA1	45.2878122	69.77101123	0.806401334	3276	flat	0.6490921	-0.623504897	1.54061342	0.623504897
YDR041W	RSM10	717.0053988	738.7764106	0.226714514	612	flat	0.970530987	-0.043153819	1.030363805	0.043153819
YDR042C	YDR042C	36.53206371	39.76799665	0.27953458	603	flat	0.918629722	-0.122444632	1.088577885	0.122444632
YDR043C	NRG1	534.1201716	1047.799269	0.939321444	696	up	0.509754289	-0.972126085	1.961729447	0.972126085
YDR044W	HEM13	30.02754495	20.91296904	0.59569378	987	flat	1.435833664	0.521888628	0.696459503	-0.521888628
YDR045C	RPC11	506.6390153	306.7360138	0.909794113	333	down	1.651710241	0.723960617	0.605433069	-0.723960617
YDR046C	BAP3	299.8692054	430.7337075	0.883884298	1815	flat	0.696182352	-0.522462853	1.436405272	0.522462853
YDR047W	HEM12	198.954184	179.7859583	0.569290996	1089	flat	1.106616923	0.146155892	0.903655076	-0.146155892
YDR048C	YDR048C	5.336238337	14.93637053	0.675300855	315	flat	0.357264727	-1.484934613	2.799044868	1.484934613
YDR049W	VMS1	50.59376881	45.87550588	0.354182978	1899	flat	1.102849284	0.141235645	0.906742213	-0.141235645
YDR050C	TPI1	3789.253707	3221.971915	0.762258953	747	flat	1.176066647	0.233969819	0.850291948	-0.233969819
YDR051C	DET1	367.3453057	324.5370562	0.668522546	1005	flat	1.131905583	0.178753622	0.883465914	-0.178753622
YDR052C	DBF4	58.01739979	57.83871142	0.015412498	2115	flat	1.003089425	0.004450227	0.99692009	-0.004450227
YDR053W	YDR053W	0.223407107	1.149793919	0.54969552	396	flat	0.194301869	-2.363628317	5.146630887	2.363628317
YDR054C	CDC34	126.8257997	131.4338752	0.221342613	888	flat	0.964939971	-0.0514889	1.036333897	0.0514889
YDR055W	PST1	149.4367631	371.8717753	0.967514862	1335	up	0.401850243	-1.315270142	2.488489228	1.315270142
YDR056C	YDR056C	264.6918732	124.5126347	0.954661447	618	down	2.125823406	1.088021756	0.47040596	-1.088021756
YDR057W	YOS9	94.225959	72.48571905	0.750333478	1629	flat	1.299924457	0.378427786	0.769275472	-0.378427786
YDR058C	TGL2	128.4201442	126.5546873	0.098847325	981	flat	1.014740323	0.021110582	0.985473798	-0.021110582
YDR059C	UBC5	155.9591522	211.1916777	0.846469479	447	flat	0.738472055	-0.437384767	1.354147382	0.437384767
YDR060W	MAK21	109.4224495	87.62191711	0.730680006	3078	flat	1.248802276	0.320545072	0.800767278	-0.320545072
YDR061W	YDR061W	81.86132875	93.03110355	0.540938089	1620	flat	0.879933505	-0.184531056	1.136447514	0.184531056
YDR062W	LCB2	142.2014065	137.0096071	0.228708134	1686	flat	1.037893689	0.053658676	0.963489817	-0.053658676
YDR063W	AIM7	294.307587	213.8310078	0.863259388	450	flat	1.376355983	0.46085366	0.72655622	-0.46085366
YDR064W	RPS13	1041.453385	714.9297559	0.891286066	456	flat	1.456721274	0.542724862	0.686473121	-0.542724862
YDR065W	RRG1	71.54887295	72.84541366	0.100297231	1098	flat	0.982201478	-0.025909102	1.01812105	0.025909102
YDR066C	RTR2	71.70347506	82.17816438	0.548376106	591	flat	0.87253683	-0.196712065	1.146083426	0.196712065
YDR067C	OCA6	171.1715469	172.9085647	0.068508047	675	flat	0.989954125	-0.014566423	1.010147818	0.014566423
YDR068W	DOS2	142.7075754	128.8360723	0.536595621	933	flat	1.107667851	0.147525335	0.90279771	-0.147525335
YDR069C	DOA4	61.39718951	90.81263386	0.821494853	2781	flat	0.676086431	-0.564720402	1.479100828	0.564720402
YDR070C	FMP16	400.9349509	263.180489	0.896730463	282	flat	1.523422015	0.60731565	0.656416928	-0.60731565
YDR071C	PAA1	639.4051043	632.1231611	0.127642453	576	flat	1.011519817	0.016524585	0.988611378	-0.016524585
YDR072C	IPT1	75.95841651	106.5475698	0.815397999	1584	flat	0.712906138	-0.488215953	1.402709202	0.488215953
YDR073W	SNF11	68.86721209	76.77917983	0.464796288	510	flat	0.896951651	-0.156897875	1.114887295	0.156897875
YDR074W	TPS2	178.0233358	162.4888254	0.512809917	2691	flat	1.095603562	0.131725861	0.912738909	-0.131725861
YDR075W	PPH3	189.9177313	148.3345786	0.806792808	927	flat	1.280333507	0.356519659	0.781046496	-0.356519659
YDR076W	RAD55	51.37155864	32.81573996	0.766884153	1221	flat	1.56545483	0.646581882	0.646581882	-0.646581882
YDR077W	SED1	247.3136449	316.8275799	0.830382775	1017	flat	0.780593801	-0.357356089	1.28107602	0.357356089
YDR078C	SHU2	182.0728031	159.0000734	0.656858054	672	flat	1.145111441	0.195488006	0.873277451	-0.195488006
YDR079C-A	TFB5	511.8287434	466.4068156	0.572785269	219	flat	1.09738693	0.134072298	0.911255613	-0.134072298
YDR079W	PET100	355.983268	303.9972994	0.740575613	336	flat	1.171007995	0.227750925	0.853965135	-0.227750925
YDR080W	VPS41	59.92980024	66.38467772	0.420291431	2979	flat	0.902765552	-0.147576726	1.107707308	0.147576726
YDR081C	PDC2	56.36807405	78.39955514	0.773437727	2778	flat	0.718984616	-0.475967193	1.390850343	0.475967193
YDR082W	STN1	140.3592387	177.3237733	0.791858779	1485	flat	0.791542138	-0.33726194	1.26335662	0.33726194
YDR083W	RRP8	148.8744034	124.3532843	0.714078585	1179	flat	1.197189155	0.259651115	0.835289892	-0.259651115
YDR084C	TVP23	155.7058176	134.824835	0.656560824	600	flat	1.154874898	0.20773658	0.865894654	-0.20773658
YDR085C	AFR1	52.90107621	73.32019195	0.759402639	1863	flat	0.721507607	-0.47091349	1.385986774	0.47091349
YDR086C	SSS1	669.162207	452.8200744	0.89261998	243	flat	1.477766214	0.56341805	0.56341805	-0.56341805
YDR087C	RRP1	543.8161395	332.7396453	0.909504132	837	down	1.634359317	0.708725198	0.611860556	-0.708725198

YDR088C	SLU7	138.517073	146.3570578	0.333964042	1149	flat	0.946432479	-0.079428511	1.056599411	0.079428511
YDR089W	YDR089W	52.77646246	71.17620841	0.736399884	2610	flat	0.74149022	-0.43150043	1.348635454	0.43150043
YDR090C	YDR090C	115.303928	140.8737862	0.736392634	933	flat	0.818491014	-0.288961518	1.221760512	0.288961518
YDR091C	RLI1	80.62465363	70.94360642	0.516144701	1827	flat	1.136461165	0.184548386	0.87992448	-0.184548386
YDR092W	UBC13	239.7477415	180.6819016	0.842047267	462	flat	1.326905127	0.408065222	0.753633383	-0.408065222
YDR093W	DNF2	28.72187147	31.33313175	0.247600406	4839	flat	0.91666137	-0.125539219	1.090915395	0.125539219
YDR094W	YDR094W	5.529325908	4.968752294	0.094642598	336	flat	1.112819795	0.154219988	0.898618091	-0.154219988
YDR095C	YDR095C	1.93728207	2.954215033	0.145498043	411	flat	0.655768808	-0.608740815	1.52492767	0.608740815
YDR096W	GIS1	36.21142151	47.76462337	0.638241264	2685	flat	0.758122203	-0.399497677	1.319048559	0.399497677
YDR097C	MSH6	99.38255287	70.81916529	0.80814847	3729	flat	1.403328498	0.488852762	0.712591529	-0.488852762
YDR098C	GRX3	296.9596012	258.084512	0.693953893	858	flat	1.150629299	0.202423112	0.869089637	-0.202423112
YDR098C-A	YDR098C-A	0.334350773	0.803030674	0.091982021	1323	flat	0.416361148	-1.264092643	2.40176108	1.264092643
YDR098C-B	YDR098C-B	23.07454456	28.95437762	0.459293896	5268	flat	0.796927665	-0.327479314	1.25481903	0.327479314
YDR099W	BMH2	220.2043953	198.8555994	0.578135421	822	flat	1.107358284	0.147122079	0.903050092	-0.147122079
YDR100W	TVP15	234.8939562	212.2008555	0.582905611	432	flat	1.106941608	0.14657912	0.903390019	-0.14657912
YDR101C	ARX1	163.2361265	133.1205849	0.752015369	1782	flat	1.226227534	0.294226704	0.815509335	-0.294226704
YDR102C	YDR102C	5.047793021	8.203934991	0.328012179	333	flat	0.615289252	-0.700663304	1.625251859	0.700663304
YDR103W	STE5	85.9956744	117.6046295	0.810047847	2754	flat	0.731226949	-0.451608853	1.367564477	0.451608853
YDR104C	SPO71	39.43009936	50.87515117	0.630933739	3738	flat	0.775036505	-0.36766383	1.290261805	0.36766383
YDR105C	TMS1	88.78028771	115.3772109	0.775815572	1422	flat	0.769478539	-0.378047005	1.299581404	0.378047005
YDR106W	ARP10	85.46850433	85.20578096	0.01816007	855	flat	1.003083398	0.004441559	0.99692608	-0.004441559
YDR107C	TMN2	37.68376647	38.26268145	0.054951428	2019	flat	0.984869984	-0.021994813	1.01536245	0.021994813
YDR108W	TRS85	35.3961235	37.56322452	0.199644773	2097	flat	0.942307908	-0.085729544	1.061224247	0.085729544
YDR109C	YDR109C	56.38470889	72.21219687	0.693649413	2148	flat	0.780819741	-0.356938566	1.280705324	0.356938566
YDR110W	FOB1	195.7140825	179.5219684	0.49753516	1701	flat	1.090195725	0.124587168	0.917266485	-0.124587168
YDR111C	ALT2	59.67608434	61.74483881	0.160555314	1524	flat	0.966495103	-0.049165672	1.034666391	0.049165672
YDR112W	IRC2	2.863081376	7.367611521	0.452950558	309	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YDR113C	PDS1	20.81628577	20.4257508	0.045643033	1122	flat	1.019119736	0.027323564	0.98123897	-0.027323564
YDR114C	YDR114C	1.167910423	2.504501606	0.195614035	303	flat	0.466324485	-1.100593911	2.144429536	1.100593911
YDR115W	YDR115W	449.5794046	401.3865489	0.639756416	318	flat	1.120065946	0.163583676	0.892804574	-0.163583676
YDR116C	MRPL1	83.72610979	86.85366374	0.193903146	858	flat	0.963990535	-0.052909113	1.037354583	0.052909113
YDR117C	TMA64	47.41282993	41.38445534	0.436015659	1698	flat	1.145667607	0.196188536	0.872853517	-0.196188536
YDR118W	APC4	100.4818797	102.6538828	0.126968247	1959	flat	0.978841491	-0.03085284	1.021615869	0.03085284
YDR118W-A	YDR118W-A	40.83194517	15.56644075	0.876025808	117	flat	2.623075231	1.391259185	0.381231918	-1.391259185
YDR119W	VBA4	96.56067715	89.07688236	0.412606931	2307	flat	1.084015006	0.116384728	0.922496455	-0.116384728
YDR119W-A	COX26	325.707556	627.47858	0.937509062	201	up	0.519073585	-0.945989023	1.926509129	0.945989023
YDR120C	TRM1	138.8238463	122.357404	0.595599536	1713	flat	1.13457659	0.182154002	0.881386068	-0.182154002
YDR121W	DPB4	102.2410719	78.06925616	0.767210381	591	flat	1.309620163	0.389148439	0.76358018	-0.389148439
YDR122W	KIN1	43.30699578	42.23036521	0.094816587	3195	flat	1.025494228	0.036319372	0.975139569	-0.036319372
YDR123C	INO2	34.32412148	59.05039984	0.819776715	915	flat	0.581268231	-0.782724033	1.720376146	0.782724033
YDR124W	YDR124W	18.96417009	15.25511194	0.344570103	975	flat	1.243135427	0.313983472	0.804417587	-0.313983472
YDR125C	ECM18	45.66362541	68.19746841	0.790416123	1362	flat	0.66957948	-0.57867278	1.493474681	0.57867278
YDR126W	SWF1	14.96363569	16.96372512	0.21646368	1011	flat	0.882096095	-0.180992264	1.133663334	0.180992264
YDR127W	ARO1	89.37858971	48.48960989	0.877816442	4767	flat	1.843252398	0.882253634	0.5425193	-0.882253634
YDR128W	MTCS	40.62859489	41.82888235	0.102102363	3447	flat	0.971304816	-0.042003979	1.029542923	0.042003979
YDR129C	SAC6	224.0853199	232.261948	0.251406409	1929	flat	0.964795662	-0.051704674	1.036488906	0.051704674
YDR130C	FIN1	158.4568466	149.0006914	0.376642018	876	flat	1.063463834	0.088770971	0.940323468	-0.088770971
YDR131C	YDR131C	47.96715043	78.29332813	0.840256633	1671	flat	0.612659489	-0.706842635	1.632228044	0.706842635
YDR132C	YDR132C	40.07274905	53.75286572	0.678780629	1488	flat	0.74549977	-0.423720187	1.341382036	0.423720187

YDR133C	YDR133C	1166.951068	185.1989491	0.996433232	336	down	6.301067437	2.65559625	0.158703269	-2.65559625
YDR134C	YDR134C	125.2775739	31.75781161	0.975322604	411	down	3.944779804	1.979944772	0.253499574	-1.979944772
YDR135C	YCF1	90.58951892	116.1655909	0.764296071	4548	flat	0.779830914	-0.358766748	1.282329262	0.358766748
YDR136C	VPS61	10.34456784	12.18420363	0.210287081	573	flat	0.849014688	-0.236138582	1.177835924	0.236138582
YDR137W	RGF1	78.25439558	81.60073592	0.218689285	1992	flat	0.958991297	-0.060410372	1.042762331	0.060410372
YDR138W	HPR1	54.31907948	58.1829316	0.295063071	2259	flat	0.933591313	-0.099136959	1.071132504	0.099136959
YDR139C	RUB1	745.1829993	587.6331384	0.835957663	234	flat	1.268109217	0.342679005	0.78857561	-0.342679005
YDR140W	MTQ2	164.4517832	156.5584261	0.308786429	666	flat	1.050417964	0.070963494	0.952001998	-0.070963494
YDR141C	DOP1	39.14029405	36.95311781	0.192032768	5097	flat	1.059187867	0.082958502	0.944119576	-0.082958502
YDR142C	PEX7	111.4492499	119.7498135	0.395331303	1128	flat	0.930684121	-0.103636503	1.074478416	0.103636503
YDR143C	SAN1	28.86229694	27.6552724	0.124590402	1833	flat	1.043645368	0.061631565	0.958179886	-0.061631565
YDR144C	MKC7	29.63792781	28.81225633	0.079447586	1791	flat	1.028656953	0.040761938	0.97214139	-0.040761938
YDR145W	TAF12	117.3036252	109.0515655	0.410200087	1620	flat	1.075671171	0.105237119	0.929652134	-0.105237119
YDR146C	SWI5	53.7460862	19.38131497	0.912121212	2130	down	2.773087703	1.471493244	0.360608862	-1.471493244
YDR147W	EKI1	128.7075489	128.1321747	0.046273742	1605	flat	1.004490474	0.006463882	0.995529601	-0.006463882
YDR148C	KGD2	128.8904936	87.2257456	0.85169639	1392	flat	1.477665713	0.563319931	0.676743049	-0.563319931
YDR149C	YDR149C	0.624782588	1.714946863	0.167427867	708	flat	0.364316004	-1.456737721	2.744869806	1.456737721
YDR150W	NUM1	47.26510964	50.59093245	0.273974192	8247	flat	0.934260496	-0.098103228	1.070365283	0.098103228
YDR151C	CTH1	101.4953565	198.0184963	0.929462085	978	up	0.51255493	-0.964221469	1.951010402	0.964221469
YDR152W	GIR2	293.1235629	232.9845573	0.814165579	798	flat	1.258124428	0.331274611	0.794833943	-0.331274611
YDR153C	ENT5	87.68186715	75.64081162	0.579752066	1236	flat	1.159187286	0.213113677	0.862673368	-0.213113677
YDR154C	YDR154C	1515.570903	1058.08557	0.887965782	351	flat	1.432370827	0.518405041	0.698143233	-0.518405041
YDR155C	CPR1	629.5968641	414.3490479	0.89831086	489	flat	1.519484278	0.603581748	0.65811803	-0.603581748
YDR156W	RPA14	52.35496995	60.1225574	0.49045962	414	flat	0.870804108	-0.199579882	1.148363899	0.199579882
YDR157W	YDR157W	86.48856047	61.53971633	0.792272002	402	flat	1.405410451	0.490991532	0.711535907	-0.490991532
YDR158W	HOM2	515.909272	241.6200817	0.957699	1098	down	2.135208581	1.094377009	0.46833832	-1.094377009
YDR159W	SAC3	43.55512021	50.43550715	0.46831231	3906	flat	0.863580495	-0.211597437	1.157969647	0.211597437
YDR160W	SSY1	80.20655635	89.02343447	0.473771205	2559	flat	0.900960032	-0.150464988	1.10992715	0.150464988
YDR161W	YDR161W	218.436875	144.8621803	0.883405829	1164	flat	1.507894432	0.592535429	0.663176399	-0.592535429
YDR162C	NBP2	263.0434874	256.3700838	0.201130926	711	flat	1.026030352	0.037073409	0.974630037	-0.037073409
YDR163W	CWC15	258.8729857	221.6227779	0.714520806	528	flat	1.168079329	0.224138257	0.856106238	-0.224138257
YDR164C	SEC1	48.60722361	64.61683234	0.707880238	2175	flat	0.752237797	-0.410739297	1.329366862	0.410739297
YDR165W	TRM82	134.0623378	101.5229274	0.801399159	1335	flat	1.320512926	0.401098423	0.757281493	-0.401098423
YDR166C	SEC5	68.93074602	97.22619528	0.808706684	2916	flat	0.708972986	-0.496197437	1.410490977	0.496197437
YDR167W	TAF10	494.7722738	381.7537994	0.84492533	621	flat	1.296050687	0.374122141	0.771574762	-0.374122141
YDR168W	CDC37	271.1659948	263.7314289	0.204719443	1521	flat	1.028189913	0.040106763	0.972582971	-0.040106763
YDR169C	STB3	35.9155177	37.59870855	0.156945049	1542	flat	0.955232748	-0.066075797	1.046865282	0.066075797
YDR169C-A	YDR169C-A	4.128563345	6.070911893	0.229085109	150	flat	0.680056541	-0.556273395	1.470465968	0.556273395
YDR170C	SEC7	52.50933977	35.79119698	0.737784544	6030	flat	1.467102086	0.552969262	0.681615826	-0.552969262
YDR170W-A	YDR170W-A	14.10960262	20.30520418	0.492938959	1323	flat	0.694876175	-0.525172178	1.439105319	0.525172178
YDR171W	HSP42	127.8411522	409.7058226	0.977142236	1128	up	0.312031573	-1.68023608	3.204803896	1.68023608
YDR172W	SUP35	177.5832484	146.7579527	0.748651588	2058	flat	1.21004174	0.275056813	0.826417773	-0.275056813
YDR173C	ARG82	161.7793783	173.9418576	0.431491953	1068	flat	0.930077328	-0.104577425	1.075179417	0.104577425
YDR174W	HMO1	336.9232434	168.7729892	0.942692475	741	down	1.996310221	0.997335929	0.50092415	-0.997335929
YDR175C	RSM24	124.1333666	129.7973611	0.261983471	960	flat	0.956362792	-0.064370093	1.045628299	0.064370093
YDR176W	NGG1	93.20938581	79.4486336	0.616383935	2109	flat	1.173203133	0.230452828	0.852367312	-0.230452828
YDR177W	UBC1	375.0384758	193.6976904	0.935986661	648	down	1.936205202	0.95323186	0.516474183	-0.95323186
YDR178W	SDH4	114.5562906	107.5752245	0.347194432	546	flat	1.064894739	0.090710832	0.93905995	-0.090710832
YDR179C	CSN9	415.3891954	320.9265285	0.842119762	489	flat	1.294343591	0.37222064	0.772592383	-0.37222064

YDR179W-A	YDR179W-A	99.4007554	68.90833902	0.821371611	1392	flat	1.442506913	0.528578233	0.693237579	-0.528578233
YDR180W	SCC2	49.74172704	58.75185261	0.53953893	4482	flat	0.846640997	-0.240177745	1.181138173	0.240177745
YDR181C	SAS4	66.44368394	82.393946	0.680433522	1446	flat	0.806414636	-0.310406272	1.240056859	0.310406272
YDR182W	CDC1	62.93541684	64.06128234	0.092482239	1476	flat	0.98242518	-0.025580557	1.01788922	0.025580557
YDR182W-A	YDR182W-A	32.95911914	23.06351332	0.617058141	204	flat	1.429058907	0.515065387	0.699761217	-0.515065387
YDR183C-A	YDR183C-A	61.03689994	107.0645315	0.881738437	258	flat	0.570094495	-0.810727026	1.754095171	0.810727026
YDR183W	PLP1	258.5139386	160.533132	0.901275917	693	down	1.610346322	0.687370988	0.620984435	-0.687370988
YDR184C	ATC1	123.4570395	198.5908467	0.894997825	885	flat	0.621665306	-0.685790028	1.608582609	0.685790028
YDR185C	UPS3	33.25787139	37.38107786	0.343823401	540	flat	0.889698031	-0.168612335	1.12397686	0.168612335
YDR186C	YDR186C	80.60976267	87.35290841	0.397143686	2634	flat	0.92280571	-0.115901164	1.083651726	0.115901164
YDR187C	YDR187C	1.022765486	0.584866271	0.085645933	519	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YDR188W	CCT6	480.0843116	312.794394	0.899014064	1641	flat	1.5348239	0.618073135	0.651540545	-0.618073135
YDR189W	SLY1	51.24228867	46.2675694	0.371857329	2001	flat	1.107520653	0.147333602	0.902917699	-0.147333602
YDR190C	RVB1	445.778068	355.3358811	0.825003625	1392	flat	1.254525906	0.327142262	0.79711387	-0.327142262
YDR191W	HST4	154.8409972	133.2273342	0.670110193	1113	flat	1.162231445	0.216897394	0.860413822	-0.216897394
YDR192C	NUP42	14.71065825	22.3022672	0.553414528	1293	flat	0.659603713	-0.600328575	1.516061812	0.600328575
YDR193W	YDR193W	1.330364128	1.141148852	0.053914746	399	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YDR194C	MSS116	293.3452903	438.2011592	0.893439176	1995	flat	0.669430658	-0.578993471	1.493806697	0.578993471
YDR194W-A	YDR194W-A	1.156460321	1.983958135	0.127105988	153	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YDR195W	REF2	30.26287738	35.05364233	0.38861099	1602	flat	0.863330466	-0.212015194	1.158305005	0.212015194
YDR196C	CAB5	817.1825794	689.8763515	0.768631289	726	flat	1.184534848	0.244320642	0.844213238	-0.244320642
YDR197W	CBS2	107.8265811	110.6514497	0.158938669	1170	flat	0.974470569	-0.037309481	1.026198258	0.037309481
YDR198C	RKM2	85.70455157	68.61395213	0.695309555	1440	flat	1.249083443	0.320869857	0.800587027	-0.320869857
YDR199W	YDR199W	2.417191654	3.732117967	0.173756706	366	flat	0.647672896	-0.626662723	1.543989266	0.626662723
YDR200C	VPS64	77.74567337	79.9420354	0.143018704	1815	flat	0.972525568	-0.040191916	1.028250601	0.040191916
YDR201W	SPC19	499.3714097	379.1272287	0.855524141	498	flat	1.317160499	0.397431152	0.75920892	-0.397431152
YDR202C	RAV2	71.54612614	96.43896497	0.780223285	1056	flat	0.741879863	-0.430742513	1.347927137	0.430742513
YDR203W	YDR203W	1.391025386	1.90909179	0.093714659	318	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YDR204W	COQ4	126.8234276	112.7756202	0.563803103	1008	flat	1.124564221	0.169366053	0.889233341	-0.169366053
YDR205W	MSC2	19.32086294	19.05010284	0.03339133	2175	flat	1.014213052	0.020360746	0.985986128	-0.020360746
YDR206W	EBS1	116.6927267	135.7094617	0.655263158	2655	flat	0.859871708	-0.217806668	1.162964185	0.217806668
YDR207C	UME6	18.67331091	18.25383704	0.047817892	2511	flat	1.022980038	0.032777994	0.977536181	-0.032777994
YDR208W	MSS4	108.6205356	117.0077463	0.412258953	2340	flat	0.928319184	-0.107307162	1.0772157	0.107307162
YDR209C	YDR209C	1.068468774	2.199605759	0.167594606	414	flat	0.485754672	-1.041700222	2.058652355	1.041700222
YDR210C-C	YDR210C-C	0.401220928	0.229437335	0.049746266	1323	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YDR210C-D	YDR210C-D	22.43638394	29.90511838	0.531789184	5268	flat	0.750252303	-0.414552252	1.332884945	0.414552252
YDR210W	YDR210W	290.2411073	290.8978616	0.024017689	228	flat	0.99774232	-0.003260826	1.002262789	0.003260826
YDR210W-A	YDR210W-A	0.268699209	0.57620652	0.070798898	1317	flat	0.466324485	-1.100593911	2.144429536	1.100593911
YDR210W-B	YDR210W-B	21.48038523	27.28082467	0.456684066	5313	flat	0.787380348	-0.344867389	1.270034237	0.344867389
YDR211W	GCD6	221.4005168	194.345812	0.655574888	2139	flat	1.139209096	0.18803257	0.87780198	-0.18803257
YDR212W	TCP1	271.8321937	246.7211366	0.568015079	1680	flat	1.101779107	0.139835011	0.907622947	-0.139835011
YDR213W	UPC2	34.10355936	39.24395088	0.401239669	2742	flat	0.869014424	-0.202547972	1.150728886	0.202547972
YDR214W	AHA1	175.3421184	395.2146347	0.963455125	1053	up	0.44366302	-1.172463787	2.253962928	1.172463787
YDR215C	YDR215C	2.350631304	3.299408638	0.137320574	414	flat	0.712440186	-0.489159199	1.403626605	0.489159199
YDR216W	ADR1	45.59327345	58.42412063	0.652298101	3972	flat	0.780384419	-0.357743121	1.28141974	0.357743121
YDR217C	RAD9	50.3126449	57.23340602	0.457959983	3930	flat	0.879078294	-0.185936433	1.137555104	0.185936433
YDR218C	SPR28	11.75416451	59.53980021	0.957945484	1272	up	0.197416929	-2.340682385	5.065421721	2.340682385
YDR219C	MFB1	97.26550982	134.0768274	0.825511092	1398	flat	0.725446087	-0.463059693	1.378462187	0.463059693
YDR220C	YDR220C	10.53204935	16.51948815	0.490880093	294	flat	0.637553007	-0.649382799	1.568497032	0.649382799

YDR221W	GTB1	78.02405833	87.65256859	0.506908801	2109	flat	0.890151419	-0.167877328	1.123404376	0.167877328
YDR222W	YDR222W	98.32275685	239.2124138	0.964361317	1248	up	0.411026984	-1.282694986	2.432930294	1.282694986
YDR223W	CRF1	21.80224233	29.18707641	0.529752066	1404	flat	0.746982741	-0.420853186	1.338719017	0.420853186
YDR224C	HTB1	946.7993211	640.435213	0.893431927	396	flat	1.478368619	0.564006038	0.676421285	-0.564006038
YDR225W	HTA1	857.8631354	655.780207	0.856227345	399	flat	1.308156492	0.387535138	0.764434535	-0.387535138
YDR226W	ADK1	697.4389199	375.9155832	0.922169059	669	down	1.855307284	0.891658152	0.538994272	-0.891658152
YDR227W	SIR4	34.17684888	37.52440022	0.288871973	4077	flat	0.910790011	-0.134809627	1.097947923	0.134809627
YDR228C	PCF11	76.28764804	67.21251472	0.504799188	1881	flat	1.135021482	0.182719603	0.881040594	-0.182719603
YDR229W	IVY1	85.41631212	78.22650788	0.417442366	1362	flat	1.091910075	0.126854048	0.915826333	-0.126854048
YDR230W	YDR230W	2.287996927	1.308386184	0.142648978	348	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YDR231C	COX20	387.9475265	316.0705343	0.803900246	618	flat	1.227408076	0.295614982	0.814724963	-0.295614982
YDR232W	HEM1	63.16927522	52.24965154	0.59338118	1647	flat	1.208989407	0.273801604	0.827137107	-0.273801604
YDR233C	RTN1	45.82864716	47.1726262	0.109293896	888	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YDR234W	LYS4	49.16372777	49.35167329	0.024082935	2082	flat	0.996191709	-0.005504691	1.003822849	0.005504691
YDR235W	PRP42	139.3863588	133.3929723	0.26615195	1635	flat	1.044930301	0.063406715	0.957001628	-0.063406715
YDR236C	FMN1	337.4487848	422.0531214	0.818964767	657	flat	0.799541024	-0.322756036	1.250717562	0.322756036
YDR237W	MRPL7	208.6424138	179.5719104	0.697585907	879	flat	1.16188781	0.216470772	0.860668294	-0.216470772
YDR238C	SEC26	125.2556949	89.44310644	0.829940554	2922	flat	1.400395177	0.485833999	0.71408415	-0.485833999
YDR239C	YDR239C	23.61424466	24.13983579	0.056408583	2364	flat	0.978227228	-0.031758473	1.022257376	0.031758473
YDR240C	SNU56	73.81407081	61.05802192	0.623705959	1479	flat	1.208916838	0.273715005	0.827186758	-0.273715005
YDR241W	BUD26	98.9134968	110.6676647	0.527983181	288	flat	0.893788597	-0.161994456	1.118832801	0.161994456
YDR242W	AMD2	63.48336364	80.11764029	0.69723793	1650	flat	0.792376852	-0.335741359	1.262025761	0.335741359
YDR243C	PRP28	94.32710819	103.0715092	0.446201247	1767	flat	0.915161803	-0.127901257	1.092702948	0.127901257
YDR244W	PEX5	105.5472848	120.7414913	0.595940264	1839	flat	0.874159194	-0.19403206	1.143956394	0.19403206
YDR245W	MNN10	308.8937803	254.6239062	0.783086849	1182	flat	1.213137387	0.278742944	0.824308945	-0.278742944
YDR246W	TRS23	22.65348069	32.19422974	0.606176599	660	flat	0.70365034	-0.507069397	1.421160403	0.507069397
YDR246W-A	YDR246W-A	1.760581384	3.020354176	0.16968972	201	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YDR247W	VHS1	19.08535003	36.57439705	0.781136726	1386	flat	0.521822684	-0.938368435	1.916359773	0.938368435
YDR248C	YDR248C	351.9007416	325.4509469	0.502704074	582	flat	1.081271218	0.112728443	0.924837343	-0.112728443
YDR249C	YDR249C	91.46549808	134.1877139	0.852240104	1122	flat	0.681623492	-0.552953037	1.467085586	0.552953037
YDR250C	YDR250C	3.205406323	8.248521594	0.486486878	276	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YDR251W	PAM1	47.02034065	58.32263933	0.613614615	2493	flat	0.806210782	-0.310771018	1.240370412	0.310771018
YDR252W	BTT1	124.4466951	125.1282396	0.050210236	450	flat	0.994553232	-0.007879504	1.005476598	0.007879504
YDR253C	MET32	44.54179204	77.46736531	0.85523416	576	flat	0.574974918	-0.798429071	1.7392063	0.798429071
YDR254W	CHL4	72.27877004	61.83336188	0.566195447	1377	flat	1.168928356	0.225186509	0.855484423	-0.225186509
YDR255C	RMD5	51.85162494	97.70523683	0.893033203	1266	flat	0.53069443	-0.914046689	1.884323528	0.914046689
YDR256C	CTA1	5.372161606	15.09884418	0.679164854	1548	flat	0.355799526	-1.490863505	2.810571477	1.490863505
YDR257C	RKM4	111.1673766	111.1978475	0.006031608	1485	flat	0.999725976	-0.000395387	1.000274099	0.000395387
YDR258C	HSP78	327.1109258	1033.687389	0.977395969	2436	up	0.316450533	-1.659948095	3.160051554	1.659948095
YDR259C	YAP6	31.64003158	26.61293842	0.408242714	1152	flat	1.188896584	0.249623228	0.841116051	-0.249623228
YDR260C	SWM1	170.2126993	102.6611319	0.894381615	513	flat	1.658005285	0.729448606	0.603134386	-0.729448606
YDR261C	EXG2	46.56550131	77.00964317	0.841974772	1689	flat	0.604671044	-0.725777602	1.653791777	0.725777602
YDR261C-C	YDR261C-C	0.401220928	0.114718668	0.067899087	1323	flat	3.497433641	1.806296684	0.285293938	-1.806296684
YDR261C-D	YDR261C-D	30.84938966	39.24343358	0.552145861	4815	flat	0.786103224	-0.347209328	1.272097569	0.347209328
YDR261W-A	YDR261W-A	0.537398418	0.460965216	0.031462955	1317	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YDR261W-B	YDR261W-B	22.64598753	26.68093219	0.356075105	5313	flat	0.848770477	-0.23655362	1.178174816	0.23655362
YDR262W	YDR262W	217.9864163	295.9476891	0.858278962	819	flat	0.736570767	-0.441103955	1.357642802	0.441103955
YDR263C	DIN7	31.81607483	35.44886682	0.315709729	1293	flat	0.897520222	-0.15498365	1.114181024	0.15498365
YDR264C	AKR1	172.5438798	189.5341338	0.538342758	2295	flat	0.910357814	-0.13549439	1.098469178	0.13549439

YDR265W	PEX10	223.2669822	363.2668433	0.90646658	1014	up	0.614608755	-0.702259777	1.627051343	0.702259777
YDR266C	HEL2	60.73042956	70.43206376	0.539720168	1920	flat	0.862255432	-0.213812783	1.159749145	0.213812783
YDR267C	CIA1	137.7375686	88.19023571	0.872843265	993	flat	1.561823342	0.643231279	0.640277279	-0.643231279
YDR268W	MSW1	147.4486909	166.9500771	0.614042337	1140	flat	0.883190313	-0.179203746	1.132258795	0.179203746
YDR269C	YDR269C	1.365265656	1.405303679	0.014122082	324	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YDR270W	CCC2	52.9348136	56.43028385	0.262744672	3015	flat	0.938056837	-0.092252756	1.066033486	0.092252756
YDR271C	YDR271C	8.085895951	12.64773311	0.416427432	372	flat	0.639315827	-0.645399285	1.564172132	0.645399285
YDR272W	GLO2	928.7658994	990.6624408	0.454480209	825	flat	0.937520048	-0.093078553	1.066643857	0.093078553
YDR273W	DON1	10.9579355	10.50522094	0.0653835	1098	flat	1.043094244	0.060869511	0.958686146	-0.060869511
YDR274C	YDR274C	0.713461407	0.407991391	0.069327244	372	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YDR275W	BSC2	400.8605088	390.1504112	0.214738292	708	flat	1.027451201	0.039069875	0.973282233	-0.039069875
YDR276C	PMP3	651.9338547	848.301528	0.852856314	168	flat	0.768516657	-0.379851565	1.301207971	0.379851565
YDR277C	MTH1	26.77178996	21.21555232	0.445650283	1302	flat	1.261894555	0.335591363	0.79245924	-0.335591363
YDR278C	YDR278C	10.57179293	11.45455074	0.121291866	318	flat	0.922933877	-0.115700804	1.083501239	0.115700804
YDR279W	RNH202	81.83192303	74.80539584	0.413890097	1053	flat	1.093930753	0.129521417	0.914134644	-0.129521417
YDR280W	RRP45	332.1932271	307.3481811	0.499760766	918	flat	1.080836808	0.112148712	0.925209053	-0.112148712
YDR281C	PHM6	53.64323801	37.10001713	0.733572568	315	flat	1.445908713	0.531976471	0.691606594	-0.531976471
YDR282C	YDR282C	99.83875214	132.755483	0.805183413	1245	flat	0.752049933	-0.41109964	1.329698941	0.41109964
YDR283C	GCN2	36.56016938	36.23651728	0.033152095	4980	flat	1.008931656	0.012828451	0.991147412	-0.012828451
YDR284C	DPP1	104.8411037	87.92355156	0.661483254	870	flat	1.192412065	0.253882878	0.838636265	-0.253882878
YDR285W	ZIP1	23.66585153	28.99160741	0.42907786	2628	flat	0.816300083	-0.292828491	1.225039689	0.292828491
YDR286C	YDR286C	164.3732363	169.8095646	0.231274467	345	flat	0.967985736	-0.046942307	1.033073075	0.046942307
YDR287W	INM2	101.3521036	105.6711627	0.241423807	879	flat	0.959127363	-0.060205691	1.0426144	0.060205691
YDR288W	NSE3	557.0068309	525.2137592	0.403900246	912	flat	1.060533585	0.084790309	0.942921577	-0.084790309
YDR289C	RTT103	229.3006959	211.4947761	0.504581702	1230	flat	1.084190825	0.116618704	0.922346857	-0.116618704
YDR290W	YDR290W	1.608531173	1.379752703	0.059018414	330	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YDR291W	HRQ1	51.62071979	53.17210247	0.11907351	3234	flat	0.970823372	-0.042719255	1.030053488	0.042719255
YDR292C	SRP101	85.19784486	93.12961037	0.432557634	1866	flat	0.914830896	-0.128423006	1.093098194	0.128423006
YDR293C	SSD1	45.96721778	59.40693826	0.664897782	3753	flat	0.773768505	-0.370026088	1.2923762	0.370026088
YDR294C	DPL1	83.72086685	111.7287881	0.791525301	1770	flat	0.74932225	-0.416341805	1.334539313	0.416341805
YDR295C	HDA2	33.64014577	53.96366128	0.784087284	2025	flat	0.623385163	-0.681804277	1.604144692	0.681804277
YDR296W	MHR1	175.5094109	139.2922149	0.78645788	681	flat	1.26000876	0.333433763	0.793645276	-0.333433763
YDR297W	SUR2	59.48501472	51.60275109	0.498071625	1050	flat	1.152748903	0.205078293	0.867491608	-0.205078293
YDR298C	ATP5	673.002898	411.852943	0.910113093	639	down	1.634085441	0.708483419	0.611963105	-0.708483419
YDR299W	BFR2	127.8807338	100.6144899	0.768051327	1605	flat	1.270997188	0.345960838	0.786783802	-0.345960838
YDR300C	PRO1	187.2495263	226.7747391	0.766644918	1287	flat	0.825707162	-0.276297876	1.211083112	0.276297876
YDR301W	CFT1	43.84372708	48.61647043	0.364390315	4074	flat	0.901828674	-0.149074712	1.108858066	0.149074712
YDR302W	GPI11	234.0412857	200.5240595	0.708090474	660	flat	1.167148153	0.222987703	0.856789258	-0.222987703
YDR303C	RSC3	134.1350393	173.2425384	0.807104538	2658	flat	0.774261567	-0.369107063	1.291553194	0.369107063
YDR304C	CPR5	436.4742221	284.0703242	0.898441351	678	flat	1.536500595	0.619648325	0.650829556	-0.619648325
YDR305C	HNT2	203.8579607	132.0469751	0.887327824	654	flat	1.543829085	0.626513043	0.647740096	-0.626513043
YDR306C	YDR306C	134.5815609	198.878342	0.874684645	1437	flat	0.676702951	-0.563405415	1.477753272	0.563405415
YDR307W	PMT7	46.79216374	58.67937715	0.629926055	1989	flat	0.797420934	-0.326586615	1.254042824	0.326586615
YDR308C	SRB7	421.2222176	292.7815665	0.883616065	423	flat	1.438691044	0.52475681	0.695076267	-0.52475681
YDR309C	GIC2	74.87628834	43.87182423	0.846346237	1152	flat	1.706705605	0.771214225	0.585924132	-0.771214225
YDR310C	SUM1	27.24263677	22.74926219	0.383123097	3189	flat	1.197517376	0.26004659	0.835060952	-0.26004659
YDR311W	TFB1	86.81815609	91.97636085	0.293721908	1929	flat	0.943918147	-0.083266335	1.059413894	0.083266335
YDR312W	SSF2	137.120787	102.5109702	0.812084964	1362	flat	1.33751493	0.419554996	0.747655205	-0.419554996
YDR313C	PIB1	124.2268065	157.5898732	0.78399304	861	flat	0.788291811	-0.343198308	1.26856576	0.343198308

YDR314C	RAD34	75.66054037	105.5620322	0.811258518	2079	flat	0.716740089	-0.480478044	1.395205898	0.480478044
YDR315C	IPK1	116.7040702	93.10884376	0.744823836	846	flat	1.253415524	0.325864767	0.797820021	-0.325864767
YDR316W	OMS1	92.84269265	99.57410221	0.371110628	1416	flat	0.932397989	-0.100982202	1.072503386	0.100982202
YDR316W-A	YDR316W-A	0.468091082	0.573593338	0.037936784	1323	flat	0.81606785	-0.293238989	1.225388306	0.293238989
YDR316W-B	YDR316W-B	44.50330647	58.36972046	0.676120052	5268	flat	0.762438232	-0.391307631	1.311581657	0.391307631
YDR317W	HIM1	44.55437551	80.45786847	0.866731912	1245	flat	0.553760326	-0.852666398	1.805835399	0.852666398
YDR318W	MCM21	319.9117125	299.0212023	0.466376686	1107	flat	1.069862973	0.097426029	0.934699139	-0.097426029
YDR319C	YFT2	217.58065	252.0348271	0.699144556	825	flat	0.863295968	-0.212072844	1.158351292	0.212072844
YDR320C	SWA2	21.81976143	24.50143814	0.262541685	2007	flat	0.890550233	-0.167231104	1.122901284	0.167231104
YDR320C-A	DAD4	1021.637642	754.7058279	0.870639408	219	flat	1.35368988	0.436897267	0.738721634	-0.436897267
YDR320W-B	YDR320W-B	9.61621897	30.79448062	0.856872553	138	flat	0.312270861	-1.679130143	3.202348107	1.679130143
YDR321W	ASP1	159.1056293	137.0722908	0.672089314	1146	flat	1.160742469	0.215047921	0.861517543	-0.215047921
YDR322C-A	TIM11	1892.511548	1379.515632	0.875677831	291	flat	1.371866693	0.456140299	0.728933799	-0.456140299
YDR322W	MRPL35	51.12623086	50.31598173	0.067826591	1104	flat	1.016103216	0.023046959	0.984151988	-0.023046959
YDR323C	PEP7	107.5575334	158.4398194	0.864259823	1548	flat	0.678854178	-0.558826386	1.473070406	0.558826386
YDR324C	UTP4	147.1071109	130.2211903	0.598564593	2331	flat	1.129671066	0.175902754	0.885213431	-0.175902754
YDR325W	YCG1	124.9898073	109.239301	0.600717703	3108	flat	1.144183513	0.194318462	0.873985675	-0.194318462
YDR326C	YSP2	64.8405362	52.52456781	0.627888937	4317	flat	1.234480147	0.303903635	0.81005758	-0.303903635
YDR327W	YDR327W	3.787672793	5.105506944	0.171480354	327	flat	0.741879863	-0.430742513	1.347927137	0.430742513
YDR328C	SKP1	881.8187862	712.1646644	0.822067566	585	flat	1.238223167	0.308271357	0.80760886	-0.308271357
YDR329C	PEX3	105.8828382	103.5855065	0.129788314	1326	flat	1.022178119	0.031646615	0.978303078	-0.031646615
YDR330W	UBX5	64.27703411	56.24580713	0.488429752	1503	flat	1.142788012	0.192557807	0.875052932	-0.192557807
YDR331W	GPI8	154.6779714	200.0306528	0.81645643	1236	flat	0.773271342	-0.370953348	1.293207113	0.370953348
YDR332W	IRC3	53.85082623	64.22848815	0.574068436	2070	flat	0.838425873	-0.254244858	1.192711285	0.254244858
YDR333C	RQC1	72.74678506	73.16119651	0.038168769	2172	flat	0.994335639	-0.008195178	1.008195178	0.008195178
YDR334W	SWR1	78.61983663	99.61237722	0.732746122	4545	flat	0.789257709	-0.341431648	1.267013282	0.341431648
YDR335W	MSN5	80.35652737	101.760047	0.735442946	3675	flat	0.789666768	-0.340684118	1.266356951	0.340684118
YDR336W	YDR336W	196.5046363	180.8425077	0.494896332	945	flat	1.086606455	0.119829523	0.920296392	-0.119829523
YDR337W	MRPS28	375.557467	359.2485029	0.314172829	861	flat	1.045397445	0.064051538	0.956573985	-0.064051538
YDR338C	YDR338C	40.16705717	53.4984573	0.670958388	2088	flat	0.750807765	-0.413484523	1.331898851	0.413484523
YDR339C	FCF1	328.8881852	250.5582496	0.844997825	570	flat	1.312621659	0.392451143	0.761834146	-0.392451143
YDR340W	YDR340W	61.89925241	55.59993566	0.416347687	303	flat	1.113297195	0.154838772	0.898232749	-0.154838772
YDR341C	YDR341C	159.9624285	121.3183873	0.815093519	1824	flat	1.318534082	0.398934863	0.758418014	-0.398934863
YDR342C	HXT7	219.1846739	125.7242262	0.908191968	1713	down	1.7433766	0.801884251	0.573599531	-0.801884251
YDR343C	HXT6	180.7602165	108.1813109	0.897266928	1713	flat	1.670900593	0.740625905	0.598479649	-0.740625905
YDR344C	YDR344C	4.184354741	3.760136871	0.081006235	444	flat	1.112819795	0.154219988	0.898618091	-0.154219988
YDR345C	HXT3	118.2185455	124.4287546	0.29077135	1704	flat	0.950090241	-0.073863546	1.052531598	0.073863546
YDR346C	SVF1	166.1092098	132.7749576	0.775641583	1446	flat	1.251058279	0.323148997	0.799323275	-0.323148997
YDR347W	MRP1	284.7316646	251.8548593	0.655458895	966	flat	1.130538697	0.177010375	0.884534074	-0.177010375
YDR348C	PAL1	36.44931639	27.31910352	0.584391765	1500	flat	1.334206167	0.415981615	0.749509352	-0.415981615
YDR349C	YPS7	62.88180351	87.5384141	0.789205452	1791	flat	0.718333821	-0.477273651	1.392110423	0.477273651
YDR350C	ATP22	113.56778	159.4537564	0.847411918	2055	flat	0.712230195	-0.489584495	1.404040445	0.489584495
YDR351W	SBE2	87.99192397	81.29641168	0.38354357	2595	flat	1.08235926	0.114179442	0.92390765	-0.114179442
YDR352W	YPQ2	106.5525445	139.2046097	0.799195302	954	flat	0.765438334	-0.38564194	1.306440971	0.38564194
YDR353W	TRR1	483.5395506	375.3214801	0.844388865	960	flat	1.288334338	0.365507039	0.776196031	-0.365507039
YDR354C-A	YDR354C-A	4.300586817	7.377844315	0.323053502	144	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YDR354W	TRP4	134.7549453	94.40985031	0.842127012	1143	flat	1.42733989	0.513328922	0.700603975	-0.513328922
YDR355C	YDR355C	1.459888028	1.5021700964	0.014122082	303	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YDR356W	SPC110	117.3972434	110.4434853	0.346730463	2835	flat	1.062962139	0.088090211	0.94076728	-0.088090211

YDR357C	CNL1	506.6001363	389.509049	0.84907206	369	flat	1.300611982	0.37919062	0.76886882	-0.37919062
YDR358W	GGA1	96.23801652	86.22218057	0.50416123	1674	flat	1.116163102	0.15854786	0.895926409	-0.15854786
YDR359C	EAF1	19.4398274	20.32901151	0.101703639	2949	flat	0.956260337	-0.064524656	1.045740329	0.064524656
YDR360W	OPI7	2.237152551	1.39561193	0.128062926	435	flat	1.602990419	0.680765802	0.623834047	-0.680765802
YDR361C	BCP1	278.8026303	216.9709708	0.826794258	852	flat	1.284976646	0.361742139	0.778224261	-0.361742139
YDR362C	TFC6	55.69310137	67.50469144	0.613107148	2019	flat	0.825025642	-0.277489136	1.21208354	0.277489136
YDR363W	ESC2	39.23361228	42.8417743	0.301333913	1371	flat	0.915779351	-0.126928059	1.091966093	0.126928059
YDR363W-A	SEM1	1882.755951	1537.402225	0.811707989	270	flat	1.224634595	0.292351344	0.816570105	-0.292351344
YDR364C	CDC40	93.90153472	124.1474855	0.794316369	1368	flat	0.756370814	-0.402834399	1.322102838	0.402834399
YDR365C	ESF1	215.757989	195.4466866	0.552994055	1887	flat	1.10392247	0.142638853	0.905860717	-0.142638853
YDR365W-A	YDR365W-A	0.802441855	0.803030674	0.002791069	1323	flat	0.999266755	-0.001058238	1.000733784	0.001058238
YDR365W-B	YDR365W-B	48.13074579	61.88458024	0.666811657	5268	flat	0.777750218	-0.3626212	1.285759845	0.3626212
YDR366C	YDR366C	17.07300631	33.47369966	0.774865884	399	flat	0.510042406	-0.971310894	1.96062129	0.971310894
YDR367W	KEI1	130.7112719	141.2899915	0.438270262	666	flat	0.925127608	-0.112275716	1.080931961	0.112275716
YDR368W	YPR1	139.6287284	120.5777495	0.646375236	939	flat	1.157997466	0.211632096	0.863559748	-0.211632096
YDR369C	XRS2	66.636461	89.64358205	0.769914456	2565	flat	0.743348932	-0.427888516	1.345263249	0.427888516
YDR370C	DXO1	135.7992458	124.5930187	0.463288386	1329	flat	1.089942656	0.124252234	0.91747946	-0.124252234
YDR371C-A	YDR371C-A	10.11076737	23.1272834	0.748412353	105	flat	0.437179205	-1.193703316	2.287391505	1.193703316
YDR371W	CTS2	170.545146	123.7106395	0.841945774	1536	flat	1.378581072	0.725383527	0.463184112	-0.463184112
YDR372C	VPS74	381.3210653	316.7050858	0.782042917	1038	flat	1.204025709	0.267866197	0.83054705	-0.267866197
YDR373W	FRQ1	801.1636199	793.2976056	0.081963172	573	flat	1.009915591	0.014234717	0.990181763	-0.014234717
YDR374C	PHO92	11.71904905	53.06280211	0.946955198	921	up	0.220852435	-2.178845357	4.527910234	2.178845357
YDR374W-A	WIP1	987.5785651	900.5185975	0.584493258	270	flat	1.09667759	0.133139453	0.911845021	-0.133139453
YDR375C	BCS1	131.380978	131.2928794	0.010606061	1371	flat	1.000671008	0.000967735	0.999329442	-0.000967735
YDR376W	ARH1	70.26198752	88.99498035	0.716470929	1482	flat	0.789505062	-0.340979578	1.266616324	0.340979578
YDR377W	ATP17	1188.84121	870.9576213	0.872901261	306	flat	1.364981694	0.448881603	0.732610557	-0.448881603
YDR378C	LSM6	1821.584517	1576.459975	0.738690735	261	flat	1.155490495	0.208505392	0.865433342	-0.208505392
YDR379C-A	SDH6	341.3437194	462.2746452	0.86630419	240	flat	0.738400263	-0.437525029	1.354279042	0.437525029
YDR379W	RGA2	55.88451373	56.30119611	0.038697985	3030	flat	0.992599049	-0.010717022	1.007456133	0.010717022
YDR380W	ARO10	209.3493205	173.8864439	0.753102798	1908	flat	1.203942733	0.26776677	0.830604291	-0.26776677
YDR381C-A	YDR381C-A	501.325549	467.6361843	0.485566188	345	flat	1.072041826	0.100361194	0.932799426	-0.100361194
YDR381W	YRA1	893.6559864	628.9322086	0.8853922	681	flat	1.420909876	0.506815051	0.703774403	-0.506815051
YDR382W	RPP2B	1242.28843	630.3356718	0.940582862	333	down	1.97083631	0.978807957	0.507398811	-0.978807957
YDR383C	NKP1	208.6491517	127.2182025	0.898412353	717	flat	1.64008882	0.713773947	0.609723076	-0.713773947
YDR384C	ATO3	73.40380481	54.623543	0.739785414	828	flat	1.34381259	0.426331952	0.744151385	-0.426331952
YDR385W	EFT2	131.3570188	92.41997149	0.839480934	2529	flat	1.421305554	0.507216741	0.703578479	-0.507216741
YDR386W	MUS81	52.08456126	48.0341295	0.31615195	1899	flat	1.084340214	0.116817476	0.922219786	-0.116817476
YDR387C	YDR387C	41.26441781	76.61432575	0.866681166	1668	flat	0.538599242	-0.892715894	1.856668041	0.892715894
YDR388W	RVS167	105.747881	98.56328661	0.378795128	1449	flat	1.07289321	0.101506486	0.932059212	-0.101506486
YDR389W	SAC7	58.16907133	53.44874084	0.341583297	1965	flat	1.088315092	0.122096311	0.918851541	-0.122096311
YDR390C	UBA2	86.61742563	73.94059357	0.60200087	1911	flat	1.171446176	0.228290669	0.853645707	-0.228290669
YDR391C	YDR391C	110.2384633	114.6438297	0.242975207	699	flat	0.961573454	-0.056531027	1.039962154	0.056531027
YDR392W	SPT3	118.6569347	122.5857209	0.210540815	1014	flat	0.967950702	-0.046994522	1.033110465	0.046994522
YDR393W	SHE9	138.4791644	125.0935529	0.532050167	1371	flat	1.107004807	0.146661487	0.903338444	-0.146661487
YDR394W	RPT3	194.5360351	198.0004093	0.14739017	1287	flat	0.982503197	-0.025465994	1.017808393	0.025465994
YDR395W	SXM1	106.1630574	108.1949994	0.123879948	2835	flat	0.981219631	-0.027351997	1.019139822	0.027351997
YDR396W	YDR396W	2.295608361	0.302939715	0.265267508	501	flat	7.577772888	2.921773902	0.131964895	-2.921773902
YDR397C	NCB2	293.693719	231.61699	0.819646223	441	flat	1.268014574	0.342571327	0.788634469	-0.342571327
YDR398W	UTP5	70.24419	62.13886268	0.483891547	1932	flat	1.130438939	0.176883067	0.884612132	-0.176883067

YDR399W	HPT1	498.2703058	553.5377248	0.624546904	666	flat	0.900156003	-0.151753043	1.110918548	0.151753043
YDR400W	URH1	64.94660812	64.9819015	0.006901551	1023	flat	0.999456874	-0.000783778	1.000543421	0.000783778
YDR401W	YDR401W	8.627317019	21.25895566	0.743866899	564	flat	0.405820359	-1.301086851	2.464144485	1.301086851
YDR402C	DIT2	6.800694722	8.982471679	0.243627664	1470	flat	0.757107282	-0.40143035	1.320816776	0.40143035
YDR403W	DIT1	13.94859124	41.16990219	0.889720168	1611	flat	0.338805547	-1.561470599	2.951545535	1.561470599
YDR404C	RPB7	110.2436142	135.0071976	0.732782369	516	flat	0.816575828	-0.292341232	1.224626012	0.292341232
YDR405W	MRP20	35.74513718	40.43441949	0.372850515	792	flat	0.884027461	-0.17783691	1.13118658	0.17783691
YDR406W	PDR15	20.12240958	37.16614906	0.765970712	4590	flat	0.541417663	-0.88518614	1.847002911	0.88518614
YDR406W-A	YDR406W-A	9.350404787	14.80710218	0.465354502	246	flat	0.631481074	-0.663188599	1.583578734	0.663188599
YDR407C	TRS120	43.5487994	45.25731476	0.154552704	3870	flat	0.962248857	-0.055518043	1.039232204	0.055518043
YDR408C	ADE8	173.2350666	210.3641563	0.762672176	645	flat	0.823500874	-0.280157914	1.214327794	0.280157914
YDR409W	SIZ1	71.98102943	90.84007207	0.717471364	2715	flat	0.792392914	-0.335712116	1.26200018	0.335712116
YDR410C	STE14	209.9915106	208.0552097	0.070204437	720	flat	1.009306669	0.013364591	0.990779147	-0.013364591
YDR411C	DFM1	66.73993377	78.54987334	0.594867334	1026	flat	0.84965902	-0.235044111	1.176942722	0.235044111
YDR412W	RRP17	131.0793871	94.10770908	0.830535015	708	flat	1.392865562	0.478056017	0.717944379	-0.478056017
YDR413C	YDR413C	0.614369545	0.790483319	0.052501087	576	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YDR414C	ERD1	38.34478352	64.94593532	0.828403654	1089	flat	0.590410829	-0.760208912	1.693735871	0.760208912
YDR415C	YDR415C	139.9779572	145.4320671	0.259359142	1125	flat	0.962497199	-0.055145753	1.038964063	0.055145753
YDR416W	SYF1	97.59045913	98.71114493	0.080440771	2580	flat	0.988646816	-0.01647287	1.011483559	0.01647287
YDR417C	YDR417C	1.902563753	2.039956953	0.042554734	372	flat	0.932648971	-0.100593911	1.072214768	0.100593911
YDR418W	RPL12B	623.7257273	312.9932989	0.942416993	498	down	1.992776617	0.994779998	0.501812392	-0.994779998
YDR419W	RAD30	41.32290326	56.58511875	0.70554589	1899	flat	0.730278635	-0.453481072	1.369340349	0.453481072
YDR420W	HKR1	14.21330143	13.72100164	0.063984341	5409	flat	1.035879289	0.050855896	0.965363446	-0.050855896
YDR421W	ARO80	62.23544113	78.51968064	0.693627664	2853	flat	0.792609453	-0.335317921	1.261655404	0.335317921
YDR422C	SIP1	28.04416277	33.41729484	0.423568218	2448	flat	0.839211041	-0.252894437	1.191595381	0.252894437
YDR423C	CAD1	107.4577289	129.315359	0.707351022	1230	flat	0.830974214	-0.267124385	1.203406776	0.267124385
YDR424C	DYN2	475.6409383	346.5206878	0.87137886	279	flat	1.372619168	0.456931407	0.728534194	-0.456931407
YDR425W	SNX41	31.4211747	24.08322343	0.523430477	1878	flat	1.304691409	0.383708614	0.76646477	-0.383708614
YDR426C	YDR426C	173.4277459	232.47738	0.844700594	378	flat	0.745998367	-0.422755622	1.340485508	0.422755622
YDR427W	RPN9	479.0211277	528.1231095	0.597353922	1182	flat	0.9070255	-0.140784983	1.102504835	0.140784983
YDR428C	BNA7	50.87542617	34.37093884	0.737190083	786	flat	1.480187271	0.565779715	0.67559019	-0.565779715
YDR429C	TIF35	719.7640823	569.3779488	0.835624184	825	flat	1.264123565	0.33813749	0.791061909	-0.33813749
YDR430C	CYM1	88.46921453	81.35430753	0.404936929	2970	flat	1.087455812	0.120956779	0.919577595	-0.120956779
YDR431W	YDR431W	2.268441398	2.918707641	0.107039292	312	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YDR432W	NPL3	72.97821953	94.59894838	0.746563723	1245	flat	0.771448529	-0.374358192	1.296262761	0.374358192
YDR433W	YDR433W	21.0640987	29.25326026	0.561555749	441	flat	0.720059867	-0.473811235	1.388773414	0.473811235
YDR434W	GPI17	102.139224	126.8082998	0.742170509	1605	flat	0.805461662	-0.312112172	1.241524019	0.312112172
YDR435C	PPM1	64.98498534	75.80951275	0.567783094	987	flat	0.857214128	-0.222272468	1.166569668	0.222272468
YDR436W	PP22	35.42086695	30.38302131	0.402580832	2133	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YDR437W	GPI19	52.28676981	60.99615969	0.523771205	423	flat	0.857214128	-0.222272468	1.166569668	0.222272468
YDR438W	THI74	45.22819682	51.13638724	0.420914891	1113	flat	0.884462107	-0.177127759	1.130630687	0.177127759
YDR439W	LR54	27.96440689	35.47180321	0.523162244	1044	flat	0.788355944	-0.34308094	1.268462562	0.34308094
YDR440W	DOT1	50.88623774	43.64878048	0.483949543	1749	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YDR441C	APT2	31.75817957	42.25176776	0.617812092	546	flat	0.75164144	-0.411883486	1.33042159	0.411883486
YDR442W	YDR442W	0.900450021	2.317141944	0.204509207	393	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YDR443C	SSN2	19.94344714	23.24833138	0.311265768	4263	flat	0.857844239	-0.221212377	1.165712788	0.221212377
YDR444W	YDR444W	68.45219748	61.47386559	0.44168479	2064	flat	1.11351705	0.155123649	0.8980554	-0.155123649
YDR445C	YDR445C	0.86734524	1.115976451	0.061476004	408	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YDR446W	ECM11	4.963619297	7.346538045	0.264499058	909	flat	0.67564059	-0.565672093	1.480076856	0.565672093

YDR447C	RPS17B	1102.744005	718.6128069	0.901239669	411	down	1.534545439	0.617811365	0.651658775	-0.617811365
YDR448W	ADA2	84.46945694	85.83013367	0.088052777	1305	flat	0.984146865	-0.023054469	1.016108506	0.023054469
YDR449C	UTP6	167.2422566	134.3355598	0.774532405	1323	flat	1.244958943	0.316098165	0.80323934	-0.316098165
YDR450W	RPS18A	2095.777515	1395.896748	0.898535595	441	flat	1.501384338	0.586293338	0.666051973	-0.586293338
YDR451C	YHP1	26.65739044	17.4352931	0.606053357	1062	flat	1.528932739	0.612524941	0.654051009	-0.612524941
YDR452W	PPN1	206.5155442	204.6122157	0.069856459	2025	flat	1.009302126	0.013358097	0.990783606	-0.013358097
YDR453C	TSA2	79.78695659	70.87866678	0.49354067	591	flat	1.125683654	0.17080145	0.888349046	-0.17080145
YDR454C	GUK1	367.2099844	216.8951678	0.910990286	564	down	1.693029808	0.759607374	0.590657055	-0.759607374
YDR455C	YDR455C	0.572616275	5.402915116	0.490452371	309	flat	0.105982838	-3.238097435	9.435489959	3.238097435
YDR456W	NHX1	36.51331935	53.14441799	0.736015659	1902	flat	0.68705841	-0.54149534	1.455480327	0.54149534
YDR457W	TOM1	40.59462276	44.72554138	0.32985356	9807	flat	0.907638488	-0.139810308	1.101760242	0.139810308
YDR458C	HEH2	136.7009249	129.4487865	0.326721763	1992	flat	1.056023224	0.078641563	0.946948871	-0.078641563
YDR459C	PFA5	115.8356916	134.774244	0.654791939	1125	flat	0.859479438	-0.218464969	1.163494966	0.218464969
YDR460W	TFB3	85.63014035	95.68285049	0.504704944	966	flat	0.89493718	-0.160141679	1.117396866	0.160141679
YDR461C-A	YDR461C-A	380.4540296	302.9210153	0.8215456	243	flat	1.255951256	0.328780474	0.796209244	-0.328780474
YDR461W	MFA1	427.9997135	155.8747648	0.970385675	111	down	2.7457922	1.457222448	0.36419362	-1.457222448
YDR462W	MRPL28	159.8025001	122.3753636	0.807278527	444	flat	1.305838817	0.384976833	0.765791296	-0.384976833
YDR463W	STP1	56.76774599	75.69181816	0.739016964	1560	flat	0.749985234	-0.415065902	1.333359584	0.415065902
YDR464C-A	YDR464C-A	4.068091082	4.015153369	0.402595331	189	flat	0.116581121	-3.100593911	8.577718145	3.100593911
YDR464W	SPP41	24.29412274	26.49330167	0.222038567	4308	flat	0.916991134	-0.12502031	1.090523084	0.12502031
YDR465C	RMT2	120.6722942	89.91221408	0.801167174	1239	flat	1.342112364	0.424505462	0.745094097	-0.424505462
YDR466W	PKH3	28.57125912	38.99834948	0.621422358	2697	flat	0.732627393	-0.44884845	1.364950327	0.44884845
YDR467C	YDR467C	12.98630672	8.354465908	0.4199942	327	flat	1.554414951	0.636371683	0.643328861	-0.636371683
YDR468C	TLG1	229.6267613	196.7425151	0.706756561	675	flat	1.167143569	0.222982037	0.856792623	-0.222982037
YDR469W	SDC1	480.3811327	352.4118362	0.868834276	528	flat	1.363124286	0.446917109	0.763608821	-0.446917109
YDR470C	UGO1	45.20196448	52.20018676	0.472053067	1509	flat	0.865934919	-0.207669495	1.154821198	0.207669495
YDR471W	RPL27B	543.9457545	270.6799524	0.946382485	411	down	2.009553163	1.006874744	0.497623063	-1.006874744
YDR472W	TRS31	61.26389269	71.96738277	0.571212121	852	flat	0.85127304	-0.232306155	1.174711231	0.232306155
YDR473C	PRP3	80.81443143	78.90032656	0.120711904	1410	flat	1.024259784	0.034581674	0.976314814	-0.034581674
YDR475C	JIP4	53.83474438	68.35832947	0.672741772	2631	flat	0.787537449	-0.344579568	1.269780887	0.344579568
YDR476C	YDR476C	26.2131006	33.27759112	0.506894302	675	flat	0.787710279	-0.344262992	1.269502285	0.344262992
YDR477W	SNF1	76.37563105	63.67754589	0.618022329	1902	flat	1.199412289	0.262327659	0.833741666	-0.262327659
YDR478W	SNM1	286.8951412	242.277179	0.743011454	597	flat	1.184160813	0.243865017	0.844479896	-0.243865017
YDR479C	PEX29	71.51925691	77.84622758	0.388132521	1665	flat	0.918724762	-0.122295381	1.088465274	0.122295381
YDR480W	DIG2	32.03823407	34.97644712	0.266695665	972	flat	0.915994525	-0.12658912	1.091709582	0.12658912
YDR481C	PHO8	127.3727845	142.0472036	0.556843555	1701	flat	0.896693361	-0.157313378	1.115208435	0.157313378
YDR482C	CWC21	125.7650599	75.14241437	0.882405394	408	flat	1.673689366	0.743031791	1.597482436	-0.743031791
YDR483W	KRE2	103.8464821	101.0676641	0.158017979	1329	flat	1.027494629	0.039130852	0.973241097	-0.039130852
YDR484W	VPS52	66.00740461	68.4002015	0.172227055	1926	flat	0.965017692	-0.051372702	1.036250431	0.051372702
YDR485C	VPS72	53.79283898	55.86611761	0.160555314	2388	flat	0.962888443	-0.054559433	1.038541908	0.054559433
YDR486C	VPS60	210.4028711	201.2639269	0.290778599	690	flat	1.04540776	0.064065774	0.956564546	-0.064065774
YDR487C	RIB3	277.2599785	193.1653784	0.876736262	627	flat	1.435350272	0.521402845	0.696694054	-0.521402845
YDR488C	PAC11	18.66578933	14.96885267	0.344744092	1602	flat	1.246975285	0.318432872	0.801940513	-0.318432872
YDR489W	SLD5	42.78511166	40.81573533	0.173437727	885	flat	1.048250419	0.067983407	0.953970523	-0.067983407
YDR490C	PKH1	47.94485463	61.87000604	0.672633029	2301	flat	0.774928882	-0.367864179	1.290440998	0.367864179
YDR491C	YDR491C	2.69723215	3.084812954	0.07830216	492	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YDR492W	IZH1	83.7248087	83.1478732	0.046273742	951	flat	1.006938668	0.009975813	0.993109145	-0.009975813
YDR493W	MZM1	256.6082862	198.6918073	0.828874873	372	flat	1.291489014	0.369035371	0.774300044	-0.369035371
YDR494W	RSM28	196.8154901	186.4317787	0.355524141	1086	flat	1.055697111	0.078195972	0.947241391	-0.078195972

YDR495C	VPS3	52.3646833	54.99014396	0.205016674	3036	flat	0.952255796	-0.070578931	1.050138003	0.070578931
YDR496C	PUF6	201.8049663	162.9382238	0.782332898	1971	flat	1.238536677	0.308636592	0.80740443	-0.308636592
YDR497C	ITR1	329.3272812	309.0803292	0.425598086	1755	flat	1.065507087	0.091540189	0.938520271	-0.091540189
YDR498C	SEC20	77.02658175	71.01175153	0.380179788	1152	flat	1.084701899	0.117298612	0.921912279	-0.117298612
YDR499W	LCD1	77.90337251	61.88596683	0.687683051	2244	flat	1.258821289	0.332073482	0.794393937	-0.332073482
YDR500C	RPL37B	823.3932513	645.176498	0.840510367	267	flat	1.276229456	0.351887738	0.783558156	-0.351887738
YDR501W	PLM2	18.64293793	15.11912924	0.332216906	1566	flat	1.233069553	0.302254179	0.810984261	-0.302254179
YDR502C	SAM2	113.4397461	129.039729	0.599282297	1155	flat	0.879107132	-0.185889105	1.137517788	0.185889105
YDR503C	LPP1	156.7781717	79.10582164	0.929193852	825	down	1.981879063	0.98686893	0.504571656	-0.98686893
YDR504C	SPG3	92.38582038	137.9393392	0.860497318	384	flat	0.669756872	-0.578290616	1.493079118	0.578290616
YDR505C	PSP1	87.20837061	138.2538427	0.876381035	2526	flat	0.630784425	-0.664781058	1.585327667	0.664781058
YDR506C	GMC1	37.86695444	47.10190262	0.567514862	1827	flat	0.803936833	-0.314845944	1.24387882	0.314845944
YDR507C	GIN4	82.68994825	51.47616311	0.840822097	3429	flat	1.606373577	0.683807444	0.6225202	-0.683807444
YDR508C	GNP1	200.0772146	240.3831203	0.753733507	1992	flat	0.832326389	-0.264778715	1.201451753	0.264778715
YDR509W	YDR509W	5.338659497	8.286445832	0.310693055	348	flat	0.644264092	-0.634275907	1.552158521	0.634275907
YDR510C-A	YDR510C-A	13.61064839	19.45805094	0.47585182	117	flat	0.699486728	-0.51563141	1.429619691	0.51563141
YDR510W	SMT3	180.9860402	154.252745	0.699876758	306	flat	1.173308392	0.23058226	0.852290844	-0.23058226
YDR511W	SDH7	159.5526879	132.1404952	0.731760186	402	flat	1.207447328	0.271960257	0.828193476	-0.271960257
YDR512C	EM11	189.6441141	153.3874016	0.777714949	564	flat	1.236373471	0.306114604	0.808817096	-0.306114604
YDR513W	GRX2	450.1280869	430.7255776	0.318848775	432	flat	1.045046104	0.063566591	0.956895582	-0.063566591
YDR514C	YDR514C	120.0305459	93.3423609	0.76892852	1452	flat	1.285917184	0.362797733	0.777655056	-0.362797733
YDR515W	SLF1	167.0646328	217.495839	0.825772075	1344	flat	0.768127949	-0.38058145	1.301866442	0.38058145
YDR516C	EMI2	120.3722846	118.045509	0.130353777	1503	flat	1.019710835	0.028160097	0.980670172	-0.028160097
YDR517W	GRH1	45.69723503	42.85987843	0.234275772	1119	flat	1.066200762	0.092479118	0.937909666	-0.092479118
YDR518W	EUG1	84.37025478	67.87779546	0.686167899	1554	flat	1.242972819	0.313794748	0.804522822	-0.313794748
YDR519W	FPR2	543.1749568	332.5609824	0.909504132	408	down	1.633309334	0.707798051	0.612253894	-0.707798051
YDR520C	URC2	54.02001198	70.48697832	0.70691605	2319	flat	0.766382859	-0.383862801	1.304830853	0.383862801
YDR521W	YDR521W	1.316506169	0.903409508	0.082492388	336	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YDR522C	SPS2	1.407065042	2.01156789	0.102421343	1509	flat	0.699486728	-0.51563141	1.429619691	0.51563141
YDR523C	SPS1	2.942967761	7.521666127	0.458431202	1473	flat	0.391265407	-1.353780531	2.555809896	1.353780531
YDR524C	AGE1	42.61664026	64.10279639	0.784884732	1449	flat	0.664817179	-0.588970433	1.504172924	0.588970433
YDR524C-A	YDR524C-A	4.423460726	21.50114629	0.832448891	120	flat	0.205731391	-2.281166157	4.860706949	2.281166157
YDR524C-B	YDR524C-B	1588.484553	1250.426629	0.842098014	201	flat	1.270354067	0.345230654	0.787182114	-0.345230654
YDR524W-C	YDR524W-C	7.86393018	6.745457659	0.149296796	90	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YDR525W	API2	2.680885289	1.839670271	0.127417718	330	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YDR525W-A	SNA2	265.7762653	232.7182892	0.669247499	240	flat	1.142051474	0.191627677	0.91627677	-0.191627677
YDR526C	YDR526C	1.126996363	0.644470477	0.090075395	471	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YDR527W	RBA50	81.90104557	77.84104833	0.251399159	1320	flat	1.052157535	0.07335073	0.950428017	-0.07335073
YDR528W	HLR1	54.38909258	48.68184066	0.403610265	1272	flat	1.117235746	0.159933639	0.895066241	-0.159933639
YDR529C	QCR7	907.5006146	528.8333407	0.914890532	384	down	1.716042739	0.779085485	0.582736069	-0.779085485
YDR530C	APA2	56.26569676	53.53948372	0.208967667	978	flat	1.050919674	0.071652402	0.951547511	-0.071652402
YDR531W	CAB1	191.3627575	187.5163909	0.151457155	1104	flat	1.020512162	0.029293376	0.97990013	-0.029293376
YDR532C	KRE28	137.2113206	161.9958355	0.700804698	1158	flat	0.847005234	-0.239557209	1.180630248	0.239557209
YDR533C	HSP31	1800.237	2916.205892	0.910200087	714	up	0.617321639	-0.695905733	1.619901097	0.695905733
YDR534C	FIT1	1.839624499	2.103970726	0.061657242	1587	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YDR535C	YDR535C	9.535603961	14.23816662	0.421096129	501	flat	0.669721335	-0.578367166	1.493158344	0.578367166
YDR536W	STL1	3.207655731	3.017704742	0.046665217	1710	flat	1.062945518	0.088067653	0.94078199	-0.088067653
YDR537C	YDR537C	5.401585705	7.012604497	0.196338988	606	flat	0.770268123	-0.376567373	1.298249233	0.376567373
YDR538W	PAD1	28.15481176	37.47476477	0.588052777	729	flat	0.75130056	-0.412537918	1.331025229	0.412537918

YDR539W	FDC1	75.71373254	72.27276064	0.23400754	1512	flat	1.04761091	0.067102989	0.954552869	-0.067102989
YDR540C	IRC4	120.252599	130.1311207	0.430897492	540	flat	0.924087938	-0.113897947	1.082148093	0.113897947
YDR541C	YDR541C	29.14782817	30.64784024	0.145983761	1035	flat	0.951056516	-0.072397019	1.051462224	0.072397019
YDR542W	PAU10	2.680885289	1.254320639	0.205002175	363	flat	2.137320558	1.095803302	0.467875535	-1.095803302
YDR543C	YDR543C	0.147448691	1.517727973	0.201580397	300	flat	0.097150934	-3.363628317	10.29326177	3.363628317
YDR544C	YDR544C	1.031109726	0.353782744	0.119059011	429	flat	2.914528034	1.543262279	0.343108726	-1.543262279
YDR545C-A	YDR545C-A	NA	NA	NA	480	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YDR545W	YRF1-1	28.30817938	19.08773077	0.602588082	5391	flat	1.4830563	0.568573367	0.674283235	-0.568573367
YEL001C	IRC22	203.5574848	141.6993816	0.867580107	678	flat	1.436544623	0.522602808	0.696114819	-0.522602808
YEL002C	WBP1	146.9013175	126.8881624	0.651986371	1293	flat	1.157722792	0.211289852	0.863764631	-0.211289852
YEL003W	GIM4	1603.767815	1052.020372	0.900442221	336	down	1.524464599	0.608302649	0.655968004	-0.608302649
YEL004W	YEA4	40.32270322	48.67349186	0.533268088	1029	flat	0.828432514	-0.271543918	1.207098929	0.271543918
YEL005C	VAB2	51.68519482	55.77516227	0.310787299	849	flat	0.926670452	-0.109871725	1.079132283	0.109871725
YEL006W	YEA6	123.2249774	144.394953	0.675982311	1008	flat	0.853388396	-0.228725601	1.171799388	0.228725601
YEL007W	MIT1	100.5834398	83.73671577	0.66645643	2001	flat	1.201186826	0.264460557	0.832509963	-0.264460557
YEL008C-A	YEL008C-A	29.48973818	58.75076026	0.867493113	93	flat	0.501946495	-0.994394507	1.992244214	0.994394507
YEL008W	YEL008W	39.24225001	99.98680349	0.947136436	381	up	0.392474293	-1.349329934	2.547937579	1.349329934
YEL009C	GCN4	665.1922856	430.7405277	0.902261853	846	down	1.544299277	0.626952367	0.647542879	-0.626952367
YEL009C-A	YEL009C-A	8.456616094	13.39171741	0.438393504	408	flat	0.631481074	-0.663188599	0.663188599	0.663188599
YEL010W	YEL010W	6.049177062	9.512824904	0.347680151	351	flat	0.635897026	-0.653134934	1.57258166	0.653134934
YEL011W	GLC3	180.7867353	139.8606062	0.810134841	2115	flat	1.292620848	0.370299165	0.773622058	-0.370299165
YEL012W	UBC8	175.9958347	163.5542474	0.453407279	657	flat	1.076070096	0.105772059	0.92930749	-0.105772059
YEL013W	VAC8	129.7752208	112.4534198	0.634761491	1737	flat	1.154035343	0.206687408	0.866524588	-0.206687408
YEL014C	YEL014C	2.312920641	3.96791627	0.206959548	306	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YEL015W	EDC3	96.53615377	94.85799834	0.1138466	1656	flat	1.017691238	0.025299922	0.982616301	-0.025299922
YEL016C	NPP2	51.09962728	57.65727726	0.436595621	1482	flat	0.886265008	-0.174189942	1.128330681	0.174189942
YEL017C-A	PMP2	618.6142804	1056.660612	0.914513557	132	up	0.585442737	-0.77240003	1.708108987	0.77240003
YEL017W	GTT3	42.4024046	49.69286856	0.489299696	1014	flat	0.853289533	-0.228892744	1.171935154	0.228892744
YEL018C-A	YEL018C-A	1.325381491	0.852656165	0.088806728	534	flat	1.554414951	0.636371683	0.643328861	-0.636371683
YEL018W	EAF5	142.8145892	106.6023219	0.815731477	840	flat	1.33969492	0.421904503	0.7464386	-0.421904503
YEL019C	MMS21	28.38937481	28.3158204	0.009301145	804	flat	1.002597644	0.003742749	0.997409087	-0.003742749
YEL020C	YEL020C	50.09575843	63.84737998	0.664499058	1683	flat	0.784617293	-0.349938962	1.274506704	0.349938962
YEL020C-B	YEL020C-B	7.149027437	29.12811262	0.87200232	198	flat	0.24543394	-2.02659333	4.074416119	2.02659333
YEL020W-A	TIM9	1191.653511	895.6894631	0.863165144	264	flat	1.330431539	0.411894274	0.751635819	-0.411894274
YEL021W	URA3	1.760581384	1.698949224	0.02061041	804	flat	1.036276634	0.051409182	0.964993291	-0.051409182
YEL022W	GEA2	56.17189169	72.07475307	0.694425112	4380	flat	0.779356006	-0.3596456	1.283110661	0.3596456
YEL023C	YEL023C	31.73493054	30.44344544	0.129802813	2049	flat	1.042422436	0.05994004	0.959303988	-0.05994004
YEL024W	RIP1	271.4148125	337.272883	0.807749746	648	flat	0.804733574	-0.313416871	1.242647297	0.313416871
YEL025C	YEL025C	81.05337625	101.3095123	0.720530666	3567	flat	0.800056919	-0.321825453	1.249911071	0.321825453
YEL026W	SNU13	215.7162737	192.4048848	0.601674641	381	flat	1.121157989	0.164989591	0.891934955	-0.164989591
YEL027W	VMA3	467.2566589	324.9131935	0.8846165	483	flat	1.438096908	0.524160897	0.695363431	-0.524160897
YEL028W	YEL028W	32.36211527	34.16530503	0.169501232	462	flat	0.947221611	-0.078226098	1.055719156	0.078226098
YEL029C	BUD16	223.2929057	309.8492572	0.867217631	939	flat	0.720650124	-0.472629094	1.387635923	0.472629094
YEL030C-A	YEL030C-A	8.706494128	8.190912872	0.078729883	315	flat	1.062945518	0.088067653	0.94078199	-0.088067653
YEL030W	ECM10	30.22126656	36.6294038	0.472604031	1935	flat	0.825054831	-0.277438095	1.212040658	0.277438095
YEL031W	SPF1	62.8112022	81.04534244	0.721299116	3648	flat	0.775013101	-0.367707396	1.290300768	0.367707396
YEL032C-A	YEL032C-A	1.092212525	0.936869119	0.047629404	162	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YEL032W	MCM3	48.57311813	38.30753733	0.599311295	2916	flat	1.267978093	0.34252982	0.788657159	-0.34252982
YEL033W	MTC7	322.0700691	418.8206479	0.846230245	420	flat	0.768992815	-0.378957976	1.300402267	0.378957976

YEL034C-A	YEL034C-A	2.640872075	7.802581621	0.496085254	603	flat	0.33846132	-1.562937125	2.954547361	1.562937125
YEL034W	HYP2	913.9952395	757.5832036	0.795621285	474	flat	1.206461858	0.270782306	0.828869967	-0.270782306
YEL035C	UTR5	2.825364137	6.967613451	0.430172539	501	flat	0.405499553	-1.302227772	2.466093967	1.302227772
YEL036C	ANP1	54.85915365	47.05663577	0.500913441	1503	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YEL037C	RAD23	133.0364128	113.3541193	0.667369871	1197	flat	1.17363545	0.230984354	0.852053336	-0.230984354
YEL038W	UTR4	200.6078242	154.657368	0.820704654	684	flat	1.297111329	0.375302309	0.770943849	-0.375302309
YEL039C	CYC7	322.0589827	355.4678674	0.583485573	342	flat	0.906014333	-0.142394222	1.103735299	0.142394222
YEL040W	UTR2	242.6602173	130.1527407	0.921103378	1404	down	1.864426488	0.898731915	0.536357967	-0.898731915
YEL041W	YEF1	51.19085599	88.12614039	0.862904161	1488	flat	0.580881629	-0.783683891	1.721521133	0.783683891
YEL042W	GDA1	111.9928207	65.8949332	0.878628389	1557	flat	1.699566496	0.765166808	0.588385334	-0.765166808
YEL043W	YEL043W	27.39433358	39.59520209	0.669059011	2871	flat	0.691859926	-0.531448116	1.445379278	0.531448116
YEL044W	IES6	326.3295578	422.6009028	0.842489488	501	flat	0.772193234	-0.372966182	1.295012642	0.372966182
YEL045C	YEL045C	15.57556594	10.33195099	0.451051182	426	flat	1.5075145	0.592171879	0.663343537	-0.592171879
YEL046C	GLY1	93.40950572	121.0009931	0.776410033	1164	flat	0.77197305	-0.373377611	1.295382008	0.373377611
YEL047C	FRD1	162.53792	153.3839735	0.345983761	1413	flat	1.059679941	0.083628588	0.943681164	-0.083628588
YEL048C	TCA17	332.4823422	219.8886933	0.893482674	459	flat	1.512048379	0.5965043	0.6613545	-0.5965043
YEL049W	PAU2	3.655752666	6.689710075	0.322067566	363	flat	0.546474006	-0.871775221	1.829913204	0.871775221
YEL050C	RML2	240.4087285	214.8188578	0.608561693	1182	flat	1.119123018	0.162368631	0.893556815	-0.162368631
YEL050W-A	YEL050W-A	7.833211703	7.114349875	0.107641003	192	flat	1.101043924	0.138872023	0.908272023	-0.138872023
YEL051W	VMA8	621.3499308	436.4206118	0.884217776	771	flat	1.423741029	0.509686751	0.702374926	-0.509686751
YEL052W	AFG1	56.49308666	65.47061846	0.524662897	1530	flat	0.862876936	-0.212773279	1.158913813	0.212773279
YEL053C	MAK10	23.22216439	27.43214048	0.365818472	2202	flat	0.846531258	-0.240364754	1.181291288	0.240364754
YEL053W-A	YEL053W-A	9.406209591	11.77547566	0.254240974	348	flat	0.798796572	-0.324099953	1.251883189	0.324099953
YEL054C	RPL12A	562.4368136	316.6504748	0.918174569	498	down	1.776207075	0.828799785	0.96299742	-0.828799785
YEL055C	POL5	55.63557642	53.45923556	0.177881688	3069	flat	1.040710288	0.057568508	0.560882209	-0.057568508
YEL056W	HAT2	129.9895922	144.34776	0.540452371	1206	flat	0.900530719	-0.151152604	1.110456288	0.151152604
YEL057C	YEL057C	7.183397761	18.37704811	0.715216761	702	flat	0.390889642	-1.355166738	2.558266815	1.355166738
YEL058W	PCM1	177.9954089	191.2119651	0.437907786	1674	flat	0.930880078	-0.103332773	1.074252231	0.103332773
YEL059C-A	SOM1	66.05701351	29.00546794	0.912324199	225	down	2.27739865	1.187386852	0.439097476	-1.187386852
YEL059W	HHY1	14.60171502	62.37911088	0.955292156	309	up	0.234080204	-2.094925161	4.272040017	2.094925161
YEL060C	PRB1	160.477962	207.5341867	0.81860954	1908	flat	0.77326037	-0.370973819	1.293225463	0.370973819
YEL061C	CIN8	91.73930537	68.0273677	0.774090184	3003	flat	1.34856468	0.431424718	0.741529134	-0.431424718
YEL062W	NPR2	44.76120973	45.08834726	0.033826301	1848	flat	0.992744522	-0.010505601	1.007308505	0.010505601
YEL063C	CAN1	38.07220005	49.64930765	0.635566188	1773	flat	0.766822376	-0.383035659	1.304082968	0.383035659
YEL064C	AVT2	57.38543645	72.15255646	0.673263738	1443	flat	0.795334764	-0.330365863	1.25733219	0.330365863
YEL065W	SIT1	259.2659016	142.6036935	0.916028708	1887	down	1.818086862	0.862421128	0.550028726	-0.862421128
YEL066W	HPA3	193.4854488	161.0478016	0.739314195	540	flat	1.201416268	0.264736104	0.832350973	-0.264736104
YEL067C	YEL067C	11.58525428	7.485393066	0.388038278	588	flat	1.547714887	0.630139729	0.646113834	-0.630139729
YEL068C	YEL068C	61.90188284	35.55038496	0.830484269	333	flat	1.741243672	0.800118109	0.574302159	-0.800118109
YEL069C	HXT13	1.82679794	2.775785674	0.138408003	1695	flat	0.658119233	-0.60357911	1.5194815	0.60357911
YEL070W	DSF1	2.638246954	3.419665414	0.120356677	1509	flat	0.771492715	-0.374275561	1.29618852	0.374275561
YEL071W	DLD3	695.352599	1021.794326	0.893569668	1491	flat	0.6805211	-0.5552882	1.469462151	0.5552882
YEL072W	RMD6	126.6024967	166.8192385	0.817913586	696	flat	0.758920241	-0.397979822	1.317661522	0.397979822
YEL073C	YEL073C	50.24177615	121.324551	0.951420908	324	up	0.414110547	-1.271912148	2.41481413	1.271912148
YEL074W	YEL074W	3.131653612	3.581658934	0.08415978	339	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YEL075C	YEL075C	34.76432549	30.43682115	0.359322894	369	flat	1.142179905	0.191789908	0.875518818	-0.191789908
YEL075W-A	YEL075W-A	3.035708342	2.727942436	0.067558359	612	flat	1.112819795	0.154219988	0.898618091	-0.154219988
YEL076C	YEL076C	2.174358575	1.165689688	0.147520661	651	flat	1.865297942	0.899406089	0.536107384	-0.899406089
YEL076C-A	YEL076C-A	0.543589644	0.699413813	0.047636654	651	flat	0.777207476	-0.363628317	1.286657722	0.363628317

YEL077C	YEL077C	10.86828379	7.758859749	0.316238944	3834	flat	1.400757861	0.486207589	0.71389926	-0.486207589
YEL077W-A	YEL077W-A	NA	NA	NA	483	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YER001W	MNN1	144.086165	103.5025499	0.83753081	2289	flat	1.392102564	0.477265506	0.718337877	-0.477265506
YER002W	NOP16	404.0856796	296.1314063	0.86677541	696	flat	1.364548545	0.448423721	0.73284311	-0.448423721
YER003C	PMI40	98.07052463	57.179519	0.870835146	1290	flat	1.715133781	0.778321112	0.583044898	-0.778321112
YER004W	FMP52	184.5650855	141.5237722	0.816652168	696	flat	1.304127798	0.383085254	0.766796016	-0.383085254
YER005W	YND1	94.73169458	111.2038404	0.64430187	1893	flat	0.851874308	-0.231287515	1.173882098	0.231287515
YER006C-A	YER006C-A	6.120511697	8.113640109	0.22877338	318	flat	0.754348432	-0.406697039	1.32564735	0.406697039
YER006W	NUG1	182.5420453	157.3076978	0.67568508	1563	flat	1.160413939	0.214639531	0.861761451	-0.214639531
YER007C-A	TMA20	330.7063495	186.5193169	0.915550239	546	down	1.77304075	0.826225695	0.564002829	-0.826225695
YER007W	PAC2	83.58266832	104.3986294	0.724423662	1557	flat	0.800610782	-0.32082705	1.249046381	0.32082705
YER008C	SEC3	31.58511972	44.6501872	0.680709004	4011	flat	0.707390533	-0.499421183	1.413646286	0.499421183
YER009W	NTF2	700.2642589	507.1138705	0.876083805	378	flat	1.380881691	0.46558972	0.724175001	-0.46558972
YER010C	YER010C	109.1747754	100.9665843	0.409569378	705	flat	1.081296115	0.112761662	0.924816048	-0.112761662
YER011W	TIR1	5.435363507	4.563103711	0.127772945	765	flat	1.191154936	0.252361079	0.83952135	-0.252361079
YER012W	PRE1	484.7283094	308.1216589	0.903095549	597	down	1.573171815	0.653676244	0.635658477	-0.653676244
YER013W	PRP22	44.10594348	52.66577872	0.535566188	3438	flat	0.837468743	-0.25589275	1.194074416	0.25589275
YER014C-A	BUD25	3.063868901	0.985537645	0.270102943	462	flat	3.108829903	1.636371683	0.32166443	-1.636371683
YER014W	HEM14	62.47455643	54.71315657	0.481941424	1620	flat	1.141856189	0.191380962	0.191380962	-0.191380962
YER015W	FAA2	18.80218206	25.8726782	0.521480354	2235	flat	0.726719589	-0.460529301	1.376046574	0.460529301
YER016W	BIM1	114.7962851	85.05142266	0.800057996	1035	flat	1.349727983	0.432668683	0.740890026	-0.432668683
YER017C	AFG3	58.0506657	80.53385965	0.773756706	2286	flat	0.720823092	-0.472282866	1.387302948	0.472282866
YER018C	SPC25	26.83300501	32.58785288	0.445744527	666	flat	0.823405123	-0.28032567	1.214469005	0.28032567
YER019C-A	SBH2	792.5781316	742.3793008	0.451899377	267	flat	1.067618845	0.094396676	0.936663871	-0.094396676
YER019W	ISC1	50.83586665	47.30993055	0.282535885	1434	flat	1.074528456	0.10370369	0.930640779	-0.10370369
YER020W	GPA2	35.51875131	48.79214374	0.677664202	1350	flat	0.727960458	-0.458068007	1.373700987	0.458068007
YER021W	RPN3	397.8300747	370.8392586	0.477722198	1572	flat	1.07278306	0.101358362	0.932154913	-0.101358362
YER022W	SRB4	123.3596896	98.53466494	0.746839205	2064	flat	1.251942042	0.324167775	0.798759021	-0.324167775
YER023C-A	YER023C-A	2.49209055	1.425096689	0.151428157	213	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YER023W	PRO3	293.6643613	167.4612746	0.913172394	861	down	1.753625499	0.810340682	0.570247182	-0.810340682
YER024W	YAT2	52.46875494	59.296651498	0.449971002	2772	flat	0.884853941	-0.17648876	1.130130018	0.17648876
YER025W	GCD11	203.1329124	165.5703244	0.769305495	1584	flat	1.226867877	0.294979892	0.815083693	-0.294979892
YER026C	CHO1	431.8064189	498.6037746	0.726598521	831	flat	0.866031187	-0.207509115	1.154692827	0.207509115
YER027C	GAL83	47.197691	49.74371587	0.209786864	1254	flat	0.948817156	-0.075797999	1.053943844	0.075797999
YER028C	MIG3	9.85479858	15.75363213	0.487828041	1185	flat	0.625557237	-0.676786202	1.598574745	0.676786202
YER029C	SMB1	155.9812547	129.1738021	0.729817312	591	flat	1.207530104	0.272059156	0.828136704	-0.272059156
YER030W	CHZ1	988.2892125	593.2936623	0.912744672	462	down	1.665767351	0.736186921	0.600323928	-0.736186921
YER031C	YPT31	213.8006018	149.7401259	0.866905901	672	flat	1.427811019	0.513805041	0.700372799	-0.513805041
YER032W	FIR1	19.67103402	18.22888786	0.165282007	2631	flat	1.079113228	0.10984625	0.926686815	-0.10984625
YER033C	ZRG8	14.95022938	23.72183926	0.596549224	3231	flat	0.630230616	-0.666048253	1.586720756	0.666048253
YER034W	YER034W	50.41793946	64.19064547	0.664825286	558	flat	0.785440606	-0.34842591	1.273170743	0.34842591
YER035W	EDC2	138.1574035	191.2753062	0.850674206	438	flat	0.722296078	-0.469337758	1.384473806	0.469337758
YER036C	ARB1	162.0728982	220.7453779	0.851094679	1833	flat	0.734207437	-0.445740366	1.362012899	0.445740366
YER037W	PHM8	226.4848525	466.1593061	0.948267363	966	up	0.485852904	-1.041408503	2.058236129	1.041408503
YER038C	KRE29	49.40323879	58.64196256	0.549043062	1395	flat	0.842455413	-0.247327761	1.187006439	0.247327761
YER038W-A	YER038W-A	9.055903849	8.763783573	0.046592721	381	flat	1.033332667	0.047304784	0.96774256	-0.047304784
YER039C	HVG1	147.4486909	250.9310249	0.907206032	750	up	0.587606458	-0.767077842	1.70181928	0.767077842
YER039C-A	YER039C-A	174.514615	307.7037535	0.91445556	219	up	0.567151401	-0.818194181	1.763197619	0.818194181
YER040W	GLN3	44.65819447	60.14161463	0.705270407	2193	flat	0.742550641	-0.429438676	1.346709497	0.429438676

YER041W	YEN1	34.61164007	47.59541671	0.673169494	2280	flat	0.727205316	-0.459565348	1.37512746	0.459565348
YER042W	MXR1	198.4579677	333.3532251	0.90969987	555	up	0.595338376	-0.7482182	1.679717015	0.7482182
YER043C	SAH1	206.3626345	134.459456	0.885609685	1350	flat	1.534757321	0.618010552	0.651568809	-0.618010552
YER044C	ERG28	338.8351125	319.1642718	0.424423662	447	flat	1.061632339	0.086284224	0.941945684	-0.086284224
YER044C-A	MEI4	14.20410372	35.87132129	0.852450341	1227	flat	0.395973809	-1.336523087	2.525419555	1.336523087
YER045C	ACA1	11.01351446	14.86753933	0.361664492	1470	flat	0.740775875	-0.432890979	1.34993597	0.432890979
YER046W	SPO73	198.0317834	134.2065013	0.874445411	432	flat	1.475575188	0.561277435	0.677701827	-0.561277435
YER046W-A	YER046W-A	3.217062346	3.679340541	0.085145716	330	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YER047C	SAP1	103.2797623	67.09777343	0.848347107	2694	flat	1.539242765	0.622220788	0.649670099	-0.622220788
YER048C	CAJ1	203.4942392	160.4197169	0.801921125	1176	flat	1.268511397	0.343136481	0.788325594	-0.343136481
YER048W-A	ISD11	845.5794399	1122.586164	0.8630709	285	flat	0.75324235	-0.40881398	1.327593968	0.40881398
YER049W	TPA1	172.3663766	159.224175	0.458141221	1935	flat	1.082538984	0.11441898	0.923754262	-0.11441898
YER050C	RSM18	295.5338509	248.5870997	0.754291721	417	flat	1.188854334	0.249571958	0.841145943	-0.249571958
YER051W	JHD1	132.9729979	186.2526215	0.855661882	1479	flat	0.713938933	-0.486127416	1.400680021	0.486127416
YER052C	HOM3	92.8815049	61.41815852	0.833811802	1584	flat	1.512280849	0.59672609	0.661252836	-0.59672609
YER053C	PIC2	102.4792895	102.8626268	0.036631869	903	flat	0.996273308	-0.005386523	1.003740632	0.005386523
YER053C-A	YER053C-A	644.1179654	2762.53118	0.990814847	114	up	0.233162243	-2.100593911	4.288859072	2.100593911
YER054C	GIP2	24.87021635	22.02410356	0.274728143	1647	flat	1.12922718	0.175335759	0.885561398	-0.175335759
YER055C	HIS1	594.0499942	432.0601445	0.873205742	894	flat	1.374924306	0.459352195	0.727312766	-0.459352195
YER056C	FCY2	225.6461988	224.4380505	0.062556184	1602	flat	1.005382993	0.007745189	0.994645829	-0.007745189
YER056C-A	RPL34A	651.1914315	374.0411563	0.916891402	366	down	1.740961979	0.799884696	0.574395083	-0.799884696
YER057C	HMF1	197.5812458	94.56612757	0.947665652	390	down	2.089344788	1.063050589	0.478618946	-1.063050589
YER058W	PET117	188.6797137	111.9558598	0.899623025	324	flat	1.685304495	0.753009276	0.593364584	-0.753009276
YER059W	PCL6	111.2344518	103.4650661	0.388335508	1263	flat	1.075091874	0.104459953	0.930153063	-0.104459953
YER060W	FCY21	44.98718092	91.14018643	0.911715239	1587	up	0.493604223	-1.018573357	2.025914595	1.018573357
YER060W-A	FCY22	23.04753549	24.96200433	0.201051182	1593	flat	0.923304683	-0.115121292	1.083066098	0.115121292
YER061C	CEM1	54.11999354	86.56416883	0.844860084	1329	flat	0.625200869	-0.677608312	1.599485942	0.677608312
YER062C	GPP2	217.3546439	206.3948798	0.329860809	753	flat	1.05310095	0.074643739	0.949576582	-0.074643739
YER063W	THO1	280.0851845	240.9422034	0.717297376	657	flat	1.162457969	0.217178554	0.860246156	-0.217178554
YER064C	VHR2	133.4614633	180.067726	0.835348702	1518	flat	0.741173703	-0.432116399	1.349211387	0.432116399
YER065C	ICL1	45.34443612	37.44454319	0.523256488	1674	flat	1.210975813	0.27617005	0.825780325	-0.27617005
YER066C-A	YER066C-A	13.59706491	39.98804241	0.885950413	501	flat	0.340028271	-1.556273395	2.940931935	1.556273395
YER066W	RRT13	99.40895611	78.33434701	0.733347832	558	flat	1.269034081	0.343730815	0.788000901	-0.343730815
YER067C-A	YER067C-A	15.56402848	41.22224125	0.8784689	324	flat	0.377563859	-1.405207421	2.648558585	1.405207421
YER067W	RG11	380.636065	417.8436272	0.566086704	486	flat	0.910953381	-0.13455087	1.097751016	0.13455087
YER068C-A	YER068C-A	1.638318788	2.810607358	0.160983036	432	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YER068W	MOT2	50.90490518	50.67697145	0.027047992	1764	flat	1.004497777	0.006474372	0.995522362	-0.006474372
YER069W	ARG5,6	113.931419	166.8798119	0.864999275	2592	flat	0.682715409	-0.550643781	1.464739168	0.550643781
YER070W	RNR1	136.7010248	36.76236486	0.972031318	2667	down	3.718504653	1.894722577	0.268925306	-1.894722577
YER071C	TDA2	495.2882798	435.7990559	0.679868059	381	flat	1.136506087	0.184605411	0.8798897	-0.184605411
YER072W	VTC1	333.2340414	280.5850946	0.759257648	390	flat	1.187639856	0.248097415	0.842006097	-0.248097415
YER073W	ALD5	169.5801451	94.87013628	0.904936929	1563	down	1.787497644	0.83794134	0.559441297	-0.83794134
YER074W	RPS24A	656.1466744	324.3771551	0.947745397	408	down	2.022789411	1.016346131	0.494366836	-1.016346131
YER074W-A	YOS1	1024.254046	933.5791836	0.584833986	258	flat	1.097126054	0.133729293	0.911472293	-0.133729293
YER075C	PTP3	24.34728652	28.64459684	0.369204002	2787	flat	0.849978328	-0.234502038	1.176500585	0.234502038
YER076C	YER076C	75.2328964	88.15845654	0.605342903	909	flat	0.85338264	-0.228735332	1.171807291	0.228735332
YER076W-A	YER076W-A	19.32086294	30.96513969	0.670965637	348	flat	0.623955297	-0.680485422	1.602678916	0.680485422
YER077C	YER077C	34.411828	53.23429031	0.76754386	2067	flat	0.646422218	-0.62945131	1.546976531	0.62945131
YER078C	ICP55	39.10846137	35.47293896	0.30677106	1536	flat	1.102487206	0.140761914	0.907040004	-0.140761914

YER078W-A	YER078W-A	8.042655866	27.59505406	0.844591852	165	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YER079C-A	YER079C-A	2.348740209	3.133951567	0.1216661592	339	flat	0.749450066	-0.416095737	1.334311711	0.416095737
YER079W	YER079W	39.55258722	47.71372302	0.527584457	633	flat	0.828956215	-0.270632194	1.206336333	0.270632194
YER080W	AIM9	77.15229271	63.15810675	0.649478034	1884	flat	1.221573867	0.288741105	0.818616071	-0.288741105
YER081W	SER3	175.5580583	166.6271562	0.344164129	1410	flat	1.053598119	0.075324675	0.949128498	-0.075324675
YER082C	UTP7	49.94658358	48.31206161	0.140575613	1665	flat	1.033832586	0.048002581	0.967274599	-0.048002581
YER083C	GET2	80.01411477	57.31280459	0.777903436	858	flat	1.39609491	0.481397023	0.71628368	-0.481397023
YER084W	YER084W	4.343449809	11.37315536	0.584696245	387	flat	0.381903673	-1.388719298	2.618461328	1.388719298
YER084W-A	YER084W-A	1.034727655	2.958534061	0.25431347	513	flat	0.349743364	-1.51563141	2.859239382	1.51563141
YER085C	YER085C	2.372737554	2.035267397	0.072553284	522	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YER086W	ILV1	64.75476303	37.26368508	0.835566188	1731	flat	1.737744448	0.797215962	0.575458597	-0.797215962
YER087C-A	YER087C-A	2.404054743	0.824852159	0.222132811	552	flat	2.914528034	1.543262279	0.343108726	-1.543262279
YER087C-B	SBH1	87.04802233	75.58163401	0.564491808	249	flat	1.151708659	0.203775812	0.868275143	-0.203775812
YER087W	AIM10	79.93405634	83.73369235	0.244280122	1731	flat	0.954622376	-0.066997942	1.047534633	0.066997942
YER088C	DOT6	27.33624016	29.17837684	0.179607076	2013	flat	0.936866376	-0.094084802	1.067388078	0.094084802
YER088C-A	YER088C-A	19.11371919	7.026518395	0.735355952	324	flat	2.720226165	1.443726605	0.367616492	-1.443726605
YER088W-B	YER088W-B	22.86959287	27.87663625	0.413621865	147	flat	0.820385669	-0.285625805	1.218938894	0.285625805
YER089C	PTC2	53.58887905	45.15104724	0.529172104	1395	flat	1.186880091	0.247174189	0.842545096	-0.247174189
YER090C-A	YER090C-A	1.965982545	0.843182207	0.170878643	90	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YER090W	TRP2	111.2831261	66.7242613	0.874699145	1524	flat	1.667806042	0.73795152	0.599590105	-0.73795152
YER091C	MET6	140.1530525	345.0459689	0.966644918	2304	up	0.40618661	-1.299785412	2.46192261	1.299785412
YER091C-A	YER091C-A	56.98692647	20.50983748	0.917246629	222	down	2.778516726	1.474314925	0.359904258	-1.474314925
YER092W	IES5	1236.696639	1141.909618	0.560214586	378	flat	1.083007464	0.115043185	0.923354671	-0.115043185
YER093C	TSC11	27.42895983	38.07577515	0.62953458	4293	flat	0.720378238	-0.473173495	1.388159646	0.473173495
YER093C-A	AIM11	27.35280063	21.62945663	0.453030303	414	flat	1.264608774	0.338691134	0.790758391	-0.338691134
YER094C	PUP3	1153.392332	1116.438733	0.285914166	618	flat	1.033099532	0.046979255	0.967960945	-0.046979255
YER095W	RAD51	98.39718124	101.5603507	0.194649848	1203	flat	0.968854288	-0.045648389	1.032146952	0.045648389
YER096W	SHC1	33.85858828	30.57151863	0.295012324	1539	flat	1.107520653	0.147333602	0.902917699	-0.147333602
YER097W	YER097W	15.28104615	22.53596082	0.537146585	330	flat	0.678073869	-0.560485646	1.474765576	0.560485646
YER098W	UBP9	38.62960405	66.6058104	0.836044657	2265	flat	0.579973486	-0.785941147	1.724216751	0.785941147
YER099C	PRS2	211.8823821	257.0780611	0.774423662	957	flat	0.824194726	-0.278942863	1.213305507	0.278942863
YER100W	UBC6	222.6416488	206.1933223	0.476025808	753	flat	1.079771383	0.110725887	0.92612197	-0.110725887
YER101C	AST2	62.537403	62.32896782	0.016543425	1293	flat	1.003344114	0.004816488	0.996667032	-0.004816488
YER102W	RPS8B	725.9463905	479.2295292	0.898760331	603	flat	1.514819823	0.599146205	0.660144517	-0.599146205
YER103W	SSA4	426.0648019	1138.25664	0.97061766	1929	up	0.374313478	-1.417681098	2.671557554	1.417681098
YER104W	RTT105	62.36585777	49.86474681	0.637284327	627	flat	1.25070038	0.322736216	0.799552008	-0.322736216
YER105C	NUP157	58.15325524	60.36748476	0.165796723	4176	flat	0.963320825	-0.05391174	1.038075762	0.05391174
YER106W	MAM1	6.910136668	20.87084672	0.774090184	909	flat	0.331090385	-1.594702981	3.02032329	1.594702981
YER107C	GLE2	143.9034765	153.1550633	0.374720893	1098	flat	0.939593334	-0.089891617	1.064290224	0.089891617
YER107W-A	YER107W-A	1.653630178	0.472812453	0.178751631	321	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YER109C	FLO8	29.56346252	30.98694612	0.140481369	2400	flat	0.95406183	-0.067845329	1.048150097	0.067845329
YER110C	KAP123	44.84346182	44.14217804	0.062266203	3342	flat	1.015886932	0.022739839	0.984361516	-0.022739839
YER111C	SWI4	52.80657869	35.14543753	0.752501087	3282	flat	1.5025159	0.587380258	0.665550361	-0.587380258
YER112W	LSM4	218.5064111	157.1548114	0.860113093	564	flat	1.390389572	0.475489167	0.719222885	-0.475489167
YER113C	TMN3	80.75266352	80.85962329	0.011976222	2121	flat	0.998677217	-0.001909636	1.001324535	0.001909636
YER114C	BOI2	21.21788078	24.73658464	0.32431492	3123	flat	0.857753044	-0.221365754	1.165836725	0.221365754
YER115C	SPR6	91.23387748	51.38141576	0.872749021	576	flat	1.775620156	0.828322991	0.563183515	-0.828322991
YER116C	SLX8	74.85031726	82.60119516	0.439959403	825	flat	0.906165064	-0.142154225	1.103551704	0.142154225
YER117W	RPL23B	1942.262538	1257.074691	0.903276787	414	down	1.545065343	0.627667853	0.647221818	-0.627667853

YER118C	SHO1	39.1860923	25.7078923	0.699180803	1104	flat	1.524282576	0.608130379	0.656046337	-0.608130379
YER119C	AVT6	37.7652549	54.53454633	0.736102653	1347	flat	0.692501496	-0.530110908	1.444040202	0.530110908
YER119C-A	YER119C-A	5.232050321	6.935853642	0.20477019	372	flat	0.754348432	-0.406697039	1.32564735	0.406697039
YER120W	SCS2	131.078877	98.29095447	0.807300275	735	flat	1.333580264	0.415304659	0.749861127	-0.415304659
YER121W	YER121W	184.3749717	173.7688549	0.386689865	345	flat	1.061035775	0.085473301	0.94247529	-0.085473301
YER122C	GLO3	161.1190351	138.3569833	0.675743077	1482	flat	1.164516827	0.219731486	0.858725247	-0.219731486
YER123W	YCK3	61.00162983	75.64548947	0.665303755	1575	flat	0.806414636	-0.310406272	1.240056859	0.310406272
YER124C	DSE1	336.3063172	145.1624839	0.964397564	1722	down	2.316757803	1.212107231	0.431637696	-1.212107231
YER125W	RSP5	76.3456555	53.4015398	0.785638683	2430	flat	1.429652699	0.51566472	0.699470578	-0.51566472
YER126C	NSA2	590.6952135	349.1160529	0.913252139	786	down	1.691973797	0.758707226	0.591025701	-0.758707226
YER127W	LCP5	185.2581597	130.1515329	0.8607728	1074	flat	1.423403594	0.509344783	0.702541433	-0.509344783
YER128W	VFA1	28.04416277	17.60762845	0.643272437	612	flat	1.592727996	0.671499906	0.627853596	-0.671499906
YER129W	SAK1	34.85619972	29.78801184	0.406270842	3429	flat	1.170141864	0.226683448	0.854597233	-0.226683448
YER130C	COM2	144.9912127	219.6831481	0.884884732	1332	flat	0.660001525	-0.599458738	1.515148015	0.599458738
YER131W	RPS26B	340.8522237	176.2250814	0.935471944	360	down	1.934186786	0.951727124	0.517013148	-0.951727124
YER132C	PMD1	17.88887196	23.5648756	0.457720748	5262	flat	0.759132883	-0.397575649	1.317292429	0.397575649
YER133W	GLC7	893.0774063	846.6303647	0.411287516	939	flat	1.054861063	0.077052992	0.947992144	-0.077052992
YER133W-A	YER133W-A	1.810773397	1.331340328	0.089502682	342	flat	1.360113083	0.443726605	0.735232984	-0.443726605
YER134C	YER134C	175.2909576	195.2909571	0.588806728	537	flat	0.897556535	-0.155925281	1.114135947	0.155925281
YER135C	YER135C	9.454725217	23.17141944	0.763607366	393	flat	0.408033925	-1.293238989	2.450776613	1.293238989
YER136W	GDI1	109.8688475	84.840546	0.765463245	1356	flat	1.295004013	0.372956569	0.772198379	-0.372956569
YER137C	YER137C	60.562818	44.47927618	0.71568798	447	flat	1.361596303	0.445299025	0.734432076	-0.445299025
YER137C-A	YER137C-A	0.668701546	0.917749341	0.061497753	1323	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YER137W-A	YER137W-A	1.734690481	3.471926736	0.227555459	306	flat	0.499633377	-1.001058238	2.001467567	1.001058238
YER138C	YER138C	28.81799015	38.3465439	0.593598666	5268	flat	0.751514667	-0.412126835	1.33064602	0.412126835
YER138W-A	YER138W-A	281.4163586	281.8637665	0.021922575	105	flat	0.99841268	-0.002291838	1.001589843	0.002291838
YER139C	RTR1	172.0018209	174.9510219	0.111671741	681	flat	0.983142705	-0.024527253	1.017146336	0.024527253
YER140W	EMP65	97.89322421	101.0910374	0.195403799	1671	flat	0.968366996	-0.046374184	1.032666338	0.046374184
YER141W	COX15	112.0852266	128.0875148	0.602754821	1461	flat	0.875067541	-0.192533721	1.142768933	0.192533721
YER142C	MAG1	122.5263869	181.922949	0.872828766	891	flat	0.67350704	-0.570235069	1.484765475	0.570235069
YER143W	DDI1	82.07633422	100.4742994	0.694642598	1287	flat	0.816888843	-0.291788315	1.22415676	0.291788315
YER144C	UBP5	27.11153348	28.99877269	0.196063506	2418	flat	0.934920032	-0.097085125	1.069610198	0.097085125
YER145C	FTR1	364.5805409	256.7021387	0.879476584	1215	flat	1.420247384	0.506142245	0.704102688	-0.506142245
YER145C-A	YER145C-A	2.221829589	1.039539708	0.177801943	438	flat	2.137320558	1.095803302	0.467875535	-1.095803302
YER146W	LSM5	885.6333071	519.3643597	0.914448311	282	down	1.705225418	0.769962465	0.586432732	-0.769962465
YER147C	SCC4	107.3898305	119.7183825	0.534399014	1875	flat	0.897020393	-0.156787311	1.114801857	0.156787311
YER147C-A	YER147C-A	1.506774943	2.215661275	0.114267073	411	flat	0.680056541	-0.556273395	1.470465968	0.556273395
YER148W	SPT15	399.8857442	458.6771261	0.710743802	723	flat	0.871824038	-0.197891113	1.14702045	0.197891113
YER148W-A	YER148W-A	56.99312093	63.69739163	0.434130781	579	flat	0.894748112	-0.1604465	1.117632981	0.1604465
YER149C	PEA2	48.54249063	53.71531307	0.379396839	1263	flat	0.903699296	-0.146085295	1.106562774	0.146085295
YER150W	SPI1	118.7506235	238.015058	0.93969842	447	up	0.498920633	-1.00311776	2.004326806	1.00311776
YER151C	UBP3	64.63194533	65.38587107	0.064977526	2739	flat	0.988469593	0.016731509	1.011664909	0.016731509
YER152C	YER152C	104.2103586	82.72301116	0.732601131	1332	flat	1.259750547	0.333138083	0.793807951	-0.333138083
YER152W-A	YER152W-A	1.560303607	2.944445804	0.186109903	567	flat	0.529914188	-0.91616934	1.887097992	0.91616934
YER153C	PET122	31.68701278	27.37862226	0.365637234	765	flat	1.157363306	0.21084181	0.864032923	-0.21084181
YER154W	OXA1	82.68834774	57.49540213	0.798202117	1209	flat	1.438173222	0.524237453	0.695326533	-0.524237453
YER155C	BEM2	64.33877379	60.01839403	0.31215021	6504	flat	1.071984261	0.100283725	0.932849517	-0.100283725
YER156C	YER156C	154.4079211	102.8234586	0.86938524	1017	flat	1.501679901	0.58657732	0.58657732	-0.58657732
YER157W	COG3	117.0764668	142.3106529	0.729607076	2406	flat	0.822682381	-0.281592548	1.215535938	0.281592548

YER158C	YER158C	29.07873137	48.9163197	0.785116717	1722	flat	0.594458691	-0.750351535	1.682202675	0.750351535
YER158W-A	YER158W-A	16.38318788	28.80872542	0.693953893	216	flat	0.568688397	-0.814289726	1.75843222	0.814289726
YER159C	BUR6	295.1036037	284.7951092	0.260323329	429	flat	1.036196178	0.051297167	0.965068219	-0.051297167
YER159C-A	YER159C-A	0.468091082	0.114718668	0.076214296	1323	flat	4.080339248	2.028689106	0.245077661	-2.028689106
YER160C	YER160C	24.01499179	30.94229012	0.506756561	5268	flat	0.77612199	-0.365644663	1.288457243	0.365644663
YER161C	SPT2	87.05653246	87.70104756	0.048825576	1002	flat	0.992650999	-0.010641518	1.007403409	0.010641518
YER162C	RAD4	51.20668443	43.95715455	0.484268523	2265	flat	1.164922638	0.220234149	0.858426103	-0.220234149
YER163C	GCG1	293.1254662	399.5163764	0.866514427	699	flat	0.733700753	-0.446736329	1.362953488	0.446736329
YER164W	CHD1	30.93511677	29.96195455	0.101174424	4407	flat	1.032479931	0.046113739	0.968541828	-0.046113739
YER165C-A	YER165C-A	1.239064629	1.275401658	0.014122082	357	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YER165W	PAB1	107.2957083	92.86674624	0.609243149	1734	flat	1.155372753	0.208358378	0.865521536	-0.208358378
YER166W	DNF1	41.87092596	48.88525851	0.476649268	4716	flat	0.856514361	-0.223450659	1.167522747	0.223450659
YER167W	BCK2	56.21048685	56.52883531	0.033152095	2556	flat	0.994368388	-0.008147662	1.005663507	0.008147662
YER168C	CCA1	208.9620204	209.8552573	0.056256343	1641	flat	0.995743557	-0.006153855	1.004274637	0.006153855
YER169W	RPH1	29.67474281	41.45028719	0.655096419	2391	flat	0.715911633	-0.482146571	1.396820436	0.482146571
YER170W	ADK2	75.15968668	54.62029875	0.758757431	678	flat	1.376039465	0.460521848	0.726723343	-0.460521848
YER171W	RAD3	62.95434478	53.64327368	0.542206757	2337	flat	1.173573879	0.230908666	0.852098038	-0.230908666
YER172C	BRR2	44.1255879	43.39037459	0.064412063	6492	flat	1.016944157	0.024240459	0.983338164	-0.024240459
YER172C-A	YER172C-A	1.161013314	1.991768994	0.127105988	381	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YER173W	RAD24	39.85582796	35.18369393	0.371813832	1980	flat	1.132792595	0.17988374	0.882774132	-0.17988374
YER174C	GRX4	287.3143062	313.6637812	0.550572713	735	flat	0.915994525	-0.12658912	1.091709582	0.12658912
YER175C	TMT1	112.2576033	67.62321304	0.874068436	900	flat	1.660045394	0.731222693	0.602393166	-0.731222693
YER175W-A	YER175W-A	76.1371422	110.3802162	0.834587502	165	flat	0.689771635	-0.535809292	1.449755179	0.535809292
YER176W	ECM32	29.51602136	35.66615647	0.460555314	3366	flat	0.827563839	-0.273057488	1.208365993	0.273057488
YER177W	BMH1	795.1225674	752.6345062	0.409743367	804	flat	1.056452449	0.079227833	0.946564136	-0.079227833
YER178W	PDA1	163.699568	104.3062455	0.882804118	1263	flat	1.569412907	0.65022497	0.637180946	-0.65022497
YER179W	DMC1	7.48247088	14.04464692	0.531528201	1005	flat	0.532763189	-0.908433691	1.877006559	0.908433691
YER180C	ISC10	68.33256495	56.6316408	0.607140786	804	flat	1.206614606	0.270964951	0.828765038	-0.270964951
YER180C-A	SLO1	243.118888	318.2522611	0.843830651	258	flat	0.763918808	-0.388508783	1.309039638	0.388508783
YER181C	YER181C	42.86934161	52.93310524	0.584413513	324	flat	0.809877701	-0.30422403	1.234754332	0.30422403
YER182W	FMP10	87.74701686	105.1052433	0.670595911	735	flat	0.834849091	-0.260412658	1.197821272	0.260412658
YER183C	FAU1	182.7807357	193.2955438	0.35645933	636	flat	0.945602429	-0.080694354	1.057526895	0.080694354
YER184C	TOG1	52.45093054	60.90002811	0.517514862	2385	flat	0.86126283	-0.215474526	1.161085752	0.215474526
YER185W	PUG1	35.21307552	30.28799245	0.3976874	912	flat	1.162608436	0.217365281	0.860134822	-0.217365281
YER186C	YER186C	282.0256394	273.8831587	0.207307525	921	flat	1.02972976	0.04226577	0.97112858	-0.04226577
YER187W	YER187W	20.14439861	26.72056291	0.497803393	426	flat	0.753891251	-0.407571665	1.326451259	0.407571665
YER188C-A	YER188C-A	0.294897382	1.517727973	0.184261273	300	flat	0.194301869	-2.363628317	5.146630887	2.363628317
YER188W	YER188W	9.338417089	9.485799834	0.02322749	720	flat	0.984462803	-0.022591399	1.015782412	0.022591399
YER189W	YER189W	52.26636522	57.99448354	0.398448601	369	flat	0.901229945	-0.150032844	1.109594732	0.150032844
YER190C-A	YER190C-A	0.076796193	0.26349444	0.054567203	576	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YER190C-B	YER190C-B	0.366332151	0.157114697	0.057351022	483	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YER190W	YRF1-2	23.00269708	15.58032283	0.544011889	5046	flat	1.476394124	0.562077901	0.677325914	-0.562077901
YFL001W	DEG1	80.61416011	73.20268103	0.432630129	1329	flat	1.101246006	0.139136787	0.908062317	-0.139136787
YFL002C	SPB4	94.10481523	93.93077573	0.014977526	1821	flat	1.001852849	0.002670622	0.998150578	-0.002670622
YFL002W-A	YFL002W-A	23.41195476	27.3950899	0.351863129	5313	flat	0.854604049	-0.226671942	1.170132532	0.226671942
YFL002W-B	YFL002W-B	0.335874011	0.345723912	0.007401769	1317	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YFL003C	MSH4	11.60801981	22.6191541	0.683057851	2637	flat	0.513194249	-0.962423091	1.948579902	0.962423091
YFL004W	VTC2	65.20469249	69.08194877	0.260533565	2487	flat	0.943874538	-0.083332989	1.059462841	0.083332989
YFL005W	SEC4	601.3995216	450.8682637	0.863455125	648	flat	1.333869713	0.415617757	0.749698408	-0.415617757

YFL007W	BLM10	35.54173668	34.5688974	0.088451501	6432	flat	1.02814204	0.040039589	0.972628257	-0.040039589
YFL008W	SMC1	85.82331632	81.37464827	0.277192982	3678	flat	1.054668968	0.076790247	0.948164808	-0.076790247
YFL009W	CDC4	70.73756426	76.85930122	0.38292011	2340	flat	0.920351384	-0.119743317	1.086541529	0.119743317
YFL010C	WWM1	223.3986769	166.0909858	0.846012759	636	flat	1.345037938	0.427646865	0.743473453	-0.427646865
YFL010W-A	AUA1	13.96882335	28.75695107	0.762527186	285	flat	0.485754672	-1.041700222	2.058652355	1.041700222
YFL011W	HXT10	2.911235579	5.086839643	0.253863999	1641	flat	0.572307323	-0.805138028	1.747312955	0.805138028
YFL012W	YFL012W	3.364601	4.753510431	0.178686385	447	flat	0.707813951	-0.498557897	1.412800636	0.498557897
YFL012W-A	YFL012W-A	4.954276014	7.689821732	0.294997825	375	flat	0.644264092	-0.634275907	1.552158521	0.634275907
YFL013C	IES1	47.78784411	54.89809697	0.471248369	2079	flat	0.870482708	-0.200112456	1.148787898	0.200112456
YFL013W-A	YFL013W-A	2.640872075	4.7193034	0.245730028	804	flat	0.559589383	-0.837559505	1.787024613	0.837559505
YFL014W	HSP12	2575.526497	3510.550794	0.873350732	330	flat	0.733653107	-0.44683002	1.363042003	0.44683002
YFL015C	YFL015C	1.429805487	3.679340541	0.284428012	495	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YFL015W-A	YFL015W-A	2.225640617	6.681821266	0.453653763	318	flat	0.333088918	-1.586020738	3.002201351	1.586020738
YFL016C	MDJ1	147.7366766	319.6516923	0.960171089	1536	up	0.46218018	-1.113472703	2.163658339	1.113472703
YFL017C	GNA1	244.9491377	92.64464504	0.96707264	480	down	2.643964339	1.402702719	0.378219927	-1.402702719
YFL017W-A	SMX2	413.9905552	387.8638154	0.435725678	234	flat	1.067360601	0.094047664	0.936890493	-0.094047664
YFL018C	LPD1	178.6488339	110.9965058	0.891924025	1500	flat	1.60949962	0.686612236	0.621311113	-0.686612236
YFL019C	YFL019C	3.498782495	6.431050735	0.314665797	354	flat	0.544045233	-0.87820149	1.83808246	0.87820149
YFL020C	PAU5	3.836063503	4.935700726	0.150086994	369	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YFL021C-A	YFL021C-A	3.0007102	8.520578096	0.514760041	855	flat	0.352172137	-1.505647322	2.839520489	1.505647322
YFL021W	GAT1	28.45096071	27.91906644	0.056408583	1533	flat	1.019051291	0.027226668	0.981304875	-0.027226668
YFL022C	FRS2	67.75618414	53.30116097	0.674293171	1512	flat	1.271195278	0.346185671	0.786661198	-0.346185671
YFL023W	BUD27	59.01647728	54.58996475	0.323473974	2391	flat	1.081086561	0.112482043	0.924995311	-0.112482043
YFL024C	EPL1	56.85536556	99.54206276	0.876714514	2499	flat	0.571169252	-0.808009778	1.750794525	0.808009778
YFL025C	BST1	35.38768581	46.90712668	0.639604176	3090	flat	0.754420241	-0.406559711	1.32552117	0.406559711
YFL026W	STE2	1195.904452	560.5990593	0.958336958	1296	down	2.13326161	1.093060899	0.46876576	-1.093060899
YFL027C	GYP8	173.6223139	153.6013853	0.616652168	1494	flat	1.130343412	0.176761148	0.884686892	-0.176761148
YFL028C	CAF16	351.2329505	262.2005913	0.856713064	870	flat	1.339558194	0.421757257	0.746514787	-0.421757257
YFL029C	CAK1	61.77660599	61.97046468	0.015818472	1107	flat	0.996871757	-0.004520175	1.00313806	0.004520175
YFL030W	AGX1	54.16638437	48.1007052	0.421357112	1158	flat	1.126103747	0.171339748	0.888017647	-0.171339748
YFL031C-A	YFL031C-A	2.602035721	1.487968601	0.155335653	102	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YFL031W	HAC1	873.957387	1040.818472	0.779643323	717	flat	0.839682817	-0.252083629	1.190925882	0.252083629
YFL032W	YFL032W	147.4486909	171.6309204	0.681912426	321	flat	0.859103305	-0.219096473	1.164004369	0.219096473
YFL033C	RIM15	27.22513942	26.0524734	0.121726838	5313	flat	1.045011696	0.06351909	0.956927088	-0.06351909
YFL034C-A	RPL22B	810.1286609	504.6753993	0.907557578	369	down	1.605246981	0.682795285	0.622957098	-0.682795285
YFL034C-B	MOB2	85.70455157	62.00902484	0.781310715	864	flat	1.382130291	0.466893623	0.72352079	-0.466893623
YFL034W	YFL034W	46.12919938	56.12923514	0.576729013	3222	flat	0.822234609	-0.282377997	1.216197894	0.282377997
YFL036W	RPO41	79.72262798	106.7199255	0.787712049	4056	flat	0.747026645	-0.420768392	1.338640336	0.420768392
YFL037W	TUB2	149.7666616	88.92074371	0.89199652	1374	flat	1.684271356	0.752124592	0.593728556	-0.752124592
YFL038C	YPT1	1995.899671	1086.849645	0.922379295	621	down	1.836408264	0.87688683	0.544541222	-0.87688683
YFL039C	ACT1	233.2512801	203.1710319	0.67830216	1128	flat	1.148053824	0.199190282	0.8710393	-0.199190282
YFL040W	YFL040W	2.561955073	2.524870935	0.012983906	1623	flat	1.014687538	0.021035533	0.985525063	-0.021035533
YFL041W	FET5	108.8706225	118.9658363	0.46600696	1869	flat	0.915141908	-0.12793262	1.092726703	0.12793262
YFL041W-A	YFL041W-A	116.5766212	110.6676647	0.30785124	192	flat	1.053393704	0.075044741	0.94931268	-0.075044741
YFL042C	YFL042C	43.99432051	36.57537042	0.505966362	2025	flat	1.202840053	0.266444814	0.831365731	-0.266444814
YFL044C	OTU1	101.0658245	151.437758	0.866420183	906	flat	0.667375335	-0.583429726	1.498407189	0.583429726
YFL045C	SEC53	766.8488386	445.2002055	0.914731042	765	down	1.722480873	0.784487963	0.580557971	-0.784487963
YFL046W	FMP32	170.5584376	134.2605515	0.794164129	624	flat	1.270354067	0.345230654	0.787182114	-0.345230654
YFL047W	RGD2	91.35632176	89.08249503	0.145128317	2145	flat	1.025524956	0.036362599	0.975110352	-0.036362599

YFL048C	EMP47	220.6440724	265.2053813	0.766753661	1338	flat	0.831974341	-0.26538906	1.201960145	0.26538906
YFL049W	SWP82	101.8908261	116.3429296	0.588958968	1872	flat	0.875780131	-0.191359375	1.141839104	0.191359375
YFL050C	ALR2	21.73108762	27.73961488	0.467348122	2577	flat	0.783395433	-0.352187376	1.276494549	0.352187376
YFL051C	YFL051C	1.282162529	0.628458788	0.11322314	483	flat	2.040169624	1.028689106	0.490155323	-1.028689106
YFL052W	YFL052W	9.049426093	11.50780867	0.262142961	1398	flat	0.786372658	-0.346714934	1.271661711	0.346714934
YFL053W	DAK2	8.119640748	17.3479042	0.657699	1776	flat	0.468047359	-1.095273579	2.13653593	1.095273579
YFL054C	YFL054C	23.97465577	32.99748608	0.585725678	1941	flat	0.726560069	-0.460846016	1.376348691	0.460846016
YFL055W	AGP3	9.126520044	15.65694331	0.51953748	1677	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YFL056C	AAD6	49.42646258	194.0506658	0.980977236	639	up	0.25470906	-1.97307782	3.926048025	1.97307782
YFL057C	AAD16	49.92053717	170.6203996	0.973582717	459	up	0.292582465	-1.773084784	3.417839817	1.773084784
YFL058W	THI5	4.23752836	6.527862251	0.259482384	1023	flat	0.64914488	-0.623387591	1.540488157	0.623387591
YFL059W	SNZ3	28.20757565	19.96565227	0.566695665	897	flat	1.412805115	0.498562471	0.707811707	-0.498562471
YFL060C	SNO3	33.45696753	40.60886506	0.498956068	669	flat	0.823883344	-0.279488019	1.213764069	0.279488019
YFL061W	DDI2	4.045052582	1.790829467	0.283659562	678	flat	2.258759226	1.175530494	0.442720936	-1.175530494
YFL062W	COS4	74.26757746	79.21474949	0.307887487	1140	flat	0.937547337	-0.09303656	1.06661281	0.09303656
YFL063W	YFL063W	0.388022871	0.332835082	0.026047557	456	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YFL064C	YFL064C	25.61394402	26.30728487	0.069754966	525	flat	0.97364453	-0.038532943	1.027068883	0.038532943
YFL065C	YFL065C	21.75941846	22.10283456	0.038937219	309	flat	0.984462803	-0.022591399	1.015782412	0.022591399
YFL066C	YFL066C	7.803900179	10.94205918	0.318442801	1179	flat	0.713202154	-0.487617034	1.402127004	0.487617034
YFL067W	YFL067W	0.502665992	0.14372424	0.078026678	528	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YFL068W	YFL068W	0.091583038	0.314229394	0.058561693	483	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YFR001W	LOC1	658.7000542	443.4727103	0.893779904	615	flat	1.485322634	0.57077634	0.673254401	-0.57077634
YFR002W	NIC96	124.2430755	128.5250593	0.216681166	2520	flat	0.966683666	-0.048884231	1.034464567	0.048884231
YFR003C	YPI1	355.0110788	196.2020137	0.918972017	468	down	1.809416082	0.855524199	0.552664481	-0.855524199
YFR004W	RPN11	834.357869	583.3612406	0.887284327	921	flat	1.43025935	0.516276776	0.699173894	-0.516276776
YFR005C	SAD1	105.3486415	107.0409484	0.095396549	1347	flat	0.984190098	-0.022991093	1.01606387	0.022991093
YFR006W	YFR006W	132.3186946	146.1096333	0.51754386	1608	flat	0.905612393	-0.143034394	1.104225172	0.143034394
YFR007W	YFH7	24.40817312	33.7272883	0.595273307	1062	flat	0.72369213	-0.466552011	1.381803059	0.466552011
YFR008W	FAR7	45.43013719	41.70333621	0.302167609	666	flat	1.089364577	0.12348686	0.917966328	-0.12348686
YFR009W	GCN20	134.5249012	124.0250482	0.455908366	2259	flat	1.084659133	0.11724173	0.921948629	-0.11724173
YFR009W-A	YFR009W-A	NA	NA	NA	258	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YFR010W	UBP6	196.8734921	222.4989209	0.638726983	1500	flat	0.884828975	-0.176529466	1.130161905	0.176529466
YFR010W-A	YFR010W-A	0.936182164	1.606061347	0.11030158	189	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YFR011C	MIC19	281.9632861	163.0152268	0.910482819	513	down	1.729674532	0.790500595	0.578143449	-0.790500595
YFR012W	DCV1	1.8885054	5.981193984	0.430680006	609	flat	0.315740537	-1.663188599	3.167157469	1.663188599
YFR012W-A	YFR012W-A	5.084437616	3.489029824	0.199304045	87	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YFR013W	IOC3	60.43899385	48.53647834	0.62723648	2364	flat	1.245228247	0.316410209	0.803065624	-0.316410209
YFR014C	CMK1	158.7300001	140.5680942	0.60676381	1341	flat	1.129203615	0.175305653	0.885579878	-0.175305653
YFR015C	GSY1	51.07672564	16.62579303	0.91707989	2127	down	3.072137704	1.619242884	0.325506242	-1.619242884
YFR016C	YFR016C	41.24739716	35.6678373	0.421603596	3702	flat	1.156431123	0.209679342	0.864729407	-0.209679342
YFR017C	IGD1	24.5246292	26.84416824	0.229636074	588	flat	0.913592441	-0.13037738	1.094579984	0.13037738
YFR018C	YFR018C	34.43169979	20.70892564	0.712360447	1092	flat	1.662650221	0.733484694	0.601449413	-0.733484694
YFR019W	FAB1	28.26045993	22.55392162	0.451594896	6837	flat	1.253017564	0.325406638	0.79807341	-0.325406638
YFR020W	YFR020W	53.41059876	78.60050449	0.803247789	699	flat	0.679519796	-0.557412515	1.471627473	0.557412515
YFR021W	ATG18	18.6003139	22.51851883	0.35461795	1503	flat	0.82600077	-0.275784968	1.210652624	0.275784968
YFR022W	ROG3	20.49014505	34.8760379	0.724633899	2202	flat	0.587513556	-0.767305954	1.702088385	0.767305954
YFR023W	PES4	6.312345917	31.57800032	0.897709149	1836	flat	0.199896949	-2.322671643	5.002577605	2.322671643
YFR024C-A	LSB3	221.1089282	171.3492886	0.821523851	1380	flat	1.290398869	0.367817079	0.774954182	-0.367817079
YFR025C	HIS2	121.2941017	113.0767567	0.394243874	1008	flat	1.072670504	0.101206987	0.932252725	-0.101206987

YFR026C	ULI1	32.26524295	40.77033968	0.554088734	510	flat	0.791390094	-0.337539088	1.26359934	0.337539088
YFR027W	ECO1	44.3391808	36.0594944	0.538683486	846	flat	1.229611827	0.298202947	0.813264786	-0.298202947
YFR028C	CDC14	71.58740789	58.56450332	0.635421198	1656	flat	1.222368565	0.289679348	0.818083865	-0.289679348
YFR029W	PTR3	12.89904601	20.78773218	0.569624474	2037	flat	0.62051242	-0.688468007	1.611571288	0.688468007
YFR030W	MET10	69.59692069	82.1370158	0.60569813	3108	flat	0.847327116	-0.239009057	1.180181752	0.239009057
YFR031C	SMC2	55.27751947	48.56038264	0.45184863	3513	flat	1.138325451	0.186913088	0.878483389	-0.186913088
YFR031C-A	RPL2A	364.400647	217.8386032	0.909576628	765	down	1.672801063	0.742265884	0.597799716	-0.742265884
YFR032C	RRT5	1.72870879	1.570063421	0.046041757	870	flat	1.101043924	0.138872023	0.90822898	-0.138872023
YFR032C-A	RPL29	870.4387718	542.1661594	0.907713499	180	down	1.605483405	0.683007753	0.62286536	-0.683007753
YFR032C-B	YFR032C-B	73.72434544	35.6436115	0.903168044	264	down	2.068374734	1.048497587	0.483471386	-1.048497587
YFR033C	QCR6	368.4224722	198.6035929	0.92015369	444	down	1.855064487	0.89146934	0.539064818	-0.89146934
YFR034C	PHO4	45.88339454	49.45950584	0.290162389	939	flat	0.927696178	-0.108275697	1.077939118	0.108275697
YFR034W-A	YFR034W-A	58.97947635	43.21308813	0.711881978	288	flat	1.364852153	0.44874468	0.732680092	-0.44874468
YFR035C	YFR035C	5.128650118	7.478659579	0.261794983	345	flat	0.685771302	-0.544200563	1.458212085	0.544200563
YFR036W	CDC26	16.27833547	17.80800822	0.174445411	375	flat	0.914101974	-0.129572978	1.09396985	0.129572978
YFR036W-A	YFR036W-A	8.833331712	12.35631069	0.343895897	651	flat	0.714884235	-0.484218458	1.398827882	0.484218458
YFR037C	RSC8	94.75824471	71.5344905	0.766789909	1674	flat	1.324651144	0.405612467	0.754915741	-0.405612467
YFR038W	IRC5	48.48195831	40.81633777	0.507727998	2562	flat	1.187807652	0.248301231	0.841887151	-0.248301231
YFR039C	OSW7	161.1836374	173.1576142	0.43031028	1533	flat	0.930849262	-0.103380532	1.074287793	0.103380532
YFR040W	SAP155	117.4591266	110.6140726	0.345150065	3009	flat	1.061882307	0.086623875	0.941723949	-0.086623875
YFR041C	ERJ5	312.9299581	266.4569719	0.735877918	888	flat	1.174410847	0.231937199	0.851490773	-0.231937199
YFR042W	KEG1	132.9238945	204.6289954	0.885551689	603	flat	0.649584846	-0.622410118	1.53944478	0.622410118
YFR043C	IRC6	118.8262979	94.59228966	0.748144121	714	flat	1.25619433	0.329059663	0.796055177	-0.329059663
YFR044C	DUG1	123.4041533	89.84613729	0.817906336	1446	flat	1.373505384	0.457862566	0.728064128	-0.457862566
YFR045W	YFR045W	49.84717034	54.18125668	0.327352472	930	flat	0.920007644	-0.120282246	1.08694749	0.120282246
YFR046C	CNN1	64.11166835	62.60977275	0.108075975	1086	flat	1.023988198	0.034199087	0.976573756	-0.034199087
YFR047C	BNA6	122.4421899	168.009752	0.840271132	888	flat	0.728780255	-0.456444222	1.372155726	0.456444222
YFR048W	RMD8	84.37712416	90.34640123	0.356423082	1989	flat	0.933929	-0.098615219	1.070745206	0.098615219
YFR049W	YMR31	155.7724073	109.7496841	0.850869943	372	flat	1.419342649	0.505222918	0.704551506	-0.505222918
YFR050C	PRE4	252.485174	231.7329977	0.514651298	801	flat	1.089552099	0.123735183	0.917808337	-0.123735183
YFR051C	RET2	43.93809253	35.97782947	0.527308975	1641	flat	1.221254677	0.288364088	0.818830027	-0.288364088
YFR052C-A	YFR052C-A	161.3262147	137.8850904	0.68737857	306	flat	1.170004779	0.226514423	0.854697364	-0.226514423
YFR052W	RPN12	222.8351852	256.8179698	0.686646368	825	flat	0.867677544	-0.204769104	1.15250188	0.204769104
YFR053C	HXK1	145.3856228	131.578063	0.517768595	1458	flat	1.10493816	0.143965628	0.905028025	-0.143965628
YFR054C	YFR054C	1.680762279	4.456196122	0.330332028	579	flat	0.377174216	-1.406697039	2.651294699	1.406697039
YFR055W	IRC7	131.5363395	130.4088845	0.061193272	1023	flat	1.008645538	0.012419266	0.991428567	-0.012419266
YFR056C	YFR056C	0.479507938	3.290467151	0.341496303	369	flat	0.145726402	-2.778665816	6.862174516	2.778665816
YFR057W	YFR057W	0.776045741	1.331340328	0.098492098	456	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YGL001C	ERG26	232.7161624	235.7537452	0.112389445	1050	flat	0.987115442	-0.018709279	1.013052737	0.018709279
YGL002W	ERP6	163.6204828	166.9267633	0.145744527	651	flat	0.980193227	-0.028861917	1.020207009	0.028861917
YGL003C	CDH1	92.47399379	96.18522959	0.227562708	1701	flat	0.961415741	-0.05676767	1.040132751	0.05676767
YGL004C	RPN14	63.6357508	103.3604218	0.863803103	1254	flat	0.615668451	-0.699774453	1.624250842	0.699774453
YGL005C	COG7	290.473921	258.5558012	0.638864724	840	flat	1.123447703	0.167932968	0.89011709	-0.167932968
YGL006W	PMC1	88.41897647	100.5354731	0.562527186	3522	flat	0.879480384	-0.185276695	1.137035025	0.185276695
YGL006W-A	YGL006W-A	7.173179556	8.203934991	0.138386255	111	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YGL007C-A	YGL007C-A	32.54040075	26.16772368	0.47662027	87	flat	1.243531961	0.314443588	0.804161076	-0.314443588
YGL007W	BRP1	7.957548397	21.28031285	0.75800348	378	flat	0.373939446	-1.41912343	2.674229774	1.41912343
YGL008C	PMA1	303.112151	309.1606927	0.16507902	2757	flat	0.980435606	-0.028505216	1.019954798	0.028505216
YGL009C	LEU1	74.25364843	85.16140295	0.55599536	2340	flat	0.871916688	-0.197737803	1.146898567	0.197737803

YGL010W	MPO1	231.1995473	296.0292276	0.828425402	525	flat	0.781002434	-0.35660105	1.280405741	0.35660105
YGL011C	SCL1	411.9238526	389.9301117	0.393098449	759	flat	1.056404315	0.0791621	0.946607266	-0.0791621
YGL012W	ERG4	158.3362524	206.4195429	0.823278237	1422	flat	0.767060377	-0.382587955	1.303678341	0.382587955
YGL013C	PDR1	50.37255557	66.16101362	0.701246919	3207	flat	0.761363117	-0.393343412	1.313433731	0.393343412
YGL014C-A	YGL014C-A	1.092212525	1.873738239	0.12199507	162	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YGL014W	PUF4	74.53705476	78.64642142	0.267775845	2667	flat	0.947748841	-0.077423308	1.055131863	0.077423308
YGL015C	YGL015C	3.151575072	1.93095162	0.165782224	393	flat	1.632135699	0.706761011	0.612694153	-0.706761011
YGL016W	KAP122	61.75947015	63.77636955	0.158445701	3246	flat	0.968375444	-0.0463616	1.03265733	0.0463616
YGL017W	ATE1	138.0283578	137.2178664	0.054175729	1512	flat	1.005906603	0.008496359	0.99412808	-0.008496359
YGL018C	JAC1	92.1355063	60.98258343	0.832847615	555	flat	1.51084951	0.595359966	0.661879289	-0.595359966
YGL019W	CKB1	101.6814628	75.25174539	0.787552559	837	flat	1.351217334	0.434259741	0.740073395	-0.434259741
YGL020C	GET1	354.6265972	240.5212975	0.888023778	708	flat	1.4744083	0.560136097	0.678238179	-0.560136097
YGL021W	ALK1	91.29805932	47.79879163	0.890996085	2283	flat	1.910049527	0.933610047	0.523546634	-0.933610047
YGL022W	STT3	126.9822384	103.8556555	0.724938379	2157	flat	1.222680053	0.290046934	0.817875451	-0.290046934
YGL023C	PIB2	50.8651616	47.3295673	0.283007105	1908	flat	1.074701598	0.103936136	0.930490847	-0.103936136
YGL024W	YGL024W	6.319229609	7.227276064	0.128012179	336	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YGL025C	PGD1	55.05245092	42.70993292	0.647129187	1194	flat	1.28898472	0.366235161	0.775804387	-0.366235161
YGL026C	TRP5	252.953644	156.5603573	0.900971437	2124	down	1.615694089	0.692154069	0.618929045	-0.692154069
YGL027C	CWH41	36.91521182	28.87444106	0.541351312	2502	flat	1.278473642	0.354422417	0.782182727	-0.354422417
YGL028C	SCW11	95.42075502	52.92016506	0.879614325	1629	flat	1.80310766	0.85048554	0.554598054	-0.85048554
YGL029W	CGR1	741.1429239	500.473935	0.894171379	363	flat	1.480882164	0.566456848	0.675273175	-0.566456848
YGL030W	RPL30	1593.002272	1144.023255	0.880672756	318	flat	1.392456197	0.477631945	0.718155445	-0.477631945
YGL031C	RPL24A	667.4888814	301.2754887	0.96399884	468	down	2.21554327	1.147660503	0.451356565	-1.147660503
YGL032C	AGA2	125.6664979	55.19010812	0.948318109	264	down	2.276975027	1.187118468	0.439179169	-1.187118468
YGL033W	HOP2	83.75624267	44.81571185	0.879063361	657	flat	1.868903543	0.902192112	0.935073093	-0.902192112
YGL034C	YGL034C	1.692034158	4.146797741	0.300956938	366	flat	0.408033925	-1.293238989	2.450776613	1.293238989
YGL035C	MIG1	48.17630494	38.06842441	0.59585327	1515	flat	1.265518752	0.339728884	0.790189793	-0.339728884
YGL036W	YGL036W	53.40559177	108.798302	0.923024503	2730	up	0.490867879	-1.02659333	2.037208059	1.02659333
YGL037C	PNC1	1551.404843	1338.678037	0.738386255	651	flat	1.158908117	0.212766188	0.862881177	-0.212766188
YGL038C	OCH1	89.38885293	54.58772129	0.854139481	1443	flat	1.637526734	0.71151846	0.610677053	-0.71151846
YGL039W	YGL039W	52.3041488	62.33266748	0.566782659	1047	flat	0.839112955	-0.253063067	1.19173467	0.253063067
YGL040C	HEM2	156.6481136	136.7282635	0.641590547	1029	flat	1.145689337	0.196215899	0.872836962	-0.196215899
YGL041C	YGL041C	5.637744063	12.64773311	0.580861244	204	flat	0.445751346	-1.165688939	2.243403207	1.165688939
YGL041C-B	YGL041C-B	26.10566986	36.49182012	0.625090619	183	flat	0.715384154	-0.483209933	1.397850364	0.483209933
YGL041W-A	YGL041W-A	398.0163372	284.9411873	0.874858634	465	flat	1.396836803	0.482163476	0.715903245	-0.482163476
YGL042C	YGL042C	7.806107164	8.927811608	0.146099754	306	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YGL043W	DST1	212.8017558	192.5719364	0.552725823	930	flat	1.105050714	0.14411258	0.904935844	-0.14411258
YGL044C	RNA15	212.087814	134.5684735	0.892474989	891	flat	1.576058704	0.656321272	0.634494132	-0.656321272
YGL045W	RIM8	38.28778161	72.57888835	0.872379295	1629	flat	0.527533316	-0.922665887	1.895614875	0.922665887
YGL047W	ALG13	200.6173814	157.7539913	0.805277657	609	flat	1.271710336	0.346770099	0.78634259	-0.346770099
YGL048C	RPT6	370.0744237	345.4139526	0.474104683	1218	flat	1.071393963	0.099489073	0.933363482	-0.099489073
YGL049C	TIF4632	51.92127672	48.54517889	0.276011309	2745	flat	1.069545481	0.096997833	0.934976602	-0.096997833
YGL050W	TYW3	91.37513763	77.17886775	0.627700449	822	flat	1.183939857	0.243595795	0.844637499	-0.243595795
YGL051W	MST27	33.5053621	35.09073187	0.151754386	705	flat	0.954820841	-0.066698039	1.047316897	0.066698039
YGL052W	YGL052W	15.32309925	11.40775928	0.366246194	306	flat	1.343217268	0.425692682	0.744481197	-0.425692682
YGL053W	PRM8	67.77683522	69.93452426	0.163868349	714	flat	0.969147012	-0.045212567	1.031835199	0.045212567
YGL054C	ERV14	941.9743705	919.0079455	0.227272727	417	flat	1.024990453	0.035610472	0.975618843	-0.035610472
YGL055W	OLE1	294.5511226	101.6768838	0.971705089	1533	down	2.896933025	1.534526331	0.345192654	-1.534526331
YGL056C	SDS23	53.17089156	55.28592428	0.175213861	1584	flat	0.961743739	-0.056275562	1.039778019	0.056275562

YGL057C	GEP7	88.7763993	88.8854577	0.011976222	864	flat	0.998773046	-0.001771208	1.001228462	0.001771208
YGL058W	RAD6	438.0845498	461.1670547	0.358626939	519	flat	0.949947628	-0.074080117	1.052689612	0.074080117
YGL059W	PKP2	99.73765107	87.91716919	0.549601276	1476	flat	1.13445021	0.181993292	0.881484256	-0.181993292
YGL060W	YBP2	38.90624336	41.29228754	0.211584747	1926	flat	0.942215742	-0.085870659	1.061328054	0.085870659
YGL061C	DUO1	133.1794627	92.0020586	0.846969697	744	flat	1.447570465	0.533633577	0.690812658	-0.533633577
YGL062W	PYC1	82.04100188	81.82943865	0.016543425	3537	flat	1.002585417	0.003725155	0.99742125	-0.003725155
YGL063C-A	YGL063C-A	1.179589527	2.023637298	0.12815717	150	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YGL063W	PUS2	23.60768797	25.22728437	0.17784544	1113	flat	0.935799812	-0.095728156	1.068604617	0.095728156
YGL064C	MRH4	22.5633228	22.32482428	0.030991736	1686	flat	1.010683109	0.015330723	0.989429814	-0.015330723
YGL065C	ALG2	35.04831978	34.83145547	0.026359287	1512	flat	1.006226105	0.008954524	0.993812419	-0.008954524
YGL066W	SGF73	52.1672572	46.36220709	0.41246919	1974	flat	1.125210823	0.170195335	0.888722344	-0.170195335
YGL067W	NPY1	38.29836127	43.75787144	0.408075975	1155	flat	0.875233644	-0.192259899	1.142552057	0.192259899
YGL068W	MNP1	700.7971626	579.071596	0.800985936	585	flat	1.210208146	0.275255201	0.826304139	-0.275255201
YGL069C	YGL069C	14.83999728	31.98652503	0.805893867	465	flat	0.463945279	-1.107973442	2.155426611	1.107973442
YGL070C	RPB9	658.6041526	499.3283902	0.85799623	369	flat	1.318979985	0.399422673	0.758161618	-0.399422673
YGL071W	AFT1	30.21524548	37.19275497	0.496788459	2073	flat	0.812396003	-0.299744953	1.230926785	0.299744953
YGL072C	YGL072C	166.1255251	246.2092046	0.882245904	360	flat	0.674733202	-0.567610939	1.482067277	0.567610939
YGL073W	HSF1	38.68318173	51.68282307	0.667761346	2502	flat	0.748472692	-0.417978414	1.336054088	0.417978414
YGL074C	YGL074C	1.082192227	5.569643939	0.465035523	327	flat	0.194301869	-2.363628317	5.146630887	2.363628317
YGL075C	MPS2	41.72645943	48.50470843	0.469051762	1164	flat	0.860255855	-0.217162288	1.162444863	0.217162288
YGL076C	RPL7A	297.184341	233.7507573	0.824111933	735	flat	1.271372741	0.346387062	0.786551392	-0.346387062
YGL077C	HNM1	166.1150677	208.1045448	0.796244744	1692	flat	0.798228928	-0.325125532	1.25277344	0.325125532
YGL078C	DBP3	159.4922099	113.829598	0.847100188	1572	flat	1.401148846	0.486610224	0.713700049	-0.486610224
YGL079W	KXD1	83.48693	73.22979719	0.534573003	657	flat	1.140067748	0.189119559	0.877140855	-0.189119559
YGL080W	MPC1	373.6867586	246.775617	0.894947078	393	flat	1.514277476	0.598629589	0.660380951	-0.598629589
YGL081W	YGL081W	19.01674705	23.01020603	0.358750181	963	flat	0.82644836	-0.275003418	1.209996956	0.275003418
YGL082W	YGL082W	153.8561471	173.8897757	0.616659417	1146	flat	0.884791222	-0.176591022	1.130210128	0.176591022
YGL083W	SCY1	10.95333132	14.58024388	0.346940699	2415	flat	0.751244726	-0.412645137	1.331124154	0.412645137
YGL084C	GUP1	97.77346347	108.3060782	0.500971437	1683	flat	0.902751398	-0.147599346	1.107724677	0.147599346
YGL085W	LCL3	307.980102	379.3400098	0.803740757	825	flat	0.811884046	-0.3006544	1.231702981	0.3006544
YGL086W	MAD1	233.5194067	190.0195423	0.78354357	2250	flat	1.228923109	0.297394653	0.813720559	-0.297394653
YGL087C	MMS2	100.8634523	96.78265337	0.236269392	414	flat	1.04216457	0.059583114	0.959541352	-0.059583114
YGL088W	YGL088W	4.350944977	1.658719097	0.322683776	366	flat	2.623075231	1.391259185	0.381231918	-1.391259185
YGL089C	MF(ALPHA)2	1.218584222	0.20905344	0.159293896	363	flat	5.829056068	2.543262279	0.171554363	-2.543262279
YGL090W	LIF1	172.1166472	217.4690793	0.80508192	1266	flat	0.791453423	-0.337423644	1.263498231	0.337423644
YGL091C	NBP35	282.8863638	309.8502397	0.551732637	987	flat	0.912977715	-0.13134845	1.095316987	0.13134845
YGL092W	NUP145	67.123835	66.78924314	0.033826301	3954	flat	1.005009667	0.007209378	0.995015305	-0.007209378
YGL093W	SPC105	51.84797104	65.6359483	0.662904161	2754	flat	0.789932535	-0.340198651	1.265930893	0.340198651
YGL094C	PAN2	51.44849483	58.52409838	0.462867914	3348	flat	0.879099316	-0.185901933	1.137527902	0.185901933
YGL095C	VPS45	103.8263273	97.15559691	0.37000145	1734	flat	1.068660279	0.095803302	0.93575107	-0.095803302
YGL096W	TOS8	50.56904561	72.50758188	0.779092359	831	flat	0.697431142	-0.51987731	1.433833307	0.51987731
YGL097W	SRM1	207.2829422	165.1799182	0.796404234	1449	flat	1.254891906	0.327563098	0.796881385	-0.327563098
YGL098W	USE1	191.4435442	224.9856914	0.717645353	738	flat	0.850914309	-0.232914242	1.175206468	0.232914242
YGL099W	LSG1	80.23417064	67.954435	0.601964622	1923	flat	1.180705434	0.239649081	0.846951298	-0.239649081
YGL100W	SEH1	238.6983664	212.4819163	0.626221546	1050	flat	1.12338203	0.16784863	0.890169126	-0.16784863
YGL101W	YGL101W	500.7794427	356.7129172	0.879367841	648	flat	1.403872466	0.489411881	0.712315416	-0.489411881
YGL102C	YGL102C	1.855997508	2.476479211	0.104132231	429	flat	0.749450066	-0.416095737	1.334311711	0.416095737
YGL103W	RPL28	3778.028657	3336.977904	0.693801653	450	flat	1.132170714	-0.179091511	0.883259024	-0.179091511
YGL104C	VPS73	36.99841894	53.29188572	0.730527766	1461	flat	0.694259894	-0.526452262	1.440382785	0.526452262

YGL105W	ARC1	268.7711946	168.6811726	0.899093809	1131	flat	1.593368071	0.67207957	0.62760138	-0.67207957
YGL106W	MLC1	407.9413781	228.3337418	0.917739597	450	down	1.78660138	0.837217781	0.559721945	-0.837217781
YGL107C	RMD9	94.98703919	81.08623948	0.618174569	1941	flat	1.17143229	0.228273567	0.853655827	-0.228273567
YGL108C	YGL108C	201.4086373	181.1944744	0.573626214	423	flat	1.111560593	0.152586594	0.899636067	-0.152586594
YGL109W	YGL109W	3.549690706	3.747476477	0.044512107	324	flat	0.947221611	-0.078226098	1.055719156	0.078226098
YGL110C	CUE3	121.8280064	107.0908858	0.591764535	1875	flat	1.13761321	0.186010123	0.879033393	-0.186010123
YGL111W	NSA1	111.3491838	111.9760509	0.048441351	1392	flat	0.994401775	-0.008099223	1.005629741	0.008099223
YGL112C	TAF6	103.1285234	118.40431	0.609293896	1551	flat	0.870986229	-0.199278186	1.148123778	0.199278186
YGL113W	SLD3	27.19756122	31.91236695	0.389422938	2007	flat	0.852257724	-0.230638326	1.173353989	0.230638326
YGL114W	YGL114W	84.61036449	123.550583	0.845614035	2178	flat	0.684823677	-0.546195513	1.460229887	0.546195513
YGL115W	SNF4	439.8809862	486.9573033	0.62016094	969	flat	0.903325575	-0.146682039	1.107020577	0.146682039
YGL116W	CDC20	88.51747924	37.75689885	0.936022909	1833	down	2.344405445	1.229222093	0.42654738	-1.229222093
YGL117W	YGL117W	184.6988865	116.2069914	0.889727418	798	flat	1.589395648	0.668478299	0.629169962	-0.668478299
YGL118C	YGL118C	32.7214903	27.37454564	0.42477164	438	flat	1.195325422	0.257403438	0.836592263	-0.257403438
YGL119W	COQ8	113.5531153	145.9276298	0.788118022	1506	flat	0.77814678	-0.361885781	1.285104591	0.361885781
YGL120C	PRP43	63.16486888	45.71628531	0.733782804	2304	flat	1.381671071	0.4664142	0.723761264	-0.4664142
YGL121C	GPG1	540.3355963	690.3471333	0.839495433	381	flat	0.782701297	-0.35346626	1.277626605	0.35346626
YGL122C	NAB2	121.1546087	141.7700274	0.672720023	1578	flat	0.854585493	-0.226703269	1.17015794	0.226703269
YGL123C-A	YGL123C-A	1.148950838	0.328512548	0.136552124	231	flat	3.497433641	1.806296684	0.285296684	-1.806296684
YGL123W	RPS2	731.9237369	460.8734748	0.90645933	765	down	1.588122938	0.667322597	0.629674174	-0.667322597
YGL124C	MON1	55.45899598	54.66958126	0.066891402	1935	flat	1.014439743	0.020683173	0.985765795	-0.020683173
YGL125W	MET13	19.43084246	29.04138385	0.614528056	1803	flat	0.669074262	-0.579761748	1.494602404	0.579761748
YGL126W	SCS3	97.91212281	67.18900739	0.823959693	1143	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YGL127C	SOH1	196.9822355	155.3299723	0.799891257	384	flat	1.268153419	0.342729291	0.788548124	-0.342729291
YGL128C	CWC23	23.77869733	23.51409536	0.032550384	852	flat	1.011252909	0.016143852	0.98887231	-0.016143852
YGL129C	RSM23	77.28796125	78.29816152	0.076279542	1353	flat	0.987098033	-0.018734722	1.013070603	0.018734722
YGL130W	CEG1	103.4705161	127.7970946	0.735508192	1380	flat	0.809646858	-0.304635306	1.23510638	0.304635306
YGL131C	SNT2	37.7023362	53.4015398	0.719290996	4212	flat	0.7060159	-0.50222742	1.416398695	0.50222742
YGL132W	YGL132W	5.266024674	4.065342786	0.159779614	336	flat	1.295345793	0.373337277	0.771994633	-0.373337277
YGL133W	ITC1	56.43846334	61.94889673	0.374358417	3795	flat	0.911048724	-0.134399881	1.097636134	0.134399881
YGL134W	PCL10	79.97562634	104.0960891	0.764375816	1302	flat	0.768286561	-0.380283576	1.301597673	0.380283576
YGL135W	RPL1B	709.6475526	453.461844	0.904451211	654	down	1.56495538	0.646121524	0.638995854	-0.646121524
YGL136C	MRM2	63.02168345	71.55228452	0.493460925	963	flat	0.880778075	-0.183149537	1.135359778	0.183149537
YGL137W	SEC27	161.7959455	142.9051732	0.610830796	2670	flat	1.132190962	0.179117312	0.883243228	-0.179117312
YGL138C	YGL138C	1.448917772	3.362981059	0.252704074	1038	flat	0.430843275	-1.214764931	2.321029616	1.214764931
YGL139W	FLC3	38.92792337	53.61504796	0.699637524	2409	flat	0.726063388	-0.461832589	1.377290215	0.461832589
YGL140C	YGL140C	51.24446306	65.7267442	0.676997245	3660	flat	0.779659234	-0.359084392	1.282611628	0.359084392
YGL141W	HUL5	77.43079442	99.62692954	0.746172249	2733	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YGL142C	GPI10	42.87243945	66.49796793	0.803066551	1851	flat	0.644718039	-0.633259746	1.551065644	0.633259746
YGL143C	MRF1	69.23677659	49.12452861	0.762628679	1242	flat	1.409413557	0.495094996	0.709514958	-0.495094996
YGL144C	ROG1	40.92453461	46.23981726	0.398985066	2058	flat	0.885049661	-0.176169686	1.1298801	0.176169686
YGL145W	TIP20	104.6003534	104.0645391	0.044562853	2106	flat	1.005148865	0.007409184	0.99487751	-0.007409184
YGL146C	RRT6	53.21385446	48.15867608	0.366594171	936	flat	1.104969214	0.144006175	0.905002589	-0.144006175
YGL147C	RPL9A	527.1290699	277.986634	0.930216036	576	down	1.896238903	0.923140738	0.527359711	-0.923140738
YGL148W	AR02	153.0024612	76.49026921	0.930890242	1131	down	2.000286609	1.00020673	0.499928358	-1.00020673
YGL149W	YGL149W	1.734690481	1.487968601	0.061432507	306	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YGL150C	INO80	42.9283504	42.00066002	0.082347397	4470	flat	1.022087519	0.031518736	0.978389797	-0.031518736
YGL151W	NUT1	64.75769513	71.443590566	0.415397999	3399	flat	0.906418219	-0.141751236	1.103243491	0.141751236
YGL152C	YGL152C	3.262139179	5.372488401	0.246527476	678	flat	0.60719334	-0.719772127	1.646921884	0.719772127

YGL153W	PEX14	77.69080145	62.27714199	0.677446716	1026	flat	1.247501073	0.319041056	0.801602517	-0.319041056
YGL154C	LYS5	78.31523874	80.24129578	0.134217776	819	flat	0.975996686	-0.035051846	1.024593643	0.035051846
YGL155W	CDC43	71.9643478	71.52511139	0.039604176	1131	flat	1.00614101	0.008832512	0.993896472	-0.008832512
YGL156W	AMS1	31.82932995	35.56299864	0.320632159	3252	flat	0.895012546	-0.160020189	1.117302774	0.160020189
YGL157W	ARI1	108.2137806	116.1556179	0.390756851	1044	flat	0.931627609	-0.1021747	1.073390258	0.1021747
YGL158W	RCK1	7.415548196	9.17145559	0.206691315	1539	flat	0.808546487	-0.306597372	1.236787267	0.306597372
YGL159W	YGL159W	153.8871512	158.8637097	0.226228795	1113	flat	0.968674038	-0.045916819	1.032339012	0.045916819
YGL160W	AIM14	47.6174056	40.40186549	0.490097144	1713	flat	1.178594231	0.23706711	0.848468433	-0.23706711
YGL161C	YIP5	370.8500515	426.6881537	0.709148905	933	flat	0.869136038	-0.202346088	1.15056787	0.202346088
YGL162W	SUT1	28.40844778	43.5082019	0.723742207	900	flat	0.652944653	-0.614967389	1.531523378	0.614967389
YGL163C	RAD54	48.51537571	83.28651838	0.858112223	2697	flat	0.582511752	-0.77964094	1.716703564	0.77964094
YGL164C	YRB30	80.91288706	64.5866099	0.691170074	1323	flat	1.252781144	0.325134404	0.798224019	-0.325134404
YGL165C	YGL165C	25.6698239	20.18394714	0.443649413	579	flat	1.271794051	0.346865066	0.78629083	-0.346865066
YGL166W	CUP2	144.3170373	137.2223079	0.300804698	678	flat	1.051702449	0.07272659	0.950839281	-0.07272659
YGL167C	PMR1	86.73269998	111.0766214	0.758329709	2853	flat	0.780836677	-0.356907274	1.280677546	0.356907274
YGL168W	HUR1	16.47174565	19.14251498	0.27014644	333	flat	0.860479705	-0.216786929	1.162142458	0.216786929
YGL169W	SUA5	103.3176775	110.18634	0.345476294	1281	flat	0.937663213	-0.092858262	1.066480999	0.092858262
YGL170C	SPO74	7.265587666	39.47070333	0.92754096	1242	up	0.184075455	-2.441630829	5.432554825	2.441630829
YGL171W	ROK1	110.9649263	78.79649655	0.82045817	1695	flat	1.408246955	0.710102725	-0.493900352	-0.493900352
YGL172W	NUP49	142.7727282	151.0240943	0.337828041	1419	flat	0.945363909	-0.081058307	1.057793714	0.081058307
YGL173C	XRN1	85.63403368	63.69361999	0.763194142	4587	flat	1.344467997	0.427035414	0.743788623	-0.427035414
YGL174W	BUD13	28.49570206	23.11645602	0.432427142	801	flat	1.232702021	0.301824102	0.811226057	-0.301824102
YGL175C	SAE2	31.53526915	35.8230591	0.354842685	1038	flat	0.880306427	-0.183922295	1.135968079	0.183922295
YGL176C	YGL176C	38.52263095	61.1648931	0.800094244	1665	flat	0.629816043	-0.666997588	1.587765207	0.666997588
YGL177W	YGL177W	64.31813585	65.4193092	0.079665072	348	flat	0.983167457	-0.024490932	1.017120729	0.024490932
YGL178W	MPT5	49.51532782	92.88730504	0.889285196	2580	flat	0.533068839	-0.907606245	1.875930326	0.907606245
YGL179C	TOS3	30.43593298	51.22219185	0.792569233	1683	flat	0.594194272	-0.750993398	1.682951263	0.750993398
YGL180W	ATG1	34.44848034	48.28110145	0.692235755	2694	flat	0.713498228	-0.487018248	1.401545176	0.487018248
YGL181W	GTS1	38.10638711	46.13077467	0.526540525	1191	flat	0.826051316	-0.275696688	1.210578545	0.275696688
YGL182C	YGL182C	19.65982545	17.80051327	0.199768015	324	flat	1.104452729	0.143331672	0.905425804	-0.143331672
YGL183C	MND1	27.61311847	47.60146826	0.788234015	660	flat	0.580089638	-0.785652247	1.723871511	0.785652247
YGL184C	STR3	32.27417697	93.14811167	0.951478904	1398	up	0.346482354	-1.529146217	2.88614987	1.529146217
YGL185C	YGL185C	106.6286849	109.0367728	0.131861679	1140	flat	0.977914901	-0.032219169	1.022583866	0.032219169
YGL186C	TPN1	90.80805583	119.4120457	0.788676236	1740	flat	0.760459762	-0.395056182	1.314993969	0.395056182
YGL187C	COX4	677.5078309	295.1137726	0.965811222	468	down	2.295751313	1.198966371	0.43558725	-1.198966371
YGL188C	YGL188C	1605.665399	471.0190262	0.978954618	174	down	3.408918345	1.769314042	0.293348182	-1.769314042
YGL188C-A	YGL188C-A	775.5173699	531.7429921	0.8907641	141	flat	1.458443988	0.54442998	0.685662259	-0.54442998
YGL189C	RPS26A	332.0053023	179.1762191	0.919530231	360	down	1.852954058	0.889827112	0.539678788	-0.889827112
YGL190C	CDC55	133.6830825	126.909322	0.320574163	1581	flat	1.053374807	0.075018861	0.94932971	-0.075018861
YGL191W	COX13	1166.886255	1009.094522	0.73737857	390	flat	1.156369626	0.20960262	0.864775395	-0.20960262
YGL192W	IME4	1.815508007	4.20889621	0.295911266	1803	flat	0.431350149	-1.21306864	2.318302201	1.21306864
YGL193C	YGL193C	28.0719623	30.64643023	0.245063071	312	flat	0.915994525	-0.12658912	1.091709582	0.12658912
YGL194C	HOS2	121.4742857	102.4103423	0.677642453	1359	flat	1.186152522	0.246289531	0.843061901	-0.246289531
YGL194C-A	YGL194C-A	622.1970684	514.0288568	0.79969552	243	flat	1.210432177	0.275522245	0.826151203	-0.275522245
YGL195W	GCN1	53.06608329	53.24066329	0.014977526	8019	flat	0.996720927	-0.004738475	1.00328986	0.004738475
YGL196W	DSD1	119.8149502	153.5417111	0.79168479	1287	flat	0.780341377	-0.357822695	1.281490422	0.357822695
YGL197W	MDS3	19.91746429	18.59760756	0.155560389	4464	flat	1.070969168	0.098916947	0.933733697	-0.098916947
YGL198W	YIP4	245.2896442	212.2267472	0.696433232	708	flat	1.155801723	0.208893926	0.865200302	-0.208893926
YGL199C	YGL199C	9.015970907	12.88940954	0.36784834	471	flat	0.699486728	-0.51563141	1.429619691	0.51563141

YGL200C	EMP24	537.0312614	394.5596741	0.867935334	612	flat	1.361090088	0.444762559	0.734705226	-0.444762559
YGL201C	MCM6	54.63423006	39.40924305	0.708010729	3054	flat	1.386330359	0.471271089	0.72132879	-0.471271089
YGL202W	ARO8	113.0145655	70.68593356	0.866405684	1503	flat	1.598826807	0.677013667	0.625458615	-0.677013667
YGL203C	KEX1	70.77537162	80.66828132	0.527838191	2190	flat	0.877363078	-0.1887541	1.139778986	0.1887541
YGL204C	YGL204C	61.29239699	74.39843007	0.633014354	306	flat	0.823839924	-0.279564052	1.213828039	0.279564052
YGL205W	POX1	5.82707777	11.4150435	0.493656662	2247	flat	0.510473549	-0.970091887	1.95896536	0.970091887
YGL206C	CHC1	84.49327038	77.78279396	0.396512977	4962	flat	1.08627199	0.119385383	0.920579753	-0.119385383
YGL207W	SPT16	88.21302954	85.21349143	0.190662607	3108	flat	1.035200272	0.049909902	0.965996655	-0.049909902
YGL208W	SIP2	31.04929164	28.70062514	0.226794258	1248	flat	1.081833287	0.113478194	0.924356841	-0.113478194
YGL209W	MIG2	26.9488469	40.15572706	0.691641293	1149	flat	0.671108429	-0.575382218	1.490072181	0.575382218
YGL210W	YPT32	79.87355093	52.63271896	0.818181818	669	flat	1.517564597	0.601757928	0.658950533	-0.601757928
YGL211W	NCS6	296.4537846	282.1849788	0.342511237	1080	flat	1.050565434	0.071166022	0.951868363	-0.071166022
YGL212W	VAM7	111.5400507	104.8525004	0.342830216	951	flat	1.063780552	0.089200567	0.940043506	-0.089200567
YGL213C	SKI8	105.8074023	101.4360907	0.242337248	1194	flat	1.043094244	0.060869511	0.958686146	-0.060869511
YGL214W	YGL214W	1.274247946	1.249158826	0.012295201	486	flat	1.020084812	0.028689106	0.980310645	-0.028689106
YGL215W	CLG1	61.77872302	59.74867298	0.158844425	1359	flat	1.033976488	0.048203379	0.96713998	-0.048203379
YGL216W	KIP3	46.02740772	46.44825063	0.038697985	2418	flat	0.990939532	-0.01313107	1.009143311	0.01313107
YGL217C	YGL217C	1.810773397	2.218900546	0.082079165	342	flat	0.81606785	-0.293238989	1.225388306	0.293238989
YGL218W	YGL218W	1.630768931	1.8651035	0.058090474	651	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YGL219C	MDM34	67.12120841	64.77838959	0.17045817	1380	flat	1.036166673	0.051256087	0.9650957	-0.051256087
YGL220W	FRA2	585.895294	463.2624227	0.833869798	363	flat	1.264715775	0.338813198	0.79069149	-0.338813198
YGL221C	NIF3	217.9587569	199.7379028	0.526257793	867	flat	1.091223818	0.125947039	0.916402285	-0.125947039
YGL222C	EDC1	56.29859106	62.37632012	0.409562128	528	flat	0.90256352	-0.147899626	1.10795526	0.147899626
YGL223C	COG1	64.76454461	61.12062413	0.253182543	1254	flat	1.059618509	0.083544949	0.943735874	-0.083544949
YGL224C	SDT1	72.09768728	79.57719623	0.434246774	843	flat	0.906009393	-0.142402087	1.103741316	0.142402087
YGL225W	VRG4	147.6231864	145.1869955	0.106575323	1014	flat	1.016779677	0.02400071	0.983497234	-0.02400071
YGL226C-A	OST5	295.2363443	260.5142268	0.658721183	261	flat	1.133282999	0.18050817	0.882392131	-0.18050817
YGL226W	MTC3	218.3191907	119.9494689	0.913346382	372	down	1.820093017	0.864012182	0.549422469	-0.864012182
YGL227W	VID30	107.5345301	109.2532024	0.096020009	2877	flat	0.984268907	-0.022875574	1.015982515	0.022875574
YGL228W	SHE10	88.9283973	94.96740779	0.331832681	1734	flat	0.936409652	-0.09478829	1.067908685	0.09478829
YGL229C	SAP4	19.58781144	22.42308727	0.278911121	2457	flat	0.87355551	-0.195028713	1.144746944	0.195028713
YGL230C	YGL230C	10.95902432	10.93857999	0.005031173	444	flat	1.001869012	0.002693897	0.998134475	-0.002693897
YGL231C	EMC4	160.5723963	129.788256	0.764368566	573	flat	1.23718741	0.307064058	0.808284979	-0.307064058
YGL232W	TAN1	300.8970181	240.0452519	0.814484559	870	flat	1.253501229	0.32596341	0.797765473	-0.32596341
YGL233W	SEC15	109.9957523	119.4523553	0.443221691	2733	flat	0.920833683	-0.118987489	1.085972438	0.118987489
YGL234W	ADE5,7	128.6824939	133.8171115	0.255161664	2409	flat	0.961629589	-0.056446808	1.039901446	0.056446808
YGL235W	YGL235W	1.812218547	3.956832705	0.273415978	537	flat	0.457997262	-1.12658912	2.183419164	1.12658912
YGL236C	MTO1	26.9809097	39.49113085	0.676837756	2010	flat	0.683214411	-0.549589689	1.46366936	0.549589689
YGL237C	HAP2	26.71814624	21.30144524	0.438545745	798	flat	1.254287957	0.326868598	0.797265089	-0.326868598
YGL238W	CSE1	118.8488616	156.8792702	0.814078585	2883	flat	0.757581683	-0.400526646	1.319989676	0.400526646
YGL239C	YGL239C	0.280854649	1.927273617	0.2315427	315	flat	0.145726402	-2.778665816	6.862174516	2.778665816
YGL240W	DOC1	65.44137117	65.10307243	0.034428012	753	flat	1.005196356	0.007477346	0.994830507	-0.007477346
YGL241W	KAP114	82.92338317	83.31143602	0.037219081	3015	flat	0.995342142	-0.006735568	1.004679655	0.006735568
YGL242C	YGL242C	428.0872981	258.5141054	0.909823111	546	down	1.655953347	0.727662029	0.603881747	-0.727662029
YGL243W	TAD1	155.5381452	129.6944602	0.719501232	1203	flat	1.199265913	0.262151582	0.833843428	-0.262151582
YGL244W	RTF1	88.99675904	76.47466532	0.593497173	1677	flat	1.163741726	0.218770911	0.859297194	-0.218770911
YGL245W	GUS1	200.6882746	105.249119	0.922270552	2127	down	1.906792917	0.931148172	0.524440798	-0.931148172
YGL246C	RAI1	347.1884639	376.9546023	0.534051037	1164	flat	0.921035217	-0.118671774	1.085734814	0.118671774
YGL247W	BRR6	303.684728	261.8975038	0.709583877	594	flat	1.159555641	0.213572049	0.862399323	-0.213572049

YGL248W	PDE1	131.4285899	291.7866212	0.961526751	1110	up	0.45042706	-1.150634594	2.220115284	1.150634594
YGL249W	ZIP2	8.156736091	24.829025	0.812244454	2115	flat	0.328516166	-1.60596373	3.043990234	1.60596373
YGL250W	RMR1	152.5667446	103.0633458	0.863701609	726	flat	1.480320121	0.565909194	0.67552956	-0.565909194
YGL251C	HFM1	13.57818753	22.57002878	0.606568073	3564	flat	0.601602579	-0.733117343	1.662226916	0.733117343
YGL252C	RTG2	137.9859396	138.2876082	0.019138756	1767	flat	0.997818542	-0.003150617	1.002186227	0.003150617
YGL253W	HXK2	157.0162035	145.6437111	0.445316804	1461	flat	1.078084336	0.108470041	0.927571218	-0.108470041
YGL254W	FZF1	23.39519229	23.44046537	0.007727998	900	flat	0.998068593	-0.002789126	1.001935145	0.002789126
YGL255W	ZRT1	2118.176711	2114.62046	0.028128172	1131	flat	1.001681744	0.002424206	0.998321079	-0.002424206
YGL256W	ADH4	78.92162305	78.59426842	0.033826301	1149	flat	1.004165121	0.00599652	0.995852155	-0.00599652
YGL257C	MNT2	132.9412168	101.4533726	0.795701029	1677	flat	1.310367644	0.389971639	0.763144606	-0.389971639
YGL258W	VEL1	1.852012542	2.444006398	0.10092069	621	flat	0.757777289	-0.400154193	1.319648945	0.400154193
YGL258W-A	YGL258W-A	25.70900251	25.94406792	0.027743947	234	flat	0.990939532	-0.01313107	1.009143311	0.01313107
YGL259W	YPS5	16.87665739	30.17170068	0.71062056	498	flat	0.559353865	-0.838166828	1.787777045	0.838166828
YGL260W	YGL260W	0.191491806	1.314050193	0.172393794	231	flat	0.145726402	-2.778665816	6.862174516	2.778665816
YGL261C	PAU11	0.974867378	0.836213759	0.043910396	363	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YGL262W	YGL262W	2.010663967	2.012139359	0.002791069	528	flat	0.999266755	-0.001058238	1.000733784	0.001058238
YGL263W	COS12	6.037269233	2.788476591	0.366652168	1143	flat	2.165077968	1.11441898	0.461877131	-1.11441898
YGR001C	AML1	164.8582953	118.8582148	0.842757721	747	flat	1.387016418	0.471984865	0.720971999	-0.471984865
YGR002C	SWC4	58.60853625	87.28791908	0.819805713	1431	flat	0.671439265	-0.574671188	1.489337982	0.574671188
YGR003W	CUL3	87.479626	111.435866	0.753458025	2235	flat	0.785022176	-0.349194686	1.273849364	0.349194686
YGR004W	PEX31	48.21540345	49.38898805	0.094541105	1389	flat	0.97623793	-0.034695289	1.024340449	0.034695289
YGR005C	TFG2	102.8096109	87.304053	0.641663042	1203	flat	1.177604102	0.235854601	0.849181825	-0.235854601
YGR006W	PRP18	30.07485203	30.11365027	0.006901551	756	flat	0.998711606	-0.001859958	1.001290056	0.001859958
YGR007W	ECT1	224.9047624	210.7955519	0.406727563	972	flat	1.066933151	0.093469787	0.937265843	-0.093469787
YGR008C	STF2	1903.649334	1424.283545	0.866340438	255	flat	1.336566262	0.418531363	0.748185876	-0.418531363
YGR009C	SEC9	97.19853886	88.30135142	0.46091779	1956	flat	1.100759358	0.138499109	0.908463774	-0.138499109
YGR010W	NMA2	39.02177476	43.18114941	0.338255763	1188	flat	0.903676148	-0.146122251	1.106591119	0.146122251
YGR011W	YGR011W	38.14727599	33.88200063	0.350956938	327	flat	1.125886172	0.171060977	0.888189255	-0.171060977
YGR012W	YGR012W	106.1331186	91.68001463	0.609504132	1182	flat	1.15764727	0.211195737	0.863820981	-0.211195737
YGR013W	SNU71	50.38423865	46.11025405	0.330788749	1863	flat	1.092690546	0.127884882	0.91517219	-0.127884882
YGR014W	MSB2	51.66908984	38.59155291	0.669008264	3921	flat	1.338870451	0.421016372	0.746898252	-0.421016372
YGR015C	YGR015C	60.23435883	58.12575217	0.162041467	987	flat	1.036276634	0.051409182	0.964993291	-0.051409182
YGR016W	YGR016W	149.3014493	158.6595211	0.375757576	573	flat	0.941017899	-0.08770593	1.062679042	0.08770593
YGR017W	YGR017W	291.7306985	215.6056517	0.85753951	894	flat	1.353075377	0.436242211	0.739057126	-0.436242211
YGR018C	YGR018C	9.115009982	17.93678514	0.624749891	330	flat	0.508174119	-0.976605194	1.967829457	0.976605194
YGR019W	UGA1	127.5181263	131.8365401	0.217290126	1416	flat	0.967244182	-0.04804795	1.033865097	0.04804795
YGR020C	VMA7	661.660512	369.0162131	0.919283747	357	down	1.793039136	0.842406978	0.557712311	-0.842406978
YGR021W	YGR021W	196.4969152	152.4682053	0.814651298	873	flat	1.288773058	0.365998239	0.775931801	-0.365998239
YGR022C	YGR022C	1.876619702	1.379752703	0.091568798	330	flat	1.360113083	0.443726605	0.735232984	-0.443726605
YGR023W	MTL1	8.708020512	17.59684607	0.63276787	1656	flat	0.494862572	-1.014900163	2.020763048	1.014900163
YGR024C	THG1	585.4580373	534.6058618	0.575728578	714	flat	1.095120872	0.131090113	0.913141212	-0.131090113
YGR025W	YGR025W	39.12499916	31.05581992	0.539248949	303	flat	1.259828247	0.333227064	0.793758992	-0.333227064
YGR026W	YGR026W	112.0398655	93.74735511	0.678222416	837	flat	1.195125615	0.257162263	0.836732128	-0.257162263
YGR027C	RPS25A	1062.17167	681.8172455	0.904175729	327	down	1.557853923	0.639559961	0.641908709	-0.639559961
YGR027W-A	YGR027W-A	0.401220928	0.458874671	0.025960563	1323	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YGR027W-B	YGR027W-B	57.24972519	72.71726281	0.68676236	5268	flat	0.787292081	-0.345029127	1.270176626	0.345029127
YGR028W	MSP1	312.9324282	336.8547761	0.49815137	1089	flat	0.928983201	-0.106275586	1.07644573	0.106275586
YGR029W	ERV1	239.642925	197.8371727	0.770008699	570	flat	1.211313939	0.27657282	0.826549816	-0.27657282
YGR030C	POP6	167.6649265	164.181894	0.1476874	477	flat	1.021214474	0.030285891	0.979226231	-0.030285891

YGR031C-A	NAG1	6.832988114	8.945957567	0.237835291	492	flat	0.763807347	-0.388719298	1.309230664	0.388719298
YGR031W	IMO32	109.2753855	110.6215724	0.087791794	1029	flat	0.987830702	-0.017664287	1.012319215	0.017664287
YGR032W	GSC2	35.22903849	62.51822506	0.836080905	5688	flat	0.563500299	-0.82751172	1.774621953	0.82751172
YGR033C	TIM21	132.2123262	148.189273	0.566586922	720	flat	0.892185538	-0.164584333	1.120843096	0.164584333
YGR034W	RPL26B	1256.539313	921.7035505	0.872981006	384	flat	1.363279236	0.447081095	0.733525439	-0.447081095
YGR035C	YGR035C	7.309422283	11.67483056	0.406328839	351	flat	0.6260838	-0.675572323	1.597230275	0.675572323
YGR035W-A	YGR035W-A	0.398509975	1.367322499	0.153813252	222	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YGR036C	CAX4	60.9454589	72.72446539	0.599557779	720	flat	0.838032409	-0.254922058	1.193271274	0.254922058
YGR037C	ACB1	588.7894315	336.8896183	0.917145136	264	down	1.747722101	0.805475805	0.572173345	-0.805475805
YGR038C-A	YGR038C-A	0.133740309	0.057359334	0.031462955	1323	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YGR038C-B	YGR038C-B	23.64553038	29.67463577	0.465890967	5268	flat	0.796826305	-0.32766282	1.254978649	0.32766282
YGR038W	ORM1	129.1994359	158.125022	0.748550094	669	flat	0.817071417	-0.29146591	1.223883223	0.29146591
YGR039W	YGR039W	72.87367991	75.39994739	0.176939249	312	flat	0.966495103	-0.049165672	1.034666391	0.049165672
YGR040W	KSS1	81.67618541	100.6334537	0.702986806	1107	flat	0.811620613	-0.301122588	1.232102763	0.301122588
YGR041W	BUD9	51.98373554	24.18763559	0.880803248	1644	flat	2.149186321	1.103790561	0.465292371	-1.103790561
YGR042W	YGR042W	96.92583062	101.367861	0.243497173	816	flat	0.956179105	-0.064647215	1.04582917	0.064647215
YGR043C	NQM1	157.6906359	220.9945223	0.863121647	1002	flat	0.713549975	-0.486913619	1.401443536	0.486913619
YGR044C	RME1	114.6278859	103.3668553	0.51030883	903	flat	1.108942374	0.149184398	0.901760113	-0.149184398
YGR045C	YGR045C	62.63522902	53.93587748	0.523589967	363	flat	1.161292565	0.215731477	0.861109448	-0.215731477
YGR046W	TAM41	111.8470899	201.5773422	0.911258518	1158	up	0.554859433	-0.849805766	1.802258266	0.849805766
YGR047C	TFC4	98.04044534	103.4500743	0.29845585	3078	flat	0.947707829	-0.077485739	1.055177524	0.077485739
YGR048W	UFD1	155.2691739	178.6055571	0.658046977	1086	flat	0.869341226	-0.202005533	1.150296305	0.202005533
YGR049W	SCM4	27.60741446	16.95334438	0.650848195	564	flat	1.628434711	0.703485879	0.61408664	-0.703485879
YGR050C	YGR050C	278.2939157	201.0883281	0.864223575	357	flat	1.383938682	0.468780023	0.722575366	-0.468780023
YGR051C	YGR051C	1.365265656	0.46843456	0.145353052	324	flat	2.914528034	1.543262279	-1.543262279	1.543262279
YGR052W	FMP48	42.0826534	26.11585972	0.742387995	1110	flat	1.611383039	0.688299475	0.620584911	-0.688299475
YGR053C	YGR053C	109.8596584	113.1170497	0.167638104	852	flat	0.971203357	-0.042154686	1.029650477	0.042154686
YGR054W	YGR054W	65.8588865	61.60606548	0.309779614	1929	flat	1.069032505	0.09630572	0.935425252	-0.09630572
YGR055W	MUP1	329.6696296	488.7523995	0.892358997	1725	flat	0.674512555	-0.568082799	1.482552094	0.568082799
YGR056W	RSC1	24.69646534	34.63491177	0.614694795	2787	flat	0.713051198	-0.487922427	1.402423841	0.487922427
YGR057C	LST7	329.6054687	330.1943163	0.023481224	729	flat	0.998216663	-0.002575108	1.001786523	0.002575108
YGR058W	PEF1	27.90993077	37.34092633	0.592438741	1008	flat	0.747435415	-0.419979171	1.337908239	0.419979171
YGR059W	SPR3	8.967639679	13.41202108	0.405741627	1539	flat	0.66862702	-0.580726439	1.495602138	0.580726439
YGR060W	ERG25	146.5925372	144.918542	0.095092069	930	flat	1.011551284	0.016569464	0.988580625	-0.016569464
YGR061C	ADE6	56.18022968	70.4327036	0.666594171	4077	flat	0.797644089	-0.32618294	1.253691984	0.32618294
YGR062C	COX18	77.77104453	68.1461456	0.522509787	951	flat	1.14123908	0.190601056	0.876240586	-0.190601056
YGR063C	SPT4	826.8579015	550.1149936	0.897875888	309	flat	1.503063743	0.587906194	0.665307779	-0.587906194
YGR064W	YGR064W	8.391388912	18.09756933	0.671610845	369	flat	0.463674914	-1.108814418	2.156683419	1.108814418
YGR065C	VHT1	135.0868309	139.7638386	0.222321299	1782	flat	0.966536354	-0.049104099	1.034622233	0.049104099
YGR066C	YGR066C	17.31138214	27.62644775	0.640060896	879	flat	0.626623527	-0.674329157	1.595854539	0.674329157
YGR067C	YGR067C	4.579151891	7.604351337	0.318899522	2415	flat	0.602175214	-0.731744769	1.660646233	0.731744769
YGR068C	ART5	18.43736612	24.39051769	0.470436422	1761	flat	0.755923525	-0.403687806	1.322885142	0.403687806
YGR068W-A	YGR068W-A	4.60777159	4.742899917	0.424561404	96	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YGR069W	YGR069W	13.69166415	6.77557131	0.561758736	336	flat	2.020739437	1.014883306	0.494868354	-1.014883306
YGR070W	ROM1	63.06110101	77.63694996	0.660417573	3468	flat	0.812256291	-0.299993083	1.23113851	0.299993083
YGR071C	ENV11	83.91388912	106.705149	0.746933449	2583	flat	0.786408996	-0.34664827	1.271602951	0.34664827
YGR072W	UPF3	127.3075037	95.44474884	0.804675946	1164	flat	1.333834551	0.415579726	0.749718171	-0.415579726
YGR073C	YGR073C	74.19998638	79.96631258	0.362737422	372	flat	0.927890558	-0.107973442	1.079733305	0.107973442
YGR074W	SMD1	134.6096212	125.9610971	0.399731767	441	flat	1.068660279	0.095803302	0.93575107	-0.095803302

YGR075C	PRP38	190.4090502	215.2717043	0.63630564	729	flat	0.884505703	-0.17705665	1.13057496	0.17705665
YGR076C	MRPL25	161.2603404	93.17697052	0.898332608	474	flat	1.730688812	0.791346343	0.577804625	-0.791346343
YGR077C	PEX8	53.23147654	48.79023824	0.337494563	1770	flat	1.09102719	0.125687056	0.916567441	-0.125687056
YGR078C	PAC10	110.8814155	72.59798806	0.851870378	600	flat	1.527334552	0.611016109	0.654735401	-0.611016109
YGR079W	YGR079W	47.7717861	58.50002701	0.596723213	1113	flat	0.816611351	-0.292278473	1.22457274	0.292278473
YGR080W	TWF1	61.01630511	53.021728	0.495904016	999	flat	1.150779264	0.20261113	0.868976381	-0.20261113
YGR081C	SLX9	354.9949524	232.5744288	0.895498043	633	flat	1.526371383	0.610106028	0.655148551	-0.610106028
YGR082W	TOM20	100.0086773	66.81302491	0.83645788	552	flat	1.496844027	0.581923899	0.668072279	-0.581923899
YGR083C	GCD2	75.80490979	66.49759065	0.51661592	1956	flat	1.139964757	0.188989223	0.877220101	-0.188989223
YGR084C	MRP13	82.2243288	90.3196941	0.446752211	1020	flat	0.910369877	-0.135475274	1.098454623	0.135475274
YGR085C	RPL11B	860.9318419	541.4675227	0.906727563	525	down	1.589997194	0.66902422	0.628931927	-0.66902422
YGR086C	PIL1	338.3513783	184.9544971	0.919008264	1020	down	1.829376325	0.871351886	0.546634384	-0.871351886
YGR087C	PDC6	4.130654815	6.099615969	0.231564448	1692	flat	0.677199161	-0.562347909	1.476670465	0.562347909
YGR088W	CTT1	111.778155	109.9881018	0.09738292	1689	flat	1.016274971	0.023290802	0.983985662	-0.023290802
YGR089W	NNF2	46.2645839	50.96887965	0.353313035	2811	flat	0.907702587	-0.139708426	1.101682439	0.139708426
YGR090W	UTP22	53.78661454	54.88176274	0.091003335	3714	flat	0.980045317	-0.029079635	1.02036098	0.029079635
YGR091W	PRP31	31.69402164	28.10607358	0.316412933	1485	flat	1.127657392	0.173328811	0.886794169	-0.173328811
YGR092W	DBF2	93.56430018	69.22040321	0.777598956	1719	flat	1.351686726	0.434760824	0.739816394	-0.434760824
YGR093W	DRN1	94.2742811	121.4979086	0.775061621	1524	flat	0.775933365	-0.365995332	1.28877046	0.365995332
YGR094W	VAS1	152.3858869	101.685485	0.86677541	3315	flat	1.498600187	0.583615536	0.667289387	-0.583615536
YGR095C	RRP46	139.2863526	127.1548882	0.487741047	672	flat	1.095406984	0.131466984	0.912902706	-0.131466984
YGR096W	TPC1	24.71520914	21.36061592	0.312635929	945	flat	1.157045716	0.210445868	0.864270086	-0.210445868
YGR097W	ASK10	20.05405037	41.06378213	0.828106423	3441	flat	0.488363451	-1.03397286	2.04765528	1.03397286
YGR098C	ESP1	25.78318004	27.88549863	0.211548499	4893	flat	0.924608894	-0.113084855	1.081538375	0.113084855
YGR099W	TEL2	59.3218826	70.93010267	0.601101928	2067	flat	0.836342827	-0.257833653	1.195681923	0.257833653
YGR100W	MDR1	77.92609047	98.36239126	0.72892562	2853	flat	0.792234608	-0.33600037	1.262252356	0.33600037
YGR101W	PCP1	239.0623443	286.0501713	0.761983471	1041	flat	0.835735715	-0.258881305	1.196550515	0.258881305
YGR102C	GTF1	128.3765233	153.9724031	0.718515297	552	flat	0.833763198	-0.262290401	1.199381314	0.262290401
YGR103W	NOP7	247.4510208	204.2003643	0.771944324	1818	flat	1.211804992	0.277157554	0.825215283	-0.277157554
YGR104C	SRB5	57.25605009	77.69321768	0.75461795	924	flat	0.736950429	-0.440360515	1.356943372	0.440360515
YGR105W	VMA21	824.2003747	651.8447065	0.836414383	234	flat	1.264412162	0.338466817	0.790881352	-0.338466817
YGR106C	VOA1	387.246825	318.3805298	0.790793098	798	flat	1.216301843	0.282501299	0.822164339	-0.282501299
YGR107W	YGR107W	15.72786036	9.10636784	0.523568218	450	flat	1.727127724	0.788374776	0.578995975	-0.788374776
YGR108W	CLB1	263.2833828	97.43041863	0.968392055	1416	down	2.702270877	1.434172298	0.370059126	-1.434172298
YGR109C	CLB6	43.80890238	7.967075976	0.937559809	1143	down	5.498742891	2.459101831	0.181859749	-2.459101831
YGR109W-A	YGR109W-A	0.101339306	0.086926001	0.008032478	873	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YGR109W-B	YGR109W-B	6.30562231	6.993836914	0.107264028	4644	flat	0.90159699	-0.149445396	1.109143011	0.149445396
YGR110W	CLD1	75.97244207	93.46844918	0.690880093	1338	flat	0.812813765	-0.299003261	1.230294126	0.299003261
YGR111W	YGR111W	85.45405426	101.4341887	0.652747571	1203	flat	0.842458103	-0.247323154	1.187002649	0.247323154
YGR112W	SHY1	33.19485913	30.74372049	0.232296651	1170	flat	1.079728107	0.110668064	0.926159089	-0.110668064
YGR113W	DAM1	62.66569362	56.17946568	0.428490648	1032	flat	1.115455494	0.157632952	0.896494755	-0.157632952
YGR114C	YGR114C	0.680532419	1.167483056	0.091025083	390	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YGR115C	YGR115C	0.45368828	0.778322038	0.070566913	780	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YGR116W	SPT6	141.1120529	126.3728044	0.557351022	4356	flat	1.116633073	0.159155192	0.89554933	-0.159155192
YGR117C	YGR117C	116.2897222	89.72731415	0.772408293	1431	flat	1.296034807	0.374104464	0.771584216	-0.374104464
YGR118W	RPS23A	2111.344063	1312.938651	0.909721618	438	down	1.60810565	0.685362192	0.62184969	-0.685362192
YGR119C	NUP57	226.6683565	148.7858788	0.88707409	1626	flat	1.523453424	0.607345394	0.656403395	-0.607345394
YGR120C	COG2	65.37078843	52.32218108	0.645773525	789	flat	1.249389591	0.321223416	0.800390853	-0.321223416
YGR121C	MEP1	34.99289418	53.66948817	0.764810787	1479	flat	0.652007227	-0.617040138	1.53372533	0.617040138

YGR121W-A	YGR121W-A	66.3519109	64.64396924	0.125677831	216	flat	1.026420742	0.037622231	0.974259345	-0.037622231
YGR122C-A	YGR122C-A	21.94585167	18.824533	0.299557779	129	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YGR122W	YGR122W	38.56350377	38.53949444	0.005031173	1209	flat	1.00062298	0.00089849	0.999377408	-0.00089849
YGR123C	PPT1	103.90256	113.780385	0.462911411	1542	flat	0.913185168	-0.131020668	1.095068158	0.131020668
YGR124W	ASN2	342.0912559	182.5864717	0.926939249	1719	down	1.873584898	0.905801352	0.533736155	-0.905801352
YGR125W	YGR125W	58.01259969	85.52160519	0.814035088	3111	flat	0.678338527	-0.55992266	1.474190187	0.55992266
YGR126W	YGR126W	25.91522446	35.26034686	0.592786719	693	flat	0.734967939	-0.444246777	1.360603568	0.444246777
YGR127W	YGR127W	74.90205064	163.0870634	0.95245759	939	up	0.459276469	-1.122565225	2.177337763	1.122565225
YGR128C	UTP8	69.22241062	81.90912872	0.60785124	2142	flat	0.845112281	-0.242785065	1.183274723	0.242785065
YGR129W	SYF2	362.2049786	305.1851156	0.762403944	648	flat	1.186836972	0.247121775	0.842575706	-0.247121775
YGR130C	YGR130C	91.28463629	77.34158461	0.624662897	2451	flat	1.180278847	0.239127744	0.847257411	-0.239127744
YGR131W	FHN1	111.2184411	119.6836916	0.413368131	525	flat	0.929269808	-0.10583056	1.076113731	0.10583056
YGR132C	PHB1	541.0547796	453.5617624	0.773147745	864	flat	1.192902102	0.25447565	0.838291758	-0.25447565
YGR133W	PEX4	56.41515129	59.93925692	0.263447876	552	flat	0.941205383	-0.087418522	1.062467361	0.087418522
YGR134W	CAF130	32.37831449	51.22162973	0.770226185	3369	flat	0.632121911	-0.661725271	1.581973322	0.661725271
YGR135W	PRE9	807.95051	582.4793844	0.876671016	777	flat	1.387088594	0.472059936	0.720934484	-0.472059936
YGR136W	LSB1	102.1173578	174.9777292	0.899565028	726	flat	0.583602029	-0.776943195	1.713496441	0.776943195
YGR137W	YGR137W	212.090197	309.2117791	0.883173844	375	flat	0.685905943	-0.543917339	1.457925843	0.543917339
YGR138C	TPO2	74.70733671	118.2922941	0.866579672	1845	flat	0.631548634	-0.663034259	1.583409331	0.663034259
YGR139W	YGR139W	5.48039382	8.954147335	0.349963752	339	flat	0.612050887	-0.708276488	1.633851075	0.708276488
YGR140W	CBF2	25.23729944	27.17214136	0.200500217	2871	flat	0.928793175	-0.106570724	1.076665965	0.106570724
YGR141W	VPS62	122.5588478	117.6131079	0.252298101	1404	flat	1.042050924	0.059425782	0.959645999	-0.059425782
YGR142W	BTN2	74.47773291	952.8574405	0.999804263	1233	up	0.078162514	-3.677379322	12.79385668	3.677379322
YGR143W	SKN1	58.25369264	76.67278622	0.730027548	2316	flat	0.759770129	-0.396365103	1.316187571	0.396365103
YGR144W	THI4	19.38827739	25.37282239	0.471001885	981	flat	0.764175033	-0.388024971	0.388024971	0.388024971
YGR145W	ENP2	81.92982343	68.9551551	0.61722488	2124	flat	1.188160962	0.248730294	0.841636808	-0.248730294
YGR146C	ECL1	22.67371379	60.1363914	0.918479049	636	up	0.37703815	-1.407217586	2.6522515	1.407217586
YGR146C-A	YGR146C-A	10.37601899	12.17929855	0.20661157	162	flat	0.851938964	-0.231178021	1.173793009	0.231178021
YGR147C	NAT2	316.4279518	332.9548564	0.348412353	867	flat	0.950362927	-0.073449537	1.052229598	0.073449537
YGR148C	RPL24B	348.2057546	165.7177338	0.953487023	468	down	2.101197902	1.071212049	0.475918998	-1.071212049
YGR149W	YGR149W	37.86673078	57.36754695	0.770371176	1299	flat	0.660072337	-0.599303958	1.514985471	0.599303958
YGR150C	CCM1	54.78613786	64.7446962	0.560649558	2595	flat	0.846187272	-0.240951109	1.181771498	0.240951109
YGR151C	YGR151C	25.27691844	17.61648541	0.549702769	336	flat	1.434844571	0.520894466	0.696939599	-0.520894466
YGR152C	RSR1	89.54942472	46.69932226	0.89200377	819	flat	1.917574397	0.939282552	0.521492153	-0.939282552
YGR153W	YGR153W	250.7980485	196.5620173	0.81800058	654	flat	1.275923253	0.351541553	0.783746199	-0.351541553
YGR154C	GTO1	181.6468746	283.4225907	0.896636219	1071	flat	0.640904715	-0.641818212	1.560294342	0.641818212
YGR155W	CYS4	315.8536721	279.2460129	0.661273017	1524	flat	1.131094653	0.177719663	0.884099308	-0.177719663
YGR156W	PTI1	17.30618438	14.72599912	0.264252574	1278	flat	1.175212917	0.232922158	0.85090964	-0.232922158
YGR157W	CHO2	291.7450304	333.6094017	0.681600696	2610	flat	0.874510817	-0.193451865	1.143496433	0.193451865
YGR158C	MTR3	143.571554	102.7943249	0.837886037	753	flat	1.396687552	0.482009317	0.715979747	-0.482009317
YGR159C	NSR1	282.6040692	169.8148648	0.906060606	1245	down	1.664189231	0.734819488	0.600893205	-0.734819488
YGR160W	YGR160W	3.613938502	10.16778544	0.56569523	612	flat	0.355430248	-1.492361631	2.813491551	1.492361631
YGR161C	RTS3	55.62836974	130.5016098	0.95184138	792	up	0.426265774	-1.230174872	2.34595424	1.230174872
YGR161C-C	YGR161C-C	0.334350773	0.688312006	0.075764825	1323	flat	0.485754672	-1.041700222	2.058652355	1.041700222
YGR161C-D	YGR161C-D	24.2501036	34.65882217	0.630201537	5268	flat	0.699680545	-0.515231717	1.429223674	0.515231717
YGR161W-A	YGR161W-A	0.335874011	0.345723912	0.007401769	1317	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YGR161W-B	YGR161W-B	23.74498399	29.53756304	0.452363346	5313	flat	0.803891098	-0.31492802	1.243949588	0.31492802
YGR161W-C	YGR161W-C	255.8948248	380.2479761	0.890234885	279	flat	0.672968276	-0.571389598	1.485954147	0.571389598
YGR162W	TIF4631	90.14019654	76.70923125	0.612019719	2859	flat	1.175089296	0.232770392	0.850999157	-0.232770392

YGR163W	GTR2	94.24644394	88.60809513	0.323582717	1026	flat	1.063632434	0.088999677	0.940174413	-0.088999677
YGR164W	YGR164W	23.69711103	20.32671393	0.315361751	336	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YGR165W	MRPS35	350.0414875	304.8615438	0.701196172	1038	flat	1.148198238	0.199371747	0.870929746	-0.199371747
YGR166W	TRS65	58.24354706	81.25210362	0.779788314	1683	flat	0.716825097	-0.480306946	1.395040442	0.480306946
YGR167W	CLC1	316.6996241	188.7430941	0.90907641	702	down	1.677940195	0.746691296	0.595968797	-0.746691296
YGR168C	YGR168C	98.48164553	171.7676221	0.902167609	1131	up	0.573342312	-0.802531343	1.744158733	0.802531343
YGR169C	PUS6	81.77031104	67.32966071	0.651283167	1215	flat	1.214476802	0.280334933	0.823399836	-0.280334933
YGR169C-A	LSO2	275.8717442	201.8197413	0.858721183	279	flat	1.366921504	0.450930398	0.731570904	-0.450930398
YGR170W	PSD2	35.41875489	33.66806567	0.161099029	3417	flat	1.051998509	0.07313266	0.950571689	-0.07313266
YGR171C	MSM1	45.56574128	41.45645853	0.32891837	1728	flat	1.09912286	0.13635266	0.909816396	-0.13635266
YGR172C	YIP1	181.2020057	187.3286736	0.237965782	747	flat	0.967294554	-0.047972819	1.033811259	0.047972819
YGR173W	RBG2	179.3359687	126.8200881	0.856502827	1107	flat	1.414097494	0.499881589	0.70716482	-0.499881589
YGR174C	CBP4	225.7430835	123.0750169	0.914644048	513	down	1.83419096	0.875143847	0.545199503	-0.875143847
YGR174W-A	YGR174W-A	471.8358108	530.3235332	0.663208641	87	flat	0.889698031	-0.168612335	1.12397686	0.168612335
YGR175C	ERG1	331.9820626	288.0731163	0.699927505	1491	flat	1.152422922	0.204670262	0.867736992	-0.204670262
YGR176W	YGR176W	12.45687216	22.67869385	0.648057126	348	flat	0.549276437	-0.86439569	1.820576912	0.86439569
YGR177C	ATF2	70.09314634	76.26394294	0.384188778	1608	flat	0.919086316	-0.121727737	1.08803709	0.121727737
YGR178C	PBP1	111.5960216	108.5990694	0.162795418	2169	flat	1.027596482	0.039273856	0.973144632	-0.039273856
YGR179C	OKP1	91.72975069	72.46809242	0.720508917	1221	flat	1.265795023	0.3400438	0.790017327	-0.3400438
YGR180C	RNR4	181.7113347	189.0580221	0.279048862	1038	flat	0.961140567	-0.057180653	1.04043054	0.057180653
YGR181W	TIM13	72.05511498	51.06820539	0.769305495	318	flat	1.410958431	0.496675485	0.708738102	-0.496675485
YGR182C	YGR182C	761.2351058	498.1920636	0.899768015	354	flat	1.527995248	0.611640057	0.654452297	-0.611640057
YGR183C	QCR9	1641.301995	1550.951869	0.416717413	201	flat	1.058254629	0.081686799	0.944952162	-0.081686799
YGR184C	UBR1	42.32253557	63.34887133	0.77999855	5853	flat	0.668086655	-0.581892853	1.496811816	0.581892853
YGR185C	TYS1	109.5973054	75.43812458	0.83433768	1185	flat	1.452810579	0.538846613	0.688320979	-0.538846613
YGR186W	TFG1	184.5913367	166.8263492	0.562490938	2208	flat	1.106487899	0.145987673	0.903760449	-0.145987673
YGR187C	HGH1	155.4370503	159.8417309	0.183717558	1185	flat	0.972443488	-0.040313682	1.028337391	0.040313682
YGR188C	BUB1	48.82254109	47.76932467	0.088364506	3066	flat	1.022047965	0.031462905	0.978427661	-0.031462905
YGR189C	CRH1	215.5421217	183.2427474	0.715057271	1524	flat	1.176265499	0.234213733	0.850148203	-0.234213733
YGR190C	YGR190C	0.725157496	4.146797741	0.391561548	366	flat	0.174871682	-2.51563141	5.718478763	2.51563141
YGR191W	HIP1	105.0693983	115.3372748	0.467942584	1812	flat	0.910975211	-0.134516298	1.097724711	0.134516298
YGR192C	TDH3	1899.3871	2065.416596	0.562838915	999	flat	0.919614524	-0.120898843	1.087412143	0.120898843
YGR193C	PDX1	79.28506249	63.14634634	0.689067711	1233	flat	1.255576405	0.328349822	0.796446952	-0.328349822
YGR194C	XKS1	74.87743836	76.60191102	0.115050022	1803	flat	0.977487864	-0.032849305	1.023030604	0.032849305
YGR195W	SKI6	219.6806407	180.0381766	0.772734522	741	flat	1.220189211	0.287104879	0.819545027	-0.287104879
YGR196C	FVY8	92.75928646	94.13129484	0.088321009	2454	flat	0.985424525	-0.021182718	1.014791062	0.021182718
YGR197C	SNG1	32.93379519	42.29320266	0.580404524	1644	flat	0.778904435	-0.360481762	1.283854546	0.360481762
YGR198W	YPP1	68.42484481	88.31766691	0.73460925	2454	flat	0.774758293	-0.368181803	1.290725133	0.368181803
YGR199W	PMT6	84.86060183	86.53712129	0.1138466	2280	flat	0.980626586	-0.028224219	1.019756158	0.028224219
YGR200C	ELP2	117.2488069	97.33464569	0.695418298	2367	flat	1.204594788	0.268547922	0.830154679	-0.268547922
YGR201C	YGR201C	47.49674644	42.30834616	0.390097144	678	flat	1.122633021	0.1668864	0.890763038	-0.1668864
YGR202C	PCT1	67.23660304	73.68420514	0.400630709	1275	flat	0.912496822	-0.13210856	1.095894227	0.13210856
YGR203W	YCH1	117.5631173	81.48875025	0.837103088	447	flat	1.442691377	0.528762709	0.693148941	-0.528762709
YGR204C-A	YGR204C-A	4.656274449	1.331340328	0.37738872	114	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YGR204W	ADE3	72.02720634	63.30544345	0.504277222	2841	flat	1.137772716	0.186212391	0.87891016	-0.186212391
YGR205W	TDA10	114.0067198	124.8257371	0.474800638	873	flat	0.91332703	-0.130796564	1.094898067	0.130796564
YGR206W	MVB12	296.3429572	300.0736679	0.117174134	306	flat	0.98756735	-0.018048954	1.012589166	0.018048954
YGR207C	CIR1	345.2100267	285.0084591	0.786936349	786	flat	1.211227301	0.276469629	0.825608867	-0.276469629
YGR208W	SER2	154.2979204	155.8527112	0.066797158	930	flat	0.990023973	-0.014464635	1.010076551	0.014464635

YGR209C	TRX2	2245.432921	1773.573546	0.838357257	315	flat	1.266050075	0.340334468	0.789858174	-0.340334468
YGR210C	YGR210C	239.5683342	338.5417494	0.876337538	1236	flat	0.70764783	-0.498896533	1.413132293	0.498896533
YGR211W	ZPR1	80.77887213	228.5422	0.969175004	1461	up	0.353452763	-1.500410674	2.829232372	1.500410674
YGR212W	SLI1	24.01936031	21.03460944	0.284406264	1407	flat	1.141897137	0.191432698	0.875735622	-0.191432698
YGR213C	RTA1	5.935041645	13.84091548	0.61722488	954	flat	0.428804125	-1.221609312	2.332067121	1.221609312
YGR214W	RPS0A	239.764393	90.1838361	0.967065391	759	down	2.658618255	1.410676639	0.376135234	-1.410676639
YGR215W	RSM27	755.0435666	597.0641577	0.835986661	333	flat	1.26459369	0.338673927	0.790767823	-0.338673927
YGR216C	GPI1	79.42891774	104.0846233	0.769530231	1830	flat	0.763118655	-0.3900207	1.310412206	0.3900207
YGR217W	CCH1	28.08753004	34.99206161	0.497926635	6120	flat	0.802682916	-0.317097903	1.245821956	0.317097903
YGR218W	CRM1	105.7010062	151.2598939	0.852196607	3255	flat	0.698803916	-0.517040401	1.431016594	0.517040401
YGR219W	YGR219W	3.104182966	2.662680655	0.084667247	342	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YGR220C	MRPL9	254.9224033	245.6470831	0.256263593	810	flat	1.037758723	0.053471059	0.963615123	-0.053471059
YGR221C	TOS2	12.54378911	12.9116505	0.044504857	1869	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YGR222W	PETS4	200.8110742	202.5358078	0.06831231	882	flat	0.991484303	-0.012338163	1.008588837	0.012338163
YGR223C	HSV2	74.08557831	86.08345744	0.586334638	1347	flat	0.860625032	-0.216543292	1.161946217	0.216543292
YGR224W	AZR1	1.248751128	1.235934832	0.006162099	1842	flat	1.010369718	0.014883306	0.989736709	-0.014883306
YGR225W	AMA1	23.9293835	27.59505406	0.330977236	1782	flat	0.867162045	-0.205626483	1.153187004	0.205626483
YGR226C	YGR226C	1.263845922	1.445455213	0.051652893	210	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YGR227W	DIE2	29.15335333	34.81733374	0.437820792	1578	flat	0.837322971	-0.25614389	1.194282296	0.25614389
YGR228W	YGR228W	NA	NA	NA	345	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YGR229C	SMI1	220.7650755	150.1730841	0.877664202	1518	flat	1.470070865	0.555885702	0.680239316	-0.555885702
YGR230W	BNS1	93.8115584	44.72531709	0.922865014	414	down	2.097504602	1.068673976	0.476756999	-1.068673976
YGR231C	PHB2	274.7950522	215.3774745	0.821821082	933	flat	1.275876472	0.351488656	0.783774936	-0.351488656
YGR232W	NAS6	399.9787195	396.959221	0.075315355	687	flat	1.0075152	0.010801605	0.992540857	-0.010801605
YGR233C	PHO81	43.42170099	58.18600882	0.694417863	3537	flat	0.746256736	-0.422256047	1.340021406	0.422256047
YGR234W	YHB1	164.331566	122.6830112	0.825656082	1200	flat	1.339481028	0.421674148	0.746557793	-0.421674148
YGR235C	MIC26	437.6831653	359.3253407	0.79399739	702	flat	1.218069297	0.284596212	0.820971354	-0.284596212
YGR236C	SPG1	23.34604272	26.34944398	0.282637379	288	flat	0.886016522	-0.174594493	1.128647124	0.174594493
YGR237C	YGR237C	39.84491341	44.2187921	0.347723648	2358	flat	0.901085523	-0.150264054	1.109772574	0.150264054
YGR238C	KEL2	39.67588783	43.60101879	0.320342178	2649	flat	0.909976164	-0.136099339	1.098929884	0.136099339
YGR239C	PEX21	71.12230972	94.87988023	0.772190808	867	flat	0.749603705	-0.415800012	1.334038231	0.415800012
YGR240C	PFK1	142.613329	162.4747254	0.627591707	2964	flat	0.877757009	-0.188106484	1.139267462	0.188106484
YGR240C-A	YGR240C-A	1.320436038	0.755088544	0.099855009	201	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YGR241C	YAP1802	19.84985891	24.9842742	0.424952878	1707	flat	0.794494119	-0.331891555	1.258662558	0.331891555
YGR242W	YGR242W	0.143154069	0.982348203	0.139270697	309	flat	0.145726402	-2.778665816	6.862174516	2.778665816
YGR243W	MPC3	353.2750267	427.7859118	0.79276497	441	flat	0.825822022	-0.276097204	1.210914668	0.276097204
YGR244C	LSC2	228.6832734	96.92650282	0.962650428	1284	down	2.359345987	1.238386998	0.423846272	-1.238386998
YGR245C	SDA1	67.69584428	46.57264224	0.776344788	2304	flat	1.453553868	0.539584538	0.687968999	-0.539584538
YGR246C	BRF1	77.84895706	71.26796346	0.403704509	1791	flat	1.092341541	0.127424013	0.915464589	-0.127424013
YGR247W	CPD1	195.6152632	135.3307443	0.86816007	720	flat	1.445460632	0.531529317	0.691820986	-0.531529317
YGR248W	SOL4	263.4493407	189.7159967	0.863012904	768	flat	1.38865117	0.473684238	0.720123255	-0.473684238
YGR249W	MGA1	2.839274573	4.538792626	0.210794548	1371	flat	0.625557237	-0.676786202	1.598574745	0.676786202
YGR250C	YGR250C	77.30685839	211.6150128	0.9669204	2346	up	0.365318402	-1.452773666	2.737338151	1.452773666
YGR251W	NOP19	105.0852599	80.89413056	0.764760041	591	flat	1.299046781	0.377453386	0.769795218	-0.377453386
YGR252W	GCN5	112.0610051	94.05314259	0.670204437	1320	flat	1.191464761	0.252736283	0.839303043	-0.252736283
YGR253C	PUP2	1402.287895	1218.640583	0.725148615	783	flat	1.150698503	0.202509879	0.86903737	-0.202509879
YGR254W	ENO1	686.4780147	962.3827606	0.882129912	1314	flat	0.713310798	-0.487397282	1.401913448	0.487397282
YGR255C	COQ6	128.0346132	113.3026091	0.581288966	1440	flat	1.130023521	-0.176352801	0.884937333	-0.176352801
YGR256W	GND2	32.95911914	67.83084452	0.891880528	1479	flat	0.485901648	-1.041263769	2.058029653	1.041263769

YGR257C	MTM1	369.2243785	425.8185022	0.721966072	1101	flat	0.867093319	-0.205740826	1.153278405	0.205740826
YGR258C	RAD2	82.92560096	80.20035415	0.183297086	3096	flat	1.033980483	0.048208955	0.967136243	-0.048208955
YGR259C	YGR259C	2.407325565	2.409092021	0.002791069	441	flat	0.999266755	-0.001058238	1.000733784	0.001058238
YGR260W	TNA1	77.94110239	140.4252985	0.900645208	1605	up	0.555036046	-0.849346627	1.801684787	0.849346627
YGR261C	APL6	44.78071353	41.15978331	0.29753516	2430	flat	1.087972529	0.121642129	0.919140855	-0.121642129
YGR262C	BUD32	167.2585913	123.5809037	0.833442076	786	flat	1.353433956	0.436624489	0.738861321	-0.436624489
YGR263C	SAY1	33.99993343	47.97210771	0.695664782	1275	flat	0.70874379	-0.496663906	1.410947107	0.496663906
YGR264C	MES1	169.330704	198.0581185	0.705922865	2256	flat	0.854954623	-0.226080244	1.16965272	0.226080244
YGR265W	YGR265W	1.076267817	1.846384396	0.121067131	411	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YGR266W	YGR266W	57.50919026	49.58199647	0.499304045	2106	flat	1.159880488	0.21397616	0.862157792	-0.21397616
YGR267C	FOL2	456.4866438	333.8172182	0.868442801	732	flat	1.36747483	0.451514279	0.731274886	-0.451514279
YGR268C	HUA1	23.41396297	37.6254171	0.7169204	597	flat	0.622291121	-0.684338434	1.606964918	0.684338434
YGR269W	YGR269W	21.91439259	27.3840827	0.439466435	327	flat	0.80026024	-0.321458863	1.249593507	0.321458863
YGR270C-A	YGR270C-A	0.201984508	2.772105887	0.319486733	219	flat	0.072863201	-3.778665816	13.72434903	3.778665816
YGR270W	YTA7	70.34798411	71.74380782	0.104240974	4140	flat	0.980544332	-0.028345237	1.019841702	0.028345237
YGR271C-A	EFG1	566.1021534	418.3480952	0.868174569	702	flat	1.353184489	0.436358545	0.738997534	-0.436358545
YGR271W	SLH1	35.2887873	38.50874838	0.282013919	5904	flat	0.916383648	-0.12597638	1.091246011	0.12597638
YGR273C	YGR273C	1.853640685	4.914547723	0.353414528	525	flat	0.377174216	-1.406697039	2.651294699	1.406697039
YGR274C	TAF1	72.41154079	85.10845711	0.60230535	3201	flat	0.850814869	-0.233082849	1.175343822	0.233082849
YGR275W	RTT102	244.6901693	217.0927354	0.629440336	474	flat	1.127122788	0.172644691	0.887214783	-0.172644691
YGR276C	RNH70	241.4538851	245.9230705	0.156553574	1662	flat	0.981826897	-0.026459406	1.018509478	0.026459406
YGR277C	CAB4	228.7864001	236.4216778	0.248629839	918	flat	0.967704833	-0.047361028	1.033372953	0.047361028
YGR278W	CWC22	67.19374598	97.6807623	0.823133246	1734	flat	0.687891294	-0.539747498	1.453718064	0.539747498
YGR279C	SCW4	153.5447608	60.65682857	0.959612875	1161	down	2.531368098	1.339917312	0.395043297	-1.339917312
YGR280C	PXR1	89.11972346	48.91696777	0.876199797	816	flat	1.821857068	0.865409778	0.54889048	-0.865409778
YGR281W	YOR1	56.32579896	70.47816638	0.662135711	4434	flat	0.799195011	-0.323380517	1.251259062	0.323380517
YGR282C	BGL2	406.6578545	465.9521549	0.710961288	942	flat	0.872745947	-0.196366344	1.145808816	0.196366344
YGR283C	YGR283C	65.79143342	59.46653463	0.416898652	1026	flat	1.106360642	0.145821739	0.903864402	-0.145821739
YGR284C	ERV29	126.7774275	202.0383862	0.892547484	933	flat	0.627491784	-0.672331524	1.593646363	0.672331524
YGR285C	ZUO1	106.4756215	58.86732923	0.887139336	1302	flat	1.808738784	0.854984071	0.552871431	-0.854984071
YGR286C	BIO2	84.7045671	67.81337753	0.69354067	1128	flat	1.249083443	0.320869857	0.800587027	-0.320869857
YGR287C	IMA1	16.2443473	22.63729859	0.496904451	1770	flat	0.71759213	-0.478764028	1.393549286	0.478764028
YGR288W	MAL13	19.47318154	33.08689675	0.711671741	1422	flat	0.588546629	-0.764771375	1.699100719	0.764771375
YGR289C	MAL11	28.77280775	50.34494736	0.802428592	1851	flat	0.571513315	-0.807140985	1.749740512	0.807140985
YGR290W	YGR290W	0.996274938	1.025491874	0.012295201	444	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YGR291C	YGR291C	1.195529926	2.050983748	0.130194287	222	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YGR292W	MAL12	2.369261016	3.286248603	0.134384515	1755	flat	0.720962198	-0.472004478	1.387035274	0.472004478
YGR293C	YGR293C	0.957459032	0.657025097	0.0676961	462	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YGR294W	PAU12	0.731150533	2.926748158	0.283529071	363	flat	0.249816689	-2.001058238	4.002935134	2.001058238
YGR295C	COS6	139.6516659	130.185567	0.408880673	1146	flat	1.072712353	0.10126327	0.932216356	-0.10126327
YGR296C-A	YGR296C-A	NA	NA	NA	576	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YGR296C-B	YGR296C-B	0.732664303	0.157114697	0.106075105	483	flat	4.663244854	2.221334184	0.214442954	-2.221334184
YGR296W	YRF1-3	28.98238784	22.00433567	0.511860229	5580	flat	1.317121692	0.397388646	0.759231289	-0.397388646
YHL001W	RPL14B	1306.883361	847.3071276	0.903088299	417	down	1.542396279	0.625173476	0.648341813	-0.625173476
YHL002C-A	YHL002C-A	2.171023669	1.241495275	0.137547308	489	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YHL002W	HSE1	88.66451081	113.5783185	0.760946788	1359	flat	0.780646447	-0.357258792	1.280989626	0.357258792
YHL003C	LAG1	262.9740244	272.4788328	0.257104538	1236	flat	0.96511726	-0.051223857	1.036143525	0.051223857
YHL004W	MRP4	63.30961512	52.76826372	0.581636944	1185	flat	1.19976688	0.262754111	0.833495254	-0.262754111
YHL005C	YHL005C	5.177587619	4.634283888	0.092757721	393	flat	1.117235746	0.159933639	0.895066241	-0.159933639

YHL006C	SHU1	49.9958475	46.90550028	0.245621285	453	flat	1.065884538	0.092051167	0.938187922	-0.092051167
YHL006W-A	YHL006W-A	4.498434637	9.86094446	0.501703639	354	flat	0.456186997	-1.132302771	2.192083526	1.132302771
YHL007C	STE20	52.79918016	51.88261583	0.081796433	2820	flat	1.017666116	0.025264309	0.982640557	-0.025264309
YHL008C	YHL008C	60.20038908	152.9811795	0.959649123	1884	up	0.393515002	-1.34550946	2.541199182	1.34550946
YHL009C	YAP3	53.90118307	55.32905603	0.113621865	993	flat	0.974193072	-0.037720371	1.026490568	0.037720371
YHL009W-A	YHL009W-A	1.567087536	2.077405439	0.092511237	1242	flat	0.754348432	-0.406697039	1.32564735	0.406697039
YHL009W-B	YHL009W-B	24.73016313	28.1715453	0.312215456	5409	flat	0.87784191	-0.187966946	1.139157277	0.187966946
YHL010C	ETP1	55.25551624	62.24584009	0.448651588	1758	flat	0.887698136	-0.171858927	1.126509068	0.171858927
YHL011C	PRS3	288.5584661	258.4708075	0.61860954	963	flat	1.116406409	0.158862312	0.895731153	-0.158862312
YHL012W	YHL012W	26.38555521	53.15120231	0.861215021	1482	flat	0.496424428	-1.010353985	2.014405302	1.010353985
YHL013C	OTU2	127.0548135	104.7955029	0.715253009	924	flat	1.212407116	0.277874225	0.824805452	-0.277874225
YHL014C	YLF2	130.3068726	100.5588239	0.784101783	1218	flat	1.295827334	0.373873495	0.771707753	-0.373873495
YHL015W	RPS20	1582.777095	949.6166828	0.91292591	366	down	1.666753674	0.737040907	0.599968679	-0.737040907
YHL015W-A	YHL015W-A	5.266024674	7.227276064	0.227569958	84	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YHL016C	DUR3	21.71662784	22.75217206	0.113650863	2208	flat	0.954485918	-0.067204182	1.047684393	0.067204182
YHL017W	YHL017W	145.2909052	186.3227024	0.805922865	1599	flat	0.77978101	-0.358859073	1.282411327	0.358859073
YHL018W	YHL018W	32.65805715	39.30204669	0.47876613	363	flat	0.830950546	-0.267165478	1.203441053	0.267165478
YHL019C	APM2	28.66246829	40.82337618	0.665803973	1818	flat	0.702109207	-0.510232647	1.424279855	0.510232647
YHL019W-A	YHL019W-A	20.85133002	22.74036862	0.200804698	594	flat	0.916930168	-0.12511623	1.090595593	0.12511623
YHL020C	OPI1	100.2651098	83.94347309	0.661555749	1215	flat	1.194436043	0.256329605	0.837215191	-0.256329605
YHL021C	AIM17	47.96828656	81.20604607	0.852950558	1398	flat	0.590698463	-0.759506238	1.692911127	0.759506238
YHL022C	SPO11	5.321456513	8.368424916	0.318602291	1197	flat	0.635897026	-0.653134934	1.57258166	0.653134934
YHL023C	NPR3	43.81038697	44.01896302	0.025605336	3441	flat	0.995261677	-0.006852201	1.004760881	0.006852201
YHL024W	RIM4	29.82015541	21.96525078	0.547977381	2142	flat	1.357605962	0.441064805	0.736590755	-0.441064805
YHL025W	SNF6	104.8524024	89.48366129	0.633898797	999	flat	1.171749131	0.228663725	0.853424998	-0.228663725
YHL026C	YHL026C	11.66524453	10.72655846	0.126112803	948	flat	1.08751046	0.121029278	0.919531385	-0.121029278
YHL027W	RIM101	104.0620314	145.0650539	0.838197767	1878	flat	0.717347346	-0.479256242	1.394024814	0.479256242
YHL028W	WSC4	63.1644887	19.36814575	0.938393504	1818	down	3.261256369	1.705427857	0.306630294	-1.705427857
YHL029C	OCA5	79.92586391	100.4378806	0.726025808	2040	flat	0.795774099	-0.329569153	1.256638035	0.329569153
YHL030W	ECM29	129.5718191	126.2743177	0.168254313	5607	flat	1.026113793	0.03719073	0.974550783	-0.03719073
YHL030W-A	YHL030W-A	9.766082123	22.01034074	0.733521821	462	flat	0.443704268	-1.172329665	2.253753395	1.172329665
YHL031C	GOS1	32.7810036	27.32813762	0.429048862	672	flat	1.199533026	0.262472878	0.833657747	-0.262472878
YHL032C	GUT1	31.10959703	31.70840132	0.061410758	2130	flat	0.98111528	-0.027505434	1.019248217	0.027505434
YHL033C	RPL8A	557.3216277	324.6087455	0.914085834	771	down	1.716902688	0.779808271	0.582444193	-0.779808271
YHL034C	SBP1	242.8155052	149.200377	0.900877193	885	down	1.627445654	0.702609368	0.614459842	-0.702609368
YHL034W-A	YHL034W-A	1.723426257	0.985537645	0.118319559	462	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YHL035C	VMR1	31.45201831	33.69553002	0.218094824	4779	flat	0.933418121	-0.09940462	1.071331248	0.09940462
YHL036W	MUP3	36.22870942	144.0962939	0.978483399	1641	up	0.251420133	-1.991827912	3.977406211	1.991827912
YHL037C	YHL037C	2.640872075	8.305973984	0.525271857	402	flat	0.317948513	-1.653134934	3.14516332	1.653134934
YHL038C	CBP2	96.55435669	104.4690729	0.405197912	1893	flat	0.924238667	-0.113662646	1.081971611	0.113662646
YHL039W	EFM1	108.9509951	97.46956097	0.524648398	1758	flat	1.117795074	0.160655723	0.894618364	-0.160655723
YHL040C	ARN1	50.24525453	55.74669626	0.390735102	1884	flat	0.901313583	-0.149898963	1.109491767	0.149898963
YHL041W	YHL041W	3.145572072	1.349091532	0.242206757	450	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YHL042W	YHL042W	21.28729444	32.8338502	0.66584022	453	flat	0.648333787	-0.625191336	1.542415373	0.625191336
YHL043W	ECM34	2.24190992	3.550240873	0.174133681	513	flat	0.631481074	-0.663188599	1.583578734	0.663188599
YHL044W	YHL044W	48.23321583	73.95708345	0.81291866	708	flat	0.652178447	-0.616661331	1.533322674	0.616661331
YHL045W	YHL045W	4.830215736	3.925158552	0.131919675	348	flat	1.230578503	0.299336696	0.812625929	-0.299336696
YHL046C	PAU13	1.218584222	1.672427519	0.086349137	363	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YHL046W-A	YHL046W-A	1.352740283	1.85654798	0.091583297	327	flat	0.728632008	-0.456737721	1.372434903	0.456737721

YHL047C	ARN2	43.30860099	57.43415036	0.683703059	1863	flat	0.754056615	-0.407255249	1.326160371	0.407255249
YHL048C-A	YHL048C-A	7.86393018	4.496971773	0.345396549	135	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YHL048W	COS8	45.54697781	39.46622479	0.441402059	1146	flat	1.154074859	0.206736807	0.866494918	-0.206736807
YHL049C	YHL049C	19.73210422	23.06351332	0.314339568	816	flat	0.855555004	-0.225067487	1.168831923	0.225067487
YHL050C	YHL050C	13.98438873	10.87197689	0.309293896	2094	flat	1.286278372	0.3632029	0.777436669	-0.3632029
YHL050W-A	YHL050W-A	0.366332151	0.157114697	0.057351022	483	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YHR001W	OSH7	113.313309	106.1485546	0.349818762	1314	flat	1.067497428	0.094232594	0.936770407	-0.094232594
YHR001W-A	QCR10	476.7507672	396.9442392	0.779244599	234	flat	1.201052239	0.264298901	0.832603252	-0.264298901
YHR002W	LEU5	84.26816244	109.2368458	0.765187763	1074	flat	0.771426178	-0.37439999	1.296300318	0.37439999
YHR003C	TCD1	219.0470319	196.3634099	0.599463535	1290	flat	1.115518579	0.157714542	0.896444057	-0.157714542
YHR004C	NEM1	123.2367582	117.7059726	0.280846745	1341	flat	1.046988148	0.06624511	0.95512065	-0.06624511
YHR005C	GPA1	304.9974612	240.2267109	0.821045382	1419	flat	1.269623432	0.34440066	0.787635117	-0.34440066
YHR005C-A	TIM10	1284.372214	815.913336	0.905118167	282	down	1.57415274	0.654575533	0.63526237	-0.654575533
YHR006W	STP2	88.79566919	130.8643677	0.852385095	1626	flat	0.678532062	-0.559511108	1.473769711	0.559511108
YHR007C	ERG11	137.0634159	173.1143583	0.790242134	1593	flat	0.791750709	-0.336881841	1.263023814	0.336881841
YHR007C-A	YHR007C-A	68.80938908	56.914799	0.610294331	216	flat	1.208989407	0.273801604	0.827137107	-0.273801604
YHR008C	SOD2	137.4927536	94.69584791	0.851355662	702	flat	1.451940678	0.53798251	0.688733373	-0.53798251
YHR009C	TDA3	69.61604222	61.01807119	0.501674641	1572	flat	1.140908601	0.19018322	0.876494401	-0.19018322
YHR010W	RPL27A	1573.934055	1138.111342	0.877591707	411	flat	1.382935041	0.467733392	0.723099763	-0.467733392
YHR011W	DIA4	47.104414	43.12113034	0.318196317	1341	flat	1.092374287	0.12746726	0.915437147	-0.12746726
YHR012W	VPS29	270.5136407	196.8219669	0.861026533	849	flat	1.37440777	0.458810098	0.727586108	-0.458810098
YHR013C	ARD1	189.1538436	86.57611452	0.955284906	717	down	2.184827128	1.127519132	0.457702116	-1.127519132
YHR014W	SPO13	3.433736637	2.252336034	0.161135276	876	flat	1.524522356	0.608357307	0.655943152	-0.608357307
YHR015W	MIP6	13.13633791	36.25683492	0.864325069	1980	flat	0.362313422	-1.464689845	2.760041281	1.464689845
YHR016C	YSC84	85.26244129	75.4009846	0.519493983	1407	flat	1.130786842	0.177327001	0.884339968	-0.177327001
YHR017W	YSC83	76.016294	103.9342213	0.797172684	1158	flat	0.731388498	-0.451290157	1.36726241	0.451290157
YHR018C	ARG4	533.2939505	202.2546976	0.969805713	1392	down	2.636744446	1.398757751	0.379255563	-1.398757751
YHR019C	DED81	92.24177563	48.03859711	0.894222126	1665	flat	1.920159646	0.941226264	0.52079003	-0.941226264
YHR020W	YHR020W	112.6516558	90.02102058	0.735551689	2067	flat	1.251392787	0.323534694	0.799109608	-0.323534694
YHR021C	RPS27B	1172.838864	796.0452744	0.89369291	249	flat	1.473331859	0.559082425	0.678733711	-0.559082425
YHR021W-A	ECM12	13.38678904	11.64922787	0.200405974	456	flat	1.149156768	0.200575624	0.87020329	-0.200575624
YHR022C	YHR022C	27.76854723	145.0798335	0.987066841	771	up	0.191401841	-2.385323388	5.224610143	2.385323388
YHR022C-A	YHR022C-A	22.60879927	11.8045509	0.673481224	90	flat	1.915261279	0.937541218	0.522121974	-0.937541218
YHR023W	MYO1	98.46729061	85.15746897	0.596179498	5787	flat	1.156296586	0.209511491	0.864830021	-0.209511491
YHR024C	MAS2	126.5677583	105.3715901	0.697266928	1449	flat	1.201156385	0.264423995	0.832531062	-0.264423995
YHR025W	THR1	39.7040609	26.2846744	0.697607656	1074	flat	1.510540336	0.595064709	0.662014761	-0.595064709
YHR026W	VMA16	273.4001894	248.6993502	0.567043642	642	flat	1.09932008	0.136611505	0.909653174	-0.136611505
YHR027C	RPN1	204.2030864	222.3150834	0.505814122	2982	flat	0.918530058	-0.122601163	1.088696	0.122601163
YHR028C	DAP2	80.65569416	88.27160252	0.426584022	2457	flat	0.913721875	-0.130173	1.094424931	0.130173
YHR028W-A	YHR028W-A	3.582865386	9.456249055	0.531549949	321	flat	0.378888644	-1.400154193	2.639297891	1.400154193
YHR029C	YH19	46.98365065	26.92466574	0.790191388	885	flat	1.745004046	0.803230381	0.573064574	-0.803230381
YHR030C	SLT2	64.4517989	146.1399925	0.95230535	1455	up	0.441027797	-1.181058507	2.267430777	1.181058507
YHR031C	RRM3	59.99776842	55.48232094	0.326497028	2172	flat	1.081385339	0.112880702	0.924739743	-0.112880702
YHR032C-A	YHR032C-A	2.211730363	1.264773311	0.139444686	120	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YHR032W	ERC1	49.65626016	56.06727049	0.437494563	1746	flat	0.88565503	-0.175183228	1.129107797	0.175183228
YHR032W-A	YHR032W-A	31.94721636	43.00229258	0.633732057	180	flat	0.742918911	-0.428723345	1.346041924	0.428723345
YHR033W	YHR033W	20.86538078	5.250002424	0.807481514	1272	flat	3.97435641	1.990721256	0.251613066	-1.990721256
YHR034C	PIH1	79.15216681	85.6379842	0.379440336	1035	flat	0.924264712	-0.113621992	1.081941122	0.113621992
YHR035W	NEL1	14.487827	13.06865608	0.169290996	1893	flat	1.108593485	0.148730435	0.902043908	-0.148730435

YHR036W	BRL1	32.67612938	27.65351816	0.405806873	1416	flat	1.181626482	0.240774065	0.846291121	-0.240774065
YHR037W	PUT2	75.92583631	98.72258345	0.756821807	1728	flat	0.769082753	-0.378789254	1.300250195	0.378789254
YHR038W	RRF1	106.2141219	82.78516218	0.753465275	693	flat	1.283009166	0.359531478	0.779417658	-0.359531478
YHR039C	MSC7	108.5862452	112.0844069	0.202319849	1935	flat	0.968789934	-0.045744219	1.032215514	0.045744219
YHR039C-A	VMA10	917.7719385	648.0038565	0.883753806	345	flat	1.416306291	0.502133297	0.706061963	-0.502133297
YHR040W	BCD1	40.25710852	33.77323828	0.468218066	1101	flat	1.191982486	0.253363038	0.838938501	-0.253363038
YHR041C	SRB2	51.57210136	38.84232728	0.661490503	633	flat	1.327729438	0.408961187	0.753165496	-0.408961187
YHR042W	NCP1	42.87091995	32.60629461	0.608844425	2076	flat	1.314805023	0.394848874	0.760569044	-0.394848874
YHR043C	DOG2	169.5361466	89.71185592	0.918007829	741	down	1.889785301	0.918222338	0.52916064	-0.918222338
YHR044C	DOG1	57.90495148	70.66344815	0.631571698	741	flat	0.819447012	-0.287277431	1.220335159	0.287277431
YHR045W	YHR045W	96.66956953	103.6167226	0.374960128	1683	flat	0.93295336	-0.100123135	1.071864943	0.100123135
YHR046C	INM1	193.0780831	145.6198461	0.831267218	888	flat	1.325905007	0.406977419	0.754201843	-0.406977419
YHR047C	AAP1	56.43310456	71.2523401	0.676671016	2571	flat	0.79201756	-0.336395678	1.262598268	0.336395678
YHR048W	YHK8	15.74694757	27.21104522	0.672705524	1545	flat	0.578696902	-0.789120174	1.72802031	0.789120174
YHR049C-A	YHR049C-A	6.851151293	13.79752703	0.562889662	297	flat	0.496549221	-1.009991362	2.013899043	1.009991362
YHR049W	FSH1	84.23912913	163.7985108	0.925090619	732	up	0.514285073	-0.959359814	1.944446868	0.959359814
YHR050W	SMF2	92.27607164	102.0097165	0.473966942	1650	flat	0.904581199	-0.144678084	1.105483954	0.144678084
YHR050W-A	YHR050W-A	320.7655731	273.3685472	0.73677686	171	flat	1.173381416	0.230672048	0.852237803	-0.230672048
YHR051W	COX6	658.8680429	442.0764701	0.89554154	447	flat	1.490393829	0.575693606	0.675093594	-0.575693606
YHR052W	CIC1	128.5189385	106.4154096	0.70861244	1131	flat	1.207709851	0.272273893	0.82801345	-0.272273893
YHR052W-A	YHR052W-A	NA	NA	NA	195	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YHR053C	CUP1-1	1945.847079	7881.577685	0.986987096	186	up	0.246885479	-2.018086113	4.05046099	2.018086113
YHR054C	YHR054C	190.4787877	320.6467549	0.909315644	1065	up	0.594045581	-0.751354463	1.68337251	0.751354463
YHR054W-A	YHR054W-A	NA	NA	NA	195	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YHR055C	CUP1-2	1929.199646	7954.200153	0.987211831	186	up	0.242538484	-2.043714415	4.123057025	2.043714415
YHR056C	RSC30	91.80515776	153.2607659	0.891706539	2652	flat	0.599012782	-0.739341307	1.669413459	0.739341307
YHR056W-A	YHR056W-A	2.033775047	2.442320877	0.08199942	435	flat	0.832722295	-0.264092643	1.20088054	0.264092643
YHR057C	CPR2	251.5216989	189.102029	0.844113383	618	flat	1.330084612	0.411518024	0.751831869	-0.411518024
YHR058C	MED6	86.67591964	94.85799834	0.436914601	888	flat	0.913743924	-0.130138187	1.094398522	0.130138187
YHR059W	FV4	219.0344675	139.414707	0.892243004	393	flat	1.571100154	0.651775152	0.63649666	-0.651775152
YHR060W	VMA22	307.535841	202.3637298	0.892474989	546	flat	1.519718189	0.603803821	0.658016734	-0.603803821
YHR061C	GIC1	19.75344367	19.11213003	0.07661302	945	flat	1.03355532	0.047615609	0.967534085	-0.047615609
YHR062C	RPP1	71.91885127	69.51951261	0.172553284	882	flat	1.034513169	0.04895201	0.966638251	-0.04895201
YHR063C	PAN5	134.2559133	130.7376202	0.172016819	1140	flat	1.0269111	0.038311292	0.973794129	-0.038311292
YHR063W-A	YHR063W-A	2.369711103	2.25852377	0.03045527	336	flat	1.049230092	0.06933109	0.953079794	-0.06933109
YHR064C	SSZ1	230.5014229	170.8265251	0.847571408	1617	flat	1.349330396	0.432243649	0.741108332	-0.432243649
YHR065C	RRP3	232.2757465	236.6285047	0.15569813	1506	flat	0.981605098	-0.026785354	1.018739616	0.026785354
YHR066W	SSF1	128.4167673	93.15863331	0.822299551	1362	flat	1.378474144	0.463072207	0.725439795	-0.463072207
YHR067W	HTD2	37.78044748	42.30914279	0.358568943	843	flat	0.892961781	-0.163329667	1.119868758	0.163329667
YHR068W	DYS1	107.7743524	77.32067768	0.813157895	1164	flat	1.393861974	0.479087706	0.717431151	-0.479087706
YHR069C	RRP4	256.2330584	231.4535159	0.589256198	1080	flat	1.107060557	0.146734141	0.903292953	-0.146734141
YHR069C-A	YHR069C-A	22.42194969	90.311108602	0.968718283	363	up	0.24827461	-2.009991362	4.027798085	2.009991362
YHR070C-A	YHR070C-A	1.506774943	1.477107517	0.012295201	411	flat	1.020084812	0.028689106	0.980310645	-0.028689106
YHR070W	TRM5	19.28628877	13.2548243	0.486182398	1500	flat	1.455039186	0.541058008	0.687266714	-0.541058008
YHR071C-A	YHR071C-A	30.31655326	46.80843282	0.743707409	321	flat	0.647672896	-0.626662723	1.543989266	0.626662723
YHR071W	PCL5	238.6104467	188.9461347	0.809975352	690	flat	1.26284905	0.336682203	0.791860278	-0.336682203
YHR072W	ERG7	77.83357125	90.74575724	0.598644338	2196	flat	0.857710306	-0.221437638	1.165894816	0.221437638
YHR072W-A	NOP10	1436.000301	858.3309047	0.912911411	177	down	1.673014794	0.742450202	0.597723346	-0.742450202
YHR073C-B	YHR073C-B	NA	NA	NA	81	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!

YHR073W	OSH3	52.85673232	42.62425602	0.591590547	2991	flat	1.240062285	0.310412585	0.806411107	-0.310412585
YHR073W-A	YHR073W-A	NA	NA	NA	177	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YHR074W	QNS1	104.4307931	121.7720206	0.643627664	2145	flat	0.857592677	-0.221635509	1.166054734	0.221635509
YHR075C	PPE1	53.83164176	72.79543147	0.743134696	1203	flat	0.739492035	-0.435393487	1.352279609	0.435393487
YHR076W	PTC7	136.2185871	120.5946646	0.588835726	1032	flat	1.129557328	0.175757494	0.885302565	-0.175757494
YHR077C	NMD2	79.16236138	80.48135492	0.086871103	3270	flat	0.983611191	-0.023839945	1.016661877	0.023839945
YHR078W	YHR078W	64.09885224	104.2008536	0.864564303	1659	flat	0.615147093	-0.700996667	1.625627449	0.700996667
YHR079C	IRE1	27.03225999	42.74843127	0.736349137	3348	flat	0.632356772	-0.661189347	1.581385769	0.661189347
YHR079C-A	SAE3	21.796763	40.14280509	0.779440336	276	flat	0.542980565	-0.881027534	1.841686543	0.881027534
YHR080C	YHR080C	45.70252142	41.04405515	0.364172829	4038	flat	1.113499172	0.155100485	0.898069819	-0.155100485
YHR081W	LRP1	585.4908558	417.0333621	0.880375526	555	flat	1.403942488	0.489483837	0.712279889	-0.489483837
YHR082C	KSP1	98.83356911	182.7658831	0.910881543	3090	up	0.540765965	-0.886923742	1.849228807	0.886923742
YHR083W	SAM35	85.87769208	101.6417825	0.644316369	990	flat	0.844905412	-0.243138256	1.183564439	0.243138256
YHR084W	STE12	52.60215997	44.86365707	0.503117297	2067	flat	1.172489347	0.229574814	0.852886214	-0.229574814
YHR085W	IPI1	189.9667313	172.4622234	0.540807598	1005	flat	1.101497635	0.139466398	0.907854877	-0.139466398
YHR086W	NAM8	61.06176702	89.30651243	0.815796723	1572	flat	0.683732523	-0.548496044	1.462560237	0.548496044
YHR086W-A	YHR086W-A	2.18442505	0.46843456	0.238183268	162	flat	4.663244854	2.221334184	0.214442954	-2.221334184
YHR087W	RTC3	762.7836741	1126.551656	0.893671161	336	flat	0.677096048	-0.562567597	1.476895344	0.562567597
YHR088W	RPF1	233.825728	165.9587683	0.865513992	888	flat	1.408938681	0.494608825	0.709754096	-0.494608825
YHR089C	GAR1	321.9535008	267.6898853	0.776047557	618	flat	1.202710743	0.26628971	0.831455116	-0.26628971
YHR090C	YNG2	111.6025074	105.1147289	0.339734667	849	flat	1.061720927	0.086404604	0.94186709	-0.086404604
YHR091C	MSR1	52.75182978	88.37701708	0.85799623	1932	flat	0.596895341	-0.744450101	1.675335575	0.744450101
YHR092C	HXT4	29.79639057	45.85625246	0.736697115	1731	flat	0.649778143	-0.621980879	1.538986823	0.621980879
YHR093W	AHT1	3.384068315	4.146797741	0.117790344	549	flat	0.81606785	-0.293238989	1.225388306	0.293238989
YHR094C	HXT1	40.64522582	55.55256505	0.700942439	1713	flat	0.731653449	-0.450767288	1.366767288	0.450767288
YHR095W	YHR095W	7.149027437	11.34463334	0.395744527	495	flat	0.630168224	-0.666191087	1.586877857	0.666191087
YHR096C	HXT5	37.34703772	97.85463662	0.947926635	1779	up	0.381658335	-1.389646395	2.62014453	1.389646395
YHR097C	YHR097C	61.87220271	60.516129	0.102812817	1101	flat	1.022408468	0.03197169	0.978082666	-0.03197169
YHR098C	SFB3	52.38392201	45.09664838	0.485566188	2790	flat	1.161592355	0.216103864	0.860887208	-0.216103864
YHR099W	TRA1	28.48968564	29.82771131	0.135312455	11235	flat	0.955141524	-0.06621358	1.046965266	0.06621358
YHR100C	GEP4	74.99272127	67.18258233	0.462759171	558	flat	1.116252437	0.158663325	0.895854707	-0.158663325
YHR101C	BIG1	54.06451999	58.87218627	0.344715094	1008	flat	0.918337222	-0.122904073	1.088924609	0.122904073
YHR102W	KIC1	33.00886512	34.58529054	0.151145426	3243	flat	0.954419194	-0.067305038	1.047757638	0.067305038
YHR103W	SBE22	89.78294261	85.64279772	0.253407279	2559	flat	1.048342009	0.068109455	0.953887178	-0.068109455
YHR104W	GRE3	128.837789	237.6848381	0.915666232	984	up	0.54205304	-0.883494069	1.844837915	0.883494069
YHR105W	YPT35	17.69384291	14.82431974	0.286856604	645	flat	1.193568623	0.255281516	0.837823633	-0.255281516
YHR106W	TRR2	110.5650242	116.3738942	0.285196462	1029	flat	0.950084424	-0.073872379	1.052538043	0.073872379
YHR107C	CDC12	58.90719758	70.80250595	0.610410323	1224	flat	0.831993117	-0.265356503	1.201933021	0.265356503
YHR108W	GGA2	47.90824359	58.27453823	0.585602436	1758	flat	0.822112797	-0.282591745	1.216378098	0.282591745
YHR109W	CTM1	18.97206705	22.87815204	0.352791069	1758	flat	0.829265712	-0.270093652	1.205886105	0.270093652
YHR110W	ERP5	157.0017047	129.4462825	0.738437002	639	flat	1.212871483	0.278426689	0.824489663	-0.278426689
YHR111W	UBA4	105.2536233	129.9762505	0.737182833	1323	flat	0.809791196	-0.304378137	1.234886234	0.304378137
YHR112C	YHR112C	127.3738823	157.646151	0.762795418	1137	flat	0.807973309	-0.307620459	1.237664646	0.307620459
YHR113W	APE4	128.2293096	122.4073885	0.285297956	1473	flat	1.047561844	0.067035417	0.954597579	-0.067035417
YHR114W	BZZ1	65.5379197	58.01199982	0.469928955	1902	flat	1.129730399	0.175978526	0.88516694	-0.175978526
YHR115C	DMA1	88.9642461	93.90259404	0.288908221	1251	flat	0.947409888	-0.077939366	1.055509355	0.077939366
YHR116W	COX23	37.05618415	30.62082753	0.473778454	456	flat	1.210162727	0.275201056	0.826335151	-0.275201056
YHR117W	TOM71	44.0502964	44.34611422	0.03168769	1920	flat	0.993329341	-0.009655969	1.006715456	0.009655969
YHR118C	ORC6	86.10191903	83.66069333	0.149565028	1308	flat	1.02918008	0.041495438	0.971647256	-0.041495438

YHR119W	SET1	29.62613844	32.85368601	0.291547049	3243	flat	0.901759956	-0.149184649	1.108942567	0.149184649
YHR120W	MSH1	47.95154301	50.59093245	0.214520806	2880	flat	0.947828804	-0.07730159	1.055042847	0.07730159
YHR121W	LSM12	447.6793232	281.7484376	0.904646948	564	down	1.588932762	0.668058076	0.629353251	-0.668058076
YHR122W	CIA2	392.3914731	407.7803607	0.312447441	696	flat	0.962261823	-0.055498603	1.039218201	0.055498603
YHR123W	EPT1	47.69513776	46.59011891	0.091525301	1176	flat	1.02371788	0.033818187	0.976831625	-0.033818187
YHR124W	NDT80	9.438594543	14.90337978	0.465354502	1884	flat	0.633319065	-0.658995586	1.578982942	0.658995586
YHR125W	YHR125W	1.445575401	3.96791627	0.307612005	306	flat	0.364316004	-1.456737721	2.744869806	1.456737721
YHR126C	ANS1	3.133284681	9.485799834	0.558974917	480	flat	0.330313177	-1.598093571	3.027429933	1.598093571
YHR127W	YHR127W	116.3877781	90.60753065	0.765187763	732	flat	1.284526543	0.361236702	0.778496953	-0.361236702
YHR128W	FUR1	339.3358351	256.4517313	0.849209801	651	flat	1.323195727	0.404026481	0.755746092	-0.404026481
YHR129C	ARP1	71.61793557	66.35953477	0.34923155	1155	flat	1.079241074	0.110017161	0.92657704	-0.110017161
YHR130C	YHR130C	52.92354798	53.75286572	0.068754531	336	flat	0.984571655	-0.022431888	1.015670109	0.022431888
YHR131C	YHR131C	35.72728562	44.348808	0.551188923	2553	flat	0.805597427	-0.311869019	1.241314789	0.311869019
YHR131W-A	YHR131W-A	2.517416674	4.935700726	0.28368856	246	flat	0.510042406	-0.971310894	1.96062129	0.971310894
YHR132C	ECM14	62.537403	63.85491241	0.101145426	1293	flat	0.979367141	-0.030078303	1.021067543	0.030078303
YHR132W-A	IGO2	430.9523102	422.357633	0.172415543	396	flat	1.020349288	0.029063103	0.980056547	-0.029063103
YHR133C	NSG1	147.1457141	163.2077341	0.552653328	876	flat	0.901585424	-0.149463904	1.10915724	0.149463904
YHR134W	WSS1	128.4441929	128.1636955	0.018689285	810	flat	1.002188587	0.003154014	0.997816192	-0.003154014
YHR135C	YCK1	46.55986491	49.46460371	0.237052342	1617	flat	0.941276416	-0.087309646	1.062387183	0.087309646
YHR136C	SPL2	18.80218206	39.38622929	0.830969987	447	flat	0.477379592	-1.066791203	2.094769063	1.066791203
YHR137C-A	YHR137C-A	1.766666342	2.79765525	0.146686965	651	flat	0.631481074	-0.663188599	1.583578734	0.663188599
YHR137W	ARO9	249.687433	201.3794704	0.795215311	1542	flat	1.23988524	0.310206595	0.806526256	-0.310206595
YHR138C	YHR138C	544.919075	596.9730029	0.576243294	345	flat	0.912803548	-0.131623696	1.095525979	0.131623696
YHR139C	SPS100	15.06050849	35.27441161	0.838755981	981	flat	0.426952791	-1.227851538	2.342179326	1.227851538
YHR139C-A	YHR139C-A	2.268441398	6.810317829	0.458699435	312	flat	0.333088918	-1.586020738	3.002201351	1.586020738
YHR140W	YHR140W	15.60498645	38.78638154	0.862411193	720	flat	0.402331587	-1.313543086	2.485512029	1.313543086
YHR141C	RPL42B	1821.198036	1185.813632	0.901442656	321	down	1.535821471	0.619010522	0.651117346	-0.619010522
YHR142W	CHS7	156.5653923	211.4605221	0.843975642	951	flat	0.740400103	-0.433622999	1.350621098	0.433622999
YHR143W	DSE2	86.4791095	51.21168008	0.858452951	978	flat	1.688659879	0.755878777	0.592185562	-0.755878777
YHR143W-A	RPC10	2120.769058	1404.432787	0.898535595	213	flat	1.510053794	0.594599945	0.662228064	-0.594599945
YHR144C	DCD1	126.7210794	102.4749239	0.740365376	939	flat	1.236605743	0.306385611	0.808665175	-0.306385611
YHR145C	YHR145C	20.07284699	17.43048933	0.265825721	357	flat	1.151594004	0.203632182	0.86836159	-0.203632182
YHR146W	CRP1	262.4966394	202.1466013	0.833942294	1398	flat	1.298545895	0.376897005	0.77009215	-0.376897005
YHR147C	MRPL6	526.5632784	475.3194583	0.622676526	645	flat	1.10780922	0.147709451	0.902682503	-0.147709451
YHR148W	IMP3	148.7308534	125.652479	0.693569668	552	flat	1.183668278	0.243264824	0.844831291	-0.243264824
YHR149C	SKG6	75.75051112	37.92599153	0.894519356	2205	flat	1.997324475	0.998068724	0.500669777	-0.998068724
YHR150W	PEX28	68.99581846	76.93310762	0.465506742	1740	flat	0.896828694	-0.157095656	1.115040148	0.157095656
YHR151C	MTC6	84.77600254	79.39032473	0.318203567	1581	flat	1.067837962	0.094692743	0.936471671	-0.094692743
YHR152W	SPO12	201.8521734	100.0188549	0.939190953	522	down	2.018141214	1.013027127	0.495505465	-1.013027127
YHR153C	SPO16	207.761874	80.33535001	0.964868784	597	down	2.586182471	1.37082407	0.386670319	-1.37082407
YHR154W	RTT107	62.80680932	32.16846405	0.869088009	3213	flat	1.952434198	0.965273927	0.512181154	-0.965273927
YHR155W	YSP1	26.77831392	31.94350169	0.414890532	3687	flat	0.838302393	-0.254457347	1.192886968	0.254457347
YHR156C	LIN1	96.7713109	256.9603959	0.767601856	1023	up	0.3766001	-1.40889471	2.655336519	1.40889471
YHR157W	REC104	36.58016703	52.24965154	0.720110193	549	flat	0.700103559	-0.514359753	1.428360114	0.514359753
YHR158C	KEL1	102.6951655	59.62347661	0.874423662	3495	flat	1.72239479	0.784415861	0.580586986	-0.784415861
YHR159W	TDA11	45.89887962	51.79309322	0.41539075	1515	flat	0.886196919	-0.174300784	1.128417374	0.174300784
YHR160C	PEX18	29.17822686	38.65574768	0.592279252	852	flat	0.754822468	-0.405790729	1.324814831	0.405790729
YHR161C	YAP1801	44.14216294	58.99556039	0.695556039	1914	flat	0.74821889	-0.418467704	1.336507288	0.418467704
YHR162W	MPC2	1174.372112	867.829072	0.870864144	390	flat	1.353229743	0.436406792	0.738972821	-0.436406792

YHR163W	SOL3	193.6886003	180.508447	0.437704799	750	flat	1.073016823	0.101672696	0.931951837	-0.101672696
YHR164C	DNA2	27.84388936	36.07468985	0.551145426	4569	flat	0.771840021	-0.373626244	1.295605272	0.373626244
YHR165C	PRP8	29.09882201	23.6817538	0.43415253	7242	flat	1.228744385	0.297184824	0.813838917	-0.297184824
YHR165W-A	YHR165W-A	2.268441398	1.945805094	0.070204437	312	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YHR166C	CDC23	73.84192813	65.51808157	0.481665942	1881	flat	1.127046555	0.17254711	0.887274794	-0.17254711
YHR167W	THP2	206.765836	172.0477893	0.751645643	786	flat	1.201793041	0.265188473	0.832090024	-0.265188473
YHR168W	MTG2	105.0670435	98.64744438	0.338350007	1557	flat	1.065012319	0.090870118	0.938956275	-0.090870118
YHR169W	DBP8	64.71359211	59.13986316	0.375859069	1296	flat	1.094246565	0.129937855	0.913870815	-0.129937855
YHR170W	NMD3	236.77021	180.8211555	0.833985791	1557	flat	1.30941653	0.388924097	0.763698928	-0.388924097
YHR171W	ATG7	64.63440237	81.29826545	0.694533855	1893	flat	0.795028061	-0.330922312	1.257817238	0.330922312
YHR172W	SPC97	34.03487986	28.36530436	0.438190518	2472	flat	1.199877126	0.262886673	0.833418671	-0.262886673
YHR173C	YHR173C	18.78992167	41.18907774	0.85184138	339	flat	0.456186997	-1.132302771	2.192083526	1.132302771
YHR174W	ENO2	1283.611549	1448.540831	0.675576338	1314	flat	0.886141089	-0.174391676	1.128488468	0.174391676
YHR175W	CTR2	149.7768281	111.0337833	0.822988256	570	flat	1.348930241	0.431815742	0.74132818	-0.431815742
YHR175W-A	YHR175W-A	125.0364899	79.93367326	0.868044077	150	flat	1.564253021	0.64547389	0.639282767	-0.64547389
YHR176W	FMO1	19.20578791	23.13395987	0.353936494	1299	flat	0.830198895	-0.268471084	1.204530633	0.268471084
YHR177W	YHR177W	4.027232967	9.806171928	0.525953313	1362	flat	0.410683496	-1.283901125	2.434965151	1.283901125
YHR178W	STB5	33.1363187	47.66699415	0.706510077	2232	flat	0.695162749	-0.524577318	1.438512062	0.524577318
YHR179W	OYE2	1036.553266	1431.05473	0.877569958	1203	flat	0.724328178	-0.465284594	1.380589669	0.465284594
YHR180C-B	YHR180C-B	1.685127896	0.722727606	1.152218356	105	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YHR180W	YHR180W	22.83656554	20.976072809	0.197607656	492	flat	1.088661942	0.122556029	0.918558793	-0.122556029
YHR180W-A	YHR180W-A	0.966876661	0.829395948	0.043910396	183	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YHR181W	SVP26	140.3660027	152.8774028	0.474329419	687	flat	0.918160566	-0.123181624	1.08913412	0.123181624
YHR182C-A	YHR182C-A	1.119863475	3.20195775	0.269414238	474	flat	0.349743364	-1.51563141	2.859239382	1.51563141
YHR182W	YHR182W	10.09254398	14.73959737	0.416238944	2358	flat	0.68472318	-0.546407242	1.460444205	0.546407242
YHR183W	GND1	249.2785623	202.9832106	0.787110338	1470	flat	1.228074783	0.296398416	0.814282659	-0.296398416
YHR184W	SSP1	33.1501777	41.83480952	0.558967667	1716	flat	0.792406565	-0.335687262	1.261978439	0.335687262
YHR185C	PFS1	6.443136072	12.11631575	0.489749166	714	flat	0.531773536	-0.911116112	1.880499747	0.911116112
YHR186C	KOG1	25.96914042	26.33456111	0.041068581	4674	flat	0.986123912	-0.020159154	1.014071343	0.020159154
YHR187W	IKI1	107.3997239	91.71646463	0.637066841	930	flat	1.170997207	0.227737634	0.853973002	-0.227737634
YHR188C	GPI16	36.58465063	28.58465063	0.542373496	1833	flat	1.280702753	0.35693567	0.780821309	-0.35693567
YHR189W	PTH1	20.53473915	19.33580141	0.135160215	573	flat	1.062006106	0.08679206	0.941614172	-0.08679206
YHR190W	ERG9	128.5620046	109.2536766	0.66491953	1335	flat	1.176729321	0.2347825	0.849813107	-0.2347825
YHR191C	CTF8	151.6300717	124.2120655	0.743272437	402	flat	1.22073545	0.287750583	0.819178308	-0.287750583
YHR192W	LNP1	47.66979182	55.12417012	0.486327389	837	flat	0.864771147	-0.209609707	1.156375306	0.209609707
YHR193C	EGD2	465.9378632	225.7801042	0.952428592	525	down	2.063679901	1.045219211	0.484571275	-1.045219211
YHR193C-A	YHR193C-A	9.436716216	16.9985533	0.564999275	375	flat	0.555148197	-0.849055144	1.80132081	0.849055144
YHR194W	MDM31	33.25222201	53.20770481	0.781361462	1740	flat	0.624951257	-0.678184423	1.600124791	0.678184423
YHR195W	NVJ1	212.3810647	204.2491061	0.284659997	966	flat	1.039813925	0.05632538	0.961710529	-0.05632538
YHR196W	UTP9	228.6990632	232.9290848	0.154857184	1728	flat	0.981839874	-0.026440337	1.018496016	0.026440337
YHR197W	RIX1	69.16964766	63.04001006	0.392337248	2292	flat	1.097234083	0.133871342	0.911382553	-0.133871342
YHR198C	AIM18	66.8556176	70.85872836	0.26446281	966	flat	0.943505749	-0.083896786	1.059876954	0.083896786
YHR199C	AIM46	103.2614948	163.4851675	0.884254023	933	flat	0.631626075	-0.662857364	1.583215195	0.662857364
YHR199C-A	NBL1	39.85099753	36.91770746	0.259148905	222	flat	1.079454827	0.110302871	0.92639356	-0.110302871
YHR200W	RPN10	212.0191585	166.6303574	0.808742932	807	flat	1.272392148	0.347543375	0.785921228	-0.347543375
YHR201C	PPX1	330.8333692	199.694359	0.907923735	1194	down	1.656698621	0.728311178	0.603610088	-0.728311178
YHR202W	YHR202W	15.60070726	19.21280851	0.337559809	1809	flat	0.811995147	-0.300456991	1.231534455	0.300456991
YHR203C	RPS4B	654.2894962	409.3617435	0.907191533	786	down	1.598316176	0.676552827	0.62552827	-0.676552827
YHR204W	MNL1	22.71856868	26.15240172	0.315811222	2391	flat	0.868699132	-0.203071498	1.151146539	0.203071498

YHR205W	SCH9	32.06338805	33.78861064	0.165202262	2475	flat	0.948940707	-0.07561015	1.053806622	0.07561015
YHR206W	SKN7	20.02272753	28.82789891	0.5876903	1869	flat	0.694560765	-0.525827178	1.439758838	0.525827178
YHR207C	SET5	88.13346798	92.25405328	0.252994055	1581	flat	0.955334371	-0.065922324	1.046753922	0.065922324
YHR208W	BAT1	72.52679262	59.83597594	0.626982746	1182	flat	1.212093418	0.277500894	0.825018918	-0.277500894
YHR209W	CRG1	50.90009603	84.54922957	0.852261853	876	flat	0.602017266	-0.73212323	1.661081926	0.73212323
YHR210C	YHR210C	41.2166516	46.89276487	0.4161592	1026	flat	0.878955458	-0.186138038	1.13771408	0.186138038
YHR211W	FLO5	3.699920682	4.184565974	0.087052342	3228	flat	0.884182662	-0.17758365	1.130988022	0.17758365
YHR212C	YHR212C	9.21554318	11.7443236	0.267435117	336	flat	0.784680625	-0.349822518	1.274403839	0.349822518
YHR212W-A	YHR212W-A	0.43367262	1.487968601	0.163157895	204	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YHR213W	YHR213W	2.371034225	1.271128956	0.156691315	597	flat	1.865297942	0.899406089	0.536107384	-0.899406089
YHR213W-A	YHR213W-A	0.756147133	0.648601698	0.037936784	234	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YHR213W-B	YHR213W-B	0.294897382	0.505909324	0.056713064	300	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YHR214C-B	YHR214C-B	24.78847557	28.25647397	0.313984341	5382	flat	0.877267121	-0.188911896	1.139903658	0.188911896
YHR214C-C	YHR214C-C	0.123130431	0.211235626	0.033927795	1437	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YHR214C-D	YHR214C-D	3.610988348	3.097404027	0.091858779	294	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YHR214C-E	YHR214C-E	7.962229307	9.612277165	0.196404234	300	flat	0.828339547	-0.271705828	1.207234406	0.271705828
YHR214W	YHR214W	1.301017861	2.727942436	0.202058866	612	flat	0.476922769	-1.068172434	2.096775546	1.068172434
YHR214W-A	YHR214W-A	1.820354208	4.059766184	0.282847615	486	flat	0.448388928	-1.15717744	2.230206718	1.15717744
YHR215W	PHO12	37.68133211	35.67309339	0.181905176	1404	flat	1.056295615	0.079013644	0.946704678	-0.079013644
YHR216W	IMD2	35.17382893	15.15797022	0.836863854	1572	flat	2.320484103	1.214425814	0.43094456	-1.214425814
YHR217C	YHR217C	NA	NA	NA	462	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YHR218W	YHR218W	29.97797887	27.05442248	0.273473974	1812	flat	1.108062051	0.148038674	0.902476534	-0.148038674
YHR218W-A	YHR218W-A	21.97820109	20.0454638	0.203624764	318	flat	1.096417689	0.132797509	0.91206117	-0.132797509
YHR219C-A	YHR219C-A	0.183166076	0.314229394	0.041829781	483	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YHR219W	YHR219W	34.72711568	19.83164552	0.734957228	1875	flat	1.751096027	0.808258201	0.571070909	-0.808258201
YIL001W	YIL001W	52.15208561	59.1539891	0.455031173	1542	flat	0.881632607	-0.181750513	1.134259319	0.181750513
YIL002C	INP51	44.18789701	40.97491572	0.273104248	2841	flat	1.078413372	0.10891029	0.927288205	-0.10891029
YIL002W-A	YIL002W-A	733.8731986	695.9866849	0.407583007	210	flat	1.054435687	0.076471104	0.948374578	-0.076471104
YIL003W	CFD1	127.7888654	168.4643635	0.81876903	882	flat	0.758551321	-0.398681304	1.318302365	0.398681304
YIL004C	BET1	336.5542147	292.5783296	0.699985501	429	flat	1.150304656	0.202016006	0.869334915	-0.202016006
YIL005W	EPS1	32.05223679	38.12336647	0.452740322	2106	flat	0.840750431	-0.250250482	1.189413604	0.250250482
YIL006W	YIA6	10.56584202	14.20333665	0.348789329	1122	flat	0.743898584	-0.426822144	1.344269261	0.426822144
YIL007C	NAS2	125.2980278	139.6401303	0.553936494	663	flat	0.897292401	-0.156349901	1.114463912	0.156349901
YIL008W	URM1	479.2082454	311.6401439	0.899028563	300	flat	1.537697421	0.620771646	0.650323	-0.620771646
YIL009C-A	EST3	137.2407046	127.8671919	0.407880238	546	flat	1.073306628	0.102062292	0.9317002	-0.102062292
YIL009W	FAA3	217.3754369	195.9579714	0.578374656	2085	flat	1.10929622	0.149644666	0.901472467	-0.149644666
YIL010W	DOT5	163.1492459	144.9804962	0.594069885	648	flat	1.125318579	0.170333487	0.888637244	-0.170333487
YIL011W	TIR3	7.536266423	4.309597949	0.3353777	810	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YIL012W	YIL012W	5.173638276	7.544261856	0.263114398	342	flat	0.685771302	-0.544200563	1.458212085	0.544200563
YIL013C	PDR11	10.12926559	21.13927064	0.699325794	4236	flat	0.479168168	-1.061396023	2.086949982	1.061396023
YIL014C-A	YIL014C-A	322.9828467	287.1637689	0.645084819	315	flat	1.124733973	0.169583809	0.889099133	-0.169583809
YIL014W	MNT3	164.9742881	193.0633365	0.703979991	1893	flat	0.854508635	-0.226833025	1.170263189	0.226833025
YIL015W	BAR1	167.0082111	93.95458883	0.903574018	1764	down	1.777541823	0.829883505	0.562574667	-0.829883505
YIL016W	SNL1	181.7305115	172.9577503	0.315905466	480	flat	1.05072199	0.071380997	0.951726537	-0.071380997
YIL017C	VID28	94.0984921	89.1102758	0.289973902	2766	flat	1.055978014	0.078579798	0.946989413	-0.078579798
YIL018W	RPL2B	526.3050919	290.6498668	0.920798898	765	down	1.810787315	0.856617105	0.552245972	-0.856617105
YIL019W	FAF1	121.6133007	70.41907888	0.886080905	1041	flat	1.72699363	0.788262762	0.579040931	-0.788262762
YIL020C	HIS6	132.2535968	133.4287569	0.062041467	786	flat	0.991192602	-0.012762675	1.008885658	0.012762675
YIL020C-A	YIL020C-A	19.57283507	34.92117461	0.742424242	339	flat	0.56048616	-0.835249345	1.784165374	0.835249345

YILO21C-A	YILO21C-A	0.655327515	2.248485886	0.223785704	270	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YILO21W	RPB3	376.8030495	294.1886511	0.834870233	957	flat	1.280821161	0.357069048	0.780749125	-0.357069048
YILO22W	TIM44	65.05490852	54.68973484	0.5738437	1296	flat	1.189526859	0.250387848	0.840670383	-0.250387848
YILO23C	YKE4	82.52027599	179.6196795	0.954248224	1041	up	0.459416675	-1.122124872	2.176673276	1.122124872
YILO24C	YILO24C	64.41179654	55.11748956	0.536972597	570	flat	1.168627183	0.224814752	0.855704894	-0.224814752
YILO25C	YILO25C	7.077537162	9.30873157	0.247643903	375	flat	0.760311661	-0.395337177	1.315250115	0.395337177
YILO26C	IRR1	29.87405275	24.78999644	0.414136581	3453	flat	1.205084996	0.269134904	0.829816987	-0.269134904
YILO27C	EMC5	396.8654201	318.8653841	0.817043642	426	flat	1.244617446	0.315702375	0.803459732	-0.315702375
YILO28W	YILO28W	57.20565751	74.17467539	0.709475134	399	flat	0.771228957	-0.374768875	1.296631813	0.374768875
YILO29C	YILO29C	249.1161099	378.5475365	0.895193562	429	flat	0.658084087	-0.603656158	1.519562651	0.603656158
YILO29W-A	YILO29W-A	1.189102346	4.079913907	0.34261273	372	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YILO30C	SSM4	54.77942273	65.84486511	0.596215746	3960	flat	0.831946768	-0.265436874	1.201999981	0.265436874
YILO30W-A	YILO30W-A	39.40664128	42.53219984	0.269283747	339	flat	0.926513122	-0.110116685	1.079315528	0.110116685
YILO31W	ULP2	33.42170327	59.38935548	0.830100043	3105	flat	0.562755783	-0.829419117	1.776969744	0.829419117
YILO32C	YILO32C	1.239064629	4.251338861	0.352435842	357	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YILO33C	BCY1	86.34765063	68.6677884	0.704095984	1251	flat	1.257469516	0.330523426	0.795247907	-0.330523426
YILO34C	CAP2	73.10997589	58.49576564	0.66799333	864	flat	1.249833643	0.321736081	0.800106482	-0.321736081
YILO35C	CKA1	329.9213872	366.479087	0.610635059	1119	flat	0.90024615	-0.15160857	1.110807305	0.15160857
YILO36W	CST6	116.5045268	120.3685621	0.209177903	1764	flat	0.967898302	-0.047072625	1.033166396	0.047072625
YILO37C	PRM2	5.296482656	6.006229423	0.109641873	1971	flat	0.881831559	-0.181424986	1.134003416	0.181424986
YILO38C	NOT3	151.1128877	165.614283	0.506336088	2511	flat	0.91243874	-0.132200394	1.095963988	0.132200394
YILO39W	TED1	75.96407239	68.94882354	0.42337973	1422	flat	1.101745737	0.139791314	0.907650438	-0.139791314
YILO40W	APQ12	219.7940198	162.3277401	0.848434102	417	flat	1.354013921	0.437242571	0.738544844	-0.437242571
YILO41W	GVP36	118.9509622	73.17893286	0.873756706	981	flat	1.625480963	0.70086666	0.61520253	-0.70086666
YILO42C	PKP1	37.03015224	28.43338482	0.56369436	1185	flat	1.302347662	0.381114628	0.767844124	-0.381114628
YILO43C	CBR1	375.2957206	248.161837	0.894954328	855	flat	1.512302315	0.596746568	0.66124345	-0.596746568
YILO44C	AGE2	101.6853514	77.49380288	0.767348122	897	flat	1.312173975	0.391959013	0.762094066	-0.391959013
YILO45W	PIG2	50.17085326	67.11042059	0.720523416	1617	flat	0.747586631	-0.419687324	1.337637617	0.419687324
YILO46W	MET30	116.0267078	169.2941499	0.865274757	1923	flat	0.685355683	-0.545075188	1.459096385	0.545075188
YILO46W-A	YILO46W-A	23.05561348	17.47686757	0.452747571	165	flat	1.319207426	0.399671425	0.758030906	-0.399671425
YILO47C	SYG1	102.7078921	168.6364415	0.892735972	2709	flat	0.609049214	-0.715369286	1.641903441	0.715369286
YILO47C-A	YILO47C-A	106.9302701	123.8038266	0.631528201	369	flat	0.863707311	-0.211385593	1.157799624	0.211385593
YILO48W	NEO1	18.45668509	20.15732465	0.18708134	3456	flat	0.915631683	-0.12716071	1.092142199	0.12716071
YILO49W	DFG10	62.57861762	59.15553912	0.245969262	762	flat	1.057865731	0.081156526	0.945299551	-0.081156526
YILO50W	PCL7	75.374121	91.62973079	0.67169784	858	flat	0.822594592	-0.281746508	1.215665663	0.281746508
YILO51C	MMF1	518.2922477	361.4133051	0.885348702	438	flat	1.434070745	0.520116196	0.697315668	-0.520116196
YILO52C	RPL34B	948.9894433	542.4011446	0.917775845	366	down	1.749608113	0.807031816	0.571556563	-0.807031816
YILO53W	GPP1	398.6401659	430.728377	0.510729303	753	flat	0.925502444	-0.111691294	1.080494175	0.111691294
YILO54W	YILO54W	4.173076157	3.818183581	0.070537915	318	flat	1.092948013	0.128224779	0.914956602	-0.128224779
YILO55C	YILO55C	46.91122363	54.45775531	0.493634914	1884	flat	0.861424114	-0.215204385	1.160868362	0.215204385
YILO56W	VHR1	20.93265346	26.83450395	0.463658112	1923	flat	0.780064856	-0.358334017	1.28194469	0.358334017
YILO57C	RG12	5.183044891	2.759505406	0.27815717	495	flat	1.8782514	0.909390177	0.532410092	-0.909390177
YILO58W	YILO58W	5.897947635	8.520578096	0.282289401	285	flat	0.692200408	-0.530738303	1.444668319	0.530738303
YILO59C	YILO59C	93.78703617	82.52127505	0.542127012	366	flat	1.136519475	0.184622405	0.879879335	-0.184622405
YILO60W	YILO60W	21.55801549	19.18966403	0.241162824	435	flat	1.123418079	0.167894925	0.890140562	-0.167894925
YILO61C	SNP1	28.80393031	25.04335194	0.333978541	903	flat	1.150162741	0.201838008	0.869442179	-0.201838008
YILO62C	ARC15	597.7855313	454.3392127	0.857285776	465	flat	1.315725156	0.395858153	0.760037152	-0.395858153
YILO63C	YRB2	338.4127271	301.6947069	0.646114253	984	flat	1.121705881	0.165694441	0.891499293	-0.165694441
YILO64W	EFM4	149.3918132	111.182398	0.822060316	774	flat	1.343664247	0.426172685	0.744233541	-0.426172685

YIL065C	FIS1	270.7006735	183.5542805	0.883318834	468	flat	1.474771783	0.560491718	0.678071015	-0.560491718
YIL066C	RNR3	4.37261635	6.280253683	0.225416848	2610	flat	0.696248364	-0.522326063	1.436269085	0.522326063
YIL066W-A	YIL066W-A	1.394784914	1.709153123	0.068972017	444	flat	0.81606785	-0.293238989	1.225388306	0.293238989
YIL067C	YIL067C	84.12610139	115.636417	0.811903726	2037	flat	0.727505258	-0.45897042	1.374560512	0.45897042
YIL068C	SEC6	71.93154498	72.1830922	0.028374656	2418	flat	0.99651515	-0.005036356	1.003497036	0.005036356
YIL068W-A	YIL068W-A	1.151942897	1.185724979	0.012295201	384	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YIL069C	RPS24B	385.5349594	255.9305994	0.894077135	408	flat	1.506404315	0.591109038	0.663832405	-0.591109038
YIL070C	MAM33	177.2697744	130.3616536	0.837929535	801	flat	1.359830667	0.443427011	0.73538568	-0.443427011
YIL071C	PCI8	84.09545561	99.36286507	0.639509932	1335	flat	0.846346928	-0.240678932	1.181548567	0.240678932
YIL071W-A	YIL071W-A	6.120511697	5.409093406	0.109641873	477	flat	1.131522648	0.178265462	0.8837649	-0.178265462
YIL072W	HOP1	6.47217026	8.849239009	0.260207337	1818	flat	0.731381563	-0.451303835	1.367275373	0.451303835
YIL073C	SPO22	29.42930838	54.8932351	0.835138466	2928	flat	0.536119038	-0.899374728	1.865257395	0.899374728
YIL074C	SER33	82.69675514	92.35536178	0.498129622	1410	flat	0.895419102	-0.159364999	1.116795473	0.159364999
YIL075C	RPN2	212.2575341	285.3093283	0.854132231	2838	flat	0.743955816	-0.426711154	1.344165848	0.426711154
YIL076W	SEC28	275.2375563	246.3114085	0.616405684	891	flat	1.117437304	0.160193889	0.894904793	-0.160193889
YIL077C	YIL077C	151.215293	195.271543	0.814709294	963	flat	0.774384688	-0.368877668	1.291347847	0.368877668
YIL078W	THS1	444.4725436	391.4430378	0.676439031	2205	flat	1.135471833	0.183291918	0.880691155	-0.183291918
YIL079C	AIR1	131.1108858	115.6163969	0.587675801	1083	flat	1.134016362	0.181441457	0.881821491	-0.181441457
YIL080W	YIL080W	1.049190177	0.867824127	0.052493838	4722	flat	1.208989407	0.273801604	0.827137107	-0.273801604
YIL082W	YIL082W	0.202678613	0.086926001	0.0400029	873	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YIL082W-A	YIL082W-A	NA	NA	NA	4497	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YIL083C	CAB2	66.47277048	44.094828265	0.790814847	1098	flat	1.5075145	0.592171879	0.663343537	-0.592171879
YIL084C	SDS3	76.60139307	80.97634004	0.275184863	984	flat	0.945972528	-0.080129809	1.057113152	0.080129809
YIL085C	KTR7	125.0752023	133.6069413	0.398238365	1554	flat	0.936142996	-0.095199177	1.068212874	0.095199177
YIL086C	YIL086C	16.31956384	25.54105327	0.609061911	309	flat	0.638954223	-0.64621552	1.565057346	0.64621552
YIL087C	AIM19	58.60618853	74.60561557	0.692967957	474	flat	0.785546612	-0.348231212	1.272998935	0.348231212
YIL088C	AVT7	112.37332	140.5418164	0.760163839	1473	flat	0.799572134	-0.322699902	1.250668899	0.322699902
YIL089W	YIL089W	53.53962174	75.64081162	0.776866754	618	flat	0.707813951	-0.498557897	1.412800636	0.498557897
YIL090W	ICE2	78.33960934	100.0507668	0.740401624	1476	flat	0.78299859	-0.352918385	1.277141508	0.352918385
YIL091C	UTP25	88.0607694	72.2427304	0.671190373	2166	flat	1.218956827	0.285647029	0.8203736	-0.285647029
YIL092W	YIL092W	42.56011109	46.52131485	0.31723213	1902	flat	0.914851853	-0.128389956	1.093073154	0.128389956
YIL093C	RSM25	311.7009684	181.9364476	0.910685805	795	down	1.713240928	0.776728048	0.583689068	-0.776728048
YIL094C	LYS12	337.0708783	246.9707885	0.863665362	1116	flat	1.364820837	0.448711578	0.732696903	-0.448711578
YIL095W	PRK1	19.5992218	29.56855978	0.625221111	2433	flat	0.66283992	-0.593267602	1.508659889	0.593267602
YIL096C	BMT5	113.0585808	77.01230963	0.839807163	1011	flat	1.468058565	0.553909523	0.681171735	-0.553909523
YIL097W	FYV10	37.70351438	68.00908714	0.850115992	1551	flat	0.554389361	-0.851028522	1.803786418	0.851028522
YIL098C	FMC1	233.8385008	151.7727973	0.88923445	468	flat	1.540714179	0.623599249	0.649049651	-0.623599249
YIL099W	SGA1	30.50847459	50.86688299	0.788538495	1650	flat	0.599770868	-0.737516644	1.667303386	0.737516644
YIL100C-A	YIL100C-A	37.05790107	37.15971144	0.01138901	339	flat	0.997260195	-0.003958128	1.002747332	0.003958128
YIL100W	YIL100W	23.49182533	84.46113298	0.958061476	354	up	0.278137701	-1.846128784	3.595341435	1.846128784
YIL101C	XBP1	17.61192697	22.875221	0.43677686	1944	flat	0.769912866	-0.377232915	1.298848277	0.377232915
YIL102C	YIL102C	2.312920641	0.991979068	0.193910396	306	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YIL102C-A	YIL102C-A	69.45609386	68.56402687	0.071523851	228	flat	1.013010715	0.018649434	0.98715639	-0.018649434
YIL103W	DPH1	185.9376449	180.8685214	0.190256633	1278	flat	1.028026566	0.039877547	0.972737508	-0.039877547
YIL104C	SHQ1	122.8352086	123.2905007	0.040655357	1524	flat	0.99630716	-0.005337503	1.003706528	0.005337503
YIL105C	SLM1	134.2705983	239.8466768	0.912657677	2061	up	0.559818464	-0.836969023	1.78629335	0.836969023
YIL105W-A	YIL105W-A	0.313720619	4.305611272	0.434326519	141	flat	0.072863201	-3.778665816	13.72434903	3.778665816
YIL106W	MOB1	140.6145611	134.5879409	0.266572423	945	flat	1.044778307	0.063196847	0.063196847	-0.063196847
YIL107C	PFK26	41.45658845	69.59308219	0.834645498	2484	flat	0.595699848	-0.747342505	1.678697761	0.747342505

YIL108W	YIL108W	54.2831192	73.09192105	0.740039147	2091	flat	0.742669209	-0.429208329	1.346494493	0.429208329
YIL109C	SEC24	111.6601737	96.43384858	0.617398869	2781	flat	1.15789399	0.211503174	0.863636921	-0.211503174
YIL110W	HPM1	273.4432072	270.2198217	0.113853849	1134	flat	1.011928753	0.017107717	0.988211865	-0.017107717
YIL111W	COX5B	624.328799	494.2600966	0.834478759	456	flat	1.263158413	0.337035579	0.791666342	-0.337035579
YIL112W	HOS4	59.00668091	67.76571394	0.514100333	3252	flat	0.870745359	-0.199677217	1.148441378	0.199677217
YIL113W	SDP1	147.1678362	137.077336	0.415325504	630	flat	1.073611733	0.102472343	0.931435424	-0.102472343
YIL114C	POR2	76.54783101	85.57402403	0.48708134	846	flat	0.894521812	-0.160811434	1.117915725	0.160811434
YIL115C	NUP159	55.06365896	41.31073402	0.678070175	4383	flat	1.332914078	0.414583785	0.750235905	-0.414583785
YIL115W-A	YIL115W-A	1.902563753	2.039956953	0.042554734	372	flat	0.932648971	-0.100593911	1.072214768	0.100593911
YIL116W	HIS5	264.1088727	266.9785736	0.110983036	1158	flat	0.989251194	-0.015591193	1.010865598	0.015591193
YIL117C	PRM5	137.1873713	253.5890313	0.916797158	957	up	0.540983065	-0.886344663	1.8484867	0.886344663
YIL118W	RHO3	373.324832	340.1804078	0.561765985	696	flat	1.097431902	0.13413142	0.911218271	-0.13413142
YIL119C	RPI1	184.3831424	149.2928497	0.76984196	1224	flat	1.235043358	0.304561691	0.809688173	-0.304561691
YIL120W	QDR1	46.74437221	67.63397706	0.772872263	1692	flat	0.691137417	-0.532955508	1.446890264	0.532955508
YIL121W	QDR2	115.352125	73.88325862	0.861497753	1629	flat	1.561275547	0.642725179	0.640501929	-0.642725179
YIL122W	POG1	30.99773615	47.28527493	0.738958968	1056	flat	0.655547339	-0.60922813	1.525442848	0.60922813
YIL123W	SIM1	48.77862352	31.92425716	0.745592287	1431	flat	1.527948584	0.611595997	0.654472284	-0.611595997
YIL124W	AYR1	230.3762096	167.2217062	0.856212846	894	flat	1.377669292	0.462229612	0.725863606	-0.462229612
YIL125W	KGDI	63.13418823	50.04265633	0.651950123	3045	flat	1.261607454	0.335263089	0.7925639578	-0.335263089
YIL126W	STH1	86.17074964	81.98706993	0.254443961	4080	flat	1.051028531	0.071801832	0.951448958	-0.071801832
YIL127C	RRT14	170.3851539	135.8867557	0.78277512	621	flat	1.253876089	0.326394785	0.797526971	-0.326394785
YIL128W	MET18	70.19870878	76.98833089	0.408510947	3099	flat	0.911809725	-0.133195299	1.096720043	0.133195299
YIL129C	TAO3	27.02088757	22.51796657	0.383594316	7131	flat	1.199970143	0.26299851	0.833354068	-0.26299851
YIL130W	ASG1	138.5864898	83.46193208	0.886254893	2895	flat	1.660475457	0.731596399	0.602237146	-0.731596399
YIL131C	FKH1	33.74598905	25.97348903	0.538422503	1455	flat	1.299247437	0.377676213	0.377676213	-0.377676213
YIL132C	CSM2	29.90314572	23.87702886	0.464383065	642	flat	1.252381353	0.324673933	0.798478832	-0.324673933
YIL133C	RPL16A	256.2658247	161.8909838	0.897056691	600	flat	1.582953038	0.662618456	0.63173068	-0.662618456
YIL134C-A	YIL134C-A	13.87752385	14.13570171	0.035087719	204	flat	0.981735759	-0.02659333	1.01860403	0.02659333
YIL134W	FLX1	136.5790758	141.8816214	0.229889807	936	flat	0.962626974	-0.054951246	1.038823997	0.054951246
YIL135C	VHS2	31.44672309	40.40328472	0.570073945	1311	flat	0.778320953	-0.361562898	1.28481701	0.361562898
YIL136W	OM45	167.8819359	119.2867417	0.850761201	1182	flat	1.407381352	0.493013302	0.71053947	-0.493013302
YIL137C	TMA108	26.78054364	32.90814613	0.464948528	2841	flat	0.813796789	-0.297259507	1.228807995	0.297259507
YIL138C	TPM2	850.1054153	570.8655834	0.894475859	486	flat	1.489151632	0.574490663	0.671523288	-0.574490663
YIL139C	REV7	124.4323099	104.0610236	0.692061766	738	flat	1.195762885	0.257931337	0.836286201	-0.257931337
YIL140W	AXL2	26.87717642	27.19876587	0.03737857	2472	flat	0.988176322	-0.017159607	1.01196515	0.017159607
YIL141W	YIL141W	5.217415216	6.61573732	0.176591272	390	flat	0.788636997	-0.342566702	1.268010508	0.342566702
YIL142C-A	YIL142C-A	0.531346634	0.455774166	0.031462955	333	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YIL142W	CCT2	232.7902059	202.8428106	0.677954183	1584	flat	1.147638436	0.198668192	0.871354574	-0.198668192
YIL143C	SSL2	63.34703236	76.54575916	0.629773815	2532	flat	0.827570764	-0.273045416	1.208355882	0.273045416
YIL144W	NDC80	101.8077811	162.3003902	0.885341453	2076	flat	0.627279953	-0.672818639	1.594184536	0.672818639
YIL145C	PAN6	299.3684066	257.5241658	0.720748151	930	flat	1.162486657	0.217214157	0.860224927	-0.217214157
YIL146C	ATG32	10.62743395	20.14091839	0.636791359	1590	flat	0.527653891	-0.922336177	1.895181705	0.922336177
YIL147C	SLN1	46.27546138	43.75431995	0.208278962	3663	flat	1.0576204	0.08082191	0.945518827	-0.08082191
YIL148W	RPL40A	985.9631066	628.6609667	0.904987676	387	down	1.568354262	0.649251474	0.637611045	-0.649251474
YIL149C	MLP2	81.78136319	81.18640111	0.046723213	5040	flat	1.007328346	0.010534018	0.992724967	-0.010534018
YIL150C	MCM10	30.67551436	34.58226326	0.333007105	1716	flat	0.887030271	-0.172944755	1.127357242	0.172944755
YIL151C	ESL1	46.32972271	42.36255916	0.317746846	3357	flat	1.093647873	0.129148301	0.914371092	-0.129148301
YIL152W	YIL152W	61.97843278	80.8168709	0.729280847	708	flat	0.766899684	-0.382890219	1.303951508	0.382890219
YIL153W	RRD1	42.73766624	45.84000732	0.263259388	1182	flat	0.932322413	-0.101099145	1.072590325	0.101099145

YIL154C	IMP2'	37.73326729	22.01507435	0.743410178	1041	flat	1.713974102	0.777345311	0.583439387	-0.777345311
YIL155C	GUT2	134.6546814	112.4675344	0.702805568	1950	flat	1.197276015	0.259755783	0.835229294	-0.259755783
YIL156W	UBP7	25.06077563	26.47529207	0.143953893	3216	flat	0.946572206	-0.079215533	1.056443442	0.079215533
YIL156W-A	YIL156W-A	3.961308113	2.265265632	0.212266203	402	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YIL156W-B	YIL156W-B	807.77972	697.3344742	0.734884732	222	flat	1.158382024	0.212111112	0.863273064	-0.212111112
YIL157C	COA1	318.4295971	249.3775256	0.826627519	594	flat	1.276897733	0.352642984	0.783148074	-0.352642984
YIL158W	AIM20	102.998305	46.64237186	0.938089024	615	down	2.208256161	1.142907537	0.452846014	-1.142907537
YIL159W	BNR1	32.25440113	26.47199954	0.44861534	4128	flat	1.218434636	0.285028859	0.820725191	-0.285028859
YIL160C	POT1	15.87366289	11.37690825	0.403262288	1254	flat	1.395252782	0.480526523	0.716716005	-0.480526523
YIL161W	YIL161W	235.6679924	210.7240957	0.606676816	708	flat	1.118372304	0.161400538	0.894156621	-0.161400538
YIL162W	SUC2	18.20285902	18.4139604	0.02862114	1599	flat	0.988535797	-0.016634885	1.011597155	0.016634885
YIL163C	YIL163C	5.248173743	5.573577303	0.061178773	354	flat	0.941616749	-0.086788112	1.062003199	0.086788112
YIL164C	NIT1	117.9589527	104.4702755	0.569044512	600	flat	1.129114977	0.175192402	0.885649398	-0.175192402
YIL165C	YIL165C	188.4885765	166.1068949	0.62723648	360	flat	1.134742641	0.182365132	0.881257092	-0.182365132
YIL166C	YIL166C	34.59477572	46.49148304	0.650065246	1629	flat	0.744109963	-0.426412259	1.343887395	0.426412259
YIL167W	SDL1	61.91447399	132.1118662	0.941583297	633	up	0.468651876	-1.093411436	2.133779999	1.093411436
YIL168W	YIL168W	45.15616158	88.92937344	0.900717703	384	up	0.507775551	-0.977737163	1.969374064	0.977737163
YIL169C	YIL169C	1.658057568	1.574617375	0.025728578	2988	flat	1.052990774	0.074492795	0.949675937	-0.074492795
YIL170W	HXT12	4.507165223	5.081185355	0.09600551	1374	flat	0.887030271	-0.172944755	1.172944755	0.172944755
YIL171W	YIL171W	2.41279676	0.919835135	0.212258953	330	flat	2.623075231	1.391259185	0.381231918	-1.391259185
YIL171W-A	YIL171W-A	0.976481397	0.670078575	0.06922575	453	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YIL172C	IMA3	5.947930242	7.888755568	0.224786139	1770	flat	0.753975731	-0.407410009	1.326302637	0.407410009
YIL173W	VTH1	19.72958612	22.35792821	0.260504567	4650	flat	0.882442503	-0.180425815	1.133218308	0.180425815
YIL174W	YIL174W	0.388022871	0.665670164	0.065361751	228	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YIL175W	YIL175W	NA	NA	NA	318	flat	#j VALOR!	#j VALOR!	#j VALOR!	#j VALOR!
YIL176C	PAU14	0.487433689	1.672427519	0.178737132	363	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YIL177C	YIL177C	11.98701694	9.318625419	0.278700884	5277	flat	1.286350336	0.363283612	0.777393197	-0.363283612
YIL177W-A	YIL177W-A	0.183166076	0.314229394	0.041829781	483	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YIR001C	SGN1	42.64850581	44.54420745	0.164600551	753	flat	0.957442241	-0.062742638	1.044449427	0.062742638
YIR002C	MPH1	61.70890886	86.47283121	0.791351312	2982	flat	0.713621932	-0.48676814	1.401302224	0.48676814
YIR003W	AIM21	28.83922925	27.75061441	0.115832971	2040	flat	1.039228495	0.055512894	0.962252291	-0.055512894
YIR004W	DJP1	158.2774862	121.1611939	0.80954038	1299	flat	1.30633812	0.385528358	0.765498599	-0.385528358
YIR005W	IST3	513.5964468	483.1603817	0.440568363	447	flat	1.06299371	0.08813306	0.940739339	-0.08813306
YIR006C	PAN1	33.17346644	25.03926636	0.553117297	4443	flat	1.324857764	0.405837481	0.754798007	-0.405837481
YIR007W	YIR007W	14.68704607	21.16222011	0.504813687	2295	flat	0.694021988	-0.526946724	1.440876539	0.526946724
YIR008C	PRI1	154.3536052	130.3024992	0.697933884	1230	flat	1.184579008	0.244374425	0.844181767	-0.244374425
YIR009W	MSL1	45.81441467	42.46024687	0.279897057	336	flat	1.078995485	0.109688828	0.926787937	-0.109688828
YIR010W	DSN1	43.03355207	34.01955249	0.568051327	1731	flat	1.26496526	0.339097765	0.790535544	-0.339097765
YIR011C	STS1	239.6962781	267.183362	0.613085399	960	flat	0.897122771	-0.156622664	1.114674638	0.156622664
YIR012W	SQT1	246.9082939	208.804705	0.734500507	1296	flat	1.182484341	0.241821079	0.845677161	-0.241821079
YIR013C	GAT4	28.03942318	38.565219	0.625438596	366	flat	0.727065058	-0.459843632	1.375392737	0.459843632
YIR014W	YIR014W	22.93646303	26.23233534	0.304204727	729	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YIR015W	RPR2	57.55583382	56.87118613	0.061128027	435	flat	1.012038569	0.017264272	0.988104634	-0.017264272
YIR016W	YIR016W	326.9369845	230.5120681	0.875895317	798	flat	1.418307454	0.504170307	0.705065744	-0.504170307
YIR017C	MET28	141.3311388	218.7788728	0.889502682	564	flat	0.645999941	-0.630394063	1.547987758	0.630394063
YIR017W-A	YIR017W-A	4.423460726	2.782501285	0.205342903	600	flat	1.589742564	0.668793161	0.629032664	-0.668793161
YIR018C-A	YIR018C-A	31.41298197	75.88639867	0.928954618	138	up	0.41394746	-1.272480429	2.415765518	1.272480429
YIR018W	YAP5	84.39339706	91.51617164	0.405147165	738	flat	0.922169769	-0.116895724	1.084399027	0.116895724
YIR019C	FLO11	1.077841308	1.183413624	0.03707409	4104	flat	0.910790011	-0.134809627	1.097947923	0.134809627

YIRO20C	YIRO20C	NA	NA	NA	303	flat	#iVALOR!	#iVALOR!	#iVALOR!	#iVALOR!
YIRO20C-B	YIRO20C-B	0.962930226	1.238961611	0.065267508	735	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YIRO20W-A	YIRO20W-A	1.456283367	0.624579413	0.137349572	243	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YIRO21W	MRS1	83.44623715	77.13727337	0.375619835	1092	flat	1.081788784	0.113418845	0.924394868	-0.113418845
YIRO21W-A	YIRO21W-A	12.46045275	4.275290066	0.631520951	213	flat	2.914528034	1.543262279	0.343108726	-1.543262279
YIRO22W	SEC11	174.1298826	107.2045949	0.892090764	504	flat	1.624276298	0.699797063	0.615658802	-0.699797063
YIRO23C-A	YIRO23C-A	1.092212525	0.46843456	0.110946788	324	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YIRO23W	DAL81	27.72825021	30.0627889	0.228403654	2913	flat	0.922344574	-0.116622275	1.084193509	0.116622275
YIRO24C	INA22	158.5922786	171.82266	0.479592576	651	flat	0.922999787	-0.11559778	1.083423868	0.11559778
YIRO25W	MND2	52.50611919	52.64747441	0.013455125	1107	flat	0.997315062	-0.003878757	1.002692167	0.003878757
YIRO26C	YVH1	67.94758851	49.2048795	0.746186748	1095	flat	1.380911592	0.46562096	0.72415932	-0.46562096
YIRO27C	DAL1	4.413865367	13.16900628	0.651739887	1383	flat	0.335170724	-1.577031955	2.983554137	1.577031955
YIRO28W	DAL4	4.775853824	8.272731092	0.353371031	1908	flat	0.577300745	-0.792605007	1.732199392	0.792605007
YIRO29W	DAL2	45.17759308	56.17946568	0.608249964	1032	flat	0.804165588	-0.314435493	1.243524983	0.314435493
YIRO30C	DCG1	22.26776148	21.47533459	0.088248514	735	flat	1.036899397	0.052275926	0.964413716	-0.052275926
YIRO30W-A	YIRO30W-A	5.759714487	8.695316514	0.308663187	384	flat	0.662392735	-0.594241245	1.509678393	0.594241245
YIRO31C	DAL7	148.0863068	181.0334988	0.759736117	1665	flat	0.818004998	-0.289818437	1.222486418	0.289818437
YIRO32C	DAL3	99.15172172	142.7387023	0.85076845	588	flat	0.694637965	-0.525666832	1.439598827	0.525666832
YIRO33W	MGA2	90.79874501	64.76002663	0.797796143	3342	flat	1.402080106	0.487568778	0.71322601	-0.487568778
YIRO34C	LYS1	79.87461169	70.34033388	0.51338988	1122	flat	1.135544961	0.183384829	0.880634439	-0.183384829
YIRO35C	YIRO35C	312.8225167	355.7236936	0.682680876	765	flat	0.879397471	-0.18541271	1.137142228	0.18541271
YIRO36C	IRC24	164.8744453	106.5475698	0.880056546	792	flat	1.547425676	0.629870117	0.646234592	-0.629870117
YIRO36W-A	YIRO36W-A	1.100363365	2.642809904	0.21754386	402	flat	0.416361148	-1.264092643	2.40176108	1.264092643
YIRO37W	HYR1	436.9516083	261.5921385	0.910722053	492	down	1.67035451	0.740154328	0.598675308	-0.740154328
YIRO38C	GTT1	231.149352	148.3283083	0.892409743	705	flat	1.55836303	0.640031357	0.640031357	-0.640031357
YIRO39C	YPS6	35.29998399	62.90954239	0.837465565	1614	flat	0.561122886	-0.833611339	1.782140819	0.833611339
YIRO40C	YIRO40C	0.531346634	1.367322499	0.138538495	333	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YIRO41W	PAU15	2.831014865	1.618909838	0.165586487	375	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YIRO42C	YIRO42C	33.47147498	24.7618066	0.573640713	711	flat	1.351738002	0.434815551	0.739788331	-0.434815551
YIRO43C	YIRO43C	16.97894016	13.57851867	0.326475279	693	flat	1.250426544	0.322420309	0.799727105	-0.322420309
YIRO44C	YIRO44C	9.988459705	13.87170728	0.365187763	186	flat	0.720059867	-0.473811235	1.388773414	0.473811235
YJL001W	PRE3	668.1610122	504.0355862	0.86123677	648	flat	1.325622695	0.406670207	0.754362462	-0.406670207
YJL002C	OST1	137.3714848	139.6818827	0.105190663	1431	flat	0.983459574	-0.024062345	1.016818614	0.024062345
YJL003W	COX16	306.2967763	207.8904703	0.885674931	357	flat	1.473356503	0.559106557	0.678722358	-0.559106557
YJL004C	SYS1	362.405753	359.8404068	0.073763955	612	flat	1.007129122	0.01024866	0.992921342	-0.01024866
YJL005W	CYR1	50.81778759	45.42451754	0.392547484	6081	flat	1.118730376	0.161862376	0.893870428	-0.161862376
YJL006C	CTK2	217.3502925	210.3271173	0.244678846	972	flat	1.033391677	0.047387169	0.967687298	-0.047387169
YJL007C	YJL007C	1.965982545	2.890910425	0.135276207	315	flat	0.680056541	-0.556273395	1.470465968	0.556273395
YJL008C	CCT8	280.5930448	236.0613807	0.751565898	1707	flat	1.188644428	0.24931721	0.841294484	-0.24931721
YJL009W	YJL009W	3.24657668	1.85654798	0.182825866	327	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YJL010C	NOP9	56.19408879	52.03205346	0.31338263	2001	flat	1.079989834	0.111017733	0.925934642	-0.111017733
YJL011C	RPC17	698.2878743	606.71988996	0.719885457	486	flat	1.150811069	0.202651003	0.868952365	-0.202651003
YJL012C	VTC4	72.33563201	82.89345302	0.550123242	2166	flat	0.872633837	-0.196551678	1.145956021	0.196551678
YJL013C	MAD3	61.43695453	62.16017669	0.063353632	1548	flat	0.988365185	-0.016883902	1.011771777	0.016883902
YJL014W	CCT3	189.1201714	189.7869185	0.04984051	1605	flat	0.996486864	-0.005077307	1.003525521	0.005077307
YJL015C	YJL015C	62.08365932	62.30672733	0.026359287	285	flat	0.996419841	-0.005174346	1.003593023	0.005174346
YJL016W	YJL016W	99.33109318	135.9293737	0.822785269	1686	flat	0.730755175	-0.452539955	1.368447374	0.452539955
YJL019W	MPS3	20.29308484	22.5177796	0.228889372	2049	flat	0.901202747	-0.150076383	1.10962822	0.150076383
YJL020C	BBC1	63.63977176	51.81420197	0.619711469	3474	flat	1.228230279	0.296581075	0.814179569	-0.296581075

YJL020W-A	YJL020W-A	2.057423594	1.764799969	0.066246194	258	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YJL022W	YJL022W	5.439854615	8.349959724	0.307264028	309	flat	0.651482737	-0.618201144	1.534960089	0.618201144
YJL023C	PET130	62.70806394	80.97456716	0.721610845	1044	flat	0.774416785	-0.368817873	1.291294326	0.368817873
YJL024C	APS3	231.0785638	198.2126789	0.706734812	585	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YJL025W	RRN7	29.26069167	31.92631659	0.251444906	1545	flat	0.916506969	-0.125782243	1.091099177	0.125782243
YJL026C-A	YJL026C-A	1.594039901	0.683661249	0.146491228	222	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YJL026W	RNR2	108.2273391	105.2291395	0.162795418	1200	flat	1.028492104	0.040530718	0.972297207	-0.040530718
YJL027C	YJL027C	1.485094728	3.639635428	0.27522836	417	flat	0.408033925	-1.293238989	2.450776613	1.293238989
YJL028W	YJL028W	1.579807402	1.355114262	0.057872988	336	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YJL029C	VPS53	36.72780271	37.43606058	0.069167754	2469	flat	0.981080865	-0.02755604	1.019283971	0.02755604
YJL030W	MAD2	211.8171549	232.1533144	0.534051037	591	flat	0.912402028	-0.132258441	1.096008085	0.132258441
YJL031C	BET4	481.3660311	521.7961112	0.545418298	984	flat	0.922517475	-0.116351854	1.083990306	0.116351854
YJL032W	YJL032W	2.808546493	3.854547234	0.146346237	315	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YJL033W	HCA4	109.4294954	71.39161414	0.852363346	2313	flat	1.532806012	0.616175125	0.652398276	-0.616175125
YJL034W	KAR2	270.3297961	784.4187037	0.973937944	2049	up	0.344624363	-1.536903399	2.901710115	1.536903399
YJL035C	TAD2	171.0639792	285.8085347	0.907010294	753	up	0.59852649	-0.740512993	1.670769825	0.740512993
YJL036W	SNX4	161.8458036	147.4773408	0.5053864	1272	flat	1.097428274	0.134126651	0.911221283	-0.134126651
YJL037W	IRC18	12.32015728	26.08243628	0.753748006	675	flat	0.472354543	-1.08205796	2.11705384	1.08205796
YJL038C	LOH1	5.093682049	13.33760946	0.630564013	660	flat	0.381903673	-1.388719298	2.618461328	1.388719298
YJL039C	NUP192	41.95808353	47.49659394	0.40693055	5052	flat	0.883391419	-0.178875276	1.132001034	0.178875276
YJL041W	NSP1	45.63035943	38.25018315	0.498941569	2472	flat	1.192944861	0.254527362	0.83826171	-0.254527362
YJL042W	MHP1	31.17607059	40.97178446	0.597484414	4197	flat	0.760915616	-0.394191625	1.314206174	0.394191625
YJL043W	YJL043W	3.543340634	3.921777709	0.076359287	774	flat	0.903503691	-0.146397601	1.106802341	0.146397601
YJL044C	GYP6	98.62036623	90.15987525	0.441808032	1377	flat	1.093838761	0.129400091	0.914211523	-0.129400091
YJL045W	YJL045W	15.00029202	31.39027934	0.790169639	1905	flat	0.477864241	-1.065327281	2.09264455	1.065327281
YJL046W	AIM22	136.1562789	169.4179274	0.775453096	1230	flat	0.803671022	-0.315323031	1.244290228	0.315323031
YJL047C	RTT101	30.29432178	46.20998575	0.734283022	2529	flat	0.655579553	-0.609157237	1.525367892	0.609157237
YJL047C-A	YJL047C-A	184.8023592	75.3242772	0.961490503	135	down	2.453423599	1.294796346	0.407593699	-1.294796346
YJL048C	UBX6	69.15603587	105.8968888	0.84861534	1191	flat	0.653050686	-0.614733126	1.531274711	0.614733126
YJL049W	YJL049W	113.6433813	86.82346278	0.779447586	1353	flat	1.308901737	0.388356794	0.763999292	-0.388356794
YJL050W	MTR4	92.20348305	70.65772688	0.749108308	3222	flat	1.304931352	0.383973913	0.766323837	-0.383973913
YJL051W	IRC8	15.15693712	9.58953276	0.470349427	2469	flat	1.580570972	0.660445818	0.632682757	-0.660445818
YJL052C-A	YJL052C-A	2.211730363	0.632386656	0.222683776	120	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YJL052W	TDH1	882.3896432	1003.007015	0.690727853	999	flat	0.879744239	-0.184843933	1.136694002	0.184843933
YJL053W	PEP8	107.7927535	133.5334348	0.74707844	1140	flat	0.807234185	-0.308940823	1.238797883	0.308940823
YJL054W	TIM54	60.70330238	67.48978253	0.429041612	1437	flat	0.899444332	-0.152894101	1.111797544	0.152894101
YJL055W	YJL055W	430.7180051	398.9691421	0.51030883	738	flat	1.07957724	0.110466467	0.926288517	-0.110466467
YJL056C	ZAP1	76.82060058	68.10538692	0.489836161	2643	flat	1.127966583	0.173724327	0.886551087	-0.173724327
YJL057C	IKS1	65.86630143	115.7229712	0.886508627	2004	flat	0.569172229	-0.813062824	1.756937443	0.813062824
YJL058C	BIT61	26.56244799	37.94319933	0.650427722	1632	flat	0.700058204	-0.514453219	1.428452654	0.514453219
YJL059W	YHC3	26.17304391	29.31552809	0.288625489	1227	flat	0.89280479	-0.163583327	1.120065675	0.163583327
YJL060W	BNA3	66.53415085	68.89461812	0.171154125	1335	flat	0.965738002	-0.050296246	1.035477529	0.050296246
YJL061W	NUP82	68.14855461	82.19255131	0.641728288	2142	flat	0.829132975	-0.270324597	1.206079157	0.270324597
YJL062W	LAS21	19.9082348	20.0293824	0.018283312	2493	flat	0.993951506	-0.008752629	1.006085301	0.008752629
YJL062W-A	COA3	237.6324251	181.7743968	0.833906046	258	flat	1.307293157	0.386582698	0.764939367	-0.386582698
YJL063C	MRPL8	88.71599058	60.96313198	0.812969407	717	flat	1.455240039	0.541257143	0.687171857	-0.541257143
YJL064W	YJL064W	4.021327933	17.63017343	0.781673191	396	flat	0.228093498	-2.132302771	4.384167052	2.132302771
YJL065C	DLS1	91.97989764	71.67048763	0.733797303	504	flat	1.283372008	0.359939422	0.779197297	-0.359939422
YJL066C	MPM1	78.44503475	71.58716923	0.410105843	759	flat	1.095797412	0.131981101	0.912577443	-0.131981101

YJL067W	YJL067W	11.59425603	13.40443509	0.206278092	351	flat	0.864956707	-0.209300171	1.156127228	0.209300171
YJL068C	YJL068C	60.15906588	44.85729344	0.701420908	900	flat	1.341121171	0.423439591	0.74564478	-0.423439591
YJL069C	UTP18	120.9327078	109.5995158	0.494345368	1785	flat	1.103405493	0.141963068	0.906285138	-0.141963068
YJL070C	YJL070C	49.39282356	48.54225577	0.077881688	2667	flat	1.017522214	0.025060291	0.982779527	-0.025060291
YJL071W	ARG2	64.62099148	71.17924235	0.412142961	1725	flat	0.907862873	-0.13945369	1.101487933	0.13945369
YJL072C	PSF2	207.1171798	200.9452924	0.198274612	642	flat	1.030714267	0.043644447	0.970200988	-0.043644447
YJL073W	JEM1	47.43008973	44.09085908	0.279476584	1938	flat	1.075735214	0.105323011	0.929596788	-0.105323011
YJL074C	SMC3	51.98434756	36.04244334	0.726199797	3693	flat	1.442309198	0.528380479	0.693332609	-0.528380479
YJL075C	APQ13	0.848625559	1.091890628	0.060287081	417	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YJL076W	NET1	48.72002122	38.30456314	0.604625199	3570	flat	1.271911679	0.346998494	0.786218113	-0.346998494
YJL077C	ICS3	8.712877188	13.03099775	0.399021314	396	flat	0.66862702	-0.580726439	1.495602138	0.580726439
YJL077W-A	YJL077W-A	198.293067	87.2257456	0.958387705	87	down	2.273331867	1.184808308	0.439882982	-1.184808308
YJL077W-B	YJL077W-B	176.0448006	159.4380901	0.536291141	99	flat	1.104157736	0.142946285	0.905667703	-0.142946285
YJL078C	PRY3	10.43174412	6.653682725	0.368341308	2646	flat	1.56781508	0.648755407	0.637830324	-0.648755407
YJL079C	PRY1	70.08727773	18.55000856	0.952421343	900	down	3.77828816	1.917732737	0.264670125	-1.917732737
YJL080C	SCP160	57.43626847	37.31236391	0.77677251	3669	flat	1.539336092	0.622308258	0.649630711	-0.622308258
YJL081C	ARP4	71.13647046	61.01885934	0.554567203	1470	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YJL082W	IML2	35.21042509	90.81487054	0.943678411	2196	up	0.387716515	-1.366925907	2.579204037	1.366925907
YJL083W	TAX4	12.67327591	15.72081868	0.302559084	1815	flat	0.806146052	-0.310886855	1.240470009	0.310886855
YJL084C	ALY2	20.44847174	25.85114504	0.438639988	3141	flat	0.791008356	-0.33823516	1.264209148	0.33823516
YJL085W	EXO70	77.83589547	83.75069426	0.366347687	1872	flat	0.929376122	-0.105665515	1.075990631	0.105665515
YJL086C	YJL086C	9.350404787	9.460093059	0.019921705	369	flat	0.988405159	-0.016825554	1.011730858	0.016825554
YJL087C	TRL1	59.47809511	58.65615356	0.068261563	2484	flat	1.014012878	0.020075975	0.986180769	-0.020075975
YJL088W	ARG3	169.109295	247.1344665	0.879288096	1017	flat	0.684280495	-0.54734027	1.461389017	0.54734027
YJL089W	SIP4	13.18155767	18.52969092	0.449876758	2490	flat	0.711374935	-0.491317953	1.405728472	0.491317953
YJL090C	DPB11	35.92736729	41.79538471	0.436979846	2295	flat	0.859601306	-0.21826042	1.163330014	0.21826042
YJL091C	GWT1	116.8178019	154.9669295	0.817065391	1473	flat	0.753824073	-0.407700228	1.326569469	0.407700228
YJL092W	SRS2	21.33300208	21.87250526	0.058046977	3525	flat	0.975334185	-0.036031472	1.025289604	0.036031472
YJL093C	TOK1	86.59414447	95.2600939	0.457155285	2076	flat	0.909028544	-0.137602498	1.100075467	0.137602498
YJL094C	KHA1	36.77781992	59.21570239	0.801022184	2622	flat	0.62108222	-0.687143826	1.610092782	0.687143826
YJL095W	BCK1	16.66897979	20.01061222	0.317978831	4437	flat	0.833006987	-0.263599499	1.200470123	0.263599499
YJL096W	MRPL49	563.5816629	543.3840892	0.277656952	486	flat	1.037169976	0.052652349	0.964162117	-0.052652349
YJL097W	PHS1	74.80653767	77.04674116	0.144280122	654	flat	0.970924098	-0.042569577	1.029946627	0.042569577
YJL098W	SAP185	95.20813487	93.63383153	0.093033203	3177	flat	1.016813403	0.024054952	0.983464613	-0.024054952
YJL099W	CHS6	37.70107089	45.78242347	0.528178918	2241	flat	0.823483513	-0.28018833	1.214353396	0.28018833
YJL100W	LSB6	27.79213812	49.92526228	0.809105408	1824	flat	0.556674854	-0.845093178	1.796380763	0.845093178
YJL101C	GSH1	72.61685159	119.9578811	0.1877127737	2037	flat	0.605352903	-0.724151657	1.651928973	0.724151657
YJL102W	MEF2	38.91206915	61.57286656	0.799499783	2460	flat	0.631967802	-0.662077038	1.582359096	0.662077038
YJL103C	GSM1	31.3477346	38.41314741	0.498223865	1857	flat	0.81606785	-0.293238989	1.225388306	0.293238989
YJL104W	PAM16	180.8703941	112.9864158	0.890445121	450	flat	1.600815398	0.678806949	0.624681647	-0.678806949
YJL105W	SET4	4.836106795	4.689355592	0.025431347	1683	flat	1.031294535	0.044456422	0.969655095	-0.044456422
YJL106W	IME2	8.490853407	8.536240923	0.012099464	1938	flat	0.994682962	-0.00769133	1.00534546	0.00769133
YJL107C	YJL107C	14.44085117	26.20818923	0.683884298	1164	flat	0.5510053	-0.859861899	1.814864576	0.859861899
YJL108C	PRM10	4.761363976	17.25888581	0.751261418	1152	flat	0.275878989	-1.857892507	3.624777668	1.857892507
YJL109C	UTP10	68.84271081	61.62375726	0.447955633	5310	flat	1.117145625	0.15981726	0.895138447	-0.15981726
YJL110C	GZF3	80.72281591	78.81920635	0.120392924	1656	flat	1.024151595	0.034429279	0.976417949	-0.034429279
YJL111W	CCT7	226.6588769	217.3298314	0.291873278	1653	flat	1.042925748	0.060636447	0.958841032	-0.060636447
YJL112W	MDV1	72.09519207	53.271902276	0.741902276	2145	flat	1.353146083	0.436317599	0.739018508	-0.436317599
YJL113W	YJL113W	34.15402859	40.40089311	0.457162534	4647	flat	0.845378059	-0.242331426	1.182902714	0.242331426

YJL114W	YJL114W	58.58974413	119.0112684	0.92600406	681	up	0.492304174	-1.022378125	2.031264518	1.022378125
YJL115W	ASF1	184.9427866	117.9852817	0.887248079	840	flat	1.567507267	0.648472132	0.637955575	-0.648472132
YJL116C	NCA3	58.80498086	90.85413016	0.839161954	1014	flat	0.647246094	-0.627613741	1.545007393	0.627613741
YJL117W	PHO86	212.2883075	239.1718761	0.62784544	936	flat	0.887597283	-0.172022843	1.126637067	0.172022843
YJL118W	YJL118W	9.517142775	11.03802162	0.183442076	660	flat	0.862214543	-0.213881198	1.159804143	0.213881198
YJL119C	YJL119C	65.25969837	110.0821215	0.875772075	324	flat	0.592827404	-0.754315955	1.686831602	0.754315955
YJL120W	YJL120W	3.822743838	0.46843456	0.387480064	324	flat	8.160678495	3.028689106	0.122538831	-3.028689106
YJL121C	RPE1	76.37718799	55.24783836	0.764752791	717	flat	1.382446631	0.467223786	0.72335523	-0.467223786
YJL122W	ALB1	157.1669	91.1211681	0.897295926	528	flat	1.724812174	0.786439266	0.579773273	-0.786439266
YJL123C	MTC1	178.4775594	132.6559732	0.834188778	1437	flat	1.345416683	0.428053053	0.743264159	-0.428053053
YJL124C	LSM1	109.435907	106.4456613	0.162577932	519	flat	1.028091757	0.039969031	0.972675827	-0.039969031
YJL125C	GCD14	129.4783817	85.10870406	0.862440191	1152	flat	1.521329494	0.60533265	0.657319801	-0.60533265
YJL126W	NIT2	119.2993953	131.4050193	0.502522836	924	flat	0.907875483	-0.139433653	1.101472635	0.139433653
YJL127C	SPT10	33.26221638	51.77480762	0.765753226	1923	flat	0.642440173	-0.638365984	1.556565174	0.638365984
YJL127C-B	YJL127C-B	882.4665047	863.8640352	0.182448891	159	flat	1.021534025	0.030737257	0.978919914	-0.030737257
YJL127W-A	YJL127W-A	1.512294265	1.297203396	0.057872988	117	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YJL128C	PBS2	62.63814342	77.05853537	0.658344208	2007	flat	0.812864443	-0.298913313	1.230217423	0.298913313
YJL129C	TRK1	41.99186019	41.99538567	0.002791069	3708	flat	0.999916051	-0.000121118	1.000083956	0.000121118
YJL130C	URA2	107.0550721	140.6496442	0.80168914	6645	flat	0.761147123	-0.393752754	1.31380645	0.393752754
YJL131C	AIM23	88.05619298	79.92517059	0.447274177	1071	flat	1.101732938	0.139774554	0.907660982	-0.139774554
YJL132W	YJL132W	77.78851042	94.04120066	0.666557924	2253	flat	0.82717479	-0.273735878	1.208934329	0.273735878
YJL133C-A	YJL133C-A	235.9179054	406.7510969	0.913556619	225	up	0.580005579	-0.785861318	1.724121347	0.785861318
YJL133W	MRS3	78.54568359	79.82124897	0.085660432	945	flat	0.984019727	-0.023240857	1.01623979	0.023240857
YJL134W	LCB3	122.1306718	127.0942937	0.252406844	1230	flat	0.96094536	-0.057473695	1.040641895	0.057473695
YJL135W	YJL135W	7.511537082	16.22728022	0.641670291	318	flat	0.462895629	-1.111241155	1.260314199	1.111241155
YJL136C	RPS21B	1115.24828	675.5039275	0.91122952	264	down	1.650987114	0.72332886	0.605698246	-0.72332886
YJL136W-A	YJL136W-A	16.85127896	1.806819016	0.811889227	84	flat	9.326489709	3.221334184	0.107221477	-3.221334184
YJL137C	GLG2	14.55136687	16.86364415	0.243837901	1143	flat	0.86288389	-0.212761651	1.158904473	0.212761651
YJL138C	TIF2	268.2374669	170.8082744	0.89676671	1188	flat	1.570400894	0.651132899	0.636780075	-0.651132899
YJL139C	YUR1	50.31815465	56.36938394	0.415137016	1287	flat	0.892650427	-0.163832786	1.120259364	0.163832786
YJL140W	RPB4	851.4829807	676.1409755	0.832028418	666	flat	1.259327583	0.332653614	0.794074563	-0.332653614
YJL141C	YAK1	74.19880905	105.5021302	0.820740902	2424	flat	0.703292047	-0.507804193	1.421884415	0.507804193
YJL142C	IRC9	90.04500206	99.25091327	0.465811222	393	flat	0.907246081	-0.140434176	1.102236782	0.140434176
YJL143W	TIM17	411.0016339	356.0456189	0.720965637	477	flat	1.15435105	0.207082029	0.8662876	-0.207082029
YJL144W	YJL144W	128.912284	325.2274229	0.967442366	315	up	0.396375813	-1.335059165	2.522858278	1.335059165
YJL145W	SFH5	199.4306022	139.0821906	0.866637669	885	flat	1.433904668	0.519949111	0.697396433	-0.519949111
YJL146W	IDS2	59.92063821	69.64326232	0.546085254	1410	flat	0.860393902	-0.216930795	1.162258354	0.216930795
YJL147C	YJL147C	63.36828856	90.35038588	0.804951428	1149	flat	0.701361571	-0.511769711	1.425798107	0.511769711
YJL148W	RPA34	377.1913947	304.1941964	0.810511817	702	flat	1.23996907	0.310304134	0.806471729	-0.310304134
YJL149W	DAS1	33.13154319	48.00043289	0.712367696	1992	flat	0.690234258	-0.534842014	1.448783494	0.534842014
YJL150W	YJL150W	12.84701465	19.53511253	0.518254313	303	flat	0.657637095	-0.604636417	1.520595489	0.604636417
YJL151C	SNA3	322.6265385	282.0255712	0.680216036	402	flat	1.143962007	0.194039139	0.874154905	-0.194039139
YJL152W	YJL152W	5.897947635	8.010230971	0.239488183	360	flat	0.736301819	-0.441630829	1.358138706	0.441630829
YJL153C	INO1	16.51204441	11.74770716	0.419204002	1602	flat	1.405554649	0.491139547	0.71146291	-0.491139547
YJL154C	VPS35	67.12426118	81.9626641	0.660192837	2835	flat	0.818961437	-0.288132574	1.221058715	0.288132574
YJL155C	FBP26	174.79017	274.7322159	0.897187183	1359	flat	0.636220144	-0.652402044	1.57178299	0.652402044
YJL156C	SSY5	76.54693466	83.76412958	0.418102073	2100	flat	0.913839075	-0.129987963	1.094284571	0.129987963
YJL156W-A	YJL156W-A	10.75976933	2.734644997	0.633898797	222	flat	3.934612846	1.976221686	0.254154612	-1.976221686
YJL157C	FAR1	184.9230152	57.47032518	0.973626214	2493	down	3.217713048	1.686035674	0.310779732	-1.686035674

YJL158C	CIS3	454.6334635	283.1317097	0.905719878	684	down	1.605731354	0.683230544	0.622769181	-0.683230544
YJL159W	HSP150	223.2387426	424.0351101	0.92968682	1242	up	0.526462874	-0.925596299	1.899469174	0.925596299
YJL160C	YJL160C	13.41373507	19.14726263	0.469283747	864	flat	0.70055628	-0.51342714	1.427437065	0.51342714
YJL161W	FMP33	55.55801502	65.40485189	0.558380455	543	flat	0.849447914	-0.235402607	1.177235217	0.235402607
YJL162C	JJ2	40.69987837	42.53449971	0.160852545	1752	flat	0.956867452	-0.063609002	1.045076826	0.063609002
YJL163C	YJL163C	35.37707799	57.77921242	0.801703639	1668	flat	0.612280378	-0.707735647	1.633238687	0.707735647
YJL164C	TPK1	124.4792968	145.1629268	0.664912281	1194	flat	0.857514378	-0.221767234	1.166161205	0.221767234
YJL165C	HAL5	71.5195052	78.60507027	0.42508337	2568	flat	0.909858676	-0.136285618	1.099071785	0.136285618
YJL166W	QCR8	1542.158097	1509.207395	0.185957663	285	flat	1.021833117	0.031159599	0.978633383	-0.031159599
YJL167W	ERG20	455.8796069	245.2155394	0.921183123	1059	down	1.859097543	0.894602468	0.537895391	-0.894602468
YJL168C	SET2	141.9042987	160.5951943	0.609794113	2202	flat	0.883614851	-0.178510428	1.131714795	0.178510428
YJL169W	YJL169W	47.47128584	30.84812954	0.743547919	369	flat	1.538870802	0.621872113	0.649827132	-0.621872113
YJL170C	ASG7	62.49015947	33.00456069	0.856698565	630	flat	1.893379526	0.920963627	0.528156128	-0.920963627
YJL171C	YJL171C	169.8074092	272.1970572	0.900376975	1191	up	0.623839989	-0.68075206	1.062975149	0.68075206
YJL172W	CPS1	105.5395309	105.0397523	0.042663477	1731	flat	1.004757995	0.006848057	0.995264536	-0.006848057
YJL173C	RFA3	248.3851118	212.2351312	0.722567783	369	flat	1.170329862	0.226915216	0.854459954	-0.226915216
YJL174W	KRE9	139.5705659	151.0422424	0.446215746	831	flat	0.92404988	-0.113957365	1.082192663	0.113957365
YJL175W	YJL175W	1.034727655	0.887560218	0.045367551	513	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YJL176C	SWI3	69.5115257	66.39294282	0.223423227	2478	flat	1.046971602	0.066222311	0.955135744	-0.066222311
YJL177W	RPL17B	263.9730077	173.9234218	0.889734667	555	flat	1.517754221	0.601938186	0.658868205	-0.601938186
YJL178C	ATG27	163.7114141	150.2848287	0.481158475	816	flat	1.089340924	0.123455535	0.91798626	-0.123455535
YJL179W	FPD1	718.7453459	471.4155069	0.899666522	330	flat	1.524653592	0.608481493	0.655886691	-0.608481493
YJL180C	ATP12	113.2550681	124.6150882	0.494671596	978	flat	0.908839128	-0.137903147	1.10030474	0.137903147
YJL181W	YJL181W	84.99983357	80.18497463	0.28616065	1836	flat	1.060046897	0.084128092	0.94335449	-0.084128092
YJL182C	YJL182C	0.834615231	2.863637686	0.265579237	318	flat	0.291452803	-1.778665816	3.631087258	1.778665816
YJL183W	MNN11	299.4289018	288.8347562	0.261309265	1269	flat	1.036678916	0.051969126	0.964618827	-0.051969126
YJL184W	GON7	241.1499557	179.1082205	0.849014064	372	flat	1.346392449	0.429098991	0.742725496	-0.429098991
YJL185C	ATG36	38.41690381	54.72080448	0.727903436	882	flat	0.702052979	-0.51034819	1.424393927	0.51034819
YJL186W	MNN5	177.3905715	214.1711535	0.755451646	1761	flat	0.828265472	-0.271834847	1.207342373	0.271834847
YJL187C	SWE1	35.60346438	39.42390955	0.321980571	2460	flat	0.903093194	-0.147053222	1.107305433	0.147053222
YJL188C	BUD19	0.286308138	0.491174101	0.055502392	309	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YJL189W	RPL39	2005.302196	1484.649287	0.868914021	156	flat	1.350690842	0.433697496	0.740361872	-0.433697496
YJL190C	RPS22A	872.7611825	405.8860305	0.962273452	393	down	2.150261691	1.104512249	0.465059673	-1.104512249
YJL191W	RPS14B	717.7250665	638.392054	0.669290996	417	flat	1.12427005	0.168988613	0.889466014	-0.168988613
YJL192C	SOP4	90.85349123	82.02189473	0.473930695	705	flat	1.107673647	0.147532883	0.902792987	-0.147532883
YJL193W	YJL193W	95.27453872	89.88364176	0.298035378	1209	flat	1.059976397	0.08403214	0.943417234	-0.08403214
YJL194W	CDC6	81.1254665	73.9178799	0.417906336	1542	flat	1.097508027	0.134231491	0.911155067	-0.134231491
YJL195C	YJL195C	3.402662097	7.134618678	0.395418298	702	flat	0.476922769	-1.068172434	2.096775546	1.068172434
YJL196C	ELO1	195.7132463	223.6737367	0.65784399	933	flat	0.874994307	-0.192654464	1.142864578	0.192654464
YJL197C-A	YJL197C-A	2.509764951	3.229208454	0.114325069	282	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YJL197W	UBP12	69.92945085	70.34356742	0.038168769	3765	flat	0.994112943	-0.008518326	1.00592192	0.008518326
YJL198W	PHO90	35.54148717	28.39287025	0.507053792	2646	flat	1.251775071	0.32397535	0.798865566	-0.32397535
YJL199C	MBB1	247.8220199	210.7181957	0.723981441	327	flat	1.176082678	0.233989484	0.850280358	-0.233989484
YJL200C	ACO2	68.98359006	47.32493554	0.780266783	2370	flat	1.457658405	0.543652671	0.686031787	-0.543652671
YJL201W	ECM25	60.9454589	98.90527293	0.860490068	1800	flat	0.6162003	-0.698528709	1.622848933	0.698528709
YJL202C	YJL202C	3.304884451	2.18064364	0.154951428	348	flat	1.515554578	0.599845807	0.659824473	-0.599845807
YJL203W	PRP21	81.54279915	77.05665155	0.27815717	843	flat	1.058218824	0.081637986	0.944984135	-0.081637986
YJL204C	RCY1	42.07810441	40.9058669	0.100282732	2523	flat	1.028656953	0.040761938	0.97214139	-0.040761938
YJL205C	NCE101	143.625947	99.30812665	0.851986371	162	flat	1.446265798	0.532332718	0.691435835	-0.532332718

YJL206C	YJL206C	14.06493441	24.99551998	0.663853849	2277	flat	0.562698212	-0.829566715	1.777151549	0.829566715
YJL207C	LAA1	28.72871267	36.38027847	0.527772945	6045	flat	0.789678196	-0.340663238	1.266338624	0.340663238
YJL208C	NUC1	156.7424265	93.5165721	0.893497173	990	flat	1.676092515	0.745101784	0.596625777	-0.745101784
YJL209W	CBP1	111.0254875	108.2105288	0.158684935	1965	flat	1.026013723	0.037050028	0.974645833	-0.037050028
YJL210W	PEX2	246.2176301	189.5300006	0.831528201	816	flat	1.299095813	0.377507838	0.769766164	-0.377507838
YJL211C	YJL211C	2.391059852	3.076475622	0.111200522	444	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YJL212C	OPT1	40.21663044	46.22746452	0.435413948	2400	flat	0.869972663	-0.200958026	1.149461405	0.200958026
YJL213W	YJL213W	98.95050701	175.2396756	0.90430622	996	up	0.564658127	-0.824550445	1.7709831	0.824550445
YJL214W	HXT8	18.6250978	18.19498448	0.048542845	1710	flat	1.023639114	0.033707181	0.976906789	-0.033707181
YJL215C	YJL215C	6.63519109	16.02046194	0.666333188	360	flat	0.414169773	-1.271705828	2.414468811	1.271705828
YJL216C	IMA5	13.73147602	9.388008083	0.398557344	1746	flat	1.462661291	0.548595723	0.683685284	-0.548595723
YJL217W	REE1	212.6521321	157.3657647	0.844236625	597	flat	1.351323983	0.434373606	0.740014987	-0.434373606
YJL218W	YJL218W	80.6851212	33.89849281	0.93169494	591	down	2.380197894	1.251081527	0.420133134	-1.251081527
YJL219W	HXT9	2.024823572	2.493919205	0.088103523	1704	flat	0.811904238	-0.30061852	1.231672349	0.30061852
YJL220W	YJL220W	0.585888838	2.010235726	0.20523416	453	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YJL221C	IMA4	5.448104171	8.145997597	0.290256633	1770	flat	0.668807486	-0.5803371	1.495198576	0.5803371
YJL222W	VTH2	21.63214987	21.83569923	0.024887632	4650	flat	0.990678139	-0.013511678	1.009409576	0.013511678
YJL222W-A	YJL222W-A	0.388022871	0.665670164	0.065361751	228	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YJL222W-B	YJL222W-B	0.641081265	0.54990144	0.033927795	138	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YJL223C	PAU1	0.243716844	0.41810688	0.049746266	363	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YJL225C	YJL225C	11.76907118	9.692520884	0.231368711	5277	flat	1.21424254	0.280056623	0.823558694	-0.280056623
YJL225W-A	YJL225W-A	0.183166076	0.628458788	0.089459185	483	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YJR001W	AVT1	69.39624954	73.91477858	0.296483979	1809	flat	0.938868395	-0.091005151	1.065112006	0.091005151
YJR002W	MPP10	126.6966529	99.47846649	0.767862839	1782	flat	1.273608826	0.348922239	0.785170438	-0.348922239
YJR003C	YJR003C	131.342757	144.9624795	0.515985211	1560	flat	0.906046567	-0.142342894	1.103696031	0.142342894
YJR004C	SAG1	10.64529719	13.0557245	0.255553139	1953	flat	0.815373914	-0.294466293	1.22643119	0.294466293
YJR005C-A	LSO1	12.54882476	19.91345213	0.548818327	282	flat	0.630168224	-0.666191087	1.586877857	0.666191087
YJR005W	APL1	103.782003	124.7813441	0.702254603	2103	flat	0.831710892	-0.26584597	1.202340873	0.26584597
YJR006W	POL31	95.35821074	90.60753065	0.267355372	1464	flat	1.052431404	0.073726204	0.950180692	-0.073726204
YJR007W	SUI2	204.5911016	156.4172108	0.826453531	915	flat	1.307983313	0.387344135	0.764535748	-0.387344135
YJR008W	MHO1	203.5574848	306.9780178	0.891046832	1017	flat	0.663101176	-0.59269908	1.508065489	0.59269908
YJR009C	TDH2	876.9876191	1069.550043	0.810519066	999	flat	0.819959407	-0.286375606	1.219572569	0.286375606
YJR010C-A	SPC1	244.2991994	198.1034407	0.7869291	285	flat	1.233190088	0.302395198	0.810904994	-0.302395198
YJR010W	MET3	56.61799341	74.1078112	0.71922575	1536	flat	0.763994949	-0.388364995	1.308909178	0.388364995
YJR011C	YJR011C	456.8658292	506.8748003	0.621879078	786	flat	0.901338613	-0.149858899	1.109460957	0.149858899
YJR012C	YJR012C	92.1554318	111.6405673	0.698013629	624	flat	0.825465456	-0.276720252	1.211437732	0.276720252
YJR013W	GPI14	49.19822656	71.75397102	0.786283892	1212	flat	0.685651621	-0.544452364	1.458466616	0.544452364
YJR014W	TMA22	156.4882589	77.53886631	0.933732057	597	down	2.018191216	1.013062871	0.495493188	-1.013062871
YJR015W	YJR015W	113.6307132	80.98509343	0.821966072	1533	flat	1.403106528	0.488624547	0.71270426	-0.488624547
YJR016C	ILV3	126.56432	73.29641919	0.888074525	1758	flat	1.726746291	0.788056125	0.579123873	-0.788056125
YJR017C	ESS1	104.6799478	104.7321058	0.007727998	513	flat	0.999501987	-0.00071866	1.000498261	0.00071866
YJR018W	YJR018W	32.17062346	41.81068797	0.591902276	363	flat	0.769435401	-0.378127887	1.299654264	0.378127887
YJR019C	TES1	26.54076436	17.6345536	0.595817022	1050	flat	1.505043165	0.589804865	0.664432771	-0.589804865
YJR020W	YJR020W	27.89569827	111.2088965	0.973865449	333	up	0.250840528	-1.995157636	3.986596623	1.995157636
YJR021C	REC107	41.75372453	36.61819872	0.395512542	945	flat	1.140245178	0.189344069	0.877004366	-0.189344069
YJR022W	LSM8	456.8228532	185.3467798	0.967500362	330	down	2.46469269	1.301407775	0.405730095	-1.301407775
YJR023C	YJR023C	23.98792135	25.67301049	0.182543135	402	flat	0.934363399	-0.097944333	1.070247402	0.097944333
YJR024C	MDE1	177.0587953	159.6195542	0.560743802	735	flat	1.109255042	0.109591111	0.901505931	-0.149591111
YJR025C	BNA1	392.6442667	216.5746659	0.919551979	534	down	1.812974131	0.85835834	0.55157985	-0.85835834

YJR026W	YJR026W	1.069922473	0.573593338	0.092605481	1323	flat	1.865297942	0.899406089	0.536107384	-0.899406089
YJR027W	YJR027W	50.66659458	64.44869925	0.665021024	5268	flat	0.786153874	-0.347116376	1.272015611	0.347116376
YJR028W	YJR028W	0.267480618	0.688312006	0.086124402	1323	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YJR029W	YJR029W	58.66039604	73.03417639	0.664941279	5268	flat	0.803191039	-0.316184921	1.24503381	0.316184921
YJR030C	YJR030C	59.41431163	50.52311618	0.532673626	2238	flat	1.175982721	0.233866862	0.85035263	-0.233866862
YJR031C	GEA1	34.26167594	34.3975254	0.019928955	4227	flat	0.996050604	-0.005709056	1.003965056	0.005709056
YJR032W	CPR7	132.8535159	122.1116161	0.458655937	1182	flat	1.087967878	0.121635962	0.919144784	-0.121635962
YJR033C	RAV1	24.86432269	31.25610628	0.48045527	4074	flat	0.795502884	-0.330060934	1.257066467	0.330060934
YJR034W	PET191	443.4282649	222.7857576	0.941677541	327	down	1.99037977	0.993043727	0.502416682	-0.993043727
YJR035W	RAD26	32.23233813	36.98821396	0.384587502	3258	flat	0.871421858	-0.198556794	1.147549824	0.198556794
YJR036C	HUL4	38.20786906	63.90433572	0.823096999	2679	flat	0.597891655	-0.74204402	1.672543832	0.74204402
YJR037W	YJR037W	1.151942897	1.185724979	0.012295201	384	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YJR038C	YJR038C	0.731150533	1.672427519	0.149724518	363	flat	0.437179205	-1.193703316	2.287391505	1.193703316
YJR039W	YJR039W	26.73000332	38.64209368	0.663447876	3366	flat	0.691732791	-0.531713247	1.445644926	0.531713247
YJR040W	GEF1	65.89822262	77.89706393	0.597825141	2340	flat	0.845965423	-0.241329398	1.18208141	0.241329398
YJR041C	URB2	34.86063517	43.18528106	0.54276497	3525	flat	0.807234185	-0.308940823	1.238797883	0.308940823
YJR042W	NUP85	153.3862221	135.882491	0.589865159	2235	flat	1.128815206	0.174809327	0.885884594	-0.174809327
YJR043C	POL32	39.3196509	33.7272883	0.425438596	1053	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YJR044C	VPS55	81.35821383	69.24858129	0.593953893	423	flat	1.174871923	0.232503491	0.851156608	-0.232503491
YJR045C	SSC1	364.7723034	296.6714069	0.802551834	1965	flat	1.229549916	0.298130305	0.813305737	-0.298130305
YJR046W	TAH11	108.9901728	219.0043836	0.940481369	1815	up	0.497662061	-1.006761688	2.009395691	1.006761688
YJR047C	ANB1	32.10275295	15.3693972	0.794113383	474	flat	2.088745091	1.062636438	0.478756362	-1.062636438
YJR048W	CYC1	159.2445861	157.7517257	0.066195447	330	flat	1.009463354	0.013588538	0.990625361	-0.013588538
YJR049C	UTR1	121.1245178	161.3955547	0.820835146	1593	flat	0.750482366	-0.414109921	1.332476345	0.414109921
YJR050W	ISY1	148.6982561	156.7032696	0.335558939	708	flat	0.948916104	-0.075647554	1.053833943	0.075647554
YJR051W	OSM1	119.6625432	116.5002349	0.165854719	1506	flat	1.027144222	0.038638766	0.973573115	-0.038638766
YJR052W	RAD7	234.4069471	185.738441	0.808844425	1698	flat	1.262027105	0.335742896	0.792376008	-0.335742896
YJR053W	BFA1	32.77207425	41.1766198	0.549347542	1725	flat	0.795890348	-0.329358415	1.256454489	0.329358415
YJR054W	KCH1	140.5203789	144.2552692	0.175199362	1494	flat	0.974109158	-0.037844646	1.026578994	0.037844646
YJR055W	HIT1	216.6155313	239.7703586	0.584420763	495	flat	0.90342915	-0.14651663	1.106893662	0.14651663
YJR056C	YJR056C	139.6096466	170.3441523	0.753798753	711	flat	0.819574049	-0.287053792	1.220146003	0.287053792
YJR057W	CDC8	365.0204458	313.8036639	0.7300058	651	flat	1.163212823	0.218115079	0.859687909	-0.218115079
YJR058C	APS2	523.2435976	573.9336188	0.575619835	444	flat	0.911679645	-0.13340113	1.096876524	0.13340113
YJR059W	PTK2	59.01548336	73.44642085	0.665593736	2457	flat	0.803517485	-0.315598677	1.244527989	0.315598677
YJR060W	CBF1	94.3336511	92.70213474	0.112324199	1056	flat	1.017599555	0.025169945	0.982704832	-0.025169945
YJR061W	YJR061W	13.32709321	28.32227415	0.774496158	2808	flat	0.470551664	-1.087574965	2.125165157	1.087574965
YJR062C	NTA1	109.9748314	139.1802945	0.771813832	1374	flat	0.790160934	-0.339781575	1.26564972	0.339781575
YJR063W	RPA12	250.428729	151.371282	0.903987241	378	down	1.654400529	0.726308552	0.60444855	-0.726308552
YJR064W	CCT5	584.6615586	549.3114921	0.444707844	1689	flat	1.064353408	0.089977263	0.939537556	-0.089977263
YJR065C	ARP3	105.4421972	99.38307618	0.332129912	1350	flat	1.060967332	0.085380235	0.942536089	-0.085380235
YJR066W	TOR1	35.79106628	43.2817609	0.508249964	7413	flat	0.826931842	-0.274159671	1.209289507	0.274159671
YJR067C	YAE1	459.7907065	376.9380741	0.801631144	426	flat	1.219804361	0.286649778	0.819803595	-0.286649778
YJR068W	RFC2	159.1946035	153.6306564	0.232311115	1062	flat	1.036216386	0.051325302	0.965049399	-0.051325302
YJR069C	HAM1	167.5553305	111.1467455	0.873952443	594	flat	1.5075145	0.592171879	0.663343537	-0.592171879
YJR070C	LIA1	179.0189934	139.8234053	0.802957808	978	flat	1.280322082	0.356506785	0.781053466	-0.356506785
YJR071W	YJR071W	5.754095254	17.27495254	0.727395969	369	flat	0.333088918	-1.586020738	3.002201351	1.586020738
YJR072C	NPA3	66.69570318	54.39180561	0.624496158	1158	flat	1.226208662	0.294204501	0.815521885	-0.294204501
YJR073C	OPI3	543.9218375	272.2623128	0.94446861	621	down	1.997786002	0.998402054	0.500554113	-0.998402054
YJR074W	MOG1	297.7251649	213.914171	0.869363491	657	flat	1.391797297	0.47694911	0.718495432	-0.47694911

YJR075W	HOC1	83.04666821	89.58545468	0.38045527	1191	flat	0.927010624	-0.109342223	1.078736289	0.109342223
YJR076C	CDC11	80.17522567	55.82028364	0.794033638	1248	flat	1.436309894	0.522367054	0.696228581	-0.522367054
YJR077C	MIR1	152.1746105	112.694545	0.824430912	936	flat	1.350328096	0.433309989	0.740560759	-0.433309989
YJR078W	BNA2	8.119421304	39.89329034	0.925054371	1362	up	0.203528494	-2.296697309	4.913316953	2.296697309
YJR079W	YJR079W	8.578832924	13.79752703	0.455125417	330	flat	0.621765981	-0.685556412	1.608322152	0.685556412
YJR080C	AIM24	121.2438856	128.3344666	0.324677396	1185	flat	0.944749207	-0.081996692	1.058481968	0.081996692
YJR082C	EAF6	190.1312067	188.1627663	0.100543715	342	flat	1.01046137	0.015014169	0.989646937	-0.015014169
YJR083C	ACF4	48.13486296	32.4761147	0.726598521	930	flat	1.482161995	0.567703138	0.674690083	-0.567703138
YJR084W	YJR084W	128.3220918	112.7557339	0.598985066	1272	flat	1.138053804	0.186568766	0.878693078	-0.186568766
YJR085C	YJR085C	994.8613558	734.5230664	0.870595911	318	flat	1.354431741	0.437687689	0.738317015	-0.437687689
YJR086W	STE18	434.9072198	404.7274596	0.481781934	333	flat	1.074568106	0.103756924	0.93060644	-0.103756924
YJR087W	YJR087W	14.11474648	24.21446339	0.639720168	351	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YJR088C	EMC2	571.879496	494.1680842	0.729701319	879	flat	1.157257043	0.210709343	0.864112261	-0.210709343
YJR089W	BIR1	50.3641497	66.80122075	0.713027403	2865	flat	0.753940559	-0.40747731	1.32636451	0.40747731
YJR090C	GRR1	66.07032485	86.42617626	0.743214441	3456	flat	0.764471225	-0.387465896	1.308093709	0.387465896
YJR091C	JSN1	27.51835458	42.80771207	0.729498333	3276	flat	0.642836378	-0.637476522	1.555605803	0.637476522
YJR092W	BUD4	46.06753298	18.83184571	0.883884298	4344	flat	2.446256925	1.290575935	0.408787805	-1.290575935
YJR093C	FIP1	43.42543762	56.76055835	0.667406119	984	flat	0.765063609	-0.386348394	1.30708086	0.386348394
YJR094C	IME1	4.411207373	10.09015827	0.51922575	1083	flat	0.437179205	-1.193703316	2.287391505	1.193703316
YJR094W-A	RPL43B	3826.372802	2744.422088	0.880875743	279	flat	1.394236265	0.479475059	0.717238552	-0.479475059
YJR095W	SFC1	17.8034023	31.63891131	0.719805713	969	flat	0.562705908	-0.829546985	1.777127246	0.829546985
YJR096W	YJR096W	236.7515376	321.6010158	0.860482819	849	flat	0.736165391	-0.441898168	1.3583904	0.441898168
YJR097W	JJJ3	234.0428353	251.2000634	0.455857619	519	flat	0.93169895	-0.102064227	1.073308068	0.102064227
YJR098C	YJR098C	25.40516257	59.29226481	0.90646658	1971	up	0.428473472	-1.222722209	2.333866774	1.222722209
YJR099W	YUH1	101.9075762	101.6087926	0.019138756	711	flat	1.002940529	0.0907068092	0.997068092	-0.004236062
YJR100C	AIM25	162.8229141	165.500215	0.109322894	984	flat	0.983822977	-0.023529346	1.016443023	0.023529346
YJR101W	RSM26	259.4434269	258.8285158	0.023647963	801	flat	1.002375747	0.003423413	0.997629884	-0.003423413
YJR102C	VPS25	66.24295866	48.3479847	0.734790489	609	flat	1.370128643	0.454311356	0.729858474	-0.454311356
YJR103W	URA8	85.10768997	104.1526623	0.699499783	1737	flat	0.817143682	-0.291338319	1.223774988	0.291338319
YJR104C	SOD1	1913.408367	1929.309688	0.083608815	465	flat	0.991758025	-0.011939928	1.008310469	0.011939928
YJR105W	ADO1	303.9777997	238.5636932	0.825134116	1023	flat	1.274199756	0.349591466	0.784806303	-0.349591466
YJR106W	ECM27	13.64814329	20.48723711	0.523618965	2178	flat	0.666177836	-0.586020738	1.501100675	0.586020738
YJR107W	YJR107W	26.35253199	27.83270144	0.148832826	987	flat	0.946819052	-0.078839359	1.056168016	0.078839359
YJR108W	ABM1	46.37499149	69.35853642	0.793344933	372	flat	0.66862702	-0.580726439	1.495602138	0.580726439
YJR109C	CPA2	153.2992019	68.81090186	0.952972307	3357	down	2.227833058	1.155641129	0.448866667	-1.155641129
YJR110W	YMR1	113.9784801	154.0490222	0.825438596	2067	flat	0.739884476	-0.434628066	1.351562348	0.434628066
YJR111C	YJR111C	27.82834448	25.65174039	0.219088009	852	flat	1.084852102	0.117498373	0.921784636	-0.117498373
YJR112W	NNF1	290.8096953	155.7799999	0.923314485	606	down	1.866797377	0.900565346	0.535676776	-0.900565346
YJR112W-A	YJR112W-A	248.2499777	185.3467798	0.847049442	330	flat	1.339381121	0.421566538	0.74661348	-0.421566538
YJR113C	RSM7	124.7368361	133.8211761	0.404538205	744	flat	0.932115826	-0.101418858	1.072828046	0.101418858
YJR114W	YJR114W	3.151575072	5.406664536	0.259583877	393	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YJR115W	YJR115W	2.948973818	3.571124643	0.103494273	510	flat	0.825782943	-0.276165476	1.210971973	0.276165476
YJR116W	TDA4	8.741600959	8.492049375	0.034420763	840	flat	1.029386497	0.041784763	0.971452416	-0.041784763
YJR117W	STE24	36.43996281	55.71688595	0.769211251	1362	flat	0.654020091	-0.61259314	1.529005017	0.61259314
YJR118C	ILM1	195.4417942	127.4693102	0.883971292	612	flat	1.533245876	0.616589071	0.652211113	-0.616589071
YJR119C	JHD2	50.24177615	53.85262494	0.285667682	2187	flat	0.932949438	-0.1001292	1.071869449	0.1001292
YJR120W	YJR120W	33.52252288	25.94406792	0.53061476	351	flat	1.292107428	0.369726024	0.773929457	-0.369726024
YJR121W	ATP2	313.9620367	168.6693783	0.923858199	1536	down	1.861405075	0.896392046	0.537228577	-0.896392046
YJR122W	IBA57	87.10723867	129.0170366	0.853204292	1494	flat	0.675160746	-0.566697067	1.481128762	0.566697067

YJR123W	RPS5	677.4810646	352.5695513	0.932905611	678	down	1.921552959	0.942272738	0.520412407	-0.942272738
YJR124C	YJR124C	70.7359644	86.75950553	0.673133246	1347	flat	0.815310829	-0.294577917	1.226526086	0.294577917
YJR125C	ENT3	121.9245654	118.2516661	0.174322169	1227	flat	1.031060022	0.04412832	0.969875641	-0.04412832
YJR126C	VPS70	69.54784311	63.79940249	0.373024503	2436	flat	1.090101794	0.12446286	0.917345523	-0.12446286
YJR127C	RSF2	45.80411903	68.17503641	0.7876903	4143	flat	0.671860573	-0.573766224	1.488404053	0.573766224
YJR128W	YJR128W	2.211730363	2.951137726	0.116804408	360	flat	0.749450066	-0.416095737	1.334311711	0.416095737
YJR129C	EFM3	41.54583702	30.80095005	0.626946498	1020	flat	1.348849206	0.431729072	0.741372716	-0.431729072
YJR130C	STR2	155.9730683	148.9270574	0.300413223	1920	flat	1.047311825	0.066691053	0.954825464	-0.066691053
YJR131W	MNS1	111.9537697	107.9886449	0.211273017	1650	flat	1.036717979	0.052023487	0.964582481	-0.052023487
YJR132W	NMD5	67.94728043	76.29633473	0.48231115	3147	flat	0.890570703	-0.167197943	1.122875474	0.167197943
YJR133W	XPT1	223.5603008	230.3091972	0.201464405	630	flat	0.970696366	-0.042908004	1.03018826	0.042908004
YJR134C	SGM1	163.6097338	130.1930493	0.780085544	2124	flat	1.256670265	0.329606154	0.795753689	-0.329606154
YJR135C	MCM22	206.4281672	202.3637298	0.153334783	720	flat	1.020084812	0.028689106	0.980310645	-0.028689106
YJR135W-A	TIM8	737.5785651	539.8282451	0.871712339	264	flat	1.36632081	0.450296266	0.731892534	-0.450296266
YJR136C	TTI2	112.4383619	104.4187255	0.406836306	1266	flat	1.076802665	0.106753886	0.928675265	-0.106753886
YJR137C	MET5	46.08410228	55.42915052	0.558887922	4329	flat	0.83140553	-0.266375751	1.202782473	0.266375751
YJR138W	IML1	41.56471614	57.42150629	0.716064956	4755	flat	0.723852766	-0.466231817	1.381496414	0.466231817
YJR139C	HOM6	420.3926009	322.376664	0.84646223	1080	flat	1.304041663	0.382989963	0.766846665	-0.382989963
YJR140C	HIR3	32.56568418	39.945054	0.509264898	4947	flat	0.815261989	-0.294664343	1.226599563	0.294664343
YJR140W-A	YJR140W-A	8.257126689	15.17727973	0.539886907	150	flat	0.544045233	-0.87820149	1.83808246	0.87820149
YJR141W	YJR141W	176.8536884	181.4295508	0.185653183	1044	flat	0.974778847	-0.03685315	1.025873718	0.03685315
YJR142W	YJR142W	87.09359992	69.6178429	0.698731332	1029	flat	1.25102411	0.323109593	0.799345106	-0.323109593
YJR143C	PMT4	80.70062033	69.62054924	0.565550239	2289	flat	1.159149435	0.213066568	0.862701538	-0.213066568
YJR144W	MGM101	303.635082	194.4940292	0.897832391	810	flat	1.561153745	0.642612623	0.640551902	-0.642612623
YJR145C	RPS4A	772.0233364	507.2609906	0.899789764	786	flat	1.521945016	0.605916239	0.65705396	-0.605916239
YJR146W	YJR146W	10.99617356	15.43452176	0.400645208	354	flat	0.712440186	-0.489159199	1.403626605	0.489159199
YJR147W	HMS2	18.97529114	11.55558903	0.553566768	1077	flat	1.642087746	0.71553122	0.608980855	-0.71553122
YJR148W	BAT2	128.9100491	130.7044249	0.09738292	1131	flat	0.986271499	-0.019943251	1.013919596	0.019943251
YJR149W	YJR149W	29.92662319	29.72998005	0.024887632	1215	flat	1.006614304	0.009511004	0.993429157	-0.009511004
YJR150C	DAN1	1.57804619	1.861204873	0.065173264	897	flat	0.847862701	-0.238097435	1.179436245	0.238097435
YJR151C	DAN4	2.131788302	2.394579419	0.061606496	3486	flat	0.890255836	-0.167708107	1.123272614	0.167708107
YJR151W-A	YJR151W-A	3.469380962	8.927811608	0.50985211	51	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YJR152W	DAL5	44.45144357	47.89398936	0.284022039	1632	flat	0.928121549	-0.107614339	1.077445084	0.107614339
YJR153W	PGU1	20.36584128	30.60611659	0.632470639	1086	flat	0.665417359	-0.587668591	1.502816219	0.587668591
YJR154W	YJR154W	28.63988981	30.61699082	0.201834131	1041	flat	0.935424712	-0.096306553	1.069033122	0.096306553
YJR155W	AAD10	107.6528504	188.3593194	0.905190663	867	up	0.571529196	-0.807100895	1.749691891	0.807100895
YJR156C	THI11	5.448250748	5.044257194	0.077098739	1023	flat	1.080089801	0.111151266	0.925848943	-0.111151266
YJR157W	YJR157W	3.899469511	7.525923835	0.375496593	363	flat	0.518138317	-0.948590818	1.929986583	0.948590818
YJR158W	HXT16	0.882615403	1.336028146	0.086653618	1704	flat	0.660626354	-0.598093571	1.513714967	0.598093571
YJR159W	SOR1	35.33826167	56.10223514	0.786675366	1074	flat	0.629890442	-0.666827176	1.587577671	0.666827176
YJR160C	MPH3	4.010213152	6.208505806	0.252638828	1809	flat	0.645922429	-0.630567177	1.548173519	0.630567177
YJR161C	COS5	35.17265647	38.33844099	0.275895317	1152	flat	0.917425319	-0.124337371	1.090006978	0.124337371
YJR162C	YJR162C	0.756147133	0.432401132	0.070668407	351	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YKL001C	MET14	319.447952	395.0080193	0.811323764	609	flat	0.808712574	-0.306301052	1.236533266	0.306301052
YKL002W	DID4	343.1187991	292.6891714	0.739415688	699	flat	1.172297552	0.2293388	0.853025751	-0.2293388
YKL003C	MRP17	352.7598226	350.3038807	0.073162244	396	flat	1.00701089	0.010079284	0.993037921	-0.010079284
YKL004W	AUR1	90.96337149	94.2602199	0.197759896	1206	flat	0.965023969	-0.051363319	1.036243692	0.051363319
YKL005C	BYE1	56.25353417	69.55190377	0.646324489	1785	flat	0.808799344	-0.306146267	1.236400607	0.306146267
YKL006C-A	SFT1	298.2074544	260.1819383	0.692931709	294	flat	1.146149715	0.196795507	0.872486366	-0.196795507

YKL006W	RPL14A	1704.252279	959.4078988	0.919102508	417	down	1.776358399	0.82892269	0.562949459	-0.82892269
YKL007W	CAP1	180.0079929	176.4100172	0.148948818	807	flat	1.020395529	0.029128483	0.980012134	-0.029128483
YKL008C	LAC1	72.21114885	67.13259771	0.344011889	1257	flat	1.075649555	0.105208127	0.929670816	-0.105208127
YKL009W	MRT4	436.8711845	414.119869	0.394251124	711	flat	1.054938962	0.077159527	0.947922142	-0.077159527
YKL010C	UFD4	61.04614264	82.80685641	0.76399884	4452	flat	0.737211208	-0.43985009	1.356463371	0.43985009
YKL011C	CCE1	115.376518	154.4881299	0.821422358	1062	flat	0.746830958	-0.421146363	1.338991092	0.421146363
YKL012W	PRP40	58.97947635	62.28575416	0.241858779	1752	flat	0.946917592	-0.078689218	1.056058107	0.078689218
YKL013C	ARC19	670.5486396	447.6709255	0.895672031	516	flat	1.497860597	0.582903361	0.667618871	-0.582903361
YKL014C	URB1	32.17973696	31.12847175	0.106321589	5295	flat	1.033771822	0.047917784	0.967331454	-0.047917784
YKL015W	PUT3	87.17527704	122.8636931	0.831252719	2940	flat	0.709528379	-0.495067705	1.409386896	0.495067705
YKL016C	ATP7	584.2338415	390.5619985	0.895128317	525	flat	1.495879895	0.580994346	0.668502868	-0.580994346
YKL017C	HCS1	43.45856152	32.83972808	0.619066261	2052	flat	1.323353269	0.404198241	0.755656122	-0.404198241
YKL018C-A	YKL018C-A	375.1094696	298.4865014	0.821212121	300	flat	1.256704969	0.329645995	0.795731715	-0.329645995
YKL018W	SWD2	93.74162226	95.20293651	0.090416123	990	flat	0.984650534	-0.022316312	1.015588745	0.022316312
YKL019W	RAM2	82.70150548	83.30746605	0.047549659	951	flat	0.992726215	-0.010532204	1.00732708	0.010532204
YKL020C	SPT23	57.89028935	82.77668878	0.796672466	3249	flat	0.699355147	-0.515902823	1.429888669	0.515902823
YKL021C	MAK11	199.0714522	151.3413182	0.828715384	1407	flat	1.315380721	0.39548043	0.760236169	-0.39548043
YKL022C	CDC16	51.19502704	47.10190262	0.317732347	2523	flat	1.086899343	0.12021834	0.920048398	-0.12021834
YKL023C-A	YKL023C-A	93.51474949	79.21474949	0.628787879	228	flat	1.180506313	0.239405757	0.847094157	-0.239405757
YKL023W	YKL023W	85.92333785	75.88639867	0.522741772	834	flat	1.132262689	0.179208708	0.883187276	-0.179208708
YKL024C	URA6	87.60610024	81.43906199	0.372473539	615	flat	1.075725802	0.105310387	0.929604922	-0.105310387
YKL025C	PAN3	27.75504769	34.66966841	0.498296361	2040	flat	0.800557057	-0.320923866	1.249130205	0.320923866
YKL026C	GPX1	189.5768883	391.77859	0.951790634	504	up	0.483887821	-1.047255466	2.066594686	1.047255466
YKL027W	TCD2	149.6867514	157.8708115	0.337139336	1344	flat	0.948159764	-0.076797923	1.054674579	0.076797923
YKL028W	TFA1	178.1595362	169.6838728	0.313650863	1449	flat	1.049949729	0.070320254	0.952426552	-0.070320254
YKL029C	MAE1	52.15722349	53.38476006	0.097158185	2010	flat	0.977005861	-0.033560877	1.023535313	0.033560877
YKL030W	YKL030W	5.839552114	5.509903534	0.05722778	606	flat	1.059828376	0.08383066	0.943548996	-0.08383066
YKL031W	YKL031W	6.197118892	11.73123071	0.483913296	414	flat	0.528258206	-0.920684821	1.893013659	0.920684821
YKL032C	IXR1	15.38595035	14.88963898	0.064854284	1794	flat	1.033332667	0.047304784	0.96774256	-0.047304784
YKL033W	TTI1	50.09565725	66.07497144	0.705313905	3117	flat	0.758163888	-0.399418354	1.318976037	0.399418354
YKL033W-A	YKL033W-A	673.9089534	518.2902278	0.851681891	711	flat	1.300254022	0.378793501	0.769080489	-0.378793501
YKL034W	TUL1	31.35470185	37.65991677	0.464593301	2277	flat	0.832574911	-0.26434801	1.201093123	0.26434801
YKL035W	UGP1	452.9623784	323.9843314	0.876439031	1500	flat	1.398099644	0.483467187	0.715256602	-0.483467187
YKL036C	YKL036C	4.727362608	5.020474212	0.056937799	393	flat	0.941616749	-0.086788112	1.062003199	0.086788112
YKL037W	AIM26	1.239064629	5.951874405	0.479860809	357	flat	0.208180574	-2.264092643	4.803522161	2.264092643
YKL038W	RG11	27.07213368	37.19794435	0.615506742	3513	flat	0.727785746	-0.458414299	1.374030758	0.458414299
YKL039W	PTM1	133.0977687	227.2730057	0.90553139	1572	up	0.585629465	-0.771939953	1.707564356	-0.771939953
YKL040C	NFU1	409.4139526	455.7120958	0.619646223	771	flat	0.89840484	-0.154562395	1.113083941	0.154562395
YKL041W	VPS24	210.2290668	202.813427	0.247361172	675	flat	1.036563851	0.051808987	0.964725906	-0.051808987
YKL042W	SPC42	33.21646333	24.32256368	0.580788749	1092	flat	1.365664564	0.449603171	0.732244232	-0.449603171
YKL043W	PHD1	31.73963646	24.95084134	0.497883138	1101	flat	1.272086821	0.34719714	0.786109865	-0.34719714
YKL044W	YKL044W	16.53630178	16.54843585	0.004008989	321	flat	0.999266755	-0.001058238	1.000733784	0.001058238
YKL045W	PRI2	128.9966997	79.66398247	0.878207916	1587	flat	1.619259993	0.695334647	0.617566051	-0.695334647
YKL046C	DCW1	199.0229663	228.8958632	0.677794693	1350	flat	0.86949132	-0.201756469	1.150097737	0.201756469
YKL047W	ANR2	137.1814706	153.7298934	0.570392924	1551	flat	0.892353905	-0.164312103	1.120631618	0.164312103
YKL048C	ELM1	81.79836892	100.5504648	0.70139191	1923	flat	0.813505627	-0.29777577	1.229247797	0.29777577
YKL049C	CSE4	268.9976987	186.3066077	0.877830941	690	flat	1.443844112	0.529914987	0.692595545	-0.529914987
YKL050C	YKL050C	18.65872925	23.45836958	0.408336958	2769	flat	0.795366529	-0.330308244	1.257281975	0.330308244
YKL051W	SFK1	21.65912973	43.58823276	0.832941859	1062	flat	0.49690314	-1.008963436	2.012464642	1.008963436

YKL052C	ASK1	165.9678439	260.897266	0.896251994	879	flat	0.636142519	-0.652578078	1.571974787	0.652578078
YKL053C-A	MDM35	882.9973327	554.174237	0.906785559	261	down	1.593356879	0.672069437	0.627605788	-0.672069437
YKL053W	YKL053W	13.44732061	21.45055536	0.571647093	375	flat	0.626898483	-0.673696257	1.595154602	0.673696257
YKL054C	DEF1	69.63409082	55.72533019	0.658887922	2217	flat	1.249594943	0.321460521	0.80025932	-0.321460521
YKL055C	OAR1	58.34528843	60.92671434	0.194106133	837	flat	0.95763064	-0.062458782	1.044243948	0.062458782
YKL056C	TMA19	4060.631626	3148.984408	0.850746701	504	flat	1.289505155	0.36681754	0.775491278	-0.36681754
YKL057C	NUP120	89.80449169	99.57348265	0.489560679	3114	flat	0.901891641	-0.148973985	1.10878065	0.148973985
YKL058W	TOA2	1223.224749	1306.315459	0.456908801	369	flat	0.936393075	-0.09481383	1.06792759	0.09481383
YKL059C	MPE1	35.42771713	27.69910781	0.533362331	1326	flat	1.279020154	0.355038997	0.781848509	-0.355038997
YKL060C	FBA1	2007.923506	2138.029017	0.458873423	1080	flat	0.939146985	-0.090577124	1.06479605	0.090577124
YKL061W	BLI1	543.232019	354.1365271	0.899644773	342	flat	1.533962123	0.61726286	0.651906579	-0.61726286
YKL062W	MSN4	52.15617719	60.29220475	0.504371466	1893	flat	0.865056725	-0.209133356	1.155993556	0.209133356
YKL063C	YKL063C	120.4164309	78.29549069	0.85969987	504	flat	1.537974024	0.621031137	0.65020604	-0.621031137
YKL064W	MNR2	54.32800219	66.28976818	0.618819777	2910	flat	0.819553359	-0.287090212	1.220176806	0.287090212
YKL065C	YET1	462.8606731	428.189921	0.513418878	621	flat	1.0809705	0.112327152	0.925094625	-0.112327152
YKL065W-A	YKL065W-A	472.2343208	425.237297	0.620124692	222	flat	1.110519524	0.151234757	0.900479441	-0.151234757
YKL066W	YKL066W	149.6404957	143.5688623	0.266963897	444	flat	1.04229074	0.059757764	0.959425199	-0.059757764
YKL067W	YNK1	988.4807043	673.4507241	0.892185008	462	flat	1.467784752	0.553640415	0.681298807	-0.553640415
YKL068W	NUP100	43.6509562	46.26962363	0.213484124	2880	flat	0.943404177	-0.084052107	1.059991067	0.084052107
YKL068W-A	YKL068W-A	576.3564018	561.6233893	0.221429607	237	flat	1.026232904	0.037358189	0.97443767	-0.037358189
YKL069W	YKL069W	305.1617658	235.9046795	0.83477599	543	flat	1.293580808	0.371370179	0.773047957	-0.371370179
YKL070W	YKL070W	4.51019525	4.166312084	0.069247499	510	flat	1.082538984	0.11441898	0.923754262	-0.11441898
YKL071W	YKL071W	90.64938972	101.7724205	0.531006235	771	flat	0.890706827	-0.166977444	1.122703869	0.166977444
YKL072W	STB6	37.41005899	46.50144377	0.563948093	2301	flat	0.804492419	-0.313849269	1.243019793	0.313849269
YKL073W	LHS1	59.04634651	68.42968527	0.533222459	2646	flat	0.862876196	-0.212774516	1.158914807	0.212774516
YKL074C	MUD2	137.8421853	141.1372036	0.145635784	1584	flat	0.976653793	-0.034080852	1.023904281	0.034080852
YKL075C	YKL075C	116.7165912	112.6237166	0.213360882	1353	flat	1.036341144	0.051498989	0.964933223	-0.051498989
YKL076C	PSY1	88.23882595	83.3959902	0.286813107	384	flat	1.058070367	0.081435577	0.945116725	-0.081435577
YKL077W	YKL077W	110.380165	107.7471004	0.136080905	1179	flat	1.024437452	0.034831902	0.976145491	-0.034831902
YKL078W	DHR2	49.96427107	47.49773685	0.197513412	2208	flat	1.05192951	0.073038033	0.95063404	-0.073038033
YKL079W	SMY1	158.8495942	220.3824181	0.857198782	1971	flat	0.720790686	-0.472347727	1.38736532	0.472347727
YKL080W	VMA5	238.4691805	176.2315179	0.851428157	1179	flat	1.353158523	0.436330862	0.739011714	-0.436330862
YKL081W	TEF4	229.3487628	120.7812576	0.924561404	1239	down	1.898877088	0.925146525	0.526627029	-0.925146525
YKL082C	RRP14	168.5999514	113.2771683	0.869617225	1305	flat	1.488384234	0.573747014	0.671869519	-0.573747014
YKL083W	YKL083W	1.870080957	4.442130654	0.311526751	615	flat	0.420987383	-1.2481511	2.375368102	1.2481511
YKL084W	HOT13	20.92007067	23.78206226	0.275358852	351	flat	0.879657552	-0.184986098	1.136806019	0.184986098
YKL085W	MDH1	223.5938357	173.217312	0.822190808	1005	flat	1.290828458	0.368297289	0.774696277	-0.368297289
YKL086W	SRX1	21.65652647	43.08134091	0.825141366	384	flat	0.502689239	-0.992261289	1.989300591	0.992261289
YKL087C	CYT2	178.9044116	176.2812935	0.108757431	675	flat	1.014880298	0.021309575	0.985337879	-0.021309575
YKL088W	CAB3	61.45413969	68.63385241	0.446991446	1716	flat	0.895391087	-0.159410138	1.116830416	0.159410138
YKL089W	MIF2	55.44070777	48.75126217	0.450993185	1650	flat	1.137215844	0.185506105	0.879340545	-0.185506105
YKL090W	CUE2	186.1041585	224.1269462	0.757604756	1332	flat	0.830351556	-0.268205818	1.204309178	0.268205818
YKL091C	YKL091C	115.4935727	147.3806585	0.783500072	933	flat	0.783641312	-0.351734638	1.276094029	0.351734638
YKL092C	BUD2	79.02182329	84.05878006	0.310185588	3315	flat	0.94007816	-0.089147385	1.063741338	0.089147385
YKL093W	MBR1	10.06120479	11.01096765	0.127250979	1020	flat	0.913743924	-0.130138187	1.094398522	0.130138187
YKL094W	YJU3	332.933509	373.631759	0.650862694	942	flat	0.891073901	-0.166383009	1.122241375	0.166383009
YKL095W	YJU2	31.28660394	32.82064076	0.147817892	837	flat	0.953259998	-0.069058338	1.049031746	0.069058338
YKL096C-B	YKL096C-B	8.846921453	13.15364244	0.397484414	150	flat	0.672583392	-0.572214939	1.486804478	0.572214939
YKL096W	CWP1	88.83783625	121.839829	0.816318689	720	flat	0.729136252	-0.455739662	1.371485778	0.455739662

YKL096W-A	CWP2	1542.027922	1139.111963	0.871146875	279	flat	1.353710585	0.436919333	0.738710335	-0.436919333
YKL097C	YKL097C	3.87456414	4.800599429	0.133891547	411	flat	0.807100071	-0.309180533	1.239003732	0.309180533
YKL098W	MTC2	103.9554457	121.1073439	0.642293751	1074	flat	0.858374417	-0.220321015	1.164992781	0.220321015
YKL099C	UTP11	268.2273795	188.0531473	0.873401479	753	flat	1.426338157	0.512316057	0.701096017	-0.512316057
YKL100C	YKL100C	96.59393831	133.0162952	0.824735392	1764	flat	0.726181241	-0.461598432	1.377066693	0.461598432
YKL100W-A	YKL100W-A	0.491495636	1.686364415	0.179889807	90	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YKL101W	HSL1	44.78790387	35.10391231	0.586784109	4557	flat	1.275866447	0.351477321	0.783781094	-0.351477321
YKL102C	YKL102C	15.61221433	18.84760228	0.312316949	306	flat	0.828339547	-0.271705828	1.207234406	0.271705828
YKL103C	APE1	255.2150739	231.9324107	0.56307815	1545	flat	1.100385553	0.138009103	0.908772382	-0.138009103
YKL104C	GFA1	126.6251571	102.5910831	0.734094534	2154	flat	1.234270595	0.303658718	0.81019511	-0.303658718
YKL105C	SEG2	24.02385555	19.37905091	0.397477164	3399	flat	1.23968174	0.309969789	0.806658651	-0.309969789
YKL106C-A	YKL106C-A	46.44633763	48.06138582	0.140053647	120	flat	0.966396138	-0.049313406	1.034772348	0.049313406
YKL106W	AAT1	148.8840321	160.1673105	0.444664347	1356	flat	0.929553176	-0.105390697	1.075785685	0.105390697
YKL107W	YKL107W	4.185640257	5.0509093245	0.128048427	930	flat	0.827349894	-0.273430508	1.208678466	0.273430508
YKL108W	SLD2	45.72858078	31.53575745	0.704320719	1362	flat	1.450054937	0.536107559	0.689629044	-0.536107559
YKL109W	HAP4	134.7495063	188.4170403	0.854211976	1665	flat	0.71516624	-0.48364946	1.398276294	0.48364946
YKL110C	KTI12	124.8148472	171.4291469	0.841757286	942	flat	0.728084165	-0.457822863	1.373467586	0.457822863
YKL111C	YKL111C	4.212819739	2.710228524	0.191815282	336	flat	1.554414951	0.636371683	0.643328861	-0.636371683
YKL112W	ABF1	145.0314992	163.4529443	0.595425547	2196	flat	0.887298175	-0.172509093	1.127016856	0.172509093
YKL113C	RAD27	248.0833849	153.2258006	0.901123677	1149	down	1.619070573	0.695165872	0.617638302	-0.695165872
YKL114C	APN1	191.9237036	181.8799012	0.353139046	1104	flat	1.055222168	0.077546778	0.947667733	-0.077546778
YKL115C	YKL115C	18.23411292	31.28141624	0.702696825	393	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YKL116C	PRR1	53.29744587	47.37416795	0.416449181	1557	flat	1.125031809	0.169965793	0.888863757	-0.169965793
YKL117W	SBA1	924.1023944	631.3375349	0.892105263	651	flat	1.463721612	0.549641191	0.683190022	-0.549641191
YKL118W	YKL118W	17.29686566	14.59353821	0.274438162	312	flat	1.1852414	0.245180926	0.843709981	-0.245180926
YKL119C	VPH2	551.8403783	477.3348163	0.728831376	648	flat	1.156086586	0.209249454	0.864987114	-0.209249454
YKL120W	OAC1	260.5078102	306.1918896	0.734971727	975	flat	0.850799185	-0.233109443	1.175365489	0.233109443
YKL121W	DGR2	26.41284873	36.11943477	0.603153545	2559	flat	0.731264177	-0.451535406	1.367494856	0.451535406
YKL122C	SRP21	309.9933192	185.1989491	0.908039727	504	down	1.673839515	0.743161211	0.59742884	-0.743161211
YKL123W	YKL123W	20.66603699	27.08805832	0.489299696	381	flat	0.762920574	-0.390395227	1.310752436	0.390395227
YKL124W	SSH4	32.08280136	41.08332618	0.571161375	1740	flat	0.78092025	-0.356752871	1.28054049	0.356752871
YKL125W	RRN3	94.80856907	64.93040056	0.821900826	1884	flat	1.460156849	0.54612335	0.684857932	-0.54612335
YKL126W	YPK1	121.4232391	99.5475029	0.718022329	2043	flat	1.219751732	0.286587532	0.819838967	-0.286587532
YKL127W	PGM1	59.75416299	45.80650101	0.675279107	1713	flat	1.304490884	0.383486862	0.76658259	-0.383486862
YKL128C	PMU1	380.078889	367.4679215	0.267000145	888	flat	1.034318553	0.048680581	0.966820132	-0.048680581
YKL129C	MYO3	52.67844824	51.18705498	0.116434682	3819	flat	1.029136141	0.041433844	0.97168874	-0.041433844
YKL130C	SHE2	221.1133405	206.8698047	0.44368566	741	flat	1.068852657	0.096062989	0.935582649	-0.096062989
YKL131W	YKL131W	1.186368777	1.744514912	0.098274612	522	flat	0.680056541	-0.556273395	1.470465968	0.556273395
YKL132C	RMA1	30.17395484	80.8750637	0.939669421	1293	up	0.373093429	-1.422391143	2.680293788	1.422391143
YKL133C	YKL133C	85.99055119	93.11348342	0.391510802	1392	flat	0.923502677	-0.114811952	1.082833894	0.114811952
YKL134C	oct-01	49.9379913	64.46580654	0.680817747	2319	flat	0.774643086	-0.368396349	1.290917093	0.368396349
YKL135C	APL2	78.89620461	83.64553067	0.284804988	2181	flat	0.943220803	-0.084332557	1.060197142	0.084332557
YKL136W	YKL136W	51.44074629	28.14833835	0.817717848	399	flat	1.827487848	0.869861813	0.547199261	-0.869861813
YKL137W	CMC1	483.4210651	418.2786022	0.725953313	336	flat	1.15573941	0.208816144	0.86524695	-0.208816144
YKL138C	MRPL31	365.9408419	308.1447704	0.762954908	396	flat	1.187561423	0.248002134	0.842061708	-0.248002134
YKL138C-A	HSK3	441.5035087	310.7728707	0.881868929	210	flat	1.420662967	0.506564336	0.703896718	-0.506564336
YKL139W	CTK1	229.2283618	211.640328	0.503494273	1587	flat	1.083103414	0.115170997	0.923272872	-0.115170997
YKL140W	TGL1	67.84251242	56.85720459	0.586320139	1647	flat	1.193208722	0.254846428	0.838076341	-0.254846428
YKL141W	SDH3	95.73050684	88.21634954	0.413027403	597	flat	1.085178738	0.117932686	0.921507181	-0.117932686

YKL142W	MRP8	464.329332	371.8433535	0.820595911	660	flat	1.248722957	0.320453435	0.800818143	-0.320453435
YKL143W	LTV1	205.6019461	147.5205422	0.858075975	1392	flat	1.393717397	0.478938057	0.717505573	-0.478938057
YKL144C	RPC25	299.7431134	209.4892132	0.87830941	639	flat	1.430828389	0.516850648	0.698895834	-0.516850648
YKL145W	RPT1	747.3254162	641.5751796	0.746447731	1404	flat	1.164829064	0.220118259	0.858495062	-0.220118259
YKL145W-A	YKL145W-A	NA	NA	NA	93	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YKL146W	AVT3	40.51115547	57.16118341	0.730687255	2079	flat	0.708717928	-0.49671655	1.410998594	0.49671655
YKL147C	YKL147C	1.717848826	1.964696406	0.060439321	618	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YKL148C	SDH1	63.07399538	45.22403166	0.740256633	1923	flat	1.39470085	0.479955711	0.716999635	-0.479955711
YKL149C	DBR1	130.0163333	119.1254468	0.475496593	1218	flat	1.091423678	0.126211248	0.916234474	-0.126211248
YKL150W	MCR1	155.526738	113.8713397	0.832137161	909	flat	1.365811085	0.449757948	0.732165679	-0.449757948
YKL151C	YKL151C	211.2267933	215.5353335	0.155480644	1014	flat	0.980010051	-0.029131549	1.020397697	0.029131549
YKL152C	GPM1	1832.287805	1642.98133	0.657126287	744	flat	1.115221318	0.157330044	0.896683003	-0.157330044
YKL153W	YKL153W	1.387752385	2.380749762	0.14323619	510	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YKL154W	SRP102	506.9827641	336.584571	0.896121502	735	flat	1.506256697	0.590967656	0.663897463	-0.590967656
YKL155C	RSM22	89.1255839	96.83860519	0.41661592	1887	flat	0.920351793	-0.119742676	1.086541046	0.119742676
YKL156C-A	YKL156C-A	NA	NA	NA	117	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YKL156W	RPS27A	786.9851814	654.024946	0.794519356	249	flat	1.203295358	0.266990806	0.831051157	-0.266990806
YKL157W	APE2	147.2320821	160.7974128	0.499557779	2859	flat	0.915637133	-0.127152123	1.092135698	0.127152123
YKL159C	RCN1	58.4230662	64.90912087	0.421444106	636	flat	0.900074834	-0.111018731	1.111018731	0.111018731
YKL160W	ELF1	434.2666923	269.2407843	0.907148035	438	down	1.612930572	0.68968434	0.619989488	-0.68968434
YKL161C	KDX1	43.21537668	82.53082989	0.883746556	1302	flat	0.523627071	-0.933388411	1.909756115	0.933388411
YKL162C	YKL162C	19.61104176	30.00305919	0.637552559	1209	flat	0.653634739	-0.613443434	1.529906445	0.613443434
YKL162C-A	YKL162C-A	88.46921453	93.24603235	0.285399449	153	flat	0.948771892	-0.075866825	1.053994125	0.075866825
YKL163W	PIR3	19.62967234	36.00336297	0.757858489	978	flat	0.545217744	-0.875095579	1.834129594	0.875095579
YKL164C	PIR1	81.65725746	70.70896406	0.563505872	1026	flat	1.154836003	0.207687991	0.865923817	-0.207687991
YKL165C	MCD4	41.73439033	41.4075784	0.033826301	2760	flat	1.007892563	0.011341862	0.992169242	-0.011341862
YKL165C-A	YKL165C-A	94.51839159	69.40038169	0.784964477	234	flat	1.361928988	0.445651482	0.734252673	-0.445651482
YKL166C	TPK3	103.3988564	95.60291495	0.403603016	1197	flat	1.081545018	0.113093718	0.924603214	-0.113093718
YKL167C	MRP49	391.2732652	292.5475659	0.858503697	414	flat	1.33746888	0.419505323	0.747680948	-0.419505323
YKL168C	KKQ8	81.14762436	91.76148437	0.532419893	2175	flat	0.88433208	-0.177339869	1.130796928	0.177339869
YKL169C	YKL169C	0.691165738	4.347658257	0.409837611	384	flat	0.158974256	-2.653134934	6.290326639	2.653134934
YKL170W	MRPL38	297.6554148	199.0880579	0.888596491	417	flat	1.495094271	0.580236455	0.668854145	-0.580236455
YKL171W	NNK1	29.23578995	38.17464332	0.573611715	2787	flat	0.765843172	-0.384879104	1.305750363	0.384879104
YKL172W	EBP2	284.0798843	189.9524029	0.887748296	1284	flat	1.495531933	0.580658716	0.668658407	-0.580658716
YKL173W	SNU114	63.8895616	63.77766707	0.011976222	3027	flat	1.001754447	0.002528914	0.998248626	-0.002528914
YKL174C	TPO5	156.738673	205.1425532	0.826678266	1857	flat	0.764047588	-0.388265597	1.308881	0.388265597
YKL175W	ZRT3	123.4590229	124.9716486	0.091764535	1512	flat	0.987896249	-0.01756856	1.012252046	0.01756856
YKL176C	LST4	149.3696147	150.0030301	0.048441351	2487	flat	0.995777316	-0.006104944	1.004240591	0.006104944
YKL177W	YKL177W	6.524278357	34.92117461	0.91323764	339	up	0.18682872	-2.420211845	5.352496122	2.420211845
YKL178C	STE3	10.08035636	17.61552637	0.562099464	1413	flat	0.572242699	-0.805300943	1.74751028	0.805300943
YKL179C	COY1	140.0762563	133.3963851	0.296375236	2040	flat	1.050075354	0.07049286	0.952312609	-0.07049286
YKL180W	RPL17A	222.3685662	151.4993328	0.876518776	555	flat	1.467785779	0.553641424	0.68129833	-0.553641424
YKL181W	PRS1	410.4447904	405.5548814	0.122241554	1284	flat	1.01205733	0.017291017	0.988086317	-0.017291017
YKL182W	FAS1	85.40814521	40.9017334	0.916572423	6156	down	2.088130212	1.062211678	0.478897338	-1.062211678
YKL183C-A	YKL183C-A	32.39717715	52.01602913	0.778490648	213	flat	0.622830648	-0.683088156	1.605572883	0.683088156
YKL183W	LOT5	100.6685525	94.26062983	0.338350007	921	flat	1.067980902	0.094885848	0.936346332	-0.094885848
YKL184W	SPE1	207.7542582	210.8136071	0.112534435	1401	flat	0.985487896	-0.021089942	1.014725806	0.021089942
YKL185W	ASH1	66.08905669	38.48003011	0.833724808	1767	flat	1.717489734	0.58224511	0.780301476	-0.780301476
YKL186C	MTR2	154.1436585	153.9605133	0.015412498	555	flat	1.001189559	0.001715151	0.998811854	-0.001715151

YKL187C	FAT3	7.068113011	7.005934719	0.013092649	2253	flat	1.008875089	0.012747562	0.991202986	-0.012747562
YKL188C	PXA2	25.8639507	47.15501432	0.803856749	2562	flat	0.548487813	-0.866468528	1.823194564	0.866468528
YKL189W	HYM1	44.16088292	53.87934305	0.57385095	1200	flat	0.819625489	-0.286963244	1.220069426	0.286963244
YKL190W	CNB1	403.8083466	376.844957	0.477671451	528	flat	1.071550353	0.099699645	0.93322726	-0.099699645
YKL191W	DPH2	57.71169321	53.99518211	0.289836161	1605	flat	1.068830421	0.096032975	0.935602113	-0.096032975
YKL192C	ACP1	92.21394318	89.93943546	0.145128317	378	flat	1.025289326	0.036031081	0.975334449	-0.036031081
YKL193C	SDS22	127.2669232	118.791688	0.397585907	1017	flat	1.071345355	0.099423617	0.93340583	-0.099423617
YKL194C	MST1	39.04364903	47.9685083	0.556553574	1389	flat	0.813943364	-0.296999682	1.22858671	0.296999682
YKL195W	MIA40	421.3966794	336.730241	0.818986516	1212	flat	1.251436991	0.323585654	0.799081382	-0.323585654
YKL196C	YKT6	1021.577348	932.5343518	0.584732492	603	flat	1.09548495	0.131569665	0.912837734	-0.131569665
YKL197C	PEX1	34.65891642	39.25158552	0.368370306	3132	flat	0.882994049	-0.17952438	1.132510464	0.17952438
YKL198C	PTK1	8.228659974	8.698893362	0.06968972	1989	flat	0.945943309	-0.08017437	1.057145804	0.08017437
YKL201C	MNN4	33.04151326	46.25701881	0.681818182	3537	flat	0.714302696	-0.485392528	1.399966716	0.485392528
YKL202W	YKL202W	1.064062718	2.868558025	0.242489488	582	flat	0.370939932	-1.430742513	2.695854274	1.430742513
YKL203C	TOR2	20.49387865	21.03356343	0.058046977	7425	flat	0.974341733	-0.037500234	1.02633395	0.037500234
YKL204W	EAP1	36.10512968	41.79945919	0.426134551	1899	flat	0.863770259	-0.211280452	1.157715249	0.211280452
YKL205W	LOS1	106.4684008	139.6879515	0.800645208	3303	flat	0.76218743	-0.39178228	1.312013241	0.39178228
YKL206C	ADD66	243.620449	226.3377911	0.479099609	804	flat	1.076357809	0.106157747	0.929059084	-0.106157747
YKL207W	EMC3	310.2227575	246.7801783	0.81600696	762	flat	1.257081341	0.330078004	0.795493472	-0.330078004
YKL208W	CBT1	166.6387043	153.0747699	0.481963172	816	flat	1.088609863	0.122487013	0.918602737	-0.122487013
YKL209C	STE6	253.0955066	145.0717521	0.910780049	3873	down	1.74462294	0.802915265	0.573189758	-0.802915265
YKL210W	UBA1	210.1683291	169.4919629	0.785406699	3075	flat	1.239989941	0.310328417	0.806458155	-0.310328417
YKL211C	TRP3	138.3281533	85.43087355	0.882021169	1455	flat	1.619182241	0.695265372	0.617595706	-0.695265372
YKL212W	SAC1	82.60907425	73.04876624	0.514020589	1872	flat	1.130875694	0.177440357	0.884270486	-0.177440357
YKL213C	DOA1	132.9097557	147.1800451	0.539749166	2148	flat	0.903041955	-0.147135078	1.107368261	0.147135078
YKL214C	YRA2	93.96240105	48.85496908	0.895548789	612	flat	1.923292611	0.943578272	0.519941684	-0.943578272
YKL215C	OMP1	31.64361183	37.18649735	0.426127302	3861	flat	0.850943597	-0.232864585	1.17516602	0.232864585
YKL216W	URA1	1042.157985	462.0638497	0.964665797	945	down	2.255441507	1.173409871	0.443372172	-1.173409871
YKL217W	JEN1	14.0996317	10.98733379	0.309293896	1851	flat	1.283262343	0.359816137	0.779263886	-0.359816137
YKL218C	SRY1	107.8584919	110.4646048	0.135645933	981	flat	0.976407711	-0.034444406	1.024162334	0.034444406
YKL219W	COS9	69.53217678	83.94622859	0.646215746	1224	flat	0.82829423	-0.271784756	1.207300454	0.271784756
YKL220C	FRE2	35.41253671	28.77714556	0.484645498	2136	flat	1.230578503	0.299336696	0.812625929	-0.299336696
YKL221W	MCH2	3.421805063	8.111626299	0.464883283	1422	flat	0.421839584	-1.245233616	2.370569378	1.245233616
YKL222C	YKL222C	28.61256466	34.32444283	0.43999565	2118	flat	0.833591525	-0.262587484	1.199628319	0.262587484
YKL223W	YKL223W	0.265673317	0.227887083	0.020545165	333	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YKL224C	PAU16	0.713461407	2.447948344	0.237255328	372	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YKL225W	YKL225W	1.016887523	0.436128728	0.105886617	348	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YKR001C	VPS1	85.37383775	85.46638375	0.010606061	2115	flat	0.998917165	-0.001563047	1.001084009	0.001563047
YKR002W	PAP1	66.23529945	73.79696648	0.456713064	1707	flat	0.897534175	-0.155961222	1.114163703	0.155961222
YKR003W	OSH6	76.31865425	82.70321696	0.3892272	1347	flat	0.922801519	-0.115907716	1.083656647	0.115907716
YKR004C	ECM9	88.62524489	99.70964199	0.530426272	1134	flat	0.888833247	-0.170015312	1.125070426	0.170015312
YKR005C	YKR005C	16.5389216	22.12151038	0.45477019	1578	flat	0.7476398	-0.419584723	1.33754249	0.419584723
YKR006C	MRPL13	115.7333121	113.5909615	0.126388285	795	flat	1.01886022	0.026956139	0.981488903	-0.026956139
YKR007W	MEH1	204.6747233	116.2224124	0.908220966	555	down	1.761060704	0.81644464	0.567839597	-0.81644464
YKR008W	RSC4	67.41184557	81.70516406	0.649514282	1878	flat	0.825062239	-0.277425141	1.212029776	0.277425141
YKR009C	FOX2	14.72850408	24.76204352	0.636892852	2703	flat	0.59480164	-0.749519471	1.681232756	0.749519471
YKR010C	TOF2	59.28506949	56.42330678	0.213875598	2316	flat	1.050719514	0.071377598	0.951728779	-0.071377598
YKR011C	YKR011C	106.3961705	132.3367329	0.746121502	1062	flat	0.807003227	-0.309353653	1.239352418	0.309353653
YKR012C	YKR012C	29.02164709	78.29549069	0.938364506	378	up	0.370668181	-1.43179982	2.697830707	1.43179982

YKR013W	PRY2	89.36284296	49.3644856	0.875634334	990	flat	1.81026586	0.85620159	0.552405049	-0.85620159
YKR014C	YPT52	285.7367397	194.3983489	0.884290271	705	flat	1.46985168	0.555670582	0.680340754	-0.555670582
YKR015C	YKR015C	7.877750796	13.33680117	0.468718283	1707	flat	0.590677682	-0.759556993	1.692970686	0.759556993
YKR016W	MIC60	152.6271107	121.1938049	0.774691895	1623	flat	1.259363965	0.332695293	0.794051623	-0.332695293
YKR017C	HEL1	78.58587836	102.2816678	0.762034218	1656	flat	0.768328089	-0.380205597	1.301527321	0.380205597
YKR018C	YKR018C	108.0884205	107.0353612	0.059598376	2178	flat	1.009838424	0.014124478	0.990257427	-0.014124478
YKR019C	IRS4	23.79285694	24.72056926	0.104588952	1848	flat	0.962472048	-0.055183452	1.038991212	0.055183452
YKR020W	VPS51	110.0950225	75.73309281	0.834833986	495	flat	1.453724104	0.539753493	0.687888436	-0.539753493
YKR021W	ALY1	23.2119009	31.97832957	0.578374656	2748	flat	0.725863459	-0.462229905	1.377669572	0.462229905
YKR022C	NTR2	234.2745144	220.6892378	0.404226475	969	flat	1.061558401	0.086183742	0.942011291	-0.086183742
YKR023W	YKR023W	49.81599839	47.63741285	0.177881688	1593	flat	1.045732659	0.064514074	0.956267352	-0.064514074
YKR024C	DBP7	131.3345136	101.3861351	0.784746991	2229	flat	1.29538929	0.373385721	0.771968711	-0.373385721
YKR025W	RPC37	178.5014894	133.8961428	0.827519211	849	flat	1.333133918	0.414821711	0.750112188	-0.414821711
YKR026C	GCN3	207.3918842	196.4118554	0.359721618	918	flat	1.055903086	0.078477425	0.078477425	-0.078477425
YKR027W	BCH2	45.62054796	57.12944721	0.62031318	2298	flat	0.798546987	-0.324550795	1.252274463	0.324550795
YKR028W	SAP190	65.31092884	58.90859058	0.418805278	3102	flat	1.108682591	0.14884639	0.90197141	-0.14884639
YKR029C	SET3	35.25435455	28.39012432	0.494787589	2256	flat	1.241782323	0.3124123	0.805294117	-0.3124123
YKR030W	GMH1	140.4529501	209.5646289	0.879802813	822	flat	0.670213055	-0.577308307	1.49206285	0.577308307
YKR031C	SPO14	64.33806298	51.01152215	0.652812817	5052	flat	1.2612457	0.334849351	0.792866925	-0.334849351
YKR032W	YKR032W	6.740511583	8.190912872	0.179309845	315	flat	0.822925563	-0.281166157	1.215176737	0.281166157
YKR033C	YKR033C	0.83069685	1.425096689	0.101768885	426	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YKR034W	DAL80	1.092212525	3.185355006	0.270363926	810	flat	0.342885651	-1.544200563	2.916424169	1.544200563
YKR035C	OPI8	0.826815089	0.709218679	0.03999565	642	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YKR035W-A	DID2	462.3415536	425.7041877	0.542257503	615	flat	1.086062968	0.119107751	0.920756926	-0.119107751
YKR036C	CAF4	62.0017166	53.96889843	0.496810207	1932	flat	1.148841618	0.200179918	0.870442004	-0.200179918
YKR037C	SPC34	62.76532112	62.72591962	0.006901551	888	flat	1.000628153	0.000905949	0.999372241	-0.000905949
YKR038C	KAE1	146.9914856	110.0712277	0.81707989	1161	flat	1.335421515	0.417295189	0.748827235	-0.417295189
YKR039W	GAP1	75.80280957	109.6556363	0.831731187	1809	flat	0.691280559	-0.532656742	1.44659066	0.532656742
YKR040C	YKR040C	12.63845922	25.59660273	0.731557199	504	flat	0.493755338	-1.018131751	2.025294562	1.018131751
YKR041W	YKR041W	5.639471842	13.30279499	0.608336958	753	flat	0.42393135	-1.238097435	2.35887249	1.238097435
YKR042W	UTH1	321.3253438	315.4330815	0.164470059	1098	flat	1.018679912	0.026700802	0.981662628	-0.026700802
YKR043C	SHB17	152.0022534	136.3351231	0.564419313	816	flat	1.114916318	0.15693543	0.896928302	-0.15693543
YKR044W	UIP5	54.66228495	54.12318223	0.044562853	1332	flat	1.009960662	0.014299101	0.990137574	-0.014299101
YKR045C	YKR045C	22.91865521	28.31992414	0.435044222	552	flat	0.809276716	-0.305295007	1.235671285	0.305295007
YKR046C	PET10	20.55974704	28.85820794	0.567906336	852	flat	0.712440186	-0.489159199	1.403626605	0.489159199
YKR047W	YKR047W	51.17336919	48.60697431	0.202240110	306	flat	1.052798902	0.07422989	0.949849015	-0.07422989
YKR048C	NAP1	209.8145486	137.7332084	0.884717993	1254	flat	1.523340312	0.607238273	0.656452135	-0.607238273
YKR049C	FMP46	142.8271647	134.0282166	0.370276932	402	flat	1.065649968	0.091733637	0.938394435	-0.091733637
YKR050W	TRK2	8.813786915	11.36874886	0.270066696	2670	flat	0.775264457	-0.367239571	1.289882428	0.367239571
YKR051W	YKR051W	106.6275736	128.8318017	0.709170654	1257	flat	0.827649479	-0.272908199	1.208240958	0.272908199
YKR052C	MRS4	116.2185747	218.6191769	0.921966072	915	up	0.531602837	-0.911579291	1.88110358	0.911579291
YKR053C	YSR3	20.67922381	36.97510124	0.754813687	1215	flat	0.559274298	-0.838372062	1.788031388	0.838372062
YKR054C	DYN1	24.43188423	26.27811443	0.195063071	12279	flat	0.929742668	-0.105096629	1.075566427	0.105096629
YKR055W	RHO4	73.72434544	71.72823984	0.136718863	876	flat	1.027828727	0.03959988	0.972924743	-0.03959988
YKR056W	TRM2	39.85722425	48.37757915	0.540887342	1920	flat	0.823878023	-0.279497336	1.213771909	0.279497336
YKR057W	RPS21A	2239.544548	1296.392644	0.915985211	264	down	1.727520253	0.788702624	0.578864415	-0.788702624
YKR058W	GLG1	31.06698511	34.92988205	0.330259533	1851	flat	0.889409963	-0.169079529	1.124340901	0.169079529
YKR059W	TIF1	394.7603588	279.3999224	0.878679136	1188	flat	1.41288643	0.498645504	0.770770971	-0.498645504
YKR060W	UTP30	93.61651428	80.57755786	0.600384225	825	flat	1.161818709	0.216384968	0.860719484	-0.216384968

YKR061W	KTR2	83.27735921	99.7567682	0.663107148	1278	flat	0.834804101	-0.260490407	1.197885826	0.260490407
YKR062W	TFA2	83.53931909	84.57450713	0.077359722	987	flat	0.987760046	-0.01776748	1.012391627	0.01776748
YKR063C	LAS1	274.0845447	262.1072961	0.303429027	1509	flat	1.045695975	0.064463465	0.956300898	-0.064463465
YKR064W	OAF3	70.20878637	100.3035501	0.816753661	2592	flat	0.699963125	-0.514649174	1.428646688	0.514649174
YKR065C	PAM17	195.2578119	166.8478732	0.704973177	594	flat	1.170274503	0.226846972	0.854500374	-0.226846972
YKR066C	CCP1	171.3174569	217.876419	0.81030883	1086	flat	0.786305639	-0.346837894	1.271770099	0.346837894
YKR067W	GPT2	84.58481353	95.60598255	0.538784979	2232	flat	0.884723019	-0.176702235	1.130297255	0.176702235
YKR068C	BET3	406.3199492	412.2900216	0.125148615	582	flat	0.985519726	-0.021043346	1.014693033	0.021043346
YKR069W	MET1	114.2851469	161.9080178	0.851283167	1782	flat	0.705864654	-0.502536515	1.416702189	0.502536515
YKR070W	YKR070W	113.6983956	120.5296719	0.321342613	1059	flat	0.943322867	-0.084176455	1.060082433	0.084176455
YKR071C	DRE2	181.4168134	332.537533	0.918906771	1047	up	0.545552894	-0.874209016	1.833002834	0.874209016
YKR072C	SIS2	54.21292897	48.07486476	0.423662462	1689	flat	1.127677202	0.173354155	0.886778591	-0.173354155
YKR073C	YKR073C	10.47299113	15.12999849	0.415731477	321	flat	0.692200408	-0.530738303	1.444668319	0.530738303
YKR074W	AIM29	636.6758857	591.8490494	0.520588662	468	flat	1.07574032	0.105329858	0.929592376	-0.105329858
YKR075C	YKR075C	10.53204935	16.26137114	0.47708424	924	flat	0.647672896	-0.626662723	1.543989266	0.626662723
YKR075W-A	YKR075W-A	103.5417474	102.8682293	0.04984051	270	flat	1.006547387	0.009415094	0.993495203	-0.009415094
YKR076W	ECM4	56.67434857	60.1363914	0.261120777	1113	flat	0.942430153	-0.085542395	1.061086592	0.085542395
YKR077W	MSA2	99.00126388	54.89950087	0.882245904	1092	flat	1.803318105	0.85065391	0.554533333	-0.85065391
YKR078W	YKR078W	43.88234077	54.38956901	0.598078875	1758	flat	0.80681538	-0.30968951	1.239440925	0.30968951
YKR079C	TRZ1	62.74038456	54.81186841	0.486117152	2517	flat	1.144649624	0.194906058	0.873629781	-0.194906058
YKR080W	MTD1	360.8588522	737.7450305	0.948825576	963	up	0.489137625	-1.031687652	2.044414391	1.031687652
YKR081C	RPF2	283.186964	203.976774	0.86492678	1035	flat	1.388329457	0.473349967	0.720290126	-0.473349967
YKR082W	NUP133	100.2600166	101.3566177	0.079665072	3474	flat	0.989180765	-0.015693909	1.010937572	0.015693909
YKR083C	DAD2	786.5397331	598.7852154	0.855951863	402	flat	1.313559041	0.393481047	0.761290486	-0.393481047
YKR084C	HBS1	100.1301894	90.1047653	0.493598666	1836	flat	1.111264083	0.152201703	0.899876109	-0.152201703
YKR085C	MRPL20	408.9444304	225.336143	0.919791214	588	down	1.814819518	0.859826081	0.55101898	-0.859826081
YKR086W	PRP16	42.47402588	47.193034	0.362287951	3216	flat	0.900006257	-0.151993064	1.111103387	0.151993064
YKR087C	OMA1	227.3096292	236.4321901	0.290677106	1038	flat	0.961415741	-0.05676767	1.040132751	0.05676767
YKR088C	TVP38	69.88544461	76.03607598	0.38368856	1014	flat	0.919109037	-0.121692071	1.088010192	0.121692071
YKR089C	TGL4	66.29526211	81.13430549	0.660192837	2733	flat	0.81710519	-0.291406279	1.223832638	0.291406279
YKR090W	PXL1	30.57422643	32.55852088	0.188248514	2121	flat	0.939054527	-0.090719163	1.064900888	0.090719163
YKR091W	SRL3	90.85704758	160.1704825	0.90138466	741	up	0.567252131	-0.81793797	1.762884517	0.81793797
YKR092C	SRP40	101.076621	90.98909717	0.49462085	1221	flat	1.110865193	0.151683752	0.900199238	-0.151683752
YKR093W	PTR2	44.13663471	97.40015067	0.935022474	1806	up	0.453147499	-1.141947372	2.206786977	1.141947372
YKR094C	RPL40B	782.5067735	566.3047012	0.876489778	387	flat	1.381776934	0.466524734	0.723705814	-0.466524734
YKR095W	MLP1	93.200777	100.885223	0.401471654	5628	flat	0.923829816	-0.114300985	1.08245045	0.114300985
YKR095W-A	PCC1	194.8310792	122.7824877	0.89123532	267	flat	1.586798596	0.666119026	0.6301997	-0.666119026
YKR096W	ESL2	42.95244473	52.49443743	0.569566478	3588	flat	0.818228499	-0.289424308	1.222152493	0.289424308
YKR097W	PCK1	9.543951628	21.43215865	0.726453531	1650	flat	0.445309863	-1.16711853	2.245627334	1.16711853
YKR098C	UBP11	24.8896676	26.63422349	0.186044657	2154	flat	0.934499465	-0.097734257	1.070091571	0.097734257
YKR099W	BAS1	32.10459181	22.42947744	0.61108453	2436	flat	1.431357101	0.517383647	0.698637677	-0.517383647
YKR100C	SKG1	121.3552428	116.1033478	0.25677106	1068	flat	1.045234656	0.063826865	0.956722966	-0.063826865
YKR101W	SIR1	68.11904406	102.0314836	0.838523996	1965	flat	0.667627693	-0.582884295	1.497840802	0.582884295
YKR102W	FLO10	1.663523692	1.556644075	0.037066841	3510	flat	1.068660279	0.095803302	0.93575107	-0.095803302
YKR103W	NFT1	9.386397385	14.11067845	0.422988256	3657	flat	0.665198163	-0.58814391	1.503311427	0.58814391
YKR104W	YKR104W	4.418657837	4.449365394	0.009946353	921	flat	0.993098441	-0.009991362	1.006949521	0.009991362
YKR105C	VBA5	1.416316756	1.475207293	0.022430042	1749	flat	0.960079823	-0.058773736	1.04158006	0.058773736
YKR106W	GEX2	4.883041062	8.541326257	0.364796288	1848	flat	0.571695884	-0.806680192	1.749181739	0.806680192
YLL001W	DNM1	101.4244689	99.37981321	0.124111933	2274	flat	1.020574155	0.029381013	0.979840607	-0.029381013

YLL002W	RTT109	28.4775046	20.37529545	0.560482819	1311	flat	1.397648671	0.483001754	0.71548739	-0.483001754
YLL003W	SF1	61.47068971	75.85968751	0.65799623	2841	flat	0.810320893	-0.303434756	1.234079004	0.303434756
YLL004W	ORC3	49.46819937	37.71771301	0.640474119	1851	flat	1.311537615	0.391259185	0.762463835	-0.391259185
YLL005C	SPO75	1.832503868	6.636785154	0.477917935	2607	flat	0.276113182	-1.856668328	3.621703217	1.856668328
YLL006W	MMM1	58.4269754	72.74668038	0.66430332	1281	flat	0.803156585	-0.316246809	1.24508722	0.316246809
YLL006W-A	YLL006W-A	0.999652142	0.857473431	0.043910396	177	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YLL007C	YLL007C	23.86631963	27.34644997	0.318790779	1998	flat	0.872739228	-0.19637745	1.145817637	0.19637745
YLL008W	DRS1	167.2651683	117.8439515	0.854980426	2259	flat	1.419378476	0.505259334	0.704533722	-0.505259334
YLL009C	COX17	2678.089508	1665.887133	0.908126722	210	down	1.607605615	0.684913521	0.622043112	-0.684913521
YLL010C	PSR1	37.55118529	36.7611682	0.074184428	1284	flat	1.021490533	0.030675833	0.978961594	-0.030675833
YLL011W	SOF1	244.0426292	193.7942453	0.80630709	1470	flat	1.259287286	0.332607448	0.794099973	-0.332607448
YLL012W	YEH1	19.26594393	33.22784239	0.719211251	1722	flat	0.579813269	-0.786339744	1.724693195	0.786339744
YLL013C	PUF3	72.98710198	89.22400813	0.675605336	2640	flat	0.818020884	-0.28979042	1.222462678	0.28979042
YLL014W	EMC6	1140.630607	1203.971365	0.414578802	327	flat	0.947390146	-0.077969429	1.05553135	0.077969429
YLL015W	BPT1	45.93593831	48.80727778	0.235718428	4680	flat	0.94116985	-0.087472989	1.062507474	0.087472989
YLL016W	SDC25	15.9958637	27.29691875	0.668225315	3147	flat	0.585995212	-0.771039217	1.706498583	0.771039217
YLL017W	YLL017W	5.671103495	5.350964009	0.056183848	312	flat	1.059828376	0.08383066	0.943548996	-0.08383066
YLL018C	DPS1	76.78958704	47.05500706	0.83816152	1674	flat	1.631911073	0.706562443	0.612778488	-0.706562443
YLL018C-A	COX19	47.66018291	38.83748349	0.554023488	297	flat	1.227169699	0.295334765	0.814883224	-0.295334765
YLL019C	KNS1	33.64547364	43.80434395	0.605299406	2214	flat	0.768085322	-0.380661514	1.301938692	0.380661514
YLL019W-A	YLL019W-A	0.951281877	0.815982781	0.043910396	93	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YLL020C	YLL020C	58.11213111	50.59093245	0.483594316	306	flat	1.148666931	0.199960533	0.870574379	-0.199960533
YLL021W	SPA2	37.02801481	27.31289604	0.602486588	4401	flat	1.355697131	0.43903491	0.73762788	-0.43903491
YLL022C	HIF1	39.80350671	24.64014326	0.731832681	1158	flat	1.615392666	0.691884894	0.619044534	-0.691884894
YLL023C	POM33	28.33121275	26.19887573	0.213621865	840	flat	1.081390402	0.112887456	0.924735413	-0.112887456
YLL024C	SSA2	663.519109	1164.935268	0.917877338	1920	up	0.569575947	-0.812039871	1.755692115	0.812039871
YLL025W	PAU17	4.718358108	8.094549191	0.344758591	375	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YLL026W	HSP104	936.7939269	1927.575747	0.949253299	2727	up	0.485995909	-1.040983926	2.057630491	1.040983926
YLL027W	ISA1	104.9176741	112.4690849	0.384899232	753	flat	0.932857898	-0.100270763	1.07197463	0.100270763
YLL028W	TPO1	89.47397562	177.6284698	0.932434392	1761	up	0.503714161	-0.989322805	1.985252902	0.989322805
YLL029W	FRA1	239.8105508	267.322487	0.613128897	2250	flat	0.897083345	-0.156686068	1.114723627	0.156686068
YLL030C	RRT7	3.621546794	7.100481747	0.366441931	342	flat	0.510042406	-0.971310894	1.96062129	0.971310894
YLL031C	GPI13	45.59611777	56.20662534	0.596868204	3054	flat	0.811223188	-0.301829205	1.232706381	0.301829205
YLL032C	YLL032C	18.136546	22.60054972	0.388828476	2478	flat	0.802482516	-0.317458136	1.246133069	0.317458136
YLL033W	IRC19	85.91599044	89.57442152	0.226482529	693	flat	0.959157637	-0.060160155	1.042581492	0.060160155
YLL034C	RIX7	185.5953212	156.3609965	0.723734957	2514	flat	1.186966861	0.247279657	0.842483504	-0.247279657
YLL035W	GRC3	45.32940797	56.18550633	0.605393649	1899	flat	0.80678116	-0.309493496	1.6239493496	0.309750701
YLL036C	PRP19	66.05935397	70.86745696	0.32738147	1512	flat	0.932153584	-0.101360419	1.07278459	0.101360419
YLL037W	YLL037W	16.48638906	31.07159631	0.74107583	381	flat	0.530593565	-0.914320916	1.884681733	0.914320916
YLL038C	ENT4	43.28332539	41.20713046	0.179360592	744	flat	1.050384361	0.070917341	0.952032453	-0.070917341
YLL039C	UBI4	1151.566556	1688.306824	0.892561983	1146	flat	0.682083694	-0.55197932	1.466095742	0.55197932
YLL040C	VPS13	36.85045184	38.81587281	0.173437727	9435	flat	0.949365534	-0.074964419	1.053335058	0.074964419
YLL041C	SDH2	80.18558021	66.50718086	0.636892852	801	flat	1.205668007	0.269832701	0.829415721	-0.269832701
YLL042C	ATG10	36.68663856	41.85797387	0.396701464	504	flat	0.876455193	-0.190247757	1.140959638	0.190247757
YLL043W	FPS1	93.13475519	95.44319196	0.146324489	2010	flat	0.9758135	-0.035322652	1.024785986	0.035322652
YLL044W	YLL044W	0.989588529	1.358145837	0.077214731	447	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YLL045C	RPL8B	313.0272597	171.0642813	0.918406554	771	down	1.829880892	0.871749746	0.546483656	-0.871749746
YLL046C	RNP1	17.57588395	46.74602158	0.894011889	750	flat	0.375986733	-1.411246337	2.659668311	1.411246337
YLL047W	YLL047W	24.65157801	31.61933278	0.506133101	384	flat	0.779636249	-0.359126925	1.282649442	0.359126925

YLL048C	YBT1	53.51447072	46.20760256	0.481926925	4986	flat	1.158131298	0.211798822	0.863459956	-0.211798822
YLL049W	LDB18	132.0484943	241.1501113	0.91539075	540	up	0.547577994	-0.868863625	1.826223863	0.868863625
YLL050C	COF1	1140.269876	600.7673228	0.930991736	432	down	1.898022467	0.92449707	0.526864153	-0.92449707
YLL051C	FRE6	48.88761644	89.82906098	0.877910686	2139	flat	0.544229405	-0.877713186	1.837460435	0.877713186
YLL052C	AQY2	36.56727534	79.93367326	0.922408293	450	up	0.457470223	-1.128250254	2.185934624	1.128250254
YLL053C	YLL053C	59.94319329	109.1176974	0.889401189	459	flat	0.549344375	-0.86421726	1.820351761	0.86421726
YLL054C	YLL054C	28.16200115	38.4826761	0.618624039	2532	flat	0.731809843	-0.450459275	1.366475198	0.450459275
YLL055W	YCT1	61.86193196	92.05267407	0.825250109	1596	flat	0.672027538	-0.573407742	1.488034259	0.573407742
YLL056C	YLL056C	27.61580833	46.53012181	0.777142236	897	flat	0.593503891	-0.752670608	1.684908921	0.752670608
YLL057C	JLP1	12.56705549	17.88444585	0.449775265	1239	flat	0.702680731	-0.509058757	1.423121419	0.509058757
YLL058W	YLL058W	85.03898457	136.4901198	0.878599391	1728	flat	0.623041321	-0.682600247	1.605029982	0.682600247
YLL059C	YLL059C	38.56350377	77.83220376	0.899318544	507	flat	0.495469766	-1.01313107	2.018286622	1.01313107
YLL060C	GTT2	154.6320886	235.8748175	0.888060026	702	flat	0.655568451	-0.609181669	1.525393724	0.609181669
YLL061W	MMP1	31.9640484	90.6998395	0.949188053	1752	up	0.352415711	-1.504649854	2.837557945	1.504649854
YLL062C	MHT1	33.57293269	60.0864613	0.833326084	975	flat	0.558743716	-0.839741393	1.789729299	0.839741393
YLL063C	AYT1	39.73354196	36.85150027	0.256691315	1425	flat	1.078206903	0.108634051	0.927465774	-0.108634051
YLL064C	PAU18	1.462301067	0.20905344	0.187552559	363	flat	6.994867282	2.806296684	0.142961969	-2.806296684
YLL065W	YLL065W	1.008196177	0.432401132	0.105886617	351	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YLL066C	YLL066C	14.18246115	9.56445489	0.415282007	3618	flat	1.482830052	0.56835326	0.428885907	-0.56835326
YLL066W-A	YLL066W-A	0.091583038	0.314229394	0.058561693	483	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YLL066W-B	YLL066W-B	1.034727655	0.443780109	0.107119037	171	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YLL067C	YLL067C	10.07443792	8.85131571	0.155016674	3618	flat	1.138185355	0.186735522	0.878591519	-0.186735522
YLL067W-A	YLL067W-A	0.366332151	0.157114697	0.057351022	483	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YLR001C	YLR001C	25.32085283	36.34574521	0.644729593	2589	flat	0.696666217	-0.521460489	1.435407625	0.521460489
YLR002C	NOC3	97.48490255	86.40077921	0.530426272	1992	flat	1.128287308	0.174134483	0.886299078	-0.174134483
YLR003C	CMS1	166.2332501	153.1588503	0.478555894	876	flat	1.085364965	0.118180245	0.921349069	-0.118180245
YLR004C	THI73	3.320409451	5.213569374	0.226830506	1572	flat	0.636878348	-0.650910269	1.570158576	0.650910269
YLR005W	SSL1	97.15017641	89.24590897	0.42000145	1386	flat	1.08856728	0.122430578	0.918638671	-0.122430578
YLR006C	SSK1	32.92262495	35.54846726	0.243330434	2139	flat	0.926133459	-0.110707989	1.079757988	0.110707989
YLR007W	NSE1	134.4102013	136.3102868	0.099325794	1011	flat	0.986060586	-0.020251803	1.014136468	0.020251803
YLR008C	PAM18	345.8500655	352.639754	0.167870088	507	flat	0.980746106	-0.028048393	1.019631884	0.028048393
YLR009W	RLP24	445.2950465	280.2737657	0.9046107	600	down	1.58878604	0.667924852	0.629411371	-0.667924852
YLR010C	TEN1	514.3303404	548.644522	0.443990141	483	flat	0.93745644	-0.09317644	1.066716231	0.09317644
YLR011W	LOT6	107.0538933	85.10870406	0.735413948	576	flat	1.257848941	0.330958675	0.795008023	-0.330958675
YLR012C	YLR012C	16.219356	52.61456974	0.92430042	300	up	0.308267388	-1.697745821	3.243937044	1.697745821
YLR013W	GAT3	2.076742125	7.125483443	0.492387995	426	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YLR014C	PPR1	49.23645788	62.33026484	0.651950123	2715	flat	0.789928585	-0.340205866	1.265937225	0.340205866
YLR015W	BRE2	106.0698092	112.1798937	0.311062781	1518	flat	0.945533159	-0.080800042	1.057604369	0.080800042
YLR016C	PML1	744.5799258	575.7494897	0.8484631	615	flat	1.293235928	0.370985494	0.773254112	-0.370985494
YLR017W	MEU1	100.1604125	96.39219081	0.229063361	1014	flat	1.039092603	0.055324232	0.962378133	-0.055324232
YLR018C	POM34	94.8586578	76.22367155	0.708699435	900	flat	1.244477678	0.315540353	0.803549969	-0.315540353
YLR019W	PSR2	73.50206098	76.52196315	0.209040162	1194	flat	0.960535485	-0.058089183	1.041085952	0.058089183
YLR020C	YEH2	112.4877582	108.5030017	0.211425257	1617	flat	1.036724851	0.05203305	0.964576087	-0.05203305
YLR021W	IRC25	165.1425338	161.6099231	0.148245614	540	flat	1.021858872	0.031195961	0.978608717	-0.031195961
YLR022C	SDO1	331.0839927	240.0549822	0.866253444	753	flat	1.379200672	0.463832382	0.725057652	-0.463832382
YLR023C	IZH3	70.74284618	130.1042546	0.899637524	1632	flat	0.543739683	-0.879011972	1.839115354	0.879011972
YLR024C	UBR2	35.81908935	41.65040995	0.435326954	5619	flat	0.859993681	-0.217602036	1.162799242	0.217602036
YLR025W	SNF7	236.8968179	198.5851539	0.743257938	723	flat	1.192923102	0.254501048	0.838277	-0.254501048
YLR026C	SED5	79.64823713	77.8892655	0.116398434	1023	flat	1.022582979	0.032217917	0.977915749	-0.032217917

YLR027C	AAT2	221.7712768	164.2092318	0.846193997	1257	flat	1.350540858	0.433537287	0.740444092	-0.433537287
YLR028C	ADE16	165.0329435	163.1386656	0.099122807	1776	flat	1.011611459	0.016655284	0.988521819	-0.016655284
YLR029C	RPL15A	679.4147971	389.1800023	0.916963897	615	down	1.745759785	0.803855059	0.572816494	-0.803855059
YLR030W	YLR030W	16.97894016	30.08627422	0.706966797	792	flat	0.564341734	-0.825359052	1.771975985	0.825359052
YLR031W	YLR031W	34.85150875	94.1478315	0.947977381	561	up	0.370178561	-1.433706753	2.701399017	1.433706753
YLR032W	RAD5	41.43686287	43.67251433	0.194700594	3510	flat	0.94880873	-0.07581081	1.053953203	0.07581081
YLR033W	RSC58	233.8073078	244.4054987	0.298318109	1509	flat	0.956636856	-0.06395672	1.045328741	0.06395672
YLR034C	SMF3	76.58621876	109.613687	0.827881688	1422	flat	0.698692115	-0.517271236	1.431245578	0.517271236
YLR035C	MLH2	32.92173357	47.82878383	0.71445556	2088	flat	0.688324706	-0.538838802	1.452802713	0.538838802
YLR035C-A	YLR035C-A	34.97442131	42.4946327	0.511715239	3468	flat	0.8230315	-0.280980446	1.215020324	0.280980446
YLR036C	YLR036C	139.7871413	138.6290747	0.061707989	612	flat	1.008353706	0.01200179	0.9917155	-0.01200179
YLR037C	PAU23	7.077537162	4.047274596	0.320798898	375	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YLR038C	COX12	1102.00343	752.8412566	0.892344498	252	flat	1.46379256	0.549711118	0.683156909	-0.549711118
YLR039C	RIC1	55.43624386	70.35825042	0.677968682	3171	flat	0.787913905	-0.343890099	1.2691742	0.343890099
YLR040C	AFB1	4.456227102	5.846063305	0.17677251	675	flat	0.762261178	-0.391642693	1.311886304	0.391642693
YLR041W	YLR041W	32.24578847	46.33562037	0.700043497	321	flat	0.695917918	-0.523010941	1.436951074	0.523010941
YLR042C	YLR042C	11.83230235	5.621214716	0.538871973	486	flat	2.104936913	1.073776995	0.47507362	-1.073776995
YLR043C	TRX1	1457.757153	664.9788909	0.9630709	312	down	2.192185607	1.132369953	0.456165754	-1.132369953
YLR044C	PDC1	502.685005	654.4529133	0.85154415	1692	flat	0.768099576	-0.380634742	1.301914533	0.380634742
YLR045C	STU2	43.9858187	43.02221027	0.08400754	2667	flat	1.022397929	0.03195682	0.978092748	-0.03195682
YLR046C	YLR046C	69.75248033	106.9690195	0.850485718	813	flat	0.652081141	-0.616876598	1.533551481	0.616876598
YLR047C	FRE8	25.92693138	40.64948284	0.722227055	2061	flat	0.637817005	-0.648785534	1.56784782	0.648785534
YLR048W	RPS0B	251.1872955	151.9727615	0.903218791	759	down	1.652844188	0.724950729	0.605017707	-0.724950729
YLR049C	YLR049C	175.4948754	93.04486177	0.918841525	1287	down	1.88613183	0.915430516	0.530185634	-0.915430516
YLR050C	YLR050C	75.72673507	63.0825207	0.617217631	486	flat	1.200439269	0.263562419	0.380634742	-0.263562419
YLR051C	FCF2	596.0173688	458.567351	0.850826446	654	flat	1.299737907	0.378220732	0.769385885	-0.378220732
YLR052W	IES3	68.49608509	64.09528493	0.314760041	753	flat	1.068660279	0.095803302	0.93575107	-0.095803302
YLR053C	YLR053C	91.44524315	135.0638655	0.854791939	327	flat	0.677051873	-0.562661723	1.476991704	0.562661723
YLR054C	OSW2	11.14508726	20.44571477	0.622538785	2175	flat	0.545106267	-0.875390588	1.834504683	0.875390588
YLR055C	SPT8	80.39988319	96.48353617	0.659177903	1809	flat	0.833301581	-0.263089378	1.200045726	0.263089378
YLR056W	ERG3	257.9949225	344.4606657	0.856046107	1098	flat	0.748982244	-0.416996577	1.335145135	0.416996577
YLR057W	MNL2	52.59581538	47.25788278	0.38538495	2550	flat	1.112953274	0.154393025	0.898510318	-0.154393025
YLR058C	SHM2	260.3253696	581.7957231	0.964071335	1410	up	0.447451501	-1.160196777	2.234879083	1.160196777
YLR059C	REX2	31.67416323	23.04698034	0.574191678	810	flat	1.374330292	0.458728768	0.727627125	-0.458728768
YLR060W	FRS1	149.8731828	109.8400446	0.829425837	1788	flat	1.364467607	0.448338144	0.732886582	-0.448338144
YLR061W	RPL22A	1362.329216	883.2679189	0.903110048	366	down	1.542373709	0.625152365	0.6483513	-0.625152365
YLR062C	BUD28	3.510683116	4.416668706	0.132354647	378	flat	0.794871282	-0.331206839	1.258065328	0.331206839
YLR063W	BMT6	13.69741937	15.75783142	0.225039872	1098	flat	0.869245203	-0.202164894	1.150423375	0.202164894
YLR064W	PER33	68.34300636	117.614686	0.883036103	822	flat	0.581075448	-0.783202597	1.720946916	0.783202597
YLR065C	ENV10	213.0714599	152.3287416	0.859670871	546	flat	1.398760717	0.484149185	0.714918562	-0.484149185
YLR066W	SPC3	308.2873169	261.4320617	0.745469045	555	flat	1.179225359	0.237839455	0.848014327	-0.237839455
YLR067C	PET309	64.19970951	72.22038907	0.474909381	2898	flat	0.888941618	-0.169839423	1.124933269	0.169839423
YLR068W	FYV7	252.4088774	157.7638288	0.899006815	456	flat	1.599916022	0.677996182	0.625032806	-0.677996182
YLR069C	MEF1	72.0989268	87.30587423	0.660446571	2286	flat	0.825819882	-0.276100942	1.210917806	0.276100942
YLR070C	XYL2	5.699697294	9.636368085	0.38138321	1071	flat	0.591477748	-0.757604201	1.690680678	0.757604201
YLR071C	RGR1	72.70323262	105.2926701	0.828207916	3249	flat	0.690487121	-0.53431359	1.448252936	0.53431359
YLR072W	YLR072W	36.50098717	47.09184778	0.613484124	2082	flat	0.775102038	-0.36754185	1.290152717	0.36754185
YLR073C	RFU1	41.66709275	34.9857692	0.47507612	603	flat	1.190972607	0.25214023	0.839649875	-0.25214023
YLR074C	BUD20	163.1647789	102.9995032	0.884225025	501	flat	1.584131708	0.663692289	0.631260643	-0.663692289

YLR075W	RPL10	2705.882733	2092.003423	0.850674206	666	flat	1.293440873	0.371214105	0.773131591	-0.371214105
YLR076C	YLR076C	2.300617872	1.076402818	0.1823039	423	flat	2.137320558	1.095803302	0.467875535	-1.095803302
YLR077W	FMP25	70.08862429	62.02586923	0.482680876	1752	flat	1.129990199	0.176310259	0.884963428	-0.176310259
YLR078C	BOS1	399.0142125	335.3456094	0.76584747	735	flat	1.189859659	0.250791421	0.84043525	-0.250791421
YLR079W	SIC1	138.550033	104.7321058	0.80492968	855	flat	1.322899335	0.403703285	0.755915415	-0.403703285
YLR080W	EMP46	65.00996214	57.52586925	0.46876178	1335	flat	1.130099605	0.176449935	0.884877754	-0.176449935
YLR081W	GAL2	3.436195579	4.311227287	0.129657822	1725	flat	0.797034197	-0.32728647	1.254651311	0.32728647
YLR082C	SRL2	144.9724533	140.4445478	0.220204437	1179	flat	1.03223981	0.045778176	0.968767132	-0.045778176
YLR083C	EMP70	59.15606161	72.40259194	0.638480499	2004	flat	0.817043424	-0.291515339	1.223925156	0.291515339
YLR084C	RAX2	55.42911475	48.02202351	0.485109468	3663	flat	1.15424363	0.206947771	0.86636822	-0.206947771
YLR085C	ARP6	71.47398956	85.16332364	0.627178483	1317	flat	0.83925787	-0.252813935	1.191528893	0.252813935
YLR086W	SMC4	69.07955581	62.1066979	0.433768305	4257	flat	1.112272237	0.153509942	0.89906047	-0.153509942
YLR087C	CSF1	22.74267743	29.21929826	0.487799043	8877	flat	0.778344409	-0.361519422	1.284778292	0.361519422
YLR088W	GAA1	68.80938908	65.97386638	0.203189793	1845	flat	1.042979483	0.060710779	0.958791631	-0.060710779
YLR089C	ALT1	56.29407018	35.31980781	0.788284761	1779	flat	1.593838519	0.672505469	0.627416133	-0.672505469
YLR090W	XDJ1	95.00824343	120.8683364	0.762498188	1380	flat	0.786047415	-0.347311755	1.272187887	0.347311755
YLR091W	GEP5	12.63845922	11.5292261	0.140553864	882	flat	1.096210544	0.132524917	0.912233517	-0.132524917
YLR092W	SUL2	22.76053618	37.23583171	0.723111498	2682	flat	0.6112536	-0.710157038	1.635982185	0.710157038
YLR093C	NYV1	339.131989	365.2904335	0.502232855	762	flat	0.92839001	-0.107197097	1.07197097	0.107197097
YLR094C	GIS3	45.08470906	52.30076515	0.478889372	1509	flat	0.862027715	-0.214193841	1.16005551	0.214193841
YLR095C	IOC2	49.51229103	52.45775652	0.227606206	2439	flat	0.943850716	-0.083369401	1.059489582	0.083369401
YLR096W	KIN2	38.96858259	42.87890006	0.319508482	3444	flat	0.908805556	-0.137956441	1.100345386	0.137956441
YLR097C	HRT3	132.2336955	146.4937435	0.53969117	1035	flat	0.902657631	-0.147749203	1.107839745	0.147749203
YLR098C	CHA4	30.62570652	33.59736808	0.268450051	1947	flat	0.911550763	-0.133605094	1.097031608	0.133605094
YLR099C	ICT1	14.931513	15.49747551	0.070719153	1185	flat	0.963480342	-0.053672864	1.073903895	0.053672864
YLR099W-A	MIM2	138.0655924	96.58268921	0.845969262	264	flat	1.429506607	0.515517288	0.699542062	-0.515517288
YLR100W	ERG27	242.6124149	198.7293237	0.778824126	1044	flat	1.2208184	0.287848611	0.819122648	-0.287848611
YLR101C	YLR101C	11.84057669	20.31302591	0.591779034	396	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YLR102C	APC9	131.262594	103.2739711	0.770639408	798	flat	1.27101333	0.345979162	0.78677381	-0.345979162
YLR103C	CDC45	121.3110888	66.52202484	0.895643033	1953	flat	1.823622915	0.866807443	0.548358979	-0.866807443
YLR104W	LCL2	291.0994609	233.4081656	0.808184718	396	flat	1.247169139	0.318657134	0.801815863	-0.318657134
YLR105C	SEN2	57.88726383	59.29043141	0.104240974	1134	flat	0.976333996	-0.034553328	1.02423966	0.034553328
YLR106C	MDN1	20.41643449	16.84304104	0.33368856	14733	flat	1.212158448	0.277578294	0.824974657	-0.277578294
YLR107W	REX3	329.3384834	331.7765841	0.073010004	1215	flat	0.992651378	-0.010640967	1.007403024	0.010640967
YLR108C	YLR108C	55.94555267	126.0609448	0.947890387	1458	up	0.443797663	-1.172026026	2.253279105	1.172026026
YLR109W	AHP1	1947.988806	2243.722145	0.726069305	531	flat	0.868195204	-0.203908641	1.151814701	0.203908641
YLR110C	CCW12	735.482873	697.7018146	0.40753226	402	flat	1.054150724	0.07608116	0.948630947	-0.07608116
YLR111W	YLR111W	1.859713218	5.013515828	0.360809047	333	flat	0.370939932	-1.430742513	2.695854274	1.430742513
YLR112W	YLR112W	76.0413963	88.17276798	0.581049732	420	flat	0.862413623	-0.213548127	1.159536414	0.213548127
YLR113W	HOG1	112.4127175	82.03621385	0.806009859	1308	flat	1.370281639	0.454472446	0.729776983	-0.454472446
YLR114C	AVL9	119.1539617	120.9553143	0.097571408	2295	flat	0.985107288	-0.021647237	1.015117857	0.021647237
YLR115W	CFT2	69.8838214	75.29813201	0.353327534	2580	flat	0.928095021	-0.107655575	1.077475881	0.107655575
YLR116W	MSL5	30.16979503	42.95456528	0.676953748	1431	flat	0.702365274	-0.509706577	1.423760594	0.509706577
YLR117C	CLF1	54.95035515	71.54793208	0.708271712	2064	flat	0.76802157	-0.380781264	1.302046764	0.380781264
YLR118C	YLR118C	167.7552211	146.6693261	0.633666812	684	flat	1.143764859	0.193790486	0.874305581	-0.193790486
YLR119W	SRN2	89.29602962	93.14405319	0.231013484	642	flat	0.958687394	-0.060867633	1.043092885	0.060867633
YLR120C	YPS1	65.03263313	100.0280366	0.845831521	1710	flat	0.650144053	-0.621168682	1.53812066	0.621168682
YLR120W-A	YLR120W-A	72.8570002	65.47061846	0.44445411	102	flat	1.112819795	0.154219988	0.898618091	-0.154219988
YLR121C	YPS3	9.327795376	7.553852389	0.20693055	1527	flat	1.234839509	0.304323548	0.809821837	-0.304323548

YLR122C	YLR122C	9.829912725	6.42424539	0.342735972	378	flat	1.530127218	0.613651606	0.65354043	-0.613651606
YLR123C	YLR123C	7.506478808	5.519010812	0.229701319	330	flat	1.360113083	0.443726605	0.735232984	-0.443726605
YLR124W	YLR124W	6.154380141	6.158896124	0.002791069	345	flat	0.999266755	-0.001058238	1.000733784	0.001058238
YLR125W	YLR125W	65.65233681	98.96620362	0.838415253	411	flat	0.663381381	-0.592089574	1.5074285	0.592089574
YLR126C	YLR126C	168.1617213	126.2765734	0.823459475	756	flat	1.331693731	0.413262323	0.750923412	-0.413262323
YLR127C	APC2	33.56443268	42.71201674	0.573423227	2562	flat	0.785831137	-0.347708762	1.272538021	0.347708762
YLR128W	DCN1	19.44138295	24.54597093	0.42430767	810	flat	0.792039679	-0.336355387	1.262563008	0.336355387
YLR129W	DIP2	272.8737955	212.4926347	0.825909816	2832	flat	1.284156488	0.360821021	0.778721292	-0.360821021
YLR130C	ZRT2	327.106032	496.939301	0.897245179	1269	flat	0.658241422	-0.60331128	1.519199441	0.60331128
YLR131C	ACE2	28.4952723	22.5067313	0.4653835	2313	flat	1.266077776	0.340366033	0.789840892	-0.340366033
YLR132C	USB1	46.71742027	43.63685238	0.262295201	873	flat	1.070595557	0.09841357	0.934059546	-0.09841357
YLR133W	CKI1	95.44963283	113.157077	0.667804843	1749	flat	0.843514479	-0.245515263	1.185516106	0.245515263
YLR134W	PDC5	24.83621566	25.29546622	0.0507757	1692	flat	0.98184455	-0.026433465	1.018491165	0.026433465
YLR135W	SLX4	22.56024029	28.03102399	0.438197767	2247	flat	0.804831115	-0.313242014	1.242496695	0.313242014
YLR136C	TIS11	45.78127185	41.56947246	0.333282587	858	flat	1.101319529	0.139233103	0.908001695	-0.139233103
YLR137W	RKM5	154.099909	126.4773311	0.738625489	1104	flat	1.218399437	0.28498718	0.820748902	-0.28498718
YLR138W	NHA1	77.61244479	78.24662473	0.048441351	2958	flat	0.991895115	-0.01174052	1.008171111	0.01174052
YLR139C	SLS1	8.79197163	9.583996519	0.113339133	1932	flat	0.917359643	-0.124440653	1.090085014	0.124440653
YLR140W	YLR140W	3.24657668	3.248958964	0.002791069	327	flat	0.999266755	-0.001058238	1.000733784	-0.001058238
YLR141W	RRN5	24.70980809	21.68182819	0.287306075	1092	flat	1.139655193	0.188597397	0.877458381	-0.188597397
YLR142W	PUT1	18.36153509	126.5303614	0.990278382	1431	up	0.145115646	-2.784725023	6.891055722	2.784725023
YLR143W	DPH6	93.32685361	108.0404024	0.612345948	2058	flat	0.863814384	-0.211206755	1.157656111	0.211206755
YLR144C	ACF2	60.98326625	77.76734359	0.701449906	2340	flat	0.784175766	-0.350751037	1.275224309	0.350751037
YLR145W	RMP1	224.6767676	142.2556912	0.894048137	606	flat	1.579386847	0.659364581	0.633157103	-0.659364581
YLR146C	SPE4	240.7185605	289.5952711	0.77138611	903	flat	0.831224072	-0.26669066	1.203045044	0.26669066
YLR146W-A	YLR146W-A	543.4537464	432.8335331	0.828106423	189	flat	1.255572188	0.328344978	0.796449626	-0.328344978
YLR147C	SMD3	134.4385123	102.173844	0.80060896	306	flat	1.315782074	0.395920562	0.760004274	-0.395920562
YLR148W	PEP3	146.0046885	173.2973399	0.717645353	2757	flat	0.842509692	-0.247234812	1.186929966	0.247234812
YLR149C	YLR149C	33.72561028	47.68420308	0.695505292	2193	flat	0.707270083	-0.499666857	1.413887034	0.499666857
YLR149C-A	YLR149C-A	3.05066257	0.872257456	0.279679571	87	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YLR150W	STM1	346.9887441	168.3902569	0.947107438	822	down	2.060622452	1.043080198	0.485290257	-1.043080198
YLR151C	PCD1	62.352203	59.19584178	0.224815137	1023	flat	1.053320658	0.074944697	0.949378513	-0.074944697
YLR152C	YLR152C	34.34506768	52.78291392	0.762563433	1731	flat	0.650685329	-0.61996807	1.536841168	0.61996807
YLR153C	ACS2	117.5709298	80.91590657	0.840024648	2052	flat	1.453001453	0.539036146	0.688230557	-0.539036146
YLR154C	RNH203	131.7739652	73.37964075	0.89645498	333	flat	1.795783733	0.844613616	0.556859928	-0.844613616
YLR154C-G	YLR154C-G	NA	NA	NA	150	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YLR154C-H	YLR154C-H	2.680885289	0.57489696	0.276475279	132	flat	4.663244854	2.221334184	2.214442954	-2.221334184
YLR154W-A	YLR154W-A	NA	NA	NA	186	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YLR154W-B	YLR154W-B	0.268088529	1.839670271	0.223444976	165	flat	0.145726402	-2.778665816	6.862174516	2.778665816
YLR154W-C	TAR1	4.010604392	6.475639353	0.274902131	375	flat	0.619337207	-0.691202975	1.614629298	0.691202975
YLR154W-E	YLR154W-E	52.47438705	75.88639867	0.789915905	204	flat	0.691486063	-0.532227921	1.446160745	0.532227921
YLR154W-F	YLR154W-F	22.58788456	21.52805636	0.115108018	141	flat	1.049230092	0.06933109	0.953079794	-0.06933109
YLR155C	ASP3-1	105.8543494	92.68035834	0.575199362	1089	flat	1.142144369	0.191745022	0.875546058	-0.191745022
YLR156C-A	YLR156C-A	1.340442644	0.57489696	0.130542265	132	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YLR156W	YLR156W	9.488002717	10.99802879	0.182644628	345	flat	0.862700298	-0.21306864	1.159151101	0.21306864
YLR157C	ASP3-2	101.792402	92.68035834	0.464354067	1089	flat	1.09831688	0.135294353	0.910484049	-0.135294353
YLR157C-A	YLR157C-A	0.334350773	0.573593338	0.060337828	1323	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YLR157C-B	YLR157C-B	29.30500747	37.10769988	0.532883863	5268	flat	0.789728481	-0.340571373	1.266257991	0.340571373
YLR157C-C	YLR157C-C	2.680885289	1.149793919	0.216412933	132	flat	2.331622427	1.221334184	0.428885907	-1.221334184

YLR157W-D	YLR157W-D	13.70649803	22.08899867	0.585979411	213	flat	0.62051242	-0.688468007	1.611571288	0.688468007
YLR157W-E	YLR157W-E	4.289416462	8.278516218	0.399478034	165	flat	0.518138317	-0.948590818	1.929986583	0.948590818
YLR158C	ASP3-3	103.2547031	90.86856186	0.556705814	1089	flat	1.136308322	0.184354344	0.880042837	-0.184354344
YLR159C-A	YLR159C-A	2.010663967	1.149793919	0.130556764	132	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YLR159W	YLR159W	5.897947635	12.7577134	0.57323474	345	flat	0.462304447	-1.113084855	2.163076749	1.113084855
YLR160C	ASP3-4	98.5428441	95.88584441	0.155429897	1089	flat	1.027710031	0.039433264	0.973037112	-0.039433264
YLR161W	YLR161W	8.205840188	12.31779225	0.387052342	345	flat	0.666177836	-0.586020738	1.501100675	0.586020738
YLR162W	YLR162W	0.247812926	0.425133886	0.052508337	357	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YLR162W-A	RRT15	76.76693747	69.06063794	0.451768885	189	flat	1.111587436	0.152621434	0.899614342	-0.152621434
YLR163C	MAS1	208.4663349	210.9958759	0.107684501	1389	flat	0.988011419	-0.017400378	1.012134051	0.017400378
YLR163W-A	YLR163W-A	1.552091483	0.665670164	0.144055386	114	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YLR164W	SHH4	119.0059257	143.989577	0.72246629	507	flat	0.826489862	-0.274930971	1.209936196	0.274930971
YLR165C	PUS5	165.4894719	113.879197	0.862715673	765	flat	1.453201957	0.539235214	0.6881356	-0.539235214
YLR166C	SEC10	115.7607497	142.6060917	0.746049007	2616	flat	0.811751787	-0.30088944	1.231903663	0.30088944
YLR167W	RPS31	3787.98578	2412.493092	0.905306655	459	down	1.570154042	0.650906104	0.636880187	-0.650906104
YLR168C	UPS2	483.5806416	611.0333399	0.834203277	693	flat	0.791414494	-0.337494608	1.263560381	0.337494608
YLR169W	YLR169W	11.74591266	12.00462804	0.035087719	354	flat	0.978448697	-0.031431887	1.022025992	0.031431887
YLR170C	APS1	413.7954981	411.4943996	0.072393794	471	flat	1.005592053	0.008045154	0.994439044	-0.008045154
YLR171W	YLR171W	10.43483043	24.9063052	0.774945629	390	flat	0.418963405	-1.25510386	2.38684331	1.25510386
YLR172C	DPH5	47.2227701	46.72518013	0.409913006	903	flat	1.010649289	0.015282447	0.989462923	-0.015282447
YLR173W	YLR173W	49.97275829	72.43890491	0.785616935	1827	flat	0.689860764	-0.535622886	1.449567872	0.535622886
YLR174W	IDP2	33.77396164	35.40140309	0.154045237	1239	flat	0.9540289	-0.067895125	1.048186276	0.067895125
YLR175W	CBF5	386.8395613	310.4443582	0.816420183	1452	flat	1.2460834	0.317400631	0.802514503	-0.317400631
YLR176C	RFX1	51.64335922	82.05450496	0.837146585	2436	flat	0.629378719	-0.667999697	1.588868466	0.667999697
YLR177W	YLR177W	61.83937147	76.73092139	0.668435552	1887	flat	0.805925048	-0.311282423	1.240810176	0.311282423
YLR178C	TFS1	292.8867178	315.0435339	0.493866899	660	flat	0.929670621	-0.10520843	1.075649781	0.10520843
YLR179C	YLR179C	329.9346944	335.6032152	0.124351167	606	flat	0.983109456	-0.024576044	1.017180736	0.024576044
YLR180W	SAM1	165.0809364	257.7099457	0.894983326	1149	flat	0.640568745	-0.642574688	1.561112696	0.642574688
YLR181C	VTA1	115.6425382	87.88455032	0.785457445	993	flat	1.315846048	0.395990706	0.759967324	-0.395990706
YLR182W	SWI6	53.84444732	60.72170374	0.445556039	2412	flat	0.886741379	-0.173414696	1.127724524	0.173414696
YLR183C	TOS4	58.25727868	24.67598542	0.905893867	1470	down	2.360889654	1.239330613	0.42356914	-1.239330613
YLR184W	YLR184W	6.863990782	9.594832016	0.288668987	348	flat	0.715384154	-0.483209933	1.397850364	0.483209933
YLR185W	RPL37A	717.6940774	468.9608906	0.899673771	267	flat	1.530392175	0.613901402	0.653427282	-0.613901402
YLR186W	EMG1	152.9270217	163.5706828	0.420356677	759	flat	0.934929286	-0.097070845	1.06959961	0.097070845
YLR187W	SKG3	14.81665521	22.80779136	0.568051327	3081	flat	0.649631303	-0.622306944	1.53933469	0.622306944
YLR188W	MDL1	50.16645115	48.19222444	0.168123822	2088	flat	1.040965669	0.057922489	0.960646475	-0.057922489
YLR189C	ATG26	64.80855721	88.48138894	0.777439466	3597	flat	0.732454113	-0.449189716	1.365273241	0.449189716
YLR190W	MMR1	55.86267476	52.13333892	0.290234885	1476	flat	1.071534567	0.099678391	0.933241008	-0.099678391
YLR191W	PEX13	109.2720531	110.8555832	0.09322894	1161	flat	0.985715378	-0.020756962	1.01449163	0.020756962
YLR192C	HCR1	281.7046042	195.7070281	0.878816877	798	flat	1.439419968	0.525487577	0.694724279	-0.525487577
YLR193C	UPS1	202.5743946	195.1775178	0.247252429	528	flat	1.037898201	0.053664949	0.963485628	-0.053664949
YLR194C	YLR194C	43.36726202	53.56686965	0.587864289	765	flat	0.809591121	-0.304734628	1.235191413	0.304734628
YLR195C	NMT1	192.36707077	127.3648913	0.880984486	1368	flat	1.515148372	0.599459077	0.660001369	-0.599459077
YLR196W	PWP1	216.4454786	185.178595	0.712570683	1731	flat	1.16884718	0.225086319	0.855543836	-0.225086319
YLR197W	NOP56	387.2790962	286.6151638	0.861331013	1515	flat	1.351216352	0.434258693	0.740073933	-0.434258693
YLR198C	YLR198C	1.228739091	0.843182207	0.080375526	360	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YLR199C	PBA1	130.8407517	129.6735092	0.061874728	831	flat	1.009001395	0.01292817	0.991078907	-0.01292817
YLR200W	YKE2	449.0133178	269.671666	0.910874293	345	down	1.66503706	0.735554288	0.600587233	-0.735554288
YLR201C	COQ9	68.80938908	72.30045135	0.235471944	783	flat	0.951714516	-0.071399219	1.05073526	0.071399219

YLR202C	YLR202C	23.53768093	31.56131565	0.551036683	327	flat	0.745776291	-0.423185162	1.340884675	0.423185162
YLR203C	MSS51	80.37134592	86.71077437	0.376228795	1311	flat	0.926889957	-0.109530027	1.078876724	0.109530027
YLR204W	QR15	278.0461028	184.2955396	0.889285196	336	flat	1.508696865	0.593302961	0.662823675	-0.593302961
YLR205C	HMX1	31.15896864	58.38639059	0.846172249	954	flat	0.533668348	-0.905984646	1.873822952	0.905984646
YLR206W	ENT2	44.23460726	42.92813649	0.107858489	1842	flat	1.030433904	0.043251967	0.970464963	-0.043251967
YLR207W	HRD3	16.68963599	20.92790371	0.377968682	2502	flat	0.797482453	-0.326475319	1.253946085	0.326475319
YLR208W	SEC13	404.444832	364.4923891	0.614136581	894	flat	1.109611185	0.150054236	0.901216582	-0.150054236
YLR209C	PNP1	82.89262942	64.2115681	0.725126867	936	flat	1.290929841	0.368410596	0.774635436	-0.368410596
YLR210W	CLB4	70.94169119	66.83270685	0.283862549	1383	flat	1.061481639	0.086079416	0.942079414	-0.086079416
YLR211C	ATG38	79.89510563	74.21489209	0.360330579	681	flat	1.076537382	0.106398417	0.928904111	-0.106398417
YLR212C	TUB4	77.02172123	48.98995357	0.826497028	1422	flat	1.572194207	0.652779439	0.636053736	-0.652779439
YLR213C	CRR1	9.132755794	12.19923194	0.31014934	1269	flat	0.748633671	-0.417668157	1.335766795	0.417668157
YLR214W	FRE1	173.11807	111.9333585	0.881941424	2061	flat	1.546617311	0.629116266	0.646572357	-0.629116266
YLR215C	CDC123	104.9703977	104.2649688	0.051268668	1083	flat	1.006765732	0.009728017	0.993279735	-0.009728017
YLR216C	CPR6	331.6010075	1137.479997	0.978969117	1116	up	0.291522496	-1.77832088	3.430267012	1.77832088
YLR217W	YLR217W	0.546106263	5.152780156	0.47599681	324	flat	0.105982838	-3.238097435	9.435489959	3.238097435
YLR218C	COA4	256.4240147	98.50155059	0.967130637	453	down	2.603248509	1.38031304	0.384135436	-1.38031304
YLR219W	MSC3	31.75506786	42.19380923	0.616492678	2187	flat	0.752600167	-0.410044486	1.328726785	0.410044486
YLR220W	CCC1	223.3185745	190.9298658	0.715282007	969	flat	1.169636681	0.226060462	0.854966347	-0.226060462
YLR221C	RSA3	228.8457058	172.3754395	0.84014789	663	flat	1.327600419	0.40882099	0.75323869	-0.40882099
YLR222C	UTP13	170.8458059	153.7519047	0.558909671	2454	flat	1.111178468	0.152090548	0.899945444	-0.152090548
YLR222C-A	YLR222C-A	174.6405274	272.00839	0.895918515	231	flat	0.642040958	-0.63926276	1.557533032	0.63926276
YLR223C	IFH1	80.07848792	94.19416704	0.620574163	3258	flat	0.850142747	-0.234222991	1.176273048	0.234222991
YLR224W	YLR224W	135.0151796	169.6847221	0.783173844	1110	flat	0.795682593	-0.329735057	1.256782552	0.329735057
YLR225C	YLR225C	190.2377227	284.3260002	0.887741047	1224	flat	0.669083104	-0.579742682	1.494582652	0.579742682
YLR226W	BUR2	91.59691403	102.9704332	0.534014789	1188	flat	0.889545777	-0.168859245	1.12416924	0.168859245
YLR227C	ADY4	67.2771962	94.32034166	0.802174859	1482	flat	0.71328406	-0.487451362	1.401966	0.487451362
YLR227W-A	YLR227W-A	0.668701546	0.344156003	0.071487603	1323	flat	1.943018689	0.958299778	0.514663089	-0.958299778
YLR227W-B	YLR227W-B	52.48031424	60.81859817	0.509736117	5268	flat	0.86289911	-0.212736205	1.158884032	0.212736205
YLR228C	ECM22	26.30557013	30.78908281	0.377910686	2445	flat	0.854379791	-0.227050573	1.17043967	0.227050573
YLR229C	CDC42	346.658016	276.4056674	0.818993765	576	flat	1.254163922	0.326725924	0.797343937	-0.326725924
YLR230W	YLR230W	1.445575401	0.991979068	0.086566623	306	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YLR231C	BNA5	109.3848438	102.1847688	0.379106858	1362	flat	1.070461332	0.098232683	0.934176667	-0.098232683
YLR232W	YLR232W	1.016887523	1.744514912	0.1169204	348	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YLR233C	EST1	52.40747756	59.84184581	0.473118747	2100	flat	0.875766395	-0.191382004	1.141857013	0.191382004
YLR234W	TOP3	10.72762165	11.16542649	0.064470059	1971	flat	0.960789242	-0.057708098	1.040810988	0.057708098
YLR235C	YLR235C	1.995546192	4.184212458	0.274235175	399	flat	0.476922769	-1.068172434	2.096775546	1.068172434
YLR236C	YLR236C	2.457478181	3.747476477	0.171581847	324	flat	0.655768808	-0.608740815	1.52492767	0.608740815
YLR237W	THI7	28.99742201	30.91198877	0.184065536	1797	flat	0.938063941	-0.092241831	1.066025413	0.092241831
YLR238W	FAR10	82.74364949	100.6537758	0.68631289	1437	flat	0.822062052	-0.282680797	1.216453183	0.282680797
YLR239C	LIP2	71.16976326	61.97004795	0.523452226	987	flat	1.148454223	0.199693352	0.87073562	-0.199693352
YLR240W	VPS34	30.70164522	42.62112802	0.65553139	2628	flat	0.720338636	-0.473252808	1.388235963	0.473252808
YLR241W	CSC1	49.75216364	86.75346395	0.865419748	2349	flat	0.573356892	-0.802494654	1.744114378	0.802494654
YLR242C	ARV1	114.4787973	121.7638902	0.351732637	966	flat	0.940170334	-0.089005937	1.06363705	0.089005937
YLR243W	GPN3	87.28098332	87.09794231	0.015412498	819	flat	1.002101554	0.00302872	0.997902853	-0.00302872
YLR244C	MAP1	155.6571747	125.5646081	0.762273452	1164	flat	1.23965803	0.309942196	0.806674079	-0.309942196
YLR245C	CDD1	149.5109103	138.3290531	0.443924895	429	flat	1.080835204	0.112146571	0.925210426	-0.112146571
YLR246W	ERF2	77.08289895	77.29170235	0.016543425	1080	flat	0.997298502	-0.003902712	1.002908816	0.003902712
YLR247C	IRC20	72.93833122	105.2434362	0.827352472	4671	flat	0.693043993	-0.528981161	1.442909845	0.528981161

YLR248W	RCK2	202.470461	238.0506232	0.721618095	1833	flat	0.850535311	-0.233556962	1.175730139	0.233556962
YLR249W	YEF3	548.6784491	386.2823445	0.883514572	3135	flat	1.420407785	0.506305172	0.704023176	-0.506305172
YLR250W	SSP120	376.5902309	365.9769581	0.214448311	705	flat	1.028999839	0.041242756	0.971817451	-0.041242756
YLR251W	SYM1	352.9832297	471.1599971	0.861164274	594	flat	0.749179115	-0.416617413	1.334794283	0.416617413
YLR252W	YLR252W	418.349521	613.0430638	0.890945339	306	flat	0.682414574	-0.551279638	1.465384883	0.551279638
YLR253W	MCP2	64.25658739	75.08759447	0.567964332	1710	flat	0.85575504	-0.224730211	1.168558704	0.224730211
YLR254C	NDL1	183.6124224	124.3471866	0.871603596	570	flat	1.476610991	0.562289802	0.677226437	-0.562289802
YLR255C	YLR255C	14.24504302	34.29893725	0.83861099	354	flat	0.415320245	-1.267703897	2.407780532	1.267703897
YLR256W	HAP1	66.02326611	76.50910808	0.555306655	4509	flat	0.862946488	-0.212656996	1.158820407	0.212656996
YLR256W-A	YLR256W-A	35.37431178	50.24677644	0.70969262	1323	flat	0.704011566	-0.506328964	1.420431209	0.506328964
YLR257W	YLR257W	206.3365842	337.3252545	0.906589822	966	up	0.611684365	-0.709140694	1.63483008	0.709140694
YLR258W	GSY2	185.8354747	148.5481628	0.784065536	2118	flat	1.251011599	0.323095166	0.7993531	-0.323095166
YLR259C	HSP60	583.8247642	1169.242091	0.945106568	1719	up	0.499318976	-1.001966358	2.00272781	1.001966358
YLR260W	LCB5	50.36401505	76.84233198	0.815608235	2064	flat	0.65542018	-0.609508002	1.525738802	0.609508002
YLR261C	VPS63	73.58907141	51.05506944	0.78430477	327	flat	1.441366591	0.527437311	0.693786026	-0.527437311
YLR262C	YPT6	209.5682782	152.0070146	0.852754821	648	flat	1.378675048	0.463282456	0.725334082	-0.463282456
YLR262C-A	TMA7	1454.070936	824.2430378	0.918551544	195	down	1.764128867	0.818955951	0.566852013	-0.818955951
YLR263W	RED1	21.33375986	16.80254399	0.394562853	2484	flat	1.269674394	0.344458568	0.787603502	-0.344458568
YLR264C-A	YLR264C-A	3.780735664	10.37762717	0.5669204	117	flat	0.364316004	-1.456737721	2.744869806	1.456737721
YLR264W	RPS28B	1116.273324	894.2691294	0.828106423	204	flat	1.248252106	0.319909341	0.801120218	-0.319909341
YLR265C	NEJ1	91.22044374	87.75978077	0.221632594	1029	flat	1.039433359	0.055797266	0.962062638	-0.055797266
YLR266C	PDR8	63.01226106	55.20321119	0.483347832	2106	flat	1.141460066	0.190880387	0.876070946	-0.190880387
YLR267W	BOP2	17.40462656	12.66988326	0.415108018	1713	flat	1.373700626	0.458067628	0.72796065	-0.458067628
YLR268W	SEC22	53.35585186	52.47338575	0.071139626	645	flat	1.016817404	0.024060629	0.983460744	-0.024060629
YLR269C	YLR269C	8.569667504	7.350819244	0.158351457	351	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YLR270W	DCS1	181.8953936	158.1146806	0.659736117	1053	flat	1.150401676	0.202137683	0.869261599	-0.202137683
YLR271W	YLR271W	190.7717971	187.0944665	0.149818762	825	flat	1.019654941	0.028081015	0.98072393	-0.028081015
YLR272C	YCS4	31.94512844	33.4407353	0.145983761	3531	flat	0.955275898	-0.06601063	1.046817995	0.06601063
YLR273C	PIG1	17.31215754	25.25649016	0.561273017	1947	flat	0.685453815	-0.544868632	1.458887495	0.544868632
YLR274W	MCM5	124.495338	103.5288669	0.70200087	2328	flat	1.202518116	0.266058628	0.831588304	-0.266058628
YLR275W	SMD2	859.4531802	804.8971775	0.453023054	333	flat	1.067780089	0.094614553	0.936522426	-0.094614553
YLR276C	DBP9	116.0755745	64.87543102	0.889923155	1785	flat	1.789206987	0.839320297	0.558906827	-0.839320297
YLR277C	YSH1	97.31613598	85.29112329	0.561374511	2340	flat	1.140987857	0.190283438	0.876433517	-0.190283438
YLR278C	YLR278C	46.21230953	42.10884616	0.323495723	4026	flat	1.097448962	0.134153848	0.911204105	-0.134153848
YLR279W	YLR279W	3.402662097	7.394059357	0.418087574	390	flat	0.460188637	-1.119702734	2.17302193	1.119702734
YLR280C	YLR280C	13.35859934	8.64802264	0.424416413	351	flat	1.544699858	0.627326543	0.647374954	-0.627326543
YLR281C	YLR281C	15.12294265	12.97203396	0.233275337	468	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YLR282C	YLR282C	1.810773397	0.443780109	0.201007685	342	flat	4.080339248	2.028689106	0.245077661	-2.028689106
YLR283W	YLR283W	98.76721833	100.8606526	0.125337103	945	flat	0.979244292	-0.030259282	1.021195639	0.030259282
YLR284C	ECI1	134.8552084	131.428401	0.170559664	843	flat	1.026073568	0.037134174	0.974588988	-0.037134174
YLR285C-A	YLR285C-A	271.0986457	79.88041965	0.97708424	171	down	3.393805977	1.762904089	0.29465444	-1.762904089
YLR285W	NNT1	158.1415349	131.111615	0.730564013	786	flat	1.206159613	0.270420835	0.829077668	-0.270420835
YLR286C	CTS1	127.7539457	48.434303	0.956908801	1689	down	2.637674907	1.399266764	0.379121778	-1.399266764
YLR286W-A	YLR286W-A	10.48524024	15.73940121	0.451471654	135	flat	0.666177836	-0.586020738	1.501100675	0.586020738
YLR287C	YLR287C	328.6117734	313.2090312	0.34569378	1068	flat	1.049177197	0.069258357	0.953127844	-0.069258357
YLR287C-A	RPS30A	1470.800692	1263.982828	0.750507467	192	flat	1.163623951	0.218624896	0.859384167	-0.218624896
YLR288C	MEC3	64.93950765	52.08203361	0.642946208	1425	flat	1.246869662	0.318310665	0.802008446	-0.318310665
YLR289W	GUF1	82.94559484	94.21190671	0.542127012	1938	flat	0.880415202	-0.183744039	1.13582773	0.183744039
YLR290C	YLR290C	169.6190336	174.1565552	0.185160215	834	flat	0.973945732	-0.038086707	1.026751253	0.038086707

YLR291C	GCD7	206.350969	183.6901134	0.614716543	1146	flat	1.12336459	0.167826234	0.890182945	-0.167826234
YLR292C	SEC72	442.8020995	265.7327843	0.910801798	582	down	1.666343506	0.736685834	0.60011636	-0.736685834
YLR293C	GSP1	233.7731972	196.1548426	0.742206757	660	flat	1.191778873	0.253116577	0.839081832	-0.253116577
YLR294C	YLR294C	198.6535999	145.793869	0.846107003	330	flat	1.362564841	0.446324886	0.733910027	-0.446324886
YLR295C	ATP14	216.3367193	106.0385944	0.942525736	375	down	2.040169624	1.028689106	0.490155323	-1.028689106
YLR296W	YLR296W	7.034249473	4.641369949	0.266630419	327	flat	1.515554578	0.599845807	0.659824473	-0.599845807
YLR297W	YLR297W	88.46921453	133.0930684	0.860751051	390	flat	0.66471692	-0.589188017	1.504399798	0.589188017
YLR298C	YHC1	69.14835158	72.17930448	0.209272147	696	flat	0.958008006	-0.061890382	1.043832612	0.061890382
YLR299C-A	YLR299C-A	1.902563753	3.263931126	0.179360592	93	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YLR299W	ECM38	39.0817105	57.70886999	0.758126722	1983	flat	0.677221899	-0.56229947	1.476620886	0.56229947
YLR300W	EXG1	501.0628342	243.1519648	0.948412353	1347	down	2.060698274	1.043133282	0.485272402	-1.043133282
YLR301W	HRI1	638.0616411	549.685968	0.74400464	735	flat	1.160774839	0.215088153	0.861493518	-0.215088153
YLR302C	YLR302C	2.1934516	1.672427519	0.093613165	363	flat	1.311537615	0.391259185	0.762463835	-0.391259185
YLR303W	MET17	0.927767044	1.477937352	0.097361172	1335	flat	0.6277445	-0.671750612	1.593004798	0.671750612
YLR304C	ACO1	482.3976041	482.7894632	0.02108163	2337	flat	0.999188344	-0.001171448	1.000812316	0.001171448
YLR305C	STT4	26.27859888	29.247467	0.276504277	5703	flat	0.898491445	-0.154423328	1.112976652	0.154423328
YLR306W	UBC12	204.3997725	233.6819261	0.66122952	567	flat	0.874692262	-0.193152564	1.143259228	0.193152564
YLR307C-A	YLR307C-A	4.356438594	28.74484798	0.897636654	264	flat	0.151555458	-2.722082288	6.598244727	2.722082288
YLR307W	CDA1	12.10836932	21.775537	0.632376396	906	flat	0.556002271	-0.846837319	1.798553805	0.846837319
YLR308W	CDA2	1.036380575	2.909382697	0.249427287	939	flat	0.356220093	-1.489159199	2.807253211	1.489159199
YLR309C	IMH1	198.8617213	218.5062313	0.55061621	2736	flat	0.91009634	-0.135908823	1.098784773	0.135908823
YLR310C	CDC25	51.9316144	48.87274983	0.244207627	4770	flat	1.062588346	0.087582795	0.941098219	-0.087582795
YLR311C	YLR311C	14.49064721	26.16772368	0.681636944	348	flat	0.553760326	-0.852666398	1.805835399	0.852666398
YLR312C	YLR312C	44.04983447	77.47132763	0.857111788	1197	flat	0.568595322	-0.814525866	1.758720063	0.814525866
YLR312W-A	MRPL15	412.8563345	395.7644991	0.315571988	762	flat	1.043186884	0.060997635	0.95860101	-0.060997635
YLR313C	SPH1	45.0398826	47.35158837	0.190582862	1593	flat	0.951179974	-0.072209754	1.05132575	0.072209754
YLR314C	CDC3	148.0713149	128.2737462	0.650840945	1563	flat	1.154338431	0.207066258	0.866297069	-0.207066258
YLR315W	NKP2	26.42586927	18.06819016	0.575329854	462	flat	1.462563159	0.548498927	0.683731156	-0.548498927
YLR316C	TAD3	177.303627	153.1824518	0.671806583	969	flat	1.157466962	0.210971014	0.863955545	-0.210971014
YLR317W	YLR317W	21.15126048	19.88747	0.139422938	435	flat	1.063547072	0.088883888	0.940249874	-0.088883888
YLR318W	EST2	36.48730317	40.70140554	0.344591852	2655	flat	0.896462977	-0.157684093	1.115495035	0.157684093
YLR319C	BUD6	70.82769815	64.76152316	0.390669856	2367	flat	1.093669431	0.129176739	0.914353069	-0.129176739
YLR320W	MMS22	25.71991598	34.1445331	0.562425692	4365	flat	0.753266003	-0.408768677	1.32755228	0.408768677
YLR321C	SFH1	78.17888434	65.28244444	0.620936639	1281	flat	1.197548361	0.260083918	0.835039346	-0.260083918
YLR322W	VPS65	1.685127896	1.445455213	0.060258083	315	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YLR323C	CWC24	50.81308732	36.38655526	0.69953603	780	flat	1.396479742	0.481794646	0.716086292	-0.481794646
YLR324W	PEX30	70.96671725	55.70795424	0.684471509	1572	flat	1.273906361	0.349259235	0.784987053	-0.349259235
YLR325C	RPL38	2646.983967	1476.742914	0.919870958	237	down	1.79244738	0.841930767	0.557896433	-0.841930767
YLR326W	YLR326W	39.40122694	60.87705564	0.788871973	723	flat	0.647226225	-0.627658028	1.545054821	0.627658028
YLR327C	TMA10	487.7670487	1028.100788	0.95645933	261	up	0.47443505	-1.075717499	2.107770074	1.075717499
YLR328W	NMA1	77.31886576	105.3348519	0.797614905	1206	flat	0.734029283	-0.446090477	1.36234347	0.446090477
YLR329W	REC102	7.678460129	4.200001939	0.354494708	795	flat	1.828203949	0.870427022	0.546984925	-0.870427022
YLR330W	CHS5	67.36123229	79.87645733	0.610780049	2016	flat	0.843317725	-0.245851817	1.185792697	0.245851817
YLR331C	JIP3	1.170227705	1.606061347	0.085210961	378	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YLR332W	MID2	40.59727881	57.43479864	0.732840365	1131	flat	0.706841145	-0.500542074	1.414745035	0.500542074
YLR333C	RPS25B	815.4318428	423.7570764	0.9330796	327	down	1.924290798	0.944326835	0.519671975	-0.944326835
YLR334C	YLR334C	2.554229291	6.373660781	0.40861969	381	flat	0.400747605	-1.319234198	2.495336188	1.319234198
YLR335W	NUP2	55.29837172	43.293196865	0.636196897	2163	flat	1.27729073	0.353086941	0.782907115	-0.353086941
YLR336C	SGD1	124.4794615	112.7053551	0.499289546	2700	flat	1.10446803	0.143351659	0.90541326	-0.143351659

YLR337C	VRP1	32.62617732	27.70750334	0.401152675	2454	flat	1.177521371	0.235753244	0.849241487	-0.235753244
YLR338W	OPI9	1.54666459	3.714718816	0.276931999	858	flat	0.416361148	-1.264092643	2.40176108	1.264092643
YLR339C	YLR339C	1.602703162	0.54990144	0.162838915	552	flat	2.914528034	1.543262279	0.343108726	-1.543262279
YLR340W	RPP0	578.0177115	291.2615344	0.942344498	939	down	1.984531575	0.988798516	0.503897248	-0.988798516
YLR341W	SPO77	4.44196893	6.56200379	0.244019139	1434	flat	0.67692264	-0.562937125	1.47727368	0.562937125
YLR342W	FKS1	109.0978913	122.582611	0.558141221	5631	flat	0.88999484	-0.168131123	1.12360202	0.168131123
YLR342W-A	YLR342W-A	133.2122656	70.65285393	0.909003915	174	down	1.885447765	0.914907182	0.530377992	-0.914907182
YLR343W	GAS2	5.622144328	9.190079455	0.356394084	1668	flat	0.61176232	-0.708956845	1.63462176	0.708956845
YLR344W	RPL26A	398.1114654	272.3215036	0.887907786	384	flat	1.46191711	0.547861513	0.68403331	-0.547861513
YLR345W	YLR345W	107.8977479	152.9631722	0.847933884	1530	flat	0.705383828	-0.503519595	1.417667886	0.503519595
YLR346C	YLR346C	100.0338177	247.4987774	0.965122517	306	up	0.404179038	-1.306933594	2.474151072	1.306933594
YLR347C	KAP95	78.13754292	133.2267015	0.888690735	2586	flat	0.586500619	-0.769795463	1.705028037	0.769795463
YLR347W-A	YLR347W-A	8.156736091	7.534819726	0.097556909	141	flat	1.082538984	0.11441898	0.923754262	-0.11441898
YLR348C	dic-01	172.8946857	77.83220376	0.955147165	897	down	2.221377236	1.151454414	0.450171175	-1.151454414
YLR349W	YLR349W	1.744954922	0.89806389	0.133587067	507	flat	1.943018689	0.958299778	0.514663089	-0.958299778
YLR350W	ORM2	47.1564016	52.45603595	0.384087284	651	flat	0.89896998	-0.153655155	1.112384197	0.153655155
YLR351C	NIT3	127.8561936	79.69804426	0.874865884	876	flat	1.604257605	0.681905822	0.623341287	-0.681905822
YLR352W	YLR352W	20.91289601	33.56032152	0.690445121	2424	flat	0.623143494	-0.682363678	1.604766815	0.682363678
YLR353W	BUD8	64.59424438	43.38758776	0.779737567	1812	flat	1.488772428	0.574123242	0.671694331	-0.574123242
YLR354C	TAL1	172.9011435	128.2841501	0.832550384	1008	flat	1.347798175	0.430604478	0.741950849	-0.430604478
YLR355C	ILV5	574.156266	343.9161367	0.911903726	1188	down	1.66946591	0.739386634	0.598993962	-0.739386634
YLR356W	ATG33	45.42611184	40.11503229	0.398629839	594	flat	1.132396243	0.179378867	0.883083114	-0.179378867
YLR357W	RSC2	36.64679823	39.27902733	0.240162389	2670	flat	0.932986398	-0.100072046	1.071826987	0.100072046
YLR358C	YLR358C	2.196044332	6.996618317	0.476823256	564	flat	0.31387225	-1.671750612	3.186009597	1.671750612
YLR359W	ADE13	150.5625142	146.745127	0.17646078	1449	flat	1.026013723	0.037050028	0.974645833	-0.037050028
YLR360W	VPS38	157.4349886	179.4828308	0.638118022	1320	flat	0.877159046	-0.18908964	1.140044106	0.18908964
YLR361C	DCR2	49.65888553	78.46400231	0.830643758	1737	flat	0.632887491	-0.659979042	1.580059671	0.659979042
YLR361C-A	YLR361C-A	327.9616337	193.6763979	0.910142091	297	down	1.693348478	0.759878899	0.5905459	-0.759878899
YLR362W	STE11	53.14724401	64.75357509	0.609663622	2154	flat	0.82076154	-0.284964966	1.218380676	0.284964966
YLR363C	NMD4	175.0532403	242.3282563	0.860352327	657	flat	0.722380638	-0.469168871	1.384311744	0.469168871
YLR363W-A	YLR363W-A	213.9720537	164.1263971	0.825097869	258	flat	1.303702863	0.382615091	0.767045949	-0.382615091
YLR364C-A	YLR364C-A	115.801167	122.158593	0.314984776	123	flat	0.947957603	-0.077105558	1.054899499	0.077105558
YLR364W	GRX8	152.5423729	155.4521379	0.140408873	330	flat	0.981281924	-0.02726041	1.019075126	0.02726041
YLR365W	YLR365W	10.09558604	21.87715998	0.72277077	333	flat	0.461466939	-1.115700804	2.167002479	1.115700804
YLR366W	YLR366W	37.8740755	35.71124643	0.190365376	306	flat	1.060564368	0.084832184	0.942894208	-0.084832184
YLR367W	RPS22B	1042.045786	820.6544385	0.837393069	393	flat	1.269774143	0.344571905	0.787541631	-0.344571905
YLR368W	MDM30	74.88128842	83.78331383	0.484602001	1797	flat	0.893749423	-0.162057689	1.118881841	0.162057689
YLR369W	SSQ1	76.01002423	96.10739446	0.726627519	1974	flat	0.790886327	-0.338457741	1.264404208	0.338457741
YLR370C	ARC18	309.230383	231.1920823	0.853508772	537	flat	1.337547462	0.419590086	0.747637021	-0.419590086
YLR371W	ROM2	59.04467106	54.58004797	0.324488908	4071	flat	1.081799545	0.113433196	0.924385673	-0.113433196
YLR372W	ELO3	250.577544	270.2082172	0.48723358	1038	flat	0.927349829	-0.108814418	1.07834171	0.108814418
YLR373C	VID22	36.94390703	40.15865591	0.27785269	2706	flat	0.919948793	-0.120374536	1.087017025	0.120374536
YLR374C	YLR374C	3.629506237	3.891610188	0.060062346	390	flat	0.932648971	-0.100593911	1.072214768	0.100593911
YLR375W	STP3	75.4388651	106.9174648	0.819776715	1032	flat	0.705580377	-0.503117657	1.417272975	0.503117657
YLR376C	PSY3	102.1825496	102.4310237	0.017891837	729	flat	0.99757423	-0.003503899	1.002431669	0.003503899
YLR377C	FBP1	1.858951977	2.464314761	0.103044802	1047	flat	0.754348432	-0.406697039	1.32564735	0.406697039
YLR378C	SEC61	35.0075686	37.54877938	0.234841235	1443	flat	0.932322413	-0.101099145	1.072590325	0.101099145
YLR379W	YLR379W	1.651425338	8.90400411	0.610033348	375	flat	0.185469966	-2.430742513	5.391708548	2.430742513
YLR380W	CSR1	19.61175742	13.60636325	0.484399014	1227	flat	1.441366591	0.527437311	0.693786026	-0.527437311

YLR381W	CTF3	28.96744036	38.18443675	0.583739307	2202	flat	0.75861903	-0.398552533	1.318184702	0.398552533
YLR382C	NAM2	44.67942454	50.93008953	0.437132086	2685	flat	0.877269703	-0.188907649	1.139900302	0.188907649
YLR383W	SMC6	60.77795366	44.69243808	0.714513557	3345	flat	1.359915822	0.443517352	0.735339632	-0.443517352
YLR384C	IKI3	73.37483743	74.08760996	0.051268668	4050	flat	0.990379329	-0.013946892	1.009714128	0.013946892
YLR385C	SWC7	31.48528437	27.38757245	0.352486588	399	flat	1.149619391	0.201156302	0.869853108	-0.201156302
YLR386W	VAC14	42.37685418	50.36123468	0.516623169	2643	flat	0.841457809	-0.249037159	1.188413714	0.249037159
YLR387C	REH1	300.4820435	292.3291293	0.207358272	1299	flat	1.027889503	0.039685185	0.972867217	-0.039685185
YLR388W	RPS29A	960.2272641	629.2801948	0.900166739	171	down	1.52591369	0.609673362	0.655345061	-0.609673362
YLR389C	STE23	32.01415156	26.72264233	0.422198057	3084	flat	1.198015943	0.260647108	0.834713432	-0.260647108
YLR390W	ECM19	25.31420003	21.04224624	0.373292736	339	flat	1.203017954	0.266658174	0.831242789	-0.266658174
YLR390W-A	CCW14	73.78603945	106.8971585	0.829592576	717	flat	0.69025258	-0.53480372	1.448745038	0.53480372
YLR392C	ART10	50.62689155	62.38573558	0.618551544	1557	flat	0.811513899	-0.30131229	1.232264784	0.30131229
YLR393W	ATP10	28.22589225	37.94319933	0.60138466	840	flat	0.743898584	-0.426822144	1.344269261	0.426822144
YLR394W	CST9	15.87439322	21.26285567	0.446288241	1449	flat	0.74657861	-0.42163392	1.339443679	0.42163392
YLR395C	COX8	453.9179952	211.3292115	0.961490503	237	down	2.147918842	1.102939483	0.465566939	-1.102939483
YLR396C	VPS33	54.63272304	59.51014308	0.346933449	2076	flat	0.918040526	-0.123370254	1.089276532	0.123370254
YLR397C	AFG2	56.29859106	62.7042543	0.426011309	2343	flat	0.897843244	-0.155464511	1.11378017	0.155464511
YLR398C	SKI2	67.29063703	62.37453472	0.339335943	3864	flat	1.078815855	0.10944863	0.926942253	-0.10944863
YLR399C	BDF1	174.1053538	207.7394766	0.73476874	2061	flat	0.838094697	-0.25481483	1.193182588	0.25481483
YLR399W-A	YLR399W-A	1.685127896	1.445455213	0.060258083	105	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YLR400W	YLR400W	5.039385638	13.76841832	0.647622155	474	flat	0.366010497	-1.450043069	2.732162076	1.450043069
YLR401C	DUS3	92.17196192	80.00778255	0.574249674	2007	flat	1.152037452	0.204187618	0.868027336	-0.204187618
YLR402W	YLR402W	34.09750977	32.4098161	0.15738002	192	flat	1.052073534	0.073235545	0.950503903	-0.073235545
YLR403W	SFP1	44.019039	48.3720319	0.339321444	2052	flat	0.910010129	-0.136045491	1.098888867	0.136045491
YLR404W	FLD1	47.22482547	33.96314346	0.681114978	858	flat	1.39047275	0.475575471	0.719179862	-0.475575471
YLR405W	DUS4	260.5193989	238.6572248	0.539190953	1104	flat	1.091604912	0.126450792	0.916082356	-0.126450792
YLR406C	RPL31B	506.4991873	274.6998876	0.921284616	342	down	1.843827428	0.882703634	0.542350105	-0.882703634
YLR406C-A	YLR406C-A	2.359179054	4.047274596	0.210606061	150	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YLR407W	YLR407W	250.9847149	283.6626955	0.655183413	687	flat	0.884799866	-0.176576928	1.130199086	0.176576928
YLR408C	BLS1	246.2273261	206.0655053	0.753581267	369	flat	1.19489832	0.256887857	0.836891293	-0.256887857
YLR409C	UTP21	86.96335556	79.65380853	0.420131941	2820	flat	1.091766447	0.126664265	0.915946815	-0.126664265
YLR410W	VIP1	50.59791171	59.28004639	0.527671451	3441	flat	0.853540353	-0.228468734	1.171590771	0.228468734
YLR410W-A	YLR410W-A	0.268699209	0.345723912	0.031462955	1317	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YLR410W-B	YLR410W-B	23.76163545	27.85215084	0.357974482	5313	flat	0.853134668	-0.229154605	1.172147889	0.229154605
YLR411W	CTR3	25.71212709	31.77612286	0.464078585	726	flat	0.80916502	-0.305494141	1.235841856	0.305494141
YLR412C-A	YLR412C-A	15.81333786	24.92886526	0.606720313	207	flat	0.634338454	-0.656675292	1.576445497	0.656675292
YLR412W	BER1	82.35679607	87.01640381	0.282412643	825	flat	0.946451387	-0.079399689	1.056578303	0.079399689
YLR413W	INA1	39.43598123	9.654186813	0.912896912	2028	down	4.084857896	2.030285891	0.244806558	-2.030285891
YLR414C	PUN1	493.2828931	609.0075125	0.812672176	792	flat	0.809978338	-0.304044769	1.234600918	0.304044769
YLR415C	YLR415C	43.32120829	29.10097884	0.706981296	339	flat	1.488651242	0.574005802	0.671749011	-0.574005802
YLR416C	YLR416C	1.552091483	0.190191475	0.20045672	399	flat	8.160678495	3.028689106	0.122538831	-3.028689106
YLR417W	VPS36	59.60359779	62.63639255	0.220102943	1701	flat	0.951580948	-0.071601708	1.050882747	0.071601708
YLR418C	CDC73	256.5008445	318.0551768	0.805596636	1182	flat	0.806466498	-0.310313493	1.239977114	0.310313493
YLR419W	YLR419W	46.51410652	45.69389929	0.075982311	4308	flat	1.017950038	0.025666754	0.982366484	-0.025666754
YLR420W	URA4	161.749194	121.5568432	0.820711904	1095	flat	1.330646551	0.41212741	0.751514367	-0.41212741
YLR421C	RPN13	1083.607003	906.7699612	0.788096274	471	flat	1.195018637	0.257033119	0.836807033	-0.257033119
YLR422W	YLR422W	23.08224204	19.44597145	0.334848485	5799	flat	1.186993517	0.247312055	0.842464584	-0.247312055
YLR423C	ATG17	105.7538697	100.4526485	0.27723648	1254	flat	1.052741572	0.074151325	0.949900742	-0.074151325
YLR424W	SPP382	78.1956386	80.98830511	0.184812237	2127	flat	0.965517657	-0.050625452	1.03571384	0.050625452

YLR425W	TUS1	34.24687484	37.82716509	0.303943744	3924	flat	0.905351346	-0.143450317	1.104543561	0.143450317
YLR426W	TDA5	74.85162901	75.65433017	0.067406119	981	flat	0.989389885	-0.015388945	1.010723897	0.015388945
YLR427W	MAG2	55.77120379	60.16626541	0.32245904	2013	flat	0.926951397	-0.109434399	1.078805213	0.109434399
YLR428C	YLR428C	4.3593526	3.959290365	0.077366971	345	flat	1.101043924	0.138872023	0.90822898	-0.138872023
YLR429W	CRN1	86.88617643	72.2395063	0.649195302	1956	flat	1.202751526	0.26633863	0.831426923	-0.26633863
YLR430W	SEN1	16.9909513	13.48638208	0.333710309	6696	flat	1.259859849	0.333263253	0.793739082	-0.333263253
YLR431C	ATG23	38.58349004	45.57641271	0.482441641	1362	flat	0.846567067	-0.240303728	1.18124132	0.240303728
YLR432W	IMD3	169.5097164	124.7394747	0.834986226	1572	flat	1.358909975	0.442449884	0.735883921	-0.442449884
YLR433C	CNA1	49.23828125	53.421833	0.321357112	1662	flat	0.921688353	-0.117649075	1.08496543	0.117649075
YLR434C	YLR434C	10.1370975	13.04297477	0.295860519	384	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YLR435W	TSR2	575.4793566	390.2378236	0.892032768	618	flat	1.474688823	0.56041056	0.678109161	-0.56041056
YLR436C	ECM30	60.85294207	57.49510676	0.243598666	3825	flat	1.058402106	0.081887837	0.944820493	-0.081887837
YLR437C	DIF1	59.19954902	64.18252624	0.350086994	402	flat	0.922362401	-0.11659439	1.084172554	0.11659439
YLR437C-A	YLR437C-A	4.268251578	11.31639278	0.585711179	228	flat	0.377174216	-1.406697039	2.651294699	1.406697039
YLR438C-A	LSM3	407.6137143	235.5288966	0.913585617	270	down	1.730631444	0.79129852	0.577823779	-0.79129852
YLR438W	CAR2	13.11426004	16.66524833	0.337944034	1275	flat	0.786922569	-0.345706409	1.270773058	0.345706409
YLR439W	MRPL4	22.85454709	15.80966639	0.526997245	960	flat	1.445605905	0.531674304	0.691751463	-0.531674304
YLR440C	SEC39	70.27695351	50.94720662	0.749333043	2130	flat	1.379407394	0.464048605	0.724948992	-0.464048605
YLR441C	RPS1A	927.8900039	505.316462	0.922125562	768	down	1.836255246	0.876766612	0.5445866	-0.876766612
YLR442C	SIR3	60.5759586	68.98763515	0.497353922	2937	flat	0.878069794	-0.187592477	1.138861633	0.187592477
YLR443W	ECM7	156.6437095	170.8148187	0.486175149	1347	flat	0.917038174	-0.124946304	1.090467145	0.124946304
YLR444C	YLR444C	1.459888028	1.502700964	0.014122082	303	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YLR445W	GMC2	1.560303607	5.085860934	0.392177758	567	flat	0.306792425	-1.704665235	3.259532895	1.704665235
YLR446W	YLR446W	19.29743235	20.04986263	0.090959838	1302	flat	0.962472048	-0.055183452	1.038991212	0.055183452
YLR447C	VMA6	289.8687848	246.5211332	0.732405394	1038	flat	1.175837467	0.233688653	0.850457677	-0.233688653
YLR448W	RPL6B	309.0591204	169.4939149	0.91831231	531	down	1.823423104	0.866649361	0.548419068	-0.866649361
YLR449W	FPR4	139.8699032	118.5604295	0.684326519	1179	flat	1.179735126	0.238462982	0.847647898	-0.238462982
YLR450W	HMG2	25.85285842	22.10330414	0.338603741	3138	flat	1.169637727	0.226061752	0.854965582	-0.226061752
YLR451W	LEU3	40.8268303	44.83029639	0.319102508	2661	flat	0.910697309	-0.134956473	1.098059684	0.134956473
YLR452C	SST2	136.8593858	89.96356084	0.86599246	2097	flat	1.521275775	0.605281707	0.657343012	-0.605281707
YLR453C	RIF2	71.5647434	62.72764604	0.507024793	1188	flat	1.140880424	0.19014759	0.876516048	-0.19014759
YLR454W	FMP27	42.40061252	49.05145942	0.460954038	7887	flat	0.864410825	-0.210210955	1.156857331	0.210210955
YLR455W	PDP3	194.7289596	238.8555499	0.779135856	915	flat	0.815258258	-0.294670945	1.226605177	0.294670945
YLR456W	YLR456W	251.8855197	194.4666086	0.828599391	615	flat	1.295263601	0.373245733	0.772043621	-0.373245733
YLR457C	NBP1	77.31840728	79.20642861	0.120139191	960	flat	0.976163282	-0.034805609	1.024418782	0.034805609
YLR458W	YLR458W	2.786431954	0.796707598	0.261823981	381	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YLR459W	GAB1	46.2876903	48.15744456	0.163136146	1185	flat	0.961174139	-0.057130263	1.040394201	0.057130263
YLR460C	YLR460C	134.3855973	255.9069182	0.926062056	1131	up	0.525134679	-0.929240623	1.904273399	0.929240623
YLR461W	PAU4	2.680885289	4.599175677	0.230651008	363	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YLR462W	YLR462W	52.73288157	49.59406678	0.247738147	609	flat	1.063290127	0.088535301	0.940477086	-0.088535301
YLR463C	YLR463C	3.045136007	3.574359358	0.094069885	552	flat	0.851938964	-0.231178021	1.173793009	0.231178021
YLR464W	YLR464W	27.04358478	17.04358478	0.617369871	651	flat	1.546642877	0.629140114	0.646561669	-0.629140114
YLR465C	BSC3	3.435697652	2.947044608	0.098984157	309	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YLR466C-A	YLR466C-A	0.366332151	0.157114697	0.057351022	483	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YLR466C-B	YLR466C-B	NA	NA	NA	117	flat	#jVALOR!	#jVALOR!	#jVALOR!	#jVALOR!
YLR466W	YRF1-4	25.71556344	17.08312759	0.587190083	4149	flat	1.505319404	0.590069636	0.664310841	-0.590069636
YLR467C-A	YLR467C-A	0.091583038	0.314229394	0.058561693	483	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YLR467W	YRF1-5	27.81586322	20.49538053	0.529266348	5391	flat	1.357177203	0.440609102	0.736823458	-0.440609102
YML001W	YPT7	775.4813446	621.1307783	0.826555024	627	flat	1.248499304	0.320195017	0.8009616	-0.320195017

YML002W	YML002W	30.60859003	45.79233452	0.721857329	2214	flat	0.668421699	-0.581169527	1.496061546	0.581169527
YML003W	YML003W	41.85313356	85.88288876	0.909721618	873	up	0.487327967	-1.037035076	2.052006181	1.037035076
YML004C	GLO1	490.8643575	568.4131064	0.729657822	981	flat	0.863569738	-0.211615407	1.15798407	0.211615407
YML005W	TRM12	73.88357729	75.39469414	0.108438452	1389	flat	0.979957252	-0.029209278	1.020452676	0.029209278
YML006C	GIS4	50.87455476	79.70519809	0.829868059	2325	flat	0.638284026	-0.647729551	1.566700651	0.647729551
YML007C-A	YML007C-A	59.7764963	95.7125749	0.854124982	111	flat	0.624541722	-0.679130143	1.601174054	0.679130143
YML007W	YAP1	127.6076689	129.469268	0.098680586	1953	flat	0.985621305	-0.020894653	1.014588458	0.020894653
YML008C	ERG6	195.8302926	152.6950279	0.809025663	1152	flat	1.282492923	0.358950864	0.779731398	-0.358950864
YML009C	MRPL39	522.0929702	290.7197245	0.91877628	213	down	1.795863597	0.844677776	0.556835164	-0.844677776
YML009C-A	YML009C-A	1.893836397	2.784821969	0.132332898	327	flat	0.680056541	-0.556273395	1.470465968	0.556273395
YML009W-B	YML009W-B	27.44956761	21.31819166	0.473430477	477	flat	1.287612385	0.364698359	0.776631237	-0.364698359
YML010W	SPT5	68.56918444	62.19261244	0.407503262	3192	flat	1.102529412	0.140817143	0.907005282	-0.140817143
YML011C	RAD33	206.4281672	237.0384138	0.679636074	534	flat	0.870863772	-0.199481037	1.148285222	0.199481037
YML012C-A	YML012C-A	46.57506267	50.59093245	0.31476729	378	flat	0.92062076	-0.119321119	1.086223604	0.119321119
YML012W	ERV25	885.5267605	577.0229936	0.900971437	636	down	1.534647268	0.617907096	0.651615535	-0.617907096
YML013W	UBX2	43.60448465	48.60188724	0.377925185	1755	flat	0.897176779	-0.156535814	1.114607537	0.156535814
YML014W	TRM9	83.72979232	72.99548824	0.553131796	840	flat	1.14705435	0.197933751	0.871798272	-0.197933751
YML015C	TAF11	83.37012435	69.69010291	0.631934174	1041	flat	1.196297909	0.258576702	0.835912186	-0.258576702
YML016C	PPZ1	94.29907619	87.74903518	0.367906336	2079	flat	1.074641285	0.103855169	0.930543069	-0.103855169
YML017W	PSP2	142.7819646	85.76610938	0.888676236	1782	flat	1.664783044	0.735334176	0.600678871	-0.735334176
YML018C	YML018C	92.73549645	133.154307	0.844142381	1182	flat	0.696451347	-0.521905523	1.435850479	0.521905523
YML019W	OST6	72.44025774	86.44516685	0.631165724	999	flat	0.837990837	-0.254993626	1.19333047	0.254993626
YML020W	YML020W	28.91324705	28.07226176	0.080179788	1995	flat	1.029957874	0.042585332	0.970913496	-0.042585332
YML021C	UNG1	83.30851035	70.54624469	0.608837176	1080	flat	1.180906379	0.239894594	0.84680718	-0.239894594
YML022W	APT1	373.3275365	327.7646581	0.685428447	564	flat	1.139010956	0.187781624	0.877781624	-0.187781624
YML023C	NSE5	76.60978661	82.65304942	0.369472234	1671	flat	0.92688397	-0.109539345	1.078883692	0.109539345
YML024W	RPS17A	1047.208586	748.1549572	0.882245904	411	flat	1.399721509	0.485139815	0.71442783	-0.485139815
YML025C	YML6	86.31142881	79.85258675	0.378686385	861	flat	1.080884569	0.112212461	0.925168171	-0.112212461
YML026C	RPS18B	1975.210626	1228.981087	0.908119472	441	down	1.607193673	0.684543789	0.622202549	-0.684543789
YML027W	YOX1	23.37787534	12.18900704	0.682340148	1158	flat	1.91794748	0.939563215	0.521390711	-0.939563215
YML028W	TSA1	948.4618329	783.517436	0.803262288	591	flat	1.210517838	0.275624339	0.826092742	-0.275624339
YML029W	USA1	27.31052034	31.59672062	0.364796288	2517	flat	0.864346673	-0.210318029	1.156943194	0.210318029
YML030W	RCF1	346.3201127	187.8188367	0.91953748	480	down	1.84390511	0.882764414	0.542327257	-0.882764414
YML031C-A	YML031C-A	1.316506169	0.903409508	0.082492388	336	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YML031W	NDC1	50.43824121	48.817165	0.140053647	1968	flat	1.033207095	0.047129455	0.967860176	-0.047129455
YML032C	RAD52	55.79308515	62.38119213	0.431151225	1416	flat	0.894389531	-0.161024794	1.118081066	0.161024794
YML034C-A	YML034C-A	1.330364128	3.423464556	0.269783964	399	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YML034W	SRC1	96.76872168	82.82371815	0.612055966	2505	flat	1.168369687	0.224496834	0.855893482	-0.224496834
YML035C	AMD1	83.30578318	95.13091489	0.558815427	2433	flat	0.875696226	-0.1914976	1.141948509	0.1914976
YML036W	CGI121	315.1513228	231.8287783	0.859859359	546	flat	1.359414155	0.44298505	0.735610996	-0.44298505
YML037C	YML037C	42.20232325	40.35405755	0.16200522	1023	flat	1.045801236	0.06460868	0.956204646	-0.06460868
YML038C	YMD8	157.1010882	153.7142101	0.146599971	1329	flat	1.022033605	0.031442633	0.978441409	-0.031442633
YML039W	YML039W	52.24520243	60.04071937	0.491293316	5268	flat	0.870162832	-0.200642699	1.149210197	0.200642699
YML040W	YML040W	0.802441855	0.917749341	0.039633174	1323	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YML041C	VPS71	138.8431445	178.5985943	0.803827751	843	flat	0.777403345	-0.36326478	1.286333545	0.36326478
YML042W	CAT2	22.58975473	31.51566283	0.58631289	2013	flat	0.716778665	-0.480400399	1.395130811	0.480400399
YML043C	RRN11	188.1422075	174.8773177	0.458851675	1524	flat	1.075852546	0.105480359	0.929495406	-0.105480359
YML045W	YML045W	46.90480565	55.22939493	0.522176309	5268	flat	0.849272488	-0.23570058	1.177478388	0.23570058
YML045W-A	YML045W-A	0.066870155	1.147186677	0.1676961	1323	flat	0.058290561	-4.100593911	17.15543629	4.100593911

YML046W	PRP39	80.3244297	95.31974097	0.642728723	1890	flat	0.842684095	-0.246936198	1.186684317	0.246936198
YML047C	PRM6	8.019872138	3.439610138	0.45753951	1059	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YML047W-A	YML047W-A	10.63564328	7.04955616	0.3538495	366	flat	1.508696865	0.593302961	0.662823675	-0.593302961
YML048W	GSF2	205.5522344	187.4619452	0.525641583	1212	flat	1.096501128	0.132907296	0.911991766	-0.132907296
YML049C	RSE1	35.70380195	38.96467558	0.284268523	4086	flat	0.916312055	-0.126089095	1.091331272	0.126089095
YML050W	AIM32	63.98895111	88.85843263	0.78753806	936	flat	0.720122438	-0.473685876	1.388652745	0.473685876
YML051W	GAL80	31.65412263	48.03817897	0.739459185	1308	flat	0.658936773	-0.601788054	1.517596287	0.601788054
YML052W	SUR7	113.3846369	64.44917467	0.885406699	909	flat	1.759287647	0.814991386	0.56841188	-0.814991386
YML053C	YML053C	192.7216692	119.4706057	0.894359867	639	flat	1.613130427	0.68986309	0.619912676	-0.68986309
YML054C	CYB2	52.00555178	90.2432849	0.868065826	1776	flat	0.576281679	-0.795153939	1.735262521	0.795153939
YML054C-A	YML054C-A	2.782050771	0.954545895	0.245715528	159	flat	2.914528034	1.543262279	0.343108726	-1.543262279
YML055W	SPC2	406.5959431	256.9114949	0.902965057	537	down	1.582630404	0.662324379	0.631859465	-0.662324379
YML056C	IMD4	396.7352776	242.7401121	0.907894737	1575	down	1.634403454	0.708764158	0.611844032	-0.708764158
YML057C-A	YML057C-A	3.629506237	0.778322038	0.34399739	390	flat	4.663244854	2.221334184	0.214442954	-2.221334184
YML057W	CMP2	48.79211225	48.24953392	0.052559084	1815	flat	1.011245255	0.016132934	0.988879794	-0.016132934
YML058W	SML1	348.8214744	479.8911306	0.871603596	315	flat	0.726876269	-0.46021829	1.375749963	0.46021829
YML058W-A	HUG1	6.410812647	5.865615356	0.091496303	207	flat	1.092948013	0.128224779	0.914956602	-0.128224779
YML059C	NTE1	41.25052661	42.55058782	0.107314775	5040	flat	0.969446692	-0.044766525	1.031516233	0.044766525
YML060W	OGG1	76.9705633	59.44770046	0.714506307	1131	flat	1.294760987	0.3726858	0.772343321	-0.3726858
YML061C	PIF1	31.4100002	27.58970618	0.332963607	2580	flat	1.138468093	0.187093859	0.878373321	-0.187093859
YML062C	MFT1	133.0414905	128.4726478	0.220878643	1179	flat	1.035562766	0.050414999	0.965658512	-0.050414999
YML063W	RPS1B	1217.373254	662.02978	0.922263303	768	down	1.838849687	0.878803555	0.54381824	-0.878803555
YML064C	TEM1	111.9651035	90.69350085	0.71860954	738	flat	1.234543848	0.303978078	0.810015782	-0.303978078
YML065W	ORC1	39.8997769	44.67483433	0.369392489	2745	flat	0.893115274	-0.1630817	1.119676294	0.1630817
YML066C	SMA2	3.347483793	4.785628745	0.183594316	1110	flat	0.699486728	-0.51563141	1.429619691	0.51563141
YML067C	ERV41	244.8567212	253.0979793	0.251667392	1059	flat	0.967438467	-0.047758191	1.033657471	0.047758191
YML068W	ITT1	123.8569003	159.1710412	0.795476294	1395	flat	0.77813715	-0.361903637	1.285120496	0.361903637
YML069W	POB3	248.5563646	167.6911016	0.882506887	1659	flat	1.482227514	0.567766911	0.67466026	-0.567766911
YML070W	DAK1	181.0216236	208.5903061	0.671784834	1755	flat	0.867833347	-0.204510071	1.152294969	0.204510071
YML071C	COG8	60.53156783	69.14648826	0.501884877	1824	flat	0.875410586	-0.191968264	1.142321118	0.191968264
YML072C	TCB3	56.70956766	36.45426827	0.780448021	4638	flat	1.555635879	0.637504414	0.64282395	-0.637504414
YML073C	RPL6A	414.8556387	211.7959375	0.93784254	531	down	1.958751634	0.969934478	0.510529249	-0.969934478
YML074C	FPR3	113.8074847	75.39522457	0.850173989	1236	flat	1.509478689	0.594050388	0.66248037	-0.594050388
YML075C	HMG1	28.06416789	26.75804768	0.133398579	3165	flat	1.048812239	0.068756426	0.953459507	-0.068756426
YML076C	WAR1	23.1861116	32.65658073	0.602414093	2835	flat	0.709998141	-0.494112848	1.408454393	0.494112848
YML077W	BET5	168.6444402	135.6469376	0.770385675	480	flat	1.24326021	0.314128279	0.804336849	-0.314128279
YML078W	CPR3	316.6521066	226.1387035	0.873068001	549	flat	1.400256134	0.485690748	0.714155058	-0.485690748
YML079W	YML079W	185.6977572	106.4413183	0.904378715	606	down	1.744602193	0.802898108	0.573196574	-0.802898108
YML080W	DUS1	122.8275416	130.4148329	0.356060606	1272	flat	0.941821868	-0.086473874	1.061771906	0.086473874
YML081C-A	ATP18	1438.116232	914.0095128	0.905168914	180	down	1.57341495	0.653899196	0.635560251	-0.653899196
YML081W	TDA9	51.41860898	52.85378565	0.113933594	3756	flat	0.972846284	-0.039716227	1.02791162	0.039716227
YML082W	YML082W	42.14764118	48.48946294	0.447020444	1950	flat	0.869212374	-0.202219383	1.150466825	0.202219383
YML083C	YML083C	1.196481024	2.414841644	0.176903001	1257	flat	0.495469766	-1.01313107	2.018286622	1.01313107
YML084W	YML084W	74.72642392	76.13198572	0.104668697	309	flat	0.981537828	-0.026884225	1.018809435	0.026884225
YML085C	TUB1	90.04902193	69.22375355	0.744164129	1344	flat	1.300839919	0.379443435	0.768734097	-0.379443435
YML086C	ALO1	100.8918367	103.2938203	0.13169494	1581	flat	0.976746105	-0.033944497	1.023807512	0.033944497
YML087C	AIM33	78.19962519	73.3810969	0.304697695	939	flat	1.065664435	0.091753223	0.938381696	-0.091753223
YML088W	UFO1	62.72630407	91.35104095	0.816449181	2007	flat	0.686651224	-0.542350609	1.452343432	0.542350609
YML089C	YML089C	5.274587316	3.290467151	0.235058721	369	flat	1.602990419	0.680765802	0.623834047	-0.680765802

YML090W	YML090W	1.600218351	8.62791096	0.600739452	387	flat	0.185469966	-2.430742513	5.391708548	2.430742513
YML091C	RPM2	101.5594225	85.57984001	0.652747571	3609	flat	1.186721341	0.24698121	0.842657805	-0.24698121
YML092C	PRE8	199.1438494	231.9926823	0.706713064	753	flat	0.858405737	-0.220268376	1.164950275	0.220268376
YML093W	UTP14	95.1207888	73.63791278	0.745614035	2700	flat	1.291736623	0.369311944	0.77415162	-0.369311944
YML094C-A	YML094C-A	22.44741264	33.97898448	0.662889662	402	flat	0.660626354	-0.598093571	1.513714967	0.598093571
YML094W	GIM5	58.44002992	55.21815188	0.238371756	492	flat	1.058348169	0.081814314	0.944868645	-0.081814314
YML095C	RAD10	84.55588434	116.2872144	0.812657677	633	flat	0.727129674	-0.459715421	1.375270512	0.459715421
YML096W	YML096W	80.62023478	83.19611514	0.178679136	1578	flat	0.969038454	-0.045374178	1.031950792	0.045374178
YML097C	VPS9	109.738362	105.2112312	0.245215311	1356	flat	1.043028969	0.060779227	0.958746142	-0.060779227
YML098W	TAF13	153.7679205	142.4375658	0.444947078	504	flat	1.079546113	0.11042487	0.926315224	-0.11042487
YML099C	ARG81	33.70733978	41.46044634	0.523169494	2643	flat	0.812999925	-0.298672875	1.230012413	0.298672875
YML099W-A	YML099W-A	4.021327933	3.219422974	0.121900826	330	flat	1.249083443	0.320869857	0.800587027	-0.320869857
YML100W	TSL1	186.8130639	266.3044078	0.87322749	3297	flat	0.701501959	-0.511480962	1.425512768	0.511480962
YML100W-A	YML100W-A	20.84619423	32.27352587	0.663128897	174	flat	0.645922429	-0.630567177	1.548173519	0.630567177
YML101C	CUE4	206.4281672	141.4831162	0.873814702	354	flat	1.459030398	0.545009941	0.68538668	-0.545009941
YML101C-A	YML101C-A	64.54357789	51.54547834	0.645099319	318	flat	1.2521676	0.324427677	0.798615138	-0.324427677
YML102W	CAC2	140.2806095	124.3738702	0.579418588	1407	flat	1.127894544	0.173632184	0.886607711	-0.173632184
YML103C	NUP188	69.23677659	61.00850972	0.48661737	4968	flat	1.134870806	0.18252807	0.881157569	-0.18252807
YML104C	MDM1	38.40463243	41.93485978	0.297593156	3384	flat	0.915816403	-0.126869691	1.091921915	0.126869691
YML105C	SEC65	196.203623	156.0194814	0.793482674	822	flat	1.257558487	0.330625499	0.795191644	-0.330625499
YML106W	URA5	443.5152693	376.4232815	0.758329709	681	flat	1.178235489	0.236627914	0.848726769	-0.236627914
YML107C	PML39	223.6818648	216.5593944	0.2453893	1005	flat	1.032889224	0.046685535	0.968158034	-0.046685535
YML108W	YML108W	987.3498187	832.8412936	0.779280847	318	flat	1.18551977	0.245519722	0.843511872	-0.245519722
YML109W	ZDS2	31.33480133	32.35029933	0.104530955	2829	flat	0.968609317	-0.046013215	1.032407992	0.046013215
YML110C	COQ5	371.8770879	295.6612935	0.82107438	924	flat	1.257780765	0.330880478	0.795051115	-0.330880478
YML111W	BUL2	47.7407162	53.77689779	0.420436422	2763	flat	0.887755117	-0.171766324	1.126436762	0.171766324
YML112W	CTK3	42.89416462	47.35447549	0.343736407	891	flat	0.905810152	-0.142719387	1.103984095	0.142719387
YML113W	DAT1	34.46391088	30.07011246	0.366949398	747	flat	1.146118457	0.196756161	0.872510162	-0.196756161
YML114C	TAF8	25.50775787	23.95891517	0.160482819	1533	flat	1.064645778	0.090373506	0.939279543	-0.090373506
YML115C	VAN1	70.36823718	67.58042468	0.201507902	1608	flat	1.041251775	0.058318955	0.960382516	-0.058318955
YML116W	ATR1	78.53068398	106.8651925	0.797216181	1629	flat	0.734857461	-0.444463655	1.360808121	0.444463655
YML116W-A	YML116W-A	67.15484931	38.56932474	0.840082645	303	flat	1.741146618	0.800037694	0.574334171	-0.800037694
YML117W	NAB6	69.71010355	84.4222256	0.654697695	3405	flat	0.825731649	-0.276255093	1.211047198	0.276255093
YML118W	NGL3	21.97160334	35.19369214	0.700231985	1518	flat	0.624305153	-0.679676722	1.601780789	0.679676722
YML119W	YML119W	77.01928825	54.26513424	0.782738872	1074	flat	1.419314433	0.505194238	0.704565512	-0.505194238
YML120C	NDI1	61.50388974	86.81167785	0.795592287	1542	flat	0.708474842	-0.497211471	1.411482725	0.497211471
YML121W	GTR1	313.5773767	322.0901808	0.208554444	933	flat	0.973570122	-0.038643201	1.02714738	0.038643201
YML122C	YML122C	3.250837279	5.178599384	0.230658257	381	flat	0.6277445	-0.671750612	1.593004798	0.671750612
YML123C	PHO84	10.48189673	24.86527122	0.773466725	1764	flat	0.421547653	-1.246232367	2.372211047	1.246232367
YML124C	TUB3	161.8629575	112.1848255	0.858815427	1338	flat	1.442823989	0.528895316	0.693085232	-0.528895316
YML125C	PGA3	163.1828323	149.6715765	0.481607945	939	flat	1.09027269	0.124689015	0.917201732	-0.124689015
YML126C	ERG13	72.4656371	56.86338545	0.688263013	1476	flat	1.274381336	0.349797043	0.78469448	-0.349797043
YML127W	RSC9	93.08015297	100.4864569	0.396955198	1746	flat	0.926295501	-0.110455588	1.079569099	0.110455588
YML128C	MSC1	321.2889762	199.7062294	0.904523706	1542	down	1.608807983	0.685992146	0.621578218	-0.685992146
YML129C	COX14	455.2218738	367.6749457	0.814752791	213	flat	1.238109583	0.308139011	0.807682949	-0.308139011
YML130C	ERO1	178.1933115	438.3650476	0.967406119	1692	up	0.406495254	-1.298689585	2.46005332	1.298689585
YML131W	YML131W	88.54978758	311.2862838	0.978331158	1098	up	0.284464148	-1.813681257	3.515381485	1.813681257
YML132W	COS3	107.0167077	95.85650358	0.520914891	1140	flat	1.116426155	-0.158887829	0.89571531	-0.158887829
YML133C	YML133C	14.43388639	10.70688098	0.354255473	4125	flat	1.34809441	0.430921535	0.74178781	-0.430921535

YML133W-A	YML133W-A	NA	NA	NA	576	flat	#jVALOR!	#jVALOR!	#iVALOR!	#iVALOR!
YML133W-B	YML133W-B	0.183166076	0.628458788	0.089459185	483	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YMR001C	CDC5	59.35540786	33.60785739	0.828592142	2118	flat	1.766116988	0.82058091	0.566213907	-0.82058091
YMR001C-A	YMR001C-A	234.385971	272.6654151	0.716064956	231	flat	0.859610196	-0.2182455	1.163317984	0.2182455
YMR002W	MIX17	508.6510253	577.1233122	0.683065101	471	flat	0.881355881	-0.182203415	1.13461545	0.182203415
YMR003W	AIM34	133.6670544	95.0804459	0.835616935	597	flat	1.405831169	0.491423347	0.711322968	-0.491423347
YMR004W	MVP1	70.49890533	77.56617572	0.424633899	1536	flat	0.908887214	-0.137826817	1.100246527	0.137826817
YMR005W	TAF4	99.08248791	104.563264	0.299862259	1167	flat	0.947584115	-0.077674082	1.055315285	0.077674082
YMR006C	PLB2	27.52931711	25.83214514	0.170523416	2121	flat	1.065700001	0.091801371	0.938350379	-0.091801371
YMR007W	YMR007W	18.80841569	33.4617191	0.732137161	381	flat	0.562087549	-0.831133236	1.779082282	0.831133236
YMR008C	PLB1	50.8199097	107.5722985	0.93183993	1995	up	0.472425619	-1.081840892	2.116735333	1.081840892
YMR009W	AD11	121.563254	211.3576733	0.907496013	540	up	0.575154202	-0.797979291	1.738664163	0.797979291
YMR010W	YMR010W	78.66351341	104.7955029	0.781723938	1218	flat	0.750638255	-0.413810279	1.332199623	0.413810279
YMR011W	HXT2	37.32465016	20.06835881	0.772836016	1626	flat	1.859875564	0.8952061	0.537670379	-0.8952061
YMR012W	CLU1	85.16950204	67.17747446	0.710214586	3834	flat	1.267828282	0.342359356	0.788750349	-0.342359356
YMR013C	SECS9	87.56183797	116.6510154	0.793185443	1560	flat	0.75063074	-0.413824722	1.332212961	0.413824722
YMR013C-A	YMR013C-A	NA	NA	NA	150	flat	#jVALOR!	#jVALOR!	#iVALOR!	#iVALOR!
YMR013W-A	YMR013W-A	NA	NA	NA	81	flat	#jVALOR!	#jVALOR!	#iVALOR!	#iVALOR!
YMR014W	BUD22	128.166939	99.13876954	0.78183993	1560	flat	1.292803407	0.370502905	0.773512813	-0.370502905
YMR015C	ERG5	79.16818393	104.936294	0.780071045	1617	flat	0.754440441	-0.406521083	1.325485679	0.406521083
YMR016C	SOK2	9.15457521	10.10531348	0.12753371	2358	flat	0.905916994	-0.142549228	1.103853892	0.142549228
YMR017W	SPO20	6.890818217	11.31304771	0.410388575	1194	flat	0.609103612	-0.715240436	1.641756806	0.715240436
YMR018W	YMR018W	47.98524387	52.65386367	0.346208496	1545	flat	0.911333766	-0.133948573	1.097292822	0.133948573
YMR019W	STB4	43.42751969	51.17672219	0.50677106	2850	flat	0.848579546	-0.23687819	1.178439905	0.23687819
YMR020W	FMS1	167.6685703	268.062367	0.900065246	1527	up	0.625483436	-0.676956416	1.598763361	-0.676956416
YMR021C	MAC1	65.32894151	81.09072904	0.678374656	1254	flat	0.805627749	-0.311814718	1.241268068	0.311814718
YMR022W	UBC7	269.3159221	282.5168336	0.33892997	498	flat	0.953273894	-0.069037307	1.049016454	0.069037307
YMR023C	MSS1	107.8305986	122.7814091	0.59368566	1581	flat	0.878232294	-0.187325509	1.138650909	0.187325509
YMR024W	MRPL3	129.1213088	125.765694	0.169290996	1173	flat	1.02668148	0.037988666	0.97401192	-0.037988666
YMR025W	CSI1	102.0185537	94.85799834	0.37846165	888	flat	1.075487102	0.104990222	0.929811244	-0.104990222
YMR026C	PEX12	62.00217451	89.0400411	0.806974047	1200	flat	0.696340363	-0.522135445	1.436079328	0.522135445
YMR027W	YMR027W	199.5409672	183.244439	0.49800638	1413	flat	1.088933276	0.122915556	0.918329912	-0.122915556
YMR028W	TAP42	62.91679834	58.17267981	0.333819052	1101	flat	1.081552346	0.113103492	0.924596949	-0.113103492
YMR029C	FAR8	144.4659502	134.0080424	0.436972597	1572	flat	1.078039404	0.108409912	0.927609878	-0.108409912
YMR030W	RSF1	50.14037711	70.45156375	0.762867914	1131	flat	0.711699988	-0.490658882	1.405086436	0.490658882
YMR030W-A	YMR030W-A	65.05983474	29.20713626	0.909286646	291	down	2.22753214	1.155446248	0.448927305	-1.155446248
YMR031C	EIS1	143.9546461	84.33820136	0.892293751	2532	flat	1.706873561	0.771356193	0.585866477	-0.771356193
YMR031W-A	YMR031W-A	1.62328834	4.177232954	0.31000435	327	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YMR032W	HOF1	36.44403464	16.15889484	0.837588807	2010	flat	2.255354404	1.173354155	0.443389295	-1.173354155
YMR033W	ARP9	180.8451892	188.4187933	0.280890242	1404	flat	0.959804413	-0.059187649	1.041878936	0.059187649
YMR034C	YMR034C	39.04848089	66.52416864	0.832811367	1305	flat	0.58698187	-0.768612152	1.703630131	0.768612152
YMR035W	IMP2	217.1968918	234.764664	0.480107293	534	flat	0.925168584	-0.112211818	1.080884087	0.112211818
YMR036C	MIH1	43.03907734	62.5322156	0.763723358	1665	flat	0.688270469	-0.538952485	1.452917197	0.538952485
YMR037C	MSN2	24.93033185	34.73193093	0.609989851	2115	flat	0.717792855	-0.478360533	1.393159591	0.478360533
YMR038C	CCS1	242.6415657	215.9220997	0.627403219	750	flat	1.123745861	0.168315801	0.88988092	-0.168315801
YMR039C	SUB1	126.9165865	102.7358526	0.734841235	879	flat	1.235368017	0.304940886	0.809475384	-0.304940886
YMR040W	YET2	217.0517996	175.9684607	0.780194287	483	flat	1.2334699	0.302722511	0.81072104	-0.302722511
YMR041C	ARA2	85.13406557	167.2813272	0.927055241	1008	up	0.508927487	-0.974467981	1.964916466	0.974467981
YMR042W	ARG80	34.45991877	32.40093426	0.193301435	534	flat	1.063547072	0.088883888	0.940249874	-0.088883888

YMR043W	MCM1	24.66040823	21.85810322	0.270008699	861	flat	1.1282044	0.174028469	0.886364208	-0.174028469
YMR044W	IOC4	113.8080862	109.0468418	0.249369291	1428	flat	1.043662378	0.061655079	0.95816427	-0.061655079
YMR045C	YMR045C	27.52487521	35.40789065	0.538183268	5268	flat	0.777365573	-0.363334878	1.286396046	0.363334878
YMR046C	YMR046C	0.468091082	0.344156003	0.03999565	1323	flat	1.360113083	0.443726605	0.735232984	-0.443726605
YMR046W-A	YMR046W-A	19.20262021	22.35413294	0.301580397	129	flat	0.859018789	-0.219238408	1.164118891	0.219238408
YMR047C	NUP116	116.3971084	89.73759651	0.776047557	3342	flat	1.297082972	0.375270769	0.770960703	-0.375270769
YMR048W	CSM3	64.35810784	58.86366354	0.37369871	954	flat	1.093341868	0.128744576	0.914627007	-0.128744576
YMR049C	ERB1	68.24976533	58.91840029	0.532187908	2424	flat	1.158377773	0.212105826	0.863276233	-0.212105826
YMR050C	YMR050C	24.95543903	32.84377163	0.544352617	5268	flat	0.759822572	-0.396265525	1.316096727	0.396265525
YMR051C	YMR051C	0.200610464	0.229437335	0.016449181	1323	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YMR052C-A	YMR052C-A	13.2945541	14.09911232	0.098107873	366	flat	0.94293554	-0.084768944	1.06051788	0.084768944
YMR052W	FAR3	116.0888717	129.5621441	0.545911266	615	flat	0.89600919	-0.158414566	1.116059982	0.158414566
YMR053C	STB2	42.41532259	66.16651917	0.804842685	2553	flat	0.64103905	-0.641515851	1.559967368	0.641515851
YMR054W	STV1	55.63664408	62.17404156	0.429882558	2673	flat	0.894853265	-0.160276962	1.11750165	0.160276962
YMR055C	BUB2	48.2210051	54.87550653	0.449768015	921	flat	0.878734578	-0.186500629	1.138000057	0.186500629
YMR056C	AAC1	238.2009819	205.4644644	0.695802523	930	flat	1.15932934	0.213290463	0.862567663	-0.213290463
YMR057C	YMR057C	7.610255013	4.079913907	0.360838046	372	flat	1.865297942	0.899406089	0.536107384	-0.899406089
YMR058W	FET3	204.4374942	93.47806513	0.956568073	1911	down	2.187010331	1.128960035	0.457245211	-1.128960035
YMR059W	SEN15	238.2039316	187.4694795	0.814694795	387	flat	1.270685444	0.345606938	0.786976828	-0.345606938
YMR060C	SAM37	177.7475987	170.4359157	0.278664637	984	flat	1.042899896	0.060600685	0.9588648	-0.060600685
YMR061W	RNA14	119.7857506	122.6718185	0.140111643	2034	flat	0.976473261	-0.034347556	1.024093582	0.034347556
YMR062C	ARG7	274.9484412	150.0559105	0.917101638	1326	down	1.83230664	0.873660962	0.545760179	-0.873660962
YMR063W	RIM9	25.31202527	31.40853723	0.465716978	720	flat	0.805896342	-0.31133381	1.240854372	0.31133381
YMR064W	AEP1	93.41258104	100.9869095	0.399652023	1557	flat	0.924996928	-0.11247952	1.081084671	0.11247952
YMR065W	KAR5	176.704847	150.9713568	0.696563723	1515	flat	1.170452798	0.227066754	0.854370208	-0.227066754
YMR066W	SOV1	60.52120905	82.49867293	0.766862404	2697	flat	0.733602213	-0.446930104	1.363136564	0.446930104
YMR067C	UBX4	52.33190947	60.53926928	0.506212846	1251	flat	0.864429156	-0.210180361	1.156832798	0.210180361
YMR068W	AVO2	49.9322733	65.87484412	0.704857184	1281	flat	0.757986967	-0.399755052	1.319283897	0.399755052
YMR069W	NAT4	14.43553617	32.54801248	0.81830506	858	flat	0.443515136	-1.172944755	2.254714484	1.172944755
YMR070W	MOT3	118.199195	89.12659178	0.793149195	1473	flat	1.32619449	0.407292367	0.754037215	-0.407292367
YMR071C	TVP18	429.5320793	380.3354028	0.673966942	504	flat	1.129350768	0.175493646	0.885464488	-0.175493646
YMR072W	ABF2	269.7349421	137.4753599	0.935174714	552	down	1.962060272	0.97236936	0.509668339	-0.97236936
YMR073C	IRC21	121.462684	129.7331832	0.394968827	606	flat	0.936249932	-0.095034386	1.068090865	0.095034386
YMR074C	YMR074C	794.0011012	628.2284967	0.836247644	438	flat	1.263873106	0.337851622	0.791218672	-0.337851622
YMR075C-A	YMR075C-A	9.185328284	25.29546622	0.800724953	366	flat	0.363121526	-1.46147564	2.753898983	1.46147564
YMR075W	RCO1	57.25744784	58.86273454	0.12169059	2055	flat	0.972728302	-0.0398912	1.028036295	0.0398912
YMR076C	PDS5	28.03601869	19.8721816	0.564100333	3834	flat	1.410817355	0.496531228	0.708808973	-0.496531228
YMR077C	VPS20	282.9420825	330.8920446	0.73722633	666	flat	0.855088803	-0.225853839	1.169469178	0.225853839
YMR078C	CTF18	25.91281576	18.88637235	0.519718718	2226	flat	1.372037746	0.456320172	0.728842922	-0.456320172
YMR079W	SEC14	220.5445665	167.6965007	0.833942294	915	flat	1.315141137	0.395217633	0.760374664	-0.395217633
YMR080C	NAM7	74.66486178	73.33603273	0.1015369	2916	flat	1.018119729	0.02590723	0.982202752	-0.02590723
YMR081C	ISF1	5.741364955	7.163317868	0.177722198	1017	flat	0.801495209	-0.319234198	1.247668094	0.319234198
YMR082C	YMR082C	2.230316333	2.975937203	0.117884588	357	flat	0.749450066	-0.416095737	1.334311711	0.416095737
YMR083W	ADH3	310.4265524	399.3454455	0.836573873	1128	flat	0.777338407	-0.363385296	1.286441003	0.363385296
YMR084W	YMR084W	24.3318372	58.09300988	0.906829056	789	up	0.41884277	-1.255519323	2.387530765	1.255519323
YMR085W	YMR085W	27.31035799	54.09607788	0.857198782	1299	flat	0.504849132	-0.986075773	1.980789776	0.986075773
YMR086C-A	YMR086C-A	22.70448868	16.1174652	0.505857619	339	flat	1.40868855	0.494352678	0.709880122	-0.494352678
YMR086W	SEG1	36.76244156	36.27175073	0.049188053	2883	flat	1.013528181	0.019386204	0.986652388	-0.019386204
YMR087W	YMR087W	132.5486126	117.690485	0.57107438	855	flat	1.126247485	0.171523884	0.887904314	-0.171523884

YMR088C	VBA1	54.68434575	74.76315416	0.753421778	1689	flat	0.731434439	-0.451199538	1.367176532	0.451199538
YMR089C	YTA12	151.1616845	139.0331921	0.471313615	2478	flat	1.087234511	0.120663156	0.91976477	-0.120663156
YMR090W	YMR090W	471.318447	496.1461621	0.360497318	684	flat	0.949958869	-0.074063045	1.052677155	0.074063045
YMR091C	NPL6	184.8519597	146.4352219	0.794599101	1308	flat	1.262346294	0.336107733	0.792175653	-0.336107733
YMR092C	AIP1	321.4668699	310.8549989	0.26138901	1848	flat	1.034137688	0.048428283	0.966989223	-0.048428283
YMR093W	UTP15	160.1281308	183.0722458	0.642032768	1542	flat	0.8746718	-0.193186313	1.143285973	0.193186313
YMR094W	CTF13	26.90399913	30.20669453	0.300572713	1437	flat	0.890663462	-0.167047684	1.122758531	0.167047684
YMR095C	SNO1	19.65982545	43.84547479	0.865006525	675	flat	0.448388928	-1.15717744	2.230206718	1.15717744
YMR096W	SNZ1	45.81794891	80.6399091	0.861606496	894	flat	0.56817957	-0.815581136	1.760006963	0.815581136
YMR097C	MTG1	115.074087	130.0516905	0.583413078	1104	flat	0.884833458	-0.176522156	1.130156179	0.176522156
YMR098C	ATP25	101.3138476	116.0372774	0.604016239	1839	flat	0.873114657	-0.195756974	1.145324949	0.195756974
YMR099C	YMR099C	288.1681798	174.8612766	0.905299406	894	down	1.647981677	0.720700202	0.606802863	-0.720700202
YMR100W	MUB1	123.5149903	133.68715	0.434094534	1863	flat	0.923910715	-0.114174656	1.082355669	0.114174656
YMR101C	SRT1	7.200982578	16.03026639	0.646607221	1032	flat	0.44921166	-1.154532718	2.22612209	1.154532718
YMR102C	YMR102C	57.03703851	72.16024017	0.680361027	2505	flat	0.790421961	-0.339305065	1.265147035	0.339305065
YMR103C	YMR103C	95.53700302	158.0444005	0.891626794	363	flat	0.604494703	-0.726198396	1.654274214	0.726198396
YMR104C	YPK2	30.79459385	66.48454397	0.907032043	2034	up	0.463184253	-1.110341888	2.158968041	1.110341888
YMR105C	PGM2	414.3566896	346.1484852	0.775605336	1710	flat	1.197048976	0.259482179	0.835387708	-0.259482179
YMR105W-A	YMR105W-A	18.14753119	25.68462724	0.543511672	195	flat	0.706552251	-0.501131841	1.415323494	0.501131841
YMR106C	YKU80	21.90666264	26.41970917	0.385718428	1890	flat	0.829178796	-0.27024487	1.206012508	0.27024487
YMR107W	SPG4	120.5011715	133.019262	0.506437582	348	flat	0.905892648	-0.142588	1.103883559	0.142588
YMR108W	ILV2	145.0483634	128.9774644	0.580527766	2064	flat	1.124602379	0.169415004	0.889203169	-0.169415004
YMR109W	MYO5	58.97947635	37.48705158	0.790720603	3660	flat	1.573329293	0.653820654	0.635594853	-0.653820654
YMR110C	HFD1	127.5306688	139.9081321	0.489944904	1599	flat	0.911531495	-0.13363559	1.097054798	0.13363559
YMR111C	YMR111C	33.1202243	38.02515009	0.390756851	1389	flat	0.871008378	-0.199241499	1.148094582	0.199241499
YMR112C	MED11	122.8739091	97.34921849	0.757670001	396	flat	1.26219718	0.335937305	0.79226924	-0.335937305
YMR113W	FOL3	86.26437429	89.71616291	0.221299116	1284	flat	0.961525454	-0.056603045	1.040014069	0.056603045
YMR114C	YMR114C	54.50406893	44.42130654	0.585000725	1107	flat	1.22698032	0.29511211	0.815008997	-0.29511211
YMR115W	MGR3	122.9522351	124.6633136	0.09583877	1506	flat	0.986274402	-0.019939005	1.013916612	0.019939005
YMR116C	ASC1	319.4107266	329.1572542	0.212200957	960	flat	0.970389449	-0.04336423	1.03051409	0.04336423
YMR117C	SPC24	150.3425437	122.4584253	0.74953603	642	flat	1.227702736	0.295961282	0.814529422	-0.295961282
YMR118C	SHH3	5.838069994	21.82857491	0.808728433	591	flat	0.267450808	-1.902654534	3.739005345	1.902654534
YMR119W	ASI1	59.59286291	77.14105379	0.714796288	1875	flat	0.772518134	-0.372359296	1.294467996	0.372359296
YMR119W-A	YMR119W-A	72.19087905	56.66184434	0.687451066	375	flat	1.274065112	0.349439009	0.784889242	-0.349439009
YMR120C	ADE17	82.65083448	284.7766147	0.977345223	1779	up	0.290230413	-1.784729389	3.445538287	1.784729389
YMR121C	RPL15B	195.9269434	194.4666086	0.065905466	615	flat	1.007509437	0.010793352	0.992546534	-0.010793352
YMR122C	YMR122C	8.257126689	4.047274596	0.42261853	375	flat	2.040169624	1.028689106	0.490155323	-1.028689106
YMR122W-A	YMR122W-A	496.4684156	600.5441275	0.791837031	255	flat	0.826697645	-0.274568319	1.209632091	0.274568319
YMR123W	PKR1	145.0511512	109.4080328	0.811990721	369	flat	1.325781549	0.40684308	0.754272075	-0.40684308
YMR124W	EPO1	28.86495559	34.99563441	0.461751486	2832	flat	0.824815897	-0.277855956	1.212391764	0.277855956
YMR125W	STO1	139.3749343	145.7277091	0.270052197	2586	flat	0.956406541	-0.064304098	1.045580469	0.064304098
YMR126C	DLT1	171.6079224	202.3637298	0.719885457	1029	flat	0.848017195	-0.237834577	1.179221372	0.237834577
YMR127C	SAS2	150.1453926	147.743431	0.1061476	1017	flat	1.016257654	0.023266218	0.984002429	-0.023266218
YMR128W	ECM16	55.32814442	47.3591773	0.505292156	3804	flat	1.168266587	0.22436952	0.855969015	-0.22436952
YMR129W	POM152	52.72007004	56.90534629	0.314578802	4014	flat	0.926451968	-0.110211914	1.079386773	0.110211914
YMR130W	YMR130W	68.90671495	90.82992492	0.756096854	909	flat	0.758634503	-0.398523107	1.318157817	0.398523107
YMR131C	RRB1	251.1235517	175.5861073	0.873814702	1536	flat	1.430201714	0.516218637	0.699202071	-0.516218637
YMR132C	JLP2	108.787503	102.6342362	0.311794983	627	flat	1.059953356	0.084000779	0.943437741	-0.084000779
YMR133W	REC114	5.636733171	7.901147958	0.253218791	1287	flat	0.713406862	-0.487203002	1.401724672	0.487203002

YMR134W	ERG29	174.7081127	162.1885775	0.453972742	714	flat	1.077191226	0.107274384	0.928340276	-0.107274384
YMR135C	GID8	85.10634965	129.5837919	0.862534435	1368	flat	0.656766934	-0.606546601	1.522610151	0.606546601
YMR135W-A	YMR135W-A	1.491054177	1.136874886	0.074097434	534	flat	1.311537615	0.391259185	0.762463835	-0.391259185
YMR136W	GAT2	78.32390353	77.82526685	0.042663477	1683	flat	1.006407131	0.00921405	0.993633659	-0.00921405
YMR137C	PSO2	45.17008234	64.95814589	0.763353632	1986	flat	0.6953721	-0.52414291	1.438078979	0.52414291
YMR138W	CIN4	215.9508952	153.0902695	0.864549804	576	flat	1.410611503	0.496320709	0.70891241	-0.496320709
YMR139W	RIM11	114.6204918	109.2273232	0.278534145	1113	flat	1.049375637	0.069531201	0.952947605	-0.069531201
YMR140W	SIP5	48.447427	75.47341146	0.821603596	1470	flat	0.641913835	-0.639548439	1.557841482	0.639548439
YMR141C	YMR141C	6.298779028	9.332307927	0.31400609	309	flat	0.674943334	-0.567161711	1.481605861	0.567161711
YMR141W-A	YMR141W-A	1.179589527	2.698183064	0.215050022	225	flat	0.437179205	-1.193703316	2.287391505	1.193703316
YMR142C	RPL13B	440.1343423	208.940551	0.954443961	600	down	2.106505129	1.074851428	0.474719946	-1.074851428
YMR143W	RPS16A	747.6877367	423.3477333	0.918196317	432	down	1.766131428	0.820592706	0.566209278	-0.820592706
YMR144W	YMR144W	49.95200548	36.72636204	0.67430767	1029	flat	1.360113083	0.443726605	0.735232984	-0.443726605
YMR145C	NDE1	141.4561238	187.213504	0.826272292	1683	flat	0.755587181	-0.404329869	1.323474015	0.404329869
YMR146C	TIF34	136.4324094	91.87778536	0.857329274	1044	flat	1.484933587	0.570398409	0.673430791	-0.570398409
YMR147W	YMR147W	32.12275051	27.55398999	0.380767	672	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YMR148W	OSW5	28.89598506	18.33496881	0.645940264	447	flat	1.576004048	0.65627124	0.634516137	-0.65627124
YMR149W	SWP1	85.6949186	91.66301349	0.356423082	861	flat	0.934890916	-0.097130056	1.06964351	0.097130056
YMR150C	IMP1	273.2818669	227.526759	0.760598811	573	flat	1.2010977	0.264353508	0.832517139	-0.264353508
YMR151W	YIM2	11.91708598	21.48382063	0.629730318	438	flat	0.554700497	-0.850219077	1.802774661	0.850219077
YMR152W	YIM1	70.98486156	63.72245863	0.449028563	1098	flat	1.113969283	0.155709452	0.897690821	-0.155709452
YMR153C-A	YMR153C-A	5.792627142	10.38920934	0.424430912	336	flat	0.557561885	-0.842796154	1.793522885	0.842796154
YMR153W	NUP53	105.3824467	111.810212	0.33861824	1428	flat	0.942511822	-0.08541738	1.060994649	0.08541738
YMR154C	RIM13	21.0640987	30.78541631	0.614941279	2184	flat	0.684223286	-0.547460892	1.461511207	0.547460892
YMR155W	YMR155W	47.78629106	76.07103711	0.829164854	1644	flat	0.628179829	-0.670750477	1.591900845	0.670750477
YMR156C	TPP1	69.46745855	108.8022564	0.858474699	717	flat	0.638474429	-0.647299253	1.566233437	0.647299253
YMR157C	AIM36	193.8719896	208.2923547	0.44446861	768	flat	0.93076863	-0.103505507	1.074380859	0.103505507
YMR158C-A	YMR158C-A	334.6444202	235.3578162	0.878077425	138	flat	1.421853863	0.507773194	0.703307158	-0.507773194
YMR158W	MRPS8	340.8333201	221.173179	0.896136001	468	flat	1.541024647	0.623889936	0.648918888	-0.623889936
YMR158W-B	YMR158W-B	0.826815089	0.945624906	0.039633174	321	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YMR159C	ATG16	152.5263941	158.1385438	0.232782369	453	flat	0.964511184	-0.052130128	1.036794613	0.052130128
YMR160W	YMR160W	32.26906478	40.49751508	0.54415688	2451	flat	0.796815921	-0.327681621	1.254995004	0.327681621
YMR161W	HLJ1	152.8223765	288.0310421	0.925728578	675	up	0.530576064	-0.914368503	1.884743901	0.914368503
YMR162C	DNF3	34.13477237	37.76764239	0.312650428	4971	flat	0.903809987	-0.145908596	1.106427252	0.145908596
YMR163C	INP2	42.93973207	57.18351854	0.685305205	2118	flat	0.750910982	-0.413286203	1.331715774	0.413286203
YMR164C	MSS11	36.91073948	34.86041854	0.184341018	2277	flat	1.058815156	0.082450751	0.944451914	-0.082450751
YMR165C	PAH1	44.59340477	50.59093245	0.424097434	2589	flat	0.881450541	-0.182048474	1.134493603	0.182048474
YMR166C	YMR166C	40.75817471	66.63195981	0.822060316	1107	flat	0.611691069	-0.709124883	1.634812164	0.709124883
YMR167W	MLH1	26.11948238	38.50167067	0.675300855	2310	flat	0.678398675	-0.559794742	1.474059482	0.559794742
YMR168C	CEP3	43.96827958	52.16930308	0.522386545	1827	flat	0.842799826	-0.246738078	1.186521364	0.246738078
YMR169C	ALD3	140.9341925	238.6854249	0.905719878	1521	up	0.590459985	-0.760088801	1.693594866	0.760088801
YMR170C	ALD2	89.69068297	119.5422822	0.795744527	1521	flat	0.750284178	-0.414490959	1.332828319	0.414490959
YMR171C	EAR1	71.34268782	74.73869149	0.232630129	1653	flat	0.954561639	-0.067089735	1.047601286	0.067089735
YMR172C-A	YMR172C-A	0.691165738	1.976208299	0.190727853	384	flat	0.349743364	-1.51563141	2.859239382	1.51563141
YMR172W	HOT1	51.11554617	50.94225837	0.014977526	2160	flat	1.003401651	0.004899218	0.996609881	-0.004899218
YMR173W	DDR48	98.39035614	115.8544091	0.65907641	1293	flat	0.849258625	-0.23572413	1.177497609	0.23572413
YMR173W-A	YMR173W-A	81.89934881	77.87161247	0.250601711	1185	flat	1.051722781	0.072754481	0.950820899	-0.072754481
YMR174C	PAI3	159.4155412	119.5119129	0.822712774	207	flat	1.33388829	0.41563785	0.749687967	-0.41563785
YMR175W	SIP18	186.522594	134.065971	0.852972307	240	flat	1.391274703	0.476407304	0.718765315	-0.476407304

YMR175W-A	YMR175W-A	43.10038656	46.69932226	0.296520226	195	flat	0.922933877	-0.115700804	1.083501239	0.115700804
YMR176W	ECM5	30.97257912	49.26524937	0.765927215	4236	flat	0.628690193	-0.669578837	1.590608557	0.669578837
YMR177W	MMT1	59.78741438	63.36242028	0.251341163	1533	flat	0.943578451	-0.083785624	1.059795292	0.083785624
YMR178W	YMR178W	295.5407942	253.8744974	0.720566913	825	flat	1.164121632	0.219241805	0.859016766	-0.219241805
YMR179W	SPT21	65.35143559	37.72657149	0.834565753	2277	flat	1.732238923	0.792637931	0.577287571	-0.792637931
YMR180C	CTL1	90.85779145	113.6325928	0.736436132	963	flat	0.799575097	-0.322694555	1.250664263	0.322694555
YMR181C	YMR181C	36.71948044	50.26453933	0.680911991	465	flat	0.730524559	-0.45299532	1.368879372	0.45299532
YMR182C	RGM1	7.372434544	3.818183581	0.370073945	636	flat	1.930874823	0.949254638	0.517899963	-0.949254638
YMR182W-A	YMR182W-A	30.5066257	31.40126841	0.083485573	87	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YMR183C	SSO2	117.7596977	84.26124897	0.822473539	888	flat	1.397554619	0.482904667	0.715535541	-0.482904667
YMR184W	ADD37	216.6532523	201.6010524	0.447672901	597	flat	1.07466633	0.103884724	0.930524007	-0.103884724
YMR185W	RTP1	82.73343042	76.19550824	0.392975207	2946	flat	1.085804562	0.11876445	0.920976053	-0.11876445
YMR186W	HSC82	1035.774841	2178.204778	0.95553864	2118	up	0.475517661	-1.072429171	1.202971315	1.072429171
YMR187C	YMR187C	35.70169691	38.29452525	0.237799043	1296	flat	0.932292454	-0.101145506	1.072624793	0.101145506
YMR188C	MRPS17	408.7674212	368.1659454	0.614803538	714	flat	1.110280368	0.150924032	0.900673406	-0.150924032
YMR189W	GCV2	93.91128215	271.18695	0.971313615	3105	up	0.346297203	-1.529917361	2.887692977	1.529917361
YMR190C	SGS1	25.57949665	30.11697774	0.382572133	4344	flat	0.8493381	-0.235589127	1.177387427	0.235589127
YMR191W	SPG5	107.5508098	139.4632389	0.790988836	1122	flat	0.771176768	-0.374866505	1.296719561	0.374866505
YMR192W	GYL1	47.15904038	36.83805761	0.604262723	2163	flat	1.280171742	0.356337369	0.781145191	-0.356337369
YMR193C-A	YMR193C-A	0.685807865	1.568711084	0.14291721	387	flat	0.437179205	-1.193703316	2.287391505	1.193703316
YMR193W	MRPL24	284.1945424	234.5934744	0.779019864	777	flat	1.211434134	0.276715967	0.825467908	-0.276715967
YMR194C-A	YMR194C-A	14.94146734	34.40183406	0.831868929	225	flat	0.434321825	-1.203163645	2.302440134	1.203163645
YMR194C-B	CMC4	48.61821699	72.46809242	0.79876758	222	flat	0.670891359	-0.575848933	1.490554301	0.575848933
YMR194W	RPL36A	767.901103	454.8174917	0.913708859	303	down	1.688371967	0.755632781	0.592286546	-0.755632781
YMR195W	ICY1	371.3863901	306.3122863	0.789408438	384	flat	1.212443662	0.277917712	0.824780591	-0.277917712
YMR196W	YMR196W	110.4037305	91.05438714	0.6969262	3267	flat	1.212503142	0.277988486	0.824740131	-0.277988486
YMR197C	VTI1	236.1884535	195.1696064	0.76892127	654	flat	1.210170261	0.275210037	0.826330007	-0.275210037
YMR198W	CIK1	68.94155597	58.5834495	0.564238075	1785	flat	1.176809433	0.234880716	0.849755255	-0.234880716
YMR199W	CLN1	136.0733074	54.01298821	0.956568073	1641	down	2.519270123	1.33300582	0.396940364	-1.33300582
YMR200W	ROT1	244.0648759	243.5057721	0.023198492	771	flat	1.00229606	0.003308717	0.9977092	-0.003308717
YMR201C	RAD14	84.98118098	93.43002847	0.453320284	1116	flat	0.909570321	-0.136742915	1.099420217	0.136742915
YMR202W	ERG2	190.1625269	142.9250558	0.831027983	669	flat	1.330505179	0.411974126	0.751594219	-0.411974126
YMR203W	TOM40	106.5582807	93.88008083	0.560069595	1164	flat	1.135046751	0.182751721	0.881020979	-0.182751721
YMR204C	INP1	50.71394404	42.77998088	0.515180513	1263	flat	1.185459717	0.24544664	0.843554602	-0.24544664
YMR205C	PFK2	111.0165768	149.0324552	0.81938524	2880	flat	0.74491544	-0.42485143	1.342434251	0.42485143
YMR206W	YMR206W	4.695818181	2.738899527	0.234196027	942	flat	1.714428255	0.777727532	0.583284834	-0.777727532
YMR207C	HFA1	26.17144843	28.89209089	0.25677106	6372	flat	0.905834352	-0.142680843	1.1039546	0.142680843
YMR208W	ERG12	87.93786789	92.40821219	0.261215021	1332	flat	0.95162395	-0.071536514	1.050835259	0.071536514
YMR209C	YMR209C	45.65114491	51.69553796	0.425358852	1374	flat	0.883077084	-0.179388719	1.132403975	0.179388719
YMR210W	YMR210W	127.0680052	146.3764312	0.638038278	1350	flat	0.868090608	-0.204082461	1.151953484	0.204082461
YMR211W	DML1	82.45975108	94.16715577	0.557177033	1428	flat	0.875674224	-0.191533849	1.141977202	0.191533849
YMR212C	EFR3	113.0251651	114.8795375	0.098441351	2349	flat	0.983858114	-0.023477822	1.016406722	0.023477822
YMR213W	CEF1	17.96329229	23.02700648	0.424206177	1773	flat	0.780096723	-0.358275083	1.281892323	0.358275083
YMR214W	SCJ1	154.9381482	155.9217892	0.058119472	1134	flat	0.993691446	-0.009130148	1.006348604	0.009130148
YMR215W	GAS3	30.78166956	40.47274596	0.5946136	1575	flat	0.76055303	-0.394879251	1.314832708	0.394879251
YMR216C	SKY1	131.0169929	155.7901123	0.708358707	2229	flat	0.840984007	-0.24984973	1.189083254	0.24984973
YMR217W	GUA1	221.5654853	176.7797221	0.800043497	1578	flat	1.253342197	0.325780364	0.797866698	-0.325780364
YMR218C	TRS130	70.39572132	74.99199868	0.298811077	3309	flat	0.938709763	-0.091248931	1.065291999	0.091248931
YMR219W	ESC1	35.48011899	33.02590708	0.229447586	4977	flat	1.074311719	0.103412661	0.930828532	-0.103412661

YMR220W	ERG8	130.7465383	138.3415763	0.331093229	1356	flat	0.945099382	-0.081462051	1.058089783	0.081462051
YMR221C	YMR221C	44.67257367	49.78949193	0.382731622	1515	flat	0.897228952	-0.15645192	1.114542724	0.15645192
YMR222C	FSH2	126.1212909	98.47163637	0.772604031	672	flat	1.280788008	0.357031705	0.780769334	-0.357031705
YMR223W	UBP8	83.28351904	115.651729	0.816507177	1416	flat	0.720123423	-0.473683901	1.388650844	0.473683901
YMR224C	MRE11	22.42581821	25.11295925	0.261505002	2079	flat	0.892997834	-0.163271419	1.119823545	0.163271419
YMR225C	MRPL44	211.7899378	115.4904114	0.91323764	297	down	1.833831356	0.874860971	0.545306414	-0.874860971
YMR226C	YMR226C	289.8357103	169.5173781	0.90938089	804	down	1.709769898	0.773802179	0.584874024	-0.773802179
YMR227C	TAF7	41.26567423	35.95294692	0.40830796	1773	flat	1.147768897	0.198832185	0.871255531	-0.198832185
YMR228W	MTF1	158.6582405	177.6599704	0.584051037	1026	flat	0.893044393	-0.163196201	1.119765162	0.163196201
YMR229C	RRP5	87.10552721	72.11401122	0.653059301	5190	flat	1.207886314	0.272484675	0.827892483	-0.272484675
YMR230W	RPS10B	1046.885705	761.2503514	0.875206612	318	flat	1.375218682	0.459661049	0.727157079	-0.459661049
YMR230W-A	YMR230W-A	31.3621025	12.04546011	0.834116282	189	flat	2.603645044	1.380532779	0.384076932	-1.380532779
YMR231W	PEP5	33.35489803	42.633912	0.576808757	3090	flat	0.782356028	-0.354102809	1.278190446	0.354102809
YMR232W	FUS2	19.0508928	24.69852307	0.453624764	2034	flat	0.771337329	-0.374566164	1.296449637	0.374566164
YMR233W	TRI1	145.1102975	120.7942087	0.713273887	681	flat	1.201301776	0.264598613	0.832430302	-0.264598613
YMR234W	RNH1	61.00742396	67.55121639	0.42277077	1047	flat	0.903128429	-0.146996934	1.107262231	0.146996934
YMR235C	RNA1	190.9605104	149.6648418	0.803037553	1224	flat	1.275920972	0.351538974	0.7837476	-0.351538974
YMR236W	TAF9	253.2757893	188.5953115	0.850500217	474	flat	1.342959097	0.425415365	0.744624316	-0.425415365
YMR237W	BCH1	75.53440523	80.87571132	0.341402059	2175	flat	0.933956611	-0.098572567	1.070713552	0.098572567
YMR238W	DFG5	119.757891	117.9352891	0.097912136	1377	flat	1.015454253	0.022125247	0.984780946	-0.022125247
YMR239C	RNT1	207.9901237	159.4900582	0.823705959	1416	flat	1.3040946	0.383048528	0.766815536	-0.383048528
YMR240C	CUS1	105.2048096	105.9283826	0.051623894	1311	flat	0.993169225	-0.009888537	1.006877755	0.009888537
YMR241W	YHM2	164.5808245	167.5121985	0.140735102	945	flat	0.982500534	-0.025469904	1.017811152	0.025469904
YMR242C	RPL20A	248.5320131	146.5090009	0.906415833	519	down	1.696360029	0.762442395	0.589497502	-0.762442395
YMR242W-A	YMR242W-A	1.965982545	3.37272883	0.183985791	90	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YMR243C	ZRC1	185.1263248	192.5424652	0.279672321	1329	flat	0.961483092	-0.056666608	1.040059892	0.056666608
YMR244C-A	COA6	233.6710682	85.76367596	0.967652603	315	down	2.724592499	1.446040471	0.367027363	-1.446040471
YMR244W	YMR244W	5.798544023	15.91624841	0.689654922	1068	flat	0.364316004	-1.456737721	2.744869806	1.456737721
YMR245W	YMR245W	5.413575124	6.843217915	0.179222851	621	flat	0.791086181	-0.338093225	1.264084779	0.338093225
YMR246W	FAA4	75.8246937	36.68752511	0.905371901	2085	down	2.066770475	1.047378179	0.483846664	-1.047378179
YMR247C	RKR1	58.67759803	73.96051224	0.679498333	4689	flat	0.793363867	-0.333945401	1.260455689	0.333945401
YMR247W-A	YMR247W-A	0.307184773	2.107955519	0.246049007	144	flat	0.145726402	-2.778665816	6.862174516	2.778665816
YMR250W	GAD1	222.3808072	142.7078692	0.891416558	1758	flat	1.558293936	0.63996739	0.641727454	-0.63996739
YMR251W	GTO3	8.678179082	7.306047465	0.171937074	1101	flat	1.187807652	0.248301231	0.841887151	-0.248301231
YMR251W-A	HOR7	10035.8494	9043.972357	0.638248514	180	flat	1.109672719	0.150134239	0.901166608	-0.150134239
YMR252C	YMR252C	51.55243118	50.2161848	0.109293896	405	flat	1.026609875	0.037888043	0.974079857	-0.037888043
YMR253C	YMR253C	43.20424292	54.85763759	0.627729448	1245	flat	0.787570242	-0.344519494	1.269728015	0.344519494
YMR254C	YMR254C	2.004156963	3.929392811	0.24184428	309	flat	0.510042406	-0.971310894	1.96062129	0.971310894
YMR255W	GFD1	214.3857156	197.010192	0.502624329	567	flat	1.088196065	0.121938516	0.918952046	-0.121938516
YMR256C	COX7	480.5377008	473.5643021	0.127221981	183	flat	1.014725347	0.02108929	0.985488342	-0.02108929
YMR257C	PET111	46.79332986	54.50683483	0.498180368	2403	flat	0.858485546	-0.22013425	1.164841976	0.22013425
YMR258C	ROY1	179.7064189	221.1755205	0.780781499	1602	flat	0.812505916	-0.299549777	1.230760269	0.299549777
YMR259C	TRM732	53.00266805	63.05175324	0.56722488	4263	flat	0.840621637	-0.250471503	1.189595837	0.250471503
YMR260C	TIF11	1215.589987	701.7028033	0.91584747	462	down	1.732343067	0.792724665	0.577252866	-0.792724665
YMR261C	TPS3	60.65661786	79.36302673	0.730527766	3165	flat	0.764293152	-0.387801991	1.308398482	0.387801991
YMR262W	YMR262W	78.60799635	84.74786773	0.371770335	942	flat	0.927551317	-0.108500993	1.078107466	0.108500993
YMR263W	SAP30	287.7439304	142.0052411	0.944642598	606	down	2.026290919	1.01884132	0.493512551	-1.01884132
YMR264W	CUF1	532.2608626	482.1018268	0.597919385	612	flat	1.10404241	0.142795591	0.905762307	-0.142795591
YMR265C	YMR265C	69.89450931	80.04755761	0.542685225	1386	flat	0.873162297	-0.195678258	1.145262459	0.195678258

YMR266W	RSN1	41.88531995	51.17426605	0.563498623	2862	flat	0.818484039	-0.288973812	1.221770924	0.288973812
YMR267W	PPA2	175.8953837	149.0073766	0.708670436	933	flat	1.18044749	0.239333867	0.847136369	-0.239333867
YMR268C	PRP24	42.14713142	42.86018322	0.062780919	1335	flat	0.983363305	-0.024203574	1.016918157	0.024203574
YMR269W	TMA23	137.4333081	87.34094941	0.874285921	636	flat	1.573526611	0.654001577	0.63551515	-0.654001577
YMR270C	RRN9	162.9992905	166.9777224	0.152588082	1098	flat	0.976173876	-0.034789951	1.024407664	0.034789951
YMR271C	URA10	107.3529942	123.3708703	0.615666232	684	flat	0.870164845	-0.200639363	1.149207539	0.200639363
YMR272C	SCS7	86.09471613	93.16615871	0.390640858	1155	flat	0.924098592	-0.113881313	1.082135616	0.113881313
YMR272W-A	YMR272W-A	2.328137224	0.665670164	0.230506017	114	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YMR272W-B	YMR272W-B	1.638318788	0.70265184	0.149804263	108	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YMR273C	ZDS1	50.80219087	53.6285976	0.222683776	2748	flat	0.94729665	-0.078111812	1.055635528	0.078111812
YMR274C	RCE1	16.79795213	17.9309634	0.129295346	948	flat	0.936812582	-0.094167642	1.067449369	0.094167642
YMR275C	BUL1	42.89142062	60.42949659	0.738661737	2931	flat	0.709776236	-0.494563823	1.408894733	0.494563823
YMR276W	DSK2	69.78186707	67.22912681	0.177606206	1122	flat	1.037970749	0.053765787	0.963418287	-0.053765787
YMR277W	FCP1	40.8350399	33.19814257	0.519588227	2199	flat	1.230039898	0.298705112	0.812981759	-0.298705112
YMR278W	PRM15	113.0361072	150.7983331	0.818899522	1869	flat	0.749584593	-0.415836795	1.334072244	0.415836795
YMR279C	YMR279C	5.778026334	4.021090749	0.212563433	1623	flat	1.4369301	0.522989884	0.695928076	-0.522989884
YMR280C	CAT8	14.64204573	19.12153793	0.396179498	4302	flat	0.765735779	-0.385081427	1.305933493	0.385081427
YMR281W	GPI12	49.50408507	69.66620206	0.761606496	915	flat	0.710589692	-0.492911334	1.407281883	0.492911334
YMR282C	AEP2	136.8912631	141.4978747	0.221342613	1743	flat	0.967443952	-0.047750013	1.033651612	0.047750013
YMR283C	RIT1	64.7167795	88.48491881	0.778012179	1542	flat	0.73138768	-0.451291769	1.367263938	0.451291769
YMR284W	YKU70	117.5677124	151.9405948	0.797477164	1809	flat	0.773774201	-0.370015467	1.292366686	0.370015467
YMR285C	NGL2	105.0429046	131.6736866	0.758605191	1548	flat	0.797751679	-0.325988354	1.253522902	0.325988354
YMR286W	MRPL33	418.6186971	294.8230201	0.881267218	261	flat	1.419898273	0.505787573	0.704275806	-0.505787573
YMR287C	DSS1	50.83179611	52.15560046	0.108322459	2910	flat	0.974618175	-0.037090969	1.02604284	0.037090969
YMR288W	HS1155	42.14119992	47.52008367	0.397107438	2916	flat	0.886808201	-0.173305982	1.127639549	0.173305982
YMR289W	ABZ2	104.1184356	106.4433219	0.130216036	1125	flat	0.978158458	-0.0318599	1.022329247	0.0318599
YMR290C	HAS1	106.5943303	100.9819007	0.302174859	1518	flat	1.055578569	0.078033966	0.947347767	-0.078033966
YMR290W-A	YMR290W-A	7.118212663	7.850317104	0.108568943	348	flat	0.906742055	-0.141235896	1.102849476	0.141235896
YMR291W	TDA1	45.61615377	89.80536901	0.901464405	1761	up	0.507944617	-0.977256891	1.96871857	0.977256891
YMR292W	GOT1	322.265556	297.722178	0.499347542	417	flat	1.082437184	0.114283305	0.923841138	-0.114283305
YMR293C	HER2	73.50237967	85.8413886	0.591054081	1395	flat	0.856258046	-0.223882455	1.167872237	0.223882455
YMR294W	JNM1	120.5609884	111.3271054	0.423292736	1122	flat	1.082943709	0.114958255	0.92340903	-0.114958255
YMR294W-A	YMR294W-A	31.45572072	11.8045509	0.837443816	360	flat	2.664711345	1.413979262	0.375275169	-1.413979262
YMR295C	YMR295C	352.3874774	280.2942065	0.819602726	594	flat	1.257205712	0.330220732	0.795414776	-0.330220732
YMR296C	LCB1	31.23063506	28.32730207	0.267261128	1677	flat	1.102492394	0.140768702	0.907035736	-0.140768702
YMR297W	PRC1	285.1043543	224.9540523	0.818515297	1599	flat	1.267389279	0.341859717	0.789023559	-0.341859717
YMR298W	LIP1	329.6601195	265.0160766	0.80723503	453	flat	1.243924986	0.314899488	0.803906997	-0.314899488
YMR299C	DYN3	168.7416009	121.224279	0.847730897	939	flat	1.391978589	0.47713702	0.718401855	-0.47713702
YMR300C	ADE4	589.1022452	943.6050433	0.907793243	1533	up	0.624310191	-0.679665078	1.601767861	0.679665078
YMR301C	ATM1	38.45188726	32.65348172	0.439198202	2073	flat	1.177573883	0.23581758	0.849203617	-0.23581758
YMR302C	YME2	103.4046753	120.6216239	0.64276497	2553	flat	0.857264825	-0.222187146	1.166500678	0.222187146
YMR303C	ADH2	91.51113594	167.5734037	0.907633754	1047	up	0.546095824	-0.872773971	1.831180457	0.872773971
YMR304C-A	YMR304C-A	203.4035787	160.42082	0.801783384	351	flat	1.267937533	0.34248367	0.788682387	-0.34248367
YMR304W	UBP15	60.34496382	82.44143825	0.767558359	3693	flat	0.731973691	-0.4501363	1.366169321	0.4501363
YMR305C	SCW10	147.0706173	116.488865	0.776091054	1170	flat	1.262529404	0.336316989	0.79206076	-0.336316989
YMR306C-A	YMR306C-A	28.80920576	27.24127132	0.155212411	390	flat	1.057557315	0.080735854	0.945575229	-0.080735854
YMR306W	FKS3	4.788367341	8.639548934	0.3784689	5358	flat	0.554238118	-0.851422159	1.804278644	0.851422159
YMR307C-A	YMR307C-A	0.45368828	0.389161019	0.026047557	195	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YMR307W	GAS1	402.2716249	355.4916414	0.672227055	1680	flat	1.131592358	0.178354339	0.883710457	-0.178354339

YMR308C	PSE1	98.77709549	107.9118513	0.452232855	3270	flat	0.915349837	-0.127604864	1.092478482	0.127604864
YMR309C	NIP1	183.6851588	177.2860597	0.240184138	2439	flat	1.036094768	0.051155967	0.965162677	-0.051155967
YMR310C	YMR310C	21.60726099	24.34092033	0.265644483	954	flat	0.887692852	-0.171867514	1.126515773	0.171867514
YMR311C	GLC8	260.2789935	200.3840846	0.83368856	690	flat	1.298900529	0.377290952	0.769881895	-0.377290952
YMR312W	ELP6	44.88036795	43.02075642	0.162643178	822	flat	1.043225914	0.061051612	0.958565145	-0.061051612
YMR313C	TGL3	120.8941677	172.6228706	0.857467015	1929	flat	0.70033691	-0.513878972	1.427884189	0.513878972
YMR314W	PRE5	614.1394835	443.6932416	0.875467595	705	flat	1.384153343	0.46900378	0.722463306	-0.46900378
YMR315W	YMR315W	144.3312043	141.7991564	0.134210526	1050	flat	1.017856579	0.025534294	0.982456684	-0.025534294
YMR315W-A	YMR315W-A	0.409579697	5.621214716	0.514129332	108	flat	0.072863201	-3.778665816	13.72434903	3.778665816
YMR316C-A	YMR316C-A	3.969772447	17.51224585	0.78045527	312	flat	0.226685514	-2.141235896	4.411397903	2.141235896
YMR316C-B	YMR316C-B	50.39023222	44.20566913	0.434725243	309	flat	1.139904298	0.188912706	0.877266628	-0.188912706
YMR316W	DIA1	164.8625125	216.7753901	0.830245034	1011	flat	0.760522274	-0.394937594	1.314885881	0.394937594
YMR317W	YMR317W	1.369812553	1.507529976	0.042576483	3423	flat	0.908646975	-0.138208203	1.100537422	0.138208203
YMR318C	ADH6	597.3101539	434.5727111	0.87322749	1083	flat	1.374461721	0.458866728	0.727557548	-0.458866728
YMR319C	FET4	113.6394793	130.8228452	0.624525156	1659	flat	0.868651642	-0.20315037	1.151209474	0.20315037
YMR320W	YMR320W	32.95911914	42.15911037	0.576410033	306	flat	0.781779284	-0.355166738	1.279133408	0.355166738
YMR321C	YMR321C	157.4640737	86.86367646	0.905219661	318	down	1.812772382	0.858197786	0.551641238	-0.858197786
YMR322C	SNO4	21.55972455	45.48932581	0.855589387	714	flat	0.473951288	-1.077189307	2.109921475	1.077189307
YMR323W	ERR3	8.483349338	11.66594561	0.319551979	1314	flat	0.727189173	-0.459597376	1.375157988	0.459597376
YMR324C	YMR324C	0.728141683	0.312289706	0.086124402	243	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YMR325W	PAU19	1.415507432	2.833092217	0.196164999	375	flat	0.499633377	-1.001058238	2.001467567	1.001058238
YMR326C	YMR326C	0.858924413	1.473522304	0.103929245	309	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YNL001W	DOM34	256.4921413	225.5022183	0.665166014	1161	flat	1.137426245	0.185772998	0.879177885	-0.185772998
YNL002C	RLP7	412.399837	378.8837944	0.539140206	969	flat	1.088459953	0.122288328	0.918729254	-0.122288328
YNL003C	PET8	84.43377667	70.63413078	0.633413078	855	flat	1.195102953	0.836747995	0.257134905	-0.257134905
YNL004W	HRB1	309.0913436	245.9497639	0.81584747	1365	flat	1.256725515	0.329669581	0.795718706	-0.329669581
YNL005C	MRP7	226.6429071	231.0591243	0.156191098	1116	flat	0.980887069	-0.027841049	1.019485353	0.027841049
YNL006W	LST8	225.2472765	760.5281621	0.978802378	912	up	0.29617217	-1.755492009	3.376414463	1.755492009
YNL007C	SIS1	542.3438534	1406.370595	0.969646223	1059	up	0.38563367	-1.374697077	2.59313457	1.374697077
YNL008C	ASi3	113.9514846	121.7320959	0.388480499	2031	flat	0.936084142	-0.095289879	1.068280035	0.095289879
YNL009W	IDP3	57.08821048	98.53815821	0.872567783	1263	flat	0.579351304	-0.787489667	1.726068436	0.787489667
YNL010W	YNL010W	504.3720095	419.5702538	0.788589242	726	flat	1.202115748	0.265575816	0.83186665	-0.265575816
YNL011C	YNL011C	148.1113816	160.071984	0.450028998	1335	flat	0.925279852	-0.112038319	1.080754107	0.112038319
YNL012W	SPO1	18.10445951	37.06266095	0.811128027	1896	flat	0.488482452	-1.033621357	2.047156444	1.033621357
YNL013C	YNL013C	0.468091082	1.204546011	0.12707699	378	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YNL014W	HEF3	21.89859983	29.38631196	0.533659562	3135	flat	0.745197283	-0.42430568	1.341926524	0.42430568
YNL015W	PBI2	681.368161	274.2561075	0.968283312	228	down	2.484422926	1.312910786	0.402507958	-1.312910786
YNL016W	PUB1	110.1643083	82.79529253	0.786697115	1362	flat	1.330562462	0.412036238	0.751561861	-0.412036238
YNL017C	YNL017C	2.348740209	4.924781035	0.307351022	339	flat	0.476922769	-1.068172434	2.096775546	1.068172434
YNL018C	YNL018C	1.058359282	1.237951039	0.052486588	1839	flat	0.854928223	-0.226124793	1.169688838	0.226124793
YNL019C	YNL019C	2.690291904	3.727752917	0.145548789	855	flat	0.721692656	-0.470543521	1.385631393	0.470543521
YNL020C	ARK1	17.26003455	27.78938543	0.647549659	1917	flat	0.621101701	-0.687098577	1.610042283	0.687098577
YNL021W	HDA1	89.34514734	100.3947358	0.530013049	2121	flat	0.889938567	-0.168222345	1.123673068	0.168222345
YNL022C	RCM1	98.97981367	99.63631706	0.049601276	1473	flat	0.993411003	-0.009537369	1.0066327	0.009537369
YNL023C	FAP1	60.75008175	74.47236639	0.645773525	2898	flat	0.815739914	-0.293818851	1.225880925	0.293818851
YNL024C	YNL024C	273.526276	396.9442392	0.886733362	741	flat	0.689079848	-0.537256928	1.45121063	0.537256928
YNL024C-A	KSH1	500.517611	618.1796129	0.812867914	219	flat	0.80966373	-0.304605244	1.235080643	0.304605244
YNL025C	SSN8	46.41903231	71.98277734	0.813672611	972	flat	0.644863036	-0.63293532	1.550716888	0.63293532
YNL026W	SAM50	67.97840676	70.51437182	0.177301725	1455	flat	0.964036196	-0.05284078	1.03730545	0.05284078

YNL027W	CRZ1	73.09459403	87.32337677	0.639024213	2037	flat	0.83705643	-0.256603209	1.194662587	0.256603209
YNL028W	YNL028W	2.225640617	0.238636474	0.265332753	318	flat	9.326489709	3.221334184	0.107221477	-3.221334184
YNL029C	KTR5	136.3970873	177.7937549	0.81431057	1569	flat	0.76716467	-0.382391814	1.303501112	0.382391814
YNL030W	HHF2	1625.054707	1255.530737	0.85046397	312	flat	1.294316944	0.372190939	0.772608289	-0.372190939
YNL031C	HHT2	841.2109255	884.0488487	0.371335363	411	flat	0.951543488	-0.071658501	1.050924117	0.071658501
YNL032W	SIW14	369.9811832	305.1601989	0.789263448	846	flat	1.212416247	0.277885091	0.82479924	-0.277885091
YNL033W	YNL033W	2.690291904	6.567945616	0.412273452	855	flat	0.409609345	-1.287679464	2.441350549	1.287679464
YNL034W	YNL034W	1.972396844	1.650601385	0.070255183	1839	flat	1.194956494	0.256958093	0.836850551	-0.256958093
YNL035C	YNL035C	97.54298012	79.64828852	0.690524866	1170	flat	1.224671389	0.292394689	0.816545572	-0.292394689
YNL036W	NCE103	100.2916771	96.16834906	0.237248079	666	flat	1.042876145	0.060567829	0.958886638	-0.060567829
YNL037C	IDH1	254.052869	299.201221	0.743642163	1083	flat	0.849103718	-0.235987306	1.177712427	0.235987306
YNL038W	GPI15	718.267449	473.1351987	0.898745832	690	flat	1.51810191	0.602268642	0.658717306	-0.602268642
YNL039W	BDP1	86.8832118	80.77543836	0.371038133	1785	flat	1.075614241	0.105160761	0.929701339	-0.105160761
YNL040W	YNL040W	82.01631777	71.40295717	0.550971437	1371	flat	1.148640351	0.199927148	0.870594525	-0.199927148
YNL041C	COG6	114.8695516	102.0852744	0.550949688	2520	flat	1.125231354	0.170221659	0.888706128	-0.170221659
YNL042W	BOP3	32.83240371	51.61039708	0.768914021	1191	flat	0.636158712	-0.652541355	1.571934773	0.652541355
YNL042W-B	YNL042W-B	5.143558984	5.294399907	0.025431347	258	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YNL043C	YNL043C	19.29235208	14.18437358	0.434029288	321	flat	1.360113083	0.443726605	0.735232984	-0.443726605
YNL044W	YIP3	218.923819	244.9515769	0.609736117	531	flat	0.893743252	-0.16206765	1.118889566	0.16206765
YNL045W	LAP2	123.4005115	107.1293108	0.617768595	2016	flat	1.151883743	0.203995116	0.868143166	-0.203995116
YNL046W	YNL046W	92.56027647	50.00606617	0.880875743	519	flat	1.850980962	0.888290057	0.540254071	-0.888290057
YNL047C	SLM2	57.63291296	65.14448835	0.46937799	1971	flat	0.884693616	-0.176750182	1.130334821	0.176750182
YNL048W	ALG11	133.2678332	161.2643566	0.739857909	1647	flat	0.826393606	-0.275099003	1.210077126	0.275099003
YNL049C	SFB2	54.13737567	58.32090388	0.314230825	2631	flat	0.928267089	-0.107388125	1.077276155	0.107388125
YNL050C	YNL050C	91.18967008	72.80664066	0.706684066	813	flat	1.25249974	0.324810304	0.79840336	-0.324810304
YNL051W	COG5	97.4475259	96.54853692	0.056473829	1212	flat	1.009311265	0.01337116	0.990774635	-0.01337116
YNL052W	COX5A	463.2186795	302.8885696	0.897825141	462	flat	1.529336945	0.612906297	0.653878142	-0.612906297
YNL053W	MSG5	33.58219164	35.31040591	0.159830361	1470	flat	0.951056516	-0.072397019	1.051462224	0.072397019
YNL054W	VAC7	25.51899298	32.75827959	0.516122952	3498	flat	0.77900895	-0.360288191	1.283682299	0.360288191
YNL054W-A	YNL054W-A	0.534961237	0.917749341	0.078708134	1323	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YNL054W-B	YNL054W-B	37.62890591	43.62383832	0.43830651	5250	flat	0.862576687	-0.213275371	1.159317213	0.213275371
YNL055C	POR1	475.5739466	317.9746986	0.894062636	852	flat	1.495634554	0.580757708	0.668612528	-0.580757708
YNL056W	OCA2	208.9601144	161.4821682	0.819109758	594	flat	1.294013554	0.371852729	0.772789432	-0.371852729
YNL057W	YNL057W	24.17627184	16.86364415	0.536842105	333	flat	1.433632709	0.519675458	0.697528728	-0.519675458
YNL058C	YNL058C	33.95506131	25.2156698	0.574481659	951	flat	1.346585737	0.429306089	0.742618886	-0.429306089
YNL059C	ARP5	78.09319554	68.9267995	0.50645933	2268	flat	1.132987403	0.18013182	0.882622347	-0.18013182
YNL061W	NOP2	136.0625076	102.8164669	0.803349282	1857	flat	1.323353269	0.404198241	0.755656122	-0.404198241
YNL062C	GCD10	203.5346021	154.8357139	0.826931999	1437	flat	1.314519738	0.394535805	0.760734108	-0.394535805
YNL063W	MTQ1	88.00112344	212.160704	0.962933159	945	up	0.414785216	-1.269563621	2.410886313	1.269563621
YNL064C	YDJ1	236.5652411	540.7060146	0.964470059	1230	up	0.437511762	-1.192606292	2.285652837	1.192606292
YNL065W	AQR1	238.5302843	228.3055878	0.296505727	1761	flat	1.044785134	0.063206275	0.957134598	-0.063206275
YNL066W	SUN4	79.29307272	53.11447064	0.810983036	1263	flat	1.492871373	0.578089867	0.669850074	-0.578089867
YNL067W	RPL9B	1430.713079	1426.822392	0.028171669	576	flat	1.002726819	0.003928615	0.997280596	-0.003928615
YNL067W-A	YNL067W-A	3.009156957	1.032468009	0.26000435	147	flat	2.914528034	1.543262279	0.343108726	-1.543262279
YNL067W-B	YNL067W-B	3.764647427	6.458416908	0.294055386	141	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YNL068C	FKH2	26.24347499	37.04921125	0.637646803	2589	flat	0.708340991	-0.497484064	1.411749445	0.497484064
YNL069C	RPL16B	427.5271087	214.8207936	0.94153255	597	down	1.990157013	0.992882256	0.502472917	-0.992882256
YNL070W	TOM7	1378.766119	1015.136087	0.871103378	183	flat	1.358208162	0.441704607	0.836264166	-0.441704607
YNL071W	LAT1	138.961996	97.62059842	0.843881398	1449	flat	1.423490516	0.509432881	0.702498533	-0.509432881

YNL072W	RNH201	34.56427104	21.02480309	0.708438452	924	flat	1.643975969	0.717189211	0.608281398	-0.717189211
YNL073W	MSK1	36.18498202	57.07919761	0.786900101	1731	flat	0.633943425	-0.657573999	1.577427828	0.657573999
YNL074C	MLF3	35.21842904	41.43319191	0.453117297	1359	flat	0.850005211	-0.234456409	1.176463376	0.234456409
YNL075W	IMP4	230.9522794	173.1565935	0.843924895	873	flat	1.333776986	0.415517461	0.749750528	-0.415517461
YNL076W	MKS1	51.31718541	65.98441275	0.67953458	1755	flat	0.777716786	-0.362683217	1.285815117	0.362683217
YNL077W	APJ1	95.04726576	249.7987061	0.967094389	1587	up	0.380495429	-1.394048974	2.628152468	1.394048974
YNL078W	NIS1	23.56287903	15.7476677	0.559939104	1224	flat	1.496277384	0.581377651	0.668325279	-0.581377651
YNL079C	TPM1	627.8365258	385.5029052	0.9092359	600	down	1.628616846	0.703647231	0.614017964	-0.703647231
YNL080C	EOS1	32.54317156	45.21478431	0.669153255	1101	flat	0.719746252	-0.474439723	1.389378544	0.474439723
YNL081C	SWS2	298.9931787	226.9565442	0.84554154	432	flat	1.317402765	0.397696483	0.759069304	-0.397696483
YNL082W	PMS1	114.4161352	100.4872525	0.583942294	2622	flat	1.138613429	0.18727802	0.878261203	-0.18727802
YNL083W	SAL1	117.3036252	125.8130057	0.39799913	1485	flat	0.932364858	-0.101033467	1.072541497	0.101033467
YNL084C	END3	324.2186071	287.0674052	0.661976222	1050	flat	1.129416302	0.17557736	0.88541311	-0.17557736
YNL085W	MKT1	115.1909628	118.7151844	0.172016819	2493	flat	0.970313641	-0.04347694	1.030594601	0.04347694
YNL086W	SNN1	32.63912769	31.92631659	0.069167754	309	flat	1.022326757	0.031856385	0.978160841	-0.031856385
YNL087W	TCB2	60.73035139	69.64298843	0.517413368	3537	flat	0.872023915	-0.197560395	1.146757541	0.197560395
YNL088W	TOP2	81.92740417	77.56804268	0.274974627	4287	flat	1.056200483	0.078883707	0.946789947	-0.078883707
YNL089C	YNL089C	4.265811183	1.90909179	0.292844715	477	flat	2.234471493	1.159933639	0.447533121	-1.159933639
YNL090W	RH02	560.4578219	496.9969322	0.665173264	579	flat	1.127688695	0.173368858	0.886769553	-0.173368858
YNL091W	NST1	40.77710774	48.55261929	0.511164274	3723	flat	0.839853922	-0.251789677	1.190683253	0.251789677
YNL092W	YNL092W	39.2706239	49.32931318	0.592554734	1203	flat	0.796091033	-0.328994682	1.256137751	0.328994682
YNL093W	YPT53	17.08002935	36.39800117	0.823292736	663	flat	0.469257344	-1.091548772	2.131026852	1.091548772
YNL094W	APP1	31.09462189	41.12664236	0.60461795	1764	flat	0.756070034	-0.403408219	1.322262879	0.403408219
YNL095C	YNL095C	15.04297686	20.06327803	0.427736697	1929	flat	0.749776624	-0.415467249	1.333730565	0.415467249
YNL096C	RPS7B	442.1916761	288.975251	0.89754241	573	flat	1.530194004	0.613714575	0.653511906	-0.613714575
YNL097C	PHO23	52.29751151	48.298292	0.307184283	993	flat	1.082802504	0.114770129	0.923529449	-0.114770129
YNL097C-B	YNL097C-B	6.473357161	8.637476271	0.242757721	123	flat	0.749450066	-0.416095737	1.334311711	0.416095737
YNL097W-A	YNL097W-A	20.98308293	42.80771207	0.834109033	156	flat	0.490170624	-1.028644069	2.040105937	1.028644069
YNL098C	RAS2	500.6864525	337.3773018	0.892525736	969	flat	1.484054943	0.569544505	0.6738295	-0.569544505
YNL099C	OCA1	183.8481585	171.4588087	0.433021604	717	flat	1.072258462	0.100652701	0.932610966	-0.100652701
YNL100W	MIC27	337.4378977	295.7954944	0.681397709	705	flat	1.14078106	0.190021935	0.876592394	-0.190021935
YNL101W	AVT4	45.80408913	93.52945494	0.914847035	2142	up	0.489729029	-1.02994438	2.041945528	1.02994438
YNL102W	POL1	47.01495358	24.69278323	0.820102943	4407	flat	1.90399572	0.929030235	0.525211265	-0.929030235
YNL103W	MET4	97.40815448	96.14532333	0.085000725	2019	flat	1.013134608	0.018825868	0.987035673	-0.018825868
YNL103W-A	YNL103W-A	2.948973818	0.843182207	0.273089749	90	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YNL104C	LEU4	145.9266399	94.00121641	0.874264173	1860	flat	1.552390974	0.63449195	0.644167621	-0.63449195
YNL105W	RRT16	1.443553617	0.707556489	0.124575903	429	flat	2.040169624	1.028689106	0.490155323	-1.028689106
YNL106C	INP52	15.2928203	21.66351584	0.497629404	3552	flat	0.705925133	-0.502412908	1.416580814	0.502412908
YNL107W	YAF9	218.2500446	207.9354184	0.326134551	681	flat	1.049604951	0.06984643	0.952739408	-0.06984643
YNL108C	YNL108C	196.4168908	206.8441076	0.326743512	813	flat	0.949589007	-0.074624861	1.053087169	0.074624861
YNL109W	YNL109W	10.20798629	20.29196741	0.66369436	546	flat	0.503055524	-0.991210452	1.987852141	0.991210452
YNL110C	NOP15	568.1778514	376.7994335	0.896730463	663	flat	1.50790527	0.592545798	0.663171633	-0.592545798
YNL111C	CYB5	283.6864069	263.8254411	0.463882848	363	flat	1.075280707	0.104713332	0.929989716	-0.104713332
YNL112W	DBP2	518.199933	341.650648	0.897477164	1641	flat	1.516753842	0.600986966	0.659302764	-0.600986966
YNL113W	RPC19	472.8669205	284.0875437	0.911106278	429	down	1.664511278	0.735098646	0.600776945	-0.735098646
YNL114C	YNL114C	7.610255013	17.13563841	0.668116572	372	flat	0.444118558	-1.170983239	2.251651013	1.170983239
YNL115C	YNL115C	69.17515327	65.49368774	0.254393214	1935	flat	1.056210998	0.078898069	0.946780522	-0.078898069
YNL116W	DMA2	57.5134473	65.10076011	0.471407858	1569	flat	0.883452777	-0.131922414	1.131922414	0.131922414
YNL117W	MLS1	3.188079803	6.016218994	0.31277367	1665	flat	0.529914188	-0.91616934	1.887097992	0.91616934

YNL118C	DCP2	108.0581755	122.3352311	0.57707699	2913	flat	0.883295634	-0.179031714	1.132123789	0.179031714
YNL119W	NCS2	111.2730202	103.9469563	0.381267218	1482	flat	1.070478868	0.098256316	0.934161364	-0.098256316
YNL120C	YNL120C	3.640708417	5.30892501	0.205676381	486	flat	0.685771302	-0.544200563	1.458212085	0.544200563
YNL121C	TOM70	124.4008858	101.1818649	0.729933304	1854	flat	1.229478088	0.298046023	0.813353251	-0.298046023
YNL122C	YNL122C	214.5632674	204.1082447	0.32692475	348	flat	1.051222932	0.072068653	0.951273008	-0.072068653
YNL123W	NMA111	76.44283834	84.70686184	0.463172394	2994	flat	0.90243974	-0.148097496	1.10810723	0.148097496
YNL124W	NAF1	55.45027848	53.05377703	0.186972597	1479	flat	1.045171175	0.063739242	0.956781075	-0.063739242
YNL125C	ESBP6	38.24040232	71.15757264	0.864680296	2022	flat	0.537404536	-0.895919596	1.860795607	0.895919596
YNL126W	SPC98	33.04104077	30.76072044	0.220400174	2541	flat	1.074130914	0.103169839	0.930985215	-0.103169839
YNL127W	FAR11	46.64571793	72.65154869	0.816934899	2862	flat	0.642047125	-0.639248904	1.557518073	0.639248904
YNL128W	TEP1	12.60940529	29.88935549	0.811468755	1305	flat	0.421869427	-1.245131554	2.370401681	1.245131554
YNL129W	NRK1	165.1914794	148.833905	0.554523706	723	flat	1.109904893	0.150436058	0.900978098	-0.150436058
YNL130C	CPT1	122.5994699	189.2665848	0.885094969	1182	flat	0.647760776	-0.626466984	1.543779798	0.626466984
YNL130C-A	DGR1	9.02747087	25.81170023	0.810983036	147	flat	0.349743364	-1.51563141	2.859239382	1.51563141
YNL131W	TOM22	273.8883526	203.0250492	0.853284037	459	flat	1.349037243	0.431930178	0.741269379	-0.431930178
YNL132W	KRE33	77.58842182	58.39256157	0.73908221	3171	flat	1.328738109	0.410056781	0.752593753	-0.410056781
YNL133C	FYV6	180.4975354	209.6325419	0.697752646	522	flat	0.861018684	-0.21588355	1.161414983	0.21588355
YNL134C	YNL134C	778.0753996	850.2497294	0.58215891	1131	flat	0.915113963	-0.127976675	1.092760072	0.127976675
YNL135C	FPR1	636.7219121	311.0242543	0.948687835	345	down	2.047177683	1.033636325	0.488477384	-1.033636325
YNL136W	EAF7	70.26310856	52.60981942	0.72738147	1278	flat	1.335551221	0.417435307	0.74875451	-0.417435307
YNL137C	NAM9	144.2393354	128.7108117	0.563259388	1461	flat	1.120646615	0.164331409	0.892341963	-0.164331409
YNL138W	SRV2	117.3434174	94.46200669	0.733144846	1581	flat	1.242228717	0.312930824	0.805004736	-0.312930824
YNL138W-A	YSF3	192.369106	180.5978635	0.394628099	258	flat	1.065179301	0.091096299	0.93880908	-0.091096299
YNL139C	THO2	35.87487548	44.35412788	0.54723793	4794	flat	0.808828337	-0.306094553	1.236356288	0.306094553
YNL140C	YNL140C	2.328137224	2.662680655	0.070124692	570	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YNL141W	AAH1	167.0237757	131.2747471	0.793047702	1044	flat	1.272322205	0.347464067	0.785964433	-0.347464067
YNL142W	MEP2	40.75481816	33.49119728	0.502696825	1500	flat	1.216881493	0.283188677	0.821772708	-0.283188677
YNL143C	YNL143C	103.5517524	127.0566166	0.731274467	393	flat	0.8150048	-0.295119539	1.226986639	0.295119539
YNL144C	YNL144C	12.93409569	21.09662365	0.579128607	2223	flat	0.613088421	-0.705832936	1.631086096	0.705832936
YNL144W-A	YNL144W-A	5.266024674	21.68182819	0.819979701	84	flat	0.242877336	-2.041700222	4.117304709	2.041700222
YNL145W	MFA2	748.5856614	345.0561033	0.962722923	117	down	2.169460717	1.117336463	0.460944046	-1.117336463
YNL146C-A	YNL146C-A	1206.357136	928.5381909	0.853813252	195	flat	1.299200342	0.377623918	0.769704231	-0.377623918
YNL146W	YNL146W	26.86193972	24.54411574	0.229636074	303	flat	1.094435017	0.130186296	0.913713455	-0.130186296
YNL147W	LSM7	472.0900327	402.1106872	0.749623025	348	flat	1.174030056	0.231469343	0.85176695	-0.231469343
YNL148C	ALF1	98.06783519	56.54280685	0.872705524	765	flat	1.734399841	0.794436529	0.576568319	-0.794436529
YNL149C	PGA2	898.3027937	723.839495	0.822212556	390	flat	1.24102484	0.311531993	0.805785644	-0.311531993
YNL150W	YNL150W	2.818872031	2.603945052	0.604596201	408	flat	1.082538984	0.11441898	0.923754262	-0.11441898
YNL151C	RPC31	204.3217574	135.9129415	0.881165724	756	flat	1.503328197	0.588160004	0.665190743	-0.588160004
YNL152W	INN1	21.43400482	30.72473702	0.600695955	1230	flat	0.697613939	-0.519499228	1.433457596	0.519499228
YNL153C	GIM3	728.8502212	363.8655526	0.944889082	390	down	2.003075631	1.002216894	0.499232273	-1.002216894
YNL154C	YCK2	88.25356745	98.12976111	0.491249819	1641	flat	0.899355776	-0.153036151	1.111907019	0.153036151
YNL155W	CUZ1	365.0293409	413.1899428	0.673249239	825	flat	0.883441979	-0.178792707	1.131936249	0.178792707
YNL156C	NSG2	453.1589766	595.452749	0.854327969	900	flat	0.76102941	-0.393975887	1.314009665	0.393975887
YNL157W	IGO1	318.4542732	289.1765724	0.576794258	507	flat	1.101245065	0.139135554	0.908063093	-0.139135554
YNL158W	PGA1	43.12318497	38.64232026	0.356444831	597	flat	1.115957445	0.158282013	0.896091518	-0.158282013
YNL159C	ASI2	150.9061085	220.8555878	0.876120052	870	flat	0.683279558	-0.549452129	1.463529807	0.549452129
YNL160W	YGP1	109.1535661	180.9872795	0.896237495	1065	flat	0.603100762	-0.729529038	1.658097724	0.729529038
YNL161W	CBK1	53.99310054	51.86071807	0.175764825	2271	flat	1.041117488	0.058132884	0.96050639	-0.058132884
YNL162W	RPL42A	1867.499681	1057.208644	0.918631289	321	down	1.766443825	0.82084787	0.566109143	-0.82084787

YNL162W-A	YNL162W-A	114.7272006	77.61896485	0.8430767	219	flat	1.478082074	0.563726381	0.676552417	-0.563726381
YNL163C	RIA1	73.33946587	65.70901487	0.458365956	3333	flat	1.116124873	0.158498446	0.895957096	-0.158498446
YNL164C	IBD2	146.6109142	125.183813	0.677366971	1056	flat	1.171165111	0.227944482	0.853850572	-0.227944482
YNL165W	YNL165W	28.47534915	34.68027064	0.464789039	1221	flat	0.821082091	-0.284401626	1.217905019	0.284401626
YNL166C	BN15	166.5611938	133.7448481	0.77430042	1347	flat	1.245365307	0.316568994	0.802977243	-0.316568994
YNL167C	SKO1	29.94482673	39.97308243	0.607938234	1944	flat	0.749124784	-0.416722043	1.334891091	0.416722043
YNL168C	FMP41	110.359674	88.53413178	0.730861244	780	flat	1.246521221	0.317907443	0.802232632	-0.317907443
YNL169C	PSD1	95.29717786	90.17505524	0.29292446	1503	flat	1.05680199	0.079705089	0.946251057	-0.079705089
YNL170W	YNL170W	25.69181735	34.49381758	0.576402784	396	flat	0.744823831	-0.425028862	1.342599362	0.425028862
YNL171C	YNL171C	4.795079378	2.879158757	0.230419023	369	flat	1.665444591	0.735907357	0.60044027	-0.735907357
YNL172W	APC1	26.28616456	31.58679144	0.424525156	5247	flat	0.832188499	-0.265017745	1.201650829	0.265017745
YNL173C	MDG1	71.19320987	57.20773015	0.659917355	1101	flat	1.244468356	0.315529546	0.803555989	-0.315529546
YNL174W	YNL174W	3.705516839	13.24369959	0.679317094	573	flat	0.279794691	-1.837559505	3.574049227	1.837559505
YNL175C	NOP13	122.3386168	89.16025718	0.816855154	1212	flat	1.372120501	0.456407186	0.728798964	-0.456407186
YNL176C	TDA7	31.85076902	36.93058648	0.401435407	1911	flat	0.862449586	-0.213487968	1.159488063	0.213487968
YNL177C	MRPL22	263.9807208	213.1347025	0.797803393	930	flat	1.238562832	0.308667058	0.80738738	-0.308667058
YNL178W	RPS3	1425.418921	717.7194939	0.942946208	723	down	1.986039021	0.989893969	0.50351478	-0.989893969
YNL179C	YNL179C	36.76118047	88.01436193	0.937240829	438	up	0.417672521	-1.259555863	2.394220229	1.259555863
YNL180C	RH05	65.55249028	54.85763759	0.584819487	996	flat	1.194956494	0.836958093	0.256958051	-0.256958093
YNL181W	YNL181W	182.1425005	156.9806874	0.675402349	1224	flat	1.160286042	0.214480513	0.861856442	-0.214480513
YNL182C	IPI3	65.87455902	62.51073847	0.243598666	1668	flat	1.053811883	0.075617353	0.948935969	-0.075617353
YNL183C	NPR1	54.09558798	97.15249859	0.878998115	2373	flat	0.556811083	-0.844740167	1.795941263	0.844740167
YNL184C	YNL184C	42.74659295	31.56131565	0.637632304	327	flat	1.354398322	0.437652091	0.738335233	-0.437652091
YNL185C	MRPL19	165.995696	147.3182498	0.596904451	477	flat	1.126782976	0.172209673	0.887482347	-0.172209673
YNL186W	UBP10	54.03353035	57.99137149	0.298963317	2379	flat	0.931751206	-0.101983313	1.073247872	0.101983313
YNL187W	SWT21	56.92013709	59.49380603	0.193743657	1074	flat	0.956740557	-0.063800339	1.045215438	0.063800339
YNL188W	KAR1	90.91536792	71.57334682	0.723836451	1302	flat	1.270240557	0.345101739	0.787252458	-0.345101739
YNL189W	SRP1	308.2573736	210.7489672	0.884261273	1629	flat	1.462675608	0.548609844	0.683678592	-0.548609844
YNL190W	YNL190W	70.48766686	75.02265104	0.296730463	615	flat	0.9395518	-0.089955391	1.064337272	0.089955391
YNL191W	DUG3	33.77316383	65.42905509	0.871284616	1074	flat	0.516179911	-0.9540541	1.937309025	0.9540541
YNL192W	CHS1	133.1206379	162.9010148	0.750985936	3396	flat	0.817187284	-0.29126134	1.223709692	0.29126134
YNL193W	YNL193W	46.21289918	53.66801957	0.491112078	1677	flat	0.861088215	-0.215767051	1.161321201	0.215767051
YNL194C	YNL194C	30.46621957	49.08325565	0.771168624	906	flat	0.620704946	-0.688020452	1.611071421	0.688020452
YNL195C	YNL195C	13.73186281	7.144520994	0.535761925	786	flat	1.922013082	0.942618156	0.520287822	-0.942618156
YNL196C	SLZ1	3.353348154	7.783220376	0.447875888	897	flat	0.430843275	-1.214764931	2.321029616	1.214764931
YNL197C	WHI3	21.64956609	24.91335948	0.305741627	1986	flat	0.868994248	-0.202581467	1.150755603	0.202581467
YNL198C	YNL198C	22.77425324	23.5423151	0.08676236	303	flat	0.967375262	-0.047852449	1.033725007	0.047852449
YNL199C	GCR2	74.79920505	64.96443101	0.536291141	1605	flat	1.151387057	0.2033729	0.868517666	-0.2033729
YNL200C	YNL200C	88.94678114	76.80809582	0.581143976	741	flat	1.158039139	0.211684014	0.863528672	-0.211684014
YNL201C	PSY2	145.3888721	153.4807566	0.336291141	2577	flat	0.947277531	-0.078140931	1.055656835	0.078140931
YNL202W	SPS19	64.41444516	84.26066564	0.739604176	879	flat	0.76446637	-0.387475059	1.308102017	0.387475059
YNL203C	YNL203C	4.914956363	14.63169125	0.68061476	612	flat	0.335911706	-1.573846024	2.976972768	1.573846024
YNL204C	SPS18	13.32426708	25.88373288	0.714564303	903	flat	0.514773783	-0.957989516	1.942600874	0.957989516
YNL205C	YNL205C	5.019529902	12.55803288	0.604857184	423	flat	0.399706702	-1.322986333	2.501834459	1.322986333
YNL206C	RTT106	143.956485	142.7862501	0.061874728	1368	flat	1.008195712	0.011775723	0.991870912	-0.011775723
YNL207W	RIO2	222.2114074	177.5432958	0.795461795	1278	flat	1.251589965	0.323761997	0.798983715	-0.323761997
YNL208W	YNL208W	1000.881714	769.9939918	0.853429027	600	flat	1.299856524	0.37835239	0.769315676	-0.37835239
YNL209W	SSB2	186.3520914	107.608726	0.902638828	1842	down	1.73175632	0.792235939	0.572235939	-0.792235939
YNL210W	MER1	2.067546219	4.293695374	0.276489778	813	flat	0.481530719	-1.054300259	2.076710709	1.054300259

YNL211C	YNL211C	117.6199902	109.3229345	0.410983036	261	flat	1.075894923	0.105537185	0.929458796	-0.105537185
YNL212W	VID27	101.2744648	148.6714375	0.858989416	2349	flat	0.681196513	-0.553857045	1.468005166	0.553857045
YNL213C	RRG9	83.94288262	106.8292248	0.747527911	645	flat	0.785767029	-0.347826461	1.272641842	0.347826461
YNL214W	PEX17	60.30651457	52.86752441	0.473415978	600	flat	1.140710015	0.189932085	0.876646989	-0.189932085
YNL215W	IES2	86.44811098	71.86749282	0.648339858	963	flat	1.202881965	0.266495082	0.831336764	-0.266495082
YNL216W	RAP1	59.869867	40.63160637	0.763418878	2484	flat	1.473480188	0.559227663	0.678665386	-0.559227663
YNL217W	YNL217W	86.39501276	88.80487836	0.148825576	981	flat	0.972863365	-0.039690897	1.027893573	0.039690897
YNL218W	MGS1	67.25465798	65.99191358	0.098513847	1764	flat	1.019134835	0.027344938	0.981224432	-0.027344938
YNL219C	ALG9	72.92875898	78.43414347	0.345599536	1668	flat	0.929808828	-0.104993972	1.075489897	0.104993972
YNL220W	ADE12	274.7166162	423.8447704	0.9	1302	flat	0.648153842	-0.625591812	1.54284359	0.625591812
YNL221C	POP1	68.40542006	76.2329119	0.463128897	2628	flat	0.897321358	-0.156303344	1.114427948	0.156303344
YNL222W	SSU72	409.7221594	243.9118386	0.911207771	621	down	1.679796117	0.748286139	0.595310341	-0.748286139
YNL223W	ATG4	110.6907748	92.39232915	0.678280412	1485	flat	1.198051568	0.260690008	0.834688612	-0.260690008
YNL224C	SQS1	68.19501953	66.07123078	0.162418443	2304	flat	1.032143926	0.045644159	0.968857128	-0.045644159
YNL225C	CNM67	153.9344065	127.8681471	0.727098739	1746	flat	1.20385264	0.267658807	0.830666451	-0.267658807
YNL226W	YNL226W	5.81184621	5.169876308	0.102870813	411	flat	1.124175099	0.168866764	0.889541141	-0.168866764
YNL227C	JJJ1	49.99783021	46.82443324	0.249166304	1773	flat	1.067772245	0.094603954	0.936529306	-0.094603954
YNL228W	YNL228W	39.50941756	58.01354029	0.75599536	777	flat	0.681037864	-0.554193085	1.468347141	0.554193085
YNL229C	URE2	195.7121779	153.0545672	0.805045672	1065	flat	1.278701685	0.35467973	0.782043233	-0.35467973
YNL230C	ELA1	53.46955159	59.77718071	0.423394229	1140	flat	0.894480987	-0.160877278	1.117966748	0.160877278
YNL231C	PDR16	287.4411695	290.6104131	0.113505872	1056	flat	0.989094529	-0.015819688	1.011025712	0.015819688
YNL232W	CSL4	305.8679669	277.3004693	0.57538785	879	flat	1.103020012	0.141458966	0.906601865	-0.141458966
YNL233W	BNI4	25.85718364	24.19073701	0.181317964	2679	flat	1.068887799	0.096110421	0.93555189	-0.096110421
YNL234W	YNL234W	37.43193932	39.0983787	0.152421343	1281	flat	0.9573783	-0.062838989	1.044519184	0.062838989
YNL235C	YNL235C	2.66226803	12.9954908	0.712954908	432	flat	0.204804673	-2.287679464	4.882701098	2.287679464
YNL236W	SIN4	37.68637309	36.01036627	0.156945049	2925	flat	1.046542343	0.065630684	0.955527511	-0.065630684
YNL237W	YTP1	42.95244473	46.4116815	0.284935479	1380	flat	0.925466248	-0.11174772	1.080536435	0.11174772
YNL238W	KEX2	38.86132368	52.82562394	0.686414383	2445	flat	0.735652904	-0.44290286	1.359336712	0.44290286
YNL239W	LAP3	79.84913721	54.5937315	0.802522836	1365	flat	1.462606329	0.54854151	0.683710975	-0.54854151
YNL240C	NAR1	105.0721769	112.9041541	0.389212701	1476	flat	0.930631629	-0.103717875	1.074539021	0.103717875
YNL241C	ZWF1	76.75491142	84.88478586	0.460569813	1518	flat	0.904224599	-0.14524693	1.105919925	0.14524693
YNL242W	ATG2	21.06674328	24.51738848	0.320226185	4779	flat	0.859257229	-0.218838011	1.163795854	0.218838011
YNL243W	SLA2	89.13874419	77.26994842	0.577432217	2907	flat	1.153601704	0.206145201	0.866850314	-0.206145201
YNL244C	SUI1	989.6647913	953.3373876	0.285790924	327	flat	1.038105506	0.053953077	0.963293224	-0.053953077
YNL245C	CWC25	81.91593938	80.10230971	0.117768595	540	flat	1.022641415	0.032300359	0.977859868	-0.032300359
YNL246W	VPS75	140.3266409	108.2455045	0.791445556	795	flat	1.296373845	0.374481819	0.771382425	-0.374481819
YNL247W	YNL247W	70.72929391	49.73457552	0.770711904	2304	flat	1.422135269	0.508058696	0.703167991	-0.508058696
YNL248C	RPA49	156.5224565	135.4766797	0.657510512	1248	flat	1.155346122	0.208325123	0.865541487	-0.208325123
YNL249C	MPA43	64.03020499	56.55376795	0.46876178	1629	flat	1.132200511	0.17912948	0.883235778	-0.17912948
YNL250W	RAD50	65.51528276	78.48722726	0.621966072	3939	flat	0.834725407	-0.26062641	1.197998756	0.26062641
YNL251C	NRD1	49.35435347	37.50404193	0.643874148	1728	flat	1.31597425	0.39613126	0.759893288	-0.39613126
YNL252C	MRPL17	233.7218611	225.8651913	0.249869508	846	flat	1.034784775	0.049330732	0.966384532	-0.049330732
YNL253W	TEX1	130.7866402	135.7463554	0.225982311	1269	flat	0.963463364	-0.053698286	1.037922185	0.053698286
YNL254C	RTC4	103.8743016	105.3348519	0.090416123	1206	flat	0.986134217	-0.020144079	1.014060747	0.020144079
YNL255C	GIS2	749.3074382	554.5291816	0.867348122	462	flat	1.351249786	0.43429439	0.740055621	-0.43429439
YNL256W	FOL1	71.20431327	65.61490632	0.368174569	2475	flat	1.085185018	0.117941034	0.921501849	-0.117941034
YNL257C	SIP3	70.08008511	46.47784851	0.798724083	3690	flat	1.507816893	0.59246124	0.663210503	-0.59246124
YNL258C	DSL1	167.1736151	187.4879854	0.604733942	2265	flat	0.891649749	-0.165450982	1.121516606	0.165450982
YNL259C	ATX1	1271.246821	996.0944402	0.841808032	222	flat	1.276231219	0.35188973	0.783557074	-0.35188973

YNL260C	LTO1	232.6577333	286.0040151	0.793888647	597	flat	0.813477158	-0.297826259	1.229290817	0.297826259
YNL261W	ORC5	84.66012335	106.1355604	0.732528636	1440	flat	0.797660304	-0.326153612	1.253666498	0.326153612
YNL262W	POL2	22.55175659	17.9332268	0.398513847	6669	flat	1.257537477	0.330601395	0.795204929	-0.330601395
YNL263C	YIF1	79.10739288	95.07883177	0.663658112	945	flat	0.832018983	-0.265311651	1.201895655	0.265311651
YNL264C	PDR17	62.17209758	78.69700603	0.696280992	1053	flat	0.790018588	-0.340041497	1.265793002	0.340041497
YNL265C	IST1	113.0275584	72.58699003	0.85968537	897	flat	1.55713246	0.638891675	0.642206123	-0.638891675
YNL266W	YNL266W	4.212819739	3.252274229	0.137393069	420	flat	1.295345793	0.373337277	0.771994633	-0.373337277
YNL267W	PIK1	46.51474166	40.39688326	0.439147455	3201	flat	1.151443822	0.203444025	0.86847485	-0.203444025
YNL268W	LYP1	71.21868141	52.98821519	0.734993475	1836	flat	1.344047561	0.426584191	0.74402129	-0.426584191
YNL269W	BSC4	1.787256859	4.982440317	0.36492678	396	flat	0.358711143	-1.479105534	2.787758397	1.479105534
YNL270C	ALP1	15.92651365	16.56985244	0.081876178	1722	flat	0.961174139	-0.057130263	1.040394201	0.057130263
YNL271C	BN11	50.30158513	46.03412379	0.330788749	5862	flat	1.09270213	0.127900177	0.915162488	-0.127900177
YNL272C	SEC2	133.2858561	133.6000019	0.019450486	2280	flat	0.99764861	-0.003396334	1.002356933	0.003396334
YNL273W	TOF1	36.963328	34.58476173	0.225757576	3717	flat	1.068774979	0.095958139	0.935650646	-0.095958139
YNL274C	GOR1	278.3461612	237.6764889	0.729179353	1053	flat	1.171113569	0.227880988	0.853888151	-0.227880988
YNL275W	BOR1	55.96406118	63.83050056	0.484717993	1731	flat	0.876760494	-0.189745302	1.14056234	0.189745302
YNL276C	YNL276C	10.50013405	11.11467455	0.082021169	396	flat	0.944709087	-0.08205796	1.05852692	0.08205796
YNL277W	MET2	108.3914401	207.8695191	0.925068871	1461	up	0.521439798	-0.939427396	1.917766928	0.939427396
YNL277W-A	YNL277W-A	8.893730561	25.6698156	0.811613745	189	flat	0.346100204	-1.530738303	2.889336638	1.530738303
YNL278W	CAF120	11.64580612	14.11396419	0.25938089	3183	flat	0.825126518	-0.277312748	1.211935356	0.277312748
YNL279W	PRM1	17.86311935	8.406348292	0.660671306	1986	flat	2.124955894	1.087432897	0.470598003	-1.087432897
YNL280C	ERG24	169.2133268	168.9437516	0.018450051	1317	flat	1.00159565	0.002300202	0.998406892	-0.002300202
YNL281W	HCH1	1101.269378	1759.841721	0.908075975	462	up	0.625777514	-0.676278275	1.598012036	0.676278275
YNL282W	POP3	139.0230514	116.152651	0.706452081	588	flat	1.196899513	0.259302034	0.835492027	-0.259302034
YNL283C	WSC2	12.63845922	15.15720397	0.261881978	1512	flat	0.833825239	-0.262183053	1.199292074	0.262183053
YNL284C	MRPL10	339.9993343	315.9192283	0.498477599	969	flat	1.07622235	0.105976173	0.92917602	-0.105976173
YNL284C-A	YNL284C-A	0.267480618	0.803030674	0.100507467	1323	flat	0.333088918	-1.586020738	3.002201351	1.586020738
YNL284C-B	YNL284C-B	34.79654755	41.83259334	0.492576483	5268	flat	0.831804695	-0.265683267	1.202205284	0.265683267
YNL285W	YNL285W	27.82499489	35.0872596	0.51276642	372	flat	0.793022744	-0.334565851	1.260997881	0.334565851
YNL286W	CUS2	183.5375313	182.5518961	0.058322459	858	flat	1.005399206	0.007768454	0.994629789	-0.007768454
YNL287W	SEC21	94.23483641	89.02058305	0.294722343	2808	flat	1.05857357	0.082121539	0.944667455	-0.082121539
YNL288W	CAF40	40.7652263	48.96769397	0.525561838	1122	flat	0.832492262	-0.264491233	1.201212367	0.264491233
YNL289W	PCL1	437.5013299	195.4978175	0.963549369	840	down	2.237883448	1.162134901	0.446850796	-1.162134901
YNL290W	RFC3	135.341467	128.3318374	0.323742207	1023	flat	1.054621127	0.076724803	0.94820782	-0.076724803
YNL291C	MID1	74.39578757	88.74147167	0.635399449	1647	flat	0.838342955	-0.254387543	1.192829252	0.254387543
YNL292W	PUS4	73.35937343	53.97200961	0.746549224	1212	flat	1.35921145	0.442769911	0.735720701	-0.442769911
YNL293W	MSB3	72.2359044	94.07989321	0.750891692	1902	flat	0.767813747	-0.381171705	1.302399188	0.381171705
YNL294C	RIM21	102.4409444	143.2462357	0.837936784	1602	flat	0.715138823	-0.483704769	1.398329901	0.483704769
YNL295W	YNL295W	59.65352751	72.65821536	0.631564448	1575	flat	0.821015589	-0.284518479	1.218003669	0.284518479
YNL296W	YNL296W	0.280854649	0.963636808	0.119131506	315	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YNL297C	MON2	46.40535464	50.31279048	0.309960853	4911	flat	0.922337127	-0.116633922	1.084202262	0.116633922
YNL298W	CLA4	37.50059232	35.28762548	0.202015369	2529	flat	1.062712263	0.087751029	0.940988483	-0.087751029
YNL299W	TRF5	52.83386995	52.87263857	0.006901551	1929	flat	0.999266755	-0.001058238	1.000733784	0.001058238
YNL300W	TOS6	40.94206368	5.894089217	0.939894157	309	down	6.946291814	2.79624302	0.143961703	-2.79624302
YNL301C	RPL18B	650.9820277	616.019001	0.406017109	561	flat	1.05675641	0.079642863	0.946291871	-0.079642863
YNL302C	RPS19B	1369.950871	869.1173291	0.906082355	435	down	1.576255386	0.656501301	0.634414961	-0.656501301
YNL303W	YNL303W	12.71109404	13.51999057	0.103907496	348	flat	0.940170334	-0.089005937	1.06363705	0.089005937
YNL304W	YPT11	34.78095914	25.29546622	0.598731332	1254	flat	1.374987867	0.459418888	0.727279145	-0.459418888
YNL305C	BXI1	101.4328243	157.2053807	0.878019429	894	flat	0.645224889	-0.632126005	1.54984722	0.632126005

YNL306W	MRPS18	439.9111401	314.916951	0.876083805	654	flat	1.396911594	0.48224072	0.715864915	-0.48224072
YNL307C	MCK1	62.90098409	58.26030252	0.330397274	1128	flat	1.079654265	0.110569395	0.926222433	-0.110569395
YNL308C	KRI1	112.778323	85.03036788	0.78816152	1776	flat	1.326329944	0.407439711	0.753960208	-0.407439711
YNL309W	STB1	14.28956434	9.973984306	0.395875018	1263	flat	1.43268366	0.518720094	0.69799079	-0.518720094
YNL310C	ZIM17	95.04121332	52.03638766	0.881020734	525	flat	1.826437568	0.86903244	0.547513924	-0.86903244
YNL311C	SKP2	56.35473526	66.41715346	0.562904161	2292	flat	0.848496696	-0.237019053	1.178554972	0.237019053
YNL312W	RFA2	221.7111702	260.7094767	0.726837756	822	flat	0.850414695	-0.233761568	1.175896895	0.233761568
YNL313C	EMW1	68.23371463	62.33026484	0.386073655	2715	flat	1.094712413	0.130551916	0.913481923	-0.130551916
YNL314W	DAL82	35.13425837	39.7217868	0.368370306	768	flat	0.884508508	-0.177052075	1.130571375	0.177052075
YNL315C	ATP11	155.9535683	111.4903621	0.843613165	957	flat	1.398807623	0.484197563	0.714894589	-0.484197563
YNL316C	PHA2	36.88417999	34.58305531	0.207046542	1005	flat	1.06653908	0.092936829	0.93761215	-0.092936829
YNL317W	PFS2	48.85424436	42.66574346	0.441713789	1398	flat	1.145046128	0.195405719	0.873327262	-0.195405719
YNL318C	HXT14	1.907838884	3.927577011	0.255357402	1623	flat	0.485754672	-1.041700222	2.058652355	1.041700222
YNL319W	YNL319W	16.65066849	11.7013041	0.430513267	441	flat	1.422975452	0.508910774	0.702752812	-0.508910774
YNL320W	YNL320W	141.654216	170.766586	0.737298826	855	flat	0.829519517	-0.269652169	1.205517145	0.269652169
YNL321W	VNX1	14.98818376	17.08626651	0.224583152	2727	flat	0.877206483	-0.18901162	1.139982455	0.18901162
YNL322C	KRE1	117.4893709	134.5332121	0.623633464	942	flat	0.873311274	-0.19543213	1.14506709	0.19543213
YNL323W	LEM3	118.5984892	112.7629217	0.285631434	1245	flat	1.051750765	0.072792868	0.9507956	-0.072792868
YNL324W	YNL324W	2.010663967	3.832646397	0.227482964	396	flat	0.524615046	-0.93066891	1.906159588	0.93066891
YNL325C	FIG4	58.84543209	56.33990204	0.191242569	2640	flat	1.044471679	0.062773374	0.957421843	-0.062773374
YNL326C	PFA3	154.011689	149.370854	0.186291141	1011	flat	1.031069214	0.044141182	0.969866995	-0.044141182
YNL327W	EGT2	86.85605227	36.70512949	0.935471944	3126	down	2.36631919	1.24264469	0.422597258	-1.24264469
YNL328C	MDJ2	56.37154032	53.34418047	0.23091924	441	flat	1.056751455	0.079636099	0.946296308	-0.079636099
YNL329C	PEX6	38.92874264	29.58907106	0.586987096	3093	flat	1.315645988	0.395771343	0.760082886	-0.395771343
YNL330C	RPD3	193.789708	174.3871773	0.570291431	1302	flat	1.111261224	0.15219799	0.899878425	-0.15219799
YNL331C	AAD14	66.17591113	82.26058777	0.681818182	1131	flat	0.804466792	-0.313895227	1.243059391	0.313895227
YNL332W	THI12	4.23752836	5.786059723	0.192474989	1023	flat	0.732368583	-0.449358191	1.365432684	0.449358191
YNL333W	SNZ2	26.3336458	23.34966113	0.281412208	897	flat	1.127795631	0.173505659	0.886685471	-0.173505659
YNL334C	SNO2	37.55643786	40.60886506	0.265267508	669	flat	0.924833477	-0.112734474	1.081275738	0.112734474
YNL335W	DDI3	4.045052582	2.238536834	0.222364796	678	flat	1.807007381	0.853602399	0.553401171	-0.853602399
YNL336W	COS1	96.34343781	89.79228324	0.367906336	1146	flat	1.072958993	0.101594939	0.932002068	-0.101594939
YNL337W	YNL337W	0.346938096	0.29759372	0.023205742	255	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YNL338W	YNL338W	0.278205077	0.954545895	0.119131506	159	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YNL339C	YRF1-6	14.41192043	10.11818649	0.393424677	5580	flat	1.424358055	0.510311857	0.70207066	-0.510311857
YNL339W-A	YNL339W-A	0.460777159	0.13174722	0.073495723	576	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YNL339W-B	YNL339W-B	0.549498227	0.157114697	0.082673626	483	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YNR001C	CIT1	339.5006107	344.8615228	0.123626214	1440	flat	0.984454885	-0.022603002	1.015790582	0.022603002
YNR001W-A	YNR001W-A	10.90716343	29.80013829	0.831288966	219	flat	0.366010497	-1.450043069	2.732162076	1.450043069
YNR002C	ATO2	12.60868664	38.97110697	0.888016529	849	flat	0.323539351	-1.627986904	3.090814141	1.627986904
YNR003C	RPC34	104.605109	70.63639624	0.837037843	954	flat	1.480895325	0.56646967	0.675267173	-0.56646967
YNR003W-A	YNR003W-A	4.468142148	3.066117118	0.180520516	99	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YNR004W	SWM2	65.59962166	123.5520051	0.906046107	441	up	0.530947447	-0.913359025	1.883425574	0.913359025
YNR005C	YNR005C	0.655327515	2.997981182	0.297796143	405	flat	0.218589603	-2.193703316	4.57478301	2.193703316
YNR006W	VPS27	23.90420189	40.68387986	0.756191098	1869	flat	0.587559544	-0.767193032	1.701955165	0.767193032
YNR007C	ATG3	96.05499927	97.76575691	0.114745542	933	flat	0.982501464	-0.025468538	1.017810189	0.025468538
YNR008W	LRO1	42.05183208	55.94042681	0.680288531	1986	flat	0.751725263	-0.411722605	1.330273238	0.411722605
YNR009W	NRM1	26.30484645	11.13000514	0.784848485	750	flat	2.363417278	1.24087437	0.423116142	-1.24087437
YNR010W	CSE2	92.40117962	126.1400582	0.782528436	450	flat	0.732528436	-0.44904333	1.365134717	0.44904333
YNR011C	PRP2	66.14175028	71.81951071	0.370936639	2631	flat	0.920944039	-0.118814601	1.085842307	0.118814601

YNR012W	URK1	102.4504051	100.7787499	0.095092069	1506	flat	1.016587378	0.023734224	0.983683273	-0.023734224
YNR013C	PHO91	34.2015064	41.65979577	0.509794113	2685	flat	0.820971533	-0.284595897	1.218069031	0.284595897
YNR014W	YNR014W	14.12184645	17.10116026	0.296107003	639	flat	0.825782943	-0.276165476	1.210971973	0.276165476
YNR015W	SMM1	36.99621698	30.09174943	0.493953893	1155	flat	1.229447197	0.298009774	0.813373687	-0.298009774
YNR016C	ACC1	104.2437164	49.6171589	0.928831376	6702	down	2.100961012	1.07104939	0.475972659	-1.07104939
YNR017W	TIM23	90.98179312	67.1520897	0.776801508	669	flat	1.354861681	0.438145573	0.738082724	-0.438145573
YNR018W	RCF2	80.86741535	63.18245341	0.712548934	675	flat	1.279903058	0.356034543	0.781309173	-0.356034543
YNR019W	ARE2	83.01154914	138.1612401	0.886269392	1929	flat	0.60083095	-0.734968964	1.664361664	0.734968964
YNR020C	ATP23	155.0659664	143.5587714	0.446549224	813	flat	1.080156684	0.1112406	0.925791614	-0.1112406
YNR021W	YNR021W	163.3221796	115.1724437	0.851928375	1215	flat	1.41806646	0.503925148	0.705185567	-0.503925148
YNR022C	MRPL50	248.7670056	177.4296274	0.866934899	420	flat	1.402060126	0.487548219	0.713236174	-0.487548219
YNR023W	SNF12	74.63452254	66.82999718	0.462527186	1701	flat	1.11678177	0.159347297	0.895430089	-0.159347297
YNR024W	MPP6	261.4651652	154.7487345	0.907242279	561	down	1.689611007	0.756691138	0.591852205	-0.756691138
YNR025C	YNR025C	35.63343363	26.98183064	0.567609105	360	flat	1.320645515	0.401243274	0.757205464	-0.401243274
YNR026C	SEC12	88.71912756	78.99473986	0.508670436	1416	flat	1.123101712	0.167488589	0.890391306	-0.167488589
YNR027W	BUD17	91.34400032	106.4318673	0.62415543	954	flat	0.858239197	-0.220548303	1.165176333	0.220548303
YNR028W	CPR8	100.1124121	89.55741116	0.512650428	927	flat	1.11785737	0.160736123	0.894568508	-0.160736123
YNR029C	YNR029C	153.4152193	144.9489041	0.340017399	1290	flat	1.058408963	0.081897184	0.944814372	-0.081897184
YNR030W	ALG12	37.98406493	49.85773053	0.642648978	1656	flat	0.761849056	-0.392422908	1.312595969	0.392422908
YNR031C	SSK2	59.70738761	58.21159189	0.117014644	4740	flat	1.025695839	0.036602977	0.974947895	-0.036602977
YNR032C-A	HUB1	616.4949319	419.768007	0.891003335	222	flat	1.468656309	0.55449682	0.680894498	-0.55449682
YNR032W	PPG1	134.5019766	146.8370966	0.489611425	1107	flat	0.915994525	-0.12658912	1.091709582	0.12658912
YNR033W	ABZ1	59.09174693	83.71900496	0.79215601	2364	flat	0.70583432	-0.502598515	1.416763073	0.502598515
YNR034W	SOL1	47.44001359	98.19668565	0.922683776	966	up	0.483112167	-1.049569908	2.06991268	1.049569908
YNR034W-A	YNR034W-A	354.4726104	436.4106698	0.806995795	297	flat	0.812245518	-0.300012218	1.23115484	0.300012218
YNR035C	ARC35	253.4569917	237.0251558	0.453407279	1029	flat	1.069325282	0.096700779	0.935169136	-0.096700779
YNR036C	MRPS12	442.9205481	249.6695367	0.917304625	462	down	1.774027195	0.827028126	0.563689217	-0.827028126
YNR037C	RSM19	486.5806799	280.9996356	0.914426562	276	down	1.731606088	0.792110778	0.577498547	-0.792110778
YNR038W	DBP6	45.17078943	52.437903	0.484971727	1890	flat	0.861414871	-0.215219866	1.160880818	0.215219866
YNR039C	ZRG17	29.97636752	36.64920684	0.483942294	1818	flat	0.817926774	-0.289956405	1.222603333	0.289956405
YNR040W	YNR040W	140.7934192	137.7934141	0.141866029	771	flat	1.021750256	0.031042606	0.978712747	-0.031042606
YNR041C	COQ2	227.6165046	210.0947838	0.503168044	1119	flat	1.083399123	0.115564828	0.923020869	-0.115564828
YNR042W	YNR042W	0.824887781	2.830261955	0.263679861	429	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YNR043W	MVD1	60.16797965	58.74664951	0.105009424	1191	flat	1.024194233	0.034489341	0.9763773	-0.034489341
YNR044W	AGA1	20.55345388	5.853496316	0.789024213	2178	flat	3.511312346	1.812010336	0.284793804	-1.812010336
YNR045W	PET494	33.76274105	45.7383328	0.652878063	1470	flat	0.73817166	-0.437971744	1.354698445	0.437971744
YNR046W	TRM112	88.25237822	67.70257136	0.742141511	408	flat	1.30353067	0.382424528	0.767147274	-0.382424528
YNR047W	FPK1	55.74682049	76.84841864	0.762875163	2682	flat	0.725412721	-0.463126049	1.378525591	0.463126049
YNR048W	YNR048W	38.39653727	42.50151939	0.335486443	1182	flat	0.903415638	-0.146538208	1.106910217	0.146538208
YNR049C	MSO1	137.5256036	113.410005	0.724974627	633	flat	1.21264084	0.278152316	0.82464648	-0.278152316
YNR050C	LYS9	147.7125812	103.7849777	0.847904886	1341	flat	1.423255893	0.509195073	0.70261434	-0.509195073
YNR051C	BRE5	43.60595005	44.90435477	0.107314775	1548	flat	0.971085105	-0.042330358	1.029775861	0.042330358
YNR052C	POP2	63.3281935	58.28448438	0.352015369	1302	flat	1.086536051	0.119736044	0.920356024	-0.119736044
YNR053C	NOG2	440.9533335	310.6096263	0.88183993	1461	flat	1.419638337	0.50552344	0.704404758	-0.50552344
YNR054C	ESF2	126.0523509	92.08507262	0.816869653	951	flat	1.368868453	0.452983811	0.730530387	-0.452983811
YNR055C	HOL1	105.7008673	114.3682578	0.416202697	1761	flat	0.924215069	-0.113699482	1.081999237	0.113699482
YNR056C	BIO5	11.96380837	11.52248995	0.059656372	1686	flat	1.038300612	0.054224198	0.963112213	-0.054224198
YNR057C	BIO4	167.2737249	229.3597315	0.855640133	714	flat	0.729307293	-0.455401274	1.37116413	0.455401274
YNR058W	BIO3	26.30165837	37.44360073	0.645962012	1443	flat	0.702434004	-0.50956541	1.423621286	0.50956541

YNR059W	MNT4	37.61083647	32.47920448	0.403791504	1743	flat	1.157997466	0.211632096	0.863559748	-0.211632096
YNR060W	FRE4	4.300586817	7.869700603	0.360236335	2160	flat	0.546474006	-0.871775221	1.829913204	0.871775221
YNR061C	YNR061C	169.834083	178.9079338	0.345338553	660	flat	0.94928201	-0.075091352	1.053427737	0.075091352
YNR062C	YNR062C	1.258708337	3.701775545	0.30108018	984	flat	0.340028271	-1.556273395	2.940931935	1.556273395
YNR063W	YNR063W	20.90473216	24.71300483	0.343272437	1824	flat	0.845900056	-0.241440878	1.182172756	0.241440878
YNR064C	YNR064C	5.269643935	11.1265281	0.522524286	873	flat	0.473610806	-1.078226098	2.111438313	1.078226098
YNR065C	YNR065C	15.02207791	15.71625207	0.086595621	3351	flat	0.955830808	-0.065172827	1.046210262	0.065172827
YNR066C	YNR066C	60.80149679	95.04612251	0.846643468	1311	flat	0.639705179	-0.644520932	1.56322011	0.644520932
YNR067C	DSE4	74.33102163	51.81271704	0.782840365	3354	flat	1.434609607	0.520658197	0.697053746	-0.520658197
YNR068C	YNR068C	40.39986109	61.33918916	0.781716688	819	flat	0.658630504	-0.602458763	1.518301982	0.602458763
YNR069C	BSC5	30.39248526	77.02211348	0.933369581	1470	up	0.394594278	-1.341558059	2.534248608	1.341558059
YNR070W	PDR18	3.691743835	5.081847787	0.17784544	4002	flat	0.726456988	-0.461050714	1.37654399	0.461050714
YNR071C	YNR071C	3.868916087	3.097404027	0.119037263	1029	flat	1.249083443	0.320869857	0.800587027	-0.320869857
YNR072W	HXT17	1.618021033	2.059453887	0.085051472	1695	flat	0.785655383	-0.348031462	1.272822692	0.348031462
YNR073C	YNR073C	1.758831303	3.017351836	0.16968972	1509	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YNR074C	AIF1	148.6158309	196.8908321	0.832216906	1137	flat	0.754813362	-0.405808133	1.324830813	0.405808133
YNR075C-A	YNR075C-A	0.475640938	3.263931126	0.339611425	93	flat	0.145726402	-2.778665816	6.862174516	2.778665816
YNR075W	COS10	15.80649966	17.13346245	0.15814847	1125	flat	0.922551393	-1.116298812	1.083950452	0.116298812
YNR076W	PAU6	3.899469511	1.672427519	0.282332898	363	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YNR077C	YNR077C	0.173469048	0.595187441	0.086124402	255	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YOL001W	PHO80	29.79065387	41.47079837	0.653146295	882	flat	0.718352553	-0.477236032	1.392074123	0.477236032
YOL002C	IZH2	173.5999681	191.06827	0.540727853	954	flat	0.9085756	-0.138321532	1.100623877	0.138321532
YOL003C	PFA4	68.55002462	67.27659618	0.098956068	1137	flat	1.018928253	0.027052469	0.98142337	-0.027052469
YOL004W	SIN3	46.1820428	39.0047202	0.488835726	4611	flat	1.184011642	0.243683266	0.84458629	-0.243683266
YOL005C	RPB11	120.8835548	71.07816955	0.883202842	363	flat	1.700712829	0.587988744	0.766139558	-0.766139558
YOL006C	TOP1	109.8014018	106.1095531	0.206017109	2310	flat	1.034792802	0.049341923	0.966377035	-0.049341923
YOL007C	CSI2	36.64660446	22.63278557	0.715506742	1026	flat	1.619182241	0.695265372	0.617595706	-0.695265372
YOL008W	COQ10	64.36702467	66.1573732	0.128853125	624	flat	0.972938035	-0.03958017	1.027814685	0.03958017
YOL009C	MDM12	79.68734397	83.51223775	0.244896332	816	flat	0.954199601	-0.067637011	1.047998761	0.067637011
YOL010W	RCL1	243.8512861	186.1416373	0.835450196	1104	flat	1.310030843	0.389600779	0.763340806	-0.389600779
YOL011W	PLB3	114.739549	136.6028816	0.694700594	2061	flat	0.839949696	-0.251625166	1.190547487	0.251625166
YOL012C	HTZ1	185.6761293	126.6647049	0.870182688	405	flat	1.465886881	0.551773778	0.682180878	-0.551773778
YOL013C	HRD1	45.9441573	50.86588317	0.370023198	1656	flat	0.90324112	-0.146816928	1.107124086	0.146816928
YOL013W-A	YOL013W-A	30.87206965	42.68609925	0.653552269	192	flat	0.723234734	-0.467464128	1.382676955	0.467464128
YOL013W-B	YOL013W-B	9.424555499	29.20713626	0.84446136	291	flat	0.322679889	-1.631824428	3.099046555	1.631824428
YOL014W	YOL014W	124.800572	153.7964346	0.753581267	375	flat	0.811465963	-0.301397513	1.232337578	0.301397513
YOL015W	IRC10	6.179280742	8.360000762	0.245007032	1761	flat	0.739148347	-0.436064153	1.35290839	0.436064153
YOL016C	CMK2	251.3868529	303.2068161	0.774068436	1344	flat	0.829093673	-0.270392985	1.20613633	0.270392985
YOL017W	ESC8	57.41218957	34.81222205	0.803624764	2145	flat	1.649196351	0.721763174	0.606355938	-0.721763174
YOL018C	TLG2	164.7868786	121.0114766	0.835399449	1194	flat	1.361745871	0.445457493	0.734351409	-0.445457493
YOL019W	YOL019W	22.65153802	17.50519583	0.43046252	1656	flat	1.29398941	0.37182581	0.772803852	-0.37182581
YOL019W-A	YOL019W-A	8.095222244	0.495989534	0.629114108	153	flat	16.32135699	4.028689106	0.061269415	-4.028689106
YOL020W	TAT2	175.5459962	201.766535	0.668080325	1779	flat	0.870045155	-0.200837816	1.149365632	0.200837816
YOL021C	DIS3	63.24695343	58.97226457	0.310265333	3006	flat	1.072486429	0.100959392	0.932412731	-0.100959392
YOL022C	TSR4	164.6089786	138.0427399	0.715303755	1227	flat	1.192449373	0.253928016	0.838610026	-0.253928016
YOL023W	IFM1	61.28812646	81.97673987	0.752443091	2031	flat	0.747628249	-0.419607013	1.337563156	0.419607013
YOL024W	YOL024W	3.238757372	4.094063897	0.12785269	519	flat	0.791086181	-0.338093225	1.264084779	0.338093225
YOL025W	LAG2	19.58546908	27.01754789	0.535218211	1983	flat	0.724916604	-0.46411306	1.379469023	0.46411306
YOL026C	MIM1	269.0291904	194.3756878	0.863281137	342	flat	1.384068107	0.468914937	0.722507798	-0.468914937

YOL027C	MDM38	42.23094909	34.46176757	0.521755836	1722	flat	1.225443501	0.29330397	0.816031094	-0.29330397
YOL028C	YAP7	29.13010722	33.7272883	0.379585327	738	flat	0.863695503	-0.211405317	1.157815453	0.211405317
YOL029C	YOL029C	140.2952395	170.0556591	0.745498043	606	flat	0.824996006	-0.27754096	1.21212708	0.27754096
YOL030W	GAS5	27.1183984	28.68558025	0.155212411	1455	flat	0.945366911	-0.081053725	1.057790354	0.081053725
YOL031C	SIL1	102.5851555	87.63500383	0.62969407	1266	flat	1.170595665	0.227242841	0.854265935	-0.227242841
YOL032W	OPI10	268.5118265	321.1602513	0.767007395	741	flat	0.836068055	-0.258307715	1.196074882	0.258307715
YOL033W	MSE1	84.18578887	77.44086866	0.397143686	1611	flat	1.087097683	0.120481582	0.919880537	-0.120481582
YOL034W	SMC5	48.1162547	53.82801222	0.403610265	3282	flat	0.893888753	-0.1618328	1.118707442	0.1618328
YOL035C	YOL035C	3.795708874	3.506302249	0.06338988	303	flat	1.082538984	0.11441898	0.923754262	-0.11441898
YOL036W	YOL036W	38.46824114	53.77776284	0.711591997	2286	flat	0.715318732	-0.483341873	1.397978209	0.483341873
YOL037C	YOL037C	8.497043203	14.14831162	0.477439466	354	flat	0.600569413	-0.735597094	1.665086463	0.735597094
YOL038C-A	YOL038C-A	605.4611869	814.197819	0.867623604	96	flat	0.743629094	-0.427344878	1.344756421	0.427344878
YOL038W	PRE6	740.7128354	510.4724282	0.890604611	765	flat	1.451033973	0.537081297	0.68916374	-0.537081297
YOL039W	RPP2A	464.11887	198.1084177	0.966050457	321	down	2.34275189	1.228204173	0.426848444	-1.228204173
YOL040C	RPS15	276.9560725	111.7953472	0.965956213	429	down	2.477348829	1.308797025	0.403657324	-1.308797025
YOL041C	NOP12	146.5511771	132.6362272	0.518551544	1380	flat	1.104910628	0.14392968	0.905050576	-0.14392968
YOL042W	NGL1	66.3519109	85.89339629	0.731948673	1092	flat	0.772491411	-0.372409203	1.294512775	0.372409203
YOL043C	NTG2	73.22123967	61.21370041	0.60769175	1143	flat	1.196157709	0.258407617	0.836010162	-0.258407617
YOL044W	PEX15	148.9078185	165.0792665	0.553342033	1152	flat	0.902038285	-0.148739428	1.108600396	0.148739428
YOL045W	PSK2	69.87087693	100.9982317	0.823560969	3306	flat	0.691802972	-0.531566882	1.44549827	0.531566882
YOL046C	YOL046C	0.524262012	0.674545766	0.045367551	675	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YOL047C	LDS2	2.065107715	4.251338861	0.270566913	1071	flat	0.485754672	-1.041700222	2.058652355	1.041700222
YOL048C	RRT8	176.3365977	288.0585745	0.904603451	1029	up	0.612155351	-0.708030274	1.633572261	0.708030274
YOL049W	GSH2	167.2883318	111.2589205	0.873604466	1476	flat	1.503594777	0.588415809	0.665072808	-0.588415809
YOL050C	YOL050C	26.18247782	71.86749282	0.933869798	321	up	0.364316004	-1.456737721	2.744869806	1.456737721
YOL051W	GAL11	27.30935088	23.19140711	0.361026533	3246	flat	1.177563343	0.235804666	0.849211218	-0.235804666
YOL052C	SPE2	27.63270177	35.80869526	0.549565028	1191	flat	0.77167575	-0.373933325	1.295881075	0.373933325
YOL052C-A	DDR2	306.3127643	598.9313615	0.938871973	186	up	0.511432167	-0.967385191	1.955293515	0.967385191
YOL053W	AIM39	87.94793128	54.80684348	0.846868204	1188	flat	1.604688862	0.682293596	0.623173765	-0.682293596
YOL054W	PSH1	59.55912722	60.16218994	0.047187183	1221	flat	0.989976051	-0.01453447	1.010125446	0.01453447
YOL055C	THI20	60.31506232	75.51979771	0.675213861	1656	flat	0.79866557	-0.324336573	1.25208853	0.324336573
YOL056W	GPM3	175.1923261	165.7518708	0.348397854	912	flat	1.056955347	0.079914429	0.946113762	-0.079914429
YOL057W	YOL057W	78.52885334	60.82280642	0.716478179	2136	flat	1.29110868	0.368610446	0.774528136	-0.368610446
YOL058W	ARG1	153.5427698	126.0567414	0.738241264	1263	flat	1.21804489	0.284567304	0.820987804	-0.284567304
YOL059W	GPD2	36.51110441	44.96971773	0.543990141	1323	flat	0.811904238	-0.30061852	1.231672349	0.30061852
YOL060C	MAM3	27.8630058	43.79299951	0.738212266	2121	flat	0.636243375	-0.652349367	1.5717256	0.652349367
YOL061W	PRS5	190.8229335	178.6460492	0.431651443	1491	flat	1.068162069	0.09513056	0.936187521	-0.09513056
YOL062C	APM4	139.8964409	179.7417681	0.80400174	1476	flat	0.778319042	-0.36156644	1.284820164	0.36156644
YOL063C	CRT10	54.42365041	57.08642795	0.206234595	2874	flat	0.953355331	-0.068914065	1.048926846	0.068914065
YOL064C	MET22	169.1129399	104.7147512	0.890263883	1074	flat	1.614986789	0.691522363	0.619200112	-0.691522363
YOL065C	INP54	94.8267425	85.54466759	0.481731187	1155	flat	1.108505593	0.14861605	0.90211543	-0.14861605
YOL066C	RIB2	49.01672697	41.87425152	0.48445701	1776	flat	1.170569627	0.22721075	0.854284937	-0.22721075
YOL067C	RTG1	72.56463663	93.50795941	0.741924025	534	flat	0.776026309	-0.36582253	1.288616105	0.36582253
YOL068C	HST1	180.5076236	248.7387512	0.858757431	1512	flat	0.725691605	-0.462571514	1.377995823	0.462571514
YOL069W	NUF2	99.88670165	96.48093754	0.200297231	1356	flat	1.035299865	0.050048692	0.965903728	-0.050048692
YOL070C	NBA1	122.5410236	74.37471742	0.878135421	1506	flat	1.647616661	0.72038062	0.606937295	-0.72038062
YOL071W	SDH5	137.3172471	136.874854	0.021784834	489	flat	1.003232099	0.004655414	0.996778314	-0.004655414
YOL072W	THP1	38.09091181	42.15911037	0.334196027	1368	flat	0.903503691	-0.146397601	1.106802341	0.146397601
YOL073C	DSC2	55.87529339	68.44655566	0.628577642	969	flat	0.816334626	-0.292767443	1.224987853	0.292767443

YOL075C	YOL075C	29.80854616	46.05923502	0.740778599	3885	flat	0.64717849	-0.627764437	1.545168784	0.627764437
YOL076W	MDM20	182.5255689	176.5921883	0.236211396	2391	flat	1.033599338	0.047677051	0.96749288	-0.047677051
YOL077C	BRX1	429.2170796	324.3363888	0.853704509	876	flat	1.323370101	0.40421659	0.755646511	-0.40421659
YOL077W-A	ATP19	724.4218291	513.9745456	0.88307235	207	flat	1.40945079	0.495133108	0.709496215	-0.495133108
YOL078W	AVO1	58.02738625	71.78152692	0.653479774	3531	flat	0.808388854	-0.306878666	1.237028437	0.306878666
YOL079W	YOL079W	2.439000902	2.662680655	0.055799623	399	flat	0.915994525	-0.12658912	1.091709582	0.12658912
YOL080C	REX4	99.85835479	66.29156665	0.839103958	870	flat	1.506350805	0.59105779	0.663855987	-0.59105779
YOL081W	IRA2	41.20903672	57.17760904	0.717471364	9240	flat	0.720719831	-0.472489552	1.387501713	0.472489552
YOL082W	ATG19	82.65633344	75.03510894	0.437124837	1248	flat	1.10156878	0.139559578	0.907796243	-0.139559578
YOL083C-A	YOL083C-A	3.137206189	4.305611272	0.157785994	141	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YOL083W	ATG34	64.19194823	80.72499874	0.693344933	1239	flat	0.795192929	-0.330623166	1.257556453	0.330623166
YOL084W	PHM7	26.69534766	37.12721655	0.626120052	2976	flat	0.719023674	-0.475888822	1.39077479	0.475888822
YOL085C	YOL085C	13.71014143	46.59691146	0.915426997	342	up	0.294228544	-1.764990879	3.39871851	1.764990879
YOL085W-A	YOL085W-A	6.6455748	9.97567682	0.336805858	213	flat	0.666177836	-0.586020738	1.501100675	0.586020738
YOL086C	ADH1	987.3569931	1832.290505	0.92261853	1047	up	0.538864875	-0.892004546	1.8557528	0.892004546
YOL086W-A	MHF1	826.036732	378.0421326	0.962867914	273	down	2.185038811	1.127658906	0.457657775	-1.127658906
YOL087C	DUF1	52.08885714	57.11295059	0.358489198	3351	flat	0.912032325	-0.132843136	1.096452365	0.132843136
YOL088C	MPD2	210.7773732	209.2790371	0.066362186	834	flat	1.007159514	0.010292195	0.992891381	-0.010292195
YOL089C	HAL9	44.50633618	70.85674729	0.820936639	3093	flat	0.628117122	-0.670894498	1.592059769	0.670894498
YOL090W	MSH2	140.6339638	110.775793	0.773858199	2895	flat	1.269536963	0.3443024	0.787688763	-0.3443024
YOL091W	SPO21	21.94810022	22.47564376	0.056408583	1830	flat	0.976528212	-0.03426637	1.024035955	0.03426637
YOL092W	YPQ1	101.8302609	92.50445577	0.467913586	927	flat	1.100814659	0.138571587	0.908418135	-0.138571587
YOL093W	TRM10	89.27165638	45.7727484	0.897883138	882	flat	1.950323271	0.963713274	0.512735512	-0.963713274
YOL094C	RFC4	125.9685112	128.5072142	0.134420763	972	flat	0.980244666	-0.028786209	1.020153473	0.028786209
YOL095C	HMI1	38.45762178	49.51757461	0.620719153	2121	flat	0.77664591	-0.364671104	1.28758806	0.364671104
YOL096C	COQ3	88.18656528	71.11824369	0.691721038	939	flat	1.2399992	0.31033919	0.806452133	-0.31033919
YOL097C	WRS1	255.736644	200.0269662	0.819160505	1299	flat	1.278510837	0.35446439	0.782159971	-0.35446439
YOL097W-A	YOL097W-A	114.1538252	79.15032979	0.834754241	186	flat	1.442240677	0.528311937	0.69336555	-0.528311937
YOL098C	YOL098C	100.2878379	109.954859	0.460062346	3114	flat	0.912081911	-0.132764701	1.096392755	0.132764701
YOL099C	YOL099C	13.30634527	11.10532663	0.2392272	492	flat	1.198194858	0.260862548	0.834588792	-0.260862548
YOL100W	PKH2	29.89856079	47.08416726	0.753733507	3246	flat	0.635002434	-0.655165974	1.574797114	0.655165974
YOL101C	IZH4	48.33302135	31.03341543	0.753450776	939	flat	1.557450918	0.639186699	0.642074808	-0.639186699
YOL102C	TPT1	227.7475883	192.289345	0.730194287	693	flat	1.184400458	0.244156954	0.844309028	-0.244156954
YOL103W	ITR2	138.3117064	181.795613	0.820320429	1830	flat	0.760808823	-0.394394117	1.314390645	0.394394117
YOL103W-A	YOL103W-A	1.003052319	0.688312006	0.06922575	1323	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YOL103W-B	YOL103W-B	50.80094418	60.30001231	0.55508192	5268	flat	0.842469881	-0.247302986	1.186986055	0.247302986
YOL104C	NDJ1	72.42947025	104.1915238	0.824191678	1059	flat	0.69515703	-0.524589187	1.438523896	0.524589187
YOL105C	WSC3	23.71885584	30.42722149	0.496491228	1671	flat	0.779527498	-0.35932818	1.282828383	0.35932818
YOL106W	YOL106W	18.24365158	29.15409666	0.655582137	354	flat	0.625766313	-0.676304099	1.598040641	0.676304099
YOL107W	YOL107W	56.31422305	55.75327249	0.045490793	1029	flat	1.010061303	0.014442856	0.990038919	-0.014442856
YOL108C	INO4	298.0015647	172.7414075	0.911041032	456	down	1.725131044	0.786705956	0.579666109	-0.786705956
YOL109W	ZEO1	4021.986396	3445.508768	0.75154415	342	flat	1.167312774	0.223191173	0.856668429	-0.223191173
YOL110W	SHR5	52.28852735	83.53880862	0.840938089	714	flat	0.625918998	-0.67595213	1.59765082	0.67595213
YOL111C	MDY2	57.87188055	64.12935099	0.415028273	639	flat	0.902424236	-0.148122281	1.108126267	0.148122281
YOL112W	MSB4	137.3396326	122.1160438	0.574140931	1479	flat	1.124664935	0.169495252	0.88915371	-0.169495252
YOL113W	SKM1	58.39507605	96.24616416	0.861461505	1968	flat	0.606726269	-0.72088232	1.648189722	0.72088232
YOL114C	YOL114C	105.9015721	112.8950364	0.347346672	609	flat	0.938053394	-0.092258052	1.066037399	0.092258052
YOL115W	PAP2	116.9507565	115.8835034	0.0599971	1755	flat	1.009209707	0.013225988	0.990874337	-0.013225988
YOL116W	MSN1	63.36828856	84.01000793	0.749818762	1149	flat	0.754294519	-0.406800151	1.3257421	0.406800151

YOL117W	RRI2	57.56433412	74.63337248	0.710439321	1938	flat	0.771294827	-0.37464566	1.296521077	0.37464566
YOL118C	YOL118C	8.875552266	7.367611521	0.184746991	309	flat	1.204671587	0.268639898	0.830101756	-0.268639898
YOL119C	MCH4	86.76562407	162.5561236	0.915202262	1506	up	0.533757955	-0.905742429	1.873508377	0.905742429
YOL120C	RPL18A	745.6015085	492.3823372	0.898811077	561	flat	1.514273466	0.598625769	0.6603827	-0.598625769
YOL121C	RPS19A	1241.009533	872.257456	0.885863419	435	flat	1.422756005	0.508688269	0.702861205	-0.508688269
YOL122C	SMF1	96.86559831	106.2760907	0.456394084	1728	flat	0.911452403	-0.133760775	1.097149995	0.133760775
YOL123W	HRP1	117.7384687	64.77530603	0.893518921	1605	flat	1.817644345	0.862069938	0.550162634	-0.862069938
YOL124C	TRM11	87.17818912	48.84239791	0.870516166	1302	flat	1.784887574	0.835833205	0.560259377	-0.835833205
YOL125W	TRM13	134.6512573	145.72734	0.443011454	1431	flat	0.923994477	-0.114043866	1.082257551	0.114043866
YOL126C	MDH2	163.2857725	75.88639867	0.951797883	1134	down	2.151713289	1.105485855	0.464745933	-1.105485855
YOL127W	RPL25	1367.663941	783.274996	0.917471364	429	down	1.746084004	0.804122968	0.572710132	-0.804122968
YOL128C	YGK3	63.13627455	99.29815996	0.851928375	1128	flat	0.635825222	-0.653297849	1.572759252	0.653297849
YOL129W	VPS68	527.3083994	525.5987684	0.026975497	555	flat	1.00325273	0.004685082	0.996757816	-0.004685082
YOL130W	ALR1	28.39244559	33.47237275	0.408576193	2580	flat	0.848235224	-0.237463701	1.178918267	0.237463701
YOL131W	YOL131W	12.44521061	19.95789078	0.555118167	327	flat	0.62357344	-0.681368615	1.603660349	0.681368615
YOL132W	GAS4	7.309956285	9.325023565	0.229215601	1416	flat	0.78390754	-0.351244593	1.275660647	0.351244593
YOL133W	HRT1	384.3334729	326.3529823	0.754088734	366	flat	1.177661899	0.235925408	0.849140148	-0.235925408
YOL134C	YOL134C	0.907376559	0.778322038	0.041829781	390	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YOL135C	MED7	20.49735165	26.54322465	0.471922575	669	flat	0.772225377	-0.372906131	1.294958739	0.372906131
YOL136C	PFK27	28.15603142	77.66597921	0.93876323	1194	up	0.362527219	-1.463838778	2.758413572	1.463838778
YOL137W	BSC6	81.60011889	96.50880687	0.635660432	1494	flat	0.845519922	-0.242089347	1.182704243	0.242089347
YOL138C	RTC1	17.27193309	19.22606226	0.209924605	4026	flat	0.898360406	-0.154633751	1.113138996	0.154633751
YOL139C	CDC33	1254.967503	900.9441287	0.880556764	642	flat	1.39294709	0.47814046	0.717902358	-0.47814046
YOL140W	ARG8	196.3432332	229.5682878	0.717014644	1272	flat	0.855271584	-0.225545487	1.16921925	0.225545487
YOL141W	PPM2	38.30276338	41.5776054	0.281114978	2088	flat	0.921235435	-0.118358191	1.085498845	0.118358191
YOL142W	RRP40	267.8549248	172.9748064	0.894229375	723	flat	1.54851987	0.630889896	0.645777958	-0.630889896
YOL143C	RIB4	398.2849344	169.3308268	0.965702479	510	down	2.352111201	1.233956268	0.425149967	-1.233956268
YOL144W	NOP8	91.2053758	73.33077425	0.69876758	1455	flat	1.243753073	0.31470009	0.804018114	-0.31470009
YOL145C	CTR9	111.2293835	107.4236033	0.208394954	3234	flat	1.035427784	0.050226936	0.965784399	-0.050226936
YOL146W	PSF3	297.6195114	265.6672555	0.622241554	585	flat	1.120271713	0.163848689	0.892640587	-0.163848689
YOL147C	PEX11	58.35732998	52.29864325	0.415419748	711	flat	1.115847876	0.158140357	0.896179508	-0.158140357
YOL148C	SPT20	101.9223843	79.85841403	0.742416993	1815	flat	1.276288611	0.351954607	0.783521839	-0.351954607
YOL149W	DCP1	355.9106332	245.7585382	0.883333333	696	flat	1.448212688	0.534273495	0.690506311	-0.534273495
YOL150C	YOL150C	3.686217272	2.432256368	0.167580107	312	flat	1.515554578	0.599845807	0.659824473	-0.599845807
YOL151W	GRE2	162.2365479	317.1151742	0.936443381	1029	up	0.51160134	-0.966908053	1.954646954	0.966908053
YOL152W	FRE7	5.983425137	6.517350396	0.089654922	1863	flat	0.918076331	-0.123313988	1.08923405	0.123313988
YOL153C	YOL153C	31.97255118	66.23761258	0.894432362	1746	flat	0.4826948	-1.050816809	2.071702449	1.050816809
YOL154W	ZPS1	265.5256025	69.00603186	0.981310715	750	down	3.847860765	1.944056596	0.259884663	-1.944056596
YOL155C	HPF1	6.915465461	4.494648957	0.269037263	2904	flat	1.538599683	0.621617916	0.649941639	-0.621617916
YOL155W-A	YOL155W-A	6.55327515	8.993943546	0.264847035	135	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YOL156W	HXT11	3.063194634	5.433181125	0.269001015	1704	flat	0.563793948	-0.826760105	1.77369765	0.826760105
YOL157C	IMA2	14.19506041	15.77751114	0.182601131	1770	flat	0.899702132	-0.152480653	1.111478971	0.152480653
YOL158C	ENB1	113.7322522	139.6043029	0.742351747	1821	flat	0.814675836	-0.295701977	1.227482092	0.295701977
YOL159C	YOL159C	182.7677959	273.2498619	0.887030593	516	flat	0.668866929	-0.58020888	1.495065695	0.58020888
YOL159C-A	YOL159C-A	314.9892913	431.4127866	0.867761346	273	flat	0.730134343	-0.453766155	1.369610963	0.453766155
YOL160W	YOL160W	6.467047846	7.544261856	0.145766275	342	flat	0.857214128	-0.222272468	1.166569666	0.222272468
YOL161C	PAU20	0.974867378	2.090534399	0.170632159	363	flat	0.466324485	-1.100593911	2.144429536	1.100593911
YOL162W	YOL162W	11.60475808	31.3851155	0.839169204	648	flat	0.369753557	-1.435364071	2.704504074	1.435364071
YOL163W	YOL163W	16.47955957	53.26927593	0.925010874	510	up	0.309363311	-1.692625985	3.232445364	1.692625985

YOL164W	BDS1	59.38968909	52.23298744	0.46507902	1941	flat	1.137014979	0.18525126	0.87949589	-0.18525126
YOL164W-A	YOL164W-A	1.450314992	1.658719097	0.055821372	183	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YOL165C	AAD15	10.44428227	17.56629599	0.542786719	432	flat	0.594563719	-0.750096664	1.681905519	0.750096664
YOL166C	YOL166C	1.043884537	0.895414734	0.045367551	339	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YOL166W-A	YOL166W-A	1.701331049	0.972902547	0.117203132	156	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YOR001W	RRP6	67.37641815	70.44132556	0.210236335	2202	flat	0.956489924	-0.064178324	1.045489319	0.064178324
YOR002W	ALG6	100.5356579	108.7008842	0.408982166	1635	flat	0.924883533	-0.11265639	1.081217217	0.11265639
YOR003W	YSP3	48.63652016	57.13923685	0.523191243	1437	flat	0.85119303	-0.232441757	1.17482165	0.232441757
YOR004W	UTP23	185.3805894	123.9973834	0.875750326	765	flat	1.4950363	0.580180514	0.66888008	-0.580180514
YOR005C	DNL4	28.33511351	46.25456681	0.765354502	2835	flat	0.612590615	-0.707004831	1.632411559	0.707004831
YOR006C	TSR3	183.7943236	137.7555645	0.832042917	942	flat	1.334206167	0.415981615	0.749509352	-0.415981615
YOR007C	SGT2	462.402494	667.7419902	0.888234015	1041	flat	0.69248677	-0.530141586	1.44407091	0.530141586
YOR008C	SLG1	61.7028031	66.60916963	0.339045962	1137	flat	0.926340974	-0.110384766	1.079516104	0.110384766
YOR008C-A	YOR008C-A	1.965982545	2.023637298	0.016840655	225	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YOR008W-B	YOR008W-B	8.673452405	16.36765461	0.578077425	102	flat	0.529914188	-0.91616934	1.887097992	0.91616934
YOR009W	TIR4	3.14234915	3.52477808	0.076489778	1464	flat	0.891502693	-0.165688939	1.121701604	0.165688939
YOR010C	TIR2	9.712889955	9.435610416	0.0369291	756	flat	1.029386497	0.041784763	0.971452416	-0.041784763
YOR011W	AUS1	12.07071003	17.73402578	0.469124257	4185	flat	0.680652559	-0.555009536	1.469178344	0.555009536
YOR011W-A	YOR011W-A	5.556037627	6.598817276	0.142844715	207	flat	0.841974765	-0.2481511	1.187684051	0.2481511
YOR012W	YOR012W	22.43784426	23.82906238	0.148861824	414	flat	0.941616749	-0.086788112	1.062003199	0.086788112
YOR013W	IRC11	11.83346182	22.23423146	0.659917355	471	flat	0.532218163	-0.90991035	1.878928736	0.90991035
YOR014W	RTS1	44.77927261	47.18705704	0.202834566	2274	flat	0.948973626	-0.075560103	1.053770066	0.075560103
YOR015W	YOR015W	123.3654047	96.54436275	0.766376686	360	flat	1.277810544	0.35367395	0.782588628	-0.35367395
YOR016C	ERP4	190.4072999	179.7437456	0.357568508	624	flat	1.059326428	0.083147219	0.943996085	-0.083147219
YOR017W	PET127	50.91673895	69.03356949	0.735732927	2403	flat	0.737564917	-0.439518061	1.355812861	0.439518061
YOR018W	ROD1	52.96188061	92.91103226	0.87185008	2514	flat	0.5700279	-0.810895561	1.754300096	0.810895561
YOR019W	YOR019W	26.86753163	33.21976412	0.475989561	2193	flat	0.808781529	-0.306178045	1.236427841	0.306178045
YOR020C	HSP10	2109.480897	3148.930935	0.896897202	321	flat	0.669903831	-0.577974093	1.492751577	0.577974093
YOR020W-A	YOR020W-A	959.8747745	901.741675	0.4538495	273	flat	1.064467575	0.090132005	0.939436788	-0.090132005
YOR021C	SFM1	701.552603	614.4197824	0.702406844	642	flat	1.141813176	0.191326615	0.875800018	-0.191326615
YOR022C	YOR022C	38.50964413	45.07962975	0.465680731	2148	flat	0.854258217	-0.227255875	1.170606241	0.227255875
YOR023C	AHC1	49.09755351	64.42090516	0.695548789	1701	flat	0.762136971	-0.391877794	1.312100106	0.391877794
YOR024W	YOR024W	2.457478181	6.558083836	0.428055676	324	flat	0.374725033	-1.416095737	2.668623423	1.416095737
YOR025W	HST3	55.16160846	34.3295613	0.788081775	1344	flat	1.606825324	0.684213104	0.622345183	-0.684213104
YOR026W	BUB3	135.7217775	110.6491739	0.733978541	1026	flat	1.226595488	0.294659549	0.815264698	-0.294659549
YOR027W	STI1	271.5555043	652.2800392	0.967152385	1770	up	0.416317361	-1.264244374	2.402013691	1.264244374
YOR028C	CIN5	69.63961819	71.78443117	0.141329564	888	flat	0.970121474	-0.043762689	1.030798747	0.043762689
YOR029W	YOR029W	0.263301234	1.355114262	0.168631289	336	flat	0.194301869	-2.363628317	5.146630887	2.363628317
YOR030W	DFG16	47.0408888	66.91058807	0.7623097	1860	flat	0.703041031	-0.508319205	1.422392089	0.508319205
YOR031W	CRS5	273.8332831	1044.341391	0.982427142	210	up	0.262206674	-1.931223686	3.813785452	1.931223686
YOR032C	HMS1	9.423157716	16.04953719	0.523256488	1305	flat	0.58712956	-0.7682492	1.703201588	0.7682492
YOR032W-A	YOR032W-A	18.04595918	26.42809904	0.575953313	201	flat	0.682832282	-0.550396829	1.464488464	0.550396829
YOR033C	EXO1	95.55849725	116.6541984	0.713252139	2109	flat	0.819160378	-0.28778216	1.22076217	0.28778216
YOR034C	AKR2	33.38238361	44.3851114	0.629280847	2250	flat	0.75210769	-0.410988846	1.329596829	0.410988846
YOR034C-A	YOR034C-A	34.58672996	48.71719421	0.696686965	243	flat	0.709949136	-0.494212427	1.408551611	0.494212427
YOR035C	SHE4	49.98323977	86.70901586	0.863259388	2370	flat	0.576448011	-0.794737595	1.734761817	0.794737595
YOR036W	PEP12	190.8159529	215.6679196	0.636262143	867	flat	0.884767439	-0.176629802	1.130240508	0.176629802
YOR037W	CYC2	120.8516791	148.4643985	0.748644338	1101	flat	0.814011172	-0.228484367	1.228484367	0.228484367
YOR038C	HIR2	71.03121867	69.82241704	0.083413078	2628	flat	1.017312515	0.024762938	0.982982108	-0.024762938

YOR039W	CKB2	269.9620433	285.7704022	0.379918805	777	flat	0.944681609	-0.082099923	1.058557709	0.082099923
YOR040W	GLO4	67.33146514	112.14913	0.875018124	858	flat	0.600374387	-0.736065665	1.665627352	0.736065665
YOR041C	YOR041C	3.071847727	3.864585117	0.121045382	432	flat	0.794871282	-0.331206839	1.258065328	0.331206839
YOR042W	CUE5	85.82086425	65.94012311	0.737501812	1236	flat	1.301496876	0.380171849	0.768346062	-0.380171849
YOR043W	WHI2	171.6702417	188.547315	0.537755546	1461	flat	0.910488923	-0.135286629	1.098311001	0.135286629
YOR044W	IRC23	428.5344231	487.6581653	0.694374366	474	flat	0.878759864	-0.186459116	1.137967311	0.186459116
YOR045W	TOM6	454.712737	334.5529404	0.866217196	186	flat	1.359165269	0.442720892	0.735745699	-0.442720892
YOR046C	DBP5	216.1970246	197.8597751	0.526750761	1449	flat	1.092678006	0.127868326	0.915182693	-0.127868326
YOR047C	STD1	89.86086509	115.6201759	0.765115268	1335	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YOR048C	RAT1	89.4941806	88.77276825	0.051623894	3021	flat	1.008126505	0.011676687	0.991939003	-0.011676687
YOR049C	RSB1	2.741299605	11.82830252	0.675148615	1065	flat	0.231757651	-2.109311128	4.314852158	2.109311128
YOR050C	YOR050C	2.033775047	4.797416008	0.32784544	348	flat	0.42393135	-1.238097435	2.35887249	1.238097435
YOR051C	ETT1	198.8593724	161.3275013	0.774343918	1239	flat	1.232643975	0.301756166	0.811264258	-0.301756166
YOR052C	TMC1	939.3751035	1109.650121	0.770392924	453	flat	0.846550715	-0.240331595	1.181264137	0.240331595
YOR053W	YOR053W	23.79873607	39.49642972	0.740901841	342	flat	0.60255411	-0.730837291	1.659601989	0.730837291
YOR054C	VHS3	130.4975525	164.2893688	0.78107148	2025	flat	0.794315259	-0.332216377	1.258945977	0.332216377
YOR055W	YOR055W	1.423642533	2.791223859	0.188871973	435	flat	0.510042406	-0.971310894	1.96062129	0.971310894
YOR056C	NOB1	152.3209085	129.9967003	0.681977671	1380	flat	1.171729037	0.228638984	0.853439634	-0.228638984
YOR057W	SGT1	89.06496681	105.5253308	0.650949688	1188	flat	0.844013445	-0.24462114	1.24462114	0.24462114
YOR058C	ASE1	40.10737528	49.96282832	0.585203712	2658	flat	0.802744293	-0.316987592	1.245726701	0.316987592
YOR059C	LPL1	248.2107453	268.2104645	0.488255763	1353	flat	0.925432741	-0.111799954	1.080575558	0.111799954
YOR060C	SLD7	101.499564	82.94559854	0.695795273	774	flat	1.223688366	0.291236197	0.817201526	-0.291236197
YOR061W	CKA2	167.831304	160.2542184	0.305951863	1020	flat	1.047281661	0.0666495	0.954852966	-0.0666495
YOR062C	YOR062C	269.6831075	303.7336651	0.642576483	807	flat	0.88789337	-0.171541666	1.126261366	0.171541666
YOR063W	RPL3	964.800867	876.8660327	0.607974482	1164	flat	1.100283089	0.137874759	0.908857012	-0.137874759
YOR064C	YNG1	211.2537607	216.3912156	0.160823546	660	flat	0.976258487	-0.03466491	1.02431888	0.03466491
YOR065W	CYT1	119.4810037	87.63655072	0.810823546	930	flat	1.363369538	0.447176655	0.733476854	-0.447176655
YOR066W	MSA1	32.76637575	27.22273984	0.434659997	1890	flat	1.203639896	0.267403832	0.830813272	-0.267403832
YOR067C	ALG8	52.29581597	54.35461773	0.172444541	1734	flat	0.962122781	-0.05570708	1.039368384	0.05570708
YOR068C	VAM10	1.025730024	2.199605759	0.176591272	345	flat	0.466324485	-1.100593911	2.144429536	1.100593911
YOR069W	VPS5	71.01966531	71.54575654	0.044214876	2028	flat	0.992646786	-0.01064764	1.007407684	0.01064764
YOR070C	GYP1	41.69238846	42.34413468	0.059409888	1914	flat	0.984608347	-0.022378125	1.015632259	0.022378125
YOR071C	NRT1	18.11723481	24.8309418	0.506401334	1797	flat	0.729623345	-0.454776205	1.370570182	0.454776205
YOR072W	YOR072W	2.808546493	0.240909202	0.319479484	315	flat	11.65811214	3.543262279	0.085777181	-3.543262279
YOR072W-A	YOR072W-A	7.816557107	14.01917405	0.50784399	249	flat	0.557561885	-0.842796154	1.793522885	0.842796154
YOR072W-B	YOR072W-B	1.092212525	0.46843456	0.110946788	162	flat	2.331622427	1.221334184	0.428885907	-1.221334184
YOR073W	SGO1	39.51924304	32.87126575	0.479092359	1773	flat	1.202242814	0.265728303	0.831778729	-0.265728303
YOR073W-A	YOR073W-A	0.378073566	1.297203396	0.148093374	234	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YOR074C	CDC21	47.37695641	21.23160444	0.875496593	915	flat	2.231435526	1.157972123	0.448142009	-1.157972123
YOR075W	UFE1	287.9286252	327.8933921	0.67938234	1041	flat	0.878116583	-0.187515603	1.138800951	0.187515603
YOR076C	SKI7	60.28049421	97.93538794	0.859779614	2244	flat	0.615512896	-0.700139012	1.624661331	0.700139012
YOR077W	RTS2	62.90300375	47.55113393	0.697614905	699	flat	1.32284971	0.403649166	0.755943772	-0.403649166
YOR078W	BUD21	432.3332778	216.2468229	0.943823401	645	down	1.999258403	0.999464952	0.500185468	-0.999464952
YOR079C	ATX2	173.0878581	228.4647841	0.836225895	942	flat	0.757612858	-0.400467278	1.319935359	0.400467278
YOR080W	DIA2	77.848081	79.16480152	0.086871103	2199	flat	0.983367349	-0.024197641	1.016913975	0.024197641
YOR081C	TGL5	33.34306396	26.84692148	0.481745687	2250	flat	1.241969735	0.312630018	0.805172599	-0.312630018
YOR082C	YOR082C	5.173638276	11.09450273	0.530411773	342	flat	0.466324485	-1.100593911	2.144429536	1.100593911
YOR083W	WHI5	23.61171604	15.55329342	0.569276497	888	flat	1.5181168	0.602282792	0.658710845	-0.602282792
YOR084W	LPX1	23.33337531	21.77496319	0.173582717	1164	flat	1.07156899	0.099724737	0.933211029	-0.099724737

YOR085W	OST3	40.49587977	35.02449169	0.417703349	1053	flat	1.15621606	0.209411016	0.864890253	-0.209411016
YOR086C	TCB1	88.17108744	71.85872966	0.679911556	3561	flat	1.22700593	0.295142222	0.814991986	-0.295142222
YOR087W	YVC1	57.01640206	55.97931578	0.08784254	2028	flat	1.018526241	0.02648315	0.981810738	-0.02648315
YOR089C	VPS21	431.1651293	393.2186219	0.566869653	633	flat	1.096502315	0.132908858	0.911990778	-0.132908858
YOR090C	PTC5	48.94370158	52.09188507	0.248238365	1719	flat	0.9395648	-0.08993543	1.064322546	0.08993543
YOR091W	TMA46	59.32039818	50.15228274	0.543163694	1038	flat	1.182805546	0.242212913	0.845447507	-0.242212913
YOR092W	ECM3	28.0008426	32.29909694	0.365202262	1842	flat	0.86692339	-0.206023587	1.153504464	0.206023587
YOR093C	YOR093C	38.52085872	38.34970622	0.022531535	4947	flat	1.004462942	0.006424339	0.995556888	-0.006424339
YOR094W	ARF3	302.4300866	248.0055493	0.789444686	552	flat	1.219448869	0.286229268	0.820042583	-0.286229268
YOR095C	RKI1	305.6002211	217.9902726	0.872408293	777	flat	1.401898431	0.487381828	0.713318439	-0.487381828
YOR096W	RPS7A	1473.406133	808.1305492	0.922038567	573	down	1.823227862	0.866494876	0.548477796	-0.866494876
YOR097C	YOR097C	207.6010545	230.5336808	0.583710309	528	flat	0.900523749	-0.151163771	1.110464883	0.151163771
YOR098C	NUP1	39.21012541	42.1356234	0.255089169	3231	flat	0.930569486	-0.103814214	1.074610779	0.103814214
YOR099W	KTR1	167.1334653	159.733807	0.304182978	1182	flat	1.046324936	0.065330949	0.955326052	-0.065330949
YOR100C	CRC1	15.37422326	76.65760191	0.970479919	984	up	0.20055706	-2.317915343	4.986112185	2.317915343
YOR101W	RAS1	164.0961237	122.5606138	0.825518341	930	flat	1.338897699	0.421045733	0.746883052	-0.421045733
YOR102W	YOR102W	5.545078973	1.297203396	0.449507032	351	flat	4.274641117	2.095803302	0.233937768	-2.095803302
YOR103C	OST2	309.3045821	320.9241593	0.264528056	393	flat	0.963793386	-0.053204194	1.03756678	0.053204194
YOR104W	PIN2	81.27913702	105.1147289	0.759663622	849	flat	0.773242131	-0.371007847	1.293255966	0.371007847
YOR105W	YOR105W	22.99658482	31.56131565	0.572060316	327	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YOR106W	VAM3	63.65214613	53.79739999	0.558380455	852	flat	1.183182573	0.242672708	0.845178101	-0.242672708
YOR107W	RG52	22.73563685	35.25045616	0.684478759	930	flat	0.644974259	-0.63268651	1.550449472	0.63268651
YOR108C-A	YOR108C-A	3.370255792	3.613638032	0.057880238	210	flat	0.932648971	-0.100593911	1.072214768	0.100593911
YOR108W	LEU9	107.8690753	95.91371821	0.541561548	1815	flat	1.124646999	0.169472243	0.889167891	-0.169472243
YOR109W	INP53	50.35612331	68.53518917	0.736327389	3324	flat	0.73474844	-0.444677705	1.361010035	0.444677705
YOR110W	TFC7	105.6490161	100.7177279	0.270748151	1308	flat	1.048961472	0.068961689	0.95332386	-0.068961689
YOR111W	YOR111W	124.2872227	170.0115884	0.83816152	699	flat	0.731051476	-0.451955099	1.367892731	0.451955099
YOR112W	CEX1	32.7792759	42.42467957	0.59046687	2286	flat	0.772646399	-0.372119778	1.294253104	0.372119778
YOR113W	AZF1	26.68579586	32.56618493	0.453052052	2745	flat	0.81943267	-0.287302683	1.220356519	0.287302683
YOR114W	YOR114W	45.48417244	52.47737399	0.471705089	885	flat	0.866738729	-0.206330924	1.153750221	0.206330924
YOR115C	TRS33	347.6281032	327.0543923	0.426323039	807	flat	1.062906083	0.088014128	0.940816894	-0.088014128
YOR116C	RPO31	59.74649213	66.9005349	0.446244744	4383	flat	0.893064491	-0.163163735	1.119739963	0.163163735
YOR117W	RPT5	840.6948118	828.4119812	0.131984921	1305	flat	1.014826959	0.021233751	0.985389668	-0.021233751
YOR118W	RTC5	82.70625513	79.44914039	0.216238944	1704	flat	1.040996224	0.057964835	0.960618278	-0.057964835
YOR119C	RIO1	98.3801987	103.2680889	0.270030448	1455	flat	0.952667951	-0.069954639	1.049683679	0.069954639
YOR120W	GCY1	178.9169738	279.1391065	0.896396984	939	flat	0.6409599	-0.641693994	1.560160004	0.641693994
YOR121C	YOR121C	20.81628577	13.88770695	0.526228795	306	flat	1.498900132	0.583904263	0.667155856	-0.583904263
YOR122C	PFY1	1050.020441	913.4252606	0.723894447	381	flat	1.149541716	0.201058821	0.869911884	-0.201058821
YOR123C	LEO1	75.02443067	55.16043602	0.750369726	1395	flat	1.360113083	0.443726605	0.735232984	-0.443726605
YOR124C	UBP2	66.20712624	79.99964416	0.638531245	3819	flat	0.827592759	-0.273007072	1.208323767	0.273007072
YOR125C	CAT5	110.2714569	77.39980263	0.825554589	702	flat	1.424699458	0.510657613	0.701902422	-0.510657613
YOR126C	IAH1	184.7118747	156.2180257	0.713563868	717	flat	1.182397959	0.241715684	0.845738943	-0.241715684
YOR127W	RGA1	44.84897681	57.2159355	0.642540235	3024	flat	0.783854645	-0.351341944	1.27574673	0.351341944
YOR128C	ADE2	241.2281205	328.5757238	0.862991156	1716	flat	0.734162943	-0.445827798	1.362095444	0.445827798
YOR129C	AF11	21.27615338	29.70944019	0.571117877	2682	flat	0.716141174	-0.481684079	1.396372721	0.481684079
YOR130C	ORT1	236.018553	183.5432123	0.819682471	879	flat	1.285901832	0.36278051	0.77766434	-0.36278051
YOR131C	YOR131C	377.5763737	344.6651653	0.561454255	657	flat	1.095487481	0.131572997	0.912835626	-0.131572997
YOR132W	VPS17	45.89073386	43.35056349	0.209293896	1656	flat	1.058596017	0.082152131	0.944647423	-0.082152131
YOR133W	EFT1	137.5488144	89.77940088	0.867986081	2529	flat	1.532075432	0.61548733	0.652709377	-0.61548733

YOR134W	BAG7	8.199585737	15.05388722	0.536936349	1230	flat	0.544682288	-0.87651314	1.835932656	0.87651314
YOR135C	IRC14	1.552091483	0.443780109	0.170284182	342	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YOR136W	IDH2	230.3387658	343.4714116	0.890778599	1110	flat	0.670619906	-0.576432788	1.491157646	0.576432788
YOR137C	SIA1	76.02009552	76.25182274	0.017253878	1869	flat	0.996961027	-0.004390986	1.003048236	0.004390986
YOR138C	RUP1	80.39464336	76.8650923	0.223430477	2016	flat	1.045918777	0.064770821	0.956097186	-0.064770821
YOR139C	YOR139C	2.701350062	4.634283888	0.231549949	393	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YOR140W	SFL1	14.11047446	16.35795469	0.239676671	2301	flat	0.862606281	-0.213225874	1.159277439	0.213225874
YOR141C	ARP8	42.09476232	56.09742849	0.681818182	2646	flat	0.750386666	-0.414293904	1.332646282	0.414293904
YOR142W	LSC1	161.3892944	74.96656353	0.951522401	990	down	2.152817026	1.106225706	0.46450766	-1.106225706
YOR142W-A	YOR142W-A	0.534961237	0.688312006	0.045367551	1323	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YOR142W-B	YOR142W-B	44.38575057	57.21730742	0.655284906	5268	flat	0.775739939	-0.366355014	1.289091807	0.366355014
YOR143C	THI80	197.7655566	170.270107	0.693018704	960	flat	1.161481367	0.21596601	0.860969473	-0.21596601
YOR144C	ELG1	31.53763666	25.23158878	0.476083805	2376	flat	1.249926706	0.3218435	0.800046911	-0.3218435
YOR145C	PNO1	347.4427334	306.8570012	0.666246194	825	flat	1.132262689	0.179208708	0.883187276	-0.179208708
YOR146W	YOR146W	1.445575401	1.487968601	0.014122082	306	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YOR147W	MDM32	214.5697964	292.5016672	0.860192837	1869	flat	0.733567772	-0.446997836	1.363200563	0.446997836
YOR148C	SPP2	575.3669884	484.1497836	0.773756706	558	flat	1.188406993	0.249028999	0.841462568	-0.249028999
YOR149C	SMP3	34.10998729	59.8871386	0.828135421	1551	flat	0.569571165	-0.812051985	1.755706858	0.812051985
YOR150W	MRPL23	225.1289768	210.0757622	0.447672901	492	flat	1.071656123	0.099842043	0.933135153	-0.099842043
YOR151C	RPB2	209.4132509	215.7858139	0.19953603	3675	flat	0.97046811	-0.043247289	1.030430562	0.043247289
YOR152C	YOR152C	44.86571061	38.18926418	0.469312745	771	flat	1.174825218	0.232446139	0.851190445	-0.232446139
YOR153W	PDR5	90.65363958	122.4621777	0.806836306	4536	flat	0.740258268	-0.433899396	1.35087988	0.433899396
YOR154W	SLP1	110.8874339	104.2792689	0.341452806	1764	flat	1.063369882	0.08864351	0.940406548	-0.08864351
YOR155C	ISN1	183.084849	171.1790752	0.429955053	1353	flat	1.069551572	0.097006049	0.934971278	-0.097006049
YOR156C	NFI1	23.89196119	28.18339428	0.370204437	2181	flat	0.847731858	-0.23832009	1.179618285	0.23832009
YOR157C	PUP1	592.7212261	504.171468	0.754559954	786	flat	1.175634211	0.233439247	0.850604712	-0.233439247
YOR158W	PET123	164.7357788	136.7065322	0.733746556	957	flat	1.205032241	0.269071746	0.829853315	-0.269071746
YOR159C	SME1	496.6692745	416.9757906	0.771183123	285	flat	1.191122568	0.252321876	0.839544163	-0.252321876
YOR160W	MTR10	56.58513995	75.39244815	0.735856169	2919	flat	0.750541219	-0.413996789	1.33237186	0.413996789
YOR161C	PNS1	54.77445813	51.8088623	0.228497898	1620	flat	1.057241092	0.080304404	0.945858053	-0.080304404
YOR161C-C	YOR161C-C	3.009156957	3.097404027	0.019878208	147	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YOR161W-A	YOR161W-A	6.55327515	1.873738239	0.469870958	81	flat	3.497433641	1.806296684	0.285923938	-1.806296684
YOR161W-B	YOR161W-B	2.033775047	1.163009941	0.131607945	261	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YOR162C	YRR1	28.25342363	61.94426131	0.902377845	2433	up	0.456110429	-1.132544935	2.19245151	1.132544935
YOR163W	DDP1	77.70311964	64.51013079	0.629672321	567	flat	1.204510341	0.26844678	0.830212881	-0.26844678
YOR164C	GET4	192.3899213	154.0356505	0.786022909	939	flat	1.248996064	0.320768931	0.800643035	-0.320768931
YOR165W	SEY1	89.53190779	101.4423073	0.550695955	2331	flat	0.882589426	-0.180185631	1.133029663	0.180185631
YOR166C	SWT1	72.8570002	68.22611587	0.299463535	1377	flat	1.067875538	0.094743509	0.936438718	-0.094743509
YOR167C	RPS28A	2191.34775	1256.589484	0.917565608	204	down	1.743885158	0.802305036	0.573432256	-0.802305036
YOR168W	GLN4	299.4482673	250.8310922	0.763549369	2430	flat	1.193824357	0.255590593	0.83764416	-0.255590593
YOR169C	YOR169C	10.84461339	12.07654516	0.154588952	465	flat	0.897989719	-0.155229168	1.113598496	0.155229168
YOR170W	YOR170W	1.156460321	3.471926736	0.291677541	306	flat	0.333088918	-1.586020738	3.002201351	1.586020738
YOR171C	LCB4	102.8130232	130.8888604	0.771009134	1875	flat	0.78549865	-0.348319299	1.273076663	0.348319299
YOR172W	YRM1	102.183629	130.0450525	0.77015369	2361	flat	0.785755605	-0.347847436	1.272660345	0.347847436
YOR173W	DCS2	207.9276454	196.2185035	0.363549369	1062	flat	1.059673995	0.083620492	0.943686459	-0.083620492
YOR174W	MED4	144.9653445	117.3354609	0.754103233	855	flat	1.235477693	0.305068963	0.809403525	-0.305068963
YOR175C	ALE1	81.28703636	79.31352635	0.135682181	1860	flat	1.024882389	0.035458362	0.975721713	-0.035458362
YOR176W	HEM15	69.38321647	56.36908463	0.638502247	1182	flat	1.230873571	0.299682583	0.812431125	-0.299682583
YOR177C	MPC54	15.03025365	35.35925386	0.839901406	1395	flat	0.425072704	-1.234218475	2.352538732	1.234218475

YOR178C	GAC1	11.9964552	29.88305707	0.819501232	2382	flat	0.401446719	-1.316719574	2.490990594	1.316719574
YOR179C	SYC1	180.2150666	142.1364293	0.794026388	567	flat	1.267902026	0.342443269	0.788704474	-0.342443269
YOR180C	DCI1	85.75876065	50.59093245	0.858271712	816	flat	1.695140937	0.761405227	0.58992145	-0.761405227
YOR181W	LAS17	42.69965244	49.55357894	0.467290126	1902	flat	0.861686549	-0.214764931	1.160514808	0.214764931
YOR182C	RPS30B	965.3281481	645.824872	0.896447731	192	flat	1.494721232	0.579876444	0.669021072	-0.579876444
YOR183W	FYV12	17.92068705	19.84721196	0.208445701	390	flat	0.902932214	-0.14731041	1.107502849	0.14731041
YOR184W	SER1	293.4824701	309.4223191	0.38031028	1188	flat	0.948485135	-0.076302932	1.054312781	0.076302932
YOR185C	GSP2	144.5130608	111.483186	0.793982891	663	flat	1.29627674	0.374373749	0.77144021	-0.374373749
YOR186C-A	YOR186C-A	68.66896175	69.38185021	0.051268668	210	flat	0.989725145	-0.014900163	1.010381524	0.014900163
YOR186W	YOR186W	9.965497728	15.00282824	0.440220386	435	flat	0.664241273	-0.590220727	1.505477062	0.590220727
YOR187W	TUF1	478.0300024	386.5932669	0.815513992	1314	flat	1.236519214	0.306284657	0.808721764	-0.306284657
YOR188W	MSB1	25.99139489	21.20551386	0.403023054	3414	flat	1.225690406	0.293594618	0.815866711	-0.293594618
YOR189W	IES4	281.2867334	198.0397185	0.874409163	351	flat	1.420355147	0.506251707	0.704049267	-0.506251707
YOR190W	SPR1	14.14978469	21.55219095	0.54691895	1338	flat	0.656535789	-0.607054438	1.523146213	0.607054438
YOR191W	ULS1	38.64611984	37.78705448	0.078483399	4860	flat	1.022734383	0.032431507	0.97777098	-0.032431507
YOR192C	THI72	7.470733671	11.3829598	0.375003625	1800	flat	0.656308535	-0.6075539	1.523673618	0.6075539
YOR192C-A	YOR192C-A	0.134349604	0.345723912	0.057351022	1317	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YOR192C-B	YOR192C-B	15.91879712	18.59666687	0.270900391	5313	flat	0.856002704	-0.224312741	1.168220609	0.224312741
YOR192C-C	YOR192C-C	27.62329905	28.1772282	0.057829491	237	flat	0.980341248	-0.028644069	1.028052969	0.028644069
YOR193W	PEX27	108.7287429	124.3973326	0.6	1131	flat	0.874044006	-0.194222177	1.144107154	0.194222177
YOR194C	TOA1	371.6529024	279.0433661	0.8546107	861	flat	1.331882236	0.413466526	0.750817131	-0.413466526
YOR195W	SLK19	194.4098433	217.8118126	0.601942874	2466	flat	0.892558769	-0.163980931	1.120374405	0.163980931
YOR196C	LIP5	126.4150463	128.9764013	0.134797738	1245	flat	0.980140902	-0.028938933	1.020261472	0.028938933
YOR197W	MCA1	171.5580842	135.0649374	0.794541105	1299	flat	1.27018964	0.345043908	0.787284015	-0.345043908
YOR198C	BFR1	199.2905236	125.7791548	0.890988836	1413	flat	1.584447947	0.663980265	0.63113465	-0.663980265
YOR199W	YOR199W	2.41279676	2.299587838	0.03045527	330	flat	1.049230092	0.06933109	0.953079794	-0.06933109
YOR200W	YOR200W	2.439000902	0.380382951	0.272350297	399	flat	6.411961675	2.680765802	0.155958512	-2.680765802
YOR201C	MRM1	285.9005125	272.0640701	0.341213571	1239	flat	1.050857294	0.071566765	0.951603996	-0.071566765
YOR202W	HIS3	42.29976019	24.49425236	0.768392055	663	flat	1.726925957	0.788206227	0.579063622	-0.788206227
YOR203W	YOR203W	92.71773613	51.44840588	0.877526461	354	flat	1.802149834	0.849718965	0.554892818	-0.849718965
YOR204W	DED1	173.8188534	326.5414731	0.926678266	1815	up	0.532302534	-0.909681662	1.878630923	0.909681662
YOR205C	GEP3	83.12188319	92.18993973	0.478070175	1671	flat	0.901637244	-0.149380985	1.109093493	0.149380985
YOR206W	NOC2	209.2485641	175.1115116	0.743192692	2133	flat	1.194944651	0.256943795	0.836858845	-0.256943795
YOR207C	RET1	109.6505395	123.1779225	0.558655937	3450	flat	0.890180134	-0.16783079	1.123368139	0.16783079
YOR208W	PTP2	44.56837927	97.74626229	0.934819487	2253	up	0.455959934	-1.133021038	2.193175159	1.133021038
YOR209C	NPT1	245.5192155	234.6007425	0.329650573	1290	flat	1.046540658	0.065628361	0.955529049	-0.065628361
YOR210W	RPB10	1068.691498	775.2525986	0.75253561	213	flat	1.378507469	0.463107084	0.725422257	-0.463107084
YOR211C	MGM1	73.65747528	59.08011385	0.667645353	2646	flat	1.246738885	0.318159341	0.802092573	-0.318159341
YOR212W	STE4	344.9742956	275.6251272	0.813911846	1272	flat	1.251606844	0.323781453	0.79897294	-0.323781453
YOR213C	SAS5	183.2153613	156.6490318	0.699318544	747	flat	1.169591406	0.226004615	0.854999443	-0.226004615
YOR214C	SPR2	2.115297675	1.7077108	0.082129912	711	flat	1.238674414	0.308797025	0.807314649	-0.308797025
YOR215C	AIM41	324.5456669	179.5162119	0.917855589	558	down	1.807890571	0.854307356	0.553130823	-0.854307356
YOR216C	RUD3	71.32260388	64.46432217	0.430897492	1455	flat	1.106388797	0.145858454	0.9038414	-0.145858454
YOR217W	RFC1	71.77432795	67.14156232	0.321821082	2586	flat	1.068999968	0.096261809	0.935453723	-0.096261809
YOR218C	YOR218C	1.053204935	0.722727606	0.071806583	420	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YOR219C	STE13	43.19044271	53.30503826	0.585747426	2796	flat	0.810250665	-0.303559795	1.234185966	0.303559795
YOR220W	RCN2	119.8436352	131.0419265	0.478903871	798	flat	0.91454421	-0.128875181	1.093440851	0.128875181
YOR221C	MCT1	23.93488445	29.28488721	0.429882558	1083	flat	0.817183458	-0.291268094	0.291268094	0.291268094
YOR222W	ODC2	132.51233	65.5382534	0.929889807	924	down	2.02190817	1.015717475	0.494582303	-1.015717475

YOR223W	DSC3	182.7759881	227.4001981	0.795440046	879	flat	0.80376354	-0.315156959	1.244147004	0.315156959
YOR224C	RPB8	471.2339794	368.5910792	0.835305205	441	flat	1.278473642	0.354422417	0.782182727	-0.354422417
YOR225W	YOR225W	8.846921453	8.278516218	0.092786719	330	flat	1.068660279	0.095803302	0.93575107	-0.095803302
YOR226C	ISU2	126.2235927	134.6943297	0.366695665	471	flat	0.937111406	-0.093707526	1.067108983	0.093707526
YOR227W	HER1	61.62811362	78.42203081	0.701602146	3741	flat	0.785852049	-0.34767037	1.272504158	0.34767037
YOR228C	MCP1	76.7901103	88.65935686	0.577432217	909	flat	0.86612528	-0.207352377	1.154567385	0.207352377
YOR229W	WTM2	41.33604325	33.18678688	0.539575178	1404	flat	1.245557258	0.316791343	0.802853497	-0.316791343
YOR230W	WTM1	185.6237629	171.1775385	0.487951283	1314	flat	1.084393224	0.116888003	0.922174704	-0.116888003
YOR231C-A	YOR231C-A	0.880290692	5.285619808	0.461512252	201	flat	0.166544459	-2.586020738	6.004402701	2.586020738
YOR231W	MKK1	91.42398201	118.1780328	0.773307235	1527	flat	0.773612319	-0.370317326	1.29263712	0.370317326
YOR232W	MGE1	597.9076609	405.1693018	0.892199507	687	flat	1.475698327	0.561397826	0.677645276	-0.561397826
YOR233W	KIN4	43.44305998	36.94843381	0.463027403	2403	flat	1.175775412	0.233612513	0.850502562	-0.233612513
YOR234C	RPL33B	880.8694014	651.5924725	0.867964332	324	flat	1.351871666	0.434958202	0.739715185	-0.434958202
YOR235W	IRC13	54.48580196	36.61819872	0.75168914	315	flat	1.487943259	0.573319512	0.672068638	-0.573319512
YOR236W	DFR1	44.65191488	27.68183096	0.754422213	636	flat	1.613040515	0.689782676	0.61994723	-0.689782676
YOR237W	HES1	22.71048802	21.63198491	0.11660867	1305	flat	1.049856872	0.070192658	0.952510791	-0.070192658
YOR238W	YOR238W	40.64539571	50.59093245	0.58737857	912	flat	0.803412662	-0.315786896	1.244690366	0.315786896
YOR239W	ABP140	54.90060954	46.81068789	0.51230245	1887	flat	1.172822106	0.229984201	0.852644229	-0.229984201
YOR241W	MET7	275.0764102	278.6648082	0.116376686	1647	flat	0.987122888	-0.018698397	1.013045095	0.018698397
YOR242C	SSP2	48.5946492	40.66314194	0.518247064	1116	flat	1.19505397	0.257075773	0.836782292	-0.257075773
YOR243C	PUS7	161.649067	138.3964651	0.677975932	2031	flat	1.168014421	0.224058086	0.856153813	-0.224058086
YOR244W	ESA1	116.23982	123.0743536	0.321342613	1338	flat	0.944468255	-0.082425789	1.058796836	0.082425789
YOR245C	DGA1	90.15836421	105.4078378	0.632818617	1257	flat	0.855328846	-0.2254489	1.169140974	0.2254489
YOR246C	ENV9	455.3536309	424.9026955	0.482137161	993	flat	1.071665668	0.099854892	0.933126842	-0.099854892
YOR247W	SRL1	20.68474526	11.02930281	0.63953168	633	flat	1.875435431	0.907225593	0.533209506	-0.907225593
YOR248W	YOR248W	53.13992424	24.54411574	0.884297521	303	flat	2.165077968	1.11441898	0.461877131	-1.11441898
YOR249C	APC5	87.86738314	83.40866559	0.277432217	2058	flat	1.053456287	0.075130451	0.949256284	-0.075130451
YOR250C	CLP1	39.40781155	47.52825268	0.526373786	1338	flat	0.829144968	-0.27030373	1.206061712	0.27030373
YOR251C	TUM1	151.2195099	128.8824738	0.682050167	915	flat	1.173313216	0.230588193	0.85228734	-0.230588193
YOR252W	TMA16	169.1953134	119.5528739	0.853610265	537	flat	1.41523418	0.501040797	0.70659684	-0.501040797
YOR253W	NAT5	319.8886853	262.6726944	0.785218211	531	flat	1.217822378	0.284303728	0.82113781	-0.284303728
YOR254C	SEC63	286.2369918	268.726233	0.418754531	1992	flat	1.065162074	0.091072967	0.938824264	-0.091072967
YOR255W	OSW1	2.431053685	9.791793377	0.610192837	837	flat	0.24827461	-2.009991362	4.027798085	2.009991362
YOR256C	TRE2	87.19496658	95.06098664	0.41954473	2430	flat	0.91725291	-0.124608519	1.090211859	0.124608519
YOR257W	CDC31	160.0091349	149.8990591	0.382673626	486	flat	1.067445892	0.094162943	0.936815634	-0.094162943
YOR258W	HNT3	85.35791188	84.93707007	0.038697985	654	flat	1.004954748	0.00713054	0.99506968	-0.00713054
YOR259C	RPT4	374.0753089	334.2697683	0.632521386	1314	flat	1.119082084	0.162315861	0.8935895	-0.162315861
YOR260W	GCD1	140.9293705	137.7051978	0.144700594	1737	flat	1.023413588	0.033389293	0.977122067	-0.033389293
YOR261C	RPN8	1297.983432	1178.515025	0.610374076	1017	flat	1.101371984	0.139301816	0.90795845	-0.139301816
YOR262W	GPN2	192.2764825	201.7822248	0.320987386	1044	flat	0.952891082	-0.069616775	1.049437883	0.069616775
YOR263C	YOR263C	1.084181551	2.603945052	0.215434247	408	flat	0.416361148	-1.264092643	2.40176108	1.264092643
YOR264W	DSE3	198.8333623	111.7460967	0.908293461	1293	down	1.779331611	0.831335408	0.562008787	-0.831335408
YOR265W	RBL2	190.9942856	157.4465468	0.75554589	321	flat	1.21307383	0.278667359	0.824352133	-0.278667359
YOR266W	PNT1	143.1365122	129.6989235	0.514499058	1272	flat	1.103606015	0.142225226	0.906120469	-0.142225226
YOR267C	HRK1	35.81451097	58.04643828	0.799920255	2280	flat	0.616997563	-0.696663303	1.620751944	0.696663303
YOR268C	YOR268C	1.552091483	1.521531803	0.012295201	399	flat	1.020084812	0.028689106	0.980310645	-0.028689106
YOR269W	PAC1	70.59664594	67.6589844	0.206357837	1485	flat	1.043418647	0.061318121	0.958388086	-0.061318121
YOR270C	VPH1	267.3362234	243.4500637	0.564912281	2523	flat	1.098115233	0.135029454	0.135029454	-0.135029454
YOR271C	FSF1	116.5204289	82.98146846	0.824365666	984	flat	1.404174101	0.489721824	0.712162402	-0.489721824

YOR272W	YTM1	226.386515	162.0885189	0.861867479	1383	flat	1.396684457	0.482006119	0.715981334	-0.482006119
YOR273C	TPO4	79.53293023	143.1876694	0.901312165	1980	up	0.555445385	-0.84828303	1.800357022	0.84828303
YOR274W	MOD5	104.8294889	109.7905783	0.27122662	1287	flat	0.954813158	-0.066709647	1.047325324	0.066709647
YOR275C	RIM20	36.52807448	46.08207291	0.581977671	1986	flat	0.792674291	-0.335199909	1.261552205	0.335199909
YOR276W	CAF20	742.3404462	424.4017111	0.917565608	486	down	1.749145743	0.806650503	0.571707649	-0.806650503
YOR277C	YOR277C	6.585087165	10.31465613	0.365086269	309	flat	0.638420426	-0.647421283	1.566365922	0.647421283
YOR278W	HEM4	133.8791374	120.2451148	0.534333768	828	flat	1.113385252	0.154952878	0.898161708	-0.154952878
YOR279C	RFM1	164.8011735	144.7779096	0.628432652	933	flat	1.138303309	0.186885025	0.878500477	-0.186885025
YOR280C	FSH3	126.1321386	105.160927	0.695795273	801	flat	1.199420186	0.262337158	0.833736177	-0.262337158
YOR281C	PLP2	177.8631944	131.6774444	0.834652748	861	flat	1.350749137	0.43375976	0.74032992	-0.43375976
YOR282W	YOR282W	1.378025148	1.891249811	0.092576483	321	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YOR283W	YOR283W	478.857177	579.7151437	0.798644338	693	flat	0.826021508	-0.275748748	1.21062223	0.275748748
YOR284W	HUA2	171.0163095	85.0093537	0.935899667	732	down	2.011735204	1.008440422	0.497083313	-1.008440422
YOR285W	RDL1	1237.93708	1097.823234	0.674960128	420	flat	1.127628786	0.173292212	0.886816666	-0.173292212
YOR286W	RDL2	259.9028925	147.050977	0.912411193	450	down	1.767433973	0.82165632	0.565791999	-0.82165632
YOR287C	RRP36	335.0661281	264.0476906	0.823611715	903	flat	1.268960646	0.343647328	0.788046503	-0.343647328
YOR288C	MPD1	79.87189274	79.93050142	0.008539945	957	flat	0.999266755	-0.001058238	1.000733784	0.001058238
YOR289W	YOR289W	234.8647005	240.7084445	0.1961505	756	flat	0.97572273	-0.035456858	1.024881321	0.035456858
YOR290C	SNF2	49.20148218	52.40199282	0.250355227	5112	flat	0.938923875	-0.090919901	1.065049901	0.090919901
YOR291W	YPK9	48.10851381	49.35449418	0.104567203	4419	flat	0.97475447	-0.03688923	1.025899374	0.03688923
YOR292C	YOR292C	75.62690919	113.5848032	0.849376541	930	flat	0.665818904	-0.586798262	1.501909894	0.586798262
YOR293C-A	YOR293C-A	46.59378632	52.61456974	0.424735392	150	flat	0.885568133	-0.175324786	1.129218591	0.175324786
YOR293W	RPS10A	895.5421433	504.4775056	0.918848775	318	down	1.775187463	0.827971384	0.563320788	-0.827971384
YOR294W	RRS1	139.7871413	92.25405328	0.865912716	612	flat	1.515241188	0.599547452	0.659960941	-0.599547452
YOR295W	UAF30	50.35147435	44.62606268	0.409678121	687	flat	1.128297486	0.174147498	0.886291082	-0.174147498
YOR296W	YOR296W	28.39244559	32.47231943	0.346824706	3870	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YOR297C	TIM18	76.09269229	80.2115302	0.268138321	579	flat	0.948650301	-0.076051727	1.054129218	0.076051727
YOR298C-A	MBF1	878.4837793	2106.513233	0.967442366	456	up	0.417032167	-1.261769426	2.397896561	1.261769426
YOR298W	MUM3	7.18812368	6.745457659	0.071241119	1440	flat	1.065624312	0.091698903	0.938417028	-0.091698903
YOR299W	BUD7	65.88804955	77.13932002	0.580556764	2241	flat	0.85414351	-0.227449609	1.170763447	0.227449609
YOR300W	YOR300W	21.75941846	14.73522304	0.528265913	309	flat	1.476694204	0.562371102	0.677188275	-0.562371102
YOR301W	RAX1	34.49487722	24.59926073	0.613723358	1308	flat	1.402272922	0.487767166	0.71312794	-0.487767166
YOR302W	YOR302W	145.1802495	262.6836877	0.916122952	78	up	0.552680872	-0.855481413	1.809362421	0.855481413
YOR303W	CPA1	138.5731386	212.923973	0.886595621	1236	flat	0.650810412	-0.619690762	1.536545792	0.619690762
YOR304C-A	BIL1	422.4309248	232.5868842	0.919950703	231	down	1.816228487	0.860945709	0.550591518	-0.860945709
YOR304W	ISW2	65.26676219	60.11340055	0.355647383	3363	flat	1.085727335	0.118661837	0.921041561	-0.118661837
YOR305W	RRG7	324.3871199	308.3340368	0.347274177	729	flat	1.052063934	0.073222381	0.950512576	-0.073222381
YOR306C	MCH5	15.59227536	86.93499311	0.977214731	1566	up	0.179355571	-2.479105534	5.575516794	2.479105534
YOR307C	SLY41	105.9422092	110.2080004	0.240387125	1362	flat	0.961293271	-0.05695146	1.040265266	0.05695146
YOR308C	SNU66	32.24813205	32.17858628	0.009301145	1764	flat	1.002161244	0.003114651	0.997843417	-0.003114651
YOR309C	YOR309C	86.1471879	60.94813121	0.794990576	381	flat	1.41345085	0.499221718	0.707488343	-0.499221718
YOR310C	NOP58	111.335281	114.5212709	0.166325939	1536	flat	0.972179929	-0.040704745	1.028616175	0.040704745
YOR311C	DGK1	125.7620793	151.5989453	0.726257793	873	flat	0.829570938	-0.269562741	1.205442421	0.269562741
YOR312C	RPL20B	478.9951692	253.2470954	0.929918805	519	down	1.891414267	0.919465384	0.528704905	-0.919465384
YOR313C	SPS4	23.40041171	7.461789446	0.804074235	1017	flat	3.136032165	1.648940356	0.31887428	-1.648940356
YOR314W	YOR314W	2.41279676	2.759505406	0.072408293	330	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YOR314W-A	YOR314W-A	7.970199507	10.93857999	0.304965927	111	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YOR315W	SFG1	86.08963911	31.20017159	0.944526606	1041	down	2.759268129	1.464285656	0.362414942	-1.464285656
YOR316C	COT1	95.23844988	116.8190622	0.716318689	1320	flat	0.815264633	-0.294659664	1.226595585	0.294659664

YOR316C-A	YOR316C-A	5.476665661	11.5636417	0.533797303	210	flat	0.473610806	-1.078226098	2.111438313	1.078226098
YOR317W	FAA1	277.1025754	351.3219103	0.824800638	2103	flat	0.788742652	-0.342373434	1.267840654	0.342373434
YOR318C	YOR318C	132.9929369	133.9171741	0.056981296	306	flat	0.993098441	-0.009991362	1.006949521	0.009991362
YOR319W	HSH49	385.8470416	460.0465165	0.769646223	642	flat	0.838713103	-0.253750699	1.192302822	0.253750699
YOR320C	GNT1	131.2053595	139.5363726	0.36522401	1476	flat	0.940295043	-0.088814583	1.063495982	0.088814583
YOR321W	PMT3	50.10126605	51.86577027	0.146882703	2262	flat	0.965979408	-0.04993566	1.035218755	0.04993566
YOR322C	LDB19	40.00378402	49.72613018	0.57954183	2457	flat	0.804482148	-0.313867688	1.243035663	0.313867688
YOR323C	PRO2	225.2060968	156.754399	0.870980136	1371	flat	1.436681192	0.522739955	0.696048647	-0.522739955
YOR324C	FRT1	74.1889433	76.01224676	0.130020299	1809	flat	0.97601303	-0.035027686	1.024576485	0.035027686
YOR325W	YOR325W	0.74657565	2.881761975	0.277301725	474	flat	0.259069159	-1.948590818	3.859973165	1.948590818
YOR326W	MYO2	89.19943662	81.94124995	0.408010729	4725	flat	1.088577934	0.122444698	0.91862968	-0.122444698
YOR327C	SNC2	329.7257794	333.2023482	0.115629984	348	flat	0.989566194	-0.01513188	1.010543818	0.01513188
YOR328W	PDR10	18.42873095	20.55963772	0.223894447	4695	flat	0.896354848	-0.157858117	1.115629599	0.157858117
YOR329C	SCD5	23.57827863	34.53859764	0.646360737	2619	flat	0.68266462	-0.550751111	1.464848142	0.550751111
YOR329W-A	YOR329W-A	9.268203427	23.1272834	0.766434682	210	flat	0.400747605	-1.319234198	2.495336188	1.319234198
YOR330C	MIP1	33.93082225	44.54420745	0.617355372	3765	flat	0.761733662	-0.392641444	1.312794813	0.392641444
YOR331C	YOR331C	1.902563753	1.631965563	0.064013339	558	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YOR332W	VMA4	524.3880365	363.649352	0.887095839	702	flat	1.442015594	0.528086766	0.693473776	-0.528086766
YOR333C	YOR333C	2.121563898	11.64683337	0.690604611	417	flat	0.182158002	-2.456737721	5.489739613	2.456737721
YOR334W	MRS2	79.45324362	77.55128073	0.120392924	1413	flat	1.024525229	0.034955511	0.97606186	-0.034955511
YOR335C	ALA1	113.1926238	104.0833261	0.438531245	2877	flat	1.08751928	0.121040977	0.919523928	-0.121040977
YOR335W-A	YOR335W-A	1.092212525	0.936869119	0.047629404	81	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YOR336W	KRE5	27.82743229	46.22070548	0.771045382	4098	flat	0.602055551	-0.732031487	1.660976299	0.732031487
YOR337W	TEA1	41.1304243	48.99332405	0.513346382	2280	flat	0.839510792	-0.252379223	1.191169916	0.252379223
YOR338W	YOR338W	30.29989582	65.32345673	0.905596636	1092	up	0.463844036	-1.108288303	2.158288303	1.108288303
YOR339C	UBC11	37.75437817	34.80140576	0.264230825	471	flat	1.084852102	0.117498373	0.921784636	-0.117498373
YOR340C	RPA43	122.8288177	93.60096064	0.788408003	981	flat	1.312260226	0.39205384	0.762043976	-0.39205384
YOR341W	RPA190	108.7135213	91.64099235	0.662679426	4995	flat	1.186297949	0.246466401	0.842958551	-0.246466401
YOR342C	YOR342C	59.16378721	58.17957231	0.075170364	960	flat	1.016916847	0.024201715	0.983364572	-0.024201715
YOR343C	YOR343C	2.976028623	4.641369949	0.20769175	327	flat	0.641196167	-0.641162293	1.559585117	0.641162293
YOR343W-A	YOR343W-A	0.268699209	0.057620652	0.057351022	1317	flat	4.663244854	2.221334184	0.214442954	-2.221334184
YOR343W-B	YOR343W-B	23.24544014	25.96677447	0.263288386	5313	flat	0.89519937	-0.159719074	1.117069598	0.159719074
YOR344C	TYE7	131.996876	139.8180907	0.333761056	876	flat	0.944061497	-0.083047254	1.059253029	0.083047254
YOR345C	YOR345C	0.504098088	1.729604528	0.184377265	351	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YOR346W	REV1	52.75851739	53.41294186	0.059409888	2958	flat	0.987747829	-0.017785324	1.012404148	0.017785324
YOR347C	PYK2	73.28810671	66.45672783	0.41876903	1521	flat	1.102794391	0.141163835	0.906787347	-0.141163835
YOR348C	PUT4	9.955134543	13.85611526	0.367674351	1884	flat	0.71846505	-0.477010116	1.391856152	0.477010116
YOR349W	CIN1	18.15870577	26.41694009	0.5715456	3045	flat	0.687388687	-0.540801986	1.454780997	0.540801986
YOR350C	MNE1	98.28432317	141.1060345	0.848071625	1992	flat	0.696528136	-0.521746464	1.435692183	0.521746464
YOR351C	MEK1	2.960817086	6.095293066	0.348129622	1494	flat	0.485754672	-1.041700222	2.058652355	1.041700222
YOR352W	TFB6	67.12344474	87.50466513	0.740952588	1032	flat	0.767084185	-0.382543177	1.303637879	0.382543177
YOR353C	SOG2	58.68160021	71.09559067	0.622792518	2376	flat	0.825390149	-0.276851874	1.211548261	0.276851874
YOR354C	MSC6	71.70304304	87.5304344	0.671284616	2079	flat	0.819179272	-0.287748884	1.220734013	0.287748884
YOR355W	GDS1	93.93863059	89.86419932	0.236037408	1569	flat	1.045339872	0.063972083	0.956626669	-0.063972083
YOR356W	CIR2	83.05654106	99.42078813	0.661925475	1896	flat	0.835404171	-0.259453749	1.197025386	0.259453749
YOR357C	SNX3	657.0964973	647.7501596	0.129810062	489	flat	1.014428924	0.020667786	0.985776309	-0.020667786
YOR358W	HAP5	67.8385335	72.86759817	0.333297086	729	flat	0.930983526	-0.103172455	1.074132862	0.103172455
YOR359W	VTS1	31.62830697	25.3920138	0.473111498	1572	flat	1.245600574	0.316841515	0.802825577	-0.316841515
YOR360C	PDE2	236.477483	307.0975197	0.838995215	1581	flat	0.770040355	-0.376994041	1.298633239	0.376994041

YOR361C	PRT1	149.6488415	128.4638861	0.667739597	2292	flat	1.164909813	0.220218266	0.858435553	-0.220218266
YOR362C	PRE10	513.2643011	496.1062372	0.274575903	867	flat	1.034585463	0.049052825	0.966570705	-0.049052825
YOR363C	PIP2	19.19642936	28.51765701	0.605422648	2991	flat	0.673141884	-0.571017469	1.485570908	0.571017469
YOR364W	YOR364W	22.77662705	33.7272883	0.647549659	369	flat	0.675317471	-0.566362213	1.480785027	0.566362213
YOR365C	YOR365C	14.61920259	13.65380279	0.127649703	2112	flat	1.070705562	0.098561802	0.93396358	-0.098561802
YOR366W	YOR366W	70.72538901	54.8782996	0.697150935	354	flat	1.288767865	0.365992427	0.775934928	-0.365992427
YOR367W	SCP1	119.2793887	124.8413059	0.281165724	603	flat	0.955448101	-0.065750585	1.046629323	0.065750585
YOR368W	RAD17	115.0246504	123.2052808	0.393743657	1206	flat	0.933601626	-0.099121022	1.071120671	0.099121022
YOR369C	RPS12	4541.829259	2582.948162	0.918029578	432	down	1.758389628	0.814254782	0.568702172	-0.814254782
YOR370C	MRS6	125.868452	104.8672971	0.696049007	1812	flat	1.200264101	0.263351885	0.83314997	-0.263351885
YOR371C	GPB1	36.84575304	50.81628181	0.689314195	2694	flat	0.725077706	-0.463792479	1.379162525	0.463792479
YOR372C	NDD1	40.9136908	34.18306246	0.479346093	1665	flat	1.196899513	0.259302034	0.835492027	-0.259302034
YOR373W	NUD1	34.05857085	37.0525139	0.266565173	2556	flat	0.919197303	-0.12155353	1.087905716	0.12155353
YOR374W	ALD4	410.474471	411.8296482	0.026497028	1560	flat	0.996709374	-0.004755197	1.00330149	0.004755197
YOR375C	GDH1	328.9888153	251.8427736	0.844577352	1365	flat	1.306326208	0.385515203	0.765505579	-0.385515203
YOR376W	YOR376W	1.678277782	3.290467151	0.212592431	369	flat	0.510042406	-0.971310894	1.96062129	0.971310894
YOR376W-A	YOR376W-A	286.9578369	608.0640919	0.956125852	156	up	0.471920379	-1.083384621	2.119001518	1.083384621
YOR377W	ATF1	35.71285783	30.77775358	0.395331303	1578	flat	1.160346474	0.214555651	0.861811556	-0.214555651
YOR378W	AMF1	4.114847187	7.941599861	0.38877048	1548	flat	0.518138317	-0.948590818	1.929986583	0.948590818
YOR379C	YOR379C	10.96078764	12.98351364	0.224394664	339	flat	0.84420812	-0.244329389	1.184542029	0.244329389
YOR380W	RDR1	44.90850439	61.1345637	0.716224445	1641	flat	0.734584524	-0.444999592	1.361313732	0.444999592
YOR381W	FRE3	33.05170093	37.16159785	0.343272437	2136	flat	0.889404731	-0.169088016	1.124347516	0.169088016
YOR381W-A	YOR381W-A	10.53204935	15.35796164	0.426381035	168	flat	0.685771302	-0.544200563	1.458212085	0.544200563
YOR382W	FIT2	56.29859106	71.28722299	0.678686385	462	flat	0.78974308	-0.340544704	1.266234583	0.340544704
YOR383C	FIT3	14.81679528	12.58603685	0.240278382	615	flat	1.177240735	0.849443933	0.235409369	-0.235409369
YOR384W	FRE5	4.412852907	7.206478147	0.300688705	2085	flat	0.612345284	-0.707582718	1.63306557	0.707582718
YOR385W	YOR385W	200.0437909	258.8656303	0.829411338	873	flat	0.772770764	-0.37188758	1.294044814	0.37188758
YOR386W	PHR1	84.5094617	132.2872439	0.871661592	1698	flat	0.638833037	-0.646489173	1.565354236	0.646489173
YOR387C	YOR387C	1.852012542	0.977602559	0.133949543	621	flat	1.894443222	0.921773902	0.527859578	-0.921773902
YOR388C	FDH1	1.877330812	5.501931645	0.396534725	1131	flat	0.341213038	-1.55125532	2.930720366	1.55125532
YOR389W	YOR389W	19.67555331	34.96845251	0.741220821	1875	flat	0.562665829	-0.829649745	1.777253831	0.829649745
YOR390W	FEX1	45.64635005	58.39485288	0.65108018	1128	flat	0.781684477	-0.355341706	1.279288548	0.355341706
YOR391C	HSP33	21.18800516	54.41713742	0.907032043	714	up	0.38936273	-1.360813301	2.568299234	1.360813301
YOR392W	YOR392W	0.996274938	1.709153123	0.114680296	444	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YOR393W	ERR1	9.35861554	15.59309562	0.505444396	1314	flat	0.600176884	-0.736540341	1.666175467	0.736540341
YOR394C-A	YOR394C-A	0.263301234	0.903409508	0.113766855	168	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YOR394W	PAU21	1.251079801	2.146281983	0.134094534	495	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YOR396C-A	YOR396C-A	0.549498227	0.314229394	0.060432072	483	flat	1.74871682	0.806296684	0.571847876	-0.806296684
YOR396W	YRF1-8	27.06097844	21.9030303	0.423952443	5391	flat	1.235490161	0.305083522	0.809395357	-0.305083522
YPL001W	HAT1	155.3912604	169.0411689	0.48260838	1125	flat	0.919250981	-0.121469284	1.08784219	0.121469284
YPL002C	SNF8	197.8584997	214.9033626	0.501355662	702	flat	0.920685918	-0.119219014	1.086146731	0.119219014
YPL003W	ULA1	147.3849981	162.2624939	0.52569958	1389	flat	0.908312171	-0.138739883	1.100943081	0.138739883
YPL004C	LSP1	602.9875411	339.3438568	0.91831231	1026	down	1.77692193	0.829380298	0.562770926	-0.829380298
YPL005W	AEP3	59.80538335	93.34735476	0.844606351	1821	flat	0.640675716	-0.642333787	1.560852043	0.642333787
YPL006W	NCR1	34.17384689	48.43077308	0.699869508	3513	flat	0.705622577	-0.503031374	1.417188215	0.503031374
YPL007C	TFC8	126.7708269	115.2683045	0.496353487	1767	flat	1.099789118	0.137226917	0.909265225	-0.137226917
YPL008W	CHL1	76.25594709	86.97884209	0.542677976	2586	flat	0.876718352	-0.189814647	1.140617164	0.189814647
YPL009C	TAE2	61.25010104	67.19488621	0.387219081	3117	flat	0.911529203	-0.133639218	1.097057557	0.133639218
YPL010W	RET3	520.4162742	332.5688138	0.903400029	570	down	1.56483787	0.64601319	0.639043839	-0.64601319

YPL011C	TAF3	153.6132124	147.7712547	0.264361317	1062	flat	1.03953379	0.055936654	0.961969692	-0.055936654
YPL012W	RRP12	55.30825589	45.98053014	0.558416703	3687	flat	1.20286251	0.266471749	0.83135021	-0.266471749
YPL013C	MRPS16	588.8278869	515.4469593	0.699318544	366	flat	1.142363683	0.192022021	0.875377968	-0.192022021
YPL014W	YPL014W	18.37318766	20.52773437	0.225242859	1146	flat	0.895042158	-0.159972458	1.117265809	0.159972458
YPL015C	HST2	44.06986012	54.12381879	0.584188778	1074	flat	0.814241513	-0.296471317	1.228136841	0.296471317
YPL016W	SWI1	52.49846165	28.12317233	0.829578077	3945	flat	1.866733277	0.900515807	0.53569517	-0.900515807
YPL017C	IRC15	34.97482948	96.02158978	0.94923155	1500	up	0.364239225	-1.457041799	2.745448404	1.457041799
YPL018W	CTF19	33.9530499	32.81573996	0.112512687	1110	flat	1.034657452	0.049153208	0.966503453	-0.049153208
YPL019C	VTC3	55.45199571	95.25134889	0.868783529	2508	flat	0.582164939	-0.78050014	1.717726254	0.78050014
YPL020C	ULP1	195.5236017	196.263537	0.052232855	1866	flat	0.996229889	-0.005449399	1.003784378	0.005449399
YPL021W	ECM23	1.882323713	3.498309158	0.205806873	564	flat	0.538066714	-0.894143034	1.858505598	0.894143034
YPL022W	RAD1	89.67451718	120.5727582	0.804030738	3303	flat	0.743737794	-0.427134008	1.344559881	0.427134008
YPL023C	MET12	113.5220468	142.7771452	0.76815282	1974	flat	0.79509957	-0.330792555	1.257704113	0.330792555
YPL024W	RMI1	285.2705664	373.1603901	0.847788894	726	flat	0.764471723	-0.387464956	1.308092857	0.387464956
YPL025C	YPL025C	9.512818766	4.351908167	0.49077135	558	flat	2.185896025	1.128224779	0.457478301	-1.128224779
YPL026C	SKS1	138.5959067	172.089633	0.771618095	1509	flat	0.805370458	-0.312275541	1.241664615	0.312275541
YPL027W	SMA1	3.356555565	20.1541113	0.832499638	738	flat	0.166544459	-2.586020738	6.004402701	2.586020738
YPL028W	ERG10	249.5910923	139.22016	0.913317384	1197	down	1.792779813	0.842198309	0.557792983	-0.842198309
YPL029W	SUV3	48.5501787	58.40579193	0.570755401	2214	flat	0.831256235	-0.266634838	1.202998495	0.266634838
YPL030W	TRM44	71.49184765	67.15768145	0.290938089	1704	flat	1.064537163	0.090226315	0.939375379	-0.090226315
YPL031C	PHO85	75.748151	59.6840739	0.691097579	918	flat	1.26915182	0.343864659	0.787927799	-0.343864659
YPL032C	SVL3	30.16807356	44.40487412	0.706481079	2478	flat	0.679386535	-0.55769547	1.471916131	0.55769547
YPL033C	SRL4	5.019529902	20.63105401	0.809090909	846	flat	0.243299732	-2.039193367	4.110156611	2.039193367
YPL034W	YPL034W	155.087599	209.9828461	0.846266493	498	flat	0.738572706	-0.437188145	1.353962841	0.437188145
YPL035C	YPL035C	2.796440689	3.489029824	0.110990286	348	flat	0.801495209	-0.319234198	1.247668094	0.319234198
YPL036W	PMA2	18.53996198	19.37184439	0.097056691	2844	flat	0.95705714	-0.063323034	1.044869693	0.063323034
YPL037C	EGD1	629.363273	334.2843891	0.929186603	474	down	1.882718109	0.912817008	0.53114696	-0.912817008
YPL038W	MET31	201.789332	150.9201412	0.837654052	534	flat	1.337060318	0.419064551	0.747909415	-0.419064551
YPL038W-A	YPL038W-A	43.7738301	66.40059883	0.793627664	192	flat	0.659238484	-0.601127631	1.516901735	0.601127631
YPL039W	YPL039W	134.0527215	133.7388056	0.019450486	951	flat	1.002347231	0.00338237	0.997658266	-0.00338237
YPL040C	ISM1	33.40014214	36.7200387	0.290720603	3009	flat	0.909588969	-0.136713337	1.099397678	0.136713337
YPL041C	YPL041C	22.82619157	30.40320459	0.535500942	624	flat	0.750782422	-0.413533223	1.331943811	0.413533223
YPL042C	SSN3	85.97637695	104.9124912	0.69876758	1668	flat	0.819505628	-0.287174238	1.220247874	0.287174238
YPL043W	NOP4	196.4119734	137.8344792	0.863484124	2058	flat	1.424984333	0.510946057	0.701762102	-0.510946057
YPL044C	YPL044C	1.128022772	2.211625462	0.158670436	549	flat	0.510042406	-0.971310894	1.96062129	0.971310894
YPL045W	VPS16	114.3050302	106.5005612	0.388835726	2397	flat	1.073281013	0.102027861	0.931722436	-0.102027861
YPL046C	ELC1	407.2532842	346.5478873	0.74585327	300	flat	1.175171742	0.23287161	0.850939454	-0.23287161
YPL047W	SGF11	422.2930507	404.2215502	0.317058141	300	flat	1.04470692	0.063098268	0.957206257	-0.063098268
YPL048W	CAM1	206.7826112	135.9631309	0.883398579	1248	flat	1.520872679	0.604899382	0.657517236	-0.604899382
YPL049C	DIG1	27.21128158	22.11259299	0.419276497	1359	flat	1.230578503	0.299336696	0.812625929	-0.299336696
YPL050C	MNN9	141.1188228	98.88227705	0.84523706	1188	flat	1.427139696	0.513126561	0.700702253	-0.513126561
YPL051W	ARL3	330.4628951	245.8363401	0.858104973	597	flat	1.344239403	0.426790099	0.743915107	-0.426790099
YPL052W	OAZ1	441.5408921	440.9871722	0.023111498	879	flat	1.001255637	0.001810365	0.998745938	-0.001810365
YPL053C	KTR6	187.1641772	208.1358496	0.576518776	1341	flat	0.89924046	-0.153221145	1.112049606	0.153221145
YPL054W	LEE1	3.710629307	6.868305398	0.331774685	906	flat	0.540253977	-0.888290307	1.850981284	0.888290307
YPL055C	LGE1	51.8062968	68.51804965	0.71353487	999	flat	0.756097073	-0.403356625	1.322581499	0.403356625
YPL056C	LCL1	2.023805561	3.471926736	0.187668552	306	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YPL057C	SUR1	53.58970697	106.0692396	0.911700739	1149	up	0.505233253	-0.984978498	1.979283813	0.984978498
YPL058C	PDR12	53.38188716	99.50888432	0.891046832	4536	flat	0.536453479	-0.898475029	1.864094539	0.898475029

YPL059W	GRX5	471.6405145	471.0652385	0.02338698	453	flat	1.001221224	0.001760778	0.998780266	-0.001760778
YPL060C-A	YPL060C-A	29.46305063	51.27768718	0.803646513	3315	flat	0.574578384	-0.799424376	1.74040658	0.799424376
YPL060W	MFM1	139.8981782	134.5425522	0.258220966	1242	flat	1.039806187	0.056314644	0.961717686	-0.056314644
YPL061W	ALD6	379.7171676	200.041192	0.928983616	1503	down	1.898194886	0.92462812	0.526816297	-0.92462812
YPL062W	YPL062W	3.49508008	9.368691194	0.531665942	405	flat	0.373059588	-1.422522006	2.68053692	1.422522006
YPL063W	TIM50	62.44158398	47.72729476	0.687784544	1431	flat	1.308299251	0.38769257	0.764351122	-0.38769257
YPL064C	CWC27	143.7380616	108.2176899	0.811729738	906	flat	1.328230733	0.409505785	0.752881239	-0.409505785
YPL065W	VPS28	277.9074091	229.4288377	0.777954183	729	flat	1.211301125	0.276557558	0.82555855	-0.276557558
YPL066W	RGL1	43.98885945	41.73751927	0.195150065	1440	flat	1.053940441	0.075793341	0.948820219	-0.075793341
YPL067C	YPL067C	18.07913597	22.88032121	0.409257648	597	flat	0.790160934	-0.339781575	1.265564972	0.339781575
YPL068C	YPL068C	19.25860452	19.44481417	0.024082935	882	flat	0.990423686	-0.013882278	1.009668907	0.013882278
YPL069C	BTS1	43.79577187	49.53695469	0.414513557	1008	flat	0.884103033	-0.177713585	1.131089888	0.177713585
YPL070W	MUK1	55.17900438	72.21381059	0.715013774	1839	flat	0.764105978	-0.388155347	1.308718985	0.388155347
YPL071C	YPL071C	240.8015563	206.2305526	0.710185588	471	flat	1.167632794	0.223586635	0.856433637	-0.223586635
YPL072W	UBP16	49.60173961	50.89447804	0.106734812	1500	flat	0.974599633	-0.037118416	1.026062361	0.037118416
YPL073C	YPL073C	1.456283367	1.873738239	0.083246339	486	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YPL074W	YTA6	86.2818962	98.23351916	0.560352327	2265	flat	0.878334574	-0.187157501	1.138518316	0.187157501
YPL075W	GCR1	66.74585778	77.9460804	0.574126432	2358	flat	0.856308071	-0.223798171	1.16780401	0.223798171
YPL076W	GPI2	37.88539317	45.18976528	0.49600551	843	flat	0.838362247	-0.254354343	1.192801803	0.254354343
YPL077C	YPL077C	27.40954918	30.01868606	0.247600406	723	flat	0.913082909	-0.131182231	1.095190799	0.131182231
YPL078C	ATP4	645.8854492	468.7404761	0.87369871	735	flat	1.377916954	0.462488941	0.725733142	-0.462488941
YPL079W	RPL21B	769.4806837	668.6801506	0.721146875	483	flat	1.150745514	0.202568819	0.869001867	-0.202568819
YPL080C	YPL080C	2.976028623	1.392410985	0.220936639	327	flat	2.137320558	1.095803302	0.467875535	-1.095803302
YPL081W	RPS9A	474.21882	283.3603236	0.911157025	594	down	1.67355406	0.742915154	0.597530743	-0.742915154
YPL082C	MOT1	58.82160837	80.21966911	0.763027403	5604	flat	0.733256682	-0.447609783	1.363778913	0.447609783
YPL083C	SEN54	32.13625314	36.53789566	0.36246919	1404	flat	0.879532129	-0.185191816	1.136968131	0.185191816
YPL084W	BRO1	47.49767297	71.66549839	0.802189358	2535	flat	0.662769032	-0.593421902	1.508821252	0.593421902
YPL085W	SEC16	21.17728466	19.48994938	0.185421198	6588	flat	1.086574636	0.119787275	0.920323342	-0.119787275
YPL086C	ELP3	133.1794627	132.6425344	0.044562853	1674	flat	1.004047935	0.005828148	0.995968385	-0.005828148
YPL087W	YDC1	317.339258	366.0683508	0.716478179	954	flat	0.866885261	-0.20608704	1.153555199	0.20608704
YPL088W	YPL088W	79.35576774	126.9935651	0.874191678	1029	flat	0.624880227	-0.678348406	1.600306679	0.678348406
YPL089C	RLM1	23.56565488	42.8192087	0.787110338	2031	flat	0.550352414	-0.861572361	1.817017559	0.861572361
YPL090C	RPS6A	897.3839313	471.5416446	0.93107873	711	down	1.903085213	0.928340162	0.525462545	-0.928340162
YPL091W	GLR1	247.6772431	218.0427378	0.648825576	1452	flat	1.135911453	0.183850378	0.88035031	-0.183850378
YPL092W	SSU1	64.44053898	128.8470589	0.925547339	1377	up	0.500132013	-0.99961914	1.999472086	0.99961914
YPL093W	NOG1	152.9097535	125.3843171	0.74368566	1944	flat	1.219528542	0.286323524	0.819989008	-0.286323524
YPL094C	SEC62	184.8738495	122.52204	0.878019429	825	flat	1.508902802	0.593499876	0.662733212	-0.593499876
YPL095C	EEB1	104.9241013	177.5664237	0.898528346	1371	flat	0.590900571	-0.759012701	1.692332091	0.759012701
YPL096C-A	ERI1	159.4155412	181.1008741	0.624380165	207	flat	0.880258265	-0.184001228	1.136030231	0.184001228
YPL096W	PNG1	98.92024811	66.29635928	0.834877483	1092	flat	1.49209171	0.577336213	0.670200091	-0.577336213
YPL097W	MSY1	100.8513155	130.1202887	0.78261563	1479	flat	0.775062187	-0.367616026	1.290219052	0.367616026
YPL098C	MGR2	264.114234	282.2441494	0.459134406	342	flat	0.935765133	-0.095781621	1.068644219	0.095781621
YPL099C	INA17	157.1174575	151.4963442	0.232963607	549	flat	1.037103954	0.052560509	0.964223496	-0.052560509
YPL100W	ATG21	70.25321932	76.95522118	0.406531825	1491	flat	0.912910368	-0.131454875	1.09539779	0.131454875
YPL101W	ELP4	93.30888709	87.01197572	0.363324634	1371	flat	1.07236833	0.100800518	0.932515417	-0.100800518
YPL102C	YPL102C	4.08768648	11.01980707	0.580969987	303	flat	0.370939932	-1.430742513	2.695854274	1.430742513
YPL103C	FMP30	74.00729602	82.08891171	0.459525881	1407	flat	0.901550459	-0.149519855	1.109200256	0.149519855
YPL104W	MSD1	45.73370625	51.51210758	0.411410758	1977	flat	0.887823443	-0.171655292	1.171655292	0.171655292
YPL105C	SYH1	56.79376635	66.89906832	0.564129332	2550	flat	0.848947045	-0.23625353	1.177929773	0.23625353

YPL106C	SSE1	412.0489785	555.1152026	0.865622735	2082	flat	0.742276516	-0.429971369	1.347206841	0.429971369
YPL107W	YPL107W	166.6347856	117.6391562	0.852798318	747	flat	1.416490827	0.502321259	0.705969979	-0.502321259
YPL108W	YPL108W	228.5890947	146.6837686	0.892105263	507	flat	1.558380296	0.640047341	0.641691892	-0.640047341
YPL109C	YPL109C	66.46395397	72.11898881	0.370407424	1974	flat	0.921587436	-0.117807046	1.085084237	0.117807046
YPL110C	GDE1	26.09263598	39.01784332	0.687088589	3672	flat	0.668735987	-0.580491338	1.495358436	0.580491338
YPL111W	CAR1	80.69946315	81.33931354	0.048825576	1002	flat	0.992133565	-0.011393739	1.007928806	0.011393739
YPL112C	PEX25	151.7041721	159.4574959	0.307575758	1185	flat	0.951376862	-0.071911156	1.051108178	0.071911156
YPL113C	YPL113C	32.90668517	39.12195532	0.458721183	1191	flat	0.841130892	-0.249597773	1.188875607	0.249597773
YPL114W	YPL114W	28.85781521	41.19547356	0.669160505	420	flat	0.70050937	-0.513523748	1.427532655	0.513523748
YPL115C	BEM3	46.83357002	44.00380484	0.233877048	3387	flat	1.064307284	0.089914742	0.939578273	-0.089914742
YPL116W	HOS3	53.23362479	60.59315118	0.471161375	2094	flat	0.878541943	-0.18681693	1.138249582	0.18681693
YPL117C	IDI1	328.5707852	320.3508871	0.207633754	867	flat	1.025659046	0.036551224	0.97498287	-0.036551224
YPL118W	MRP51	263.441661	206.7629413	0.819986951	1035	flat	1.27412417	0.349505883	0.784852861	-0.349505883
YPL119C	DBP1	35.83623523	43.05959622	0.496063506	1854	flat	0.832247359	-0.264915708	1.201565844	0.264915708
YPL119C-A	YPL119C-A	202.0717286	139.6999612	0.869450486	264	flat	1.446469469	0.532535872	0.691338477	-0.532535872
YPL120W	VPS30	60.19500319	83.13957895	0.776750761	1674	flat	0.724023431	-0.465891708	1.381170771	0.465891708
YPL121C	MEI5	2.512578589	8.620876381	0.549050312	669	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YPL122C	TFB2	47.27537793	61.61463757	0.680752501	1542	flat	0.767275112	-0.382184136	1.303313485	0.382184136
YPL123C	RNY1	151.0416935	188.4076105	0.784210526	1305	flat	0.801675118	-0.318910397	1.247388096	0.318910397
YPL124W	SPC29	84.63787059	58.55800842	0.804103233	762	flat	1.445367984	0.531436843	0.691865332	-0.531436843
YPL125W	KAP120	80.24748694	109.5565497	0.80246484	3099	flat	0.732475485	-0.449147619	1.365233404	0.449147619
YPL126W	NAN1	116.4466584	113.815498	0.136080905	2691	flat	1.02311777	0.032972221	0.977404586	-0.032972221
YPL127C	HHO1	31.99465802	19.53317855	0.68907496	777	flat	1.637964755	0.711904314	0.610513747	-0.711904314
YPL128C	TBF1	37.13716584	46.18781399	0.562838915	1689	flat	0.804046839	-0.314648548	1.243708639	0.314648548
YPL129W	TAF14	159.4853187	101.5948521	0.881781934	735	flat	1.569816929	0.650596323	0.637016955	-0.650596323
YPL130W	SPO19	7.767386394	9.711652211	0.221828331	672	flat	0.799800716	-0.322287522	1.250311458	0.322287522
YPL131W	RPL5	347.7414092	197.7799876	0.914760041	894	down	1.758223435	0.81411842	0.568755927	-0.81411842
YPL132W	COX11	106.2022465	137.150169	0.788183268	903	flat	0.774350095	-0.368942117	1.291405536	0.368942117
YPL133C	RDS2	45.32315465	58.06073455	0.650971437	1341	flat	0.78061628	-0.357314543	1.281039129	0.357314543
YPL134C	ODC1	153.9914302	84.91468404	0.904472959	933	down	1.81348411	0.858764104	0.551424738	-0.858764104
YPL135C-A	YPL135C-A	1.016887523	5.233544736	0.447723648	174	flat	0.194301869	-2.363628317	5.146630887	2.363628317
YPL135W	ISU1	332.5589751	541.5667889	0.908735682	498	up	0.614068259	-0.703529063	1.628483455	0.703529063
YPL136W	YPL136W	4.075817471	9.460093059	0.504378715	369	flat	0.430843275	-1.214764931	2.321029616	1.214764931
YPL137C	GIP3	39.81230119	55.18650658	0.70985211	3831	flat	0.721413687	-0.4711013	1.386167213	0.4711013
YPL138C	SPP1	125.7895611	114.0439664	0.499050312	1062	flat	1.102991812	0.141422082	0.906625044	-0.141422082
YPL139C	UME1	58.91550729	73.96591859	0.67662027	1383	flat	0.79652235	-0.328213251	1.255457553	0.328213251
YPL140C	MKK2	25.06918571	24.54707965	0.055632884	1521	flat	1.021269579	0.030363737	0.979173394	-0.030363737
YPL141C	FRK1	34.56360768	26.28859076	0.555335653	2598	flat	1.31477598	0.394817005	0.760585845	-0.394817005
YPL142C	YPL142C	1.391025386	4.772729476	0.381557199	318	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YPL143W	RPL33A	899.9831206	620.207357	0.891032333	324	flat	1.451100363	0.537147304	0.68913221	-0.537147304
YPL144W	POC4	366.3456736	309.3177145	0.753516021	447	flat	1.184366935	0.24411612	0.844332926	-0.24411612
YPL145C	KES1	66.70782153	79.317278	0.612092214	1305	flat	0.841025098	-0.24977924	1.189025157	0.24977924
YPL146C	NOP53	329.4960877	300.882914	0.554675946	1368	flat	1.09509737	0.131059152	0.913160809	-0.131059152
YPL147W	PXA1	19.70496856	29.68078815	0.625482094	2613	flat	0.663896405	-0.590969954	1.506259097	0.590969954
YPL148C	PPT2	188.9715981	203.2359872	0.443743657	522	flat	0.929813665	-0.104986467	1.075484302	0.104986467
YPL149W	ATG5	178.6378377	193.6175008	0.491170074	885	flat	0.922632701	-0.116171668	1.083854928	0.116171668
YPL150W	YPL150W	71.37039738	86.65520025	0.661287516	2706	flat	0.823613553	-0.279960524	1.214161661	0.279960524
YPL151C	PRP46	164.3465718	169.7930188	0.231397709	1356	flat	0.967923021	-0.04703578	1.03314001	0.04703578
YPL152W	RRD2	100.708688	122.3201375	0.711700739	1077	flat	0.823320592	-0.280473785	1.214593695	0.280473785

YPL152W-A	YPL152W-A	26.80885289	1.533058559	0.905284906	99	down	17.4871682	4.128224779	0.057184788	-4.128224779
YPL153C	RAD53	61.77777267	58.53038535	0.239575178	2466	flat	1.055482077	0.07790208	0.947434373	-0.07790208
YPL154C	PEP4	436.3900171	363.6067509	0.777149485	1218	flat	1.200170283	0.263239113	0.833215098	-0.263239113
YPL155C	KIP2	47.21694995	43.50677076	0.301246919	2121	flat	1.085278202	0.118064913	0.921422726	-0.118064913
YPL156C	PRM4	22.14317182	37.8100653	0.742402494	855	flat	0.585642253	-0.77190845	1.70752707	0.77190845
YPL157W	TGS1	186.7372345	136.4034001	0.843591417	948	flat	1.369007182	0.453130015	0.730456358	-0.453130015
YPL158C	AIM44	123.4372835	48.65794557	0.954139481	2277	down	2.536837141	1.343030905	0.394191643	-1.343030905
YPL159C	PET20	87.19209988	129.0666308	0.853110048	762	flat	0.675558813	-0.565846722	1.480256021	0.565846722
YPL160W	CDC60	137.5016481	108.3693942	0.7715311	3273	flat	1.268823629	0.343491544	0.788131602	-0.343491544
YPL161C	BEM4	62.09589979	57.53322128	0.327903436	1902	flat	1.079305111	0.110102761	0.926522065	-0.110102761
YPL162C	YPL162C	55.96592646	78.47133682	0.778193417	822	flat	0.713202154	-0.487617034	1.402127004	0.487617034
YPL163C	SVS1	78.5263143	26.16772368	0.946411483	783	down	3.00088442	1.585387754	0.333235093	-1.585387754
YPL164C	MLH3	14.58012195	24.51823123	0.634297521	2148	flat	0.59466451	-0.749852119	1.68162045	0.749852119
YPL165C	SET6	1.261593077	1.217428856	0.017166884	1122	flat	1.036276634	0.051409182	0.964993291	-0.051409182
YPL166W	ATG29	87.36679441	133.0967055	0.864361317	642	flat	0.656415905	-0.607317898	1.52342439	0.607317898
YPL167C	REV3	37.97416119	44.57380493	0.466536175	4515	flat	0.851938964	-0.231178021	1.173793009	0.231178021
YPL168W	YPL168W	152.0329425	192.5037801	0.798071625	1293	flat	0.789766011	-0.340502814	1.266197818	0.340502814
YPL169C	MEX67	59.22522417	76.22367155	0.706299841	1800	flat	0.77699254	-0.364027348	1.287013644	0.364027348
YPL170W	DAP1	564.3526365	582.2917127	0.275474844	459	flat	0.969192287	-0.045145172	1.031786998	0.045145172
YPL171C	OYE3	92.51394171	337.8616386	0.979215601	1203	up	0.273821977	-1.868689855	3.652007821	1.868689855
YPL172C	COX10	63.75643178	70.91471956	0.438560244	1389	flat	0.8990578	-0.153514225	1.11227554	0.153514225
YPL173W	MRPL40	120.0370886	87.77017475	0.812070465	894	flat	1.367629596	0.451677548	0.731192132	-0.451677548
YPL174C	NIP100	68.58315403	74.98402876	0.399289546	2607	flat	0.914636826	-0.128729088	1.093330131	0.128729088
YPL175W	SPT14	61.71362426	70.69328971	0.519001015	1359	flat	0.872977117	-0.195984257	1.145505398	0.195984257
YPL176C	TRE1	60.67212714	84.79143525	0.786501377	2352	flat	0.715545467	-0.482884653	1.397535231	0.482884653
YPL177C	CUP9	90.00613899	82.72523807	0.408489198	921	flat	1.088013055	0.121695867	0.919106619	-0.121695867
YPL178W	CBC2	368.4100784	224.6334225	0.90738727	627	down	1.64005015	0.713739931	0.609737452	-0.713739931
YPL179W	PPQ1	128.1463168	168.7897473	0.818703784	1650	flat	0.759206758	-0.397435261	1.317164251	0.397435261
YPL180W	TCO89	30.89050074	41.99047393	0.635812672	2400	flat	0.735654968	-0.442898814	1.359332899	0.442898814
YPL181W	CTI6	73.40443704	67.35479172	0.38107148	1521	flat	1.089817594	0.124086687	0.917584746	-0.124086687
YPL182C	YPL182C	0.921554318	1.976208299	0.162403944	384	flat	0.466324485	-1.100593911	2.144429536	1.100593911
YPL183C	RTT10	134.1288683	126.6270084	0.329991301	3042	flat	1.059243758	0.083034627	0.944069759	-0.083034627
YPL183W-A	RTC6	271.0546147	244.3434397	0.594077135	282	flat	1.109318159	0.149673199	0.901454638	-0.149673199
YPL184C	MRN1	178.6221825	92.76379783	0.926859504	1839	down	1.92555918	0.945277463	0.519329663	-0.945277463
YPL185W	YPL185W	6.478806114	10.34814527	0.374851385	396	flat	0.6260838	-0.675572323	1.597230275	0.675572323
YPL186C	UIP4	81.1209519	65.68527622	0.670392924	915	flat	1.234994455	0.304504564	0.809720235	-0.304504564
YPL187W	MF(ALPHA)1	1.776490252	3.047646533	0.170755401	498	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YPL188W	POS5	174.3802831	154.8204439	0.60138466	1245	flat	1.126338865	0.171640936	0.887832277	-0.171640936
YPL189C-A	COA2	385.0761463	535.9706032	0.877838191	207	flat	0.71846505	-0.477010116	1.391856152	0.477010116
YPL189W	GUP2	12.23098977	13.7673685	0.180629259	1830	flat	0.888404328	-0.170711673	1.125613606	0.170711673
YPL190C	NAB3	58.50205842	67.85359184	0.532579382	2409	flat	0.862180716	-0.213937799	1.159849647	0.213937799
YPL191C	YPL191C	81.44395834	102.8635579	0.735573438	1083	flat	0.79176688	-0.336852375	1.262998018	0.336852375
YPL192C	PRM3	11.44377899	11.70387243	0.035087719	402	flat	0.977777147	-0.032422409	1.022422409	0.032422409
YPL193W	RSA1	172.0749382	121.5771623	0.854574453	1146	flat	1.415355771	0.501164742	0.706536138	-0.501164742
YPL194W	DDC1	45.31702017	44.97888774	0.034428012	1839	flat	1.007517581	0.010805014	0.992538511	-0.010805014
YPL195W	APL5	105.4108004	115.1716404	0.461294766	2799	flat	0.915249623	-0.127762821	1.092598101	0.127762821
YPL196W	OXR1	149.9241069	128.6929924	0.667957083	822	flat	1.164974907	0.22029888	0.858387587	-0.22029888
YPL197C	YPL197C	5.556037627	19.06324991	0.768972017	414	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YPL198W	RPL7B	433.8000669	317.7936532	0.867703349	735	flat	1.365036912	0.448939963	0.732580923	-0.448939963

YPL199C	YPL199C	132.1531835	108.7390166	0.721480354	723	flat	1.215324431	0.281341493	0.822825555	-0.281341493
YPL200W	CSM4	11.45779636	9.667057155	0.206742062	471	flat	1.1852414	0.245180926	0.843709981	-0.245180926
YPL201C	YIG1	1.787256859	4.927688225	0.359866609	1386	flat	0.362696822	-1.463163991	2.757123689	1.463163991
YPL202C	AFT2	54.45347337	76.55366516	0.775460345	1251	flat	0.711311121	-0.491447376	1.405854584	0.491447376
YPL203W	TPK2	59.67608434	74.22659117	0.664143831	1143	flat	0.803971776	-0.314783239	1.243824758	0.314783239
YPL204W	HRR25	120.2823866	125.6085979	0.257829491	1485	flat	0.957596762	-0.062509821	1.044280891	0.062509821
YPL205C	YPL205C	3.590055082	5.718974972	0.247723648	345	flat	0.6277445	-0.671750612	1.593004798	0.671750612
YPL206C	PGC1	139.6641327	160.7283351	0.647361172	966	flat	0.868945308	-0.202662719	1.150820415	0.202662719
YPL207W	TYW1	103.4504379	89.01758397	0.617203132	2433	flat	1.162134864	0.216777501	0.860485328	-0.216777501
YPL208W	RKM1	54.13184816	55.52874606	0.112222706	1752	flat	0.974843698	-0.036757172	1.025805472	0.036757172
YPL209C	IPL1	73.64421028	65.1633206	0.492221256	1104	flat	1.130148212	0.176511986	0.884839695	-0.176511986
YPL210C	SRP72	164.7468836	122.096993	0.82969407	1923	flat	1.349311557	0.432223506	0.74111868	-0.432223506
YPL211W	NIP7	751.826292	551.4967581	0.871763085	546	flat	1.363246984	0.447046963	0.733542793	-0.447046963
YPL212C	PUS1	109.6801822	77.41805075	0.822285051	1635	flat	1.416726217	0.502560984	0.705852682	-0.502560984
YPL213W	LEA1	233.3267569	227.1300022	0.198492098	717	flat	1.027282854	0.038833471	0.973441731	-0.038833471
YPL214C	THI6	124.772663	123.8121896	0.057785994	1623	flat	1.007757503	0.011148524	0.992302213	-0.011148524
YPL215W	CBP3	104.7061239	91.39492855	0.588422503	1008	flat	1.145644792	0.196159805	0.872870899	-0.196159805
YPL216W	YPL216W	98.73581422	107.0527981	0.426982746	3309	flat	0.922309514	-0.116677115	1.084234722	0.116677115
YPL217C	BMS1	86.47666465	62.68319079	0.780165289	3552	flat	1.379583004	0.464232226	0.724856712	-0.464232226
YPL218W	SAR1	408.9964211	327.3842539	0.818007829	573	flat	1.24928556	0.321103284	0.800457503	-0.321103284
YPL219W	PCL8	28.7121183	38.58456511	0.605241409	1479	flat	0.744134817	-0.426364072	1.343842509	0.426364072
YPL220W	RPL1A	737.2434544	483.6307487	0.899702769	654	flat	1.524393262	0.608235136	0.655998701	-0.608235136
YPL221W	FLC1	126.798446	195.7372097	0.886037408	2382	flat	0.647799395	-0.626380974	1.543687765	0.626380974
YPL222C-A	YPL222C-A	120.4763694	153.6236851	0.786683854	246	flat	0.784230435	-0.350650463	1.275135414	0.350650463
YPL222W	FMP40	26.62208584	30.47204204	0.334449761	2067	flat	0.873656114	-0.194862572	1.144615122	-0.194862572
YPL223C	GRE1	41.00644066	37.41932873	0.30045672	507	flat	1.095862541	0.132066846	0.912523207	-0.132066846
YPL224C	MMT2	70.95778237	102.8508441	0.827867189	1455	flat	0.689909577	-0.535520807	1.449465311	0.535520807
YPL225W	YPL225W	2075.114637	2172.656847	0.377185733	441	flat	0.955104641	-0.066269292	1.047005697	0.066269292
YPL226W	NEW1	94.20948938	114.4530034	0.702892562	3591	flat	0.823128154	-0.280811032	1.214877654	0.280811032
YPL227C	ALG5	208.8049521	189.2251891	0.550369726	1005	flat	1.103473343	0.142051779	0.906229413	-0.142051779
YPL228W	CET1	127.3420512	123.6258422	0.175003625	1650	flat	1.030060131	0.042728559	0.97081711	-0.042728559
YPL229W	YPL229W	46.15785106	47.90252541	0.145911266	621	flat	0.963578656	-0.053525658	1.037797998	0.053525658
YPL230W	USV1	117.8084949	59.88314453	0.916884153	1176	down	1.967306423	0.976221686	0.508309223	-0.976221686
YPL231W	FAS2	116.584431	66.18623048	0.887733797	5664	flat	1.761460506	0.816772128	0.567710713	-0.816772128
YPL232W	SSO1	108.9397544	94.57548883	0.600326229	873	flat	1.151881484	0.203992287	0.868144869	-0.203992287
YPL233W	NSL1	88.87690676	65.97803632	0.769305495	651	flat	1.347068081	0.429822766	0.742352977	-0.429822766
YPL234C	VMA11	727.234816	465.7431902	0.903653763	495	down	1.56145024	0.642886594	0.640430271	-0.642886594
YPL235W	RVB2	226.6086448	209.7594381	0.477562708	1416	flat	1.080326334	0.111467173	0.925646232	-0.111467173
YPL236C	ENV7	62.37281609	88.15296722	0.798064376	1095	flat	0.707552089	-0.499091734	1.413323508	0.499091734
YPL237W	SUI3	985.4315655	548.1863624	0.921146875	858	down	1.797621453	0.846089247	0.556290646	-0.846089247
YPL238C	YPL238C	1.134220699	1.556644075	0.083369581	390	flat	0.728632008	-0.456737721	1.372434903	0.456737721
YPL239W	YAR1	212.0033416	363.9526782	0.912055966	603	up	0.582502491	-0.779663876	1.716730856	0.779663876
YPL240C	HSP82	1362.13516	3987.919319	0.974111933	2130	up	0.341565376	-1.549766358	2.927697218	1.549766358
YPL241C	CIN2	80.57605041	30.4674017	0.938560244	807	down	2.644664327	1.403084621	0.37811982	-1.403084621
YPL242C	IQG1	54.82016168	48.62951929	0.425344353	4488	flat	1.127302151	0.172874253	0.88707362	-0.172874253
YPL243W	SRP68	185.9327992	152.1100702	0.761932724	1800	flat	1.222356935	0.289665621	0.818091649	-0.289665621
YPL244C	HUT1	206.9485744	263.6680362	0.820023198	1020	flat	0.784883057	-0.349450377	1.274075151	0.349450377
YPL245W	YPL245W	77.58069582	97.2902547	0.72061041	1365	flat	0.79741487	-0.326597586	1.25405236	0.326597586
YPL246C	RBD2	72.65912676	54.43815164	0.732869363	789	flat	1.334709658	0.416525944	0.749226616	-0.416525944

YPL247C	YPL247C	38.88818527	51.07367035	0.648448601	1572	flat	0.761413562	-0.393247828	1.313346714	0.393247828
YPL248C	GAL4	3.544118193	6.940479394	0.360700304	2646	flat	0.510644581	-0.969608599	1.958309237	0.969608599
YPL249C	GYP5	26.88673335	32.21992346	0.424017689	2685	flat	0.834475395	-0.261058583	1.198357682	0.261058583
YPL249C-A	RPL36B	557.6772269	302.543794	0.921509352	303	down	1.84329422	0.882286367	0.542506991	-0.882286367
YPL250C	ICY2	160.7944118	327.5485918	0.946563723	411	up	0.490902467	-1.026491678	2.037064523	1.026491678
YPL250W-A	YPL250W-A	12.90176045	41.10513261	0.897085689	288	flat	0.31387225	-1.671750612	3.186009597	1.671750612
YPL251W	YPL251W	2.04384324	1.001800642	0.157597506	303	flat	2.040169624	1.028689106	0.490155323	-1.028689106
YPL252C	YAH1	53.52472709	26.61141533	0.861802233	519	flat	2.011344621	1.008160292	0.497179841	-1.008160292
YPL253C	VIK1	31.4921278	27.24727689	0.362106713	1944	flat	1.155789914	0.208879185	0.865209142	-0.208879185
YPL254W	HFI1	148.8357338	162.7393389	0.502283602	1467	flat	0.914565186	-0.128842093	1.093415773	0.128842093
YPL255W	BBP1	94.8866705	63.69739163	0.828671886	1158	flat	1.489647662	0.574971138	0.671299681	-0.574971138
YPL256C	CLN2	40.18381905	11.02622887	0.903552269	1638	down	3.644384634	1.865675231	0.274394747	-1.865675231
YPL257W	YPL257W	41.34643703	51.11248845	0.580730753	582	flat	0.80893023	-0.305912819	1.236200556	0.305912819
YPL257W-A	YPL257W-A	0.534961237	1.376624012	1.138538495	1323	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YPL257W-B	YPL257W-B	52.59787014	61.53885632	0.533913296	5268	flat	0.854709907	-0.226493251	1.169987609	0.226493251
YPL258C	THI21	17.09550039	19.61315135	0.257155285	1656	flat	0.871634552	-0.198204708	1.147269802	0.198204708
YPL259C	APM1	121.6761466	150.2848287	0.75216036	1428	flat	0.809636925	-0.304653007	1.235121533	0.304653007
YPL260W	YPL260W	363.3328068	481.2554099	0.858351457	1656	flat	0.754968774	-0.40551112	1.324558094	0.40551112
YPL261C	YPL261C	0.572616275	5.402915116	0.490452371	309	flat	0.105982838	-3.238097435	9.435489959	3.238097435
YPL262W	FUM1	130.8644823	101.1818649	0.783978541	1467	flat	1.293359066	0.371122856	0.773180493	-0.371122856
YPL263C	KEL3	106.4706191	75.57602485	0.816485428	1956	flat	1.408788294	0.494454827	0.709829862	-0.494454827
YPL264C	YPL264C	100.3817359	122.6187007	0.719986951	1062	flat	0.818649483	-0.288682223	1.221524011	0.288682223
YPL265W	DIP5	91.13249137	124.2759194	0.814535305	1827	flat	0.733307722	-0.447509363	1.36368399	0.447509363
YPL266W	DIM1	264.2058674	205.2183905	0.825068871	957	flat	1.287437577	0.364502483	0.776736689	-0.364502483
YPL267W	ACM1	123.1547637	31.55910548	0.974387415	630	down	3.902352803	1.964344215	0.256255662	-1.964344215
YPL268W	PLC1	87.52011951	111.9397068	0.758757431	2610	flat	0.781850533	-0.355035261	1.279016842	0.355035261
YPL269W	KAR9	83.98860315	90.12245175	0.359728868	1935	flat	0.931938729	-0.101692988	1.073031916	0.101692988
YPL270W	MDL2	56.00764227	68.63110991	0.629469334	2322	flat	0.81606785	-0.293238989	1.225388306	0.293238989
YPL271W	ATP15	865.5004109	566.136625	0.89999275	189	flat	1.528783641	0.612384246	0.654114796	-0.612384246
YPL272C	PBI1	14.5171491	12.69656606	0.203371031	1554	flat	1.143391767	0.193319808	0.87459087	-0.193319808
YPL273W	SAM4	351.0726192	201.4326083	0.914267073	978	down	1.742878783	0.801472233	0.573763368	-0.801472233
YPL274W	SAM3	194.5921499	234.1981601	0.760062346	1764	flat	0.830886758	-0.267276231	1.203533443	0.267276231
YPL275W	FDH2	3.110731875	9.178945549	0.544135131	711	flat	0.338898609	-1.561074381	2.950735042	1.561074381
YPL276W	YPL276W	2.423814097	3.811645595	0.181361462	438	flat	0.635897026	-0.653134934	1.57258166	0.653134934
YPL277C	YPL277C	15.349167	23.94775696	0.589778164	1464	flat	0.640943827	-0.641730171	1.560199127	0.641730171
YPL278C	YPL278C	29.78171578	57.10263662	0.85	303	flat	0.521547122	-0.939130489	1.917372291	0.939130489
YPL279C	FEX2	25.48980028	34.84854123	0.593895897	1128	flat	0.731445259	-0.451178196	1.367156307	0.451178196
YPL280W	HSP32	50.05821102	134.5548749	0.95938814	714	up	0.372028223	-1.426516023	2.687968112	1.426516023
YPL281C	ERR2	9.560600048	10.04888384	0.069196752	1314	flat	0.951409151	-0.071862193	1.051072505	0.071862193
YPL282C	PAU22	0.89362843	0.919835135	0.012295201	495	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YPL283C	YRF1-7	14.20580936	9.927790507	0.393526171	5580	flat	1.43091349	0.516936452	0.698854268	-0.516936452
YPL283W-A	YPL283W-A	0.153592386	0.52698888	0.079505582	576	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YPL283W-B	YPL283W-B	0.183166076	0.942688182	0.129947803	483	flat	0.194301869	-2.363628317	5.146630887	2.363628317
YPRO01W	CIT3	19.6194562	36.35898636	0.762519936	1461	flat	0.539604047	-0.890026925	1.85321071	0.890026925
YPRO02C-A	YPRO02C-A	16.08531173	27.59505406	0.673140496	198	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YPRO02W	PDH1	33.93886695	52.93944768	0.77015369	1551	flat	0.641088422	-0.641404742	1.559847232	0.641404742
YPRO03C	YPRO03C	53.90177309	83.15675121	0.829440336	2265	flat	0.648194792	-0.625500665	1.542746118	0.625500665
YPRO04C	AIM45	413.1982445	350.0305964	0.75661882	1035	flat	1.180463219	0.23935309	0.847125081	-0.23935309
YPRO05C	HAL1	26.49078175	34.29893725	0.538379005	885	flat	0.772349929	-0.372673457	1.294749909	0.372673457

YPR006C	ICL2	35.27505139	39.17284005	0.325815572	1728	flat	0.900497675	-0.151205544	1.110497037	0.151205544
YPR007C	REC8	9.266966181	19.8352114	0.695316804	2043	flat	0.467197752	-1.097894762	2.140421257	1.097894762
YPR008W	HAA1	48.66867581	70.68172001	0.782470639	2085	flat	0.688561	-0.538343626	1.452304153	0.538343626
YPR009W	SUT2	64.68009488	95.1636127	0.825155865	807	flat	0.679672545	-0.557088247	1.471296739	0.557088247
YPR010C	RPA135	146.6404173	131.0574072	0.563643613	3612	flat	1.11890217	0.162083901	0.893733185	-0.162083901
YPR010C-A	YPR010C-A	1429.242379	1208.638167	0.771277367	219	flat	1.182522957	0.241868192	0.845649545	-0.241868192
YPR011C	YPR011C	83.32880145	92.51797432	0.480042047	981	flat	0.900676891	-0.150918449	1.110276072	0.150918449
YPR012W	YPR012W	16.65302862	20.23637298	0.334333768	255	flat	0.822925563	-0.281166157	1.215176737	0.281166157
YPR013C	CMR3	13.72478381	15.11364334	0.163832101	954	flat	0.908105577	-0.139068059	1.101193546	0.139068059
YPR014C	YPR014C	1.072354115	2.759505406	0.232376396	330	flat	0.388603738	-1.363628317	2.573315443	1.363628317
YPR015C	YPR015C	16.29070214	54.26285496	0.928019429	744	up	0.300218301	-1.735916169	3.330909528	1.735916169
YPR016C	TIF6	216.9773419	187.1453192	0.68907496	738	flat	1.159405657	0.213385431	0.862510885	-0.213385431
YPR016W-A	YPR016W-A	3.389625078	1.744514912	0.215709729	261	flat	1.943018689	0.958299778	0.514663089	-0.958299778
YPR017C	DSS4	207.2473266	176.0142858	0.721001885	432	flat	1.177446056	0.235660965	0.849295808	-0.235660965
YPR018W	RLF2	37.0200667	30.92131126	0.4561476	1821	flat	1.197234696	0.259705995	0.835258119	-0.259705995
YPR019W	MCM4	47.54983479	48.09930194	0.053218791	2802	flat	0.988576401	-0.016575628	1.011555606	0.016575628
YPR020W	ATP20	432.1771974	319.6823576	0.863034653	348	flat	1.351895677	0.434983827	0.739702047	-0.434983827
YPR021C	AGC1	61.75536533	54.73681174	0.449514282	2709	flat	1.128223646	0.17405308	0.886349088	-0.17405308
YPR022C	YPR022C	43.27242004	52.68773476	0.563955343	3402	flat	0.821299686	-0.284019348	1.217582347	0.284019348
YPR023C	EAF3	245.5277455	272.083572	0.593772655	1206	flat	0.902398273	-0.148163788	1.108158149	0.148163788
YPR024W	YME1	86.10372751	115.1822967	0.795585037	2244	flat	0.747543068	-0.419771395	1.337715568	0.419771395
YPR025C	CC11	89.96615555	106.4464035	0.651123677	1182	flat	0.845177973	-0.242672927	1.183182752	0.242672927
YPR026W	ATH1	38.58970689	68.080702	0.844591852	3636	flat	0.566822987	-0.819029827	1.764219205	0.819029827
YPR027C	YPR027C	1.166860144	2.365763028	0.175286356	834	flat	0.493227821	-1.019673916	2.027460652	1.019673916
YPR028W	YOP1	841.8424152	695.6951981	0.802530086	543	flat	1.210073632	0.826395992	0.275094837	-0.275094837
YPR029C	APL4	61.95323146	69.35755685	0.45292156	2499	flat	0.893244144	-0.162873545	1.119514757	0.162873545
YPR030W	CSR2	11.8274351	21.05701021	0.618290561	3366	flat	0.561686345	-0.832163365	1.780353055	0.832163365
YPR031W	NT01	52.32558349	47.21370064	0.377192982	2247	flat	1.108271175	0.148310928	0.902306243	-0.148310928
YPR032W	SRO7	23.89980715	27.98647327	0.357974482	3102	flat	0.853977095	-0.227730719	1.170991594	0.227730719
YPR033C	HTS1	245.3524652	174.7098197	0.866688415	1641	flat	1.40434273	0.489895068	0.712076888	-0.489895068
YPR034W	ARP7	49.91045645	47.52160809	0.194098884	1434	flat	1.050268677	0.070758441	0.952137317	-0.070758441
YPR035W	GLN1	445.6845336	956.454987	0.962324199	1113	up	0.46597544	-1.101674177	2.14603585	1.101674177
YPR036W	VMA13	190.8521677	136.141361	0.857162534	1437	flat	1.401867635	0.487350135	0.713334109	-0.487350135
YPR036W-A	SPO24	845.2279368	1282.628934	0.899434537	204	flat	0.658980875	-0.6016915	1.517494724	0.6016915
YPR037C	ERV2	186.9679339	124.8080871	0.87630129	591	flat	1.498043422	0.583079442	0.667537393	-0.583079442
YPR038W	IRC16	0.737243454	1.264733103	0.095331303	360	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YPR039W	YPR039W	0.526602467	1.806819016	0.190097144	336	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YPR040W	TIP41	54.43623938	68.30484437	0.661410758	1071	flat	0.796960155	-0.327420498	1.254767874	0.327420498
YPR041W	TIF5	488.6144549	364.852833	0.86168624	1218	flat	1.339209705	0.421381888	0.746709045	-0.421381888
YPR042C	PUF2	104.6392382	82.09272124	0.74554154	3228	flat	1.274646968	0.350097727	0.784530952	-0.350097727
YPR043W	RPL43A	1698.03815	911.1807725	0.927374221	279	down	1.863557925	0.898059663	0.536607951	-0.898059663
YPR044C	OPI11	1.749391248	1.714946863	0.012295201	354	flat	1.020084812	0.028689106	0.980310645	-0.028689106
YPR045C	THP3	190.1493309	215.4679628	0.637704799	1413	flat	0.88249468	-0.180340514	1.133151307	0.180340514
YPR046W	MCM16	323.5769623	346.3533067	0.470588662	546	flat	0.934239564	-0.098135552	1.070389265	0.098135552
YPR047W	MSF1	100.2023657	92.78592291	0.397136436	1410	flat	1.079930689	0.110938722	0.925985353	-0.110938722
YPR048W	TAH18	169.8022905	181.6895507	0.429824561	1872	flat	0.934573782	-0.09761953	1.070006477	0.09761953
YPR049C	ATG11	30.4402132	38.66194244	0.545425547	3537	flat	0.787343089	-0.344935659	1.270094338	0.344935659
YPR050C	YPR050C	4.487568853	2.932807678	0.196114253	414	flat	1.530127218	0.613651606	0.653651606	-0.613651606
YPR051W	MAK3	292.7314688	165.2065478	0.914354067	531	down	1.771912026	0.825306977	0.564362104	-0.825306977

YPR052C	NHP6A	85.01828772	50.05273104	0.857771495	282	flat	1.698574403	0.764324414	0.588728994	-0.764324414
YPR053C	YPR053C	30.65380679	23.9641259	0.495788024	456	flat	1.27915397	0.35518993	0.781766717	-0.35518993
YPR054W	SMK1	2.501700154	2.86118384	0.073988691	1167	flat	0.87435841	-0.193703316	1.143695753	0.193703316
YPR055W	SEC8	86.4497484	108.158288	0.730136291	3198	flat	0.799289171	-0.323210551	1.251111658	0.323210551
YPR056W	TFB4	257.4045288	190.7233382	0.851529651	1017	flat	1.349622606	0.432556044	0.740947874	-0.432556044
YPR057W	BRR1	208.9287591	168.3405881	0.785261708	1026	flat	1.241107456	0.311628031	0.805732006	-0.311628031
YPR058W	YMC1	66.92638631	45.1704754	0.783703059	924	flat	1.48164007	0.567195021	0.674927751	-0.567195021
YPR059C	YPR059C	0.914410486	1.176533313	0.062737422	387	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YPR060C	ARO7	253.5887991	228.3481776	0.590416123	771	flat	1.110535682	0.151255748	0.900466339	-0.151255748
YPR061C	JID1	34.4697933	31.99625198	0.233492823	906	flat	1.077307221	0.107429729	0.92824032	-0.107429729
YPR062W	FCY1	570.5058782	455.9547559	0.823771205	477	flat	1.251233529	0.323351077	0.79921132	-0.323351077
YPR063C	YPR063C	55.63312308	47.36172399	0.51707989	423	flat	1.174643117	0.2322225	0.851322402	-0.2322225
YPR064W	YPR064W	10.11076737	10.47955029	0.053907496	420	flat	0.96480928	-0.051684311	1.036474276	0.051684311
YPR065W	ROX1	27.25203447	29.61420436	0.230100043	1107	flat	0.92023524	-0.119925389	1.086678662	0.119925389
YPR066W	UBA3	59.76586937	39.62956375	0.774510657	900	flat	1.50811323	0.592744751	0.663080186	-0.592744751
YPR067W	ISA2	107.970493	179.5162119	0.896107003	558	flat	0.601452603	-0.733477043	1.662641402	0.733477043
YPR068C	HOS1	40.57186908	36.30517021	0.347455415	1413	flat	1.117523175	0.16030475	0.894836029	-0.16030475
YPR069C	SPE3	215.6562486	176.7241076	0.771632594	882	flat	1.220298982	0.287234662	0.819471306	-0.287234662
YPR070W	MED1	117.6989021	116.1717708	0.092032768	1701	flat	1.013145459	0.01884132	0.987025102	-0.01884132
YPR071W	YPR071W	117.5416451	169.1932599	0.86092504	636	flat	0.694718248	-0.525500102	1.439432465	0.525500102
YPR072W	NOT5	123.2155905	114.7990321	0.396897202	1683	flat	1.073315587	0.102074334	0.931692423	-0.102074334
YPR073C	LTP1	578.1444966	392.8604507	0.892032768	486	flat	1.471628146	0.557413174	0.679519485	-0.557413174
YPR074C	TKL1	211.4513825	161.1332342	0.828715384	2043	flat	1.312276661	0.392071909	0.762034432	-0.392071909
YPR074W-A	YPR074W-A	4.656274449	0.887560218	0.416115702	171	flat	5.246150461	2.391259185	0.190615959	-2.391259185
YPR075C	OPY2	73.11167775	79.88041965	0.408104973	1083	flat	0.915264067	-0.127740053	1.092580859	0.127740053
YPR076W	YPR076W	1.887343243	3.642547136	0.225706829	375	flat	0.518138317	-0.948590818	1.929986583	0.948590818
YPR077C	YPR077C	2.140384222	2.855939735	0.114687545	372	flat	0.749450066	-0.416095737	1.334311711	0.416095737
YPR078C	YPR078C	0.790609603	1.62759032	0.13554444	1119	flat	0.485754672	-1.041700222	2.058652355	1.041700222
YPR079W	MRL1	36.36038398	50.85580644	0.700659707	1146	flat	0.714970158	-0.484045067	1.398659774	0.484045067
YPR080W	TEF1	1094.653941	1116.417331	0.183761056	1377	flat	0.980506045	-0.02840157	1.019881525	0.02840157
YPR081C	GRS2	58.0742986	50.01882174	0.507314775	1857	flat	1.161048913	0.215428752	0.861290157	-0.215428752
YPR082C	DIB1	595.5288793	375.5674082	0.905901116	432	down	1.58567774	0.6650996	0.630645165	-0.6650996
YPR083W	MDM36	71.63972602	69.34446775	0.169261998	1740	flat	1.033099371	0.04697903	0.967961097	-0.04697903
YPR084W	YPR084W	68.33617665	85.01933505	0.691344063	1371	flat	0.803772184	-0.315141443	1.244133623	0.315141443
YPR085C	ASA1	97.5021073	103.4607357	0.330382775	1332	flat	0.942406862	-0.085578051	1.061112817	0.085578051
YPR086W	SUA7	120.3454055	119.6051524	0.052232855	1038	flat	1.00618914	0.008901524	0.993848929	-0.008901524
YPR087W	VPS69	4.409680475	4.728124528	0.066978396	321	flat	0.932648971	-0.100593911	1.072214768	0.100593911
YPR088C	SRP54	230.2049487	188.9225964	0.775308105	1626	flat	1.218514636	0.285123579	0.820671308	-0.285123579
YPR089W	YPR089W	62.66154715	51.72908616	0.597491663	2667	flat	1.211340694	0.276604686	0.825531582	-0.276604686
YPR091C	NVJ2	35.72427426	39.43599274	0.309888357	2313	flat	0.905879928	-0.142608257	1.103899059	0.142608257
YPR092W	YPR092W	7.516992084	11.90374881	0.406640568	306	flat	0.631481074	-0.663188599	1.583578734	0.663188599
YPR093C	ASR1	68.26517246	92.42910841	0.778700884	867	flat	0.7385679	-0.437197535	1.353971653	0.437197535
YPR094W	RDS3	392.1042965	415.969889	0.43245614	324	flat	0.942626634	-0.085241649	1.06086542	0.085241649
YPR095C	SYT1	29.0811599	33.7272883	0.381818182	3681	flat	0.862244235	-0.213831517	1.159764205	0.213831517
YPR096C	YPR096C	12.84701465	9.016205782	0.364847035	303	flat	1.424880372	0.510840801	0.701813303	-0.510840801
YPR097W	YPR097W	108.1564978	117.0563009	0.419131506	3222	flat	0.923969893	-0.114082251	1.082286346	0.114082251
YPR098C	YPR098C	381.1821712	356.6348448	0.473981441	486	flat	1.068830421	0.096032975	0.935602113	-0.096032975
YPR099C	YPR099C	3.965006814	4.676472747	0.112258953	357	flat	0.847862701	-0.238097435	1.179436245	0.238097435
YPR100W	MRPL51	1247.144034	749.5351623	0.912113963	423	down	1.663889963	0.734560028	0.601001281	-0.734560028

YPR101W	SNT309	693.1764025	831.5884521	0.786813107	528	flat	0.833557033	-0.262647182	1.199677959	0.262647182
YPR102C	RPL11A	887.2198371	515.7384199	0.914876033	525	down	1.72029037	0.7826521	0.581297214	-0.7826521
YPR103W	PRE2	751.7835336	685.9638583	0.580904741	864	flat	1.095952104	0.13218475	0.912448634	-0.13218475
YPR104C	FHL1	33.2349664	27.42816828	0.448368856	2811	flat	1.211709293	0.277043616	0.825280458	-0.277043616
YPR105C	COG4	67.60060631	70.19345151	0.179027113	2586	flat	0.963061437	-0.054300259	1.038355354	0.054300259
YPR106W	ISR1	76.77958858	68.48006847	0.481172974	1332	flat	1.121196142	0.165038685	0.891904603	-0.165038685
YPR107C	YTH1	240.4330806	215.1930093	0.607496013	627	flat	1.117290387	0.160004195	0.895022468	-0.160004195
YPR108W	RPN7	429.6586271	427.6698592	0.070588662	1290	flat	1.004650241	0.006693329	0.995371283	-0.006693329
YPR108W-A	YPR108W-A	6.6455748	6.412935099	0.041365811	213	flat	1.036276634	0.051409182	0.964993291	-0.051409182
YPR109W	YPR109W	425.9517775	569.1908637	0.863092649	885	flat	0.748346126	-0.418222394	1.336280053	0.418222394
YPR110C	RPC40	261.8969605	249.9432972	0.33415253	1008	flat	1.0478255	0.067398478	0.954357381	-0.067398478
YPR111W	DBF20	44.99142355	63.30582166	0.746295491	1695	flat	0.710699622	-0.492688162	1.407064206	0.492688162
YPR112C	MRD1	105.7379801	60.84585118	0.879592576	2664	flat	1.737800985	0.797262873	0.575439886	-0.797262873
YPR113W	PIS1	432.3382429	477.0656254	0.594497608	663	flat	0.906244801	-0.142027281	1.103454606	0.142027281
YPR114W	YPR114W	104.8005569	94.45775362	0.498086124	948	flat	1.109496604	0.149905252	0.901309654	-0.149905252
YPR115W	RGC1	40.9700606	41.11680026	0.020726403	3252	flat	0.996431151	-0.005157971	1.003581632	0.005157971
YPR116W	RRG8	26.62562691	50.59093245	0.831035233	834	flat	0.526292472	-0.926063335	1.900084179	0.926063335
YPR117W	YPR117W	22.25350122	28.13993632	0.460881543	7470	flat	0.790815621	-0.338586726	1.264517257	0.338586726
YPR118W	MR11	203.779817	156.8073319	0.822016819	1236	flat	1.299555413	0.378018152	0.769493928	-0.378018152
YPR119W	CLB2	111.7253495	58.40579193	0.905270407	1476	down	1.912915583	0.935773209	0.522762222	-0.935773209
YPR120C	CLB5	107.1370304	50.82300094	0.931404959	1308	down	2.108042194	1.075903744	0.474373806	-1.075903744
YPR121W	THI22	48.01732237	59.06690019	0.605777874	1719	flat	0.812931138	-0.298794946	1.230116493	0.298794946
YPR122W	AXL1	43.34430499	63.89772857	0.773814702	3627	flat	0.678338745	-0.559922197	1.474189714	0.559922197
YPR123C	YPR123C	1.627020037	1.39561193	0.059018414	435	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YPR124W	CTR1	128.8998629	83.28237036	0.866797158	1221	flat	1.547744887	0.630167694	0.64610131	-0.630167694
YPR125W	YLH47	42.12819739	51.14687676	0.554023488	1365	flat	0.823670966	-0.279859959	1.21407703	0.279859959
YPR126C	YPR126C	0.858924413	2.947044608	0.271241119	309	flat	0.291452803	-1.778665816	3.431087258	1.778665816
YPR127W	YPR127W	53.18380526	78.37208032	0.803247789	1038	flat	0.678606527	-0.559352788	1.473607989	0.559352788
YPR128C	ANT1	100.7491359	100.1054621	0.048825576	987	flat	1.006429957	0.009246771	0.993611123	-0.009246771
YPR129W	SCD6	81.81295934	48.71184067	0.852044367	1050	flat	1.679529211	0.748056888	0.595404946	-0.748056888
YPR130C	YPR130C	47.05347929	50.2189403	0.249166304	408	flat	0.93696679	-0.093930181	1.067273686	0.093930181
YPR131C	NAT3	225.2353982	163.1299454	0.857612005	588	flat	1.38071154	0.465411942	0.724264244	-0.465411942
YPR132W	RPS23B	1700.305589	1083.546889	0.90522691	438	down	1.569203517	0.650032474	0.637265969	-0.650032474
YPR133C	SPN1	334.5040374	266.1255376	0.818218066	1233	flat	1.256940767	0.329916665	0.795582438	-0.329916665
YPR133W-A	TOM5	153.2309925	128.9572788	0.706473829	153	flat	1.18823066	0.24881492	0.841587441	-0.24881492
YPR134W	MSS18	171.6763196	156.6626272	0.509823111	807	flat	1.09583455	0.132029996	0.912546515	-0.132029996
YPR135W	CTF4	63.49191474	45.19383944	0.746201247	2784	flat	1.404879858	0.49044676	0.711804639	-0.49044676
YPR136C	YPR136C	1.552091483	0.295853406	0.188639988	513	flat	5.246150461	2.391259185	0.190615959	-2.391259185
YPR137C-A	YPR137C-A	0.200610464	0.573593338	0.079505582	1323	flat	0.349743364	-1.51563141	2.859239382	1.51563141
YPR137C-B	YPR137C-B	26.46687208	31.8065999	0.426221546	5268	flat	0.832118873	-0.265138454	1.201751375	0.265138454
YPR137W	RRP9	111.3828438	104.9717779	0.338350007	1722	flat	1.061074186	0.085525527	0.942441173	-0.085525527
YPR138C	MEP3	93.16349938	160.1357882	0.897042192	1470	flat	0.58177813	-0.781459031	1.718868326	0.781459031
YPR139C	LOA1	101.4015914	74.62582726	0.791162824	903	flat	1.358800232	0.44233337	0.735943354	-0.44233337
YPR140W	TAZ1	128.3035205	172.5654057	0.832108163	1146	flat	0.743506614	-0.427582518	1.344977947	0.427582518
YPR141C	KAR3	92.54930159	103.7460628	0.521349862	2190	flat	0.892075314	-0.164762579	1.120981586	0.164762579
YPR142C	YPR142C	1.098022166	1.345503522	0.061461505	564	flat	0.81606785	-0.293238989	1.225388306	0.293238989
YPR143W	RRP15	312.1682643	223.3257098	0.870827896	753	flat	1.397816063	0.48317453	0.715401709	-0.48317453
YPR144C	NOC4	86.12283391	87.27621981	0.081477454	1659	flat	0.986784649	-0.019192823	1.013392336	0.019192823
YPR145C-A	YPR145C-A	45.16782683	71.72385359	0.821806583	237	flat	0.629746236	-0.667157501	1.58794121	0.667157501

YPR145W	ASN1	354.7517718	318.5551209	0.628563143	1719	flat	1.113627591	0.15526686	0.897966258	-0.15526686
YPR146C	YPR146C	132.4357333	150.3930446	0.605458895	330	flat	0.880597461	-0.18344541	1.135592645	0.18344541
YPR147C	YPR147C	214.8399942	244.163451	0.648180368	915	flat	0.879902349	-0.184584671	1.136489749	0.184584671
YPR148C	YPR148C	140.0086193	103.0384129	0.821734087	1308	flat	1.358800232	0.44233337	0.735943354	-0.44233337
YPR149W	NCE102	211.8515674	252.6639097	0.747013194	522	flat	0.838471816	-0.254165804	1.192645931	0.254165804
YPR150W	YPR150W	26.77803811	29.94750599	0.290481369	522	flat	0.894165882	-0.161385595	1.11836072	0.161385595
YPR151C	SUE1	52.4262012	67.45457659	0.684087284	621	flat	0.777207476	-0.363628317	1.286657722	0.363628317
YPR152C	URN1	53.79029496	53.30503826	0.042134261	1398	flat	1.009103393	0.013074	0.990978732	-0.013074
YPR153W	YPR153W	29.90803233	31.57448266	0.161519501	423	flat	0.947221611	-0.078226098	1.055719156	0.078226098
YPR154W	PIN3	35.49690706	84.31822074	0.934123532	648	up	0.420987383	-1.2481511	2.375368102	1.2481511
YPR155C	NCA2	49.8027669	52.06684295	0.181288966	1851	flat	0.956515972	-0.064139036	1.045460849	0.064139036
YPR156C	TPO3	67.12110551	84.94079509	0.708576193	1869	flat	0.790210469	-0.339691135	1.265485639	0.339691135
YPR157W	TDA6	52.36318894	71.67048763	0.747303175	1404	flat	0.730610195	-0.45282621	1.368718924	0.45282621
YPR158C-C	YPR158C-C	0.668701546	0.573593338	0.036117152	1323	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YPR158C-D	YPR158C-D	28.29738544	35.5807526	0.513614615	5268	flat	0.795300362	-0.330428267	1.257386577	0.330428267
YPR158W	CUR1	283.1247985	699.274667	0.967978831	759	up	0.404883534	-1.304421122	2.469846056	1.304421122
YPR158W-A	YPR158W-A	0.334350773	0.229437335	0.036117152	1323	flat	1.457264017	0.543262279	0.686217452	-0.543262279
YPR158W-B	YPR158W-B	45.45145759	54.30534923	0.543207192	5271	flat	0.836960967	-0.256767753	1.194798849	0.256767753
YPR159C-A	YPR159C-A	18.21425005	31.24714093	0.702414093	102	flat	0.582905607	-0.778665816	1.715543629	0.778665816
YPR159W	KRE6	117.8362492	123.8460413	0.288023778	2163	flat	0.951473685	-0.071764339	1.051001217	0.071764339
YPR160C-A	YPR160C-A	5.277111042	6.390433572	0.149637524	285	flat	0.825782943	-0.276165476	1.210971973	0.276165476
YPR160W	GPH1	150.3552099	60.50742751	0.958387705	2709	down	2.484905013	1.313190705	0.40242987	-1.313190705
YPR160W-A	YPR160W-A	NA	NA	NA	81	flat	#iVALOR!	#iVALOR!	#iVALOR!	#iVALOR!
YPR161C	SGV1	56.4697114	72.81096205	0.70276932	1974	flat	0.775566066	-0.366678413	1.289380807	0.366678413
YPR162C	ORC4	48.24076037	60.32730058	0.630491518	1590	flat	0.799650571	-0.322558381	1.250546221	0.322558381
YPR163C	TIF3	324.1846732	208.2679347	0.898629839	1311	flat	1.556575061	0.638375148	0.642436093	-0.638375148
YPR164W	MMS1	41.53277756	45.52465299	0.318667537	4224	flat	0.912313984	-0.132397663	1.096113857	0.132397663
YPR165W	RHO1	747.4946491	661.0548506	0.687269827	630	flat	1.130760403	0.177293268	0.884360646	-0.177293268
YPR166C	MRP2	765.4620832	581.3595944	0.858750181	348	flat	1.316675755	0.396900111	0.759488428	-0.396900111
YPR167C	MET16	107.378665	76.85187448	0.813462375	786	flat	1.397215952	0.482555019	0.715708977	-0.482555019
YPR168W	NUT2	66.44523285	81.97011839	0.671277367	474	flat	0.810603109	-0.302932385	1.233649351	0.302932385
YPR169W	JIP5	183.6379233	189.7416513	0.237646803	1479	flat	0.967831375	-0.047172385	1.03323784	0.047172385
YPR169W-A	YPR169W-A	5.251597209	7.62329119	0.263114398	219	flat	0.688888444	-0.537657717	1.45161384	0.537657717
YPR170C	YPR170C	31.06954558	37.94319933	0.49107583	336	flat	0.818843591	-0.28834019	1.221234448	0.28834019
YPR170W-A	YPR170W-A	2.85384563	6.527862251	0.397150935	186	flat	0.437179205	-1.193703316	2.287391505	1.193703316
YPR170W-B	YPR170W-B	55.2075331	27.06102508	0.869102508	258	flat	2.040169624	1.028689106	0.490155323	-1.028689106
YPR171W	BSP1	35.11169866	35.59777916	0.049188053	1731	flat	0.986345202	-0.019835445	1.013843833	0.019835445
YPR172W	YPR172W	80.39988319	73.99867731	0.389589677	603	flat	1.086504328	0.119693922	0.920382896	-0.119693922
YPR173C	VPS4	286.2793761	223.5010372	0.827352472	1314	flat	1.280886119	0.357142214	0.78070953	-0.357142214
YPR174C	YPR174C	59.37798633	62.66894785	0.241126577	666	flat	0.947486568	-0.077822604	1.055423933	0.077822604
YPR175W	DPB2	44.06365226	58.50951318	0.688139771	2070	flat	0.753102357	-0.409082135	1.327840753	0.409082135
YPR176C	BET2	234.9228529	284.7679786	0.7792301	978	flat	0.824962322	-0.277599865	1.212176573	0.277599865
YPR177C	YPR177C	1.189102346	1.223974172	0.012295201	372	flat	0.971509345	-0.041700222	1.029326177	0.041700222
YPR178W	PRP4	65.18118095	87.17707887	0.761360012	1398	flat	0.747687142	-0.419493372	1.3374578	0.419493372
YPR179C	HDA3	76.82616241	79.66529454	0.186218646	1968	flat	0.964361744	-0.052353674	1.036955277	0.052353674
YPR180W	AOS1	237.6974586	241.0338103	0.114694795	1044	flat	0.986158159	-0.020109052	1.014036127	0.020109052
YPR181C	SEC23	57.82903143	57.49866704	0.033826301	2307	flat	1.005745601	0.008265427	0.994287223	-0.008265427
YPR182W	SMX3	85.75751446	87.2257456	0.090691605	261	flat	0.983167457	-0.024490932	1.017120729	0.024490932
YPR183W	DPM1	31.3603559	17.36703651	0.72414818	804	flat	1.805740195	0.852590337	0.553789522	-0.852590337

YPR184W	GDB1	36.51201805	15.96395721	0.839944904	4611	flat	2.28715334	1.193553093	0.437224729	-1.193553093
YPR185W	ATG13	46.2897108	40.73288878	0.407612005	2217	flat	1.136421015	0.184497416	0.879955568	-0.184497416
YPR186C	PZF1	88.40063374	109.2999447	0.721204872	1290	flat	0.808789373	-0.306164054	1.23641585	0.306164054
YPR187W	RPO26	1183.370263	822.7512539	0.88784979	468	flat	1.438308671	0.524373321	0.695261052	-0.524373321
YPR188C	MLC2	238.9747685	163.4950866	0.878258663	492	flat	1.461663305	0.547611024	0.684152087	-0.547611024
YPR189W	SKI3	92.44096573	85.33027475	0.404936929	4299	flat	1.083331397	0.115474638	0.923078573	-0.115474638
YPR190C	RPC82	85.36266196	63.87587959	0.75815572	1965	flat	1.33638335	0.418333913	0.748288281	-0.418333913
YPR191W	QCR2	250.8625695	205.7912997	0.780259533	1107	flat	1.219014457	0.285715236	0.820334816	-0.285715236
YPR192W	AQY1	15.61221433	12.39973834	0.314665797	918	flat	1.259076111	0.332365496	0.794233162	-0.332365496
YPR193C	HPA2	34.74905454	51.8798734	0.745563288	471	flat	0.669798368	-0.578201234	1.492986618	0.578201234
YPR194C	OPT2	16.05477773	58.25447916	0.937262578	2634	up	0.27559731	-1.85936629	3.628482445	1.85936629
YPR195C	YPR195C	4.82559352	36.79340541	0.931368711	330	up	0.131153762	-2.93066891	7.624638351	2.93066891
YPR196W	YPR196W	29.55234908	38.77564037	0.58245614	1413	flat	0.762136971	-0.391877794	1.312100106	0.391877794
YPR197C	YPR197C	2.352904642	3.767409863	0.183507322	564	flat	0.624541722	-0.679130143	1.601174054	0.679130143
YPR198W	SGE1	82.28937969	136.149127	0.885065971	1632	flat	0.604406223	-0.726409579	1.654516385	0.726409579
YPR199C	ARR1	92.26789266	101.6963489	0.469319994	885	flat	0.907288154	-0.140367273	1.102185668	0.140367273
YPR200C	ARR2	52.4512137	69.90044865	0.723263738	393	flat	0.750370201	-0.414325559	1.332675523	0.414325559
YPR201W	ARR3	9.247399379	14.86499003	0.473930695	1215	flat	0.622092538	-0.684798893	1.607477889	0.684798893
YPR202W	YPR202W	69.2206825	70.27694382	0.078062926	717	flat	0.984970016	-0.021848287	1.015259331	0.021848287
YPR203W	YPR203W	44.66406947	45.18801733	0.05137741	309	flat	0.988405159	-0.016825554	1.011730858	0.016825554
YPR204C-A	YPR204C-A	0.366332151	0.314229394	0.023205742	483	flat	1.165811214	0.221334184	0.857771814	-0.221334184
YPR204W	YPR204W	27.91961659	17.8757893	0.631114978	3099	flat	1.561867626	0.643272185	0.640259125	-0.643272185

Annex 2. GSEA obtained from PAR-CLIP results obtained after reads normalization with RPKM.

Columns	<i>N</i>	Number of genes that match in an specific GO group
	<i>lor</i>	log odds ratio (<i>lor</i>) indicates that the gene set is enriched in those genes with high values of the ranking statistic
	<i>pval</i>	p-value obtained from GSEA analysis
	<i>padj</i>	p-value adjusted obtained from GSEA analysis
	<i>ontology</i>	GO gene group category
	<i>desc</i>	GO category description
	<i>state</i>	UP (significant at 30°C) or DOWN (significant at 39°C)

	N	lor	pval	padj	ontology	desc	state
GO:0003735	220	0.00925288	7.19E-86	1.77E-81	MF	structural constituent of ribosome	UP
GO:0005198	383	0.00692672	1.58E-63	1.95E-59	MF	structural molecule activity	UP
GO:0022625	98	0.00642285	8.18E-45	5.60E-41	CC	cytosolic large ribosomal subunit	UP
GO:0015934	145	0.00588246	9.07E-45	5.60E-41	CC	large ribosomal subunit	UP
GO:0042254	398	0.00475428	4.70E-39	2.32E-35	BP	ribosome biogenesis	UP
GO:0042274	142	0.00422342	1.79E-28	7.35E-25	BP	ribosomal small subunit biogenesis	UP
GO:0006364	276	0.00370745	3.77E-26	1.33E-22	BP	rRNA processing	UP
GO:0042255	78	0.00419869	3.45E-25	1.07E-21	BP	ribosome assembly	UP
GO:0016072	293	0.00357555	9.44E-25	2.59E-21	BP	rRNA metabolic process	UP
GO:0006407	18	0.00472581	1.29E-24	2.88E-21	BP	rRNA export from nucleus	UP
GO:0051029	18	0.00472581	1.29E-24	2.88E-21	BP	rRNA transport	UP
GO:1901566	850	0.00533822	4.46E-24	9.18E-21	BP	organonitrogen compound biosynthetic process	UP
GO:0030490	114	0.00396988	2.77E-23	5.26E-20	BP	maturation of SSU-rRNA	UP
GO:0030684	189	0.0035926	9.58E-23	1.69E-19	CC	preribosome	UP
GO:0019843	71	0.00402205	1.00E-21	1.65E-18	MF	rRNA binding	UP
GO:0034470	394	0.00301758	1.97E-19	2.94E-16	BP	ncRNA processing	UP
GO:0034660	508	0.00289821	2.03E-19	2.94E-16	BP	ncRNA metabolic process	UP
GO:0000028	29	0.00430817	3.82E-19	5.23E-16	BP	ribosomal small subunit assembly	UP
GO:0000462	103	0.00360702	3.57E-18	4.64E-15	BP	maturation of SSU-rRNA from tricistronic rRNA transcript (SSU-rRNA, 5.8S rRNA, LSU-rRNA)	UP
GO:0015935	100	0.00572732	8.15E-15	1.01E-11	CC	small ribosomal subunit	UP
GO:0043603	583	0.00577518	1.35E-14	1.59E-11	BP	cellular amide metabolic process	UP
GO:0070925	164	0.00304324	1.70E-14	1.91E-11	BP	organelle assembly	UP
GO:0015078	58	0.0035237	2.19E-14	2.35E-11	MF	hydrogen ion transmembrane transporter activity	UP
GO:0042273	120	0.00316096	2.51E-14	2.58E-11	BP	ribosomal large subunit biogenesis	UP
GO:0030687	91	0.00329695	3.63E-14	3.59E-11	CC	preribosome, large subunit precursor	UP
GO:1902600	60	0.00348442	4.14E-14	3.93E-11	BP	hydrogen ion transmembrane transport	UP
GO:0006396	565	0.00236768	7.21E-14	6.59E-11	BP	RNA processing	UP
GO:0044769	29	0.00366753	7.18E-13	6.33E-10	MF	ATPase activity, coupled to transmembrane movement of ions, rotational mechanism	UP
GO:0071428	64	0.00334561	3.43E-12	2.92E-09	BP	rRNA-containing ribonucleoprotein complex export from nucleus	UP
GO:0046933	14	0.00376068	7.73E-12	6.36E-09	MF	proton-transporting ATP synthase activity, rotational mechanism	UP
GO:0016469	32	0.00352915	1.14E-11	9.04E-09	CC	proton-transporting two-sector ATPase complex	UP
GO:0005753	15	0.00370523	2.61E-11	1.95E-08	CC	mitochondrial proton-transporting ATP synthase complex	UP
GO:0045259	15	0.00370523	2.61E-11	1.95E-08	CC	proton-transporting ATP synthase complex	UP
GO:0070180	11	0.00401235	3.76E-11	2.73E-08	MF	large ribosomal subunit rRNA binding	UP
GO:0015985	19	0.00361571	1.01E-10	6.92E-08	BP	energy coupled proton transport, down electrochemical gradient	UP
GO:0015986	19	0.00361571	1.01E-10	6.92E-08	BP	ATP synthesis coupled proton transport	UP
GO:0005730	291	0.00233777	1.35E-10	9.00E-08	CC	nucleolus	UP
GO:0009145	25	0.00348779	2.61E-10	1.65E-07	BP	purine nucleoside triphosphate biosynthetic process	UP
GO:0009206	25	0.00348779	2.61E-10	1.65E-07	BP	purine ribonucleoside triphosphate biosynthetic process	UP
GO:0098800	79	0.00292891	7.54E-10	4.65E-07	CC	inner mitochondrial membrane protein complex	UP

GO:0006754	21	0.003486	9.89E-10	5.95E-07	BP	ATP biosynthetic process	UP
GO:0000276	10	0.00362447	1.76E-09	1.01E-06	CC	mitochondrial proton-transporting ATP synthase complex, coupling factor F(o)	UP
GO:0045263	10	0.00362447	1.76E-09	1.01E-06	CC	proton-transporting ATP synthase complex, coupling factor F(o)	UP
GO:0009201	29	0.0033272	2.07E-09	1.16E-06	BP	ribonucleoside triphosphate biosynthetic process	UP
GO:0000027	41	0.00317802	2.31E-09	1.27E-06	BP	ribosomal large subunit assembly	UP
GO:0030686	90	0.00279577	2.42E-09	1.30E-06	CC	90S preribosome	UP
GO:0033177	17	0.00349246	3.00E-09	1.57E-06	CC	proton-transporting two-sector ATPase complex, proton-transporting domain	UP
GO:0019829	40	0.00317166	3.12E-09	1.61E-06	MF	cation-transporting ATPase activity	UP
GO:0043604	510	0.00625909	3.56E-09	1.76E-06	BP	amide biosynthetic process	UP
GO:0098798	119	0.00263474	3.56E-09	1.76E-06	CC	mitochondrial protein complex	UP
GO:0006414	63	0.00298465	3.74E-09	1.81E-06	BP	translational elongation	UP
GO:0015077	87	0.00277427	5.04E-09	2.39E-06	MF	monovalent inorganic cation transmembrane transporter activity	UP
GO:0009142	33	0.00322057	5.16E-09	2.40E-06	BP	nucleoside triphosphate biosynthetic process	UP
GO:0015992	99	0.00269724	5.66E-09	2.59E-06	BP	proton transport	UP
GO:0006818	100	0.00268126	6.88E-09	3.09E-06	BP	hydrogen transport	UP
GO:0042625	42	0.0031022	7.28E-09	3.21E-06	MF	ATPase coupled ion transmembrane transporter activity	UP
GO:0065003	643	0.00204478	1.07E-08	4.64E-06	BP	macromolecular complex assembly	UP
GO:0000469	78	0.00279097	1.21E-08	5.15E-06	BP	cleavage involved in rRNA processing	UP
GO:0071426	132	0.00251945	1.34E-08	5.59E-06	BP	ribonucleoprotein complex export from nucleus	UP
GO:0071166	134	0.00249377	1.82E-08	7.50E-06	BP	ribonucleoprotein complex localization	UP
GO:0051168	140	0.00245365	2.45E-08	9.91E-06	BP	nuclear export	UP
GO:0005758	61	0.00287889	2.90E-08	1.16E-05	CC	mitochondrial intermembrane space	UP
GO:0043933	984	0.00157918	5.94E-08	2.29E-05	BP	macromolecular complex subunit organization	UP
GO:0034622	552	0.0019916	8.33E-08	3.16E-05	BP	cellular macromolecular complex assembly	UP
GO:0006450	28	0.00315656	9.71E-08	3.63E-05	BP	regulation of translational fidelity	UP
GO:0031970	66	0.0027578	1.01E-07	3.71E-05	CC	organelle envelope lumen	UP
GO:0022607	834	0.00161857	1.12E-07	4.05E-05	BP	cellular component assembly	UP
GO:0000478	55	0.00282971	1.19E-07	4.18E-05	BP	endonucleolytic cleavage involved in rRNA processing	UP
GO:0000479	55	0.00282971	1.19E-07	4.18E-05	BP	endonucleolytic cleavage of tricistronic rRNA transcript (SSU-rRNA, 5.8S rRNA, LSU-rRNA)	UP
GO:0006405	102	0.00251576	1.38E-07	4.78E-05	BP	RNA export from nucleus	UP
GO:0006518	500	0.00650031	1.70E-07	5.84E-05	BP	peptide metabolic process	UP
GO:0042455	65	0.00270158	1.92E-07	6.50E-05	BP	ribonucleoside biosynthetic process	UP
GO:0022627	70	0.00635741	2.41E-07	8.03E-05	CC	cytosolic small ribosomal subunit	UP
GO:0009163	67	0.00264835	3.45E-07	0.00011364	BP	nucleoside biosynthetic process	UP
GO:0000460	86	0.00250828	4.43E-07	0.00014187	BP	maturation of 5.8S rRNA	UP
GO:0000466	85	0.00250855	4.84E-07	0.00015295	BP	maturation of 5.8S rRNA from tricistronic rRNA transcript (SSU-rRNA, 5.8S rRNA, LSU-rRNA)	UP
GO:1901659	71	0.00257345	6.83E-07	0.00021335	BP	glycosyl compound biosynthetic process	UP
GO:0006448	38	0.00286846	7.82E-07	0.00023828	BP	regulation of translational elongation	UP
GO:0000447	43	0.00282512	7.82E-07	0.00023828	BP	in ITS1 to separate SSU-rRNA from 5.8S rRNA and LSU-rRNA from tricistronic rRNA transcript (SSU-rR	UP
GO:0044391	245	0.0087303	8.79E-07	0.00026431	CC	ribosomal subunit	UP
GO:0042451	51	0.00270541	9.95E-07	0.00029211	BP	purine nucleoside biosynthetic process	UP

GO:0046129	51	0.00270541	9.95E-07	0.00029211	BP	purine ribonucleoside biosynthetic process	UP
GO:0004129	12	0.00322477	1.25E-06	0.00034942	MF	cytochrome-c oxidase activity	UP
GO:0015002	12	0.00322477	1.25E-06	0.00034942	MF	heme-copper terminal oxidase activity	UP
GO:0016675	12	0.00322477	1.25E-06	0.00034942	MF	oxidoreductase activity, acting on a heme group of donors	UP
GO:0016676	12	0.00322477	1.25E-06	0.00034942	MF	oxidoreductase activity, acting on a heme group of donors, oxygen as acceptor	UP
GO:0001172	12	0.00328198	1.50E-06	0.00041225	NA	NA	UP
GO:0003968	12	0.00328198	1.50E-06	0.00041225	MF	RNA-directed RNA polymerase activity	UP
GO:0033178	13	0.00313389	3.07E-06	0.00083237	CC	proton-transporting two-sector ATPase complex, catalytic domain	UP
GO:0005665	13	0.00320419	3.19E-06	0.00085428	CC	DNA-directed RNA polymerase II, core complex	UP
GO:0098796	350	0.00171165	3.40E-06	0.00090259	CC	membrane protein complex	UP
GO:0001056	17	0.00308314	3.59E-06	0.00092168	MF	RNA polymerase III activity	UP
GO:0005666	17	0.00308314	3.59E-06	0.00092168	CC	DNA-directed RNA polymerase III complex	UP
GO:0005740	417	0.00163613	3.63E-06	0.00092431	CC	mitochondrial envelope	UP
GO:0098662	124	0.00217332	4.50E-06	0.00113227	BP	inorganic cation transmembrane transport	UP
GO:0044455	171	0.00202057	4.58E-06	0.0011411	CC	mitochondrial membrane part	UP
GO:0015672	133	0.00212232	5.62E-06	0.00138703	BP	monovalent inorganic cation transport	UP
GO:0042797	19	0.00300233	5.80E-06	0.00141563	BP	tRNA transcription from RNA polymerase III promoter	UP
GO:0015399	73	0.00240244	5.91E-06	0.00141563	MF	primary active transmembrane transporter activity	UP
GO:0015405	73	0.00240244	5.91E-06	0.00141563	MF	P-P-bond-hydrolysis-driven transmembrane transporter activity	UP
GO:0001054	14	0.0031197	6.92E-06	0.00162667	MF	RNA polymerase I activity	UP
GO:0005736	14	0.0031197	6.92E-06	0.00162667	CC	DNA-directed RNA polymerase I complex	UP
GO:0033108	40	0.00267442	7.61E-06	0.00177154	BP	mitochondrial respiratory chain complex assembly	UP
GO:0016820	65	0.00243771	7.86E-06	0.00179444	MF	hydrolase activity, acting on acid anhydrides, catalyzing transmembrane movement of substances	UP
GO:0042626	65	0.00243771	7.86E-06	0.00179444	MF	ATPase activity, coupled to transmembrane movement of substances	UP
GO:0043043	462	0.00674194	9.31E-06	0.00210617	BP	peptide biosynthetic process	UP
GO:0009304	20	0.00294329	9.82E-06	0.00220152	BP	tRNA transcription	UP
GO:0009124	62	0.00246015	1.03E-05	0.00227815	BP	nucleoside monophosphate biosynthetic process	UP
GO:0006412	458	0.00676579	1.32E-05	0.00288875	BP	translation	UP
GO:0046961	18	0.00292579	1.36E-05	0.00293576	MF	proton-transporting ATPase activity, rotational mechanism	UP
GO:0022890	133	0.00205716	1.41E-05	0.00302487	MF	inorganic cation transmembrane transporter activity	UP
GO:1901293	118	0.00212269	1.48E-05	0.00315406	BP	nucleoside phosphate biosynthetic process	UP
GO:0009165	115	0.00213057	1.59E-05	0.00334333	BP	nucleotide biosynthetic process	UP
GO:0033617	21	0.00289453	1.94E-05	0.00402624	BP	mitochondrial respiratory chain complex IV assembly	UP
GO:0044429	600	0.001379	2.09E-05	0.00423544	CC	mitochondrial part	UP
GO:0009262	10	0.00321615	2.14E-05	0.00425486	BP	deoxyribonucleotide metabolic process	UP
GO:0009263	10	0.00321615	2.14E-05	0.00425486	BP	deoxyribonucleotide biosynthetic process	UP
GO:0009260	74	0.0023058	2.34E-05	0.00458007	BP	ribonucleotide biosynthetic process	UP
GO:0043492	71	0.00230894	2.41E-05	0.00464253	MF	ATPase activity, coupled to movement of substances	UP
GO:0003899	34	0.00263006	2.70E-05	0.00511746	MF	DNA-directed RNA polymerase activity	UP
GO:0034062	34	0.00263006	2.70E-05	0.00511746	MF	RNA polymerase activity	UP
GO:0070069	21	0.00284951	3.03E-05	0.00557261	CC	cytochrome complex	UP

GO:0009156	59	0.00238894	3.28E-05	0.00597373	BP	ribonucleoside monophosphate biosynthetic process	UP
GO:0098660	138	0.001975	3.32E-05	0.00597373	BP	inorganic ion transmembrane transport	UP
GO:0036442	20	0.00280523	4.05E-05	0.00724119	MF	hydrogen-exporting ATPase activity	UP
GO:0009127	43	0.00250728	4.88E-05	0.00853197	BP	purine nucleoside monophosphate biosynthetic process	UP
GO:0009168	43	0.00250728	4.88E-05	0.00853197	BP	purine ribonucleoside monophosphate biosynthetic process	UP
GO:0046390	80	0.00220155	5.20E-05	0.00897653	BP	ribose phosphate biosynthetic process	UP
GO:0006403	152	0.00190855	5.84E-05	0.00986721	BP	RNA localization	UP
GO:0017004	37	0.00254047	6.03E-05	0.01011841	BP	cytochrome complex assembly	UP
GO:0014070	11	0.00313217	6.96E-05	0.01151578	BP	response to organic cyclic compound	UP
GO:0032040	52	0.00235441	7.33E-05	0.01197497	CC	small-subunit processome	UP
GO:0009152	61	0.00229879	7.54E-05	0.01223488	BP	purine ribonucleotide biosynthetic process	UP
GO:0006123	11	0.0029779	8.80E-05	0.01410238	BP	mitochondrial electron transport, cytochrome c to oxygen	UP
GO:0008535	25	0.00268304	9.49E-05	0.01510809	BP	respiratory chain complex IV assembly	UP
GO:0000788	12	0.0030257	0.00010289	0.01616805	CC	nuclear nucleosome	UP
GO:0005751	11	0.00303402	0.00010797	0.01675319	CC	mitochondrial respiratory chain complex IV	UP
GO:0045277	11	0.00303402	0.00010797	0.01675319	CC	respiratory chain complex IV	UP
GO:0005732	30	0.00253821	0.00014232	0.0216733	CC	small nucleolar ribonucleoprotein complex	UP
GO:0000786	15	0.00288156	0.0001504	0.02248753	CC	nucleosome	UP
GO:0008092	100	0.00198951	0.00016651	0.02443232	MF	cytoskeletal protein binding	UP
GO:0090501	188	0.00170431	0.00016737	0.02443232	BP	RNA phosphodiester bond hydrolysis	UP
GO:0031967	569	0.00124165	0.00018799	0.02712133	CC	organelle envelope	UP
GO:0031975	569	0.00124165	0.00018799	0.02712133	CC	envelope	UP
GO:0098655	149	0.00179275	0.00020104	0.02866904	BP	cation transmembrane transport	UP
GO:0016471	17	0.00273685	0.00022088	0.03113849	CC	vacuolar proton-transporting V-type ATPase complex	UP
GO:0033176	17	0.00273685	0.00022088	0.03113849	CC	proton-transporting V-type ATPase complex	UP
GO:0005743	240	0.00156811	0.00023987	0.03362281	CC	mitochondrial inner membrane	UP
GO:0050657	138	0.00182248	0.00026815	0.03737496	BP	nucleic acid transport	UP
GO:0000470	55	0.00220293	0.00027508	0.03812537	BP	maturation of LSU-rRNA	UP
GO:0031125	23	0.00261693	0.00027878	0.03842258	BP	rRNA 3'-end processing	UP
GO:0097034	29	0.00250561	0.0003092	0.0421442	BP	mitochondrial respiratory chain complex IV biogenesis	UP
GO:0007007	29	0.00249421	0.00031499	0.04269753	BP	inner mitochondrial membrane organization	UP
GO:0006890	34	0.00243617	0.00033549	0.04517762	BP	retrograde vesicle-mediated transport, Golgi to ER	UP
GO:0050658	136	0.00180774	0.00033878	0.04517762	BP	RNA transport	UP
GO:0051236	136	0.00180774	0.00033878	0.04517762	BP	establishment of RNA localization	UP
GO:0009144	101	0.0019411	0.00036848	0.04887374	BP	purine nucleoside triphosphate metabolic process	UP
GO:0006119	33	0.00240497	0.00039873	0.05232326	BP	oxidative phosphorylation	UP
GO:0006913	188	0.00164304	0.00040102	0.05234555	BP	nucleocytoplasmic transport	UP
GO:0005746	29	0.00246884	0.0004202	0.05427558	CC	mitochondrial respiratory chain	UP
GO:0098803	29	0.00246884	0.0004202	0.05427558	CC	respiratory chain complex	UP
GO:0051169	189	0.00163005	0.00044936	0.05773972	BP	nuclear transport	UP
GO:0007035	27	0.00247021	0.0004703	0.05889657	BP	vacuolar acidification	UP

GO:0045851	27	0.00247021	0.0004703	0.05889657	BP	pH reduction	UP
GO:0051452	27	0.00247021	0.0004703	0.05889657	BP	intracellular pH reduction	UP
GO:0000313	86	0.00195424	0.00046532	0.05889657	CC	organellar ribosome	UP
GO:0005761	86	0.00195424	0.00046532	0.05889657	CC	mitochondrial ribosome	UP
GO:0009119	149	0.00172554	0.00049	0.06105356	BP	ribonucleoside metabolic process	UP
GO:0006164	64	0.00210611	0.00049878	0.06183544	BP	purine nucleotide biosynthetic process	UP
GO:0009141	112	0.00185398	0.0005264	0.06460981	BP	nucleoside triphosphate metabolic process	UP
GO:0019866	252	0.00147608	0.0005463	0.06672043	CC	organelle inner membrane	UP
GO:0015988	12	0.00278752	0.00058342	0.07023542	BP	energy coupled proton transmembrane transport, against electrochemical gradient	UP
GO:0015991	12	0.00278752	0.00058342	0.07023542	BP	ATP hydrolysis coupled proton transport	UP
GO:0000011	19	0.0026369	0.00058362	0.07023542	BP	vacuole inheritance	UP
GO:0031981	844	0.00101837	0.00059109	0.07078877	CC	nuclear lumen	UP
GO:0001731	11	0.00282955	0.00066878	0.07970603	BP	formation of translation preinitiation complex	UP
GO:0031966	378	0.0012898	0.00070432	0.08353785	CC	mitochondrial membrane	UP
GO:0003743	37	0.00229368	0.00074855	0.0883587	MF	translation initiation factor activity	UP
GO:0007006	53	0.00212734	0.00079582	0.09349144	BP	mitochondrial membrane organization	UP
GO:0042026	17	-0.00116121	4.09E-08	1.60E-05	BP	protein refolding	DOWN
HSF1.DEP	165	-0.00574395	4.19E-07	0.00013599	NA	NA	DOWN
GO:0006950	881	-0.00129861	3.48E-06	0.00091419	BP	response to stress	DOWN
GO:0034614	21	-0.00177622	1.06E-05	0.00233677	BP	cellular response to reactive oxygen species	DOWN
GO:0000302	29	-0.00168189	1.61E-05	0.00335884	BP	response to reactive oxygen species	DOWN
GO:0098754	11	-0.00147391	2.07E-05	0.00422253	BP	detoxification	DOWN
GO:1990748	11	-0.00147391	2.07E-05	0.00422253	BP	cellular detoxification	DOWN
GO:0046686	13	-0.0014669	2.19E-05	0.00433081	BP	response to cadmium ion	DOWN
GO:0034605	55	-0.00105887	2.37E-05	0.00461055	BP	cellular response to heat	DOWN
GO:0009636	26	-0.0011227	2.73E-05	0.00514254	BP	response to toxic substance	DOWN
GO:0072593	19	-0.00138864	2.80E-05	0.00519264	BP	reactive oxygen species metabolic process	DOWN
GO:1990267	23	-0.00132106	2.78E-05	0.00519264	BP	response to transition metal nanoparticle	DOWN
GO:0016209	35	-0.00109146	3.31E-05	0.00597373	MF	antioxidant activity	DOWN
GO:0005507	22	-0.00126515	4.26E-05	0.00755297	MF	copper ion binding	DOWN
GO:0009408	74	-0.00101301	4.97E-05	0.00864277	BP	response to heat	DOWN
GO:0010038	34	-0.00133354	5.39E-05	0.00923281	BP	response to metal ion	DOWN
GO:0009266	79	-0.00100304	5.74E-05	0.00976769	BP	response to temperature stimulus	DOWN
GO:1901701	60	-0.00140257	6.46E-05	0.0107764	BP	cellular response to oxygen-containing compound	DOWN
GO:0010035	67	-0.00136325	7.24E-05	0.01191459	BP	response to inorganic substance	DOWN
GO:0051082	82	-0.00100365	7.76E-05	0.01251138	MF	unfolded protein binding	DOWN
GO:0033554	789	-0.00099793	9.94E-05	0.01571929	BP	cellular response to stress	DOWN
GO:0006457	114	-0.00103093	0.0001361	0.02098493	BP	protein folding	DOWN
GO:0006979	123	-0.00120921	0.00013826	0.02118572	BP	response to oxidative stress	DOWN
GO:1901700	88	-0.00111673	0.00014553	0.0220259	BP	response to oxygen-containing compound	DOWN
GO:0034599	113	-0.00119688	0.00014979	0.02248753	BP	cellular response to oxidative stress	DOWN

GO:0009628	187	-0.00107974	0.00015763	0.02342605	BP	response to abiotic stimulus	DOWN
GO:0006458	23	-0.00087014	0.00015949	0.02356066	BP	'de novo' protein folding	DOWN
GO:0000491	10	-0.00093799	0.00019762	0.0283454	BP	small nucleolar ribonucleoprotein complex assembly	DOWN
GO:0042221	525	-0.00091829	0.00030118	0.04127929	BP	response to chemical	DOWN
GO:0070887	393	-0.00089854	0.00038977	0.0514209	BP	cellular response to chemical stimulus	DOWN
MEX67.DEP	64	-0.00075242	0.00050872	0.06275132	NA	NA	DOWN
GO:0046914	292	-0.00073644	0.00080806	0.09447934	MF	transition metal ion binding	DOWN

Annex 3. PAR-CLIP results obtained after reads normalization with RPKM and RNA-seq from McKinlay *et al.*, 2011.

Columns	Sys.gene	Systematic gene name
	<i>gene</i>	Standard gene name
	<i>parclip30</i>	Reads value of PAR-CLIP at 30 °C
	<i>parclip39</i>	Reads value of PAR-CLIP after heat shock treatment during 20 minutes at 39 °C
	<i>RNAmean30</i>	Reads value of expression data in McKinlay et al, 2011 after same data treatment than PAR-CLIP data from cells grown at 30 °C
	<i>RNAmean39</i>	Reads value of expression data in McKinlay et al, 2011 after same data treatment than PAR-CLIP data from cells after heat shock treatment during 20 minutes at 39 °C
	<i>FCpar_rna_30</i>	Reads value of normalized PAR-CLIP at 30 °C
	<i>FCpar_rna_39</i>	Reads value of normalized PAR-CLIP after heat shock treatment during 20 minutes at 39 °C
	<i>diffNoiseq_rna</i>	Is there any significative difference between both conditions?
	<i>diffNoiseq_rna_prob</i>	NOiseq value (p-value) obtained after comparison between both conditions
	<i>upNoiseq_rna</i>	Is Mip6 binding at 39 °C higher than 30 °C?
	<i>downNoiseq_rna</i>	Is Mip6 binding at 30 °C higher than 39 °C?

Sys.gene	gene	parclip30	parclip39	RNAmean30	RNAmean39	FCpar_rna_30	FCpar_rna_39	diffNoiseq_rna	diffNoiseq_rna_prob	upNoiseq_rna	downNoiseq_rna
YAL001C	TFC3	62.32298067	68.24220511	113.8808439	80.61065688	0.54726483	0.84656555	FALSE	0.383044983	FALSE	FALSE
YAL002W	VPS8	27.67995386	30.36216936	177.4246447	120.9303767	0.156009634	0.251071486	FALSE	0.383044983	FALSE	FALSE
YAL003W	EFB1	691.9436285	671.0354309	7131.267873	4686.4757	0.097029538	0.143185514	FALSE	0.383044983	FALSE	FALSE
YAL005C	SSA1	847.5846894	1493.958812	3400.119393	29246.24582	0.249280861	0.051082071	FALSE	0.383044983	FALSE	FALSE
YAL008W	FUN14	130.3551245	143.8514979	315.707843	479.8634221	0.41289796	0.299775918	FALSE	0.383044983	FALSE	FALSE
YAL009W	SPO7	112.196573	101.2935855	94.9663747	63.45882891	1.181434727	1.596209499	FALSE	0.383044983	FALSE	FALSE
YAL011W	SWC3	33.56229935	31.94005265	178.4998245	146.102877	0.188024271	0.218613441	FALSE	0.383044983	FALSE	FALSE
YAL012W	CYS3	81.22985057	73.47547918	3205.312672	3776.241259	0.025342255	0.019457305	FALSE	0.383044983	FALSE	FALSE
YAL013W	DEP1	12.80258512	10.0881382	3474.016345	3694.719169	0.00368524	0.002730421	FALSE	0.383044983	FALSE	FALSE
YAL014C	SYN8	147.1572844	143.3042743	243.3679085	278.5057623	0.604670046	0.514546892	FALSE	0.383044983	FALSE	FALSE
YAL015C	NTG1	96.73100876	123.2038284	32.96662453	38.54363223	2.934210285	3.196476858	FALSE	0.383044983	FALSE	FALSE
YAL016C-A	YAL016C-A	1.850591744	4.194351366	116.6459876	160.7805242	0.015865027	0.026087434	FALSE	0.383044983	FALSE	FALSE
YAL016W	TPD3	170.2140678	192.1586681	8.488380808	3.372255088	20.05259563	56.98224574	FALSE	0.858073818	FALSE	FALSE
YAL017W	PSK1	43.29781227	52.21921087	66.18825157	93.72787487	0.654161596	0.557136401	FALSE	0.383044983	FALSE	FALSE
YAL019W	FUN30	39.84514478	38.51615057	1620.042566	1115.130275	0.024595122	0.034539597	FALSE	0.383044983	FALSE	FALSE
YAL020C	ATS1	155.8424032	182.0963832	306.476003	572.8799403	0.508497898	0.317861336	FALSE	0.383044983	FALSE	FALSE
YAL021C	CCR4	19.15875895	18.81451884	5723.69316	5242.880403	0.003347272	0.003588584	FALSE	0.383044983	FALSE	FALSE
YAL022C	FUN26	45.99908363	48.97188622	1032.115045	1379.776829	0.044567787	0.035492614	FALSE	0.383044983	FALSE	FALSE
YAL023C	PMT2	63.21536172	47.9232238	2710.665703	2250.947056	0.023320973	0.021290249	FALSE	0.383044983	FALSE	FALSE
YAL024C	LTE1	11.87387861	9.906088202	41.73582946	6.362089496	0.284500842	1.55704949	FALSE	0.699437716	FALSE	FALSE
YAL025C	MAK16	138.3761892	79.18716781	3315.573683	1879.705712	0.041735218	0.042127428	FALSE	0.383044983	FALSE	FALSE
YAL026C	DRS2	23.50087745	21.37077698	42.28978711	22.52595802	0.55571047	0.948717784	FALSE	0.383044983	FALSE	FALSE
YAL027W	SAW1	38.19494219	44.20878358	2.493830727	6.463917802	15.31577175	6.839317104	FALSE	0.821655133	FALSE	FALSE
YAL028W	FRT2	33.88524438	45.03972199	62.5383672	55.11367445	0.541831293	0.81721501	FALSE	0.383044983	FALSE	FALSE
YAL029C	MYO4	61.33306715	48.88755869	250.926759	162.0102906	0.244426172	0.301755885	FALSE	0.383044983	FALSE	FALSE
YAL030W	SNC1	229.5106233	212.3656969	108.3610337	267.4249774	2.118018032	0.794113171	FALSE	0.699437716	FALSE	FALSE
YAL031C	GIP4	22.24631353	33.04498504	230.5384887	272.3118076	0.096497178	0.121349806	FALSE	0.383044983	FALSE	FALSE
YAL032C	PRP45	32.91800939	35.34844803	228.4878062	174.4448289	0.144068998	0.202633969	FALSE	0.383044983	FALSE	FALSE
YAL033W	POP5	370.7564838	302.463355	253.2509483	111.1511577	1.463988531	2.721189426	FALSE	0.45227797	FALSE	FALSE
YAL034C	FUN19	38.25226775	89.99619127	366.1152989	446.8876964	0.104481479	0.201384357	FALSE	0.383044983	FALSE	FALSE
YAL034W-A	MTW1	67.25544951	42.21831599	101.6087524	103.2982331	0.661906065	0.408703176	FALSE	0.383044983	FALSE	FALSE
YAL035W	FUN12	102.9437784	83.77830037	9867.28661	5631.241448	0.010432836	0.014877412	FALSE	0.383044983	FALSE	FALSE
YAL036C	RBG1	275.3849319	213.8949155	854.7241631	620.8848696	0.322191584	0.344500126	FALSE	0.383044983	FALSE	FALSE
YAL037W	YAL037W	33.17082123	41.90438725	5.481232119	1	6.051708905	41.90438725	TRUE	0.985640138	TRUE	FALSE
YAL038W	CDC19	486.0712192	524.3567104	48704.8352	44798.779	0.009979938	0.01170471	FALSE	0.383044983	FALSE	FALSE
YAL039C	CYC3	76.64534139	77.9683315	569.6709228	1410.360752	0.134543187	0.055282545	FALSE	0.383044983	FALSE	FALSE
YAL040C	CLN3	34.07151215	41.16023118	335.9395358	442.9157552	0.101421561	0.092930158	FALSE	0.383044983	FALSE	FALSE
YAL041W	CDC24	63.00940222	74.74039794	261.1307719	240.4386974	0.241294436	0.31085012	FALSE	0.383044983	FALSE	FALSE
YAL042C-A	YAL042C-A	1.542159786	1.048587841	25.9588642	1	0.05940783	1.048587841	FALSE	0.577652826	FALSE	FALSE
YAL042W	ERV46	103.1699336	83.63496293	1198.639101	1313.125333	0.086072558	0.063691531	FALSE	0.383044983	FALSE	FALSE
YAL043C	PTA1	16.03816747	16.02498365	1580.352644	1510.834752	0.010148474	0.010606708	FALSE	0.383044983	FALSE	FALSE
YAL044C	GCV3	620.0091089	1058.264284	3509.794531	3811.787363	0.176651113	0.277629412	FALSE	0.383044983	FALSE	FALSE
YAL046C	AIM1	277.9969803	232.0463212	246.0887318	152.7701117	1.129661559	1.518924864	FALSE	0.383044983	FALSE	FALSE

YAL047C	SPC72	32.59328717	47.08041589	76.1685424	18.97216525	0.427910081	2.481552067	FALSE	0.827537486	FALSE	FALSE
YAL048C	GEM1	14.80054709	26.57055164	75.07609104	6.856918679	0.197140619	3.874998798	FALSE	0.897419262	FALSE	FALSE
YAL049C	AIM2	106.7930043	95.5700789	297.4522988	311.5707175	0.359025648	0.306736396	FALSE	0.383044983	FALSE	FALSE
YAL051W	OAF1	27.64961531	44.37687781	267.3609104	222.6704341	0.103416821	0.199293983	FALSE	0.383044983	FALSE	FALSE
YAL053W	FLC2	27.51102905	37.97385969	1320.427408	3095.723679	0.020834942	0.012266553	FALSE	0.383044983	FALSE	FALSE
YAL054C	ACS1	17.72349813	32.01276998	144.7729845	313.0635585	0.12242269	0.102256456	FALSE	0.383044983	FALSE	FALSE
YAL055W	PEX22	152.9805468	123.6059126	141.0823813	81.50833007	1.084334878	1.516481966	FALSE	0.383044983	FALSE	FALSE
YAL056W	GPB2	102.6976016	112.3262531	125.0885629	48.74075834	0.820999132	2.30456515	FALSE	0.699437716	FALSE	FALSE
YAL058W	CNE1	29.89045984	37.38643012	620.7483583	806.810649	0.048152298	0.046338543	FALSE	0.383044983	FALSE	FALSE
YAL059W	ECM1	590.0064417	345.0887818	8.537164945	1	69.11034816	345.0887818	TRUE	0.965657439	TRUE	FALSE
YAL060W	BDH1	227.0357169	313.9192739	285.5054049	1107.198337	0.795206371	0.283525782	FALSE	0.577652826	FALSE	FALSE
YAL061W	BDH2	46.13751007	94.50836924	370.2837819	1323.789368	0.124600407	0.071392301	FALSE	0.383044983	FALSE	FALSE
YAL062W	GDH3	24.18295106	39.52122996	278.4110021	552.2882422	0.086860616	0.071559065	FALSE	0.383044983	FALSE	FALSE
YAL063C	FLO9	1.707391192	2.796234244	62.90114773	41.96624884	0.027144039	0.06663055	FALSE	0.383044983	FALSE	FALSE
YAR002C-A	ERP1	264.5294721	193.5788482	49.15009353	142.1870487	5.382074643	1.361437978	FALSE	0.831055363	FALSE	FALSE
YAR002W	NUP60	20.37578618	15.7404686	21.30399341	1	0.956430364	15.7404686	TRUE	0.993555363	TRUE	FALSE
YAR003W	SWD1	120.1936584	91.38185189	386.6804135	92.79119653	0.310834618	0.984811656	FALSE	0.577652826	FALSE	FALSE
YAR007C	RFA1	70.68025742	65.91942408	7.047898874	8.453735357	0.102855726	7.797668284	FALSE	0.430449827	FALSE	FALSE
YAR008W	SEN34	195.1921699	123.9841146	13.72540057	1	14.22123667	123.9841146	TRUE	0.995155709	TRUE	FALSE
YAR009C	YAR009C	31.57369247	42.23785411	1	9.341689426	31.57369247	4.521436346	TRUE	0.985034602	FALSE	TRUE
YAR014C	BUD14	59.38835617	69.41060757	1458.86363	802.3548527	0.040708641	0.086508616	FALSE	0.383044983	FALSE	FALSE
YAR015W	ADE1	117.4101	135.1346233	1043.916916	557.8457679	0.112470732	0.242243701	FALSE	0.383044983	FALSE	FALSE
YAR018C	KIN3	140.2189332	80.60658279	183.6266539	172.6888874	0.763608824	0.466773421	FALSE	0.383044983	FALSE	FALSE
YAR019C	CDC15	12.48081778	18.33899474	217.5946599	284.8127033	0.057358107	0.064389666	FALSE	0.383044983	FALSE	FALSE
YAR019W-A	YAR019W-A	1.750559758	3.570866703	1	18.68337885	1.750559758	0.191125317	FALSE	0.752926759	FALSE	FALSE
YAR020C	PAU7	3.03612708	7.07796793	13.69335396	16.24007056	0.221722676	0.43583357	FALSE	0.383044983	FALSE	FALSE
YAR027W	UIP3	179.5946357	203.0350424	20.8740467	1	8.603728749	203.0350424	TRUE	0.999985582	TRUE	FALSE
YAR028W	YAR028W	46.30416789	77.9613905	64.07381112	156.842092	0.72266917	0.49706931	FALSE	0.383044983	FALSE	FALSE
YAR031W	PRM9	13.72857462	16.93872667	1	8.571148349	13.72857462	1.976249387	TRUE	0.97482699	FALSE	TRUE
YAR033W	MST28	54.77948433	58.84585725	85.29815175	55.02803715	0.642211856	1.069379544	FALSE	0.383044983	FALSE	FALSE
YAR035W	YAT1	2.753696654	2.816555714	477.1866034	579.7059333	0.005770691	0.004858594	FALSE	0.383044983	FALSE	FALSE
YAR042W	SWH1	25.61684345	25.18727397	4499.698675	6043.798192	0.005693013	0.004167458	FALSE	0.383044983	FALSE	FALSE
YAR050W	FLO1	2.02145262	2.691693627	156.4057214	170.4464717	0.012924416	0.015792017	FALSE	0.383044983	FALSE	FALSE
YAR064W	YAR064W	1	1	1	31.38106442	1	0.031866351	FALSE	0.577652826	FALSE	FALSE
YAR068W	YAR068W	2.548847425	3.262273285	21.43735907	18.94287022	0.118897454	0.172216419	FALSE	0.383044983	FALSE	FALSE
YBL002W	HTB2	153.0944079	146.8022978	942.222315	37.88574045	0.162482257	3.874869438	FALSE	0.897419262	FALSE	FALSE
YBL003C	HTA2	1287.317882	802.0041322	42.28615812	8.571148349	30.44300875	93.57020782	FALSE	0.888480392	FALSE	FALSE
YBL004W	UTP20	52.32754065	69.36320278	205.9749414	45.88573094	0.254048091	1.51165082	FALSE	0.699437716	FALSE	FALSE
YBL005W	PDR3	16.83077202	20.55532686	177.9298606	215.102787	0.094592172	0.095560486	FALSE	0.383044983	FALSE	FALSE
YBL005W-B	YBL005W-B	40.8182734	54.52417918	43.84985695	9.471435112	0.93086446	5.756696692	TRUE	0.919045559	TRUE	FALSE
YBL006C	LDB7	272.9495019	231.6394268	487.4345398	768.7661464	0.559971606	0.301313251	FALSE	0.383044983	FALSE	FALSE
YBL007C	SLA1	45.63213648	47.29510173	6462.366149	8415.323459	0.007061212	0.005620117	FALSE	0.383044983	FALSE	FALSE
YBL008W	HIR1	26.91719798	38.64688316	326.0379233	361.2440282	0.082558488	0.10698276	FALSE	0.383044983	FALSE	FALSE
YBL008W-A	YBL008W-A	6.375866867	6.606103401	14.61661898	12.4381942	0.436206682	0.531114348	FALSE	0.383044983	FALSE	FALSE

YBL009W	ALK2	25.83174591	29.79414434	21.43735907	1	1.204987322	29.79414434	TRUE	0.999106113	TRUE	FALSE
YBL010C	YBL010C	89.11735286	74.44600512	1	8.571148349	89.11735286	8.685651221	TRUE	0.997981546	FALSE	TRUE
YBL011W	SCT1	48.25844095	65.19180988	1028.593964	972.9021838	0.046916901	0.067007569	FALSE	0.383044983	FALSE	FALSE
YBL012C	YBL012C	1.268829227	1	68.99740004	35.59084957	0.018389522	0.02809711	FALSE	0.383044983	FALSE	FALSE
YBL013W	FMT1	10.02979294	8.326100473	505.4690942	1000.039447	0.019842544	0.008325772	FALSE	0.383044983	FALSE	FALSE
YBL014C	RRN6	88.06464691	108.8469328	494.0376523	417.2087144	0.17825493	0.260893239	FALSE	0.383044983	FALSE	FALSE
YBL015W	ACH1	52.03472445	60.67085477	1795.63085	2469.691756	0.02897852	0.024566165	FALSE	0.383044983	FALSE	FALSE
YBL016W	FUS3	59.00721556	32.71949519	4087.073504	5945.494096	0.014437522	0.005503242	FALSE	0.383044983	FALSE	FALSE
YBL017C	PEP1	31.85243194	21.79735384	1266.165909	622.7258818	0.025156602	0.035003128	FALSE	0.383044983	FALSE	FALSE
YBL019W	APN2	38.64797465	62.55299446	41.54659889	35.59084957	0.930231973	1.757558339	FALSE	0.383044983	FALSE	FALSE
YBL020W	RFT1	40.08743789	47.25757448	530.476526	198.9380475	0.075568731	0.237549202	FALSE	0.383044983	FALSE	FALSE
YBL021C	HAP3	94.64340965	59.53086284	706.2371849	732.5257341	0.134010799	0.081267947	FALSE	0.383044983	FALSE	FALSE
YBL022C	PIM1	124.1224439	138.1029024	2278.645526	4207.948026	0.054472028	0.032819536	FALSE	0.383044983	FALSE	FALSE
YBL023C	MCM2	85.58454424	75.25940584	961.829829	565.0986764	0.088980963	0.133179229	FALSE	0.383044983	FALSE	FALSE
YBL024W	NCL1	60.84664606	54.32756569	299.3687706	66.89507348	0.203249811	0.812131041	FALSE	0.577652826	FALSE	FALSE
YBL025W	RRN10	78.85612251	69.98246526	36.23215618	148.8670976	2.176412635	0.470100287	FALSE	0.752926759	FALSE	FALSE
YBL026W	LSM2	570.791891	496.8340267	7.111243429	8.691868748	77.01702102	57.16078338	FALSE	0.477350058	FALSE	FALSE
YBL027W	RPL19B	645.8321687	443.4202038	5998.38591	1965.625639	0.107667659	0.225587312	FALSE	0.383044983	FALSE	FALSE
YBL028C	YBL028C	828.7775677	581.5840565	36.18094967	1	22.90646252	581.5840565	TRUE	0.999985582	TRUE	FALSE
YBL029C-A	YBL029C-A	427.9980405	309.675584	1	8.691868748	427.9980405	35.62819377	TRUE	0.999134948	FALSE	TRUE
YBL029W	YBL029W	37.6898534	33.52699693	102.0836828	144.8814656	0.369205463	0.231409841	FALSE	0.383044983	FALSE	FALSE
YBL030C	PET9	299.7675815	169.6740038	815.7936466	528.8668193	0.367455156	0.32082558	FALSE	0.383044983	FALSE	FALSE
YBL031W	SHE1	34.31987896	24.16391805	28.76970624	1	1.192917254	24.16391805	TRUE	0.998082468	TRUE	FALSE
YBL032W	HEK2	46.289016	42.54192243	2837.440103	1854.412701	0.016313654	0.022940914	FALSE	0.383044983	FALSE	FALSE
YBL033C	RIB1	71.67365892	86.68124116	1418.420292	1919.035891	0.050530622	0.045169161	FALSE	0.383044983	FALSE	FALSE
YBL034C	STU1	17.05364907	17.88971199	198.6202628	62.66901495	0.08586057	0.28546343	FALSE	0.383044983	FALSE	FALSE
YBL035C	POL12	25.49314636	18.8389351	367.4334092	166.2508351	0.069381678	0.113316334	FALSE	0.383044983	FALSE	FALSE
YBL036C	YBL036C	254.3756704	262.8785333	14.65767466	34.76747499	17.35443555	7.561047598	FALSE	0.826787774	FALSE	FALSE
YBL037W	APL3	30.32576054	38.41756039	64.95065591	17.3837375	0.466904608	2.209971268	FALSE	0.752926759	FALSE	FALSE
YBL038W	MRPL16	295.5337432	256.8725185	152.2630584	370.6755748	1.940941856	0.692984745	FALSE	0.699437716	FALSE	FALSE
YBL039C	URA7	190.6687806	158.9261427	578.6935866	114.9484688	0.329481413	1.382585992	FALSE	0.699437716	FALSE	FALSE
YBL039W-B	YBL039W-B	349.7618396	303.8807565	21.92492848	1	15.95270151	303.8807565	TRUE	0.999927912	TRUE	FALSE
YBL040C	ERD2	369.8554806	409.5784109	28.58314543	1	12.9396354	409.5784109	TRUE	1	TRUE	FALSE
YBL041W	PRE7	430.67839	378.1675721	845.349774	1438.331719	0.509467682	0.262920971	FALSE	0.383044983	FALSE	FALSE
YBL042C	FUI1	80.64712555	94.06815989	459.3026789	228.1121391	0.175586012	0.412376826	FALSE	0.383044983	FALSE	FALSE
YBL043W	ECM13	29.84348168	37.21267549	57.41559416	223.2292377	0.519780072	0.16670162	FALSE	0.383044983	FALSE	FALSE
YBL045C	COR1	168.5381984	99.42810651	1378.571799	696.9010716	0.122255655	0.142671766	FALSE	0.383044983	FALSE	FALSE
YBL046W	PSY4	69.67980338	65.66247574	709.2142574	457.4143335	0.098249299	0.143551417	FALSE	0.383044983	FALSE	FALSE
YBL047C	EDE1	41.28429818	43.46707689	3347.648186	5039.649783	0.012332329	0.008625019	FALSE	0.383044983	FALSE	FALSE
YBL049W	MOH1	36.69563665	172.043844	1	9.092577708	36.69563665	18.92134986	FALSE	0.559457901	FALSE	FALSE
YBL050W	SEC17	292.7116647	295.0575876	69.24561292	1	4.22715104	295.0575876	TRUE	1	TRUE	FALSE
YBL051C	PIN4	55.54887213	56.87766157	1120.644298	1067.39231	0.049568692	0.053286557	FALSE	0.383044983	FALSE	FALSE
YBL054W	TOD6	16.11571636	19.1736081	648.2459278	921.1412926	0.024860498	0.020815057	FALSE	0.383044983	FALSE	FALSE
YBL055C	YBL055C	142.9515872	162.0781455	118.0723425	66.77748671	1.210711875	2.42713755	FALSE	0.699437716	FALSE	FALSE

YBL056W	PTC3	374.6412502	388.2905127	1638.777394	1529.53254	0.228610214	0.253862211	FALSE	0.383044983	FALSE	FALSE
YBL057C	PTH2	128.9497959	185.8559234	353.6689398	195.3122196	0.619081212	0.951583694	FALSE	0.383044983	FALSE	FALSE
YBL058W	SHP1	122.4762207	113.6332881	2448.198951	3457.653382	0.05002707	0.03286428	FALSE	0.383044983	FALSE	FALSE
YBL059C-A	CMC2	692.0161649	558.1156449	1	12.10202678	692.0161649	46.11753509	TRUE	0.999610727	FALSE	TRUE
YBL059W	YBL059W	64.22817286	43.35964776	96.05832663	63.01495562	0.668637224	0.688085032	FALSE	0.383044983	FALSE	FALSE
YBL060W	YEL1	116.8555888	100.2437784	27.6033668	16.67899138	4.233381733	6.010182275	FALSE	0.428460208	FALSE	FALSE
YBL061C	SKT5	82.41538644	101.6031972	966.9827131	1054.414329	0.085229431	0.096359841	FALSE	0.383044983	FALSE	FALSE
YBL063W	KIP1	27.89305238	31.12948006	367.645477	189.1342093	0.075869429	0.164589368	FALSE	0.383044983	FALSE	FALSE
YBL064C	PRX1	230.0040087	244.7452049	325.8778917	1055.440342	0.705798137	0.231889189	FALSE	0.383044983	FALSE	FALSE
YBL066C	SEF1	17.33419812	18.35986962	35.37488936	43.2189948	0.4900142	0.424810195	FALSE	0.383044983	FALSE	FALSE
YBL067C	UBP13	59.71591122	64.9423534	359.550206	314.8759361	0.166085042	0.206247433	FALSE	0.383044983	FALSE	FALSE
YBL068W	PRS4	116.4684345	125.2533367	20.58810086	1	5.657075187	125.2533367	TRUE	0.999971165	TRUE	FALSE
YBL069W	AST1	75.80432634	89.72010201	296.3043147	463.7796331	0.255832678	0.193454166	FALSE	0.383044983	FALSE	FALSE
YBL070C	YBL070C	3.405002332	2.469571365	13.91059916	1	0.244777546	2.469571365	FALSE	0.827537486	FALSE	FALSE
YBL071W-A	KTI11	107.1057842	110.8976394	190.8706374	349.0543189	0.561143326	0.31770883	FALSE	0.383044983	FALSE	FALSE
YBL072C	RPS8A	362.6434772	256.7944672	991.237163	92.22786275	0.365849356	2.784348022	FALSE	0.827537486	FALSE	FALSE
YBL074C	AAR2	28.4508987	49.23650101	62.98598729	38.51696811	0.451702036	1.278306768	FALSE	0.577652826	FALSE	FALSE
YBL075C	SSA3	59.41467146	451.7219628	148.5225545	968.5765476	0.400038039	0.466377143	FALSE	0.383044983	FALSE	FALSE
YBL076C	ILS1	218.238965	141.7264681	2416.851276	871.134946	0.090298881	0.162691749	FALSE	0.383044983	FALSE	FALSE
YBL078C	ATG8	299.9076037	381.0639307	1	18.68337885	299.9076037	20.3958788	TRUE	0.999596309	FALSE	TRUE
YBL079W	NUP170	45.10355651	52.86054795	2470.686298	1909.564574	0.018255477	0.02768199	FALSE	0.383044983	FALSE	FALSE
YBL080C	PET112	58.84036687	51.0286954	629.6388866	704.4853876	0.093450973	0.072434001	FALSE	0.383044983	FALSE	FALSE
YBL081W	YBL081W	13.36225034	11.21903739	1304.47854	717.2694436	0.010243365	0.015641315	FALSE	0.383044983	FALSE	FALSE
YBL082C	ALG3	16.56309849	15.35187428	2219.167742	1452.314498	0.007463653	0.010570627	FALSE	0.383044983	FALSE	FALSE
YBL085W	BOI1	27.85437688	23.74875093	1273.82393	896.4228263	0.02186674	0.0264928	FALSE	0.383044983	FALSE	FALSE
YBL086C	YBL086C	31.31046684	35.36457924	851.765229	622.5318847	0.036759503	0.056807659	FALSE	0.383044983	FALSE	FALSE
YBL087C	RPL23A	643.4829335	463.3846444	8267.391343	3348.216824	0.077833854	0.138397442	FALSE	0.383044983	FALSE	FALSE
YBL088C	TEL1	21.58830101	30.29771957	162.3405742	140.3199668	0.132981549	0.215918805	FALSE	0.383044983	FALSE	FALSE
YBL089W	AVT5	40.44649292	50.07234897	37.64609398	1	1.074387503	50.07234897	TRUE	0.999841407	TRUE	FALSE
YBL090W	MRP21	454.9414689	342.6761502	24.43790834	15.05177271	18.61621963	22.7664978	FALSE	0.426903114	FALSE	FALSE
YBL091C	MAP2	67.8020417	53.53761524	3885.593351	2849.908207	0.017449598	0.018785733	FALSE	0.383044983	FALSE	FALSE
YBL091C-A	SCS22	77.28323475	68.56334591	387.4689758	528.370245	0.199456575	0.129763829	FALSE	0.383044983	FALSE	FALSE
YBL092W	RPL32	465.7557999	279.3726171	2404.622636	590.1583272	0.193691847	0.473385877	FALSE	0.383044983	FALSE	FALSE
YBL093C	ROX3	101.0027434	66.95779013	1022.437124	846.9495604	0.098786264	0.079057589	FALSE	0.383044983	FALSE	FALSE
YBL095W	YBL095W	129.2426642	143.3353801	43.11004754	40.04810365	2.997970811	3.579080331	FALSE	0.383044983	FALSE	FALSE
YBL097W	BRN1	47.25902707	42.11573206	498.455648	327.9820541	0.094810897	0.128408648	FALSE	0.383044983	FALSE	FALSE
YBL098W	BNA4	36.82868249	48.14860614	74.15276285	90.58380059	0.496659613	0.531536608	FALSE	0.383044983	FALSE	FALSE
YBL099W	ATP1	288.57665	118.6517473	1264.463731	923.369363	0.228220583	0.128498683	FALSE	0.383044983	FALSE	FALSE
YBL100C	YBL100C	1	1	140.5183599	135.153556	0.007116508	0.007398991	FALSE	0.383044983	FALSE	FALSE
YBL101C	ECM21	18.48833019	29.70186025	1949.710655	3385.708388	0.009482602	0.008772717	FALSE	0.383044983	FALSE	FALSE
YBL102W	SFT2	292.9300386	291.7695669	522.1628781	590.9583861	0.560993611	0.493722695	FALSE	0.383044983	FALSE	FALSE
YBL103C	RTG3	55.6103769	44.40241985	115.4197484	89.70498955	0.481809896	0.494982721	FALSE	0.383044983	FALSE	FALSE
YBL104C	SEA4	57.95233132	63.1574852	42.05239106	116.1766021	1.378098364	0.543633435	FALSE	0.577652826	FALSE	FALSE
YBL105C	PKC1	36.0961775	37.31225069	422.3966271	242.8194743	0.085455648	0.153662513	FALSE	0.383044983	FALSE	FALSE

YBL106C	SRO77	10.69101128	14.02680709	169.4561508	54.27422842	0.063090134	0.258443234	FALSE	0.383044983	FALSE	FALSE
YBL107C	MIX23	435.9693545	342.7125724	364.5500344	224.9873152	1.195910886	1.523252864	FALSE	0.383044983	FALSE	FALSE
YBL113C	YBL113C	11.3022032	7.275321947	321.4732157	314.6704094	0.035157527	0.023120452	FALSE	0.383044983	FALSE	FALSE
YBR001C	NTH2	73.70674703	111.2013308	230.3726382	408.4869913	0.319945752	0.272227349	FALSE	0.383044983	FALSE	FALSE
YBR002C	RER2	145.5648384	105.2679892	1219.467102	514.9513347	0.119367581	0.20442318	FALSE	0.383044983	FALSE	FALSE
YBR003W	COQ1	57.75046783	59.74296044	41.32598489	75.9314159	1.397437181	0.786801612	FALSE	0.383044983	FALSE	FALSE
YBR004C	GPI18	54.23054636	90.11090354	7.110787614	1	7.626517526	90.11090354	TRUE	0.998111303	TRUE	FALSE
YBR005W	RCR1	148.0041014	169.7830313	331.8130546	726.1770058	0.44604665	0.233803921	FALSE	0.383044983	FALSE	FALSE
YBR006W	UGA2	72.81827678	73.57801914	77.06261886	441.4122953	0.944923464	0.166687743	FALSE	0.577652826	FALSE	FALSE
YBR007C	DSF2	26.06867322	26.11367876	55.43856007	66.71596552	0.470226376	0.391415736	FALSE	0.383044983	FALSE	FALSE
YBR008C	FLR1	66.31919114	109.3396349	201.5886612	212.7314957	0.328982745	0.513979533	FALSE	0.383044983	FALSE	FALSE
YBR009C	HHF1	1192.730846	845.2424609	304.7332102	8.33949569	3.914016608	101.3541456	TRUE	0.999956747	TRUE	FALSE
YBR010W	HHT1	722.4652759	728.1179661	1867.110154	386.1450519	0.386943038	1.885607397	FALSE	0.752926759	FALSE	FALSE
YBR011C	IPP1	114.6137973	65.60227683	5377.317519	4604.378729	0.021314307	0.014247802	FALSE	0.383044983	FALSE	FALSE
YBR014C	GRX7	319.8053857	260.5740786	28.53265012	1	11.20840106	260.5740786	TRUE	0.999985582	TRUE	FALSE
YBR015C	MNN2	49.26852371	56.19238456	5491.034202	3687.417847	0.00897254	0.015238952	FALSE	0.383044983	FALSE	FALSE
YBR016W	YBR016W	44.05914646	40.96808311	8688.155379	7760.528597	0.005071174	0.005279033	FALSE	0.383044983	FALSE	FALSE
YBR017C	KAP104	88.61923045	88.41683551	1567.149844	1053.719874	0.056548026	0.083909242	FALSE	0.383044983	FALSE	FALSE
YBR019C	GAL10	7.980676895	9.688951655	1	123.5972239	7.980676895	0.078391337	TRUE	0.970876586	FALSE	TRUE
YBR020W	GAL1	3.902772049	1.581801697	144.7650141	144.3406677	0.026959359	0.010958808	FALSE	0.383044983	FALSE	FALSE
YBR021W	FUR4	32.44920677	56.82221433	79.17799951	72.43623264	0.40982605	0.784444639	FALSE	0.383044983	FALSE	FALSE
YBR023C	CHS3	65.84698249	83.88882593	1822.543061	1746.86487	0.036129178	0.048022504	FALSE	0.383044983	FALSE	FALSE
YBR025C	OLA1	248.2398991	395.1397545	115.5570238	116.3187214	2.148202601	3.397043484	FALSE	0.45227797	FALSE	FALSE
YBR026C	ETR1	166.5805787	145.6463742	70.8440559	139.4577663	2.351369872	1.044376215	FALSE	0.699437716	FALSE	FALSE
YBR028C	YPK3	54.67337585	57.52082429	105.6341337	1	0.517573003	57.52082429	TRUE	0.99988466	TRUE	FALSE
YBR029C	CDS1	98.85311574	109.0439775	150.6358631	303.5783609	0.656238918	0.359195488	FALSE	0.383044983	FALSE	FALSE
YBR030W	RKM3	72.2521381	77.48931416	272.6128378	253.8255841	0.265035714	0.305285673	FALSE	0.383044983	FALSE	FALSE
YBR031W	RPL4A	126.8649464	111.2543034	2728.061846	1207.111149	0.046503691	0.092165749	FALSE	0.383044983	FALSE	FALSE
YBR032W	YBR032W	2.164367819	2.616278575	47.34000871	1	0.045719633	2.616278575	FALSE	0.844910611	FALSE	FALSE
YBR033W	EDS1	16.87030612	23.93515725	42.58308502	61.90237365	0.396173882	0.386659765	FALSE	0.383044983	FALSE	FALSE
YBR034C	HMT1	156.0343132	125.8125137	63.33148267	9.341689426	2.463771676	13.46785447	TRUE	0.954483852	TRUE	FALSE
YBR035C	PDX3	277.0432815	213.2800196	961.4924032	1395.365665	0.288138815	0.152848837	FALSE	0.383044983	FALSE	FALSE
YBR036C	CSG2	152.8848809	199.844004	741.8496728	544.3781862	0.206086066	0.367105092	FALSE	0.383044983	FALSE	FALSE
YBR037C	SCO1	97.4842965	76.77363412	225.3086478	392.7978264	0.432670017	0.195453307	FALSE	0.383044983	FALSE	FALSE
YBR038W	CHS2	28.59754552	20.6497838	1473.614097	1207.97102	0.019406401	0.017094602	FALSE	0.383044983	FALSE	FALSE
YBR039W	ATP3	133.8231397	98.80923891	1	9.215450379	133.8231397	10.72212804	TRUE	0.999120531	FALSE	TRUE
YBR041W	FAT1	43.14019373	60.53951475	134.40505	54.45687928	0.320971524	1.111696365	FALSE	0.577652826	FALSE	FALSE
YBR042C	CST26	129.1345709	150.4907978	198.829155	359.8358137	0.649475027	0.418220733	FALSE	0.383044983	FALSE	FALSE
YBR043C	QDR3	84.27232729	87.69841617	257.6459249	256.1579552	0.327085815	0.342360697	FALSE	0.383044983	FALSE	FALSE
YBR044C	TCM62	45.44123182	65.40772536	7.308309492	1	6.217748697	65.40772536	TRUE	0.997923875	TRUE	FALSE
YBR046C	ZTA1	153.9996159	221.6495589	49.80748606	296.5657571	3.091896984	0.747387564	FALSE	0.827537486	FALSE	FALSE
YBR048W	RPS11B	381.507739	215.7152236	2048.131322	468.5992422	0.186271132	0.46034053	FALSE	0.383044983	FALSE	FALSE
YBR049C	REB1	80.47421418	83.57413181	976.3486307	457.2640035	0.082423646	0.182769978	FALSE	0.383044983	FALSE	FALSE
YBR051W	YBR051W	3.321574925	15.80947823	1	18.94287022	3.321574925	0.834587264	FALSE	0.774048443	FALSE	FALSE

YBR052C	RFS1	275.8127197	217.072592	1145.428557	3177.102667	0.240794345	0.068324072	FALSE	0.383044983	FALSE	FALSE
YBR053C	YBR053C	133.2174756	148.06995	6.862700286	1	19.41181606	148.06995	TRUE	0.987730681	TRUE	FALSE
YBR054W	YRO2	220.7836411	622.0587802	255.4222404	1454.387755	0.86438691	0.427711783	FALSE	0.383044983	FALSE	FALSE
YBR055C	PRP6	64.39288188	73.8904899	25.66820895	1	2.508662837	73.8904899	TRUE	0.999913495	TRUE	FALSE
YBR056W	YBR056W	144.379334	144.3166015	106.2676831	189.6612355	1.358638202	0.760917755	FALSE	0.383044983	FALSE	FALSE
YBR057C	MUM2	167.9714557	134.8821112	156.966782	23.36815476	1.070108296	5.772048012	TRUE	0.901672434	TRUE	FALSE
YBR058C	UBP14	64.07703494	77.43727346	18.96575023	92.29165712	3.378565791	0.839049551	FALSE	0.827537486	FALSE	FALSE
YBR058C-A	TSC3	714.5768722	679.0965554	1	10.92134124	714.5768722	62.18069193	TRUE	0.998168973	FALSE	TRUE
YBR059C	AKL1	38.9850763	41.85652531	2467.924462	3304.564187	0.015796706	0.012666277	FALSE	0.383044983	FALSE	FALSE
YBR060C	ORC2	47.83489106	62.4796253	43.38148989	1	1.102656713	62.4796253	TRUE	0.99988466	TRUE	FALSE
YBR061C	TRM7	58.26240004	58.06007277	12.69140123	21.84268249	4.59069877	2.65810176	FALSE	0.45227797	FALSE	FALSE
YBR062C	YBR062C	407.142964	365.7080447	74.63270031	46.73630952	5.4552892	7.824923457	FALSE	0.44994233	FALSE	FALSE
YBR065C	ECM2	98.62006207	143.9466915	50.10611728	1	1.96822399	143.9466915	TRUE	1	TRUE	FALSE
YBR066C	NRG2	139.909132	102.8280348	89.2027591	14.35169026	1.568439513	7.164872778	TRUE	0.912312572	TRUE	FALSE
YBR067C	TIP1	129.2728231	248.1724153	7347.192069	9117.255668	0.017594861	0.027220079	FALSE	0.383044983	FALSE	FALSE
YBR068C	BAP2	279.2440552	384.0203715	764.5173247	503.7100901	0.365255366	0.762383719	FALSE	0.383044983	FALSE	FALSE
YBR069C	TAT1	116.9398624	161.0326496	1051.298833	421.3713255	0.111233703	0.382163284	FALSE	0.383044983	FALSE	FALSE
YBR071W	YBR071W	108.8422915	50.89607967	785.2456612	488.8785828	0.138609224	0.104107812	FALSE	0.383044983	FALSE	FALSE
YBR072W	HSP26	772.8426177	3867.387046	190.0691534	6253.132987	4.066112801	0.618471901	FALSE	0.890614187	FALSE	FALSE
YBR073W	RDH54	140.9725408	142.960027	361.2776828	201.8641661	0.390205505	0.708199131	FALSE	0.383044983	FALSE	FALSE
YBR074W	PFF1	52.45632047	72.2591863	335.1367542	138.8739459	0.156522136	0.520322122	FALSE	0.383044983	FALSE	FALSE
YBR076C-A	YBR076C-A	42.57400669	123.7098015	1	8.453735357	42.57400669	14.63374429	FALSE	0.857439446	FALSE	FALSE
YBR077C	SLM4	252.2779458	262.3528181	1	16.90747071	252.2779458	15.51697605	TRUE	0.999798155	FALSE	TRUE
YBR078W	ECM33	148.3889458	122.4945685	623.0832975	244.0188572	0.238152662	0.501988125	FALSE	0.383044983	FALSE	FALSE
YBR079C	RPG1	62.42151426	50.61256423	5223.738312	4448.13719	0.011949587	0.011378373	FALSE	0.383044983	FALSE	FALSE
YBR080C	SEC18	28.44919076	37.19378375	902.2212736	396.7882485	0.031532387	0.09373711	FALSE	0.383044983	FALSE	FALSE
YBR081C	SPT7	40.14156313	48.46788542	277.1440435	254.4838419	0.144840072	0.19045565	FALSE	0.383044983	FALSE	FALSE
YBR082C	UBC4	427.4214874	550.9519794	1425.649503	2963.502305	0.299808253	0.185912452	FALSE	0.383044983	FALSE	FALSE
YBR083W	TEC1	52.46826592	42.77463257	1087.362871	747.8330123	0.048252766	0.057198107	FALSE	0.383044983	FALSE	FALSE
YBR084C-A	RPL19A	407.5441318	246.1642741	7965.815091	3384.700413	0.051161636	0.072728527	FALSE	0.383044983	FALSE	FALSE
YBR084W	MIS1	52.03722724	47.37983997	1624.277218	598.0144156	0.032037159	0.079228592	FALSE	0.383044983	FALSE	FALSE
YBR085C-A	YBR085C-A	1093.005749	2658.828594	1	34.18594761	1093.005749	77.77548319	TRUE	0.999596309	FALSE	TRUE
YBR086C	IST2	29.62387985	31.29818789	1872.159636	990.3771516	0.015823373	0.031602292	FALSE	0.383044983	FALSE	FALSE
YBR087W	RFC5	138.0710861	126.787562	27.9687586	25.89444176	4.93661832	4.896323434	FALSE	0.383044983	FALSE	FALSE
YBR088C	POL30	186.9035141	76.0084484	6.952656997	1	26.8823148	76.0084484	FALSE	0.858275663	FALSE	FALSE
YBR089C-A	NHP6B	274.2229978	323.6990667	48.98486021	1	5.598117391	323.6990667	TRUE	1	TRUE	FALSE
YBR090C	YBR090C	35.93984575	49.41150512	69.11204759	137.8732257	0.520022876	0.358383616	FALSE	0.383044983	FALSE	FALSE
YBR091C	TIM12	333.6427649	225.8086254	147.3798419	111.7200716	2.263829032	2.021200149	FALSE	0.383044983	FALSE	FALSE
YBR092C	PHO3	101.204236	40.46473593	2361.686854	1361.766854	0.042852521	0.029714878	FALSE	0.383044983	FALSE	FALSE
YBR093C	PHO5	16.81547306	15.9976863	104.5324203	16.67899138	0.160863711	0.959151902	FALSE	0.577652826	FALSE	FALSE
YBR094W	PBY1	35.14498296	40.65294401	1	8.33949569	35.14498296	4.874748488	TRUE	0.987038639	FALSE	TRUE
YBR096W	YBR096W	258.8725496	367.0057445	13.53992219	16.67899138	19.11920512	22.00407304	FALSE	0.405190311	FALSE	FALSE
YBR101C	FES1	446.3837147	1556.86107	226.6159239	251.2988393	1.969780883	6.195257701	FALSE	0.831055363	FALSE	FALSE
YBR102C	EXO84	46.51636608	48.65503213	124.11152	49.22254064	0.374794911	0.988470556	FALSE	0.577652826	FALSE	FALSE

YBR103W	SIF2	135.9459886	137.6271542	74.72671664	191.7687447	1.819242096	0.717672499	FALSE	0.699437716	FALSE	FALSE
YBR104W	YMC2	214.7737895	157.2119153	14.29157272	74.62916517	15.02800243	2.106574754	TRUE	0.978633218	FALSE	TRUE
YBR105C	VID24	34.1250647	67.57758668	1382.688005	2588.910598	0.024680235	0.026102712	FALSE	0.383044983	FALSE	FALSE
YBR106W	PHO88	644.1087375	517.7693742	5073.405965	1377.470521	0.126957855	0.375884178	FALSE	0.383044983	FALSE	FALSE
YBR107C	IML3	45.61595807	62.83854455	143.4648291	79.90442554	0.317959171	0.786421329	FALSE	0.383044983	FALSE	FALSE
YBR108W	AIM3	11.81143109	13.56527562	3900.608208	5039.955043	0.0030281	0.002691547	FALSE	0.383044983	FALSE	FALSE
YBR109C	CMD1	187.2551891	145.2152459	14.61661898	17.1422967	12.81111516	8.471166292	FALSE	0.50239331	FALSE	FALSE
YBR110W	ALG1	124.5756675	183.4050041	5.009771209	6.819433281	24.86653828	26.89446417	FALSE	0.392315456	FALSE	FALSE
YBR111C	YSA1	131.4957108	119.7830818	1029.535472	1502.030008	0.127723342	0.079747463	FALSE	0.383044983	FALSE	FALSE
YBR111W-A	SUS1	781.5053703	806.8072677	1	36.37031083	781.5053703	22.18312819	TRUE	1	FALSE	TRUE
YBR112C	CYC8	21.42557517	22.17974737	10599.73549	7324.93787	0.002021331	0.003027978	FALSE	0.383044983	FALSE	FALSE
YBR113W	YBR113W	2.413815318	1.641267926	1015.142998	350.5066311	0.002377808	0.004682559	FALSE	0.383044983	FALSE	FALSE
YBR114W	RAD16	51.09598443	106.9002826	177.8528811	323.1681971	0.287293544	0.330788374	FALSE	0.383044983	FALSE	FALSE
YBR116C	YBR116C	28.42918993	36.78398485	1	23.88133286	28.42918993	1.540281904	TRUE	0.99877451	FALSE	TRUE
YBR117C	TKL2	18.30579846	28.02589322	194.5266171	1778.431673	0.094104338	0.015758769	FALSE	0.383044983	FALSE	FALSE
YBR118W	TEF2	885.2526347	977.8184425	4306.150758	3245.166247	0.205578644	0.301315362	FALSE	0.383044983	FALSE	FALSE
YBR121C	GRS1	140.4617833	96.454384	990.5147207	444.5414037	0.141806861	0.216975029	FALSE	0.383044983	FALSE	FALSE
YBR123C	TFC1	45.51388041	47.56394449	47.68398163	19.13153502	0.954489932	2.486154114	FALSE	0.699437716	FALSE	FALSE
YBR125C	PTC4	106.8346849	65.16680682	30.68142749	27.56384858	3.482063697	2.364212916	FALSE	0.428460208	FALSE	FALSE
YBR126C	TPS1	237.5034893	251.9908797	143.7438336	940.9073113	1.652269063	0.2678169	FALSE	0.699437716	FALSE	FALSE
YBR126W-A	YBR126W-A	187.2718384	202.3318626	43.86091858	72.6963282	4.269674336	2.783247347	FALSE	0.45227797	FALSE	FALSE
YBR127C	VMA2	101.329276	77.62384048	370.3574022	359.0488954	0.273598625	0.216192952	FALSE	0.383044983	FALSE	FALSE
YBR128C	ATG14	57.58961046	60.76338588	3.395296987	2.332161412	16.96158265	26.05453704	FALSE	0.520660323	FALSE	FALSE
YBR129C	OPY1	323.2875497	348.7112332	5.200444787	5.768786128	62.16536526	60.44793922	FALSE	0.384688581	FALSE	FALSE
YBR131W	CCZ1	41.65307959	53.97327034	6.20146701	9.656304016	6.716649387	5.589433623	FALSE	0.407151096	FALSE	FALSE
YBR132C	AGP2	56.18615071	95.01575858	5.947576	14.69096875	9.446899159	6.467630568	FALSE	0.44994233	FALSE	FALSE
YBR133C	HSL7	17.65940582	26.96694384	50.92971438	17.17899675	0.34674072	1.569762439	FALSE	0.699437716	FALSE	FALSE
YBR135W	CKS1	40.37445812	44.33234954	65.78683007	83.98058008	0.613716424	0.527888108	FALSE	0.383044983	FALSE	FALSE
YBR139W	YBR139W	125.4534867	122.5179098	3.117682531	6.192526948	40.23933979	19.78480043	FALSE	0.83405421	FALSE	FALSE
YBR140C	IRA1	26.72341533	23.20928666	3.432219504	2.467463326	7.786044947	9.406132368	FALSE	0.407151096	FALSE	FALSE
YBR141C	BMT2	52.74597104	61.37030971	9.44474776	6.841333447	5.584688166	8.970518712	FALSE	0.496568627	FALSE	FALSE
YBR142W	MAK5	53.00277661	54.85171127	8.222548686	7.488756499	6.446027703	7.32454197	FALSE	0.383044983	FALSE	FALSE
YBR143C	SUP45	428.7177799	364.7936551	5.901444737	2.006988944	72.64624157	181.7616665	FALSE	0.854945213	FALSE	FALSE
YBR146W	MRPS9	121.9674276	125.3344349	345.3820147	364.0211926	0.35313775	0.344305325	FALSE	0.383044983	FALSE	FALSE
YBR149W	ARA1	103.9851524	78.63496996	54.21553642	128.0628495	1.917995454	0.614034205	FALSE	0.699437716	FALSE	FALSE
YBR150C	TBS1	79.38848451	82.00818774	5.95510576	1	13.33116282	82.00818774	TRUE	0.985928489	TRUE	FALSE
YBR151W	APD1	228.1022162	319.5381246	3.694116939	1	61.74742704	319.5381246	TRUE	0.965657439	TRUE	FALSE
YBR152W	SPP381	28.86400265	35.74535402	36.1891242	36.34342194	0.797587764	0.983543984	FALSE	0.383044983	FALSE	FALSE
YBR153W	RIB7	160.803204	171.4890516	35.5184344	34.81414418	4.527316779	4.92584424	FALSE	0.383044983	FALSE	FALSE
YBR156C	SLI15	10.28547772	12.85307672	5.532221696	1	1.859194783	12.85307672	TRUE	0.972649942	TRUE	FALSE
YBR158W	AMN1	271.1979112	131.4014022	159.6988053	135.4049119	1.69818372	0.970433054	FALSE	0.383044983	FALSE	FALSE
YBR159W	IFA38	260.4089686	265.8893342	18.14002435	8.159042468	14.35549167	32.58830129	FALSE	0.837745098	FALSE	FALSE
YBR160W	CDC28	155.6446685	200.9080276	10.83243972	9.622711179	14.36838538	20.87852622	FALSE	0.479397347	FALSE	FALSE
YBR162C	TOS1	144.7220575	80.93442471	70.20177703	34.6682635	2.061515585	2.334539332	FALSE	0.383044983	FALSE	FALSE

YBR162W-A	YSY6	1408.026934	1109.024632	12.29740581	8.003559064	114.4978832	138.5664331	FALSE	0.434356978	FALSE	FALSE
YBR169C	SSE2	146.9240516	306.6983452	13.18725772	58.22114536	11.141365	5.267817102	FALSE	0.802321223	FALSE	FALSE
YBR170C	NPL4	117.3481406	164.4893216	102.8821055	120.1824085	1.140607884	1.368663881	FALSE	0.383044983	FALSE	FALSE
YBR172C	SMY2	54.67487146	54.61996425	37.21862585	7.589038252	1.469019079	7.197218202	TRUE	0.912312572	TRUE	FALSE
YBR173C	UMP1	125.0313809	90.15040436	33.75354661	27.34264944	3.70424425	3.297061777	FALSE	0.383044983	FALSE	FALSE
YBR176W	ECM31	157.7622071	155.7605211	1	3.298526638	157.7622071	47.22124094	FALSE	0.889302191	FALSE	FALSE
YBR177C	EHT1	66.84853251	103.5735681	50.8201605	31.48858333	1.315393967	3.289241913	FALSE	0.699437716	FALSE	FALSE
YBR181C	RPS6B	662.9774203	376.6686806	13.53106812	5.365980209	48.99668041	70.1956895	FALSE	0.490743945	FALSE	FALSE
YBR182C	SMP1	33.40410014	80.88709389	5.809344242	11.29089122	5.75006382	7.163924649	FALSE	0.415383506	FALSE	FALSE
YBR185C	MBA1	59.46020919	69.61270251	40.44136506	12.72417899	1.470281952	5.470899345	FALSE	0.831055363	FALSE	FALSE
YBR187W	GDT1	205.8947958	199.5152937	304.6417849	137.2206764	0.675858684	1.453973986	FALSE	0.577652826	FALSE	FALSE
YBR189W	RPS9B	549.7248867	374.121162	820.4516609	362.259489	0.670027148	1.032743581	FALSE	0.383044983	FALSE	FALSE
YBR191W	RPL21A	363.7317957	250.2933587	49.30266859	6.361095745	7.377527549	39.34752262	TRUE	0.964979815	TRUE	FALSE
YBR192W	RIM2	103.1961924	85.4016542	32.25875732	20.36055104	3.199013259	4.194466743	FALSE	0.415383506	FALSE	FALSE
YBR193C	MED8	45.32503997	58.39323542	26.06305768	7.260266836	1.739053051	8.042849766	TRUE	0.923745675	TRUE	FALSE
YBR195C	MSI1	40.25201102	28.83988404	8.507982791	5.068024232	4.731087498	5.690557644	FALSE	0.383044983	FALSE	FALSE
YBR196C	PGI1	387.1800544	472.4653412	336.2245588	132.9160249	1.15151974	3.55461534	FALSE	0.774048443	FALSE	FALSE
YBR197C	YBR197C	17.60396619	19.19204352	45.87455668	41.01331315	0.383741391	0.467946675	FALSE	0.383044983	FALSE	FALSE
YBR198C	TAF5	68.61115213	65.09643819	40.11428872	32.68605553	1.710391841	1.99156604	FALSE	0.383044983	FALSE	FALSE
YBR199W	KTR4	219.0190253	277.1248538	20.33355024	8.851654418	10.77131257	31.30769014	FALSE	0.855867935	FALSE	FALSE
YBR200W	BEM1	44.39785831	55.92848411	13.56208714	16.99498367	3.273674461	3.290881898	FALSE	0.383044983	FALSE	FALSE
YBR202W	MCM7	48.3483499	33.99358173	206.9162784	150.3933115	0.233661413	0.226031207	FALSE	0.383044983	FALSE	FALSE
YBR203W	COS111	21.53188502	42.75517733	18.58383752	4.059186477	1.158635023	10.5329424	TRUE	0.978344867	TRUE	FALSE
YBR204C	LDH1	90.63162325	111.0387593	3.807719703	5.602491345	23.80207324	19.8195325	FALSE	0.422159746	FALSE	FALSE
YBR205W	KTR3	42.82063674	32.73147529	114.3375679	70.84025212	0.374510649	0.462046285	FALSE	0.383044983	FALSE	FALSE
YBR207W	FTH1	124.9894032	161.5140302	157.1331527	85.49250082	0.795436234	1.889218688	FALSE	0.699437716	FALSE	FALSE
YBR208C	DUR1,2	13.59973263	22.50009074	143.8016677	90.19052642	0.094572844	0.249472884	FALSE	0.383044983	FALSE	FALSE
YBR212W	NGR1	13.71445219	13.08787202	35.53679892	45.33419405	0.385922554	0.288697578	FALSE	0.383044983	FALSE	FALSE
YBR213W	MET8	26.23213797	30.74840856	4.009072563	4.693241026	6.543193608	6.551636361	FALSE	0.383044983	FALSE	FALSE
YBR214W	SDS24	27.50915142	25.85722291	164.6651081	569.06825	0.167061205	0.045437824	FALSE	0.383044983	FALSE	FALSE
YBR216C	YBP1	58.40159111	77.05489498	1	9.184421927	58.40159111	8.389738145	TRUE	0.985914072	FALSE	TRUE
YBR218C	PYC2	62.58380832	53.47531627	1561.451657	1497.679224	0.040080529	0.035705454	FALSE	0.383044983	FALSE	FALSE
YBR220C	YBR220C	26.75688464	35.48376396	64.84464671	77.66980478	0.412630587	0.456854038	FALSE	0.383044983	FALSE	FALSE
YBR221C	PDB1	91.46436238	72.96114202	460.3868493	285.3537983	0.198668495	0.255686598	FALSE	0.383044983	FALSE	FALSE
YBR222C	PCS60	27.28049479	27.68734514	257.0496726	345.5619228	0.106129273	0.080122674	FALSE	0.383044983	FALSE	FALSE
YBR223C	TDP1	20.7236564	27.23249965	56.27576252	52.13579747	0.368251899	0.522337836	FALSE	0.383044983	FALSE	FALSE
YBR225W	YBR225W	23.50723919	26.83500383	34.92161662	32.6238468	0.673142926	0.822557928	FALSE	0.383044983	FALSE	FALSE
YBR226C	YBR226C	57.97451416	39.86164583	3.266645192	2.164899454	17.74741692	18.41270076	FALSE	0.383044983	FALSE	FALSE
YBR227C	MCX1	62.47079135	62.80658768	36.3326439	15.3350235	1.719412205	4.095630351	FALSE	0.749524221	FALSE	FALSE
YBR228W	SLX1	111.0127514	124.4690958	17.86942775	12.07129145	6.212440209	10.31116648	FALSE	0.506257209	FALSE	FALSE
YBR229C	ROT2	47.35722406	49.62071386	6.223563995	4.242654899	7.609341544	11.69567524	FALSE	0.50239331	FALSE	FALSE
YBR230C	OM14	228.3167564	183.9922133	8.900909838	29.12100108	25.65094586	6.318196711	TRUE	0.955968858	FALSE	TRUE
YBR230W-A	YBR230W-A	235.277191	129.4927731	6.203718367	19.66642114	37.92518891	6.584460499	TRUE	0.965210496	FALSE	TRUE
YBR231C	SWC5	178.9717015	169.4987057	23.47001735	39.12686116	7.625546198	4.332029217	FALSE	0.508693772	FALSE	FALSE

YBR233W	PBP2	28.10250959	21.91396619	68.19055362	16.88874248	0.41211734	1.297548721	FALSE	0.577652826	FALSE	FALSE
YBR234C	ARC40	68.07233494	46.32851736	15.12543629	17.4540441	4.500520425	2.654314215	FALSE	0.45227797	FALSE	FALSE
YBR235W	VHC1	22.29562722	30.2902511	107.1706948	128.7118165	0.208038469	0.235333879	FALSE	0.383044983	FALSE	FALSE
YBR239C	ERT1	20.85189164	24.51321388	77.94179038	29.50130548	0.267531597	0.830919632	FALSE	0.577652826	FALSE	FALSE
YBR240C	THI2	6.462709526	12.69465546	1.268632136	5.120878424	5.094234445	2.478999581	FALSE	0.749524221	FALSE	FALSE
YBR241C	YBR241C	16.88806883	21.79518777	20.50770112	90.22087186	0.823498876	0.241575894	FALSE	0.577652826	FALSE	FALSE
YBR242W	YBR242W	262.4026818	198.6437787	7.802146748	1	33.6321131	198.6437787	TRUE	0.965902537	TRUE	FALSE
YBR243C	ALG7	19.31220254	28.73924717	17.78745094	1.284262388	1.085720635	22.37801826	TRUE	0.99783737	TRUE	FALSE
YBR245C	ISW1	45.00991225	42.3648047	74.33315554	18.74406335	0.605515963	2.260171869	FALSE	0.699437716	FALSE	FALSE
YBR248C	HIS7	172.3509969	126.4676576	261.5365283	177.0484166	0.658993977	0.714311148	FALSE	0.383044983	FALSE	FALSE
YBR249C	ARO4	29.98482377	13.53271856	17.7495174	3.136671186	1.689331777	4.314356767	FALSE	0.749524221	FALSE	FALSE
YBR251W	MRPS5	155.2762135	116.2502612	5.990254426	8.572844773	25.92147219	13.56028999	FALSE	0.555435409	FALSE	FALSE
YBR252W	DUT1	619.8622692	334.173609	170.2526244	64.84101962	3.640838262	5.153737726	FALSE	0.428460208	FALSE	FALSE
YBR253W	SRB6	497.3275701	413.3326992	3.479007784	1	142.9509794	413.3326992	FALSE	0.858477509	FALSE	FALSE
YBR254C	TRS20	330.6618401	277.7566203	3.610502581	8.661370963	91.58332745	32.06843599	FALSE	0.858347751	FALSE	FALSE
YBR255W	MTC4	65.77256016	80.0336556	173.5743848	88.79174755	0.378930107	0.901363672	FALSE	0.577652826	FALSE	FALSE
YBR256C	RIB5	681.7185088	426.5865934	14.6730527	7.462218024	46.46057796	57.16619269	FALSE	0.43504902	FALSE	FALSE
YBR260C	RGD1	35.03153524	46.68181014	2.933143916	6.09741614	11.94334006	7.655998716	FALSE	0.50239331	FALSE	FALSE
YBR261C	TAE1	50.66292741	42.33954684	26.57280519	21.79270831	1.906570535	1.942830888	FALSE	0.383044983	FALSE	FALSE
YBR262C	MIC12	945.2286474	615.3348651	12.62257916	13.57933929	74.88395482	45.3140504	FALSE	0.538206459	FALSE	FALSE
YBR263W	SHM1	45.70886227	36.68562513	365.5853848	122.6522984	0.125029239	0.299102631	FALSE	0.383044983	FALSE	FALSE
YBR264C	YPT10	241.1899352	194.8800503	14.16746835	7.536657362	17.02420851	25.85762374	FALSE	0.518468858	FALSE	FALSE
YBR265W	TSC10	67.41904618	49.52862571	104.2029852	73.54547722	0.646997262	0.673442169	FALSE	0.383044983	FALSE	FALSE
YBR267W	REI1	39.26929847	31.85684381	599.2749358	665.1025286	0.065528017	0.047897644	FALSE	0.383044983	FALSE	FALSE
YBR268W	MRPL37	461.9495994	254.2726592	419.8724116	450.445864	1.100214224	0.564491051	FALSE	0.383044983	FALSE	FALSE
YBR269C	SDH8	144.1614297	103.9233533	113.7326676	288.5128986	1.267546367	0.360203491	FALSE	0.577652826	FALSE	FALSE
YBR270C	BIT2	25.93497564	27.9085687	6.351923649	5.572980764	4.083011237	5.007835104	FALSE	0.383044983	FALSE	FALSE
YBR271W	EFM2	115.835477	120.5876018	10.16339592	1.640851069	11.39732013	73.49088778	TRUE	0.985914072	TRUE	FALSE
YBR272C	HSM3	97.40855113	118.1132833	6.008058435	5.118887176	16.21298331	23.07401574	FALSE	0.478171857	FALSE	FALSE
YBR273C	UBX7	59.24963784	59.35918998	199.0631195	258.1085608	0.297642466	0.22997761	FALSE	0.383044983	FALSE	FALSE
YBR275C	RIF1	17.92851254	13.09504065	35.18255729	22.89417696	0.509585258	0.57198128	FALSE	0.383044983	FALSE	FALSE
YBR276C	PPS1	83.47846436	97.07483629	7.827446643	7.544977926	10.66483978	12.86615246	FALSE	0.416969435	FALSE	FALSE
YBR279W	PAF1	94.16078423	97.36349707	42.88486139	12.30914833	2.195664885	7.909848388	FALSE	0.847303922	FALSE	FALSE
YBR280C	SAF1	30.30416496	48.11341767	5.071320736	13.88415079	5.975596207	3.465348251	FALSE	0.487600923	FALSE	FALSE
YBR284W	YBR284W	22.49321215	47.0760752	3.220664644	4.64728446	6.984028029	10.12980281	FALSE	0.462889273	FALSE	FALSE
YBR286W	APE3	167.1337167	104.2896621	841.7351778	563.4997295	0.19855855	0.185074911	FALSE	0.383044983	FALSE	FALSE
YBR287W	YBR287W	68.83779715	126.4626337	12.08326538	17.63293139	5.696953183	7.171957449	FALSE	0.415383506	FALSE	FALSE
YBR288C	APM3	166.6607939	135.3068286	6.07244995	5.427575649	27.44539605	24.92951501	FALSE	0.397188581	FALSE	FALSE
YBR289W	SNF5	17.61355842	19.63845308	608.0606973	394.3456368	0.028966777	0.049800102	FALSE	0.383044983	FALSE	FALSE
YBR290W	BSD2	216.2627661	227.4523801	39.07234187	42.92772606	5.534932277	5.298495889	FALSE	0.383044983	FALSE	FALSE
YBR294W	SUL1	2.82430426	4.301648727	3.972117944	1	0.711032326	4.301648727	FALSE	0.890614187	FALSE	FALSE
YBR295W	PCA1	30.31636505	45.27107836	35.60797589	36.44716101	0.85139254	1.242101637	FALSE	0.383044983	FALSE	FALSE
YBR296C	PHO89	1.731912491	3.140292631	4.46465948	3.48634057	0.38791592	0.900741786	FALSE	0.577652826	FALSE	FALSE
YBR298C	MAL31	22.94620921	12.17384909	6.398526833	1	3.586170662	12.17384909	FALSE	0.868584198	FALSE	FALSE

YCL005W	LDB16	107.8356731	89.10956599	12.94413266	14.2957856	8.330853513	6.23327521	FALSE	0.446323529	FALSE	FALSE
YCL005W-A	VMA9	835.3452343	539.2008722	11.79231997	3.852787164	70.83807395	139.9508588	FALSE	0.562975779	FALSE	FALSE
YCL008C	STP22	19.19209864	18.59749317	59.86731971	94.19905057	0.320577215	0.197427607	FALSE	0.383044983	FALSE	FALSE
YCL009C	ILV6	61.89781659	25.99821339	845.7639015	632.6661336	0.073185692	0.041093101	FALSE	0.383044983	FALSE	FALSE
YCL010C	SGF29	89.49568438	82.32221162	37.33834024	42.93959652	2.396884377	1.917163138	FALSE	0.383044983	FALSE	FALSE
YCL011C	GBP2	386.0705144	375.2719487	932.2441325	584.0587084	0.41413027	0.642524361	FALSE	0.383044983	FALSE	FALSE
YCL014W	BUD3	14.91170539	15.41558643	5.042500718	1.606499274	2.957204416	9.59576309	FALSE	0.855204729	FALSE	FALSE
YCL016C	DCC1	63.24069423	75.48181139	6.58574504	4.45438974	9.602663609	16.94548879	FALSE	0.539186851	FALSE	FALSE
YCL017C	NFS1	77.0127656	101.1697763	366.4681025	406.7613806	0.210148619	0.248720211	FALSE	0.383044983	FALSE	FALSE
YCL024W	KCC4	39.35850287	33.09415962	27.8098345	9.930389101	1.415272819	3.332614592	FALSE	0.699437716	FALSE	FALSE
YCL025C	AGP1	81.1421723	190.3335785	92.56323306	70.51294663	0.87661342	2.699271377	FALSE	0.699437716	FALSE	FALSE
YCL026C-B	HBN1	90.39520625	152.7803295	13.30853489	40.61674196	6.792273306	3.761511193	FALSE	0.508693772	FALSE	FALSE
YCL028W	RNQ1	34.93789585	23.86441294	341.9817338	264.7521951	0.102163047	0.090138678	FALSE	0.383044983	FALSE	FALSE
YCL029C	BIK1	12.72281824	11.98386105	33.74765313	33.46747488	0.376998608	0.35807485	FALSE	0.383044983	FALSE	FALSE
YCL030C	HIS4	134.7129585	132.3973223	605.5929675	80.67172084	0.222448023	1.641186291	FALSE	0.699437716	FALSE	FALSE
YCL031C	RRP7	252.5894717	201.7300032	8.173625787	4.156941031	30.90298948	48.52847363	FALSE	0.529801038	FALSE	FALSE
YCL032W	STE50	47.45807862	41.12156584	4.448357511	2.605888708	10.66867456	15.78024637	FALSE	0.475792964	FALSE	FALSE
YCL033C	MXR2	248.3516021	164.1753508	278.2397364	568.7604579	0.892581359	0.28865465	FALSE	0.577652826	FALSE	FALSE
YCL034W	LSB5	380.3454746	284.589694	36.54595096	45.57816034	10.40732187	6.243992558	FALSE	0.516133218	FALSE	FALSE
YCL035C	GRX1	671.1208471	557.4519687	15.89880972	8.255559586	42.21201831	67.52443162	FALSE	0.535683391	FALSE	FALSE
YCL036W	GFD2	135.6672234	96.08171555	100.1402482	132.7889543	1.354772191	0.723567077	FALSE	0.383044983	FALSE	FALSE
YCL037C	SRO9	56.61853533	40.69967153	250.3695823	126.5262654	0.226139832	0.321669745	FALSE	0.383044983	FALSE	FALSE
YCL039W	GID7	22.69362546	19.18662739	26.46011066	36.00468012	0.857654216	0.532892594	FALSE	0.383044983	FALSE	FALSE
YCL040W	GLK1	396.2357944	346.787464	624.7214536	5430.367033	0.634259944	0.063860778	FALSE	0.577652826	FALSE	FALSE
YCL041C	YCL041C	6.035452619	24.02219419	54.08790918	93.98548465	0.111585985	0.255594726	FALSE	0.383044983	FALSE	FALSE
YCL042W	YCL042W	12.75173373	13.57921255	19.91354594	162.5321285	0.64035475	0.083547866	FALSE	0.577652826	FALSE	FALSE
YCL043C	PDI1	176.8964902	153.2582306	4311.263091	4127.332617	0.041031245	0.037132513	FALSE	0.383044983	FALSE	FALSE
YCL044C	MGR1	14.23638535	16.96304063	245.4009647	435.1421366	0.058012752	0.038982758	FALSE	0.383044983	FALSE	FALSE
YCL047C	POF1	96.87472659	109.8466614	2.396307677	3.598278581	40.42666453	30.52755894	FALSE	0.45461361	FALSE	FALSE
YCL048W-A	YCL048W-A	16.39508623	41.83865488	1	5.566627068	16.39508623	7.51597949	FALSE	0.820602653	FALSE	FALSE
YCL049C	YCL049C	41.74917237	67.39773225	42.17597458	42.93289652	0.989880442	1.569838928	FALSE	0.383044983	FALSE	FALSE
YCL050C	APA1	111.2617998	143.3373989	127.7556492	157.3613222	0.870895342	0.910880748	FALSE	0.383044983	FALSE	FALSE
YCL051W	LRE1	87.46541436	87.85514227	17.34047354	10.42335789	5.044003796	8.428679432	FALSE	0.504801038	FALSE	FALSE
YCL052C	PBN1	79.39071865	132.755747	5.625171587	4.046934608	14.11347501	32.80402573	FALSE	0.841738754	FALSE	FALSE
YCL054W	SPB1	104.7427784	91.21967009	107.1447241	60.89017796	0.977582231	1.498101552	FALSE	0.383044983	FALSE	FALSE
YCL057C-A	MIC10	158.6221495	93.47411616	286.4661601	428.01667	0.553720375	0.218388962	FALSE	0.383044983	FALSE	FALSE
YCL057W	PRD1	109.6923332	88.08137869	306.1261717	360.9407746	0.358323931	0.244032775	FALSE	0.383044983	FALSE	FALSE
YCL059C	KRR1	139.527758	118.9237542	5.079308666	1.192360779	27.46983245	99.73806277	FALSE	0.891854095	FALSE	FALSE
YCL061C	MRC1	26.90169117	21.15719534	15.82717122	8.230479944	1.699715685	2.570590716	FALSE	0.383044983	FALSE	FALSE
YCL063W	VAC17	43.59420203	38.32786407	19.70035628	1.582365849	2.212863636	24.22187265	TRUE	0.996164937	TRUE	FALSE
YCL064C	CHA1	32.90118874	40.25880189	227.4896477	259.4482999	0.144627191	0.155170806	FALSE	0.383044983	FALSE	FALSE
YCR004C	YCP4	295.7775413	173.6765894	447.9450046	678.6978183	0.660298783	0.255896785	FALSE	0.383044983	FALSE	FALSE
YCR005C	CIT2	731.0414443	1125.473668	8.741401279	43.83667338	83.62977754	25.67424902	FALSE	0.888711073	FALSE	FALSE
YCR006C	YCR006C	40.27672379	63.55238715	4.859933802	2.944675425	8.287504611	21.58213656	FALSE	0.848370819	FALSE	FALSE

YCR008W	SAT4	61.64745448	66.7901845	3.831646868	4.090039146	16.08902297	16.32996216	FALSE	0.383044983	FALSE	FALSE
YCR009C	RVS161	447.3379417	475.5069917	3.306779676	2.955610502	135.2790284	160.8828333	FALSE	0.425634371	FALSE	FALSE
YCR011C	ADP1	142.5649615	212.2341791	64.85730353	72.15929619	2.198132727	2.941189706	FALSE	0.383044983	FALSE	FALSE
YCR012W	PGK1	1310.733193	1716.1083	1718.648418	2175.632073	0.762653478	0.788786083	FALSE	0.383044983	FALSE	FALSE
YCR016W	YCR016W	210.0874738	121.5280878	9.386728461	1	22.38133069	121.5280878	TRUE	0.965643022	TRUE	FALSE
YCR017C	CWH43	39.15776477	56.13572143	37.68583965	19.85692079	1.039057777	2.827010392	FALSE	0.699437716	FALSE	FALSE
YCR018C	SRD1	114.9898941	148.3893497	5.87240907	3.815575786	19.5813835	38.89042127	FALSE	0.560294118	FALSE	FALSE
YCR019W	MAK32	56.18503299	78.76507902	3.001688286	1	18.71781066	78.76507902	TRUE	0.958823529	TRUE	FALSE
YCR021C	HSP30	56.01791224	1630.166777	3.820886327	9.886290374	14.66097325	164.8916546	TRUE	0.998168973	TRUE	FALSE
YCR024C-A	PMP1	511.2541794	590.7897351	22.12783031	10.56207594	23.10457791	55.93500165	FALSE	0.845242215	FALSE	FALSE
YCR024C-B	YCR024C-B	604.4963129	637.3528975	18.76651772	4.441925233	32.21142685	143.4857329	TRUE	0.958982122	TRUE	FALSE
YCR025C	YCR025C	6.205223228	4.5005084	3.840056278	3.498195667	1.615919867	1.286522776	FALSE	0.383044983	FALSE	FALSE
YCR026C	NPP1	85.77978419	96.67612963	49.56141065	46.38422906	1.730777697	2.084245693	FALSE	0.383044983	FALSE	FALSE
YCR027C	RHB1	218.6011497	251.0319293	5.14256742	5.184601957	42.50817381	48.41874677	FALSE	0.410524798	FALSE	FALSE
YCR028C	FEN2	122.9128405	189.641097	119.4298096	44.09472504	1.029163832	4.300766062	FALSE	0.873241061	FALSE	FALSE
YCR030C	SYPI	37.22828612	35.74829778	390.6324236	494.9112845	0.095302601	0.072231729	FALSE	0.383044983	FALSE	FALSE
YCR031C	RPS14A	484.5482812	355.516869	987.6833089	454.4738977	0.490590736	0.782260259	FALSE	0.383044983	FALSE	FALSE
YCR032W	BPH1	27.82929766	40.36386057	6.840340502	4.955998907	4.06840824	8.144445011	FALSE	0.791565744	FALSE	FALSE
YCR033W	SNT1	37.6113542	45.08158583	369.2066183	348.3528073	0.101870748	0.129413586	FALSE	0.383044983	FALSE	FALSE
YCR034W	ELO2	55.34824768	54.16498574	13.45324045	3.649685804	4.114120156	14.84099965	FALSE	0.878935986	FALSE	FALSE
YCR037C	PHO87	54.4137061	66.49000177	20.66899808	12.86807367	2.632624275	5.167051689	FALSE	0.487600923	FALSE	FALSE
YCR042C	TAF2	58.56620134	69.65810736	72.98534341	46.41484378	0.80243784	1.500772203	FALSE	0.383044983	FALSE	FALSE
YCR044C	PER1	91.18558201	89.43458422	14.40403202	1.728634961	6.330559519	51.7371141	TRUE	0.995011534	TRUE	FALSE
YCR045C	RRT12	1.57977344	1.879785521	22.70724052	36.22039597	0.069571353	0.051898536	FALSE	0.383044983	FALSE	FALSE
YCR046C	IMG1	110.3007108	69.16978856	125.9061363	198.174579	0.876055085	0.349034618	FALSE	0.577652826	FALSE	FALSE
YCR047C	BUD23	138.165783	116.3248642	40.85910299	25.40482409	3.381517776	4.578849428	FALSE	0.428460208	FALSE	FALSE
YCR048W	ARE1	26.63443723	31.7150627	248.9084691	230.8958678	0.107004946	0.137356563	FALSE	0.383044983	FALSE	FALSE
YCR049C	YCR049C	1.46712181	1	4.435758578	2.378696123	0.330748796	0.420398381	FALSE	0.383044983	FALSE	FALSE
YCR051W	YCR051W	96.06687298	65.76479619	312.9681199	176.1944553	0.306954181	0.373251224	FALSE	0.383044983	FALSE	FALSE
YCR052W	RSC6	37.0859159	33.84945545	58.55730803	57.20978413	0.633326858	0.59167249	FALSE	0.383044983	FALSE	FALSE
YCR053W	THR4	113.238697	75.33950934	20.14698472	2.310533458	5.620627531	32.60697614	TRUE	0.964763552	TRUE	FALSE
YCR057C	PWP2	58.67217006	59.00689763	879.9959831	342.9210058	0.066673225	0.1720714	FALSE	0.383044983	FALSE	FALSE
YCR059C	YIH1	52.79813269	53.22291801	44.58674075	52.11475424	1.184166678	1.021263916	FALSE	0.383044983	FALSE	FALSE
YCR060W	TAH1	252.43228	165.9390259	104.7193182	155.2444663	2.410560767	1.068888507	FALSE	0.699437716	FALSE	FALSE
YCR061W	YCR061W	9.684861064	14.07629628	66.59265751	246.425702	0.145434368	0.057121867	FALSE	0.383044983	FALSE	FALSE
YCR063W	BUD31	13.98924376	8.083417664	31.73547183	76.55637179	0.440807808	0.105587784	FALSE	0.383044983	FALSE	FALSE
YCR065W	HCM1	28.93187291	24.08596992	34.42714589	21.39454297	0.840379653	1.125799694	FALSE	0.383044983	FALSE	FALSE
YCR067C	SED4	44.08935009	34.78636063	46.21725757	38.67668685	0.953958595	0.899414181	FALSE	0.383044983	FALSE	FALSE
YCR068W	ATG15	11.98133834	27.89525429	225.508635	370.8639323	0.053130286	0.075216951	FALSE	0.383044983	FALSE	FALSE
YCR069W	CPR4	29.99960049	35.75717411	57.4786282	47.68709103	0.521926174	0.749829217	FALSE	0.383044983	FALSE	FALSE
YCR071C	IMG2	262.5527036	202.2276551	22.47936193	4.853929442	11.67972225	41.66266889	FALSE	0.8911188	FALSE	FALSE
YCR072C	RSA4	149.3115519	121.7946971	251.2495173	138.5844367	0.594275975	0.878848304	FALSE	0.383044983	FALSE	FALSE
YCR073C	SSK22	16.17444276	28.20323424	29.99157541	16.35163354	0.539299538	1.72479613	FALSE	0.699437716	FALSE	FALSE
YCR073W-A	SOL2	50.57649667	43.06510445	75.11653947	131.95923	0.673307064	0.326351589	FALSE	0.383044983	FALSE	FALSE

YCR075C	ERS1	123.5854946	88.41885523	1.806055829	3.843721753	68.42839108	23.00344846	FALSE	0.858318916	FALSE	FALSE
YCR076C	FUB1	198.5699687	215.641463	36.31067696	50.19509388	5.468638574	4.296066534	FALSE	0.415383506	FALSE	FALSE
YCR077C	PAT1	50.10181098	48.40607762	80.3934794	71.88128954	0.623207396	0.673416934	FALSE	0.383044983	FALSE	FALSE
YCR079W	PTC6	40.07961887	47.32137275	20.04112569	34.51438654	1.999868645	1.371062258	FALSE	0.383044983	FALSE	FALSE
YCR081W	SRB8	22.12885899	24.95022246	2.942551462	4.246607852	7.520296341	5.875329989	FALSE	0.415383506	FALSE	FALSE
YCR083W	TRX3	458.0756731	479.2865645	114.4753758	168.3483844	4.001521462	2.846992362	FALSE	0.428460208	FALSE	FALSE
YCR084C	TUP1	66.09742202	47.92663252	494.5470017	401.1070452	0.133652457	0.119485891	FALSE	0.383044983	FALSE	FALSE
YCR086W	CSM1	95.88439028	58.79777897	24.78463723	18.35365402	3.868702591	3.203600705	FALSE	0.383044983	FALSE	FALSE
YCR088W	ABP1	67.17367164	43.00094288	261.6584	473.0151443	0.256722779	0.090908174	FALSE	0.383044983	FALSE	FALSE
YCR089W	FIG2	3.78667278	5.552956482	34.59056733	18.65287712	0.109471254	0.29769973	FALSE	0.383044983	FALSE	FALSE
YCR090C	YCR090C	296.7772743	295.2892122	1	3.030859236	296.7772743	97.42755739	FALSE	0.888595732	FALSE	FALSE
YCR091W	KIN82	9.904259211	11.97222623	3.063511564	2.83879806	3.232975951	4.217357479	FALSE	0.383044983	FALSE	FALSE
YCR093W	CDC39	38.88085356	43.39333924	1329.513192	435.603776	0.029244429	0.099616536	FALSE	0.383044983	FALSE	FALSE
YCR102C	YCR102C	77.34307466	132.2414195	26.1695709	4.288951749	2.955458266	30.83303969	TRUE	0.997001153	TRUE	FALSE
YCR105W	ADH7	12.81547563	13.62584864	18.63395472	20.35016495	0.687748565	0.669569444	FALSE	0.383044983	FALSE	FALSE
YDL001W	RMD1	98.00139195	86.8551878	25.49782166	4.735717556	3.843520175	18.34044931	TRUE	0.953373702	TRUE	FALSE
YDL003W	MCD1	121.9162987	35.49664026	12.88964629	3.765408722	9.458467355	9.42703512	FALSE	0.383044983	FALSE	FALSE
YDL005C	MED2	89.28462597	79.41596527	3.166320522	1.935088648	28.19822736	41.03996236	FALSE	0.489114764	FALSE	FALSE
YDL006W	PTC1	248.5748298	210.2083967	33.69890799	6.856918679	7.376346732	30.65639342	TRUE	0.957352941	TRUE	FALSE
YDL007W	RPT2	345.6471249	351.21947	49.12983095	55.5051337	7.035381929	6.327693433	FALSE	0.383044983	FALSE	FALSE
YDL008W	APC11	287.6638958	209.0606217	4.150762763	2.289975037	69.30386348	91.29384309	FALSE	0.45905421	FALSE	FALSE
YDL012C	YDL012C	48.57803327	66.06103401	251.3837625	162.8143851	0.193242526	0.405744455	FALSE	0.383044983	FALSE	FALSE
YDL013W	SLX5	44.34704328	60.30733105	67.19377667	63.92811544	0.65998736	0.943361628	FALSE	0.383044983	FALSE	FALSE
YDL014W	NOP1	219.8600317	169.8520488	252.6894818	184.909397	0.870079871	0.918569049	FALSE	0.383044983	FALSE	FALSE
YDL017W	CDC7	54.41122231	70.4824418	16.07801931	6.428361261	3.384199339	10.96429384	FALSE	0.862658593	FALSE	FALSE
YDL019C	OSH2	31.76110509	41.9484136	88.68487423	65.26767333	0.35813441	0.642713482	FALSE	0.383044983	FALSE	FALSE
YDL020C	RPN4	158.8373851	411.1016227	4.974264078	1.959119623	31.93183607	209.8399802	TRUE	0.986058247	TRUE	FALSE
YDL022W	GPD1	149.5137682	175.6010139	103.04165	338.5817118	1.451003241	0.518637031	FALSE	0.577652826	FALSE	FALSE
YDL025C	RTK1	60.78121071	90.91813806	4.994512267	6.008204498	12.16959884	15.13233081	FALSE	0.41816609	FALSE	FALSE
YDL028C	MPS1	46.99051585	51.06417183	3.946212594	1.052381679	11.90775072	48.52248271	TRUE	0.958549596	TRUE	FALSE
YDL029W	ARP2	208.9351125	207.6203926	42.08416301	33.60793039	4.964696873	6.177720264	FALSE	0.415383506	FALSE	FALSE
YDL030W	PRP9	62.20915749	65.19017293	6.878707589	2.743499589	9.043727573	23.76168496	FALSE	0.849480969	FALSE	FALSE
YDL031W	DBP10	87.91355921	77.24807659	52.02545434	15.55734731	1.689818193	4.965375849	FALSE	0.783708189	FALSE	FALSE
YDL033C	SLM3	53.2266489	58.79115946	27.01209884	33.21603201	1.970474386	1.769963355	FALSE	0.383044983	FALSE	FALSE
YDL034W	YDL034W	1	1	4.106341119	1	0.243525798	1	FALSE	0.577652826	FALSE	FALSE
YDL035C	GPR1	159.5197579	133.9532817	4.133915465	1	38.58805514	133.9532817	FALSE	0.889345444	FALSE	FALSE
YDL037C	BSC1	1.845669957	4.952904273	15.69064331	3.116781218	0.117628699	1.58910874	FALSE	0.699437716	FALSE	FALSE
YDL039C	PRM7	2.223887074	5.859490857	5.278093833	10.45941824	0.421342845	0.560211928	FALSE	0.383044983	FALSE	FALSE
YDL040C	NAT1	60.48107184	55.99091148	96.74211564	26.08222598	0.625178305	2.146707552	FALSE	0.699437716	FALSE	FALSE
YDL042C	SIR2	26.70497566	31.52468527	4.907640206	5.199982923	5.44151049	6.062459383	FALSE	0.383044983	FALSE	FALSE
YDL046W	NPC2	83.47604568	69.60453775	6.622121223	2.196274809	12.60563539	31.69208948	FALSE	0.852032872	FALSE	FALSE
YDL047W	SIT4	132.4996997	171.3634515	22.36748478	21.34539922	5.923763938	8.028121175	FALSE	0.446323529	FALSE	FALSE
YDL048C	STP4	9.596882337	23.67971891	307.9285154	298.2024845	0.031165942	0.079408188	FALSE	0.383044983	FALSE	FALSE
YDL049C	KNH1	31.0610473	26.35892559	24.63688974	18.32464556	1.260753595	1.438441224	FALSE	0.383044983	FALSE	FALSE

YDL051W	LHP1	227.5775254	201.3744563	8.186128446	3.355094838	27.80038537	60.02049602	FALSE	0.836836794	FALSE	FALSE
YDL052C	SLC1	43.78414841	48.82142207	7.577721022	4.667491116	5.778010075	10.45988538	FALSE	0.521583045	FALSE	FALSE
YDL053C	PBP4	234.7938275	235.5940102	94.07539389	113.4556247	2.495804884	2.076530017	FALSE	0.383044983	FALSE	FALSE
YDL055C	PSA1	705.4550302	425.9294293	108.6851779	43.2075893	6.490811753	9.857745737	FALSE	0.493886967	FALSE	FALSE
YDL056W	MBP1	67.71218667	58.5096928	63.32353557	43.91698844	1.069305213	1.332279258	FALSE	0.383044983	FALSE	FALSE
YDL057W	YDL057W	59.20909223	93.83745662	3.033275286	5.906657411	19.51985449	15.88672748	FALSE	0.424423299	FALSE	FALSE
YDL058W	USO1	36.52167605	38.70465942	170.3470448	69.67079036	0.214395713	0.555536391	FALSE	0.383044983	FALSE	FALSE
YDL059C	RAD59	95.32676822	141.8884134	11.92100466	7.34738591	7.996538125	19.3114143	FALSE	0.835784314	FALSE	FALSE
YDL060W	TSR1	54.30396115	42.47777515	191.9233533	131.379084	0.282946083	0.323322205	FALSE	0.383044983	FALSE	FALSE
YDL061C	RPS29B	807.0771493	632.7951679	10.51096715	2.366797297	76.78428994	267.3634826	FALSE	0.889388697	FALSE	FALSE
YDL063C	SYO1	76.70009923	85.45737626	1	5.311684354	76.70009923	16.08856449	TRUE	0.959486736	FALSE	TRUE
YDL064W	UBC9	111.7602221	117.6276639	69.25627443	37.56717894	1.613719812	3.131128481	FALSE	0.45227797	FALSE	FALSE
YDL065C	PEX19	220.3006728	203.3832417	43.39690412	22.90011558	5.076414487	8.881319443	FALSE	0.508693772	FALSE	FALSE
YDL066W	IDP1	182.1959337	99.27120418	677.8438926	491.095042	0.268787453	0.20214255	FALSE	0.383044983	FALSE	FALSE
YDL067C	COX9	771.9859121	588.6772142	441.9021807	293.9694427	1.746961083	2.002511584	FALSE	0.383044983	FALSE	FALSE
YDL070W	BDF2	350.9933953	438.5460192	236.7014344	262.3384101	1.482852844	1.671680556	FALSE	0.383044983	FALSE	FALSE
YDL071C	YDL071C	2.914681996	5.284882721	22.27639395	57.22557491	0.130841733	0.092351763	FALSE	0.383044983	FALSE	FALSE
YDL072C	YET3	440.6551499	429.1808354	24.26403792	55.19133361	18.16083338	7.776236001	FALSE	0.833376586	FALSE	FALSE
YDL073W	YDL073W	46.97520476	59.01899486	5.194096313	5.230685135	9.043961053	11.28322454	FALSE	0.42850346	FALSE	FALSE
YDL074C	BRE1	151.1047098	155.2418593	65.15063169	20.60110649	2.319313042	7.535607827	FALSE	0.844910611	FALSE	FALSE
YDL075W	RPL31A	819.8608423	401.7747098	665.9086883	123.3289212	1.231191088	3.257749325	FALSE	0.749524221	FALSE	FALSE
YDL078C	MDH3	198.1955515	169.3774186	52.2401706	54.35865643	3.793930019	3.115923566	FALSE	0.383044983	FALSE	FALSE
YDL080C	THI3	59.01036501	79.27324082	152.06211	94.76476771	0.388067514	0.836526514	FALSE	0.383044983	FALSE	FALSE
YDL081C	RPP1A	1716.348176	1082.495448	5113.641763	3275.649068	0.335641067	0.330467466	FALSE	0.383044983	FALSE	FALSE
YDL082W	RPL13A	215.8079128	133.8836956	516.9777023	186.0041526	0.417441433	0.719788745	FALSE	0.383044983	FALSE	FALSE
YDL083C	RPS16B	417.130126	308.2848254	6.259662209	1.897732581	66.63780122	162.4490344	FALSE	0.845905421	FALSE	FALSE
YDL084W	SUB2	323.9622308	224.5385481	47.04613908	18.22450691	6.886053503	12.32069264	FALSE	0.528460208	FALSE	FALSE
YDL085C-A	YDL085C-A	592.4407971	274.4564698	17.83225821	11.64844512	33.22298219	23.56163994	FALSE	0.482280854	FALSE	FALSE
YDL085W	NDE2	17.12687071	19.35854477	1.28962402	23.52734436	13.28051466	0.822810449	TRUE	0.990657439	FALSE	TRUE
YDL086W	YDL086W	158.5877765	121.1922619	16.44036995	29.13254194	9.646241355	4.160030463	FALSE	0.803662053	FALSE	FALSE
YDL087C	LUC7	58.4975935	55.47109726	6.257039505	3.860605771	9.349084892	14.36849566	FALSE	0.508463091	FALSE	FALSE
YDL088C	ASM4	63.2249072	75.51021783	54.49568518	13.58446153	1.160181893	5.55857276	FALSE	0.896064014	FALSE	FALSE
YDL093W	PMT5	19.48997706	20.71806622	3.54499283	1	5.497888993	20.71806622	FALSE	0.887211649	FALSE	FALSE
YDL095W	PMT1	68.76939185	64.12281297	14.21279381	6.186111598	4.838555513	10.36560882	FALSE	0.802321223	FALSE	FALSE
YDL096C	OPI6	1	1	12.08600985	19.18721189	0.082740293	0.052118046	FALSE	0.383044983	FALSE	FALSE
YDL097C	RPN6	269.7476767	263.4341923	46.95482729	67.38364488	5.744833754	3.909467836	FALSE	0.428460208	FALSE	FALSE
YDL098C	SNU23	88.31237331	84.46778366	40.34001531	30.06387162	2.189200293	2.809610975	FALSE	0.383044983	FALSE	FALSE
YDL099W	BUG1	153.6173771	108.8139839	26.64448037	33.48447722	5.765448417	3.249684419	FALSE	0.487600923	FALSE	FALSE
YDL100C	GET3	227.564139	190.3054013	154.0942489	128.1811784	1.476785412	1.484659477	FALSE	0.383044983	FALSE	FALSE
YDL101C	DUN1	31.75529023	40.27066924	24.57665802	1	1.292091472	40.27066924	TRUE	0.999682814	TRUE	FALSE
YDL102W	POL3	36.23443465	42.39618273	3.809516185	1.970131556	9.511558134	21.51946787	FALSE	0.83288639	FALSE	FALSE
YDL103C	QRI1	211.8937225	113.5107307	10.03595757	6.787870754	21.1134534	16.7225828	FALSE	0.439460784	FALSE	FALSE
YDL104C	QRI7	67.03292336	64.11806243	13.15495709	17.0485832	5.095639836	3.76090269	FALSE	0.428460208	FALSE	FALSE
YDL105W	NSE4	26.69983715	29.94329747	10.98358294	3.713543973	2.430885922	8.063267241	FALSE	0.844910611	FALSE	FALSE

YDL109C	YDL109C	14.65587269	33.30237311	25.88675805	33.06698055	0.566153269	1.007118659	FALSE	0.383044983	FALSE	FALSE
YDL110C	TMA17	609.7990866	545.9878838	34.55699529	129.7621492	17.64618369	4.207605122	TRUE	0.951600346	FALSE	TRUE
YDL112W	TRM3	40.98877199	37.48208982	28.245834	7.525734643	1.451143981	4.98052238	FALSE	0.808232411	FALSE	FALSE
YDL113C	ATG20	199.2760351	266.0992041	22.4932638	19.98877864	8.859365047	13.31242938	FALSE	0.50239331	FALSE	FALSE
YDL115C	IWR1	155.6143778	178.8997494	9.190490356	2.392783607	16.93210827	74.76637203	TRUE	0.9588812	TRUE	FALSE
YDL117W	CYK3	52.41602687	52.88859307	9.135495676	4.508860372	5.737622646	11.72992479	FALSE	0.802321223	FALSE	FALSE
YDL120W	YFH1	161.1402761	113.750809	4.194577174	1	38.41633362	113.750809	FALSE	0.858419839	FALSE	FALSE
YDL121C	YDL121C	770.1237542	548.7469892	10.02699277	1.674812997	76.80505729	327.6467225	TRUE	0.95893887	TRUE	FALSE
YDL122W	UBP1	86.3309616	83.13359754	51.50222825	39.85863003	1.676256825	2.085711362	FALSE	0.383044983	FALSE	FALSE
YDL123W	SNA4	15.15910258	13.74319384	15.79666314	26.87741108	0.959639542	0.511328781	FALSE	0.383044983	FALSE	FALSE
YDL124W	YDL124W	529.5471231	655.8263675	11.37667653	30.89988005	46.54673283	21.22423668	FALSE	0.836923299	FALSE	FALSE
YDL125C	HNT1	364.0297273	371.437512	38.47834024	34.10473961	9.460640065	10.89108189	FALSE	0.399264706	FALSE	FALSE
YDL126C	CDC48	369.2744036	322.087051	1328.467407	1856.204745	0.27797024	0.17351914	FALSE	0.383044983	FALSE	FALSE
YDL128W	VCX1	78.88035015	100.5880793	72.81516857	57.97251676	1.083295578	1.735099404	FALSE	0.383044983	FALSE	FALSE
YDL129W	YDL129W	18.6326703	20.36127761	18.78272907	4.284748838	0.992010811	4.752035271	FALSE	0.873241061	FALSE	FALSE
YDL130W	RPP1B	511.4313503	308.6964206	274.0342116	174.961476	1.866304748	1.764367949	FALSE	0.383044983	FALSE	FALSE
YDL131W	LYS21	78.87045765	54.12710572	51.64436416	17.28654083	3.64392583	3.131170444	FALSE	0.383044983	FALSE	FALSE
YDL132W	CDC53	73.52190085	51.86654713	5.060019904	1	14.52996278	51.86654713	FALSE	0.891536909	FALSE	FALSE
YDL133C-A	RPL41B	6604.744139	6365.573483	16.08878641	1	410.5184797	6365.573483	TRUE	0.999610727	TRUE	FALSE
YDL134C	PPH21	210.3954009	184.9708952	71.32670195	85.9738044	2.949742454	2.151479704	FALSE	0.383044983	FALSE	FALSE
YDL135C	RDI1	216.5670941	211.7424276	1	4.934159681	216.5670941	42.9135742	TRUE	0.965657439	FALSE	TRUE
YDL137W	ARF2	582.2691186	384.2671136	6.39647895	6.503635587	91.02963102	59.08497001	FALSE	0.529397347	FALSE	FALSE
YDL138W	RGT2	30.96531702	52.11097273	26.99350659	23.98327954	1.147139477	2.172804292	FALSE	0.45227797	FALSE	FALSE
YDL139C	SCM3	21.57818889	15.13898696	16.74163596	7.34366912	1.288893686	2.06150178	FALSE	0.383044983	FALSE	FALSE
YDL140C	RPO21	65.41505634	61.31154791	502.6411995	333.6454317	0.130142647	0.183762588	FALSE	0.383044983	FALSE	FALSE
YDL141W	BPL1	22.25028586	30.2739905	17.69112853	22.03009955	1.257708678	1.374210336	FALSE	0.383044983	FALSE	FALSE
YDL143W	CCT4	161.8502526	142.7784163	247.552021	289.6459536	0.653802995	0.492941174	FALSE	0.383044983	FALSE	FALSE
YDL144C	YDL144C	55.44971585	50.57894294	85.88288806	151.1612648	0.645643353	0.334602539	FALSE	0.383044983	FALSE	FALSE
YDL145C	COP1	58.29768136	49.46333662	529.8514548	354.5270698	0.110026463	0.13951921	FALSE	0.383044983	FALSE	FALSE
YDL147W	RPN5	469.7691872	559.988227	10.21376136	12.51468715	45.99375005	44.7464823	FALSE	0.384688581	FALSE	FALSE
YDL148C	NOP14	91.46566807	83.57413181	5.174488801	1.044200814	17.67627134	80.03645533	TRUE	0.959486736	TRUE	FALSE
YDL149W	ATG9	40.78997183	54.85228142	6.50845326	16.40065645	6.267229739	3.344517434	FALSE	0.487600923	FALSE	FALSE
YDL150W	RPC53	104.8504595	82.97973855	42.04607919	28.34828627	2.493703612	2.927151848	FALSE	0.383044983	FALSE	FALSE
YDL153C	SAS10	187.6734002	144.591854	14.52274801	4.472769702	12.92271959	32.32714038	FALSE	0.852032872	FALSE	FALSE
YDL155W	CLB3	88.87056087	99.40024744	38.77061988	32.47256214	2.292214082	3.061053422	FALSE	0.383044983	FALSE	FALSE
YDL156W	CMR1	39.24324868	38.90401238	4.674688194	1.595796805	8.394837698	24.37905143	FALSE	0.853316032	FALSE	FALSE
YDL159W	STE7	52.1084136	62.64702709	7.296495455	2.451476343	7.141567334	25.55481609	FALSE	0.88849481	FALSE	FALSE
YDL160C	DHH1	59.06973868	78.09187321	35.88659391	28.9653062	1.646011289	2.6960486	FALSE	0.45227797	FALSE	FALSE
YDL161W	ENT1	32.77682685	38.32991864	134.2487614	105.3538159	0.244149939	0.363820886	FALSE	0.383044983	FALSE	FALSE
YDL164C	CDC9	51.24468457	48.06027607	6.638304111	1.267552654	7.719544587	37.91580247	TRUE	0.958895617	TRUE	FALSE
YDL166C	FAP7	375.1303681	320.2959225	8.8068503	2.125078103	42.5952929	150.7219533	FALSE	0.89188293	FALSE	FALSE
YDL168W	SFA1	152.5751924	300.7740102	68.95327648	79.96415665	2.21273303	3.761360374	FALSE	0.45227797	FALSE	FALSE
YDL169C	UGX2	39.03591959	44.43390978	5.181951917	20.35870735	7.533053223	2.182550641	FALSE	0.844910611	FALSE	FALSE
YDL170W	UGA3	49.54224754	68.35048384	43.02924819	37.00449977	1.151362146	1.84708574	FALSE	0.383044983	FALSE	FALSE

YDL171C	GLT1	60.62067712	60.97152285	181.0796083	107.0165519	0.334773626	0.569739183	FALSE	0.383044983	FALSE	FALSE
YDL173W	PAR32	117.9166112	85.99837311	24.02445899	21.24531488	4.908190075	4.047874725	FALSE	0.383044983	FALSE	FALSE
YDL174C	DLD1	47.13225847	42.91720237	87.47255355	164.4734177	0.538823397	0.260937013	FALSE	0.383044983	FALSE	FALSE
YDL175C	AIR2	55.47752206	58.59326495	4.287471815	1	12.93944881	58.59326495	TRUE	0.959443483	TRUE	FALSE
YDL177C	YDL177C	296.8657589	285.8781589	5.883829798	2.378987524	50.45451162	120.1679941	FALSE	0.845083622	FALSE	FALSE
YDL178W	DLD2	175.0547395	187.4424819	150.379901	137.4370145	1.164083353	1.363842794	FALSE	0.383044983	FALSE	FALSE
YDL181W	INH1	344.2826893	202.7920114	124.7724534	135.6756016	2.759284441	1.494682972	FALSE	0.45227797	FALSE	FALSE
YDL182W	LYS20	53.10745362	43.93803039	33.87018469	38.00076586	1.567970595	1.156240655	FALSE	0.383044983	FALSE	FALSE
YDL183C	YDL183C	42.22202892	61.87648253	6.232590547	2.405443838	6.774394789	25.72351994	FALSE	0.889057093	FALSE	FALSE
YDL184C	RPL41A	5708.853103	5123.964818	63.41955503	10.05186581	90.0172368	509.7526088	TRUE	0.965902537	TRUE	FALSE
YDL185C-A	YDL185C-A	1	1.158965509	14.01027255	9.444010374	0.071376199	0.122719635	FALSE	0.383044983	FALSE	FALSE
YDL185W	VMA1	219.4168257	178.9563832	1536.826725	997.8270299	0.142772651	0.179346097	FALSE	0.383044983	FALSE	FALSE
YDL188C	PPH22	94.71431355	102.2955694	505.1699076	506.5475636	0.187490015	0.201946622	FALSE	0.383044983	FALSE	FALSE
YDL189W	RBS1	78.8067221	67.21493854	108.8602073	106.194083	0.723925887	0.63294429	FALSE	0.383044983	FALSE	FALSE
YDL190C	UFD2	54.25893633	49.35120906	18.62684699	14.68840973	2.912942613	3.359874212	FALSE	0.383044983	FALSE	FALSE
YDL192W	ARF1	1683.949516	1262.177119	3.295724689	2.296282005	510.9496923	549.6611983	FALSE	0.395602653	FALSE	FALSE
YDL193W	NUS1	213.1102816	279.9394881	11.19203413	5.340905535	19.04124658	52.41423693	FALSE	0.857540369	FALSE	FALSE
YDL194W	SNF3	16.05545168	20.00492329	84.20351057	44.60836536	0.190674374	0.448456767	FALSE	0.383044983	FALSE	FALSE
YDL195W	SEC31	41.29514131	43.03819327	157.8955972	147.3159894	0.26153447	0.292148826	FALSE	0.383044983	FALSE	FALSE
YDL197C	ASF2	24.47372399	25.8718118	18.06238687	19.79845813	1.354955143	1.306758922	FALSE	0.383044983	FALSE	FALSE
YDL198C	GGC1	88.84454258	51.64904763	20.67362804	18.2314447	4.297481912	2.832965159	FALSE	0.45227797	FALSE	FALSE
YDL200C	MGT1	382.9696803	370.9670764	9.416077191	7.003115686	40.67189261	52.97171902	FALSE	0.455478662	FALSE	FALSE
YDL201W	TRM8	76.42154015	58.77206975	2.722204327	5.069282249	28.07340338	11.59376552	FALSE	0.841464821	FALSE	FALSE
YDL202W	MRPL11	146.9971287	123.3139302	30.0607688	9.288271336	4.889998978	13.27630575	FALSE	0.837701845	FALSE	FALSE
YDL203C	ACK1	38.88578144	39.02964937	121.3106304	72.66236591	0.320547188	0.537137057	FALSE	0.383044983	FALSE	FALSE
YDL204W	RTN2	40.56389073	44.93491654	2.789631028	35.65334901	14.54095195	1.26032807	TRUE	0.990758362	FALSE	TRUE
YDL205C	HEM3	133.3674359	149.3086785	47.49239917	24.60854361	2.808184851	6.067351278	FALSE	0.776081315	FALSE	FALSE
YDL207W	GLE1	57.1400243	56.78715973	104.1811981	101.8654906	0.548467721	0.557472009	FALSE	0.383044983	FALSE	FALSE
YDL208W	NHP2	508.3675711	291.7345027	26.40107626	4.012852098	19.25556239	72.70003866	FALSE	0.892329873	FALSE	FALSE
YDL209C	CWC2	288.4677917	178.4943233	12.73211908	14.18596111	22.65669917	12.58246247	FALSE	0.549524221	FALSE	FALSE
YDL213C	NOP6	104.3567927	76.58403058	89.84487981	19.9269287	1.161521869	3.843243067	FALSE	0.774048443	FALSE	FALSE
YDL214C	PRR2	4.129132828	8.99688368	1.014786228	5.545835646	4.068968136	1.622277373	FALSE	0.749524221	FALSE	FALSE
YDL215C	GDH2	84.26710987	113.9497433	7.806439008	10.67797504	10.79456456	10.67147497	FALSE	0.383044983	FALSE	FALSE
YDL217C	TIM22	214.9811521	230.5784168	14.1919777	16.75856003	15.14807567	13.75884422	FALSE	0.393670704	FALSE	FALSE
YDL218W	YDL218W	13.97764165	13.43379518	7.097114022	10.30354272	1.969482469	1.303803511	FALSE	0.383044983	FALSE	FALSE
YDL220C	CDC13	10.00444901	15.23569793	14.98222141	17.68858499	0.667754717	0.86132938	FALSE	0.383044983	FALSE	FALSE
YDL222C	FMP45	36.82528329	95.89504938	38.58974957	865.7556176	0.954276296	0.110764571	FALSE	0.577652826	FALSE	FALSE
YDL223C	HBT1	16.63345265	9.422267825	104.3322611	1718.848617	0.159427702	0.005481732	FALSE	0.383044983	FALSE	FALSE
YDL224C	WHI4	30.41732237	44.6504835	29.41665361	16.41481199	1.034017084	2.720133714	FALSE	0.699437716	FALSE	FALSE
YDL226C	GCS1	192.6607552	127.7554274	57.51742591	50.61432643	3.3496067	2.524096169	FALSE	0.383044983	FALSE	FALSE
YDL227C	HO	92.27343629	8.327966809	28.71077867	1	3.213895288	8.327966809	FALSE	0.814504037	FALSE	FALSE
YDL229W	SSB1	201.1162224	124.0885872	26.57475756	1.776611561	7.567941945	69.84564887	TRUE	0.99538639	TRUE	FALSE
YDL230W	PTP1	89.63803759	94.24183225	142.2589444	201.5766279	0.630104757	0.467523608	FALSE	0.383044983	FALSE	FALSE
YDL231C	BRE4	59.23413826	74.74401184	42.9686639	67.22509492	1.378542707	1.111846877	FALSE	0.383044983	FALSE	FALSE

YDL233W	MFG1	33.8141212	41.0662637	14.15681621	25.20068631	2.388539958	1.629569258	FALSE	0.383044983	FALSE	FALSE
YDL234C	GYP7	63.43757893	104.8250946	14.75725308	14.91365262	4.298738971	7.028800874	FALSE	0.479368512	FALSE	FALSE
YDL237W	AIM6	77.83666968	79.85894819	32.81641533	2.83734566	2.371882148	28.14565363	TRUE	0.996914648	TRUE	FALSE
YDL238C	GUD1	50.61037956	92.66520554	54.25504935	121.9594125	0.932823399	0.75980364	FALSE	0.383044983	FALSE	FALSE
YDL239C	ADY3	40.13368488	51.27872931	2.133180026	4.700249038	18.81401682	10.90978986	FALSE	0.534602076	FALSE	FALSE
YDL240W	LRG1	40.15561395	34.56631708	4.394536148	1.993986339	9.137622856	17.33528279	FALSE	0.547102076	FALSE	FALSE
YDL243C	AAD4	29.73564461	93.15273079	4.048267703	1.608356906	7.345276249	57.91794747	TRUE	0.987586505	TRUE	FALSE
YDR001C	NTH1	95.92869602	137.9785427	35.58356458	96.59175007	2.695870893	1.428471299	FALSE	0.45227797	FALSE	FALSE
YDR002W	YRB1	627.1856969	553.1248954	116.7039811	107.6349235	5.374158541	5.138898019	FALSE	0.383044983	FALSE	FALSE
YDR003W	RCR2	235.5228817	335.4188994	30.475852	43.88340241	7.728180387	7.643411427	FALSE	0.383044983	FALSE	FALSE
YDR004W	RAD57	171.7618096	220.9677103	37.64323879	25.96979682	4.562886063	8.508642246	FALSE	0.508693772	FALSE	FALSE
YDR006C	SOK1	51.67474825	82.17348134	170.6451492	224.9594794	0.302819907	0.365281257	FALSE	0.383044983	FALSE	FALSE
YDR007W	TRP1	349.5459372	371.7034181	18.79462927	4.234454372	18.59818208	87.78071162	TRUE	0.959515571	TRUE	FALSE
YDR009W	GAL3	6.480179103	10.05919776	3.227785562	8.40868345	2.007623796	1.196286888	FALSE	0.383044983	FALSE	FALSE
YDR010C	YDR010C	5.470499242	6.348207473	3.584095961	1	1.526326109	6.348207473	FALSE	0.896064014	FALSE	FALSE
YDR011W	SNQ2	36.38501161	81.33746487	39.36318689	47.54355851	0.924341103	1.710798843	FALSE	0.383044983	FALSE	FALSE
YDR012W	RPL4B	110.3377092	99.00055786	96.00208393	45.49531232	1.149326188	2.176060627	FALSE	0.45227797	FALSE	FALSE
YDR017C	KCS1	39.47254083	39.26367832	26.61729781	14.15287082	1.482965744	2.774255402	FALSE	0.45227797	FALSE	FALSE
YDR019C	GCV1	372.4517788	1005.467608	16.77778773	11.96885978	22.19909948	84.00696701	FALSE	0.892344291	FALSE	FALSE
YDR020C	DAS2	94.65419359	53.11344938	3.821988131	1	24.76569533	53.11344938	FALSE	0.836591696	FALSE	FALSE
YDR023W	SES1	357.7252796	272.043999	8.746186418	10.91254531	40.90071518	24.92947257	FALSE	0.534501153	FALSE	FALSE
YDR025W	RPS11A	313.1271954	198.0428451	389.9554127	28.93553885	0.802982047	6.844277071	TRUE	0.957843137	TRUE	FALSE
YDR026C	NSI1	74.14318038	70.18743836	3.035937657	1.51418685	24.42183891	46.35322144	FALSE	0.560366205	FALSE	FALSE
YDR027C	VPS54	69.56483529	87.48757164	9.044251804	1.976647328	7.691607531	44.26058731	TRUE	0.965513264	TRUE	FALSE
YDR028C	REG1	58.36543012	54.15052246	28.7919009	23.20347209	2.027147507	2.333724981	FALSE	0.383044983	FALSE	FALSE
YDR032C	PST2	480.0437308	230.8263266	209.2263968	826.4389034	2.294374601	0.279302348	FALSE	0.827537486	FALSE	FALSE
YDR033W	MRH1	321.8862205	382.92076	108.970828	72.47651006	2.953875145	5.283377465	FALSE	0.487600923	FALSE	FALSE
YDR035W	ARO3	299.7827687	184.5910295	17.92096856	12.37135349	16.72804501	14.92084351	FALSE	0.395040369	FALSE	FALSE
YDR036C	EHD3	37.23346263	42.98582253	3.040422881	2.494425426	12.24614604	17.23275512	FALSE	0.467949827	FALSE	FALSE
YDR037W	KRS1	162.8841149	130.1878486	333.8168814	172.1249468	0.487944511	0.756356652	FALSE	0.383044983	FALSE	FALSE
YDR041W	RSM10	590.5564829	643.1235958	2.384548939	5.015040926	247.6596195	128.2389526	FALSE	0.563004614	FALSE	FALSE
YDR042C	YDR042C	30.08937882	34.61904933	1	4.897799056	30.08937882	7.068286987	TRUE	0.957352941	FALSE	TRUE
YDR044W	HEM13	24.73197743	18.20526976	34.02269346	14.15690414	0.726925911	1.285964048	FALSE	0.383044983	FALSE	FALSE
YDR046C	BAP3	246.9851741	374.9646129	20.15601299	19.70674359	12.25367211	19.02722341	FALSE	0.513062284	FALSE	FALSE
YDR047W	HEM12	163.8672224	156.5082349	185.9163393	129.8792637	0.881403017	1.205028658	FALSE	0.383044983	FALSE	FALSE
YDR049W	VMS1	41.6712039	39.93579097	22.61988519	27.04996516	1.842237639	1.476371253	FALSE	0.383044983	FALSE	FALSE
YDR050C	TP11	3120.992318	2804.808239	2802.2858	2772.036724	1.113730911	1.011822179	FALSE	0.383044983	FALSE	FALSE
YDR051C	DET1	302.5613923	282.5177355	37.39305236	23.64419473	8.091379902	11.94871463	FALSE	0.462889273	FALSE	FALSE
YDR054C	CDC34	104.459183	114.4165206	24.354005	35.70779585	4.289199376	3.204244841	FALSE	0.428460208	FALSE	FALSE
YDR055W	PST1	123.082545	323.7238086	30.79257207	118.3180287	3.997150505	2.736048024	FALSE	0.428460208	FALSE	FALSE
YDR056C	YDR056C	218.0116105	108.3914053	1	7.793600794	218.0116105	13.90774408	TRUE	0.999610727	FALSE	TRUE
YDR057W	YOS9	77.60855224	63.10065619	26.14475142	22.47606887	2.968418058	2.807459638	FALSE	0.383044983	FALSE	FALSE
YDR059C	UBC5	128.4546652	183.8477099	6.690960321	10.89570307	19.19824046	16.87341411	FALSE	0.405190311	FALSE	FALSE
YDR060W	MAK21	90.12503541	76.27710035	69.05915969	26.55292593	1.305041009	2.872643887	FALSE	0.699437716	FALSE	FALSE

YDR061W	YDR061W	67.424511	80.98593429	7.235596542	4.030674209	9.318445356	20.09240392	FALSE	0.826355248	FALSE	FALSE
YDR062W	LCB2	117.1231941	119.2703366	51.88195736	47.16302862	2.257493743	2.528894774	FALSE	0.383044983	FALSE	FALSE
YDR063W	AIM7	242.404386	186.1453136	1	4.694920566	242.404386	39.64823494	TRUE	0.986029412	FALSE	TRUE
YDR064W	RPS13	857.7857981	622.3644783	36.94626308	8.222843216	23.21711931	75.68726072	FALSE	0.888682238	FALSE	FALSE
YDR068W	DOS2	117.5400966	112.1550674	32.83060213	33.82226583	3.580199234	3.316012829	FALSE	0.383044983	FALSE	FALSE
YDR072C	IPT1	62.56261861	92.75236089	108.465274	123.4322764	0.576798604	0.75144333	FALSE	0.383044983	FALSE	FALSE
YDR073W	SNF11	56.72199767	66.83822265	9.278104537	5.407232151	6.113532937	12.36089385	FALSE	0.809717416	FALSE	FALSE
YDR074W	TPS2	146.6276757	141.4506421	5.472746905	4.690635318	26.79233632	30.15596663	FALSE	0.404051326	FALSE	FALSE
YDR077W	SED1	203.6981543	275.8064409	13227.77097	26364.02477	0.01539928	0.010461469	FALSE	0.383044983	FALSE	FALSE
YDR080W	VPS41	49.3607609	57.78954503	17.25288586	20.76957512	2.861014749	2.782413443	FALSE	0.383044983	FALSE	FALSE
YDR081C	PDC2	46.42717003	68.24880044	3.856954896	1.491453322	12.03726029	45.75993054	FALSE	0.8919406	FALSE	FALSE
YDR083W	RRP8	122.6193613	108.2526868	15.92772334	1	7.698486388	108.2526868	TRUE	0.999567474	TRUE	FALSE
YDR087C	RRP1	447.9103606	289.6582973	13.06698401	5.945710012	34.27802163	48.71719218	FALSE	0.488192042	FALSE	FALSE
YDR088C	SLU7	114.0886186	127.4075295	18.87815004	22.05648944	6.043421542	5.776419218	FALSE	0.383044983	FALSE	FALSE
YDR089W	YDR089W	43.46896426	61.96069397	9.541163334	3.127155293	4.555939641	19.81375665	TRUE	0.953719723	TRUE	FALSE
YDR091C	RLI1	66.40593218	61.75820804	11.23589421	11.60335395	5.910159971	5.322444553	FALSE	0.383044983	FALSE	FALSE
YDR092W	UBC13	197.4665508	157.2881762	5.427452801	3.455776878	36.38291443	45.51456351	FALSE	0.446683968	FALSE	FALSE
YDR093W	DNF2	23.65656859	27.27628559	69.41925317	59.82662804	0.340778206	0.455922162	FALSE	0.383044983	FALSE	FALSE
YDR096W	GIS1	29.82528412	41.58031564	23.73635482	24.08005205	1.256523352	1.726753561	FALSE	0.383044983	FALSE	FALSE
YDR097C	MSH6	81.85574472	61.64987889	32.48260281	1	2.519987244	61.64987889	TRUE	0.999870242	TRUE	FALSE
YDR098C	GRX3	244.588699	224.669111	20.08551756	7.810385201	12.17736602	28.76543285	FALSE	0.840657439	FALSE	FALSE
YDR099W	BMH2	181.3698104	173.108841	4.619168697	3.078193969	39.26459981	56.23714513	FALSE	0.489258939	FALSE	FALSE
YDR100W	TVP15	193.4687645	184.7262247	5.571769414	20.92852587	34.7230386	8.826528248	FALSE	0.891248558	FALSE	FALSE
YDR101C	ARX1	134.4482941	115.8848442	17.65691687	8.844919807	7.614483045	13.10185357	FALSE	0.524567474	FALSE	FALSE
YDR104C	SPO71	32.47632562	44.28810895	28.61470186	40.77183513	1.134952437	1.086242716	FALSE	0.383044983	FALSE	FALSE
YDR105C	TMS1	73.12326317	100.4387873	5.61278169	1	13.0279899	100.4387873	TRUE	0.987687428	TRUE	FALSE
YDR108W	TRS85	29.15376961	32.6997393	7.505327596	1.385231377	3.884410006	23.60597648	TRUE	0.9830594	TRUE	FALSE
YDR109C	YDR109C	46.44087119	62.8625482	120.9875034	101.2990591	0.383848496	0.620563989	FALSE	0.383044983	FALSE	FALSE
YDR110W	FOB1	161.1985355	156.278425	15.44166496	12.90415718	10.43919395	12.11070377	FALSE	0.399264706	FALSE	FALSE
YDR111C	ALT2	49.15178957	53.75044762	20.15554576	14.23797928	2.4386236	3.775145797	FALSE	0.45227797	FALSE	FALSE
YDR113C	PDS1	17.14518821	17.78113393	73.69074187	21.17249686	0.232664074	0.839822249	FALSE	0.577652826	FALSE	FALSE
YDR116C	MRPL1	68.96042486	75.60831632	73.94776242	55.80383233	0.932555937	1.354894694	FALSE	0.383044983	FALSE	FALSE
YDR118W	APC4	82.76119757	89.36280763	7.231880169	1	11.44393928	89.36280763	TRUE	0.987687428	TRUE	FALSE
YDR119W	VBA4	79.53152652	77.54368449	38.38080052	10.43935532	2.07216956	7.428014673	FALSE	0.847303922	FALSE	FALSE
YDR120C	TRM1	114.3412902	106.5152224	224.8475664	48.63186059	0.508528031	2.190235395	FALSE	0.752926759	FALSE	FALSE
YDR121W	DPB4	84.21014397	67.9612668	23.65704654	7.989877875	3.559622028	8.505920599	FALSE	0.794780854	FALSE	FALSE
YDR122W	KIN1	35.66950424	36.76260359	100.8821916	135.2349042	0.353575826	0.271842568	FALSE	0.383044983	FALSE	FALSE
YDR123C	INO2	28.27082264	51.40487018	11.0442085	24.06818859	2.559787118	2.135801371	FALSE	0.383044983	FALSE	FALSE
YDR124W	YDR124W	15.61970608	13.27996171	6.786035115	2.036708518	2.301742596	6.520305478	FALSE	0.802407728	FALSE	FALSE
YDR127W	ARO1	73.61605042	42.21143478	15.41612853	8.482043302	4.775261848	4.976564406	FALSE	0.383044983	FALSE	FALSE
YDR128W	MTC5	33.46345808	36.41310259	31.53117624	26.36151003	1.061281629	1.381298057	FALSE	0.383044983	FALSE	FALSE
YDR129C	SAC6	184.5663068	202.1899144	144.9146356	228.9151185	1.273620887	0.883252778	FALSE	0.383044983	FALSE	FALSE
YDR130C	FIN1	130.5118736	129.7088796	18.78424186	31.64000568	6.947944699	4.099521374	FALSE	0.487600923	FALSE	FALSE
YDR134C	YDR134C	103.1839977	27.64598017	9.098403779	4.161713735	11.34089014	6.642931717	FALSE	0.516133218	FALSE	FALSE

YDR135C	YCF1	74.6134238	101.1250921	558.2900921	264.9072585	0.133646333	0.381737717	FALSE	0.383044983	FALSE	FALSE
YDR137W	RGP1	64.45368571	71.03550947	4.057145967	1.51717236	15.88645965	46.82098841	FALSE	0.85777105	FALSE	FALSE
YDR138W	HPR1	44.73952998	50.64971709	6.712426386	3.821071385	6.665179982	13.25537055	FALSE	0.537802768	FALSE	FALSE
YDR139C	RUB1	613.7647665	511.5495454	4.474475199	1.159767565	137.1702243	441.0793688	FALSE	0.888696655	FALSE	FALSE
YDR140W	MTQ2	135.4495612	136.2880792	9.409660236	6.891169193	14.39473454	19.77720694	FALSE	0.467661476	FALSE	FALSE
YDR142C	PEX7	91.79439532	104.2452487	1.649027621	10.78218175	55.66577185	9.668288952	TRUE	0.965743945	FALSE	TRUE
YDR143C	SAN1	23.77222905	24.07461578	52.10267095	22.06984152	0.456257397	1.090837728	FALSE	0.577652826	FALSE	FALSE
YDR144C	MKC7	24.411072	25.08179963	28.12285438	12.70921569	0.868015446	1.973512782	FALSE	0.699437716	FALSE	FALSE
YDR145W	TAF12	96.61631062	94.93215258	18.02193444	11.60295705	5.361039957	8.181720588	FALSE	0.479368512	FALSE	FALSE
YDR146C	SWI5	44.26758807	16.87192606	8.907211545	8.143826736	4.969859292	2.071744231	FALSE	0.749524221	FALSE	FALSE
YDR147W	EKI1	106.0090726	111.5423067	22.91023459	10.74583052	4.627149153	10.38005452	FALSE	0.803662053	FALSE	FALSE
YDR148C	KGD2	106.1597537	75.93222301	40.94675161	67.624457	2.592629441	1.1228515	FALSE	0.699437716	FALSE	FALSE
YDR149C	YDR149C	1	1.492904723	9.239728308	3.304615744	0.108228291	0.451763485	FALSE	0.383044983	FALSE	FALSE
YDR150W	NUM1	38.92957705	44.04068934	125.1757666	75.5336382	0.31099931	0.583060612	FALSE	0.383044983	FALSE	FALSE
YDR152W	GIR2	241.4291729	202.8189641	157.0500196	103.9979241	1.537275662	1.950221275	FALSE	0.383044983	FALSE	FALSE
YDR153C	ENT5	72.21855675	65.84724426	33.42756363	29.60271539	2.160449309	2.224365008	FALSE	0.383044983	FALSE	FALSE
YDR155C	CPR1	518.5630546	360.7013514	2398.413681	3335.815264	0.216210848	0.108129894	FALSE	0.383044983	FALSE	FALSE
YDR156W	RPA14	43.1218049	52.33821052	267.1073077	336.5807514	0.161440004	0.155499714	FALSE	0.383044983	FALSE	FALSE
YDR158W	HOM2	424.9250643	210.336407	90.62054909	43.20387724	4.689058591	4.868461362	FALSE	0.383044983	FALSE	FALSE
YDR159W	SAC3	35.87387019	43.90538769	3.228959423	4.064529549	11.11004057	10.80208353	FALSE	0.383044983	FALSE	FALSE
YDR160W	SSY1	66.06156928	77.49715675	13.95149196	18.09847844	4.735089944	4.281970829	FALSE	0.383044983	FALSE	FALSE
YDR161W	YDR161W	179.9140047	126.1062007	73.61308951	26.53364395	2.444049093	4.752690618	FALSE	0.487600923	FALSE	FALSE
YDR162C	NBP2	216.653929	223.1766578	28.66231602	39.32584693	7.558842377	5.675062973	FALSE	0.415383506	FALSE	FALSE
YDR163W	CWC15	213.2189245	192.9282471	110.3058403	91.96275642	1.932979467	2.097895437	FALSE	0.383044983	FALSE	FALSE
YDR165W	TRM82	110.4195071	88.37828221	9.924663589	1.136505858	11.12576825	77.76315587	TRUE	0.987629758	TRUE	FALSE
YDR167W	TAF10	407.5157236	332.3263611	43.19775886	34.65134731	9.433723747	9.590575459	FALSE	0.383044983	FALSE	FALSE
YDR168W	CDC37	223.3439755	229.5848953	9.668895706	12.48244417	23.09922273	18.39262345	FALSE	0.439129181	FALSE	FALSE
YDR169C	STB3	29.58156501	32.73062904	59.51476662	27.89640359	0.497045804	1.173292068	FALSE	0.577652826	FALSE	FALSE
YDR170C	SEC7	43.24895052	31.1571444	5651.859308	2809.259037	0.007652163	0.011090876	FALSE	0.383044983	FALSE	FALSE
YDR170W-A	YDR170W-A	11.62127553	17.67619504	17.01821435	12.40559147	0.682872791	1.424857097	FALSE	0.577652826	FALSE	FALSE
YDR171W	HSP42	105.2954711	356.659306	25.40211633	280.2074723	4.145145612	1.272840096	FALSE	0.774048443	FALSE	FALSE
YDR172W	SUP35	146.2652008	127.7565186	1501.279369	685.6367908	0.097427037	0.186332648	FALSE	0.383044983	FALSE	FALSE
YDR173C	ARG82	133.2484536	151.4207971	1.473713177	3.273657215	90.41681629	46.25432265	FALSE	0.562874856	FALSE	FALSE
YDR174W	HMO1	277.5044735	146.9211661	48.01946597	36.57359716	5.778999576	4.017137429	FALSE	0.428460208	FALSE	FALSE
YDR175C	RSM24	102.2415794	112.9918936	8.639952883	1	11.83358067	112.9918936	TRUE	0.995472895	TRUE	FALSE
YDR176W	NGG1	76.77125884	69.16204984	102.7481838	67.33343832	0.747178743	1.027157554	FALSE	0.383044983	FALSE	FALSE
YDR177W	UBC1	308.8978181	168.6187504	3.050424832	1	101.2638682	168.6187504	FALSE	0.549754902	FALSE	FALSE
YDR178W	SDH4	94.3534877	93.64696031	26.52905777	46.75176535	3.556609079	2.003067897	FALSE	0.45227797	FALSE	FALSE
YDR181C	SAS4	54.72587566	71.72601895	3.911789059	1	13.98998638	71.72601895	TRUE	0.965542099	TRUE	FALSE
YDR182W	CDC1	51.83631599	55.76697045	201.8421672	151.5098163	0.256816089	0.368074966	FALSE	0.383044983	FALSE	FALSE
YDR186C	YDR186C	66.39366734	76.04292146	126.2377125	130.7383988	0.525941623	0.58164183	FALSE	0.383044983	FALSE	FALSE
YDR187C	YDR187C	1	1	22.23161013	19.88908431	0.044980998	0.050278836	FALSE	0.383044983	FALSE	FALSE
YDR188W	CCT6	395.4180862	272.2954504	1991.998023	1969.148874	0.198503252	0.138280784	FALSE	0.383044983	FALSE	FALSE
YDR189W	SLY1	42.20535275	40.2770922	13.42484922	8.784572715	3.143823223	4.584980227	FALSE	0.428460208	FALSE	FALSE

YDR190C	RVB1	367.1619886	309.3288935	661.817259	325.8137136	0.554778503	0.949404155	FALSE	0.383044983	FALSE	FALSE
YDR192C	NUP42	12.1163308	19.41468904	4.75372484	3.477408421	2.548807769	5.583091396	FALSE	0.776081315	FALSE	FALSE
YDR194C	MSS116	241.6117971	381.465219	13.82616748	15.21265632	17.4749653	25.07551679	FALSE	0.480853518	FALSE	FALSE
YDR195W	REF2	24.92580733	30.51508438	4.596876997	2.678486617	5.422335066	11.39265889	FALSE	0.802321223	FALSE	FALSE
YDR196C	CAB5	673.0667172	600.5548547	11.01196374	9.093105385	61.12140696	66.04507803	FALSE	0.394074394	FALSE	FALSE
YDR200C	VPS64	64.03468022	69.59156861	38.22700066	36.34259734	1.675116518	1.914876033	FALSE	0.383044983	FALSE	FALSE
YDR202C	RAV2	58.9284665	83.95256406	1	5.477369921	58.9284665	15.3271671	FALSE	0.892301038	FALSE	FALSE
YDR204W	COQ4	104.4572293	98.17403666	71.26342978	195.4939108	1.465790092	0.502184627	FALSE	0.577652826	FALSE	FALSE
YDR205W	MSC2	15.91349366	16.5835975	7.611349669	13.58051134	2.090758453	1.221132039	FALSE	0.383044983	FALSE	FALSE
YDR206W	EBS1	96.11314832	118.1385271	74.24542496	41.68164892	1.294532941	2.834305508	FALSE	0.699437716	FALSE	FALSE
YDR207C	UME6	15.38014196	15.89042793	36.40019038	30.55800781	0.422529163	0.520008635	FALSE	0.383044983	FALSE	FALSE
YDR208W	MSS4	89.46454461	101.8582097	10.23472901	8.764026493	8.741271463	11.62230737	FALSE	0.430449827	FALSE	FALSE
YDR211W	GCD6	182.3549875	169.1829567	3.430804033	1.907041489	53.15225985	88.71487991	FALSE	0.549437716	FALSE	FALSE
YDR212W	TCP1	223.8926855	214.7770046	68.7335186	30.27692144	3.257401775	7.093753076	FALSE	0.776081315	FALSE	FALSE
YDR213W	UPC2	28.08915819	34.16285421	55.88458938	45.61881796	0.502627978	0.748876357	FALSE	0.383044983	FALSE	FALSE
YDR214W	AHA1	144.4193097	344.0443595	32.78400041	135.8543755	4.405176548	2.532449603	FALSE	0.45227797	FALSE	FALSE
YDR216W	ADR1	37.55258086	50.85967825	2.216128165	5.566012124	16.94513046	9.137543563	FALSE	0.542618224	FALSE	FALSE
YDR217C	RAD9	41.43965815	49.823131	97.84977015	11.96391804	0.423502867	4.164449376	FALSE	0.897419262	FALSE	FALSE
YDR221W	GTB1	64.26397005	76.30378324	97.07294279	88.19208188	0.662017326	0.865199932	FALSE	0.383044983	FALSE	FALSE
YDR222W	YDR222W	80.98285114	208.240471	11.16641345	3.549865094	7.25236008	58.66151685	TRUE	0.995011534	TRUE	FALSE
YDR223W	CRF1	17.95726444	25.40809001	4.819250985	10.95832122	3.726152569	2.318611538	FALSE	0.45227797	FALSE	FALSE
YDR224C	HTB1	779.8246402	557.5150901	120.9951027	7.289056325	6.445092591	76.48659376	TRUE	0.998082468	TRUE	FALSE
YDR225W	HTA1	706.5729727	570.8732964	12.12131566	1.523759706	58.29177231	374.647849	TRUE	0.986029412	TRUE	FALSE
YDR226W	ADK1	574.4406894	327.2440459	615.5269039	185.1273192	0.933250335	1.767670203	FALSE	0.383044983	FALSE	FALSE
YDR227W	SIR4	28.14952259	32.66594176	10.411321	6.216276889	2.703741687	5.254904559	FALSE	0.487600923	FALSE	FALSE
YDR228C	PCF11	62.83378785	58.51019812	49.48312117	30.17366074	1.269802437	1.939114999	FALSE	0.383044983	FALSE	FALSE
YDR229W	IVY1	70.35254819	68.09815841	28.14008328	22.51027377	2.500083155	3.025203474	FALSE	0.383044983	FALSE	FALSE
YDR231C	COX20	319.5302674	275.1474135	9.603011233	21.73462512	33.27396581	12.65940461	FALSE	0.852912341	FALSE	FALSE
YDR232W	HEM1	52.02893181	45.48464637	344.7839081	340.328209	0.150903017	0.133649357	FALSE	0.383044983	FALSE	FALSE
YDR233C	RTN1	37.74644477	41.06496709	438.0610783	44.31434721	0.086167082	0.926674309	FALSE	0.577652826	FALSE	FALSE
YDR234W	LYS4	40.49336059	42.96188283	469.9881802	210.2158399	0.086158253	0.204370341	FALSE	0.383044983	FALSE	FALSE
YDR237W	MRPL7	171.8468651	156.3219007	104.7512381	47.47097547	1.640523475	3.292999548	FALSE	0.699437716	FALSE	FALSE
YDR238C	SEC26	103.1659772	77.86249184	24.50976838	7.022569198	4.209177975	11.08746523	FALSE	0.823904268	FALSE	FALSE
YDR239C	YDR239C	19.44970748	21.01433908	5.541757442	2.223865517	3.509664161	9.449464868	FALSE	0.816262976	FALSE	FALSE
YDR240C	SNU56	60.79644326	53.1525561	3.357088628	4.411576266	18.10987138	12.04842734	FALSE	0.512658593	FALSE	FALSE
YDR242W	AMD2	52.28762854	69.74443712	3.694923041	1.130261321	14.15120909	61.70647075	TRUE	0.958837947	TRUE	FALSE
YDR244W	PEX5	86.93328304	105.1085294	30.00896469	14.16767168	2.896910438	7.418899288	FALSE	0.802407728	FALSE	FALSE
YDR246W	TRS23	18.65838096	28.02589322	15.84400398	12.927726	1.177630414	2.16789041	FALSE	0.383044983	FALSE	FALSE
YDR246W-A	YDR246W-A	1.450090545	2.629294886	4.78121669	7.705050776	0.303289024	0.341243032	FALSE	0.383044983	FALSE	FALSE
YDR251W	PAM1	38.72797478	50.77133621	14.42605907	2.912704056	2.684584514	17.43099719	TRUE	0.979829873	TRUE	FALSE
YDR256C	CTA1	4.424743341	13.14392666	22.50872693	17.40503093	0.196579014	0.755179736	FALSE	0.577652826	FALSE	FALSE
YDR258C	HSP78	269.4226267	899.8510799	1	4.228165791	269.4226267	212.8230359	FALSE	0.451730104	FALSE	FALSE
YDR260C	SWM1	140.1944995	89.36911814	25.09063522	22.17900431	5.587522927	4.029446809	FALSE	0.428460208	FALSE	FALSE
YDR261C	EXG2	38.35334954	67.03884683	56.07376178	29.02103598	0.68398032	2.310008743	FALSE	0.699437716	FALSE	FALSE

YDR262W	YDR262W	179.5429874	257.6299666	5.111203	2.617464423	35.12734427	98.42730404	FALSE	0.858290081	FALSE	FALSE
YDR263C	DIN7	26.20508755	30.85913731	31.56221996	2.806351144	0.830267566	10.99617821	TRUE	0.985625721	TRUE	FALSE
YDR264C	AKR1	142.1145601	164.9942688	59.2927748	41.83635615	2.396827616	3.943801134	FALSE	0.45227797	FALSE	FALSE
YDR265W	PEX10	183.8922887	316.2329971	28.8583437	20.3396043	6.372239884	15.54764746	FALSE	0.830867935	FALSE	FALSE
YDR266C	HEL2	50.02019364	61.31289719	61.1575542	142.0392515	0.817890681	0.431661647	FALSE	0.383044983	FALSE	FALSE
YDR267C	CIA1	113.4465853	76.77183611	17.71957358	11.88181746	6.402331564	6.461287285	FALSE	0.383044983	FALSE	FALSE
YDR268W	MSW1	121.4450832	145.3342748	9.637685452	8.845264916	12.60106317	16.43074303	FALSE	0.439359862	FALSE	FALSE
YDR270W	CCC2	43.59938907	49.12399279	3.360945901	1.271721308	12.9723567	38.62795447	FALSE	0.857223183	FALSE	FALSE
YDR272W	GLO2	764.9715385	862.3967713	1	6.663318319	764.9715385	129.4245194	TRUE	0.965902537	FALSE	TRUE
YDR273W	DON1	9.025426947	9.145061175	7.136215352	11.32821049	1.264735788	0.807282067	FALSE	0.383044983	FALSE	FALSE
YDR274C	YDR274C	1	1	7.82225178	3.75682694	0.127840426	0.266182078	FALSE	0.383044983	FALSE	FALSE
YDR276C	PMP3	536.9607606	738.4679874	4.642140894	8.95015161	115.6709313	82.50899197	FALSE	0.488480392	FALSE	FALSE
YDR280W	RRP45	273.6086286	267.5543839	16.80178077	21.75133872	16.28450176	12.30059388	FALSE	0.439359862	FALSE	FALSE
YDR281C	PHM6	44.18287788	32.29650552	8.444163463	9.162839454	5.232357009	3.52472677	FALSE	0.428460208	FALSE	FALSE
YDR284C	DPP1	86.3516419	76.53968079	112.9928028	43.45110035	0.764222497	1.761513061	FALSE	0.699437716	FALSE	FALSE
YDR287W	INM2	83.47795138	91.9894262	527.0595895	465.8725852	0.158384276	0.197456191	FALSE	0.383044983	FALSE	FALSE
YDR288W	NSE3	458.7747813	457.2118933	22.74701468	1	20.16857103	457.2118933	TRUE	0.999985582	TRUE	FALSE
YDR289C	RTT103	188.8619147	184.1115647	5.111774031	1.702329396	36.94645217	108.152726	FALSE	0.858405421	FALSE	FALSE
YDR291W	HRQ1	42.51704489	46.28766329	35.76830979	7.873127328	1.188679173	5.879196583	FALSE	0.896064014	FALSE	FALSE
YDR292C	SRP101	70.17260916	81.07168697	10.49382411	5.727804273	6.687038817	14.15406028	FALSE	0.815470012	FALSE	FALSE
YDR293C	SSD1	37.86057749	51.71524592	121.2294025	105.282871	0.312305239	0.491202847	FALSE	0.383044983	FALSE	FALSE
YDR294C	DPL1	68.95610655	97.26274274	21.34263793	26.88448485	3.230908325	3.617801988	FALSE	0.383044983	FALSE	FALSE
YDR295C	HDA2	27.70747083	46.9767353	34.0407149	52.48059471	0.813950909	0.895125819	FALSE	0.383044983	FALSE	FALSE
YDR296W	MHR1	144.557099	121.2574046	146.8902017	214.6623534	0.984116689	0.564875036	FALSE	0.383044983	FALSE	FALSE
YDR297W	SUR2	48.99441642	44.92150313	36.04781118	15.58566065	1.359150939	2.882232851	FALSE	0.699437716	FALSE	FALSE
YDR298C	ATP5	554.3141308	358.5284287	11.00418265	8.477778352	50.37303983	42.29037536	FALSE	0.422736448	FALSE	FALSE
YDR299W	BFR2	105.3280721	87.58746441	17.39053565	10.96580599	6.056631852	7.987325738	FALSE	0.415383506	FALSE	FALSE
YDR300C	PRO1	154.226763	197.4131599	79.20671025	44.21772934	1.947142641	4.464570272	FALSE	0.749524221	FALSE	FALSE
YDR301W	CFT1	36.11157923	42.3218701	11.73742064	6.345189688	3.076619672	6.669914089	FALSE	0.776081315	FALSE	FALSE
YDR303C	RSC3	110.4793872	150.812022	5.218961476	6.227082291	21.16884512	24.21872956	FALSE	0.408044983	FALSE	FALSE
YDR304C	CPR5	359.4989409	247.2904194	122.218271	114.7841457	2.941450062	2.154395259	FALSE	0.383044983	FALSE	FALSE
YDR305C	HNT2	167.9061838	114.9502396	12.02846305	3.982417368	13.95907217	28.86443811	FALSE	0.831069781	FALSE	FALSE
YDR307W	PMT7	38.54003846	51.08188553	6.543614683	11.55267588	5.889716973	4.421649673	FALSE	0.415383506	FALSE	FALSE
YDR309C	GIC2	61.6713313	38.19153529	16.77258311	4.050524345	3.676913143	9.428787988	FALSE	0.814504037	FALSE	FALSE
YDR310C	SUM1	22.43820728	19.80380951	81.04840458	51.71928369	0.276849463	0.382909586	FALSE	0.383044983	FALSE	FALSE
YDR311W	TFB1	71.50716717	80.06775403	6.419239343	5.204744158	11.13950787	15.38360995	FALSE	0.463581315	FALSE	FALSE
YDR312W	SSF2	112.9385774	89.24544977	11.03999754	1	10.22994588	89.24544977	TRUE	0.995112457	TRUE	FALSE
YDR313C	PIB1	102.3185405	137.18598	23.1080016	23.18504113	4.427840288	5.917003955	FALSE	0.428460208	FALSE	FALSE
YDR320C	SWA2	17.97169392	21.32912309	7.518111103	1	2.390453357	21.32912309	TRUE	0.991753172	TRUE	FALSE
YDR321W	ASP1	131.046239	119.3249044	66.99340736	12.81037928	1.956106491	9.314705037	TRUE	0.932266436	TRUE	FALSE
YDR322C-A	TIM11	1558.753903	1200.903333	37.1226879	26.89040434	41.98925215	44.65917722	FALSE	0.390210496	FALSE	FALSE
YDR324C	UTP4	121.1637432	113.3608477	15.40783349	8.116890508	7.863775482	13.96604372	FALSE	0.534775087	FALSE	FALSE
YDR326C	YSP2	53.40545423	45.72396795	17.89630667	13.67906234	2.984160655	3.34262443	FALSE	0.383044983	FALSE	FALSE
YDR328C	SKP1	726.303877	619.9573961	83.07863609	96.52874761	8.742366403	6.422515691	FALSE	0.446323529	FALSE	FALSE

YDR329C	PEX3	87.20965928	90.17380963	41.68370145	39.06547531	2.092176468	2.30827371	FALSE	0.383044983	FALSE	FALSE
YDR330W	UBX5	52.94132967	48.96340113	10.16239746	12.10179041	5.209531499	4.045963403	FALSE	0.415383506	FALSE	FALSE
YDR331W	GPI8	127.3994295	174.1317547	13.53992219	1	9.40916999	174.1317547	TRUE	0.999913495	TRUE	FALSE
YDR333C	RQC1	59.91738082	63.68867644	7.527536483	3.184359664	7.959759604	20.00046576	FALSE	0.846482122	FALSE	FALSE
YDR334W	SWR1	64.75467868	86.71509987	105.6354117	110.7349089	0.613001622	0.783087291	FALSE	0.383044983	FALSE	FALSE
YDR335W	MSN5	66.18509186	88.58470085	80.46373651	40.70541252	0.822545593	2.176238867	FALSE	0.699437716	FALSE	FALSE
YDR337W	MRPS28	309.3252816	312.7349299	12.91490434	6.202149214	23.95103157	50.4236385	FALSE	0.835726644	FALSE	FALSE
YDR339C	FCF1	270.886454	218.1173088	155.8795687	4.471903486	1.737793196	48.77504836	TRUE	0.99982699	TRUE	FALSE
YDR341C	YDR341C	131.7519356	105.610732	16.78051499	14.60636552	7.851483445	7.230459343	FALSE	0.383044983	FALSE	FALSE
YDR342C	HXT7	180.529924	109.4461264	17.38183218	96.54571331	10.38612743	1.13361974	TRUE	0.978344867	FALSE	TRUE
YDR344C	YDR344C	3.446414523	3.273294478	6.493102685	9.433349625	0.530780844	0.346991748	FALSE	0.383044983	FALSE	FALSE
YDR345C	HXT3	97.36987831	108.3183856	30.71879162	12.94993901	3.169717074	8.364393493	FALSE	0.814504037	FALSE	FALSE
YDR346C	SVF1	136.8146891	115.5839668	23.26513128	1.209558668	5.88067557	95.55879341	TRUE	0.999754902	TRUE	FALSE
YDR347W	MRP1	234.5172445	219.2460404	30.42895982	38.15032271	7.707041117	5.746898712	FALSE	0.428460208	FALSE	FALSE
YDR348C	PAL1	30.02122456	23.78197225	657.7315873	463.9618551	0.04564358	0.051258464	FALSE	0.383044983	FALSE	FALSE
YDR349C	YPS7	51.79215775	76.20440886	30.2511488	8.079052707	1.712072427	9.432344562	TRUE	0.937874856	TRUE	FALSE
YDR351W	SBE2	72.47393288	70.7705875	37.21464585	8.253798838	1.947457277	8.574304861	TRUE	0.923745675	TRUE	FALSE
YDR352W	YPQ2	87.76125822	121.1811421	22.67396839	27.87318678	3.87057337	4.347588348	FALSE	0.383044983	FALSE	FALSE
YDR353W	TRR1	398.2639697	326.7268641	3112.806609	3105.835664	0.127943692	0.105197731	FALSE	0.383044983	FALSE	FALSE
YDR354W	TRP4	110.9899684	82.1861683	16.33092075	1	6.796308064	82.1861683	TRUE	0.999077278	TRUE	FALSE
YDR356W	SPC110	96.69341861	96.14385409	5.195318291	1	18.61164479	96.14385409	TRUE	0.965599769	TRUE	FALSE
YDR358W	GGA1	79.26576935	75.0585942	9.083595234	10.17275869	8.726255112	7.378391301	FALSE	0.402436563	FALSE	FALSE
YDR359C	EAF1	16.0114779	17.69691993	274.1475805	168.8680325	0.058404593	0.104797336	FALSE	0.383044983	FALSE	FALSE
YDR362C	TFC6	45.8712335	58.76454536	24.34961894	25.61219683	1.883858372	2.294396914	FALSE	0.383044983	FALSE	FALSE
YDR364C	CDC40	77.34134245	108.0735337	64.54402449	60.37691349	1.198272699	1.789981095	FALSE	0.383044983	FALSE	FALSE
YDR365C	ESF1	177.7075589	170.1412959	399.3522316	166.3630438	0.444989523	1.022710886	FALSE	0.577652826	FALSE	FALSE
YDR369C	XRS2	54.88465514	78.03701094	5.223315916	8.251630067	10.50762696	9.457163046	FALSE	0.395040369	FALSE	FALSE
YDR372C	VPS74	314.072429	275.6998067	3.044469452	1.478874122	103.1616293	186.4254723	FALSE	0.559256055	FALSE	FALSE
YDR375C	BCS1	108.2110238	114.2937802	9.237198229	3.458964289	11.71470192	33.04277543	FALSE	0.856329296	FALSE	FALSE
YDR376W	ARH1	57.8707947	77.47238672	35.3791187	36.20672488	1.635733077	2.139723683	FALSE	0.383044983	FALSE	FALSE
YDR379W	RGA2	46.02888895	49.01161864	14.53380276	3.852787164	3.167023091	12.72108127	TRUE	0.942214533	TRUE	FALSE
YDR380W	ARO10	172.429104	151.372558	21.39777033	93.88628981	8.058274357	1.61229673	TRUE	0.929354095	FALSE	TRUE
YDR381W	YRA1	736.0535042	547.5014332	2670.420066	1492.987204	0.275632105	0.366715423	FALSE	0.383044983	FALSE	FALSE
YDR382W	RPP2B	1023.202178	548.7231834	496.7231821	288.9091588	2.059904218	1.89929314	FALSE	0.383044983	FALSE	FALSE
YDR384C	ATO3	60.45853054	47.55117907	18.71784622	25.31295075	3.229993976	1.878531648	FALSE	0.45227797	FALSE	FALSE
YDR385W	EFT2	108.19129	80.45392834	21.03325352	6.234548875	5.143820945	12.90453086	FALSE	0.830810265	FALSE	FALSE
YDR388W	RVS167	87.09850272	85.8018399	382.1278049	665.3465274	0.227930293	0.128958124	FALSE	0.383044983	FALSE	FALSE
YDR389W	SAC7	47.91054885	46.52848401	61.20313773	46.82905951	0.78281197	0.993581432	FALSE	0.383044983	FALSE	FALSE
YDR390C	UBA2	71.34183693	64.36716135	29.65136478	6.792999084	2.406022032	9.475514504	FALSE	0.865527682	FALSE	FALSE
YDR391C	YDR391C	90.79713944	99.8003604	4.217608516	5.636483552	21.52810985	17.70613885	FALSE	0.422649942	FALSE	FALSE
YDR392W	SPT3	97.73095451	106.713978	40.22173798	56.53977204	2.429804365	1.887414366	FALSE	0.383044983	FALSE	FALSE
YDR394W	RPT3	160.2282449	172.3643762	54.76283571	46.27729185	2.925857342	3.72459946	FALSE	0.383044983	FALSE	FALSE
YDR395W	SXM1	87.44045989	94.18649012	19.65685476	12.57783706	4.448344404	7.488289891	FALSE	0.504801038	FALSE	FALSE
YDR398W	UTP5	57.8561359	54.09345539	159.3677746	108.2648911	0.36303535	0.499639863	FALSE	0.383044983	FALSE	FALSE

YDR399W	HPT1	410.3968532	481.8686235	17.12392376	4.821780677	23.96628594	99.93582366	TRUE	0.9588812	TRUE	FALSE
YDR400W	URH1	53.49281963	56.56839276	40.05964483	23.5625404	1.335329353	2.400776478	FALSE	0.45227797	FALSE	FALSE
YDR404C	RPB7	90.80138196	117.5271884	5.0334275	1	18.03967217	117.5271884	TRUE	0.986029412	TRUE	FALSE
YDR405W	MRP20	29.44123229	35.19918732	84.45564873	79.74459045	0.348599919	0.441399061	FALSE	0.383044983	FALSE	FALSE
YDR406W	PDR15	16.57368194	32.35407505	83.61661776	199.7519947	0.198210384	0.161971224	FALSE	0.383044983	FALSE	FALSE
YDR407C	TRS120	35.8686641	39.39763992	13.01160218	2.064750613	2.756667751	19.08106464	TRUE	0.981459054	TRUE	FALSE
YDR408C	ADE8	142.6838512	183.1273315	84.49470224	41.37566729	1.688672158	4.425966843	FALSE	0.749524221	FALSE	FALSE
YDR409W	SIZ1	59.28667155	79.07858584	50.63807078	57.96714321	1.170792462	1.364196706	FALSE	0.383044983	FALSE	FALSE
YDR410C	STE14	172.9580393	181.1173349	6.591804222	14.38629538	26.2383459	12.58957432	FALSE	0.830291234	FALSE	FALSE
YDR411C	DFM1	54.96987976	68.37896503	56.11790684	36.04963628	0.979542589	1.896800414	FALSE	0.383044983	FALSE	FALSE
YDR415C	YDR415C	115.2918656	126.6023016	2.644758829	4.557951094	43.59258182	27.77614306	FALSE	0.529008074	FALSE	FALSE
YDR416W	SYF1	80.37969924	85.93055432	20.09761985	1	3.999463609	85.93055432	TRUE	0.999899077	TRUE	FALSE
YDR417C	YDR417C	1.567033331	1.775834248	13.2918402	5.364871482	0.117894385	0.331011517	FALSE	0.383044983	FALSE	FALSE
YDR418W	RPL12B	513.7273338	272.4686021	4.225307053	2.419430164	121.5834322	112.6168493	FALSE	0.395242215	FALSE	FALSE
YDR419W	RAD30	34.03532031	49.2587805	32.37191231	14.53838688	1.051384298	3.388187486	FALSE	0.774048443	FALSE	FALSE
YDR420W	HKR1	11.70668633	11.94447981	33.74723113	26.61493224	0.34689324	0.448788661	FALSE	0.383044983	FALSE	FALSE
YDR421W	ARO80	51.2597859	68.35337273	20.52651605	16.61643506	2.497247257	4.113600328	FALSE	0.45227797	FALSE	FALSE
YDR422C	SIP1	23.09837857	29.0906024	12.13040359	7.413872808	1.904172305	3.923806511	FALSE	0.749524221	FALSE	FALSE
YDR423C	CAD1	88.50680696	112.5722986	48.87489037	45.71949168	1.810885023	2.462238631	FALSE	0.383044983	FALSE	FALSE
YDR424C	DYN2	391.7583328	301.6550442	23.62669472	14.89309042	16.58117386	20.2546977	FALSE	0.423846597	FALSE	FALSE
YDR425W	SNX41	25.87983083	20.96505659	27.75946546	23.5602431	0.932288515	0.889848908	FALSE	0.383044983	FALSE	FALSE
YDR429C	TIF35	592.8286533	495.6579401	98.61270647	95.16375152	6.011686268	5.208474153	FALSE	0.383044983	FALSE	FALSE
YDR430C	CYM1	72.86704991	70.82098731	19.52395436	36.629923	3.732187065	1.933418951	FALSE	0.45227797	FALSE	FALSE
YDR431W	YDR431W	1.868385895	2.540809001	1	6.286848836	1.868385895	0.404146667	FALSE	0.699437716	FALSE	FALSE
YDR432W	NPL3	60.10800021	82.35078296	413.2277491	573.5847609	0.145459738	0.143572125	FALSE	0.383044983	FALSE	FALSE
YDR435C	PPM1	53.52442876	65.99410288	1	4.300725863	53.52442876	15.34487549	FALSE	0.889071511	FALSE	FALSE
YDR436W	PPZ2	29.17414938	26.44919036	18.45676532	21.65046503	1.5806751	1.22164537	FALSE	0.383044983	FALSE	FALSE
YDR440W	DOT1	41.91209389	37.99737005	4.670906739	5.460613727	8.973010216	6.958443126	FALSE	0.430449827	FALSE	FALSE
YDR441C	APT2	26.15740253	36.78123506	79.94264426	51.17421211	0.327202118	0.718745508	FALSE	0.383044983	FALSE	FALSE
YDR442W	YDR442W	1	2.01713081	1	4.357907455	1	0.46286683	FALSE	0.577652826	FALSE	FALSE
YDR443C	SSN2	16.42628078	20.23826189	7.379793603	2.721383489	2.225845554	7.43675486	FALSE	0.844910611	FALSE	FALSE
YDR444W	YDR444W	56.38017379	53.51455856	5.136060167	2.376623579	10.97731957	22.51705278	FALSE	0.827422145	FALSE	FALSE
YDR447C	RPS17B	908.2673885	625.5706676	15.2361796	5.878074448	59.61254149	106.4244206	FALSE	0.557295271	FALSE	FALSE
YDR448W	ADA2	69.57267754	74.71730744	33.81521701	15.31282733	2.057436967	4.879393324	FALSE	0.749524221	FALSE	FALSE
YDR449C	UTP6	137.7479152	116.9425107	8.355422055	1.428524725	16.48605113	81.86243379	TRUE	0.959486736	TRUE	FALSE
YDR450W	RPS18A	1726.172495	1215.16351	132.5572309	16.36715785	13.02209229	74.24401484	TRUE	0.965787197	TRUE	FALSE
YDR451C	YHP1	21.95617323	15.17786469	75.01345246	40.29391411	0.292696477	0.376678837	FALSE	0.383044983	FALSE	FALSE
YDR452W	PPN1	170.0950839	178.1201213	1.111089583	3.088086141	153.0885416	57.67977745	FALSE	0.855464245	FALSE	FALSE
YDR453C	TSA2	65.71596887	61.70167644	2.629831034	3.321663832	24.98866582	18.57553309	FALSE	0.467805652	FALSE	FALSE
YDR454C	GUK1	302.4499359	188.8127426	56.46615246	34.55612684	5.35630502	5.46394402	FALSE	0.383044983	FALSE	FALSE
YDR457W	TOM1	33.43547717	38.93471771	59.4326676	33.61722235	0.562577426	1.158177714	FALSE	0.577652826	FALSE	FALSE
YDR458C	HEH2	112.5927609	112.6884506	3.355392453	1.46668252	33.55576506	76.83220402	FALSE	0.841162053	FALSE	FALSE
YDR461C-A	YDR461C-A	313.3583011	263.7004238	21.70946181	77.79179881	14.43418099	3.389822936	TRUE	0.947923875	FALSE	TRUE
YDR462W	MRPL28	131.6202118	106.5308567	159.9116368	225.022712	0.823080887	0.473422686	FALSE	0.383044983	FALSE	FALSE

YDR463W	STP1	46.75635703	65.89164675	94.94031503	78.13338526	0.492481587	0.843322563	FALSE	0.383044983	FALSE	FALSE
YDR464W	SPP41	20.00968432	23.0630908	61.30961281	40.82629953	0.326371076	0.564907696	FALSE	0.383044983	FALSE	FALSE
YDR465C	RMT2	99.39089132	78.27086193	25.52845089	10.35462034	3.893338133	7.559027697	FALSE	0.508693772	FALSE	FALSE
YDR466W	PKH3	23.53251779	33.94905196	154.8006279	58.65192543	0.152018232	0.578822463	FALSE	0.383044983	FALSE	FALSE
YDR468C	TLG1	189.1304762	171.2693474	15.28180288	31.67009329	12.37618871	5.407920522	FALSE	0.812110727	FALSE	FALSE
YDR470C	UGO1	37.23028196	45.44158602	17.35607423	28.08216125	2.145086583	1.618165554	FALSE	0.383044983	FALSE	FALSE
YDR471W	RPL27B	448.0171171	235.6337612	55.15445697	22.3191089	8.122954005	10.55748965	FALSE	0.430449827	FALSE	FALSE
YDR472W	TRS31	50.45957682	62.64943132	3.891713479	1	12.96590232	62.64943132	TRUE	0.959443483	TRUE	FALSE
YDR475C	JIP4	44.34061076	59.50765892	43.10368552	74.43098116	1.028696508	0.799501202	FALSE	0.383044983	FALSE	FALSE
YDR476C	YDR476C	21.59023701	28.96898677	82.52729265	114.3745838	0.261613296	0.25328168	FALSE	0.383044983	FALSE	FALSE
YDR477W	SNF1	62.90625444	55.43291813	8.623245714	7.597746996	7.294962539	7.295967892	FALSE	0.383044983	FALSE	FALSE
YDR478W	SNM1	236.2991769	210.9084269	4.298426539	1	54.97341289	210.9084269	FALSE	0.892488466	FALSE	FALSE
YDR479C	PEX29	58.90633584	67.76711477	18.02731108	12.96809878	3.267616317	5.225678484	FALSE	0.45227797	FALSE	FALSE
YDR480W	DIG2	26.38806746	30.44788399	1.188007878	6.520542549	22.2120307	4.669532292	TRUE	0.955651672	FALSE	TRUE
YDR481C	PHO8	104.9097033	123.6556921	160.1686408	161.0177005	0.654995277	0.767963347	FALSE	0.383044983	FALSE	FALSE
YDR482C	CWC21	103.5855121	65.41337682	53.49421619	44.03713039	1.936387137	1.485414155	FALSE	0.383044983	FALSE	FALSE
YDR483W	KRE2	85.53242879	87.98196404	341.9782899	295.7696746	0.225110698	0.297467833	FALSE	0.383044983	FALSE	FALSE
YDR484W	VPS52	54.36653724	59.54410958	4.875689741	1.501515039	1.15053257	39.65601944	FALSE	0.891017878	FALSE	FALSE
YDR485C	VPS72	44.30609567	48.63287177	4.084372857	2.590174145	10.84771083	18.77590813	FALSE	0.534602076	FALSE	FALSE
YDR486C	VPS60	173.2968535	175.2053511	40.9413493	46.50233408	4.232807576	3.767667894	FALSE	0.383044983	FALSE	FALSE
YDR487C	RIB3	228.3632425	168.1553593	103.7100847	68.24959441	2.201938638	2.46382943	FALSE	0.383044983	FALSE	FALSE
YDR488C	PAC11	15.37394686	13.03076576	28.29668274	29.99967268	0.543312691	0.434363598	FALSE	0.383044983	FALSE	FALSE
YDR489W	SLD5	35.23965804	35.53113242	1	5.828575454	35.23965804	6.096023411	TRUE	0.965123991	FALSE	TRUE
YDR490C	PKH1	39.48944426	53.85940887	59.26412783	120.474277	0.666329628	0.447061482	FALSE	0.383044983	FALSE	FALSE
YDR493W	MZM1	211.3536206	172.9662557	4.682155324	1.382057486	45.14024118	125.1512745	FALSE	0.858016148	FALSE	FALSE
YDR494W	RSM28	162.1057022	162.29359	3.730421388	1.189165463	43.45506454	136.4768782	FALSE	0.888566897	FALSE	FALSE
YDR496C	PUF6	166.2152493	141.8418549	3.656178057	2.160957106	45.46147555	65.6384407	FALSE	0.491320646	FALSE	FALSE
YDR497C	ITR1	271.2481123	269.0622628	64.16707716	48.15523474	4.227216265	5.587393857	FALSE	0.415383506	FALSE	FALSE
YDR498C	SEC20	63.44240543	61.81753009	21.39312216	19.25228161	2.965551497	3.21091969	FALSE	0.383044983	FALSE	FALSE
YDR499W	LCD1	64.16456801	53.87330314	5.065168074	1	12.6678063	53.87330314	TRUE	0.958722607	TRUE	FALSE
YDR500C	RPL37B	678.1820937	561.6424989	17.28958461	2.568237083	39.22489226	218.6879485	TRUE	0.965859285	TRUE	FALSE
YDR502C	SAM2	93.43385361	112.3323557	50.67490754	91.90930417	1.843789326	1.222208749	FALSE	0.383044983	FALSE	FALSE
YDR505C	PSP1	71.82856464	120.3534753	8.429900029	4.620524823	8.520689971	26.04757682	FALSE	0.884674164	FALSE	FALSE
YDR506C	GMC1	31.18885223	41.00340042	33.63205964	38.28452494	0.927354809	1.071017611	FALSE	0.383044983	FALSE	FALSE
YDR507C	GIN4	68.10699766	44.81130508	131.2282937	52.56224558	0.518996291	0.852537874	FALSE	0.383044983	FALSE	FALSE
YDR508C	GNP1	164.7921987	209.2596007	138.917749	206.0059784	1.186257335	1.015793825	FALSE	0.383044983	FALSE	FALSE
YDR510W	SMT3	149.0678864	134.2809253	18.95273376	6.242088747	7.865244576	21.51217818	FALSE	0.850389273	FALSE	FALSE
YDR511W	SDH7	131.4144557	115.0316513	12.95540292	10.69548057	10.14360237	10.75516435	FALSE	0.383044983	FALSE	FALSE
YDR512C	EMI1	156.1990485	133.5276219	22.09419461	16.05367307	7.069687366	8.317574509	FALSE	0.402436563	FALSE	FALSE
YDR514C	YDR514C	98.86231978	81.2568917	16.1862393	9.460663714	6.107800454	8.588920836	FALSE	0.44994233	FALSE	FALSE
YDR516C	EMI2	99.14379046	102.7616085	99.83375742	173.061776	0.993088841	0.593785704	FALSE	0.383044983	FALSE	FALSE
YDR517W	GRH1	37.63820809	37.31061081	73.51592748	52.84874152	0.511973519	0.705988633	FALSE	0.383044983	FALSE	FALSE
YDR519W	FPR2	447.382255	289.5027667	120.4324453	126.698533	3.714798398	2.284973314	FALSE	0.45227797	FALSE	FALSE
YDR524C-B	YDR524C-B	1308.344195	1088.528083	1731.903803	1131.770563	0.755436989	0.961792185	FALSE	0.383044983	FALSE	FALSE

YDR525W-A	SNA2	218.9047624	202.587171	14.25312412	10.69063003	15.3583706	18.94997492	FALSE	0.424423299	FALSE	FALSE
YDR527W	RBA50	67.45722348	67.7626061	16.66981285	5.680036828	4.046669516	11.92995894	FALSE	0.83311707	FALSE	FALSE
YDR530C	APA2	46.34284769	46.60747799	10.7263889	8.745537507	4.320451935	5.329286845	FALSE	0.407151096	FALSE	FALSE
YDR531W	CAB1	157.6145971	163.2377725	47.98005922	28.49699371	3.285002137	5.728245375	FALSE	0.487600923	FALSE	FALSE
YDR533C	HSP31	1482.752616	2538.631164	6.690790378	37.65300922	221.6109806	67.42173379	FALSE	0.88884083	FALSE	FALSE
YDR534C	FIT1	1.515193854	1.831559859	4.602934034	6.647186365	0.329180006	0.275539117	FALSE	0.383044983	FALSE	FALSE
YDR539W	FDC1	62.36108636	62.91527049	8.728047405	6.703308762	7.144906927	9.385703796	FALSE	0.430449827	FALSE	FALSE
YEL001C	IRC22	167.6586989	123.3529042	21.89296696	6.307357239	7.658107704	19.55698711	FALSE	0.844694348	FALSE	FALSE
YEL002C	WBP1	120.994243	110.4593624	4.412748731	1.054910566	27.41924599	104.7096938	FALSE	0.892416378	FALSE	FALSE
YEL006W	YEA6	101.4933909	125.6994675	26.00152097	9.195062963	3.903363617	13.67032156	FALSE	0.875374856	FALSE	FALSE
YEL007W	MIT1	82.84484685	72.89493408	95.77272286	75.84360876	0.865015052	0.961121646	FALSE	0.383044983	FALSE	FALSE
YEL009C	GCN4	547.8809746	374.97055	27.03765133	7.453088441	20.26363044	50.31076084	FALSE	0.845299885	FALSE	FALSE
YEL011W	GLC3	148.9037304	121.7522036	1.756632243	3.65824989	84.76659298	33.2815437	FALSE	0.854887543	FALSE	FALSE
YEL012W	UBC8	144.9577386	142.378119	12.45132853	4.628475097	11.64194955	30.76134493	FALSE	0.852566321	FALSE	FALSE
YEL013W	VAC8	106.8884532	97.893553	4.300161979	2.577261255	24.85684346	37.98355825	FALSE	0.524769319	FALSE	FALSE
YEL015W	EDC3	79.51132801	82.57629252	80.91142153	8.120035278	0.982695972	10.16944997	TRUE	0.980882353	TRUE	FALSE
YEL016C	NPP2	42.08785069	50.19212166	15.21909956	13.00316025	2.765462604	3.859994085	FALSE	0.428460208	FALSE	FALSE
YEL017W	GTT3	34.92444404	43.25890196	39.69904123	32.53244121	0.879730164	1.329715827	FALSE	0.383044983	FALSE	FALSE
YEL018W	EA5	117.6282377	92.80002397	2.591057807	3.720867506	45.39776665	24.94042689	FALSE	0.557266436	FALSE	FALSE
YEL020C	YEL020C	41.26102113	55.58076302	55.16368046	33.3076599	0.747974406	1.668708135	FALSE	0.577652826	FALSE	FALSE
YEL022W	GEA2	46.2655858	62.74289989	4.396938784	3.186017618	10.5222265	19.69320557	FALSE	0.549019608	FALSE	FALSE
YEL023C	YEL023C	26.13825363	26.5017911	6.999953983	7.685158634	3.73406078	3.448437744	FALSE	0.383044983	FALSE	FALSE
YEL026W	SNU13	177.6732004	167.4933303	6.927199495	3.307665244	25.64863341	50.6379328	FALSE	0.561735871	FALSE	FALSE
YEL027W	VMA3	384.8526798	282.8451726	89.35766163	15.00764649	4.306879486	18.84673741	TRUE	0.952768166	TRUE	FALSE
YEL031W	SPF1	51.73400747	70.55202536	57.68810216	13.63991677	0.896788168	5.17246744	TRUE	0.901672434	TRUE	FALSE
YEL032W	MCM3	40.00690909	33.34768247	341.5742459	298.1776982	0.117125075	0.111838285	FALSE	0.383044983	FALSE	FALSE
YEL036C	ANP1	45.18435829	40.96399448	348.1919158	355.7567436	0.129768545	0.11514608	FALSE	0.383044983	FALSE	FALSE
YEL037C	RAD23	109.5745111	98.67763477	396.4918529	578.6594207	0.276360057	0.170528002	FALSE	0.383044983	FALSE	FALSE
YEL038W	UTR4	165.2292316	134.63316	11.66380252	16.60907914	14.16598329	8.105997858	FALSE	0.534775087	FALSE	FALSE
YEL040W	UTR2	199.8653912	113.3012606	286.3400443	153.2621089	0.698000141	0.739264658	FALSE	0.383044983	FALSE	FALSE
YEL041W	YEF1	42.16299057	76.7160395	1.739503892	15.89979637	24.23851465	4.824969937	TRUE	0.962687428	FALSE	TRUE
YEL042W	GDA1	92.24210364	57.36321001	43.20714201	8.481134979	2.134880933	6.763624227	FALSE	0.831055363	FALSE	FALSE
YEL043W	YEL043W	22.5631513	34.46862729	64.04945598	60.69951197	0.352277017	0.567856745	FALSE	0.383044983	FALSE	FALSE
YEL044W	IES6	268.7790583	367.8848002	23.2079168	14.21227699	11.5813522	25.88500072	FALSE	0.833664937	FALSE	FALSE
YEL045C	YEL045C	12.82870597	8.994225288	8.740512288	6.740168649	1.467729299	1.334421401	FALSE	0.383044983	FALSE	FALSE
YEL046C	GLY1	76.9360862	105.3344322	791.9025338	614.998909	0.097153479	0.171275803	FALSE	0.383044983	FALSE	FALSE
YEL047C	FRD1	133.8732212	133.5246378	414.1675457	584.7024658	0.323234456	0.228363391	FALSE	0.383044983	FALSE	FALSE
YEL049W	PAU2	3.01103512	5.823562227	4.416950614	5.309563528	0.681699974	1.096806206	FALSE	0.383044983	FALSE	FALSE
YEL050C	RML2	198.0109681	187.0052621	72.7927916	50.15271323	2.720200225	3.728716754	FALSE	0.428460208	FALSE	FALSE
YEL052W	AFG1	46.53013579	56.99383327	70.16692679	51.03733027	0.663134869	1.11670875	FALSE	0.383044983	FALSE	FALSE
YEL054C	RPL12A	463.2471486	275.6522664	6.513633538	4.104473963	71.11962101	67.15897553	FALSE	0.389633795	FALSE	FALSE
YEL055C	POL5	45.82385348	46.53761992	8.338629815	1	5.495369682	46.53761992	TRUE	0.994953864	TRUE	FALSE
YEL056W	HAT2	107.0650186	125.6583848	30.49327727	16.76604677	3.511102387	7.494812968	FALSE	0.776081315	FALSE	FALSE
YEL058W	PCM1	146.6046739	166.4548635	171.8653953	213.1737663	0.853020316	0.780841219	FALSE	0.383044983	FALSE	FALSE

YEL059C-A	SOM1	54.40739727	25.24999522	14.79948954	28.32667174	3.676302289	0.89138588	FALSE	0.827537486	FALSE	FALSE
YEL059W	HHY1	12.02660047	54.30259754	3.369409195	1.626357623	3.569349929	33.38908784	TRUE	0.994723183	TRUE	FALSE
YEL060C	PRB1	132.1765512	180.6637712	172.7215962	745.5906451	0.765257815	0.2423096	FALSE	0.577652826	FALSE	FALSE
YEL061C	CIN8	75.56043737	59.21954831	4.867287605	3.077891897	15.52413654	19.24029508	FALSE	0.424423299	FALSE	FALSE
YEL063C	CAN1	31.35790134	43.22098108	13.86541096	9.913567437	2.261591916	4.359780811	FALSE	0.487600923	FALSE	FALSE
YEL065W	SIT1	213.5425469	124.1401307	5.128184363	3.179276629	41.64096526	39.04665909	FALSE	0.390210496	FALSE	FALSE
YEL066W	HPA3	159.3629369	140.1961944	12.44100182	8.733265682	12.8094939	16.05312371	FALSE	0.435510381	FALSE	FALSE
YEL068C	YEL068C	50.98505294	30.94751143	3.997433825	1	12.75444577	30.94751143	FALSE	0.842546136	FALSE	FALSE
YEL069C	HXT13	1.504629349	2.416391805	3.558790373	2.485891968	0.422792351	0.972042163	FALSE	0.577652826	FALSE	FALSE
YEL071W	DLD3	572.7223058	889.4978664	20.54309736	29.25787656	27.87906302	30.40199669	FALSE	0.393613033	FALSE	FALSE
YEL077C	YEL077C	8.951585944	6.754284125	9.020763366	5.006933431	0.992331312	1.348986204	FALSE	0.383044983	FALSE	FALSE
YER001W	MNN1	118.6755623	90.10159379	60.8904924	19.20216581	1.948999878	4.692262045	FALSE	0.749524221	FALSE	FALSE
YER002W	NOP16	332.8223443	257.7898971	128.318055	70.38591934	2.593729655	3.66252085	FALSE	0.428460208	FALSE	FALSE
YER003C	PMI40	80.77510184	49.77622098	145.2643578	16.96841284	0.556055891	2.933463575	FALSE	0.827537486	FALSE	FALSE
YER004W	FMP52	152.0157421	123.2000318	107.5141485	138.6219061	1.413913835	0.888748649	FALSE	0.383044983	FALSE	FALSE
YER006W	NUG1	150.3494792	136.9403392	41.2134962	15.68849588	3.648064179	8.728710535	FALSE	0.806877163	FALSE	FALSE
YER007C-A	TMA20	272.3839723	162.3697942	55.0702132	17.53823378	4.946121623	9.258047093	FALSE	0.521583045	FALSE	FALSE
YER008C	SEC3	26.01486299	38.86911999	135.7591653	84.56773422	0.191625095	0.459621159	FALSE	0.383044983	FALSE	FALSE
YER009W	NTF2	576.7677601	441.4554813	4.92055605	1.95790459	117.215972	225.4734391	FALSE	0.562889273	FALSE	FALSE
YER010C	YER010C	89.92104031	87.8939715	71.03708482	55.0010707	1.265832354	1.5980411	FALSE	0.383044983	FALSE	FALSE
YER011W	TIR1	4.476799145	3.97229747	13.51413623	4.102995483	0.331267872	0.968145709	FALSE	0.577652826	FALSE	FALSE
YER013W	PRP22	36.32755193	45.84689562	3.807263567	2.298194881	9.54164357	19.94908961	FALSE	0.825749712	FALSE	FALSE
YER014W	HEM14	51.45673154	47.62918996	3.584111267	6.156349583	14.35690126	7.736596064	FALSE	0.537802768	FALSE	FALSE
YER016W	BIM1	94.55115752	74.03941976	73.71771404	38.04979029	1.282611089	1.945856185	FALSE	0.383044983	FALSE	FALSE
YER017C	AFG3	47.81302488	70.10676663	141.3497296	161.7509227	0.338260462	0.433424215	FALSE	0.383044983	FALSE	FALSE
YER018C	SPC25	22.10081694	28.36855214	25.33227125	20.80046268	0.872437245	1.363842362	FALSE	0.383044983	FALSE	FALSE
YER019C-A	SBH2	652.8014359	646.2600032	40.84692584	14.60075625	15.981654	44.2620911	FALSE	0.857194348	FALSE	FALSE
YER019W	ISC1	41.87060608	41.18449401	36.95311276	34.03305493	1.133073859	1.210132152	FALSE	0.383044983	FALSE	FALSE
YER020W	GPA2	29.25477115	42.47479817	139.1801882	152.319105	0.210193502	0.278854042	FALSE	0.383044983	FALSE	FALSE
YER023W	PRO3	241.8745977	145.7792853	110.9402359	78.93916869	2.180224295	1.846729421	FALSE	0.383044983	FALSE	FALSE
YER025W	GCD11	167.3090029	144.1331651	86.65275188	17.52855156	1.930798494	8.222765278	TRUE	0.923745675	TRUE	FALSE
YER026C	CHO1	355.6543375	434.0472271	8.912607381	3.806145325	39.90463422	114.0385324	FALSE	0.858405421	FALSE	FALSE
YER027C	GAL83	38.87404816	43.30316584	17.70877711	12.69105658	2.195185354	3.412100921	FALSE	0.45227797	FALSE	FALSE
YER028C	MIG3	8.116835939	13.71393618	11.20292758	4.659159176	0.724528109	2.943435855	FALSE	0.827537486	FALSE	FALSE
YER029C	SMB1	128.4728697	112.4490697	15.1039429	9.879708389	8.505916008	11.38182073	FALSE	0.446323529	FALSE	FALSE
YER030W	CHZ1	813.9974991	516.477175	11.92277105	1.508787467	68.27250946	342.312742	TRUE	0.965657439	TRUE	FALSE
YER031C	YPT31	176.0953706	130.352576	54.68713042	40.70471403	3.220051395	3.202395083	FALSE	0.383044983	FALSE	FALSE
YER033C	ZRG8	12.31365189	20.65046251	5.105203736	5.717881806	2.411980506	3.611558127	FALSE	0.45227797	FALSE	FALSE
YER034W	YER034W	41.52638328	55.87958433	23.78852989	32.99698858	1.745647313	1.693475276	FALSE	0.383044983	FALSE	FALSE
YER035W	EDC2	113.7923793	166.5100035	32.95043256	65.22530038	3.453441138	2.552843798	FALSE	0.383044983	FALSE	FALSE
YER036C	ARB1	133.4902093	192.1644481	167.5528488	130.3061444	0.796705101	1.474715171	FALSE	0.383044983	FALSE	FALSE
YER037W	PHM8	186.542665	405.8034947	27.70188027	119.0582616	6.733935141	3.408444648	FALSE	0.508693772	FALSE	FALSE
YER039C	HVG1	121.4450832	218.4418191	11.79162979	17.2034554	10.29926188	12.69755488	FALSE	0.41816609	FALSE	FALSE
YER040W	GLN3	36.7824096	52.35480033	40.06301238	53.06871618	0.918113926	0.986547331	FALSE	0.383044983	FALSE	FALSE

YER041W	YEN1	28.50763532	41.43301695	106.8796344	90.91384211	0.266726542	0.455739368	FALSE	0.383044983	FALSE	FALSE
YER043C	SAH1	169.9691409	117.0503655	233.8408349	154.0565786	0.726858254	0.759788167	FALSE	0.383044983	FALSE	FALSE
YER045C	ACA1	9.071204172	12.94256993	2.043757394	4.308442273	4.43849363	3.004002168	FALSE	0.428460208	FALSE	FALSE
YER047C	SAP1	85.06565403	58.41031293	10.50462005	11.35760736	8.097927734	5.142836082	FALSE	0.479368512	FALSE	FALSE
YER048C	CAU1	167.6066071	139.6494307	112.4207263	82.29248082	1.490887069	1.696988952	FALSE	0.383044983	FALSE	FALSE
YER049W	TPA1	141.9683608	138.6086812	9.224086972	3.673665064	15.39104751	37.73035342	FALSE	0.84410323	FALSE	FALSE
YER054C	GIP2	20.48417979	19.17254053	2.961610751	17.85451245	6.916567203	1.073820446	TRUE	0.937946943	FALSE	TRUE
YER055C	HIS1	489.2851237	376.11931	397.7002525	97.171462	1.230286178	3.87067666	FALSE	0.774048443	FALSE	FALSE
YER056C	FCY2	185.8519138	195.3790132	142.1644086	49.96567706	1.30730269	3.9102645	FALSE	0.774048443	FALSE	FALSE
YER056C-A	RPL34A	536.349269	325.6123097	67.79217477	14.30317041	7.911669316	22.76504442	FALSE	0.852378893	FALSE	FALSE
YER058W	PET117	155.4047268	97.46041438	8.685826195	13.13661093	17.89176105	7.41899223	FALSE	0.833895617	FALSE	FALSE
YER060W	FCY21	37.05337699	79.33984299	19.64621871	6.758378436	1.886030973	11.73947919	TRUE	0.968930219	TRUE	FALSE
YER060W-A	FCY22	18.98294144	21.73005764	19.12619853	7.63025452	0.992509903	2.847881101	FALSE	0.699437716	FALSE	FALSE
YER061C	CEM1	44.57555423	75.35630366	19.07287865	11.24784401	2.337117278	6.699622042	FALSE	0.802407728	FALSE	FALSE
YER062C	GPP2	179.0226326	179.6719756	56.26488149	219.7650394	3.181782807	0.817563959	FALSE	0.774048443	FALSE	FALSE
YER063W	THO1	230.6902037	209.7462967	27.4189547	25.35481826	8.41353021	8.272443313	FALSE	0.383044983	FALSE	FALSE
YER064C	VHR2	109.924601	156.7535208	35.45915394	32.16841035	3.100034512	4.872902299	FALSE	0.45227797	FALSE	FALSE
YER065C	ICL1	37.34762773	32.59642419	12.03223471	9.220489114	3.103964361	3.535216385	FALSE	0.383044983	FALSE	FALSE
YER068W	MOT2	41.92746919	44.11558847	28.52390167	17.6394466	1.469906525	2.50096216	FALSE	0.45227797	FALSE	FALSE
YER069W	ARG5,6	93.83881659	145.2731072	18.11604436	7.21667389	5.179873417	20.13020256	FALSE	0.88627451	FALSE	FALSE
YER070W	RNR1	112.5928431	32.00257066	52.63957957	19.03844164	2.138938876	1.680944862	FALSE	0.383044983	FALSE	FALSE
YER072W	VTC1	274.465888	244.2564386	177.0010144	68.80566745	1.550645847	3.549946504	FALSE	0.749524221	FALSE	FALSE
YER073W	ALD5	139.6735007	82.5868589	192.517077	64.04140282	0.725512265	1.289585413	FALSE	0.383044983	FALSE	FALSE
YER074W	RPS24A	540.4306202	282.3785376	8.07541868	1.971849127	66.92292271	143.2049408	FALSE	0.83738466	FALSE	FALSE
YER074W-A	YOS1	843.6196825	812.7043487	3.335343479	2.859879875	252.9333749	284.1742955	FALSE	0.408823529	FALSE	FALSE
YER075C	PTP3	20.05347229	24.93584779	82.05111387	89.15334329	0.244402195	0.27969616	FALSE	0.383044983	FALSE	FALSE
YER076C	YER076C	61.96504904	76.74417153	3.382188522	7.617527721	18.32099206	10.07468228	FALSE	0.544852941	FALSE	FALSE
YER077C	YER077C	28.3430615	46.34179938	15.1500787	16.13145181	1.870819424	2.872760612	FALSE	0.45227797	FALSE	FALSE
YER082C	UTP7	41.1381543	42.05687451	1537.567673	684.1206733	0.026755345	0.061475813	FALSE	0.383044983	FALSE	FALSE
YER083C	GET2	65.90306612	49.89224947	62.56864148	79.61619659	1.053292265	0.626659544	FALSE	0.383044983	FALSE	FALSE
YER084W	YER084W	3.577452063	9.900620085	1	8.496712265	3.577452063	1.165229535	FALSE	0.774048443	FALSE	FALSE
YER086W	ILV1	53.33480776	32.43898262	64.46783159	6.856918679	0.827308852	4.730839629	FALSE	0.873241061	FALSE	FALSE
YER087W	AIM10	65.83712655	72.89230212	1.719602233	8.779901785	38.28625322	8.302177394	TRUE	0.958823529	FALSE	TRUE
YER088C	DOT6	22.51530305	25.4005168	1450.032925	1252.208368	0.015527443	0.020284577	FALSE	0.383044983	FALSE	FALSE
YER088C-A	YER088C-A	15.74288115	6.116762409	55.57145104	75.0326605	0.283290806	0.081521332	FALSE	0.383044983	FALSE	FALSE
YER089C	PTC2	44.1381055	39.30513135	142.7394903	154.979522	0.309221403	0.253614999	FALSE	0.383044983	FALSE	FALSE
YER090W	TRP2	91.65756869	58.08516114	117.9706899	94.36520566	0.776952045	0.615535787	FALSE	0.383044983	FALSE	FALSE
YER091C	MET6	115.4360817	300.371264	76.43123113	70.83625787	1.51032608	4.240360418	FALSE	0.749524221	FALSE	FALSE
YER093C	TSC11	22.59167096	33.14592762	10.77250525	7.505370765	2.097160357	4.416294498	FALSE	0.749524221	FALSE	FALSE
YER094C	PUP3	949.9835293	971.8882221	82.31185559	101.6540335	11.54127218	9.56074431	FALSE	0.407151096	FALSE	FALSE
YER095W	RAD51	81.04415027	88.41086015	33.22268116	48.99490711	2.43942233	1.804490821	FALSE	0.383044983	FALSE	FALSE
YER099C	PRS2	174.5154424	223.79297	13.66219201	4.205269484	12.77360487	53.21727201	TRUE	0.958679354	TRUE	FALSE
YER100W	UBC6	183.3772372	179.4965147	8.174423015	2.748035546	22.43304963	65.3181197	FALSE	0.858261246	FALSE	FALSE
YER101C	AST2	51.50849468	54.25894673	6.366744292	4.354570809	8.090240839	12.46022837	FALSE	0.50239331	FALSE	FALSE

YER103W	SSA4	350.9252948	990.881264	66.18754506	3101.220701	5.301983847	0.319513301	TRUE	0.928229527	FALSE	TRUE
YER104W	RTT105	51.36720265	43.40852634	58.09954633	35.05476376	0.884123989	1.238306059	FALSE	0.383044983	FALSE	FALSE
YER105C	NUP157	47.89752203	52.551426	17.12710173	13.91466944	2.79659237	3.776692377	FALSE	0.383044983	FALSE	FALSE
YER107C	GLE2	118.5250921	133.3253656	7.983343998	1.478663405	14.84654703	90.16613593	TRUE	0.985971742	TRUE	FALSE
YER109C	FLO8	24.34973918	26.97492222	31.66981799	28.80054773	0.768862618	0.936611431	FALSE	0.383044983	FALSE	FALSE
YER110C	KAP123	36.93500375	38.42688514	40.87036427	10.78027223	0.903711147	3.564556101	FALSE	0.774048443	FALSE	FALSE
YER111C	SWI4	43.49376928	30.59499442	3.935944723	9.70223772	11.05040145	3.153395671	FALSE	0.865527682	FALSE	FALSE
YER113C	TMN3	66.51136663	70.39035213	3.459467687	5.25327365	19.22589619	13.39933093	FALSE	0.474567474	FALSE	FALSE
YER114C	BOI2	17.47595914	21.53382409	559.7229156	369.3134485	0.031222519	0.058307717	FALSE	0.383044983	FALSE	FALSE
YER115C	SPR6	75.14414522	44.72882511	4.666984789	4.162551916	16.10121923	10.74552967	FALSE	0.508463091	FALSE	FALSE
YER116C	SLX8	61.64994041	71.9064346	47.56353148	28.99636491	1.296159862	2.479843071	FALSE	0.45227797	FALSE	FALSE
YER117W	RPL23B	1599.730958	1094.31539	23.70936401	7.546667683	67.47253775	145.0064367	FALSE	0.83738466	FALSE	FALSE
YER119C	AVT6	31.10508812	47.47370522	40.97521871	102.640122	0.759119514	0.462525807	FALSE	0.383044983	FALSE	FALSE
YER119C-A	YER119C-A	4.309341661	6.037836442	1	3.191294687	4.309341661	1.891970825	FALSE	0.749524221	FALSE	FALSE
YER120W	SCS2	107.9622005	85.56476787	676.8705198	622.9295362	0.159501998	0.137358662	FALSE	0.383044983	FALSE	FALSE
YER122C	GLO3	132.7045666	120.4432617	27.95612404	4.676519719	4.746887173	25.75489231	TRUE	0.96355248	TRUE	FALSE
YER124C	DSE1	276.9963465	126.3676226	13.77955158	5.151044866	20.10198554	24.53242514	FALSE	0.426903114	FALSE	FALSE
YER125W	RSP5	62.88156529	46.48739431	392.625322	277.6233035	0.160156673	0.167447738	FALSE	0.383044983	FALSE	FALSE
YER126C	NSA2	486.5219821	303.9143753	21.12191236	14.1247358	23.03399303	21.51646442	FALSE	0.389258939	FALSE	FALSE
YER127W	LCP5	152.5865878	113.3002092	19.38652629	10.44529647	7.870754433	10.8470075	FALSE	0.446323529	FALSE	FALSE
YER129W	SAK1	28.70906516	25.93121953	26.4495127	25.65453866	1.085428888	1.01078487	FALSE	0.383044983	FALSE	FALSE
YER130C	COM2	119.4209985	191.2397501	14.24956654	30.22299024	8.380675868	6.327625051	FALSE	0.430449827	FALSE	FALSE
YER131W	RPS26B	280.7405506	153.4084012	2950.898877	427.7861062	0.0951373	0.35861006	FALSE	0.383044983	FALSE	FALSE
YER132C	PMD1	14.7340443	20.51382166	34.45669139	24.87104733	0.427610537	0.824807311	FALSE	0.383044983	FALSE	FALSE
YER133W	GLC7	735.5769607	737.0131974	9.620585506	14.71748483	76.45864799	50.07738794	FALSE	0.528633218	FALSE	FALSE
YER134C	YER134C	144.3771715	170.0118231	9.118097327	2.792132304	15.83413363	60.88960141	FALSE	0.892329873	FALSE	FALSE
YER137C	YER137C	49.88214155	38.72033761	6.671121162	1.977957311	7.477325076	19.57592178	FALSE	0.846842561	FALSE	FALSE
YER140W	EMP65	80.62906959	88.00231102	14.52313181	1	5.551768766	88.00231102	TRUE	0.999553057	TRUE	FALSE
YER141W	COX15	92.31821313	111.5034291	63.28220221	50.90022208	1.458833762	2.190627556	FALSE	0.383044983	FALSE	FALSE
YER143W	DDI1	67.60159875	87.46542499	11.75982537	19.02894942	5.748520631	4.596440038	FALSE	0.415383506	FALSE	FALSE
YER144C	UBP5	22.33022497	25.24416684	55.52587178	27.78513542	0.402158926	0.908549354	FALSE	0.577652826	FALSE	FALSE
YER145C	FTR1	300.2842131	223.46572	647.3464719	127.62498	0.46386939	1.750955965	FALSE	0.699437716	FALSE	FALSE
YER147C	SCC4	88.45088298	104.2178873	110.9069222	159.6393116	0.797523556	0.65283348	FALSE	0.383044983	FALSE	FALSE
YER148W	SPT15	329.363097	399.2900673	4.941478047	1	66.6527492	399.2900673	TRUE	0.986029412	TRUE	FALSE
YER150W	SPI1	97.80812068	207.1981425	102.489261	1334.637628	0.954325553	0.155246741	FALSE	0.577652826	FALSE	FALSE
YER151C	UBP3	53.23364982	56.92005852	84.67535379	74.85633282	0.628679391	0.760390689	FALSE	0.383044983	FALSE	FALSE
YER152C	YER152C	85.83213311	72.01247852	53.30751417	64.51404664	1.610131976	1.116229446	FALSE	0.383044983	FALSE	FALSE
YER152W-A	YER152W-A	1.285133155	2.563214724	4.261260747	5.338386836	0.301585196	0.480147805	FALSE	0.383044983	FALSE	FALSE
YER153C	PET122	26.0987865	23.83378482	116.878791	118.1577291	0.223297882	0.201711602	FALSE	0.383044983	FALSE	FALSE
YER154W	OXA1	68.1056794	50.05120526	505.1920609	539.5962786	0.13481146	0.092756765	FALSE	0.383044983	FALSE	FALSE
YER155C	BEM2	52.99218113	52.24753367	78.80228836	50.45922534	0.67247008	1.035440662	FALSE	0.383044983	FALSE	FALSE
YER156C	YER156C	127.1770045	89.5104276	18.18388312	9.485363668	6.993940934	9.436689065	FALSE	0.446323529	FALSE	FALSE
YER158C	YER158C	23.95049376	42.58289649	12.74354665	16.24888411	1.879421358	2.620665899	FALSE	0.383044983	FALSE	FALSE
YER159C	BUR6	243.0600196	247.9213631	500.8908033	369.8457919	0.485255505	0.67033712	FALSE	0.383044983	FALSE	FALSE

YER161C	SPT2	71.7035042	76.34598542	26.84975113	7.997850951	2.670546325	9.545812479	FALSE	0.857598039	FALSE	FALSE
YER162C	RAD4	42.17602756	38.2658175	81.32229396	129.2021334	0.518628109	0.296170168	FALSE	0.383044983	FALSE	FALSE
YER163C	GCG1	241.4307405	347.7891347	8.820253582	19.88361483	27.37231285	17.4912428	FALSE	0.523039216	FALSE	FALSE
YER164W	CHD1	25.47949261	26.08264107	106.9272875	55.2280118	0.238288029	0.472271954	FALSE	0.383044983	FALSE	FALSE
YER165W	PAB1	88.37335984	80.84285708	1641.933384	866.3519599	0.053822744	0.093314104	FALSE	0.383044983	FALSE	FALSE
YER166W	DNF1	34.48669538	42.55585694	253.7373046	173.7438043	0.135914959	0.244934529	FALSE	0.383044983	FALSE	FALSE
YER167W	BCK2	46.29737443	49.20978434	70.98049682	62.03224958	0.652254866	0.793293564	FALSE	0.383044983	FALSE	FALSE
YER168C	CCA1	172.1101069	182.684322	13.45407783	6.890046813	12.79241202	26.51423523	FALSE	0.830190311	FALSE	FALSE
YER169W	RPH1	24.44139441	36.0835259	191.7260299	110.0681173	0.127480835	0.327829046	FALSE	0.383044983	FALSE	FALSE
YER170W	ADK2	61.90475037	47.54835487	5.323747749	3.125531297	11.62803974	15.21288714	FALSE	0.439359862	FALSE	FALSE
YER171W	RAD3	51.85190586	46.69782978	17.54394493	10.89525669	2.955544268	4.286069717	FALSE	0.428460208	FALSE	FALSE
YER172C	BRR2	36.34373192	37.77242117	13.40256203	8.657122481	2.711700333	4.36316123	FALSE	0.45227797	FALSE	FALSE
YER173W	RAD24	32.826974	30.62829759	3.563845265	4.920618217	9.211110909	6.224481608	FALSE	0.44994233	FALSE	FALSE
YER174C	GRX4	236.6444192	273.0522739	6.068780276	5.852063652	38.99373655	46.65914285	FALSE	0.428777393	FALSE	FALSE
YER175C	TMT1	92.46019	58.86772142	6.445272069	8.68327737	14.34542856	6.779435795	FALSE	0.815470012	FALSE	FALSE
YER176W	ECM32	24.3106646	31.04829347	51.97826163	35.87320154	0.467708304	0.865501046	FALSE	0.383044983	FALSE	FALSE
YER177W	BMH1	654.8971426	655.1874194	2122.430315	2422.484571	0.308560021	0.270460926	FALSE	0.383044983	FALSE	FALSE
YER178W	PDA1	134.8300045	90.80123123	357.8535567	445.7797653	0.376774247	0.203690787	FALSE	0.383044983	FALSE	FALSE
YER180C-A	SLO1	200.243172	277.046662	8.281645596	8.243910133	24.17915253	33.60622054	FALSE	0.476787774	FALSE	FALSE
YER187W	YER187W	16.59179305	23.26092747	1.383055424	4.81478485	11.99647734	4.831145772	FALSE	0.822231834	FALSE	FALSE
YFL001W	DEG1	66.39728927	63.72478977	77.19898398	46.71196598	0.860079833	1.364206974	FALSE	0.383044983	FALSE	FALSE
YFL002C	SPB4	77.50877302	81.76912173	3.266991924	1	23.72481317	81.76912173	FALSE	0.889273356	FALSE	FALSE
YFL004W	VTC2	53.70538902	60.13758786	26.60877172	2.738713692	2.018334013	21.95833323	TRUE	0.995069204	TRUE	FALSE
YFL005W	SEC4	495.3385106	392.4922546	72.3289331	52.97028477	6.84841445	7.409668577	FALSE	0.383044983	FALSE	FALSE
YFL007W	BLM10	29.27370289	30.09310163	32.47616016	33.37673888	0.90139052	0.901618991	FALSE	0.383044983	FALSE	FALSE
YFL008W	SMC1	70.68777436	70.83869444	17.78371955	12.8219043	3.974858812	5.52481853	FALSE	0.428460208	FALSE	FALSE
YFL009W	CDC4	58.26250016	66.90797035	92.72407943	94.88687159	0.628342719	0.705134116	FALSE	0.383044983	FALSE	FALSE
YFL010C	WWM1	184.0007581	144.5864141	3399.931113	5985.108013	0.054118967	0.024157695	FALSE	0.383044983	FALSE	FALSE
YFL013C	IES1	39.36012364	47.79018526	18.13672878	17.0345739	2.170188688	2.805481695	FALSE	0.383044983	FALSE	FALSE
YFL014W	HSP12	2121.314389	3056.02347	27.1545296	2796.886304	78.12009343	1.09265202	TRUE	0.99994233	FALSE	TRUE
YFL016C	MDJ1	121.6822806	278.2649024	449.7556956	1258.760318	0.27055195	0.221062658	FALSE	0.383044983	FALSE	FALSE
YFL017C	GNA1	201.7506444	80.64951236	22.06813836	18.33912599	9.142168731	4.397674808	FALSE	0.791565744	FALSE	FALSE
YFL017W-A	SMX2	340.9804259	337.645285	30.48244804	7.732535769	11.18612342	43.6655316	FALSE	0.891868512	FALSE	FALSE
YFL018C	LPD1	147.1428628	96.62527242	59.68043025	38.4441456	2.465512768	2.513393676	FALSE	0.383044983	FALSE	FALSE
YFL021C-A	YFL021C-A	2.471513974	7.417379258	30.40235823	53.62551639	0.081293496	0.138318095	FALSE	0.383044983	FALSE	FALSE
YFL021W	GAT1	23.43343484	24.30425518	394.1789845	472.9376643	0.059448717	0.051389976	FALSE	0.383044983	FALSE	FALSE
YFL022C	FRS2	55.80690727	46.40001199	4532.639871	2505.767137	0.012312231	0.018517288	FALSE	0.383044983	FALSE	FALSE
YFL023W	BUD27	48.60850883	47.52194835	313.6315596	193.604511	0.154986025	0.24545889	FALSE	0.383044983	FALSE	FALSE
YFL024C	EPL1	46.82852427	86.65388936	120.1457727	110.8909133	0.389764227	0.781433634	FALSE	0.383044983	FALSE	FALSE
YFL025C	BST1	29.14681996	40.83384303	7.692275636	3.211619242	3.789102386	12.71440976	FALSE	0.868584198	FALSE	FALSE
YFL028C	CAF16	289.2905637	228.2522624	5.324132745	1	54.33571579	228.2522624	TRUE	0.95893887	TRUE	FALSE
YFL029C	CAK1	50.88186954	53.94686066	16.86165878	24.44583286	3.017607591	2.206791684	FALSE	0.383044983	FALSE	FALSE
YFL030W	AGX1	44.61376372	41.87288339	14.86632816	28.75889054	3.000994141	1.455997871	FALSE	0.699437716	FALSE	FALSE
YFL031W	HAC1	719.8288905	906.0588682	1805.309407	1664.082932	0.398728821	0.544479395	FALSE	0.383044983	FALSE	FALSE

YFL032W	YFL032W	121.4450832	149.4090676	19.45660655	5.300263854	6.241842989	28.18898676	TRUE	0.957482699	TRUE	FALSE
YFL033C	RIM15	22.42379571	22.67933861	326.6927777	377.5701002	0.068638786	0.060066564	FALSE	0.383044983	FALSE	FALSE
YFL034C-B	MOB2	70.5899546	53.98042826	22.7489525	23.86503199	3.102998022	2.261904709	FALSE	0.383044983	FALSE	FALSE
YFL034W	YFL034W	37.9939925	48.83841807	93.50626057	72.47637483	0.406325654	0.673852937	FALSE	0.383044983	FALSE	FALSE
YFL036W	RPO41	65.66298506	92.90240089	8.12243123	3.212677683	8.084154018	28.91743588	FALSE	0.889287774	FALSE	FALSE
YFL037W	TUB2	123.3542635	77.40776184	696.6373043	583.9277067	0.177070999	0.132563947	FALSE	0.383044983	FALSE	FALSE
YFL038C	YPT1	1643.908807	946.1301715	736.0579828	595.6629691	2.2333958	1.588364932	FALSE	0.383044983	FALSE	FALSE
YFL039C	ACT1	192.1157858	176.8655343	1127.853632	1009.359723	0.170337516	0.175225472	FALSE	0.383044983	FALSE	FALSE
YFL041W	FET5	89.67052691	103.5627767	123.7104088	120.869296	0.724842217	0.856816248	FALSE	0.383044983	FALSE	FALSE
YFL042C	YFL042C	36.23561445	31.83978726	2.471457754	3.947624313	14.66163619	8.065556582	FALSE	0.53633218	FALSE	FALSE
YFL044C	OTU1	83.24215967	131.8304078	28.48102218	44.42533144	2.92272374	2.967460311	FALSE	0.383044983	FALSE	FALSE
YFL045C	SEC53	631.6096836	387.5580662	12.40055632	1.169893784	50.93397968	331.2762846	TRUE	0.986058247	TRUE	FALSE
YFL047W	RGD2	75.24499559	77.54857047	54.9001586	42.54626299	1.370578838	1.822688176	FALSE	0.383044983	FALSE	FALSE
YFL048C	EMP47	181.7319473	230.8680083	3.663584261	2.661291682	49.60495907	86.75035878	FALSE	0.556358131	FALSE	FALSE
YFL049W	SWP82	83.92166646	101.2794699	6.601335032	9.93324338	12.71283249	10.19601212	FALSE	0.42850346	FALSE	FALSE
YFL050C	ALR2	17.89865836	24.14803804	6.947569811	4.280288511	2.576247356	5.641684662	FALSE	0.776081315	FALSE	FALSE
YFL051C	YFL051C	1.056044202	1	1	6.635727754	1.056044202	0.150699371	FALSE	0.577652826	FALSE	FALSE
YFL053W	DAK2	6.687685324	15.10179043	10.27560188	17.50054059	0.650831494	0.862932797	FALSE	0.383044983	FALSE	FALSE
YFL054C	YFL054C	19.74655757	28.72514823	16.28941105	33.5335994	1.212232751	0.856607962	FALSE	0.383044983	FALSE	FALSE
YFL056C	AAD6	40.70976028	168.9260244	2.430029638	3.505710312	16.75278344	48.18596215	FALSE	0.857785467	FALSE	FALSE
YFL057C	AAD16	41.11670137	148.5293837	6.176954783	1.878607857	6.656467922	79.06353798	TRUE	0.998096886	TRUE	FALSE
YFL067W	YFL067W	1	1	1.527430337	6.238972498	0.654694342	0.160282803	FALSE	0.383044983	FALSE	FALSE
YFR001W	LOC1	542.5336936	386.0542378	3.846491434	2.337585913	141.0463803	165.1508232	FALSE	0.422491349	FALSE	FALSE
YFR002W	NIC96	102.3319403	111.8843227	3.211899158	5.008506619	31.86025939	22.33885891	FALSE	0.484342561	FALSE	FALSE
YFR003C	YPI1	292.4023926	170.7988273	5.962285628	14.09705506	49.04199678	12.11592255	TRUE	0.958549596	FALSE	TRUE
YFR004W	RPN11	687.2130244	507.8307501	39.57825691	40.4253283	17.36339794	12.56219235	FALSE	0.463581315	FALSE	FALSE
YFR005C	SAD1	86.7696719	93.18185941	3.2120213	1	27.01404001	93.18185941	FALSE	0.889273356	FALSE	FALSE
YFR007W	YFH7	20.10362111	29.36045956	13.45882157	6.819244143	1.493713325	4.305529902	FALSE	0.749524221	FALSE	FALSE
YFR009W	GCN20	110.8004942	107.9669489	33.50403509	23.00829439	3.3070791	4.692522926	FALSE	0.428460208	FALSE	FALSE
YFR010W	UBP6	162.1534751	193.6909517	34.17931109	4.802135439	4.744199632	40.33433755	TRUE	0.994737601	TRUE	FALSE
YFR012W	DCV1	1.555454267	5.206781006	3.175905048	8.419053433	0.489767246	0.618452068	FALSE	0.383044983	FALSE	FALSE
YFR013W	IOC3	49.78015465	42.25223495	45.21271362	10.74838264	1.101021166	3.931031893	FALSE	0.774048443	FALSE	FALSE
YFR014C	CMK1	130.7368546	122.3680899	30.42606875	42.8504235	4.296869757	2.855703161	FALSE	0.45227797	FALSE	FALSE
YFR015C	GSY1	42.06898791	14.47317435	43.34289291	15.04556422	0.970608676	0.961956238	FALSE	0.383044983	FALSE	FALSE
YFR016C	YFR016C	33.97313024	31.04975667	196.9904802	138.0451355	0.172460772	0.224924671	FALSE	0.383044983	FALSE	FALSE
YFR017C	IGD1	20.19953935	23.36852904	7.180109218	27.303885	2.813263522	0.855868278	FALSE	0.699437716	FALSE	FALSE
YFR018C	YFR018C	28.35942877	18.02764481	106.3207312	78.07334413	0.266734704	0.230906528	FALSE	0.383044983	FALSE	FALSE
YFR019W	FAB1	23.2765302	19.63376058	158.6453945	142.0843762	0.146720491	0.138183811	FALSE	0.383044983	FALSE	FALSE
YFR020W	YFR020W	43.99126618	68.42373194	24.36732518	17.56680894	1.805338331	3.895057558	FALSE	0.749524221	FALSE	FALSE
YFR021W	ATG18	15.32001848	19.60294156	27.77231862	24.41493872	0.551629077	0.80290767	FALSE	0.383044983	FALSE	FALSE
YFR022W	ROG3	16.87656469	30.36047521	9.696428411	14.16168588	1.740492888	2.143846113	FALSE	0.383044983	FALSE	FALSE
YFR024C-A	LSB3	182.1148226	149.1639	51.25738775	63.88125395	3.552947791	2.335018347	FALSE	0.45227797	FALSE	FALSE
YFR025C	HIS2	99.90303867	98.43618362	60.27240254	48.86122013	1.657525409	2.014607563	FALSE	0.383044983	FALSE	FALSE
YFR027W	ECO1	36.51965622	31.39070411	14.13867279	6.333105941	2.582962119	4.956604927	FALSE	0.487600923	FALSE	FALSE

YFR028C	CDC14	58.96246792	50.98188495	70.34065204	59.65912538	0.838241702	0.854553006	FALSE	0.383044983	FALSE	FALSE
YFR029W	PTR3	10.62420904	18.0962479	99.0705426	118.0050365	0.10723883	0.153351488	FALSE	0.383044983	FALSE	FALSE
YFR030W	MET10	57.32301706	71.50235471	22.85592943	30.2288704	2.50801514	2.365366411	FALSE	0.383044983	FALSE	FALSE
YFR031C	SMC2	45.52894237	42.27304425	25.61469332	13.9900924	1.777454128	3.021641533	FALSE	0.45227797	FALSE	FALSE
YFR031C-A	RPL2A	300.1360448	189.6340271	5654.683606	2470.39564	0.053077425	0.076762614	FALSE	0.383044983	FALSE	FALSE
YFR032C	RRT5	1.423838906	1.366780014	13.3273537	35.26932873	0.106835831	0.038752652	FALSE	0.383044983	FALSE	FALSE
YFR032C-A	RPL29	716.9308077	471.9693875	23.78563306	7.253705021	30.14133808	65.06597471	FALSE	0.836980969	FALSE	FALSE
YFR033C	QCR6	303.448593	172.8894629	1853.622215	1882.29458	0.163705738	0.091850375	FALSE	0.383044983	FALSE	FALSE
YFR034C	PHO4	37.79153707	43.0557538	314.7200726	309.2869815	0.120079844	0.139209719	FALSE	0.383044983	FALSE	FALSE
YFR035C	YFR035C	4.224176806	6.510362772	10.70633053	7.332740143	0.394549449	0.887848559	FALSE	0.383044983	FALSE	FALSE
YFR036W	CDC26	13.40753718	15.50232265	56.8448812	53.09387614	0.235861821	0.291979486	FALSE	0.383044983	FALSE	FALSE
YFR037C	RSC8	78.04696564	62.27258762	749.9705268	699.1332984	0.10406671	0.089071122	FALSE	0.383044983	FALSE	FALSE
YFR038W	IRC5	39.93182595	35.53165686	148.0497272	107.5633395	0.269719011	0.330332407	FALSE	0.383044983	FALSE	FALSE
YFR039C	OSW7	132.7577759	150.7380933	13.38996555	7.056367575	9.914721239	21.36199562	FALSE	0.828099769	FALSE	FALSE
YFR040W	SAP155	96.7443883	96.29235467	17.11580503	14.95394184	5.652342273	6.439262351	FALSE	0.383044983	FALSE	FALSE
YFR044C	DUG1	101.640968	78.21334041	43.67193461	25.57725277	2.32737498	3.057925771	FALSE	0.383044983	FALSE	FALSE
YFR045W	YFR045W	41.05627328	47.16615762	5.734932483	7.57714809	7.158981104	6.224790259	FALSE	0.383044983	FALSE	FALSE
YFR046C	CNN1	52.80512733	54.50339455	26.16539266	7.677416171	2.018128602	7.099184586	FALSE	0.847303922	FALSE	FALSE
YFR047C	BNA6	100.8486535	146.2567487	116.4906897	195.5092771	0.865722864	0.748080863	FALSE	0.383044983	FALSE	FALSE
YFR048W	RMD8	69.4966283	78.64883285	20.809454	10.76900496	3.33966611	7.303259044	FALSE	0.776081315	FALSE	FALSE
YFR050C	PRE4	207.9576481	201.7294497	28.26023176	10.19441196	7.358667467	19.78823796	FALSE	0.848702422	FALSE	FALSE
YFR051C	RET2	36.18930267	31.31961271	268.4504634	203.5299804	0.134808121	0.15388206	FALSE	0.383044983	FALSE	FALSE
YFR052W	RPN12	183.5366421	223.5665539	1.477808616	11.56606286	124.195136	19.32952956	TRUE	0.986014994	FALSE	TRUE
YFR053C	HXK1	119.7458516	114.5420398	91.900626	453.0425036	1.302992774	0.252828463	FALSE	0.699437716	FALSE	FALSE
YFR055W	IRC7	108.3389862	113.5242403	17.51961228	11.12456839	6.183868942	10.204822	FALSE	0.506257209	FALSE	FALSE
YGL001C	ERG26	191.6750399	205.2296123	15.88665655	2.689577659	12.06515916	76.30551647	TRUE	0.985914072	TRUE	FALSE
YGL003C	CDH1	76.16555834	83.73168097	32.99928906	26.56472516	2.308096947	3.151987475	FALSE	0.383044983	FALSE	FALSE
YGL004C	RPN14	52.41314116	89.9778677	10.43099437	22.96125567	5.024750211	3.918682367	FALSE	0.415383506	FALSE	FALSE
YGL006W	PMC1	72.82567169	87.51867823	7.107864796	11.24078644	10.24578742	7.785814516	FALSE	0.430449827	FALSE	FALSE
YGL008C	PMA1	249.6562036	269.1322213	2050.699041	846.0800147	0.121742	0.318093108	FALSE	0.383044983	FALSE	FALSE
YGL009C	LEU1	61.1584983	74.13516039	133.828217	27.54211982	0.456992551	2.691701324	FALSE	0.827537486	FALSE	FALSE
YGL011C	SCL1	339.2782008	339.4440483	20.53978104	45.72666176	16.51810212	7.423328868	FALSE	0.825187428	FALSE	FALSE
YGL012W	ERG4	130.4125471	179.6934455	117.7766306	66.41870668	1.107287129	2.705464387	FALSE	0.699437716	FALSE	FALSE
YGL013C	PDR1	41.48900316	57.59483976	23.07534569	13.88774301	1.797979701	4.147170617	FALSE	0.749524221	FALSE	FALSE
YGL014W	PUF4	61.39192394	68.46370379	360.1454489	175.0639013	0.17046425	0.391078362	FALSE	0.383044983	FALSE	FALSE
YGL017W	ATE1	113.6860918	119.4516316	19.88019379	23.75402444	5.718560541	5.028690271	FALSE	0.383044983	FALSE	FALSE
YGL018C	JAC1	75.88676549	53.08688499	4.933221324	3.661590276	15.38280172	14.49831385	FALSE	0.383044983	FALSE	FALSE
YGL019W	CKB1	83.74922582	65.50855225	404.6801635	394.1666951	0.206951646	0.166195047	FALSE	0.383044983	FALSE	FALSE
YGL020C	GET1	292.085717	209.3798875	15.35818582	4.865415765	19.01824346	43.03432586	FALSE	0.839619377	FALSE	FALSE
YGL022W	STT3	104.5880327	90.40898118	166.5908765	100.0953585	0.627813689	0.903228507	FALSE	0.383044983	FALSE	FALSE
YGL023C	PIB2	41.89473467	41.2015883	139.9230956	117.7644665	0.299412577	0.349864348	FALSE	0.383044983	FALSE	FALSE
YGL025C	PGD1	45.34356623	37.18007945	331.859612	391.6309217	0.136634783	0.094936527	FALSE	0.383044983	FALSE	FALSE
YGL026C	TRP5	208.3435	136.2897604	154.5114154	61.11363143	1.34840199	2.230104106	FALSE	0.383044983	FALSE	FALSE
YGL027C	CWH41	30.40495608	25.13593301	7.359765609	3.612088502	4.131239729	6.958836416	FALSE	0.487600923	FALSE	FALSE

YGL028C	SCW11	78.59263763	46.06834539	6.169567395	3.942646839	12.73875988	11.68462387	FALSE	0.391104383	FALSE	FALSE
YGL029W	CGR1	610.4371867	435.6752491	43.99674537	23.08074269	13.87459871	18.87613648	FALSE	0.465643022	FALSE	FALSE
YGL030W	RPL30	1312.065182	995.9012486	7.014243759	5.59095796	187.0572547	178.1271216	FALSE	0.389258939	FALSE	FALSE
YGL031C	RPL24A	549.7725496	262.2679513	32.36433158	7.748506322	16.98698916	33.8475495	FALSE	0.558982122	FALSE	FALSE
YGL035C	MIG1	39.68007668	33.13952861	26.60673657	16.01588394	1.491354514	2.069166381	FALSE	0.383044983	FALSE	FALSE
YGL036W	YGL036W	43.98714222	94.71168027	1.587628861	4.201722235	27.70618707	22.54115693	FALSE	0.429945213	FALSE	FALSE
YGL037C	PNC1	1277.803751	1165.353171	298.6904123	1445.915114	4.278020647	0.80596237	FALSE	0.873241061	FALSE	FALSE
YGL038C	OCH1	73.62450365	47.51999536	147.5169348	93.28280677	0.499091875	0.509418584	FALSE	0.383044983	FALSE	FALSE
YGL040C	HEM2	129.0221234	119.0254199	111.805804	93.1642668	1.153984129	1.277586611	FALSE	0.383044983	FALSE	FALSE
YGL042C	YGL042C	6.42944558	7.771886355	16.42019557	1	0.391557186	7.771886355	TRUE	0.970689158	TRUE	FALSE
YGL043W	DST1	175.2726781	167.638753	16.93025635	12.82557768	10.3526299	13.07065905	FALSE	0.42850346	FALSE	FALSE
YGL044C	RNA15	174.6846449	117.1452679	10.84441258	8.558877187	16.10826254	13.68699017	FALSE	0.409933679	FALSE	FALSE
YGL045W	RIM8	31.53546359	63.18176243	13.11933089	17.93232657	2.40374024	3.523344401	FALSE	0.428460208	FALSE	FALSE
YGL047W	ALG13	165.2371033	137.328849	3.833050134	9.289976393	43.10851608	14.78247557	FALSE	0.857598039	FALSE	FALSE
YGL048C	RPT6	304.8092112	300.6916031	106.8301835	143.3645427	2.853212465	2.097391709	FALSE	0.383044983	FALSE	FALSE
YGL049C	TIF4632	42.7645965	42.25980901	97.02849674	46.80581042	0.440742647	0.902875276	FALSE	0.383044983	FALSE	FALSE
YGL050W	TYW3	75.26049315	67.18616111	12.66591752	3.784496099	5.941969308	17.75300049	FALSE	0.877840254	FALSE	FALSE
YGL055W	OLE1	242.6049724	88.5123052	253.0357301	81.85681152	0.95877531	1.081306535	FALSE	0.383044983	FALSE	FALSE
YGL056C	SDS23	43.79383303	48.12779877	19.0763635	13.39913349	2.295711812	3.591859042	FALSE	0.45227797	FALSE	FALSE
YGL058W	RAD6	360.825276	401.4576133	35.27676229	19.16113207	10.22841249	20.95166464	FALSE	0.825749712	FALSE	FALSE
YGL061C	DUO1	109.6923332	80.09012457	71.4347156	5.413356852	1.535560578	14.79490947	TRUE	0.988091119	TRUE	FALSE
YGL062W	PYC1	67.57249751	71.234601	115.447464	399.3408072	0.585309501	0.17838047	FALSE	0.383044983	FALSE	FALSE
YGL063W	PUS2	19.44430712	21.96099064	29.40577981	17.13427035	0.661240996	1.281699786	FALSE	0.383044983	FALSE	FALSE
YGL064C	MRH4	18.58412305	19.43432555	33.75175914	55.52729691	0.550611984	0.349995887	FALSE	0.383044983	FALSE	FALSE
YGL065C	ALG2	28.8673035	30.32166508	14.55746829	1	1.982989276	30.32166508	TRUE	0.998731257	TRUE	FALSE
YGL066W	SGF73	42.9671966	40.35947671	130.6360284	189.2105868	0.328907708	0.213304537	FALSE	0.383044983	FALSE	FALSE
YGL070C	RPB9	542.4547049	434.6780233	3.084136782	3.606281422	175.8854238	120.5335836	FALSE	0.494521338	FALSE	FALSE
YGL071W	AFT1	24.88657566	32.37723616	72.46564504	38.67049232	0.343425849	0.837259477	FALSE	0.383044983	FALSE	FALSE
YGL073W	HSF1	31.86113213	44.99120782	34.52488982	44.05982591	0.922845295	1.021139028	FALSE	0.383044983	FALSE	FALSE
YGL076C	RPL7A	244.7738044	203.4859606	112.4341406	20.87897978	2.177041628	9.745972395	TRUE	0.931675317	TRUE	FALSE
YGL077C	HNM1	136.8195139	181.1602824	112.7519873	43.99122007	1.213455454	4.118100887	FALSE	0.774048443	FALSE	FALSE
YGL078C	DBP3	131.3646434	99.09155102	19.16833701	11.75307669	6.853210237	8.431115836	FALSE	0.407151096	FALSE	FALSE
YGL083W	SCY1	9.021634751	12.69247196	63.20746914	34.73101468	0.142730517	0.365450652	FALSE	0.383044983	FALSE	FALSE
YGL084C	GUP1	80.53042949	94.28318699	1.319222097	3.497145272	61.04387554	26.96004302	FALSE	0.840542099	FALSE	FALSE
YGL085W	LCL3	253.6656574	330.2250961	5.349113376	5.874587327	47.42200054	56.21247548	FALSE	0.422736448	FALSE	FALSE
YGL086W	MAD1	192.3366264	165.4168292	43.20997385	36.61908245	4.451209045	4.51723031	FALSE	0.383044983	FALSE	FALSE
YGL087C	MMS2	83.07547719	84.25175353	93.09439195	76.55763922	0.892378966	1.100500935	FALSE	0.383044983	FALSE	FALSE
YGL089C	MF(ALPHA)2	1.003678373	1	560.5722858	39.65954808	0.001790453	0.025214609	FALSE	0.383044983	FALSE	FALSE
YGL090W	LIF1	141.7626729	189.3123471	13.357527	9.052971415	10.61294302	20.91162541	FALSE	0.552623991	FALSE	FALSE
YGL091C	NBP35	232.9973754	269.7324894	19.1732559	22.57079342	12.15220704	11.95050987	FALSE	0.383044983	FALSE	FALSE
YGL092W	NUP145	55.28607732	58.14172948	24.05866963	16.17605242	2.297969014	3.594308919	FALSE	0.45227797	FALSE	FALSE
YGL093W	SPC105	42.70421879	57.13775709	257.1280256	123.9277539	0.166081541	0.461056989	FALSE	0.383044983	FALSE	FALSE
YGL094C	PAN2	42.375193	50.94671142	4.47330637	7.472894901	9.472902032	6.817533512	FALSE	0.446323529	FALSE	FALSE
YGL097W	SRM1	170.7271459	143.7933066	89.14367685	55.93757576	1.915190757	2.570603117	FALSE	0.383044983	FALSE	FALSE

YGL099W	LSG1	66.08431359	59.15605854	67.97582659	18.36978485	0.97217374	3.220291312	FALSE	0.774048443	FALSE	FALSE
YGL100W	SEH1	196.6022404	184.9708952	61.44026984	24.61299209	3.199892202	7.515173065	FALSE	0.794780854	FALSE	FALSE
YGL103W	RPL28	3111.746885	2904.923869	128.4297344	66.14927953	24.22917792	43.91467133	FALSE	0.556963668	FALSE	FALSE
YGL104C	VPS73	30.47348905	46.39193764	5.567862699	6.489492624	5.47310354	7.148777313	FALSE	0.415383506	FALSE	FALSE
YGL105W	ARC1	221.371515	146.8412374	2513.881917	1984.070035	0.088059631	0.074010108	FALSE	0.383044983	FALSE	FALSE
YGL106W	MLC1	335.9980635	198.7703112	169.5508417	115.8104992	1.981695049	1.716341028	FALSE	0.383044983	FALSE	FALSE
YGL107C	RMD9	78.23541062	70.58762728	3.843624906	1.364589183	20.3545904	51.7281158	FALSE	0.854354095	FALSE	FALSE
YGL108C	YGL108C	165.8888158	157.7343838	20.6570567	23.08456159	8.030612402	6.832894928	FALSE	0.402436563	FALSE	FALSE
YGL110C	CUE3	100.3427855	93.2253312	5.112343729	4.609684157	19.62755066	20.22380016	FALSE	0.383044983	FALSE	FALSE
YGL111W	NSA1	91.71197661	97.47799128	891.3333332	397.8741412	0.102893018	0.244997051	FALSE	0.383044983	FALSE	FALSE
YGL112C	TAF6	84.94108719	103.0739538	3.33809221	1	25.44599785	103.0739538	TRUE	0.9588812	TRUE	FALSE
YGL114W	YGL114W	69.68873506	107.5539149	259.9208309	183.4399797	0.268115237	0.586316653	FALSE	0.383044983	FALSE	FALSE
YGL115W	SNF4	362.3048983	423.9086785	13.65850798	3.436682564	26.5259499	123.3482205	TRUE	0.959558824	TRUE	FALSE
YGL116W	CDC20	72.9068028	32.86833771	3.950242777	2.123726845	18.45628406	15.47672564	FALSE	0.411115917	FALSE	FALSE
YGL119W	COQ8	93.5272294	127.0337015	11.5112296	13.63432698	8.12486873	9.317196345	FALSE	0.399264706	FALSE	FALSE
YGL120C	PRP43	52.02530256	39.79718542	40.79194862	26.07257799	1.275381646	1.526400091	FALSE	0.383044983	FALSE	FALSE
YGL122C	NAB2	99.7881463	123.4144032	96.10846816	151.6893867	1.038286721	0.813599461	FALSE	0.383044983	FALSE	FALSE
YGL123W	RPS2	602.8438678	401.2020445	924.2364683	463.1994907	0.652261503	0.866153898	FALSE	0.383044983	FALSE	FALSE
YGL124C	MON1	45.67841423	47.59125655	5.487081728	1.481971145	8.324719131	32.11348393	FALSE	0.890916955	FALSE	FALSE
YGL125W	MET13	16.00407752	25.28126094	88.35854202	163.9668069	0.181126546	0.154185237	FALSE	0.383044983	FALSE	FALSE
YGL126W	SCS3	80.64463529	58.4897344	51.04847664	78.42969014	1.579765756	0.745760111	FALSE	0.577652826	FALSE	FALSE
YGL127C	SOH1	162.2430408	135.218679	87.98222779	120.753497	1.844043336	1.119790998	FALSE	0.383044983	FALSE	FALSE
YGL129C	RSM23	63.65768883	68.16053473	5.583664315	1.357805679	11.40070127	50.19903494	TRUE	0.958679354	TRUE	FALSE
YGL130W	CEG1	85.22276707	111.2506109	20.24944861	10.42023373	4.208646305	10.67640264	FALSE	0.823904268	FALSE	FALSE
YGL131C	SNT2	31.05326557	46.48739431	7.971849196	1	3.895365405	46.48739431	TRUE	0.998918685	TRUE	FALSE
YGL133W	ITC1	46.48514567	53.92808521	12.48830433	16.12820963	3.722294431	3.343711822	FALSE	0.383044983	FALSE	FALSE
YGL135W	RPL1B	584.4962444	394.750032	3.648912183	4.870422031	160.1836973	81.05047766	FALSE	0.563004614	FALSE	FALSE
YGL136C	MRM2	51.90736889	62.28807776	2.659353986	7.592891724	19.51878883	8.203472409	FALSE	0.835265283	FALSE	FALSE
YGL137W	SEC27	133.2620991	124.4025764	105.7937231	83.40121143	1.259640887	1.49161594	FALSE	0.383044983	FALSE	FALSE
YGL139W	FLC3	32.06271187	46.67325857	15.02707636	2.738711077	2.13366267	17.04205273	TRUE	0.988927336	TRUE	FALSE
YGL140C	YGL140C	42.20714366	57.21679722	336.2602276	277.5576167	0.125519286	0.206143855	FALSE	0.383044983	FALSE	FALSE
YGL143C	MRF1	57.02638689	42.76414762	24.94324989	28.9870177	2.286245263	1.475286215	FALSE	0.383044983	FALSE	FALSE
YGL144C	ROG1	33.70720676	40.25293326	2.847743494	3.358490781	11.83646169	11.98542318	FALSE	0.383044983	FALSE	FALSE
YGL145W	TIP20	86.15334961	90.59081967	1.491294544	3.577522789	57.77084744	25.32222016	FALSE	0.840671857	FALSE	FALSE
YGL146C	RRT6	43.82921912	41.92334851	1.75161027	6.671808773	25.02224375	6.283655593	FALSE	0.889085928	FALSE	FALSE
YGL147C	RPL9A	434.1661724	241.9944128	37.35603077	5.384693302	11.62238502	44.9411692	FALSE	0.891969435	FALSE	FALSE
YGL148W	ARO2	126.0194073	66.58671864	274.3554419	149.2387716	0.459328987	0.446175735	FALSE	0.383044983	FALSE	FALSE
YGL149W	YGL149W	1.428765685	1.295314392	3.364629657	4.366537982	0.424642778	0.296645626	FALSE	0.383044983	FALSE	FALSE
YGL150C	INO80	35.35763563	36.56263941	316.9693502	284.4274958	0.111549068	0.128548189	FALSE	0.383044983	FALSE	FALSE
YGL151W	NUT1	53.33722276	62.19338301	5.759460967	2.242292966	9.260801153	27.73651078	FALSE	0.885193195	FALSE	FALSE
YGL153W	PEX14	63.98948535	54.21383103	7.946136321	9.626059433	8.052905558	5.631985903	FALSE	0.44994233	FALSE	FALSE
YGL156W	AMS1	26.21600504	30.95849196	1.467479971	7.753249959	17.86464249	3.992969673	TRUE	0.951658016	FALSE	TRUE
YGL157W	ARI1	89.12952369	101.1164103	35.11453024	84.80955472	2.538251917	1.192276161	FALSE	0.699437716	FALSE	FALSE
YGL158W	RCK1	6.107764417	7.983984618	3.077182944	3.987972679	1.984855801	2.002015876	FALSE	0.383044983	FALSE	FALSE

YGL160W	AIM14	39.21974315	35.17084823	1	3.140573441	39.21974315	11.19886189	FALSE	0.891017878	FALSE	FALSE
YGL161C	YIP5	305.4480517	371.4428558	43.2244791	48.79709009	7.066552518	7.611987827	FALSE	0.383044983	FALSE	FALSE
YGL162W	SUT1	23.39841936	37.87499283	63.27268498	67.36477352	0.370066046	0.562237366	FALSE	0.383044983	FALSE	FALSE
YGL163C	RAD54	39.95934995	72.50302584	21.36401588	25.65028421	1.87040443	2.826597368	FALSE	0.383044983	FALSE	FALSE
YGL164C	YRB30	66.64333363	56.22428141	293.5877797	194.8417549	0.226996279	0.288563822	FALSE	0.383044983	FALSE	FALSE
YGL166W	CUP2	118.8657186	119.4554981	306.2320969	252.0045773	0.38815565	0.474021144	FALSE	0.383044983	FALSE	FALSE
YGL167C	PMR1	71.43678184	96.69501509	5.305694552	9.763096359	13.46417159	9.90413405	FALSE	0.456156286	FALSE	FALSE
YGL169W	SUA5	85.09688264	95.92000255	4.95169198	6.444032416	17.1854152	14.88509001	FALSE	0.405997693	FALSE	FALSE
YGL172W	NUP49	117.5937592	131.4703031	59.6633123	57.06882536	1.97095593	2.303714896	FALSE	0.383044983	FALSE	FALSE
YGL173C	XRN1	70.53187303	55.44691104	112.6020737	52.4539897	0.626381653	1.05705803	FALSE	0.383044983	FALSE	FALSE
YGL174W	BUD13	23.47028574	20.12346105	13.81799987	5.635823572	1.698529886	3.570633607	FALSE	0.699437716	FALSE	FALSE
YGL178W	MPT5	40.78295352	80.86075404	4.973752186	9.613821857	8.199635202	8.410885415	FALSE	0.383044983	FALSE	FALSE
YGL179C	TOS3	25.06834337	44.59021666	3.571451305	2.35559008	7.019091465	18.92953152	FALSE	0.846914648	FALSE	FALSE
YGL180W	ATG1	28.37324995	42.0299229	11.3210958	11.60464872	2.506228234	3.621817767	FALSE	0.428460208	FALSE	FALSE
YGL181W	GTS1	31.38605928	40.15800892	159.584252	197.1867556	0.196673913	0.203654697	FALSE	0.383044983	FALSE	FALSE
YGL184C	STR3	26.58240018	81.08779282	4.598920786	31.18521456	5.780138736	2.600199933	FALSE	0.776081315	FALSE	FALSE
YGL186C	TPN1	74.79342019	103.9512133	44.66425084	25.02069149	1.674570127	4.154609929	FALSE	0.749524221	FALSE	FALSE
YGL189C	RPS26A	273.4538456	155.9774414	50.05683627	9.462504483	5.462867132	16.48373765	FALSE	0.877840254	FALSE	FALSE
YGL190C	CDC55	110.1071361	110.4777824	505.9575197	332.1445293	0.217621306	0.332619606	FALSE	0.383044983	FALSE	FALSE
YGL191W	COX13	961.0977045	878.4423651	3.50333651	1	274.337821	878.4423651	FALSE	0.888696655	FALSE	FALSE
YGL195W	GCN1	43.70750843	46.34734722	493.3119769	239.9404629	0.088600136	0.193161865	FALSE	0.383044983	FALSE	FALSE
YGL197W	MDS3	16.40488019	16.18968889	82.82233308	76.19801689	0.198073147	0.212468638	FALSE	0.383044983	FALSE	FALSE
YGL198W	YIP4	202.0311002	184.7469595	11.27592897	13.51769773	17.91702491	13.66704325	FALSE	0.44433391	FALSE	FALSE
YGL200C	EMP24	442.3220432	343.4741997	38.53375552	18.61311698	11.47881999	18.45334127	FALSE	0.517978662	FALSE	FALSE
YGL201C	MCM6	44.99910155	34.30674523	96.02301191	87.07008325	0.468628307	0.394013006	FALSE	0.383044983	FALSE	FALSE
YGL202W	ARO8	93.08365657	61.53389729	56.92960932	36.60584395	1.635065789	1.68098562	FALSE	0.383044983	FALSE	FALSE
YGL203C	KEX1	58.29363993	70.2237841	292.2667424	268.7434493	0.199453552	0.261304171	FALSE	0.383044983	FALSE	FALSE
YGL206C	CHC1	69.59229132	67.7118942	109.3090029	45.02207849	0.636656538	1.503970862	FALSE	0.577652826	FALSE	FALSE
YGL207W	SPT16	72.65604494	74.18050473	140.1415973	93.85756779	0.518447387	0.790351876	FALSE	0.383044983	FALSE	FALSE
YGL208W	SIP2	25.57353194	24.98462184	46.7412557	54.9318919	0.547129758	0.45482908	FALSE	0.383044983	FALSE	FALSE
YGL209W	MIG2	22.1962293	34.95657849	115.6150097	34.7095961	0.191983977	1.00711568	FALSE	0.577652826	FALSE	FALSE
YGL210W	YPT32	65.7872917	45.81811627	444.5488817	207.4721092	0.147986632	0.220839883	FALSE	0.383044983	FALSE	FALSE
YGL211W	NCS6	244.1720867	245.6491783	16.47348499	11.2659067	14.822127	21.80465228	FALSE	0.479628028	FALSE	FALSE
YGL212W	VAM7	91.8691828	91.27675993	44.1103292	40.99547666	2.082713606	2.226508078	FALSE	0.383044983	FALSE	FALSE
YGL215W	CLG1	50.88361322	52.01273465	74.36000317	62.65988151	0.6842874	0.830080323	FALSE	0.383044983	FALSE	FALSE
YGL216W	KIP3	37.91015252	40.43437979	254.2809607	112.9557287	0.149087656	0.357966615	FALSE	0.383044983	FALSE	FALSE
YGL219C	MDM34	55.28391395	56.39123048	31.46554211	12.48927997	1.756966835	4.515170659	FALSE	0.749524221	FALSE	FALSE
YGL220W	FRA2	482.5685619	403.2816842	25.66080032	11.99714426	18.80567075	33.61480661	FALSE	0.552350058	FALSE	FALSE
YGL221C	NIF3	179.520206	173.8769084	60.13624236	60.30072027	2.985224865	2.883496377	FALSE	0.383044983	FALSE	FALSE
YGL222C	EDC1	46.36994085	54.30016811	7.781568403	1	5.95894535	54.30016811	TRUE	0.995343137	TRUE	FALSE
YGL223C	COG1	53.34286429	53.20705291	4.881624346	3.201611869	10.92727758	16.61883298	FALSE	0.508463091	FALSE	FALSE
YGL225W	VRG4	121.5888052	126.3889605	98.3104665	57.57756574	1.236783931	2.195107746	FALSE	0.383044983	FALSE	FALSE
YGL226W	MTC3	179.8170748	104.4190538	42.84138227	57.07215961	4.19727528	1.829597031	FALSE	0.749524221	FALSE	FALSE
YGL227W	VID30	88.57006379	95.10768262	72.8681944	114.4680342	1.215483168	0.830866742	FALSE	0.383044983	FALSE	FALSE

YGL228W	SHE10	73.24525259	82.67153622	13.93336899	11.52037603	5.256822858	7.176114394	FALSE	0.428460208	FALSE	FALSE
YGL229C	SAP4	16.13336392	19.51986597	5.461117618	5.931462741	2.954223851	3.290902569	FALSE	0.383044983	FALSE	FALSE
YGL233W	SEC15	90.5972322	103.9863038	8.387136108	8.743009689	10.80192703	11.89365076	FALSE	0.393670704	FALSE	FALSE
YGL234W	ADE5,7	105.9884362	116.4911882	269.5514122	83.01458839	0.393203046	1.40326165	FALSE	0.699437716	FALSE	FALSE
YGL236C	MTO1	22.22263761	34.37803064	8.952925725	7.522223764	2.482164858	4.570195159	FALSE	0.487600923	FALSE	FALSE
YGL237C	HAP2	22.00621432	18.54344814	5.493905046	6.933145729	4.005568741	2.67460816	FALSE	0.45227797	FALSE	FALSE
YGL240W	DOC1	53.90032776	56.67387513	3.651561057	2.165342741	14.76090004	26.17316606	FALSE	0.549149366	FALSE	FALSE
YGL241W	KAP114	68.29926469	72.52471728	1.237627957	3.296691463	55.18561884	21.99924321	FALSE	0.854426182	FALSE	FALSE
YGL242C	YGL242C	352.5911096	225.0430829	5.724750765	1	61.59064807	225.0430829	FALSE	0.892358708	FALSE	FALSE
YGL243W	TAD1	128.1079057	112.9023158	4.147177384	1	30.89038492	112.9023158	FALSE	0.892301038	FALSE	FALSE
YGL244W	RTF1	73.30155826	66.57313505	140.5356347	77.09926135	0.521586987	0.863473059	FALSE	0.383044983	FALSE	FALSE
YGL245W	GUS1	165.295494	91.62202649	232.2719621	175.2499966	0.71164635	0.522807579	FALSE	0.383044983	FALSE	FALSE
YGL246C	RAI1	285.9593505	328.1485384	3.189080506	5.427575649	89.66827585	60.45950524	FALSE	0.494420415	FALSE	FALSE
YGL247W	BRR6	250.1278026	227.9884171	13.52465496	6.364513237	18.49420953	35.8218152	FALSE	0.559429066	FALSE	FALSE
YGL248W	PDE1	108.250239	254.0076515	75.28491384	99.06731473	1.43787425	2.563990477	FALSE	0.45227797	FALSE	FALSE
YGL250W	RMR1	125.6605324	89.71925556	11.77918605	2.571344505	10.66801491	34.89196232	FALSE	0.887399077	FALSE	FALSE
YGL251C	HFM1	11.18357921	19.64778228	4.281855734	5.828575454	2.611853342	3.370940711	FALSE	0.383044983	FALSE	FALSE
YGL252C	RTG2	113.6511542	120.382869	18.8442739	6.52970007	6.031071023	18.43620192	FALSE	0.87972895	FALSE	FALSE
YGL253W	HXK2	129.325298	126.786543	872.9492919	271.908594	0.148147549	0.466283692	FALSE	0.383044983	FALSE	FALSE
YGL254W	FZF1	19.26928653	20.4055194	27.81487274	24.12886908	0.692769178	0.84568901	FALSE	0.383044983	FALSE	FALSE
YGL255W	ZRT1	1744.621436	1840.830723	6.126993571	4.336010122	284.7434743	424.5448399	FALSE	0.528863899	FALSE	FALSE
YGL257C	MNT2	109.4961036	88.31773301	4.748904759	1	23.05712773	88.31773301	FALSE	0.892373126	FALSE	FALSE
YGR002C	SWC4	48.27251105	75.9863466	50.38737926	62.68567256	0.958027819	1.212180447	FALSE	0.383044983	FALSE	FALSE
YGR004W	PEX31	39.7122799	42.99436627	22.5679309	3.845001128	1.759677486	11.18188652	TRUE	0.968930219	TRUE	FALSE
YGR005C	TFG2	84.6784171	76.00039158	7.201306714	4.644067989	11.75875719	16.36504715	FALSE	0.463581315	FALSE	FALSE
YGR006W	PRP18	24.77094157	26.21469604	41.5161822	14.08201636	0.596657502	1.861572616	FALSE	0.699437716	FALSE	FALSE
YGR008C	STF2	1567.927462	1239.874936	4.191127422	17.83590943	374.1063691	69.51565556	TRUE	0.965671857	FALSE	TRUE
YGR009C	SEC9	80.05689686	76.86856514	15.66240969	7.913419991	5.111403572	9.713697141	FALSE	0.521583045	FALSE	FALSE
YGR010W	NMA2	32.14001191	37.59028535	8.621483663	9.008799111	3.727898024	4.17261889	FALSE	0.383044983	FALSE	FALSE
YGR012W	YGR012W	87.41580099	79.80977713	48.01209098	31.35916529	1.820703894	2.545022369	FALSE	0.383044983	FALSE	FALSE
YGR013W	SNU71	41.49862585	40.1401452	44.36340238	55.67691125	0.935424778	0.720947773	FALSE	0.383044983	FALSE	FALSE
YGR014W	MSB2	42.55688454	33.59492523	176.5079648	73.01069247	0.241104613	0.460137058	FALSE	0.383044983	FALSE	FALSE
YGR017W	YGR017W	240.2819498	187.6901861	18.61253983	14.9077167	12.90968089	12.59013637	FALSE	0.383044983	FALSE	FALSE
YGR019W	UGA1	105.029413	114.7670506	51.51912255	133.1889823	2.038649104	0.861685769	FALSE	0.699437716	FALSE	FALSE
YGR020C	VMA7	544.9720539	321.2379693	27.00456645	20.59666772	20.18073702	15.5965991	FALSE	0.442704729	FALSE	FALSE
YGR021W	YGR021W	161.8433102	132.7274383	50.84717522	55.94147614	3.182936111	2.372612371	FALSE	0.383044983	FALSE	FALSE
YGR027C	RPS25A	874.8502689	593.5391986	59.08448166	10.48404013	14.80676896	56.61359469	FALSE	0.892257785	FALSE	FALSE
YGR028W	MSP1	257.7446063	293.240623	13.21129762	15.40594632	19.50940882	19.0342493	FALSE	0.383044983	FALSE	FALSE
YGR029W	ERV1	197.3802194	172.2222746	11.13918256	8.930893508	17.71945279	19.28387955	FALSE	0.391104383	FALSE	FALSE
YGR031W	IMO32	90.00390713	96.2988834	37.77047262	37.9607875	2.382917154	2.536798885	FALSE	0.383044983	FALSE	FALSE
YGR032W	GSC2	29.0161512	54.42369996	26.641407	17.63830297	1.089137342	3.085540602	FALSE	0.749524221	FALSE	FALSE
YGR034W	RPL26B	1034.939818	802.366309	19.39039724	30.95868448	53.37383271	25.9173257	FALSE	0.835582468	FALSE	FALSE
YGR036C	CAX4	50.19730105	63.30849093	2.945438483	6.616821971	17.0423865	9.567809322	FALSE	0.539590542	FALSE	FALSE
YGR037C	ACB1	484.9522981	293.270954	58.42944517	32.36363169	8.299792967	9.061744272	FALSE	0.383044983	FALSE	FALSE

YGR038W	ORM1	106.4142119	137.6518407	5.467870923	1	19.46172713	137.6518407	TRUE	0.987730681	TRUE	FALSE
YGR040W	KSS1	67.27201898	87.60397284	14.83670808	12.66543534	4.534160718	6.916775497	FALSE	0.479368512	FALSE	FALSE
YGR041W	BUD9	42.81604028	21.05595001	21.73470982	16.29144618	1.969938437	1.292454321	FALSE	0.383044983	FALSE	FALSE
YGR042W	YGR042W	79.83228262	88.24329298	9.163127669	5.535035183	8.712339881	15.94267969	FALSE	0.54217128	FALSE	FALSE
YGR043C	NQM1	129.8807896	192.3813346	1	15.92512722	129.8807896	12.08036407	TRUE	0.998024798	FALSE	TRUE
YGR044C	RME1	94.41245669	89.98346826	16.49903194	20.78818377	5.722302803	4.328587299	FALSE	0.415383506	FALSE	FALSE
YGR045C	YGR045C	51.58906839	46.95247046	1	10.89821191	51.58906839	4.308272848	TRUE	0.998976355	FALSE	TRUE
YGR047C	TFC4	80.75032724	90.05591252	21.88222546	48.26302599	3.690224626	1.865940037	FALSE	0.45227797	FALSE	FALSE
YGR048W	UFD1	127.8863694	155.4806657	28.26926147	54.97892012	4.523866657	2.828005085	FALSE	0.45227797	FALSE	FALSE
YGR049W	SCM4	22.73865387	14.75831611	34.65654273	19.7015948	0.656114317	0.74909246	FALSE	0.383044983	FALSE	FALSE
YGR051C	YGR051C	1.124491511	1	3.911335224	1	0.28749556	1	FALSE	0.577652826	FALSE	FALSE
YGR054W	YGR054W	54.24421134	53.62964192	49.26611851	59.03460839	1.101044957	0.908444104	FALSE	0.383044983	FALSE	FALSE
YGR055W	MUP1	271.5300851	425.4713553	67.35387917	170.9194572	4.031394902	2.489309072	FALSE	0.45227797	FALSE	FALSE
YGR056W	RSC1	20.34107098	30.15056881	43.78684617	33.82923683	0.464547524	0.891257729	FALSE	0.383044983	FALSE	FALSE
YGR058W	PEF1	22.98781932	32.50622309	13.26931802	12.6448241	1.732403978	2.570713743	FALSE	0.383044983	FALSE	FALSE
YGR061C	ADE6	46.27245333	61.31345418	281.4306411	87.55361963	0.164418676	0.700296052	FALSE	0.577652826	FALSE	FALSE
YGR062C	COX18	64.055577	59.32294747	7.521673926	8.922658936	8.516133194	6.648572797	FALSE	0.415383506	FALSE	FALSE
YGR063C	SPT4	681.0357286	478.8890492	7.100139548	3.677865729	95.91863991	130.2084101	FALSE	0.479455017	FALSE	FALSE
YGR065C	VHT1	111.2633237	121.667965	4.890731019	1.788029153	22.74983499	68.04585083	FALSE	0.88843714	FALSE	FALSE
YGR068C	ART5	15.18580768	21.23256403	8.278324567	12.34856469	1.83440593	1.719435785	FALSE	0.383044983	FALSE	FALSE
YGR069W	YGR069W	11.27704344	5.898306608	1.375681787	7.181485034	8.197421487	0.821321298	TRUE	0.969362745	FALSE	TRUE
YGR070W	ROM1	51.93983488	67.5849333	16.99331471	11.90339917	3.056486376	5.677784333	FALSE	0.487600923	FALSE	FALSE
YGR071C	ENV11	69.11508799	92.88953757	8.769971391	1	7.880879528	92.88953757	TRUE	0.998111303	TRUE	FALSE
YGR072W	UPF3	104.8559352	83.08707371	3.846491434	1	27.26015045	83.08707371	FALSE	0.888480392	FALSE	FALSE
YGR077C	PEX8	43.84373342	42.47313938	21.93246549	32.72572257	1.999033507	1.297851844	FALSE	0.383044983	FALSE	FALSE
YGR078C	PAC10	91.32670255	63.19838921	236.4121537	189.1335025	0.386302908	0.334146983	FALSE	0.383044983	FALSE	FALSE
YGR079W	YGR079W	39.34689757	50.92575668	135.9427778	145.6209806	0.289437204	0.349714419	FALSE	0.383044983	FALSE	FALSE
YGR080W	TWF1	50.25565304	46.1567585	3.018571925	1.363654177	16.64881748	33.84784742	FALSE	0.832915225	FALSE	FALSE
YGR082W	TOM20	82.37144772	58.16243212	11.02267577	8.237076852	7.472908522	7.061052503	FALSE	0.383044983	FALSE	FALSE
YGR083C	GCD2	62.43618387	57.8878386	104.8325181	80.56073493	0.595580312	0.718561451	FALSE	0.383044983	FALSE	FALSE
YGR085C	RPL11B	709.1004914	471.3612065	20.15342411	4.627132531	35.18511234	101.868966	FALSE	0.858362168	FALSE	FALSE
YGR086C	PIL1	278.6807468	161.007579	645.2461473	721.3343889	0.431898351	0.223207962	FALSE	0.383044983	FALSE	FALSE
YGR087C	PDC6	3.402184954	5.309870346	5.54956794	4.120835893	0.613054024	1.288542054	FALSE	0.577652826	FALSE	FALSE
YGR088W	CTT1	92.06529574	95.74743118	1.432036389	36.26732971	64.28977393	2.640046343	TRUE	0.999870242	FALSE	TRUE
YGR089W	NNF2	38.10550102	44.36970196	6.264649196	1.535908397	6.082623277	28.88824754	TRUE	0.957727797	TRUE	FALSE
YGR090W	UTP22	44.30096895	47.7759659	22.45930911	16.70901859	1.972499187	2.859292163	FALSE	0.383044983	FALSE	FALSE
YGR091W	PRP31	26.10455929	24.46704963	8.392700816	3.666361979	3.110388404	6.673386255	FALSE	0.776081315	FALSE	FALSE
YGR092W	DBF2	77.06358158	60.25811596	14.67984195	8.456625901	5.249619298	7.125550623	FALSE	0.428460208	FALSE	FALSE
YGR094W	VAS1	125.5115701	88.51979279	821.3170743	338.4069195	0.152817437	0.261577963	FALSE	0.383044983	FALSE	FALSE
YGR095C	RRP46	114.7222304	110.691554	13.765628	13.29518471	8.333962707	8.325687563	FALSE	0.383044983	FALSE	FALSE
YGR096W	TPC1	20.35650918	18.59495772	8.740296627	15.73913162	2.329040998	1.181447501	FALSE	0.45227797	FALSE	FALSE
YGR097W	ASK10	16.51737836	35.74706345	58.50816234	155.5309106	0.282308958	0.229838965	FALSE	0.383044983	FALSE	FALSE
YGR099W	TEL2	48.86005379	61.74645269	5.430646297	5.01725757	8.99709742	12.3068134	FALSE	0.456156286	FALSE	FALSE
YGR100W	MDR1	64.1832795	85.62695541	47.31833363	91.01588134	1.356414619	0.940791367	FALSE	0.383044983	FALSE	FALSE

YGR101W	PCP1	196.9020282	249.0139265	28.41688988	42.51774892	6.929049206	5.856705324	FALSE	0.402436563	FALSE	FALSE
YGR102C	GTF1	105.7364257	134.0368806	88.01491875	55.59871374	1.201346626	2.410791034	FALSE	0.699437716	FALSE	FALSE
YGR103W	NOT7	203.811303	177.7615943	82.05686601	31.52818095	2.483781223	5.638181111	FALSE	0.776081315	FALSE	FALSE
YGR106C	VOA1	318.9531395	277.1583232	67.11459148	2.275001498	47.5236655	121.8277541	FALSE	0.855060554	FALSE	FALSE
YGR108W	CLB1	216.8515172	84.8156496	173.1638189	14.93179321	1.252291146	5.680205212	FALSE	0.896064014	FALSE	FALSE
YGR109C	CLB6	36.08289611	6.935541629	4.08330649	1	8.836685709	6.935541629	FALSE	0.415383506	FALSE	FALSE
YGR109W-B	YGR109W-B	5.193581723	6.088312351	4.40852487	5.773907648	1.178076993	1.054452673	FALSE	0.383044983	FALSE	FALSE
YGR110W	CLD1	62.57417066	81.36665475	5.965654358	6.292900243	10.48907075	12.92991333	FALSE	0.41816609	FALSE	FALSE
YGR112W	SHY1	27.3407136	26.76318814	2.186051482	4.192807823	12.50689374	6.383118251	FALSE	0.537802768	FALSE	FALSE
YGR113W	DAM1	51.61416035	48.90564921	3.552150949	1	14.53039611	48.90564921	FALSE	0.888826413	FALSE	FALSE
YGR114C	YGR114C	1	1.0163236	3.248137552	1	0.307868735	1.0163236	FALSE	0.577652826	FALSE	FALSE
YGR116W	SPT6	116.2259556	110.0107302	94.61564375	31.59384072	1.228401045	3.482030917	FALSE	0.749524221	FALSE	FALSE
YGR118W	RPS23A	1738.993773	1142.946383	8.846487374	4.087521129	196.5744933	279.6184648	FALSE	0.491796424	FALSE	FALSE
YGR119C	NUP57	186.6938068	129.5218797	283.9315641	225.9687607	0.657531005	0.573184892	FALSE	0.383044983	FALSE	FALSE
YGR121C	MEP1	28.8216526	46.72065015	74.64352525	77.00225885	0.386123947	0.606743891	FALSE	0.383044983	FALSE	FALSE
YGR123C	PPT1	85.57861698	99.04870988	152.4842581	60.56405324	0.561229192	1.63543727	FALSE	0.699437716	FALSE	FALSE
YGR124W	ASN2	281.7610708	158.9461528	334.1454011	236.8471514	0.843228935	0.67109168	FALSE	0.383044983	FALSE	FALSE
YGR125W	YGR125W	47.78167207	74.44872557	7.456872972	5.616242004	6.407735824	13.25596823	FALSE	0.809717416	FALSE	FALSE
YGR128C	UTP8	57.01455446	71.30397322	4.279266358	1	13.32344138	71.30397322	TRUE	0.965556517	TRUE	FALSE
YGR129W	SYF2	298.3275979	265.6713806	180.9891308	64.54645773	1.648317755	4.115971503	FALSE	0.749524221	FALSE	FALSE
YGR130C	YGR130C	75.18595235	67.32781027	355.8054249	663.5318727	0.21131199	0.101468841	FALSE	0.383044983	FALSE	FALSE
YGR132C	PHB1	445.6359858	394.8370135	68.90102601	86.56601945	6.467769953	4.561108573	FALSE	0.428460208	FALSE	FALSE
YGR133W	PEX4	46.46594487	52.17864281	33.6608106	25.44158821	1.380416693	2.050919242	FALSE	0.383044983	FALSE	FALSE
YGR134W	CAF130	26.66817232	44.58972732	9.074009607	9.910568596	2.938962319	4.499209797	FALSE	0.45227797	FALSE	FALSE
YGR136W	LSB1	84.10824769	152.3225495	90.02881414	273.1146423	0.934236983	0.557723849	FALSE	0.383044983	FALSE	FALSE
YGR138C	TPO2	61.53217548	102.9764411	12.7513541	20.00010826	4.825540486	5.148794184	FALSE	0.383044983	FALSE	FALSE
YGR140W	CBF2	20.78652521	23.65403795	32.55208929	1	0.638561938	23.65403795	TRUE	0.998414072	TRUE	FALSE
YGR141W	VPS62	100.9447379	102.3851923	236.6230141	118.7322442	0.426605748	0.862320029	FALSE	0.383044983	FALSE	FALSE
YGR142W	BTN2	61.34306391	829.4865601	7.716036188	7.373895384	7.950074678	112.4896024	TRUE	0.999581892	TRUE	FALSE
YGR143W	SKN1	47.98024659	66.74560432	83.8081806	76.22430952	0.572500754	0.875647215	FALSE	0.383044983	FALSE	FALSE
YGR145W	ENP2	67.48092616	60.02721076	60.5533864	11.08699828	1.114403837	5.414198618	FALSE	0.896064014	FALSE	FALSE
YGR146C-A	YGR146C-A	8.546135483	10.60238818	3.290490121	1.013337736	2.597222654	10.46283761	TRUE	0.931675317	TRUE	FALSE
YGR147C	NAT2	260.6236699	289.845644	47.77777357	46.78210425	5.454914501	6.195652134	FALSE	0.383044983	FALSE	FALSE
YGR148C	RPL24B	286.7972349	144.2614888	137.4084148	74.44790682	2.087188294	1.937750771	FALSE	0.383044983	FALSE	FALSE
YGR155W	CYS4	260.1506683	243.0907341	18.46552531	16.89271	14.08845207	14.39027451	FALSE	0.383044983	FALSE	FALSE
YGR156W	PTI1	14.25411774	12.81935558	44.79423227	47.3747629	0.318213239	0.270594612	FALSE	0.383044983	FALSE	FALSE
YGR157W	CHO2	240.2937542	290.4154423	13.98424916	14.61530244	17.18317169	19.87064198	FALSE	0.405997693	FALSE	FALSE
YGR158C	MTR3	118.2517065	89.485066	3.464967155	1.992804855	34.12780012	44.90407867	FALSE	0.455464245	FALSE	FALSE
YGR159C	NSR1	232.7648655	147.8281452	61.93237313	63.37132608	3.75837149	2.332729238	FALSE	0.45227797	FALSE	FALSE
YGR161C	RTS3	45.81791775	113.60496	5.210075329	16.61368329	8.794098905	6.838035733	FALSE	0.415383506	FALSE	FALSE
YGR161W-C	YGR161W-C	210.7659831	331.0155038	2.387224529	9.575314019	88.28913265	34.56967606	FALSE	0.854916378	FALSE	FALSE
YGR162W	TIF4631	74.24334256	66.77733064	561.397434	311.664995	0.132247385	0.214259964	FALSE	0.383044983	FALSE	FALSE
YGR167W	CLC1	260.8474308	164.3056487	91.4726877	51.03888767	2.851642795	3.219224717	FALSE	0.383044983	FALSE	FALSE
YGR169C	PUS6	67.3495449	58.61217668	6.365106429	3.972678927	10.58105558	14.7538167	FALSE	0.463581315	FALSE	FALSE

YGR169C-A	LSO2	227.2198331	175.6892016	153.3618224	76.25962607	1.481593199	2.303829833	FALSE	0.383044983	FALSE	FALSE
YGR170W	PSD2	29.1724098	29.30890476	197.0388273	320.2441343	0.148054118	0.091520505	FALSE	0.383044983	FALSE	FALSE
YGR173W	RBG2	147.7088166	110.400102	46.01457941	19.00418968	3.210043828	5.80925069	FALSE	0.487600923	FALSE	FALSE
YGR174C	CBP4	185.9317121	107.1399226	41.74802238	41.53354343	4.453665145	2.579599855	FALSE	0.45227797	FALSE	FALSE
YGR175C	ERG1	273.4347044	250.7749514	16.26658587	8.47743221	16.80959401	29.58147528	FALSE	0.549985582	FALSE	FALSE
YGR177C	ATF2	57.73172984	66.38969588	3.991745416	1	14.46277852	66.38969588	TRUE	0.959443483	TRUE	FALSE
YGR178C	PBP1	91.91528287	94.53824324	249.9059956	281.795507	0.367799431	0.335485275	FALSE	0.383044983	FALSE	FALSE
YGR180C	RNR4	149.6652701	164.5798015	750.8024353	281.676979	0.199340416	0.584285596	FALSE	0.383044983	FALSE	FALSE
YGR181W	TIM13	59.34769159	44.45616754	26.70604531	45.53532928	2.22225683	0.976300562	FALSE	0.699437716	FALSE	FALSE
YGR182C	YGR182C	626.9859718	433.6888222	12.62935971	1.700062482	49.64511156	255.1016958	TRUE	0.965657439	TRUE	FALSE
YGR184C	UBR1	34.85866047	55.1467986	68.78445742	92.94584923	0.506781063	0.5933218	FALSE	0.383044983	FALSE	FALSE
YGR185C	TYS1	90.26905423	65.67080006	24.56355949	4.437992614	3.674917483	14.79741085	TRUE	0.947923875	TRUE	FALSE
YGR186W	TFG1	152.0373636	145.2265666	66.79274616	56.00362051	2.276255617	2.593163894	FALSE	0.383044983	FALSE	FALSE
YGR187C	HGH1	128.0246396	139.1462792	35.31047498	18.63786703	3.625684436	7.465783452	FALSE	0.776081315	FALSE	FALSE
YGR188C	BUB1	40.21234457	41.58440823	7.118373709	6.95417492	5.649091522	5.979775992	FALSE	0.383044983	FALSE	FALSE
YGR189C	CRH1	177.5297614	159.5174575	98.2868269	132.4081896	1.80624166	1.204740115	FALSE	0.383044983	FALSE	FALSE
YGR191W	HIP1	86.53967517	100.4040219	43.11907207	64.15912063	2.006992985	1.564922039	FALSE	0.383044983	FALSE	FALSE
YGR192C	TDH3	1564.416903	1797.997512	2799.524403	2586.6563	0.558815241	0.695104917	FALSE	0.383044983	FALSE	FALSE
YGR194C	XKS1	61.67227851	66.68390566	17.4450354	54.16115706	3.535233784	1.231212723	FALSE	0.749524221	FALSE	FALSE
YGR195W	SKI6	180.9384235	156.7277973	17.93669141	8.631086449	10.08761423	18.1585248	FALSE	0.544852941	FALSE	FALSE
YGR196C	FYV8	76.40053766	81.9436787	86.60747191	61.16053932	0.882147186	1.339812886	FALSE	0.383044983	FALSE	FALSE
YGR197C	SNG1	27.12569011	36.80772941	7.120679911	13.46172386	3.809424163	2.734250813	FALSE	0.428460208	FALSE	FALSE
YGR199W	PMT6	69.8948413	75.33275809	36.73209544	11.26927847	1.902827499	6.684789829	FALSE	0.831055363	FALSE	FALSE
YGR200C	ELP2	96.57115994	84.73227683	44.1034884	29.27408202	2.189649015	2.89444693	FALSE	0.383044983	FALSE	FALSE
YGR201C	YGR201C	39.12036308	36.83048799	10.9977661	45.77451546	3.55711903	0.804606835	FALSE	0.827537486	FALSE	FALSE
YGR202C	PCT1	55.37895793	64.14396871	196.0365023	202.3008034	0.282493093	0.317072239	FALSE	0.383044983	FALSE	FALSE
YGR203W	YCH1	96.83003948	70.9380231	14.80435328	19.50108897	6.540646365	3.637644196	FALSE	0.487600923	FALSE	FALSE
YGR204W	ADE3	59.32470484	55.10899353	868.7463511	844.3987598	0.068287717	0.065264181	FALSE	0.383044983	FALSE	FALSE
YGR208W	SER2	127.0864032	135.6737365	27.46069774	19.57091836	4.627937877	6.932415436	FALSE	0.479368512	FALSE	FALSE
YGR209C	TRX2	1849.435124	1543.940738	96.83189337	205.7359737	19.09944193	7.504476297	FALSE	0.844694348	FALSE	FALSE
YGR210C	YGR210C	197.3187832	294.709176	506.5710308	332.8842635	0.38951849	0.88532024	FALSE	0.577652826	FALSE	FALSE
YGR211W	ZPR1	66.53295317	198.9517794	67.46456772	37.47815996	0.986191054	5.308472443	TRUE	0.901672434	TRUE	FALSE
YGR214W	RPS0A	197.4802657	78.50731579	680.2478373	321.727078	0.290306348	0.244018366	FALSE	0.383044983	FALSE	FALSE
YGR215W	RSM27	621.8863539	519.7594868	84.2138269	94.72441241	7.384611017	5.487070056	FALSE	0.428460208	FALSE	FALSE
YGR216C	GPI1	65.42107268	90.60830348	3.423908172	1.170653571	19.10713413	77.39975831	TRUE	0.958823529	TRUE	FALSE
YGR217W	CCH1	23.13409771	30.4614768	11.93979061	8.013718542	1.9375631	3.801166292	FALSE	0.45227797	FALSE	FALSE
YGR218W	CRM1	87.05989465	131.6755726	5.961912276	3.036434464	14.60267958	43.36519498	FALSE	0.857598039	FALSE	FALSE
YGR221C	TOS2	10.33160419	11.23991911	11.44484654	6.851037557	0.902729814	1.640615603	FALSE	0.383044983	FALSE	FALSE
YGR223C	HSV2	61.02006852	74.9378322	3.362574923	5.247894218	18.14682793	14.27960037	FALSE	0.43627451	FALSE	FALSE
YGR227W	DIE2	24.01195561	30.30937175	4.379903069	3.207085506	5.482302972	9.450752622	FALSE	0.504801038	FALSE	FALSE
YGR229C	SMI1	181.8316107	130.7294771	58.66656165	35.12737629	3.099408004	3.721583872	FALSE	0.383044983	FALSE	FALSE
YGR231C	PHB2	226.3330232	187.4915521	57.85119978	73.86425302	3.91233067	2.538325975	FALSE	0.45227797	FALSE	FALSE
YGR232W	NAS6	329.4396754	345.594405	7.710215825	11.71422265	42.72768531	29.50212024	FALSE	0.489042676	FALSE	FALSE
YGR237C	YGR237C	32.81798431	38.49357962	8.232776927	8.185974127	3.986259388	4.702382272	FALSE	0.383044983	FALSE	FALSE

YGR238C	KEL2	32.67876757	37.95579229	2.429301687	4.692814831	13.4519182	8.088065193	FALSE	0.513912918	FALSE	FALSE
YGR239C	PEX21	58.57939306	82.59534126	1.099351747	21.06300547	53.28539588	3.921346427	TRUE	0.998990773	FALSE	TRUE
YGR240C	PFK1	117.4624711	141.4383677	346.9926411	116.897469	0.338515741	1.209935244	FALSE	0.577652826	FALSE	FALSE
YGR241C	YAP1802	16.34919749	21.74944412	220.5501607	176.4346226	0.074129157	0.123271974	FALSE	0.383044983	FALSE	FALSE
YGR244C	LSC2	188.353379	84.37702164	274.2910173	514.8543235	0.686691751	0.163885235	FALSE	0.577652826	FALSE	FALSE
YGR245C	SDA1	55.75720876	40.54266584	254.9023331	78.6947134	0.218739499	0.515189192	FALSE	0.383044983	FALSE	FALSE
YGR246C	BRF1	64.11974911	62.04056907	3.769205991	1	17.01147384	62.04056907	FALSE	0.892200115	FALSE	FALSE
YGR247W	CPD1	161.1171437	117.808844	11.28089285	8.795657542	14.28230424	13.39397804	FALSE	0.383044983	FALSE	FALSE
YGR248W	SOL4	216.9882072	165.152585	2.055602819	23.87196049	105.5594034	6.91826652	TRUE	0.999581892	FALSE	TRUE
YGR250C	YGR250C	63.67325333	184.2162338	13.63323362	17.47384438	4.67044394	10.54239867	FALSE	0.803662053	FALSE	FALSE
YGR251W	NOP19	86.55273949	70.42039159	10.19311899	3.272657689	8.491290998	21.51779938	FALSE	0.848010381	FALSE	FALSE
YGR252W	GCN5	92.29826322	81.87564519	15.00938874	12.42727021	6.149368558	6.588385367	FALSE	0.383044983	FALSE	FALSE
YGR253C	PUP2	1154.984619	1060.857525	17.54560554	17.9870462	65.82757238	58.97897368	FALSE	0.404238754	FALSE	FALSE
YGR254W	ENO1	565.4128165	837.7785927	235.2869911	349.8226138	2.403077254	2.394866883	FALSE	0.383044983	FALSE	FALSE
YGR255C	COQ6	105.4548139	98.63279384	13.92981206	23.44980204	7.570440535	4.206124797	FALSE	0.508693772	FALSE	FALSE
YGR256W	GND2	27.14654801	59.04846989	1	70.5790618	27.14654801	0.836628717	TRUE	0.998861015	FALSE	TRUE
YGR257C	MTM1	304.1090775	370.6858021	65.51096654	70.72701185	4.64210946	5.241078231	FALSE	0.383044983	FALSE	FALSE
YGR258C	RAD2	68.30109136	69.81644163	83.2156864	163.4097013	0.820771832	0.427247838	FALSE	0.383044983	FALSE	FALSE
YGR260W	TNA1	64.19564397	122.2437826	9.253832471	18.93519722	6.937195391	6.455902264	FALSE	0.383044983	FALSE	FALSE
YGR261C	APL6	36.88332156	35.83063491	29.98741367	17.49054758	1.229960075	2.048571364	FALSE	0.383044983	FALSE	FALSE
YGR262C	BUD32	137.7613692	107.5803098	4.592956221	1.270123438	29.99405231	84.70067288	FALSE	0.858304498	FALSE	FALSE
YGR264C	MES1	139.4680503	172.4146136	3.296177747	1.262226895	42.31205385	136.595579	FALSE	0.888653403	FALSE	FALSE
YGR266W	YGR266W	47.36704242	43.162385	4.479346851	1	10.57454223	43.162385	TRUE	0.958304498	TRUE	FALSE
YGR267C	FOL2	375.9820321	290.5963518	40.10654922	31.05273986	9.37457945	9.358154969	FALSE	0.383044983	FALSE	FALSE
YGR268C	HUA1	19.28474688	32.75387951	23.93189086	31.51901249	0.805817935	1.039178481	FALSE	0.383044983	FALSE	FALSE
YGR269W	YGR269W	18.04963622	23.83853827	1	15.18615507	18.04963622	1.569754698	TRUE	0.993555363	FALSE	TRUE
YGR270W	YTA7	57.94162519	62.45480366	102.3127416	123.5006642	0.566318762	0.505704192	FALSE	0.383044983	FALSE	FALSE
YGR271W	SLH1	29.0653629	33.52284179	22.0735024	30.03152757	1.316753561	1.116254966	FALSE	0.383044983	FALSE	FALSE
YGR274C	TAF1	59.64125922	74.0890697	134.3687374	121.9692479	0.443862616	0.607440572	FALSE	0.383044983	FALSE	FALSE
YGR275W	RTT102	201.5373469	188.9847302	29.30428255	18.31620458	6.877402528	10.31789798	FALSE	0.493886967	FALSE	FALSE
YGR277C	CAB4	188.4383186	205.8110646	23.00690063	26.4941433	8.190512996	7.768172093	FALSE	0.383044983	FALSE	FALSE
YGR278W	CWC22	55.34365901	85.03358012	68.26491667	48.10481644	0.810718913	1.767672895	FALSE	0.577652826	FALSE	FALSE
YGR279C	SCW4	126.4660685	52.80330712	4980.765834	2568.250943	0.025390888	0.020560026	FALSE	0.383044983	FALSE	FALSE
YGR280C	PXR1	73.40283704	42.58346065	945.5693687	168.0844319	0.077628188	0.253345656	FALSE	0.383044983	FALSE	FALSE
YGR281W	YOR1	46.39235045	61.35303069	67.30482515	55.84675402	0.68928714	1.098596181	FALSE	0.383044983	FALSE	FALSE
YGR282C	BGL2	334.9408982	405.6231643	6.438936464	7.03182378	52.01804678	57.68392056	FALSE	0.402753749	FALSE	FALSE
YGR283C	YGR283C	54.18865408	51.76712607	19.76502592	21.85572806	2.741643461	2.368583921	FALSE	0.383044983	FALSE	FALSE
YGR285C	ZUO1	87.69790108	51.24550258	1322.868307	931.427151	0.06629375	0.055018262	FALSE	0.383044983	FALSE	FALSE
YGR286C	BIO2	69.76632438	59.03326444	14.35027116	3.639504477	4.861672898	16.22013788	FALSE	0.878489043	FALSE	FALSE
YGR287C	IMA1	13.37954306	19.70634235	8.461599341	15.25633191	1.581207349	1.291682854	FALSE	0.383044983	FALSE	FALSE
YHL001W	RPL14B	1076.405342	737.6023366	10.27365562	8.989230705	104.7733524	82.05400004	FALSE	0.452595156	FALSE	FALSE
YHL002W	HSE1	73.02790432	98.87280588	24.37777575	14.76665115	2.995675449	6.695682379	FALSE	0.776081315	FALSE	FALSE
YHL004W	MRP4	52.14452179	45.93611142	33.28971211	31.63352039	1.566385483	1.452134029	FALSE	0.383044983	FALSE	FALSE
YHL006C	SHU1	41.17873019	40.83242721	14.57191697	11.24569154	2.82589657	3.630939641	FALSE	0.383044983	FALSE	FALSE

YHL006W-A	YHL006W-A	3.705104233	8.58420216	8.725838089	14.0444226	0.424612994	0.611217876	FALSE	0.383044983	FALSE	FALSE
YHL007C	STE20	43.48767553	45.16513248	414.5468301	439.3935238	0.104904132	0.102789709	FALSE	0.383044983	FALSE	FALSE
YHL008C	YHL008C	49.5836295	133.1739953	11.93029397	23.31031885	4.156111295	5.713091966	FALSE	0.428460208	FALSE	FALSE
YHL010C	ETP1	45.51081957	54.18658194	10.36258104	4.908519817	4.391842091	11.03929167	FALSE	0.823904268	FALSE	FALSE
YHL011C	PRS3	237.6691628	225.005391	1	3.757263516	237.6691628	59.88544325	FALSE	0.892502884	FALSE	FALSE
YHL013C	OTU2	104.6478087	91.22714221	1	3.874678	104.6478087	23.54444478	TRUE	0.95893887	FALSE	TRUE
YHL014C	YLF2	107.3263444	87.53900566	7.747930029	9.187264292	13.85226042	9.528299489	FALSE	0.470357555	FALSE	FALSE
YHL015W	RPS20	1303.643286	826.6653983	40.1245421	9.097636215	32.48992308	90.8659545	FALSE	0.857958478	FALSE	FALSE
YHL016C	DUR3	17.88674866	19.80634263	55.62944939	63.99425791	0.321533807	0.309501872	FALSE	0.383044983	FALSE	FALSE
YHL017W	YHL017W	119.6678381	162.1986364	19.2705439	4.240573414	6.209883784	38.24922257	TRUE	0.98539504	TRUE	FALSE
YHL019C	APM2	23.60764158	35.53778397	44.23022509	48.39962333	0.53374455	0.734257449	FALSE	0.383044983	FALSE	FALSE
YHL020C	OPI1	82.58265656	73.07492158	271.8431081	245.8685225	0.303787935	0.297211375	FALSE	0.383044983	FALSE	FALSE
YHL021C	AIM17	39.5087438	70.69192195	23.51332966	149.7716525	1.680270058	0.47199801	FALSE	0.699437716	FALSE	FALSE
YHL023C	NPR3	36.08411887	38.31962333	13.73510007	7.012967241	2.627146413	5.464109843	FALSE	0.749524221	FALSE	FALSE
YHL024W	RIM4	24.56116248	19.1213077	2.372077817	9.570492548	10.35428193	1.997943951	TRUE	0.944059977	FALSE	TRUE
YHL025W	SNF6	86.36094804	77.89779586	209.1660129	262.822436	0.412882317	0.296389445	FALSE	0.383044983	FALSE	FALSE
YHL026C	YHL026C	9.607997087	9.337741095	6.138721229	6.65650944	1.565146344	1.402798446	FALSE	0.383044983	FALSE	FALSE
YHL027W	RIM101	85.70996446	126.2828073	132.4863265	116.3950885	0.646934417	1.084949622	FALSE	0.383044983	FALSE	FALSE
YHL028W	WSC4	52.02498943	16.86046193	46.76354933	12.42884842	1.112511565	1.356558658	FALSE	0.383044983	FALSE	FALSE
YHL029C	OCA5	65.83037891	87.43372149	169.5207471	138.2629849	0.388332284	0.632372587	FALSE	0.383044983	FALSE	FALSE
YHL030W	ECM29	106.7209227	109.9249951	47.16728398	63.8110689	2.262604792	1.722663434	FALSE	0.383044983	FALSE	FALSE
YHL031C	GOS1	26.99984439	23.78983665	17.83423032	15.17661174	1.513933817	1.567532797	FALSE	0.383044983	FALSE	FALSE
YHL032C	GUT1	25.62320206	27.60296726	81.37408965	84.26327942	0.314881582	0.327580026	FALSE	0.383044983	FALSE	FALSE
YHL033C	RPL8A	459.0340615	282.5801429	179.6746796	77.70390858	2.554806624	3.636627141	FALSE	0.428460208	FALSE	FALSE
YHL034C	SBP1	199.9932929	129.8827109	239.95299	196.9078842	0.833468643	0.659611531	FALSE	0.383044983	FALSE	FALSE
YHL036W	MUP3	29.83952318	125.4394771	3.297283471	4.066955593	9.049729404	30.84358171	FALSE	0.887283737	FALSE	FALSE
YHL038C	CBP2	79.52632072	90.94297657	19.83893156	17.07608084	4.008598975	5.325752285	FALSE	0.415383506	FALSE	FALSE
YHL047C	ARN2	35.67082636	49.99788404	16.68719253	13.09041632	2.137616995	3.81942658	FALSE	0.45227797	FALSE	FALSE
YHL050C	YHL050C	11.51814399	9.464331521	12.89359329	1.13654069	0.893323043	8.327314279	TRUE	0.966983852	TRUE	FALSE
YHR001W	OSH7	93.32971461	92.405008	43.49469531	54.98397795	2.145772351	1.680580624	FALSE	0.383044983	FALSE	FALSE
YHR002W	LEU5	69.40688274	95.09344375	2.572080273	5.768578313	26.98472651	16.48472788	FALSE	0.529873126	FALSE	FALSE
YHR003C	TCD1	180.4165561	170.9393268	2.148117003	3.363245249	83.98823523	50.82570973	FALSE	0.538393887	FALSE	FALSE
YHR005C	GPA1	251.2090262	209.1234424	5.854868447	4.644362869	42.90600694	45.02736938	FALSE	0.388119954	FALSE	FALSE
YHR005C-A	TIM10	1057.864193	710.2732451	5.946866116	11.5348234	177.8859944	61.57642997	FALSE	0.858463091	FALSE	FALSE
YHR006W	STP2	73.13593201	113.9207499	16.85846442	18.93384311	4.33823213	6.016779017	FALSE	0.428460208	FALSE	FALSE
YHR007C	ERG11	112.891324	150.7004379	3.891581006	3.116781218	29.0091158	48.35130457	FALSE	0.547246251	FALSE	FALSE
YHR007C-A	YHR007C-A	56.67437215	49.54577551	3.218338125	7.364595245	17.6098253	6.727562596	FALSE	0.843094002	FALSE	FALSE
YHR008C	SOD2	113.2449451	82.43513646	147.5699107	317.0660529	0.767398615	0.259993575	FALSE	0.577652826	FALSE	FALSE
YHR009C	TDA3	57.33876637	53.11777799	14.87946586	29.54413151	3.853550048	1.797912995	FALSE	0.749524221	FALSE	FALSE
YHR010W	RPL27A	1296.359778	990.7547778	41.37321572	11.98951438	31.33330963	82.63510481	FALSE	0.855348904	FALSE	FALSE
YHR011W	DIA4	38.7972212	37.53803723	10.91197432	1.381850715	3.555472187	27.16504526	TRUE	0.98615917	TRUE	FALSE
YHR012W	VPS29	222.8066685	171.3385122	61.90571729	77.80197967	3.5991291	2.202238465	FALSE	0.45227797	FALSE	FALSE
YHR013C	ARD1	155.7952406	75.36670268	45.67270398	32.24052274	3.411123648	2.337638979	FALSE	0.428460208	FALSE	FALSE
YHR016C	YSC84	70.22581356	65.63846876	118.992163	381.2811048	0.590171754	0.17215243	FALSE	0.383044983	FALSE	FALSE

YHR017W	YSC83	62.610289	90.47737474	8.696607253	2.120696499	7.199392496	42.66399025	TRUE	0.965470012	TRUE	FALSE
YHR018C	ARG4	439.2438332	176.0678421	29.39014878	7.873127328	14.94527423	22.36313916	FALSE	0.515873702	FALSE	FALSE
YHR019C	DED81	75.97429348	41.81881673	285.6986426	86.84380628	0.265924587	0.481540579	FALSE	0.383044983	FALSE	FALSE
YHR020W	YHR020W	92.7847486	78.36558075	311.555338	92.72358653	0.297811455	0.845152606	FALSE	0.577652826	FALSE	FALSE
YHR021C	RPS27B	966.0005291	692.9775938	33.96279549	11.11746955	28.44290392	62.33231317	FALSE	0.83761534	FALSE	FALSE
YHR023W	MYO1	81.10189536	74.13173577	5.30015016	2.021983801	15.30181088	36.66287324	FALSE	0.843598616	FALSE	FALSE
YHR024C	MAS2	104.246649	91.72864074	26.83171772	29.50883463	3.885202213	3.108514514	FALSE	0.383044983	FALSE	FALSE
YHR025W	THR1	32.70197212	22.88147547	1455.002292	940.7675377	0.022475547	0.024322135	FALSE	0.383044983	FALSE	FALSE
YHR026W	VMA16	225.1841542	216.4990897	76.59554348	33.47123043	2.939911959	6.468214251	FALSE	0.776081315	FALSE	FALSE
YHR027C	RPN1	168.1904442	193.5309165	1568.768577	1505.682285	0.107211763	0.128533701	FALSE	0.383044983	FALSE	FALSE
YHR028C	DAP2	66.43149849	76.84266797	19.90337164	38.13338454	3.337700752	2.015102224	FALSE	0.45227797	FALSE	FALSE
YHR029C	YHI9	38.69775532	23.43860416	3.584095961	5.799479623	10.79707567	4.041501252	FALSE	0.825663206	FALSE	FALSE
YHR030C	SLT2	53.08527347	127.2185686	291.7106315	751.0771857	0.181979221	0.169381484	FALSE	0.383044983	FALSE	FALSE
YHR031C	RRM3	49.41674241	48.29876704	14.78619661	21.30882609	3.342086117	2.266608533	FALSE	0.428460208	FALSE	FALSE
YHR032W	ERC1	40.89903145	48.80798046	326.1999199	338.6171857	0.125380262	0.144139112	FALSE	0.383044983	FALSE	FALSE
YHR032W-A	YHR032W-A	26.31310136	37.43458594	15.57014943	20.0181135	1.689971023	1.870035652	FALSE	0.383044983	FALSE	FALSE
YHR033W	YHR033W	17.18562498	4.570260215	30.70063657	72.26552196	0.559780737	0.06324261	FALSE	0.577652826	FALSE	FALSE
YHR034C	PIH1	65.19312871	74.55003645	18.14282347	19.50330971	3.593328724	3.822430016	FALSE	0.383044983	FALSE	FALSE
YHR036W	BRL1	26.91346547	24.07308867	60.91242644	45.89094856	0.44183867	0.524571608	FALSE	0.383044983	FALSE	FALSE
YHR037W	PUT2	62.53578415	85.94051184	10.66592402	6.370537171	5.863137973	13.49030852	FALSE	0.818497693	FALSE	FALSE
YHR039C	MSC7	89.43630157	97.57231794	38.92792241	12.00870426	2.297484582	8.125132892	FALSE	0.847303922	FALSE	FALSE
YHR039C-A	VMA10	755.9164395	564.1037861	7.167826175	6.695545609	105.45965	84.25060765	FALSE	0.449927912	FALSE	FALSE
YHR040W	BCD1	33.15748593	29.40046019	142.3833353	107.4291553	0.232874766	0.273673009	FALSE	0.383044983	FALSE	FALSE
YHR041C	SRB2	42.47700066	33.81323068	199.4864909	188.6335172	0.212931715	0.179253566	FALSE	0.383044983	FALSE	FALSE
YHR042W	NCP1	35.31033343	28.38460614	492.8262732	258.0173044	0.071648642	0.110010475	FALSE	0.383044983	FALSE	FALSE
YHR043C	DOG2	139.6372616	78.09644507	3.172952106	5.066622257	44.00862572	15.41390716	FALSE	0.857583622	FALSE	FALSE
YHR046C	INM1	159.027413	126.765768	85.21469553	104.8383456	1.866197045	1.209154601	FALSE	0.383044983	FALSE	FALSE
YHR047C	AAP1	46.48073195	62.02696854	288.4620897	90.78621637	0.161132896	0.683220108	FALSE	0.577652826	FALSE	FALSE
YHR048W	YHK8	12.96986325	23.68790475	15.16258432	6.850888903	0.855386059	3.457639598	FALSE	0.827537486	FALSE	FALSE
YHR049W	FSH1	69.38296965	142.5907565	6.146087293	1	11.28896587	142.5907565	TRUE	0.999120531	TRUE	FALSE
YHR050W	SMF2	76.00254115	88.80204451	24.15192314	16.7942578	3.146852559	5.287643285	FALSE	0.487600923	FALSE	FALSE
YHR051W	COX6	542.6720563	384.8387753	2.149373367	3.741801526	252.4791944	102.848527	FALSE	0.846006344	FALSE	FALSE
YHR057C	CPR2	207.1640885	164.6181107	64.14048618	92.83766519	3.229849052	1.773182364	FALSE	0.45227797	FALSE	FALSE
YHR058C	MED6	71.39001511	82.57629252	14.47439402	9.147160808	4.932159165	9.027532614	FALSE	0.521583045	FALSE	FALSE
YHR060W	VMA22	253.2997449	176.1627574	16.18097591	1	15.65416983	176.1627574	TRUE	0.998168973	TRUE	FALSE
YHR061C	GIC1	16.26978575	16.63759375	4.623135976	1	3.519209868	16.63759375	TRUE	0.952249135	TRUE	FALSE
YHR062C	RPP1	59.23545894	60.51849828	8.824111776	7.440090708	6.712908953	8.134107588	FALSE	0.407151096	FALSE	FALSE
YHR064C	SSZ1	189.8508851	148.7088212	40.29459343	8.481146829	4.711572173	17.5340463	FALSE	0.883376586	FALSE	FALSE
YHR065C	RRP3	191.3122944	205.9911127	44.18568367	11.63592605	4.329734848	17.70302697	TRUE	0.951600346	TRUE	FALSE
YHR066W	SSF1	105.7695724	81.09695218	19.07007845	11.53843448	5.546362733	7.028419004	FALSE	0.415383506	FALSE	FALSE
YHR068W	DYS1	88.76759173	67.30961026	28.67589957	7.135585344	3.09554689	9.432948667	FALSE	0.855204729	FALSE	FALSE
YHR069C	RRP4	211.0445668	201.4861537	61.50479924	45.53871364	3.431351202	4.42450253	FALSE	0.383044983	FALSE	FALSE
YHR070C-A	YHR070C-A	1.241044646	1.285859543	4.17865993	1	0.296995847	1.285859543	FALSE	0.577652826	FALSE	FALSE
YHR070W	TRM5	15.88501688	11.53866061	250.4495926	192.0687213	0.063426004	0.060075688	FALSE	0.383044983	FALSE	FALSE

YHR071C-A	YHR071C-A	24.9700171	40.74792752	16.89437612	8.068935923	1.478007647	5.049975351	FALSE	0.808232411	FALSE	FALSE
YHR071W	PCL5	196.5298259	164.4824006	9.176198783	14.25169448	21.41734618	11.54125222	FALSE	0.549019608	FALSE	FALSE
YHR072W	ERG7	64.1070767	78.99648239	90.37483338	56.94181812	0.709346555	1.387319285	FALSE	0.383044983	FALSE	FALSE
YHR073W	OSH3	43.53507796	37.10549553	12.19486656	4.861797832	3.569951154	7.632052344	FALSE	0.791565744	FALSE	FALSE
YHR074W	QNS1	86.01369248	106.0056313	26.60438105	18.9306228	3.233064972	5.599690639	FALSE	0.487600923	FALSE	FALSE
YHR076W	PTC7	112.1954867	104.980713	10.85241143	4.474152224	10.33830015	23.46382235	FALSE	0.83428489	FALSE	FALSE
YHR077C	NMD2	65.20152539	70.06105993	196.9143532	151.0915499	0.331116165	0.463699393	FALSE	0.383044983	FALSE	FALSE
YHR080C	YHR080C	37.64256219	35.72989061	54.90220578	35.60613076	0.685629323	1.003475802	FALSE	0.383044983	FALSE	FALSE
YHR082C	KSP1	81.40357809	159.102335	5.895501148	10.10647384	13.80774527	15.74261582	FALSE	0.399264706	FALSE	FALSE
YHR083W	SAM35	70.73256057	88.48174859	28.88980772	44.17567686	2.448356917	2.002951735	FALSE	0.383044983	FALSE	FALSE
YHR084W	STE12	43.32540123	39.05495093	7.583480009	4.576053536	5.71312922	8.53463593	FALSE	0.479368512	FALSE	FALSE
YHR085W	IP1	156.4647699	150.132738	32.57147037	32.35845202	4.80373677	4.639676147	FALSE	0.383044983	FALSE	FALSE
YHR086W	NAM8	50.29309742	77.74358329	28.90659058	40.14450465	1.739848817	1.936593413	FALSE	0.383044983	FALSE	FALSE
YHR087W	RTC3	628.2614393	980.6917788	14.98026086	261.2529431	41.93928565	3.75380184	TRUE	0.997851788	FALSE	TRUE
YHR088W	RPF1	192.5889258	144.4713154	471.4496781	265.9390965	0.408503674	0.543249628	FALSE	0.383044983	FALSE	FALSE
YHR089C	GAR1	265.1747496	233.030832	481.7752002	176.1556281	0.550411788	1.32286907	FALSE	0.577652826	FALSE	FALSE
YHR090C	YNG2	91.9206248	91.50503651	9.224617643	20.73503555	9.964708388	4.413063883	FALSE	0.803662053	FALSE	FALSE
YHR091C	MSR1	43.44867572	76.93443402	13.38062387	7.506943509	3.247133777	10.24843652	FALSE	0.862658593	FALSE	FALSE
YHR094C	HXT1	33.47715603	48.35991632	17.0583697	3.542705397	1.962506184	13.65056106	TRUE	0.97482699	TRUE	FALSE
YHR096C	HXT5	30.76062647	85.18494212	4.667721232	13.20562271	6.5900736	6.450656964	FALSE	0.383044983	FALSE	FALSE
YHR097C	YHR097C	50.96060711	52.68082458	57.91808005	95.72995227	0.879873902	0.5503066	FALSE	0.383044983	FALSE	FALSE
YHR098C	SFB3	43.14565106	39.25777577	40.8765795	49.99991917	1.055510309	0.785156785	FALSE	0.383044983	FALSE	FALSE
YHR099W	TRA1	23.46533036	25.96577892	281.365412	113.291335	0.083398063	0.229194748	FALSE	0.383044983	FALSE	FALSE
YHR100C	GEP4	61.76723048	58.48414122	3.310726825	2.622858954	18.65669798	22.2978598	FALSE	0.422159746	FALSE	FALSE
YHR102W	KIC1	27.18752093	30.10737227	41.66358915	31.41127137	0.6525487	0.958489452	FALSE	0.383044983	FALSE	FALSE
YHR103W	SBE22	73.94909285	74.55422674	226.1801652	216.325014	0.326947736	0.344639879	FALSE	0.383044983	FALSE	FALSE
YHR104W	GRE3	106.116344	206.9106777	5.67331548	31.92693484	18.70446733	6.480756098	FALSE	0.849697232	FALSE	FALSE
YHR105W	YPT35	14.57340998	12.90494618	3.826846923	8.262392049	3.808203013	1.561889838	FALSE	0.749524221	FALSE	FALSE
YHR106W	TRR2	91.06610902	101.3064253	11.82558757	21.02456896	7.700768225	4.818478112	FALSE	0.479368512	FALSE	FALSE
YHR107C	CDC12	48.51850137	61.63537651	163.1628135	39.93113607	0.297362495	1.543541772	FALSE	0.699437716	FALSE	FALSE
YHR108W	GGA2	39.45928983	50.72946298	955.4327671	696.6376453	0.041299913	0.072820444	FALSE	0.383044983	FALSE	FALSE
YHR111W	UBA4	86.69141085	113.1476214	9.825942268	14.55068563	8.822707124	7.776102393	FALSE	0.396957901	FALSE	FALSE
YHR113W	APE4	105.6151742	106.5587351	66.15384516	89.39993539	1.596508471	1.191933021	FALSE	0.383044983	FALSE	FALSE
YHR114W	BZZ1	53.97984928	50.50091664	92.66751242	77.31863419	0.582511043	0.653153243	FALSE	0.383044983	FALSE	FALSE
YHR115C	DMA1	73.27477921	81.74458885	32.60009872	31.1788948	2.247685807	2.621792381	FALSE	0.383044983	FALSE	FALSE
YHR116W	COX23	30.52106696	26.65620671	40.23243348	65.96431136	0.758618466	0.404100432	FALSE	0.383044983	FALSE	FALSE
YHR117W	TOM71	36.2817186	38.60441675	73.88307761	64.49426903	0.4910694	0.598571274	FALSE	0.383044983	FALSE	FALSE
YHR118C	ORC6	70.91724353	72.82875462	29.46472453	6.124294666	2.40685242	11.89177834	TRUE	0.942805652	TRUE	FALSE
YHR119W	SET1	24.40136176	28.59996662	3.568685236	1.428524725	6.837633512	20.02063116	FALSE	0.851326413	FALSE	FALSE
YHR120W	MSH1	39.49495309	44.04068934	6.475429947	3.244746312	6.099201662	13.57292223	FALSE	0.817156863	FALSE	FALSE
YHR122W	CIA2	323.1904929	354.9831425	7.279056799	4.304885448	44.40005097	82.4605316	FALSE	0.561144752	FALSE	FALSE
YHR124W	NDT80	7.774032395	12.97376995	6.855107354	12.61994648	1.134049694	1.028036844	FALSE	0.383044983	FALSE	FALSE
YHR127W	YHR127W	95.86197959	78.87615263	18.94500374	8.48289187	5.06001376	9.298262178	FALSE	0.521583045	FALSE	FALSE
YHR128W	FUR1	279.4915877	223.247734	13.89032657	2.048831424	20.1213115	108.9634469	TRUE	0.965614187	TRUE	FALSE

YHR131C	YHR131C	29.42652897	38.60676175	116.5084379	123.1301517	0.252569938	0.313544337	FALSE	0.383044983	FALSE	FALSE
YHR132C	ECM14	51.50849468	55.58732019	123.4774525	146.9327679	0.417148991	0.378318063	FALSE	0.383044983	FALSE	FALSE
YHR132W-A	IGO2	354.9508568	367.6730277	9.444261459	1	37.58376007	367.6730277	TRUE	0.99550173	TRUE	FALSE
YHR133C	NSG1	121.1955385	142.0764704	7.052396692	1	17.18501437	142.0764704	TRUE	0.995155709	TRUE	FALSE
YHR134W	WSS1	105.7921614	111.5697463	28.53483634	38.20733155	3.707473913	2.920113544	FALSE	0.383044983	FALSE	FALSE
YHR135C	YCK1	38.34870716	43.06019162	116.9688917	65.63483389	0.327853898	0.656056991	FALSE	0.383044983	FALSE	FALSE
YHR136C	SPL2	15.48628578	34.28671117	4.947902424	3.028599885	3.129868871	11.3209775	FALSE	0.870977509	FALSE	FALSE
YHR137W	ARO9	205.6533082	175.3059346	1.913178492	5.177589714	107.4930066	33.85859914	FALSE	0.888581315	FALSE	FALSE
YHR140W	YHR140W	12.85293797	33.7645285	1	3.583052704	12.85293797	9.42339711	FALSE	0.456156286	FALSE	FALSE
YHR141C	RPL42B	1500.017027	1032.280831	3.942807293	1	380.4439112	1032.280831	FALSE	0.857497116	FALSE	FALSE
YHR142W	CHS7	128.9539905	184.0817457	20.47026256	17.79607877	6.29957677	10.34394981	FALSE	0.506257209	FALSE	FALSE
YHR143W	DSE2	71.22791382	44.5810659	44.9902583	18.07105377	1.583185261	2.466987618	FALSE	0.383044983	FALSE	FALSE
YHR144C	DCD1	104.3729309	89.20701931	3.30718403	1.558390609	31.55945662	57.24304215	FALSE	0.558535179	FALSE	FALSE
YHR146W	CRP1	216.2035215	175.9737415	42.28982115	21.33992314	5.112424588	8.246221902	FALSE	0.496568627	FALSE	FALSE
YHR148W	IMP3	122.5011274	109.3836686	5.221687384	4.24095592	23.46006537	25.79222013	FALSE	0.397188581	FALSE	FALSE
YHR149C	SKG6	62.39137879	33.01553718	203.8378859	46.6464422	0.306083329	0.707782537	FALSE	0.383044983	FALSE	FALSE
YHR150W	PEX28	56.82792341	66.97222069	1.985803649	3.718024487	28.61709083	18.01285089	FALSE	0.525086505	FALSE	FALSE
YHR151C	MTC6	69.82516168	69.11129049	16.51369875	8.886120219	4.228317517	7.777442661	FALSE	0.508693772	FALSE	FALSE
YHR152W	SPO12	166.2541311	87.06894905	75.52610149	41.02624592	2.201280456	2.122274342	FALSE	0.383044983	FALSE	FALSE
YHR154W	RTT107	51.73038931	28.00346353	6.457140607	1	8.011346268	28.00346353	FALSE	0.888941753	FALSE	FALSE
YHR155W	YSP1	22.05577101	27.8076281	16.88860739	9.067932695	1.305955577	3.0665896	FALSE	0.699437716	FALSE	FALSE
YHR158C	KEL1	84.58415493	51.90374804	294.4743989	267.2580522	0.28723772	0.19420836	FALSE	0.383044983	FALSE	FALSE
YHR159W	TDA11	37.80429124	45.08720077	3.004777203	2.668176572	12.58139579	16.89813232	FALSE	0.46156286	FALSE	FALSE
YHR161C	YAP1801	36.35738384	51.35779447	105.6528288	104.9179072	0.344121253	0.489504565	FALSE	0.383044983	FALSE	FALSE
YHR162W	MPC2	967.2633779	755.4672095	26.49877574	17.43096727	36.50219118	43.34052138	FALSE	0.421107266	FALSE	FALSE
YHR163W	SOL3	159.5302613	157.1371796	64.0965752	49.94278002	2.488904606	3.146344267	FALSE	0.383044983	FALSE	FALSE
YHR164C	DNA2	22.93342477	31.40393213	29.70327304	14.1867283	0.772084098	2.213613418	FALSE	0.699437716	FALSE	FALSE
YHR165C	PRP8	23.96704127	20.61556709	44.49275896	32.15062725	0.53867285	0.641218192	FALSE	0.383044983	FALSE	FALSE
YHR165W-A	YHR165W-A	1.868385895	1.693872667	8.893809511	7.106446242	0.210077121	0.238357205	FALSE	0.383044983	FALSE	FALSE
YHR166C	CDC23	60.81938775	57.03515111	8.861890241	2.345839118	6.863026521	24.31332596	FALSE	0.887961361	FALSE	FALSE
YHR168W	MTG2	86.53254675	85.87510138	11.39540447	13.26211407	7.593635397	6.475219633	FALSE	0.402436563	FALSE	FALSE
YHR169W	DBP8	53.30089762	51.48275027	134.8792369	66.53377205	0.395174964	0.773783729	FALSE	0.383044983	FALSE	FALSE
YHR170W	NMD3	195.0141278	157.4094003	230.6621556	153.5107791	0.845453505	1.0253964	FALSE	0.383044983	FALSE	FALSE
YHR172W	SPC97	28.0325908	24.6927166	87.28814272	15.69645085	0.321150043	1.573140122	FALSE	0.699437716	FALSE	FALSE
YHR174W	ENO2	1057.237676	1260.991518	5819.037392	6729.035592	0.181686008	0.187395579	FALSE	0.383044983	FALSE	FALSE
YHR175W	CTR2	123.3626371	96.65772345	3.032845124	1	40.6755479	96.65772345	FALSE	0.845054787	FALSE	FALSE
YHR177W	YHR177W	3.317002272	8.536521282	11.47044282	4.627417748	0.289178223	1.844769966	FALSE	0.752926759	FALSE	FALSE
YHR178W	STB5	27.29249719	41.49532692	78.8750618	53.15292871	0.34602188	0.780678091	FALSE	0.383044983	FALSE	FALSE
YHR179W	OYE2	853.7498491	1245.769424	202.1719763	77.35240301	4.222889169	16.10511602	FALSE	0.881516724	FALSE	FALSE
YHR182W	YHR182W	8.312653276	12.83119321	7.160628282	13.38867431	1.160883228	0.95836174	FALSE	0.383044983	FALSE	FALSE
YHR183W	GND1	205.3165447	176.7020311	99.13049191	72.14160222	2.071174477	2.449377692	FALSE	0.383044983	FALSE	FALSE
YHR186C	KOG1	21.38930091	22.92490312	26.68154566	13.13879832	0.801651493	1.74482495	FALSE	0.577652826	FALSE	FALSE
YHR187W	IKI1	88.45903156	79.84150778	3.234540349	5.578394296	27.34825416	14.31263255	FALSE	0.556732987	FALSE	FALSE
YHR188C	GPI16	30.13269167	24.86749235	341.0107984	312.8113933	0.088362867	0.07949676	FALSE	0.383044983	FALSE	FALSE

YHR189W	PTH1	16.91329431	16.83230535	207.633786	256.4131222	0.081457332	0.065645257	FALSE	0.383044983	FALSE	FALSE
YHR191C	CTF8	124.8890482	108.1297522	60.9257467	55.5352634	2.04985667	1.947046716	FALSE	0.383044983	FALSE	FALSE
YHR192W	LNP1	39.26289069	47.98698767	23.37681373	2.016740788	1.679565536	23.79432595	TRUE	0.99772203	TRUE	FALSE
YHR193C	EGD2	383.7664629	196.547305	688.6064772	523.6329371	0.557308819	0.375353212	FALSE	0.383044983	FALSE	FALSE
YHR194W	MDM31	27.38796014	46.31865603	97.66357183	141.682472	0.280431686	0.326918746	FALSE	0.383044983	FALSE	FALSE
YHR195W	NVJ1	174.9261788	177.8040253	24.66620223	22.29816515	7.09173537	7.973930775	FALSE	0.383044983	FALSE	FALSE
YHR197W	RIX1	56.97109661	54.87792703	20.43758799	11.85214648	2.787564591	4.630209991	FALSE	0.45227797	FALSE	FALSE
YHR199C	AIM46	85.05060809	142.3179832	199.9257222	349.0873644	0.425411034	0.407685863	FALSE	0.383044983	FALSE	FALSE
YHR199C-A	NBL1	32.82299545	32.13780033	18.59978103	15.85654473	1.76469795	2.026784578	FALSE	0.383044983	FALSE	FALSE
YHR200W	RPN10	174.6280973	145.0559508	119.5595267	183.6061692	1.460595422	0.790038545	FALSE	0.383044983	FALSE	FALSE
YHR201C	PPX1	272.4885912	173.8390024	7.00672031	6.048429223	38.88960585	28.74118155	FALSE	0.474625144	FALSE	FALSE
YHR203C	RPS4B	538.9009684	356.3597764	598.5338051	153.1197093	0.900368473	2.327327932	FALSE	0.699437716	FALSE	FALSE
YHR204W	MNL1	18.71199023	22.76632874	9.489845198	1.683810687	1.971790882	13.52071758	TRUE	0.97482699	TRUE	FALSE
YHR205W	SCH9	26.40878536	29.41384222	79.98056598	42.77305994	0.330190029	0.687672153	FALSE	0.383044983	FALSE	FALSE
YHR206W	SKN7	16.49157951	25.09541688	25.01953545	10.7727105	0.65914811	2.329535996	FALSE	0.699437716	FALSE	FALSE
YHR207C	SET5	72.59051462	80.30949233	6.495215302	4.791541707	11.17599821	16.76067897	FALSE	0.508463091	FALSE	FALSE
YHR208W	BAT1	59.73618559	52.0887341	115.7681123	12.56903118	0.515998615	4.14421234	FALSE	0.897419262	FALSE	FALSE
YHR209W	CRG1	41.92350817	73.60224794	1	3.228461638	41.92350817	22.79793171	FALSE	0.558261246	FALSE	FALSE
YHR210C	YHR210C	33.94780688	40.82134071	17.14988726	10.14188259	1.979476971	4.025025959	FALSE	0.749524221	FALSE	FALSE
YHR211W	FLO5	3.047413797	3.642770773	14.63703844	11.2492965	0.208198797	0.323822096	FALSE	0.383044983	FALSE	FALSE
YHR216W	IMD2	28.97067824	13.19539738	5.006774498	2.819096904	5.786295798	4.680717913	FALSE	0.407151096	FALSE	FALSE
YHR217C	YHR217C	1	1	1	3.070262095	1	0.325705093	FALSE	0.577652826	FALSE	FALSE
YIL002C	INP51	36.39505238	35.66970298	7.779319849	7.908786921	4.678436302	4.510135795	FALSE	0.383044983	FALSE	FALSE
YIL003W	CFD1	105.2524054	146.6524995	11.34155515	6.071753536	9.280244558	24.15323657	FALSE	0.849408881	FALSE	FALSE
YIL006W	YIA6	8.702481897	12.36436466	20.70410692	17.16133777	0.42032636	0.720477903	FALSE	0.383044983	FALSE	FALSE
YIL007C	NAS2	103.2008444	121.5602738	3.855356333	7.198129287	26.76817278	16.88775915	FALSE	0.523313149	FALSE	FALSE
YIL008W	URM1	394.6965203	271.2906464	5.90911098	1	66.79456887	271.2906464	TRUE	0.95893887	TRUE	FALSE
YIL009W	FAA3	179.0397586	170.5863823	32.00495279	14.40550888	5.594126627	11.84174636	FALSE	0.809717416	FALSE	FALSE
YIL010W	DOT5	134.3767356	126.2091977	10.35975912	1.857280612	12.97102896	67.95375824	TRUE	0.965527682	TRUE	FALSE
YIL011W	TIR3	6.20719314	3.751614277	5.558475409	8.516296034	1.116707853	0.440521826	FALSE	0.577652826	FALSE	FALSE
YIL013C	PDR11	8.342898774	18.40227104	1.193193386	4.061451166	6.992075944	4.530959574	FALSE	0.479368512	FALSE	FALSE
YIL017C	VID28	77.50356502	77.57275433	6.165848048	9.639692112	12.56981431	8.047223234	FALSE	0.50239331	FALSE	FALSE
YIL018W	RPL2B	433.4875087	253.018078	2245.643102	1016.847721	0.193034908	0.248825928	FALSE	0.383044983	FALSE	FALSE
YIL019W	FAF1	100.1659447	61.30159352	27.98424278	7.792592828	3.579369486	7.866649121	FALSE	0.791565744	FALSE	FALSE
YIL020C	HIS6	108.9297502	116.1531158	42.76715948	38.03758469	2.547041971	3.053640675	FALSE	0.383044983	FALSE	FALSE
YIL021W	RPB3	310.3511969	256.0986794	11.85336265	11.29243512	26.18254466	22.67878244	FALSE	0.409486736	FALSE	FALSE
YIL022W	TIM44	53.5820205	47.60880075	90.66571204	104.8897584	0.59098439	0.453893702	FALSE	0.383044983	FALSE	FALSE
YIL023C	YKE4	67.96724828	156.3634849	40.23479394	57.20987734	1.689265475	2.733155396	FALSE	0.45227797	FALSE	FALSE
YIL026C	IRR1	24.60555465	21.58032041	4.341093102	1.969828389	5.668055042	10.95543172	FALSE	0.531040946	FALSE	FALSE
YIL029W-A	YIL029W-A	1	3.551668495	3.881089504	1.265637827	0.257659608	2.806228149	FALSE	0.844910611	FALSE	FALSE
YIL030C	SSM4	45.11868848	57.31962446	169.7611664	134.6691582	0.265777442	0.425632901	FALSE	0.383044983	FALSE	FALSE
YIL033C	BCY1	71.11963864	59.77705076	140.2076724	231.2953642	0.507244985	0.258444656	FALSE	0.383044983	FALSE	FALSE
YIL036W	CST6	95.95813886	104.783885	42.13719892	26.5794577	2.277278541	3.942288297	FALSE	0.45227797	FALSE	FALSE
YIL038C	NOT3	124.4630733	144.1714323	37.12753567	28.83410886	3.352311729	5.000030795	FALSE	0.45227797	FALSE	FALSE

YIL039W	TED1	62.56727703	60.02169898	3.921029343	1	15.95684999	60.02169898	FALSE	0.892272203	FALSE	FALSE
YIL040W	APQ12	181.0318074	141.3104133	4.714169973	1.535908397	38.40162923	92.00445391	FALSE	0.8455594	FALSE	FALSE
YIL041W	GVP36	97.97312827	63.70411639	1016.665252	732.3418233	0.096367145	0.086986861	FALSE	0.383044983	FALSE	FALSE
YIL042C	PKP1	30.49962595	24.75198236	28.56516913	36.37985563	1.067720825	0.680376047	FALSE	0.383044983	FALSE	FALSE
YIL043C	CBR1	309.1096959	216.0311709	582.3949223	360.5200519	0.530756166	0.599220958	FALSE	0.383044983	FALSE	FALSE
YIL044C	AGE2	83.7524286	67.46032013	39.50165976	24.88483191	2.120225558	2.710901177	FALSE	0.383044983	FALSE	FALSE
YIL046W	MET30	95.56458652	147.3748497	238.9838298	346.6256761	0.399878881	0.425170032	FALSE	0.383044983	FALSE	FALSE
YIL047C	SYG1	84.59463712	146.8022978	77.98933664	103.1467898	1.084694918	1.42323671	FALSE	0.383044983	FALSE	FALSE
YIL048W	NEO1	15.20171961	17.54746216	9.63677141	9.241049645	1.577470189	1.898860285	FALSE	0.383044983	FALSE	FALSE
YIL051C	MMF1	426.8877855	314.6194451	219.8344566	241.8596603	1.941860217	1.300834727	FALSE	0.383044983	FALSE	FALSE
YIL052C	RPL34B	781.628519	472.173948	396.483015	104.3055044	1.9714048	4.526836343	FALSE	0.749524221	FALSE	FALSE
YIL053W	GPP1	328.3371851	374.9599726	1417.827763	1442.109296	0.231577624	0.260008013	FALSE	0.383044983	FALSE	FALSE
YIL054W	YIL054W	3.437124996	3.323825611	8.600574533	5.059604419	0.399638999	0.65693389	FALSE	0.383044983	FALSE	FALSE
YIL055C	YIL055C	38.63810131	47.40685668	8.027525783	22.24733688	4.81320177	2.130900293	FALSE	0.749524221	FALSE	FALSE
YIL056W	VHR1	17.24103365	23.36011603	3.28036496	1.706610775	5.255827891	13.68801626	FALSE	0.835942907	FALSE	FALSE
YIL061C	SNP1	23.72415578	21.8008728	22.90860031	27.64973283	1.035600406	0.788465948	FALSE	0.383044983	FALSE	FALSE
YIL062C	ARC15	492.3618727	395.5138036	59.95467815	55.7461817	8.21223444	7.094903931	FALSE	0.399264706	FALSE	FALSE
YIL063C	YRB2	278.7312763	262.6328913	68.82589381	21.29612353	4.049802492	12.33242712	FALSE	0.86810842	FALSE	FALSE
YIL064W	EFM4	123.0455223	96.78709635	39.21062851	9.691140633	3.138065544	9.987172822	FALSE	0.855204729	FALSE	FALSE
YIL065C	FIS1	222.9607168	159.7886549	64.70479036	129.6822295	3.445814685	1.232155366	FALSE	0.749524221	FALSE	FALSE
YIL066C	RNR3	3.601474881	5.467120056	12.24991947	22.04009575	0.293999882	0.248053371	FALSE	0.383044983	FALSE	FALSE
YIL067C	YIL067C	69.28987515	100.6644328	12.52091649	13.42634028	5.533929981	7.49753326	FALSE	0.428460208	FALSE	FALSE
YIL069C	RPS24B	317.5431734	222.7940755	37.98003601	6.670065109	8.360791794	33.40208407	TRUE	0.957684544	TRUE	FALSE
YIL074C	SER33	68.1126041	80.39768395	4.114634083	1	16.55374518	80.39768395	TRUE	0.959486736	TRUE	FALSE
YIL075C	RPN2	174.8244337	248.3690039	623.9503623	752.257098	0.28018965	0.330165052	FALSE	0.383044983	FALSE	FALSE
YIL077C	YIL077C	124.5474186	169.988829	4.557206116	1	27.32977519	169.988829	TRUE	0.986029412	TRUE	FALSE
YIL078W	THS1	366.0867024	340.7610888	28.339318	9.070412184	12.91797856	37.56842378	FALSE	0.857050173	FALSE	FALSE
YIL084C	SDS3	63.09220175	70.49195703	18.98898015	16.65094251	3.322569261	4.233511525	FALSE	0.383044983	FALSE	FALSE
YIL085C	KTR7	103.0173157	116.3082298	58.57331055	32.50879652	1.758775708	3.577746402	FALSE	0.699437716	FALSE	FALSE
YIL087C	AIM19	48.27057737	64.94607985	5.652195792	7.478455799	8.540146014	8.684423844	FALSE	0.383044983	FALSE	FALSE
YIL088C	AVT7	92.55549924	122.3452144	180.3059988	198.9651055	0.51332457	0.614907896	FALSE	0.383044983	FALSE	FALSE
YIL091C	UTP25	72.53063694	62.88912841	77.48957403	52.86452754	0.936005106	1.189628118	FALSE	0.383044983	FALSE	FALSE
YIL092W	YIL092W	35.05433789	40.49798405	13.69971168	7.000964561	2.558764644	5.784629203	FALSE	0.776081315	FALSE	FALSE
YIL093C	RSM25	256.730323	158.3802904	139.6267753	100.7902955	1.838689767	1.571384323	FALSE	0.383044983	FALSE	FALSE
YIL094C	LYS12	277.6260719	214.9943329	41.86209032	12.40875	6.631920904	17.32602662	FALSE	0.843094002	FALSE	FALSE
YIL098C	FMC1	192.599446	132.122068	17.09494642	19.93586338	11.26645508	6.627356211	FALSE	0.516133218	FALSE	FALSE
YIL099W	SGA1	25.12809176	44.28091128	1.938464927	11.74429449	12.96288182	3.770419016	FALSE	0.872981546	FALSE	FALSE
YIL101C	XBP1	14.50594049	19.91345984	39.51095668	92.03205134	0.367137162	0.216375269	FALSE	0.383044983	FALSE	FALSE
YIL104C	SHQ1	101.1723606	107.3275067	17.4740767	5.27455283	5.789854443	20.34817172	FALSE	0.885697809	FALSE	FALSE
YIL106W	MOB1	115.8162	117.1622148	69.6067808	49.54247405	1.663863759	2.364884214	FALSE	0.383044983	FALSE	FALSE
YIL108W	YIL108W	44.70991154	63.6283704	440.8266218	509.5322845	0.101422894	0.124876033	FALSE	0.383044983	FALSE	FALSE
YIL109C	SEC24	91.96812125	83.94811011	198.0057072	226.8041522	0.464472073	0.370134803	FALSE	0.383044983	FALSE	FALSE
YIL111W	COX5B	514.2240496	430.2659452	39.92947699	108.1748244	12.87830666	3.977505371	FALSE	0.86810842	FALSE	FALSE
YIL112W	HOS4	48.60044012	58.99177207	48.25673219	45.24599526	1.007122487	1.30380096	FALSE	0.383044983	FALSE	FALSE

YIL113W	SDP1	121.2137592	119.3292964	4.227786075	19.0669894	28.67074092	6.258423596	TRUE	0.957727797	FALSE	TRUE
YIL114C	POR2	63.04808574	74.49435751	132.4194474	76.31076694	0.476124066	0.976197206	FALSE	0.577652826	FALSE	FALSE
YIL115C	NUP159	45.35279766	35.96204133	77.35395473	39.61502172	0.586302249	0.907788	FALSE	0.383044983	FALSE	FALSE
YIL118W	RHO3	307.4863873	296.1356697	28.27567302	14.62906169	10.87459128	20.24297088	FALSE	0.549019608	FALSE	FALSE
YIL120W	QDR1	38.50067531	58.87709178	6.188967616	1.17779504	6.220855835	49.98925092	TRUE	0.994982699	TRUE	FALSE
YIL121W	QDR2	95.00897115	64.31724981	45.77225828	28.48430691	2.075688959	2.257988934	FALSE	0.383044983	FALSE	FALSE
YIL122W	POG1	25.53106862	41.16303066	23.69643953	23.99262897	1.077422142	1.7156532	FALSE	0.383044983	FALSE	FALSE
YIL123W	SIM1	40.17617217	27.79087525	562.5808862	408.5223392	0.071414037	0.068027798	FALSE	0.383044983	FALSE	FALSE
YIL124W	AYR1	189.7477541	145.5707349	70.08555567	15.91172158	2.707373186	9.148647689	FALSE	0.855204729	FALSE	FALSE
YIL125W	KGD1	52.00003266	43.56340108	138.8661339	100.4992395	0.374461585	0.433469957	FALSE	0.383044983	FALSE	FALSE
YIL126W	STH1	70.97393538	71.37182302	109.4882771	71.96767189	0.648233193	0.991720604	FALSE	0.383044983	FALSE	FALSE
YIL127C	RRT14	140.3365406	118.2928661	45.26218467	19.90111071	3.10052512	5.944033364	FALSE	0.487600923	FALSE	FALSE
YIL129C	TAO3	22.2555651	19.6024608	37.08054691	22.06469479	0.600195168	0.888408427	FALSE	0.383044983	FALSE	FALSE
YIL130W	ASG1	114.1457932	72.65572791	22.94369757	15.19802846	4.97503913	4.780602174	FALSE	0.383044983	FALSE	FALSE
YIL131C	FKH1	27.7946479	22.61058071	60.48019245	7.790968996	0.459566129	2.902152572	FALSE	0.827537486	FALSE	FALSE
YIL133C	RPL16A	211.0715546	140.9302059	13.20123672	5.030795235	15.98877128	28.01350469	FALSE	0.549855825	FALSE	FALSE
YIL134W	FLX1	112.4924008	123.5115486	16.26142672	21.84054597	6.917744839	5.655149318	FALSE	0.407151096	FALSE	FALSE
YIL135C	VHS2	25.90087358	35.17208371	41.44880081	54.69016163	0.62488837	0.643115373	FALSE	0.383044983	FALSE	FALSE
YIL136W	OM45	138.2747825	103.842133	54.36624337	293.8164583	2.543394098	0.353425174	FALSE	0.827537486	FALSE	FALSE
YIL137C	TMA108	22.05760751	28.64737554	588.8254864	466.6377923	0.037460348	0.061391032	FALSE	0.383044983	FALSE	FALSE
YIL138C	TPM2	700.1833808	496.9529637	4.071200556	1	171.9844973	496.9529637	FALSE	0.858477509	FALSE	FALSE
YIL142W	CCT2	191.7360253	176.5798094	181.0725742	168.0483517	1.058890481	1.050767875	FALSE	0.383044983	FALSE	FALSE
YIL143C	SSL2	52.17534024	66.63502404	47.06768008	57.30204666	1.108517355	1.162873369	FALSE	0.383044983	FALSE	FALSE
YIL144W	NDC80	83.85326697	141.2866045	42.15625844	15.51936614	1.989106009	9.103890151	TRUE	0.932266436	TRUE	FALSE
YIL145C	PAN6	246.5726947	224.1813154	7.710273262	5.843525979	31.97976081	38.36404874	FALSE	0.427869089	FALSE	FALSE
YIL146C	ATG32	8.753211656	17.5331801	20.92488306	8.769116888	0.418315918	1.999423696	FALSE	0.752926759	FALSE	FALSE
YIL147C	SLN1	38.11446018	38.08924484	45.21143627	28.81572922	0.843026971	1.321821306	FALSE	0.383044983	FALSE	FALSE
YIL148W	RPL40A	812.0816182	547.2653102	107.3781253	37.36968901	7.562821722	14.64463111	FALSE	0.543137255	FALSE	FALSE
YIL149C	MLP2	67.35864792	70.67482052	9.379752892	5.551725429	7.181281714	12.73024421	FALSE	0.528460208	FALSE	FALSE
YIL150C	MCM10	25.2656729	30.10473695	32.98213481	20.47325768	0.766041163	1.47044195	FALSE	0.383044983	FALSE	FALSE
YIL151C	ESL1	38.15915214	36.87768178	13.16661639	4.458532561	2.89817452	8.271259945	FALSE	0.816262976	FALSE	FALSE
YIL152W	YIL152W	51.04810276	70.35313509	7.244166985	12.64608514	7.046787142	5.563234336	FALSE	0.415383506	FALSE	FALSE
YIL153W	RRD1	35.20057995	39.90488857	98.03940125	147.8173823	0.359045236	0.269960731	FALSE	0.383044983	FALSE	FALSE
YIL154C	IMP2'	31.07874175	19.16468038	77.68634075	127.6056542	0.400054134	0.150186765	FALSE	0.383044983	FALSE	FALSE
YIL155C	GUT2	110.9073867	97.90584015	64.15544124	220.192047	1.728729233	0.444638403	FALSE	0.699437716	FALSE	FALSE
YIL156W	UBP7	20.64113261	23.04741299	255.4179316	258.2431959	0.08081317	0.089246932	FALSE	0.383044983	FALSE	FALSE
YIL157C	COA1	262.272311	217.0894586	27.05750817	7.217809136	9.693143555	30.0769187	FALSE	0.885986159	FALSE	FALSE
YIL158W	AIM20	84.83383372	40.60336725	52.56446527	31.6984115	1.613900822	1.280927508	FALSE	0.383044983	FALSE	FALSE
YIL159W	BNR1	26.56611195	23.04454675	25.11585867	24.06882117	1.057742532	0.957443931	FALSE	0.383044983	FALSE	FALSE
YIL160C	POT1	13.07423144	9.903887077	34.27180788	103.5041528	0.381486483	0.095685891	FALSE	0.383044983	FALSE	FALSE
YIL161W	YIL161W	194.106294	183.4406679	22.31762333	3.317863877	8.697444666	55.28878661	TRUE	0.985870819	TRUE	FALSE
YIL162W	SUC2	14.99265755	16.02981939	5.294527675	1.158915833	2.831727109	13.83173733	TRUE	0.948572664	TRUE	FALSE
YIL164C	NIT1	97.15606655	90.94402349	65.73676362	109.9359107	1.47795634	0.827245828	FALSE	0.383044983	FALSE	FALSE
YIL168W	YIL168W	37.19255672	77.41527424	2.313458118	8.109201188	16.07660689	9.546596815	FALSE	0.529411765	FALSE	FALSE

YIL169C	YIL169C	1.365647522	1.370744347	1100.49255	1080.995085	0.001240942	0.001268039	FALSE	0.383044983	FALSE	FALSE
YIL170W	HXT12	3.712295119	4.423300676	5.671911247	19.35817569	0.65450515	0.228497806	FALSE	0.383044983	FALSE	FALSE
YIL173W	VTH1	16.25013565	19.46314335	6.114139311	16.17133325	2.657796105	1.203558362	FALSE	0.699437716	FALSE	FALSE
YIR001C	SGN1	35.12714358	38.77686193	20.33678992	21.0839056	1.727270809	1.839168827	FALSE	0.383044983	FALSE	FALSE
YIR002C	MPH1	50.82611127	75.27679195	92.20354092	37.14240784	0.551238171	2.026707376	FALSE	0.699437716	FALSE	FALSE
YIR003W	AIM21	23.7532295	24.15761342	198.1907678	205.8963062	0.119850333	0.117329028	FALSE	0.383044983	FALSE	FALSE
YIR004W	DJP1	130.3641447	105.4738911	77.30942988	40.4915573	1.686264469	2.604836616	FALSE	0.383044983	FALSE	FALSE
YIR006C	PAN1	27.32309366	21.7973162	979.3189986	1349.229158	0.027900096	0.016155385	FALSE	0.383044983	FALSE	FALSE
YIR007W	YIR007W	12.0968828	18.42224914	4.446506717	7.006379426	2.720536269	2.629353624	FALSE	0.383044983	FALSE	FALSE
YIR008C	PRI1	127.1322676	113.4316291	14.66602497	23.59110355	8.668488415	4.808237516	FALSE	0.508693772	FALSE	FALSE
YIR009W	MSL1	37.73472227	36.96272141	139.5378409	113.3577777	0.270426445	0.326071331	FALSE	0.383044983	FALSE	FALSE
YIR010W	DSN1	35.44428424	29.61488296	14.71062991	7.698785256	2.409433482	3.846695546	FALSE	0.45227797	FALSE	FALSE
YIR011C	STS1	197.4241633	232.5898906	213.1997268	241.0885119	0.926005705	0.964748958	FALSE	0.383044983	FALSE	FALSE
YIR012W	SQT1	203.3642898	181.7697896	47.80450096	39.81745232	4.254082475	4.565078351	FALSE	0.383044983	FALSE	FALSE
YIR014W	YIR014W	18.89145738	22.83591299	2.03952823	9.665135563	9.262660405	2.362710057	FALSE	0.857598039	FALSE	FALSE
YIR015W	RPR2	47.40546006	49.5078094	26.74725111	20.69248681	1.772348862	2.392550004	FALSE	0.383044983	FALSE	FALSE
YIR016W	YIR016W	269.2793611	200.6665996	30.07961381	33.25073647	8.952221356	6.034952031	FALSE	0.44994233	FALSE	FALSE
YIR017W-A	YIR017W-A	3.643352495	2.422237914	1	16.37272926	3.643352495	0.147943441	FALSE	0.897419262	FALSE	FALSE
YIR018W	YAP5	69.51003135	79.66710064	63.23147574	35.01260046	1.099294782	2.275383708	FALSE	0.699437716	FALSE	FALSE
YIR019C	FLO11	1	1.030191564	9.454461845	8.755309392	0.105770166	0.117664781	FALSE	0.383044983	FALSE	FALSE
YIR022W	SEC11	143.4208601	93.32431789	100.5945471	32.83734534	1.425731953	2.842017737	FALSE	0.699437716	FALSE	FALSE
YIR023W	DAL81	22.83817939	26.17041993	170.2590307	92.04643778	0.134137845	0.284317574	FALSE	0.383044983	FALSE	FALSE
YIR025W	MND2	43.24629791	45.83096127	12.21669468	12.77873984	3.539934413	3.586500848	FALSE	0.383044983	FALSE	FALSE
YIR026C	YVH1	55.96455614	42.83409511	23.08130046	7.542161028	2.424670838	5.67928674	FALSE	0.776081315	FALSE	FALSE
YIR027C	DAL1	3.635449345	11.46395384	5.622913855	17.2237791	0.646541889	0.665588764	FALSE	0.383044983	FALSE	FALSE
YIR029W	DAL2	37.21020863	48.90564921	23.93482098	28.15789334	1.554647459	1.736836226	FALSE	0.383044983	FALSE	FALSE
YIR031C	DAL7	121.9702511	157.5942505	1.473304462	3.73504585	82.7868606	42.19339115	FALSE	0.562802768	FALSE	FALSE
YIR033W	MGA2	74.7857514	56.37524507	159.4604639	80.74457589	0.468992436	0.698192348	FALSE	0.383044983	FALSE	FALSE
YIR034C	LYS1	65.78816538	61.23304401	43.85586988	83.85491942	1.500099429	0.730226019	FALSE	0.577652826	FALSE	FALSE
YIR035C	YIR035C	257.6540784	309.6664941	15.48710776	14.90844622	16.63668145	20.77121181	FALSE	0.439129181	FALSE	FALSE
YIR036C	IRC24	135.7976839	92.75236089	15.44366997	33.26543163	8.793096729	2.788250635	FALSE	0.855204729	FALSE	FALSE
YIR037W	HYR1	359.8921367	227.7225888	37.4090735	22.38529009	9.620450418	10.17286744	FALSE	0.383044983	FALSE	FALSE
YIR038C	GTT1	190.3845474	129.123553	3.47016683	5.590980213	54.86322611	23.09497585	FALSE	0.844478085	FALSE	FALSE
YIR039C	YPS6	29.07458497	54.76435162	1.26909615	5.257403568	22.90967865	10.41661552	FALSE	0.831343714	FALSE	FALSE
YIR042C	YIR042C	27.56854631	21.55578044	1.628630518	4.828815971	16.92744057	4.463988805	FALSE	0.883477509	FALSE	FALSE
YJL001W	PRE3	550.3261455	438.7757568	15.13100649	10.72803718	36.37075602	40.89991016	FALSE	0.405132641	FALSE	FALSE
YJL005W	CYR1	41.8557154	39.54319418	40.9352196	56.24001196	1.022486646	0.703114967	FALSE	0.383044983	FALSE	FALSE
YJL008C	CCT8	231.1084992	205.4974169	21.01166655	12.67035279	10.9990561	16.21876046	FALSE	0.475792964	FALSE	FALSE
YJL011C	RPC17	575.1399248	528.216416	1	6.778428496	575.1399248	77.92608808	TRUE	0.987745098	FALSE	TRUE
YJL012C	VTC4	59.57873748	72.16085248	70.79732538	21.8665418	0.841539383	3.300057831	FALSE	0.774048443	FALSE	FALSE
YJL013C	MAD3	50.60211799	54.11200977	16.63094889	16.76942284	3.042647677	3.226826008	FALSE	0.383044983	FALSE	FALSE
YJL014W	CCT3	155.7675067	165.2143243	154.1915807	95.80158372	1.010220571	1.724546901	FALSE	0.383044983	FALSE	FALSE
YJL016W	YJL016W	81.81336031	118.329966	1	3.699266736	81.81336031	31.98741115	FALSE	0.854887543	FALSE	FALSE
YJL019W	MPS3	16.71425742	19.60229804	23.14459753	10.43241054	0.722166691	1.878980698	FALSE	0.699437716	FALSE	FALSE

YJL020C	BBC1	52.416453	45.10557648	1694.993357	3285.989449	0.030924282	0.013726635	FALSE	0.383044983	FALSE	FALSE
YJL024C	APS3	190.3262432	172.5491623	38.93111167	19.68281832	4.888795491	8.766486564	FALSE	0.508693772	FALSE	FALSE
YJL025W	RRN7	24.10036408	27.79266803	27.66366749	16.98040017	0.871191938	1.636749885	FALSE	0.383044983	FALSE	FALSE
YJL026W	RNR2	89.14069106	91.60463383	14.63050512	5.506216878	6.092796544	16.63658295	FALSE	0.844953864	FALSE	FALSE
YJL029C	VPS53	30.25059788	32.58903987	14.92379638	15.15584608	2.027004196	2.150261998	FALSE	0.383044983	FALSE	FALSE
YJL030W	MAD2	174.4617185	202.095346	14.97024303	19.87745712	11.65390021	10.16706236	FALSE	0.399264706	FALSE	FALSE
YJL033W	HCA4	90.13083865	62.14821012	59.93150641	14.53041846	1.503897433	4.277110829	FALSE	0.749524221	FALSE	FALSE
YJL034W	KAR2	222.6552462	682.8563692	544.4385928	523.1765646	0.408963011	1.305212075	FALSE	0.577652826	FALSE	FALSE
YJL035C	TAD2	140.8956503	248.8035757	10.25342719	11.31385205	13.74132256	21.99105791	FALSE	0.524538639	FALSE	FALSE
YJL036W	SNX4	133.3031644	128.3827642	1	4.924790686	133.3031644	26.06867427	TRUE	0.965643022	FALSE	TRUE
YJL037W	IRC18	10.14741139	22.70542206	1	3.201611869	10.14741139	7.091872154	FALSE	0.462889273	FALSE	FALSE
YJL039C	NUP192	34.5584821	41.34698922	103.9899622	22.84814766	0.332325172	1.809642945	FALSE	0.699437716	FALSE	FALSE
YJL041W	NSP1	37.58312647	33.2977542	109.2290257	83.25306805	0.344076368	0.399958284	FALSE	0.383044983	FALSE	FALSE
YJL042W	MHP1	25.67795254	35.66697714	462.933146	620.4848071	0.05546795	0.057482434	FALSE	0.383044983	FALSE	FALSE
YJL043W	YJL043W	2.918447735	3.414006926	4.653709106	5.328586896	0.62712294	0.640696491	FALSE	0.383044983	FALSE	FALSE
YJL044C	GYP6	81.22797503	78.48645726	3.973956693	5.071262604	20.44007555	15.47670933	FALSE	0.44433391	FALSE	FALSE
YJL045W	YJL045W	12.35488563	27.32603402	1.202926131	24.09534634	10.27069353	1.134079321	TRUE	0.978344867	FALSE	TRUE
YJL047C	RTT101	24.9517063	40.22696417	17.76019723	36.49512621	1.404922815	1.10225579	FALSE	0.383044983	FALSE	FALSE
YJL048C	UBX6	56.95988536	92.18592656	1.44311165	6.08827717	39.47018608	15.14154563	FALSE	0.854008074	FALSE	FALSE
YJL050W	MTR4	75.94275406	61.50934266	51.44170696	9.325337327	1.476287599	6.595937552	TRUE	0.912312572	TRUE	FALSE
YJL051W	IRC8	12.48390527	8.347931394	17.76140119	8.222806391	0.702867141	1.015216825	FALSE	0.383044983	FALSE	FALSE
YJL052W	TDH1	726.7740594	873.1430362	55.88040432	458.725588	13.00588405	1.903410359	TRUE	0.97482699	FALSE	TRUE
YJL053W	PEP8	88.78274765	116.2442406	25.20782883	23.50401251	3.522030725	4.945718972	FALSE	0.428460208	FALSE	FALSE
YJL054W	TIM54	49.99785053	58.75156679	24.8184476	26.48565456	2.014543832	2.218241073	FALSE	0.383044983	FALSE	FALSE
YJL055W	YJL055W	354.7578731	347.3127534	320.2607131	397.9736355	1.107715866	0.872702919	FALSE	0.383044983	FALSE	FALSE
YJL056C	ZAP1	63.27275049	59.28746602	22.80462806	30.87561066	2.774557441	1.920203836	FALSE	0.383044983	FALSE	FALSE
YJL057C	IKS1	54.2503186	100.7397804	1.116784823	3.371292472	48.57723483	29.88164962	FALSE	0.53533737	FALSE	FALSE
YJL059W	YHC3	21.55724459	25.51991045	3.335560581	1	6.462855065	25.51991045	FALSE	0.889532872	FALSE	FALSE
YJL061W	NUP82	56.13008046	71.55069977	3.204077737	4.203273063	17.51832667	17.02261516	FALSE	0.383044983	FALSE	FALSE
YJL062W	LAS21	16.39727838	17.43608519	39.23535363	25.60937794	0.417921004	0.680847666	FALSE	0.383044983	FALSE	FALSE
YJL062W-A	COA3	195.7242852	158.239221	30.12419741	67.4794219	6.497244808	2.344999654	FALSE	0.802407728	FALSE	FALSE
YJL063C	MRPL8	73.07030528	53.06995201	61.09276102	61.05945772	1.196055049	0.869152036	FALSE	0.383044983	FALSE	FALSE
YJL066C	MPM1	64.61070433	62.31844579	43.54748759	80.25735869	1.483683857	0.77648264	FALSE	0.383044983	FALSE	FALSE
YJL068C	YJL068C	49.54959394	39.04941122	85.59217325	242.462322	0.578903328	0.161053523	FALSE	0.383044983	FALSE	FALSE
YJL069C	UTP18	99.60537915	95.40915725	264.3339529	145.315826	0.37681644	0.656564119	FALSE	0.383044983	FALSE	FALSE
YJL070C	YJL070C	40.68205374	42.25726435	17.34509974	8.379185549	2.345449397	5.043123118	FALSE	0.749524221	FALSE	FALSE
YJL073W	JEM1	39.06546174	38.38221068	8.959421993	1	4.360265849	38.38221068	TRUE	0.994679931	TRUE	FALSE
YJL074C	SMC3	42.81654436	31.37586073	201.8399969	32.03848292	0.212131119	0.979317929	FALSE	0.577652826	FALSE	FALSE
YJL076W	NET1	40.1279048	33.34509336	1342.125021	723.0342985	0.029898783	0.046118273	FALSE	0.383044983	FALSE	FALSE
YJL077C	ICS3	7.17630037	11.34381392	8.32045603	11.50889558	0.862488828	0.985656168	FALSE	0.383044983	FALSE	FALSE
YJL078C	PRY3	8.592033096	5.792199505	348.9680404	280.3859494	0.024621261	0.020657952	FALSE	0.383044983	FALSE	FALSE
YJL079C	PRY1	57.72689621	16.14825276	199.2691856	167.3362145	0.28969304	0.096501841	FALSE	0.383044983	FALSE	FALSE
YJL080C	SCP160	47.30698089	32.48135878	239.6301722	89.38150811	0.197416629	0.363401328	FALSE	0.383044983	FALSE	FALSE
YJL081C	ARP4	58.59105646	53.11846409	5.506269593	2.036943811	10.64078964	26.07753037	FALSE	0.840960208	FALSE	FALSE

YJL082W	IML2	29.00082041	79.05664726	15.55398742	12.29770329	1.864526415	6.428570065	FALSE	0.831055363	FALSE	FALSE
YJL083W	TAX4	10.43825508	13.68537123	29.18069739	29.26073257	0.357710953	0.467704327	FALSE	0.383044983	FALSE	FALSE
YJL084C	ALY2	16.84224076	22.50407717	6.407829526	7.66009072	2.628384649	2.937834289	FALSE	0.383044983	FALSE	FALSE
YJL085W	EXO70	64.10899103	72.90710271	2.722669281	3.910083384	23.54637468	18.64592019	FALSE	0.439460784	FALSE	FALSE
YJL087C	TRL1	48.98871713	51.0616688	9.83601023	9.923028343	4.980547598	5.145774761	FALSE	0.383044983	FALSE	FALSE
YJL090C	DPB11	29.59132484	36.38394205	4.407827271	1	6.713358538	36.38394205	TRUE	0.96489331	TRUE	FALSE
YJL091C	GWT1	96.2161657	134.9026411	5.294297641	3.42005448	18.17354675	39.44458835	FALSE	0.836058247	FALSE	FALSE
YJL092W	SRS2	17.57077799	19.04057037	9.242925538	3.095834845	1.900997462	6.15038312	FALSE	0.831055363	FALSE	FALSE
YJL093C	TOK1	71.32266157	82.9263269	6.492425001	6.499480456	10.98551952	12.75891626	FALSE	0.402436563	FALSE	FALSE
YJL094C	KHA1	30.2917942	51.54877025	7.00489858	3.266031698	4.324372988	15.78330372	FALSE	0.881415802	FALSE	FALSE
YJL095W	BCK1	13.72928865	17.41974528	26.19481446	11.50672671	0.524122386	1.513874946	FALSE	0.577652826	FALSE	FALSE
YJL096W	MRPL49	464.1900957	473.0296263	13.99435755	1	33.16980391	473.0296263	TRUE	0.999596309	TRUE	FALSE
YJL098W	SAP185	78.41751452	81.51062428	86.52950041	22.81870521	0.906251789	3.572096818	FALSE	0.774048443	FALSE	FALSE
YJL099W	CHS6	31.05222341	39.85476037	5.972031963	1.672385476	5.199607706	23.83108496	TRUE	0.956185121	TRUE	FALSE
YJL100W	LSB6	22.89080022	43.46120659	52.20273388	81.7432095	0.438498111	0.531679718	FALSE	0.383044983	FALSE	FALSE
YJL101C	GSH1	59.81036203	104.4263768	9.496118859	13.33120196	6.298400738	7.833230426	FALSE	0.407151096	FALSE	FALSE
YJL102W	MEF2	32.04965366	53.60074142	1.256720419	5.457127809	25.50261233	9.822152475	FALSE	0.850317186	FALSE	FALSE
YJL104W	PAM16	148.9726354	98.35753953	28.43991291	18.00742556	5.238153712	5.462054485	FALSE	0.383044983	FALSE	FALSE
YJL107C	YJL107C	11.89410608	22.81489319	3.05437268	4.069810262	3.894124042	5.605886202	FALSE	0.428460208	FALSE	FALSE
YJL109C	UTP10	56.70181737	53.64504306	36.7815397	18.0080079	1.541583572	2.978954884	FALSE	0.45227797	FALSE	FALSE
YJL110C	GZF3	66.48678286	68.61411745	85.29833841	28.17924545	0.779461641	2.434916775	FALSE	0.699437716	FALSE	FALSE
YJL111W	CCT7	186.685999	189.1911283	70.5734839	39.26245873	2.645271123	4.818626606	FALSE	0.487600923	FALSE	FALSE
YJL112W	MDV1	59.38070081	46.38131339	74.92826932	25.47937062	0.792500632	1.820347688	FALSE	0.699437716	FALSE	FALSE
YJL115W	ASF1	152.3268329	102.7091791	272.9320059	117.7998962	0.558112752	0.871895328	FALSE	0.383044983	FALSE	FALSE
YJL116C	NCA3	48.43431128	79.09082376	71.62934645	393.0950113	0.676179718	0.201200273	FALSE	0.383044983	FALSE	FALSE
YJL117W	PHO86	174.84978	208.205182	15.11944361	2.057075604	11.56456445	101.2141613	TRUE	0.995126874	TRUE	FALSE
YJL118W	YJL118W	7.838728096	9.608877675	58.61449097	41.71300628	0.133733621	0.230356873	FALSE	0.383044983	FALSE	FALSE
YJL121C	RPE1	62.90753681	48.09464401	75.80569454	55.73641436	0.82985239	0.862894475	FALSE	0.383044983	FALSE	FALSE
YJL122W	ALB1	129.4494182	79.32328706	71.95210333	54.13988876	1.799105408	1.465154231	FALSE	0.383044983	FALSE	FALSE
YJL123C	MTC1	147.0017938	115.4803879	146.5297039	159.0545016	1.003221804	0.726042877	FALSE	0.383044983	FALSE	FALSE
YJL124C	LSM1	90.13611954	92.66364694	14.51871089	1	6.208272912	92.66364694	TRUE	0.999538639	TRUE	FALSE
YJL125C	GCD14	106.6439637	74.08928468	39.50757426	15.600649	2.699329576	4.749115545	FALSE	0.487600923	FALSE	FALSE
YJL126W	NIT2	98.26011276	114.3914009	3.575780287	1.648088519	27.47934853	69.40852968	FALSE	0.854743368	FALSE	FALSE
YJL127C	SPT10	27.39619193	45.0712827	23.57187058	10.80209169	1.162240894	4.172458817	FALSE	0.808232411	FALSE	FALSE
YJL128C	PBS2	51.59146882	67.08140873	105.1792061	115.7626027	0.490510156	0.579473916	FALSE	0.383044983	FALSE	FALSE
YJL129C	TRK1	34.58630201	36.55804795	578.4393886	333.3732749	0.059792439	0.109661004	FALSE	0.383044983	FALSE	FALSE
YJL130C	URA2	88.17516152	122.4390813	72.79606312	35.71637704	1.211262776	3.428093535	FALSE	0.749524221	FALSE	FALSE
YJL133C-A	YJL133C-A	194.3121331	354.0871423	22.14148016	206.3338611	8.7759324	1.716088384	TRUE	0.937874856	FALSE	TRUE
YJL133W	MRS3	64.69360304	69.48642096	142.7300233	53.6707647	0.453258548	1.294679168	FALSE	0.577652826	FALSE	FALSE
YJL134W	LCB3	100.5920738	110.6388049	14.827507	11.52448954	6.784152842	9.600321518	FALSE	0.44994233	FALSE	FALSE
YJL136C	RPS21B	918.5664473	588.0432952	41.93386683	12.2577086	21.90512149	47.97334594	FALSE	0.837038639	FALSE	FALSE
YJL138C	TIF2	220.931914	148.6929335	6.527519492	8.529047448	33.84622815	17.43370926	FALSE	0.558982122	FALSE	FALSE
YJL140W	RPB4	701.3180029	588.5978616	5.53750817	1.086274768	126.6486624	541.8498884	TRUE	0.95893887	TRUE	FALSE
YJL141C	YAK1	61.11333023	91.84227914	76.92596884	188.0731438	0.794443426	0.488332769	FALSE	0.383044983	FALSE	FALSE

YJL143W	TIM17	338.5186218	309.9467382	351.5167552	294.608382	0.96302272	1.052063543	FALSE	0.383044983	FALSE	FALSE
YJL144W	YJL144W	106.1777013	283.1187172	10.31996125	50.90057687	10.28857558	5.562190738	FALSE	0.521583045	FALSE	FALSE
YJL145W	SFH5	164.259621	121.0745731	15.03442968	6.097643778	10.92556382	19.85596035	FALSE	0.544852941	FALSE	FALSE
YJL146W	IDS2	49.35321466	60.62622554	64.93857061	20.80290457	0.759998475	2.914315419	FALSE	0.774048443	FALSE	FALSE
YJL148W	RPA34	310.6710547	264.8087603	22.51081486	1.42516892	13.80096885	185.8086832	TRUE	0.999149366	TRUE	FALSE
YJL151C	SNA3	265.7290925	245.51041	41.46975284	143.9245755	6.407780955	1.705826883	FALSE	0.831055363	FALSE	FALSE
YJL152W	YJL152W	4.857803327	6.973109146	6.948720679	7.164399857	0.699093193	0.973299828	FALSE	0.383044983	FALSE	FALSE
YJL154C	VPS35	55.28642834	71.35057713	66.51362209	39.66826733	0.831204596	1.798681463	FALSE	0.577652826	FALSE	FALSE
YJL155C	FBP26	143.9647013	239.1613593	2.578930415	19.75667665	55.8234144	12.10534361	TRUE	0.959414648	FALSE	TRUE
YJL156C	SSY5	63.04734747	72.9187985	21.48001663	4.315543224	2.935162879	16.89678326	TRUE	0.958506344	TRUE	FALSE
YJL157C	FAR1	152.3105484	50.02937514	4.09563712	1.264230976	37.18848714	39.57297053	FALSE	0.390210496	FALSE	FALSE
YJL158C	CIS3	374.4556731	246.4733316	3499.968233	2526.026246	0.106988306	0.097573543	FALSE	0.383044983	FALSE	FALSE
YJL159W	HSP150	183.8690293	369.1333141	1214.82123	3179.547969	0.151354804	0.116096161	FALSE	0.383044983	FALSE	FALSE
YJL160C	YJL160C	11.0481291	16.66817756	1.441166997	19.22205959	7.666099155	0.867137961	TRUE	0.957843137	FALSE	TRUE
YJL164C	TPK1	102.5265024	126.3680081	19.64548521	32.3040654	5.218832791	3.911829875	FALSE	0.428460208	FALSE	FALSE
YJL165C	HAL5	58.90654035	68.42770657	29.89513097	30.16842579	1.97043928	2.268189499	FALSE	0.383044983	FALSE	FALSE
YJL166W	QCR8	1270.187733	1313.803301	4.916398981	2.536934018	258.3573339	517.8705049	FALSE	0.836548443	FALSE	FALSE
YJL167W	ERG20	375.4820504	213.4663441	38.6704162	20.05369211	9.709801116	10.64474028	FALSE	0.383044983	FALSE	FALSE
YJL168C	SET2	116.8784833	139.8021882	29.38001083	7.865888121	3.978163384	17.77322358	TRUE	0.951658016	TRUE	FALSE
YJL171C	YJL171C	139.8606852	236.9544394	7.239873006	2.566802329	19.31811305	92.3150321	TRUE	0.959544406	TRUE	FALSE
YJL172W	CPS1	86.92689663	91.43976747	197.6592514	300.3562239	0.439781574	0.304437732	FALSE	0.383044983	FALSE	FALSE
YJL174W	KRE9	114.9563206	131.4861014	8.819662025	2.779537204	13.0340959	47.3050338	FALSE	0.891435986	FALSE	FALSE
YJL175W	YJL175W	1	1	31.15957888	5.427575649	0.03209286	0.184244323	FALSE	0.383044983	FALSE	FALSE
YJL176C	SWI3	57.25268207	57.79674001	3.965699395	1	14.43696972	57.79674001	TRUE	0.958751442	TRUE	FALSE
YJL177W	RPL17B	217.4195219	151.4047482	185.4667983	14.66089618	1.172282715	10.32711414	TRUE	0.978013264	TRUE	FALSE
YJL178C	ATG27	134.8397615	130.8267536	11.55782618	10.51053355	11.66653309	12.44720385	FALSE	0.383044983	FALSE	FALSE
YJL180C	ATP12	93.28174487	108.4805937	4.761419914	1.838570292	19.59116116	59.0026904	FALSE	0.888307382	FALSE	FALSE
YJL183W	MNN11	246.6225212	251.4379782	13.68425834	2.828413472	18.02235204	88.89717881	TRUE	0.959515571	TRUE	FALSE
YJL184W	GON7	198.6214748	155.9182469	263.1479758	241.939146	0.754790053	0.644452333	FALSE	0.383044983	FALSE	FALSE
YJL185C	ATG36	31.64181419	47.63584766	1.642805578	5.245789827	19.26083926	9.08077701	FALSE	0.825850634	FALSE	FALSE
YJL186W	MNN5	146.1065038	186.4414191	34.97311113	22.83250752	4.177681056	8.165612949	FALSE	0.508693772	FALSE	FALSE
YJL187C	SWE1	29.32454448	34.31951279	70.67579471	21.3526544	0.414916374	1.607271496	FALSE	0.699437716	FALSE	FALSE
YJL190C	RPS22A	718.843645	353.3340801	89.74515405	23.60330884	8.009832427	14.96968423	FALSE	0.537802768	FALSE	FALSE
YJL191W	RPS14B	591.1492322	555.7364684	200.6365751	224.3737847	2.946368238	2.47683333	FALSE	0.383044983	FALSE	FALSE
YJL192C	SOP4	74.83084274	71.40213889	131.0106243	73.15607041	0.571181483	0.976024799	FALSE	0.383044983	FALSE	FALSE
YJL196C	ELO1	161.1978467	194.7136587	13.58840147	19.28252176	11.86289992	10.09793538	FALSE	0.402436563	FALSE	FALSE
YJL197W	UBP12	57.5969032	61.23585889	25.11034292	6.29351764	2.293752155	9.729989236	TRUE	0.931675317	TRUE	FALSE
YJL198W	PHO90	29.27349737	24.71671341	15.77482461	12.1290053	1.855709847	2.037818667	FALSE	0.383044983	FALSE	FALSE
YJL200C	ACO2	56.81785158	41.19755623	190.7501774	53.47185936	0.297865262	0.770453033	FALSE	0.383044983	FALSE	FALSE
YJL201W	ECM25	50.19730105	86.09954767	16.90478824	6.597730293	2.969413182	13.0498738	TRUE	0.945833333	TRUE	FALSE
YJL203W	PRP21	67.16215632	67.07976882	8.596720365	10.04768975	7.812532393	6.676138546	FALSE	0.402436563	FALSE	FALSE
YJL204C	RCY1	34.65733646	35.60959424	5.051844048	1	6.860333797	35.60959424	TRUE	0.96477797	TRUE	FALSE
YJL208C	NUC1	129.0998036	81.40854697	7.557177174	1	17.08307224	81.40854697	TRUE	0.959486736	TRUE	FALSE
YJL209W	CBP1	91.44536645	94.20000881	13.456533	5.198706816	6.795611206	18.11989253	FALSE	0.845054787	FALSE	FALSE

YJL210W	PEX2	202.7954293	164.9906707	6.043286433	13.97627863	33.55714339	11.8050502	FALSE	0.856358131	FALSE	FALSE
YJL211C	YJL211C	1.969379727	2.678150028	5.206529985	11.27597219	0.378251875	0.237509457	FALSE	0.383044983	FALSE	FALSE
YJL212C	OPT1	33.12414644	40.24217989	25.72553055	26.92075323	1.287598185	1.494838556	FALSE	0.383044983	FALSE	FALSE
YJL213W	YJL213W	81.49989317	152.5505806	17.60377517	23.93209483	4.629682688	6.374309547	FALSE	0.428460208	FALSE	FALSE
YJL218W	YJL218W	66.45573587	29.50949743	3.242570362	1.99716078	20.49477065	14.77572448	FALSE	0.468079585	FALSE	FALSE
YJR001W	AVT1	57.15773567	64.34468874	17.31311921	9.564254579	3.301411778	6.727621919	FALSE	0.776081315	FALSE	FALSE
YJR002W	MPP10	104.3528122	86.59852719	42.13545242	9.007205309	2.476603578	9.614361417	FALSE	0.865527682	FALSE	FALSE
YJR003C	YJR003C	108.1795433	126.1935137	4.472417667	1	24.18815759	126.1935137	TRUE	0.965643022	TRUE	FALSE
YJR004C	SAG1	8.767924592	11.36533919	52.23500591	3.447453328	0.167855338	3.29673475	FALSE	0.890614187	FALSE	FALSE
YJR005C-A	LSO1	10.33575176	17.33516495	3.104414652	4.023264472	3.329372175	4.308731149	FALSE	0.383044983	FALSE	FALSE
YJR005W	APL1	85.47932103	108.6253236	4.245568821	5.22985323	20.1337735	20.77024323	FALSE	0.383044983	FALSE	FALSE
YJR007W	SUI2	168.5100302	136.1651477	10.0703471	5.155206896	16.73328918	26.41312957	FALSE	0.523313149	FALSE	FALSE
YJR008W	MHO1	167.6586989	267.2321474	1	3.927850799	167.6586989	68.03520834	FALSE	0.845977509	FALSE	FALSE
YJR009C	TDH2	722.32472	931.0704294	501.6461375	358.7303324	1.439908864	2.59546056	FALSE	0.45227797	FALSE	FALSE
YJR010W	MET3	46.63301436	64.51272853	1.732557821	7.888336691	26.91570452	8.178242265	FALSE	0.885438293	FALSE	FALSE
YJR012C	YJR012C	75.90317699	97.18594427	9.738862931	15.10296298	7.793843853	6.434892571	FALSE	0.407151096	FALSE	FALSE
YJR014W	TMA22	128.8904601	67.49954899	70.4329926	25.5722356	1.829972792	2.639563863	FALSE	0.383044983	FALSE	FALSE
YJR015W	YJR015W	93.59114238	70.49957707	18.29645741	7.300915482	5.115260309	9.656265333	FALSE	0.521583045	FALSE	FALSE
YJR016C	ILV3	104.2438171	63.80639122	815.3144741	207.6217668	0.127857189	0.307320336	FALSE	0.383044983	FALSE	FALSE
YJR017C	ESS1	86.21890701	91.17195338	213.7786262	258.5271326	0.403309295	0.352659129	FALSE	0.383044983	FALSE	FALSE
YJR019C	TES1	21.86011497	15.351326	62.02549974	84.30296923	0.352437547	0.182097097	FALSE	0.383044983	FALSE	FALSE
YJR021C	REC107	34.39016324	31.87707038	7.932150827	7.916194873	4.335540762	4.026817289	FALSE	0.383044983	FALSE	FALSE
YJR024C	MDE1	145.8332387	138.9528688	28.78043219	19.74620408	5.067096898	7.036940784	FALSE	0.428460208	FALSE	FALSE
YJR025C	BNA1	323.3987047	188.5337375	19.97426321	23.65282103	16.19077016	7.970877438	FALSE	0.819766436	FALSE	FALSE
YJR031C	GEA1	28.2193898	29.94391795	11.42827895	3.456561491	2.469259802	8.662920658	FALSE	0.857598039	FALSE	FALSE
YJR032W	CPR7	109.4238694	106.3012578	3.85775098	1.461247968	28.3646793	72.74689863	FALSE	0.854930796	FALSE	FALSE
YJR034W	PET191	365.2265896	193.9406503	13.26015844	15.43558135	27.54315426	12.56451869	FALSE	0.832511534	FALSE	FALSE
YJR035W	RAD26	26.54793991	32.19917803	9.653183508	8.092110117	2.750174582	3.979083028	FALSE	0.428460208	FALSE	FALSE
YJR038C	YJR038C	1	1.455890557	1.765530877	3.501630647	0.566401875	0.415775021	FALSE	0.383044983	FALSE	FALSE
YJR039W	YJR039W	22.01598032	33.63892225	1.581734795	4.046934608	13.91888222	8.312198123	FALSE	0.523788927	FALSE	FALSE
YJR040W	GEF1	54.27661025	67.8113691	43.11745983	90.25867767	1.25880816	0.751300272	FALSE	0.383044983	FALSE	FALSE
YJR041C	URB2	28.71271839	37.59388205	30.03895799	22.88068276	0.955849348	1.643040221	FALSE	0.383044983	FALSE	FALSE
YJR042W	NUP85	126.3354892	118.2891535	42.73671038	11.87747158	2.956135091	9.959119057	FALSE	0.863134371	FALSE	FALSE
YJR043C	POL32	32.38535552	29.36045956	2.734035976	3.868173387	11.8452558	7.590264609	FALSE	0.50239331	FALSE	FALSE
YJR045C	SSC1	300.4421569	258.2599813	371.6455361	724.7982128	0.808410509	0.356319837	FALSE	0.383044983	FALSE	FALSE
YJR046W	TAH11	89.76899372	190.6488684	149.7111331	187.4512053	0.599614684	1.017058642	FALSE	0.383044983	FALSE	FALSE
YJR047C	ANB1	26.44120798	13.37944993	13.17857465	10.10257544	2.006378435	1.324360309	FALSE	0.383044983	FALSE	FALSE
YJR048W	CYC1	131.1606898	137.3268768	6.622923867	4.489550438	19.80404614	30.58811315	FALSE	0.522693195	FALSE	FALSE
YJR049C	UTR1	99.76336212	140.4989223	43.10436136	42.05665477	2.314460973	3.34070608	FALSE	0.428460208	FALSE	FALSE
YJR050W	ISY1	122.4742788	136.4141691	84.6381357	50.39613846	1.447034222	2.706837732	FALSE	0.45227797	FALSE	FALSE
YJR051W	OSM1	98.55921691	101.4164081	6.471065999	6.294108165	15.23075439	16.11291155	FALSE	0.383044983	FALSE	FALSE
YJR056C	YJR056C	114.9885091	148.2889034	4.4850009	3.307194874	25.63845843	44.83827201	FALSE	0.554051326	FALSE	FALSE
YJR057W	CDC8	300.6465377	273.1740454	21.32225724	1	14.10012712	273.1740454	TRUE	0.999927912	TRUE	FALSE
YJR059W	PTK2	48.60769019	63.93697146	71.29998865	103.7794264	0.681734894	0.616085227	FALSE	0.383044983	FALSE	FALSE

YJR060W	CBF1	77.69725208	80.6995586	41.80355387	31.20402459	1.858627913	2.586190712	FALSE	0.383044983	FALSE	FALSE
YJR064W	CCT5	481.5524044	478.1895807	51.51570723	45.00561147	9.347681131	10.62511018	FALSE	0.396957901	FALSE	FALSE
YJR065C	ARP3	86.84672837	86.51548751	51.40474057	36.9839071	1.689469248	2.339273871	FALSE	0.383044983	FALSE	FALSE
YJR066W	TOR1	29.47906147	37.6778702	98.24009401	112.49603	0.300071593	0.334926221	FALSE	0.383044983	FALSE	FALSE
YJR067C	YAE1	378.7034002	328.1341502	101.3704755	11.11932759	3.735835293	29.51025119	TRUE	0.986490773	TRUE	FALSE
YJR069C	HAM1	138.0057763	96.75605992	49.90864249	38.345045	2.765167904	2.523300205	FALSE	0.383044983	FALSE	FALSE
YJR070C	LIA1	147.4477421	121.7198193	71.08343248	37.03248164	2.074291251	3.286839389	FALSE	0.45227797	FALSE	FALSE
YJR072C	NPA3	54.93344954	47.3494458	252.8066375	168.2305671	0.217294332	0.281455663	FALSE	0.383044983	FALSE	FALSE
YJR073C	OPI3	447.997418	237.011246	34.3881922	98.79896745	13.0276525	2.398924322	TRUE	0.95233564	FALSE	TRUE
YJR074W	MOG1	245.2192502	186.2177093	120.6674628	228.2772575	2.032190323	0.81575235	FALSE	0.699437716	FALSE	FALSE
YJR075W	HOC1	68.40080756	77.98640959	75.28151212	58.0043769	0.908600341	1.344491808	FALSE	0.383044983	FALSE	FALSE
YJR076C	CDC11	66.03576398	48.59297214	201.7469028	99.46853529	0.32731984	0.488526065	FALSE	0.383044983	FALSE	FALSE
YJR077C	MIR1	125.3375538	98.10345863	90.45093577	89.25871361	1.385696596	1.09909111	FALSE	0.383044983	FALSE	FALSE
YJR078W	BNA2	6.687504581	34.72812067	11.4415292	37.88765365	0.584493948	0.916607848	FALSE	0.383044983	FALSE	FALSE
YJR083C	ACF4	39.64594328	28.27128122	6.378161011	1	6.215889378	28.27128122	TRUE	0.957727797	TRUE	FALSE
YJR084W	YJR084W	105.6915936	98.15672507	21.39223641	36.02236203	4.940651907	2.724883087	FALSE	0.487600923	FALSE	FALSE
YJR085C	YJR085C	819.410599	639.4209519	70.62644685	114.5047536	11.60203628	5.584230627	FALSE	0.809717416	FALSE	FALSE
YJR088C	EMC2	471.0245479	430.1858461	3.150799502	1	149.4936595	430.1858461	FALSE	0.858477509	FALSE	FALSE
YJR089W	BIR1	41.48207972	58.15215629	4.316510151	4.167142323	9.610096646	13.95492445	FALSE	0.470357555	FALSE	FALSE
YJR091C	JSN1	22.66530032	37.26519867	56.34912379	127.8668598	0.402229863	0.291437506	FALSE	0.383044983	FALSE	FALSE
YJR092W	BUD4	37.9432014	16.39359914	27.84839957	6.64854537	1.362491274	2.465742238	FALSE	0.45227797	FALSE	FALSE
YJR093C	FIP1	35.76705803	49.41150512	7.107042144	6.643800134	5.032622195	7.437235335	FALSE	0.44994233	FALSE	FALSE
YJR099W	YUH1	83.93546255	88.45303007	21.59526037	25.87648394	3.886753905	3.418278552	FALSE	0.383044983	FALSE	FALSE
YJR101W	RSM26	213.6887643	225.3167852	5.394013899	1.575700691	39.6159091	142.9946604	FALSE	0.891911765	FALSE	FALSE
YJR103W	URA8	70.09835371	90.66753316	473.2706492	769.3474925	0.148114728	0.117849911	FALSE	0.383044983	FALSE	FALSE
YJR104C	SOD1	1575.965421	1679.512998	1007.776946	2002.197331	1.563803804	0.8388349	FALSE	0.383044983	FALSE	FALSE
YJR105W	ADO1	250.3691891	207.6757433	621.4976648	515.2425839	0.402848157	0.403064013	FALSE	0.383044983	FALSE	FALSE
YJR106W	ECM27	11.24119778	17.83465932	28.94491396	33.93183371	0.388365217	0.525602579	FALSE	0.383044983	FALSE	FALSE
YJR107W	YJR107W	21.7050787	24.22907225	4.575441653	2.796973954	4.743821546	8.66260203	FALSE	0.508693772	FALSE	FALSE
YJR109C	CPA2	126.2638157	59.90163466	152.9803479	77.46449339	0.825359711	0.773278596	FALSE	0.383044983	FALSE	FALSE
YJR111C	YJR111C	22.92062133	22.33049037	2.736485693	3.887850229	8.375933187	5.743660135	FALSE	0.44994233	FALSE	FALSE
YJR112W	NNF1	239.523372	135.6104395	103.2088237	77.19293518	2.32076448	1.756772678	FALSE	0.383044983	FALSE	FALSE
YJR112W-A	YJR112W-A	204.4693582	161.349071	27.84879966	32.17515911	7.342124641	5.014709341	FALSE	0.44994233	FALSE	FALSE
YJR113C	RSM7	102.7386228	116.4947266	187.9269495	339.753604	0.546694463	0.342880032	FALSE	0.383044983	FALSE	FALSE
YJR114W	YJR114W	2.59577277	4.706638556	1.906034618	10.9280683	1.361870737	0.430692637	FALSE	0.577652826	FALSE	FALSE
YJR115W	YJR115W	2.428901664	3.108754542	64.92985618	61.12164291	0.037408086	0.050861763	FALSE	0.383044983	FALSE	FALSE
YJR116W	TDA4	7.199958503	7.392544283	52.06891804	25.82213764	0.138277475	0.286287076	FALSE	0.383044983	FALSE	FALSE
YJR121W	ATP2	258.5926361	146.8309701	268.4930793	197.4389615	0.963125891	0.743677788	FALSE	0.383044983	FALSE	FALSE
YJR122W	IBA57	71.74526802	112.3126013	4.106457313	1.831750811	17.47132931	61.31434509	FALSE	0.891709919	FALSE	FALSE
YJR123W	RPS5	558.0025415	306.9207333	425.6893041	259.8600266	1.310821146	1.181100215	FALSE	0.383044983	FALSE	FALSE
YJR125C	ENT3	100.4223157	102.9410734	89.12302182	102.1681651	1.12678311	1.00756506	FALSE	0.383044983	FALSE	FALSE
YJR126C	VPS70	57.28259465	55.5389974	213.8857109	140.6155756	0.267818708	0.394970452	FALSE	0.383044983	FALSE	FALSE
YJR127C	RSF2	37.72624235	59.34809766	67.45711129	58.28760743	0.559262643	1.018194094	FALSE	0.383044983	FALSE	FALSE
YJR128W	YJR128W	1.821676248	2.569040212	9.652372112	3.148585108	0.188728348	0.815934816	FALSE	0.577652826	FALSE	FALSE

YJR129C	EFM3	34.21893814	26.81300792	8.646657523	3.639881306	3.957475828	7.366451175	FALSE	0.508693772	FALSE	FALSE
YJR131W	MNS1	92.20993952	94.00685325	36.23929072	36.82041206	2.544474179	2.553117904	FALSE	0.383044983	FALSE	FALSE
YJR132W	NMD5	55.96430239	66.41789375	44.74911786	14.79203455	1.250623589	4.490112129	FALSE	0.808232411	FALSE	FALSE
YJR133W	XPT1	184.1338785	200.4899953	3.83500503	3.392752876	48.01398618	59.09360411	FALSE	0.435553633	FALSE	FALSE
YJR134C	SGM1	134.7560132	113.3363503	27.0879358	21.74635208	4.974761244	5.211740794	FALSE	0.383044983	FALSE	FALSE
YJR137C	MET5	37.95684859	48.25248084	85.51423637	104.3509068	0.443865843	0.462405956	FALSE	0.383044983	FALSE	FALSE
YJR139C	HOM6	346.2534261	280.6370593	95.58913774	52.8365148	3.622309336	5.311422609	FALSE	0.428460208	FALSE	FALSE
YJR140C	HIR3	26.82249806	34.77318225	8.424156907	3.317863877	3.183997919	10.4805934	FALSE	0.862658593	FALSE	FALSE
YJR142W	YJR142W	71.73403456	60.60409729	4.38905654	2.508543367	16.34383925	24.15907896	FALSE	0.482525952	FALSE	FALSE
YJR143C	PMT4	66.46850162	60.60645322	106.7670068	19.82581623	0.622556571	3.056946181	FALSE	0.827537486	FALSE	FALSE
YJR144W	MGM101	250.086912	169.3119835	16.26222541	11.4760576	15.37839415	14.75349718	FALSE	0.383044983	FALSE	FALSE
YJR145C	RPS4A	635.8716226	441.5835531	164.2928835	33.50325942	3.870354024	13.18031621	FALSE	0.872981546	FALSE	FALSE
YJR146W	YJR146W	9.056921458	13.43614251	32.4716922	79.06883997	0.278917446	0.169929678	FALSE	0.383044983	FALSE	FALSE
YJR147W	HMS2	15.62886586	10.05943322	66.64615268	56.64704938	0.234505147	0.177580886	FALSE	0.383044983	FALSE	FALSE
YJR148W	BAT2	106.1758605	113.7815157	912.5955297	1737.515608	0.116344927	0.065485176	FALSE	0.383044983	FALSE	FALSE
YJR149W	YJR149W	24.64885392	25.88070139	2.053324147	3.566291858	12.00436568	7.257034035	FALSE	0.506257209	FALSE	FALSE
YJR151C	DAN4	1.755832528	2.084542095	3.541753131	5.331191433	0.495752375	0.391008674	FALSE	0.383044983	FALSE	FALSE
YJR153W	PGU1	16.77418276	26.64340046	7.126131499	2.392783607	2.353897449	11.13489761	TRUE	0.938148789	TRUE	FALSE
YJR155W	AAD10	88.66751748	163.9715631	1.762498857	5.68815192	50.30784395	28.82686071	FALSE	0.549985582	FALSE	FALSE
YKL001C	MET14	263.1110718	343.8644956	1.681189984	6.569094986	156.5028786	52.34579441	FALSE	0.888581315	FALSE	FALSE
YKL002W	DID4	282.6073996	254.7933444	38.28854157	34.12340053	7.380991492	7.466821606	FALSE	0.383044983	FALSE	FALSE
YKL005C	BYE1	46.33283005	60.5466956	19.99810416	16.79220203	2.316861123	3.60564359	FALSE	0.45227797	FALSE	FALSE
YKL006W	RPL14A	1403.695472	835.1889001	238.1311126	72.84969495	5.894632823	11.46454904	FALSE	0.531040946	FALSE	FALSE
YKL009W	MRT4	359.8258962	360.5018453	4.811503087	2.37861881	74.78450907	151.5593182	FALSE	0.83650519	FALSE	FALSE
YKL010C	UFD4	50.28022851	72.08546793	29.59176962	29.22506131	1.699128817	2.466563446	FALSE	0.383044983	FALSE	FALSE
YKL012W	PRP40	48.57803327	54.22132815	22.04384514	36.18837463	2.203700532	1.498307915	FALSE	0.383044983	FALSE	FALSE
YKL013C	ARC19	552.2926981	389.7088906	18.34978499	15.51050763	30.09804738	25.12547622	FALSE	0.424682814	FALSE	FALSE
YKL014C	URB1	26.50461532	27.09812387	8.763966542	4.151653228	3.024271624	6.527068226	FALSE	0.776081315	FALSE	FALSE
YKL015W	PUT3	71.80130734	106.9559598	3.055194575	4.736999098	23.50138611	22.57884319	FALSE	0.383044983	FALSE	FALSE
YKL016C	ATP7	481.2001182	339.9941217	8.612205915	1	55.87420028	339.9941217	TRUE	0.986029412	TRUE	FALSE
YKL017C	HCS1	35.79434031	28.58781589	4.048446007	1.839732296	8.841501219	15.53911727	FALSE	0.534775087	FALSE	FALSE
YKL018C-A	YKL018C-A	308.9562916	259.8400671	22.49039657	16.11836177	13.73725406	16.12074917	FALSE	0.409933679	FALSE	FALSE
YKL019W	RAM2	68.11651669	72.52126132	37.45581921	27.70293216	1.818583017	2.617818969	FALSE	0.383044983	FALSE	FALSE
YKL020C	SPT23	47.68093201	72.05918884	259.3044732	431.1199307	0.183880098	0.167144184	FALSE	0.383044983	FALSE	FALSE
YKL021C	MAK11	163.9638095	131.7464545	23.40723765	4.487867375	7.004833803	29.35613811	TRUE	0.957064591	TRUE	FALSE
YKL022C	CDC16	42.16642603	41.00340042	9.932027273	4.615781666	4.245500427	8.883305882	FALSE	0.791565744	FALSE	FALSE
YKL023C-A	YKL023C-A	77.02175012	68.95844779	4.516063199	3.172490197	17.05506472	21.73637853	FALSE	0.440224913	FALSE	FALSE
YKL023W	YKL023W	70.77015639	66.06103401	27.27119962	26.78403425	2.595051094	2.466433301	FALSE	0.383044983	FALSE	FALSE
YKL024C	URA6	72.15615186	70.89476821	335.3890896	279.1269932	0.215141619	0.253987504	FALSE	0.383044983	FALSE	FALSE
YKL025C	PAN3	22.86025095	30.18082534	6.16114757	3.283358705	3.710388477	9.192058515	FALSE	0.806877163	FALSE	FALSE
YKL027W	TCD2	123.2884461	137.430544	21.75531645	30.99352286	5.667049079	4.434169829	FALSE	0.415383506	FALSE	FALSE
YKL028W	TFA1	146.7398562	147.7141133	100.4482293	66.9301854	1.460850602	2.20698796	FALSE	0.383044983	FALSE	FALSE
YKL029C	MAE1	42.95893241	46.47278711	188.755156	129.6607844	0.227590776	0.358418217	FALSE	0.383044983	FALSE	FALSE
YKL032C	IXR1	12.67253042	12.96180823	295.614566	152.6392331	0.042868424	0.084917933	FALSE	0.383044983	FALSE	FALSE

YKL033W-A	YKL033W-A	555.0603971	451.1847836	6.716959377	2.555878309	82.63566383	176.5282729	FALSE	0.837399077	FALSE	FALSE
YKL034W	TUL1	25.82508093	32.78391236	3.500060842	5.285894715	7.378466287	6.202150085	FALSE	0.402436563	FALSE	FALSE
YKL035W	UGP1	373.0792955	282.0365746	293.0914441	1294.569009	1.272910906	0.217861367	FALSE	0.699437716	FALSE	FALSE
YKL037W	AIM26	1.020546918	5.18125757	3.986350632	1	0.256010324	5.18125757	TRUE	0.928229527	TRUE	FALSE
YKL038W	RGT1	22.2977736	32.38175365	312.3681192	275.3088797	0.071383	0.117619721	FALSE	0.383044983	FALSE	FALSE
YKL039W	PTM1	109.6250465	197.8469136	89.50306367	86.49247191	1.224818928	2.287446632	FALSE	0.45227797	FALSE	FALSE
YKL040C	NFU1	337.2109391	396.7089332	49.80846922	55.66363894	6.770152635	7.126895416	FALSE	0.383044983	FALSE	FALSE
YKL041W	VPS24	173.1537008	176.5542302	57.43701279	62.0336922	3.01467107	2.846102237	FALSE	0.383044983	FALSE	FALSE
YKL043W	PHD1	26.14212962	21.72033998	67.09322882	16.48157341	0.389638866	1.317855974	FALSE	0.577652826	FALSE	FALSE
YKL045W	PRI2	106.2472297	69.34951649	9.653212998	12.50334489	11.00641099	5.546477129	FALSE	0.531040946	FALSE	FALSE
YKL046C	DCW1	163.9238745	199.2596522	45.21972056	37.69793349	3.625052797	5.285691649	FALSE	0.428460208	FALSE	FALSE
YKL048C	ELM1	67.37265457	87.5317289	15.02579114	9.547154407	4.483800814	9.168357939	FALSE	0.791565744	FALSE	FALSE
YKL050C	YKL050C	15.36813187	20.42190145	71.05678587	31.94940584	0.216279581	0.639195031	FALSE	0.383044983	FALSE	FALSE
YKL051W	SFK1	17.83939075	37.94466172	739.4921642	811.7811098	0.02412384	0.046742479	FALSE	0.383044983	FALSE	FALSE
YKL052C	ASK1	136.698254	227.1176846	696.6104148	790.0377351	0.196233434	0.287477008	FALSE	0.383044983	FALSE	FALSE
YKL054C	DEF1	57.35363198	48.51031275	224.4231101	163.1027641	0.255560276	0.29742177	FALSE	0.383044983	FALSE	FALSE
YKL056C	TMA19	3344.510844	2741.270765	193.1974442	111.3488632	17.31136174	24.61875842	FALSE	0.480651672	FALSE	FALSE
YKL058W	TOA2	1007.500511	1137.180726	8.524412973	6.179018139	118.1900166	184.0390659	FALSE	0.531386967	FALSE	FALSE
YKL059C	MPE1	29.17979148	24.11277561	29.12535526	14.7791005	1.001869032	1.631545547	FALSE	0.383044983	FALSE	FALSE
YKL060C	FBA1	1653.812155	1861.208466	13286.84246	8007.556205	0.124469915	0.232431521	FALSE	0.383044983	FALSE	FALSE
YKL062W	MSN4	42.95807063	52.48589285	8.665699935	3.97835205	4.957253419	13.19287288	FALSE	0.835942907	FALSE	FALSE
YKL064W	MNR2	44.7468791	57.70692387	3.801234793	10.40587944	11.77166935	5.545607577	FALSE	0.809717416	FALSE	FALSE
YKL067W	YNK1	814.15522	586.2559296	12.11655798	12.85202978	67.19360574	45.6158241	FALSE	0.493367935	FALSE	FALSE
YKL068W	NUP100	35.95280483	40.27888046	22.55963901	16.5153942	1.593678198	2.43886885	FALSE	0.383044983	FALSE	FALSE
YKL069W	YKL069W	251.3443545	205.3610044	5.55774234	1	45.22418261	205.3610044	TRUE	0.959602076	TRUE	FALSE
YKL074C	MUD2	113.532752	122.863514	11.02339836	5.714916001	10.29925149	21.49874364	FALSE	0.827422145	FALSE	FALSE
YKL078W	DHR2	41.15272248	41.34798415	5.561498791	1	7.399574112	41.34798415	TRUE	0.965325836	TRUE	FALSE
YKL079W	SMY1	130.8353575	191.8484823	8.86249845	5.050006327	14.76280738	37.98975089	FALSE	0.853546713	FALSE	FALSE
YKL080W	VMA5	196.413473	153.4140044	14.36652237	10.17347563	13.67160875	15.0798026	FALSE	0.393670704	FALSE	FALSE
YKL081W	TEF4	188.9015047	105.143147	154.7716257	62.53511291	1.220517674	1.68134576	FALSE	0.383044983	FALSE	FALSE
YKL082C	RRP14	138.866171	98.61064694	15.75945404	3.975753607	8.811610518	24.8030076	FALSE	0.853243945	FALSE	FALSE
YKL085W	MDH1	184.1614993	150.7900617	59.60872945	81.08497221	3.08950553	1.859654849	FALSE	0.45227797	FALSE	FALSE
YKL086W	SRX1	17.83724659	37.50339952	2.300871049	9.382358345	7.752388643	3.997225233	FALSE	0.508693772	FALSE	FALSE
YKL087C	CYT2	147.3533676	153.4573353	38.62227375	53.99376665	3.815243208	2.84213058	FALSE	0.383044983	FALSE	FALSE
YKL088W	CAB3	50.61627243	59.74750862	138.1305413	80.4497612	0.36643795	0.742668564	FALSE	0.383044983	FALSE	FALSE
YKL089W	MIF2	45.66335128	42.43920973	9.87195331	4.461138171	4.625563943	9.51309018	FALSE	0.791565744	FALSE	FALSE
YKL091C	YKL091C	95.12547352	128.2985998	18.93024976	1.904699633	5.02505116	67.35896705	TRUE	0.999034025	TRUE	FALSE
YKL092C	BUD2	65.08577218	73.17529922	18.99126108	5.914162624	3.427143247	12.37289264	FALSE	0.870977509	FALSE	FALSE
YKL094W	YJU3	274.2183566	325.2559191	74.20070576	93.90982235	3.695630032	3.463492007	FALSE	0.383044983	FALSE	FALSE
YKL095W	YJU2	25.76899256	28.5711999	16.53025824	18.06113745	1.558898366	1.581915866	FALSE	0.383044983	FALSE	FALSE
YKL096C-B	YKL096C-B	7.286704991	11.45057923	31.68030403	48.47179585	0.23000742	0.236231793	FALSE	0.383044983	FALSE	FALSE
YKL096W	CWP1	73.17066262	106.0646602	320.6623778	1295.398609	0.228185992	0.08187801	FALSE	0.383044983	FALSE	FALSE
YKL096W-A	CWP2	1270.080515	991.6258439	3846.257232	2301.765922	0.330212058	0.430810898	FALSE	0.383044983	FALSE	FALSE
YKL098W	MTC2	85.62217596	105.4270133	145.769437	177.6828968	0.587380851	0.593343621	FALSE	0.383044983	FALSE	FALSE

YKL099C	UTP11	220.9236055	163.7050325	35.04816764	5.828575454	6.303428121	28.08662834	TRUE	0.956877163	TRUE	FALSE
YKL101W	HSL1	36.88924383	30.55884567	10.29960636	4.953301324	3.581616865	6.169389598	FALSE	0.487600923	FALSE	FALSE
YKL103C	APE1	210.206111	201.9030438	38.18580008	120.7981714	5.504824058	1.671408113	FALSE	0.808232411	FALSE	FALSE
YKL104C	GFA1	104.2939252	89.30813883	11.30500562	30.21090946	9.225464253	2.956155258	FALSE	0.855204729	FALSE	FALSE
YKL105C	SEG2	19.78708063	16.86995514	57.05135655	51.44517949	0.346829275	0.327921008	FALSE	0.383044983	FALSE	FALSE
YKL106W	AAT1	122.627292	139.4297045	17.81670116	12.32985946	6.882715879	11.30829633	FALSE	0.506257209	FALSE	FALSE
YKL107W	YKL107W	3.447473329	4.404068934	15.38596574	9.84140916	0.224066099	0.447503895	FALSE	0.383044983	FALSE	FALSE
YKL108W	SLD2	37.6640258	27.4526764	274.0759268	78.32494531	0.137421868	0.35049723	FALSE	0.383044983	FALSE	FALSE
YKL109W	HAP4	110.9854886	164.0218106	4.002251742	7.785651901	27.73076153	21.06719035	FALSE	0.450100923	FALSE	FALSE
YKL112W	ABF1	119.4541802	142.2899321	106.0325904	56.74810002	1.126579854	2.507395526	FALSE	0.699437716	FALSE	FALSE
YKL113C	RAD27	204.3321452	133.3869442	20.99185886	6.12741415	9.733875714	21.76888015	FALSE	0.831372549	FALSE	FALSE
YKL114C	APN1	158.0766164	158.3310652	105.7238705	81.40374467	1.495183781	1.945009604	FALSE	0.383044983	FALSE	FALSE
YKL116C	PRR1	43.8980686	41.2404143	29.20504701	19.41432159	1.503098714	2.124226392	FALSE	0.383044983	FALSE	FALSE
YKL117W	SBA1	761.1304752	549.5953306	747.1031024	663.2194591	1.018775685	0.828677933	FALSE	0.383044983	FALSE	FALSE
YKL120W	OAC1	214.5654362	266.5478029	7.357170722	4.706228814	29.16412359	56.63723831	FALSE	0.562096309	FALSE	FALSE
YKL122C	SRP21	255.3238296	161.2203806	11.57372887	1	22.06063686	161.2203806	TRUE	0.987730681	TRUE	FALSE
YKL125W	RRN3	78.08841495	56.52355989	6.747103192	4.839745748	11.57362096	11.67903498	FALSE	0.383044983	FALSE	FALSE
YKL127W	PGM1	49.21609851	39.87572047	24.22122743	2.724603449	2.031940729	14.63542171	TRUE	0.978633218	TRUE	FALSE
YKL128C	PMU1	313.0493192	319.8901422	37.08751716	31.14344136	8.440827078	10.27150913	FALSE	0.407151096	FALSE	FALSE
YKL129C	MYO3	43.38823553	44.55962912	364.9394111	548.9753155	0.118891614	0.08116873	FALSE	0.383044983	FALSE	FALSE
YKL134C	oct-01	41.13107733	56.11911902	6.604307544	13.76582944	6.227916713	4.076697249	FALSE	0.479368512	FALSE	FALSE
YKL138C-A	HSK3	363.6412776	270.5356631	10.63538206	1	34.19165156	270.5356631	TRUE	0.987745098	TRUE	FALSE
YKL139W	CTK1	188.8023373	184.2382713	23.17341505	10.34365934	8.147367871	17.81171104	FALSE	0.824134948	FALSE	FALSE
YKL140W	TGL1	55.87801095	49.49563811	6.094032656	2.707617041	9.169299559	18.28014721	FALSE	0.822995963	FALSE	FALSE
YKL141W	SDH3	78.84776255	76.79456885	36.17574503	8.88909308	2.179575362	8.639190541	FALSE	0.857598039	FALSE	FALSE
YKL142W	MRP8	382.4416074	323.6990667	2.505706112	7.10753954	152.6282774	45.54305535	FALSE	0.889302191	FALSE	FALSE
YKL143W	LTV1	169.3426052	128.4203722	11.23757759	9.423389932	15.06931577	13.62783171	FALSE	0.395040369	FALSE	FALSE
YKL145W	RPT1	615.5293532	558.5074599	532.3899276	634.6680958	1.156162657	0.879999268	FALSE	0.383044983	FALSE	FALSE
YKL146W	AVT3	33.36672993	49.76025939	96.14386558	92.3330548	0.347050014	0.538921402	FALSE	0.383044983	FALSE	FALSE
YKL148C	SDH1	51.95045524	39.36866614	313.6482984	383.3697996	0.16563283	0.102691099	FALSE	0.383044983	FALSE	FALSE
YKL149C	DBR1	107.0870438	103.7017217	10.02732627	12.00870426	10.67952123	8.635546308	FALSE	0.41816609	FALSE	FALSE
YKL150W	MCR1	128.0985102	99.12788822	27.76014893	64.7052561	4.61447489	1.531991282	FALSE	0.808232411	FALSE	FALSE
YKL151C	YKL151C	173.9754712	187.6289723	49.62054133	167.6164092	3.506117962	1.119395012	FALSE	0.774048443	FALSE	FALSE
YKL152C	GPM1	1509.151038	1430.256903	272.70409	169.7534512	5.534024216	8.425495286	FALSE	0.479368512	FALSE	FALSE
YKL154W	SRP102	417.5728085	293.0054026	7.652049458	3.071078036	54.57006136	95.40799652	FALSE	0.556459054	FALSE	FALSE
YKL155C	RSM22	73.40766395	84.300461	6.80624892	4.81478485	10.78533342	17.50866625	FALSE	0.518959054	FALSE	FALSE
YKL157W	APE2	121.2666749	139.9782246	5.866634609	5.460351848	20.6705689	25.6353855	FALSE	0.427739331	FALSE	FALSE
YKL159C	RCN1	48.11974994	56.50503538	9.902720754	10.40535501	4.859245367	5.430380348	FALSE	0.383044983	FALSE	FALSE
YKL160W	ELF1	357.6807244	234.3809289	1438.086962	1186.058551	0.248719816	0.197613287	FALSE	0.383044983	FALSE	FALSE
YKL163W	PIR3	16.16784236	31.34184027	1	40.1602216	16.16784236	0.780420003	TRUE	0.994651096	FALSE	TRUE
YKL164C	PIR1	67.25642911	61.55394592	369.0344366	343.7051092	0.182249737	0.179089412	FALSE	0.383044983	FALSE	FALSE
YKL165C	MCD4	34.37423876	36.04634682	4.337041859	5.677658056	7.925733687	6.348805522	FALSE	0.415383506	FALSE	FALSE
YKL166C	TPK3	85.16374505	83.22476131	10.65908768	1	7.989778077	83.22476131	TRUE	0.997981546	TRUE	FALSE
YKL168C	KKQ8	66.83667337	79.8806986	4.487134371	3.187912327	14.89517983	25.05736997	FALSE	0.54094579	FALSE	FALSE

YKL171W	NNK1	24.07985395	33.23199486	9.851759161	11.30276073	2.444218698	2.940166181	FALSE	0.383044983	FALSE	FALSE
YKL172W	EBP2	233.9804103	165.3583826	879.3713067	314.4872083	0.266076922	0.525803207	FALSE	0.383044983	FALSE	FALSE
YKL173W	SNU114	52.62219065	55.52007616	19.92116936	8.844247538	2.641521173	6.277535304	FALSE	0.776081315	FALSE	FALSE
YKL175W	ZRT3	101.6861609	108.7909886	138.0483061	1	0.736598397	108.7909886	TRUE	0.999985582	TRUE	FALSE
YKL176C	LST4	123.0272387	130.5814408	4.94244208	2.64690091	24.89199401	49.33370958	FALSE	0.561735871	FALSE	FALSE
YKL178C	STE3	8.302615029	15.33476232	1.545424602	7.428595182	5.372384402	2.064288327	FALSE	0.783708189	FALSE	FALSE
YKL179C	COY1	115.372829	116.1249353	3.929709724	2.309423913	29.35912246	50.28307476	FALSE	0.549221453	FALSE	FALSE
YKL180W	RPL17A	183.1523146	131.8840102	179.7434862	29.499268	1.018964962	4.47075535	FALSE	0.873241061	FALSE	FALSE
YKL181W	PRS1	338.0599816	353.0458064	342.1584537	167.3965642	0.988021713	2.109038546	FALSE	0.699437716	FALSE	FALSE
YKL182W	FAS1	70.34582157	35.60599592	144.4038003	32.72756665	0.487146609	1.087951215	FALSE	0.577652826	FALSE	FALSE
YKL183W	LOTS	82.9149493	82.05626809	34.63187345	36.51723424	2.394180304	2.247055939	FALSE	0.383044983	FALSE	FALSE
YKL184W	SPE1	171.115342	183.5185899	71.37707108	48.5891869	2.397343285	3.776943011	FALSE	0.45227797	FALSE	FALSE
YKL185W	ASH1	54.43378941	33.49784181	50.53797739	70.02320131	1.077086821	0.478382039	FALSE	0.577652826	FALSE	FALSE
YKL186C	MTR2	126.9593464	134.0265303	67.2608136	64.1784228	1.887567807	2.088342537	FALSE	0.383044983	FALSE	FALSE
YKL187C	FAT3	5.821601857	6.098843797	11.32775669	13.5900169	0.513923632	0.44877382	FALSE	0.383044983	FALSE	FALSE
YKL190W	CNB1	332.593921	328.0530894	14.17938954	5.019439536	23.45615233	65.3565178	FALSE	0.857857555	FALSE	FALSE
YKL191W	DPH2	47.53383256	47.00417498	40.74465163	21.16717101	1.166627537	2.220616773	FALSE	0.45227797	FALSE	FALSE
YKL192C	ACP1	75.95136948	78.29455883	33.76524682	17.0929738	2.249394766	4.580511251	FALSE	0.749524221	FALSE	FALSE
YKL193C	SDS22	104.8225113	103.4111762	10.98877434	1	9.539053951	103.4111762	TRUE	0.997995963	TRUE	FALSE
YKL195W	MIA40	347.0804283	293.132212	20.71748532	40.76976909	16.75301915	7.189940452	FALSE	0.830348904	FALSE	FALSE
YKL196C	YKT6	841.415039	811.7947961	10.74148484	1.85414075	78.33321477	437.8280323	TRUE	0.965859285	TRUE	FALSE
YKL197C	PEX1	28.54657415	34.16950035	22.13884038	13.17528953	1.289434029	2.593453471	FALSE	0.699437716	FALSE	FALSE
YKL198C	PTK1	6.777478247	7.572607217	90.59956838	155.0735925	0.07480696	0.048832345	FALSE	0.383044983	FALSE	FALSE
YKL201C	MNN4	27.21441135	40.26790764	12.77393086	13.3845162	2.130464901	3.00854413	FALSE	0.383044983	FALSE	FALSE
YKL203C	TOR2	16.87963984	18.31025024	257.1914906	244.0493529	0.065630631	0.075026834	FALSE	0.383044983	FALSE	FALSE
YKL204W	EAP1	29.73773759	36.38748898	37.07874688	37.38256452	0.802015712	0.973381293	FALSE	0.383044983	FALSE	FALSE
YKL205W	LOS1	87.6919538	121.6019034	10.8832204	3.926616169	8.05753725	30.96862493	FALSE	0.890628604	FALSE	FALSE
YKL206C	ADD66	200.6562792	197.0327855	6.627306674	2.09419529	30.27719843	94.08520136	FALSE	0.88849481	FALSE	FALSE
YKL207W	EMC3	255.5128049	214.828402	66.58718272	67.08260089	3.837267091	3.202445927	FALSE	0.383044983	FALSE	FALSE
YKL209C	STE6	208.4603442	126.2886382	14.06251567	4.330685481	14.82383017	29.16135073	FALSE	0.557684544	FALSE	FALSE
YKL210W	UBA1	173.1036747	147.5470509	135.4328628	236.0511969	1.278151189	0.625063769	FALSE	0.577652826	FALSE	FALSE
YKL211C	TRP3	113.9330162	74.36974139	69.254805	43.65794498	1.645127962	1.703464087	FALSE	0.383044983	FALSE	FALSE
YKL212W	SAC1	68.04038635	63.59080304	114.6725923	47.97278511	0.5933448	1.325559959	FALSE	0.577652826	FALSE	FALSE
YKL213C	DOA1	109.4701909	128.1239608	53.85177987	53.59907134	2.032805437	2.390413818	FALSE	0.383044983	FALSE	FALSE
YKL214C	YRA2	77.39147458	42.52948922	35.20681636	20.5563584	2.198195764	2.068921372	FALSE	0.383044983	FALSE	FALSE
YKL215C	OMP1	26.06303961	32.37178875	80.37962826	88.22276693	0.324249318	0.366932368	FALSE	0.383044983	FALSE	FALSE
YKL216W	URA1	858.3661371	402.238296	45.96974909	6.798973435	18.67241293	59.16162195	FALSE	0.888379469	FALSE	FALSE
YKL217W	JEN1	11.61306306	9.564752629	26.66928831	36.8113914	0.435447055	0.259831326	FALSE	0.383044983	FALSE	FALSE
YKL218C	SRY1	88.83689265	96.16223912	22.57801029	64.01135203	3.934664371	1.502268521	FALSE	0.749524221	FALSE	FALSE
YKL221W	MCH2	2.818345812	7.06137635	6.681882964	1.306079748	0.421789161	5.406543023	TRUE	0.928229527	TRUE	FALSE
YKR001C	VPS1	70.31756448	74.40065391	36.87369848	10.72092372	1.90698431	6.939761519	FALSE	0.847303922	FALSE	FALSE
YKR002W	PAP1	54.55424123	64.24213032	8.68163068	5.242413026	6.283870305	12.25430541	FALSE	0.531040946	FALSE	FALSE
YKR006C	MRPL13	95.32293322	98.88381192	12.24893454	13.18582169	7.782140795	7.499252927	FALSE	0.383044983	FALSE	FALSE
YKR007W	MEH1	168.5789047	101.1745566	48.71230705	56.92583059	3.460704591	1.777304882	FALSE	0.45227797	FALSE	FALSE

YKR008W	RSC4	55.52329522	71.12641681	3.292295468	1.817739856	16.8646149	39.1290407	FALSE	0.83954729	FALSE	FALSE
YKR009C	FOX2	12.1310294	21.55598668	28.17464619	32.9621346	0.430565456	0.653962097	FALSE	0.383044983	FALSE	FALSE
YKR012C	YKR012C	23.90347669	68.1582097	8.099955828	1.607090315	2.951062598	42.41093923	TRUE	0.999307958	TRUE	FALSE
YKR013W	PRV2	73.60308072	42.97303627	1233.356291	812.5113541	0.059677063	0.052889152	FALSE	0.383044983	FALSE	FALSE
YKR014C	YPT52	235.3450676	169.2286914	8.967009559	7.341207375	26.24565816	23.05188816	FALSE	0.408044983	FALSE	FALSE
YKR016W	MIC60	125.7102525	105.5022798	5.517661943	1.733605314	22.78324655	60.85715069	FALSE	0.857064591	FALSE	FALSE
YKR018C	YKR018C	89.02627172	93.17699563	100.005525	95.15333949	0.890213533	0.979229905	FALSE	0.383044983	FALSE	FALSE
YKR019C	IRS4	19.59682024	21.51988229	58.90193345	51.10521066	0.332702495	0.421089787	FALSE	0.383044983	FALSE	FALSE
YKR020W	VPS51	90.67899544	65.92757738	11.46537747	7.503913108	7.908941129	8.7857597	FALSE	0.383044983	FALSE	FALSE
YKR022C	NTR2	192.9585656	192.1155767	1	5.217390912	192.9585656	36.82215498	TRUE	0.965657439	FALSE	TRUE
YKR023W	YKR023W	41.03059873	41.46957565	56.82507846	39.64766845	0.722050894	1.045952443	FALSE	0.383044983	FALSE	FALSE
YKR024C	DBP7	108.1727538	88.25920112	88.3800976	61.66011443	1.223949246	1.431382376	FALSE	0.383044983	FALSE	FALSE
YKR025W	RPC37	147.0215035	116.559987	158.815216	120.2478742	0.925739404	0.969330957	FALSE	0.383044983	FALSE	FALSE
YKR026C	GCN3	170.8168752	170.9814998	28.29224824	25.12724381	6.037585763	6.804626131	FALSE	0.383044983	FALSE	FALSE
YKR028W	SAP190	53.79288984	51.28142163	32.47860661	9.901151374	1.656256085	5.17933922	FALSE	0.808232411	FALSE	FALSE
YKR029C	SET3	29.0370026	24.71432301	9.890306419	3.124269935	2.935905256	7.910431403	FALSE	0.802407728	FALSE	FALSE
YKR030W	GMH1	115.6830902	182.4313226	35.07131827	36.58430296	3.29850989	4.986601025	FALSE	0.45227797	FALSE	FALSE
YKR031C	SPO14	52.99159568	44.40682334	61.27809693	50.09671355	0.864772216	0.886421887	FALSE	0.383044983	FALSE	FALSE
YKR036C	CAF4	51.06728032	46.98129438	13.53913155	11.64379864	3.771828358	4.034876918	FALSE	0.383044983	FALSE	FALSE
YKR037C	SPC34	51.69621784	54.60450334	21.86088682	5.240765442	2.364781368	10.41918474	TRUE	0.93755767	TRUE	FALSE
YKR038C	KAE1	121.0685093	95.81979438	17.92096003	20.53409709	6.75569328	4.666374858	FALSE	0.44994233	FALSE	FALSE
YKR039W	GAP1	62.43445404	95.45801156	6.416066562	19.87553957	9.730954852	4.802788434	FALSE	0.791565744	FALSE	FALSE
YKR041W	YKR041W	4.644911548	11.58042031	21.53607663	18.35233177	0.215680489	0.631005392	FALSE	0.383044983	FALSE	FALSE
YKR042W	UTH1	264.6573725	274.5924948	1563.110502	2583.465537	0.169314564	0.10628843	FALSE	0.383044983	FALSE	FALSE
YKR043C	SHB17	125.1955931	118.6831812	696.6642243	307.843601	0.179707223	0.385530772	FALSE	0.383044983	FALSE	FALSE
YKR044W	UIP5	45.02220877	47.11560234	30.09077834	12.61448529	1.496212835	3.73503962	FALSE	0.749524221	FALSE	FALSE
YKR045C	YKR045C	18.8767901	24.65321197	133.4731519	131.0841998	0.141427619	0.188071575	FALSE	0.383044983	FALSE	FALSE
YKR046C	PET10	16.93389188	25.12180167	95.96209617	210.8961823	0.176464381	0.119119281	FALSE	0.383044983	FALSE	FALSE
YKR048C	NAP1	172.8122858	119.9002499	1085.541789	1524.736764	0.159194503	0.078636688	FALSE	0.383044983	FALSE	FALSE
YKR049C	FMP46	117.6385955	116.6749606	32.36697891	77.81975791	3.634525046	1.499297398	FALSE	0.749524221	FALSE	FALSE
YKR050W	TRK2	7.259413961	9.896784122	64.15759055	81.81299327	0.113149729	0.120968366	FALSE	0.383044983	FALSE	FALSE
YKR051W	YKR051W	87.82305538	112.1513497	8.849554367	4.892245038	9.924008796	22.92431161	FALSE	0.834602076	FALSE	FALSE
YKR052C	MRS4	95.72261638	190.3135362	7.508638188	1.859993665	12.74833252	102.319454	TRUE	0.995126874	TRUE	FALSE
YKR053C	YSR3	17.03229809	32.18776308	124.2885358	43.49862651	0.137038368	0.739971941	FALSE	0.577652826	FALSE	FALSE
YKR054C	DYN1	20.1231506	22.87576485	17.71582127	14.22433746	1.135885844	1.608213031	FALSE	0.383044983	FALSE	FALSE
YKR055W	RHO4	60.72254159	62.44125133	4.434066841	3.987972679	13.69454809	15.65739195	FALSE	0.399264706	FALSE	FALSE
YKR057W	RPS21A	1844.585207	1128.542664	15.84173502	2.863575478	116.4383323	394.1026431	FALSE	0.889316609	FALSE	FALSE
YKR058W	GLG1	25.58810505	30.40734791	17.6212798	15.74325366	1.452113884	1.931452581	FALSE	0.383044983	FALSE	FALSE
YKR059W	TIF1	325.1416091	243.2247161	283.3790079	117.3312972	1.147373658	2.072973895	FALSE	0.383044983	FALSE	FALSE
YKR060W	UTP30	77.10658736	70.14480703	1	7.045707385	77.10658736	9.955679847	TRUE	0.987644175	FALSE	TRUE
YKR061W	KTR2	68.59081459	86.84079589	8.798158445	23.17254449	7.796042208	3.747572734	FALSE	0.791565744	FALSE	FALSE
YKR062W	TFA2	68.806576	73.6242527	4.839498906	6.074551258	14.2177067	12.12011383	FALSE	0.409933679	FALSE	FALSE
YKR066C	CCP1	141.1044254	189.6669466	260.9971929	569.3609084	0.540635797	0.333122531	FALSE	0.383044983	FALSE	FALSE
YKR067W	GPT2	69.66769019	83.22743174	23.6748382	41.54840618	2.942689179	2.003143788	FALSE	0.383044983	FALSE	FALSE

YKR068C	BET3	334.6625849	358.9089168	14.92035701	10.84353164	22.42993145	33.09889516	FALSE	0.488033449	FALSE	FALSE
YKR069W	MET1	94.13016212	140.9450344	7.413807697	26.93478492	12.69660153	5.232825687	FALSE	0.822231834	FALSE	FALSE
YKR070W	YKR070W	93.64688851	104.9241352	4.223956415	1	22.17042017	104.9241352	TRUE	0.959544406	TRUE	FALSE
YKR071C	DRE2	149.4226897	289.4823534	10.89054233	3.451059661	13.72040851	83.88216428	TRUE	0.985942907	TRUE	FALSE
YKR072C	SIS2	44.65209986	41.85038863	116.1851701	132.0303831	0.38431841	0.316975439	FALSE	0.383044983	FALSE	FALSE
YKR075C	YKR075C	8.674648799	14.15593586	37.33726553	5.902531039	0.232332193	2.398282324	FALSE	0.827537486	FALSE	FALSE
YKR076W	ECM4	46.67943089	52.35025337	2.387704247	8.024270123	19.54992163	6.523989418	FALSE	0.881358131	FALSE	FALSE
YKR078W	YKR078W	36.14338312	47.34749878	3.029014049	6.975708708	11.93239204	6.787482214	FALSE	0.528460208	FALSE	FALSE
YKR080W	MTD1	297.2188702	642.2257533	3.123955465	1	95.14183975	642.2257533	TRUE	0.986072664	TRUE	FALSE
YKR081C	RPF2	233.2449627	177.5669533	107.899287	20.4421685	2.161691417	8.686307094	TRUE	0.923745675	TRUE	FALSE
YKR082W	NUP133	82.57846157	88.23350542	6.717383841	2.880387661	12.29324742	30.63251055	FALSE	0.851600346	FALSE	FALSE
YKR084C	HBS1	82.47153034	78.43848265	26.65145308	35.05891697	3.0944478	2.237333307	FALSE	0.383044983	FALSE	FALSE
YKR085C	MRPL20	336.8242205	196.1608255	51.42893635	39.48377764	6.549313371	4.968137225	FALSE	0.415383506	FALSE	FALSE
YKR086W	PRP16	34.98343441	41.0827326	124.1026288	76.18010897	0.281891163	0.539284246	FALSE	0.383044983	FALSE	FALSE
YKR089C	TGL4	54.60362906	70.62946996	41.4069337	17.74075712	1.31870738	3.98119818	FALSE	0.774048443	FALSE	FALSE
YKR090W	PXL1	25.1822478	28.34301789	62.02655191	63.46077522	0.405991419	0.446622623	FALSE	0.383044983	FALSE	FALSE
YKR091W	SRL3	74.8337719	139.4324659	4.142663463	15.79283515	18.06416876	8.828843242	FALSE	0.822995963	FALSE	FALSE
YKR092C	SRP40	83.25105211	79.20831597	352.4784934	184.780613	0.236187608	0.428661398	FALSE	0.383044983	FALSE	FALSE
YKR093W	PTR2	36.35283055	84.78930058	67.65632646	64.73842735	0.537316057	1.309721352	FALSE	0.577652826	FALSE	FALSE
YKR094C	RPL40B	644.5062321	492.9826001	26.17631949	8.98856587	24.62172852	54.84552344	FALSE	0.83866782	FALSE	FALSE
YKR095W	MLP1	76.76416825	87.82314437	42.31811115	8.599491741	1.813979078	10.21259709	TRUE	0.944059977	TRUE	FALSE
YKR096W	ESL2	35.37748075	45.69773869	23.32863229	26.38800994	1.516483278	1.731761462	FALSE	0.383044983	FALSE	FALSE
YKR098C	UBP11	20.50020067	23.18576681	1	6.440145637	20.50020067	3.600192934	TRUE	0.961303345	FALSE	TRUE
YKR099W	BAS1	26.44272255	19.52542877	23.58641213	11.66646605	1.121099827	1.673636959	FALSE	0.383044983	FALSE	FALSE
YKR100C	SKG1	99.95339711	101.0709078	4.171571621	1	23.96060914	101.0709078	TRUE	0.9588812	TRUE	FALSE
YKR102W	FLO10	1.370149656	1.355098134	14.1038325	2.483638599	0.097147329	0.545610031	FALSE	0.383044983	FALSE	FALSE
YLL001W	DNM1	83.53755458	86.51264701	14.92904372	12.57992618	5.595640024	6.877039321	FALSE	0.407151096	FALSE	FALSE
YLL002W	RTT109	23.45529753	17.73721127	3.567843648	1.804258346	6.574082232	9.830749187	FALSE	0.493886967	FALSE	FALSE
YLL003W	SF11	50.62990374	66.03778127	17.71695539	11.93346232	2.857709049	5.533832471	FALSE	0.487600923	FALSE	FALSE
YLL008W	DRS1	137.7667863	102.5861476	2517.716161	1176.171704	0.054718951	0.087220384	FALSE	0.383044983	FALSE	FALSE
YLL009C	COX17	2205.789697	1450.196985	7.815033435	12.52794829	282.2495534	115.7569421	FALSE	0.845948674	FALSE	FALSE
YLL010C	PSR1	30.92877118	32.00152894	66.07850319	57.01163726	0.468061014	0.561315733	FALSE	0.383044983	FALSE	FALSE
YLL011W	SOF1	201.004005	168.7028039	3.347118151	2.402092013	60.0528562	70.231616	FALSE	0.420963091	FALSE	FALSE
YLL012W	YEH1	15.86826	28.92567924	51.37910937	43.77982269	0.308846537	0.660708003	FALSE	0.383044983	FALSE	FALSE
YLL013C	PUF3	60.11531618	77.6717612	330.1969304	390.3857559	0.182058979	0.198961566	FALSE	0.383044983	FALSE	FALSE
YLL014W	EMC6	939.4724233	1048.087598	4.28375949	3.48656882	219.3102637	300.6071734	FALSE	0.48072376	FALSE	FALSE
YLL015W	BPT1	37.83481438	42.48797273	21.04256627	12.14408358	1.798013317	3.498656151	FALSE	0.45227797	FALSE	FALSE
YLL017W	YLL017W	4.670964738	4.658149834	1	5.185899675	4.670964738	0.898233696	FALSE	0.873241061	FALSE	FALSE
YLL018C	DPS1	63.2472064	40.96257665	950.3198765	785.3171938	0.066553597	0.05216055	FALSE	0.383044983	FALSE	FALSE
YLL018C-A	COX19	39.25497638	33.80901404	10.91477035	15.63482706	3.596500442	2.162416886	FALSE	0.45227797	FALSE	FALSE
YLL019C	KNS1	27.71185909	38.13279199	1671.385847	2235.342737	0.016580169	0.017059036	FALSE	0.383044983	FALSE	FALSE
YLL021W	SPA2	30.49786547	23.77656848	224.7127655	91.87087911	0.135719328	0.25880419	FALSE	0.383044983	FALSE	FALSE
YLL022C	HIF1	32.78387997	21.44986942	105.0594844	57.91068542	0.312050646	0.37039571	FALSE	0.383044983	FALSE	FALSE
YLL023C	POM33	23.33480527	22.80678555	10.51831361	20.94861063	2.218493015	1.088701583	FALSE	0.699437716	FALSE	FALSE

YLL024C	SSA2	546.5028743	1014.105686	4669.188725	8391.317888	0.117044503	0.120851778	FALSE	0.383044983	FALSE	FALSE
YLL026W	HSP104	771.5837672	1678.003559	36.37785537	179.9458258	21.21025991	9.325048531	FALSE	0.831588812	FALSE	FALSE
YLL027W	ISA1	86.41470859	97.90718985	31.03962358	40.06776992	2.784012775	2.443539784	FALSE	0.383044983	FALSE	FALSE
YLL028W	TPO1	73.69461436	154.6300864	102.1636088	97.77723708	0.721339186	1.581452811	FALSE	0.577652826	FALSE	FALSE
YLL029W	FRA1	197.5182833	232.7110025	298.0576045	278.2426072	0.662684932	0.836360056	FALSE	0.383044983	FALSE	FALSE
YLL031C	GPI13	37.55492356	48.92929238	156.6720683	94.56856968	0.239704013	0.517394865	FALSE	0.383044983	FALSE	FALSE
YLL032C	YLL032C	14.93803929	19.67435153	24.67167233	7.100350183	0.605473317	2.770898762	FALSE	0.827537486	FALSE	FALSE
YLL034C	RIX7	152.8642885	136.1162117	24.4486021	11.5537236	6.252475616	11.78115527	FALSE	0.531040946	FALSE	FALSE
YLL035W	GRC3	37.3352499	48.91090775	59.8728923	1	0.623575185	48.91090775	TRUE	0.999841407	TRUE	FALSE
YLL036C	PRP19	54.40932497	61.69191801	59.58061948	27.88195068	0.91320509	2.212611259	FALSE	0.699437716	FALSE	FALSE
YLL038C	ENT4	35.65000829	35.8718518	46.9721205	71.67706696	0.758961016	0.500464839	FALSE	0.383044983	FALSE	FALSE
YLL039C	UBI4	948.4797413	1469.713895	19.56676656	117.5204883	48.47401527	12.5060227	FALSE	0.892070358	FALSE	FALSE
YLL040C	VPS13	30.35161697	33.79020139	33.08009557	44.55366602	0.917519023	0.758415736	FALSE	0.383044983	FALSE	FALSE
YLL041C	SDH2	66.04429243	57.89618711	19.53683462	7.418419412	3.380501176	7.804383104	FALSE	0.791565744	FALSE	FALSE
YLL043W	FPS1	76.70978986	83.0857184	222.7198642	202.5139158	0.344422758	0.41027165	FALSE	0.383044983	FALSE	FALSE
YLL045C	RPL8B	257.8227136	148.9157939	265.8936055	92.82794194	0.96964616	1.604213029	FALSE	0.383044983	FALSE	FALSE
YLL048C	YBT1	44.0768196	40.22488954	59.66673442	22.44211327	0.738716808	1.792384214	FALSE	0.699437716	FALSE	FALSE
YLL050C	COF1	939.1753099	522.9831859	1.053579644	4.098000029	891.4136819	127.619127	TRUE	0.986072664	FALSE	TRUE
YLL051C	FRE6	40.26594343	78.19847505	3.032844486	2.152021105	13.27662649	36.33722498	FALSE	0.855925606	FALSE	FALSE
YLL056C	YLL056C	22.74556742	40.50565073	6.746764403	3.221153394	3.371329731	12.57489035	FALSE	0.875807382	FALSE	FALSE
YLL058W	YLL058W	70.04176499	118.8181098	44.01478621	88.8523782	1.591323531	1.337253005	FALSE	0.383044983	FALSE	FALSE
YLL060C	GTT2	127.3616385	205.3350089	7.119356933	7.278030813	17.88948633	28.21298977	FALSE	0.525014418	FALSE	FALSE
YLL061W	MMP1	26.32696495	78.95650983	12.30072935	11.18147496	2.140276742	7.061368033	FALSE	0.831055363	FALSE	FALSE
YLL062C	MHT1	27.65211125	52.30678796	7.587420912	1.125319023	3.644467807	46.48174151	TRUE	0.998918685	TRUE	FALSE
YLL063C	AYT1	32.72625399	32.08016529	15.02161412	2.981268991	2.178611016	10.7605739	TRUE	0.938148789	TRUE	FALSE
YLR002C	NOC3	80.29275831	75.21406885	33.76015946	13.89856034	2.378328763	5.41164459	FALSE	0.776081315	FALSE	FALSE
YLR004C	THI73	2.734832026	4.538544322	4.585252904	3.25128295	0.596440825	1.395924129	FALSE	0.577652826	FALSE	FALSE
YLR005W	SSL1	80.01706347	77.69082644	59.41628106	55.98374511	1.346719486	1.387739	FALSE	0.383044983	FALSE	FALSE
YLR006C	SSK1	27.11648982	30.94584202	34.93250097	33.6663173	0.776253892	0.919192965	FALSE	0.383044983	FALSE	FALSE
YLR007W	NSE1	110.7060224	118.6615606	25.87721564	12.14080382	4.27812729	9.773781236	FALSE	0.803662053	FALSE	FALSE
YLR008C	PAM18	284.856988	306.9818464	10.3162368	4.707178841	27.61249025	65.21567521	FALSE	0.844694348	FALSE	FALSE
YLR009W	RLP24	366.7641512	243.985419	14.25569408	1.990111071	25.72755484	122.5988953	TRUE	0.959558824	TRUE	FALSE
YLR011W	LOT6	88.1741906	74.08928468	4.284032271	4.275407885	20.58205565	17.32917342	FALSE	0.41583045	FALSE	FALSE
YLR014C	PPR1	40.55326424	54.26007582	4.342275489	4.657332	9.339173515	11.65046336	FALSE	0.42850346	FALSE	FALSE
YLR015W	BRE2	87.36365668	97.65544159	12.21986556	10.20292757	7.14931406	9.571315769	FALSE	0.446323529	FALSE	FALSE
YLR016C	PML1	613.2680493	501.204528	76.64679486	49.1183733	8.001222366	10.20401317	FALSE	0.42850346	FALSE	FALSE
YLR017W	MEU1	82.49642337	83.91184597	199.0089684	60.8990862	0.414536209	1.377883499	FALSE	0.577652826	FALSE	FALSE
YLR018C	POM34	78.12967018	66.35463861	35.82036825	32.53131338	2.181152065	2.039715945	FALSE	0.383044983	FALSE	FALSE
YLR019W	PSR2	60.53945855	66.61430901	106.1575343	73.08341751	0.570279434	0.911483224	FALSE	0.383044983	FALSE	FALSE
YLR020C	YEH2	92.64975548	94.45461388	8.082532977	1	11.4629604	94.45461388	TRUE	0.995112457	TRUE	FALSE
YLR021W	IRC25	136.0184932	140.6855354	5.46522749	2.503017359	24.88798379	56.20637624	FALSE	0.840340254	FALSE	FALSE
YLR024C	UBR2	29.50214247	36.25773784	8.08845881	9.944748694	3.647436819	3.645917957	FALSE	0.383044983	FALSE	FALSE
YLR025W	SNF7	195.1184075	172.8734113	136.7600252	115.5437467	1.426721056	1.496172803	FALSE	0.383044983	FALSE	FALSE
YLR026C	SED5	65.60171356	67.80458037	18.99888385	19.80656559	3.452924608	3.423338593	FALSE	0.383044983	FALSE	FALSE

YLR027C	AAT2	182.6603614	142.9482995	1100.808769	1307.909708	0.165932873	0.109295236	FALSE	0.383044983	FALSE	FALSE
YLR028C	ADE16	135.9282299	142.0163445	132.142924	158.3210656	1.028645544	0.897014835	FALSE	0.383044983	FALSE	FALSE
YLR029C	RPL15A	559.5952467	338.791059	2658.786076	881.9331388	0.210470204	0.384145968	FALSE	0.383044983	FALSE	FALSE
YLR030W	YLR030W	13.98458534	26.1908645	23.43088592	25.91494882	0.596844071	1.01064697	FALSE	0.383044983	FALSE	FALSE
YLR032W	RAD5	34.12918235	38.01803097	50.3975728	30.43007221	0.67719893	1.249357238	FALSE	0.383044983	FALSE	FALSE
YLR034C	SMF3	63.07970354	95.42149358	4.440491843	10.43478182	14.20556681	9.144560489	FALSE	0.509068627	FALSE	FALSE
YLR035C	MLH2	27.11575564	41.63616895	40.7606076	42.57013744	0.665244147	0.978060477	FALSE	0.383044983	FALSE	FALSE
YLR036C	YLR036C	115.1347014	120.6801242	3.41244023	1	33.73969759	120.6801242	FALSE	0.891839677	FALSE	FALSE
YLR040C	AFB1	3.670340292	5.089146324	4.621016564	1	0.794271183	5.089146324	TRUE	0.919045559	TRUE	FALSE
YLR044C	PDC1	414.0329893	569.7178536	4104.482649	3435.585577	0.100873368	0.165828457	FALSE	0.383044983	FALSE	FALSE
YLR045C	STU2	36.22861199	37.4519248	46.82496014	23.18264065	0.773702997	1.61551591	FALSE	0.577652826	FALSE	FALSE
YLR046C	YLR046C	57.45114267	93.11924352	8.236626079	12.76289147	6.975082045	7.296093033	FALSE	0.383044983	FALSE	FALSE
YLR047C	FRE8	21.35453573	35.38640541	7.91390794	10.75478627	2.698355338	3.290293691	FALSE	0.383044983	FALSE	FALSE
YLR048W	RPS0B	206.8886595	132.2961419	1472.70505	241.5067942	0.140482074	0.5477947	FALSE	0.383044983	FALSE	FALSE
YLR049C	YLR049C	144.545127	80.99791117	16.1031096	5.27455283	8.976224502	15.35635603	FALSE	0.529411765	FALSE	FALSE
YLR050C	YLR050C	62.37179581	54.91493363	10.25117284	2.585205988	6.084357059	21.24199537	FALSE	0.884140715	FALSE	FALSE
YLR052W	IES3	56.41632151	55.79657056	29.441858	8.139016371	1.916194335	6.855443952	FALSE	0.831055363	FALSE	FALSE
YLR055C	SPT8	66.22080158	83.99136442	245.667469	234.4301159	0.269554621	0.358278902	FALSE	0.383044983	FALSE	FALSE
YLR056W	ERG3	212.4957139	299.8617427	245.0489603	149.0965309	0.867156154	2.01119195	FALSE	0.699437716	FALSE	FALSE
YLR058C	SHM2	214.4151703	506.4679274	291.6432607	96.59233731	0.735196725	5.243355131	TRUE	0.919045559	TRUE	FALSE
YLR059C	REX2	26.08820305	20.0629807	79.92731984	72.5748619	0.326399072	0.276445317	FALSE	0.383044983	FALSE	FALSE
YLR060W	FRS1	123.441999	95.61854364	244.6232351	203.7593953	0.504620908	0.469271827	FALSE	0.383044983	FALSE	FALSE
YLR061W	RPL22A	1122.072932	768.9071172	3.507988556	1	319.8621987	768.9071172	FALSE	0.845689158	FALSE	FALSE
YLR063W	BMT6	11.28178368	13.71759176	53.22567544	79.85771586	0.211961306	0.171775408	FALSE	0.383044983	FALSE	FALSE
YLR065C	ENV10	175.494818	132.6060316	7.09251331	1	24.7436713	132.6060316	TRUE	0.965657439	TRUE	FALSE
YLR068W	FYV7	207.8948069	137.3374128	296.9617406	81.61337882	0.700072698	1.682780627	FALSE	0.577652826	FALSE	FALSE
YLR070C	XYL2	4.694515821	8.388702732	6.719505359	59.31488016	0.698640089	0.141426615	FALSE	0.577652826	FALSE	FALSE
YLR071C	RGR1	59.88150916	91.65993885	54.62139218	37.20561587	1.096301408	2.463604935	FALSE	0.699437716	FALSE	FALSE
YLR072W	YLR072W	30.06378284	40.99464743	36.23174514	59.98113445	0.829763588	0.683459021	FALSE	0.383044983	FALSE	FALSE
YLR073C	RFU1	34.31880958	30.4559991	21.62884234	12.11212094	1.586715047	2.514505861	FALSE	0.383044983	FALSE	FALSE
YLR074C	BUD20	134.3895292	89.6636789	1130.620077	1269.207572	0.118863562	0.070645402	FALSE	0.383044983	FALSE	FALSE
YLR075W	RPL10	2228.681391	1821.142019	167.1442487	107.8335915	13.33388022	16.88844815	FALSE	0.435510381	FALSE	FALSE
YLR077W	FMP25	57.72800529	53.99509173	13.62672228	19.76818262	4.236382316	2.731414049	FALSE	0.45227797	FALSE	FALSE
YLR078C	BOS1	328.6452659	291.9268551	12.70865616	12.47305109	25.85995417	23.4046067	FALSE	0.397188581	FALSE	FALSE
YLR079W	SIC1	114.1157659	91.17195338	61.00827066	113.5979803	1.87049665	0.802584281	FALSE	0.699437716	FALSE	FALSE
YLR080W	EMP46	53.54500072	50.07772766	16.55657288	48.3729445	3.234063059	1.035242493	FALSE	0.774048443	FALSE	FALSE
YLR081W	GAL2	2.83019846	3.753032657	2.100780692	3.444154515	1.347212715	1.089681848	FALSE	0.383044983	FALSE	FALSE
YLR082C	SRL2	119.4055474	122.2605396	7.612913125	8.843773137	15.6846066	13.82447715	FALSE	0.396957901	FALSE	FALSE
YLR083C	EMP70	48.72347649	63.02829193	8.841388667	2.433559734	5.510839793	25.89962804	TRUE	0.956978085	TRUE	FALSE
YLR084C	RAX2	45.65380277	41.80438898	11.66991198	3.305511474	3.912094869	12.64687457	FALSE	0.86810842	FALSE	FALSE
YLR085C	ARP6	58.86905171	74.1368324	5.605311183	6.049636434	10.50236995	12.25475832	FALSE	0.402436563	FALSE	FALSE
YLR086W	SMC4	56.89689309	54.06545513	103.3767765	56.73183024	0.550383703	0.953000369	FALSE	0.383044983	FALSE	FALSE
YLR087C	CSF1	18.73184723	25.43613994	102.5907281	37.47305796	0.182588111	0.678784741	FALSE	0.577652826	FALSE	FALSE
YLR088W	GAA1	56.67437215	57.43192334	35.45332308	14.9220083	1.598563047	3.848806553	FALSE	0.749524221	FALSE	FALSE

YLR089C	ALT1	46.36621726	30.74678818	37.01908251	51.7218187	1.252495041	0.59446456	FALSE	0.577652826	FALSE	FALSE
YLR090W	XDJ1	78.25287534	105.2189513	37.08750871	42.7112541	2.109952328	2.463494774	FALSE	0.383044983	FALSE	FALSE
YLR091W	GEP5	10.40957856	10.03648363	29.72524356	32.21064413	0.350193213	0.311589038	FALSE	0.383044983	FALSE	FALSE
YLR092W	SUL2	18.74655646	32.41473556	37.70163689	22.63812438	0.49723455	1.431864893	FALSE	0.577652826	FALSE	FALSE
YLR094C	GIS3	37.13370535	45.52914206	51.98655918	46.96120166	0.714294347	0.969505474	FALSE	0.383044983	FALSE	FALSE
YLR095C	IOC2	40.78045229	45.66580703	59.52792051	50.22617506	0.685064285	0.909203358	FALSE	0.383044983	FALSE	FALSE
YLR096W	KIN2	32.09620056	37.32716963	48.99251535	52.96057621	0.65512457	0.704810489	FALSE	0.383044983	FALSE	FALSE
YLR099C	ICT1	12.29823627	13.49094534	53.27907284	67.87624562	0.23082677	0.198757978	FALSE	0.383044983	FALSE	FALSE
YLR099W-A	MIM2	113.7167597	84.07767965	62.43023646	50.15719027	1.821501346	1.676283683	FALSE	0.383044983	FALSE	FALSE
YLR100W	ERG27	199.8260191	172.9989147	23.90635867	16.90107457	8.358697441	10.23597133	FALSE	0.407151096	FALSE	FALSE
YLR102C	APC9	108.1135177	89.9026102	6.889265058	5.291999123	15.6930408	16.98840233	FALSE	0.390109573	FALSE	FALSE
YLR103C	CDC45	99.91703004	57.90910918	17.4435851	8.390251874	5.72801001	6.901951223	FALSE	0.407151096	FALSE	FALSE
YLR105C	SEN2	47.67844006	51.61382375	87.81862267	66.90272986	0.54291947	0.771475601	FALSE	0.383044983	FALSE	FALSE
YLR106C	MDN1	16.81585351	14.66229425	2990.622306	545.9716364	0.005622861	0.026855414	FALSE	0.383044983	FALSE	FALSE
YLR107W	REX3	271.2573389	288.8199281	4.835589232	1	56.09602592	288.8199281	TRUE	0.965657439	TRUE	FALSE
YLR109W	AHP1	1604.447359	1953.217013	431.2887448	1047.202818	3.720123417	1.865175474	FALSE	0.699437716	FALSE	FALSE
YLR110C	CCW12	605.7753254	607.3671187	19062.42444	11552.31172	0.031778504	0.052575375	FALSE	0.383044983	FALSE	FALSE
YLR112W	YLR112W	62.63096433	76.75663	14.36417358	14.05289838	4.360220515	5.461978583	FALSE	0.415383506	FALSE	FALSE
YLR113W	HOG1	92.58794874	71.41460405	193.9471304	152.4678662	0.477387567	0.468391182	FALSE	0.383044983	FALSE	FALSE
YLR114C	AVL9	98.14032735	105.2946677	177.8730145	99.23584195	0.551743768	1.061054813	FALSE	0.383044983	FALSE	FALSE
YLR115W	CFT2	57.55932082	65.54893298	82.63394386	28.63389963	0.696557832	2.289207332	FALSE	0.699437716	FALSE	FALSE
YLR116W	MSL5	24.84914071	37.39303812	34.63503242	50.76989979	0.717456834	0.736519833	FALSE	0.383044983	FALSE	FALSE
YLR117C	CLF1	45.25947577	62.28428885	14.07248358	15.96104097	3.216168311	3.902269843	FALSE	0.383044983	FALSE	FALSE
YLR120C	YPS1	53.56367353	87.07694191	90.92436221	173.2517012	0.589101449	0.502603676	FALSE	0.383044983	FALSE	FALSE
YLR121C	YPS3	7.682773435	6.57582002	154.2189176	193.9402812	0.049817322	0.033906417	FALSE	0.383044983	FALSE	FALSE
YLR125W	YLR125W	54.07408813	86.15258937	8.794813979	1	6.148406125	86.15258937	TRUE	0.999538639	TRUE	FALSE
YLR126C	YLR126C	138.5052258	109.9269587	33.23340114	10.9549129	4.16765125	10.03448952	FALSE	0.806877163	FALSE	FALSE
YLR128W	DCN1	16.01275912	21.36789001	7.232381924	7.199907792	2.214036715	2.96780051	FALSE	0.383044983	FALSE	FALSE
YLR129W	DIP2	224.7505936	184.9802259	120.689338	126.1933429	1.862224097	1.465847735	FALSE	0.383044983	FALSE	FALSE
YLR130C	ZRT2	269.4185959	432.5982606	35.31335779	7.098500823	7.629367831	60.94220052	TRUE	0.995040369	TRUE	FALSE
YLR131C	ACE2	23.46993177	19.59268021	30.64713704	13.73127367	0.765811558	1.426865467	FALSE	0.383044983	FALSE	FALSE
YLR132C	USB1	38.47847653	37.98698634	33.42674197	22.28572968	1.151128535	1.704543082	FALSE	0.383044983	FALSE	FALSE
YLR133W	CKI1	78.61642263	98.50610447	21.53460704	18.96658158	3.650701518	5.193666767	FALSE	0.428460208	FALSE	FALSE
YLR136C	TIS11	37.70742443	36.1872797	11.14353883	1	3.383792618	36.1872797	TRUE	0.997404844	TRUE	FALSE
YLR137W	RKM5	126.9233125	110.1017234	25.19509415	36.59465489	5.037620092	3.0086832	FALSE	0.487600923	FALSE	FALSE
YLR138W	NHA1	63.92494744	68.11567064	592.0845665	580.3783182	0.107965907	0.117364258	FALSE	0.383044983	FALSE	FALSE
YLR139C	SLS1	7.241445954	8.343111956	8.008648677	5.857693168	0.904203224	1.424299928	FALSE	0.383044983	FALSE	FALSE
YLR141W	RRN5	20.35206064	18.87458115	69.98277642	102.3434513	0.290815279	0.184423927	FALSE	0.383044983	FALSE	FALSE
YLR144C	ACF2	50.22844081	67.69844426	4.60489264	3.145251197	10.90762472	21.52401828	FALSE	0.552623991	FALSE	FALSE
YLR146C	SPE4	198.2661591	252.1000257	7.453226154	5.538986731	26.60138777	45.51374429	FALSE	0.547621107	FALSE	FALSE
YLR147C	SMD3	110.7293405	88.94492161	22.36653185	16.77964009	4.950670997	5.300764565	FALSE	0.383044983	FALSE	FALSE
YLR149C-A	YLR149C-A	2.512656893	1	350.4753034	223.3764239	0.007169284	0.004476748	FALSE	0.383044983	FALSE	FALSE
YLR150W	STM1	285.7948527	146.5879879	1257.753138	847.8600217	0.227226507	0.172891732	FALSE	0.383044983	FALSE	FALSE
YLR152C	YLR152C	28.28807483	45.94886479	9.881657905	14.48644791	2.862685099	3.171851724	FALSE	0.383044983	FALSE	FALSE

YLR153C	ACS2	96.83647422	70.43934816	224.4889381	137.9713551	0.431364124	0.510536032	FALSE	0.383044983	FALSE	FALSE
YLR162W	YLR162W	1	1	18.97587954	41.75533555	0.05269848	0.023949035	FALSE	0.383044983	FALSE	FALSE
YLR162W-A	RRT15	63.22855124	60.11903625	15.5221128	13.50473498	4.073450056	4.451700559	FALSE	0.383044983	FALSE	FALSE
YLR163C	MAS1	171.701839	183.6772594	8.28305152	6.400705921	20.72929748	28.69640657	FALSE	0.473428489	FALSE	FALSE
YLR164W	SHH4	98.0183985	125.3465774	1.63361265	4.325064443	60.00100359	28.98143577	FALSE	0.835957324	FALSE	FALSE
YLR167W	RPS31	3119.948	2100.136402	231.179767	58.31969882	13.49576583	36.01075527	FALSE	0.855536332	FALSE	FALSE
YLR169W	YLR169W	9.67443883	10.45033306	13.90498212	9.382505974	0.695753417	1.113810435	FALSE	0.383044983	FALSE	FALSE
YLR172C	DPH5	38.89470438	40.67545394	34.79875446	15.20736022	1.117703923	2.67472154	FALSE	0.699437716	FALSE	FALSE
YLR173W	YLR173W	41.15971292	63.0599033	21.3992351	19.75966386	1.92341982	3.191344941	FALSE	0.45227797	FALSE	FALSE
YLR175W	CBF5	318.6176996	270.2496846	209.5276906	82.03806492	1.520647218	3.294198673	FALSE	0.699437716	FALSE	FALSE
YLR176C	RFX1	42.5356917	71.43052693	78.39254555	89.6363832	0.542598679	0.796892114	FALSE	0.383044983	FALSE	FALSE
YLR177W	YLR177W	50.93356589	66.79621245	108.8599089	126.4868062	0.467881761	0.528088379	FALSE	0.383044983	FALSE	FALSE
YLR178C	TFS1	241.234097	274.2533836	20.08778047	424.6832396	12.00899708	0.645783393	TRUE	0.98861015	FALSE	TRUE
YLR179C	YLR179C	271.748404	292.1511075	182.4588657	135.9453912	1.489368044	2.149032821	FALSE	0.383044983	FALSE	FALSE
YLR180W	SAM1	135.9677589	224.3430415	365.6477453	263.2792311	0.371854498	0.852110668	FALSE	0.383044983	FALSE	FALSE
YLR181C	VTA1	95.24816796	76.50572922	27.0597435	2.291121709	3.519921316	33.39225887	TRUE	0.994723183	TRUE	FALSE
YLR182W	SWI6	44.34860252	52.85978261	47.60868142	7.803085761	0.931523436	6.774215256	TRUE	0.937946943	TRUE	FALSE
YLR183C	TOS4	47.98320021	21.48107092	25.84217766	1	1.856778513	21.48107092	TRUE	0.995198962	TRUE	FALSE
YLR185W	RPL37A	591.1237083	408.242345	29.89005533	8.088300666	19.77660134	50.47319108	FALSE	0.854339677	FALSE	FALSE
YLR186W	EMG1	125.957272	142.3924264	15.3952804	9.953799487	8.181551017	14.30533402	FALSE	0.534775087	FALSE	FALSE
YLR187W	SKG3	12.20363445	19.85476063	10.14251632	8.101434993	1.203215658	2.450770838	FALSE	0.699437716	FALSE	FALSE
YLR188W	MDL1	41.31924669	41.95255321	54.49391232	23.47331756	0.758236011	1.787244309	FALSE	0.699437716	FALSE	FALSE
YLR189C	ATG26	53.37911496	77.02529237	29.951159	34.44156069	1.782205322	2.236405402	FALSE	0.383044983	FALSE	FALSE
YLR190W	MMR1	46.01090143	45.38339329	29.11706697	15.32565916	1.580203854	2.961268603	FALSE	0.45227797	FALSE	FALSE
YLR191W	PEX13	90.00116242	96.50259577	52.45553977	59.98741735	1.715760867	1.608713961	FALSE	0.383044983	FALSE	FALSE
YLR192C	HCR1	232.0240273	170.3679298	120.7682871	76.16230155	1.921233074	2.236906269	FALSE	0.383044983	FALSE	FALSE
YLR194C	YLR194C	35.71914211	46.63131813	58.92031823	119.0284656	0.606227922	0.391766103	FALSE	0.383044983	FALSE	FALSE
YLR195C	NMT1	158.9439159	110.874367	22.86556229	9.867170228	6.951235832	11.23669345	FALSE	0.506257209	FALSE	FALSE
YLR196W	PWP1	178.2738049	161.2026619	24.978454	11.86280445	7.137103238	13.58891673	FALSE	0.537802768	FALSE	FALSE
YLR197W	NOP56	318.9797195	249.5057668	4.150203654	1	76.8588113	249.5057668	FALSE	0.888826413	FALSE	FALSE
YLR199C	PBA1	107.7660702	112.8840774	4.202042094	1.273731024	25.64611867	88.62473729	FALSE	0.889273356	FALSE	FALSE
YLR200W	YKE2	369.8266794	234.7560223	22.56491785	4.436143624	16.38945384	52.91894091	FALSE	0.888307382	FALSE	FALSE
YLR203C	MSS51	66.19729706	75.4839275	72.29977789	122.0752684	0.91559475	0.61833923	FALSE	0.383044983	FALSE	FALSE
YLR204W	QRI5	229.0107283	160.4339397	49.16215952	41.18070375	4.658272349	3.895852308	FALSE	0.383044983	FALSE	FALSE
YLR205C	HMX1	25.66386663	50.8268333	1.664969003	4.476534518	15.41402068	11.35405817	FALSE	0.46156286	FALSE	FALSE
YLR206W	ENT2	36.43352495	37.37003119	118.696634	116.9053371	0.306946572	0.319660608	FALSE	0.383044983	FALSE	FALSE
YLR207W	HRD3	13.74630198	18.21827077	93.16745394	117.4945617	0.147544034	0.15505629	FALSE	0.383044983	FALSE	FALSE
YLR208W	SEC13	333.1181577	317.2998658	3.860616852	2.060901185	86.28625177	153.9617077	FALSE	0.557352941	FALSE	FALSE
YLR209C	PNP1	68.27393458	55.89779801	58.49593209	37.17694856	1.167156965	1.503560679	FALSE	0.383044983	FALSE	FALSE
YLR210W	CLB4	58.43062787	58.17956575	7.206160909	4.65025666	8.108426749	12.51104401	FALSE	0.50239331	FALSE	FALSE
YLR212C	TUB4	63.4384021	42.64699664	53.22273538	15.36436654	1.191941783	2.775708099	FALSE	0.699437716	FALSE	FALSE
YLR213C	CRR1	7.522130448	10.61974069	15.90517709	25.1233006	0.472935976	0.422704837	FALSE	0.383044983	FALSE	FALSE
YLR216C	CPR6	273.1208511	990.2051765	91.63399758	364.4870453	2.980562436	2.716708836	FALSE	0.383044983	FALSE	FALSE
YLR218C	COA4	211.2018466	85.74809713	52.69819911	75.96822856	4.007762129	1.128736299	FALSE	0.774048443	FALSE	FALSE

YLR219W	MSC3	26.15483959	36.73078069	281.9525599	324.0112552	0.092763263	0.113362669	FALSE	0.383044983	FALSE	FALSE
YLR220W	CCC1	183.9347823	166.2092889	37.40445309	46.96301961	4.917456804	3.539152513	FALSE	0.428460208	FALSE	FALSE
YLR222C	UTP13	140.7159534	133.8449312	4.271106831	1.438580098	32.94601585	93.03960995	FALSE	0.858318916	FALSE	FALSE
YLR222C-A	YLR222C-A	143.8414492	236.7901998	3.7706337	3.70621374	38.14781828	63.89005505	FALSE	0.54877451	FALSE	FALSE
YLR223C	IFH1	65.95608661	81.99841054	133.2898883	99.55145983	0.494831884	0.823678635	FALSE	0.383044983	FALSE	FALSE
YLR224W	YLR224W	111.2043086	147.7148526	13.52143282	10.29553612	8.224299163	14.34746583	FALSE	0.530190311	FALSE	FALSE
YLR225C	YLR225C	156.6879701	247.5129918	6.59607753	4.976555045	23.75471928	49.73580913	FALSE	0.835611303	FALSE	FALSE
YLR226W	BUR2	75.44315773	89.63837275	17.92429144	4.927883924	4.208989683	18.19003332	TRUE	0.951600346	TRUE	FALSE
YLR227W-B	YLR227W-B	43.22504384	52.94413166	3.437691842	1	12.57385648	52.94413166	TRUE	0.958679354	TRUE	FALSE
YLR228C	ECM22	21.66639889	26.8026772	5.901613302	6.503752013	3.671267123	4.121109959	FALSE	0.383044983	FALSE	FALSE
YLR231C	BNA5	90.09406171	88.954432	9.318726209	18.47631765	9.66806618	4.81451086	FALSE	0.791565744	FALSE	FALSE
YLR234W	TOP3	8.835730557	9.719786841	50.57783519	33.53685456	0.174695705	0.289824045	FALSE	0.383044983	FALSE	FALSE
YLR236C	YLR236C	2.02408472	3.262273285	5.641002207	3.368753226	0.358816509	0.968391884	FALSE	0.577652826	FALSE	FALSE
YLR237W	THI7	23.88352387	26.90966995	25.15048918	7.831383392	0.949624626	3.436132367	FALSE	0.774048443	FALSE	FALSE
YLR241W	CSC1	40.97802168	75.53850037	9.896418049	3.157330896	4.140692266	23.92479688	TRUE	0.962932526	TRUE	FALSE
YLR243W	GPN3	71.88837158	75.820967	3.443141724	1	20.87871408	75.820967	FALSE	0.891796424	FALSE	FALSE
YLR244C	MAP1	128.2059435	109.3071748	20.23790906	8.581896029	6.334940191	12.73694933	FALSE	0.809717416	FALSE	FALSE
YLR245C	CDD1	123.1436158	120.4189478	4.876991357	6.400670363	25.24991471	18.81348999	FALSE	0.467805652	FALSE	FALSE
YLR246W	ERF2	63.48879071	67.2843865	4.415662116	1	14.37809077	67.2843865	TRUE	0.959457901	TRUE	FALSE
YLR247C	IRC20	60.07514648	91.6170795	13.36880347	20.36162769	4.493681624	4.499496843	FALSE	0.383044983	FALSE	FALSE
YLR248W	RCK2	166.7633794	207.2291029	170.0712618	217.2852065	0.980550021	0.953719336	FALSE	0.383044983	FALSE	FALSE
YLR249W	YEF3	451.9151679	336.2685744	7188.81173	3259.21629	0.062863681	0.103174673	FALSE	0.383044983	FALSE	FALSE
YLR250W	SSP120	310.1759103	318.5922208	8.260494181	8.084732489	37.54931649	39.40664966	FALSE	0.386908881	FALSE	FALSE
YLR253W	MCP2	52.92448888	65.36565471	21.13228557	4.470023752	2.504437521	14.62311127	TRUE	0.956805075	TRUE	FALSE
YLR254C	NDL1	151.2310878	108.2473785	5.518990193	2.847755781	27.401949	38.01146828	FALSE	0.477883506	FALSE	FALSE
YLR255C	YLR255C	11.73283007	29.85809447	3.655704266	1.769587854	3.20945821	16.87290879	TRUE	0.958304498	TRUE	FALSE
YLR256W	HAP1	54.37960145	66.60311835	347.7943465	340.0708705	0.156355622	0.195850701	FALSE	0.383044983	FALSE	FALSE
YLR256W-A	YLR256W-A	29.13580454	43.74109282	3.500542826	5.616798761	8.323224708	7.787548509	FALSE	0.383044983	FALSE	FALSE
YLR257W	YLR257W	169.9476847	293.6501864	25.42976258	17.57276381	6.683022862	16.7105294	FALSE	0.842805652	FALSE	FALSE
YLR258W	GSY2	153.0620893	129.3149419	207.3658151	472.1486848	0.73812595	0.273886058	FALSE	0.383044983	FALSE	FALSE
YLR259C	HSP60	480.8631845	1017.854885	212.1487591	819.521251	2.266632087	1.242011581	FALSE	0.45227797	FALSE	FALSE
YLR260W	LCB5	41.48196882	66.8931982	14.07023649	21.63492845	2.948206938	3.091907531	FALSE	0.383044983	FALSE	FALSE
YLR264W	RPS28B	919.410718	778.4839499	4.197547959	1.665648262	219.0351907	467.3759566	FALSE	0.837226067	FALSE	FALSE
YLR269C	YLR269C	7.058346715	6.39907452	15.21308972	5.108189723	0.463965364	1.252708859	FALSE	0.577652826	FALSE	FALSE
YLR274W	MCM5	102.5397146	90.12450345	12.45924494	11.49077338	8.230010332	7.843206066	FALSE	0.383044983	FALSE	FALSE
YLR276C	DBP9	95.60483523	56.47570751	6.476653523	1.323066098	14.76145588	42.68547702	FALSE	0.857439446	FALSE	FALSE
YLR278C	YLR278C	38.06244559	36.65681818	94.99035806	69.12873076	0.400697991	0.530268931	FALSE	0.383044983	FALSE	FALSE
YLR286C	CTS1	105.223644	42.16328873	241.4113069	92.58476393	0.435868748	0.455402022	FALSE	0.383044983	FALSE	FALSE
YLR287C-A	RPS30A	1211.414705	1100.329098	66.36758186	15.31073666	18.25310899	71.8665027	FALSE	0.892373126	FALSE	FALSE
YLR288C	MEC3	53.48697137	45.33873071	5.162713824	5.655170354	10.36024331	8.017217498	FALSE	0.430449827	FALSE	FALSE
YLR292C	SEC72	364.7108529	231.327126	125.3405505	142.4774454	2.909759464	1.623605233	FALSE	0.45227797	FALSE	FALSE
YLR295C	ATP14	178.184226	92.30928486	39.56755719	16.04600854	4.503291047	5.752787969	FALSE	0.415383506	FALSE	FALSE
YLR299W	ECM38	32.18937757	50.23703444	90.83955249	239.5916463	0.354354207	0.209677738	FALSE	0.383044983	FALSE	FALSE
YLR300W	EXG1	412.6968996	211.6699501	32.1459423	16.35156701	12.83822685	12.94493365	FALSE	0.383044983	FALSE	FALSE

YLR301W	HRI1	525.5350089	478.5155716	24.86947954	9.563446806	21.13172526	50.03588991	FALSE	0.844175317	FALSE	FALSE
YLR303W	MET17	1	1.286581936	41.869534	31.40334124	0.023883715	0.040969587	FALSE	0.383044983	FALSE	FALSE
YLR304C	ACO1	397.3234134	420.280468	296.9958375	356.6556075	1.33780802	1.178392991	FALSE	0.383044983	FALSE	FALSE
YLR305C	STT4	21.64418421	25.46066154	37.76780992	23.78705	0.573085499	1.070358096	FALSE	0.383044983	FALSE	FALSE
YLR309C	IMH1	163.7910661	190.2152142	6.108391258	2.015924907	26.81410853	94.35629944	FALSE	0.891796424	FALSE	FALSE
YLR310C	CDC25	42.77311106	42.54496782	9.36887859	1.546560686	4.565446189	27.50940729	TRUE	0.984155133	TRUE	FALSE
YLR313C	SPH1	37.09678435	41.2207582	3.688179883	3.071403441	10.05829041	13.42082178	FALSE	0.456156286	FALSE	FALSE
YLR314C	CDC3	121.9579031	111.6655482	403.5056179	359.6542801	0.302245862	0.310480243	FALSE	0.383044983	FALSE	FALSE
YLR315W	NKP2	21.76548244	15.72881762	14.64790632	7.271331574	1.485910817	2.163127546	FALSE	0.383044983	FALSE	FALSE
YLR316C	TAD3	146.0348926	133.349208	20.51944936	33.86739911	7.116901142	3.937391459	FALSE	0.508693772	FALSE	FALSE
YLR319C	BUD6	58.33673831	56.37654783	36.85660268	30.30514685	1.582802919	1.860296144	FALSE	0.383044983	FALSE	FALSE
YLR320W	MMS22	21.18402894	29.72368174	1	4.335145929	21.18402894	6.85644318	FALSE	0.882453864	FALSE	FALSE
YLR321C	SFH1	64.39149141	56.83002302	93.12926232	48.27564806	0.69142061	1.177198552	FALSE	0.383044983	FALSE	FALSE
YLR323C	CWC24	41.85184405	31.67541887	17.83451855	10.13324549	2.346676415	3.125890804	FALSE	0.383044983	FALSE	FALSE
YLR324W	PEX30	58.45124042	48.49518655	89.59911443	127.4118233	0.652364042	0.380617633	FALSE	0.383044983	FALSE	FALSE
YLR326W	YLR326W	32.45254505	52.99502037	28.38769457	23.50890131	1.143190581	2.254253386	FALSE	0.45227797	FALSE	FALSE
YLR327C	TMA10	401.7459189	894.9878018	26.45525677	240.5793666	15.18586353	3.720135332	TRUE	0.947923875	FALSE	TRUE
YLR328W	NMA1	63.68314312	91.69665915	10.40631872	5.747603842	6.11966103	15.95389343	FALSE	0.83989331	FALSE	FALSE
YLR330W	CHS5	55.48160794	69.53448124	494.8194021	446.509311	0.112124965	0.155729073	FALSE	0.383044983	FALSE	FALSE
YLR332W	MID2	33.43766481	49.99844838	3.581549682	5.270375148	9.336088504	9.486696293	FALSE	0.383044983	FALSE	FALSE
YLR333C	RPS25B	671.6247353	368.8912786	143.3350141	60.83789983	4.685699021	6.063511062	FALSE	0.415383506	FALSE	FALSE
YLR335W	NUP2	45.54611719	37.68807951	39.42823039	26.76950259	1.155165138	1.407873732	FALSE	0.383044983	FALSE	FALSE
YLR336C	SGD1	102.526638	98.11286904	19.28609122	8.648282869	5.316092144	11.34478029	FALSE	0.809717416	FALSE	FALSE
YLR337C	VRP1	26.87232281	24.12008414	658.5867514	1315.663679	0.040803012	0.018333017	FALSE	0.383044983	FALSE	FALSE
YLR338W	OPI9	1.273899474	3.23375691	5.600077291	6.019330279	0.227478909	0.537228688	FALSE	0.383044983	FALSE	FALSE
YLR339C	YLR339C	1.320055252	1	3.739964262	1	0.352959322	1	FALSE	0.577652826	FALSE	FALSE
YLR340W	RPP0	476.0802462	253.5505501	559.5682582	244.3943855	0.850799235	1.03746471	FALSE	0.383044983	FALSE	FALSE
YLR342W	FKS1	89.85771525	106.7112707	1339.003554	530.9794718	0.067107899	0.200970614	FALSE	0.383044983	FALSE	FALSE
YLR344W	RPL26A	327.9017246	237.0627731	50.87971063	46.23749277	6.44464602	5.127068076	FALSE	0.415383506	FALSE	FALSE
YLR347C	KAP95	64.35744083	115.9772214	23.79721323	16.49751694	2.704410815	7.029980439	FALSE	0.802407728	FALSE	FALSE
YLR348C	dic-01	142.4034989	67.75490668	113.5850246	144.695036	1.253717199	0.468260063	FALSE	0.577652826	FALSE	FALSE
YLR350W	ORM2	38.84004043	45.66430923	41.6685983	21.50788541	0.932117758	2.123142668	FALSE	0.699437716	FALSE	FALSE
YLR351C	NIT3	105.3078598	69.37916814	44.43844386	37.96805292	2.369746792	1.82730382	FALSE	0.383044983	FALSE	FALSE
YLR352W	YLR352W	17.22476056	29.21511075	5.514055541	1	3.123791633	29.21511075	TRUE	0.994362745	TRUE	FALSE
YLR353W	BUD8	53.2025977	37.76999516	99.29532598	38.27168325	0.535801632	0.986891403	FALSE	0.383044983	FALSE	FALSE
YLR354C	TAL1	142.4088178	111.6746051	174.4689123	134.7779985	0.816241793	0.828581863	FALSE	0.383044983	FALSE	FALSE
YLR355C	ILV5	472.8997936	299.3877164	3456.566411	1329.169712	0.136812009	0.225244161	FALSE	0.383044983	FALSE	FALSE
YLR356W	ATG33	37.41489936	34.92115266	15.20964701	48.78957392	2.45994528	0.71575031	FALSE	0.699437716	FALSE	FALSE
YLR357W	RSC2	30.1838791	34.19338914	441.7980341	344.362037	0.068320537	0.099294886	FALSE	0.383044983	FALSE	FALSE
YLR359W	ADE13	124.009762	127.7453536	7.201643032	1.059506195	17.21964854	120.5706528	TRUE	0.987730681	TRUE	FALSE
YLR361C	DCR2	40.90119382	68.30490333	34.92797696	40.07707643	1.171015254	1.704338475	FALSE	0.383044983	FALSE	FALSE
YLR361C-A	YLR361C-A	270.1233062	168.6002148	3.090519102	2.100389886	87.40386237	80.27091346	FALSE	0.396871396	FALSE	FALSE
YLR362W	STE11	43.77435589	56.36962884	5.67850651	2.201121486	7.708779731	25.6095037	FALSE	0.884904844	FALSE	FALSE
YLR367W	RPS22B	858.2737253	714.4004951	7.157147553	1.796771797	119.9184059	397.6022421	FALSE	0.88884083	FALSE	FALSE

YLR368W	MDM30	61.67544959	72.93549888	4.496378205	1	13.71669526	72.93549888	TRUE	0.965542099	TRUE	FALSE
YLR370C	ARC18	254.69544426	201.2585692	15.83817757	9.631766521	16.08110791	20.89529151	FALSE	0.443843714	FALSE	FALSE
YLR371W	ROM2	48.63173044	47.51331555	15.71028662	13.30160325	3.095534259	3.571999154	FALSE	0.383044983	FALSE	FALSE
YLR373C	VID22	30.42859069	34.95912813	120.7643785	80.56317006	0.251966607	0.433934366	FALSE	0.383044983	FALSE	FALSE
YLR375W	STP3	62.13469372	93.07436381	34.43999312	50.24714328	1.804143616	1.852331451	FALSE	0.383044983	FALSE	FALSE
YLR378C	SEC61	28.83373908	32.68716444	123.6004501	88.4883434	0.233281829	0.369395145	FALSE	0.383044983	FALSE	FALSE
YLR379W	YLR379W	1.360184932	7.751161324	6.716535047	1.114286484	0.202512891	6.956165615	TRUE	0.961548443	TRUE	FALSE
YLR380W	CSR1	16.15308686	11.84468418	507.7489267	383.3244098	0.031813138	0.030899895	FALSE	0.383044983	FALSE	FALSE
YLR381W	CTF3	23.85882969	33.24052029	24.46377086	11.15769314	0.975271957	2.979157059	FALSE	0.774048443	FALSE	FALSE
YLR382C	NAM2	36.7998956	44.33593419	11.66943052	5.505930264	3.153529688	8.052396609	FALSE	0.802407728	FALSE	FALSE
YLR383W	SMC6	50.05933653	38.90590045	22.05195325	5.677596119	2.270063607	6.852530478	FALSE	0.831055363	FALSE	FALSE
YLR384C	IKI3	60.43467176	64.49514284	666.3004198	366.039453	0.090701837	0.176197244	FALSE	0.383044983	FALSE	FALSE
YLR386W	VAC14	34.90339962	43.84073162	27.95517954	18.63264974	1.248548576	2.352898393	FALSE	0.45227797	FALSE	FALSE
YLR387C	REH1	247.489934	254.4799186	16.03229854	28.6523535	15.43695892	8.881641032	FALSE	0.530190311	FALSE	FALSE
YLR388W	RPS29A	790.8844715	547.8043639	7.988671162	4.586060217	99.00075438	119.4498846	FALSE	0.432871972	FALSE	FALSE
YLR389C	STE23	26.36823207	23.26273766	43.01252282	10.36981974	0.613036166	2.243311672	FALSE	0.699437716	FALSE	FALSE
YLR390W	ECM19	20.84986384	18.31780884	12.99791395	16.699784	1.604093082	1.096888968	FALSE	0.383044983	FALSE	FALSE
YLR390W-A	CCW14	60.77335543	93.05668669	1493.607553	1398.009922	0.040688972	0.066563681	FALSE	0.383044983	FALSE	FALSE
YLR393W	ATP10	23.24805878	33.03051701	22.38117588	35.02833459	1.038732679	0.94296567	FALSE	0.383044983	FALSE	FALSE
YLR394W	CST9	13.07483297	18.50985494	1.591276607	6.582976487	8.216568327	2.811775946	FALSE	0.816262976	FALSE	FALSE
YLR396C	VPS33	44.9978603	51.80508833	3.146768304	2.085453603	14.29970559	24.84116082	FALSE	0.542430796	FALSE	FALSE
YLR397C	AFG2	46.36994085	54.58564313	34.91717818	8.323989608	1.327997945	6.557629899	TRUE	0.912312572	TRUE	FALSE
YLR398C	SKI2	55.42346265	54.29861388	53.67958231	35.31505587	1.032486846	1.537548577	FALSE	0.383044983	FALSE	FALSE
YLR399C	BDF1	143.4006572	180.8424813	265.5208041	190.1046705	0.540073151	0.951278476	FALSE	0.383044983	FALSE	FALSE
YLR401C	DUS3	75.91679191	69.64880318	200.9630593	187.4560567	0.377764909	0.371547361	FALSE	0.383044983	FALSE	FALSE
YLR403W	SFP1	36.25597366	42.10908016	164.2891495	132.3413665	0.220683921	0.318185321	FALSE	0.383044983	FALSE	FALSE
YLR404W	FLD1	38.89639727	29.56577746	16.31879873	5.412248636	2.383533121	5.462752998	FALSE	0.776081315	FALSE	FALSE
YLR405W	DUS4	214.5749812	207.7571649	29.78834923	34.03189554	7.203318975	6.104777934	FALSE	0.402436563	FALSE	FALSE
YLR406C	RPL31B	417.1745138	239.1332167	6.358732162	1	65.60655539	239.1332167	FALSE	0.892358708	FALSE	FALSE
YLR407W	YLR407W	206.7218053	246.9355682	53.33488302	80.1544959	3.875921229	3.080745071	FALSE	0.383044983	FALSE	FALSE
YLR409C	UTP21	71.6267597	69.34065982	93.69598899	25.88554669	0.764459188	2.678740405	FALSE	0.699437716	FALSE	FALSE
YLR410W	VIP1	41.67461616	51.60478333	35.17749326	20.73242466	1.184695449	2.489085776	FALSE	0.699437716	FALSE	FALSE
YLR413W	INA1	32.48117018	8.404214386	118.2453137	45.42986067	0.274693086	0.18499318	FALSE	0.383044983	FALSE	FALSE
YLR414C	PUN1	406.2890056	530.15648	54.37109815	43.10713638	7.472517925	12.29857802	FALSE	0.506257209	FALSE	FALSE
YLR417W	VPS36	49.09208654	54.52656776	7.289435955	12.95792277	6.734689328	4.207971349	FALSE	0.479368512	FALSE	FALSE
YLR419W	YLR419W	38.31101858	39.77769783	11.61945166	7.429184269	3.29714514	5.354248379	FALSE	0.479368512	FALSE	FALSE
YLR420W	URA4	133.2235926	105.8183138	14.31799061	2.25865366	9.30462914	46.85017261	TRUE	0.965297001	TRUE	FALSE
YLR421C	RPN13	892.5053311	789.3662408	14.35407691	19.44607311	62.17782839	40.59257806	FALSE	0.52833045	FALSE	FALSE
YLR426W	TDA5	61.65102082	65.8590125	10.04911802	2.446786292	6.134968329	26.91653649	TRUE	0.956372549	TRUE	FALSE
YLR427W	MAG2	45.93556201	52.37625946	12.38455608	12.09865046	3.709100407	4.329099317	FALSE	0.383044983	FALSE	FALSE
YLR429W	CRN1	71.56319165	62.88632175	194.4408505	194.4544823	0.368046074	0.323398674	FALSE	0.383044983	FALSE	FALSE
YLR430W	SEN1	13.99447822	11.74023753	30.99034951	21.18019603	0.45157536	0.55430259	FALSE	0.383044983	FALSE	FALSE
YLR431C	ATG23	31.77902177	39.67542278	6.67618442	8.098722849	4.760057507	4.898972779	FALSE	0.383044983	FALSE	FALSE
YLR432W	IMD3	139.6154926	108.5888753	25.26598459	5.448382613	5.525828295	19.930479	FALSE	0.885726644	FALSE	FALSE

YLR433C	CNA1	40.55476604	46.50506005	7.845515868	8.273373198	5.169165002	5.62105189	FALSE	0.383044983	FALSE	FALSE
YLR435W	TSR2	473.989548	339.7119193	29.17786105	12.98702481	16.24483533	26.15779396	FALSE	0.526701269	FALSE	FALSE
YLR436C	ECM30	50.12110021	50.05094812	27.88217022	15.77961235	1.797603982	3.171874379	FALSE	0.45227797	FALSE	FALSE
YLR437C	DIF1	48.752929459	55.87251633	44.60328034	57.90804567	1.093177323	0.964848937	FALSE	0.383044983	FALSE	FALSE
YLR437C-A	YLR437C-A	3.515515566	9.851206827	11.57691307	68.04922926	0.303666059	0.144765884	FALSE	0.383044983	FALSE	FALSE
YLR438C-A	LSM3	335.7281855	205.0338759	220.4654351	124.4520281	1.522815517	1.647493248	FALSE	0.383044983	FALSE	FALSE
YLR438W	CAR2	10.80146857	14.5075212	1017.229492	3748.007949	0.010618517	0.003870729	FALSE	0.383044983	FALSE	FALSE
YLR439W	MRPL4	18.82398789	13.76271542	63.12655926	76.43901901	0.298194423	0.1800483	FALSE	0.383044983	FALSE	FALSE
YLR440C	SEC39	57.88312134	44.35083504	13.92847548	16.6678416	4.155739902	2.660862523	FALSE	0.45227797	FALSE	FALSE
YLR441C	RPS1A	764.2501133	439.8907916	75.31625765	28.29755385	10.14721306	15.5451879	FALSE	0.508463091	FALSE	FALSE
YLR442C	SIR3	49.89296472	60.05548547	10.78863259	14.44704643	4.624586508	4.156938636	FALSE	0.383044983	FALSE	FALSE
YLR447C	VMA6	238.7483976	214.6028966	2.555162697	7.998146019	93.43764993	26.83158023	FALSE	0.889273356	FALSE	FALSE
YLR448W	RPL6B	254.5543834	147.5487502	223.6329275	104.901704	1.138268797	1.40654293	FALSE	0.383044983	FALSE	FALSE
YLR449W	FPR4	115.2028677	103.2098598	750.4536855	236.2416755	0.153510963	0.436882525	FALSE	0.383044983	FALSE	FALSE
YLR450W	HMG2	21.29352606	19.24148664	61.44550597	50.33522916	0.346543262	0.382266793	FALSE	0.383044983	FALSE	FALSE
YLR451W	LEU3	33.62673329	39.02590961	10.07549564	4.983383034	3.337476833	7.831208106	FALSE	0.794780854	FALSE	FALSE
YLR455W	PDP3	160.3871459	207.929812	4.598666718	1	34.87687971	207.929812	TRUE	0.986029412	TRUE	FALSE
YML001W	YPT7	638.7197868	540.7100902	4.128589186	1	154.7065494	540.7100902	FALSE	0.891897347	FALSE	FALSE
YML004C	GLO1	404.2969956	494.8180203	8.997740998	20.97754474	44.93316663	23.58798547	FALSE	0.560813149	FALSE	FALSE
YML006C	GIS4	41.90247128	69.38539573	2.08597828	3.773830064	20.08768341	18.38593539	FALSE	0.39217128	FALSE	FALSE
YML007W	YAP1	105.1031642	112.7062803	312.8932327	432.752232	0.335907438	0.260440668	FALSE	0.383044983	FALSE	FALSE
YML008C	ERG6	161.2942511	132.9248931	153.4632159	51.94605199	1.051028744	2.558902708	FALSE	0.699437716	FALSE	FALSE
YML010W	SPT5	56.47652928	54.14024592	1057.571673	747.9185997	0.053402082	0.072387885	FALSE	0.383044983	FALSE	FALSE
YML012W	ERV25	729.3579241	502.3131454	227.8947651	91.65455843	3.200415436	5.480503687	FALSE	0.487600923	FALSE	FALSE
YML013W	UBX2	35.91452887	42.30917506	24.5694408	29.04334071	1.461756056	1.456759933	FALSE	0.383044983	FALSE	FALSE
YML014W	TRM9	68.96345795	63.54442319	52.12737801	31.75469891	1.322979605	2.001102998	FALSE	0.383044983	FALSE	FALSE
YML015C	TAF11	68.66721994	60.66700146	108.0407043	134.7108498	0.635568052	0.450349779	FALSE	0.383044983	FALSE	FALSE
YML016C	PPZ1	77.6687747	76.38803548	1.889749012	4.357907455	41.10004779	17.52860433	FALSE	0.843468858	FALSE	FALSE
YML017W	PSP2	117.6013667	74.66157267	219.8563251	191.8665447	0.534900994	0.389132836	FALSE	0.383044983	FALSE	FALSE
YML018C	YML018C	76.38094318	115.9142001	17.18891097	10.00292977	4.443617361	11.58802499	FALSE	0.830810265	FALSE	FALSE
YML019W	OST6	59.66491174	75.25270942	3.036379099	1.234557199	19.65002057	60.95522306	FALSE	0.888379469	FALSE	FALSE
YML020W	YML020W	23.81419375	24.43761559	124.9629077	103.4128081	0.1905701	0.236311305	FALSE	0.383044983	FALSE	FALSE
YML021C	UNG1	68.616472	61.41229458	221.3367905	147.4158134	0.310009339	0.416592312	FALSE	0.383044983	FALSE	FALSE
YML022W	APT1	307.4886149	285.3274448	343.0967039	151.1821624	0.89621559	1.887308927	FALSE	0.577652826	FALSE	FALSE
YML023C	NSE5	63.09911503	71.95157505	16.45129416	9.953591631	3.835510717	7.228704745	FALSE	0.508693772	FALSE	FALSE
YML024W	RPS17A	862.5260287	651.2878585	228.529123	98.13964408	3.77424994	6.636338093	FALSE	0.487600923	FALSE	FALSE
YML025C	YML6	71.08980479	69.5137013	64.46630504	74.35902762	1.102743592	0.934838762	FALSE	0.383044983	FALSE	FALSE
YML026C	RPS18B	1626.86842	1069.859195	248.3506059	34.66337922	6.550692376	30.86424979	TRUE	0.95817474	TRUE	FALSE
YML027W	YOX1	19.25502355	10.61083966	514.8938169	229.656241	0.037396106	0.046203141	FALSE	0.383044983	FALSE	FALSE
YML028W	TSA1	781.1939564	682.0717928	1085.680375	1156.098367	0.719543223	0.5899773	FALSE	0.383044983	FALSE	FALSE
YML029W	USA1	22.4941191	27.50574638	191.3677888	361.4817581	0.117543915	0.076091658	FALSE	0.383044983	FALSE	FALSE
YML030W	RCF1	285.2441391	163.5010592	294.7923399	210.5257443	0.967610418	0.776632139	FALSE	0.383044983	FALSE	FALSE
YML031W	NDC1	41.54310467	42.49657981	114.4635874	69.45800568	0.362937294	0.61183127	FALSE	0.383044983	FALSE	FALSE
YML032C	RAD52	45.95358444	54.30440932	27.07654442	29.63568611	1.69717316	1.832399261	FALSE	0.383044983	FALSE	FALSE

YML034W	SRC1	79.70288094	72.10014651	132.8965697	119.7188263	0.599736179	0.602245685	FALSE	0.383044983	FALSE	FALSE
YML035C	AMD1	68.61422579	82.8138733	366.6182677	318.4815966	0.187154411	0.260027186	FALSE	0.383044983	FALSE	FALSE
YML037C	YML037C	34.75964844	35.12923021	11.87040291	1	2.928261887	35.12923021	TRUE	0.998500577	TRUE	FALSE
YML038C	YMD8	129.3952128	133.8121171	10.42325458	1.788761394	12.41408926	74.80713608	TRUE	0.985914072	TRUE	FALSE
YML041C	VPS71	114.3571851	155.4746044	5.764667986	1.910205401	19.83760129	81.3915636	TRUE	0.958823529	TRUE	FALSE
YML042W	CAT2	18.60589352	27.43518353	5.434790499	1	3.423479437	27.43518353	TRUE	0.993742791	TRUE	FALSE
YML043C	RRN11	154.9620136	152.2351388	45.49621219	38.50489766	3.406042089	3.953656495	FALSE	0.383044983	FALSE	FALSE
YML046W	PRP39	66.15865484	82.97825119	9.322509153	3.480983876	7.096657537	23.83758562	FALSE	0.884746251	FALSE	FALSE
YML048W	GSF2	169.3016605	163.1903761	168.9124173	200.065193	1.002304408	0.815685995	FALSE	0.383044983	FALSE	FALSE
YML049C	RSE1	29.40718681	33.91973797	75.60304939	46.74904729	0.388968263	0.725570679	FALSE	0.383044983	FALSE	FALSE
YML050W	AIM32	52.70405212	77.35351846	4.369398028	1	12.06208539	77.35351846	TRUE	0.985914072	TRUE	FALSE
YML051W	GAL80	26.07169676	41.81845272	111.9480198	107.6757877	0.232891094	0.38837378	FALSE	0.383044983	FALSE	FALSE
YML052W	SUR7	93.38846331	56.10464055	313.3159991	217.4327719	0.298064777	0.258032127	FALSE	0.383044983	FALSE	FALSE
YML054C	CYB2	42.83400907	78.55906748	2.466751453	5.879690085	17.36454194	13.36108984	FALSE	0.443843714	FALSE	FALSE
YML056C	IMD4	326.7682372	211.3114218	96.61897381	63.94663949	3.382029681	3.304496116	FALSE	0.383044983	FALSE	FALSE
YML057W	CMP2	40.18728207	42.00244256	62.13572683	101.5809005	0.646766106	0.413487598	FALSE	0.383044983	FALSE	FALSE
YML058W	SML1	287.3043682	417.7573961	86.35900336	147.5477777	3.326860629	2.831336415	FALSE	0.383044983	FALSE	FALSE
YML059C	NTE1	33.9757078	37.0413655	21.69363734	29.74656108	1.566160034	1.245231857	FALSE	0.383044983	FALSE	FALSE
YML060W	OGG1	63.39626623	51.75073045	10.42017238	2.143152417	6.083993998	24.14701355	FALSE	0.889085928	FALSE	FALSE
YML061C	PIF1	25.87062702	24.01753872	51.58178923	28.77215324	0.501545747	0.834749437	FALSE	0.383044983	FALSE	FALSE
YML062C	MFT1	109.5786934	111.8386971	214.7167452	205.3996348	0.510340697	0.544493164	FALSE	0.383044983	FALSE	FALSE
YML063W	RPS1B	1002.680968	576.3137082	58.91509176	18.27844079	17.01908523	31.52969747	FALSE	0.556271626	FALSE	FALSE
YML064C	TEM1	92.21927455	78.95099187	9.132317225	2.828186731	10.09812431	27.91576348	FALSE	0.854152249	FALSE	FALSE
YML065W	ORC1	32.86317224	38.89057594	17.62112344	10.96838026	1.864987346	3.545699095	FALSE	0.45227797	FALSE	FALSE
YML069W	POB3	204.7217117	145.9793555	65.14674784	22.38448734	3.142470168	6.52145181	FALSE	0.776081315	FALSE	FALSE
YML070W	DAK1	149.0971944	181.5831499	171.3282346	359.9500333	0.870242986	0.504467657	FALSE	0.383044983	FALSE	FALSE
YML071C	COG8	49.85640257	60.19377112	16.26685577	19.353539	3.064907151	3.110220364	FALSE	0.383044983	FALSE	FALSE
YML072C	TCB3	46.70843885	31.73436477	188.1802342	179.6302779	0.248211185	0.176664898	FALSE	0.383044983	FALSE	FALSE
YML073C	RPL6A	341.6929459	184.3737334	21.08453702	12.75900681	16.20585482	14.45047692	FALSE	0.396957901	FALSE	FALSE
YML074C	FPR3	93.73673896	65.63345451	428.305195	253.7761723	0.218855013	0.258627333	FALSE	0.383044983	FALSE	FALSE
YML075C	HMG1	23.11485564	23.29355891	194.370742	143.0213927	0.118921477	0.162867655	FALSE	0.383044983	FALSE	FALSE
YML076C	WAR1	19.09707869	28.42838148	20.8182628	6.253025315	0.917323356	4.546340379	FALSE	0.873241061	FALSE	FALSE
YML078W	CPR3	260.8082934	196.8594748	30.86204413	34.27298442	8.450778318	5.743867309	FALSE	0.44994233	FALSE	FALSE
YML079W	YML079W	152.9486592	92.65986619	6.365106429	19.2687098	24.0292383	4.808825663	TRUE	0.962687428	FALSE	TRUE
YML080W	DUS1	101.1660457	113.5294185	6.374545038	3.135625234	15.87031625	36.20630976	FALSE	0.838739908	FALSE	FALSE
YML081C-A	ATP18	1184.494378	795.6684541	3.097306254	1	382.427271	795.6684541	FALSE	0.836721453	FALSE	FALSE
YML081W	TDA9	42.35057773	46.01056043	31.37565079	16.95376998	1.349791213	2.713883725	FALSE	0.699437716	FALSE	FALSE
YML082W	YML082W	34.71460993	42.21130686	53.3797097	42.9569554	0.650333434	0.98264196	FALSE	0.383044983	FALSE	FALSE
YML085C	TUB1	74.16824723	60.26103252	146.1014998	56.7970444	0.507648774	1.06098888	FALSE	0.577652826	FALSE	FALSE
YML086C	ALO1	83.09885578	89.91988944	72.55128193	42.61269882	1.145380944	2.110166498	FALSE	0.383044983	FALSE	FALSE
YML087C	AIM33	64.40857447	63.88010531	17.85410554	5.817942253	3.607493769	10.9798452	FALSE	0.862658593	FALSE	FALSE
YML088W	UFO1	51.66408172	79.5233972	41.72962562	49.04056102	1.238067223	1.621584165	FALSE	0.383044983	FALSE	FALSE
YML092C	PRE8	164.023439	201.9555117	39.77229166	29.35604725	4.124063065	6.879519916	FALSE	0.487600923	FALSE	FALSE
YML093W	UTP14	78.34557255	64.10367004	426.034689	159.9977477	0.18389482	0.400653578	FALSE	0.383044983	FALSE	FALSE

YML096W	YML096W	66.40229263	72.42432753	10.84773101	6.522490702	6.121307078	11.10378394	FALSE	0.521583045	FALSE	FALSE
YML097C	VPS9	90.38523448	91.58904421	3.801683489	2.327626435	23.77505511	39.34868706	FALSE	0.534717416	FALSE	FALSE
YML098W	TAF13	126.6498725	123.9955123	432.235093	290.2752398	0.293011545	0.427165308	FALSE	0.383044983	FALSE	FALSE
YML099C	ARG81	27.7628147	36.0923697	10.265176487	5.035803538	2.606405141	7.167152059	FALSE	0.802407728	FALSE	FALSE
YML100W	TSL1	153.8672737	231.8247387	187.9898117	2050.149057	0.818487302	0.113077016	FALSE	0.577652826	FALSE	FALSE
YML100W-A	YML100W-A	17.16982211	28.09492251	1	6.186663857	17.16982211	4.54120721	FALSE	0.883477509	FALSE	FALSE
YML101C	CUE4	170.0231165	123.1646397	22.72598528	29.72041727	7.48144093	4.144108696	FALSE	0.508693772	FALSE	FALSE
YML102W	CAC2	115.5411431	108.2706073	31.33310963	20.60374174	3.687509617	5.254900232	FALSE	0.428460208	FALSE	FALSE
YML103C	NUP188	57.02638689	53.10945448	3.797602098	3.199446177	15.01641968	16.59957741	FALSE	0.393670704	FALSE	FALSE
YML104C	MDM1	31.63170695	36.50535863	3.590052614	4.285574174	8.810931302	8.518195496	FALSE	0.383044983	FALSE	FALSE
YML105C	SEC65	161.6017421	135.8189142	179.5355511	153.2005743	0.900110185	0.886543114	FALSE	0.383044983	FALSE	FALSE
YML106W	URA5	365.2982502	327.6860101	67.64116582	15.71378769	5.400531552	20.853407	FALSE	0.887226067	FALSE	FALSE
YML107C	PML39	184.2340038	188.5204433	40.01577737	20.94680627	4.604034107	8.999961182	FALSE	0.521583045	FALSE	FALSE
YML109W	ZDS2	25.80869	28.16175575	5.241646638	2.365858303	4.923775252	11.90339917	FALSE	0.815325836	FALSE	FALSE
YML110C	COQ5	306.293963	257.380652	5.187188313	13.24506758	59.04816725	19.43218866	FALSE	0.888307382	FALSE	FALSE
YML111W	BUL2	39.32130706	46.81415295	64.91354587	45.0956648	0.60574887	1.038107613	FALSE	0.383044983	FALSE	FALSE
YML112W	CTK3	35.32947874	41.22327151	21.62593166	19.03937302	1.633662739	2.165159087	FALSE	0.383044983	FALSE	FALSE
YML113W	DAT1	28.3859592	26.17679527	78.99762378	79.44211619	0.359326747	0.329507779	FALSE	0.383044983	FALSE	FALSE
YML114C	TAF8	21.00928641	20.85684309	92.56492681	89.53288745	0.226968109	0.232951753	FALSE	0.383044983	FALSE	FALSE
YML115C	VAN1	57.95830649	58.83047308	26.57507431	15.83302356	2.180927354	3.715681523	FALSE	0.45227797	FALSE	FALSE
YML116W	ATR1	64.68124872	93.02885944	7.235901619	3.237329367	8.938934238	28.73629739	FALSE	0.885741061	FALSE	FALSE
YML117W	NAB6	57.41623933	73.49168777	56.59468292	56.14630738	1.014516495	1.30893181	FALSE	0.383044983	FALSE	FALSE
YML118W	NGL3	18.09675745	30.63700128	7.044203949	7.888298962	2.569028039	3.883853975	FALSE	0.45227797	FALSE	FALSE
YML119W	YML119W	63.4363982	47.23917516	23.98347133	14.84904737	2.645004858	3.181293318	FALSE	0.383044983	FALSE	FALSE
YML120C	NDI1	50.65724871	75.57176654	56.02606127	68.40864316	0.904172943	1.104710794	FALSE	0.383044983	FALSE	FALSE
YML123C	PHO84	8.633340947	21.64584901	99.5758635	60.12292813	0.086701141	0.360026527	FALSE	0.383044983	FALSE	FALSE
YML124C	TUB3	133.3172931	97.65973489	311.3543053	170.9253364	0.42818516	0.571359033	FALSE	0.383044983	FALSE	FALSE
YML125C	PGA3	134.4043988	130.292902	77.11732638	94.98947539	1.742856049	1.371656191	FALSE	0.383044983	FALSE	FALSE
YML126C	ERG13	59.68581527	49.50101871	468.2030854	345.8204547	0.127478475	0.143140806	FALSE	0.383044983	FALSE	FALSE
YML127W	RSC9	76.66481712	87.47600839	29.53127929	28.43289309	2.596054724	3.076577825	FALSE	0.383044983	FALSE	FALSE
YML128C	MSC1	264.6274186	173.8493359	42.22548464	701.993196	6.267007256	0.247651027	TRUE	0.961115917	FALSE	TRUE
YML129C	COX14	374.9403132	320.070362	1	3.48656882	374.9403132	91.8009592	TRUE	0.95893887	FALSE	TRUE
YML130C	ERO1	146.767675	381.607888	2.621578485	15.19963834	55.9844673	25.10637948	FALSE	0.83866782	FALSE	FALSE
YMR001C	CDC5	48.88766663	29.25649193	9.393401769	1	5.204468821	29.25649193	TRUE	0.964431949	TRUE	FALSE
YMR002W	MIX17	418.9468602	502.4004752	1554.821707	2085.664581	0.269450097	0.240882681	FALSE	0.383044983	FALSE	FALSE
YMR004W	MVP1	58.0659304	67.52332253	4.497421226	1	12.91093884	67.52332253	TRUE	0.965527682	TRUE	FALSE
YMR005W	TAF4	81.60859831	91.02497232	136.0170779	180.13267	0.599987881	0.50532184	FALSE	0.383044983	FALSE	FALSE
YMR006C	PLB2	22.67432953	22.48753727	33.21834984	5.920130242	0.682584464	3.798486918	FALSE	0.873241061	FALSE	FALSE
YMR008C	PLB1	41.85746326	93.64441313	32.61825108	82.66166506	1.283252838	1.132863862	FALSE	0.383044983	FALSE	FALSE
YMR009W	ADI1	100.1247241	183.9922133	3.166897896	5.941670357	31.61602534	30.96641217	FALSE	0.383044983	FALSE	FALSE
YMR010W	YMR010W	64.79065275	91.22714221	5.709140979	3.885716969	11.34858169	23.47755715	FALSE	0.828835063	FALSE	FALSE
YMR011W	HXT2	30.74218711	17.47001515	7.287041893	1.819742346	4.218747135	9.600268513	FALSE	0.803662053	FALSE	FALSE
YMR012W	CLU1	70.14926479	58.47969469	11.79103748	12.31696404	5.949371707	4.747898467	FALSE	0.415383506	FALSE	FALSE
YMR014W	BUD22	105.5638031	86.30281239	1216.977035	982.6007586	0.086742642	0.087831005	FALSE	0.383044983	FALSE	FALSE

YMR016C	SOK2	7.540101857	8.796931586	27.90056846	32.00194327	0.270249041	0.274887419	FALSE	0.383044983	FALSE	FALSE
YMR020W	FMS1	138.0990455	233.3550868	20.73547562	63.11122746	6.660037512	3.697520967	FALSE	0.487600923	FALSE	FALSE
YMR021C	MAC1	53.80772585	70.59153555	7.477034388	1.804452284	7.196399409	39.12075491	TRUE	0.964979815	TRUE	FALSE
YMR024W	MRPL3	106.3498631	109.4822252	24.12781741	7.217809136	4.407769726	15.16834584	FALSE	0.876441753	FALSE	FALSE
YMR027W	YMR027W	164.3505223	159.51893	130.5228161	176.3117076	1.259170827	0.904755176	FALSE	0.383044983	FALSE	FALSE
YMR028W	TAP42	51.820981	50.64079265	14.96410034	6.998918903	3.463020149	7.235516421	FALSE	0.776081315	FALSE	FALSE
YMR029C	FAR8	118.9883697	116.6573985	101.432185	6.428361261	1.173082979	18.14729972	TRUE	0.994997116	TRUE	FALSE
YMR030W	RSF1	41.29777099	61.32987243	1.073663408	3.691989252	38.46435548	16.61160644	FALSE	0.839302191	FALSE	FALSE
YMR031C	EIS1	118.5672376	73.41854254	91.2044265	129.7295319	1.300016262	0.565935462	FALSE	0.577652826	FALSE	FALSE
YMR032W	HOF1	30.01687429	14.06672764	37.85276193	24.00373786	0.792990333	0.586022382	FALSE	0.383044983	FALSE	FALSE
YMR034C	YMR034C	32.16200824	57.91097541	1	5.610206192	32.16200824	10.32243262	FALSE	0.88650519	FALSE	FALSE
YMR035W	IMP2	178.8927012	204.3685921	50.50372639	56.87743262	3.54216835	3.593140244	FALSE	0.383044983	FALSE	FALSE
YMR036C	MIH1	35.44883509	54.43587908	15.83563714	9.832583179	2.238548079	5.536274455	FALSE	0.776081315	FALSE	FALSE
YMR037C	MSN2	20.5336935	30.23502644	85.2195476	89.40370972	0.24095051	0.338185368	FALSE	0.383044983	FALSE	FALSE
YMR038C	CCS1	199.8500289	187.9656621	222.2505139	193.2126076	0.899210649	0.972843669	FALSE	0.383044983	FALSE	FALSE
YMR039C	SUB1	104.533959	89.43416437	1045.618748	702.9452844	0.099973302	0.127227775	FALSE	0.383044983	FALSE	FALSE
YMR041C	ARA2	70.12007779	145.6226365	3.822863043	2.386974536	18.34229398	61.00720151	FALSE	0.888624567	FALSE	FALSE
YMR042W	ARG80	28.38267113	28.20583475	56.61584796	92.20073734	0.501320251	0.30591767	FALSE	0.383044983	FALSE	FALSE
YMR043W	MCM1	20.3113728	19.02803303	1821.258271	1621.878063	0.011152385	0.011732098	FALSE	0.383044983	FALSE	FALSE
YMR044W	IOC4	93.73723437	94.92804047	42.68265852	25.23573118	2.196143296	3.761652072	FALSE	0.45227797	FALSE	FALSE
YMR047C	NUP116	95.86966441	78.11885291	560.9970326	401.857505	0.170891571	0.194394411	FALSE	0.383044983	FALSE	FALSE
YMR048W	CSM3	53.00810549	51.2423115	15.1435823	7.123848432	3.500367644	7.193065937	FALSE	0.776081315	FALSE	FALSE
YMR049C	ERB1	56.21344197	51.28996123	60.26959303	30.35815826	0.932699876	1.689495153	FALSE	0.383044983	FALSE	FALSE
YMR053C	STB2	34.93508386	57.59963248	4.110194932	1	8.499617278	57.59963248	TRUE	0.985914072	TRUE	FALSE
YMR054W	STV1	45.82473285	54.1240795	49.11177934	43.89267707	0.9330701	1.233100442	FALSE	0.383044983	FALSE	FALSE
YMR055C	BUB2	39.71689365	47.77051971	9.838758517	8.73943052	4.036778989	5.46609068	FALSE	0.428460208	FALSE	FALSE
YMR056C	AAC1	196.1925731	178.8620254	23.17349964	34.49850921	8.466247056	5.184630569	FALSE	0.496568627	FALSE	FALSE
YMR057C	YMR057C	6.268133326	3.551668495	4.720152457	1	1.327951456	3.551668495	FALSE	0.749524221	FALSE	FALSE
YMR058W	FET3	168.3835125	81.37502568	917.6269945	107.2967587	0.183498866	0.758410848	FALSE	0.577652826	FALSE	FALSE
YMR059W	SEN15	196.1950026	163.1895311	2.718367919	5.304101937	72.17382211	30.76666568	FALSE	0.844824106	FALSE	FALSE
YMR063W	RIM9	20.84807261	27.34192797	9.745474753	6.288918531	2.139256746	4.347635898	FALSE	0.749524221	FALSE	FALSE
YMR067C	UBX4	43.1028113	52.70096878	13.70733365	9.870193649	3.144507341	5.339405756	FALSE	0.487600923	FALSE	FALSE
YMR068W	AVO2	41.12636775	57.34572195	63.24849597	92.89931003	0.650234715	0.617288997	FALSE	0.383044983	FALSE	FALSE
YMR069W	NAT4	11.88972842	28.33387007	12.80727782	19.60923876	0.928357188	1.444924528	FALSE	0.383044983	FALSE	FALSE
YMR070W	MOT3	97.35394041	77.5869578	290.9835475	269.8308334	0.334568539	0.287539259	FALSE	0.383044983	FALSE	FALSE
YMR072W	ABF2	222.1652989	119.6757863	31.33359979	13.74673026	7.090321584	8.705763773	FALSE	0.407151096	FALSE	FALSE
YMR073C	IRC21	100.0418903	112.9360251	11.47285273	9.833656908	8.719879236	11.48464159	FALSE	0.430449827	FALSE	FALSE
YMR074C	YMR074C	653.9734548	546.8888341	66.38439233	40.83502371	9.851313417	13.39264152	FALSE	0.456156286	FALSE	FALSE
YMR076C	PDS5	23.09167075	17.29923791	8.958281753	1	2.577689716	17.29923791	TRUE	0.979829873	TRUE	FALSE
YMR078C	CTF18	21.3429095	16.44106597	13.20466679	1	1.616315644	16.44106597	TRUE	0.991796424	TRUE	FALSE
YMR079W	SEC14	181.64999	145.9840555	64.96443263	35.42949634	2.796145254	4.120410126	FALSE	0.428460208	FALSE	FALSE
YMR080C	NAM7	61.4971913	63.84087581	16.93348475	3.582577962	3.631691421	17.8198148	TRUE	0.953373702	TRUE	FALSE
YMR083W	ADH3	255.6806592	347.640335	755.1192464	838.3378226	0.338596401	0.414678099	FALSE	0.383044983	FALSE	FALSE
YMR086W	SEG1	30.27912792	31.57547862	284.3264287	255.2757977	0.106494243	0.123691627	FALSE	0.383044983	FALSE	FALSE

YMR088C	VBA1	45.04037899	65.0832212	3.553029226	19.94140902	12.67661371	3.263722294	FALSE	0.875807382	FALSE	FALSE
YMR089C	YTA12	124.5032645	121.0319187	62.43454005	87.09927736	1.994140813	1.389585796	FALSE	0.383044983	FALSE	FALSE
YMR090W	YMR090W	388.1981431	431.907813	15.18078589	28.10375293	25.57167633	15.36833227	FALSE	0.530031719	FALSE	FALSE
YMR091C	NPL6	152.252024	127.4755733	27.81851863	6.834869526	5.473045708	18.65076909	FALSE	0.882107843	FALSE	FALSE
YMR092C	AIP1	264.7739395	270.6071577	4.749956363	9.17380429	55.74239409	29.49781238	FALSE	0.561317762	FALSE	FALSE
YMR095C	SNO1	16.19267776	38.16859743	3.629133752	1	4.46185753	38.16859743	TRUE	0.994636678	TRUE	FALSE
YMR096W	SNZ1	37.73763323	70.19908536	21.75067444	8.927722835	1.735009796	7.863044884	TRUE	0.923745675	TRUE	FALSE
YMR098C	ATP25	83.44644215	101.0133919	4.227426136	1.483902125	19.73930223	68.07281299	FALSE	0.889230104	FALSE	FALSE
YMR099C	YMR099C	237.3477062	152.2211746	1.821232986	6.573206834	130.3225386	23.15782516	TRUE	0.965844867	FALSE	TRUE
YMR102C	YMR102C	46.97815793	62.81731857	35.26498347	34.13642541	1.332147454	1.840184431	FALSE	0.383044983	FALSE	FALSE
YMR103C	YMR103C	78.68838448	137.5816576	5.315134176	62.71030707	14.80459041	2.193924158	TRUE	0.976960784	FALSE	TRUE
YMR104C	YPK2	25.36375189	57.87648113	4.264656597	12.33353047	5.947431243	4.692612652	FALSE	0.415383506	FALSE	FALSE
YMR105C	PGM2	341.2819899	301.3310323	14.77998594	171.8771559	23.09081966	1.753176743	TRUE	0.997029988	FALSE	TRUE
YMR105W-A	YMR105W-A	14.94708716	22.3591192	1	7.175845129	14.94708716	3.115886534	TRUE	0.948572664	FALSE	TRUE
YMR106C	YKU80	18.0432695	22.99902666	62.96977999	27.87692157	0.286538551	0.825020316	FALSE	0.577652826	FALSE	FALSE
YMR107W	SPG4	99.24994729	115.7966401	1	4.132989867	99.24994729	28.01764432	FALSE	0.89182526	FALSE	FALSE
YMR108W	ILV2	119.4680702	112.2781528	1009.48521	551.1436093	0.118345538	0.203718506	FALSE	0.383044983	FALSE	FALSE
YMR109W	MYO5	48.57803327	32.63342882	903.4530504	1198.294894	0.053769295	0.02723322	FALSE	0.383044983	FALSE	FALSE
YMR111C	YMR111C	27.27924115	33.10185722	9.149737225	14.8304897	2.981423452	2.232013769	FALSE	0.383044983	FALSE	FALSE
YMR112C	MED11	101.204236	84.74496283	3.658005312	1.563127358	27.66650875	54.21500838	FALSE	0.562024221	FALSE	FALSE
YMR113W	FOL3	71.05104867	78.10019442	13.32086593	12.85549095	5.333816064	6.075240122	FALSE	0.383044983	FALSE	FALSE
YMR115W	MGR3	101.2687486	108.5225751	11.96778339	8.90828578	8.461779874	12.1822063	FALSE	0.462889273	FALSE	FALSE
YMR116C	ASC1	263.0804114	286.539735	107.6558423	29.27363104	2.443716996	9.788322285	TRUE	0.931675317	TRUE	FALSE
YMR120C	ADE17	68.07478187	247.9052631	70.36261042	19.60370851	0.967485167	12.64583499	TRUE	0.987874856	TRUE	FALSE
YMR121C	RPL15B	161.3738569	169.2881132	276.2621736	255.6031782	0.584133017	0.662308327	FALSE	0.383044983	FALSE	FALSE
YMR122C	YMR122C	6.800924658	3.523255147	6.742705015	2.847336594	1.008634464	1.237386249	FALSE	0.383044983	FALSE	FALSE
YMR122W-A	YMR122W-A	408.9127389	522.7888888	63.84180752	38.61433549	6.405093383	13.53872551	FALSE	0.815470012	FALSE	FALSE
YMR123W	PKR1	119.4703664	95.24246638	26.41187704	9.85323205	4.523357662	9.666114215	FALSE	0.802321223	FALSE	FALSE
YMR124W	EPO1	23.77441883	30.46458701	23.08616634	33.71655962	1.029812333	0.903549691	FALSE	0.383044983	FALSE	FALSE
YMR128W	ECM16	45.57063926	41.22736455	66.16261927	33.90253057	0.688767158	1.216055671	FALSE	0.383044983	FALSE	FALSE
YMR129W	POM152	43.42251704	49.53754668	200.2303838	105.2457003	0.216862777	0.470684755	FALSE	0.383044983	FALSE	FALSE
YMR131C	RRB1	206.8361573	152.8521581	121.3316779	30.35733519	1.704716863	5.035098015	FALSE	0.783708189	FALSE	FALSE
YMR135C	GID8	70.09724977	112.8059762	18.76939898	15.86959867	3.734656067	7.108306806	FALSE	0.508693772	FALSE	FALSE
YMR135W-A	YMR135W-A	1.228096347	1	1	7.557383815	1.228096347	0.132320923	FALSE	0.699437716	FALSE	FALSE
YMR136W	GAT2	64.51093545	67.74886792	22.56277494	9.319859294	2.859175595	7.269301583	FALSE	0.802407728	FALSE	FALSE
YMR138W	CIN4	177.8664447	133.268961	4.4515321	1.941794834	39.95623097	68.63184446	FALSE	0.550778547	FALSE	FALSE
YMR139W	RIM11	94.40636655	95.08515408	3.947351565	2.429090084	23.91638166	39.14435068	FALSE	0.534501153	FALSE	FALSE
YMR140W	SIP5	39.90338447	65.70151818	186.8057602	237.1198043	0.213608962	0.27708153	FALSE	0.383044983	FALSE	FALSE
YMR141C	YMR141C	5.187945301	8.124010655	1	3.905839754	5.187945301	2.079965172	FALSE	0.783708189	FALSE	FALSE
YMR142C	RPL13B	362.5135733	181.888047	1350.586479	454.4454796	0.268411967	0.400241734	FALSE	0.383044983	FALSE	FALSE
YMR143W	RPS16A	615.827776	368.5349351	6.5044016	2.408154979	94.67862131	153.03622	FALSE	0.536937716	FALSE	FALSE
YMR145C	NDE1	116.5093472	162.9741017	37.75785877	7.199034991	3.085697944	22.6383261	TRUE	0.984775087	TRUE	FALSE
YMR146C	TIF34	112.3716	79.98194157	1297.886709	641.6959964	0.086580438	0.124641484	FALSE	0.383044983	FALSE	FALSE
YMR147W	YMR147W	26.45767884	23.98644687	17.03551953	1	1.55308905	23.98644687	TRUE	0.997736448	TRUE	FALSE

YMR148W	OSW5	23.79997603	15.9610552	35.11031499	34.78736448	0.677862789	0.458817603	FALSE	0.383044983	FALSE	FALSE
YMR149W	SWP1	70.58202047	79.79497721	37.70674487	15.99432153	1.87186724	4.988956677	FALSE	0.783708189	FALSE	FALSE
YMR150C	IMP1	225.0866987	198.0678123	4.388564716	1.729330982	51.28936526	114.5343571	FALSE	0.839230104	FALSE	FALSE
YMR152W	YIM1	58.46618485	55.47201581	1.951909839	4.061960981	29.95332248	13.65646201	FALSE	0.833924452	FALSE	FALSE
YMR153W	NUP53	86.79751533	97.33362435	43.73617062	29.94091712	1.984570531	3.250856477	FALSE	0.45227797	FALSE	FALSE
YMR157C	AIM36	159.6813086	181.3237757	4.523362795	1	35.30145952	181.3237757	TRUE	0.965657439	TRUE	FALSE
YMR160W	YMR160W	26.57818956	35.25411362	3.949041372	4.511733014	6.730288964	7.813874074	FALSE	0.402436563	FALSE	FALSE
YMR161W	HLJ1	125.8710818	250.7383247	36.77782866	47.5926294	3.422471809	5.26842765	FALSE	0.45227797	FALSE	FALSE
YMR162C	DNF3	28.11486657	32.87769023	56.4820878	61.95148365	0.497766065	0.530700611	FALSE	0.383044983	FALSE	FALSE
YMR164C	MSS11	30.40127247	30.34687816	32.90283662	36.08584842	0.923971171	0.840963411	FALSE	0.383044983	FALSE	FALSE
YMR165C	PAH1	36.72904601	44.04068934	12.37177363	14.91375896	2.968777728	2.953024081	FALSE	0.383044983	FALSE	FALSE
YMR166C	YMR166C	33.5701856	58.00481035	7.884291732	6.937267263	4.257856855	8.361334248	FALSE	0.521583045	FALSE	FALSE
YMR167W	MLH1	21.51312902	33.51668046	4.136859625	1	5.200352676	33.51668046	TRUE	0.985149942	TRUE	FALSE
YMR168C	CEP3	36.21416602	45.414701	5.379347731	1.9038139	6.732073818	23.85459051	FALSE	0.887961361	FALSE	FALSE
YMR169C	ALD3	116.0794622	207.7817138	1.491294544	6.173319838	77.83805191	33.65801858	FALSE	0.841190888	FALSE	FALSE
YMR170C	ALD2	73.87310385	104.0645874	2.364527641	3.297369178	31.24222469	31.5598836	FALSE	0.383044983	FALSE	FALSE
YMR172W	HOT1	42.10096217	44.34652746	18.58877762	12.58785924	2.264859101	3.522960229	FALSE	0.45227797	FALSE	FALSE
YMR174C	PAI3	131.3014957	104.0381502	4.216456723	33.08472616	31.14024508	3.144597591	TRUE	0.994622261	FALSE	TRUE
YMR176W	ECM5	25.51034821	42.88664862	1	3.927850799	25.51034821	10.9186043	FALSE	0.839186851	FALSE	FALSE
YMR177W	MMT1	49.24348578	55.15859331	5.759968589	1	8.549262904	55.15859331	TRUE	0.985870819	TRUE	FALSE
YMR182C	RGM1	6.072254159	3.323825611	29.86032696	27.79608789	0.203355247	0.1195789	FALSE	0.383044983	FALSE	FALSE
YMR183C	SSO2	96.99195157	73.35155353	348.9690036	226.6108644	0.277938586	0.323689483	FALSE	0.383044983	FALSE	FALSE
YMR184W	ADD37	178.4449363	175.4988274	45.12802401	26.52741207	3.954193435	6.615753807	FALSE	0.487600923	FALSE	FALSE
YMR186W	HSC82	853.1087047	1896.182484	188.0179686	165.6513548	4.537378588	11.44682751	FALSE	0.823904268	FALSE	FALSE
YMR189W	GCV2	77.34937085	236.0751154	22.47993681	12.10511874	3.440817984	19.50209002	TRUE	0.961303345	TRUE	FALSE
YMR190C	SGS1	21.06837355	26.21759269	12.4970299	3.016590538	1.68587046	8.691134033	TRUE	0.937874856	TRUE	FALSE
YMR191W	SPG5	88.58347244	121.4062853	6.878707589	12.71098835	12.87792384	9.551286023	FALSE	0.456156286	FALSE	FALSE
YMR192W	GYL1	38.84221384	32.06846311	10.47945973	14.23914812	3.706509196	2.252133543	FALSE	0.45227797	FALSE	FALSE
YMR194C-B	CMC4	40.04405445	63.08531176	5.339576237	1	7.499481734	63.08531176	TRUE	0.995054787	TRUE	FALSE
YMR194W	RPL36A	632.4763738	395.9301577	8.154192587	4.701049775	77.56456168	84.22164764	FALSE	0.39666955	FALSE	FALSE
YMR195W	ICY1	305.8898033	266.6526113	27.23716932	26.20608787	11.23060182	10.17521626	FALSE	0.393670704	FALSE	FALSE
YMR196W	YMR196W	90.93326063	79.26515254	43.70695979	353.277325	2.080521296	0.224370903	FALSE	0.752926759	FALSE	FALSE
YMR197C	VTI1	194.5349681	169.9000905	9.86915519	6.045774081	19.71141039	28.10228902	FALSE	0.482900807	FALSE	FALSE
YMR198W	CIK1	56.78323049	50.99837808	9.386130201	2.026675472	6.04969559	25.16356407	TRUE	0.955968858	TRUE	FALSE
YMR199W	CLN1	112.0758281	47.01967564	29.78966599	7.825831101	3.762238495	6.008266092	FALSE	0.479368512	FALSE	FALSE
YMR200W	ROT1	201.0223284	211.9779483	53.71609993	9.678752849	3.742310566	21.90137011	TRUE	0.962485582	TRUE	FALSE
YMR201C	RAD14	69.99415547	81.33320854	66.94490091	67.3422441	1.04554872	1.207759106	FALSE	0.383044983	FALSE	FALSE
YMR202W	ERG2	156.6260355	124.4198847	476.4500119	222.8865775	0.328735506	0.558220626	FALSE	0.383044983	FALSE	FALSE
YMR203W	TOM40	87.7659828	81.72499053	86.99265571	47.54879714	1.008889568	1.71876042	FALSE	0.383044983	FALSE	FALSE
YMR205C	PFK2	91.43802721	129.7365307	1698.938576	1794.302484	0.053820679	0.072304716	FALSE	0.383044983	FALSE	FALSE
YMR207C	HFA1	21.55593049	25.15129763	48.21623392	23.81993402	0.447067901	1.055892834	FALSE	0.577652826	FALSE	FALSE
YMR208W	ERG12	72.42940997	80.44369157	9.463726158	1.730974427	7.653371279	46.47306762	TRUE	0.985712226	TRUE	FALSE
YMR209C	YMR209C	37.60024628	45.00227645	35.14144078	18.40022907	1.06996883	2.445745445	FALSE	0.699437716	FALSE	FALSE
YMR210W	YMR210W	104.6586739	127.4243945	13.70200669	17.52291815	7.638200468	7.271870669	FALSE	0.383044983	FALSE	FALSE

YMR213W	CEF1	14.79534008	20.04559295	263.9880667	234.3204507	0.056045488	0.085547774	FALSE	0.383044983	FALSE	FALSE
YMR214W	SCJ1	127.6137223	135.7338706	95.51298576	93.80174613	1.336087667	1.447029253	FALSE	0.383044983	FALSE	FALSE
YMR215W	GAS3	25.35310689	35.23255147	10.24228463	1.607090315	2.475337077	21.9231932	TRUE	0.992200115	TRUE	FALSE
YMR216C	SKY1	107.91123	135.6192426	484.9220179	542.6931014	0.222533162	0.249900436	FALSE	0.383044983	FALSE	FALSE
YMR217W	GUA1	182.4908626	153.8912301	286.8158945	44.1683935	0.636264817	3.484193512	FALSE	0.827537486	FALSE	FALSE
YMR219W	ESC1	29.2229519	28.74988943	7.558025295	3.155694676	3.86647977	9.110478794	FALSE	0.806877163	FALSE	FALSE
YMR220W	ERG8	107.688472	120.4298496	16.56951654	6.942488117	6.499192161	17.34678513	FALSE	0.844953864	FALSE	FALSE
YMR221C	YMR221C	36.79425292	43.34301506	85.9676317	33.6929367	0.428001239	1.286412504	FALSE	0.577652826	FALSE	FALSE
YMR222C	FSH2	103.8789194	85.72205604	85.36007609	114.075423	1.216949704	0.751450697	FALSE	0.383044983	FALSE	FALSE
YMR224C	MRE11	18.47086835	21.86146773	4.923500727	6.440322251	3.751572179	3.39446799	FALSE	0.383044983	FALSE	FALSE
YMR226C	YMR226C	238.721156	147.5691755	54.33872642	87.96709018	4.393204842	1.677549811	FALSE	0.749524221	FALSE	FALSE
YMR227C	TAF7	33.98818402	31.29795182	171.5317176	157.3982231	0.198145186	0.198845649	FALSE	0.383044983	FALSE	FALSE
YMR229C	RRP5	71.74385839	62.7770751	329.2151937	88.73156621	0.217923898	0.707494275	FALSE	0.383044983	FALSE	FALSE
YMR230W	RPS10B	862.2600906	662.6877312	3.852108661	1	223.8410612	662.6877312	FALSE	0.858477509	FALSE	FALSE
YMR235C	RNA1	157.2832891	130.2870393	418.109059	309.4882078	0.376177664	0.420975779	FALSE	0.383044983	FALSE	FALSE
YMR236W	TAF9	208.6088328	164.1770001	94.20645479	106.8316188	2.214379399	1.536782855	FALSE	0.383044983	FALSE	FALSE
YMR237W	BCH1	62.21338468	70.40435717	103.512331	116.66002	0.601023898	0.603500301	FALSE	0.383044983	FALSE	FALSE
YMR238W	DFG5	98.63774948	102.6656593	27.01028842	30.87914864	3.651858431	3.324756794	FALSE	0.383044983	FALSE	FALSE
YMR239C	RNT1	171.309611	138.8401393	3.236195183	1	52.93550027	138.8401393	FALSE	0.855449827	FALSE	FALSE
YMR240C	CUS1	86.6512058	92.21334267	26.06827038	36.89653182	3.324010552	2.499241477	FALSE	0.383044983	FALSE	FALSE
YMR241W	YHM2	135.5558452	145.8236158	35.03101003	20.54403255	3.869595684	7.098100895	FALSE	0.508693772	FALSE	FALSE
YMR242C	RPL20A	204.7016547	127.5397998	136.9792115	25.0242521	1.494399423	5.096647815	FALSE	0.808232411	FALSE	FALSE
YMR243C	ZRC1	152.4780029	167.6130976	20.9666144	3.671286282	7.272418902	45.65514228	TRUE	0.985712226	TRUE	FALSE
YMR244W	YMR244W	4.775930238	13.85549777	1	18.57573374	4.775930238	0.745892354	TRUE	0.919045559	FALSE	TRUE
YMR245W	YMR245W	4.458853296	5.957194694	9.9986149	7.895773142	0.445947098	0.754478958	FALSE	0.383044983	FALSE	FALSE
YMR246W	FAA4	62.45247875	31.93742076	249.4162656	55.23784684	0.250394571	0.578180045	FALSE	0.383044983	FALSE	FALSE
YMR250W	GAD1	183.1623968	124.2308182	50.76797011	455.2613755	3.607833766	0.27287801	FALSE	0.890614187	FALSE	FALSE
YMR251W	GTO3	7.147721517	6.360099551	1.787302862	3.332805117	3.999166379	1.908332269	FALSE	0.749524221	FALSE	FALSE
YMR251W-A	HOR7	8265.957178	7873.007232	76.45803209	398.0517957	108.1110375	19.77885119	TRUE	0.965614187	FALSE	TRUE
YMR253C	YMR253C	35.58487257	47.75496435	7.791294175	1.91482341	4.567260813	24.93961798	TRUE	0.963047866	TRUE	FALSE
YMR256C	COX7	395.791517	412.2497314	4.313100684	2.446857875	91.76496122	168.4812737	FALSE	0.560914072	FALSE	FALSE
YMR259C	TRM732	43.65527691	54.88814977	13.75330551	1	3.174166158	54.88814977	TRUE	0.999639562	TRUE	FALSE
YMR260C	TIF11	1001.212192	610.8500808	4.341919315	1.677840972	230.5920768	364.0691168	FALSE	0.533290081	FALSE	FALSE
YMR261C	TPS3	49.95939915	69.08752688	64.55731976	114.0436381	0.7738766	0.605799044	FALSE	0.383044983	FALSE	FALSE
YMR262W	YMR262W	64.74492651	73.7751675	45.23789245	38.77202609	1.431210054	1.902793713	FALSE	0.383044983	FALSE	FALSE
YMR263W	SAP30	236.9982762	123.6191627	46.68952491	39.07647316	5.076048142	3.163518933	FALSE	0.45227797	FALSE	FALSE
YMR264W	CUE1	438.3929375	419.6818632	481.7646152	655.7511269	0.909973302	0.640001741	FALSE	0.383044983	FALSE	FALSE
YMR265C	YMR265C	57.56812385	69.68342838	90.26628232	61.41435372	0.637758888	1.134644007	FALSE	0.383044983	FALSE	FALSE
YMR266W	RSN1	34.49855088	44.54849603	28.1374363	8.278129939	1.226072998	5.381468564	FALSE	0.896064014	FALSE	FALSE
YMR269W	TMA23	113.1959832	76.03251085	170.0869882	42.28899848	0.665518182	1.797926496	FALSE	0.699437716	FALSE	FALSE
YMR270C	RRN9	134.2532258	145.3583408	25.137558	6.275681204	5.340742559	23.16216138	TRUE	0.955046136	TRUE	FALSE
YMR272C	SCS7	70.91131091	81.10350323	46.16557172	41.368028	1.536021504	1.960535881	FALSE	0.383044983	FALSE	FALSE
YMR273C	ZDS1	41.84286927	46.68505388	339.9561222	217.0543553	0.123083147	0.215084622	FALSE	0.383044983	FALSE	FALSE
YMR275C	BUL1	35.32721867	52.60540887	29.1315011	43.5193184	1.212681027	1.208782922	FALSE	0.383044983	FALSE	FALSE

YMR276W	DSK2	57.47534685	58.52465937	442.6171926	822.076685	0.129853399	0.071191241	FALSE	0.383044983	FALSE	FALSE
YMR277W	FCP1	33.63349507	28.89982479	327.1788795	214.8554482	0.102798491	0.134508224	FALSE	0.383044983	FALSE	FALSE
YMR279C	YMR279C	4.759030986	3.500461445	14.62022798	21.96196535	0.325510039	0.15938744	FALSE	0.383044983	FALSE	FALSE
YMR280C	CAT8	12.05981858	16.64578356	20.49015858	6.371586349	5.885663859	2.612502232	FALSE	0.776081315	FALSE	FALSE
YMR283C	RIT1	53.30352289	77.02836521	3.919754807	1	13.59868806	77.02836521	TRUE	0.965787197	TRUE	FALSE
YMR285C	NGL2	86.51785383	114.6252825	4.69480335	6.022273446	18.42842977	19.03355661	FALSE	0.383044983	FALSE	FALSE
YMR287C	DSS1	41.86725342	45.40277252	6.371089337	2.841430534	6.57144347	15.97884304	FALSE	0.830867935	FALSE	FALSE
YMR288W	HS1155	34.70930464	41.36743762	8.445751789	4.732480908	4.109676143	8.741173695	FALSE	0.791565744	FALSE	FALSE
YMR289W	ABZ2	85.7564214	92.66161038	18.67640666	16.2695887	4.591698122	5.695387393	FALSE	0.407151096	FALSE	FALSE
YMR290C	HAS1	87.79567476	87.90730481	22.89694543	1	3.834383719	87.90730481	TRUE	0.999927912	TRUE	FALSE
YMR291W	TDA1	37.57142607	78.17785059	4.523180751	3.873995558	8.306417131	20.1801601	FALSE	0.835957324	FALSE	FALSE
YMR293C	HER2	60.53972104	74.72710514	3.239283046	6.200792407	18.68923468	12.05121866	FALSE	0.513062284	FALSE	FALSE
YMR295C	YMR295C	290.2414816	244.0032132	45.50722922	28.48021726	6.377920312	8.567463194	FALSE	0.446323529	FALSE	FALSE
YMR296C	LCB1	25.72289418	24.65963464	385.0839344	407.4267378	0.066798149	0.060525322	FALSE	0.383044983	FALSE	FALSE
YMR297W	PRC1	234.8242077	195.8282059	233.078423	461.6319897	1.007490117	0.424208483	FALSE	0.577652826	FALSE	FALSE
YMR298W	LIP1	271.5222522	230.7032137	70.49567276	32.3795196	3.851615873	7.124973335	FALSE	0.508693772	FALSE	FALSE
YMR300C	ADE4	485.2099449	821.4321138	6.560908176	2.105828239	73.95469222	390.0755525	TRUE	0.965657439	TRUE	FALSE
YMR301C	ATM1	31.67062806	82.42568371	110.0447759	48.20810977	0.287797652	0.589645266	FALSE	0.383044983	FALSE	FALSE
YMR302C	YME2	85.16853777	105.0041818	8.965982057	14.10162242	9.499075196	7.446248284	FALSE	0.42850346	FALSE	FALSE
YMR303C	ADH2	75.37250721	145.8768965	51.50484421	54.2925964	1.463406178	2.686865359	FALSE	0.45227797	FALSE	FALSE
YMR304W	UBP15	49.70270748	71.76736216	4.849643835	5.519244866	10.24873355	13.00311255	FALSE	0.42850346	FALSE	FALSE
YMR305C	SCW10	121.1336855	101.4065103	184.8699802	61.26923675	0.655237186	1.65509668	FALSE	0.699437716	FALSE	FALSE
YMR306W	FKS3	3.943905277	7.520946388	12.13901507	8.331989304	0.324894998	0.902659151	FALSE	0.577652826	FALSE	FALSE
YMR307W	GAS1	331.3282109	309.4644867	1076.444151	422.0688234	0.307798794	0.73320859	FALSE	0.383044983	FALSE	FALSE
YMR308C	PSE1	81.35706398	93.9400025	19.20954323	10.82442722	4.235241983	8.67851948	FALSE	0.791565744	FALSE	FALSE
YMR309C	NIP1	151.2909966	154.3320098	47.55814301	16.53195011	3.181179647	9.335378387	FALSE	0.825663206	FALSE	FALSE
YMR310C	YMR310C	17.79666942	21.18938827	52.29825921	17.61595327	0.340291813	1.202852207	FALSE	0.577652826	FALSE	FALSE
YMR311C	GLC8	214.3769729	174.439426	603.4727941	530.3761304	0.355238836	0.328897581	FALSE	0.383044983	FALSE	FALSE
YMR312W	ELP6	36.96540123	37.45065919	8.068946294	8.860417844	4.581193118	4.226737367	FALSE	0.383044983	FALSE	FALSE
YMR314W	PRE5	505.8316911	386.2462159	35.16061674	24.83159181	14.38631452	15.55462972	FALSE	0.390109573	FALSE	FALSE
YMR315W	YMR315W	118.8773871	123.4397607	9.876321673	11.01257749	12.03660544	11.20897999	FALSE	0.383044983	FALSE	FALSE
YMR317W	YMR317W	1.128236531	1.312343065	41.85231821	43.78176768	0.026957564	0.029974648	FALSE	0.383044983	FALSE	FALSE
YMR318C	ADH6	491.9703314	378.3107414	30.31076866	23.00894186	16.23087613	16.44190088	FALSE	0.383044983	FALSE	FALSE
YMR319C	FET4	93.59836248	113.8846035	12.12503459	1	7.719430554	113.8846035	TRUE	0.999581892	TRUE	FALSE
YNL002C	RLP7	339.6702419	329.827949	5.056772435	2.223645495	67.17135214	148.3275773	FALSE	0.839186851	FALSE	FALSE
YNL003C	PET8	69.54328974	61.50243635	21.84317767	26.79014204	3.183753334	2.29571147	FALSE	0.383044983	FALSE	FALSE
YNL004W	HRB1	254.5809238	214.1055051	532.9098687	373.3125499	0.477718539	0.573528817	FALSE	0.383044983	FALSE	FALSE
YNL005C	MRP7	186.6728456	201.1428258	11.91935413	6.362390821	15.66132221	31.61434615	FALSE	0.831920415	FALSE	FALSE
YNL006W	LST8	185.5233442	662.059047	29.90256122	12.4149099	6.204262665	53.32773676	TRUE	0.995011534	TRUE	FALSE
YNL007C	SIS1	446.6977224	1224.281259	190.9861074	585.9526224	2.338901654	2.089386091	FALSE	0.383044983	FALSE	FALSE
YNL010W	YNL010W	415.4224788	365.2465434	19.02749216	8.403788496	21.83274996	43.46212944	FALSE	0.561072664	FALSE	FALSE
YNL011C	YNL011C	121.9909038	139.3467204	7.301368634	1	16.70795024	139.3467204	TRUE	0.995155709	TRUE	FALSE
YNL016W	PUB1	90.73606215	72.07540128	1145.175904	573.5124307	0.079233297	0.125673651	FALSE	0.383044983	FALSE	FALSE
YNL018C	YNL018C	1	1.077667765	3.130662125	1.548666358	0.319421247	0.695868261	FALSE	0.383044983	FALSE	FALSE

YNL020C	ARK1	14.21610676	24.19136457	7.58131989	13.6528862	1.87514931	1.771886488	FALSE	0.383044983	FALSE	FALSE
YNL021W	HDA1	73.58850585	87.39616287	29.16372675	25.83346737	2.523288827	3.38305972	FALSE	0.383044983	FALSE	FALSE
YNL022C	RCM1	81.5240314	86.73594011	7.70575177	3.07807771	10.57963374	28.17860635	FALSE	0.851614764	FALSE	FALSE
YNL023C	FAP1	50.03638003	64.83008307	47.54574003	21.5568655	1.052384083	3.007398411	FALSE	0.699437716	FALSE	FALSE
YNL024C-A	KSH1	412.2478303	538.1410259	29.64912582	17.77889067	13.90421535	30.26853789	FALSE	0.833910035	FALSE	FALSE
YNL026W	SAM50	55.98993938	61.38454845	10.37697588	5.834137134	5.395593091	10.52161563	FALSE	0.531040946	FALSE	FALSE
YNL027W	CRZ1	60.20385125	76.01721342	10.56755019	8.548171417	5.697049003	8.892804052	FALSE	0.493886967	FALSE	FALSE
YNL030W	HHF2	1338.464946	1092.971338	16.50513189	2.45957048	81.09386551	444.3748807	TRUE	0.965671857	TRUE	FALSE
YNL031C	HHT2	692.8574965	769.5869364	877.9277468	233.9898635	0.78919649	3.288975534	FALSE	0.827537486	FALSE	FALSE
YNL032W	SIW14	304.7324144	265.64969	25.05098329	1	12.16448915	265.64969	TRUE	0.999956747	TRUE	FALSE
YNL034W	YNL034W	1.624550868	1.436890354	5.083006225	4.889679198	0.319604344	0.293861887	FALSE	0.383044983	FALSE	FALSE
YNL036W	NCE103	82.60453856	83.71698605	2.119017393	9.419560041	38.98247312	8.8875686	TRUE	0.958290081	FALSE	TRUE
YNL037C	IDH1	209.2488691	260.4622486	54.52815227	139.7945044	3.837446537	1.863179456	FALSE	0.699437716	FALSE	FALSE
YNL039W	BDP1	71.56074986	70.31706702	30.01924668	32.98937548	2.383828969	2.131506462	FALSE	0.383044983	FALSE	FALSE
YNL040W	YNL040W	67.55216662	62.15808452	7.797486641	3.925350322	8.663325727	15.83504131	FALSE	0.54217128	FALSE	FALSE
YNL041C	COG6	94.6115029	88.86781957	16.40682043	7.994303991	5.76659587	11.11639233	FALSE	0.531040946	FALSE	FALSE
YNL042W	BOP3	27.04217973	44.92815915	11.77385731	10.32139785	2.296798663	4.352914189	FALSE	0.487600923	FALSE	FALSE
YNL046W	YNL046W	76.23662447	43.53154843	41.58025268	29.21700575	1.83348151	1.48993873	FALSE	0.383044983	FALSE	FALSE
YNL047C	SLM2	47.46894576	56.70992874	22.85378274	22.96305583	2.077071717	2.469615941	FALSE	0.383044983	FALSE	FALSE
YNL048W	ALG11	109.7651189	140.384711	5.373567731	4.59439791	20.42686059	30.55562747	FALSE	0.521640715	FALSE	FALSE
YNL049C	SFB2	44.58987091	50.76982546	14.04507257	1	3.174769706	50.76982546	TRUE	0.999639562	TRUE	FALSE
YNL052W	COX5A	381.5268263	263.6721791	52.55145719	36.73189359	7.260061788	7.178289853	FALSE	0.383044983	FALSE	FALSE
YNL053W	MSG5	27.65973731	30.73860358	49.66362687	68.31300562	0.55694155	0.449967079	FALSE	0.383044983	FALSE	FALSE
YNL054W	VAC7	21.01854013	28.51691291	34.9926851	15.323501	0.600655253	1.860992009	FALSE	0.699437716	FALSE	FALSE
YNL055C	POR1	391.7031556	276.8050369	63.94621969	48.189682	6.125509178	5.744072702	FALSE	0.383044983	FALSE	FALSE
YNL056W	OCA2	172.1085371	140.5743215	12.31777396	7.219231011	13.97237339	19.47220158	FALSE	0.468079585	FALSE	FALSE
YNL058C	YNL058C	27.96684881	21.95087986	1.08943744	9.614828163	25.67090848	2.283023627	TRUE	0.996583045	FALSE	TRUE
YNL059C	ARP5	64.32091443	60.00252649	4.590112994	8.851882345	14.01292616	6.778504746	FALSE	0.815470012	FALSE	FALSE
YNL061W	NOP2	112.066933	89.50434118	521.5999767	246.8412043	0.214852258	0.362598868	FALSE	0.383044983	FALSE	FALSE
YNL062C	GCD10	167.6398518	134.7884146	37.6467516	22.99328671	4.452969902	5.862076887	FALSE	0.415383506	FALSE	FALSE
YNL063W	MTQ1	72.48150996	184.6912718	4.658492914	1	15.55900402	184.6912718	TRUE	0.998168973	TRUE	FALSE
YNL064C	YDJ1	194.8453066	470.6982944	64.61183109	114.1016414	3.015628923	4.125254365	FALSE	0.428462028	FALSE	FALSE
YNL065W	AQR1	196.4638007	198.7458025	5.504948207	3.268640465	35.68858294	60.80381266	FALSE	0.549509804	FALSE	FALSE
YNL066W	SUN4	65.30918488	46.23749332	2296.627454	1397.330467	0.028436996	0.033089877	FALSE	0.383044983	FALSE	FALSE
YNL067W	RPL9B	1178.396823	1242.085067	3.394112388	1.661910272	347.18851	747.3839517	FALSE	0.83744233	FALSE	FALSE
YNL068C	FKH2	21.61525467	32.25227771	22.79410081	14.01796369	0.948282841	2.300781942	FALSE	0.699437716	FALSE	FALSE
YNL069C	RPL16B	352.1297136	187.0069472	38.69627768	6.631830232	9.099834265	28.1983918	FALSE	0.885640138	FALSE	FALSE
YNL071W	LAT1	114.4550763	84.98120594	696.4200636	865.7348242	0.164347758	0.09816078	FALSE	0.383044983	FALSE	FALSE
YNL072W	RNH201	28.46862015	18.30262414	20.72279302	9.432239649	1.37378297	1.940432477	FALSE	0.383044983	FALSE	FALSE
YNL073W	MSK1	29.80350742	49.68888867	9.79475697	9.776215794	3.042802134	5.082630101	FALSE	0.487600923	FALSE	FALSE
YNL074C	MLF3	29.0074128	36.06864403	23.49347046	10.70507139	1.234701057	3.369304389	FALSE	0.749524221	FALSE	FALSE
YNL076W	MKS1	42.26704092	57.44110422	49.66355673	36.65600167	0.851067537	1.567031362	FALSE	0.383044983	FALSE	FALSE
YNL077W	APJ1	78.28501581	217.4561069	4.557987625	3.411317282	17.17534628	63.74549446	FALSE	0.892200115	FALSE	FALSE
YNL078W	NIS1	19.40740055	13.70874399	306.5548266	266.1852511	0.06330809	0.051500765	FALSE	0.383044983	FALSE	FALSE

YNL079C	TPM1	517.1131642	335.5900528	749.2803896	499.0009103	0.690146401	0.672523929	FALSE	0.383044983	FALSE	FALSE
YNL080C	EOS1	26.80395569	39.36061609	20.40088649	7.979160311	1.313862302	4.932927095	FALSE	0.808232411	FALSE	FALSE
YNL084C	END3	267.0403886	249.8994544	18.07597949	6.872391278	14.77321817	36.36280943	FALSE	0.843915802	FALSE	FALSE
YNL085W	MKT1	94.87623105	103.3445779	11.54777528	3.561231269	8.215974831	29.01933912	FALSE	0.889287774	FALSE	FALSE
YNL086W	SNN1	26.88298929	27.79266803	5.363742231	2.673777773	5.011983822	10.39453178	FALSE	0.802321223	FALSE	FALSE
YNL087W	TCB2	50.02012926	60.62598711	22.18890398	1.763806899	2.254285715	34.37223606	TRUE	0.998976355	TRUE	FALSE
YNL088W	TOP2	67.47893355	67.52494776	16.02440838	2.308868691	4.211009354	29.24590212	TRUE	0.984818339	TRUE	FALSE
YNL091W	NST1	33.58577965	42.26628607	578.988885	405.1302313	0.058007641	0.104327653	FALSE	0.383044983	FALSE	FALSE
YNL092W	YNL092W	32.34497477	42.94241779	7.676658515	24.3710999	4.21341847	1.762022148	FALSE	0.749524221	FALSE	FALSE
YNL094W	APP1	25.61086788	35.80178487	172.6491255	206.997138	0.14834056	0.172957874	FALSE	0.383044983	FALSE	FALSE
YNL095C	YNL095C	12.3900427	17.4655922	3.745332577	2.13587931	3.308128837	8.177237409	FALSE	0.794780854	FALSE	FALSE
YNL097C	PHO23	43.07447965	42.04488771	67.87542856	78.00523345	0.634610795	0.539000857	FALSE	0.383044983	FALSE	FALSE
YNL098C	RAS2	412.3868955	293.6954949	96.75628168	126.3094999	4.262120126	2.325205112	FALSE	0.45227797	FALSE	FALSE
YNL099C	OCA1	151.4252502	149.25924	69.79615798	33.8751792	2.16953561	4.406153519	FALSE	0.749524221	FALSE	FALSE
YNL101W	AVT4	37.72621772	81.41976181	26.5014452	11.70591024	1.423553222	6.955440472	TRUE	0.912312572	TRUE	FALSE
YNL102W	POL1	38.72353776	21.49569385	72.07010053	15.01258892	0.537303784	1.431844565	FALSE	0.577652826	FALSE	FALSE
YNL103W	MET4	80.22954529	83.69694156	36.33972921	17.05909666	2.207763983	4.90629388	FALSE	0.749524221	FALSE	FALSE
YNL104C	LEU4	120.1914565	81.83044213	125.4071677	69.07791614	0.958409784	1.184610751	FALSE	0.383044983	FALSE	FALSE
YNL106C	INP52	12.59582451	18.85863978	21.36395596	13.74598939	0.589582965	1.371937607	FALSE	0.577652826	FALSE	FALSE
YNL108C	YNL108C	161.7773986	180.0630398	18.81765515	28.15717831	8.597107201	6.394924868	FALSE	0.446323529	FALSE	FALSE
YNL112W	DBP2	426.8117512	297.4155511	221.4364984	115.8846179	1.927467939	2.566479972	FALSE	0.383044983	FALSE	FALSE
YNL114C	YNL114C	6.268133326	14.91700768	13.21323421	1.380587653	0.474382973	10.80482477	TRUE	0.98638985	TRUE	FALSE
YNL115C	YNL115C	56.97563127	57.01391566	38.63599441	114.177322	1.47467749	0.499345357	FALSE	0.577652826	FALSE	FALSE
YNL116W	DMA2	47.3705487	56.67186219	31.6787874	31.53707946	1.495339708	1.796991452	FALSE	0.383044983	FALSE	FALSE
YNL117W	MLS1	2.625839636	5.237271165	6.25284953	6.056401855	0.419942879	0.864749614	FALSE	0.383044983	FALSE	FALSE
YNL118C	DCP2	89.00136065	106.4959203	42.04925763	22.50358776	2.116597668	4.732397402	FALSE	0.749524221	FALSE	FALSE
YNL121C	TOM70	102.4619197	88.08137869	21.30463161	14.90322504	4.809372985	5.910222682	FALSE	0.407151096	FALSE	FALSE
YNL123W	NMA111	62.96160926	73.73947083	9.68534236	4.100035837	6.500710757	17.98507958	FALSE	0.847462514	FALSE	FALSE
YNL124W	NAF1	45.67123412	46.18465799	912.4909023	807.156717	0.050051167	0.057218948	FALSE	0.383044983	FALSE	FALSE
YNL125C	ESBP6	31.49643997	61.94447106	12.81666078	24.10011954	2.457460683	2.570297254	FALSE	0.383044983	FALSE	FALSE
YNL126W	SPC98	27.21402218	26.77798703	4.463717494	1	6.096716968	26.77798703	TRUE	0.956372549	TRUE	FALSE
YNL130C	CPT1	100.9781961	164.7613606	20.32810381	20.72007584	4.967418359	7.951774015	FALSE	0.479368512	FALSE	FALSE
YNL132W	KRE33	63.90516108	50.8322053	5.174214054	2.426964721	12.35069914	20.94476481	FALSE	0.536750288	FALSE	FALSE
YNL134C	YNL134C	640.856362	740.1639461	110.3825115	130.4235336	5.805778046	5.675079685	FALSE	0.383044983	FALSE	FALSE
YNL135C	FPR1	524.4315505	270.7544988	222.8589667	200.1789992	2.353199238	1.352561957	FALSE	0.45227797	FALSE	FALSE
YNL136W	EAF7	57.87171804	45.79818164	121.1548296	84.53542566	0.477667446	0.541763187	FALSE	0.383044983	FALSE	FALSE
YNL137C	NAM9	118.80172	112.0460248	3.855449861	1	30.81397094	112.0460248	FALSE	0.891868512	FALSE	FALSE
YNL138W	SRV2	96.64908517	82.23157175	285.9650767	469.8960899	0.337975134	0.174999481	FALSE	0.383044983	FALSE	FALSE
YNL138W-A	YSF3	158.443469	157.2150189	4.318796486	2.707389146	36.6869496	58.06886652	FALSE	0.531545559	FALSE	FALSE
YNL139C	THO2	29.54809033	38.61139285	9.316541121	2.112302454	3.171573006	18.27929176	TRUE	0.960625721	TRUE	FALSE
YNL141W	AAH1	137.5679649	114.2779956	30.39504483	8.352138605	4.525999737	13.68248314	FALSE	0.872390427	FALSE	FALSE
YNL142W	MEP2	33.56742099	29.15493635	30.83038148	57.14683124	1.088777348	0.510175905	FALSE	0.577652826	FALSE	FALSE
YNL143C	YNL143C	85.28967674	110.6060061	1.106562984	11.41642001	77.07620624	9.688326632	TRUE	0.987644175	FALSE	TRUE
YNL144C	YNL144C	10.65307747	18.36514576	5.146284387	2.43653059	2.07005223	7.537416454	FALSE	0.847303922	FALSE	FALSE

YNL148C	ALF1	80.7728867	49.22194691	21.75389944	17.92405458	3.713030252	2.746139089	FALSE	0.383044983	FALSE	FALSE
YNL149C	PGA2	739.8808145	630.1206321	76.49009835	22.17759934	9.672896629	28.41248155	FALSE	0.855074971	FALSE	FALSE
YNL151C	RPC31	168.2881867	118.3156614	270.3077948	159.0188791	0.622579851	0.744035313	FALSE	0.383044983	FALSE	FALSE
YNL152W	INN1	17.65396819	26.74666255	10.89343831	5.915181337	1.620605698	4.521697819	FALSE	0.749524221	FALSE	FALSE
YNL153C	GIM3	600.3123881	316.7541887	51.96647265	47.74448956	11.55191718	6.634361194	FALSE	0.516133218	FALSE	FALSE
YNL154C	YCK2	72.6894337	85.42444496	80.21781243	60.63020136	0.906150785	1.408942129	FALSE	0.383044983	FALSE	FALSE
YNL156C	NSG2	373.2412223	518.3589136	7.921652909	46.88928835	47.1165837	11.05495374	TRUE	0.958549596	FALSE	TRUE
YNL157W	IGO1	262.2926353	251.7355379	16.64772784	17.1006557	15.75546151	14.72081201	FALSE	0.389258939	FALSE	FALSE
YNL158W	PGA1	35.51810976	33.6391195	3.539778576	1	10.03399196	33.6391195	FALSE	0.887730681	FALSE	FALSE
YNL159C	ASI2	124.292761	192.2603886	43.84137072	27.22174348	2.835056453	7.06275073	FALSE	0.802407728	FALSE	FALSE
YNL160W	YGP1	89.90357144	157.5540154	57.11781536	72.52502222	1.574002277	2.172409061	FALSE	0.383044983	FALSE	FALSE
YNL161W	CBK1	44.47103971	45.14606992	206.8387868	98.33472698	0.215003387	0.459106069	FALSE	0.383044983	FALSE	FALSE
YNL162W	RPL42A	1538.153054	920.3269287	12.18051582	6.014194487	126.279796	153.025801	FALSE	0.434443483	FALSE	FALSE
YNL163C	RIA1	60.40553822	57.20136339	37.86277452	24.13851337	1.59538066	2.369713599	FALSE	0.383044983	FALSE	FALSE
YNL164C	IBD2	120.7550543	108.975683	28.38095488	16.28795584	4.254791806	6.690568423	FALSE	0.479368512	FALSE	FALSE
YNL165W	YNL165W	23.45352221	30.19005486	35.19535508	21.6570852	0.666381179	1.394003605	FALSE	0.577652826	FALSE	FALSE
YNL166C	BNIS	137.1869626	116.4282812	140.4569629	61.00114692	0.976718845	1.908624461	FALSE	0.383044983	FALSE	FALSE
YNL167C	SKO1	24.66384714	34.7975817	26.8626202	22.3634813	0.918147484	1.556000215	FALSE	0.383044983	FALSE	FALSE
YNL168C	FMP41	90.8969738	77.07120635	12.68995604	5.984051228	7.162906909	12.87943626	FALSE	0.530017301	FALSE	FALSE
YNL169C	PSD1	78.49085416	78.49967182	57.48313541	27.72261341	1.365458819	2.831611532	FALSE	0.699437716	FALSE	FALSE
YNL172W	APC1	21.65041563	27.49710278	15.17561167	11.08270031	1.426658516	2.481083311	FALSE	0.45227797	FALSE	FALSE
YNL173C	MDG1	58.63778948	49.8007795	37.12607695	56.73917126	1.57942326	0.877714256	FALSE	0.383044983	FALSE	FALSE
YNL175C	NOP13	100.7633462	77.61626439	46.76459067	18.36498737	2.154693215	4.226317329	FALSE	0.487600923	FALSE	FALSE
YNL176C	TDA7	26.23366318	32.14901184	33.70785294	23.83885999	0.778265623	1.348596865	FALSE	0.383044983	FALSE	FALSE
YNL177C	MRPL22	217.4258747	185.5391622	78.38351679	101.8745896	2.773872411	1.821250647	FALSE	0.383044983	FALSE	FALSE
YNL178W	RPS3	1174.036327	624.793016	224.2463824	60.26902703	5.235474991	10.36673474	FALSE	0.531040946	FALSE	FALSE
YNL180C	RHO5	53.99185023	47.75496435	139.3185517	139.7887706	0.387542431	0.341622322	FALSE	0.383044983	FALSE	FALSE
YNL181W	YNL181W	150.0203969	136.6556684	5.058073439	3.460176235	29.65959247	39.49384631	FALSE	0.45461361	FALSE	FALSE
YNL185C	MRPL19	136.7211943	128.2442715	10.65295391	21.15949072	12.83411113	6.060839233	FALSE	0.809717416	FALSE	FALSE
YNL186W	UBP10	44.50433944	50.48295916	54.40708147	47.73258194	0.817987994	1.057620541	FALSE	0.383044983	FALSE	FALSE
YNL187W	SWT21	46.88187289	51.79086652	22.35980097	41.36091225	2.096703497	1.252169348	FALSE	0.383044983	FALSE	FALSE
YNL189W	SRP1	253.8940303	183.4623191	3.079896173	1.993688017	82.43590563	92.02157888	FALSE	0.405219146	FALSE	FALSE
YNL190W	YNL190W	58.05667391	65.30911981	176.8538164	71.34393855	0.328274928	0.915412313	FALSE	0.577652826	FALSE	FALSE
YNL191W	DUG3	27.81703023	56.9576513	21.35054522	26.76468334	1.302872125	2.128089863	FALSE	0.383044983	FALSE	FALSE
YNL192W	CHS1	109.6438825	141.8094635	7.497702563	5.386299269	14.62366393	26.32780995	FALSE	0.550965975	FALSE	FALSE
YNL193W	YNL193W	38.06293126	46.7193717	17.55601788	17.63999309	2.168084558	2.648491497	FALSE	0.383044983	FALSE	FALSE
YNL194C	YNL194C	25.09328871	42.72821847	1	6.727584539	25.09328871	6.351197554	FALSE	0.889085928	FALSE	FALSE
YNL195C	YNL195C	11.31015278	6.219486663	2.743540864	27.68077852	4.122465582	0.224686118	FALSE	0.897419262	FALSE	FALSE
YNL196C	SLZ1	2.761961758	6.775490668	1.302523083	4.1700709	2.120470489	1.624790281	FALSE	0.383044983	FALSE	FALSE
YNL197C	WHI3	17.83151372	21.68771107	588.0099254	366.3731884	0.030325192	0.059195683	FALSE	0.383044983	FALSE	FALSE
YNL199C	GCR2	61.6078422	56.55318426	223.2586654	270.9162817	0.275948269	0.208747824	FALSE	0.383044983	FALSE	FALSE
YNL200C	YNL200C	73.26039431	66.86339475	5.84417737	16.05294932	12.5356213	4.165178213	FALSE	0.86810842	FALSE	FALSE
YNL201C	PSY2	119.7485279	133.6088899	19.26738307	15.7301009	6.215090416	8.493835528	FALSE	0.446323529	FALSE	FALSE
YNL202W	SPS19	53.05450733	73.35104573	2.475938355	8.655397062	21.42804049	8.474602056	FALSE	0.846482122	FALSE	FALSE

YNL206C	RTT106	118.5687523	124.2990508	104.9368227	90.07580908	1.129906064	1.379938211	FALSE	0.383044983	FALSE	FALSE
YNL207W	RIO2	183.0228718	154.5559403	768.158585	224.301609	0.238261832	0.689054086	FALSE	0.383044983	FALSE	FALSE
YNL208W	YNL208W	824.3692246	670.2992918	304.9631564	1027.43608	2.703176457	0.652399993	FALSE	0.827537486	FALSE	FALSE
YNL209W	SSB2	153.487597	93.67612424	435.8113938	67.54270254	0.352188124	1.386917028	FALSE	0.699437716	FALSE	FALSE
YNL212W	VID27	83.41400477	129.4222557	26.10496284	17.31342119	3.195331297	7.475256	FALSE	0.794780854	FALSE	FALSE
YNL215W	IES2	71.2023821	62.56247458	34.7006151	25.35071175	2.051905475	2.467878425	FALSE	0.383044983	FALSE	FALSE
YNL216W	RAP1	49.3113973	35.37084349	85.05161146	73.66119386	0.579782046	0.48018287	FALSE	0.383044983	FALSE	FALSE
YNL217W	YNL217W	71.15864813	77.30689811	50.88161797	13.46437045	1.398513863	5.74159025	FALSE	0.896064014	FALSE	FALSE
YNL218W	MGS1	55.39382876	57.44763389	68.9446197	29.56438406	0.803453975	1.943136504	FALSE	0.699437716	FALSE	FALSE
YNL220W	ADE12	226.26842	368.9676186	45.74464384	6.061718472	4.946336903	60.86848478	TRUE	0.999019608	TRUE	FALSE
YNL221C	POP1	56.3416459	66.36268257	801.4339744	531.3581715	0.070301045	0.12489256	FALSE	0.383044983	FALSE	FALSE
YNL223W	ATG4	91.16968265	80.42986498	5.31939881	10.48656073	17.13909521	7.669803955	FALSE	0.825187428	FALSE	FALSE
YNL224C	SQS1	56.16835097	57.51668152	4.699344475	3.506583647	11.95238001	16.40248382	FALSE	0.463581315	FALSE	FALSE
YNL229C	URE2	161.1969667	133.2385925	71.73584213	75.86733195	2.247091021	1.756205064	FALSE	0.383044983	FALSE	FALSE
YNL230C	ELA1	44.03982227	52.03755136	26.95965616	40.50759635	1.633545399	1.284636859	FALSE	0.383044983	FALSE	FALSE
YNL232W	CSL4	251.9260121	241.397089	53.18734905	61.94869473	4.736577713	3.896725994	FALSE	0.383044983	FALSE	FALSE
YNL234W	YNL234W	30.83055508	34.03612994	4.326342305	5.156654625	7.126240343	6.600428459	FALSE	0.383044983	FALSE	FALSE
YNL236W	SIN4	31.04011767	31.34793682	6.51019046	3.549495017	4.767927737	8.831661032	FALSE	0.521583045	FALSE	FALSE
YNL237W	YTP1	35.37748075	40.40254544	7.865386814	7.273336692	4.497869156	5.554884526	FALSE	0.407151096	FALSE	FALSE
YNL238W	KEX2	32.00785751	45.98604495	52.15667078	31.23689547	0.613686745	1.472170785	FALSE	0.577652826	FALSE	FALSE
YNL239W	LAP3	65.76718351	47.5252274	5.067394828	2.833322153	12.97849995	16.77367586	FALSE	0.438220877	FALSE	FALSE
YNL240C	NAR1	86.54196375	98.28592866	24.24472712	31.53576636	3.569516923	3.116649443	FALSE	0.383044983	FALSE	FALSE
YNL241C	ZWF1	63.21864607	73.89435821	240.328884	453.2665657	0.263050554	0.163026272	FALSE	0.383044983	FALSE	FALSE
YNL242W	ATG2	17.35147579	21.34300827	69.06596239	85.1969419	0.251230493	0.250513784	FALSE	0.383044983	FALSE	FALSE
YNL243W	SLA2	73.41850333	67.26544915	274.588851	329.907115	0.267376126	0.203892084	FALSE	0.383044983	FALSE	FALSE
YNL244C	SUI1	815.1304849	829.9043662	16.73284815	13.57843283	48.71438967	61.11930415	FALSE	0.448514994	FALSE	FALSE
YNL245C	CWC25	67.46949066	69.73109146	16.49790499	14.09615458	4.089579296	4.946816599	FALSE	0.383044983	FALSE	FALSE
YNL246W	VPS75	115.5790565	94.23045607	25.81879162	24.5349651	4.476547865	3.840659877	FALSE	0.383044983	FALSE	FALSE
YNL247W	YNL247W	58.25568834	43.29520892	24.45087398	11.1569617	2.382560574	3.880555484	FALSE	0.45227797	FALSE	FALSE
YNL250W	RAD50	53.96120452	68.32512124	6.907992895	9.700933522	7.811415752	7.043149104	FALSE	0.383044983	FALSE	FALSE
YNL251C	NRD1	40.65036812	32.64821936	125.3081484	73.35719397	0.32440323	0.445058182	FALSE	0.383044983	FALSE	FALSE
YNL253W	TEX1	107.7215017	118.170644	10.47267016	1	10.28596337	118.170644	TRUE	0.998154556	TRUE	FALSE
YNL254C	RTC4	85.55534218	91.69665915	14.51188132	12.42980673	5.895537614	7.377158882	FALSE	0.415383506	FALSE	FALSE
YNL255C	GIS2	617.1618318	482.7317118	5.753831951	1	107.2610109	482.7317118	TRUE	0.959602076	TRUE	FALSE
YNL256W	FOL1	58.64693472	57.11943951	16.13083213	5.666068926	3.635704236	10.08096447	FALSE	0.825663206	FALSE	FALSE
YNL258C	DSL1	137.6913791	163.2130447	13.23769267	5.632389824	10.40146365	28.9775832	FALSE	0.85467128	FALSE	FALSE
YNL259C	ATX1	1047.053555	867.1254645	24.93323397	20.62009538	41.9942939	42.05244682	FALSE	0.383044983	FALSE	FALSE
YNL262W	POL2	18.57459662	15.61136446	101.9917151	33.56953687	0.182118681	0.465045572	FALSE	0.383044983	FALSE	FALSE
YNL263C	YIF1	65.15625098	82.76853362	45.01398735	23.51834262	1.447466772	3.519318302	FALSE	0.749524221	FALSE	FALSE
YNL267W	PIK1	38.31154171	35.16651108	7.047351192	3.126555281	5.436303749	11.24768568	FALSE	0.802321223	FALSE	FALSE
YNL268W	LYP1	58.65876894	46.12758475	35.49677339	61.43983197	1.652509886	0.750776545	FALSE	0.577652826	FALSE	FALSE
YNL271C	BNI1	41.43054885	40.07387188	706.2455523	641.8283077	0.058663093	0.062437059	FALSE	0.383044983	FALSE	FALSE
YNL272C	SEC2	109.7799634	116.3021888	57.235715	21.29098545	1.918032532	5.462508493	FALSE	0.783708189	FALSE	FALSE
YNL273W	TOF1	30.44458663	30.10691192	6.245551578	4.137237486	4.874603348	7.277056738	FALSE	0.479368512	FALSE	FALSE

YNL274C	GOR1	229.2578693	206.9034095	21.29017736	146.5543809	10.7682461	1.411785906	TRUE	0.970588235	FALSE	TRUE
YNL275W	BOR1	46.09440766	55.56606905	13.5096306	15.27914794	3.411966547	3.636725639	FALSE	0.383044983	FALSE	FALSE
YNL277W	MET2	89.2758517	180.9556866	13.34830378	20.04534423	6.688179501	9.027317494	FALSE	0.446323529	FALSE	FALSE
YNL278W	CAF120	9.591986777	12.28656366	966.3555162	634.6445711	0.00992594	0.019359755	FALSE	0.383044983	FALSE	FALSE
YNL279W	PRM1	14.71283334	7.317939317	5.261679256	8.580139157	2.796223909	0.852892847	FALSE	0.699437716	FALSE	FALSE
YNL281W	HCH1	907.0528226	1531.986836	242.81408	365.0194538	3.735585772	4.197000517	FALSE	0.383044983	FALSE	FALSE
YNL282W	POP3	114.5053641	101.1138276	26.51714567	17.62012348	4.318163257	5.738542508	FALSE	0.415383506	FALSE	FALSE
YNL283C	WSC2	10.40957856	13.19473034	85.70848983	63.6480008	0.121453296	0.207307852	FALSE	0.383044983	FALSE	FALSE
YNL284C	MRPL10	280.0380742	275.0156978	202.893386	187.1953092	1.380222784	1.469137763	FALSE	0.383044983	FALSE	FALSE
YNL286W	CUS2	151.1694042	158.9160539	4.328437721	1	34.92470355	158.9160539	TRUE	0.959587659	TRUE	FALSE
YNL288W	CAF40	33.57599359	42.6276191	172.3882238	146.8647344	0.194769648	0.290250885	FALSE	0.383044983	FALSE	FALSE
YNL289W	PCL1	360.3449111	170.1858067	32.28076595	14.43106308	11.16283646	11.79301939	FALSE	0.383044983	FALSE	FALSE
YNL290W	RFC3	111.4730529	111.7161181	145.6243475	104.2383695	0.765483622	1.071737007	FALSE	0.383044983	FALSE	FALSE
YNL291C	MID1	61.2755702	77.25170098	28.90007814	5.551222288	2.120256212	13.91616062	TRUE	0.97482699	TRUE	FALSE
YNL292W	PUS4	60.42193495	46.98400274	105.9276246	59.31488016	0.570407721	0.792111568	FALSE	0.383044983	FALSE	FALSE
YNL293W	MSB3	59.49659753	81.89901062	21.13403205	23.22832218	2.815203336	3.525825498	FALSE	0.383044983	FALSE	FALSE
YNL294C	RIM21	84.37476753	124.6994799	5.386694696	2.464075698	15.66355108	50.60700044	FALSE	0.888206459	FALSE	FALSE
YNL295W	YNL295W	49.1332108	63.2508186	43.56073242	22.32845735	1.12792435	2.832744672	FALSE	0.699437716	FALSE	FALSE
YNL297C	MON2	38.22144585	43.79855971	20.87264821	1	1.831173767	43.79855971	TRUE	0.999769319	TRUE	FALSE
YNL298W	CLA4	30.88710063	30.71877264	73.41238746	61.32084614	0.42073418	0.500951545	FALSE	0.383044983	FALSE	FALSE
YNL299W	TRF5	43.51624754	46.02697238	40.14732809	4.423019483	1.083913914	10.40623324	TRUE	0.978344867	TRUE	FALSE
YNL300W	TOS6	33.72164446	5.130954098	115.476095	35.76911906	0.29202273	0.143446477	FALSE	0.383044983	FALSE	FALSE
YNL301C	RPL18B	536.1767951	536.2601585	936.1614663	485.1689034	0.572739655	1.105306121	FALSE	0.383044983	FALSE	FALSE
YNL302C	RPS19B	1128.350456	756.58867	1342.552542	445.4892306	0.840451618	1.698332121	FALSE	0.577652826	FALSE	FALSE
YNL304W	YPT11	28.64709378	22.02034467	20.62687623	15.93626785	1.388823662	1.381775513	FALSE	0.383044983	FALSE	FALSE
YNL305C	BX11	83.54443642	136.8512696	7.328177413	23.45360106	11.40043857	5.834978995	FALSE	0.531040946	FALSE	FALSE
YNL306W	MRPS18	362.3297344	274.1431901	30.64802759	35.83512462	11.82228557	7.650125205	FALSE	0.50239331	FALSE	FALSE
YNL307C	MCK1	51.8079557	50.71707044	23.19129008	17.90894384	2.233940222	2.831940895	FALSE	0.383044983	FALSE	FALSE
YNL308C	KRI1	92.88907714	74.02109104	124.2012334	62.96983602	0.747891745	1.175500775	FALSE	0.383044983	FALSE	FALSE
YNL309W	STB1	11.76949975	8.682606213	33.14907309	39.15299214	0.355047627	0.221760988	FALSE	0.383044983	FALSE	FALSE
YNL310C	ZIM17	78.28003076	45.29899475	6.80971736	6.810894733	11.49534212	6.650960928	FALSE	0.516133218	FALSE	FALSE
YNL311C	SKP2	46.41618362	57.81781598	7.864132594	3.889073932	5.902263609	14.866731	FALSE	0.835654556	FALSE	FALSE
YNL312W	RFA2	182.610855	226.9542093	7.886005005	2.749711996	23.15631995	82.53744742	FALSE	0.891782007	FALSE	FALSE
YNL313C	EMW1	56.20022192	54.26007582	37.66113525	24.1250384	1.492260431	2.249118734	FALSE	0.383044983	FALSE	FALSE
YNL314W	DAL82	28.93808623	34.57882249	13.88261553	5.296265037	2.084483732	6.528907117	FALSE	0.831055363	FALSE	FALSE
YNL316C	PHA2	30.37939693	30.10542645	1	10.29367796	30.37939693	2.924652061	TRUE	0.997001153	FALSE	TRUE
YNL317W	PFS2	40.23845675	37.1416114	4.621901913	5.205740648	8.706038663	7.134741032	FALSE	0.407151096	FALSE	FALSE
YNL320W	YNL320W	116.6725045	148.6566426	5.743333568	3.242680701	20.31442247	45.84374977	FALSE	0.839691465	FALSE	FALSE
YNL321W	VNX1	12.34491275	14.87402819	358.3637567	443.7255567	0.034447995	0.033520783	FALSE	0.383044983	FALSE	FALSE
YNL322C	KRE1	96.76929877	117.114572	181.7902798	285.4865107	0.532312833	0.410228041	FALSE	0.383044983	FALSE	FALSE
YNL323W	LEM3	97.6828163	98.16298227	253.1067006	126.1733431	0.385935323	0.778000961	FALSE	0.383044983	FALSE	FALSE
YNL327W	EGT2	71.53838009	31.95274582	579.869617	409.5659772	0.123369768	0.078016114	FALSE	0.383044983	FALSE	FALSE
YNL328C	MDJ2	46.430025	46.43746155	12.69458579	10.00981913	3.657466717	4.639190875	FALSE	0.383044983	FALSE	FALSE
YNL330C	RPD3	159.6135379	151.8084591	104.6932683	49.37550116	1.524582626	3.074570497	FALSE	0.699437716	FALSE	FALSE

YNL331C	AAD14	54.50532646	71.60992723	1.681144676	3.518394704	32.42155613	20.35301132	FALSE	0.52733564	FALSE	FALSE
YNR001C	CIT1	279.627304	300.210699	2.505706112	5.551317519	111.5962094	54.07917994	FALSE	0.83650519	FALSE	FALSE
YNR002C	ATO2	10.38505658	33.92533667	4.829905248	2.577398917	2.150157415	13.16262548	TRUE	0.974798155	TRUE	FALSE
YNR003C	RPC34	86.15726656	61.4907738	9.683784556	2.076529704	8.897065611	29.61227749	FALSE	0.886231257	FALSE	FALSE
YNR006W	VPS27	19.68852873	35.41634889	48.1037572	71.43823062	0.409292951	0.495761843	FALSE	0.383044983	FALSE	FALSE
YNR007C	ATG3	79.11502847	85.10757008	24.56475674	17.4894857	3.220672173	4.866213424	FALSE	0.45227797	FALSE	FALSE
YNR008W	LRO1	34.63569744	48.69755982	676.9526772	725.3929873	0.051164134	0.067132659	FALSE	0.383044983	FALSE	FALSE
YNR009W	NRM1	21.66580284	9.688951655	133.2522509	27.52741856	0.162592397	0.351974582	FALSE	0.383044983	FALSE	FALSE
YNR011C	PRP2	54.47719011	62.52070494	14.22938591	23.9784049	3.828499027	2.607375479	FALSE	0.428460208	FALSE	FALSE
YNR013C	PHO91	28.16983159	36.26590843	105.0416393	102.5148609	0.268177761	0.353762451	FALSE	0.383044983	FALSE	FALSE
YNR014W	YNR014W	11.63136008	14.88699358	17.37498591	43.65420597	0.669431339	0.341020831	FALSE	0.383044983	FALSE	FALSE
YNR015W	SMM1	30.47167542	26.1956308	194.0882128	185.6802591	0.156999104	0.141079245	FALSE	0.383044983	FALSE	FALSE
YNR016C	ACC1	85.85960805	43.19299479	3184.29205	1345.371585	0.026963484	0.032104881	FALSE	0.383044983	FALSE	FALSE
YNR017W	TIM23	74.93651769	58.45759662	254.0025394	258.3525586	0.295022711	0.226270632	FALSE	0.383044983	FALSE	FALSE
YNR018W	RCF2	66.60588118	55.00192758	167.7529987	229.4031096	0.397047336	0.239761038	FALSE	0.383044983	FALSE	FALSE
YNR019W	ARE2	68.37188198	120.2728623	454.6562084	1104.382619	0.150381499	0.108905066	FALSE	0.383044983	FALSE	FALSE
YNR020C	ATP23	127.7189989	124.9715502	146.7796978	82.2537601	0.870140768	1.519341487	FALSE	0.383044983	FALSE	FALSE
YNR021W	YNR021W	134.5191712	100.2605323	1	11.59288003	134.5191712	8.648457678	TRUE	0.999596309	FALSE	TRUE
YNR022C	MRPL50	204.8952046	154.4569891	1	3.964546629	204.8952046	38.9595919	TRUE	0.965657439	FALSE	TRUE
YNR023W	SNF12	61.4722026	58.17720691	4.790682379	3.385010677	12.83161724	17.18671297	FALSE	0.46156286	FALSE	FALSE
YNR026C	SEC12	73.07288903	68.76692383	7.850140392	18.54344845	9.308481809	3.70842155	FALSE	0.814504037	FALSE	FALSE
YNR027W	BUD17	75.23484713	92.6516389	34.37473124	35.15878646	2.18866721	2.635234268	FALSE	0.383044983	FALSE	FALSE
YNR029C	YNR029C	126.3593726	126.181696	4.851655212	6.243335579	26.04459037	20.21062209	FALSE	0.445905421	FALSE	FALSE
YNR030W	ALG12	31.28530947	43.40241848	23.58743287	22.42069333	1.326354998	1.93581964	FALSE	0.383044983	FALSE	FALSE
YNR031C	SSK2	49.17757229	50.6746666	77.8936247	89.76112395	0.631342712	0.564550268	FALSE	0.383044983	FALSE	FALSE
YNR032W	PPG1	110.7816125	127.8254154	10.34483657	20.60483618	10.7088799	6.203660844	FALSE	0.516133218	FALSE	FALSE
YNR033W	ABZ1	48.67050415	72.87951637	149.8171041	167.8941639	0.324866139	0.434080105	FALSE	0.383044983	FALSE	FALSE
YNR034W	SOL1	39.07363546	85.48270447	5.512861635	6.162608627	7.087722864	13.87118827	FALSE	0.537802768	FALSE	FALSE
YNR035C	ARC35	208.7580788	206.3364075	38.84118492	79.90103525	5.374657834	2.582399676	FALSE	0.749524221	FALSE	FALSE
YNR036C	MRPS12	364.8084122	217.3436617	377.8982074	491.2915738	0.965361584	0.442392407	FALSE	0.577652826	FALSE	FALSE
YNR037C	RSM19	400.7687745	244.6173071	10.89081935	16.45411699	36.79877165	14.8666323	FALSE	0.843915802	FALSE	FALSE
YNR038W	DBP6	37.20460485	45.64852403	58.86670013	52.89488034	0.632014446	0.863004581	FALSE	0.383044983	FALSE	FALSE
YNR039C	ZRG17	24.68982549	31.90406373	8.933258501	16.22558301	2.763809587	1.966281502	FALSE	0.383044983	FALSE	FALSE
YNR040W	YNR040W	115.9635152	119.955185	12.31839104	9.220689288	9.413852414	13.00935117	FALSE	0.457641292	FALSE	FALSE
YNR041C	COQ2	187.4747424	182.8928359	18.91136086	13.53798594	9.913339594	13.50960451	FALSE	0.456156286	FALSE	FALSE
YNR043W	MVD1	49.55693571	51.14044783	145.9251181	92.94254708	0.339605247	0.55023721	FALSE	0.383044983	FALSE	FALSE
YNR044W	AGA1	16.92870856	5.095616949	21.05706196	6.90718111	0.803944472	0.737727427	FALSE	0.383044983	FALSE	FALSE
YNR045W	PET494	27.80844558	39.81637832	23.11452957	31.67169954	1.203072098	1.257159511	FALSE	0.383044983	FALSE	FALSE
YNR046W	TRM112	72.6884542	58.93680486	95.04042281	78.44304034	0.764816191	0.75133249	FALSE	0.383044983	FALSE	FALSE
YNR047W	FPK1	45.91547888	66.89849679	24.46375258	24.03259205	1.876877995	2.783657154	FALSE	0.383044983	FALSE	FALSE
YNR048W	YNR048W	31.62503943	36.99865018	27.5495493	43.75616328	1.147933096	0.845564314	FALSE	0.383044983	FALSE	FALSE
YNR049C	MSO1	113.2720018	98.72628464	25.4357822	16.42991542	4.453254116	6.008934442	FALSE	0.428460208	FALSE	FALSE
YNR050C	LYS9	121.6624346	90.34745442	6.552778763	1	18.56654085	90.34745442	TRUE	0.959529988	TRUE	FALSE
YNR051C	BRE5	35.91573584	39.0903793	178.0434893	94.39768183	0.201724511	0.41410317	FALSE	0.383044983	FALSE	FALSE

YNR052C	POP2	52.15982374	50.73812136	107.9475612	88.15016093	0.483195944	0.575587393	FALSE	0.383044983	FALSE	FALSE
YNR053C	NOG2	363.1881297	270.3935547	188.5220297	132.0152783	1.926502331	2.048198953	FALSE	0.383044983	FALSE	FALSE
YNR054C	ESF2	103.8221374	80.16239038	41.59204225	25.85064731	2.496279983	3.100981938	FALSE	0.383044983	FALSE	FALSE
YNR055C	HOL1	87.05978024	99.56046807	50.17471593	32.82001557	1.735132499	3.033528971	FALSE	0.45227797	FALSE	FALSE
YNR056C	BIO5	9.853907105	10.03061964	6.267989896	6.2697077	1.57210003	1.59985443	FALSE	0.383044983	FALSE	FALSE
YNR057C	BIO4	137.7738339	199.6634613	9.48957298	9.673585811	14.518444	20.64006721	FALSE	0.478171857	FALSE	FALSE
YNR058W	BIO3	21.663177	32.59560375	12.02684089	32.15540903	1.801235852	1.013689601	FALSE	0.383044983	FALSE	FALSE
YNR061C	YNR061C	139.8826549	155.7438923	6.57147524	6.965228318	21.28633979	22.36019915	FALSE	0.386908881	FALSE	FALSE
YNR062C	YNR062C	1.03672632	3.222489464	4.69357471	9.941544995	0.220882032	0.324143729	FALSE	0.383044983	FALSE	FALSE
YNR064C	YNR064C	4.340305378	9.685924804	4.839170367	1	0.896911051	9.685924804	TRUE	0.975879469	TRUE	FALSE
YNR065C	YNR065C	12.37282942	13.68139588	25.44267557	45.66237272	0.486302213	0.299620783	FALSE	0.383044983	FALSE	FALSE
YNR067C	DSE4	61.22222619	45.10428381	33.66645253	17.56678101	1.818493533	2.567589576	FALSE	0.383044983	FALSE	FALSE
YNR069C	BSC5	25.03255796	67.04970255	3.705358996	2.030902243	6.7557713	33.01473658	TRUE	0.958463091	TRUE	FALSE
YNR070W	PDR18	3.040678994	4.42387734	3.725371182	1.846282272	0.816208331	2.396100211	FALSE	0.699437716	FALSE	FALSE
YNR072W	HXT17	1.332671709	1.792806823	4.273986118	4.923040671	0.311810023	0.364166568	FALSE	0.383044983	FALSE	FALSE
YNR074C	AIF1	122.4063899	171.3984612	4.59402213	3.493874801	26.64471055	49.05684116	FALSE	0.559256055	FALSE	FALSE
YNR075W	COS10	13.01891292	14.91511346	3.086530956	1	4.217975813	14.91511346	FALSE	0.878935986	FALSE	FALSE
YOL002C	IZH2	142.9843998	166.3297733	57.10078343	19.75764386	2.504070719	8.418502451	FALSE	0.844910611	FALSE	FALSE
YOL003C	PFA4	56.46074843	58.56598266	3.823955122	2.239532434	14.76501335	26.1509866	FALSE	0.548745675	FALSE	FALSE
YOL004W	SIN3	38.03751662	33.95459783	153.9453446	108.0529255	0.247084553	0.314240431	FALSE	0.383044983	FALSE	FALSE
YOL005C	RPB11	99.56489464	61.87534866	58.69645562	36.48964499	1.696267578	1.695696099	FALSE	0.383044983	FALSE	FALSE
YOL006C	TOP1	90.43715675	92.37105622	46.95605624	27.17301648	1.925995579	3.399367026	FALSE	0.45227797	FALSE	FALSE
YOL007C	CSI2	30.1837195	19.70241365	2.227294321	4.286282119	13.55174267	4.596620826	FALSE	0.838249712	FALSE	FALSE
YOL010W	RCL1	200.8464066	162.0410146	31.01608379	17.84606913	6.475556616	9.07992754	FALSE	0.44994233	FALSE	FALSE
YOL011W	PLB3	94.50442718	118.9162718	53.61469607	62.3468451	1.762659012	1.90733423	FALSE	0.383044983	FALSE	FALSE
YOL012C	HTZ1	152.9308455	110.264837	230.7882561	82.03087967	0.6626457	1.344186939	FALSE	0.577652826	FALSE	FALSE
YOL013C	HRD1	37.84158389	44.28004092	18.13578554	8.753513207	2.086569882	5.058545051	FALSE	0.749524221	FALSE	FALSE
YOL014W	YOL014W	102.7911184	133.8836956	22.53573194	1	4.561250492	133.8836956	TRUE	0.999971165	TRUE	FALSE
YOL016C	CMK2	207.0530235	263.9492207	9.563225287	9.430349911	21.65096161	27.98933478	FALSE	0.447880623	FALSE	FALSE
YOL017W	ESC8	47.28714847	30.3049219	3.532309608	4.232270006	13.3870339	7.160441525	FALSE	0.537802768	FALSE	FALSE
YOL018C	TLG2	135.7255603	105.3435584	12.97445316	7.667974924	10.46098503	13.73811984	FALSE	0.439359862	FALSE	FALSE
YOL019W	YOL019W	18.65678089	15.23871678	152.1132209	101.3425773	0.12265062	0.150368356	FALSE	0.383044983	FALSE	FALSE
YOL020W	TAT2	144.5872323	175.6428841	71.28684166	68.98827378	2.028245731	2.545981723	FALSE	0.383044983	FALSE	FALSE
YOL021C	DIS3	52.09291093	51.33685145	58.47223186	45.08202441	0.890899993	1.13874326	FALSE	0.383044983	FALSE	FALSE
YOL026C	MIM1	221.5840114	169.2089643	46.3277997	35.43356004	4.782959969	4.775387066	FALSE	0.383044983	FALSE	FALSE
YOL027C	MDM38	34.78322592	29.99984239	122.5897133	87.65519918	0.283736906	0.342248294	FALSE	0.383044983	FALSE	FALSE
YOL028C	YAP7	23.99280912	29.36045956	19.97098883	26.25743133	1.201383132	1.118177144	FALSE	0.383044983	FALSE	FALSE
YOL029C	YOL029C	115.553193	148.0377627	3.242570362	11.09663868	35.6362947	13.34077525	FALSE	0.855536332	FALSE	FALSE
YOL030W	GAS5	22.33587922	24.97152489	36.83315232	37.83785747	0.606406941	0.659961387	FALSE	0.383044983	FALSE	FALSE
YOL032W	OPI10	221.1578883	279.5781413	11.93829726	11.78926068	18.52507803	23.7146458	FALSE	0.445703576	FALSE	FALSE
YOL034W	SMC5	39.63061672	46.85864936	4.39337375	3.965708829	9.020542976	11.8159581	FALSE	0.430449827	FALSE	FALSE
YOL036W	YOL036W	31.68409782	46.81490599	35.67586191	25.31208764	0.888110227	1.849507897	FALSE	0.577652826	FALSE	FALSE
YOL037C	YOL037C	6.998530217	12.31646397	2.608623999	3.066820119	2.682843606	4.016037292	FALSE	0.45227797	FALSE	FALSE
YOL038W	PRE6	610.0829473	444.3791909	432.0506725	959.7321686	1.412063413	0.46302417	FALSE	0.577652826	FALSE	FALSE

YOL039W	RPP2A	382.2682618	172.4584003	1065.406812	803.0264273	0.358800279	0.214760554	FALSE	0.383044983	FALSE	FALSE
YOL040C	RPS15	228.1129325	97.32068414	3502.181376	1700.410842	0.065134528	0.057233629	FALSE	0.383044983	FALSE	FALSE
YOL041C	NOP12	120.7058522	115.4631986	62.5297751	16.23917546	1.930374003	7.110163868	FALSE	0.847303922	FALSE	FALSE
YOL043C	NTG2	60.30816204	53.28807818	4.229988451	1.811807544	14.25728764	29.41155552	FALSE	0.831920415	FALSE	FALSE
YOL048C	RRT8	145.2384056	250.7622924	5.566412454	1	26.09192308	250.7622924	TRUE	0.99550173	TRUE	FALSE
YOL049W	GSH2	137.7858647	96.85371112	21.52172997	10.28487563	6.402174217	9.417100857	FALSE	0.462889273	FALSE	FALSE
YOL051W	GAL11	22.49315589	20.18870787	52.13702429	46.46963224	0.431423853	0.434449487	FALSE	0.383044983	FALSE	FALSE
YOL052C	SPE2	22.75948158	31.17237709	116.9189044	88.47514419	0.194660408	0.352329204	FALSE	0.383044983	FALSE	FALSE
YOL052C-A	DDR2	252.2923664	521.3849351	12.02711962	433.1064836	20.97695661	1.203826207	TRUE	0.996828143	FALSE	TRUE
YOL053W	AIM39	72.43769861	47.71074679	18.80795153	15.17661174	3.851440094	3.143702139	FALSE	0.383044983	FALSE	FALSE
YOL054W	PSH1	49.05545866	52.37271165	127.4035526	80.20038812	0.385039959	0.65302317	FALSE	0.383044983	FALSE	FALSE
YOL056W	GPM3	144.2959344	144.2912059	21.95099185	12.87630879	6.573549631	11.20594483	FALSE	0.516133218	FALSE	FALSE
YOL057W	YOL057W	64.67974093	52.94779505	9.550116437	1	6.772665166	52.94779505	TRUE	0.987586505	TRUE	FALSE
YOL058W	ARG1	126.4644287	109.7355894	47.0525901	48.6929638	2.687725126	2.253623128	FALSE	0.383044983	FALSE	FALSE
YOL059W	GPD2	30.07211584	39.14727942	84.32124834	180.9313129	0.35663746	0.216365419	FALSE	0.383044983	FALSE	FALSE
YOL060C	MAM3	22.94916989	38.12291638	58.07164221	68.75920962	0.395187204	0.554440875	FALSE	0.383044983	FALSE	FALSE
YOL061W	PR55	157.1699749	155.5159151	72.50289069	34.53959372	2.167775289	4.50254037	FALSE	0.749524221	FALSE	FALSE
YOL063C	CRT10	44.8256591	49.69518286	6.250709602	15.82302796	7.171291254	3.140687293	FALSE	0.791565744	FALSE	FALSE
YOL064C	MET22	139.2886904	91.15684582	101.279245	94.31078135	1.37529353	0.96655806	FALSE	0.383044983	FALSE	FALSE
YOL066C	RIB2	40.37228441	36.4525976	181.2093724	190.7339237	0.222793578	0.191117536	FALSE	0.383044983	FALSE	FALSE
YOL067C	RTG1	59.76735554	81.4010494	20.31965412	24.80599305	2.941356934	3.281507386	FALSE	0.383044983	FALSE	FALSE
YOL070C	NBA1	100.9300572	64.74507716	27.05094703	23.65715339	3.731109934	2.736807599	FALSE	0.383044983	FALSE	FALSE
YOL071W	SDH5	113.1003904	119.1530307	11.15336897	8.647377166	10.14046882	13.77909491	FALSE	0.456156286	FALSE	FALSE
YOL072W	THP1	31.37331316	36.70057445	4.282168313	4.828251421	7.326501637	7.601214446	FALSE	0.383044983	FALSE	FALSE
YOL073C	DSC2	46.02129468	59.58446205	47.19276849	66.59777578	0.975176836	0.894691472	FALSE	0.383044983	FALSE	FALSE
YOL075C	YOL075C	24.5516006	40.09573184	24.40719089	22.02090926	1.005916687	1.820802737	FALSE	0.383044983	FALSE	FALSE
YOL076W	MDM20	150.3359085	153.7279771	17.6467251	1	8.519195923	153.7279771	TRUE	0.999913495	TRUE	FALSE
YOL077C	BRX1	353.5216463	282.3430495	1.091453422	11.60327959	323.8998926	24.33303855	TRUE	0.999149366	FALSE	TRUE
YOL078W	AVO1	47.79385092	62.48763908	25.70548895	50.81475339	1.859285813	1.229714501	FALSE	0.383044983	FALSE	FALSE
YOL081W	IRA2	33.94153494	49.77455831	51.49870604	77.52168835	0.65907549	0.642072682	FALSE	0.383044983	FALSE	FALSE
YOL082W	ATG19	68.07931105	65.31996472	4.854879427	6.097265749	14.02286341	10.71299291	FALSE	0.439359862	FALSE	FALSE
YOL084W	PHM7	21.98743643	32.32018331	1.058350653	18.89007579	20.7751905	1.710961018	TRUE	0.996164937	FALSE	TRUE
YOL085C	YOL085C	11.29226212	40.56379282	1	6.39029475	11.29226212	6.347718596	FALSE	0.520025952	FALSE	FALSE
YOL086C	ADH1	813.2296831	1595.055339	3202.665619	5831.217995	0.253922757	0.273537251	FALSE	0.383044983	FALSE	FALSE
YOL086W-A	MHF1	680.3593781	329.095261	67.64659927	62.51396746	10.05755478	5.264347703	FALSE	0.521583045	FALSE	FALSE
YOL087C	DUF1	42.90262294	49.7182715	11.10305429	5.057310896	3.864037933	9.83096996	FALSE	0.814504037	FALSE	FALSE
YOL088C	MPD2	173.6053096	182.1827077	12.52853056	1	13.85679739	182.1827077	TRUE	0.999149366	TRUE	FALSE
YOL089C	HAL9	36.65733258	61.68259497	21.64038118	5.828575454	1.693931926	10.58279085	TRUE	0.964085928	TRUE	FALSE
YOL090W	MSH2	115.8321809	96.43313635	23.72735332	25.00878651	4.881799471	3.855970233	FALSE	0.415383506	FALSE	FALSE
YOL091W	SPO21	18.07739927	19.56561772	5.094025918	1	3.548745051	19.56561772	TRUE	0.961260092	TRUE	FALSE
YOL092W	YPQ1	83.87178237	80.52747404	104.421765	50.45094233	0.803202114	1.596154013	FALSE	0.383044983	FALSE	FALSE
YOL093W	TRM10	73.52797553	39.84633798	75.19435218	35.9230318	0.977839072	1.109214228	FALSE	0.383044983	FALSE	FALSE
YOL094C	RFC4	103.7530834	111.8687881	21.01491727	4.913304334	4.937115959	22.76854444	TRUE	0.955651672	TRUE	FALSE
YOL096C	COQ3	72.63424783	61.91023422	18.35083382	28.48953878	3.958089782	2.173086574	FALSE	0.45227797	FALSE	FALSE

YOL097C	WRS1	210.6356985	174.1285454	85.14862834	32.76505265	2.473741535	5.314459502	FALSE	0.749524221	FALSE	FALSE
YOL097W-A	YOL097W-A	94.02199988	68.90236881	1.349226368	3.164731698	69.68586008	21.77194637	FALSE	0.888538062	FALSE	FALSE
YOL098C	YOL098C	82.60137642	95.71849244	40.31438592	5.980313722	2.048930538	16.00559718	TRUE	0.980334487	TRUE	FALSE
YOL100W	PKH2	24.62574053	40.98796134	11.94773722	1	2.061121707	40.98796134	TRUE	0.999610727	TRUE	FALSE
YOL101C	IZH4	39.80915506	27.01537493	3.97914789	1.345055874	10.0044422	20.08494625	FALSE	0.825749712	FALSE	FALSE
YOL103W	ITR2	113.9194698	158.2576902	44.90574579	19.68932715	2.536857318	8.037739889	FALSE	0.844910611	FALSE	FALSE
YOL105C	WSC3	19.53586975	26.48766774	65.70568409	24.4066212	0.297323893	1.085265655	FALSE	0.577652826	FALSE	FALSE
YOL108C	INO4	245.446905	150.3757748	5.963332224	8.078561278	41.15935449	18.61417765	FALSE	0.83744233	FALSE	FALSE
YOL109W	ZEO1	3312.680971	2999.402737	232.6190709	93.33633418	14.24079702	32.13542468	FALSE	0.837197232	FALSE	FALSE
YOL110W	SHR5	43.06707992	72.72265089	14.29279907	24.54974136	3.013201242	2.962257313	FALSE	0.383044983	FALSE	FALSE
YOL111C	MDY2	47.66576974	55.82622593	45.9101596	28.51760503	1.038240123	1.957605692	FALSE	0.383044983	FALSE	FALSE
YOL112W	MSB4	113.118828	106.3051122	16.65209858	13.28353332	6.793067399	8.002773785	FALSE	0.402436563	FALSE	FALSE
YOL113W	SKM1	48.09669605	83.78472607	10.38009962	5.541959574	4.6335486	15.11824923	FALSE	0.875965975	FALSE	FALSE
YOL116W	MSN1	52.19284776	73.13284183	7.972671968	8.145661524	6.546468733	8.978134141	FALSE	0.446323529	FALSE	FALSE
YOL119C	MCH4	71.46389955	141.5092269	6.696719241	16.73365461	10.67147912	8.456564345	FALSE	0.42850346	FALSE	FALSE
YOL120C	RPL18A	614.1094688	428.631308	656.4993755	276.7108222	0.935430393	1.549022567	FALSE	0.383044983	FALSE	FALSE
YOL121C	RPS19A	1022.148824	759.3222301	52.6911426	6.449663507	19.39887377	117.7305187	TRUE	0.986000577	TRUE	FALSE
YOL122C	SMF1	79.7826727	92.51603143	4.725315381	15.65690116	16.88409477	5.908961838	FALSE	0.845833333	FALSE	FALSE
YOL123W	HRP1	96.97446642	56.38854617	55.0880084	37.8680125	1.760355279	1.489081218	FALSE	0.383044983	FALSE	FALSE
YOL125W	TRM13	110.9045665	126.8593441	4.990252625	1	22.2242389	126.8593441	TRUE	0.96588812	TRUE	FALSE
YOL126C	MDH2	134.4891847	66.06103401	46.86380022	15.37550083	2.869788282	4.296512663	FALSE	0.45227797	FALSE	FALSE
YOL127W	RPL25	1126.466841	681.8607427	109.689397	29.98059707	10.26960556	22.74340105	FALSE	0.831372549	FALSE	FALSE
YOL128C	YGK3	52.00175104	86.44156578	5.442109896	1.293758241	9.55543935	66.81431123	TRUE	0.987629758	TRUE	FALSE
YOL129W	VPS68	434.3138759	457.5470536	4.293847644	2.759438109	101.1479474	165.8116745	FALSE	0.538523645	FALSE	FALSE
YOL130W	ALR1	23.38523927	29.13854911	79.5645543	73.8600804	0.293915293	0.394510119	FALSE	0.383044983	FALSE	FALSE
YOL131W	YOL131W	10.25041069	17.37384992	1	5.220779284	10.25041069	3.327826935	FALSE	0.855204729	FALSE	FALSE
YOL135C	MED7	16.88250035	23.10655001	10.25474835	9.261555695	1.646310545	2.494888632	FALSE	0.383044983	FALSE	FALSE
YOL137W	BSC6	67.20936732	84.0133632	10.15407264	3.103464318	6.618956722	27.07083265	TRUE	0.956314879	TRUE	FALSE
YOL138C	RTC1	14.22590691	16.73677464	45.23294273	28.69488226	0.314503237	0.583266887	FALSE	0.383044983	FALSE	FALSE
YOL139C	CDC33	1033.645208	784.294706	6.327307472	1	163.3625697	784.294706	TRUE	0.959602076	TRUE	FALSE
YOL141W	PPM2	31.54780322	36.19435963	16.66775478	4.073417037	1.892744621	8.885503081	TRUE	0.923745675	TRUE	FALSE
YOL143C	RIB4	328.0446012	147.4067779	242.4648346	249.4036304	1.352957437	0.591037018	FALSE	0.577652826	FALSE	FALSE
YOL144W	NOP8	75.12067001	63.83629816	23.19195766	14.23057992	3.239082751	4.485853599	FALSE	0.428460208	FALSE	FALSE
YOL145C	CTR9	91.61330394	93.51497023	54.19232334	28.68325092	1.690521799	3.260263995	FALSE	0.45227797	FALSE	FALSE
YOL146W	PSF3	245.1322294	231.2700815	3.340632311	2.228572968	73.37899135	103.7749649	FALSE	0.489114764	FALSE	FALSE
YOL147C	PEX11	48.06560676	45.52729489	14.8455597	11.08323008	3.237709303	4.107764124	FALSE	0.383044983	FALSE	FALSE
YOL148C	SPT20	83.94765915	69.51877409	84.19248025	78.02176177	0.997092126	0.891017743	FALSE	0.383044983	FALSE	FALSE
YOL151W	GRE2	133.6249982	276.0567991	6.870368524	11.75364108	19.44946589	23.48691756	FALSE	0.424682814	FALSE	FALSE
YOL153C	YOL153C	26.33396821	57.6615211	2.512483571	5.552669998	10.48124991	10.38446749	FALSE	0.383044983	FALSE	FALSE
YOL154W	ZPS1	218.6983058	60.07150026	1.971251409	7.838429058	110.9438932	7.663716775	TRUE	0.999581892	FALSE	TRUE
YOL155C	HPF1	5.695874769	3.912705871	309.7417105	336.0433602	0.018389111	0.011643455	FALSE	0.383044983	FALSE	FALSE
YOL158C	ENB1	93.67477421	121.5290851	20.84495122	7.000401453	4.49388311	17.36030225	FALSE	0.883477509	FALSE	FALSE
YOL164W	BDS1	48.91590213	45.47013985	11.76258274	7.604465066	4.158602172	5.979400188	FALSE	0.428460208	FALSE	FALSE
YOR001W	RRP6	55.49411567	61.32095982	11.147606	8.442922385	4.978119579	7.263001722	FALSE	0.44994233	FALSE	FALSE

YOR002W	ALG6	82.80549158	94.62687563	7.264992428	16.7811512	11.3978772	5.638878674	FALSE	0.802321223	FALSE	FALSE
YOR003W	YSP3	40.05912973	49.74115435	1	7.513032729	40.05912973	6.62064923	TRUE	0.985495963	FALSE	TRUE
YOR004W	UTP23	152.6874262	107.942866	24.73068724	6.696334622	6.174006596	16.11969415	FALSE	0.83989331	FALSE	FALSE
YOR006C	TSR3	151.3809094	119.9197114	12.03770312	11.8248314	12.57556429	10.14134641	FALSE	0.41816609	FALSE	FALSE
YOR007C	SGT2	380.8545807	581.286332	242.0979348	318.0486132	1.573142626	1.827665042	FALSE	0.383044983	FALSE	FALSE
YOR008C	SLG1	50.8210823	57.98497093	238.9225559	213.6510225	0.212709437	0.27140039	FALSE	0.383044983	FALSE	FALSE
YOR009W	TIR4	2.588173904	3.068408684	3.377489458	1.933712623	0.766301105	1.586796635	FALSE	0.577652826	FALSE	FALSE
YOR013W	IRC11	9.746548077	19.3554622	4.07621404	1.86098063	2.391078579	10.40067902	TRUE	0.93755767	TRUE	FALSE
YOR014W	RTS1	36.88213476	41.07752951	303.4703038	352.0535949	0.121534576	0.116679762	FALSE	0.383044983	FALSE	FALSE
YOR015W	YOR015W	101.6090529	84.0443155	1.902176675	14.1262666	53.41725313	5.949506539	TRUE	0.995343137	FALSE	TRUE
YOR017W	PET127	41.93721599	60.09547247	5.609173734	1.848780681	7.47654075	32.50546325	TRUE	0.957742215	TRUE	FALSE
YOR018W	ROD1	43.62168262	80.88140919	13.60220144	16.890112	3.20695755	4.788684005	FALSE	0.45227797	FALSE	FALSE
YOR019W	YOR019W	22.12925456	28.9186469	1	3.791147562	22.12925456	7.627940202	FALSE	0.852378893	FALSE	FALSE
YOR020C	HSP10	1737.45919	2741.224215	4.942556827	4.740900106	351.5304428	578.2075459	FALSE	0.538884083	FALSE	FALSE
YOR023C	AHC1	40.43885662	56.08003123	35.71123532	41.83910243	1.132384703	1.340373669	FALSE	0.383044983	FALSE	FALSE
YOR025W	HST3	45.43347308	29.88475348	32.95423052	13.84992887	1.378684083	2.157755015	FALSE	0.383044983	FALSE	FALSE
YOR027W	STI1	223.6647922	567.8263116	133.2744599	719.9790708	1.678226963	0.78867058	FALSE	0.577652826	FALSE	FALSE
YOR030W	DFG16	38.74489912	58.24736332	9.644838678	1	4.017164041	58.24736332	TRUE	0.999466551	TRUE	FALSE
YOR032C	HMS1	7.76131796	13.97152903	8.605138532	6.540033806	0.90193992	2.136308381	FALSE	0.699437716	FALSE	FALSE
YOR033C	EXO1	78.70608805	101.5504373	30.99684993	24.33179906	2.539164084	4.173568796	FALSE	0.45227797	FALSE	FALSE
YOR034C	AKR2	27.49516683	38.63836478	21.96383564	4.716688898	1.251838125	8.191840848	TRUE	0.949380046	TRUE	FALSE
YOR036W	PEP12	157.1642253	187.7443919	11.87040291	12.63081337	13.24000764	14.86399857	FALSE	0.396957901	FALSE	FALSE
YOR039W	CKB2	222.3523492	248.7703803	4.51188218	5.073028665	49.2815061	49.03784243	FALSE	0.383044983	FALSE	FALSE
YOR040W	GLO4	55.45709043	97.62866099	4.307375838	3.858400116	12.87491329	25.3028867	FALSE	0.555536332	FALSE	FALSE
YOR042W	CUE5	70.68575473	57.40254897	83.61302443	85.8435108	0.845391674	0.668688273	FALSE	0.383044983	FALSE	FALSE
YOR043W	WHI2	141.3949942	164.135218	25.89344496	17.79705071	5.460648221	9.222607761	FALSE	0.504801038	FALSE	FALSE
YOR045W	TOM6	374.5209662	291.2368166	160.5745785	133.2545603	2.332380193	2.185567353	FALSE	0.383044983	FALSE	FALSE
YOR046C	DBP5	178.0691675	172.2419507	9.963218515	5.788321729	17.87265503	29.75680322	FALSE	0.542257785	FALSE	FALSE
YOR048C	RAT1	73.71125605	77.27894545	77.93250484	51.23766857	0.945834555	1.508244766	FALSE	0.383044983	FALSE	FALSE
YOR049C	RSB1	2.257852251	10.29683723	34.50454691	22.14473712	0.065436369	0.464978978	FALSE	0.383044983	FALSE	FALSE
YOR050C	YOR050C	1.675104596	4.176272265	12.21146938	12.72006455	0.137174696	0.328321625	FALSE	0.383044983	FALSE	FALSE
YOR051C	ETT1	163.7891316	140.4396801	28.62274147	5.170696651	5.722342555	27.16068831	TRUE	0.957482699	TRUE	FALSE
YOR052C	TMC1	773.7097352	965.9785636	26.34580112	101.5762076	29.36747802	9.509890026	FALSE	0.885640138	FALSE	FALSE
YOR054C	VHS3	107.4833966	143.0180608	11.3621642	9.929310354	9.459764413	14.40362479	FALSE	0.50239331	FALSE	FALSE
YOR056C	NOB1	125.4580511	113.1654235	189.192227	118.6200578	0.663124766	0.95401592	FALSE	0.383044983	FALSE	FALSE
YOR058C	ASE1	33.0341592	43.49390878	11.00274318	4.879404044	3.002356655	8.913774793	FALSE	0.816262976	FALSE	FALSE
YOR061W	CKA2	138.23308	139.5053601	40.73533557	38.45056555	3.393443998	3.628174464	FALSE	0.383044983	FALSE	FALSE
YOR062C	YOR062C	222.1226057	264.4078561	2.978170237	8.491036822	74.58358253	31.13964309	FALSE	0.84550173	FALSE	FALSE
YOR063W	RPL3	794.6514876	763.334113	871.2129303	374.8706288	0.91212086	2.036260123	FALSE	0.699437716	FALSE	FALSE
YOR064C	YNG1	173.9976828	188.3740394	12.24609269	6.542475656	14.20842445	28.79247082	FALSE	0.831055363	FALSE	FALSE
YOR065W	CYT1	98.40969321	76.28983928	43.6925432	50.68322619	2.252322387	1.505228554	FALSE	0.383044983	FALSE	FALSE
YOR066W	MSA1	26.98779626	23.69808522	323.6402199	384.9088642	0.083388265	0.061568042	FALSE	0.383044983	FALSE	FALSE
YOR069W	VPS5	58.49485072	62.28239499	4.503323495	11.49673025	12.98926244	5.417400742	FALSE	0.822231834	FALSE	FALSE
YOR070C	GYP1	34.33964421	36.8616428	32.68233517	15.3007358	1.050709627	2.40914184	FALSE	0.699437716	FALSE	FALSE

YOR071C	NRT1	14.92213376	21.61596439	84.39240441	102.9707501	0.176818446	0.209923346	FALSE	0.383044983	FALSE	FALSE
YOR072W	YOR072W	2.31323968	1	11.88130922	9.40611487	0.194695689	0.10631382	FALSE	0.383044983	FALSE	FALSE
YOR072W-A	YOR072W-A	6.438052602	12.20404644	4.43531567	1.773341038	1.451543268	6.881951179	TRUE	0.912312572	TRUE	FALSE
YOR077W	RTS2	51.80961918	41.39446767	7.807271967	23.82752362	6.636072036	1.737254292	FALSE	0.831055363	FALSE	FALSE
YOR078W	BUD21	356.0882811	188.2483419	33.15200605	15.78144213	10.74107795	11.92846258	FALSE	0.395040369	FALSE	FALSE
YOR079C	ATX2	142.562604	198.8843869	4.875689741	1	29.23947412	198.8843869	TRUE	0.986072664	TRUE	FALSE
YOR081C	TGL5	27.46278148	23.37092581	31.59721339	36.78591222	0.869152008	0.63532272	FALSE	0.383044983	FALSE	FALSE
YOR082C	YOR082C	4.261230989	9.658045909	3.262366461	3.718393571	1.306177905	2.597370538	FALSE	0.45227797	FALSE	FALSE
YOR083W	WHI5	19.44762481	13.53953625	32.20059002	34.13614309	0.603952437	0.396633451	FALSE	0.383044983	FALSE	FALSE
YOR084W	LPX1	19.21837141	18.95565753	36.35661819	51.10684187	0.528607235	0.370902541	FALSE	0.383044983	FALSE	FALSE
YOR085W	OST3	33.3541482	30.48970801	21.34499953	6.760985802	1.562621173	4.509654198	FALSE	0.749524221	FALSE	FALSE
YOR086C	TCB1	72.62149962	62.55484603	821.3607771	697.6223887	0.088416079	0.089668633	FALSE	0.383044983	FALSE	FALSE
YOR087W	YVC1	46.96116086	48.73141365	5.934190679	1	7.913658897	48.73141365	TRUE	0.985769896	TRUE	FALSE
YOR089C	VPS21	355.1261437	342.3067797	54.72996749	27.19664427	6.488696412	12.58636089	FALSE	0.537802768	FALSE	FALSE
YOR090C	PTC5	40.31213756	45.34730665	29.01769278	20.08579043	1.389226148	2.257680961	FALSE	0.383044983	FALSE	FALSE
YOR091W	TMA46	48.85883115	43.65883366	196.7093188	153.8390114	0.248380867	0.283795594	FALSE	0.383044983	FALSE	FALSE
YOR092W	ECM3	23.06269821	28.11718277	100.0923572	94.46935176	0.230414178	0.297632854	FALSE	0.383044983	FALSE	FALSE
YOR096W	RPS7A	1213.560658	703.4981319	64.15104049	27.44077394	18.91724046	25.63696394	FALSE	0.468367935	FALSE	FALSE
YOR097C	YOR097C	170.9891569	200.6854139	3.837478786	1	44.55768134	200.6854139	TRUE	0.959602076	TRUE	FALSE
YOR098C	NUP1	32.29514561	36.68012845	128.6106507	88.50589492	0.251107863	0.414437123	FALSE	0.383044983	FALSE	FALSE
YOR099W	KTR1	137.65831	139.0523288	94.94407967	54.06214786	1.449888297	2.572082951	FALSE	0.45227797	FALSE	FALSE
YOR100C	CRC1	12.66287148	66.73238599	1	3.501661709	12.66287148	19.05734806	FALSE	0.512658593	FALSE	FALSE
YOR101W	RAS1	135.1566248	106.6921216	5.770831117	6.196941692	23.42065156	17.21689938	FALSE	0.468367935	FALSE	FALSE
YOR104W	PIN2	66.94499285	91.50503651	2.680316212	4.052322864	24.97652798	22.58088498	FALSE	0.39888985	FALSE	FALSE
YOR106W	VAM3	52.42664506	46.83200064	9.781078736	16.34045295	5.360006445	2.866016064	FALSE	0.487600923	FALSE	FALSE
YOR107W	RGS2	18.72604831	30.6864158	16.85907746	6.452174668	1.110739799	4.755980329	FALSE	0.873241061	FALSE	FALSE
YOR108W	LEU9	88.84560961	83.49532343	61.10078072	24.82229006	1.45408305	3.363723623	FALSE	0.699437716	FALSE	FALSE
YOR109W	INP53	41.47546884	59.66161977	49.65642729	57.41015441	0.83524875	1.039217197	FALSE	0.383044983	FALSE	FALSE
YOR110W	TFC7	87.01707336	87.67733566	53.86062204	80.0812019	1.615597259	1.094855392	FALSE	0.383044983	FALSE	FALSE
YOR112W	CEX1	26.99842138	36.93175917	30.24226149	30.53725202	0.892738177	1.209400216	FALSE	0.383044983	FALSE	FALSE
YOR113W	AZF1	21.97956915	28.34968964	441.1255495	572.5193216	0.049826108	0.049517437	FALSE	0.383044983	FALSE	FALSE
YOR116C	RPO31	49.20978045	58.23861178	27.05373656	12.78944461	1.818964281	4.553646665	FALSE	0.749524221	FALSE	FALSE
YOR117W	RPT5	692.432403	721.1536326	51.91043421	68.35720624	13.33898307	10.54978213	FALSE	0.42850346	FALSE	FALSE
YOR119C	RIO1	81.03016272	89.89748959	161.2743689	80.50221589	0.502436706	1.116708262	FALSE	0.577652826	FALSE	FALSE
YOR120W	GCY1	147.3637144	242.9976693	1	6.722989614	147.3637144	36.14428748	TRUE	0.958924452	FALSE	TRUE
YOR122C	PFY1	864.8419939	795.1598477	20.07288236	1.639104067	43.08509253	485.1185864	TRUE	0.998168973	TRUE	FALSE
YOR123C	LEO1	61.7933477	48.01855806	109.4068691	68.22827214	0.564803181	0.703792674	FALSE	0.383044983	FALSE	FALSE
YOR124C	UBP2	54.53103657	69.6417185	1.607473246	14.97081582	33.92344892	4.651831894	TRUE	0.986966551	FALSE	TRUE
YOR125C	CAT5	90.82431435	67.37849053	13.38676108	12.76245601	6.784636984	5.279429797	FALSE	0.415383506	FALSE	FALSE
YOR127W	RGA1	36.93954613	49.80792247	4.614319442	1	8.00541588	49.80792247	TRUE	0.985813149	TRUE	FALSE
YOR128C	ADE2	198.6858546	286.0334981	44.84222444	26.99218747	4.430776062	10.59689951	FALSE	0.815325836	FALSE	FALSE
YOR130C	ORT1	194.3950308	159.7790197	8.956000795	6.415016912	21.70556203	24.90703016	FALSE	0.408405421	FALSE	FALSE
YOR132W	VPS17	37.79758205	37.7377646	62.54031596	56.60435875	0.60437146	0.666693616	FALSE	0.383044983	FALSE	FALSE
YOR133W	EFT1	113.2911191	78.15524467	29.29242553	18.86772342	3.867590924	4.142272118	FALSE	0.383044983	FALSE	FALSE

YOR134W	BAG7	6.753531455	13.10479049	1	23.73704448	6.753531455	0.55208181	TRUE	0.961115917	FALSE	TRUE
YOR136W	IDH2	189.7169137	299.000572	1	7.330264517	189.7169137	40.78987481	TRUE	0.959602076	FALSE	TRUE
YOR137C	SIA1	62.61342009	66.37914493	9.093510855	9.959675743	6.88550562	6.664789763	FALSE	0.383044983	FALSE	FALSE
YOR138C	RUP1	66.21648583	66.91301164	56.03248754	83.47681385	1.181751672	0.801576013	FALSE	0.383044983	FALSE	FALSE
YOR140W	SFL1	11.62199362	14.24001429	85.47373312	76.11925249	0.135971522	0.187075067	FALSE	0.383044983	FALSE	FALSE
YOR141C	ARP8	34.67105663	48.83423376	23.117115	22.22458898	1.499800327	2.197306497	FALSE	0.383044983	FALSE	FALSE
YOR142W	LSC1	132.9271638	65.26029421	585.2919536	543.5881266	0.227112577	0.120054672	FALSE	0.383044983	FALSE	FALSE
YOR145C	PNO1	286.1687778	267.1267994	9.451689107	1.862185316	30.2769986	143.4480216	TRUE	0.959587659	TRUE	FALSE
YOR147W	MDM32	176.7289124	254.6301172	7.534681055	1	23.45539394	254.6301172	TRUE	0.998039216	TRUE	FALSE
YOR148C	SPP2	473.8969966	421.4646615	4.358832834	5.081820493	108.7210762	82.93576328	FALSE	0.458967705	FALSE	FALSE
YOR150W	MRPL23	185.4259075	182.8762771	17.93310468	11.18693306	10.33986646	16.34731129	FALSE	0.514850058	FALSE	FALSE
YOR151C	RPB2	172.4817598	187.8470219	128.1273234	108.0971039	1.346174689	1.737761837	FALSE	0.383044983	FALSE	FALSE
YOR152C	YOR152C	36.95332881	33.24472269	2.335557673	4.175058192	15.82205793	7.962696846	FALSE	0.543137255	FALSE	FALSE
YOR153W	PDR5	74.66623633	106.6064306	789.5995308	566.2568895	0.094562159	0.188265136	FALSE	0.383044983	FALSE	FALSE
YOR154W	SLP1	91.3316595	90.77774742	17.45853601	10.64088738	5.231346973	8.53103169	FALSE	0.496568627	FALSE	FALSE
YOR155C	ISN1	150.7965556	149.0157249	6.972903771	3.449779123	21.62607725	43.19572924	FALSE	0.834529988	FALSE	FALSE
YOR156C	NFI1	19.67844677	24.53435926	54.09971511	47.78209626	0.363744	0.513463435	FALSE	0.383044983	FALSE	FALSE
YOR157C	PUP1	488.1906932	438.8940453	22.5308959	37.76668411	21.66761123	11.62119618	FALSE	0.551412918	FALSE	FALSE
YOR159C	SME1	409.0781749	362.9879974	125.8291248	72.77692117	3.251061115	4.987680044	FALSE	0.45227797	FALSE	FALSE
YOR160W	MTR10	46.60595484	65.63103756	9.928221416	2.048410161	4.694290436	32.03998829	TRUE	0.985034602	TRUE	FALSE
YOR161C	PNS1	45.11459942	45.10092816	20.85419497	77.4079291	2.163334498	0.582639643	FALSE	0.699437716	FALSE	FALSE
YOR163W	DDP1	63.99963114	56.1577044	21.60349224	22.07319179	2.962466921	2.544158767	FALSE	0.383044983	FALSE	FALSE
YOR167C	RPS28A	1804.888251	1093.893004	52.20705104	4.949120411	34.57173342	221.0277612	TRUE	0.986029412	TRUE	FALSE
YOR168W	GLN4	246.6384714	218.3548252	19.35183228	5.617104022	12.74496739	38.87320305	FALSE	0.887456747	FALSE	FALSE
YOR172W	YRM1	84.16283147	113.2075153	6.846636437	5.308254452	12.29258078	21.32669342	FALSE	0.540311419	FALSE	FALSE
YOR173W	DCS2	171.2581512	170.8131821	2.322351933	14.28402185	73.74341018	11.95833946	TRUE	0.985914072	FALSE	TRUE
YOR174W	MED4	119.3996923	102.1434935	4.718752691	2.497002963	25.30323162	40.90643665	FALSE	0.532987313	FALSE	FALSE
YOR175C	ALE1	66.95149908	69.04443555	5.661438012	2.33966873	11.82588221	29.51034676	FALSE	0.851081315	FALSE	FALSE
YOR176W	HEM15	57.14700107	49.07071731	39.21465607	38.30716542	1.457286811	1.280980119	FALSE	0.383044983	FALSE	FALSE
YOR181W	LAS17	35.16927015	43.13764682	153.6740984	265.7565296	0.2288562	0.162320177	FALSE	0.383044983	FALSE	FALSE
YOR182C	RPS30B	795.085779	562.2069249	212.8080964	40.56031507	3.736163203	13.86100981	FALSE	0.879368512	FALSE	FALSE
YOR184W	SER1	241.7247843	269.3599737	18.4377035	5.867204805	13.11035207	45.9094207	FALSE	0.891262976	FALSE	FALSE
YOR185C	GSP2	119.027172	97.04893986	51.89265858	226.9622305	2.293718905	0.427599516	FALSE	0.752926759	FALSE	FALSE
YOR187W	TUF1	393.7260688	336.5392403	113.5551878	78.35792529	3.467266236	4.294897281	FALSE	0.383044983	FALSE	FALSE
YOR188W	MSB1	21.40763066	18.45993745	13.83208415	7.814223486	1.547679325	2.362350844	FALSE	0.383044983	FALSE	FALSE
YOR189W	IES4	231.679851	172.3985959	18.22425634	1.700062482	12.71271906	101.4072116	TRUE	0.995112457	TRUE	FALSE
YOR191W	ULS1	31.83060637	32.89458895	32.9721436	13.61615539	0.965378738	2.415849996	FALSE	0.699437716	FALSE	FALSE
YOR192C	THI72	6.153217548	9.909155102	2.470628241	4.059793864	2.490547727	2.440802522	FALSE	0.383044983	FALSE	FALSE
YOR194C	TOA1	306.1093142	242.9143248	79.19750757	41.21680153	3.86513823	5.893575334	FALSE	0.479368512	FALSE	FALSE
YOR195W	SLK19	160.124308	189.6107051	24.2105177	11.76789916	6.613832467	16.11253653	FALSE	0.830867935	FALSE	FALSE
YOR196C	LIP5	104.1208689	112.2772273	75.73675807	64.28593791	1.374773248	1.746528571	FALSE	0.383044983	FALSE	FALSE
YOR197W	MCA1	141.3026164	117.5774524	802.395235	614.1245782	0.176101016	0.191455377	FALSE	0.383044983	FALSE	FALSE
YOR198C	BFR1	164.1442462	109.4939431	4.974876023	2.842904409	32.99464055	38.51481703	FALSE	0.417070358	FALSE	FALSE
YOR201C	MRM1	235.4799579	236.8386708	51.99980249	46.37379167	4.528477929	5.107166403	FALSE	0.383044983	FALSE	FALSE

YOR202W	HIS3	34.83990169	21.32286769	69.62070261	78.29075484	0.500424448	0.272354861	FALSE	0.383044983	FALSE	FALSE
YOR204W	DED1	143.1646832	284.2626312	546.9251981	483.1351095	0.261762822	0.588370883	FALSE	0.383044983	FALSE	FALSE
YOR205C	GEP3	68.46275784	80.25367986	9.007992226	2.096097174	7.600223904	38.28719434	TRUE	0.96495098	TRUE	FALSE
YOR206W	NOC2	172.3461166	152.4390105	74.7307929	21.91196031	2.306226255	6.956886027	FALSE	0.831055363	FALSE	FALSE
YOR207C	RET1	90.31290012	107.2295045	25.0484288	16.03714395	3.605531542	6.686321757	FALSE	0.508693772	FALSE	FALSE
YOR208W	PTP2	36.70843393	85.09059952	5.024254501	1	7.306244922	85.09059952	TRUE	0.998111303	TRUE	FALSE
YOR209C	NPT1	202.220185	204.2258943	15.5057454	5.961288642	13.0416294	34.25868241	FALSE	0.853416955	FALSE	FALSE
YOR211C	MGM1	60.66746446	51.43073699	16.39705934	12.95985687	3.69989906	3.968464893	FALSE	0.383044983	FALSE	FALSE
YOR212W	STE4	284.1356663	239.9386613	21.47710008	19.57671713	13.22970351	12.25632774	FALSE	0.383044983	FALSE	FALSE
YOR213C	SAS5	150.9040512	136.3669537	4.264331278	3.055062778	35.38750658	44.6363835	FALSE	0.446943483	FALSE	FALSE
YOR216C	RUD3	58.74436395	56.11782683	48.91624802	46.55429579	1.200917207	1.205427467	FALSE	0.383044983	FALSE	FALSE
YOR217W	RFC1	59.11642332	58.44843226	44.65915968	18.08691833	1.323724489	3.231530722	FALSE	0.699437716	FALSE	FALSE
YOR219C	STE13	35.57350613	46.40338727	42.46483757	14.47088916	0.837716759	3.206671461	FALSE	0.774048443	FALSE	FALSE
YOR222W	ODC2	109.142854	57.05271119	144.3447746	129.185284	0.756126117	0.441634755	FALSE	0.383044983	FALSE	FALSE
YOR223W	DSC3	150.5421645	197.9576378	68.60474301	88.30804434	2.194340478	2.241671631	FALSE	0.383044983	FALSE	FALSE
YOR224C	RPB8	388.128572	320.8678795	144.7270513	128.5035115	2.681797	2.496958066	FALSE	0.383044983	FALSE	FALSE
YOR226C	ISU2	103.9631795	117.254829	52.85228901	19.57448019	1.967051597	5.990188646	FALSE	0.831055363	FALSE	FALSE
YOR227W	HER1	50.75956484	68.26836608	56.62911967	92.50740905	0.896350943	0.73797728	FALSE	0.383044983	FALSE	FALSE
YOR228C	MCP1	63.24763738	77.18021796	4.418486176	1.079829713	14.31432279	71.47443436	TRUE	0.965542099	TRUE	FALSE
YOR229W	WTM2	34.04614298	28.88993938	62.36389216	33.81144601	0.545927167	0.854442586	FALSE	0.383044983	FALSE	FALSE
YOR230W	WTM1	152.8877143	149.0143872	61.92699208	55.66339594	2.468838049	2.677062452	FALSE	0.383044983	FALSE	FALSE
YOR231W	MKK1	75.30072348	102.8769737	34.69196187	8.066963152	2.170552468	12.75287513	TRUE	0.952523068	TRUE	FALSE
YOR232W	MGE1	492.4624639	352.7101496	7.842285638	6.962487713	62.79578259	50.65863871	FALSE	0.436361015	FALSE	FALSE
YOR233W	KIN4	35.78157257	32.1645484	58.00321643	32.96532384	0.616889455	0.975708552	FALSE	0.383044983	FALSE	FALSE
YOR234C	RPL33B	725.5219229	567.2277674	198.2979259	42.06180299	3.658746906	13.48557901	FALSE	0.875807382	FALSE	FALSE
YOR236W	DFR1	36.77723745	24.09773568	14.12612966	4.721643446	2.60349001	5.103675437	FALSE	0.487600923	FALSE	FALSE
YOR237W	HES1	18.70533465	18.83119131	8.487069088	1	2.203980486	18.83119131	TRUE	0.990556517	TRUE	FALSE
YOR239W	ABP140	45.21850315	40.74989062	116.9523493	33.82305994	0.3866404	1.204796097	FALSE	0.577652826	FALSE	FALSE
YOR243C	PUS7	133.1411237	120.4776317	7.279157082	1.605272169	18.29073369	75.05121811	TRUE	0.958823529	TRUE	FALSE
YOR246C	ENV9	375.0488339	369.8885691	30.99037891	22.98438872	12.10210546	16.09303487	FALSE	0.439359862	FALSE	FALSE
YOR247W	SRL1	17.03684579	9.601287724	828.226157	322.9186523	0.020570282	0.029732837	FALSE	0.383044983	FALSE	FALSE
YOR250C	CLP1	32.45796842	41.37454896	9.048158368	2.87301062	3.587245835	14.40111243	TRUE	0.945775663	TRUE	FALSE
YOR251C	TUM1	124.5508919	112.195461	35.04441015	21.85747184	3.554087267	5.133048409	FALSE	0.428460208	FALSE	FALSE
YOR252W	TMA16	139.3565368	104.0738078	6.905383368	1.512753348	20.18085447	68.79760531	FALSE	0.889230104	FALSE	FALSE
YOR254C	SEC63	235.7570967	233.932999	17.29491802	7.818277365	13.6315822	29.92129699	FALSE	0.833924452	FALSE	FALSE
YOR256C	TRE2	71.8175245	82.75299899	8.554434125	17.24937039	8.395356543	4.797450407	FALSE	0.508693772	FALSE	FALSE
YOR257W	CDC31	131.7904051	130.4909314	8.505406835	5.048038291	15.49489726	25.84982995	FALSE	0.54094579	FALSE	FALSE
YOR259C	RPT4	308.1045124	290.9903081	142.4368439	124.6700423	2.163095615	2.334083656	FALSE	0.383044983	FALSE	FALSE
YOR262W	GPN2	158.3671803	175.6565426	38.06575042	40.200054	4.160358815	4.369559865	FALSE	0.383044983	FALSE	FALSE
YOR265W	RBL2	157.3111077	137.0612108	75.72081624	25.7329307	2.077514686	5.326296192	FALSE	0.783708189	FALSE	FALSE
YOR266W	PNT1	117.8933874	112.9062012	1.787576459	3.088103387	65.95152156	36.56166491	FALSE	0.558607266	FALSE	FALSE
YOR267C	HRK1	29.49837152	50.53089619	4.174793043	3.009817053	7.065828465	16.78869356	FALSE	0.830348904	FALSE	FALSE
YOR269W	PAC1	58.14643377	58.8988613	3.648912183	1	15.93527902	58.8988613	FALSE	0.892142445	FALSE	FALSE
YOR270C	VPH1	220.189611	211.9294528	10.2837245	3.21688132	21.41146538	65.88040766	FALSE	0.888408304	FALSE	FALSE

YOR271C	FSF1	95.97123647	72.23747215	68.08121999	32.99090595	1.409658001	2.189617717	FALSE	0.383044983	FALSE	FALSE
YOR272W	YTM1	186.46167	141.1021652	109.4836023	23.66072535	1.703101341	5.96356042	FALSE	0.831055363	FALSE	FALSE
YOR273C	TPO4	65.50674184	124.6484965	171.4124558	257.3010878	0.382158587	0.484446053	FALSE	0.383044983	FALSE	FALSE
YOR275C	RIM20	30.08609311	40.1156128	22.36762611	4.75848355	1.345073141	8.4303355	TRUE	0.957900807	TRUE	FALSE
YOR278W	HEM4	110.2686154	104.676421	1.665442725	4.366760856	66.20979137	23.97118242	FALSE	0.857857555	FALSE	FALSE
YOR279C	RFM1	135.7373341	126.0328409	6.584237494	1.995445914	20.61549788	63.16023904	FALSE	0.888379469	FALSE	FALSE
YOR285W	RDL1	1019.61822	955.6829587	6.647871753	4.674368458	153.3751338	204.4517815	FALSE	0.459962514	FALSE	FALSE
YOR287C	RRP36	275.9748734	229.8602092	16.37860869	10.99908594	16.84971408	20.89811921	FALSE	0.427739331	FALSE	FALSE
YOR290C	SNF2	40.52445675	45.61726332	51.63190669	30.98608681	0.784872366	1.472185358	FALSE	0.383044983	FALSE	FALSE
YOR291W	YPK9	39.62424099	42.96433848	44.38681851	78.7925062	0.892702886	0.545284578	FALSE	0.383044983	FALSE	FALSE
YOR293W	RPS10A	737.6070241	439.1604588	22.07300486	7.150723578	33.41670192	61.41482803	FALSE	0.56016436	FALSE	FALSE
YOR294W	RRS1	115.1347014	80.30949233	77.73227289	32.33700982	1.481169881	2.483516342	FALSE	0.45227797	FALSE	FALSE
YOR296W	YOR296W	23.38523927	28.26797735	3.044435983	1	7.681304321	28.26797735	FALSE	0.889749135	FALSE	FALSE
YOR298C-A	MBF1	723.5570219	1833.773177	304.6174416	472.4680947	2.375297416	3.881263512	FALSE	0.45227797	FALSE	FALSE
YOR299W	BUD7	54.26823128	67.15173382	95.5731636	126.2502166	0.567818719	0.531894009	FALSE	0.383044983	FALSE	FALSE
YOR301W	RAX1	28.41146441	21.41428014	228.0393826	131.7879175	0.124590165	0.162490466	FALSE	0.383044983	FALSE	FALSE
YOR303W	CPA1	114.1347966	185.3557168	37.77030354	36.42705145	3.021813063	5.088408461	FALSE	0.487600923	FALSE	FALSE
YOR304C-A	BIL1	347.9322773	202.4727796	3.456146361	1	100.6705854	202.4727796	FALSE	0.836519608	FALSE	FALSE
YOR304W	ISW2	53.75651229	52.33023925	16.39478146	8.872573234	3.278879467	5.89797772	FALSE	0.487600923	FALSE	FALSE
YOR305W	RRG7	267.179183	268.4125964	4.876907726	9.953754624	54.78454751	26.96596476	FALSE	0.835582468	FALSE	FALSE
YOR306C	MCH5	12.84246857	75.6791156	10.38934723	7.976858006	1.236118909	9.487333927	TRUE	0.965743945	TRUE	FALSE
YOR307C	SLY41	87.25855977	95.9388585	18.32975125	17.65549069	4.76048794	5.433938946	FALSE	0.383044983	FALSE	FALSE
YOR310C	NOP58	91.7005257	99.69366982	581.6389808	111.6934726	0.157658838	0.89256487	FALSE	0.577652826	FALSE	FALSE
YOR311C	DGK1	103.5830572	131.9707255	13.18079537	5.67077701	7.858634802	23.27207104	FALSE	0.853316032	FALSE	FALSE
YOR312C	RPL20B	394.5210217	220.4580172	22.91765257	6.663334988	17.21472217	33.08523698	FALSE	0.558391003	FALSE	FALSE
YOR315W	SFG1	70.90712926	27.1605404	100.811034	11.50811527	0.703366749	2.360120643	FALSE	0.699437716	FALSE	FALSE
YOR316C	COT1	78.44248327	101.6939554	6.356790923	5.34307923	12.33995018	19.03283687	FALSE	0.513062284	FALSE	FALSE
YOR317W	FAA1	228.2335986	305.8346301	10.52155896	9.380249606	21.69199445	32.60410362	FALSE	0.521640715	FALSE	FALSE
YOR318C	YOR318C	109.5387025	116.5782953	3.146768304	1	34.80990397	116.5782953	FALSE	0.889258939	FALSE	FALSE
YOR320C	GNT1	108.0663769	121.4699501	1.405728464	4.132985419	76.87571223	29.39036502	FALSE	0.855348904	FALSE	FALSE
YOR321W	PMT3	41.26555744	45.15046799	6.492114354	3.164731698	6.356258561	14.26676012	FALSE	0.818497693	FALSE	FALSE
YOR322C	LDB19	32.94883698	43.28785705	100.5066944	87.72596715	0.327827287	0.493444056	FALSE	0.383044983	FALSE	FALSE
YOR323C	PRO2	185.4894268	136.4586786	58.05640299	28.37803926	3.194986552	4.808601374	FALSE	0.45227797	FALSE	FALSE
YOR324C	FRT1	61.10520437	66.17058797	4.832051309	1.282589485	12.64581033	51.59140064	TRUE	0.958621684	TRUE	FALSE
YOR326W	MYO2	73.46849223	71.33193556	37.44213643	40.99103922	1.962187504	1.740183633	FALSE	0.383044983	FALSE	FALSE
YOR327C	SNC2	271.5763326	290.0610919	17.80607262	26.70388698	15.25189402	10.86213	FALSE	0.467949827	FALSE	FALSE
YOR328W	PDR10	15.17869538	17.89768589	6.392256745	11.43885405	2.374544075	1.564639763	FALSE	0.383044983	FALSE	FALSE
YOR329C	SCD5	19.42008432	30.06672491	90.75042028	91.64512012	0.213994428	0.328077751	FALSE	0.383044983	FALSE	FALSE
YOR330C	MIP1	27.94688448	38.77686193	48.69243828	54.42458014	0.573947115	0.712488031	FALSE	0.383044983	FALSE	FALSE
YOR332W	VMA4	431.9085394	316.5659807	104.1532216	64.78956795	4.146857226	4.886064079	FALSE	0.383044983	FALSE	FALSE
YOR334W	MRS2	65.44110852	67.51035606	3.369832376	2.676346367	19.4196925	25.22482026	FALSE	0.447044406	FALSE	FALSE
YOR335C	ALA1	93.23031308	90.60717422	82.9367959	27.00535325	1.12411279	3.355156046	FALSE	0.774048443	FALSE	FALSE
YOR336W	KRE5	22.91987002	40.23629597	15.97085694	20.16373698	1.435105837	1.995478121	FALSE	0.383044983	FALSE	FALSE
YOR337W	TEA1	33.87678636	42.64993073	8.314850176	10.93570541	4.074250966	3.90006215	FALSE	0.383044983	FALSE	FALSE

YOR338W	YOR338W	24.95629731	56.86572525	3.267154426	15.96222406	7.63854231	3.562518922	FALSE	0.791565744	FALSE	FALSE
YOR341W	RPA190	89.5411316	79.77580724	117.9358	68.35300686	0.759236225	1.167114819	FALSE	0.383044983	FALSE	FALSE
YOR342C	YOR342C	48.72983963	50.64679274	6.362762019	6.110136612	7.658598496	8.288978784	FALSE	0.383044983	FALSE	FALSE
YOR344C	TYE7	108.7183039	121.7151928	94.42365293	48.65816681	1.151388456	2.501434	FALSE	0.699437716	FALSE	FALSE
YOR346W	REV1	43.45418392	46.49732009	2.834692109	3.757263516	15.3294193	12.37531514	FALSE	0.41816609	FALSE	FALSE
YOR347C	PYK2	60.36323661	57.85226647	87.10438072	273.0464512	0.692998861	0.211877013	FALSE	0.383044983	FALSE	FALSE
YOR348C	PUT4	8.199476954	12.06209963	7.077533976	36.96361053	1.158521737	0.326323632	FALSE	0.577652826	FALSE	FALSE
YOR353C	SOG2	48.33268967	61.89051419	109.2560229	111.742559	0.442380094	0.553866984	FALSE	0.383044983	FALSE	FALSE
YOR355W	GDS1	77.37189621	78.22906386	4.436813243	1	17.43861911	78.22906386	TRUE	0.959486736	TRUE	FALSE
YOR356W	CIR2	68.40893926	86.54831672	46.87151488	49.56864312	1.459499217	1.746029572	FALSE	0.383044983	FALSE	FALSE
YOR358W	HAP5	55.87473374	63.43309165	10.97612379	10.16945814	5.090570663	6.23760782	FALSE	0.407151096	FALSE	FALSE
YOR359W	VTS1	26.05043387	22.10439179	49.22314275	48.25977495	0.529231423	0.458029318	FALSE	0.383044983	FALSE	FALSE
YOR360C	PDE2	194.7730252	267.3361769	4.468832911	2.313374299	43.58476344	115.5611424	FALSE	0.855435409	FALSE	FALSE
YOR361C	PRT1	123.2572219	111.8310698	59.91122934	36.94247739	2.057330875	3.027167577	FALSE	0.383044983	FALSE	FALSE
YOR362C	PRE10	422.7465525	431.8730574	606.8057098	942.9020704	0.696675304	0.458025357	FALSE	0.383044983	FALSE	FALSE
YOR363C	PIP2	15.81100481	24.82534344	64.51274565	84.15688259	0.245083427	0.294988867	FALSE	0.383044983	FALSE	FALSE
YOR369C	RPS12	3740.845909	2248.521861	1459.835697	711.8170959	2.562511601	3.158847792	FALSE	0.383044983	FALSE	FALSE
YOR370C	MRS6	103.6706703	91.28964082	46.94816388	24.66443355	2.208194353	3.701266468	FALSE	0.45227797	FALSE	FALSE
YOR371C	GPB1	30.34774684	44.23686168	81.65856503	69.49216992	0.371641932	0.636573325	FALSE	0.383044983	FALSE	FALSE
YOR373W	NUD1	28.05210372	32.25515276	21.38714482	8.837272882	1.311633879	3.649898921	FALSE	0.749524221	FALSE	FALSE
YOR374W	ALD4	338.0844277	358.50815	35.27018378	412.5285448	9.585559004	0.869050529	TRUE	0.975879469	FALSE	TRUE
YOR375C	GDH1	270.9693372	219.2355195	160.2623974	78.31311915	1.690785497	2.799473726	FALSE	0.45227797	FALSE	FALSE
YOR378W	AMF1	3.389165112	6.913364025	8.644532788	8.331295768	0.392058795	0.829806577	FALSE	0.383044983	FALSE	FALSE
YOR380W	RDR1	36.98857561	53.21918767	18.84118549	37.27680254	1.963176661	1.427675767	FALSE	0.383044983	FALSE	FALSE
YOR381W	FRE3	27.22280235	32.3501131	3.412407297	3.469573449	7.977594697	9.323945313	FALSE	0.402436563	FALSE	FALSE
YOR382W	FIT2	46.36994085	62.05733498	1.154039064	5.305668971	40.18056434	11.69642044	FALSE	0.888509227	FALSE	FALSE
YOR383C	FIT3	12.20374982	10.95646418	91.05036705	133.7310471	0.134032956	0.081929099	FALSE	0.383044983	FALSE	FALSE
YOR384W	FRE5	3.634615439	6.273421935	87.44330775	130.6183549	0.041565393	0.04802864	FALSE	0.383044983	FALSE	FALSE
YOR386W	PHR1	69.60562718	115.1593997	1	11.75471774	69.60562718	9.79686644	TRUE	0.987629758	FALSE	TRUE
YOR389W	YOR389W	16.2056319	30.44092447	1	3.990550642	16.2056319	7.628251639	FALSE	0.819766436	FALSE	FALSE
YPL002C	SNF8	162.9647697	187.0788257	4.148714416	1.550314474	39.28078759	120.6715339	FALSE	0.888538062	FALSE	FALSE
YPL003W	ULA1	121.3926231	141.2536148	3.879212046	4.373296395	31.29311357	32.29911767	FALSE	0.385250865	FALSE	FALSE
YPL004C	LSP1	496.6464718	295.4074309	806.9630636	1083.91039	0.615451306	0.27253861	FALSE	0.383044983	FALSE	FALSE
YPL005W	AEP3	49.2582858	81.26123899	8.35147144	3.666361979	5.898156529	22.16399784	FALSE	0.887889273	FALSE	FALSE
YPL006W	NCR1	28.14705002	42.16021584	9.973560254	21.64312717	2.82216674	1.947972468	FALSE	0.383044983	FALSE	FALSE
YPL008W	CHL1	62.80767759	75.71728725	3.877642915	1.818548842	16.19738562	41.6361032	FALSE	0.853878316	FALSE	FALSE
YPL009C	TAE2	50.44821742	58.49485206	13.42586291	9.784768002	3.757540037	5.978154214	FALSE	0.479368512	FALSE	FALSE
YPL011C	TAF3	126.5224482	128.6386237	12.47414115	1.100796333	10.14277831	116.8596041	TRUE	0.998154556	TRUE	FALSE
YPL012W	RRP12	45.55425822	40.02721725	56.39747081	12.84313308	0.807735836	3.116624035	FALSE	0.774048443	FALSE	FALSE
YPL013C	MRPS16	484.9839715	448.7096463	91.5131425	89.09325689	5.29961007	5.036404123	FALSE	0.383044983	FALSE	FALSE
YPL014W	YPL014W	15.13294754	17.86991322	13.68910859	7.542614326	1.105473555	2.36919355	FALSE	0.699437716	FALSE	FALSE
YPL015C	HST2	36.29783212	47.11615648	66.25206465	22.09009954	0.547874731	2.132908292	FALSE	0.699437716	FALSE	FALSE
YPL016W	SWI1	43.23999083	24.48193453	9.317214949	7.319729895	4.640870804	3.344649992	FALSE	0.428460208	FALSE	FALSE
YPL017C	IRC15	28.80677373	83.58922837	51.91273937	89.61965514	0.554907602	0.932710891	FALSE	0.383044983	FALSE	FALSE

YPL018W	CTF19	27.96519213	28.56693363	10.97855528	9.571046619	2.54725612	2.984724113	FALSE	0.383044983	FALSE	FALSE
YPL019C	VTC3	45.67264851	82.91871415	6.056171399	13.49783336	7.541505267	6.143112892	FALSE	0.407151096	FALSE	FALSE
YPL020C	ULP1	161.0416473	170.8523849	3.323621562	2.391948376	48.45366546	71.42812385	FALSE	0.493497693	FALSE	FALSE
YPL022W	RAD1	73.85978901	104.9616429	26.92050985	16.54653377	2.743625192	6.343421792	FALSE	0.776081315	FALSE	FALSE
YPL023C	MET12	93.50164003	124.2911248	62.28448757	47.18308874	1.501202686	2.634230359	FALSE	0.45227797	FALSE	FALSE
YPL024W	RMI1	234.9611072	324.8455805	47.06154612	36.14127798	4.99263468	8.9882151	FALSE	0.521583045	FALSE	FALSE
YPL025C	YPL025C	7.835166657	3.788446395	3.315423703	1.466544792	2.363247463	2.583246292	FALSE	0.383044983	FALSE	FALSE
YPL026C	SKS1	114.1535494	149.8083886	4.363100561	3.470979203	26.16340095	43.16026685	FALSE	0.535539216	FALSE	FALSE
YPL028W	ERG10	205.5739578	121.1946789	377.3455747	308.1434057	0.544789635	0.393306093	FALSE	0.383044983	FALSE	FALSE
YPL029W	SUV3	39.98801519	50.84372266	22.89772812	14.28281171	1.746374792	3.559783864	FALSE	0.699437716	FALSE	FALSE
YPL030W	TRM44	58.8837604	58.46246437	3.50481907	1.001143516	16.80079891	58.39568795	FALSE	0.889172434	FALSE	FALSE
YPL031C	PHO85	62.38943489	51.95649952	32.92466942	34.94430948	1.894914543	1.486837207	FALSE	0.383044983	FALSE	FALSE
YPL032C	SVL3	24.84772283	38.65556873	314.3726254	61.98183988	0.079039079	0.623659588	FALSE	0.577652826	FALSE	FALSE
YPL036W	PMA2	15.27031004	16.86368168	88.19380293	143.5948	0.173144932	0.117439362	FALSE	0.383044983	FALSE	FALSE
YPL037C	EGD1	518.3706589	291.0030359	607.7209031	280.1712193	0.852974871	1.038661418	FALSE	0.383044983	FALSE	FALSE
YPL038W	MET31	166.2023723	131.3798092	13.80982259	2.43353638	12.03508381	53.98719752	TRUE	0.959385813	TRUE	FALSE
YPL039W	YPL039W	110.4115867	116.423021	15.31639032	13.89862277	7.208721139	8.376586875	FALSE	0.402436563	FALSE	FALSE
YPL040C	ISM1	27.50979352	31.96572467	24.71206642	17.50795445	1.113212997	1.825782946	FALSE	0.383044983	FALSE	FALSE
YPL042C	SSN3	70.81384167	91.32898348	11.94825104	11.38325299	5.926711906	8.023100565	FALSE	0.446323529	FALSE	FALSE
YPL043W	NOP4	161.7733484	119.9884087	27.74548487	17.15688235	5.830618898	6.993602116	FALSE	0.407151096	FALSE	FALSE
YPL047W	SGF11	347.8187182	351.8851079	21.56661969	7.949093419	16.12764185	44.26732576	FALSE	0.857194348	FALSE	FALSE
YPL048W	CAM1	170.3150518	118.3593526	108.1670627	133.9233561	1.574555577	0.883784248	FALSE	0.383044983	FALSE	FALSE
YPL049C	DIG1	22.4123818	19.24957283	201.0443334	174.5442373	0.111479799	0.11028478	FALSE	0.383044983	FALSE	FALSE
YPL050C	MNN9	116.2315316	86.07952917	55.43004876	57.28212211	2.096904734	1.502729403	FALSE	0.383044983	FALSE	FALSE
YPL055C	LGE1	42.66989409	59.64669938	202.737933	303.2089986	0.210468231	0.196718104	FALSE	0.383044983	FALSE	FALSE
YPL056C	LCL1	1.666893299	3.022400249	23.32246756	21.91547384	0.071471567	0.1379117	FALSE	0.383044983	FALSE	FALSE
YPL057C	SUR1	44.13878741	92.33596225	10.68042134	1	4.132682225	92.33596225	TRUE	0.999927912	TRUE	FALSE
YPL058C	PDR12	43.96761808	86.62500668	49.48697959	47.65419434	0.88846841	1.817783469	FALSE	0.577652826	FALSE	FALSE
YPL061W	ALD6	312.7513899	174.1409293	1255.290512	1599.877021	0.249146621	0.108846447	FALSE	0.383044983	FALSE	FALSE
YPL062W	YPL062W	2.878698268	8.155683212	1.46580233	5.643901246	1.963906189	1.445043571	FALSE	0.383044983	FALSE	FALSE
YPL063W	TIM50	51.42957401	41.54782013	486.2019162	288.038335	0.105778222	0.144244064	FALSE	0.383044983	FALSE	FALSE
YPL067C	YPL067C	14.89075392	19.9178997	32.10985038	50.7279008	0.463744108	0.392641907	FALSE	0.383044983	FALSE	FALSE
YPL068C	YPL068C	15.86221495	16.92720373	110.5057015	49.48822892	0.14354205	0.34204505	FALSE	0.383044983	FALSE	FALSE
YPL074W	YTA6	71.06548046	85.51476898	9.009367641	2.567443381	7.887954326	33.30736312	TRUE	0.957684544	TRUE	FALSE
YPL075W	GCR1	54.97475903	67.85403918	100.8804179	93.30282405	0.544949755	0.727245288	FALSE	0.383044983	FALSE	FALSE
YPL079W	RPL21B	633.7773844	582.1030244	244.9213787	108.3353332	2.587676861	5.373159498	FALSE	0.749524221	FALSE	FALSE
YPL081W	RPS9A	390.587015	246.6723459	142.5592981	213.6441708	2.739821395	1.154594319	FALSE	0.699437716	FALSE	FALSE
YPL082C	MOT1	48.44800642	69.8332558	537.4184731	226.6803267	0.0901495	0.308069327	FALSE	0.383044983	FALSE	FALSE
YPL083C	SEN54	26.46880018	31.80716453	40.91289991	10.73926501	0.646954878	2.961763631	FALSE	0.827537486	FALSE	FALSE
YPL084W	BRO1	39.1211262	62.38663331	29.54622661	30.42287831	1.324065056	2.050648616	FALSE	0.383044983	FALSE	FALSE
YPL085W	SEC16	17.44252242	16.96649507	101.6365727	82.53985872	0.171616594	0.205555175	FALSE	0.383044983	FALSE	FALSE
YPL086C	ELP3	109.6923332	115.4686891	15.15723245	12.90155451	7.236963183	8.949982655	FALSE	0.407151096	FALSE	FALSE
YPL088W	YPL088W	65.36082319	110.5511181	1.375378288	3.599392205	47.52206994	30.7138294	FALSE	0.52710496	FALSE	FALSE
YPL089C	RLM1	19.40968685	37.27520679	72.24672923	119.9616244	0.268658347	0.310726092	FALSE	0.383044983	FALSE	FALSE

YPL090C	RPS6A	739.1239999	410.4889568	7.700098457	3.224766097	95.98890249	127.2926298	FALSE	0.459717416	FALSE	FALSE
YPL091W	GLR1	203.9976294	189.8117313	47.91471281	85.21360354	4.257515436	2.227481569	FALSE	0.487600923	FALSE	FALSE
YPL093W	NOG1	125.9430492	109.150227	59.71494036	36.64177929	2.109071004	2.978846254	FALSE	0.383044983	FALSE	FALSE
YPL094C	SEC62	152.2700534	106.6585422	35.65311186	34.73615724	4.270876943	3.070533722	FALSE	0.428460208	FALSE	FALSE
YPL095C	EEB1	86.4200023	154.5760738	5.894113261	1	14.66208715	154.5760738	TRUE	0.998024798	TRUE	FALSE
YPL096C-A	ERI1	131.3014957	157.6529024	43.31298427	20.41757729	3.031458071	7.721430422	FALSE	0.802407728	FALSE	FALSE
YPL096W	PNG1	81.47497064	57.71266158	11.58356453	12.11362455	7.033670027	4.764276898	FALSE	0.44994233	FALSE	FALSE
YPL097W	MYS1	83.06548083	113.2730103	7.947351048	5.751935884	10.45197077	19.69302381	FALSE	0.549538639	FALSE	FALSE
YPL098C	MGR2	217.535842	245.7006879	14.43356405	16.25066901	15.07152643	15.11941987	FALSE	0.383044983	FALSE	FALSE
YPL101W	ELP4	76.85321238	75.7461309	12.03014324	8.480043034	6.388387139	8.932281429	FALSE	0.446323529	FALSE	FALSE
YPL102C	YPL102C	3.366794385	9.593021441	1	3.402619469	3.366794385	2.819304812	FALSE	0.383044983	FALSE	FALSE
YPL103C	FMP30	60.95559186	71.46047887	7.354061794	7.827632105	8.288697262	9.129258748	FALSE	0.383044983	FALSE	FALSE
YPL105C	SYH1	46.77778851	58.23733508	62.6970528	20.96542719	0.746092303	2.777779559	FALSE	0.774048443	FALSE	FALSE
YPL106C	SSE1	339.3812598	483.2418578	63.5048579	51.82489466	5.344177927	9.324512111	FALSE	0.504801038	FALSE	FALSE
YPL107W	YPL107W	137.2475759	102.407868	27.87754487	29.6720864	4.923230384	3.451320092	FALSE	0.428460208	FALSE	FALSE
YPL108W	YPL108W	188.2758094	127.6919395	13.64209566	36.57267705	13.80109143	3.491457279	FALSE	0.879368512	FALSE	FALSE
YPL110C	GDE1	21.49101717	33.96602185	70.04507884	80.91136889	0.306816946	0.419792945	FALSE	0.383044983	FALSE	FALSE
YPL111W	CAR1	66.46754852	70.80793466	57.63660131	94.4339397	1.153217695	0.749814472	FALSE	0.383044983	FALSE	FALSE
YPL112C	PEX25	124.9500805	138.811793	22.97269331	16.44708957	5.439069717	8.439900105	FALSE	0.493886967	FALSE	FALSE
YPL115C	BEM3	38.57414245	38.30642775	4.735605341	1.042312029	8.145556835	36.7514014	TRUE	0.958722607	TRUE	FALSE
YPL116W	HOS3	43.84550281	52.74787434	3.205220693	1	13.67940214	52.74787434	FALSE	0.892214533	FALSE	FALSE
YPL119C	DBP1	29.51626455	37.48447022	20.31338656	30.67751407	1.453044989	1.221887476	FALSE	0.383044983	FALSE	FALSE
YPL120W	VPS30	49.57919346	72.37511134	39.98380266	30.57418708	1.239981947	2.367196588	FALSE	0.45227797	FALSE	FALSE
YPL123C	RNY1	124.4044346	164.0136017	1	6.092176749	124.4044346	26.92200316	TRUE	0.959573241	FALSE	TRUE
YPL124W	SPC29	69.71139027	50.97623097	137.836514	33.91256821	0.505754159	1.503166338	FALSE	0.699437716	FALSE	FALSE
YPL125W	KAP120	66.09528148	95.37175417	3.987336786	1	16.57629767	95.37175417	TRUE	0.965844867	TRUE	FALSE
YPL127C	HHO1	26.35217635	17.00412716	418.3506439	189.9931093	0.062990644	0.089498652	FALSE	0.383044983	FALSE	FALSE
YPL128C	TBF1	30.58776695	40.20766309	73.86184026	24.8681256	0.414121376	1.616835291	FALSE	0.699437716	FALSE	FALSE
YPL129W	TAF14	131.3589675	88.44089452	16.42547023	17.5162607	7.997272877	5.049073887	FALSE	0.479368512	FALSE	FALSE
YPL131W	RPL5	286.4147801	172.1724936	4197.152735	1168.158906	0.068240257	0.147387905	FALSE	0.383044983	FALSE	FALSE
YPL133C	RDS2	37.33009939	50.54334146	19.92552572	13.88001437	1.873481278	3.641447345	FALSE	0.45227797	FALSE	FALSE
YPL134C	ODC1	126.8339647	73.92038533	46.80969008	73.18742442	2.709566427	1.010014848	FALSE	0.699437716	FALSE	FALSE
YPL135W	ISU1	273.9098744	471.4476203	17.36349881	38.75414258	15.7750392	12.16508969	FALSE	0.438220877	FALSE	FALSE
YPL137C	GIP3	32.79112348	48.04125314	101.0340065	198.8268595	0.324555312	0.241623558	FALSE	0.383044983	FALSE	FALSE
YPL138C	SPP1	103.6056924	99.27816411	9.061221468	4.602314378	11.43396537	21.57135649	FALSE	0.552191465	FALSE	FALSE
YPL140C	MKK2	20.64805951	21.36885518	7.790227701	5.590644174	2.650507829	3.822252771	FALSE	0.428460208	FALSE	FALSE
YPL141C	FRK1	28.46807377	22.88488476	13.09833994	3.747795958	2.173410821	6.106224837	FALSE	0.783708189	FALSE	FALSE
YPL145C	KES1	54.94343074	69.04770145	895.4499195	698.9603204	0.061358463	0.098786296	FALSE	0.383044983	FALSE	FALSE
YPL146C	NOP53	271.3871486	261.926205	27.60170554	7.911829245	9.832260119	33.10564434	FALSE	0.887730681	FALSE	FALSE
YPL149W	ATG5	147.1338059	168.5489433	4.771210675	1	30.83783465	168.5489433	TRUE	0.965657439	TRUE	FALSE
YPL150W	YPL150W	58.78372873	75.43554882	35.44491506	39.3241778	1.658453085	1.918299455	FALSE	0.383044983	FALSE	FALSE
YPL151C	PRP46	135.3629047	147.8091277	23.55714822	18.24070975	5.74614989	8.103255286	FALSE	0.44994233	FALSE	FALSE
YPL154C	PEP4	359.4295861	316.5288953	32.24000041	82.6799825	11.14856022	3.828361905	FALSE	0.83311707	FALSE	FALSE
YPL155C	KIP2	38.88991065	37.87374699	26.28121827	19.0614401	1.479760575	1.98692999	FALSE	0.383044983	FALSE	FALSE

YPL157W	TGS1	153.8048174	118.7426181	5.851550486	1.419954565	26.28445533	83.62423774	FALSE	0.888523645	FALSE	FALSE
YPL158C	AIM44	101.6682554	42.35797526	54.21810391	23.19995198	1.875171725	1.825778575	FALSE	0.383044983	FALSE	FALSE
YPL160W	CDC60	113.252271	94.33830522	35.03788252	9.796998858	3.232280687	9.629306544	FALSE	0.825663206	FALSE	FALSE
YPL163C	SVS1	64.67764966	22.7796669	28.50716181	1.900300789	2.268821081	11.98740065	TRUE	0.94871684	TRUE	FALSE
YPL167C	REV3	31.27715232	38.80262729	1.25373179	4.036966986	24.94724356	9.611826756	FALSE	0.850317186	FALSE	FALSE
YPL169C	MEX67	48.78044175	66.35463861	235.3355862	240.1446057	0.207280346	0.276311177	FALSE	0.383044983	FALSE	FALSE
YPL170W	DAP1	464.8251027	506.8996989	35.42438556	25.1332675	13.12161369	20.16847586	FALSE	0.516075548	FALSE	FALSE
YPL172C	COX10	52.51253921	61.7330613	12.75856272	5.863915271	4.115866369	10.52761823	FALSE	0.823904268	FALSE	FALSE
YPL173W	MRPL40	98.86770866	76.40616238	4.595285658	1.012661449	21.51502997	75.45084532	FALSE	0.891767589	FALSE	FALSE
YPL175W	SPT14	50.82999508	61.540301	4.322889909	2.492445503	11.7583367	24.69073082	FALSE	0.828979239	FALSE	FALSE
YPL176C	TRE1	49.97217326	73.81309413	426.6001439	253.418642	0.117140545	0.291269393	FALSE	0.383044983	FALSE	FALSE
YPL177C	CUP9	74.132927	72.0144171	7.638026614	3.154458839	9.705769663	22.82940459	FALSE	0.838220877	FALSE	FALSE
YPL178W	CBC2	303.4383849	195.5490895	39.87232829	37.26684584	7.610249963	5.247266977	FALSE	0.44994233	FALSE	FALSE
YPL179W	PPQ1	105.5468177	146.9357544	15.73616832	1	6.707275595	146.9357544	TRUE	0.999956747	TRUE	FALSE
YPL180W	TCO89	25.44274493	36.55377215	37.40761629	45.13792279	0.680148789	0.809823977	FALSE	0.383044983	FALSE	FALSE
YPL181W	CTI6	60.45905127	58.63405386	151.874461	178.0011	0.398085701	0.329402761	FALSE	0.383044983	FALSE	FALSE
YPL182C	YPL182C	1	1.720339427	1.765530877	3.58760228	0.566401875	0.479523451	FALSE	0.383044983	FALSE	FALSE
YPL183W-A	RTC6	223.252238	212.7071592	30.61803443	10.14188259	7.291527434	20.97314352	FALSE	0.851326413	FALSE	FALSE
YPL184C	MRN1	147.1209115	80.75323788	23.20621827	16.8149156	6.339719373	4.80247655	FALSE	0.415383506	FALSE	FALSE
YPL186C	UIP4	66.81470478	57.18069829	1	12.54880581	66.81470478	4.556664529	TRUE	0.999480969	FALSE	TRUE
YPL187W	MF(ALPHA)1	1.463193773	2.653053575	539.3829081	618.8984847	0.002712718	0.004286735	FALSE	0.383044983	FALSE	FALSE
YPL190C	NAB3	48.18481134	59.06827201	1634.057722	1188.46983	0.029487827	0.049701112	FALSE	0.383044983	FALSE	FALSE
YPL193W	RSA1	141.7283196	105.8360021	6.18596381	3.701042761	22.91127526	28.59626569	FALSE	0.441681084	FALSE	FALSE
YPL194W	DDC1	37.32504677	39.15526214	6.630237583	2.658814308	5.629518748	14.72658772	FALSE	0.83989331	FALSE	FALSE
YPL195W	APL5	86.82086868	100.259833	256.3375381	169.6593935	0.338697443	0.590947727	FALSE	0.383044983	FALSE	FALSE
YPL199C	YPL199C	108.8470455	94.66007087	275.238463	99.3544334	0.395464516	0.952751353	FALSE	0.577652826	FALSE	FALSE
YPL200W	CSM4	9.437133852	8.415418346	7.952017792	1	1.18675965	8.415418346	TRUE	0.959558824	TRUE	FALSE
YPL203W	TPK2	49.15178957	64.61612951	6.774550169	6.608545364	7.255358414	9.777663003	FALSE	0.446323529	FALSE	FALSE
YPL204W	HRR25	99.06974664	109.3454691	282.2316635	278.596656	0.351022793	0.392486653	FALSE	0.383044983	FALSE	FALSE
YPL206C	PGC1	115.0333862	139.9180907	67.55990168	58.54108749	1.702687295	2.390083558	FALSE	0.383044983	FALSE	FALSE
YPL207W	TYW1	85.20622975	77.49206374	43.84637607	12.43226614	1.943290128	6.233140671	FALSE	0.831055363	FALSE	FALSE
YPL210C	SRP72	135.6926187	106.2885279	1.048031119	3.392339652	129.473845	31.33192394	TRUE	0.958910035	FALSE	TRUE
YPL211W	NIP7	619.2364681	480.0919102	1	3.899669391	619.2364681	123.1109261	TRUE	0.965657439	FALSE	TRUE
YPL212C	PUS1	90.33731509	67.39437599	226.1005997	76.34657001	0.399544783	0.882742682	FALSE	0.383044983	FALSE	FALSE
YPL213W	LEA1	192.1779517	197.7224254	6.718378865	4.412336515	28.60481011	44.8112751	FALSE	0.529397347	FALSE	FALSE
YPL214C	THI6	102.7681314	107.7816501	11.7835354	8.502687581	8.721332596	12.67618609	FALSE	0.462889273	FALSE	FALSE
YPL215W	CBP3	86.24046681	79.56160247	7.845383786	4.285131485	10.9925109	18.56689877	FALSE	0.533463091	FALSE	FALSE
YPL217C	BMS1	71.22590014	54.56730681	244.1892686	103.7872404	0.291683171	0.525761226	FALSE	0.383044983	FALSE	FALSE
YPL219W	PCL8	23.64853547	33.58884218	1.872034868	4.423818502	12.63252938	7.592726093	FALSE	0.513912918	FALSE	FALSE
YPL221W	FLC1	104.4366534	170.3942036	180.4185592	346.8993214	0.578857596	0.491192093	FALSE	0.383044983	FALSE	FALSE
YPL222W	FMP40	21.92709484	26.52668516	11.36860864	38.33852824	1.928740406	0.691906716	FALSE	0.699437716	FALSE	FALSE
YPL223C	GRE1	33.7746681	32.57447437	1.457642256	22.21029822	23.17075261	1.466638315	TRUE	0.997491349	FALSE	TRUE
YPL224C	MMT2	58.44388127	89.53426741	7.501534868	4.105826282	7.790923098	21.806638	FALSE	0.851989619	FALSE	FALSE
YPL226W	NEW1	77.59498715	99.63424122	154.8636149	38.58365364	0.501053699	2.58229151	FALSE	0.827537486	FALSE	FALSE

YPL228W	CET1	104.88439	107.61943	43.46016102	19.44112158	2.413345638	5.535659532	FALSE	0.776081315	FALSE	FALSE
YPL229W	YPL229W	38.01759126	41.70036286	10.89885734	18.89395697	3.488218084	2.207074089	FALSE	0.45227797	FALSE	FALSE
YPL230W	USV1	97.03214299	52.12979555	1.353938468	6.6317787	71.66658257	7.860605413	TRUE	0.99538639	FALSE	TRUE
YPL231W	FAS2	96.02395136	57.61679167	3543.944962	1350.013603	0.027095215	0.042678675	FALSE	0.383044983	FALSE	FALSE
YPL232W	SSO1	89.72746696	82.33036083	115.1686899	93.45359491	0.779096012	0.880975857	FALSE	0.383044983	FALSE	FALSE
YPL233W	NSL1	73.20284277	57.43555338	5.095181974	7.118685675	14.36707131	8.06828058	FALSE	0.534775087	FALSE	FALSE
YPL234C	VMA11	598.9818709	405.4412552	74.15674865	32.49160849	8.077240194	12.47833745	FALSE	0.50239331	FALSE	FALSE
YPL235W	RVB2	186.6446257	182.600909	24.57162989	30.64327344	7.595939974	5.958923069	FALSE	0.415383506	FALSE	FALSE
YPL237W	SUI3	811.6438182	477.2101268	5.917281634	2.06911629	137.1649802	230.6347541	FALSE	0.55	FALSE	FALSE
YPL239W	YAR1	174.6150699	316.8300338	85.37611237	23.05372983	2.045245034	13.74311385	TRUE	0.97482699	TRUE	FALSE
YPL240C	HSP82	1121.913099	3471.584874	529.2860802	6953.902672	2.119672406	0.499228281	FALSE	0.752926759	FALSE	FALSE
YPL245W	YPL245W	63.89879761	84.69363335	63.97900285	22.35910708	0.998746382	3.787880841	FALSE	0.774048443	FALSE	FALSE
YPL246C	RBD2	59.84518167	47.38979119	17.79445649	18.38453483	3.363136251	2.577698681	FALSE	0.383044983	FALSE	FALSE
YPL247C	YPL247C	32.02998186	44.46092493	55.38426051	176.9844961	0.578322823	0.251213671	FALSE	0.383044983	FALSE	FALSE
YPL248C	GAL4	2.919088167	6.041863277	24.59829887	29.5280649	0.118670327	0.204614264	FALSE	0.383044983	FALSE	FALSE
YPL249C	GYP5	22.14506992	28.04826025	115.4286903	172.8226927	0.191850656	0.162295008	FALSE	0.383044983	FALSE	FALSE
YPL249C-A	RPL36B	459.3269483	263.3720432	46.37891281	10.70815214	9.903788607	24.5954708	FALSE	0.840066321	FALSE	FALSE
YPL250C	ICY2	132.4371929	285.1393536	3.810308418	1	34.75760447	285.1393536	TRUE	0.995170127	TRUE	FALSE
YPL252C	YAH1	44.08526719	23.16591174	2.801991553	3.288432361	15.7335475	7.044667243	FALSE	0.821655133	FALSE	FALSE
YPL254W	HFI1	122.5875114	141.6687205	54.30250273	24.15548863	2.257492845	5.864866685	FALSE	0.783708189	FALSE	FALSE
YPL255W	BBP1	78.15274265	55.45019435	105.8977354	1	0.73800202	55.45019435	TRUE	0.999870242	TRUE	FALSE
YPL256C	CLN2	33.09712157	9.59861178	78.99985449	24.8587025	0.418951678	0.386126821	FALSE	0.383044983	FALSE	FALSE
YPL258C	THI21	14.08058935	17.07374551	6.791367415	6.776679766	2.073306964	2.519485367	FALSE	0.383044983	FALSE	FALSE
YPL260W	YPL260W	299.2565256	418.9450358	2.784709391	3.637767134	107.4641852	115.1654354	FALSE	0.393685121	FALSE	FALSE
YPL262W	FUM1	107.7856157	88.08137869	168.4345505	201.10106	0.639925808	0.437995596	FALSE	0.383044983	FALSE	FALSE
YPL263C	KEL3	87.69378092	65.79084574	3911.45444	1591.445396	0.022419737	0.04134031	FALSE	0.383044983	FALSE	FALSE
YPL264C	YPL264C	82.67871482	106.7426877	2.03754458	6.515921232	40.57762251	16.38182598	FALSE	0.844593426	FALSE	FALSE
YPL265W	DIP5	75.06063926	108.1853387	97.64721094	107.5133885	0.768692096	1.006249921	FALSE	0.383044983	FALSE	FALSE
YPL266W	DIM1	217.6113152	178.6478119	6.687461015	1.386591352	32.54019944	128.8395544	FALSE	0.892459631	FALSE	FALSE
YPL270W	MDL2	46.13030291	59.7451212	7.262443292	11.68041491	6.351898536	5.114982784	FALSE	0.407151096	FALSE	FALSE
YPL271W	ATP15	712.8633613	492.8362855	9.636971964	6.478978279	73.97171683	76.06697604	FALSE	0.385121107	FALSE	FALSE
YPL273W	SAM4	289.1585079	175.3521925	33.01011488	4.315643452	8.759694079	40.63176082	TRUE	0.958910035	TRUE	FALSE
YPL274W	SAM3	160.2744635	203.875436	134.1036772	166.8660053	1.195153383	1.221791315	FALSE	0.383044983	FALSE	FALSE
YPL277C	YPL277C	12.64223407	20.84712959	14.01073441	54.88120738	0.902324868	0.379859165	FALSE	0.577652826	FALSE	FALSE
YPR002W	PDH1	27.95351044	46.0851314	1	9.504994621	27.95351044	4.848517357	TRUE	0.964316609	FALSE	TRUE
YPR003C	YPR003C	44.39581849	72.39006023	10.83901868	3.905839754	4.095926007	18.5338019	TRUE	0.953373702	TRUE	FALSE
YPR004C	AIM45	340.3278447	304.7105086	4.228100416	2.434218986	80.49190209	125.1779361	FALSE	0.531314879	FALSE	FALSE
YPR008W	HAA1	40.08561451	61.53022928	61.37348231	32.32547377	0.653142253	1.903459473	FALSE	0.699437716	FALSE	FALSE
YPR010C	RPA135	120.7793543	114.0887957	293.1144853	141.4376529	0.412055222	0.806636658	FALSE	0.383044983	FALSE	FALSE
YPR011C	YPR011C	68.63318462	80.53924228	26.15373693	31.72173628	2.624220959	2.538929193	FALSE	0.383044983	FALSE	FALSE
YPR013C	CMR3	11.30432221	13.15680971	4.475748912	3.546269969	2.525682837	3.710041769	FALSE	0.428460208	FALSE	FALSE
YPR014C	YPR014C	1	2.402219419	1	8.419053433	1	0.285331295	FALSE	0.577652826	FALSE	FALSE
YPR016C	TIF6	178.7118704	162.9147451	30.2174778	7.25840471	5.914188854	22.44497953	FALSE	0.887889273	FALSE	FALSE
YPR017C	DSS4	170.6978114	153.2248983	7.659712307	9.446921575	22.28514656	16.21955863	FALSE	0.47061707	FALSE	FALSE

YPR018W	RLF2	30.49131907	26.91778541	55.73843687	27.77611413	0.547042953	0.969098315	FALSE	0.383044983	FALSE	FALSE
YPR019W	MCM4	39.16408892	41.87166182	7.018691499	5.540656911	5.579970131	7.557165601	FALSE	0.428460208	FALSE	FALSE
YPR021C	AGC1	50.86437482	47.64978238	12.8733525	3.972678927	3.951136646	11.99437036	FALSE	0.86810842	FALSE	FALSE
YPR022C	YPR022C	35.64102618	45.86600892	15.53591629	4.851470033	2.29410519	9.45404354	TRUE	0.931675317	TRUE	FALSE
YPR023C	EAF3	202.2272107	236.8556477	46.35835327	30.91878276	4.362260443	7.660574788	FALSE	0.508693772	FALSE	FALSE
YPR024W	YME1	70.91873307	100.2691096	154.7260376	215.682487	0.458350347	0.464892217	FALSE	0.383044983	FALSE	FALSE
YPR025C	CCL1	74.09999492	92.66429306	7.280136551	1	10.17837981	92.66429306	TRUE	0.99544406	TRUE	FALSE
YPR026W	ATH1	31.78414223	59.26597716	2.562689813	4.766672322	12.402649	12.43340703	FALSE	0.383044983	FALSE	FALSE
YPR030W	CSR2	9.741584213	18.33066125	3.890019378	5.850915303	2.504250819	3.132956179	FALSE	0.383044983	FALSE	FALSE
YPR031W	NTO1	43.09760095	41.10072343	8.590597923	3.065020988	5.016833675	13.40960587	FALSE	0.837701845	FALSE	FALSE
YPR032W	SRO7	19.68490903	24.36293453	22.03343736	38.11105093	0.893410715	0.639261682	FALSE	0.383044983	FALSE	FALSE
YPR033C	HTS1	202.0828423	152.0893275	18.32868655	3.917116464	11.02549502	38.82685872	FALSE	0.890859285	FALSE	FALSE
YPR034W	ARP7	41.10839845	41.36876468	71.7075275	68.88303438	0.573278704	0.600565365	FALSE	0.383044983	FALSE	FALSE
YPR035W	GLN1	367.0849495	832.6183155	408.2501373	484.3365864	0.899166751	1.719090275	FALSE	0.383044983	FALSE	FALSE
YPR036W	VMA13	157.1940534	118.5145064	187.1065772	157.1854519	0.840131094	0.753978851	FALSE	0.383044983	FALSE	FALSE
YPR036W-A	SPO24	696.1660798	1116.561006	51.64269284	25.21035067	13.48043724	44.28978482	FALSE	0.888134371	FALSE	FALSE
YPR037C	ERV2	153.9948314	108.6486042	36.09706793	15.69467302	4.266131301	6.922642099	FALSE	0.479368512	FALSE	FALSE
YPR040W	TIP41	44.83602791	59.46109878	25.89381186	26.05316898	1.731534474	2.282298127	FALSE	0.383044983	FALSE	FALSE
YPR041W	TIF5	402.4438791	317.6136414	287.062382	165.4724432	1.401938758	1.919435256	FALSE	0.383044983	FALSE	FALSE
YPR042C	PUF2	86.18537688	71.46379516	5.669199068	1.324646832	15.20239029	53.9493195	FALSE	0.891580161	FALSE	FALSE
YPR043W	RPL43A	1398.577248	793.205964	5.635696399	2.426964721	248.1640509	326.8304467	FALSE	0.459933679	FALSE	FALSE
YPR045C	THP3	156.6151667	187.5703245	248.1868647	257.9645339	0.631037291	0.727116715	FALSE	0.383044983	FALSE	FALSE
YPR047W	MSF1	82.53097781	80.77249833	6.83100668	7.275216747	12.08181776	11.10241813	FALSE	0.383044983	FALSE	FALSE
YPR048W	TAH18	139.8564692	158.1653603	5.973493269	3.157145037	23.41284453	50.09759083	FALSE	0.836361015	FALSE	FALSE
YPR052C	NHP6A	70.02471818	43.57217137	14.29881686	8.360782706	4.897238621	5.211494294	FALSE	0.383044983	FALSE	FALSE
YPR054W	SMK1	2.060507838	2.490733073	12.72807476	17.30438982	0.161886843	0.143936487	FALSE	0.383044983	FALSE	FALSE
YPR056W	TFB4	212.0094402	166.0295014	3.211391801	1	66.01793035	166.0295014	FALSE	0.854930796	FALSE	FALSE
YPR057W	BRR1	172.0827114	146.5447499	9.166798672	3.346152976	18.7723891	43.79499412	FALSE	0.843800461	FALSE	FALSE
YPR058W	YMC1	55.12345009	39.32204406	23.06836855	6.165615409	2.389568641	6.377634907	FALSE	0.783708189	FALSE	FALSE
YPR062W	FCY1	469.8931772	396.920175	1061.920133	331.215369	0.442493896	1.198374871	FALSE	0.577652826	FALSE	FALSE
YPR063C	YPR063C	45.8218328	41.22958151	6.753824399	5.483357947	6.784575686	7.519038865	FALSE	0.383044983	FALSE	FALSE
YPR064W	YPR064W	8.327662847	9.122714221	2.509739599	5.228056422	3.318138205	1.744953284	FALSE	0.45227797	FALSE	FALSE
YPR065W	ROX1	22.44594762	25.77991571	38.74452106	9.139540954	0.579332174	2.820701372	FALSE	0.827537486	FALSE	FALSE
YPR066W	UBA3	49.22574038	34.49853999	12.36163133	30.92054747	3.982139497	1.115715691	FALSE	0.774048443	FALSE	FALSE
YPR069C	SPE3	177.6237611	153.8428162	6.770926424	8.734319598	26.23330251	17.61360052	FALSE	0.485005767	FALSE	FALSE
YPR070W	MED1	96.94187769	101.1304718	6.057845829	1.897868079	16.00269806	53.28635481	FALSE	0.888956171	FALSE	FALSE
YPR072W	NOT5	101.4856595	99.93546797	31.06305589	19.42406721	3.267085501	5.144930096	FALSE	0.45227797	FALSE	FALSE
YPR074C	TKL1	174.1604526	140.2705656	486.4132417	285.7719913	0.358050394	0.490847843	FALSE	0.383044983	FALSE	FALSE
YPR075C	OPY2	60.21792213	69.53793054	256.6512544	189.6034158	0.23462937	0.36675463	FALSE	0.383044983	FALSE	FALSE
YPR079W	MRL1	29.94797601	44.27126887	38.39018726	88.76219498	0.780094554	0.498762664	FALSE	0.383044983	FALSE	FALSE
YPR080W	TEF1	901.6040642	971.8695912	154.7260601	58.68079128	5.827098962	16.56197147	FALSE	0.845833333	FALSE	FALSE
YPR084W	YPR084W	56.28461404	74.01148669	3.177854353	5.61640713	17.71151468	13.17772821	FALSE	0.46156286	FALSE	FALSE
YPR086W	SUA7	99.12165171	104.1193176	13.69386889	5.611840643	7.238396431	18.55350574	FALSE	0.844766436	FALSE	FALSE
YPR088C	SRP54	189.6066963	164.46191	48.03824847	54.88673123	3.946994371	2.996387402	FALSE	0.383044983	FALSE	FALSE

YPR089W	YPR089W	51.61074514	45.031481	4.46729987	4.583314858	11.55300666	9.825090005	FALSE	0.402436563	FALSE	FALSE
YPR091C	NVJ2	29.42404869	34.33003151	77.63912566	98.99271433	0.378984802	0.346793516	FALSE	0.383044983	FALSE	FALSE
YPR093C	ASR1	56.22613194	80.46188226	18.28661637	31.89467102	3.074714906	2.522737488	FALSE	0.383044983	FALSE	FALSE
YPR095C	SYT1	23.95249399	29.36045956	20.18384855	14.91140135	1.1867159	1.968993985	FALSE	0.383044983	FALSE	FALSE
YPR102C	RPL11A	730.7524148	448.9633702	17.64343269	1.878631758	41.41781407	238.9842333	TRUE	0.965902537	TRUE	FALSE
YPR103W	PRE2	619.2012505	597.1489302	204.0541087	165.3596963	3.034495382	3.611212065	FALSE	0.383044983	FALSE	FALSE
YPR104C	FHL1	27.37374767	23.87691589	50.01198372	35.13189645	0.547343769	0.679636407	FALSE	0.383044983	FALSE	FALSE
YPR105C	COG4	55.67876668	61.10517918	2.770280453	5.488531982	20.09860288	11.13324645	FALSE	0.544852941	FALSE	FALSE
YPR106W	ISR1	63.23897124	59.6136358	6.008392366	2.170536356	10.52510678	27.46493309	FALSE	0.85093714	FALSE	FALSE
YPR109W	YPR109W	350.832203	495.4950777	5.745117034	6.000919283	61.06615426	82.56986211	FALSE	0.478546713	FALSE	FALSE
YPR112C	MRD1	87.09034794	52.9678561	407.680334	109.67433	0.213624109	0.482955821	FALSE	0.383044983	FALSE	FALSE
YPR113W	PIS1	356.0923706	415.2977221	20.57750211	16.94391045	17.30493666	24.51014619	FALSE	0.478676471	FALSE	FALSE
YPR114W	YPR114W	86.31824583	82.22786934	1.110122961	12.00062867	77.75557202	6.851963474	TRUE	0.998082468	FALSE	TRUE
YPR115W	RGC1	33.74470393	35.79321708	99.27767824	76.92670885	0.339902227	0.465289853	FALSE	0.383044983	FALSE	FALSE
YPR117W	YPR117W	18.32894067	24.49652801	4.877534767	3.830145118	3.75782881	6.395717982	FALSE	0.487600923	FALSE	FALSE
YPR118W	MRI1	167.8418213	136.504758	8.417122783	7.911808937	19.94052191	17.25329303	FALSE	0.405997693	FALSE	FALSE
YPR119W	CLB2	92.02180287	50.84372266	5.762857101	3.620892048	15.96808688	14.04176705	FALSE	0.399264706	FALSE	FALSE
YPR120C	CLB5	88.24266595	44.24271085	4.566762167	1	19.32280743	44.24271085	FALSE	0.83995098	FALSE	FALSE
YPR122W	AXL1	35.70023372	55.62459274	2.854085947	4.732480908	12.50846484	11.75379126	FALSE	0.383044983	FALSE	FALSE
YPR123C	YPR123C	1.340083677	1.214915568	3.206072916	4.000854646	0.417982907	0.303664011	FALSE	0.383044983	FALSE	FALSE
YPR124W	CTR1	106.1674708	72.49941489	75.83744059	102.0900027	1.399934781	0.710151954	FALSE	0.383044983	FALSE	FALSE
YPR125W	YLH47	34.6985952	44.52465296	3.507988556	4.330220031	9.891307978	10.28230728	FALSE	0.383044983	FALSE	FALSE
YPR127W	YPR127W	43.80446931	68.22488291	23.7710835	40.43241097	1.842762839	1.687381021	FALSE	0.383044983	FALSE	FALSE
YPR129W	SCD6	67.38467187	42.40489231	87.78690578	101.1655052	0.767593655	0.41916355	FALSE	0.383044983	FALSE	FALSE
YPR131C	NAT3	185.5135607	142.0087534	3.852760386	6.086011397	48.15081711	23.33363251	FALSE	0.835265283	FALSE	FALSE
YPR132W	RPS23B	1400.444809	943.2550382	33.49157871	9.381938923	41.81483414	100.5394563	FALSE	0.845573818	FALSE	FALSE
YPR133C	SPN1	275.5119113	231.6690276	49.12943831	43.57977814	5.607878307	5.31597538	FALSE	0.383044983	FALSE	FALSE
YPR133W-A	TOM5	126.2076355	112.2605807	18.66835827	2.016740788	6.760510681	55.66435774	TRUE	0.995011534	TRUE	FALSE
YPR135W	CTF4	52.29467159	39.34238304	6.188868507	1.479042482	8.44979523	26.59990062	FALSE	0.885207612	FALSE	FALSE
YPR137W	RRP9	91.73970047	91.38059409	19.70109375	16.27130672	4.656579052	5.616057496	FALSE	0.383044983	FALSE	FALSE
YPR138C	MEP3	76.7334648	139.4022636	165.394468	143.4090234	0.463942148	0.972060616	FALSE	0.577652826	FALSE	FALSE
YPR140W	TAZ1	105.6762975	150.2225608	10.84621715	27.63201684	9.743147866	5.436539853	FALSE	0.520025952	FALSE	FALSE
YPR141C	KAR3	76.22758509	90.31357801	1	4.232665851	76.22758509	21.33728038	FALSE	0.891767589	FALSE	FALSE
YPR143W	RRP15	257.115208	194.4106924	4.195788282	1	61.27935699	194.4106924	FALSE	0.888624567	FALSE	FALSE
YPR144C	NOC4	70.93446992	75.97616209	5.798516464	5.891455824	12.23321006	12.89599114	FALSE	0.383044983	FALSE	FALSE
YPR145W	ASN1	292.1888162	277.3103092	93.02192202	35.7481548	3.141074812	7.757332112	FALSE	0.794780854	FALSE	FALSE
YPR148C	YPR148C	115.3171203	89.69755077	55.78459218	57.32703308	2.067185862	1.564664103	FALSE	0.383044983	FALSE	FALSE
YPR149W	NCE102	174.490062	219.9503393	2.025648229	5.37139159	86.14035723	40.94848339	FALSE	0.836634948	FALSE	FALSE
YPR152C	URN1	44.3040003	46.40338727	40.02807807	32.88849688	1.106823071	1.410930619	FALSE	0.383044983	FALSE	FALSE
YPR154W	PIN3	29.23677928	73.4011489	214.5623388	151.984359	0.1362624	0.482951992	FALSE	0.383044983	FALSE	FALSE
YPR155C	NCA2	41.01970071	45.32550686	20.58045627	1.887225324	1.993138547	24.01700861	TRUE	0.997260669	TRUE	FALSE
YPR156C	TPO3	55.2838292	73.94311565	162.238661	103.1365434	0.340756198	0.7169439	FALSE	0.383044983	FALSE	FALSE
YPR157W	TDA6	43.12857441	62.39097657	1.09558335	3.433327133	39.36585419	18.17216192	FALSE	0.836058247	FALSE	FALSE
YPR159W	KRE6	97.05500268	107.8111188	28.85261883	19.21414446	3.363819529	5.611028847	FALSE	0.487600923	FALSE	FALSE

YPR160W	GPH1	123.8390173	52.67324971	13.7358728	81.64691552	9.015737049	0.645134594	TRUE	0.976773356	FALSE	TRUE
YPR161C	SGV1	46.51088292	63.38378846	21.91267593	22.15296238	2.122556052	2.861187925	FALSE	0.383044983	FALSE	FALSE
YPR163C	TIF3	267.0124392	181.3025175	278.7163876	183.9567743	0.958007678	0.985571301	FALSE	0.383044983	FALSE	FALSE
YPR164W	MMS1	34.20818181	39.63036463	116.3773514	58.56695632	0.293941917	0.676667649	FALSE	0.383044983	FALSE	FALSE
YPR165W	RHO1	615.6687407	575.4650074	87.94912851	91.16243162	7.000282449	6.31252367	FALSE	0.383044983	FALSE	FALSE
YPR167C	MET16	88.44168653	66.90150519	16.64546772	38.39510278	5.313259321	1.742448915	FALSE	0.808232411	FALSE	FALSE
YPR168W	NUT2	54.72715141	71.35706628	3.787927088	1	14.44778375	71.35706628	TRUE	0.959486736	TRUE	FALSE
YPR169W	JIP5	151.2520914	165.174918	43.29802498	24.13223071	3.493279231	6.844577279	FALSE	0.508693772	FALSE	FALSE
YPR171W	BSP1	28.91950508	30.98876928	15.03601925	14.84557699	1.923348501	2.087407536	FALSE	0.383044983	FALSE	FALSE
YPR172W	YPR172W	66.22080158	64.41772471	8.695296569	11.75684566	7.615703622	5.479167337	FALSE	0.446323529	FALSE	FALSE
YPR173C	VPS4	235.7920063	194.5633194	185.1237107	123.1088551	1.273699654	1.580416935	FALSE	0.383044983	FALSE	FALSE
YPR174C	YPR174C	48.90626323	54.55490797	48.59904016	32.73482702	1.006321587	1.666570834	FALSE	0.383044983	FALSE	FALSE
YPR175W	DPB2	36.29271906	50.93401463	8.291910911	1	4.376882416	50.93401463	TRUE	0.998010381	TRUE	FALSE
YPR178W	PRP4	53.6860239	75.88985739	5.259466449	8.61364664	10.20750383	8.810421481	FALSE	0.399264706	FALSE	FALSE
YPR180W	AOS1	195.7778496	209.8260429	1.224991947	8.00962073	159.8197034	26.19675138	TRUE	0.986014994	FALSE	TRUE
YPR181C	SEC23	47.63047736	50.05404745	130.1530029	99.75469985	0.365957575	0.50177132	FALSE	0.383044983	FALSE	FALSE
YPR182W	SMX3	70.63357712	75.93222301	32.93334465	30.1676096	2.144743507	2.51701159	FALSE	0.383044983	FALSE	FALSE
YPR183W	DPM1	25.82973784	15.1184456	380.1061034	415.330514	0.06795402	0.036400999	FALSE	0.383044983	FALSE	FALSE
YPR184W	GDB1	30.07286835	13.89702949	47.01569412	289.6812111	0.639634678	0.047973527	FALSE	0.577652826	FALSE	FALSE
YPR185W	ATG13	38.12619661	35.45901239	13.54424972	21.20943021	2.814936036	1.671851249	FALSE	0.45227797	FALSE	FALSE
YPR186C	PZF1	72.81056382	95.14837302	15.38596574	1	4.732271283	95.14837302	TRUE	0.999913495	TRUE	FALSE
YPR187W	RPO26	974.674642	716.225826	5.533782335	1	176.1317274	716.225826	TRUE	0.95893887	TRUE	FALSE
YPR188C	MLC2	196.829897	142.326618	15.11291963	22.421404	13.02394916	6.347801323	FALSE	0.809717416	FALSE	FALSE
YPR189W	SKI3	76.13835501	74.28216758	7.755191225	9.29774362	9.81772761	7.989268215	FALSE	0.407151096	FALSE	FALSE
YPR190C	RPC82	70.30835961	55.60557265	57.48471159	39.35002979	1.223079279	1.413101158	FALSE	0.383044983	FALSE	FALSE
YPR191W	QCR2	206.6212011	179.1465439	48.75280535	49.595014	4.238139727	3.612188594	FALSE	0.383044983	FALSE	FALSE
YPR192W	AQY1	12.85889116	10.7942866	6.26858826	12.40387452	2.051321705	0.870235069	FALSE	0.699437716	FALSE	FALSE
YPR194C	OPT2	13.22340541	50.71200105	3.223790997	1	4.101818457	50.71200105	TRUE	0.998976355	TRUE	FALSE
YPR195C	YPR195C	3.974566359	32.02959225	3.029075993	4.716920866	1.312138212	6.790360313	TRUE	0.917920992	TRUE	FALSE
YPR199C	ARR1	75.9958046	88.5292501	5.123847063	1.366827644	14.83178629	64.76987096	TRUE	0.958837947	TRUE	FALSE

Annex 4. GSEA obtained from PAR-CLIP results obtained after reads normalization with RPKM and RNA-seq from McKinlay *et al.* , 2011.

Columns	<i>N</i>	Number of genes that match in a specific GO group
	<i>lor</i>	log odds ratio (<i>lor</i>) indicates that the gene set is enriched in those genes with high values of the ranking statistic
	<i>pval</i>	p-value obtained from GSEA analysis
	<i>padj</i>	p-value adjusted obtained from GSEA analysis
	<i>ontology</i>	GO gene group category
	<i>desc</i>	GO category description
	<i>state</i>	UP (significant at 30°C) or DOWN (significant at 39°C)

	N	lor	pval	padj	ontology	desc	state
MSN2.4DEPLIST	171	0.00395197	2.24E-05	0.02803816	NA	NA	UP
GO:0042180	58	0.00451938	3.21E-05	0.03805592	BP	cellular ketone metabolic process	UP
GO:0003735	176	-0.00575845	1.20E-11	2.56E-07	MF	structural constituent of ribosome	DOWN
GO:0002181	156	-0.00565596	7.83E-11	7.31E-07	BP	cytoplasmic translation	DOWN
GO:0005840	277	-0.00512902	1.36E-10	7.31E-07	CC	ribosome	DOWN
GO:0022626	163	-0.00555008	1.46E-10	7.31E-07	CC	cytosolic ribosome	DOWN
GO:0044391	198	-0.00537093	1.71E-10	7.31E-07	CC	ribosomal subunit	DOWN
GO:0006412	359	-0.00467123	1.31E-09	4.66E-06	BP	translation	DOWN
GO:0043043	363	-0.0046146	1.98E-09	6.04E-06	BP	peptide biosynthetic process	DOWN
GO:0043604	401	-0.00452514	2.40E-09	6.40E-06	BP	amide biosynthetic process	DOWN
GO:0006518	393	-0.00433341	1.27E-08	3.00E-05	BP	peptide metabolic process	DOWN
GO:0043603	457	-0.00399524	8.28E-08	0.00017653	BP	cellular amide metabolic process	DOWN
GO:0005198	280	-0.00429359	1.36E-07	0.00026383	MF	structural molecule activity	DOWN
GO:0044445	214	-0.00445199	2.49E-07	0.00044203	CC	cytosolic part	DOWN
GO:0022625	87	-0.00520908	8.55E-07	0.00140187	CC	cytosolic large ribosomal subunit	DOWN
GO:0015934	115	-0.00473249	3.34E-06	0.00474797	CC	large ribosomal subunit	DOWN
GO:0030529	581	-0.00337629	3.16E-06	0.00474797	CC	intracellular ribonucleoprotein complex	DOWN
GO:1901566	664	-0.00310638	9.84E-06	0.01312055	BP	organonitrogen compound biosynthetic process	DOWN