# PROJECT PROCUREMENT

### **Keywords**

Dynamic capabilities • International public procurement • Learning and knowledge management • SME.

# SMES DYNAMIC LEARNING CAPABILITIES in international public procurement

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# • ABSTRACT •

The aim of this research is to contribute to the limited existing research on the subject of SME access to international procurement by analysing whether the dynamic capabilities of learning and knowledge management would allow SMEs to overcome the internal and external barriers of the international public procurement market. By means of CAQDAS software and in-depth interviews with management-level executives responsible for international procurement, the authors analysed the barriers faced by Spanish firms in the public procurement market, and studied the dynamic capabilities developed to overcome those barriers. Results show that SMEs develop dynamic learning and knowledge management skills and that these are embodied in knowledge acquisition and transformation capabilities. The authors provide SMEs with ideas not only about the learning and knowledge capabilities required in the international public procurement market, but also about the key barriers they may find. Moreover, suggestions for public administration are also provided. The value of the paper is twofold, on one hand, the paper tackles the problems of the market barriers in international public procurement from the perspective of how SMEs can overcome them. On the other, it is the first time that research integrates these two areas of analysis i.e. international public procurement and barriers overcome by dynamic capabilities.

# 1. INTRODUCTION

The market for public procurement is a complex one, especially when considering international procurement and when the applicants are small and medium-sized enterprises.

Over the last few decades, academic interest in public procurement has increased and has been analysed from different perspectives: the comparison between public and private sector procurement (Stentoft and Vagn. 2012: Torvinen and Ulkuniemi, 2016), public sector objectives in their tender policies (Larson, 2009), the effectiveness of the public sector, the scope of public organisations and the strategic role of public procurement (Zheng et al, 2007), and the specific regulations of public procurement (Vaidya et al, 2006). Although there is considerable literature about public tenders, there is a lack of research about how firms can successfully market to government (Purchase et al. 2009; McKevitt and Davis, 2013). When referring to SMEs, the literature has centred on the perspective of the procurer, i.e. of government, though the focus has been on seeing what actions must be carried out for the process to become more accessible to SMEs, but without exploring the factors that predict SME activity and performance in public sector tendering (Flynn and Davis, 2016), as well as on the barriers facing SMEs when accessing the public procurement market (Kidalov and Snider, 2011; McKevitt and Davis, 2015). Currently, very little is known about the strategic and behavioural aspects associated with SMEs' participation in public sector procurement (Tammi et al 2016). The current literature suggests stimulating discussion on the barriers facing small firms within the tender process (McKevitt and Davis, 2015).

Despite a slight improvement in recent years, the number of contracts awarded to Spanish companies is still low compared to procurements awarded to other countries within the same economic environment. Specifically, Spanish companies account for 0.70% of all contracts awarded by the sum total of United Nations agencies, and represent only 0.38% of the said contracts' economic value (Annual Statistical Report on United Nations Procurement, 2014). This low percentage is due to the barriers faced by Spanish companies when tendering for international projects, largely because of their small size.

In recent years, one line of research has focused on demonstrating that the competitive advantages and results of companies depend more on the capabilities enabling them to provide added value to customers on an on-going basis (Javalgi et al., 2006). To achieve this, companies must have detailed knowledge of all the components in their value chain and understand how these evolve over time. According to Govindarajan and Gupta (2001), competitive advantage should be analysed from the perspective of how the company can manage to maintain it over time, in highly complex and rapidly changing environments.

Therefore, a company's permanence and long-term international success will be determined by its ability for integration and systematic involvement in the processes of renovation and/or reconfiguration of existing capabilities and resources, with the aim of adapting to the changing environment, i.e. its dynamic capabilities (Teece et al., 1997; Eisenhardt and Martin, 2000; Rindova and Kotha, 2001; O'Reilly and Tushman, 2008). As Flynn and Davis (2016, p.4) point out "specifically, in the context of public procurement, capability denotes the ability of a firm to marshal its organisational resources in order to identify contract opportunities and subsequently position itself to exploit them". Among the generic dynamic capabilities of internationalisation, we believe that learning and knowledge management skills can help overcome some of the barriers faced by SMEs wishing to break into international public procurement, given the complexity and uncertainties of this market.

The objective of the current study is to determine whether having dynamic learning and knowledge management capabilities would allow SMEs to overcome the internal and external barriers of the international public procurement market. Accordingly, we aim to contribute a vision of how businesses can overcome the problems and barriers in the tender market by developing their capabilities.

After the introduction, the next section sets out the conceptual framework in which a literature review is carried out on the concept of international public procurement, on barriers for SMEs in international public procurement, dynamic capabilities and the generic dynamic capability of learning and knowledge. The section ends with a proposal for a relationship model and research questions. The methodology of the empirical study is subsequently presented and results are put forward and analysed. Finally, the conclusions and suggestions for management are presented.the related work. In section 4 is presented the research methodology. Section 5 presents a new process model for success management, being followed by Section 6, which presents the complete workflow. Finally, we conclude with some final remarks and with some highlights for further research.

# 2. CONCEPTUAL FRAMEWORK

# --- 2.1. International public procurement and SMEs ---

A tender is a formal and competitive procedure whereby bids are solicited, received and evaluated for the acquisition of goods, works or services and the contract is awarded to the bidder offering the most advantageous proposal. The bidding may be public or private, and international or local. Governments are the largest consumers of goods and services and represent an important opportunity for procurement (Business Link, 2003). In the EU for

example, the public purchase of goods and services accounts for approximately 16% of GDP, which makes the public sector an attractive client since it generates a significant volume of business.

Public purchasers who seek international procurement can be divided into three groups, national governments and their various levels of administration (regional, local, etcetera), non-financial international institutions (Europeaid, EDF, UN...), and financial organisations (WB, IBRD, EIB, etc.).

Following on from Muro (2009), the international public tender market has major similarities with traditional export markets. In addition, size is also important, as recently stressed by Flynn et al. (2015, p.456): "size is significant in influencing SME tendering. Thus, in terms of tendering resources, behaviours and outcomes, size matters". Nevertheless, the propensity to contract foreign companies will be greater, among other factors, when the value of a contract exceeds €1 million (Kutlina-Dimitrova and Lakatos, 2016), which is detrimental to SMEs. In addition, given the limited specific weight that SMEs have in the overall economic context of any country, they are under-represented as providers to the public sector (McKevitt and Davis, 2013, Flynn and Davis, 2016). In fact, the processes and cultures of public procurement are not adapted to the characteristics of these companies (Loader, 2013), which fail to perform well in the area of procurement (GHK, 2010).

Given that the objective of government is to include as many vendors as possible in order to increase competition (Vaidya et al, 2006), it is important to remember that SMEs suffer handicaps when accessing public tenders despite constituting a large percentage of the business community in EU countries. In turn, from the point of view of government, and in line with Cabral et al. (2006) and Patil (2017), enhanced SME access to the procurement market could drive competition and especially variety, thus, increasing the potential for economy-wide innovation.

# --- 2.2. Barriers for SMEs in international public procurement ---

Small and medium-sized enterprises face various difficulties and obstacles when approaching the international public procurement market, both when presenting an offer and implementing it thereafter. We have analysed these obstacles, grouped by the classification proposed by Leonidou (2004), in relation to both the internal and external barriers existing in the process of SME internationalisation. The review of the different authors, shown in **Table 1**, groups internal barriers by lack of resources, capacities and skills. On the other hand, external barriers relate to actual government, and to the country of destination.

Despite these difficulties, authors such as Flynn and Davis (2016) sustain that SMEs can be genuine contenders for public contracts, provided they are given the opportunity to compete. Although, on the other hand, public administration, when selecting and choosing the best offer at the time, will consider the best value for money. At present, public procurement is sometimes a strategic tool for pub-

lic administrations pursuing different objectives (Schapper et al., 2006), such as support for SMEs (OECD, 2013).

# --- 2.3. Barriers for SMEs in international public procurement ---

Dynamic capabilities are based on the recognition of opportunities and the creation of competitive advantages, and are the foundation for sustaining superior performance in dynamic environments (Zollo & Winter, 2002; Teece, 2007). A company's potential to change or expand its resources lies in its dynamic capabilities (Teece et al., 1997; Helfat et al., 2009), routines (Zollo & Winter, 2002; Winter, 2003; Zahra et al., 2006), and skills (Eisenhardt & Martin, 2000). The existence of dynamic capabilities varies from one company to another and may appear in different forms, though there are common features such as the collection and distribution of knowledge, the constant updating of operational processes, interaction with the environment, and the evaluation of decisions (Easterby-Smith et al., 2009).

This research is based on the definition of Teece et al. (1997), which established that dynamic capabilities are applied in complex and unstable environments and related them to the creation of competitive advantage and an improvement in the company's performance. The international environment is characterised by its complexity and instability, so the concept of dynamic capability is a valid one in explaining the success of internationalisation (Knight and Cavusgil, 2004, Jantunen et al., 2005, Weerawardena et al., 2007). Evers (2011) demonstrated the relationship between dynamic capabilities and the development of competitive advantage in a study of international companies.

Frasquet et al. (2013) proposed a conceptual framework that included dynamic capabilities in the strategic process of internationalisation activities in such a way that their appearance, combination and interaction can be a way for companies to generate competitive advantage. In addition, Pehrsson et al. (2015) analysed the relationship between the degree of internationalisation and the financial performance of new international firms, based on the concept of dynamic capability.

The starting point is a generic dynamic capability; namely, the decisive capacities involved in the internationalisation process of any company and, at secondary level, the individual dynamic capabilities that are linked to specific environments and sectors, which must be determined in every particular context. In terms of generic dynamic capabilities, Frasquet et al. (2013), when compiling previous authors' classifications, differentiated between the acquisition of knowledge and learning, and adaptation.

# --- 2.4. The generic dynamic capability of learning and knowledge management ---

An international company gains an advantage over local competitors by exploiting its existing and distinctive capabilities, but this must

Type of Barrier	Classification according to Cause	Classificatio n by cause according to Karjalainen and Kemppainen (2008)	Type of Barrier	Authors
	Lack of Resources	Relative to the tender process itself	Lack of financial resources. Long payment cycles, costs of tender preparation, need to provide tender guarantees and execution guarantees. Scarcity of administrative and management resources. Excessive bureaucracy and paperwork required. Very long and extensive processes. Time availability. Dedication cost any offer requires Lack of legal resources	MacManus (1991), Bovis (1998), Fee et al. (2002), Loader (2013)  MacManus (1991), Bovis (1998), Fee et al. (2002), Loader (2005), Loader (2007), Karjalainen y Kemppainen (2008), Peck y Cabras (2010), Cabras (2011), Loader (2013)  Bovis (1998), Fee et al. (2002), Loader (2005), Loader (2007), Karjalainen y Kemppainen (2008) Peck y Cabras (2010), Loader (2014)  Bovis (1998), Fee et al. (2002), Loader (2005), Loader (2005), Loader (2013)
Internal	Lack of Capacity	Relative to the contract size	Size of contracts. Decentralised institutional structures that group purchase need. Supply capacity and consequent need for networking, or association with other companies	Bovis (1998), Loader (2013)
	Lack of Skills	Inadequate access to relevant information	Lack of information about tender announcements. Need to pay for information. Difficulty in identifying the appropriate contact	Bovis (1998), Fee et al. (2002), Loader (2005), Loader (2007), Loader (2013)
		Relative to the tender process itself	Lack of languages skills within companies  Lack of bidding control skills by management. Lack of training on how to prepare business plans. Lack of knowledge about standard requirements to be met.  Poor completion of offers	Karjalainen y Kemppainen (2008) Loader (2014) Karjalainen y Kemppainen (2008) Loader (2014)
External	Relative to own administration	Relative to the tender process itself	Complexity of the procedures. Lack of explicitness in tender specifications. Tender objectives lacking clear priorities. Decentralised processes producing complexity, confusion and inconsistency	MacManus (1991), Fee et al. (2002), Cabras 2011, Loader (2014)
			Communication difficulties between management and provider  Lowest price criterion vs. "Value for money"	(2007), Peck y Cabras (2010),
			Lack of specific competence on the part of officials managing the procedure. Lack of knowledge of the subject for tender.  Excessive delays between the	Cabras (2011), Loader (2014) MacManus (1991), Fee et al. (2002), Loader (2005), Loader (2013) MacManus (1991), Loader (2013)
			delivery deadline and the contract's award decision  Need to demonstrate experience (Risk aversion on the part of the administration)	Loader (2005). Loader (2014)
			Time shortage between award and execution contracts  Preference for some companies in particular	Fee et al. (2002)  Bovis (1998), Loader (2005), Cabras (2011), Loader (2013)
	Relative to the country of destination	Relative to the tender process itself	Lack of final contract profitability  Difficulty in complying with requirements. Sometimes this serves to "evaluate" suppliers, thereby carrying out restrictive processes	Fee et al. (2002) Fee et al. (2002), Loader (2013)
			Currency fluctuations (Exchange rates) rs faced by SMEs in International Procurer	Fee et al. (2002)

be followed by constant improvement and reconfiguration of capabilities, as the firm learns and accumulates knowledge (Luo, 2002). For this reason, and given the complexity of procurement scope, focus on the analysis of the dynamic capability of learning and knowledge management was considered to be of the greatest interest.

The learning process consists of the acquisition, integration and exploitation of acquired knowledge (Villar et al., 2014). It is considered a key process to the rethinking of an organisation's strategies based on its environment, requiring the exploration and learning of new capabilities, and the exploitation of existing ones (Escandón et al., 2013). Zollo and Winter (2002) defended the importance of developing this capability in situations where the diversity of experience in a company is great, the frequency of co-ordination is high, and the causal ambiguity in the performance of routines is also high, as in the case of international public procurement.

According to Weerawardena et al. (2007), market data is insufficient for the development of innovative products, and additional information, which the company has accumulated from its networks or its experience, for example in R&D&I, is required. Eisenhardt and Martin (2000) emphasised the need for repeated practice with the corresponding generation of experience and learning from past mistakes. Following the same approach, Zollo and Winter (2002) also pointed out the relevance of deliberately planned cognitive processes for companies, such as knowledge instrumentation through group dynamics, performance evaluation systems, and establishing routines, which are all usually carried out in any company.

The dynamic capability of learning and knowledge management is, in turn, embodied in three abilities: acquisition of knowledge, transformation of knowledge, and exploitation of knowledge from within the business' environment (Lane and Lubatkin, 1998; Zahra and George, 2002). All three could be considered as specific capabilities within the field of public procurement, as justified below:

• Knowledge acquisition refers to the need within the company to have internal routines and processes that enable the

understanding, analysis and interpretation of external knowledge (Zahra and George, 2002). With respect to international scope, entering a new market requires research and knowledge of the foreign market, especially when the distance, whether physical or psychological, is significant in comparison to the national market (Frasquet et al., 2013). In the specific area of public tenders, it is absolutely essential to obtain the appropriate information in an accessible form and without delay when the project is announced (Fee et al., 2002; Loader, 2013).

- The transformation of knowledge involves having the skills that enable the development of routines, allowing newly acquired knowledge to be combined with the knowledge already existing in the company, and its subsequent assimilation (Zahra and George, 2002). Knight and Cavusgil (2004) emphasised the importance of exchange, and the efficiency in acquiring knowledge and integrating it as being determining factors to achieving superior performance. This ability seems essential for companies involved in international public procurement, given the complexity of the process (Fee et al., 2002; Karjalaien and Kemppainen, 2008).
- The exploitation of knowledge is an understanding of how to use the newly incorporated and assimilated knowledge in order to achieve the company's objectives (Lane and Lubatkin, 1998). The capability to exploit information and transform it into knowledge acquires special relevance in foreign markets (Prange and Verdier, 2011). The adequate exploitation of knowledge appears to be a very important capability in the competitive international procurement market, since firms perceive barriers to be worse than they actually are and, on the other hand, they recognise and presume that they will be well compensated by the benefits obtained, if they are awarded the tender (Loader, 2005; Peck and Cabras, 2010).

# --- 2.5. Model and research questions ---

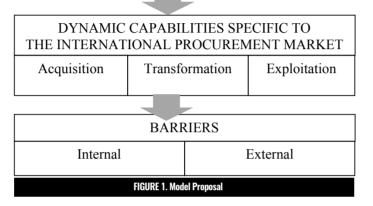
On the one hand, all the literature centring on the problems of SMEs in accessing and executing international tenders has been reviewed. On the other hand, the dynamic capability of learning and knowledge management has been analysed as the capability required by a company to develop according to changing and complex environments, and to develop and maintain competitive advantage (Eisenhardt and Martin, 2000; Prange and Verdier, 2011). Both analyses lead to the consideration of a dynamic learning and knowledge management capability, through the specific abilities generated within a company, which help to overcome the existing barriers detected by the academic literature in relation to the international procurement market. In turn, this leads to better results for companies involved in international tenders (**Figure 1**).

Accordingly, the following research questions were posed:

C.1. What are the market access barriers for SMEs when they seek to engage in international procurement?

- C.2. How do SMEs develop the generic dynamic learning and knowledge management capability in the competitive international procurement process?
- C.3. Which specific dynamic capabilities help SMEs to overcome market access barriers when engaging in international procurement?

# GENERIC DYNAMIC CAPABILITY Learning and Knowledge Management



# 3. METHODOLOGY

Given that we have not found any academic studies on the subject of dynamic capabilities and international public procurement for SMEs, the methodology used herein was qualitative, centring on case studies. As Pratt (2009) suggested, this methodology is flexible and allows for the emergence of unexpected findings, making it an appropriate methodology in this study, due to the objectives' exploratory nature. Authors such as Stentoft and Vagn (2011) also used qualitative analysis based on the case study method in the context of public procurement. The qualitative research process was in line with the progressive approach model proposed by Sinkovics and Alfoldi (2012). Information was collected through semi-structured individual interviews.

When selecting the number of companies to be studied, we followed Eisenhardt and Graebner's recommendation (2007), which established between four and ten cases for analysis in a qualitative study of multiple cases. Consequently, eight Spanish cases were selected (See **Table 2**). When possible, more than one interviewee per company was used in order to overcome the limitation of qualitative methodology by obtaining different points of view from the same location (Eisenhardt and Graebner, 2007). This allowed information triangulation, as recommended by Doherty (2009) as a useful means of improving information validity and credibility. Case selection followed a quota strategy, according to the type of company (size and sector). Due to the nature of the research, all of the companies had to meet the following criteria: they had to be SMEs and to have bid

for and won an international tender. Additionally, the representativeness of the sample, the learning opportunities each company added to the study and the accessibility to each of these companies were considered in this selection. To identify the companies, their webs and any existing reports were analysed. This also enabled us to obtain relevant information about their activities, services, and relationships with stakeholders, confirming their appropriateness for the definitive interviews. Seven companies were finally chosen. A public promotion body was also included, given its relevance in this area. Not only had this company bid for and won an international public tender, but also ran an in-house business support department to win bids.

All the interviewees were conducted with management-level executives who were responsible for international public procurement (See **Table 2**). Due to the complexity of this type of analysis, a protocol was developed to provide a practical and conceptual guide for the collection of interview information. The protocol focused on a semi-structured interview design, with open questions and unlimited time, in order to obtain any unexpected results and redirect the interview according to the respondent's answers. All interviews were recorded and subsequently transcribed to avoid loss or distortion of information which was collected according to the protocol described.

	Sector	Size	Interview Code	Responsibilities of the Interviewee	Type of Interview
Company EPS1	Nuclear maintenance and cleaning services	Small	EPS11	Responsible for Project Support Director of Operations	Face-to-face
Company EPS2	Software development	Small	EPS20	Manager – Founding Partner	Face-to-face
Company EPB1	Printing services	Small	EPB10	Assistant Manager	Face-to-face
Company EPS3	Training Services	Small	EPS30	Manager	Face-to-face
Company EMS1	Training Services	Medium	EMS10	International Department Director	Video- Conference
Company EMS2	Food industry Technology	Medium	EMS20	International Unit Director Face-to-i	
Organisation EMB1	Institute of Regional Promotion	Medium	EMB10	Executive responsible international procurement	Face-to-face

TABLE 2. Company characteristics and individuals interviewed

Once transcribed, the interviews were assigned a code based on the company's characteristics and were incorporated into a single hermeneutic unit in CAQDAS Atlas.ti 7.5.10 software, as suggested by Sinkoviks and Alfoldi (2012) to facilitate effective documentation of the research process. In the information-content analysis methodology, we searched for recurrent or central themes (Hutchinson et al., 2009), using the following steps.

Firstly, the interviews were coded according to Sinkoviks and Alfoldi (2012), and Bogdan and Biklen (1997). The next coding step was to identify the blocks or paragraphs (or parts of them) where interviewees talked about any of the elements previously identified in the literature review. In the final step, a search of the responses was made in line with the literature for any barriers that companies identified in their bidding processes, taking the list of barriers identified in **Table 1** as a reference. The initial list included 19 codes, 10 corresponded to internal barriers, and nine to external barriers (See **Table 3**).

	BIERF	Shortage of financial resources.			
	BIERA				
	BIEKA	Scarcity of administrative and			
		management resources.			
	BITCS	Size of contracts. Delivery capability and			
		Need for NETWORKING or association			
		with other companies			
	BIFIL	Lack of information about tender			
Internal		announcements			
Barriers	BIFHI	Lack of language skills within companies			
	BIFHG	Lack of management skills			
	BIFEX	Lack of experience in call-for-tender			
		processes.			
	BIFCR	Lack of knowledge about the usual			
		compliance requirements			
	BIFRL	Lack of legal resources			
	BIFRE	Lack of digital resources			
	BECPR	Procedural complexity			
	BEFCA	Lack of communication between			
		management and provider			
	BEERA	Excessive delays in administration			
External	BEFRP	Lack of final, expected return on contracts			
Barriers	BECRQ	Compliance requirements			
Dairiers	BEPRE	Preference shown to some companies			
	BEPMB	Lowest price versus "value for money"			
	BECEF	Lack of specific competence shown by			
		officials			
	BEFCM	Currency fluctuations (Exchange)			

TABLE 3. SMEs external and internal barriers when seeking international procurement Codes

Whenever doubts arose as to paragraph coding, a comment was included about the question raised, and this was discussed later with another researcher. After coding the transcribed interviews, each one was analysed, and then they were re-analysed collectively, following the suggestions of Miles and Huberman (1994) and Jurgenson (2005), so as to obtain a specific viewpoint from each case and a final conclusion from all of them.

# 4. RESULTS

--- 4.1. Market access barriers for SMEs when they seek to engage international procurement ---

# **Internal barriers**

The most frequent internal barrier mentioned by companies centred on the administrative burden of managing a bid for a public tender (BIERA), and more specifically, the scarcity of administrative resources available, causing major difficulties in preparing a bid (EPS30: "... our resources are limited and it is clear that we have to dedicate a lot of time to procurement, for which one never knows the result in any case. Sometimes you spend a lot of time on a tender which, in the end, is unsuccessful and, of course, this means you have wasted a lot of time"). The barrier relating to lack of financial

resources (BIERF) was also very relevant, since the public procurement process tends to impose a significant financial burden upon small and medium-sized enterprises, in the form of guarantees or preliminary bank guarantees, as well as expenses arising from official sworn translations and external consultancy firms (EMS10: "...Or it may be because the company's type of financing would not allow you to obtain a bank guarantee for the amount the contract will be awarded for").

The lack of foreign language skills in companies in which international competitive procurement is undertaken (BIFHI) was another of the most frequently identified barriers (EPS12: "... knowledge of foreign languages is fundamental for a SME. In addition, the legal language used in procurement is highly complicated..."). The lack of market information about the environment in which the international public tender (BI-FIM) will be carried out and, therefore, the need to be able to establish and understand the relevant market information affecting the area in which it will occur were also cited EPS30: "... we are a small company, which means that we do not have the resources or the time to go into depth about everything surrounding the tender itself"). Likewise, SMEs indicated in their replies that they do not have sufficient specific management skills (BIFHG) when it comes to processing bids and completing projects in the international tender market (EPS11: "... in the end only the people/companies specialised in preparing this type of tender, or with the minimum technical standards, compete for such a tender").

Two other internal barriers were frequently mentioned; the first regarding the inability to gather information on international tender announcements (BIFIL) (EPS30: "...because of our resources, as I've mentioned, we see the opportunities from time to time - but not in a systematic way".) and secondly, the lack of knowledge, due to complexity, about the usual requirements to be met (BIFCR) (EMS10: "It is very complex in the sense that somehow one must know everything behind the rules and regulations, the requirements, etc. which are all complicated...").

### **External harriers**

The external barrier most frequently cited by the companies interviewed related to completing the requirements that the public administration demands in each bidding process, whether in terms of provision or compliance (BECRQ). Here companies expressed their difficulties in complying with all the established requirements, in order to prove they were competent to submit an offer, and reach the minimum provision in order to be finally accepted.

Specifically, this centred on compiling the necessary specific technical requirements and abilities (EPS11: "... In many procurement opportunities there is a technical minimum - a technical assessment, and you are given a score where you have to achieve a minimum ..."), and on administrative aspects (EPS12: "... the ability to identify which of the documents requested are the equivalents in the countries of destination and origin is important, as is the fact that there are times when you are asked for a type of certificate that needs to be updated with a Social Security payment, or to appear in a Register that exists in one country, but not in another, etc." ...). In addition, administrations sometimes request pre-qualifications or prior approvals, or indicate the need to have a local partner or partner (EPS11: "additionally, to enter/progress with the companies themselves is complicated because you have to have achieved approval first to be invited and to present pre-qualifications").

Another barrier considered to be important was compliance with administrative and regulatory rules in the target market of the tender (BENOR). With this, the companies refer to their initial ignorance of the administrative rules in the market of origin of the bidding, or where the works to be tendered will be undertaken, and also to the potential administrative obstacles that could be found there (EPS11: ... "the most complicated thing when you are going to begin in a country that is new to you, is

to understand how it works at labour level. For example, the agreements it has and how it applies them, issues of legislation or, for example, if there are issues with a long-term contract of four years, you need to know if that country allows expatriate personnel or not, or whether you have to create a company in that area to be able to carry out those jobs".)

A recurrent requirement is the need to demonstrate experience (BEFEX). This barrier relates to the aversion of companies in general, and of public administration to assume any type of risk (EMS10: "... how to prove your experience, that is, in order to bid, you first need to compete initially when you must show your technical and economic solvency, and proven professional experience, in order to qualify for consideration").

Other barriers that were widely cited were those relating to the complexity of the procurement procedures which must be managed in an international tender (BECPR) (EPS12: "... the legal language used in procurement settings, which is highly complicated ... "). Two of the companies mentioned the impossibility of maintaining fluid communication channels (BEFCA - lack of communication between administration and provider) with the different international administrations (EPS12: "...when you get into a tender situation there are channels of communication that you just cannot do without, which for a SME are quite complicated, ... you have a channel via email, and any queries that are posed are transmitted to all bidders on the principle of transparency, so instead of saying "Hey! Call so-and-so to tell him..." No! In this situation you cannot operate that way, that's the biggest problem we found"). Cultural barriers (BE-CUL) also take on considerable importance, especially in relation to partners (EPS12: "... With a foreign partner it depends on the country but, for example, in France we had a very interesting experience (...). So, with regard to organisation and to the client, everything was fine, but when the job had to be done, it was us Spaniards who saved the day.").

Our research detected some internal barriers to international procurement that had not previously been identified by academics. Specifically, the barrier of a short deadline by which a company must submit a tender from

the time of the official announcement (BEFTP) was especially relevant given the intermediate steps to be carried out (EPS11: ... "Yes, it's true, it leaves you with very little time and often there are few technical staff with sufficient knowledge to be able to develop the technical part of the bid, so then sometimes, yes, that is limiting"). Other barriers related to political risks and security in the target market (BERPS), given that a sizeable proportion of international procurement comes from developing countries, thus carrying a significant burden of political and social instability (EMS20: "In fact, political risks and security risks go hand in hand. With the security risks, you have to control them and comply with rules, and with the political risks you have no choice but to be very careful").

# --- 4.2. SMEs and the development of the dynamic capability of learning and knowledge management in the international tender process ---

Our results reveal the existence of dynamic learning and knowledge management capabilities, but of an unequal nature. These capabilities, based on the way in which companies acquire, integrate and exploit new knowledge and information, complementing and integrating it with existing knowledge, enable tenders to be executed. However, these capabilities have not been identified in a way that allows a clear or decisive pattern to be established in the companies interviewed. Nonetheless, the following analysis of the results obtained establishes some interesting conclusions.

Knowledge acquisition. The ability of companies to know how to guide their organisation towards the acquisition of the necessary information and knowledge, are the most present and active capabilities in almost all the companies. This manifests itself through systematic information gathering and business opportunity searches via the internet (EPS12: "Yes, we don't subscribe to any service, but we are on the page of the European Commission, the official newspaper and the TED").

Knowledge transformation. When analysing the way in which learning and acquired experience was transmitted and integrated, it became apparent that companies had failed to systematise this aspect. Only two companies had formalised this (EPS11: "I co-ordinate all the group's bids, so all the information from each of the bids goes through me more or less... when we have to do another similar one - then all the know-how we acquired from the previous ones is shared in the new bid"). However, the remainder lacked this systematic approach (EPB10: "In this market as one continues with bidding, one gains experience - this experience, where is it kept in the company? Is it left with one particular person? Is it shared? No! My partner and I

have it, it's ours. Sharing it with someone else makes no sense"). In fact, opportunities in the international bidding market are lost due to failing to formally create a system (EPS30: "The truth is that sometimes there have been tenders that maybe we could have won, but as we didn't have a system we lost them").

Knowledge exploitation. Finally, as regards the management of generated knowledge, only two companies claimed to have a system to deal with such information (EMS20: "There are departments that have gained more expert knowledge than others (...). You know that according to the type of tender, one entrusts management tasks to this department or to another. For economic management we have an executive department which is very good"). The study revealed that knowledge exploitation was achieved through accumulated experience, which is useful, but the formal need for structured management was not appreciated (EMB10: "The usual thing is to have to tender many projects, which go to bigger companies, well, there are also small contracts that you can do and so you gradually learn the operation of this type of work").

# --- 4.3. Learning and knowledge management dynamic capabilities that enable SMEs to overcome access barriers and to manage international procurement. ---

The analysis of the concurrences extracted with the CAQDAS software shows the relationship between internal and external barriers, and the development of learning and knowledge management capabilities in the field of international procurement (See **Table 4**).

	Code	Barrier Description	c-coefficient coocurrence	Learning and knowledge management Dynamic	
			(*)	Capability	
	BIFIL	Lack of information about tender	0,58	Knowledge acquisition	
INTERNAL		announcements			
	BIFCR	Lack of information about usual compliance requirements	0,14	Knowledge transformation	
	BIFHG	Lack of management skills	0,10	Knowledge transformation	
	BECRQ	Compliance to requirements	0,04	Knowledge transformation	
EXTERNAL	BECPR	Procedural complexity	0,03	Knowledge transformation	
	BEFTP	Short deadlines for the preparation of bids	0,04	Knowledge transformation	

TABLE 4. Relationship between barriers and learning and knowledge management capability

The dynamic capabilities of learning, acquisition and knowledge integration enable companies to radically overcome internal barriers. The lack of information on tender announcements (BIFIL) was the barrier that was reduced the most as a result of having a knowledge assimilation system (EPS12: "For the last year, we have had a person who deals with this, not only managing the whole area of registering opportunities, but also monitoring bids and procurement too").

The lack of knowledge about the usual requirements to be met (BIFCR) is another barrier that can be overcome, thanks to the development of this type of dynamic capability. Basically, this is achieved through the transformation of knowledge, by assimilating it and integrating it into the company (EPS11: "I co-ordinate all the group bids, then all the information that comes from each of the bids goes through me, more or less. Then when we have to prepare a bid, I have all that information, I'm not the one who prepares the bids worldwide, that would be impossible, but yes, when we have to prepare a similar bid, all the know-how we

# have already acquired is used in the new bid").

In the same way, other barriers may be overcome through this capability, although to a lesser extent, since few were regularly cited in the interviews. These include complexity of procedures (BECPR), compliance with requirements (BECRQ) lack of management skills (BIFHG) and short deadlines for the preparation of bids (BEFTP).

In relation to the exploitation capability, no evidence was found that it helps overcome any of the barriers. Therefore, we suggest modifying the proposed model based on the results (**Figure 2**).

GENERIC DYNAMIC CAPABILITY

LEARNING AND KNOWLEDGE MANAGEMENT



Acquisition

Transformation

# BARRIERS

Internal

FIGURE 2. The Dynamic Capability of learning and knowledge management and barriers in the market of international procurement

# 5. CONCLUSIONS

From the point of view of research progress, the present study has allowed the integration of two areas of analysis that relate to business activity but which, to date, have not worked in tandem: international procurement and dynamic capabilities. Within a given environment, we have defined the barriers which SMEs face in procurement, and established that internal barriers are the most difficult to overcome. Failing to overcome the barriers themselves makes it impossible for a company

to access such a complex and competitive market. The analysis of our results enables us to establish that SMEs develop dynamic learning and knowledge capabilities and that these are embodied in knowledge acquisition and transformation capabilities. Companies formalise systems for gathering and disseminating information within the company, and integrate the experience from previous procurement, which allows them to radically overcome internal barriers. Nevertheless, a fact detected was that this information did not flow with the agility that it should, and the companies themselves recognised that it was centred on certain members of staff, without becoming part of the whole company's general knowledge. This probably contributed to the failure to detect that companies develop the capability to exploit know-how, an important capability when using embedded knowledge.

One question that arises is the reasons why external barriers are not overcome by these capabilities. Further research is required to analyse geographically whether the reason is public administrative complexity, and if so, then public administrations should perhaps consider easing procedures.

As proposals for management, it has been shown that companies find it useful to develop dynamic capabilities even when generated informally and sometimes unconsciously. Although a host of support policies has been adopted by governments seeking to ease the barriers faced by SMEs and to increase their share in public sector contracts (Patil, 2017), nevertheless SMEs should be more proactive. It would be appropriate to establish mechanisms to coordinate and integrate the information obtained, once generated, whether through acquisition or experience. Moreover, given that there are still internal barriers to overcome, a company must adopt a pro-active attitude. The solution to these difficulties requires not only the existence of such capabilities, but also a positive attitude within the company since, for dynamic capabilities to achieve positive results in a company's international strategy, flexibility, the availability of learning, and the creation of databases to provide solutions to problems in the internationalisation process, will be absolutely essential (Teece et al., 1997). In parallel, public administration should strive to adapt regulated formal systems and requirements to business reality.

Regarding future lines of research and limitations, this research was carried out in just one country, this making it difficult to generalise the results, although nowadays all SMEs in the European Union operate at a similar competitive level and face the same problems and situations. It would be interesting to see whether the same phenomenon occurs in other countries with a small percentage of SMEs and whether the results are confirmed in similar countries (e.g. Portugal, Italy ...). Another line that could be addressed is the analysis of other dynamic capabilities identified in the literature, such as networking or adaptation.

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# • REFERENCES •

**Bogdan, R. and Biklen, S.K.** (1997). Qualitative research for education, Allyn & Bacon, Boston.

**Bovis, C.** (1998). The regulation of public procurement as a key element of European economic law, European Law Journal, Vol. 4 No. 2, pp.220-242.

Business Link (2003). Selling to Government, Available at: www.businesslink.gov.uk/bdotg/action/, (accessed December 4, 2003).

Cabras, I. (2011). Mapping the spatial patterns of public procurement: a case study from a peripheral local authority in Northern England, International Journal of Public Sector Management, Vol. 24 No. 3, pp. 187-205.

**Doherty, C.** (2009). A qualitative study of health service reform on nurses' working lives: Learning from the UK National Health Service (NHS), International Journal of Nursing Studies, Vol. 46 No. 8, pp. 1134-1142.

Easterby-Smith, M., Lyles, M.A. & Peteraf, M.A. (2009). Dynamic capabilities: current debates and future directions, British Journal of Management, No. 20, pp. 1-8.

Einsenhardt, K.M. & Graebner, M.E. (2007). Theory Building from Cases: Opportunities and Challenges, Academy of Management Journal, Vol. 50, No. 1, pp. 25-32.

**Eisenhardt, K.M. & Martin, J.A.** (2000). Dynamic capabilities: what are they?, Strategic Management Journal, No. 21, pp. 1105-1121

Escandón, D.M., Rodríguez, A. & Hernández, M. (2013). Importance of dynamic capabilities in Colombian born global Enterprise, Cuadernos de Administración, Vol. 26 No. 47, pp. 141-163

**Evers, N.** (2011). International new ventures in 'low tech' sectors: a dynamic capabilities perspective", Journal of Small Business and Enterprise Development, Vol. 18 No. 3, pp. 502-528.

Fee, R., Erridge, A. & Hennigan, S. (2002). SMEs and government purchasing in Northern Ireland, European Business Review, Vol. 14 No. 5, pp. 326-334.

Flynn, A., McKevitt, D. & Davis, P. (2015). The impact of size on small and medium-sized enterprise public sector tendering, International Small Business Journal, Vol. 33 No.4, pp. 443-461.

Flynn, A. & Davis, P. (2016). Investigating the effect of tendering capabilities on SME activity and performance in public contract competitions, International Small Business Journal, DOI: 10.1177/0266242616630035

Frasquet, M., Dawson, J. & Mollá, A. (2013). Post- Entry internationalisation activity of retailers. An assessment of dynamics capabilities, Management Decision, Vol. 51 No. 7, pp. 1510-1527

**GHK** (2010). Evaluation of SMEs' Access to Public Procurement Markets in the EU, DG Enterprise and Industry, Brussels.

**Govindarajan, V. & Gupta, A.K.** (2001). Building and effective global business team, MIT Sloan Management Review, Summer, pp. 63-71.

Helfat, C.E., Finkelstein, S., Mitchell, W., Peteraf, M.A., Singh, H., Teece, D.J. & Winter, S.G. (2009). Dynamic Capabilities: Understanding Strategic Change in Organizations, Blackweel Publishing Ltda. Oxford.

Hutchinson, K., Fleck, E. & Lloyd-Reason, L. (2009). The role of business support organisations in the process of retailer internationalization, The International Review of Retail, Distribution and Consumer Research, Vol. 19 No. 4, pp. 371-388.

Jantunen, A., Puumalainen, K., Saarenketo, S. & Kyläheiko, K. (2005). Entrepreneurial orientation, dynamic capabilities and international performance", Journal of International Entrepreneurship, Vol. 3 No. 3, pp. 223-243.

Javalgi, R.G., Martin, L.C. & Young, R.B. (2006). Marketing research, market orientation and customer relationship management; a framework and implications for service providers, Journal of Service Marketing, Vol. 20 No. 1, 12-24.

Jurgenson, A. (2005). Cómo hacer investigación cualitativa

Reimp Paid, Ecuador

**Karjalainen, K. & Kemppainen, K.** (2008). The involvement of small and medium-sized enterprises in public procurement: Impact of resource perceptions, electronic systems and enterprise size, Journal of Purchasing and Supply Management, Vol. 14 No. 4 np 230–240

**Knight, G.A. & Cavusgil, T.** (2004). Innovation, organizational capabilities, and the born-global firm, Journal of International Business Studies, No. 35, pp. 124-141.

Kutlina-Dimitrova, Z. & Lakatos, C. (2016). Determinants of direct cross-border public procurement in EU Member States, Rev World Econ, No. 152, pp. 501-528.

Lane, P.J. & Lubatkin, M. (1998). Relative absorptive capacity and interorganizational learning, Strategic Management Journal, Vol. 19 No. 5, pp. 461-477.

Larson, P. D. (2009). Public vs. Private sector perspectives on supply chain management, Journal of public procurement, Vol. 9 No. 2. pp. 222-247

**Leonidou, L.C.** (2004). An Analysis of the Barriers Hindering Small Business Export Development, Journal of Small Business Management, Vol. 42 No. 3, pp. 279-302.

**Loader, K.** (2005). Supporting SMEs through government purchasing activity, The International Journal of Entrepreneurship and Innovation, Vol. 6 No. 1, pp. 17-26.

 $\label{lower} \textbf{Loader}, \textbf{K}. (2007). The challenge of competitive procurement: value for money versus small business support", Public Money and Management, Vol. 27 No. 5, pp. 307-314.$ 

**Loader, K.** (2013). Is public procurement a successful small business support policy? A review of the evidence, Environment and Planning C: Government and Policy, Vol. 31 No. 1, pp. 39-55.

**Luo, Y.** (2002). Capability exploitation and building in a foreign market: implications for multinational enterprises, Organization Science, Vol. 3 No. 1, pp. 48-63.

McKevitt, D. & Davis, P. (2013). Micro-enterprises: how they interact with public procurement processes, International Journal of Public Sector Management, Vol. 26 No. 6, pp. 469-480.

McKevitt, D. & Davis, P. (2015). How to interact, when and with whom? SMEs and public procurement, Public Money & Management, Vol. 35 No.1, pp.79-86.

**McManus, S.** (1991). Why businesses are reluctant to sell to government, Public Administration Review, Vol. 51 No. 4, pp. 328-344.

Miles, M.B. & Huberman, A.M. (1994). Qualitative data analysis: An expanded sourcebook, Sage Publications, Thousand Oaks

Muro, J.F. (2009). Iniciación a las Licitaciones Internacionales - Programa ILI, Cámaras de Comercio e Industria y Navegación de España

OECD (2013). Government at a glance 2013: procurement data", available at: www.oecd ilibrary.org/docserver/download/4213201e.pdf?expires1/4145761/5797&id1/4id&accname1/4guest&checksum1/408034536CF468AD5353E82D5C2983E33 (accessed March 9, 2015).

O'Reilly, C.A. & Tushman, M.L. (2008). Ambidexterity as a dynamic capability: Resolving the innovator's dilemma, Research in Organizational Behavior, No. 28, pp. 185.

Patil, K. (2017). Public procurement policy for small & medium enterprises in developing countries: evidence from India, International Journal of Public Sector Management, Vol. 30 No. 4.

Peck, F. & Cabras, I. (2010). The Impact of Local Authority Procurement on Local Economies. The Case of Cumbria, North West England, Public Policy and Administration, Vol. 26 No. 3, pp. 307-321

Pehrsson, T., Ghannad, N., Pehrsson, A., Abt, T., Chen, S., Erath, F. & Hammarstig, T. (2015). Dynamic capabilities and performance in foreign markets: Developments within international new ventures, Journal of International Entrepreneurship, Vol. 13 No. 1, pp. 28-48. **Prange, C. & Verdier, S.** (2011). Dynamic capabilities, internationalization processes and performance, Journal of World Business, Vol. 46, pp. 126-133.

**Pratt, M.G** (2009). From the editors: For the lack of a boilerplate Tips on writing up (and reviewing) qualitative research, Academy of Management Journal, Vol. 52 No. 5, pp. 856-862.

Purchase, S., Goh, T. & Dooley, K. (2009). Supplier perceived value: differences between business-to-business and business-to-government relationships, Journal of Purchasing and Supply Management, Vol. 5 No. 1, pp. 3-11.

Rindova, V.P. & Kotha, S. (2001). Continuous "morphing": Competing through dynamic capabilities, form, and function, Academy of Management Journal, No. 44, pp. 1263-1280.

Schapper, P.R., Malta, J.V. & Gilbert, D.L. (2006). An analytical framework for the management and reform of public procurement, Journal of Public Procurement, Vol. 6 No. 1/2, pp. 1-26.

Sinkovics, R. & Alfoldi, E. (2012). Progressive Focusing and Trustworthiness in Qualitative Research. The Enabling Role of Computer-Assisted Qualitative Data Analysis Software (CAQ-DAS), Management International Review, No. 52, pp. 817-845.

Stentoft, J. & Vagn, P. (2012). Public procurement vs private purchasing: is there any foundation for comparing and learning across the sectors?, International Journal of Public Sector Management. Vol. 25 No.3. pp. 203-220.

Tammi, T., Reijonen, H. & Saastamoinen, J. (2016). Are entrepreneurial and market orientations of small and medium-sized enterprises associated with targeting different tiers of public procurement?, Environment and Planning C: Government and Policy, DOI: 10.1177/0263774X16666814.

**Teece, D.J.** (2007). Explicating dynamic capabilities: The nature and microfoundations of (sustainable) enterprise performance, Strategic Management Journal, No. 28, pp. 1319-1350.

**Teece, D.J., Pisano, G. & Shuen, A.** (1997). Dynamic capabilities and strategic management, Strategic Management Journal, Vol. 18 No.7, pp. 509-533.

**Torvinen, H. & Ulkuniemi, P.** (2016). End-user engagement within innovative public procurement practices: A case study on public-private partnership procurement, Industrial Marketing Management, No. 58, pp. 58-68.

Vaidya, K., Sajeev, A. S. M. & Callender, G. (2006). Critical factors that influence e-procurement implementation success in the public sector, Journal of public procurement, Vol. 6 No.1/2, np. 70-99

Villar, C., Alegre, J. & Pla-Barber, J. (2014). Exploring the role of knowledge management practices on exports: A dynamic capabilities view", International Business Review. Vol. 23 No. 1, no. 38-44

Weerawardena, J., Sullivan, G., Liesch, P.W. & Knight, G. (2007). Conceptualizing accelerated internationalization in the born global firm: A dynamic capabilities perspective, Journal of World Business, No. 42, pp. 294-306.

Winter, S. (2003). Understanding Dynamic Capabilities, Strategic Management Journal, Vol. 24 No. 10, pp. 991-995.

Zahra, S.A. & George, G. (2002). Absorptive capacity: A review, reconceptualization, and extension, Academy of Management Review, Vol. 27 No. 2, pp. 185-203.

Zahra, S.A., Sapienza, H.J. & Davidsson, P. (2006). Entrepreneurship and Dynamic Capabilities: a Review, Model and Research Agenda, Journal of Management Studies, Vol. 43 No. 4, nn. 917-955.

Zheng, J., Knight, L., Harland, C., Humby, S. & James, K. (2007). An analysis of research into the future of purchasing and supply management, Journal of Purchasing and Supply Management. Vol. 13 No.1. pp. 69-83.

Zollo, M. & Winter, S.G. (2002). Deliberate learning and the evolution of dynamic capabilities, Organization Science, No. 13, pp. 339-351.