



CHARACTERIZATION OF INTRAPRENEURSHIP IN THE MEXICAN SOFTWARE INDUSTRY: AN ANALYSIS BASED ON THE GROUNDED THEORY

CARACTERIZAÇÃO DO INTRAEMPREENDEDORISMO NA INDÚSTRIA MEXICANA DE SOFTWARE: UMA ANÁLISE BASEADA NA GROUNDED THEORY

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DOI: <http://dx.doi.org/10.31512/gesto.v7i2.3246>

Recebido em: 28/08/2019

Aceito em: 13/09/2019

Abstract: Facing the dynamics of the current competitive conditions involves the identification of phenomena related to the company's development or intrapreneurship. With the purpose of contributing to a generation of theory in this regard, this research identifies some environmental and organizational factors related to the intraprenurial behavior in the software industry in México, through the use of qualitative research techniques investigation with strict attachment to the Grounded Theory. Results suggest the consideration of constructs set forth in the literature, as well as other proposed by the research subjects, such as government support, competitiveness in the field, and individual elements like skills or worker's creative talent, their commitment towards the company, the degree of risk aversion and their disposition for teamwork.

Keywords: Grounded Theory, intrapreneurship, qualitative research

Resumo: Enfrentar a dinâmica das condições competitivas atuais envolve a identificação de fenômenos relacionados ao desenvolvimento da empresa ou intra-emprededorismo. Com o propósito de contribuir para uma geração de teoria a esse respeito, esta pesquisa identifica alguns fatores ambientais e organizacionais relacionados ao comportamento intraprenurial na indústria de software no México, por meio do uso de técnicas de pesquisa qualitativa com rigorosa vinculação à Grounded Theory. Os resultados sugerem a consideração de construtos estabelecidos na literatura, bem como outros propostos pelos sujeitos da pesquisa, como apoio do governo, competitividade no campo e elementos individuais como habilidades ou talentos criativos do trabalhador, seu comprometimento com a empresa, o grau de aversão ao risco e sua disposição para o trabalho em equipe.

Palavras-chave: Grounded Theory, intrapreneurship, pesquisa qualitativa.

1 Introduction

Before the industrial revolution, the market size and conditions, as well as the conditions of the corporations that interacted in that market, made evident the lack of planning, and of the organization's internal knowledge, as well as of the industrial sectors. Back then, an "invisible hand" as described by Adam Smith, explained the regulations of the market forces behavior, under the assumption of perfect competition (Crook; Combs, Ketchen and Aguinis, 2013; Ghemawat, 2000). Companies were, therefore, undifferentiated, passive, and static

information processing entities, which sought adaptation in an environment that they did not intend to modify (Nonaka; Toyama, 2005).

However, facing the current dynamics of the competitive business environment leads imminently to the need to deepen the understanding of the functioning of economic units; in other words, to unravel their characteristics and inner phenomena (Galvan; Sánchez, 2019). In this sense, their nature, their structure, their components, their environmental interaction manners, and the fashion in which they acquire and maintain their positions in the market, are some of the questions embedded in the concept of the modern corporation (Freeman, 1984; Porter, 1991).

In this order of ideas, it can be said that it is widely known that one of the legitimate ways to achieve development and competitiveness in economic entities is through corporate entrepreneurship, which is also known as intrapreneurship (Baruah and Ward, 2014; Galván and Sánchez, 2019; Kuratko, 2010), which can be defined as a special type of organizational capability, characterized by a combination of elements of both endogenous and exogenous natures (Galván and Sánchez, 2018, 2019; Salvato, Sciascia and Alberti, 2009).

This capability to undertake from within the company leads imminently to macroeconomic development (Parker, 2011; Turró, Urbano and Perís-Ortíz, 2014), to a revitalization at a corporate level (Kearney, Hisrich and Roche, 2010; Kearney, Hisrich and Antoncic, 2013), to relative or absolute growth (Antoncic, 2007), to efficiency or financial performance (Covin and Slevin, 1991, Zahra, 1991), to competitive capability, and to strategic repositioning (Ireland, Covin and Kuratko, 2009); it also brings about other results, such as labor satisfaction and affective commitment (Rutherford and Holt, 2007).

Such impacts create the need to unravel the nature of intrapreneurship, especially in environments considered hostile and of great turbulence (De Villiers-Scheepers, 2012), through inductive valuation methods, in which we do not move from the knowledge of a previous theory (Miles, Huberman and Saldaña, 2013), because despite the existence of studies that have addressed the factors and consequences of corporate entrepreneurship (eg. Alpkan, Bulut, Gunday, Ulusoy and Kilic, 2010; Antoncic and Hisrich, 2001; Antoncic, 2007; Ireland et al., 2009; Kuratko and Audretsch, 2013; Rutherford and Holt, 2007; Zahra, 1991), they present fragmented information, and away from the reality in which the companies immersed in the software industry in Mexico develop.

For the reasons mentioned above, with the purpose of representing a phenomenon adapted to such conditions, the intention of this document is to respond, through the Grounded Theory, the following question: What are the main environmental and organizational factors that influence the intrapreneurial behavior in software industry companies in northern Mexico?, therefore, the general objective of this research is “to identify the main environmental and organizational factors that influence the intrapreneurial behavior, from the perspective of senior officers of the software industry in northern Mexico”

2 The Grounded Theory

The process to understand the complexities proper of certain phenomena involves contemplating a series of aspects of different nature; among those aspects are the perspective of the individuals involved and the interests of the researcher, which ultimately fall into the most feasible approach to the facts and particularities of the topic being researched (Páramo, 2015). In this order of ideas, this document considers a qualitative approach to the conceptualization and characterization of intrapreneurship, as well as of the factors that produce it.

A valid reason to carry out this research is the very nature of the intrapreneurship, which, up to the present time, has been limitedly taken into account in the research agenda, therefore we lack a formal or substantial theory that indicates which its conditioning factors are, particularly those that promote its development in companies located in emergent environments, like México.

For the reasons stated above, it was considered that an essential phase of the approach to the phenomenon of intrapreneurship is to follow the procedure proposed by the Grounded Theory by Strauss and Corbin (1990), which suggests an approach to social reality different from common hypothetical-deductive procedures.

The Grounded Theory is based on the generation of theory through an interpretative analysis, supported on the emergence of social patterns or mentions acquired by steady comparative methods (Trinidad, Carrero and Soriano, 2006). One of authors' distinctive elements of their proposal is the affirmation that if this procedure of data substantiation is strictly followed, the qualitative research shall have the criteria required to be considered a scientific contribution. The steps proposed by Strauss and Corbin (1990) are the following:

1 Preparation of data; 2 Conceptual ordering: Integration of data into categories; 3 Theorization: Delimitation of the theory that starts developing (coding, analysis and comparison of real data with abstract data); 4 Final draft of a report, as product of saturated data per incidents in each category.

2.1 Stage 1. Preparation of data

With the purpose of following the procedure outlined, the stage of preparation of data involved two actions: first, the documentary classification of literature originated from the search of the key terms with which intrapreneurship is identified in the Web of Science™ (WOS), 121 sources published between 1980 and 2017 were found in the categories of administration, business, and economics. Additionally, a search was conducted in Scopus® using the same classification criteria, obtaining a compilation of 162 articles.

The processing of these documents in the bibliographic manager Mendeley allowed the elimination of duplicated works, therefore a collection of 227 sources was obtained; those sources were managed with other tools such as Pajek and BibExcel for their graphic

representation. These actions allowed us to identify authors with more publications in the field, and research clusters; however, the fact of having high publications indexes in the field does not guarantee that they really are representative in the research of intrapreneurship, reason why we proceeded to the visualization of the highest citation indexes in WOS, and the technique of filtration based on relevance of documents en Scopus®.

The compilation and analysis of the documents described made it possible to create a documentary information database regarding the concepts, characteristics and dimensions of intrapreneurship. The aforementioned was done to enrich, and in its due time to contrast the information obtained from the contributions made by of the research subjects.

The second action included the process of drafting, application and transcription of an instrument of qualitative research, which was a structured script for focused interviews, in other words, oriented to subjects showing similar characteristics, and with a strict attachment to questions previously prepared.

Regarding the characteristics of the instrument, its aim was: *To gather descriptions, opinions, beliefs, and experiences from the interviewee, regarding the internal and external factors that he considers to influence the development of entrepreneurship and innovation actions within organizations, in order to enrich the planning of an intrapreneurship model applicable to the context in which the Mexican corporations of the software sector develop.* Such instrument consisted on 14 questions of introductory, key, reinforcement and closing types, which intended to answer the research question asked in the first section of this article.

The interviews were conducted and recorded in audio format, with the informed consent of the research subjects, during the month of November 2018, and the average time spent in each interview was of 47 minutes. It is important to mention that, despite the theoretical notions of the interviewer regarding intrapreneurship, it was attempted, at all times, to follow criteria of non-discretion, specificity, amplitude, and congruency during the interview.

Regarding the sample, it is worth mentioning that it was of an intentional type, following the recommendations given by the Grounded Theory, as well as those given by Miles and Huberman (1994) who suggest that the sample configuration should be based on the needs for information, and that the credibility of a research project depends at a greater extent on the richness of the information collected and the researcher's analytical capabilities, than on the size of the sample.

Under this argument, the interviews were conducted by telephone and in person - five and three respectively - to eight project leaders of software industry - chart 1 - whose companies stand out for being highly innovative in their field. The companies that participated in this study were heterogeneous, because in some cases, they only engage indirectly with software development however, all of the research subjects had substantial experience in companies of this nature.

Chart 1 – Description of subjects and companies

	Subject	Age	Sex	Company	Approx. no. of employees	Years in the field	Place of interview	Type
1	Bernal, F.J.	31	M	Company 1	41,000	79	Victoria	In person
2	Romero, R.	29	M	Company 2	100	11	Victoria	In person
3	Palacios, B.	35	M	Company 3	43,391	17	Monterrey	By telephone
4	Torres, D.	32	M	Company 4	52	38	Monterrey	By telephone
5	Bautista, M.	35	F	Company 5	80	10	Querétaro	By telephone
6	Carrizales, P.E.	31	M	Company 6	12,000	68	Victoria	In person
7	Martínez, C.	30	M	Company 7	70	10	Victoria	By telephone
8	Trujillo, M.	40	M	Company 8	500,000	22	Washington	By telephone

Source: Own preparation.

The application procedure consisted firstly in the introduction interviewer-interviewee. Afterwards, an agreement of confidentiality; the consent for the use of data; the presentation of the research objective were all read, and then the question and answer session of the questions included the instrument was carried out. The information recorded in audio format was transcribed and coded through classification of fragmented data using the software Atlas Ti.

2.2 Stage 2. Integration of categories

This stage is also known as “conceptual ordering” and it refers to the organization of data into categories, which are known as families in Atlas Ti®. For the case of these interviews, once transcribed, they were provisionally coded, and the data was categorized into similar families, as suggested by Miles, Huberman and Saldaña (2013), who propose such process for qualitative researches that are based on, corroborate, or deepen phenomena for which there is a previous notion or knowledge. The categories or code groups assigned were the ones shown below:

Chart 2 – Categorization of mentions

Categorization	Code	Concept
Concept	CO	Connotation that the interviewee attributes to intrapreneurship
Characteristics	CA	Characteristics of the normative perception in terms of resources and capabilities of the intrapreneurial corporation of the software field
Environmental factors +	EF+	Factors of the external environment considered by the interviewee as stimulating elements for intrapreneurship
Environmental factors -	EF-	Factors of the external environment considered by the interviewee as inhibitory elements for intrapreneurship
Organizational factors+	IF+	Organizational or internal factors, considered by the interviewee as stimulating elements for intrapreneurship
Organizational factors -	IF-	Organizational or internal factors, considered by the interviewee as inhibitory elements for intrapreneurship

Recommendations	RE	Perception of the characteristics absent in the Mexican corporations of software industry for the development of intrapreneurial behavior
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Source: own preparation

2.3 Stage 3. Theorization

To Strauss and Corbin (1990), the term theory “...denotes a set of categories well constructed, for example, topics and concepts, systematically interrelated through sentences that indicate relationships, to create a theoretical framework that explains a social, psychological, educational, nursing phenomenon, or of any other kind” (p. 33). Specifically in this research, the establishment of categories, their temporary coding and the final coding, allowed us to contrast the data with the information resulting from the literary analysis, in other words, the contrast between the real data and the abstract data regarding intrapreneurship.

2.3.1 Intrapreneurship, conceptualization and characterization

A brief retrospective regarding intrapreneurship traces its conceptual origins back to the seventies, when Collins and Moore (1970) distinguished, for the first time, entrepreneurship of an independent nature from corporate entrepreneurship. Later, Sharma and Chrisman (1999), would define the former as: “... the process whereby an individual or group of individuals, acting independently of any association with an existing organization, create a new organization” (p.92); and the latter as: “...the process whereby an individual or a group of individuals, in association with an existing organization, create a new organization or instigate renewal or innovation within that organization” (p.92).

This cumulus of conceptualizations demonstrate the lack of a unique and consensual definition (Coduras, Guerrero and Peña, 2011, Hornsby, Kuratko and Zahra, 2002; Kuratko and Morris, 2018; Lumpkin and Dess, 1996; Parker, 2011), for instance, Lumpkin and Dess (1996), just as Ireland et al. (2009), mention different levels of intrapreneurship such as: individual, groupal and organizational, and Stevenson and Jarrillo (1990) assume that this phenomenon is nourished, in accordance with several disciplines and that go beyond the economic-administrative sciences, including, for example, sociology and psychology, which allow to reflect on the individual’s nature, its importance, and on the environmental variables.

The following chart summarizes some of the conceptual notions of intrapreneurship; the first manifestations of this phenomenon identified it as an act of creation of new business units, independent from the organization. However, this process is known today as just one particular dimension of intrapreneurship, since aspects related to diversification, the corporation’s strategic and structural restructuring, and innovation, have been added over time.

Chart 3 – Conceptual notions on intrapreneurship.

AUTHORS	CONCEPT
Collins and Moore (1970)	They distinguish two types of corporations: 1) corporate entrepreneurship; 2) Independent enterprise.
Burgelman (1984)	...is extending the firm's domain of competence and corresponding opportunity set through internally generated new resource combinations (p. 154).
Nielsen, Peters and Hisrich (1985)	...is the development within a large organization of internal markets and relatively small and independent units designed to create, internally test-market and expand improved and/or innovative staff services, technologies or methods within the organization. This is different from the large organization entrepreneurship/venture management strategy that tries to develop internal entrepreneurial/venture units whose purpose is to develop profitable positions in external markets (p. 181).
Pinchot (1985)	Intrapreneurship is a method of using the entrepreneurial spirit where many of our best people and resources are: in large organizations (pp. 3-4).
Jennings and Lumpkin (1989)	...corporate entrepreneurship to be a multidimensional concept that incorporates a firm's activities direct at product and technological innovation, risk taking, and proactiveness (p. 486).
Guth and Ginsberg (1990)	Entrepreneurship involves the identification of market opportunity and the creation of combinations of resources to pursue it... the topic of corporate entrepreneurship encompasses two types of phenomena and the process surrounding them: (1) the birth of new businesses within existing organizations, i.e. internal innovation or venturing; and (2) the transformation of organization through renewal of the key ideas on which they are built, i.e. strategic renewal. (p.5).
Zahra (1991)	...refers to the process of creating new business within established firms to improve organizational profitability and enhance a company's competitive position (p. 260-261).
Covin and Slevin (1991)	Entrepreneurship is described as a dimension of strategic posture represented by a firm's risk-taking propensity, tendency to act in competitively aggressive, proactive manners, and reliance in frequent and extensive product innovation (p. 7).
Zahra (1993)	Corporate entrepreneurship is a process of organizational renewal... that has two distinct but related dimensions: innovation and venturing, and strategic renewal... Innovation and venturing activities stress creating new business through market developments or by undertaking product, process, technological and administrative innovations. Venturing can occur throughout the firm, with the goal of improving Company profitability and competitive position. The second dimension of corporate entrepreneurship embodies renewal activities that enhance a firm's ability to compete and take risks (p. 321)
Lumpkin and Dess (1996)	The essential act of entrepreneurship is new entry. New entry can be accomplished by entering new or established markets with new or exist-ing goods or services. New entry is the act of launching a new venture, either by a start-up firm, through an existing firm, or via "internal corpo-rate venturing". An EO [entrepreneurial orientation] refers to the processes, practices, and decision-making activ-ities that lead to new entry (p. 136).
Knight (1997)	Entrepreneurship is a fundamental posture, instrumentally important to strategic innovation, particularly under shifting conditions in the firm's external environment. The notion of entrepreneurial orientation is applicable to any firm, regardless of its size and type. (p. 215).
Sharma and Chrisman (1999)	Corporate entrepreneurship is the process whereby an individual or a group of individuals, in association with an existing organization, create a new organization or instigate renewal or innovation within that organization. (p.18)

Antoncic and Hisrich (2001)	...is defined as entrepreneurship within an existing organization. It refers to a process that goes on inside an existing firm, regardless of its size, and leads not only to new business ventures but also to other innovative activities and orientations such as development of new products, services, technologies, administrative techniques, strategies, and competitive postures. (p.498).
Antoncic and Hisrich (2003)	...is defined as entrepreneurship within an existing organization, referring to emergent behavioral intentions and behaviors of an organization that are related to departures from the customary (p. 9).
Kuratko, Ireland, Covin and Hornsby (2005)	[is] ...a type of proactive behavior that can stimulate desired innovation. In an innovation context, effective CE facilitates the firm's efforts to exploit its current competitive advantages and explore for tomorrow's opportunities and the competencies required to successfully pursue them (p.699).
Rutherford and Holt (2007)	CE is the process of enhancing the ability of the firm to acquire and utilize the innovative skills and abilities of the firm's members (p. 430).
Ireland et al. (2009)	CE strategy is a vision-directed, organization-wide reliance on entrepreneurial behavior that purposefully and continuously rejuvenates the organization and shapes the scope of its operations through the identification and exploitation of entrepreneurial opportunity (p. 21)
Parker (2011)	Intrapreneurship — also known as corporate entrepreneurship and corporate venturing — is the practice of developing a new venture within an existing organization, to exploit a new opportunity and create economic value. Entrepreneurship involves developing a new venture outside an existing organization.(p. 19).
Antoncic and Antoncic (2011).	Intrapreneurship can be defined in broad terms as entrepreneurship within an existing organization. Intrapreneurship includes entrepreneurial behaviors and orientations of existing organizations (p. 591).
De Villiers-Sheepers (2012)	Generally, CE refers to the development and pursuit of new business ideas and opportunities within established firms... In most cases, CE describes the total process whereby established enterprises act in an innovative, risk-taking and proactive manner (p. 328).
Kearney et al. (2013)	...it is generally defined as a set of organizational level activities that focus on the discovery and pursuit of new opportunities through acts of venturing, renewal, innovation, risk taking and proactivity (pp. 328-329).
Ahmed and Amjad (2013)	Intrapreneurship is the act of behaving like an entrepreneur within corporate environments (p. 88).
Kuratko and Morris (2018)	CE is a term used to describe entrepreneurial behavior inside established midsized and large organizations... Other popular or related terms include organizational entrepreneurship, intrapreneurship, corporate venturing, and strategic entrepreneurship... Regardless of the reason the firm decides to engage in CE, it has become a major strategy in all types of organizations (p. 43).
Galván and Sánchez (2018)	Intrapreneurship represents the entrepreneurial practice or behavior in corporations, independently of their nature or size, characterized by a philosophy of readiness to change, as well as a general vision focused on the exploration and/or exploitation of the opportunities presented by the context, through an adequate combination of resources and development of productive and innovative activities, like the creation and/or substantial improvement of products, services, internal organization methods, processes, technologies and markets (p. 173).

Source: Own preparation, based on Galván and Sánchez (2018, p. 168-169).

As the chart above shows, the context of the company, and its proper exploration and exploitation represent an incentive in the birth of intrapreneurial actions. Also, the first contributions of the 21st century begin to assimilate the effect that certain aspects related to organizational philosophy have over entrepreneurship in the organization, and its incremental or radical transformation.

It is notorious that most of the authors refer to intrapreneurship as a process (e.g. Antoncic and Hisrich, 2001, 2003; Burgelman, 1983; De Villiers-Sheepers, 2012; Rutherford and Holt, 2007; Sharma and Chrisman, 1999; Zahra, 1991, 1993). Others define it as a set of actions in the corporation (e.g. Burgelman, 1984; Jennings and Lumpkin, 1989; Kearney et al., 2013; Lumpkin and Dess, 1996; Pinchot, 1985); or, a series of good organizational practices (Parker, 2011); or as a capability (Rutherford and Holt, 2007); and some other more recent contributions describe it as behavior related matters, regarding the company's position (Knight, 1997); a focused vision (Ireland et al., 2009); a behavioral intention (Antoncic and Hisrich, 2003) or the organizational behavior in general (Ahmed and Amjad, 2013; Kuratko et al., 2005; Kuratko and Morris, 2018)

In the same manner, most of the contributions made by the theoreticians in this matter, suggest the presence of the dimension of innovation, through the introduction of new and substantially improved products, services, management methods, and strategic or technological changes (Covin and Slevin, 1991; Jennings and Lumpkin, 1989; Knight, 1997; Kearney et al., 2013; Kuratko et al., 2005; Sharma and Chrisman, 1999; Zahra, 1993). This innovation would appear due to the exploration and exploitation of new markets (Nielsen et al., 1985; Pinchot, 1985; Lumpkin and Dess, 1996), and the effective use of opportunities present in the context (Burgelman, 1984; Ireland et al., 2009; Parker, 2011).

Besides innovation, the authors mention other representative dimensions of the phenomenon such as the opening of new businesses, the strategic renewal, the productivity, and the assumption of risk, or risk taking (Antoncic and Hisrich, 2001; Covin and Slevin, 1991; De Villiers-Sheepers, 2012; Guth and Ginsberg, 1990; Jennings and Lumpkin, 1989; Kearney et al., 2013; Ireland et al., 2009; Sharma and Chrisman, 1999; Zahra, 1991, 1993).

Additionally, among the corporate capabilities, an adequate combination of resources is contemplated (Burgelman, 1983, 1984; Kuratko et al., 2005; Ireland et al., 2009), as well as aspects regarding results produced by intrapreneurship, like the improvement of the innovative skills (Rutherford & Holt, 2007); the improvement of the competitive position, or of the domination over competitors (Burgelman, 1983, 1984; Covin & Slevin, 1991; Zahra, 1991); and the general creation of value (Kuratko et al., 2005; Parker, 2011).

In contrast with what has been stated about the research subjects, it is assumed that despite being continuously developing entrepreneurship actions, most of them ignore the terminology attributed to intrapreneurship. During the first approach to the research subjects, they showed a lack of familiarity with the term, five of them said they had never heard of

“intrapreneurship”, two of them said they had heard something about it, and one of them said to be well informed about it.

Consistently with the information above, the individuals, after hearing the term were able to come up with some concepts, which include elements like “undertaking from your work site” (5 mentions [5m]), with contributions like “...it is the entrepreneurship within the company, as part of your role in the information technology...” (B. Palacios, personal communication, November 9th 2018) or “...basically I understand it as internal entrepreneurship ...” (F.J. Bernal, personal communication, November 8th 2018); or, “making innovations” (4 m), or “the company’s action force” (2m), or as a “digital transformation process” (1m). The following chart summarizes the subjects’ statements.

Chart 4 – Conceptualization according to interviewees

CODE	MENTIONS
CO: Undertaking from your work place	5
CO: Making innovations	4
CO: Company power	2
CO: Digital transformation process	1

Source: Own preparation from data in Atlas Ti7.

It is worth mentioning that due to the lack of familiarity with this phenomenon, the interviewees were explained what intrapreneurship consists on, thus deepening their knowledge, according to their characterization:

One of the main characteristics expressed by the interviewees regarding the intraprenurial organization is the disposition and openness to new ideas (4m). Among the mentions in this regard are: “...it means to take the people’s ideas...” (P.E. Carrizales, personal communication, November 12th 2018), and “...sometimes among the projects they are blocked, the project leader says -No, not that!- and maybe the director would have liked it, or maybe it could have benefitted the company, I think openness to new ideas mainly...” (R. Romero, personal communication, November 8th 2018). Also, one of the interviewees presented an example regarding one of the largest software companies in Mexico in which he works

...each year the workers present a document, such document must contain improvement ideas, in that instrument they tell you -you know? We have X number of ideas per department - and from those the ones that look the most profitable are chosen, and receive investment money ... (M. Trujillo, personal communication, November 14th 2018).

It is worth mentioning that in the literature, openness to new ideas is one of the two aspects most frequently mentioned, the corporate philosophy regarding the entrepreneurship vision, and the support from the senior officers to the ideas given by the subordinates (Kuratko et al., 2005; Kuratko, Hornsby and Covin, 2014; Moriano, Topa, Molero and Lévy, 2011).

On the other hand, regarding “readiness to change”, this characteristic was mentioned in 4 contributions, among those, the opinion of de F.J. Bernal stands out, he said that “... *sometimes that has a lot to do, if there is resistance to change, then it is difficult to apply this methodology, therefore I believe that this is the most important one, and the disposition to do it...*” (Personal communication, November 8th 2018) and that of B. Palacios who said that the intraprenurial corporations must have: “...*flexibility, agility, adaptation to change, and... also must [have] a section of organizational change management process...*” (Personal communication, November 9th 2018). Specifically in the case of a multinational and highly entrepreneurial company, M. Trujillo stated, “...*here, we are not afraid to take risks, that is the most important, our hands do not shake before anything ...*” (Personal communication, November 14th 2018).

Among other aspects mentioned by the interviewees as characteristics of an intraprenurial corporation we can identify innovation in general (3m); and some of them alluded specifically to product innovation (2m), it was stated that the importance of such “...*may have the possibility of a new technology, tool, implemented to the process that we already have... it may allow the employees to carry out a new non-standardized way to work, unfixed...*” (C. Martínez, personal communication, November 12th 2018). R. Romero, also said that:

I think that mainly the products or the projects that are offered, that’s where we find out if they are making a traditional project, a recurring project, or a new project, it is surprising even for the client, who still does not realize the scope that innovation may have; we have to make it noticeable. (Personal communication, November 8th 2018).

Some less mentioned characteristics were: training (2m) “...*it is important to allow and support the employees to get trained in this subject ...*” said R. Torres (personal communication, November 9th 2018); effective communication (2m), “...*communication with employees is necessary in every line, starting with the director, and up to the project leader and the developer, in order for ideas to flow*” (R. Romero, personal communication, November 8th 2018); digital transformation (2m), for which, one of the most prominent contributions was that of B. Palacios, who works as Manager of Enterprise Architecture at one of the most important software enterprise in México.

I believe that the most innovative companies nowadays in terms of software are working with topics such as the Internet of Things, and they are designing the future of what digital transformation would be. Such digital transformation initially originated from topics such as agility, which began with *Agile Manifesto*, etc., and has been evolving towards a whole topic, therefore I believe that corporations that are working building the future of digital transformation, with both the theoretical topics and the technologies *per se*, are the corporations that I consider to be entrepreneurial; now: what do I refer to when I say that they are working with the digital transformation?, that they are not only doing it, but also evaluating if it is something that generates value in the industry or not, and how to improve

that; as leading corporations in this regard, I understand and know that there are some, at world level, for instance Amazon, Dell, Microsoft, that are researcher further ahead in the topic of the *Internet of Things* or digital transformation systems, in order to carry out such action, and that is what I personally consider would be an innovative corporation; even though, well, Amazon is not exactly a corporation of software development, but Microsoft and Dell are. (Personal communication, November 9th 2018).

Now, regarding the other less frequent elements mentioned, but that are worthwhile pointing out, in the sense that they have also been considered in previous researches in the intrapreneurship field are: the vision, the entrepreneurial mindset, the search for opportunities, the agility, the continuous improvement, the flexibility, the flow of ideas, the use of IT, and the innovation in processes.

2.3.2 Intrapreneurship Environmental Factors: real variables

Some existing theoretical-empirical models support the phenomenon of intrapreneurship in their application contexts, in other words, in highly dynamic and developed economies, but those may be very different from the reality of the business dynamics of emergent economies immersed in hostile environments. The aforementioned may be supported with the information collected from the interviews, which is summarized below, in two families or categories that involve the positive environmental factors (external) and the negative environmental factors (external) .

Chart 15 – Positive external environmental factors (EF+)

CODE	MENTIONS
EF+: Government support: agreements and relationships	8
EF+: Competitive rivalry	8
EF+: Favorable changes	4
EF+: Economic stability	3
EF+: Geographical location	1

Source: Own preparation.

One of the external environmental factors that the interviewees relate at a greater extent with intrapreneurship is government support, mainly regarding agreements and cooperation relationships that companies of the software industry maintain with the public sector. Among the most representative mentions include the contributions of F.J. Bernal, who states: “...*the biggest part of cash flow occurs in the government, therefore that is a very strong political factor, as a corporation, to have the possibility to make some intrapreneurship*”, as well as, in the specific case of the company where he works, he said:

... [My company] when it was contracted by the government, well that brought many opportunities, and there were certain improvement areas that were taken into account, for instance the cashiers issuing birth certificates, since it was a project that was made for the

government, it was an innovation, and entrepreneurship by opportunity. (F.J. Bernal, personal communication, November 8th 2018).

In general, the government factor for the case of the emerging economies has been conceived in other researches under similar contexts, for instance, in the work of Galván, Sánchez and Santos (2018), who made interviews to owners, or managers of small and medium sized companies in Tamaulipas highly related to innovation and intrapreneurship, during which they supported that dimension in 11 mentions, and stated that when the government acts in favor of a corporation in areas such as support, subsidies and programs that foster innovation, science, and technology, or through fiscal incentives, training, or public credits, among other benefits, that company has the possibility to innovate.

Among other aspects mentioned by the research subjects, there is a strong consideration of matters regarding competition (8m), regarding both competitive rivalry (7m) and low competition (1m). The aforementioned is supported in the intrapreneurship-related literature, in which both aspects are mentioned as enhancers of intrapreneurship development, with the understanding that a corporation located in contexts of high competitiveness tends to strive for survival and, that contexts of low competition generate multiple opportunities for expansion (Antoncic, 2007; De Villiers-Sheepers, 2012; Zahra, 1993).

Competition in software industry was described as: “...*a butchery*...”. Referring to the industries of the field that are located in highly dynamic and competitive environments, saying that this “...*allows both [improving and worsening] because if you do not improve you stop being efficient in the market, this simple, it means survival for companies, as well as for individuals ...*” (M. Trujillo, personal communication, November 14th 2018).

In this regard F.J. Bernal (personal communication, November 8th 2018) stated that this competitiveness has even more repercussions than those related to political factors, mainly in big cities where corporations fight for clients at a greater extent than they do to get subsidies. R. Romero (personal communication, November 8th 2018), he said that competitive rivalry is an invitation to intrapreneurship since it allows them to improve, compare, and reflect about the products or services offered by the corporation. M.C. Bautista (personal communication, November 11th 2018) also said that this competitiveness is an opportunity for total improvement in the corporation, and that it clears the way for the development of innovations and entrepreneurship. P.E. Carrizales (personal communication, November 12th 2018) stated that competitiveness allows the environmental scanning and promotes “...*staying in the game*...”; and, in addition to the considerations above, R. Romero (personal communication, November 8th 2018) indicated that little competitiveness is also favorable, for example, “...*right now in the city [referring to Victoria, Tamaulipas] there is not so much competition as there is in other places, this is also beneficial because it gives the companies space to move as they deem convenient*”.

Among other matters present in several mentions are some favorable changes (4m), among which the ones that stand out are the changes in the communication tendencies among individuals, in the understanding that this represents an opportunity to innovate in the software sector; and the changes in the consumption trends; as well as in the manners in which business are done. For example, B. Palacios said about this that:

The changes in the ways people communicate, and the changes in the way companies do business, led to innovation, what happened? Well, when Internet began to emerge; when electronic commerce started, to mention some, the companies were forced either to change or to improve, and that is where several [companies] died, that was a change, the change in the way people communicate and the change in the way of doing business; for instance, now there is a myriad of people who buy online, well that is a favorable change in the subject of intrapreneurship in software companies (personal communication, November 8th 2018).

Other aspects less mentioned by the interviewees were economic stability (1m), mainly meaning that the individuals in the corporations, who are supposed to be those who develop new ideas, are able to meet, at least their most basic needs. (M. Trujillo, November 11th 2018); and the corporation's geographical location (1m), as expressed by D. Torres (personal communication, November 9th 2018), who stated that a company located in a context of a low technological level shall not have the same opportunities to undertake as those located in cities with infrastructure and conditions that allow expansion.

Regarding the identification of external environmental factors that negatively affect the intrapreneurial development (EF-), from the perspective of the research subjects, the following chart shows them:

Chart 6 – Negative external environmental factors (EF-)

CODE	MENTIONS
EF-: Competitive rivalry	5
EF-: Economic and political instability	3
EF-: Scarce government agreements	3
EF-: Geographical location	2
EF-: Cost reduction and competitor's advantage	2
EF-: Few clients	1

Source: Own preparation.

Regarding competitive rivalry (5m), this has already been mentioned before making this information reiterative; the subjects stated that competitiveness has both positive and negative repercussions in the development of an intrapreneurial behavior. However, other contributions are focused specifically in pointing out noxious aspects for the corporation, like cost reductions due to multiple offers of software services, as well as advantages of older companies, with more experience, and more resources in the sector (2m).

Another aspect mentioned was economic and political instability, J.M. Bernal mentions the specific case of the company he works in, which kept a privileged position based on the political relationships, however, a political transition caused a decrease in the innovations offered to the public sector (personal communication, November 8th 2018).

Among other matters less referred to are the scarce government agreements of this type of corporations, the geographical location – previously mentioned - and the disadvantages that cause that clients do not recognize a company as an option for the acquisition of software, fact which is also related to brand recognition and purchase decision.

2.3.3 *Intrapreneurship organizational factors: real variables*

Organizational factors are understood as the endogenous elements, or those that are part of the organization's responsibility (Antoncic and Hisrich, 2001; Covin and Slevin, 1991). Data collected from the interviews, differ a little from the factors considered in the intrapreneurship models available, mainly those regarding human resources, their motivation, training and commitment. However, other factors mentioned by the research subjects have been considered, measured and tested in previous models (eg. Alpkan et al., 2010; Antoncic, 2007; Antoncic and Hisrich, 2001, 2003; Covin and Slevin, 1991; Guth and Ginsberg, 1990; Ireland et al., 2009; Kearney et al., 2013, 2010; Kuratko and Audretsch, 2013; Kuratko et al., 2014; Zahra, 1991). The following chart summarizes the contributions of the subjects in this matter:

Chart 7 – Positive internal organizational factors (IF+)

CODE	MENTIONS
IF+: Human talent	8
IF+: Employee autonomy	7
IF+: Risk aversión	7
IF+: Entrepreneurial cultura	6
IF+: Comfort at work	4
IF+: Employee commitment	4
IF+: Administrative support	3
IF+: Self-renovation	3
IF+: Employee training	3
IF+: Time availability	3
IF+: Own resources	3
IF+: Motivation and rewards	2
IF+: Teamwork	2
IF+: Innovation in general	2
IF+: Readiness to change	2
IF+: Others	13

Source: Own preparation.

Human talent has been considered the most recurrent element (8m) by the interviewees, this is similar to the results obtained in the research conducted by Galván et al. (2018), who found a high substantiation in matters related to human resources (24m), mainly regarding their skills, abilities, characteristics, motivation, and proactive behavior or task receptivity. In this regard, among the contributions made by B. Palacios, it can be found that:

There is something in the company that we call human capital and it refers to having a talent and human capital integration plan... because if you don't pay proper attention to this matter, even if you have an entrepreneurial organizational culture, you will not be able to observe this type of behavior in the company, you need people to have the motivation, for example, as we say in México "that they wear the company's colors with pride" because if you hire an average employee, who simply started to work there because he had a certain need, but he does not feel part of the corporation - in my case I can tell you that I feel as the owner of the company-, if it is not like that, that employee will not generate much. (Personal communication, November 9th 2018).

On his part, D. Torres said "...one of the most difficult things for a company is to get capable people, I have had the chance to interview 20 or 30 individuals, I have done, it and it is complicated to find people well trained to do the work" (personal communication, November 9th 2018); P.E. Carrizales also stated "*The personnel, the workers that we have are well educated people, and have a lot of new ideas, they tend to share their ideas, and from there you generate other new ideas that may be improved, the ones they have, or the ones that we generate*" (personal communication, November 12th 2018). As well as, M. Trujillo, said that innovation and entrepreneurships in his company always come from human talent; in his words:

Ideas always come from the engineers, in other words from the hands that do the work, an engineer makes a proposal and says that something can be done, evidence about it is then presented, and he says this may cost this amount of money, but I am going to earn this amount of money, in other words, it is a risk, but do you want to try it or not? And this is how things start, and the one who makes the decision is the director. (Personal communication, November 14th 2018).

However, according to the interviewees one way to exploit the employees' creative talent is complying with certain requirements, as a company; among those requirements we have training (3m), or the promotion of an optimal work environment (4m), that is to say, the fact that the employees feel comfortable within the facilities, because they are not just general workers that must follow guidelines or standardized tasks (R. Romero, personal communication, November 8th 2018). In the same manner, it is essential to give them some kind of autonomy (7m).

The aforementioned is complemented with the contributions made by multiple researches that suggest that autonomy, understood as "...top-level managers' commitment to

tolerate failure, provide decision-making latitude and freedom from excessive oversight, and to delegate authority and responsibility to middle-level managers...” (Kuratko et al. 2005, p. 703), is an element that influences positively and significantly the intraprenurial behavior (eg. Alpkán et al. 2010; Galván and Sánchez, 2017; Hornsby, Kuratko, Holt and Wales, 2013; Marenthabile, 2017; Tatikonda and Rosenthal, 2000).

To M. Bautista it is important to provide the employees with enough freedom to innovate, as well as with opportunities to express themselves and propose new ideas (personal communication, November 11th 2018), Also, to C. Martínez, it is essential to adopt a flexible behavior regarding work in the software sector, and delegate decision making authority to employees (personal communication, November 12th 2018).

The information above is closely related to time availability, in other words, the provision of free time for the development of ideas. This variable has been widely mentioned in the literature regarding intrapreneurship, therefore there is evidence that, depending on the sector, free time may be related to intraprenurial behavior, or not, for example, Alpkán et al. (2010) found that in manufacturing sectors free time resulted counterproductive. However, other researches demonstrate the opposite (Hornsby et al., 2013; Kuratko et al., 2014; Van Wyk and Adonisi, 2012). Concerning the software sector, M. Trujillo said that at least at *Amazon*, free time for employees is one of their strategies (personal communication, November 14th 2018) and P.E. Carrizales stated:

The lack of time and saturation of projects, as we have a great amount of work, we need to be in two or three projects at the same time, and as a consequence there is no time to be checking, updating; we may have ideas but the lack of time, well... it forces you to put them off. (Personal communication, November 12th 2018).

Another element mentioned in the contributions made by the individuals is the one regarding motivation and rewards (2m). Matters concerning rewards have been related to intraprenurial behavior since the first studies conducted by Kuratko, Montagno and Hornsby (1990), who recognized it as “...the degree to which the organization is perceived uses incentive systems based on business activity and success” (Kuratko et al., 2014, p. 34), and from the point of view of the Expectancy Theory by Vroom de 1964, incentives to employees have been related to the fulfillment of organizational objectives, fact that has been proven in multiple researches about intrapreneurship (eg. Alpkán et al., 2010; Galván and Sánchez, 2017; Hornsby, Kuratko, Shepherd and Bott, 2009; Hornsby et al., 2013).

In this regard, D. Torres mentions that it is necessary “...*that there is some type of reward or recognition, not only monetary, but of any other type, in other words, an acknowledgement through a certificate or something else, because the work you are doing needs to be acknowledged ...*” (personal communication, November 9th 2018).

Among other aspects related to the company's human resources is commitment towards the company one is working for (4m), as has been expressed by M. Trujillo “...*that they wear the company's colors with pride...*” (personal communication, November 14th 2018), as well as, the disposition employees have to participate in teamwork (2m), since as pointed out by the interviewees “...*sometimes a good résumé is not enough, but to work as a team number, sometimes opinions may clash and that cannot delay development or sales productivity* (R. Romero, personal communication, November 8th 2018).

Additionally, regarding the managerial actions necessary for behavior development, there is administrative support (3m) “...*that you feel your bosses' support in the organization in order to innovate...*” declared M. Bautista (personal communication, November 11th 2018), or “...*we need to take the employees into account, it has to be done, they are the ones who have the ideas, the innovations, the ones that support them...*” said M. Trujillo (personal communication, November 14th 2018).

In the literature, the administrative support variable has been present as an organizational factor of great importance in the development of internal entrepreneurship (eg. Alpkan et al., 2010; Hornsby et al., 2013; Moriano et al., 2011; Rutherford and Holt, 2007; Srivastava and Agrawal, 2010; Van Wyk and Adonisi, 2012), administrative support is identified as the senior officers' will to promote intrapreneurship, including also the support to the innovative ideas coming from the employees, as well as the adequate management of resources so that they are accomplished (Kuratko et al., 2005; Kuratko et al., 2014; Moriano et al., 2011).

On their side, interviewees also stated repeatedly (8m) the importance of having a risk aversion mindset, M. Trujillo, mentioned the importance of this factor during the whole interview, using statements like: “...*well the most important thing, I thinks, is to take risks, to try new things, because many times that investment... well, it is not going to produce, I mean you are going to throw it away, because the paths you took or the decisions tat were made were not the best...*” “...*I think that the most important thing for innovation to take place is that the company be willing to take risks and to lose...*” “...*Simply put, if you have an idea, that does not mean that your innovation or idea is right, you might be making a mistake, as it happens to all of us everyday, then you have to be ready to take the risk that such failure will bring, because it is going to cost man-hours and man-hours cost money...*” “...*we have this concept, but implementing it costs 1 million dollars, do you take the risk or not? If it works we are going to save 50 millions, if it doesn't work we are going to lose that million, that is what a company must be willing to do, take the risk...*” and he concluded as follows “...*the biggest strength in my company is that they are not afraid, their hand does not shake at the moment of investing, their hand does not shake at the moment of researching new things, of investing in new projects, new markets...*” (personal communication, November 14th 2018).

Regarding risk aversion or tolerance to uncertainty, the literature about the topic has also identified this element as a dimension inherent to intrapreneurship, then the statements

made by the research subjects support what has been contributed by multiple researches (e.g. Covin and Slevin, 1991; De Villiers-Sheepers, 2012; Kearney et al., 2013; Lewin, Massini and Peeters, 2011; Schindehutte, Morris and Kuratko, 2000; Zahra, 1991). Additionally, another dimension considered in the literature and which was supported by several mentions during the interviews was the self-renovation ability (3m), which is recognized in terms of intrapreneurship as the ability to transform the fundamental ideas upon which the organization is built, in other words, the internal reorganization, strategic reformulation, and drastic administrative changes (Antoncic, 2007; Guth and Ginsberg, 1990; Zahra, 1991). This variable is also supported with mentions related to readiness to change, for example, R. Romero stated:

If there is resistance to change, to be open to innovation, and make little changes to its type of industry, or type of projects, with the intention to continue moving forward, we will fail, take for example *Blockbuster*, that had everything to modify its type of industry and compete in the *streaming* industry as *Netflix* and others, but they did not have an openness to change, fact that practically made them disappear, then, we need to have that openness in which if something works well, but you know it can be improved, then there needs to be a disposition to make the necessary adjustments. (Personal communication, November 8th 2018).

On the other hand, another mention highly related to intrapreneurship, according to the research subjects, was the corporation's entrepreneurial vision, coded in this document as "entrepreneurial culture", this factor has been contemplated in previous studies, and for instance Kanter (1985) said that culture is a determinant factor in corporate entrepreneurship. Burgelman (1984) he also pointed out the effects of this factor in the development of innovations; Guth and Ginsberg (1990) presented in their pioneer model certain aspects related to behavior and form of organization, which included strategy, structure, values, and beliefs that characterized the organization. Zahra (1991) also included philosophical and intangible aspects in his model like the most dominant organizational values.

Among the contributions made by the individuals interviewed, certain elements were pointed out that are similar to the contributions of the theoreticians mentioned. B. Palacios mentions, for instance, "...there must be an internal culture that promotes entrepreneurship..." (personal communication, November 9th 2018); F.J. Bernal said "... I think that all this about entrepreneurship is really a consequence of how you are as company, in other words, if you promote or not this behavior among your employees..." (personal communication, November 8th 2018).

Among the elements with fewer mentions in the interviews coded as "others" were some like effective communication, attention to client's needs; the search for the creation of needs; having a I+D department, environmental scanning, the company's level of growth, the continuous improvement mindset, the transfer of knowledge, among others.

The following chart presents all the elements identified as internal aspects that inhibit the intrapreneurial behavior during the coding process of the interviews, many of which will be obviated in the sense that several are simple contrapositions to the factors that promote the development of such behavior, like the loss of human talent, the lack of administrative support, or time availability, elements that have been previously mentioned.

Chart 8 – Negative internal organizational factors (IF-)

CODE	MENTIONS
Low levels of solvency	6
Company size	3
Formal controls	2
Clash of opinions or ideas	2
Loss of human talent	2
Autocratic leader	2
Time availability	2
Lack of administrative support	2
Others	7

Source: Own preparation

Regarding the information presented in the chart, certain items attract our attention like the one referring to low levels of solvency, which up to the present time has not been taken into account in the intrapreneurship models, aspect that was supported by six mentions (6m) by the research subjects, the mentions related to the size of the corporation (3m) are also notorious, which may be, according to the interviewees, an element highly related to the development of intrapreneurship. R. Romero, pointed out the following, regarding the limitations to corporate entrepreneurship:

Only the resources, it is difficult to hire personnel and give them the equipment they need to work, when the project is still not producing an adequate income, sometimes, to have an income we need to do something, to do something we need to invest resources, to have resources we need to have an income, then to enter this cycle, I think that is what may affect. (personal communication, November 8th 2018).

Additionally, M. Trujillo said: “...in my case, the economic matter, for example is very important, if you do not have money to pay for innovation, or assume the risk because it is not going to happen, it is that simple...” (personal communication, November 14th 2018) and F.J. Bernal declared: “...it is worrying that you cannot carry out new projects due to the lack of investment resources, or that you cannot compete due to the size of your company, for that reason, many corporations in the field are absorbed by bigger ones ...” (personal communication, November 8th 2018).

Regarding formal controls, it is worth mentioning that it has been a highly recognized element in literature about intrapreneurship, and which is understood as the formal procedure that rules the trajectory of new ideas in the company (Antoncic and Hisrich, 2001; Antoncic,

2007; Baruah and Ward, 2014; Galván et al., 2018; Heinze and Weber, 2015; Kuratko, Hornsby, Naffziger and Montagno, 1993; Zahra, 1991). However, this procedure has been conceived as both, a positive aspect and as a negative one, Kuratko et al., (1993) and Kearney et al. (2010), tell us that it is positive because it requires a very well organized follow up system; conversely, Zahra (1991) states that the same element is negative in the sense that excessive bureaucratic matters may discourage employees.

3 Conclusions: results final report (phase 4)

Based on the analysis of the theoretical contributions made by the main authors in the phenomenon of corporate entrepreneurship, as well as on the contributions regarding the conceptualization and characterization that phenomenon made by the research subjects, we have come up with our own definition for the term “intrapreneurship”, which, is understood as:

The organization’s practice characterized by a philosophy of readiness to change and a vision focused on the exploitation of the environmental opportunities through an adequate combination of organizational resources and capabilities, and the development of proactive and substantially innovative activities that lead to internal organization and openness for new business and markets.

The definition above involves the identification of intrapreneurship from a perspective that goes beyond a mere behavioral intention, but which involves a set of activities in which the corporation’s exogenous and endogenous conditions shall allow an optimal exploitation of resources and capabilities for the development of innovations, which contributes, at a certain extent to a comprehensive development regarding the corporation’s financial performance, its competitive capability, its strategic repositioning, its relative or absolute growth, and the general satisfaction of the entities related.

Also, as a result of the multiple mentions of the research subjects, and the abstract knowledge of the intrapreneurship phenomenon, taking as reference the most representative works of the authors: Guth and Ginsberg (1990); Zahra (1991); Covin and Slevin (1991); Antoncic and Hisrich (2001); Kuratko et al. (2005); Rutherford and Holt (2007); Ireland et al. (2009); Alpkan et al. (2010); Kearney et al. (2010); De Villiers-Sheepers (2012) and Kearney et al. (2013); it is proposed to consider the environmental and organizational variables in the representation of intrapreneurship.

In this sense, it would be important to remember the main aim of this research, which was to identify the main environmental and organizational factors that influence the intrapreneurial behavior, from the point of view of the senior officers of the software industry in northern México. Specifically in the munificent matters, it is considered important to take into account, additionally to the constructs proposed in the literature, certain aspects related to government support for the development of innovations. Also, in reference to hostile

conditions, unfavorable changes, and competitive rivalry of the sector, which represent elements that at a certain extent, may enhance the entrepreneurship behavior in the sense that, under such conditions, the corporation would be forced to innovate or die, their consideration becomes necessary.

As organizational factors, we found elements presented in the literature, such as administrative support, autonomy, communication, rewards, formal controls, support structure, and time availability (eg. Galván and Sánchez, 2017; Kuratko et al., 2005; Kuratko et al., 2014; Moriano et al., 2011). Certain elements related to human resources were also found, specifically speaking, their skills or creative talent, their commitment towards the corporation, their degree of risk aversion, and their disposition to teamwork. Additionally, aspects like the organizational culture and the provision of environmental conditions proper for the development of innovations, were came out in the research subjects' statements.

It is evident that the inclusion of solvency or liquidity to develop intrapreneurship, considering that this is an intensive knowledge sector in an emergent economy, may lead to a detriment in the intention of intrapreneurship of those companies.

It is important to clarify that the identification of a causal relationship between los constructs mentioned and intrapreneurship could only be proven with a method that involves a more strict analysis of statistic data, therefore future researches may retake the constructs hereby proposed in order to contribute to the theoretical construction of intrapreneurship, and the empirical validation of the relationships among the variables, through hypothetical-deductive reasoning, and the multivariate statistic technique.

4 Management implications

The importance of the identification of the aforementioned elements with respect to the organization management falls on different matters, a very important one is the very nature of the phenomenon, in the sense that it has been considered a key element of economic development, that is why it becomes necessary that the corporation administrators value it, in connection with their results, according to the company's growth and profit, or financial performance (Kearney et al., 2010; Kearney et al., 2013, Zahra, 1991, 1993).

In the same manner, beyond the corporation's financial statements, it has been shown that intrapreneurship produces satisfaction to stakeholders; therefore the actions taken by the higher management officers aiming at its achievement may produce an increase in the affective commitment, and in the levels of satisfaction of the working staff; and positively influence the level of commitment of investors, suppliers, clients and other entities related.

Additionally, some authors state that intrapreneurship is a key element regarding competitiveness (e.g. Parker, 2011; Turró et al., 2014). With the aforementioned, and as a consequence of intrapreneurial actions, the corporation would definitely increase its competitive capacity, and achieve its market strategic repositioning (Ireland et al., 2009).

Finally, the fact of being aware of the benefits that this phenomenon produces encourages the higher management to make decisions that promote entrepreneurial activities through actions such as the provision of support to workers with initiatives; the assumption of tolerance to failure; the establishment of incentives to entrepreneurship; the establishment of effective communication channels; the promotion of values related to productivity; the environmental scanning; and the efforts to reach a less bureaucratic, and flexible structure (Gómez, 2010).

Acknowledgments

The authors of this article wish to thank the Consejo Nacional de Ciencia and Tecnología in México (CONACYT), for its priceless efforts in the fostering of productivity and scientific diffusion.

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