

“POST”-PANDEMIC ENTREPRENEURS: CONTRIBUTION TO INNOVATION MANAGEMENT

EMPREENDEDORES “PÓS” PANDEMIA: CONTRIBUIÇÃO NA GESTÃO DA INOVAÇÃO

Submission: 16/10/2021

Accept: 14/05/2022

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ABSTRACT

Objective - This research's aim was to understand the practice of innovative management in the retail trade of the city of Sobral, Ceará, so as to provide a contribution to such enterprises' sustainability, representing more than 50% of the municipality's GDP and which have been suffering the consequences of the COVID-19 pandemic, as well as stimulating new research fronts for the retail trade's areas of innovation.

Design / methodology / approach - A field investigation was carried out through unidentified respondents by using a semi-structured questionnaire and working with theoretical creativity categories, innovation and knowledge management, so as to analyze the innovative management process. This work made use of the qualitative method with descriptive goals, and the analysis of data was done by narrative synthesis means.

Results - The results show that there is already a favorable climate for innovation management in the retail trade business segment of Sobral. However, it is observed that it is necessary to organize the segment governance and stimulate creativity and knowledge management as innovation factors. Technology transfer, through the university-business partnership, will need to be induced for the impacts and competitive transformations for the sector to be completed.

Originality / value - The research is considered relevant since the theme of innovation management in retail trade is relatively new in the scientific area, seeing that it is able to guide future research in other municipalities, as well as deepening the elements which enable a university-company approach such as the competitiveness factor which constitute the main limitations of this work.

Keywords - Creativity; Knowledge Management; Innovation

RESUMO

Objetivo - Esta pesquisa objetivou conhecer a prática da gestão da inovação no comércio varejista de Sobral, Ceará, visando oferecer uma contribuição para a sustentabilidade desses empreendimentos, que representam mais de 50% do PIB do município e vem sofrendo as consequências da pandemia do COVID-19, além de estimular novas frentes de pesquisa na área de inovação no comércio varejista.

Design / metodologia / abordagem - Trabalhou-se com uma investigação de campo através de respondentes não identificados, utilizando-se de questionário semiestruturado, com as categorias teóricas de criatividade, inovação e gestão do conhecimento, para analisar o processo de gestão da inovação. Trata-se de um trabalho que utilizou método qualitativo, com objetivos descritivos, sendo a análise dos dados feita através da análise de conteúdo.

Resultados - Os resultados mostram que já existe um clima favorável à gestão da inovação no segmento empresarial do comércio varejista de Sobral. No entanto, observa-se que é necessário organizar a governança do segmento e estimular a criatividade e a gestão do conhecimento como fatores de inovação. A transferência de tecnologia, através da parceria universidade-empresa, precisará ser induzida para que os impactos e as transformações competitivas para o setor se completem.

Originalidade / valor - Considera-se a pesquisa relevante uma vez que o tema da gestão da inovação no comércio varejista é relativamente novo na área científica, podendo orientar pesquisas futuras em outros municípios, além de aprofundar os elementos que viabilizarão a aproximação universidade-empresa como fator de competitividade, principais limitações do trabalho.

Palavras-chave - Criatividade; Gestão do Conhecimento; Inovação

1 INTRODUCTION

Creativity is part of the initial innovation process, when the idea is generated, followed by knowledge sharing and implementation (Anderson, Potocnik, & Zhou, 2014). The two processes, creativity and innovation management, must go hand in hand and fully integrate (Chibás, 2013). Correia, Mendes, and Marques (2018) analyze the relationship between knowledge management and innovation management and highlight the importance of both as valuable resources for organizations. The relationships between competitive intelligence and knowledge, information and innovation, the players of a social network, and knowledge (explicit) and know-how (tacit), are examples of knowledge management applied to the improvement of innovation management (Canongia et al., 2004; Tomaél, Alcará, & Di Chiara, 2005; Sanner, Manda, & Nielsen, 2014; Menezes et al., 2017).

The Covid-19 pandemic has transformed the economy, forcing governments in several countries to take measures to address the coronavirus. Even regions with an outstanding GDP had to take special action, especially with the micro and small business segment. This is the case of the municipality of Sobral, in the State of Ceará, ranked 7th in GDP per capita in the state (IBGE Cidades, 2017), where in the services sector, retail trade accounted for more than 50% of the municipality's GDP (Banco do Nordeste, 2019).

Starting from the assumptions that entrepreneurs who are at the head of Sobral's retail trade companies are fearful, not knowing how they will get out of the crisis, but aware that they need a cultural change process that leads to modern innovation management, this paper seeks to answer, among others, the following questions: (i) how creativity can contribute to the innovation management process; (ii) how knowledge management can be a key element in the innovation management process; and (iii) in what way innovation and innovation management are factors of competitiveness and capable of providing answers to crises.

Corroborating the importance of this paper, as stated by Menezes Filho et al. (2014), theoretical models and empirical evidence ensure that the greater the competition, the greater the need for modern managerial practices and innovation. This will be evident in the "post"-pandemic period



for Sobral's retail trade, which currently already has expressive competition. On creativity, entrepreneurial culture and innovation, it is necessary that the entrepreneur who owns the company has a holistic view (Pereira et al., 2015).

Thus, the research is considered important in the study area, since, in addition to the effective contribution it can bring to the economy of the municipality of Sobral, innovation management in the retail trade is a relatively new theme in the area of scientific research, which may result in new academic contributions.

2 CREATIVITY, INNOVATION AND KNOWLEDGE MANAGEMENT

Creativity is part of the initial innovation process, followed by knowledge sharing and implementation (Anderson, Potocnik, & Zhou, 2014). In turn, innovation is an element of fundamental importance to the competitiveness and productivity of companies (Stroll & Korhonen, 2018; Oliva et al., 2019) and even as a mechanism for the development of society itself (Lowe & Feldman, 2018; Mcdowell et al., 2018).

The term "knowledge", on the other hand, is understood as a competitive resource (Pereira & Silva, 2018; Machado, 2018), amenable to management (Mciver, Fitzsimmons, & Flanagan, 2016), while knowledge management comprises the organization's ability to master, develop, and direct the organization's expertise to strategic goals (Loon, 2019). Some authors, such as Burger et al. (2018) and Donnelly (2019) associate knowledge management with the company's own expectation of effectiveness and success.

Importantly, as stated by Muzzio and Paiva Junior (2018), it becomes necessary to integrate creativity with innovation and knowledge management in an organizational context.

Creativity can be developed and encouraged, involving skills linked to emotion, relationships, and techniques for creating innovation (Amabile, 1997; Muzzio, 2017). In his studies, Amabile (1997) highlights a fundamental aspect, that the process of creativity can be favored by the "passion" of the business, that is, the pleasure that the individual feels when developing a certain enterprise.

Creativity, according to Amabile (1988), is influenced by two factors: i) relevant skills that depend on cognitive, perception and motor factors, that is, what individuals bring with them; and ii) skills for creativity, characterized by the direction to new perspectives or problems, application of heuristics leading to new cognitive paths, as well as persistence, including knowledge, techniques and talent. Complementing the creativity development, the author also establishes: a) expertise, that is, the knowledge and experience that a person possesses and that can be used at work; b) creative reasoning, dealing with the way of approaching problems and the ability to put together existing ideas into new combinations; and c) motivation, comprising the motivational factor, which can be intrinsic or internal to the individual, related to his/her will, and extrinsic motivation, originating from the "need to do", even if he/she does not have the will.

One of the skills that the creative individual needs to develop is the ability to modify his/her behavior and knowledge base, interconnecting new areas in a multidisciplinary context. He/she also needs to have the ability to influence his/her environment and leadership to ensure the applicability of innovative ideas, facing intra-organizational resistance (Paiva Junior, 2018; Lins Filho, Andrade, & Silva, 2020). Therefore, creativity concerns the ability of individuals to engage in a process of creating objects or ideas in the organizational context ideas that are new, different from the simple reproduction of existing ones (Castañer, 2016).

According to Muzzio (2017), the creative individual is the professional endowed with skills, capable of causing the development of the innovative process in organizations through the operationalization of projects that allow the effectiveness of creativity. Amabile (1997) argues that creativity in an organizational context can be manageable, since organizations are made up of professionals, procedures, and resources, which can be adapted to their goals and policies, through their managers.



However, in order to have a greater creativity return, the attitude of the organizations' managers becomes fundamental, aiming to: i) identifying those who are really willing to make changes or those who prefer to continue in the traditional posture; ii) knowing the different strengths of the organization, especially in relationships that opportune creativity; iii) reflecting on how people can be stimulated to develop their relationship capabilities; and iv) creating solutions and alternatives, placing the leader as the responsible for this dynamic, collaborating with business innovation (Galton, 2008; Ries, 2012; Muzzio & Paiva Junior, 2018; Lins Filho, Andrade, & Silva, 2020).

Blomberg, Kallio, and Pohjanpää (2017) assure that creativity is a capability required by organizations operating in environments with heightened competition. According to the same authors, it can be stated that even in organizations that consider it as a secondary element, creativity has been included as necessary.

Organizational creativity should take place in a multidisciplinary context, involving skills of teams from different areas of knowledge working together to generate problem solving and innovative projects (Muzzio & Paiva Junior, 2018; Lima & Rita, 2020). Thus, managers and professionals need to relate to each other and create promising partnerships and links aligned with organizational goals. In order to generate ideas, creativity, and solutions for new businesses, it is also possible to act jointly among organizations, institutions, and external agents (Galina, 2020). This statement is confirmed by Madeira (2015), who states that the expenses required for funding Research and Development (R&D) activities justify the importance of approaching universities as an alternative for companies to strengthen their innovation process. Likewise, universities benefit, since they obtain resources to finance their activities. The company gains a competitive advantage and the society with the generation of economic development (Guimarães & Kniess, 2014).

As Guimarães and Azambuja (2018) point out, innovative companies differentiate themselves from traditional companies, especially in a global and digitally connected market. Innovative companies exhibit work dynamics that are resilient and agile enough to adapt to the market. On work dynamics, Cirella et al. (2016) ratify the importance of employees in the organizational sphere. While Aguiar and Suave (2020) recall that the result of creativity must present innovation, differentiation, acceptability, appropriateness, and usefulness.

The employees' creativity, aiming to give results that assist in the creation of innovative products or services and processes, can be stimulated through tools such as design (Forcelini, Varnier, Fialho, & Merino, 2018). In turn, design thinking is a method where multidisciplinary teams work in order to meet the needs of consumers in various areas of the economy (Brown & Wyatt, 2010). New ways of thinking about organizations are emerging, especially human capital and the very leadership that manages creative talents, conceptualized as creative management, which articulates culture, individual and leadership (Muzzio, 2017).

Good leadership is fundamental, since creativity leads to divergent and convergent ideas, which develop knowledge, but which must be strategically directed towards solutions in innovative products and services (Le Masson, Hatchuel, & Weil, 2017). Muzzio and Paiva Junior (2018) ratify that the leader or manager has the role of directing and influencing the company towards creativity in processes and practices, being decisive factors for innovation.

Creativity integrates innovation, since it materializes the application of new ideas (Stoner & Freeman, 1999). Paiva et al. (2016) ratified that creativity and innovation are factors of economic growth, used by entrepreneurs.

Therefore, the companies which are able to respond to the market in a swift and flexible way are promoting innovation based on competence management, and so are said to be winning companies (Tece; Pisano, 1994).



Innovation is seen by Pimentel and Nogueira (2018) as a construct from reality, which incorporates cultural, social, and knowledge resources. Vanhaverbeke (2017) and Vendruscolo and Galina (2020) show that ideas likely to turn into businesses with growth potential result in innovations known as startups, which can partner with large companies. This shows that product and service development is increasingly associated with knowledge external to organizations (Vanhaverbeke, 2017).

Startup companies, like the innovative ones, present innovations in business models by working with organizational innovation, therefore inspiring managers and academics to overcome obstacles (Chesbrough, 2010).

It should be noted that the main aspect of a business model is the delivery of value to customers, that is, it will depend on how companies organize themselves in order to better meet consumers' needs, which is a function of innovative management (Teece, 2010).

Since knowledge results from an organization's asset and considering the constant changes needed to meet increasingly demanding audiences, it becomes important systematic market research and other information, for which strategic management is key. Cohendet, Parmentier and Simon (2017) state that: "the new dynamic capabilities framework for corporate strategic management, especially in terms of organizational knowledge processes, has become the paradigm for explaining innovation strategy."

Nonaka and Takeuchi (1997) ratify that knowledge results from the interaction of individuals within the organization, because an organization does not create knowledge alone. In turn, the same authors and Nonaka and Konno (1998) introduce the concepts of externalization and internalization processes. Externalization converts tacit knowledge into explicit knowledge, where tacit knowledge is articulated and translated into understandable formats. Internalization, on the other hand, transforms explicit knowledge into tacit knowledge and is characterized as "learning by doing", or on-the-job training, so that the members of the organization can access the knowledge produced by the group.

According to Windsperger and Gorovaia (2011) technology transfer is related to tacit and explicit knowledge. The more tacit knowledge, the more information will be required to facilitate absorptive capacity. According to Cohen and Levinthal (2012, p. 377) absorptive capacity refers to the "ability to recognize the value of new information, assimilate it, and apply it for business purposes."

The previous forms of knowledge lead to the notion of Technology Transfer (TT), understood, in this case, as a process of transfer of knowledge and specific skills, which arises from research and development and aims to promote the technological capacity building of the receiving companies (Windsperger & Gorovaia, 2011).

Technology transfer, starting from the university and reaching the company, called University-Business Technology Transfer (UBTT), emerged in the 1970s in the United States and became common practice in developed economies and emerging countries, and, in the latter, it has shown itself as an important form of technology transfer, mainly due to the low research funding capacity of most companies (Muscio, 2010).

However, it should be noted, as the classic in the area of innovation Bell (1993) points out, that the Brazilian National Research System faces difficulties related to the institutional separation between research sectors and productive analysis, due to the linear innovation model. According to this same author, negative results of the transfer of research to companies occurred from the erroneous view that research institutes could replace the industrial R&D sectors and that they could generate innovations to be exploited by local industry.

Understanding that the TT process requires direct contact between those involved, since besides the observation of body language it is possible immediate feedback, Windsperger and Gorovaia (2011) state that the transfer and absorption of new knowledge are made possible in a direct way through training, conferences and meetings.



According to Cruz da Silva (2013), TT can also be seen as a process of know-how, aiming to contribute to business development, including creating companies from Science and Technology Institutions (STI), known as spin-offs, with the results of academic research.

Competitive advantages arise from technologies transferred and absorbed through know-how (Cruz da Silva, 2013). And, in this context, the concept of franchising emerges, for example, with the standardization of activities and the dissemination of best practices. In the same line of reasoning, technology transfer allows innovation to happen when the receiver absorbs or masters the knowledge, being in a position to create new technologies and generating more knowledge and innovation. As Windsperger and Gorovaia (2011) state, the success of technology transfer lies in organizational skills or learning capacity. In the case of franchises, in the efficiency of passing on knowledge between franchisee and franchisor.

The technological knowledge transfer, according to Castro et al. (2013), is a means to achieve innovation and result in competitiveness for companies. Some reasons for this were pointed out by Van Wijk, Jansen and Lyles (2008), who stated that technology transfer allows companies to acquire, transform and apply external knowledge, as well as obtain product, process and/or service innovations, adding value for customers and enabling superior performance. For Dias and Porto (2014), technology transfer plays an important role because of the innovation potential it can provide. However, according to Freeman (1995), for technology transfer to be effective, resulting in innovation, it is necessary to work with a systemic vision and with the concept of the National Innovation System (NIS).

One of the classics on NIS, Edquist (2004), points out its three main players or agents: (i) the State, for formulating public policies; (ii) universities and research institutes, for the dissemination of knowledge; and (iii) companies, for the transformation of knowledge into products or services. The way these players relate to each other will define the innovative capacity of the System (OECD, 2004). It is important to remember Freeman (1995), when he stated that the state has a fundamental role in Science, Technology & Innovation (ST&I) public policies, which strengthen the SNI. And, when building public policies for innovation, remember the Triple Helix model in its balanced configuration (Etzkowitz & Leydesdorff, 2000; Etzkowitz, 2003; Ranga & Etzkowitz, 2013).

In turn, regional inequalities compromise the effectiveness of uniform public policies, as not all regions are able to take advantage of national policies. Thus, the concept of Regional Innovation System (RIS) arises, derived from the NIS, operating according to specific characteristics of each region of the country (Araújo & Oliveira, 2015).

The RSI concept is closely related to the issue of tacit knowledge. Thus, it is necessary to understand that technological development and innovation go through the knowledge economy, from the distinction between tacit knowledge and codified knowledge. Tacit knowledge is characterized by being personal and context-specific, difficult to be formulated and replicated, and is linked to agents and institutions, which are unique and through which knowledge can be accessed and used. Codified knowledge, on the other hand, refers to knowledge that can be transmitted in formal and systematic language, being transformed into information. Its use is not tied to any agent or institution (Herscovici, 2007).

In Brazil, a milestone in the attempt to organize the SNI is the Innovation Law, Law n. 10.973, of 2004, amended by Law n. 13.243, of January 11, 2016, and regulated by Decree n. 9.283, of February 07, 2018 (Galdino, 2020), which encourages the creation of cooperative environments and also the more effective participation of ICTs in the innovation process and gives a prominent place to the Technological Innovation Centers (TIC), as a way to align the interests between universities and companies, and among their main functions is the study of feasibility and support for the launch of technology in the market.



3 RESEARCH METHODOLOGY

This article is structured as applied research. As for the form of approach, the qualitative method was chosen, which allows us to know “the exploration of the set of opinions and social representations about the theme we intend to investigate” (Gomes, 2009, p. 79).

As for the objectives, this was descriptive research, which according to Gil (2010) aims to study the characteristics of a group, raise opinions and attitudes of a population. This is because the research conducted a survey on the target population and, for this, it used the following technical procedures:

1. Bibliographic research, by which it was aimed to ensure the scientific character in data collection. By systemic revision means, a review of the literature was conducted on the following theoretical categories: Creativity, Innovation and Knowledge Management. The bibliographic research used books, scientific articles and other materials available on the internet, preferably with less than 5 (five) years of publication, through specialized databases. Having read them, they were organized in order to build a conceptual framework, which served as the basis for the questionnaire and for the arguments in the results discussion stage;
2. Documentary research, where databases were analyzed, mainly from the Brazilian Micro and Small Business Support Service (SEBRAE), the Chamber of Store Managers (*Câmara dos Dirigentes Lojistas*, in Portuguese) (CDL) and the Luciano Feijão College itself; and
3. Field research through unidentified respondents, using a semi-structured questionnaire, that is, composed of closed and open questions, prepared by the researchers (Cherobim et al., 2003) as per the annex. The Google Drive forms platform was used to send, receive and tabulate the questionnaires. The link to the questionnaire was sent through the database of Sebrae and CDL, Sobral offices, and responses were expected for a period of two weeks.

The data analysis was done through a narrative synthesis, a method used in qualitative research. It is known that in qualitative methodology the researcher makes use of the information about a topic in order to understand a certain phenomenon (Clandinin; Connelly, 2000). This was the technique used for the questionnaire, making use of theoretical propositions for better argumentation and questioning. It should be stressed that each result obtained from the questionnaire was integrated and confirmed by the theoretical framework.

In order to illustrate the importance of the retail trade in Sobral, State of Ceará, it is noteworthy that, according to data from the Internal Revenue Service (Datasebrae, 2020), of the 10,585 companies in the service sector, 5,496, that is, more than 50%, represented the retail trade in that municipality.

4 RESULTS DISCUSSION

The research aimed at knowing the practice of innovation management in the retail trade of Sobral, whose field analysis, using theoretical categories, will offer a contribution to the sustainability of these enterprises.

Field results show that entrepreneurs have yet to master their creativity techniques while fostering them in their companies. This fact reveals the favorable climate that exists for innovation management in companies, since it is known that it is from creativity that the innovation process begins (Anderson, Potocnik, & Zhou, 2014).



As stated by Muzzio (2017), the creative individual is the professional endowed with skills, capable of provoking the development of the innovative process in organizations, through the operationalization of projects that allow the effectiveness of creativity. Nearly all of the entrepreneurs who participated in the survey, consider themselves to be creative. This reaffirms the favorable environment for the innovative management process. This fact is reaffirmed when the interviewees, almost all of them, claim to have involved themselves with the process of creating new ideas for their company.

However, when one analyzes the creativity aligned to the objectives and policies of the companies, as well as if the businessmen surveyed feel they are leaders or have managers capable of making strategic decisions for innovative solutions, we do not have the majority of respondents as in other cases, but even so, a high number of respondents manage to achieve such alignment. Such fact highlights an opportunity to present how through the innovation management process, creativity can be articulated to the company's goals and policies and the importance of the businessman and his managers leading the process, as stated by the classic Amabile (1997) and others (Le Masson, Hatchuel, & Weil, 2017; Muzzio & Paiva Junior, 2018).

Another aspect extremely favorable to the construction of an innovation management model is that nearly all of the respondents (90%) identify creativity as a determining factor to address competition, in line with what Blomberg, Kallio and Pohjanpää (2017) state, when they emphasize the importance of creativity in any organization.

To generate ideas, creativity, and solutions for new businesses, it is also possible to act jointly among organizations, institutions, and external agents (Galina, 2020). When asked how businessmen have been acting jointly, less than half 41% answered that they have been acting in partnership with other companies, organizations, or institutions. The partnerships they establish take place in the relationship with suppliers, competitors and customers with the aim of seeking innovative ideas for their company, these were the answers obtained from most respondents.

However, when it comes to the partnerships focused on innovation with government agencies and other funding institutions, only a little more than half of the respondents keep such practice. When it comes to partnerships with higher education institutions to generate innovation, the number of those who practice it is still very incipient, having been performed by only 30.4% of the businessmen surveyed. These two results reveal a fragility in what Freeman (1995) calls the Innovation System, showing that innovation does not depend only on the isolated performance of companies, organizations or educational and research institutions, but on how they interact among themselves and with other players. It is known, from the theoretical framework (Bell, 1993), that there exist difficulties between the Brazilian institutional research system and the productive sector, which allows us to understand the statement from the entrepreneurs surveyed by this work. Nonetheless, the importance of the university-company approach as an alternative to strengthen the innovative process also lies in the fact that both can benefit themselves: the first can obtain resources to finance its activities and the second may gain competitive advantages. Finally, society gains from the economic development generated (Guimarães; Kniess, 2014). A good innovation management practice may help to increase the percentage of these partnerships and, consequently, increase innovations in the segment.

The businessmen were asked about the partnerships with companies and they mentioned mainly suppliers of raw material, products and services, among them: IT developers, from the pharmaceutical industry, artisans and liberal professionals and consultants. Opening up to IT developers, freelancers and consultants could facilitate the implementation of the innovation management process.

At the core of management and with an eye toward innovation, the majority of entrepreneurs consider that their standing stimulates creativity (82%), and yet a lower number of them (75%), say they stimulate the creativity of employees through creative thinking, motivation, and multidisciplinary knowledge. A large number of them also indicate that creativity is stimulated, also



influencing their environment and their leaders in order to ensure the applicability of innovative ideas among their employees (84%).

Such corporate behavior is in line with what the classic of the area, Amabile (1988), argues, since it stimulates skills that individuals need to develop (Paiva Júnior, 2018; Lins Filho, Andrade, & Silva, 2020) and is in accordance with the posture of managers who aim for a higher return of creativity (Gallon, 2008; Ries, 2012; Muzzio & Paiva Júnior, 2018; Lins Filho, Andrade, & Silva, 2020).

A key aspect is that nearly the majority of businessmen consider creativity and innovation important for decision-making in their company. As Stroll and Korhonen (2018) and Oliva et al. (2019) point out, innovation is an element of fundamental importance to the competitiveness and productivity of companies.

However, nearly more than half of the entrepreneurs interviewed make use of some type of methodology to offer new products, services or innovative processes. Among these methodologies, organizational creativity is known to develop in a multidisciplinary context involving skills of teams from different areas of knowledge working together to generate problem solving and innovative projects (Muzzio & Paiva Junior, 2018; Lima & Rita, 2020).

Innovative companies differentiate themselves from traditional companies, especially in a global and digitally connected market (Guimarães & Azambuja, 2018). In this aspect, a reflection and work with the companies of the retail trade should take place, because the number of entrepreneurs who consider that their companies are prepared to adapt quickly to the changes that the market requires is still small (62.5%).

Ideas likely to turn into businesses with growth potential result in innovations, known as startups (Vanhaverbeke, 2017; Vendruscolo & Galina, 2020). Of the businessmen surveyed, a considerable number (73.2%) showed that they already partner or are interested in partnering with startups. This result signals an openness to the innovation management process, especially considering that there are practically no public innovation policies aimed at the retail trade (Lima, Mota, & Pontes et al., 2017).

Considering the constant changes required to serve increasingly demanding audiences, systematic market research and other information becomes important, for which strategic management is key. So state Cohendet, Parmentier and Simon (2017, p. 197), “the new dynamic capabilities framework for corporate strategic management, especially in terms of organizational knowledge processes, has become the paradigm for explaining innovation strategy.” In the context of the research, more than half of the entrepreneurs reported that they know and apply knowledge management in their company, indicating that they can identify market needs and respond with innovation. Nonetheless, the research revealed that half of those interviewed are unaware or not in the habit of transforming practical knowledge into explicit knowledge within their companies. In turn, the practice of either “learning by doing”, or “in-service training” being capable of transforming explicit knowledge into practical knowledge is known to the majority (84%).

Classics in the area ensure that knowledge results from the interaction of individuals within the organization, because an organization does not create knowledge alone, bringing the importance of tacit knowledge and experience (Nonaka & Takeuchi, 1997). The same authors show that explicit knowledge is transformed into tacit knowledge through learning by doing or on-the-job training, so that the members of the organization can access the knowledge produced by the group. In view of the previous statements, we can see the need to stimulate the transformation of practical knowledge into explicit knowledge.

5 FINAL CONSIDERATIONS

Through field research, with unidentified respondents and using a semi-structured questionnaire that aimed at knowing the practice of innovation management in the retail trade of Sobral, it was researched about creativity, knowledge management and innovation in companies that are members of groups of class entities of the segment.

As the objective is to offer a contribution to the sustainability of these enterprises, based on the results of the research and supported by bibliographic research on the theoretical categories researched, the following considerations about the management of innovation in companies in the retail trade of Sobral are presented, as best shown in the item “Results Discussion”:

(i) Creativity can contribute to the innovation management process with regard to the climate it provides, since it is from this that the innovation process is initiated. Most of the businessmen surveyed consider themselves creative, which reaffirms this favorable environment for the innovation management process. Another relevant aspect of creativity in the innovation management process is knowing how to articulate it to the company’s objectives and policies, having the businessman and his managers as leaders of the process.

ii) Knowledge management is a key element in the innovation management process because it allows the identification of market needs through strategic management, incorporating the transformation of explicit knowledge into tacit knowledge. Through “learning by doing”, the members of the organization socialize knowledge, allowing the stimulation of the transformation of practical knowledge into explicit knowledge.

iii) Innovation and innovation management are competitiveness factors and capable of providing answers to crises when adopted by organizations in their decision making. A relevant number among the surveyed companies does not consider itself prepared to quickly adapt to the changes that the market demands acting together helps in these moments of crisis, when working in partnership, interacting among themselves and with other institutions, can leverage innovations in the segment where they operate. Most of the companies surveyed establish partnerships with suppliers, competitors and customers. However, this number is reduced when this partnership relationship is with government agencies and other development institutions, and is even smaller when it concerns higher education institutions. The university-company approach, in the technology transfer process, is an alternative to strengthen the innovation process, providing funding for university activities and gains in competitive advantages for companies.

The results show that there is already a favorable climate for innovation management in the retail business segment of Sobral. However, it is observed that it is necessary to organize the governance of the segment and stimulate, increasingly, creativity and knowledge management as factors of innovation. Technology transfer, through the university-company partnership, will need to be induced so that the impacts and competitive transformations for the sector are completed, minimizing the post-pandemic losses and contributing to territorial development.

Based on the main findings, future research in other municipalities is recommended, aiming to assess whether creativity and knowledge management are also conducive elements to innovation management, as well as to deepen on which elements enable the university-company approach as a competitiveness factor. These were the limitations identified in the study.

REFERENCES

- Aguiar, A. B., & Suave, R. (2020). Pesquisa sobre criatividade em contabilidade gerencial: Visão geral e oportunidades de pesquisa no contexto brasileiro. *Revista de Educação e Pesquisa em Contabilidade*, 14(1), pp. 5-13. Available: <https://doi.org/10.17524/repec.v14i1.2565>. Access: March 10, 2021.
- Amabile, T. M. (1988). A model of creativity and innovation in organizations. *Research in Organizational Behavior*, 6(1), jan. 2016, pp. 123-167. Available: 10.4236 / ajibm.2016.61005. Access: March 25, 2021.
- Amabile, T. M. (1997). Motivating creativity in organizations: On doing what you love and loving what you do. *California Management Review*, 40(1), pp. 39-58. Available: <https://doi.org/10.2307/41165921>. Access: March 16, 2021.
- Anderson, N., Potocnik, K., & Zhou, J. (2014). Innovation and creativity in organizations: A state-of-the-science review: Prospective commentary and guiding framework. *Journal of Management*, 40, pp. 1.297-1.333, March 17, 2014. Available: <https://doi.org/10.1177/0149206314527128>. Access: March 25, 2021.
- Araújo, J. C. H. et al. (2015). *As tramas da implementação da energia eólica na zona costeira do Ceará: Legitimação e contestação da “energia limpa”*. 185p. Dissertação (Programa de Pós-Graduação em Planejamento Urbano e Regional) – Universidade Federal do Rio de Janeiro, RJ. Available: <https://revistafoco.emnuvens.com.br/foco/article/view/220>. Access: May 14, 2021.
- Banco do Nordeste (2019). Escritório Técnico de Estudos Econômicos do Nordeste (Etene). *Informações Socioeconômicas Municipais*. Ceará: Banco do Nordeste. Available: <https://www.bnb.gov.br/documents/80223/3021436/Sobral-CE-2019.pdf/bb38d5e7-968c-ed6e-e6ed-3f14a0da04a2>. Access: April 1st, 2021.
- Bell, M. (1993). Integrating R&D with industrial production & technical change: Strengthening linkages & changing structures. Economic and Social Commission for Western Asia. *UN, E/ESCWA/NR/1993/WG, 2*. Available: <https://pt.scribd.com/document/324027253/Bell-M-Integrating-R-D-With-Industrial-Production-Technical-Change>. Access: May 14, 2021.
- Blomberg, A., Kallio, T., & Pohjanpää, H. (2017). Antecedents of organizational creativity: Drivers, barriers. *Journal of Innovation Management*, 5(1), Turku, Finlândia. pp. 78-104. Available: https://doi.org/10.24840/2183-0606_005.001_0007. Access: March 10, 2021.
- Brown, T., & Wyatt, J. (2010). Design thinking for social innovation. *Stanford Social Innovation Review*, pp. 30-35. Available: https://elibrary.worldbank.org/doi/abs/10.1596/1020-797x_12_1_29. Access: Feb 10, 2021.
- Burger, F. et al. (2018). Barreiras, elementos dificultadores e fatores críticos na implementação da Gestão do Conhecimento: Uma revisão da literatura. *Perspectivas em Gestão & Conhecimento*, 8(2), João Pessoa, pp. 43-61. Available: <http://www.periodicos.ufpb.br/index.php/pgc/article/download/33133/20820>. Access: Feb 6, 2021.
- Canongia, C. et al. (2004). Foresight, inteligência competitiva e gestão do conhecimento: Instrumentos para a gestão da inovação. *Gestão & Produção*, 11(2), pp. 231-238. Available: <https://www.scielo.br/j/gp/a/szKFNBLTxNBx8nbNwSmcpSz/abstract/?format=html&lang=pt>. Access: March 30, 2021.



- Castañer, X. (2016). Redefining creativity and innovation in organisations: Suggestions for redirecting research. *International Journal of Innovation Management*, 20(4). Available: <https://doi.org/10.1142/S1363919616400016>. Access: March 25, 2021.
- Castro, J. M. *et al.* (2013). O papel dos fatores do contexto relacional na transferência de conhecimento tecnológico: Um estudo de caso em uma organização pública de pesquisa agropecuária. *Tourism & Management Studies*, 9(2), pp. 130-135. Available: <https://www.redalyc.org/pdf/3887/388743879019.pdf>. Access: May 14, 2021.
- Cherobim, A. P. M. S., Martins, G. A., & Silveira, J. A. G. (2003). Abordagem metodológica qualitativo-quantitativa em pesquisas na área de administração. In: Encontro Nacional da Associação Nacional dos Programas de Pós-Graduação em Administração, Atibaia. *Anais [...]*. Atibaia: ANPAD. Available: <http://www.anpad.org.br/admin/pdf/enanpad2003-epa-0249.pdf>. Access: May 11, 2021.
- Chesbrough, H. Business Model Innovation: Opportunities and Barriers. *Long Range Planning*. Volume 43, Issues 2–3, April–June 2010, Pages 354-363.
- Chibás Ortiz, F. (2013). Criatividade e comunicação: Indicadores, barreiras, paradoxos e dilemas no mundo corporativo. *Revista Científica Hermes*, 8. Available: <https://www.redalyc.org/pdf/4776/477647815006.pdf>. Access: Apr 1st, 2021.
- Cirella, S. (2016). Organizational variables for developing collective creativity in business: A case from an Italian fashion design company. *Creativity and Innovation Management*, 25(3), pp. 331-343. Available: <https://onlinelibrary.wiley.com/doi/abs/10.1111/caim.12189>. Access: March 1st, 2021.
- Clandinin, D. J., & Connelly, F. M. (2000). Narrative inquiry: experience and story in qualitative research. San Francisco: Jossey-Bass. Available: <https://www.scielo.br/j/rbla/a/gPC5BsmLqFS7rdRWmSrDc3q/?format=pdf&lang=pt>. Access: March 1st, 2021.
- Cohen, W. M., & Levinthal, D. A. (2012). Capacidade de absorção: Uma nova perspectiva de aprendizagem e inovação. In: Burgelman, R. A., Christensen, C. M., & Wheelwright, S. C. *Gestão estratégica da tecnologia e da inovação: Conceitos e soluções*. 5. ed. Trad. Luiz Claudio de Queiroz Faria. Porto Alegre: AMGH, pp. 377-393.
- Cohendet, P., Parmentier, G., & Simon, L. (2017). Managing knowledge, creativity and innovation. In: *The Elgar companion to innovation and knowledge creation*. Edward Elgar Publishing. Available: <https://dx.doi.org/10.21714/2178-8030gep.v.21.6505>. Access: Apr 1st, 2021.
- Correia, P. M. A. R., Oliveira Mendes, I., & Marques, N. S. L. (2018). Gestão do conhecimento e da inovação. Determinantes da competitividade organizacional – Um estudo de caso de uma empresa de consultoria tecnológica. *Revista Estudo & Debate*, 25(1). Available: <http://dx.doi.org/10.22410/issn.1983-036X.v25i1a2018.1611>. Access: May 15, 2021.
- Cruz da Silva, R. (2013). *Transferência de tecnologia em franquias: Estudo de casos do segmento de frozen yogurt*. São Paulo, SP, Brasil. Available: <http://bibliotecatede.uninove.br/handle/tede/192>. Access: May 14, 2021.
- Datasebrae. (2020). *Receita Federal do Brasil (RFB)*. Available: <https://datasebrae.com.br/totaldeempresas-11-05-2020/>. Access: Dec 16, 2020.



- Dias, A. A., & Porto, G. S. (2014). Como a USP transfere tecnologia? *Organizações & Sociedade*, 21, pp. 489-507. Available: <https://doi.org/10.1590/S1984-92302014000300008>. Access: May 14, 2021.
- Donnelly, R. (2019). Aligning knowledge sharing interventions with the promotion of firm success: The need for SHRM to balance tensions and challenges. *Journal of Business Research*, 94, pp. 344-352. Available: <https://www.sciencedirect.com/science/article/abs/pii/S0148296318300821>. Access: March 31, 2021.
- Edquist, C. (2004). Reflexões sobre a abordagem dos sistemas de inovação. *Ciência e políticas públicas*, 31(6), pp. 485-489. Available: <https://doi.org/10.3152/147154304781779741>. Access: May 14, 2021.
- Etzkowitz, H. (2003). Innovation in innovation: The triple helix of university-industry-government relations. *Social Science Information*, 42(3), pp. 293-337. Available: <https://doi.org/10.1177%2F05390184030423002>. Access: May 14, 2021.
- Etzkowitz, H., & Leydesdorff, L. (2000). The dynamics of innovation: From National Systems and “Mode 2” to a Triple Helix of university-industry-government relations. *Research Policy*, 29(2), pp. 109-123. Available: [https://doi.org/10.1016/S0048-7333\(99\)00055-4](https://doi.org/10.1016/S0048-7333(99)00055-4). Access: May 14, 2021.
- Forcelini, F., Varnier, T., Fialho, F. A. P., & Merino, E. A. D. (2018). As técnicas de criatividade no processo de design, 1(1), pp. 31-46. Available: <https://periodicos.feevale.br/seer/index.php/revistagestaoedesenvolvimento/article/view/1815>. Access: Feb 10, 2021.
- Freeman, C. *et al.* (1995). Inovação e crescimento. *Capítulos*.
- Galdino, J. F. (2020). Política Nacional de Inovação. *Coleção Meira Mattos: Revista das Ciências Militares*, 14(49), pp. 27-50. Available: <https://doi.org/10.22491/cmm.a021>. Access: May 11, 2021.
- Galina, S. V. R., & Cajuela, A. R. (2020). Processos em relacionamentos interorganizacionais para desenvolvimento de capacidade de absorção em startups. *Revista de Administração Contemporânea*, 24, pp. 550-566. Available: <https://www.scielo.br/j/rac/a/HRMfGg4qf5YJfzRqCSVBWJ/abstract/?lang=pt>. Access: Apr 6, 2021.
- Gallon, A. V. (2008). Potencial de liderança criativa em equipes de trabalho de empresas de base tecnológica incubadas. *Revista de Administração e Inovação*, 5(1), pp. 20-35. Available: <https://www.revistas.usp.br/rai/article/view/79098>. Access: March 25, 2021.
- Gil, A. C. (2010). *Como elaborar projetos de pesquisa*. São Paulo: Atlas.
- Gomes, R. (2009). Análise e interpretação de dados de pesquisa qualitativa. In: Minayo, M. C. S. *Pesquisa social: Teoria, método e criatividade*. Petrópolis: Vozes.
- Guimarães, S. K., & Azambuja, L. R. (2018). Internacionalização de micro, pequenas e médias empresas inovadoras no Brasil: Desafios do novo paradigma de desenvolvimento. *Revista Brasileira de Ciências Sociais*, 33(97). Available: <https://doi.org/10.1590/339708/2018>. Access: March 10, 2021.
- Herscovici, A. (2007). Capital intangível, trabalho e direitos de propriedade intelectual: Elementos de análise. *Informação e desenvolvimento: Conhecimento, inovação e apropriação social*. Brasília: Ibict (no prelo).



- IBGE – Instituto Brasileiro de Geografia e Estatística. (2017). *IBGE – cidades*. Available: <https://www.ibge.gov.br/cidades-e-estados/ce/sobral.html>. Access: March 30, 2021.
- Le Masson, P., Hatchuel, A., & Weil, B. (2017). Design theories, creativity and innovation. *The Elgar Companion to Innovation and Knowledge Creation*, Edward Elgar Publishing Online, cap. 18, pp. 275- 306. Available: <https://econpapers.repec.org/bookchap/elgeebok/15485.htm>. Access: Feb 10, 2021.
- Lima, M. A. M., Mota, T. L. N. G., & Pontes, D. I. S. et al. (2017). *Políticas públicas de incentivo à inovação para o varejo: Relatório final*. Fortaleza. Available: <http://pndv.org.br/wp-content/uploads/2017/08/Estudo-material-para-site.pdf>. Access: May 11, 2021.
- Lima, P. R. S., & Rita, L. P. S. As ferramentas de gestão do conhecimento como vantagens aplicadas às startups brasileiras de base tecnológica. *P2P Inovação*, 6(2), Rio de Janeiro, pp. 178-194, mar/aug. 2020. Available: <https://doi.org/10.21721/p2p.2020v6n2.p178-194>. Access: March 1st, 2021.
- Lins Filho, M. L., Andrade, A. P. V. de, & Silva, G. G. da. (2020). Capacidade de inovar em Startups: Uma abordagem sob a ótica da orientação para aprendizagem. *NAVUS – Revista de Gestão e Tecnologia*, Florianópolis, 10, pp. 01-21. Available: <http://navus.sc.senac.br/index.php/navus/article/download/1095/pdf>. Access: March 10, 2021.
- Loon, M. (2019). Knowledge management practice system: Theorising from an international metastandard. *Journal of Business Research*, 94, pp. 432-441, January. Available: <https://www.sciencedirect.com/science/article/abs/pii/S014829631730468X>. Access: March 31, 2021.
- Lowe, N., & Feldman, M. P. (2018). Breaking the waves: Innovating at the intersections of economic development. *Economic Development Quarterly*, 32(3), pp. 183-194. Available: <https://journals.sagepub.com/doi/10.1177/0891242418783848>. Access: Apr 6, 2021.
- Machado, H. P. V. (2018). Configuração de estudos sobre gestão do conhecimento em pequenas empresas no Brasil. *Perspectivas em Gestão & Conhecimento*, 8(3), João Pessoa, pp. 209-227, set./dez. Available: <http://www.periodicos.ufpb.br/index.php/pgc/article/view/33758/21774>. Access: Apr 6, 2021.
- Madeira, L. M., & Rodrigues, A. B. (2015). Novas bases para as políticas públicas de segurança no Brasil a partir das práticas do governo federal no período 2003-2011. *Revista de Administração Pública*, 49, pp. 3-22. Available: <https://www.scielo.br/j/rap/a/3ymmqlRLZRSt8Xc5JwxJfQn/?format=pdf&lang=pt>. Access: Apr 6, 2021.
- Mcdowell, W. C. et al. (2018). Building small firm performance through intellectual capital development: Exploring innovation as the “black box”. *Journal of Business Research*, 88, pp. 321-327. Available: <https://www.sciencedirect.com/science/article/pii/S0148296318300249>. Access: Apr 6, 2021.
- Mciver, D., Fitzsimmons, S., & Flanagan, D. (2016). Instructional design as Knowledge Management: A knowledge-in-practice approach to choosing instructional methods. *Journal of Management Education*, 40(1), pp. 47-75. Available: <https://journals.sagepub.com/doi/full/10.1177/1052562915587583>. Access: March 31, 2021.
- Menezes Filho, N. et al. (2014). Políticas de inovação no Brasil. *Policy Paper*, 11, pp. 1-72. Available em: <https://www.insper.edu.br/wp-content/uploads/2018/09/Políticas-Inovacao-Brasil-CPP.pdf>. Access: Apr 1st, 2021.



- Menezes, K. C. *et al.* (2017). Gestão do conhecimento nas organizações: Uma aprendizagem em rede colaborativa. *Perspectivas em Gestão & Conhecimento*, 7(1), pp. 145-159. Available: <https://dialnet.unirioja.es/servlet/articulo?codigo=5908254>. Access: March 30, 2021.
- Muscio, A. (2010). O que impulsiona o uso de escritórios de transferência de tecnologia pela universidade? Provas da Itália. *The Journal of Technology Transfer*, 35(2), pp. 181-202. Available: <https://link.springer.com/article/10.1007%2Fs10961-009-9121-7>. Access: Apr 1st, 2021.
- Muzzio, H. (2017). Indivíduo, liderança e cultura: Evidências de uma gestão da criatividade. *Revista de Administração Contemporânea*, 21(1), Curitiba, Jan./Fev. Available: <https://doi.org/10.1590/1982-7849rac2017160039>. Access: March 16, 2021.
- Muzzio, H., & Paiva Júnior, F. G. (2018). Organizational creativity management: Discussion elements. *Revista de Administração Contemporânea*, 22(6), Rio de Janeiro, pp. 922-939, nov./dec. Available: <https://doi.org/10.1590/1982-7849rac2018170409>. Access: Apr 14, 2021.
- Nonaka, I., & Konno, N. (1998). The Concept of “Ba”: Building a foundation for knowledge creation. *California Management Review*, 40(3), pp. 40-54, ago. Available: <https://doi.org/10.21529/RECADM.2017013>. Access: March 19, 2021.
- Nonaka, I., & Takeuchi, H. (1997). *Criação do conhecimento na empresa: Como as empresas japonesas geram a dinâmica da inovação*. Rio de Janeiro: Campus.
- Oliva, F. L. *et al.* (2019). Innovation in the main Brazilian business sectors: Characteristics, types and comparison of innovation. *Journal of Knowledge Management*, 23(1), pp. 135-175. Available: <https://doi.org/10.1108/JKM-03-2018-0159>. Access: March 31, 2021.
- Organização para Cooperação e Desenvolvimento Econômico – OCDE. (2004). *Principles of Corporate Governance*. Available: <http://www.oecd.org/corporate/ca/corporategovernanceprinciples/31557724.pdf>. Access: May 14, 2021.
- Paiva Jr., F. G., Salviano, K. M. T., Costa, I. C. A., & Barbosa, A. M. S. (2016). O meio empreendedor promovendo inovação: A geração de capital social no Porto Digital. *Desenvolvimento em Questão*, 37, pp. 37-63, nov. Available: <https://doi.org/10.21527/2237-6453.2016.37.37-63>. Access: March 19, 2021.
- Pereira, F. C. M., & Silva, E. F. (2018). Criação do conhecimento organizacional baseada nos capacitadores de von Krogh, Nonaka e Ichijo: Estudo de caso. *Perspectivas em Gestão & Conhecimento*, 8(1), João Pessoa, pp. 20-43, jan./abr. Available: <http://www.periodicos.ufpb.br/index.php/pgc/article/view/32751/19960>. Access: Apr 6, 2021.
- Pereira, R. M. *et al.* (2015). Estilo cognitivo e as dimensões do processo de estratégia em micro e pequenas empresas. *Revista de Empreendedorismo e Gestão de Pequenas Empresas*, 6(3), pp. 525-552. Available: <https://dialnet.unirioja.es/servlet/articulo?codigo=6718809>. Access: Apr 1st, 2021.
- Pimentel, R., & Nogueira, E. E. S. (2018). Estudos baseados na prática: Possibilidades metodológicas para pesquisas em estudos organizacionais. *Organizações & Sociedade*, 25, pp. 350-370. Available: <https://doi.org/10.1590/1984-9250861>. Access: Apr 1st, 2021.



- Ranga, M., & Etzkowitz, H. (2013). Sistemas Triple Helix: Uma estrutura analítica para políticas e práticas de inovação na Sociedade do Conhecimento. *Indústria e Ensino Superior*, 27(4), pp. 237-262. Available: <https://doi.org/10.5367%2Fihe.2013.0165>. Access: May 11, 2021.
- Ries, E. (2012). *Lean Startup: Schnell, risikolos und erfolgreich Unternehmen gründen*. Redline Wirtschaft.
- Sanner, T. A., Manda, T. D., & Nielsen, P. (2014). Enxertia: equilibrando controle e cultivo em inovação de infraestrutura de informação. *Journal of the Association for Information Systems*, 15(4). Available: <https://aisel.aisnet.org/jais/vol15/iss4/1/>. Access: Apr 19, 2021.
- Stoner, J., & Freeman, R. E. (1999). *Administração*. Rio de Janeiro: L. T. C.
- Stroll, D., & Korhonen, J. J. (2018). Empirical measurement of innovation diffusion: A new approach. *XXIX Ispim Innovation Conference*, 24, Estocolmo, Suécia. Proceedings... Manchester: The International Society for Professional Innovation Management. pp. 1-14. Available: <https://search.proquest.com/conference-papers-proceedings/empirical-measurement-innovation-diffusion-new/docview/2186205841/se-2?accountid=201395>. Access: March 25, 2021.
- Teece, D. J. (2010). Business Models, Business Strategy and Innovation. *Long Range Planning*, 43, 172-194.
- Teece, D. J., & Pisano, G. (1994). The dynamic capabilities of firms: an introduction. *Industrial and Corporate Change*, 3(3), 537-556. Available: <https://academic.oup.com/icc/article-abstract/3/3/537/696604?redirectedFrom=fulltext>. Access: Apr 19, 2021.
- Tomaél, M. I., Alcará, A. R., & Di Chiara, I. G. (2005). Das redes sociais à inovação. *Ciência da Informação*, 34, pp. 93-104. Available: <https://doi.org/10.1590/S0100-19652005000200010>. Access: Apr 19, 2021.
- Tukoff-Guimarães, Y. B., & Kniess, C. T. (2014). Valoração de patentes: o caso do núcleo de inovação tecnológica de uma instituição de pesquisa brasileira. *Exacta*, 12(2), pp. 161-172. Available: <https://www.redalyc.org/pdf/810/81032895002.pdf>. Access: Apr 1st, 2021.
- Van Wijk, R., Jansen, J. J. P., & Lyles, M. A. (2008). Inter-and intra-organizational knowledge transfer: a meta-analytic review and assessment of its antecedents and consequences. *Journal of management studies*, 45(4), pp. 830-853. Available: <https://doi.org/10.1111/j.1467-6486.2008.00771.x>. Access: May 14, 2021.
- Vanhaverbeke, W., & Usman, M. (2017). Como as start-ups organizam e gerenciam com sucesso a inovação aberta com grandes empresas. *European Journal of Innovation Management*. Available: <https://www.emerald.com/insight/content/doi/10.1108/EJIM-07-2016-0066/full/html>. Access: Apr 19, 2021.
- Vendruscolo, L. T., & Galina, S. V. R. (2020). A internacionalização no processo de inovação das startups brasileiras de tecnologia da informação e comunicação (TIC). *Revista de Empreendedorismo e Gestão de Pequenas Empresas*, 9(2), São Paulo, pp. 123-157, jan./apr. Available: <https://www.regepe.org.br/regepe/article/view/1577>. Access: March 1st, 2021.
- Windsperger, J., & Gorovaia, N. (2011). Knowledge attributes and the choice of knowledge transfer mechanism in networks: the case of franchising. *Journal of Management & Governance*, 15(4), pp. 617-640. Available: <https://link.springer.com/article/10.1007/s10997-009-9126-5>. Access: Apr 1st, 2021.



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1. Definition of research problem	√	√	√	√	√
2. Development of hypotheses or research questions (empirical studies)	√	√	√	√	√
3. Development of theoretical propositions (theoretical work)	√	√	√	√	√
4. Theoretical foundation / Literature review	√	√	√	√	√
5. Definition of methodological procedures	√	√	√	√	√
6. Data collection	√	√	√	√	√
7. Statistical analysis	√	√	√	√	√
8. Analysis and interpretation of data	√	√	√	√	√
9. Critical revision of the manuscript	√	√	√	√	√
10. Manuscript writing	√	√	√	√	√
11. Other (please specify)	√	√	√	√	√

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Conflict of Interest

The authors have stated that there is no conflict of interest.

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