Characterization of the operations management of micro and small enterprises of Teresina, Piauí, Brazil

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Abstract
This research aimed to characterize the operations management of micro and small businesses in the city of Teresina, capital of Piauí state, Brazil. The results point to the managerial activity development time associated with the dimensions of factors: business, employees and managers.

Keywords: Operations Management. Small Enterprises. Brazilian Enterprises.

INTRODUCTION

Micro and small enterprises (MSEs) are undoubtedly fundamental to the emergence of new jobs. According to Villela (1994) aspects such as competitiveness, flexibility and complementarity give the MEPs this degree of importance. This fact has led many countries to begin to adopt policies to support this segment companies.

Given this importance, one can not fail to mention the difficulties in administering such organizations, since the size of their problems transcends its size (Cunha and Soares, 2010). The
difficulties encountered in MSE management are, among other factors, due to the operation of planning, lack of financial assistance, but mainly because of the lack of managerial competence demonstrated by their managers (Ribeiro 2011), a factor that leading to extinction these organizations already during its first years of existence (Sales et al. 2011).

This reality of complex difficulties and challenges which the MEP's are part, is included management of operations, which is based on the pursuit of maximum efficiency and effectiveness and its essential functions the planning and development of production strategies that are vital to the full use of human and material resources of the company (Peinado and Graeml, 2014).

Thus, the present study of the following research problem: What features include the management operations of micro and small companies of Teresina-PI? Thus, this study aims to characterize the management operations of the MSE Teresina-PI by analyzing the factors of managerial activity development time, characteristics of employees and characteristics of managers.

THEORETICAL

Through the introduction of federal law No. 123 of December 14, 2006, microenterprise is represented by the simple society, business associations, individual limited liability company and the businessman, who is properly registered with the competent bodies and that annually earns a gross equal income or less than R $ 360,000.00. In turn, if the gross revenue earned annually exceeds R $ 360,000.00, equal to or less than R $ 3,600,000.00 the enterprise is characterized as small business (... Observatory, 2012).

According to data Sebrae (2013) the MPE's already surpassed the 6 million businesses accounting for 99% of private establishments in Brazil also are responsible for creation of 7 million formal jobs with an average salary that reaches R $ 1,203.00. Regarding the business sector, trade remains with the most attractive projects of this nature to representing 51.5% of total establishments, followed by services with 33.3% of the enterprises and industry with 10.7% of MPE's (Sebrae 2012).

However, in the same proportion in which they develop, become increasingly evident the difficulties to manage these organizations (Ribeiro 2011). From an operational management standpoint many factors contribute to the success of a company, whether it is inserted in the production process or not, due to management operations encompass much more than the production process, involving other management areas that are critical to efficiency and organizational effectiveness (Peinado and Graeml, 2014).

According to Lima et al. (2010), among the difficulties encountered in MSE management can highlight the hand of shortage of skilled labor, poor infrastructure, political and economic instability and little knowledge of the managers of these organizations in Regarding his own management operations management strategies.

These factors point not only to the lack of technical-scientific knowledge, but also to the lack logical planning and continuous actions consistent with the current reality of the company so that its resources are used in the best way possible and so there is a growth perspective (Jabbour and Jabbour, 2011). In the conduct of these actions has stood out the figure of the Sebrae, an agency that has decreased the distance between managers and useful information to management of their companies (Alves et al. 2013).
METHOD

This study adopted a quantitative approach in the collection and analysis of data, something common in the field of applied social sciences, in order to analyze the factors that involve the management of MPE'S operations in the city of Teresina-PI, and so power characterized over there.

To meet the proposed objectives a field survey was conducted in May 2015. The data were collected by a team of 25 students in neighborhoods located in different regions of the county. In the process, we interviewed the managers of 249 MEP's from the city of Teresina-PI. Thus, he sought to know the profile of these organizations in relation to the entire length of the city and not just a region. The interviews were supported by a structured questionnaire, adapted from Rodrigues (2012), consisting of 13 questions covering three main arguments: a) general information on the MSE Teresina; b) information about the employees of these companies; c) information on the managers of these organizations.

In addition to the field research, desk research using for this document and records provided by the main agencies that have information on MSEs in Teresina-PI, Sebrae and the Board of Trade was held.

RESULTS AND DISCUSSIONS

In order to allow a better understanding in the exhibition of the collected data, this section was divided into three distinct parts. In the first part were presented general information about MSE Teresina, such as the area of operation, the existence of time and the monthly sales average. In the second part of the analysis were exposed information on the profile of employees that make up the MSE of the city of Teresina as the amount used, the level of education of these employees and the average salary paid to them. Finally, in the third part, the characteristics of the managers of these companies such as their average age, their education and the time they develop any management activity were presented.

GENERAL INFORMATION ON BUSINESS

The company's area of operation

According to the information obtained, it appears that most of the analyzed MSEs (46.6%) develops activities in retail. This result is compliant with the records found in the directory of Small and Medium Enterprises (2013), a document published annually by SEBRAE which is disclosed general information about MSE Brazil, highlighting that with regard to the business sector, trade remains with the most attractive projects of this nature to representing 51.5% of MSEs in Brazil.

The second area of action more prevalent among MSEs analyzed in the city of Teresina was the service sector, with a 16.9% stake. This large number is a result of a growing trend that has occurred in relation to this sector in Brazil, more specifically in the state of Piauí since 2006 (Sebrae 2013).
Company Lifetime

Regarding this aspect, the results indicated that 44.6% of the analyzed companies have a lifetime more than 10 years in the market. This result can be interpreted in two different ways. First, it can be perceived as a negative trend because if companies, which began operations as MPE a decade later still remain in the same form of constitution, it is suggested, therefore, that they could not overcome a gross revenue barrier annual currently represents an amount of R $ 2,520,000.00, regulatory limit of small businesses in Piauí.

It can be inferred that these companies were not able to develop satisfactorily, its ability to generate revenue and therefore have a growth decelerated pace. Your time spent in combined market information on the monthly sales average (information that will be exposed in item 1.4) already provide an idea of its development profile over the years.

Among the analyzed companies, 20.1% (14.1% at presence of time between 1 and 3 years and 6% existence of time equal to or less than 1 year) can be framed within the risk period and still coexist with uncertainties this early age. Also becomes pertinent to mention that the simple fact of being on the market during a period of 10 years, for example, does not mean that the company has been successful.

Average monthly turnover of the company
Among the questions posed to managers of 249 MSE analyzed this, formulated in order to obtain information regarding the average turnover mensalfoi where there was a better balance between the percentages of the responses. It was found that 23% of these projects every month receives a value of more than R $ 30,000.00, while 27% of monthly bill a value between R $ 10,001.00 and R $ 30,000.00. In turn, 17.7% have sales between R $ 5,001.00 and R $ 10,000.00.No other extreme, 19.8% of MSEs earn up to R $ 3,000.00 per month.

![Figure 3 - Average monthly billing companies](source: Authors / 2015)

Despite the heterogeneity of the responses, it is clear, as the predominant factor, that these companies have financial constraints which prevents, for example, offer more attractive salaries to its employees. Moreover, it can be inferred that all the 249 companies analyzed are likely to be framed in the definition of micro, since its annual turnover does not exceed the amount of R $ 360,000.00, which amount represents the limit to which the project is framed in the definition of micro enterprise.

**INFORMATION ON EMPLOYEES AND EMPLOYABILITY**

**Number of employees in the company**

To specifically analyze the context of Teresina, it is highlighted that 77.9% of MSEs analyzed have a workforce of up to 5 employees and 15.3% between 6 and 10 employees. We can see then that individually the number of employees per company is still small, however when designing this number by the number of enterprises in the form of MPE in Teresina that margin is strengthened, since the municipality 99% of companies can be classified in this definition.

![Figure 4 - Number of employees](source: Authors / 2015)
When analyzing the aspect hand-to-work in MSEs is to be noted that this type of development there is a negative trend with regard to the predominance of family members in the staff. This factor is associated with financial constraints, something characteristic in early small enterprises. So one of the options faced by managers for hand labor without incurring high hiring costs is to employ family members in the company, even if the skills of these people are not compatible to the need of the position they occupy.

**Educational level of employees**

According to the data, 66.9% of officials of MPE's analyzed has completed high school as education level and 17.7% of the workforce of these projects completed elementary school. This number indicates that, even though in recent years the MSE Brazil have excelled mainly by their employability potential, it is clear that the hand labor absorbidaana is mainly of low quality, when you consider the level of education.

![Figure 5 - Degree of education of employees](source: Authors / 2015)

It is noticed that qualified professionals have a preference for large enterprises where there are greater opportunities for professional growth and hence more attractive remuneration.

**Average salary of employees**

By the data obtained, it is clear that the reality of Teresina is aligned with the numbers of MSEs in national terms. Among the companies surveyed, 56% offer a compensation of a minimum wage R $ 788.00 and 35.1% offer monthly compensation as a value between 1 and 3 minimum wages, these values not very attractive to young professionals or even professionals qualified, when considering the level of education, which have high career aspirations. These values only meet the need for hand labor disqualified aimed at activities that require little knowledge management, namely operating activities. Another curious fact that can be noted is that 6.8% of MPE's analyzed oferecemaa their employees a lower salary to the minimum wage.
INFORMATION ON MANAGERS OF ENTERPRISES

Age, sex and marital status of the company's manager

According to employment data Yearbook of Small and Medium Enterprises (2013), 2002-2012, among employers, there was a slight expansion in the age groups considered older. The share of employers with 35 or more years of age, representing 74.0% in 2002, has grown to the proportion of 76.1% in 2012. Among the data obtained, it can be seen that 45% of MSE analyzed in Teresina have employer with an average age above 46 years and 27.3% of them are managed by individuals having age between 37 and 45 years.

In contrast, only 4% of SMEs run by employers aged less than 23 years. These data demonstrate that in Teresina, few businesses run by young people and the possibility of opening your own business is not the most preferable option for people with lower age groups. Regarding marital status of employers found the following information: 69.9% are married, 27.7% are single, 8% are divorced and 0.4% are widowed.
As for the division by sex, there is that among the managers of MSEs analyzed, 61.8% are male and 38.2% female. These numbers indicate an increase in the number of women occupying managerial position in the main MSE in Teresina. Data from the Micro employment Yearbook and Small Enterprises (2013) showed that, on the national scene, in the period 2002-2012, men predominated among employers, although women's participation has grown in the same period passando 26.0% to 28.8%.

![Figure 9 - Sex managers](source: Authors / 2015)

**Educational level of the company's manager**

The data show that 55% of employers of MSE analyzed in Teresina have as level of education completed high school and 12.4% of them have only primary education. This finding may explain the difficulties faced by these professionals to manage their businesses in an increasingly competitive environment, characterized by more demanding consumers and aware of their rights.

![Figure 10 - Level of education of managers](source: Authors / 2015)

Studies of Rodrigues (2012), Rodrigues et al. (2014), Borges et al. (2012) show that the lack of technical and scientific knowledge of managers of MSEs Brazil is one of the main reasons why mortality rates among these companies. In addition, employers with low education are more resistant to change and the adoption of any management mechanism flee their conception of what running a business. These managers develop their businesses predominantly based on the use of common sense, which they called "practice" by making intuitive decisions.

However, the data indicate that 28.5% of employers have completed higher education. This information indicates that this scenario may change in the coming years, as the number of young...
people who have specific knowledge in management and likely to open their own business in Brazil has increased significantly each year.

**Time developing management activity**

The data, collected from the MSE Teresina, indicate that 54.2% of employers of these companies have a managerial experience of over 10 years and 20.1% manage a business in a period of 5-10 years. What can we infer from this information? First, it can not be confused experience in management with technical and scientific knowledge in business administration.

Thus, the mere fact of developing a managerial activity every day does not mean that the individual holds an extensive knowledge in the management area. This can be confirmed by own profile employers of MPE's analyzed that predominantly have only finished high school, but are ahead of business more than 10 years.

![Graph 11 - Time that the manager works with management](source: Authors / 2015)

In Teresina, as well as in much of the country, the smaller companies are still managed in archaic way through the use of questionable procedures. However, due to the considerable demand business is driven by high revenues so that the management problems end up going unnoticed before satisfactory results.

**CONCLUSION**

In this study, we sought to classify the management operations in companies of Teresina-PI through quantitative analysis of its components, some information has been brought to light which allowed a greater understanding of the importance of these organizations in local economic and social scenario.

It can be seen that it is possible to draw a profile of the characteristics of the operations management of Teresina companies due to the fact that the present study have addressed sheds, company employees and managers and, therefore, information such as level of education, amount of employees, time experience with management and average monthly revenues of the same say as much about the company and their respective operations are being managed. Predominantly, 70.3% of managers has more practical experience than theoretical and 55% have only a high school education, or scientific expertise little calculated to important issues such as planning and carrying out their tasks in an organized way for more efficiency. From the developer's point of view, the results showed that 66.9% have secondary education and 56% earn a minimum wage, which means that the workforce has low-skilled to deal with possible more complex issues that arise in the context organizational, which increases the dependence relationship with the manager. The internal operations of SME'S are not being worked the right
way, the lack of knowledge and qualification limits the potential of efficiency and effectiveness that can be achieved, and operations management of these companies are still misunderstood, however, some factors such as education level point for a potential improvement, taking into account that the number of managers with college now reaches 17%, three times more than a decade ago.

Thus, this study joins others such as Araújo (2009) and Rodrigues et al. (2014) in an attempt to develop a solid theoretical body on the characteristics, importance and management forms associated MSE in the Northeast and in the city of Teresina.

In addition, as a suggestion for future work, it would be interesting to analyze what changes occur in the MSE operations management to face times of crisis? Of what strategies their managers have to go through this period without harming their organizations?

Acknowledgments

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Bibliography


