Development of Competencies of Leading Entrepreneurs in the Garment Segment of the Local Productive Arrangement in the Pernambuco Agreste

ABSTRACT

The question that guides this paper is: what skills do some entrepreneurs have to meet in order to achieve a leadership position in this area? To support this question we use the Evolutionary Theory of the Firm, in particular, David Teece's concept framework of economic competencies. This approach focuses on a garment cluster in connection with the attributes of the Transaction Costs Theory. The methodology used in this research is predominantly qualitative. The results indicate that these businesses became local leaders as they developed competencies in procurement activities, product creation, production and sales. The evolution of competencies is considered remarkable in the face of these entrepreneurs' low schooling level and limited capital resources.

KEY WORDS:

Competencies. Entrepreneurship. Local Productive Arrangement. Pernambuco's Agreste.

Romilson Marques Cabral

- DPhD in Business Administration - Bahia Federal University (UFBA-2007);
- MS in Rural Administration and Rural Communication - Rural Federal University of Pernambuco (UFRPE-1998);
- Specialist in Integrated Rural Development (1985);
- Economist (UFPE-1977);
- Assistant Professor of UFRPE presently in the Business Administration Department and Business Administration and Rural Development Post-Graduation Studies (PADR).

1– INTRODUCTION

Three major municipalities – Santa Cruz do Capibaribe, Toritama and Caruaru – integrate the garment Local Productive Arrangement (LPA) in the Pernambuco Agreste. The LPA has experienced some change from the most rudimentary production in the late 1940s to the early years of the 21st century, in order to be able to satisfy clients of large retailers in shopping malls. The observation of such phenomena is relevant when considered the existence of 12 thousand productive units in the research area, where the Economically Active Population (EAP) is 155,934 inhabitants, 76 thousand of which is employed and produce 57 million pieces/month, with a monthly turnover of more than R$ 144 million.

The premise underlying the present study is that some firms have become local leaders as a result of learning how to use their scarce resources as they struggled to survive and grow in the heart of a hostile competitive environment. A learning process that led to the acquisition of competencies needed for innovation, in this case, procedural, adaptive and local innovation. Such evolution resulted from learning-by-doing and from the process of practice and interaction given the low schooling level of the majority of entrepreneurs and their limited capital resources – backyard facilities with one or two sewing machines and family labor.

The study aims to verify what skills have been developed by some of these entrepreneurs that have allowed them to reach a leadership position. To do so, we find support in the Evolutionary Theory of the Firm, in connection with the Transaction Costs Theory, especially in cluster areas, as well as in David Tierce's framework for economic competencies. The method is predominantly qualitative, validated by triangulation. The results show various competencies historically acquired in each business activity and transmitted down the line by generations of entrepreneurs of which this can be considered the third generation. Significant advance in procurement, product creation, production and sales activities has been reached and manifested through the use of modern technologies, new management tools, and a myriad of governance structures for production, product creation and sales.

The present article is comprised of four parts. The first presents the theories underlying the study and seeks to briefly present the Schumpeterian view of the origins and evolution of entrepreneurship and innovation. Regarding to the Evolutionary Theory, our understanding is that such approach enables the interaction between the economy and the study of organizations located in clusters, more specifically when verified these firms' competencies. Moreover, we have incorporated elements of the Transaction Costs Theory in an effort to understand these firms' dynamics along their relationship with the internal environment in connection with the external environment. The second part of the article deals with the methodology, followed by the results in the third part, and, finally, we present our conclusion.

2 – ENTREPRENEURSHIP, INNOVATION AND COMPETENCIES

2.1 – The Schumpeterian View of Entrepreneurship and Innovation

SIt was Schumpeter, in as early as the 20th century, who consolidated the field of entrepreneurship by clearly associating the term with innovation. For Schumpeter (1982), an entrepreneur is an individual or group of individuals who take on the responsibility to initiate and consolidate a business unit oriented to profits by means of the production or distribution of goods and services. His contribution to the understanding of development cycles is built upon the entrepreneur's role in the process of creative destruction. For the author, therefore, someone is considered an entrepreneur if he/she proceeds with: 1) introduction of a good; 2) introduction of a new method of production; 3) opening of a new market; 4) conquest of a new source of raw material or of semi-manufactured goods; 5) establishment of a new organization in any industry, such as the creation or fragmentation of a monopoly position (SCHUMPETER, 1982).

Along the course of his studies on development and importance of innovations, Schumpeter (1942, 2002) broadened his understanding of entrepreneurship in different dimensions. The first one is the predominant view of small businesses, where the entrepreneur is seen as the hero, the creative destroyer. The second results from large businesses, where it recognizes the

importance of engineering and management teams in defining strategies and in the role of laboratories for the creation of innovation. The third dimension is recognized by Schumpeter (1954, 2002) in his analysis of the role that major institutions play in innovation. Thus, the entrepreneurial role crosses firm boundaries. To illustrate, the author mentions the role of the Agriculture Department of the USA in the innovation and diffusion of it to the farmers in that country.

It is relevant to bring up, however, that fifteen years after the launching of the first version of the Theory of Development, in German language, in 1927, Schumpeter, influenced by the insights of evolutionary biologists (Darwin among them), had already perceived that innovations also resulted from the more subtle elements of a business; they are born in a business' routine. Such dimension is revisited and deepened nearly sixty years later by Nelson and Winter's (1982) in their elaboration of the Theory of Economic Change, setting a new and broad agenda for research on economy of businesses.

Among the theoretic contributions indicated to the regionalized approach to entrepreneurship, Julien (2010) highlights the "gazelas" figure of businesses or entrepreneurs. Attention is drawn to the fact that businesses or entrepreneurs get confused when they are in small business settings. In the case under study, the term entrepreneur-leaders is more appropriate, consensual with the terms used locally. "Gazelas" or leaders are those who adopt proactive strategies, seek constant innovation of processes and products and grow rapidly. They open up new possibilities in their region and transform the locality. They can become role-models for future entrepreneurs and businesses. These businesses or entrepreneurs generally account for less than 10% of the total.

Having glimpsed at the sources of innovation comprised in the elements of routine, Schumpeter seeks to incorporate another contribution: the subtle differences between management function and entrepreneurship function. And it is in Penrose's endeavor to separate those two functions, in her attempt to deepen Schumpeter's (1975) perceptions that rest this author's major contributions (1959).

2.1.1 – Penrose's contributions

Seeking to find an answer to the question: Why do firms grow?, Penrose (1959) sets the traditional analysis of mainstream economists aside and compares the growth of a firm to the animal world, to its biological processes. The author engages in detailed investigation of the entrepreneurship functions of firms.

Penrose (1959) establishes a clear distinction between the Schumpeterian entrepreneur, of first stage – capable of introducing something that is disruptive to the economic system as a whole – and the entrepreneur, as she sees it, more oriented to the firm's inner nature and capable of producing incremental (procedural) innovations. In a broad sense, however, in author's point of view, the matter of entrepreneurial judgment involves more than the combination of imagination, "good sense", self-confidence and other personal qualities. The process is intimately related to organization of the accumulated information and easy of consultation inside and outside the firms (institutions).

Another of Penrose's (1959) relevant and decisive contributions is her effort to understand the management and the entrepreneurship functions. It is in regard to the latter – a business' ability to use its resources – that a concept associated with a "special" type of intangible resource is originated: the firm's organizational capacities.

Penrose's contribution (1959) foreshadowed the concept of dynamics capabilities, posteriorly developed by the evolutionary scholars.

2.1.2 – The evolutionary scholars' contributions

Following Schumpeter and Penrose, the evolutionary scholars resurfaced the criticism pertaining to the premises underlying the mainstream orthodox theory: unlimited rationality and availability of symmetry of information among the agents. For the evolutionary scholars, it is necessary to observe the firm's trajectory and investigate its "black box" in order to verify the behavior of processes occurring in its interior and their interrelatedness with the external environment.

For Nelson and Winter (1992) and Nelson (1994), the capabilities of a firm are comprised of tacit

knowledge. They define the business' direction when faced with the influences of technological paradigms of market opportunities and with the learning that constitute a firm's competencies. However, they are path dependent upon decisions taken in the past – i. e., having been successful in accomplishing a certain action, firms become hostages of their own success.

There is a subtle difference between capabilities and competencies. A firm's competency is a set of differentiated technological skills, complementary assets, organizational routines and capacities that set the basis for the firm's competitive capacities in a given business. In essence, "competence is a measure of the firm's ability to solve technical and organizational problems" (TEECE, 1988 apud DOSI; TEECE; WINTER, 1992, p. 198).

A core competency has an economic, organizational and technical dimension. The economic and organizational competency involves: 1) allocative competency – deciding what to produce and how to price it; 2) transactional competency – deciding whether to make or buy or whether to do that alone or in partnership; 3) administrative competency – how to design efficient organizational structure and policies to enable efficient performance; and 4) technical competency – includes the ability to develop and design new products and processes and to operate facilities effectively as well as the ability to learn (DOSI; TEECE; WINTER, 1992).

Competency represents the possibility to articulate these diverse capacities. In the present study, competency is regarded as an acquired condition, a stock of capacities, however not static. Capacities correspond to the flow of actions or learning processes that constitute that condition.

Evolutionary scholars stress that innovations are generated and supported by inter-firm relations and by a network of inter-institutional relations (SCHMITZ, 1997). In that sense, for Nelson and Winter (1982); Freeman (1997) and Lundvall (1988), the firm is redefined as an organization directed to learning experiences and inserted in a broader institutional context. And it is in such environment of variety and selection that the different attributes, path dependencies and institutional traits grant meaning to the locality.

Recently, authors of the evolutionary school, like Sidney Winter, and others connected to the new economic institutionalism, like Oliver Williamson, have made efforts to approximate the two theories aiming to obtain better understanding of firm dynamics in its institutional relations with the selection environment. The Transaction Costs Theory (TCT), of the latter school of thought, helps to explain the interaction between what is produced internally and the exchange occurring vertically and horizontally among the different actors at play. The TCT constitutes an effort to articulate the internal dynamics with that occurring to a firm's transactions.

2.2 – The Transaction Costs Theory (TCT)

Transactions are interactions between economic agents and events that derive from the transfer of a good or service across a technologically separable interface, whose effects upon the economic performance may or may not occur at the moment the transaction is being decided, but in the future (WILLIAMSON, 1985).

Transaction costs are the costs of drafting, adapting and monitoring a particular task to be accomplished (WILLIAMSON, 1985). They derive from the need for the agents' coordinated actions regarding the demand for resources for construction, maintenance, and operation of institutional mechanisms that safeguard an agreement.

Transaction costs are of two types: the ex ante costs of drafting, negotiating and establishing an agreement; and, mainly, the ex post costs derived from unforeseen matters, when the terms of an agreement are not fully observed due to the risk of one of the parties incurring in delays, mistakes, omissions, or even due to the bad faith of one of the parties in the execution of the agreement (WILLIAMSON, 1985).

Still according to Williamson (1985), two behavioral assumptions underlie the understanding of transaction costs economics: bounded rationality and opportunism – both also visited by the evolutionary scholars. Bounded rationality is generated from the fact that the economic agent attempts to be the optimizer but fails because of information asymmetry (broken information); lack of access to information or to its processing cost; or incapacity to see reality through a "neutral" point of view.

Opportunism is bound to uncertainties and depends on cognitive and moral values. The cognitive dimension regards the uncertainties involving the performance of a given duty. The moral aspect refers to the individual's behavior, who while acting on self-interest, tries to benefit from the breaches in contractual agreement. That entails bonding costs of effecting secure commitments.

The definition of a transactions governance structure embodies three attributes: asset specificities, degree of uncertainties and frequency. Asset specificity describes the condition where regardless of the form assets cannot be redeployed to alternative uses or users without loss of productive value (WILLIAMSON, 1991). Asset specificities represent the most important inductor of the form of governance. For better understanding, we present below the classification suggested by Williamson (1991) and Azevedo (2005), which divides them into six types:

1) Locational – concerns the proximity of firms or parts of them, entailing reduction of transportation and inventory costs; 2) physical asset specificity – refers to design characteristics that may reduce the asset value in the case of alternative uses; 3) human asset specificity – describes transaction-specific knowledge acquired through specialized training and enhanced in the learning-by-doing process. This asset specificity involves the learning and acquisition of competencies; 4) dedicated assets – is concerned with the volume of investment made on a specific transaction; for instance, the acquisition of specific machines from an outsourced party in order to render some service; 5) brand capital – refers to the brand-added value reflected in consumer perceptions; 6) temporal assets – describe the value of a transaction that depends on the asset being used in a particular sequence.

Uncertainty may be determined by the risk of a given event taking place and by the asymmetry between the parties. Uncertainty is also connected to the third attribute: Frequency. It has to do with the occurrence of repeated transactions enabling the parties to get to know one another and to reduce uncertainties, build-up brand reputation and establish a commitment between them, thus setting the grounds for a perennial relationship (WILLIAMSON, 1985).

In an industrial cluster, the tendency – due to the proximity and cooperation and trust relations developed among the agents – is that transaction costs are reduced; and thus the development of transactional and locational competencies in conjunction with the administrative and technical competencies.

3 – METHODOLOGY

3.1 – The Choice of Method and Instruments of Analysis

Applying Vergara's (2000, 2005) proposed taxonomy, the research was carried out to meet a predominantly descriptive and explanatory goal; therefore, of appreciative bias. It is explanatory because intends to explain certain phenomena with a theoretical bias. Finally, it is predominantly qualitative once this method offers better explanations of the entrepreneurship phenomenon, which involves dynamic, diverse and simultaneous nuances.

The choice for a study of multiple cases (twenty one) resulted from the following reasons: a) possibility of describing the phenomena more thoroughly; b) difficulty finding a statistically representative sample of entrepreneur-leaders; and c) impossibility of appropriately deepening the research in only one firm (or in a small number of firms) due to these entrepreneurs' little time availability for providing a broader range of information.

The study of multiple cases constitutes a broader variation of case studies. According to Yin (2005), it is empirical investigation of a contemporary phenomenon in a real life context, especially when the borders between the phenomenon and the context are not evident. In what concerns multiple case studies, Bogdan and Biklen (1994) point out that qualitative researchers tend to analyze the data inductively, collecting data or evidence in order to build inter-relation as particular data are progressively collected and grouped together. It is a theory that builds itself as the information gathered finds inter-relatedness.

Our choice of approach was non-probabilistic sampling, selecting the entrepreneurs on the basis of their accessibility and type. In accessibility sampling, the researcher selects the items he has access to,

assuming that they may somehow represent the universe under study. Sampling by type (judgment sampling) is also a type of non-probabilistic sampling and consists of selecting a population subgroup that based on the available information would be representative of the entire population (GIL, 1995).

For selecting the entrepreneurs, a previous survey was carried out based on the information gathered from two directors of the Garment Association of Santa Cruz of Capibaribe (Ascap); of the president of the Commercial and Industrial Association of Toritama (Acit) and of the managers of the Brazilian Service of Support for Micro and Small Enterprises (Sebrae) in the city of Caruaru.

Being the firms under study characterized as small enterprises (according to Sebrae's categories), the definition of entrepreneurial leadership in the cluster was established upon the following criteria: 1) leadership in sales volume; 2) leadership in the introduction of technologies and innovation (modern machines, new designs, modern floor plan of facilities and stores, new production processes, good quality products, opening of new markets); 3) leadership in conducting policies of local and/or regional corporate interests. As there was no systematized data for an objective selection, the representative population of entrepreneurs was appointed by the Sebrae technicians and by the leaders of the previously listed local associations.

The interviews with the entrepreneurs were carried out based on a structured script containing fifty semi-structured questions. Besides information gathered on the firms under study, more general issues pertaining to the LPA were considered which were gathered from other actors through open questions interviews and related to the following themes: 1) the entrepreneurs' contribution, capacities and competencies; 2) evolution of technological processes; 3) the firms' (entrepreneurs' and others') relationship with clients, suppliers and competitors, verifying terms of agreement and types of transactions; 4) manufacturing processes and processes of incorporation of new learning; 5) market evolution and demands; 6) local creation and innovation processes.

Such contributions were categorized by type of activity: procurement, product creation, sales (recorded once they serve as the basis for a strategic plan for the development of the locality's LPA).

3.2 – Analysis Procedures

The result of the analysis embodies the data gathered through the interviews with the entrepreneur-leaders and the other participating actors. The data provided by the latter contributed to 'filling', so as to say, the "black holes". We follow Bogdan and Biklen's (1994) recommendation for multiple case studies, i.e., in qualitative research, data shall be analyzed inductively, collecting data or evidence to build inter-relation as particular data is progressively collected and grouped together.

The triangulation method, having been recommended by the institutional field researchers, was used for data gathering. This method can be defined in Social Science as a research strategy based on the use of different data gathering instruments for investigating the same phenomenon (VERGARA, 2005). Thus, different data sources were used: twenty-one interviews with leader-owners; visits to nine factories and points of sales, with direct observation of their productive and sales processes; fourteen interviews with other actors – leaders of trade unions and associations; private consultants of Sebrae and of the National Service of Industrial Learning (Senai); three lectures given by two entrepreneurs from Santa Cruz do Capibaribe and one from Toritama on the profile of the local entrepreneur; three Master's dissertations (on Economic Geography, Economy and Business Administration) and one doctorate thesis on urban development about Santa Cruz do Capibaribe; besides three published books – one on the Northeastern region, about entrepreneurs from the three hub cities, and the two other specifically on Santa Cruz do Capibaribe.

The use of such procedure as cross examining different sources of information derived from the understanding that the competencies would be collected indirectly. Prior to carrying out the interviews the researcher observed that the entrepreneurs would not be able to define precisely what competency would mean and/or would not be able to evaluate themselves considering their competencies.

The first tabulation was that of the data collected in the interviews with the entrepreneur-leaders, from

which we obtained matrices based on the categories of analysis listed in Figure 1. Following this first gathering, the contributions of other actors and of documental data were added. Based on that version of matrices, more shapes were inserted with a view to get to the competencies.

The analysis procedure was performed as follows: for each activity (procurement, creation, production and sales), each one of the listed competencies (transactional, allocative, administrative and technical) was incorporated considering the attributes defining the governance structure (specific assets, uncertainty and frequency). Finally, the conditioning factors of innovativeness (learning activities, institutional surrounding, technological change and business opportunities) were introduced. Attention is drawn to the fact that it was not possible to consider all the above mentioned elements in the analysis. The reason for that is bound to the limits imposed by the lack of information (asymmetry) and to the characteristics of activity itself. Procurement, for instance, is not associated with allocative competency, although sales are. Our further challenge was to include in the analysis elements of the trajectory of firms and of the LPA. (See Figure 1 below).

4 – ANALYSIS OF RESULTS

4.1 – The Development of Competencies in Procurement

In procurement, the transactional competencies were historically developed from the expansion of acquired input values and diversification of suppliers derived from the (expansion and new market focus) strategies adopted by firms. The conjunction of such initiatives enabled the expansion of the LPA as a whole, thus attracting new suppliers. The increase in the local input offer enhanced the entrepreneurs' bargaining power especially that of the first movers and of the more organized ones.

Furthermore, as from the mid-90s, some strategies adopted by the major fabric manufacturers have been a kind of overlap in wholesalers[1], getting closer to small producers and retailers with the objective of getting closer to the consumers' preferences (GORINI, 1999). Such move has led to customizing products and establishing new forms of delivery, what has also enhanced the bargaining power of producers in the clusters and their accumulated competencies in procurement.

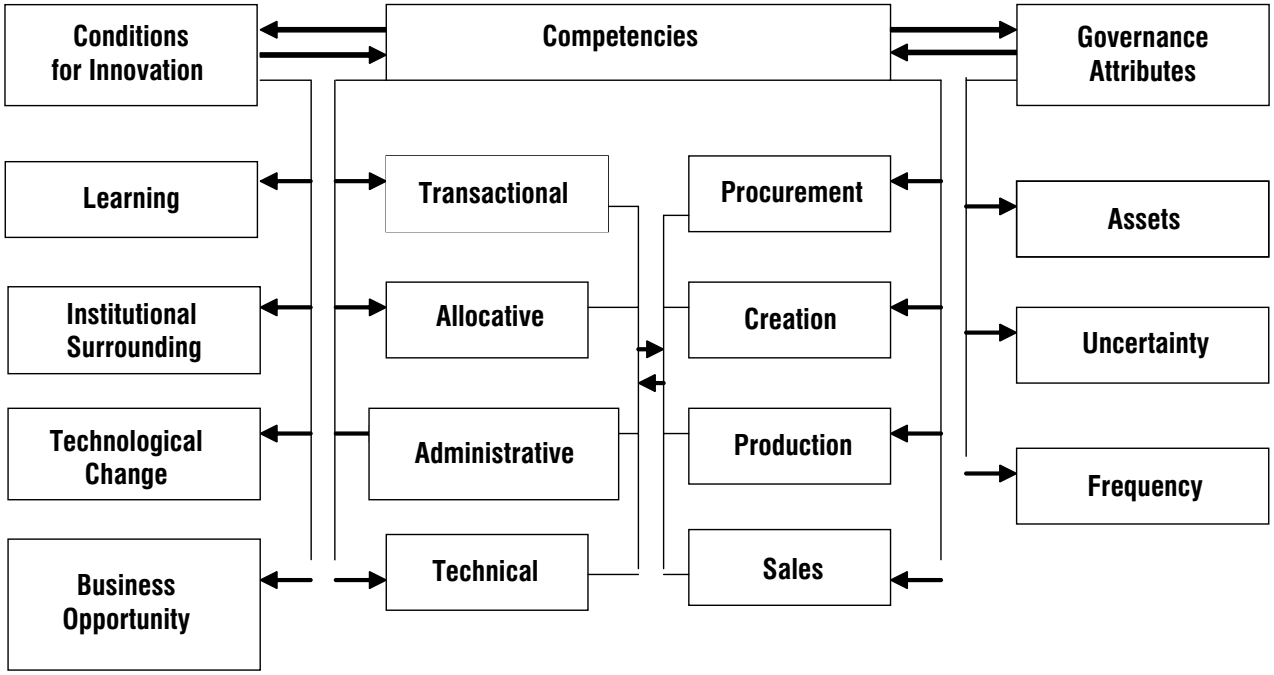

Figure1 – Analysis Diagram

Source: Field Research.

1 Direct contact: fabric manufacturers and producers.

New forms of relationship with machine and equipment suppliers also enhanced the buyers' bargaining power. The coming to town of new representatives and retailers in that segment enabled the creation of specific local assets, important to buyers' transactions. The suppliers' strategies for getting closer to the buyers reduced the latter's transaction costs as they facilitated direct sales, expanded the access to direct loans from suppliers and enabled a more effective technical assistance, i.e., with positive rebate in the production cost of local entrepreneurs.

On the other hand, the growing participation of the LPA entrepreneurs in fairs and exhibitions has also contributed to their strengthened competency in acquisition. In these events, buyers are offered greater options of quality, price and terms of payment, as well as of aftersales services. It is relevant to mention that there is a (sometimes exaggerated) concern among entrepreneurs with regard to the acquisition of edge machines and equipment in spite of the absence of an enhanced acquisition plan or deeper analysis of investments. These acquisitions entail the lack of trained operators to make full use of the machinery and losses associated with the low returns relative to the inversions.

In parallel, an evolution of their transactional competencies resulting from the expansion and deepening of the relationship with machine, fabric, and trims and notions suppliers – less uncertainty and greater frequency of transactions – have led to enhanced competencies regarding administrative and technical processes that are translated into greater control of inventory and flows across Managerial Information Systems (MISs), and other software, which provides better control of material (fabric and other inputs) reference, codes, and standard, resulting in lower inventory costs and increased productive efficiency. Some of the firms have been able to set up reasonably well-trained teams in that area and some now possess a managerial structure for procurement.

4.2 – The Development of Competencies in Creative Activities

The entrepreneur-leaders have adopted distinct strategies for market niche diversification such as diversity by income range and age group and adaptation to national and imported styles/models. The initiative has led to increased technical competencies pertinent to the development of capacities in different creation skills, involving a great range of products going from those destined to the general consumption to the more sophisticated styles, targeting clients of large retailers, store chains and shopping malls as well as buyers of white labels (products produced by one company that other companies rebrand with their own labels).

Creative procedures are greatly influenced by large retailers and great designers that dictate fashion at national and international levels. Thus, technical competency is limited to the ability to adapt creative processes to these trends in the extremely short and short terms. There is no differentiated local creation, something the most renowned designers have been advocating. Nevertheless, there is growing awareness of the fact that product commoditization weakens local competitiveness, especially in the face of foreign competitors' aggressiveness, mainly the Chinese competition.

The various human skills and diversity of material resources involved in product creation demand competencies for the establishment of diverse governance structures – internal production of styles and/or hiring of temps (stylists) in the human resources market and design of various structures such as product creation teams (or pairs), sole designers, and the employment of material, equipment, procedure techniques and methods for capturing various trends such as hand drawing, CAD and other computer software, internet access and specialized fashion magazines.

This flexibility varies according to competencies developed by each entrepreneur with regard to constantly capturing trends, adapting and creating in the face of the fashion market demands. The most simple and the mass fashion products are developed by in-house labor force, in a quasi-artisanal production method. For the launch of new collections, mixed resources are employed: in-house human resources and temporary stylists hired in the market.

The evolution of such competencies has also derived from structural and conjuncture factors. The first regards the dimension of firms and contract bonds with clients. Larger firms have permanently

hired product creation teams whereas smaller firms employ semi-craft processes like family labor or mixed processes (in-house permanent workers and temps upon demand). The conjuncture factors refer to the launching of collections (when more specialized labor is demanded) and seasonality, which demands hires in certain times of year in order to be able to meet increased demand.

4.3 – The Development of Competencies in Production

The production logic obeys the relationship between variety and speed of pieces produced – a dynamic that has led to the development of competencies for production and transaction costs reduction. With regard to production, economies of scale and scope are learned by these firm owners from dealing with the great volume and variety of styles produced and speed of delivery. These competencies have resulted from constant changes in the operationalization of various inputs (fabric, thread, labels, elastic, sequins, beads, buttons, etc.) associated with changes in styles, standards and sizes. The transactional competencies were developed in the various vertical arrangements – from in-house manufacturing to the procurement of readymade apparel and/or outsourcing of the partial manufacturing of some pieces or of complementary processes (sewing buttons, for instance).

Firms change their strategies and governance structure according to various conditioning factors, such as: physical and dedicated assets (product quality, type of apparel; temporal assets); season demands; specific human assets (available in- house asset and in the market); trust built in previous relationships (opportunism and frequency); for instance, if the apparel demands greater quality, the tendency is for in-house manufacturing, thus outsourcing pieces that are less demanding in quality.[2]

The decision for in-house manufacturing and/or procurement depends on the internal availability of specific assets (human asset: good seamstresses, for instance) or on the degree of trust involved in hiring these human assets; of temporal assets (season of year) and of locational assets (hiring locally or in another municipality)[3]. Thus, the greater the production volume the greater the tendency to hire pools of workers (factions). Some complementary assets, readymade apparel or processes are commonly hired[4] once internal production would not guarantee a large enough scale to justify the investment. The variation in arrangement also depends on the season given the evidence that an increased and faster growth in demand in certain times of year – as is observed in the end of the year – favors hiring factions, once it would be unfeasible to hire labor force directly for a short period of time, besides representing no advantage.

The development of productive – technical and administrative – competencies has been consolidated along these firms' trajectory. Modern management tools[5] have long been pursued though adopted precariously, as attest some consultants. Production cells; 5S; quality control; information management; time and motion control are some of the most frequently implemented tools, mainly as from the 90s. Administrative competency results from simple arrangements – generally informal structures represented by simple organizational charts shaped like flat pyramids describing administration, finance, production and sales processes – and centralized decision making that meets the need for a lead time that satisfies the client.

Some entrepreneurs have, however, adopted new and more complex organizational structures, with more decentralized decision making processes besides using edge consultancy service, an unusual practice in the locality.

These entrepreneurs' technical production competencies have also been improved as a result of the pressure suffered from commercial partners for price reduction and better quality. They face constant threat of replacement by more competitive suppliers what has been translated into these firms' requests for

2 Outsourcing also depends on the availability and quality of the labor force to be hired.

3 Depending on the occasion, pools of workers can be hired in a neighboring municipality, whose labor is cheaper. There is a direct spatial relationship regarding the employment of labor force and its price.

4 That is the case with embroidery, printing, and jeans wash.

5 By modern we mean the more recent implementation of these models, some of which date back to mid-19th century and early 20th century, respectively production cells and time and motion studies.

updated productive patterns so as to be able to follow the trends and assimilate new procedures in their search for quality. As a result, some firms use modern machines and equipment, elaborate layouts and cutting software in order to meet these partners' demands.

Some productive competencies have historically been developed autonomously through learning-by-doing and interacting with suppliers and clients. There were no specialized courses, schools or technicians in the locality to offer these entrepreneurs any support. Recently, the most common learning practice among them has been to participate in fairs and exhibitions and visit factories in other states.

The technical competency acquired from production coupled with the capacity to perceive market trends constitute the major contribution to the development of core competencies in the firms under study. Institutional innovations have been the most diverse, where family arrangements and those based on friendship relations at various degrees are formed and generate profit transfer between companies. As a consequence, the competency transcends the individual firm and stretches on to the partner and family firms.

4.4 – The Development of Competencies in Sales Activities

The major allocative competency has been to establish miscellaneous production flow strategies targeting a diversified public with diverse regional and international focus. They are related to strategies adopted for dealing with a wide range of products and constantly changing markets that meet the demands of a heterogeneous public in regard to income and consumer profile; therefore, practicing different prices. For each of the product lines presented, there is a great variety of styles and quality standards that satisfy this diversified public.

Their contracts are normally verbal agreements and for short term delivery orders. Some firms have longer term contracts[6], but transactions are generally guided by short term agreements despite some occasional long-lasting relationships between manufacturers and buyers.

A significant number of firms employ sales representatives on commission basis but direct contact between firm owners and clients is the most common practice. Administratively, local entrepreneurs have set up sales management teams and acquired capacities as they build enhanced relationship with their clients. These gains have derived from keeping a client record; obtaining sales volume; payment terms and fulfillment; and debt collection services in association with Serasa (a credit information services company), among others.

Part of the production is sold in factory shops to a diversified public, including the sacoleiros (informal trade-people), who establish a relationship of variable terms. The majority of this contingent is shop owners in each of the three main municipalities comprising the cluster. They also own stands and shops in the major commercial hubs and some even sell in open market fairs, which have resisted despite the recent implementation of these hubs.

Other strategies are sales to major retailers and branded merchandisers that buy white label products and to clients in other municipalities, states, and countries.

CONCLUSION

Besides the tacit ways these entrepreneurs enhance their capacities, they have more recently invested in formal learning. These capacities have generated better throughput necessary to meet the dynamism of creation and production variety inherent to the fashion world. The majority of the interviews corroborate the researcher's assumption that the concept of competency did not seem to be clearly identified by the entrepreneurs, who also demonstrated no perception of their dimension and results and showed difficulty to precise causal factors (personal efforts and other conditionings); perhaps due to the belief that competencies are tacit, reflected in their association of competencies with dedication to their work, hard work and vision of the future.

Transactional competencies were acquired from their relationship with differentiated markets of suppliers and clients, adapting to the local institutional variables (values and beliefs) and the broader (legal, macroeconomic and technological). Friendly

6 This is the case with supply to large retailers.

relationships built on trust between buyers and sellers have developed as they become more frequent.

The majority of the leaders in this study started their business at quite an early age, with a low schooling level and precarious access to capital goods. Despite the low volume of credit loaned from financial agents for investment, these firms show a high rate of expansion of physical assets along their trajectory. Their expansion has been financed directly by their own savings and by suppliers and indirectly by resources prevenient from the non-payment of taxes and from the inappropriate distribution of resources in the informal labor market.

The expansion of the firms under study has been the fruit of their allocative competencies generated from their growing capacity to conquer new markets (by means of regional expansion and strategies for the diversification of market niches and price adjustment) coupled with their technical competency acquired by the adoption of mixed technological strategies, articulation of imitative strategies for obtaining technology of more advanced centers and dependence on machine and fabric suppliers and the opportunists when they aimed to adapt to market needs. Technological competency is here understood from Winter's (1996) perspective of productive knowledge. The author holds that technology and organization are inseparable as the capacity to do things.

The arrival of new educational institutions have offered a promising outlook for the enhancement of local technical and organizational competencies by means of the improved capacities of leaders and firms' technical body. These initiatives have contributed to the greater systemic competitiveness and local collective effectiveness as these firms and their partners engage in teamwork to develop complementary assets and (in some cases) transform them into principal assets.

Transactional competencies shall be highlighted in the diverse governance structures adopted for production. These are modified according to seasonality, asset specificity and client relations as well as to these firms' readiness and/or difficulty to hire specific human assets. Their capacities and competencies have improved in order to meet the needs of multiple dynamic and parallel markets. The simple structures, the prevailing administrative competencies, and have somehow proven to be effective in dealing with such dynamics.

These competencies have formed flexible meshes along these firms' trajectory. They are a metaphoric intertwining of horizontal and vertical thread that weave the various strands and textures in the locality. The inter-firm and inter-institutional relations established in the cluster under study differ from those observed by Castells (2005) in his study of Hong Kong companies. The latter are flexible and appear and disappear according to the international market fluctuation. The local firms are flexible, grow and shrink in size, reorganize themselves, but due to the demands of major buyers and of the national market dynamics, they do not disappear.

These emerging strategies are the raw material of the strand that flexibilizes these firms' physical structure. They grow and shrink to the taste of the institutions, specific assets, conjuncture, new technologies, business opportunities, economic structure and seasonality. Nevertheless, this acquired elasticity seems to find a certain limit imposed by these entrepreneurs' low level of education and local values and beliefs, the fruits of the recent past's dependence trajectory and reflected in the constraints of these entrepreneurs and their associates' dynamic learning capacity.

REFERENCES

AZEVEDO, P. F. de. Contratos: uma perspectiva econômica. In: ZYLBERSZTAJN, D.; SZTAJN, R. **Direito & economia:** análise econômica do direito e das organizações. Rio de Janeiro: Campus, 2005.

BACKER, M.; KNUDSEN, T.; MARCH, J. G. Schumpeter, winter, and the sources of novelty. **Industrial and Corporate Change**, v. 15, n. 2, p. 353-371, Mar. 2006.

BOGDAN, R.; BIKLEN, S. Investigação qualitativa em educação: fundamentos, métodos e técnicas. In: _____. **Investigação qualitativa em educação**. [S.l.]: Porto Editora, 1994.

CASTELLS, M. **A sociedade em rede**. 8. ed. São Paulo: Paz e Terra, 2005. v. 1.

DOSI, G.; TEECE, D.; WINTER, S. Toward a theory

of corporate coherence: preliminary remarks. In: _____. **Tenhnology and enterprise in a historical perspective**. Oxford: Clarendon Press, 1992.

FREEMAN, C. **The economics of industrial innovation**. Cambridge: The MIT Press, 1997.

GIL, A. C. **Técnicas de pesquisa em economia**. 2. ed. São Paulo: Atlas, 1995.

GORINI, A. P. F. **O segmento de índigo**. Rio de Janeiro: BNDES, 1999. (BNDES Setorial, n. 10).

JULIE, P. A. **Empreendedorismo regional e economia do conhecimento**. São Paulo: Saraiva, 2010.

LUNDVALL, B. A. Innovation as an interactive process: from user-producer interaction to the national system of innovation. In: DOSI, G. et al. (Ed.). **Technical change and economic theory**. London: Pinter, 1988.

FREEMAN, C.; SOETE, L. **The economics of industrial innovation**. 3th ed. [S.l.]: MIT Press Edition, 1997.

NELSON, R. R. Why do firms differ, and how does it matter?. In: RUMELT, R. P.; SCHENDEL, D. E.; TEECE, D. J. **Fundamental issues in strategy**. London: Harvard Business School Press, 1994.

NELSON, R.; WINTER, S. **An evolutionary theory of economic change**. London: The Belknap Press of Havard University Press, 1982.

PATRÍCIO, T. **Perspectivas e estratégias para as microempresas**. Recife: Centro Josué de Castro de Estudos e Pesquisas, 1996. (Série Debate, n. 2).

PENROSE, E. **The theory of the growth of the firm**. 3th ed. Oxford: Oxford University, 1959.

SCHMITZ, H. Collective efficiency and increasing returns. Bringhton: University of Sussex, 1997. (IDS Working Paper, n. 50).

SCHUMPETER, J. A. **Capitalism, socialism and democracy**. New York: Harper Perennial, 1942.

_____. **Capitalism, socialism and democracy**. New York: Harper Perennial, 1975.

_____. Economic theory and entrepreneurial history. **Revista Brasileira de Inovação**, v. 1, n. 2, p. 201-224, jul./dez. 2002.

_____. **History of economic analysis**. New York: Oxford University Press, 1954.

_____. **Teoria do desenvolvimento econômico**. São Paulo: Abril Cultural, 1982. (Coleção Os Economistas).

SEBRAE. **Estudo de caracterização econômica do Pólo de Confecções do Agreste Pernambucano:** relatório final apresentado ao Sebrae-Pe. Recife, 2003.

TEECE, D. J. Technological change and the nature of the firm. In: DOSI, G. et al. (Ed.). **Technical change and economic theory**. New York: Pinter Publishers, 1988. p. 256-281,

VERGARA, S. C. **Métodos de pesquisa em administração**. São Paulo: Atlas, 2005.

_____. **Projetos e relatórios de pesquisa em administração**. 3. ed. São Paulo: Atlas, 2000.

WILLIAMSON, O. E. **The economic institutions of capitalism**. New York: The New York Free Press, 1985.

_____. Comparative economic organization: the analisys of discrete strucuture alternatives. **Administrative Sciense Quaterly**. v. 36, p. 269-296, 1991.

YIN, R. K. **Estudo de caso:** planejamento e métodos. 3. ed. Porto Alegre: Bookman, 2005.

WINTER, S. G. Coase: la competencia y la corporación. In: WILLIAMSON, O.; WINTER, S. G. (Org.). **La naturaleza de la empresa:** origens, evolución y desarrollo. Ciudad de Mexico: Fondo de Cultura Económica, 1996.