Essential Determinants for Assessing the Strategic Agility Framework in Small and Medium-sized Enterprises (SMEs)

John Balen [1], Lolade Nojeem [1], Wilmin Bitala [2], Utian Junta [2], Ibrina Browndi [2]
[1] Department of Computer Science, Rivers State University, Port Harcourt, Nigeria
[2] Department of Urban and Regional Planning, Rivers State University, Port Harcourt, Nigeria

ABSTRACT

Small and medium-sized businesses have an important role in the economy of the community, so it needs to be pursued in order to survive and grow sustainability. The rapid Development of information technology and is marked by the era of the industrial revolution 4.0, has an impact on the business environment, which is characterized by dynamic and unpredictable conditions. For this reason, small and medium businesses must-have agility in order to survive and grow in such environmental conditions. In small and medium businesses, the owner-manager plays a central role in determining the success of his business. For this reason, the individual capabilities of the owner-manager are the main factors that determine the business strategy and practice of implementing the strategy in running the business. This paper proposes a framework for the relationship between entrepreneurial capabilities that must be owned by owner-managers through strategic agility in an effort to improve business performance.

KEYWORDS: agility, strategic agility, competitive capabilities, competitive advantage, telecom industry

1.0 INTRODUCTION

Discussion on business performance has always been an interesting theme in any research on companies because business activity is the main core of the economy. As long as there are business activities, good practices are always needed in order to improve business performance. Performance measurement is directly related to strategic planning. Strategic planning involves the development, implementation and supervision. This study involves small and medium entrepreneurs in which the owner-manager plays the most important role in management. Every owner-manager always monitors the progress of his business in order to develop or at least survive [1-9].

Several studies have shown that there is a relationship between strategy and business performance. However, the relationship can be declared strong or weak. In this regard, the framework needs to be rebuilt to ensure that its indicators can be evaluated. Indicators of evaluating business performance may change due to the development of environmental situations. Representation of changes in indicators due to environmental changes can be seen from the results of recent research. One of the environmental developments caused by advances in information technology where the flow of information and data is very heavy and fast so that companies must be agile in dealing with environmental changes. All changes that occur in the environment also affect small and medium businesses. In a rapidly changing environment, the role of competence of the owner-manager determines the agility of business activities [10-17].

At present, the business environment is in the industrial era 4.0, where all business activities at the operational level, business units, and corporations use digital technology. Each functional unit is integrated with others and becomes supporting capacities for the company in taking dynamic, fast and appropriate actions. A group of actions that are dynamic, fast and precise is often referred to as strategic agility. Strategic agility is not only needed for large corporate companies, but also for small and medium-sized companies as long as they are required to be adaptive to the environment. Surely, the small and medium-sized companies' adaptive ability to the environment is supported by adequate entrepreneurial competencies of the enterprise [17-29].

This article provides an offer to researchers, a framework of the relationship between entrepreneurial competencies through strengthening strategic agility in an effort to improve business performance. This article also qualitatively explains how the framework done based on literature [30-43].

2.0 LITERATURE REVIEW

The current business environment allows for an increase in differences between one concept and another. Especially in a business environment that has become an increase in perception caused by market coverage. Moreover, this will happen if the business perspective incorporates the value of competent resources in achieving business performance. Achieving this business performance is more important for organizations to focus on competencies both at the local and global levels. Business depends on a strong emphasis on management factors such as finance, technology, and processes. On the other hand, the business can make supporting factors such as leadership, communication, and creativity to strengthen management factors. Competitive pressure for both individuals and organizations drive the need for creativity to be able to excel in new ways [1-11].

The right business strategy can provide benefits and confidence to succeed even in unusual ways. Maneuvers that are done flexibly make it possible to produce something unique and extraordinary in creating value and competitive advantage. Operational flexibility can reduce attacks on organizational resources and devices with the help of technological agility. The operations management perspective explores performance measurement. Initially, the focus of measurement on operational management is on measuring productivity. As the development of the business environment progresses, the focus of measurement shifts to the development of consistent steps in modern manufacturing management. Surely the thinking of operations management within the scope of manufacturing management will not develop if an alliance between organizational devices does not occur [12-23].

Performance measurement is the act of evaluating the work of people, machines or organizational devices. Cumulatively, performance measurement on resources focuses on the company's achievements in generating revenue more than costs. Thus, performance measurement is centered on one entity and attempts to measure financial and non-financial performance at the company level. Performance measures that focus on activities describe the activities carried out and then identify the costs incurred and the revenue generated by each of these activities. Activity costs can be measured directly. Revenue generated by activities can be measured indirectly provided that the activities carried out for each customer are known. The results of performance appraisal are a consequence of product attributes. These attributes are elements of the product that customers value, such as price, availability, service, and quality. Other elements can be included in the assessment such as working conditions, innovation, and flexibility. Attributes are the results of business processes that are in a position between the elements of performance and performance achievements. Initialized attributes as the basis for customer satisfaction, but also stakeholder satisfaction in general. Attributes must be monitored so as to provide what stakeholders want as an achievement of the organization's strategic goals. Every part of the organization requires individual decentralization in innovation and use of expertise. Decentralized individuals require collaboration with other individuals. Collaboration is needed as part of teamwork, to determine long-term plans while remaining responsive and flexible [24-33].

Competence is an individual characteristic. The competency of the company determines the toughness of the business being run. Competence is a special ability possessed by an individual or organization. This ability can be in the form of motivation, knowledge, and expertise in specific jobs. Competence is not static but requires individuals or teams to be dynamic in the face of a rapidly changing competitive environment. Dynamic competence requires a variety of skills that are not only related to the tasks they can complete but also at the level of implementation in which they work. Therefore, the competency possessed must be able to be used to develop existing skills and learn something new. Likewise, management structures must be able to adjust responses and learn focus, and coordinate. Competence is useful as an ability to deal with critical situations effectively by considering environmental constraints and establishing relationships and internal resources. In small and medium enterprises, which are characterized by one-man-one- management, the competence of the company depends on the competency of the owner-manager. These competencies are entrepreneurial capabilities which include supply chain management capabilities, relationships, strategy, commitment, conceptual, opportunity, organizing and leading, relationship, personal and technical [34-43].

The success of a small to medium-sized company depends on the owner-manager with the aim of business activities that are not much different from large companies. Activities undertaken can be in the form of fulfilling consumer desires or speculation activities in reaching consumers. The main economic activities in small and medium businesses start from the supply of raw materials, the operational process to the sale of the resulting activities [1-13].

Overall, the economic activities of small and medium-sized companies under single person control are the owner-manager of the company. The owner-manager is often referred to as an Entrepreneur. Entrepreneurs are individuals who set up a new company or result from taking business from other individuals by taking risks to benefit in business ventures. The company can be a long- running business, an old business developed in a new form or a completely new company. Entrepreneurs are often regarded as extraordinary people who are able to design new ideas, evaluate opportunities and risks, formulate strategies, produce products or services and conduct business [14-26].

Entrepreneurs also have a significant role in the economic environment because they create businesses from the needs of the surrounding community. The role will be even greater if the managed businesses can develop in a sustainable manner. Usually, entrepreneurs recruit the surrounding community to participate in the production factors.Agility is a characteristic that allows organizations to grow and develop in dynamic and unpredictable environments. Initially, the agility model was developed on manufacturing strategies with the term agile manufacturing. Agile manufacturing is a new concept in manufacturing that is intended to increase the competitiveness of companies [27-33].

Strategic agility means that organizations can take fast, decisive, and effective actions to anticipate, and utilize change. If the operating system is at the expected level of productivity, then the system must be deployed to all functions. When companies will use agility as a model for placing efficiency in the short term, it is more important to seize and take advantage of opportunities in places that have the potential to develop for years to come. The first challenge of strategic agility is to explore all decision alternatives, and the second challenge is moving from a comfort zone to discomfort. Many elements contribute to the company's agility strategy including the customer base, brand, core competencies, employee ability to change, and infrastructure. In addition, the agility strategy is able to improve the efficiency of a company's operations to turn investments into providing the right product, at the right price, and available everywhere [34-43].

Strategic agility has become a real-life contradiction and is difficult to resolve for corporate leaders and the executive team on traditional thinking. A strong strategic commitment can help companies gain momentum towards ambitious goals. Paradoxically, it can cause companies to develop inertia or become erroneous when technological disruptions, changes in market conditions, or unexpected competitors. Strategic agility is a Meta capability that involves not only allocating sufficient resources for development and deployment, but also staying agile by balancing dynamic capabilities over time. This balancing act is very important because companies face heterogeneity and unexpected changes. The event is basically unprecedented because all this time the company operates in an established and developing market [1-17].

By reassessing the relative emphasis on each dynamic capability, large global companies regenerate their competitive advantage over time. With strategic agility, process performance is based on a relative level of mass customization ability to provide products and services. Process performance is based on the specific characteristics, attributes, needs, and desires of the customer. Strategic agility results from a combination of three main meta-capabilities that provide the foundation. To set the argument, there are three main dimensions of the framework developed in previous studies and develop three appropriate vectors of the five recommended leadership actions for each dimension. The dimensions of strategic agility measurement are Strategic Sensitivity, Leadership Unity and Resource Fluidity. In addition to the three dimensions, there are other dimensions in the assessment of strategic agility. This dimension is a collective commitment where the sub-dimension results in acceptance of partner culture or cultural learning and determinants of knowledge transfer [18-33].

3.0 THE FRAMEWORK

Strategic agility offers companies the development of entrepreneurial capabilities in a way that is suited to the conditions of a competitive and dynamic environment. Strategic agility also creates measurement dimensions to develop strategic variations over time. Strategic agility stimulates companies to develop various capabilities in resources. With a strong entrepreneurial capability, the company is able to build an operational procedure from various combinations of activities and assets to achieve the expected business performance.Capacity absorption underlies the company's ability to value, change, and exploit new knowledge for the purpose. Strategic agility underlies the company's ability to take action to effectively reconfigure entrepreneurial capabilities in company routines. Conceptually, it enables a company to accurately determine the most appropriate form of strategic agility to strengthen its entrepreneurial capabilities. Figure 1 illustrates a framework that includes the relationship between entrepreneurial capabilities and strategic agility. Conceptually, strategic agility is a dimension to strengthen the concept of strategy or capability. Surely the strategy or capability aims to improve business performance.

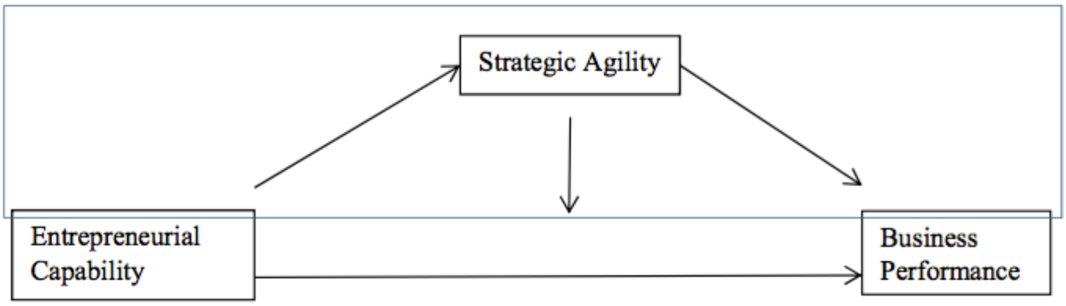

Figure 1. Conceptual framework

The ability possessed by the owner-manager in building competitive advantage is an individual resource that can be used in carrying out strategic behavior. Entrepreneurial capability is an important dimension in every phase of business development. The owner-manager of a small and medium business must have the Entrepreneurial Capabilities needed so that the company can be agile and able to survive in dynamic and uncertain environmental conditions.Entrepreneurial capabilities that must be possessed include supply chain management capabilities, relationship capabilities, conceptual capabilities, organizing capabilities, strategy capabilities and commitment capabilities. Supply chain management capability is an ability related to the company's product supply chain. Relationship capability is the ability related to the development of interpersonal relationships. Conceptual capability is the ability related to understanding (cognition), absorbing information, interpreting it, and being able to process it to create a concept that is beneficial to the company. Organizing capability is the ability to search for, identify and organize internal and external resources to be used efficiently and effectively in running a business. Strategy capability is the capability related to planning, evaluating and implementing corporate strategy. Commitment capability is the ability related to commitment to keeping learning, moving forward and innovating.Strategic agility can be conceptualized by three Meta capabilities, namely strategic sensitivity, leadership unity, and resource fluidity. Strategic sensitivity is the sharpness of perception and the intensity of awareness and attention in developing strategies. Unity leadership can be implemented in various ways such as dialogue activities, giving subordinates motivation, discussing before making decisions, giving attention and so on. Resource fluidity is an internal ability to utilize resources efficiently and effectively, such as re-configuring resources or moving resources quickly.

4.0 CONCLUSION

The ability possessed by managers of small and medium business owners in building competitive advantage is an individual resource that can be used in running a business. Entrepreneurial capability is an important resource that must be owned by managers of small and medium business owners so that their companies can be agile in facing the conditions of a dynamic and uncertain business environment.

Further research in the field can include case studies and further analysis. A comparison of implementation models by various types of organizations in various business environments can provide interesting results. In addition, it would be appropriate to test the model in small and medium businesses to examine the correlation between entrepreneurial competencies and strategic agility and business performance.

REFERENCES

[1] Dyer, Lee, and Richard A. Shafer. "From human resource strategy to organizational effectiveness: Lessons from research on organizational agility." (1998).

[2] Arokodare, Michael A., and Blessing R. Falana. "Strategic agility and the global pandemic: The agile organizational structure, a theoretical review." Information Management and Business Review 13.1 (I) (2021): 16-27.

[3] Dehmolaee, Sanaz, and Yaghub Rashnavadi. "Strategic agility in telecom industry: the effective factors on competitive advantages." Middle East Journal of Management 6, no. 1 (2019): 1-20.

[4] Bundtzen, Henning, and Gerriet Hinrichs. "The link between organizational agility and VUCA–an agile assessment model." (2021).

[5] Nazari Enjedani, Somayeh, and Mandar Khanal. "Development of a Turning Movement Estimator Using CV Data." Future Transportation 3, no. 1 (2023): 349-367.

[6] Anca-Ioana, Munteanu. "A REVIEW OF ORGANIZATIONAL AGILITY CONCEPT AND CHARACTERISTICS." Annals of the University of Oradea, Economic Science Series 28.1 (2019).

[7] Almahamid, Soud, Abdulkareem Awwad, and Arthur C. McAdams. "Effects of organizational agility and knowledge sharing on competitive advantage: an empirical study in Jordan." International Journal of Management 27.3 (2010): 387.

[8] Saadat, Mohammadreza, and Benedek Nagy. "Digital geometry on the dual of some semi-regular tessellations." In Discrete Geometry and Mathematical Morphology: First International Joint Conference, DGMM 2021, Uppsala, Sweden, May 24–27, 2021, Proceedings, pp. 283-295. Cham: Springer International Publishing, 2021.

[9] Fakunmoju, Segun, Micheal Arokodare, and Grace Makinde. "Strategic agility and competitive advantage of oil and gas marketing companies: the moderating effect of information technology capability and strategic foresight." The Journal of Accounting and Management 10.3 (2020).

[10] Amini, Mahyar, and Zavareh Bozorgasl. "A Game Theory Method to Cyber-Threat Information Sharing in Cloud Computing Technology ." *International Journal of Computer Science and Engineering Research* 11.4 (2023): 549-560.

[11] Nazari Enjedani, Somayeh, and Mahyar Amini. "The role of traffic impact effect on transportation planning and sustainable traffic management in metropolitan regions ." International Journal of Smart City Planning Research 12.9 (2023): 688-700

[12] Jahanbakhsh Javidi, Negar, and Mahyar Amini. "Evaluating the effect of supply chain management practice on implementation of halal agroindustry and competitive advantage for small and medium enterprises ." International Journal of Computer Science and Information Technology 15.6 (2023): 8997-9008

[13] Amini, Mahyar, and Negar Jahanbakhsh Javidi. "A Multi-Perspective Framework Established on Diffusion of Innovation (DOI) Theory and Technology, Organization and Environment (TOE) Framework Toward Supply Chain Management System Based on Cloud Computing Technology for Small and Medium Enterprises ." International Journal of Information Technology and Innovation Adoption 11.8 (2023): 1217-1234

[14] Amini, Mahyar and Ali Rahmani. "Agricultural databases evaluation with machine learning procedure." Australian Journal of Engineering and Applied Science 8.6 (2023): 39-50

[15] Amini, Mahyar, and Ali Rahmani. "Machine learning process evaluating damage classification of composites." International Journal of Science and Advanced Technology 9.12 (2023): 240-250

[16] Amini, Mahyar, Koosha Sharifani, and Ali Rahmani. "Machine Learning Model Towards Evaluating Data gathering methods in Manufacturing and Mechanical Engineering." International Journal of Applied Science and Engineering Research 15.4 (2023): 349-362.

[17] Sharifani, Koosha and Amini, Mahyar and Akbari, Yaser and Aghajanzadeh Godarzi, Javad. "Operating Machine Learning across Natural Language Processing Techniques for Improvement of Fabricated News Model." International Journal of Science and Information System Research 12.9 (2022): 20-44.

[18] Amini, Mahyar, et al. "MAHAMGOSTAR.COM AS A CASE STUDY FOR ADOPTION OF LARAVEL FRAMEWORK AS THE BEST PROGRAMMING TOOLS FOR PHP BASED WEB DEVELOPMENT FOR SMALL AND MEDIUM ENTERPRISES." Journal of Innovation & Knowledge, ISSN (2021): 100-110.

[19] Amini, Mahyar, and Aryati Bakri. "Cloud computing adoption by SMEs in the Malaysia: A multi-perspective framework based on DOI theory and TOE framework." Journal of Information Technology & Information Systems Research (JITISR) 9.2 (2015): 121-135.

[20] Amini, Mahyar, and Nazli Sadat Safavi. "A Dynamic SLA Aware Heuristic Solution For IaaS Cloud Placement Problem Without Migration." International Journal of Computer Science and Information

Technologies 6.11 (2014): 25-30.
[21] Amini, Mahyar. "The factors that influence on adoption of cloud computing for small and medium enterprises." (2014).
[22] Amini, Mahyar, et al. "Development of an instrument for assessing the impact of environmental context on adoption of cloud computing for small and medium enterprises." Australian Journal of Basic and Applied Sciences (AJBAS) 8.10 (2014): 129-135.
[23] Amini, Mahyar, et al. "The role of top manager behaviours on adoption of cloud computing for small and medium enterprises." Australian Journal of Basic and Applied Sciences (AJBAS) 8.1 (2014): 490-498.
[24] Amini, Mahyar, and Nazli Sadat Safavi. "A Dynamic SLA Aware Solution For IaaS Cloud Placement Problem Using Simulated Annealing." International Journal of Computer Science and Information Technologies 6.11 (2014): 52-57.
[25] Sadat Safavi, Nazli, Nor Hidayati Zakaria, and Mahyar Amini. "The risk analysis of system selection and business process re-engineering towards the success of enterprise resource planning project for small and medium enterprise." World Applied Sciences Journal (WASJ) 31.9 (2014): 1669-1676.
[26] Sadat Safavi, Nazli, Mahyar Amini, and Seyyed AmirAli Javadinia. "The determinant of adoption of enterprise resource planning for small and medium enterprises in Iran." International Journal of Advanced Research in IT and Engineering (IJARIE) 3.1 (2014): 1-8.
[27] Sadat Safavi, Nazli, et al. "An effective model for evaluating organizational risk and cost in ERP implementation by SME." IOSR Journal of Business and Management (IOSR-JBM) 10.6 (2013): 70-75.
[28] Safavi, Nazli Sadat, et al. "An effective model for evaluating organizational risk and cost in ERP implementation by SME." IOSR Journal of Business and Management (IOSR-JBM) 10.6 (2013): 61-66.
[29] Amini, Mahyar, and Nazli Sadat Safavi. "Critical success factors for ERP implementation." International Journal of Information Technology & Information Systems 5.15 (2013): 1-23.
[30] Amini, Mahyar, et al. "Agricultural development in IRAN base on cloud computing theory." International Journal of Engineering Research & Technology (IJERT) 2.6 (2013): 796-801.
[31] Amini, Mahyar, et al. "Types of cloud computing (public and private) that transform the organization more effectively." International Journal of Engineering Research & Technology (IJERT) 2.5 (2013): 1263-1269.
[32] Amini, Mahyar, and Nazli Sadat Safavi. "Cloud Computing Transform the Way of IT Delivers Services to the Organizations." International Journal of Innovation & Management Science Research 1.61 (2013): 1-5.
[33] Abdollahzadegan, A., Che Hussin, A. R., Moshfegh Gohary, M., & Amini, M. (2013). The organizational critical success factors for adopting cloud computing in SMEs. Journal of Information Systems Research and Innovation (JISRI), 4(1), 67-74.
[34] Khoshraftar, Alireza, et al. "Improving The CRM System In Healthcare Organization." International Journal of Computer Engineering & Sciences (IJCES) 1.2 (2011): 28-35.
[35] Amini, Mahyar and Ali Rahmani. "How Strategic Agility Affects the Competitive Capabilities of Private Banks." International Journal of Basic and Applied Sciences 10.01 (2023): 8397-8406.
[36] Amini, Mahyar and Ali Rahmani. "Achieving Financial Success by Pursuing Environmental and Social Goals: A Comprehensive Literature Review and Research Agenda for Sustainable Investment." World Information Technology and Engineering Journal 10.04 (2023): 1286-1293.
[37] Yun, Chidi, et al. "The Significance of Information Systems in Enhancing Strategic Agility within Supply Chain Context: A Case Study of Telecommunications Industry." International Journal of Engineering and Applied Sciences 11.02 (2023): 67-74.
[38] Motalo, Kubura, et al. "The Competitive Edge of Strategic Agility in Airlines through Embracing Novel Technologies ."International Journal of Technology and Scientific Research 12.04 (2023): 789-796.
[39] Olutola, Tomiloba, et al. "The Intermediate Function of Sustainable Dynamic Capabilities in the Association between Social Customer Relationship Management and Sustainable Competitive Advantage." Asian Journal of Basic and Applied Sciences 10.04 (2023): 97-104.
[40] Chen, Lee, et al. "Categorization of Surgical Complications using Computer Vision Technique ." American-Eurasian Journal of Scientific Research 11.04 (2023): 5994-6001.
[41] Li, Chang, et al. "Analysis and Categorization of Stock Price Factors via a Novel Framework based on Computer Science Technology ." World Journal of Technology and Scientific Research 12.03 (2023): 361-366.
[42] Zhang, Lixuan, et al. "A Hybrid Forecasting Method for Anticipating Stock Market Trends via a Soft-Thresholding De-noise Model and Support Vector Machine (SVM) ." World Basic and Applied Sciences Journal 13.03 (2023): 597-602.
[43] Xiang, Zheng, et al. "Efficiency of Risk Classification and Insurance Market Regulation through the Integration of Advanced Technology ." World Engineering and Applied Sciences Journal 14.02 (2023): 3986-3992.