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Dynamic representation of Strategic Construct

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Abstract. There is a clear lack of capacity at the level of organizational decision making to develop a decision-making process based upon a complete and clear understanding of multiple potential outcomes derived from different strategic actions. The existing analysis and scenarios creating models, used at the academic and practitioners fields, do not provide a single output that can be interpreted and taken as the final and relevant information output to be used at the decision-making moment, and are nor or cannot be dynamic, turning any tentative to create scenarios based upon them impossible. Their lack of capacity to connect distinctive and still related variables creates great difficulty to decision makers when evaluating multiple business variables and producing action decisions. Current existing business simulation and diagnosis models only consider a reduced number of factors or variables, most only two variables represented by 2x2 matrices, not linking to any of them multiple existing factors and variables related to the business environment, in order to deliver a final and single output, which could be used as the core indication for the decision-making process. That has led to an important question: How can information represented in multiple 2x2 matrices be reduced to a single representation? Or, in other words, can we interconnect two or more 2x2 matrices and create a new matrix that represents all variables in place? The proposed model in this paper is a tentative to provide a solution to that problem, having a unique and unmistakable meaning, eliminating confusion and potential errors at the decision-making moment. The concept has been applied to a software application dealing with multiple variables represented in different 2x2 matrices and reducing all those variables to a single positioning in a final 2x2 matrix.

Keywords: Dynamic models; strategy; innovation; decision-making.

1. Introduction

Using visual models to represent reality in the economic and business environments has been a constant for some authors (Ansoff 1965 [1], Porter 1985 [2], Tesmer 2002 [3], Lowy & Hood 2004 [4], Sarkar 2007 [5]), who had approached fields like business strategy and value creation. Their attempts have brought a better understanding to the market about how strategic planning and decision evolves, develops, disseminates and transforms the economy.

However, the conceptual format on many of those models makes their operational application difficult at the enterprises' level. Entrepreneurs and strategy and innovation managers and practitioners have been seeking, for a long time, for models that can, in a simple and clear fashion, indicate the most appropriate kind of decision to be developed and applied in their businesses.

This paper intends to present a practical strategic model to top management and scholars, which will bring the decision point down to a simple and unique proposition, answering entrepreneurs and managers' doubts and validating the strategic reasons to use strategy as a mean to increase value creation.

2. Researching prior practices

The concept of "strategy", from the military point of view to the business environment and management point of view has been deeply analysed and used (Chandler 1962 [6]; Steiner 1979 [7]; Queen 1980 [8]; Porter 1980 [9]; Mewes 1981 [10]; Mintzberg 1994 [11]; Krause 1995 [12]; Kaplan & Norton 2001 [13]; Kim & Mauborgne 2005 [14]; Patel 2006 [15], and many others), in such way that the word and meaning of strategy became vulgar to most entrepreneurs, corporate and business management and students.

Strategy is a kind of "plan" that enterprises define in order to conduct their own future, covering three different levels: corporate – related to different businesses or product lines; business – related to product positioning; and functional/organizational – related to distinctive competencies that may create competitive advantages (Eisenhardt & Sull 2001[16]). From the business stand point of view, according to Lowy & Hood (2004), authors have worked many different subjects or perspectives like "market needs" (Gale 1994 [17]; Hamel & Prahalad 1994 [18]), "strategic context" (Porter 1980; Pascale & Athos 1981[19]; Tesmer 2002), "strategic options" (Ansoff 1965; Rowe et al. 1984 [20]; Porter 1985), "marketing and communication" (Davenport & Back 2002 [21]) and "risk" (Henderson 1979 [22]; Ohmae 1982 [23]). All these authors have proposed their own models for strategic analysis and definition, and most are used in the business and academic world, providing a better understanding of the many different factors that impact business decisions.

The "market needs" perspective brings up the necessity to understand consumers in all its extension. One way to understand consumers' needs is studying their specific functional and emotional needs and, consequently, transforming those into product attributes or functionalities.

Value Analysis (VA) contributes to that understanding through a process of functional analysis (FA) and function costing, determining the relation between the satisfaction of needs and resources utilized, being this relation called "value" (Miles 1972 [24]; European Norm EN 12973:2000 [25]).

A European transnational group of specialists in Value Management (VM) have produced a document (Value Management Handbook, European Commission, 1995) [26], which illustrates the existence of a direct relation between "value" to consumers and business strategic planning and decision making, which is supported by the VM European Standard. Many of those applications of VM concept in the business world have brought up the issue of product value, from the consumers' perspective, to the level of corporate strategic analysis and definition, impacting many aspects related to different stakeholders beyond consumers, like impact on society and environment, economical influence on suppliers and social influence on internal human resources.

From the observation of the direct application of the value concept in strategic planning and implementation in many small and medium size businesses, I came to the construct of a model which progresses from value to product and business strategy, which can provide decision makers with a clear vision of some potential scenarios and respective outcomes, based upon a set of influential factors, internal and external to the companies.

This model intends to understand the needed alignment of the different factors in play in order to create the right conditions for any strategy to achieve success. The existence of a good and straight alignment of all factors in play is crucial to make any strategy sustainable. The confrontation with this reality in many situations, especially in the small and medium size company world, has taken me to name the constructed model as "Moving along Alignments and Paradoxes" (MAP), as it can provide a clear idea about a business's aligned or paradoxal existence.

3. Approach/Methods

It is commonly understood that the mission of any business proposition is to provide economical return to shareholders; otherwise they would not invest their resources in any business, in the first instance. It is in accordance with this simple concept that the MAP model has been developed. It has been constructed with the specific objective of understanding the potential profit of any business proposition and the consequent and appropriate strategy to achieve such objective.

With that purpose set, the model evolves around five major variables plus one, each one represented by a matrix, being three independent and the other two dependent, and the last one a mix of both situations.

The dependent variables in a business are those that are subjected to the result of other variables, that is, are themselves the result of something else. In this category we can include product "margin" and "profit", as both are the outcome or result of decisions and outputs from different factors inherent to the business and to the market.

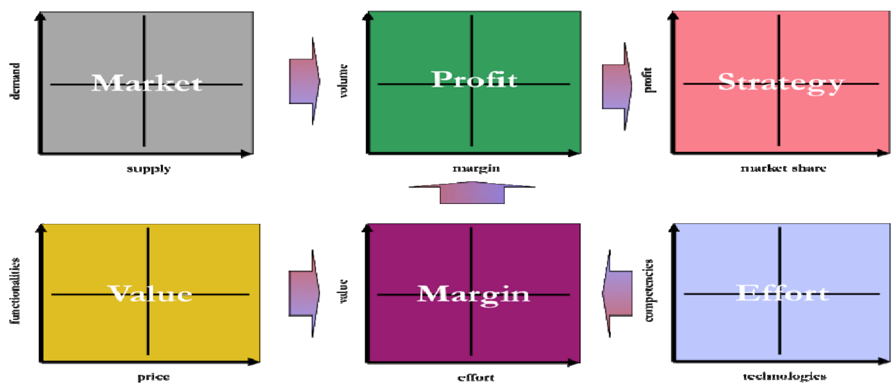
The independent variables in a business are those that we or someone else may impact in different ways, inducing different outputs or results from real situations. In this category we may include the product "value" for consumers, the organization's "effort" to deliver that value to consumers and the "market potential" derived from the combination of the demand and the supply connected to the same product.

Once we identified these variables, dependent and independent, we tried to understand the connections among them. Therefore, product "margin" may be the result of the combination of outcomes coming from product "value" and organization's "effort" and, business "profit" may be the result of the combination of outcomes coming from product "margin" and "market potential".

Finally, the consequent "strategy" to be implemented may result from the combination of the business "profit" and organization's existing "market share", or capability to acquire it in the future.

The relation among all variables and their major factors are represented in figure 1.

Figure 1 . MAP model



In mathematical terms, the outputs of the "value" and the "effort" matrices become, respectively, the "y" and "x" axis of the "margin" matrix, the outputs of the "market" and the "margin" matrices become, respectively, the "y" and "x" axis of the "profit" matrix, and the output of the "profit" matrix becomes the "y" axis of the "strategy" matrix.

Value is defined by the factors functionalities of the product and by the price paid by the consumer. The functionalities can be intrinsic to the product, satisfying the needs for which the product was created in the first instance, or extrinsic to the product, satisfying emotional needs or other needs that no other product can satisfy. The price can be determined by consumers/market or can be imposed by the producer/seller.

Effort is defined by the factors competencies and sophisticated processes and technologies, which are applied by businesses in order to produce the needed value for consumers. Both can be compared with other competitors and they can be determined of the same kind or of higher ranking.

Market potential is defined by demand and supply. The factor demand behaves mainly as a result of its elasticity and the factor supply is mainly dependent on the number of competitors.

Margin is the result of value and effort and Profit is the results of potential available volume from the market and the margin.

Strategy is defined by potential profit resulting from of previous factors and business existing market share or capability to acquire market share in the future.

The four kinds of strategic approach are the consequence of the combination of potential profit and market share, being, clockwise from the top left quadrant: (1) "develop" product and market, focusing on yearly adopters kind of consumers, (2) "leverage" the dominant market position, focusing on corporate image and marketing, (3) "explore" the market, focusing on distribution and, (4) "control" the organization and clients, focusing on sales and clients retention.

The MAP model has a straight relation with Jack Tesmer's Perfect Business Match model (2002), as both come to an equivalent conclusion when using different determining factors in the analysis process. The validation of each of those models by the other has an especial importance to understand the market environment and the most adequate approaching strategy to marketing, eliminating misunderstandings and reducing risk in the strategic decision process.

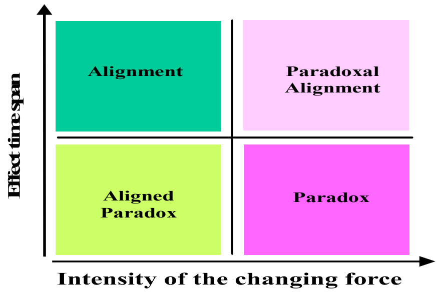
4. Implications to strategic thinking

When one is conceiving and designing business strategies, one must consider the effect that all forces in play can have on one's plans. There are many forces that can influence the route course of a business strategy, like political, social, economical and technological (known as PEST) and rivalry in the industry, buyers' power, suppliers' power, threat of substitutes, and barriers to entry (Porter 1980).

The intensity of change that those forces can have on the environment where the business is in and the time length that they will impact define the kind of strategic equilibrium that a business can expect, as shown on figure 2.

If the intensity of the changing force is weak, that means that changes are going to be soft and slow, and this situation is going to last for a long time span, we may say that we can have a strategy of "alignment" with all forces and expect that things will happen as predicted.

Figure 2 – "Strategic Equilibrium" matrix



However, if the intensity of the changing forces is very strong, that means that changes are going to happen very rapidly, even without previous notice, and having a strong impact on the business environment, and the time span that it is going to last is not expected to be very long, then we may say that we must have a "paradox" strategy if we want to go over the situation.

If the intensity of the changing force is weak and the span of time that it is going to be felt is short, we may just have to readjust our strategies in order to align them for the time being, but being ready to go back to previous strategies when the "aligned paradox" disappears. This normally happens when something occurs far from one's geographic arena and brings new working conditions and needs into his operating process, forcing one, sometimes, to develop some quick strategic adjustments.

When the intensity of the changing force is very strong and its time span of effect is too long, we must develop strategies to face a "paradoxal alignment" situation. The increasing pricing of diesel is forcing transportation companies to develop "paradoxal alignment" strategies, as on one hand production costs will keep increasing constantly while on the other hand there is a great pressure from clients to maintain or even reduce prices previously established, as transport costs became a critical factor to these. This situation, because may last for too long, may put some transport companies into turmoil, running the risk of closing business. Most of the time, the best strategy in a "paradoxal alignment" situation is getting out of the market while conditions are kept unchangeable.

This approach must be used when evaluating any business condition in a short or long-term perspective, as the current situation may change unexpectedly, and sometimes, for no apparent reason.

5. Value to the economy

This paper intended to demonstrate the importance of having a model to create a direct and clear relation between value creation and business strategy. It also intends to demonstrate the relation between business strategy and value creation.

The MAP model starts at the product value analysis and definition and brings that together with other factors to a final one single possible and adequate strategic approach to market. There is a direct relation between value for consumers, value creation by organizations and the right strategy that most decision makers seek when entering a new business.

In the same way, it brings all its simplicity and practical side to a easy and simple to use software that can not only characterize a specific product and time situation but also create and project scenarios and foresee future tendencies.

The model is very intuitive and can be utilized by any entrepreneur or manager, even without a great level of business fundamental knowledge. When using the software application, the dynamics among all factors in play, related to a specific product or business situation, turn decision options into clear decision targets, turning these much clearer and reducing uncertainty at the eyes of the decision maker.

The model can be applied to a new product or to an existing product situation. It is also applicable to any kind of product or service industry.

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