
Business Processes' Reengineering in the Context of Increasing the Firm's Value

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Abstract:

This article is devoted to the study of practical combination of the business processes' reengineering concept and the concept of value creation to increase the performance of the company and the possibility of an objective quantitative assessment of management decisions' quality.

The article compares the management evaluation tools within the framework of business process reengineering and determines that the use of the VBM (Value Based Management) model will improve the results. The concept of creating value provides an objectively evaluation of the company's management actions and efforts aimed at maximizing the value of the company.

The authors revealed the functional links of business processes when the product of an auxiliary process transfers its value to the final product of the main business process and, as a result, considering of every single business process as an independent business line, analyzing its profitability, efficiency, and "narrow" places that are not visible in the company as a whole, becomes possible.

Therefore, the author's vision results in the following: business processes' reengineering is a powerful effective tool for introducing the concepts of cost management into practice. Being implemented within the framework of the reengineering project, the transformations fundamentally affect the performance of the entire company's management including its main component - financial management. Thus, the effectiveness of financial management while implementing a reengineering project can be objectively evaluated through the application of methods and tools developed within the framework of the value concept.

Keywords: *Reengineering, business processes, management, the value concept, market value, efficiency and performance, financial goals.*

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1. Introduction

Lately the concept of business processes' reengineering becomes more and more diffused in Russia, allowing the manager studying his enterprise from a completely new standpoint from the one of existing and operating business processes within the enterprise. A new version of a process model of activity is coming to push out the traditional organizational and functional structure of the enterprise. The concept of business process reengineering provided the manager with a multiple increase in the efficiency of the enterprise, based on the technologies for identifying, describing, and redesigning business processes within the enterprise. The background of the concept development had already a sufficient number of introduction examples, showing really outstanding results.

As a practical matter, the concept of business process reengineering was introduced and interpreted as a purely managerial theory. Authors consider this traditional approach not reflecting the true essence which is multifaceted and includes not only the adoption of managerial decisions aimed at improving business efficiency, but also financial goals to increase the value of the corporation (Arvanitis *et al.*, 2017).

The new concept of management is Value Based Management (VBM). It has replaced the traditional views that linked the efficiency of the company's activities with the task of maximizing profits. It states that growth of the company's market value in the long term, the growth of the well-being of its owners and shareholders is the main goal of the company's management. In this vein, the concept of business process reengineering becomes the tool that allows the manager to lead the company to the intended goal -to the highest possible value of the company in the long term. At the same time, the concept of creating value provides the user with the objective evaluation of the company's management actions and efforts (Kuznetsova *et al.*, 2017; Anureev, 2017; Bondarenko *et al.*, 2017).

2. Theoretical, Empirical, and Methodological Grounds of the Research

Issues connected with the study of the theory of market value management of the company now are of great interest to Western economists. The foundations of this paradigm were laid by Jack Welch (2013), CEO of General Electric. Further, the theory was supported and developed in the studies of Kaplan and Norton (2005), Copeland (2004), Rappaport (1986) and others. The concept of business process reengineering was developed as well. The appearance of the term "reengineering" is connected with economists like Hammer and Champi (2001) and Davenport (1993).

Simultaneously with the concept of reengineering, in the 1980s, Western economists offered a new perspective on the ultimate goals of the enterprise. The views of scientists on the management of business performance are also changed. In this case, the study of reengineering, increment of the company's value and business performance management should take place jointly (Ivanova *et al.*, 2017).

In the process of research, authors applied the following methods: theoretical (analysis, synthesis, concretization, generalization, method of analogies); diagnostic (the method of aims and tasks); empirical (study of regulatory documentation and experience of Russian enterprises in managing their own capital); experimental (ascertaining, forming); methods of graphical representation of results.

Experimental base of the research included the initial data of Russian enterprises on reengineering business processes, when the object of study undergoes transformational changes under the influence of external and internal factors. The study is carried out in three stages:

- The first stage included the theoretical study of current methodological approaches to business processes' reengineering, basing on the analysis of scientific papers as well as the theory and methodology for conducting a comparative analysis of the business performance evaluation concepts from the standpoint of the transformations' results.
- The second stage involved identifying the problems that had limited the effectiveness of management from the viewpoint of methodological tools' inadequacy. Authors also suggested the application of the VBM concept and revealed the factors affecting the company's value.
- The third stage assumed that theoretical and methodological work was completed. So, the theoretical and practical conclusions were refined, the results of the study were generalized and systematized.

3. Results

After highlighting the urgency of the research problem and describing the theoretical, methodological, and empirical aspects authors concluded the results. Generally, the task of managing business performance solving by the company's management could be described by the following main stages:

- Development of a strategy aimed at creating a market value of the company in the long term.
- Defining the target indicators to judge the direction of the company's development and the degree of compliance of the strategy developed.
- Analysis of current activities of the company, identification, and description of its business units and business processes.
- Fixing target indicators for business units and business processes.
- Introduction of value thinking at all levels of the company, management's interest.
- Performance monitoring.
- Motivation of staff and its performance efficiency control.

The highlighted stages of the cost management system implementation will still not be enough if the manager does not have a convenient and sufficiently accurate tool for measuring the results. After all, managing something needs the capability of

measuring it. Modern economic science provides a fairly wide range of measuring tools in the form of concepts for assessing business performance as follows:

- Traditional financial model;
- Value Based Management (VBM) model;
- BSC (Balanced Scorecard);
- ABPA system (Activity-Based Performance Analysis);
- BPM concept (Business Performance Management).

All these systems have advantages and disadvantages and could be applied in various situations. The traditional financial model is based on the market type of economic thinking. It assumes that all the parameters determining the business performance are localized in the internal environment of the company. Consequently, business performance is determined by the quality of operational management decisions aimed at solving tactical tasks based on the current capabilities of the organization. The accounting data turns to be a decision-making basis. The system assumes that the effective activity of the company in the previous period is indicated by the effectiveness of management. As noted above, this efficiency evaluation system has a number of shortcomings. Nevertheless, it is quite applicable for enterprises with a fairly simple internal structure and a stable market position.

The main issue of VBM model is the criterion of creating the highest possible market value of the company in the long term. The VBM model as well as the traditional financial model is based on financial management data. The main difference is that the company's valuation is directed to the future and takes the influence of the external environment and risk factors through the discounting of cash flows. Evaluation of the effectiveness of decisions made by the enterprise management is performed from the position of creating the highest possible value of the enterprise in the future. The disadvantage of this model is a sufficient complexity for management's understanding, in some cases an overcomplicated mathematical apparatus that is poorly applicable in practice as well. Within the framework of this concept a number of created value estimation approaches emerged and developed simultaneously as:

- EVA - economic value added;
- MVA - market value added;
- SVA - the value of equity added;
- CFROI - cash flow for investment;
- DCF - discounted cash flow;
- CVA - the cash flow value added.

The techniques differ in the sources, types of input calculations data, mathematical apparatus and with varying degrees of reliability of the results obtained. The BSC emerged as a possible solution to the problem of assessing the company's ability to

achieve its strategic goals. The BSC methodology provides user with the translation of the company's strategic goals into a set of indicators that can be controlled within the framework of current activities. The indicators are emerged within the framework of the BSC depending on the company's strategy in four areas of activity: financial, client, internal business processes, training and staff development.

The BSC system was formulated by Norton and Kaplan in 1992. The authors described it as a system that *"... reflects all the reliable elements of the company's strategy, from continuous improvement and partnership in the teams of performers to global goals"*.

Unlike the rest of business performance assessment systems, BSC could be considered as more management and non-financial criteria-oriented that characterize the quality of management in terms of its ability to implement the chosen strategy in achieving its goals. The advantages of the BSC system are the coverage of almost all levels of the organization, the logical interrelation of indicators and the flexibility of the system of indicators. But the system has disadvantages as well such as: the lack of an integral indicator which allows for judging the effectiveness of management in general; a large number of different indicators creating difficulties with the choice of really meaningful indicators and the difficulty of implementation.

The ABPA system is based on the management skills in the company's business processes. If business processes and economic indicators like generated revenues and resources consumed are acquainted, managers achieve a powerful tool for analyzing and managing the company. This effectiveness evaluation approach was proposed by Meyer (2004) in his book "Business Efficiency Assessment".

The advantage of the ABPA system is the full coverage of all business processes in the company. The connections between indicators are determined by real business processes. The system provides a clear pattern of company's activities. The disadvantages are: the strong reliance of implementation effectiveness and the quality of identifying, describing and economic calculating of business processes; the lack of a single integrated indicator to evaluate the company's management effectiveness.

In our opinion, the ABPA system is a striking example of combining the cost approach to the efficiency evaluation and the concept of business process reengineering based on methods and tools provided by financial analysis and financial management. However, the project was not brought to its logical conclusion. The only integral financial indicator that characterizes the efficiency of the company's management as a whole was not found.

The BPM system cannot be characterized as something homogeneous. The systems were partly developed by large companies to solve their own management problems, however, partly developed, implemented, and approved by the largest consulting

companies. We consider the BSC system as one of the most well-known BPM systems. The analysis of the systems provides us with the following conclusions:

1. If the business processes of the company are simple and not subject to significant changes and the performance criteria of the company are weakly dependent on environmental factors, then the traditional financial model is likely to be the best financial system;
2. In conditions of low business processes and strong dependence on external factors, the ABPA would be the best performance evaluation system;
3. Under the current conditions of the Russian economy most companies are facing the strong effect of environmental factors on the business performance. Moreover, companies are forced to constantly change their business strategies, rebuild business processes for successful retention of competitive market positions. Thus, BSC and VBM are the main competing systems for business performance evaluation.

We conclude that the BSC relies more upon non-financial methods, while in the present context, the tasks of assessing the effectiveness of financial decision making are actualized through the use of financial indicators. So the VBM concept is most suitable for solving these problems.

The concept of a system of goals and indicators was called Value Based Management (VBM), a management model based on value creation. According to this concept, the traditional accounting methods of assessing the effectiveness of the company's activities are replaced with a system of market value management indicators, becoming the basic management paradigm.

Welch (2013) is the founder of the VBM concept, a CEO of General Electric, who delivered a speech on August 12, 1981 on *"Rapid growth in a slowly growing economy"* at the Pierre Hotel in New York. In his speech he first emphasized that the main goal of the company's management is increasing the shareholders' well-being. This management principle asserts that the decision-making management of the company should take into account the interests of shareholders, whereas the previous approach obliged management to take care of maximizing profits. The new management concept immediately revealed the conflict that exists between the mercenary managers of the company and its owners. The mercenary is inclined to work to maximize profits. The methods used to increase the short-term profits could seriously undermine the company's position in the future while the owner of the company is interested in strengthening the market position of his firm in the long run and increasing the rate of its securities in the stock market.

The new management paradigm required the development of a system for evaluating the effectiveness of the company's management in terms of maximizing its market value. The list of cost indicators is constantly being improved, updated, and supplemented making them more objective and clear.

The spread of market value indicators is caused by significant discrepancies in the evaluation of the assets and capital book value and the market value of the company. So, accounting methods cannot evaluate assets such as the company's reputation, intellectual development, corporate knowledge, corporate image, influence resources, development potential, and so on. Indeed, accounting methods that estimate such items as goodwill and intellectual developments (for example, in IFRS) at fair value still exist, but corporate knowledge, the image of the organization, resources of influence, the development potential are no longer measured. But the evaluation of the company at its market value provides us with a fairly objective result. It can be assumed that the concept of reengineering and the concept of cost-based management arose almost at the same time, although they are studied mainly separately from each other.

Thus, the management concepts for creating value for VBM and reengineering business processes for BPR are not independent management theories but closely interrelated, organically complementing each other. In this case, the reengineering of business processes becomes not only a managerial category but turns into a coherent financial and management concept aimed at a significant increase in business performance as an integral framework. This concept gives the manager tools for further strategic development, setting goals and the means to achieve them with a balanced theory of evaluating the effectiveness of actions and the accuracy of the course taken.

Actually, the concept of reengineering has already been integrated in the practice of Russian management and adopted by a growing number of companies. Its value is beyond the doubt. However, as already noted above, the concept of business reengineering was considered rather narrowly: only in the organizational and managerial context. Several studies and articles are devoted to the theory and practice of the reengineering concept. At the same time, the main thrust of the research is focused on the search, development, and description of management techniques and methods aimed at the practical application of the management concepts as well as in the selection and training of personnel, the rational use of resources, the psychological aspect of introducing a new form of thinking into the minds of employees. Indeed, this direction of research is justified since business reengineering is quite a complex and multifaceted task covering completely all areas and directions of the company.

The core task of management of any enterprise is to ensure its effective performance in the harsh conditions of the modern Russian economy. To assume, the main efforts of managers within the reengineering framework will focus on the following tasks:

- maintaining its market share through improving the quality of goods, works and services offered to consumers;
- maintaining competitive prices for their products, goods, services under rapid inflation conditions;

- optimization of internal processes aimed at rational use of resources available;
- determination of the most rational patterns of interacting with the external environment.

At the same time, the head of the enterprise struggles with affecting the company's value. The VBM concept identifies seven key cost factors guiding the manager in his future actions:

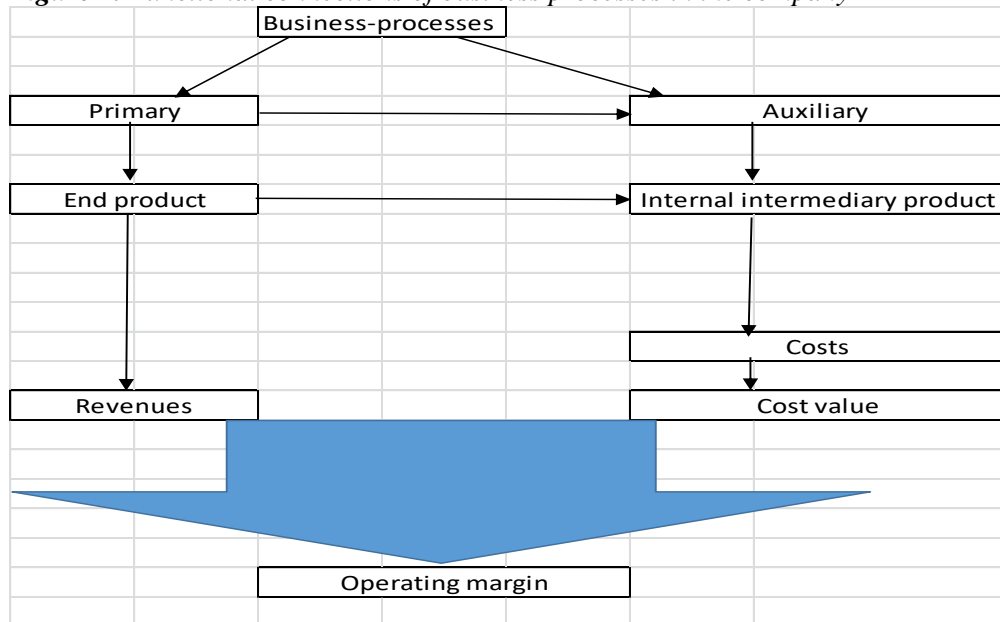
- Income;
- Operating margin;
- The tax burden;
- Capital expenditures' growth rates;
- Investments in working capital;
- Cost of capital;
- Competitive advantages.

We do not consider the creating of the final cost of the product there but dip into the creating a market value for the company itself. The main stages of the reengineering project implementation are thoroughly described in the studies of the business reengineering concept. Generally, they are the following:

- Studying the activities of the enterprise, highlighting the business processes in it, and studying them in detail;
- "As is" description of business processes and frameworks of the company;
- Research and identification of existing problems, bottlenecks reducing the effectiveness of existing business processes, searching and identifying causes;
- Redesign of business processes aimed at eliminating identified problems. Building the company's business scheme "as it should be";
- Developing measures to transition from "as is" state to "as it should be" one, consistent and systematic implementation of activities to implement the project in practice;
- Management of new business processes.

4. Conclusion and recommendations

Thus, in the context of cost management efficiency means gains in the market value of the company, increase of its investment appeal. Application of reengineering tools provides the manager with a fresh look at the company's business activity. The process of decomposition and description of business processes cannot be handled without a proper description of the processes' economic features. The description of the process would be incomplete unless all the revenues of the process are calculated, and all the costs are associated with it, which ultimately form the costs of the products (works, services) produced (Figure 1).

Figure 1. Functional connections of business processes in the company

Carrying out the company's research to identify the existing business processes, one should identify the main and auxiliary business processes (Figure 1). At the output of the main business process we get the final product intended for the client of the company. At the output of the auxiliary business process we get an internal, intermediate product consumed by the main business process. Thus, the product of the auxiliary process transfers its value to the final product of the main business process.

While studying the activities of the company and highlighting business processes, it is necessary to provide the correspondence of basic processes' number and the number of products produced by the enterprise, sales channels, services provided, etc. This approach makes us considering every business process as an independent business line, analyzing its profitability and effectiveness, providing us with the data on shortcomings and "bottlenecks" that are not visible in the enterprise as a whole. While analyzing the economics of business processes, one could realize that one or two of the main business processes appears as donors to the others. So, management should pay much attention to the researching and redesigning low-profit business processes noted before.

Thus, the impact of business reengineering, at least, on two of the cost factors named before (revenues and operating margin) is obvious. Identifying problematic business processes and "bottlenecks" and then eliminating them, debugging processes will lead to an increase in their profitability and growth in operating margin.

It is not hard to demonstrate the impact of business reengineering on other value factors. Redesign of existing business processes may require certain capital expenditures, investments in the project or vice versa, refusing them. Capital costs are another factor of value too. Similarly, it is obvious that reengineering contributes to a more efficient use of the resources available to the company. And this is a direct impact on the amount of investment in working capital, it is another cost factor.

Business reengineering, in the context of the planned changes, their scale, the amount of necessary costs, have every reason to be considered as a separate business project. Moreover, business reengineering enables deep business analysis in the process of its decomposition and description, providing an opportunity to rethink and evaluate existing sources of funding as well as arranging their structure, taking measures to reduce the cost of capital raised. So, there is another factor of value - the cost of capital. Tax administration of business is another important issue. Reengineering provides the enterprise manager with an opportunity to study the issues of interaction between the enterprise and the fiscal authorities. It is no secret that it is necessary to utilize all legal measures to reduce the tax burden on the enterprise in conditions of complicated Russian tax legislation.

So, the last of the cost factors remained. It is the competitive advantage of the company for a certain period of time. Probably this is the only cost factor that is not directly related to the functions and methods of financial management. An indirect link is not hard to find, though. The impact of reengineering on achieving competitive advantages does not require any special evidence. Just enough mentioning that business reengineering is aimed at achieving greater flexibility of the enterprise to ensure its easier adaptation to rapidly changing environmental conditions. The precise, fine-tuning of the business economy achieved in the process of implementing the reengineering project increases the safety margin of the enterprise, its resistance to negative market influences.

Thus, we have every reason to conclude that a targeted implementation of the business reengineering project gives the manager the opportunity to directly affect the company's value factors. This conclusion provides us the assertion that business reengineering is an effective tool of cost management aimed at creating and incrementing the market value of the company to increase the well-being of its shareholders.

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