MANAGEMENT OF A MODERN INDUSTRIAL ENTERPRISE: INITIATION OF BUSINESS PROCESSES REENGINEERING

Topicality. Today, in order to overcome financial problems, business entities are forced to mobilize the entire economic potential. But it is precisely in the manufacturing sector that business processes are often unable to resolve the crisis effectively, so the management department should find an alternative way to overcome it. Before modern domestic enterprises, the increasing problem of increasing the efficiency of management is becoming more and more actual. One of the key issues is the dominance of functional management in organizations, which causes a lot of complexity. The process of reengineering business processes at the enterprise comes at the aid, which today needs additional study and coverage. Applying the principles of reengineering, an enterprise can prevent bankruptcy or decline in production and continue development in the chosen direction, or take on the basis of analysis of the results of the decision on the change of products, technological or market orientation.

Purpose and tasks. Consider the methods of building a business on the principles of reengineering business processes at the enterprise. Analyze the major mistakes during reengineering, and specify the main advantages.

Research results In the article during the study of the topic found methods of building a business on the principles of reengineering business processes in the enterprise, the main advantages of reengineering. It also found that due to the reengineering of business processes at the enterprise it is possible to accelerate the growth of investment attractiveness, the introduction of new information technologies, that is, the enterprise is moving to a new stage in its development, and accordingly, there is growth, because without it it is difficult to imagine a modern enterprise, which seeks to match the international quality standards to maximize the needs of the population, support the national economy and domestic production.

Conclusions Thanks to the reengineering of business processes at the enterprise it is possible to accelerate the growth of investment attractiveness, the introduction of new information technologies, that is, the company is moving to a new stage in its development. Business process reengineering can provide a radical transformation of the management and production system of enterprises and allows to significantly improve the competitiveness and efficiency of their activities, help them to win new markets, move to a qualitatively new level in a competitive market environment.

Keywords. Reengineering, enterprise, business processes, enterprise management, management methods, approach
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УПРАВЛІННЯ СУЧАСНИМ ПРОМИСЛОВИМ ПІДПРИЄМСТВОМ: ІНІЦІАЦІЯ РЕІНЖИНІРІНГУ БІЗНЕС-ПРОЦЕСІВ

Актуальність. На сьогодні для подолання фінансових проблем суб’єктів господарювання змушено мобілізувати весь економічний потенціал. Але ж саме у виробничій сфері бізнес-процеси часто не в змозі ефективно вирішити кризу, тому відділ менеджменту повинен знайти альтернативні шляхи для її подолання. Перед сучасними вітчизняними підприємствами все актуальнішою постає проблема зростання ефективності управління. Однією з ключових проблем є домінування функціонального управління в організаціях, що викликає багато складнощів. На допомогу приходить такий процес як реінжиніринг бізнес-процесів на підприємстві, який на сьогодні потребує додаткового вивчення та висвітлення. За допомогою реінжинірингу підприємство може здійснити банкрутство чи спаду виробництва і продовжити розвиток в обраному напрямку, або прийняти на основі аналізу отриманих результатів рішення про зміну продукції, технологічної або ринкової орієнтації.

Мета та завдання. Розглянуті методи побудови бізнесу на принципах реінжинірингу бізнес-процесів на підприємствах. Проаналізовані основні помилки при проведенні реінжинірингу, а також вказани головні переваги реінжинірингу та усвідомлення і уникнення помилок при його проведенні.

Результати. У статті в ході вивчення теми виявлені методи побудови бізнесу на принципах реінжинірингу бізнес-процесів на підприємствах, основні переваги реінжинірингу. А також встановлено, що завдяки реінжинірингу бізнес-процесів на підприємстві вдається прискорити зростання інвестиційної привабливості, впроваджуватися нові інформаційні технології, подолати дотримання принципу рівноваги, а відповідно відбувається і зростання, адже без цього важко уявити сучасне підприємство, яке працює відповідно міжнародним стандартам якості для максимальної задоволення потреб населення, підтримки національної економіки та вітчизняного виробництва.

Висновки. Завдяки реінжинірингу бізнес-процесів на підприємствах вдається прискорити зростання інвестиційної привабливості, впроваджується нові інформаційні технології, побудова підприємства відповідно новому етапу свого розвитку, а відповідно відбувається і зростання, адже без цього важко уявити сучасне підприємство, яке працює відповідно міжнародним стандартам якості для максимальної задоволення потреб населення, підтримки національної економіки та вітчизняного виробництва.

Ключові слова. Реінжиніринг, підприємство, ініціація, бізнес-процеси, управління підприємством, методи управління.
Problem statement and its connection with important scientific and practical tasks. Today, business entities are faced with questions concerning the mobilization of domestic economic potential for effective overcoming of financial problems. Therefore, business processes in the field of production are often ineffective, and enterprise management is forced to look for alternative ways to overcome the crisis.

Analysis of recent publications on the problem. In the domestic literature, the methodological and applied aspects of reengineering business processes are not given due attention. Modern approaches to theoretical substantiation of scientific aspects and methodical approaches to the practical implementation of business process reengineering have been studied and developed by well-known foreign scholars [5, 7, 6, 9, 10]: M. Hammer, J. Champoy, T. Davenport, M. Robson, F. Ullah, E. Frese, F. Hilo. Recently, the greatest attention to developing the problems of the formation and implementation of reengineering processes is given to scientists from CIS countries: O. Ariefyev, L. Blyhman, M. Borodatov, P. Zabelin, S. Kozenko, V. Medinsky, E. Ojchman, E. Popov, V. Tarasov, M. Shapot. A significant contribution to the study of the issue of reengineering was made by the following domestic scientists: N. Abdikeyev, T. Danko, B. Zhelezko, S. Ildemenov, V. Ilyin, A. Kiselev, V. Medinsky, Y. Telnov, O. Cheremnyh, S. Teremny. Among the foreign ones it is worthwhile to identify: E. Sinder, N. Obolenski, M. Hammer, M. Robson, D. Cumpi, E. Feze, F. Ulaha and others.

Allocation of previously unsolved parts of the general problem. Despite a large number of scientific publications regarding the reengineering of business processes, it is not enough to highlight its necessity and main advantages.

Formulation of research objectives (problem statement) is to outline the main benefits of reengineering and awareness and avoidance errors during its conduct.

Outline of the main results and their justification. Modern approaches to substantiating the effectiveness of implementing reengineering and the practical implementation of business process reengineering have been researched and developed by renowned foreign and domestic scholars. In modern scientific literature, a large number of definitions of the concept of reengineering business processes are proposed. But first, it is necessary to disassemble the separate components of this concept for a more accurate understanding of it.

In the broad sense, the business process is understood as a structured sequence of actions for the implementation of an appropriate type of activity at all stages of the life cycle of an object of activity [2]. If earlier the best indicator of business success was the surplus of funds, today one of the leading indicators of business is its transparency and the ability to manage it. To date, there are a number of effective methods of reorganization and improvement of the enterprise. Some of them have flowed into the whole direction of theoretical and practical management. Among the most well-known are Global Quality Management, Business Process Reengineering, Horizontal Organizations.

Applying them, an enterprise can prevent bankruptcy or decline in production and continue development in the chosen direction, or take on the basis of the analysis of the results of the decision on the change of products, technological or market orientation. To achieve the goal of this study we will define the concept of RBP. The ideologues of reengineering business processes were American scientists M. Hammer and J. Champa. [9, p. 59], which determine reengineering as a fundamental rethinking and radical redesign of business processes in order to achieve fundamental changes in key actual performance indicators: cost, quality, services and pace. M. Robson and F. Ullach note that business process reengineering is a combination of methods and tools designed to fundamentally improve key performance indicators by analyzing and redesigning existing business processes [8, p. 57].

Business process – a set of different types of activities, within which "on the move" is used one or more resources, and as a result of this activity "output" creates a product that is of value to the consumer [3]. Some authors consider the business process as a set of internal steps (activities) to create the products required by the customer, cost, durability, service and quality which satisfies the consumer. Business processes in the organization are heterogeneous. In essence, organizational activities - a set of interrelated business processes, which reflect the implementation of individual functions of the organization [4].

In order for business processes to be able to fully meet the needs of consumers, to keep up with the times and to meet higher quality standards, the company uses a process like reengineering. Reengineering is a fundamental rethinking and radical redesign of business processes to achieve significant improvements in key performance indicators. Using this approach allows you to look at the purpose of the business process in a new way, completely ignoring the existing business process and the structure of the enterprise [1]. The main
The objective of business process reengineering is to improve performance, simplify management, significantly accelerate the company's response to changes in customer requirements (or the prognosis of such changes) with multiple reductions in all types of costs. The main tasks of reengineering business processes are a significant reduction in time costs, the number of employees and other expenses for the performance of production functions, as well as the globalization of business: working with clients and partners in every corner of the world.

The concept of business process reengineering is based on a process-oriented approach to enterprise management. Below are the key methods of building a business on the principles of reengineering business processes of the enterprise (Table 1) [5, p. 6].

<table>
<thead>
<tr>
<th>№</th>
<th>Methods of reengineering</th>
<th>Features of the method</th>
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<tbody>
<tr>
<td>1</td>
<td>Automation of business processes of the enterprise</td>
<td>Automation leads only to accelerating existing business processes. Using information technology, automation of business processes of an enterprise automates the existing process with all its drawbacks and does not set itself the task of designing a new process for a radical increase in efficiency.</td>
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<td>2</td>
<td>Software rebuilding</td>
<td>On the basis of modern technologies the rewriting of obsolete information systems is carried out without changing the automated processes themselves</td>
</tr>
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<td>3</td>
<td>Reduce enterprise size</td>
<td>Reduced opportunities for the company due to lower market requirements. Reengineering, by contrast, increases the company's capabilities</td>
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<td>4</td>
<td>Reorganization of the enterprise</td>
<td>This concept deals only with organizational structures, and not with processes</td>
</tr>
<tr>
<td>5</td>
<td>Improvement of quality, total quality management</td>
<td>Although quality management takes the central role of business processes, this method takes on existing processes and tries to improve them without changing them to new ones.</td>
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<tr>
<td>6</td>
<td>Continuous improvement of business processes</td>
<td>Provides a gradual improvement of business processes.</td>
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Source: author's development

For effective implementation of reengineering it is necessary to abstract from the existing functional organization of business, doubting the accepted methods of management of the company. Naturally, managers of enterprises need to have the resolve to change and try to perceive the situation in the company as if "side" [5, p. 5-9].

The risk of reengineering is quite large, but the prerequisites of failure are not in the mystery of reengineering, but in violation of the rules of its conduct. American researchers M. Hummer and J. Champi point out that the magnitude of the result is unrealistic. The main strategy in managing reengineering is to avoid global mistakes.

When conducting reengineering, the following common mistakes are often encountered (Fig. 1) [5]:

1. The company tries to improve the existing process, instead of re-designing it. This is the most flagrant error, though quite widespread. Without achieving the desired results, the craftsmen begin to use various techniques aimed at improving the company's performance, but, as a rule, their results are not satisfactory. But, after failing with other improvements, companies traditionally avoid radical restructuring.

2. Non-system approach to recovery. Companies focus on redevelopment, ignoring everything else. Reengineering causes significant configurations in areas such as design work, organizational structures, management systems, and evaluations. Traditionally, even managers who are interested in radical redesign of the actions, avoid making all the necessary configurations.
3. Incorrect assessment of the company's corporate culture. In order for the staff to successfully perform redesigned processes, it must have a prerequisite, and it is not enough simply to find a new process; it is necessary that managers form and bring to life the newest systems of values and beliefs.

4. Inconsistency in the development of innovation. It is in the early completion of the reengineering and the limited formulation of the task. Significant results are achieved only with the huge ambitions of company management. Experience has shown that quite often companies refuse to reengineering with the appearance of the first problems. Reengineering will be ineffective if the limited area of its action or task is set very narrowly.

5. Inappropriate allocation of tasks for the development of innovation. Attempts to perform reengineering are not top-down, but from the bottom up are ineffective for two reasons. The first reason is that managers of these levels do not have the same breadth of views on the company's activities, which is needed for reengineering. Their experience is mainly limited to knowing the functions that they perform in their own unit. The second reason is that business processes cross organizational boundaries, that is, the boundaries of divisions, which means that managers of the lower and middle level do not have sufficient authority to insist on the transformation of actions.

6. Lack of resource support for innovation. Significant increase in the efficiency of the company, which is a consequence of reengineering, is unrealistic without significant investment in its program.

7. Planning the moment of the beginning of the motivation. The chances of a successful reengineering drop markedly, if it's clear that the company's CEO is retiring in a year or two. And the point here is not that he will not take care of the future of the company or will become insufficiently diligent, but that the reengineering will necessarily entail configurations within the structure of the company, its management systems, and the executive director may not want to take over obligations that will shrink his heir.

8. Personal recurrence difficulties. Attempting to reengineering, without trampling on any rights, can not lead to a positive result. Because it's unrealistic to please everyone, there is either a delay in reengineering, or consistently only make partial configurations. The company retreats when it encounters resistance from employees who are not satisfied with the consequences of reengineering.

![Typical errors during reengineering](image-url)

**Fig. 1.** Characteristic mistakes in the course of reengineering business processes in an enterprise

*Source: [3]*

Business process reengineering is the most radical of all four approaches to improving business processes. It is also often referred to as process innovation, since its success is largely based on the innovation and creativity of the team to improve the process. This approach provides a new perspective on the goals of the process and completely ignores the existing process and structure of the organization. It all starts with a clean sheet of paper, just as if you were just starting to develop this process. BP reengineering, if done correctly, reduces costs and cycle times by 60-90% and error rates by 40-70%. This approach is used in cases where the process at the moment is so out of date that it is not even worth trying to maintain or improve it. The team to improve the process seems to go back and examine the process with a fresh eye, posing the question of how would plan this process, if there were no restrictions. The approach utilizes the opportunities provided by available process tools, including the latest achievements in the field of mechanization, automation and information technology, and at the same time improves those tools. Often, this process encourages the team to improve the process to develop a fundamentally new project process, which becomes a real breakthrough. [4]

Before modern domestic enterprises, the increasing problem of increasing the efficiency of management is becoming more and more actual. One of the key issues is the dominance of functional management in organizations, which causes a lot of complexity. Functional subdivisions and departments are not directly interested in overall results, as systems for evaluating their activities (which are generally characteristic of domestic enterprises) are separated from the overall performance of the company. There is constant competition between divisions and divisions, which is the result of the desire of each of them to be dominant. From practice we see constant conflicts between accounting, planning and economic and financial departments, sales and
production, etc. In functionally-oriented structures, the exchange of information is extremely complicated, it is considered a norm to pass information up to the functional manager so that he passes it to another functional manager, and he is already directly involved with the executor. Why complicate this process instead of directly transferring it to an executor? And all this is the dominant factor of the former Soviet way of managing the process: "No information should pass without me and my participation, but I am the leader and must all myself be in charge." As a result, the time is lost, which is so priceless in market conditions, when you do not have time – there will be competitors, and time is lost.

As a result, managers "cook" in their functions, forgetting about the goals and objectives of the company. At present, the devastating effects of such a management are particularly felt in today's crisis. At the same time, real work does not depend on the transfer of information from one manager to another, and through him in turn to the performer. The whole process is completely unchanged in the direct forwarding of information to the recipient, as much time is spent and opportunities for the enterprise are lost. All this is a process that has been brought to automatism, but its mechanics are simply not understood.

In most cases, a particular work represents a certain process, which is a set of certain actions that nobody manages and for which nobody answers. All this is a business process - a flow of work that goes from one specialist to another, or from one unit to another. As a rule, there is no standard list of business processes; each business must develop its own list of key business processes that will help to better understand its situation when it is described in terms of business processes.

The initiation of reengineering, as a business process, is carried out at the stage of analysis of the existing model and its reengineering. The object of the analysis and the object of measurement are the business processes of the enterprise, that is, the dynamic sequential actions focused on the consumer, ending with the production of production. At this stage, cost and simulation modeling is carried out to analyze the efficiency of the existing model and find a way to improve it. With the help of functional-cost analysis, such tasks as determination of the actual cost of production of products or services are solved; determine the cost of customer support, work with suppliers; identification of the most time-consuming work to be optimized in the first place; providing managers and management with information on changes in the financial aspect; realization of the forecast of the future activity of the company.

Imitation models are built to find the optimal solution in terms of resource constraints, optimal use of equipment, minimization of executed operations. The simulation model provides additional information for system analysis. To optimize business processes, you need to complete the most complete and detailed description of them, which will simulate the existing and foreseeable process-oriented organizational structure of the enterprise. Further development of existing methodical approaches to describing business processes has been further developed, taking into account the purpose of the description and the stage of reengineering, on which the description is carried out. When describing business processes, it is expedient to apply a comprehensive approach that includes: interviewing managers and employees of the structural units responsible for specific tasks; verbal and formal description of information flows and job responsibilities; construction of the matrix of responsibility for the appointment of the executor responsible for the process and the owner of the process; graphic representation of the organizational structure, goals, participants and possible options for the implementation of business processes of the enterprise.

The business process management system of enterprises has become popular due to its flexibility and orientation, above all, to meet the needs of customers. The main task in the transition to process-oriented management for enterprises is a complete and exhaustive description and regulation of business processes, as well as their optimal status and interaction. In this case, in many cases enterprises need reengineering, that is, a complete redesign of existing, or the development of entirely new business processes. The experience of reengineering business processes has such giants in the world of industry as Ford, General Motors, Duke Power, Deere&Company, and others.

In order to ensure effective reengineering, the organizational and economic mechanism for its implementation includes a block of planning and regulation of the economic activity of the enterprise. At the same time, planning reengineering is divided into current, operational and perspective. The author devised methods for the progressive planning of reengineering business processes by developing medium-term targeted programs, which should include: steps for the phased implementation of redesigned business processes; definition of funding sources, timing of implementation, responsible executors, incentive methods.

Regarding current planning, it should be implemented in the form of annual and quarterly plans for the implementation of reengineering. Research of scientific peculiarities of the business processes of industrial
enterprises has revealed that each business process consists of functional flows that are material and informational in nature. For industrial organizations, these flows are equally important.

However, if the above errors can be avoided or minimized, then, of course, the reengineering of business processes at the enterprise makes it possible to feel its main advantages (Fig. 2).

![Diagram of Advantages of Reengineering Business Processes at the Enterprise]

Fig. 2. Benefits of reengineering business processes at the enterprise
*Source:* designed by the authors on the basis of [6, p. 9]

In order to provide more productivity and re-evaluate the processes of the enterprise, to improve the performance of the enterprise and reduce costs, it is necessary to reengineering business processes at the enterprise.

**Conclusions and perspectives of further research.** Consequently, reengineering is a continuous process of constant changes and improvements in the production system of the enterprise and radical views and actions aimed at the best analogs for the production activity of the enterprise. Thanks to the reengineering of business processes at the enterprise it is possible to accelerate the growth of investment attractiveness, the introduction of new information technologies, that is, the enterprise goes to a new stage of its development, and accordingly, there is growth, because without it is difficult to imagine a modern enterprise, which seeks to meet international quality standards for maximum satisfaction, needs of the population, support of the national economy and domestic production.

Business process reengineering can provide a radical transformation of the management and production system of enterprises and allows to significantly improve the competitiveness and efficiency of their activities, help them to win new markets, move to a qualitatively new level in a competitive market environment. World practice shows that the best client is the business consultant who provides services in the complex of business process reengineering, provides the implementation of new processes by means of information technologies and provides further support to the established information system. Such "partner-consultant" is increasingly becoming system integrators who traditionally deal with the supply of integrated information solutions.
To this end, the enterprise should have such a level of corporate culture when employees, and especially managers, could accurately formulate new goals, priorities, tasks for reengineering, need a radical reorganization of existing systems to improve efficiency, and not just improve past performance. The coherent actions of all enterprise systems will enable transforming and mobilizing resources for efficient and productive functioning of domestic enterprises.

**LITERATURE**


**REFERENCES**


