

ORGANIZATION OF INDUSTRIAL AND SALE SYSTEM AS THE BASIS OF HARMONIZING THE PROCESSES AND STRUCTURES

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In the article the author develops his ideas concerning the essence of harmonic production, its principals and concepts. The special logical formulas of the ways and methods of their implementation are presented, illustrated by the examples of the enterprises of car industry.

The experience of national and foreign companies reveals that customer oriented policy of the enterprise demands transformation in its functions as well as in the organizational structure of the enterprise, composition and technology of accomplishing work.

Among the functions and projects providing enterprises the right for priority the following spheres are of special importance: the study of price structures in the future, market analysis, developing supply strategy, the analysis of the tendencies of branch development, the study and development of technical, technological and organizational changes influencing the process of cutting production costs and their structures, etc.

The level of innovative activity and production organization is in this situation the most important index of enterprise competitiveness.

The role of organizing production and its functions in relation to production system is changing concerning the stages of product life cycle (*LC*) and production system (*PS*) itself.

The complexity of changing production system in comparison to products and technologies is preconditioned by the unpredictability of the behavior of many of its elements, including personal factor. As the change of the system of production components (products, mechanical facilities and executors), their interrelations in space and time make the essence of organizing production. It is possible to suppose that organizing production is the main regulator of *PS* parameter. The importance of its functions is changing from stage to stage *LC PS*: on the first stage - to give functional and structural integrity of *PS*; on the second stage - contribute to the effective use of all types of

resources $\{P_i\}$ and updating the elements; on the third and fourth ones - provide the flexibility of *F* elements and links, increase their universal character (at the cost of diversification as well); on the fifth one - support the existence of *PS* by changing the specialization (for example, switch to providing a number of services for other enterprises using the existing capacity of workshops and etc.) .

The role of organizing production is in providing the most approximation of the organized nature to rational value. The positions of *FSO* theory are used for defining the scorecard of *OP*. This theory is used for developing the indices reflecting the degree of complying with the principals of updating, concentration, compatibility and flexibility of functions, elements and links of *PS*, in time measurement as well. *OP* functions were previously specified and systemized as the type of activity and the links of *FSO* indices with these functions are revealed.

The method of express evaluation of *OP* level is based on two indices - organized nature coefficient (K_{opz}) in time measurements and integral coefficient of quality *OP* (k^{OP}). Taking into account that the change of *OP* level often needs additional costs, and the low *OP* level withdraws the losses of all kinds, defining the optimal *OP* level for *PS* for a certain stage of the life cycle of its development can be done with the help of finding the minimum total expenditures depending on K_{opz} value.

In order to reveal the main types of losses because of *OP*, the extended classificatory was developed that makes it possible to classify them due to *OP* and *PS* functions.

The developed approach made it possible to evaluate not only *OP* level ($k_{opz} \rightarrow 1$) and its

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components but define the defective PS zones in order to improve them on the base of the method developed by us that is targeted at accounting the elements of the theory of system dynamics.

Dynamic structures of the model are represented by a number of “storages” or levels connected with each other by the managed flows.

The structured scheme of flows is supplied by the system of simple equations that help to measure and represent in quantitative terms dynamic changes that occur in the flows at different rates while entering, various parameters of lags and extensions. The rates of flows, the values of lags and extensions are initially defined by organizing production (for example, the value of uncompleted production), and regulated by management procedures.

Lag values are taking into account in FSO indices and total K_{opz} .

While implementing various methodical forms of evaluating OP level the results of FSA PS in different volumes are used.

On the basis of the data of statistic reports and PS internal industrial information, as

well as questioning during the analyzed time period, the values of private OP and FSO indices are defined and the elements of nonproduction costs are calculated.

The limits of K_{opz} increase can be set on the basis of the joint consideration of the graphs of the change of nonproduction costs, conditioned by OP disadvantages and the expenditures for accomplishing the works on OP depending on K_{opz} .

The minimum value of total costs correspond to the optimal value of K_{opz}

(OP level) for PS certain stage of development and existence conditions.

The use of K_{opz} while organizing innovative processes makes it possible to make a better choice of strategy and tactics in the situation of market economy.

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