

CONTROL AND ANALITIC BUDGET BACKING FOR RAW MATERIALS PURCHASE

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Key words: infrastructure, managing, budget, optimization, logistics, fixing, circulation assets, resources (of raw materials), informational system, circulation of documents.

The present article gives a careful consideration to the ways of improvement of service processes mechanisms within large-scale enterprise of mechanical engineering on the basis of efficient using of the available infrastructure. The analysis in the paper covers the basic existing problems of industrial enterprise with the determined necessity to provide control over raw materials purchase as one of the most expensive and hard-to-regulate spheres of activity. The proposed set of measures which would adjust to the up-to-date requirements of processes of enterprise provision will allow solving the complex of measures of raw materials purchase expenses decrease, of turnover and circulation assets increase, and, as a consequence, of competition stimulation without significant costs.

Economic management under market conditions leads to designing rational methods of raw material purchase management within enterprises of automobile cluster which depend upon analytical backing for raw material resources purchase. The stock of materials enables an uninterrupted supply of production line.

The rise of competition forces the enterprises of the automobile cluster to give attention to production efficiency. The most important condition here is a highly-organized supply called "Just in Time". The ideal which is to be reached exists. The system of "industrial park", widely spread in the West, makes it possible to cut the expenses for transport and storage operations considerably. Thus, the key objective now is effective enterprise provision which is impossible without upgrading of informational and management aspects of the material stock analysis.

The market economy promoted the usage of many new enterprise management systems which allow survival under such a cut-throat competition. On the most important tools in such circumstances is budgeting which is based upon analytical information. That is why there always a question about appliance of such analytical resources in which the process of budgeting would meet the needs of management in this very respect.

Nowadays there can be seen an obvious process of basic management figures increase of significance - accounting, analysis, planning, control, they all need to be reexamined and filled with some new contents.

A matter of utter complication for all domestic producers without any exception is how, when and by which means to provide an enterprise with circulation assets. Enormous sum of money which had already been invested in the storages of materials makes the problem of their control and management even more significant and important.

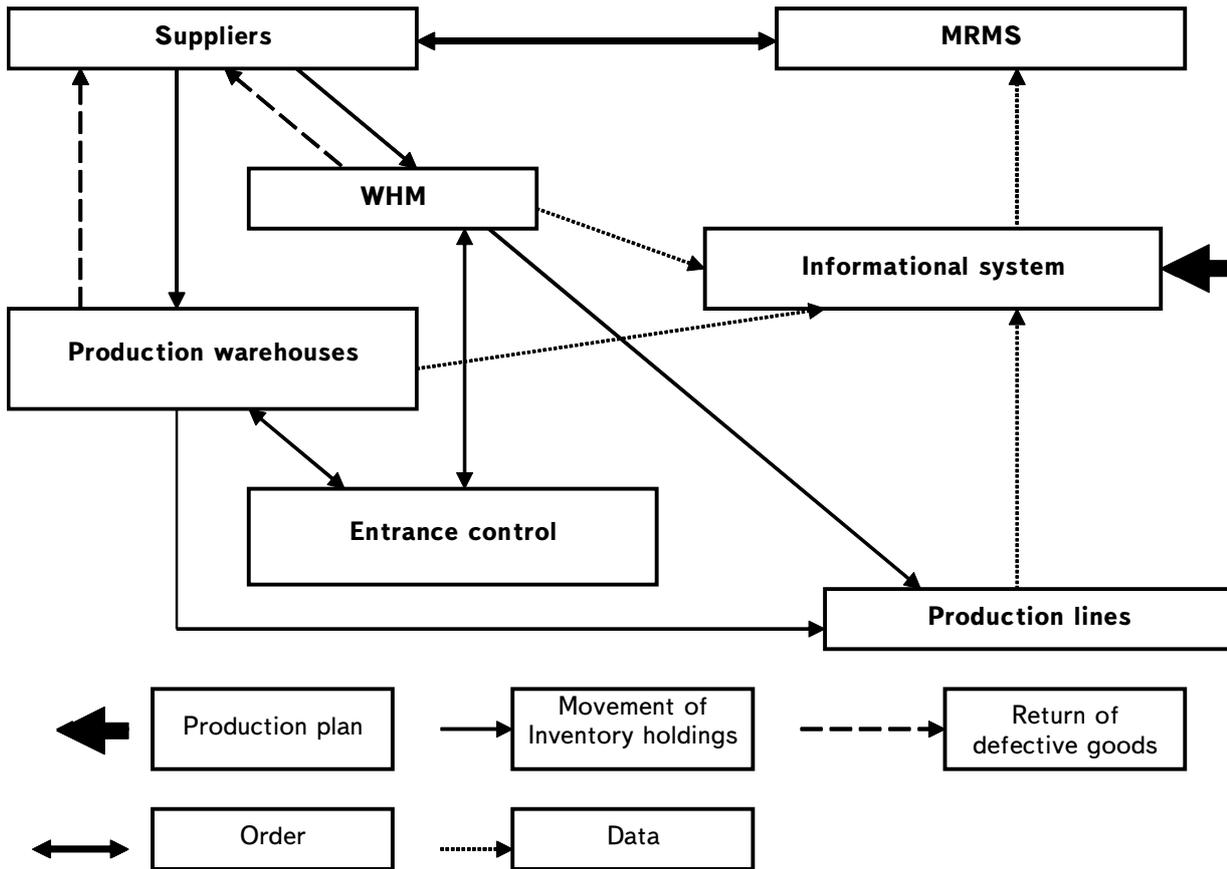
In order to exemplify the situation let us look at the principle scheme of the large-scale industrial enterprise provision (pic. 1)

After the production plan is available and the analysis of raw materials remains at the production storages and management of warehousing (WHM), the management of raw materials (MRMS) supply makes and sends an order to the suppliers. All enterprises are provided with informational systems of information processing and storage which apparently deal with the key production figures.

The drawbacks of this supply system are characterized by involvement of considerable sums of financial resources which are invested into the stock of raw materials, losses, production embezzlements, expenses for warehouses keeping, unpredictable quality of materials, which, by the way, need to be paid for, delays of money returns from the suppliers, and, consequently, the growth of bills payable. This in turn causes the rise of self-cost, the enforced short-term crediting, the decrease of profitability and the investment attractiveness of companies.

The majority of excessive resources of at modern enterprises is the non-liquid materials: left either from the Soviet times or caused by consumption of narrow specialization and production pecu-

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Pic. 1. The existing scheme of enterprise supply and provision

liarities. In most cases these materials are necessary for subsidiary production and, unfortunately, the possibility to change the situation at the subsidiary production completely is extremely limited.

One can draw an evident conclusion: it is necessary to alter the system of the main production supply. It can be achieved by way of passing some storage places to the suppliers for consignment with a legally executed lease contract, firstly, for the guaranteed uninterrupted supplies, secondly, potential trouble shooting concerning suppliers, and finally, for polishing of new scheme o supplies.

In this case after snatching of three-month order the suppliers place the materials in the consignment-designed warehouses, still remaining to be as an owner of the goods (pic. 2). The arrive material first goes through the quality services tests, after that the quantitative date is to be transferred to the informational system while the low-quality material is to be given back or reduced in price.

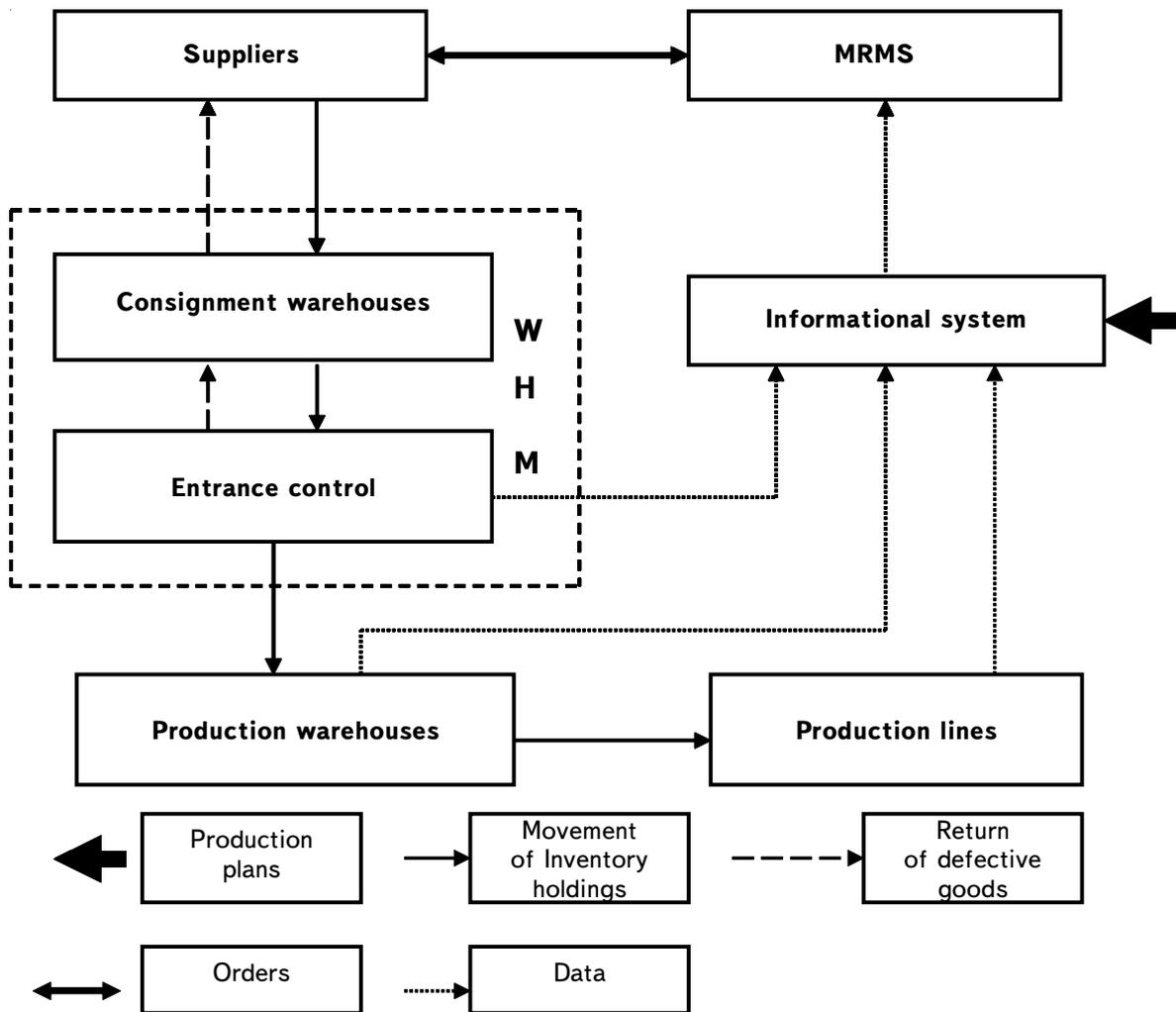
As a matter of fact, the process of production under this scheme of provision is getting closer to the western standard but with special tribute to the Russian specificity.

The present scheme enables:

- ◆ To ensure and guarantee the uninterrupted work of the production line;
- ◆ To reduce the stock of materials and raw materials to the minimum required level;
- ◆ To remove from 30% to 55% of financial recourses from the volume of circulation assists which are invested into resources and to use them following different aims;
- ◆ To exclude the probability of low-quality materials supplies and expenses connected with this;
- ◆ To minimize excessive resources of materials and raw materials min;
- ◆ To toughen the control over the raw materials consumption at the production line;
- ◆ To improve planning of using financial resources;
- ◆ To make right operative decisions in the field of supplies
- ◆ To reduce expenses for;
- ◆ To make the informational streams more transparent.

Since the infrastructure does already exist, the expenses for modernization will not be high.

The further stages of this scheme could be the complete passing of all the warehouses, and the expenses connected with them to the suppliers (pic. 3). In this case, the materials from



Pic. 2. The transitional scheme of enterprise supply and provision as proposed

the consignment warehouse are withdrawn almost every day by small portions and then go exactly to the production line for processing.

The availability of the necessary and sufficient raw material resources implies the increasing position of the controlling function over the availability of raw materials and materials. In this case, the means of control and management is the system of budgetary control (budgeting). The budget in itself is an indispensable part and constituent of many controlling systems. They make the management process more definite, enable to foresee the potential changes, to control the work of executors, to estimate the efficiency of materials consumption with the basis put on calculation of the future expenses¹.

Here are the stages of the internal control over materials and raw material purchases for a large-scale industrial enterprise:

1. Inventory of warehouses.
2. Processing of information at the computer center (CC), control over its authenticity.

3. Control at warehouses over the transferred to the CC information about arriving and distribution of materials.

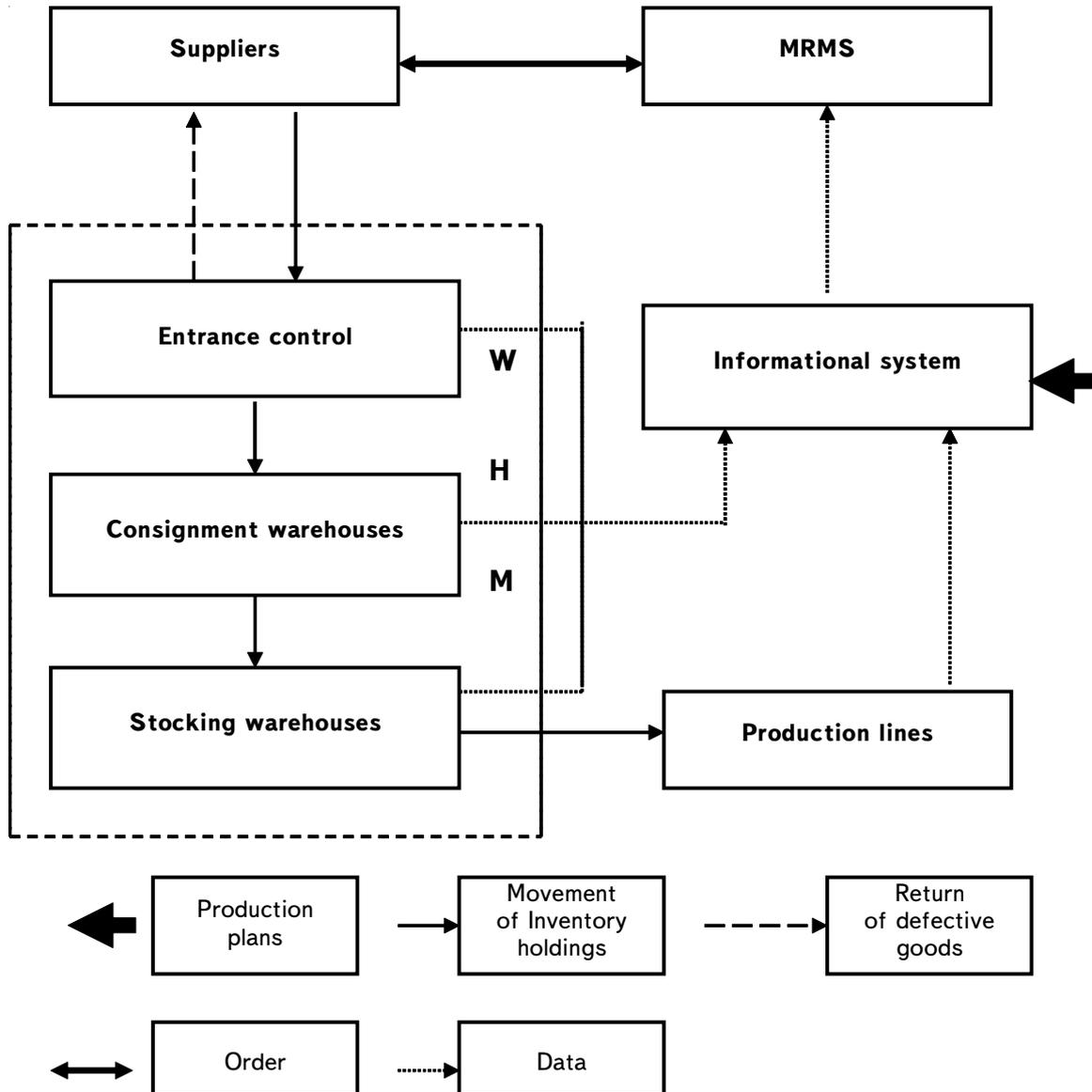
4. Conversion of materials into the system of computerized control system.

5. Transfer of information about the state of warehouses and arriving of materials to the supply service.

6. Control over material and raw material consumption at the production lines by means of applying of informational system capacities which could show the route, applicability and norm of consumption for every detail for every certain type of material.

When the revision is going on, all inventory documents, organization of inventory, correctness of decisions on re-grading of goods and material values, shortages and excesses are all covered and affected by a most accurate and intensive inspection².

The estimation of the stock of material and raw materials is carried out by means of two approaches - comparative (a method of proba-



Pic. 3. The scheme of enterprise supply and provision as intended

ble selling price) and cost-based (a method of actual costs).

The most important role in this scheme, and in the efficient management of the enterprise supply process, on the whole, is given to the process of rate setting of the stock of materials and raw materials, and also to the process of planning that is necessary for this budget.

The cornerstone of the whole problem is that how to optimize the expenses for material and raw material without causing any damage or obstacles to the production of enterprise. In order to survey a thorough analysis it is impossible neither to apply one figure and a group of figures in common money terms nor to manage without the metric system using also natural figures. To exemplify that one can remember the standard of material and raw material stock which is expressed through money (through ru-

bles) and natural terms (through days) and enables to realize how much materials it is necessary to have in order to guarantee the non-stop working process of the production line and how much this will cost the company.

We suppose that the proposed set of measures, caused by the changing structure of supply and characterized by relatively low expenses for reorganization of the informational system and circulation of documents, will certainly ensure efficient management of material and raw material purchase processes, reduction of costs, prevention of embezzlement and other damages and losses.

¹ Garifullin K.M. Management of expenses. Kazan, 2005. pp. 225-226.

² Melnik M.V., Panteleev A. S., Zvezdin A.L. Revision and control. M., 2003. p. 89.