

MANAGEMENT OF PRODUCTION POTENTIAL IN PASSENGER TRANSPORT

Yusupkhodjaeva G.B

Tashkent State Technical University

Doctor of Philosophy in Economics (PhD) Associate Professor

gulchehra76@mail.ru

ABSTRACT

This article is devoted to research on the development of production potential management in passenger transport. In the context of a rapidly developing transport system, ensuring a high level of passenger service in transport is considered

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Managing the production capacity of passenger transport is a complex task that involves efficient use of resources, optimization of processes and ensuring a high level of passenger service. Here are some key aspects of managing the production capacity of passenger transport:

1. Planning and coordination: It is necessary to develop effective route plans and traffic schedules, as well as ensure their coordination with other modes of transport (for example, metro, taxi). In addition, urban development plans and changes in infrastructure should be taken into account.

2. Maintenance and upgrades: Regular maintenance of vehicles reduces the chance of failures and improves overall productivity. In addition, it is important to

introduce innovative technologies and upgrade vehicles to improve efficiency and environmental sustainability.

3. Use of information technologies: The introduction of modern information technologies, such as monitoring systems, ticket systems using smart technologies, allows you to increase the efficiency of management and provide passengers with convenient services.

4. Personnel management: Effective organization of staff work, their training and motivation have a direct impact on the quality of service. It is also important to carefully monitor the working hours of drivers and other employees.

5. Environmental sustainability: Within the framework of production capacity management, efforts should be made to reduce the negative impact on the environment. The introduction of environmentally friendly technologies and practices can not only reduce the negative impact, but also attract more users.

6. Route development and optimization: Continuous study of passenger traffic, analysis of changes in urban infrastructure and making appropriate changes to routes will help optimize the use of the transport fleet.

7. Performance monitoring and evaluation: It is important to regularly monitor and evaluate the performance of the passenger transport system using key performance indicators. This allows you to quickly respond to problems and make adjustments to the system.

Managing production capacity in urban passenger transport requires a systematic approach, taking into account various aspects, ranging from maintenance of transport to ensuring passenger convenience.

The effectiveness of forming the management system and development of enterprises and economic sectors in general directly depends on their production potential, since its qualitative and quantitative characteristics determine the economic feasibility of strategic decisions made. Therefore, studying the problems associated with the formation of production potential and evaluating the effectiveness of its use is important in solving organizational and economic problems that arise when enterprises operate in a competitive market environment.

The production potential reflects the actual ability of the enterprise to produce the maximum volume of products, taking into account resource constraints.

Production potential (PP) is a system of economic relations that arises between economic entities at the macro-and micro-levels in order to obtain the maximum possible production result, which can be obtained with the most efficient use of production resources, with the existing level of equipment and technologies, advanced forms of production organization. Many scientists consider the production potential as a set of available resources of an enterprise, which in the production process take the form of its factors. From this we can conclude that the production potential, together with the production of products and services, provides an increase in the cost of capital of the enterprise. To increase the value of a business, the production capital structure must respond flexibly to changes in the market environment.

The essence of managing the production potential of urban passenger transport is to establish a balance between the demand for passenger transportation and the ability of the industry to meet this demand, that is, determining the level of production potential of carriersthat corresponds to the existing level of demand. And this is primarily the necessary production capacity, which is expressed in the carrying capacity of the fleet.

The lack of transportation capacity or its low level requires an increase in production capacity. In other words, these actions are nothing more than the transformation of the existing production potential of the industry into a new one that

fully meets the existing demand and ensures the appropriate level of quality of urban passenger transportation.

Based on all of the above, it is of great importance to assess the value of the production potential of urban passenger transport at a certain point in time. This assessment involves the use of a system of indicators that can be divided into three groups:

1. Indicators that reflect the total volume and structure of production capacities, both of the enterprise and of the industry as a whole.
2. Indicators that characterize the technical condition and efficiency of using the rolling stock fleet.
3. Indicators that describe the organizational aspects of the transport process and the effectiveness of the management process in urban passenger transport.

Let's look at the content of all groups of indicators.

The first group includes indicators that characterize the total production capacity of the enterprise and the specific weight of all its components, such as rolling stock, repair facilities and equipment, production stocks, construction in progress, the number of repair posts, intangible assets, etc. These indicators are considered both in kind and in value terms, as well as in absolute terms and dynamics. This approach will allow us to assess the current state of production potential, as well as its growth rates, which will make it possible to determine the prospects for the formation of production potential corresponding to the existing level of demand.

In modern conditions, the increase in production potential is primarily achieved through the creation and implementation of innovative tools aimed at improving transportation technologies. These innovations are objects of intellectual property based on the use of information technologies in the technological process, the formation of intelligent transport systems in passenger transport, contributing to the rhythm of transport operations and passenger awareness. These objects of intellectual property should be considered as intangible assets that are part of the production potential of the enterprise and reflect in this group of indicators.

Indicators of the second group include indicators of the efficiency of using the active part of fixed assets, namely the coefficients: renewal, depreciation, technical readiness, and others. It is also important to determine these indicators in dynamics in order to track general trends in changes in the production potential.

The third group includes indicators that characterize the transport process of passenger transportation, namely the interval and frequency of movement, speed of movement (technical, communication, operational), turnover coefficients, capacity, technical readiness, release, and others.

The use of these indicators, both in absolute terms and in dynamics, will allow us to assess the competitiveness of this enterprise, its ability to meet the ever-increasing demand for passenger transportation, and assess the attractiveness of public passenger transport.

Assessing the production potential and its compliance with market needs requires, first of all, an analysis of the production capacities of transport operators and the entire industry as a whole.

The production capacity of a passenger transport vehicle enterprise is the availability of vehicles of a given capacity, and their ability to transport the required number of passengers, at a certain point in time in accordance with the presented quality parameters.

The algorithm for estimating the production capacity of a transport service operator includes:

1. Data collection Baseline data: Collect information about the operator's current vehicle fleet, including the number and type of vehicles, their technical characteristics and age.

- map routes and traffic schedules: Evaluate current routes, traffic schedules, their frequency and duration.

- Track passenger traffic: Analyze passenger traffic on different routes, at different times of the day, and on different days of the week.

2. Defining Key Performance Indicators (KPIs):

-loading of the vehicle fleet: Calculate the percentage of loading of each vehicle to determine how efficiently they are used.

-punctuality: Measure the punctuality of transport and compare it with the expectations of passengers.

-capacity utilization: Consider the extent to which the vehicle fleet is being used over different time periods.

3. Analysis Of The Technical Condition Of Transport:

-pcheck the technical condition of the transport fleet, taking into account the frequency and volume of maintenance.

4. Forecasting The Need For:

-oevaluate the forecast of transport service needs in the future, taking into account changes in urban infrastructure, development plans and other factors.

5. Economic Efficiency Assessment:

-panalyze financial indicators, such as fuel costs, maintenance costs, and personnel costs.

-pcalculate the profitability of each route and the total profitability of the operator.

6. Defining Backup Capabilities:

-andidentify opportunities to increase production capacity, such as adding new vehicles, optimizing routes, or introducing new technologies.

7. Development Of Improvement Scenarios:

-oidentify various improvement scenarios, which may include expanding the fleet, changing routes, and improving maintenance.

8. Monitoring and Adjustment:

-develop a monitoring system to regularly monitor production activities, and make adjustments to the strategy if necessary.

This algorithm allows the transport service operator to systematically evaluate its production capacity, optimize resources, and improve the quality of services provided.

The implementation of the proposed measures will allow not only to change the number of rolling stock, but also the production potential of the fleet as a whole. And as a result, this means creating an efficient mechanism that provides high-quality passenger transportation services. This applies to changes in the entire transport process, such as reducing the travel interval, reducing bus occupancy, etc. This will be possible only as a result of increasing and replacing existing production facilities with technologically more efficient ones.

This will enable the use of technological, organizational and managerial innovations. Moreover, in this case, management innovation mechanisms aimed at improving the quality of services provided and the efficiency of all components of the transport process come first.

Production capacities in passenger transport are unevenly loaded, during peak hours there is an overload and shortage of production capacities, and during daytime and evening hours there is an objective decrease in the operation of vehicles. The elimination of these fluctuations is possible on the basis of innovative management decisions, the use of stimulating and limiting price decisions.

Assessment of the production potential of passenger transport enterprises, in addition to the analysis of production capacities, should also include a resource component, that is, the entire set of costs necessary for the formation of production capacities of the enterprise, namely financial resources to ensure uninterrupted and efficient operation of the entire transport system for passenger transportation. As a result, when calculating the production potential of urban passenger transport enterprises, it is necessary to take into account all emerging costs for passenger transportation (fixed assets, fuel, materials, etc.).

REFERENCES

1. Allayeva G.J. Problems of formation and use of the innovative potential of fuel and energy enterprises in Uzbekistan EDITOR-COORDINATOR, 2021
3. Illayeva, S. A., and Birikhodzhayeva, M. S. (2022, September). Improving the efficiency of customs activities in the development of international economic cooperation. In the international scientific and practical conference "Time of scientific progress" (vol. 1, No. 1, pp. 87-91).
4. Muzafarova, K. Z. (2019). The role of foreign investments in the development of the national economy of Uzbekistan. *Economics and Entrepreneurship*, (1), 411-414.
5. G.B. Yusupkhodzhayeva GLONASS JSC Innovative navigation and Information technologies in Uzbekistan e3s successfully web conferences 289, 07031 (2021)