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# INTELLECTUAL MANAGEMENT IS THE BASIS OF DEVELOPING A NEW INDEPENDENCE

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Abstract. This article presents ideas about the organization of Intelligent Management Technologies, which is one of the new methods of rethinking modern information flows. Suggestions and opinions of world-class IT specialists and scientists were studied. Based on the results of the study, the conclusions of our study are presented.

**Keywords**: intelligent management, digital technology, enterprise, production, automation, industrial revolution, productivity.

#### INTRODUCTION

Today, Uzbekistan is boldly stepping into a new stage of its development. Our relations with all countries, near and far, international organizations are expanding and developing more and more. Thanks to the far-sighted policy of the head of our state, the future of our great country began to be shared with the developed countries of the world, and important changes took place in our worldview and lifestyle.

The word "intellectual" comes from the Latin intellectus and the Greek words meaning knowledge, understanding, mind.

Management has a clear objective, this objective is to obtain optimal results based on technical, mathematical and other means.

Materials and Methods

An intellectual system is simply a mental system. Today, scientists and experts do not have a single opinion about the intellectual system. Therefore, as a result of our research, we found it necessary to define the intellectual system as follows:

An intellectual system is a mental system that has a scientifically based purpose, consists of certain elements and operates for a certain period of time by establishing relationships between these elements.

The algorithm of the intelligent system is as follows:

$$Fa=\{IM; E; N; S; t\}$$
 (1)

Here, Fa is the intellectual system, IM is the intellectual goal, E is the elements of the intellectual goal, N is the relationship between the elements of the intellectual goal, S is the structure of the intellectual system, and t is time.

It is known from the experience of developed foreign countries and the researches of scientists (academicians Vasil Qabulov, Murad Sharifkhojayev, Nodirbek Yusufbekov, S.S.Gulomov, F.B.Abutaliyev, etc.) that the more automated and intelligently the state and its constituent units are managed, the higher its level of development is proportionately higher. Today there is no clear definition of Intelligent Management among scientists and manufacturers. Therefore, as a result of our research, we gave Intelligent management the following tariff:

Intelligent management is an electronic system of obtaining optimal results based on logical rules of marketing, information technology, innovation, automation, employee activation (motivation) and fundamental sciences.

As a result of our research, we found that smart management is the basis for stable and efficient operation of the enterprise.

The algorithm is as follows:

$$Ib=K*Us$$
 (2)

Ib - level of intellectual management

K is the coefficient connecting the efficiency of the enterprise with intellectual management

Economic efficiency

As a result of our research, k = 0.47. This means that the efficiency of the enterprise has increased by 0.47 percent as a result of the introduction of intelligent management. We found this in the example of a machine-building enterprise. In other sectors, this coefficient is different.

The term "artificial intelligence" entered science in the 60s of the 20th century. In 1969, an international conference on artificial intelligence was held in Washington, where the issues of modeling human creative activity in electronic computing machines (ECM) were discussed. At this conference, artificial intelligence was defined as follows: Artificial intelligence is an artificial system that imitates the complexities of human activity. Today, scientists and experts do not have a single opinion about artificial intelligence. For example, in 1979 academician V. M. Glushkov defined artificial intelligence as follows: Artificial intelligence is the science of conceptualizing human mental issues with the help of electronic computers. Also, in 1995, O. V. German defined artificial intelligence as a programming system that imitates human thinking in a computer.

As a result of our research, we found it necessary to define artificial intelligence as follows. Artificial intelligence is an intelligent system that simulates issues related to human activity with the help of electronic devices. Currently, IT specialists and scientists are conducting a lot of research on the introduction of artificial intelligence systems and their troubleshooting. In particular, with the help of artificial intelligence technologies, the issues of face recognition, voice recognition and the implementation of tasks are being implemented in real time.

Uzbekistan has been developing steadily in recent years. As stated in the Decree of the President of the Republic of Uzbekistan No. PF-158 dated 11.09.2023: "It is necessary to improve the main directions of the development of our country and raise the implemented large-scale reforms to a new level. stage" [1].

For the successful implementation of these tasks, it is necessary to create such a mechanism that serves to ensure high and stable economic development, efficiency, as well as macroeconomic balance. In the implementation of these issues, it is very important to organize automation, intelligent management and achieve optimal results on this basis.

In order to achieve the above goals, we determined the following principles as a result of our research conducted on the example of the limited liability company "UZ-CARAM-KO" in 2021-2023. To the following principles (rules) in the organization of automation and intelligent management in enterprises:

the principle that the enterprise is a socio-economic-technical system;

the principle of mutual development of administrative management and production systems of the enterprise;

the principle of continuous systematic development of technological processes in the enterprise and all relevant objects and entities;

It is necessary to follow the principles that the increase in the level of automation and the use of intellectual management in the enterprise are proportional to the increase in the efficiency of the organization.

The beginning of the 21st century began a period of changes in the field of production, which was mainly associated with the emergence and integration of intelligent technologies. This digitization, according to Vial's explanation, is a process aimed at improving the manufactured product by initiating significant changes in its characteristics using a combination of information, computing, communication and connectivity technologies [2].

This paradigm shift is key to contextualizing the role of Intelligent Technologies in modern manufacturing processes that are increasingly being redefined and transformed by these innovations[3].

In the intellectual era, investments in projects based on artificial intelligence have increased, which has led to increased attention to SI by large organizations, because they can dramatically reduce transaction costs for businesses:

According to McKinsey, by 2030, about 400 million people on the planet, i.e. 14% of the workforce, will be out of work due to software and robots taking over their jobs. - 53% of workers believe that automation will significantly change their jobs or make their occupations obsolete in the next decade (only 28% of workers think this is unlikely).

Due to robotization, 77% of workers will need to acquire new skills or complete retraining in the near future.

74% of women and 80% of men will gain new skills through robotics. - 34% of older workers without secondary or higher education do not consider it necessary to develop new intellectual skills.

69% of 18 to 34-year-olds have a positive opinion about the impact of digitization on the labor market. 59% of those aged 35 to 54 and 50% of those over 55 agree [4].

Central to understanding this transformation is the concept of "Intellectual Transformation". This term reflects the transition from traditional manufacturing practices to modern, technology-based practices that fundamentally change the way manufacturing processes are carried out. Smart transformation in manufacturing is not a linear process, but a continuous evolution characterized by the continuous introduction of new technologies to increase efficiency, productivity and flexibility in a highly competitive and dynamic global market.

Another key term integral to this discussion is Industry 4.0, a term that originated in Germany and represents the fourth industrial revolution characterized by the convergence of physical and intellectual technologies and represents a new stage in the process of industrialization of cyber-physical systems, cloud computing and cognitive technologies. Industry 4.0 is characterized by a high level of automation and data exchange in production technologies, which allows for the creation of smart factories, recognized for increasing efficiency, reducing human errors and increasing production flexibility.

In the context of modern manufacturing, "automation and intelligent control" refers to the use of various control systems, mechanisms and software to control equipment with little or no human intervention. The essence of automation is to increase the speed, consistency and quality of its production, thereby reducing operational costs and human errors. Automation integrated with intelligent technologies such as artificial intelligence devices enables real-time monitoring and

decision-making, thereby bringing production to higher levels of accuracy and efficiency. Automation and intelligent management are required to optimize production processes and obtain the desired results.

#### **CONCLUSION**

In conclusion, it can be said that the introduction of intelligent technologies into production processes shows a significant increase in quality and optimization compared to traditional methods. Based on the principles of Industry 4.0 and manifested in advanced automation, this Intelligent transformation will not only redefine production processes, but also set new benchmarks for efficiency and innovation in the manufacturing sector.

Intelligent information technology is a technology that processes information from various fields and provides intelligent solutions based on systematic, logical and objective laws.

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