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THEORETICAL ASPECTS OF IMPROVING MEDIUM-ERGONOMIC COMPETENCE

Submission Date: October 04, 2023, **Accepted Date:** October 09, 2023,

Published Date: October 14, 2023

Crossref doi: <https://doi.org/10.37547/ijp/Volume03Issue10-05>

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ABSTRACT

Microergonomics "man is another component of the working system", the main goals of ergonomics, the interaction of mid-ergonomics at the level of workplaces and production tasks, the optimal distribution of functions between man and machine in improving the quality and efficiency of mid-ergonomics education and study of coordination problems, capabilities of the deputy directors, it was thought that the appropriate distribution of functions within the system would significantly increase its efficiency.

KEYWORDS

Ergonomic approach, ergonomic culture, ergonomic educational environment, technological system.

INTRODUCTION

Today, mid-ergonomics plays an important role in ensuring the quality and effectiveness of education. In this regard, T.S. Nazarova carried out studies in the field of equipping modern schools, using quality educational tools [1,2,4]. He developed the main task of pedagogical ergonomics, which consists in adapting material resources and working conditions to the specific characteristics of the teacher's educational activity and the student's knowledge activity, which is carried out in order to organize them rationally.

B.S. Gershunsky in researches in the field of pedagogical ergonomics "Pedagogical mid-ergonomics limited to the study of the physiological and psychophysiological mechanisms of optimal functioning of the student's body in the educational environment, attention to the purpose and content of such education, methods of presenting educational information, tactics (form, duration, sequence)" [2].

Thus, pedagogical ergonomics (PE) together with pedagogy, psychology and physiology is designed to help improve the educational process based on the midergonomic approach. He studies the physiological and psychological work opportunities of the teacher and the student, the conditions for creating optimal conditions for their work, protecting human health, and making his work effective with the use of biological resources, nerve power, time and material resources. Such conditions are intended to create optimal opportunities for the spiritual and physical development of the young generation and students.

Midiergonomics in the educational process is the implementation of ergonomic requirements for the organization of the educational process based on the principle of expediency of existence that is logically complementary and dependent on the discretion of the creative mind.

Taking this into account, we have conducted a pedagogical and mid-ergonomic analysis of the activities of the subjects of the pedagogical process, which are carried out during the application of some pedagogical technologies.

An interesting thing in this regard is the technology related to active learning through the purposeful activities of the student. This technology is a project method. This technology includes a collection of research, search, and problem-solving methods that are creative in their essence. The project method is "a way to achieve a didactic goal by developing a problem (technology) in detail, which should be completed with very realistic, concrete practical results, formalized in one way or another" [2].

In addition to creating a comfortable and safe environment for students to learn, to introduce students to modern ideas about the working environment, to ensure that students are responsible for their workplace. The deputy director of education should take into account the provision of the following by teachers in the process of planning the activities of educational subjects:

- formation of general labor skills and qualifications in students, formation and development of general labor culture, qualities that are the basis for choosing professions according to their interests, abilities, professional inclinations;
- to provide knowledge about various fields of the national economy, the techniques and technologies used in them, to create an opportunity for them to get acquainted with various fields of labor activity through practical work, to teach them the technologies of production of consumer goods;
- learning to use various tools, equipment, and devices used in the professional activities of working specialties in technology classes in higher classes;
- study the basics of working with mechanized and electrified tools, technological knowledge and skills, labor legislation, safety techniques, sanitary and hygiene rules;
- to study preliminary information related to the contents of various production areas, to be able to use measuring and checking tools, reference books, to perform labor practices, to learn to draw conclusions by comparing the obtained results with the set requirements;
- to inculcate in students the desire for knowledge and love for work, respect for working people, to

educate them in the spirit of community and loyalty to the Motherland;

- to train students to produce high-quality, competitive consumer goods, labor products and the means of delivering the produced products to consumers based on the requirements of market economy laws, to form and develop work management elements, patronage, and business qualities;
- to restore and develop the national spirit, way of life, traditions of the people, to teach national values, historical monuments, the rich heritage of folk masters and to strengthen the skills of using them in their practical activities by studying folk handicraft professions;
- to ensure that they study information technology and computer equipment, new technology and equipment application fields in the course of technology science training at the level of modern requirements and in accordance with world experiences.

Achieving these goals is the middle link in solving the problem of forming the process of socialization of young people.

At the next stage, the following issues will be resolved during the implementation of labor activities, i.e., educational work planning:

- categories of professions in Uzbekistan in the planning of educational work: human-human; man-technique; man-nature; human-character system; human-artistic image. Basics of professional skills. Step-by-step familiarization with the importance of interest, inclination, ability, professional suitability in choosing a career direction.

- to help students to voluntarily choose the field of interest in their institutions based on regional, geographical and local conditions. Considering whether health is compatible with the chosen profession. Formation of skills to consciously choose the future professional life path.

Pupils are taught the importance of choosing the right profession in the conditions of the market economy, the importance of choosing the right profession in the conditions of the market economy; world of professions, family tree of professions, important professions in the national economy of Uzbekistan, classifier of professions; training system of junior specialists; occupations, working conditions, means, subject, purpose, students' interests and inclinations, their character traits, their mental structure, psyche, their abilities and the needs of the schools to obtain information about the professions, the changes of the needs based on the requirements of the labor market, the compatibility of the health with the chosen profession, the voluntary choice of the educational direction in the educational institutions located in the region; it is necessary for him to know the possibilities of continuing his studies, his future position.

To be able to analyze the workplace of students in the issue of educational environment in classrooms; it is necessary to be able to correctly assess their personal qualities, interests and health levels, to be able to compare their individual characteristics with the midiergonomic requirements of the type of work, and to make personal professional plans.

The criteria of knowledge, skills and qualifications that must be acquired by students are expressed as follows:

Classification of professions, to know the general characteristics of their main categories.

To know the methods of determining the mutual compatibility of a person's interests, inclinations, abilities, health and other qualities with the midiergonomic conditions required by the type of labor activity.

The content, sections, tasks of the personal plan to be responsible for one's workplace, methods of testing training and improving professional skills, setting the time and place, making corrections, making mistakes and know how to analyze the cause of difficulties.

Consciousness and independence in choosing one's workplace. Self-education and the essence of choosing the type of work. Analysis of midiergonomic factors of professions. Determining whether one is suitable for the desired profession, knowing the methods of educating one's mental inclination towards the profession.

The above-mentioned determines the purpose and content of the creation of the design process of the interface of the cocktail hygiene, software products system. As the deputy directors for educational affairs are preparing to organize classes in the school, it is necessary to acquire the theoretical and scientific directions of the ways, forms, methods of implementation of these goals and tasks.

An important feature of educational activity is to determine the relationship between the student and the teacher as a source of information, on the basis of which educational and cognitive activities are carried out. The objective side of these relations depends on the characteristics of the data, and the subjective side

depends on the characteristics of the analyzers receiving the information sources.

I.M. Cheredov gives the following definition of working ability: "This is the state of the student that describes the level and duration of actions necessary to perform this or that educational work" [4]. We described the pedagogical conditions for the implementation of the midiergonomic approach and solved this problem, focusing only on factors related to performance. The activity of the subjects of the educational process at each individual moment depends on a combination of the following factors: physiological (age, gender, health); physical (working conditions, state of the workplace); psychological (mental state, type of nervous system activity, forms and methods of information impact on a person).

There is a detailed description of the factors affecting the activity of subjects of the educational process. These include: health status and level of fatigue; the power of motives; amount of mental and physical activity; organization of exercises and outdoor environment; learning ability; characteristics of the will and the level of preparation of the person for this type of activity; mood and emotional state of a person during work; changing mode of educational work and rest; specific characteristics of certain activities.

Based on the results of the analysis of the research on activity problems, in our opinion, the need for a midiergonomic integrative approach to the analysis of the activities of the subjects of the pedagogical process arises. Ensuring the compatibility between the physiological capabilities of the human body and midiergonomic requirements is one of the most important tasks among those mentioned above. This task is solved on the basis of information on the

characteristics of labor physiology, especially age physiology. During the next 50 years, physiologists tried different ways to solve this task. Psychologists used tests to solve this task in the 20s and 30s, and as such tests, in many cases, workers were given tasks closer to their activities. The use of this method filled with modern statistical processing continues even now abroad. The results of orientation to labor activities carried out with the help of tests do not sufficiently satisfy both researchers and production, the main reason why testology has not justified itself sufficiently is that with the help of tests, the level of preparation of the examined person for these labor operations is determined, in fact, the fitness for labor activity from the midiergonomic point of view is determined. for the purpose of evaluation, it is required to determine abilities and psychophysiological processes. That's why scientists began to study the main features of the nervous system, they believed that testing the psychophysiological qualities of individuals can have a very real prognostic value.

Of course, it is impossible to describe the whole complex of activities of subjects of the pedagogical process using only the midiergonomic approach. However, we have uncovered components of interest from a midiergonomic point of view.

Therefore, the tasks of the midiergonomic approach to the organization of educational activities, determining the advanced forms of its implementation, are primarily related to the search for an effective combination of incentives and conditions for this work. The results of work, well-being, and a person's attitude to certain tasks are expressed by the way a person's activity continues, to what extent it is related to his personal and professional interests and functional capabilities.

Maintaining people's health in any conditions, increasing the effectiveness of training, the existence of conditions for the comprehensive development of a person, in essence, are the main results of educational activities that can serve as criteria for evaluating its optimal organization.

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