

MEASURES TO MAINTAIN WORKABILITY AND PREVENT FATIGUE

Bakhrudinov Nuriddin Sadriddinovich

Dotsent of Namangan State Technical University,

Republic of Uzbekistan, Namangan

Mamadaliyev Adkhamjon Tukhtamirzaevich

Dotsent of Namangan State Technical University,

Republic of Uzbekistan, Namangan

Annotation: This article provides information on maintenance of work capacity of working employees and measures to prevent burnout during work, periods of change in work capacity and burnout during the work shift.

Key words: Organism, fatigue symptoms, parabiosis, work ability, end of shift, tired person, cerebral hemisphere, attention, hard work, central nervous system, braking process, , disease, productivity, rest, working day

Labor is purposeful activity of people aimed at creating material and spiritual wealth. When a person influences the environment, changes it and adapts it to his needs, he creates conditions not only for his own living, but also for the development and progress of society[1,2,3,4].

The labor process is a complex and multifaceted phenomenon. Its main form is the use of human power, the relationship of workers with the means of mutual production (labor tools and materials) and the mutual relations of workers in production on the horizontal (relationship of participation in the general labor process), as well as on the vertical (relationship between the leader and the employee). The role of work in the development of man and society is manifested not only in the creation of material and spiritual wealth in the process of work designed to satisfy people's needs, but also the workers themselves improve their skills, reveal their abilities, enrich their knowledge[5,6,7,8,9].

In the course of work, a decrease in the body's ability to work can be observed, if it is objectively assessed as fatigue, and subjectively, a feeling of fatigue occurs.

Convenient work for people who are engaged in any kind of work labor protection is seriously engaged in creating conditions. Comfortable working conditions are defined as the creation of technological processes that are less stressful and consume less energy as a result of work, and use them in production, as well as organizing rest at the right time. In this it is important to use modern tools and equipment for production.

A person's work capacity, or the ability to maintain the required level of work capacity as long as possible without changing the quality of work, depends on several factors. The most important of these are training and exercise, emotional state, fatigue and environmental conditions[10,11,12,13,14].

Training refers to general changes that occur in the body as a result of repeated work and help to increase work ability.

Exercise refers to the processes expressed by the increase of work capacity in relation to a certain activity in the body.

The state of fatigue usually occurs with a specific sensation defined by the term "fatigue". Emotional state can have a significant effect on performance: a good emotional state leads to an increase in performance, and a negative emotional state leads to a decrease in performance.

Fatigue is defined as a decrease in work ability that occurs as a result of performing heavy, demanding or continuous work and is expressed by the deterioration of work results in terms of quantity and quality.

Fatigue is a reversible physiological state. However, if the work capacity is not restored before the start of the next work period, the fatigue becomes more and more intense and passes into the stage of extreme fatigue. causes the development of pathology. This, in turn, causes an increase in the number of injuries[15,16,17].

At the same time, after the cessation of work, the symptoms of exhaustion are eliminated, and some favorable processes are observed in the body, muscles, and the activity of the regulatory systems, which are considered in the training of athletes. However, fatigue that occurs in production is an unpleasant phenomenon, because it causes a decrease in labor productivity and an increase in general and occupational diseases.

Among the numerous hypotheses that explain the nature of fatigue, the theory of the central nervous system is the most well-founded and accepted by occupational physiologists[18,19,20].

Changes in the central nervous system in the process of work occur in three phases:

1. Inertia braking. This situation is observed at the beginning of the work. Its duration depends on the qualification of the employee.
2. Performance arousal.
3. Protective braking is a sign of exhaustion.

Changes that occur in the central nervous system after work:

1. Excitement after work.
2. Continued braking.
3. Recovery of excitement.

Excited states are called parabiosis after a series of stages, passing to inhibition. In this case, the process loses its oscillating wave character and becomes permanent. The tension develops as a result of frequent continuous impulses from the working muscles and internal organs to the nerve centers. In this case, the center of inhibition appears in the afferent centers of the cortex of the cerebral hemispheres, while other zones are functionally affected by the center of inhibition. closeness or distance and the series can be in the state of excitation and inhibition due to other reasons. Regardless of this, the slowness of the braking process is noted in them, one of the permanent and characteristic signs of fatigue is a violation of movement coordination. This can sometimes be seen with the eyes,

for example, when a person's body sways after hard work, and a tired person staggers a little.

Legal changes in labor capacity at work are observed in a certain phase. First, there is an induction phase, during which the working capacity gradually increases and reaches its maximum level during the first 30 minutes to 1 1/2 hours. After that, a stable high stage of work capacity begins, lasting 1 1/2 -3 hours. And finally, signs of fatigue appear for the first half of the working day after the lunch break, and for the second half before the end of the shift, i.e., the phase of decrease in working ability is noted .

In fatigue, the quality indicators of labor deteriorate, during the work process, errors occur due to the invalid output of the product, slightly lower product development, and decreased attention.

Fatigue can be determined by a number of physiological indicators. Tiredness during work, i.e. lack of interest in work, deterioration of the attention function, decrease in muscle endurance, and sometimes strength, indicate the occurrence of fatigue.

The importance of proper organization of work and rest in the prevention of fatigue and its prevention.

Fatigue in long-term work is vital, it is necessary to fight against it, and it is important to be able to prevent the development of fatigue. Ways to prevent fatigue can be divided into several groups. General technical, hygienic and physiological.

1. General technical measures
2. Improvement of sanitary and hygienic conditions of work.

Physiological measures include the following.

- a) Rational organization of work process
- b) Doing exercises
- c) Creating a rational order of rest and work.

Movements should correspond to the physiological and anatomic characteristics of the body. Exercise also plays a big role in preventing fatigue.

It should also be noted that the length of the working day, i.e. shortening the working day, is important in preventing burnout.

The organization of rest in the work process is important in preventing burnout. This thing is organized in South Korea. During the lunch period from 12⁰⁰ to 13⁰⁰ hours, the working workers sleep and rest. This, in turn, preserves the health of workers, and does not cause fatigue. Productivity increases and quality products are developed

Literature:

1. Г.Т. Искандарова ва бошқ. Меҳнат гигиенаси бўйича ўқув услубий мажмуа. Тошкент. 2017й
2. Мамадалиев, А. Т. (2024). МЕҲНАТНИ БАЖАРИШ ЖАРАЁНИДА ЮЗАГА КЕЛАДИГАН ТОЛИҚИШ ВА УНИНГ ОЛДИНИ ОЛИШ ЧОРА ТАДБИРЛАРИ. *Экономика и социум*, (3-2 (118)), 680-683.
3. Бахриддинов, Н. С., & Мамадалиев, А. Т. (2023). Компьютер хоналари учун ёритиш ва шамоллатишни ҳисоблаш. *Scientific Impulse*, 1(8), 995-1003.
4. Бахриддинов, Н. С., & Мамадалиев, А. Т. (2024). МЕҲНАТ ХАВФСИЗЛИГИНИ ТАЪМИНЛОВЧИ ПСИХОЛОГИК ОМИЛЛАРНИНГ ИШ КУНЛАРИГА БОҒЛИҚЛИГИ. *Экономика и социум*, (6-1 (121)), 969-973.
5. Мамадалиев, А. Т. (2023). МИНЕРАЛЛАРНИНГ ФИЗИК КИМЁВИЙ ХУСУСИЯТЛАРИ МАВЗУСИНИ ИНТЕРФАОЛ ТАЪЛИМ МЕТОДЛАРИ АСОСИДА УЎҚИТИШ. *STUDIES IN ECONOMICS AND EDUCATION IN THE MODERN WORLD*, 2(4).
6. Вафакулов, В. Б., & Мамадалиев, А. Т. (2023). ТРЕБОВАНИЯ К СНЕГОЗАЩИТНЫМ БАРЬЕРАМ НА ГОРНЫХ ДОРОГАХ. *Universum: технические науки*, (2-1 (107)), 25-28.
7. Бахриддинов, Н. С., & Мамадалиев, А. Т. (2024). МЕҲНАТ ХАВФСИЗЛИГИНИ ТАЪМИНЛОВЧИ ПСИХОЛОГИК ОМИЛЛАРНИНГ ИШ КУНЛАРИГА БОҒЛИҚЛИГИ. *Экономика и социум*, (6-1 (121)), 969-973.
8. Мамадалиев, А. Т. (2024). ШОВҚИН ВА ТЕБРАНИШЛАР МАВЗУСИНИ РИВОЖЛАНТИРУВЧИ ТАЪЛИМ ТЕХНОЛОГИЯЛАРИ ВА УСУЛЛАРИ ЁРДАМИДА ЎҚИТИШ. *Экономика и социум*, (5-2 (120)), 1117-1120.
9. Гафуров, К., Росабоев, А., & Мамадалиев, А. (2007). Дрожирование опущенных семян хлопчатника с минеральным удобрением. *ФарПИ илмий-техник журнали. – Фарғона*, 3, 55-59.

10. Мамадалиев, А. Т., & Мамаджанов, З. Н. (2022). Минерал ўғитлар ва микроэлементли композицияларни сувдаги эритмаси билан қобиқланган тукли чигитларни лаборатория-дала шароитида синаш натижалари. *Экономика и социум*, (2-1 (93)), 382-387.
11. Rosaboev, A., & Mamadaliyev, A. (2019). Theoretical substantiation of parameters of the cup-shaped coating drums. *International Journal of Advanced Research in Science, Engineering and Technology*, 6(11), 11779-11783.
12. Бахриддинов, Н. С., & Мамадалиев, А. Т. (2024). МЕҲНАТ ХАВФСИЗЛИГИНИ ТАЪМИНЛОВЧИ ПСИХОЛОГИК ОМИЛЛАРНИНГ ИШ КУНЛАРИГА БОҒЛИҚЛИГИ. *Экономика и социум*, (6-1 (121)), 969-973.
13. Baxriddinov, N. S., Mamadaliev, A. T., & Mamadjanov, Z. N. (2025). QISHLOQ XO 'JALIGIDA MEHNAT GIGIYENASI. *Экономика и социум*, (4-1 (131)), 125-131.
14. Бахриддинов, Н. С., Мамадалиев, А. Т., & Рахимов, Ж. (2024). КОРХОНА ВА ТАШКИЛОТЛАРДА ЁНҒИН ХАВФСИЗЛИГИНИ ТАЪМИНЛАШНИНГ ТИЗИМЛИ УСУЛИНИ ИШЛАБ ЧИҚИШ. *Экономика и социум*, (5-2 (120)), 907-910.
15. Мамадалиев, А. Т. (2022). Уруғлик чигитларни макро ва микроўғитлар билан қобиқловчи қурилманинг ўлчамлари ва иш режимларини асослаш. In *МИРОВАЯ НАУКА 2022. ПРОБЛЕМЫ И ПЕРСПЕКТИВЫ РАЗВИТИЯ. МЕЖДУНАРОДНЫЕ КОММУНИКАЦИИ* (pp. 54-57).
16. Mamadaliyev, A. T., & Bakhriddinov, N. S. (2022). Teaching the subject of engineering geology on the basis of new pedagogical technology. *Scientific Impulse*, 1(5).
17. Mamadaliyev, A. T. (2022). The movement of the population when a flood happens. *Scientific Impulse*, 1(5).
18. Mamadaliyev, A. T. (2022). Naturally occurring carbonate minerals and their uses. *Scientific Impulse*, 1(5).
19. Mamadaliyev, A. T. (2022). The movement of the population when a flood happens. *Scientific Impulse*, 1(5).
20. Mamadaliev, A. (2021). Theoretical study of the movement of macro and micro fertilizers in aqueous solution after the seed falls from the spreader. *Scienceweb academic papers collection.-2021*.