

DECREASE IN COGNITIVE FUNCTIONS IN ELDERLY PEOPLE

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Abstract: The modern demographic situation is characterized by an increase in the number of elderly people, which poses many problems for society and science related to the psychological characteristics of people at a later stage of life. Within the framework of these trends, interest in the problems of changes in mental activity during normal (physiological) and pathological aging has recently increased. This article explains the causes of physiological aging of the brain. Various factors leading to a decrease in cognitive function in elderly people are given.

Keyword: memory loss, neuronal plasticity, cognitive disorders, dementia.

Relevance. There are currently about 400,000 people over 65 years old in the world, and their number is expected to increase in the near future [1]. One of the most common neurological symptoms in old age is memory loss. 80% of people over 60 years old who have consulted neurologists for various reasons complain of memory loss. Memory loss is a nonspecific symptom that is observed in many brain diseases. During physiological aging, the brain undergoes a number of structural, neurophysiological and neurochemical changes, which in themselves can cause weakening of memory, attention and other cognitive functions. With age, neuronal plasticity decreases - the ability of brain neurons to change their functional properties depending on changing environmental conditions. This leads to a decrease in the compensatory capabilities of the brain in various pathological conditions. Finally, old age is a strong and independent risk factor for the development of various vascular and degenerative diseases that are accompanied by memory impairment [2, 3].

The performance of neuropsychological tests gradually decreases with age, including in individuals without clinically obvious cerebral pathology. This decrease begins quite early - at 30-40 years. To the greatest extent, this concerns the speed of reaction to external stimuli and the ability to concentrate for a long time. Therefore, thinking in elderly people becomes slower compared to healthy young and middle-aged people. Elderly people, as a rule, need more time to perform various cognitive tasks, they get tired faster. With age, the volume of working memory also decreases, which affects the ability to learn and assimilate new knowledge and skills. And another cognitive symptom typical for the elderly is the difficulty of transition from the previous stage of cognitive activity to the next. Therefore, elderly people are less inclined to change their behavior strategy and, accordingly, they become more conservative [3,4,5].

The severity of age-related physiological deterioration of cognitive functions is individual. With the so-called "successful aging", a person completely or almost completely retains the memory and intellectual potential and even at the most advanced age is not inferior to young people in memory and other cognitive abilities. It is assumed that "successful aging" is predisposed by the constitutional features of the individual, a healthy lifestyle, intensive intellectual activity in the young and middle years of life.

Risk factors:

1. Demographic risk factors. Increasing age is not only the strongest risk factor, but also the only risk factor that is determined after 80 years of life. Cognitive disorders are much more common in women. They are also widespread among people with a low level of education.
2. Genetic risk factors. Caused by genes. Some genes are recognized as increasing susceptibility to Alzheimer's disease [6]
3. Medical risk factors. Cardiovascular diseases can cause or worsen the nutrition of the brain, creating a cellular energy crisis [7].
4. Head injury. Head trauma is associated with an increased risk of developing Alzheimer's disease, and the severity of the injury increases the risk [8, 9].
5. Lifestyle and environmental risk factors. Many environmental and occupational hazards, such as smoking, are also associated with an increased risk of developing cognitive disorders, as is excessive alcohol consumption [10, 11]

One of the main problems is that at present, our health offices in polyclinics do not carry out early detection of cognitive disorders in elderly patients and have not yet become widespread enough in the comprehensive assessment of the health of an elderly patient. Therefore, addressing issues related to the aging of the population requires a comprehensive approach and occupies a worthy place among the directions of state policy.

Dementia is a progressive neurodegenerative disease that negatively affects memory, other cognitive functions and behavior, inevitably reducing the autonomy and independence of an elderly person in everyday life. Old age is one of the key factors in the occurrence and progression of dementia symptoms. Disability, dependence on other people and a serious financial burden for the family and the state are only part of the global situation, which, along with the aging of the population, places great responsibility on public health. The World Health Organization (WHO) in the “Draft global action plan for the public health response to dementia” notes that dementia “is not an inevitable consequence of ageing,” and the provision of preventive measures can reduce the risk of its development [12].

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