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GROWTH INDICATORS OF TEENAGERS IN VARIOUS REGIONS OF THE REPUBLIC OF KARAKALPAKSTAN

**Rzaev Rakhat Muratbayevich¹, Zhangabaeva Ramash Kaiyrbergenovna²,
Elubaeva Gulnaz Mazhitovna³**

¹Doctor of Philosophy in Biological Sciences (PhD)

Head of the Department "Anatomy, Physiology and Biotechnology of Animals"

Nukus branch of Samarkand State University of Veterinary Medicine, Animal Husbandry and Biotechnology

²Assistant, Department of Anatomy, Physiology and Biotechnology of Animals

Nukus branch of Samarkand State University of Veterinary Medicine, Animal Husbandry and Biotechnology

³2nd year Master's student in Biology, Karakalpak State University named after Berdakh

ANNOTATION

The article discusses the main growth indicators of adolescents in various regions of the Republic of Karakalpakstan. The results of the study show that the growth rates of adolescents in the northern and central regions are higher than in adolescent boys in the southern regions.

KEY WORDS: *protection, health, physical development, development, weight, height, index.*

Today, the strengthening and protection of human health on a global scale, the study of their theoretical foundations is one of the urgent problems in the field of physiological, medical and environmental sciences. Especially in different regions, this leads to a deterioration in the indicators of physical development and health of the young population. In this regard, it seems relevant to develop measures to study the characteristics of the morphological and functional indicators of the physical development of adolescence.

In recent years, extensive scientific research has been carried out in the world to study the state of physical development of the younger generation and evaluate morphofunctional indicators that determine the adaptive capabilities of the development of the human body and its relationship with the environment.

In this regard, among other things, to determine the age dynamics of anthropometric and functional indicators of adolescents depending on the environmental conditions of the region, to substantiate the negative impact of environmental factors on the human body, to analyze somatotypological indicators in adolescents based on proportional levels of character variability, and adverse environmental factors the external environment on the body of adolescents of the Republic of Karakalpak region much attention is paid to the development of measures to adapt to the impact and improve physical development indicators.

In this regard, in the Republic of Karakalpakstan, much attention is paid to the development of measures to determine the age dynamics of anthropometric and functional indicators of adolescents, depending on the environmental conditions of the region, to improve the indicators of physical development and adaptation of the body of adolescents to adverse environmental factors in the region.

In the republic, much attention is paid to carrying out complex measures to study physical development, the morphofunctional state of the human body and the mechanisms of its adaptation to harmful environmental factors. In

this regard, among other things, measures were developed to improve the level of public health, to determine the mechanisms of adaptation of the body to external environmental factors during the period of individual development.

Currently, health problems are one of the priority tasks of the social and social development of any country, which determines the relevance and necessity of conducting relevant scientific research and developing certain methodological and organizational approaches to health care, its formation and development.

In the course of the work, a set of methodological techniques was used, which allows for a comprehensive individual assessment of the functional state and physical development of each adolescent.

The study of the functional features of the subjects was carried out using a complex of traditional methods. The somatometric method of calculation was carried out by determining the indicators of the general dimensions of the body - height - weight, chest circumference.

Height was measured in a standing position using a medical stadiometer with an accuracy of 0.5 cm. In this case, the observer stands on the stadiometer bar from behind, touching the lower leg, groin, shoulder blade and elbow, and the stadiometer shoulder touches the top of the skull.

The analysis showed that the growth rates of adolescents in the northern and central regions of the age dynamics of body growth indicators were higher than in adolescent boys in the southern regions.

The average annual growth of adolescents in height was 2.04 cm in the northern regions, and 1.12 cm in the southern regions. From the data obtained on the state and dynamics of growth, we can conclude that there is a general decrease in body height in adolescents in all age groups of the southern regions (the percentage deviation was 0.6%, $p < 0.05$). We then carried out anthropometric measurements of adolescents in a sitting position (Fig. 1).

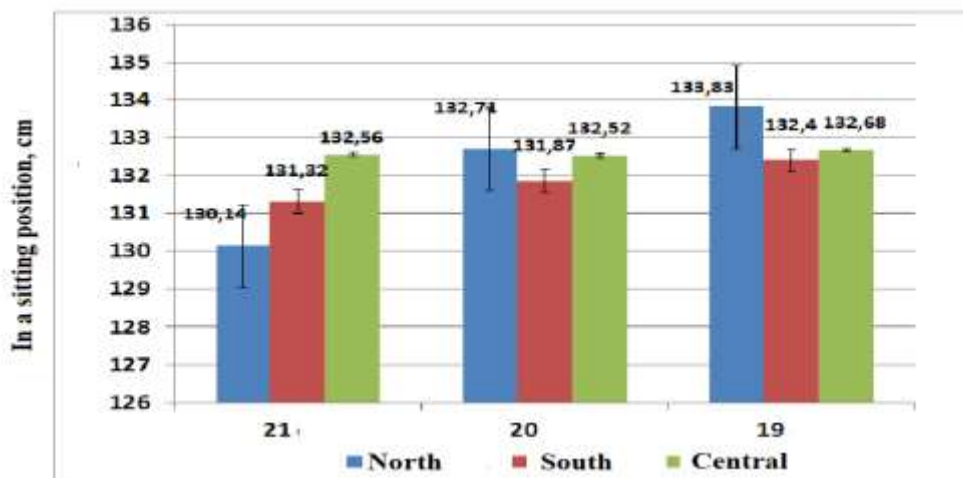


Figure 1. Dynamics of indicators of age-related body growth (in a sitting position) of young men of military age living in Karakalpakstan

As can be seen from the diagram, the highest indicators were found in 19- and 20-year-old adolescents from the northern regions (133.83 ± 1.9 cm and 132.71 ± 3.2 cm, respectively). The highest growth rate of posture in a sitting position in adolescents aged 21 was observed in adolescents from the central regions of Karakalpakstan (132.56 ± 3.1 cm).

LITERATURE

1. *Age physiology. L.: Medicine, 1975. - 220 p.*
2. *Egorova E.E., Gurieva A.B. Morphofunctional characteristics of students of the republican choreographic school Sakha (Yakutia) // Sib. honey. Review, 2006. - No. 3, - S. 94-96.*
3. *Yeschanov T.B. Medical and ecological zoning of the Republic of Karakalpakstan in the light of the state of health of mother and child // Ecological factors and health of mother and child in the Aral crisis region: Proceedings of the international. seminar. - Tashkent: FAN, 2001. - S. 11-14.*