



UDC 612

## 7-10 YEARS OLD IN THE CONDITIONS OF THE REPUBLIC OF KARAKALPAKSTAN DYNAMICS OF DEVELOPMENT OF CHILDREN'S ANTHROPOMETRIC INDICATORS

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### ANNOTATION

*The article presents the dynamics of development of anthropometric indicators of children aged 7-10 in the Republic of Karakalpakstan. Today, the assessment of age, gender-specific characteristics and physiological changes in the level of physical development of 7-10-year-old school students on the basis of morphofunctional system indicators is one of the most pressing issues today.*

**KEYWORDS:** *degree, monitoring, hypokinesia, morphofunctional, physiological feature.*

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### INTRODUCTION

In today's world, great attention is paid to the creation of conditions for the healthy physical, mental and emotional development of children, which is a priority for the future of any society.

Therefore, in order to constantly monitor the level of physical development and health of school-age children during education, to conduct physiometric / anthropometric research, to develop and implement a set of measures to improve their health, which in turn will prevent various diseases. scientific and practical significance in terms of [1,3,4].

In research conducted in many countries around the world, the organization of physical education classes in the optimal development of the level of physical activity of students requires taking into account the individual characteristics of school-age physiological age of students. Studies have shown that under the influence of hypokinesia in children and adolescents, there is a decrease in the activity of the musculoskeletal system, the main functional systems of

the body and, in turn, an increase in the susceptibility to various diseases [1,3].

Based on the above data, the identification of age-related, gender-specific characteristics of school-age students at the level of physical development, assessment of physiological changes in them on the basis of morphofunctional system is one of the most pressing issues today [4,5].

### MATERIALS AND METHODS

Research work in secondary schools of Nukus, Muynak and Elikqala districts of the Republic of Karakalpakstan in 2019-2021. was carried out in the range of anthropometric indicators of school students VV. This was done using the method recommended by Bunak (1931). Anthropometric markers were also determined using the Pine (Pignet I) (IP) index.

The study involved 609 school-age students aged 7–10 years, of whom 316 were boys (51.8%) and 293 (48.2%) were girls. During the study, the developmental dynamics of height (cm), weight (kg) and chest (cm) size of children in the control group



were studied. Analysis of the obtained results. During the study, the dynamics of height (cm), weight (kg) and chest (cm), volume of children in the control group of 7-10 years were studied (Table 1).

**Table 1**  
Dynamics of development of height, weight and chest volume of 7-10-year-old schoolchildren in Muynak district in the Republic of Karakalpakstan

Age	Boys			Girls		
	Height (sm)	Weight (kg)	Rib cage (sm)	Height (sm)	Weight (kg)	Rib cage (sm)
7	124,5±0,81	24,46±0,52	59,4±0,40	122,4±0,95	24±0,81	57,1±0,67
8	128,23±0,80	28,1±0,73	61,20±0,63	127,7±0,67	27,1±0,63	60,8±0,60
9	136,7±0,79	30,3±1,01	63,8±0,91	135,6±1,39	30,5±1,36	62,6±1,30
10	139,91±1,10	31,8±1,04	65,83±0,79	141,7±1,25	33,07±1,28	64,51±1,11

**Table 2**  
Dynamics of development of height, weight and chest volume of 7-10-year-old schoolchildren in Nukus in the Republic of Karakalpakstan

Age	Boys			Girls		
	Height (sm)	Weight (kg)	Rib cage (sm)	Height (sm)	Weight (kg)	Rib cage (sm)
7	125±0,86	25,3±0,65	60,3±0,56	123,9±0,78	25,3±0,70	58,8±0,75
8	129,6±1,07	28,7±1,02	62,6±0,98	128,7±0,79	28,2±1,02	61,6±0,86
9	137,27±0,99	31,16±0,90	64,51±0,82	137,2±1,09	31,2±1,46	63,5±1,34
10	140,1±1,01	33,9±1,16	66,8±1,04	143,7±1,17	34,2±0,96	65,1±0,94

**Table 3**  
Dynamics of development of height, weight and chest volume of 7-10-year-old schoolchildren in Ellikkala district in the Republic of Karakalpakstan

Age	Boys			Girls		
	Height (sm)	Weight (kg)	Rib cage (sm)	Height (sm)	Weight (kg)	Rib cage (sm)
7	126,4±1,04	25,98±1,03	61,85±1,05	124,2±1,21	26,1±0,65	59,2±0,68
8	130,7±1,31	29,2±0,91	63±0,83	129,1±0,95	28,7±0,74	62,06±0,79
9	138,70±1,12	32,9±0,70	65,5±0,71	138,8±1,11	32±0,84	64,3±0,88
10	141,4±1,06	34,3±0,95	67,2±0,85	144,4±1,48	35,8±1,67	65,9±1,95

The results show that boys and girls aged 7-10 studying in secondary schools of Muynak and Elikqala districts, as well as Nukus, differ in height (cm), weight (kg) and chest size (cm). (Tables 1,2,3).

## CONCLUSION

Based on the findings, it was found that the anthropometric indicators of 7-10-year-old boys and girls living in the southern district were relatively high compared to the anthropometric indicators of boys and girls living in the northern district. It was found that this difference depends on the climatic factors of the regions, as well as the lifestyle of the population.

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