UDK: 616-053.5:616-071-072.7

CORRELATION BETWEEN ANTHROPOMETRIC INDICATORS IN BOYS OF SAMARKAND CITY IN THE SECOND PERIOD OF CHILDHOOD (8-12 YEARS OLD)


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САМАРҚАНД ШАҲРИ ЁШЛИКНИНГ ИККИНЧИ ДАВРИДАГИ (8-12 ЁШ) ЎҒИЛ БОЛАЛАРДА АНТРОПОМЕТРИК КЎРСАТКИЧЛАРНИНГ ЎЗАРО БОҒЛИҚЛИГИ

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ВЗАИМОСВЯЗЬ МЕЖДУ АНТРОПОМЕТРИЧЕСКИМИ ПОКАЗАТЕЛЯМИ У МАЛЬЧИКОВ Г. САМАРКАНДА ВО ВТОРОМ ПЕРИОДЕ ДЕТСТВА (8-12 ЛЕТ)

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Резюме. *Ушбу мақолада Самарқанд шаҳрида яшовчи 8- 12 ёшдаги ўғил болаларда болаликнинг иккинчи давридаги жисмоний ривожланиши ва антропометрик кўрсаткичлар орасидаги ўзаро корреляцион боғликликни ўрганилди.*

Калит сўзлар*: Болалар, жисмоний ривожланиши, антропометрия, корреляцион боғликлик.*

Abstract. *In this article, the correlation between physical development and anthropometric indicators in the second period of childhood in boys aged 8-12 living in the city of Samarkand was studied.*

Keywords: *Children, physical development, anthropometry, correlation gardening.*

Introduction: Anthropometric correlates in children are studied to assess their physical development and health. Anthropometry involves measuring and analysing parameters such as height, weight, body circumference, skinfold thickness and other anthropometric parameters.The study of correlations in anthropometry allows us to assess the relationship between different parameters and identify possible patterns. For example, it is possible to study the relationship between height and weight in children of a certain age and sex, as well as the relationship between anthropometric indices and the level of physical activity, nutrition, health and other factors.[3]These studies are important for assessing children's physical development, identifying possible problems or diseases, developing programmes to improve health and fitness, and monitoring the developmental dynamics of children at the population level.The study of anthropometric correlation indices in children is carried out using standardised methods of measurement and data analysis, which allows us to obtain objective and reliable results. The data obtained can be used in various fields, from medicine and physiology to sports and education.[2]

Materials and methods: For the article, the relevant literature and works of other authors were analysed and studied and anthropometric indicators of children of Samarkand city aged 8 to 12 years were measured.

Results: When studying the correlation between weight and height in 8-12 years old boys, it was found that the correlation coefficient at 8 years of age is 0.5096, at 9 years of age this indicators equal to 0.7707, in 10 years of age the correlation coefficient is equal to 0.5213, in 11 years of age it is equal to 0.5111, in 12 years of age it is equal to 0.7827.The correlation coefficient between chest circumference and height at the age of 8 years is 0.3539, at the age of 9 years this indicator is 0.547, at the age of 10 years 0.3687, at the age of 11 years 0.3849 and at the age of 12 years 0.6581 respectively The correlation between the length of the upper limb and height at the age of 8 years was 0. 6941, at 9 years of age 0.6220, at 10 years of age 0.6120, at 11 years of age 0.6854 and at 12 years of age 0.8764 The correlation coeffi-

cient of lower limb length from height in boys of 8 years of age is 0.7104, at 9 years of age 0.8422, at 10 years of age 0.5633, at 11 years of age 0.7129 and at 12 years of age 0.9043.The results of the study showed that the correlation between weight and height in boys of the second period of childhood in 8, 10 and 11 years of age is medium, in 9 and 12 years of age is strong. Correlation dependence of chest circumference on height at the age of 8-12 years is medium Correlation dependence of upper limb length on height is as follows: at 8,9,10 and 11 years of age is medium, at 12 years of age is strong.The correlation between lower limb length and height is strong at 8,9,11,12 years of age, and medium at 10 years of age.Thus, we found that correlation between body weight and height in 9 and 12 years of age is strong Correlation between chest circumference and height in all ages (8-12).

Conclusions: Correlation between upper limb length and height is strong in 12 years of age, between lower limb length and height is strong in 8,9,11 and 12 years of age.The correlation between many indices was found to be strong at 9 and 12 years of age. During the second period of childhood (8-12 years), boys exhibit a number of important anthropometric indicators that may be related to each other. Some of these include:. Height and Weight: At this age, boys begin to actively grow and gain weight. Their height and weight often correlate with each other as height influences weight and vice versa. Body Mass Index (BMI): BMI is a measure that reflects the relationship between a child's weight and height. At this age, BMI can be related to a boy's level of physical activity and general health. waist and hip circumference: These measures can indicate a boy's body fat distribution and are associated with the risk of obesity and metabolic diseases. chest volume: Reflects the development of a boy's lungs and respiratory system, which is important for physical activity and general health. Head circumference: May be related to a boy's brain and bone development.The relationship between these anthropometric measures can be studied using statistical methods and research to identify patterns of development and health in boys at this age period.

Literature:

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ВЗАИМОСВЯЗЬ МЕЖДУ АНТРОПОМЕТРИЧЕСКИМИ ПОКАЗАТЕЛЯМИ У МАЛЬЧИКОВ Г. САМАРКАНДА ВО ВТОРОМ ПЕРИОДЕ ДЕТСТВА (8-12 ЛЕТ)

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Резюме. *В данной статье изучена взаимосвязь между физическим развитием и антропометрическими показателями во втором периоде детства у мальчиков 8-12 лет, проживающих в городе Самарканд.*

Ключевые слова: *Дети, физическое развитие, антропометрия, корреляционные связи.*