

Attitude of teachers to the application of fitness gadgets in physical education lessons

UDC 796.01/.09



PhD, Associate Professor **S.A. Davydova**¹

PhD, Associate Professor **A.R. Galeev**¹

Dr. Hab., Professor **N.I. Sinyavsky**²

Postgraduate student **T.A. Eliseeva**²

¹Nizhnevartovsk State University, Nizhnevartovsk

²Surgut State Pedagogical University, Surgut

Corresponding author: ffkis@nvsu.ru

Received by the editorial office on 05.22.2023

Abstract

Objective of the study was to identify the possibilities of using fitness gadgets in physical education classes in the general education system.

Methods and structure of the study. With the help of the Google Forms resource platform, a survey was conducted of 338 physical education teachers representing general educational institutions in the city of Surgut, the results of which with a sufficient degree of reliability allow us to judge the state of the use of fitness gadgets in physical education lessons in the general education system of KHAMAO-YUGRA.

Results and conclusions. As a result of the survey, a low percentage of readiness of physical education teachers to introduce and use fitness gadgets in the process of teaching the subject "Physical Education" was revealed. Many teachers note the lack of knowledge in the field of information technology and experience in working with them, and also point to the poor development of diagnostic tools for assessing the use of fitness gadgets in educational activities.

Keywords: *physical education teacher, questioning, survey, fitness gadget, physical education lesson.*

Introduction. The problem of using fitness gadgets in physical education lessons is currently becoming particularly relevant. Modern fitness gadgets provide a wide range of opportunities that allow you to assess the physical activity, the functional state of the body, draw up a training plan, and monitor the vital signs of students [3]. The functionality of these electronic devices makes it possible to simplify and improve the efficiency of students' self-control, to make the process of performing exercises and their results interesting and, most importantly, visual [4].

Objective of the study was to identify the possibilities of using fitness gadgets in physical education classes in the general education system.

Methods and structure of the study. To study the problem of using information technologies in the process of physical education of schoolchildren, a survey was conducted using the Google Forms resource of 338 physical education teachers repre-

senting general educational institutions in the city of Surgut, of which 52.1% were male and 47.9% were female.

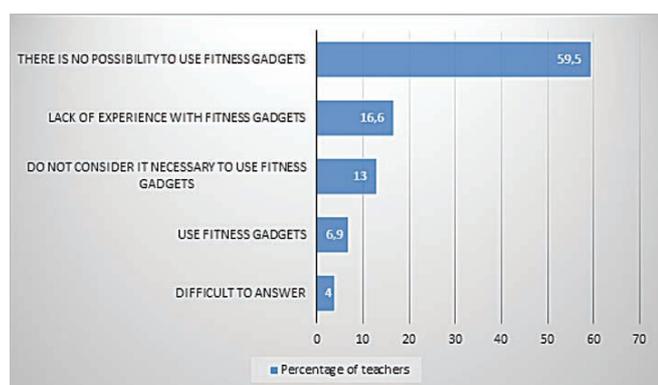
Age gradation was up to 25 years old - 5.1%, from 25-30 years old - 12.4%, from 30 to 40 years old - 31.7%, from 40-50 years old - 24.9%, from 50 - 60 years - 21.0%, over 60 years - 4.9%. 94.1% have higher education, 5% have secondary specialized education, 0.6% have not completed higher education. Pedagogical work experience up to 2 years - 7.1%, from 2 to 5 years - 7.4%, from 5 to 10 years - 16%, from 10 to 15 years - 13.9%, from 15 to 20 years - 15.4%, over 20 years - 40.2%.

Results of the study and their discussion. Judging by the results of a sociological survey, the majority (68.6%) of physical education teachers were trained in advanced training courses that were associated with the use of information technology in teaching and teaching the subject "physical culture" and only (31.4%) teachers were not trained.



When asked what information technologies are used in the physical education of schoolchildren in teaching the subject "Physical Education", the following narrowings were received: 64.5% of teachers answered that they did not use anything, 26.8% indicated that they used visual material in the lessons from the Russian Electronic schools" and 8.7% of teachers found it difficult to answer.

Also, during the survey, it was found that 13.0% of teachers do not consider it necessary to use fitness gadgets in physical education classes, 59.5% of teachers believe that they do not have the opportunity to use them, and 16.6% of teachers answered that they do not have sufficient experience in their application. I would like to note that 6.9% indicated that they use fitness gadgets in physical education classes, and only 4% of respondents found it difficult to answer (see figure).



The results of the survey on the need to use fitness gadgets in physical education classes

The use of fitness gadgets in physical education classes allows a physical education teacher to form an initial idea of the scientific basis of physical exercises. With the help of fitness gadgets in physical education lessons, schoolchildren can observe a close relationship between motor load and changes in heart rhythms, heart rate, respiratory rate and other parameters.

To the question "Do you consider it appropriate to use fitness gadgets in physical education lessons?" Respondents had to answer up to three options of the most important answer to the corresponding question.

Below are the responses ranked by the frequency of mentions: individual approach to each student during classes - 49.7%; a student can independently study his physical abilities and track the dynam-

ics of his development - 44.4%; increases students' interest in their health - 44.4%; the ability to choose the type of load that will be most effective for the child - 41.1%; students develop self-control skills in the process of physical exercises - 37.6%; student and teacher work together to achieve planned results - 30.8%; allows to individualize the educational process - 21.6%; contributes to improving the quality of physical education of schoolchildren - 21.0%.

According to the results of the study, where respondents had to indicate when working with children what age it is necessary to use fitness gadgets in physical education lessons, it was found that 46.7% chose the answer in all age groups of students, 21.9% believe that in high school age, 15.7% indicated middle school age, 5.3% answered at primary school age, 10.4% of respondents found it difficult to answer.

The results of the survey indicate the feasibility of using fitness bracelets that monitor the functional state of the body (heart rate, pressure, body temperature) and physical activity (number of steps taken, distance) in the physical education of schoolchildren, which is considered a matter of the distant future by 30.8% of respondents, some believe (25.7%) that nothing will change, since there is no possibility for their application, the quality of teaching will change, 38.8% of respondents noted, and 4.7% found it difficult to answer. The use of fitness gadgets in physical education lessons is an addition to the existing arsenal of training and education tools, but their effectiveness has not yet been evaluated. Therefore, it is necessary that this effectiveness is determined by the methodological and theoretical readiness of the teacher to use fitness gadgets in physical education lessons.

To the question: "Do you have the opportunity to purchase (at the request of the school administration) the fitness gadgets you need for the educational process?" the following judgments were received: 35.8% believe that there is no possibility, 50.9% indicated that they do not know, and only 13.3% noted that yes, there is such a possibility.

Conclusions. As a result of the study, a low percentage of readiness of physical education teachers to introduce and use fitness gadgets in the process of teaching the subject "Physical Education" was revealed. Many teachers note the lack of knowledge in the field of information technology and experience in working with them, and also point to the poor de-



velopment of diagnostic tools for assessing the use of fitness gadgets in educational activities.

References

1. Baluev S.A. Informatsionno-kommunikatsionnyye tekhnologii v rabote uchitelya fizicheskoy kultury [Information and communication technologies in the work of a teacher of physical culture]. Vestnik sportivnoy nauki. 2019. No. 3. pp. 70-75.
2. Vasenin G.A., Germanov G.N., Sabirova E.F. Kompetentnost v rabote shkolnogo uchitelya fizicheskoy kultury [Competence in the work of a school teacher of physical culture]. Fizicheskaya kultura v shkole. 2020. No. 8. pp. 2-11.
3. Matveev A.P., Karpov V.Yu., Eremin M.V., Mikhailov A.A. Samostoyatelnyye zanyatiya mladshikh shkolnikov po fizicheskoy kulture kak dopolnitelnaya forma osvoyeniya osnov programmogo materiala [Self-study of junior schoolchildren in physical culture as an additional form of mastering the basics of program material]. Teoriya i praktika fizicheskoy kultury. 2018. No. 5. pp. 56-58.
4. Melenteva N.N., Lopukhina A.S., Sverkunova N.S. Vnedreniye tsifrovyykh tekhnologiy v prepodavaniye distsipliny «Teoriya i metodika obucheniya fizicheskoy kulture» [The introduction of digital technologies in teaching the discipline "Theory and methods of teaching physical culture"]. Fizicheskaya kultura. Sport. Turizm. Dvigatel'naya rekreatsiya. 2022. Vol. 7. No. 4. pp. 20-25.
5. Sinyavsky N.I., Fursov A.V. Soderzhaniye uroka fizicheskoy kultury napravlennogo na podgotovku obuchayushchikhsya k sdache norm GTO [The content of the lesson of physical culture aimed at preparing students to pass the GTO norms]. Napravleniya i perspektivy razvitiya massovoy fizicheskoy kultury, sporta vysshikh dostizheniy i adaptivnoy fizicheskoy kultury [Directions and prospects for the development of mass physical culture, sports of higher achievements and adaptive physical culture]. Proceedings national scientific-practical conference with international participation. Saint Petersburg. 2022. pp. 252-255.