THE SELECTION OF MOTOR TESTS FOR FITNESS LEVEL ASSESSMENT OF WOMEN STUDENTS, WHO DON'T GO IN FOR SPORT

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Abstract

Physical Education, as a compulsory subject, is included in a curriculum of higher educational establishments. It is meant to carry out the process of student’s comprehensive physical training with the aim of health promotion, improvement of physical development, rise of fitness and physical efficiency level. Especially, it concerns women students, who don’t go in for sport.

Women make the half of contingent of the majority of the higher educational establishments – women make more than 50% among all the students. They have all sorts of initial level of physical training. Women’s physical education experience shows that one can’t solve the problems of physical training only with the help of compulsory exercises. The irregular increase of the majority of women’s physical activity indexes and fitness level indexes is observed in the process of physical training in the institute of higher education. This situation causes the necessity of using additional independent exercises according to an individual program by taking into account the individual peculiarities of each woman student.

Physical Education of students provides not only for special organized compulsory exercises but also for independent exercises, which are aimed at self-education and self-perfection in the field of physical education. In order to do it, it is necessary to work out an individual program of physical self-perfection. One of the criteria, which determines the efficiency of the worked out program, is fitness level assessment. The fitness level assessment of a student is to promote awareness of the level of working knowledge of motor skills, of development of motor abilities, perception of the aim and the way of physical self-perfection. In its turn, all these facts will promote active involvement in the process of physical self-development and self-perfection.

The method of fitness level assessment includes the complex of the motor tests. The results of these tests help to identify the efficiency of the worked out program with account of physical and somatic state of a student. An important fact is which sides of fitness level are assessed by the matched motor tests. The object of this article is the selection of the complex of motor tests, which are intended for fitness level assessment of women students' motor abilities who don’t go in for sport.

Keywords: motor tests, fitness, level assessment of women students.
1 INTRODUCTION

The problem of physical students’ health improvement, of increasing of their fitness level attracts attention of a lot of scientists. The dissimilarity of women students’ fitness level draws special attention to this problem. The specific characteristic of this category of students is the significant difference between the extremes in the rates of motor qualities development, within the scope of one health group. The difference is 22%, it represents different dynamics of their development in the process of their physical training. First of all, this peculiarity is representative of full-time women students (Yushkov, 1991).

The physical education of women students is to be based on the knowledge of the peculiarities of feminine constitution. One should take account of students’ anatomic and physical features in order to achieve significant changes in physical training. The peculiarities of feminine constitution define the possibilities in the certain groups of physical exercises. For women there aren’t any limits in dexterity and coordination of movement development. The fluency in movement and high level of spine’s flexibility lets a woman to excel a man in plasticity, rhythmic and orchestics. In the basis of their flexibility there is the very valuable ability to regulate various levels of muscle tension and the skill to regulate them intentionally. One should take account of the feminine peculiarities of their motor system in choosing physical exercises for them. That’s why it’s reasonable to use widely such exercises as the dynamic exercises with higher movement amplitude, frequent change of poses and rhythmical phases’ changes of muscle contraction and relaxation. It helps to achieve the improvement of movements’ speed and coordination in most links of a motor system and also flexibility, gracefulness and necessary force of movements is been producing gradually. One also should practice muscle-strengthening exercises in physical training for women, as optimal muscle strength and endurance development is necessary for harmonious development, overcoming problems, successful work and life in the whole. These peculiarities cause the main motor features - muscle strength, speed of movements, dexterity and endurance and they also define physical efficiency. Taking into account the biological features of an organism, the specialists in physical education must be very careful on choosing the facilities and methods in working with women (Kustova, 1988).

For realization of this activity, each woman student must have an opportunity to work out an individual plan of trainings with account of her own fitness level (Achkurin, 1996). The efficiency of this individual plan of self-study is defined according to the criteria of fitness level assessment.

2 OPINIONS AND DISCUSSION

According to the specialists’ opinion, the assessment of the development level of the main students’ motor features and abilities allows to reveal their strengths and weaknesses of the fitness level and also to define goals and ways of their physical self-improvement. This assessment is defined according to the results of the motor tests for the detection of the development level of various physical features or motor abilities (Ostanigrosh, 1984). The assessment of the motor abilities, according to the specialists’ opinion (Palagina, 2005), is the main part in the control of both fitness level and assessment of physical training’ system efficiency. For the assessment of development level of motor abilities and physical features one uses not only one test, there are several tests, the so-called a battery of tests (Blagush, 1988). It’s a complex of motor tests, according to results of which one assesses a fitness level.

The analysis of the sources about the problem of man’s motor abilities testing lets us know that the problem of working out of a complex of fitness level assessment is ambiguous. The majority of the experts in Physical Education and Sports are for the comprehensive approach in man’s fitness level assessment, they only disagree about the quantity and quality of the necessary rates. There are used a lot of testing complexes for fitness level assessment. They differ only in the quantity and the content of the exercises (Palagina, 2005). At different times various authors used from one-two to fifteen or even more testing rates. There is a great number of the testing complexes for students’ fitness level assessment. The preference (with a little difference in the size of factor coefficient) was given to the widely used tests, to the test which were simple and which didn’t require the special equipment. In most cases the experts test only the endurance rates (running, aerobic), speed (running), strength endurance (muscles of arms, shoulder girdle, legs and tummy muscles), speed and force abilities (in most cases leg muscles) in students’ (in particular women students) motor abilities assessment. At the same time one should mention that there aren’t any tests for joints’ suppleness (Hasin, 1995).

The analysis of the existing tests has shown the specificity of the diagnosed forms of man’s motor abilities and the absence of a common integrated rate in each sort of motor abilities. This fact is explained by the complexity of the mechanism of cooperation of all the sides of a man’s fitness and by the complexity of the
mechanism of their display. After the analysis of the most used tests for motor abilities assessment, one found out that there aren’t any tests which would characterize the development level of the certain motor features in the pure state. At best each test shows one form of a certain feature. That's why assessment of the data, which was obtained as a result of a test for a certain feature, may be considered conditionally. There is a great number of various tests for the assessment of certain motor abilities, but there isn’t full clarity in the question of the tests which can give more information about the development level of students’ fitness (Leshko, 1993).

The strength abilities, which are developed in the size of motor efforts, are reproduced by the integral body response, connected with mobilization of psychological qualities, the function of motor, muscle, vegetative, hormonal and other physiological systems (Verhoshinsky, 1988). It is also noted that the strength of the certain muscle groups may be uncoordinated. It means that if there is the same strength in shoulder girdle, there can be differences in strength of tummy, back and leg muscles. That's why the definition of strength qualities of the main muscle groups is more informative. As for the various forms of strength, one verifies them as “muscle strength of upper extremity”, “tummy muscles strength”, “back muscles strength” and so on (Cherepahin, 1997).

The experts in Physical Education of young people represent flexibility as the main part of a man’s motor function. The success in sports depends on it (Palagina, 2005). E.P. Vasilyev recommends to define flexibility as physical quality, which defines the degree of flexibility of various parts of a locomotor system relative to each other. Out of all the variety of joints, the flexibility in the joints of spine, shoulder girdle and in the hip joints is the most important, as amplitude of movements in these joints has a tendency to decrease in the course of life.

The differences in the experts’ opinions on the problem about the type of the test for fitness level assessment cause appearance of a large number of tests for fitness level assessment. The problem of testing and assessment of man’s fitness level and in particular students’ fitness level hasn’t got the definite solution yet. All these facts confirm the complexity and the possibility of the alternative approaches in solving this problem of formation of the complex of tests for students’ fitness level assessment. One should mention that any motor exercise may be used as a test under the condition that it’s quite safe, informative, standardized and also under the condition of presence of an assessment system and a definition of factor structure of a test combination.

3 CONCLUSION

The carried out researches in selection of motor exercises in the test battery on women students’ fitness level assessment that don’t go in for sport gave us an opportunity to choose five motor tests, which were included in the structure of the test of motor fitness. This is run in 10 minutes, body lifting and raising in 30 seconds, bending and extension of arms to chest on knees in 30 seconds, forward bend, standing on a gym bench, dislocate backwards with extended arms with a broomstick. The motor exercises were selected for women’s motor abilities assessment. The peculiarities in a woman’s locomotor system go with the peculiarities of the functions of the certain physiological systems and an organism on the whole. That’s why the peculiarities of a woman’s organism were the determinative in choosing a test combination for women students’ fitness level assessment, in particular in choosing a method of performance of some motor exercises. The test in run in 10 seconds one can do along with walking, the test in press-up in 30 seconds one do in kneeling hips extended. In this way, the complex of tests for motor abilities assessment allows to check them under normal conditions of training study time-effective. Moreover, all women at the age of 18 to 21 of the main health group are tested and assessed according to one standard and these exercises practically rule out injuries. The index of safety (r’tt = 0.90 - 0.99) and informativeness (r = 0.815-0.905, r = 0.377-0.515) of tests give grounds for steady usage of them in assessment of development of the certain sides of women students’ fitness (Palagina, 2015).

Run in 10 minutes is used to define development level of total endurance, in the base of which there are the capabilities of cardiovascular and respiratory system. Bending and extension of arms to chest on floor or knees in 30 seconds is used to define capabilities of arms and shoulder girdle muscles inspired and strength conditions. The exercise of raising body up in 30 seconds is used to define capabilities of abdominal muscles in speed and strength conditions. Forward bend, standing on a gym bench, is used to define development level of flexibility of a spine, back thighs muscles and extensibility of tendons, knee joint ligaments. Dislocate backwards with extended arms with a broomstick is used to define development level of shoulder joints’ flexibility.
REFERENCES LIST


