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Improvement of artistry at the qualified sportswomen in rhythmic gymnastics

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Purpose: to define influence of means of modern choreography on artistic abilities of the qualified sportswomen in rhythmic gymnastics.

Material & Methods: art-aesthetic requirements by the technique of V. S. Avanesov were defined at eight candidates of master of sports, choreographic priorities were found out by means of questioning and conversation, the level of coordination abilities of gymnasts by motive tests was defined.

Results: classes by choreography, communication with music are priority in art- aesthetic needs of gymnasts. Most of gymnasts gave their advantage to the use of techniques of contemporary dance and jazz-modern from means of modern choreography.

Conclusions: the level of musically-rhythmical preparedness, coordinate movements by different parts of body, expressiveness of movements improved considerably under the influence of means of modern choreography at gymnasts that promoted the improvement of artistry of sportswomen.

Keywords: contemporary dance, jazz modern, art requirements, gymnast.

Introduction

Assessing performance of competitive athletes in rhythmic gymnastics exercises carried out by the judges on the technical and artistic parameters [4]. Indicators of technical skill gymnasts is harmonious and unerring execution of movements by various parts of the body at high speed and maximum amplitude in combination with a masterly work items [7]. In the assessment of artistic expression affects the exercises, musicality and versatility of performance skills of athletes. Dancing training plays a key role in shaping the performance skills of athletes [1; 8; 10]. Currently, the training of qualified gymnasts actively introducing various types of modern choreography [2; 3]. Many experts in rhythmic gymnastics argue that modern choreography, this contributes to the development of skills expressive movements, liberation, mastery of a variety of styles, the development of artistry gymnasts. For the effective use of modern choreography necessary to study their impact on the specially trained athletes

The purpose of research:

to determine the influence of the modern choreography at the artistic abilities of qualified athletes in rhythmic gymnastics.

Research objectives:

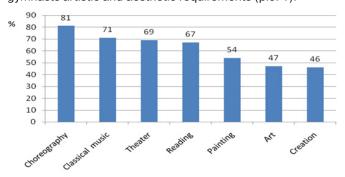
- 1. To study the artistic and aesthetic needs of the gymnasts and their priorities for the types of choreography.
- 2. Determine the influence of the modern choreography at the coordination abilities of qualified athletes in rhythmic gymnastics.

Material and Methods of the research

In the experiment, participated 8 athletes, candidates for master of sports in artistic gymnastics, extending the program of masters of sports. Artistic and aesthetic needs of the gymnasts were detected by the method of V. S. Avanesov, 32 claims [9]. Choreographic athletes priorities were determined by the developed questionnaire and during the conversations. The level of coordination abilities determined by the results of the gymnasts asymmetric movements jobs rhythm, tests for the differentiation of muscle effort and the vestibular apparatus.

Results of the research and their discussion

Artistic and aesthetic needs of the gymnasts were interpreted on possible initiation athletes to different types of art and creativity. Since, according to the preferred direction of artistic and aesthetic needs of gymnasts in the questionnaire had a different number of allegations, and, consequently, different maximum possible score, the results were converted into percentages. In Picture 1, in order of importance are presented gymnasts artistic and aesthetic requirements (pic. 1).



Pic. 1. Priorities in the artistic and aesthetic needs of gymnasts

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The priority of artistic and aesthetic needs of sportswomen study group are dance (81%). Girls have a positive attitude to the classical choreography and sports ballroom dances. In second place is the need to communicate with a serious music (71%), which is based on a positive attitude and the ability to listen to classical music, as evidenced by the ability for most women to get rid of a bad mood by listening to classical music.

The next most important need to identify the theater and reading (69% and 67%). If possible, athletes try to go to the theater and to spend time reading, but the theater is possible to visit only partially, and some prefer the adaptation of literary works. Requirements for the admission to the art of painting in athletes is not high (54%). Girls are less expanding their knowledge in the painting, do not go to art galleries and exhibitions. Athletes believe that modern man can not do without the dialogue with the works of art (47%). Do gymnasts modest skills in art (46%), but they have a desire to develop their creative abilities.

With the help of questionnaires and interviews were defined preferences in the kinds of choreographic art. It should be noted that the process of training in rhythmic gymnastics athletes all have experience training Exercises classical dance and familiarity with some directions in the choreography. Three gymnasts training in addition to studying classic, sports ballroom and folk dances. Most gymnasts means of modern choreography preferring the use of techniques Contempo dance and modern jazz.

To implement the tools of modern choreography in athletes through questionnaires and interviews were defined their competence and preferences in styles of music and nature [2; 6]. Based on the fact that the musical style includes the totality of the means of expression of artistic and ideological content of the musical work, gymnasts considered their preferences for the following musical styles: Classical, folk, Dance music, pop, rock, alternative rock, and others have determined that the four athletes like classical music, three – rock music. With the help of questionnaires and interviews gymnasts defined priorities in terms of the nature of music and music is offered the following nature: a tragic, romantic, lyrical, heroic, patriotic, sad and funny. Regarding the preferred nature of the music of the girls they were very diverse: from the romantic, lyrical to heroic. Most women – romance. Some lyrical romance or romance heroic.

Thus, as a result of studying the artistic and aesthetic needs of the gymnasts it was found that the gymnasts are addicted to dancing, interested in a variety of styles of music, theater and literature. Do female athletes to be creative desires and needs. It is determined that the most competent athletes in classical dance, modern choreography in the priority areas for the gymnasts are Contempo technology and modern jazz.

Motor coordination in gymnastics characterized by a pronounced specific motor and sensory asymmetry. The high rate of asymmetry does not allow athletes to perform competitive elements of the high "cost" at the appropriate level and to include them in its program, thus limiting the variety and technical complexity of the composition competition [5]. As a result, testing coordination abilities gymnasts had identified problems, namely the low level of co-ordination of the various movements of the body parts (4 to 7.4 errors). Least of all

gymnasts made mistakes in carrying out asymmetric movements of arms and legs during the 20 s, the average - four errors. Harder athletes were given the asymmetrical movement of the upper limbs, from six to 7.4 errors to demonstrate perfect execution. Gymnasts have successfully coped with the method of distance using the corresponding movements of the hands and feet, from 5.8 seconds to 6.8 seconds. Do athletes did not cause difficulty running backwards, which they managed to 4 seconds. Some gymnasts experienced significant difficulties in tests for orientation in space without visual control, deviations of up to 45°. We do not have caused difficulties sportswomen simple tests on the sense of rhythm (from 0 to 2 error error). In the test to reproduce the musical rhythmic pattern in athletes had difficulties, only one athlete coped without errors. It is determined that the majority of girls kinetic sensitivity is well developed, departing from 11% to 18%, except for gymnasts under the number 5 (38% and 36%) (table. 1).

Thus, the athletes have been identified problems in the implementation of asymmetrical movements with his hands and feet, and with two hands. Athletes have experienced difficulties in the tests on the orientation in space without visual control and allow for deviations in the differentiation of muscle sensations tests. Gymnasts coped better with simple rhythmic and tests showed a low result in the reproduction of musical rhythmic pattern.

Modern dance was used as a tool for the development of coordination abilities of gymnasts and improve artistic skills of athletes [2; 8]. With the help of modern choreography funds is expanding choreographic vocabulary athletes and improved their artistic skills. Research orientation present in our methodology. In class jazz – modern dance and contemporary dance gymnasts lined connection between the dance form and its internal feelings.

The dance was performed Contemporary girl isolated movement different parts of the body. Athletes trained isolated movement – only one part of the mobility of the body, while the entire body remain stationary or moving in the opposite direction. Isolated traffic stressed rhythm of the music, creating the impression of music passing through the body of a gymnast. Classes contemporary dance gymnast learn to improvise, to exercise the utmost expressiveness, emotion and emancipation, thus improving the level of coordination abilities and artistry gymnasts.

Technique Jazz Nouveau is currently popular in the preparation of highly skilled gymnasts [6]. In this style of choreography developed plastic girls, flexibility, the ability to reflect movements using pulsing music. movements fusion was achieved in regular training to strengthen all muscle groups. Classes develop musicality, sense of rhythm, proper breathing, coordination and the ability to control the body. Broken body movements, spectacular dance moves dance totally dependent on the imagination of girls, unity of his inner world with the world of space and music. In class athletes have learned to distinguish between complex rhythmic patterns, coordinate movement with the rhythm of the music syncopated music between strong stakes.

In training with the use of modern forms of choreography studied diverse mix of footwork, arms, torso, head. This development was not of a mechanical character. By appropriate

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adjustment of each movement raised its expressive, artistic performances. To improve the skills and maintain a creative interest as learning new exercises become more complex systems. While working on the nature of its motion-ha music was the main methodological procedures providing the most vivid and profound awareness of the task and correct its implementation [2]. Activities on the development of athletes have the ability to perceive the content of the music and its individual members have contributed more vivid sense of movement and provide the necessary emotional expressiveness. To develop the creative abilities of the athletes to respect the basic principle that the work on the nature of the motion in relation to music is to realize its tasks and independent decision. In this case, the teacher did not explain and did not show movement, athletes, listening to music, independently found ways to set training.

In the next phase of the study was conducted retest level of coordination abilities of gymnasts, which showed improvement in average performance in the group for all the studied parameters (table 2).

E number of errors when performing exercise asymmetrical errors decreased from 24 at baseline to 20 at the end of the

experimental errors. Positive changes have also occurred in the tests on the orientation in space (from 9.9 s to 2 s and from 58° to 24°). The average value of the number of errors in the performance tests for improved rhythm ($\overline{X}-4$ errors – $\overline{X}-2$ errors), the deviation in the test for differentiation of muscle effort decreased from 24% to 20%. Thus, it is determined that a class modern types of choreography positive impact on the medium performance group coordination abilities gymnasts. The greatest improvement occurred in the coordination abilities of the gymnasts in which the primary testing results were at a low level.

Conclusions

1. Priorities in the artistic and aesthetic needs of the gymnasts were distributed in the following order: introduction to choreography classes (81%); the need to communicate with a serious music (71%); theaters (69%); reading (67%); interest in painting (54%); fellowship with the works of art (47%); introduction to creative work (46%). Most gymnasts are competent in the classical choreography. From contemporary trends are a priority for athletes Contemporary technology and modern jazz.

Table 1
The test results of coordination abilities of female athletes

Tests		Results										
		2	3	4	5	6	7	8	X	σ		
1. Asymmetric hands and feet movement, the quantity of errors	5	4	4	3	5	5	3	3	4,0	0,9		
2. Right-circles, the left-vertical line, the quantity of errors	9	7	5	4	4	4	9	6	6,0	2,1		
3. Left – circles, right – triangle, the quantity of errors	7	5	7	8	5	5	11	11	7,4	2,5		
4. Right – circles, the left – the horizontal line, the quantity of errors	7	7	6	5	5	8	9	8	6,9	1,6		
5.Passing 12 m. Of the same heading.	6,1	6,7	6,3	6,8	6,1	5,6	6,8	5,8	6,3	0,5		
6.Runningbacks12 m	3	3,8	3,7	3,9	3,3	3,7	3,7	4	3,6	0,3		
7. Pivoting after 5 spins around itself without visual control, degrees	15	30	15	20	40	30	25	15	23,8	9,2		
8. Deviation walking without visual control, degrees	25	35	40	25	35	30	40	45	34,4	7,3		
9. Two hands clap, step 1, the quantity of errors	0	2	0	0	2	1	0	0	0,6	0,9		
10. Two steps, 1 clap hands, the quantity of errors	0	1	1	0	1	2	0	0	0,6	0,7		
11. The rhythmic pattern, the quantity of errors	3	4	2	0	2	4	2	1	2,3	1,4		
12.Dynamometryright, kg	16	21	18	24	18	17	15	16	18	3,0		
13.Dynamometry 50% deviation (%)	6,3	11	5,6	8,3	38	8,8	3,3	25	13	12,0		
14. Dynamometry 25% deviation (%)	6,3	6	8,3	16	36	10	1,7	6,3	11	10,8		

Table 2

	Results											
Tests		2	3	4	5	6	7	8	At the beginning of the experiment		At the end of the experiment	
									$\bar{\mathbf{x}}$	V	$\bar{\mathbf{x}}$	V
1. Asymmetric exercise, the quantity of errors	24	20	18	18	15	18	26	19	24	19	20	18
2. The orientation in space	1,1	1,5	1,5	1,5	1,4	1,3	1,5	2,6	9,9	7	2,0	29
3. Orientation in space without visual control, degrees	10	25	20	15	30	30	30	30	58	33	24	19
3. The feeling of rhythm, the quantity of errors	2	5	2	0,5	3	5	1	0,5	4	77	2	75
4. Differentiation of muscular effort, deviation%	10	15	10	24	45	18	3	31	25	87	20	69

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- 2. Gymnasts revealed problems in the performance of isolated movements and co-ordination of simultaneous movements in different parts of the body. In tests on orientation space without visual control deviation amounted to: ($\bar{X}-24^\circ; \bar{X}-34^\circ$); in the differentiation of muscle sensation tests: ($\bar{X}-13\%; \bar{X}-11\%$). Gymnasts showed lower result in the reproduction of musical rhythmic pattern.
- 3. The method of application of means of modern choreography in the preparation of highly skilled gymnasts based on the use of technology Contempo Dance (sontemporary dance) and jazz-modernist. Athletes performing isolated and asymmetric movements of different body parts, learn to distinguish between a complex rhythmic pattern, to improvise, to express their emotions and feelings. Under the influence of the mod-
- ern choreography gymnasts improved expression skills, musicality, coordination of movements of different parts of the body, contributing to the improvement of artistry athletes.
- 4. The number of errors when performing asymmetrical exercises decreased from 24 to 20 errors. Decreased while the job in tests for spatial orientation with visual control (from 9.9 s to 2 s), the deviation in the tests fell outside the visual field (58° to 24°). When the differentiation of muscle effort deviation decreased from 25% to 20%. Greatly improved performance is musical-rhythmic training of athletes.

Prospects for further research. In future compilation of competitive programs of gymnasts with the inclusion of elements of Contempo and jazz-modern.

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