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# Improving the composition of voluntary programs in the category of Women in fitness

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**Purpose:** to reveal the basic directions of perfection of construction of compositions of voluntary programs in the category of Women in fitness.

**Material & Methods:** judges-experts analyzed the structure and content of voluntary competitive programs of performances of six female athletes'-finalists of the championship of Ukraine on bodybuilding and fitness in 2016.

**Results:** voluntary programs include elements of structural groups of varying complexity: "acrobatic", "choreographic", "strength" and "flexibility"; female athletes with better indicators in the quantitative analysis of competitive compositions received higher grades for performance; the results of athletes for an arbitrary program are directly proportional to the number of complex elements in the composition.

**Conclusions:** in an voluntary program in women's fitness for a competitive result affects the saturation of the program, the variety and complexity of the elements.

**Keywords:** fitness, bodybuilding, competitions, composition, women, evaluation.

#### Introduction

The main functional purpose of fitness is to improve the physical health of the broad masses of the population in the process of familiarizing them with a healthy lifestyle by increasing the motor activity [5; 12]. Modern fitness industry offers a variety of physical exercise systems to improve the level of health of those involved [11]. For those wishing to demonstrate and evaluate the level of their physical condition, the federation of bodybuilding and fitness of Ukraine holds various competitions [8]. Carrying out of competitions promotes development of a kind of sports, gives the chance to reveal the strongest athletes, the strongest commands, to define the best training methods [9; 10]. Also, competitions are an effective advertising for involving new participants in sports training. Now in Ukraine under the auspices of the IFBB (International Bodybuilding and Fitness Federation) competitions are held in various areas: male and classical bodybuilding, masculare and mens physicist, bodyfitness, fitness bikini, male and female fitness, wumens physicist, wellness, etc. Specificity of the sport provides assessment of athletes athletic build, muscle proportionality, physical attractiveness, charisma, charisma. The basis in training for bodybuilding is the process of building muscle mass, the formation of a beautiful body with the help of a power complex of exercises and a special diet with a protein diet [8; 10; 12].

The competitive program and preparation in the direction of "fitness", which arose relatively recently in the framework of competitive bodybuilding, and includes competition in the performance of motor elements in the form of an arbitrary program, is significantly different. According to the rules of the competition, an arbitrary program in fitness does not have mandatory movements, but must include elements of strength, flexibility, acrobatics and choreography, performed preferably in a dynamic mode [8; 12]. Thus, a competitive fitness program involves not only demonstrating harmonious proportions of the body, but also performing exercises

that require good motor preparation, the availability of skills for performing acrobatic elements, various equilibria, racks, swing, jumps, turns, combined into a complete artistic composition.

At the present time, programs for improving one's body with strength training have been developed in sufficient detail [10]. Experts develop recommendations on the training of athletes in the "fitness" class, but to date there are no studies devoted to the content of arbitrary competitive athlete's fitness programs [12].

Relationship of research with scientific programs, plans, themes. The research was carried out in accordance with the initiative theme of the scientific research of the Department of Dance Sports, Fitness and Gymnastics of KSAPC: "Theoretical and methodological bases of development of system-forming components of physical culture (sport, physical recreation, fitness) for 2018–2020.

**Purpose of the study:** to reveal the basic directions of perfection of construction of compositions of voluntary programs in the category of Women in fitness.

Objectives of the study: 1. To analyze the structural components and content of arbitrary competitive programs in women's fitness. 2. Identify the leading factors that affect the competitive result in an arbitrary program in women's fitness.

## Material and Methods of the research

An analysis was made of the video footage of the performances of six female finalists of the Ukrainian Bodybuilding and Fitness Championship in 2016 [8]. With the help of qualified expert judges, the structure and content of random competitive fitness programs in the category "women" were analyzed, and estimates for the performance of each component of the program from five points [4; 6; 7].

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### Results of the research and their discussion

Competitions in fitness are spectacular. Judging is carried out in three rounds: a bikini, an arbitrary program and a final. In the second round the athletes represent an arbitrary program with a musical accompaniment lasting up to two minutes. In a competitive composition, contestants must demonstrate elements of strength, flexibility, acrobatics and choreography, and also display their artistic abilities, that is, reflect the plasticity of movements and manner of execution, the intended image and chosen style of music [1; 2; 3].

All the elements included in the composition of athletes, the experts were ranked into two categories of complexity, namely: to category A were attributed to simple elements, to category B – complex elements [6]. The content and complexity of the exercises of an arbitrary program of each athlete are

reflected in Table 1, the numbers of the athletes correspond to the results of the performance in the second round.

In their competitive programs athletes actively used various acrobatic elements: "bridge stand", flip flops, coups, rumblings, stances on the head. To demonstrate the strength of the athletes performed various stops: the angle of the legs apart, high angle of the legs apart, horizontal supports with support on the elbows. In various endeavors, from complex static positions, the athletes performed various "push-ups", including "push-up" in the Wenson rest. Elements of flexibility of the girl demonstrated the performance of swings, twines, jumps with maximum amplitude of motion by various links of the body. Arbitrary compositions contained various choreographic elements: equilibria, turns, jumps and dance movements corresponding to the nature of the music.

Table 1
Classification of elements of an arbitrary program

	Classification of elements of an arbitrar					
No.	Acrobatic	Power	Flexibilities	Choreographic		
1.	1) "bridge stand" from the lying position (A) 2) falling forward at the stop lying (B) 3) the roll is bent in the support lying (B) 4) standing on his legs, rolling back over the head to the floor and balance on the hips, hands up (B) 5) flip forward (B)	1) angle in the support of the foot apart (A) 2) "push-up" in an emphasis lying on one leg (A) 3) horizontal foot rest apart with support on elbows (B) 4) high angle in the support, legs apart (B) 5) "push-up" in the stop Wenson (B)	1) jump into the twine with the torso bending backwards (A) 2) jump into the ring with a torso bending backwards (B) 3) a transverse jump – "Pike" (A) 4) jump with a turn of 360° in the twine (B)	1) equilibrium in the ring without the help of hands (B) 2) equilibrium is sideways to 90° (A) 3) equilibrium "Swallow" (A) 4) turning the "compass" (B) 5) turn attitude (A) 6) jump into the twine (A) 7) three jumps in a row with a step change with a change of legs (B) 8) jump "Cossack" (B)		
2.	1) three "wheels" to the right (A) 2) stand on the head, bending your legs (A) 3) back flip (B) 4) the "bridge stand" is tilted backward (B)	1) "push-up" in the support lying (A) 2) "push-up" in an emphasis lying on one leg (A) 3) "push-up" in an emphasis lying on one leg and one arm (B) 4) "push-up" in the stop Wenson (B)	1) swing forward (A) 2) swing backwards (A) 3) the transverse jump (A) 4) leap into the twine with the torso bending backwards (A) 5) jump into the ring with the torso bending backwards (B)	1) equilibrium is forward-90° (A) 2) the equilibrium-backward by 90° "Swallow" (A) 3) twist forward (B) 4) turn attitude (A) 5) turning jump (A) 6) jump into the twine with a turn of 360° (B) 7) jump into the twine (A) 8) three jumps in a row with a step change with a change of legs (B)		
3.	1) roll forward (A) 2) stand on head bending legs (A)	1) angle in the support of the foot apart (A) 2) high angle in the support of the foot apart (B) 3) horizontally the foot rest apart with the support on the elbows (B) 4) horizontal foot rest apart with support on the elbow of one hand (B)	1) the front twine, the trunk parallel to the floor (B) 2) the back twine, the trunk parallel to the floor (A) 3) a transverse jump – "Pike" (A) 4) jump into the ring with the torso bending backward (B)	1) the equilibrium "letter T" (A) 2) turning the "compass" (B) 3) cross rotation and wave by trunk (A) 4) turn in the "gun" (A) 5) jump "Cossack" (B) 6) jump into the twine (A)		
4.	1) flip forward (B) 2) the "bridge stand" from the lying position (A) 3) "wheel" to the left (A) 4) the "bridge" is tilted backward (B) 5) the roll is bent in the support lying (B)	1) "push-up" in the support lying (A) 2) jump in the grouping (A)	1) jump into the twine with the torso bending backward (B) 2) jump into the ring with a torso bending backwards (B) 3) a jump with a turn on 360° in a twine (B)	1) equilibrium "letter T" (A) 2) balance is a forward step with the help of hands (A) 3) equilibrium in the ring with the help of hands (A) 4) equilibrium is to the side with the help of the hand (A) 5) turning into the ring without the help of hands (B) 6) jump into the twine (A) 7) jump with a turn of 360° (A)		
5.	1) swing in the support lying (A) 2) a flip forward (A) 1) roll forward with change of legs (A) 2) the roll is bent from the rack on the lap (B)	1) angle in the support of the foot apart (A) 2) "push-up" in the stop Wenson (B)	1) swing forward (A) 2) swing backwards (A) 3) transverse jump of the "Pike" (A)	1) equilibrium of the "swallow" (A) 2) equilibrium "letter T" (A) 3) jump "Cossack" (B) 4) jump "ue" (B) 5) jump into the string (A) 6) jump with a turn of 360° (A)		
6.	1) "bridge stand" from the lying position (A) 2) roll back (A) 3) headstand (A)	1) angle in the support of the foot apart (A) 2) horizontal foot rest apart with support on elbows (B) 3) horizontal foot rest apart with support on the elbow of one hand (B)	1) jump into the ring with a torso bending backwards (B)	1) turning the "compass" (A) 2) jump "Cossack" (A) 3) chete an tunnan – a jump in the string (A)		

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An analysis was made of the number and complexity of elements of different structural groups in the composition of arbitrary programs of athletes. It was revealed that the composition of an athlete's free program with the best result includes the largest number of elements – 22, of which the largest number – 13 elements – are classified as more complex. The scores of athletes for an arbitrary program are directly proportional to the number of complex elements in the composition (from 13 to 3 elements of group B) (Table 2).

At the next stage of the study, a detailed analysis of the performances of female athletes was conducted. With the expert judges, the evaluation criteria were preliminarily discussed [1; 4; 6; 8]. The performance of the elements of each structural group was estimated from five points; the final result for execution of an arbitrary program was calculated. The scores received by the athletes according to all the refereeing criteria are shown in Figure 1, the numbers of the athletes correspond to the results of the performance in the second round.

It was revealed that the scores for the performance of the competition program exhibited by the expert judges are interrelated with the results of the earlier analysis of the quantitative indicators of the competition compositions that are shown in Table 2. Therefore, the athletes with the best performance for their competitive compositions in quantitative ratio received higher assessment for their implementation (from 4,9 points to 4,2 points). Thus, we can conclude that athletes prefer to include in an arbitrary program those elements that they have well mastered. The content of competitive athletes' compositions is largely limited by the level of their motor readiness. When judging the performance of arbitrary fitness programs by judges, the logic of the composition, the variety and com-

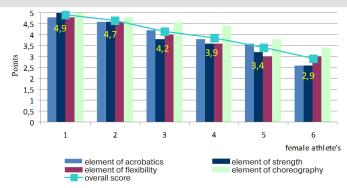


Figure 1. Expert evaluation of female athlete's performances in an arbitrary program

plexity of the elements, as well as the technical performance of the elements, artistry, plasticity and musicality [2; 3; 8].

## **Conclusions**

- 1. Compositions of arbitrary competitive exercises in women's fitness include elements of different structural groups: "acrobatic", "choreographic", "power", "flexibility", differing in different levels of complexity.
- 2. Saturation of the program, the diversity and complexity of the elements in the aggregate affect the competitive result in an arbitrary program in women's fitness.

**Prospects for further research** in this direction, they are supposed to consider issues related to improving the technical preparedness of female athletes in women's fitness.

Table 2

Quantitative indicators of elements of different structural groups and categories
of complexity in arbitrary programs of female athletes

		of complexity in arbitrary programs of female athletes					
Athletes	Complexity Categories	Structural groups					
Atmetes		Acrobatics	Power	Flexibilities	Choreographic	Total sum	
	All	5	5	4	8	22	
1	А	1	2	2	4	9	
	В	4	3	2	4	13	
	All	4	4	5	8	21	
2	А	2	2	4	5	13	
	В	2	2	1	3	8	
	All	2	4	4	6	16	
3	А	2	1	2	4	9	
	В	0	3	2	2	7	
	All	5	2	3	7	17	
4	А	2	1	3	6	12	
	В	3	1	0	1	5	
	Всего	4	2	3	6	15	
5	А	3	1	3	4	11	
	В	1	1	0	2	4	
	All	3	3	1	3	10	
6	А	3	1	0	3	7	
	В	0	2	1	0	3	

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