METHODS OF CREATIVITY DEVELOPMENT AT THE SPECIALIST IN PHYSICAL EDUCATION AND SPORT

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Abstract

It can be noticed that creativity is a defining attribute of modern man. Stimulating creative potential is one of the top priorities of education in the world at the beginning of the third millennium, in order to cope with complex issues and changes in different sectors. The creativity of the physical culture and sports specialist is conditioned by: pedagogical creativity, situational creativity, managerial creativity, scientific creativity. In the process of professional training of specialists in physical education and sports it is necessary to pay more attention to the development of creative potential as it influences the progress of the field.

Introduction

Creativity is a defining attribute of modern man. The development of science and technique involves a high level of knowledge from the side of all those who participate in the production process, as well as the valorisation of all human recources with creator character of each individual, the very essence of the human personality consisting in its creative affirmation.

For education, a great importance represents the educability of creativity in general, which it involves receptivity and open attitude towards the positive experience, sensibility to the new, the desire to experience and capitalize new hypothesis, a guiding activity of valued norms and acquisitions, but based on the invention, on the creation and on the teachers' dedication to student and values.

The modern school puts at the centre of its concerns the formation of the creative personality, of the native skills specific to each pupil, which they must develop up to the superior limit of capacities, through a wealthy own activity, as systematically as possible organized and as possible suitable with these skills [5, 10].

The specific of creative learning is understood by P.Popescu-Neveanu [3,4,7] as a maximal approach of the active knowledge model, through exploration,

hypothesis, deduction, putting and solving problems, but also of the practical achievement, of transformative projects. The combinatorial feature of this model is reinforced by motivation.

The model of creative learning thus becomes a reference system for all didactic categories. It structures and reorganises intellectual operability, incites the power of innovation, which is only a continuation of reality through other possibilities, the prolongation of what is given, known, familiar, with what is particular value[3]. The authors Pasăre D., Rață E., consider "The schooling period is considered esssential to establish a basis for the motivational, social, moral and intellectual aspects of a child's personality." [1]. In the context of the methods the authors Ş.,Ghe., Pentiuc, E., Rață consider that "The pattern recognition methods used to build the system assumes that a pattern is an abstract representation of a person, object, or phenomena, not necessary an visual entity" [2].

The purpose of the research is to study the methods of developing creativity in the process of vocational training of specialists in the physical education and sport field.

Methods: Theoretical analysis, experimental method, statistical-mathematical method, graphical method, observation.

For the development of creative potential in the context of didactic activity, Nagâţ G. [6] and other authors recommend the following four groups of independent activities (Figure 1):

- Search-research of information, ideas, possibilities of meanings transfer, classification criteria;
- Organizing of new materials: producing of reports on their own activity, composition of collections etc.;
- Engendering of new ways to look at things, new means of expressing ideas, structures, forms, models;
- Communication-arrangement of words in propositions, viewing of experience data, composition of informative sheets, notes, announcements etc.



Fig.1. Groups of independent activities

In order developing the creativity exists:

- non-specific means (without a relationship with a particular subject of education);
- specific means (in relation with a particular matter, depending on its content).

Non-specific means.

Three categories of evidence there are identified, namely (Figure 2):

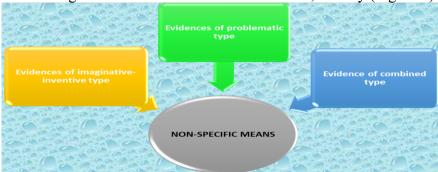


Fig.2. Non-specific means

• Evidences of imaginative-inventive type

The narration is used inside of the instructive-educational process, most often as a method of exercising the spirit of observation and language development. If the object which constitutes the theme of composition is complex, it exhibits a lot of aspects that the student takes over effortlessly, looking to transpose them into a form of self-expression. But when the object is simple by simplicity and banalness, this is poor in aspects; for to discuss it, the accent does not fall on the capacity of observation, but especially on the imaginative-inventive one of individual. This is all the more tense as the outer support points are fewer.

• Evidences of problematic type

The questioning principle was integrated to tasks what it aims the educating of non-specific creativity precisely because it represents the main correlation of the creation activity in general.

Unlike the method of activation known in the instructive process, which is asking questions to the group activates it, but limiting the process to the first correct answer, evidence of problematic type represents a reversal of roles between teacher and student. This time those who formulate the questions – orally or in writing – are the students. They are asked to formulate as many questions as possible with reference to certain known objects, but also as many questions that concern about it and discoveries, research that he would like to make.

For students, such a test has a inedited character. Accustomed to receive questions and "record" solutions provided by teachers and manuals, they see themselves in situation of discovering as many unknowns as possible. Just the

ability to get out from known sphere, to formulate questions is, as is known, a condition of prospective and original thinking.

• Evidence of combined type

It was considered by John Dewey to be one of the best exercises to develop the imaginative side of thinking and intellect in general. Similar to the "free expression" method, this process followed, like the other evidences, the transition from the comfort attitude of the student (imitation, memorization) to that of effort "elaborations, personal interpretations".

The students are asked to transpose inside of this evidence, in another form of expression a content given or elaborated by them. They are thus asked to illustrate some ideas through drawings, or – finally – their own opinions on concrete situations which will solve the created situation etc.

Using these non-specific methods, even if it would not lead to obvious progress from the start for a particular object of education, are important because they create what is called "creative attitude" and especially "the ability to seek and find problems".

Specific means.

Cultivating creativity is not just about stimulating students to formulate answers to such questions or to formulate questions themselves.

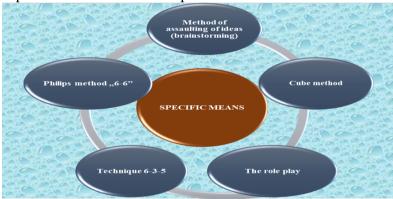


Fig.3. Specific means

In most disciplines the main way is the active methods (Figure 3). Among these, a central place occupies the learning by discovery from which creative learning derives. Essentially, this refers to the fact that, at the requirement formulated by the teacher, students must to specify aut a problem and solve it their own, either through an individual study in the audience, or, better, in an activity per groups.

Material-method

• Method of assaulting of ideas (brainstorming)

The brainstorming designates a specific group technique and is, probably, one of the most used terms in the description of group communication. This technique was first time proposed by Osborn in 1957 and was developed to overcome some of the difficulties faced by groups when they have to solve problems [3].

This method is one of the most useful in pedagogical practice, having two main aspects:

- in the original sense, represents a method to stimulate participants' creativity and at the same time, to discover innovative solutions to the discussed issues;
- in the second sense, defines a propitious framework for school / universey education.

In the activity with the method of assaulting of ideas, we have to guide ourselves after a set of rules which follow the following: all the ideas, except for obvious jokes, will be regarded as such by the members of the group; no suggestion will be criticized; the expression of more unusual ideas by the participants will be encouraged by the moderator of discussions, will build a high degree of collective humor; the group members should be encouraged to build on the idea of another; at the end, no idea belongs to anyone, it encourages combinations of ideas; the rules of brainstorming activity will be displayed in a place where they can be seen by all participants; the moments of silence (inevitable) will be overcome by the moderator by re-focusing on a previously issued idea, asking the participants at the extension exercise, its modification / remodeling - attention should be paid to the inhibition that people may have when, after a prolong period of silence, they have the impression of "breaking" the silence; are required ideas from the "silent" members of the group, which invests them with the role and power structure; pauses can be used to remotivate the discussion (so, the participants are requested that as on return to the meeting room to change places and get to know their new neighbors before resuming the discussions); the quantity is more important than quality, but this should not stop the group members from trying to think creatively and intelligently; at the end of the discussions, the moderator will explain to the participants that if they find ideas on the same day or in otherwise agreed time, they can communicate them [8].

• Cube method

Theoretically, this method can be described as follows: "The Cube, as a method, is used when it is desired to explore a subject from several perspectives, because it offers the possibility of complex and integrative approaches.

This gives to the students the opportunity to develop the competencies needed for complex and integrative approaches.

The steps of the method: a cube is accomplished on whose faces the words are noted: describes, compares, analyzes, associates, applies, argues; the theme / subject of discussion is announced; the group is divided into six subgroups, each of which going to analyze the theme chosen from the perspective of the requirement on one of the cube faces; the final form of the exercise is shared to the whole group; the work in final form can be developed on the blackboard.

• The role play

The role play method is based on the simulation of some functions, relationships, activities, phenomena etc., and through their practice, students become actors of the social life they are prepearing for. By putting students to relate with each other the role play activates them cognitively and affectively, and the interactions between participants enable effective self-control of conducts, behaviours and acquisitions.

To simulate is similar to mimic, to pretending, to imitate, to reproduce fictionally situations, actions, facts, etc. The goal is to put the participants (students in our case) in situations that are not familial just to help them understand the respective situations and other people who have different points of view, responsabilities, interests, concerns and motivations.

There are several variants, of which: the prescribed role play, given by scenario – the participants receive the case and description of the roles and interpret them as such; the improvised role play, starts from a given situation and each participant has to develop its role.

• Technique 6-3-5

The new ideas are written on the sheets of paper that circulate between the participants. The technique is called 6-3-5 because there are six members in the working group, who notes three solutions each on the sheet of paper, for a given problem, for five minutes. This technique has the following advantages: encourages the group solidarity and the competition between groups, combining individual and team work.

• Philips method "6-6"

The students are grouping in six, discussing the problem for six minutes. Each group chooses a leader. At the end, the groups announce their opinion; follows a general discussion, after which are drawn the conclusions.

Therefore, the methods of developing creativity are based on all forms of organizing activities (individual, pairs, group and frontal), the group of students becoming a learning community, where each contributes both to their own learning and to the collective learning process. The students are requested to turn to those sources that help them solve the problems and are involved in complex learning experiences, real life projects through which they develop their knowledge and skills.

Results

The authors Agache Ghe., Vizitiu E., consider "Performing any motor act appropriate involves not only execution and reception, but also information processing, under the control and domination of the psyche, thus implying the participation of the function complexes called psychomotor" and creativity.

The evaluation and assessment of the results obtained by the masters students of the experimental group compared to those in the control group was performed by the committee of experts on each topic. The system for evaluating each topic was used by scoring from 1 to 10.

During the experiment conducted for masters students from both groups (control and experimental), 10 tests were performed, one for each chapter of the course. The control group was tested in the classical form of evaluation. The experimental group was also tested based on the evaluation grid from 1 to 10, and the topic was in accordance with the newly developed course content "Creativity and innovation management in sport".

The time given to each master student in the control and experimental groups to test each topic did not exceed 8 min. It should be noted that the recovery methodology in the control and experimental group was different. Figure 4 shows the results obtained by the subjects of the control group.

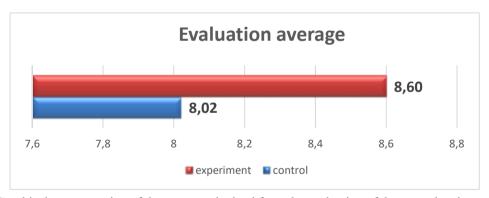


Fig. 4. Graphical representation of the average obtained from the evaluation of the control and experimental groups

The differences between the averages obtained, at the final stage, by the subjects of the control and experimental groups (Figure 5) are significant, which confirms the validity, usefulness, necessity within the university curricular contents of the development methods of the creative potential.

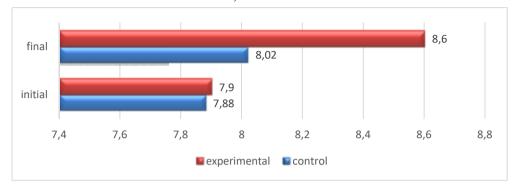


Fig. 5. Graphical representation of the averages obtained by the control and experimental groups at the initial and final stages of the experiment

Given the tendency of the Republic of Moldova to join the EU, education must be harmonized with contemporary educational standards and technologies in order to develop the creative potential of human resources. In this perspective, taking into account the extension of the training modalities, it becomes very important to identify the areas and the set of competence that the "quality" specialists must integrate.

Conclusions Encouraging the tendency to be creative must constitutes a moral obligation of each teacher because the learning process offers various and reach opportunities for cultivating creativity.

The especially use of an active-participatory strategies leads to the development of students' critical thinking, that constitutes an important formative objective.

The developing of students creativity in order to achieve performances assume a change of vision in pedagogical practice, based on:student-centered learning; the learning promotion through collaboration; the use of some didactic strategies, which will stimulate the creativity, which will put the students in concrete situations of communication, problem-solving, the realization of some original products.

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