PEDAGOGICAL FACTORS OF THE DEVELOPMENT OF CREATIVE THINKING OF SCHOOL AGE CHILDREN THROUGH THE EDUCATIONAL CLUSTER

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ANNOTATION

The article is devoted to the generalization of the features of the development of creative thinking in primary school and adolescence.

Keywords: critical thinking, cluster method, elementary school, knowledge, use of methods, primary school age, learning, child, appropriate cluster.

At the moment, the topic of developing creative thinking is very relevant. This is connected directly with the presentation by society of many requirements for the personality of a person. Since ancient times, talented, gifted people have always aroused great interest in society. However, people used to think that talent was a gift from God. Over time, researchers have proven that creative thinking can be developed.

Creative thought activity is a natural form of brain activity that is common to all people. But on its way there are obstacles, certain patterns and stereotypes that appear in a person under the influence of the environment and the system of education and upbringing.

Until now, most people do not use all the possibilities of their brain enough. Then, the question arises before science: "Under what conditions could everyone develop their creative inclinations and transform them into creative achievements?"

Researchers in the field of child psychology argue that it is necessary to develop creative thinking at an early age. At this age, imagination, fantasy begin to develop, children learn to observe, compare, generalize.

According to the results of a psychological study, children at the age of 6 have a fairly high potential for creativity. But in adults, this figure is reduced to a minimum. This shows how important it is to start developing creative thinking from childhood, which will make it much easier in the future to find solutions to complex problems.

Primary school age primarily differs from the previous ones in that the child descends into the system of educational activities. The psychological aspect of this activity is the very process of assimilation by schoolchildren of knowledge, skills and abilities, which are diverse in their content and degree of complexity, as well as the process of assimilation and use of knowledge in practice. From the moment of schooling, the child is able to independently see his present, past and future, where his whole life in the future will be colored by cognitive activity, which is the leading one at this age stage. So, referring to the definition of D.B. Elkonin that the leading activity predetermines other types of age-related activities that are directly formed in it. As a result, it can be stated that creative thinking is able to enter and interact with learning activities.

Creative thinking can be systematically enriched by constantly expanding the scope of activities, the system of knowledge and skills. The student learns over time and begins to use

new knowledge on familiar subjects. Also, creative thinking can, with the help of mental activity, activate all intellectual abilities and forces. Educational activity is an active and complex process, where the student is required to be active. Intellectual activity must be stimulated "outside", as a result of which the child will rapidly develop HMF (higher mental functions) and volitional qualities. This set of individual properties act as the basis of creative thinking.

A characteristic feature of children's creativity is its universal character. A feature of virginity is that in this age period everyone creates, and creativity is not limited to such cognitive prerequisites as thinking, intellect, memory and imagination. This is explained by the fact that processes of a cognitive nature, despite the unevenness, develop over many years.

If we talk about the relationship of knowledge and creativity with the cognitive interest of younger students, then it is worth dwelling on the research of S.L. Rubinshtein, which states that knowledge is the basis of a person's cognitive interest, without which it cannot arise, but, accordingly, the satisfaction of interest also inevitably leads to the enrichment of knowledge.

At present, the management of modern production technologies requires the upbringing of a highly intelligent personality, striving for self-knowledge, self-improvement, self-realization. Informatics in elementary school is a special subject, during the study of which younger students purposefully master information knowledge and skills, techniques and methods of working with various sources of information necessary for mastering various areas. The process of intellectual development should be based on the basic concepts of the propaedeutic course of informatics, such as "information" and "information processes", "algorithm" and "performer", "model" and "simulation", "computer", etc.

This approach in pedagogy is not accidental, because. conceptual thinking is considered as the highest stage of intellectual development, contributing to the development of creative abilities. Intellectual ability is fundamental in the development of creative abilities

The development of creative thinking can be facilitated by gradation internalization of educational activity means. In other words, as learning activity develops, the student stops focusing his attention and efforts around a certain type of activity. Since this system of actions becomes everyday for the child, he can safely and easily maneuver abstract judgments. By the end of the first grade, children, as a rule, use previously acquired information to solve some more complex problems. The child forms a full-fledged plan of internal actions, which are a significant impetus for creative thinking. Perception and attention begin to actively obey thinking, and memory is structured. Educational activity pushes mental processes towards arbitrariness, and the development of the volitional sphere will only contribute to this.

Also, active learning activity enables the developing creative thinking of the student a certain motive of subjective significance. Thus, creative activity can be actively encouraged with the help of good grades.

A cluster is a graphical form of organizing information, when the main semantic units are singled out, which are fixed in the form of a diagram with the designation of all the links between them. It is an image that contributes to the systematization and generalization of educational material.

The modern education system is focused on the formation of independent thinking in students. Critical thinking is a pedagogical technology that stimulates the intellectual development of students. The cluster is one of his methods (techniques).

The features of critical thinking include the presence of three stages:

- · Call,
- Understanding,
- Reflection.

At the first stage, activation takes place, involving all members of the team in the process. The goal is to reproduce the already existing knowledge on this topic, form an associative series and raise questions that you want to find answers to. At the comprehension phase, work with information is organized: reading the text, thinking and analyzing the facts obtained. At the stage of reflection, the acquired knowledge is processed as a result of creative activity and conclusions are drawn.

Cluster reception can be applied at any of the stages.

- At the challenge stage, children express and record all the available knowledge on the topic, their assumptions and associations. It serves to stimulate the cognitive activity of schoolchildren, motivate them to think before starting to study the topic.
- At the stage of comprehension, the use of a cluster allows you to structure the educational material.
- At the stage of reflection, the cluster method performs the function of systematizing the acquired knowledge.

It is possible to use the cluster throughout the lesson, in the form of a general strategy for the lesson, at all its stages. So, at the very beginning, children record all the information that they have. Gradually, during the lesson, new data is added to the schema. It is advisable to highlight them in a different color. This technique develops the ability to assume and predict, supplement and analyze, highlighting the main thing.

The cluster is made in the form of a cluster or a model of a planet with satellites. The main concept, thought, is located in the center, large semantic units are indicated on the sides, connected to the central concept by straight lines. These can be words, phrases, sentences expressing ideas, thoughts, facts, images, associations related to this topic. And already around the "satellites" of the central planet there may be less significant semantic units that more fully reveal the topic and expand logical connections. It is important to be able to specify the categories, substantiating them with the help of the opinions and facts contained in the material being studied.

Depending on the way the lesson is organized, the cluster can be drawn up on the board, on a separate sheet or in a notebook for each student when completing an individual task. When composing a cluster, it is advisable to use multi-colored crayons, pencils, pens, felt-tip pens. This will allow you to highlight some specific points and more clearly display the big picture, simplifying the process of systematizing all the information.

There are several recommendations for clustering. When creating it, you should not be afraid to state and record everything that comes to mind, even if these are just associations or assumptions. In the course of work, incorrect or inaccurate statements can be corrected or supplemented. Students can safely use their imagination and intuition by continuing to work

until they run out of ideas. You should not be afraid of a significant number of semantic units, you should try to make as many connections between them as possible. In the process of analysis, everything is systematized and will fall into place.

The cluster method can be used in almost all lessons, when studying a variety of topics. The form of work when using this method can be absolutely any: individual, group and collective. It is determined depending on the goals and objectives, the capabilities of the teacher and the team. It is possible to flow from one form to another. For example, at the challenge stage, it will be individual work, where each student creates his own cluster in a notebook. As new knowledge becomes available, as a joint discussion of the material covered, on the basis of personal drawings and taking into account the knowledge gained in the lesson, a general graphic scheme is drawn up. The cluster can be used as a way to organize work in the classroom, and as homework. In the latter case, it is important that students have some experience in its preparation.

The use of a cluster has the following advantages:

- It allows you to cover a large amount of information;
- Involves all members of the team in the learning process, they are interested in it;
- Children are active and open, because they do not have fear of making a mistake, making a wrong judgment.

During this work, the following skills are formed and developed:

- The ability to ask questions;
- Highlight the main thing;
- Establish cause-and-effect relationships and build inferences;
- Move from particulars to the general, understanding the problem as a whole;
- · Compare and analyze;
- · Draw analogies.

The cluster reception develops systemic thinking, teaches children to systematize not only educational material, but also their value judgments, teaches children to develop and express their opinion, formed on the basis of observations, experience and new knowledge gained, develops the skills of simultaneously considering several positions, the ability to creative processing information.

Lessons using the cluster method give the children the opportunity to express themselves, express their vision of the issue, give freedom of creative activity. In general, non-traditional technologies used in the educational process increase the motivation of students, create an environment of cooperation and instill self-esteem in children, give them a sense of creative freedom.

LITERATURE

- 1. Aroyan N. Creative thinking in the system of concepts of modern psychology //. 2018. S. 118-126.
- 2. Blonsky P.P. Psychology of the junior school student. M., Voronezh. NPO " Modek ", 2017. 435 p.
- 3. Blonsky, P.P. Memory and thinking. St. Petersburg: Piter, 2021. 288 p.

- 4. Viktorova V.V. Primary school age as a period of moral development of the individual. Bulletin of MGUKI, 2019. No. 5 (55) September October. pp. 202 205.
- 5. Danilova E.E. The value of primary school age # Age and pedagogical psychology. Reader. M. Academy, 2018. 455 p.