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DEVELOPMENT OF SMALL MOTORICS OF SENIOR PRESCHOOLERS THROUGH THE UNCONVENTIONAL QUILLING TECHNIQUE

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The article describes the work on the development of fine motor skills of hands in older preschool children through the use of an unconventional application technique – quilling. The urgency of the problem for the development of preschool children, their preparation for school has been substantiated. The development of fine motor skills in preschool age is the foundation of mental development. With the help of fine motor skills, such higher properties of consciousness as attention, thinking, imagination, visual and motor memory, and speech are developed. The purpose of the study is to theoretically substantiate and reveal the influence of classes in non-traditional quilling technique on the development of fine motor skills in older preschool children. Experimental work was carried out on the basis of the Municipal budgetary preschool educational institution “Kindergarten” Muruchaana “of the Ust-Aldan ulus of the Republic of Sakha (Yakutia). The performed diagnostics of the level of development of fine motor skills in older preschool children at the ascertaining stage showed medium and low levels. The author has developed a system of lessons on the “quilling” technique using the national-regional component. Children learned to do work on Yakut ornaments. Interesting training scenarios have been developed. Consultation for parents is being held. The results of the experimental work at the control stage showed positive results.

Keywords: fine motor skills, non-traditional quilling technique, creativity, thinking, older preschool children

Introduction

One of the indicators of the normal physical and neuropsychic development of a child is the development of his hand and hand skills. According to the skill of the child's hand, experts, on the basis of modern research, draw a conclusion about the peculiarities of the development of the central nervous system. The development of fine motor skills in preschool age forms the foundation of mental development, and mental abilities begin to form early and not by themselves, but in close connection with the expansion of activities, including general motor and manual ones.

In older preschool children, the level of fine motor development is an indicator of intellectual readiness for schooling. With the help of fine motor skills, such higher properties of consciousness as attention, thinking, imagination, visual and motor memory, and speech are developed. A child who has a sufficient level of development of fine motor skills, well-developed coherent speech, memory, attention, he knows how to reason logically. This is the age when the main task of upbringing and teaching a preschooler is to prepare him for school. One of the important aspects of the development of a preschooler during this period is the development of fine motor skills and coordination of movements of the fingers.

The purpose of the study is to theoretically substantiate and reveal the influence of classes in non-traditional quilling techniques on the development of fine motor skills in older preschool children.

Materials and research methods

The development of fine motor skills in older preschool children has always been relevant.

This problem is disclosed in the works of the founders of Russian psychology L.S. Vygotsky, Z.I. Bogateeva, A.V. Zaporozhets Melnikova, T.V. Fadeeva, S.V. Chernykh, D.B. Elkonin.

V.L. Belkina, human hand movements are not hereditarily predetermined, but arise in the process of education and training as a result of the formation of associative connections between visual, tactile and muscular sensations in the process of active interaction with the environment [1].

The problem of improving fine motor skills of hands in older preschool children through unconventional paper handling techniques is determined by the interest in studying the features of children's creativity as one of the ways to prepare preschoolers for school. In the studies of a number of prominent Russian teachers (D.V. Kutsakova, S.V. Lishtvan, L.V. Panteleeva and others) devoted to working with paper, a large role is assigned. According to these researchers, working with paper actively contributes to the development of fine motor skills of the hands of preschool children, as well as the improvement of the eye and sensorimotor skills in general, creative thinking is activated, its speed, flexibility, and originality increase.

Fine motor skills are a set of coordinated actions of the nervous, muscular and skeletal systems, often in combination with the visual system performing fine and precise movements of the hands and fingers and toes. When applied to motor skills of the hand and fingers, the term dexterity is often used [2].

V. A. Sukhomlinsky wrote that “the origins of the abilities and talents of children are at their fingertips. The more confidence in

the movements of the child's hand, the finer the interaction of the hand with the tool, the more complex the movement, the brighter the creative element of the child's mind. And the more skill in a child's hand, the smarter the child is ... "[1, 2].

The research work was carried out on the basis of the Municipal budgetary preschool educational institution "Kindergarten" Muruchenee "of the Ust-Aldan ulus of the RS (Yakutia). Children of the senior group "Kuncheen" (12 people) took part.

During the research work at the ascertaining stage, we used the following methods:

- technique "Drawing simple patterns" (author L.A. Venger);

- "Paths" technique (author L.A. Venger);

- graphic test "Fence" (author A. R. Luria).

Consider the content of the techniques and analyze them.

LA Venger's technique "Drawing simple patterns" [3].

Purpose: to check how ready the child's hands are for mastering writing, i.e. how developed are the small muscles of the arms. The experimenter draws the initial part of the pattern himself, and then invites the child to continue the pattern to the end of the page, without taking his hands off the sheet of paper. The patterns can be different at the discretion of the experimenter. The pictures show sample patterns. In this case, it is necessary to instruct on the implementation of this task.

After the test – tasks, the material was processed, the levels of fine motor skills formation in older preschool children were determined:

- high – coped well with the task – 6 points;
- average – mistakes were made in the alternation of elements – 3 points;

- low – patterns do not correspond to the sample in size, harmony, rhythm, elements – 0 point.

LA Venger's technique "Paths".

The technique is a task for the child to draw lines connecting different elements of the drawing. The technique allows you to determine the level of development of the accuracy of movements, the degree of preparedness of the hand for mastering writing, the formation of attention and control over their own actions. The figure shows paths with cars at one end and a house at the other. The car should "drive" along the path to the house. The width of the tracks is selected so that it is rather difficult, but accessible to the child. The type of tracks gets more complicated from the first to the last.

Instructions for the child: "Cars and paths with houses are drawn here. Try to connect the car to the house with a line without leaving the driveway. "

After the test – tasks, the levels of the formation of fine motor skills in older preschool children were determined:

- high level – execution is considered if there are no exits outside the track, the pencil comes off the sheet no more than 3 times – 6 points;

- average level – two exits beyond the track, the pencil was torn off the sheet no more than 4 times, the track is uneven, trembling – 3 points;

- low level – the task was performed poorly, more than three exits outside the track – 0 points.

Graphic test "Fence" AR Luria.

Purpose: to determine the level of development of fine motor skills of the hand. The graphic test represents the continuation of repeating elements replacing each other.

Instructions for children: "Continue to draw the fence in the same way as mine; pay attention to the drawing. "

The subject is invited, without lifting his hand from a sheet of paper, to draw a pattern with alternating triangular and square links to the edge of the page, first with his right hand, then with his left.

After the test – tasks, the levels of formation of fine motor skills of the hand in older preschool children were determined:

- high level – error-free execution of the task, the lines are straight, the alternation of a square and a triangle is traced – 6 points;

- intermediate level – the task is completed, but there are difficulties in switching between the teeth in the form of adhesion of the walls of the triangular and square teeth – 3 points;

- instead of a "fence" there is a smooth wave or drawing only square or triangular teeth – 0 points. (Children's works are presented in Appendix 1.2).

Let's analyze the indicators according to the methods (see Figure 1).

Analysis of Chart 1 allows you to capture the following results:

- LA Venger's "Paths" method: high level – 16%, medium level – 24%, low level – 60%;

- technique "Drawing simple patterns" by L.A. Venger: high level – 32%, medium level – 28%, low level – 40%;

- graphic test "Fence" by A. R. Luria: high level – 16%, medium level – 32%, low level – 52%.

Analyzing the results of the methods carried out, we can say that the level of development of fine motor skills are mainly at low and medium levels. The children did a little better with the "Drawing Simple Patterns" technique. Four children are of a high level, three children are of an intermediate level and five children are of a low level.

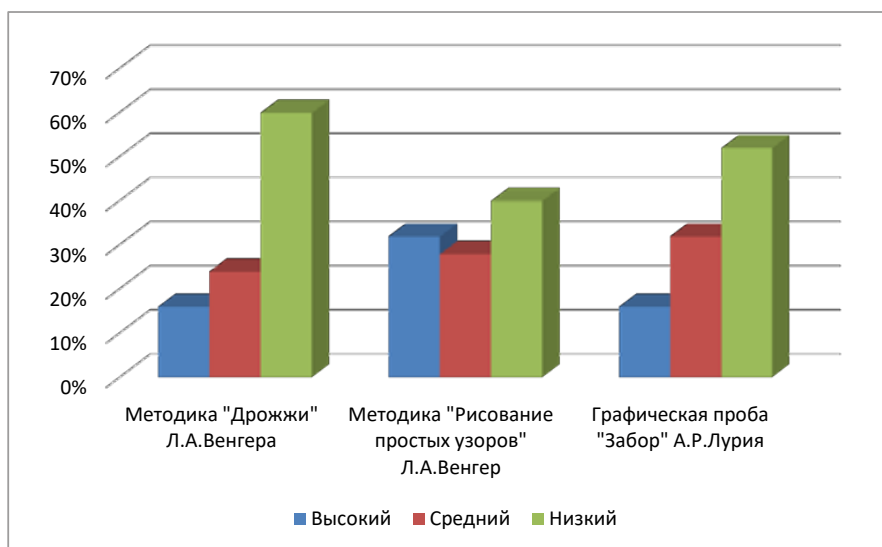


Fig. 1. Analysis of the results of the ascertaining stage of the study

One interesting and effective means of developing fine motor skills in older preschoolers is quilling – this is the art of paper rolling. The essence of quilling is twisting strips of paper of various lengths and widths into spirals, giving these spirals the desired shape and creating compositions from them. This art technique is constantly being updated and developed, new techniques and directions appear in it, modern materials become popular. In Russia, as in many parts of the world, quilling has become popular not so long ago. However, today there are already quite a few followers of this technique. In children, quilling exercises develop hand motility and perseverance; and in all people, regardless of their age, it promotes the awakening of the imagination and forms a state of psychological relaxation. Indeed, making compositions using the paper filigree technique, one can feel like a magician creating something extraordinarily beautiful and refined (the very name of the craft suggests something light and pleasant).

Research results and discussion of results. At the formative stage of the research work, we developed and tested a system of lessons for the development of fine motor skills in older preschoolers using non-traditional quilling techniques, which are aimed at the development of fine motor coordination, a conscious attitude to the order of work, aesthetic perception and feelings, wider familiarization of the work with paper, its properties, as well as with objects of art of different nations.

Paper filigree is an ancient paper processing technique that is still widespread in our time and is called "quilling". "Quilling" opens the way for children to be creative, develops

their imagination and artistic capabilities, and most importantly fine motor skills. I would also like to note that both boys and girls are happy to do quilling [4].

Children are recommended to start quilling classes at the age of 5-6, using thin paper, PVA glue, and perform the simplest compositions (for example, a flat chamomile from ordinary round or drop-shaped spirals) [5].

Systematic work with non-traditional techniques at the formative stage of research makes children fantasize, create their own ideas, ideas. Children are interested in classes. These activities contribute to the development of fine motor skills of the fingers, creativity, endurance and patience in older preschool children, awaken will, a sense of form, color perception and an eye. Children were happy to prepare gifts for mothers on Mother's Day, New Year's gifts.

Classes in this technique are held in sub-groups once a week and at the request of children in their free time.

We have developed a system of work for children of the senior group "Khatynchaan ("Herringbone")."

An obligatory part of each lesson was finger gymnastics, finger games, as well as games – exercises sounded with nursery rhymes. Finger games develop not only hand dexterity, precision and coordination, but also the child's brain, stimulating his speech, imagination and creativity. Also, in the process of tactile control, children got acquainted with different objects, and also learned to determine the size of an object, to distinguish objects by shape, learned to name them correctly, which made it possible to expand the child's vocabulary. During the lessons, special attention was

paid to teaching children the correct actions with the basic tools: paper, pencil and scissors.

In our group, children were attracted by the opportunity to make paper crafts using the origami technique, which the children can then use in dramatization and games. Recently, origami has been very popular among teachers, since the developmental potential is very high. A huge merit of this art is the ability to awaken children's imagination, spatial thinking, memory, as well as develop fine motor skills of the fingers, transform an ordinary sheet of paper, in a short time outside what is fabulous, turn it into animals, birds, flowers. Organization of paper handling in origami technique went from simple to complex. Children are happy to do a variety of origami-style crafts. When doing crafts, we use methods such as: examining and analyzing the folding scheme, talking with children, commenting on practical actions. It was also obligatory to show how to do the work, as well as to demonstrate the phased folding of the craft. Children were given the choice of paper. When performing the work, the children relied on the folding scheme and the visual display of the teacher. The final point was the evaluation of the children's work.

Analyzing the work of children, we paid attention to the accuracy of the craft. But in the works of children, there were both mistakes and difficulties in the implementation of the practical part:

- not all children know how to correctly form a fold line;
- precisely connect two opposite corners of the square;
- children have difficulty in verbal description of their actions.

In quilling classes, children are happy to wind strips of paper on a rod and give them an interesting shape. During work, children develop not only fine motor skills, but also an eye, attention, memory, accuracy and perseverance.

Children learned new, more complex quilling blanks gradually. Starting from the simplest forms to more complex ones. At first, children learned to wind simple spirals, measured the desired size. Then after that, they moved on to complex quilling elements.

The number of options for crafts using the quilling technique is huge. You just need to work with your child, and it will become a pleasant and useful activity. Performing the craft "Mom's bouquet" using the quilling technique, the children examined the sample, explained the sequence of the work, and also remembered the safety rules when working with toothpicks. During work, some children found it difficult to wrap a strip of paper on a toothpick, an additional showing was required. After

completing the work, the teacher and the children discuss the difficulties they encountered.

An important point in effective work on the development of fine motor skills in older preschool children is working with parents. The task of working with parents is to increase psychological and pedagogical literacy, to involve parents in joint activities. To this end, the following were carried out:

a) Consultation for parents "Non-traditional paper handling techniques as a means of developing fine motor skills in older preschoolers" (Appendix 1).

b) Exhibition of works for parents and peers.

Systematic work at the final stage will definitely give positive dynamics. By creating in the group the necessary developmental environment that will contribute to the development of fine motor skills, having received the help of parents, as well as taking into account the age characteristics of children, preschool educators will be able to continue effective work with older preschool children to improve the development of fine motor skills.

After carrying out the formative work, we carried out a control section to identify the level of development of fine motor skills in older preschool children. At the control stage of the study, we carried out a diagnosis similar to the one that we used at the ascertaining stage.

The criteria and levels for assessing the development of fine motor skills in older preschool children remained the same.

The results of the control stage showed that a high level of fine motor development was observed in four children. These are 005, 007, 010 and 012. The high level remained the same. All their works are executed faultlessly, the lines do not go beyond the "path", the lines are even, smooth, the correct alternation of figures can be traced. According to the results of the methods carried out, we can say that the indicators of the average level at the control stage have changed significantly. If at the ascertaining stage of the experiment eight children had a low level of development, then at the control stage these indicators increased significantly. Six children are at an average level of development and only two children are left at a low level. The rest of the children have a low level of development. Such children, continuing the patterns, make mistakes, their patterns do not correspond to the sample in size, there is awkwardness, trembling of hands, which indicates a low level of fine motor skills.

Let's analyze the indicators according to the methods. For clarity, let's draw up a diagram showing the results as a percentage (Fig. 2).

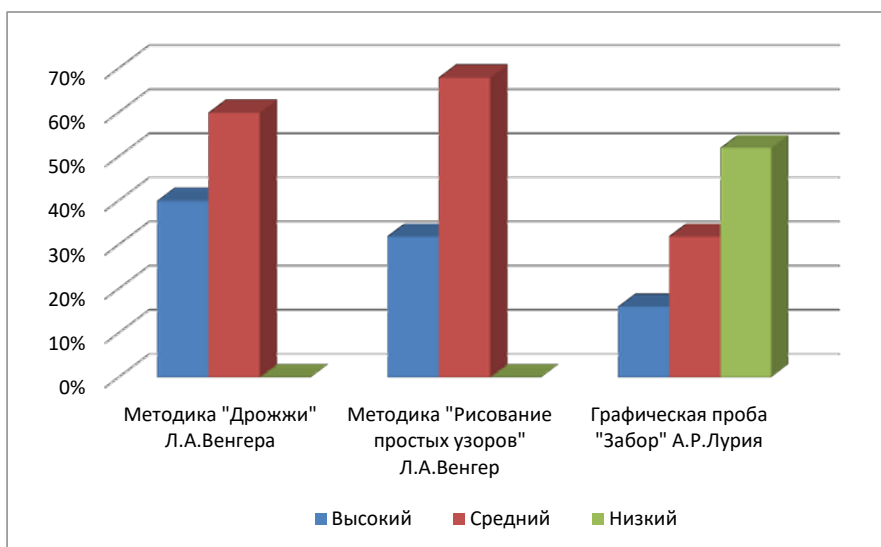


Fig. 2. Indicators according to the methodology

Analysis of Chart 2 allows you to capture the following results:

- LA Venger's "Paths" method: high level – 40%, medium level – 60%, low level – absent%;
- technique "Drawing simple patterns" by L.A. Venger: high level – 32%, medium level – 68%, low level – 0%;
- graphic test "Fence" by A. R. Luria: high level – 16%, medium level – 32%, low level – 52%.

According to the results of the diagnostic studies, it can be said that the results of children's work on the criterion of the development of fine motor skills have increased significantly. The results of the "Fence" methodology graphic test indicate that it was more difficult for children to complete this task and therefore the results are slightly lower than the results of the "House" and "Drawing simple patterns" methods, four children have a high level, six children have an average level and a low level – two children. The great difficulty in children was caused by the fact that there is no accuracy of movements, poor formation of attention and control over their own actions.

In the process of working with paper, preschool children develop not only fine motor skills, but also logical imagination, sensory perception, eyes, volitional qualities, aesthetic taste and artistic abilities, independence, self-confidence, and self-esteem are formed.

When a child creates his own image, he prepares to become the creator of a kind world. Mysterious and attractive to children are non-traditional paperwork techniques, an interesting combination of materials and tools, simplicity of execution technique, accessibility

satisfies a research need for them, awakens a sense of success, joy, and develops work skills. Performing unusual crafts with their own hands, seeing the result of their work, children experience a flurry of positive emotions. Working with paper gives children the opportunity to show imagination and taste, perseverance and patience. Children happily decorate the group room with their artwork, and also love to give them to their parents and their friends.

Creating works with their own hands, children see their result. They experience a lot of positive emotions. Working with paper makes children patient, teaches them to fantasize, develops artistic taste, makes it possible to acquire manual skill, to show creativity. All this has a beneficial effect on the formation of a harmoniously developed personality.

Conclusion

Thus, the experimental work carried out has shown positive results. The use of quilling technology plays an important role in the development of medical hand motor skills in older preschool children.

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