Teaching Children Problem-Solving in Preschool

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Annotation: The article highlights the key moments in problem solving in Kindergarten, where problem-solving teaching begins with dramatizing work, before which children have extensive experience working with specific sets. The meaning of dramatization is that children are shown combining two groups of objects to form a number greater than the number of items in each of the two groups, and dividing a number of items to form a number smaller than the previous number. At this stage, the children are not explained the structure of the problem, all their attention is focused on the relationship between the numbers given in the problem.

Keywords: *educator, arithmetic operations, addition, multiplication.*

1. Introduction

In kindergarten, we will focus on the main points of problem solving for children. Problem-solving training begins with dramatizing the work. Until then, children have a lot of experience working with specific kits. The point of dramatization is that children are shown combining two groups of objects to form a number greater than the number of items in each of the two groups, and dividing a number of items to form a number smaller than the previous number.

2. Materials and methods

At this stage, the children are not explained the structure of the problem, all their attention is focused on the relationship between the numbers given in the problem. The educator teaches the children to talk briefly about what they see (that is, to create the conditions for the problem): "Ali brought two cubes, and Farxod brought one cub." You can ask how many cups Ali brought, how many cups Farxod brought, how many cups. The children are then asked the following questions:- Are our cups bigger than the cups in Farxod? (Farxod had 1 cube, there were 3 cubes here).

"Are our cups bigger than Ali's?" Why? (The governor brought 2 cubes, of which three cubes. Three is greater than two).

"What did we do to have three cubes?" (We put one cube in front of two cubes, and there were three cubes.)

At this stage of teaching, the educator describes an arithmetic operation: "We add one cube to two cubes."

Often, first graders can't solve problems involving the words "used," "spent," "shared," and "donated." The naturalists of the preparatory group helped the children to differentiate between these concepts, their meanings, words with opposite meanings, ie came and went, bought and sold, flew and flew, came and went, they have to choose and teach words like they went, they went up and down. At the same time, children should be given opposite words that are difficult for them to understand: gave (he) - gave (to him), gave (he) - gave (to), received (he)) - received (from).

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3. Main part

Children often ask what is correct when they say subtraction (addition) or subtraction (addition). Addition and subtraction are mathematical operations. These terms include the words add and subtract in marriage. Words in marriage are close to children's experiences, so that's where learning can begin. The school method does not use the words gain and loss. Therefore, it is advisable for the educator to use the words of addition and subtraction in his speech, and gradually try to make the children use them as well. For example, a child says, "One plane should be taken from two planes," and the educator clarifies this idea: "It is necessary to separate, not to take one plane from two planes."

As children are taught to express arithmetic operations correctly, it is best to offer them different meaningful but the same number of problems to solve. For example, "Mukhtar had 3 balls. One ball burst. How many balls does Mukhtar have left?" "Three butterflies were landing. One butterfly flew away. How many butterflies are left?"

Probl ems that are similar in appearance but require different arithmetic operations should also be mentioned. Explain to the children why they need to do different things. "Three kids were playing. One child left. How many children are left?". "Three kids were playing. Another child came.

When children solve problems independently, their attention should be focused on the moral side of the problem. For example, a child thinks: "The child had 3 cars. Another boy came and pulled out one of his cars. How many cars does the boy have left? "Although the problem is well-structured, the educator says, "You don't even want to create a problem with a kid who grabs a toy. Let's find better: the gave his to friend something maybe kid car play Teaching arithmetic begins with counting one by one and counting one by one. Here, children rely on their knowledge of neighboring numbers, so this knowledge must be thorough. Some children start counting the first addition before moving on to the calculations, so it is important to explain why this is not necessary. Once children have mastered this method of addition (subtraction), they can be taught to take two numbers as a second addition (subtraction) and to add (subtract) this number one at a time. Children are told to use the following method to teach addition and subtraction of three numbers: one, one, and another. Children are taught to report orally about the methods they use: "I put one together, it's two. Then I added two and I got three. "

To teach children to differentiate between arithmetic operations in arithmetic, they are taught to answer the following questions: a) What to do to know how much... (the answer requires the expression of an arithmetic operation, using nouns: add one apple to one apple swelling is necessary); (b) How do we know this? (The answer requires an explanation of the calculation methods, in which the numbers are not named, we add one to two, we get three, we add one, we get four). The name is given only after the result is found, there were 4 mushrooms in total.

Promote brainstorming by asking openended questions: "What can you do with a...?" "How many ways can you...?" Listen carefully to children's ideas. Allow children to find their own solutions. Offer help when they become frustrated, but don't solve their problems for them. Use literature as a springboard. Teach Kids How to Evaluate the Problem

- 1. Identify the problem. Just stating the problem out loud can make a big difference for kids who are feeling stuck. ...
- 2. Develop at least five possible solutions. Brainstorm possible ways to solve the problem. ...

- 3. Identify the pros and cons of each solution. ...
- 4. Pick a solution. ...
- 5. Test it out.

Solving problems means making choices. Typically, effective problem-solving skills result in "happier, more confident, and more independent" individuals. When children tackle problems on their own, or in a group, they become resilient. They learn to look at challenges from a fresh perspective.

Basic math for preschoolers always includes counting. You should make counting a game and an exciting activity for your preschooler. Encourage your child to count objects in their world, such as toys, buttons, blocks, windows, doors, cars, and other items.

A teaching through problem solving approach means using problems, questions, or tasks that are intellectually challenging and invite mathematical thinking through both mathematical content and mathematical processes in our students.

15 Hands-On Math Activities for Preschoolers

- Patterns with Bears. Counting Bears are a great math manipulative to use with preschoolers. ...
- Sorting Colors with Bears. Sorting is a skill preschoolers should work on a lot. ...
- Money Muncher. ...
- Sorting Jelly Beans. ...
- Graphing. ...
- Shape Wheel. ...
- Shape Sorter. ...
- Noodle Shape Cards.

Math is an important part of learning for children in the early years because it provides vital life skills. They will help children problem solve, measure and develop their own spatial awareness, and teach them how to use and understand shapes

Problem solving develops mathematical power. It gives students the tools to apply their mathematical knowledge to solve hypothetical and real world problems. Problem solving is enjoyable. It allows students to work at their own pace and make decisions about the way they explore the problem.

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