

## METHODOLOGY FOR SOLVING LOGICAL PROBLEMS WITH STUDENTS IN ELEMENTARY SCHOOL MATHEMATICS LESSONS

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**Annotation:** The article focuses on learning to sound out important elements of the condition to listen to the text of the issue, which the teacher reads them at the initial time, when working on the issue in primary classes does not involve mastering its content, in order to better master the condition of the issue, each student will listen to the text of the issue and

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**Introduction.** Solving mathematical problems is an important component of teaching mathematics. It is impossible to imagine mastering mathematics without solving problems. In the process of mastering one or another theoretical material, which is studied in elementary grades of solving problems, an important role is played and an important role in the cultivation of thinking abilities of students. Issues are drawn up on the basis of the system of practical affairs.

This means content each new concept. It always happens with the solution of one or another issue that requires its application, which helps to explain the importance of this concept. Suitable simple issues are used when revealing the content of arithmetic operations between actions and the links between the action components and the results, when familiarizing yourself with the links between different amounts. Simple issues are needed in students to solve complex issues, the knowledge that will be will serve as the basis for the content of qualifications and skills. Issues teaching children to solve issues is a useful tool for development and usually takes some knowledge into its own. The search for this knowledge requires the problem solver to independently refer to analysis and synthesis-compare facts, generalize, etc. Teaching these ways of knowing is one of the important goals of teaching mathematics.

When solving issues, interest in the subject develops, independence in general develops freedom, exactingness, hard work, striving for the goal. Even when educating students, life issues help to expand thought circles. As long as work on issues leads to the improvement of the private qualifications of students systematically and on a planned basis. In elementary grades, the study of issues is carried out using the formation of new concepts, the transition from solving simple Masas to solving complex ones. In this case, the various simple problems of addition, subtraction, multiplication and division are those related to finding the sum of the same adjectives, multiplying and diminishing the number by several times, simple issues of finding unknown congenents of steps to compare numbers, as well as various complex issues including solvable issues, problems of finding the sum of two factors and inverse, then let's look at the issues that multiplication brings to be and other.

The importance of logical issues-logical issues shape abilities in students such as analytical thinking, understanding of cause-and-effect relationships, applying different methods and solving problems. They will be useful to students not only for mathematical knowledge, but also for general mental development. For example, logical issues in readers:

- Develops logical thinking: students learn to correctly understand the issue, perform each step accurately and carefully, find mistakes and correct them.
- Teaches problem solving: analyzes the issue and determines the steps leading to the correct solution, forms decision-making and issue-solving skills in students.
- Encourages creative thinking: logical issues require different approaches and encourage students to take creative perspectives. Principles for choosing logical issues-when choosing logical issues for elementary students, it is necessary to take into account the following principles:
  - Simplicity and intelligibility of the issue: in order for logical issues not to distract readers, they must be simple, clear and understandable. The fact that the issue is multi-step helps to attract the attention of readers.
  - Age eligibility: issues suitable for Primary School students must be at their own level. It is necessary to avoid over-straining students with difficult issues.
  - Interactivity: logical issues should encourage students to actively participate, encourage exchange of ideas between them.
    - Vital importance: issues should relate to the daily life of students, develop practical experiences. Logical problem solving methodology-the methodology used in solving logical problems in the elementary grade includes the following steps:
      - Reading and understanding the issue: getting to know the issue, understanding its content is the first and most important step in solving the issue. It is necessary to thoroughly teach students the words of the matter, to determine what they are asking for.
      - Issue analysis: before solving the issue, readers are advised to analyze the conditions of the issue, extract the necessary information, and consider the methods by which the issue can be solved.
      - Action plan: a step-by-step plan for solving the issue must be drawn up. It is important to show readers what steps the issue will be resolved.
      - Result verification: once the issue has been resolved, it is necessary to teach students to verify the correctness of the answer. This develops accuracy and caution in students.

Part of the research methodology. In elementary grades, the study of issues is carried out using the formation of new concepts, the transition from solving simple Masas to solving

complex ones. In this addition, subtraction, multiplication and division are different simple issues i.e. the problems of multiplying and diminishing a number several times to find the sum of the same complements and equal divisors compare numbers simple issues of finding unknown congenents of steps as well as various complex issues including problems to be quoted, issues to find the sum of two multiples and If the issue given is appropriate or similar in its complexity to the issues solved in the classroom, then students should be taught to independently find the way to solve the proposed issue.

To this end, students must master the simplest general methods of approaching the solution of issues. Staged issues. Much attention is paid to staged issues. These issues reflect the actions observed by children, often directly performed by themselves. Here it is possible not to answer the question, but to make it visible on the visual basis of the given numbers. First-class children often do not know how to solve the issue, because they do not understand the meaning of words that represent (spent, shared, gifted and hako) this or that action. Therefore, at school, in a preparatory group, special attention should be paid to revealing the content of the words that represent this or that action.

To this end, it is necessary to take into account what practical actions need to be included in the basis of the issue. In this, it is advisable to compare the opposite action: came - went, came close-walked away, picked up, picked up-dropped, brought-took, flew away from the intended gathering and the issues related to finding the residue. Visual issues. Initially, children are told about the content of the topic, and pictures are shown depicting the given numbers. The first issue on the picture is drawn up by the teacher himself. He teaches children to look at pictures, to distinguish between given numbers and life actions that led to changes in quantitative relationships.

For example, the painting depicts a child holding 7 balloons, giving 1 balloon to a girl. Looking at the picture, the teacher says: what is depicted here? What is the child holding? How many balloons are in it? What is he doing? What do we know? Draw up the condition of the issue. What can you ask about? he asks. The teacher changes the issues given, encouraging children to come up with issues of varying content on the same topic and find the balance, to draw up an issue based on a picture of the content they want to use in teaching storytelling. Mathematical problems are separated into simple and complex ones. Issues that can be solved with one action are called simple issues. Issues compiled from several simple issues and therefore solved using two or more actions are called complex issues.

For example: there were 8 birds on the tree branch. 3 of them flew? It is possible to draw up 2 inverse problems on this issue.

1) there were several birds on the tree branch. After the flight of 3 Birds, 5 birds remained on the tree branch. How many birds remained on the tree branch?

2) 8 birds were landing on a tree branch, 5 birds were left after several birds took off. How many birds flew? A directly expressed issue is separated from a simple one.

Issue 1. There are 6 apples in one box these apples are 4 more than the second box. How many apples are in the second box. Solution:  $6-4=2$  (apples) answer: there are 2 apples in the second box.

Issue 2. Wali painted 6 pictures of rabbits. Valini's drawings are 2 more than those of Zokir. How many Rabbit did Zokir draw? Solution:  $6-2=4$ . Answer: Zakir drew a picture of 4 rabbits. Work on the issue begins with mastering its content. To better understand the content of the matter, readers should not only broadcast its text to each of them, but also read it independently. If the issue condition is dizzying, it is in accordance with the goal of giving students one to three minutes to independently think over the content of the issue. When working on the text of the issue, the attention of readers should first of all be paid to the content of each word and each number in the text of the issue, it is necessary to help visualize the landscape being described in the issue, after the problem has worked verbally on the text, the content of the issue should be transferred to the language of The problem condition is that when it is difficult to analyze the links between complex given ones, it is advisable to use short writing when solving problems of a new type. Let us dwell on the question of choosing an action when solving a simple issue. Various issues play a major role in teaching elementary students to solve issues in math classes. We will dwell on some aspects of such issues anna below.

Methods of working with logical issues-visual aids and diagrams: to make it easier to understand logical issues, it will be useful to provide diagrams, drawings or tables to students. These aids make it easier to visualize the issue and solve it effectively. • **Working in groups:** encouraging students to take issue together in small groups. Through this method, students discuss their thoughts with others and come up with different approaches.

• **Games and contests:** holding logical issues in the form of games, such as quizzes or contests, arouses interest in readers and encourages them to actively participate. • **Target questions:** asking students-oriented questions when solving logical issues, such as "how can this be done?" or "what other solutions can there be?", which deepens their thinking. Benefits of solving logical problems

• **Mental development:** logical issues develop mental abilities in students, increasing their logical thinking, analysis and decision-making skills. • **Problem solving:** students learn to use different methods to solve issues, which prepares them to effectively solve problems in life.

• **Acquiring new knowledge:** logical issues give students the opportunity to acquire new knowledge and apply their knowledge in practice.

**In conclusion,** the methodology for solving logical problems in the elementary school serves not only to strengthen the knowledge of mathematics, but also to develop general mental abilities in students. Teaching students to analyze issues, solve problems and think logically can help them become successful in the future not only in mathematics, but also in other areas. When logical issues are used effectively in the course of the lesson, they play an important role in deepening and strengthening students' knowledge.

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