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## THE STUDENTS' SOCIAL PROBLEM SOLVING INITIAL ABILITY IN ONE OF PUBLIC ELEMENTARY SCHOOLS IN BANDUNG BARAT DISTRICT

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### ABSTRACT

This research was motivated by the tendency of the elementary school students' low social problem solving ability. It was not accustomed to them. They were never directed and invited by teachers to solve simple social problems. So, it is important for them to have social problem solving skill as a provision for them in dealing with problems and making it easier to solve any problems they face. This study aims to determine the elementary school students' initial ability to solve social problems. The method used in this study is a qualitative descriptive method. Research participants involved 37 students of class V-a in one of the public elementary schools in Cipongkor District, West Bandung Regency on social issues. The instruments used in data collection were learning observation sheets, test questions, and SPSI-R short form questionnaires. The research data were analyzed qualitatively through scoring and percentages based on the emergence of social problem solving aspects and indicators. The results showed that the average percentage of students' social problem-solving ability indicators in the low category based on the results of learning observations was 37.5%; based on the results of the essay test, it was in the moderate category, 41.95%; and based on the SPSI-R short form questionnaire, it showed the category was low with a high score of 70.54 on the Impulsivity/Carelessness Style (ICS) dimension. Thus, the researcher concluded that the initial ability of the students to solve social problems in one of the public elementary schools in West Bandung Regency was in the relatively low category.

**Keywords:** Problem Solving Ability, Social Matters, Elementary School Students

**Articel Received:** 21/04/2022; **Accepted:** 30/06/2022

**How to cite:** Nurdiansyah, D., Sopandi, W., Nurdiansah, N., & Agustin, M. (2022). Kemampuan Awal Pemecahan Masalah Sosial Siswa Di Salah Satu Sekolah Dasar Kabupaten Bandung Barat. *Current Issues on Elementary Education Journal, Vol 1 (1), 16-30*.

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### INTRODUCTION

The important role played by the government in realizing the goal of national education in educating the nation's life according to the mandate of the 1945 Constitution is to improve the quality of education starting from the basic education level. Everyone has the same right to get the right to education, starting from children, teenagers, adults, even male and female gender, normal individuals and individuals with special needs (Indraswati et al., 2020).

In the era of information and technology in the life of the 21<sup>st</sup> century, problem-solving skills are indispensable. To face the dynamics of change and future global demands, education needs to shape students to have 21<sup>st</sup> century skills which include critical thinking and problem solving abilities, creative, innovative, communication and collaboration (Indraswati et al., 2020). Students' skills in solving social problems are important for them to be able to answer the problems of their lives in a narrow or broad sense. Problem solving activities are an important part of learning activities. Many factors affect the condition of students in Indonesia losing their intellectual power, but the most prominent and significant is the way Indonesian students learn to use models/methods that have not developed higher order thinking skills (Agustin & Pratama, 2021).

Daily routines are always faced with various problems. The way to solve each problem for each student is different and unique. The effectiveness and efficiency of students in responding to changes is a must, so that flexible intellectual skills are needed, the ability to explore and synthesize information, and integrate various sources of knowledge in problem solving. In order to produce graduates who are able to face global competition, learning 21<sup>st</sup> century skills is a must for students. The 21<sup>st</sup> century skills that include the ability to think creatively (creative thinking), communicate (communication), collaborate (collaboration) and think critically and solve problems (critical thinking and problem solving) or more closely with the term 4C are mandatory for students in Indonesia which characterize from 21<sup>st</sup> century learning (Indraswati et al., 2020). The importance of learning skills in the 21<sup>st</sup> century as a response to the demands of competency development and human resources can be done by updating the quality and concept of learning.

You can imagine what will happen to students if problem solving skills and critical thinking, communication, creativity, and collaboration (4C) are not provided while they are studying at school even though they need the 4Cs to succeed in life (Sopandi et al., 2021). Students are like people who are robbed and cannot do anything because they do not have anything they need but a certificate.

Children's cognitive development is basically the ability to solve simple social problems in social life and can be accepted by society itself. In social life, children are

always faced with problems that need to be solved, so it is important for them to be equipped with social problem solving skills. In social interaction, there are actually rules that must be obeyed and lived. Children who still have an egocentric nature need to learn to adjust when interacting socially with other people. This situation shows how important it is for children to have the right strategy in solving social problems.

Education is a process of developing the potential and talents contained in humans to develop one's spiritual, emotional, intellectual, skills and behavior needed for a balanced survival in a social life (Amaliyah & Rahmat, 2021). To achieve a balance in social life, of course, it requires solid cooperation between fellow human beings in the family environment or the scope of the state and nation society. This can be realized by providing educational services related to humans and their environment.

Problems in education personnel is not just giving the value that must be obtained, but how to train students' skills to solve problems, especially related to the values that apply in the surrounding community and how to develop their values in everyday life. Therefore, the main purpose of education must be to facilitate students to develop skills in making reflective decisions so that students are trained to solve individual problems and determine general policies to participate in social activities in the community. Students' individual skills in solving personal problems or social problems require a more specific response from the school. Learning activities require strategic steps that can provide students with the ability to solve social problems in particular.

Problem solving ability is a skill that must be possessed by a person to overcome the problems faced by applying a set of rules, methods or strategies, based on the skills and initial knowledge possessed from observations and previous experiences in finding new things (Ayu Wardani et al., 2019). Problem solving skills are very important for students' lives in their environment and future. This is none other than the ability to solve problems within certain limits, which can be formed through the disciplines and behaviors that are learned.

In line with that (Firdayanti et al., 2019), in her article stated that generally problem solving consists of a series of learning activities that emphasize solving problems that are faced instinctively. In acquiring social problem solving skills, one must have a lot of experience in solving various problems (Wardani & Kurniawan, 2014). For this reason, the initial solving ability of an individual can become his potential in solving everything and making it easier to solve any existing problems.

So, problem solving ability is the ability to apply the initial knowledge possessed by individuals into new situations that require higher-order thinking processes. The ability to solve social problems is the ability of students to recognize problems, consider approaches to solving problems, apply and choose problem solving approaches, and arrive at solutions that can be accounted for.

If students have good problem solving skills, they are likely to be objective in making decisions in their lives, students will be trained to be skilled at sorting out appropriate information and investigating and reanalyzing the results. Problem solving ability can also be a supporting factor for students in formulating students' provisions and concepts in solving problems by contributing their ideas. If students' social problem solving abilities are low, they will have difficulty in taking solutions to an existing problem, because they are not accustomed to collecting appropriate information and are unable to realize and analyze the importance of re-checking the hypotheses they get.

In this research study, what is meant by problem-solving ability is that students are never directed and invited by teachers to practice solving simple social problems that arise in the school environment, such as the accumulation of garbage due to environmental pollution, undisciplined behavior in schools and in the community, air pollution due to environmental pollution which disturbs the air around the school, even the condition of school toilets which are often not kept clean has become a social problem that many students feel at school.

Problem solving is a process of moving from one situation to another to achieve a goal. Individual ability to achieve goals can be starting from initial conditions. In order to achieve these goals, individuals need to take various actions. According to Westen in (Eskin, 2013) the stages are: (1) the initial stage of finding the problem, (2) the stage of doing the actions to solve the problems, (3) the stage of eliminating the problems to achieve goals expected.

According to (Santrock, 2005) there are four stages in problem solving, including: 1) Finding and describing problems, 2) Developing problem solving strategies, 3) Evaluating the solutions obtained, 4) Defining and rethinking problems and solutions in a long period of time.

According to (Keenland, 2001), the problem solving process is divided into six stages, namely: 1) Realizing the existence of the problem, 2) Collecting relevant facts, 3)

Defining the problem, 4) Developing social options, 5) Selecting the best solution, 6) Executing the solution.

Meanwhile, according to (Soslo, 2007) The stages of problem solving consist of 1) Identifying the existence of a problem, 2) Representing the problem, 3) Planning alternative solutions, 4) Executing the plan, 5) Evaluating the plan, and 6) Evaluating the solutions taken. According to (Polya, 1973), there are four steps to finding a problem-solving solution, namely 1) Understanding the problem, 2) Making a problem-solving plan, 3) Implementing a problem-solving plan, and 4) Viewing or checking back.

In the meantime, according to Krulik and Rudnick, quoted by (Carson, 2007), there are five stages of problem solving, namely 1) Reading, 2) Exploring, 3) Choosing a strategy, 4) Solving the problem, and 5) Looking back and discussing (extended review and discussion).

While, problem solving levels according to Dewey, quoted by (Carson, 2007) are: 1) confronting problems, 2) defining problem, 3) inventing several solution, 4) conjecture consequence of solution, and 5) testing concequences.

Techniques of problem solving (D'Zurilla & Goldfried, 1971) are made with the aim of solving problems (especially social problems) through clear steps and dividing the problem into small parts. In this model they define five stages of problem solving techniques, namely: 1) General orientation to the problem, 2) Definition and formulation, 3) Alternative generation, 4) Decision making, and 5) Verification.

From several expert opinions regarding the indicators or stages of problem solving mentioned above, the authors conclude that six indicators to measure the initial ability to solve social problems of elementary school students are as follows:

1. Finding problems
2. Predicting consequences if problems are ignored
3. Identifying problems causing factors
4. Finding solutions
5. Making decisions
6. Taking actions to solve problems

In his research, (Ariffudin, 2020) applied a counseling approach, namely Reality counseling, by providing interventions to understand students that the problems they are experiencing arise due to the fulfillment of various basic needs from an ineffective problem solving process. The results showed statistical data that group counseling can

significantly improve students' social problem solving abilities. This happens because the movement and climate within the counseling group are able to serve students to grow cognitive abilities effectively, efficiently and bravely in dealing with problems directly.

Related to that, the research conducted by Isnaini et al. shows that students have not been able to demonstrate the ability to solve problem-solving test items in accordance with the problem-solving steps. The results obtained describe the problem solving ability of female students is lower than that of male students (Isnaini et al., 2021). In solving problem-solving essay questions using the Polya indicator, students often forget at the recheck stage so that all students who answer incompletely match the four Polya indicators on all question numbers.

Research conducted by Lestari, et al, found that science learning at Madrasah Ibtidaiyah Muhammadiyah 01 Ciasmara, Pamijahan District tends to be taught traditionally so that it is only a transfer of knowledge, so it does not provide space for students to train their high-level thinking process skills in solving problems on science material correctly (Lestari et al., 2021). Research conducted by Lestari, et al described the problem-solving ability of science material on living things with their environment in class V MI students based on the rules of Polya's problem-solving stage. The results showed that the ability to solve science problems in the adaptation of living things and their environment at MI Muhammadiyah 01 Ciasmara, Pamijahan District, Bogor is classified as good with an average percentage of 65%.

Research conducted by Supiyati, et al., explains that students should be directed to think about the problem to be studied, make tentative assumptions about the problem presented, analyze the data obtained and determine a conclusion from the experiment carried out. However, the facts that occur in the field only rely on the knowledge aspect that is prioritized while the science process skills are less trained in science material, so that problem solving abilities are still not developed optimally (Supiyasti et al., 2019). The results showed that the problem solving ability of the experimental group students who applied the guided inquiry model using the science process skills approach obtained better post-test results than the pre-test.

From the four research results, the authors found weaknesses related to indicators that can explore social problem solving abilities. From the four research results, there are no indicators that can describe the ability to solve social problems. In

this study, an analysis of the initial social problem solving abilities of elementary school students will be carried out using social problem solving indicators from the results of the analysis and adopting the theory of several figures. The purpose of this study is to describe the initial ability to solve social problems of elementary school students based on the emergence of aspects or indicators of social problem solving abilities.

## METHOD

This study used descriptive qualitative method. Descriptive analysis in this study is in the form of percentage results from each aspect contained in indicators of social problem solving ability.

The research was conducted in one of the public elementary schools in Cipongkor District, West Bandung Regency, West Java with the research subjects being fifth grade students with a total of 37 students, 25 male students and 12 female students. The implementation of the research was carried out in May 2022. The object of this research is the emergence of students' social problem solving abilities aspects in learning social problems.

Data collection techniques for students' initial social problem solving abilities were collected through observation sheets during learning activities, written tests, and short version of the SPSI-R questionnaire. Tests, observations, and questionnaires were conducted to see the emergence of indicators of students' social problem solving abilities by seeing how students were able to find problems, predict the consequences if problems were ignored, identify factors causing problems, find solutions, make decisions, and take problem solving actions.

The number of students who have reached a certain category can be expressed in percent by using the equation 1 (Sudijono, 2011).

$$P = \frac{f}{N} \times 100\% \dots\dots\dots (1)$$

Explanation:

P = Percentage

N = Total Sample

f = Frequences whose percentage being looked for

The authors used descriptive statistical techniques in data analysis in which students' social problem solving abilities were analyzed by determining the percentage value of each student's answers which was then calculated on average based on aspects

of social problem solving ability indicators. Furthermore, the mean for the results of the observation of learning activities on the material of social problems and the results of essay tests are classified as in **Table 1**.

**Table 1.** Classification of the Students' Social Problem-Solving Initial Ability based on their Obtained Scores

| Points   | Criteria  |
|----------|-----------|
| 80,1-100 | Very High |
| 60,1-80  | High      |
| 40,1-60  | Moderate  |
| 20,1-40  | Low       |
| 0,0-20   | Very Low  |

As for the classification of the acquisition scores based on the short version of the SPSI-R questionnaire containing positive and negative statements, it is classified as in **Table 2**.

**Table 2.** Classification of the Students' Social Problem-Solving Initial Ability based on their SPSI-R obtained Scores

| PPO, RPS | Criteria  | NPO, ICS, AS |
|----------|-----------|--------------|
| 80,1-100 | Very High | 0,0-20       |
| 60,1-80  | High      | 20,1-40      |
| 40,1-60  | Moderate  | 40,1-60      |
| 20,1-40  | Low       | 60,1-80      |
| 0,0-20   | Very Low  | 80,1-100     |

## RESULTS AND DISCUSSION

The results of the research on the students' initial ability to solve social problems include three aspects, namely the results of observations of learning activities, the



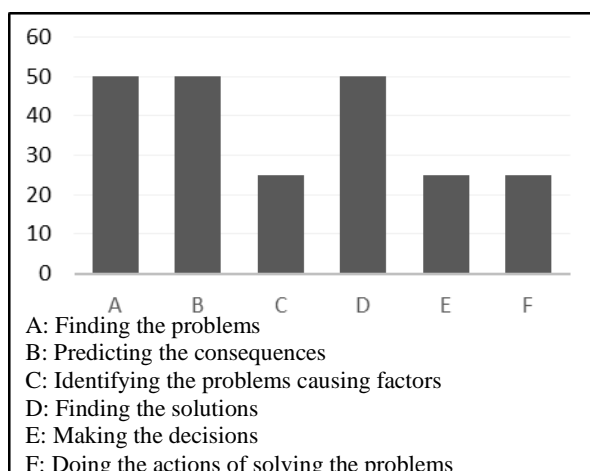
results of the ten essay questions, and the results of the short version of the SPSP-R questionnaire. The percentage of occurrence of each indicator of students' social problem solving abilities based on the results of observations is presented in **Table 3**.

**Table 3.** The Observation Result of the Students' Social Problem-Solving Initial Ability

| No.          | Indicators of Social Problem-Solving                    | Emergences | Percentage   | Categories |
|--------------|---|------------|--------------|------------|
| 1.           | Be able to find the problems                            | 2          | 50%          | Moderate   |
| 2.           | Predicting the consequences if the problems are ignored | 2          | 50%          | Moderate   |
| 3.           | Identifying the problems causing factors                | 1          | 25%          | Low        |
| 4.           | Be able to find the solutions                           | 2          | 50%          | Moderate   |
| 5.           | Be able to make the decisions                           | 1          | 25%          | Low        |
| 6.           | Be able to do the actions of solving the problems       | 1          | 25%          | Low        |
| <b>Total</b> |   | <b>9</b>   | <b>37,5%</b> | <b>Low</b> |

Based on table 3, the indicators of the students' initial ability to solve social problems as a whole appear in those of low to moderate category. However, from the average percentage of appearances, it can be seen that their initial ability to solve social problems is in the low category with an average of 37.5%.

In summary, the percentage of the appearance of indicators of critical thinking skills in these students can be described in **Diagram 1**.



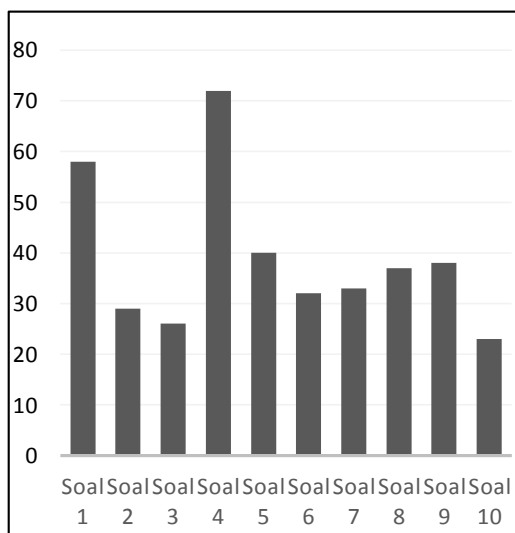
**Diagram 1.** The Emergence Percentage Diagram of Social Problems-Solving Indicators

**Table 4.** The Test Result of the Students' Social Problem-Solving Initial Ability

| No.          | Social Problem-Solving Indicators                   | Items Number | Obtained   |              | Categories      |
|--------------|---|--------------|------------|--------------|-----------------|
|              |   |              | Item Score | Mean         |                 |
| 1)           | Be able to find the problems                        | 1, 2, 3      | 113        | 37,7         | Low             |
| 2)           | Predicting consequences if the problems are ignored | 4            | 72         | 72,0         | High            |
| 3)           | Identifying the problems causing factors            | 5            | 40         | 40,0         | Low             |
| 4)           | Be able to find the solutions                       | 6, 7         | 65         | 32,5         | Low             |
| 5)           | Be able to make the decisions                       | 8            | 37         | 37,0         | Low             |
| 6)           | Be able to do the actions of solving the problems   | 9, 10        | 61         | 30,5         | Low             |
| <b>Total</b> |   |              |            | <b>41,95</b> | <b>Moderate</b> |

Based on table 4, the indicators of overall social problem solving ability appear in students in various variations. However, from the percentage of occurrences, it can be seen that five of the six indicators of problem-solving ability are in the low category, although there is one indicator that predicts the consequences if the problem is ignored, appears in the high category. The average score obtained from the results of the essay test shows that the students' initial ability to solve social problems is in the medium category with a score of 41.95.

In summary, the percentage of the appearance of indicators of social problem solving abilities in these students can be illustrated in **Diagram 2**.



**Diagram 2.** The Test Result of the Students’ Social Problem-Solving Initial Ability

The percentage of the aspects emergence of the students' initial ability to solve social problems based on the short version of the SPSI-R questionnaire is presented in **table 5**.

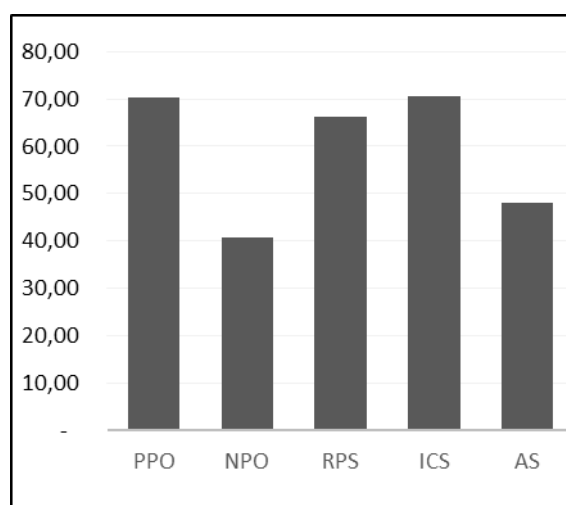
**Table 5.** The Result of *Social Problem Solving Inventory-Revised (SPSI-R)* of Short Version

| No | Dimensions                                   | Total Scores Obtained | Mean  | Dimension Scores | Criteria |
|----|--|-----------------------|-------|------------------|----------|
| 1. | <i>Positive Problem Orientation (PPO)</i>    | 521                   | 104,2 | 70,41            | High     |
| 2. | <i>Negative Problem Orientation (NPO)</i>    | 302                   | 60,4  | 40,81            | Moderate |
| 3. | <i>Rational Problem Solving (RPS)</i>        | 491                   | 98,2  | 66,35            | High     |
| 4. | <i>Impulsivity/ Carelessness Style (ICS)</i> | 522                   | 104,4 | 70,54            | Low      |
| 5. | <i>Avoidance Style (AS)</i>                  | 356                   | 71,2  | 48,11            | Moderate |

Based on table 5, the dimensions of overall social problem solving abilities appeared in the students with various variations. However, from the percentage of

occurrence, it can be seen that two of the five dimensions of social problem solving ability are in the high category on the PPO and RPS dimensions, two dimensions on the NPO and AS show the dimensions of social problem solving ability in the medium category. Although there is one dimension of ICS social problem solving ability which shows a low category dimension with a dimension score of 70.54. This shows that the students always act quickly without good planning. For the dimensions of NPO, ICS, and AS, the greater the score obtained, the lower a student's social problem solving ability.

In summary, the percentage of the appearance of indicators of social problem solving abilities in these students can be illustrated in **Diagram 3**.



**Diagram 3.** The Result of Short Version SPSI-R

Based on the results of observations of the implementation of preliminary study learning related to the initial ability to solve social problems of elementary school students, the results showed that the indicators of finding problems, predicting the consequences if problems are ignored, and looking for solutions were in the "Moderate" category, where only two aspects of the assessment appear. Then, the indicators identifying the factors causing the problem, making decisions, and taking action are in the "Low" category, where only one aspect of the assessment emerges from each indicator.

Based on the test results in the form of 10 essay questions, showing the results that the answers to questions number 1, 2, and 3 indicators found problems, the mean score achieved was 37.7 in the "Low" category. The answer to question number 4, the indicator predicts the consequences if the problem is ignored, the mean score achieved was 72 in the "High" category. The answer to question number 5 indicators identifies

the problem causing factors; the mean score achieved was 40 in the "Low" category. The answers to questions number 6 and 7 indicators look for solutions, the mean score achieved was 32.5 in the "Low" category. The answer to question number 8 is an indicator of making decisions; the mean score achieved was 37 in the "Low" category. And the answers to questions number 9 and 10 indicators of carrying out problem solving actions; the mean score achieved was 30.5 in the "Low" category. With a mean score percentage obtained from 41.95 student answers, they were in the "Moderate" category.

Based on the short version of the SPSI-R questionnaire, the results showed that the Positive Problem Orientation (PPO) dimension is in the "High" category with an average dimension score of 70.41. In the Negative Problem Orientation (NPO) dimension in the "Moderate" category with a mean dimension score of 40.81. Then, the Rational Problem-Solving (RPS) dimension is in the "High" category with a mean dimension score of 66.35. The Impulsivity/Carelessness Style (ICS) dimension is in the "Low" category with a mean dimension score of 70.54. And the Avoidance Style (US) dimension is in the "Moderate" category with an average dimension score of 48.11.

Based on the presentation of these results, it can be seen that of the six indicators of social problem solving abilities that are expected to appear in the students seen from the observations, there are 3 indicators that show the "Low" category. Then, from the 6 indicators seen from the essay test results, there is 1 indicator that is in the "High" category, while the other 5 indicators are in the "Low" category. And of the 5 dimensions of solving social problems based on the short version of the SPSI-R questionnaire, 2 dimensions of PPO and RPS are in the "High" category, 2 dimensions of NPO and AS show the "Moderat" category. Meanwhile, the ICS dimension is still in the "Low" category.

### **CONCLUSION**

The ability to solve social problems is the student's ability to feel the turmoil of problems, how to consider approaches to problem solving, apply by choosing approaches to problem solving strategies, and reach solutions that can be accounted for in an accountable manner. The indicators used to measure the initial ability to solve social problems of the elementary school students are: (1) Able to find problems, (2) Predict the consequences if the problem is ignored, (3) Identify factors causing

problems, (4) Able to find solutions, (5) Able to make decisions, (6) Able to perform problem solving actions. After conducting a preliminary study, the method used by the teacher is monotonous without using a learning model, students are not accustomed to solving the problems they face. Based on the results of observations, three indicators show that they are in the "Low" category, with an average gain of 37.5 being in the "Low" category. Based on the results of the essay test, there are five indicators indicating the "Low" category with an average score of 41.95 in the "Moderate" category. And based on the results of the short version of the SPSI-R questionnaire, there is one dimension of ICS which shows the low category with a score of 70.54. This proves that the initial ability to solve social problems of students in one of the State Elementary Schools in Cipongkor District, West Bandung Regency is still relatively "Low".

The authors suggest that further researchers conduct research on the implementation of learning models or methods that can improve students' social problem solving abilities as a follow-up to the preliminary study conducted by the authors.

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