

THE EFFECTIVENESS OF ELEMENTARY SCHOOL LEARNING MATERIAL

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THE EFFECTIVENESS OF ELEMENTARY SCHOOL LEARNING MATERIAL BASED ON SOUTH KALIMANTAN LOCAL WISDOM TO INCREASE STUDENTS HIGH ORDER THINKING SKILLS AND GAWI MANUNTING CHARACTER

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Abstract

Local wisdom is an essential element incorporated into the learning process, and local wisdom characters must develop on learning activity, like gawi manuntung character. And also high order thinking skills must be developed in the young generation, such as critical thinking, creative thinking, and problem-solving skills. According to the 2019 Programme for International Student Assessment (PISA), Indonesia ranked 68 out of 74 countries with an average score of 396 in science ability and 379 in mathematic ability. Besides that, according to observation and interviews with 425 elementary school teachers in South Borneo Indonesia, less than 20% of teachers design learning material based on high-order thinking skills and gawi manuntung character. High-order thinking skills consist of critical thinking, creative thinking, and problem-solving skills. Gawi manuntung character consists of discipline, hard work, and responsible. It is because there are no learning materials in the elementary school learning process which contain South Kalimantan local wisdom and high order thinking skills activity. Therefore, it is necessary to develop an elementary school learning material based on South Kalimantan local wisdom and high order thinking skills activity. The objective of this research is to produce products in the form of learning material based on South Kalimantan local wisdom that is feasible and effective based on the validity, practicality, effectiveness of learning material, and achievement of high order thinking skills and gawi manuntung character.

This research is a research and development which refers to the 4D model (define, design, develop and disseminate). The subjects include 50 students of fifth grade elementary school in Banjarmasin South Kalimantan Indonesia. Data were obtained through the validation sheet of learning material, questionnaire, the test of high order thinking skills, and the sheet of character assessment.

The research results showed that: (1) the validity category of the learning material was very good; (2) the practicality category of the learning material was very practical, (3) the effectiveness category of the learning material was very effective, (4) the achievement of high order thinking skills was very good, and (5) the achievement of gawi manuntung characters was very good.

In conclusion, the elementary school learning materials based on South Kalimantan local wisdom are feasible and effective to be used in learning activities, can increase students high order thinking skills and gawi manuntung character.

Keywords: Learning material, local wisdom, high order thinking skills, gawi manuntung character, elementary school.

1 INTRODUCTION

Human resources in the era of society 5.0 must have the ability to face challenges, including the ability to process information, think critically, communicate and work together. In addition to these abilities, there are four basic skills that students must master in facing future challenges, namely Critical Thinking, Creativity, Communication, Collaboration [1]–[7]. In more detail, the skills needed by students in dealing with life and the world of work, in the society 5.0, the emphasis is on the following skills: critical, creative and innovative thinking skills, problem-solving, collaboration and leadership; adaptability, initiative, entrepreneurial spirit, able to communicate effectively both orally and in writing, able to access and analyze information, have curiosity and imagination [2], [6], [15]–[17], [7]–[14].

Based on the demand for skills that the younger generation must possess in the era of society 5.0, it is time for the learning process to be directed at training thinking skills expected by human resources in

the future. The first thinking skill is critical thinking (Critical Thinking) can help students think rationally in overcoming problems and finding alternative solutions, so critical thinking skills need to be trained since elementary school education [1], [3], [4], [18], [19]. Another important skill for the young generation to have is creative thinking. Someone creative will be able to innovate through the development of broad ideas and express opinions and new findings to solve problems in social life, have high curiosity to find the truth of an opinion, and even make students able to be open and responsive to different perspectives. Skills that support critical and creative thinking are problem-solving. Problem-solving activities allow students to have in-depth analysis skills of a problem around their lives and then solve it through rational and acceptable solutions to logical thinking. Another thinking skill that needs to be developed in students is logical thinking skills. Logical thinking skills will help students in solving problems coherently. By thinking logically, students are also able to provide arguments for solving the problems they present, and they are also able to present appropriate conclusions. Thinking skills that are no less important are analytical thinking skills. Analytical thinking skills are also seen as thinking skills that can help students when asked where and how a result is obtained and concluded so that analytical thinking skills can help students survive in the information age and globalization [1], [3], [4], [18], [19].

The need to develop teaching materials to facilitate the learning process-oriented critical, creative, logical and analytical thinking skills is supported by observations and interviews conducted from 10 to 26 December 2021 with 425 teachers in South Kalimantan. Observation results show that 71.23% of respondents do not know how the concepts and achievements of higher-order thinking skills are critical thinking skills, creativity, logical thinking and problem-solving. 82.35% of respondents have never packaged learning by integrating critical thinking skills, creativity, logical thinking and problem solving based on local wisdom and the character of Gawi Manuntung. The cause of the fact that happened is that teachers have never been provided with in-depth knowledge of higher-order thinking skills in the era of society 5.0, and there are no local wisdom-based teaching materials that lead to community skills 5.0 and the gawi manuntung character that makes it easier for teachers to carry out the learning process expected in the era of society 5.0.

Another fact is shown by the results of the 2015 PISA (Program for International Student Assessment) study showing the achievements of Indonesian children, who are only ranked 69th out of 72 countries. This result is supported by the TIMSS (Trends in International Mathematics and Science Study) study of Indonesian students, ranked 36 out of 49 countries in scientific thinking skills. The achievements shown by these two international assessment institutions should be of concern to all parties involved in education. The achievement that is still a concern is also shown by the Human Development Index (HDI) assessment results that Indonesia is in the 116th position out of 189 countries. Various assessments that place Indonesia at the lower middle level must immediately find the causes and solutions that are implemented in short to long term.

Based on the observations of textbooks taught in elementary schools in South Kalimantan from December 14 to 30, 2021, the textbooks used did not contain content that leads to training students who have community skills 5.0. Learning activities have not been able to develop critical thinking skills, creative, logical, opinion analysis, original thinking and application skills. Teachers have not been equipped with in-depth knowledge about packaging teaching materials containing skills in the 5.0 era of society, so the teaching materials used only rely on teacher books and student books sold in the market. Coupled with the learning process without using a learning model that integrates community skills development 5.0. It is exacerbated by the fact that some teachers have an inaccurate perception of the books provided by the government. Some teachers consider the book as the only source of learning and do not take the initiative to find or add material from other sources.

If this condition is not corrected, it will result in low learners' of society 5.0 skills and Gawi Manuntung character. Developing society 5.0 skills and gawi manuntung character will require innovation of learning material based on local wisdom and containing the activity based on society 5.0 skills and gawi manuntung character. Learning material based on local wisdom was developed as the thematic textbooks in fifth-grade class. The extent to which this innovation will realise that textbooks contain local wisdom that can use globally by introducing local wisdom to each region. The objective of this study was (1) to know the validity category of the learning material product, to know the practicality category of the learning material product, and (2) to know the effectiveness of the learning material in increasing high order thinking skills and gawi manuntung characters.

2 METHODOLOGY

Based on the problem to be solved, the researcher uses the research and development (R & D) method or in education with the 4-D model, consisting of define, design, develop, and disseminate. And used the classroom action research to know the increase of students' society 5.0 skills with five cycles that involve planning learning activities, implementing learning models, observing, and reflecting on learning. The subjects include 50 students of fifth grade Sungai Miai 2 Banjarmasin elementary school South Kalimantan Indonesia. The method of this study is described as follows :

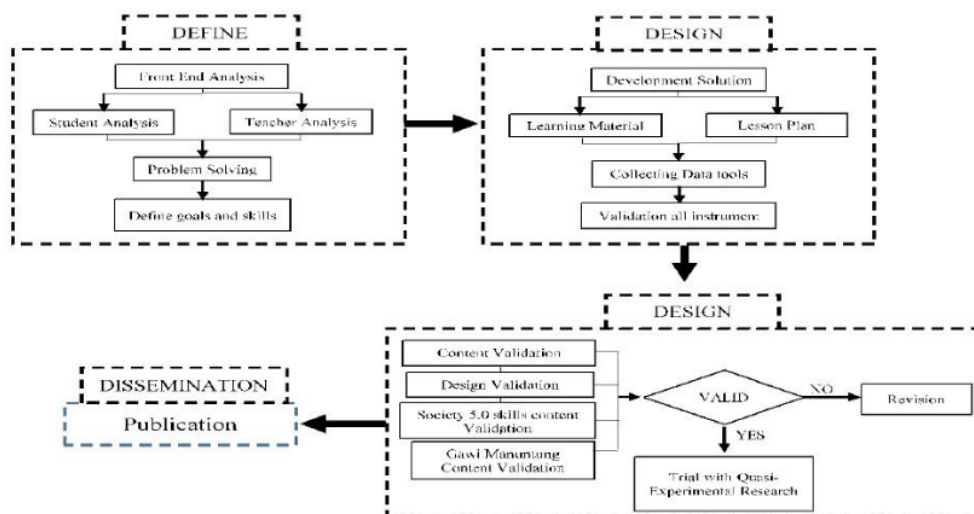


Figure 1. Research and Development Design.

The define stage was carried out to find out the learning model used in several schools in Banjarmasin during the Covid-19 pandemic with the following stages: front end analysis, digging information on the learning model used in several elementary schools in South Kalimantan, skills developed in the learning model that has been used and the need for the development of learning models to meet the needs of today's society. Student analysis (learner analysis) explores information on student activities using learning materials and students' society 5.0 skills and gawi manuntung characters (discipline, responsibility and hard work). Teacher analysis, teacher's role in controlling learning, teacher knowledge about society 5.0 skills and gawi manuntung character, development of students' society 5.0 skills, development of students' gawi manuntung character, teacher's difficulties in developing student skills, teacher skills on making learning material based on local wisdom and integrating society 5.0 skills and gawi manuntung character, obstacles when making learning material. Analysis of society 5.0 skills and gawi manuntung character development, learning material that has been used, evaluation procedures in the learning process whether it contains society 5.0 skills and gawi manuntung characters. Formulating learning objectives, determining learning objectives oriented to the development of society 5.0 skills, and determining how to develop each item of gawi manuntung character.

The design stage begins with the preparation of the skills to be developed. The preparation of this skill is based on the analysis that has been done previously. After knowing the priority skills to be developed in elementary schools, the researchers prepared learning material content based on society 5.0 skills and gawi manuntung character. The researchers design the learning activity on the learning material oriented to develop every indicator of society 5.0 skills and gawi manuntung characters. The learning material design also contains local wisdom of south Kalimantan, such as text, pictures, video, and every illustration of the content.

The next stage is develop. The researcher is studying the basic information about the learning process during the covid-19 pandemic in elementary school, principles, concepts, literature, and related research to create the learning material. In this phase, the researcher develops the learning material, including the content, design of illustration, learning activity, students' group worksheet, learning evaluation and

learning project. Creation of research tools and assessment forms for learning activities, students' society 5.0 skills and gawi manuntung character.

Before Learning material is valid if there is a match between the guidance of the preparation of learning material and constructed instructional material. The suitability of the learning material with the guidelines was calculated using the equation :

$$\text{validation percentage} = \frac{X}{X_{max}} \times 100\%$$

Where are X = the total of the obtained scores and X_{max} = maximum score.

Before the teaching materials are used in the trial process, the teaching materials are reviewed by experts consisting of content experts and design experts. They will validate the learning materials until they are declared eligible for testing. Compared the validation result with the validation criteria of the learning material. Table 1 shows the validation criteria for learning material:

Table 1. Validity Criteria of Learning Material.

No.	Average Value	Category
1	80% - 100%	Highly Validity
2	65% - 79%	Valid
3	55% - 64%	Less Valid
4	<55%	Nor Valid

After being declared valid by the experts, the teaching materials will be tested for practicality to get valuable teaching materials for use by teachers and students. Analyzed the practicality of the learning material through student responses to the questionnaire. The practicality of learning material included three aspects: ease of use, benefit and efficiency of learning time. Table 2 shows the practicality criteria of learning material:

Table 2. Practicality Criteria of Learning Material.

No.	Interval	Category
1	$X > 3,25$	Very practical
2	$2,50 < X \leq 3,25$	Practical
3	$1,75 < X \leq 2,50$	Fairly practical
4	$X \leq 1,75$	Less practical

Analyzed the effectiveness of the learning material based on the scores from the test of learning outcomes through pretest and posttest. The analysis was performed using the normalized gain (N-gain) equation:

$$g = \frac{\%Sf - \%Si}{100 - \%Si}$$

Where are Sf = score from posttest and Si = score from pretest.

Compared the analysis result of the learning result test was with the effectiveness criteria of the learning material. Table 3 shows the effectiveness criteria of learning material.

Table 3. Effectiveness Criteria of Learning Material.

No.	Interval	Category
1	$g \geq 0,7$	Very effective
2	$0,3 < g \leq 0,6$	Moderate / effective
3	$g \leq 0,3$	Low/less effective

Conducted the analysis of society 5.0 skills and gawi manuntung character using the average scores obtained from the observation sheets during the learning process. Table 4 shows the students' achievement criteria.

Table 4. The Criteria of the Achievement of Student Skills and Character.

No.	Interval	Category
1	$X > 3,25$	Very good
2	$2,50 < X \leq 3,25$	Good
3	$1,75 < X \leq 2,50$	Fair
4	$X \leq 1,75$	Poor

Undertook the feasibility test of the product was to know the level of worthiness. Based on deficiencies in test results, researchers revised the areas that were still less deserving, resulting in a viable product to be used. Did the design of the product test to get the data that would be used to know the deficiencies of the product that developed, and it will be the revision of the product. The purpose of the test is to know the appropriateness and effectiveness of the textbook. Can find a phase of the trials of this product in the following images :

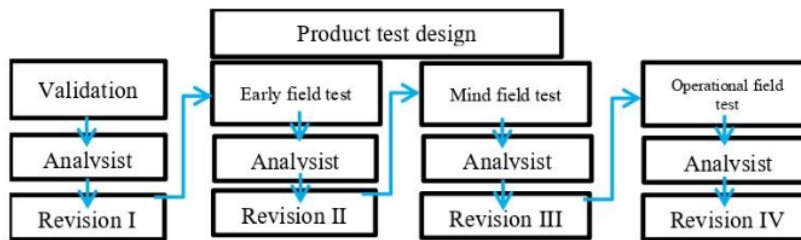


Figure 2. Product test design.

The stages under are the validation of materials experts, media experts, and book designers; Early trial (limited trial) It was done in the fifth grade Sungai Miai 2 elementary school by using the design One-Shot Case Study, a group of students is given the treatment which one team is not given treatment, and Test results will be observed.

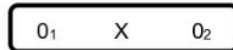


Figure 3. One-group pretest-posttest Design.

X = Treatment is studying uses a textbook, O₁ = pretest score, O₂ = posttest score

The trials of open field operations were used in two schools: one school for experiment class (EC) is Sungai Miai 2 elementary school, and one school for control class (CC) is Karang Mekar 1 elementary school Banjarmasin. Randomly selected those two schools based on regional samples. The operational trial uses the quasi-experiment method with the nonequivalent control group design. In a nonequivalent control group design, experimental and control groups are chosen randomly. Design nonequivalent control group design almost the same as pretest-posttest control group design, which can modify in the following images:

Experiment class	Pretest O ₁	Treatment X ₁	Posttest O ₂
Control class	Pretest O ₃	Treatment X ₂	Posttest O ₄

Figure 4. Nonequivalent Control Group Design.

O₁ = The initial aptitude test of an experiment class, O₂ = Final test the ability of the experiment class, X₁ = learning using teaching material the results of development, X₂ = learning using plain text teaching materials, O₃ = An early control class test, O₄ = Final control class test.

The test subjects in this research and development used validators: one content expert and a design expert. Early field trials use six students from fifth grade Sungai Miai 2 elementary school. The field operations test involves two elementary schools there are Sungai Miai 2 elementary school have been 25 students, and Karang Mekar 1 elementary school have been 25 students.

3 RESULTS

3.1 Product of Research and Development

The researchers design the learning material with explanations that both teachers and students can use to prepare what will be found in the learning process. After that, the researchers design the content with Activities that society 5.0 skills. The researchers made the preparation of learning material content based on society 5.0 skills and gawi manuntung character. The researchers design the learning activity on the learning material oriented to develop every indicator of society 5.0 skills and gawi manuntung characters. The learning material design also contains local wisdom of south Kalimantan, such as text, pictures, video, and every illustration of the content. Researchers design the content and learning activity on the learning material to guide students in developing their skills and character. In the activity on learning material, students are invited to observe and absorb information in a text equipped with various data and realities in everyday life. In this section, students will reveal various facts associated with the experiences of their daily lives. Students are asked to apply what is in the teaching material to their daily lives, dig at what problems are available in information, and dig at solutions to the problems. In other words, this critical thinking skill consists of extracting information by locating veracity or facts, producing interpretation, analysis, evaluation, inference, and exposure using evidence and setting the best criteria for making decisions. The thought activity contains the ability of the student to give several different ideas or ideas by using the imagination based on rational concepts.

3.2 Validation of Learning Material

The analysis of the validation of learning material analysis results based on the content aspects is shown in Table 5. Validation results from the content aspect showed a high validity category with a percentage of 85. It indicates that there was the conformity of the content of the learning material based on local wisdom integrating with society 5.0 skills and gawi manuntung character development with the guidance of the preparation of learning material, so the learning material is valid to be used. The reliability coefficient was 0.71 and categorized as the high index. It shows that validator was objective in filling the module validation sheet to obtain good reliability.

Table 5. Validation result of the content of learning material.

Assesment Aspect	Score	Category
Content Quality	3,80	Very Good
Organization	4,00	Very Good
Language	4,00	Very Good
Evaluation	3,40	Good
Validity	85%	High validity
Reliability	0,71	High

The learning material validation analysis result based on the design aspects is shown in Table 6. The validation result of the learning material design showed a very valid category with a percentage of 87.50. It shows that the appearance of the learning material based on local wisdom integrating with society 5.0 skills and gawi manuntung character development has been following the guidance of preparation on aspects of consistency, format, attractiveness, shape and size of letters, and linguistics. The reliability coefficient of learning material was 0.76, with a high category. It also shows that both validators filled out validation sheets objectively.

Table 6. Validation result of the design of learning material.

Assesment Aspect	Score	Category
Consistency	3,70	Very Good
Format	4,00	Very Good
Attractive appeal	4,00	Very Good
Font type and size	3,60	Very Good
Language	3,80	Very Good
Validity	87,50%	High validity
Reliability	0,76	High

Based on the validation results of content and display aspects, found high validity category and high reliability. This validation indicates that the developed learning material is valid and reliable for use. Learning material based on local wisdom integrating with society 5.0 skills and gawi manuntung character development is valid in terms of content, and the material in the textbook follows the purpose of learning. In terms of construct, the precision of the learning material is used in the learning and the use of the language in the learning material following the General Guidelines for Indonesian Spelling (PUEBI). In addition, learning material in the form of textbook is designed for self-learning systems with a whole and systematic learning program, based on local wisdom integrating with society 5.0 skills and gawi manuntung character development; contains objectives, material/activities, group worksheet, and evaluation; is presented in communicative, two-way form; can replace some teachers' roles; focused and measurable discussion coverage; concerned with users' learning activities.

3.3 The Practicality of The Learning Material

The practicality of learning material measured included three indicators: ease of use, benefits, and efficiency of learning time. Table 7 shows the results of the analysis of the practicality of learning material. The result of the practicality analysis revealed a very practical category with an average value of 3.71. It shows that the learning material is used practically by students. Learning material in the form of a module is said to be practical if the implementation is easy and in a relatively short time.

Table 7. Analysis Result of the Practicality of the Learning Material.

No	Indicator	Score	Category
1	Ease of use	3,68	Very Practical
2	Benefits	3,77	Very Practical
3	Efficiency of learning time	3,69	Very Practical
	Mean	3,71	Very Practical

3.4 The Effectiveness of The Learning Material

Analyzed the effectiveness of learning material based on students' learning result test scores. Table 8 shows the effectiveness of the learning material that has been developed. The analysis based on the normalized gain (N-gain) test showed $\langle g \rangle$ value of 0.72 with a very effective category. Based on these results, more than 70% of students can achieve the value of the standard score that the school has established. It shows that the learning material developed is effectively used in the learning process. Learning outcomes are said to be effective if the number of students who reach the standard score is at least 70% after using the developed learning module.

Table 8. The Effectiveness of the Learning Material.

Indicator	Mean of pretest	Mean of posttest	N-gain	Category
Society 5.0 skills	45,5	88,5	0,72	Very Effective
Gawi manuntung character	52,5	90,5	0,78	Very Effective

3.5 The Achievement of Students Society 5.0 Skills and Gawi Manuntung Character

The results of the field operations test took place at Sungai Miai 2 elementary school and Karang Mekar 1 elementary school. As a class on experimentation sungai miai 2 elementary schools with the test subjects of 25 students. The control class is Karang Mekar 1 elementary school with a test subject of 25 students. The trials of field operations are conducted for eight sessions. The purpose of field operations trials is to implement revised learning material products on previous trials and to test the effectiveness of textbooks based on local wisdom to increase students' society 5.0 skills (critical thinking, creative thinking and innovation, logical thinking, analytical thinking, problem-solving, collaboration and social skills) and gawi manuntung character. The data at the field operational trials included the results of society 5.0 skills and gawi manuntung character (discipline, responsibility, and work hard) test through the students' and teacher response questionnaires. The following are the results of the test and posttest students for the experimental class:

Table 9. Student's Society 5.0 Skills and Gawi Manuntung Character After Study.

Skills and Character	Result		
	X	SD	Competency Level
Critical Thinking	3,68	.48	Very Good
Creative Thinking and Innovation	3,69	.49	Very Good
Logical Thinking	3,71	.54	Very Good
Analytical Thinking	3,66	.46	Very Good
Problem Solving	3,78	.59	Very Good
collaboration	3,71	.54	Very Good
social skills	3,78	.59	Very Good
Decipline	3,88	.58	Very Good
Responsibility	3,78	.59	Very Good
Work hard	3,71	.54	Very Good
Average	3,738	.54	Very Good

Table 10. N Gain Analysis the operational test on six meetings.

Society 5.0 skills	items	Pretest		Posttest		t	P*
		X1	SD.1	X2	SD.2		
Critical Thinking	8	3,57	.999	6,78	.891	-15.434	.000
Creative Thinking and Innovation	9	3,64	.532	6,34	.752	-15.832	.000
Logical Thinking	8	3,65	.679	6,78	.712	14.102	.000
Analytical Thinking	8	3,55	.465	6,45	.794	-17.954	.000
Problem Solving	9	3,57	.588	5,45	.712	-14.699	.000
collaboration	8	3,65	.679	6,78	.712	14.102	.000
social skills	9	3,57	.588	5,45	.712	-14.699	.000
Decipline	8	3,65	.679	6,78	.712	14.102	.000
Responsibility	8	3,55	.465	6,45	.794	-17.954	.000
Work hard	9	3,77	.588	6,45	.712	-14.699	.000
Average Score	84	3,61		6,37		-958	.000

3.6 Discussion

The teaching materials that are packaged based on the development of community skills 5.0 and the gawi manuntung character are ideas for overcoming learning problems. Even though this country is still in a state of a virus outbreak, learning in schools cannot be sacrificed. The learning process must continue, either in knowledge transfer or skill development. Teaching materials that are packaged innovatively following the demands of the 5.0 era of society are an alternative solution to develop student skills even though learning is only carried out from home. It is in line with the results of research by Noorhapizah and Agusta that the learning process must run optimally even though conditions require teachers and students to interact online from their respective homes [6], [20]. Teaching materials that are packaged based on local wisdom and integrate activities that develop community skills 5.0 and the gawi manuntung character are also an alternative solution for developing student skills that teachers can use as a reference because according to research by Noorhapizah, Agusta and Pratiwi (2020) most teachers still do not master the concept of skills that must develop in elementary school students and have not been able to package learning containing these skills [20].

The development of these teaching materials is also based on the demand to produce elementary school graduates who can think at a high level in society 5.0, which consists of critical thinking, creative and innovative thinking, logical thinking, analytical thinking, problem-solving, social skills and collaboration. Critical thinking skills impact students' ability to think deeply and consider various solutions to a problem to produce fast, precise and accurate solutions [1], [3], [4], [18], [19]. While students who are accustomed to being trained to think creatively will have the speed and accuracy in solving problems and get used to arguing or communicating with various points of view according to the context of the problem [1], [3], [4], [18], [19].

In addition, the importance of problem-solving skills is a strong foundation for the research team to package teaching materials based on local wisdom and integrate activities that develop community skills 5.0, learning activities in teaching materials that develop critical thinking skills are Group activities, Analysis and observation, Wondering observation result, Intensive data collection, Making experiment on outdoor, Analysis of the result, Negotiation of solution, Using Technology, Necessity intelligences development, Task Product Creation, Unity on presentation and role play, Network Tournament and Games, accompanied by learning content with local activities in Kalimantan south and contains various problems in everyday life.

This teaching material is also designed by presenting activities that train logical and analytical thinking skills, and students are allowed to present arguments based on the results of the analysis of problems that occur around their environment then, students are allowed to present arguments based on the results of their logical thinking. This activity step is in line with previous research, which states that community skills 5.0 can be developed by asking questions or allowing students to make questions from observations [1]–[7], provide opportunities for students to explore problems that are happening from the results of observations [1]–[7], open students' horizons using concrete and various objects using the surrounding environment as an object of observation [1]–[7], and involve students providing arguments to answer various questions [6]–[11].

Each activity in this teaching material is designed to develop soft and social skills that are interrelated in every learning step. The activity starts with the group. In this step, students will listen to the teacher's explanation using audio, and the teacher will also build students' initial knowledge using video, which aims to provide more concrete knowledge to students. Students will be invited to observe objects related to the learning topic. Then the teacher will provoke students to ask questions about the previously observed object. The teacher allows students to answer questions and provide arguments, and the teacher will also provide opportunities for students to provide answers to other students' questions so that various answers appear. Students are trained to present answers in logical facts based on the material discussed. This activity will provide opportunities for students to evaluate the various ideas given to distinguish between relevant and irrelevant arguments until finally allowing all students to conclude ideas [6]–[11].

This textbook is also equipped with an Analysis activity. In this activity, the teacher will provide learning content that is more specific to exploring environmental issues associated with the South Kalimantan area. Students will be asked to analyze what will happen if the problem is left unchecked. Then students and groups will discuss the best solution for the problem being discussed. Furthermore, the teacher will direct students to analyze what will happen if the solution is applied. Analytical activities are equipped with worksheets that will guide students to express their opinions and reasoning on the solutions. This activity allows students in groups to organize their learning experiences to find material concepts based

on the problems posed by the teacher until finally formulating the results of reasoning based on their daily experiences or the experiences of the people around them [6]–[13].

The activity also focuses on growing students' analytical thinking skills because the activities are packaged through activities to explore environmental issues, package action strategies to overcome environmental issues, act on environmental issues and have good personality attitudes. The teacher will train the students to have problem-solving skills by knowing the problems that are happening in detail. Organizing data and selecting relevant information in problem-solving, selecting appropriate approaches and methods, developing problem-solving strategies and making it possible to solve problems differently from other groups. This activity will also hone students' communication skills through giving and receiving information, conveying opinions or arguments in groups, responding to statements from friends in groups during discussions, explaining what will and has been done in groups, and receiving information provided by group friends properly and give a positive response even though there are differences of opinion This activity will also train students' independence in learning so that they grow self-confidence, are active in learning, discipline and take responsibility [6], [7], [9]–[13], [21], [22].

The activity continued with solving the problem outdoor. The teacher will direct students to do physical activities that will train students to test reasoning results about the solutions given with friends in groups. The physical activity contains exploration activities of things that can find in the environment around children. The group will investigate critically, systematically, and logically so that they can formulate their findings with confidence. The teacher will explain the Google Meet or Zoom Meeting application so that all students can listen to the detailed instructions from the teacher. This activity also has the potential to develop a gawi manuntung character in the form of decisiveness, work hard, and responsibility. Students in the group can package action strategies to overcome environmental issues and implement material learning solutions. This activity also has the potential to train problem-solving skills that focus on skills in organizing data and selecting relevant information in problem-solving, implementing appropriate problem-solving approaches and methods [2], [6], [15]–[17], [7]–[14].

4 CONCLUSIONS

Based on the results of the study and discussion, we can conclude that: (1) the validity category of the learning material was very good; (2) the practicality category of the learning material was very practical, (3) the effectiveness category of the learning material was very effective, (4) the achievement of high order thinking skills was very good, and (5) the achievement of gawi manuntung characters was very good. The elementary school learning materials based on South Kalimantan local wisdom are feasible and effective to be used in learning activities, can increase students' society 5.0 skills and gawi manuntung character.

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