

Needs Analysis of Digital Learning Media Development in Middle School Social Studies Learning in Singaraja, Indonesia

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Abstract. This study aims to analyze the needs of developing digital learning media in Social Science learning in Junior High Schools in Singaraja City. This study used qualitative research methods. The subjects of this study were Junior High Schools in Singaraja City, Junior High School Social Science teachers and Junior High School students in Singaraja City. Data collection techniques using document studies, interviews and observations. Data analysis used qualitative data analysis. The results of data analysis show that the types of digital media used by science teachers are powerpoint, concept maps, pictures, and globes. Not many Junior High School Social Science teachers in Singaraja City are able to develop learning media independently. Meanwhile, the needs analysis shows that the development of digital learning media in Social Science learning in Junior High Schools in Singaraja City is very much needed by both teachers and students. First, Junior High School Social Science teachers in Singaraja City have not been able to develop digital learning media independently. Second, Social Science teachers in Singaraja City mostly only use available learning media, which are not necessarily relevant to students' learning needs. Third, students are more enthusiastic in using learning media made by the teacher together with students. Fourth, digitalization in the learning process is a necessity that requires teachers and students to collaboratively develop learning media.

Keywords: needs analysis, learning media, digital.

1. Introduction

Learning media as intermediaries to simplify and clarify teaching materials will determine the success of the learning process[1]. In this context, the teacher's ability is needed to select and package learning media so that they are in line with learning objectives and learning materials. Through learning media the teacher can help students simplify abstract material into concrete, the distant becomes close, the less interesting becomes interesting, the unidirectional becomes multi-directional, the diverse becomes uniform, the old becomes few and the virtual becomes real, making it easier for students to learn. to understand facts, data, concepts or theories to be transformed in learning[2]. Learning media is the key to success in carrying out the learning process and achieving learning objectives in a fun way. For that, learning media are packaged in such a way, so that they become interesting, invite attention,

make curious, exhilarating and build the desire of students to be involved in learning activities [3].

Effective media are media that are able to convey messages in accordance with the goals of the sender of the message. In the context of learning, teaching materials are the substance of the message that the teacher wants to convey to students[4]. Learning objectives are indicators of success that can be measured based on mastery of the concepts, attitudes and skills of students after learning takes place [5]. Learning objectives are the specifications of the success indicators of a learning media in the learning process. If all students have mastered the concepts, attitudes and skills as determined according to the minimum completeness criteria, it can be said that the learning media used by the teacher is effective. Although it is undeniable, the success of learning is due to various factors that influence each other [6,7]. However, the contribution of learning media as an intermediary that facilitates and clarifies the learning material delivered by the teacher also contributes positively to student learning outcomes. The effectiveness of learning media can also be assessed based on the similarity of students' views on media content and the attractiveness of the media on students' learning motivation. The purpose of using instructional media is to make it easier for students to understand the teaching material to be presented in the learning process by the teacher [8,9]. Through learning media the basic competencies to be achieved in learning are more easily realized. Learning media is useful for facilitating materials, learning activities, concepts, communication, time, place, intelligence, and explanations. Various learning materials with learning media can be understood uniformly by students, the learning process that is boring and less interesting becomes fun learning, abstract concepts through learning media become concrete, one-way communication through learning media becomes multi-faceted. direction, the time that tends to be long with learning media becomes shorter, learning that was initially only carried out in the classroom with learning media can be carried out in various places, abilities that focus on intellectuals become abilities that are multi-intelligent, and repeated explanations with media learning becomes simpler[10].

2. Methods

This needs analysis phase research uses qualitative research methods, namely the process of describing the learning media used by Social Science teachers and the needs of learning media in learning Social Sciences at Junior High Schools in Singaraja City [11]. Research activities were carried out at 6 (six) Junior High Schools in Singaraja City, namely State Junior High School 1 Singaraja, State Junior High School 2 Singaraja, State Junior High School 3 Singaraja, State Junior High School 6 Singaraja, Mutiara Junior High School Singaraja and Singaraja Laboratory Junior High School. Research informants were all Social Science teachers in Singaraja City, Principals of Junior High Schools in Singaraja City and junior high school students in Singaraja City who were determined by purposive sampling [12]. The data collection technique was carried out by observation, interviews and documentation studies with observation guide instruments, interview guidelines and documentation study sheets. The data analysis technique used in this study is a qualitative data analysis technique that begins with data collection, data reduction, data presentation and conclusion drawing [13]. At the data collection stage, literature studies and empirical studies were carried out to obtain data about the learning media used and the learning media needed. Meanwhile, the data reduction stage is carried out by sorting and selecting the collected data, so that it is in accordance with the needs of the research problem. The data that has been

sorted is then presented in an orderly and structured manner to be used as a conclusion. This process is circular until the end of the research activity [14,15].

3. Result and Discussion

The results of data analysis show that not all Social Science teachers in Singaraja City use digital learning media in carrying out the learning process. There are several rationales related to the non-use of digital learning media in social science learning by teachers. First, the teachers claimed to be accustomed to implementing Social Science learning, so they did not need learning media in delivering the material. Teachers are more comfortable delivering material directly to students. If the material is considered important and difficult for students to understand, the teacher writes a concept map to make it easier for students to understand the material presented [16]. In fact, teachers admit that by simply explaining and concept maps written directly on the blackboard, students can understand well. Second, some teachers admit that they do not have adequate skills in developing learning media, especially learning media that are multi-media. Learning media that are multi-media, are learning media that involve images, text and visualizations that can be heard, seen and felt by students.

Learning media that are multi-media are able to stimulate students' higher-order thinking skills through the messages conveyed [17]. Meanwhile, Junior High School Social Science teachers in Singaraja City only have the ability to develop textual learning media, such as power points. While the ability to develop learning videos, combine and package powerpoints and images into learning videos has not been able to be done. Third, digitalization in education provides abundant learning resources for teachers, including Social Science teachers in Singaraja City. The availability of learning resources in various search engines such as YouTube, Google, Google Schoolers and others causes teachers to be lazy to develop learning media [18]. If the teacher is going to teach, it will automatically use the media that has been provided on various search engines, although it is often less relevant to the material to be delivered.

On the other hand, this condition causes students to be less involved in the learning process, especially in the manufacture and development of learning media. As a result, students become lazy to study and have implications for student achievement in Social Sciences. Fourth, the teacher assesses the learning media as something that is not essential in the learning process. The teacher prioritizes the expository presentation of Social Science material according to the teacher's understanding. In fact, it is not uncommon for students to judge learning Social Sciences as a pseudo-imaginary, because of the lack of visualization media that can translate students' thoughts into something empirical [19]. Furthermore Social Science learning becomes boring and less challenging for students. Schematically rational Social Science teachers do not use learning media can be described as follows:

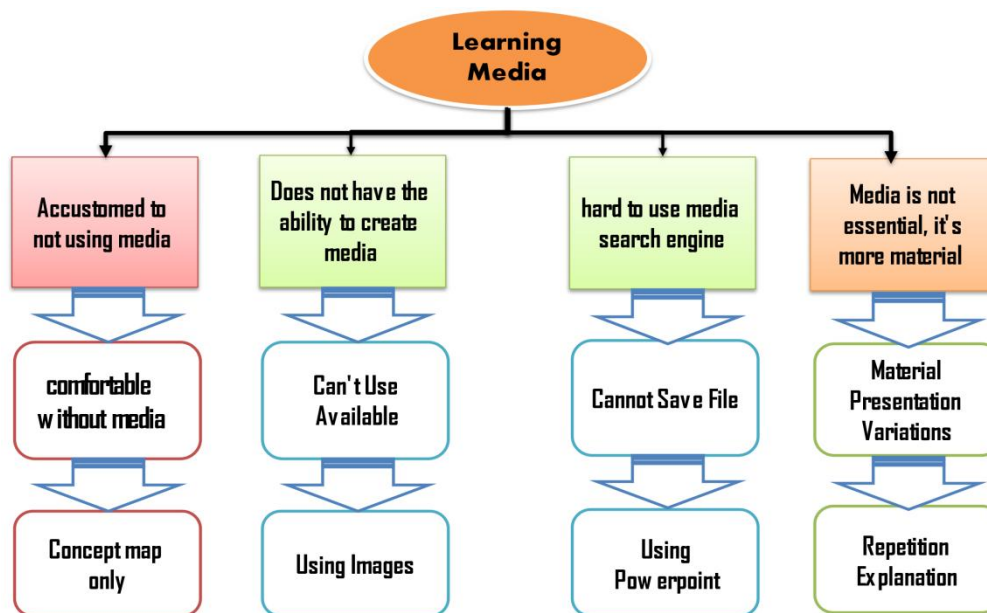


Figure 1. Rational Social Science Teachers Do Not Use Learning Media in the Learning Process

Most of the Social Science teachers in Singaraja City admitted to using learning media in carrying out the learning process. The teachers admitted that it was easier to carry out the learning process by using learning media. This is in line with the thoughts of Sanjaya [20], which states that the use of learning media is to make it easier for students to understand the teaching material to be presented in the learning process by the teacher. Through learning media the basic competencies to be achieved in learning are more easily realized. Learning media is useful for facilitating materials, learning activities, concepts, communication, time, place, intelligence, and explanations. Various learning materials with learning media can be understood uniformly by students, the learning process that is boring and less interesting becomes fun learning, abstract concepts through learning media become concrete, one-way communication through learning media becomes multi-faceted. direction, the time that tends to be long with learning media becomes shorter, learning that was initially only carried out in the classroom with learning media can be carried out in various places, abilities that focus on intellectuals become abilities that are multi-intelligent, and repeated explanations with media learning becomes simpler [21].

Digital learning media used by Junior High School Social Science teachers in Singaraja City so far are powerpoint, pictures, globes, concept maps, videos, caricatures and concept maps. This learning media was developed by the teacher by first analyzing the subject matter, learning objectives, learning models, learning media, availability of infrastructure and student characteristics. This analysis process will provide an overview of what learning media are suitable for use, the breadth and depth of the material in the media, and the appearance of the media. Making this media also does not involve students in the process, so it is not uncommon when used in learning it is difficult to understand [22,23]. The process of involving colleagues as practitioner validators was also not carried out, because it was

considered relevant for use. Schematically the analysis process in the development of learning media by Social Science teachers at Junior High School in Singaraja City and the learning media used can be described as follows:

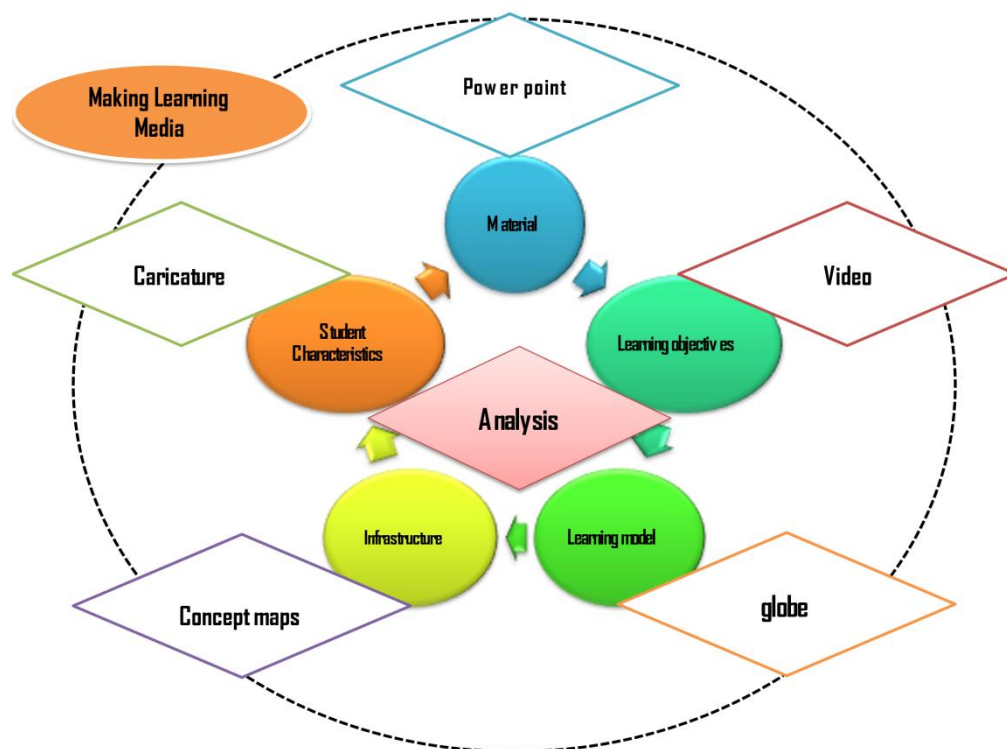


Figure 2. The Process of Analysis of Making Media and Learning Media Used by Teachers

Meanwhile, the needs analysis shows that the development of digital learning media in Social Science learning in Junior High Schools in Singaraja City is very much needed by both teachers and students. As many as 87% of teachers in Singaraja City stated that they needed visible learning media in accordance with the teacher's abilities and student needs [24,25]. Some of the factors that form the basis for the needs of Junior High School Social Science teachers in Singaraja City are: First, because until now Junior High School Social Science teachers in Singaraja City have not been able to develop digital learning media independently. This is due to the lack of ability of teachers to use information technology, the lack of creativity in the development of learning media by teachers, the lack of knowledge about the development of learning media and the absence of collective motivation built on Social Science teachers in Singaraja City [26]. On the other hand, training on the development of learning media has not been evenly distributed to all teachers. There are still many Social Science teachers who have not received adequate training regarding the development of learning media, especially Social Science learning. Second, Social Science teachers in Singaraja City mostly only use available learning media, which are not necessarily relevant to students' learning needs.

The teachers acknowledged that the available media were very helpful in making it easier for Social Science teachers to carry out the learning process [27]. Although on the other hand, it is recognized that there are various problems related to the use of available learning media, such as the teacher's mastery of the media to be used, the relevance of the material, learning objectives and learning media used and the suitability of the available learning media with the students' socio-cultural conditions. Third, students are more enthusiastic in using learning media made by the teacher together with students. This is because students directly learn in the process of making learning media. Students can also learn directly how the learning media created by the teacher together with students can be used in the learning process [28]. Indirectly students also learn about the material that will be presented by the teacher, through the development of joint learning media between teachers and students. Fourth, digitalization in the learning process is a necessity that requires teachers and students to collaboratively develop learning media. The digitization process will require everyone to always be in touch with technology and constantly upgrade their knowledge of the technological instruments used in carrying out their duties and responsibilities. Included in this context are Social Science teachers who are implementers and developers of the curriculum.

While the learning media that are widely used by Social Science teachers in carrying out the learning process are pictures, illustrations, graphics, posters, maps and globes, role playing, sociodrama, concept maps and powerpoints. The learning media used by Social Science teachers in Singaraja City is mostly visual. This condition makes learning less challenging and builds student learning motivation [29]. Meanwhile, digitalization in learning practices has brought a very significant change in the use of audio-visual learning media that is challenging for students. This matter must be addressed carefully by Social Science teachers in Singaraja City to make the learning process more interactive and adaptive to the development of information technology.

Based on the results of data analysis of learning media needs conducted on Social Science teachers at Junior High Schools in Singaraja City, it was found that the learning media needed were learning media that were relevant to the teacher's digital abilities, relevant to learning materials, easy to understand by students and the availability of facilities. -School infrastructure [30]. On the other hand, most of the Social Science teachers at Junior High Schools in Singaraja City do not have adequate skills in developing learning media. This is a barrier in the development and packaging of learning media for Junior High School Social Science subjects in Singaraja City [31]. While digital skills are the ability of teachers to operationalize various learning technologies for the benefit of learning in the classroom. Digital ability is the main skill in carrying out the learning process assisted by technology to facilitate learning activities and the achievement of learning objectives. Based on data analysis, it can be described the need for digital learning media by Junior High School Social Science teachers in Singaraja City as follows:

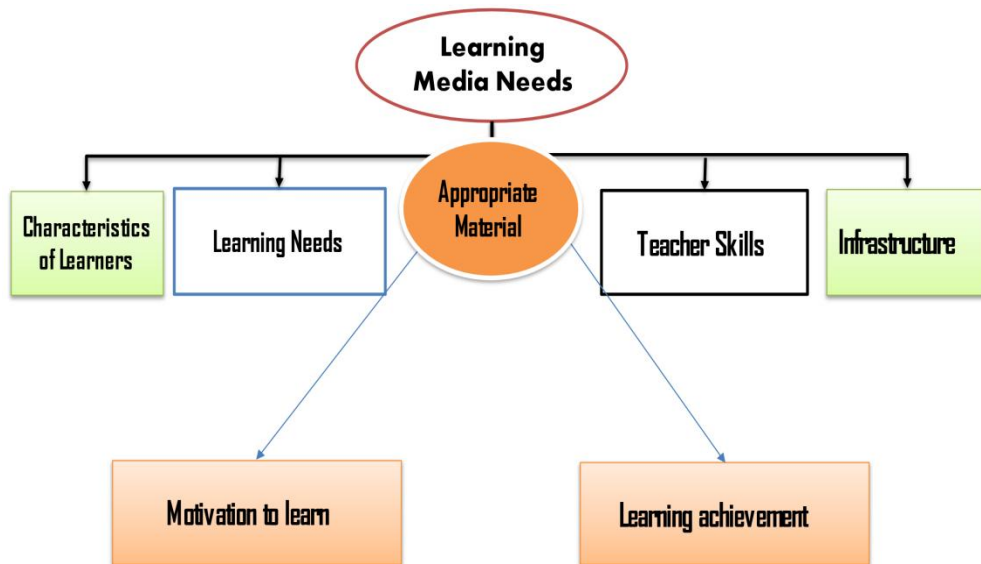


Figure 3. Digital Learning Media Needs

4. Conclusions

Not all Junior High School Social Science teachers in Singaraja City use digital learning media. The learning media used by the Social Sciences of Junior High Schools in Singaraja City are concept maps, powerpoints, globes and self-made pictures. Some teachers have used audiovisual learning media, such as videos and animated videos taken on the internet. Junior High School Social Science teachers in Singaraja City really need digital learning media in carrying out the learning process. Relevant digital learning media are learning media that are in accordance with the needs of students, learning objectives and materials, skills in using teacher technology and the availability of infrastructure owned by the school. The need for digital learning media is increasingly urgent due to digitalization in all dimensions, including educational practice, visible learning media in the digital era are learning media that are not bound by space and time, and the use of digital learning media will be able to improve the technological literacy of students and teachers.

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