

# The Development of Learning Model Assisted by Animation Media in Economics Subjects

Annazmy Hidayah<sup>1\*</sup>, Efendi Napitupulu<sup>2</sup>, Samsidar Tanjung<sup>3</sup>

<sup>1</sup>*Magister of Technology Education of Universitas Negeri Medan, Medan, Indonesia*

<sup>2,3</sup>*Department of Technology Education of Universitas Negeri Medan, Medan, Indonesia*

\*Corresponding author. Email: [annazmy@gmail.com](mailto:annazmy@gmail.com)

## ABSTRACT

This study aims to: (1) Determine the feasibility of a learning model assisted by animation media in Economics subjects at SMA Negeri 1 Kualuh Selatan, Labuhanbatu Utara (2) To find out the activeness of a learning model assisted by animation media in improving student learning outcomes in economic subjects at SMA Negeri 1 Kualuh Selatan. This type of research is development research using the Borg and Gall product development model. This learning product development model is a model that is arranged in a programmatic manner and in a systematic sequence and meets the characteristics of students in learning. This model includes 5 stages, which are: planning / development design, product development, expert validation, testing, revision and final product. The results indicated (1) the expert test of economics subject matter was at a good qualification, that is 80%, (2) the test of the learning design expert with very good qualifications, that is 91.82%, (3) The test of the software expert was at a good qualification, that is 81, 49%, (4) Individual trials are in very good qualifications 94.81%, (5) Small group trials are at very good qualifications 96.10%, (6) Field trials are at very good qualifications 99.58 %, it can be concluded that the learning model assisted by animation media is feasible to apply. The results of hypothesis testing prove that there is a significant difference between the learning outcomes of students who use animation assisted learning models and students who do not use animation assisted learning models. This is indicated by the results of data processing  $t_{count} = 7.30$  at the significance level  $\alpha = 0.05$   $t_{table} = 1.68$ . It is concluded that the learning model assisted by animation media developed is feasible and effective to improve learning outcomes in Economics

**Keywords:** *Economic Learning Outcomes, Learning Models, Animation*

## 1. INTRODUCTION

The world change is now entering the 21st century and the 4.0 industrial revolution where the development of science and technology (IPTEK) is developing so rapidly and has become the basis of human life, requiring humans to develop their abilities to face global challenges and competition. One of the efforts to face this big challenge is to create quality human resources (HR) through education.

The relationship between the education world and the industrial revolution 4.0 is that the education world is required to follow technological developments and utilize information and communication technology as more and sophisticated facilities to expedite the learning process. By understanding how technology can help facilitate the learning process so that they can design an effective learning process. (Rose, Meyer & Strangman, 2002)

In addition, be expected by utilization of information technology and communication mindset to be able to

shift from being teacher-centered to being student centered. Advances in technology make it easier to carry out and develop innovative learning techniques so that they will produce good and quality output. Besides the students will become individuals who have thinking skills and learning skills (thinking and learning skills).

To actualize the success of improving education, efforts must be made from various sides which is paying attention to all components that play an important role such as improving the quality of teachers, curriculum, facilities and infrastructure, school management and community participation. One of the important components that must be improved is the quality of teachers, teachers are required to be able to develop intellectual intelligence and develop children's skills. In addition, teachers are also expected to be able to be facilitators and mentors in class, and teachers are expected to be able to present subject matter creatively, use learning media and conduct appropriate evaluations to achieve learning outcomes.

Based on the results of observations made by researchers at SMAN 1 Kualuh Selatan in class XI IPS-2, the current economic learning process has not met expectations. Researchers found various problems that caused the learning process to be less effective, when the teaching and learning process tended to be conventional, such as lectures, questions and answers and assignments, the teacher only focused on books when explaining the lesson so that students had difficulty understanding the material presented by the teacher. Then the students look passive and only act as listeners, even when the teacher tries to ask small questions the students only answer improperly according to the textbook and most students respond less. And also, the teacher rarely use interesting learning media so that students are less motivated.

Furthermore, the researchers conducted interviews outside the classroom, some students said that economic subjects were disliked, saturated, less attractive, less enthusiastic and students were not actively involved in the learning process and lacked confidence when answering questions given by the teacher, so that students could not get good study achievement. This is evidenced by student data obtained from teachers of economic subjects that students get low learning outcomes and represent unsatisfactory. As shows in Table I below:

**Table 1.** Recapitulation of economic learning outcomes for class xi-2 students of sma n 1 kualuh selatan for the 2018/2019 academic year

No.	Value Range	Frequency	Percentage (%)
1	80-85	4	11.11
2	75-79	3	8.33
3	70-74	3	8.33
4	65-69	5	13.89
5	60-64	6	16.67
6	55-59	9	25
7	50-54	6	16.67
<b>Total</b>		<b>36</b>	<b>100%</b>

Based on Table 1, it shows that of the 36 students, only 9 (nine) people or 25 percent of students have completed, the remaining 27 people or 75 percent of students have not completed or are still below the Minimum Completion Criteria (KKM) that has been determined by the school is 75. Refers to the occur, it is necessary to make changes in the learning process. One way to solve this problem is by increase emphasize the effectiveness of learning by developing a learning model that is able to increase student learning activities.

The learning model is an important factor in learning because it is a plan that can help the learning process and the achievement of learning objectives for both students and teachers. So in this case the teacher must have the skills and creativity in choosing an appropriate learning model that will affect student learning outcomes.

The learning model according to Joyce & Weil (1980: 3) is "a pattern or a plan, which can be used to shape a curriculum of course, to select instructional material, and to guide a teacher action". That is, a

learning model is a kind of pattern or plan that can be used to determine curriculum or teaching, select subject matter, and guide teacher activities.

Whereas Slavin (2010) argues that the learning model is a reference to a learning approach including its objectives, syntax, environment and management system.

In addition to developing learning models, teachers are also expected to be able to create attractive media in order to generate motivation and enthusiasm for student learning. This is in accordance with the statement Burden and Byrd (1999: 137) that learning media is a means of introducing learning information. Meanwhile, according to Gagne(2006: 14) argued that the media are various types of components in the student environment that can stimulate them to learn.

Furthermore, according to Shilpa (2014), media allows students to build their own knowledge and improve their skills for professional development. So with the media students can interact, share information and gain good skills and understanding.

The learning media according to Adam and Syastra (2015) are everything both physical and technical in the learning process that can help teachers easier to deliver subject matter to students so that easy to achieve the learning objectives that have been formulated. Meanwhile, according to Kartikawati dkk. (2017) learning media is all types of teaching facilities that are used as intermediaries in the teaching and learning process to increase the effectiveness of achieving educational goals.

One of the learning media that is effectively used by the teacher is animation media. The learning material packaged in animation media adds to the curiosity of students about the material to be studied thus it can have a positive influence on student learning motivation, that is students will easily absorb the material more so that what is conveyed by the teacher will be more quickly accepted and remembered by students.

According to Vaughan (2011: 140) animation is an attempt to make static presentations come alive. Animation is a visual change over time that gives great power to multimedia project and the web pages created. According to Mayer and Moreno (2002: 88), one of the most interesting forms of image presentation is animation. Animation refers to a simulated motion picture depicting a move to be drawn (or simulated) on an object.

This is in line with Fernandes (2002) who defines that "Animation is the process of recording and playing back the sequence of stills to achieve the illusion of continuous motion". This means that animation is a process of recording and playing back a series of static images to get the illusion of movement.

Based on previous research conducted by Harahap (2016) entitled "The impact of Using Animated Learning Media on Learning Outcomes of Textile Knowledge for Class X Students of State Vocational High School 1 Stabat" states that classes that use

animation media get higher student scores than classes using image media. In this case, it can be said that animation media can have a positive influence on improving student learning outcomes.

Meanwhile, according to Kriz and Hegarty (2007) which states that animation can directly and openly deputize the movement of machine parts, when the actual machine movements must be seen directly, but animation can display fast or slow motion to be felt in real.

From some of the descriptions above, the researcher conducted a study entitled "Development of Learning Model assisted by Animated Media in Economics Subjects for Class XI Students of SMAN 1 Kualuh Selatan, North Labuhanbatu".

## **2. METHOD**

Research on the development of learning models assisted by animation media was implemented at SMAN 1 Kualuh Selatan, North Labuhanbatu Regency, class XI for the 2019/2020 school year. The time of the research was held on in October-December 2019.

In this study, the steps were grouped into four groups, namely: (1) Preliminary study, (2) Model design and development (3) Validation and (4) Model Testing.

## **3. RESULT AND DISCUSSION**

### ***3.1 Study of Product Development Results***

The development product of learning model assisted by animation media is implemented based on the stages as contained in the procedure. The results of the development are then carried out by a predetermined expert on the feasibility or validation test. Based on the results of the validation carried out, the learning model product assisted by animation media is deemed feasible to be continued in field trials. The learning model assisted by the animation media developed has met the standards based on the standard design of the animation media learning model development and learning material standards.

This product development research is aimed at producing a product in the form of a learning model assisted by animation media for students in class XI-2 SMAN 1 Kualuh Selatan which is used to improve the learning process. Revised and refined aspects based on data analysis and trials and input from material experts, learning design experts, software experts. It aims to explore some of the common aspects of the product development process. The learning media variables that were assessed included the feasibility of content, presentation, language, and graphics.

In the results of the questionnaire submitted to software experts, it gave the average percentage of response score of 81.49% that the development of animation-assisted media in learning was feasible

because it met the principles and criteria of learning media development. Meanwhile, learning design experts gave an average percentage of response scores of 91.88% that the development of learning models assisted by animated media is appropriate because it has been designed in such a way and meets the learning design standards. The learning materials expert gave an average percentage of a response score of 80% that the development of a learning model assisted by animated media was appropriate because it contained material and delivery criteria that met the requirements for delivering messages to students. By looking at the guidelines and assessment criteria according to Arends (2008: 24), it can be concluded that the data above proves that the use of a learning model is a plan or pattern that is comprehensive to help students learn the types of knowledge that are suitable for use by students in Economics subjects.

Latuheru (1988: 23) and Rajagukguk (2018) which propounds the benefits of learning media, namely: (1) Learning media attracts and enlarges the attention of students to the teaching material presented, (2) Learning media reduces, even eliminates the existence of verbalism, (3) Learning media resolves the differences in learning experiences based on socio-economic and student backgrounds, (4) Learning media helps provide learning experiences that are difficult to obtain in other ways, (5) Learning media can overcome the problems of time and space boundaries, (6) Media learning can help the development of students' minds on a systematic basis about what they are experiencing, (7) Learning media can help students overcome things that are difficult to see with the eye, (8) Learning media can cultivate their own ability to make one's way based on experience and reality, (9) Learning media can overcome things/events/occurrences that are difficult for the eye senses to follow (10) The learning media allows direct contact between students, teachers, the community, and the natural environment around them.

### ***3.2 Study of Product Feasibility Test Results***

Based on the results of the validation that has been done, the animation media product is declared feasible to be continued in field trials. The animation media developed has met the standards based on the design of animation media development standards and learning material standards.

In the results of the questionnaire submitted to software experts, it gave 81.49% response that the animated media was appropriate because it met the principles and criteria for developing software experts. Meanwhile, instructional design experts gave 91.88% responses that animation assisted media was appropriate because it had been designed in such a way and met the learning design standards. Learning material experts gave 80% response that animated assisted media was appropriate because it contained material and delivery criteria that met the requirements for delivering messages to students. By looking at the guidelines and assessment criteria according to Arends (2008: 24), it can be concluded that the data above proves that the use

of learning models is a plan or pattern that is comprehensive to help students learn the types of knowledge that are appropriate for students to use in Economics

### **3.3 Study of Research Results of Product Effectiveness Tests**

From the results of research data processing, there are differences in the learning outcomes of Economics between students who are taught using a learning model assisted by animation media and students who are taught without a learning model assisted by animation media. Students in class XI-2 SMAN 1 Kualuh Selatan who were taught using animation assisted learning model, namely the average student learning outcomes of Economics at 31.47. Meanwhile, the learning outcomes of economics before using the learning model assisted by animation media 26.47. So, the learning model assisted by animation media that has been produced is feasible and effective for use in learning.

## **4. CONCLUSION**

Based on the formulation, the purpose of the study, results, and study of research on the development of the "AMIE" model-assisted by animation media in Economics subjects that have been tested on class XI students of SMAN 1 Kualuh Selatan can be concluded as follows:

- "AMIE" learning model assisted by animation media is stated to be good in product and proper to use in class XI students of SMAN 1 Kualuh Selatan for economic learning.
- The application of "AMIE" learning model assisted by animation media is more effective in improving student learning outcomes in Economics.

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