DEVELOPMENT OF INTERACTIVE COMIC MEDIA VALIDATION INSTRUMENTS BASED ON MADURA'S LOCAL WISDOM

Ayyu Subhi Farahiba^{1*}, Afiyah Nur Kayati¹

¹Pendidikan Bahasa dan Sastra Indonesia, Universitas Trunojoyo Madura *email: ayyu.farahiba@trunojoyo.ac.id

Submitted: 2021-11-12, Reviewed: 2021-11-21, Accepted: 2021-12-02 DOI: 10.22216/jcc.2021.v6i3.734 URL: http://dx.doi.org/10.22216/jcc.2021.v6i3.734

Abstract

The rapid development of information and communication media has led to the discovery and development of media based on information and communication technology in learning. The medium of learning interactive comics with local wisdom can foster character values in learners. This research aims to compile an instrument of validation of interactive comic media hero madura in terms of content and media design. This research uses the research and development approach of the theory of four D models Thiagarajan, et al. The development of four D models includes four stages of development, namely define, design, develop, and disseminate. The development of this interactive comic media validation instrument stopped until the third stage of development. The results of this study are validation instruments for assessing the feasibility of content and learning media design. The validation results of the material obtained a score of 96% declared very worthy of trial. The media validation results obtained a score of 91% declared very worthy of trial. The validation average is 93.5%, with criteria that are very worthy of use as a learning medium.

Key words: Validation instruments, interactive comic media, madura local wisdom.

Abstrak

Perkembangan media informasi dan komunikasi yang semakin pesat menimbulkan banyak ditemukan dan dikembangkannnya media berbasis teknologi informasi dan komunikasi dalam pembelajaran. Media pembelajaran komik interaktif berkearifan lokal dapat menumbuhkan nilai-nilai karakter pada peserta didik. Penelitian ini bertujuan untuk menyusun instrumen validasi media komik interaktif tokoh pahlawan Madura dari segi isi dan desain media. Penelitian ini menggunakan pendekatan research and development teori four D models Thiagarajan, dkk. Pengembangan model four D models meliputi empat tahap pengembangan, yaitu define, design, develop, dan disseminate penyebaran. Pengembangan instrumen validasi media komik interaktif ini berhenti sampai tahap ketiga yaitu pengembangan. Pengembangan instrumen validasi media komik interaktif ini berhenti hingga tahap ketiga pengembangan. Hasil penelitian ini adalah instrumen validasi untuk menilai kelayakan konten dan desain media pembelajaran. Hasil validasi media memeperoleh skor 96% dinyatakan sangat layak untuk diujicobakan. Hasil validasi media memeperoleh skor 91% dinyatakan sangat layak untuk diujicobakan. Rata-rata validasi adalah 93,5%, dengan kriteria yang sangat layak digunakan sebagai media pembelajaran.

Kata Kunci: Instrument validasi, media komik interaktif, kearifan lokal Madura.

INTRODUCTION

The Covid-19 pandemic has caused changes, especially in the field of education. Changes that occur in the field of education are requiring the learning process through distance. Based on government policy in circular Letter No. 4 of 2020 on Implementation Education Policy in the Emergency Period of The

Spread of Corona Virus Disease (COVID-19), learning done online or online. This is done to prevent and avoid the spread of Covid-19 that is sweeping Indonesia. (Nafrin dan Hudaidah, 2021). Distance learning requires adaptation and innovation related to the use of technology. Educators must have readiness in dealing with

learning conditions like this. Therefore, we need media that are able to support and maximize the learning process.

learning process The that currently carried out online requires teachers and students to interact by utilizing technology-based media. Learning media is everything that is used to transmit messages from the sender to the recipient (Bastian et al., 2019). Learning media is a tool used to stimulate the thoughts, feelings, attention and abilities or skills of students so that it encourage the learning Utilization of learning media can make the learning process more effective efficient.

Technology plays in a role facilitating learning by creating a learning media. According to Kuswanto Radiansah, the use of learning media is an inseparable part and has become an integration of the learning methods used (Kuswanto & Radiansah, 2018 p.15). The use of media can make the learning process more interesting, for example in terms of appearance combined with several images or animations. Learning media is one of the important aspects in the process of achieving learning success in schools.

Therefore we need an alternative media that can support the learning process. The rapid development of information and communication media has led to the discovery and development of information communication technology-based media in learning. There are 280 researches based on technology and information media using web systems, computer assisted instruction, and android developed from (Schoolar.google). 2011-2018 development of technology and information is increasingly pushing towards renewal. Along with this, it is not impossible that later teachers are expected to be able to technology-based develop their own learning media.

The rapid development of technology and information can be balanced with elements of local wisdom. Local wisdom is a form of dialectic

between humans with knowledge of life that has pedagogical values to regulate behavior that is beneficial for the common interest (Khotimah et al., 2019). The integration of local wisdom in media development makes learning meaningful for students. Learning media based on local wisdom is one of the supporting elements of learning incorporating cultural values in it. Through this local wisdom-based media, it is hoped that students will become more familiar with and get closer to cultural values in their area.

One of the media based on local wisdom that can be used as a learning media is interactive comic media. The interactive comic media developed contains elements of Madurese local wisdom. This can be seen in the characters and stories displayed in the media. Before the media is tested, it is necessary to validate the product so that the learning media developed is in accordance with learning objectives to be achieved, the characteristics of students. characteristics of the media and sources. development validation The media instrument used as a measuring tool for the developed media was valid, less valid, or invalid by meeting certain categories.

In this study, the development of an interactive comic media validation instrument based on local wisdom was carried out. This is because there are still limited instruments used to validate the media. The target to be validated is interactive comic media based on local wisdom. The development of learning media with the integration of local culture can attract students' attention and improve student achievement (Suparman, 2017). One of the local wisdom materials that can be used as learning media is folklore. The folklore used in this study is the story of "Pangeran Trunojoyo" a Madurese hero who fought against the invaders. The story of Pangeran Trunojoyo struggle in this media described is through comic characters.

Ugwu's research, (2011) states that learning should be integrated with local wisdom or local knowledge, because through such integration, an understanding of the concepts studied, and the life values of the concepts they learn. It is very easy to apply in everyday life. The development of local wisdom-based learning validation instruments is important to measure the essence of the content of local wisdom contained in the learning media. Based on research conducted by Daniah, (2016) obtained the results that local wisdom contains values that are relevant in building character education. The development of local wisdom as character development requires understanding. understanding, awareness, cooperation, and participation of all elements of the citizen learning.

Local wisdom learning media can foster character values in students. Comic media has its own charm for students so that it is possible to attract attention. Apart from the fact that the storyline is in accordance with the intellectual development of comic students, it also has a good visual appearance. Through the characters of heroes depicted in comics, it is hoped that students can capture and explore the character values of each character. In fact, students are expected to have a change in attitude according to the characters shown in the comic.

In developing appropriate media, it is necessary to assess the feasibility of the media. The media feasibility assessment is compiled in the form of criteria developed in the form of an instrument. This study aims to develop a validation instrument for interactive comic learning media based on Madura local wisdom. The validation instrument developed will be used to assess the feasibility of the interactive comic media created.

METHOD OF RESEARCH

This research is a development research with a 4D model (Define, Design, Development, Disseminate) limited to the

development stage (Development) (Chrisyarani, 2018). The main focus of this development research is the development of validation instruments for interactive comic learning media based on local wisdom. The activities carried out at each stage of development can be described as follows.

First, the definition stage. The definition stage is the stage of gathering information related to the product being developed. Activities carried out in the stage of efficacy are problem analysis and student analysis. Problem analysis can be done through literature studies. This activity is carried out to establish the basic problems needed in the development of validation instruments. At this stage, an analysis of learning media and learning theory is carried out. The second activity is student analysis. This activity is a study of the characteristics of students in accordance with the design and development validation instruments. These characteristics include the background knowledge and cognitive development of the student.

Second, the design stage. The design phase is the development stage of the prototype validation instrument of interactive comic learning media based on local wisdom. Activities at the design stage are the preparation of interactive comic learning media assessment instruments based on local wisdom. Product assessment instruments are structured based on aspects of interactive comic media assessment based on local wisdom. Validation instruments developed are material validation instruments and learning media validation instruments. There are several stages of development of interactive comic learning media validation instruments, namely: 1) conducting literature studies on interactive comic media, (2) collecting supporting materials according to material needs and goals, and (3) making a cheklist of learning media. Cheklis aims to examine how the content about this media, the scope of which is lecturers as material experts and media experts test the feasibility evaluation used to compile the validation instrument.

The third stage, development (Develop). Thiagarajan divides the development stage in two activities, namely: expert appraisal and developmental testing. The last stage is dissemination (Disseminate). Thiagarajan divides the stage of dissemination in three activities, namely: validation testing, packaging, diffusion and adoption.

In this study stopped until the third stage, namely development. The development in question leads to the development of media validation instruments. Designed validation instruments are developed in the form of questionnaires. The main purpose of the questionnaire is: (a) information relevant to the purpose of the survey, (b) provide a logical and directed order of questions on the subject matter to the respondent, (c) provide a standard format of recording facts, opinions and attitudes, (d) facilitate data processing.

Validation instruments are developed using likert scale measurements. Each aspect is spelled out to be an indicator that will then be used as a starting point for the preparation of instruments to have a measure expressed in the form of words, in the form of: very less, less, enough, good and very good. For the purposes of quantitative analysis, the answers are given numbers or values. The explanation is as follows, less = 1, enough = 2, good = 3 and very good = 4 (Chrisyarani, 2018). In the analysis of validation is data that describes the validity of the learning media.

The development of interactive comic media validation instruments based on local

wisdom will be implemented in 2021. The subjects of this study are material expert validators and media experts. The data in this study is in the form of interactive comic media validation instruments based on local wisdom that have been declared valid by material experts and media experts.

DISCUSSION / RESEARCH FINDING *Result*

interactive The comic validation instrument was developed in the form of a questionnaire accompanied by a rubric. The media validation instrument is designed in two forms, namely content/material validation instrument and the media validation instrument. For the purposes of quantitative analysis, answers are given a number or value. The explanation is as follows, less = 1, enough = 2, good = 3 and very good = 4. The material validation instrument designed includes aspects of content and presentation. The content aspect consists of indicators which include: the accuracy of the material, the suitability of the material with the development of students, the language used. The presentation aspect consists of indicators which include: technique, presentation presentation completeness. The development of the material validation instrument in the form of a questionnaire is presented in table 1. below.

Tabel 1. Instrument Validation of Interactive Comic Media Material/Content of Madura Heroes

Catagory	Rated aspect -		Score			
Category			3	2	1	
Contents	1. Media compatibility with Core Competencies (Kompetensi					
	Inti) and Basic Competencies (Kompetensi Dasar)					
	2. The suitability of the material with the learning objectives					
	3. The suitability of the media with the learning objectives					
	4. The suitability of the material with the level of needs and					
	abilities of students					
	5. The suitability of the story characters with the comic media					
	used					
	6. Explanation of the examples provided					
	7. The suitability of the comic story with the material					
	8. The suitability of the evaluation with the material and learning					
	objectives					
Language	9. The suitability of language with the level of social emotional		•		•	

CURRICULA: JOURNAL OF TEACHING AND LEARNING

	development of students		
10. The suitability of language with students' thinking level 11. Ease of understanding the flow of material through the use of			
	12. Accuracy of dialogue/text with story/material		
Presentation	13.Consistent presentation of the material		
	14. The clarity of the storyline that supports understanding the		
	material		
	15.Presentation of attractive and proportional figure image.		
Score			
Total score			

(Source: Researcher, adapted from Muslich, 2010)

The criteria or rubrics used to assess based on the questionnaire are as follows.

Tabel 2. Criteria or Rubric for Validation of Material/Content of Interactive Comic Media Heroes of Madura

	One of continue			oring scale	
No.	Questions	4	3	2	1
1.	Media compatibility with Core Competencies (Kompetensi Inti) and Basic Competencies (Kompetensi Dasar)	If the learning media used is in accordance with the Core Competencies (Kompetensi Inti) and Basic Competencies (Kompetensi Dasar)	If the learning media used is only in accordance with the Core Competencies (Kompetensi Inti) only	If the learning media used is only in accordance with the Core Competencies (Kompetensi Dasar) only	If the learning media used is not in accordance with the Core Competencies (Kompetensi Inti) and Basic Competencies (Kompetensi Dasar)
2.	The suitability of the material with the learning objectives	If the learning material developed very well suited with the learning objectives	If the learning material developed is in accordance with the learning objectives	If the learning material developed is quite in accordance with the learning objectives	If the learning material developed is not in accordance with the learning objectives
3.	The suitability of the media with the learning objectives	If the learning media used is very well suited to the learning objectives	If the learning media used is in accordance with the learning objectives	If the learning media used is quite in accordance with the learning objectives	If the learning media used is not in accordance with the learning objectives
4.	The suitability of the material with the level of needs and abilities of students	If the material used is very appropriate to the level and needs and abilities of students	If the material used is in accordance with the level and needs and abilities of students	If the material used is sufficient in accordance with the level and needs and abilities of students	If the material used is not in accordance with the level and needs and abilities of students
5.	The suitability of the story characters with the comic media used	If the character of the story fits perfectly with the comic media used	If the character of the story is in accordance with the comic media used	If the character of the story is quite in accordance with the comic media used	If the character of the story does not match the comic media used
6.	Explanation of the examples provided	If the example given is very clear	If the example given is clear	If the example given is clear enough	If the examples given are not clear
7.	The suitability of the comic story with the material	If the comic story fits perfectly with the material	If the comic story matches the material	If the comic story is quite in line with the material	If the comic story doesn't match the material
8.	The suitability of	If the evaluation	If the evaluation	If the evaluation is	If the evaluation is

	the evaluation with the material and learning objectives	is very much in line with the material and learning	is in accordance with the material and learning	quite in accordance with the material and learning objectives	not in accordance with the material and learning objectives
9.	Suitability of language with the level of social emotional development of students	objectives If the language used is very suitable for the level of social emotional development of students	objectives If the language used is in accordance with the level of social emotional development of students	If the language used is quite in accordance with the level of social emotional development of students	If the language used is not in accordance with the level of social emotional development of students
10.	The suitability of language with students' thinking level	If the discussion used is very in line with the students' thinking level	If the discussion used is in accordance with the students' thinking level	If the discussion used is quite in accordance with the students' thinking level	If the discussion used is not in accordance with the student's thinking level
11,	Ease of students in understanding the material	Students are very easy to understand the material presented	Students easily understand the material presented	Students are quite easy to understand the material presented	Students do not easily understand the material presented
12.	Accuracy of dialogue/text with story/material	If the dialogue/text with the story/material is very appropriate	If the dialogue/text with the story/material is appopriate	If the dialogue/text with the story/material is quite appropriate	If the dialogue/text with the story/material is inaccurate
13.	Consistent presentation of material	If the material presented is very coherent	If the material presented is coherent	If the material presented is coherent enough	If the material presented is not coherent
14.	Kejelasan alur cerita yang mendukung untuk memahami materi.	Jika alur cerita yang disajikan sangat jelas dalam mendukung kemudahan pembaca untuk memahami materi	Jika alur cerita yang disajikan jelas dalam mendukung kemudahan pembaca untuk memahami materi	Jika alur cerita yang disajikan cukup jelas dalam mendukung kemudahan pembaca untuk memahami materi	Jika alur cerita yang disajikan kurang jelas dalam mendukung kemudahan pembaca untuk memahami materi
15.	Presentation of attractive and proportional figure images	If the presentation of the image of the character is very attractive and proportional	If the presentation of the image of the character is attractive and proportional	If the presentation of the image of the character is quite attractive and proportional	If the presentation of the image of the character is not attractive and proportional

The media validation instrument designed includes aspects of media suitability, appearance, and media quality.

The development of media validation instruments in the form of a questionnaire is presented in table 3 below.

Tabel 3. Media Validation Instruments Instructions of Interactive Comic Media Heroes of Madura

Cotogowy	Dotod concet		Score			
Category	Rated aspect	4	3	2	1	
Effects on	1. Ease of use					
learning	learning 2. Media support for student learning independence					
strategies 3. The ability of media to increase students' motivation in studying anecdotal texts						
	4. Media ability increases students' knowledge					

CURRICULA: JOURNAL OF TEACHING AND LEARNING

Characterizations	5. The suitability of the selection of story characters with
	the characteristics of students
	6. The attractiveness of the character design of the
	characters
	7. The accuracy of the characters with the content of the
	story
Graphics	8. The suitability of the type/shape of letters with the
•	characteristics of students
	9. Compatibility of illustration with material
	10. Contrast the color of the text letters with the background
	on the word balloon
	11. The suitability of the letter size with the characteristics
	of students
	12. Illustration clarity
	13. The accuracy of word balloon placement
	14. Harmonious use of color
	15. The suitability of the use of color with the characteristics
	of students
Score	
Total score	

(Source: Researcher)

The criteria or rubrics used to assess based on the questionnaire are as follows.

Tabel 4. Criteria or Rubric for Validation of Interactive Comic Media for Madura Heroes

No.	Questions	Scoring scale			
140.	Questions	4	3	2	1
1.	Ease of use	If interactive comics are very easy to use in the student learning process both independently and in the classroom	If interactive comics are easy to use in the student learning process both independently and in the classroom	If interactive comics are easy enough to be used in the student learning process both independently and in the classroom	If interactive comics are not easy to use in the student learning process both independently and in class
2.	Media support for student learning independence	If interactive comics really support students to be able to learn anecdotal texts independently	If interactive comics support students to be able to study anecdotal texts independently	If interactive comics support students enough to be able to study anecdotal texts independently	If interactive comics do not support students to be able to study anecdotal texts independently
3.	The ability of media to increase students' motivation in studying anecdotal texts	If the media is very able to increase students' motivation in studying anecdotal texts	If the media is able to increase students' motivation in studying anecdotal texts	If the media is sufficient to increase students' motivation in studying anecdotal texts	If the media is not able to increase students' motivation in studying anecdotal texts
4.	Media ability increases students' knowledge	If the media is very able to increase students' knowledge	If the media is able to increase students' knowledge	If the media is sufficient to increase students' knowledge	If the media is not able to increase students' knowledge
5.	The suitability of the	If the	If the	If the	If the

CURRICULA: JOURNAL OF TEACHING AND LEARNING

	selection of story characters with the characteristics of students	character/charac ter in the comic fits the student's characteristics very well	character/charac ter in the comic matches the student's characteristics	character/char acter in the comic is quite suitable for the student's characteristics	character/charac ter in the comic does not match the student's characteristics
6.	The attractiveness of the character design of the characters	If the character design of the character is very interesting	If the character design of the character is interesting	If the character design of the character is interesting enough	If the character design of the character is not attractive
7.	The suitability of the characters with the content of the story	If the character is in accordance with the content of the story	If the characters match the content of the story	If the characters fit enough with the content of the story	If the characters do not match the content of the story
8.	The suitability of the type/shape of letters with the characteristics of students	If the type / shape of the letters is very suitable for the characteristics of the students	If the type / shape of the letter is in accordance with the characteristics of the student	If the type / shape of the letters is quite suitable for the characteristics of the students	If the type / shape of the letter does not match the characteristics of the student
9.	Compatibility of illustration with material	If the illustration fits the material very well	If the illustration matches the material	If the illustration is sufficient with the material	If the illustration doesn't match the material
10.	Contrast the color of the text letters with the background on the word balloon	If the media is very able to encourage student involvement in learning	If the media is able to encourage student involvement in learning	If the media is sufficient to encourage student involvement in learning	If the media is not able to encourage student involvement in learning
11.	Clarity of text/dialogue	If the text/dialogue is very clear	If the text/dialogue is clear	If the text/dialogue is clear enough	If the text/dialogue is not clear
12.	Illustration clarity	If the illustration is very clear	If the illustration is clear	If the illustration is clear enough	If the illustration is not clear
13.	The accuracy of word balloon placement	If the placement of the word balloon is very precise	If the placement of the word balloon is right	If the placement of the word balloons is quite right	If the placement of the word balloons is not correct
14.	Harmonious use of color	If the use of color is very harmonious	If the use of harmonious colors	If the use of color is harmonious enough	If the use of color is not harmonious
15.	The suitability of the use of color with the characteristics of students	If the use of color in comics is very in line with the characteristics of students	If the use of color in the comic is in accordance with the characteristics of the students	If the use of color in the comics is quite in line with the characteristics of the students	If the use of color in the comic does not match the characteristics of the students

The formula for processing validation data to experts adapted with modifications from Akbar (2012: 49-50) is as follows.

$$Vm = \frac{TSe}{TSh} \times 100\%$$

$$Vd = \frac{TSe}{TSh} \times 100\%$$

$$Vt = \frac{Vm + Vd}{2} = \dots \%$$

Information:

Vm = Material/content expert validity

Vd = Design expert validity

Tse = Total Empirical Score achieved (based on expert judgment)

TSh = Total expected score

Vt = Total/combined validation

100% = constant

Interpretation is the interpretation of the respondent's data analysis. As a guideline for interpretation, the criteria are set in table 5 below.

No.	Criteria	Validity Level
1.	86% - 100%	Very Valid (can be used without revision)
2.	70% - 85%	Sufficiently Valid (can be used with revisions)
3.	60% - 69%	Invalid (unusable)
4.	0% - 59%	Very invalid

(Source: adapted from Akbar & Sriwiyana, 2011)

The assessment is carried out by providing comic learning media products and also the assessment sheet that will be filled by material expert lecturers, assessments from material experts that include aspects of content feasibility, presentation feasibility, and also language. Validation with material experts is done with two stages, namely the first stage of

revision then continued with the stage after revision. This stage is done with the aim of getting a product that suits the needs of learners. The author submitted the comic learning media and also the assessment questionnaire to the material expert lecturer on Friday, October 8, 2021 at the University of Muhammadiyah Malang. Validation results as well as expert assessments of the material can be presented in the table below.

Table 6. Results of Material Expert Validation Assessment

Aspect	Score %	Category
Material	96%	Very worthy
Media	91%	Very worthy
Average		93.5%
Criteria		Very worthy

This comic-based learning media before being piloted in the field, first validated with material experts. The validation results can be seen from the percentage of the ideal score of obtaining a score of 96% declared very worthy of trial. This comic-based learning media before being piloted in the field, first validated with media experts. The validation results can be seen from the percentage of the ideal score of obtaining a score of 91% declared very worthy of trial. The validation average is 93.5%, with criteria very worth using learning media.

Discussion

Digital comics based on science process skills designed is an application developed as a support in learning can be used for self-study or with teachers. In its use, digital comic media will be very helpful to improve learning outcomes, learning motivation, innovation, learning activities, and valuable experiences. In previous research conducted by Ani Widyanti, Anti Colonial Prodjosantoso developed IPA digital comic media to increase the motivation of learning and character of learners in addictive and

psychotropic substance materials (Widyawati & Prodiosantoso, 2015). Furthermore, in Lenny Kurniawati's research that comics can also be one to foster problem-solving skills by learners to achieve good completion both individually and classically and there is an influence on problem-solving skills and learning interests (Kurniati, 2017).

The validation instrument for the interactive comic media of the Madura hero character produced in this study is an instrument intended to test validity/feasibility of the media. Expert validation of the material aims to find out criteria of learning planning, presentation of learning materials, and evaluation of learning (Hapsari et al., 2017).

The development of interactive comic media validation instruments for the Madura hero character consists of (1) material/content validation instruments and learning media design validation instruments. Material/content validation instruments include: aspects of content, language, and presentation This is in accordance with the statement of Izzati et al., (2013) which states that the components in the preparation of the validation instrument include three components, namely content, linguistic and presentation (Izzati et al., 2013). The content or material aspect is designed by taking into account the criteria for the comic media being assessed.

The interactive comic developed contains anecdotal text learning with examples of anecdotal texts based on the story of Prince Trunojoyo's struggle. Comic stories are arranged in the form of stories that correspond to the story of Prince Trunojoyo so as to increase the wisdom of comic learning media. The development of this comic media makes comics not boring to reread because it utilizes the features of images, colors, and storylines. This is in accordance with the opinion of Ghafoor and Shilna who stated that comics with interesting and distinctive

features have great power to tell the story contained in it, contributing to stimulating the liveliness and creativity of students (Subroto et al., 2020).

The instructional media design validation instrument was developed by taking into account the functions and parts of comic media. Comics are audiovisual media so that in order to function properly, comic development must adhere to several things as follows (Arsyad, 2011).

a. Form

It is important to pay attention to the selection of forms in order to arouse the interest and attention of students.

b. Lines

Lines are used to connect successive elements so that these line elements will help clarify the story.

c. Texture

Texture serves to create a smooth or rough impression that can indicate an element of emphasis.

d. Color

The function of using color is to give the impression of separation or emphasis and to build cohesion and heighten the reality of objects and create emotional responses. Things that need to be done in color selection include: (a) special color selection, (b) color value, namely the level of thickness and thinness, and (c) color intensity or strength.

The development of comic media validation instruments must also pay attention to parts of the comic itself. According to Susani, comics have the following sections (Susiani, 2006).

- a. Characters are all the characters in the comics,
- b. Frame, is a room that limits one story scene with another,
- c. The word balloon, is the space for the characters' spoken conversations,
- d. Narrative is an explanatory sentence put forward by comic artists,
- e. Sound effects are effects given to the visualization of words or sentence

- descriptions spoken by the characters.
- f. The introduction is a description of the atmosphere in which the character is being discussed by the comic artist.

The measurement of this comic media validation instrument uses a Likert scale. Each aspect is translated into indicators which will then be used as a starting point for the preparation of the instrument having a measure expressed in words, in the form of: Very poor, less, enough, good and very good. For the purposes of quantitative analysis, the answers are given a number or value. The explanation is as follows, less = 1, enough = 2, good = 3 and very good = 4.

The advantages of comics as learning media are that 74% of teachers surveyed think that comics help motivate, while 79% say comics increase individual participation. One teacher even said that comics made learning very easy. The use of comics in the learning process can stimulate students' motivation and interest in a subject that is considered difficult to understand, stimulate discussion activities, build understanding and extend memory. In addition, Hurlock stated "Comic will motivate children to develop reading skills" (Jumariyati, 2008).

This comic media can be used as a means of entertainment as well as value content. Values such as camaraderie, friendship, and unyielding spirit can be depicted dramatically through comics. The generated media encourages students to conduct additional research on learning, as well asgive opportunities for students to communicate with one another and develop high-level thinking abilities (Fanani & Kusmaharti, 2018, in Mega & Handayani, 2021). Comics create interest in students, streamline the learning process, increase interest in learning and generate interest in appreciation (Sudjana & Rivai, 2002).

CONCLUTION

The development of this interactive comic media validation instrument stopped until the third stage, namely development. This research has produced a validation instrument to assess the feasibility of the content/material and design of instructional media. The material validation instrument designed includes aspects content/material, language, and presentation. The content aspect consists of indicators which include: the accuracy of the material and the suitability of children's stories with the material. The language aspect includes the suitability of language student development. with presentation aspect consists of indicators which include: presentation techniques and presentation completeness.

The instrument for validation of instructional media design consists of aspects of effects for learning strategies, characterizations, and graphics. Aspects of effects for learning strategies include the ease and support of media in learning. The characterization aspect includes the suitability of the characters built in the comics. The graphic aspects include the suitability of letters, illustrations, colors, and word balloons.

The author submitted the comic learning media and also the assessment questionnaire to the material expert lecturer on Friday, October 8, 2021 at the University of Muhammadiyah Malang. The results of this study are validation instruments for assessing the feasibility of content and learning media design. The validation results of the material obtained a score of 96% declared very worthy of trial. The media validation results obtained a score of 91% declared very worthy of trial. The validation average is 93.5%, with criteria that are very worthy of use as a learning medium.

ACKNOWLEDGEMENTS

Thank you to LPPM Universitas Trunojoyo Madura for providing the opportunity to obtain a DIPA research grant. This article is the outcome of the research conducted by the researcher. Thanks also to the research team and lecturers of the Indonesian Language and Literature Education Study Program, Universitas Trunojoyo Madura.

REFERENCES

- Akbar, S., & Sriwiyana, H. (2011).

 Curriculum Development and Social
 Science Learning. Yogyakarta: Cipta
 Media.
- Arikunto, S. (2006). *Research Procedures* A Practical Approach. Jakarta: Rineka Cipta.
- Arsyad, A. (2011). *Learning Media*. Jakarta: PT. Raja Grafindo Sejahtera.
- Bastian, A., Zaliluddin, D., & Ramdani, A. M. (2019). Development of Media Learning Game Qur'an Based on Interactive Multimedia. *Infotech Journal*, 5(2), 29–33. https://doi.org/10.31949/infotech.v5i2. 101
- Chrisyarani, D. D. (2018). Development of Puppet Media Validation Instruments Hands With Puppet Storytelling Methods Hands With Storytelling Methods. *Elementary School Education Journal*, 2(1), 40–50. https://doi.org/10.30651/else.v2i1.1204
- Daniah. (2016). Local Wisdom As A Basis For Character Education. *Pionir: Journal of Education*, 5(2). https://doi.org/10.22373/pjp.v5i2.3356
- Hapsari, W., Wibawanto, H., & Sudana, I. M. (2017). Development of Mobile Learning Digital Engineering for Electrical Engineering Education Students. *Journal of Vocational and Career Education*, 2(1), 28–36. https://doi.org/10.15294/jvce.v2i1.109 79
- Hurlock, E. B. (2000). Child Development, Language Transfer: Meitasari Tjandrasa dan Muslichah Zarkasih. Jakarta: Erlangga.
- Izzati, N., Hindarto, N., & Pamelasari, S. D. (2013). Development of Thematic

- and Innovative Modules Of Character on The Theme of Environmental Pollution For Students of Class VII Junior High School. *Jurnal Pendidikan IPA Indonesia*, 2(2), 183– 188.
- https://doi.org/10.15294/jpii.v2i2.2721
- Jumariyati, N. (2008). Development of Comics as a Biological Learning Medium for Class VIII Students at SMP Negeri 3 Gading, Probolinggo. In *Thesis*. State University of Malang.
- Khotimah, R., Kristianingsih, R., (2019). Integrative Ngazizah, N. Thematic Teaching Materials Based on Local Wisdom To Instill Character Elementary School Students. Seminar National **Primary** onEducation, 1, 614-623. http://eproceedings.umpwr.ac.id/index .php/semnaspgsd/article/view/1071
- Kurniati, L. (2017). Open Ended Problem Solving Contextual Learning With Mathematical Comics To Improve Problem-Solving Skills. *Journal of Mathematics Education IKIP Veteran Semarang*, 1(1), 34–41.
- Kuswanto, J., & Radiansah, F. (2018). Android-Based Learning Media on Class XI Network Operating System Subjects. *Infotama Media Journal*, 14(1), 15–20. https://doi.org/10.37676/jmi.v14i1.467
- Mega, I.R., & Handayani, R. (2021). Developing Hots-Based English Materials The Tenthgrade For Students Bangka Selatan. In Curricula: Journal Of Teaching And Learning, No.6 Vol. http://publikasi.lldikti10.id/index.php/ curricula88
- Muslich, M. (2010). *Text Book Writing*. Yogyakarta: Ar-Ruzz Media.
- Subroto, E. N., Qohar, A., & Dwiyana. (2020). Effectiveness of Using Comics as a Medium of Learning Mathematics,, No. 2 Vol. 5, hlm. *UM Journal of Education*, 2(5), 136.
- Sudjana, N., & Rivai, A. (2002). *Teaching Media*. Bandung: Sinar Baru

- Algesindo.
- Sugiyono. (2007). *Qualitative Quantitative Research Methods & R&D*. Bandung: Alfabeta.
- Suparman, A. R. (2017). Development of Problem-Based Chemical Learning Media Combined with Local Papuan Culture. *Journal of Educational Reason*, 5(1), 74–79. https://doi.org/10.26858/jnp.v5i1.3280
- Susiani, L. (2006). Create Comics with Adobe Ilustator and Adobe Photoshop. Yogyakarta: Andi.
- Ugwu, N. (2011). Creating Change Through Integration of Indigenous Knowledge and Practices Into Chemistry Teaching For Sustainable Living. University of Uyu, Uyu. Akwa Ibom.
- Widyawati, A., & Prodjosantoso, A. K. (2015). Development of IPA Comic Media to Increase Learning Motivation and Character of Junior High School Learners. *Journal of Educational Innovation IPA*, 1(1), 24–35.
 - https://doi.org/10.21831/jipi.v1i1.4529