Development of Learning Media Template and Its Instruction for Citizenship Education

Tijan¹, Andi Suhardiyanto¹ and Yan Amal Abdilah²

¹Faculty of Social Science, Universitas Negeri Semarang, Semarang, Indonesia

²Bestari Edutech, Jambi, Indonesia

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Abstract:

Citizenship education teachers are required to be able to develop their own learning media because the government and learning media developer are more focused on Science, Technology, Engineering, and Mathematics (STEM). Unfortunately, development of learning media is not easy and requires a long time. This Research and Development aims to develop a template and its modification instructions. With this template, teachers can more easily and quickly develop learning media that is in line with their needs and characteristics of citizenship education. The ADDIE (Analysis, Design, Development, Implementation and Evaluation) research model was used in this study. The Analysis phase has been carried out in previous study. This research conducted at the Design to Evaluation phase. In Semarang city of Indonesia, 40 Citizenship education teachers and 2 experts in the field of instructional media filled out 1-5-scale questionnaires related to the quality of this research product. Respectively, the teachers and experts gave good score by average rating of 4.26 and 3.6 on the aspect of visual, 4.35 and 3.9 on the aspect of content, 4.55 and 4.4 on the aspect of navigation, and 4.2 and 4.0 on the aspect of ease of modification

1 INTRODUCTION

Citizenship Education as a value-based education emphasizes the realization of good citizens, who have holistic competence in knowledge, skills and traits based on national character (Nurdin, 2015). UNESCO identified three learner attributes in relation to global citizenship education, which refer to the traits and qualities that global citizenship education aims to develop in learners. These are: informed and critically literate; socially connected and respectful of diversity; ethically responsible and engaged. Global citizenship education requires skilled educators who have a good understanding of transformative and participatory teaching and learning. The main role of the educator is to be a guide and facilitator, encouraging learners to engage in critical inquiry and supporting the development of knowledge, skills, values and attitudes that promote positive personal and social change. However, in many contexts, educators have limited experience of such approaches (UNESCO, 2015).

Therefore, it is recommended for teachers to provide variety learning resources and media for students. Unfortunately, finding learning media for citizenship education is quite harder than that for other subjects. For example, Ministry of Education in Indonesia has an annual project of developing up to 60 mobile learning applications, but only zero to two of them are designed for citizenship education. This shows the need of citizenship education teachers to develop their own learning media which in line with the characteristics of citizenship education, especially that promote cooperative learning.

1.1 Teacher for Learning Media Development

In the previous research, most of citizenship education teachers stated that theyhave facility and ability to develop learning media, but are lacking of time to do it (see Figure 1). This was the main reason of developing media template. With this media template, teachers of citizenship education do not need to develop learning media from zero, cutting the time of development. They just need to input their learning material, encouragement to cooperative learning, and assessment. They need no worry about thousands lines of programming code and compatibility of learning media with various devices.

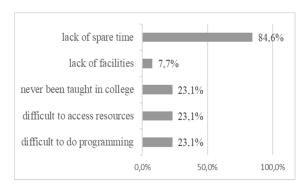


Figure 1: The difficulties faced by teachers in developing learning media.

1.2 Teacher Perception of Citizenship Education Learning Media

The teachers believe that learning media should be in accordance with developed students characteristic. Many reasearch findings stated that student characteristics account the most in academic achievement compared to teachers and school Furthermore, students' 2016). (Detterman, intelligent or cognitive ability, such as cognitive development and initial knowledge, account the most of academic achievement attributable to other characteristics (see Table 1).

Language used in learning media should be easily understood by students, conform national language standard, and usecommunicative language style. Instructional messagethat use conversation style "you" and "I" rather than relying solely on third-person constructions willincreases the learner's feeling of social presence and than increase their motivational commitment to active cognitive processing (Mayer, 2009). Thus, improve their learning achievement.

The teachers explained a list of menu should be included in learning media, such as Media Identity,

Guide, Learning Material, Task, and Evaluation. The content of learning material includes Introduction, Apperception, Bridging to Main Material, Main Material, Ice Breaker, and Closing Statement. Besides, the teachers expected learning media to promote active and cooperative learning, especially peer discussion. Beyond that, teachers prefer cheap and easy to use learning media.

1.3 Design of Citizenship Education Learning Media

Based on findings mentioned, the learning media template was developed using Construct 2. Construct is an HTML5-based 2D editor. It is intended primarily for non-programmers, enabling fast development of learning mediain drag-and-drop mode using visual editors and behavior-based logic systems. Construct's unique block-based approach is a simple and exciting way to start designing games. There's no need to learn the syntax of complicated programming languages. Each block is a list of conditions on the left. When those conditions are met, it performs the actions on the right. Learning media developed by Construct can be publised in any device, such as Mobile and Desktop devices.

The media template featured to present information in the form of visual (picture and animation), audio (music and sound), or audio-visual (video). It is expected for teachers to include actual and contextual contents like local news. Contextual teaching helps to promote authentic learning and increases students' success by allowing them to make connections betweenthe content they are learning to the life contexts in which that content could be used as they construct knowledge (Hudson and Whisler, 2007).

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Table 1: Basic chara	しにいいいしゃ ひょうしゃ	anning incura	necaea nv	CIVIC CUUC	ation teachers.

Adjustment to Civic Education Characteristics		Adjustment to Students' Char	Additional Characters		
Supporting active learning	100%	Adjusted to students competencies	53.8%	Cheap	61.5%
Helping achievment of competencies	84.6%	Adjusted to students interests	46.2%	Easy to use	61.5%
Attracting students' attention and enthusiasm	76.9%	Adjusted to students needs	84.6%	Easy to get	61.5%
		Contextual	84.6%		

Special menu for cooperative task would be the main focus in the media template. Within cooperative situations, individuals seek outcomes that are beneficial to themselves and beneficial to all other group members (Johnson and Johnson, 2016). This showed the value of mutual cooperation, *gotong royong* slogan of Indonesia.

2 METHOD

This reasearch and development used ADDIE reseach model which consists of five phases, such as Analysis, Design, Development, Implementation, and Evaluation. ADDIE model is one of the most common models used in the instructional design field a guide to producing an effective design. This model is an approach that helps instructional designers, any content's developer, or even teachers to create an efficient, effective teaching design by applying the processes of the ADDIE model on any instructional product (Aldoobie, 2015).

The Analysis phase has been done in a previous research. This research continued for the next four phases. The Design and Development stages were conducted 3 months to develop Citizenship Template. Education Media During Implementation stage, the media template was given to 40 teachers of Citizenship Education in Semarang. They were asked to develop their own media using the template. After that, the teachers and 2 expert of Instructional Multimedia were asked to fill out 1-5-scale questionnaires related to the quality of this research product. These questionaires were used as evaluation and guidance for product revision.

3 RESULT AND DISCUSSION

Data collection was carried out by distributing questionnaires to be filled by 40 citizenship education teachers and two experts in instructional media. The questionnaires consist of four aspects, such as visual, content, navigation and modification. Overall, the media template quality is good with average score of 4.34 by teachers and 3.98 by experts.

Table 2: Media template and its instruction score by teachers and experts.

Aspect	Teachers	Experts
Visual	4.26	3.60
Content	4.35	3.90
Navigation	4.55	4.40
Modification	4.20	4.00
Average Score	4.34	3,98

3.1 Visual Aspect

This aspect consists of design, layout, colour, and legibility. The average grades of this aspect are 4.26 (teachers) and 3.6 (experts). This result states that the template and instruction quality are good. One expert gave a score of 2 for legibility and design of instruction. Thus, revision was conducted for the instruction.

3.2 Content Aspect

This aspect consists of media identity, guidance, learning material, assignment, and interactive evaluation. The average grades of this aspect are 4.35 (teachers) and 3.9 (experts). This result states that the template and instruction quality are good. One expert gave a score of 2 for media identity. Thus, revision was conducted on that page.

3.3 Navigation Aspect

This aspect consists of navigation layout, style, visibility and ease of use. The average grades of this aspect are 4.55 (teachers) and 4.4 (experts). This result states that the template and instruction quality are very good. One expert suggested adding visual navigation (next and previous button), previously only swipe to go, fordesktop version. Using button is way easier navigation for devices without touch screen.

3.4 Modification Aspect

This aspect assess the ease of modificating media template to be a ready used learning media. The modification consists of programm code and visual content such aslearning material and evaluation. The average grades of this aspect are 4.2 (teachers) and 4 (experts). This result states that the template and instruction quality are good.

4 CONCLUSIONS

This Research and Development aims to helps teachers developing learning media by developing a template and its modification instructions using ADDIE (Analysis, Design. Development, Implementation and Evaluation) research model. The result showed thatlearning media template developed by the researcher is in accordance with the teacher's needs. Regardless of its good quality, some small revision need to be made. Media template modification instructionrevision became the main focus before product publication to citizenship education teachers. In revised version, researchers added minor changes mediatemplate by adding next and previous buttons and correcting writing errors (typo).

The media template content is complete and in accordance with the characteristics of citizenship education and teachers needs. And, media templates are proven to be easy for teachers to modify. So as to reduce the limitations of teachers related to time and funds for the development of learning media.

REFERENCES

- Aldoobie, N., 2015. ADDIE model. American. International Journal of Contemporary Research. AIJCRNET.
- Detterman, D.K., 2016. Education and intelligence: Pity the poor teacher because student characteristics are more significant than teachers or schools. *The Spanish Journal of Psychology*. CAMBRIDGE.
- Hudson, C.C., Whisler, V.R., 2007. Contextual teaching and learning for practitioners. *International Multi-Conference on Society, Cybernetics, and Informatics*. IIISCI.
- Johnson, D.W., Johnson, R., 2016. Cooperative learning and teaching citizenship in democracies. *International Journal of Educational Research*. ELSEVIER.
- Mayer, R.E., 2009. *Multimedia learning*, Cambridge University Press. Cambridge, 2nd edition.
- Nurdin, E.S., 2015. The policies on civic education in developing national character in indonesia. *International Education Studies*. CCSENET.
- UNESCO, 2015. Global citizenship education: Topics and learning objectives, United Nations Educational, Scientific and Cultural Organization. Paris.