Learning Media Edu-Games “My Profession” as an Effort to Introduce Various Types of Profession in Early Childhood Education Students

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Abstract: This research aims to obtain a picture of attitudes and understanding of early childhood education teachers on the use of learning media Edu-Games My Profession as an effort to introduce various types of professions in early childhood education students. The developed product includes My Professional Edu-Games app guide that meets the contents feasibility aspect. This research is a research of the development of ADDIE model which has five main elements consist of Analysis, Design, Develop, Implement, and Evaluate. The research data are analysed quantitatively to answer whether the product in the form of guide, material and application of Edu-Games My Profession has fulfilled the criterion of clarity. Products are tested on expert groups with a focus on the clarity aspects of content and applications. The result showed 1) early childhood education teachers generally understand that the use of media applications Edu-Games My Profession has not been used and is needed as a medium of learning to introduce various types of professions. 2) Early childhood teachers have commonly known that the use of Edu-Games My Profession learning media can assist students in recognizing early childhood interest in different types of professions., and 3) expert group test results have fulfilled the clarity aspect of content and application of Edu-Games My Profession.

1. Introduction
The challenges experienced by early childhood teachers are able to describe themselves as teachers in introducing and directing students’ careers. Teachers with early career guidance directions that can be
started from formal education are: encouraging students' awareness and understanding of the various activities and jobs in the world around them, developing positive attitudes toward all types helping students understand likes and dislikes and self-awareness and career awareness. However, until now, early childhood education teachers are still experiencing obstacles related to the method of introducing various types of professions to direct the career of early childhood education students. One method of introducing the profession in early childhood is the use of Edu-Games application media "My Profession". A medium that incorporates elements of the game in learning, in which students of early age are expected to show their fondness for a wide range of profession choices.

Playing is a fun activity to meet the interests of the activity itself. Play provides an opportunity for children to adapt to the environment and help children overcome anxiety and conflict. [1]. By playing, many psychological and personality functions can be developed. This is because in the activity of playing many activities involving psychological activities and personality of the participants [2]. By playing, making all aspects such as a motor, physical, cognitive, language, emotion, social, imagination, activity, ethics and moral inherent in children will be developed as media to build children, including aspects of cognitive abilities of children.

The most appropriate activity for young children to build their knowledge is the activity of play. Playing is meant by this research is to play through animated games that can be done by using electronic media such as a mobile phone that contain the types of professions. Animation games are computer games created with animation techniques and methods that involve the player's decisions, striving to achieve goals limited by a specific context [3].

Media is a tool for communication that refers to anything that brings information between source and receiver [5]. When the message is loaded has a learning purpose and is intended to facilitate communication and learning, then the media is called learning media. This opinion is not much different from the opinion of Sadiman, Rahardjo, Haryono, and Rahardjito [6] which states the media is basically something that can be used to channel the message from the sender to the recipient so that it can stimulate thinking, feelings, interests and willingness and attention so that the learning process occurs. Media is a human, material, or eventual condition, which causes students to acquire knowledge, skills or attitudes [7].

A game is a structured or semi-structured activity, usually done for fun and sometimes also used as a tool of learning [3]. A game is an activity that involves a player's decision, seeks to achieve a goal restricted by a particular context [8], Game has an 'end and how to achieve it': it means there are goals, outcomes and set of rules to achieve them [9].

Some types of games among others are:

PC Game is a game that is played on a PC (Personal Computer) that has advantages that have a good interface for input and output, high-quality visual output because computer screens usually have a much higher resolution compared to regular television screens.

Console Game is a game that runs on certain machines that are usually available in private homes, such as Microsoft Xbox 360, Nintendo Wii, etc.

Arcade Game is a game that runs on machines with integrated audio input and audio output and is available in public places, such as malls, airports, etc.

Online Game is a game that can only be played online via LAN or the internet [8].

The game in this research is included in the PC is a game that provides learning fun and motivates by increasing the curiosity, to better understand and love a profession and determine interest in career choices. The game software will display image or text through the media (television, computer, phones) then the player gives input that the command is channeled through the game hardware to the media.

Based on the game genre, the game is studied educational games that create the ability of the gaming environment to be provided as a tool to motivate or help students to carefully gameplay procedures to develop their abilities and interests.

This research focused on the development of educational game media that utilizes android technology [10]-[11] as a medium in directing the child's career interests. Given that early age has not
seen the talents possessed by children clearly, it needs to be supported by the provision of educational services that one of them through educational media game. This media utilizes the passion of children in the current game model by utilizing android games. As a medium of learning, play very well with the development of children. Children will learn to adapt to their cognitive development with their self-awareness, emotional, socialization, communication, cognition, and motor skills [4].

2. Method
This research is a development of the ADDIE model consist of Analysis, Design, Development, Implementation and Evaluation [10]. The main focus of the research is 1) to analyze the response of early childhood teachers regarding the use of "Edu-Games My Profession" learning media; 2) to develop "Edu-Games My Profession" media product in the form of guidance and material; 3) test the product effectiveness in achieving the goal. The material of "Edu-Games My Profession" includes: 1) pointing the drawing (from the sound of the image to the object); 2) choosing a matching profession with the equipment (drawing selected by profession type); 3) distinguishing two pictures (find the differences); 4) playing puzzles, and 5) concept that explain the understanding of each profession (recognition). Guidelines and effective materials are guides and materials that meet the content clarity aspect. The clarity aspect of the content is validated by an expert of instructional media and career guidance experts by using expert validation tools.

3. Result and Discussion
The result of the research on the teacher's responses shows that teachers have a strong desire to apply Edu-Games My Profession media. The measurement result using the instrument are shown in the following diagram:

![Early Childhood Teachers' Responses to the Use of Edu-Games Learning Media "My Profession"](image_url)

**Figure 1.** Result of measurement of early childhood education teacher responses to Edu-Games My Profession Media

Based on the picture above, early childhood teachers choose to use learning media that shows the elements of the game in introducing the profession to the students. The use of learning media that creates a pleasant learning atmosphere and encourages students' interest in various types of professions realized by teachers as an effort to introduce the early needs of the various professions. Through the Edu-Games Profession media, students will be able to recognize the various types of work related to the potential and interests [13].

The result of validation of media experts shows that the learning media has fulfilled the element of readability and accuracy of image, clarity of clues, and the suitability of the image with the concept of
the profession introduced to the students. The following table shows the feasibility of educational games

| Professional Educational Game Application Dimension | Scale Value | Clarity Value | Category |
|-----------------------------------------------------|-------------|---------------|----------|
| No.                                                 |             |               |          |
| 1. Clarity of application instructions                | 5           |               |          |
| 2. The suitability of question items with indicator   | 5           |               |          |
| 3. The suitability of the image item with the child's ability | 5           |               |          |
| 4. Accuracy of image with the concept of profession  | 6           |               |          |
| 5. The feasibility of the number of professions found in the game | 6           |               |          |
| 6. Clarity of meaning contained in the game profession | 5           |               |          |
| 7. The ease of professional analysis is contained in the game | 6           |               |          |
| 8. The provision of professional Edu Games application in improving the interest of early childhood career | 6           |               |          |

Table 1 above shows that the Edu-Games My Profession application has fulfilled the clarity aspect as an application that can increase the interest of early childhood career. Judging from the aspect of the contents in full application of educational games profession has been feasible for its development and implemented in early childhood education.

**My Professional Edu-Games Material**

Edu-Games My Profession game menu is divided into two main parts, namely the opening screen (Splash Screen) and main menu (Dashboard)

1. **Screen Opener (Splash Screen)**

   The opening screen is the main opening menu of the media which is named "Professional Game for Early Childhood”. This menu is the main view menu of profession-based games android. This menu consists of the iconic main display of professional gaming apps represented by pilot professions, architects, police, and astronauts.

![Figure 2](image.png)

**Figure 2.** The main display of professional gaming applications under the name "Professional Game for Early Childhood Education"

1. **Main Menu (Dashboard)**

   The main menu of the game is a menu which featuring 5 types of professional games are designed to introduce different types of professions. This menu has fulfilled the clarity element of expert
validation results as stated earlier. This menu consists of 1) pointing the image (from the sound of the image to the object), 2) the menu matching the profession with the equipment (the image is chosen by profession type), 3) the menu distinguish the professional image (find different), 4) menu in playing puzzle, and 5) a menu of concepts that explain the understanding of each profession (recognition) through the concept of sound. Some menu of pictures are shown in the following image:

![Menu pictures of Edu Games application above are some of the menus that have been roughed up and have been tried in early childhood education teachers. The results of early childhood teacher responses are summarized in Table 1 which generally indicates that how to use the application is quite easy and students can understand each of the contents of the displayed menu. During the trial use, teachers felt the difference in the design aspect of the message. Messages contained in the media have been fairly easy to understand the intent and purpose.

4. Conclusion
This research development shows that: 1) early childhood teachers understand that the media application Edu-Games My Profession is needed as a medium of learning to introduce various types of professions. 2) early childhood education teachers have understood that the use of Edu-Games My Profession learning media can help early childhood students in introducing interest to various types of profession, and 3) expert assessment result shows that the clarity aspect of the content and application of Edu-Games My Profession has fulfilled the aspect of eligibility contents of professional game material.

Acknowledgments
Further thanks to: Directorate General of Higher Education that has helped fund the first year of leading research universities, to produce research, one of which is an article published in international journals. Lecturer and teacher involved as an expert validator and try to subject decent research products used.

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