KID'S ONLINE TYPING GAME (CABARAN KEYBOARD)

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ABSTRACT

The use of information and communication technology (ICT) is so wide and covers every aspect of life. We have experience of children's curiosity about computer, mobile phones, play station portable (PSP) games etc. Kindergarten students gained learning skills through interacting with multimedia contents. Moreover, multimedia has the potential to create high quality learning environments especially for children, with the capability of creating a more pragmatic learning context through its different medias- texts, graphics, sound, animation etc.

Kid's Online Typing Game (Cabaran Keyboard) is an educational game that is developed to improve the efficiency the kids typing. And also to make the kids know how to spell some words and understand the meaning of the words. This project is also developed to make the kids more exposed to technology.

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PART I

INTRODUCTION

1.0 Overview

The project that was developed is an online game. Online game (web game) is a game that can be run from an Internet browser and requires the Internet connection. In most cases online games are freeware programs that can be used for an unlimited time and are available for free.

The purposes of this project are to improve the efficiency the students typing. And also to make the students know how to spell some words and understand the meaning of the words. This project was developed to make the students more exposed to technology. The use of information and communication technology (ICT) is so wide and covers every aspect of life. We have experience of kid's curiosity about computer, mobile phone, play station portable (PSP) games etc. Primary schools' students gained learning skills through interacting with multimedia contents. Moreover, multimedia has the potential to create high quality learning environments especially for kids, with the capability of creating a more pragmatic learning context through its different mediastexts, graphics, sound, animation etc.

1.1 Problem statement and objective

This section is discussed about problem statement of existing system and also objective those are achieved from the development of this project.

1.1.1 Problem statement

The purpose to develop this system is because in the existing system that are used by users have a lot of problems. The problems that are faced by the existing system are:

- 1. The existing system able to make the kids to learn typing fast only.
- 2. The existing systems cannot improve the kids' general knowledge.
- The existing systems are not suitable for kids to learn spell word in Bahasa Melayu.

1.1.2 Objective

This objective is very important because it determine the goal of a project are achieved. Here are objectives of the project that was achieved in developing this system. Among them are:

- 1. Develop a system that can improve the students typing ability within the time given.
- 2. Develop a system that improve the kids general knowledge.
- Develop a system that can improve kids ability to spell word in Bahasa Melayu.

1.1.3 Scope

The scope of this project also important to make sure the flow of the system will run smoothly.

1.1.3.1 User

This CABARANKEYBOARD game are specially created for students or kids who are age among 7 to 10 years. This game can be used by the students to learn in a new and technology way.

1.1.3.2 Technology

CABARANKEYBOARD game is created using a web technology and use the following software and language:

- i. Xampp application
- ii. PHP language
- iii. HTML language
- iv. CSS language
- v. Javascript language

1.1.3.3 Module

CABARANKEYBOARD game was focused to the 4 modules which are:

- i. Fruit
- ii. Animal
- iii. Thing
- iv. Vegetable

1.1.3.4 Language

Because the students nowadays have difficulty in spelling the word in Bahasa Melayu and also because there many foreign people are more interested in learn Bahasa Melayu, so this system is developed using Bahasa Melayu language.

1.2 The existing system

This section also will review and discuss about the existing system that are related to the project. In this section, we will review the existing game and discuss its limitations.

1.2.1 Type It

This game is all about speed and quick fingers. It challenges our texting abilities. The users have to touch and type as fast as they can to see if they can beat all levels. The users task is to type appearing words as fast as possible to score and collect all achievements. The faster users can handle the keyboard the more points users get. Figure 1.1 show the main page of Type It game.



Figure 1.1: Main page of Type It game.

By playing this game it can improve our dexterity and reduce the number of errors while writing mails, texting SMS, and surfing the web. The game can be used as a training or tutor for typing words using the soft keyboard. It's a training game that should be real fun. The users texting speed and accuracy improves while playing and practicing. This model could possibly be used to improve the virtual keyboards of current smartphones. Figure 1.2 show the Type It game page.



Figure 1.2: Type It game page

1.2.1.1 Limitation:

- i. The user only learn how to type fast.
- ii. The user don't understand the meaning of the word that they are typing.

1.2.2 Fast Type - Keyboard Training

This game is to improve users typing speed with Fast Type. Fast Type allows users to find out how many words the users can type in one minute (Words Per Minute) with using own keyboard. Texting speed improvement guaranty. Fast Type measures how fast users can text random words in one minute: 1 word = 5 letters in average. Typing random words will familiarize the users with their keyboard, and guaranty a speed improvement. This game let users choose the languages they want for improvement: English, French, German, Spanish, Portuguese, Italian: Figure 1.3 show the Fast Type - Keyboard Training page.



Figure 1.3: the Fast Type - Keyboard Training page.

1.2.2.1 Limitation:

i. The user don't understand the meaning of the word that they are typing.

1.2.3 Typing Practice (English)

Typing Practice is the best solution to practice and improve users typing skills while they play on their android phone. This is the right app to get typing speed and accuracy on smart phones. Typing Practice helps to learn fast typing with fun and makes users more productive. Figure 1.4 show the main page of Typing Practice (English) game.



Figure 1.4: Main page of Typing Practice (English) game.

This terrific application comprises of games to learn typing, with loads of letters and words that challenge users to type and finish the game play. Figure 1.5 show the practice page of Typing Practice (English) game.



Figure 1.5: the practice page of Typing Practice (English) game

1.2.3.1 Limitation:

- i. The user only learn how to type fast.
- ii. The user don't understand the meaning of the word that they are typing.

1.2.4 Comparison of existing system and developed system

Bil		Type It	Fast Type – Keyboard Training	Typing Practice (English)	Cabaran Keyboard Game (developed)
1	User interface	Too compact, have keyboard on interface	Too compact, have keyboard on interface	Simple and not to compact	Make interface more simple and user friendly
2	What system can do	Learn to type fast	Learn to type fast using many languanges	Improve the speed of typing	Improve the speed of typing and the knowledge
3	Limitation	User don't understand the typing word	User don't understand the typing word	User don't understand the typing word	Divide to a few category only

Table 1.1: Comparison of existing system and proposed system

1.3 Conclusion

Overall, this report contained three main parts. Part I discussed about the project background which are included the problem statement, the objectives of the proposed system, the existing system that is related to the proposed system, scope and also limitation of this system.

Part 2 will discuss the detail user requirement, method and material that used to complete the proposed system. The final part is it will conclude the whole development process of the proposed system.

PART II

REPORT BODY

2.0 Introduction

This part will be focused on development of a Cabaran Keyboard Game. This part will explain about the user requirement, technique, method that are used to complete this project and also expected results that are we get through storyboard.

2.1 User Requirements

The user requirements are needed and important in order to develop this project. And in order to define the user requirements, a questionnaire and interview had been done.

2.1.1 Pre-production evaluation

A set of questionnaire consists of seven close-ended questions and one openended question was distributed online to obtain feedback from user on the preproduction phase of the courseware development. The questionnaire focused on identifying user's computer literacy and their understanding on coronary heart disease as well as their expectation on having an interactive courseware with 3D models on myocardial infarction. The Survey conducted was participated by users from various backgrounds and as a result it helped to information regarding interactive courseware and cardiac anatomy knowledge.

2.2 Post production evaluation

Evaluation in the post production phase focused on obtaining user feedback and opinion on the courseware upon the completion on the project. The beta version of the courseware was given to them to be evaluated by them before they complete the feedback form.

2.2.1 User Responses

There are two techniques in the evaluation phase, namely summative evaluation and formative evaluation.

The formative evaluation conducted to identify the effectiveness and efficiency of the Kid's Online Typing Game (Cabaran Keyboard). Based on the constructive

response or feedback provided by the users, appropriate adjustments will be applied for the project.

The summative evaluation will be conducted to identify the overall Kid's Online Typing Game (Cabaran Keyboard)'s effectiveness measured upon the project completion. The user feedbacks via questionnaire collected and the contain accuracy, methods and effectiveness of the project will be validated.

2.3. Methodology

2.3.1. Introduction

The methodology that is chosen is an ADDIE Model. Figure 1.6 shows the diagram of ADDIE Model.



Figure 2.1 ADDIE Model.

ADDIE is the generic term for the five-phase instructional design model consisting of Analysis, Design, Development, Implementation, and Evaluation. Each step has an outcome that feeds into the next step in the sequence. This model guides you through the process of creating effective educational courses and materials for your user.

2.4 Phases in ADDIE model and description for Kid's Online Typing Game

2.4.1 Analysis phase

The analysis is the most important step in the process. It helps to determine the basis for all future decisions. A mistake that many beginners make is not conducting a proper analysis at the beginning. It is this analysis that helps you identify your audience, limitations or opportunities, or other important points that will be useful in the design process. During analysis, the designer identifies the learning problem, the goals and objectives, the user's needs, existing knowledge, and any other relevant characteristics. Analysis also considers the learning environment, any constraints, the delivery options, and the timeline for the project.

2.4.1.1 The users and their characteristics.

The target users for the Kid's Online Typing Game (Cabaran Keyboard) are kids between 7-10 years old, foreign people or anyone who is seeking for a game that can improve their typing ability. Thus, the learning behavior of above listed users and the