2D Games "Go Flu Away"
Influenza Education, Information and Awareness

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Abstract—influenza viruses are usually one each of the viruses that popular among us that even are called "the flu" and it's the communicable disease. There are four types of influenza but common influenza or famous influenza that always attack human is Influenza type A, type B, and type C. Studies were conducted to identify certain people that did not care and aware about the influenza and provide one interactive platform such as 2D games to give them education, information, and awareness about influenza virus. In this game, the AGILE model is used as a guide while manufacturing this game. This is the best method to provide the simplest method and easy step to follow to implement in this game. The step in this methodology is to plan, design, develop, test, release, and feedback. Based on the research, mostly youth generations are now less concerned to find out or to worry about the virus danger of influenza compare to other generations. So by developing this interactive game, the youth generation can discover and understand where the illness comes from and obtain more data or signs of influenza and how to avoid influenza virus by using attractive interfaces and content to attract young generations. Overall, this interactive game is very good to help people become more aware of this influenza virus, so people are not easily infected by the influenza virus. The results of the study that have been collected show that they are satisfied with it and successfully make this as an interactive game at the same time gain knowledge about the influenza virus. This interactive game will help people not easily get infected if users are using all the information and awareness implemented in this game

Keywords—2d game; influenza virus; interactive; education and information

I. Introduction

Influenza is typically one of the viruses that is an infectious disease. There are four types of influenza. Influenza A, Influenza B and Influenza C are the normal influenza or the famous influenza that often affects humans. Type D has not been reported to infect humans. This virus is transmitted by air such as if we cough and sneeze. Therefore, if they don't follow the protocol to cover their mouth if the cough or sneeze, this virus is easily infected by humans. 2019-2020 influenza seasons based on comparison by (Grohskopf LA,2019). Annual outbreaks of influenza are spreading across the world. Vaccines in America only give person less than 6 months of age because activity remains high as of mid-February 2020.

Currently knowing or caring about the influenza virus or any current disease problem that exists in our country is less worrying in Malaysia, particular for younger generations. There are different approaches to attracting or raising public or adolescent consciousness about the dangers of the influenza virus that afflicted our nation today, such as creating video, graphic information, gameboard, and others.

Anything that can make adolescents particularly interested in playing and joining the public. So we creating a single platform that will give them benefits such as mobile games, hopefully sneezing can help them cope with influenza viruses. By coincidence, there will be something to learn through the game. Nowadays, as we know, young generations are very lazy to learn and take care of the issues because they tend to play games that don't benefit to them. So we developed one game and try to make the background game more interesting and provide animation in the games to attract users. This game is intended to provide younger generations with knowledge and information.

II. Problem Statements

Many younger generations are not aware of their health and about influenza virus disease. Therefore, this analysis was carried out based on the problems, as we agree. Therefore, this analysis was carried out on the basis of the problems listed below.

- Many individuals did not recognize this influenza virus or were less worried about it. Most individuals behaved as they were able to handle themselves at home with the flu and did not take action such as taking vaccines or running to the hospital.
- Mostly are not aware that influenza viruses they're already infected and ignore to go to the hospital.

III. Research Objectives

The advancement of research is to provide a better understanding for young generations of the relevance of this virus problem and knowledge of influenza viruses. The aims of this analysis are:

- Identifying the causes, signs, consequences and strategies of influenza virus prevention.

- To build game-based learning using applications in 2D and UNITY.
- Identifying the efficacy of the 2D game and raising awareness of influenza viruses and informing consumers.

IV. Research Methodology

Figure 1: AGILE model

The AGILE model breaks the project into several steps or method. A stage determines what operations are carried out. The project phase is planning, designing, developing, testing, releasing and feedback. The approach used for this project is shown in Figure 3.1

A. Plan

At this point, the course begins to develop or designed. It's the first fundamental stage in which the need for software application or product is evaluated. For growth, the user requirements are collected. Agile planning focuses on finding the answers to a simple question, such as what to create when it will be finished, how much it will cost and who should be involved, and so on. (Rastogi ,2015) The planning is to establish the aim of the project, use this planning to identify the issue first on the current project and analyze what the current project needs and then make a goal why the project needs to build this android framework. A work plan will be prepared during this process.

B. Design

At the phase start designing the courses at this point. The design comes up with what will be used for the GUI and then will be possible to add it to the production of Android. The next step is the design of where to store the data. At this point the researchers will be heavily driven by the storyboards fit the design process, each aspect of the course e should be created. The center of the content has already been determined. A level of detail and polish to the courses is all you need to add. By adding graphics, selecting colors, and deciding on fonts, everything is achieved. The careful choice of these elements makes it possible for you to present the course in a way that will appeal to the audience. This stage also consists of a diagram, of how the project would look and work and of several book layout interface designs.

C. Develop

The development needs to process the application in this phase. To ensure the coding feature on the android application, this project needs to correctly code the application. The method of growth should be iterative. The creation includes the design of the interface and coding in the software programmed, the link on the android application after that code, testing them any for application error. Based on specified specifications design and develop software.

D. Test

In this phase, to see if the application will work in real life, the application will be tested on the public. This stage is acceptable or not to see the user's survey to understand this android programmed. If there is an error time search, the fix will be completed as normal immediately for the project to run. To ensure that there is no fundamental error in the development of the game, the course software should be reviewed and evaluated.

E. Release

A release is the delivery of an application's final version. A release of software may be public or private and is usually the initial generation of a new update application. Distribution of alpha and then beta versions of the programmed is followed by a release. Quality monitoring, internal and external training, as well as recording and reporting are put into development.

F. Feedback

For any improvisation or changes at a later stage or level, input and analysis are gathered from viewers and the lecturer and work on the specifications of the next iteration. To ensure the better design of the code framework can be updated based on user input and user reviews. It may require adding functionality or structuring the appearance of the user interface. (2015, Rastogi)

V. Results And Findings

This part are discusses about the method of used in the testing development of games "Go Flu Away". Analysis of the outcome involves all selected guidelines deemed important to the consistency of the prototype. As the first aim is to identify software and hardware faults so that the defects are also discovered and repaired, testing is very necessary.

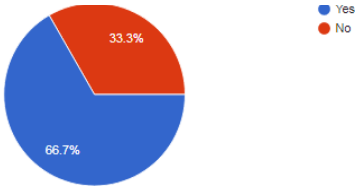

Figure 2: Do you know about Influenza Viruses?

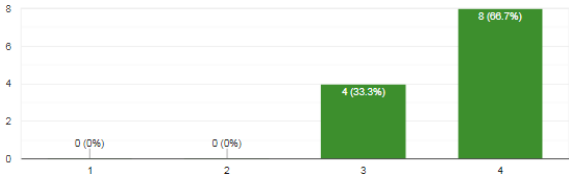

Figure 3: How friendly these Go Flu Away game to users?

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