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GAME OF THRONES TRIVIA

Table of Contents

INTRODUCTION:	
LITERATURE REVIEW:	3
OBJECTIVES:	4
PROJECT INTENTIONS	4
PROJECT SPECIFICATIONS AND FEATURES	5
METHODOLOGY:	5
UML DIAGRAM: CLASS DIAGRAM	7
CONCLUSION:	8
REFERENCES:	9

INTRODUCTION:

An app game is usually undertaken as an educational tool, entertainment and fun. These games are played for enjoyment, sometimes for achievement or reward as well. These days, there are numerous games accessible on different subjects, going from fictional games to science and innovation. As innovation has progressed, the appeal of playing games has expanded, with more visual improvement, imagination and fulfillment. Quiz games are popular on television game shows, radio game shows, board games and recently on apps. Keeping this in mind, I have taken an interest to base my quiz game on a popular television series known as Game of Thrones (GoT).

Mainly, the goal of quiz games is usually to answer all the questions correctly. There are numerous types of quiz games. The goal of some of these games is to win the game by answering the questions within the time limit, while some of these games are played to beat other opponents scores. After extensive research, basing the quiz game on one of the worlds largest television series, GoT which is the adaptation of George RR Martin's epic fantasy book series gives me plenty of resource material to base my quiz on. At its best, GoT was addictive and unmissable TV, loaded up with extraordinary lines and really astonishing and all-around memorable moments.

LITERATURE REVIEW:

1. Quiz for GoT was released on November 24, 2016 on Android. It is developed by World of Quiz. It is a free to play quiz game that incorporates in-app purchases. The game has had over 100 000 downloads with a 4.2 rating on the play store. Players are required to pick which season they want to be quizzed on thereafter the game is broken down into levels, each level must be completed before moving to the next level. A level consists of 10 questions and the user must answer 8 of these questions correctly to unlock the next level.

Some of the key features in this system which I plan to implement are the game having multiple levels with each level requiring completion before moving to the next. The game also gets more difficult as you progress through the levels. I will also be using a similar scoring system that was used in this game but mine will keep track of all the levels with a total score at the end instead of only individual levels. Some of the downfalls of this system are questions are poorly written with some of them having incorrect answers. Another significant letdown of this system is that it's not based on the entire series and only goes

- up till season 4 out of the 8 seasons that are available. My game will consist of three levels with each level having its own unique set of questions that are based on the entire series.
- 2. Quiz planet- Game of Thrones was released on July 4, 2017 on Android. It is developed by Monster Planet corp. It is also a free to play quiz game that incorporates in-app purchases. This game had over 50 000 downloads with a 3.8 rating on the play store. The game is made up of 202 stages, the user is required to complete each stage before moving on to the next. Each stage comprises of 5 questions with each question having 4 possible answers. The user must pick an answer before the timer runs out.

The areas of this system which I plan to take inspiration from are the easy to navigate and well-designed interface. Another aspect I plan on implementing from this system is the use of a timer on each question, I will implement this as part of the visual feedback in my system along with displaying the player's score. However, the shortcomings of this system are that it takes a long time to load each question along with repeated questions means that the users gets frustrated quiet often. Online reviews have said that the game is "boring and unchallenging". I plan on using this research to prioritize efficiency and an easy-to-use interface that will give users a pleasant experience when using my program.

The key aspects where my program will differ from these systems are that both games have an overflow of advertisements while mine will have none. One of the main features that my program will implement that these systems don't is the use of a leaderboard, this will allow users to compete by comparing scores.

OBJECTIVES:

PROJECT INTENTIONS

- To create a well-organized and user-friendly program that does not require any training to use.
- Program the quiz game using the C++ programming language with the game of thrones theme driving the development.
- To program a fun and interactive game that keeps the user engaged and wanting to keep playing.
- To create a competitive environment for users to compete to showcase their knowledge on the Game of thrones series.

• To create a quiz game to run fluidly and efficiently on windows 10, 8 and 7, which will limit the potential for bugs and appeal to a larger user base.

PROJECT SPECIFICATIONS AND FEATURES

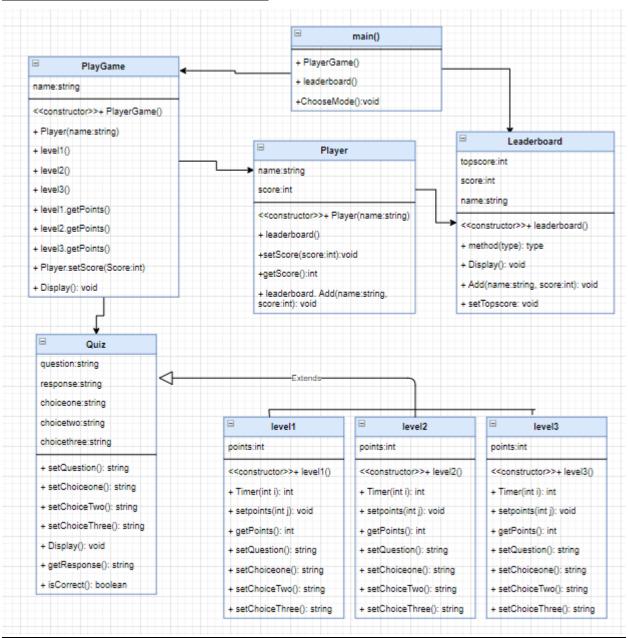
- Multiple choice questions-This comprises of multiple potential answers, from which the right one should be chosen
- Time limit-By setting time cutoff to each question in the game. This will add an extra level of complexity and make the game more challenging.
- Scoring system- assigning points for each correct answer
- Multiple levels-the questions will get increasingly more difficult with each level and the players will get the inclination that they are making progress with the game.
- Leaderboard -players will have the ability to post their score to a leaderboard. This will give the players the ability to compete with each other.

METHODOLOGY:

- I will be using the C++ programming language on code blocks as my integrated development language (IDE). This will help ensure that my program is efficient and reliable so that the user will have an enjoyable experience.
- The user will be presented with each question individually with three possible answers. The user will then be prompted to enter their answer. The program will then evaluate the users answer and display if its correct or not.
- My program will provide the user with visual feedback on his or her progress throughout the different levels of the game using a progress bar. The user will also be able to view the current score while playing the game as well as the time limit on each question.
- By having a quiz class as the parent class and each level as a separate child class I will be able to set different time limits as well as scores that can be achieved for each level. This will also allow me to have the questions increase in difficulty as each level will be able to access its own questions instead of all the questions being stored in one place for all three levels.
- My program will have an easy to use and navigate interface that will require no training to use.

A leaderboard will be used to store and display the names of each player as well as their score furthermore a sorting algorithm will be used to arrange the scores in descending order.

UML DIAGRAM: CLASS DIAGRAM



CONCLUSION:

In conclusion this proposal has discussed the key areas which must be followed to create a competitive quiz game that users will enjoy. Through my research done on related systems, I have learnt which aspects of quiz games are popular and how my program will differ from those which are currently out there. My objectives and methodology have outlined the goals which my program will be based on. The class diagram has shown me the basic structure, along with the rest of the research done in this proposal has provided me with the building blocks to implement my program. My program will test the user's knowledge on the game of throne series and provide an enjoyable and entertaining experience while being easy to navigate.

REFERENCES:

Hughes, S., 2021. *Game of Thrones: how it dominated the decade – then lost its way*. [online] the Guardian. Available at: https://www.theguardian.com/tv-and-radio/2019/dec/30/game-of-thrones-best-tv-2010s [Accessed 24 April 2021].

Play.google.com. 2021. [online] Available at: ">https://play.google.com/store/apps/details?id=pl.swiatquizu.gotquiz.android&hl=en&gl=US>"|Accessed 24 April 2021].

ResearchGate. 2021. ResearchGate | Find and share research. [online] Available at: https://www.researchgate.net/ [Accessed 24 April 2021].

World of Quiz. 2021. *Game of Thrones Quiz - World of Quiz*. [online] Available at: https://world-of-quiz.com/game-of-thrones-quiz/ [Accessed 24 April 2021].