RESEARCH INTO THE SIMULATION OF SHOCK WAVES

Requirements for GUI

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Disclaimer

The features outlined in this document may be subject to change throughout the development of our project to accommodate the features created in the backend.

Introduction

This document will cover the initial requirements and components set out for the graphical user interface, decided upon at the beginning of our project, as well as covering the reasoning why these were selected.

Requirements

The below requirements have been decided upon by the entire project group, as we all feel these features are vital aspects for a fully user-interactive system. As such, we will aim to implement all of these in our final simulation.

Reference Name	Feature	Description
Home-01	Start button	This button is on the homepage and when pressed will display an overlay to either create a new scene or load a scene.
Home-02	Help button	This button is on the homepage and when pressed opens a page which describes what the program does.
Home-03	Quit button	This button is on the homepage and when pressed is closes the program.
Option-01	Create Scene button	This button is on the options screen which appears after the Start button is pressed on the main menu. Once pressed it opens an empty scene into which the user can place objects.
Option-02	Load Scene button	This button is also on the options screen. When pressed it opens a list of pre made and saved scenes each of which can be selected and loaded.
Pause-01	Save Scene button	Exists within the Pause menu of the open scene. Once a scene has been edited, it can then be saved under a new name; making it available in the load scene list.
Scene-01	Prefab menu	A menu which holds assets. Users can drag assets into the scene or remove assets from the scene using this menu.

Scene-02	Pause button	This button on the scene control menu will halt the scene running and resume when pressed a second time.
Scene-03	Time slider	This slider is on the GUI. Moving the slider affects the speed of time at which the scene plays at.
Scene-04	Wave shape	This dropdown on the scene control menu allows the user to change the shape in which the shock wave spawns.

Evaluation

A reflective analysis of the GUI has been written, based on the aforementioned requirements. This file is called *"Graphical User Interface Evaluation"*.