GRIFFITH COLLEGE DUBLIN

Assignment Cover Sheet

Student name: **Thanh Phuong Hoang**

Student number: **3135433**

Faculty: **Computing Science**

Course: **Computing Science**   **Stage/year:**   **2**

Subject: **Software Development 2**

Study Mode: Full time   √   Part-time

Lecturer Name: **Gemma Deery**

Assignment Title: **Review 3**

No. of pages: **2**

Disk included?   Yes   No

Additional Information: (ie. number of pieces submitted, size of assignment, A2, A3 etc)

Date due: **30/04/2025**

Date submitted: **30/04/2025**

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Signed: Thanh Phuong Hoang   **Date: 30/04/2025**

Menu System

I designed and built a complete main menu for the game using Java Swing. This gives players a straightforward way to either begin playing or exit the application cleanly.

To get the game started from the menu, I linked the "Start Game" button directly to the main part of the game's code. I also added a pause feature (activated by pressing ESC) with an overlay, and a "Quit" option (activated by pressing Q) during gameplay, making it easier for players to control their experience.

I developed the menu's look and logic in its own dedicated section of the code, which helps keep things tidy and separate from the core game mechanics. To ensure everything worked as expected, I created a set of automated tests. These tests checked if the "Start" and "Quit" buttons were present and labelled correctly, if the menu window had the right title, and if clicking the buttons triggered the right actions. For the "Quit" button tests, I even used a special trick to prevent the game from fully closing during testing.

Throughout the development of this menu, I followed a structured approach using Git. I worked on a separate "menu-feature" branch, saved my changes frequently with descriptive messages, handled any conflicts when combining my work with the main project, and finally integrated the completed menu into the main game.