

## Year 10 Computer Game Software

This year students have focussed on developing skills in Unity3D Version 5. What is that? It's the state-of-the-art game engine widely used to create popular contemporary games that many kids and adults alike are totally obsessed with.

Guided mainly by the tutorials at Unity 3D official site, coupled with classroom teaching, our budding Rossmoyne game makers have successfully created a variety of simple 2D and 3D desktop, as well as mobile games.

Even though Unity3D is cross-platform, most students have compiled their work to play in Apple MacOS, a few, in Windows environment. All games included are in Apple format.

### How to play:

-WASD (or the 4 arrow keys) to move forward, left, backward and right respectively.

-Press Command Q to quit.

[Click here to download the games](#)

*If you have troubles opening the games; please follow the procedures at the end of this article.*

### 1: Island In The Sun

This work was created in the early part of the year. Students created a terrain which you-the player-can explore by pressing WASD or the 4 arrow keys.

### 2: Racing Car

Students had developed two versions of this game. One was intended for the desktop, the other for mobile devices like smart phones and tablets.

In this game, our student developers first created the scrolling background. Henceforth the game engine spawns enemy cars, based on a timer logic programmed by the students. You, the player, must move the car left and right to avoid crashing into oncoming enemy cars. The objective is to stay in the game for as long as possible by avoiding the inevitable, game-ending crash.

Note: Only desktop version is uploaded here.

### 3: Platform Game

Here our student developers created an animated cartoon character that can move, jump, flip right and flip left on a platform in order to collect the golden coins. Whenever the character collides with the platform, the platform falls away into the Neverworld.

The character will stay in the air for a moment before a new platform is spawned. The objective of the game is to collect as many coins as you can. The game could make our character filthy rich and go on forever.

### 4: Roll-a-Ball

In this game, you, the player controls a ball rolling around the game board. You must follow the path on

the game board and pick up as many collectible objects as possible. The game ends when all the collectible objects have been picked up.

In conclusion, as simple as these works may look, they have been very challenging to develop, particularly debugging the C# scripts. Many students have to be commended for their tireless effort to ensure their games work as intended. Many took challenges upon themselves to develop games that are far more sophisticated than what was required.

Our school endorses National STEM\* school education strategy and much emphasis is placed on preparing our students to be more future-ready. Accordingly through this unit, we have exposed our students to multiple experiences, such as coding, physics as well as the creation of both desktop and mobile games. There is little doubt this is a significant step forward towards addressing STEM.

(\*Science Technology Engineering and Mathematics)

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Computing Teacher

## How to open the zip files

Depending on your MacBook Operating System, you might encounter different problems while opening these files.

A. For MacOS Sierra, please follow the following procedure:

1. Click to download the zip file, for example, Andy\_PlatformGame.zip
2. If the following notification as shown in Figure 1 appears when you try to open the game, right-click (or tap on track pad with 2 fingers) to open the file.

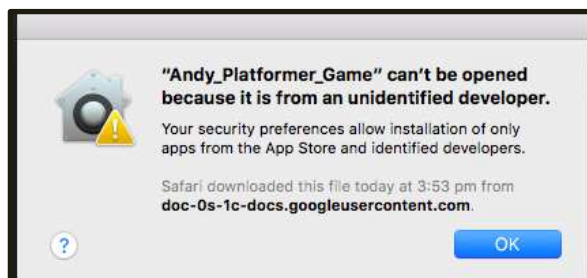


Figure 1

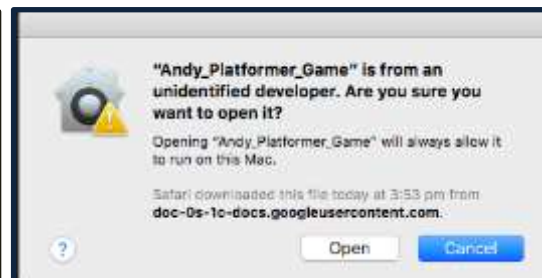


Figure 2 Now You Can Open The File

B. For Operating System before MacOS Sierra, you might encounter the following problem when starting up the game.

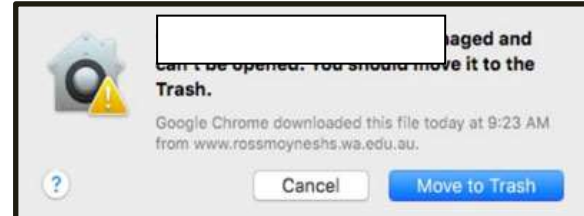


Figure 3

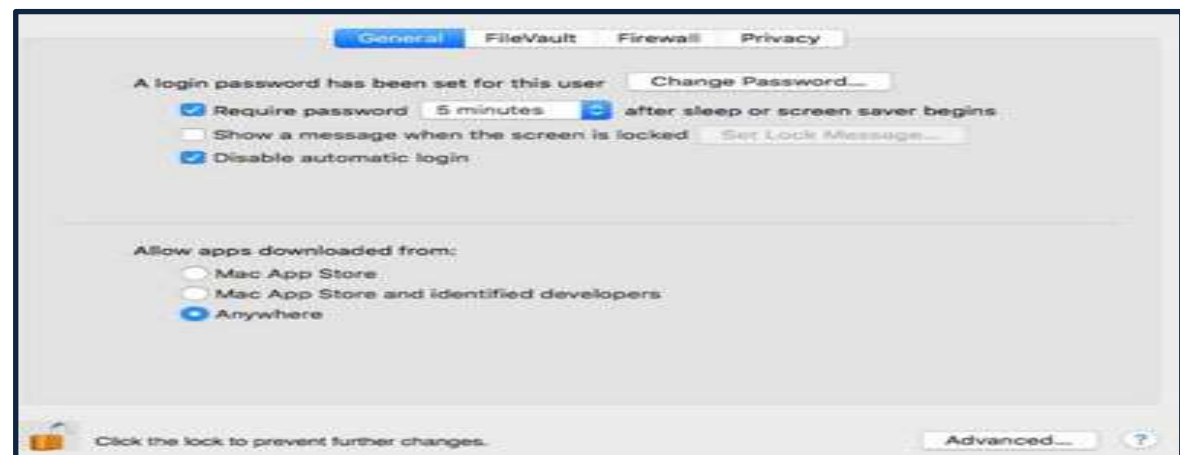


Figure 4 Please Change The Security & Privacy in Systems Preferences shown.

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