

C++ Programming II: Final Project

Zinedin Bautista

Professor Alex Lai

University of Advancing Technology

C++ Programming II

August 13, 2019

### C++ Programming II: Final Project

#### **Description:**

For my C++ Programming II, I decided to create an interactive story about an agent who works at a company called Dystopian Inc. As the user of the program goes out to adventure as the agent working for Dystopian Inc. They will be faced with different scenarios all which lead to a different ending. Which is all depended on what the user of the program decides to do if they were stuck in that scenario. As the user continues there adventure in the interactive story, they will also be able to play three minigames. These minigames are word decryption, hangman, and Blackjack.

The program will layout an introduction to the story. As the different scenarios are printed out and presented to the user, they decide the faith of the agent on what word or number they type depending. On what the instructions state what type of data structure, the program wants to be inputted. Also, when the time comes, the application will display a set of instructions on how to play each minigame, and as the user performs the minigame, a UI will be displayed. Showing the progress of the user in whatever minigame they are playing.

#### **List of the 10 (out of 14) features that I applied in the project.**

1. Opening screen with a description of the application and instructions
2. Menu for the user to choose options
3. 4 classes
4. Inheritance (minimum 2 derived classes)
5. Dynamic Polymorphism
6. Encapsulation

## C++ Programming II: Final Project 3

7. File input and output processing OR network communication (e.g. remote data storage)
8. Vectors
9. Iterators
10. Boost Library (or any library other than the STL)