Taladone: An Island of Adventure is a text based adventure game that takes place on the fictional island of Taladone. The player lives in the Town of Davenrun. Davenrun is the main town of the island that’s in the central field. There are five sections in the island. The Central Field, the Northern Woods, the Eastern Graveyard, the Southern Ocean, and the Western Mountain. Inside the town, there are dozens of characters you can interact with, two stores to buy and sell inventory items, an arena to fight different creatures. a casino to play card games, five quests under the order of the Jarl of Davenrun in his Palace, 15 side quests, an Inn to hear gossip, a well to health your battle wounds, and your personal house to save your game status. The town has a gate in which you can travel to different parts of the island for a main quest to fight mysterious creatures as well as the quest boss of the game. In the final quests, you go to the abandoned church and fight the final boss of the game: The Sum of all Diabolical.

The Software System will be implemented using the Java programming language utilizing a 13 Table Database which is the essential data of the game to be saved which created with the SQL Database language. Each location of the game will be implemented using Javafx and fxml controllers. When a player moves a direction or goes inside a building, Cave, or Dungeon, the controller is called from that controller. FXML is an easy way to layout the components of each character. There are 6 linked list objects used in the games to represent inventory items from either the store or the player. When the player saves the game, the data in the data structures or objects is stored in the Database. Player enemies are stored in a queue of string so they can simply managed and the player can fight multiple enemies per action. An array of Booleans are also used so tell whether a cave or dungeon has been cleared or how many quests you can completed form the Jarl of Davenrun. Those are stored in the database as well. The software is “Codecentric” with a focus on user interface implementation rather than “Datacentric” which is more focused on SQL manipulations rather than code manipulation. In either Software implementation method, it would still have a focus on user interface design.

Final rubric:

10 – points name, section, in comments

10 – expands class concepts

60 – Javafx controllers for Davenrun with Data structures use

20 – Database saves and loads game

Here is my main source for the fxml and the book

*(2013). The elder scrolls V. Skyrim. Rockville, MD :Bethesda Softworks,*

Murach Joel, Micheal Urban, “*Murach’s Java Servlets and JSP 3rd Edition”*  Fresno, CA: Mike Murach & Associates INC.

Fedortsova, Irina. “Creating a Custom Control with FXML.” *Docs.oracle.com*, Oracle, Jan. 2014, docs.oracle.com/javafx/2/fxml\_get\_started/custom\_control.htm.

Psudocode example for outside :

Create global variables for components as made in fxml

initialize method{

set up the components in fxml layout, and set conditions of those variables.

}

Doaction method {

Allows users to pick a method to interact with a character

}

Doaction2 method {

Allows users to pick a method see components of their inventory lists

}

Fillmap method {

Fills the minimap of the town of davenrun

}

Stats method {

Allows user to see your stats in the gui of the game

}

Close window method {

Closes the window of the game

}

Create methods for location actions which could be character interactions, attacking an enemy, moving character or a town activity. ‘

Uml for driver

|  |
| --- |
| Class: public class Taladone\_an\_island\_of\_adventure extends Application |
| ButtonType buttonTypeOne = new ButtonType("Yes");  ButtonType buttonTypeTwo = new ButtonType("No");  int health = 100, attackdamage = 100, armor = 0, bank = 100, Game\_ID = 0, Jarl\_level\_count = 0;  ButtonType buttonTypeCancel = new ButtonType("Cancel", ButtonData.CANCEL\_CLOSE);  TextInputDialog dialog = new TextInputDialog("");  String test;  private Player player;  Optional<String> inputresult;  // InsidehouseController insidehouse = new InsidehouseController();  Stage primaryStage = new Stage();  private Player you; |
| public void start(Stage primaryStage) throws IOException  public static void main(String[] args) throws SQLException  public void create\_name() throws IOException  public void confirm\_name() throws IOException  public void startgame() throws IOException  public void load\_game() throws ClassNotFoundException, IOException, SQLException  public void intionalize\_game() throws ClassNotFoundException, SQLException, IOException |

Uml example for a location in the game

|  |
| --- |
| Class: public class OutsidehouseController implements Initializable |
| String intro = "Your house in the town of Davenrun in \n the center of the great mysterious island on the Irish sea. The year is 1215. Davenrun is the flesh and blood of the Talendone,\n the mysterious island that rules this land. \n Where adventurers like yourself can go to escape the harsh realities of life. \n There are rumors of the creatures that are thought to be tales told to us when we kids. The island would be a hell where sinful men go to die, \n but is a haven of adventure of opportunity if you are willing to risk everything, \n even your life to do so. \n As you walk outside, you are ready to explore your new home. \n You came from a land form away from Talendone. As you walk outside, you are ready to explore your new home. \n. This is your new life and now you must make use of it, for you are an adventurer…. \\n Or a fool. That is a faith that is up to you for decide.\n You are at the most northern part of the town.\n You can either go south, west, or east. You notice a group of five people standing in your neighborhood. What would like you to do?";  private Inside\_good\_storeController lists;  public static LinkedList<goodItem> gooditem = new LinkedList<>();  public static Weaponlinklist Weaponitem = new Weaponlinklist();  public static Armorlinklist Armoritem = new Armorlinklist();  static int MapHeight = 4;  static int MapWidth = 3;  static ArrayList<Character> row1 = new ArrayList<Character>(MapWidth);  static ArrayList<Character> row2 = new ArrayList<Character>(MapWidth);  static ArrayList<Character> row3 = new ArrayList<Character>(MapWidth);  static ArrayList<Character> row4 = new ArrayList<Character>(MapWidth);  goodItem ring = new goodItem("1", "Ring", "Taladones ancient rings of the Northen woods. Said to links back to the warriors to carves them from the depths of caves of the northen woods", 10, 30);  goodItem ruby = new goodItem("0", "ruby", "Ruby", 0, 10);  Weapon sword5 = new Weapon("4", "sword", "sword", 140, 30);  Weapon ax = new Weapon("5", "ake", "ake", 100, 30);  Armor plate = new Armor("0", "armor", "armor", 100, 30);  Armor plate2 = new Armor("1", "armor", "armor", 100, 30);    @FXML  private TextArea prompt;  @FXML  private TextArea current;  @FXML  private ComboBox Actions;  @FXML  private Button Go\_inside;  @FXML  private Button Go\_South;  @FXML  private Button Go\_West;  @FXML  private Button Go\_East;  @FXML  private ComboBox Look;  @FXML  private Button button;  @FXML  private Button button2;  @FXML  private Button Player\_stats;  @FXML  private TextArea stats;  @FXML  private TextArea Map;  Player player; |
| public OutsidehouseController();  @Override  public void initialize(URL url, ResourceBundle rb)  public void intionalize()  public void fillmap()  @FXML  private void doAction(String listItem)  @FXML  private void doAction2(String listItem)  public void go\_inside() throws IOException  public void go\_south()  public void go\_West() throws IOException  public void go\_East() throws IOException  public void steve\_helderhan()  public void unkown\_person()  public void Adrian\_Hoderson()  public void Joel\_Orion()  public void Nigel\_williams()  public void Armorlist()  public void weaponlist()  public void goodlist()  @FXML  public void closeWindow() |