# CSCI 6461 Computer System Architecture Project Part 2 Design Notes

#### Team - 5

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#### Classes

# Simulator.java

All of the instructions needed to move data between memory and general-purpose registers, between processor registers and I/O devices, and to carry out operations like conditional movements are contained in this file.

## Constants.java

All of the constants used in the simulator's design are defined by this class.

# MainFrame.java

Methods for updating the user interface (UI) are included in this class.

### Memory.java

This class provides a 2048-word capacity that can be increased to 4096 words, simulating memory for the CISC architecture.

### OpCodes.java

This class defines the opcodes used in the simulator.

### Register.java

This class gives the size of the register and represents a register in a computer system that can store a binary value.

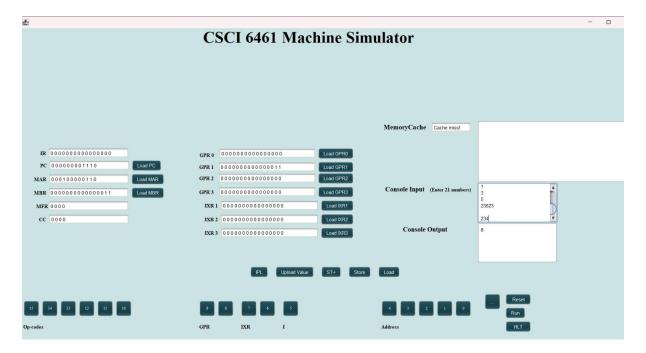
### Util.java

This is a utility class that implements general-purpose word conversions.

#### Word.java

This class represents a word in the simulator, capable of holding a 16-bit binary value.

# **GUI**



In part 2, we added a Program 1 load button to load Program 1 and developed an extended text box to show the Keyboard Console, Printer Display, and CACHE at the bottom of the GUI.