CO453 Application Programming

Week 3 - C#

Scissors Paper Stone Project

Programming Project

Using C#

The Scissors Paper Stone Game

Basic Rules

- **<u>You play against the computer</u>**
- <u>Player</u> chooses either: Scissors, Paper or Stone
- <u>Computer</u> also chooses one of these at random
- **<u>Possible results</u>**
  - If player and computer choose the same thing, the result is a **<u>Draw</u>**.
  - Scissors **<u>win</u>** against Paper
    (because scissors cut paper)
  - Scissors **<u>lose</u>** against Stone
    (because stone blunts scissors)
  - Paper **<u>wins</u>** against Stone
    (because paper wraps stone)

The Basic Program

(see notes for Extension work)

Change the Existing Program (SPS Project)

- Change <u>colours</u> to your own choice.
- Get <u>all</u> computer choices to be described correctly, instead of "NOT YET DETERMINED"

  e.g. **The computer chose STONE**
- Get the program to show all <u>results</u> correctly
  e.g. **THE COMPUTER WINS** or **YOU WIN**
- Get the program to <u>draw</u> the computer choice as well as the player choice (pictures are included)
- Add a variable for the player **name** and add code to pick up the name at the start of the program.
- The player name should be used wherever possible

  e.g.   **What is your choice, _Brian_?**

  Brian picked SCISSORS.

  The computer picked PAPER

  Brian WON!!
- The program should work for both upper and lower case inputs

Project

Deliverables

Your Log Book

1. **Source Code (fully commented)**

2. **Author name, date, project title etc.**

3. **Sample outputs from program execution**

4. **Class Diagrams**

5. **Completed Test Plans**

6. **Commentary on success (or otherwise)**

The Last Slide