Pre-Lab Write Up

Name: _____Josh Benner_____

Lab: _____4 _____

- Describe in English what this program is supposed to do (not how it does it). This should be able to be your class comment at the top of your program:

This program generates a random number between a range determined by the programmer and records the number of guess/games played and returns statistics to the player about how they did overall.

- List the separate tasks needed to accomplish what you described in part 1. This should be the individual methods you are going to have in your program:

I need a method that introduces the game. A method to play the game and a method to display results.

- For each of the tasks in part 2, describe in English what they are supposed to do (not how they do it). Additionally, note any information each of the tasks need to accomplish their goal as well as any information they need to give back. These should be able to be used as your method comments in your program:

To introduce the game, I need to set up a method that accepts one parameter: max range of the game. This method doesn't need to return anything it just needs to display how the game works when called in the main function. The method to play the game needs parameters guess made , random number, users guess, scanner and the range of numbers to guess.
I need to stay in this method until the user guess the correct number and I need to return the number of guess it took to get that number. To display the reuslts, I need to pass the guess made, the number of games played and the best game score. I will then need to display the vital information when this method is Called and I do not need to return any values.

- For each of the tasks in part 3, give a brief description in English of how you plan to accomplish the task. This should be almost pseudo-code, but it should all be in English instead of having the code like structure:

In main:

Introduce and initialize variables.

Call intro and pass max Range

In intro Method: print out Rules of the game and tell what the range is.

Back to main:

Use do while loop to play multiple games as long as user says yes to play.

Generate random number

Ask user if they'd like to play and store input

If user wants to play call Play game method.

In PlayGame method: pass guesses made, random number user guess scanner and Max range.

Create while loop to allow user to guess until they get it correct

Prompt user to guess

Store guess

If guess is too large so too high

If guess is too small say to low

Else guess is correct.

Increment guesses made

If guess is correct and guess is 1 say you got it on first try.

Return the number of guesses made.

Return to main:

If user say no to play then print goodbye and exit

store the best game played

Increment the number of games played

Check to see if the user said yes or no to keep playing.

call method to print results when user no longer wants to play pass guess made, games played
        and best game to this method

Enter results method:

Subtract 1 game from the increment.

Print out the number of games played

Print out the total guesses made

Calculate the guess made per game

Print out the guesses per game

Print out best game played

Exit results method.

Return to main method.

And exit code.