

# Lab 02 - Streaming, Expressions & Variables

**Direction: Submit typed work in the Labs directory of your github repository and/or as an attachment on Google classroom under the accurate Lab02 assessment. All submissions should have their appropriate extensions.**

## Part A: In class

Your objective is to write a complete C++ program. For each of the following English statements

- ☐ Two integers are positive consecutive odd numbers.
- ☐ The character is a lowercase vowel.

write code that

- a. declares a variable for each of the unknown values in the statement. Make sure to use acceptable data types.
- b. prompts the user to provide a value(s) for the variable(s), and then, store the input(s) in the variable(s). Have a separate prompt for each variable.
- c. assigns a bool variable a bool expression that represents the English statement using the variable(s) as the unknown(s).
- d. displays the value of the bool variable preceded by the string "Result: ". The string and bool value must be on its own line.

## Part B: Take home

Your objective is to write to write a complete C++ that

- a. Prompt the user and store their inputs in acceptable variables for
  - ☐ a name (it may contain a space)
  - ☐ an adjective
  - ☐ a noun (may contain spaces)
  - ☐ a pronoun
  - ☐ a part of the body (may contain spaces)
  - ☐ a positive number

- b. Display the message below in the exact format

Please excuse *name*,  
who is far too *adjective* to attend *noun* class. Furthermore, *pronoun* is sick  
with the *part-of-the-body* flu. It will take *positive-number* days for *name* to recover.

where *name*, *adjective*, *noun*, *pronoun*, *part-of-the-body*, and *positive-number* are the values of their respective variables from the previous step.

- c. After the body of the main function, write a trace table list of the main function with the inputs

```
("Alex Jane", "anxious", "chemistry", "she", "eye", 12)
```

as a comment