**Assignment-1**

1. In the below elements which of them are values or an expression? eg:- values can be integer or string and expressions will be mathematical operators.

\* ----- expression

'hello' -----string

-87.8. ------integer

- ------expression

/ -------expression

+ -------expression

6 ------integer

2. What is the difference between string and variable?

A Variable is a store of information. This can be chosen by us. A variable can store everything from strings to numbers.

A string is the values inside the quotes assigned to a string.

Example: X=”HELLO”.Here X is a variable whereas “HELLO” is a string.

3. Describe three different data types.

The Three different data types are:

1. Int – It stores the integers values that can be positive or negative and do not contain any decimal point.

2) Float – These are floating-point real numbers that stores the decimal values. It consists of integer and fraction parts.

3) Complex – These are complex numbers specified as a real part and an imaginary part.

4. What is an expression made up of? What do all expressions do?

Expression is made up of operators and operands. All expressions are interpreted to produce some other value.

5. This assignment statements, like spam = 10. What is the difference between an expression and a statement?

An Expression always evaluates to a value.

A statement does something, like creating a variable or displaying a value, it only does whatever the statement says.

6. After running the following code, what does the variable bacon contain?

bacon = 22

bacon + 1

23

7. What should the values of the following two terms be?

'spam' + 'spamspam'

'spam' \* 3

spam' + 'spamspam' = spamspamspam

'spam' \* 3 =

spam

spam

spam

8. Why is eggs a valid variable name while 100 is invalid?

Eggs is a valid variable name while 100 is invalid because variable names cannot begin with a number.

9. What three functions can be used to get the integer, floating-point number, or string version of a value?

1. int()

2. float()

3. str()

10. Why does this expression cause an error? How can you fix it?

'I have eaten ' + 99 + ' burritos.'

This expression causes and error because in this line 'I have eaten' and 'burritos' are strings, while 99 is as integer. In order to fix the error, the code should be like this-

‘I have eaten’+’99’+’burritos.’