**1. What are the differences between operators and values in the following?**

* : This a multiply operator

'hello’ : It’s a string

-87.8: Float value

* : Subtraction

/ : Divide Operator

* : Addition operator

6: Integer value

1. **What is the difference between string and a variable?**

Variable is a placeholder that helps store any value and string is a data type consisting of alphabets or can also be alphanumeric.

For example-

A=5

A=’mystery’

A=’taylor1989’

Here A is a variable and 5 or ‘msytery’ is the value getting stored in it.

Where ‘mystery’ is a data of type string

String can be purely alphabetic, alphanumeric or alphanumeric as well, any value enclosed in a single quotes is considered as string.

**3. Describe three different data forms.**

Ans. These are: integer, string, float

**4. What makes up an expression? What are the functions of all expressions?**

Ans. Expression is a representation of data values. Like 2+10 : It is representing the integer value

’ram is a boy’ : It is representing the string value

10.5\*2 : It is representing the float value

**5. In this chapter, assignment statements such as spam = 10 were added. What's the difference between a declaration and an expression?**

Expression is representation of the sentence with any data value such as string, int, float, Boolean, complex. It does not related to the storing of any value. It can be change as per requirement While declaration means we have declared the value of by initializing some variable with it like spam=10. Here it indicate that its value will be 10 where ever the spam will use.

**6. After running the following code, what does the variable bacon contain?** **bacon = 22** **bacon + 1**

Ans. 23

**7. What should the values of the following two terms be?** '**spam' + 'spamspam'** '**spam' \* 3**

Ans. ‘spamspamspam ‘spamspamspam’

**8. Why is it that eggs is a true variable name but 100 is not?**

Ans. It is by convention or you can say it’s a protocol that a name of a variable cannot be start with a integer. That’s why 100 is not a true variable name.

**9. Which of the following three functions may be used to convert a value to an integer, a floating-point number, or a string?**

Ans. String

**10. What is the error caused by this expression? What would you do about it?** **'I have eaten ' + 99 + ' burritos.'**

Ans. Type error: Concatenation cannot happen between string and integer data type