

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.

\*

'hello'

-87.8

-

/

+

6

A) Values = 'hello', -87.8, 6

Expression = \*, -, /, +

2. What is the difference between string and variable?

A) **String** – A string is a sequence of characters.

**Variable** – Variable is used to store the information.

3. Describe three different data types.

A) integer, float, complex, boolean

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

A) Expression is a combination of operand and operators. With expression we can do addition, subtraction, multiplication, division, logical operations etc.

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

A) Expression is a combination of variables and operations that returns a value.

The statement is an action or command that does something, for example, a print statement or assignment statement.

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

```
bacon = 22
```

```
bacon + 1
```

A)23

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

```
'spam' + 'spamspam'
```

```
'spam' * 3
```

A) 'spam' + 'spamspam' – 'spamspamspam'  
'spam' \* 3 – 'spamspamspam'

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

A) Variable names should not start with a number, as 100 is an integer is not a valid name for variable.

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

A) int(), float(), str()

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

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

A) 99 is an integer and cannot be concatenated with a string. To fix this 99 should be changed to string and then concatenate with other string.  
"I have eaten" + str(99) + "burritos"