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.

**Ans:**

\* = Expression

'hello' = values

-87.8 = values

- = Expression

/ = Expression

* = Expression

6 = values

2. What is the difference between string and variable?

**Ans:**

Variable can store everything from strings to numbers where as string is represented in single quotes or double quotes and assigned to a variable.

Ex:

string :

“abc” or ‘123’

The values which are present in single quotes and double quotes are strings.

Variable:

A = 123 or b = ‘’abc’’

A & b are variables

3. Describe three different data types.

**Ans:**

The different types of data types are:

1. Lists
2. Tuples
3. Dictionary
4. Numbers
5. String.

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

**Ans:**

An expression is a combination of variables,values,operators. They need to be evaluated to a single value.

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

**Ans:**

An expression should be evaluated to some value and statement is an action or command that prints something.

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

bacon = 22

bacon + 1

**Ans:**

After running the following code bacon returns the value ‘’23’’

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

'spam' + 'spamspam'

'spam' \* 3

**Ans:**

‘spamspamspam’

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

**Ans:** We can call the variable names by using alphabets but not using numbers as variable names and also also we can set the variable name by using the combination of alphabets and followed by numbers.

**Ex:**

correct variables:

eggs, eggs100, eggs\_100

wrong variable names:

100, 100eggs, 100\_eggs

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

**Ans:**

The three functions that can be used to get the integer, floating point number, or string version of a value are:

int(), float(), and str().

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

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

**Ans:**

We can only concatenate string not integer to string.

We can fix this by changing the code:

'I have eaten ' + '99'+ ' burritos.' (or)

'I have eaten ' + "99"+ ' burritos.' (or)

'I have eaten ' + str(99)+ ' burritos.'