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.

\* operations

'hello' value

-87.8 value

- operations

/ operations

* operation

6 value

**Answer**: look above

2. What is the difference between string and variable?

**Answer**: Variable is a store of information whereas string is a type of information. Eg: r=”raj” Here r is variable and of type string.

3. Describe three different data types.

**Answer:** -Integer data is use to indicate the value under consideration is numerical interger.

String data type is used to indicate the given value is a character or collection of characters

Float data types is use to indicate numerical values with decimal part.

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

**Answer**: Expression is a combination of variables, operations and values that yields a result value. Expression yield a value.

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

**Answer**: An “expression” is a combination of values and functions that are combined and interpreted by the compiler to create a new value, as opposed to a “statement” which is just a standalone unit of execution and doesn't return anything

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

bacon = 22

bacon + 1

**Answer**: bacon will still be containing 22.

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

'spam' + 'spamspam'

'spam' \* 3

**Answer**: both will give ‘spamspamspam’.

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

Answer: Variable cannot be integers.

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

**Answer:** The int(), float(), and str() functions will evaluate to the integer, floating-point number, and string versions of the value passed to them.

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

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

**Answer**: Here we are trying two different data types which cannot be operated as their values have different meaning.

We need same data type variable or variable which can convert into one or another than only operations can be applied on them.