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

\*: Multiplications Operator.

'hello': Quotation used for string representations

-87.8: Floating Data Types which has Negative values

-: Subtract right operand from the left or unary minus

/: Divide left operand by the right one (always results into float)

+: Add two operands or unary plus

6: Integer Data types.

2. What is the difference between string and variable?

Spam: It’s a user defined variable as its written without quotes.

'spam’: It’s a string as its written within double quotes.

3. Describe three different data forms.

* Numeric Types: int, float
* Sequence Types: list, range
* Text Type: str

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

Anything that evaluates to something is a Python expression.

Expressions always returns a value. An expression is a combination of values, variables, operators, and calls to functions.

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

Spam is an user defined variable where its assigned value as 10. In Python no command for declaration. A variable created when any value assigned it and based on value its create data types.

Difference between declaration & an expression is declaration will do (action)something and expression will return something.

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

bacon = 22 : bacon contain number 22 as Integer data types.

bacon + 1 : here just add one with bacon variable but its not express.

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

'spam' + 'spamspam’: 'spamspamspam'

'spam' \* 3: 'spamspamspam'

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

Eggs(0) zeros consider as Boolean type in python as false and true variable where non-zero considered as integer or strings in statements.

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

We convert and value which has consist numeric values integer or floating, eg (98,22.50)

But type can’t be converting into string like any characters like(‘abnggf’) because we cannot do arithmetic calculation.

10. What is the error caused by this expression? What would you do about it?

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

Type Error: must be str, not int

This is because 99 is not quoted under double quotes. We must quote 99 under quotes ‘99’ then it will execute as String Concatenation.