**Basic Concepts in Python**

**Syntax & Indentations:**

* To define blocks of code one tab space is used for indentation. Blocks of code such as function definitions, loops, and conditional statements

# Conditional statement

if condition:

    statement1

elif another\_condition:

    statement2

else:

    statement3

# Loop

for item in iterable:

    statement

# While loop

while condition:

    statement

**Comments:**

* # This is a Single Line Comment
* “”” This is a

Multi-line Comment “””

**Operators:**

1. Arithmetic Operators: +, -, \*, /, //, %
2. Comparison Operators: ==, !=, >, >=, <, <=
3. Logical Operators: and, or, not
4. Assignment Operators: =, +=, -=, \*=, /=
5. Identity Operators: is, is not
6. Membership Operators: in, not in
7. Bitwise Operators: &, !, ^, ~, <<, >>

**Variables:**

**Rules to create variable:**

* A variable name must start with a letter or the underscore character
* A variable name cannot start with a number
* A variable name can only contain alpha-numeric characters and underscores (A-z, 0-9, and \_ )
* Variable names are case-sensitive (age, Age and AGE are three different variables)
* A variable name cannot be any of the Python keywords

**Multiple Assignment Variable:**

* We can define Multiple Variables in Single line in python

Eg : a, b, c = 1, 2, 3

**Variable Reassignment:**

**Local and Global Variables:**