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Notebook: Computers and Programming I

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- String literal is any string passed through a function
- Most programs need to read input from the user
 - Prompt the user to enter two integers
 - Read the two integers
 - Compute the sum
 - o Print the result
- input function always returns a string
- Built- In Functions coverts between data types
 - o int (item) coverts item to an integer
 - o float (item) converts item to a float
 - Nested Function call: General Format:
 - function1(function2(argument))
 - Python Example: (*Try this is an Python*)
 - num1 = int(input("Enter an Integer"))
 - num2 = int(input("Enter another Integer"))
 - \blacksquare sum = num1 + num2
 - print "The sum is", sum
- Neither the "print" nor the "input" functions are uppercase
- Cases used for variables must be consistent
- Floats are real numbers (eg. 3.25, 1.75)
- Math Expressions: Performs calculation and gives a value
 - Math operator: tool for performing calculation
 - Operands: Values surrounding operator
 - variables can be used as operand

Operation	Python Operation
+	+
-	-
X	*

X	*
/	/ (Float) or // (Integers)
Expon	Λ
Modulus	Gives remainder

- Two Types of Division
 - o Float:
 - = 5/2 = 2.5
 - Integer
 - **■** 5//2 = 2
 - -5//3 = -3
 - Rounds only when negative

• Python Operator Precedence

- Operations enclosed in parentheses
 - Forces operations to be performed before others
- Exponents (**)
- o Multiplication, Division, (/ and //), and remainder (%)
- Addition and subtraction)
- Higher precedent performed first
- 0 2 + 3 % 5
 - 3/5 leaves a remainder of 3
 - 3 + 2 = 5
- 0 3 * 4 // 2
 - They are in the same rank; therefore, we do the left most rank first
 - 12 // 2 = 6

Homework

4 % 5 * 3

(2 + 7) // 10

9/2

-9 // 4

6 * 5 % 2