# Lab 1.02 - Using the Interpreter

## Part 1

Using the interpreter, type in the expressions below. Copy and paste the output into the output column. If the result is unexpected, note that in the third column.

### Section 1

|  |  |  |  |
| --- | --- | --- | --- |
|  | **Input** | **Output** | **Did it do something unexpected?** |
| a | 5 + 2 \* 2 |  |  |
| b | 2/3 |  |  |
| c | 2.0 \* 1.5 |  |  |
| d | (2 + 3) \* 10 |  |  |
| e | 5.0 // 2 |  |  |
| f | 5.0 % 2 |  |  |

### Section 2

|  |  |  |  |
| --- | --- | --- | --- |
|  | **Input** | **Output** | **Did it do something unexpected?** |
| a | a |  |  |
| b | 'a' |  |  |

### Section 3

|  |  |  |  |
| --- | --- | --- | --- |
|  | **Input** | **Output** | **Did it do something unexpected?** |
| a | 'a + b' |  |  |
| b | 'a' + 'b' |  |  |

### Section 4

|  |  |  |  |
| --- | --- | --- | --- |
|  | **Input** | **Output** | **Did it do something unexpected?** |
| a | 'a' \* 'b' |  |  |
| b | 'a' \* 2 |  |  |

## Part 2

### Before going to the IDE

1. For each item, predict the data type of the result and enter into the “String/Integer/Float” column.
2. Next, predict the value of the result for each item and enter into it into the “Prediction of Result” column.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  | **Expression** | **String/Integer/Float** | **Prediction of Result** | **Interpreter Result** |
| a | 10 \* 2 | integer | 20 | 20 |
| b | .5 \* 2 |  |  |  |
| c | 10/2 |  |  |  |
| d | 10%2 |  |  |  |
| e | 2 \*\* 3 |  |  |  |
| f | (2+5)\*3 |  |  |  |
| g | 2 + 5 \* 3 |  |  |  |
| h | 'ab' + '12' + '3' |  |  |  |
| i | x |  |  |  |
| j | "ab" + "cd" |  |  |  |
| k | 'abc' \* 2 |  |  |  |
| l | '1'\*2 + '2' \* 3 |  |  |  |
| m | 1 \* 2 + '3' \* 2 |  |  |  |
| n | 'A' \*\* 2 |  |  |  |
| o | 'bc' % 2 |  |  |  |
| p | 'bc' / 2 |  |  |  |

## Now go to the IDE

Use the interpreter to evaluate the expressions, write down results in the “Interpreter Result” column.