**Python**

Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Understanding Variables and the Math Object**

Create a program that includes the following seven lines at the top:



When you run the program the number “15” will be outputted to the screen.

Change the equation to a-b. Guess the output in the table below and then write down the actual output. Do this for all of the statements - guess first then alter the code and run the program.

|  |  |  |
| --- | --- | --- |
| **Statement** | **Your Guessed Output** | **Actual Output** |
| print a + b | 15 | 15 |
| print a - b |  |  |
| print a \* b |  |  |
| print a / b |  |  |
| print a / c |  |  |
| print a // c |  |  |
| print c / d |  |  |
| print float(c) / float (d) |  |  |
| print int(e) / int (f) |  |  |
| print float(e) / float(f) |  |  |
| print a % b |  |  |
| print a % c |  |  |
| print a % d |  |  |
| print b % c |  |  |
| print (a\*b) % c |  |  |
| print (a-b+c) % c |  |  |
| print (3\*b-a) % c |  |  |
| print math.sqrt(5 \* b) |  |  |
| print math.pow(b,2) |  |  |
| print b\*\*3 |  |  |
| print math.pow(d,c) |  |  |
| print d\*\*c |  |  |
| print d – c + f / 2.5 |  |  |
| print (8 \* d – 2 \* e) // 3 |  |  |
| print (4 \* b – 12) / (e \* f) |  |  |