

# Homework 1

## Python basics and flow control

Out 1/19 – Due 2/2

In this assignment you will develop a security program. Inside a while loop you ask several questions. Be creative!<sup>1</sup> When all of them are answered correctly by the user, a piece of secret information will be printed and the program finishes (but don't print your SSN or anything sensitive). See Canvas for grading rubric. In your program:

- use **at least once** each of the following functions: `print()`, `input()`, `len()`, `str()`, `int()`, and `randint()`.
- use **at least one** variable of each of the following data types: `int`, `float` and `string`.
- use *camelcase* or *underscores* for variable names. Be consistent and use descriptive names.
- use **at least four different math operators**. One of them has to be the modulus (%) or the integer division (/).
- use a for loop inside your main loop to ask three questions using the `range()` function. Use the value of your iterator to ask the three questions.
- use **at least once** each of the following statements: `if`, `else`, `elif`, `break` and `continue`.
- use at least one "Truthy" or "Falsy" value.
- write some comments to explain what you did in your code and why.

Submit your code as *hw1\_firstname\_lastname.py* (please only turn in the py file). Comment everything so we know it's your code. On top of your file include this multi-line comment:

```
'''
```

```
Homework 1
```

```
Name:
```

```
Date:
```

```
Description of your program:
```

```
'''
```

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<sup>1</sup> For example, use `randint` to generate two numbers `num1` and `num2`, then ask the user what is the result of `num1+num2`; or ask what is the number of days in February in a leap year; or how many characters are in the word `pneumonoultramicroscopicsilicovolcanoconiosis`; and so on.