Recap:

- First Python class.
  - Install python (skipped)
  - Write our first python program
    - Check if a given number x is a prime number

Main idea: use the definition of prime number

- A number is prime if it has no other factor than 1 and itself.

Pseudo Code (fake code that illustrate the idea)

```
x ← 6                          or any other integer
i ← 2                          start checking from 2
while i ≤ x-1 do               check if i is a factor of x
    if (the remainder of x÷i) = 0 do
        print ("x is not a prime")     if so, x is not prime
        quit the program immediately   no need to continue
    end if
    i ← i+1                    check the next, until i = x-1
endwhile
print ("x is a prime")         if pass all checks without quitting,
                               x does not have any factors other than
                               1 and itself
                                   (we have checked from 2 to x-1)
                               then x must be a prime
```

Today's Objective

Revist the Python code

- Install python onto local machine
- re-program the check python code.

Learn some mathematics.