

# Python Modules

Consider a module to be the same as a code library.

A file containing a set of functions you want to include in your application.

## Create a Module

To create a module just save the code you want in a file with the file extension.py

### Example :

Save this code in a file named mymodule.py

```
def greeting(name):  
    print("Hello, "+ name)
```

## Use a Module

Now we can use the module we just created, by using the import statement:

**Import the module named mymodule, and call the greeting function:**

```
import mymodule  
mymodule.greeting("Jonathan")
```

# Python Datetime

A date in Python is not a data type of its own, but we can import a module named datetime to work with dates as date objects.

### Example :

```
import datetime  
  
x = datetime.datetime.now()  
print(x) # Current date and time  
print(x.year) # Current year  
print(x.strftime("%A")) # Current day  
print(x.strftime("%B")) # Current month
```

### Example 2 :

Display a particular date

```
import datetime

y = datetime.datetime(2023,8,9)
print(y) # date and time
print(y.year) # year
print(y.strftime("%A")) # day
print(y.strftime("%B")) # month
```

## Python Math

Python has a set of built-in math functions, including an extensive math module, that allows you to perform mathematical tasks on numbers.

### Example :

```
x = min(8,5,0,10)
print(x)

y = max(8,5,0,10)
print(y)

abs1 = abs(-8.5)
print(abs1)

pow1 = pow(4,3)
print(pow1)

import math

sqrt1 = math.sqrt(64)
print(sqrt1)

ceil1 = math.ceil(4.5)
print(ceil1)

floor1 = math.floor(4.5)
print(floor1)
```