Module Checklist

Programming with Python

By Techworld with Nana

Video Overview

- ★ Introduction to Python
- ★ Install Python & Local Setup
- ★ Our first program
- ★ Python IDE vs simple file editor
- ★ Strings & Numbers
- ★ Variables
- ★ Functions
- ★ User Input
- ★ Conditionals (if / else) & Boolean Data Type
- ★ Error Handling with Try / Except
- ★ While Loops
- ★ Lists and For Loops
- ★ Comments
- ★ Sets
- ★ Built-In Functions
- ★ Dictionaries
- ★ Modules
- ★ Demo Project: Countdown App
- ★ Packages, PyPi & pip
- ★ Demo Project: Automation with Python - Working with Spreadsheets
- ★ Classes and Objects
- ★ Demo Project: API Requests

Demo Projects	
Git Project	https://gitlab.com/nanuchi/python-programming

Introduction to Python

- ❏ Watched video

Install Python & Local Setup

- ❏ Watched video
- ❏ **Install Python & PyCharm:**
    - ❏ Python3 installed
    - ❏ PyCharm downloaded & setup

Useful Links:

- Python for different OS:
    - https://www.python.org/downloads/
    - Installation Guide for Windows:
      https://docs.python.org/3/using/windows.html#installation-steps
- PyCharm Download: https://www.jetbrains.com/pycharm/download/

Our first program

- ❏ Watched video
- ❏ **Demo executed**

Python IDE vs simple File Editor

- ❏ Watched video

Strings and Numbers

- ❏ Watched video
- ❏ **Demo executed**

Variables

- ❏ Watched video
- ❏ **Demo executed**

Functions

- ❏ Watched video
- ❏ **Demo executed**

User Input

- ❏ Watched video
- ❏ **Demo executed**

Conditionals (if / else) & Boolean Data Type

- ❏ Watched video
- ❏ **Demo executed - validate User Input to make our program more robust**

Error Handling with try / except

- ❏ Watched video
- ❏ **Demo executed**

While Loops

- ❏ Watched video
- ❏ **Demo executed**

Lists and For Loops

- ❏ Watched video
- ❏ **Demo executed**

Comments

- ❏ Watched video

Sets

- ❏ Watched video
- ❏ **Demo executed**

Built-In Functions

- ❏ Watched video
- ❏ **Demo executed**

Dictionaries

- ❏ Watched video
- ❏ **Demo executed**

DEVOPS
BOOTCAMP

Modules

- ❏ Watched video
- ❏ **Demo executed**

Project: Countdown Application

- ❏ Watched video
- ❏ **Program implemented**
  - ❏ Get user Input: goal and deadline
  - ❏ Convert deadline string into a proper date type
  - ❏ Calculate how many days are left until the deadline
  - ❏ Print a proper message to the user including the entered goal
  - ❏ Calculate how many hours are left until the deadline

Exercise:

Write a program that accepts a user input of a goal and a deadline date.

And print back to the user, how much time they have remaining till that deadline.

Packages, PyPi & pip

- ❏ Watched video
- ❏ **Demo executed**

Project: Automation with Python - Spreadsheet

- ❏ Watched video
- ❏ **Program implemented**
    - ❏ Exercise 1 - List companies with respective product count
    - ❏ Exercise 2 - List companies with respective total inventory value
    - ❏ Exercise 3 - List products with less than 10 in inventory
    - ❏ Exercise 4 - Write to Spreadsheet and save into a new File

Classes and Objects

- ❏ Watched video
- ❏ **Demo executed**

Project: API Requests

- ❏ Watched video
- ❏ **Program implemented - API Request to list your GitLab projects**