**Task Automation with Python Scripts**

Identify a repetitive task in your workflow and create Python scripts to automate it. This could include tasks like file organization, data cleaning, or system maintenance.

Program:

import os

import shutil

# Define file type categories

FILE\_TYPES = {

'Images': ['.jpg', '.jpeg', '.png', '.gif', '.bmp'],

'Documents': ['.pdf', '.docx', '.doc', '.txt', '.xlsx', '.pptx'],

'Videos': ['.mp4', '.mkv', '.avi', '.mov'],

'Archives': ['.zip', '.rar', '.tar', '.gz'],

'Music': ['.mp3', '.wav', '.aac'],

'Scripts': ['.py', '.js', '.html', '.css'],

'Executables': ['.exe', '.msi']

}

def organize\_folder(folder\_path):

if not os.path.isdir(folder\_path):

print("Invalid folder path.")

return

for filename in os.listdir(folder\_path):

filepath = os.path.join(folder\_path, filename)

if os.path.isfile(filepath):

file\_ext = os.path.splitext(filename)[1].lower()

moved = False

for folder, extensions in FILE\_TYPES.items():

if file\_ext in extensions:

target\_dir = os.path.join(folder\_path, folder)

os.makedirs(target\_dir, exist\_ok=True)

shutil.move(filepath, os.path.join(target\_dir, filename))

moved = True

print(f"Moved {filename} to {folder}/")

break

if not moved:

other\_dir = os.path.join(folder\_path, "Others")

os.makedirs(other\_dir, exist\_ok=True)

shutil.move(filepath, os.path.join(other\_dir, filename))

print(f"Moved {filename} to Others/")

if \_name\_ == "\_main\_":

folder = input("Enter the path to the folder you want to organize: ")

organize\_folder(folder)