Al 360 - www.ai360.ltd

Email: ai360ltd@gmail.com

Contact: +91 996357199

Al 360 - Python Essentials

Course Title: Python Programming – Foundations to Applications

Duration: 30 Hours (5 Weeks x 6 Hours per Week)

Format: Online/Offline + Hands-on Coding Sessions + Projects

Target Audience: Students, Freshers, Job Seekers, Working Professionals

Prerequisites: No prior coding knowledge required

Course Fee: ₹5000 (includes training + certificate + course materials)

Course Overview:

This 30-hour course is a complete beginner-to-intermediate journey through Python programming. It is designed for students and professionals who want to start from scratch and develop the skills to build real-world applications using Python.

Week-wise Curriculum

Week 1: Introduction to Python & Basic Programming

- Python installation & setup (Anaconda, VSCode)
- Variables, data types, and operators
- Conditional statements and loops
- Input/output handling
- Lab: Simple calculator, number guessing game

Week 2: Functions, Data Structures & Modules

- Defining and calling functions
- List, Tuple, Set, Dictionary
- Scope and Recursion
- Built-in functions and standard libraries

• Lab: Student grade calculator, data organizer tool

Week 3: File Handling, Exception Handling & OOP

- Working with text and CSV files
- Try-except blocks and custom exceptions
- Object-Oriented Programming: Classes and Objects
- Constructors, Inheritance, Polymorphism
- Lab: Library Management System using OOP

Week 4: Real-World Use Cases in Python

- Web scraping with BeautifulSoup
- Introduction to APIs and JSON
- Working with Pandas and NumPy
- Plotting with Matplotlib
- Lab: Weather App, Data Dashboard from CSV

Week 5: Final Project & Deployment Basics

- Recap of all modules
- Project Development (choose from 3 guided project themes)
- Code review and feedback
- Introduction to GitHub and project hosting
- Showcase Day + Certification

Hands-on Projects

- Student Grade Report System
- ✓ Web Scraper with Live Data Fetch
- CSV-based Dashboard with Pandas + Matplotlib
- ☑ Capstone Project: Choose from Inventory App / Portfolio Tracker / Quiz Generator

Tools & Technologies

Python 3.x, Jupyter Notebook, VS Code

- Libraries: NumPy, Pandas, Matplotlib, Requests, BeautifulSoup
- GitHub for project hosting

Outcomes & Certification

- Al 360 Certificate of Completion in Python Programming
- Resume-ready project portfolio
- Prepared for Data Science, Web Dev, or Automation tracks

Why Learners Choose This Course

- Easy for absolute beginners
- ✓ Builds confidence in real-world coding
- ✓ Applicable across multiple career tracks (Al, Data, Web)
- ✓ Affordable and structured with personal mentorship

Al 360 - www.ai360.ltd

Email: ai360ltd@gmail.com

Contact: +91 996357199