

Module 1

Pre – Work – Introduction to Python & Linux Python

- Introduction to Python and IDEs
- Python Basics
- Object Oriented Programming
- Hands-on Sessions And Assignments for Practice

Linux

- Introduction to Linux
- Linux Basics
- Hands-on Sessions And Assignments for Practice

Module 2

Object Oriented Programming & Software Engg.

- Object Oriented Programming and Design
- Agile Methodology
- Unit Testing, Code Refactoring, Writing Clean Code
- Introduction to version Control & Git
- Overview of Operating Systems

Module 3

Database Design & Querying

- Databases Concepts – SQL – Querying, Joins, DB Design
- Database Design & Modelling
- Working with SQL Queries
- Joins, Sub Queries, Views

Module 4

Solving Top Product Companies Interview Questions

In this module you will be solving question asked by top product companies.

Module 5

Product Management

- Introduction to Product Management
- Product Vision and Measurement
- Roadmaps and Prioritization
- Understanding user stories
- Interaction with different teams for better product development

Module 6

MS SQL

- SQL Basics
- Advanced SQL
- Deep Dive into User Defined Functions
- SQL Optimization and Performance

Specialization 1

Backend Specialization

- MVC
- REST APIs and Web Services
- Object-Relation Mapping
- Spring Boot
- Views and Database Indexes
- Multithreading

Specialization 2

Full Stack Specialization

- Building a server for hosting
- MVC Introduction
- Web Architecture
- HTML, CSS and JavaScript
- JS Frameworks – Node.js, React / Redux
- Backend Architecture
- NoSQL Database – MongoDB

Specialization 3

Cloud Computing & DevOps

- AWS
- DevOps

Specialization 4

Data Science

- Introduction to Data Science using Python
- Python basic constructs
- NumPy for mathematical computing
- Pandas for Data manipulation
- Data visualization with Matplotlib
- Maths for DS–Statistics & Probability
- Machine Learning using Python
- Supervised learning–Linear Regression
- Supervised learning–Logistics Regression

- Unsuperwised Leaning And K-means Clustering
- Hire Clustering And Dimention Reduction
- Time Series Forecasting
- OOPs in Python (Self-paced)
- Python integration with Spark (Self-paced)

Specialization 5

Cyber Security

- Ethical Hacking

Skills to Master

- Problem Solving
 - Advanced Programming
 - Data Structures
 - Algorithms
 - Product Management
 - System Design
 - Application Development
 - Full-Stack Specialization
- Back-end Specialization
 - Web Architecture
 - Data Science
 - Cloud Computing
 - Cyber Security
 - Databases
 - Rest API

Tools to Master

