SYLLABUS

WEB DEVELOPMENT WITH DJANGO INCLUDING REST API

LESSONS

1. Introduction to Python
2. Object Oriented Programming with Python
3. Introduction to Django
4. Advanced Django for Web and Automation
5. Django REST
6. Deploying Web APIs

Lesson 1 : Introduction to Python

1. Variables and Data Types
2. Sequential Types: Str & List
3. If-Elif-Else Statements
4. Definite loops: For loops
5. Indexing
6. Slicing
7. Indefinite loops: while loops
8. Runtime complexity
9. Searching and sorting algorithms
10. Custom functions in Python
11. Args and Kwargs
12. Importing files

Lesson 2 : Object Oriented Programming with Python

1. Classes
2. Methods
3. Inheritance
4. Abstract Classes

Lesson 3 : Introduction to Django

1. HTTP protocol
2. MVC model
3. Virtual environment
4. Django structure
5. Django Models , Urls , Views , Serializers
6. Django Admin Panel
7. Function Based and Class Based Views

Lesson 4 : Dive Deep into Django

1. GET and POST methods
2. Models and User model
3. Logic in templates
4. Querying models
5. Serving Staticfiles
6. Deployment of Django
7. Automating tasks with Django

Lesson 5 : Django REST

1. Generic Views and Concrete Classes in Django Rest
2. ModelSerializer
3. JSON
4. Building RESTful APIs
5. Filtering Models
6. Working with Images
7. Authentication with tokens
8. Postman
9. Related models
10. Contenttypes app

Lesson 6 : Deploying Web APIs

1. Using API endpoints
2. Deployment of Django REST project