# INFOSOFT IT SOLUTIONS

## Training | Projects | Placements

Revathi Apartments, Ameerpet, 1st Floor, Opposite Annapurna Block,

Infosoft It solutions, Software Training & Development Institute, **9059683947|9182540872**

# *Cisco ACI*

**Introduction to Cisco ACI**

- Overview of Cisco ACI architecture and components

- Benefits of using Cisco ACI for data center networking

- ACI integration with existing data center infrastructure

**ACI Fabric Fundamentals**

- Understanding ACI fabric components (Leaf switches, Spine switches)

- Fabric discovery and initialization process

- VXLAN and encapsulation in ACI

**ACI Policy Model**

- Understanding the ACI policy-driven approach

- Tenants, Application Profiles (EPGs), and Contracts

- Policies for networking, security, and application deployment

**ACI Fabric Access Policies**

- Access policies: Physical domains, VLAN pools, and interfaces

- Configuration of Access Policies for Leaf and Spine switches

- Integrating ACI with external Layer 2 and Layer 3 networks

**ACI Application Network Profiles (ANP)**

- Configuring ANPs for application-specific requirements

- Service Graphs and Device Packages in ACI

- Service Insertion and Chaining with ACI

**ACI Integration with Virtualization**

- Integrating ACI with VMware vSphere and NSX

- Cisco ACI Multi-Site architecture for distributed data centers

- ACI integration with other hypervisors and virtualization platforms

**ACI Security Policies**

- Microsegmentation using ACI security groups

- Role-Based Access Control (RBAC) in ACI

- Policy enforcement and monitoring in ACI fabric

**ACI Automation and Orchestration**

- Automation using Cisco APIC REST API

- Cisco ACI Toolkit for automation and programmability

- Ansible integration with Cisco ACI for configuration management

**ACI Monitoring and Troubleshooting**

- Using Cisco APIC for monitoring ACI fabric health

- Troubleshooting common ACI fabric issues

- Packet capture and analysis in ACI environment

**ACI Fabric Upgrades and Maintenance**

- Best practices for ACI fabric upgrades

- Managing ACI fabric maintenance windows

- Backup and restore procedures for ACI configurations

**ACI Multi-Pod and Multi-Site Deployments**

- Multi-Pod architecture in ACI

- Interconnecting ACI fabrics in different locations (Multi-Site)

- Stretching ACI fabrics across multiple data centers

**ACI Analytics and Telemetry**

- Telemetry and visibility options in ACI

- Using ACI Analytics for performance monitoring

- Predictive analytics and troubleshooting with ACI data

**ACI Disaster Recovery and High Availability**

- High availability considerations in ACI fabric

- Disaster recovery strategies for ACI deployments

- Designing resilient ACI architectures

**ACI Compliance and Governance**

- Implementing compliance policies in ACI

- Auditing and reporting in ACI fabric

- Ensuring regulatory compliance with ACI configurations

**Real-World Use Cases and Case Studies**

- Deploying Cisco ACI in enterprise environments

- Industry-specific use cases and success stories