

## Cloud Computing

Duration: 5 days

### DAY 1

- Cloud Essentials
- Using a cloud environment
- Network & Cloud
- Architect systems in the Cloud
- Design for resiliency – no single point of failure
- Reference 3-tier Cloud architectures and components
- Cost models for redundancy and resilience in the Cloud

### DAY 2

- Understanding Loadbalancer and Auto scaling of EC2 instances
- Refactoring components and storage architectures
- Monitoring applications to determine resource usage
- Right-scaling cloud resources & cost estimation for Cloud

### DAY 3

- Understand how DevOps is changing Operations in the Cloud
- Develop workflows and orchestration to automate
- Develop Source Code continuously using Continuous Development Tools
- Continuous Build using Build Tools
- Introduction to Dockers and Containers
- Continuous Integration using Jenkins
- Unit and Performance Testing using Selenium and Blazemeter

## DAY 4

- Advanced Docker – Dockerfile , Docker Compose , Docker Networking , Docker Swarm
- Continuous Deployment using Chef and Ansible
- Continuous Monitoring using Nagios and ELK

## DAY 5

- Cloud component integration
- Analyse applications for “cloud readiness”
- Migrate applications into the Cloud
- Managing applications in the Cloud programmatically
- Understand general enterprise IT architecture applying the TOGAF framework