



ROLASOFT PROFESSIONAL COMPUTER & IT COURSES VERSION 2.0 LATEST

Diploma in Certified DevOps Engineer

Become a job-ready DevOps Engineer in 6 months!

Benefits of Studying Diploma in DevOps Engineer with RolaSoft

1. Industry-Relevant Curriculum

Stay ahead with a syllabus designed by industry experts, focused on real-world applications of devops.

2. Hands-On Training

Learn by doing — build real-time projects, and gain practical experience.

3. Experienced Instructors

Gain insights from certified professionals and senior software engineers with years of teaching and industry experience.

4. Placement Assistance

Access job support services including resume building, mock interviews, and direct placement opportunities with partner companies.

5. Flexible Learning Modes

Choose between: Online, Offline (at our center), or Hybrid Classes

Benefits of Studying Diploma in DevOps Engineer with RolaSoft

6. Mini & Major Projects

Work on individual and group projects to strengthen your portfolio and impress future employers.

7. Certification Upon Completion

Earn a Diploma Certificate from RolaSoft Technologies, recognized by IT recruiters and employers.

8. Small Batch Size

Personalized attention and better interaction in small groups for an enhanced learning experience.

9. Affordable Fees & Installment Plans

Top-tier training at a reasonable cost, with flexible payment options.

10. Career-Oriented Skills You'll Gain at RolaSoft Technologies

RolaSoft ensures you're job-ready with the right tech stack and practical knowledge.

Diploma in DevOps Engineer Course Details

DurationSix (6) Months

Schedule
Weekdays / Weekends

Learning Modes
Online, Offline (at our center), or Hybrid Classes

Start Date
New batches start every month — enroll now!

Eligibility
No prior experience required

DevOps Engineer Prerequisites

Basic knowledge of mathematics and logical reasoning

✓ Basic knowledge of Linux and command-line operations

Familiarity with software development and version control (Git)

✓ Understanding of cloud computing concepts (helpful but not required)

Diploma in DevOps Engineer – Program Details

Program Overview

The **DevOps** course at *Rolasoft Technologies* is a comprehensive 6-month program that covers the fundamental principles and practices of DevOps, along with practical training on the tools and technologies used in modern software development and IT operations. Students will gain hands-on experience in Continuous Integration (CI), Continuous Delivery (CD), Infrastructure as Code (IaC), automation, monitoring, and cloud-based deployment strategies.

DevOps is a methodology that aims to bridge the gap between development and operations teams, ensuring faster and more reliable software releases. By the end of the course, students will be proficient in setting up and managing DevOps pipelines, working with automation tools like Docker, Kubernetes, Jenkins, and Terraform, and implementing best practices for system reliability, scalability, and continuous improvement.

Month 1: Introduction to DevOps & Version Control

✓ What is DevOps?

(Understanding the DevOps culture, principles, and practices, The lifecycle of software development in a DevOps environment, The benefits and challenges of adopting DevOps)

✓ Version Control with Git

(Introduction to Git and GitHub, Git commands and workflows (Branching, Merging, Pull Requests), Collaborating with Git in a team environment)

Introduction to Agile and Scrum

(Agile methodologies and how DevOps fits into Agile workflows, Scrum framework and its role in DevOps)

Project: Set up a Git repository and implement basic Git workflows for collaboration

Month 2: Continuous Integration (CI) & Continuous Delivery (CD)

What is Continuous Integration (CI)?

(Introduction to CI and its importance in DevOps, Setting up a CI pipeline with Jenkins, Automating build processes and unit tests, Integrating Git with CI tools for automated testing)

What is Continuous Delivery (CD)?

(Introduction to CD and its role in automating deployments, Automating deployment pipelines for faster and more reliable releases, Setting up CD with Jenkins and integrating it with GitHub)

Testing in DevOps

(Introduction to automated testing (Unit, Integration, and End-to-End Tests), Tools for automated testing in DevOps (JUnit, Selenium))

Project: Set up a complete CI/CD pipeline for a sample application using Jenkins

Month 3: Containerization with Docker

What is Docker?

(Introduction to containerization and its advantages, Setting up and using Docker for application deployment, Creating Docker images and containers)

Dockerizing Applications

(Writing Dockerfiles to define application environments, Managing container lifecycle (Start, Stop, Remove Containers), Working with Docker Compose for multi-container applications)

✓ Docker Networking & Storage

(Setting up Docker networks and volumes, Persisting data in containers)

☑ Project: Dockerize a web application and deploy it using Docker Compose

Month 4: Orchestration with Kubernetes

What is Kubernetes?

(Introduction to Kubernetes and its role in container orchestration, Understanding Pods, Nodes, and Clusters in Kubernetes, Setting up a local Kubernetes environment using Minikube)

W Kubernetes Objects & Deployments

(Deploying applications in Kubernetes (Pods, Services, Deployments), Scaling applications and managing replicas, Understanding Kubernetes namespaces and configurations)

V Kubernetes Networking & Storage

(Setting up services and ingress controllers for routing traffic, Persistent storage in Kubernetes with Persistent Volumes)

Advanced Kubernetes Topics

(Helm: Package manager for Kubernetes, Kubernetes Monitoring and Logging)

✓ **Project**: Deploy a multi-container application using Kubernetes and Helm

Month 5: Infrastructure as Code (IaC) & Configuration Management

What is Infrastructure as Code (IaC)?

(Introduction to IaC and its benefits in DevOps, Overview of IaC tools: Terraform, Ansible, CloudFormation, Writing and managing infrastructure code with Terraform)

✓ Terraform Basics

(Setting up Terraform and managing cloud resources, Writing Terraform configuration files for cloud infrastructure, Managing state and using modules in Terraform)

Configuration Management with Ansible

(Introduction to Ansible for automating server configuration, Writing playbooks and managing configurations, Using Ansible to automate application deployment)

Project: Use Terraform to provision cloud infrastructure and Ansible to configure servers

Month 6: Cloud Platforms, Monitoring & Career Preparation

Cloud Platforms

(Introduction to cloud computing and popular cloud providers (AWS, Azure, GCP), Setting up cloud environments for DevOps workflows, Understanding cloud services for DevOps: Compute, Storage, Networking, Security)

✓ Monitoring and Logging in DevOps

(Introduction to monitoring and logging practices in DevOps, Tools for monitoring applications and infrastructure (Prometheus, Grafana, ELK Stack), Setting up alerting systems for system health and performance)

Security in DevOps

(Introduction to DevSecOps and secure software delivery, Integrating security practices into the DevOps pipeline, Securing CI/CD pipelines and containerized applications)

✓ Project: Implement monitoring and logging for a multi-container application deployed on Kubernetes

Tools & Technologies Used

Tools & Technologies Used for **DevOps Engineer** Course are:

- ✓ Version Control: Git, GitHub
- ✓ CI/CD Tools: Jenkins, CircleCI, TravisCI
- Containerization: Docker, Docker Compose
- ✓ Orchestration: Kubernetes, Helm
- Infrastructure as Code: Terraform, Ansible, AWS CloudFormation
- Cloud Platforms: AWS, Microsoft Azure, Google Cloud Platform (GCP)
- Monitoring and Logging: Prometheus, Grafana, ELK Stack, Nagios
- Automation Tools: Jenkins, Ansible, Terraform

Final Capstone Project (End of 6 Months)

Students will complete an **industry-level project** in **DevOps Engineer** :

Implement monitoring and logging for a multi-container application deployed on Kubernetes (Capstone Project)

DevOps Engineer Learning Outcomes

By the end of this course, students will be able to:

- Understand and apply DevOps principles and practices to software development and operations
- ☑ Implement CI/CD pipelines for automating builds, tests, and deployments
- ✓ Use Docker to containerize applications and deploy them in a consistent environment
- ✓ Orchestrate containerized applications using Kubernetes
- Automate infrastructure provisioning with Terraform and manage configurations with Ansible
- Implement monitoring and logging systems for real-time insights and performance tracking
- Secure DevOps pipelines and integrate DevSecOps practices

Certification Obtain

After completion of the program, the student will be awarded with a certificate:

Diploma in Certified DevOps Engineer

The program also prepares students for industry certifications such as:

- DevOps Foundation Certification DevOps Institute
- ✓ Docker Certified Associate (DCA) Docker
- Certified Kubernetes Administrator (CKA) CNCF + Linux Foundation
- Microsoft Certified: DevOps Engineer Expert (Azure)
- ✓ AWS Certified DevOps Engineer Professional
- ✓ Google Professional Cloud DevOps Engineer

DevOps Engineer Career Opportunities

- ✓ DevOps Engineer
- ✓ Cloud DevOps Engineer
- ✓ Site Reliability Engineer (SRE)
- ✓ CI/CD Engineer
- ✓ DevSecOps Engineer
- ✓ Platform Engineer

Who Should Take This **DevOps Engineer?**

Who Should Take This Certified DevOps Engineer?

- Software developers interested in automating the software delivery pipeline
- System administrators and cloud engineers looking to gain DevOps skills
- IT professionals who want to improve collaboration between development and operations teams
- ✓ Individuals looking to transition into a career in DevOps
- Companies that want to improve the speed and reliability of their software releases

Rolasoft Technologies Services

Rolasoft Technologies – Services Offered

- SOFTWARE DEVELOPMENT COMPANY
- (MOBILE APPLICATION, WEB APPLICATION, DESKTOP APPLICATION, CUSTOMIZED APPLICATION, E-COMMERCE WEBSITE)
- PROFESSIONAL COMPUTER AND IT EDUCATION

(TOP-UP PROGRAMS, DIPLOMA PROGRAMS, CERTIFICATE PROGRAMS, TECH @ SCHOOL, CORPORATE PROGRAMS, SIWES PROGRAMS, CUSTOMIZED PROGRAMS)

DIGITAL ADVERTISING AND BUSINESS BRANDING

(SOCIAL MEDIA MARKETING, EMAIL MARKETING, CONTENT MARKETING, WEBSITE SEO, BRANDED CLOTHING, STICKERS AND TAG, CUSTOM BRANDING, AND MANY MORE)

INTERNATIONAL UNIVERSITY ADMISSION PROCESSING

(AMERICA, UK, CANADA, EUROPE, AFRICA, AND MANY MORE)

Contact & Registration

Phone: +234 8032867212, +234 8082171242

Email: info@rolasofttech.com

Website: www.rolasofttech.com

Address: 2, Martins Street Off Ojuelegba Road, Yaba, Lagos State.



P Enroll Today & Start Your DevOps Engineer Journey!

Shape your future with DevOps Engineer.