

# Microsoft Windows Automation with Red Hat Ansible Automation Platform

**Course Duration: 40 Hours**

**Course Code: DO417**

## 1. Course Overview

The **Microsoft Windows Automation with Red Hat Ansible Automation Platform (DO417)** course teaches IT administrators and automation engineers how to manage and automate Windows Server environments using Ansible Automation Platform. The training covers automating routine administrative tasks, configuration management, user and group administration, and security policies across Windows infrastructure. By integrating Ansible with Windows, participants will learn how to achieve greater efficiency, consistency, and scalability in hybrid enterprise environments.

## 2. What You'll Learn?

After completing this course, you will be able to:

- Understand **Ansible Automation Platform architecture** and its use with Windows.
- Configure **Ansible control nodes and managed Windows hosts**.
- Automate **Windows system administration tasks** including services, features, and registry settings.
- Manage **users, groups, and permissions** with Ansible.
- Automate **patching, updates, and compliance policies**.
- Integrate **Windows with Linux and hybrid cloud automation**.

- Write and execute **Ansible playbooks tailored for Windows environments**.
- Use **roles and collections** for modular Windows automation.

### 3. Target Audience

This course is designed for:

- **Windows system administrators** adopting automation.
- **IT operations engineers** managing hybrid Windows and Linux environments.
- **Automation engineers** using Ansible across multi-OS infrastructures.
- **DevOps professionals** integrating Windows into CI/CD pipelines.

### 4. Pre-Requisites

- Familiarity with **Microsoft Windows Server administration**.
- Knowledge of **PowerShell or command-line tools** is helpful.
- Prior exposure to **Red Hat Ansible Automation Platform (DO374 or DO407 recommended)**.
- Basic understanding of **networking and IT infrastructure concepts**.

### 5. Course Content

#### **Module 1: Introduction to Windows Automation with Ansible**

- Overview of Ansible Automation Platform
- Managing Windows hosts with Ansible

#### **Module 2: Configuring Control Nodes and Windows Hosts**

- Setting up WinRM for Ansible

- Configuring inventory for Windows systems

### **Module 3: Writing Windows Automation Playbooks**

- Creating playbooks for Windows tasks
- Using Ansible modules for Windows

### **Module 4: Managing Windows Services and Features**

- Starting, stopping, and configuring services
- Installing and managing Windows features

### **Module 5: User, Group, and Permission Management**

- Automating user and group creation
- Managing file and folder permissions

### **Module 6: Automating Windows Updates and Patching**

- Scheduling and applying updates
- Compliance and security automation

### **Module 7: Advanced Windows Automation**

- Registry configuration
- Firewall and security settings

### **Module 8: Roles, Collections, and Best Practices**

- Using Ansible Galaxy for Windows automation
- Structuring playbooks for scalability

### **Module 9: Hybrid and Multi-OS Automation**

- Integrating Linux and Windows tasks in playbooks
- Real-world enterprise use cases