

PE 201: Design & Manage Private Training Service Description

In *Puppet Enterprise 201: Design & Manage*, you'll learn how to use Puppet Enterprise (PE) to declare and manage system configuration enabling continuous compliance and management over the systems in your organization.

Overview

In *Puppet Enterprise 201: Design & Manage*, you'll learn how to streamline your code base and ensure system-wide consistency by building a baseline configuration for your servers and customizing it to meet the business and technology needs of your organization. This one-day, instructor-led course — with hands-on labs for both Linux and Windows users — will teach you how to write reusable, maintainable, and refactorable code to achieve your organization's infrastructure automation and compliance goals.

Course Topics

In this course, you'll learn how to:

- Access node facts to quickly gain key information about your system's health and configuration, saving you time and effort.
- Run Puppet in no-op mode to simulate system changes without applying them.
- Write Puppet code to bring up a web application server.
- Use Puppet Development Kit (PDK) to create classes and validate code.
- Use component modules to configure servers according to your requirements.
- Evaluate and implement Puppet Forge modules to increase code sustainability and reduce maintenance.
- Develop roles to include profiles, enabling you to easily build servers to spec from reusable building blocks.

Puppet and PE concepts covered in this course include:

- Causes of drift between current and desired states
- The agent catalog
- Idempotency (the ability to repeatedly apply an agent catalog without changing the result beyond the initial application)
- Node classification with trusted facts
- The control repository (control repo)
- Component modules and module dependencies

Course Agenda

Class duration is about 8 hours including 10-minute breaks throughout the day and a one-hour break for lunch. Topics covered include:

Welcome and Objectives

Learn how Puppet agent manages state

Lab 1.0 Inspect the agent catalog

Lab 1.1 Simulate changes by running in no-op mode

Classify your nodes with a role

Lab 2.0 Configure node classification by using trusted facts

Develop your roles and profiles

Lab 3.0 Create a base profile

Lab 3.1 Develop web server profiles that consume Puppet Forge modules

Course Conclusion

Delivery Options

This instructor-led course is taught in a cloud-hosted classroom environment and can be delivered virtually or at your facility.

Prerequisites

This course is for you if you're fairly new to Puppet software and are a competent-to-experienced site reliability engineer (SRE), sysadmin, or DevOps engineer who manages Windows or Linux. You should already know how to complete these tasks in Puppet Enterprise (PE):

- Gather information on facts and resources from nodes.
- Set external and trusted facts on nodes.
- Use basic Git workflow, with commands such as pull and push.

We also strongly recommend that you take the first course in this series: *Puppet Enterprise 101: Deploy & Discover,* which teaches you how to install and configure Puppet Enterprise, deploy agents, and gather information about the systems in your infrastructure to prepare for a faux compliance audit.

Class Maximum

The attendee limit for this course is 15 students.

Technical Requirements

Puppet courses have specific technical requirements. You will need access to Zoom to access this course. For the best classroom experience, we recommend that you use two monitors and we also recommend using Google Chrome as your browser. Mozilla Firefox, Apple Safari, and Microsoft Edge are not suitable for this class.

To access the labs used in class, you must <u>create a free account</u> with our Practice Lab partner, Instrugt. We recommend having your Instrugt login credentials ready when you come to class.

Fees

Product Description	Length	Amount
PE201: Design & Manage	1 day	\$6,000.00

This class will be delivered virtually, unless the Customer and Puppet mutually agree that the class will be delivered onsite at the Customer's facility. Onsite delivery requires a minimum of 2 days of private training scheduled consecutively, and the Customer will be responsible for travel and expenses in addition to the fees above. A travel and expense estimate will be provided on the quote and billed at actuals not to exceed the estimate, unless otherwise specified in the quote that travel and expenses will be invoiced in full at the time of purchase. Any quote that does not include a travel and expense estimate will be performed remotely.