

## **Application and Network Monitoring with Zabbix**

Duration: 3 Days (8Hours per day)

**Hands-On Format:** This hands-on class is approximately 80/20 lab to lecture ratio, combining engaging lecture, demos, group activities and discussions with comprehensive machine-based practical programming labs and project work.

Provisioning a Linux to Install Zabbix Server

Download and Install the Zabbix Repository

Install Zabbix Server, Frontend and Agent

Create the Initial Database

Log in and Configure Zabbix Server Front End

Configure a Domain Name for the Zabbix Server

Install Zabbix Agent on Same Network as Zabbix Server

Install Zabbix Agent on CentOS on a Different Cloud Provider

Zabbix Agent Auto Registration

Install and Configure Zabbix Proxy

Configure Zabbix Agent on the Zabbix Proxy

Zabbix Server Health

Zabbix Proxy Health

**Enable PSK Encryption for Zabbix Agents** 

**Enable PSK Encryption for Zabbix Proxy** 

**Creating Host Items** 

**Creating Host Triggers** 

Set Up the Email Media Type

**Creating Host Graphs** 

Convert Host Items, Triggers and Graphs To A Template

**Template Dashboards** 

**Monitoring Dashboards** 

Creating a Network Map

Reading Window Event Logs

Item Preprocessing with Regex

Item Preprocessing with JavaScript

Item Cloning to Create a PCI DSS Windows Template

**Importing Templates** 

Slack Media Type

Telegram Media Type

Customizing Trigger Alert Messages with Macros

Add Disk Space History Graph to OS Linux Template

Trigger Prototypes and Triggering within a Range

Configure Trigger 'OK Event Generation' to Minimize Alert Flapping

Remote HTTP Monitoring with the HTTP Agent Item

Log File Monitoring – NGINX Proxy HTTP Status Codes

Dependent Items

Execute Bat File on Remote Windows Host with Zabbix Agent

Execute Python Script on Remote Linux Host with Zabbix Agent

Execute a Shell Script using Zabbix Agent

**User Defined Parameters** 

**Administration Scripts** 

**Execute PowerShell Scripts to Check Windows Updates** 

Calculated Items

Creating Custom Low level Discovery Rules

Setup SNMP Hosts in Zabbix

Query SNMP Hosts using OIDs

Query SNMP Hosts using MIBs

Set up a Network Discovery Rule and Action to Auto Configure SNMP Devices

Setup SNMP Traps

Triggers on SNMP Traps



Using the Zabbix Get Command Zabbix Sender and Trapper Setup MySQL Monitoring Users, Groups and Roles Grafana Zabbix Plugin Prometheus Node Exporter