



Serverless with GCP

Duration 2 day(s) (SERVERLESS-GCP)

Develop and deploy Serverless applications on Google Cloud Platform

Description

In order to understand how Serverless applications are working and get benefits from it, you have to learn the basics of deployment and management on GCP. During this training, you will learn the basics of Serverless computing such as scaling from zero, hosting constraints, configuration management and you will be introduced to different serverless products like Google App Engine, Cloud Functions and Cloud Run. The training aims at being productive as a Cloud Developer using Serverless tools to scale easily with a smaller amount of infrastructure operation.

Goals

- Understanding the Cloud Computing models (IaaS, CaaS, PaaS, FaaS)
- Understanding Cloud-Native key principles
- Discovering the Google Cloud Platform ecosystem
- Deploying a Serverless application on Google App Engine
- Developing Cloud Functions
- Mastering the data layer
- Using the GCP provided development tools
- Monitoring and logging your applications

Public

- Developers
- Tech Lead & DevOps
- Solution and technical architects
- Operators

Prerequisites

Basic knowledge of the followings:

- Application Development
- Data modeling and storing

Structure

40% Theory, 60% Practice

Program

Cloud Computing concepts

What is Cloud Computing ?

the new models *aaS

"Cloud-Native" Applications

- Introduction to DevOps
- Cloud Patterns ("12-factor app")
- Deployment models

The Google Cloud Platform ecosystem

- The compute services
- The storage services
- Create your first GCP project

Serverless on the PaaS "App Engine"

- Environment details
- Configure your application
- Deploy your application
- Be effective with the Google App Engine Dashboard

Serverless on the FaaS "Cloud Function"

- Environment details and constraints
- Write and test your functions
- Deploy and execute your functions
- Be effective with the Cloud Functions Dashboard

Getting started with Cloud Run

- Create your Docker image
- Deploy your container
- Be effective with the Cloud Run Dashboard

Monitoring & Pricing

- Monitor your application
- Understand the pricing and the quotas