cloudthat

Google Cloud Professional Database Engineer Outline

Duration: (5 day, 8 hrs/day)   **Pre-requisites: None**

With Associate Cloud Engineer Training completed duration is 3 days, 8hrs/day

Course Overview:

A Professional Cloud Database Engineer is a database professional with two years of Google Cloud experience and five years of overall database and IT experience. The Professional Cloud Database Engineer designs, creates, manages, and troubleshoots Google Cloud databases used by applications to store and retrieve data. The Professional Cloud Database Engineer should be comfortable translating business and technical requirements into scalable and cost-effective database solutions.

After completing this course, participants will be able to:

1. Acquire knowledge to design scalable and highly available cloud database solutions and migrating the existing data solution to Google Cloud.

2. Attain skills required to clear the GCP Professional Database Engineer Certification Exam

Module No		
	Google Cloud Fundamentals: Core Infrastructure	
	1	Introducing Google Cloud
	2	Resources and Access in the Cloud
	3	Virtual Machines and Networks in the Cloud
	4	Storage in the Cloud
1	5	Containers in the Cloud
	6	Applications in the Cloud
	7	Developing and Deploying in the Cloud
	8	Logging and Monitoring in the Cloud
	Hands-on	
	1	Cloud Storage: Qwik Start - Cloud Console
	2	Compute Engine: Qwik Start - Windows

Module No	Module Name	
1	**Hands-on**	
	3	Cloud IAM: Qwik Start
	4	Cloud Monitoring: Qwik Start
2	**Enterprise Database Migration**	
	1	Migrating Enterprise Databases to the Cloud
	2	Google Cloud Data Migration Solutions
	3	Google Implementation Methodology
	4	Migration Strategies
	5	Networking for Secure Database Connectivity
	6	Migrating SQL Server Databases to Google Cloud
	7	Migrating Oracle Databases to Google Cloud
	8	Testing and Monitoring SQL Server Databases in Google Cloud
	9	Google Cloud Data Migration Services
	10	Making the Business Case for Moving to Google Cloud
	Hands-on	
	1	Cloud SQL for MySQL: Qwik Start
	2	Migrating to Cloud SQL from Amazon RDS for MySQL Using Database Migration Service
	3	Migrating On-premises MySQL Using a Continuous Database Migration Service Job
	4	Migrating MySQL User Data When Running Database Migration Service Jobs
	5	Migrating MySQL User Data When Running Database Migration Service Jobs
	6	Connect an App to a Cloud SQL for PostgreSQL Instance
	7	Securing a Cloud SQL for PostgreSQL Instance
	8	Configure Replication and Enable Point-in-Time-Recovery for Cloud SQL for PostgreSQL
	9	Cloud Spanner - Database Fundamentals

Module No	Module Name	
2	**Hands-on**	
	10	Cloud Spanner - Loading Data and Performing Backups
	11	Cloud Spanner - Defining Schemas and Understanding Query Plans
	12	Deploy a Modern Web App connected to a Cloud Spanner Instance
	13	Designing and Querying Bigtable Schemas
	14	Creating and Populating a Bigtable Instance
	15	Streaming Data to Bigtable
	16	Monitoring and Managing Bigtable Health and Performance