

# **DP-700: Implementing Data Engineering Solutions Using Microsoft Fabric**

## Course Overview

This course covers methods and practices for implementing and managing data engineering operations using Microsoft Fabric. This course is mainly targeted for Business Analysts, Data Analysts, Data Engineers and Data Scientists. Students will build on existing experience on data engineering and will learn how to use Microsoft Fabric components in-depth for Data Engineering purposes, like workspace settings, lakehouses, data warehouses, spark notebooks, dataflows, data pipelines, event streams, and semantic models to create and deploy data engineering assets. They also learn to implement analytics best practices in Fabric, including identifying and resolving errors, optimization, achieve data security and governance, enable version control and deployment.

Fabric Data Engineers collaborate with other professionals, such as analytics engineers, architects, analysts, and administrators to design and deploy data engineering solutions for analytics.

## Key Features

Our DP-700 exam certification course modules have 50% -60% hands-on lab sessions to encourage Thinking-Based Learning (TBL).

- The training on exam DP-700: Microsoft Fabric Analytics Engineer is delivered by certified instructor to support Competency-Based Learning (CBL) modules.

- Integrated teaching assistance and support through expert designed Learning Management System (LMS) and ExamReady platform.
- Interactive-rich virtual and face-to-face classroom teaching to inculcate Problem-Based Learning (PBL) in this new course by Microsoft.
- This new Microsoft certifications course consists of well-structured use-cases to simulate challenges encountered in a Real-World environment.
- Being a Microsoft Learning Partner gives us competitive edge in delivering the best training on this newly announced course from Microsoft.

## Who Should Attend?

- Data Engineers
- Analytics Engineers
- Solutions Architects
- Administrators
- Business Analysts
- Data Analysts

### Prerequisites

While there are no official prerequisites for taking this course, it is recommended that:

- Students have a foundational knowledge of Azure Data Platform (refer DP-900 course) and Azure Data Engineer Associate exam syllabus (DP-203).
- Awareness of functioning of Azure Synapse Analytics and PowerBI is an added advantage.

## Course Modules

### Module 1    Configure Microsoft Fabric Workspace settings

- Configure Spark workspace settings
- Configure domain workspace settings
- Configure OneLake workspace settings
- Configure data workflow workspace settings

## Module 2 Implement lifecycle management in Fabric

- Configure version control
- Implement database projects
- Create and configure deployment pipelines

## Module 3 Configure Security And governance

- Implement workspace-level access controls
- Implement item-level access controls
- Implement row-level, column-level, object-level, and file-level access controls
- Implement dynamic data masking
- Apply sensitivity labels to items
- Endorse items

## Module 4 Orchestrate Processes

- Choose between a pipeline and a notebook
- Design and implement schedules and event-based triggers
- Implement orchestration patterns with notebooks and pipelines, including parameters and dynamic expressions

## Module 5 Design and Implement loading pages

- Design and implement full and incremental data loads
- Prepare data for loading into a dimensional model
- Design and implement a loading pattern for streaming data

## Module 6 Ingest and bath data

- Choose an appropriate data store
- Choose between dataflows, notebooks, and T-SQL for data transformation
- Create and manage shortcuts to data
- Implement mirroring
- Ingest data by using pipelines
- Transform data by using PySpark, SQL, and KQL
- Denormalize data
- Group and aggregate data
- Handle duplicate, missing, and late-arriving data

## Module 7 Ingest and transform streaming data

- Choose an appropriate streaming engine
- Process data by using eventstreams
- Process data by using Spark structured streaming
- Process data by using KQL
- Create windowing functions

## Module 8 Monitor Fabric Items

- Monitor data ingestion
- Monitor data transformation
- Monitor semantic model refresh
- Configure alerts

## Module 9 Identify and resolve errors

- Identify and resolve pipeline errors
- Identify and resolve dataflow errors
- Identify and resolve notebook errors
- Identify and resolve eventhouse errors
- Identify and resolve eventstream errors
- Identify and resolve T-SQL errors

## Module 10 Optimize Performance

- Optimize a lakehouse table
- Optimize a pipeline
- Optimize a data warehouse
- Optimize eventstreams and eventhouses
- Optimize Spark performance
- Optimize query performance

# About CloudThat

Founded in 2012, CloudThat is an award-winning company and the first in India to offer cloud training and consulting services for mid-market and enterprise clients worldwide. Recently, it became the first Indian company to win consecutive AWS Training Partner of the Year (APJ) Awards and the Microsoft Training Services Partner of the Year Award. These achievements represent its 11th award in 8 years. Notably, 20 of CloudThat's Microsoft trainers feature in Microsoft's Top 100 MCTs Global List for 2025, underscoring its global excellence in training.

A pioneer in the cloud domain, CloudThat specializes in Cloud Migration, Data Platforms, DevOps, IoT, and cutting-edge technologies like Gen AI & AI/ML. As a Microsoft Solutions Partner, AWS Advanced Tier Training Partner, and Google Cloud Platform Partner, CloudThat has trained 850k+ professionals across 600+ cloud certifications and supported 500+ consulting projects for 250+ corporates in 30+ countries. These achievements highlight CloudThat's commitment to empowering professionals to advance their skills and careers

## Our Success Track

<b>13+ Years</b> of Experience	<b>200+</b> Corporates served	<b>30+</b> countries catered
<b>850K+</b> Professionals trained	<b>500+</b> Projects delivered	<b>600+</b> Cloud certifications

To know more about our cloud certification training, email at [sales@cloudthat.com](mailto:sales@cloudthat.com) or call us at **+918880002200**.