



# ETL Testing Training



## **Course Overview:**

ETL testing course was made by an eminent ETL tester who has more than 10 years of on-field experience. This ETL certification course masters you in all the key concepts of ETL testing like OLAP, OLTP, data warehousing, SQL for checking the information, and so on. This ETL course makes you work on real-world examples and case studies. After completion of this ETL testing course with projects industry approved ETL certification is awarded which represents you as an expert in ETL testing.

## **Training Features:**

- 8X higher interaction in live online classes conducted by industry experts
- 90 Hrs. live Classes of ETL Testing with Interview Preparation
- 3 real-time industry projects with hands-on preparation
- Unlimited Interview Opportunities with Placement Support
- Industry-recognized course completion certificate

## **Delivery Mode:**

- Online Live Virtual Instructor Led Training

## **Target Audience:**

Software developers, data base managers, Business analyst can excel their career by using this etl certification course. Fresh graduates with a minimum degree are eligible for this ETL testing course prerequisite for this ETL testing course

There are no such prerequisites required for this ETL testing course. Some basic knowledge about statistics and analytical thinking makes this ETL course more beneficial.

## **Key Learning Outcomes:**

This ETL testing training makes you expert in the concepts like

- ETL basics, the testing procedures
- Data Warehousing
- ETL data validation
- Installation, restoration, transformations in informatica
- Building queries for BI report
- ETL database testing v/s data warehouse testing
- Deploying SQL for data information

## **Certification Details:**

- Complete at least 85 percent of the course or attend one complete batch
- Successful completion and evaluation of the project

## DWH Data Ware Housing Concepts

- What is Data Warehouse?
- Need of Data Warehouse
- Introduction to OLTP, ETL and OLAP Systems
- Difference between OLTP and OLAP
- Data Warehouse Architecture
- Data Marts
- ODS [Operational Data Store]
- Dimensional Modelling
- Difference between relation and dimensional modelling
- Star Schema and Snowflake Schema
- What is fact table
- What is Dimension table
- Normalization and De-Normalization

## ETL Testing

- ETL architecture.
- What is ETL and importance of ETL testing
- How DWH ETL Testing is different from the Application Testing
- SDLC/STLC in the ETL Projects (ex: V Model, Water fall model)

## Challenges in DWH ETL Testing compare to other testing

- Incompatible and duplicate data
- Loss of data during ETL process
- Testers have no privileges to execute ETL jobs by their own
- Volume and complexity of data is very huge
- Fault in business process and procedures
- Trouble acquiring and building test data

## ETL Testing Work flow activities involved

- Analyze and interpret business requirements/ workflows to Create estimations
- Approve requirements and prepare the Test plan for the system testing
- Prepare the test cases with the help of design documents provided by the developer team
- Execute system testing and integration testing
- Best practices to Create quality documentations (Test plans, Test Scripts and Test closure summaries)
- How to detect the bugs in the ETL testing
- How to report the bugs in the ETL testing
- How to co-ordinate with developer team for resolving the defects

## Types of ETL Testing

- Data completeness
- Data transformation
- Data quality
- Performance and scalability
- Integration testing
- User-acceptance testing
- SQL Queries for ETL Testing
- Incremental load testing
- Initial Load / Full load testing

## Different ETL tools available in the market

- Informatica
- Ab Initio
- IBM Data stage

## Power Center Components

- Designer
- Repository Manager
- Workflow Manager
- Workflow Monitor
- Power Center Admin Console

## Informatica Concepts and Overview

- Informatica Architecture

## Sources

- Working with relational Sources
- Working with Flat Files

## Targets

- Working with Relational Targets
- Working with Flat file Targets

## Transformations – Active and Passive Transformations

- Expression
- Lookup –Different types of lookup Caches
- Sequence Generator
- Filter
- Joiner
- Sorter
- Rank
- Router
- Aggregator
- Source Qualifier
- Update Strategy
- Normalizer
- Union
- Stored Procedure
- Slowly Changing Dimension
- SCD Type1
- SCD Type2 — Date, Flag and Version
- SCD Type3

## Workflow Manger

- Creating Reusable tasks
- Workflows, Worklets & Sessions
- Tasks
- Indirect Loading
- Constraint based load ordering
- Target Load plan
- Worklet ,Mapplet ,Resuable transformation
- Migration ?ML migration and Folder Copy
- Scheduling Workflow
- Parameter and variables
- XML Source, Target and Transformations

## Performance Tuning

- Pipeline Partition
- Dynamic Partition
- Pushdown optimization
- Preparation of Test Cases
- Executing Test case
- Preparing Sample data
- Data validation in Source and target
- Load and performance testing
- Unit testing Procedures
- Error handling procedures