

Analyzing Data with Excel (MS-20779)

Modality: Virtual Classroom

Duration: 3 Days

SATV Value: 3

The exam associated with this course will retire on 31st January 2021. However, the course is still valid as training material for learning purposes.

About this course:

Analyzing Data with Excel (MS-20779) is a 3 day course, that focuses mostly on integrating BI techniques to Excel Data analysis, therefore this course increases the capabilities of students from making pie charts and tables to Pivot charts, the Excel data Model and Power BI. The courseware is supported by virtual labs to provide practice on real platforms. Moreover, students will get a recognized certificate on completion off the course.

A qualified Solutions Developers with Microsoft Azure skills earns **\$81,714** annually.

Course Objective:

After completing this course, students will be able to:

- Explore and extend a classic Excel dashboard.
- Explore and extend an Excel data model.
- Pre-format and import a .CSV file.
- use data from a SQL Server database
- use data from a previous reports.
- Build measures using advanced DAX functions.
- Build data visualizations in Excel.
- Build a Power BI dashboard with Excel.

Audience:

The target audience of this course includes:

- Students experienced in analyzing data with Excel and who wish to add BI techniques to their

expertise.

- SQL Server report creators who want to learn alternative methods of presenting data.

Prerequisites:

Students attempting this course must have a previous understanding of the following:

- Basic working knowledge of the Microsoft Windows operating system and its functions
- Familiarity of relational databases.
- Complete Knowhow of Excel spreadsheets including formulas, charts, filtering, sorting, and sub-totals.

Suggested prerequisites courses:

- SQL Database for Beginners

Course Outline:

Module 1: Data Analysis in Excel

This module looks at the classic Excel dashboard and at ways to extend it.

Lessons

- Classic Data Analysis with Excel
- Excel Pivot Tables
- Limitations of Classic Data Analysis

Lab : Building a Classic Excel Dashboard

- Formatting Data
- Building a Pivot Table
- Adding pivot charts and a slicer

After completing this module, students will be able to:

- Describe classic data analysis with Excel
- Describe Excel pivot tables
- Describe the limitations of classic data analysis with Excel

Module 2: The Excel Data Model

This module looks at the classic Excel data model and at ways to extend it.

Lessons

- Using an Excel Data Model
- DAX

Lab : Explore an Excel Data Model

- Create Calculated Columns
- Format Data Model Data
- Create Measures
- Analyze the Data

After completing this module, students will be able to:

- Describe an Excel data model
- View data within an Excel data table
- Describe DAX

Module 3: Importing Data from Files

This module looks at pre-formatting and importing CSV files.

Lessons

- Importing Data into Excel
- Shaping and Transforming Data
- Loading Data

Lab : Importing Data from a CSV File

- Import and Transform Data from a CSV File
- Add Data from a Folder

After completing this module, students will be able to:

- Import data into excel.
- Shape and transform data.
- Load data.

Module 4: Importing Data from Databases

This module looks at how to import data into Excel from a SQL Server database.

Lessons

- Available Data Sources

- Previewing, Shaping, and Transforming Data
- Table Relationships and Hierarchies
- Loading Data

Lab : Import Data from Multiple Sources

- Import Data from SQL Server
- Import Data from a CSV File
- Create a Data Table

After completing this module, students will be able to:

- Identify available data sources.
- Preview, shape, and transform data.
- Explain table relationships and hierarchies.
- Load data from various sources.

Module 5: Importing Data from Excel Reports

This module describes how to import data from a report.

Lessons

- Importing Data from Excel Reports
- Transforming Excel report Data

Lab : Importing Data from a Report

- Import Data from Excel
- Transform the Excel Data
- Load the Data into an Excel Data Model

After completing this module, students will be able to:

- Import data from Excel reports.
- Transform Excel report data.

Module 6: Creating and Formatting Measures

This module describes how to create and format measures.

Lessons

- DAX
- Measures
- Advanced DAX Functions

Lab : Creating Measures using Advanced DAX Functions

- Last year comparison
- Year to date
- Market Share

After completing this module, students will be able to:

- Explain what DAX is and when to use it.
- Describe a measure.
- Use some of the advanced functions within DAX.

Module 7: Visualizing Data in Excel

This module describes how to visualize data in Excel.

Lessons

- Pivot Charts
- Cube Functions
- Charts for Cube Functions

Lab : Data Visualization in Excel

- Create a Tabular Report
- Create a Pivot Chart
- Add Slicers to Charts

After completing this module, students will be able to:

- Create and refine a pivot chart.
- Describe cube functions and when to use them.
- Describe a number of charts for use with cube functions.

Module 8: Using Excel with Power BI

This module describes how to use Excel with Power BI.

Lessons

- Power BI
- Uploading Excel Data to Power BI
- Power BI Mobile App

Lab : Creating a Power BI Dashboard with Excel

- Uploading Excel Data
- Creating a Power BI Dashboard
- Using Power BI desktop

After completing this module, students will be able to:

- Describe Power BI and the various versions available.
- Upload Excel data to Power BI.
- Describe the Power BI App.