



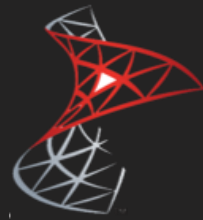
TRAINING | PLACEMENTS | CONSULTING

Business Intelligence with Power BI Curriculum

Technologies



Excel



T-SQL



Power BI



Power Apps

Course Outline



60+ Hours of Content



5+ Assignments



Project Portfolio



5+ Quizzes



5+ Projects



100+ Concepts



ATS Resume



Communication



Design

Contents

- 1. Microsoft Excel**
- 2. T-SQL**
- 3. Statistics & Charts**
- 4. Data Sources**
- 5. ETL using Power Query**
- 6. Data Modeling**
- 7. DAX**
- 8. Time Intelligence**
- 9. Data Visualization**
- 10. Performance Optimization**
- 11. External Tools**
- 12. Data Security**
- 13. Report Maintenance**
- 14. Introduction to Power Apps**
- 15. Introduction to Python**

Microsoft Excel

1. **Functions**
2. **Data Validation**
3. **Flash Fill / Analyze Feature**
4. **Formula Auditing**
5. **Tables**
6. **Charts**
7. **Pivot Tables**
8. **Customization Options**
9. **What-If Analysis**
10. **Introduction to Power Query**
11. **Web Scraping**

T-SQL I

1. Introduction to SQL
2. Installation of SSMS
3. Introduction to Data Concepts
4. Primary Key & Foreign Key
5. Creation of Database
6. Importing Databases
7. Big 6 Statements
8. Order of Queries
9. Order of Execution
10. Joins

T-SQL II

11. Partitions

12. Index

13. Window Functions

14. Analytical Functions

15. Practice Exercises

16. Connecting SQL with Excel & Power BI

17. Native Queries

18. Data Security

19. SQL Version Differences

20. Problem Solving

Statistics & Charts

1. Mean, Median and Mode
2. Quartile Vs Percentage Vs Percentile
3. Distributions
4. Outliers
5. Basic Charts
6. Charts Types
 - a. Comparison
 - b. Relationship
 - c. Distribution
 - d. Composition
 - e. Trends
 - f. Spatial

Data Sources

1. **Identify and Connect to a data source**
2. **Types of Data Source – SQL, APIs, OneDrive, CSV, Excel, Web etc.**
3. **Common Data Sources**
4. **Data Source Settings**
5. **Connection Modes - Direct Query, Import, and Dual mode**
6. **Inconsistencies, Unexpected or Null Values, and Data Quality issue**
7. **Change data source settings, including credentials, privacy levels, and data source locations**

ETL using Power Query I

1. Introduction to Power Query
2. Introduction to M-Code
3. Data Types
4. Column Quality, Distribution, and Profile
5. Data Source Settings
6. Removing Duplicates
7. Merging Columns
8. Transpose
9. Group By
10. Pivot Vs Unpivot
11. Parameters
12. Data Refresh Settings

ETL using Power Query II

13. Split Columns

14. Index Columns

15. Error Handling

16. Custom Functions

17. UI Vs M-Code

18. Custom Columns

19. Merge and Append Queries

20. Joins

21. Fuzzy Logic

Data Modeling

1. Tables
2. Data Types
3. Primary Key Vs Foreign Key Vs Composite Key
4. Relationships
5. Star Schema Vs Snowflake Schema
6. Naming Convention
7. Hierarchies
8. Physical Vs Virtual Relationships
9. Performance
10. Handling Missing / Null Values
11. Configuring Q&A

Data Analysis Expressions (DAX)

1. Introduction to DAX
2. DAX Functions
3. Types
4. Evaluation Context
5. Row Context Vs Filter Context
6. Scalar Vs Tables
7. Calendar Table
8. Calculated Columns
9. Measures
10. Quick Measures

Time Intelligence

1. Data Types
2. Calendar Vs Fiscal
3. Global Impact
4. Cumulative Aggregation
5. Rolling Totals
6. Parallel Comparison
7. Successive Time Comparison
8. Excel Vs DAX Vs M-Code
9. Calendar Table
10. Business Examples
11. Time Intelligence DAX Functions

Data Visualization I

1. Canvas
2. View Options
3. Mobile Layout
4. Themes
5. Reports Vs Dashboards
6. Wallpaper
7. Power BI Visuals
8. Slicers Vs Filters
9. Types of Filters
10. Edit Interactions
11. Format Options
12. Drill Down Vs Drill Through

Data Visualization II

11. Layers

12. Tooltips

13. Custom Tooltips

14. Conditional Formatting

15. Analytics

16. Custom Visuals

17. Bookmarks

18. Parameters

19. Mobile Layout

20. Page Navigation

21. Shapes

Performance Optimization

1. Performance Analyzer
2. Diagnostics
3. DAX Studio
4. Best Practices

External Tools

1. **DAX Studio**
2. **Bravo for Power BI**
3. **Tabular Editor 2**
4. **DAX Formatter**
5. **Vertipaq Analyzer**
6. **Analyze in Excel**

Data Security

1. Data Source
2. User Authentication
3. Access Rights
4. Row Level Security
5. Roles Creation
6. Static Vs Dynamic
7. Sharing Reports
8. Mapping Files
9. Cross Filter
10. Security Filter

Report Maintenance

1. **Workspaces**
2. **Roles in Workspace**
3. **Apps**
4. **Dashboards**
5. **Reports**
6. **Scheduled Refresh**
7. **Data Access**
8. **Native Queries**
9. **Data Gateway**

Introduction to Power Apps

- 1. Introduction to Power Platform**
- 2. Power Apps Vs Power BI Vs Power Automate**
- 3. Canvas Apps**
- 4. Tablet & Mobile Layouts**
- 5. Power Fx**
- 6. Introduction to Forms**
- 7. Local & Global Variables**
- 8. Collections**
- 9. Version Control**
- 10. Publishing**

Bonus Content

- 1. Resume Review**
- 2. Guidance on Project Portfolio**
- 3. Introduction to Anki**
- 4. LinkedIn Profile Optimization**
- 5. Naukri Profile Optimization**
- 6. Sources for Public Datasets**
- 7. Resource Guide**
- 8. Guidance on PL-300 Microsoft Certification for Power BI**
- 9. Guidance on MO-200 Microsoft Certification for Excel**
- 10. Guidance on PL-100 Microsoft Certification for Power Apps**