

WEEKLY REPORT
WEEK - 1 (From Dt. 3-7-24 to Dt. 5-7-24)

Objective of the Activity Done:	What is data Analytics?
Detailed Report:	<p>The process involved in data Analytics in the first learned about the definition, Agenda and steps to understand about data Analytics. Also discussed about the problem and solutions to Analyse the data and analysed the data based on steps as:</p> <ul style="list-style-type: none">→ Comparing the data→ Putting the data in visual→ Breaking the data <p>also understand the concept of tools in data Analytics, which helps to store the data in efficient and secure manner</p> <ul style="list-style-type: none">→ SQL (Structured Query Language)→ NO SQL <p>DA technologies like</p> <ul style="list-style-type: none">• data management• data visualization• Predictive model <p>we also learned about where this data Analytics is used or applied in various industries like finance, retail banking Agriculture and Companies like where DA for growth.</p>

WEEKLY REPORT

WEEK - 2 (From Dt. 8-7-24 to Dt. 12-7-24)

Objective of the Activity Done: Data Analytics process and structure in the second week. Learned about the different process that is required in data analytics data

Detailed Report:

Cleaning and also the data

processing the data in a detailed manner and type of DA into 4 categories like

- Descriptive Analytics
- Diagnostic Analytics
- Predictive Analytics
- Prescriptive Analytics

Also learned about the challenges faced in the organization with the solution with power BI in action which gives visible insights and Sales force forecasting also about the Architecture of the BI, which tells us about the structure of the data Analytics. mainly teaches also DWH that is data ware housing and data bases

- collect - integrate - store - Analyse
- Distribute and react with ETL tools

WEEKLY REPORT

WEEK - 3 (From Dt. 15/7/24 to Dt. 19/7/24)

Objective of the Activity Done: Data Visualization Techniques

Detailed Report: In the third week, the emphasis was on data visualization techniques using power BI. We explored various types of charts, graphs and maps that can be created in power BI to visualize data insights.

The sessions include best practices for selecting the right visualization based on the type of data and the message we want to convey. We also learned about customizing visual elements, using themes, and enhancing reports with interactive features like slicers and drill-throughs.

WEEKLY REPORT

WEEK - 4 (From Dt. 22/7/24 to Dt. 26/7/24)

Objective of the Activity Done: Advanced Analytics and DAX

Detailed Report: week four delved into advanced analytics and data analysis expression (DAX) in Power BI. We learned how to create calculated columns, measures, and custom tables using DAX. The training covered complex DAX functions such as time intelligence filtering, and aggregation. We also explored advanced analytical techniques like trend analysis, forecasting, and what-if scenarios.

The week ended with exercises to build dynamic reports using DAX-driven insights.

Objective of the Activity Done:

Power BI service and Collaboration

Detailed Report: The fifth week covered the power BI service and its collaborations features

We learned how to publish reports to the Power BI services, share dashboards and collaborate with team members in real time. The sessions emphasized data security, row-level security (RLS) and managing workspaces

We also explored power BI's integration with other Microsoft tools like excel, Teams and share point making it easier to collaborate and share insights across the organization.

WEEKLY REPORT

WEEK - 6 (From Dt. 5.1.24 to Dt. 9.1.24)

Objective of the Activity Done: Best practices and Industry application

Detailed Report: In the final week of internship classes we focused on best practices in data analytics and realworld applications of power BI across various industries

we discussed key strategies for optimizing data models, enhancing report performance, and maintaining data governance

The sessional also included case studies showcasing how companies use power BI for business intelligence,

series analysis, financial reporting, and operational efficiency the week wrapped up with an overview of the upcoming project work

Objective of the Activity Done:

Project work - data analysis and visualization

Detailed Report:

The seventh week marked the beginning of the project phase

we started by defining the project scope, objectives, and deliverable

The project involved analyzing a dataset provided by smart interoing. cleaning and transforming the data and building a data model.

Our team focused on identifying key metrics, trends, and patterns that could drive business decisions.

The intal reports and dashboards were created to visulize these insights using the skills and techniques learned over the past six weeks

Objective of the Activity Done:

Finalization and Presentation

Detailed Report:

In the final week, we completed the project by refining our reports and dashboards, ensuring they met the project requirements.

We focused on enhancing the visual appeal and usability of the dashboards by adding interactive elements and ensuring the data was accurately represented. The week culminated with a presentation to the Smart Interns team, where we showcased our findings, explained the methodologies used, and demonstrated how the insights could be applied to solve real business problems.

The project was well received, marking a successful conclusion to the internship.