E-commerce Sales Analysis Dashboard

Overview

Welcome to the E-
commerce Sales Analysis Dashboard project. This comprehensive project showcases the power o f data visualization using Power BI, focusing on e-
commerce sales data. It provides insightful analyses and interactive visualizations to help underst and sales performance, customer behavior, and product trends.

Project Learnings

- **Interactive Dashboard Creation**: Developed an engaging dashboard to track and analyz e e-commerce sales data.
- **Advanced Visualizations**: Utilized various types of visualizations like bar charts, pie cha rts, scatter plots, and more for effective data representation.
- **Complex Parameters and Filters**: Created dynamic parameters and customized filters to enable in-depth data exploration.
- **Data Manipulation**: Performed calculations and data manipulations to provide actionabl e insights.

Key Metrics

- **Sum of Amount**: 438K
- **Sum of Profit**: 37K
- **Sum of Quantity**: 5615
- **Sum of AOV (Average Order Value)**: 121K

Insights

- **State-
wise Amounts**: Maharashtra leads with 102K, followed by Madhya Pradesh, Uttar Prade sh, and Delhi.
- **Category-
wise Quantity**: Clothing accounts for 63%, followed by Electronics and Furniture.
- **Monthly Profit Trends**: Peaks in January and November with a significant drop in June.
- **Top Customers by Amount**: Harivansh, Madhav, Madan Mohan, and Shiva.
- **Payment Mode Distribution**: COD leads at 44%, followed by UPI, Debit, Credit Card, a nd EMI.
- **Sub-
Category Profit Leaders**: Printers and Bookcases are the top profit contributors, followe d by Sarees, Accessories, and Tables.

Database Schema

The database schema consists of two main tables, Orders and Details, connected by a one-to-many relationship based on the Order ID.

Orders Table:

- **order_id**: INT, Primary Key
- **date**: DATE, Not Null
- **time**: TIME, Not Null
- **customer_name**: TEXT
- **state**: TEXT
- **city**: TEXT

Details Table:

- **order_details_id**: INT, Primary Key
- **order_id**: INT, Foreign Key references orders(order_id)
- **pizza_id**: VARCHAR(50), Foreign Key references pizzas(pizza_id)
- **quantity**: BIGINT
- **amount**: DOUBLE
- **aov**: DOUBLE
- **category**: TEXT
- **payment_mode**: TEXT
- **profit**: DOUBLE