DIWALI SALES DATA ANALYSIS

BY PARAM DHINGANA

PROJECT OVERVIEW

- Goal: Analyze Diwali sales data to derive actionable insights for data-driven decision-making.
- **Objective**: Identify key trends, customer behavior patterns, and product performance to improve marketing, inventory management, and customer targeting.
- **Approach**: Perform exploratory data analysis (EDA) to calculate KPIs and create visualizations.

PROBLEM STATEMENT

- Sales data from the Diwali season needs to be analyzed to uncover customer preferences, product demand, and geographic performance.
- The company aims to leverage these insights for future sales strategies, stock management, and targeted marketing campaigns.

QUESTIONS

- What are the top-performing product categories during Diwali sales?
- How do number of orders vary across gender, age groups, occupations, and regions?
- How do sales vary across gender, age groups, occupations, and regions?
- How does Marital Status impact sales and revenue?
- What are the demographic factors (gender, age, location) that correlate with higher spending?

DATASET OVERVIEW

The dataset contains the following attributes:

- **User_ID** (customer identifier)
- Cust_name (customer name)
- **Product_ID** (unique identifier for products)
- Gender (male/female)
- Age Group (categorical age ranges)
- Age (numerical age)
- Marital_Status (binary: married/single)
- State, Zone (geographic regions)
- Occupation (customer occupation)
- **Product_Category** (category of purchased product)
- Orders (number of orders placed)
- Amount (purchase amount)

27981

Total Quantity of Orders

11239

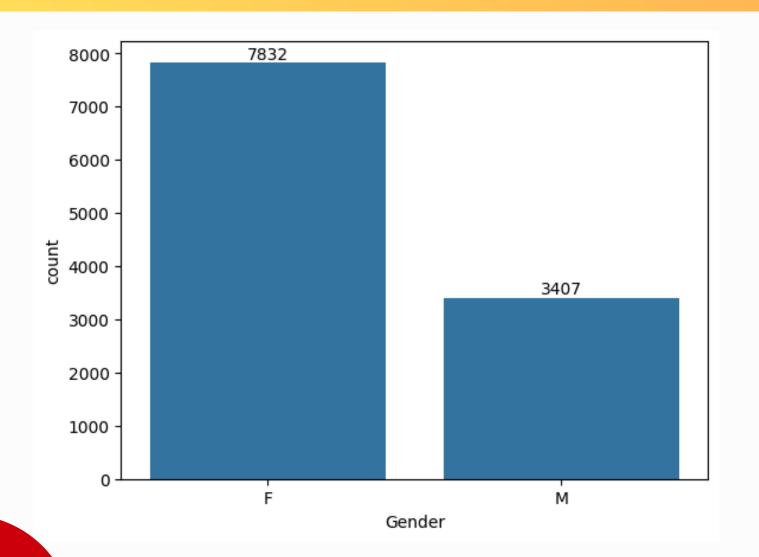
Total Number of Orders

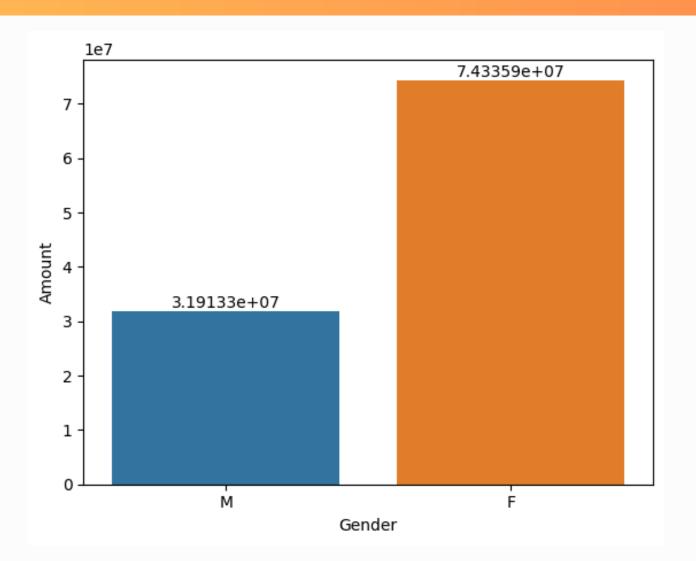
₹ 106249129

Total Revenue

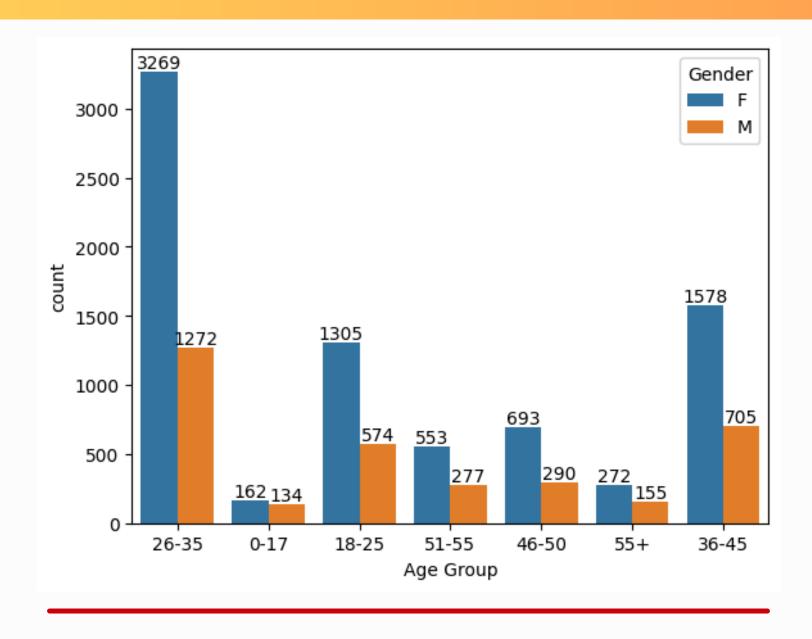
₹ 9453.61

Average Order Value (AOV)

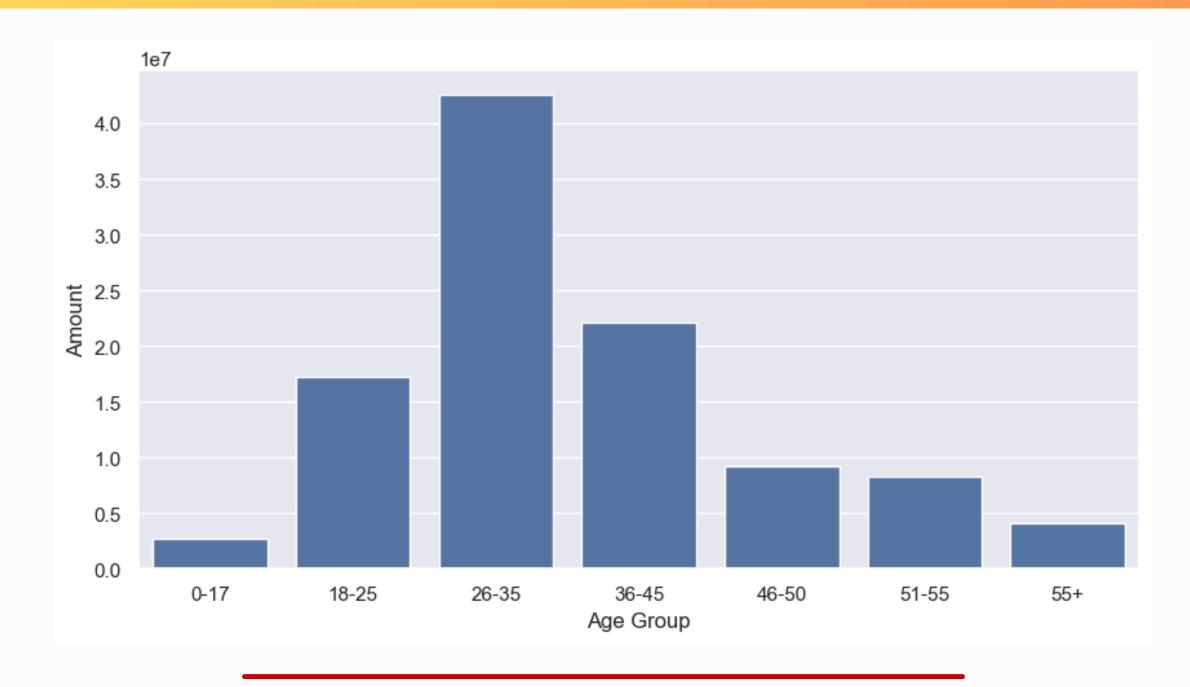




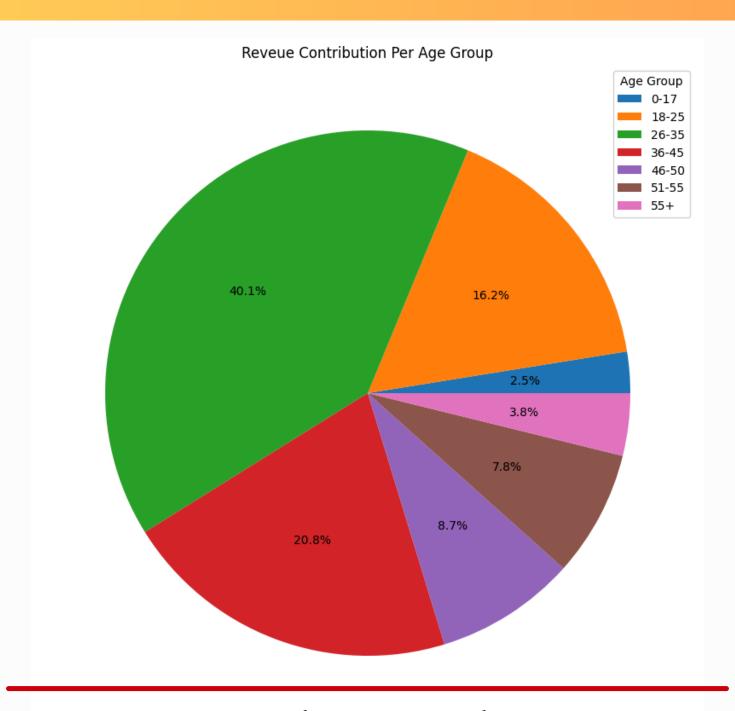
Sales & Revenue Contribution by Gender



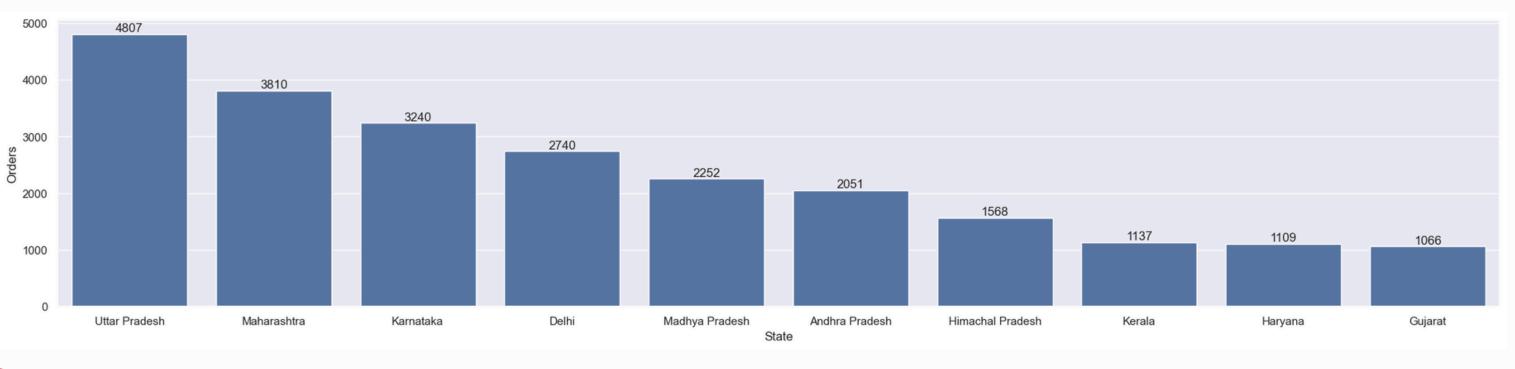
Sales Contribution by Age Group

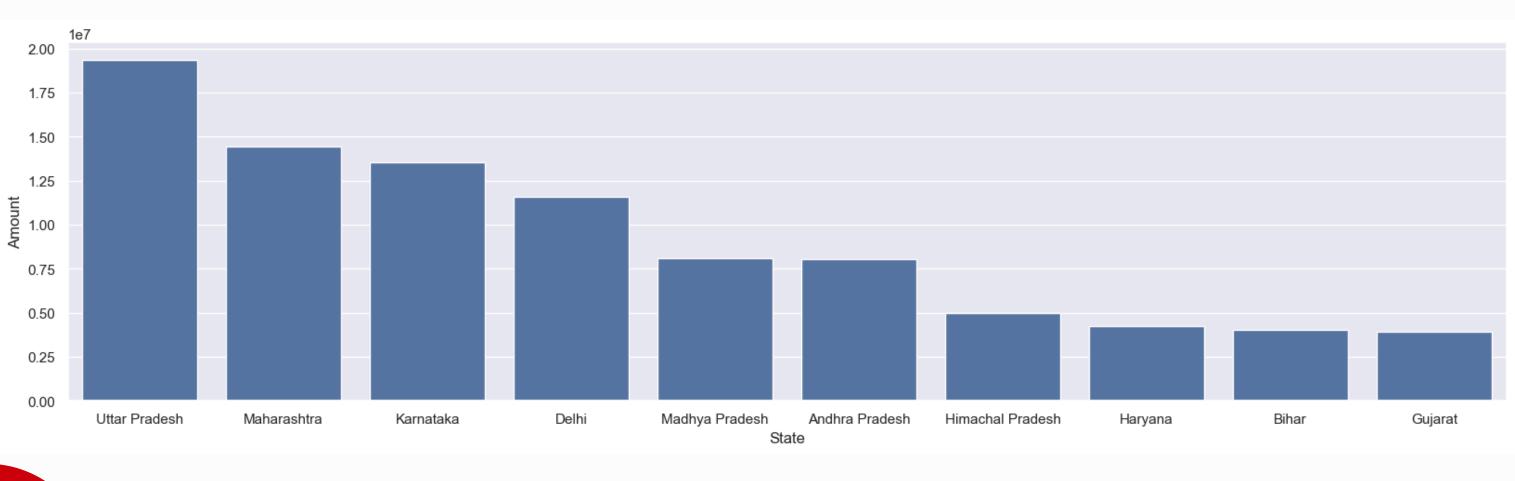


Revenue Contribution by Age Group

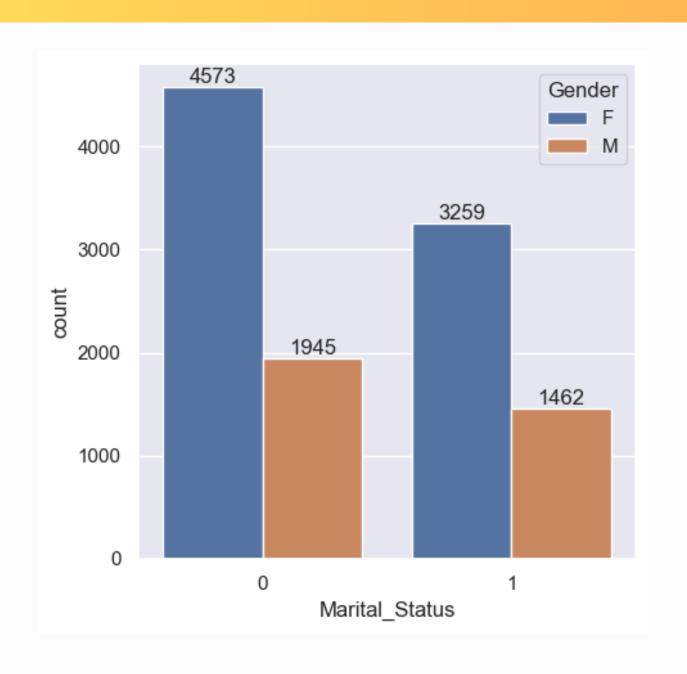


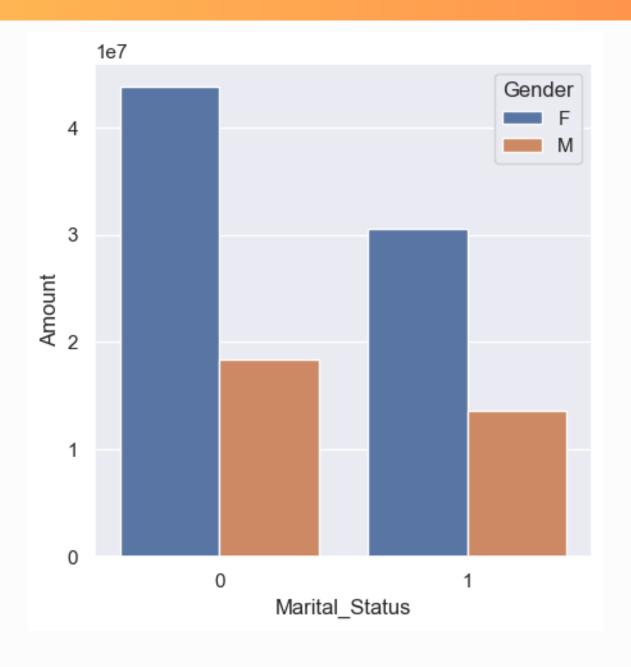
Revenue Distribution by Age Group



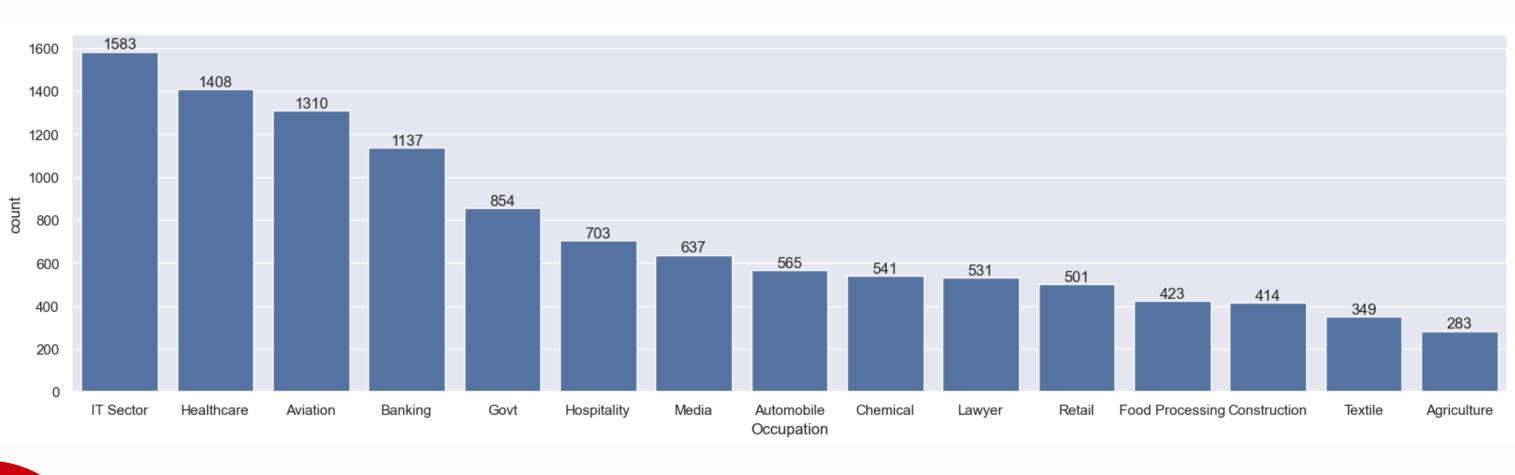


Revenue Contribution by State

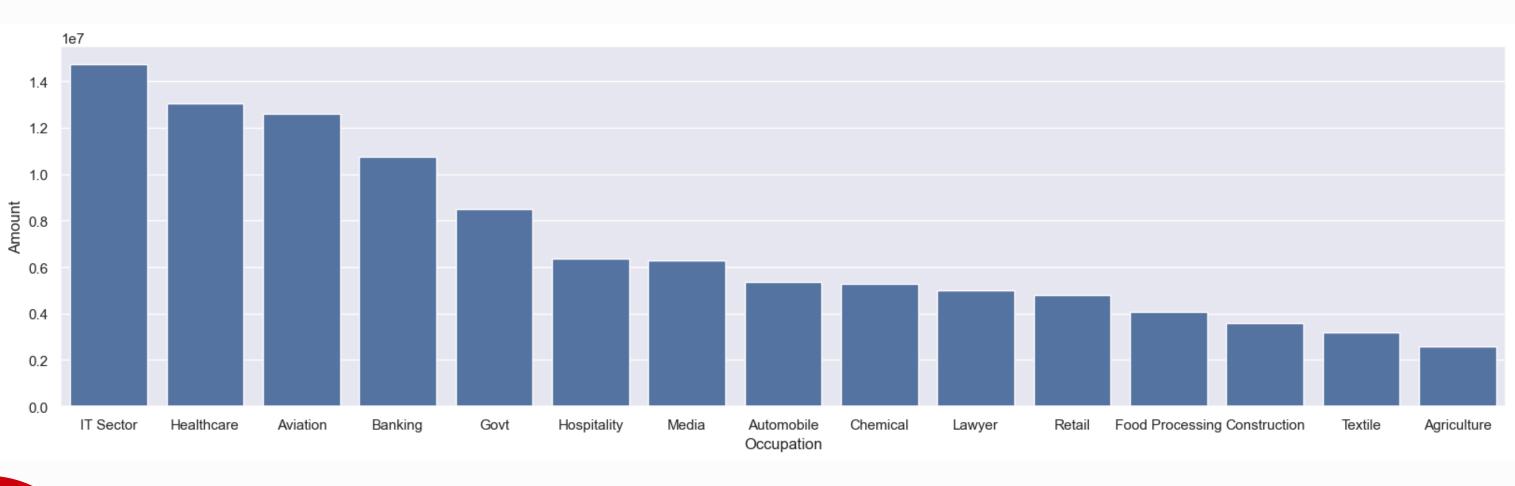




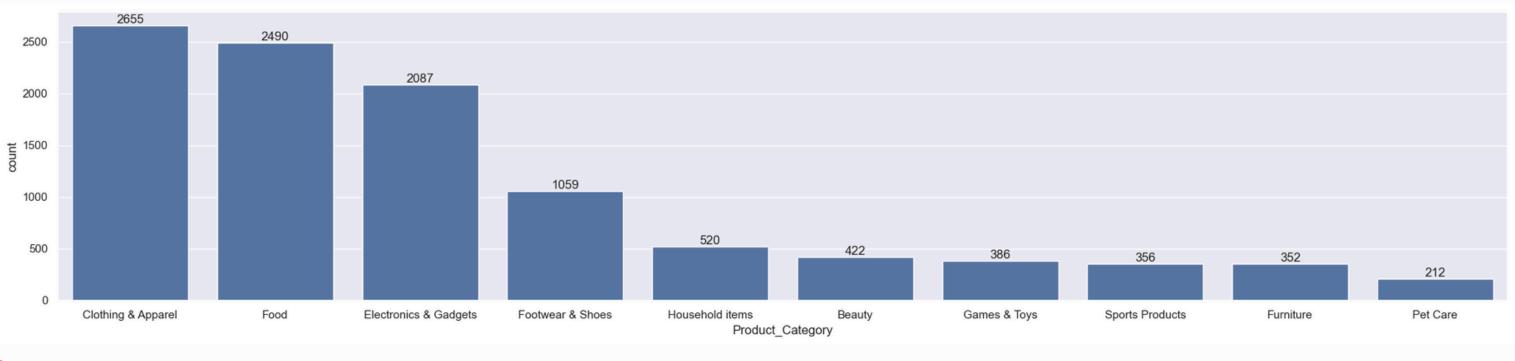
Sales & Revenue Contribution by Marital Status



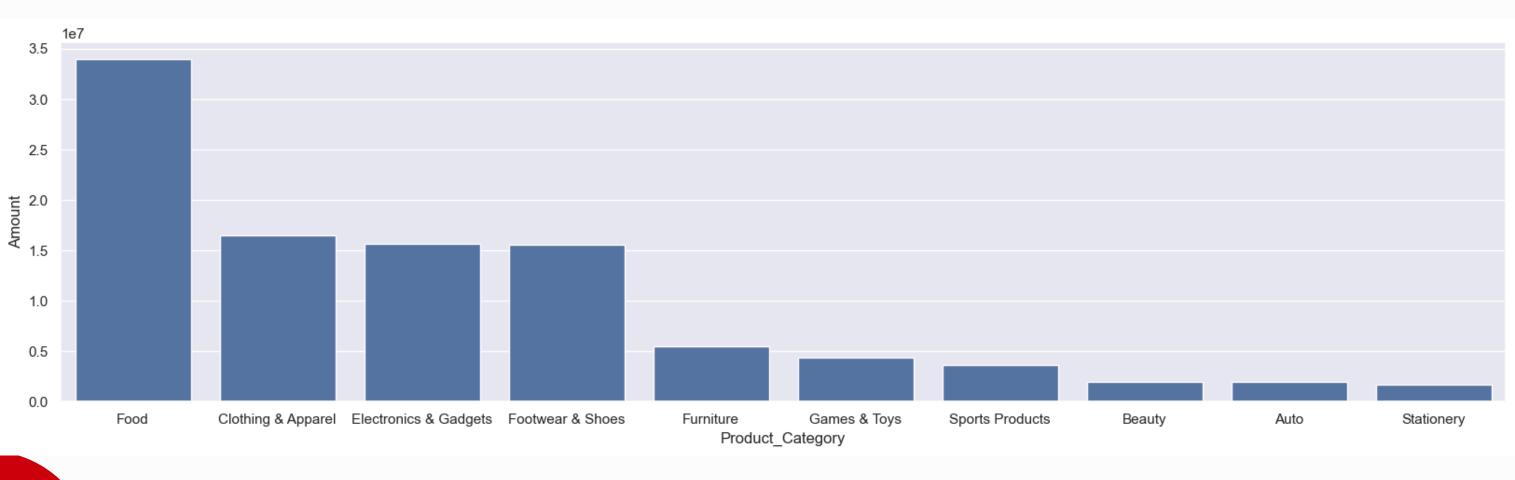
Sales Contribution by Occupation



Revenue Contribution by Occupation



Sales Contribution by Product Category[Top-10]



Revenue Contribution by Product Category[Top-10]

CONCLUSIONS

- It can be noted that Females have made more contribution to sales and revenue, than Males, i.e Females are more frequent buyers, with more purchasing power.
- Customers with Age Group 26-35 contribute more to sales and revenue, as compared to other Age Groups.
- Customers from Uttar Pradesh(UP), Maharashtra, and Karnataka contribute more to sales and revenue, as compared to other states.
- Married people, particularly females, contribute more to sales and revenue.
- Customers from IT Sector, Healthcare, and Aviation contribute more to sales and revenue, as compared to other occupations.
- Food, Clothing & Apparels, and Electronics & Gadgets contribute more to sales and revenue than other product categories.

THANKYOU