

# Retail Business Performance & Profitability Analysis

## Introduction

We analyzed retail sales data from a global superstore to uncover profit-draining categories, optimize inventory strategies, and identify trends in regional and segment performance.

## Tools Used

- Power BI
- Microsoft Excel / CSV
- DAX for calculated fields

## Visuals Created

1. Profit by Category - Bar chart showing least/most profitable categories.
2. Profit Margin by Sub-Category - DAX-based analysis for margin %.
3. Monthly Sales Trend - Seasonal revenue trends observed.
4. Profit by Region & Segment - Identified strongest performing segments per region.
5. Sales Treemap - Visual distribution of sales across sub-categories.
6. Interactive Filters - Slicers for Region, Segment, Category, and Year.

## Key Insights

- Furniture category had high sales but low profitability.
- Tables and Bookcases showed margins below 5% despite high volume.
- Q4 saw a consistent spike in sales across regions.
- Consumer segment outperformed in the West region.
- Phones and Chairs are top revenue drivers.
- High discounts negatively impacted profit margins.

## Conclusion

The business should reduce discounts on low-margin items, especially in the Furniture category, and focus on stock optimization for high-revenue but slow-moving products. Power BI enabled interactive visual analysis, making it easier to derive these actionable insights.

