IMT 577 Final Project

Store Sales Analysis: Store 5 vs. Store 8

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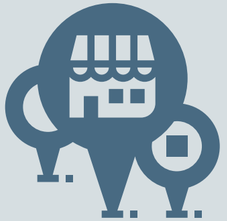


04

Store by State Analysis

01

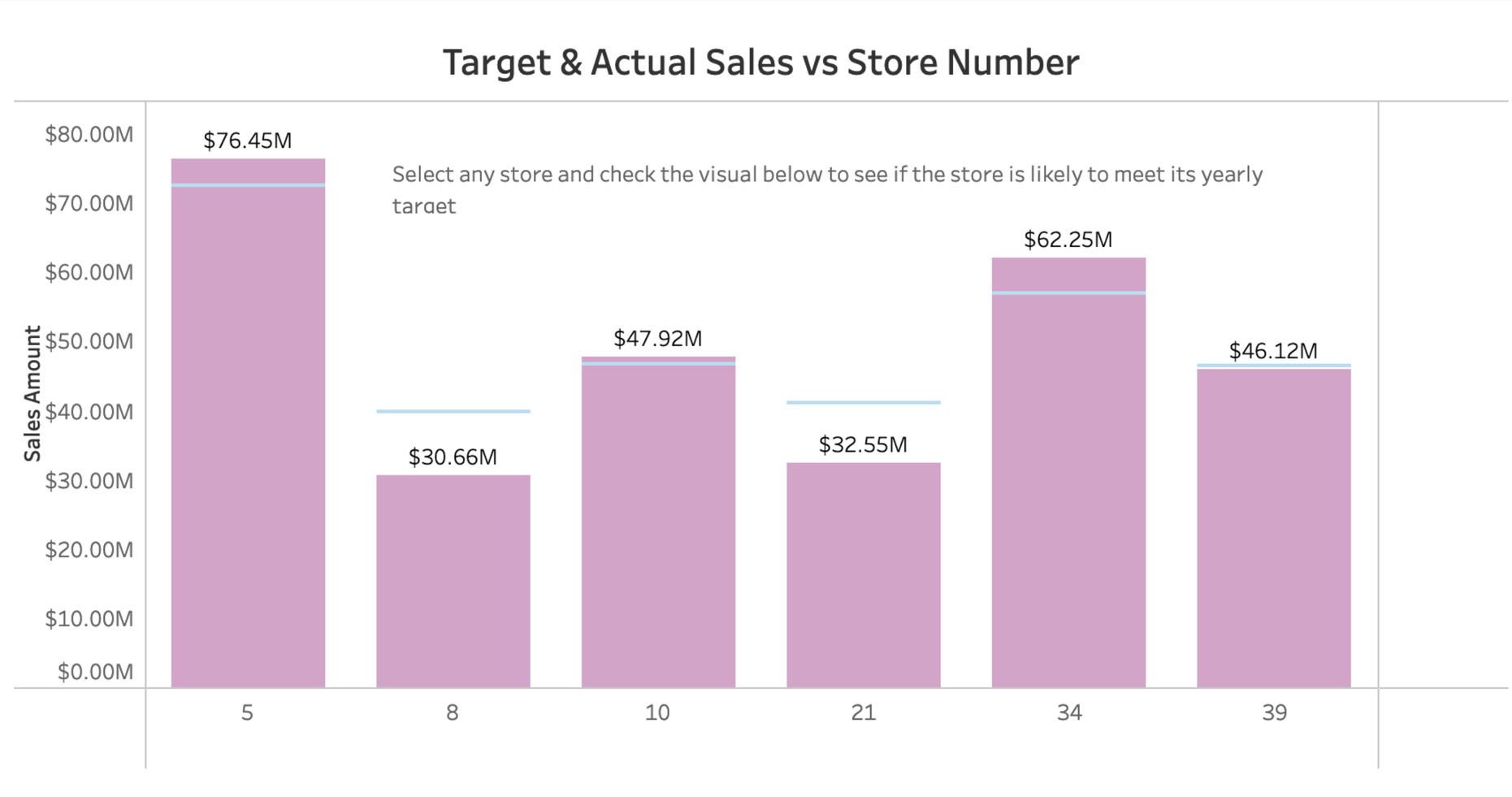
Performance Assessment

How are they performing compared to target?
Will they meet their 2014 target?

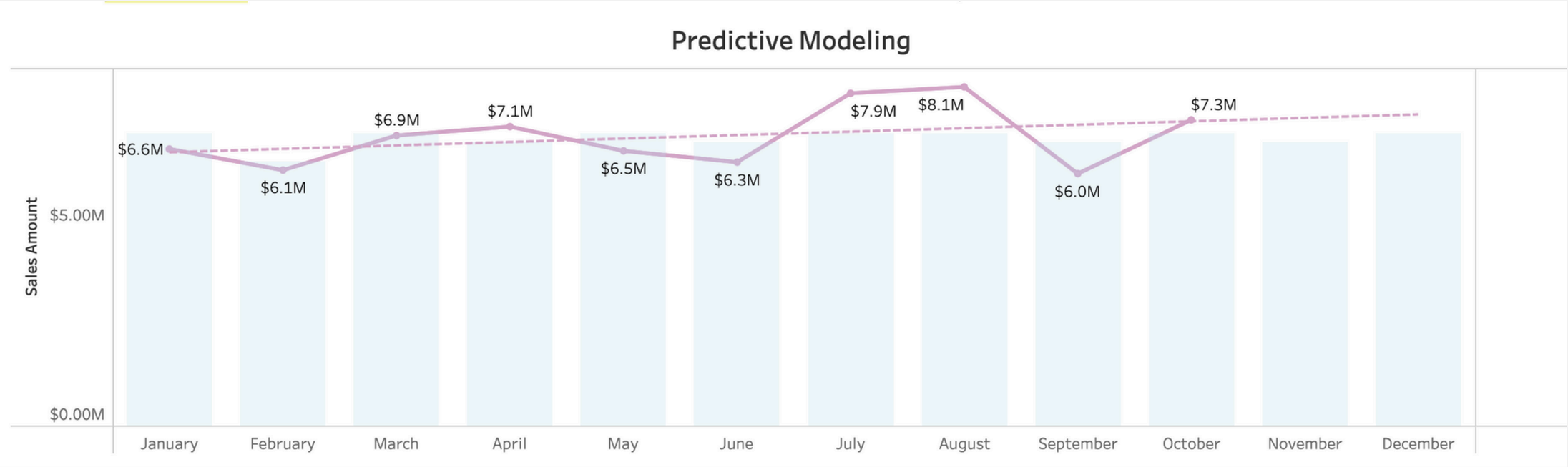
Should either store be closed? Why or why not?

What should be done in the next year to maximize store profits?

Performance in 2013

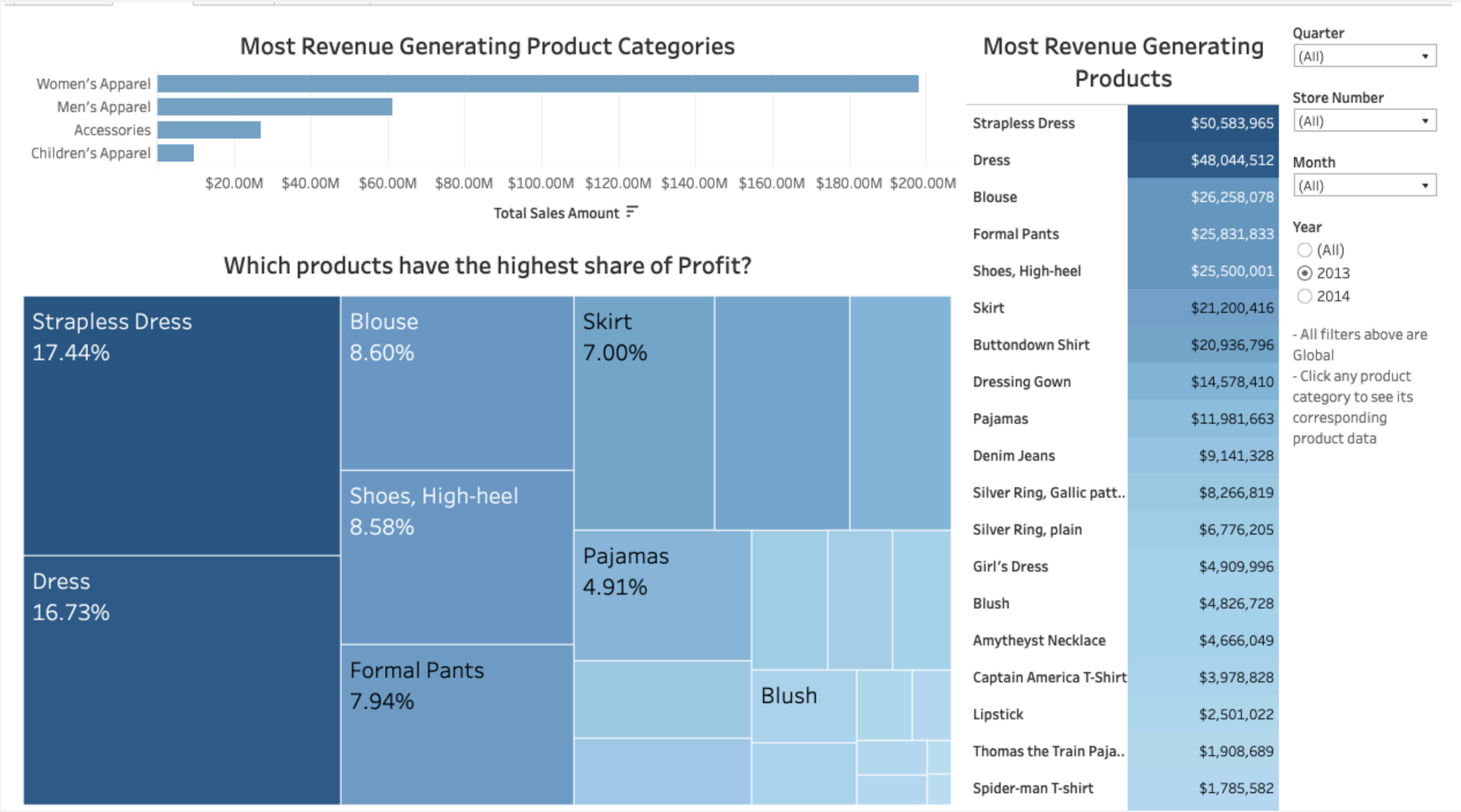


Will the Store meet its target in 2014?



- Above visualization is for Store 5.
- We predict both Store 5 and 8 will meet their 2014 targets.
- Store 5 is estimated to achieve $83.45 million, overachieving by 1.77%
- Store 8 is expected to hit $36.36 million, exceeding annual target by 9.35%

How to maximize profits?



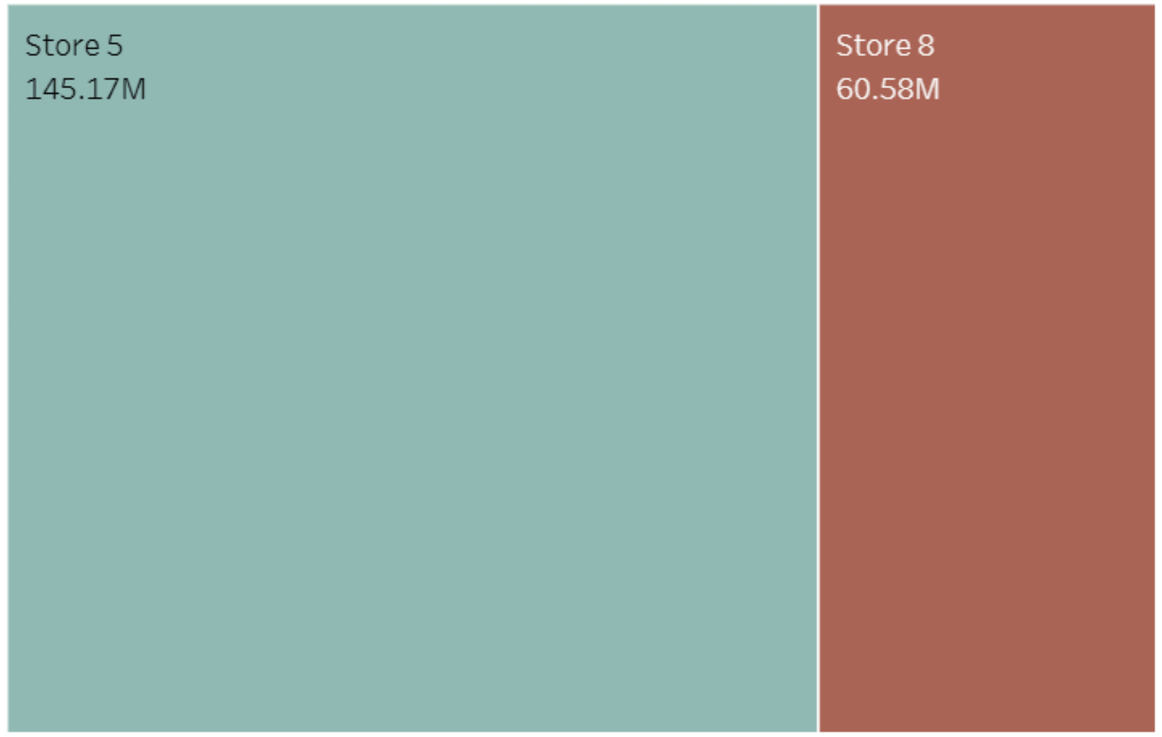
- Upselling and cross selling during peek days
- Expansion of most profitable product lines and variants
- Encourage repeat purchases by implementing loyalty programs

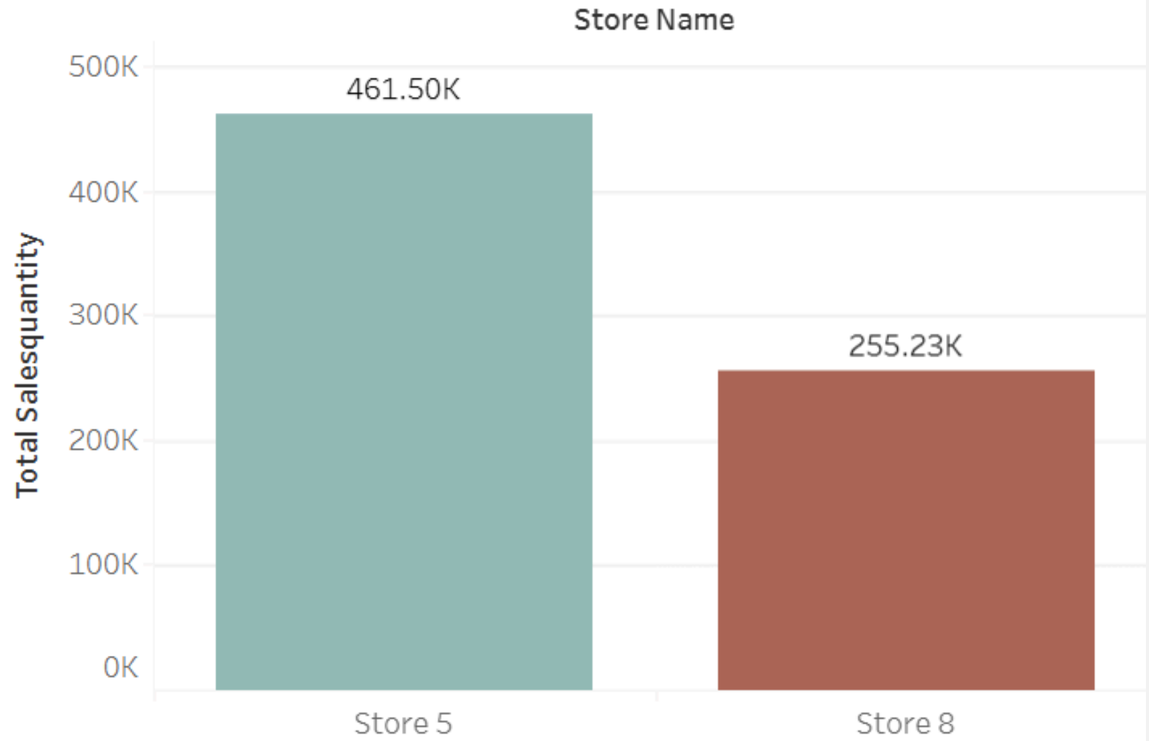
02

Bonus Allocation

Recommend separate 2013 (bonus pool: $500,000) and 2014 (bonus pool: $400,000) bonus amounts for each store.

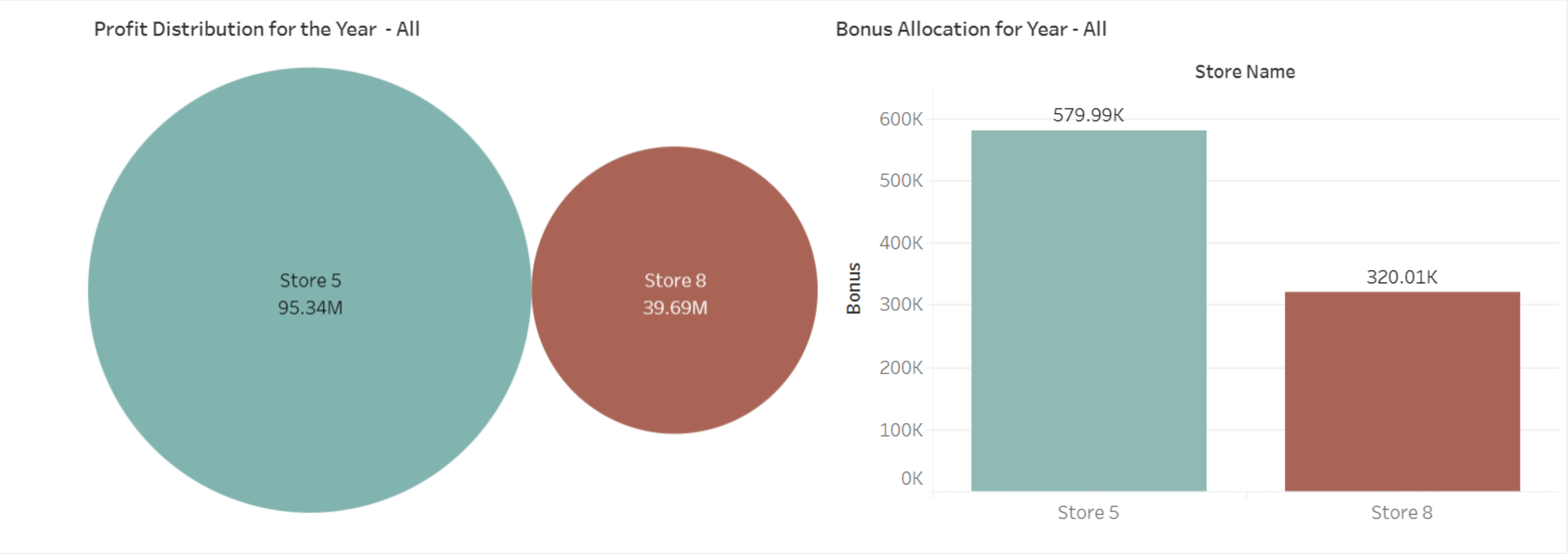
Comparing the Sale Amount and Sale Quantity for Store 5 and Store 8?





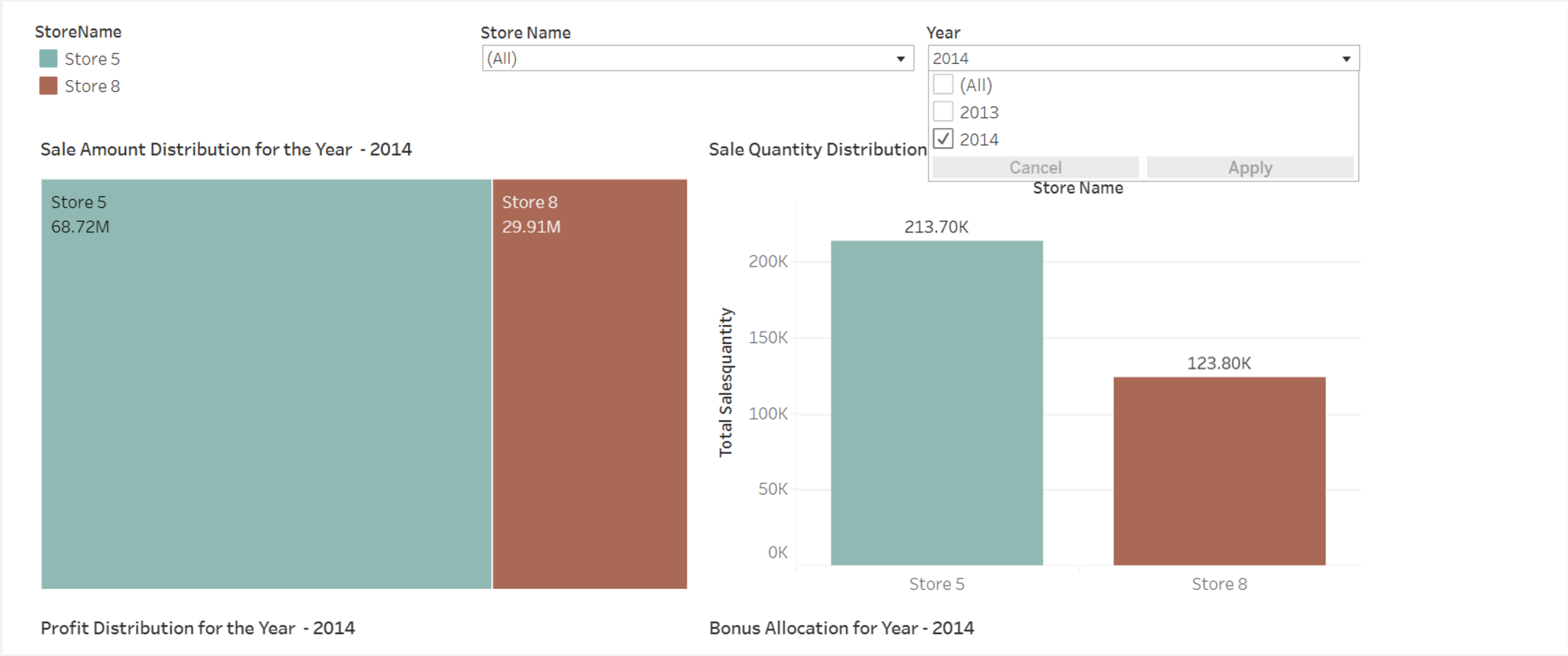
- From the above visualization we can see that the Total SalesAmount for Store 5 (145 Million)is more than double than that of Store 8 (60 Million). We have also compared the Sale Quantity for each store.
- In order to get the views for these visualizations I pulled store data and sale data from the respective fact and dimension tables and grouped them by year and store number.

Comparing the Profit Distribution and allocating Bonuses for Store 5 and Store 8



- The above visualization compares the Profit Distribution between the 2 stores. Based on the Sale Target Quantity, Sale Amount and Total Profit I have calculated and assigned Bonuses for both the stores in Snowflake Views.
- I used the individual bonuses for each year and based on the proportions of amount, quantity and profit for each year you can filter out to calculate either per year bonus or total bonus assigned.

Dashboard Screenshots showing Filters



03

Weekly Product Sales

Assess product sales by day of the week at Stores 5 and 8. What can we learn about sales trends?

Product Sales by Day of Week

Filters

Store
- [x] 5
- [x] 8

Product Category
- [x] Accessories
- [x] Children's Apparel
- [x] Men's Apparel
- [x] Women's Apparel

Store
- 5
- 8

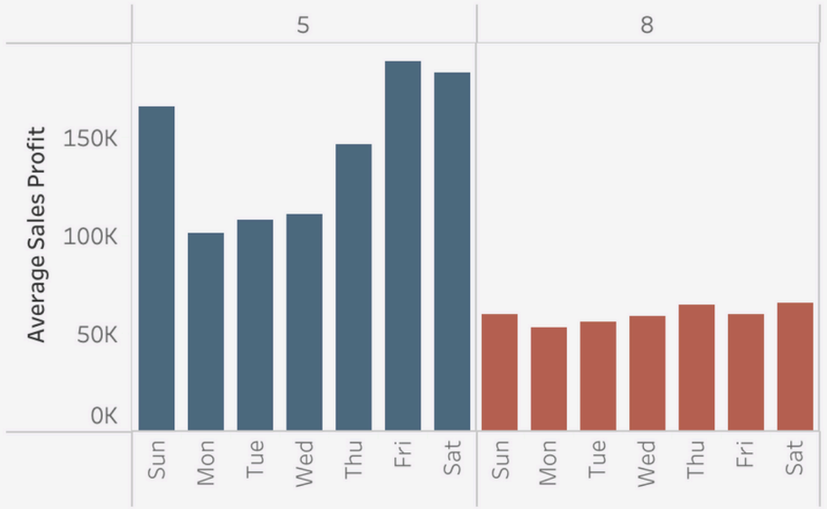
Product Category
- Accessories
- Children's Apparel
- Men's Apparel
- Women's Apparel

Day with Highest Profit

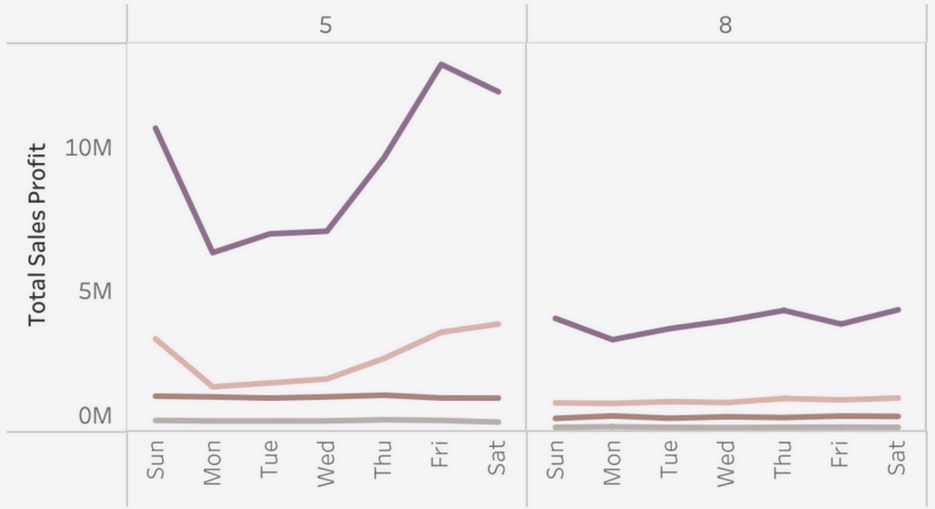
Saturday

$123,825

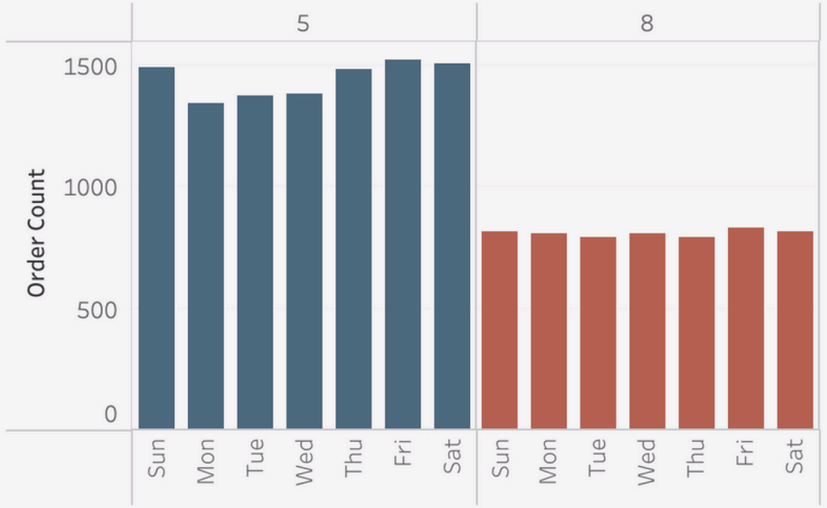
Average Sales Profit by Day of Week



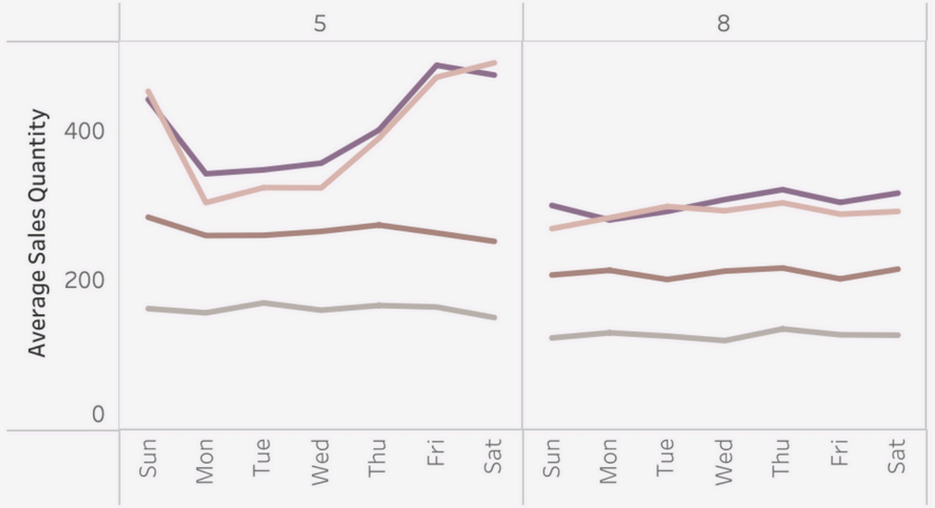
Average Sales Profit by Product Category



Transaction Volume by Day of Week



Average Sales Quantity by Product Category



Product Sales by Day of Week

What can we learn about sales trends?

Store 5

Peak Shopping Day
Friday ($188K)

Weekly Sales Trends
Peak sales on weekends

Product Category
Women's and Men's Apparel driving weekend sales

Recommendations
Weekend spend and save + Weekday happy hour sales

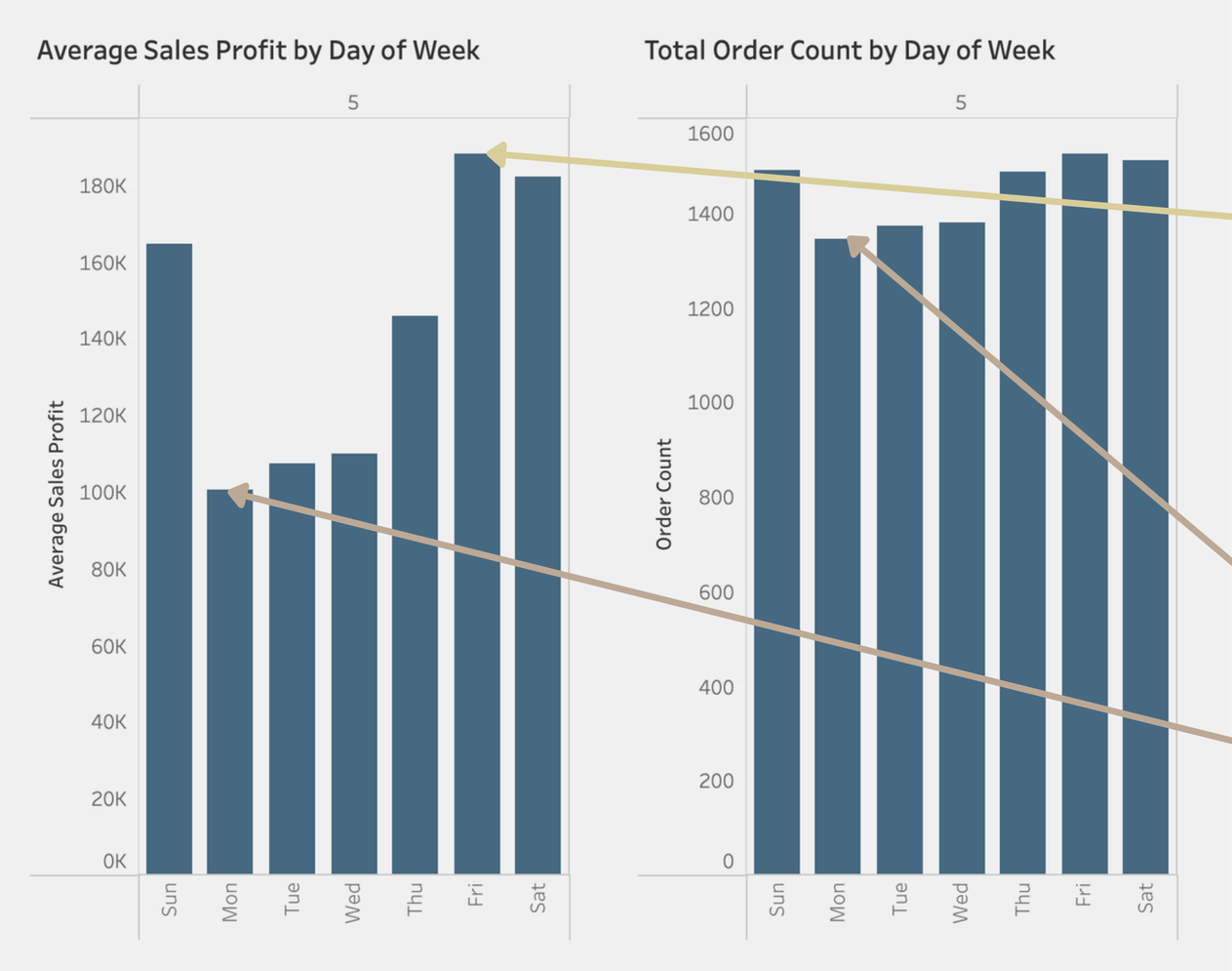
Store 8

Peak Shopping Day
Saturday ($65K)

Weekly Sales Trends
Consistent throughout the week

Product Category
Relatively stable across all days of week

Recommendations
Weekend product bundling discount



Store 5

Weekly Sales Trend

- **Peak Profit Days:**
  - Friday ($188K)
  - Saturday ($182K)
  - Aligns with consumer behavior
- **Lowest Profit Day:**
  - Monday ($100K)
  - Post-weekend drop-off
- **Transaction Volume:**
  - Similar trends but not as drastic

Lower average transaction values on workdays!

Store 5

Product Category

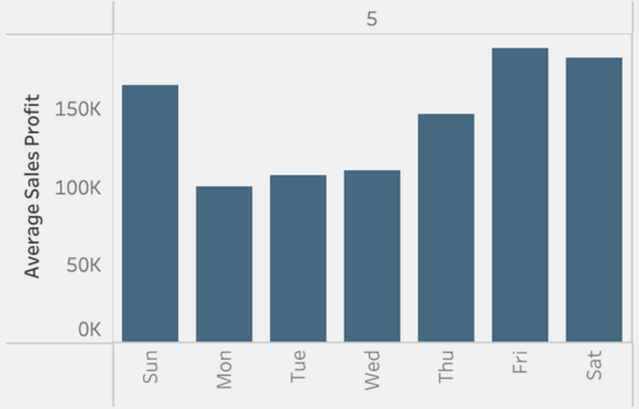
- Most Popular Categories:
  - Women's Apparel
  - Men's Apparel
- Weekly Sales Trends:
  - Women's Apparel and Men's Apparel drives weekend sales

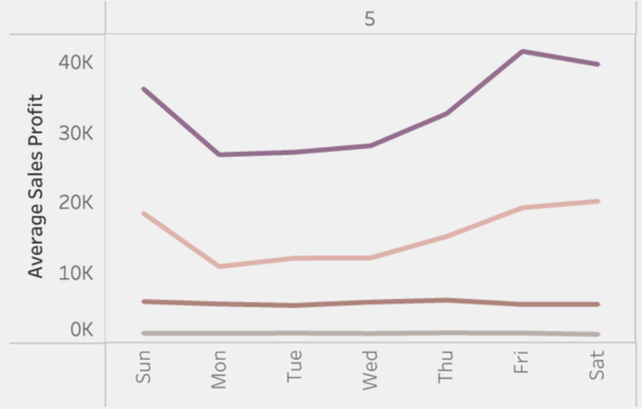
Customers tend to purchase more high-margin products during weekends!

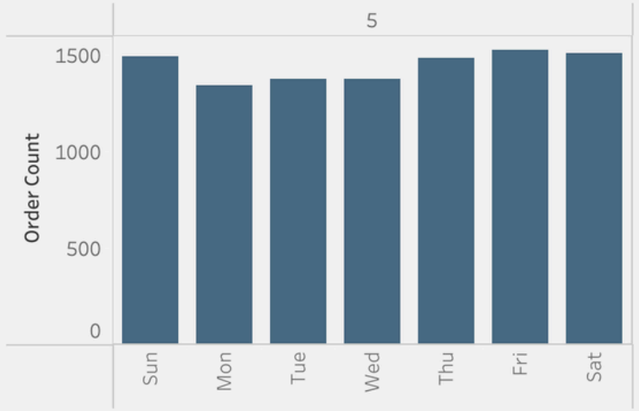
Store 5

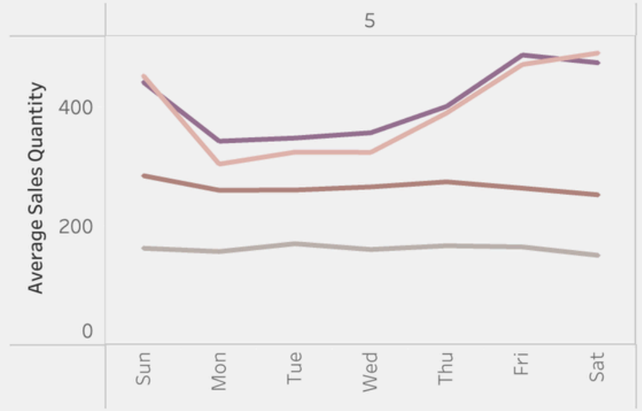
Recommendations

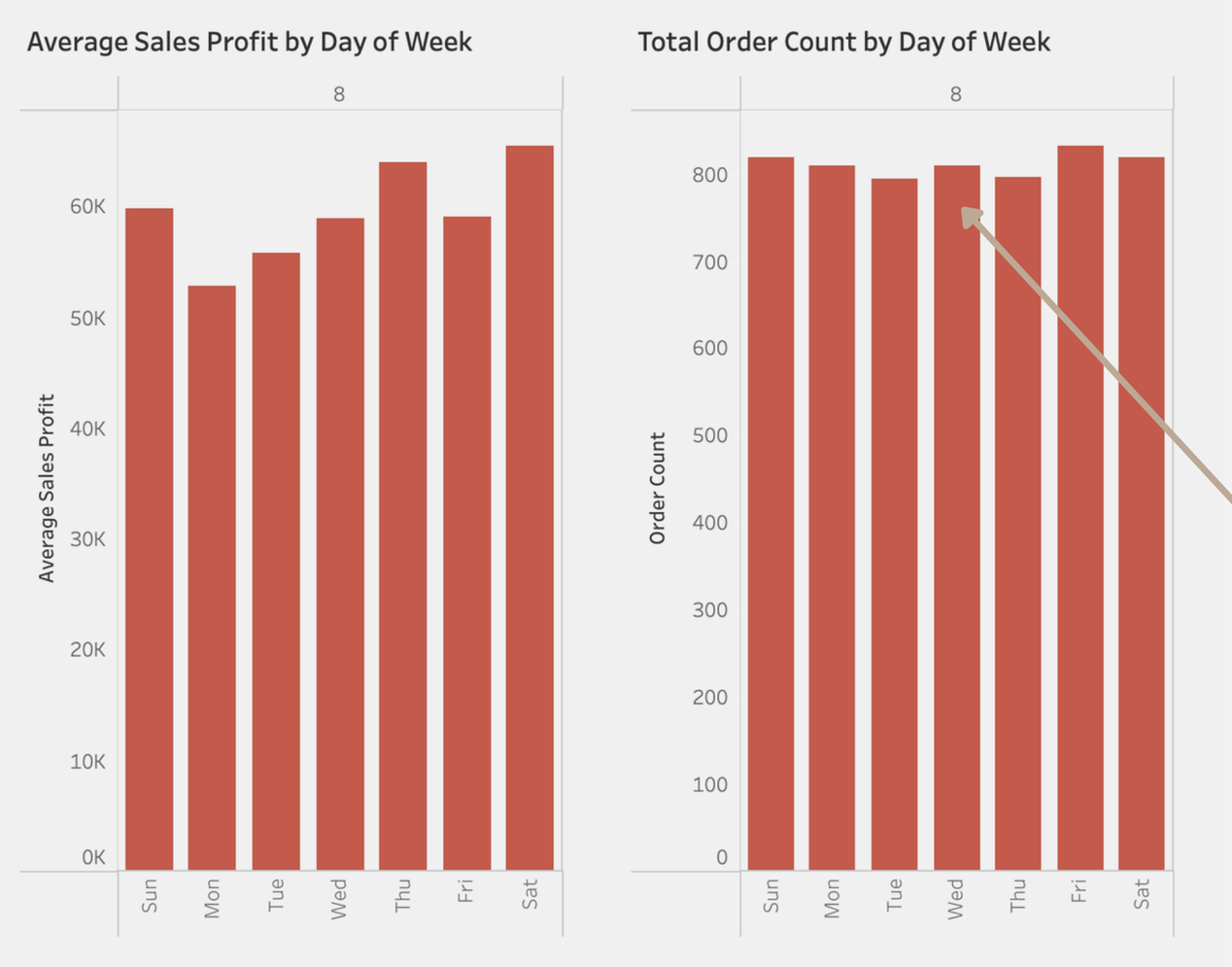
- Focus Promotional Efforts on Women’s Apparel and Men’s Apparel
- Weekend Promotions: Spend and Save
- Weekday Promotions: Happy Hour Sales









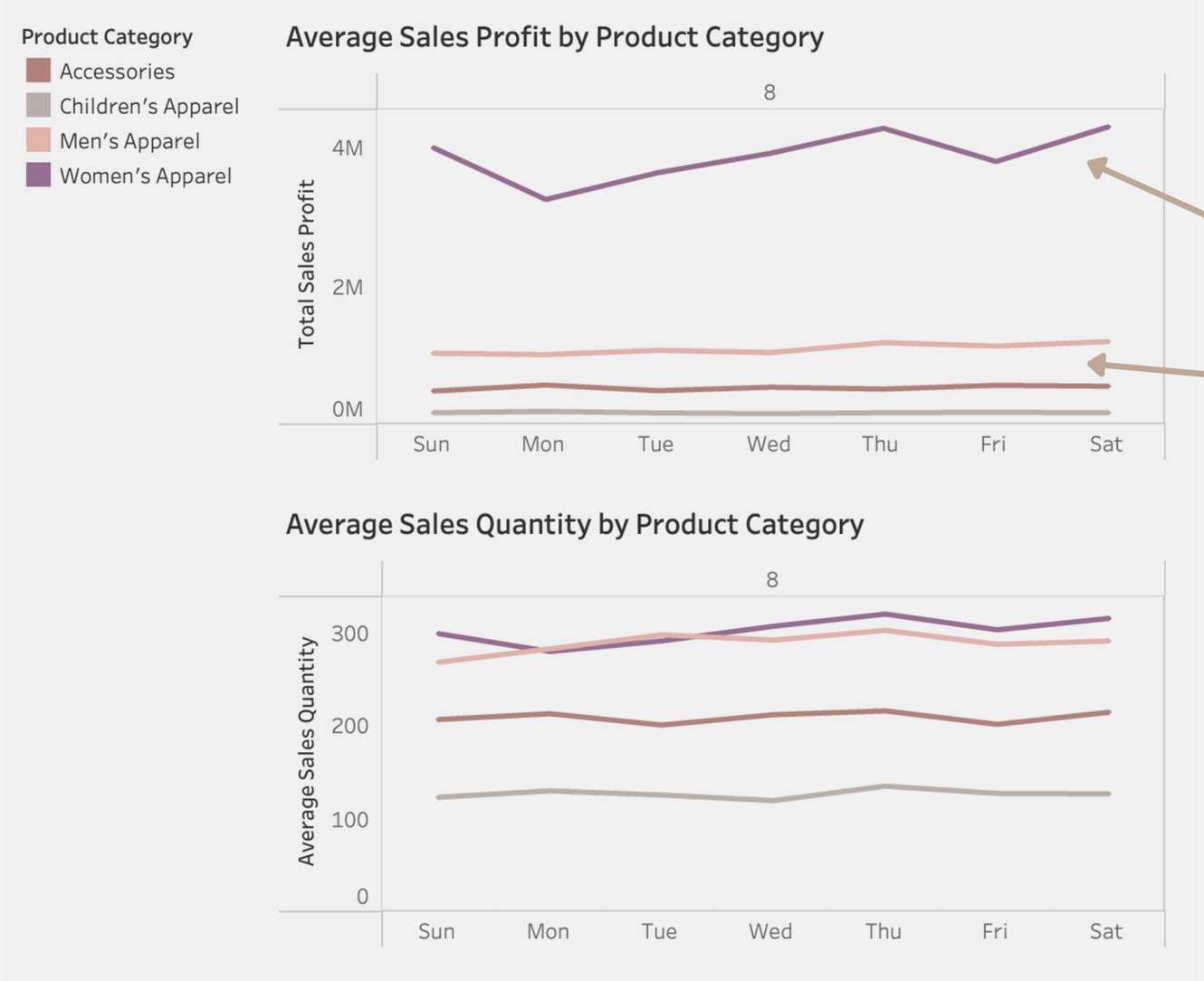


Store 8

Weekly Sales Trend

- **Peak Profit Days:**
  - Saturday ($65K)
  - Thursday ($64K)
  - Slightly higher during weekends
- **Lowest Profit Day:**
  - Monday ($53K)
  - Post-weekend drop-off
- **Transaction Volume:**
  - Consistent throughout the week

Opportunity: Weekend Sales



Store 8

Product Category

- Most Profitable Categories:
  - Women's Apparel
  - Men's Apparel
- Weekly Sales Trends:
  - Relatively stable across the week for all categories

Opportunity:
There is room to maximize profit from high-margin items!

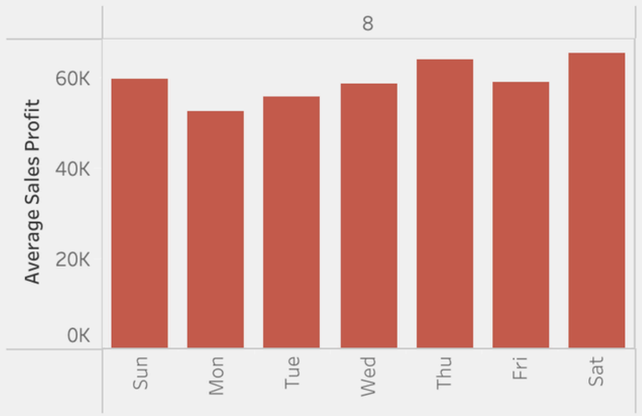
Store 8

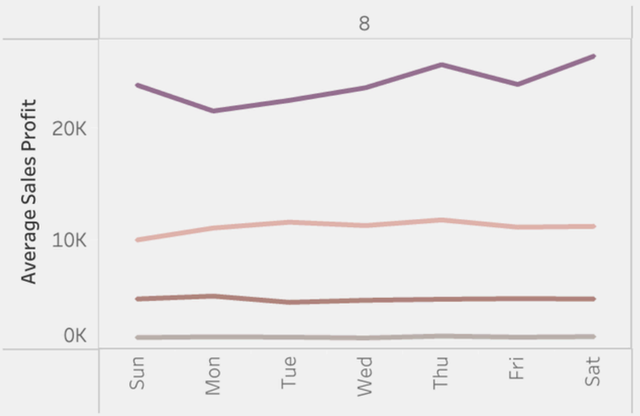
Recommendations

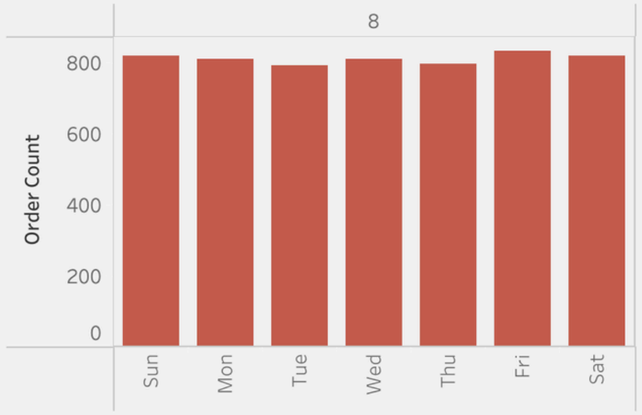
Focus on higher-margin products during peak shopping days

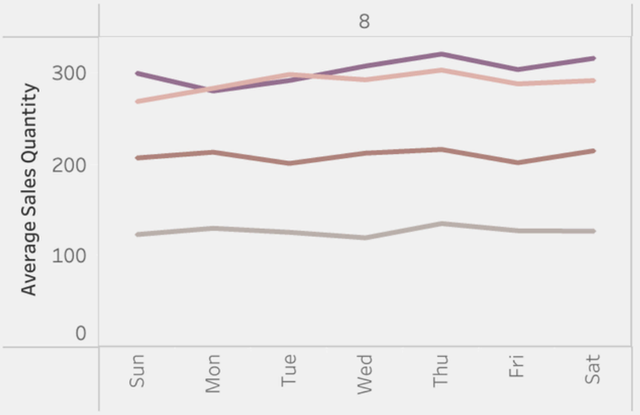
Weekend Promotions

- Upselling
- Product Bundling Discounts
  - e.g., Buy 2 for 20% off, buy 3 for 30% off
- Increase transaction values









04

Single-Store vs Multi-Store States

What can we learn about having more than one store in a state?

Store by State Analysis

Filters

Single vs. Multiple-Store State

- [x] Multiple Stores
- [x] Single Store

Single-Store State vs. Multiple-Store State

What can we learn about having more than one store in a state?

Total Sales Profit

Overall, multiple-store states achieve higher total sales profit.

Average Sales Profit

BUT **single-store states** show a **higher average profit** per store.

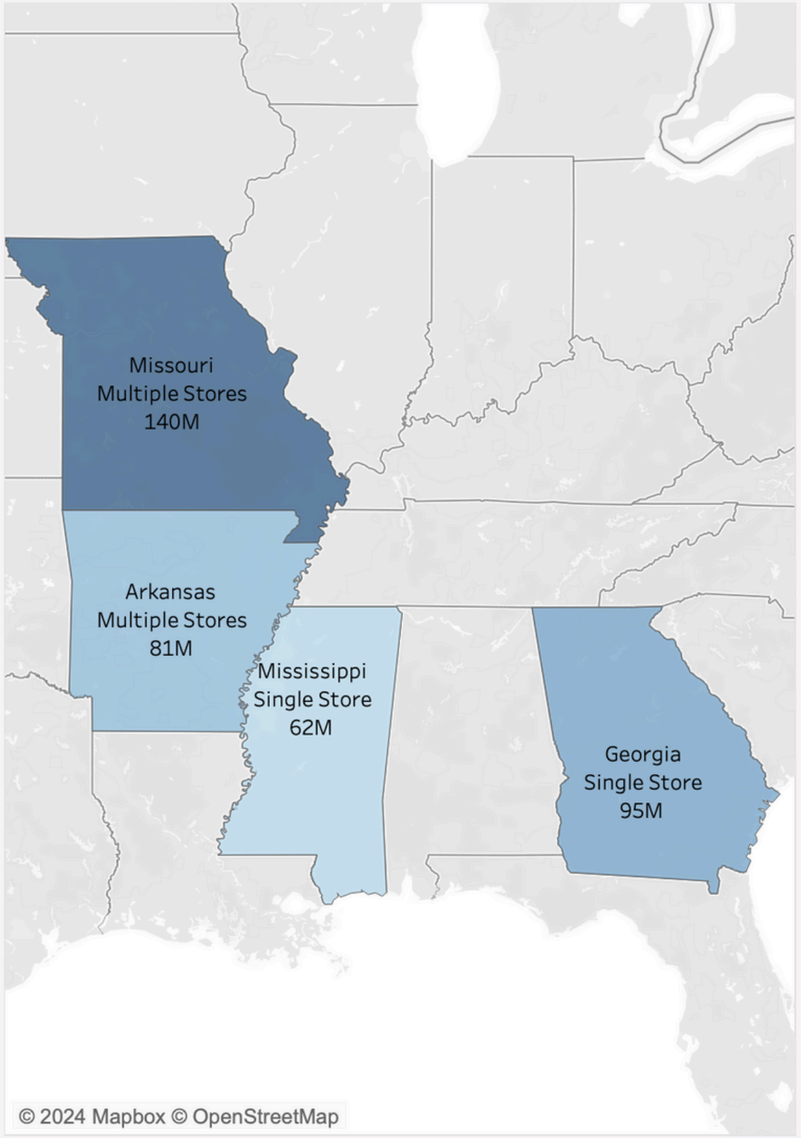
Store Positioning

Premium stores in major **metropolitan areas** like Atlanta and St Louis show **high profitability**.

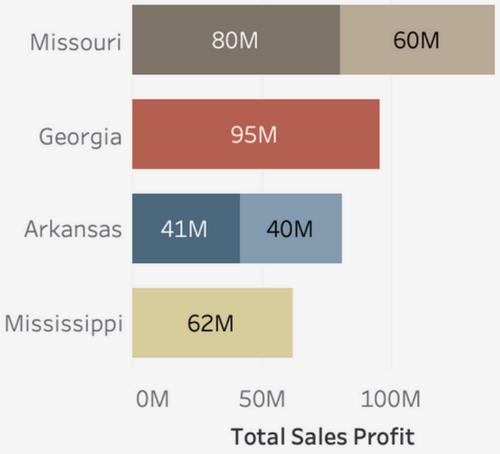
Recommendations

Market segmentation strategy **tailored** to local market's characteristics and preferences

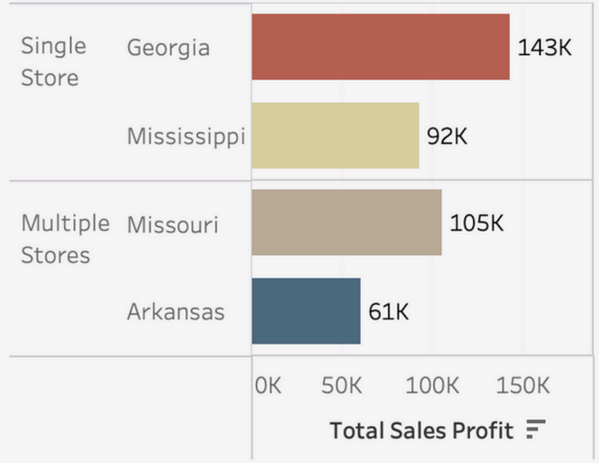
Total Sales Profit by State Map



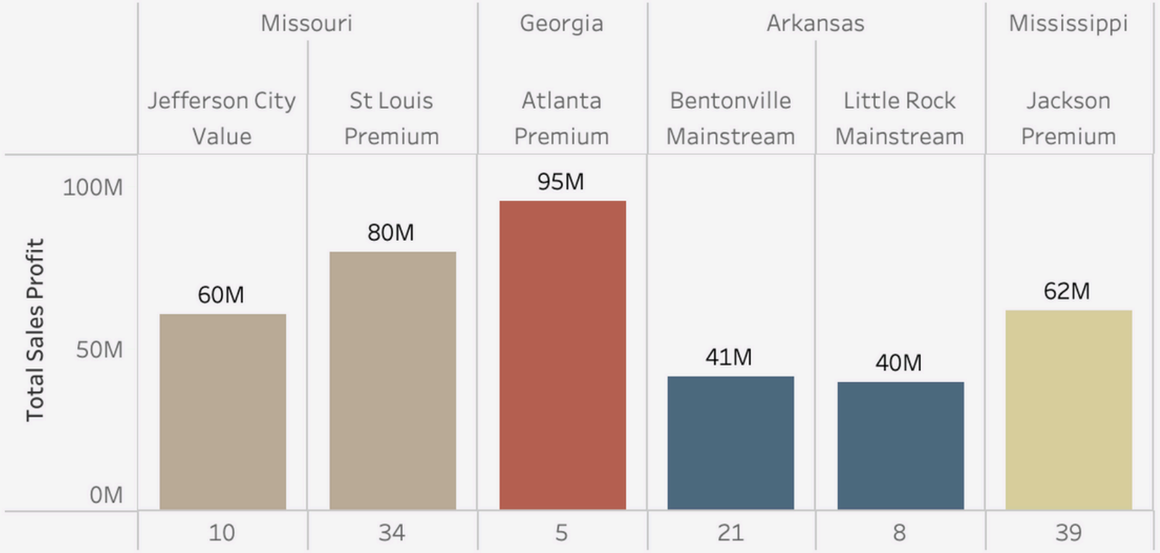
Total Sales Profit by State

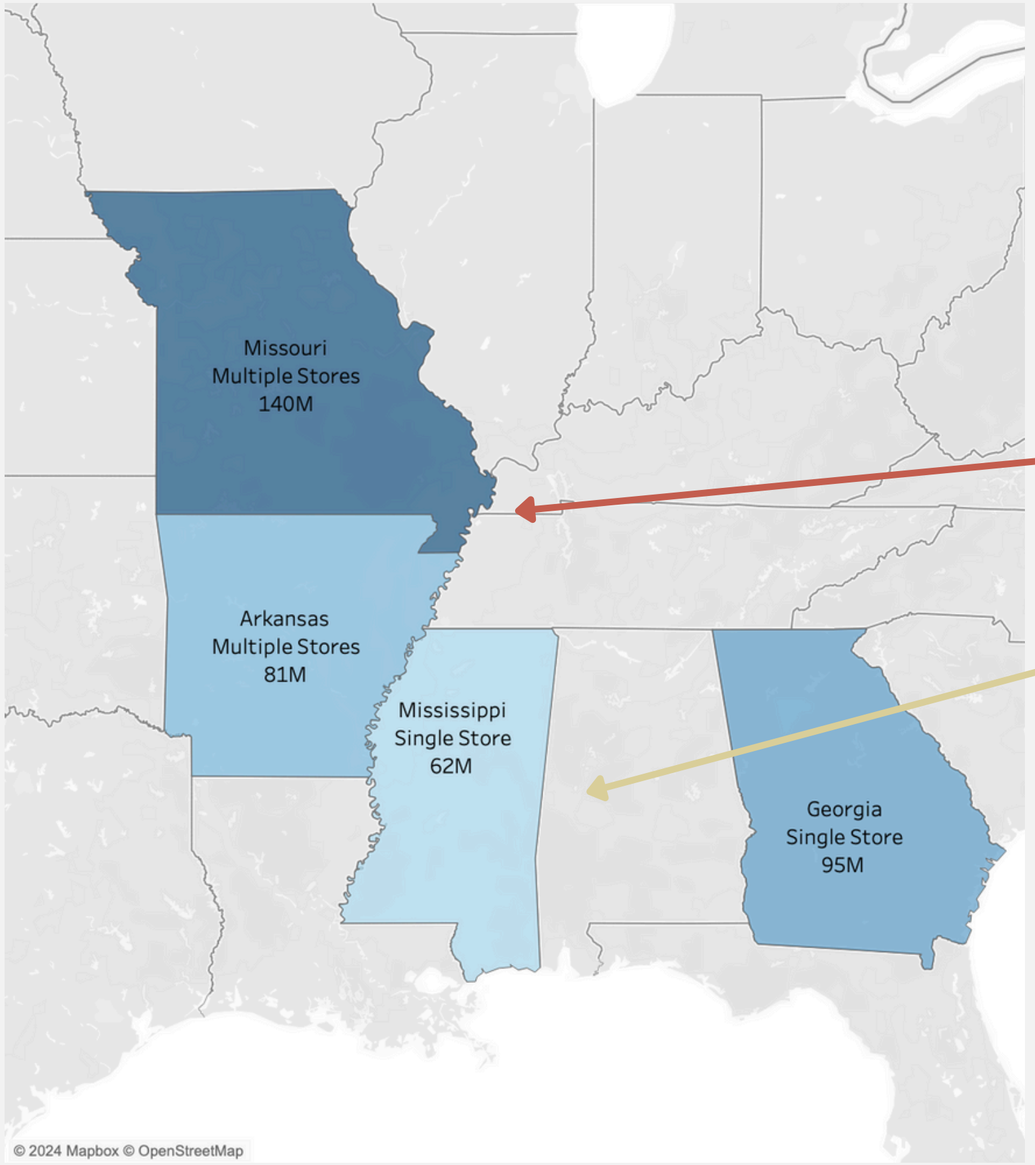


Average Store Profit by State



Total Sales Profit by State, Segment, and Store



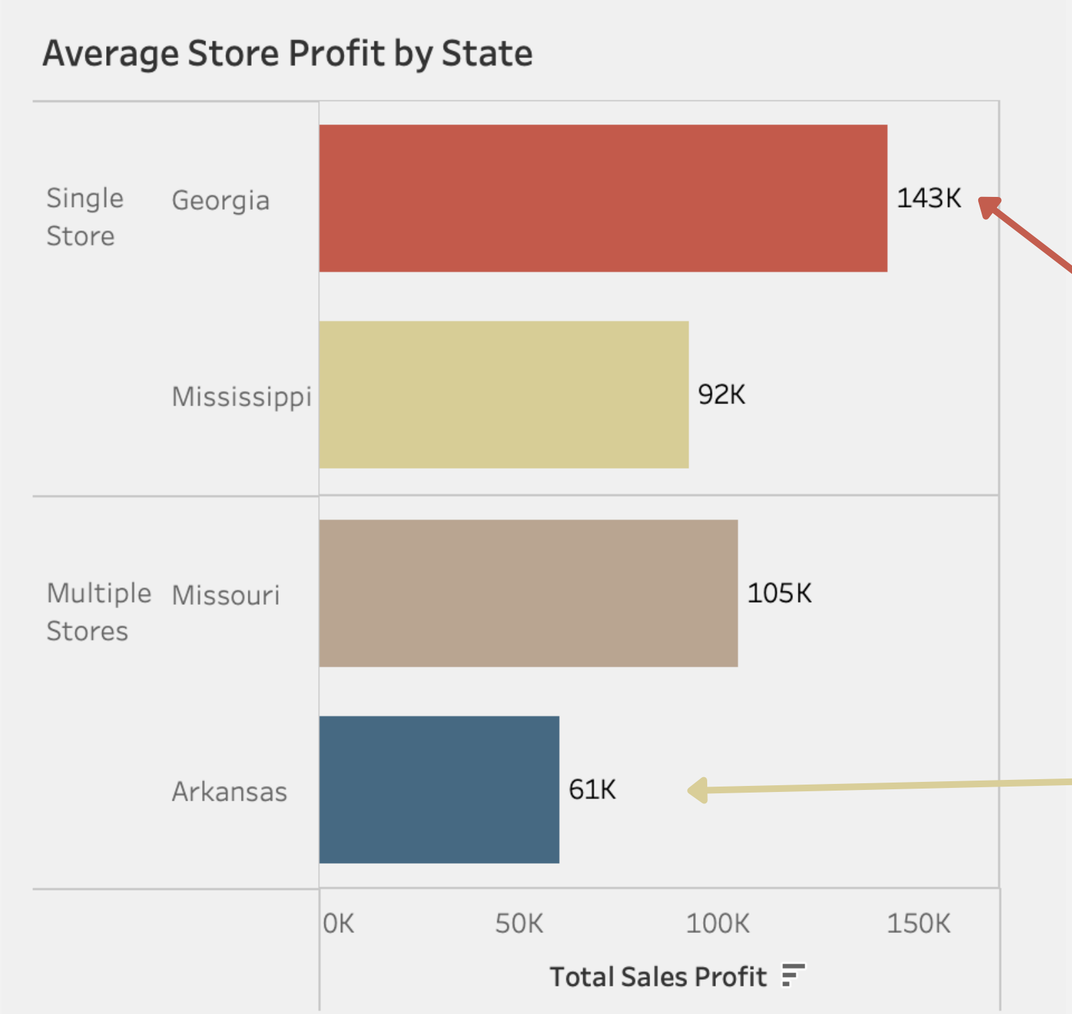


Store Location

Location Overview

- 6 Stores in 4 States:
  - Multi-Store States: Missouri, Arkansas
  - Single-Store States: Mississippi, Georgia
- Sales Performance:
  - Metric: Sales Profit
  - States with multiple stores show higher total sales profit

Economies of Scale -> Increased Total Profit

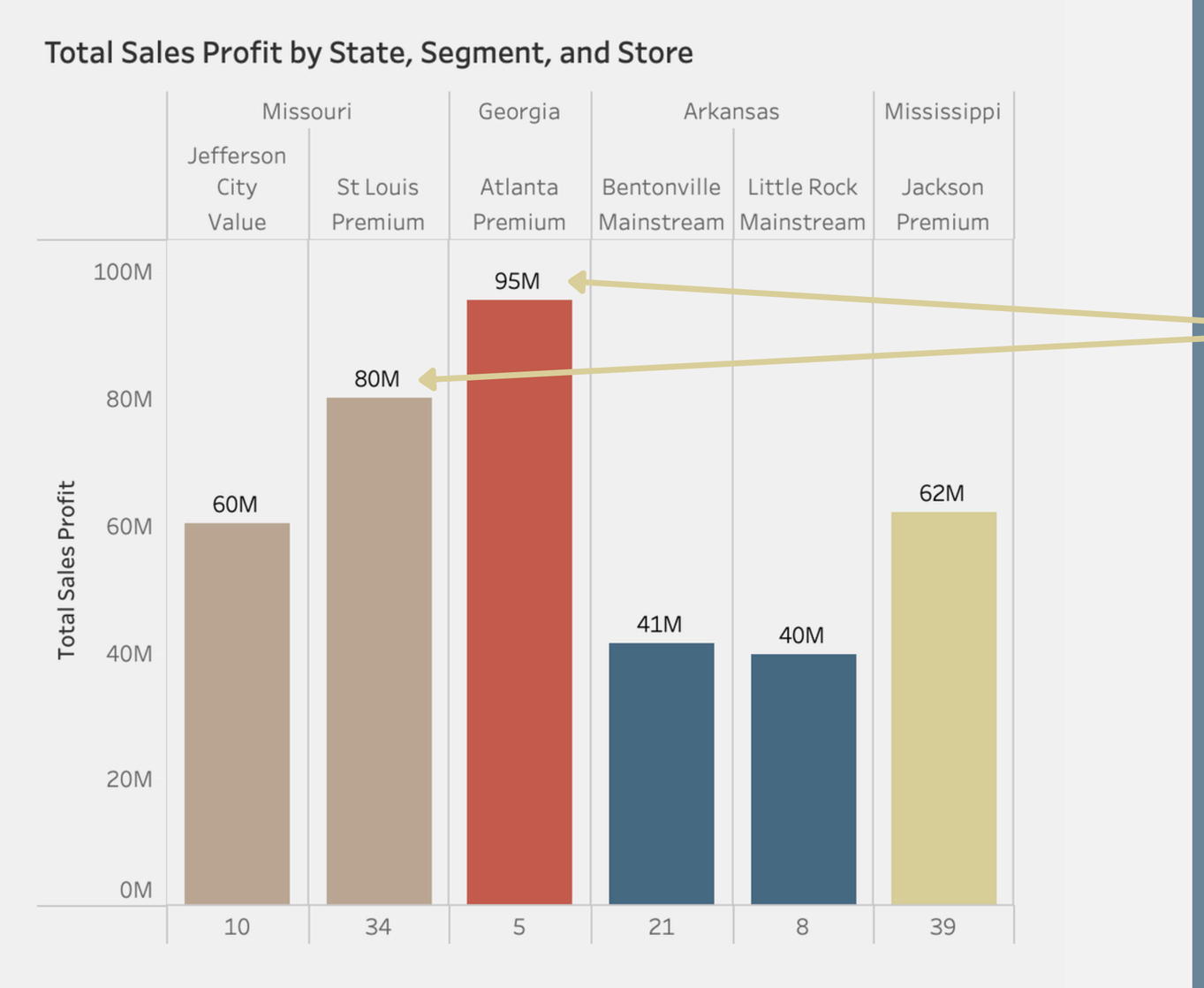


Store Location

Average Profit

- Single-store states outperform in average store profit.
- Highest Profit:
  - Georgia ($143K)
  - Single-Store State
- Lowest Profit:
  - Arkansas ($62K)
  - Multiple-Store State

Diluted Profitability!



Store Location

Location Strategy

- **Store Positioning:**
  - Premium stores in major metropolitan areas like Atlanta and St Louis show high profitability.
- **Recommendations:**
  - Market segmentation strategy tailored to local market's characteristics and preferences.

THANK YOU!