

BREW TRACK

Coffee Shop Sales Analytics



Project Objective

- Analyze coffee shop performance for 2023
- Track key metrics: Sales, Orders, and Quantity Sold
- Understand customer behavior by day, hour, product, and location
- Provide insights using Power BI, SQL Queries, and DAX calculations

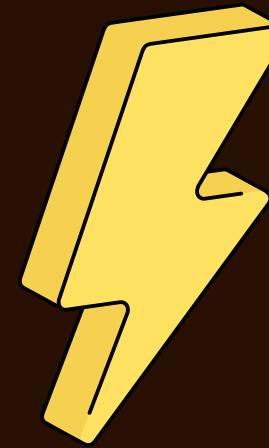
Tools & Technologies



Power BI: Data visualization



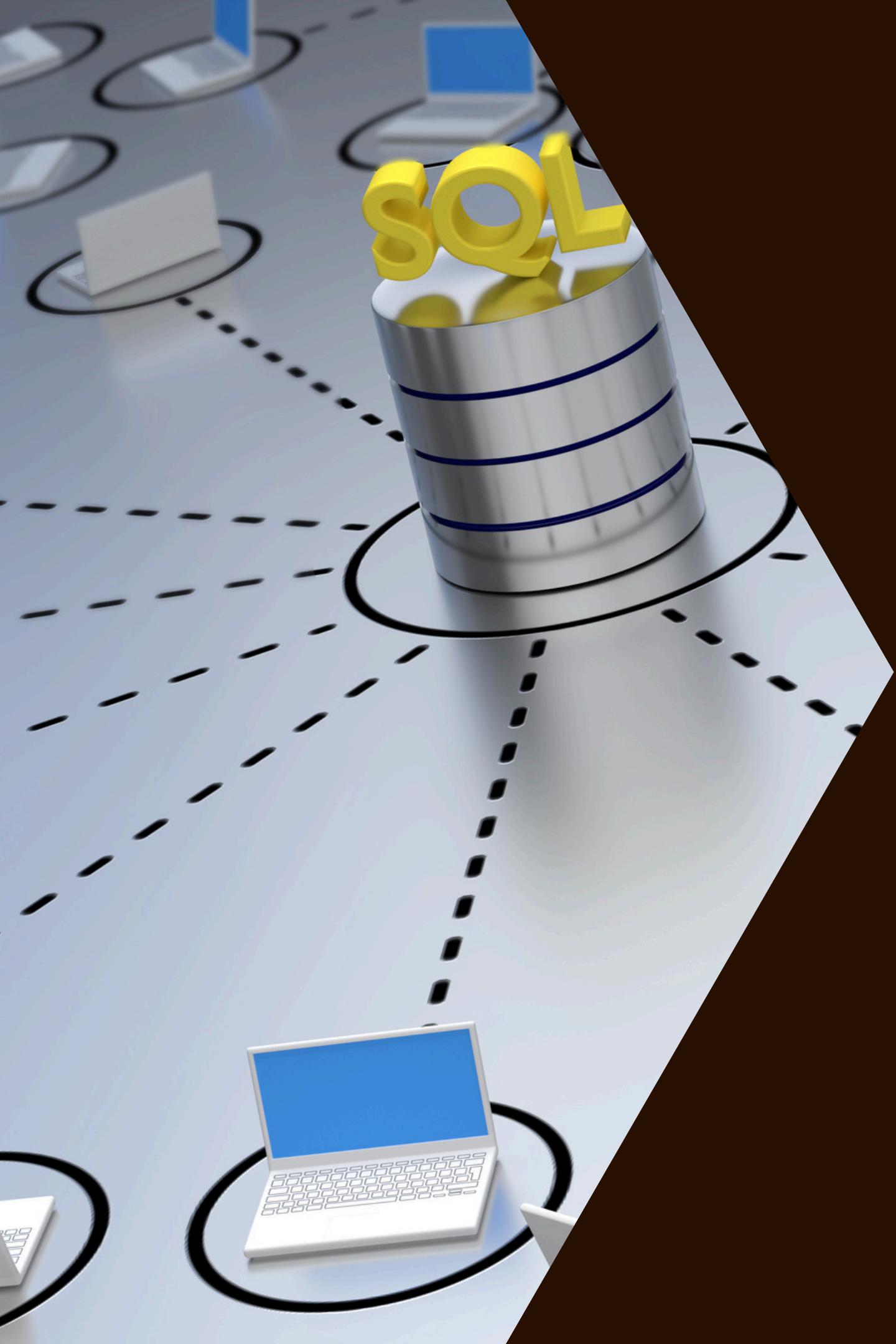
SQL (MySQL):
Data cleaning & aggregation



DAX (Power BI): Dynamic KPIs, time intelligence



Data Source:
Coffee Shop Transactions Dataset



Data Cleaning Using SQL

Performed the following SQL operations:

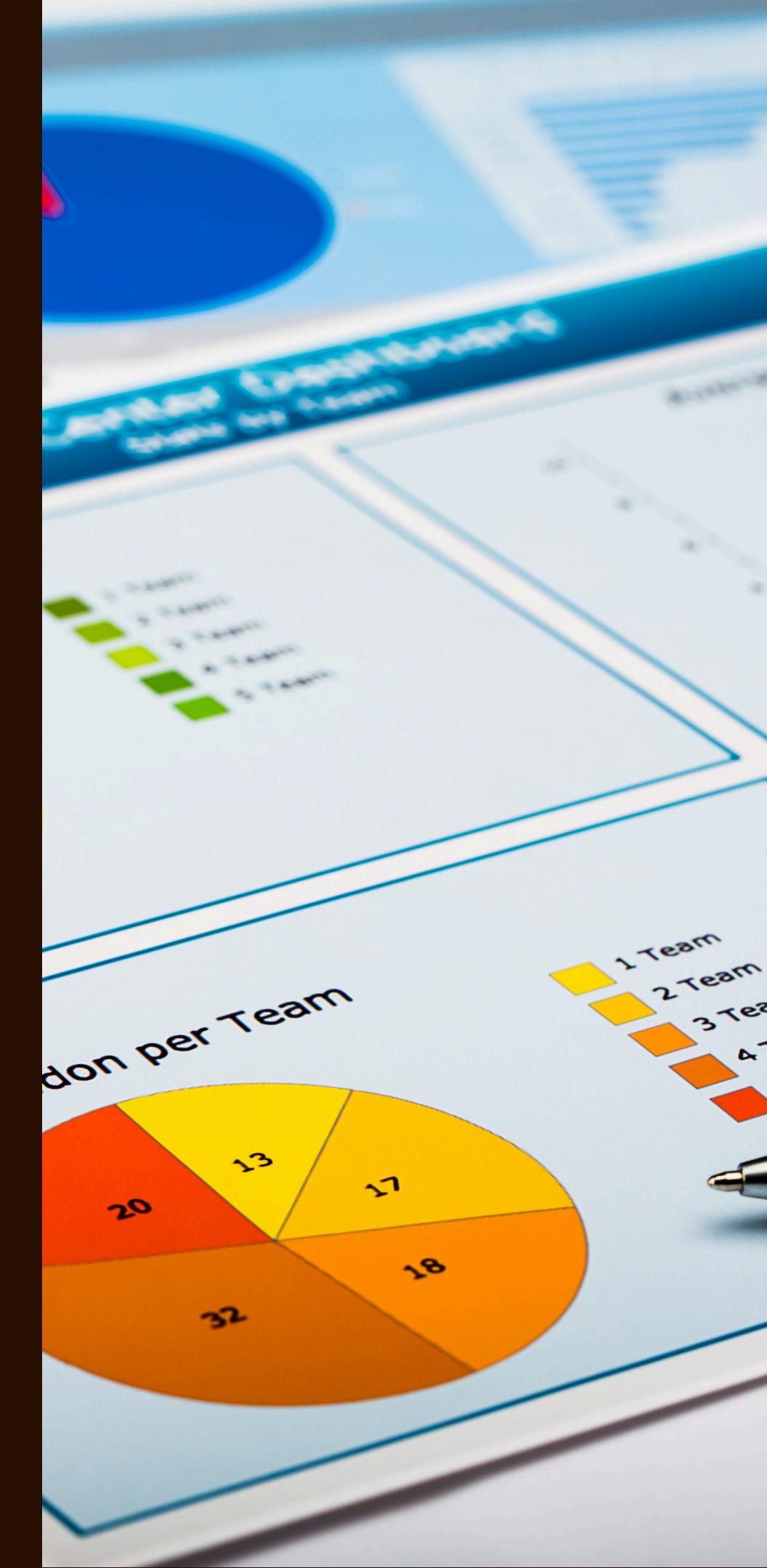
- Converted date and time columns
- UPDATE coffee_shop_sales SET transaction_date = STR_TO_DATE(transaction_date, '%d-%m-%Y');
- Changed data types of columns
- Renamed incorrect column headers
- Verified data types using DESCRIBE coffee_shop_sales

Sales Trend Over May

- Daily sales tracked to identify peaks and troughs
- Compared daily sales against average (\$5,056)
- Labeled days as Above/Below Average

SQL Example:

```
SELECT AVG(total_sales) AS average_sales
FROM (
  SELECT SUM(unit_price * transaction_qty) AS
total_sales
  FROM coffee_shop_sales WHERE
MONTH(transaction_date) = 5
  GROUP BY transaction_date
  AS internal_query;
```



Top Categories & Products

- Top Category: Coffee (\$60.36K)
- Top Product: Barista Espresso (\$20.42K)
- Showcased top 10 products by revenue.

SQL:

```
SELECT product_type, ROUND(SUM(unit_price * transaction_qty),1)
AS Total_Sales
FROM coffee_shop_sales WHERE MONTH(transaction_date) = 5
GROUP BY product_type ORDER BY Total_Sales DESC LIMIT 10;
```



Peak Days and Hours

- Highest sales on Monday & Tuesday mornings (8-10 AM)
- Weekend sales slightly lower
- Useful for scheduling staff or promotions

SQL:

```
SELECT HOUR(transaction_time) AS Hour_of_Day,  
ROUND(SUM(unit_price * transaction_qty)) AS Total_Sales  
FROM coffee_shop_sales WHERE MONTH(transaction_date) =  
5  
GROUP BY Hour_of_Day ORDER BY Hour_of_Day;
```



Location Performance



- Best performing: Hell's Kitchen (\$52.6K)
- Followed by Astoria and Lower Manhattan
- Helps decide inventory and staffing allocation

SQL:

```
SELECT store_location, SUM(unit_price * transaction_qty) AS  
Total_Sales  
FROM coffee_shop_sales WHERE MONTH(transaction_date) = 5  
GROUP BY store_location ORDER BY Total_Sales DESC;
```

DAX Calculations in Power BI



- KPI Cards (Sales, Orders, Quantity)
- Month On Month Percent Growth
- Dynamic calendar filters
- Time intelligence for comparisons

DAX Example:

Total Sales = SUMX(Sales, Sales[Unit Price] * Sales[Quantity])

Power BI Dashboard - Brew Track

- Single-page dynamic report
- Filters: Month, Store, Category
- Live KPIs and visual drilldowns



Conclusion & Insights



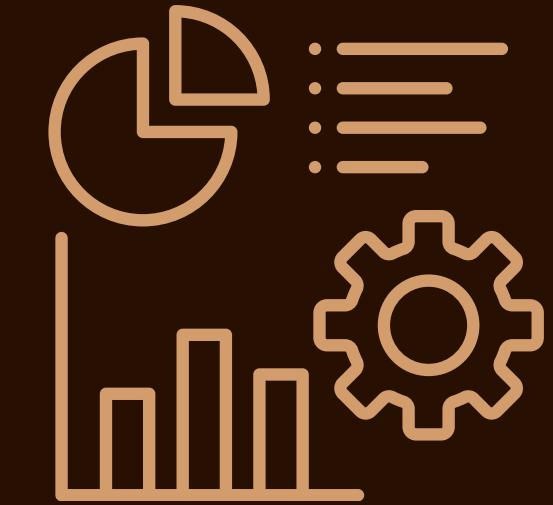
Sales grew
31.8% in May
vs April

Mon
Tue
wed
Thu
Fri
Sat
Sun

Mornings (8-10 AM) on weekdays are peak hours



Coffee and Tea categories dominate sales



SQL and DAX enabled efficient data analysis



THANK YOU