

CN-SHOP

SALES REPORT





POSTGRESQL



FIRING SQL QUERIES TO SOLVE THE BUSINESS PROBLEMS

No limit

Query

Query History

1

2

3

4

5

6

7

8

9

10

11

12

13

14

15

SELECT

Extract(MONTH from transaction_date) AS month,

ROUND(SUM(unit_price * transaction_qty)) AS total_sales,

(SUM(unit_price * transaction_qty) - LAG(SUM(unit_price * transaction_qty),

OVER (ORDER BY Extract(MONTH from transaction_date))) / LAG(SUM(unit_price

OVER (ORDER BY Extract(MONTH from transaction_date)) * 100 AS month_on_month

FROM

coffee_shop_sales

WHERE

Extract(MONTH from transaction_date) IN (4, 5) -- for months of April and M.

GROUP BY

Extract(MONTH from transaction_date)

ORDER BY

Extract(MONTH from transaction_date);

Scratch Pad

X

Data Output

Messages

Notifications

month

numeric

total_sales

numeric

month_on_month_increase_percentage

numeric

1

4

118941

[null]

2

5

156728

31.76924238454871941600



POSTGRESQL



STEPS FOR POSTGRESQL

- Data Walkthrough
- Raw data file preparation Creating Database
- Importing File
- Cleaning Imported File
- Changing Data Types
- Firing SQL Queries for Business Requirements
- Storing Results
- Preparing SQL Documents





FUNCTIONALITIES YOU LEARN

- STR_TO_DATE
- ROUND
- SUM
- COUNT
- AVG
- LAG
- MONTH
- DAY
- DAYOFWEEK
- SELECT
- ALIAS
- MAXI MIN
- HOUR
- ALTER TABLE
- UPDATE TABLE
- CHANGE COLUMN
- WHERE
- GROUP BY
- CASE
- ORDER BY
- LIMIT
- WINDOWFUNCTIONS
- JOINS
- SUBQUERIES



PROBLEM STATEMENT

KPI'S REQUIREMENTS

1. Total Sales Analysis:

- Calculate the total sales for each respective month.
- Determine the month-on-month increase or decrease in sales.
- Calculate the difference in sales between the selected month and the previous month.

2. Total Orders Analysis:

- Calculate the total number of orders for each respective month.
- Determine the month-on-month increase or decrease in the number of orders.
- Calculate the difference in the number of orders between the selected month and the previous month.

3. Total Quantity Sold Analysis:

- Calculate the total quantity sold for each respective month.
- Determine the month-on-month increase or decrease in the total quantity sold.
- Calculate the difference in the total quantity sold between the selected month and the previous month.



PROBLEM STATEMENT

CHARTS REQUIREMENTS

1. Calendar Heat Map:

- Implement a calendar heat map that dynamically adjusts based on the selected month from a slicer.
- Each day on the calendar will be color-coded to represent sales volume, with darker shades indicating higher sales.
- Implement tooltips to display detailed metrics (Sales, Orders, Quantity) when hovering over a specific day.

2. Sales Analysis by Weekdays and Weekends:

- Segment sales data into weekdays and weekends to analyze performance variations.
- Provide insights into whether sales patterns differ significantly between weekdays and weekends.

3. Sales Analysis by Store Location:

- Visualize sales data by different store locations.
- Include month-over-month (MoM) difference metrics based on the selected month in the slicer.
- Highlight MoM sales increase or decrease for each store location to identify trends.



PROBLEM STATEMENT

CHARTS REQUIREMENTS

4. Daily Sales Analysis with Average Line:

- Display daily sales for the selected month with a line chart.
- Incorporate an average line on the chart to represent the average daily sales.
- Highlight bars exceeding or falling below the average sales to identify exceptional sales days.

5. Sales Analysis by Product Category:

- Analyze sales performance across different product categories.
- Provide insights into which product categories contribute the most to overall sales.

6. Top 10 Products by Sales:

- Identify and display the top 10 products based on sales volume.
- Allow users to quickly visualize the best-performing products in terms of sales.

7. Sales Analysis by Days and Hours:

- Utilize a heat map to visualize sales patterns by days and hours.
- Implement tooltips to display detailed metrics (Sales, Orders, Quantity) when hovering over a specific day-hour.



Download Data

GitHub:

<https://github.com/MaddelaMohan/CN-Shop-Sales-Dashboard>

