# MALL EPURCHASE DATA ANALYSIS

Neha Barbate

1) How many unique categories are there?

```
SELECT Category_Grouped
FROM paytm
GROUP BY Category_Grouped;
```

| Category_Grouped |
|---|
| Others |
| Apparels |
| Shoes |
| Home |

2) List the top 5 shipping cities in terms of the number of orders?

```
SELECT shipping_city, COUNT(*)
AS OrderCount FROM paytm
GROUP BY shipping_city
ORDER BY OrderCount DESC
LIMIT 5;
```

| shipping_city | OrderCount |
|---|---|
| New Delhi | 4560 |
| Chennai | 4254 |
| Bangalore | 3974 |
| Mumbai | 3159 |
| Hyderabad | 2849 |

3) Show me a table with all the data for products that belong to the "Electronics" category.

There is no data for products that belong to the "Electronics" category

4) Filter the data to show only rows with a "Sale_Flag" of 'Yes'

```
SELECT * FROM paytm
WHERE Sale_Flag = 'On Sale';
```

5) Sort the data by "Item_Price" in descending order. What is the most expensive item?

```
SELECT * FROM paytm
ORDER BY Item_Price
DESC LIMIT 1;
```

6) Apply conditional formatting to highlight all products with a "Special_Price_effective" value below $50 in red

```
SELECT * FROM paytm WHERE
Special_Price_effective < 50;
```

7) Calculate the average "Quantity" sold for products in the "Clothing" category, grouped by "Product_Gender."

```
SELECT Product_Gender, AVG(Quantity) AS
AvgQuantityFROM paytm
WHERE Category_Grouped = 'Apparels’
GROUP BY Product_Gender;
```

| Product_Gender | AvgQuantity |
|---|---|
| MEN | 1 |
| WOMEN | 1 |

8) Find the top 5 products with the highest "Value_CM1" and "Value_CM2" ratios.

```
SELECT    *,    Value_CM1 / Value_CM2 AS CM_Ratio
FROM     paytm
ORDER BY    CM_Ratio DESC
LIMIT 5;
```

9) Identify the top 3 "Class" categories with the highest total sales.

```
SELECT Class, SUM(Item_Price * Quantity) AS TotalSales
FROM paytm
GROUP BY Class
ORDER BY TotalSales DESC
LIMIT 3;
```

10) Identify products with a "Paid_pr" higher than the average in their respective "Family" and "Brand" groups

```
SELECT    t.`S.no`,    t.`Name`,    t.Family,    t.Brand,
t.Paid_prFROM    paytm t
JOIN (    SELECT        Family,        Brand,        AVG(Paid_pr) AS
AvgPaid_pr
FROM        paytm    GROUP BY        Family, Brand) AS avg_table
ON t.Family = avg_table.Family
AND t.Brand = avg_table.Brand
WHERE    t.Paid_pr > avg_table.AvgPaid_pr;
```

# Thank You