

KPI ANALYSIS ON E-COMMERCE DATA USING HIVE

Code:

Total Sales:

```
SELECT SUM(Net_Amount) AS Total_Sales FROM purchases_final;
```

Total Discount Given:

```
SELECT SUM(Discount_Amount_INR) AS Total_Discount_Given FROM  
purchases_final;
```

Customer Count:

```
SELECT COUNT(DISTINCT CID) AS Customer_Count FROM purchases_final;
```

Sales by Product Category:

```
SELECT  
    Product_Category,  
    SUM(Net_Amount) AS Total_Sales  
FROM purchases_final  
GROUP BY Product_Category;
```

Sales by Gender:

```
SELECT
    Gender,
    SUM(Net_Amount) AS Total_Sales
FROM purchases_final
GROUP BY Gender;
```

Average Discount Amount:

```
SELECT AVG(Discount_Amount_INR) AS Average_Discount_Amount FROM
purchases WHERE Discount_Availed = 'Yes';
```

Sales by Location:

```
SELECT Location, SUM(Net_Amount) AS Total_Sales FROM purchases GROUP
BY Location;
```

Top Selling Products:

```
SELECT Product_Category, SUM(Net_Amount) AS Total_Sales FROM purchases
GROUP BY Product_Category ORDER BY Total_Sales DESC LIMIT 10;
```

Top Product Category by Year:

```
WITH Category_Count AS (
    SELECT YEAR(Purchase_Date) AS Year,
           Product_Category,
           COUNT(*) AS Purchase_Count
    FROM purchases
    GROUP BY YEAR(Purchase_Date), Product_Category
),
Top_Category AS (
    SELECT Year,
           Product_Category,
           Purchase_Count,
```

```
        RANK() OVER (PARTITION BY Year ORDER BY Purchase_Count DESC) AS  
rank
```

```
        FROM Category_Count  
)
```

```
SELECT Year,  
        Product_Category,  
        Purchase_Count
```

```
FROM Top_Category
```

```
WHERE rank = 1;
```

Total Sales by Location:

```
SELECT Location,  
        SUM(Net_Amount) AS Total_Sales
```

```
FROM purchases
```

```
GROUP BY Location
```

```
ORDER BY Total_Sales DESC;
```

Top Product Categories by Location:

```
SELECT Location,  
        Product_Category,  
        COUNT(*) AS Purchase_Count
```

```
FROM purchases
```

```
GROUP BY Location, Product_Category
```

```
ORDER BY Location, Purchase_Count DESC;
```

Total Sales by Purchase Method:

```
SELECT  
        Purchase_Method,  
        ROUND(SUM(Net_Amount), 2) AS Total_Sales  
FROM purchases
```

GROUP BY Purchase_Method
ORDER BY Total_Sales DESC;
in which city more sales has happened:

```
SELECT
    Location,
    SUM(Net_Amount) AS Total_Sales
FROM purchases
GROUP BY Location
ORDER BY Total_Sales DESC
LIMIT 5;
```

Customer Age Group Analysis: Sales Contribution

```
SELECT
    Age_Group,
    SUM(Net_Amount) AS Total_Sales
FROM purchases
GROUP BY Age_Group
ORDER BY Total_Sales DESC;
```