**PIJAR MAHIR X DIGISTAR** 

## Customer Segmentation





# Overview

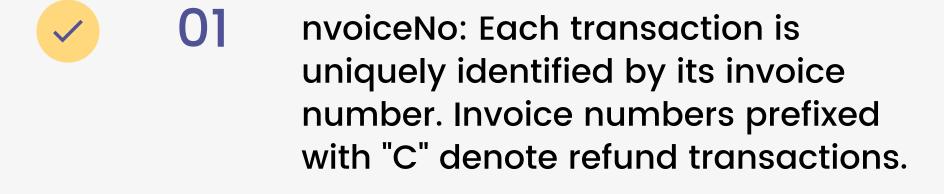
The Online Retail - II dataset provides insights into the sales activities of an online store spanning from December 1, 2009, to December 9, 2011. This dataset encompasses a wide range of souvenir products, primarily targeting corporate customers.



# Objective

The primary objective of this dataset is to facilitate the development of customercentric strategies through the integration of Customer Relationship Management (CRM) with Analytics. By leveraging RFM (Recency, Frequency, Monetary) Analysis, businesses can gain deeper insights into customer behavior and preferences.

## Data Understanding

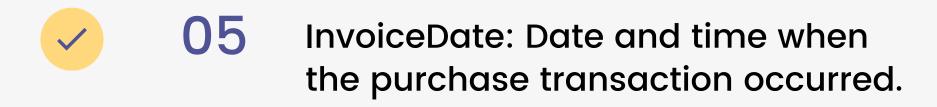




- StockCode: An exclusive code assigned to each item in the inventory.
- Description: The descriptive name of the item being purchased.

Quantity: The quantity of items included in the transaction.

## Data Understanding



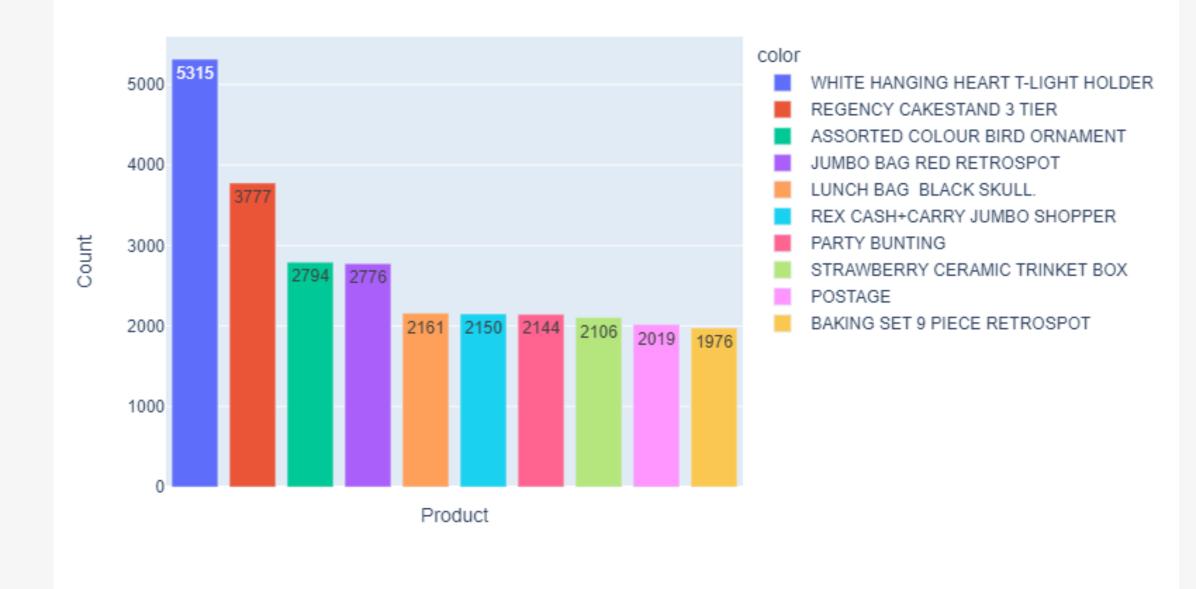


UnitPrice: The price of a single item, denominated in Sterling currency.

O7 CustomerID: A unique identifier assigned to each customer.

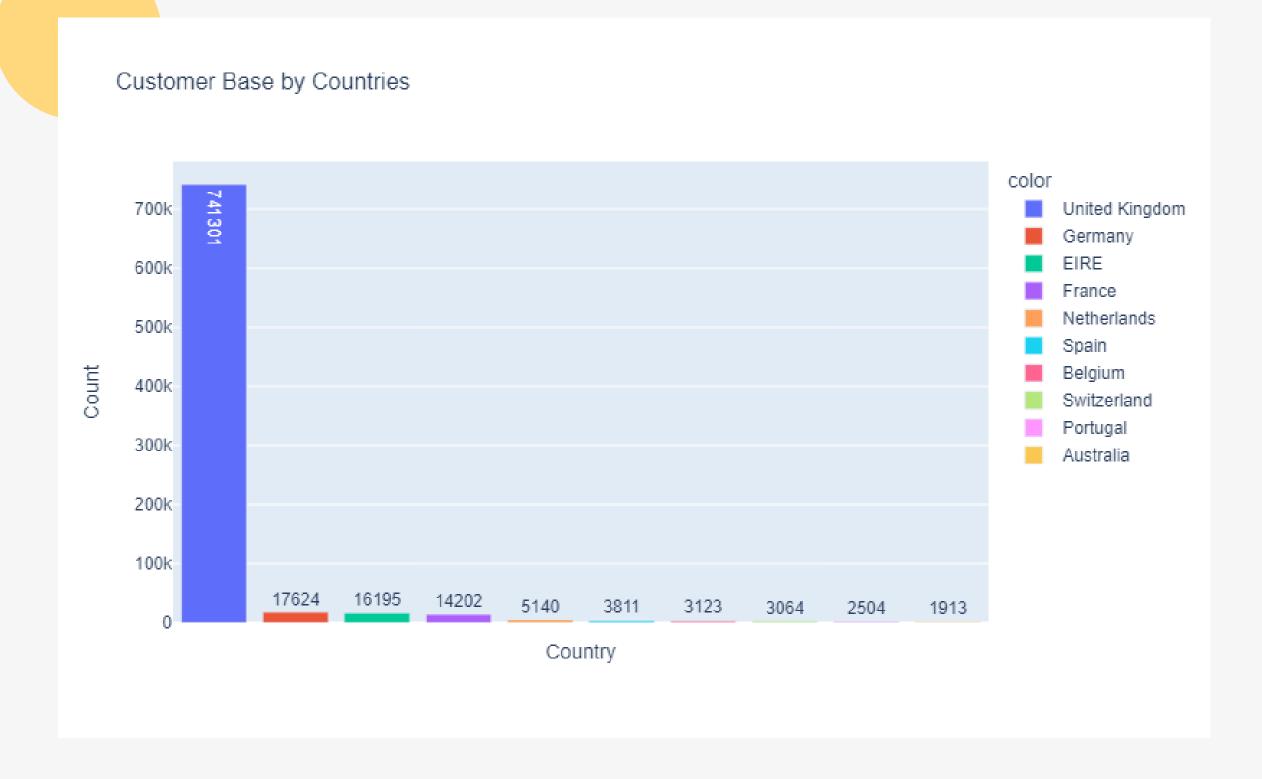
Country: The country of residence for the customer.





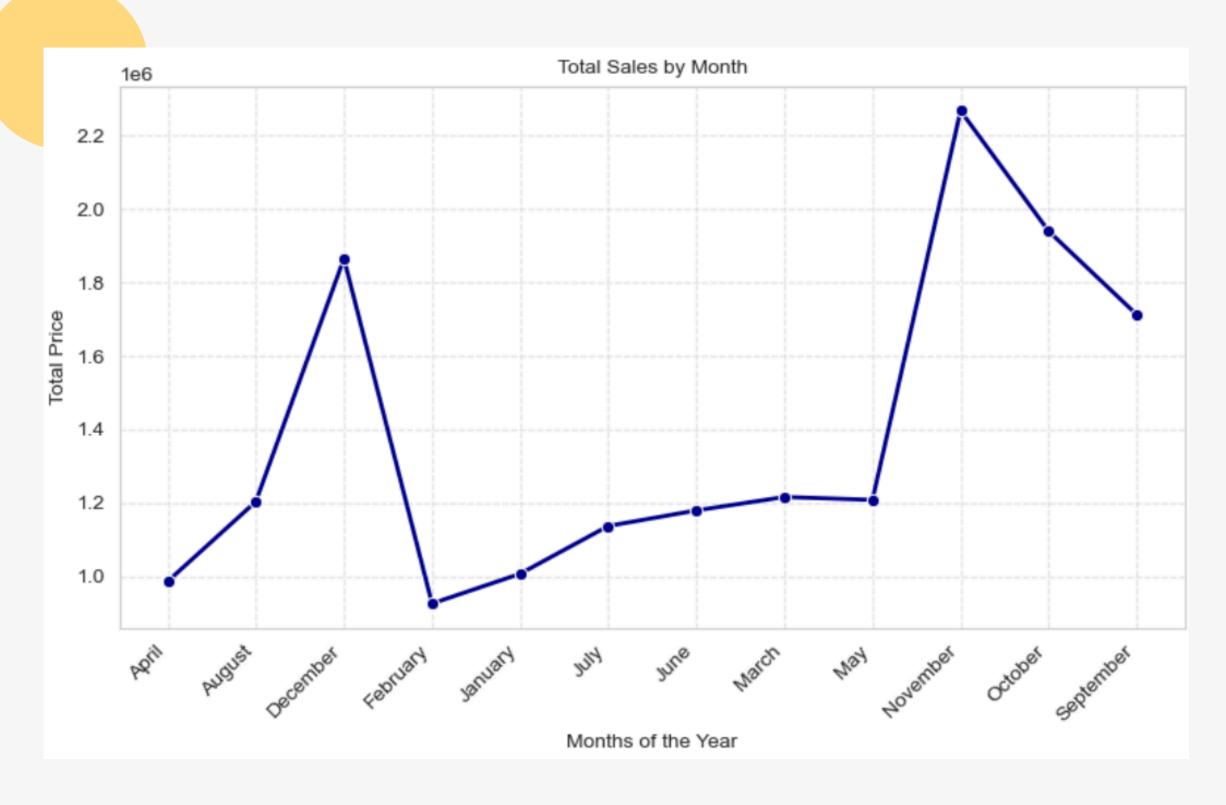
## Top 10 Most Products Per Shop

Based on the top 10 products from each store, the product with the most sales is 'WHITE HANGING HEART T-LIGHT HOLDER' with a total of 5,315 sales. Meanwhile, the average sales for the other products were the same.



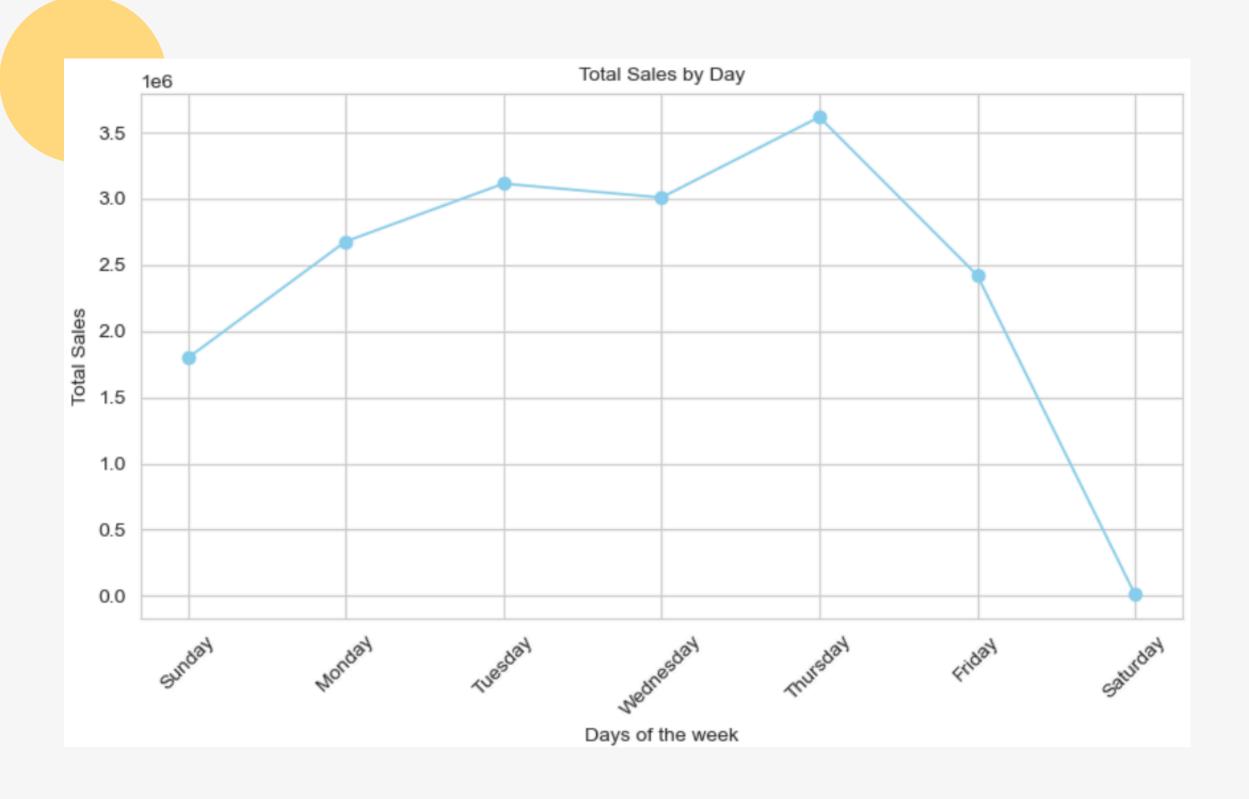
## Customer Base by Countries

the most customers are in the United Kingdom and the lowest in Australia.



# Total Sales by Month

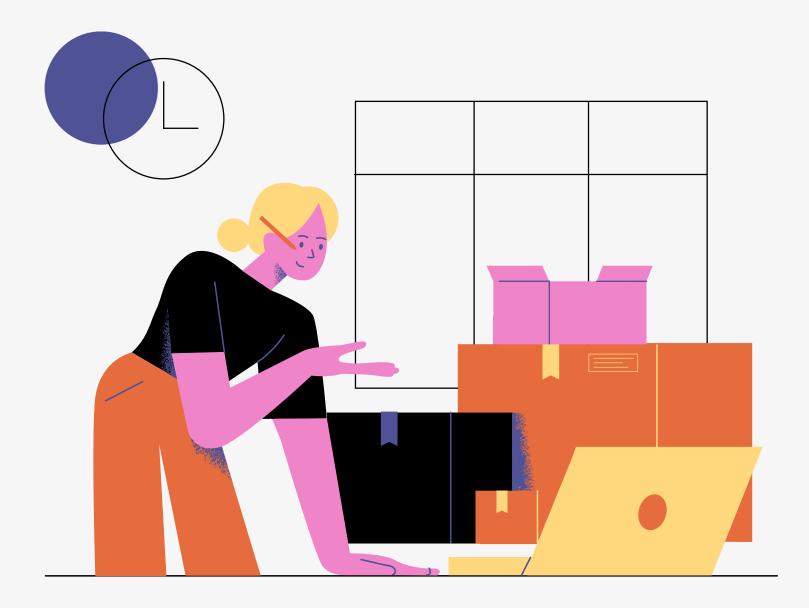
Sales did not increase significantly, but there were months when sales increased, namely in August and May. However, in the following months, sales decreased significantly. Therefore, it is necessary to evaluate and make efforts to increase sales potential in these months.



# Total Sales by Day

There was an increase in sales every day, but there were days when sales increased significantly from Wednesday to Thursday, and decreased significantly from Thursday to Saturday.

# What RFM?

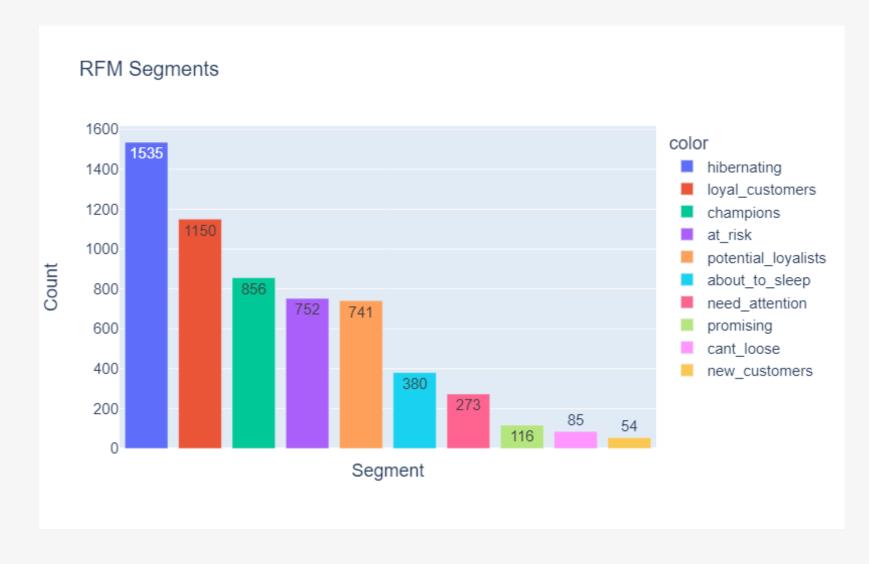


## **RFM Analysis**

RFM is a method used to analyze and segment customer behaviors. RFM stands for Recency, Frequency, and Monetary Value.

- Recency: It refers to how recently a customer has made a purchase. More recent customers are considered more valuable.
- Frequency: It indicates how often a customer makes purchases within a given time frame. Customers who make frequent purchases are typically considered more loyal or engaged.
- Monetary Value: It represents the total value of purchases made by a customer within a specific time period. Customers who spend more money are generally more valuable to the business.

## RFM Analysis



## Hibernating

- Mean Recency: 213.886 days (1015 customers)
- Mean Frequency: 1.126 (1143 purchases)
- Mean Monetary Value: 403.978(Total:403.978(Total:410,037.504)

#### **Recommendations:**

- Reach out with personalized win-back offers or discounts to encourage them to return.
- Conduct surveys or feedback sessions to understand why they stopped purchasing and address any concerns.

### At Risk

- Mean Recency: 152.159 days (611 customers)
- Mean Frequency: 3.074 (1878 purchases)
- Mean Monetary Value:
  1188.878(Total:1188.878(Total:726,404.651)

#### **Recommendations:**

- Implement targeted re-engagement campaigns to remind them of your value proposition.
- Offer personalized discounts or promotions to encourage repeat purchases.

## **About to Sleep**

- Mean Recency: 53.819 days (343 customers)
- Mean Frequency: 1.201 (412 purchases)
- Mean Monetary Value: 441.320(Total:441.320(Total:151,372.760)

#### **Recommendations:**

- Offer loyalty rewards or VIP programs to further incentivize their frequent purchases.
- Provide exclusive offers or early access to new products/services to maintain their engagement.

#### **New Customers**

- Mean Recency: 8.580 days (50 customers)
- Mean Frequency: 1.000 (50 purchases)
- Mean Monetary Value: 386.199(Total:386.199(Total:19,309.960)

#### **Recommendations:**

- Welcome them with a special discount or promotion for their next purchase to encourage repeat business.
- Implement an onboarding email series to introduce them to your products/services.

## **Potential Loyalists**

- Mean Recency: 18.793 days (517 customers)
- Mean Frequency: 2.017 (1043 purchases)
- Mean Monetary Value:
   729.511(Total:729.511(Total:377,157.180)

#### **Recommendations:**

- Offer incentives for increasing their frequency of purchases, such as referral bonuses or points-based rewards.
- Provide personalized product recommendations based on their past purchases to enhance their shopping experience.