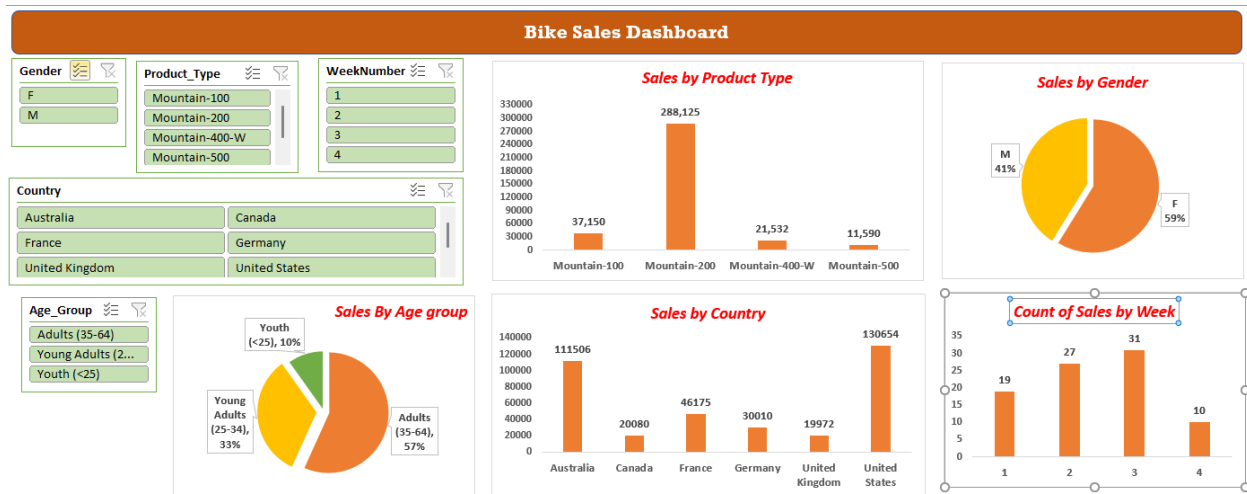


Bike Sales Data Analysis With Excel



1. Data Source – Bike Sales - <https://www.kaggle.com/code/stolltho/eda-hypothesis-testing-bike-sales/input?select=Sales.csv>
2. Created a backup of the original sheet and named it Working then applied the following transformations.
3. Deleted calculated columns (Cost, Revenue) from Working sheet.
4. Normalization - Created another sheet called Products with unique Products and Unit_Cost and Unit_Price. This was done to reduce the redundancy in the data.
5. Then using XLOOKUP, the Product details were populated into the Working sheet and later the Product ID column was deleted.
6. From Working sheet, I removed blank record, duplicate record and separated Product_Description into Product_Type, Product_Color, Product_Size columns.
7. Converted Sales Numbers which was in text to Numbers format.
8. Data Cleaning – Removed rows that did not have Product Id, Order_Quantity, Day values.
9. Added a VBA script to calculate the week of month.

```

Rev 2 - All-VBA-US-BikeSales.xlsm - Module1 (Code)
(General) WeekOfMonth

Function WeekOfMonth(dateValue As Date) As Integer
    Dim firstDayOfMonth As Date
    Dim dayOfMonth As Integer
    Dim weekNumber As Integer

    ' Ensure that the input is a date
    If Not IsDate(dateValue) Then
        WeekOfMonth = CVErr(xlErrValue)
        Exit Function
    End If

    ' Get the day of the month
    dayOfMonth = Day(dateValue)

    ' Calculate the first day of the month
    firstDayOfMonth = DateSerial(Year(dateValue), Month(dateValue), 1)

    ' Calculate the week number
    weekNumber = Int((dayOfMonth - 1) / 7) + 1

    WeekOfMonth = weekNumber
End Function
    
```

10. Created all Pivot tables in PVSheet.
11. Created a Dashboard sheet that displays the graphs related to all the pivot tables in the PVSheet.
12. These interactive charts display the sales per Gender, per Product_Type, WeekNumber, Country, Age_Group. Using the slicers, different combination of data can be analyzed.
13. Below are the pivot tables that were placed in the Dashboard.

1		
2		
3	Gender	Sum of Sales
4	F	210919
5	M	147478
6	Grand Total	358397
7		
8	Product_Type	Sum of Sales
9	Mountain-100	37150
10	Mountain-200	288125
11	Mountain-400-W	21532
12	Mountain-500	11590
13	Grand Total	358397
14		
15	Age_Group	Sum of Sales
16	Adults (35-64)	203421
17	Young Adults (25-34)	119646
18	Youth (<25)	35330
19	Grand Total	358397
20		
21	Week_Number	Count of Sales
22	1	19
23	2	27
24	3	31
25	4	10
26	Grand Total	87
27		
28	Country	Sum of Sales
29	Australia	111506
30	Canada	20080
31	France	46175
32	Germany	30010
33	United Kingdom	19972
34	United States	130654
35	Grand Total	358397
36		