Chip Data Analysis

Business Task: Understanding types of customers who purchase chips and their purchasing behavior within the region.

Stakeholders: category manager for chips, manager Zilinka, analytics team

Goals:

- Increase revenue.
- Better understand customer behavior.
- Which category of customers buy more chips?

Tools used: Excel, RStudio

Prepare data for Analysis:

Check for inconsistencies in data.

- 1. Transaction Data:
 - a. Date column is changed from Number to Date format.
 - b. Number formatting.
 - c. Added a new column WEIGHT_GRAMS separated from the PROD_NAME column.

Excel Formula to separate text new PROD_NAME :

=LEFT(F2,MIN(IFERROR(FIND({0,1,2,3,4,5,6,7,8,9},F2),""))-1)

Excel Formula to separate WEIGHT GRAMS:

=MID(F2,MIN(IFERROR(FIND({0,1,2,3,4,5,6,7,8,9},F2),"")),3)

VLOOKUP to merge purchase_behavior data into transaction_data

LIFESTAGE column:

=VLOOKUP(C2,[purchase_behaviour.xlsx]QVI_purchase_behaviour!A2:C72638, 2,FALSE)

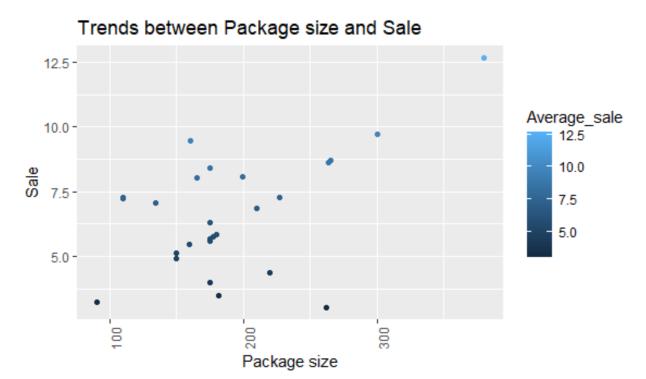
PREMIUM CUSTOMER:

=VLOOKUP(C2,[purchase_behaviour.xlsx]QVI_purchase_behaviour!A2:C72638, 3,FALSE)

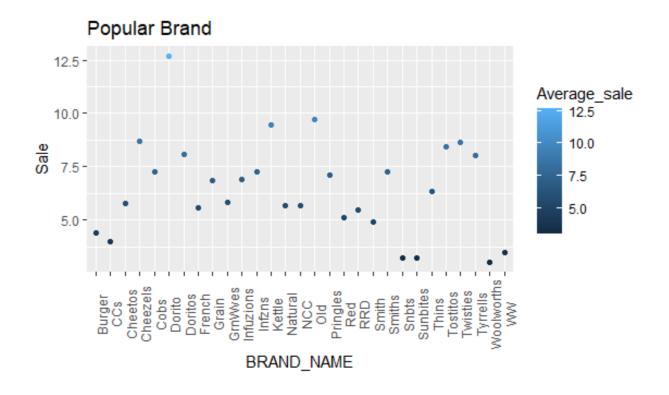
Importing Excel dataset into RStudio:

Visualizations:

1. Found positive correlation between package size and sale. Bigger package sizes have more sales.

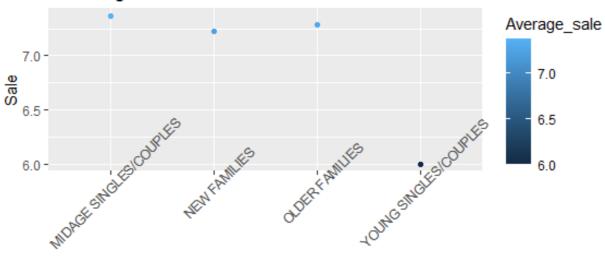


2. Dorito is the most popular brand of chips.



3. Mid Age singles/couples buy more chips.

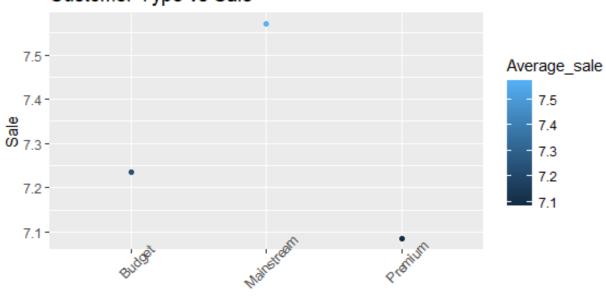
Life Stage vs Sale



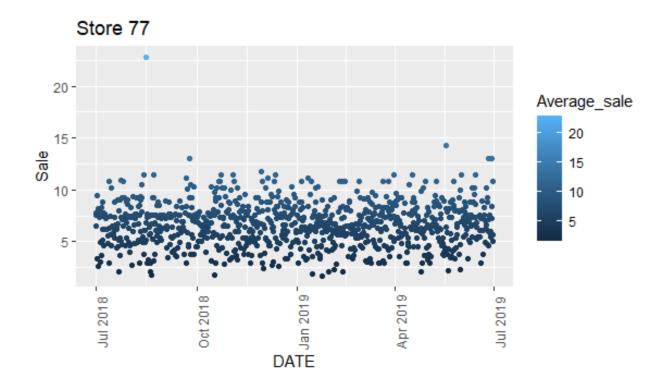
LIFESTAGE

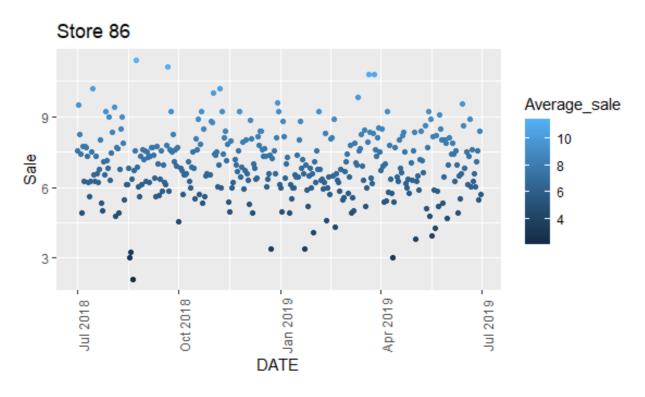
4. Most of the sale comes from the Mainstream type of customer.

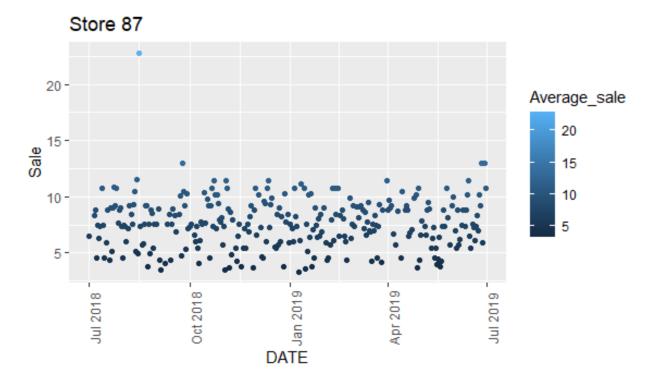
Customer Type vs Sale



Customer Type







From store 77,86,87 most of sale is from aug-sep 2018

Conclusion:

- 1. Stock up on the Doritos brand as it is more popular.
- 2. Big package sizes have more sales, we should increase production of bigger packages.
- 3. Mid-age singles or couples buy more chips, we should target this life stage in advertisements.