DATA @ ANZ

Task 1: Exploratory Data Analysis

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Tool used: Tableau

Point of Analysis

1. Age of customer and transaction volume

2. Weekly, Daily & Hourly Analysis

3. Transaction volume based on Gender, top customers and location

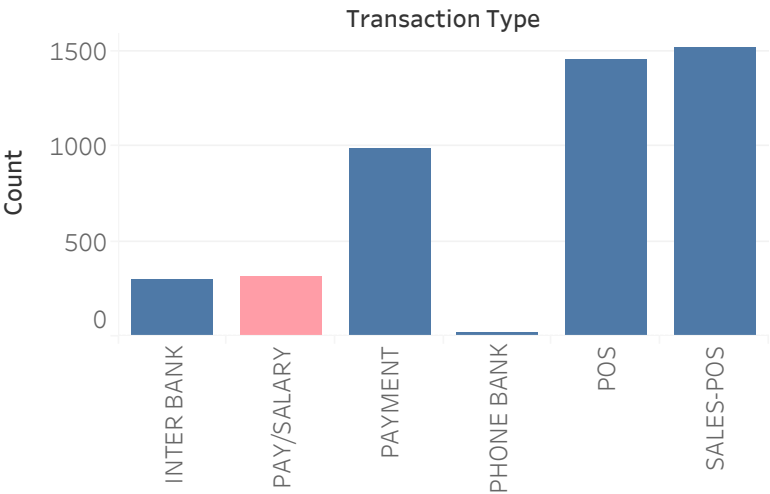4. Location based Analysis of POS

Insights

1. Transaction volume decreases significantly for Age > 40

2. Transaction in form of Phone bank are minute and the company can focus on increasing phone banking support as people would want everything on mobile phones in near future.

3. Credit is only in the form of Salary/pay which is a check on credibility of data as we don't see any anomalies in movement of data.

4. Hourly analysis show that the transaction peak time is around noon and is low between 1AM-4AM.

5. Weekly analysis confirms that POS sales rise on weekends and Salary is credited between Monday and Friday i.e. the bank working days. Also, average amount transacted each week as marginalized difference and both male and female customers have mostly similar average values.

6. Transaction volume clearly shows that most of the transactions are POS & Sales-POS i.e. the customers tend to pay a lot at merchant points directly as compared to transfers or payments.

7. Transaction volume has negligible difference based on gender which implies that the bank has an unbiased service towards gender, and customers from both genders trust the bank.

8. The transaction volume is pretty low in suburbs other than Melbourne and Sydney the reason might be low customer ratio which can be looked ahead by the marketing team.

9. Merchants are very well spread across the country.

10. Location based analysis of customers show that customer has transacted from different states with in this period and density of transaction volume is towards New South Wales and Queensland.
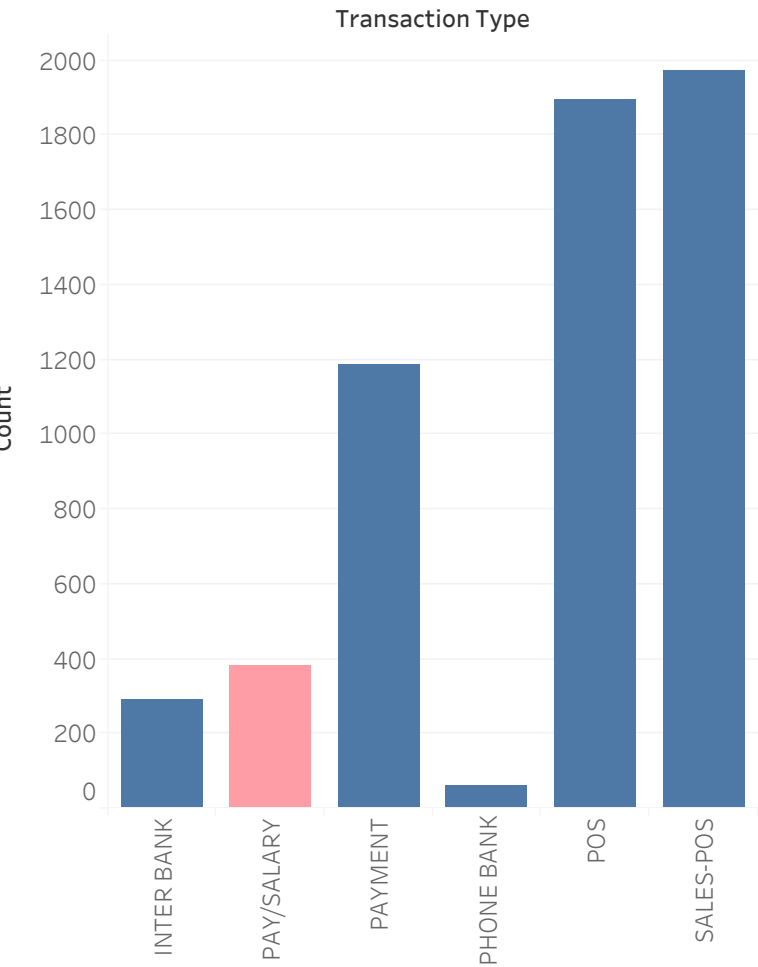

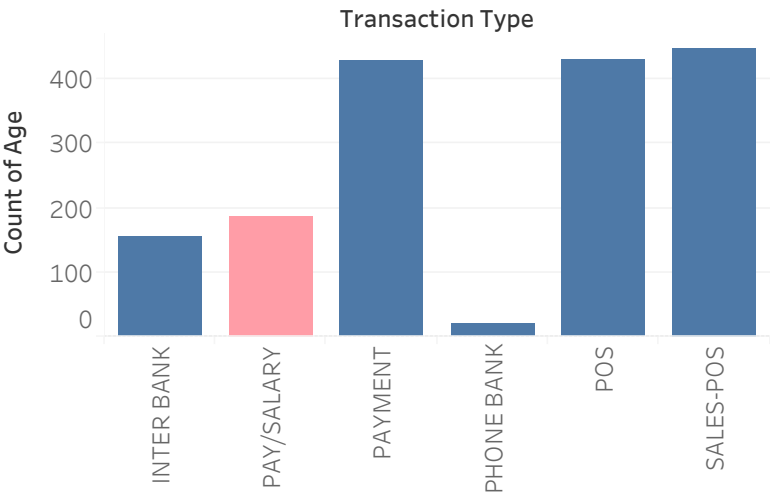Below are my findings in the form of graphs
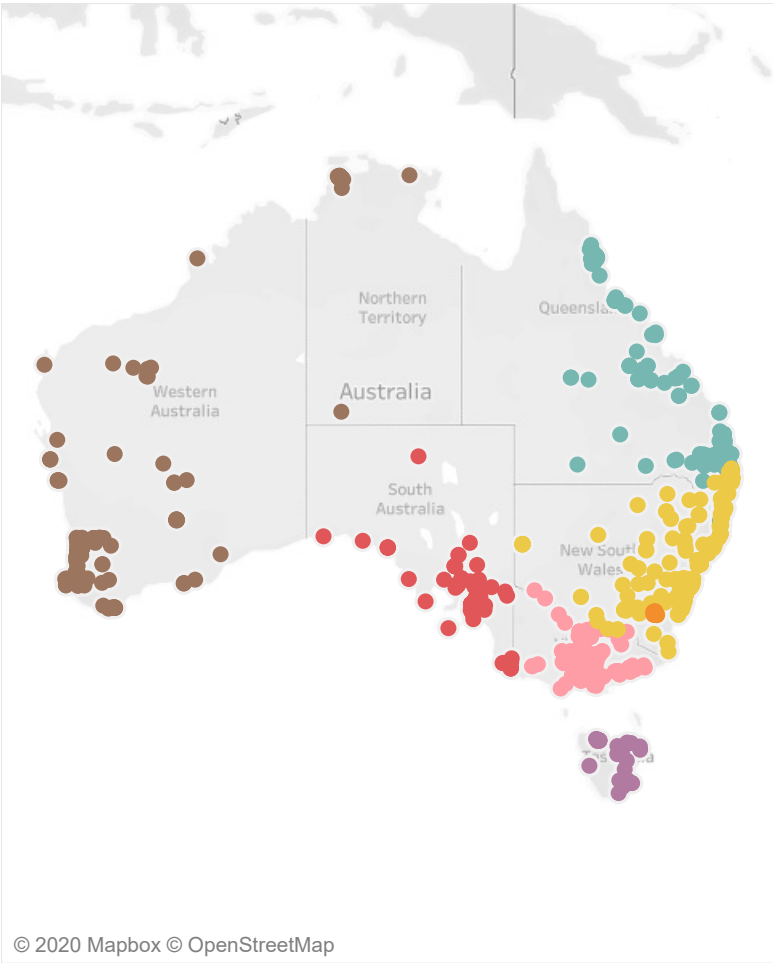
Age vs Transaction

Age 18 to 25

Transaction Type

Age 25 to 40

Transaction Type

Age 40 above

Transaction Type

movement
- credit
- debit

Location based Analysis

Merchants of POS & POS Sales

© 2020 Mapbox © OpenStreetMap

Top 5 customers & their Point of Purchase

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Merchant State

- ACT
- NT
- SA
- VIC
- NSW
- QLD
- TAS
- WA
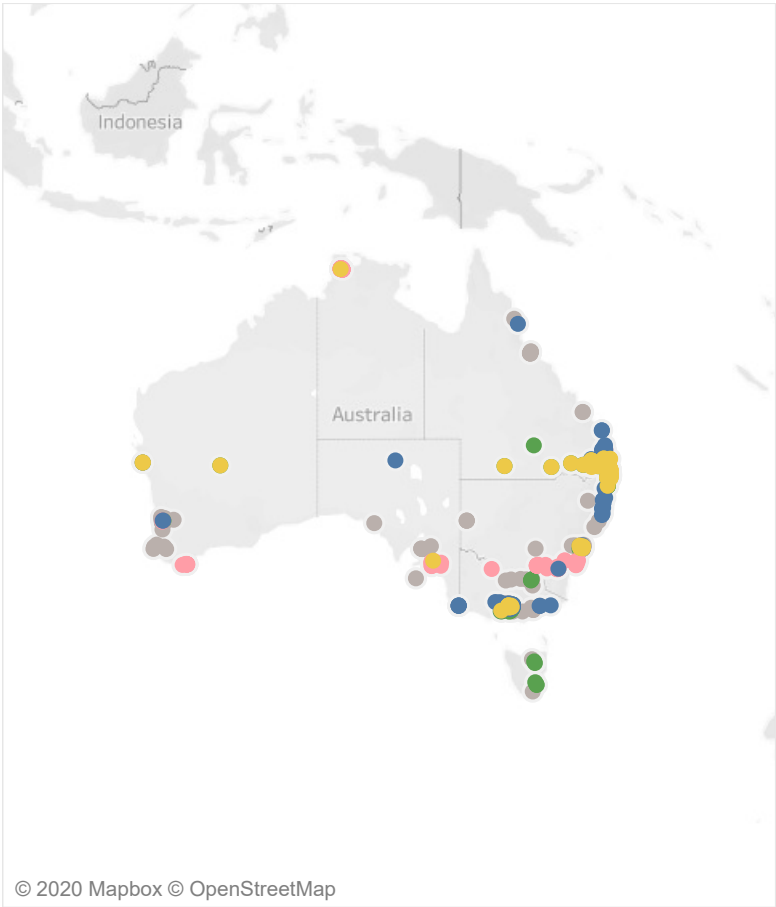
Name

- Diana
- Jessica
- Michael
- Jeffrey
- Joseph

Customer & Transaction based Analysis

Gender Count
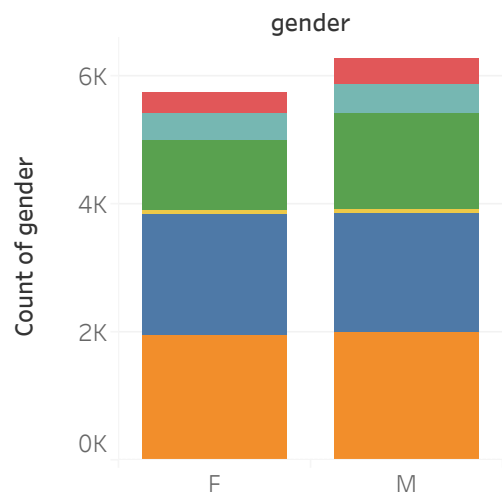
Transactions as per State

Transaction Type
- INTER BANK
- PAY/SALARY
- PAYMENT
- PHONE BANK
- POS
- SALES-POS

gender

Count of gender

6K
4K
2K
0K

F   M

Merchant State

Count of Transaction

2000
1500
1000
500
0

WA VIC TAS SA QLD NT NSW ACT

Top 10 customers

Name

Michael
Diana
Jessica
Joseph
Jeffrey
Richard
Kimberly
Tonya
Susan
Christopher

0   200   400   600
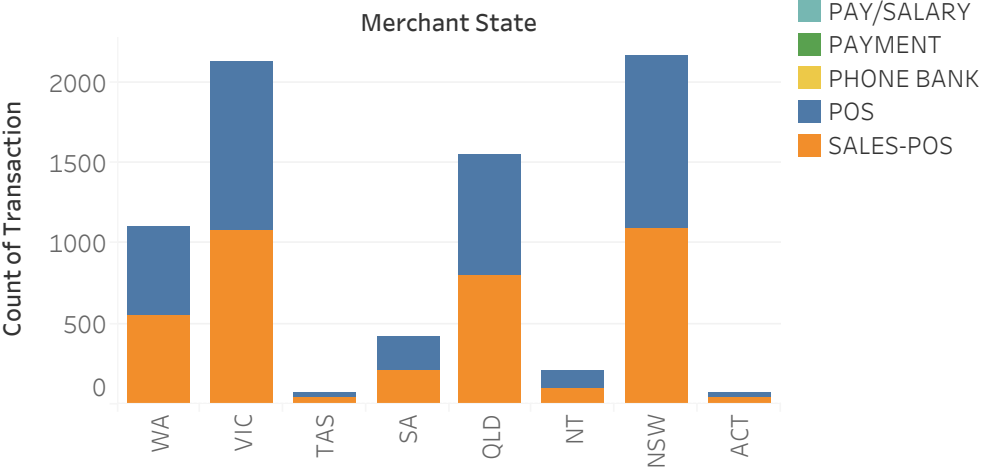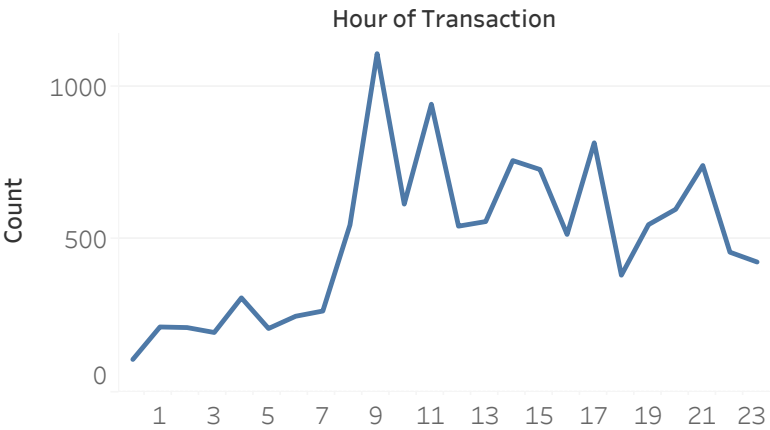
Count of Transactions
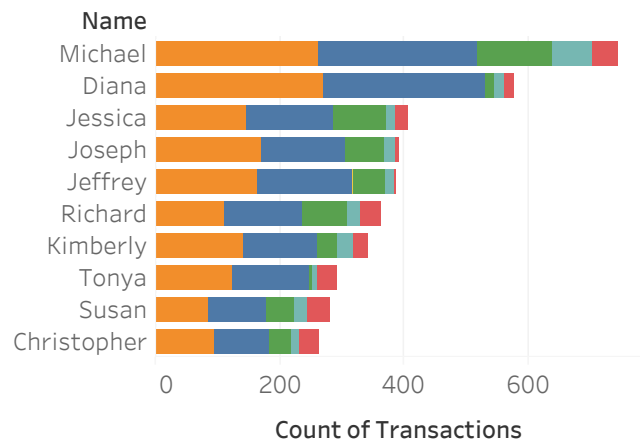
Suburbs with more than 40 Transactions

Suburb

Count of Transaction

200

100

0

Melbourne Sydney Southport Brisbane.. Chatswo.. Perth Adelaide Broadbe.. Mount G..
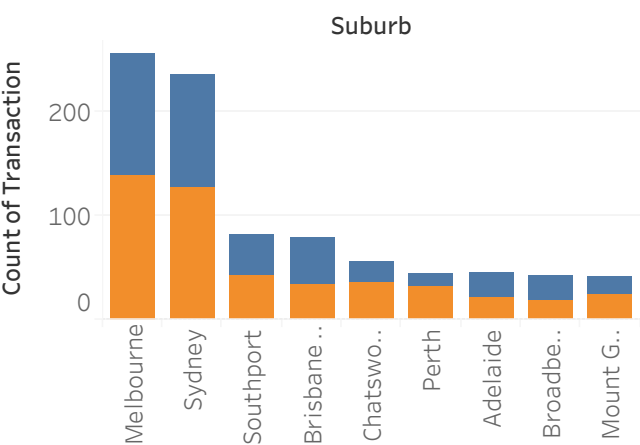
Weekly, Daily and Hourly Analysis

Hour of Transaction vs Count

Hour of Transaction

Average amount transacted weekly

Week

gender ▦ F ▦ M
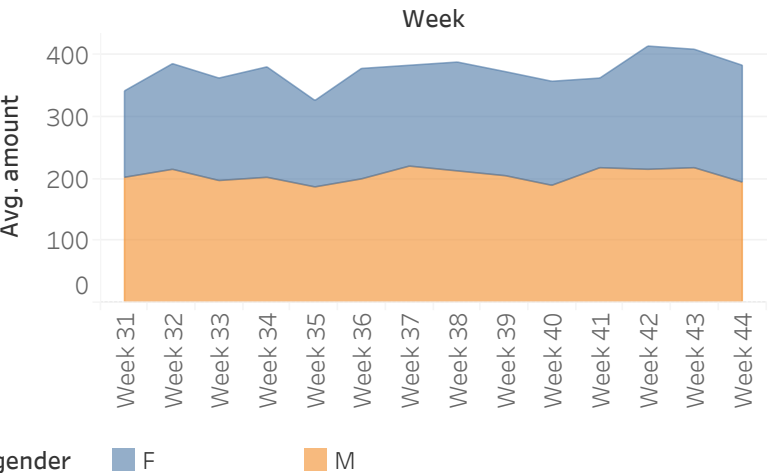
Number of transactions each week

Week
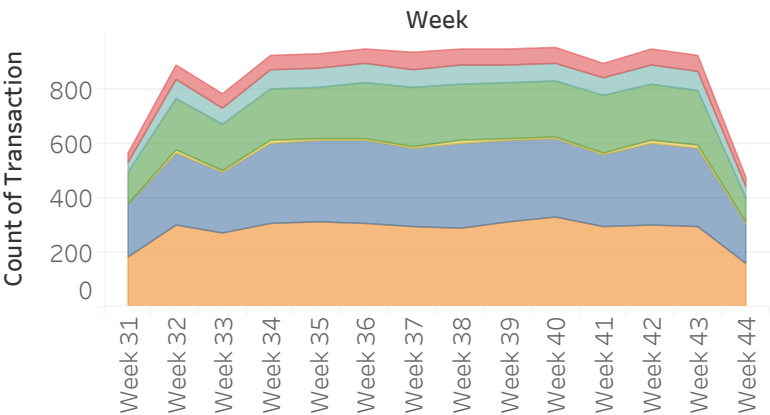
Day-wise Transaction Analysis

Week
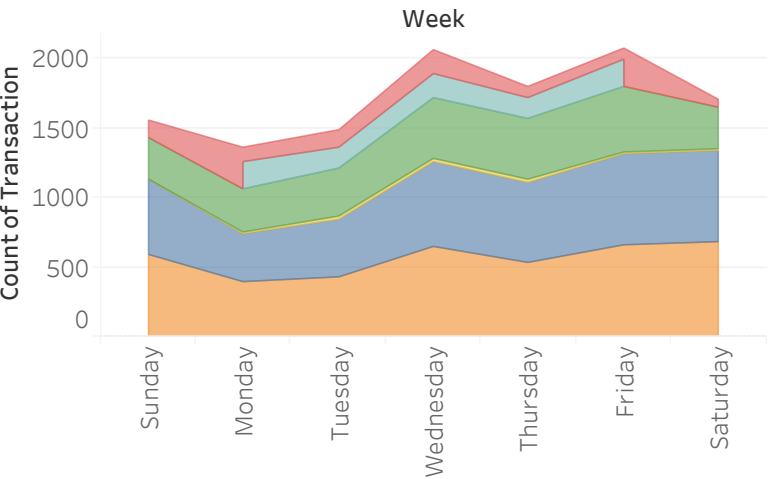
Transaction Type

▦ INTER BANK ▦ PAYMENT ▦ POS
▦ PAY/SALARY ▦ PHONE BANK ▦ SALES-POS