

# Analysis of Customer Database for United Bank

Lighthouse Labs Mini Project

By : Leah Lourenco & Nitin Kohli

# Project Outcomes :

- ❑ Segmentation of customers
- ❑ Identify patterns in the clusters
- ❑ To introduce targeted marketing based upon the findings.
- ❑ For Fraud Detection.

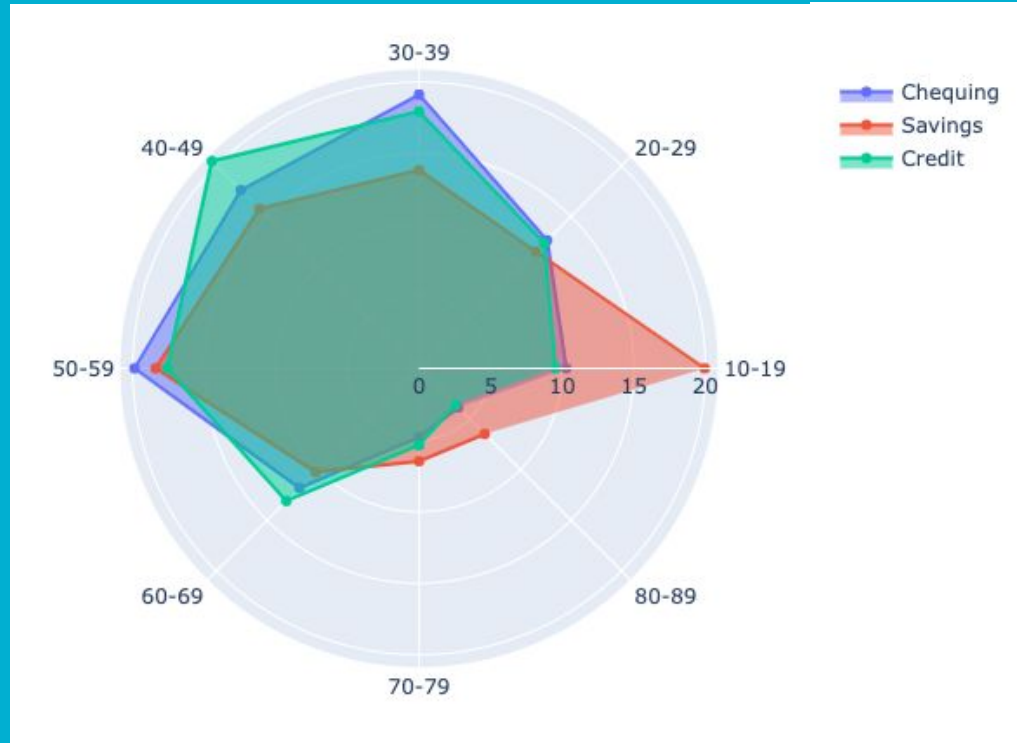


# Features considered to segment and analyse the database:

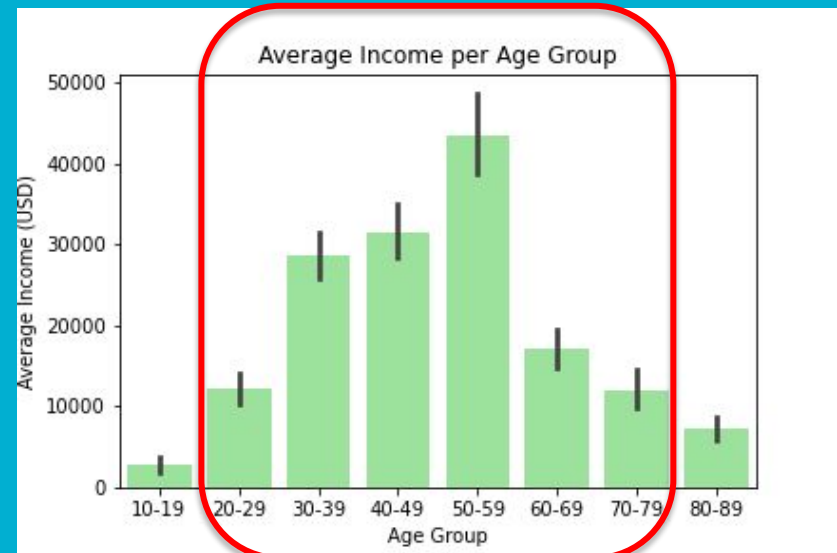
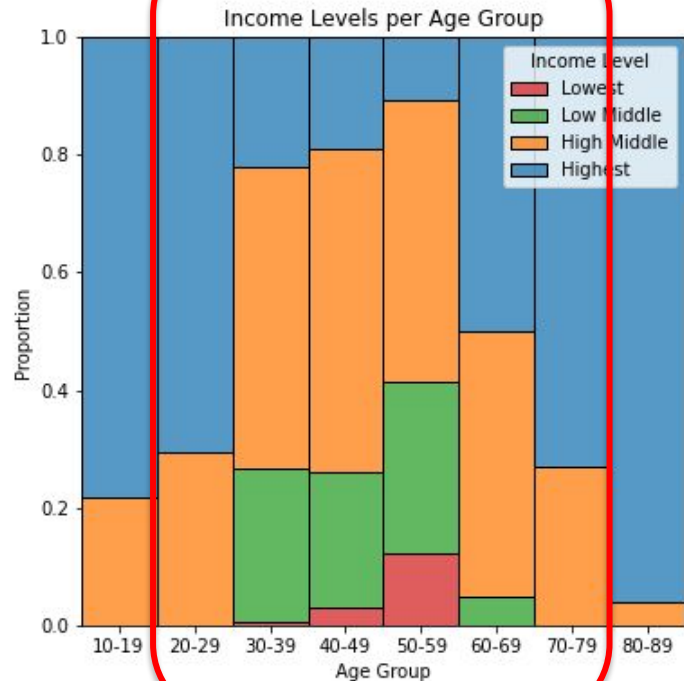
---

- ❑ 'Years with Bank' - to reward loyal customers with incentives.
- ❑ 'Income' - increased credit card limits, business accounts, line of credit.
- ❑ 'Age' - retirement package, student loans
- ❑ 'Money Spent' - to find spending habits of customers.
- ❑ 'Type of Account' - to promote investing portfolios.

# Transaction Types per Age Group



# Cluster Findings Visualised:



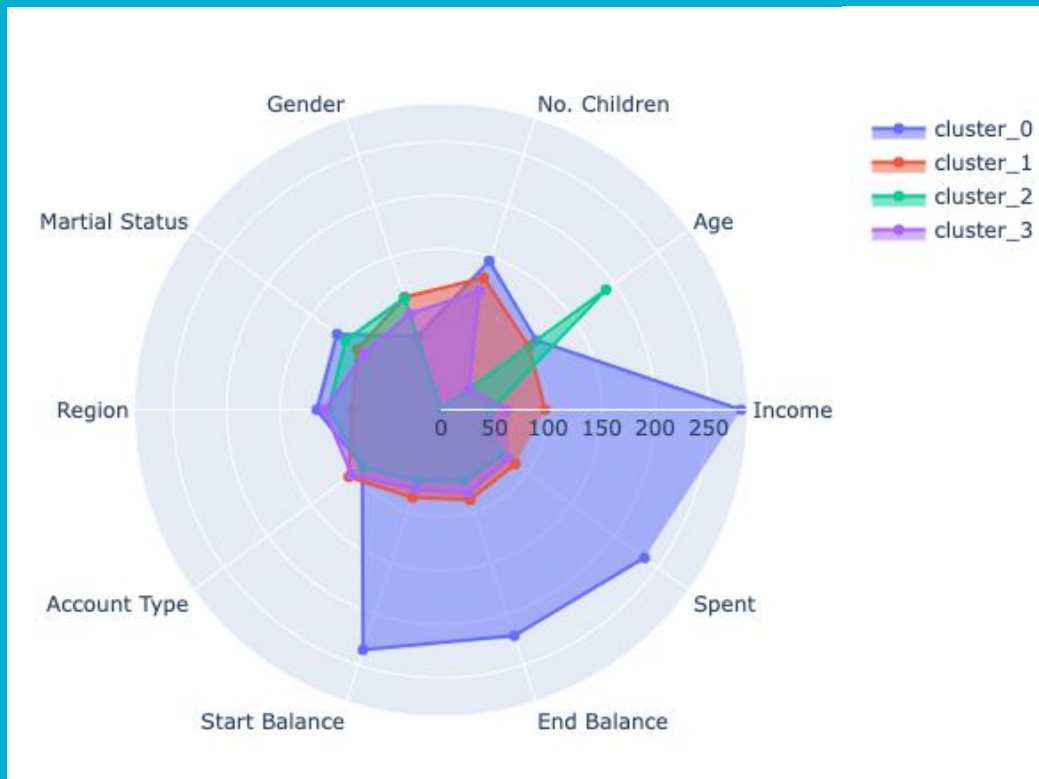
# Cluster Findings Interpreted:

1	Age Group : 20-29	2	Age Group:30-39	3	Age Group : 40-49
<ul style="list-style-type: none"><li>• Relatively new customers .</li><li>• Lesser income (\$10 - \$15K )</li><li>• Majority of transactions from Credit Account.</li></ul>		<ul style="list-style-type: none"><li>• Most of customers are with the bank for &lt; 5 years.</li><li>• Income of &gt; \$30K.</li><li>• Transactions divided between Credit and Chequing account.</li></ul>		<ul style="list-style-type: none"><li>• More loyal customers than new ones.</li><li>• Income between \$30-\$35K.</li><li>• Transactions mainly from Credit account.</li></ul>	

# Cluster Findings Interpreted:

1	Age Group : 50-59	2	Age Group:60-69	3	Age Group : 70-79
<ul style="list-style-type: none"><li>• Least amount of new customers.</li><li>• Highest earning group. (&gt;\$40)</li><li>• Majority of transactions from Savings account.</li></ul>		<ul style="list-style-type: none"><li>• Most loyal customers in the database.</li><li>• Income from \$15-20K.</li><li>• Most of the transactions from Chequing account.</li></ul>		<ul style="list-style-type: none"><li>• Majority of customers with the bank for &gt;5 yrs.</li><li>• Income between \$10-\$15K.</li><li>• Least amount of transactions overall.</li></ul>	

# Comparing Clusters



Age x Income



# PCA

---

