

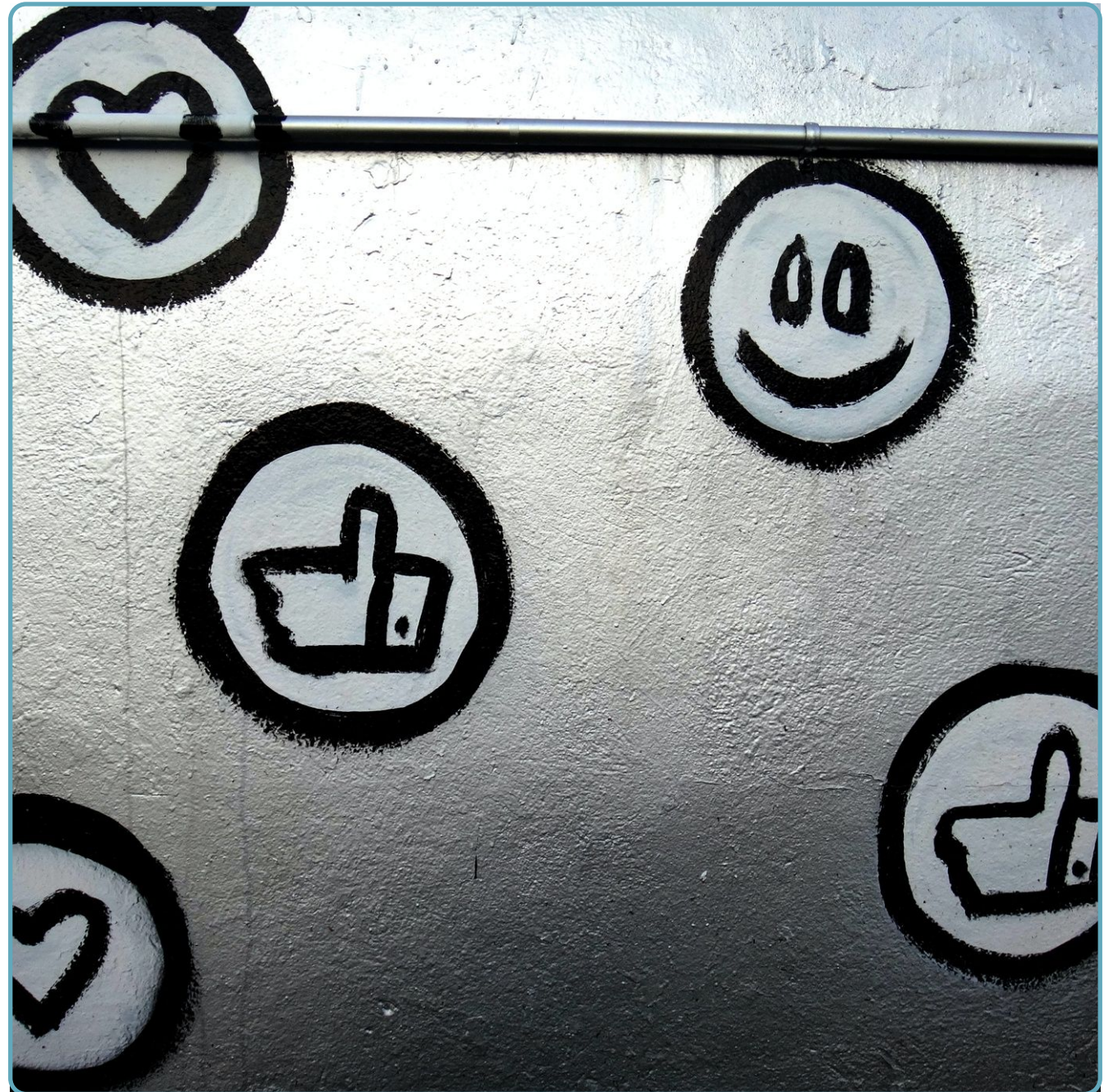


Unveiling Sentiments on Apple Products

Jay Iraj, Juvenon Edouard,
Data Scientist team

Agenda

- Business Understanding
- Data
- Modelling
- Features importances
- Conclusion & Recommendations



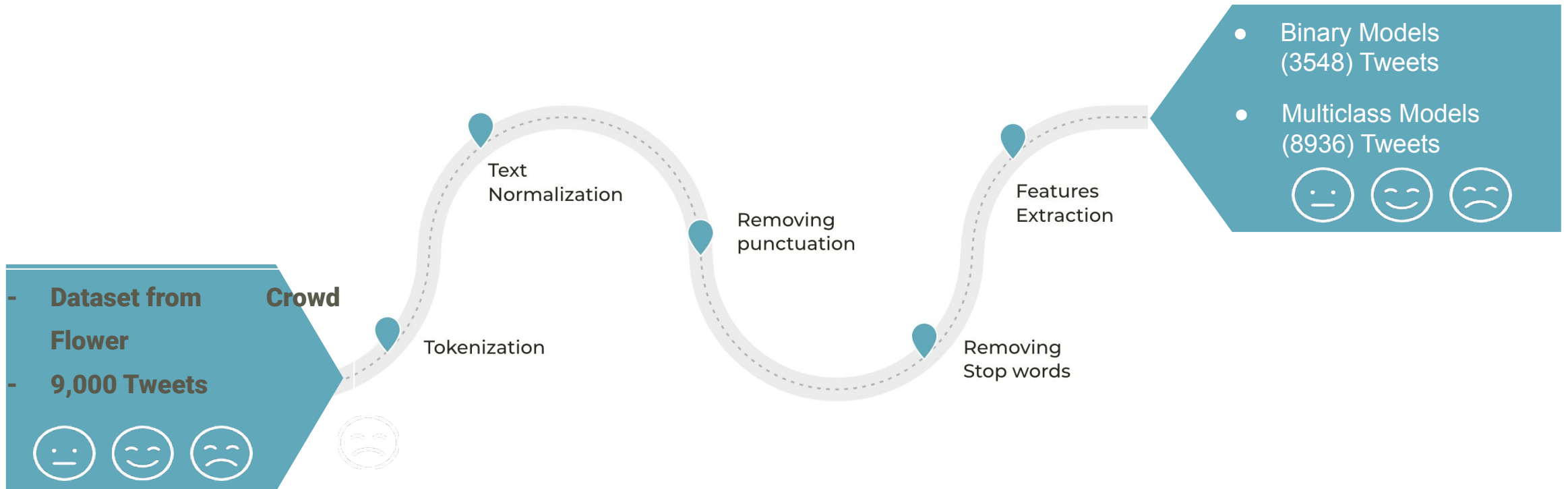
Business Understanding

Leverage sentiment analysis of tweets, to enhance our social media engagement and assess our product marketing effectiveness



Data

- understanding and processing



Models Performances

- Multinomial Naive Bayes and Random Forest

Binary Models



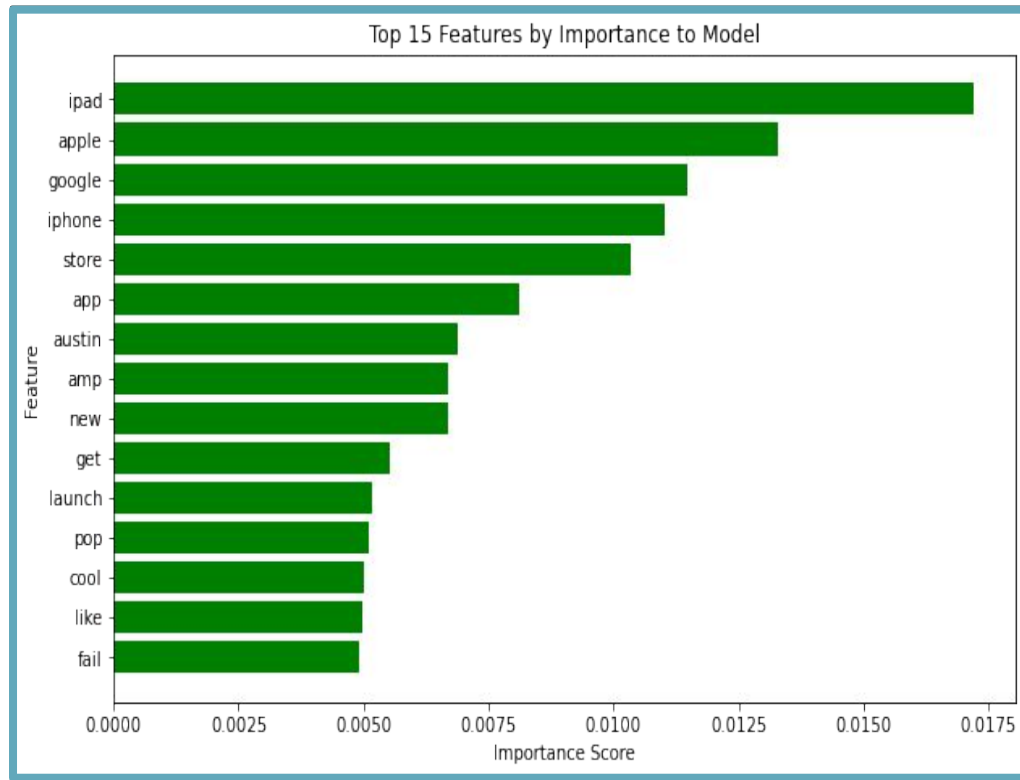
- **Naive Bayes**
Cross Validation
89 %

Multiclass Models



- **Random Forest**
Cross Validation
68.3%

Our Best Model: Ternary Random Forest

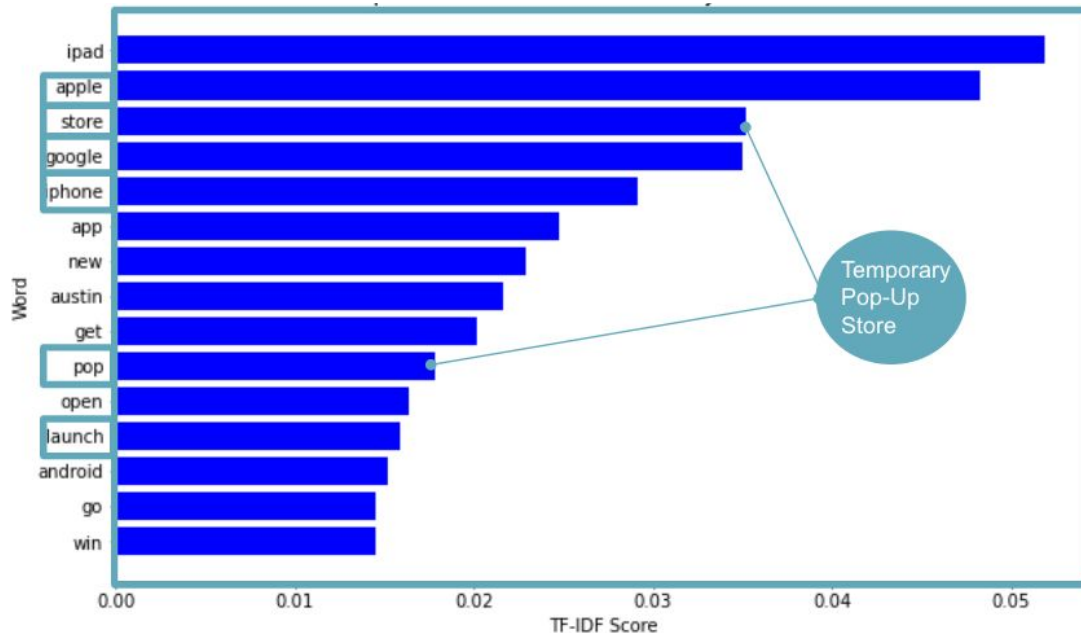


Model Accuracy
Score on the
(Test):
68.5%

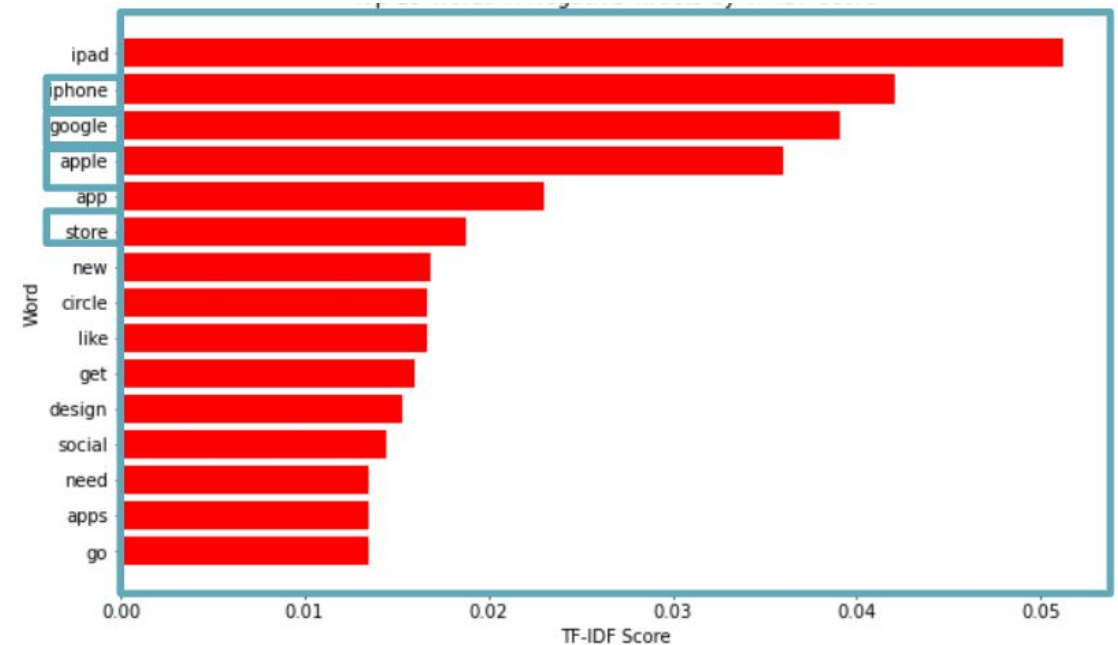
Word Frequencies in Positive and Negative Tweets



Top 15 Words in
Positive Tweets by
TF-IDF Score



Top 15 Words in
Negative Tweets by
TF-IDF Score



Conclusions and Recommendations

1. Continue Overall Marketing Strategy
2. Temporary Pop-Up Store was a success
3. Market upcoming products more on social media
4. Address negative sentiment around iPhone

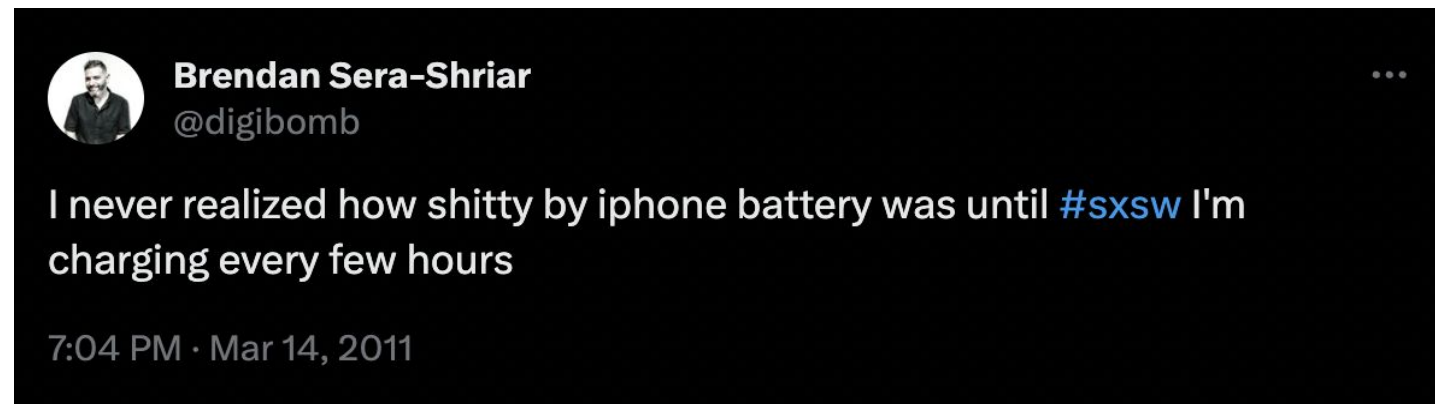


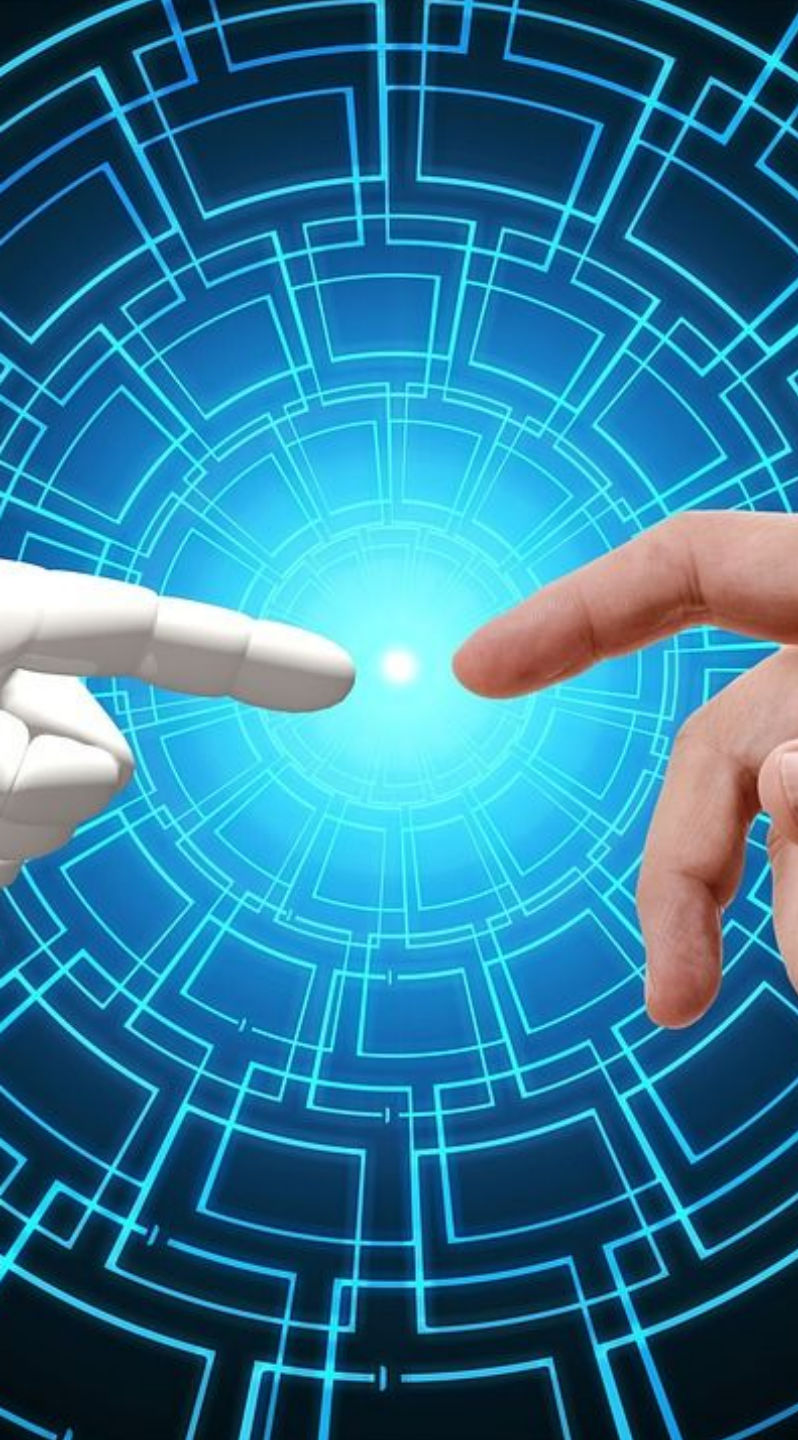
Conclusions and Recommendations

4. Address negative sentiment around iPhone



Negative Emotion





Thank you !



Positive Emotion

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