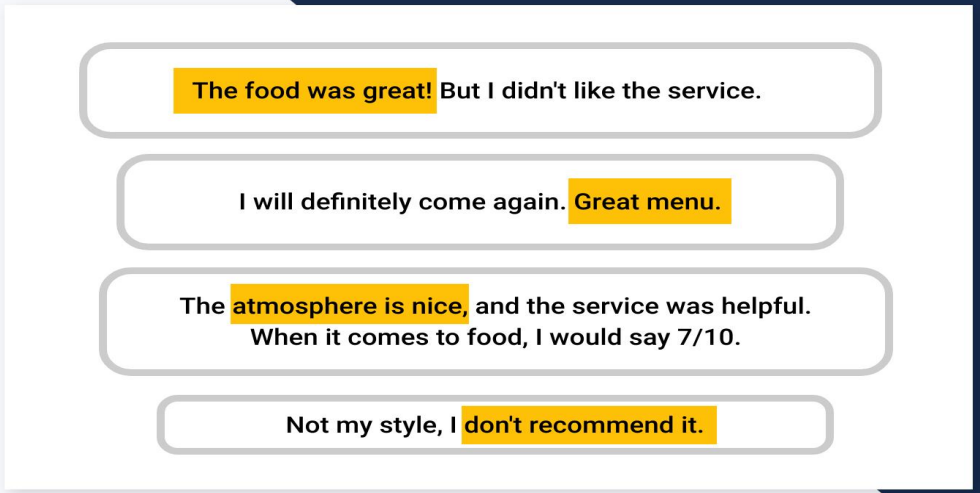


Sentiment Analysis in Python

Textblob vs Vader Sentiment vs Flair vs Building It From Scratch

SHAHUL ES

What is sentiment analysis?

Sentiment analysis is the task of determining the emotional value of a given expression in natural language.

It is essentially a multiclass text classification text where the given input text is classified into positive, neutral, or negative sentiment. The number of classes can vary according to the nature of the training dataset.

Application of sentiment analysis

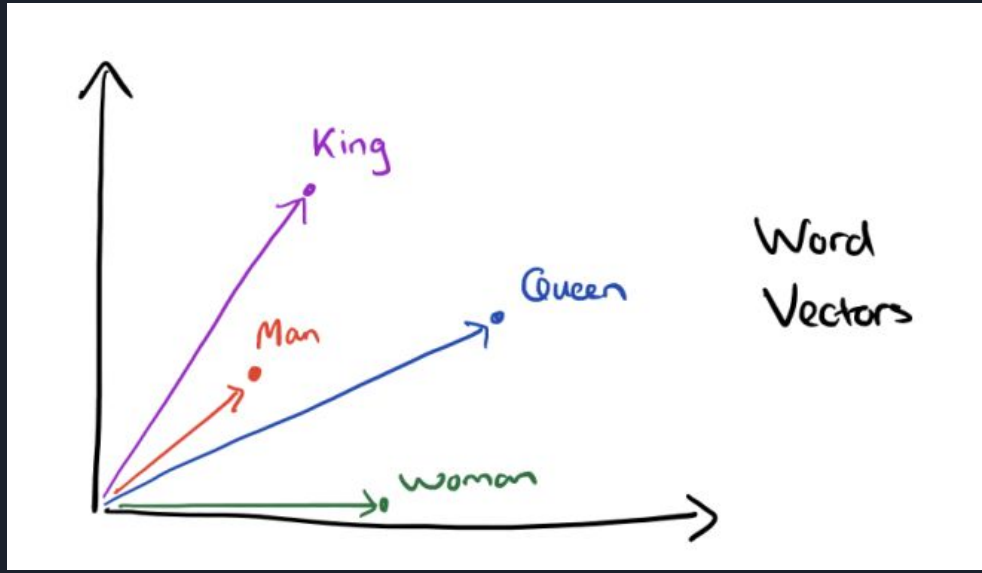
- Movie reviews: Analysing online movie reviews to get insights from the audience about the movie.
- News sentiment analysis: analyzing news sentiments for a particular organization to get insights.

1. Rule based sentiment analysis

- Textblob
- VADER

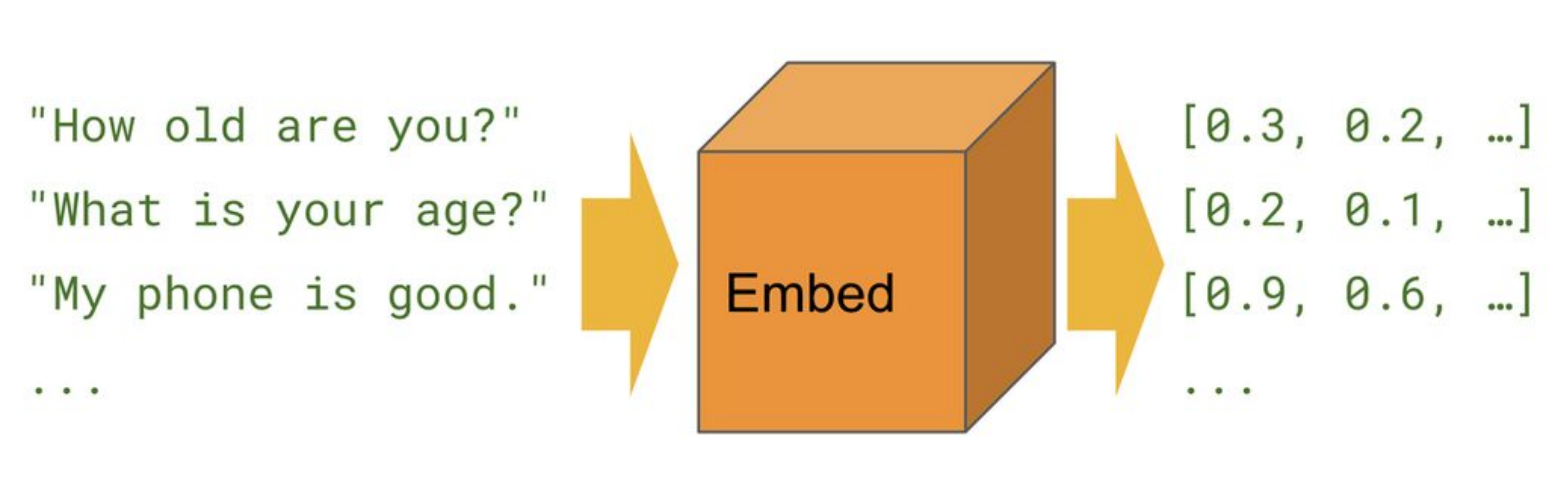
2. Embedding Based sentiment analysis

- Flair
- Custom Model



How to represent sentences?

Universal sentence encoder



Let’s get our hands dirty with some code !

- Download your kaggle API json
- Open the notebook

bit.ly/3iJajEZ

Mljar-supervised

https://github.com/mljar/mljar-supervised

No-code ML

👉 Binary Classification Example

There is a simple interface available with `fit` and `predict` methods.

```
import pandas as pd
from sklearn.model_selection import train_test_split
from supervised.automl import AutoML

df = pd.read_csv(
    "https://raw.githubusercontent.com/pplonski/datasets-for-start/master/adult/data.csv",
    skipinitialspace=True,
)
X_train, X_test, y_train, y_test = train_test_split(
    df[df.columns[:-1]], df["income"], test_size=0.25
)

automl = AutoML()
automl.fit(X_train, y_train)

predictions = automl.predict(X_test)
```

ASK ME ANYTHING!!