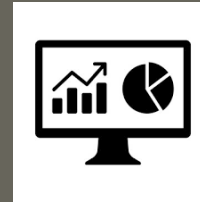


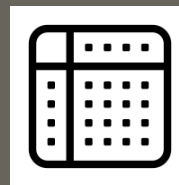
Cyclistic bike-share analysis



Introduction



Dashboard



Dataset



Analysis



Cyclistic bike-share

INTRODUCTION

This case study presents a data analysis project conducted as part of the Google Data Analytics Professional Certificate course, Capstone Project, focusing on Cyclistic, a bike-share company.

As a data analyst in the marketing analyst team, the objective is to develop a new marketing strategy to convert casual riders into annual members. The study follows the data analysis process, encompasses the steps of asking relevant questions, preparing the data, processing and analyzing it, sharing insights, and suggesting actionable recommendations.

This article specifically addresses the initial question of understanding the differences between annual members and casual riders. By leveraging data analytics techniques, the study aims to uncover key insights that can inform targeted marketing tactics and drive the conversion of casual riders into annual member.



Cyclistic bike-share DASHBOARD

5,7M

Number of ride

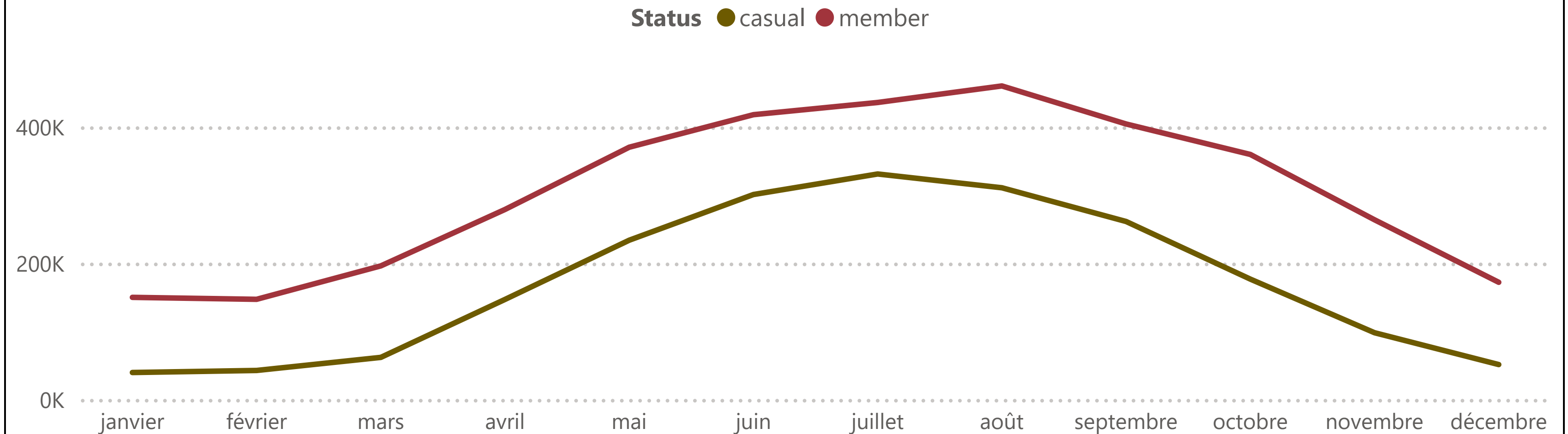
98,49K

Max minutes

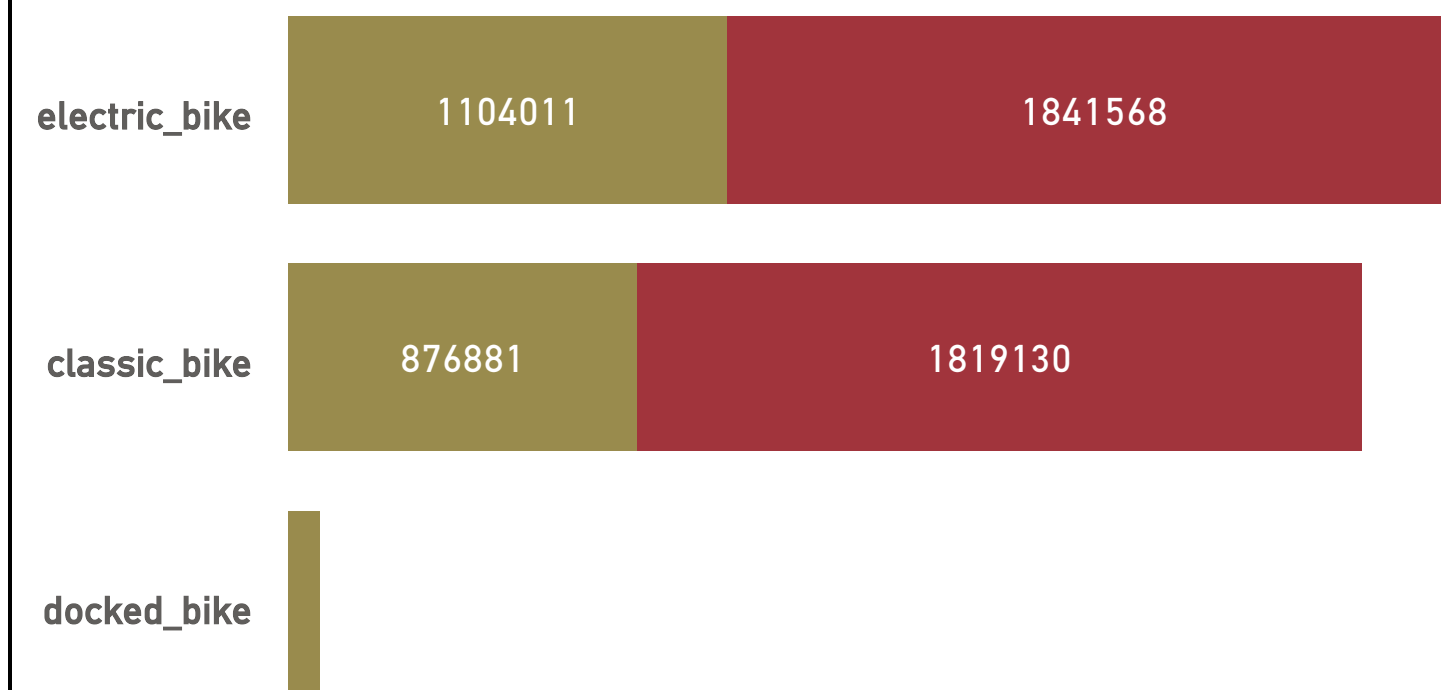
18,17

AVG ride_lenght

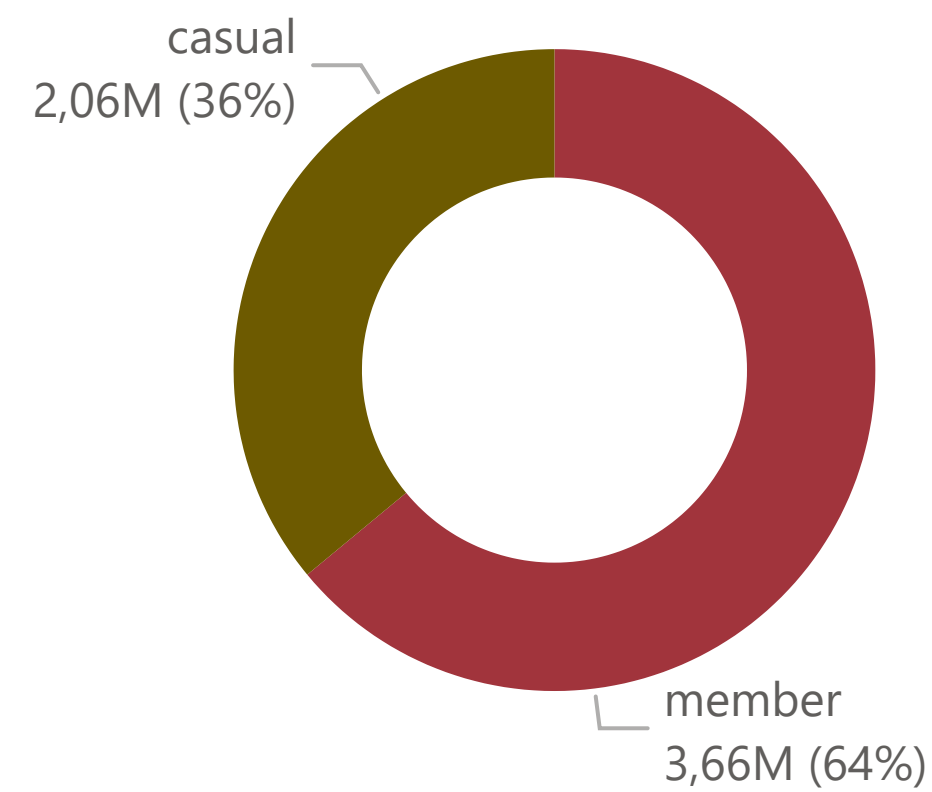
Bike Rides by Month



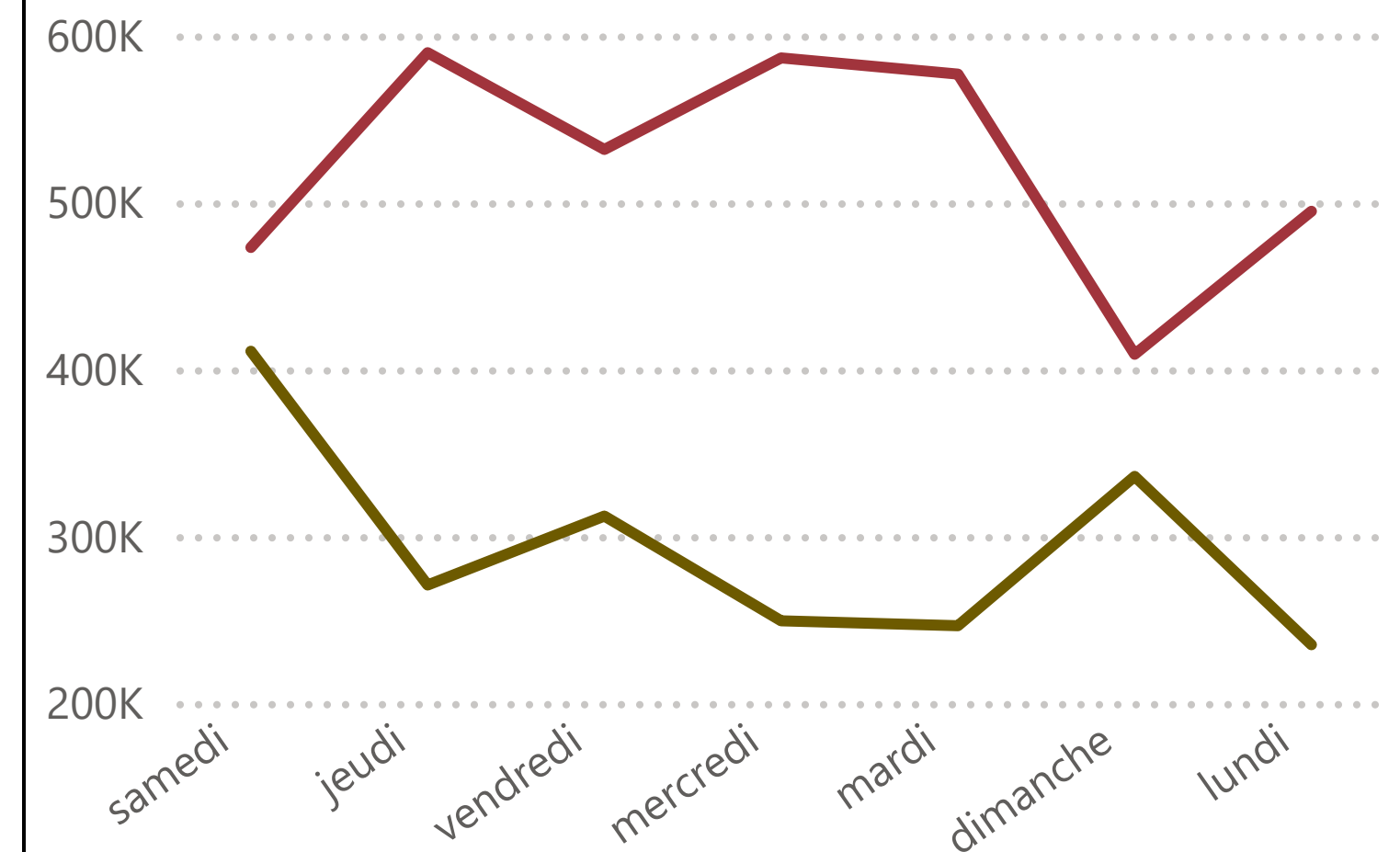
Rideable Type Distribution for Casual and Member Users



Distribution of Casual and Member Users



Bike Rides by Day





Cyclistic bike-share

DATASET

Status

Tout

Rideable type

Tout

Mois

Tout

| start_station_name | end_station_name | Count ride | Somme de Total minutes | Somme de ride_lenght | AVG ride_lenght | day_of_week |
|-----------------------------------|-----------------------------------|------------|------------------------|----------------------|-----------------|-------------|
| Streeter Dr & Grand Ave | Streeter Dr & Grand Ave | 2457,0 | 87 207,75 | 60,56 | 35,49 | samedi |
| Streeter Dr & Grand Ave | Streeter Dr & Grand Ave | 2036,0 | 78 083,75 | 54,22 | 38,35 | dimanche |
| DuSable Lake Shore Dr & Monroe St | DuSable Lake Shore Dr & Monroe St | 1937,0 | 59 022,93 | 40,99 | 30,47 | samedi |
| DuSable Lake Shore Dr & Monroe St | DuSable Lake Shore Dr & Monroe St | 1549,0 | 54 666,45 | 37,96 | 35,29 | dimanche |
| Streeter Dr & Grand Ave | Streeter Dr & Grand Ave | 1399,0 | 45 765,45 | 31,78 | 32,71 | vendredi |
| DuSable Lake Shore Dr & Monroe St | Streeter Dr & Grand Ave | 1345,0 | 34 494,50 | 23,95 | 25,65 | samedi |
| Michigan Ave & Oak St | Michigan Ave & Oak St | 1180,0 | 50 896,50 | 35,34 | 43,13 | samedi |
| Streeter Dr & Grand Ave | Streeter Dr & Grand Ave | 1177,0 | 43 295,73 | 30,07 | 36,78 | lundi |
| Streeter Dr & Grand Ave | Streeter Dr & Grand Ave | 1082,0 | 41 574,27 | 28,87 | 38,42 | jeudi |
| Ellis Ave & 60th St | Ellis Ave & 55th St | 1079,0 | 5 706,05 | 3,96 | 5,29 | jeudi |
| Ellis Ave & 60th St | Ellis Ave & 55th St | 1075,0 | 7 089,57 | 4,92 | 6,59 | mardi |
| Ellis Ave & 60th St | University Ave & 57th St | 1066,0 | 5 871,62 | 4,08 | 5,51 | mercredi |
| Michigan Ave & Oak St | Michigan Ave & Oak St | 1050,0 | 47 756,35 | 33,16 | 45,48 | dimanche |
| Ellis Ave & 60th St | University Ave & 57th St | 1047,0 | 5 909,30 | 4,10 | 5,64 | mardi |
| Ellis Ave & 60th St | Ellis Ave & 55th St | 1038,0 | 5 419,95 | 3,76 | 5,22 | mercredi |
| University Ave & 57th St | Ellis Ave & 60th St | 1020,0 | 4 440,90 | 3,08 | 4,35 | mercredi |
| Ellis Ave & 60th St | University Ave & 57th St | 1010,0 | 4 130,27 | 2,87 | 4,09 | lundi |
| Streeter Dr & Grand Ave | Streeter Dr & Grand Ave | 1007,0 | 36 428,05 | 25,30 | 36,17 | mardi |
| State St & 33rd St | Calumet Ave & 33rd St | 1005,0 | 4 576,20 | 3,18 | 4,55 | jeudi |
| Ellis Ave & 55th St | Ellis Ave & 60th St | 997,0 | 5 921,58 | 4,11 | 5,94 | lundi |
| Ellis Ave & 60th St | University Ave & 57th St | 997,0 | 4 876,67 | 3,39 | 4,89 | jeudi |



Cyclistic bike-share ANALYSIS

Key Performance Indicators (KPIs)

These indicators show a high volume of use of the service, with relatively short average journey times. This suggests that bicycles are mainly used for fast journeys, probably in urban areas. The high overall usage could indicate a good uptake of the service by the population.

Monthly Trends

Bicycle use peaks in the summer and falls in the winter. The warmer months are clearly favourable for usage, which is typical for bike-share services, which are often influenced by weather conditions..

Distribution of Users

A greater proportion of journeys are made by members.

Bike type distribution

Electric bikes are the most popular, followed by classic bikes. The fact that electric bikes are the most widely used means of transport clearly indicates that users prefer more comfortable and more efficient means of transport.

Recommendations :

- **Seasonal optimisation** : Increase maintenance capacity and availability of bikes during the summer, and develop special offers to maintain interest in winter.
- **Subscription Promotion** : Target occasional users with subscription offers to convert them into regular members.
- **Marketing strategies** : Adapt communication strategies to target specific days, such as weekends or holiday periods, based on usage trends.