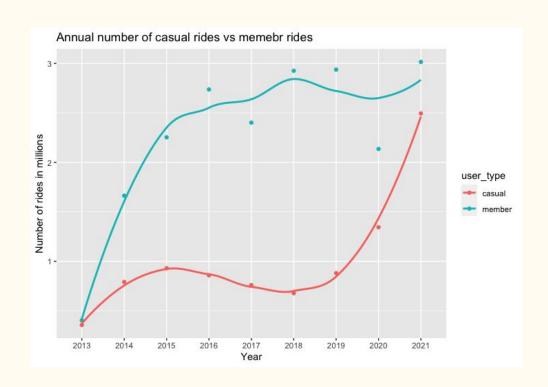
City Wheels

Sabrina Valcin February 2022

Problem

The number of rides by casual users is increasing faster than the number of rides by members.



Solution

Identify key differences between members and casual users in order to increase the share of members.

Methodology

We analyzed trip data from 2013-2021 comparing casual users to members across the following variables:

- Duration
- Seasonality
- Location

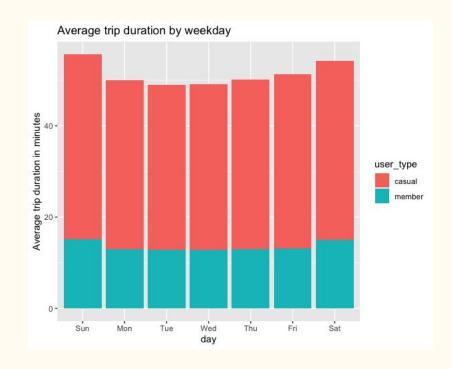
Variables

- Duration
- Seasonality
- Location

Duration

On average, the duration of trips by casual riders, 38 minutes, is about triple that of members, 13 minutes.

In general, the average trip duration for members and casual users is consistent throughout the week.

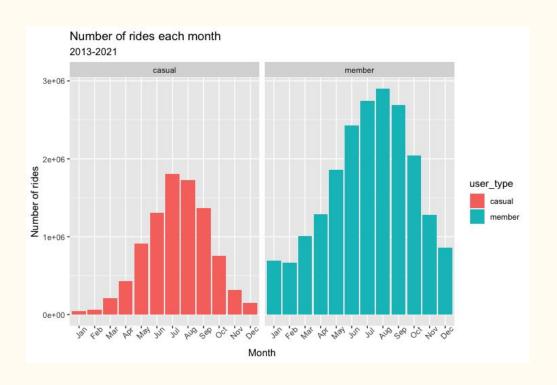


Variables

- Duration
- Seasonality
- Location

Seasonality: Monthly

Overall both casual riders and members take more trips in the warmer months.

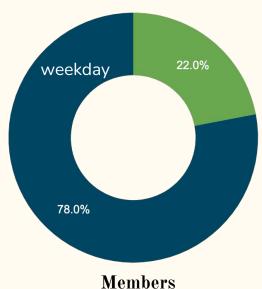


Seasonality: Daily

If all days were equal, we'd expect weekend rides to make up 29% of trips and weekday rides to account for 71% of trips.

Casual users are **2X** more likely to take trips on the weekend than members.

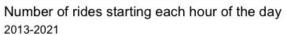


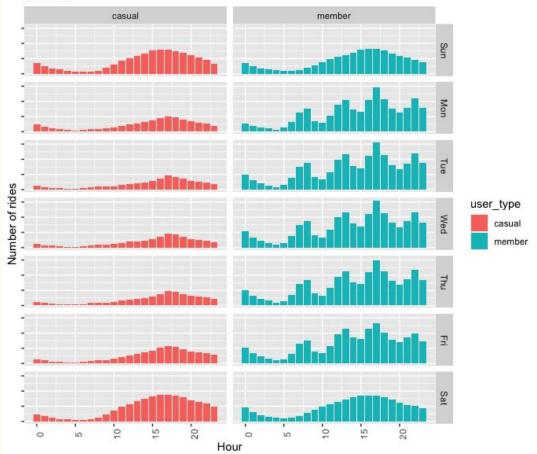


Seasonality: Hourly

Trips taken by casual users usually start late morning through the evening with peak ridership in the afternoon.

Trips for members are spread throughout the day with multiple peak times on weekdays. However, on weekends, ridership from members resembles that of casual riders.





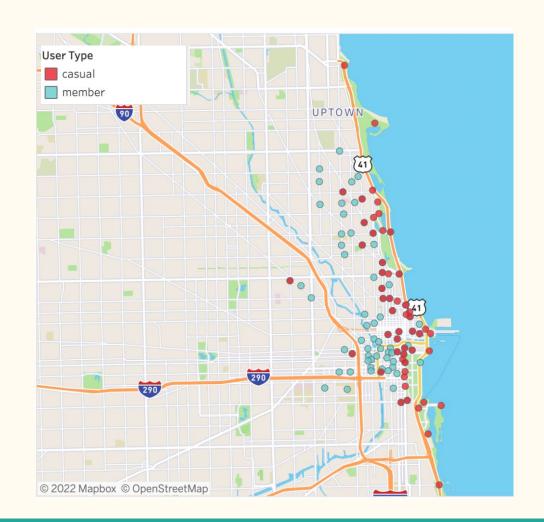
Variables

- Duration
- Seasonality
- Location

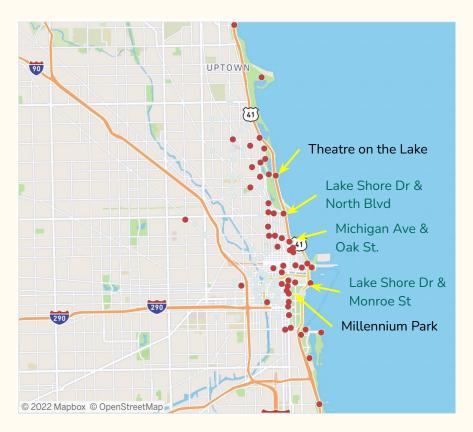
Location

The majority of trips by casual users start at about 9% of the total stations.

The majority of trips by members start at 14% of the total stations



Location: Casual users

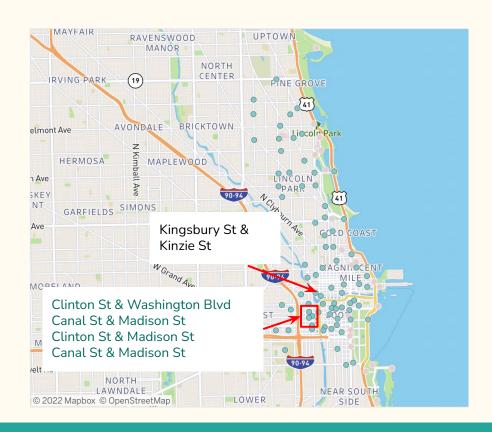


The most popular stations by casual users are those that abut Lake Michigan and are near parks and other attractions.

Top 5 stations:

- 1. Lake Shore Dr & Monroe St
- 2. Millenium Park
- 3. Michigan Ave and Oak St
- 4. Theatre on the Lake
- 5. Lake Shore Dr & North Blvd

Location: Members



The most popular starting stations for trips by members are near Transportation hubs(Chicago Union Station, Ogilvie Transportation Center, Merchandise Mart).

Top 5 stations:

- 1. Clinton St & Washington Blvd
- 2. Canal St & Adams St
- 3. Clinton St & Madison St
- 4. Canal St & Madison St
- 5. Kingsbury St & Kinzie St

Summary: Key Insights

- The average duration of trips by casual riders, 38 minutes, is about triple that of members, 13 minutes.
- Casual users are 2X more likely to take trips on the weekend than members.
- Trips for members are spread throughout the day with multiple peak times on weekdays.
- Trips for casual users peak around the afternoon.
- The most popular stations for casual users abut Lake Michigan and parks.
- The most popular stations for members are near transportation hubs.

Our findings suggest that casual riders use CityWheels for recreational purposes while members use CityWheels as a viable transportation alternative for everyday tasks like commuting to work.

Recommendations

- Offer choices: replace single membership plan with tiered choices, for example:
 - All access: premium plan for regular commuters with unlimited access to all stations, and other benefits
 - Recreation: lower cost plan with limited access to stations
- Offer an incentive to sign up such as discounts to local attractions
- Create a campaign highlighting how bike sharing is a permanent viable transportation alternative for everyday tasks

Further Study

- Continue to gather data for users' preference for rideable type (classic, electrical, docked)
- We need to assign IDs to members and casual users and relate them to trips.

 Although we know there are more trips by members, we do not know the number of distinct members or casual users
 - Gathering this data will allow us to identify repeat casual users and tailor marketing strategies
- Survey users to gather more demographic data
 - Are casual riders primarily tourists or residents?
- Survey users to ask for the purpose of their trip