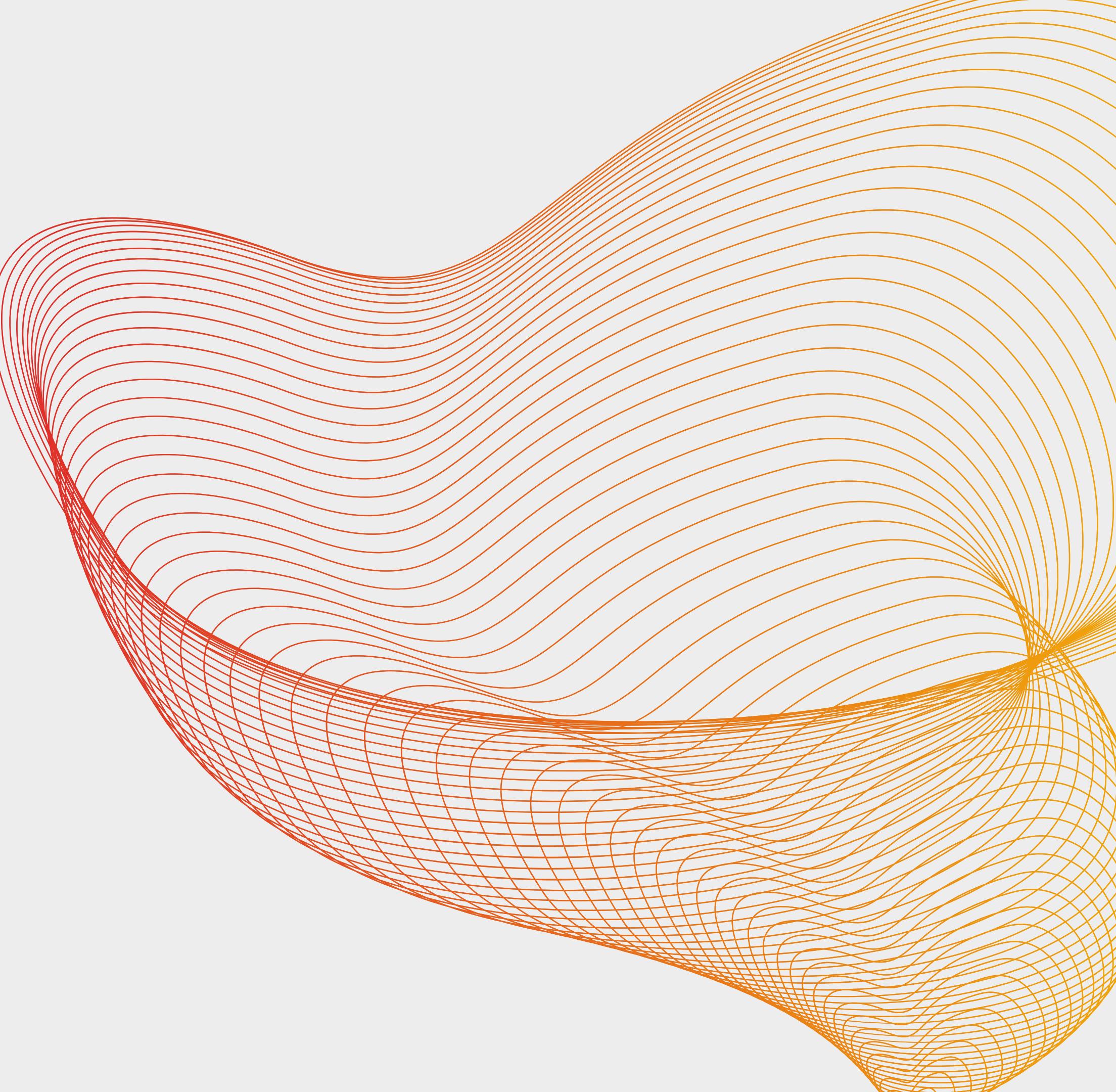


# Furious Car Enterprise

Dhrumil  
Soham  
Anuj  
Jagdish



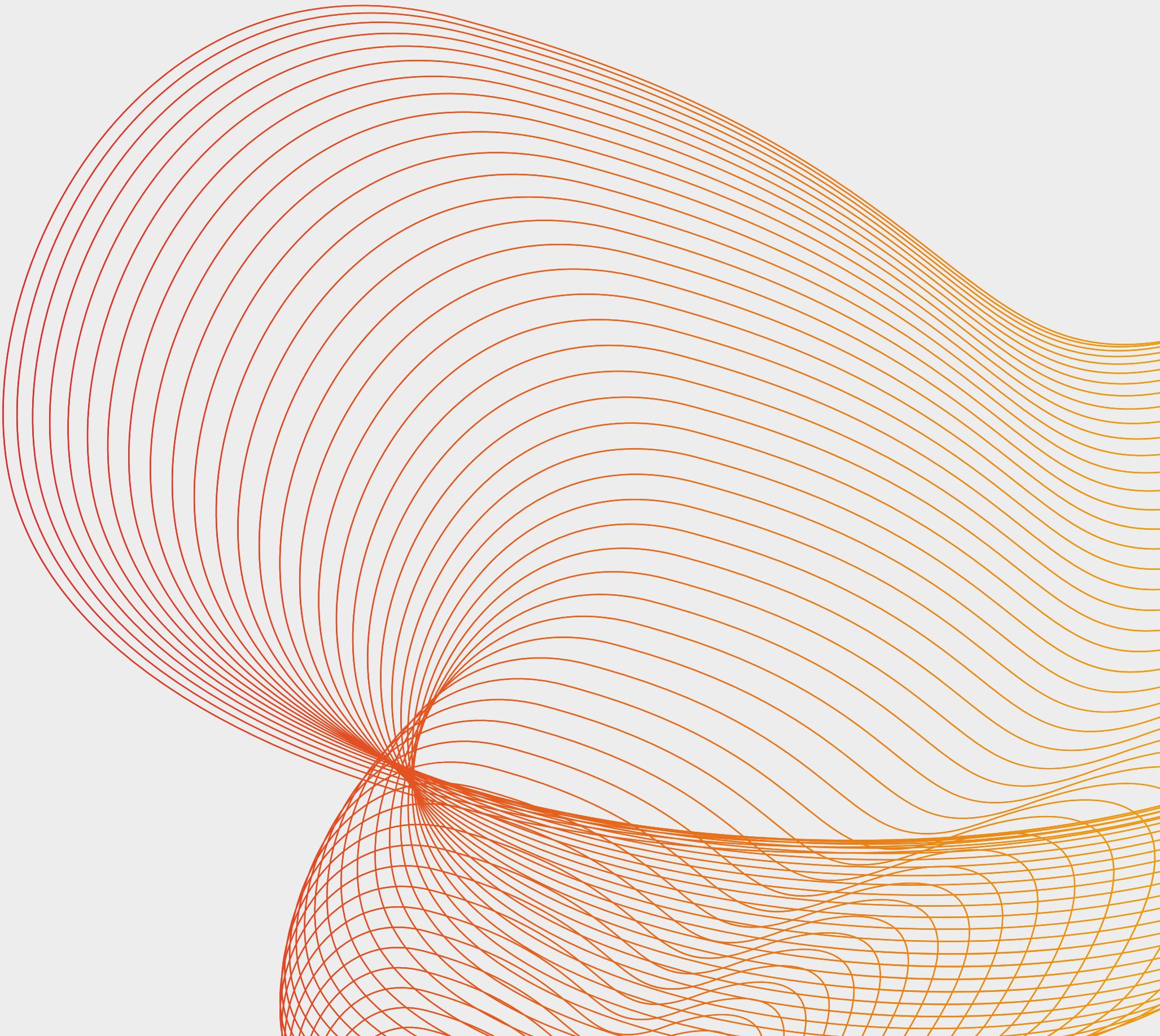


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# Business

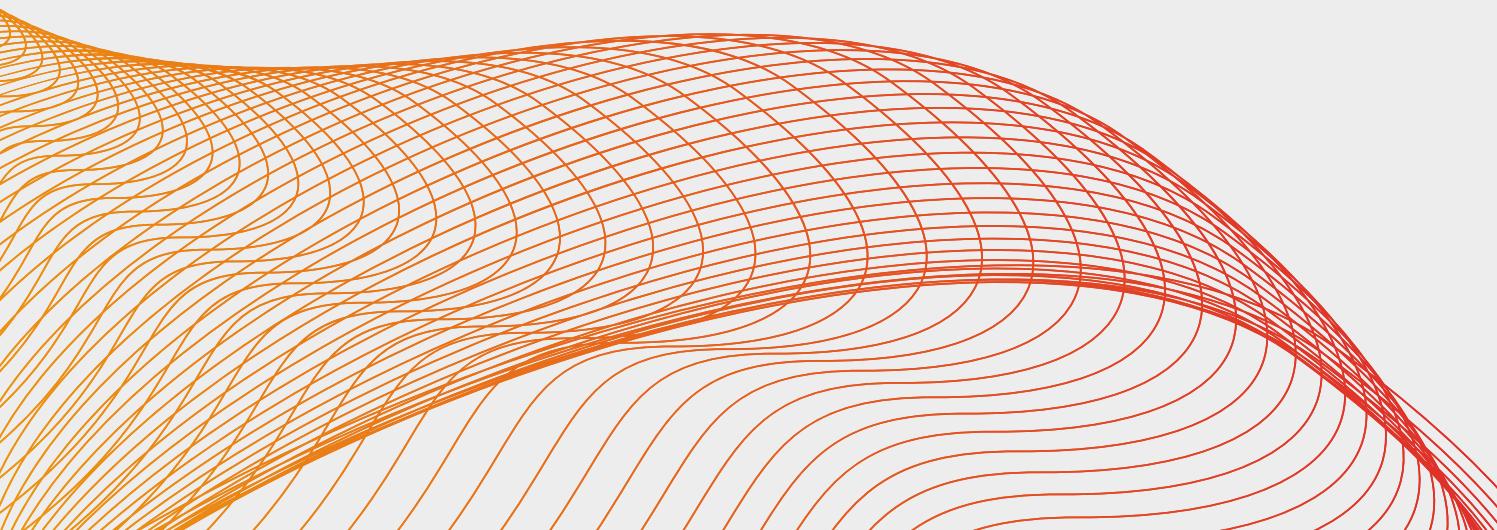
As working for the company named Furious Car Enterprise, our goal is to provide the best service and the best price possible not only this our main moto is customer satisfaction by providing the best cars in a time efficiente manner.



# Business Problem

There are basically 3 main factors which affected the business in the last quarter i.e. :

- As the business is investing at a very large scale, it is important to invest in the right car and sell at the right time to maintain the cash flow.
- As storage is the main factor in this business. It is very critical to understand which cars are in demand.
- Last but not least since the waiting period is too long affecting customer service, it will be very helpful to analyze the demand to reduce the wait time

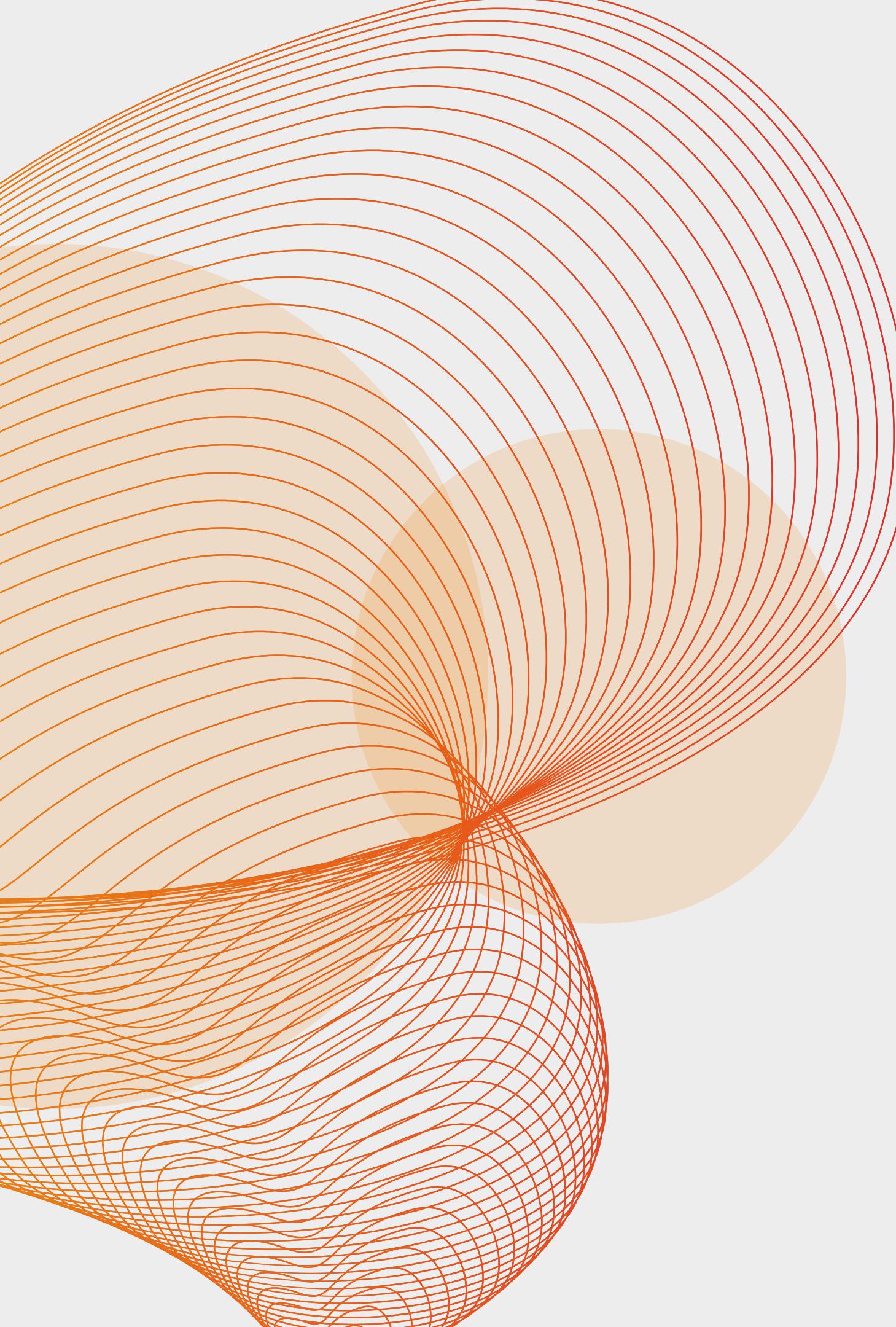




# Analytics Questions

- Most demanding cars in the market?
- Invest in New /Used cars?
- Analyzing the demand based on the fuel type?
- Brands that are more saleable in the last couple of years?





# Data Source

Here we have considered 2 dataset

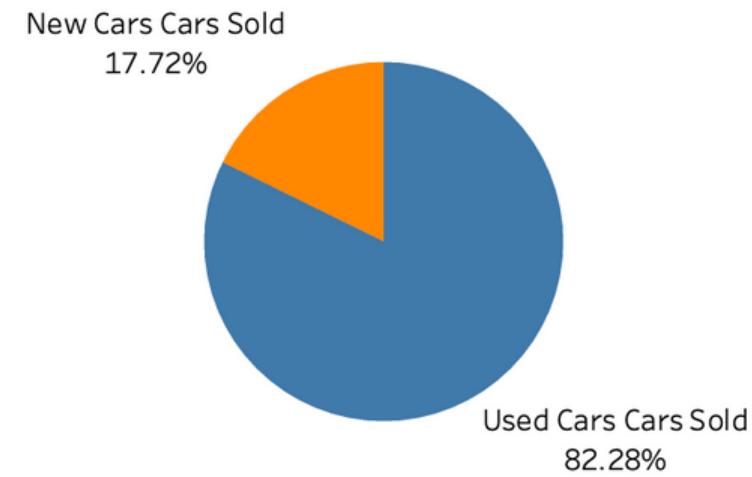
- New York Car Sales: This dataset consists of car sales in new york, having entries of 0.17 M and 24 fields
- Car Rating: Consisting of fields such as Performance, Reliability, Value of money, and many more which depict the overall rating of cars.

# Data Manipulation

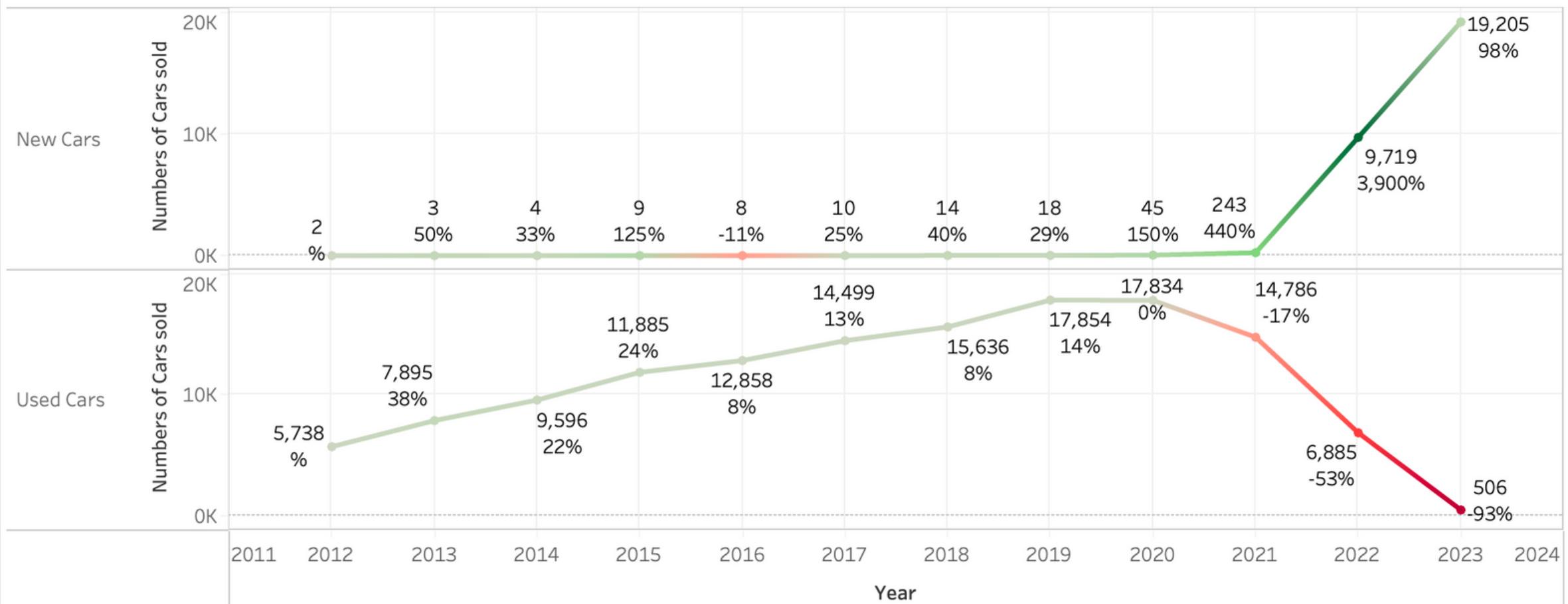
Here we performed some operations to make our data more processable :

- Merging the dataset(based on the ModelName)
- Impute missing values for the categorical variable(Yes/No)
- Splitting columns.(Year + BrandName + Model)

Percentage of new and used cars sold till now



Yearwise number of new cars and used cars sold



In the last 15 year, Used car has had more sales, but since after covid the sales of New cars has raised exponentially

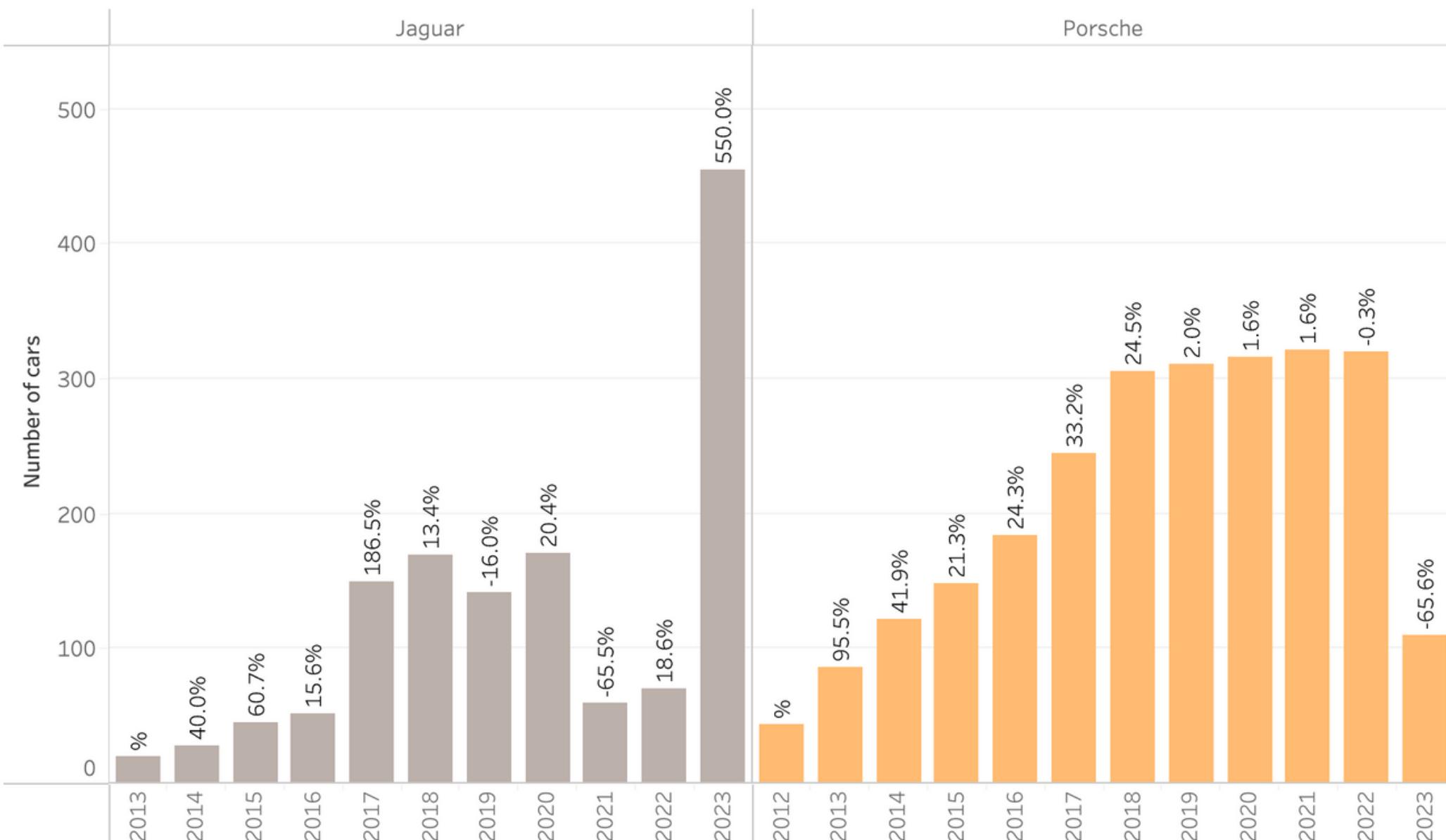
### Brandwise Top 6 new cars sold brandname

Brand	New Cars
Jaguar	65.30%
Lincoln	58.62%
Infiniti	56.87%
Buick	55.53%
Mitsubishi	52.92%
Ford	50.76%

### Brandwise Top 6 used car brandname

Brand	Used Cars	Brand
Porsche	97.39%	(Multiple values) ▾
Hyundai	74.65%	
Kia	74.30%	
Audi	72.14%	
Bmw	70.33%	
Toyota	68.81%	

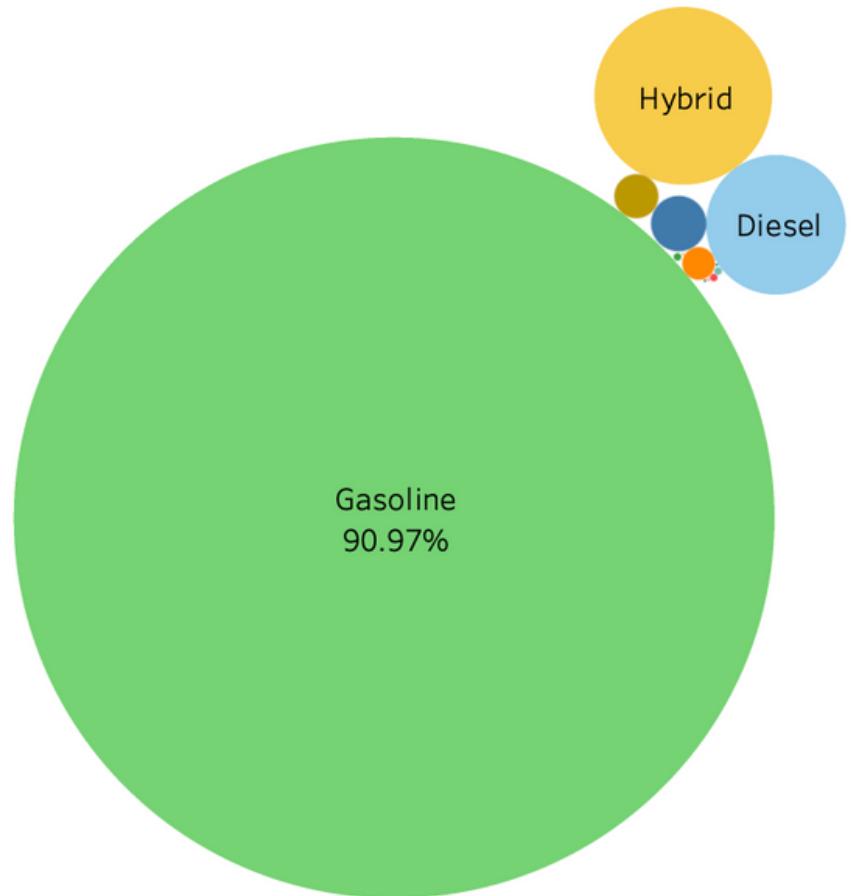
### Brandwise sale every year and sale comparision



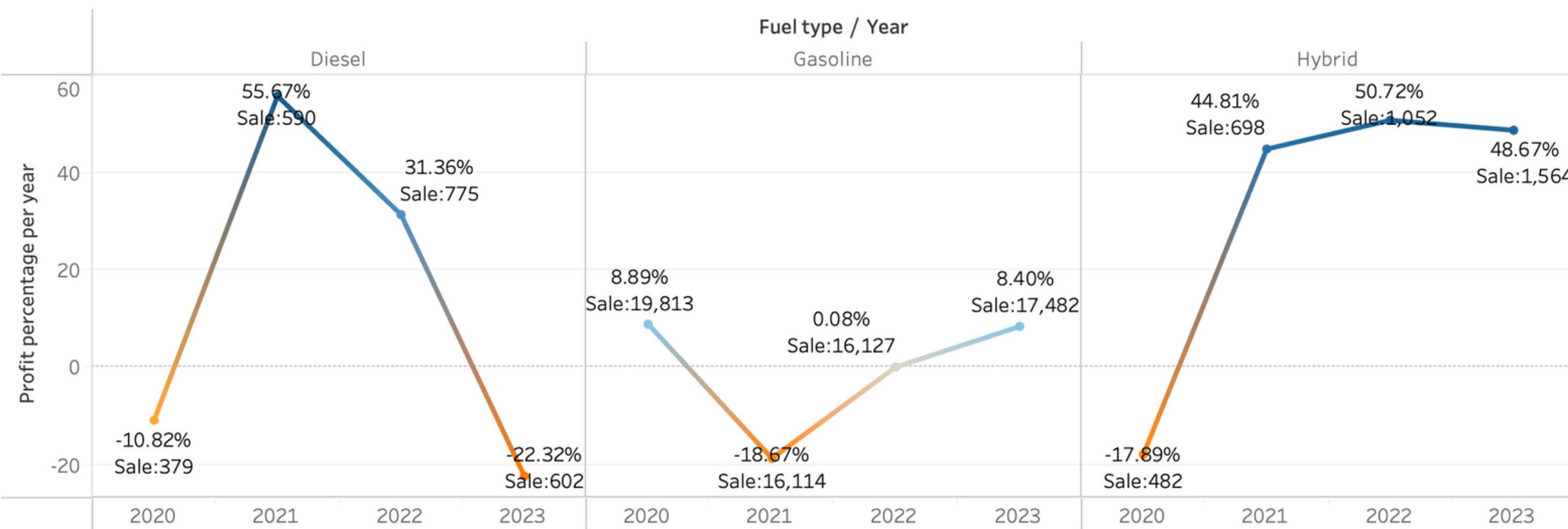
Showing the top 6 New and used cars wtr to the brand

Using the drop-down menu we can compare sales of various brands

Fuel type car sold comparision for last 4 years



Sale comparision between diesel, gasoline and hybrid fuel type

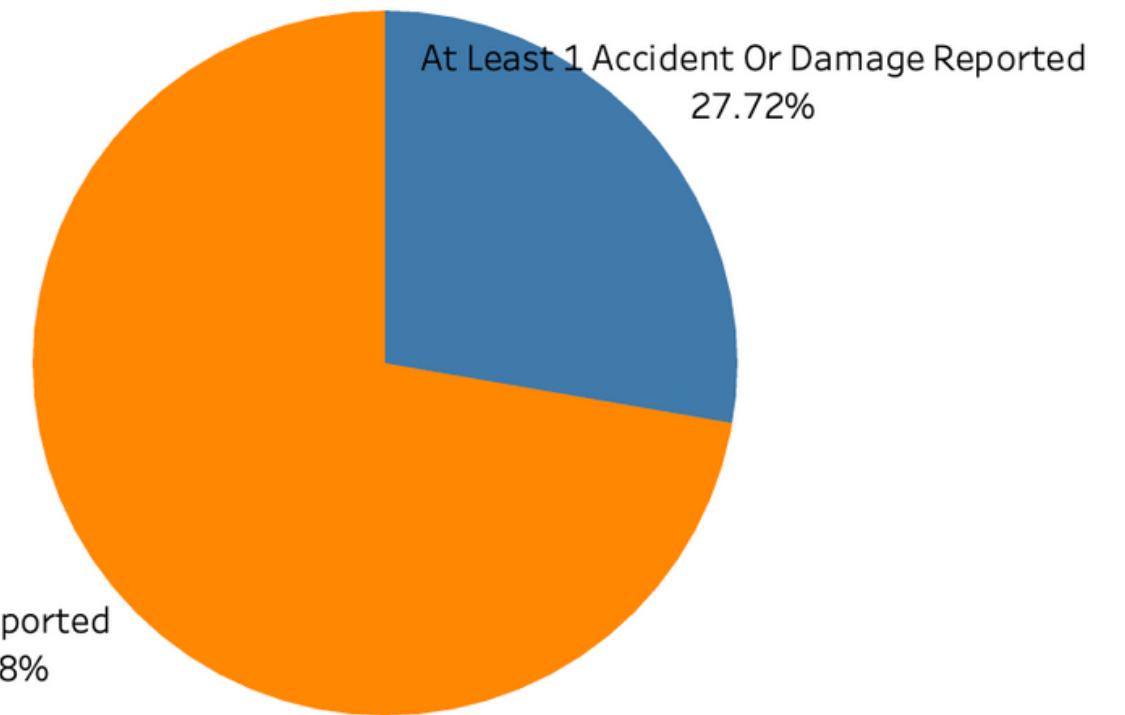


it can be seen that there are 3 main fuel types when it comes to sales

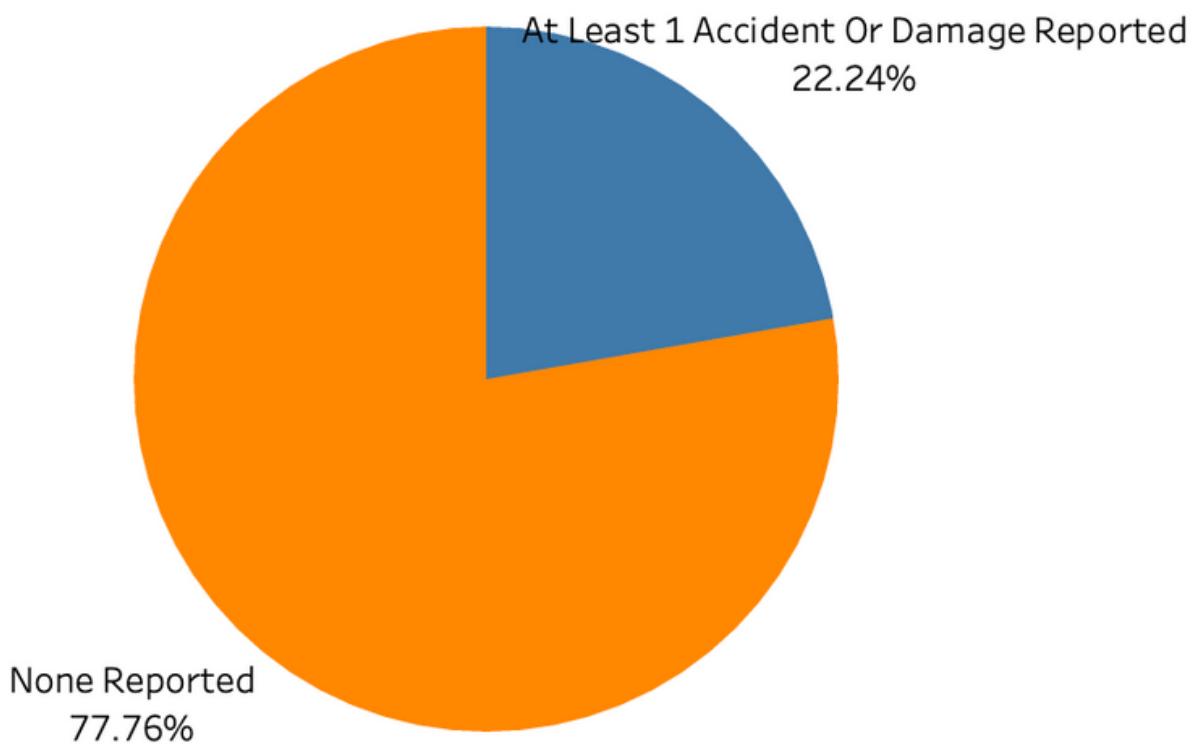
- Gasoline
- Hybrid
- Diesel

Here we can see that the hybrid fuel type has increase in sales in the past couple of years as compared to other fuel types

Number of Accident or damaged car sold in used cars section



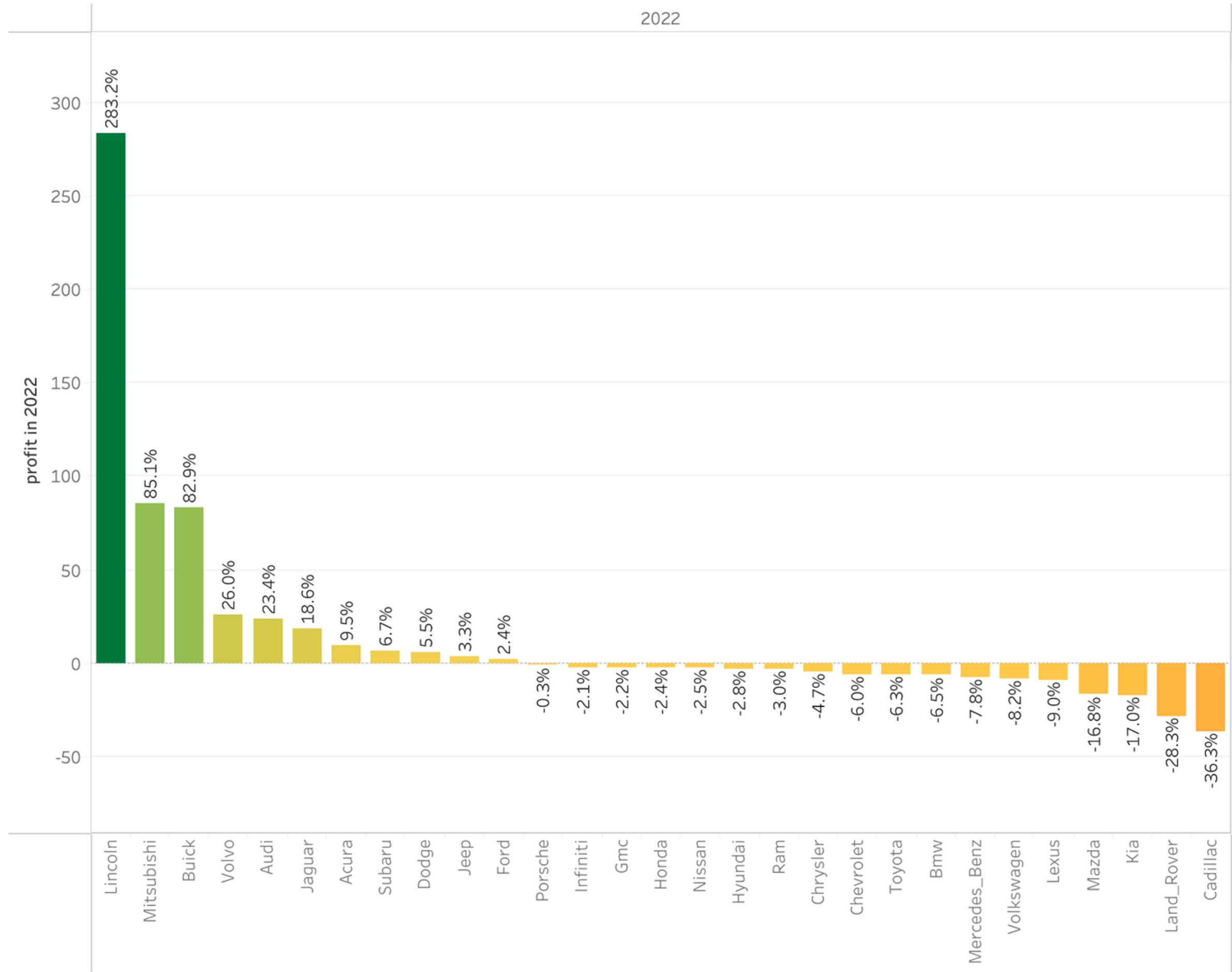
Accidental or damaged car contributions in money for used cars



In the used car category out of 4 cars 1 car is accidental

But the overall return is less when the car is accidental

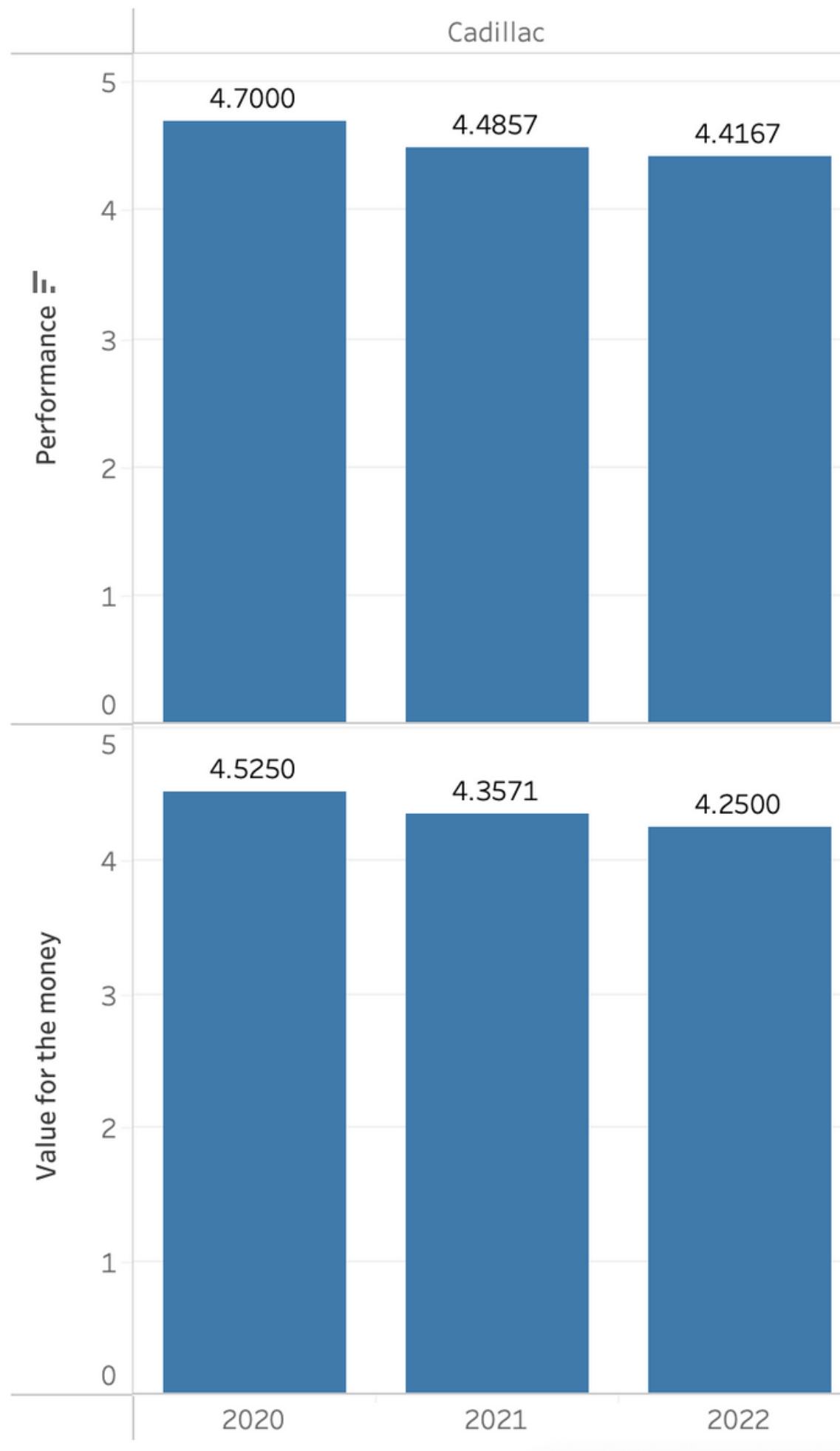
Profit in 2022 for each brand, compared with 2021



Comparison of the brand based on profit wrt the previous year. It is clear that Lincoln Brand has shown very exponential growth from the year before. Whereas Cadillac shows a huge loss.

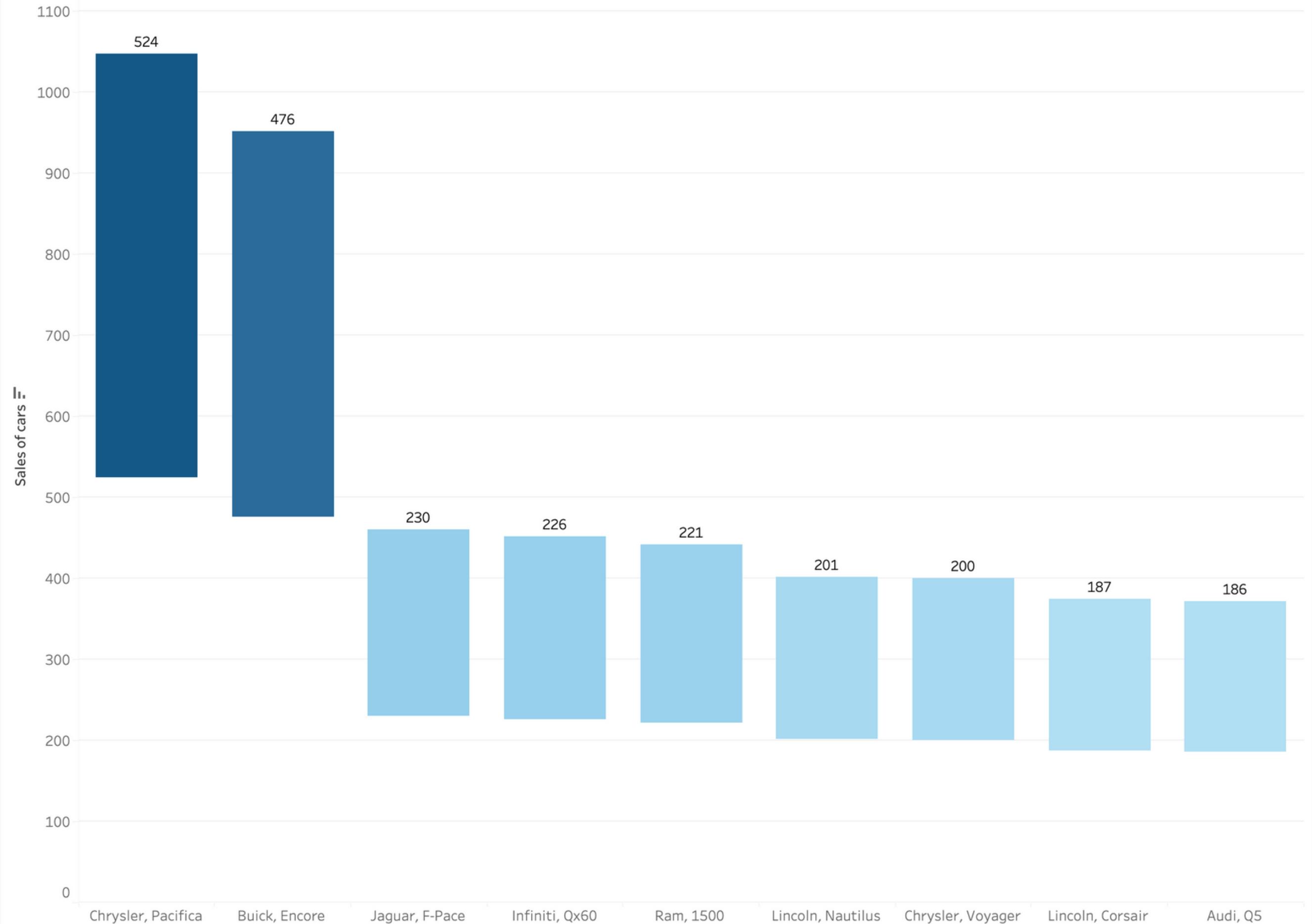
Let's look into this in the next slide.

## Root Cause Analysis For Cadillac



As per the expert rating and review it is clear that the performance and the value for money is reducing over the years, resulting into the low quality of performance which eventually affect the sale of this specific Brand.

## Top 10 most selling cars from 2020-2023



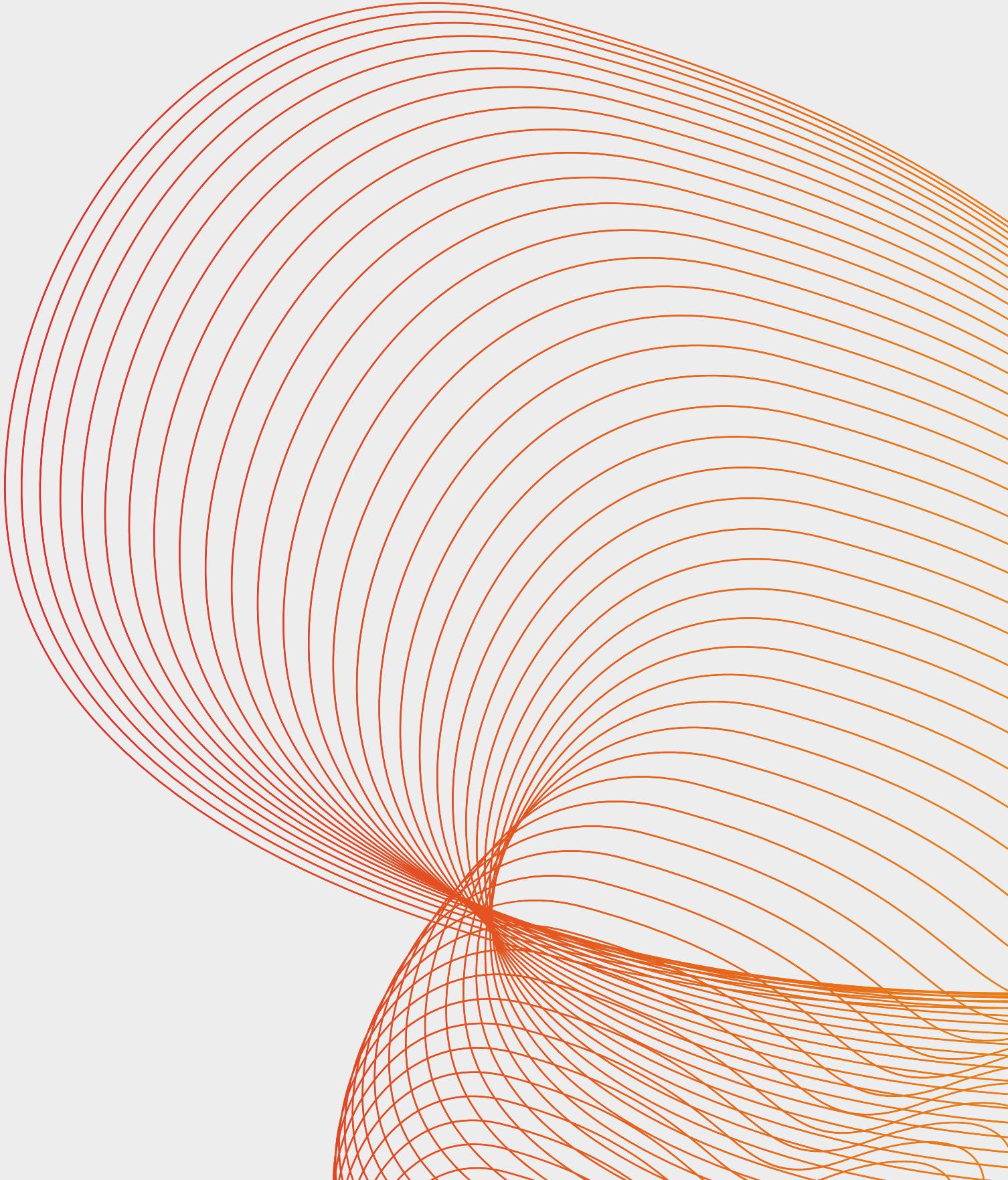
Now our main focus is to see which car that have the most sales since 2020.

Pacifica and Encore have shown some great demands.

# Potential Solution Optimization

The business should focus on the following findings

- Focus more on New car Rather than Used car
- Increase investment in more hybrid cars rather than Gasoline or Diesel
- Brands Such as Lincoln, Mitsubishi, and Buick as more profitable in the upcoming years
- Also, order the Model which is in top demand.





# Thank You