House Sales in King County, USA

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Project Description

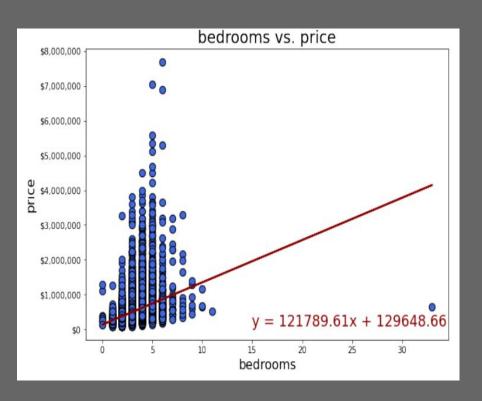
The House Sales in King County, USA dataset from Kaggle contains house sale prices for King County, which includes Seattle from May 2014 to May 2015.

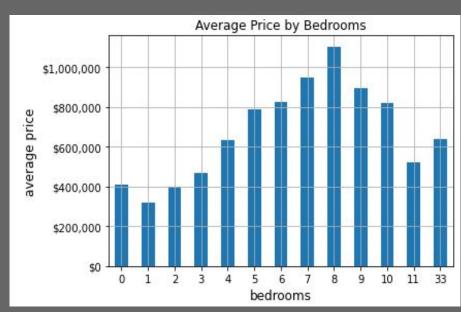
Research Question: Do house features have an effect on the price of house sales?

<u>Hypothesis</u>: House features do have an effect on the price of house sales.



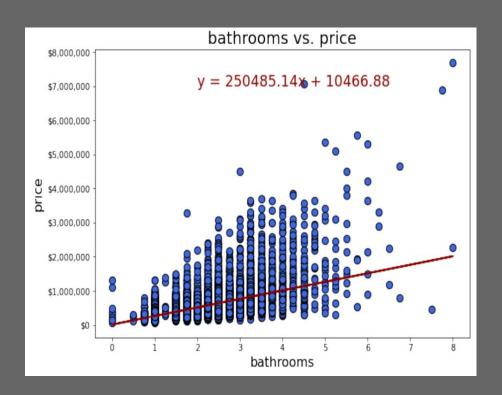
Is the price higher when there are more bedrooms?

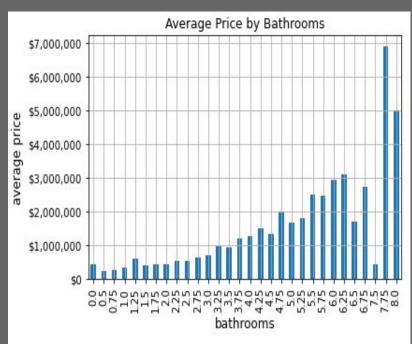




The r-squared is: 0.3083383686880964

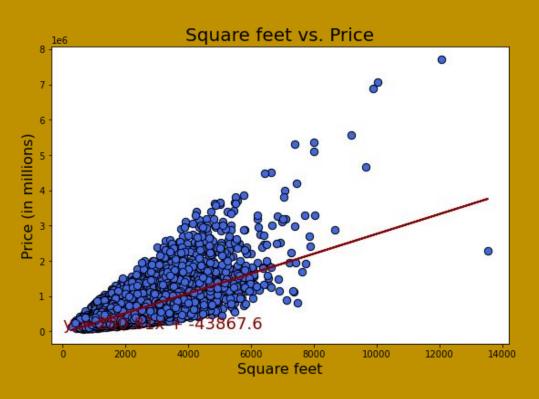
Is the price higher when there are more bathrooms?



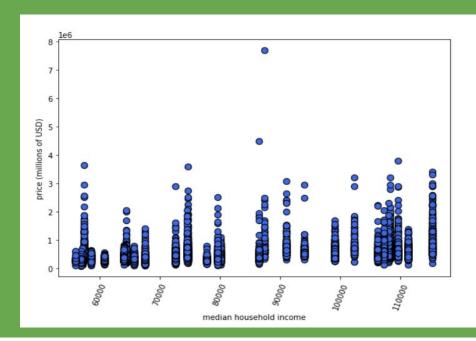


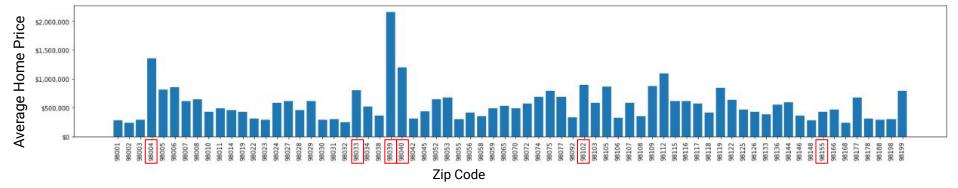
The r-squared is: 0.5251340727456009

What's the correlation between square feet and pricing?

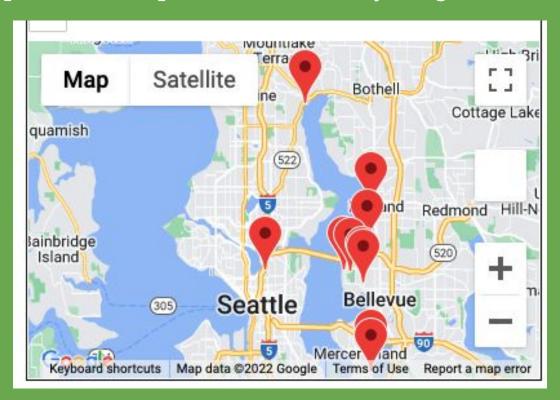


Are house sale prices higher in higher income neighborhoods?





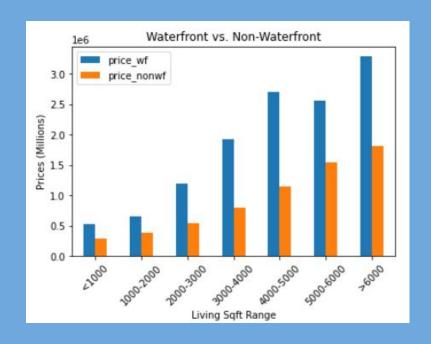
Map of top 10 most expensive houses by neighborhood zipcode

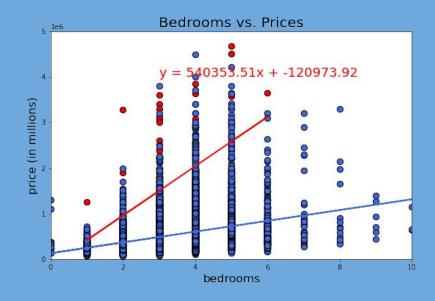


Waterfront View

Do houses with a waterfront view or without a waterfront view have more price outliers?

Within the same living square footage range, price is higher for houses having waterfront view than non-waterfront view





Boxplot (waterfront/non-waterfront & price)

The boxplot shows:

Median, upper quartile,

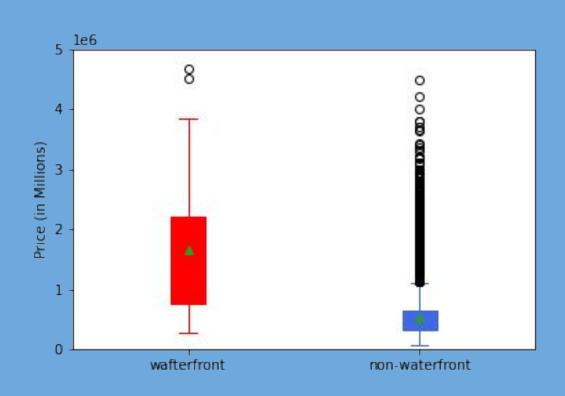
lower quartile,

upper extreme and

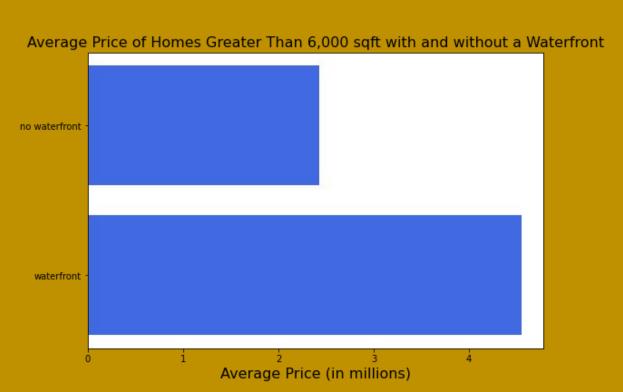
lower extreme for both

Waterfront &

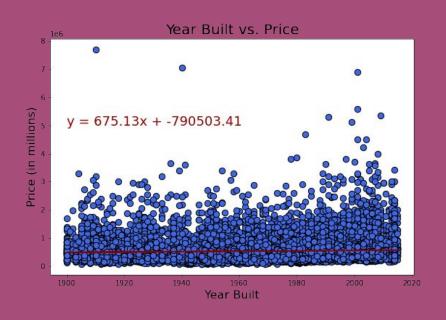
non-waterfront

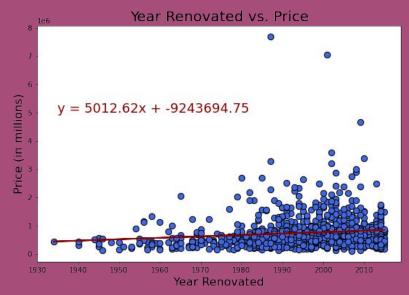


Do homes larger than 6,000 sqft with a waterfront view cost more or less than those without a waterfront view?



Do newly built homes cost more than older built homes and where/which zipcodes are the majority of the newly built homes located at?





Map of 6 homes built in 2015

Neighborhoods with newest houses:

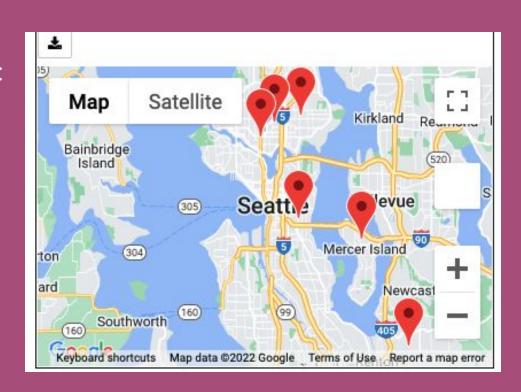
98103 Greenlake

98115 Ravenna/Maple Leaf

98144 Atlantic/Mt. Baker

98040 Mercer Island

98056 Renton



Conclusion

- Certain house features have a greater effect on price than others
- House prices depend on multiple house features, not only just one
- Limitation:
 - o dataset is only within a 1 year time frame, not most current/ up- to date data
- Lack of inclusivity for folks with disabilities only column in this data set that may indicate some level of accessible housing is number of floors (how many homes are ranch/one level)
- Outlier: Home with 33 bedrooms



Questions?



