



Evaluating House Prices

In Ames, Iowa

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A decorative graphic on the left side of the slide consisting of two overlapping squares. The top square is a lighter blue and the bottom square is a darker blue.

Introduction

How to have a great investment
in Iowa houses?

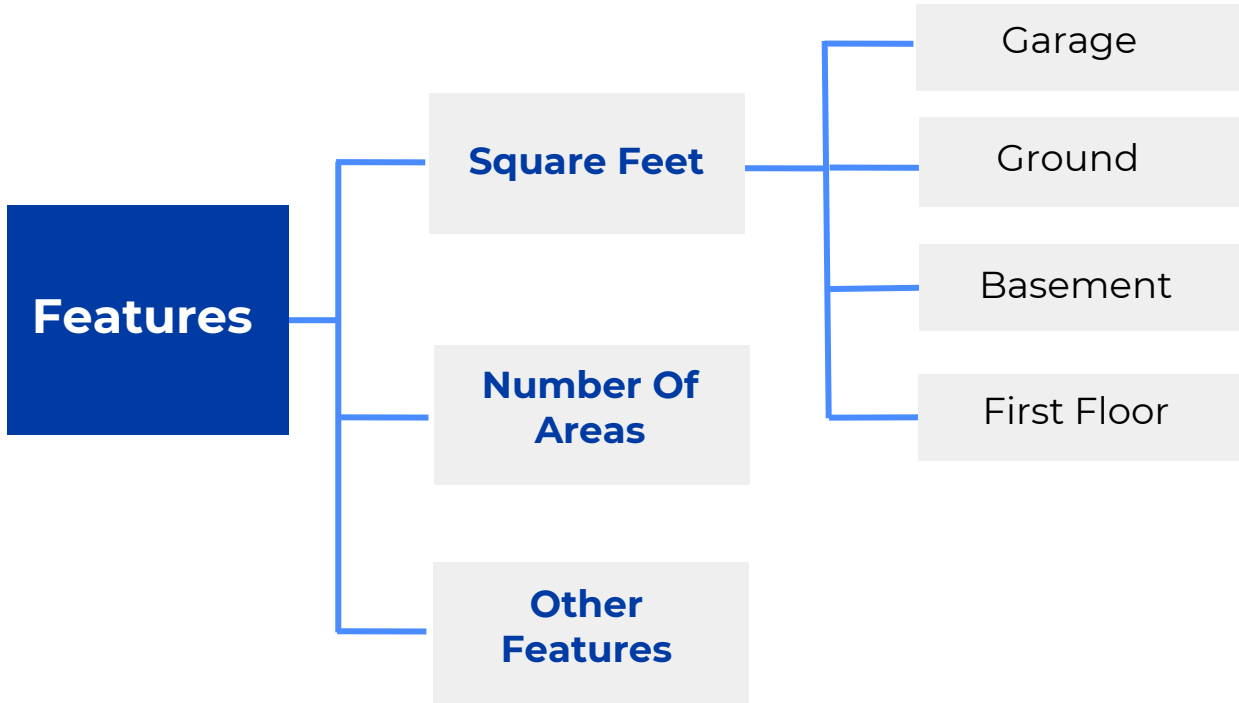
- House specification analysis description
- The impact of the area of different sections on house price
- The impact of the number of different sections on house price
- The impact of other house features on the price
- Conclusions and recommendations

Analysis Description



- Including 2000 raw data with 80 columns
- Clean data and find the most useful columns
- Determine the final dataset
- Relationship between features and price
- Most valuable features
- Define a model
- Evaluate a model
- Top influencing features on house price
- Summarize and interpret results
- Visualizations

Features with a high correlation with price



Square feet relationship

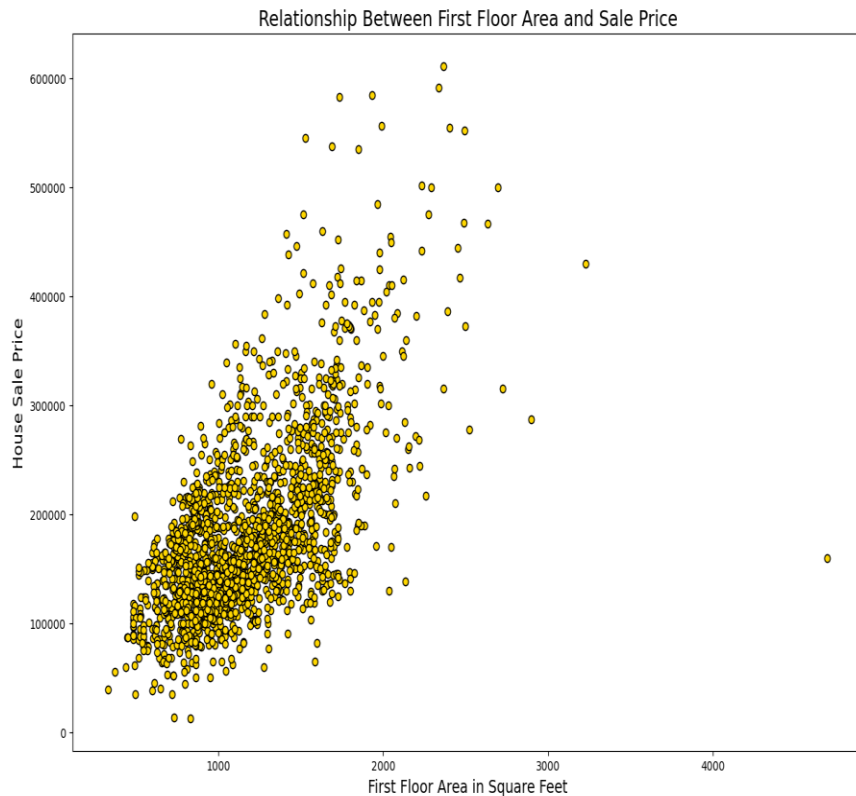
It's Obvious there is a positive relationship between Square feet and price, however, according to my analysis, the rate of correlation on each floor is completely different.



Square feet relationship

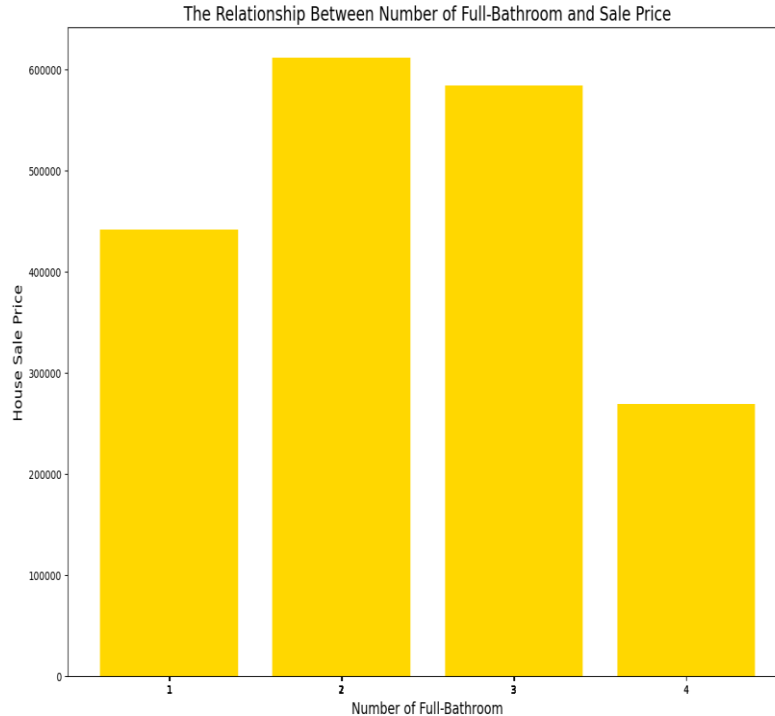
Levels of impact on
respective order:

- Ground floor
- Garage
- Basement
- First Floor
- Second Floor



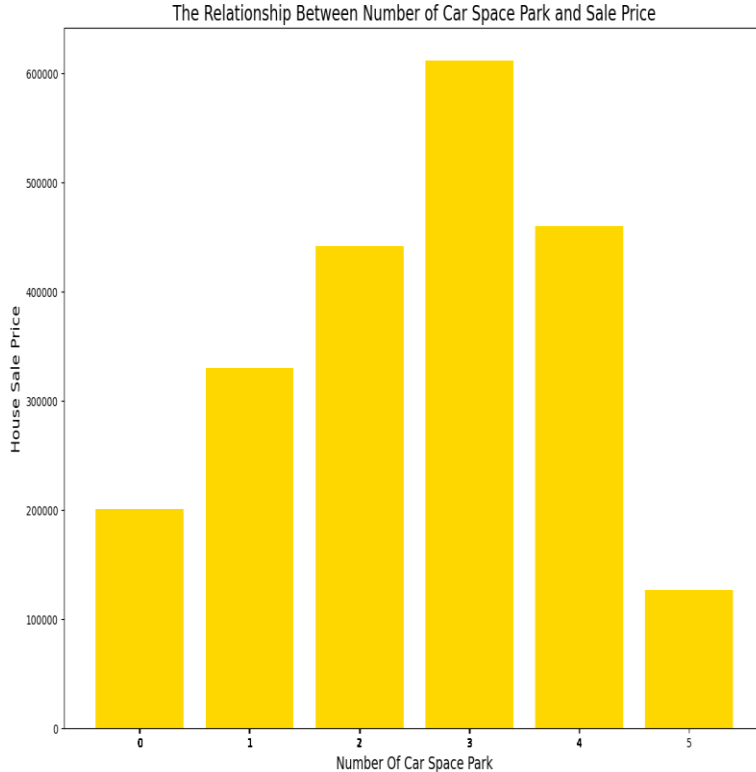
Number of areas relationship

In General, we think the price goes up by having more bathrooms. However, this analysis shows that houses with only **2** bathrooms have the highest price



Number of areas relationship

Also, we have the same story here with the number of available car parks which shows houses with **3** parking spaces have the highest price.



Conclusions and Recommendations

- For all else held constant, for each 1 Square foot increase in the Ground living area, we expect to increase in sale price by 20,000 dollars and also with the same condition for the first floor, we expect to 5,400 dollar increase in sale price.
- Having more different sections, doesn't necessarily go for increasing the sale price.

Conclusions and Recommendations

- Compared to features like pool, other features like the Masonry veneer area, fireplace, porch and wooden deck are usually ignored while they have a great positive impact on the sale price, it gets more interesting to know that pool actually has a negative impact on the house price!
- If even you have enough money but don't have cars more than 3, it's better to spend that on the other parts like increasing the ground area!

Thanks

Do you have any questions?

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