I am writing this blog related to my experience in selling my coop in Queens, NY.

Being a data science student, how should I approach things differently so that the analytics, statistical methods could benefit personally in day to day life. I believe I need to start using analytics in practice in my life before I could do at work.

I initially listed my coop as a typical person by consulting a real estate agent and we arrived at a price based on the prior sales in the neighborhood. I did not analyze beyond this as I had several assumptions. they are 1. house is in good location. 2. good schools around 3. best neighborhood. 4. less inventory. 5. top floor 6. 2 bed and 2 baths. 7. good condition. 8. has garage. 9. walk score 10. good access to public transportation.

I was aware of some disadvantages like 1. coop does not allow open houses 2. one elevator 3. has wall paper 4. not a modern style.

But, my positive assumptions were weighted high and thought it would definitely sell quick at best price. There were several showings but 2 offers only. Beginning of the listing there were more showings, in the meantime, I also showed the house with stuff. I moved and for a brief period, it was shown without stuff.

Two months passed and I did not have a good offer. I felt guilty being a data science student. Better understanding the real estate market conditions at the current scenario would have helped me in making an educated guess in terms of listing the price and what to expect.

It's time to do the analysis. but where do I start. what are my objectives. What are the relevant data that need to be analyzed? It could be anything that impact. So, how do I nail down the right reason for not getting the offers and act on it? I had several questions as why I could not sell fast.

Some of the feedback collected from the buyers were 1. Many of them prefers wood floor 2. some of them were concerned about one elevator 3. higher maintenance fees.

I thought I have to make careful decision as I got tensed paying 2 mortgages. I purchased house first. So, my objective was to price it right according to the market trend, understand the market well and take further action to sell.

I do have to ensure that I need to remove the bias as a seller. I researched and tried to understand the market. Zestimate provided some sort of an indicator. Not everyone goes by Zestimate as it has an error rate of 5 to 10% based on the city. Research data from Zillow helped me to analyze and get the answers and I did simple linear regression on the data.

Here are some of the questions that I had for which I analyzed and identified the answers.

what did I observe from my listing?

I was monitoring my listing and found there were more than 600 views, 15 to 20 shoppers saved it. Also, there were an average of 2 showings per week.

Did home values go up last year in the county, city and State?

Yes. It did go up in NYC and the number of houses sold was high compared to other states. There was a downward trend on the sales since march 2018.

Is it a buyers' market or sellers' market?

Buyer seller index is on the middle compared to other regions in NY. Market condition is not favorable to seller. price cut is 9%. days on market is 153 for NYC.

what is the inventory available with similar characteristics?

There was very less inventory in the neighborhood. This community has around 250 coops and only 2 were listed with the same characteristic (sqft, no of bed and bath). the other one was listed few days before mine. It was priced 60k more than me and had 2 price reductions in 100 days. At one point of time it was just 10k more that of mine. but both did not sell. coops in the next neighborhood sold high because of the school ranking/reputation for that community.

what is the home value index?

I found out it is on the lower end compared to other counties in Queens. Time series for the zip code is on the upward trend.

How many Listings with price cuts?

I noticed the percentage of price cuts was high in Queens in Aug. Overall in the city, there were lot of price reductions. This cautioned me that i have to lower the price as it's not a sellers' market.

what is the Age of inventory?

It was around 75 days. since I have crossed that, i need to take some action. but the overall days on market for NYC was 153. i still have time but need to act quick on the reduction.

what is the income vs mortgage affordability?

It seemed to be ok.

who are the buyers and Is there a season for selling?

Mostly first-time buyers are interested in coop due to affordability and also people who wants to downsize were interested. spring season had more action due to school enrolment. I placed my ad on 30th June.

what other factors like economy, employment rate that are affecting home sales?

NYC's unemployment rate has fallen to 4.2 percent in February, the lowest since the nation's bicentennial. The statewide jobless rate is at 4.6 percent, the lowest in more than a decade. The national jobless rate in February was 4.1. Since jobless rate is very low, the economy is good.

Do governmental policy changes have any impact to real estate market?

Interest rates were increasing since Mar 2018. Trade war was hot in the news since April of this year.

what is the probability of getting an offer by reducing the price?

Since price drives the sales, it will certainly motivate the buyer especially during buyers' market.

## **Actions taken:**

- 1. I want to address something that's doable and in my control. So, Removed the carpet after 75 days of listing.
- 2. Reduced the price by 10k after 103 days.

**Conclusion:** Need to understand the market and take appropriate action to meet the objective.

## **References:**

https://www.zillow.com/research/data/

https://www.youtube.com/watch?v=HMBnB1Ot1Ys&t=379s

https://www.bls.gov/opub/ted/2018/unemployment-rate-at-4-point-1-percent-in-february-2018.htm?view\_full