MOVING TO SEATTLE? A GUIDE TO THE DIFFERENT NEIGHBORHOODS IN THE EMERALD CITY

IBM Data Science Capstone Project

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INTRODUCTION

Background

- Seattle is located in the Pacific Northwest and it is the largest city in the state of WA
- Seattle housing market has increased in tandem with the economy as it is becoming more expensive than ever to live in this seaport city

Problem

- Moving to a new city and adapting to a new place can be overwhelming
- There are over 80 neighborhoods in Seattle
- Each neighborhood is unique with its own characteristics and attributes

Stakeholders

- People moving to Seattle area
- Investors considering buying property in Seattle

WALK SCORES IN SEATTLE

- The walkability of a neighborhood is measured by its proximity to nearby amenities
- Data for Lake City, Sand Point, and Harbor Island not included in database
- Downtown, Capitol Hill,
 South Lake Union, U-District
 and Ballard most walkable

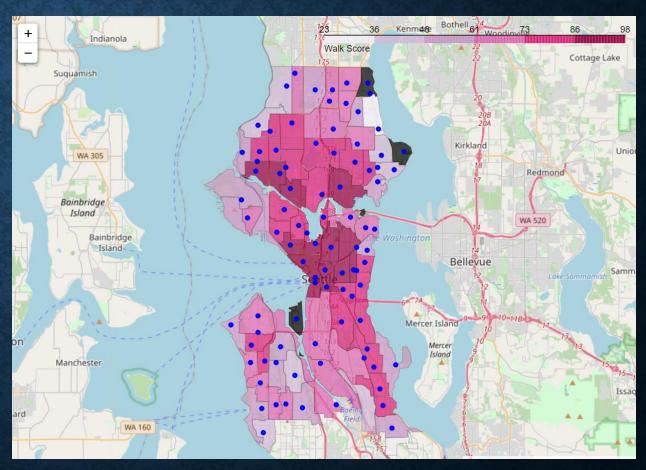


Fig. 1 Walk Scores in Seattle Neighborhoods

TRANSIT SCORES IN SEATTLE

- Transit score determined by a location's accessibility to public transportation
- Data for Lake City, Sand Point, and Harbor Island not included
- Downtown, International District, Belltown, and Pioneer Square have best access to public transportation

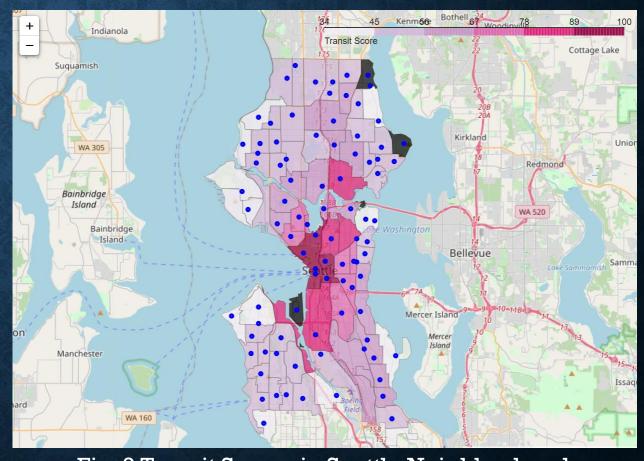


Fig. 2 Transit Scores in Seattle Neighborhoods

1-BD PROPERTY PRICE IN SEATTLE

- Choropleth map shows the average property value in each Seattle neighborhood
- Data for Sand Point, Harbor Island, Industrial District, and Georgetown not included in database
- Most expensive 1-Bedroom properties are in Madrona and Denny-Blaine

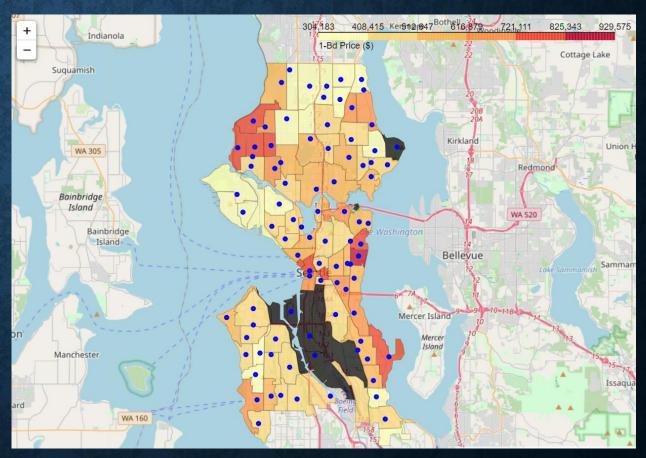


Fig. 3 Property Prices in Seattle Neighborhoods

FIVE-YEAR PROPERTY PRICE INCREASE

- Bubble plot shows the percentage increase in each Seattle neighborhood from 2015 to 2020
- Neighborhoods that have gained the most in value are Bryant (82%), Brighton (79%), and Loyal Heights (78%)
- Values have not been adjusted with inflation

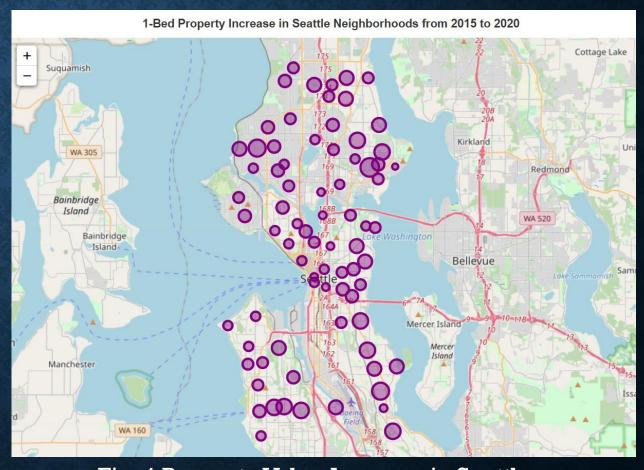


Fig. 4 Property Value Increase in Seattle

CRIME RATE IN SEATTLE

- Bar chart shows
 neighborhoods with
 the top ten highest
 crime rate in 2020
- Downtown, Capitol
 Hill, and Queen
 Anne have the most
 crime incidents

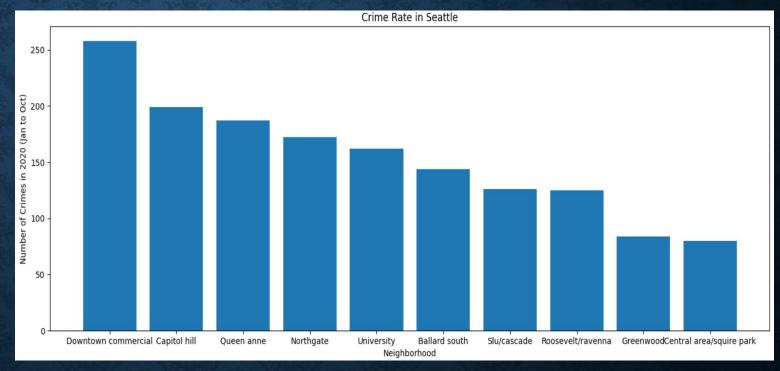


Fig. 5 Crime Rate in Seattle

COFFEESHOPS IN SEATTLE

- Bubble plot shows the number of coffeeshops in each area relative to other neighborhoods
- Downtown/Capitol
 Hill/South Lake Union area
 have the most coffeeshops
 within walking distance

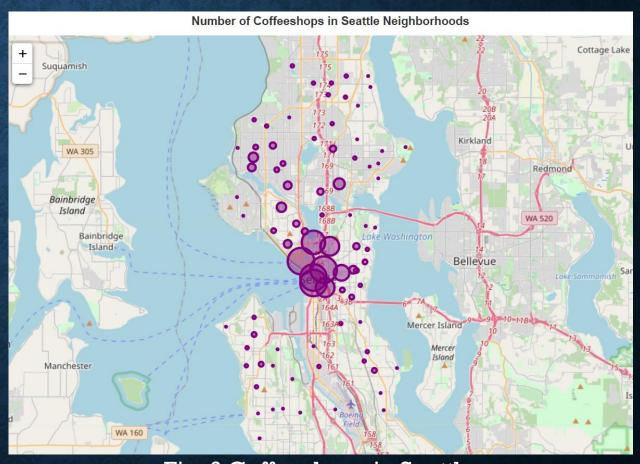


Fig. 6 Coffeeshops in Seattle

WALK SCORE VS. PROPERTY PRICE

- Scatterplot shows that there is not a strong relationship between a neighborhood's walk score and the property prices
- Coefficient of determination is 0.0089

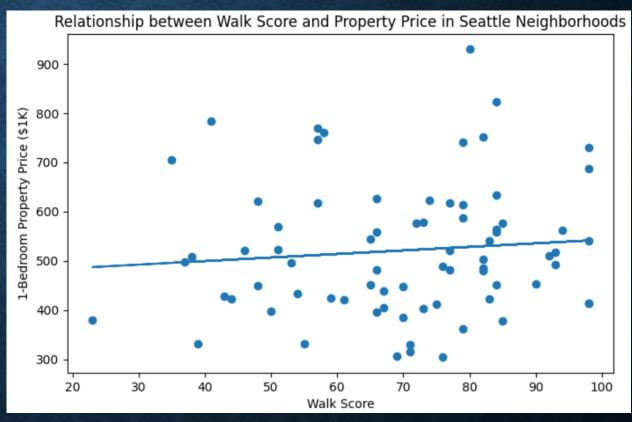


Fig. 7 Walk Score vs. Property Price

TRANSIT SCORE VS. PROPERTY PRICE

- Scatterplot shows that the relationship between a neighborhood's transit score and property price is not very strong
- Coefficient of determination of 0.0001



Fig. 8 Transit Score vs. Property Price

DISCUSSION

- While there are neighborhoods that are strong in some categories, these same neighborhoods may not perform well in other categories
- It is important to take a holistic approach and analyze several different factors when determining a place to live
- Some people may prioritize low cost over access to public transportation and others may prioritize low crime rate over property price

CONCLUSION

- The purpose of this project is to showcase the different attributes of Seattle neighborhoods so that someone that is moving to the area can make an informed decision on which area to live
- Property price, crime rate, and access to public transportation are all important factors to consider when relocating to a new place
- It is imperative to perform a thorough analysis of all of these factors before purchasing a property as a lack of understanding and awareness may lead to buyer's remorse in the future