

Applied Data Science Capstone

Introduction

The problem that is going to be presented are the perks and benefits of living in two Croatian cities: Zagreb and Varaždin. We are going to look for answers to some of the following questions: which city is better suited for a young person in their 20's regarding the numbers of interesting venues in the city, like coffee shops, restaurants, movie theaters etc in the radius of 10 kilometers from the town, and which town is better suited for a family regarding the crime rate, monthly costs etc.

Data

We are going to collect the data for the nearby venues from Foursquare to get the list of:

- coffee shops
- bars
- pubs
- clubs
- restaurants
- theaters
- shopping centers

We are also going to collect some numerical data from www.numbeo.com about

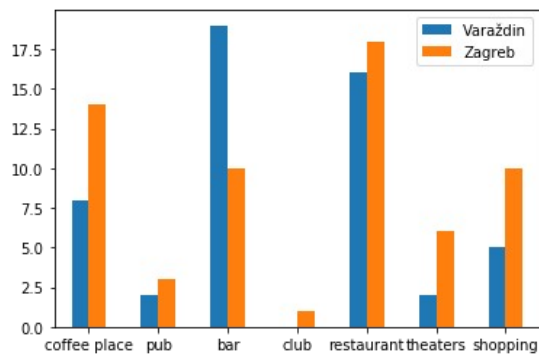
- crime rate
- quality of life index
- average salary
- cost of living
- apartment price
- rent
- preschool price

in these two cities. We are going to examine which of the two cities has more interesting venues, and after that we are going to compare which of the two cities has the smaller crime rate, living costs, rent/apartment cost, but a higher salary and quality of life index.

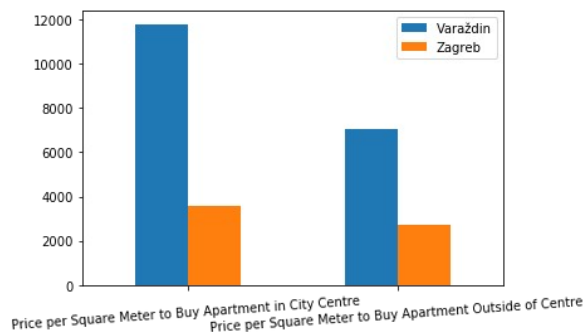
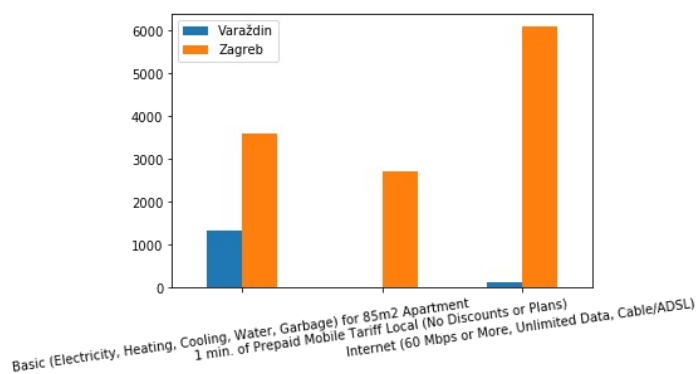
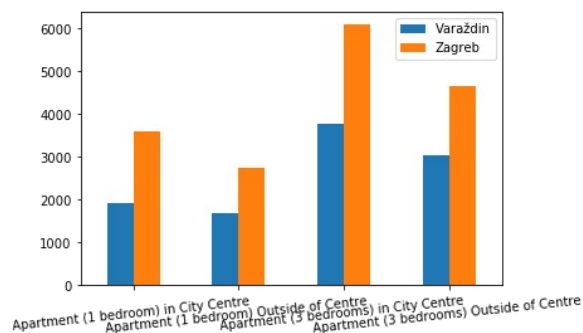
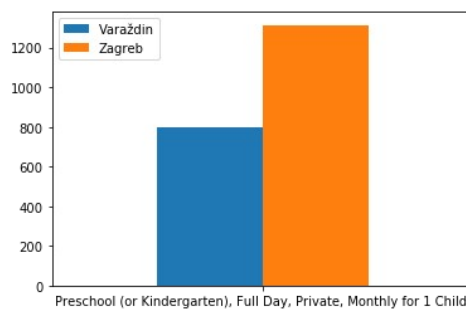
Methodology and results

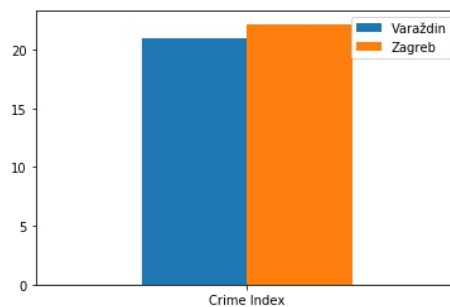
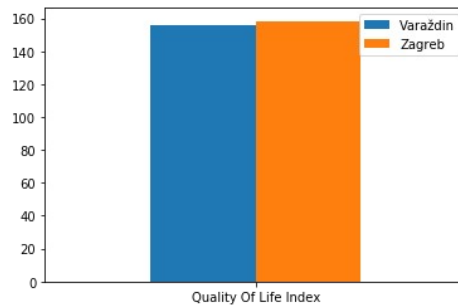
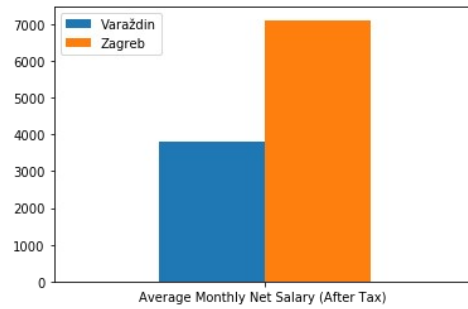
We used the Foursquare API to get the data on interesting venues regarding Varaždin and Zagreb. We collected the numerical data on these categories. After that we used www.numbeo.com and used BeautifulSoup to parse the statistical data on living costs, quality of life, and crime rate. The currency in Croatia is croatian kuna.

	Varaždin	Zagreb
coffee place	8	14
pub	2	3
bar	19	10
club	0	1
restaurant	16	18
theaters	2	6
shopping	5	10



	Varaždin	Zagreb
Preschool (or Kindergarten), Full Day, Private, Monthly for 1 Child	800.00	1313.45
Apartment (1 bedroom) in City Centre	1918.00	3595.18
Apartment (1 bedroom) Outside of Centre	1673.51	2722.55
Apartment (3 bedrooms) in City Centre	3761.01	6086.62
Apartment (3 bedrooms) Outside of Centre	3041.34	4639.60
Price per Square Meter to Buy Apartment in City Centre	11777.45	3595.18
Price per Square Meter to Buy Apartment Outside of Centre	7024.46	2722.55
Basic (Electricity, Heating, Cooling, Water, Garbage) for 85m2 Apartment	1324.09	3595.18
1 min. of Prepaid Mobile Tariff Local (No Discounts or Plans)	0.88	2722.55
Internet (60 Mbps or More, Unlimited Data, Cable/ADSL)	136.00	6086.62
Average Monthly Net Salary (After Tax)	3816.67	7114.45
Quality Of Life Index	155.67	158.31
Crime Index	20.93	22.19





Discussion

We can see that in general Zagreb has more places to go out for your people. We can also see that it is more expensive than Varaždin in most cases, but on the other hand people do have a higher monthly salary in Zagreb than in Varaždin. Regarding all this, numbeo has the data that for a family of four Varaždin is more expensive. Quality of life index and crime rates are similar, both are slightly higher in Zagreb.

Conclusion

My conclusion is that we need more data from numbeo for Varaždin to make some assumptions regarding the prices of living. We can agree though that Zagreb would be a more interesting place to live for a younger person, but for a family that maybe wants a quiet place that is not so expensive, we can't make much conclusion with this data.