

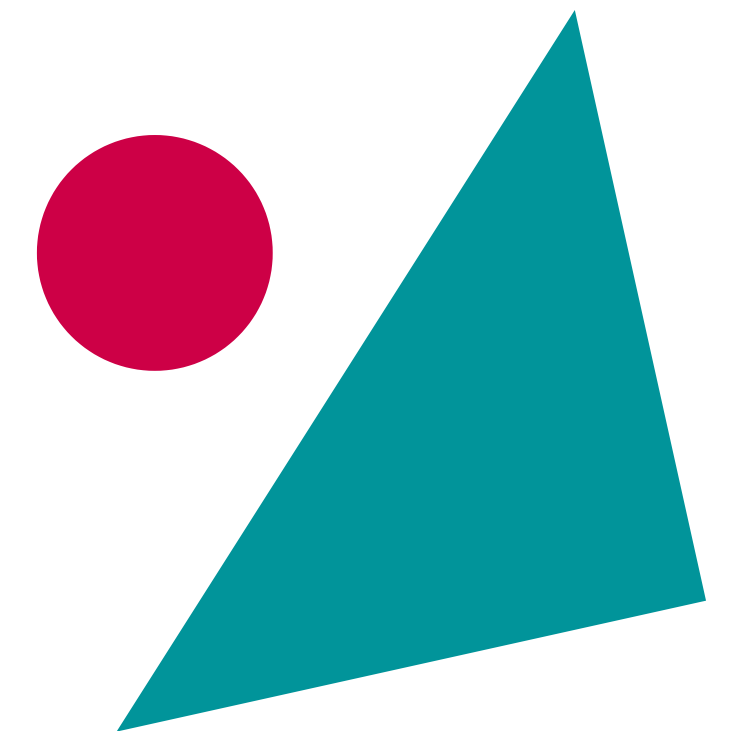
July 2020

RESTAURANT LOCATION PROPOSAL

TODAY'S PRESENTATION

WHAT WE'LL DISCUSS

Introduction to the problem
Data Acquisition and Cleaning
Exploratory Data Analysis
Results
Conclusions






INTRODUCTION

Santiago city is the vibrant capital of Chile,
with a population of over 9 millions and filled
with economical opportunities

Business Project

Our main goal is to help future entrepreneurs to
find the best location in Santiago to put a
restaurant



DATA ACQUISITION AND CLEANING

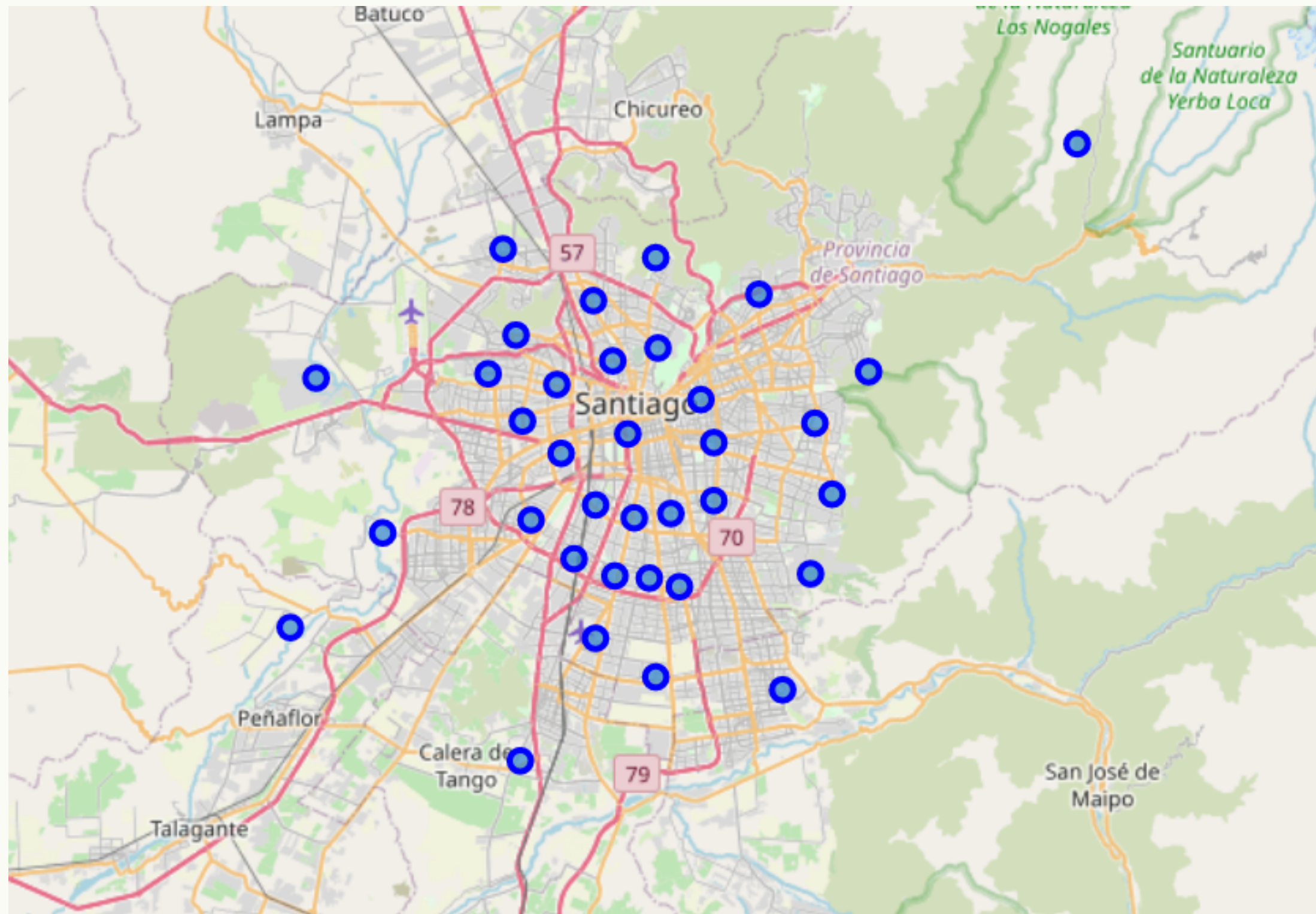
Data Sources

- Wikipedia
- `download.geonames`
- Foursquare API
- GoogleMaps API

DATA CLEANING

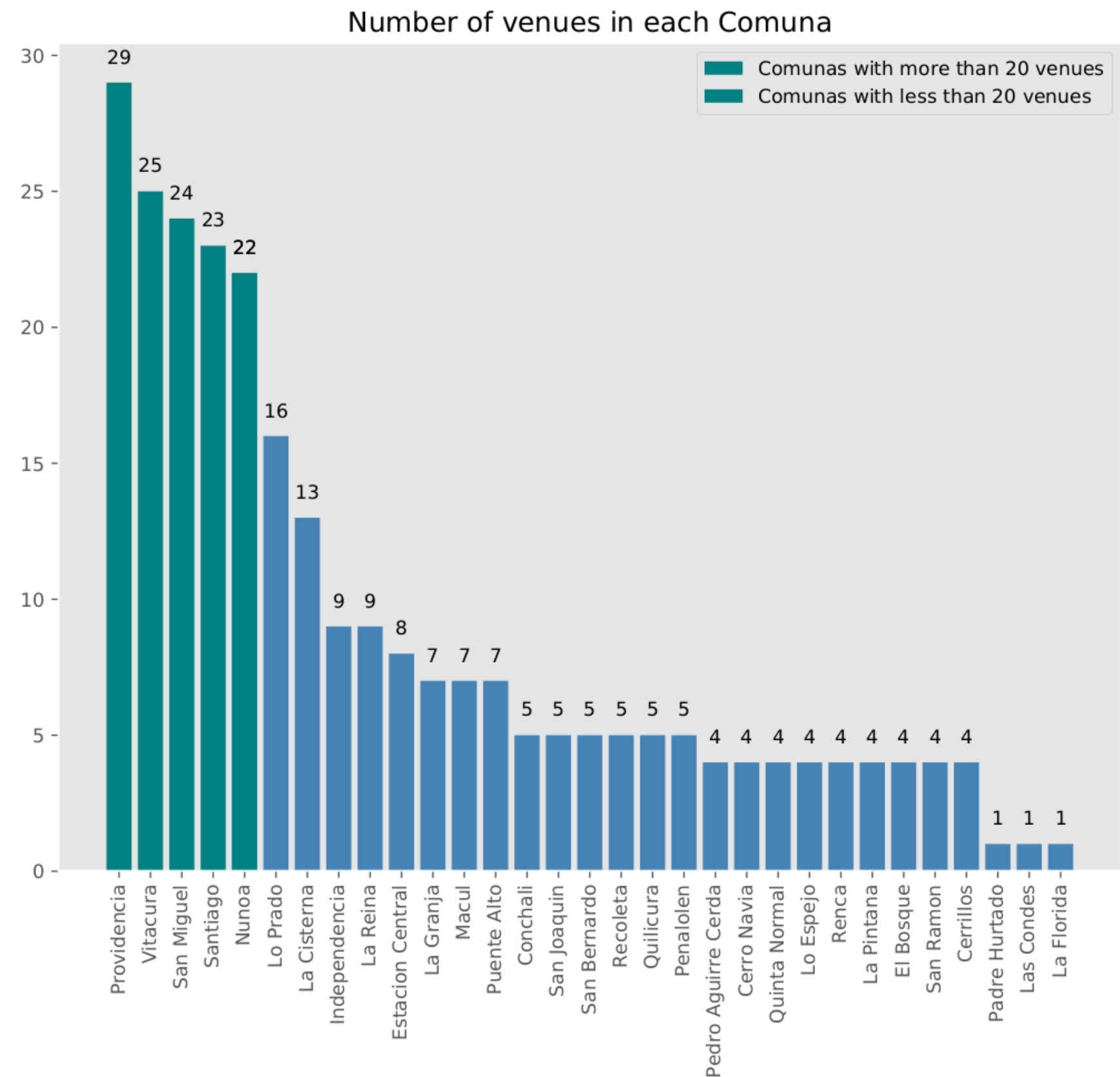
	Comuna	Codigo	Population Density	Poverty index	lat	Ing
0	Cerrillos	9200000	4329.08	19.7	-33.5003	-70.7174
1	Cerro Navia	9080000	13482.91	35.6	-33.4228	-70.745
2	Conchali	8540000	12070.29	21.6	-33.3837	-70.6774
3	El Bosque	8010000	12270.72	27.0	-33.5629	-70.6764
4	Estacion Central	9160000	9036.31	14.5	-33.4645	-70.6986

EXPLORATORY DATA ANALYSIS

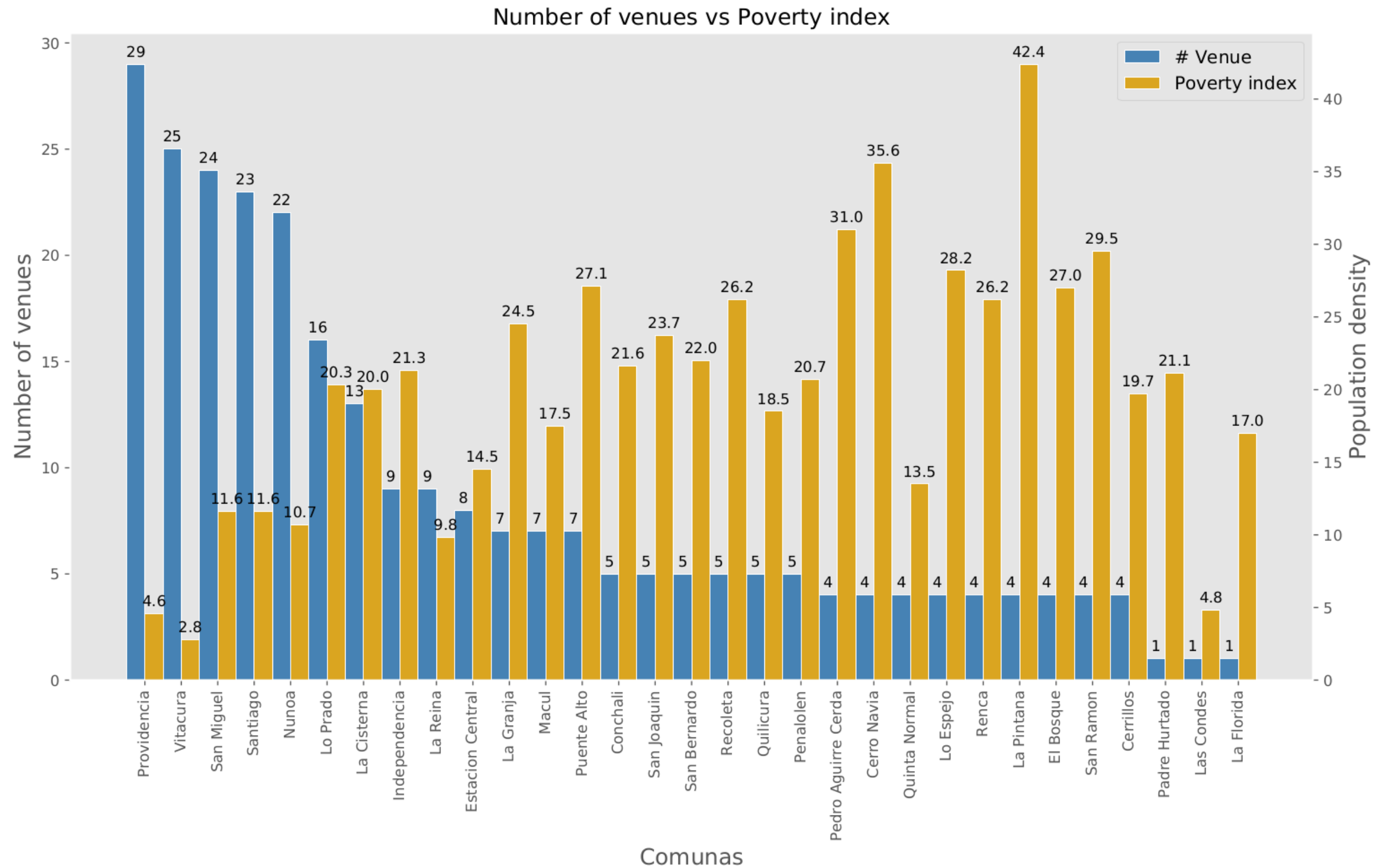


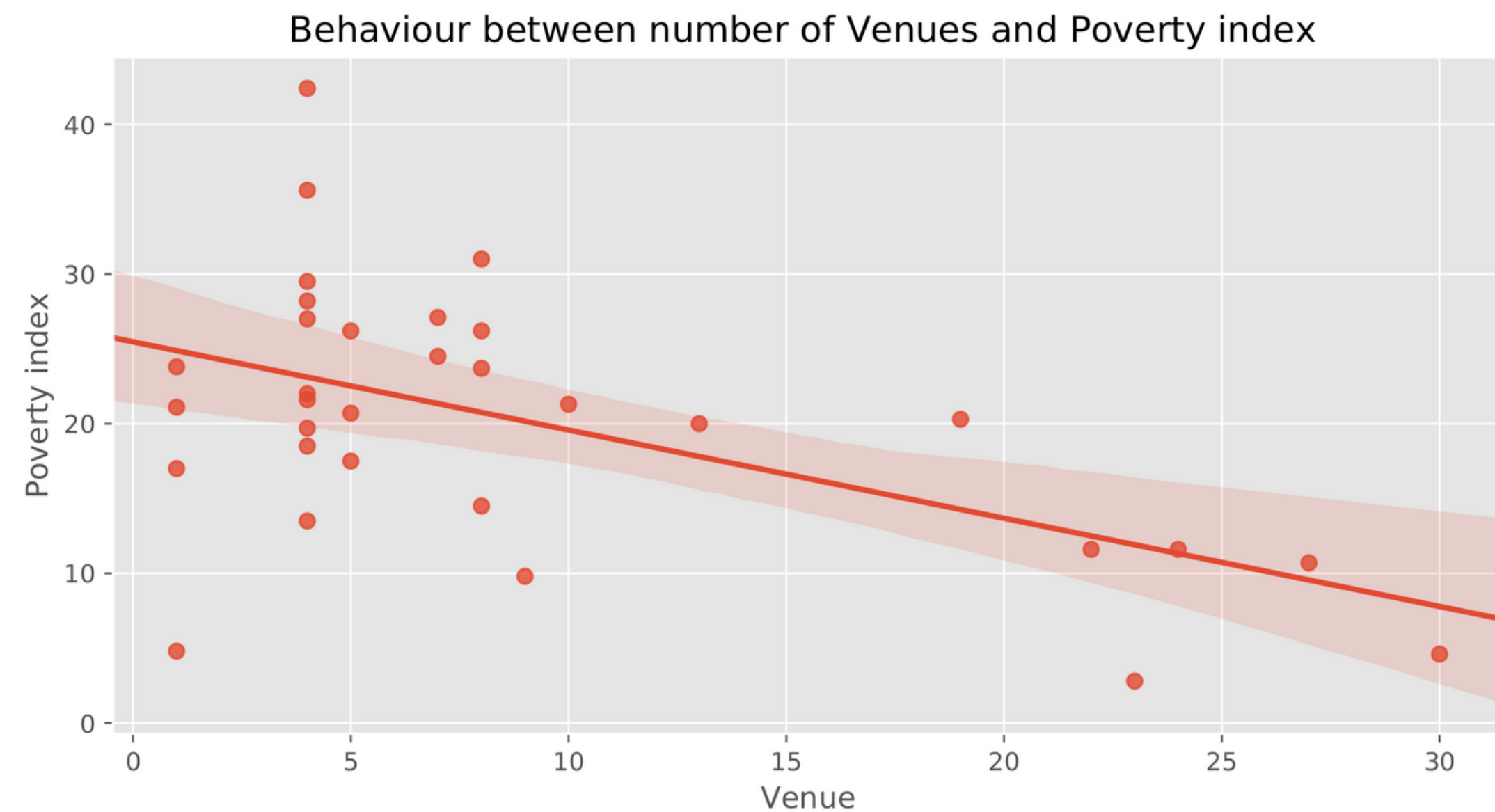
Restaurant Location Proposal | 2020

Best Commercial Comuna



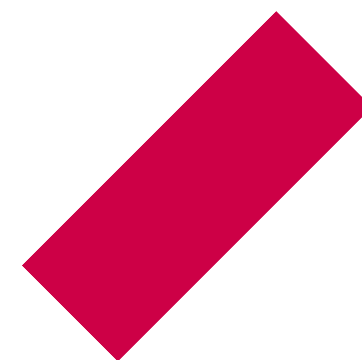
Comparison with poverty index





	Population Density	Poverty index	Venue	Metro count
0	9698.16	10.7	22	11
1	8429.15	4.6	29	11
2	8122.76	11.6	24	5
3	8654.83	11.6	23	21
4	2846.63	2.8	25	0

Correlation
matrix



Results

Cluster 1

	Comuna	Population Density	Poverty index	lat	Ing	Venue	Metro count	Cluster Labels
4	Vitacura	2846.63	2.8	-33.3799	-70.5724	23	0	0

Cluster 2

	Comuna	Population Density	Poverty index	lat	Ing	Venue	Metro count	Cluster Labels
0	Nunoa	9698.16	10.7	-33.4593	-70.6003	27	11	1
2	San Miguel	8122.76	11.6	-33.4991	-70.6517	24	5	1
3	Santiago	8654.83	11.6	-33.4541	-70.656	22	21	1

Cluster 3

	Comuna	Population Density	Poverty index	lat	Ing	Venue	Metro count	Cluster Labels
1	Providencia	8429.15	4.6	-33.4362	-70.609	30	11	2

CONCLUSIONS

- Successful Machine Learning model
- More commercial area
- High Number of subway stations
- Low poverty index
- High population density

Providencia