BEST CITIES TO WORK REMOTE

REMOTE WORK IS THE FUTURE

- Remote work has increased significantly these couple of years and is taking a new turn with the coronavirus crisis.
- Remote work can benefit both employees and employers:
 - Avoid spending hours in transport
 - Be able to pick the location they want.
 - Improve all in all the lifework balance
 - Hire the best people not only in a radius of 40 kms but from everywhere in the world
 - Reduce their real estate cost substantially

	City	Country	Cost of Living Plus Rent Index	Groceries Index	Restaurant Price Index	Safety Index	Healthcare Index	Pollution Index	Climate Index	Internet Index	Pct Nomads
0	Zurich	Switzerland	95.88	126.29	109.21	83.11	73.69	17.77	81.48	38.85	0.1
1	Geneva	Switzerland	94.20	117.24	107.27	71.41	68.89	29.26	82.61	38.85	0.1
2	New York	United States	100.00	100.00	100.00	54.32	63.33	56.34	79.66	32.89	0.1
3	San Francisco	United States	102.32	86.54	83.05	45.07	66.02	46.33	97.26	32.89	0.1
4	Anchorage	United States	64.49	87.60	67.81	37.21	60.62	16.62	41.61	32.89	0.0
235	Bogota	Colombia	19.29	21.85	19.04	38.61	64.36	69.61	97.12	3.48	0.0
236	Medellin	Colombia	17.53	23.26	17.52	48.41	76.59	63.02	99.76	3.48	0.1
237	Lahore	Pakistan	14.11	19.97	15.08	60.71	64.61	79.19	67.56	1.44	0.0
238	Islamabad	Pakistan	14.73	20.37	15.55	70.77	64.53	43.64	76.91	1.44	0.0
239	Karachi	Pakistan	13.68	19.37	16.71	45.42	58.51	89.92	71.32	1.44	0.0

DATA ACQUISITION AND CLEANING

To work thorough on the cost of living, safety, quality of life and so on, we are going to be using Numbeo that is the largest database of user contributed data about cities and countries worldwide:

https://www.numbeo.com/cost-of-living/

Nomadlist that classifies the best cities to work remote: https://nomadlist.com/

Cable.co.uk for internet speed data: https://www.cable.co.uk/

In total, 9 features and 240 cities NA data were dropped

EXPLORATORY DATA ANALYSIS

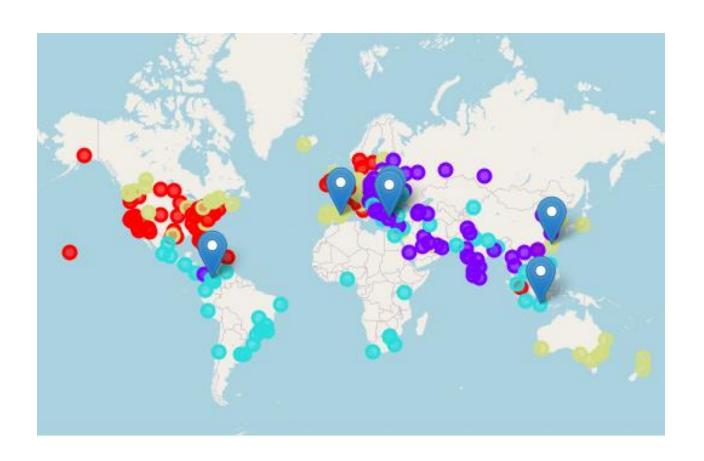
 The columns of our dataframe have completely different scales. Therefore, we rescaled the dataframe to change the values of its columns to a common scale, without distorting differences in the ranges of values.

	City	Country	Cost of Living Plus Rent Index	Groceries Index	Restaurant Price Index	Safety Index	Healthcare Index	Pollution Index	Climate Index	Internet Index	Pct Nomads
0	Zurich	Switzerland	0.928856	1.000000	1.000000	0.923212	0.731142	0.060070	0.784588	0.448057	0.003704
1	Geneva	Switzerland	0.910296	0.915357	0.980614	0.764762	0.630004	0.198387	0.797782	0.448057	0.003704
2	New York	United States	0.974370	0.754115	0.907964	0.533315	0.512853	0.524377	0.763339	0.376808	0.003704
3	San Francisco	United States	1.000000	0.628227	0.738583	0.408044	0.569532	0.403876	0.968827	0.376808	0.003704
4	Anchorage	United States	0.582081	0.638141	0.586290	0.301598	0.455752	0.046226	0.319089	0.376808	0.000000

SCORING MODEL

- Some well-known cities for remote workers like Bali, Medellin, Lisbon, Prague or Chiang Mai.
- Some surprises with cities like Bursa and Izmir in Turkey, Timisoara and Cluj in Romania, Islamabad in Pakistan or Coimbatore in India.
- In can be explained by the facts that cost of living is quite cheap and safety and healthcare are quite good and have improved substantially in those regions.

	City	Country	Total Score
0	Taipei	Taiwan	7.944064
1	Bursa	Turkey	7.831079
2	Izmir	Turkey	7.596611
3	Bali	Indonesia	7.523524
4	Valencia	Spain	7.414207
5	Medellin	Colombia	7.400906
6	Curitiba	Brazil	7.357749
7	Lisbon	Portugal	7.336295
8	Porto	Portugal	7.313023
9	Timisoara	Romania	7.280140
10	Prague	Czech Republic	7.240398
11	Islamabad	Pakistan	7.216972
12	Coimbatore	India	7.184243
13	Brno	Czech Republic	7.159454
14	Wellington	New Zealand	7.130798
15	Ankara	Turkey	7.082159
16	Cluj-Napoca	Romania	7.066849
17	Chiang Mai	Thailand	7.035165
18	Adelaide	Australia	6.996851
19	Zagreb	Croatia	6.972736



CLUSTERING

The data points from the same cluster are located next to each other

The cities in the top 6 of our scoring model don't belong to only one clusters but they are spread out into different clusters:

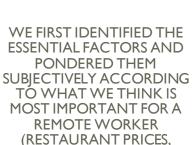
Taipei and Valencia in the blue cluster

Bali in the green cluster

Burza, Izmir and Medellin in the purple cluster

The only cluster not represented here is the red cluster where the cost of living is relatively higher than the quality of life.





INTERNET SPEED, CLIMATE

INDEX)



THE SCORING MODEL GAVE SOME EXPECTED RESULTS LIKE MEDELLIN, BALI OR VALENCIA AND SOME UNEXPECTED ONES LIKE BURZA, ISLAMABAD. HEALTH AND SAFETY IN SOME REGIONS ARE CONSIDERABLY IMPROVED OR THAT BIG NORTH AMERICAN OR EUROPEAN CITIES HAVE A COST OF LIVING RELATIVELY HIGHER THAN THE QUALITY OF LIFE.



THE CLUSTERING MODEL **DEFINED DISTINCT CATEGORIES OF CITIES AND** THAT THE WORLD IS WAY MORE WIDESPREAD THAN THE TYPICAL **DEVELOPED/UNDEVELOPED** SCHEMA. CITIES IN THE TOP 6 OF OUR SCORING MODEL DON'T BELONG TO ONLY ONE CLUSTERS BUT THEY ARE SPREAD OUT INTO **DIFFERENT CLUSTERS.** THERE IS NOT A BEST CITIES TO WORK REMOTE BUT SEVERAL AND IT DEPENDS ON INDIVIDUAL PREFERENCES.

CONCLUSIONS