A description of the problem and a discussion of the background. (**15 marks**)

With the advances in globalization and remote work, it is increasingly frequent that employees, entrepreneurs and self-employed professionals have opportunities to relocate to different cities across the world to work. However, one does not always have the ability to visit and experience the cities they will live in before they actually move. This can be stressful for families as they move into different cities they do not know and may have a hard time to get adapted to.

This project aims to provide insights on how similar certain cities across the world are, from the point of view of availability of commercial and services venues, according to the local population.

For example, a Latin American professional who wants to move to the U.S. can choose to get insights about how similar American cities are to their home city. If, for example, Latino restaurants, parks and shopping malls are very prevalent in their home city, this tool will inform them of cities in America with the most similar profiles.

A description of the data and how it will be used to solve the problem. (**15 marks)**

The external data sources used for this project are:

* Foursquare venue review data – using Foursquare API (<https://developer.foursquare.com>)
* Simple Maps World Cities open database – database of the world's cities and towns (<https://simplemaps.com/data/world-cities>)

The approach to solve the problem presented is as follows:

1. Capture user input as to the current city they live in;
2. Capture user input as to the current country they want to move to;
3. Use Simple Maps database to get coordinates for venue review search;
4. Use Foursquare data to obtain the current city profile and for the top 20 cities in the destination country;
5. Use an Euclidian distance function to calculate distance between cities;
6. Rank the top 5 cities most similar to the input city, and present results to user.