

# IBM Applied Data Science Capstone Project

## Introduction and Business Problem

Mexican cuisine was declared an intangible heritage of humanity by UNESCO in 2010. If you were to ask any Mexican what the best thing about Mexico is, chances are the vast majority will answer that it's the food. Mexican gastronomy is famous all over the world, yet it's almost impossible to get **real** Mexican food anywhere other than Mexico, a few restaurants in some southern USA states and a very limited number of Mexican-owned restaurants in other countries.

When talking to tourists or other visitors who just arrived to Mexico City, be it for work or leisure, it's universal: they always want to know what's the best place to get authentic Mexican Food. It shouldn't be a hard question. And depending on who you ask, you'll probably always get a different answer. And in a city of more than 20,000,000 habitants in 1,465 km<sup>2</sup>, with thousands of authentic Mexican restaurants, the prospect can be daunting. That's why, for this project we will use the power of the data provided by Foursquare to process information about only the best options for authentic Mexican cuisine. We will create clusters of the best options for eating the best Mexican food and based on proximity of points of interest, we will suggest the best options of hotels to minimize travel time to these places (Mexico City traffic can be quite chaotic).

## Data

Most of the data will come from the Foursquare API, where we will be paying special attention to:

- Venue name and id
- Venue Category (Only Mexican restaurants, museums, monuments, historical places of interest and hotels will be considered).
- Venue rating
- Venue location
- Venue coordinates