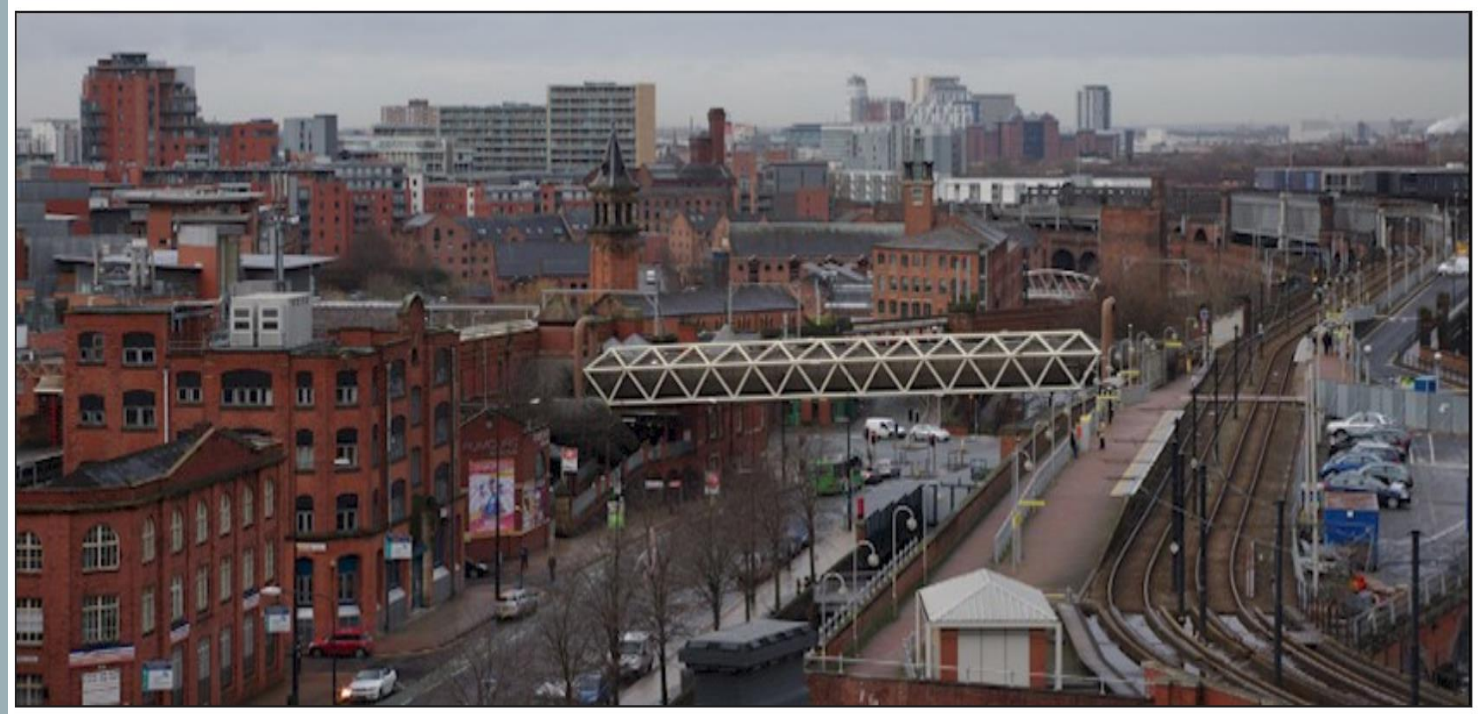


Location Analysis of Pharmacy Businesses in Manchester, UK.

**Coursera
Capstone Project**

**IBM Applied Data
Science Capstone**



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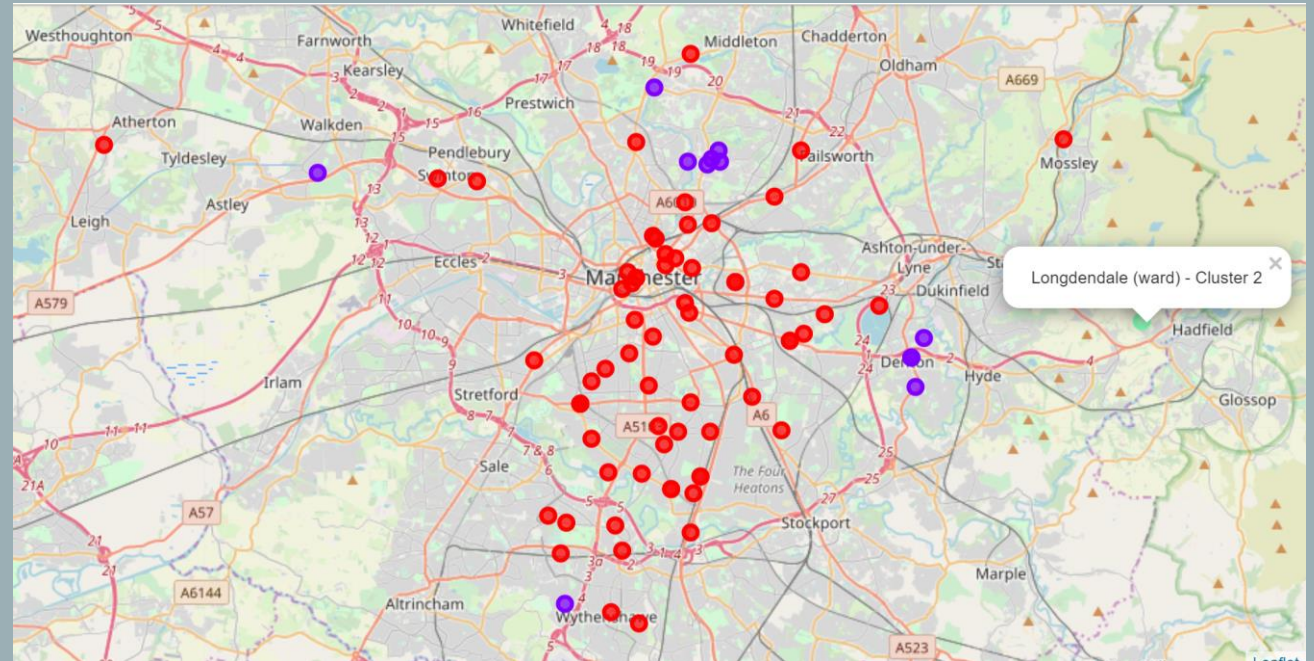
Introduction

One of the quality life criteria in big cities is the accessible environment including the availability of such facilities as a pharmacy. A pharmacy near the house is in demand for social groups, such as pensioners, people with disabilities, young families with children. For my analyzes, the city of Manchester UK was chosen. Manchester is a major city and metropolitan borough in Greater Manchester, England, with a population of 534,982 as of 2018 (4th most populous English district). It lies within the United Kingdom's second-most populous urban area, with a population of 2.9 million, and third-most populous metropolitan area, with a population of 3.3 million.

Results

The results from the k-means clustering shows that there are 3 clusters based on the frequency of occurrence for “Pharmacy”:

- Cluster 0: Areas with low concentration of Pharmacy businesses (red)
- Cluster 1: Areas with high concentration of Pharmacy businesses (violet)
- Cluster 2: Areas with high concentration of Pharmacy businesses and far distance from Manchester city (chlorine)



Thank you for your time!