ETL Project:

Team: Sylviane, Krishan & Harish

Problem Statement:
Currently there isn't information mapping charging stations with car dealers. When a buyer is at a dealership, they have no information on charging stations in their zip code for alternate fuel vehicles.

Our Approach:
Based on our analysis, we decided to use Oklahoma City for this project. We used NREL's Alternative Fuel Stations data that includes biodiesel, compressed natural gas, ethanol, electric charging, hydrogen, liquefied natural gas, and propane station locations. NREL provides REST webservice that return JSON data of all alternate fuel station locations. Using their API we extracted JSON, parsed, transformed and loaded data into a MySQL database.

For dealership data we used the DMV database from Data.gov and downloaded a spreadsheet of all dealers in Oklahoma City. We cleaned up data (made blank phone number into 9's and cleaned out apostrophes) to insert into the MySQL database.

Lastly we developed a program to retrieve data from the MySQL database, join data from both he fuel stations and car dealer tables and load them onto a web page.

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