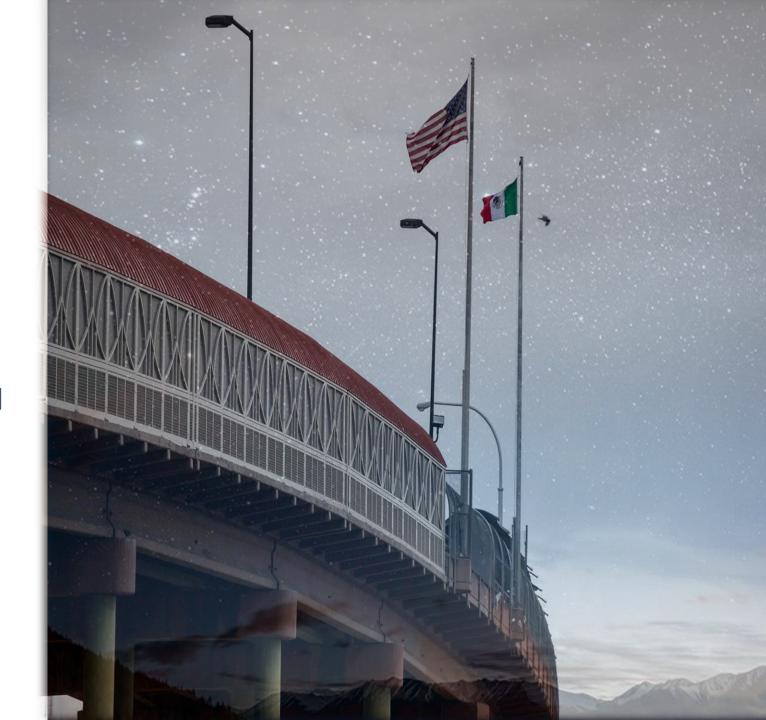


BORDER CROSSING DATA ANALYSIS

Group 4: Sara, Set and Lynn Hoang

INTRODUCTION

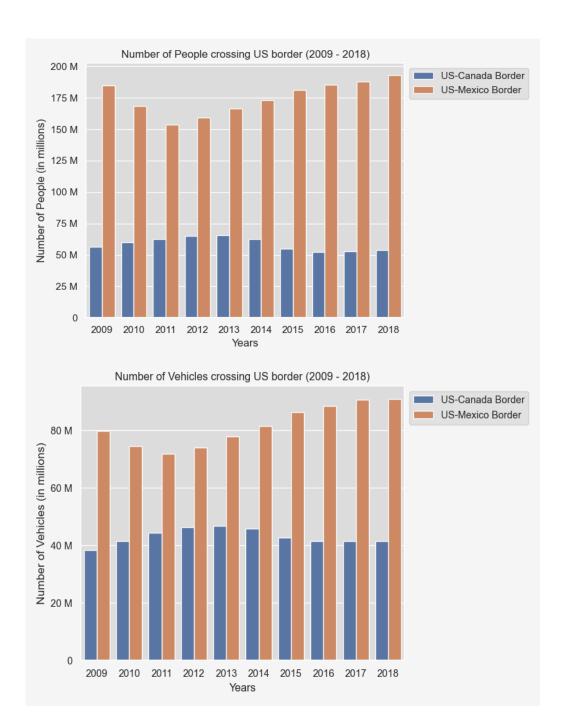
- Data collection: Kaggle and OpenWeatherMap API
- Data cleaning
- Data limitations: Time frame and Traffic Flow
- Analysis and Findings



Question 1 –

What is the busiest border in the US?





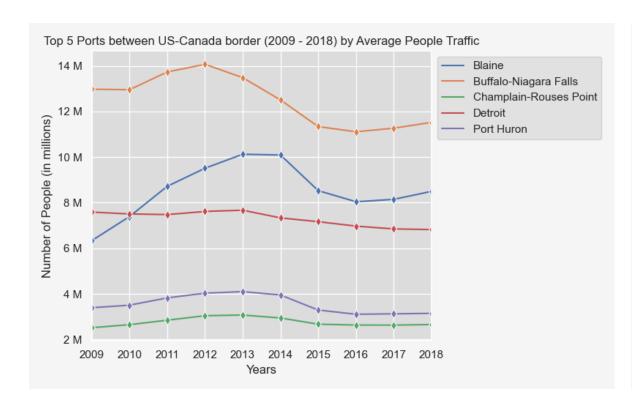
- The people traffic for the US-Mexico border is 3 times higher than the US-Canada border traffic
- The vehicle traffic for the US-Mexico border is 2 times higher than the US-Canada border traffic

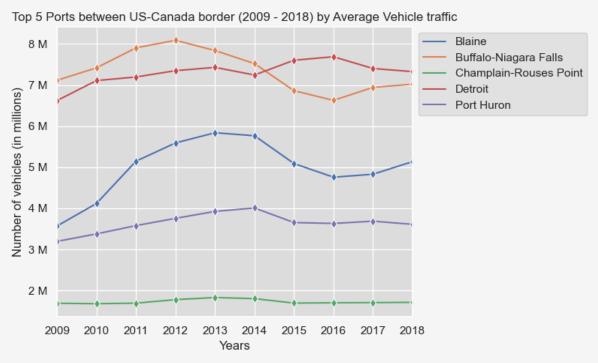
Question 2 –

What are the top 5 busiest ports along the US-Canada border?



People versus Vehicle traffic by port for the US-Canada border

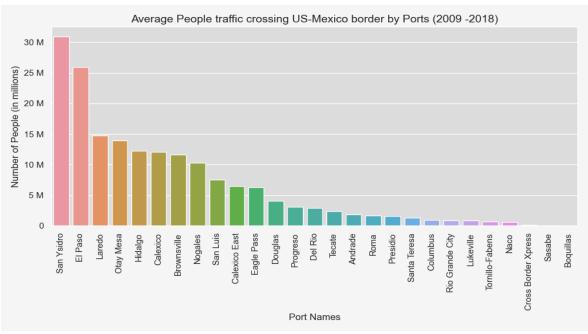


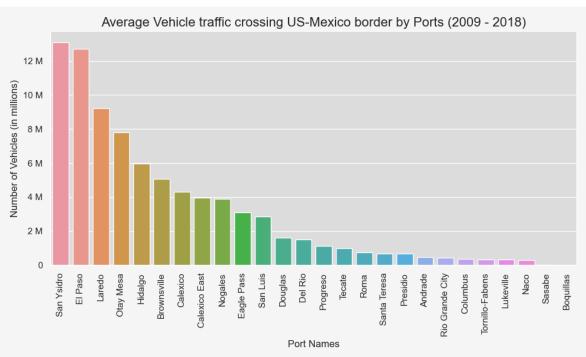


Question 3 –

What are the top 5 busiest ports along the US-Mexico border?

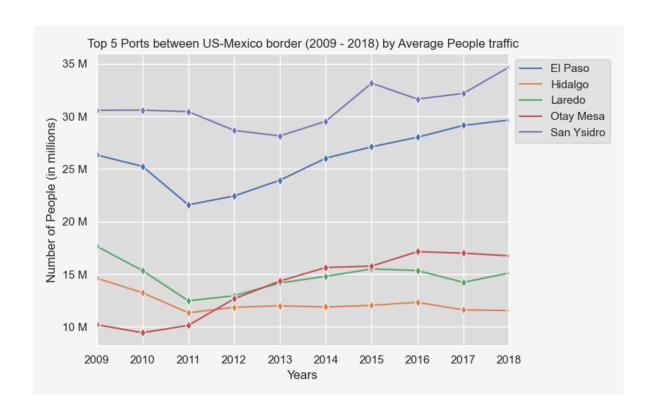


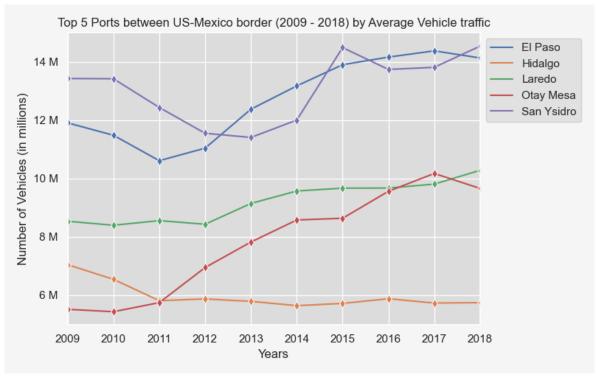




Top 5 busiest ports

- 1. San Ysidro
- 2. El Paso
- 3. Laredo
- 4. Otay Mesa
- 5. Hidalgo





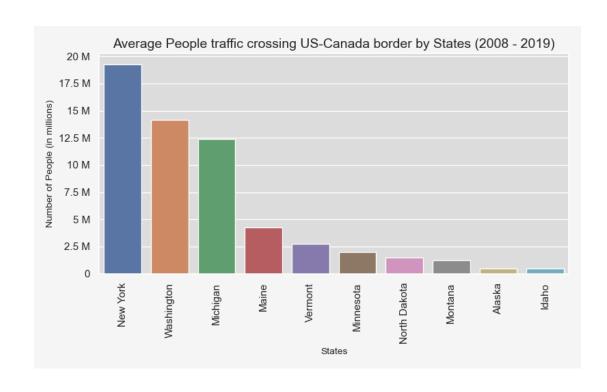
- El Paso and San Ysidro remain the most popular ports to cross along the US Mexico border
- From 2011 onward, there is an upward trend in inbound crossings at all the ports with the exception of Hidalgo

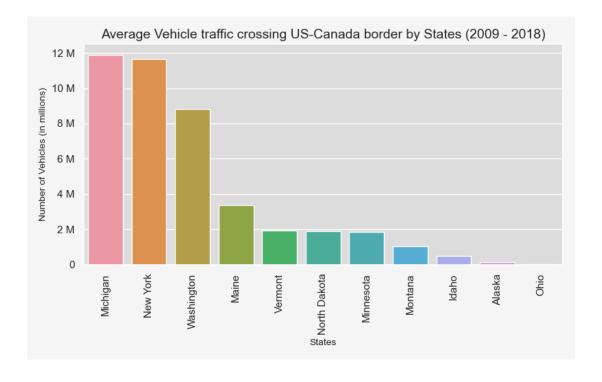
Question 4 –

What are the top 3 busiest states along the US-Canada border?



Top 3 busiest states along the US-Canada border

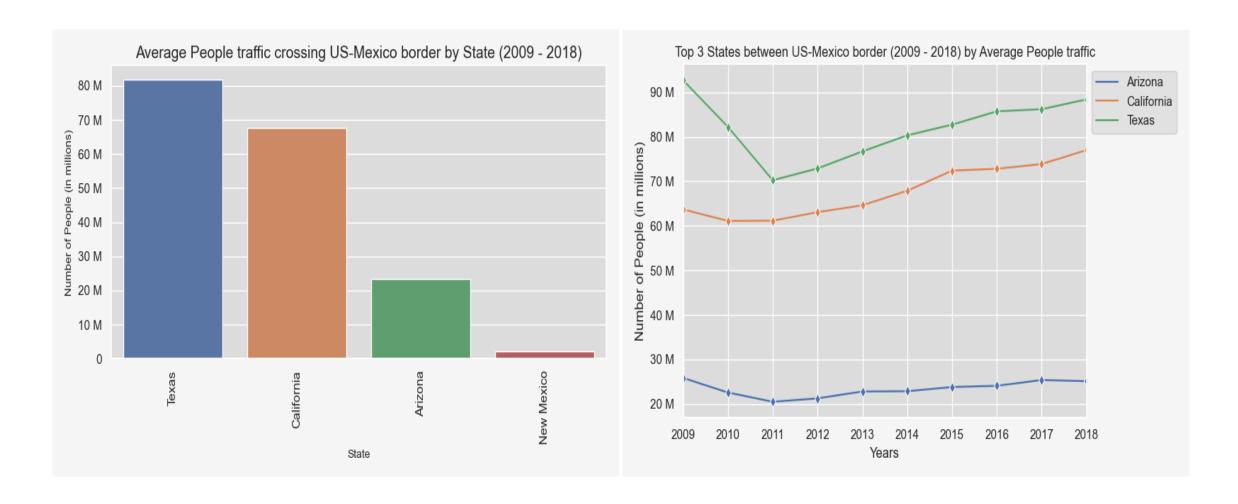




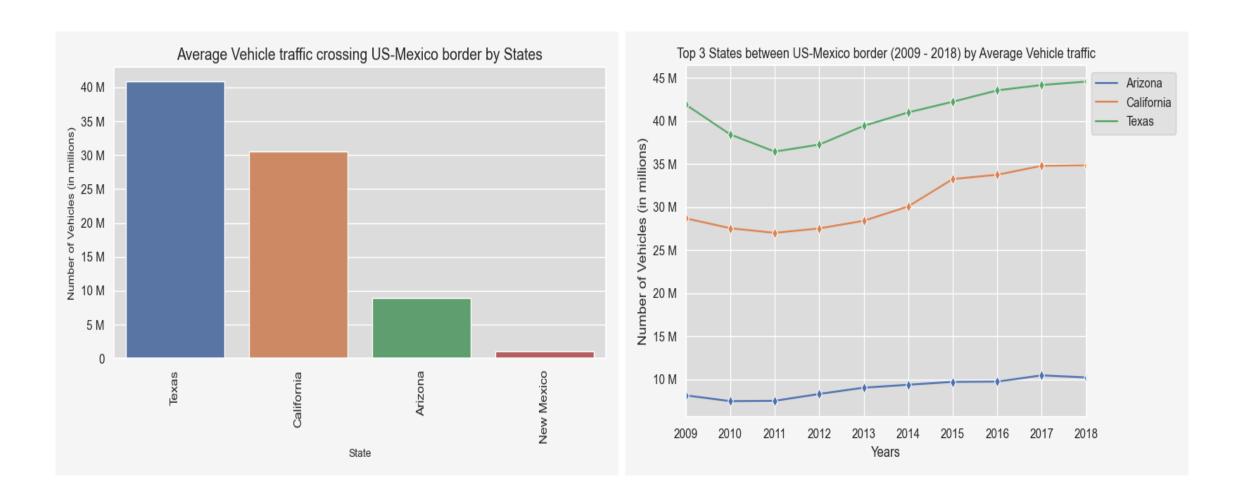
Question 5 –

What are the top 3 busiest states along US-Mexico border?





- More than 80 million people crossed the border on average into the US from Texas
 - Texas remains the most active state for border crossings

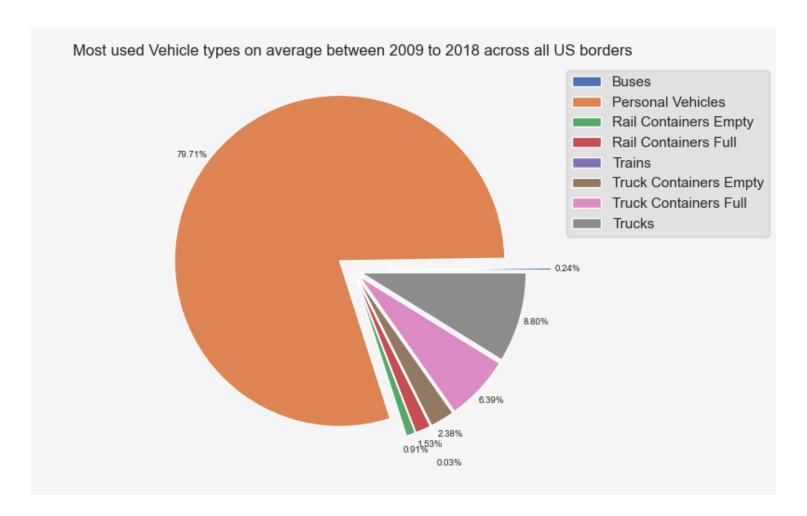


- More than 40 million vehicles crossed the border on average into the US from Texas
 - Texas remains the most active state for border crossings



Question 6 –

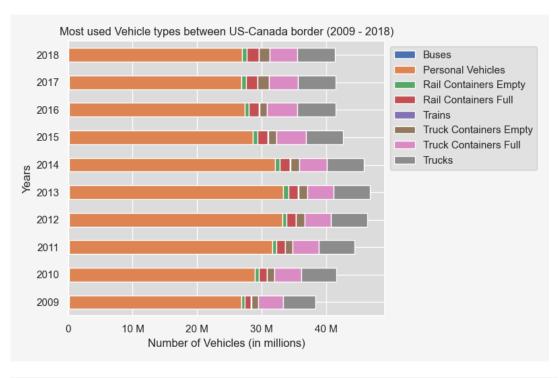
Which vehicle types are used the most?

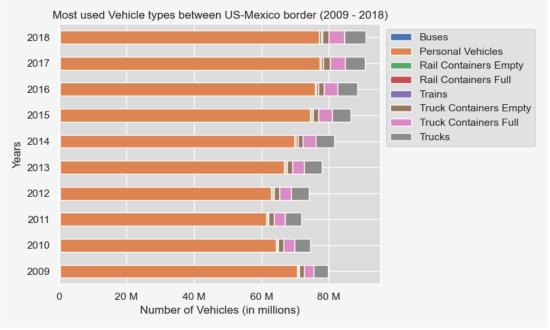




 Personal vehicles represent 79.7% of the vehicle volume across the 10 years

Vehicle Usage

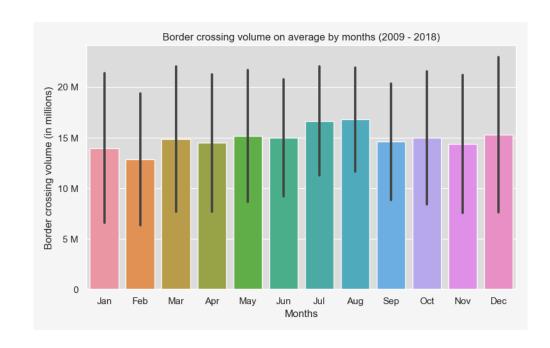


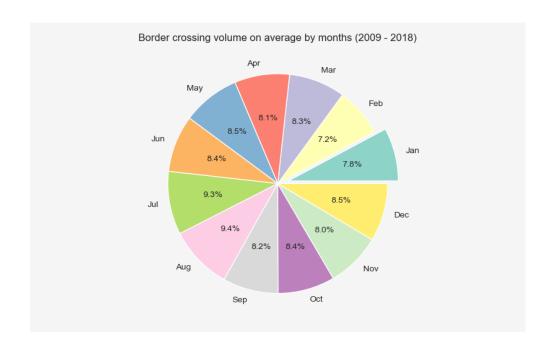


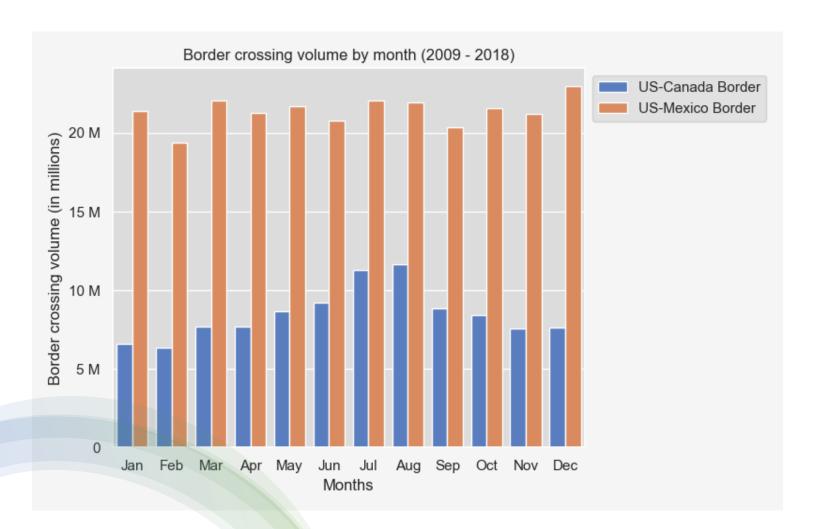
Question 7 –

Which months are the busiest at the US borders?

- July (9.3%) and August (9.4%) are the busier months of the year
 - February (7.2%) and January (7.8%) are the slower months of the year



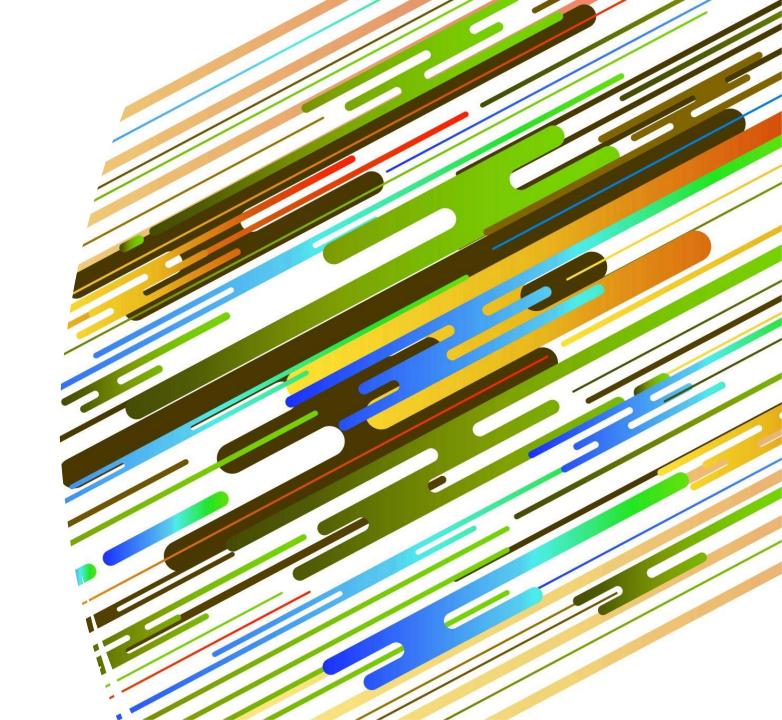


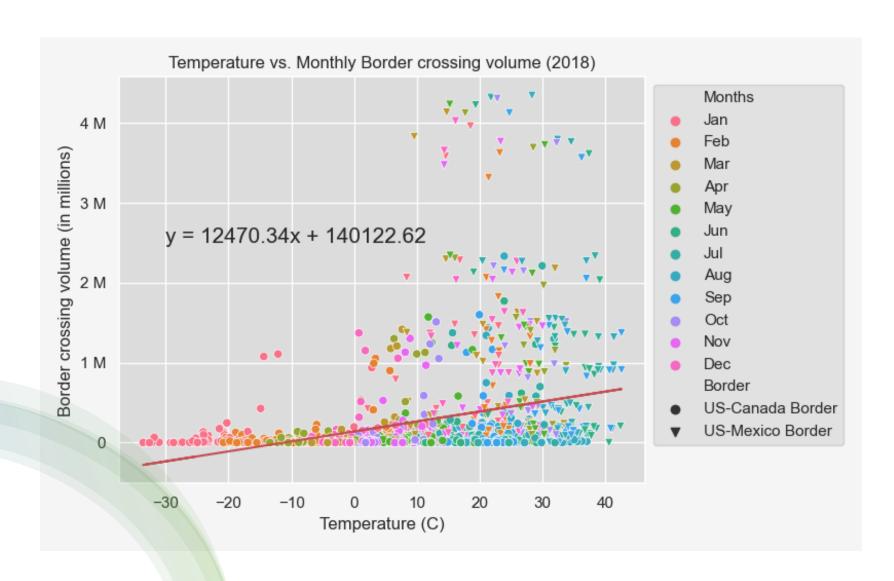


 More traffic in the summer (US - Canada)

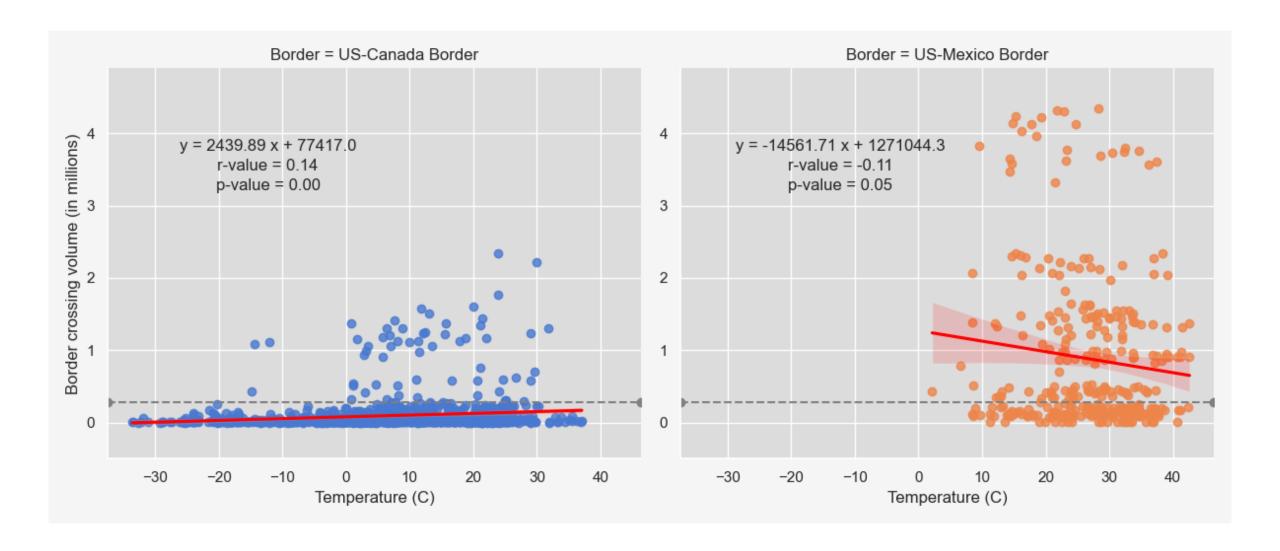
Question 8 -

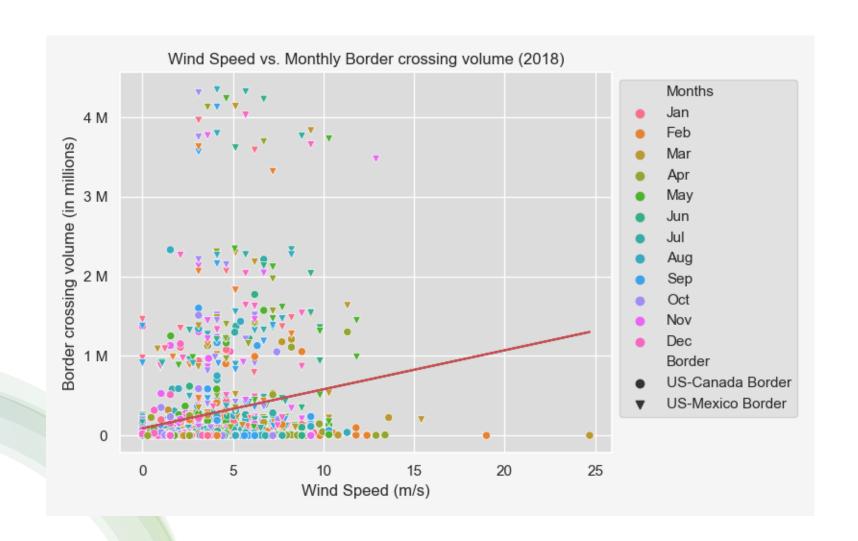
Do weather conditions impact the border crossing traffic volume?



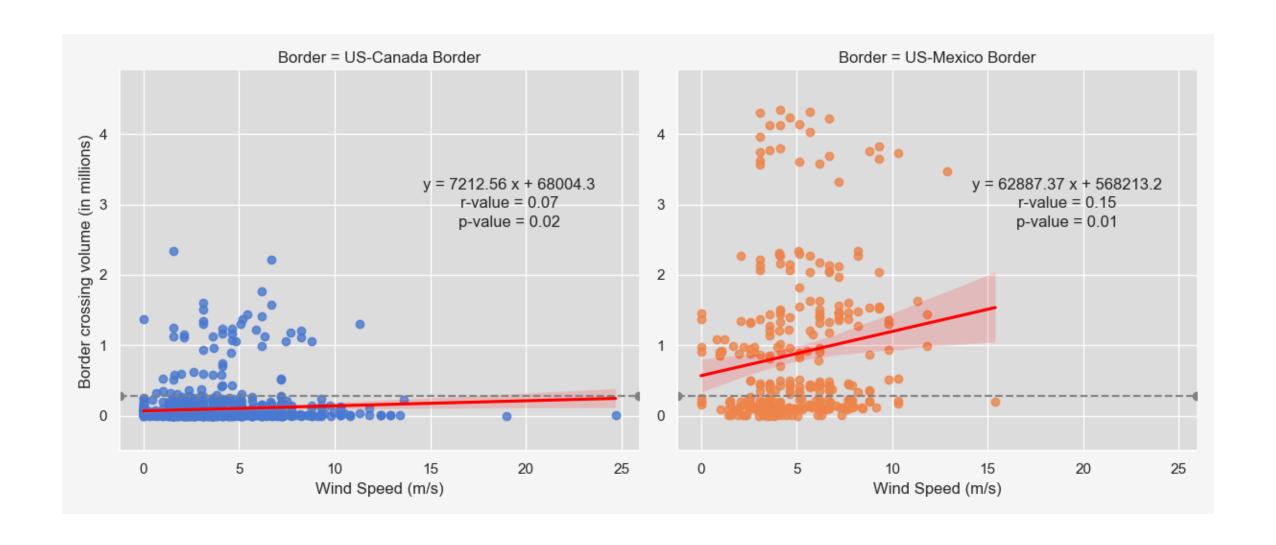


r-value = 0.2943

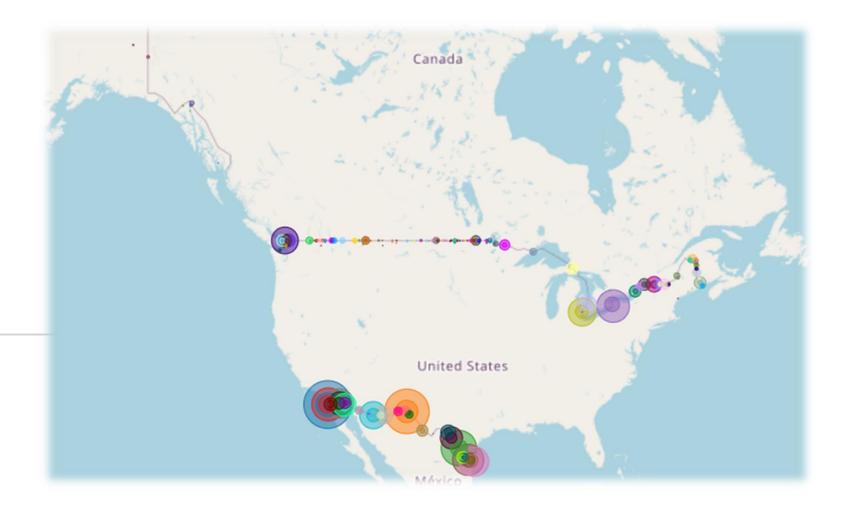




r-value = 0.1953



Conclusion



Q&A