GROUP 7 – TRENDS IN CANADIAN HOUSING

Data Source

We have selected data related to Canadian housing as the basis for our research. We are seeking to determine the impact of demographic changes on living costs, the trends within home ownership, and the impact of these changes and trends on the financial health of Canadians. Our focus is on the following subjects:

1. Housing costs:
   1. Cost of homes;
   2. Average rents;
2. Demographic data:
   1. Population growth and Immigration;
   2. Household income;
   3. Household sizes;
3. Home ownership data:
   1. Age of first-time home owners;
   2. Type of home for first-time home buyers;
   3. Marital stats of first-time home buyers;
   4. Location by city of first-time home buyers;
4. Financial data:
   1. Mortgage sizes;
   2. Down-payment sizes; and,
   3. Overall household debt.

We believe this data to be interesting given the extensive coverage of the housing market in the media, yet very limited, unbiased representation of the facts. Most media coverage on housing is very neighbourhood-specific and often provided by real estate agents, who are not without bias when describing the trends they are observing. Lastly, Canada is witnessing a transformative change in its history with respect to housing. Demand from immigration and natural population growth have absorbed all of the housing supply. It is likely that first-time home buyers in major markets such as Vancouver and Toronto convert to home renters rather than owners much like established U.S. markets such as New York or Chicago.

Analysis

HOUSING COSTS

*How has the cost of housing changed over time?*

1. Track the cost of home ownership in the CMAs
   1. Determine how prices have changed over time
      1. Use dbResPriceIndex2017-2020.csv
      2. We can also use CREA data that goes back to 2005 <https://www.crea.ca/housing-market-stats/mls-home-price-index/hpi-tool/>
2. Track the rental rate averages in the CMAs
   1. Determine average rent by unit type
      1. Use dbAvgRent2009-2019.csv
   2. Determine how vacancy has changed
      1. Use dvVacancy2009-2019.csv

DEMOGRAPHICS

*How has immigration impacted housing prices?*

1. Track population at CMA level
   1. Determine which cities are growing fastest by tracking CMA population growth
      1. Use dbPopEstimatesByCMA2009-2019.csv
2. Track immigration at CMA level
   1. Determine how much immigration contributes to population growth by CMA
      1. Use dbImmigrationByCMA2009-2019.csv

*How has household income changed in the CMAs we are tracking?*

1. Track median household income by family type
   1. Determine how income for different family types is changing by CMA
      1. Use MedIncomeByCMA2007-2017.csv

*How have families changed in the CMAs we are tracking?*

1. Track changes in family composition
   1. Determine the trends for families with no children, 1 child, 2 children, 3 children
      1. Use dbFamilyComposition2007-2017.csv

HOME OWNERSHIP

1. Track trends in age groups for home owners and renters
   1. Determine which age group is owning houses or renting
      1. Use <https://www.cmhc-schl.gc.ca/en/data-and-research/data-tables/households-age-maintainer-tenure-canada-pt-cmas>
2. Track the household type that is owning or renting
   1. Determine if couples with/without children are owning or renting
   2. Determine if multiple families are living in one house
   3. Determine if people are living alone
   4. Determine if people are renting together as two or more persons
      1. Use <https://www.cmhc-schl.gc.ca/en/data-and-research/data-tables/households-type-tenure-canada-provinces-territories-cmas>
3. Analyze first-time home buyers by CMA
   * 1. Use dbFTHB2019.csv

Challenges

* Finding the same frequency/time period for the data

Conclusions

What did you learn about your dataset?