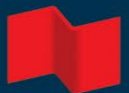


Alberta...Canada's Solution to Our Population Trap

CEA's Transportation Connects Alberta Conference

Presented by: Angus Watt Advisory Group
March 11, 2024



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Research provided by:
Stéfane Marion, Chief Economist & Strategist,
National Bank

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*****The information contained herein was obtained from sources which we believe to be reliable. However, this information is not guaranteed by National Bank Financial Inc. and may be incomplete.

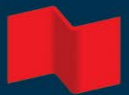


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Why is Inflation Bad?



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How?



Tax on individuals

Reduced purchasing power
Spending more to receive less



Tax on industry

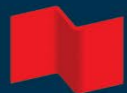
Increased cost of goods and services
Profits shrink unless they can increase productivity
Cost of inflation is passed on to the consumer



Tax on governments

All levels of government have some sort of debt
Cost of debt servicing increases, leads to:

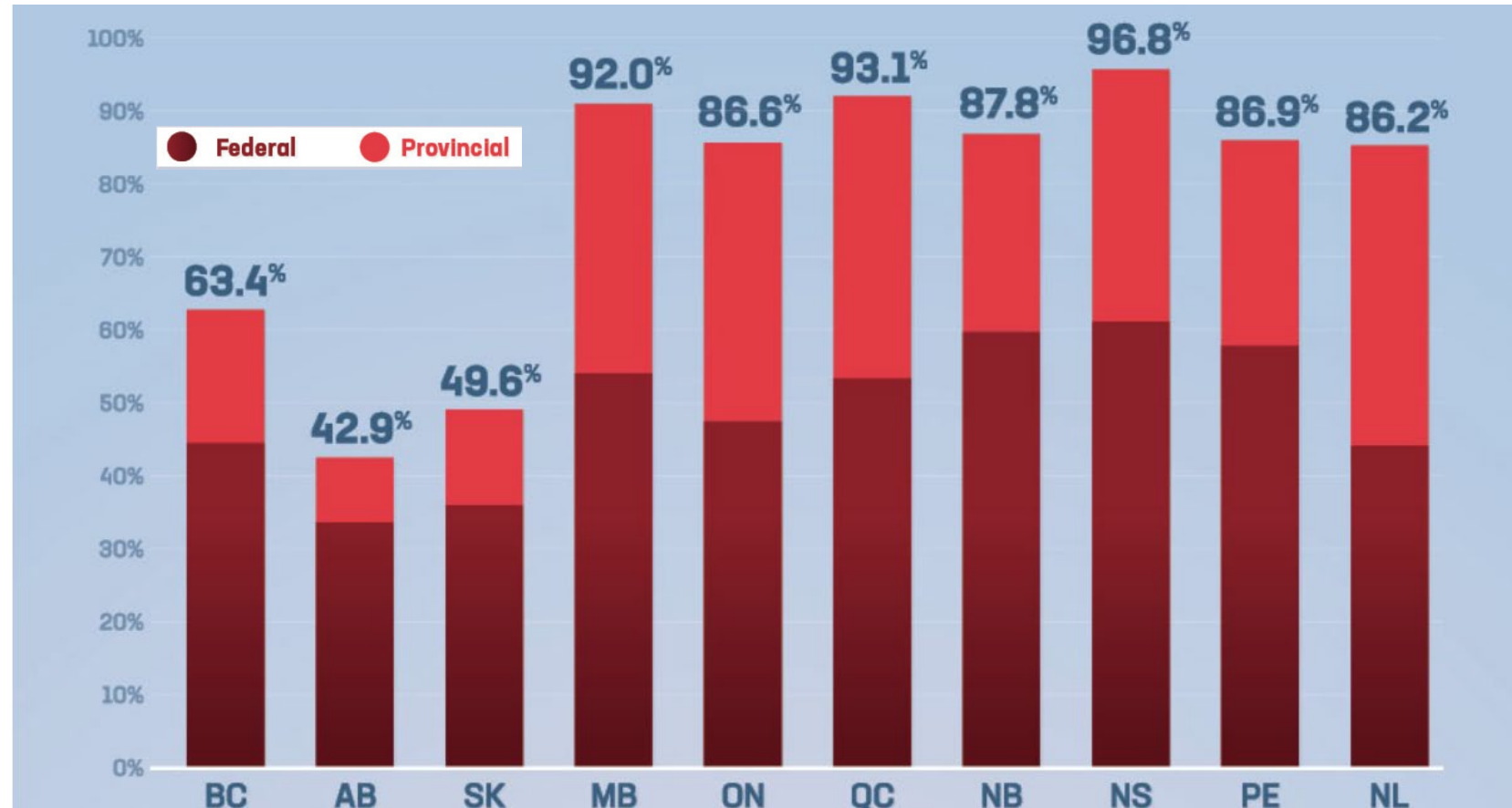
- Decreased spending
- Cut programs
- Increased taxes



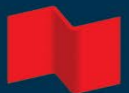
Canada's Debt Burden, 2023/24

Combined Federal and Provincial Debt as a share of the economy

- Combined federal and provincial debt interest this year (\$82bill) is equivalent to total spent on K-12 education in Canada during 2020-21.



Source: <https://www.fraserinstitute.org/file/growing-debt-burden-for-canadians-2024-infographic-1-optjpg>

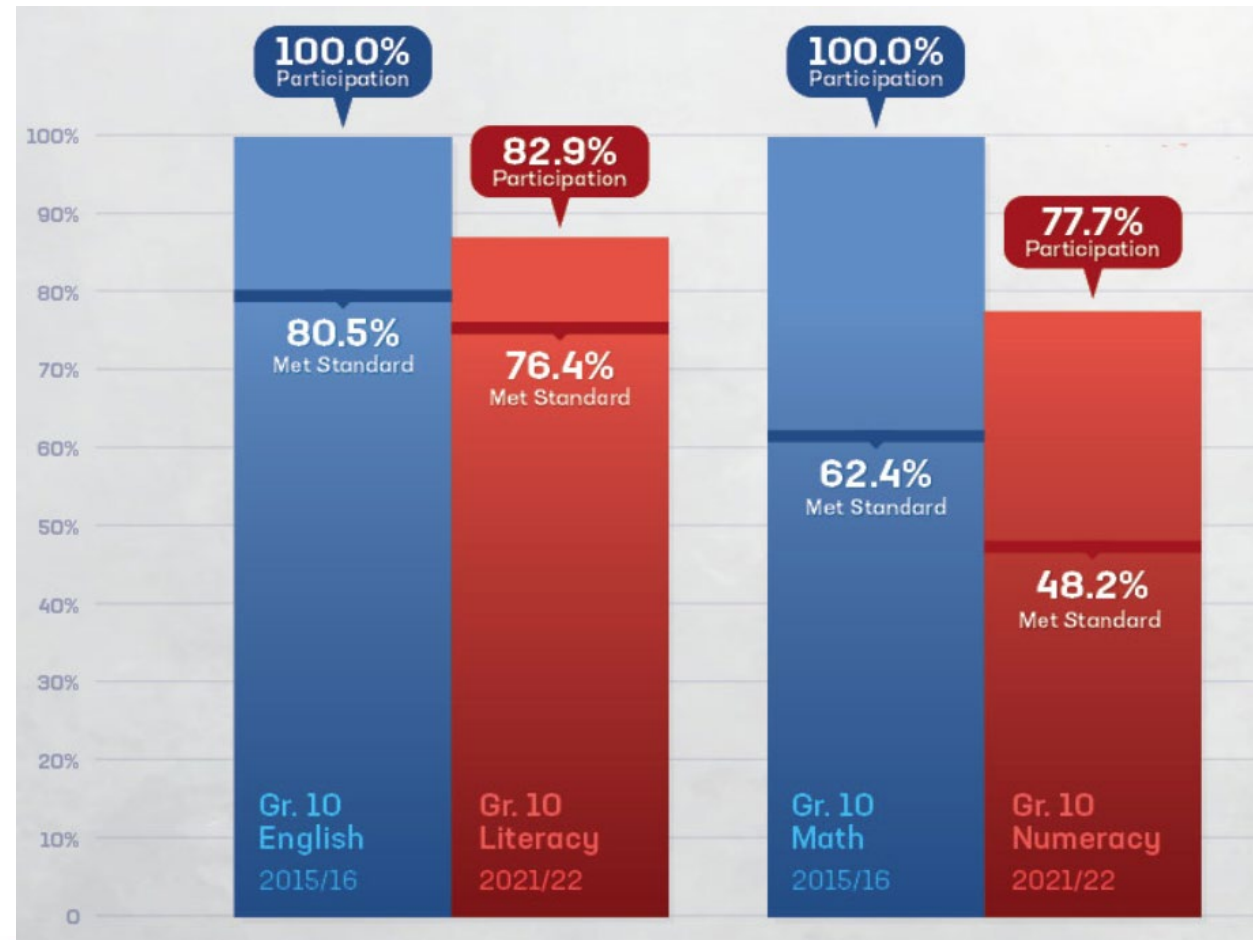


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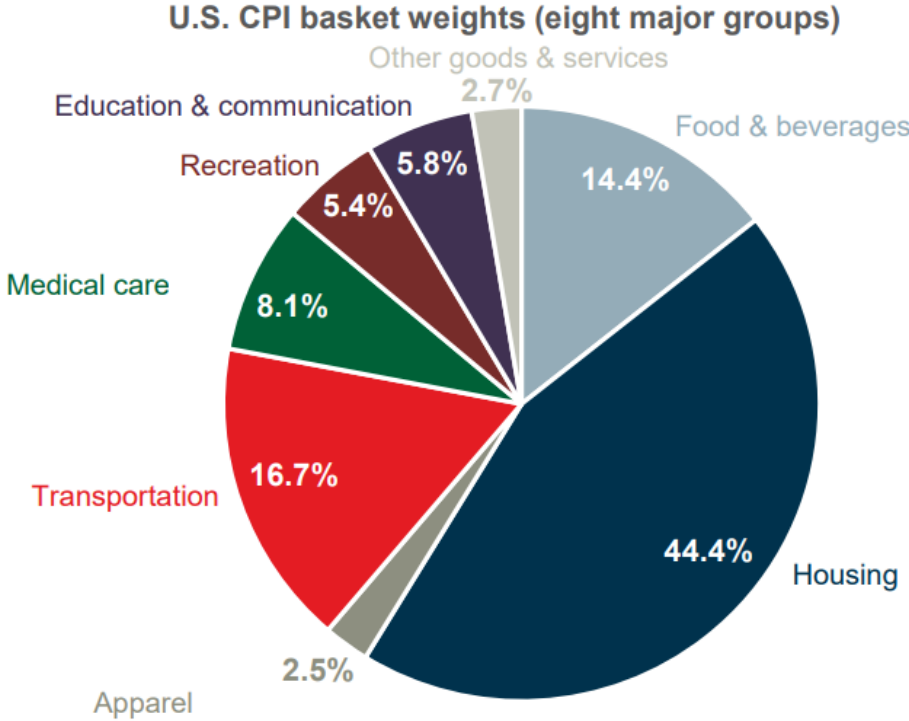
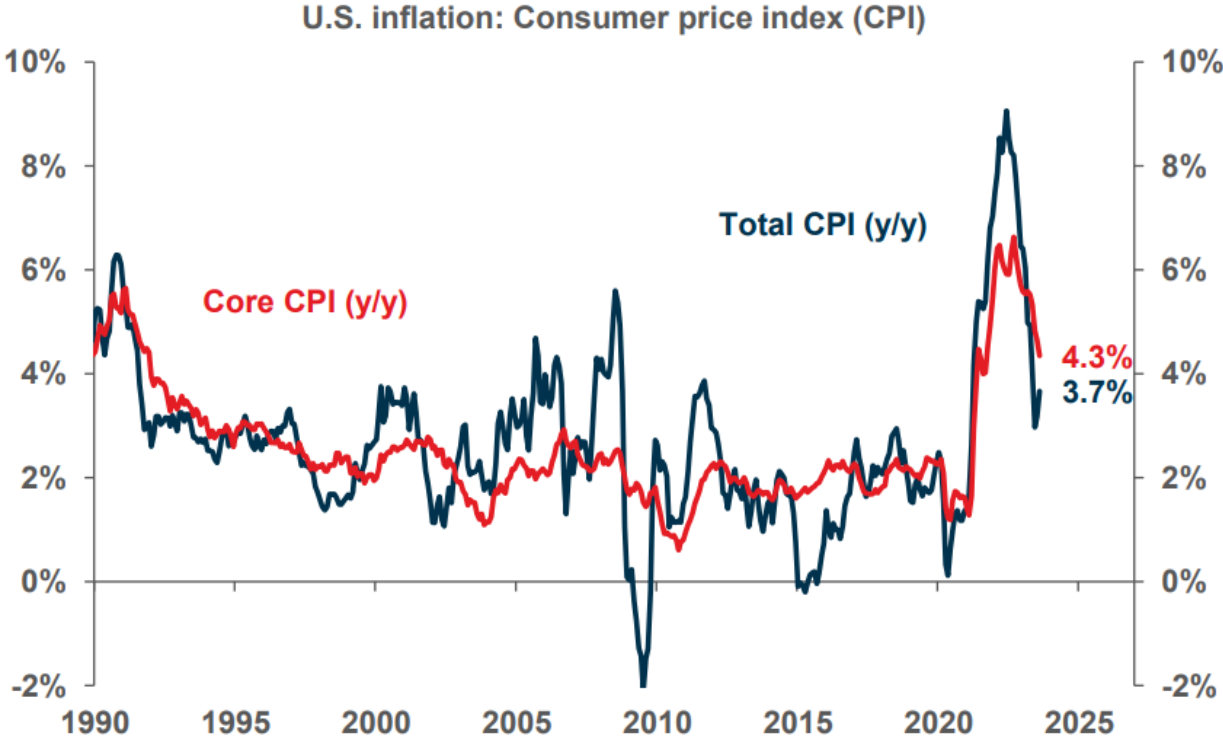
Participation Rates in Student Testing Falling in BC

- Fewer than ½ of BC grade 10 students are now proficient in numeracy

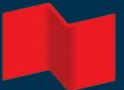


Source: <https://www.fraserinstitute.org/file/collapse-of-student-testing-in-bc-high-schools-infographic-opt.jpg>

US Inflation and CPI Composition



Source: National Bank CIO Office (Data via Refinitiv)

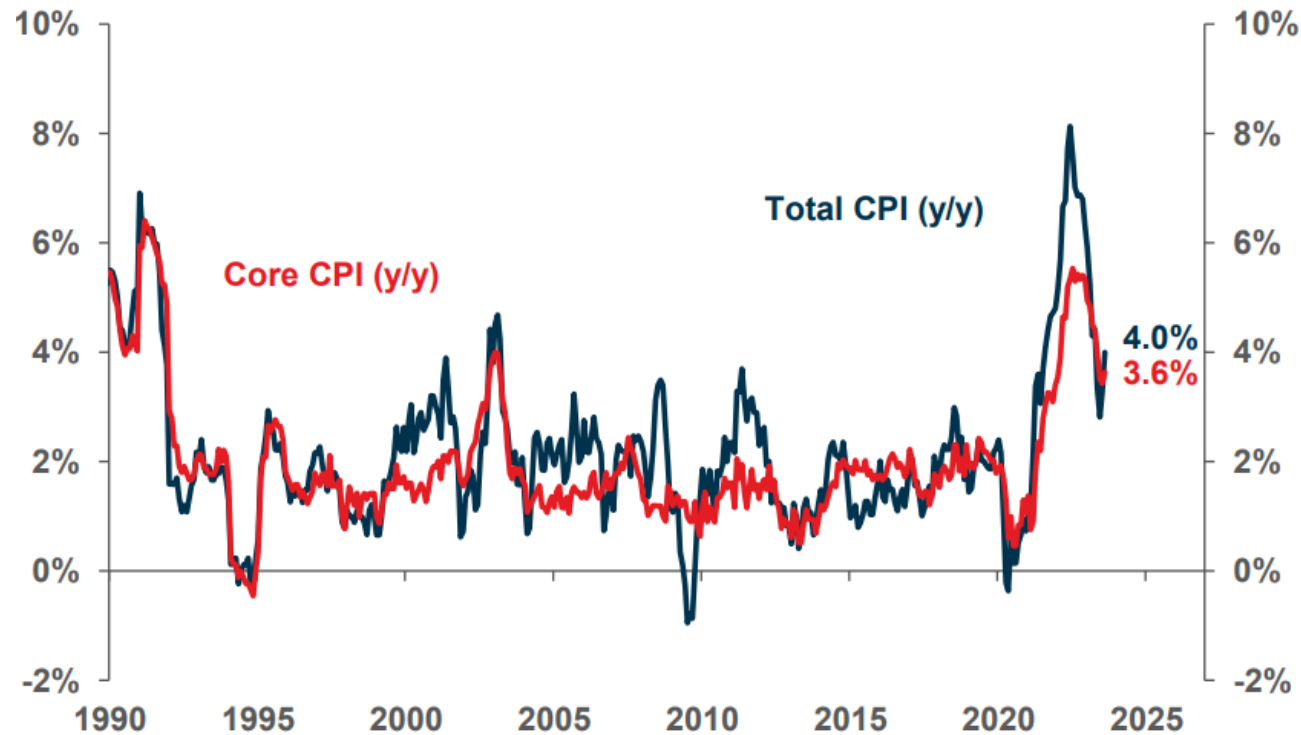


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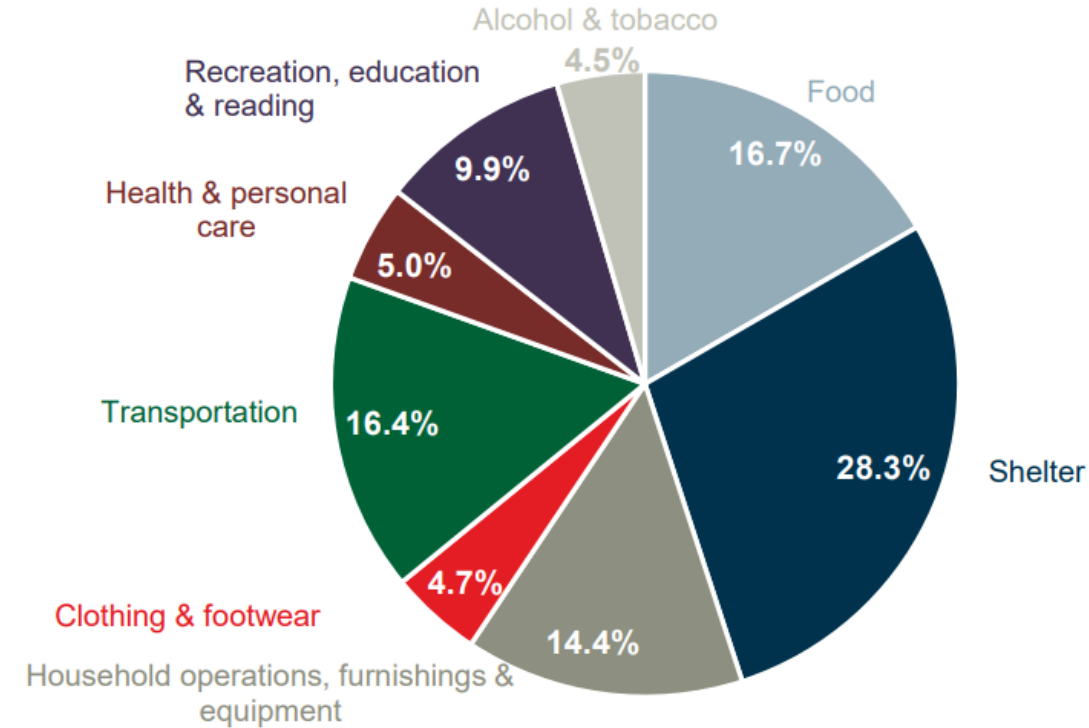
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Canada Inflation and CPI Composition

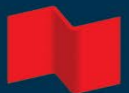
Canada inflation: Consumer price index (CPI)



Canada CPI basket weights (eight major groups)



Source: National Bank CIO Office (Data via Refinitiv)



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Mortgages by Interest Rate - US

- According to US Census data nearly 38% of households are mortgage free
- As of October 18, 2023, US 30-year mortgages are at 8.0%
- The average mortgage rate in the US is 3.4%

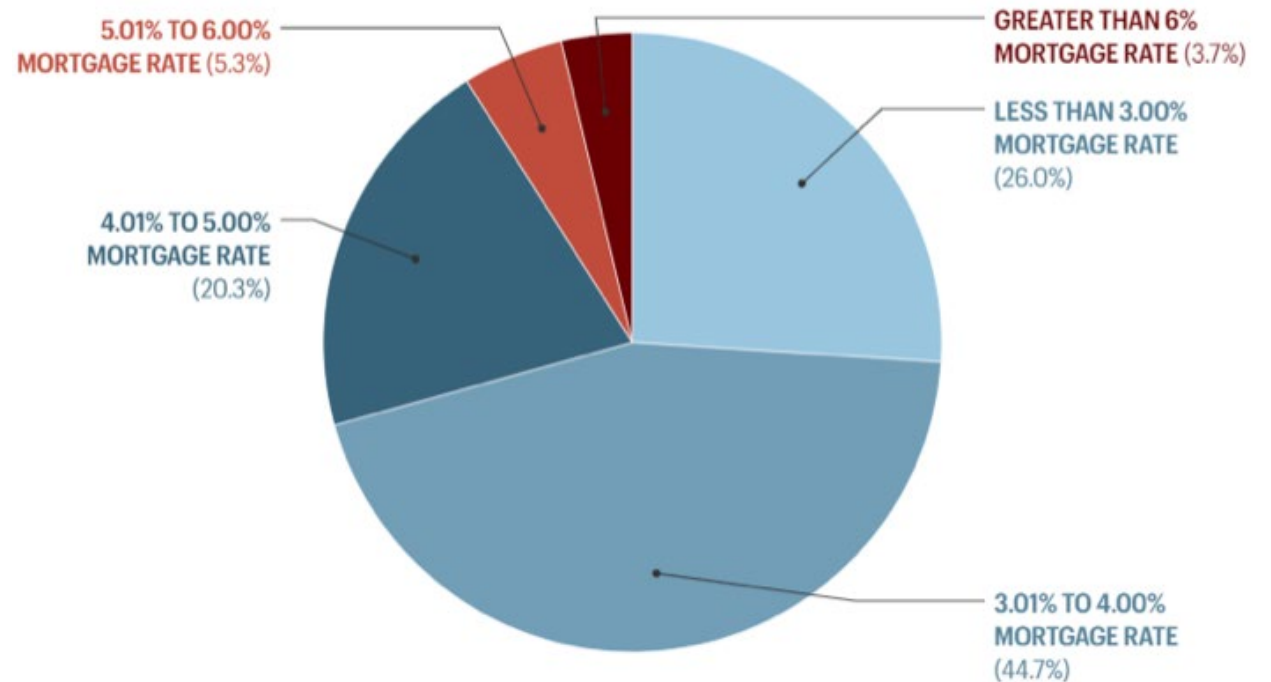
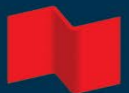


Chart: Lance Lambert. Source: Federal Housing Finance Agency, Morningstar



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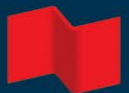
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Mortgages – Canada



- 66% of Canadians are homeowners
- 50% have a mortgage
 - 70% have a fixed-rate mortgage that is not immediately affected by higher interest rates

Bank of Canada: Financial System Review 2022

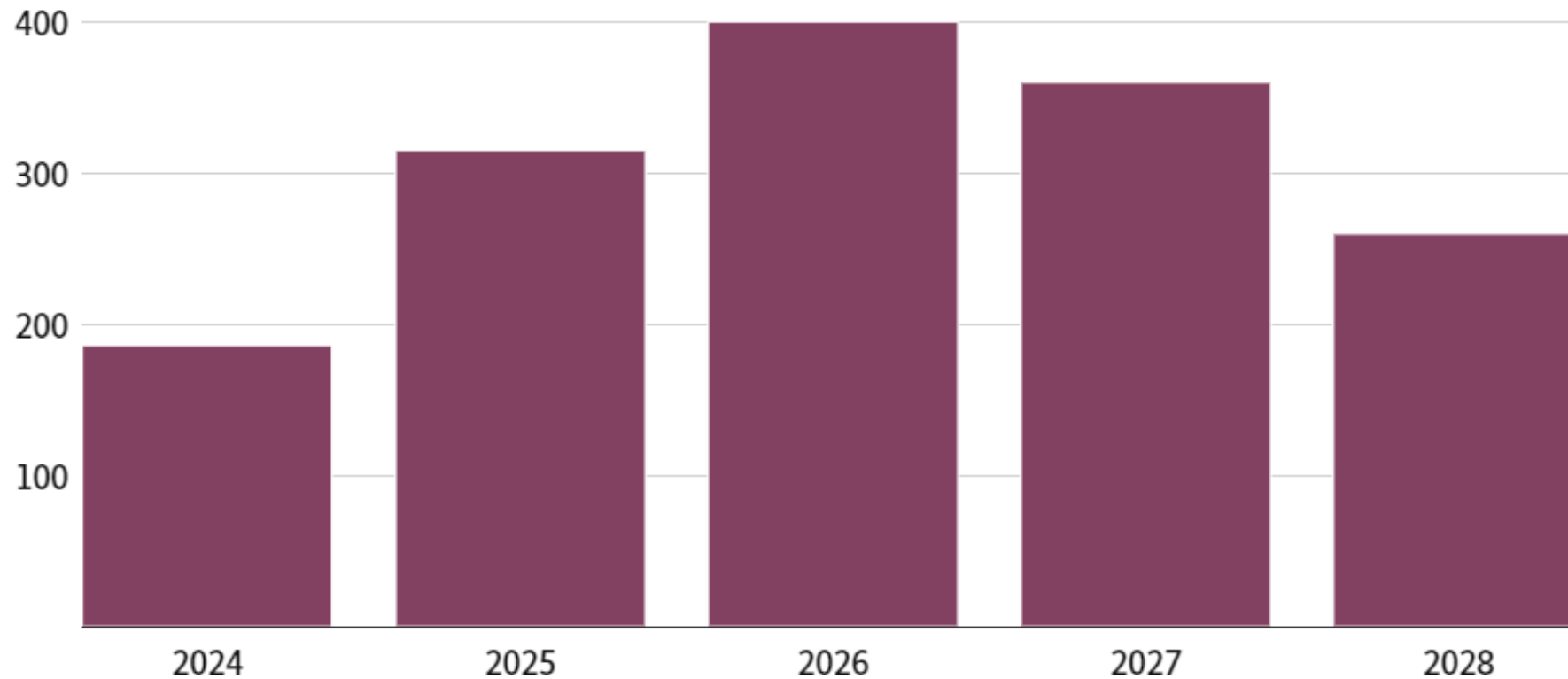


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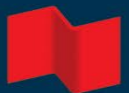
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Canadian residential mortgages up for renewal

Billions of dollars, by renewal year



Source:RBC Capital Markets



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The Pandemic Hangover



Workplace stress

Physical health

Social fear

Delay of
relationships &
marriages

Higher cost of
living

Higher cost of
family home

Delay of starting families:
average age of first-time
mothers: 31.6 (2022) versus
26.7 (1976)

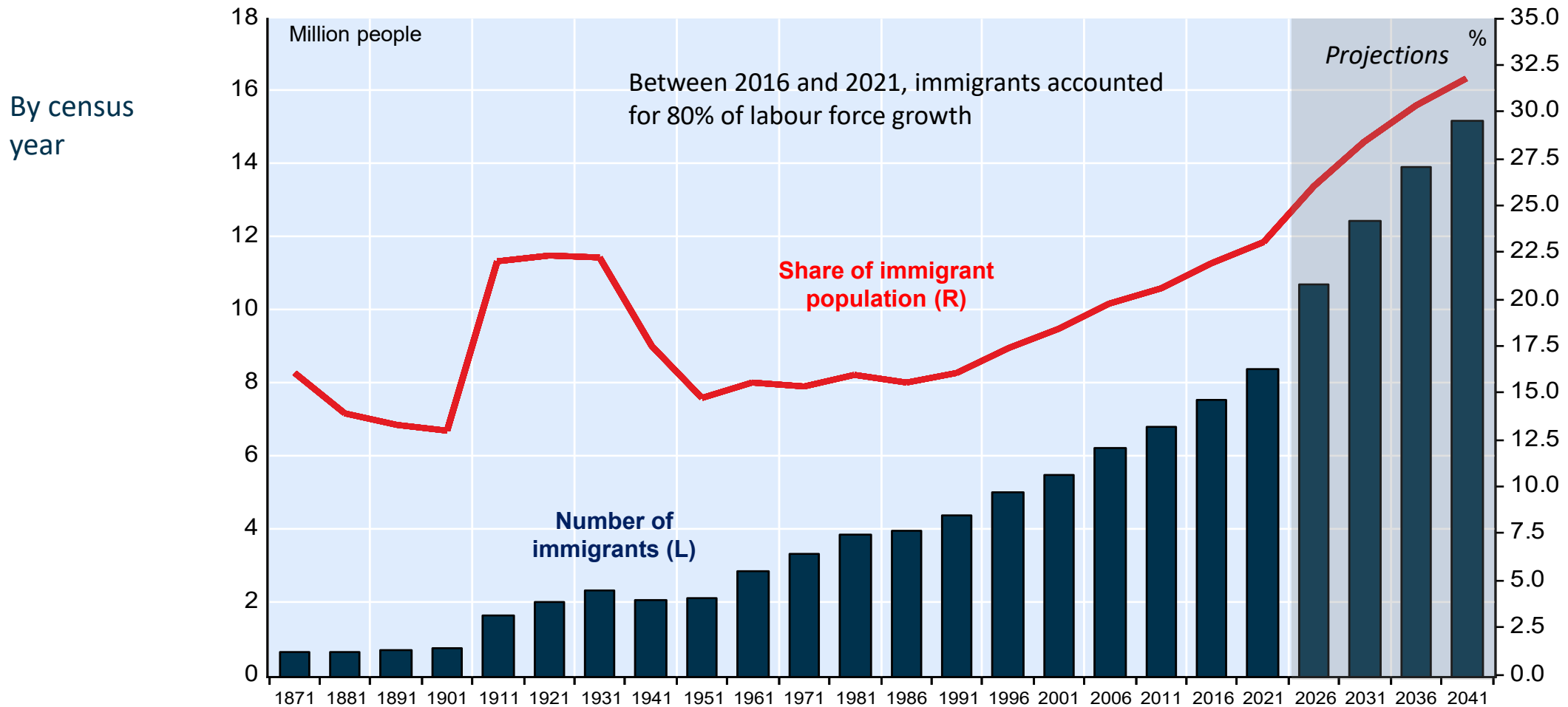
Workplace shortages: need
100,000 agriculture workers
in Canada by 2030



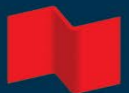
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Canada: A growing share of the population is immigrants



NBF Economics and Strategy (data via Statistics Canada
<https://www150.statcan.gc.ca/n1/daily-quotidien/221026/g-a001-eng.htm>)

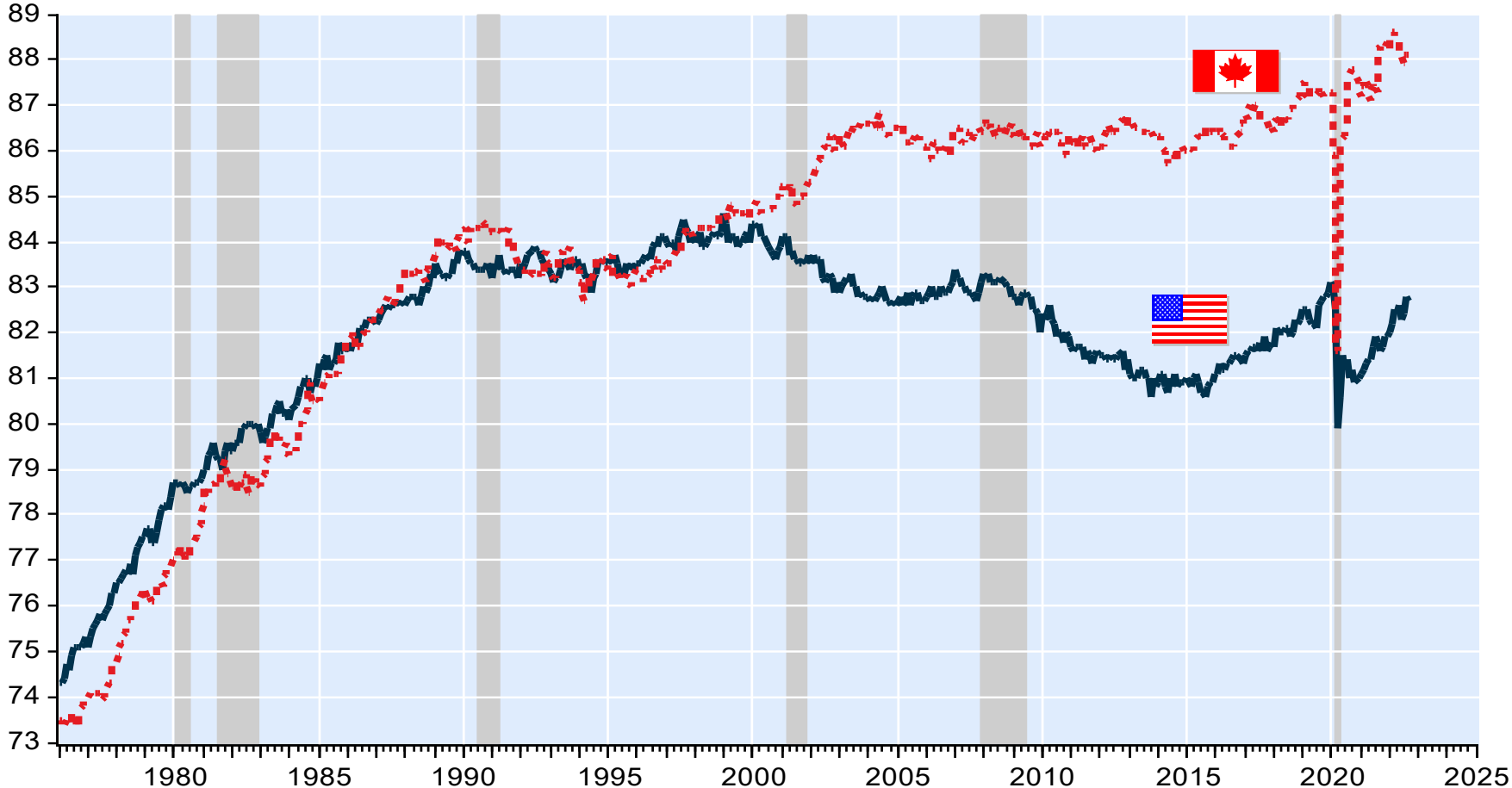


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Canada: Labour force participation near a record high

Labour force participation rate for population aged 25-54



NBF Economics and Strategy (data from Statistics Canada, U.S. Bureau of Labor Statistics)

Canada's Immigration Targets

2022: 431,645
2023: 465,000
2024: 485,000
2025: 500,000

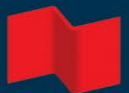
Challenges are many:

- schools
- healthcare
- housing

We will need an additional 3.5 million homes above the current home-building projections by 2030 – CHMC.

Do we have the labour capacity to build, fill and run these new schools, hospitals and homes?

Statistics Canada

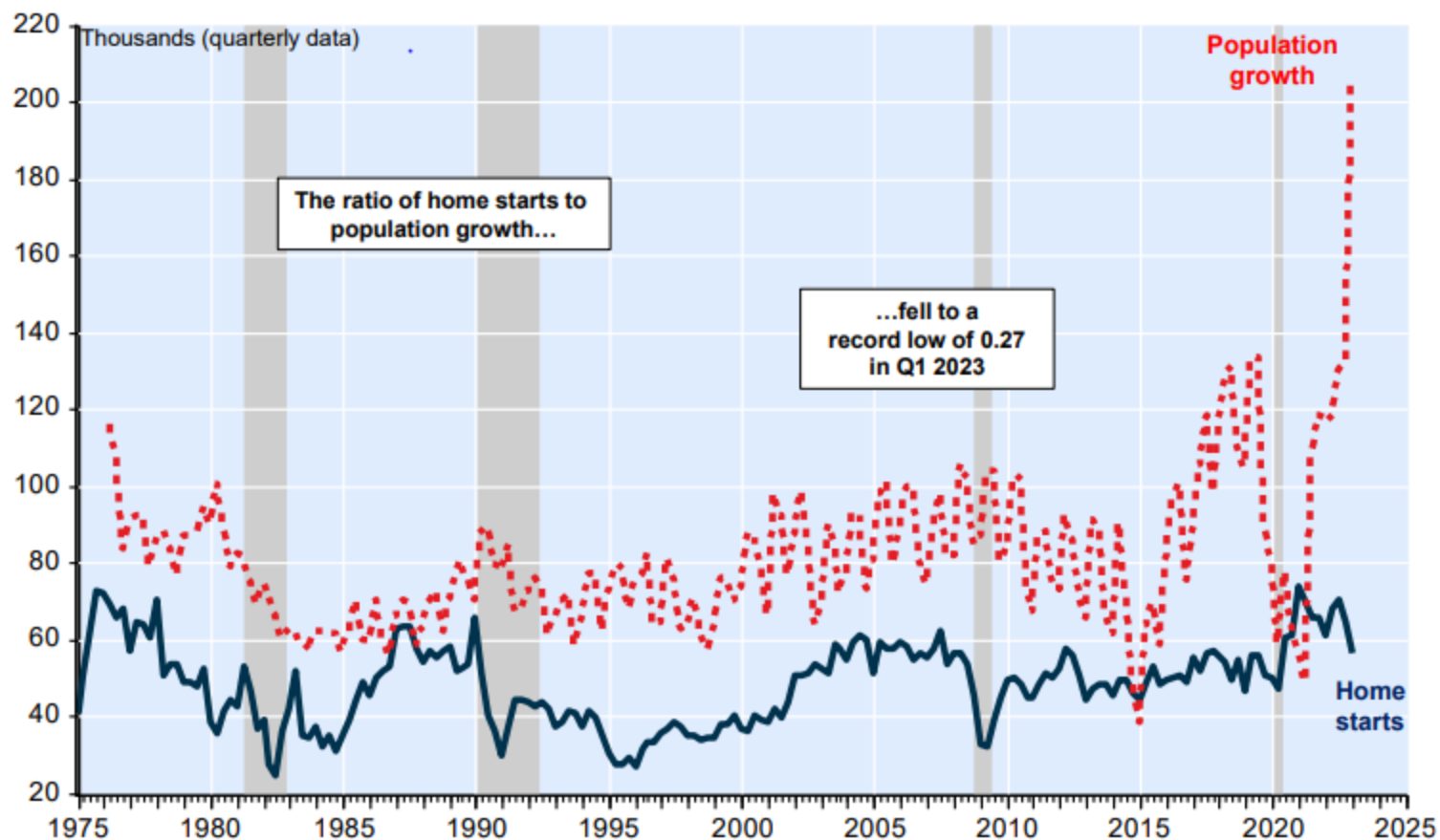


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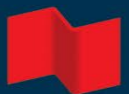
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Canada: Homebuilders aren't keeping up with Population Growth

Quarterly change in population aged 15+ vs. quarterly residential home sales



NBF Economics and Strategy (data via Statcan and [FRED](#))

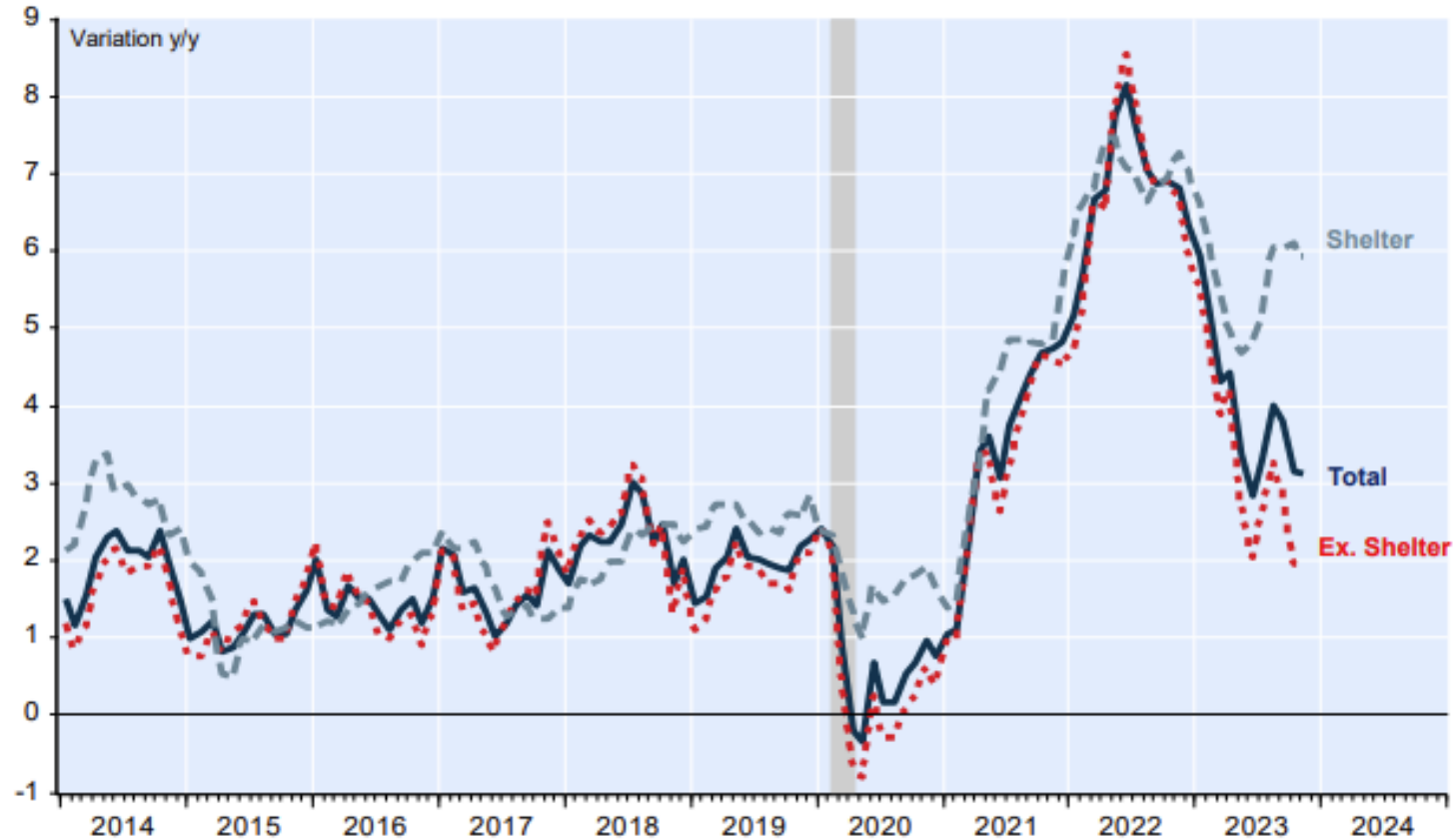


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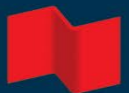
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Canada: Shelter costs keep inflation above 3%

CPI inflation: Total, housing and ex-housing



Source: NBF Economics and Strategy (data via Statistics Canada)

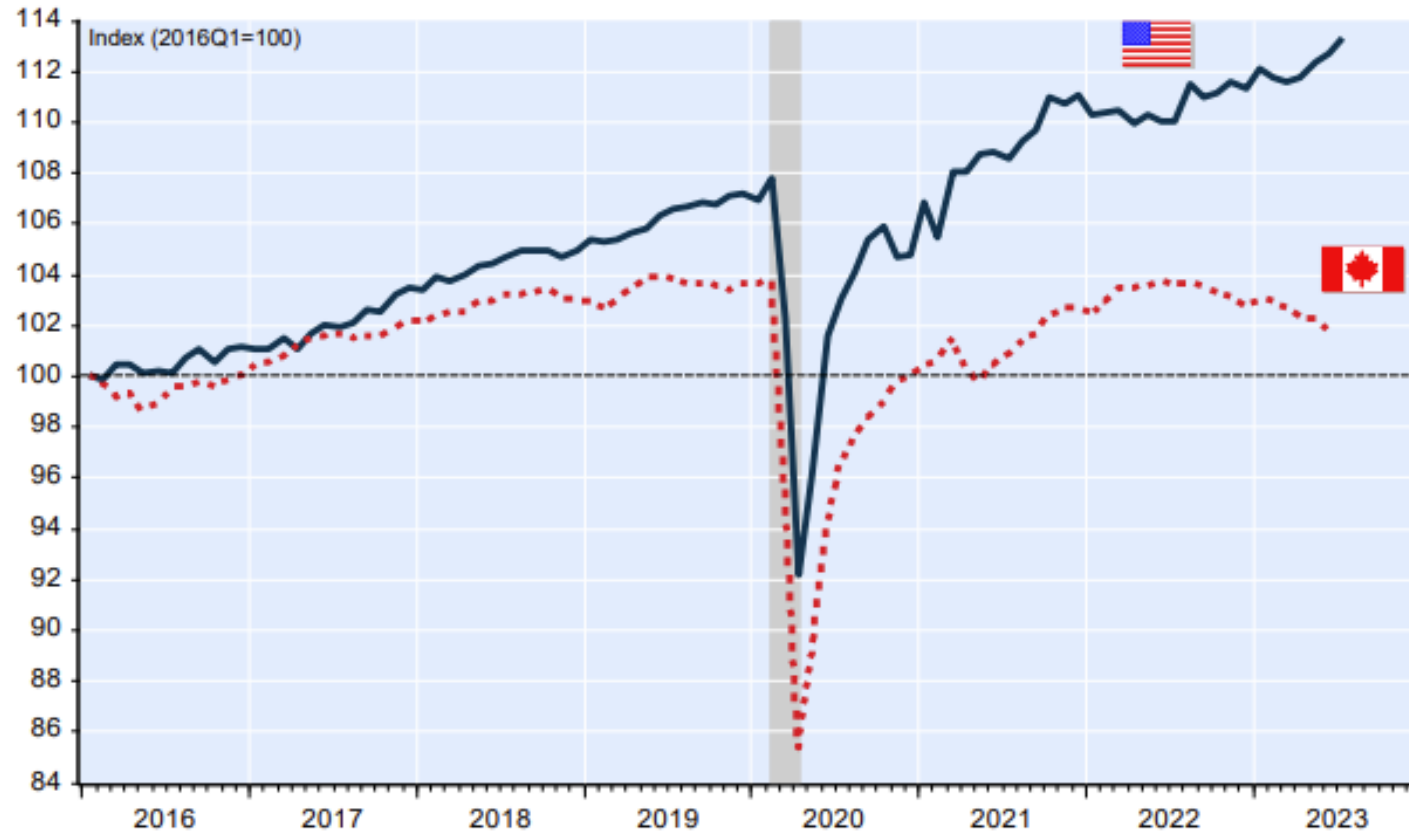


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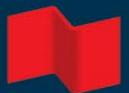
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Canada: Standard of living at a standstill

Real GDP per capita



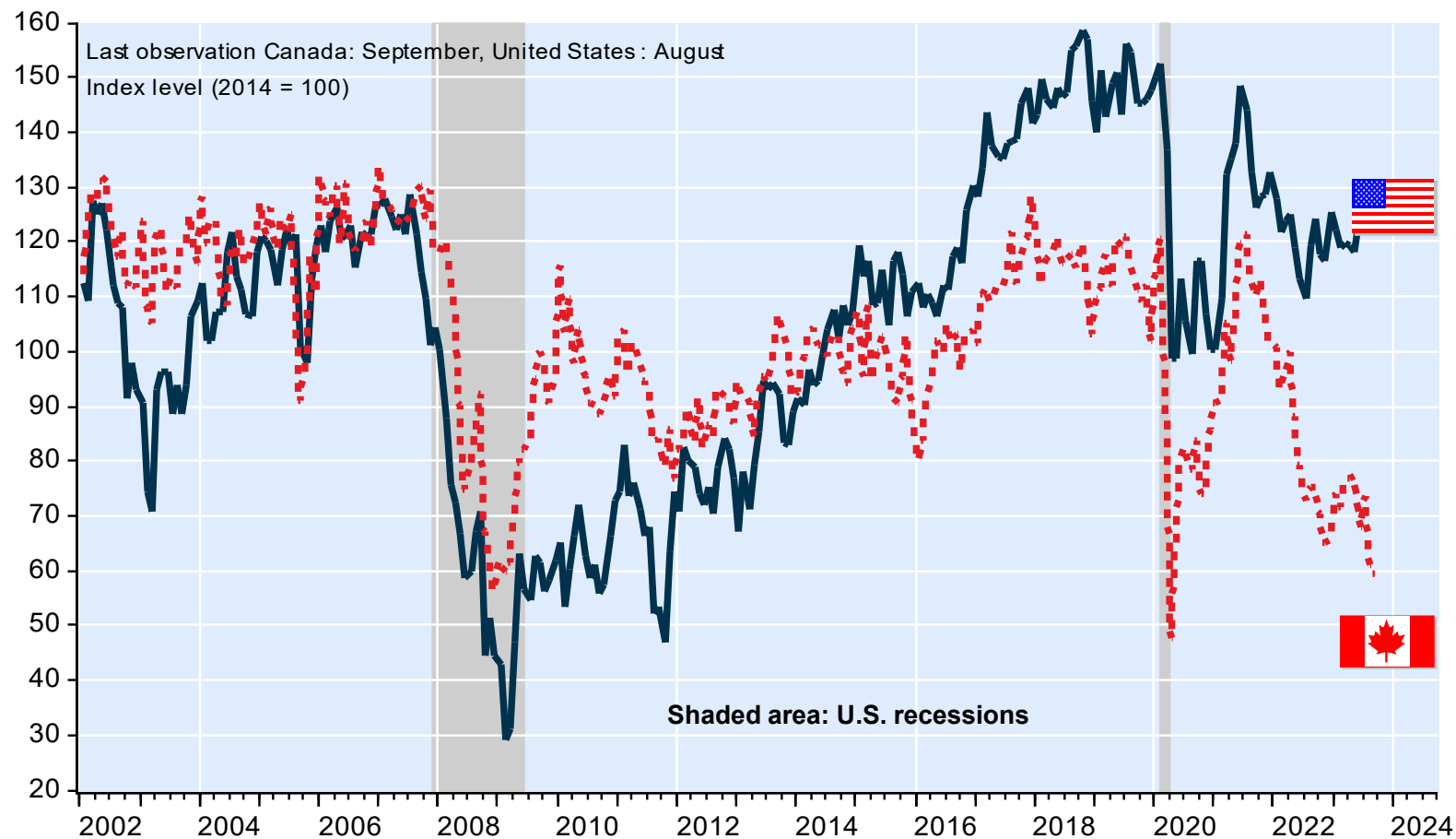
Source: NBF Economics and Strategy (data via Statistics Canada and BEA)



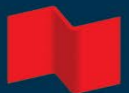
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Consumer Confidence is Falling



NBF Economics and Strategy (data from Conference Board of Canada)

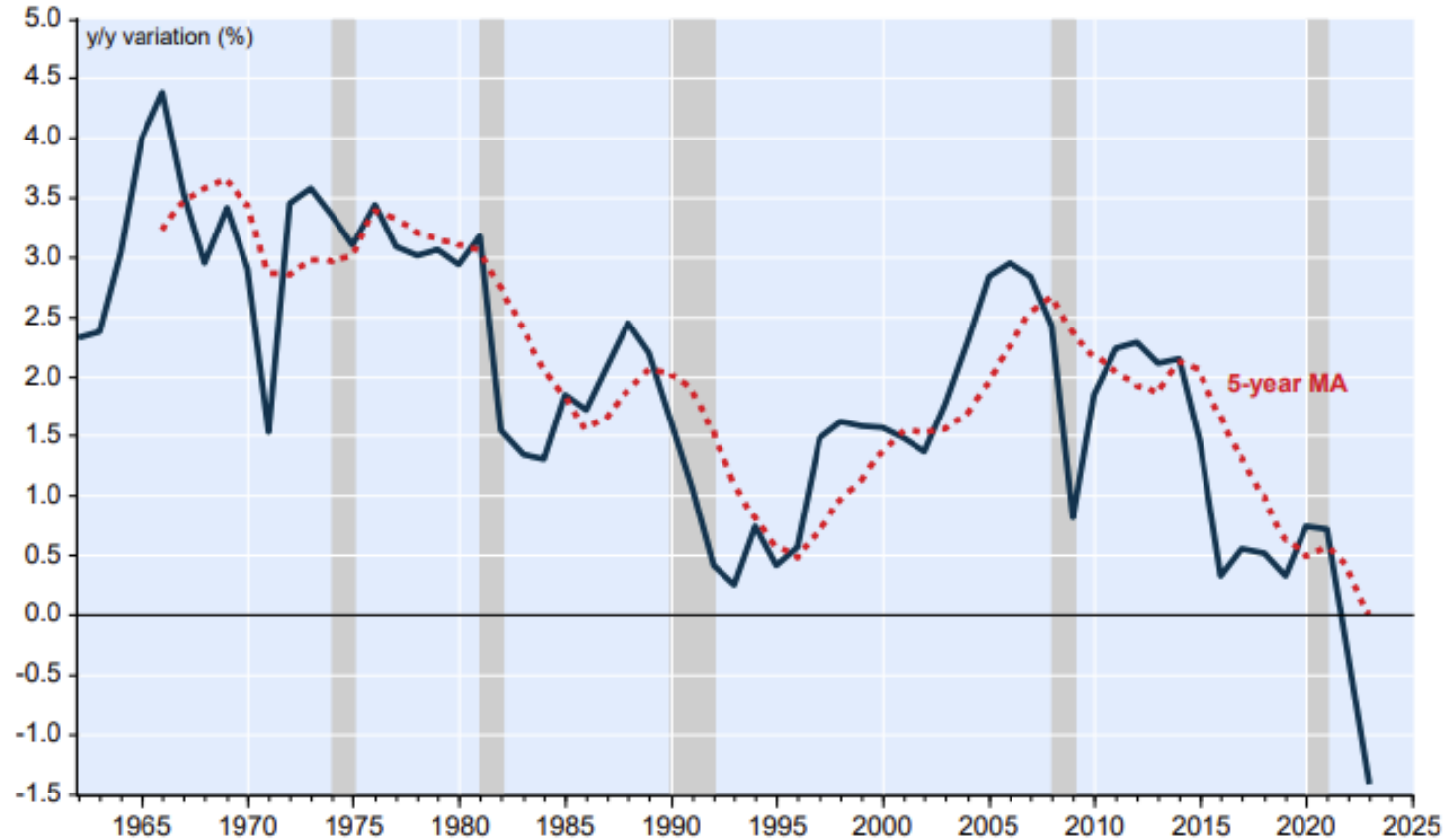


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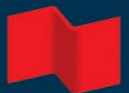
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Canada: Caught in a population trap

Net real capital stock at year-end per person, all sectors (NBF estimation for 2023)



Source: NBF Economics and Strategy (data via Statistics Canada 34-10-0163-01, 36-10-0096-01, 17-10-0009-01)



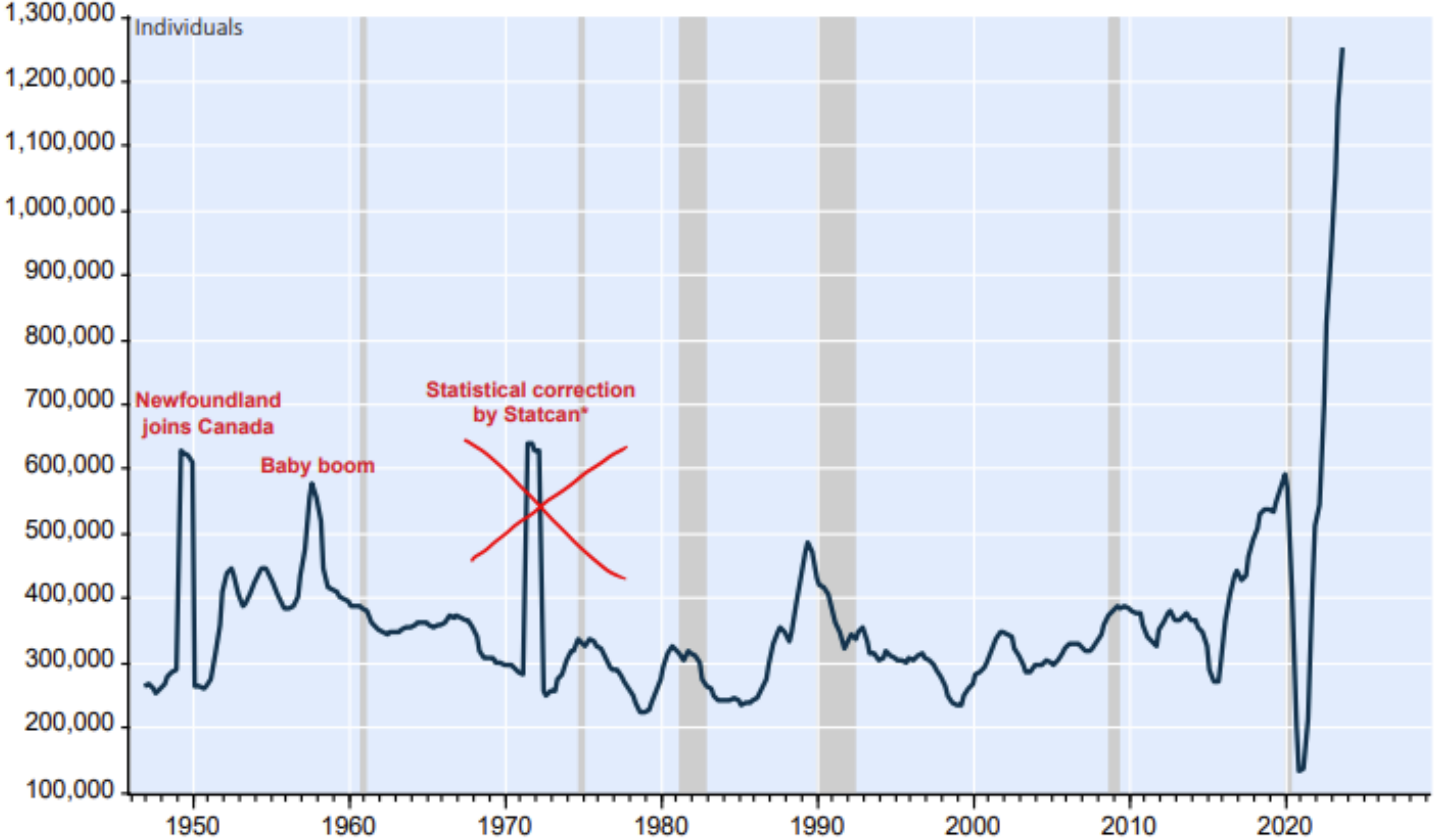
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Canada: Unprecedented Surge

Annual growth in total population

* 1972 is a statistical correction from a re-benchmarking by Statistics Canada



Source: NBF Economics and Strategy (data via Statistics Canada)

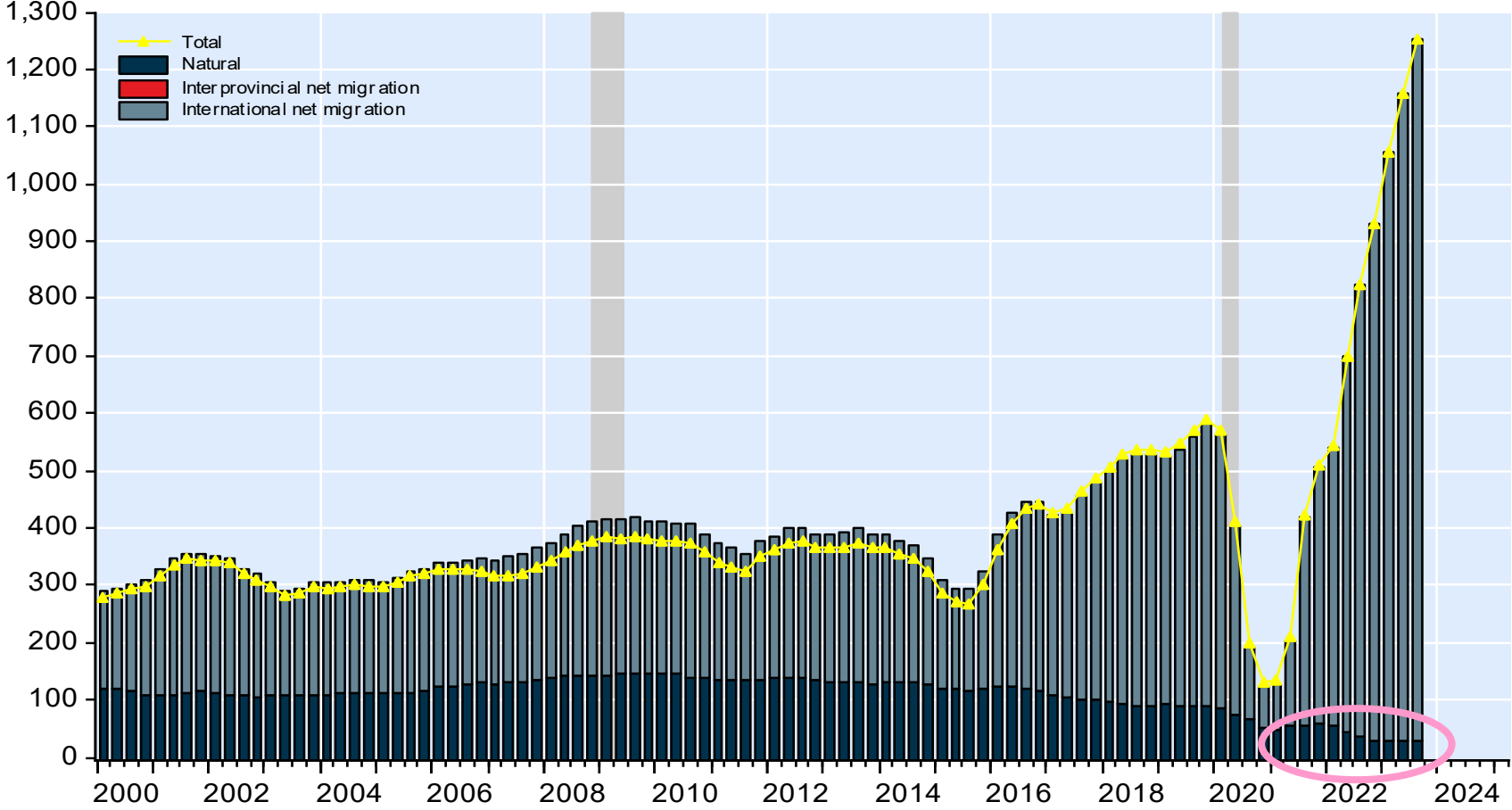


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Canada: Population growth decomposition

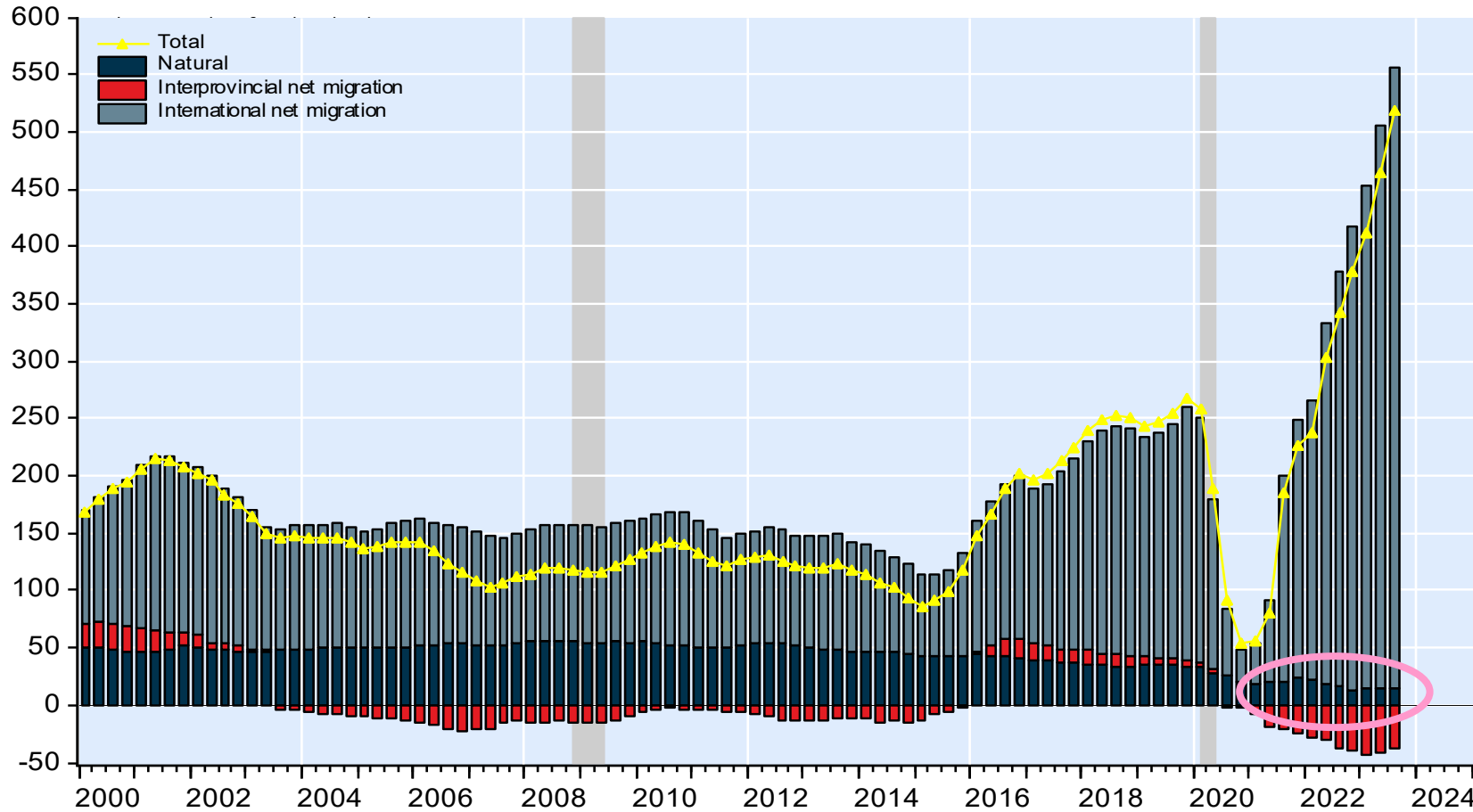
Population growth, 2023 Q3



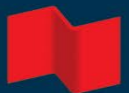
NBF Economics and Strategy (data via Statistics Canada)

Ontario: Population growth decomposition

Population growth, calendar year



NBF Economics and Strategy (data via Statistics Canada)

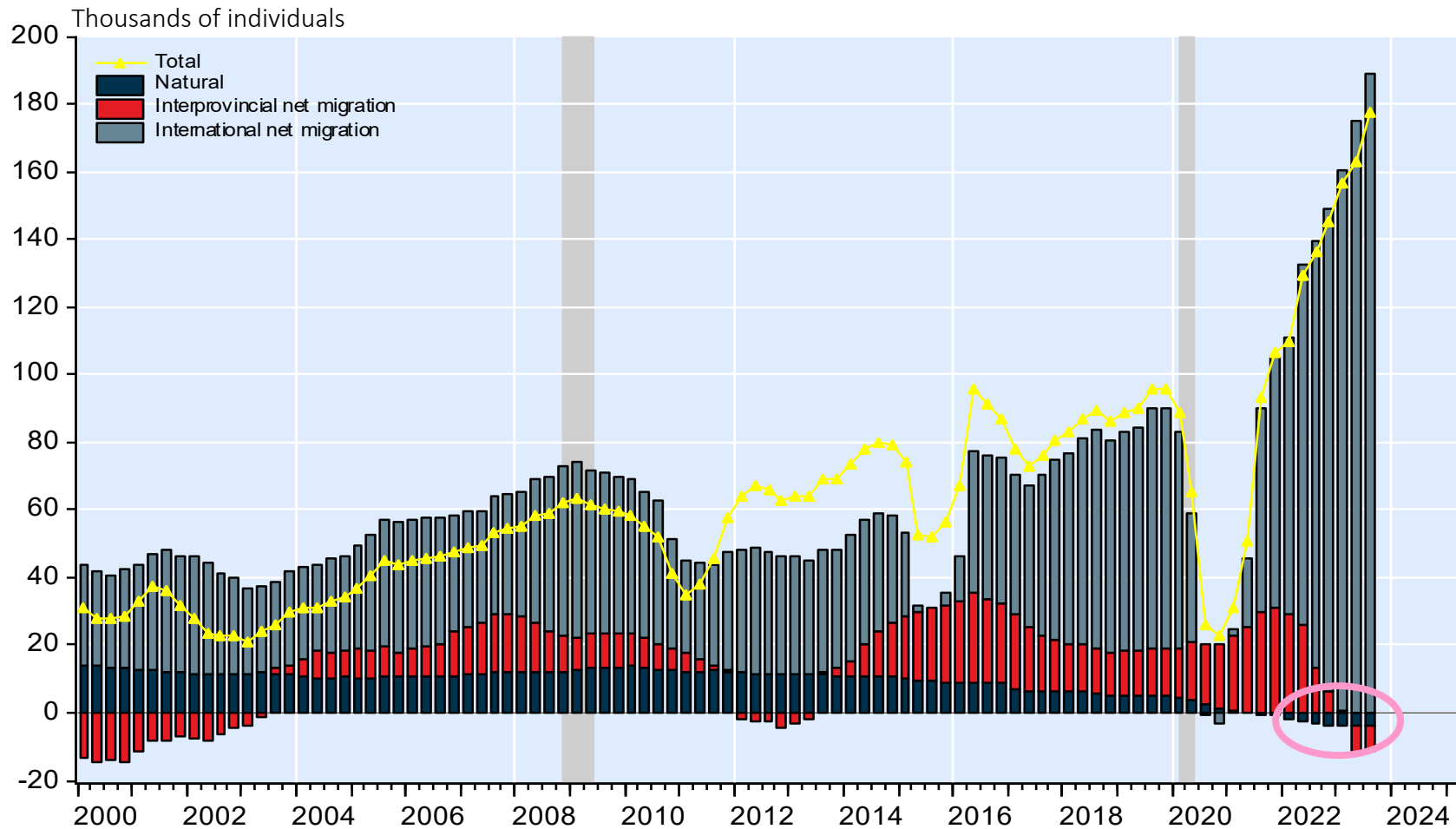


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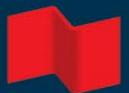
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British Columbia: Population growth decomposition

Population growth, calendar year



NBF Economics and Strategy (data via Statistics Canada)

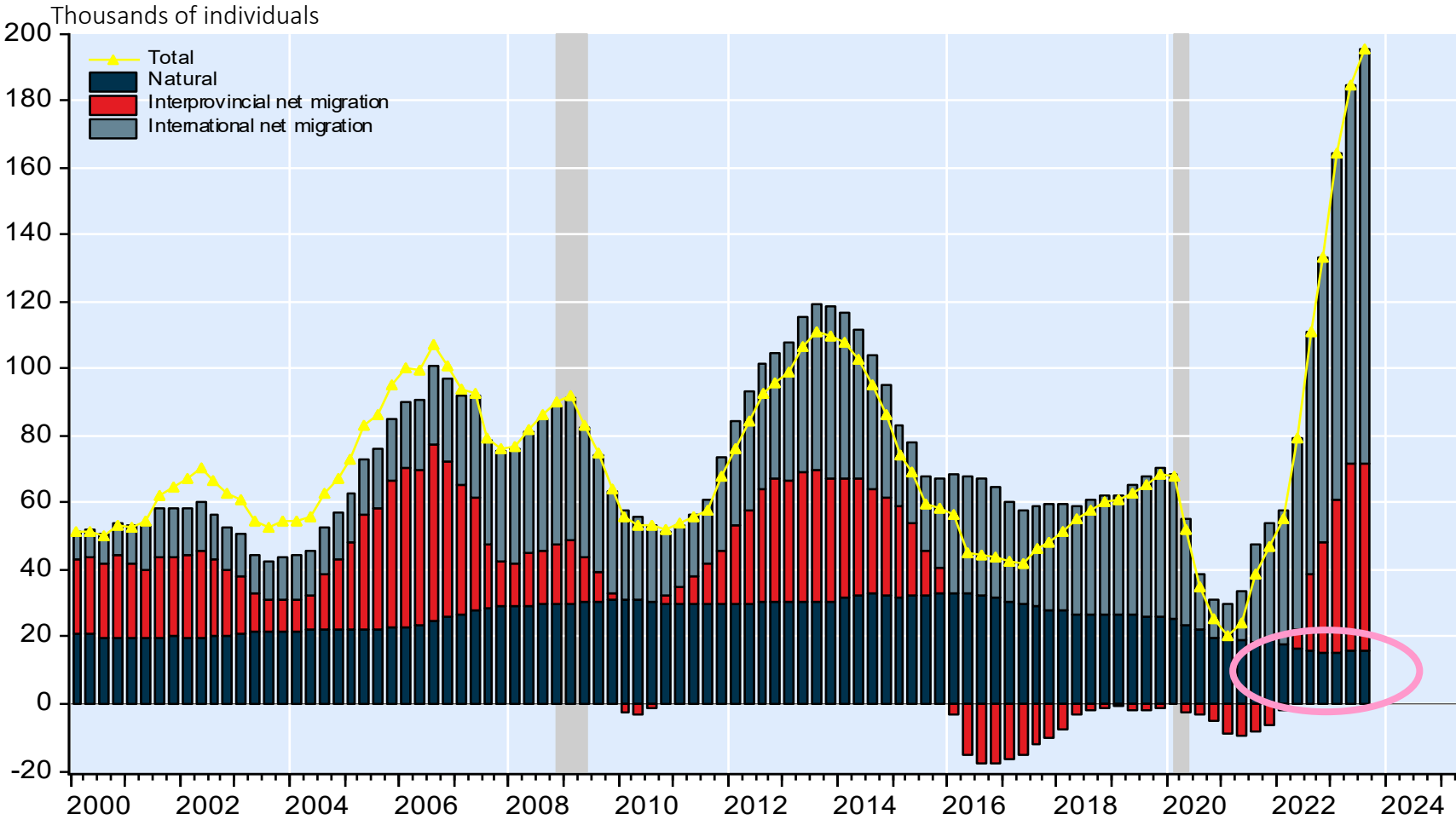


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Alberta: Population growth decomposition

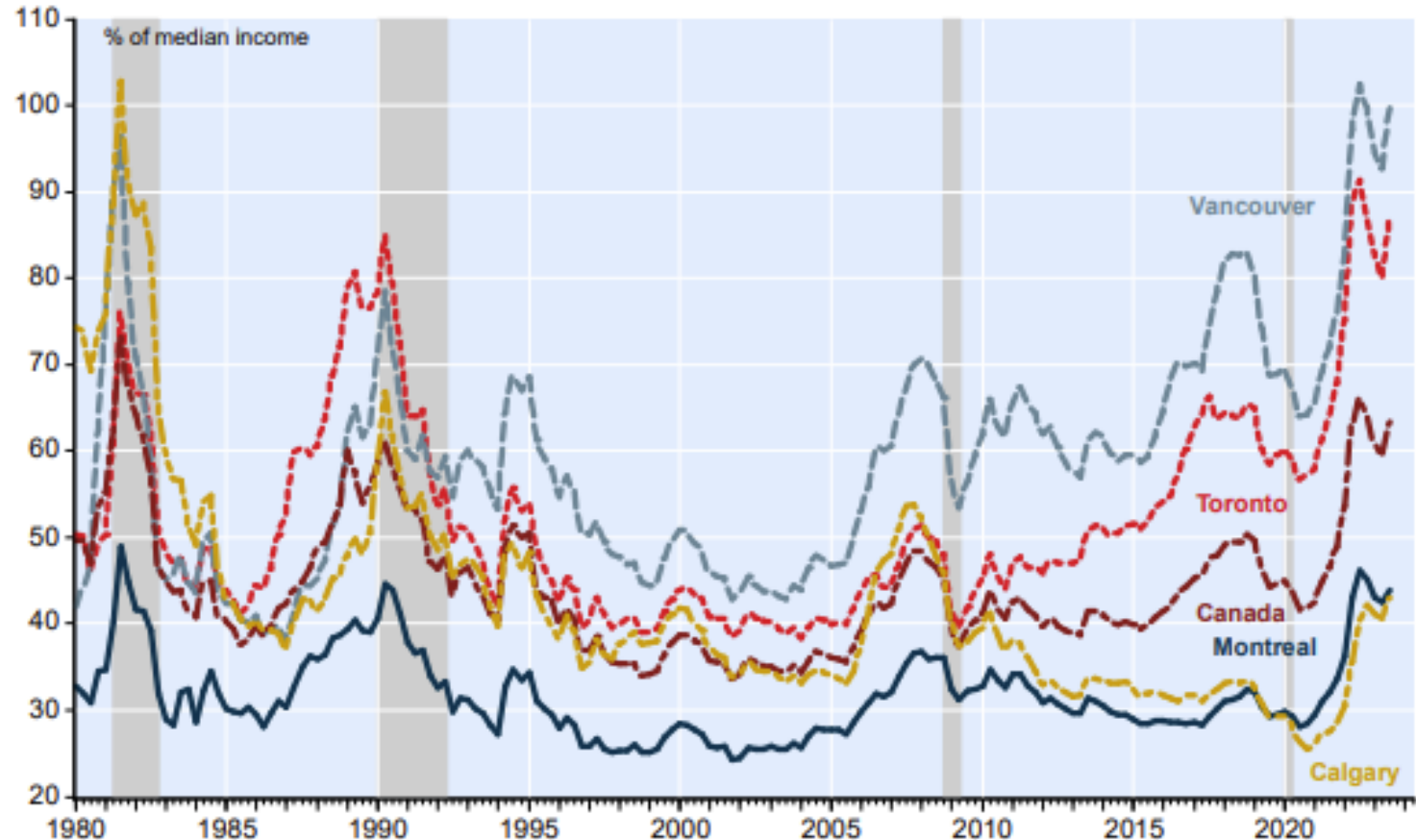
Population growth, calendar year



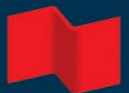
NBF Economics and Strategy (data via Statistics Canada)

Canada: Q3 2023 Perspective on Housing Affordability

Monthly mortgage payment on median home price, all types of dwellings (25-year amortization, 5-year term)



NBF Economics and Strategy (data via Statistics Canada, Teranet-National Bank, CREA)



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Canada: Q3 2023 Housing Affordability (non-condo)

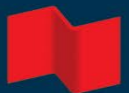
City	Average price of home in metropolitan market	Household annual income needed	Months of saving for downpayment (10% savings rate)	Mortgage payment as % of income (MPPI)
Toronto	\$1,219,008	\$254,216	311	89.1%
Vancouver	\$1,673,264	\$348,949	464	133.3%
Calgary	\$630,562	\$154,454	50	47.2%
Edmonton	\$456,068	\$112,943	30	34.1%

NBF Economics and Strategy (data via Statistics Canada, Teranet-National Bank)



“Build the highway...and they will come.”

Fasten your seatbelts, Highway 2 is about to explode
as our Province takes off.

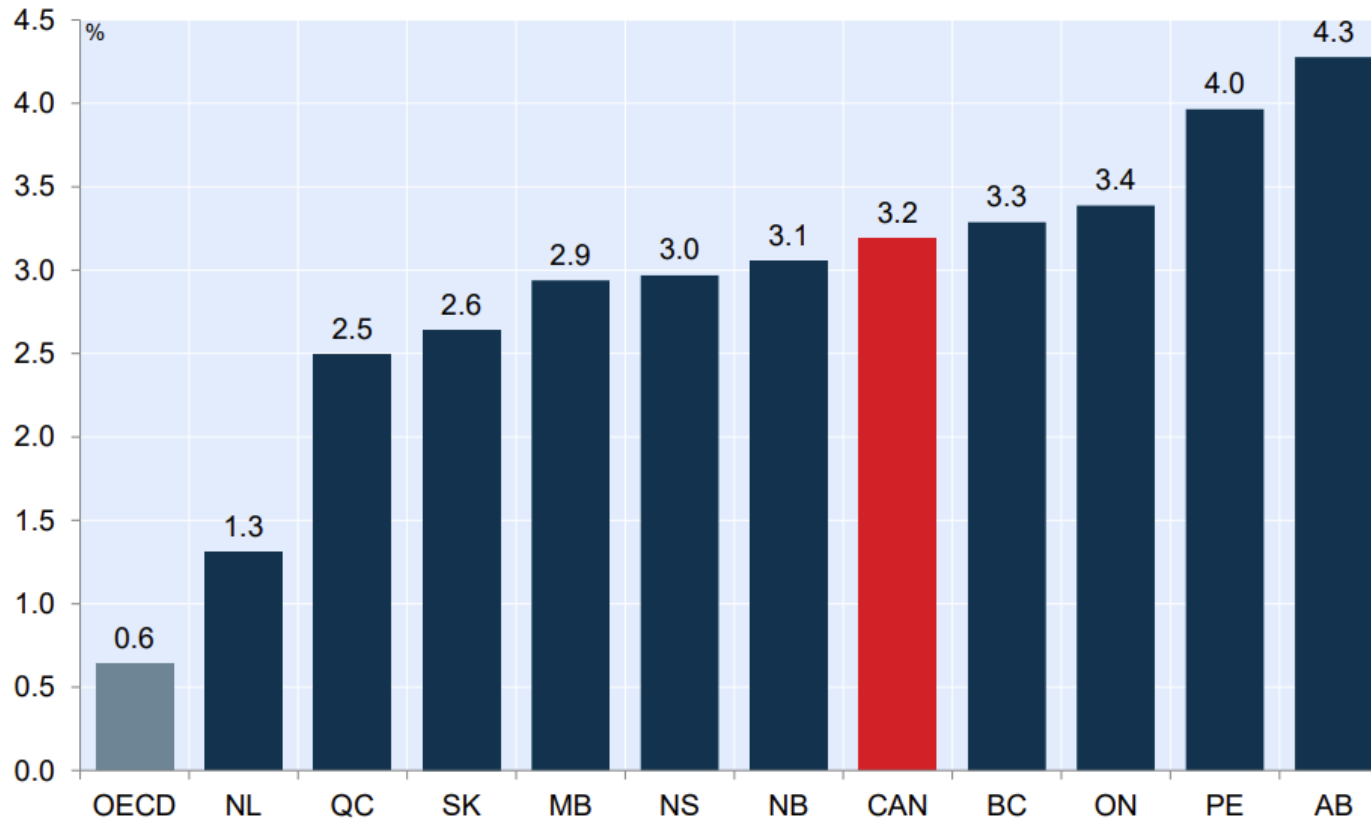


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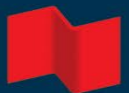
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Canada: All provinces grow at least twice as fast as OECD

Population change (2023Q3 vs 2022Q3)



Source: NBF Economics and Strategy (data via Statistics Canada, OECD)

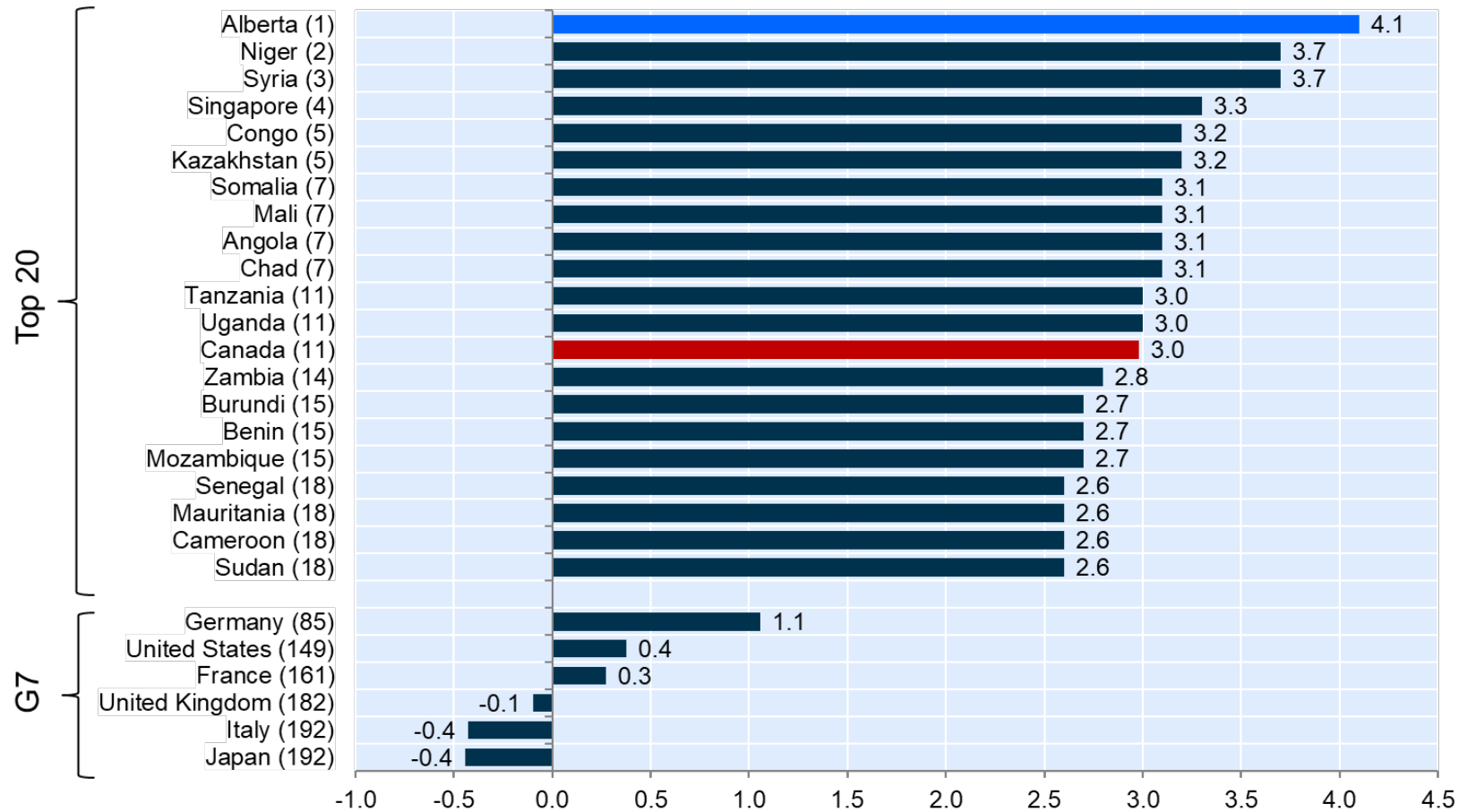


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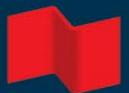
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Alberta: Population Growth is the Fastest in the World

Population growth in 2022, top 20 countries + Alberta and G7 economies (2023 data for CA and AB)



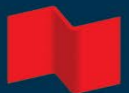
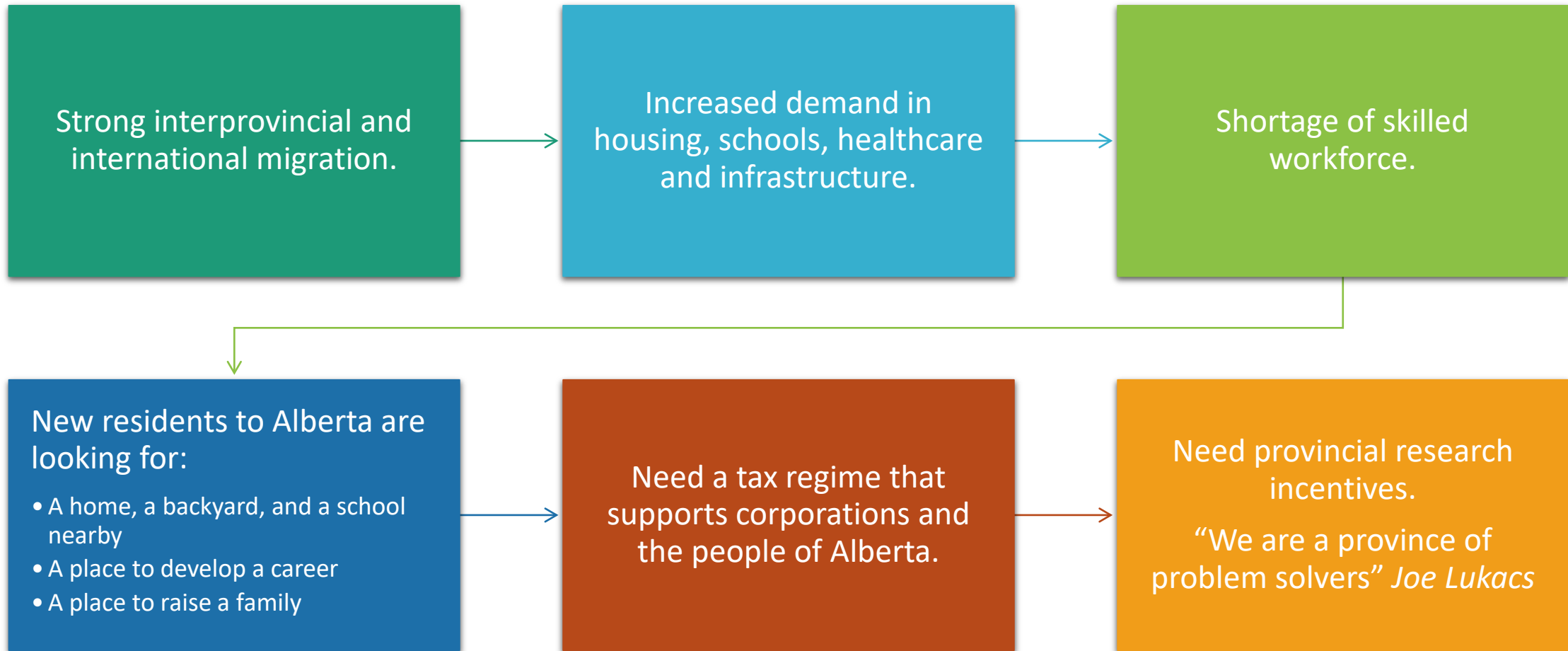
NBF Economics and Strategy (data via [World Bank](#), [Statistics Canada](#))



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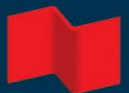
Alberta – Connecting the dots: the Next 5 Years





Joe Lukacs

- I'm a serial problem solver. I have had a couple dozen successful innovations, but the ideas came from solving problems.



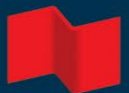
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Don Stanley

- A Harvard graduate in environmental engineering searching for work, Dr. Stanley sent out 600 letters and drove 27,000 kilometers (17,000 miles) in 4 months, visiting small communities in western Canada.
- An innovator in developing techniques for the construction and operation of environmental installations
- Grew from one man operation into an international, multi-disciplinary organization with 28,000 employees in over 400 locations across 6 continents



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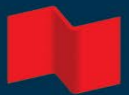
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Questions

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