DEMOGRAPHICS AS DESTINY?

REGIONAL DEVELOPMENT, POPULATION, AND PRODUCTIVITY IN NL

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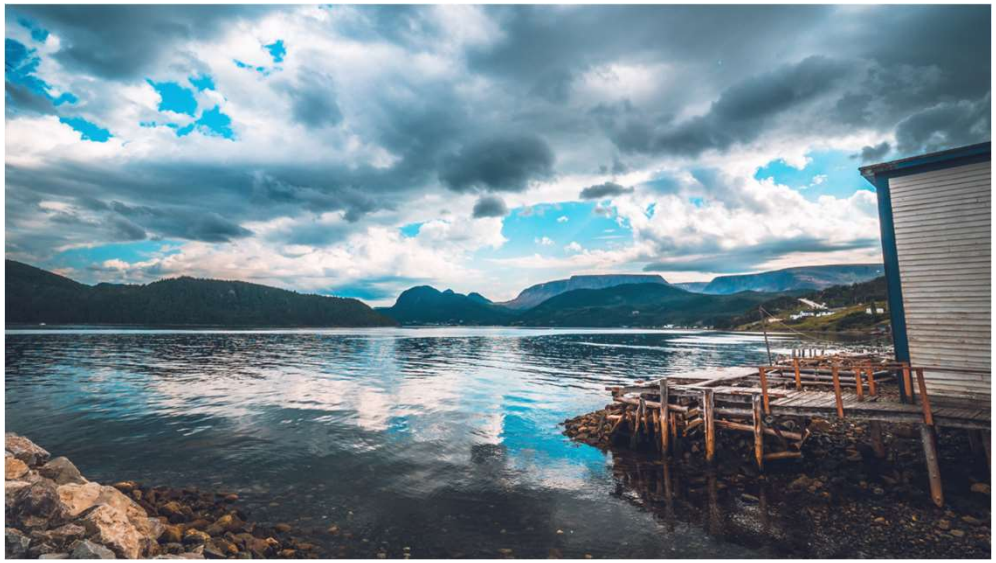
Memorial University of Newfoundland
Bank of Canada, St. John's, NL June 12, 2019

THE HARRIS CENTRE Memorial University

MEMORIAL UNIVERSITY

OVERVIEW

- Memorial University
- The Harris Centre
- RAnLab
- Demographics
- Innovation & Productivity
- Conclusions



A SPECIAL OBLIGATION

Memorial University of Newfoundland
Founded in 1949

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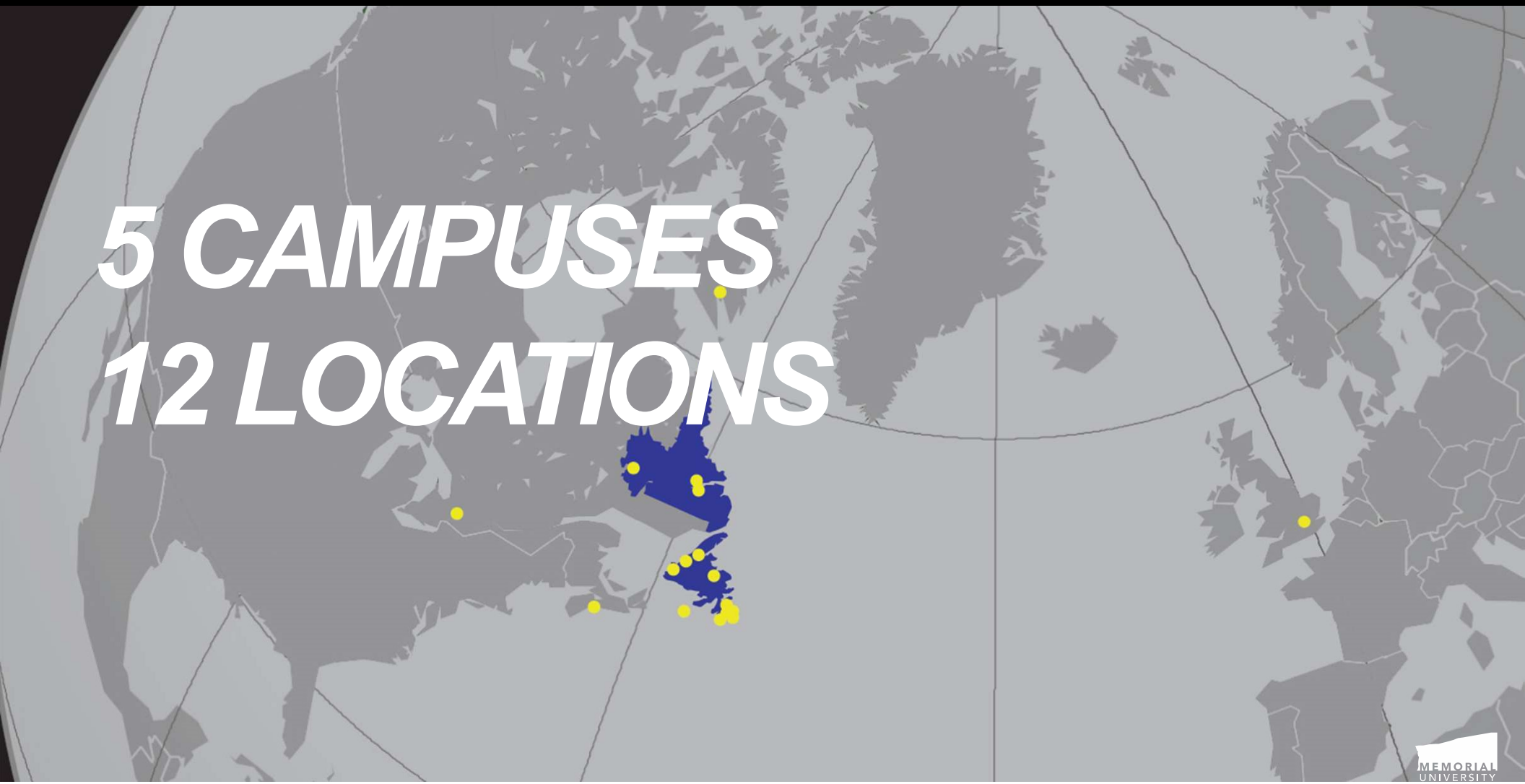
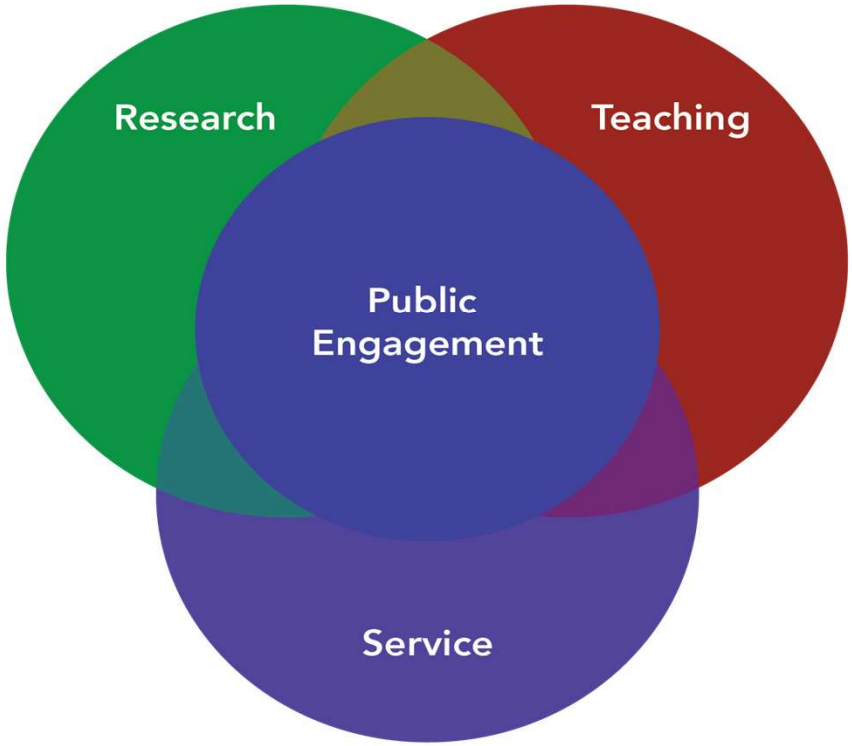

5 CAMPUSES
12 LOCATIONS
MEMORIAL
UNIVERSITY

SUPPORTING REGIONAL INNOVATION THROUGH PUBLIC ENGAGEMENT



HARRIS CENTRE

FOCUS ON RURAL & REGIONAL

Encourage informed public policy and regional development in Newfoundland and Labrador by supporting communication and collaboration between Memorial University and the people of this province.

WHAT WE DO...

- Applied Research Funds
- Public Policy Discussion Forums
- Regional Engagement
- Research & Analysis (RAnLab)
- Knowledge Mobilization & Communications
- Brokering

BY THE NUMBERS

Over **275** public forums and workshops

Over **16,000** participants across NL

Over **175** projects funded

Over **$2,750,700** flowed to support applied research

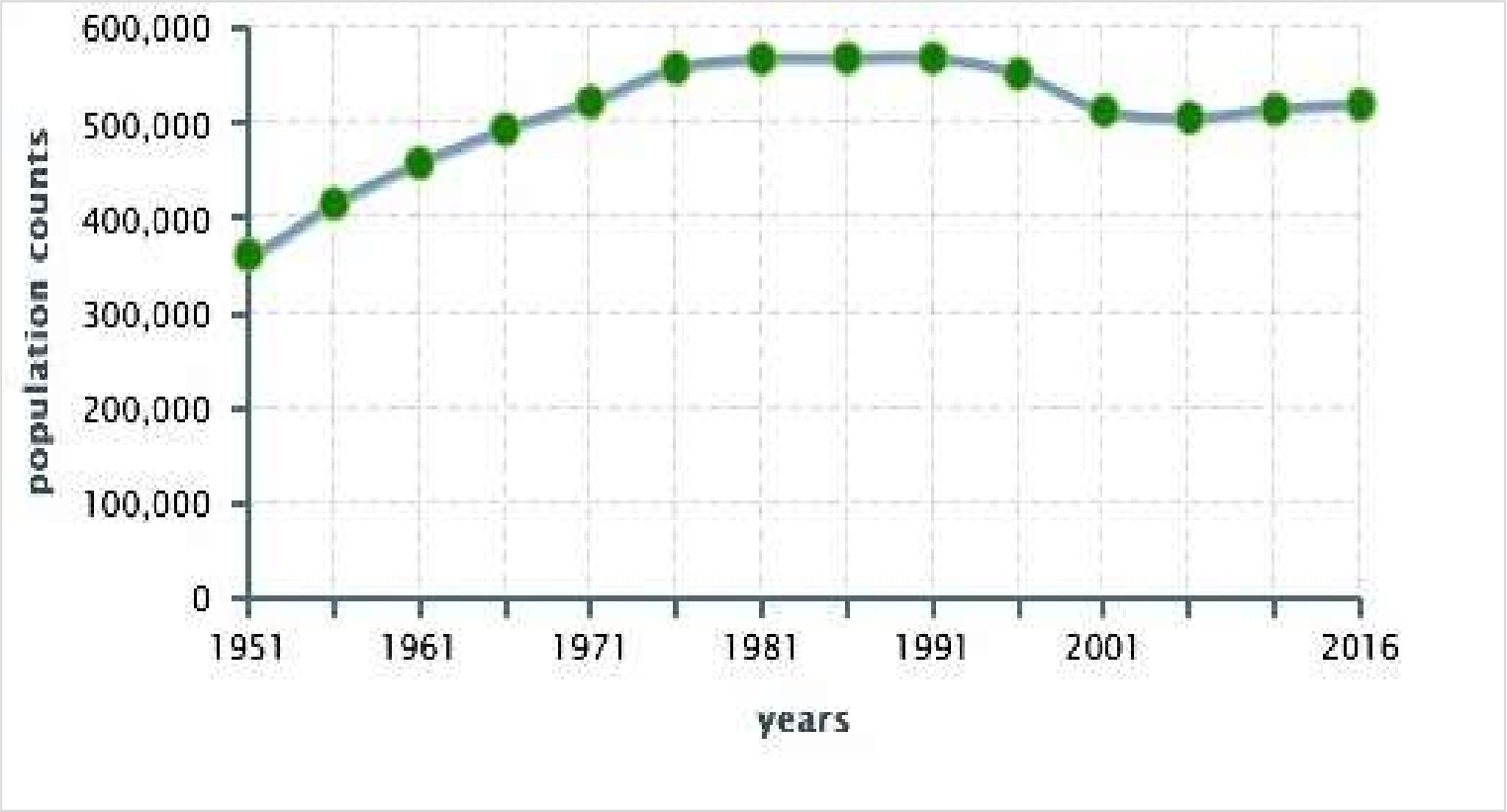
REGIONAL ANALYTICS LABORATORY (RANLAB)

- Focuses on the use of regional economic and spatial analytics
- Quantitatively assess the capacity and sustainability of industries, labour markets and the population of places
- For the purpose of informing evidence based policies for regional development

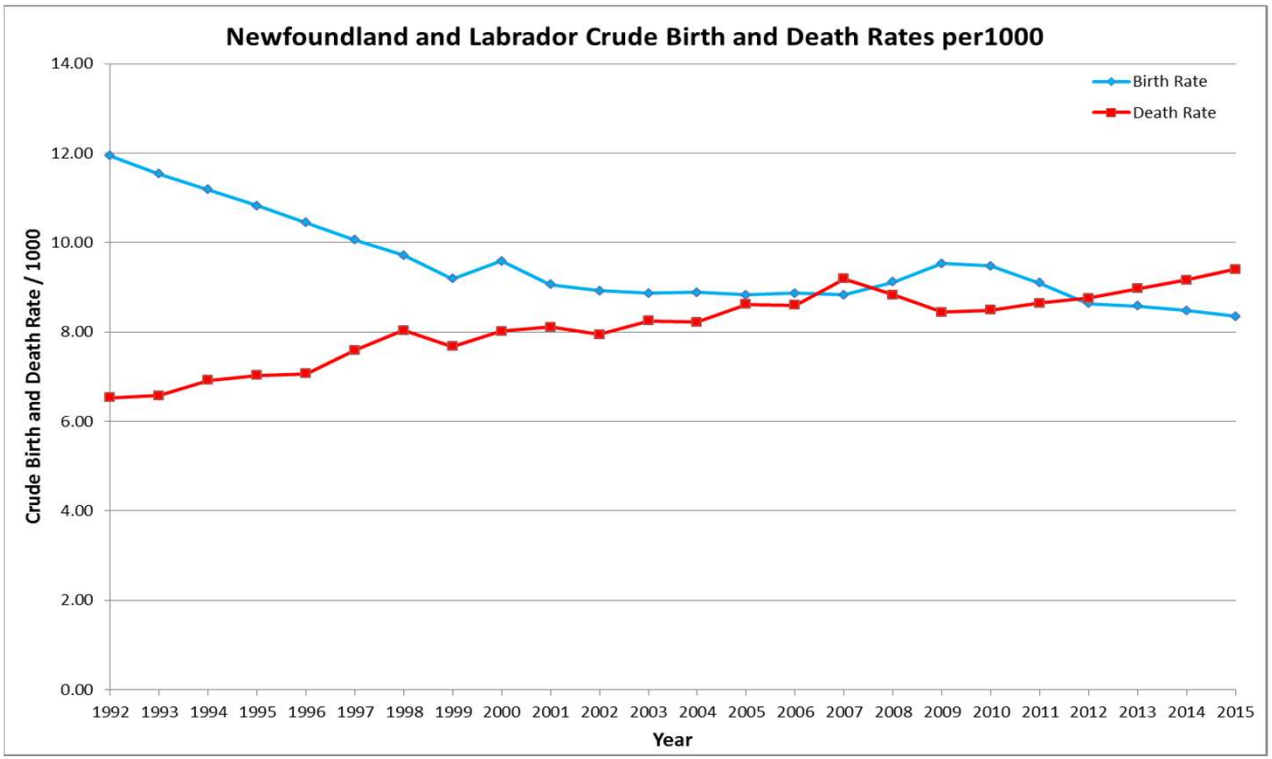
RANLAB AREAS OF FOCUS

- Regional Economic Impacts
- Forecasting Population Changes
- Analyzing Labour Force Supply Issues
- Supply Chain Analysis
- Cost benefit analysis of regionalization

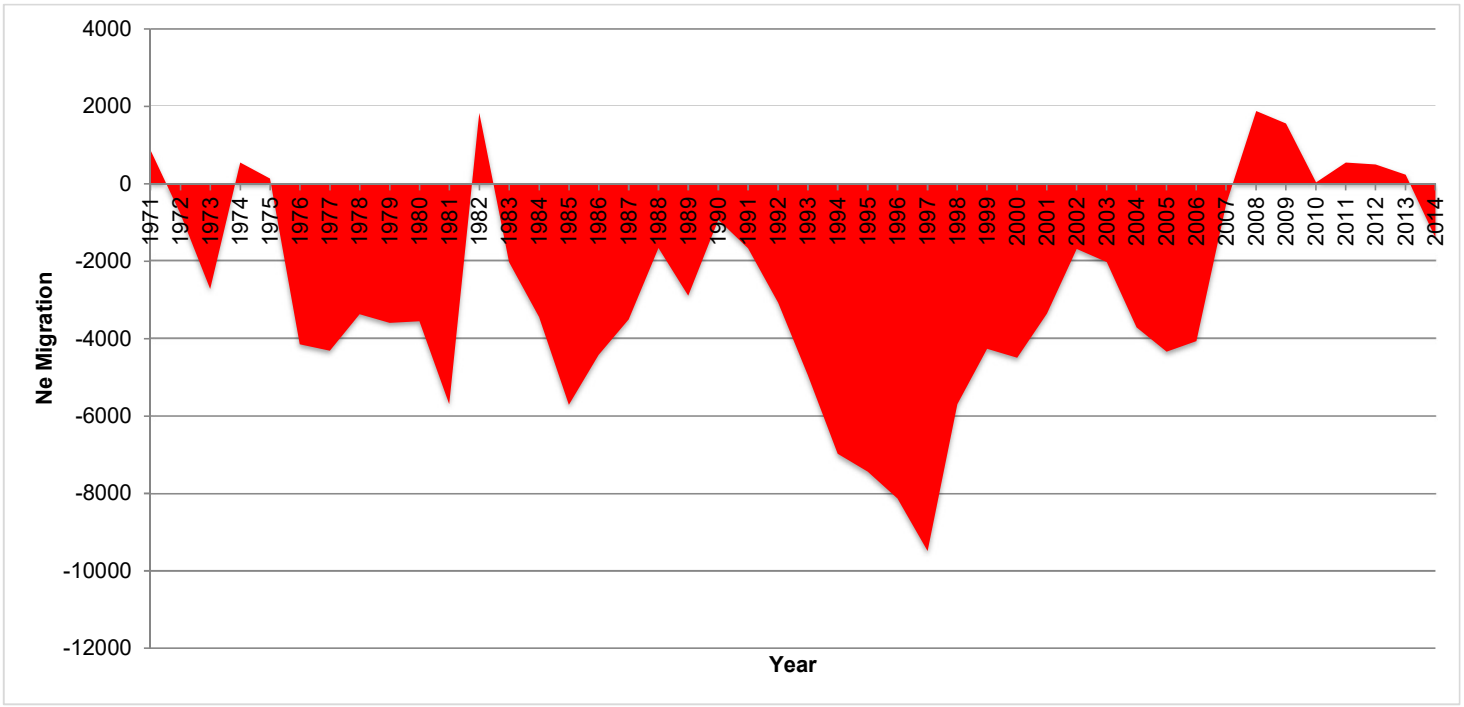
NL POPULATION: 1951-2016



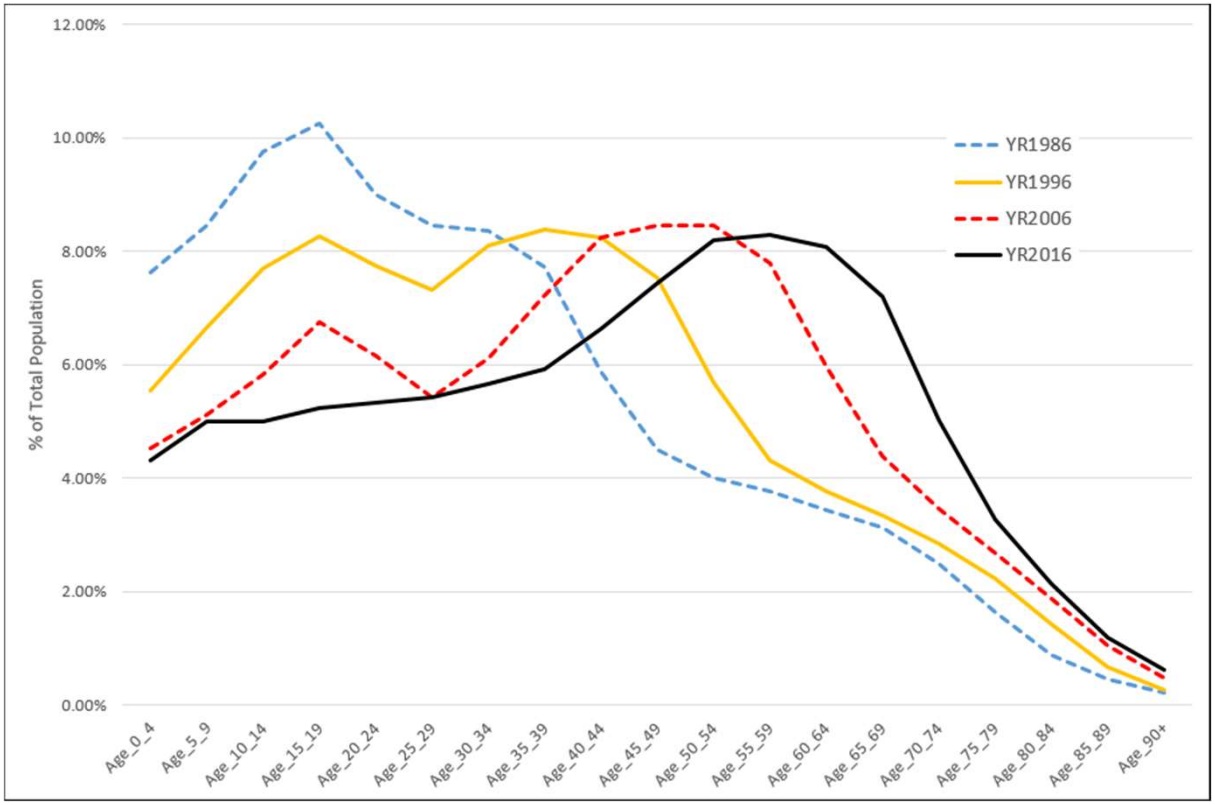
NL POPULATION: BIRTHS & DEATHS 1992-2015



NL POPULATION:
NET MIGRATION 1971-2014



DEMOGRAPHIC OVERVIEW:
AGE STRUCTURE



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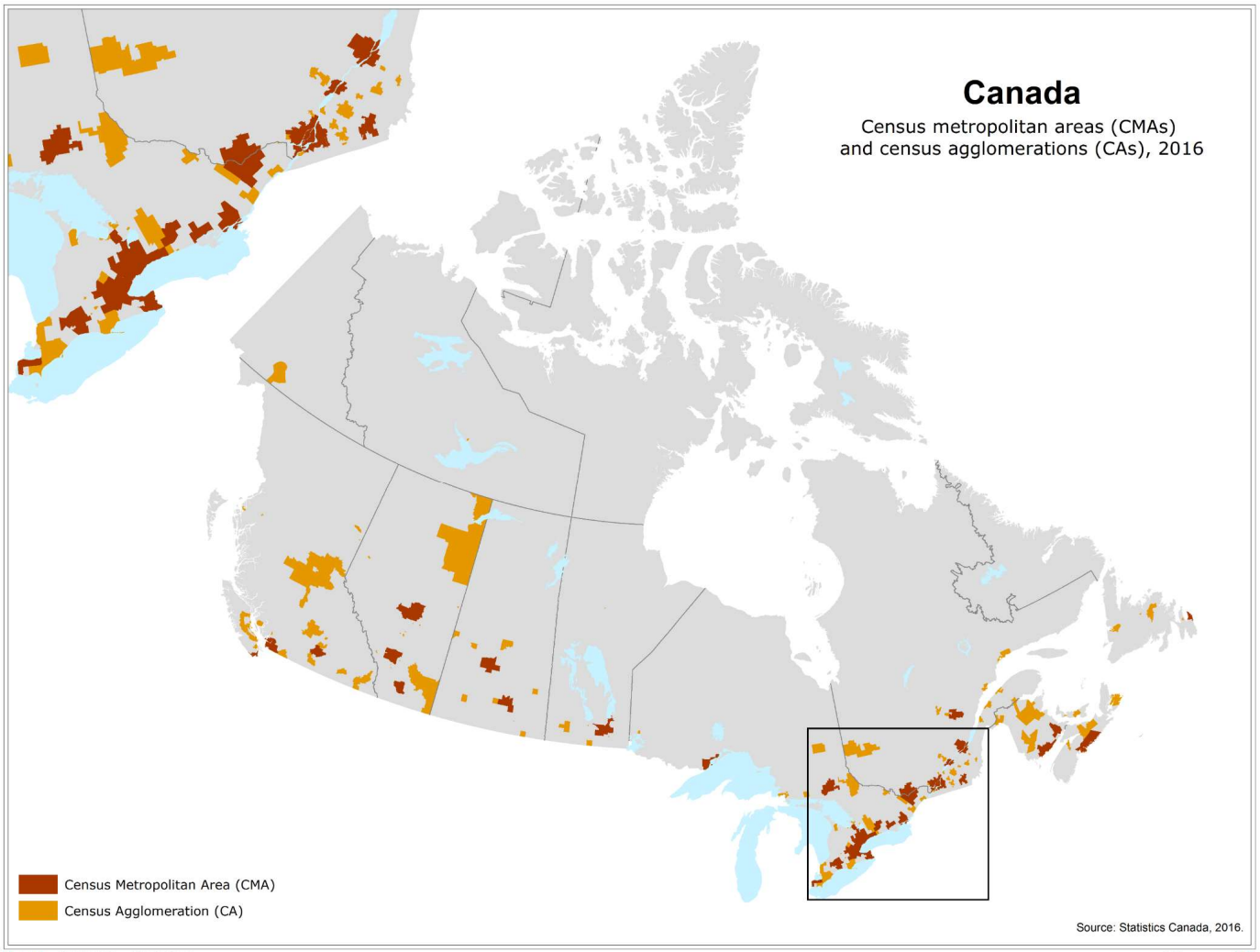
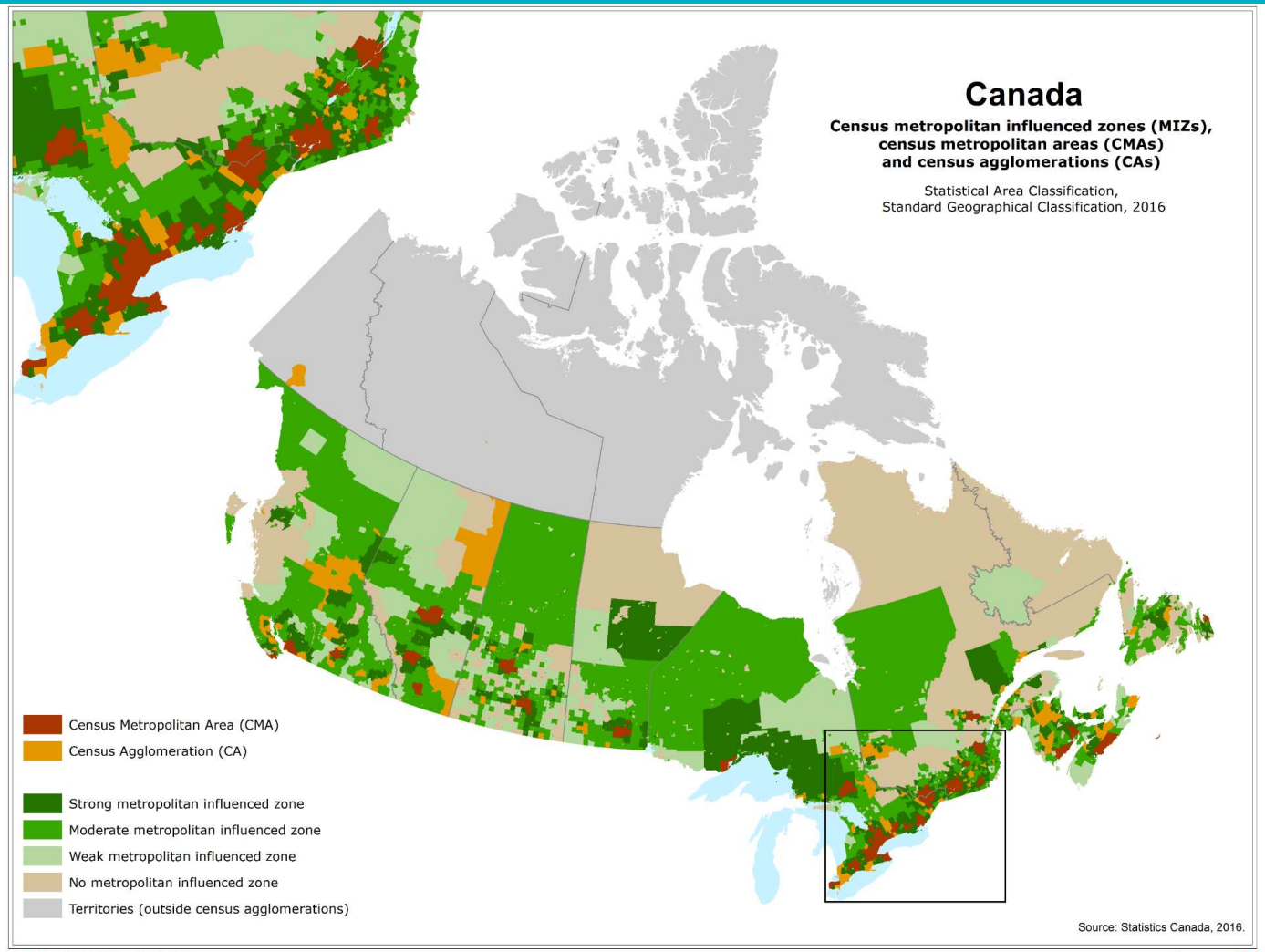
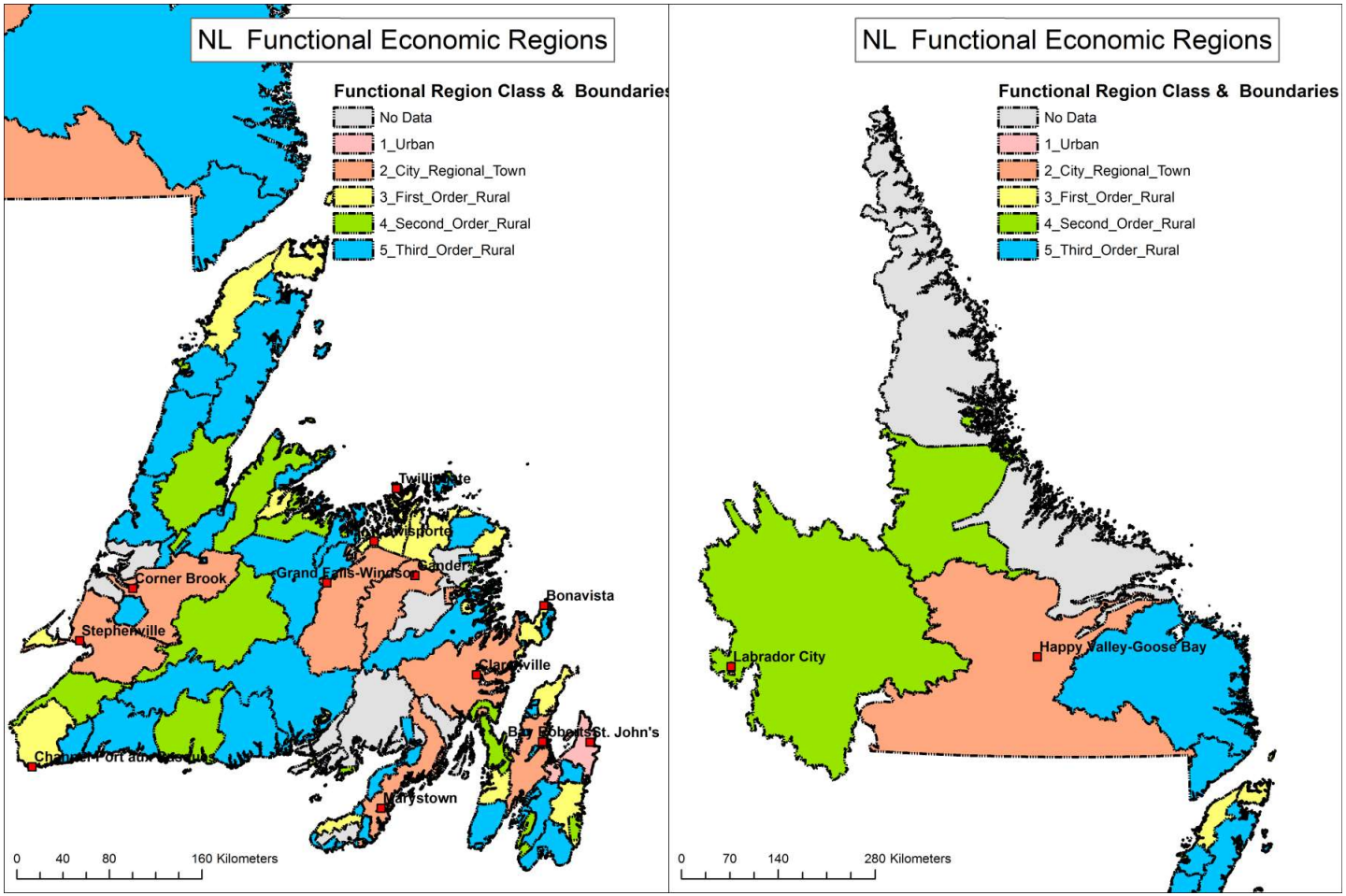

Canada
Census metropolitan areas (CMAs)
and census agglomerations (CAs), 2016
Census Metropolitan Area (CMA)
Census Agglomeration (CA)
Source: Statistics Canada, 2016.
Statistics Canada
Statistique Canada
Canada


Canada
Census metropolitan influenced zones (MIZs), census metropolitan areas (CMAs) and census agglomerations (CAs)
Statistical Area Classification, Standard Geographical Classification, 2016
Census Metropolitan Area (CMA)
Census Agglomeration (CA)
Strong metropolitan influenced zone
Moderate metropolitan influenced zone
Weak metropolitan influenced zone
No metropolitan influenced zone
Territories (outside census agglomerations)
Source: Statistics Canada, 2016.
Statistics Canada Statistique Canada
Canada

NL FUNCTIONAL ECONOMIC REGIONS



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NL FUNCTIONAL ECONOMIC REGIONS: DEFINITIONS

Labour market demography
- Age structure (+)
- participation rate (+)
- high school completion (+)
- work age population (+)
- education level (mixed best) (+)
- non university but post secondary (+)

Economic structure
- % In primary/secondary industries (-)
- Self-employment ratio (+)
- % On employment insurance (-)
- Distance to retail centre (+)
- Share of employment in largest 3 employers (-)

Income
- Earnings (waged employment by year)
- Transfer payments (unemployment level/old age payments)

Governance
- Grants received (+)
- Turnover in elected officials (middle #'s best)
- Volunteer organizations (+)
- part of multi-community organization
- Located in active RDA

NL FUNCTIONAL ECONOMIC REGIONS:
5 REGION CLASSES

FER Region Class	Number of Regions	Population 2016	% of Total Population	% Population Change 11-16	Mean Population Age
Urban	1	212,594	39.13%	4.54%	40.5
Small City & Regional Town	9	179,893	34.61%	1.00%	44.1
First Order Rural	17	69,590	13.39%	-3.36%	48.4
Second Order Rural	30	30,063	5.78%	-4.58%	47.7
Third Order Rural	136	27,576	5.31%	-6.68%	48.8

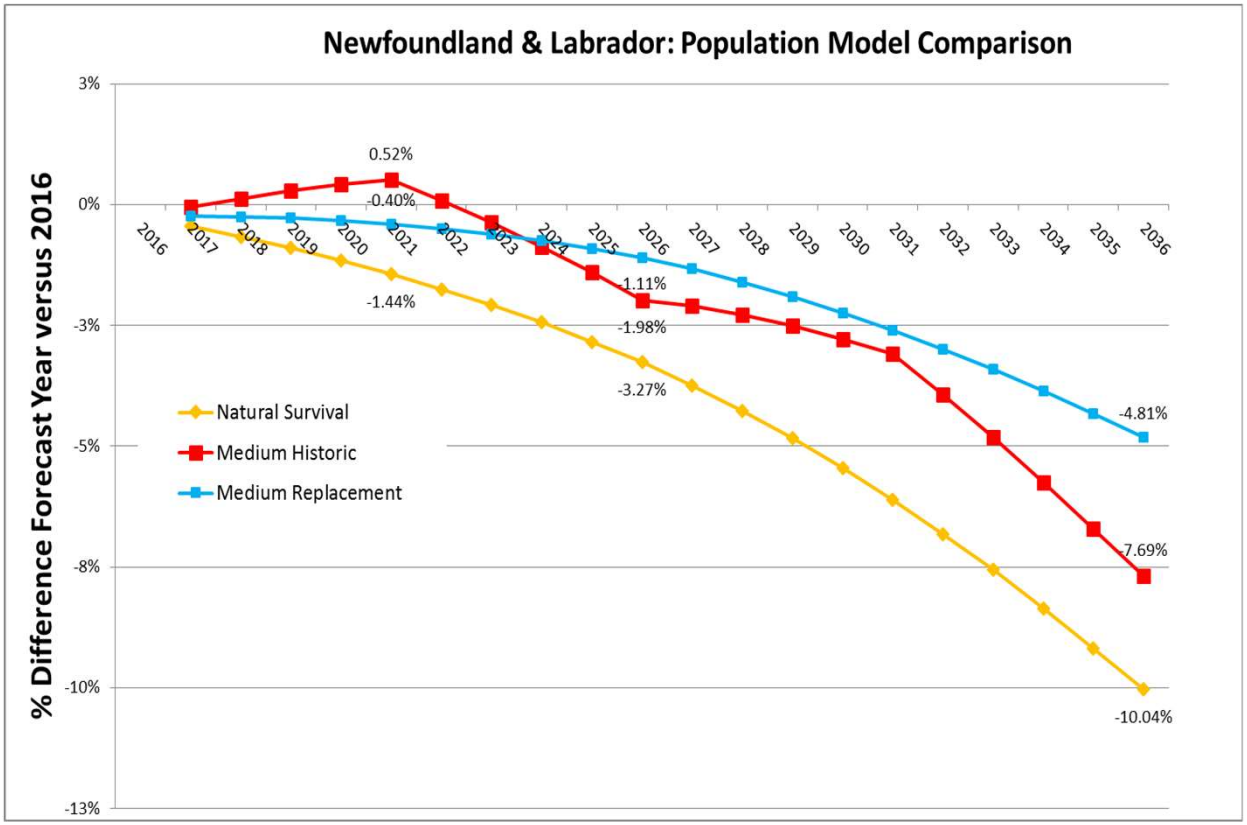
*Note that many Third Order Rural places are remote communities with weak or no economic linkages to other communities

NL FUNCTIONAL ECONOMIC REGIONS:
5 REGION CLASSES

FER Region Class	Average population	Range in size of regional population
Urban	212,594	212,594
Small City & Regional Town	19,710	8,656 – 38,996
First Order Rural	4,094	2,036 – 7,163
Second Order Rural	994	566 – 1,735
Third Order Rural	219	5 – 1,526

*Note that many Third Order Rural places are remote communities with weak or no economic linkages to other communities

NL POPULATION PROJECTIONS: 2016-2036



2016 population **519,716**
2036 projected **479,907**

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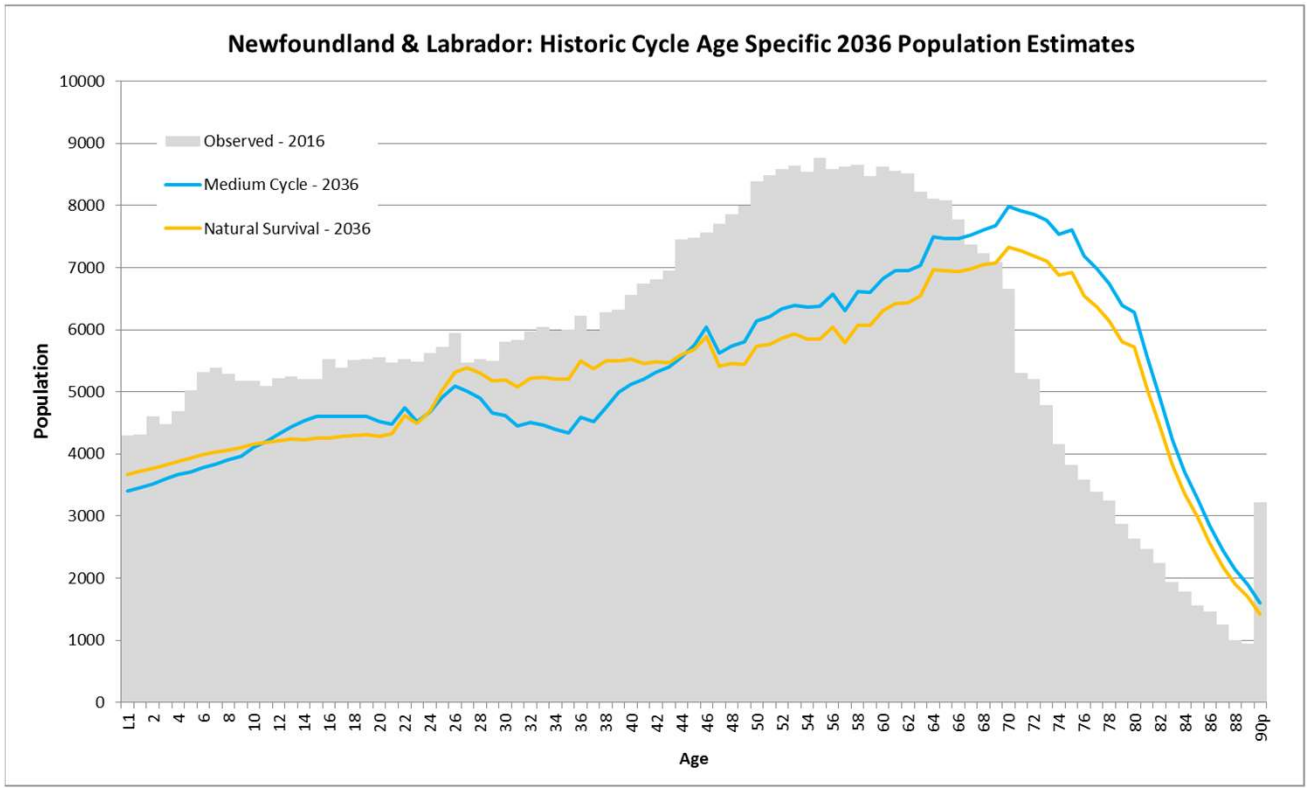
NL POPULATION PROJECTIONS:
AGE STRUCTURE 2016-2036



Average age:
2016 **43**
2036 **48**

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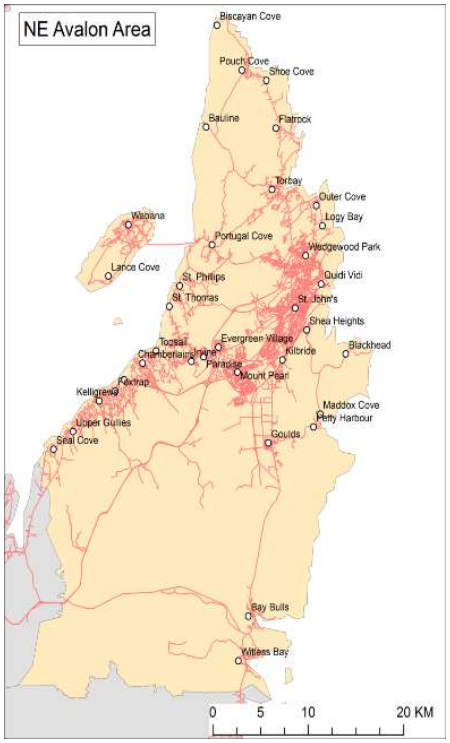
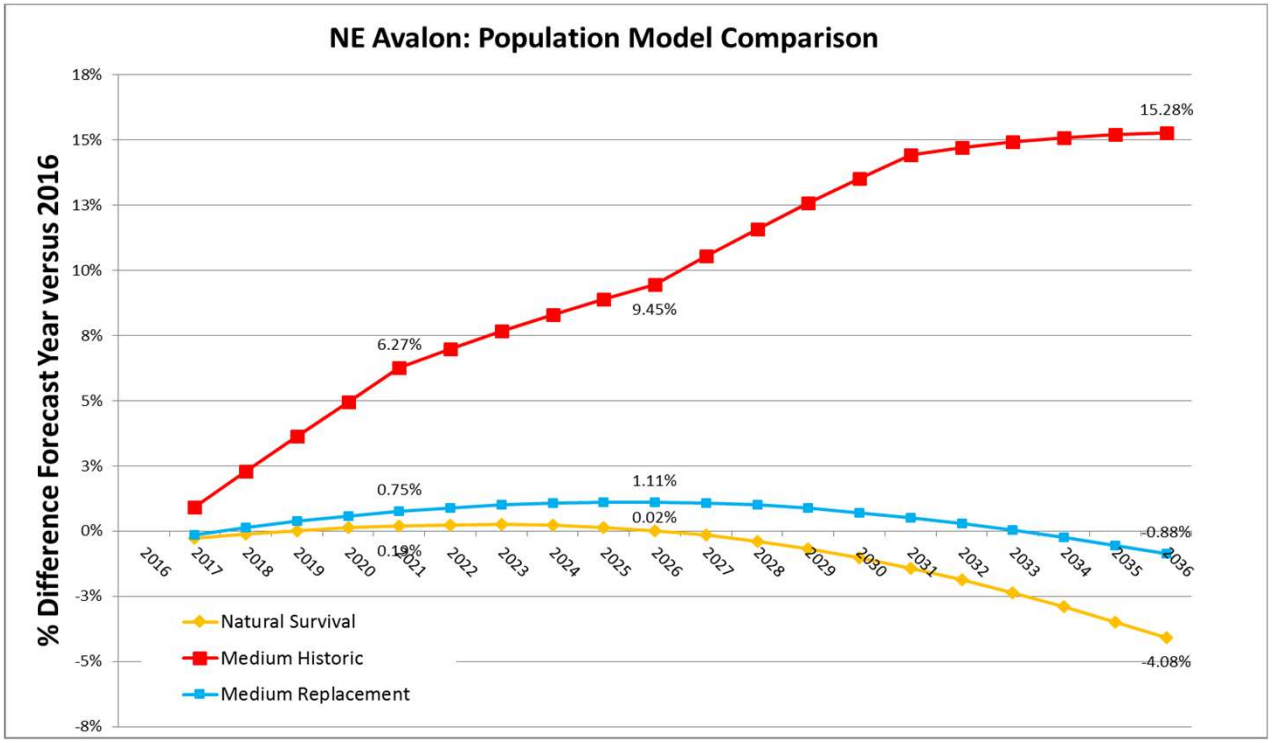
POPULATION PROJECTIONS :
NE AVALON 2016-2036





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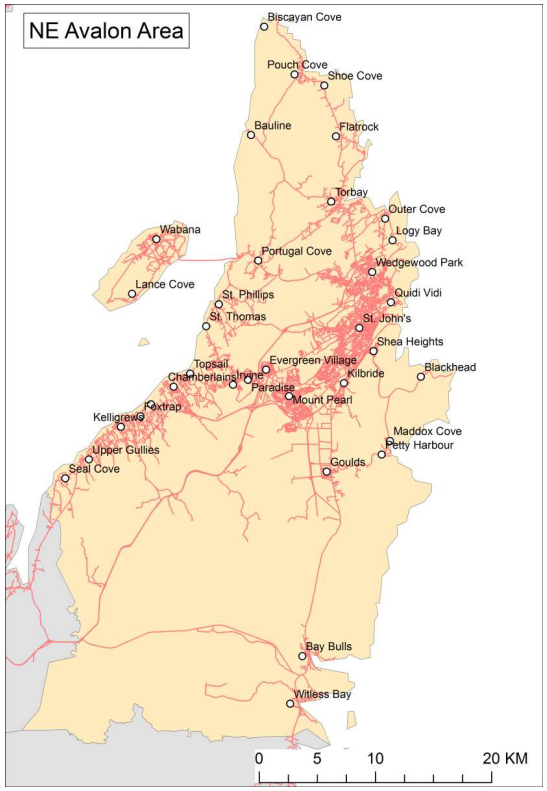
POPULATION PROJECTIONS :
NE AVALON 2016-2036



Population:

2011 – **205,168**
2026 – **235,093**
2036 – **246,904** (20.3%)

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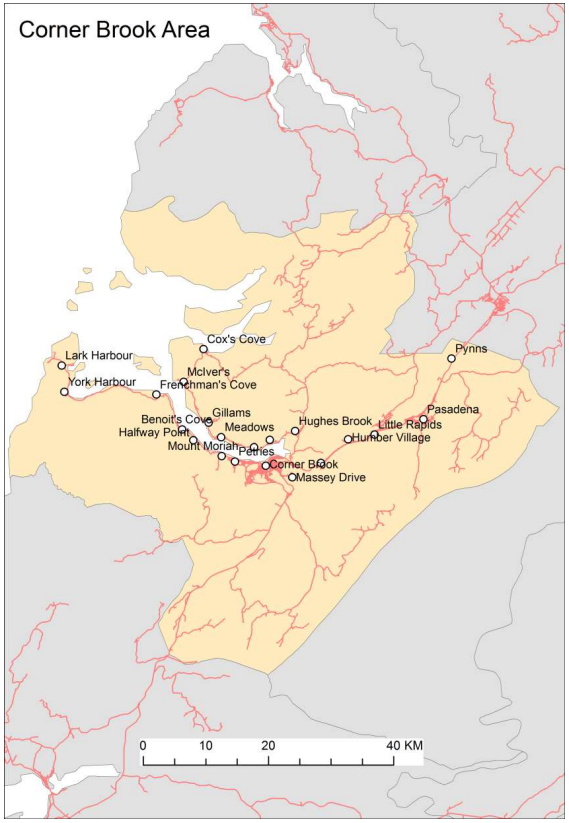
POPULATION PROJECTIONS:
CORNER BROOK 2016-2036



Population:

2011 – **33,644**
2026 – **30,687**
2036 – **27,333** (-22.7%)

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POPULATION PROJECTIONS :
LABRADOR SOUTH COAST 2016-2036

Population:

2011 – **2,248**
2026 – **1,770**
2036 – **1,411** (-37.2%)

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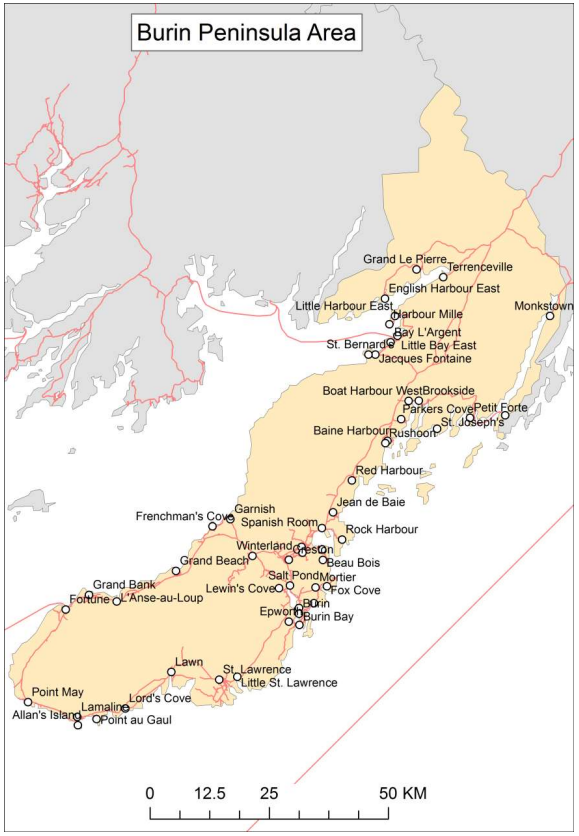
POPULATION PROJECTIONS :
BURIN PENINSULA 2016-2036



Population:

2011 – **21,031**
2026 – **18,504**
2036 – **15,218** (-27.6%)

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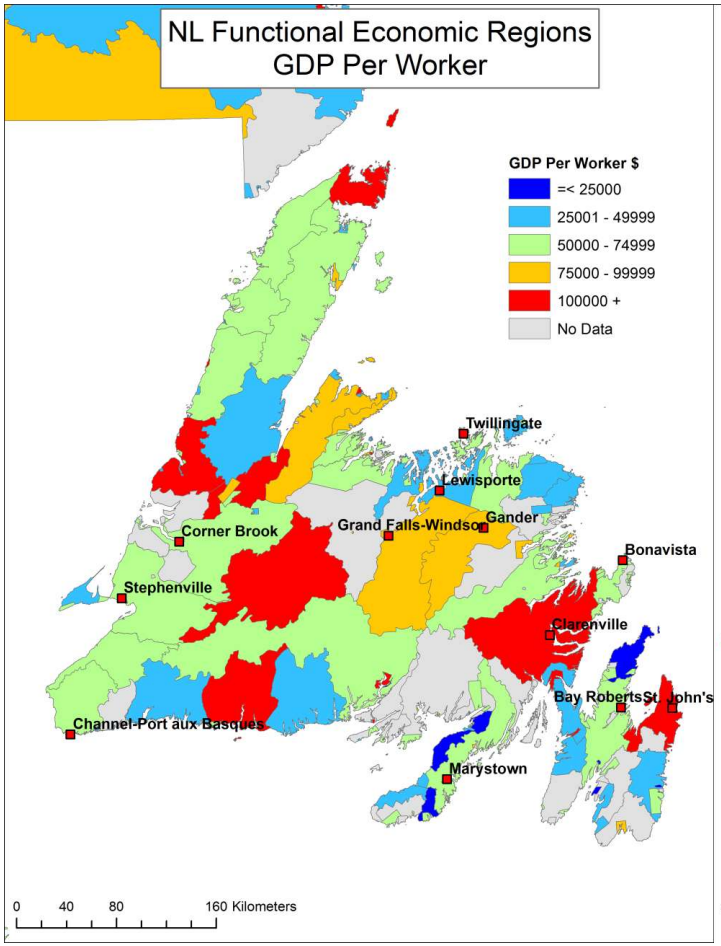
NL POPULATION: IMPLICATIONS

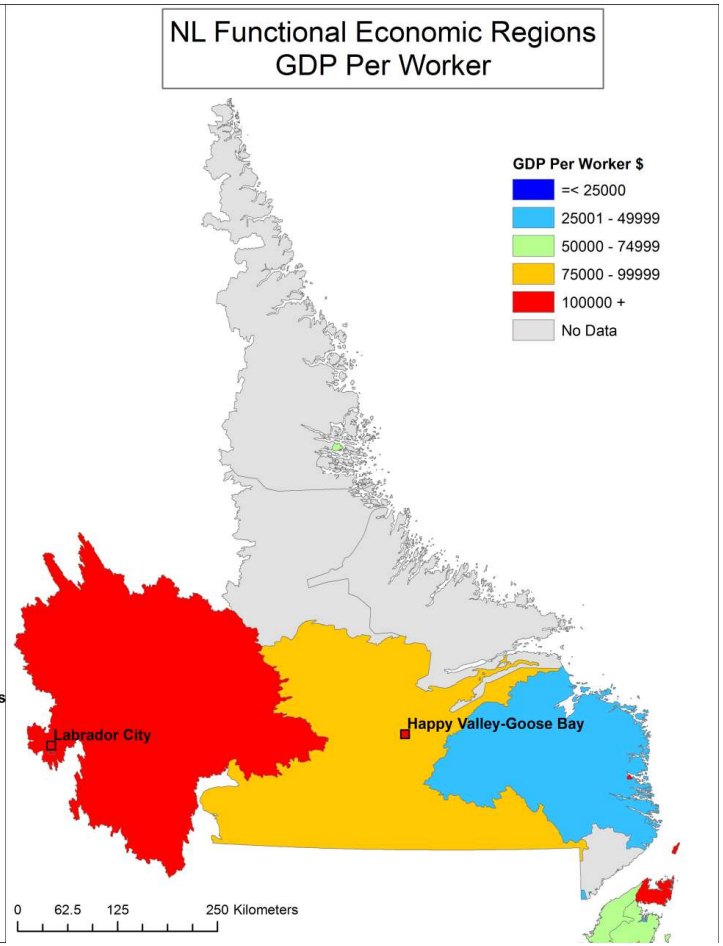
- **Labour Markets** – demand/supply imbalances
- **Business Sector** – shifting spending/needs
- **Health Care** – home support, pharmaceuticals
- **Education** – declining enrolments
- **Municipalities** – declining revenue base
- **Regional Economic Development** – declining rural population, loss of entrepreneurs/ volunteers

NL POPULATION:
LABOUR MARKET STRATEGIES

- Fertility rates
- Immigration
- Youth attraction and retention
- Long Distance Commuting
- Participation increases
  - Underrepresented marginalized groups:
    - Women
    - Indigenous
    - Low-skilled
    - People with disabilities
- Education and training

PRODUCTIVITY LEVELS





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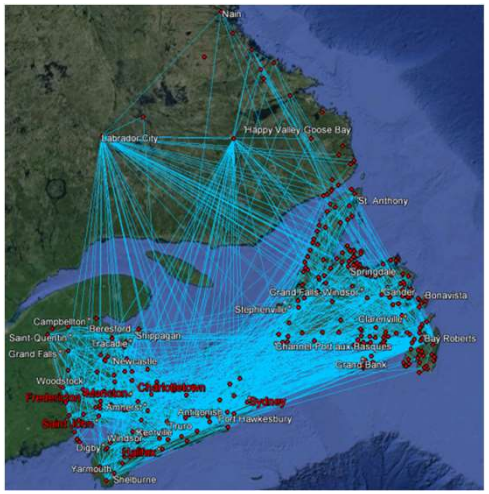
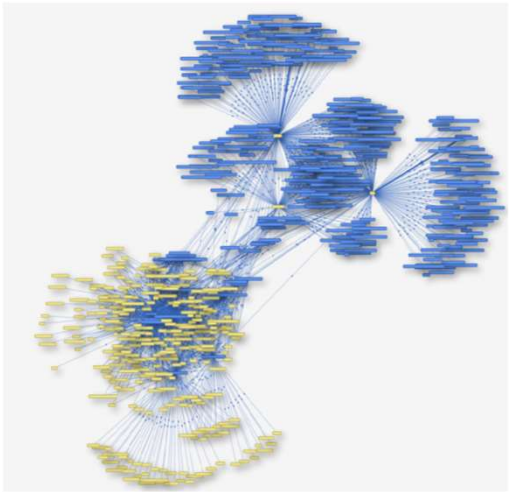
GEO-SPATIAL SUPPLY CHAIN:
BREAKDOWN OF THE ECONOMY BY INDUSTRY & LOCATION

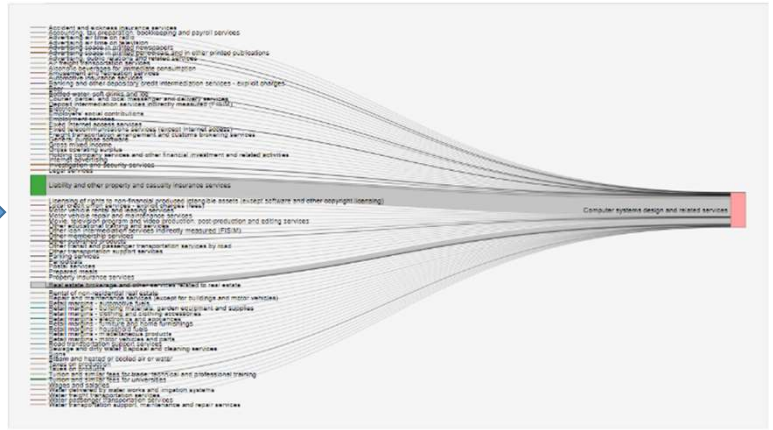
NL commodity & trade flows←→ Atlantic Provinces

St. John's commodity flows (NL + trade ←→) all industries

Single industry place based commodity flows (NL & trade ←→)



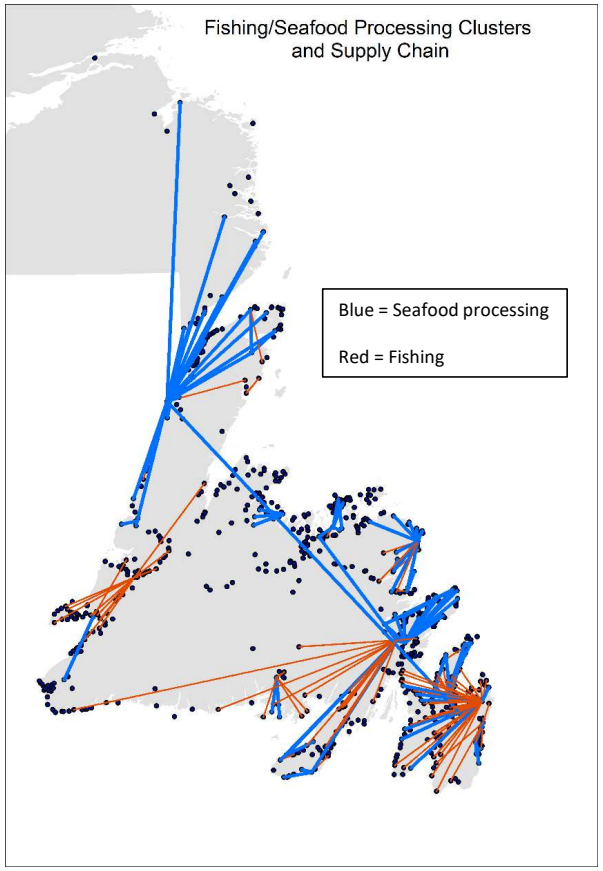




Provides baseline for calculating local economic indicators and labour market needs (e.g. occupation, skills, education) as well as population dynamics, housing demands, final demand spending etc.

INDUSTRIAL CLUSTER ANALYSIS

- Clustering algorithms can be adapted to incorporate regional supply chain data
  - Utilize a bottom-up approach to regional and industrial development
- Examples:
  - Fishery cluster on the Northern Peninsula
  - Tourism in Gros Morne
  - Mining in Labrador
  - Oil and Gas on the Avalon Peninsula

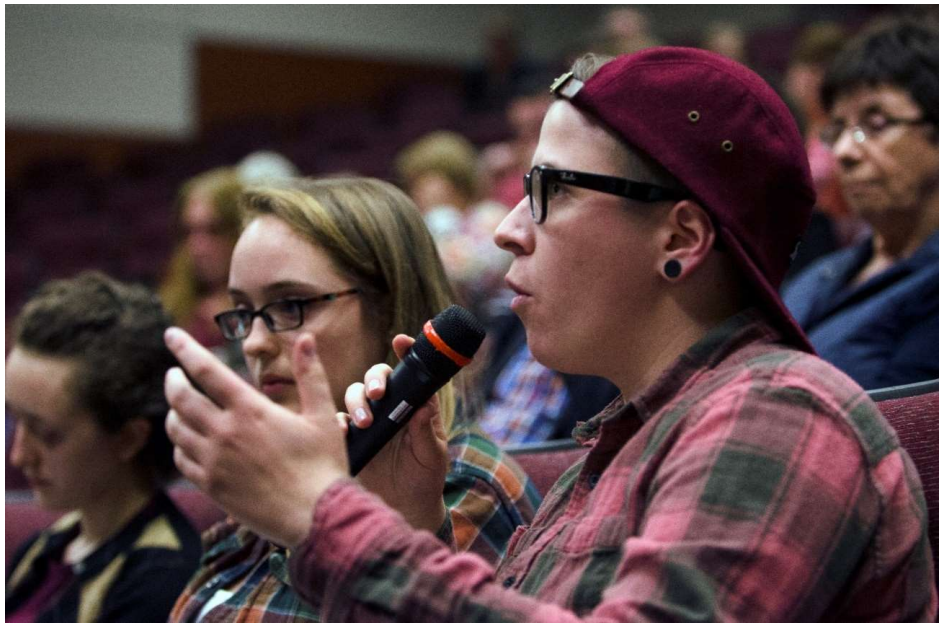


ECONOMIC DEVELOPMENT STRATEGIES

- Productivity gains in all sectors
- Exports
- Start ups AND work with existing firms
  - Succession planning
- Innovation
  - Technology
  - HR practices
  - Supply Chain Management
  - etc., etc.
- Quality of jobs matters more than number of jobs

GOVERNANCE & PUBLIC SERVICES

- Regionalization (bottom up)
- Decentralization (top down)
- Distance delivery
- Mobile delivery
- NGOs / Social Enterprise



➢ innovation
➢ productivity gains
➢culture change

REASONS FOR OPTIMISM

- NL resource endowment: renewable and non-renewable – productivity key
- Ocean tech, ICT, aquaculture, etc.
- Post-secondary system
- NL identity & tourism: with new people, ideas, networks

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Demographic crunch demands innovation and productivity gains. Are we ready to shape our future?

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