



Regional and Rural Broadband Research

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WWW.R2B2PROJECT.CA

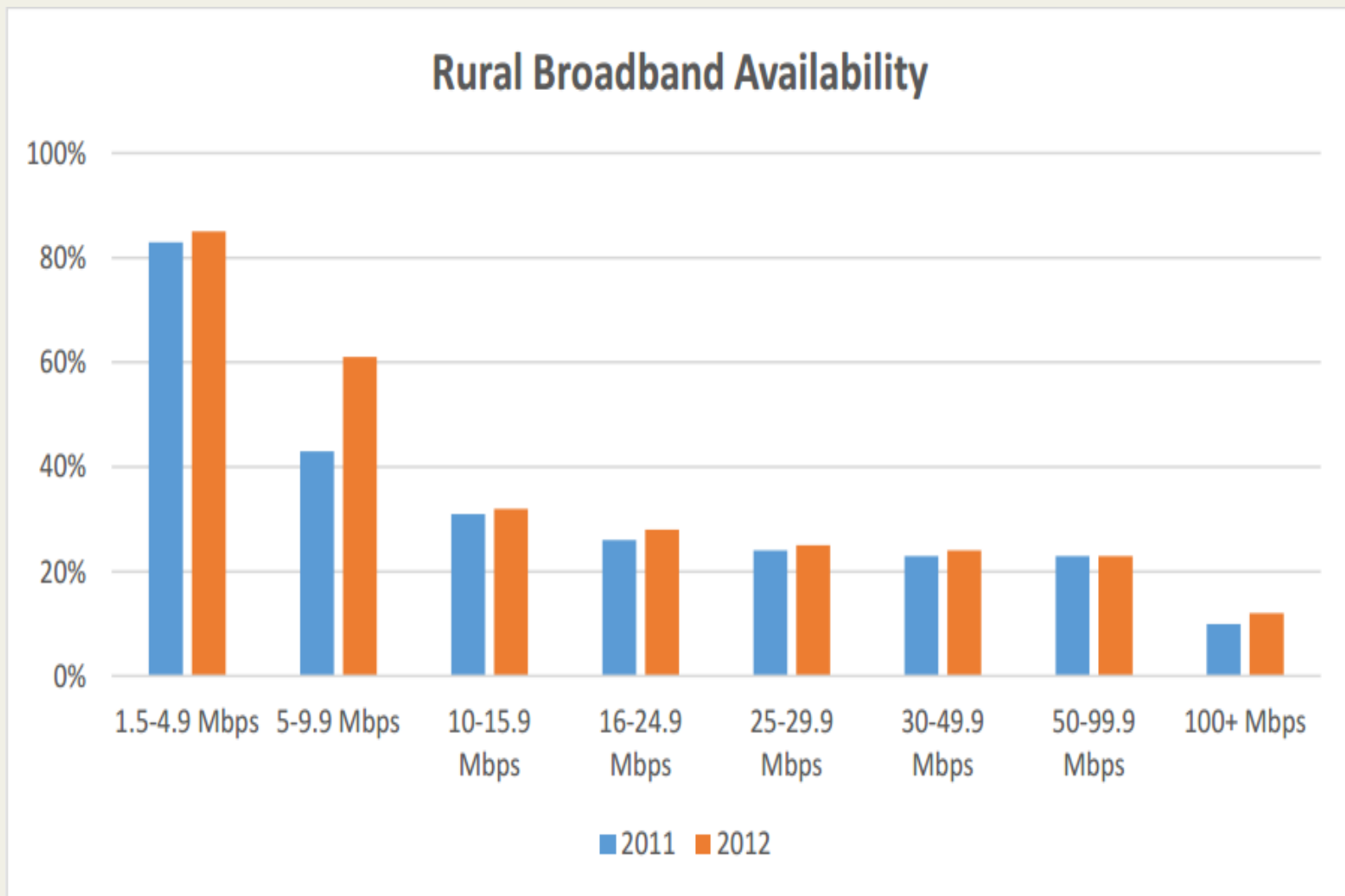
SCHOOL OF ENVIRONMENTAL DESIGN AND RURAL DEVELOPMENT
ONTARIO AGRICULTURAL COLLEGE
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18% of the Canadian households do not have access to high speed internet service.

Majority of these households are located in the rural community. (CRTC, 2016)

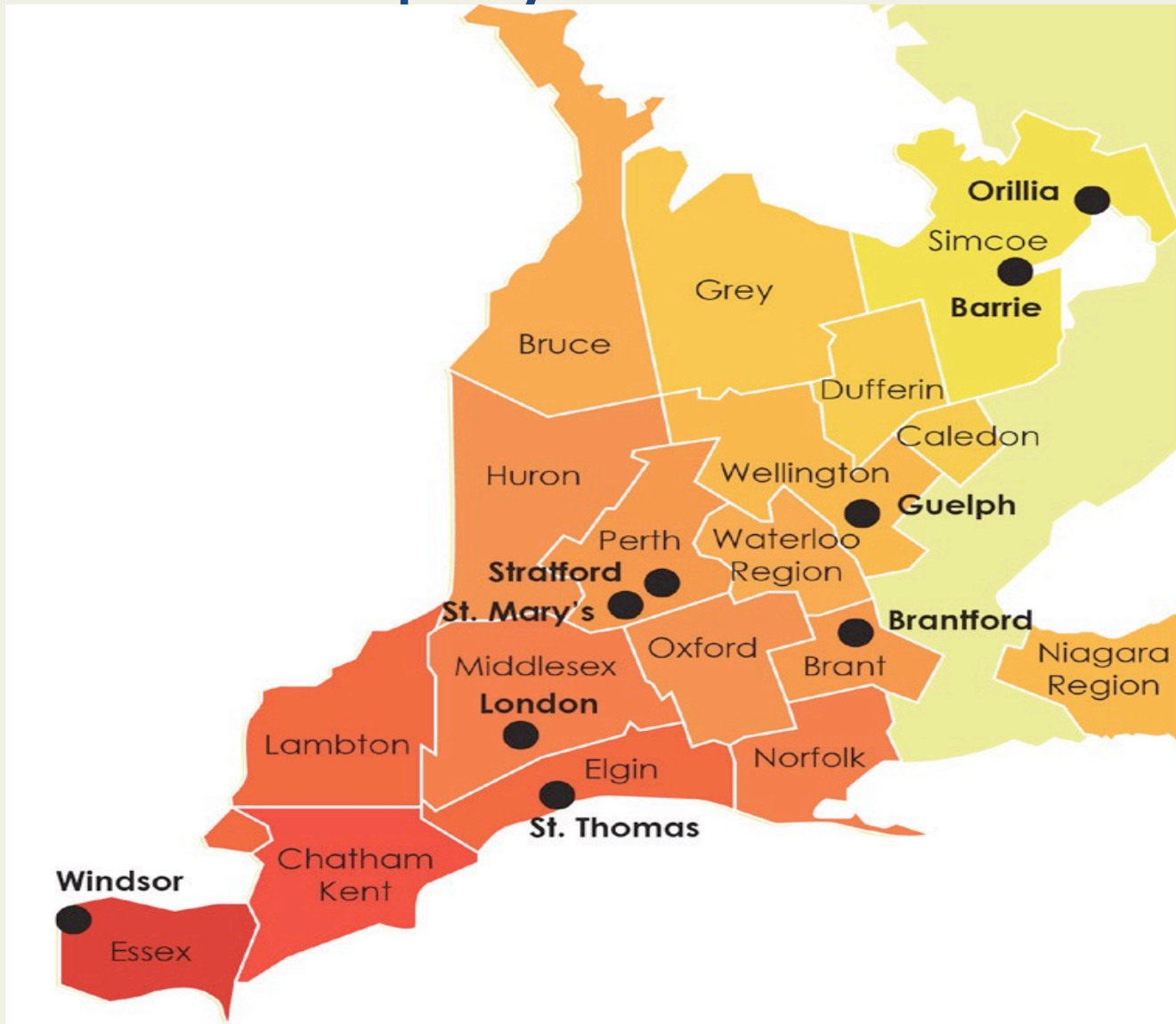
Broadband in Canada



Rural Broadband - Benefits

- Broadband infrastructure has direct effect to a country's GDP (Koutroumpis, 2009)
- Between 0.9% to 1.5% GDP per capita is increased with 10% increase in broadband penetration (Czernich, 2011)
- Employment and wage growth in rural areas 1.17% and 1.01% respectively (Ivus & Boland, 2014)
- Increase connectivity increases adoption of PA technologies leading to input cost savings and decreased input usage. This will directly benefit the agriculture sector in rural communities (Griffin & Whitacre, 2016)

Outcome Analysis of SW Ontario Broadband Deployment



Research Gap - Today

Very few literature exists individually but no comprehensive study to cover:

- Regional economic growth and broadband investments
- Economic and Social Obstacles and benefits
- Precision Agriculture adoption and role of broadband

Research Partners



Social Sciences and Humanities
Research Council of Canada

Conseil de recherches en
sciences humaines du Canada

Canada

Research Challenges

- Lost, locked down or fractured datasets
- Data is proprietary - “owned” by providers and users
- Statistics Canada data very general; 1st time in Census of Agriculture 2016 to include digital technologies!
- Past over-reliance on case studies – cannot scale
- Few reliable studies across Canada & in Ontario

Research Outcome

- ✓ Centralized data repository
 - Providers
 - Residential Users, farms & SME
 - MUSH
- ✓ GIS Mapping
- ✓ Identifying:
 - Opportunities
 - Barriers

Rural Ontario - Implications

- ✓ Better planning for resource allocation
- ✓ Sustain rural development
 - Job growth
 - Environmental
 - Community well-being
 - Reverse depopulation trend
 - New business opportunities
 - Increased agriculture production
 - Precision Agriculture adoption
 - Compete globally
 - Grey County
 - Windsor - Essex
 - Stratford



Questions?

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Thank You!



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Broadband