



Promoting Broadband

The Case of Canada

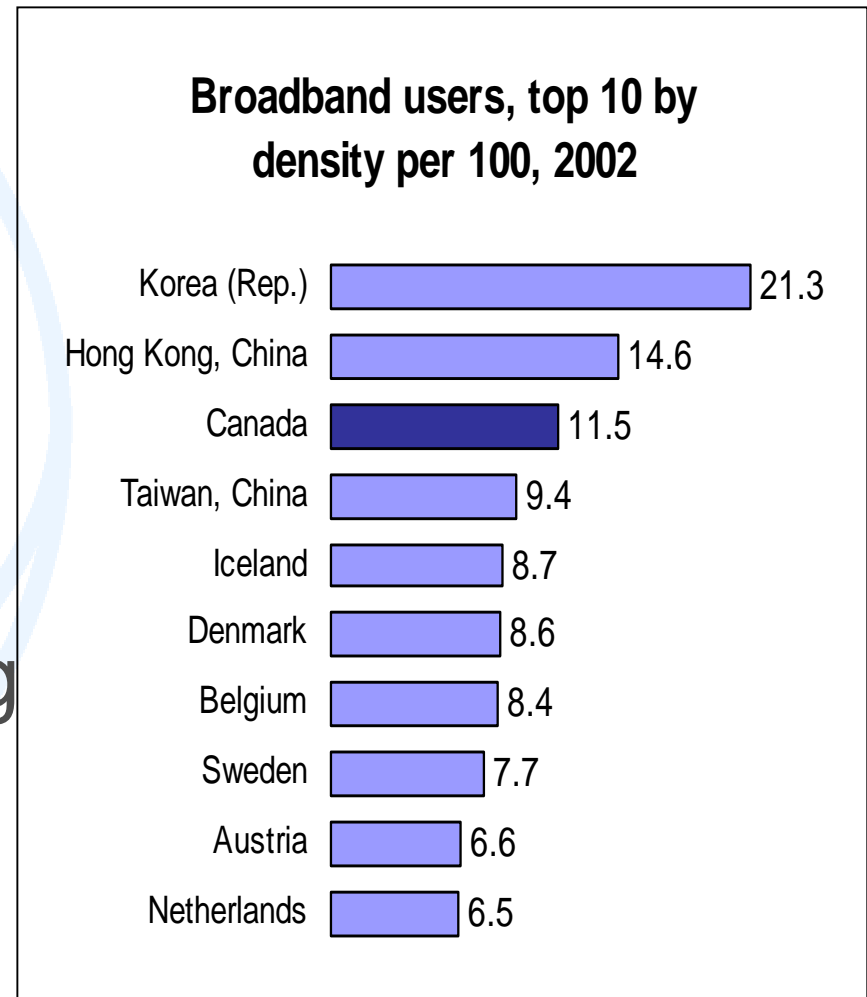
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Overview

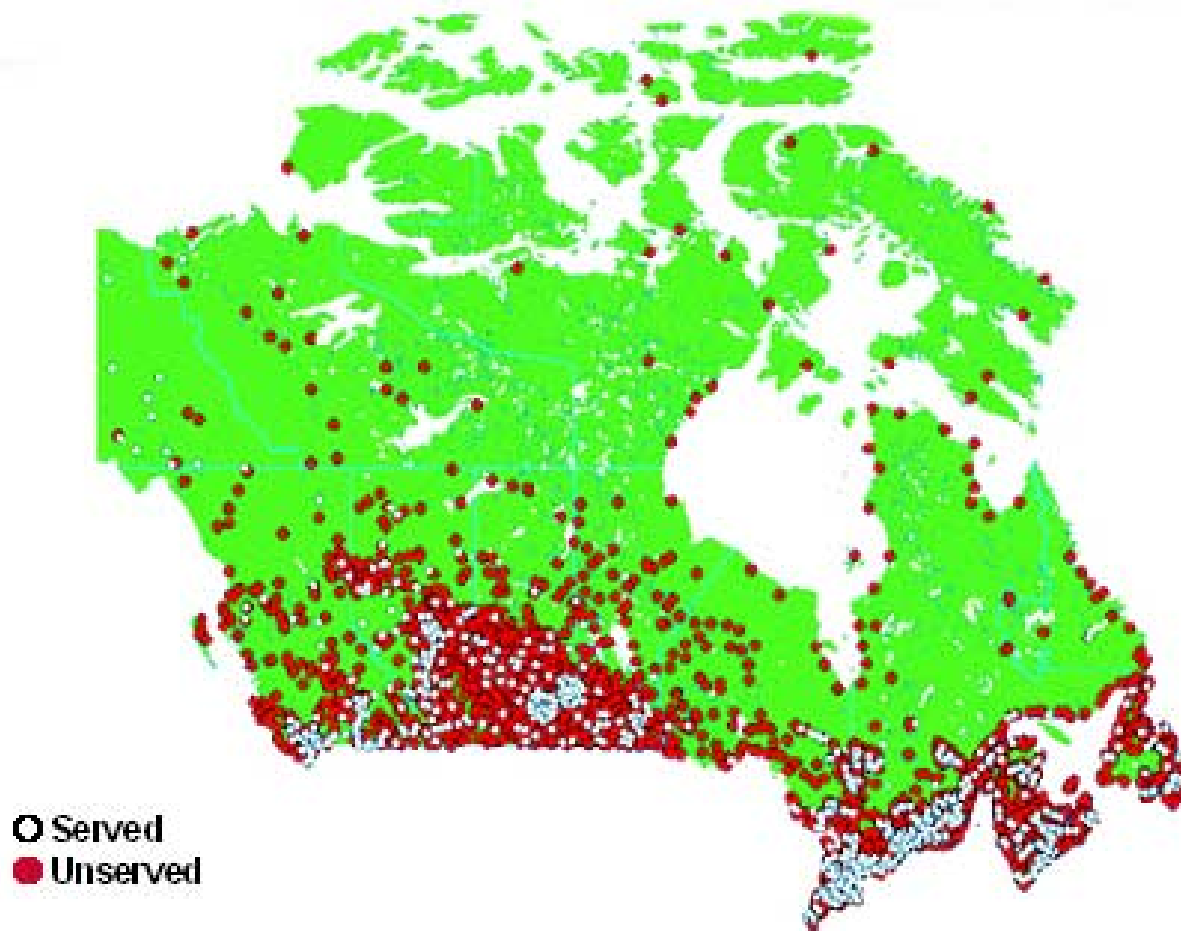
- Geography
- Demographics and Internet use
- Competition and regulation
- Initiatives promoting broadband



Source: ITU World Telecommunications Indicators Database

Geography

Distribution of served and unserved communities

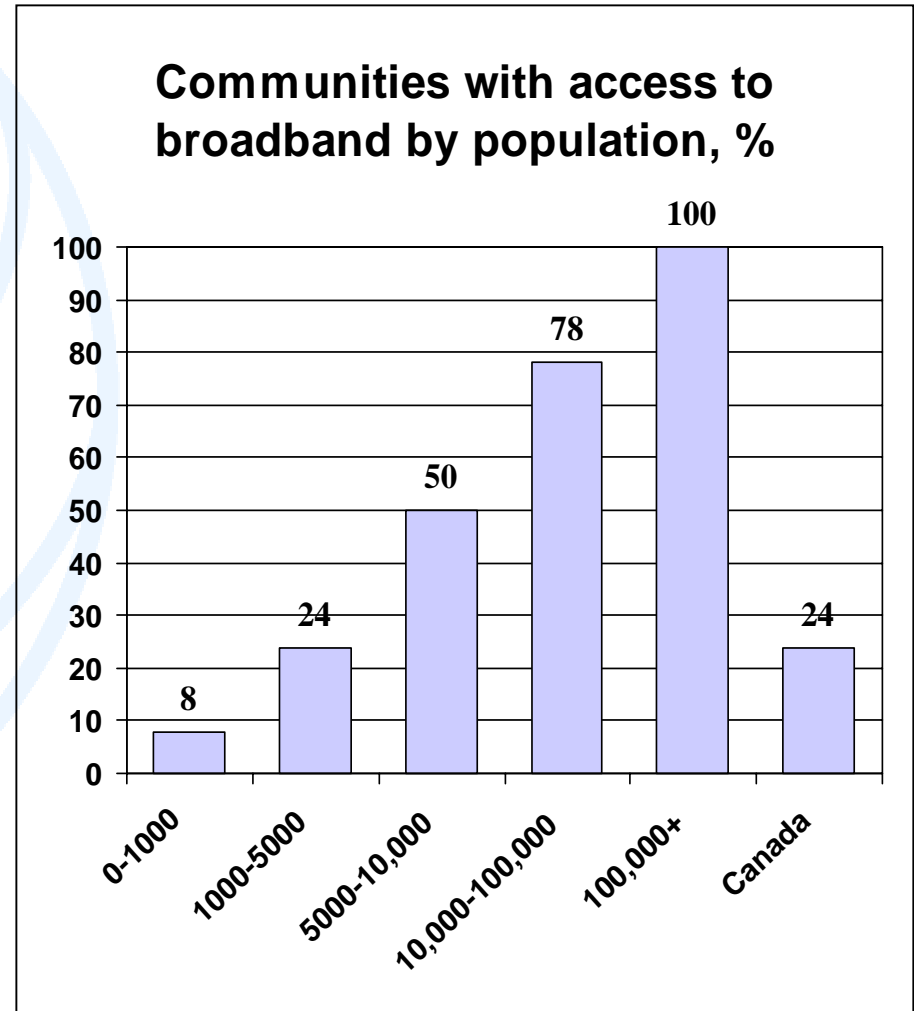


Source: National Broadband Task Force

Geography

Small communities less likely to have broadband

- Broadband is available in 1,282 communities
- Represents 85% of the population but only 24% of all communities
- Policy focus is on connecting the remaining 15% scattered over more than 3,500 communities

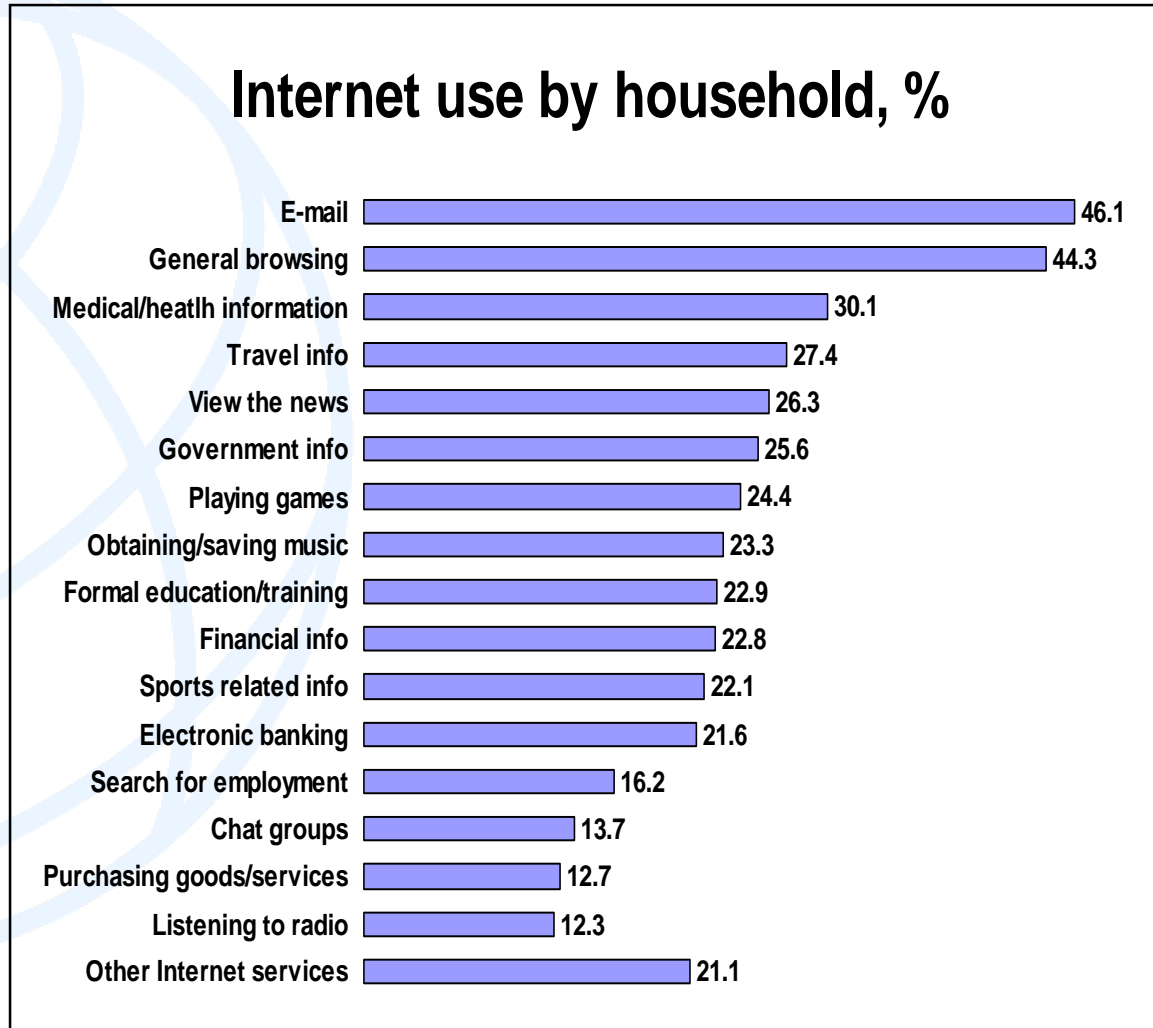


Source: National Broadband Task Force



Demographics and Internet use

- Affluent
- Highly educated
- Internet penetration of 43.5 per 100
- Use of Internet for high bandwidth activities
 - playing games, downloading music, online learning

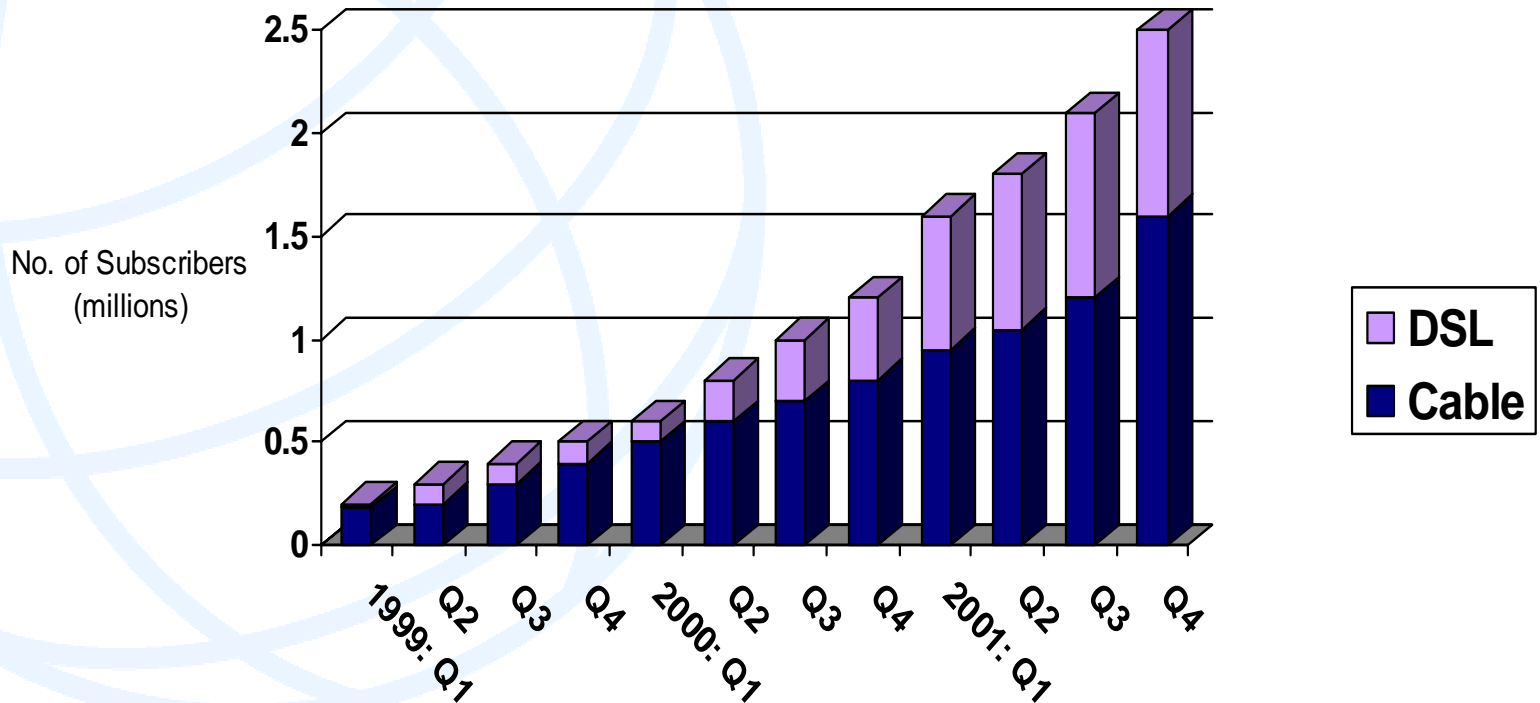




Competition

Intermodal Competition

Growth of cable Internet and DSL subscribers, 1999-2001



Source: Industry Canada



Competition

Broadband pricing

- **Affordable pricing**
 - e.g. Bell Sympatico ADSL - 1Mbit/s (downstream) 160kbit/s (upstream) at C\$44.95 (US\$28.40)
- **Tiered services**
 - Introduction of “lite” services. e.g. Bell Sympatico “lite” – 128 kbit/s (downstream) 64 kbit/s (upstream) at C\$24.95 (US\$15.70)
- **Bit cap charges**
 - Download limits imposed e.g. 10 Gbit for ADSL
 - Separation of heavy and light users





Regulation

- **Market entry and licensing**
 - FBOs need only register before commencing operations
 - Regulatory forbearance from Internet service market
- **Rights of way**
 - CRTC jurisdiction over disputes between municipalities and carriers
- **Local loop unbundling**
- **Cable open access**



Initiatives

Key drivers

- **Federal**
 - Connecting Canadians
 - Broadband for Rural and Northern Development Pilot Program
- **Provincial and territorial**
 - e.g. Alberta SuperNet, Villages branches du Quebec
- **Community**
 - “Community champions” e.g. Upper Canada Networks



Initiatives

Infrastructure deployment strategies

- **Demand aggregation model**
 - Community champions
 - Condominium fibre builds
 - Wireless networks
 - Internet exchanges
- **Public infrastructure model**
 - Public utility model
 - Public sector network model



Initiatives

Application and content development

- **Government supported broadband R&D**
 - Individual government departments
 - CANARIE
 - Communications Research Centre (CRC)
- **Focus on delivery of public services**
 - e-Learning
 - Tele-health



Thank You

<http://www.itu.int/broadband>