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# 2014 John Macleod Oration

## Improving the Health of Rural People through Health Workforce Policy

Professor Roger Strasser BTL

Northern Ontario School of Medicine





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# Disclosure:

I am a full time employee of:

- Northern Ontario School of Medicine (NOSM)

which is funded by the Government of Ontario

I sit on the board of directors for the following organizations:

- NOSM (CEO of NOSM Corporation)
- Thunder Bay Regional Health Sciences Centre
- Advanced Medical Research Institute of Canada
- Thunder Bay Regional Research Institute







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# Wonca Working Party on Rural Practice

- began Vancouver 1992
- practising rural doctors
- developed and  
developing countries



**Wonca**





**He felt angry they had “been dying for a pee” and started a 23 year campaign to introduce personal flotation devices to the fishing industry**



## Dr John AJ Macleod

The Macleods of Lochmaddy, North Uist,  
a family of doctors

From 1932 to 1973, my parents Dr Alex J. Macleod and Dr Julia Macleod served the Lochmaddy practice. There was no telephone until 1944, and conditions were hard with many sea crossings. Most births were at home, the children faced multiple infectious diseases and antibiotics were not available until 1945. Nurses were poorly trained and it took two days to get to a major hospital. Therefore my mother and father became major catalysts in developing the Scottish Air Ambulance Service.

In 1973 when I joined my father's practice my nurse wife Lorna and I had a much easier time with only one sea crossing, better communications, well trained community nurses and an active Social Work department. I worked out of a modern clinic which provided screening and health promotion. Through immunisation programmes infectious diseases of childhood are rare. The Scottish Air Ambulance Service is now well established as a vital medical intervention in the Hebrides.







Wonga  
JOHN MACLEOD ORATION AWARD  
Presented to  
David J. Macleod  
2014



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# Policy is...

a high-level overall plan

embracing the general goals

and acceptable procedures

especially of a governmental body

Merriam-Webster Dictionary on-line 2013





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# Evidence based policy or policy based evidence?

*Willingness to take action influences the view of the evidence—look at alcohol*

**W**hat should we do about alcohol? It is a major threat to the health of the public. Alcohol consumption in Britain has risen by more than 50% in the last 30 years, and alcohol associated deaths, particularly liver cirrhosis, have risen as a result.<sup>1</sup> Alcohol is, in addition, responsible for much morbidity, crime, family disruption, and harm to children. A simple prescription would be to review the scientific evidence of what would make a difference, formulate policies, and implement them—evidence based policy making. Unfortunately this simple prescription, applied to real life, is simplistic. The relation between science and policy is more complicated. Scientific findings do not fall on blank minds that get made up as a result. Science engages with busy minds that have strong views about how things are and ought to be.

In the 1980s when debates about fatty diets and heart disease risk were raging, I was struck that individual scientists seemed to have taken entrenched positions on the issue. One new piece of evidence would be even more reason for one camp to call for action to change the nation's diet; but, for the other camp, the same evidence represented a further nail in the coffin of a defunct hypothesis which strengthened the view that people should be left to enjoy their fish and chips without the interference of the food police, or the nanny state. It seemed to me then that people's willingness to take action influenced their view of the evidence, rather than the evidence influencing their willingness to take action.<sup>2</sup>

When it comes to government action, we find the same phenomenon. The topic of inequalities in health

was unpopular in Britain in the 1980s. An impressive review of evidence was insufficient to convince a government to act.<sup>3</sup> A change of government in the 1990s meant that government was willing to take action on health inequalities. A review of the scientific evidence and accompanying policy recommendations<sup>4</sup> were sufficient for a government to implement many of them.<sup>5</sup> It is true that the science base had improved between Black's review at the end of the 1970s and Acheson's 20 years later. As a scientist with an obvious interest, I would like to think that this improvement in the science, despite some shortcomings,<sup>6</sup> helped with evidence based policy formation. I have to acknowledge that, in addition, Acheson's recommendations went with the grain of government policy. This no doubt helped. Government's willingness to take action influenced their view of the science.

Although it is understandable that governments should do what they want rather than what a group of scientists suggests they should do, it means that the model of evidence based policy in the first paragraph is something of a parody. Consider the recent example of alcohol. Two reports were published in England in March: one by the Academy of Medical Sciences, the other by the prime minister's strategy unit. The academy's report concluded that to control alcohol problems one needed to control alcohol; that is, reduce the average level of consumption in the population. The academy reached this conclusion on the basis that a strong correlation exists between average consumption, the prevalence of heavy drinking, and associated harm. It found the evidence for education

See also p 905





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# Rural Realities

- geography and demography
- attitudes and values
- morbidity and mortality
- limited resources
- workforce shortages



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# Rural Health Around the World

access is the rural health issue

- resources concentrated in cities
- communication  
and transport difficulties
- rural health workforce shortages





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# Rural Health Services

- access is the major issue
- “safety net”
- local services preferred
- limited resources
- workforce shortages
- different from cities





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# Rural Practitioners

## “Extended Generalists”

- wide range of services
- high level of clinical responsibility
- relative professional isolation
- specific community health role





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# Rural Health Care

- specialists' support role
- partnership not putdown
- consultant support local service
- not assume patients will travel



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# Interprofessional Teamwork

- Much talked about in the cities
- Actually happens more  
in rural communities

- workforce shortages
- community relationship
- “do the necessary”



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# Commission for Rural Communities

Tackling rural disadvantage

## **The value of rural proofing**

**Rural proofing** is shorthand for a process that involves assessing how policies will work for rural people and places and, so, ensure that the policies are implemented fairly and effectively.

The benefits of rural proofing to **good policy making** are wide ranging. They include:

### **Better decision making**

Weighing how a policy will impact on rural and urban areas is the best way to find an effective way to roll it out to everyone, wherever they live.

### **Improved communication**

Using strong evidence to explain why certain strategies are being used in rural areas makes it easier for people to understand departmental reasoning, and improves community acceptance of policy decisions.

### **Strengthening relationships**

Identifying and engaging rural stakeholders will improve a department's understanding of, and responses to, the needs of rural people.

### **Building capacity**

By helping rural interest groups to contribute to a policy's development and its evaluation, communities gain opportunities to engage meaningfully with the policy making process, now and in future.



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# Rural Proofing Conclusions

- Rural communities must engage in policy development at an early stage
- Engagement needs strong and robust data with which to argue our cases
- Health Care professions need to develop strong and wide partnerships at local regional and national levels
- There is a place for forming multi-sector networks



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## A Code of Practice for the International Recruitment of Health Care Professionals: MELBOURNE MANIFESTO: WAY FORWARD

Adopted at 6<sup>th</sup> World Rural Health Congress  
Santiago de Compostela, Spain, 2003

Further to the Melbourne Manifesto 2002, we as rural health professionals from around the world who were present at the Sixth WONCA World Conference on Rural Health at Santiago de Compostela, Spain, recommend the following steps be taken to progress the Melbourne Manifesto.

### **These include:**

- Translate the Code on Ethical recruitment into Spanish and other appropriate languages
- Present the Manifesto to the Wonca Executive meeting in Beijing for endorsement and submission to the Wonca Council meeting in Orlando and the WHO
- Ensure the Code is presented to the Orlando conference and use this as a chance to publicize it
- Wonca and the Global Family doctor website should take a lead in facilitating and promoting the international sabbaticals for family physicians
- Link with local champions, national agencies and international organizations to promote the code and facilitate coordinated skills transfer to developing countries

*We also note that monitoring of the implementation of the code with penalties is essential for its success.*



rural health





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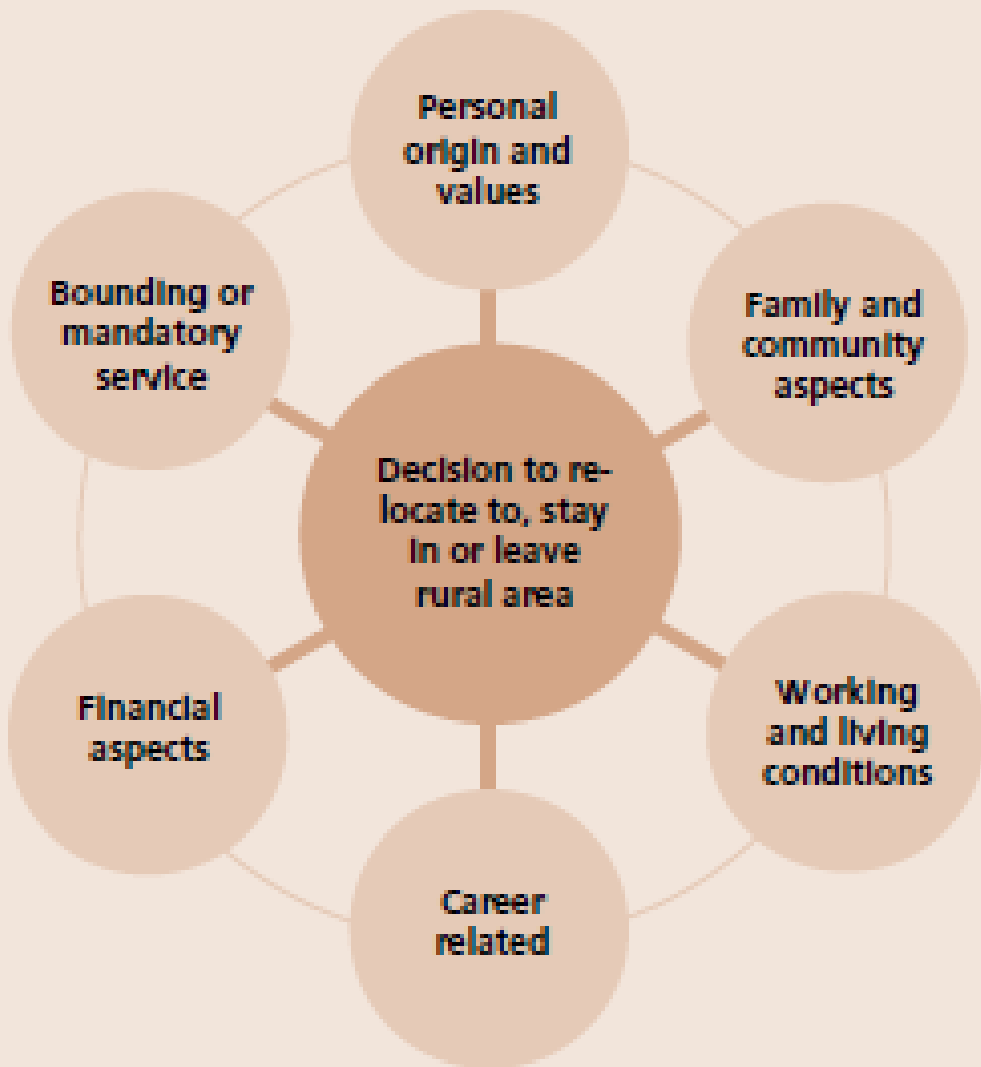


World Health  
Organization

**Increasing access  
to health workers in  
remote and rural areas  
through improved  
retention**

**GLOBAL POLICY RECOMMENDATIONS**

**Figure 2. Factors related to decisions to relocate to, stay in or leave rural and remote areas**



- Personal**  
Rural background (origin), values, altruism
- Family and community**  
Provision of schooling for children, sense of community spirit, community facilities available
- Financial aspects**  
Benefits, allowances, salaries, payment system
- Career related**  
Access to continuing education opportunities, supervision, professional development courses/ workshops etc, senior posts in rural areas
- Working and living conditions**  
Infrastructure, working environment, access to technology/medicines, housing conditions etc
- Bonding or mandatory service:**  
Whether obligated to serve there



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# Recruitment & Retention Strategies

- education and training
- regulatory initiatives
- financial incentives & rewards
- personal & professional support
- sustainable service models







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# Sustainable Rural Health Services

- health service authority/agency
- health care providers
- community participation



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# Recruitment Facilitators for Rural Practice

- rural upbringing
- positive undergraduate  
rural clinical experiences
- targeted postgraduate training  
for rural practice





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# Retention Factors

- academic involvement
- recognition and reward
- support from “the system”
- active community engagement





# THE LANCET

## Health professionals for a new century: transforming education to strengthen health systems in an interdependent world

*Julio Frenk\*, Lincoln Chen\*, Zulfiqar A Bhutta, Jordan Cohen, Nigel Crisp, Timothy Evans, Harvey Fineberg, Patricia Garcia, Yang Ke, Patrick Kelley, Barry Kistnasamy, Afaf Meleis, David Naylor, Ariel Pablos-Mendez, Srinath Reddy, Susan Scrimshaw, Jaime Sepulveda, David Senwadda, Huda Zurayk*



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# Recommended Reforms and Enabling Actions

## Reforms

### Instructional

- Competency-driven
- Interprofessional and transprofessional education
- IT-empowered
- Local-global
- Educational resources
- New professionalism

### Institutional

- Joint planning
- Academic systems
- Global networks
- Culture of critical inquiry

## Enabling actions

- Mobilise leadership
- Enhance investments
- Align accreditation
- Strengthen global learning

## Goal

Transformative and  
interdependent  
professional  
education for  
equity in health





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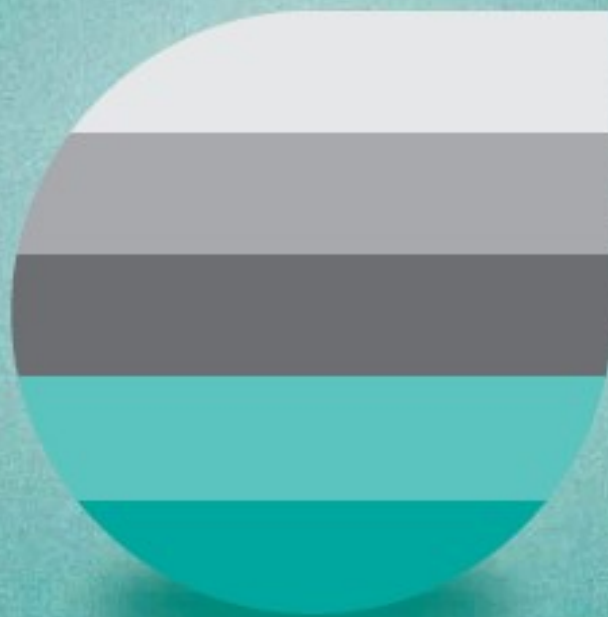
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# Transforming and scaling up health professionals' education and training

WORLD HEALTH ORGANIZATION  
GUIDELINES 2013



World Health  
Organization

[www.nosm.ca](http://www.nosm.ca)



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# Impact of Rural Based Medical Education

- more skilled rural doctors
- enhanced rural health care
- improved rural health outcomes
- broader academic developments
- economic developments





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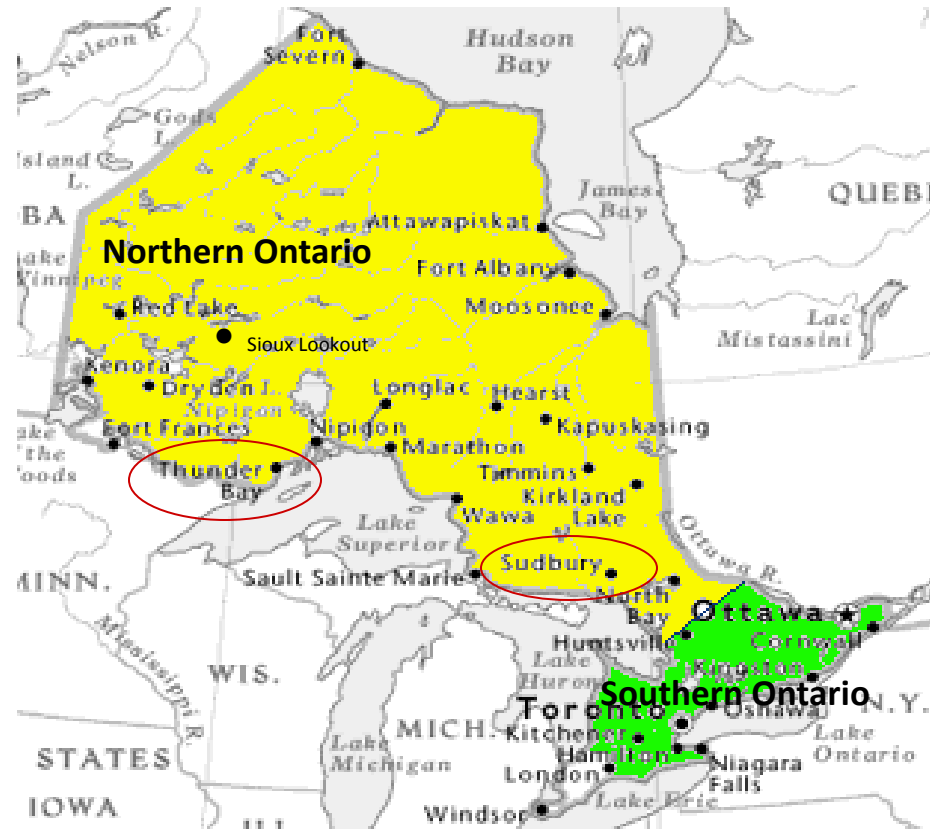




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# In, by and for Northern Ontario

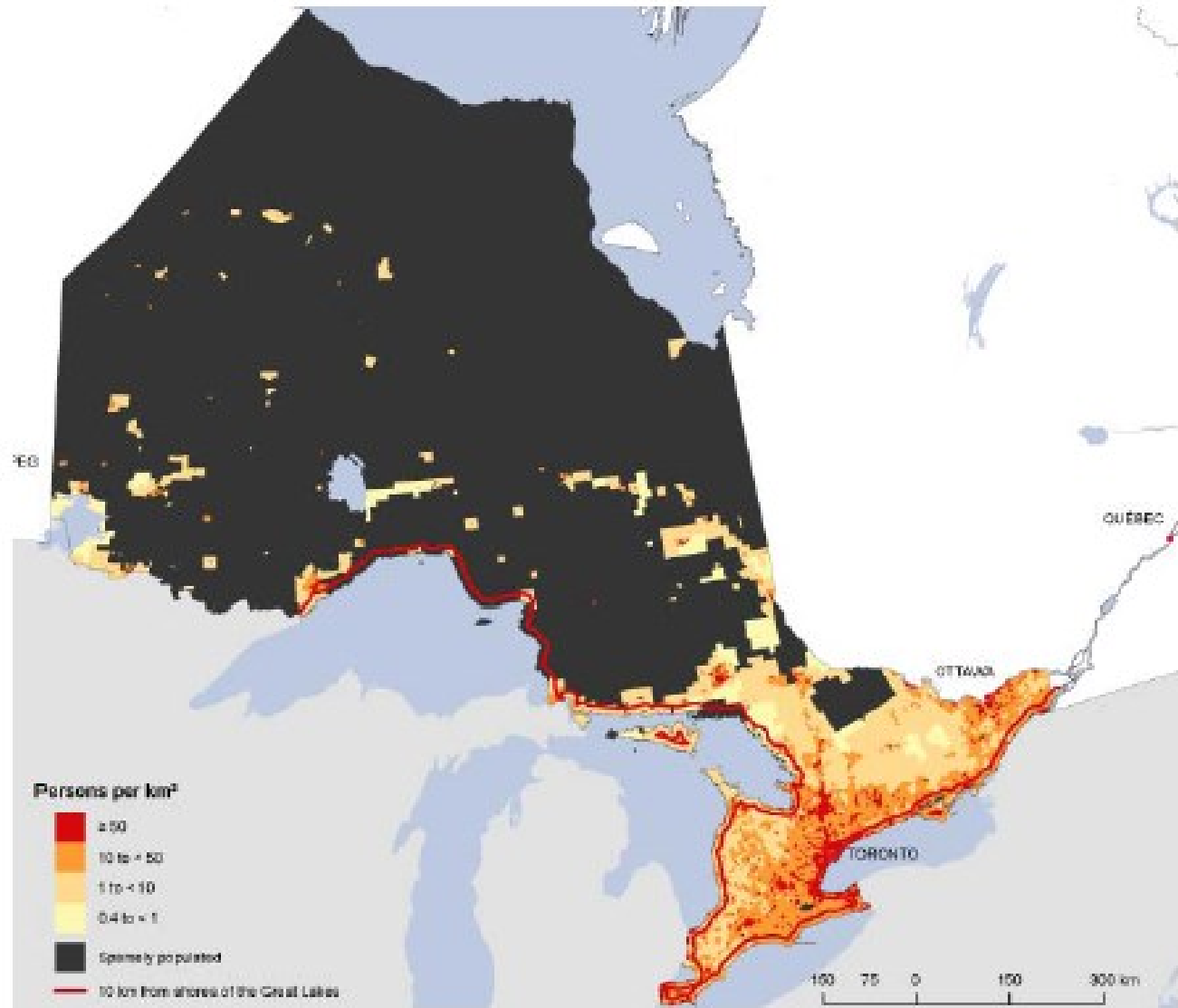


## Ontario's Population Distribution by Dissemination Area, Census 2006

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Source: Statistics Canada, Census 2006



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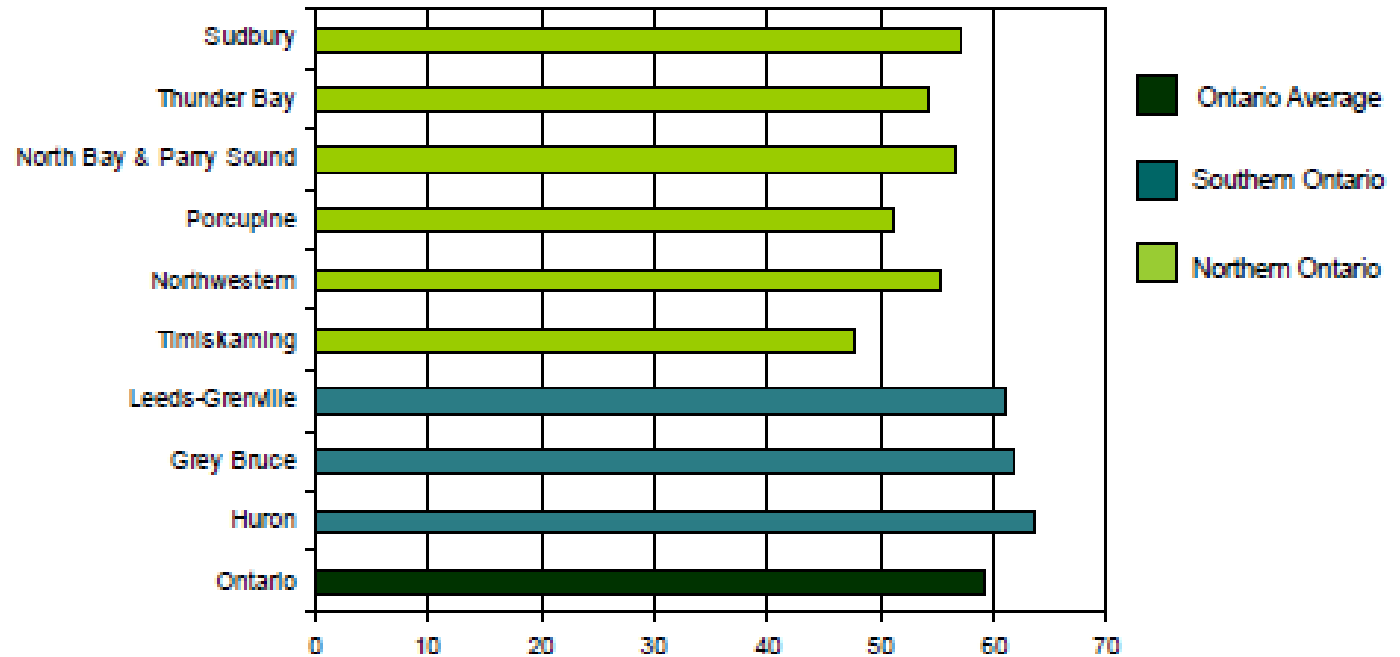
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# Northern Ontario Health Status

% Reporting Very Good or Excellent Health Status



Source: Statistics Canada, Health Profile, 2009





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# Northern Ontario School of Medicine

- Faculty of Medicine of Lakehead
- Faculty of Medicine of Laurentian
- Social Accountability mandate
- Commitment to innovation



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# Social Accountability

“Social Accountability of medical schools is the obligation to direct education, research and service activities towards addressing the priority health concerns of the community, region and/or nation they have a mandate to serve”

WHO, 1995



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# Doctor's Life Cycle

- high schools program
- local premed programs
- undergraduate program
- postgraduate programs
- professional development
- graduate studies



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# NOSM Academic Activities

- MD Program
- Residency Programs
- Continuing Education
- Health Sciences - Dietitians,  
Physician Assistants &  
Occupational / Physiotherapy
- Interprofessional Education
- Digital Library Services
- Research





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# Distributed Community Engaged Learning

- widely distributed human and instructional resources
- independent of time and place
- community partner locations distributed across Northern Ontario
- over 70 different sites







- Aboriginal Communities**  
 First-year medical students spend four weeks in an Aboriginal community in Northern Ontario.
- Rural/Remote Communities**  
 Second-year medical students complete two four-week placements in small rural or remote Northern Ontario communities.
- Comprehensive Community Clerkships (CCC)**  
 Third-year medical students spend eight months completing the CCC in a host community in Northern Ontario.
- Clinical Clerkships**  
 Fourth-year medical students undertake six core rotations in a twelve-month period at the academic health science centres in Sudbury and Thunder Bay.
- Postgraduate Residency Training**  
 Residency training at NOSM occurs at distributed learning sites throughout Northern Ontario.
- Northern Ontario Dietetic Internship Program (NODIP)**  
 Forty-eight week internships are completed in communities throughout Northern Ontario and North Simcoe Muskoka Local Health Integration Network (LHIN).
- Physician Assistant (PA) Program**  
 PA students undertake 40 weeks of supervised clinical rotations in rural and urban settings throughout Ontario, including 20 weeks in the North.
- Rehabilitation Studies**  
 Audiology, Occupation Therapy, Physiotherapy and Speech-Language Pathology learners undertake clinical placements in a diverse range of practice and community settings ranging from four to 12 weeks in duration.



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# Curriculum Innovations

- case based learning
- learning in context
- longitudinal integrated curricula
- community engaged education
- distributed learning
- rural based education
- integrated clinical learning





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# Community Engagement

- community active participant
  - interdependent partnership
- ensures student “at home”
- contributes to student’s learning experience
- education and research activities
- community capacity building





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# Academic Outcomes

- Residencies - 100% matched  
1<sup>st</sup> round Match, 3 of 5 years
- Medical Council of Canada Part 1
  - above national average
  - highest clinical decision making
- Medical Council of Canada Part 2
  - NOSM residents top total score  
in Canada 2008 & 2010



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# Career Directions

- 62% family medicine, mostly rural
  - 33% general specialties
  - 5% sub-specialties
- 
- “deep roots” in Northern Ontario
  - 70% of NOSM residents stay
  - MD graduates now practising doctors in Northern Ontario





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# Benefits of NOSM

- More generalist doctors
- Enhanced healthcare access
- Responsiveness to Aboriginal, Francophone, rural, remote
- Interprofessional cooperation
- Health research
- Broader academic developments
- Economic development





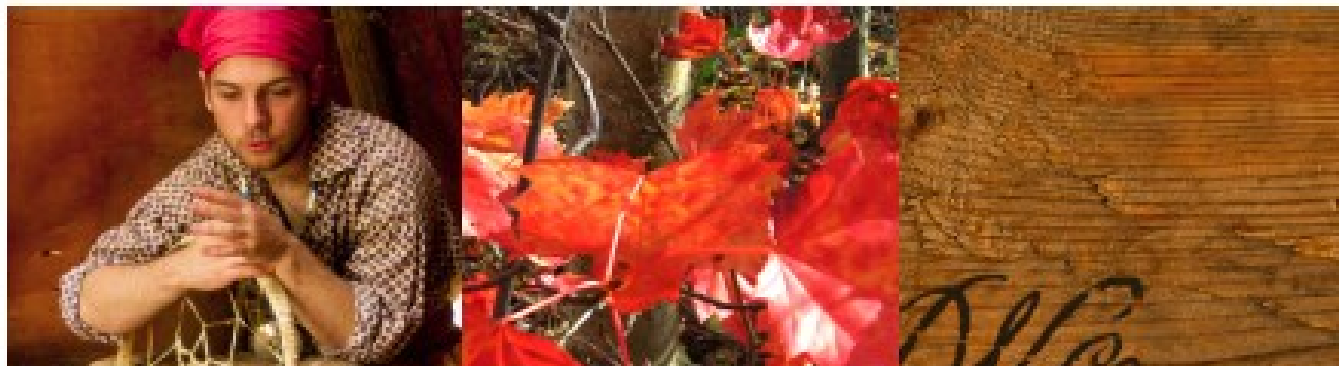
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# Thunder Bay Communique

## *New Ways of Thinking*



# Rendez-Vous 2012

together | ensemble | maamawi  
and engaged | et engagé | nakiidaa





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# Rural Health Success

- Context is critical
- Active community participation
- Focus on Health Equity
- Standards and quality
- Research evidence
- Challenge conventional wisdom
- Vision, mission and values







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