



INSTITUTE OF HEALTH ECONOMICS

ALBERTA CANADA

BECOMING THE BEST: BUILDING A SUSTAINABLE HEALTH SYSTEM GAME CHANGING HEALTH INNOVATIONS



This event is supported by Alberta Health Services in collaboration with Alberta Health and Wellness

**February 24, 2011
Edmonton, Alberta, Canada
The Fairmont Hotel MacDonald**



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HEALTH ECONOMICS
ALBERTA CANADA

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Dear Delegates:

On behalf of the Board of Directors, our CEO Dr. Egon Jonsson, and the whole team at the Institute of Health Economics, I would like to welcome you to the first in a special policy forum series: *Becoming the Best: Building a Sustainable Health System – Game Changing Health Innovations*.

This policy forum series is intended to support health system leaders thinking about the future of health services, health improvement and sustainability of the Alberta health system. The series is supported by Alberta Health Services in collaboration with Alberta Health and Wellness.

We are very pleased to have gathered such an outstanding faculty of experts and thought leaders to stimulate our thinking and open our minds to possible futures. We need to be evidence-informed as we develop long-term strategy but also imaginative and creative in our thinking. I believe that the key to future sustainability and quality of the health system will be through innovation – both through technological advances and in how we organize and deliver services.

We need to create a health system which is ready to capitalize on innovation, innovative thinking, and game changing innovations. I hope as you listen and debate the ideas you hear from the speakers today you think about how we can translate those lessons into actions.

Sincerely,

Dr. Lorne Tyrrell
Chair, Institute of Health Economics
GSK/CIHR in Virology, University of Alberta

Thursday, February 24, 2011 Program Summary

Foyer	0730 – 0800	Registration
Empire Ballroom	0800 – 0815	Introductions and Greetings <i>Fred Horne, MLA Government of Alberta</i>
	0815 – 0830	Disruptive Innovation: Analytical Framework and Background Study <i>John Rapoport, IHE</i>
	0830 – 1010	Innovations That Will Most Likely Change Health Services and Impact Health <i>Robert Brook, RAND</i> <i>Joseph Coughlin, MIT Agelab</i>
Foyer	1010 – 1030	Break
Empire Ballroom	1030 – 1200	Preparing a System for Future Innovation <i>Miles Ayling, NHS</i> <i>Axel Meisen, Alberta Innovates Tech Futures</i>
Foyer & Empire Ballroom	1200 – 1300	Lunch
Empire Ballroom	1300 – 1410	Game-Changing Health Innovations <i>Cliff Goodman, The Lewin Group, HTAI</i> <i>Jeffrey Lerner, ECRI Institute</i>
	1410 – 1520	Platforms for Innovation – Personal Approaches <i>Pamela Larson, KP</i> <i>AHS - Bill Trafford, AHS</i>
Foyer	1010 – 1030	Break
Empire Ballroom	1540 – 1655	Future Innovations – Impact on the Workforce <i>Michael Villeneuve, CNA</i> <i>Stephen Birch, McMaster University</i>
	1655 - 1715	What We Learned for the Future of Alberta Health Services: Reflections <i>Tom Noseworthy, University of Calgary</i> <i>Cy Frank, University of Calgary</i>
	1715 - 1720	Concluding Remarks <i>Alison Tonge, AHS</i>

Thursday, February 24, 2011 Program

Foyer

0730 - 0800

Registration

Empire Ballroom

0800 – 0815

Introductions and Greetings

Greetings on behalf of the Government of Alberta

Fred Horne, MLA for Edmonton-Rutherford and Parliamentary Assistant to the Minister of Health and Wellness, Government of Alberta

Greetings on behalf of Alberta Health Services

0815 - 0830

Disruptive Innovation: Analytical Framework and Background Study

John Rapoport, Institute of Health Economics

John Rapoport will explain the components of 'disruptive' or 'game changing' innovation, provide a brief overview of findings from the literature and discuss some examples of innovations that are thought to be game changing.

0830 – 1010

Innovations That Will Most Likely Change Health Services and Impact Health

Moderator: Tom Noseworthy, Director, Centre for Health and Policy Studies, Department of Community Health Sciences, University of Calgary

Thinking Out Loud – Health Services Research: Past and Future

Robert Brook, Distinguished Chair, RAND Corporation

In this session, Robert Brook will examine the role of Health Services research and what questions need to be answered as we look to incorporating research into the future of health services delivery.

Old Age, New Technology & the Creative Destruction of Health Systems Innovation

Joseph Coughlin, Director, MIT Agelab

Joseph Coughlin will discuss current work coming out of the MIT Agelab, focusing on mobile technology, home-based technology platforms for personal wellbeing and outlining potential strategies to address the needs of the aging population.

Foyer

1010 – 1030

Break

Empire Ballroom

1030 – 1200

Preparing a System for Future Innovation

Moderator: Susan Williams, Assistant Deputy Minister, Alberta Health and Wellness

Developing a Successful Culture of Innovation

Miles Ayling, Director of Innovation and Service Improvement, Commissioning and System Management Directorate, National Health Service

Miles Ayling will discuss the barriers to the adoption of new ideas that the National Health Service (NHS) has encountered and the steps taken to overcome them, and will review lessons learned from two specific programs (the Whole System Assistive Technology Demonstrator program, and the 'iTAPP' program).

Game Changing Innovations: the Foresight Approach

Axel Meisen, Chair of Foresight, Alberta Innovates – Technology Futures

Axel Meisen will provide an overview of the Foresight work underway from Alberta Innovates – Technology Futures focusing particularly on health and Alberta. What are the key trends to look for and probable futures.

Foyer and Empire Ballroom

1200 - 1300

Lunch

Empire Ballroom

1300 - 1410

Game-Changing Health Innovations

Moderator: Cy Frank, Professor of Surgery and McCaig Professor of Joint Injury and Research, University of Calgary

Getting to Personalized Medicine: Changes in the Innovation Environment

Cliff Goodman, Senior Vice President and Principal, The Lewin Group, Vice-President Health Technology Assessment International, htai.org

Cliff Goodman will discuss potential advances in personalized medicine and in genetics and how associated technologies can be effectively adopted in healthcare systems.

Forecasting, Comparing, and Preparing for Adopting Technologies on the Horizon

Jeffrey Lerner, President and Chief Executive Officer, ECRI Institute

Jeffrey Lerner will review his Health Technology Forecast program currently underway to discuss how health systems can prepare for the future technologies that are on the horizon.

Empire Ballroom

1410 - 1520 **Platforms for Innovation – Personal Approaches**

Moderator: Marvin Fritzler, Professor of Medicine, Arthritis Society Chair, Departments of Medicine and Biochemistry and Molecular Biology, University of Calgary; Chair of Alberta Research and Innovation Authority.

How Kaiser Permanente is Enabling over 3 Million Members to Engage in their Health

Pamela Larson, Director, Consumer Health, kp.org, Kaiser Permanente

Pamela Larson will provide an overview on the use and evolution of Kaiser Permanente's Personal Health Record system, including a brief demo this program, which is currently used by over 3 million members and highlight how they are planning for future developments.

Personal Health Portal and Interactive Care Record - AHS

Bill Trafford, Senior Vice President, Corporate Merger and Information Technology, Alberta Health Services

Bill Trafford will discuss the current work being done within Alberta Health Services as they move forward with the Personal Health Portal across the province.

Foyer

1520 - 1540 **Break**

Empire Ballroom

1540 – 1655 **Future Innovations - Impact on the workforce**

Moderator: Jeanne Besner, Director, Health Systems and Workforce Research Unit, Alberta Health Services

Impacts on the Nursing Workforce

Michael Villeneuve, Scholar in Residence, Canadian Nursing Association

Michael Villeneuve will look to the future of health services and how this will effect the role of nurses and other health professionals including new training models and new approaches to delivering care in partnership with patients and families.

Health Workforce Planning and Innovations in Service Delivery

Stephen Birch, Professor, Department of Clinical Epidemiology & Biostatistics, Centre for Health Economics and Policy Analysis, McMaster University

Stephen Birch will outline how organizations can work towards preparing a workforce for cultural change, and looking at how we can match staff qualifications with new innovations available.

Empire Ballroom

1655 - 1715

What We Learned for the Future of Alberta Health Services: Reflections

Tom Noseworthy, Director, Centre for Health and Policy Studies, Department of Community Health Sciences, University of Calgary

Cy Frank, Professor of Surgery and McCaig Professor of Joint Injury and Research, University of Calgary

Tom Noseworthy and Cy Frank will present their reflections on the day, and thoughts on priorities going forward as an organization.

1715 - 1720

Concluding Remarks

Alison Tonge, Executive Vice President, Alberta Health Services

Speakers



Miles Ayling, Director of Service Design (Commissioning and System Management Directorate), Department of Health, United Kingdom

Mr. Miles Ayling is Director of Service Design (Commissioning and System Management Directorate) at the Department of Health in the UK. As Director of Service Design, Mr. Ayling heads a Division of around 40 staff, and has policy responsibility for a number of important areas of health service and system design: Long-term conditions (including care planning, case management, self care and assistive technology), Urgent & emergency care (including Out of Hours, Ambulance services and Adult Critical Care), Reconfiguration of services in Primary Care Trusts and hospitals, Non-emergency three-digit (telephone) number, and Innovation (creating the culture, behaviour, funding, knowledge and support infrastructures that allow innovation to flourish throughout the NHS).

Since moving to the Department of Health in 2002 from the Benefits Agency, Mr. Ayling has been responsible for significant healthcare reform programs, including the introduction of legislation on care trusts, delivery of commissioning a patient led NHS, and Local Delivery Planning. He has also led programs to reduce burdens and bureaucracy on the front line, introduced new planning regimes for the NHS, and led the NHS wide restructuring of Strategic Health Authorities and Primary Care Trusts.



Stephen Birch, Professor, The Centre for Health Economics and Policy Analysis, McMaster University, Canada; Chair in Health Economics, University of Manchester

Dr. Stephen Birch is a Professor in The Centre for Health Economics and Policy Analysis at McMaster University in Canada and Chair in Health Economics at the University of Manchester. He holds honorary or visiting appointments at Universities in Australia, South Africa and Sweden. He is senior scientist at the WHO Collaborating Centre on Health Workforce Planning at Dalhousie University, Canada and a member of the UK Department of Health's Centre for Workforce Intelligence. He has served as a consultant with WHO and the World Bank as well as many national and provincial health departments on health workforce planning. He was a consultant to the Barer-Stoddart report on physician planning in Canada, The Kilshaw report on Physician payment reform in Canada and the George Committee on the future of the Physician workforce in Ontario.

Dr. Birch led research in Canada on the development and application of needs-based models of health care funding and has further developed these models for application to health workforce planning. The workforce planning frameworks used incorporate explicit consideration of innovations in the production and delivery of health care and dynamic changes in population morbidity. They are applied to both team-based models of service delivery and competency based

approaches to planning, both within the health care sector and across health and social care sectors. His main research interests are in the economics of health care systems with particular emphasis on equity, resource allocation and alternative delivery models. He has over 200 publications in peer reviewed journals and is Senior Editor for Social Science and Medicine.

Dr. Birch has served on various public boards including the Local Health Integration Network and the District Health Council in Hamilton, Ontario, the Health Professions Regulatory Council of Ontario and the Community Health Council for York District Health Authority.



Robert Brook, MD, ScD, FACP, Distinguished Chair in Health Care Services, RAND Corporation

Dr. Robert Brook holds the Distinguished Chair in Health Services at the RAND Corporation, where he previously serviced as vice president and director of RAND Health. He is Professor of Medicine at the David Geffen School of Medicine and Professor of Health Services at the School of Public Health at the University of California, Los Angeles, where he also directs the Robert Wood Johnson Clinical Scholars Program. A board-certified internist, he received his M.D. and Sc.D. degrees from Johns Hopkins University. He has been on the medical school faculty at UCLA since 1974, and divides his research time between UCLA and RAND. A prolific scholar, Dr. Brook has published over 300 peer-reviewed articles in the course of his long and productive career. He conducted pioneering work in the field of quality measurement. He operationalized the concept of appropriateness by establishing the scientific basis for determining whether various medical and surgical procedures were being used appropriately. More than any other individual, he is responsible for focusing policymakers' attention on quality-of-care issues and their implications for the nation's health. Most of the quality of care and health status measures being used today throughout the developed world were developed by Dr. Brook or by research teams that he led.

Dr. Brook has received numerous professional honors, including the Peter Reizenstein Prize, 2000, for his paper "Defining and Measuring Quality of Care: A Perspective from US Researchers," the National Committee for Quality Assurance Health Quality Award for pursuit of health care quality at all levels of the health system, Research! America's 2000 Advocacy Award for Sustained Leadership at the National Level, the Robert J. Glaser Award of the Society of General Internal Medicine, the Richard and Hinda Rosenthal Foundation Award of the American College of Physicians, and the Distinguished Health Services Research Award of the Association of Health Services Research. He is an elected member of many professional organizations, including the Institute of Medicine, the American Association of Physicians, the Western Association of Physicians, and the American Society for Clinical Investigation. He was selected as one of 75 Heroes of Public Health by Johns Hopkins University and is a member of the Johns Hopkins Society of Scholars. In 2005, he was awarded the Institute of Medicine's prestigious Gustav O. Lienhard Award for the advancement for personal health care services in the United States. In 2002, Dr. Brook was named chair of a panel

to advise the Office of Statewide Health Planning and Development on how to report outcomes of coronary artery bypass graft surgery at California hospitals. In 2007 he received the David E. Rogers Award from the Association of American Medical Colleges. This award recognizes a medical school faculty member who has made major contributions to improving the health and health care of the American people.



Joseph F. Coughlin, PhD, Director, Massachusetts Institute of Technology AgeLab

Dr. Joseph F. Coughlin is Director of the Massachusetts Institute of Technology AgeLab. He is one of Fast Company Magazine's '100 Most Creative People in Business' and was named by the Wall Street Journal as one of "12 pioneers inventing the future of aging and how we will all live, work and play tomorrow." His research seeks to understand how demographic and social trends, human behavior and technology converge to drive future innovations in business and government.

Dr. Coughlin is the recipient of the Gerontological Society of America's Maxwell A. Pollack Award for Productive Aging for demonstrated excellence in translating research into practical application improving the lives of older people and was recognized by the Visiting Nurse Association as a Home Health Hero for his research in intelligent systems and home care for the elderly.

Based in MIT's Engineering Systems Division, Dr. Coughlin teaches graduate classes in policy and health systems innovation and is author of the on-line publication Disruptive Demographics.com. He consults on product design, policy development and systems strategy to governments including public and private health insurers, information technology & telecommunications providers and the pharmaceutical industry.



Clifford Goodman, PhD, Senior Vice President and Principal, The Lewin Group

Dr. Clifford Goodman is Senior Vice President and Principal at The Lewin Group, a health care policy and human services consulting firm based in Falls Church, Virginia. He has 30 years of experience in health technology assessment, comparative effectiveness research, health economics, and studies pertaining to health care innovation, regulation, and payment.

Dr. Goodman directs projects for an international range of government agencies; pharmaceutical, biotechnology, and medical device companies; health care provider institutions; and professional, industry, and patient advocacy groups. Dr. Goodman directs the Lewin Group Center for Comparative Effectiveness Research. He is the current chair of the Medicare Evidence Development & Coverage Advisory Committee (MEDCAC) for the US Centers for Medicare and Medicaid Services. He has testified to Congress on issues pertaining to Medicare coverage

of health care technology. He is Vice President of the professional society, Health Technology Assessment International (HTAi), and is a Fellow of the American Institute for Medical and Biological Engineering.

Dr. Goodman did his undergraduate work at Cornell University, received a master's degree from the Georgia Institute of Technology, and earned his doctorate from the Wharton School of the University of Pennsylvania.



Pamela Larson, MPH, Director, Consumer Health, kp.org Internet Services Group, Kaiser Permanente

Pamela Larson leads and manages the work of the Health Portfolio for kp.org, the official Kaiser Permanente website. She maintains editorial oversight of all health content on the site, including information related to consumer health, facility and provider directories, the personal health record (PHR), online visits and population care. She leads a team of health professionals who enable the delivery of a clinically based PHR, assures all health content is evidence-based, is in alignment with Kaiser Permanente's clinical guidelines, and inspires trust in the Kaiser Permanente Web site as an accurate and reliable source of health information. Ms. Larson's 25 years of strategic leadership in redesigning delivery systems to improve member health in a large multi-site health maintenance organization have resulted in the implementation of key programs such as: Healthy Lifestyle programs, evidence-based online behavior change tools, PHP Printed Preventative HealthPrompt, a state-of-the-art prevention reminder system for Kaiser Permanente members; The Self-Care Program, which provides members with a medical guide (The Healthwise Handbook) to empower them to take charge of their health; and Bright Systems, a pediatric care delivery system.

A frequent author and presenter, she has taught a variety of health-related courses. She earned her Master's in Public Health Education from San Jose State University, and her Bachelor's of Science in Public Health Education from the University of California, Berkeley.



Jeffrey C. Lerner, PhD, President and Chief Executive Officer, ECRI Institute

Dr. Jeffrey C. Lerner has served since 2001 as President and Chief Executive Officer. ECRI Institute (formerly the Emergency Care Research Institute, founded in 1968) is the world's largest independent nonprofit health technology assessment organization that researches the best approaches to improving patient care. It is a Collaborating Center of the World Health Organization with terms of reference in technology, risk management and patient safety. It is also designated as an Evidence-based Practice Center (EPC) by the U.S. Agency for Healthcare Research and Quality (AHRQ) and is listed as a Patient Safety Organization (PSO) by the U.S. Department of Health and Human Services. ECRI Institute maintains a full time staff of over 300 in offices in North America, Europe and Asia. Six Vice Presidents report to the President. Information on ECRI Institute is available at www.ECRI.org.

Prior to this, he held the position of Vice President for Strategic Planning for 17 years. He played the key role in setting the course for ECRI Institute's transition from its origins as a medical device evaluation laboratory to a broader health research organization that assesses clinical procedures and drug therapies in addition to medical devices, worldwide.

Dr. Lerner maintains a special interest in assistive technology for the disabled and has served as principal investigator on projects for the U.S. Department of Transportation and the Easter Seals Society. He was the first Director of ECRI Institute's Center for Healthcare Environmental Management™, which offers programs worldwide. He developed ECRI Institute's annual technology assessment educational conference. In 1992, the Society for Strategic Healthcare Planning and Management of the Hospital Association of Pennsylvania selected him for the Dorinson Award.

Over the past 27 years, Dr. Lerner made major presentations to government agencies and professional organizations worldwide and has written articles such as "The Case for a National Patient Library™" which appeared in the October 2010 issue of Health Affairs and "The Consequences of Secret Prices: The Politics of Physician Preference Items," also published in Health Affairs in November 2008. Dr. Lerner has authored editorials, book chapters and book reviews, such as the Journal of Legal Medicine's Book Review Essay "Rescuing Science from Politics, Regulation and the Distortion of Scientific Research," edited by Wendy Wagner and Rena Steinzor. Dr. Lerner also reviews for journals such as JAMA, Health Affairs, the Journal of General Internal Medicine and the Journal of Clinical Orthopaedics and Related Research.

Dr. Lerner received his M.A., M.Phil., and Ph.D. from Columbia University, where he was awarded three University President's Fellowships and other honors. His B.A. is from Antioch College, and his business training is from the Wharton School. He also studied abroad at St. Andrew's University, Scotland. Dr. Lerner is a graduate of Stuyvesant High School, New York.



Axel Meisen, Chair of Foresight, Alberta Innovates-Technology Futures

Dr. Axel Meisen is the first Chair of Foresight at Alberta Innovates – Technology Futures, which includes the former Alberta Research Council. In this capacity, he engages pre-eminent thinkers from Canada and around the world with a focus on defining issues where AITF can strengthen its role as a strategic agent for innovation and economic development in Alberta and elsewhere. In particular, he leads the Jasper Innovation Forum where issues of strategic global importance are addressed.

Dr. Meisen is a chemical engineer, with wide experience in Canada and abroad. He holds degrees from the Imperial College of Science and Technology (UK), California Institute of Technology (USA) and McGill University. Before coming to Alberta in 2008, he served as president and vice-chancellor of Memorial University of Newfoundland.

Dr. Meisen was selected as one of the Top 50 CEO's in Atlantic Canada in 2005-07; awarded the 'Medal of Distinction' by the Government of Peru for service to that country's post-secondary education sector, and made a Fellow of the Canadian Academy of Engineering, the Canadian Institute of Chemistry and the Institution of Engineers of Ireland. He is a Member of the Order of Canada and currently serves as President of the Canadian Commission for UNESCO.



John Rapoport, Professor of Economics, Mount Holyoke College

A specialist in health economics, John Rapoport is the author, with Phillip Jacobs, of *The Economics of Health and Medical Care* (Aspen, 2001), and, with Robert L. Robertson and Bruce Stuart, of *Understanding Health Economics* (Aspen, 1982). His research has focused on economic issues related to critical care, such as methods to evaluate the economic performance of intensive care units, factors influencing the use of specific medical technologies, and the determinants of ICU costs. Another research interest in health care is Canada and he has published papers on costs of chronic disease in Canada and comparison of ICU utilization between Canada and the U.S.

Dean of the College from 1995 to 1998, Rapoport was also one of the founders and the first director of the interdisciplinary Complex Organizations Program, which focuses on the elements of leadership and the nature of organizations.

Rapoport has taught courses on introductory microeconomics, microeconomic theory, statistics, health economics, environmental economics and industrial organization.



William (Bill) Trafford, Senior Vice President Corporate Merger and Information Technology, Alberta Health Services

Mr. Bill Trafford is the Senior Vice President Corporate Merger and Information Technology for Alberta Health Services. During the 4 years prior to the formation of Alberta Health Services, Mr. Trafford was with the Calgary Health Region where he was responsible for the design, training, change management and implementation of the Region's e_record capability. This capability provides the most advanced clinical system, serving more clinicians in more ways than any others in North America. The Calgary Health Region achieved the highest level of adoption of CPOE in the world. 100% of physicians use the Order Entry capability. The capability transformed the Calgary Health Region by allowing real time information to support clinical decisions and has materially impacted quality, utilization and safety.

As the Province moved forward, Mr. Trafford has taken on the role as the new Chief Information Officer for Alberta Health Services and most recently has become Senior Vice President Corporate Merger and Information Technology. Alberta Health Services is the merger of all health delivery organizations in Alberta. It is the largest merger ever undertaken in Canada. Alberta Health Services has over 90,000 employees, an annual operating budget of \$11B, and serves a population of 3.5 million.

Prior to joining the Region, Mr. Trafford was the CEO of a North American consulting company focused on developing systems to support high volume trading transactions in the financial, oil and gas and renewable resource sectors.



Michael J. Villeneuve, RN BScN MSc, Scholar-in-residence, Canadian Nurses Association

With 30 years of progressive experience in the health-care system, Mr. Michael Villeneuve has held positions as nursing attendant, staff nurse, instructor, outpost charge nurse, research coordinator, lecturer, author and clinical nurse specialist. Mr. Villeneuve is currently scholar-in-residence with the Canadian Nurses Association (CNA), having joined the organization in July 2004 as senior nurse consultant. As co-principal investigator of CNA's study, *Toward 2020: Visions for Nursing*, he led CNA's work in "futurizing" nursing and developing nursing leadership. He is the author of *The Tenth Decade: Into a New Century, CNA 2000-2009*, a hallmark work highlighting CNA's leadership and achievements and is an author of CNA's forthcoming centennial history, *The CNA 1908-2008: One Hundred Years of Service*.

Mr. Villeneuve also serves as editor of health policy and innovation for the *Canadian Journal of Nursing Leadership*. Previous positions include executive director of the Academy of Canadian Executive Nurses, and four years as a senior nursing policy consultant in Health Canada's Office of Nursing Policy. In that role, Mr. Villeneuve was a visiting consultant with the Organisation for Economic Co-operation and Development (OECD) in Paris, where he co-authored the nursing human resources report *Tackling Nurse Shortages in OECD Countries* (2005).

For the last five years of his clinical career, Mr. Villeneuve was patient care manager in the neuro intensive care unit and neuro-trauma ward at Toronto's Sunnybrook Health Sciences Centre.

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This image shows a full page of blank white paper with horizontal ruling lines. The lines are evenly spaced and run across the width of the page, providing a template for writing or drawing. There are no margins, text, or other markings present.

For more information

Egon Jonsson, Executive Director and CEO
Institute for Health Economics
1200 10405 Jasper Avenue
Edmonton AB, T5J 3N4

Phone: (780) 448-4881
Email: ejonsson@ihe.ca
www.ihe.ca