Igniting Change in Primary Health Care

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Co-Founder and Executive Director
Primary Health Care Services of Peterborough
Today

- “Striking” similarities
- Facing challenges and opportunities
  - Access
  - Teams
  - Timely information
  - Healthy Living
- Pulling it all together
- Going forward
Many have no choice but to use emergency room, day clinic.
Community Patient Demographics

Patient Medical Services Utilization by Age
Average Number of Services per Patient

Implications

• 18% of the population of Peterborough is over the age of 65 while 12% of Ontario’s population is over the age of 65.

• 81% of Canadian seniors living in the community report at least one chronic health condition while 14% of those over 60 were co-morbid.

• For person in Ontario over 65 years the health care costs average $7,723.40 while the average for all age cohorts is $2,238.90.
The Crisis – without an investment in Primary Health Care

• Double the number of unattached patients – 5 years

• Wait times for specialist services will increase

• Avoidable ED visits would increase to >6,000 visits/month

• Complications resulting from a lack of access to primary care would threaten health system sustainability
Our Solution: To “Ignite” Change

1. Establish a sense of urgency
2. Create the guiding coalition
3. Develop a vision and strategy
4. Communicate the change vision
5. Empower people to act
6. Generate short term wins
7. Consolidate the gains
8. Anchor the change in the organization’s culture

John P. Kotter, Havard School of Business; “Leadership and Change”
Peterborough’s Interdisciplinary Teams

**Who We Are:**
- 5 Networked Health Teams
- 23 Sites
- 100% EMR enabled
- 122,000 Patients

**Team:**
- 82 Family physicians
- 21 Nurse Practitioners
- 13 Mental Health Clinicians
- 6 Registered Dietitians
- 3 Pharmacists
- 22 Registered Nurses
- + Administrative Support

**Facilitated Integration**
- Primary & Specialty Care
- Health System

**2006 to present:**
- 25,000 + unattached patients placed with a primary care physician
- 16 new Family Physicians
- 24/7 Access
- Annual Emergency Room Visits Significantly Reduced
- Integrated CDM programs INR, Mental Health, Vascular, Diabetes, Asthma, COPD, Youth Sports Concussion Program
- Integrated planning, primary and specialty care
- 600 + newborns and families placed with a primary care MD

About us...

Teams work, patients win (Peterborough, ON)


Health Council of Canada Conseil canadien de la santé
....Igniting Change in Primary Health Care
Key Building Blocks for Primary Health Care

Access  Teams  Timely Information  Healthy Living
• Delivery System design
• 24/7 care
• Unattached patients
• Patient engagement
Delivery System Design - Enablers

1. **Provider Engagement**
   - Understand readiness to embrace practice redesign
   - Created infrastructure to improve efficiency, effectiveness, access, patient and provider satisfaction
   - Ensure that value of the individual contribution is acknowledged
   - Continuous feedback mechanism

2. **Remuneration**
   - Business case aligned to provincial and federal health system goals, strategies, resources, incentives

3. **Patient Engagement**
   - Continuous engagement to inform plan development aligned to patient needs and population health goals

4. **Development of Meaningful Partnerships**
   - Values based partnerships leveraged to advance collective goals
Delivery System Design

• New clinic space
• Physician Recruitment & Retention
• Recruitment of Allied Health Professionals
• Implementation of population-based patient engagement and healthy living strategies
• Collaboration with community resources
• 100% EMR adoption
Outcomes to Date

**Population Served**
- 122,000 patients receive comprehensive primary care services through PHCSP
- >90% of the total population of Peterborough County and City.

**Regular Office Visits:**
- 98% of patients seeking primary care between 7:00 and 17:00 Monday to Friday have been accommodated
- 415,000 patient visits annually conducted by primary care practitioners

**After-hours visits**
- 27,125 visits annually
- 93% of patients seeking primary care between 17:00 and 20:00 have been accommodated by after hours care
24/7 Care

Attached Patient Visits

Time of Day: 08:00 - 16:59
- PRHC ER visits with CTAS 4 or 5 1.9%
- Peterborough Primary Care provider 98%

Time of Day: 17:00 - 20:00 / Weekends 9:00 - 12:00
- PRHC ER visits with CTAS 4 or 5 7%
- Peterborough Primary Care provider 93%

PHCSP 2011 Annual Report
24/7 Care

PHCSP Extended Hours Utilization

![Bar chart showing the number of visits from 2007 to 2010]

PHCSP 2011 Annual Report
Unattached Patients

“Access to Primary Health Care: Ideas for Improvement:”

- Establish interdisciplinary primary care teams
- Use all team members to the fullest
- Increase the number of patients served
- “...after the establishment of family health teams in Peterborough, 17,000 without a family doctor gained access to primary care....”

OHQC 2011 report page 29 (based on 2009 data)
Unattached Patients

Percentage of Adults who are:
- Provincial - Without a primary care provider
- Provincial - Without a primary care provider & actively seeking one
- Peterborough - Without a primary care provider
- Peterborough - Without a primary care provider & actively seeking one

Ontario Health Quality Council 2011 Quality Monitor Report
Patient Engagement – ER visits

“Avoidable emergency visits: Ideas for improvement”

• Patients of family physicians who practice within groups or teams that provide after-hours clinics and access to on-call advice from a clinician are less likely to go to an ED.
• “Establishment of family health teams in Peterborough resulted in 15,000 fewer ED visits”.

OHQC 2011 Report page 81 (based on 2009 data)
Patient Engagement – ER Visits

ER Visits Category 4
2003-2010

Visits

Jan Feb Mar Apr May Jun Jul Aug Sep Oct Nov Dec

Access

2003 2004 2005 2010

Peterborough Regional Health Centre Data on file
• Integration
  – Within teams
  – Primary & Specialty Care
• Governance
• Accountability
• Care coordination
• Enablers
The Team
Members of the Peterborough Networked Family Health Teams
Redefining Health Care Delivery

**Current Perspective**

- The goal is treatment
  - More treatment costs more
- Designed around facilities, locations and physicians
- Organized by specialties or types of practitioners
- Treat diseases/incidents
- Measure volume of services (tests, treatments etc..)
- Cost shifting

**Healthcare Redefined**

- The goal is health
- Designed for patients with common co-occurrences
- Teams coordinating and integrating care delivery
- Create solutions for patients and families
- Measure value of service (health outcomes/costs)
- Partnerships linking payment and value

**Teams**

Effective teams are a cost effective enabler
## Team Efficiency

### Common challenges

- Time
- Pressure to provide both acute and preventative care
- Volume pressure
- After hour access
- Long wait times
- Focus on task substitution vs. teamwork
- Underutilization of interprofessional health team

### High performing teams

- Delegate key tasks to non-physicians
- Coordinated patient flow strategies
- Group visits: shared medical appointments
- Disease-specific targeted “Mini” Clinics
- Integration of specialist care

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McMurchy D. CIHR, 2009; retrieved from: www.chsrf.ca
Coordinated Approaches to Care

**Psychiatry**
- **Shared-care mental health services initiative**
  - Stable mental health patients from the hospital’s adult out patient clinic are registered with FHT physicians. Psychiatrists fast track consultations including education, case conferencing with family doctors, nurse practitioners, mental health professionals to ensure better management of mental health patients.

**Cardiology/ Nephrology**
- **Comprehensive Vascular Disease Prevention and Management Initiative (CVDPMI)**
  - Multi-stakeholder partnership with local Cardiologists, Nephrologists, Astra Zeneca Canada, the Greater Peterborough Health Services Foundation and Primary Health Care Services of Peterborough.
  - This standardized approach to vascular care has achieved an up to 50% reduction in risk among those patients that have participated.

**Youth Sport Concussion**
- **Youth Sport Concussion Program**
  - Working with community specialists to establish best practice in the prevention, diagnosis and treatment of concussions among children in Peterborough between the ages of 8 to 18. Conducted in partnership with local school boards and community athletic programs and local sports organizations.
  - This health and wellness program is being delivered entirely through industry, business, physician and community sponsorship.
Teams- Enablers: Our Experience

1. Governance
   - PHCSP: non-profit, charitable organization
   - Mandate: develop, implement and measure an innovative, coordinated and cost effective, sustainable local healthcare solution.
   - Physician, AHCP, community board governed

2. Integration
   - Team collaborative practice agreement
   - Most productive when co-located
   - Integration with Primary & Specialty Care and Community

3. Performance Indicators
   - Macro: health system utilization
   - Micro: patient/practice targets, patient volumes

4. Accountability
   - Resources coordinated centrally by PHCSP
   - Measuring effectiveness

5. Care Coordination
   - AHCP allocation based on practice size and community need
Teams in Action - Example

Anticoagulation: “Ideas for improvement”

- “Consider establishing specialized clinics for chronic disease(s)...

- An anticoagulation clinic set up in Peterborough has achieved an 80% rate of patients on anticoagulation medication in the safe dosing range (vs. 55% of patients in usual monitoring).”

OHQC 2011 Report Page 46 (based on 2009 data)
Information Technology Adoption:

• 122,000 residents with an electronic medical record
• Two active EMR’s
• Discharge integration with hospital
• Electronic integration with all community labs and select pharmacies
IT – Objectives

• Integration
• Improved Outcomes
• Accessibility
• Efficiency
• Improved Measurement and Accountability
• Enhanced Provider and Patient Satisfaction
IT – Enables

- Personalized Health Care
- Facilitates Patient Engagement
- Increase patient adherence
- Increase safety
- Optimizes therapies and interventions
- Reduce overall costs of Health Care
- Enhances quality and innovation in Care
- Opportunity to shift the emphasis of Health Care from reaction to prevention
IT – Future State

- Changing payment models supports engagement
- Cross Generational
- Increased Mobile usage and Access
- Online
- Social Networking
- Engagement improves outcomes
IT– Utilization on the Rise

Computing Growth Drivers Over Time, 1960 – 2020E

- Mainframe
- Minicomputer
- PC
- 1B+ Units / Users
- 100MM+ Units
- 10MM+ Units
- 1MM+ Units
- Mobile Internet
- Desktop Internet
- More than Just Phones
  - Smartphone
  - Kindle
  - Tablet
  - MP3
  - Cell phone / PDA
  - Car Electronics
  - GPS, ABS, A/V
  - Mobile Video
  - Home Entertainment
  - Games
  - Wireless Home Appliances

Source: Morgan Stanley
Population Health Management Strategies:

- Anti-coagulation clinics
- Shared care Psychiatry
- Partners in pregnancy clinic
- CVDPMI – Comprehensive vascular disease prevention and management initiative
- Youth sports concussion program
Healthy Living – Pulling it All Together

Health is a state of complete physical, mental and social well-being, and not merely the absence of disease or infirmity.

~World Health Organization, 1948
Comprehensive Vascular Disease Prevention & Management Initiative
CVDPMI: Purpose

• Develop a comprehensive, guidelines-based approach to prevent, detect, and manage vascular disease by coordinating primary and specialty care resources, providers, services and strategies.

• Implement and evaluate demonstrable improvements to population health with outcomes at the patient, provider and system levels.

• Document and transfer model to communities interested in adopting a similar approach.
Collaboration That Works!

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<thead>
<tr>
<th>Primary Care</th>
<th>Specialty Care</th>
<th>Health System</th>
<th>Industry</th>
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<tbody>
<tr>
<td>Core Steering Committee</td>
<td>Core Steering Committee</td>
<td>Core Steering Committee (LHIN)</td>
<td>Core Steering Committee</td>
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<td>Co-Sponsor</td>
<td>Lead Clinical Model Development and Evaluation</td>
<td>Co-Sponsor</td>
<td>Co-Sponsor also provided in kind Support (by invitation)</td>
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<td>Implementation in Highest Acuity Patients (VHN, PRNA)</td>
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Healthy Living | Teams | Timely Information | Access |
The Patient Journey

1. **Agreement:**
   - Physician and Nurse agree to protocols

2. **Screening:**
   - Identify at risk patients using EMR, screening protocol

3. **Outreach:**
   - Nurse outreach by letter and phone

[Link to Audio](http://healthcouncilcanada.ca/audio/2011/Podcasts/CVDPMI_CPedit_Sep15.mp3)
The Patient Journey

**Assessment:**
(universal screening process) including blood pressure and cholesterol tests to identify appropriate patients

**Triage:**
referral to a dietitian and other health services including specialty care as required, as well as a dietician workshops

**Individualized Care Plans:**
lifestyle and medical management plans developed

**Monitoring:**
Patient progress tracked and documented to demonstrate effectiveness

1. Healthy Living
2. Teams
3. Timely Information
4. Access
Outcomes: Initial Trends

Clinical Evaluation: Initial Findings After 3 Visits

– Based on projections from the initial screen of patients, 20 to 30 patients of every 100 enrolled would be expected to have a cardiac event (heart attack or stroke) within the next 10 years.
– By being entered in this program and altering their CVD risk profile, (based on the preliminary analysis) we are able to reduce this number of people at risk for a heart attack or stroke to from 20-30 to 10-15 out of the same hundred.
– This represents up to a 50 percent decrease in 10 year risk for CV events, which is impressive and consistent with what is typically seen in the clinical trial setting.
– Positive and statistically significant changes in multiple risk factors can be achieved in very short time frame.
– A full outcome and economic analysis is currently underway.

A multi-stakeholder partnership is feasible and can be used in a real world setting as we aspire to obtain clinical study outcomes.

Dr. Paul Oh, Medical Director, Toronto Rehabilitation Institute
Algorithms and Protocols to Enable Guidelines Based Care Delivery
Transferable Model

Clinical Model
Guidelines Based Decision Support:
(Algorithms, protocols, directives)

Operations Manual (in development)
Documented resource to support program transfer to interested practices,

Website
www.cvdpmi.ca

Implementation Toolkit
Concussion

Timing is Everything!

- ‘Former CFL players' brains used to study link between concussions and disease’
- ‘NHL GMs to discuss why concussions are on the rise’
- ‘Hits to the head: Scientists explain Sidney Crosby’s concussion’
- ‘One Canadian concussion policy: Better safe than sorry’
- Etc., etc...


Timing is Everything
Youth Sports Concussion Program

Primary Objectives
• Develop a ‘best practice’ model for regional youth sport
• Provide ‘universal access’ for athletes aged 10-20 years
• Provide education and raise awareness for public

Secondary Objectives
• Capturing critical data for research purposes

Tertiary Objectives
• Provide a ‘model system’ for promotion of use throughout Ontario
• Utilize data for risk factor stratification to inform prevention strategies in the future
Website

The Peterborough Youth Sports Concussion Program will establish a best practice model in the prevention, diagnosis, treatment and management of concussions providing universal access to youth from across the City and County of Peterborough from the age of 10 right through until high school graduation. The program, the first of its kind in Canada, is a collaboration between primary care providers and specialists and will establish standardized guidelines for concussion management for all health care providers across the 5 Peterborough Networked Family Health Teams. As a community-wide initiative, pilots will be conducted over the next 18 months while logistical elements are addressed and the program will be fully operational by September 2012.

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www.youtube.com/theyscp
Effectiveness = Value

1. Reinvent how Physicians work

2. Patient ownership for their health management

3. Multi-disciplinary teams effectively maximized

4. A strong focus on organization to support integration, efficiency and effectiveness

5. New strategic partnerships leveraging multiple resources and stakeholders

6. Alignment among numerous stakeholders (patient, provider, institutions, government – local, regional, provincial and national) is required to achieve improved health outcomes.
Going Forward

Value can be achieved in publicly funded health systems

A high functioning primary health care model demonstrates a valuable contribution to the entire health system.

Overall health outcomes achieved relative to the total costs of care over the full cycle of the patient’s clinical condition = value.

Investments in appropriate services: save through early interventions, reduced errors, minimized complications, forestalling disease and reoccurrences. Ultimately results will drive the overall health system.

An effective and high functioning primary health care model remains the most efficient and effective way to enhance patient-centered value.
Thank you

http://www.peterboroughfht.com/