



Western Canada Backgrounder: Supporting COPD patients at home saves hospital resources and healthcare dollars

Canadian patients living with chronic obstructive pulmonary disease (COPD) do not receive adequate care. As a result, COPD is a costly disease to treat – negatively affecting both hospital resources and healthcare dollars. COPD patients would experience improved quality of life if they received more appropriate supports.

How big is the problem?

By conservative estimates, about 800,000 Canadians live with COPD today. Those living with advanced COPD are among the highest users of healthcare resources. It's estimated that one in four Canadians over age 35 will develop COPD in their lifetime.

Many patients in the advanced stages of COPD resort to episodic emergency department (ED) care to cope with poorly managed symptoms of breathlessness.

What CFHI did:

The Canadian Foundation for Healthcare Improvement (CFHI) and Boehringer Ingelheim Canada Ltd. (BICL) helped 19 teams implement INSPIRED programs across 78 organizations to improve COPD care. This proactive program supports patients living with late-stage COPD, and their families, transition from the hospital into supported care in the community. It was modelled on the INSPIRED COPD Outreach Program™ developed by Medical Director Dr. Graeme Rocker and his team of respiratory therapists and spiritual care practitioners at the Nova Scotia Health Authority in Halifax. INSPIRED delivers self-management support education, individualized action plans, telephone help lines, home visits, psychosocial and spiritual care support, and advance care planning where needed.

INSPIRED teams include respirologists and other physicians, certified COPD educators (respiratory therapists or nurses), spiritual care practitioners or social workers, program coordinators and others. Early results show 90 days into the program, six teams succeeded in reducing hospitalizations by up to 80 percent.

What would happen if we scaled up across the country?

CFHI projects significant healthcare savings across Canada. An independent analysis conducted by RiskAnalytica identifies possible savings in ED visits and in-patient hospital care. It accounts for realistic growth in Canadian populations and the aging of the population. It assumes gradual implementation and patient enrolment. It also adjusts for an expected decrease in cigarette smoking rates, the underlying cause of the majority (80-90 percent) of COPD cases.





Western Canada

Alberta

In Alberta, about 80,000 people currently live with COPD and about 19 percent of the population are smokers. Smoking rates are down since 1965 when half of Canadians over 15 years old smoked, but yesterday's smoker's are today's COPD patients. Over five years, CFHI projects Alberta would enrol an average of 540 COPD patients per year -- saving \$64 million of COPD-related hospital care.

This works out to an average net annual benefit of \$34,000 per COPD patient in Alberta.

Alberta Participants

The following healthcare team and associated facilities implemented INSPIRED programs.

Alberta Health Services (AHS)

- acute exacerbations of COPD have been successfully managed in the community (versus in the ED or hospital) through the use of action plans, antibiotics and oral steroids
- 98 percent of patients had advance care planning conversations
- 28 COPD educators are now working in AHS Continuing Care Programs

Saving Healthcare Dollars in Alberta

In Alberta, patients living with COPD account for the most hospitalizations of all chronic diseases. INSPIRED services help patients manage COPD better, which would significantly reduce their ED and hospital visits.

Five years of INSPIRED programs across Alberta would prevent:

- 6,300 ED visits
- 4,100 hospitalizations
- 37,000 hospital bed days

Five years of INSPIRED programs would decrease ED and hospital costs:

- Saving \$7 million in ED costs
- Saving \$59 million in hospital costs

Alberta Bottom Line

The INSPIRED programs cost around \$1,000 annually per COPD patient to implement, but the return on investment is substantial.

In five years, INSPIRED programs across Alberta would net \$64 million in healthcare savings. Note this figure is based on prevented ED visits and hospitalizations and does not include savings in prevented routine care, but includes costs of delivering the program.

INSPIRED Bottom Line: \$1 spent in Alberta prevents \$21 in healthcare costs.





British Columbia

In British Columbia, about 95,000 people currently live with COPD and about 14 percent of the population are smokers. Smoking rates are down since 1965 when half of Canadians over 15 years old smoked, but yesterday's smoker's are today's COPD patients. Over five years, CFHI projects British Columbia would enrol an average of 800 COPD patients per year -- saving \$96 million of COPD-related hospital care.

This works out to an average net annual benefit of \$34,000 per COPD patient in British Columbia.

British Columbia Participants

The following healthcare team and associated facilities implemented INSPIRED programs.

Providence Health Care

- 30-day COPD hospital readmission rate down from 17 to 10 percent
- Patients report enhanced knowledge of their illness, symptom management and reduced anxiety
- Almost 70 percent of clients had an advance care planning conversation

Saving Healthcare Dollars in British Columbia

In British Columbia, patients living with COPD account for the most hospitalizations of all the chronic diseases. INSPIRED services help patients manage COPD better, which would significantly reduce their ED and hospital visits.

Five years of INSPIRED programs across British Columbia would prevent:

- 9,600 ED visits
- 6,200 hospitalizations
- 56,200 hospital bed days

Five years of INSPIRED programs would decrease ED and hospital costs:

- Saving \$11 million in ED costs
- Saving \$90 million in hospital costs

British Columbia Bottom Line

The INSPIRED programs cost around \$1,000 annually per COPD patient to implement, but the return on investment is substantial.

In five years, INSPIRED programs across British Columbia would net \$96 million in healthcare savings. Note this figure is based on prevented ED visits and hospitalizations and does not include savings in prevented routine care, but includes costs of delivering the program.

INSPIRED Bottom Line: \$1 spent in British Columbia prevents \$21 in healthcare costs.





Manitoba

In Manitoba, about 24,000 people currently live with COPD and about 16 percent of the population are smokers. Smoking rates are down since 1965 when half of Canadians over 15 years old smoked, but yesterday's smoker's are today's COPD patients. CFHI projects Manitoba would enrol an average of 200 COPD patients per year -- saving \$24 million of COPD-related hospital care.

This works out to an average net annual benefit of \$34,000 per COPD patient in Manitoba.

Manitoba Participants

The following healthcare team and associated facilities implemented INSPIRED programs.

Winnipeg Regional Health Authority

- Implemented standard physician order set, standardized patient education and interprofessional inpatient protocol. Continuing to develop integrated community protocol with community partners, and spreading to another unit in hospital and to five hospitals in the region
- Decreased average hospital bed days from 10.76 to six for participating patients

Saving Healthcare Dollars in Manitoba

In Manitoba, patients living with COPD account for the most hospitalizations of all chronic diseases. INSPIRED services help patients manage COPD better, which would significantly reduce their ED and hospital visits.

Five years of INSPIRED programs across Manitoba would prevent:

- 2,400 ED visits
- 1,500 hospitalizations
- 14,000 hospital bed days

Five years of INSPIRED programs would decrease ED and hospital costs:

- Saving \$3 million in ED costs
- Saving \$22 million in hospital costs

Manitoba Bottom Line

The INSPIRED programs cost around \$1,000 annually per COPD patient to implement, but the return on investment is substantial.

In five years, INSPIRED programs across Manitoba would net \$24 million in healthcare savings. Note this figure is based on prevented ED visits and hospitalizations and does not include savings in prevented routine care, but includes costs of delivering the program.

INSPIRED Bottom Line: \$1 spent in Manitoba prevents \$21 in healthcare costs.





Saskatchewan

In Saskatchewan, about 27,000 people currently live with COPD and about 21 percent of the population are smokers. Smoking rates are down since 1965 when half of Canadians over 15 years old smoked, but yesterday's smoker's are today's COPD patients. Over five years, CFHI projects Saskatchewan would enrol an average of 170 COPD patients per year -- saving \$20.6 million of COPD-related hospital care.

This works out to an average net annual benefit of \$34,000 per COPD patient in Saskatchewan.

Saskatchewan Participants

The following healthcare team and associated facilities implemented INSPIRED programs.

Saskatoon Health Region

- Supported patients in developing goals that went beyond health to housing supports
- An outpatient COPD clinic has been established to provide additional support to patients living in the downtown core of Saskatoon
- Permanent funding has been secured for a social worker position within the program

Saving Healthcare Resources in Saskatchewan

In Saskatchewan, patients living with COPD account for the most hospitalizations of all the chronic diseases. INSPIRED services help patients manage COPD better, which would significantly reduce their ED and hospital visits.

Five years of INSPIRED programs across Saskatchewan would prevent:

- 2,000 ED visits
- 1,300 hospitalizations
- 12,000 hospital bed days

Saving Healthcare Dollars in Saskatchewan

INSPIRED programs reduce healthcare utilization by patients living with COPD. This reduction not only frees up available healthcare resources, but also prevents significant healthcare costs across Saskatchewan.

Five years of INSPIRED programs would decrease ED and hospital costs by at least nine percent:

- Saving \$2.4 million in ED costs
- Saving \$19.2 million in hospital costs





Saskatchewan Bottom Line

The INSPIRED programs cost around \$1,000 annually per COPD patient to implement, but the return on investment is substantial.

In five years, INSPIRED programs across Saskatchewan would net \$2.8 million in healthcare savings. Note this figure is based on prevented ED visits and hospitalizations and does not include savings in prevented routine care, but includes costs of delivering the program.

INSPIRED Bottom Line: \$1 spent in Saskatchewan prevents \$20.6 in healthcare costs.

National Portrait

Saving Healthcare Dollars

COPD is a primary cause of ED and hospital visits in Canada. By helping patients manage their COPD symptoms better, the INSPIRED COPD Outreach Program™ significantly reduces ED and hospital visits.

Five years of INSPIRED programs across Canada would prevent:

- 68,500 ED visits
- 44,100 hospitalizations
- 400,000 hospital bed days

Five years of INSPIRED programs would decrease ED and hospital costs:

- Saving \$79 million in ED costs
- Saving \$644 million in hospital costs

National Bottom Line

The INSPIRED program costs around \$1,000 per COPD patient to implement. In five years, nationwide INSPIRED programs would net \$688 million in healthcare savings. Note this figure is based on prevented ED visits and hospitalizations and does not include savings in prevented routine care, but includes the costs of delivering the program.

Bottom line: \$1 invested in INSPIRED prevents \$21 in healthcare costs.

The Canadian Foundation for Healthcare Improvement identifies proven innovations and accelerates their spread across Canada, improving patient care, the health of Canadians and value-for-money. These innovations could save healthcare budgets over \$1 billion per year. CFHI is a not-for-profit organization funded by Health Canada. Visit www.cfhi-fcass.ca for more information.

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