Elements of a health care system

Health care systems are complex organisations comprising regulatory, funding, and service provision bodies that provide access to health care in accordance with societal goals and values. The metaphor of a house (see Figure 12.1) can be useful in describing health care systems. The roof corresponds to the societal goals and values that shelter service provision, which is founded on legislation and regulations that control the relationships among providers (the rooms of the house), funding agencies (the power source) and citizens. Regulations also control who can provide care (back door) and who can access it (main door). Note that the model can be applied to the country as a whole or to smaller regions. It can also be applied to communities, regions, or even facilities within a larger system.
be applied to specific programmes, such as cancer or HIV/AIDS care.

Figure 12.1: Description of a health care system. (Developed from an OECD model)

Societal goals and values

In common with most of the world's developed countries, Canada treats health care as a resource for all, regardless of ability to pay. It is not seen as a commodity that can be bought and sold in the open market. Over the past one-and-a-half centuries, several factors have led Canadians to expect that the government become increasingly involved in the organization of health services. These factors include

- Urbanisation, which broke the informal social networks that provided health and social care for those in need
- The Great Depression, during which governments became involved in relief efforts, and after which people never again wanted to have to beg for health or welfare services
- The two World Wars, which left people disabled and widowed for their country, leading people to ask what their country should do in return.

Meanwhile, increasing knowledge in medicine led to more effective health care technology. Governments, noting that healthy people are more economically productive than unhealthy people, began to see the advantage of providing health care services. The Nerd's corner box titled “Timeline: Canadian Health Services” shows the gradual evolution of legislation in response to societal pressures.
The Act specifically prohibits extra-billing and user fees for insured services, which are

The Canada Health Act

In Canada, as set out in the Constitution Act of 1867, the provision of health care falls under provincial jurisdiction. In theory, this could mean that each province could administer health care in a completely different way (and in some ways they do differ). The Canada Health Act, introduced in 1984, augmented the Constitution Act. The Canada Health Act aims “to protect, promote and restore the physical and mental well-being of residents of Canada and to facilitate reasonable access to health services without financial or other barriers.” The Act applies to all services deemed medically necessary for the purpose of maintaining health, preventing disease, or diagnosing or treating injury, illness or disability, and includes accommodations and meals, physician and nursing services, drugs, and all medical and surgical equipment and supplies.

The Canada Health Act specified that the federal government would provide funding to the provinces and territories on condition that they complied with the principles of the Act. In this way the federal government could ensure some measure of continuity across provincial health systems. The federal government originally provided half of the funding of hospital services if certain conditions were met, such as the provinces offering universal coverage to their residents, ensuring adequate standards covered by the act, and keeping adequate records and accounts.2,3

All provinces participate in HIDS.

The Medical Care Act provided for universal coverage for physicians’ services.

All provinces had programmes that complied with the Medical Care Act.

The Canada Health Act.

1867 The Constitution Act

Although health care was not specifically mentioned in this Act, it gave provincial legislature power for the “Establishment, Maintenance and Management of Hospitals, Asylums, Charities, and Eleemosynary [alms giving] Institutions.” This power was mainly regulatory. Powers of “Quarantine, and Establishment and Maintenance of Marine Hospitals” were retained by the Federation.

1914 Saskatchewan. This rural municipality successfully experimented by offering physicians a retainer to practice in the area. The plan guaranteed physicians an income while allowing them to charge for their services.

1916 Saskatchewan. The province passed the Rural Municipality Act that permitted rural municipalities to levy property taxes to pay for the retention of physicians.

1917 Saskatchewan. Provincial legislation allowed municipalities the right to collect taxes to finance hospital care.

1920 The creation of a national federal Department of Health in response to the influenza pandemic of 1918?1919 and to address the welfare of returning soldiers. This new department was given responsibilities for implementing campaigns against venereal diseases, tuberculosis, and for promoting child welfare. It took over responsibility for quarantine and ensuring food and drug standards from the Department of Agriculture.

1934 Newfoundland. The Cottage Hospital and Medical Care Plan provided care in remote communities.

1935 The provinces successfully challenged the federal government’s plan to provide certain social and health benefits financed by collecting taxes. The British Privy Council ruled that health care lay outside the federal government’s responsibility.

1947 Saskatchewan introduced public insurance for hospital services. This followed the federal government’s attempt to do so, which failed because federal and provincial governments couldn’t agree on financial arrangements.

1957 Federal Hospital Insurance and Diagnostic Services Act (HIDS), passed in 1957 and implemented in 1958, offered the provinces an average of 50% of the funding of hospital services if certain conditions were met, such as the provinces offering universal coverage to their residents, ensuring adequate standards covered by the act, and keeping adequate records and accounts.2,3

1961 All 10 provinces participate in HIDS.

1966 The Medical Care Act provided for universal coverage for physicians’ services.

1971 All provinces had programmes that complied with the Medical Care Act.

1984 The Canada Health Act.

The Canada Health Act

In Canada, as set out in the Constitution Act of 1867, the provision of health care falls under provincial jurisdiction. In theory, this could mean that each province could administer health care in a completely different way (and in some ways they do differ). The Canada Health Act, introduced in 1984, augmented the Constitution Act. The Canada Health Act aims “to protect, promote and restore the physical and mental well-being of residents of Canada and to facilitate reasonable access to health services without financial or other barriers.” The Act applies to all services deemed medically necessary for the purpose of maintaining health, preventing disease, or diagnosing or treating injury, illness or disability, and includes accommodations and meals, physician and nursing services, drugs, and all medical and surgical equipment and supplies.

The Canada Health Act specified that the federal government would provide funding to the provinces and territories on condition that they complied with the principles of the Act. In this way the federal government could ensure some measure of continuity across provincial health systems. The federal government originally provided half of the funding of hospital services, but this portion has fallen steadily over the years, eroding the federal government’s ability to influence provincial governments’ policies. The principles of the Act are:

- **Public Administration**: The provincial or territorial health insurance plan must be administered and operated on a non-profit basis by a public authority accountable to the provincial or territorial government.

- **Comprehensiveness**: The plan must insure all medically necessary services provided by hospitals, dentists working within a hospital setting, and medical practitioners.

- **Universality**: The plan must entitle all insured persons to health insurance coverage on uniform terms and conditions.

- **Accessibility**: The plan must provide all insured persons reasonable access to medically necessary hospital and physician services without financial or other barriers.

- **Portability**: The plan must cover emergency services for all insured persons when they are visiting another province or territory within Canada. When they move to another province or territory, all insured persons should be able to transfer their insurance to that province or territory.

The Act specifically prohibits extra-billing and user fees for insured services, which are
Hospital services that are medically necessary for the purpose of maintaining health, preventing disease, or diagnosing or treating injury, illness or disability, and include accommodations and meals, physician and nursing services, drugs, and all medical and surgical equipment and supplies. However, the Act does not define which services or drugs are “medically necessary”

Any medically required services rendered by medical practitioners

Any medical or required surgical-dental procedures that can only be properly carried out in a hospital.

The Canada Health Act is still the basis of our health care system, although it only covers hospital services including professional services within hospitals and physician services outside hospitals. There have been changes in the way funds are allocated to provinces and territories, which allow the federal government to set the direction of health care, but the principles still hold. As a substantial source of finance, the federal government can influence provincial and territorial health care systems.

The regulating body

Health care in Canada is a shared responsibility. In reality, Canada has not one, but 14 health care systems—a different system in each province and territory. The federal government sets standards and principles and assists in financing provincial and territorial health care services. The provinces and territories are responsible for the administration and delivery of services for most of the population. The federal government retains responsibility for providing services to First Nations, Inuit and Métis communities, members of the RCMP, members and veterans of the Canadian Forces, prisoners in federal penitentiaries, and refugee claimants. The federal government also has a role in coordinating the promotion and protection of the public’s health; it contributes to disease surveillance and prevention, it supports health promotion through the Public Health Agency of Canada, and it regulates drugs, medical devices, food, and consumer safety through Health Canada.

Provincial governments work within the parameters of the Canada Health Act to provide health care services according to the needs of the population. They plan, fund, and evaluate hospital care, physician care, allied health care, prescription drug care in hospitals, and public health, as well as negotiate fees with health professionals. Most provinces discharge their provincial obligations through regional boards. This decentralizes decision-making and enhances responsiveness to community needs. These boards oversee publicly provided services, including hospitals, nursing homes, home care, and public health services.

In addition to providing hospital care under the Canada Health Act, most provinces and territories have special plans for low-income residents and seniors, such as out-of-hospital drug benefits, ambulance costs, and hearing, vision and dental care. Some provinces and territories fund community health service clinics, which provide a range of professional services in the community. Some fund extramural programmes, which provide various types of care in patients’ homes, particularly palliative care, post-operative care, home oxygen, long term care assessment, rehabilitation, etc. Figure 12.2 shows trends in the proportion of total spending (public and private) in the different service sectors.

Regulating the providers

Governments ensure that care providers meet certain standards in a number of ways, including

- Setting the standards for publicly funded institutions that provide care. Some require regular accreditation assessments. Within the institutions, standards generally require professionals to audit their practice regularly.
- Regulating health professionals. The practice of a regulated professional is: 1) covered by provincial or federal legislation and 2) governed by a professional corporation or regulatory authority, for instance a College of Physicians or an Order of Nurses. Given that many of these regulatory bodies are provincial, variation exists between provinces and territories (for examples of regulated professions, see Nerd’s Corner box). There are practitioners who define themselves as formal providers of health care, but who are not members of any professional corporation and therefore they may not have had to prove their fitness to practice and may not respect a code of ethics.

Here Be Dragons

Role of professional corporations.

It is important to realize that the provincial regulatory authorities that govern professional practice differ from the groups that represent professional interests. For instance, for physicians in Ontario, the College of Physicians and Surgeons of Ontario is the provincially-recognized regulatory body, whose duty is to serve and protect the public by regulating Ontario physicians and surgeons, whereas the Ontario Medical Association represents the interests of Ontario physicians and exercises no regulatory function.
Some regulated health professions

Some professionals are regulated only in certain provinces. For instance, British Columbia is one of the few provinces that regulate traditional Chinese medicine and acupuncture; it also regulates massage therapy, which is not regulated in Ontario. Regulated midwifery is spreading across Canada although, at the time of writing, some of the maritime provinces have yet to enact or implement legislation relating to it.

Table 12.2: Examples of regulated health professionals.

<table>
<thead>
<tr>
<th>Professionals</th>
<th>Area of expertise or practice</th>
</tr>
</thead>
<tbody>
<tr>
<td>Audiologists and speech-language pathologists</td>
<td>Hearing and understanding, speech, language, and swallowing disorders</td>
</tr>
<tr>
<td>Chiropodists/podiatrist</td>
<td>Assessment of the foot; treatment and prevention of its diseases</td>
</tr>
<tr>
<td>Chiropractors</td>
<td>Diagnosis, treatment, and prevention of mechanical disorders of the musculoskeletal system</td>
</tr>
<tr>
<td>Dental hygienists</td>
<td>Preventive oral hygiene</td>
</tr>
<tr>
<td>Dental technologists</td>
<td>Evaluation, diagnosis, prevention and treatment of disease of teeth, the jaw, the mouth, the maxillofacial area, and the adjacent and associated structures</td>
</tr>
<tr>
<td>Dentists</td>
<td>Oral procedures and related activities pertaining to the design, construction, repair, or alteration of removable dentures for partially or fully edentulous patient</td>
</tr>
<tr>
<td>Dieticians</td>
<td>Evaluation of the nutritional state of people in order to choose and implement a nutrition strategy that takes account of their need to improve or re-establish health.</td>
</tr>
<tr>
<td>Kinesiologists</td>
<td>Assessment of human movement and performance, and its restoration and management to maintain, rehabilitate, or enhance movement and performance</td>
</tr>
<tr>
<td>Massage therapists</td>
<td>Assessment of the soft tissue and joints of the body, and the treatment and prevention of physical dysfunction and pain of soft tissue and joints by manipulation to develop, maintain, rehabilitate, or augment physical function, or relieve pain</td>
</tr>
<tr>
<td>Medical laboratory technologists</td>
<td>Medical tests on blood, body fluids, and tissues</td>
</tr>
<tr>
<td>Medical radiation technologists</td>
<td>Application of radiation therapy, radiography, nuclear medicine, magnetic resonance imaging</td>
</tr>
<tr>
<td>Midwives</td>
<td>Assessment and monitoring of women during pregnancy, labour, and the post-partum period, as well as of their newborn babies; the provision of care during normal pregnancy, labour and post-partum period, and the conducting of spontaneous normal vaginal deliveries</td>
</tr>
<tr>
<td>Nurses</td>
<td>Care of individuals of all ages, families, groups, and communities, sick or well, and in all settings</td>
</tr>
<tr>
<td>Occupational therapists</td>
<td>Helping people to learn or re-learn to manage the everyday activities that are important to them, including caring for themselves or others, caring for their home, and participating in paid and unpaid work and leisure activities</td>
</tr>
<tr>
<td>Opticians</td>
<td>Supply, prepare, and dispense optical appliances, interpret prescriptions prepared by ophthalmologists and optometrists, and fit, adjust, and adapt optical appliances</td>
</tr>
<tr>
<td>Optometrists</td>
<td>Assess the eye and visual system, sensory and ocular motor disorders and dysfunctions of the eye and the visual system, and diagnose refractive disorders</td>
</tr>
<tr>
<td>Pharmacists</td>
<td>Evaluate and dispense prescription medications; advise on their correct use and mode of action</td>
</tr>
<tr>
<td>Physicians and surgeons</td>
<td>Assessment and diagnosis of health problems, prevention and treatment of disease in order to maintain or restore health</td>
</tr>
<tr>
<td>Physiotherapists</td>
<td>Through understanding of how the body moves and what prevents it from moving, manage and prevent many physical problems caused by illness, disease, sport- and work-related injury, aging, and long periods of inactivity</td>
</tr>
<tr>
<td>Psychologists</td>
<td>Assessment, treatment, and prevention of behavioural and mental conditions</td>
</tr>
<tr>
<td>Respiratory therapists</td>
<td>Monitor, evaluate, and treat individuals with respiratory and cardio-respiratory disorders</td>
</tr>
<tr>
<td>Social workers</td>
<td>Help individuals, families, groups, and communities to enhance their individual and collective well-being; help people develop their skills and their ability to use their own resources and those of the community to resolve problems. Social work is concerned with individual and personal problems, as well as with broader social issues such as poverty, unemployment, and domestic violence.</td>
</tr>
</tbody>
</table>

Sources of finance

There are two basic funding models for publicly financed health care systems. The first, the social insurance model, uses compulsory contributions
to a social insurance fund. Governments can direct how the premiums are levied and what amount should be levied, so that premiums can be linked to a person’s income. In some countries, citizens can choose from a number of insurance providers; in others, the choice is limited to a single national not-for-profit insurer.

In the second model, as used in Canada, general taxes fund health care. However, in Canada, only hospital and physician services are universally funded. Other services are funded through a variety of sources, such as social insurance (often used for drug insurance), social security, and out-of-pocket and private insurance. Meanwhile, provincial workers’ compensation and health and safety at work programmes are funded by a form of social insurance in which employers pay premiums that are graded according to the inherent risk of the industry and the past performance of the employer. Figure 12.2 shows the sources of the health care finance in Canada and how that money is spent.

![Figure 12.2: Trends in sources and allocation of health care budgets in Canada, 1975 to 2009. Source of information: CIHI.](image)

Note that both graphs represent the proportions of budgets, not the absolute budget, which is increasing.

### Public versus private financing of health care

Currently, a major policy discussion in health care financing concerns whether or not to allow people to pay out of pocket or to buy private insurance for services that are provided by public funds, for example to avoid waiting a long time for an operation. Proponents of private financing say that it would take the pressure off the public system. However, human resources link the two systems. The number of qualified professionals is limited, therefore, when professionals move into the private system, the public system is depleted. Moreover, private insurers generally avoid insuring people with, or at risk of, serious and chronic conditions requiring complex and expensive care, and very few people could afford such care without private insurance. As a result, public funds would continue to be used for the most expensive care, so reduction in cost to the public system would be small, if any. Finally, private insurers tend to have large administration costs. For example, in Canada where health care coverage is mainly public, administration costs are 17% of health spending, whereas the administration costs of health care in the U.S., where health care coverage is mainly private, are 30% of spending.

### The Chaoulli affair

Canada is unique among OECD countries in prohibiting private insurance for services that are covered by the provincial systems. However, in Québec, Jacques Chaoulli, the physician of a patient waiting for a hip replacement, challenged this. The case went before the supreme court of Canada in 2004. In 2005, by a majority decision, the court ruled that the sections of the Health Insurance Act and of the Hospital Insurance Act that prohibit private insurance violate the Quebec Charter of Rights and Freedoms. No ruling was made on whether or not the Acts in question violate the Canadian Charter of Rights and Freedoms.

To many, this ruling represents a threat to the Canadian single insurer system, possibly opening the door to private insurance for services covered by public health insurance, which could eventually drain human resources away from publicly insured care, thereby reducing the level of care available for those who cannot afford private insurance. Furthermore, as single insurer systems put the single insurer in a strong bargaining position to negotiate prices downwards, the resulting multi-payer system would probably allow health care costs to rise.
Controlling Costs

One of the major problems facing health care administrators is how to control costs which, in developed countries, have been growing constantly in the last century. Figure 12.3 shows the rising cost per capita in Canada. Population aging has contributed somewhat to this increase, but the cost increase is mainly due to increased access to health care, technological advances, and limited incentives to control costs. Note that Figure 12.2 showed the proportion of the budget allocated to various expenditures; even though the total spent on hospitals is rising, the amount spent on prescription drugs is increasing more, so that the proportion of the budget spent on hospitals is declining.

Health care utilization can change as a result of supply and demand. Both have increased faster in rich countries than in poor for a number of reasons. In terms of supply, governments in wealthy countries have higher incomes with which to pay for services, and technical innovations create a wider range of services. In terms of demand, people are more able to pay for health services. Moreover, health messages create a more informed population and encourage them to consult health professionals. In particular, elderly Canadians are making more use of family physician services.

The net effect is that health care costs are rising faster than the national wealth as measured by the gross domestic product (see Figure 12.3).

![Graph: Total health care spending per capita and as a proportion of the gross domestic product (GDP), Canada, 1975?2009](http://www.chsr.ca/cihiweb/bispPage.jsp?cw_page=AR_1282_E)

Developments in technology and pharmaceuticals produce new treatments, which are generally more expensive than the ones they replace. Being generally more effective that the old treatments, the new treatments may be used more frequently, so that, even if a new treatment is cheaper, it may end up costing the health service more. Costs can also increase when a new technology, developed for a specific application, is used more broadly. For instance, the CT scan was originally developed for imaging only the brain, but has since become indispensable for imaging many other parts of the body. In the same way, drugs that are approved for limited indications are sometimes marketed for a much broader range of indications.

Finally, health care is a large sector of the economy. Health and social services in Canada employ about 12% of the working population. This means that about 12% of the working population have an interest in maintaining current levels of spending on health care in order to maintain their income. In addition, companies that research, develop and produce technologies and pharmaceuticals provide employment, generate income for shareholders, and often produce exportable goods. Because of this, these companies have a degree of political power as well as a vested interest in health care. In this context, political will tends to maintain or increase health care spending instead of decreasing it.
Economists argue that there are only two ways to reduce health care costs: either reduce the use of services (i.e., reduce demand) or improve their efficiency (which would result in increasing supply for the same cost), either by improving administrative support or by improving quality. They also note that, unlike the case in most other markets where demand leads supply, in the health care market increasing supply tends to increase demand, so that improved efficiency is unlikely to be sufficient to control costs. Table 12.4 outlines alternative approaches to increasing efficiency in health services, showing possible side-effects of each approach.

Table 12.4: Approaches to reducing health care costs\textsuperscript{10,11}
### Reduce use of services

<table>
<thead>
<tr>
<th>Approaches</th>
<th>Examples</th>
<th>Issues raised</th>
</tr>
</thead>
<tbody>
<tr>
<td>Copayments or user fees</td>
<td>Financial incentives for patients to reduce their use</td>
<td>As poverty is a major determinant of health, co-payments or user fees ensure that those most in need have least access to care. If patients delay consultation in the hope of avoiding user fees, this could increase subsequent costs. Moreover, user fees tend not to reduce use of services or health care costs overall.</td>
</tr>
<tr>
<td>Limit resources</td>
<td>Day surgery and ambulatory treatment, both popular with patients, only became common with the closure of hospital beds</td>
<td>Forces efficiencies and innovative methods. Politically difficult. Can increase pressures on other parts of the system or create other unintended consequences. Closure of acute hospital beds increases pressure on informal carers, home care, and long stay care; more intensive use of remaining beds stresses staff and increases cost per bed, thus savings are rarely as great as predicted. Wait-lists for non-urgent procedures may expand, perhaps requiring more expensive care if the condition deteriorates.</td>
</tr>
<tr>
<td>Use gatekeepers</td>
<td>Access to secondary care only through primary care.</td>
<td>Generally reduces waste by ensuring that the correct secondary provider is consulted and by allowing the primary care provider coordination and case management role.</td>
</tr>
</tbody>
</table>

### Improve efficiency

<table>
<thead>
<tr>
<th>Approaches</th>
<th>Examples</th>
<th>Issues raised</th>
</tr>
</thead>
<tbody>
<tr>
<td>Use professionals’ skills appropriately</td>
<td>For instance, use nurse practitioners for prevention and routine follow-up, physicians for complex diagnostic and treatment problems.</td>
<td>Some claim that non-physician care is seen as second rate. However, most people are satisfied with it when it is appropriate. When the tasks of each person are clear and accepted, professional job-satisfaction is likely to be improved.</td>
</tr>
<tr>
<td>Improve practice</td>
<td>Educate and support patients in self-management of chronic conditions.</td>
<td>Can reduce hospital admissions and emergency room visits. Current thinking holds that improvement in patient autonomy in itself improves health.</td>
</tr>
<tr>
<td></td>
<td>Improve management of chronic conditions.</td>
<td>Timely and appropriate interventions to control the condition and reduce its impact on function, thus reducing need for services</td>
</tr>
<tr>
<td></td>
<td>Use of evidence-based guidelines for optimal management.</td>
<td>Observations on wide variations in practice with little apparent variation in need suggest that over-treatment could be reduced by use of guidelines. However, guidelines also vary and are hard to impose. Patients’ wishes must also be respected.</td>
</tr>
<tr>
<td></td>
<td>Reduce medical error.</td>
<td>Medical error is an important preventable cause of morbidity, which costs the system a great deal of time, money, and resources. Systems approaches to medical error reduction and quality assurance are effective in improving quality of care, morbidity associated with error, and reducing costs.</td>
</tr>
</tbody>
</table>

### Improve support systems

<table>
<thead>
<tr>
<th>Approaches</th>
<th>Examples</th>
<th>Issues raised</th>
</tr>
</thead>
<tbody>
<tr>
<td>Information systems</td>
<td>Electronic medical records, portable databases, digital imagery available via a secure network, provision of information on drug costs, etc.</td>
<td>Contribute to reducing duplication of tests, overmedication and drug interactions, and coordination of care, application of guidelines and generation of data for evaluation of practice. Systems have to be designed with the users and the objectives in mind. In certain situations a cheap paper system may be superior to an expensive electronic one.</td>
</tr>
<tr>
<td>Administrative systems</td>
<td>Call-recall systems for preventive and follow up care.</td>
<td>Improve the uptake of care but there is some concern that recall systems may generate unnecessary interventions. Running costs should not outweigh advantages of the system.</td>
</tr>
</tbody>
</table>
Financial systems
Make sure that remuneration systems reward high quality, efficient care.

All remuneration systems have advantages and disadvantages (See table 12.6)

Illustrative Materials

Manitoba tackles overuse of health care

Manitoba responded to overuse of its health care system by forcing people who visit too many doctors or pharmacies to limit their use to one doctor and one drugstore. The province reviewed the records of patients who made more than 67 office visits in a year or saw more than 12 physicians annually. The heaviest user made 247 office visits to 71 different physicians in one year. Of 99 people identified as heavy users of the system, 34 had medical conditions that justified the use. In only 28 cases were restrictions on service use imposed. The project was expected to save the province $116,000 in a province that spends nearly $2 billion a year on health care (around 0.005%).

Health care service provision

There are two basic ways of delivering publicly funded care. One way is that the government itself may organize delivery of the services. This happens in the UK, Cuba, and some Scandinavian countries where health care workers, including physicians, are public employees. Hospital and clinic buildings are owned by the state and services are managed publicly.

The other way, for instance in Canada, is that service providers can be public or private, although finance for medically necessary hospital and physicians services comes from a public insurance system. Private service providers include for-profit, not-for-profit, charitable, and religious organizations; in fact, all providers except publicly administered ones. The private sector can offer hospital, long term care and community services that are funded by provinces. Most physicians, working in hospitals or not, contract with the provincial insurance plan to provide services as private service providers. For patients with private insurance or who can afford to pay out-of-pocket, and who want services not covered by the provincial insurance plan, there is a wide range of professionals working outside of hospitals providing services such as physiotherapy, occupational therapy, optician, podiatry, and psychology.
There are a number of basic ways of paying health care providers for their services. Back in the 1960s, Avedis Donabedian proposed a useful way of thinking about the quality of care that can be extended to provide a conceptual basis for designing payment systems.

Costs of care (and hence payments) can be based on the ***structure*** of an institution (number of hospital beds, staff numbers, etc.), or payments can be based on the ***services provided: the process*** of care, in Donabedian’s term. Alternatively, quality can be judged, and payments provided, according to the ***public or private?***

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*Table 12.5: The Canadian public-private mix*\(^{13,14}\)

<table>
<thead>
<tr>
<th>Public</th>
<th>Private not-for-profit</th>
<th>Private-for-profit</th>
</tr>
</thead>
<tbody>
<tr>
<td>Public Health</td>
<td>Most hospitals</td>
<td>Most physicians</td>
</tr>
<tr>
<td>Provincial psychiatric institutions</td>
<td>Addiction treatment</td>
<td>Ancillary services in hospitals (laundry services, meal preparation and maintenance)</td>
</tr>
<tr>
<td>Home Care in some provinces</td>
<td></td>
<td>Laboratories and diagnostic services in most provinces</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Some hospitals</td>
</tr>
<tr>
<td>Private</td>
<td>Some home care and nursing homes in some provinces</td>
<td>Some hospitals</td>
</tr>
<tr>
<td>Enhanced non-medical (e.g., private room) and medical (e.g., fiberglass cast) goods and services in a publicly owned hospital</td>
<td></td>
<td>Cosmetic surgery</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Long-term care</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Extended health care benefits such as prescription drugs, dental care and eye care in some provinces</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Some MRI and CT scan clinics</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Some surgery clinics</td>
</tr>
</tbody>
</table>

*NB: This table, based on work carried out in 2002, still offers a generally correct reflection of the situation. However, gradual change in federal, provincial and territorial policies is causing some movement between the cells. The different provincial and territorial systems also change at different rates.*

In debates on health care it is important to acknowledge the difference between funding services and providing services. For instance, Dr Rao now works in a group practice in which the physicians bill the insurance plan for the services they provide and the practice members administer these funds as they see fit, paying for the clinic buildings, employing the staff, paying their own salaries etc. However, the insurance plan is publicly funded, so that people who use Dr Rao’s services do not have to pay for them. Similarly, institutions that provide publicly insured services can be private, but patients do not have to pay for services.

In Canada, the public or private health care debate is generally about who pays for the care: the provincial insurance plan or whether the patient should be allowed pay directly or through private insurance.

The other hot topic is whether or not hospitals should be private for-profit. Currently, almost all Canadian hospitals are private not-for-profit, operated by regional health authorities.\(^{15}\) As such they are perceived as public institutions, but technically they are not. There have been studies that show an increased mortality in for-profit hospital and fears that the ‘bottom-line’ will harm patient care.\(^ {16}\) There are also fears that for-profit hospitals will open the door to the free market and erode the principles of the Canadian health care.\(^ {15}\)

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Quebec’s population health approach to providing care

In 2003, Quebec adopted a bill which transformed its community services. Its Local Community Service Centres (CLSC) were merged with its residential and long-term care centres (CHSLD) to become Health and Social Service Centres (CSSS). As well as providing certain services to individual clients, the CSSS are charged with ensuring that the needs of the population of their territories are met. A CSSS must:

- Monitor the health status of its population and coordinate action to improve it
- Manage and coordinate the general and specialized services available to its population, taking the appropriate measures to provide case management, assistance, and support to users of the health and social service network
- Ensure that services are effective, efficient, relevant, and meet users’ expectations and the population’s needs
- Inform, consult, and receive input from its population, as well as assess satisfaction with regard to the services and their outcomes.

All CSSS provide a range of front line services, which may include prevention, primary care treatment, rehabilitation, crisis support, and public residential care. To ensure provision of other health and social services and secondary and tertiary services that do not exist in the CSSS territory, the CSSS must negotiate agreements with the providers of these services. Health policy making is more fully described in Chapter 14.

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Remuneration of providers

There are a number of basic ways of paying health care providers for their services. Back in the 1960s, Avedis Donabedian proposed a useful way of thinking about the quality of care that can be extended to provide a conceptual basis for designing payment systems.\(^ {17,18}\) Costs of care (and hence payments) can be based on the *structure* of an institution (number of hospital beds, staff numbers, etc.), or payments can be based on the services provided: the *process* of care, in Donabedian’s term. Alternatively, quality can be judged, and payments provided, according to the
outcomes of care (success rates). In Canada, most physicians are paid by a fee per item of service, i.e. a process of care payment, while block funding is used for most institutions, based on a combination of structure and process (see Table 12.6).

Table 12.6: Approaches to paying health care providers
## Remuneration of physicians and other professionals

<table>
<thead>
<tr>
<th>Method of payment</th>
<th>Discussion points</th>
</tr>
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</table>
| Fee for service   | The professional, acting as an independent, private contractor, is paid a set amount for each service provided: a process of care system. Although methods of remuneration of physicians in Canada are changing, most are still remunerated by this method, as are many other professionals in private community practice.  
This encourages professionals to provide services that are less time-consuming and that attract higher fees.  
Fee-for-service payment is often blamed for encouraging the development of walk-in medical centres at the expense of services that manage chronic illness and complex cases. However, walk-in services respond to patient demand for easily accessible, rapidly responsive services.  
Fee-for-service payment tends to encourage provider-driven overuse of services, increasing the risk of iatrogenic illness and medical error.  
Fee-for-service remunerates a single professional for a single service, so provides no incentive for the development of teamwork. |
| Salary            | In Canada, most non-physician health services in institutions are provided by salaried professionals. A salary implies that the professional is an employee of an organisation and is responsible to managers for services provided. In Canada, salaried physicians, although providing services within institutions, generally receive their salary from the provincial insurer, not directly from the institution in which they work.  
In the case of physicians, salaries are said to remove the incentive to offer more than the minimum of services. There is also a fear that being responsible to a manager hinders professional autonomy in deciding what care is appropriate. |
| Retainers         | Can be useful to attract physicians into areas of low patient volume (such as remote areas). The retainer ensures a minimum salary and this can be coupled with fee per service to encourage service provision.  
In Canada, retainers are frequently used in specialties such as anaesthetics and psychiatry. In Quebec, many specialists have opted for retainers coupled with modified fees per service. |
| Capitation        | Payment according to the number of people on a patient list. The fee structure can include a premium for complex cases and may be adjusted for the sociodemographic profile of the patient population. The practice is paid whether or not the patient consults. The practice team may include a number of disciplines and the payment remains the same no matter which member of the practice team provides services.  
Capitation probably discourages the provision of unnecessary services and encourages the provision of effective preventive services.  
It can encourage the development of multidisciplinary team work.  
There is concern that the requirement to register with a physician can reduce patient and physician freedom of choice. Most capitation plans allow for patients to change physician and for physicians to refuse patients.  
Family practice in the UK is generally paid by capitation. In Canada, capitation is used in some primary care practices in some provinces. |
| Target payments   | Payment for reaching a target level of services delivered. Useful in preventive services. For instance, a physician could receive a payment according to the proportion of patients on his list who have had cervical cancer screening. This moves towards a payment system based on the outcomes of care.  
Requires a denominator to develop accurate targets?generally a list of patients who have chosen to be cared for by the physician under a capitation scheme.  
There are concerns that patients could be coerced into undergoing unnecessary or unwanted interventions in order to achieve the target. |
| Mixed             | Mixed remuneration schemes are very common, for instance, supplementing a capitation programme with targeted payments. They seek to get the best from each of several types of payment. |

## Payment methods for institutions
Method of payment

Block funding

This is commonly used in Canadian hospitals. The institution is paid a certain amount of money every year to provide services. The amount paid is generally calculated according to the previous year’s amount and the types of services offered, adjusted for demographic change, changing health care costs, and inflation. It is a structure based payment system. Block funding, especially when coupled with sanctions for going over budget, favours cost control. However, it can also merely shift the costs to another budget. For instance, reducing the length of hospital stay can reduce hospital costs (as long as the number of hospital stays don’t increase), but the cost of home services, and the costs to families, may increase as sicker people need home care.

Funding by episode of care

This is similar to fee-per-item of service funding, and represents a process of care payment system. In general, the fees are scheduled according to the patient’s diagnosis classified in a way that reflects the average cost of care required for that diagnosis. This method encourages efficiency for single episodes; it does not provide any incentive to control the number of episodes.

The amount of money most Canadian hospitals receive is calculated according to their inputs: the number of beds they have, the number of staff they employ, or simply according to the previous year’s budget with allowances for changes in clientele, services offered, and inflation. Hospital managers responsible for the budget are expected not to overspend, so they must limit the number of services provided. In tension with this, physicians, mainly on fee-for-service, have an interest in increasing the number of services they provide. Physicians increase hospital costs when they use hospital facilities to provide services (for instance, when a surgeon operates). But the physician has no responsibility for hospital costs and, as long as he can use hospital facilities, his income is guaranteed. The Kirby report suggests that hospitals should instead be paid according to the services they provide. This would reduce the conflict between the interests of service managers and those of physicians. However, without other controls on spending, this plan could cause costs to rise. There is no perfect method of remuneration for service. Research on the effects of remuneration methods on quality of care and health outcomes is lacking, and definitive conclusions about which method of payment might be best are not available.

Further Reading

Remuneration of providers

To read a perspective on the effects of physician remuneration systems, see “Myth: Doctors do it for money,” September 2003, at the Canadian Health Services Research Foundation website:

http://www.chsrf.ca/PublicationsAndResources/Mythbusters/ArticleView/03-09-01/84c4445b-89da-4a46-8082-60d7ae969ee4.aspx

To read about changes in the attitudes of physicians regarding fee-for-service payments, see ”Myth: Most physicians prefer fee-for-service payments,” January 2010, at the Canadian Health Services Research Foundation website: http://www.chsrf.ca/PublicationsAndResources/Mythbusters/ArticleView/10-01-01/13b5e8bb-e7c2-4544-8da5-b1aa5d9e39db.aspx

For more about options for funding hospitals go to: http://www.chsrf.ca/PublicationsAndResources/researchreports/articleview/11-01-19/20713d8-9054-43a5-bc79-1cd5f795e495.aspx

Illustrative Materials

A radical experiment in remuneration for services

One of the challenges for limiting health care expenditure is the separation between those who are responsible for constraining costs and those who make the decisions that incur the costs. Physicians, with their patients, decide on a management plan, while hospital or laboratory managers are likely to be responsible for controlling the costs that result from the management plan. Some experiments have tried to draw responsibilities for budgets and for patient management closer together. In the UK, General Practice fund-holding gave family physicians the budget with which to pay for the health services their patients needed, including the family physician services, diagnostic and hospital services. Within their practice physicians were free to allocate budget for services they thought necessary, including office staff and the services of other professionals, such as practice nurses and social workers. Their budgets were based on the number of patients on their practice list and were adjusted for age of the patients and the proportion of patients on their list with certain chronic diseases. Any savings that were made could go into practice development. There were indications that fund-holders managed to generate economies while reducing patient waiting times. However, the project was highly politically charged and was stopped without proper assessment when a new government came to power. Some physicians believed it was unethical for physicians, in their role as patient advocates, to control the budgets for treating them. Committed fund-holders believed that fund-holding made it easier for them to negotiate better services. Some elements from the project have been introduced to Canada, most notably in Québec as the Family Medicine Groups and in Ontario as the Family Health Teams.

Ensuring equity

High quality primary care is the cornerstone of equitable, efficient, and effective health care. In addition to physician services, the notion of primary care includes nurse practitioner services, well-baby and other preventive care, home care, elderly care, and crisis intervention. In some countries, primary care physicians act as gatekeepers to higher levels of care, directing patients to the most appropriate services and following up...
after consultation, thus reducing inappropriate use of other, more expensive levels of services. Well-managed primary care services ensure preventive care and timely follow-up for all their patients and can act as a resource in advocating for community health. A number of different models of primary care services have been tested in Canada. Their common objective is to integrate services, bringing physicians out of their traditional, unidisciplinary practice and into collaboration with other types of professionals as pivotal members of multidisciplinary teams that provide the services patients need.

The Canada Health Act aims to reduce inequity in access to services by publicly insuring the population for many of its health care needs. The publicly funded Medicare system distributes the costs of care across the population. In principle, nobody has to pay to access medically necessary services in hospitals and physicians’ offices, but fees may be demanded for other services. Moreover, affordability is only one aspect of accessibility, and there is also cause for concern in the other aspects of access.

Access to health care services

The concept of access to health care services includes: 25, 26

- **Availability**: the relation between the volume of services provided and the demand for them
- **Accessibility**: the geographical relationship between the location of services and the people who need them
- **Accommodation**: the relation between the manner in which the services are provided and the constraints of people who need them
- **Affordability**: the relationship between the cost of services and the ability of users and potential users to pay
- **Acceptability**: the extent to which people who need services are comfortable using them.

Availability

While there are many forms of health care available in Canada, in general, publicly financed health care systems provide allopathic medical care only. Allopathic medicine is also highly regulated to ensure the safety of users; standards for other forms of care are, in general, less regulated.

Having a regular care provider, waiting times for appointments, and ‘unmet need’ are the usual measures of health care availability. The availability of health care is often measured by waiting times for care and by unmet need for care. Uptake of preventive care may also indicate its availability.

Accessibility

Rural areas tend to lack physicians and health professionals. In spite of financial incentives to practise in rural areas, physicians cite social, family, and professional reasons for preferring urban practices. Some Canadian medical schools are providing medical training in rural areas in order that the experience will induce physicians to remain in them. For practical and economic reasons, rural areas will likely continue to have less access than urban areas to specialized care. Other ways of providing care, such as joint or shared care and telemedicine need to be developed.

Accommodation

Many people are constrained by work or family responsibilities and so unable to attend clinics during the usual clinic hours. Similarly, people who do not have private transport may be virtually excluded from clinics not served by public transport. Services must take into account the particular problems of vulnerable populations who often are most in need of care and least able to access it. For example, people with limited mobility may need wheelchair access ramps, or people with limited vision need adequate lighting and safeguards around stairwells, many people with substance abuse problems, because of their chaotic lifestyles need mobile outreach services.

Affordability

In principle, all Canadians have access free of charge to medically necessary physician and hospital services. However, extra-billing and user fees are a continuing problem, even though prohibited under the Canada Health Act. 28 Other costs can also be a factor in reducing access. For instance, transport-related costs can be considerable particularly in cases, such as cancer, where treatment may require repeated visits to a specialist centre.
Services of non-physician professionals in the community are not included under the Medicare plan. Under the influence of federal direction as well as a number of reports on health care, provinces and territories are now beginning to extend the range of publicly financed services to cover certain types of home care. In general, provinces and territories provide some community services for the most vulnerable sectors of their populations, but other people may pay directly or have private insurance for these services. Nonetheless, as care shifts to the ambulatory setting and the physician’s office, the costs of treatment may be passed on to the patient. Financial barriers to care, therefore, still exist, and may increase.

As poverty is a major determinant of health, financial barriers increase inequity in health; they ensure that those most in need of the service have least access to it.

Further Reading

User fees

For further reading on user fees and extra billing, see "Myth: User fees would stop waste and ensure better use of the health care system," September 2001, at the Canadian Health Services Research Foundation website: http://www.chsrf.ca/PublicationsAndResources/Mythbusters/ArticleView/01-09-01.51962316b805-4550-59a5-648e60b8a5d9.aspx

Acceptability

Acceptability of services depends on a range of culturally determined factors which affect the expectations and attitudes of the user. Minority groups, such as immigrants, English speakers in Quebec, French speakers in other Canadian provinces, or Indigenous Peoples throughout Canada may feel ill at ease with services geared towards the expectations of the majority. In particular, poorly educated people on low income can be inhibited in negotiating their way through health services managed and offered, as they are, by highly educated people with a relatively high income.

First Nations, Inuit and Métis (Indigenous) health services

Traditional Indigenous teachings highlight the importance of maintaining and restoring a balance among the physical, mental, emotional, and spiritual aspects of health through social and environmental sensitivity. These teachings were discounted by arriving Europeans who brought with them a way of life that threatened the lives and health of Indigenous Peoples. Infectious diseases arriving with the different waves of immigrants had a devastating impact on Indigenous Peoples because they had no immunity to them. Through colonization, the European way of life became the norm and Canada’s Indigenous Peoples found themselves excluded and denigrated. As a result, their health deteriorated compared to that of the dominant society. The health gap between many First Nations, Inuit and Métis communities and the rest of Canada broadened and to this day remains huge (see Chapter 1).

Health services alone cannot significantly reduce the health gap between Indigenous Peoples and other Canadians. Reducing the gap would require attention to income, education, social and physical environment, and housing and sanitary infrastructure, as well as the restoration of traditional lands, governance and culture. However, in spite of the much greater service need among Indigenous Peoples, their health services lack coordination. Although the federal government retains responsibility for providing care for registered Indian and Inuit groups, the services are increasingly delivered by provinces, territories, and band councils on reserves and in Indigenous communities. These services may not be well oriented towards the communities' needs. They tend to be staffed by non-Indigenous people and, until recently, the First Nations communities had little say in the planning of their health services. There are no specific services for First Nations people living off-reserve. Mainstream institutions and professionals who serve Indigenous people living off-reserve rarely have the resources or training to provide culturally sensitive care.

In 2000, the National Aboriginal Health Organisation (NAHO) was established. Funded by Health Canada, it is an "Aboriginal-designed and -controlled body committed to influencing and advancing the health and well-being of Aboriginal Peoples by carrying out knowledge-based strategies." In the same year, the Institute of Aboriginal People’s Health was established as one of the Canadian Institutes of Health Research (CIHR) to support research and build research capacity in Indigenous peoples’ health. Nonetheless, the political nature of health service provision and the wide variety of issues to be addressed continue to create barriers to health for First Nations, Inuit and Métis Peoples and will likely do so for some time.

Further Reading

National Aboriginal Health Organization

For more about health issues of Aboriginal People in Canada, see the National Aboriginal Health Organization’s website at http://www.naho.ca/

The Aging Population

There is widespread debate over the likely impact of the aging of the Canadian population on the future demand for health services. The basic fact is that Canadians are living longer and this, combined with the falling birth rate, means that the proportion of the population aged 65 or over is rising (See Figure 12.4).
Figure 12.4 The aging population: projections of proportion of elderly people, Canada, 2006 to 2029. Note that the proportion of the population aged 85 and over will increase from 1.5% in 2006 to 2.4% in 2026

The impact this will have on health service use is widely debated, and many factors are involved. It is commonly feared that, as life expectancy increases, disability and chronic disease will rise in the population, so health services should prepare to care for a greater proportion of the population than ever before. However, set against this are the possibilities that people are becoming more aware of their health and population health promotion will maintain health for longer, reducing the duration of ill-health a person experiences before dying. (See squaring the morbidity curve, Figure 8.2).

Economists have found that adults use health services most intensively in the four to six months before they die, no matter at what age death occurs. In fact, younger people who die may cost the health services more than older people because the efforts to save them are more heroic. Controlling for the proximity to death shows that the major factor driving use of acute services (and hence costs) is the number of deaths rather than the age of the population. This means that young populations with a high death rate, such as some in remote and rural areas of Canada, may need relatively more services than populations with a lower death rate even if the latter are older.

Focusing on the aging of the population may be a distraction from the more pressing issue of how to allocate resources to care for people at the end of life. The growing use of medications, intensive interventions and high-technology equipment influence the cost of care. A greater acceptance and use of palliative options at the end of life may well reduce the cost of care for a dying person. This could result in a drop in the overall cost of care, although the increasing use of primary care services by the elderly and their greater need for long term care may in part offset this. So the future influence of population aging is uncertain.

Information and dissemination of information in health care

Information technology promises ways of managing and disseminating information for improving the coordination of services, communication between care providers, and dissemination of research findings. Canada is currently investing in the "Health Infoway", which should improve efficiency in service provision and communication. In spite of the many organizations that disseminate evidence-based guidelines and models of excellence for practice, success in getting the evidence into practice is still elusive.

Some developments in informatics that are of interest to clinicians include:

Further Reading

Animated population pyramid

For a graphic description of the Canada’s changing population structure that shows the effects of the postwar baby-boom, explore Statistic Canada’s animated population pyramids at

http://www.statcan.gc.ca/kits-trousses/animat/edu06a_0000-eng.htm

Myth of the aging population

To read about the effect of the aging population in more detail, see "Myth: The aging population will overwhelm the health care system" January 2002, at the Canadian Health Services Research Foundation website: http://28784.vws.magma.ca/mythbusters/html/myth5_e.php
● Electronic medical and health records. These have been deployed in many institutions and medical offices throughout Canada. They provide efficient storage and retrieval of information about patients, they can be built into local networks to allow quick transfer of information between hospitals and referring physicians, and they can be used as basis for call and recall systems that facilitate preventive programmes and disease follow-up. A major concern is to ensure confidentiality when transferring information between institutions and offices; another is to develop compatibility between systems in building networks. Finally, electronic medical and health records, if the system is well designed, can provide useful information for evaluation of practice.

● Telemedicine. First-line carers and patients can consult with specialists via videoconferencing. Variations on this concept include telemonitoring in which anthropometric data from patients can be communicated to a specialist service. There has also been experimentation with telesurgery using robots or with video monitoring through which a specialist can guide a general surgeon. Videoconferencing and its derivatives can be useful in bringing specialist services to remote areas.

● Teletraining. There are a number of useful services that provide continuing web-based training for clinicians. Podcasts, videocasts and interactive training programmes are all available.

Some specific types of services

Occupational health services

Occupational health services in Canada are divided into two distinct sections. The first aims to protect workers and prevent work-related injury and ill health. It is generally known as health and safety at work, although the names of the legislation and authorities governing it vary between provinces and territories. The second section aims to rehabilitate people who have been injured at work or who suffer from occupational illness, and to compensate workers whose health has been damaged by work. This is generally administered by a workers’ compensation board; again, names differ. Some large corporations in Canada maintain their own occupational health services, but must still respect occupational health legislation.

Health and safety at work

The provinces and territories are responsible for providing occupational health services. They do so within the framework of the Canadian Labour Code. Employees of most industries are covered by provincial legislation, and the types of industry covered vary slightly by province or territory. Certain industries that cross provincial and national boundaries are covered under federal legislation. Some employees, such as those working in domestic employment (for instance, domestic workers in private households), are generally not covered. The authorities responsible for providing services also vary by province or territory.

Further Reading

Health and safety at work

For more about health and safety at work in Canada, visit the Canadian Centre for Occupational Health and Safety website at: http://www.ccohs.ca/ and the Human Resources and Skills Development website at: http://www.hrsdc.gc.ca/eng/health_safety/index.shtml

In spite of provincial differences in organization, all Canadian workers have certain rights and duties under the Labour Code:

Rights of workers include

- Right to know. That is the right to know about work-related hazards. This includes the training and supervision necessary to protect the worker’s health.

- Right to participate in health and safety. Employers with 300 or more employees are required to establish a health and safety committee, which includes representation from workers and from management. Its objective is to develop a health and safety policy. Other employers (those with fewer than 300 employees) may choose to do so. Workers have the right to participate in the committee and policy deliberations. They may also participate through the internal complaint resolution process covered under the Canadian Labour Code.

- Right to refuse. Employees can refuse to work if the work is dangerous to themselves or others and if the danger is not a normal condition of employment.

The duties of workers include; using the safety equipment provided, respecting health and safety procedures, instructions and policies that relate to the hazard or to the use of safety equipment, and reporting potential workplace hazards as well as injuries and hazardous events.

The duties of employers are; to provide a safe workplace, to respect safety standards, and to ensure that workers receive the information and training they need to protect their health.

Workers’ compensation

Organized workers’ compensation in Canada began with the 1913 Meredith Report, and is administered by Workers’ Compensation Boards. One of the major goals of most workers’ compensation boards is to get workers with occupational illness back to work. To do so, compensation may cover rehabilitation costs, including, for instance, outpatient physiotherapy services. As such, workers’ compensation can provide a broader range of services than does the provincial health care plan. The ill worker remains under the care of his or her usual treating physician who, on request of the patient, must provide a letter to support the patient’s claim for compensation and will continue follow-up of the patient’s condition. Apart from medical care, return to work may require changes in the patient’s work-station, entailing work with, for instance, occupational therapists or occupational health practitioners.
hygienists and the patient’s employer.

Five basic principles of workers’ compensation.

The basic principles of workers’ compensation were set out in the 1913 Meredith Report and survive today. They are:

1. **No-fault compensation.** Workplace injuries are compensated regardless of fault. Neither worker nor the employer can sue, nor are they expected to admit responsibility, except in a case of gross negligence.

2. **Collective liability.** The total cost of the compensation system is shared by all employers in proportion to the costs of claims for each occupational sector. For instance, the forestry sector pays higher premiums than the office work sector. All employers contribute to a common fund and financial liability becomes their collective responsibility. However, employers’ contributions may be adjusted to reflect the cost of successful claims of their workers.

3. **Security of payment.** Injured workers are assured of prompt compensation and future benefits.

4. **Exclusive jurisdiction.** All compensation claims are directed solely to the compensation board. The board is the decision-maker and final authority for all claims. The board has the authority to judge each case on its individual merits.

5. **Independent board.** The governing board is both autonomous and non-political. The board is financially independent of government or any special interest group. The administration of the system is focused on the needs of its employer and worker clients, providing service with efficiency and impartiality.

Public health services in Canada

Development of the public health system

Public health activities remained fairly uncoordinated until relatively recently. As cities grew, water and sanitation services developed with engineering advances, and were coordinated by municipalities. Quarantine and isolation became important in the early and mid-19th century, when waves of immigrants brought cholera and typhus with them to Canada. In the early 20th century some towns began to chlorinate water, rural towns began to pasteurize milk, and Ontario began to immunize against smallpox and diphtheria.

In 1974, the Lalonde Report emphasized the need to look beyond the care of the sick in order to improve the health of the population, so that the health care system should include action on environment, lifestyle and health care organization, as well as biology. It was the first Canadian report on the health system to mention the importance of health promotion and prevention in maintaining population health. In 1986, with the first international conference of health promotion being held in Ottawa, the then Minister for Health and Welfare, Jake Epp, presented “Achieving Health for All: A Framework for Health Promotion.” This report reflected the Ottawa Charter for Health Promotion (which had been ratified at the same conference); the Framework set out the direction for health promotion in Canada. It said that Canada should attempt to reduce inequities, to increase the prevention effort, and enhance people’s capacity to cope. It suggested that this could be achieved by fostering public participation, strengthening community health services, and coordinating public health policy.

Until the turn of the millennium, public health continued to take a back seat to personal health services and received about 3% of overall health funding. Although some provinces, such as British Columbia and Quebec, had developed coherent structured public health systems, including provincial organizations providing public health expertise (BC-CDC in British Columbia and the INSPO in Quebec), in most provinces public health provision remained poorly coordinated.

In 2000, an E. coli outbreak killed seven people in Walkerton, Ontario, and affected thousands of others. Then, in 2001, around 6,000 people in
North Battleford, Saskatchewan, contracted cryptosporidiosis because of problems with the water supply. In 2002 and 2003, SARS, a previously unknown disease, reached near pandemic levels causing over 8,000 cases in 16 countries. Forty-four Canadians, mostly in Toronto, died. Meanwhile, experts in public health were warning of an impending influenza pandemic. During the same period, the 9/11 attacks in New York and several terrorist attacks in Europe and Asia occurred, and extreme weather conditions were causing death and injury around the world. These man-made and natural disasters increased awareness of the need for public health services disaster planning around the world.

The events in Canada demonstrated the weakness of the public health infrastructure. In response, the 2006 Public Health Agency of Canada Act came into force establishing a Chief Public Health Officer for Canada who would

- Advocate for effective disease prevention and health promotion programmes and activities
- Provide science-based health policy analysis and advice to the federal minister for health
- Provide leadership in promoting special health initiatives
- Improve the quality of public health practice.

The Act also created the Public Health Agency of Canada, whose mission is to promote and protect the health of Canadians through leadership, partnership, innovation, and action in public health. The agency would

- Concentrate and focus federal resources
- Enhance collaboration between different levels of government
- Allow faster, flexible response to emergencies
- Improve and focus communication
- Allow for longer-range plans than the usual annual planning cycle of governments
- Achieve greater success in attracting and retaining public health professionals.

In keeping with its origins, the agency’s immediate priorities were emergency preparedness, immunization, and chronic disease prevention.

According to the Public Health Agency of Canada, public health is concerned with six essential activities:

1. **Health protection:** This includes ensuring that water, air and food are safe, maintaining the regulatory framework for the control of infectious disease and protection from environmental threats, as well as advising on food and drug safety regulations.

2. **Health surveillance:** The ongoing, systematic use of routinely collected health data for the purpose of tracking and forecasting health events or health determinants. It includes
   - The collection and storage of relevant data
   - The integration, analysis, and interpretation of these data
   - The production of tracking and forecasting products with the interpreted data
   - Publication and dissemination of those products
   - Provision of expertise to those developing or contributing to surveillance systems, including risk surveillance.

The information produced by surveillance is used in planning services and prevention programmes.

1. **Disease and injury prevention:** The investigation, contact tracing, and development of preventive and control measures to reduce the risk of infectious disease emergence and outbreaks as well as the promotion of safe, healthy lifestyles to reduce preventable illness and injuries.

2. **Population health assessment:** Understanding the health of communities or specific populations, as well as the factors that underlie good health or pose potential risks, to produce better policies and services.

3. **Health promotion:** Preventing disease, encouraging safe behaviours, and improving health through public policy, community-based interventions, active public participation, and advocacy or action on environmental and socio-economic determinants of health.

4. **Emergency preparedness and response:** Planning for natural disasters (e.g., floods, earthquakes, fires, dangerous infectious disease) and man-made disasters (e.g., those involving explosives, chemicals, radioactive substances, or biological threats and social disruption).

As with general health care services, responsibility for public health is shared between the federal, provincial, and territorial governments. Provinces...
and territories are responsible for providing services to their population; however, the organisation and the services offered vary across the country.

Further Reading

Provincial public health services

To find out how public health services are delivered in each of the provinces and territories, visit the National Collaborating Centre for Healthy Public Policy website:

Coordination of world health

The World Health Organization is the directing and coordinating authority for health within the United Nations system. It was created in 1948 and is responsible for providing leadership on global health matters, shaping the health research agenda, setting norms and standards, articulating evidence-based policy options, providing technical support to countries, and monitoring and assessing health trends. It currently focuses on six approaches to improving health:

1. Promote development
2. Foster health security
3. Strengthen health systems
4. Harness research, information and evidence
5. Enhance partnerships
6. Improve system performance.

Recent successes were the agreement on a code of practice for international recruitment of health personnel, and a framework for action on interprofessional education. It is, however, confronting several other major global problems, including food safety and fraudulent medical products. The WHO must also monitor the health-related Millennium Development Goals, and develop strategies to reduce the harmful effects of alcohol, and to address the rise of chronic non-communicable diseases, including the issue of marketing food and beverages to children, which contributes to obesity and poor dental health.37

Responsibility for Promoting Health

A brief look at the list of health determinants confirms that no one authority can be responsible for the health of a population. Health promoters believe that it should be the responsibility of all members of a population or community, and a core responsibility for all government.38,39 Although those working within the health services have a particular responsibility to advocate for health, expertise in public and population health can be found in a variety of different academic disciplines, professions, and organizations. Experts in public health come from a variety of different backgrounds and may use different names to describe their expertise.

Community mobilization is the strategy of choice for sustainable health promotion. In this approach, community members are involved in defining the problems and in proposing solutions. Unlike classic top-down health education, where health professionals study and prioritize problems and then develop solutions, community mobilization involves community members in the process of defining and transforming problems. It is a long-term process that empowers communities, allowing them to take over health-promoting action.

Nerd’s Corner

Who does public health?

Public health teams comprise a wide range of professionals with interests in diverse aspects of health. Many have a basic training in the clinical sciences, such as physicians, nurses, psychologists, social workers, dieticians, kinesiologists etc. They work at all levels in the health system from the provincial and federal government to the local and regional health authorities and some work in community health service centres. Those who work in public health departments manage and deliver public health programmes, which generally include transmissible and environmental disease protection, well baby, vaccination and sexual health programmes. Statisticians and epidemiologists carry out health surveillance.

The Royal College of Physicians and Surgeons designates public health and preventive medicine as the branch of medicine concerned with the health of populations. Through interdisciplinary and intersectoral partnerships, the public health and preventive medicine specialist measures the health needs of populations and develops strategies for improving health and well-being through health promotion, disease prevention, and health protection.40
Public health law

Much of public health law was drawn up in the 19\textsuperscript{th} century when the discipline of public health was gaining recognition. Quebec, having invested in public health for some time, is the first province to have developed a sophisticated system that was consolidated by its adoption of its Public Health Law in 2001. The most notable recent event in Canada was the creation of the Public Health Agency of Canada. Public health law is still evolving; it has the following characteristics:

- Recognition of the special responsibility of government in public health
- The focus on population health
- The regulation of the relationships between the state and populations, and between the state and individuals who may pose a risk to the public’s health
- Government provision of public health services
- The government power to coerce individuals and businesses in order to protect the public’s health.

Public health law respects the following principles:

- Duty of government to protect the health and well being of the population
- Power to set standards of health and safety and ensure compliance
- Restraint in the exercise of power; should act only on the basis of clear criteria where necessary, procedural due process.

Public health law assigns the government the legal power and duty to ensure conditions for people to be healthy (e.g., to identify, prevent, and ameliorate risks to health in the population). It places constraints on autonomy, privacy, liberty, propriety, or other legally protected interests of individuals for the protection or promotion of community health, but it also places limitations on the power of the state to constrain these interests.41

Self-test questions
1. What are the advantages and disadvantages of publicly funded and privately funded health care?

<table>
<thead>
<tr>
<th>Publicly funded</th>
<th>Privately funded</th>
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<td><strong>Advantages</strong></td>
<td><strong>Disadvantages</strong></td>
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<td>Possibility of a single payer system that reduces costs.</td>
<td>Can reduce individuals’ liberty.</td>
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<td>Everyone can be covered so that people do not face financial ruin because of illness.</td>
<td>Health care is a major political issue.</td>
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<td>Health care resources can go to those that need them.</td>
<td>Resources go only to those that can afford them, therefore those least likely to need them.</td>
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<td>Redistributes wealth in the population, so affecting a major determinant of the health of populations and individuals.</td>
<td>Can drain human resources from co-existing public systems.</td>
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2. What are the likely effects of the aging population on the health care system?

The aging population is unlikely to increase the cost of acute care. The causes of increasing acute care costs are rooted in the development of technologies, particularly pharmaceuticals, and changing health behaviour. The cost of chronic care is likely to increase. A strong primary health care system that includes different types of professionals and services will be necessary to meet the needs of the aging population.

2. Assume you are treating a patient who has had a disabling cerebrovascular accident. Which allied health professionals could contribute to the management of the disability?

A wide variety of professionals and non-professionals could contribute to the management of the disability depending on which functions have been affected.

- Mobility problems can be aided by physiotherapy. Occupational therapy can help the patient and family find ways to adapt to the dysfunction. Speech therapy can be required when Broca’s speech area has been affected or when the patient has difficulty swallowing. Previously existing hearing and sight problems can require further attention to maintain optimal function. Social and psychological care can help the patient and family adapt to loss of function and social workers can help the patient access the benefits to which he or she is entitled. Respiratory therapists can help prevent respiratory problems due to immobility; pharmacists can oversee prescription drugs and warn of interactions; dieticians may be required to advise in adjusting the diet for secondary prevention and to ensure an adequate nutritional state.

Non-professional services, such as home care and respite care can be of great benefit to the patient and the carer. Patient associations or associations of elderly people can improve social support and provide a social network to prevent isolation of patients and families. Associations, such as the heart and stroke association of Canada can provide patient information to improve health and to access benefits.

1. What non-physician services are available outside hospital in your area?

2. How are health services for Aboriginal Peoples organized in your province or territory?

References


