imely access to healthcare services has become a primary concern for most Canadians. One of the key issues is lengthy waits for specialized services such as elective surgeries and diagnostic tests. A recent survey conducted by Statistics Canada on access to healthcare services revealed that approximately 20 percent of those who required specialized services over a 12-month period reported that they had difficulties accessing care. Most indicated that waiting for care was the problem. Approximately one in four of those who did wait for care indicated that their waiting time was unacceptable, and one in five reported that they experienced adverse effects such as stress, anxiety and pain. It is evident that waiting for care is an issue for some patients. There is little accurate, reliable information to determine precisely how many patients wait for care and for how long.

Governments at all levels have been called upon during the past several years to reduce lengthy waits and improve overall access to healthcare services. There have been numerous debates, however, regarding the actual extent of the problem and the best way to address it. In 1989, Health Canada released the first national report on the state of waiting times in Canada. One of the report’s most important recommendations pertained to the development of reliable and comparable waiting time data for a broad range of medical procedures so that patients, healthcare providers and governments could have a better and more accurate understanding of the extent and nature of waiting times. Furthermore, the development of these data systems must begin with standard definitions for waiting times (i.e., when the waiting for care begins and ends).

The need for reliable information has never been greater. In September 2000, on a set of 14 indicators, the First Ministers agreed to provide comparable information across all provincial and territorial jurisdictions and improve overall accountability within the system. One of the three areas of reporting is quality of healthcare services. Waiting times for selected diagnostic and surgical procedures was selected as one of the indicators to provide
information on accessibility of services. Reporting began in September 2002 and the next report is due in November 2004.5

Over the past several years, provincial ministries of health across the country have been working toward the development of waiting list strategies and management systems. Waiting list information and management for cardiac services has existed for more than a decade in Ontario through the Cardiac Care Network. Patients awaiting selected cardiac services are placed on the provincial-wide registry and followed throughout the course of their wait and eventual surgery (see www.ccnon.ca for more info). British Columbia has made waiting time information available to the public for several years through the Ministry of Health Web site (www.healthservices.gov.bc.ca/waitlist). In Manitoba, the Cataract Waiting List Program was developed to track and prioritize patients waiting for cataract surgery.7 In Saskatchewan, plans have been proposed for a province-wide surgical wait list management strategy.8 This is just to name a few.

Despite these efforts, no standard or universally accepted definitions of waiting times exist for a broad range of services and procedures. Such standards are needed to improve the accuracy and comparability of waiting time information provided to patients, healthcare providers and policy makers. Standard definitions will also serve to improve the comparability of data across procedures and jurisdictions. The establishment of standard definitions represents the first step in determining whether patients are gaining access to care within a reasonable and acceptable period of time.

The Western Canada Waiting List Project (WCWL) is a federally funded partnership of 19 organizations that was created to develop priority tools to assist in the management of waiting lists.9 In addition to the development of the tools, the WCWL Project also focused its efforts on the development of standard definitions of waiting times for general surgery, hip and knee replacement surgery, cataract surgery and magnetic resonance imaging (MRI). A comprehensive list of waiting periods potentially facing patients seeking these services is identified and defined based on an examination of the standard paths to care for these procedures. The major issues and challenges facing the implementation and operationalization of standard definitions for waiting times are discussed and recommendations are proposed regarding future efforts in this area.

Definitions Currently Used
Waiting times have been studied, both within Canada and internationally, using various definitions. Most studies conducted to date have focused on three distinct waiting periods: waits to see the specialist, waits to receive hospital-based services and total waiting time. The differences lie primarily in how these waiting periods are defined (i.e., precisely when the waiting period begins and ends).

The waiting time for a specialist consultation has been defined as the time between the referral from the primary care practitioner to the consultation.10-15 In the early 1990s, this definition was introduced in the National Health Service in the United Kingdom to ensure the comparability of national waiting time statistics for specialist consultations.11 Specialist waiting times have also been defined as the time between the visit to the primary care physician and the specialist consultation.12

The majority of studies conducted to date have focused on waiting times for hospital-based services such as surgery. In most cases, waiting times were defined as beginning when the patient was booked for surgery and placed on the hospital waiting list.5, 6, 10-16 Alternatively, surgical waiting times were also defined as the time between when the patient and physician decided that treatment was necessary and desirable (often referred to as the "decision to treat"), and the date of treatment.17 The decision to treat is often assumed to take place during the last presurgical consultation with the specialist or surgeon. This definition is commonly used in studies where, in the absence of waiting list data, waiting times were estimated retrospectively using health administrative data (i.e., hospital and physician payment data), and the date of the last presurgical consultation was used as a proxy date for the day of the treatment decision.1, 15-16

Finally, some argue that the only true meaningful measure of waiting is the "total waiting" time to care. One of the earliest definitions emerged from the United Kingdom where researchers defined total waiting time as beginning when the patient seeks care, often marked by the first visit to the primary care practitioner, and ends when the treatment has been provided.16 A similar definition has been proposed in Canada by the British Columbia Medical Association.6

There are clearly various definitions used to report waiting times for medical services in Canada and abroad. While many of these definitions may be appropriate for specific procedures, their variability represents a problem when there is a need to aggregate or compare waiting time information across jurisdictions, procedures and specialty groups. Standard definitions for waits represent the first step to improving the management and reporting of waiting time information.

Defining Waiting Times: A Path-to-Care Approach
A comprehensive understanding of the "standard" paths to care can provide information regarding the potential waiting periods faced by patients during the course of care and highlight the key processes that may serve to define the start and end of each waiting period. Paths to care were developed in consultation with WCWL panel members for surgery (i.e., general surgery, hip replacement and knee replacement) and MRIs using a Delphi approach in which members were presented with an initial path and asked to revise or change as necessary. Several iterations were conducted until a model was agreed on. The work of the WCWL Project was
conducted by clinical panels established for each procedure area. The panels comprised 12 members including specialists (in the relevant field), referring physicians, academics and representatives of the regional health authorities. They were chaired by an experienced and respected leader in the relevant clinical area selected by the host region. Selected members from the knee and hip replacement panel, general surgery panel, cataract panel and MRI panel participated in the development of the standard definitions.

Waits for Surgery

Given the similarities in the paths to care for general surgery, knee and hip replacement and cataract surgery, a single path to care was developed to represent waiting times for surgery (figure 1).

Waiting time for primary care (wait #1): The first waiting period likely experienced by patients is the waiting time for a primary care consultation with either a general or family practitioner. This waiting period is defined as the time between the date of request for a consultation to the date of the primary care consultation.

Waiting time for initial specialist/surgical consultation (wait #2): Once the initial primary care consultation has been conducted, the physician may recommend a visit to a specialist or surgeon. In the case of cataract surgery, however, patients may be referred directly to an ophthalmologist by an optometrist. The second waiting period, therefore, is defined as the time between the date of referral and the date of the specialist/surgical consultation.

Waiting time for the decision to treat (wait #3): Following the initial specialist/surgical consultation, patients may take different paths leading to the treatment decision. The waiting times experienced by patients will vary depending on the course of treatment. The decision to treat may be made at the initial specialist/surgical consultation or a subsequent presurgical consultation if the patient requires more than one consultation to reach a treatment decision. In the first case, patients will not experience any waiting. In the latter case, the time lapsed between the first consultation and the decision to treat cannot be considered a waiting period (in the traditional sense), since prior to a decision to treat, there is no treatment for which the patient is waiting. In some cases, patients may be placed on a waiting list in anticipation of the potential need for treatment, assuming they will need care once they reach the top of the queue. The waiting times for these patients, however, will appear exceedingly long compared with the waits of those placed on the list following the treatment decision. This may occur in situations where waiting lists are “gamed” to improve access for selected patients.

Waiting time for major diagnostic tests (wait #3a): Alternatively, diagnostic tests may be required to make or confirm diagnoses and treatment decisions. In some cases, only specialists may make requests for diagnostic tests, while in other jurisdictions, the request may be made directly by a primary care practitioner. The waiting time for diagnostic tests (wait #3a), therefore, is generally defined as the time between the date of the request for a test and the date of examination.

Waiting time for subsequent specialist/surgical consultation (wait #3b): Patients with more complex diagnoses may be referred to a second specialist or surgeon for further consultation before a decision to treat
can be made. For example, patients requiring surgical treatment may be referred to the surgeon following an initial specialist consultation. In such cases, patients may be facing a subsequent specialist consultation waiting time (wait #3b) defined as the time between the referral date from the first specialist to the date of the subsequent specialist/surgical consultation.

Waiting time for surgery (wait #4): Once the decision to treat has been made, patients will likely face a final waiting time for surgery. As noted in the literature and in the path to care, this waiting time may begin at one of two points in time: at the time of the treatment decision, or at the time of hospital "booking." In the case of the first starting point, the last presurgical consultation with the specialist or surgeon is commonly assumed to be when the decision to treat is made. The surgical waiting time, therefore, may be defined as the time between the date of the decision to treat and the date of surgery (wait #4a).

Alternatively, the surgical waiting time may begin when the patient is booked for surgery or placed on the hospital waiting list. The surgical waiting time, therefore, may alternatively be defined as the time between the date of booking or placement on the hospital waiting list and the date of surgery (wait #4b).

This definition, however, does not capture the elapsed time between the decision to treat and the date of booking or placement on the hospital waiting list. In most cases, this waiting time is likely to be negligible when physicians request bookings immediately following the treatment decision. However, they may choose to delay this request for various reasons (e.g., confirmation of operating room time). Although the patient has been waiting for surgery since the initial decision to treat was made, their "official" waiting time, as calculated using the booking date or date of placement on the waiting list, will be significantly shorter. The validity of this definition, therefore, is dependent in part on the processes and strategies used to book patients or place patients on hospital waiting lists.

Waits for MRI

The route to MRI examinations, like other diagnostic tests, will depend in part on the jurisdictional policies that determine access to these services. In many cases, patients referred for MRI examinations may experience waits similar to those discussed above for surgery, namely waits for a primary care consultation (wait #1) and for an initial specialist consultation (wait #2) (figure 2). The same definitions are applied to these waits and therefore do not require further discussion. There are several options for defining waits for MRIs.

Waiting time for receipt of request for MRI (wait #3a1): In some areas, MRIs can only be requested by a specialist; in other areas, they can be requested by a primary care practitioner. The first waiting period, therefore, is defined as the time between the request for an MRI and when the request is accepted by the radiologist. This waiting period is likely negligible if requests are made in a timely manner. However, given the lack of standard processes within and across jurisdictions, it is difficult to estimate whether, or to what extent, this is the case in all areas.

Waiting time for MRI (wait #3a2): The more significant waiting period for MRIs begins after the request has been received and reviewed by the radiologist. This waiting period is defined as the time between when the request for an MRI has been accepted by the radiology department or MRI clinic and the date of the MRI examination.

Figure 2: Waiting Times for MRI Examinations
Alternatively, the two waiting periods can be combined in the following definition for MRI waits: the time between the date of request for an MRI examination and the date of the examination (wait 3a). This definition may be appropriate in jurisdictions where standard request forms or letters are used that provide a referral date. Since the waiting period for patients begins when they and their physician decide that an MRI is necessary, this definition more accurately reflects the waiting time experienced by patients.

**Discussion**

Building on the existing information regarding definitions for waiting times and the expertise of the WCWL clinical panels, waiting times for surgery and MRIs were identified and defined. Standard definitions can be applied across a range of services and procedures with similar waiting periods.

The implementation and operationalization of such standards will likely meet various challenges. The degree to which processes and procedures used to deliver care are standardized across procedures and jurisdictions will affect the ability to operationalize standard measures of waits. Measuring waits for specialist/surgical consultations or MRIs, for example, is dependent on the availability of accurate information regarding the referral processes for these services. Currently, various methods are used to refer patients including phone, mail, fax or, in some cases, e-mail. Valid information regarding referral dates is critical to measure waits that begin with this date.

The availability of existing waiting time data and the use of standard procedures in the delivery of care will also affect the ability to implement national standards for waiting times. In some provinces such as Ontario and British Columbia, information systems are in place to capture waiting time data for a range of procedures. This, however, is not the case in all jurisdictions nor for all specialty groups. The implementation process may involve the establishment of information systems to collect data based on standard definitions of waiting times.

Perhaps the immediate challenge lies in the next steps toward the establishment of standard definitions for waiting times in Canada. To achieve this goal, a national initiative must be mobilized to seek consensus regarding standard definitions among key stakeholder groups including physicians, healthcare managers, policy makers, patients and academics as well as relevant national groups charged with reporting the state of the healthcare system. Wherever possible, standard definitions should be identified and adopted for similar waiting experiences within and across specialty and procedure groups. This process should be supported by a structure, newly established or currently existing, with the ability and capacity to work at the national level and across a broad range of healthcare services.

Efforts to establish standard definitions for waiting times represent one of several strategies being developed to address the issue of waiting lists and waiting times in Canada. Together, these approaches clearly mark a shift toward the development of strategies to provide valid and accurate information on waiting times better to inform patients, healthcare providers and policy makers.

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**References and Notes**