Waiting lists and elective surgery: ordering the queue

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ABSTRACT

- In the Australian public health system, access to elective surgery is rationed through the use of waiting lists in which patients are assigned to broad urgency categories.
- Surgeons are principally responsible for referring patients to waiting lists, deciding on the appropriate urgency category, and selecting patients from the waiting list to receive surgery.
- There are few agreed-upon criteria to help surgeons make these decisions, leading to striking differences between institutions in proportions of patients allocated to urgency categories.
- In other countries with publicly funded health systems, programs have been developed that aim to make prioritisation more consistent and access to surgery more equitable.
- As demand for health care increases, similar programs should be established in Australia using relevant clinical and psychosocial factors.
- Prioritisation methodology adapted for elective surgery may have a role in prioritising high-demand procedures in other areas of health care.

MJA 2010; 192: 217–220

In Australia and other countries with publicly funded health systems, such as New Zealand, the United Kingdom and Canada, waiting lists provide a buffer between the demand for elective surgery services and the capacity of the public system to provide them. Waiting lists are consistently newsworthy because they are perceived to reflect the inadequacy of health care funding. They are portrayed as one of the major problems of publicly funded health systems and are a perpetual source of community and political discontent.

Over the past decade, an increased demand for elective surgery has been observed in Australia[1-3] and overseas.[4,5] The capacity of health systems to respond to this is limited by funding and workforce availability. Under these circumstances, it is essential that those who have the greatest need for surgery and will benefit most from it receive it in a timely manner and before those with lesser need. Three recent high-level reports have underscored these concepts and emphasised the need for reforms to ensure equitable, efficient delivery of elective services.[6-8]

In this article, we review how patients access elective surgery in Australia, focusing on the assessment of need and timeliness (prioritisation). We examine the current status of prioritisation here and overseas and explore the potential for improvement in prioritisation practices in Australia.

The current prioritisation system in Australia

Most commonly, a patient's name is placed on an elective surgery waiting list after a lengthy process of referral, specialist assessment and investigation. Patients placed on a waiting list have been assessed to have a clinical need for surgery and are expected to benefit from that surgery. Despite this, the concepts of clinical "need" and "benefit" are ill defined. Currently, patients are classified into one of three nationally agreed-upon clinical urgency categories that take into account the likelihood of deterioration and are aligned with recommended waiting times for surgery (Box 1).[9,10] Some states have additional subcategories and categories for patients not ready for care. Guidelines developed in New South Wales recommend particular urgency categories for specific procedures.[11] The guidelines issued by the Victorian Government Department of Human Services (DHS) simply indicate that patients should be assigned to urgency categories based on clinical need.[12]

In public hospitals, it is common practice for waiting list offices to select patients for elective surgery admission and to manage their admission process. This occurs in consultation with the surgeon who will perform the procedure.

Patients with the most urgent need for surgery (Category 1) take precedence over those in lower urgency categories (Category 2 and 3). Victorian DHS elective surgery guidelines advise that selection should be based on clinical priority, although other factors should be taken into account, such as length of time already waited, previous postponements to surgery, and resource availability.[12]

Problems with the current system

Although assignment of urgency categories applies a basic form of prioritisation, it is an informal and relatively insensitive process that does not assure transparency and equity of access to available services, and does not take into account the numerous factors that can contribute to a patient's urgency for surgery.

The lack of specific guidelines to help surgeons make decisions about patients' need for surgery is a shortcoming of the current Australian system that may compromise patients' equity of access and clinical outcomes. A 1998 independent review of Victorian elective surgery waiting lists recommended development of specialty-specific clinical guidelines for categorisation of patients according to urgency.[13] This has not occurred.

Clinical indications for "appropriateness" of surgical procedures or the "likelihood of deterioration" of common conditions are not well defined. This may contribute to some patients being placed on waiting lists for clinically inappropriate or untimely procedures, as identified in clinical audits of waiting lists undertaken overseas.[14]

Further, priority for surgery is determined implicitly by unspecified, intuitive criteria that may vary between doctors. This probably explains the substantial variability observed in the use of urgency categories across surgeons and hospitals in a Victorian study of waiting list data.[15] Variation in Australian waiting times for surgery according to socioeconomic status and remoteness also reflect this inconsistency in access to elective services.[16]

What is happening in other countries

In NZ and Canada, there have been concerted efforts to make prioritisation for elective surgery more systematic and publicly

accountable. In both countries, this has involved a shift from implicit prioritisation to practical, explicit tools that help prioritise patients on waiting lists.

New Zealand

In the early 1990s, the Core Services Committee recommended that access to core health services should be guided by evidence-based guidelines and clinical criteria.[17] These formed the basis for subsequent Clinical Priority Assessment Criteria (CPAC) tools used to assess need for surgery.[18] The system aimed to provide certainty to patients about timing of treatment, ensure that patients with the greatest need and potential to benefit were treated first, and to provide nationally consistent access to surgery. Scoring tools were initially developed for coronary artery bypass graft surgery, cataract removal, hip and knee replacement, cholecystectomy and surgery for otitis media. These tools used a range of clinical and other social factors in a numerical assessment of patient urgency.[19] Until recently, over 30 national CPAC tools were listed on the NZ elective surgery website.[20]

After referral by their general practitioner, patients are assessed and assigned a CPAC score at their first specialist outpatient appointment. If patients' level of need, determined by their CPAC score, meets the threshold for publicly funded treatment, they are booked for surgery within 6 months. Where urgency exists (eg, among patients with cancer), waiting times are brief. If the patients' score falls below the threshold, they are either referred back to their GP for ongoing care or are placed under active review, the latter requiring monitoring and reassessment of priority every 6 months.[20]

Despite this attempt to improve equity of access to elective services, there has been significant criticism about the lack of scoring tool validation before implementation, inconsistency between scoring tools, and lack of CPAC score correlation with measures of patient need.[21] NZ clinicians believe the current CPAC tools do not effectively and consistently prioritise patients, but many acknowledge the need to work towards achieving this aim.[22]

Canada

In Canada, there has been longstanding interest in waiting lists and long waiting times. Methods for prioritisation are becoming more widely known, most notably through the work of the Western Canada Waiting List Project (WCWL), a collaborative program involving government, health and research organisations. The WCWL aimed to improve the fairness of the Canadian health system by prioritising access to medical services on the basis of need and potential to benefit. Its approach to waiting list management has public support.[23]

The first phase of the WCWL focused on developing and validating practical, physician-scored point-based scoring tools to measure patients' priority for selected elective procedures. Expert clinical panels developed tools for five services, including hip and knee replacement, cataract removal, and general surgery.[24-26] The final tools included clinical criteria and non-clinical patient factors perceived to contribute to urgency, such as ability to live and work independently, and ability to care for dependants. The second phase of the WCWL developed evidence-based benchmark waiting times corresponding to different grades of urgency for joint replacement and cataract removal.[27]

1 Current Victorian urgency categories for elective surgery

Category 1: Urgent
- Has the potential to deteriorate quickly to the point that it may become an emergency
- **Desirable treatment time:** admission within 30 days

Category 2: Semi-urgent
- Causes some pain, dysfunction or disability
- Unlikely to deteriorate quickly
- Unlikely to become an emergency
- **Desirable treatment time:** admission within 90 days

Category 3: Non-urgent
- Causes minimal or no pain, dysfunction or disability
- Unlikely to deteriorate quickly
- Unlikely to become an emergency
- **Desirable treatment time:** admission at some time in future ◆

WCWL prioritisation tools have now been put into practice in several elective surgery programs across the Canadian provinces. The WCWL hip and knee replacement prioritisation tool is part of a care pathway for joint replacement that has been rolled out across Alberta. This followed a successful year-long pilot program comprising 1200 patients, in which waiting times were reduced by 85%.[28] The BC Surgical Patient Registry[29] in British Columbia and the Saskatchewan Surgical Care Network[30] also incorporate assessment tools modified from the WCWL tools.

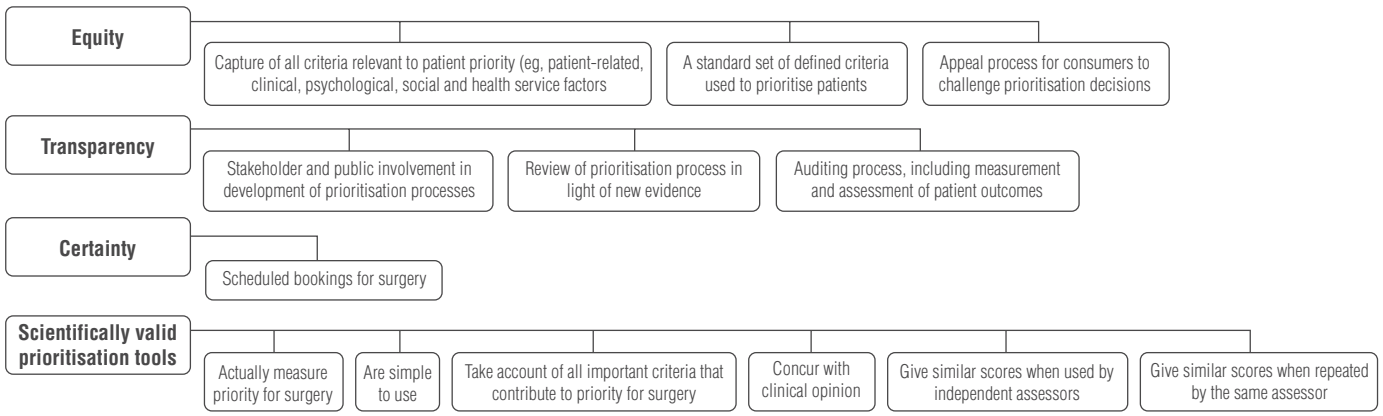
Research in Victoria

Victorian research has focused on the development of tools suitable for prioritising patients for joint replacement and prostatectomy. For the period July–September 2008, waiting times for Category 2 hip replacements and prostatectomy ranged from 15 to 315 days and 15 to 336 days, respectively,[31] indicating substantial waiting lists at some Victorian hospitals.

The Victorian Waiting List Prioritisation Study used WCWL questionnaires as a starting point to develop Australian tools suitable for prioritising local patients for total hip or knee replacement and prostatectomy.[32] Ranking and rating exercises performed by medical professionals and laypeople using real patient vignettes showed that clinical symptoms and psychosocial criteria were considered equally important when assessing a patient's urgency for surgery.[33] This information provided the foundation for prioritisation tool frameworks.

The Victorian DHS subsequently established the Orthopaedic Waiting List Project, which developed a Multi-Attribute Prioritisation Tool (MAPT) through a process involving concept mapping, review and validation with orthopaedic surgeons and patients.[34] The final MAPT contained 11 clinical and psychosocial domains, and included questions about pain, psychological and economic impact, limitations to activities, and deterioration. It has been built into the Victorian Osteoarthritis Hip and Knee Service, an improved service model for management of patients requiring joint replacement that has been piloted at several Victorian hospitals.[35]

2 Key elements of a prioritisation system for elective surgery



What would the ideal prioritisation system for elective surgery look like?

An important preliminary step in designing a system that provides better outcomes for patients is to decide on its main purpose. UK researchers described five possible goals for waiting list policies, including reducing numbers of people on waiting lists, reducing the average waiting time, improving the health status of those on waiting lists, ensuring equal access for those with equal need, and ensuring quickest access for those with greatest need.[36] The latter two goals are fundamental objectives that can facilitate improvement in waiting times and health status, and should form the foundation of an improved system. Equity, transparency and certainty should be key elements of this system, and Box 2 shows how they could be represented. NZ and Canadian experiences serve to highlight the importance of ensuring the scientific validity of all prioritisation tools (Box 2).

This requires debate about the key clinical, social, and other patient- or health service-related criteria that should be considered, development of methods for scoring these criteria and a contextual framework. Progress is also needed in many other related areas, some of which are shown in Box 3.

Implications in other areas

Australia is predicted to see an increasing mismatch between patient demand for services and the capacity of public health systems to deliver the highest standards of medical care. Although prioritisation methodology will be important to ensure fair access to high-demand surgical procedures, it will also be applicable to new, expensive medical technologies and specialised levels of care where many issues of access already exist. Allocation policies are widely debated, but progress will be limited without a foundation of scientifically valid prioritisation methods. Strategies that support the prioritisation process for access to elective surgery therefore represent an important advance in the broader health care resource allocation debate.

3 Additional developments needed to improve access to surgery

Appropriateness of surgery

- Development of consensus guidelines to help determine thresholds for some key surgical interventions
- Better definition of characteristics that might predict deterioration during the waiting period and surgical outcome
- Determination of safe and acceptable waiting times for specific surgical procedures

Prioritisation tool development

- Identification and definition of distinct psychosocial characteristics that should contribute to an overall measure of patient priority
- Development and validation of prioritisation tools for other surgical disciplines and procedures and standardisation of these in a manner to enable prioritisation of patients across different surgical procedures

Prioritisation system

- Determination of the most appropriate method for operationalising the prioritisation process (eg, should it be the responsibility of the surgeon or of a "prioritisation officer"?)

Waiting times

- Recognition of the waiting times for primary care, specialist appointments and diagnostic tests that occur before patients are placed on waiting lists for surgery, and development of standard definitions and access measures that encompass the entire patient journey
- Development of evidence-based waiting time targets or benchmarks for specific procedures
- Optimisation of medical care for patients during the wait for surgery

Ethical considerations

- Determination of how the concept of prioritisation can coexist with the expectation that doctors will do their best for each individual patient
- Determination of how to utilise community and patient views in prioritisation processes ◆

Acknowledgements

We thank Tom Noseworthy for information about implementation of the WCWL prioritisation tools. We also acknowledge the helpful comments of Terry Symonds, Manager of the Surgical Services Program, Victorian DHS.

Competing interests

None identified.

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(Received 12 Jun 2009, accepted 7 Oct 2009) ❑