Are breast cancer survival rates higher in the United States than in the United Kingdom and France? Are a patient’s chances of dying within 30 days after admission to a hospital with a heart attack lower in Canada than in Korea? Are surgeons in some countries more likely to leave “foreign bodies” behind after operations or make accidental punctures or lacerations rates when performing surgery? The need for answers to these kinds of questions and the value of measuring the quality of health care are among the issues addressed in this publication.

Many health policies depend on our ability to measure the quality of care accurately. Governments want to increase “patient-centeredness”, improve co-ordination of care, and pay providers of high-quality care more than those who underperform. However, measuring the quality of health care is challenging.

The OECD’s Health Care Quality Indicator project has overcome some of the problems, though many remain. If policy makers are serious about improving the body of evidence on the quality of care, they need to improve their health information systems. This publication describes what international comparable quality measures are currently available and how to link these measures to quality policies such as accreditation, practice guidelines, pay-for-performance, national safety programmes and quality reporting. [www.oecd.org/els/health]
Executive summary

Health care quality cannot be taken for granted

There is overwhelming evidence, from many countries, that health care is often not delivered in accordance with scientifically set and commonly-agreed professional standards. The result is that poor quality and unsafe care harms tens of thousands of people every year, and scarce health care resources are squandered. The good news is that many countries, which differ enormously in the way that their health systems are structured, are improving the quality of health care. Measuring quality is a first and essential step to reaching that goal.

The increasing complexity of health care makes measuring quality even more important. Patients are older than ever before, and (partly as a result) an ever greater number of patients have more than one health problem simultaneously. Medical knowledge, the availability of evidence and new technologies have increased as well, so more complex treatments are possible compared to the past. Not only are medical problems and treatments more complicated, but so is the health system itself with patients often being cared for across multiple providers.

Measuring, monitoring and comparing the quality of care in a health system are three essential ingredients for quality-led governance of the health system. Ultimately the goal of health systems is to deliver health care that is effective, safe and responsive to patient needs.

The OECDs Health Care Quality Indicators (HCQI) Project has led the way in providing a conceptual framework and methodological basis to provide the required information on quality since it started in 2002. This report presents recent work on health care quality and provides country examples that illustrate how quality improvement is brought about in practice.

Chapter 1 of this report focuses on why we need information on health care quality? It illustrates how improving quality of care lies at the heart of most health policy initiatives such as improving the coordination of care to avoid problems occurring at the interface between different providers (integrated care, disease management, case-management). It also discusses whether there is an effective strategy to ensure that the root causes of illness and disease are avoided. Measuring quality of care and patient experience comprise critical information inputs to policies that try to improve the patient centeredness of health care systems – one of the central objectives of policy in many countries. Quality measures are needed to implement pay-for-performance schemes, as are increasingly being introduced in OECD countries, and are necessary for assessing the success or failure of other policies high on the health agenda, such as health technology assessment and the co-ordination of care.

Using examples such as avoidable hospital admissions and re-admission rates, survival rates for cancer and 30-day survival rates for patients admitted to a hospital with a heart attack or stroke, Chapter 2 addresses the question what does existing data on health care quality show? Quality indicators gathered by the OECD HCQI Project demonstrate the scale of the quality divide across OECD countries. The chapter also describes the conceptual and methodological challenges associated with capturing and measuring quality differences.
Key conclusions are:

- Data on avoidable hospital admissions for asthma, Chronic Obstructive Pulmonary Disease (COPD), diabetes and Chronic heart Failure (CHF) illustrate the importance of a well-functioning primary care system.
- Data on hospital case-fatality rates for heart attack and stroke show that there has been a huge improvement in quality of care over time, but some countries lag behind the best performers.
- Data on differences in hospital re-admission rates for schizophrenia and bipolar disorder between countries raise questions about the quality of mental health care.
- Data on patient safety indicators, such as foreign bodies left after procedure, accidental puncture or lacerations, and obstetric trauma in deliveries with and without instruments signal important questions about both whether reporting of incidents is adequate and whether policies to improve safety could not be improved.
- Data on cancer survival and mortality illustrate improvements over time but also that large inter-country differences persist.

The methodological challenges of international measurement of patient experiences are discussed, leading to an elaboration of some basic principles when setting up a national system for measuring such experience.

Chapter 3 tackles the issue of data acquisition. How can we get more and better data to measure quality? Data to measure quality come from various sources: death registries, disease registries, administrative databases, electronic health records and patient- and population surveys. Work over the past years has identified that the following technical and coding issues as being particularly important:

- The use of unique patient identifiers to link data-bases and thus monitor health care outcomes over time;
- Coding of secondary diagnosis and whether a certain condition (like an infection) is present at admission or acquired during hospital stay; and
- Whether data for quality indicators can actually be derived from electronic health records.

Addressing these issues is technically feasible; the challenge however is to introduce them whilst balancing concerns of privacy and data-protection. Quality governance and patient safety monitoring can only work when compatible privacy and data-protection regulations are in place.

Chapter 4 describes how quality indicators can be used to improve health care quality. An essential prerequisite to achieving this is to ensure that quality indicators relate meaningfully to quality-focussed policies. Collecting data at a national level which cannot be related to policies and actions at a local level – even by individual health providers – may have little impact on outcomes. On the other hand, if health providers can see that the quality of care they provide is measured, and see how it compares with other similar providers and more generally across the entire country (and even beyond), then they are likely to consider very seriously changes in practice which might improve their performance. In technical terms, the information that is collected to assess quality at the macro level should relate, where possible, to the quality information collected at the meso and micro level.
Conclusions and recommendations

Health care systems today face tremendous challenges – complex care needs and care processes, increased health care demands (especially for chronic conditions), and, fundamentally, an economic landscape where health care systems will have to achieve more for less. Measuring health care quality has a pivotal role to play in meeting these urgent and important challenges.

Poor quality care undermines every goal of modern health systems. It denies people potential health and at worst it kills them. Poor quality of care wastes precious health care resources – something that is unacceptable at any time, but even more so at the moment when money for health care is so tight.

In this report we describe why information on health care quality is important and how it can be used to improve health care. The report highlights examples drawn from around the world that illustrate how quality improvement initiatives can be implemented in real health system settings. Despite these examples, there is clearly much work to be done and quality improvements cannot be achieved with a ‘one size fits all’ solution. That said, the experience gained from international experts and quality initiatives in one country after another often point in the same directions. These are set out in the recommendations below:

Recommendations regarding the measurement of health care quality indicators

- Develop legislation that strikes a balance between privacy and data-protection and the need for reliable and valid information for quality-led governance.
- Exploit the potential of (national) registries and administrative databases for measuring quality of care particularly through the implementation of unique patient identifiers, secondary diagnostic coding and present-on-admission flags (i.e. to facilitate the distinction between quality issues that are the responsibility of hospital or others).
- Implement the comprehensive use of electronic health records.
- Establish national systems to collect longitudinal information on patient experience.

Recommendations regarding the application of health care quality indicators

- Ensure that common quality indicators are used when considering quality improvement at macro, meso- and microlevels.
- Ensure consistency and linkage of quality measurement efforts with (national) quality policies on health system input (professionals, hospitals, technologies) health system design (distribution of responsibilities for quality and accountability), monitoring (standards, guidelines and information infrastructure) and health system improvement (national quality and safety programs and quality incentives).
- Seek examples of good quality improvement practice from other countries, and identify how that learning can be applied locally.