AUSTRALIAN COMMISSION ON SAFETY AND QUALITY IN HEALTH CARE

Clinical Care Standards

Evidence Sources: Osteoarthritis of the Knee Clinical Care Standard

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Members of the Osteoarthritis Clinical Care Standard Topic Working Group are: Associate Professor Ilana Ackerman, Ms Karen Booth, Professor Rachelle Buchbinder, Professor Milton Cohen, Ms Jessica Danko, Mr Jeff Elliott, Ms Wendy Favorito, Dr David Hale, Dr Anthony Hobbs, Dr James Linklater, Professor Lyn March, Dr Lawrence Malisano, Mr Tim Noblet, Dr John North, Adjunct Associate Professor John Orchard (dissenting member), Ms Joy Pettingell, Dr David Samra, Ms Lesley Thomas, Mr Matthew Williams, Dr David Wood and Associate Professor Michael Yelland.

Disclaimer
The Australian Commission on Safety and Quality in Health Care has produced this Evidence Sources document to support the corresponding Osteoarthritis of the Knee Clinical Care Standard. The clinical care standard supports the delivery of appropriate care for a defined clinical condition and is based on the best evidence available at the time of development. Healthcare professionals are advised to use clinical discretion and consideration of the circumstances of the individual patient, in consultation with the patient and/or their carer or guardian, when applying information contained within the clinical care standard. Consumers should use the information in the clinical care standard as a guide to inform discussions with their healthcare professionals about the applicability of the clinical care standard to their individual condition.

Evidence Sources – Osteoarthritis of the Knee Clinical Care Standard

The quality statements for the Osteoarthritis of the Knee Clinical Care Standard were developed in collaboration with the Osteoarthritis Clinical Care Standard Topic Working Group and are based on best available evidence.

Literature searches were conducted by Commission staff at different stages of development of the clinical care standard. The initial search took place between May and November 2015. A draft evidence summary was prepared which was reviewed for completeness by the Osteoarthritis Clinical Care Standard Topic Working Group. A further search took place between January and May 2016 to identify any new evidence that may affect the relevance or validity of the final quality statements.

The initial search was aimed at reviewing the evidence-base for each potential quality statement. As set out below, several steps were involved. The first step was to locate national clinical practice guidelines; if relevant, current, based on available evidence developed using systematic methods and endorsed by organisations, they would be the key sources of evidence. The second step was to locate other Australian guidelines, standards, policies, protocols, and international guidelines and standards. The third step was to identify high-level evidence published after the release of the national clinical practice guidelines.

Australian clinical practice guidelines, standards and policies were identified by searching:

- The clinical practice guideline portal of the National Health and Medical Research Council
- Websites of professional colleges and organisations
- Websites of state and territory health departments and agencies
- Internet search using various search engines.

International clinical practice guidelines were identified by searching:

- Guideline clearing houses such as the Agency for Healthcare Research and Quality, and Guidelines International Network
- Websites of guideline developers, such as the UK's National Institute for Health and Care Excellence, Scottish Intercollegiate Guideline Network.

Other high-level evidence was identified by searching:

- The Cochrane Collaboration for systematic literature reviews and meta analyses
- Medical literature databases (Medline, Embase) for systematic reviews and meta-analyses.

A summary of evidence sources for each quality statement is attached.

Quality Statement 1

Comprehensive assessment

A patient with knee pain and other symptoms suggestive of osteoarthritis receives a comprehensive assessment that includes a detailed history of the presenting symptoms and other health conditions, a physical examination, and a psychosocial evaluation that identifies factors that may affect their quality of life and participation in their usual activities.

Evidence sources

Australian Guidelines

Royal Australian College of General Practitioners. Guideline for the non-surgical management of hip and knee osteoarthritis. South Melbourne: RACGP; 2009; Available from: http://www.racgp.org.au/your-practice/guidelines/musculoskeletal/hipandkneeosteoarthritis/.

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National Institute for Health and Care Excellence. Osteoarthritis: The care and management of osteoarthritis in adults. Clinical Guideline 177 London: NICE; 2014; Available from: https://www.nice.org.uk/guidance/cg177

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Quality Statement 2

Diagnosis

A patient with knee pain and other symptoms suggestive of osteoarthritis is diagnosed as having knee osteoarthritis based on clinical assessment alone. X-rays are considered only if an alternative diagnosis is suspected (for example, insufficiency fracture, malignancy). Magnetic resonance imaging (MRI) is considered only if there is suspicion of serious pathology not detected by X-ray.

Evidence sources

International Guidelines

National Institute for Health and Care Excellence. Osteoarthritis: The care and management of osteoarthritis in adults. Clinical Guideline 177 London: NICE; 2014; Available from: https://www.nice.org.uk/guidance/cg177.

National Institute for Health and Care Excellence. Osteoarthritis: NICE Quality Standard 87 London: NICE; 2015; Available from: https://www.nice.org.uk/guidance/qs87.

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Quality Statement 3

Education and self-management

A patient with knee osteoarthritis receives education about their condition and treatments for it, and participates in the development of an individualised self-management plan that addresses both their physical and psychosocial health needs.

Evidence sources

Australian Guidelines

Royal Australian College of General Practitioners. Guideline for the non-surgical management of hip and knee osteoarthritis. South Melbourne: RACGP; 2009; Available from: http://www.racgp.org.au/your-practice/guidelines/musculoskeletal/hipandkneeosteoarthritis.

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Quality Statement 4

Weight loss and exercise

A patient with knee osteoarthritis is offered support to lose weight, if they are overweight or obese, and advice on exercise, tailored to their needs and preferences. The patient is encouraged to set weight and exercise goals, and is referred to services to help them achieve these, as required.

Evidence sources

Australian Guidelines

Royal Australian College of General Practitioners. Guideline for the non-surgical management of hip and knee osteoarthritis. South Melbourne: RACGP; 2009; Available from: http://www.racgp.org.au/your-practice/guidelines/musculoskeletal/hipandkneeosteoarthritis/.

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Quality Statement 5

Medicines used to manage symptoms

A patient with knee osteoarthritis is offered medicines to manage their symptoms according to the current version of Therapeutic Guidelines: Rheumatology (or concordant local guidelines). This includes consideration of the patient's clinical condition and their preferences.

Evidence sources

Australian Guidelines

Royal Australian College of General Practitioners. Guideline for the non-surgical management of hip and knee osteoarthritis. South Melbourne: RACGP; 2009; Available from: http://www.racgp.org.au/your-practice/guidelines/musculoskeletal/hipandkneeosteoarthritis/.

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Quality Statement 6

Patient review

A patient with knee osteoarthritis receives planned clinical reviews at agreed intervals and management of the condition is adjusted for any changing needs. If the patient has worsening symptoms with severe functional impairment that persists despite the best conservative management, they are referred for specialist assessment.

Evidence sources

International Guidelines

National Institute for Health and Care Excellence. Osteoarthritis: The care and management of osteoarthritis in adults. Clinical Guideline 177 London: NICE; 2014; Available from: https://www.nice.org.uk/guidance/cg177.

National Institute for Health and Care Excellence. Osteoarthritis: NICE Quality Standard 87 London: NICE; 2015; Available from: https://www.nice.org.uk/guidance/qs87.

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Quality Statement 7

Surgery

A patient with knee osteoarthritis who is not responding to conservative management is offered timely joint-conserving* or joint replacement surgery, depending on their fitness for surgery and preferences. The patient receives information about the procedure to inform their treatment decision. Arthroscopic procedures are not effective treatments for knee osteoarthritis, and therefore should only be offered if the patient has true mechanical locking or another appropriate indication for these procedures.†

Evidence sources

Australian Guidelines

Rheumatology Expert Group. Therapeutic Guidelines: Rheumatology. Version 3. Melbourne: Therapeutic Guidelines Limited; 2017. Available from: http://www.tg.org.au.

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* An example of joint-conserving surgery is high tibial osteotomy [1,2]

† Examples of appropriate indications for arthroscopic procedures are true mechanical locking, septic arthritis, and investigation where MRI is unclear.[3]

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