

**Policy Recommendation:**      **The place of arthroscopy in knee pain without true locking in Adults over 40 years old**

Date of Issue:                      April 2016

Dates of Revision:                February 2017 and July 2018

The Priorities Committee has reviewed the evidence for knee arthroscopy as part of treatment for generalised knee pain in the over 40's and recommend that arthroscopic lavage and debridement with or without partial-menisectomy in non-traumatic and persistent knee pain with no clear history of recurrent mechanical locking resulting in appreciable loss of function is low priority. **This includes any approach for diagnostic purposes.**

### Supporting Information

Osteoarthritis (OA) of the knee is the result of progressive degeneration of the cartilage of the joint surface. It affects more than 10% of the population over 60 years old and is more common in women. It often causes pain and stiffness of the knee joint and can impair patients' ability to perform activities of daily living and recreational activities.

Arthroscopic knee surgery involves the removal of loose bodies or osteophytes in the knee using debridement with or without partial meniscectomy.

A recent review of the evidence for knee arthroscopy included studies published before 27<sup>th</sup> November 2015 and found:

- One Cochrane Systematic review<sup>1</sup> on the clinical effectiveness of knee joint lavage alone which reported no significant improvement in pain or function at 3 months and 1 year after surgery.
- In 2015, a systematic review and meta-analysis<sup>2</sup> focused on the arthroscopic debridement and/or partial meniscectomy for patients with persistent knee pain. The key findings were that arthroscopic debridement and/or partial meniscectomy provided a very small benefit to patients in reducing pain for up to six months after surgery (2.4mm (95% C.I. 0.4mm to 4.3mm) change on a 0-100 visual analogue scale) but the pain reduction was not sustained beyond that time. There was no significant difference in knee function at any follow up time from 3 to 24 months post-surgery.
- The overall evidence base for arthroscopy surgery (lavage, debridement and/or partial meniscectomy) is weak and based on nine small RCTs. However, the meta-analysis attempts to correct for a variety of confounders and bias. The authors of review highlight that arthroscopic debridement with or without partial meniscectomy is no better than paracetamol, and less effective than both NSAIDS and exercise therapy.
- Evidence about the possible harms of knee arthroscopy indicates that the risk associated with knee arthroscopy are low, but nevertheless present. The numbers of adverse events per 1000 procedures are:
  - Venous thromboembolism (including DVT): 5.68 (95% CI 2.96 to 10.9)
  - Infection: 2.11 (95% CI 0.8 to 5.56)
  - Death from any cause: 0.96 (95% CI 0.04 to 23.9)

Although the quality of the evidence for harms was weak, there is evidence of some risk associated with undergoing knee arthroscopy, particularly for patients with comorbidities such as diabetes or COPD. Readmission was up to twice as likely for patients who had a history of smoking.

There is no evidence to support the cost effectiveness of arthroscopic surgery, as cost effectiveness is dependent upon the clinical effectiveness of the procedure.

<sup>1</sup>Reichenbach S et al. Joint lavage for osteoarthritis of the knee. The Cochrane database of systematic reviews.2010(5):Cd00732

<sup>2</sup>Thorlund JB et al. Arthroscopic surgery for degenerative knee: a systematic review and meta-analysis of benefits and harms. BMJ 2015; 350:h2747 doi:10.1136/bmj.h2747

***Whilst the panel recognised the considered expert advice of NICE in their recommendation the panel also had a duty to prioritise spending of a finite resource locally and made a decision which it felt gave the most equitable and effective use of investment.***