

Evidence Discussion (CMM-312: Knee Surgery-Arthroscopic and Open Procedures: Meniscal Allograft Transplantation)

Risks of knee arthroscopy for meniscal allograft transplantation include but are not limited to failure to improve, failure to heal, meniscal re-tearing, iatrogenic articular cartilage damage, complications related to fixation implants, neurovascular injury, infection, ecchymosis, hemarthrosis, arthrofibrosis, deep venous thrombosis, pulmonary embolism, and death, as well as complications related to risks of general and local anesthesia. **1**

Given the potential possibility for significant complications, proper patient selection is crucial to minimize the risk-benefit ratio.

Symptoms may include pain as well as mechanical symptoms such as blocked range of motion, weakness/giving way or buckling of the knee, or painful locking/clicking/catching/popping during weight-bearing activities. Supportive exam findings include joint effusion, joint line tenderness, painful/limited range of motion and positive meniscal tests (McMurray's/Thessaly/Apley's compression test). **2**

Imaging should confirm findings on MRI/ CT arthrogram amenable to arthroscopic meniscal allograft, including irreparable meniscal tearing or prior meniscal resection of more than 50% of the meniscus in a single compartment and which corresponds to the patient's symptoms and physical examination. **3**

Because several large randomized controlled trials have failed to significant benefit of arthroscopic partial meniscectomy in the presence of osteoarthritis, arthroscopic meniscal allograft transplantation is considered not medically necessary in patients with Kellgren-Lawrence Grade III or greater x-ray findings on standing radiographs. **4, 5**

It has been shown that many patients may improve with a course of conservative care and this may very well obviate the need for surgical treatment. **7** While degenerative meniscus tears have been documented in 35% of the general population over 50 years of age (and 60% of those over 50 with concomitant osteoarthritis) only 2/3 of them are symptomatic. **8** Studies have shown no clear relationship between the presence of meniscal tear on MRI and patient functional outcomes and pain. **9**

As risk for major complications exists, symptoms, physical exam findings and imaging findings should support surgical intervention. Although the use of any coverage criteria includes the possible risk of delayed care, EviCore firmly believes the benefits of our evidence-based criteria best ensure patient safety and highly outweigh any clinical harms.

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