

The Meniscus

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The meniscus is a “C” shaped soft cartilage cushion in the knee. There are two in the knee one on the inside (medial meniscus) and the other on the outside portion of the knee (lateral meniscus). The meniscus acts as a cushion between the thigh or femur bone and the tibia or shinbone protecting the articular cartilage. The more the meniscus is damaged the quicker the knee will wear out resulting in osteoarthritis.

Meniscal tears are very common. They may result from a twisting injury during athletics or wear out and tear as we age. The most common symptom of a meniscal injury is pain on the side of the knee. This may be accompanied with a small effusion (water on the knee) and a catching sensation.

If pain and swelling persist longer than a few days you should see an orthopedic specialist. The doctor will take a history and exam your knee. X-rays will also be taken to look for fractures or signs of arthritis. Often an MRI scan will be ordered to confirm the doctor’s diagnosis.

Most meniscal tears can be successfully treated with arthroscopic surgery. The biggest exception is a degenerative tear in a knee with some arthritis. Your doctor may want you to try rest, an anti-inflammatory medicine or a cortisone injection. The reason for this is that arthritis pain may not be relieved with arthroscopic surgery.

Arthroscopy of the knee for meniscal tears is one of the most common orthopedic procedures performed in the United States. One of the biggest advances in Orthopedic Surgery was the invention of the arthroscope in the 1980’s. The arthroscope is a very small instrument with a light source and a magnifying lens that allows a surgeon to look into a joint through very small incisions and treat many conditions that otherwise would of required much more invasive procedures.

Arthroscopy is done as an outpatient procedure. It can be performed under a local or general anesthesia. The surgery typically takes under 30 minutes. Most often the torn piece of meniscus is carefully removed. Occasionally if the tear is very big the meniscus can be sewn back together.

Recovery is fairly rapid. Crutches are used from 2 to seven days. Gentle exercises can be started right away. It usually takes 4 to six weeks to return to most activities. If your meniscus is sewn back your recovery will be delayed. A knee immobilizer may be required for six weeks and no cutting activities for 3 months.

Long-term prognosis is related to how much of the meniscus is removed. The most common surgery involves removing the back 1/3 of the meniscus. Twenty-year studies have shown only mild arthritic changes by x-ray. By contrast if more than 80% of the meniscus has to be removed there is a very high risk of developing disabling arthritis in 10 to 15 years.

Currently the only option is meniscal allograft reconstruction. This involves obtaining an appropriately sized meniscus from a donor. The meniscus is implanted arthroscopically as an outpatient. Crutches and a brace are used for 6 weeks and no cutting sports for 3 months.