



Lyman Orthopedics

Jeffrey Lyman, M.D.

INFORMATION SHEET FOR UNICOMPARTMENTAL KNEE REPLACEMENT PATIENTS

Introduction:

Osteoarthritis is a common problem for many people after middle age. Osteoarthritis is the type of arthritis involving the cartilage of a joint. The cartilage of a joint is a tough, gristle-like material that is found on the ends of the bones. It forms the surface of the joint on either side. Cartilage is durable and somewhat elastic. Over time, the cartilage may become worn. Eventually the cartilage may wear away entirely. This cartilage deterioration is what defines osteoarthritis. Unlike some other types of arthritis, osteoarthritis does not affect the whole body, however, the changes it can cause may limit due to the pain and loss of movement. Osteoarthritis can develop as a natural process of aging or it may occur as a result of a traumatic injury.

The normal knee is a complex joint consisting of bones and soft tissue structures that are designed to move and put up with forces of everyday activity. The forces of the knee are centralized in 3 areas or compartments. Each compartment takes in the stress of activity through the cartilage. Osteoarthritis may often develop in 1 of the 3 compartments of the knee, while the two remain relatively healthy. In the short term this can be managed with the use of anti-inflammatory drugs, pain relievers and physical therapy, which can delay the need for surgery, but eventually it may require further treatment.

Patients that have osteoarthritis in 1 compartment may not need a total knee replacement to relieve pain and restore the function of the knee. The alternative option is the unicompartmental knee replacement, where only one side of the knee or one compartment needs replacing.

Symptoms and Signs:

The predominant symptoms of osteoarthritis of the knee are pain, swelling, stiffness and a decreased activity level. The pain generally worsens with activities and improves with rest. Commonly, wasting of the thigh muscle occurs. This in turn may increase pain and may also cause symptoms of giving way. Symptoms such as locking and catching may also occur.

Treatment Options:

Initially, all patients should be treated conservatively. The reason for this is that osteoarthritic knees follow a course of sudden pain that settles over several weeks, followed by relief. Ultimately the intensity becomes more frequent as the osteoarthritis progresses, and when this happens surgical treatment should be considered. Conservative treatment consists of a four-week course of pain relievers or anti-inflammatory medications. We prefer the regular dosage of pain relief, such as panadol, because they are safe and effective. Physiotherapy should be used to strengthen the thigh muscle, as this improves the knee joint and therefore reduces the symptoms. Weight reduction is important. It is important to avoid high impact activities such as running and jumping. To maintain fitness, cycling and swimming is encouraged. If conservative measures fail, consideration can be given to surgical treatment.





Lyman Orthopedics

Jeffrey Lyman, M.D.

Unicompartmental Knee Replacement:

Unicompartmental knee replacement is an appropriate surgical option in selected cases of arthritis affecting one side of the joint only. This partial replacement is commonly performed for patients where the weight bearing surface of the knee joint becomes worn down to bone on bone on one side. The affected side of the joint is no longer smooth and free running and this leads to stiffness and pain. In this situation the unicompartmental knee replacement is performed.

What is involved for you as a Patient

Dr Lyman's team will explain all the relevant details you will need in order to prepare for surgery and your admission. You will be provided with a referral to have a chest x-ray and some blood tests. You will be assessed at the pre admission clinical by your anesthetist and other staff to ensure that you are medically fit for surgery. One week before attending the preadmission clinic you will need to have a chest x-ray performed and pathology tests carried out. These can be done at a center convenient to you. You will be required to have 4' weight bearing films (x-rays) prior to your surgery.

You will need to send to the hospital your admission, consent and questionnaire forms completed and signed by you. The hospital will be in contact with you on receipt of these forms to confirm your booking and details.

Admission to Hospital

You will usually be admitted to hospital on the morning of your surgery. You will need to take to hospital all relevant x-rays and all current medications & prescriptions with you. You will be in hospital for up to 5 days, but will start walking on your new knee the first day after surgery supervised by a physiotherapist. The hospital staff will also organize your rehabilitation to continue after you are discharged from hospital, either staying in a rehabilitation unit, or going home and seeing a physiotherapist regularly.

Potential Complications Related to Surgery

Pneumonia: After any general anesthetic there is always a risk of developing a chest infection. This risk can be minimized by early mobilization and performing deep breathing exercises after surgery. If you have any history of respiratory problem you should inform the staff at the hospital.

Deep vein thrombosis and pulmonary embolus: A combination of immobilization of the limb, smoking and the oral contraceptive pill or hormonal replacement therapy all multiply to increase the risk of a blood clot. Any past history of blood clots should be brought to the attention of the surgeon prior to your operation. The oral contraceptive pill, hormonal replacement therapy and smoking should cease one week prior to surgery to minimize the risk. Before you leave the hospital after surgery, a Doppler scan will be performed to exclude the presence of a blood clot.

Excessive bleeding resulting in a haematoma is known to occur with patients taking aspirin or anti-inflammatory drugs-such as Celebrex, Voltaren, Naprosyn or Indocid. They should be stopped at least one week prior to surgery.

Surgery is carried out under strict germ free conditions in an operating theatre. Antibiotics are administered intravenously at the time of your surgery. Any allergy to any known antibiotics should be brought to the attention of your surgeon or anesthetist. Despite these measures, following surgery there is a less than 3% chance of developing an infection. Most commonly these are superficial wound infections that resolve with a course of antibiotics. More serious infections may require further hospitalization and treatment.

Injury to the blood vessels around the knee during surgery is a very rare complication (less than 1%). Other potential problems include post-operative stiffness, pain and wound problems.

You must contact our office before you go into hospital if there is any evidence of infection, pimples, ulcers or broken skin around the area to be operated on, or if you have a cold, cough or any infection evident. Your surgery may need to be postponed until you have clearance that you are fit again to have the surgery. After you have this surgery you MUST take antibiotics prior to any other operations in the future, including dental work. This is to prevent germs lodging on the implant and causing infection in the joint.

*For any questions please do not hesitate in contacting our staff: (602)903-1824 direct line
www.lymankneemd.com
(602)903-1814 fax line*