

post operative period. The physiotherapist and the doctor will guide you in these. You will be discharged from the hospital as soon as you are comfortable and have learnt to walk and do the exercises depending on where you have come from.

The stitches will be removed normally on the 12th day. There may be some swelling of the operated leg which will resolve. If you have any doubts, always clear with the doctor. You will be able to discard your crutches/walker within a few weeks depending on various factors like your age, how quickly you have regained your muscle power and the pre operative walking status.

Do not lie down in bed all the time. You are not sick! You have problem only with your knee. Therefore walking and being up and about is important for your rehabilitation. After about 6 weeks you may be able to resume most of your normal activities including driving a car etc.

### Look after your knee

You should remember it is an artificial joint. Therefore follow the instructions and report to the doctor if you experience any problem so that the joint lasts your lifetime. If you need dental treatment you have to take prophylactic antibiotics.

Do not sit on low chairs.

Do not sit for prolonged periods of time in the first few weeks after surgery.

Do not push your knee too much if it hurts while exercising.

Do not sit cross legged in the initial period after surgery.



### Special types of Knee replacement

#### UNICOMPARTMENTAL KNEE REPLACEMENT.

If only one half of the joint is affected occasionally you may be a suitable candidate for unicompartmental knee replacement, where only the affected part of the knee is replaced.

#### HIGHFLEX KNEE.

This prosthesis enables you to get maximum amount of knee bending.

Joint replacement surgeries performed here include :

- ✓ Total hip replacement
- ✓ Hip resurfacing arthroplasty
- ✓ Revision hip replacement
- ✓ Total knee replacement
- ✓ Revision knee replacement
- ✓ Total shoulder and hemi shoulder replacements
- ✓ Total elbow replacement.



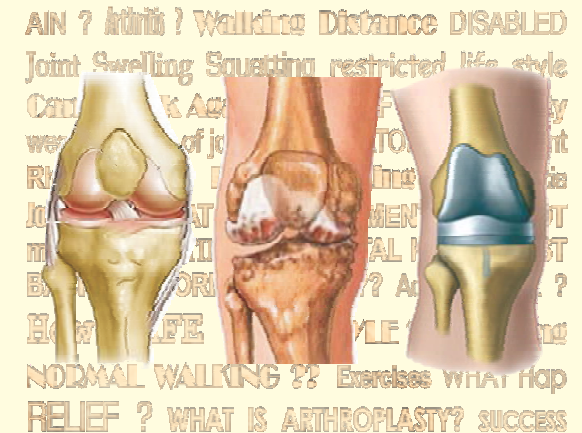
Bent and deformed arthritic knees



After Knee replacement

## All about Total Knee Replacement

### Patient Information Brochure



## About the knee joint

Knee joint is a complex hinge joint. The knee is made up of 3 bones; **the femur** (thigh bone), **the tibia** (leg bone) and **the patella** (knee cap). This complex structure enables us to walk, run, pivot and climb up and down stairs. When this joint wears out i.e, when the protective lining of the joint called articular cartilage wears out, raw bone rubs against raw bone and causes pain.



Left : Normal Knee  
Right : Arthritic Knee

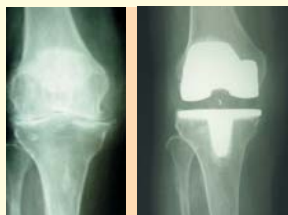
## Do you have painful knees?

Painful knee is a common problem among the middle aged and the elderly. Most common cause of painful knee is arthritis. Early knee arthritis responds to medication, physiotherapy, modification in life style etc. At some point knee arthritis begins to interfere with quality of life. The common symptoms of arthritis are swelling of **joint, knee pain, bow legged or knock kneed** deformity, loss of motion, feeling of giving way etc.



## Causes of arthritis

There are several conditions that result in arthritis of the knee joint. Wear and tear arthritis, commonly known as **osteoarthritis** is the commonest type of arthritis for which patients undergo knee replacement. Wear and tear may be due to some old injury like a fracture, dislocation, meniscal or ligament injury, or it



X-ray of a badly worn out joint before & after knee replacement

can even occur without any injury. There may be a slight mal-alignment of the joint due to bow leg in certain individuals that can result in arthritis. The other common cause of arthritis is rheumatoid arthritis, for which knee replacement is done. This is an inflammatory auto immune disease which affects the soft tissue covering (synovium), and eventually destroys the articular cartilage.

## What is Knee Replacement?

Knee replacement involves resurfacing the knee joint. There are 3 components in the artificial knee joint or prosthesis.

**A metal alloy component at the lower end of thigh bone.**

**A metal alloy component at the top end of leg bone.**

**A plastic (HDPE) between the two to act as a shock absorber.**

Occasionally the back side of the knee cap is also replaced. Replacement surgery does not involve removal of the whole joint. It involves resurfacing merely the superficial diseased surface.

The newer artificial joints are highly sophisticated and designed to suit the individual knees and it mimics the movements of the normal knee. Along with these newer designs and the advanced technical skills that we have acquired, we carefully assess your knee and your needs and replace it with a suitable prosthetic joint.

## When do you undergo Knee Replacement?

You have a painful knee that prevents you from leading a normal and happy life. You have moderate to severe arthritis in your knee joint. Your doctors have tried a course of conservative treatment and you continue to have severe pain in your knee.



Before



After

## What happens before Surgery?

Once you have decided to have total knee replacement, doctors and other staff will help and guide you in preparing for your surgery. The doctors will discuss with you in detail about the various aspects of surgery. They will order few blood tests and other investigations to assess your medical status and fitness for surgery. The anaesthetist will examine you and assess your fitness. You have to tell the doctors about the medicines you are regularly using. Certain medications that you may be taking for thinning the blood for your heart conditions will be stopped 5 to 7 days before surgery. If you have any source of infection in your body like pustules or caries tooth, you should inform the doctor, as these have to be sorted out before your surgery. Please feel free to ask the doctor or his staff about any doubts that you have. You may or may not require blood transfusion following surgery, but preparations will be made to keep one unit of blood ready. You have to continue your diabetic and blood pressure medicines even on the day of surgery as advised by the doctors

## The Operation

The operation is done usually under epidural or spinal anaesthesia. The anaesthetist will discuss the details in advance. The duration of surgery depends on the severity of the arthritis and various other factors. You will be kept comfortable during this period and sedated if you prefer.

## What happens after the surgery?

You will be given epidural analgesia post operatively by the anaesthetist to keep you comfortable and pain-free. You will be given antibiotics and injections to prevent blood clotting in your leg vessels in the immediate post op period.

Knee exercises will be initiated as early as possible. You will be made to walk with a walker or crutches within 2 to 3 days after surgery. You will also be taught exercises which are very important in the