



Total knee replacement

Total knee surgery removes the damaged and painful areas of the femur (thigh bone), patella (knee cap) and tibia (lower leg bone). These areas are then replaced with specially designed metal and "plastic" parts.

- STEP 1**
The damaged portions of the femur bone and cartilage are removed. The end of the femur bone is reshaped to allow the metal femoral implant to fit on it.
- STEP 2**
The metal implant is attached to the end of the femur using bone cement.
- STEP 3**
The damaged portions of the tibia bone and cartilage are removed. The tibia end is reshaped to receive the metal implant.
- STEP 4**
The metal implant for the tibia is secured to the end of the tibia bone using bone cement.
- STEP 5**
A "plastic" plate is attached to the tibial implant. The plate will cushion the body's weight and allow the femur to move over the tibia smoothly.
- STEP 6**
To make sure the patella, or knee cap, glides smoothly over the new artificial knee, its rear surface is prepared to receive a "plastic" component, which is cemented into place.