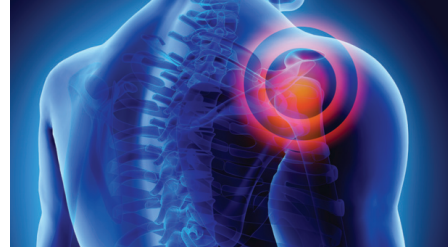


Shoulder Arthroplasty



Shoulder arthroplasty, or joint replacement surgery, is performed when there is advanced arthritis of the glenohumeral, or ball and socket, joint. It is performed when all other treatment options have failed to improve the symptoms of arthritis. There are a number of different types of shoulder arthroplasty, each of which has a different indication. Your surgeon will discuss with you the best option for treating your shoulder arthritis if the decision to perform an arthroplasty has been made.

The types of shoulder arthroplasty are:

Hemiarthroplasty (HA) – HA involves replacing only the humeral head, or ball, of the ball and socket glenohumeral joint. This can be done in a number of ways including with a prosthesis with a long stem or a prosthesis without a stem, termed a stemless implant. This can be done with or without bone cement.

Total Shoulder Arthroplasty (TSA) – TSA involves replacing both the humeral head and glenoid, or socket, of the glenohumeral joint. The humeral head can be replaced in any of the ways described with a hemiarthroplasty, while the glenoid, or socket, is generally replaced with a small prosthesis that is cemented (most common) or screwed into the native glenoid.

Reverse Total Shoulder Arthroplasty (RTSA) – RTSA is designed to help the deltoid move the shoulder when the rotator cuff is no longer functioning normally. This may occur with a large rotator cuff tear that has led to rotator cuff tear arthropathy, in an older patient with a severe fracture of the upper part of the humerus, or in certain cases of severe arthritis that is associated with loss of bone. The prosthesis places the ball, or glenosphere, on the socket side, and the socket, or cup, on the humeral head side. Reverse shoulder arthroplasties can be difficult to revise if they fail, and are generally recommended for older, less active patients except in special circumstances.

Resection Arthroplasty – Resection arthroplasty involves the excision or removal of the joint, to increase the space at the joint, and to stop the bones from rubbing against each other and causing pain. In the shoulder, this is most commonly done for acromioclavicular (AC) joint arthritis, also known as a distal clavicle excision. This operation, which can be done open or arthroscopically, involves the removal of a small portion of the end of the collarbone to increase the space at the AC joint.

Anaesthesia

In order for your surgeon to carry out a shoulder arthroplasty, you must have an anaesthetic performed at the time of surgery. The anaesthetic may involve you going to sleep, known as a general anaesthetic, or may involve you having your shoulder and arm frozen, known as a regional anaesthetic or block, or a combination of both. A regional anaesthetic or block involves temporarily freezing the nerves that sense pain and may provide up to 12 hours or longer of pain control following surgery. It may include either a single injection that can last for 12 to 24 hours, or the placement of a catheter that allows for the addition of more anaesthetic after your surgery is completed. Your surgeon and your anaesthetist will decide with you the best type of anaesthetic based on the type of surgery being performed, your medical history, and the experience and preference of your surgeon and anaesthetist.

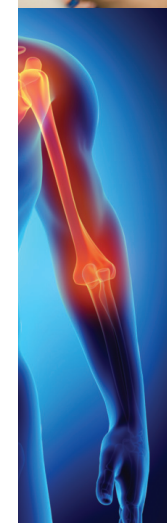
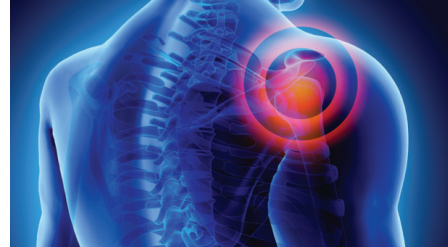
Recovery

Pain

Shoulder arthroplasty is very effective at reducing the pain associated with arthritis, but there will be pain associated with the surgery, which you may experience differently than the pain you had previously with the arthritis. Every patient experiences pain differently. The amount of pain that you may experience depends on the type of surgery performed and how you react to surgery. After surgery you will receive a prescription for pain medication that will be tailored to you based on the type of surgery performed, your medical history and any allergies you may have. You may also receive a regional anaesthetic or block, which is administered by the anaesthetist prior to or after your surgery. If a regional block is available, this will be discussed with you prior to surgery. Cooling the surgical site may also provide pain relief following surgery. Both ice packs and a cold therapy system may be used. If ice is being used it should never be applied directly to the skin and should be used on an intermittent basis (15 to 30 minutes of each hour).



Shoulder Arthroplasty



Stay in Hospital

Shoulder arthroplasty is most commonly done as a same day surgery procedure that generally is followed by an overnight stay in the hospital. You are admitted to hospital the day of your surgery, and discharged home the following day. In some cases, shoulder arthroplasty can be done as day surgery, where you are discharged home the same day as your surgery. Your surgeon and anaesthetist will decide what the best choice is for you depending on your own personal history and the type of surgery being performed.

Rehabilitation or Therapy

Rehabilitation following shoulder arthroplasty is an important part of ensuring a successful recovery. It generally requires 3 to 6 months or longer, and is most commonly done under the supervision of a therapist. In some cases your surgeon will teach you the exercises to perform and you will do these exercises on your own.

Surgical Complications

Although shoulder arthroplasty is generally safe surgery, any surgical procedure can have serious complications. These may include:

Anaesthetic Complications – Anaesthetic complications can be very serious. Your anaesthetist will review the risks of the anaesthetic with you.

Stroke – Most shoulder surgery is performed with you in an upright, sitting position. Because your head is above your heart in this position, during surgery this can result in decreased blood flow to your brain, which can lead to a stroke. This is extremely rare, but can occur.

Nerve Injury – Most nerve injuries are temporary, and improve with time. In rare cases, nerve injury can be permanent. The most commonly injured nerve is the axillary nerve which supplies the deltoid muscle.

Blood Loss – Although rare, blood loss during surgery requiring a blood transfusion may occur.

Infection – Infection is a very serious complication following shoulder arthroplasty. Antibiotics cannot penetrate the metal and plastic used to make the joint replacement. This means that an infection in an arthroplasty may require further surgery, including removal of the prosthesis, in order to cure the infection.

Stiffness – Stiffness can occur because of prolonged immobilization or due to secondary inflammation. In most patients, stiffness improves over time, even out to a year following surgery.

Instability/Dislocation – The shoulder joint has a great range of motion but can become unstable (when the humeral head comes out of the socket). To prevent a dislocation, follow your surgeon's advice for restrictions of activity that may cause a dislocation. In general, shoulder replacements are performed on patients that are looking for a lifestyle of low impact activity.

Pain – Although you and your surgeon hope that this operation helps with your pain, some patients do experience pain that may continue after surgery. Often if there is pain that persists, your surgeon may do further tests to determine the cause of the pain. Unfortunately, some patients do experience continued pain after shoulder surgery that does not completely disappear.

Your surgeon and anaesthetist will review the benefits and risks of the surgery and the anaesthetic with you, and will go over the specifics related to the surgery and anaesthetic that has been chosen together with you.

For more information: The Canadian Orthopaedic Foundation provides a free booklet, *Shoulder Surgery – Planning For Your Best Results*, which outlines general preparations, complications monitoring, a diary of progress and more. Visit www.movepainfree.org to download your free copy.

