

# Total Shoulder Replacement

## What is Arthritis?

Arthritis refers to a group of conditions that **damage** one or more joints.

Your surgeon has recommended a **total shoulder replacement** to manage your condition. However, the decision to proceed with surgery is entirely **yours**.

This document provides essential information on **the benefits, risks, and alternatives** to help you make an **informed choice**.

If you have **unanswered questions**, consult your **surgeon or healthcare team**. Once all concerns are addressed, and you decide to proceed, you will be asked to **sign an informed consent form**.

This step finalizes your decision, but **you can change your mind at any point**.

## How Does Arthritis Develop?

The most common type of arthritis is **osteoarthritis**, which results from **gradual wear and tear** of the joint. While it may develop due to a **previous injury or condition**, it often occurs **without a known cause**.

Other forms of arthritis, such as **rheumatoid arthritis**, involve **chronic inflammation** that can progressively damage the joint.

Over time, arthritis **erodes the cartilage** covering the joint surface, exposing and **damaging the underlying bone**. This leads to **pain, stiffness, and reduced mobility**, affecting daily activities.

## What Are the Benefits of Surgery?

- **Pain relief**
- **Improved shoulder mobility**
- **Enhanced ability to perform daily activities**

## Are There Alternatives to Surgery?

- **Pain management:** Simple painkillers like **paracetamol** and **anti-inflammatory medications** (e.g., ibuprofen) may help control symptoms.
- **Exercise:** Regular **moderate exercise** can help reduce stiffness and maintain joint function.
- **Steroid Injections:** A **steroid injection** into the shoulder joint may relieve pain and stiffness for **several months**, but repeated injections **can have side effects**.
  - Avoid steroid injections within **two weeks of a vaccination** as they may **reduce antibody response**.
- **Lifestyle modifications:** Adjusting daily activities to reduce **strain on the shoulder** can also help manage symptoms.

However, if arthritis **progresses**, these measures become **less effective**, and a **shoulder replacement** may be the best option.

## What Happens If I Do Not Have Surgery?

- Arthritis in the shoulder **usually worsens over time**, though the progression can vary.
- While arthritis itself **is not life-threatening**, it can be **debilitating** and significantly affect quality of life.
- Symptoms may fluctuate, often worsening in **cold weather** or with increased **strain on the joint**.

Your surgeon will discuss **your specific case** and whether surgery is the most suitable **next step** for you.



A total shoulder replacement

## What Does the Operation Involve?

The healthcare team will perform a series of **checks** to ensure you are undergoing the **correct procedure on the correct side**. You can assist by confirming your **name and procedure** with your **surgeon and healthcare team**.

Different **anaesthetic options** are available, and your **anaesthetist** will discuss the best choice for you. You may also receive a **local anaesthetic injection** to help manage pain after surgery. To minimize the risk of **infection**, you may be given **antibiotics** during the procedure.

The surgery typically lasts **1 to 2 hours**.

Your surgeon will make an incision on the **front of your shoulder**, remove the **damaged ball (humeral head)**, and assess the **socket on your shoulder blade**. The **ball** is replaced with a **metal implant**, and in some cases, the **socket is also replaced** with a **plastic component**.

There are various types of **shoulder replacements**, and your **surgeon will discuss the most suitable option** for you. The implant is secured to the bone using either a **special coating** or **acrylic cement**.

Your surgeon will **close the incision** with **stitches or clips**.

## What Should I Do About My Medication?

Inform your healthcare team about **all medications** you take and follow their advice. This includes:

- **Blood-thinning medications**
- **Herbal and complementary remedies**
- **Dietary supplements**
- **Over-the-counter medications**

## How Can I Prepare for the Operation?

- **Stop smoking** to lower the risk of **complications** and improve **long-term recovery**.
- **Maintain a healthy weight**, as **excess weight increases the risk of complications**.
- **Engage in regular exercise** to strengthen your **shoulder and overall health**. Consult your **healthcare team or GP** before starting an exercise routine.

To **minimize the risk of infection**, take the following precautions:

- **Avoid shaving or waxing** the surgical area in the **week before surgery**.
- **Take a bath or shower** the day before or on the day of the operation.
- **Keep warm** before and after surgery, and inform the healthcare team if you feel **cold**.
- **If diabetic**, keep **blood sugar levels controlled** before and after surgery.

Speak to your **healthcare team** about any **recommended vaccinations** to reduce the risk of **serious infections** during recovery. When visiting the hospital, practice **good hygiene** and wear a **face covering** if advised.

## What Complications Can Occur?

The **healthcare team** will take steps to **reduce the risk of complications**.

Risk percentages are based on **studies of previous patients**. Your **doctor can assess whether your individual risk** is higher or lower. Factors that **increase risk** include:

- **Older age**
- **Obesity**
- **Smoking**
- **Chronic conditions** (e.g., diabetes, heart disease, lung disease)

While rare, some **complications can be serious or even life-threatening**.

If you have any **concerns or uncertainties**, ask your **doctor** for clarification.

Your **anaesthetist** will also discuss the **risks associated with anaesthesia**.

## General Complications of Any Operation

- **Bleeding** during or after surgery. The need for a **blood transfusion is rare**.

- **Infection at the surgical site.** You can typically shower **after two days**, but confirm with your healthcare team. Keep your **wound dry and covered**. Inform the team if you develop a **high temperature, pus, or increased redness, soreness, or pain** at the site. Most infections **resolve with antibiotics**, but some may require **special dressings or additional surgery**. **Do not take antibiotics unless prescribed.**
- **Allergic reactions** to surgical equipment, materials, or medication. The healthcare team is trained to **detect and manage any allergic reactions**. Inform your doctor about **any known allergies or past reactions** to medication, tests, or dressings.
- **Venous Thromboembolism (VTE)** – A **blood clot** in your **leg (deep vein thrombosis - DVT)** or **lung (pulmonary embolism - PE)**. DVT may cause **pain, swelling, or redness** in the leg, or **prominent surface veins**. The healthcare team will **assess your risk** and help prevent clots by **encouraging movement, providing medication, or prescribing compression stockings**. A **pulmonary embolism** occurs when a **clot travels to the lungs**, potentially causing **breathlessness, chest or upper back pain, or coughing up blood**. Seek **emergency medical help** if you experience these symptoms.
- **Chest infection.** You may need **antibiotics and physiotherapy**. The risk decreases if you **quit smoking** and are free from **COVID-19 symptoms for at least 7 weeks before surgery**.
- **Heart attack**, where **part of the heart muscle dies**, which can be fatal.
- **Stroke**, a loss of **brain function** due to reduced blood supply, which may also be fatal.

## Specific Complications of Shoulder Replacement Surgery

- **Nerve damage** around the shoulder, leading to **weakness, numbness, or pain** in the shoulder or arm (**risk: less than 1 in 100**). This often **improves** but may be **permanent**.
- **Infection**, which can cause the **shoulder replacement to loosen or fail (risk: less than 1 in 100)**. Additional surgery may be required to manage the infection.
- **Severe pain, stiffness, and loss of arm and hand function (complex regional pain syndrome - CRPS)**. The exact cause is unknown. **Physiotherapy and pain management** may be needed, and recovery can take **months or years**. In some cases, pain and stiffness may be **permanent**.
- **Loosening of the implant over time** without infection, requiring **revision surgery (risk: 1 in 10 over 10 years)**.
- **Rotator cuff tears** – The **rotator cuff** consists of four **muscles and tendons** attaching the arm to the shoulder blade. **Surgical repair** may be necessary if torn.
- **Dislocation of the shoulder replacement (risk: less than 2 in 100 in the first 5 years)**. **Repeat dislocations** may require **additional surgery**.
- **Stiff shoulder** – While movement is usually **better than before surgery**, it may **not fully return to normal**. The shoulder may never feel like a **completely natural joint**.
- **Revision surgery** – Shoulder replacements **wear out over time**, depending on activity levels. **8 to 9 out of 10 shoulder replacements last at least 15 years** before requiring revision.

## Consequences of Shoulder Replacement Surgery

- **Pain** – The healthcare team will provide **pain relief medication**, which should be **taken as prescribed** to **facilitate movement and recovery**.
- **Scarring** – The incision is made at the **front of the shoulder**. Although **scarring is usually neat**, it may still be **visible**.

## Recovery Timeline

### *In Hospital*

After surgery, you will be transferred to the **recovery area** before moving to the **ward**. An **X-ray** will typically be performed to ensure the **correct positioning** of the shoulder replacement.

A **physiotherapist** will assist you in **starting shoulder movements**, usually **within 1 to 2 days**, and will guide you on **how to care for your new shoulder**.

Keep your **wound dry for the first week**, using a **waterproof dressing** while bathing or showering.

The **healthcare team** will inform you if **stitches or clips** need to be removed or **dressings** need to be changed.

You should be able to **return home within 2 to 3 days**, but in some cases, your doctor may recommend a **longer hospital stay**.

If you experience **any concerns** during recovery, **in hospital or at home**, contact the **healthcare team** for guidance.

## Returning to Normal Activities

You will need to **wear a sling for up to 6 weeks** to minimize strain on your **shoulder joint**.

Your **healthcare team** will advise when it is **safe to resume normal activities**.

To prevent complications, follow the recommended **posture and movement precautions** for your **new shoulder**.

Regular **exercise** is essential for regaining mobility. **Consult the healthcare team or your GP** before starting any **exercise regimen**.

Do not **drive or ride a bike** until you can safely **control your vehicle**, including in an **emergency**. Always **check with your healthcare provider and insurance policy** before resuming driving.

## Long-Term Outlook

Most people experience **significant pain relief, improved mobility, and a good recovery** following surgery.

Adhering to **physiotherapy exercises** is crucial for maintaining **shoulder strength and function**.

An **artificial shoulder** will not feel exactly like a **natural shoulder**, so **long-term care** is important.

Over time, **shoulder replacements can wear out**, especially with **high activity levels**.

Approximately **8 to 9 in 10 shoulder replacements last at least 15 years**, but a **revision surgery** may eventually be required.

## Summary

Severe **shoulder arthritis** can lead to **pain, stiffness, and loss of function**. A **shoulder replacement** can significantly **reduce pain and improve movement**.

Although **surgery is generally safe and effective**, complications are possible. Understanding the **risks and benefits** allows you to make an **informed decision**.

This document provides **essential information** but does not replace **personalized medical advice**.

For **more details** on your specific risks and alternative treatments, consult your **surgeon or doctor**.