

Revision Total Elbow Replacement

What is a Revision Total Elbow Replacement?

A revision total elbow replacement is a procedure in which your existing elbow replacement is removed and replaced with a new one.

Your surgeon has recommended this revision surgery, but the decision to proceed is entirely up to you. This document provides essential information about the potential benefits and risks, helping you make an informed decision.

If you have any questions that remain unanswered by this document, it is important to consult with your surgeon or healthcare team. Once all your questions have been addressed and you are comfortable with the information provided, you will be asked to sign the informed consent form, which is the final step in the decision-making process.

Please remember, you have the right to change your mind at any point before the procedure.



What Causes an Elbow Replacement to Fail?

Several factors can contribute to the failure of an elbow replacement:

- **Wear and Tear of the Artificial Joint** – Over time, the artificial joint may degrade, releasing small plastic particles that cause the joint to loosen from the bone.
- **Infection** – An infection in the elbow replacement can lead to loosening of the joint from the bone.
- **Dislocation** – If the elbow replacement dislocates, a procedure may be required to prevent it from occurring again.
- **Fracture** – A fall or heavy impact on the elbow may cause a fracture around the replacement.

These issues can impair your ability to use your arm effectively and may lead to pain. Your surgeon will discuss why a revision of your elbow replacement is necessary if these problems arise.

What Are the Benefits of Surgery?

Surgical revision should help restore arm movement and enable you to return to more of your usual activities with greater comfort.

Are There Any Alternatives to Surgery?

Surgery is the primary treatment for a failing elbow replacement. If the replacement begins to loosen, bone damage can worsen over time. It is generally recommended to have surgery soon after the elbow starts loosening to reduce the risk of further complications.

If infection is the cause of failure, long-term antibiotics may help, but the infection will not resolve unless the replacement is removed. In some cases of dislocation, a brace may be used, though it can be bulky and uncomfortable. If a fracture occurs around the replacement, your surgeon may recommend surgery. Sometimes, the use of traction (a weight system to align the bones) may be suggested, requiring a hospital stay of at least six weeks. Bone healing may take up to six months.

What Happens If I Decide Not to Have Surgery?

If your elbow replacement is loosening due to wear or infection, the pain is likely to increase over time. The bone surrounding the loose joint can become thin, and in severe cases, it may fracture. In such instances, a major surgery would be required to repair the fracture and replace the elbow.

Untreated infections may also spread to other parts of the body, including other artificial joints or vital organs. Your surgeon will provide you with information about the potential consequences of avoiding surgery.

What Does the Surgery Involve?

Before the surgery, the healthcare team will confirm that the correct procedure is being performed on the right side. You can help by confirming your identity and the procedure with your surgeon and the team.

There are various anaesthesia options available, which your anaesthetist will discuss with you. Antibiotics are often administered during surgery to minimize the risk of infection.

The surgeon will make an incision on the back of the elbow. If your elbow replacement is stable and not worn out, your surgeon may focus on repairing the ligaments around the elbow. If the joint surfaces are

worn or the replacement is loose, the surgeon will remove the old replacement and any surrounding cement, which can be time-consuming and challenging.

A new elbow replacement will be inserted and secured with acrylic cement. The incision will be closed with stitches or clips, and a splint or cast may be applied for initial comfort.

If the surgery involves repairing bone or addressing an infection, additional procedures may be required:

- **Bone Repair** – If your bone is fragile or broken, the surgeon may use bone grafts, mesh, or a metal cage to reinforce the bone.
- **Infection Treatment** – If infection is present, two surgeries may be required. The first involves removing the old replacement, cement, and infected material, followed by a course of antibiotics. The second surgery is for implanting a new elbow replacement once the infection has been cleared.

What Should I Do About My Medication?

Make sure your healthcare team is aware of all medications you are taking, including blood thinners, herbal remedies, and over-the-counter supplements. Follow their advice carefully.

How Can I Help Make the Operation a Success?

- **Stop Smoking** – Quitting smoking before surgery can reduce the risk of complications and improve long-term health.
- **Maintain a Healthy Weight** – Being overweight can increase the risk of complications. Regular exercise is encouraged, but consult your healthcare team before starting any program.
- **Prevent Infection** –
 - Avoid shaving or waxing the surgical site the week before surgery.
 - Take a bath or shower on the day before or the morning of the surgery.
 - Keep warm and notify the healthcare team if you feel cold.
 - If you are diabetic, control your blood sugar levels around the time of surgery.

Consult the healthcare team about vaccinations to reduce the risk of illness during recovery. Wash your hands regularly and wear a face covering if instructed.

What Complications Can Happen?

While the healthcare team will do everything to reduce risks, complications can occur. Your surgeon may inform you if your risks are higher than average, especially if you are older, overweight, or have existing health conditions, such as diabetes or heart disease.

Some complications can be severe and even life-threatening. Speak to your doctor if you have any concerns or questions.

General Surgical Complications:

- **Bleeding** – You may require a blood transfusion.
- **Wound Infection** – Infection may require additional treatment, including antibiotics, special dressings, or, in some cases, further surgery.
- **Allergic Reactions** – The healthcare team is trained to manage allergic reactions to medications, equipment, or materials.
- **Venous Thromboembolism (VTE)** – Blood clots may form in the legs (DVT) or travel to the lungs (pulmonary embolism). Your healthcare team will monitor your risk and provide necessary preventive measures.
- **Chest Infection** – Pneumonia or other infections may require antibiotics and physiotherapy.
- **Heart Attack** – A heart attack, though rare, may occur and can be fatal.

- **Stroke** – A stroke, caused by disruption of blood flow to the brain, is a risk during surgery.

Specific Complications for Elbow Replacement Surgery:

- **Nerve Damage** – Nerves around the elbow may be damaged, leading to weakness, numbness, or pain in the hand.
- **Infection** – Infection in the elbow replacement can cause loosening and failure (less than 10% risk).
- **Loosening Without Infection** – The elbow replacement may loosen over time, requiring further surgery (1 in 10 risk within 8 years).
- **Dislocation** – The elbow replacement may dislocate (less than 2% risk in the first year), and if recurrent, may require additional surgery.
- **Fractures** – Bone fractures may occur during or after surgery, particularly if the bones are weak.
- **Complex Regional Pain Syndrome (CRPS)** – Severe pain, stiffness, and loss of hand function can occur, sometimes lasting months or even years.
- **Limited Elbow Movement** – The elbow may not fully bend, which could require further treatment.
- **Revision Failure** – The revision elbow replacement may eventually fail due to wear or recurrence of the original problem (1 in 10 risk within 10 years).

Consequences of the Procedure

- **Pain** – Pain management is essential, and your healthcare team will ensure you have adequate pain control.
- **Scarring** – Scarring is common but usually minimal after revision elbow replacement surgery.

Recovery Timeline

In-Hospital:

- You will be monitored in the recovery area before being transferred to the ward.
- Physiotherapy will start 6 to 8 days post-surgery, or later if the surgery was more complex.
- You can typically go home after 2 to 5 days, depending on your recovery.

Post-Operation Care:

- Keep the wound dry for the first 4 to 5 days.
- Follow-up appointments will involve removing stitches or clips and checking the wound for signs of infection.

Returning to Normal Activities:

- Avoid driving or biking until you have regained full control of your arm.
- Gradual physical activity and exercise will help with recovery. Always check with your healthcare team before resuming any activities.

Long-Term Outlook

Avoid activities that could lead to further injury, such as contact sports or heavy lifting. Most people recover well, but the revision may wear out over time, requiring further surgery. Following the physiotherapist's advice will help strengthen your arm and improve recovery.

Summary

If your original elbow replacement fails, a revision surgery can usually be performed. A successful revision can allow you to return to many normal activities. While elbow replacement surgery is generally safe and effective, complications may arise. It's important to understand these risks so you can make an informed decision and promptly address any issues that may emerge.

Keep this informational document for reference, especially when discussing your options with your healthcare team. For personalized advice and specific risk factors, consult your surgeon. They can also provide information on alternative treatment options that may be suitable for you.

Note: This document is for informational purposes only and does not replace professional medical advice.

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