

Supracondylar Elbow Fractures: Follow-up Care

Supracondylar humerus fractures are the most common type of elbow fracture in children.

What is a Supracondylar Fracture?

A supracondylar humerus (SCH) fracture is the most common type of elbow fracture in children. This fracture commonly occurs after a fall on an outstretched arm. It occurs at the bottom part of the humerus bone (Figures 1a and 1b). This type of elbow fracture is most common in children between the ages of two and eight years. If the fracture is non-displaced (no separation between fracture fragments) the fracture can usually be treated in a cast (no reduction) for three to four weeks.

If there is displacement, however, the child will generally require reduction and pinning of the fracture. The reduction is done in the operating room under anesthesia. The reduction is commonly done closed (no incision); however, it is occasionally necessary to perform an open reduction (incision) of the SCH fracture. The fracture fragments are usually stabilized by percutaneous pins that are left outside of the skin but under the cast. We recommend elevation of the arm for 24-48 hours after the procedure.

The involved upper extremity should be elevated for the first 2-3 days to minimize swelling. Please contact our office at (979) 776-0169 if your child develops increasing pain or fever >101 F, or if you have any questions or concerns. A follow up appointment is generally scheduled one week after surgery to assess the cast and obtain follow-up x-rays.

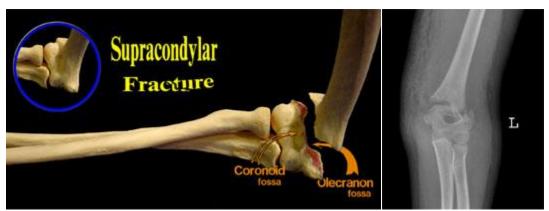


Figure 1a & 1b: SCH fractures

How are the pins removed?

The pins that are holding the fracture fragments together are generally removed after 3-4 weeks. These pins are easily removed in the office after the cast is removed and x-rays confirm healing of the fracture. Pin removal is not a painful procedure, although it is not uncommon for toddlers and young children to have anticipatory fear. If may be helpful to bring a favorite book or toy to help



distract your child as the cast and pins are removed. After the pins are removed, the pin sites are generally covered with a simple band-aid.

What to expect after pin removal? After the pins and cast are removed, it is quite common for children to have elbow stiffness. The stiffness is from the immobility related to casting and should gradually resolve as the child starts using the arm normally again. It can sometimes be helpful to have the child move the arm in water (such as in the bathtub). Some children will have full range of motion in 1-2 days, but it is also normal for the stiffness to resolve gradually over 2-4 weeks. In general, a follow-up appointment is scheduled approximately one month after the pins and cast are removed to check alignment and also to assess range of motion. If there is persistent stiffness, physical therapy can be done to improve motion. However, it is relatively uncommon for toddlers and young children to need physical therapy after elbow fractures.

Are there any restrictions after pin and cast removal?

After the pins and cast are removed, children can start using the arm and moving the elbow normally. It is generally advised that toddlers and children avoid activities that involve a high likelihood of falling for an additional 3-4 weeks (monkeybars, playgrounds, etc). Contact sports and physical education should also be restricted for approximately one month after cast/pin removal. A final follow-up visit is generally scheduled 3-4 weeks after pin removal. If there is normal range of motion and no pain, the child is allowed to return to all activities and sports without restrictions.



If you have any questions or concerns, please feel free to contact us at (979) 696-3344