

Andrew Green, MD
Associate Professor of Orthopaedic Surgery
Chief of Shoulder and Elbow Surgery
Warren Alpert Medical School, Brown University

Humeral head replacement for proximal humerus fracture

Please follow the protocol along with the instructions listed on the patient's referral

This protocol was developed for patients who have undergone an anatomic humeral head replacement for treatment of a proximal humerus fracture. The goal of this protocol is to advance range of motion and strength as directed while protecting the repair and healing of the greater and lesser tuberosities. Because the rotator cuff attaches to the tuberosities, tuberosity healing is critically important for the outcome of humeral head replacement for fracture.

Please contact the physical therapy department at (401) 443-5000 if there are any questions. You may also refer to www.universityorthopedics.com and go to Dr. Green's section to view video of the specific shoulder exercises:

<http://universityorthopedics.com/physicians/green/prepost.html>

The dressing is removed three days after surgery. Leave the steri-strips on the incisions until one week after surgery. After the dressing is removed a patient may shower quickly and gently pat the shoulder dry with a clean towel. When in the shower a sling is worn to protect your shoulder from injury. If a sling is not worn in the shower the arm is left to hang at the patient's side. If there is any drainage or concern about the healing of the incisions do not shower and just gently clean the surface of the shoulder with rubbing alcohol.

Week 0-4

Pendulum circumduction (no weights)
Supine passive self-assisted external rotation.
Scapular muscle contraction- serratus anterior, rhomboid, trapezius
Neck, elbow, forearm, wrist and hand ROM

ROM exercises are performed 5 times each day; 5 repetitions hold each stretch for 10 seconds.

Week 5-6

Add supine self-assisted forward elevation, supine horizontal adduction, and standing internal rotation behind the back.

Week 7

Begin isometric deltoid, external rotation, internal rotation.
Begin active elevation with supine active elevation, and progress to seated pulley assisted elevation, and then upright active elevation.

Week 12

Progress to resisted exercises with Theraband and light weights as appropriate based on individual patient goals and expectations.

Andrew Green, MD
Associate Professor of Orthopaedic Surgery
Chief of Shoulder and Elbow Surgery
Warren Alpert Medical School, Brown University

End result:

It can take up to 12 months (1 year) to achieve the final result of a humeral head replacement for proximal humerus fracture. Most patients are very comfortable and functional after 4 to 6 months.

Notes:

No UBE exercises

No abduction stretching or strengthening. Elevation motion and strengthening is to be performed in the scapular plane.

If stiffness develops, strengthening is to be delayed

Heat can be used after 2 weeks post-op to warm up prior to stretching

Ice is used for pain control and after stretching