

REVERSE GEOMETRY ARTHROPLASTY PROTOCOL

Aim of surgery: To replace the glenoid and humeral head to alleviate symptoms of arthritis and rotator cuff arthropathy and allow the deltoid to compensate for rotator cuff insufficiency.

Expected outcome: Patient reports a relatively pain-free shoulder that facilitates light upper limb activity between waist height and shoulder level. Some patients are able to achieve an excellent outcome involving the return of functional use above shoulder height. It may take up to 12-24 months to achieve optimal outcome.

Possible complications: Prosthesis failure/loosening long term, infection, humeral shaft or glenoid fracture, dislocation, neurovascular compromise.

Stability/congruence of reverse geometry arthroplasty is compromised with internal rotation/adduction/extension. There is a risk of dislocation in this position. As such, tucking in a shirt or performing bathroom / personal hygiene activities with the operative arm is an especially dangerous activity particularly in the immediate peri-operative phase.

Don't sacrifice quality of movement and function for ROM

Phase 1 Early rehab (1-6/52)

- Hand, wrist, elbow exercises
- Scapula setting and postural control exercises
- Restore PROM – scaption to 90, abduction to 40, ER in scapula plane to 30
- ½ lever pulley exercises
- Isometric sub maximal deltoid exercises
- Sub maximal (less than 30%) isometric peri scapula exercises at 2/52
- Active assisted ROM within safe zone at 4/52. Supine stick exercises to 90
- Static hold and functional base exercise at 2-3/52
- No IR or hand behind back for 6/52
- FOCUS ON SCAPULA DISSOCIATION



Phase 2 rehab. Movement and control phase 6-12/52

- Progress AROM and joint control through previously active assisted ranges in a logical manner.
- No elevation restriction.
- Address abnormal movement patterns, normally type III dyskinesia. But do expect increased scapula upward rotation in rTSA.
- Neuromuscular control ++ - patterns, think chain, CKC
- Little and often, avoid fatigue, push control on lowering
- Anterior deltoid programme if sufficient range

Phase 3 Functional rehab (4 months+)

- Progress deltoid rehab
- Resisted shoulder ER and belly press exercises
- Functional exercise ++ in standing
- Limit load to 4.5-6.8 kg maximum (blacknall 2011)

Functional milestones

Driving; the law states that the patient should be in complete control of the car, it is their responsibility to ensure this and to inform their insurance company about their surgery

- Dressings removed 7-10 days post op
- Sling for 3 weeks (unless otherwise stated in op notes)
- Light work (sedentary) 6-8/52
- Driving approx 8/52
- Swimming 12/52
- Golf 4/12

