**Introduction**

The perioperative care of patients having total knee joint replacement (TKJR) is evolving. Current expectations include early postoperative mobilization, even walking on the day of surgery. However, patient’s having TKJR often have reduced functional status related to significant medical co-morbidities, morbid obesity, age and chronic pain. This program is written in response to these expectations and aims to build on our existing strengths in regional anaesthesia and pain medicine improving early postoperative mobilization and analgesia. The program is different to our current care. It standardises our practices for patients having TKJR and this should help identify techniques that are effective. The program emphasizes the use of dilute local anaesthetic wherever there is a risk of motor block. An integral component of the program is that clinical outcomes including mobilization metrics will be recorded and reviewed regularly for their effectiveness and ongoing quality-improvement.

**PATIENT EDUCATION**

This will be achieved by earlier contact with patients and their relatives by:

1. Preoperative phone calls,
2. Clinic visits or,
3. Written information.

**PREOPERATIVE ANALGESIA**

Age 70 years or over: Oxycontin 10 mg, Gabapentin 300 mg.  
Age < 70: Oxycontin 20 mg, Gabapentin 600 mg.

**PERIPHERAL NERVE BLOCKADE**

1. Continuous femoral nerve block (CFNB) - via needle 10–20 ml ropivacaine 0.2%  
2. Sciatic nerve block or selective tibial nerve block 10–20 mls ropivacaine 0.2%

**INTRAOPERATIVE ANAESTHESIA**

Spinal anaesthesia – consider restricting dosage if day of surgery ambulation is a stated goal. Antiemetics - if there are no contraindications dexamethasone 4mg IV is recommended.

**IN PACU**

Commence CFNB (ropivacaine 0.2%) in at PACU 6ml/hr.  
If VAS between, 3 and 7: repeat preoperative oral analgesia.  
If VAS greater than or equal to 7: IV opioid PCA.
POSTOPERATIVE ANALGESIA

Paracetamol 1 gm q.i.d
Oxycodone Controlled Release 10 – 20 mg b.d. (5 days only)
Oxycodone 5-10 mg q2h p.r.n.
Celecoxib 200 mg b.d. or Meloxicam 15 mg daily (in case of sulphur allergy)
Contraindications for selective cyclooxygenase inhibitors are renal impairment, coronary artery disease (e.g. coronary stent).
Adjust doses according age, weight and co-morbidities.
If VAS greater than or equal to 7: IV opioid PCA
Gabapentinoid at discretion of acute pain service

EARLY MOBILIZATION AND OTHER POSTOPERATIVE CARE

Afternoon, day of surgery
If feasible, mobilise patient – before mobilization, assess blood loss, cardiovascular stability and need for antiemetics.
Extension splint if required
Morning, postoperative day one
Cease IV fluids
Review motor function, if motor block evident then pause CFNB 2 hours before mobilization
Extension splint if required
Review multimodal analgesia
Recommence CFNB post-ambulation
Morning postoperative day 2
Review multimodal analgesia
Cease CFNB at 0500 hrs
Evening postoperative day 2
Review analgesic requirements plan discharge medications

DATA COLLECTION

Mobilisation outcomes in early postoperative period, readiness for discharge. Reasons for failed mobilization targets. Data elements and who will collect to be discussed.