



PROCEDURE CHECKLIST

Femoral nerve block

Ultrasound-guided injection of local anaesthetic around the femoral nerve to provide analgesia for femoral shaft fractures, hip fractures and anterior thigh injury.



EM Orbit

Patient reference

Date

Time

Completed by

Equipment ready

- ☐ Ultrasound machine with high-frequency linear probe, sterile probe cover and gel
- ☐ Skin antiseptic, sterile gloves and drape
- ☐ Short-bevel regional block needle (e.g. 50–100 mm) with extension tubing
- ☐ Long-acting local anaesthetic (e.g. levobupivacaine or bupivacaine) drawn up and labelled; lidocaine 1% for skin
- ☐ Monitoring: ECG, non-invasive blood pressure, pulse oximetry
- ☐ IV access
- ☐ Resuscitation equipment and 20% lipid emulsion immediately available

Before · Assessment and consent

- ☐ Confirm the indication and give interim systemic analgesia.
- ☐ Examine and document distal neurovascular status and femoral nerve function (quadriceps power, anterior thigh sensation) before the block.
- ☐ Consider compartment syndrome risk and agree with the orthopaedic team if in doubt.
- ☐ Check allergies, weight, coagulation and anticoagulant history.
- ☐ Calculate the maximum safe dose of local anaesthetic for the patient's weight.
- ☐ Explain the block, benefits and risks (failure, bleeding, infection, nerve injury, local anaesthetic toxicity, falls from leg weakness) and obtain consent.

Before · Preparation

- ☐ Site an IV cannula and attach monitoring.
- ☐ **Confirm 20% lipid emulsion and resuscitation equipment are available before injecting.**
- ☐ **Perform 'Stop Before You Block': confirm the correct side with the patient and the marked limb immediately before needle insertion.**
Wrong-side block is a never event.
- ☐ Position the patient supine with the leg straight and slightly abducted if tolerated.

During · Ultrasound scan

- ☐ Place the linear probe transversely in the inguinal crease, just below the inguinal ligament.
- ☐ Identify the femoral artery (pulsatile, round, anechoic) and the femoral vein medial to it (compressible).

- ☐ Identify the femoral nerve lateral to the artery: a hyperechoic, triangular or oval structure lying deep to the fascia iliaca and on the iliopsoas muscle.
- ☐ Identify the fascia iliaca and fascia lata overlying the nerve.

During · Needle insertion

- ☐ Clean the skin with antiseptic, drape and cover the probe.
- ☐ Infiltrate the skin at the lateral end of the probe with lidocaine 1%.
- ☐ Insert the needle in-plane from lateral to medial, keeping the whole needle shaft and tip visible.
- ☐ **If the needle tip cannot be seen, stop advancing and realign the probe or the needle.**

During · Injection

- ☐ **Aspirate before every injection to exclude intravascular placement.**
- ☐ Inject a small test dose and watch for spread around the nerve deep to the fascia iliaca.
- ☐ **Stop injecting if the patient reports severe pain or paraesthesia, if there is high resistance, or if the nerve swells (intraneural injection); reposition.**
- ☐ Inject the remaining local anaesthetic in small increments with aspiration between each, watching the spread.
- ☐ Talk to the patient throughout and watch for early signs of local anaesthetic toxicity.
- ☐ **If local anaesthetic toxicity is suspected, stop injecting, call for help, manage the airway, and give 20% lipid emulsion 1.5 mL/kg IV bolus followed by infusion per the national LAST guideline.**
- ☐ Withdraw the needle and apply a dressing.

After · Monitoring and documentation

- ☐ Continue monitoring for at least 30 minutes after the injection.
- ☐ Assess and record the effect on pain scores and the sensory block.
- ☐ **Warn the patient and the nurse that the leg will be weak and numb, and that the patient must not stand or walk unaided.**
Falls risk.
- ☐ Protect the numb limb from pressure injury.
- ☐ Document indication, consent, side check, ultrasound findings, needle, drug, concentration, volume and total dose, aspiration, complications and effect.
- ☐ Prescribe regular and breakthrough analgesia for when the block wears off.



A drafted procedure checklist, awaiting senior review. Perform procedures only within your training, competence and local policy. It does not replace your clinical judgement.

EM Orbit · Emergency medicine, in one orbit · proc-femoral-block · red rows are the steps that must not be missed