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#### PROBE PLACEMENT

Transducer: Linear/Curved

Depth: 4-5 cm

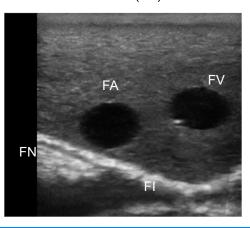
Increase gain and turn off tissue harmonics for better image.



Position the transducer, with gel, central and parallel to the inguinal crease. Identify the femoral artery and vein. Slowly slide the probe medial/laterally until the fascia iliaca and the femoral nerve are observed.

# **ANATOMY**

- Femoral Artery (FA)
- Femoral Vein (FV)
- Fascia Iliaca (FI)
- Femoral Nerve (FN)



The femoral nerve can be observed in close proximity to the artery, just inferior to the fascia iliaca

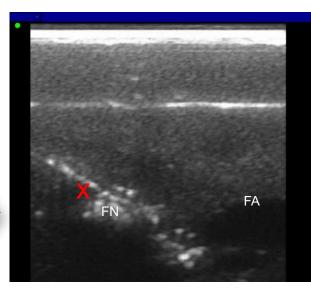
#### **NEEDLE INSERTION**

Use sharp bevel 25-22g, 5-10 cm length needle.

Insert the needle in-plane from lateral to medial







Do not use the needle to find the beam, Use the beam to find the needle.

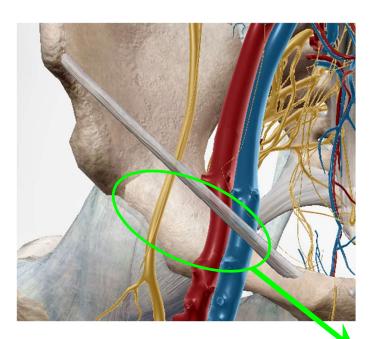
Place the tip of the needle adjacent to the femoral artery and immediately inferior to the fascia iliaca.

Advance the needle slowly. Slight caudad/cephald probe adjustments may be necessary to keep the beam on top of the needle.

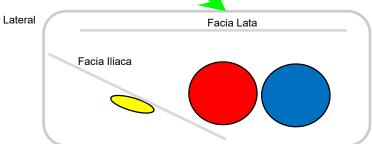


### ANATOMICAL DETAIL

The femoral nerve is the largest branch of the lumbar plexus. It is formed by the dorsal divisions of the anterior rami of the L2, L3, and L4 spinal nerves. It emerges from the lateral border of the psoas muscle, approximately at the junction of the middle and lower thirds of that muscle. Along with its course to the thigh, it remains deep to the fascia iliaca. It enters the thigh posterior to the inguinal ligament, where it is positioned immediately lateral and slightly posterior to the femoral artery. At this level, it is situated deep to both fascia lata and fascia iliaca.







## **CARE AND MAINTENANCE**

Clean the simulator with an alcohol swab or wash with soap and warm water before first use and prior to storage.

Allow to dry naturally or dab dry with a lint-free cloth.

Store at room temperature.

Never place objects on top of the simulator while in storage.

Never place printed material on the simulator as permanent ink transfer may occur.

Always use the smallest gauge needle possible as this will help with simulator life and recovery.

Never use a Tuohy needle.

An increase in gain is typically required for the best image.

