

Suprapubic aspiration (pediatrics)

Indications

- taking a urine sample for cultivation in children under two years of age.

Procedure

The volume of the urinary bladder is verified by an ultrasound, or by percussion in case of emergency. The child lies on its back in the "frog position", i.e. lower limbs are abducted and flexed in the knees. The nurse ensures the correct position of the child, the puncture site is at the **midline, 1-2 cm above the symphysis, perpendicular to the abdominal wall** (sometimes a slight caudal tilt towards the rectum is recommended).

The puncture site should be widely disinfected, we use a 22G needle = black needle, the depth of injection should be a maximum of 2 cm. The needle can be used alone, or attached to a connecting tube or syringe.

Complications

- puncture must not be performed when the abdomen is excessively distended due to the risk of intestine damage;
- transient hematuria.

Compared to catheterization, suprapubic puncture brings the following disadvantages: the necessity/suitability of a bed-side ultrasound device, and the success of the procedure strongly relies on a maximally full bladder, i.e. if the child has urinated not long before, the puncture cannot be performed. An only indication when suprapubic aspiration is strongly preferred over catheterization is an extremely tight phimosis, which would make it impossible to insert a urinary catheter.

Links

Related articles

- Bladder Catheterization (Pediatrics)
- Insertion of a permanent urinary catheter

Source

- HAVRÁNEK, Jiří: *Suprapubická punkce*.