

[SP-304] Inadvertent intraabdominal caudal epidural placement

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A 3.1 kg 3 day old male was scheduled for a diagnostic laparotomy. The plan for GETA, thoracic epidural via caudal approach was discussed with the parents and consent obtained. The patient was induced, intubated and a stimulating epidural catheter was placed on second attempt by a junior faculty with help from a senior faculty. Bolus was deferred until confirmation of position with fluoroscopy. This showed the catheter in the abdominal cavity. The epidural was removed and the patient showed no complications. Successful thoracic epidural placement via caudal approach has been described in the pediatric population. In one report this technique was successful in 19/20 children(1). A lower success rate was reported when attempting thoracic epidural placement from the lumbar region in children(2. Other reports found that the placement of caudal and epidural catheters in children and adults had a fairly consistent failure rate of 20% to 30% in children and adults when radiographic imaging studies were used for placement confirmation. (3,4). Methods to verify placement include epidurograms, electrical stimulation catheters and ultrasound (5). In a study that confirmed epidural placement with epidurograms which included caudal, lumbar and thoracic catheters, 1.6% were found to be misplaced with 3 cases of dye in the abdominal cavity (0.4%). (6)

This case illustrates the importance of early placement confirmation of indirectly placed catheters.

References

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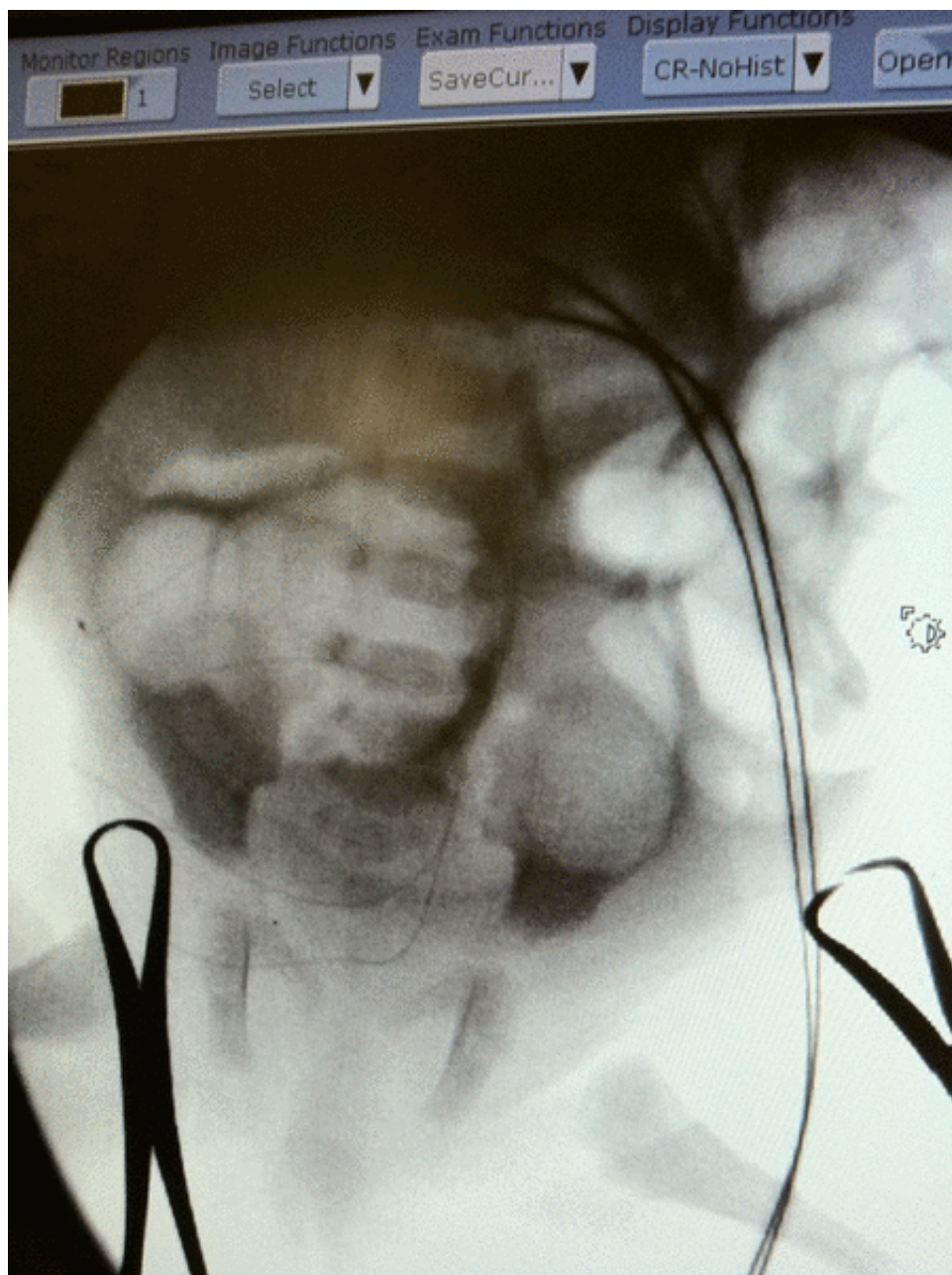
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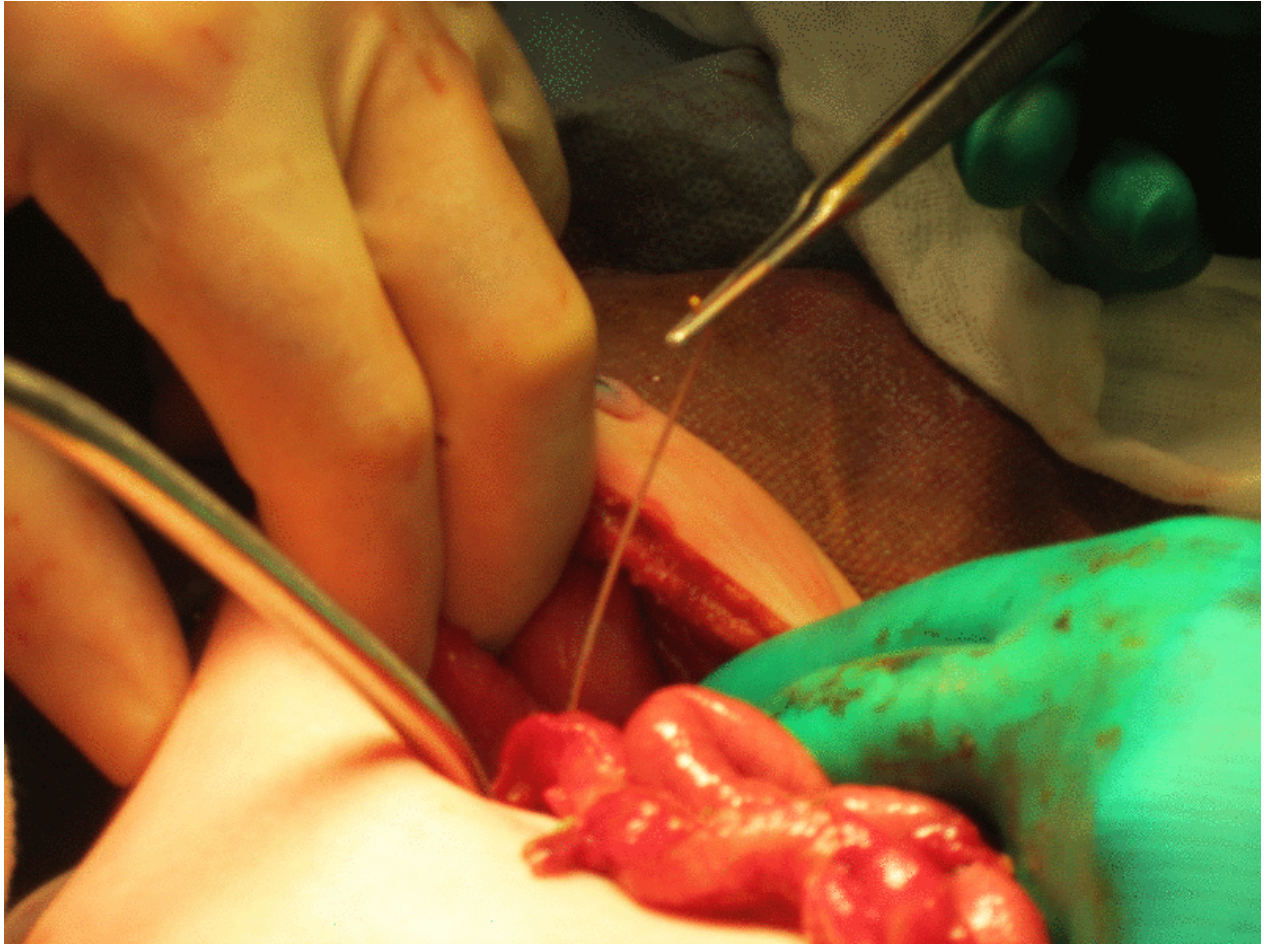
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