

### **PD-49. CONTINUOUS SPINAL ANESTHESIA OR CONTINUOUS EPIDURAL ANESTHESIA FOR POSTOPERATIVE PAIN RELIEF?**

Moellmann, M.; Reinhardt, S.; Ruehland, K.; Cord, S.

Anesthesiology and Intensive Care Medicine, St. Franziskus-Hospital, Muenster, Germany

Both continuous spinal anesthesia (CSA) and continuous epidural anesthesia (CEA) are supposed to provide adequate postoperative pain relief. The purpose of this randomized, prospective study was to compare quality of analgesia, occurrence of side effects and patients' satisfaction between spinal and epidural pain therapy with local anesthetic (LA) alone or added with opioid. With the approval of the local ethics committee, 229 patients scheduled for hip replacement (76 m, 153 f) were randomly assigned to one of four groups and received CSA or CEA. Group I received CSA alone (continuous infusion of bupivacaine (bv) 0.25% 10ml/24hrs). Group II received CEA alone (bv 0.25%; 2ml/h). Group III received CEA + opioid (bv 0.25% + sufentanil mite 0.05mg; 4 ml/h). Group IV also received CEA + opioid (bv 0.25% + sufentanil mite 0.025mg; 4 ml/h). The level of pain was gauged from verbal rating scale (VRS) and from visual analogue scale (VAS) twice a day for the first postoperative 72 hrs. No difference in demographics was noted. On the VRS-Scale, 54% of Group I and 64% of Group IV, but only 21% of Group II reported complete pain relief. Throughout the study, VAS-scores reported by group II were significantly higher than in the other groups. The lowest scores on VAS were given by group IV. In group III, but not in group IV, nausea and vomiting occurred significantly more often than in any other group. 7 patients suffered from PDPH. Satisfaction was considered excellent in 87.1% of group I, 70.6% in group II, 71.9% in group III and 86.2% in group IV. CSA and CEA are effective and safe for postoperative pain relief. Compared to CEA with LA alone, CSA and CEA with opioid provided faster onset of pain relief, ensured better analgesia and produced more satisfied patients.

*Niemi L, Pitk€anen M, Tuominen M, Rosenberg PH. Technical problems and side effects associated with continuous intrathecal or epidural post-operative analgesia in patients undergoing hip arthroplasty. Eur J Anaesth 1994; 11: 469-474*  
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