Effect of magnesium sulfate on morphine activity retention to control pain after herniorrhaphy.

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Abstract

AIM: This research was carried out to compare magnesium sulfate (MgSO4) with isotonic saline in terms of pain control after herniorrhaphy.

PATIENTS & METHODS: A randomized double-blind study, in which the patients were blind to all. A total of 100 patients who were candidates of herniorrhaphy were randomized into two groups: experimental and control (50 patients in each). Anesthesia was induced with 20% of 4 cc of morphine. The experimental and control group received postoperative 20% of 2 cc MgSO4 in 2 cc of isotonic saline and 4 cc of isotonic saline, respectively.

RESULT: The administration of postoperative morphine in control group 0.79 ± 1.48 mg was significantly higher to the experimental group 0.17 ± 0.63 mg during the first 24 h (p = 0.01).

CONCLUSION: MgSO4 increased the potency of morphine thereby reducing the amount of postoperative pain killer needed.

KEYWORDS: herniorrhaphy; magnesium sulfate; morphine; pain

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