Amézquita Álvaro+, Garzón Federico+, Medina Gabriela*, Valero Francisco**, Rincón David**

+Pediatric Anesthesiologist Fundación Hospital de la Misericordia (HOMI)
*Internship, Universidad Nacional de Colombia
**Anesthesiologist, Universidad Nacional de Colombia

Introduction: The prevalence of postoperative pain in children has been estimated between 21-61% (1), however in Colombia are no data about it; this study was planned to determine the prevalence of postoperative pain in a pediatric hospital in Bogota, Colombia, during the months of March and April 2016, involving primary caregivers of patients as evaluators of pain at different times.

Materials and Methods: A prospective observational study was performed in 201 pediatric patients undergoing scheduled surgery. Two scales validated in the literature were used, the behavioral FLACC scale for children under 4 years or cognitive impaired and faces pain scale for over 4 years (1–3). The parents and caregivers were trained with learning support material for the proper use of pain scales. Pain was classified according to the score as no pain (0), Mild (2), Moderate (4-6), Severe (8 -10). Cut off point for logistic regression was a score ≥4 because since this point we take a change of treatment. Scales were evaluated at the end of the surgery in the post anesthesia unit care, at 24, 48, 72 hours and a week later for the surgery.

Results: The prevalence of mild postoperative pain in the post anesthesia care unit was 21.3%, moderate to severe pain was 13.5%. Prevalence of moderate to severe pain at 24 hours 46.8%, 48 hours 31.3%, 72 hours 18.7%, and a week later 7.1%. Data analysis was performed, using logistic regression finding a positive association between immediate postoperative pain ≥4 and general anesthesia (OR: 0.10; 95% CI: 0.02 to 0.55 ) with a p value <0.05. Also an association between pain at 24 hours and surgery site was found; Groin and perineum (OR: 0.18; 95% CI:0.062 to 0.94), extremities (OR : 0.18; CI95%: 0.054-0.61), maxillofacial, head and neck (OR: 0,17; CI95%: 0,04-0,66), hernias and hydrocele (OR: 0.11; IC:95%: 0,03-0,45); all values of p <0.05.

Conclusions: The current study describes postoperative pain prevalence within previous ranges reported in the literature. Logistic regression showed positive association between immediate pain presentation and use of exclusive general anesthesia, which should encourage to increase staff training in regional anesthesia and performance of this kind of techniques. Groin, perineum, extremities, maxillofacial, hydrocele and head and neck surgeries were also found to increase risk for postoperative pain at first 24 hours, suggesting to focus care in these patients and ensure improved treatment and greater use of regional techniques. It is important to make greater efforts in pain treatment of patients in the first 24 hours due to the high incidence of moderate to severe pain

BIBLIOGRAPHY