

PAEDIATRIC HIGH GRADE BLUNT SPLENIC TRAUMA : NON OPERATIVE MANAGEMENT VERSUS OPERATIVE MANAGEMENT

Ahmed Elgendy¹, Rasha Dawoud²

¹Department of General Surgery, Tanta University Hospital, Tanta, Egypt, ²Department of Radiodiagnosis and Medical Imaging, Tanta University Hospital, Tanta, Egypt

Aim of the Study: The spleen is the commonest injured organ in blunt abdominal trauma. The purpose of this study is assessing Non operative management (NOM) versus operative management (OM) in high grade (III or higher) splenic trauma with studying the feasibility of NOM.

Methods: A retrospective review of all patients presented with isolated high grade blunt splenic trauma to our hospital between June 2011 to May 2015. Patients were evaluated clinically then radiologically using abdominal ultrasound and computed tomography. Data collected included demographic data, age, sex, vital signs, mode of trauma and splenic injury grading proposed by the American Association for the Surgery of Trauma.

Main Results: The study included 63 patients (49 male, 14 female). Mean age was 6.46 years (1-15). Thirty six patients were grade III (57.14%), 22 grade IV (34.92%) and 5 patients grade V (7.94%). Twelve patients (19.05%) were haemodynamically unstable and underwent immediate surgical intervention while the remaining 51 (80.95%) were stable and treated by NOM with failure in 4 cases (6.35%) those become unstable within the first 12 hours under close monitoring so OM was inevitable. Patients treated by NOM (47/63, 74.6%) passed safely without complications, needed less amount of blood transfusion with median hospital stay (7 days, 8 in OM) and the most crucial benefit that surgery was avoided.

Conclusion: NOM is better, has numerous advantages mainly splenic preservation and avoidance the risk of overwhelming post-splenectomy infection. NOM is feasible and safe in properly selected cases depending on haemodynamic stability which is the most reliable criterion for patient selection whereas, OM is mandatory in patients with shock unresponsive to resuscitation or failed NOM.