

SV17: PAEDIATRIC VARICOCELE: COMPARISON OF DIFFERENT TECHNIQUES AT A MEDIUM TERM FOLLOW-UP

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Background Indications and techniques of treatment of varicocele is still a matter of debate also in paediatric and adolescent population. The experience of different centers is herein reported.

Materials and methods A retrospective study was conducted in order to assess the results of different surgical approaches to paediatric and adolescent varicocele among 5 paediatric surgery units. Data of patients treated between Jan 2012 and Sept 2016 were collected based on a common protocol.

Results 286 patients, 8-17 years, treated for varicocele were enrolled. Depending on centers, mode of treatment was: a) laparoscopic Palomo (57 patients); b) laparoscopic Palomo with intraoperative lymphatic sparing technique (166 patients, two centers); c) retrograde scleroembolization (33 patients); d) antegrade sclerotherapy (Tauber technique) (30 patients). Preoperatively Doppler ultrasound (Sarteschi classification) and clinical examinations (Dubin classification) were performed for diagnosis and patients' selection in 258 cases (90.2%). Indications for surgery were testicular hypotrophy (94%), progression of disease (8,3%), high grade varicocele associated with prepubertal onset (6,6%), bilaterality (0,6%), and symptoms (0,34%). Only one case of spermatic vein rupture during retrograde embolization occurred. All patients were discharged the day after the procedure.

Recurrence after laparoscopic Palomo, lymphatic sparing Palomo, retrograde and antegrade scleroembolization was 3.5%, 0.6%, 30% and 20%, respectively. Incidence of ipsilateral hydrocele was 21%, 1,4%, 0%, and 0%, respectively. Six patients were lost at follow-up.

Conclusions Paediatric and adolescent varicocele is treated in order to preserve testicular function even though almost 20% will experiment fertility problems. No standard treatment is recommended. Scleroembolization techniques have a significantly higher recurrence rate compared to laparoscopic Palomo. Conversely, ipsilateral hydrocele is significantly higher after laparoscopic Palomo, without lymphatic sparing technique, and may require correction.

Key words laparoscopic Palomo, different techniques