

SUMMARY

Hypospadias is a common congenital anomaly with an incidence of 1 per 125 to 300 live male births, and 65% of this anomaly of the distal type.

Surgical repair of hypospadias has a history of more than 150 years. To date more than 300 surgical procedures with accompanying modifications have been proposed for the repair of hypospadias.

The aim of the work was to determine whether the Perimeatal based flap (Mathieu) or Tubularized incised urethral plate (snodgrass) urethroplasty is more appropriate for repair of distal hypospadias.

In a prospective study, in Kasr El Aini Cairo University hospital during the period from September 2001 to April 2002, forty patients of distal hypospadias were repaired utilizing the Mathieu or the Snodgrass technique randomly. All cases were repaired and assessed by the same team. Points of assessment included meatus site, shape, fistula formation or other complication.

In the Mathieu group urethrocutaneous fistula 4 cases (20%), all cases (20%) necessitated reoperative repair. 6 cases (30%) developed meatal stenosis, which improved with regular dilatation.

In the Snodgrass group 3 cases developed fistula of them only one case (5%) necessitated reoperative repair, meatal stenosis found in 4 cases (20%) and improved by periodic dilatation.

There is no single, universally applicable technique for hypospadias repair. However, the TIP technique urethroplasty takes less time and has a relatively low incidence of complication and a better cosmetic aspect than Mathieu repair for boys with distal hypospadias.

Further experience is necessary to determine the applicability of this technique for repair of more proximal and complex hypospadias defects.