Neglected Developmental Dysplasia of Hip A Case Report

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INTRODUCTION:

Developmental dysplasia of hip is where the ball and socket joint of the hip does not properly form and usually was detected early in babies and young children. This a case report of case report of a DDH in a young adult.

CASE REPORT:

A 22 years old student with no known medical or surgical history was brought to emergency department with pain over the left hip following a road traffic accident. She was unable to weight over the left lower limb. There was an apparent shortening around 5cm however, there was no foot drop or any open wound. X-ray was performed and showed left hip dysplasia with dislocation of left hip joint. Closed manipulative reduction was performed under sedation in emergency and trauma department however failed to maintain the left hip reduction. CT pelvic was performed for her to better visualize her dysplastic hip and possible fractures which leads to the instability.

TREATMENT:

Initial treatment involved with skin traction on a Bohler Braun frame. She was later planned for left total hip arthroplasty. Her left total hip arthroplasty was performed under general anesthesia using modified lateral approach. After assessing the possibility of reduction and soft tissue tension intraoperatively, we opted for acetabular augmentation by using her native femoral head as bone graft in order to restore her left native hip center and provide cup stability at anatomical cup position. We chose cemented Exeter stem implant for her due to narrower stem with minimal metaphyseal flare. This provides more flexibility and allows orientation of the stem independently. There is no limb length discrepancy post-operatively but she

developed foot drop with paresthesia of the left lower limb. She was started with oral neruobion in ward and later discharged with advice of non-weight bearing. Fortunately, her foot drop resolved later with no residue neurology deficit during the follow-up.



Figure 1 Figure 2 Figure 3 (1-Post trauma x-ray; 2-Post trauma CT; 3-Postop x-ray)

DISCUSSIONS:

Despite the widespread screening for hip dysplasia at birth and during infancy, a substantial number of cases are not diagnosed until adulthood, with an estimated prevalence of 0.1% of the adult population. DDH has been noted to lead to the development of radiographic osteoarthritis in 25% to 50% of patients by a mean age of 50.3 years. The incidence of the sciatic nerve palsy following acute lengthening of greater than 4 cm is around 13%. The revision rate for THA in dysplasia is 1.5-2 times higher than routine THA.

CONCLUSION:

The treatment of hip dysplasia in young adults remains a challenge. Although advanced surgical technique such as the periacetabular osteotomy and their capacity to preserve the hip and its function for a substantial period is now well established, total hip replacement remains an excellent option for adult DDH.

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