

Distal Humeral Physeal Separation In Neonates And Young Children – A Case Series In Hospital Sultanah Nur Zahirah, Kuala Terengganu.

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Objective

Distal humeral epiphyseal separation are rare, and usually mistaken as elbow dislocation from conventional radiographs. The diagnosis is made especially challenging in neonates where the ossification is yet to appear from the radiographs.

Materials and Method

We are presenting four cases of distal humeral physeal separation occurring in children of age ranging from day one of life until 2 years old, occurring within the year 2018. Two are neonates, involved in birth trauma and detected clinically by incomplete Moro reflex, and another two young children both came after an incident of fall on outstretched hand. The initial radiographs of all four cases were misinterpreted as elbow dislocation. Ultrasound and CT scans were done on the neonates and young children respectively, to confirm the correct diagnosis. They can be treated with closed reduction and casting, in all these cases joint aspiration was done along with closed reduction with contrast and per cutaneous pinning. Till date, all cases have shown remarkable outcome.

Discussion

Distal humeral epiphyseal separation though uncommon, are easily missed due to cartilaginous ossifying bone at distal humerus in such young age group. Study has shown that ultrasound has become an important tool in confirming the diagnosis in terms of better delineation of the structures at distal humerus. Even though the outcome of the treatment is good, still delayed evidence of elbow deformity later in life should be borne in mind.

Conclusion

Without clinical suspicion and adequate imaging technique, missed or delay in diagnosis and treatment can cause skeletal deformity in future.