# Post-Traumatic Hallux Valgus Interpahalangeus

<sup>1</sup>Tai, Ken Meng; <sup>1</sup>Benny E; <sup>1</sup>Tharumaraja T

<sup>1</sup>Orthopedic Department, Hospital Kulim, Kedah

### INTRODUCTION:

First described by Daw in 1935, hallux valgus interphalangeus is an uncommon great toe deformity with lateral deviation of distal phalanx relative to proximal phalanx. commonly disturbances associated with in growth development, pressure external and biomechanical alteration. Only 2 similar post traumatic cases were reported treated with excision and another with medial wedge osteotomy1. We would like to share a rare case of this condition caused by osteochondral fracture and our experience in managing it.

### **REPORT:**

A 12 years old girl presented to us with progressive valgus deformity of interphalangeal joint of great toe associated with pain and difficulty in ambulation. Interestingly, she had history of heavy object falling on her great toe 2 years ago but was treated conservatively. Clinically, there was tenderness over medial aspect of interpahalngeal joint and reduced range of motion with instability on valgus stress test. Plain radiographs (Figure 2) and CT scan were performed demonstrating large non-union osteochonral fragment involving lateral head of proximal phalanx with hallux interphalangeal angle (HVIA) of 28 degrees.

Patient underwent open reduction, debridement of non-union site, bone grafting and K-wire fixation. Due to laxity post fixation, medial capsule imbrication and augmentation were done with anchor suture. Postoperatively, she was immobilised with short leg cast and K-wires removed after 4 weeks.

Patient is currently 6 months post surgery and able to participate in sports without any complaint. Her radiograph demonstrated union with HVIA of 14 degrees. (Figure 4 and 5)



**Figure 1 and 2:** Clinical (1) and Plain AP Radiograph (2)



**Figure 3-5:** Postoperative (3), Latest Radiogprah(4) and Latest Clinical (5)

### **CONCLUSION:**

Posttraumatic hallux valgus interphalangeus is rare and easily missed condition. Surgical fixation should be considered as it provide good clincal outcome.

## **REFERENCES:**

1. Shimizu, A. et. al. (2005). Hallux valgus interphalangeus following osteochondral fracture of the proximal phalanx: a case report. Foot & ankle international, 26(11), 994-996.