

Frequently Missed Dislocation of the 4th and 5th Carpometacarpal Joints

¹Rajanthran P, ¹Yong CY, ¹Tiw AW, ¹Liew HC

¹Department of Orthopedic, Hospital Sibul, Sarawak

INTRODUCTION:

Carpometacarpal (CMC) dislocations are rare injuries which account for less than 1% of injuries of the hand.¹ Subtle radiographical findings often lead to late or missed diagnosis which may cause instability of the hand and compromise the hand function. High clinical suspicion is needed for early diagnosis.

CASE REPORT:

MB, a 25-year-old gentleman with no known medical illness fell on his right hand in a fist while playing “Sepak takraw”. Examination showed right hand deformity with prominence over dorsal ulnar aspect of his right hand. To the unsuspecting eyes, especially to those without meticulous examination, anteroposterior (AP) radiograph appeared grossly normal. However, oblique and true lateral view revealed dorsal dislocation of the 4th and 5th CMC. Closed manipulative reduction was performed but was unstable hence closed reduction and percutaneous K-wire pinning of right 4th and 5th CMC joints were done. Ulnar gutter was applied for post-operative immobilization. K-wires were removed 4 weeks post-operatively and hand rehabilitation was started to improve fingers and wrist range of motion as well as grip strength.



Figure 1: Pre-operative X-rays of right hand



Figure 2: Post-operative X-rays of right hand

DISCUSSION:

In this patient, AP radiograph showed subtle loss of parallelism of the 4th and 5th CMC joints which can easily be missed. Additional view especially the lateral view was essential in revealing the dorsal dislocation of the said CMC joints that appeared virtually normal on the AP view.

CONCLUSION:

CMC joints dislocation is one of the less common hand injuries and can easily be missed without a high index suspicion.² Routine AP and oblique radiographs may not be sufficient to show the displacement. A true lateral view radiograph should also be taken to avoid missing the diagnosis.

REFERENCE:

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