

MEDIAL PERITALAR DISLOCATION IN A VOLLEYBALL PLAYER

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ABSTRACT

We report a medial peritalar dislocation, which was treated with closed reduction and cast for 3 weeks. At follow up 12 months later, there was normal range of motion and mild pain after prolonged walking.

Key Words: Ankle injuries, peritalar dislocation, sport injuries.

INTRODUCTION

Medial Peritalar dislocation is an uncommon injury and was first described after flying accidents.^{1,2,3} This kind of dislocation is named according to the direction of the foot in relationship to the talus.³ Lateral dislocations are rarer than medial dislocation (15%). Anterior and posterior dislocation can also occur but in a very small percentage. Associated osteochondral fractures are not uncommon.^{1,2}

CASE REPORT

We present a case of a 22 years old male brought to the emergency after an acute injury while smashing a volleyball. His right foot inverted when he landed after a jump. On examination, the foot was completely displaced medially and the talar head was palpable on the dorsolateral aspect of foot. It was a closed and isolated injury. X-ray showed medial peritalar dislocation with osteochondral

fracture (Fig.1a,b). There was no history of previous dislocation or serious injury to either ankles or other joints of the feet. Under sedation, closed reduction was easily performed with abduction-eversion manipulation of the foot with the longitudinal traction through the heel and dorsiflexion of right ankle. A below knee plaster cast was applied for 3 weeks (Figs.2a,2b). After cast removal, non weight bearing crutch walking and physiotherapy were started. Full weight bearing was allowed after 8 weeks. On one year of follow-up, the patient was complaining of mild pain after prolonged walking but there was no limitations in the range of motion, no instability and arthritic changes were not seen in the subtalar region on the radiologic evaluation.

DISCUSSION

Medial peritalar dislocation of the foot is an uncommon injury. According to the severity of the force involved, the

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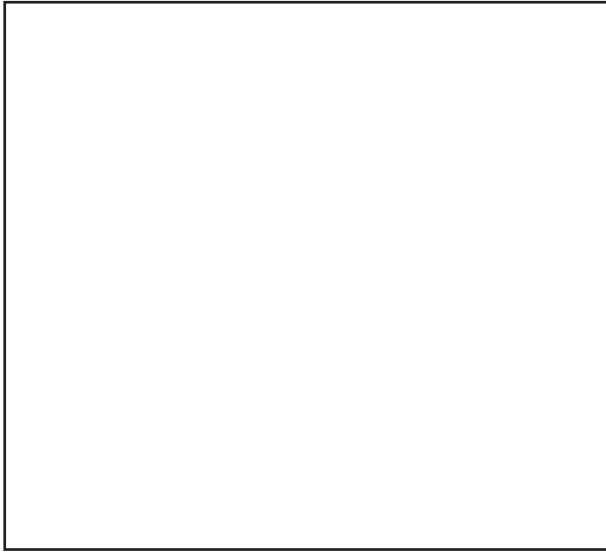
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**Fig. 1(A)****Fig. 1(B)****Fig. 2**

injury can be open, irreducible, and recurrent. Additional bone and soft tissue injuries can take place. In the case of unsuccessful closed reduction, open reduction is mandatory. The commonest obstacles to closed reduction are buttonholing of the talar head through extensor retinaculum or extensor digitorum muscles.² The medial dislocations of the subtalar and talonavicular joints take place by an inversion stress of the foot and the head of the talus moving laterally forming a bony protrusion. The sustentaculum tali act as a fulcrum causing first talonavicular dislocation, followed by talocalcaneal dislocation. A vascular necrosis is a very rare condition and osteoporosis is related to long term of immobilization.⁴ Some of the authors reported that usually these injuries did result in some subtalar stiffness and some limitation of subtalar joint motion.^{5,6} Radiological examination 12 months following the injury, there was no avascular necrosis or subtalar arthrosis or instability findings in our case. He was able to do all of his daily and sports activities as before the injury.

Dislocation must be reduced as soon as possible in order to avoid soft tissue and circulatory complication. It is essential to mobilize the foot as soon as possible after the injury. The prognosis of this lesion is good in term of no evidence of avascular necrosis and no subtalar arthrosis if there is an appropriate and rapid treatment. The etiology and treatment protocol is reviewed to alert the practitioner for prompt evaluation and treatment.

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