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Bilateral Posterior Hip Dislocation in an Unrestrained Driver

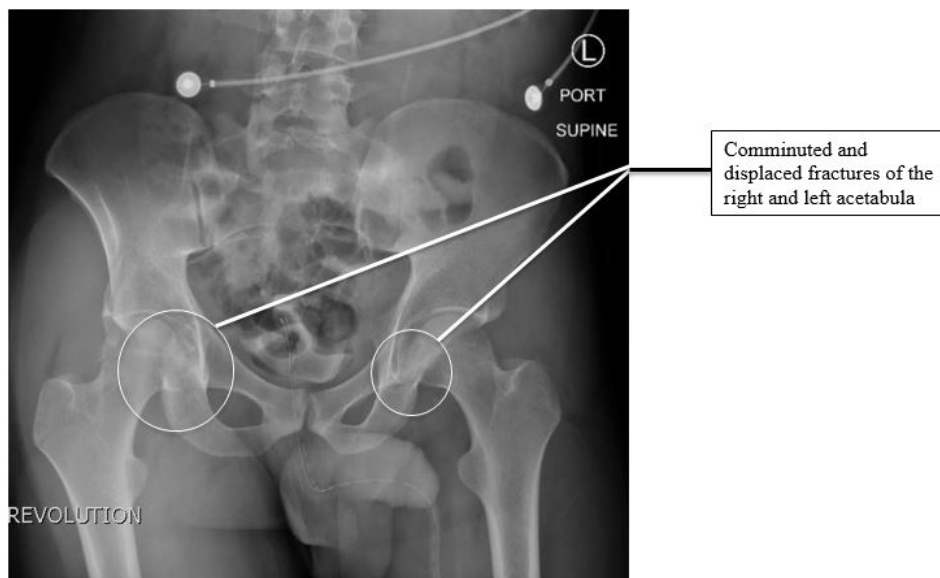
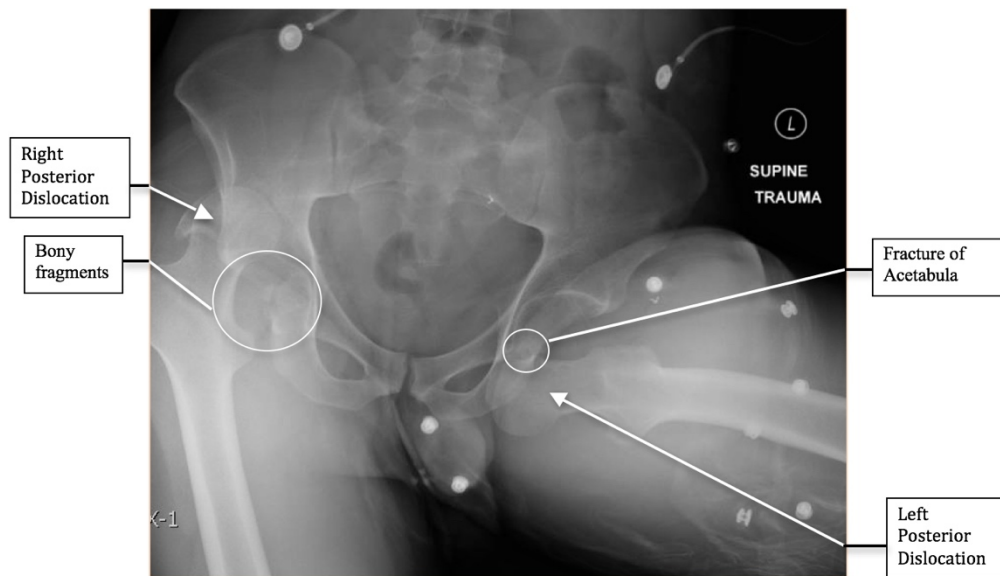
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History of present illness: A 24-year-old male was brought in by paramedics status post motor vehicle collision into an electric pole and tree at high speed. The patient was an unrestrained driver who required extrication. The patient complained of left hip pain, left foot pain, and difficulty extending his bilateral lower extremities. He denied numbness or tingling to his lower extremities. The patient had normal vitals; his bilateral lower extremities were held in flexion at the hips, but otherwise had no obvious injuries. The patient's pelvis was stable with palpable distal pulses and intact motor and sensory function of his distal lower extremities.

Significant findings: The initial radiograph of the pelvis revealed bilateral hip dislocations. Small bony fragments were noted in the right hip joint, suggestive of an underlying fracture. The sacroiliac joints and the pelvic ring were intact. In the emergency department, bilateral hip reductions were performed using the Captain Morgan technique.¹ The post-reduction film showed reduction of the bilateral hip dislocations with extensive comminuted and displaced fractures of the right and left acetabula.

Discussion: Bilateral hip dislocations are extremely rare, occurring in only 1% of all hip dislocations,² and require immense force, typically occurring in MVCs (74%).³⁻⁷ Associated injuries include fracture of the acetabulum or femoral head, sciatic nerve damage, and obstruction of the blood supply to the femoral head.⁸ X-ray imaging and computed tomography (CT) scans are used to assess the injury and to detect intra-articular fragments.³ Definitive treatment is achieved by closed reduction if possible; otherwise open reduction is utilized.⁹ Post-reduction therapy includes a non-weight-bearing period of time. Complications include avascular necrosis of the femoral head, osteonecrosis, and posttraumatic arthritis, the occurrence of which can be decreased by early reduction.^{4,10-12} This patient underwent bilateral closed hip reductions in the ER in conjunction with orthopedic surgery and underwent operative management of his pelvic fractures at a later date.

Topics: Posterior hip dislocation, dislocation reduction, pelvis, radiograph, trauma.

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