(PBL) Fracture Management: Breaks for the FP to Fix

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A past FMX presenter, Dr. Patel practices family medicine and sports medicine in Aurora and Yorkville, Illinois, and is medical director for Rush Copley Sports Medicine. His specialty topics include musculoskeletal imaging, concussions, stress fractures, osteoarthritis, joint examinations, pediatric overuse injuries, knee pain, tendonitis/tendonopathy, fractures, and exercise recommendations, as well as evidence-based medicine. He is a fellow of the American College of Sports Medicine. Since Dr. Patel also practices family medicine, he is able to deliver effective presentations to help family physicians address sports medicine and musculoskeletal complaints. He serves as chair for the 2019 AAFP Musculoskeletal and Sports Care course. Dr. Patel has found that staying current with medical advances and evidence-based medicine is the most challenging aspect of family medicine.
Learning Objectives

1. Practice applying new knowledge and skills gained from Fracture Management sessions, through collaborative learning with peers and expert faculty.

2. Identify strategies that foster optimal management of fractures within the context of professional practice.

3. Formulate an action plan to implement practice changes, aimed at improving patient care.

Associated Sessions

- Fracture Management: Breaks for the FP to Fix
Polling question

Which case to start with?
A. 55 y/o Ankle pain
B. 13 y/o Elbow pain
C. 58 y/o Wrist pain
D. 12 y/o Hand pain
E. 16 y/o Hip pain

55 y/o Ankle Pain

• **HPI:**
  - posterior ankle pain
  - Increased with prolonged walking, climbing ladder

• **PE:**
  - No edema,
  - Tender posterior ankle
  - FROM
• Xray done
• Abnormal reading by radiology
• Referred for follow up.

55 y/o Ankle Pain
Question

Plan?
A. RICE
B. Splinting/Cast (type?)
C. Repeat xray
D. MRI
E. CT

Ankle fracture that wasn’t

• Repeat xray 1 wk later.
Question
Ankle fracture that wasn’t. But what if it was?

Initial splint options?
A  B  C

Definitive treatment options?
A  B  C  D
Question
Next case?
A. 13 y/o elbow pain
B. 58 y/o wrist pain
C. 12 y/o hand pain
D. 16 y/o hip pain

13 y/o Elbow pain
13 y/o elbow pain

- Tripped fell onto L elbow
- Limited ROM
- Tenderness entire elbow

Question

Plan?
A. X-ray
B. Splint/brace (type?)
C. Physical therapy
D. RICE with close follow up
Question

Plan?
A. CT
B. MRI
C. Splint/brace (type?)
D. Sling
E. Physical therapy
F. RICE with close follow up
Posterior mold

1 wk later
Question

Plan?
A. CT
B. MRI
C. Splint/brace (type?)
D. Sling
E. Physical therapy
F. RICE with close follow up
Radial head fracture

- Often missed on initial xray
- Sling for 2-3 wks
- Rom exercise after 2-3 wks
- Gradual strengthening after 4 wks.
- Usual return to full activities 4-6 wks.
58 y/o wrist pain

• Fell few days ago. Progress worsening
• Pain/tender dorsal wrist
• Reduced ROM
• Mild edema
Imaging Results

Imaging results
Question

• Most likely diagnosis and Plan is?

Triquetrum Fracture

• Second most common carpal fracture
• Chip fracture due to forced extension and ulnar deviation

• PE:
• Pain with wrist flex/ext
• Weakness of extension
• Focal tenderness
Triquetrum Fracture

- Imaging: AP, oblique and lateral
- Focus on lateral view

Triquetrum Fracture

- Look for associated injuries
- Good healing rates
- Short arm cast 4-6 wks
12 y/o hand pain

- knuckle hit another kids shin 2 hrs prior
- Pain, edema, can’t make complete fist
- Edema of dorsal hand
- Tender 2nd MC, MCP, proximal phal
- Decreased/pain w flexion at MCP
- Pain/weakness w resisted MCP extension
Fracture?

Question

Plan?
A. CT
B. MRI
C. Splint/brace (type?)
D. RICE
Question

Splint options?
A  B  C

1 wk later
Fracture?
Question

Plan?
A. CT
B. MRI
C. Splint/brace (type?)
D. RICE
Question

• Treatment

16 y/o hip pain
16 y/o severe hip pain

• During speed training, sharp anterior hip pain
• Unable to continue
• Limping

PE:
• Severe tender groin and anterior hip
• Preserved int/ext rotation
• Weakness of hip flexion
Question

• Differential diagnosis?

Question

Plan?
A. RICE
B. Splint/brace (type?)
C. Xray
D. CT
E. MRI
Question

Plan?
A. CT
B. MRI
C. Splint/brace
D. RICE

1 wk later
1 wk later

Treatment

- Crutches, limited weight bearing for 1 wk
- ROM exercise for 2-3 wks
- Then strengthening/physical therapy for 2-3 more weeks.
- Return to sports gradually
Questions

Contact Information

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Thanks!