

## **Body MRI Goals & Objectives**

### **I. Rotation 1**

1. Reading Assignment: MRI of the MSK System, Kaplan, et al.

#### **I. Medical Knowledge**

- A. Demonstrate knowledge of normal knee anatomy
- B. Recognize common knee pathology with regard to common indications for knee MRI (e.g. meniscal tear, ACL tear, Baker cyst, etc.) as is generally covered in Musculoskeletal curriculum
- C. Demonstrate knowledge of normal shoulder anatomy
- D. Recognize common shoulder pathology with regard to common indications for shoulder MRI (e.g. rotator cuff tear, tendinosis, AC osteoarthritis, etc.) as is generally outlined in musculoskeletal curriculum
- E. Recognize hip fractures and signs of avascular necrosis on MRI
- F. Recognize liver metastasis vs cavernous hemangiomata
- G. Recognize solid renal masses vs complex cysts
- H. Recognize the features of osteomyelitis on MRI

#### **II. Patient Care**

- A. Protocol exams for the following day prior to leaving each day
- B. Supervise exams requiring direct physician involvement
- C. Review exam images on non routine studies to insure the clinical question is answered or image quality/technique/sequences are appropriate
- D. Discuss risks/benefits/findings of MRI with patient directly when appropriate

#### **III. Interpersonal and Communication Skills**

- A. Appropriately communicate exam protocols with MR technologist. This is especially true for non routine studies requiring individualized protocols.
- B. Produce reports that are accurate, concise and contain appropriate level of detail

- C. Discuss results with referring physicians or appropriate team members with appropriate documentation of critical results in exam report.
- D. Review transcribed reports for accuracy and content, correct reports as needed and sign off reports in a timely manner.

#### IV. Professionalism

- A. Interact with patients, ancillary personnel, referring physicians, peers and faculty radiologists in an appropriate professional manner.
- B. Arrive at work on time
- C. Complete work assignments and dictate reports on day exam is reviewed with faculty radiologist
- D. Appropriately adhere to dress code

#### V. Practice-Based Learning and Improvement

- A. Recognize and correct personal errors.
- B. Utilize library and online sources to research clinical questions with regard to pathology, anatomy and protocol.
- C. Participate in journal club presentations as pertaining to Body MRI

#### VI. Systems-Based Practice

- A. Utilize PACS system efficiently to review and interpret exams. This includes setting default display protocols for efficient viewing of current and comparison exams.
- B. Utilize electronic medical record (PIE, Sequoia or equivalent current version of EMR) to investigate clinical history for patient exams and appropriately protocol exams.
- C. Utilize the dictation system to produce accurate and concise exam reports
- D. Act as a consultant to referring clinicians, ancillary personnel or other team members to facilitate appropriate and cost effective imaging with regard to utilization of MRI for body and Musculoskeletal indications.

## Rotation 2

Reading Assignment: Read the remaining required chapters in the baby Resnick in any order you want: Chapters 1, 2,14, 18, 28, 30, 32, 33, 34, 38, 46-58, 63-79, 81-85.

### I. Medical Knowledge

- A. Demonstrate knowledge of normal anatomy of ankle, foot, elbow wrist and hand.
- B. Recognize common pathology of the above joints as demonstrated by MRI
- C. Recognize significant arterial disease on MRA of renal arteries, mesenteric arteries and peripheral vascular runoff exams.
- D. Distinguish between uterine fibroids vs adenomyosis on pelvic MRI
- E. Distinguish between adrenal adenoma and metastatic disease on adrenal MRI
- F. Recognize the features of cirrhosis, portal hypertension and hepatoma on liver MRI
- G. Recognize the imaging features of soft tissue tumors and findings relevant to appropriate staging.

### II. Patient Care

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- B. Supervise exams requiring direct physician involvement
- C. Review exam images on non routine studies to insure the clinical question is answered or image quality/technique/sequences are appropriate
- D. Discuss risks/benefits/findings of MRI with patient directly when appropriate.

### III. Interpersonal and Communication Skills

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