

MRI is available 24/7. However, there are a limited number of technologists and sub-specialized Radiologists available after normal operating hours. It is important that the requests that they respond to are appropriate and clinically indicated. To facilitate effective MRI utilization, UPH-DM Radiology has defined emergent, urgent, and routine MRI exams and the process for on-call (after hours) MRI orders.

UPH-DM MRI hours of operation by campus:

- IMMC:
 - Onsite staff: Monday-Thursday 6:00am-12:00am, Friday 6:00am-10:00pm, Saturday & Sunday 7:00am-9:00pm.
 - On-call staff: Monday-Thursday 11:00pm-7:00am. Friday 10:00pm-7:00am. Saturday & Sunday 9:00pm-7:00am. Holidays are covered by call.
- ILH:
 - o Onsite staff: Monday-Friday 7:00am-4:30pm.
 - o On-call staff: evenings/nights/weekends/holidays
- MWH:
 - o Onsite staff: Monday-Friday 7:00am-4:30pm
 - o On-call staff: evenings/nights/weekends/holidays

MRI orders fall into 3 categories:

- Emergent Imminent loss of life or marked loss of function
- Urgent delay in diagnosis could lead to inferior outcome
- Routine imaging needed to treat a condition related to the hospital stay

Emergent MRIs:

The following conditions are appropriate for an **emergent** MRI and an MRI tech will be called in to perform and/or the patient can be transferred:

- Mass Lesion with acute CNS deterioration a CT or inadequate outside MRI shows evidence of a mass lesion with significant neurologic deterioration over 24 hours where the condition is clinically expected to require either:
 - o Further anatomic information in order to provide safe treatment

or

- Stealth images to provide safe operative care
- Acute Spinal Cord Injury or Acute Spinal Cord Compression including weakness due to suspected mass lesion
 - Acute deterioration must have occurred over a short enough time such that rapid treatment is likely to result in restoration of function
 - A diagnosis of radiculopathy, sensory loss-only, or fixed severe deficits of >48 hours is not deemed life threatening or STAT
- Unstable Spine for planning an unstable spine correction, particularly when an occult soft tissue component may compress neural elements upon deformity correction
- Acute Appendicitis in Pregnancy if ultrasound is inconclusive and the general surgery attending consult deems the patient's condition to be life threatening

Process for emergent on-call (after hours) MRI cases:

- Ordering Physician or advanced practice Provider will order emergent exam via Epic (STAT)
- The ordering provider or designee will complete the MRI Checklist and alert radiology of order.
 - When MRI is not staffed in house (MRI tech is on-call), the MRI checklist must be completed prior to the MRI tech getting called in. Radiology team is responsible to ensure MRI checklist is complete prior to calling the on-call MRI Technologist
 - If the patient has an implant, all reasonable attempts will be made to acquire necessary implant information to ensure MRI safety. If there is an unknown implant, it must be approved by a Radiologist prior to scanning
- MRI tech is expected to arrive within 30 minutes from phone call.
- MRI tech will call the patient's unit to obtain the screening information and verify that a Provider, RN, or PCT will be able transport the patient and stay with the patient in MRI for the duration of the exam.
- For critical results will be communicated per Critical Results Reporting Policy (Rad 26)



UnityPoint Health - Des Moines On Call MRI Requests

Urgent MRIs:

- The following conditions are appropriate for an **urgent** MRI. The 1st appointment of every day will be held for **urgent** MRIs
 - MRI/MRA Brain & Neck to evaluate for vertebral or carotid artery dissection (If patient is not a candidate for CTA)
 - Acute Spinal Cord Injury or Acute Spinal Cord Compression to rule out discitis, osteomyelitis, cauda equina syndrome, or epidural asbcess
 - MRV to evaluate for dural venous sinus thrombosis
 - MRI Brain to evaluate for herpes encephalitis or for hyperacute stroke
 - MRI to evaluate for bone or soft tissue infection or abscess in patient requiring immediate surgical treatment
 - o MRI Brain to evaluate for stroke

Process for urgent MRI cases:

- The 1st appointment of every weekday (6:30am) will be held for any **urgent** MRIs that were ordered between 12:00-7:00am. Please use the 'timed' function in EPIC when placing MRI order
- Patient or legally responsible family member completes and signs the MRI Screening Form. The screening form must be completed and sent to MRI by 6:00am in order to proceed with the 1st MRI scan of the day
- MRI team will work with referring location to coordinate scan. When MRI is staffed (please refer to page 1
 for reference of staffing hours), the MRI Checklist is still required to be complete prior to patient arriving at
 MRI.
 - Patients with MRI compatible implants need verification by the vendor. Patient's Specialist following the care of the implant must approve the MRI order and complete the implant checklist prior to imaging.