

Magnetic Resonance Imaging (MRI)/Magnetic Resonance Angiography (MRA)/Magnetic Resonance Venography (MRV)

You are scheduled to have an MRI/MRA on _____ at

UW Hospital
600 Highland Ave
Madison, WI 53792

Take the Atrium elevators to 3rd floor Check in at the G3/3 reception desk
Call **(608) 263-9729** to cancel or schedule appointments

1 South Park Medical Center
1 South Park Street
Madison, WI 53715

Call **(608) 287-2050** to cancel or schedule appointments

Wisconsin Sleep
6001 Research Park Blvd
Madison, WI 53719

Call **(608) 265-8333** to cancel or schedule appointments

Science Dr Medical Center
621 Science Drive
Madison, WI 53711

Check in at 2nd Floor Radiology
Call **(608) 263-9729** to cancel or schedule appointments

East Madison Hospital
4602 East Park Blvd
Madison, WI 53792

Call **(608) 263-9729** to cancel or schedule appointments

What is MRI?

Magnetic resonance imaging (MRI) uses a strong magnet, radio signal, and a computer to produce pictures of the inside of your body with detail. Contrast may be used to help make clearer images. The MRI allows the doctor to get pictures of the bone and soft tissue. The scans are painless and **do not** use radiation. The pictures taken help the doctor to see both healthy and diseased tissue.

What is MRA?

Magnetic resonance angiography (MRA) is a type of MRI scan that looks at blood vessels and blood flow of certain organs. Contrast may be used to help see the images better. You may need to hold your breath for up to 30 seconds at times during the scan.

What is MRV?

Magnetic resonance venography (MRV) is a type of MRI scan that looks at blood vessels and structures that return blood to the heart. Contrast may be used for this.

MRI Scans for Children

Children can safely have MRI scans. Many children need medicine to help them relax and remain still during the scan. The MRI staff along with the Pediatric Specialty Clinic will work with the child's doctor to provide this medicine. A parent or other adult must stay with the child.

Is MRI/MRA Safe

The MRI/MRA machine is a large magnet. Before the scan you must answer questions about any metal placed in your body. It is vital to answer these questions honestly to the best of your knowledge.

If you are pregnant let staff know. To date, there has been no evidence that MRIs while pregnant are harmful. But there have not been many studies to research the safety of MRI exams in pregnant patients. You, your doctor and a radiologist need to discuss if MRI is the best option. If it is felt that this test is vital for your care, you will need to sign a consent form before the scan.

Tell the MRI staff if you have any of these items in your body.

- Pacemaker
- Artificial heart valve
- Implanted defibrillator
- Brain aneurysm clips
- Medicine patches
- Implantable pump
- Neurostimulator or TENS
- Eye or ear implant
- Hearing aids
- IUD
- Metallic implant
- Artificial body parts
- Stent, coil, filter
- Breast or penile implants
- Implanted shunts

If you have any of these items in your body, it is helpful for the staff to also know:

- The date the device was placed.
- The hospital and doctor who placed it.
- The make or model number of the device (many times patients will have cards that have the model number and maker's name in their wallets). If you do not have a card, we can often get this from the hospital where it was done.

Also tell the staff:

- If you have any problems lying on your back and holding still for 30-60 minutes.

- If you have ever done metal grinding/welding, or if you have ever seen a doctor about metal in your eyes.
- Have any metal in your body from an accident, gunshot, or military service wound.
- Do you have any problems with claustrophobia (fear of small, enclosed spaces)? If you do, please talk with your doctor who ordered the MRI/MRA. The doctor will be able to discuss whether medicine can help you with the test. **If you take something to relax for this test, you will need to have a responsible adult drive you home after.**

Before the Exam

You may not be able to eat or drink 2-6 hours before the MRI/MRA. This will depend on the type of scan you will have and if you will be getting medicine for sedation. Take your normal medicines with a sip of water before you arrive.

Do not eat if you have been scheduled for: MRCP

Your doctor has scheduled you for a Magnetic Resonance Cholangiopancreatography. This technique uses MRI to look at the biliary and pancreatic ducts. This can be used to find whether gallstones are lodged in any of the ducts around the gallbladder. You will not be able to eat 4 hours before your MRCP.

IV Sedation

If you need IV sedation, **do not** eat solids up to 6 hours before and you may **not** drink clear liquids (juice, coffee, pop, etc.) for 4 hours before. A nurse will call you ahead of time if you are to get IV sedation. It is vital that you follow their guidelines, or we may have to reschedule the scan.

If you have diabetes and will not be able to eat for 4 hours, talk with your doctor about any changes that need to be made to your insulin or pills. When you schedule your visit, let the scheduler know you have diabetes so we can schedule you early in the morning.

Getting Ready

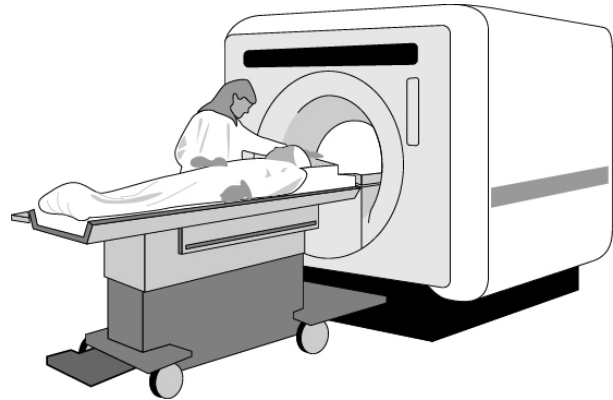
Arrive about 15 – 30 minutes before your scheduled scan. This will give the staff time to greet you and have you change into a gown. For some scans, we may need to inject contrast dye to get the best image. The contrast dye is given through an IV in the vein of your arm. The IV is removed before you go home.

- **Do not** wear any jewelry (wedding rings are okay). Watches and other jewelry may need to be removed. It depends on the part of your body to be scanned. To avoid loss of these items leave them at home.
- If you are having a head MRI, **do not** wear mascara or other makeup that glitters. This can affect the quality of your scan.
- **Do not** wear hair clips or bobby pins.
- **Do not** apply any lotions, oils, or perfume the day of the scan.

If you are **not** having a head MRI, you may bring a CD that we will be able to play for you during the scan. We will also have music choices or radio stations for you to listen to.

During the Scan

You will be put on a padded, moving table, that glides into the large magnet. The magnet is round and open at both ends. Part or all of your body may be in the magnet. The inner part of the magnet is lighted and there is good air flow for your comfort. You will hear a loud tapping noise during the scan.



We will give you ear plugs or headphones with music to help you during your scan.

You will also have a call light. The technologist can always see and hear you during the scan.

The length of time you will be in the magnet will depend on what part of your body is being scanned. The time for the entire scan ranges from 30 to 90 minutes. **To get the best pictures of your body, you must lie very still and follow the breathing instructions as they are given while the machine is scanning.**

After Your Scan

When the scan is done, we will look at the images. If an image is not clear, we will repeat the scan right away. After the scan, you will be able to leave unless you were given IV sedation and are still sleepy. You will need to be watched for a while if this is the case.

The radiologist (doctor that reads the image) will review the MRI scans and make a diagnosis or provide answers for your health problems. The radiologist will discuss the results of your scan with the doctor who ordered it. You will get the results from the doctor who ordered the exam.

Who to Call

If you have any questions or concerns, please call your referring doctor or clinic.

Your health care team may have given you this information as part of your care. If so, please use it and call if you have any questions. If this information was not given to you as part of your care, please check with your doctor. This is not medical advice. This is not to be used for diagnosis or treatment of any medical condition. Because each person's health needs are different, you should talk with your doctor or others on your health care team when using this information. If you have an emergency, please call 911. Copyright © 9/2022 University of Wisconsin Hospitals and Clinics Authority. All rights reserved. Produced by the Department of Nursing. HF#4419.