



PATIENT & CAREGIVER EDUCATION

Gadoterate Meglumine

This information from UpToDate® Lexidrug™ explains what you need to know about this medication, including what it's used for, how to take it, its side effects, and when to call your healthcare provider.

Brand Names: US

Clariscan; Dotarem

Brand Names: Canada

Dotarem

Warning

- This drug raises the chance of a health problem called nephrogenic systemic fibrosis (NSF) in some people. NSF may lead to severe skin, muscle, and organ problems that could be deadly. The risk of NSF is raised in people who have some types of kidney problems. Call your doctor right away if you have skin burning, itching, swelling, or scaling; red or dark spots on the skin; or hard or tight skin. Call your doctor right away if you have stiff joints, muscle weakness, or hip or rib pain. Call your doctor right away if you have trouble moving, bending, or straightening your arms, hands, legs, or feet.
- Before using this drug, talk with your doctor if you have kidney problems or if you are at risk for kidney problems. This includes people who are older than 60 years of age, or who have high blood pressure or high blood sugar (diabetes). Tell your doctor if you have recently taken a drug like this one.
- Your blood work may need to be checked. Talk with your doctor.
- This drug is given as a shot into a vein only. Severe health problems have happened when drugs like this were given into the spine. This included problems like confusion, memory loss, behavior changes, seizures, coma, and death. If you have questions, talk with the doctor.

What is this drug used for?

- It is used during an MRI (magnetic resonance imaging) test.

What do I need to tell my doctor BEFORE I take this drug?

- If you are allergic to this drug; any part of this drug; or any other drugs, foods, or substances. Tell your doctor about the allergy and what signs you had.
- If you have kidney problems.

This drug may interact with other drugs or health problems.

Tell your doctor and pharmacist about all of your drugs (prescription or OTC, natural products, vitamins) and health problems. You must check to make sure that it is safe for you to take this drug with all of your drugs and health problems. Do not start, stop, or change the dose of any drug without checking with your doctor.

What are some things I need to know or do while I take this drug?

- Tell all of your health care providers that you take this drug. This includes your doctors, nurses, pharmacists, and dentists.
- Tell your doctor if you have taken a drug like this one before. This drug has a metal called gadolinium in it. Small amounts of gadolinium can stay in parts of your body like the brain, bones, skin, and other body parts for months to years. It is not known how this gadolinium may affect you. So far, this has not been shown to be harmful in people with normal kidneys. However, some people may be at higher risk from gadolinium staying in the body. This includes pregnant people, young children, and people who have had many doses of gadolinium drugs. If you have questions, talk with your doctor.
- Some people have rarely felt tired; had pains; and had skin, muscle, or bone problems for a long time. These signs have not been linked to gadolinium. If you have questions, talk with the doctor.
- Allergic reactions have happened with this drug. Rarely, some allergic reactions have been deadly. In most cases, allergic reactions started within minutes of getting this drug. If you have questions, talk with the doctor.
- Kidney failure has happened with this drug in people who already had kidney problems. Talk with the doctor.
- Tell your doctor if you are pregnant, plan on getting pregnant, or are breast-feeding. You will need to talk about the benefits and risks to you and the baby.

What are some side effects that I need to call my doctor about right away?

WARNING/CAUTION: Even though it may be rare, some people may have very bad and sometimes deadly side effects when taking a drug. Tell your doctor or get medical help right away if you have any of the following signs or symptoms that may be related to a very bad side effect:

- Signs of an allergic reaction, like rash; hives; itching; red, swollen, blistered, or peeling skin with or without fever; wheezing; tightness in the chest or throat; trouble breathing, swallowing, or talking; unusual hoarseness; or swelling of the mouth, face, lips, tongue, or throat.
- Signs of kidney problems like unable to pass urine, change in how much urine is passed, blood in the urine, or a big weight gain.
- Shortness of breath with or without fever, trouble breathing, or fast breathing.
- This drug may irritate the vein. If the drug leaks from the vein, it may also cause irritation around that area. Tell your nurse if you have any redness, burning, pain, swelling, or leaking of fluid where the drug is going into your body.

What are some other side effects of this drug?

All drugs may cause side effects. However, many people have no side effects or only have minor side effects. Call your doctor or get medical help if any of these side effects or any other side effects bother you or do not go away:

- Feeling of warmth or coldness where this drug is given.
- Upset stomach.
- Headache.
- Change in taste.
- Feeling hot.

These are not all of the side effects that may occur. If you have questions about side effects, call your doctor. Call your doctor for medical advice about side

effects.

You may report side effects to your national health agency.

You may report side effects to the FDA at 1-800-332-1088. You may also report side effects at <https://www.fda.gov/medwatch>.

How is this drug best taken?

Use this drug as ordered by your doctor. Read all information given to you. Follow all instructions closely.

- It is given as a shot into a vein.

What do I do if I miss a dose?

- This drug will be given in a health care setting.

How do I store and/or throw out this drug?

- This injection will be given to you in a health care setting. You will not store it at home.

General drug facts

- If your symptoms or health problems do not get better or if they become worse, call your doctor.
- Do not share your drugs with others and do not take anyone else's drugs.
- Keep all drugs in a safe place. Keep all drugs out of the reach of children and pets.
- Throw away unused or expired drugs. Do not flush down a toilet or pour down a drain unless you are told to do so. Check with your pharmacist if you have questions about the best way to throw out drugs. There may be drug take-back programs in your area.
- Some drugs may have another patient information leaflet. If you have any questions about this drug, please talk with your doctor, nurse, pharmacist, or other health care provider.

- This drug comes with an extra patient fact sheet called a Medication Guide. Read it with care. Read it again each time this drug is refilled. If you have any questions about this drug, please talk with the doctor, pharmacist, or other health care provider.
- If you think there has been an overdose, call your poison control center or get medical care right away. Be ready to tell or show what was taken, how much, and when it happened.

Consumer Information Use and Disclaimer

This generalized information is a limited summary of diagnosis, treatment, and/or medication information. It is not meant to be comprehensive and should be used as a tool to help the user understand and/or assess potential diagnostic and treatment options. It does NOT include all information about conditions, treatments, medications, side effects, or risks that may apply to a specific patient. It is not intended to be medical advice or a substitute for the medical advice, diagnosis, or treatment of a health care provider based on the health care provider's examination and assessment of a patient's specific and unique circumstances. Patients must speak with a health care provider for complete information about their health, medical questions, and treatment options, including any risks or benefits regarding use of medications. This information does not endorse any treatments or medications as safe, effective, or approved for treating a specific patient. UpToDate, Inc. and its affiliates disclaim any warranty or liability relating to this information or the use thereof. The use of this information is governed by the Terms of Use, available at <https://www.wolterskluwer.com/en/know/clinical-effectiveness-terms>.

Last Reviewed Date

2025-03-19

Copyright

© 2026 UpToDate, Inc. and its affiliates and/or licensors. All rights reserved.

If you have questions or concerns, contact your healthcare provider. A member of your care team will answer Monday through Friday from 9 a.m. to 5 p.m. Outside those hours, you can leave a message or talk with another MSK provider. There is always a doctor or nurse on call. If you're not sure how to reach your healthcare provider, call 212-639-2000.

For more resources, visit www.mskcc.org/pe to search our virtual library.

Gadoterate Meglumine - Last updated on December 12, 2022

All rights owned and reserved by Memorial Sloan Kettering Cancer Center