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2. Tacrolimus

## Tacrolimus (oral and injection)

**Generic name:** tacrolimus (oral/injection) [ *ta-KROE-li-mus* ]**Brand names:** [Astagraf XL](#), [Envarsus XR](#), [Prograf](#), [Hecoria](#)**Dosage forms:** intravenous solution (5 mg/mL), oral capsule (0.5 mg; 1 mg; 5 mg), oral capsule, extended release (0.5 mg; 1 mg; 5 mg), ...  
[show all 5 dosage forms](#)**Drug class:** [Calcineurin inhibitors](#)[Medically reviewed](#) by Drugs.com on Jul 30, 2024. Written by [Cerner Multum](#).[Uses](#) [Side effects](#) [Warnings](#) [Before taking](#) [Dosage](#) [Interactions](#)

### What is tacrolimus?

[Tacrolimus](#) is used together with other medicines in people who have had a heart, kidney, liver, or lung transplant.

Tacrolimus weakens your immune system to prevent your body from "rejecting" the transplanted organ.

Tacrolimus may also be used for purposes not listed in this medication guide.

### Tacrolimus side effects

Get emergency medical help if you have **signs of an allergic reaction**: hives; difficult breathing; swelling of your face, lips, tongue, or throat.

You may get infections more easily, even serious or fatal infections. **Call your doctor right away if you have signs of infection such as:** fever, chills, flu symptoms, cough, sweating, painful skin sores, skin warmth or redness, or muscle aches.

Also call your doctor at once if you have:

- general ill feeling, pain or swelling near your transplanted organ;
- headaches, vision changes, pounding in your neck or ears;
- confusion, behavior changes;
- tremors, a seizure;
- fast or pounding heartbeats, fluttering in your chest, [shortness of breath](#), and sudden dizziness (like you might pass out);
- chest pain, cough, trouble breathing (even while lying down);
- **high blood sugar**--increased thirst, increased urination, hunger, fruity breath odor, nausea, loss of appetite,

drowsiness, confusion;

- **high potassium level**--nausea, weakness, chest pain, irregular heartbeats, loss of movement;
- **kidney problems**--swelling, urinating less, feeling tired or short of breath;
- **low magnesium or phosphate**--bone pain, jerky muscle movements, muscle weakness or limp feeling, slow reflexes; or
- **low blood cell counts**--fever, flu symptoms, tiredness, pale skin, cold hands and feet.

**Common side effects of tacrolimus may include:**

- low blood cell counts, infections;
- fever;
- nausea, diarrhea, [constipation](#), stomach pain;
- weakness, pain;
- fluid around your heart;
- tremors;
- headache;
- cough, breathing problems;
- [high blood sugar](#), high potassium levels, [high cholesterol](#) or triglycerides levels;
- low levels of magnesium or phosphate;
- numbness or tingling in your hands and feet;
- sleep problems (insomnia); or
- swelling in your hands, legs, ankles, or feet.

This is not a complete list of side effects and others may occur. Call your doctor for medical advice about side effects. You may report side effects to FDA at 1-800-FDA-1088.

 [Tacrolimus side effects](#) (more detail)

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## Warnings

Tacrolimus may increase your risk of developing a serious [infection](#), [skin cancer](#), or lymphoma. Talk with your doctor about the risks and benefits of using tacrolimus.

Call your doctor right away if you have any signs of infection such as fever, chills, flu symptoms, cough, sweating, painful skin sores, skin warmth or redness, or muscle aches.

## Before taking this medicine

You should not use this medicine if you are allergic to tacrolimus or hydrogenated [castor oil](#), or if you have used [cyclosporine](#) (Neoral, [Sandimmune](#), Gengraf) within the past 24 hours.

Using tacrolimus may increase your risk of developing serious infections or certain types of cancer, such as lymphoma or [skin cancer](#). Your risk may be higher if you are treated over long periods of time with drugs that weaken the immune system. Ask your doctor about this risk and about symptoms to watch for.

Some people taking tacrolimus after a [kidney transplant](#) have developed diabetes. This effect has been seen most commonly in people who are Hispanic or African-American.

Tell your doctor if you have ever had:

- problems with your liver, kidney, or heart that are not related to your transplant;
- [long QT syndrome](#) (in you or a family member); or
- if you are scheduled to receive a vaccine;

**Tell your doctor if you plan to get pregnant.** Tacrolimus may harm an unborn baby, and can worsen conditions such as diabetes or [high blood pressure](#) in the mother. Use effective [birth control](#) before and during treatment with tacrolimus.

If you are pregnant, your name may be listed on a pregnancy registry to track the effects of tacrolimus on the baby.

**If you are a man**, use birth control before and during treatment with tacrolimus if your sex partner is able to get pregnant.

Pregnancy may be less likely to occur while the mother or the father is using this medicine. **Both men and women should still use birth control to prevent pregnancy because the medicine can harm an unborn baby.**

Ask a doctor if it is safe to breastfeed while using this medicine.

## How should I take tacrolimus?

Follow all directions on your prescription label and read all medication guides or instruction sheets. Your doctor may occasionally change your dose. Use the medicine exactly as directed.

You may receive an **injection** of tacrolimus shortly after your transplant. Tacrolimus injection is given until you are ready to take the pill form of tacrolimus.

Take **oral** tacrolimus at the same time each day, with a full glass of water.

Swallow the **tablet** or **capsule** whole and do not crush, chew, break, or open it.

Mix tacrolimus **oral granules** with water right before you take them. Do not save this mixture for later use. Do not get the powder or mixture on your skin or in your eyes. If this happens, wash your skin with soap and water or rinse your eyes

with water.

Take **Astragraf XL** or **Envarsus XR** in the morning on an empty stomach, at least 1 hour before or 2 hours after a meal.

You may take **Prograf** with or without food, but take it the same way each time.

Your dose needs may change if you switch to a different brand, strength, or form of tacrolimus. **All forms of tacrolimus are not equivalent and may not have the same dose or schedule.** Avoid medication errors by using only the form and strength your doctor prescribes.

You will need frequent medical tests, and your blood pressure will need to be checked often.

Store at room temperature away from moisture and heat.

 [Detailed Tacrolimus dosage information](#)

## What happens if I miss a dose?

**For Prograf:** Take the medicine as soon as you can, but skip the missed dose if it is almost time for your next dose.

**For Astragraf XL:** Take the medicine as soon as you can, but skip the missed dose if you are more than 14 hours late for the dose.

**For Envarsus XR:** Take the medicine as soon as you can, but skip the missed dose if you are more than 15 hours late for the dose.

**Do not** take two doses at one time.

## What happens if I overdose?

Seek emergency medical attention or call the Poison Help line at 1-800-222-1222.

## What should I avoid while taking tacrolimus?

**Avoid receiving a "live" vaccine.** The vaccine may not work as well while you are using tacrolimus. Live vaccines include measles, mumps, rubella (MMR), rotavirus, typhoid, yellow fever, varicella (chickenpox), and zoster (shingles).

Grapefruit may interact with tacrolimus and cause side effects. **Avoid consuming grapefruit products.**

## What other drugs will affect tacrolimus?

**Sometimes it is not safe to use certain medications at the same time.** Some drugs can affect your blood levels of other drugs you take, which may increase side effects or make the medications less effective.

**Tacrolimus can harm your kidneys**, especially if you also use certain medicines for infections, cancer, [osteoporosis](#), [organ transplant](#) rejection, bowel disorders, high blood pressure, or pain or arthritis (including Advil, Motrin, and Aleve).

**Tell your doctor about all your current medicines.** Many drugs can affect tacrolimus, especially:

- [amiodarone](#);

- cisplatin;
- cyclosporine;
- sirolimus;
- antibiotic, antifungal, or antiviral medicines; or
- heart or blood pressure medication, such as a diuretic or "water pill."

**This list is not complete and many other drugs may affect tacrolimus.** This includes prescription and over-the-counter medicines, vitamins, and [herbal products](#). Not all possible [drug interactions](#) are listed here.

**i** [Tacrolimus drug interactions](#) (more detail)

## Does tacrolimus interact with my other drugs?

Enter medications to view a detailed interaction report using our [Drug Interaction Checker](#).

tacrolimus

+

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## Patient resources

- [Tacrolimus \(Intravenous\) advanced reading](#)
- [Tacrolimus \(Oral\) \(Advanced Reading\)](#)
- [Tacrolimus Capsules](#)

- [Tacrolimus Extended-Release Tablets](#)
- [Tacrolimus Extended-Release Capsules](#)

**Other brands**

[Prograf](#), [Envarsus XR](#), [Astagraf XL](#), [Hecoria](#)

**Professional resources**

- [Tacrolimus monograph](#)
- [Tacrolimus \(FDA\)](#)
- [Tacrolimus ER Capsules \(FDA\)](#)

**Other brands**

[Prograf](#), [Envarsus XR](#), [Astagraf XL](#)

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- [Graft Versus Host Disease](#)
- [Organ Transplant, Rejection Prophylaxis](#)
- [Crohn's Disease](#)

**Further information**

Remember, keep this and all other medicines out of the reach of children, never share your medicines with others, and use this medication only for the indication prescribed.


Always consult your healthcare provider to ensure the information displayed on this page applies to your personal circumstances.

[Medical Disclaimer](#)

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**DRUG STATUS**

**Availability**  
**Rx** Prescription only

**Pregnancy & Lactation**  
 Risk data available

**CSA Schedule\***  
**N/A** Not a controlled drug

**Approval History**



## User Reviews & Ratings

7.9 / 10

[49 Reviews](#)

## Images

[Tacrolimus 1 mg \(S 644\)](#)



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