

Fludarabine

Names	The generic drug name is fludarabine (floo-DARE-a-been). The brand name is Fludara®. There may be other names for this medication such as FAMP.
How is it Given?	Fludarabine is given by infusion into a vein (IV or intravenous), usually over 30 minutes. Typically, the infusions are given once a day for 5 days in a row, for each chemotherapy cycle.
Why am I Receiving Fludarabine?	This drug is most often used to treat chronic lymphocytic leukemia (CLL). It may be used to treat other blood cancers.
How Does it Work?	<p>Cancer is a group of diseases in which abnormal cells reproduce uncontrollably. Chemotherapy agents identify and attack cancer cells by how quickly they divide (reproduce). Unfortunately, normal cells that reproduce quickly are also affected, which can result in side effects. These normal cells will eventually grow back and be healthy. Your chemo schedule is based upon the type of cancer you have, how fast the cancer cells reproduce, and when each drug is the most likely to be effective. This is why we typically give chemotherapy in cycles.</p> <p>Fludarabine is in a class of drugs known as antimetabolites. It attacks cells at very specific phases in the cell cycle. The drug is changed inside your body and it becomes able to enter cell. Once inside the cells, it interferes with their ability to reproduce.</p>
What Should I Tell My Doctor Before I Begin?	<p>Before you begin fludarabine, tell your doctor if you:</p> <ul style="list-style-type: none">• have ever had an allergic reaction to fludarabine or have any allergies• have or have ever had kidney disease• have had chemotherapy or radiation therapy in the past• are pregnant or breast feeding

This drug may interact with other medications or cause harmful side effects. Tell your doctor and pharmacist about all prescription or over-the-counter medications, vitamins, herbal or diet supplements that you are taking.

What Are Some Possible Side Effects?

- Low blood counts (decreased red blood cells, white blood cells, and platelets), which can increase your risk of fatigue, infections, and bleeding problems
- Fatigue, weakness, trouble sleeping
- Fever, chills, infections
- Nausea, vomiting, loss of appetite
- Diarrhea
- Peripheral neuropathy: Numbness, tingling, burning sensation in arms, hands, legs, and feet
- Rash, skin reactions
- Swelling
- Changes in how foods taste, metallic taste in the mouth
- Mouth sores
- Hair thinning or loss (3-4 weeks after treatment begins)
- Muscle, joint, or back aches and pains

How Can I Manage These Side Effects?

- Drink at least 2-3 quarts of fluid, especially water, every 24 hours, unless your doctor tells you to limit your fluids. This helps prevent constipation and dehydration.
- To help avoid infections, stay away from crowds in small spaces and people who are sick. Talk to your doctor before you have any vaccinations. **Wash your hands often.**
- To help prevent bleeding problems, be careful when handling sharp objects. Stay away from rough sports or other situations where you could be bruised or injured. Use an electric razor. Be careful when using a toothbrush or dental floss (your doctor may recommend other ways to clean your teeth and gums).
- If you feel fatigued, do not drive or operate any type of dangerous tools or equipment. Try to save energy and rest. Prioritize and only do what is most important. Learn to ask for and accept help with chores and errands. Eat well and stay out of bed as much as possible during your treatment to stay strong.
- **Fever, chills: Stay well hydrated and rest.** Ask your doctor before taking any medications or products for headache, fever, aches, or any other symptom.
- **Nausea:** If prescribed, take anti-nausea medication as scheduled and also as soon as you feel nauseous. To help prevent nausea, avoid fried, spicy, and/or fatty foods on the days you receive chemo and for 2-3 days afterwards. Eating small, frequent meals may help. If you feel nauseous, try foods and drinks that are 'easy on the stomach' or made you feel better when you were sick in

How Can I Manage These Side Effects?

the past. These include bland foods, ginger ale, dry crackers, and toast.

- **Diarrhea:** Loperamide (Imodium®) is available over the counter. Take 2 tablets after the first episode of diarrhea, followed by 1 tablet (2mg) after each loose stool as needed. Do not take more than 8 tablets (16mg) in a 24-hour period. Call the clinic if not better in 24 hours.
- **Peripheral neuropathy:** Monitor your fingers and toes for any decreased sensations or tingling. Report any sensation changes to your doctor. If you develop peripheral neuropathy:
 - Stay as active as you can to help keep your muscles working. If you exercise in a gym, tell the instructor that you have peripheral neuropathy and ask for instructions.
 - Foot and hand massages may help relieve stiffness. After the massage, remember to clean the lotions and creams off your hands and feet.
 - Protect your hands and feet, particularly when handling hot items or when weather is severe. Use oven mitts, gloves, socks, and shoes
 - Have someone check the water temperature before you take a shower, wash dishes, etc. or use a thermometer or a part of your body that is not affected by PN.
 - Get rid of throw rugs and other obstacles that can increase your risk of falling or tripping.
 - Ask about balance training and/or physical or occupational therapy.
- **Taste changes:** Experiment with food. Sometimes adding a bit of spice or sweetness helps.
- **Skin care:** Use sunscreen with SPF 30 or higher when you are outdoors, even for a short time. If you develop a rash, do not put anything on it unless it is approved by your doctor.
- **Mouth care** is very important. To minimize mouth problems, rinse your mouth with a mixture of ½ tsp of baking soda in 8 oz of water after every meal and at bedtime. Brush your teeth and gums often with a soft toothbrush. (Soften it further by running it under warm water). Avoid smoking, alcohol, and mouthwashes that contain alcohol.

When Should I Call the Doctor?

Call your doctor immediately if you have:

- any sign of an allergic reaction: Itching, hives, swelling in your face or hands, swelling or tingling in your mouth or throat, chest tightness, trouble breathing, dizziness, or palpitations
- any sign of infection: **Fever of 100.4°F (38°C)** or higher, chills, cough, sore

throat, pain or burning upon urination; redness or tenderness along a vein, at an IV site, or at any other wound

When Should I Call the Doctor?

Call your doctor immediately if you have:

- unusual bruising or bleeding: bleeding lasts more than 10-15 minutes or that causes dizziness; black or bloody stools; blood in vomit (looks like coffee grounds), urine, or mucus; bloody nose, or a rash of pinpoint-sized reddish-purple spots (petechiae)
- shortness of breath or difficulty breathing
- you cannot urinate
- pain along the side of your body
- peeling or blistering skin

Call your doctor as soon as possible if you have:

- nausea, vomiting, or mouth sores that are not relieved by prescribed medication or that prevent you from eating and drinking
- vomit more than 4-5 times in 1 day
- diarrhea 5-6 times in 1 day or diarrhea with weakness
- extreme fatigue that interferes with your daily activities
- peeling or blistering skin

What Else Do I Need to Know?

- Fludarabine may interfere with the normal menstrual cycle (periods) in women, stop sperm production in men, or cause permanent infertility. **DO NOT**, however, assume that you cannot get pregnant or that you cannot father a child. Use a reliable method of birth control to prevent pregnancy during treatment and for some time afterwards. Barrier methods, like condoms, are recommended. Do not breastfeed while in treatment.
- Because this treatment suppresses your immune system, your doctor may put you on antibiotics to prevent you from getting infections.
- Do not drive a car or operate machinery until you know how this medication affects you. (Fludarabine may cause tiredness, weakness, confusion, agitation, seizures, and vision changes)
- Keep all doctor and lab appointments.
- Tell your doctors and dentists you are on fludarabine.
- **Be sure to tell your doctor that you are receiving, or have received fludarabine before you receive any blood transfusions.** (You may have a reaction to the transfusion even years after fludarabine treatment.)

- Fludarabine is associated with some rare, but serious conditions:
 - Tumor lysis syndrome (caused by large amounts of cancer cells dying rapidly) usually occurs within 24 - 48 hours of therapy and can lead to kidney failure. Your doctor will prescribe plenty of fluids and may give you a drug that blocks uric acid production (allopurinol). **If you cannot urinate, call your doctor immediately.**
 - Hemolytic anemia (a life-threatening condition in which your body attacks and destroys its own blood cells). Tell your doctor if you have ever had this type of problem before. **If you have dark urine, yellow skin, or signs of unusual bleeding** (see “When Should I Call my Doctor”) **call your doctor immediately.**
 - Damage to your nervous system (more common at higher doses) **If you experience seizures, agitation, or confusion, call your doctor immediately.**
- If you would like more information, talk to your doctor or pharmacist.