Panobinostat (Farydak®)

Pronounced: pan-oh-BIN-oh-stat

Classification: Histone Deacetylase Inhibitor

About Panobinostat (Farydak®)

Panobinostat is in a class of anti-cancer therapies called histone deacetylase (HDAC) inhibitors. Histone deacetylation is a biochemical process that is thought to play a role in promoting tumor growth. It does this by silencing some tumor suppressor genes, as well as other genes that are responsible for cell cycle progression, cell proliferation, programmed cell death (apoptosis), and differentiation (transformation of young cells into specialized cells). Therefore, blocking histone deacetylation may allow the body to block tumor growth and prevent progression.

How to Take Panobinostat

Panobinostat comes in a capsule form to take by mouth. It should be taken on each scheduled day around the same time, either with or without food. If a dose is missed it can be taken up to 12 hours after the scheduled time. If it is past the 12 hour window, the dose should be skipped, and the next dose taken as scheduled. The capsule should be swallowed whole with a cup of water. Do not open, crush or chew the capsule.

Grapefruit, pomegranate, and star fruit (and their juices) can interfere with the medication and should be avoided. Certain medications including boceprevir, clarithromycin, indinavir, intraconazole and ketoconazole can interfere with this medication. Be sure to tell your healthcare provider about all medications and supplements you take.

Storage and Handling

Store your medication in the original, labeled container at room temperature and in a dry location (unless otherwise directed by your healthcare provider or pharmacist). This medication should not be stored in a pillbox. Keep containers out of reach of children and pets.

If a caregiver prepares your dose for you, they should consider wearing gloves or pour the pills directly from their container into the cap, a small cup, or directly into your hand. They should avoid touching the pills. They should always wash their hands before and after giving you the medication. Pregnant or nursing women should not prepare the dose for you. Ask your oncology team where to return any unused medication for disposal. Do not flush down the toilet or throw in the trash.

Where do I get this medication?

Panobinostat is available through select specialty pharmacies. Your oncology team will work with your prescription drug plan to identify an in-network specialty pharmacy for distribution of this medication and shipment to the oncology clinic or directly to your home.

Insurance Information

This medication may be covered under your prescription drug plan. Patient assistance may be available to qualifying individuals without prescription drug coverage. Co-pay cards, which reduce the patient co-pay responsibility for eligible, commercially (non-government sponsored) insured patients, are also available. Your care team can help you find these resources, if they are available.
Possible Side Effects of Panobinostat

There are a number of things you can do to manage the side effects of Panobinostat. Talk to your care team about these recommendations. They can help you decide what will work best for you. These are some of the most common or important side effects:

**Diarrhea**

Diarrhea from this medication can lead to dehydration and be very serious. Notify your oncology team if you develop stomach cramps or have more than 3 stools a day. If you become weak, light-headed, dizzy, or are unable to tolerate food and drink notify your healthcare provider immediately.

Your oncology team can recommend medications to relieve diarrhea. Also, try eating low-fiber, bland foods, such as white rice and boiled or baked chicken. Avoid raw fruits, vegetables, whole-grain breads, cereals, and seeds. Soluble fiber is found in some foods and absorbs fluid, which can help relieve diarrhea. Foods high in soluble fiber include: applesauce, bananas (ripe), canned fruit, orange sections, boiled potatoes, white rice, products made with white flour, oatmeal, cream of rice, cream of wheat, and farina. Drink 8-10 glasses on non-alcoholic, un-caffeinated fluid a day to prevent dehydration.

**Heart Problems**

This medication can cause an abnormal heart rhythm or a heart attack. Your oncology team will perform blood tests and an electrocardiogram (ECG) prior to starting this medication and as needed during treatment. If you experience chest pain, abnormal heartbeats (faster, slower, or palpitations/racing heart), feel lightheaded, dizzy, or short of breath, or develop swelling in your legs, contact your care team or go to the emergency room.

**Electrolyte Abnormalities**

This medication can affect the normal levels of electrolytes (potassium, magnesium, calcium, etc.) in your body. Your levels will be monitored using blood tests. If your levels become too low, your care team may prescribe specific electrolytes to be given by IV or taken by mouth. Do not take any supplements without first consulting with your care team.

**Low Platelet Count (Thrombocytopenia)**

Platelets help your blood clot, so when the count is low you are at a higher risk of bleeding. Let your oncology care team know if you have any excess bruising or bleeding, including nose bleeds, bleeding gums, or blood in your urine or stool. If the platelet count becomes too low, you may receive a transfusion of platelets.

- Do not use a razor (an electric razor is fine).
- Avoid contact sports and activities that can result in injury or bleeding.
- Do not take aspirin (salicylic acid), non-steroidal, anti-inflammatory medications (NSAIDs) such as Motrin/Advil (ibuprofen), Aleve (naproxen), Celebrex (celecoxib) etc. as these can all increase the risk of bleeding. Please consult with your healthcare team regarding the use of these agents and all over-the-counter medications/supplements while on therapy.
- Do not floss or use toothpicks and use a soft-bristle toothbrush to brush your teeth.

**Fatigue**

Fatigue is very common during cancer treatment and is an overwhelming feeling of exhaustion that is not usually relieved by rest. While on cancer treatment, and for a period after, you may need to adjust your schedule to manage fatigue. Plan times to rest during the day and conserve energy for more important activities. Exercise can help combat fatigue; a simple daily walk with a friend can help. Talk to your healthcare team for helpful tips on dealing with this side effect.

**Nausea and/or Vomiting**

Talk to your oncology care team so they can prescribe medications to help you manage nausea and vomiting. In addition, dietary changes may help. Avoid things that may worsen the symptoms, such as heavy or greasy/fatty, spicy or acidic foods (lemons, tomatoes, oranges). Try saltines, or ginger ale to lessen symptoms.

Call your oncology care team if you are unable to keep fluids down for more than 12 hours or if you feel lightheaded or dizzy at
any time.

**Infection and Low White Blood Cell Count (Leukopenia or Neutropenia)**

This medication can cause life-threatening infections, with or without a decrease in white blood cell counts. White blood cells (WBC) are important for fighting infection. While receiving treatment, your WBC count can drop, putting you at a higher risk of getting an infection. You should let your doctor or nurse know right away if you have a fever (temperature greater than 100.4°F or 38°C), sore throat or cold, shortness of breath, cough, burning with urination, or a sore that doesn't heal.

**Tips to preventing infection:**

- **Washing hands**, both yours and your visitors, is the best way to prevent the spread of infection.
- Avoid large crowds and people who are sick (i.e.: those who have a cold, fever or cough or live with someone with these symptoms).
- When working in your yard, wear protective clothing including long pants and gloves.
- Do not handle pet waste.
- Keep all cuts or scratches clean.
- Shower or bath daily and perform frequent mouth care.
- Do not cut cuticles or ingrown nails. You may wear nail polish, but not fake nails.
- Ask your oncology care team before scheduling dental appointments or procedures.
- Ask your oncology care team before you, or someone you live with, has any vaccinations.

**Peripheral Edema**

Peripheral edema is swelling of the extremities caused by the retention of fluid. It can cause swelling of the hands, arms, legs, ankles, and feet. The swelling can become uncomfortable. Notify your oncology care team if you are experiencing any new or worsening swelling.

**Decrease in Appetite**

Nutrition is an important part of your care. Cancer treatment can affect your appetite and, in some cases, the side effects of treatment can make eating difficult. Ask your oncology care team about nutritional counseling services at your treatment center to help with food choices.

- Try to eat five or six small meals or snacks throughout the day, instead of 3 larger meals.
- If you are not eating enough, nutritional supplements may help.
- You may experience a metallic taste or find that food has no taste at all. You may dislike foods or beverages that you liked before receiving cancer treatment. These symptoms can last for several months or longer after treatment ends.
- Avoid any food that you think smells or tastes bad. If red meat is a problem, eat chicken, turkey, eggs, dairy products, and fish without a strong smell. Sometimes cold food has less of an odor.
- Add extra flavor to meat or fish by marinating it in sweet juices, sweet and sour sauce, or dressings. Use seasonings like basil, oregano, or rosemary to add flavor. Bacon, ham, and onion can add flavor to vegetables.

**Fever**

Fever can be a side effect of this medication. Contact your care provider for a temperature of 100.4°F or 38°C or greater.

**Less common, but important side effects can include:**

- **Liver Toxicity**: This medication can cause liver toxicity, which your oncology care team may monitor for using blood tests called liver function tests. Notify your healthcare provider if you notice yellowing of the skin or eyes, your urine appears dark or brown, or you have pain in your abdomen, as these can be signs of liver toxicity.
- **Bleeding**: This medication can cause bleeding and it can take longer than usual for you to stop bleeding. Notify your oncology team if you develop any signs of bleeding: blood in your stool or black stools (looks like tar), pink or brown urine, if you vomit blood or vomit that looks like coffee grounds, cough up blood, bruise easily, have bleeding gums or nosebleeds, or become confused, have a change in speech/ slurred speech, or a bad headache.
- **Low Red Blood Cell Count (Anemia)**: Your red blood cells are responsible for carrying oxygen to the tissues in your
body. When the red cell count is low, you may feel tired or weak. You should let your oncology care team know if you experience any shortness of breath, difficulty breathing, or pain in your chest. If the count gets too low, you may receive a blood transfusion.

Reproductive Concerns

Exposure of an unborn child to this medication could cause birth defects, so you should not become pregnant or father a child while on this medication. For women, effective birth control is necessary during treatment and for at least three months after treatment. For men, effective birth control is necessary during treatment and for at least 6 months after treatment. Even if your menstrual cycle stops or you believe you are not producing sperm, you could still be fertile and conceive. You should not breastfeed while taking this medication.