



Provincial Health Services Authority

For the Patient: GUPLHRH

Therapy for Prostate Cancer using LHRH Agonist (Goserelin, Leuprolide or Buserelin)

GU = GenitoUrinary

P = Prostate

LHRH = Luteinizing Hormone Releasing Hormone

ABOUT THIS MEDICATION

What are these drugs used for?

- LHRH agonists such as Goserelin (ZOLADEX®), Leuprolide (ELIGARD®, LUPRON®), and Buserelin (SUPREFACT®) are used to treat advanced or high risk prostate cancer.

How do these drugs work?

- Goserelin, Leuprolide, and Buserelin work by lowering testosterone levels in the body. They are often combined with another medication for the first 1 month of treatment.

TREATMENT SUMMARY

How are these drugs given?

- **Goserelin** is given as a small rod injected under the skin either every month or every 3 months.
- **Leuprolide** is injected into the muscle or the under the skin (ranges from every 1 month to every 6 months).
- **Buserelin** is injected under the skin as either 2 small rods (2 month injection) or 3 small rods (3 month injection).
- Try to adhere to the schedule recommended by your doctor. If your schedule is changed by a few days, the medication will still be effective.

What will happen when I get my drugs?

- Your doctor may require blood tests to be done before the start of your medications and every cycle. The dose and timing of your treatment may be changed based on your blood tests and/or other side effects.

SIDE EFFECTS AND WHAT TO DO ABOUT THEM

Your doctor will review the risks of treatment and possible side effects with you before starting treatment.

Side effects for **GOSERELIN**, **LEUPROLIDE**, and **BUSERELIN** are listed in the following table in the order in which they may occur. Tips to help manage the side effects are included.

SIDE EFFECTS	MANAGEMENT
Pain or tenderness may occur where the needle was placed.	Apply cool compresses or soak in cool water for 15-20 minutes several times a day.
Nausea does not usually occur with.	
Increased bone pain may occur for the first 1-2 weeks if your cancer has spread to your bones.	This should improve as your body adjusts to your medication. You may take acetaminophen (e.g., TYLENOL®) or ibuprofen (e.g., ADVIL®) for mild to moderate pain. Tell your doctor if the pain interferes with your activity.
Hot flashes (sudden sweating and feelings of warmth) may commonly occur when you first start taking this medication.	If hot flashes are troublesome: <ul style="list-style-type: none">• Some people find it helpful to avoid alcohol, spicy food, and caffeine (coffee, tea, colas, chocolate).• Follow a regular exercise program.• Try staying in a cool environment.• Wear layers so that if you do experience a hot flash, the outer layers may be removed.• Ask your doctor for more advice if your hot flashes continue to bother you. There may be medications available.
Tiredness and lack of energy may commonly occur.	Do not drive a car or operate machinery if you are feeling tired.
Impotence (loss of sexual ability) may commonly occur.	Sexual ability may return when you stop taking this medication.
Decreased libido (loss of sexual desire) may commonly occur.	Sexual desire may return when you stop taking this medication.
Headache may commonly occur.	Take acetaminophen (e.g., TYLENOL®) every 4-6 hours if needed, to a maximum of 4 g (4000 mg) per day.
Weight changes may rarely occur. A small amount of weight gain may occur.	To maintain your weight: <ul style="list-style-type: none">• Keep active.• Modify your diet as necessary.

SIDE EFFECTS	MANAGEMENT
Sugar control may be affected in diabetics. Some people may be at risk for developing problems with blood sugar over time.	Check your blood sugar regularly if you are diabetic. Talk to your doctor if you feel an unusual degree of thirst and experience frequent urination, as these can be signs of high blood sugar.
Hair loss is rare with these medications. If you lose hair, it will usually grow back once you stop treatment with any of these medications. Colour and texture may change.	If hair loss is a problem: <ul style="list-style-type: none"> • Use a gentle shampoo and soft brush. • Care should be taken with use of hair spray, bleaches, dyes, and perms.
Increase in cholesterol or triglycerides may rarely occur.	Discuss this with your doctor if you have: <ul style="list-style-type: none"> • A history of heart disease, high blood pressure, or elevated triglycerides. • You may need to have your cholesterol and triglyceride levels checked a few months after starting this medication.
Bone loss happens gradually and normally with age, but may happen more quickly with this medication. Over time, your risk of breaking a bone may be higher.	Speak to your physician for more information. To help prevent bone loss: <ul style="list-style-type: none"> • Supplement with vitamin D and calcium • Participate in weight bearing exercises

INSTRUCTIONS FOR THE PATIENT:

SEE YOUR DOCTOR OR GET EMERGENCY HELP IMMEDIATELY IF YOU HAVE:

- Signs of an **allergic reaction** (rare) soon after a treatment including dizziness, fast heart beat, face swelling, or breathing problems.
- Signs of **heart or lung problems** such as fast or uneven heartbeat, chest pain, chest pressure, shortness of breath or difficulty in breathing, swelling of ankles, or fainting.
- **Signs of sudden increase** in the size of the cancer in your prostate such as blood in urine, problems passing urine, sudden back or trunk pain, or weakness in your legs, especially during the first month of the treatment. This is also called a **flare** reaction.

SEE YOUR DOCTOR AS SOON AS POSSIBLE (DURING OFFICE HOURS) IF YOU HAVE:

- **Changes in eyesight**
- Ringing in your ears or **hearing problems**.

If you experience symptoms or changes in your body that have not been described above but worry you, or if any symptoms are severe, contact _____ at telephone number _____