This handout explains how to prepare for a PET/CT prostate Axumin study. It tells how the study works, what you may feel during the study, and how to get your results.

What is this study?
This study is used to diagnose cancer in the prostate gland. It is done for patients who have still have symptoms of cancer after being treated for the disease. The study is usually done if levels of prostate-specific antigen (PSA) rise after treatment.

The study uses a special camera to take both positron emission tomography (PET) images and computed tomography (CT) images. It also uses a radioactive tracer called fluciclovine F18 (brand name Axumin). This tracer helps cancer cells show up more clearly in the images.

How is the study done?
We will inject the tracer into your vein. If you have cancer cells in your body, they will absorb the tracer.

Right after you receive the injection, we will take images of your body using the PET/CT camera. The camera does 2 types of scans:

- A PET scan shows where the tracer has collected in your body.
- A CT scan creates pictures of your body’s structures.

Together, the PET and CT scans help your doctor see changes in your cells.

How do I prepare?
- Your body will be inside the PET/CT camera during the scans, but most of the time your head will not be enclosed. If you have a strong fear of enclosed places or concerns about pain, talk with your doctor about sedation (medicine to help you relax).
• Do not exercise for 24 hours before your study.
• Starting **4 hours** before your study, do **not** eat or drink anything. If you need to take medicines, take them with **only** small sips of water.

**What should I expect?**

A nuclear medicine technologist or nurse, or both, will:
• Insert an *intravenous* (IV) tube into a vein in your arm or hand.
• Take you to the PET/CT scan area.
• Ask you to lie on your back on the scanner table and raise your arms above your head.
• Inject the tracer into your IV.

The PET/CT camera will then take images. Most scans will cover the area from the base of your skull down to the middle of your thighs. This imaging takes about 30 minutes.

Expect to be in the Imaging Department for 1 to 1½ hours for your study.

**What will I feel during the scan?**
• You may feel some discomfort when the IV is placed.
• You will need to lie flat on your back with your arms over your head for up to 30 minutes. We will use pillows to help provide support.
• During the PET/CT scan, you must hold very still and breathe normally.
• The tracer does not cause any discomfort while it is in your body.

**What happens after the scan?**

After the scan, drink plenty of fluids. This will help flush the tracer out of your system. The radioactivity is gone within a day.

**Who reads the scan and how will I get the results?**

A radiologist or nuclear medicine doctor will read your scan, and will also review past scans you may have brought with you. Your own provider will give you your scan results. Your provider should receive the results from the radiologist or nuclear medicine doctor within 3 days.

You may also read your results on your eCare Results page. If you need copies of your images on disc, call 206.598.6206.

You and your provider will decide the next step, such as treatment for a problem, as needed.