

High Dose Rate Prostate Brachytherapy



EMORY
SAINT JOSEPH'S
HOSPITAL

PATIENT GUIDE



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OVERVIEW

INTRODUCTION

High Dose Rate (HDR) Prostate Brachytherapy is a treatment that places an intense radiation source directly in or around a cancerous tumor, or cancerous region through surgically placed catheters for a few seconds at a time and then removes it. There is not a risk of seed migration and there is no radiation exposure to other people.

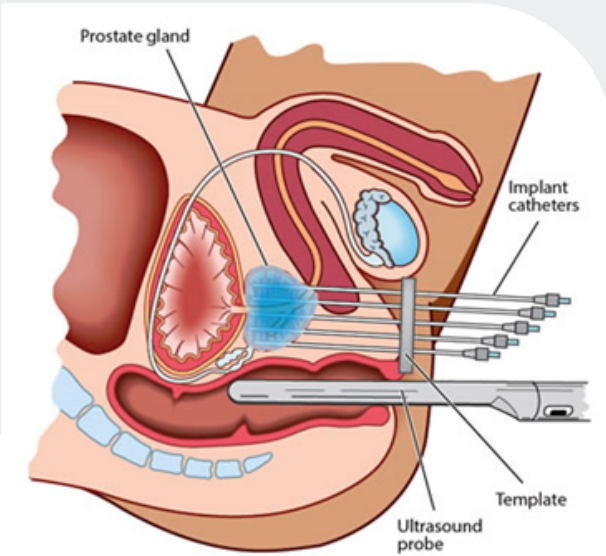
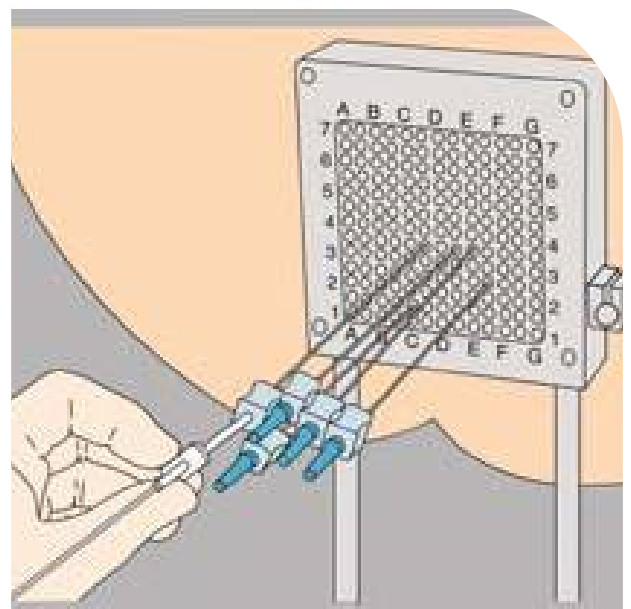


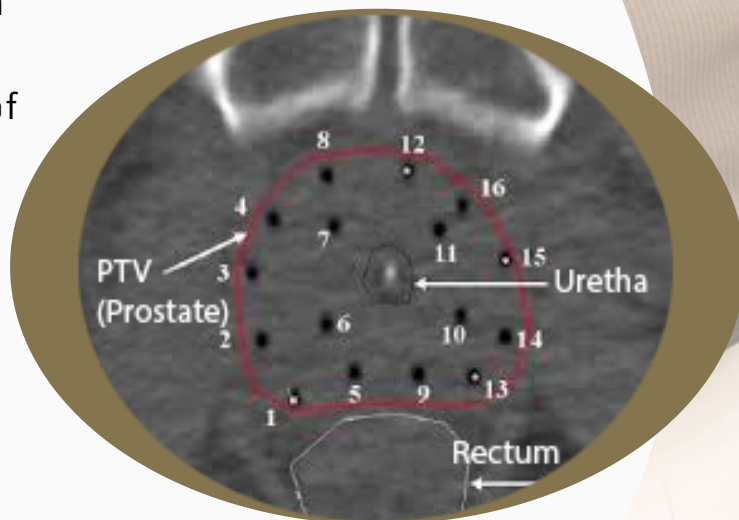
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CATHETER PLACEMENT

Catheter placement is a surgical procedure, for which patients are given a spinal or light general anesthetic. After anesthesia has been induced, the ultrasound probe will be inserted into your rectum. The probe will allow your doctors to visualize your prostate gland throughout the implant procedure. There will be 10 to 18, flexible, small-diameter catheters placed into the prostate through the skin of the perineum (the area between the scrotum and anus). The radiation source will be delivered to the prostate through these catheters. A catheter will be inserted into your bladder as well.

PLANNING RADIATION TREATMENT

After catheter insertion, the process of planning the radiation treatment begins. A CT scan will be obtained of the prostate. This information is entered into the computerized treatment planning system. This planning process will determine the appropriate dose of radiation for each catheter, which will allow precise planning of the radiation dose to the prostate. You will be lying flat for the entirety of the process



DELIVERING HDR TREATMENT

Once an individual's treatment plan has been determined, the patient is taken to a special treatment room, where each of the implanted catheters is attached to the HDR machine via connecting cables. The computer-controlled HDR machine transfers a very intense radioactive source, via a thin wire, through each catheter according to the individual's treatment plan. This treatment is painless and takes roughly 15 to 45 minutes.



During treatment you might hear a clicking sound as the radiation source is moved through each catheter. Once the treatment is completed the catheters as well as the template near the perineum will be removed and you will be discharged home. The catheter will also be removed from the bladder. In some cases, you may go home with the bladder catheter.

TREATMENT FOLLOW-UP

Regular follow-up appointments with your radiation oncologist and urologist will be recommended.

Regular rectal examinations and PSA's are also essential follow-up steps.



PRIOR TO THE PROCEDURE

PRE-OPERATIVE INSTRUCTIONS

If you are on a blood thinner (Coumadin, Eliquis, Pradaxa, Xarelto or other blood thinner), you must have clearance from the physician who put you on this medication explaining how long you are allowed to be off of this medication.

14 DAYS PRIOR TO THE PROCEDURE



Do not take vitamins or supplements for 2 weeks prior to the procedure, due to the possibility that they may slow down the blood's clotting mechanisms.



5 DAYS PRIOR TO THE PROCEDURE



Do not take any Plavix, Aspirin, Ibuprofen, Aleve or any other NSAIDs (Nonsteroidal Anti-inflammatory medication) 5 days prior to procedure.

You may take Tylenol.





DAY BEFORE PREPARATION

You may have **ONLY CLEAR LIQUIDS**.

A clear liquid diet includes foods that you can hold up and see through, for example:

- chicken broth
- bouillon
- tea
- coffee
- Jell-O
- carbonated beverages
- hard candy,
- clear fruit juices (cranberry, grape, apple, & cherry)
- Popsicles
- fruit- aids and ices made from juices

TWO HOURS BEFORE BED: Administer ONE (1) Fleet enema (saline/phosphate) rectally.

NOTHING TO EAT OR DRINK AFTER MIDNIGHT



DAY OF PROCEDURE

2 HOURS PRIOR TO ARRIVAL

**Administer one (1) Fleet enema
(saline/phosphate) rectally.**

Arrive _____ hour(s) before your surgery is scheduled.

Recommended attire for treatment day:
Shorts/jogging pants, underwear, T-shirt, and slip on shoes.

PROCEDURE #1

Arrival Date: _____

Arrival Time: _____

PROCEDURE #2

Arrival Date: _____

Arrival Time: _____



MEDICATIONS

DISCHARGE DIRECTIONS

START THESE MEDICATIONS TODAY

DAY OF PROCEDURE - START WHEN YOU GET HOME

- 1 Anti-inflammatory:** Ibuprofen 800mg
Take one tablet every 8 hours for 2 days, and then as needed for pain.
- 2 Bladder Analgesic:** Pyridium (Phenazopyridine)* 200mg
Take one tablet by mouth every 8 hours for 2 days and then as needed for urinary burning and frequency (It will turn your urine orange).
- 3 Urine flow:** Flomax (Tamsulosin) 0.4mg
Take one by mouth daily after dinner.

START THIS MEDICATION TOMORROW

Day AFTER the Procedure

Antibiotic: Cipro (Ciprofloxacin) 500mg
Take one by mouth every twelve (12) hours for 3 days.



INSTRUCTIONS

DISCHARGE DIRECTIONS

WHAT TO DO, WHAT TO AVOID

Prior to your procedure, Please make sure you have picked up all of your prescription medications for use after your procedure.

- Drink plenty of fluids over the next 48 hours to ensure good urinary flow and to prevent blood clots.
- You may advance to a regular diet as tolerated after the procedure.
- Sit on a soft, rather than hard, surface for the next few days.
- **Do NOT** ride a bike for at least 2 weeks.
- **Do NOT** drive, operate machinery, or drink alcoholic beverages for 24 hours after the procedure.
- Limit activity. No strenuous exercise should be initiated without your doctor's permission.
- Report the following to your radiation oncologist's office:
 - Excessive bleeding
 - Passing of large clots (larger than a quarter)
 - The inability to urinate or problems with your urinary catheter
 - Report a temperature above 100.4 degrees Fahrenheit
- Although fairly uncommon, you may experience diarrhea or constipation. In addition, you may experience painful bowel movements or bleeding from the rectum.
- You will receive a 4 week (1month) follow-up appointment with the doctor.

Early Side-effects

Burning with Urination

Dysuria (burning with urination) is due to inflammation caused by the trauma of needle insertion. It can also be the result of radiation on the tissues lining the urethra (tube that carries the urine from the bladder through the penis) and bladder. Dysuria usually lasts only a few days. If dysuria persists, it can be treated by using Pyridium or over the counter Pyridium (AZO-standard). Please inform your physician of any changes.

Blood in Urine

During or shortly after your procedure, you may have some blood present in the urine. This may continue for several days. Remember to drink 8-10 glasses of fluids per day following your procedure.

Discomfort at Needle Insertion Site

Mild bleeding at the site can occur. If this happens, apply firm pressure to the area with a wash cloth or gauze pad until the bleeding stops. Tenderness, swelling and bruising of the implant site and scrotum is common. It may last 3-4 weeks and will resolve on its own.

Urinary Urgency or Retention

You may experience urgency or frequency, especially at night, for a few weeks after the procedure. It may be even more than before the procedure. If you are unable to urinate, notify your Urologist or Radiation Oncologist, or go to the nearest E.R. A weakened stream is also normal.

Sexual Activity

Hemospermia is the term used to describe ejaculate that appears dark brown or black. This can happen due to trauma that occurs during the procedure. This will gradually decrease and the ejaculate will return to normal color. This may last several weeks. This should not be associated with pain.