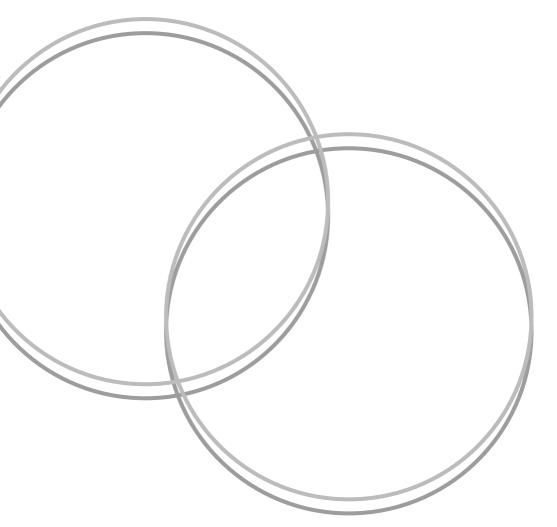


## Low Dose Rate Prostate Brachytherapy

Information for patients



#### **The Radiotherapy Department**

You have been given this leaflet because you are due to undergo a procedure called low dose rate prostate brachytherapy. This is a type of radiotherapy. This leaflet will explain what will happen to you in preparation for brachytherapy, what will happen when you come to the hospital for your procedure, the side effects of treatment and the radiation precautions required following your treatment.

A number of different healthcare professionals will be involved in your care during your preparation and treatment. If you have any questions, are not sure about something, or don't understand something then please do ask.

Useful contact numbers are at the end of this leaflet.

## What is brachytherapy?

Brachytherapy is a technique for treating prostate cancer using tiny radioactive grains of metal called "seeds". In this treatment around 60 to 80 radioactive seeds are implanted directly into the prostate. Brachytherapy provides a high radiation dose to the prostate. This minimises the effects on the surrounding tissues, including the rectum and bladder.

Brachytherapy is just as effective in curing prostate cancer as surgery or radiotherapy. Treatment time is short, does not require an overnight stay, and following treatment there is a rapid return to normal activities.

## **Preparation for the procedure**

#### Consent of partner to exposure to radiation

For the first few months following the procedure, there will be some ionising radiation given off by the seeds, most of which will be absorbed by the prostate. If you share a bed, your partner will be exposed to low levels of ionising radiation which may exceed the member of the public radiation dose limit. This additional radiation is equivalent to the extra background radiation from living in Cornwall compared to the UK average.

Your oncologist will ask your bed-sharing partner whether they consent to this additional dose and explain the risks. They must be at least 18 years old and not pregnant. Advice will be provided if your bed-sharing partner is pregnant. For all other family members and the public, exposure to the radiation will not exceed any dose limits.

#### Anaesthetic pre-operative assessment

When the brachytherapy procedure is carried out you will be given a general anaesthetic, which will make you unconscious. You will need to come to the hospital for an anaesthetic pre-assessment appointment. This is a routine check which is required before you have a general anaesthetic. Please bring all your medications with you to this appointment.

#### Medication

You will need to collect your treatment medication from the Churchill Satellite Pharmacy when you come to the hospital for your pre-operative assessment. Please follow the instructions on the medication sheet which will be given to you.

You will have been prescribed a laxative sachet to clear your bowel before the procedure. Take half of this sachet in the morning and the other half at lunchtime on the day before the procedure.

You will also have been prescribed a tablet called tamsulosin. You need to start taking this two days before your procedure and will need to continue to take it for at least three months afterwards. This will help you to pass urine more easily after the procedure.

#### Diet

You should also follow a low fibre diet for two days before your procedure so your bowel is as clear as possible and we can easily see your prostate. You will be given a diet sheet to help with this. You will also be advised about when you need to stop eating and drinking before your operation.

You should drink plenty of water the day before the procedure to ensure you keep well hydrated.

## The brachytherapy procedure

The procedure will be performed as a day case, which means you will not need to stay overnight in hospital. Your appointment letter will tell you when and where to arrive at the hospital.

When you arrive, you will be seen by an anaesthetist who will talk with you about the anaesthetic and any pain relief you may need after the procedure.

While you are under anaesthetic (asleep), a thin pipe called a catheter will be placed into your bladder. This is to enable the surgeon to see the tube from your bladder (the urethra) as it passes through the prostate gland. The catheter will be removed once the procedure is complete, before you wake from the anaesthetic.

In specific cases, which will have been discussed with you before to the procedure, the catheter will not be removed. You will be discharged home with the catheter in place and return the morning after the procedure to have it removed.

The radioactive seeds are inserted directly into your prostate through hollow needles. This is done by passing needles through the skin between your scrotum and back passage (rectum). The needle will be guided to the correct place using an ultrasound probe in your back passage. This shows an image of your prostate on a screen. Once all the seeds are in place, the needles are taken away, leaving the seeds in place permanently.

Each seed is very small, about half the size of a grain of rice. Insertion of the seeds does not require large incisions (cuts) in your skin. The whole procedure, including the anaesthetic and the insertion of the seeds, takes around 90 minutes.

# What will happen after the procedure?

You will be woken up after the anaesthetic and taken to the recovery ward until you can drink and eat comfortably. This can take a few hours. It may be more comfortable for you to wear loose trousers for a while after the procedure.

You will have an X-ray to make sure the correct number of seeds are in your prostate.

You may go home once you have passed two good amounts of urine. In specific cases where your doctor has agreed with you, the catheter will not be removed before you go home. In this case, the catheter will be removed at a hospital appointment the following day.

# What will happen after I am discharged?

You will not be able to drive after the procedure and will need to be accompanied home by a responsible adult. You should not go home on public transport after this procedure. You will need to be taken home by car.

When you are discharged, the nurse will check you have all the medication you need. You should:

- Continue with the tamsulosin to help you pass urine. A repeat prescription for this will be provided by your GP.
- Take painkillers as necessary.
- Use the prescribed mild laxative if you have problems opening your bowels.

You are encouraged to drink plenty of water for one week following the implant. Drinking caffeinated drinks like tea, coffee or fizzy drinks may make your urinary symptoms worse, so you are advised to avoid them as much as possible or to drink decaffeinated drinks.

You should be able to return to work a week after the procedure. Please avoid heavy lifting or heavy manual work during your week off.

You should be able to drive again two days after the procedure as the effects of the anaesthetic will have fully worn off by then. However, you must make sure you are able to comfortably and safely perform an emergency stop.

## Will I be followed up afterwards?

Yes, you will have appointments with the Oncology Team and will see either a doctor or the Prostate Brachytherapy Specialist Nurse.

Four weeks after the procedure you will have a CT scan to check the position of the seeds in your prostate. This is to make sure the planned dose of radiation is being delivered to your prostate. The scan will not tell us any information about whether the cancer has been cured or not.

You will have regular PSA blood tests after the procedure to monitor your illness. Your Prostate Brachytherapy Specialist Nurse will advise you how often these will be once your follow-up regime is confirmed.

## What are the possible side effects or risks of treatment?

Immediately after the procedure, you may feel sore between your legs and uncomfortable when walking. It may be uncomfortable and difficult to pass urine. You may also pass small amounts of blood in your urine.

Urinary retention (being unable to empty your bladder) occurs in 1 in 50 men, but is not usually permanent. In a small number of men, the difficulty in passing urine may require the insertion of a catheter to help empty your bladder before you can leave hospital.

The catheter can usually be removed within one to two weeks at a urology out-patients appointment. You will be given more advice about this if you need to have a catheter put in place.

Very occasionally urinary retention can develop after you have been discharged home. If you are unable to pass urine when you have returned home please contact Urology Triage using the phone number at the end of this leaflet. Bladder symptoms including slow flow, increased frequency, urgency and difficulty passing urine usually get worse in the four to six weeks following the procedure. These side effects will then slowly improve over the next six to nine months.

A small number of men may develop a narrowing of the tube coming out of their bladder (urethra) as a side effect of the treatment. This may require a small operation to allow the bladder to empty properly.

Some men develop mild constipation after their implants. This can be prevented by using the prescribed gentle laxative for a few weeks after the implant.

Occasionally, people can develop more frequent, looser bowel motions. This usually settles quickly on its own, but if the symptoms continue for more than a few days, reduce your fibre intake until the symptoms settle. If you are still having problems that are concerning you, contact your advanced nurse practitioner or your GP.

The inability to get an erection (erectile dysfunction) occurs in up to 40 out of every 100 men treated. This risk is lower in men who had normal erectile function before the procedure. Erectile dysfunction is a long-term effect but it may be treated successfully with medication.

### **Radiation precautions**

Most of the radiation given off by the seeds is absorbed by the prostate and therefore you can return to most normal activities. However, you must follow the following precautions if you have contact with children and pregnant women. Very close contact with both children and pregnant women, for example sitting next to them on a sofa, or having a child sit on your lap, should be limited to a few minutes a day for the first two months following brachytherapy. This is to keep the exposure to radiation from the seeds to a safe minimum.

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Although the seeds are implanted into the prostate, it is possible that a seed may be passed during sexual intercourse. You are advised to wear a condom for the first five ejaculations after the implant. Condoms should be disposed of by double wrapping in foil and placing in the dustbin.

It is also possible that a seed may be lost on passing urine. If it is passed into the toilet then it should be covered with toilet paper and flushed away as normal. If the seed is found on the floor it should be picked up with a spoon or tweezers and flushed down the toilet. The seed should not be handled with your fingers.

Please then contact the Churchill Hospital on **0300 304 7777** and ask for the Emergency Physicist. Please tell them if you have disposed of any loose seeds. This is to ensure the total number of brachytherapy seeds in your prostate is accurately recorded.

You will have an information card to carry for the first 20 months after your implant. This contains information about your implant and our contact details. You should show this to any doctor or hospital treating you in the 20 months following your implant. The seeds do not usually set off airline type security alarms, but show your radiation card if this happens.

Your family or next of kin will also need to be aware of this card so they can bring it to attention in case of unforeseen illness or accidental death. In the unlikely event of death, cremation is not recommended in the first 20 months after implant because the prostate still contains radioactive seeds. If you choose cremation over burial, the prostate would need to be removed before cremation takes place and retained until the seeds are no longer radioactive.

## **Useful contacts**

#### **Prostate Brachytherapy Specialist Nurse**

Telephone: **01865 235 473** (Please leave a message if there is no answer)

Or 0300 304 7777 and ask for the Nurse on Bleep 5088

#### **Medical Physics Department**

Telephone: **0300 304 7777** and ask for the Emergency Physicist

#### **Urology Triage**

Telephone: **01865 227 205** (Open 24 hours a day, 7 days a week)

## **Other sources of information**

#### **Maggie's Centre**

Maggie's Centre offers information along with psychological and emotional support. There is a resident psychologist and a team of cancer support specialists on hand for drop-in and pre-booked appointments and courses. A Welfare and Benefits Advisor is also available to help you with any money worries.

Open: Monday to Friday, 9.00am to 5.00pm

Website: www.maggiescentres.org/our-centres/maggies-oxford

Address: Maggie's Centre Churchill Hospital, Old Road, Headington, Oxford OX3 7LJ

Email: oxford@maggiescentres.org

Telephone: 01865 751 882

Benefits Advisor: 01865 759 953

#### **Prostate Cancer UK**

Leading UK charity for men with prostate cancer and prostate problems. Information and support from specialist nurses and other men going through the same experiences.

#### Website: prostatecanceruk.org

Find a local support group by visiting:

#### Website: www.prostatecanceruk.org/we-can-help/find-asupport-group

#### **Macmillan Cancer Support**

Macmillan provides practical, medical and financial support to people diagnosed with cancer and their families.

#### Website: www.macmillan.org.uk

#### Sexual Care After Radiotherapy Clinic

An appointment at our Sexual Care After Radiotherapy Clinic can provide a safe space to talk about any your concerns you may have related to sexual effects from radiotherapy.

#### Telephone: 01865 227 213

#### Email: sexualcareafterrt@ouh.nhs.uk

### **Further information**

If you would like an interpreter, please speak to the department where you are being seen.

Please also tell them if you would like this information in another format, such as:

- Easy Read
- large print
- braille
- audio
- electronic
- another language.

We have tried to make the information in this leaflet meet your needs. If it does not meet your individual needs or situation, please speak to your healthcare team. They are happy to help.

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