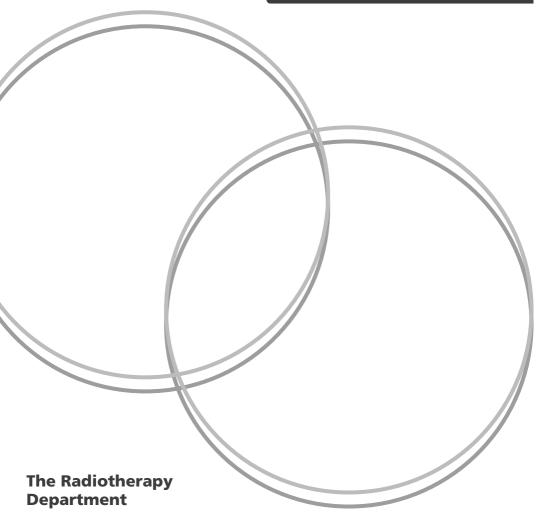


Intra-uterine and interstitial brachytherapy for gynaecological cancer

Information for patients



You have been given this leaflet as you have been recommended brachytherapy as part of your treatment for your gynaecological cancer. By giving you some idea of what to expect we hope to ease some of the worries you may have. Family members and friends may also find it helpful.

This leaflet is detailed, but is intended as a guide only. The brachytherapy radiographers and your doctor will have already talked to you about this treatment.

What is brachytherapy?

Brachytherapy is a form of high-dose radiation treatment, given from inside the body. Some people refer to it as 'internal treatment'.

Narrow tubes (applicators) are put inside your body and then a very small radioactive pellet (source) is put inside the applicators. This allows us to give a high dose of radiation to the tissue close to the source, without adding a large dose to the other tissues in your pelvis.

You will not be radioactive. Your body does not store up or give off any radiation with this treatment.

Why do I need to have brachytherapy?

In addition to the external beam radiotherapy you are having, we need to give a further dose of radiation just to your womb (uterus), cervix, vagina or vulval area. By using brachytherapy we are able to position the treatment directly in this area.

Brachytherapy procedure

You are likely to have four treatments within one week.

You will be admitted to hospital for this procedure and will need to remain in your hospital bed for the duration of your treatment (three days). You will be admitted via TDA (theatre direct admissions) on the morning of your first treatment.

Day one

On the morning of your first treatment you will be taken to the operating theatre, where you will be given either a general or a spinal anaesthetic. This means that you might be asleep (unconscious) during the procedure. If you are given a spinal anaesthetic, you will be given sedation to help you sleep during the procedure.

The doctor will examine you internally, then insert the applicators into your cervix and/or womb, vagina or vulva. If necessary, they will place soft gauze packing into your vagina to keep the applicators in the correct position. You will also have a urinary catheter (a narrow plastic tube) inserted into your bladder, as you will not be able to leave your bed during the rest of the treatment. The applicators and catheter will remain in place whilst you are in hospital.

After you have recovered (woken up) from the anaesthetic you will be taken for an MRI (magnetic resonance imaging) scan and CT (computerised tomography) scan. You will then be taken back to the ward to wait for your first treatment. During this time we will produce an individual treatment plan for you, using information from the scans and internal examination.

Later in the day you will be brought down to the radiotherapy department to have your first treatment.

Day two

You will be brought down to the Radiotherapy Department to have your second treatment, followed by a CT scan, then you will be taken back to the ward. Approximately 6 hours later, you will be brought down again to have your third treatment.

Day three

You will be brought down to the Radiotherapy Department to have a CT scan, then be taken back to the ward. Once the treatment plan is ready, you will be brought down again to have your fourth treatment.

When the treatment is completed the applicators will be removed, you will be returned to the ward where.

The ward staff will decide what time you are ready to be discharged home. This depends on how you are feeling after the treatment.

How is the treatment delivered?

The source is housed in a small machine. When the treatment plan is ready, the radiographers will connect the machine to the applicators. When the machine is switched on, the source travels into the applicators to deliver the treatment.

The radiographers will leave the room when you are ready to start the treatment. You will be asked to lie still and breathe normally. The radiographers will be watching you continuously on cameras from outside the room. If you need them to come back in just raise your hand.

You will not be able to feel the source travelling into the applicators or the treatment itself. The treatment will take between 5-10 minutes to deliver. When it is over, the source will travel back into the machine.

The machine will automatically switch itself off when the treatment is finished. The radiographers will then enter the room and disconnect the machine from the applicators.

Can I move while receiving the treatment?

While you are in hospital and have the applicators in place there are restrictions to how much you can move. You cannot completely bend your knees, sit up or roll onto your side. However, you will be able move your arms and upper body to get things off your side table. It is important to regularly do the exercises detailed on the following pages.

During this time you will be given painkillers through a special pump, called Patient Controlled Analgesia (PCA). This is connected to a cannula (narrow tube in one of your veins). You can control the amount of painkiller you receive, by pressing a button. This releases a set amount of medication into your body. The levels of painkiller are pre-set, so that you cannot have too much (overdose). Using the PCA will help you to be as comfortable as possible during your stay in hospital.

When the treatment is finished and you are ready to go home, a nurse will help you to get up out of bed. You should take your time getting up as this gives your body a chance to adapt after lying flat. Please let the nurse know if you feel lightheaded.

Exercises

During any period of inactivity, blood flow through the veins is decreased. You will be lying still for a long period of time, so it is important to carry out regular exercises. This stimulates your circulation, helping to prevent deep vein thrombosis (DVT) in your legs.

A DVT is caused by a blood clot forming in a vein. It is potentially life threatening if it moves, and could cause a blood clot in your lungs (a pulmonary embolism or PE).

We will give you elasticated stockings to wear during your treatment, as well as an anti-blood clot injection.

We also recommend the following gentle exercises:

- **1.** Point your toes towards the ceiling, then gently point them away. Repeat 10 times with each foot.
- 2. Bend your knee so that it lifts 10cm (3 inches) off the bed, then slowly straighten. Repeat 10 times with each knee.
- **3.** With both legs straight, push your knees into the bed and hold for a count of 4, then relax. Repeat 10 times.
- 4. Shrug your shoulders up and down 10 times.
- **5.** Pull your shoulders forwards then push them backwards 10 times
- **6.** Circle your shoulders 10 times (either forwards or backwards).
- **7.** Put your hands on your shoulders and circle your elbows 10 times, then change direction for another 10 times.
- **8.** With your arms stretched out and hands together, lift your arms above your head and slowly lower. Repeat 10 times.
- **9.** Take a deep breath in and hold for a count of 5, then gently release. Repeat 5 times.

Please ask the nurse caring for you if you need any help with these exercises.

Will I be able to eat and drink?

It is important that you eat and drink during your stay in hospital. You will not be able to sit up to eat, so try to choose food that is easy to eat whilst lying reasonably flat. You will be served food from the restaurant trolley that visits the ward at meal times.

Straws will be available for your cold drinks and hot drinks will be served in a beaker. You must drink plenty of fluids during your stay on the ward and for a few days afterwards, as this will help to prevent urine infections.

Please tell the nurse if you have difficulty eating and drinking whilst lying down.

What happens if I want to go to the toilet?

You will be given anti-diarrhoea medication to stop your bowels from working; usually loperamide. This will help prevent you from needing to use the toilet during your stay.

You will have a urinary catheter in place, which means that you won't need to get out of bed to pass urine.

Possible early/short-term side effects and risks during treatment

Bowels

Your bowels should begin opening again once you stop taking the anti-diarrhoea medication. If you have been experiencing diarrhoea as a side effect of your radiotherapy treatment, this may happen again for a few days.

If you have not opened your bowels within 3 to 4 days, increase your fibre intake (eat fruit, high-fibre cereals, wholemeal bread or pasta, etc.) to get them going. You may need to take a laxative (such as senna or Laxido) to help get things moving. You can get this from your local pharmacy or on prescription from your GP.

There is a low risk of bowel perforation (a small hole) and also of peritonitis (an inflammation of the thin layer of tissue that lines the inside of the abdomen). If either of these happen you will be given antibiotics.

You may also experience bowel frequency and urgency, looser stools, rectal pain/discomfort, bleeding from the bowel.

Bladder

After the catheter has been removed, you will need to pass urine before we can discharge you from hospital. This is to make sure that you are able to pass urine and there are no issues from the catheter being in place.

You may experience a burning sensation when you pass urine. This will be helped by continuing to drink plenty of fluids. If the burning sensation increases, lasts more than three days or your urine develops an unpleasant odour, you may have developed a bladder infection. Please contact your family doctor who may prescribe antibiotics to treat the infection.

There is a low risk of perforation of the bladder. If this happens you will be given antibiotics.

You may also experience urinary frequency and urgency, incontinence, pain, bleeding from the bladder

Uterus

There is a very small risk of perforation of the womb (uterus) during the procedure.

Infection

You will be monitored for infection and given antibiotics if you need them.

Vagina

After the treatment, the area treated may become sore and inflamed. You may also experience an increase in vaginal discharge or bleeding, itching or light bleeding (spotting). To reduce any discomfort and help minimise the risk of infection, it is best to bathe or shower as normal and change sanitary towels regularly. Do not use tampons, feminine deodorisers, douches or talc, as they could cause discomfort and irritation and possibly encourage infection.

Tiredness

You could feel quite tired or have less energy than usual, both during and after this treatment. This is completely normal. Try to rest and gradually build up to your normal activities as you feel able to.

You may also feel 'stiff' after lying in the same position for so long; take your regular painkillers, if required.

Skin

You might have discomfort from prolonged bed rest and there is a small risk of developing a pressure sore. Your skin will be monitored by the ward nurses.

Bleeding

There is a risk of heavy bleeding on removal of the applicators which may require vaginal packing.

Nausea

There is a chance that you might experience some nausea (feeling sick) or vomiting. Try to eat small amounts regularly and choose foods that are easy to swallow.

Possible late or long-term side effects

Bowels

1 in 5 women report some symptoms of late effects, such as a change in bowel function. These include bowel urgency, looser stools, frequency, rectal pain/discomfort, bleeding from the bowel, damage which may require surgery. These are usually minimal, with little or no impact on daily life. The effects of most of these symptoms may be controlled by a change in diet.

Less than 1 in 10 women report side effects that may affect quality of life. These may include large bowel narrowing or rectal bleeding.

Bladder

1 in 10 women report some symptoms, such as blood in the urine. These include urinary frequency, pain, incontinence, bleeding from the bladder, damage which may require surgery. These are usually minimal, with little or no impact on daily life. The effects of most of these symptoms may be helped by controlling the amount of fluid you drink.

Vagina

When the vaginal tissues heal themselves, small scars and adhesions (areas of tissue that have become connected) can form. The muscles supporting the vagina can also become hardened, causing them to lose their flexibility. This may result in your vagina becoming 'tighter' and shorter. This can make vaginal examinations in follow-up clinics and sexual intercourse more difficult and uncomfortable. You will be given vaginal dilators during your treatment, to help prevent the scars and adhesions forming and to keep your vagina as supple as possible.

The treatment can also affect the cells that produce the natural lubricant in your vagina. This can cause a 'dry' or unpleasant feeling which can make sexual intercourse uncomfortable. This may be helped with the use of a vaginal moisturiser and/or lubricant.

Small blood vessels can develop on the surface of the vagina, which can occasionally bleed. This may happen after using the dilators, intercourse, or a vaginal examination. It is usually nothing to worry about, but if you have any concerns or unexpected bleeding please contact either your gynaecological oncology nurse practitioner or your family doctor.

You may find the Macmillan booklet 'Cancer and your sex life: information for women' useful. Please ask a member of the treatment team for a copy.

Early menopause / infertility

Symptoms of menopause may start during or shortly after radiotherapy. You will also be unable to carry a pregnancy after radiotherapy and egg and hormone production will stop.

Fistula

Less than 1 in 100 women develop a fistula following this treatment (an abnormal connection between organs). If this occurs you will be referred to a specialist for further treatment.

Second cancer

Brachytherapy is associated with a small risk of causing another cancer many years later. For this reason, it is important that you come for your regular follow-up appointments and alert your medical team to any unexplained symptoms.

Follow-up arrangements

Telephone call

A radiographer will telephone you at home about two to three weeks after your course of brachytherapy has finished, to check your progress.

Hospital appointment

You will also have follow-up appointments at the hospital where you first saw your oncologist. The first of these will usually be four to six weeks after your last treatment. This appointment will be sent to you by post. It is at this appointment that your doctor will assess and discuss your progress, ask you about any continuing side effects and plan future appointments.

You will then be seen at regular intervals for the next five years. At these appointments the doctor will ask you questions about your general wellbeing and specifically about your bowel and bladder functions. They will feel your abdomen and do an internal examination. They will also discuss any future decisions about your care.

If you have any questions, remember to write them down and bring them to the appointment.

Will I have any scans or tests after the treatment has finished?

A scan may be done a few months after you complete your radiotherapy. It is not usually carried out straight away, as your body needs to recover from the treatment first. Your doctor will decide at future appointments whether any more scans or tests need to be done.

Who do I contact for advice once my treatment has finished?

For routine advice and queries up until your first follow-up appointment, please contact a member of the treatment team (as shown below). For urgent enquires, contact your family doctor.

After your first follow-up appointment, please contact your gynaecological oncology nurse practitioner or your family doctor.

How to contact us

During normal working hours:

(Monday to Friday, 8:00am to 6:30pm):

Brachytherapy radiographers Telephone: **01865 226 289**

Consultant Therapeutic radiographer

Telephone: 01865 227 213

Out of hours:

Oxford triage assessment team Telephone: **01865 572 192**

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.

Author: Gynae brachytherapy team

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Oxford University Hospitals NHS Foundation Trust

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