Radiotherapy to the female pelvis

Information for patients
This leaflet aims to help you and your family understand more about your cancer treatment.

It will be given to you in addition to the information you will receive from your doctor who is a clinical oncologist, a specialist in radiotherapy and chemotherapy. His/her team will be caring for you during your treatment. This team will include radiographers and nurses. You may also see a social worker, physiotherapist, occupational therapist or dietitian.

The leaflet describes radiotherapy planning and treatment. It also explains the side-effects which you may experience during and after treatment. Each person’s treatment will vary, so the information given is a general guide. The healthcare team looking after you will explain your treatment and the side-effects in detail. If you hear any words or phrases that you do not understand, please ask what it means. It does not matter how many times you ask.

Staff will make every effort to meet your individual needs or will direct you to the person who can help.

Please do not bring any valuables into hospital with you as the Trust cannot accept liability for loss or theft.

All your radiotherapy planning and treatment will take place in the Radiotherapy Department on Level -2, Bexley Wing, Leeds Cancer Centre (LS9 7TF).
Contacts
Radiotherapy Reception: 0113 206 8940
8.00am - 6.30pm Monday - Friday (Radiotherapy related queries only)

Review Clinic/Princess Royal Suite: 0113 206 7587
8.30am - 6.00pm Monday - Friday

Transport: 0113 206 8726

Hospital switchboard: 0113 243 3144

Consultants
Dr Cooper’s Secretary: 0113 206 8234
Dr Cardale’s Secretary: 0113 206 7854
Dr Anderson’s Secretary: 0113 206 8970
Clinic Clerk (appointments): 0113 206 8346

Clinical Nurse Specialist’s
Name: ..................................................................................................................

Telephone number: ..........................................................................................

Name: ..................................................................................................................

Telephone number: ..........................................................................................

Research Nurse
Name: ..............................................................................................................

Telephone number: ..........................................................................................

Emergency contact number
Tel: 0113 243 3144 and ask for the Oncology Patient Enquiries bleep holder. Contact this number if you feel seriously unwell.
What is radiotherapy?

Radiotherapy is the use of high energy X-rays and other types of radiation to treat cancer. The organs and tissues of the body are made up of tiny building blocks called cells. Radiotherapy causes damage to the cancer cells in the treated area. Although normal cells are also affected, they can repair themselves and are able to recover. Radiotherapy is a local treatment. This means it only affects the part of the body that is treated. You do not feel anything during your radiotherapy and you will not be radioactive. It is perfectly safe for you to be with other people, including children, throughout your treatment. You will have your radiotherapy on a treatment machine called a Linear Accelerator as shown here.

Radiotherapy is given by male and female therapy radiographers who are highly trained in the accurate planning and delivery of radiotherapy treatment. You will see your radiographers at each treatment session and they will be happy to answer any questions you may have.

Treatment for each patient is planned individually, and even patients with the same type of cancer may not receive identical treatment. Radiotherapy may be used as your main treatment, or combined with other treatments such as surgery and chemotherapy.
If you would like to visit the radiotherapy department before your treatment starts please call 0113 206 7603 to arrange a time. This visit can be very useful as you can find out more information about radiotherapy. It is a good opportunity to visit the hospital and tour the simulators and treatment areas. You will also have the opportunity to ask questions.

‘I was so pleased to see the machines before my treatment and the staff were so helpful and really put my mind at rest.’

Students
The radiotherapy department is a training centre for male and female radiographers. They are supervised at all times. If you do not wish students to be present, please speak to a member of staff. This will not affect your treatment or care.

Pregnancy
It is advisable that women do not become pregnant while having cancer treatment because the radiotherapy and chemotherapy / immunotherapy can have an effect on the unborn child. It is suggested that you use a barrier form of contraception (e.g. condoms). For more information see the ‘Contraception and pregnancy during cancer treatment’ leaflet. Please do not hesitate to ask your doctor or nurse if you have any questions or concerns about these issues.
Planning your treatment

Your first appointment for radiotherapy will be a planning appointment. This will be used to gather all the information we need to accurately plan your treatment. You will be contacted by phone, with an appointment for your radiotherapy planning session. Some tests and scans may be needed to help plan your treatment. We will explain which of these you will need when your appointment is made.

You may see your clinical oncologist (or a member of their team) at this appointment. This is an ideal opportunity for you to ask questions. If you wish to go ahead with the treatment and you have not consented for your radiotherapy treatment in another hospital, this will be completed at this visit. You will be asked to sign a form giving your consent to treatment.

What to bring with you

• a list of all questions you may have;
• an up-to-date list of all the medications you are taking (including inhalers, sprays, vitamins or herbal products);
• any medication that you may need during your visit;
• something to eat and drink;
• something to occupy yourself with as this first visit can be quite lengthy (up to two hours).

Your planning scan

In order to plan your treatment you will have a CT scan. This is done on a machine called a CT Simulator, shown in the photograph on the next page. This is a CT scanner that allows the images to be sent to the radiotherapy computer planning system.
There will be several members of staff present at your scan. These may include therapy radiographers, a mould room technician and a dosimetrist (the person who will produce the computer plan for your treatment).

Sometimes additional contrast is needed by placing a small cannula (needle) in your arm. A full bladder is needed for this scan and the radiographers will explain this procedure when you arrive.

**Contrast (dye)**

A special contrast agent, often called a dye, may be used for your scan to make specific organs, blood vessels and/or tissue types ‘stand out’. This can make it easier for the doctor to plan your treatment. This dye will not make you radioactive.

The dye is given through a small needle into a vein in your arm. You should tell the radiographer if you have any allergies, but they will go over this before they use any dye.

*The most common side-effects of the dye are:*

- warm or hot “flushed” sensation during the injection;
- a ‘metallic’ taste in the mouth, which usually lasts less than a minute or so.

You may also feel as if you have passed urine however this will pass very quickly and it should cause no ill effects.
There is a slight risk of an allergic reaction to the injection, such as a skin rash, but it may lead to other significant complications. The doctors in the radiotherapy department are trained to deal with any complications and again the risk involved is very small. You will be able to drive your car or go to work after your scan. The radiographers will advise you about drinking plenty of fluid after your injection.

The scan will be taken with you lying in the same position as for your treatment. The radiographers will draw some marks onto your skin, to be used as a reference for your treatment. You will then be scanned, which will only take a few minutes and at the end of the scan these marks will be replaced by permanent marks.

These marks are no bigger than a freckle and will be used each day for your treatment.

These permanent marks help us to reproduce your treatment with accuracy each day. It also means that you can wash without worrying about your marks coming off.

Following the scan you will be given the times of your first appointments on the treatment machine, this may be in a few days or weeks’ time. The radiographers will talk to you about any further appointments you have.
Having your treatment

When you arrive for your treatment you should go to the reception of the radiotherapy department. You will be given directions to your treatment machine.

The radiographers will explain what will happen and answer any questions that you may have.

You may need to have a full bladder each day for your treatment as for your planning scan. Please let the radiographers know if you have any worries about this.

The number of treatments you will be having will be confirmed and you will be given a list with all the appointments you need.

Treatment is normally given daily, Monday to Friday however your treatment may start on any day of the week. Wherever possible you will be treated at the time of day that suits you, but this cannot always be arranged or guaranteed. There may be occasions when you may have a longer stay in the department or be asked to attend at a different time, e.g. to see your oncologist.
Although you have the small permanent marks on your skin, the radiographers may need to draw around them each time you come for treatment. This is part of the quality checking procedure for your treatment. If you have pen marks on your skin you may prefer to wear older clothing as the marks may discolour fabric. It is also generally advisable to wear loose clothing around the treated area.

The radiographers will take images to check your treatment position before giving you your first radiotherapy treatment. You may need more routine images taken during the course of your radiotherapy. Treatment times vary from 10-20 minutes each day depending on the type of treatment you are having. The treatment machine is only switched on for a fraction of this time. For most of the time the radiographers are carefully placing you and the machine in the correct position for your treatment. The machine will move around you but does not touch you.

Once you are in the correct position the radiographers will leave the room to switch on the machine. You will only be alone for a few moments at a time. The radiographers will be watching you on a closed circuit TV monitor (CCTV) during treatment. The CCTV camera is not recording or saving any images.

There is also an intercom system so the radiographers can talk to you if needed. Please let the radiographers know if you would like to use the intercom system.

The machine stops automatically after your prescribed dose of treatment has been given. The machine can also be stopped at any time if needed. The treatment machines make a buzzing sound when they are switched on. You do not feel anything.
During your treatment we recommend you drink about two litres of fluid each day. This is the same as 3½ pints or about eight glasses.

**If you have a kidney problem and drinking this amount of fluid would be difficult for you please inform your radiographer, nurse or doctor.**

During the treatment course, please tell the radiographers how you are feeling. If you have any problems or questions, please let them know. Your clinical oncologist, or a member of the radiotherapy team will see you once a week in the radiotherapy review clinic to see how you are getting on. They will also monitor any side-effects you may be experiencing. You can expect to be in the department longer than usual on this day.

Some days the Radiotherapy Department may be very busy and your appointment time may be delayed. We will keep you informed of any delays, please see the information screens in the waiting areas.

Your appointments for Radiotherapy may not be all at the same time each day and may need to change. It is also possible that during your course of treatment you may miss a day’s treatment due to machine maintenance or bank holidays.

It is therefore important to speak to a health care professional before booking a holiday immediately following your radiotherapy.

For appointment queries please telephone the Radiotherapy Reception Desk on **0113 206 8940** for further advice.
Side-effects of treatment

Side-effects can be divided into short term (acute) effects that happen during or soon after your treatment, and long term side-effects occurring months or years later. Some side-effects are common, whilst others are rare. As your treatment progresses you may experience some side-effects. Not everyone will experience all of these reactions. If you do experience any of the following side-effects, do not worry, they are normal reactions to treatment and are temporary. They usually begin about halfway through the course of treatment, may last for several weeks after it has finished and then slowly settle down. Please tell us how you are feeling, particularly if your symptoms worsen, so that we can advise and treat you.

Tiredness (fatigue)

Radiotherapy can make you feel more tired than usual, especially if you have to travel a long way for treatment each day. Fatigue usually improves between six months to a year after treatment. Some people find that fatigue can last longer, up to two years or more.

Things you can do to help include:

• Gentle exercise can help reduce the symptoms of fatigue;

• Having enough to drink can prevent tiredness from dehydration;

• Small meals or snacks eaten more often than three times a day may be easier to face;

• Try to get a good night’s sleep where possible, a daytime nap may help;
• Try to ‘pace’ yourself, listen to what your body is telling you, rest if you need to;
• Pick out the things that you enjoy, and try to accept help for some other tasks;
• Little and often is the rule of thumb.

There is a Macmillan information leaflet available ‘Coping with fatigue’. If you would like a copy, or support with your fatigue please ask a member of staff.

**Skin reaction**
Radiotherapy can make the skin where you are having your treatment change colour and feel warm and itchy. Before you go in for your treatment the radiographer will explain what will happen to your skin and how to look after it. They will also give you a leaflet to take home. The same will happen at the end of your treatment.

Please be aware that smoking can make skin reactions worse.

If you are concerned about your skin reaction please talk to your radiographers or contact the nursing staff in Princess Royal Suite on **0113 206 7587**

**Hair loss**
Radiotherapy will only make your hair fall out in the area being treated. Usually the hair grows back after a few weeks of completing radiotherapy, but in some people this can be permanent.
Urinary problems
Radiotherapy can cause inflammation (cystitis) to the lining of the bladder. You may experience any of the following:

• need to pass urine often - called ‘frequency’;
• burning sensation on passing urine - called ‘dysuria’;
• you have the feeling that you cannot wait to empty your bladder - called ‘urgency’;
• blood in the urine - called ‘haematuria’.

Please let the doctor or radiographers know if you develop any of these symptoms. You may need a urine test to make sure that you do not have an infection.

You may need medication such as pain killers or antibiotics to help these symptoms.

You are advised to avoid coffee (caffeine) and alcohol. You should drink plenty of clear fluids and we advise drinking cranberry juice may also help.

Some fruit juices might interfere with the way some medicines work so please discuss this with your doctor or pharmacist before starting to drink cranberry juice.

Some women may find that they have mild incontinence for a few months after the treatment. We would advise using incontinence pads which are available from your local chemist. If you are finding incontinence a problem please contact your GP for advice.
Changes in bowel habits
Radiotherapy may cause inflammation and irritation of the bowel. This may cause watery diarrhoea and cramping pains in your abdomen. If you already have diarrhoea, it can make the problems worse.

You may experience frequent, loose bowel motions or diarrhoea. If you experience these symptoms whilst on treatment, please speak to a healthcare professional before taking anti-diarrhoea medications. Your specialist doctor will give you advice and may prescribe anti-diarrhoea medicines (such as Loperamide) to help control it. Drugs to reduce spasms or cramps (antispasmodics or muscle relaxants) can also be prescribed. It is helpful to drink plenty of fluids to replace those lost through diarrhoea.

Radiotherapy to the large bowel can make you feel that you have to open your bowels. This can be controlled with steroid suppositories or ointments which also contain an anaesthetic (such as Proctosedyl). Anti-constipation medicines may also help.

Macmillan toilet card
If you want to go to the toilet more often, or feel that you can not wait when you do want to go, you can get a card to show to staff in shops, pubs and other places.

The card allows you to use their toilet without them asking awkward questions. You can get the cards from your radiographer or the information lounge in the radiotherapy department.
Occasionally, the radiotherapy may cause some bleeding from the back passage. If you notice any bleeding, let your doctor know.

Radiotherapy may change the way the muscles in your bowels work. After you have opened your bowels, your muscles may continue to contract. This makes it feel as if something is left behind. This feeling is called Tenesmus. If you find you are having this problem please speak to your clinical nurse specialist for advice.

**Wind/gas from the bowel**

After radiotherapy you may find that you pass wind more often and have less control of when this happens. There can be many reasons for this:

- eating too many vegetables (see below);
- food containing starch and dietary fibre;
- some medication used to regulate bowel habits.

**Foods that may cause wind include:**

- pulses (such as peas, beans and lentils);
- vegetables from the brassica family (such as brussels sprouts, cabbage and artichokes);
- onions;
- high-fibre food such as bran;
- fizzy drinks.

If you are finding excess wind a problem please ask your clinical nurse specialist for advice.
Abdominal pain (colic)
Occasionally you may experience some abdominal discomfort and colicky pains, or you may feel bloated. If you experience any of the above, tell the radiographer before treatment as you may need to be examined by a doctor.

Loss of appetite
Your appetite may vary during your treatment. Try to eat well during your treatment and also drink about two litres of fluid each day. There is a leaflet available called ‘Eating well during your treatment’, please ask a member of staff if you would like a copy.

When radiotherapy has finished
Any of the side-effects that you experience, will gradually settle. You should start getting back to normal after about 4-6 weeks but it can take longer. Tiredness sometime lasts for several months and you may need to continue to rest more than usual.

You will be given an appointment to see the doctor about six weeks after the treatment is finished.

Long term side-effects
Severe long term side-effects of radiotherapy are uncommon due to careful planning of your treatment. It is unlikely that you will experience all of these but it is useful to know what may occur.

There may be long term bladder or bowel problems following radiotherapy.
Some patients may have constipation, diarrhoea, loose stools, feelings of urgency and increased wind.

In some cases you may need to pass urine more often or become slightly incontinent (leaking urine).

There is a very small risk of developing a hole (fistula) in the bladder or bowel into the vagina.

Radiotherapy can cause small hairline fractures to your pelvic bone. These are called pelvic insufficiency fractures. Pain from these fractures can be quite severe but can be controlled with pain killers.

Sometimes patients may suffer from neuropathic pain or nerve damage.

Radiotherapy can cause damage to the lymph nodes in your pelvis. This may result in lymphoedema, causing swelling of both legs or the pelvic area, although this is uncommon.

If you are having treatment to the vagina or vulva there may be skin changes and local oedema (Swelling). There is also a small risk of narrowing (Stricture).

If you have any concerns or worries please contact your clinical nurse specialist.

**Sexuality and Fertility**

Radiotherapy to the pelvic area may involve your ovaries. If this does occur you will no longer be able to have children. If infertility is a concern to you please discuss this with your doctor or nurse before you start your treatment.
Patients that have had cancer have told us that it affects how you feel about your body, and can change your sex life. Sexuality is an important part of who we are and should not be forgotten about. If you want to you can talk about these things in private with your key worker/clinical nurse specialist, or you can contact one of the organisations listed later for support. Macmillan also has some useful booklets that deal with these issues.

If you get a request for a smear test please contact your GP to ask to take you off the national register.

**Sexual intercourse**
You can have sexual intercourse during radiotherapy if you feel comfortable. You should use a barrier form of contraception e.g. condoms. Anxiety and worries about your illness and the future may cause you to lose interest in sex. The treatment can also make you feel tired and fatigued.

Although you may not feel able to have sex there may still be a need to express love and support. Talking with your partner may be helpful. You can resume sexual intercourse when you feel comfortable, this may be quite some time after your treatment has finished.

**Vaginal dilators**
One of the side-effects of radiotherapy to the pelvis is a change in the vaginal tissue, which leads to a narrowing and shortening of the vagina. This is sometimes called vaginal stenosis. The vagina may become less elastic, drier and tender, sometimes making sexual intercourse and pelvic examinations difficult and painful. Using a dilator regularly after treatment will keep the vagina open and the tissues more supple.
Water-based or silicone-based lubricating gel can be used to help the dryness and can be used with the dilator or when having sexual intercourse.

You should begin to use dilators as soon as you feel comfortable which is usually 2-4 weeks after finishing treatment. Try not to delay starting using the dilators, as narrowing of the vagina is easier to prevent the earlier you start to use the dilators. A member of the radiotherapy team will discuss this in more detail at the end of your treatment.

**Pelvic Floor Exercises**

You may have a more urgent need to use the toilet and difficulty in holding your bladder and bowels. This is because radiotherapy affects the muscles in your pelvic floor which are used when controlling your urges to pass water or stools. Doing pelvic floor exercises 3-4 times per day will help to strengthen these muscles and improve these side effects.

An information booklet called *'Feminine care after pelvic radiotherapy'* is available on request and gives extra information about dilators and pelvic floor exercises.

**Menopause**

Having radiotherapy to the pelvis usually stops your ovaries producing oestrogen. Your periods will stop and the symptoms of menopause may occur, although this may take several months. If you have severe menopausal symptoms please discuss this with your oncologist or GP. They may recommend hormone replacement.
The symptoms of early menopause can include:

- hot flushes and sweats
- vaginal dryness
- passing urine more often
- lower interest in sex
- tiredness and difficulty sleeping
- dry skin
- aches and pains
- mood swings, poor concentration, lower confidence and changes in memory.

You may find the above symptoms affect your sex life in some way.

Research at Leeds Cancer Centre

Leeds Cancer Centre is a major centre for cancer research. You may be asked if you would like to take part in clinical studies or trials linked to your condition. You do not have to take part in any trials, unless you wish to do so. If you do not wish to take part in a trial your treatment will not be affected in any way. If you do take part in a clinical trial you may meet a research nurse or radiographer, helping to run the trial.
Useful organisations and contact numbers

Leeds Cancer Support
Leeds Cancer Support complements care provided by your clinical team. We offer access to information and a wide range of support, in a welcoming environment for you, your family and friends.

We can be found in the information lounges in Bexley Wing and also in the purpose built Robert Ogden Macmillan Centre.

**Information Lounge Level 1 Outpatients Department**
Open from 10am - 4pm.  Tel: *(0113) 206 8816*

**Information Lounge Level -2 Radiotherapy Department**
Open from 8.30am - 6pm.  Tel: *(0113) 206 7603*

**Sir Robert Ogden Macmillan Centre**
Open from 10am - 4pm.  Tel: *(0113) 206 64983*

*All the above services can be emailed on: leedsth-tr.Cancersupport@nhs.net*

**The Sir Robert Ogden Macmillan Centre**
The Centre is on the St James’s Hospital site and offers a variety of support services including counselling, support groups and complementary therapies. These therapies include Reiki, relaxation and visualisation, hand and foot massage and many others. You can just drop in for a coffee and a chat anytime. Open from 10am - 4pm Monday to Friday.
National Organisations

Jo’s Trust
Gives support for women with cervical cancer.

Helpline: 0808 802 8000   Email: www.jostrust.org.uk

Ovacome (ovarian cancer support)
Support line for women with ovarian cancer and offers a range of information.

Tel: 0800 008 7054   Email: www.ovacome.org.uk

Target Ovarian Cancer
Gives information, materials and runs courses to support woman with ovarian cancer.

Tel: 020 7923 5470   Email: www.targetovariancancer.org.uk

Lymphoedema Support Network

Tel: 020 7351 4480   Email: www.ovacome.org.uk

Macmillan Cancer Support
This is a free telephone helpline to answer any questions you may have about living with cancer. They have a range of information dealing with emotional, practical and financial problems.

Freephone 0808 808 0000 - 9am to 8pm Monday to Friday
A textphone service for deaf and hard of hearing people is available on 10800 0808 808 0000.
website: www.macmillan.org.uk
Email: cancerline@macmillan.org.uk
Cancer Research UK
You can ask about issues related to cancer, including any financial, practical and emotional problems.
Tel: **0300 123 1022** or **0808 800 4040** to speak with a nurse
Email: cancerresearchuk.org
They can also send you written information.

College of Sexual Relationship Therapists
Contact if you have sexual problems as a result of cancer. Lists of therapists are displayed on their website.
Tel: **020 8543 2707** Email: info@cosrt.org.uk
Website: cosrt.org.uk

Relate
Gives advice, relationship counselling, sex therapy, workshops, meditation, consultations and support. You can choose to meet them face to face or via their website.
Email: relate.enquiries@relate.org.uk Website: relate.org.uk
Refreshments

A restaurant is available serving drinks, light snacks and hot meals. There is also a Café for hot drinks and light snacks; both of these are on Level 0.

Vending machines are also available on Level -2, Level 0 and Level 1. There is also a shop on Level 0 with books, papers and snacks.

Hotel Bexley Wing

The hotel is located on the 8th floor of Bexley wing and offers single and double rooms each with an en-suite, tea and coffee making facilities and digital television. Single rooms with wheelchair access are also available.

Patients are able to stay free of charge. There is a charge for relatives if they are staying in their own room.

For further details please contact the Hotel Co-ordinator on 0113 206 7687.

Out of hours please contact the Non-surgical Oncology Nurse Practitioner through main switch board on: 0113 243 3144.
Benefits and financial help

All patients with cancer are able to receive free prescriptions. Ask for a FPG2A claim form from your GP or the hospital.

Help with travel costs to and from hospital

If you are in receipt of Income Support / Income Based Employment Support Allowance / Working Tax Credit / Guarantee Pension Credit, you can claim:

• The cost of travelling by public transport.
• Petrol costs if travelling by car.
• Taxi fares in certain circumstances.

To get a refund for travel costs at the hospital, you will need to:

• Show proof of your current entitlement to one of the listed benefits.
• Produce your bus/train tickets or give your car mileage.
• You also need written proof from the department that you attended for treatment on the days you are claiming for.

To check if you are eligible because of low income please complete form HC1 available from the Information Lounge in the radiotherapy department and forward it to:

Health Benefits Division, Newcastle upon Tyne NE2 1AA.

The benefit advice above is correct at time of printing, however benefits sometimes change. Please ask at the information lounge or radiotherapy reception for the most up to date information.
Car Parking
Everyone who is coming for radiotherapy planning and treatment has free parking in the on-site multi-storey car park. Please ask for more information at the radiotherapy main reception desk.

A space for your notes...