

# Treating Bladder Cancer - A Quick Guide



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This is a brief summary of the information on 'Treating bladder cancer' from CancerHelp UK. You will find more detailed information on the website.

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## Bladder cancer stage and grade

### What is staging?

Cancers are divided into stages, depending on how far they have grown. The staging system normally used in bladder cancer is called TNM, which stands for 'tumour, node, metastasis'. So TNM staging takes into account how deeply the tumour has grown into the bladder, whether there is cancer in the lymph nodes, and whether cancer has spread to other parts of the body (metastasis).

### The T stages of bladder cancer

Cancer that is only in the innermost lining of the bladder is classed as 'carcinoma in situ' (CIS or Tis), or Ta. Cancer that has grown further into the bladder has a T number from 1 to 4. In T1, the cancer has started to grow into the connective tissue just under the bladder lining. In T4, it has spread outside the bladder. T2 and T3 are in between.



Ta, T1 and CIS tumours are classed as superficial or early bladder cancer. T2 and T3 are classed as invasive bladder cancer. T4 is called advanced bladder cancer. Below is a diagram that illustrates the different stages.

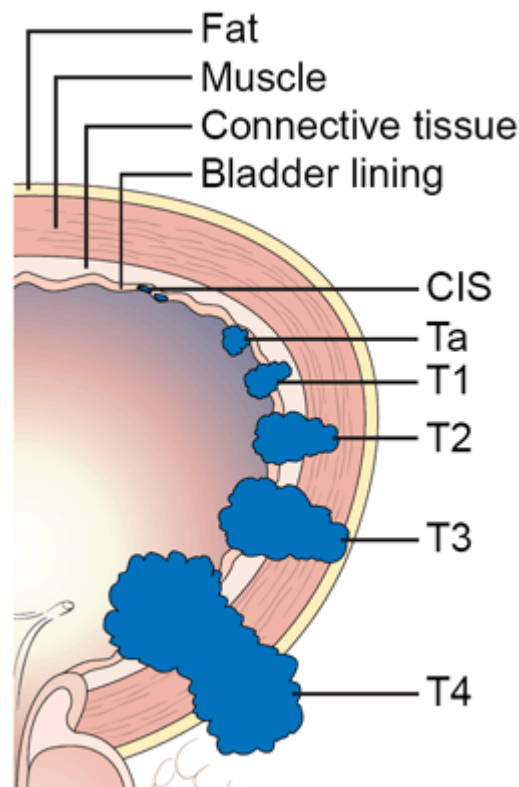


Diagram showing the T stages of bladder cancer © CancerHelp UK

## Grade

You may hear doctors talk about the 'grade' of your cancer. This means how well developed the cells look under the microscope. In low grade cancers, the cells look very like normal cells and tend to grow slowly. High grade cancer tend to grow more quickly and are more likely to spread. On CancerHelp UK, there are details of a new grading system for early bladder cancer that has been developed by the World Health Organisation.

## Bladder cancer statistics and outlook

Outlook means your chances of getting better. Your doctor may call this your prognosis. With bladder cancer, the likely outcome depends on how advanced the cancer is when it is diagnosed (the stage). The grade can also be important.

On CancerHelp UK, we have quite detailed information about the likely outcome of different stages of bladder cancer. The statistics we use are taken from a variety of sources, including the opinions and experience of the experts who check every section of CancerHelp UK. They are intended as a general guide only. For the more complete picture in your case, you'd have to speak to your own specialist.

## How reliable are cancer statistics?

No statistics can tell you what will happen to you. Your cancer is unique. The same type of cancer can grow at different rates in different people. The statistics cannot tell you about the different treatments people may have had, or how that treatment may have affected their prognosis. There are many individual factors that will affect your treatment and your outlook.

## Types of treatment for early bladder cancer

### Removing early bladder cancer tumours

If you have early stage bladder cancer, your specialist will remove the tumours during a cystoscopy, under general anaesthetic. The tumours will be sent to the lab so the pathologist can check the grade of your cancer cells.



## Treatment into the bladder

In some people, early bladder cancer comes back after surgery. So, after the cancer is removed, your specialist will give you chemotherapy treatment into the bladder. This is called intravesical therapy.

If you have a medium grade tumour, you are then likely to have a further course of chemotherapy into your bladder for 6 weeks. You may also have a course of chemotherapy treatments into the bladder if the cancer comes back after initial treatment.

If you have carcinoma in situ or a high grade tumour, your doctor will probably suggest a course of BCG treatment into the bladder to reduce the chance of the cancer coming back or spreading.

## Keeping an eye on you

After treatment you will need regular checkups for some years, to make sure the cancer doesn't come back.

## Removing early bladder cancer

If you have early bladder cancer, your specialist will remove the tumours during a cystoscopy under general anaesthetic.

After removing the tumours from the bladder lining, your doctor sends them to the laboratory for examination. The pathologist who examines them will tell your doctor the grade of bladder cancer you have.

After the surgeon has removed the areas of bladder cancer, they put chemotherapy into the bladder. This reduces the risk of the cancer coming back. Depending on the grade of your cancer, you may have further treatment into your bladder.

You will have check cystoscopies at regular intervals. Then if you do get further tumours, they can be removed while they are still at an early stage.

## Treatment into the bladder

Treatment into the bladder is called intravesical treatment. The aim is to treat the cancer and stop it coming back. You can have intravesical treatment with BCG vaccine or with chemotherapy drugs.

After surgery to remove bladder cancer, you have a tube (catheter) put into your bladder. The BCG or chemotherapy drug goes into your bladder through the catheter. You have to try not to pass urine for the next 2 hours.

## Intravesical chemotherapy

This helps to stop tumours growing back. You may have it just once, or have weekly treatment for 6 weeks. Bladder irritation is usually the only side effect. Some people get a rash on their hands or feet for a short time after treatment.

## Intravesical BCG

BCG is a vaccine for tuberculosis (TB). Doctors are not quite sure how it works for bladder cancer, but they know from research that it helps stop bladder cancers growing back. You usually have this treatment weekly for 6 weeks. You may then have it every few weeks or months for the next 3 years. You may get an irritated bladder or want to pass urine more often. Some people have flu symptoms after treatment. There is a very small chance that some of the TB could get into your system and give you TB symptoms. If you are worried, tell your doctor straight away.



## Follow up for early bladder cancer

After treatment for early bladder cancer there is still a chance that the cancer could grow back. So your specialist will want you to come for regular check ups. The best way to check your bladder is to have another bladder examination (cystoscopy). You will probably have a check cystoscopy 3 months after your treatment finishes.

The more time that passes, the lower the risk of the cancer coming back. But you may need to have regular cystoscopies for up to 10 years.

## What if the cancer comes back?

If you had early bladder cancer removed and it comes back inside the bladder, you can have the growths removed during cystoscopy as before. You will probably then have more intravesical therapy.

If your cancer is grade 3, has got more advanced, or is a return of carcinoma in situ, then you may need more intensive treatment. For more information about this, look in the 'treating invasive bladder cancer' section of CancerHelp UK.

## What to ask your doctor about treating early bladder cancer

- What stage is my bladder cancer?
- How does the stage affect my choice of treatment?
- What grade is my bladder cancer?
- How does the grade affect my choice of treatment?
- Why don't I need any more treatment after my cystoscopy?
- Why do I need more treatment after my cystoscopy?
- What type of treatment do I need?

- Why do you think this is the best treatment for me?
- What other types of treatment could I have?
- Are there any experimental treatments that might help?
- How often will I have to come for follow up appointments?
- What tests are there that will show if my cancer has come back?
- Is there a urine test that will show if my cancer has come back?
- How likely is it that my cancer will come back?
- How likely is it that my cancer will become invasive?
- What will happen if my cancer comes back?
- For how long will I need follow up?
- At what point can I consider myself cured

## Types of treatment for invasive bladder cancer

If you have invasive bladder cancer you will need to have either

- Surgery to remove part of the bladder
- Surgery to remove the whole bladder
- Radiotherapy

You may also have chemotherapy before or after your surgery or radiotherapy.

## Choosing between surgery or radiotherapy

You and your specialist will need to talk about the pros and cons of each treatment in your case. The main difference is that having radiotherapy means you can keep your bladder. But of course, there are side effects.



Surgery for invasive bladder cancer means having quite a big operation. The techniques for bladder cancer surgery have been improving over many years. If you need to have your whole bladder removed, you may need to have a bag on your abdomen (urostomy bag) afterwards to collect urine. Some people can have an operation to create a new bladder instead so that they can pass urine in the usual way

## Types of surgery for invasive bladder cancer

### Removing part of the bladder (partial cystectomy)

This is not suitable for most types of bladder cancer.

### Removing the whole bladder (radical cystectomy)

As well as removing the bladder, the surgeon removes the surrounding lymph nodes. In men, the surgeon will also take out the prostate gland. In women, the surgeon removes the tube that takes urine from the bladder to the outside of the body (the urethra). The surgeon may want to remove the womb and ovaries as well.

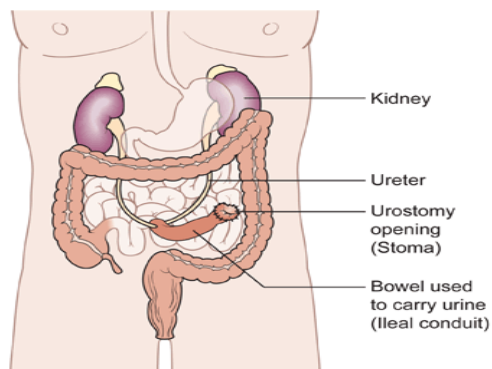


Diagram showing how a urostomy is made (ileal conduit)  
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When your bladder is removed, you need another way of collecting your urine. There are several different ways of doing this. The most common is to have a urostomy. This means having a bag outside your body to collect your urine.

Alternatively, some surgeons can use part of the bowel to make an internal pouch to hold your urine (continent urinary diversion). Or your surgeon may make an artificial bladder for you (bladder reconstruction). Or they may be able to make the back passage (the rectum) into a pouch where the urine is collected. After this operation, you pass urine out with the stools from your back passage. These operations are not suitable for everyone.

Look in the 'living with bladder cancer' section of CancerHelp UK for more information about life after surgery.

## Before your operation for invasive bladder cancer

You and your family need to understand exactly what your operation involves and how you will manage afterwards. If you are going to have a urostomy or continent urinary diversion, a stoma nurse will visit you. This is a nurse experienced in teaching people how to use and look after stomas. It might be helpful if your partner or someone close to you is there at the same time, so they can learn about stomas too.

## Tests

You will have blood tests and possibly a chest X-ray before your operation. If you have other health problems you may need other tests to make sure you are fit enough for the operation.



## Cleaning out your bowel

The surgeon will need to use part of your bowel to make the new way of collecting your urine. The cleaner your bowel, the less likely you are to get an infection after your operation. For a few days before the operation you will need to follow a diet sheet and take laxatives. You may have an enema when you come into hospital to make sure your bowel is empty.

## After your operation for invasive bladder cancer

After your operation you will have a drip for fluids and tubes to drain your wound. You won't be able to eat for a few days, but may have liquid feed through a tube until you start eating again. It is important to tell your doctor or nurse about any pain straight away, so they can find the right type and dose of painkiller for you.

## Your urostomy

You will have a stoma where your urine will drain out. The stoma has no nerve supply, so it doesn't hurt. It will get smaller as it heals. At first, your stoma nurse will change your bags. Gradually, they will teach you how to do this for yourself. After you go home, a stoma nurse or district nurse can visit to make sure you are coping.

## Continent urinary diversion, bladder reconstruction and recto-sigmoid pouch

As with a urostomy, you will have a stoma after a continent urinary diversion. At first you will have a catheter in it, connected to a drainage bag. If you have bladder reconstruction or a recto-sigmoid pouch, you will have a catheter into the new bladder for up to 3 weeks until the new bladder has healed.

## Side effects of bladder surgery

Men will probably have their prostate gland removed during the operation. This will mean that you are no longer fertile – you can no longer father a child. Also, the nerves that control erection can be damaged. For women, your vagina may be shortened during surgery. You may also have your womb removed. If so, you will no longer be able to have children.

## What to ask your doctor about bladder cancer surgery

- Why do I need an operation?
- Which type of operation should I have and why?
- What are the risks and benefits of surgery?
- What other treatment choices do I have?
- Is it possible for me to have a partial cystectomy?
- Is it possible for me to have bladder reconstruction?
- Is it possible for me to have continent urinary diversion?
- What does the surgery involve?
- Will you take anything else out as well as my bladder?
- Will I have to wear a bag?
- How do we decide where the stoma and bag should be placed?
- Is there anyone you know who has had this operation who I could talk to?
- Is there a stoma nurse I could talk to?
- Where do I get the stoma equipment from?
- Do I have to pay for it?
- What does the preparation for the operation involve?
- What are the short and long term side effects of the operation?
- Will I have any pain afterwards?



- Will the operation affect my sex life?
- What happens if my cancer comes back?

### Radiotherapy for invasive bladder cancer

Radiotherapy uses high energy rays to kill cancer cells. Your specialist may suggest radiotherapy instead of surgery if you want to try to keep your bladder, or try to keep your potency (ability to have an erection). If your cancer comes back in your bladder after radiotherapy, your doctor will probably recommend that you have your bladder removed (cystectomy).

### Having your treatment

You have radiotherapy in the hospital radiotherapy department. Treatments are usually once a day, Monday to Friday, for up to 6 or 7 weeks. Each treatment only takes a few minutes. Chemotherapy is sometimes given before radiotherapy. Or you may have both treatments at the same time (concomitant chemoradiation).

### Side effects

Radiotherapy generally causes tiredness and sore, red skin in the treated area. It can also irritate the bladder and bowel. This can cause a need to pass urine very often, pain when passing urine and bowel problems, usually diarrhoea. Drinking plenty of water will help with bladder symptoms. Your doctor may be able to give you anti-diarrhoea tablets.

Side effects usually last a few weeks after your treatment is over. A few people have long term side effects. Radiotherapy for bladder cancer can also affect your fertility. There is more about how radiotherapy affects sex and fertility in the 'radiotherapy side effects' section of CancerHelp UK.

### Chemotherapy for invasive bladder cancer

Chemotherapy uses anti-cancer or 'cytotoxic' drugs to destroy cancer cells. You have them into a vein (intravenously), or as a tablet by mouth. You may have chemotherapy before or during radiotherapy, or before or after surgery. If you have chemotherapy before surgery or radiotherapy, it can shrink the tumour and aims to make the treatment more effective. Chemotherapy after surgery may help to stop the cancer coming back.

You can find out more about chemotherapy in the main 'chemotherapy' section of CancerHelp UK. This gives more details about what chemotherapy involves, side effects and living with chemotherapy.

### The drugs and side effects

Doctors use combinations of chemotherapy drugs to treat bladder cancer. The drugs most commonly used include gemcitabine, cisplatin, carboplatin, methotrexate, vinblastine and doxorubicin. Your specialist will decide which is most suitable for you based on your individual case. You'll probably hear them talk about your treatment using the initials of the drugs you'll be having, for example, MVAC - methotrexate, vinblastine, Adriamycin (doxorubicin) and cisplatin, or GC - gemcitabine and cisplatin.

### Side effects

All chemotherapy has side effects. Which ones you get depends on the drugs and dose you have and your body's individual reaction. Most side effects only last a few days. The most common side effects of bladder cancer chemotherapy are

- A drop in the number of blood cells



- Feeling sick
- Hair loss or thinning
- Sore mouth and mouth ulcers
- Feeling tired and run down
- Loss of fertility (ability to have a baby)

The drug doxorubicin (Adriamycin) can make your urine turn red for a couple of days after treatment. This does not mean you have blood back in your urine.

### Follow up for invasive bladder cancer

After your treatment has finished, your doctor will want you to have regular check ups. This is to see how you are recovering, and to pick up any early signs of the cancer coming back. At first you will usually have a check up at least every 2 to 3 months. If all goes well, they'll gradually get further apart.

### Tests you may have

At check ups, your doctor will examine you. They will ask how you are feeling and whether you have any symptoms, or whether anything is worrying you. You will have a urine test. At some visits you might have a scan, X-ray or cystoscopy as well.

If you are worried or notice any new symptoms between check ups, tell your doctor straight away. You do not have to wait for your next appointment.

### Worrying about your appointments

You may find your check ups quite worrying, especially at first. It may be helpful to tell someone close to you how you are feeling. Having someone come along with you to your check ups may help. If you find worry is seriously affecting your life, you may need more help. It is quite common nowadays for people to have

counselling after cancer treatment. To find out more about counselling, look in the 'coping with cancer' section of CancerHelp UK.

### What to ask your doctor on treating invasive bladder cancer

- What sort of treatment do I need?
- What are the risks and benefits of this treatment?
- Is there any choice of treatments?
- Could you arrange for me to have a second opinion?
- For how long will I be having treatment?
- Can I be treated as an out patient or will I have to be in hospital?
- How often will I have to come to hospital?
- If I have to come to hospital every day, is it possible to get help paying my fares?
- Are there any side effects to the treatment?
- Is there anything I can do to help with the side effects?
- What are the long term effects of this treatment?
- Are there any clinical trials I could take part in?
- What would taking part in a clinical trial involve?
- What happens if my cancer comes back?

### What is advanced bladder cancer?

Advanced bladder cancer means the cancer has spread to another part of the body from where it started in the bladder. Your cancer may be advanced when it is first diagnosed. Or it may have come back some time after you were first treated.



This is called recurrent cancer. Not all bladder cancers will spread or come back.

### Where does bladder cancer spread?

The cancer may grow into areas near your bladder, such as the ureters, urethra, prostate or vagina. This is called local spread. Cancer that has spread to a different part of the body is called secondary cancer. Bladder cancer is most likely to spread to the lymph nodes in the pelvis, abdomen or neck, or to the lungs, the liver or the bones.

### The symptoms of cancer spread

These will depend on where the cancer has spread to. A common symptom of cancer spread is weight loss. Other symptoms can include swollen legs, pain in your bones or abdomen (tummy), lumps in your abdomen or neck, or yellowing of the skin and eyes (jaundice). Some people feel increasingly tired when their cancer has spread.

**Remember** – not everything that happens to you is caused by cancer. You are just as likely to get aches and pains as anyone else. But do check with your doctor if a symptom is worrying you.

### Types of treatment for advanced bladder cancer

If your cancer has grown through the bladder wall or has spread to lymph nodes but no further, removal of the bladder or radiotherapy to the bladder may cure it. These treatments would be followed by chemotherapy into a vein.

For bladder cancer that has spread, you may have chemotherapy, radiotherapy or minor surgery to control the cancer and

reduce symptoms for some time. Your doctor will discuss the options with you.

### Chemotherapy

There has been quite a bit of success using chemotherapy to treat advanced bladder cancer. But chemotherapy for advanced bladder cancer can be quite intensive.

### Radiotherapy

Radiotherapy can help relieve the symptoms of advanced bladder cancer. For example, if you have pain from cancer that has spread to a bone. The radiotherapy will not cure your cancer but it can improve the quality of your life.

### Surgery

If you still have cancer inside your bladder that is causing symptoms, your specialist may suggest surgery to remove it. This is called 'debulking' and is similar to having a cystoscopy. Your doctor may also suggest an operation if the cancer is blocking your ureters or kidney.

### Follow up for advanced bladder cancer

After your treatment has finished, your doctor will want you to have regular check ups.

### Tests you may have

At check ups, your doctor will examine you. They will ask how you are feeling and whether you have any symptoms, or whether anything is worrying you. You may have a urine test. At some visits you might have a scan, X-ray or cystoscopy as well.

If you are worried or notice any new symptoms between check ups, tell your doctor straight away. You do not have to wait for your next appointment.



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## What to ask your doctor about treating advanced bladder cancer

- Now that my cancer has come back, what treatment do you recommend for me?
- What will the treatment do?
- What are the side effects likely to be?
- What happens if my cancer comes back again after this treatment?
- Are there any experimental treatments or trials that you would recommend for me?
- Is there a counsellor I could talk things through with?
- What happens if I decide not to have treatment?

## Bladder cancer research

All treatments must be fully researched before they can be adopted as standard treatment for everyone.

This is so that we can be sure they work better than the treatments we already use. And so we know that they are safe.

First of all, treatments are developed and tested in laboratories. Only after we know that they are likely to be safe to test are they tested in people, in clinical trials.

There is research looking into prevention and causes of bladder cancer, how to diagnose it earlier, radiotherapy, chemotherapy, combining treatments, biological therapies and giving drugs using an electric current.

## What to ask your doctor about bladder cancer treatment

- What stage is my bladder cancer?
- How does this affect the treatment I need?
- Do you expect this treatment to cure my cancer?
- What are the chances of my cancer coming back?
- Will there be any other treatment I am likely to need in the future?
- Are there any new or experimental treatments that I might benefit from?
- Are there any clinical trials going on in bladder cancer that I might join?
- Is it possible for me to get a second opinion?
- How often will you want to see me when my treatment is finished?
- What will happen at my follow up appointments?
- What should I do if I am worried between appointments?



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## Notes

### More information

For more information about bladder cancer, visit our website  
<http://cancerhelp.cancerresearchuk.org>

You will find a wide range of detailed, up to date information for people affected by cancer, including a clinical trials database that you can search for cancer trials in the UK. You can view or print the information in a larger size if you need to.

For answers to your questions about cancer call our Cancer Information Nurses on **0808 800 4040** 9am till 5pm Monday to Friday

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