

Intravesical BCG treatment following a transurethral resection of bladder tumour (TURBT)

This leaflet will give you an overview of BCG therapy, how it is given and any side effects it may cause. Please read it carefully as it contains information that will help you to minimise any possible problems the treatment may cause. If you have any concerns or would like further information please do not hesitate to contact one of the Urology team on the numbers at the back of the leaflet.

What is cancer?

Your body is made up of millions of cells. When body tissues become old or damaged new cells grow and divide to replace them. Occasionally this process gets out of control and the cells continue to divide and grow to create a tumour.

A tumour can be benign or malignant. Benign tumours do not invade healthy tissue or spread around the body, they are not cancers. Malignant tumours have the ability to invade healthy tissue and to spread to other areas of the body. These types of tumour are cancerous. You may also hear your cancer referred to as a neoplasm, growth, polyp or wart. If you are confused please feel free to ask a nurse or doctor to explain things to you.

Why do I need further treatment after my TURBT?

Many bladder cancers are superficial and will never develop into a life threatening condition. Unfortunately some do come back after removal by TURBT. However, we know that by regularly looking into the bladder (cystoscopy) and with the use of treatments such as BCG we can reduce the risk of this.

What is intravesical BCG treatment?

BCG stands for Bacillus Calmette–Guerin. It is a weakened strain of the tuberculosis bacteria. It is not fully understood how BCG works but is believed that the treatment causes inflammation within your bladder which, in turn activates your immune system to destroy cancer cells. The treatment is given directly into your bladder so it can coat the entire bladder lining.

A six week course of once-a-week treatment of BCG has been shown to decrease tumour recurrence by up to 42% when compared to surgery alone.

What should I do before coming for treatment?

- You should not drink for 2 hours before coming for treatment. This is so you are able to hold the fluid more easily inside your bladder and also to keep the concentration of the fluid at an acceptable level.

- If you normally take diuretics (water tablets) it is best not to take these until after each treatment. If you are concerned about any of your medications please feel free to ask the nurse for advice.
- **Please bring a fresh urine sample** each time you come for a bladder treatment. This is to check that you do not have a urine infection.

What happens when I come for treatment?

The nurse will then insert a fine tube into your water pipe (catheter). Any remaining urine will be drained from your bladder and the BCG is then put into your bladder through the catheter.

What happens next?

- The catheter will be removed and you will be asked to keep the solution in your bladder for at least two hours. **You may feel like you need to pass urine but try very hard not to.** The nurse has only put a very small amount of fluid in your bladder. If you are able, it is a good idea to walk around a bit as this helps the solution to fully coat the surface of your bladder. If you have difficulty moving around or keeping the solution in your bladder the nurse may leave the catheter in for the duration of each treatment. If this is the case she will explain this procedure to you.
- The first treatment you will then be asked to remain in the department for the two hours and empty your bladder before leaving. For men this is best done sitting on the toilet to minimise the risk of splashing the drug. You will also be asked to wash your hands and private parts with soap and water. The procedure is then complete and you are free to go home.
- If all has gone well, after future instillations you will be able to leave after the solution has been instilled in to the bladder

What should I do for 6 hours after each treatment?

- Men – sit down to pass urine to prevent spraying the BCG onto your skin.
- Each time you pass urine you should pour household bleach around the rim of the toilet and leave it for 15 minutes before flushing.
- Each time you pass urine wash your hands and private parts with soap and water.
- If you leak urine onto your clothes wash well in hot water or on a hot washing machine cycle.

What should I do for 48 hours after each treatment?

- Drink at least 2-3 litres of fluid a day for at least 48 hours after each treatment to help flush the treatment out of the bladder.
- If you are having sexual intercourse you will need to use a condom during the treatment to protect your partner, this is recommended for the duration of the 6 week course and the duration of the 3 week maintenance course.

What are the risks of BCG?

You have been offered BCG treatment because it is very successful in reducing the risk of your bladder tumour returning. BCG is generally well tolerated but there may be some mild side effects. Your doctor should explain these side effects of treatment to you. Feel free to ask questions if there is anything you are unsure of.

You will then see a nurse in the clinic who will go through everything again with you and ask you to sign a consent form to show that you understand the risks and benefits and that you are happy to proceed. Feel free to ask questions if there is anything you are unsure of.

It is possible that you will notice:

- **Discomfort on passing urine and passing urine more frequently than usual.** This occurs in up to 90% of patients and should settle within 48 hours. The discomfort and frequency is caused by the BCG solution irritating the lining of the bladder. Severe discomfort and frequency occurs in up to 18% of patients. Drinking plenty of fluids and taking regular painkillers should help these patients.
- **Blood in your urine.** You may notice that you pass bloodstained or pink looking urine for up to 48 hours after treatment. You should aim to drink 2-3 litres of fluid a day to reduce this. However, you may want to decrease this intake after 5pm so you do not disturb your sleep. If symptoms do not improve after 2-3 days you should contact your GP. Up to 24% of patients may experience heavy bleeding. If this occurs please contact one of the urology team listed at the back of this booklet. If it is after 4pm or at weekends you should contact your GP.
- **Smelly or cloudy urine.** This may indicate that you have a urine infection. You should contact your GP as you may need antibiotics.
- **Fever.** 10-15% of people experience flu-like symptoms. They may feel cold and shivery or ache all over for a few hours after treatment. Taking Paracetamol regularly can help with this. However, if your temperature is not relieved by Paracetamol or reaches 38.5°C or above you should contact your GP or one of the urology team listed at the back of this booklet. We ask you to do this because there is an extremely small risk that the BCG drug can get into your bloodstream and if this is the case you may need to be given anti-tuberculosis drugs.
- **Tiredness.** Some people notice that they feel very tired whilst having a course of BCG. This should resolve once treatment is finished.
- **Nausea and diarrhoea.** This is very rare and should settle once treatment is completed. However, if it is a problem drugs can be prescribed to help.

What happens once all the treatment is finished?

You will need to have a cystoscopy (look into the bladder) under a general anaesthetic 8-10 weeks after treatment has finished. This allows the doctors to see how well the treatment has worked. You will receive an appointment for this in the post.

What else should I know?

If you or your partner are pregnant or are planning to become pregnant, please inform your consultant and nursing team **prior** to starting the treatment.

Maintenance BCG

Maintenance BCG is given to patients who have had a good response to the BCG starter course. A course consists of a dose once a week for 3 weeks (not 6 as in the first course). This re-stimulates the bladder encouraging it to maintain the benefits from the initial course.

The first dose will be given 3 months after the starter doses.

After a further 3 months a check cystoscopy will be carried out, usually under a local anaesthetic. Three further doses of BCG will be given approximately 2 weeks later.

A check cystoscopy will be carried out every 6 months usually under local anaesthetic, with 3 doses of BCG given about 2 weeks later.

The BCG will always be given after a check cystoscopy to ensure the bladder remains clear and that it is appropriate to give the BCG.

A letter will be sent to you giving the date and time of your maintenance BCG. If it is not convenient please contact **the Uro-Oncology nursing team on 0118 322 7905** to arrange a more convenient time.

It is important to remember to limit your fluid intake before you come in for your BCG and to bring a urine sample with you. You also need bleach in the house to use in the toilet after passing urine for the first 6 hours.

Typical timetable for maintenance BCG after completion of the starter (induction) course is:

3m after induction	6m after induction	12m after induction	18m after induction	24m after induction	30m after induction	36m after induction

Who can I contact if I have any questions?

Uro-Oncology Nursing Team: Tel: 0118 322 7905

Email: urology.nurses@royalberkshire.nhs.uk

We work Monday to Friday 8.30am-4pm. There is an answer machine and we will return your call if we are not in the office.

Out of hours: either contact your GP service, NHS 111 or Hopkins Ward on 0118 322 7274.

To find out more about our Trust visit www.royalberkshire.nhs.uk

Please ask if you need this information in another language or format.

Urology / Uro-oncology

Reviewed: December 2021

Next review due: December 2023

Compassionate

Aspirational

Resourceful

Excellent