

may be discharged on the day of surgery. Most patients should be able to resume usual activities and return to work in a few weeks.

The raw area in the bladder lining remaining after such a scraping will heal over, initially with a scab and, eventually, with normal lining tissue. It is not unusual to have increased frequency and urgency of urination for a few weeks after bladder tumour resection. There may also be some burning with urination. There may be a bit of blood visible in the urine for a few weeks after bladder tumour resection. Occasionally, a few blood clots may be seen, particularly after about two to four weeks when the scab comes away.

### Follow-up after a bladder tumour resection

The tissue removed at surgery will be carefully examined and a detailed report will be available to your urologist. It will be important to review the type of tumour that was removed as well as its aggressiveness (**tumour grade**) and whether it has invaded through the lining of the bladder (**tumour stage**). Additional investigations are often carried out to determine the extent of the tumour.

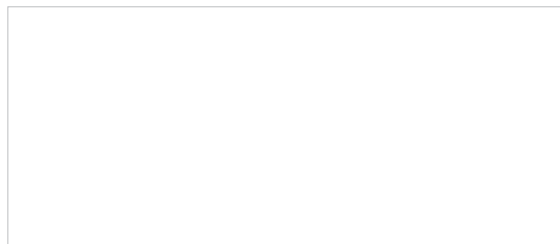
Most bladder tumours are confined to the bladder lining or **superficial**. Even these superficial tumours however have a tendency to recur. It will be important to monitor your bladder closely with regular bladder inspections (**surveillance cystoscopy**). The frequency of these check-ups will be outlined by your urologist.

In some cases your urologist may recommend additional treatments in order to decrease the chance of tumour recurrence. These treatments may involve placing a drug directly into the bladder through a small catheter. Effective medications for such treatment include BCG and mitomycin.

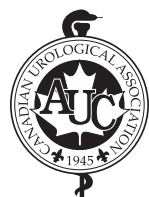
Occasionally, more aggressive tumours may invade into the muscle of the bladder wall or spread to other parts of the body. This requires more intensive investigation and treatment, which may include surgery (removal of the entire bladder), chemotherapy or radiotherapy.

### Conclusion

Bladder tumours are common and often well controlled with regular and ongoing follow-up.



BTME0107



The Canadian Urological Association produced this publication.

The information in the publication is not intended to convey medical advice or to substitute for direct consultation with a qualified medical practitioner. The Canadian Urological Association, Inc., disclaims all liability and legal responsibility howsoever caused, including negligence, for the information contained in or referenced by this brochure.

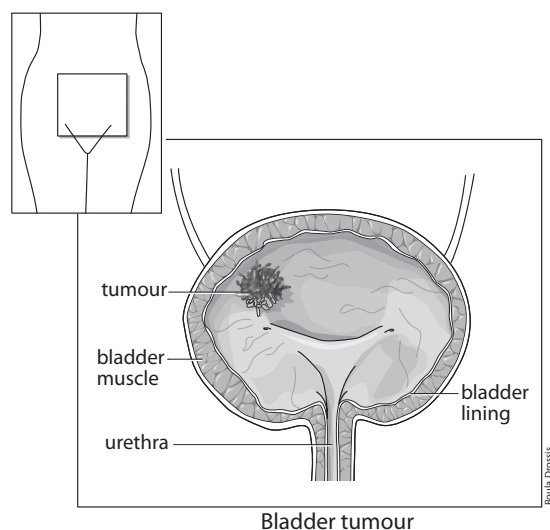
© 2007. Canadian Urological Association, Inc. All Rights Reserved.

## Bladder Tumour



*You have been found to have a growth or tumour of the lining of the bladder.*

You have been found to have a growth or tumour of the bladder lining. The bladder is a hollow organ, which stores urine produced by the kidneys. Urine passes from each kidney into the bladder through a tube called a ureter. An outer layer of muscle surrounds the inner lining of the bladder. When the bladder is full, these muscles contract to expel urine through the bladder outlet, the urethra.



The bladder is lined with cells called transitional cells. The majority of bladder tumours arise from these cells and are called **transitional cell carcinoma (TCC)**. TCC is a type of cancer and represents about 90% of bladder tumours. Other types of bladder cancer include squamous cell carcinoma and adenocarcinoma. There are also benign (non-cancerous) tumours of the bladder, which generally do not come back after they are removed.

Although the exact cause of bladder cancer is unknown there are certain risk factors

associated with the disease. **The use of tobacco is a major risk factor** as cigarette smokers are more likely to get bladder cancer. Pipe and cigar smokers are also at risk. Some workers have been found to be at higher risk of bladder cancer because of toxin exposure in their workplace.

## Symptoms and diagnosis

Bladder tumours are often diagnosed during the investigation of blood in the urine (**haematuria**). Occasionally, these tumours can cause urinary problems with pain or increased frequency and urgency to void.

The diagnosis of bladder tumours is made after visual inspection of the bladder (**cystoscopy**). At times, they are identified on ultrasound examination of the bladder or inspection of the urine for cancer cells (**cytology**) or other urinary markers.

Once a tumour has been discovered it can be biopsied at the time of cystoscopy to make a diagnosis. More often, your urologist will recommend a surgical procedure to have the tumour scraped away using an instrument passed through the urethra (**trans-urethral bladder tumour resection or TURBT**).

## Bladder tumour resection

A bladder tumour resection is often performed at the hospital. You will be contacted and given instructions concerning the time, date and location of the procedure and any necessary preoperative investigations. The risk of bleeding is increased in patients taking blood thinners, aspirin, some arthritis medications,

or many herbal supplements. These drugs normally should be stopped prior to surgery. Please discuss this with your doctor.

Your anesthesiologist will have discussed the various options for preventing you from experiencing pain during the surgery, usually either by **spinal anaesthetic** (“freezing” you from the waist down with a needle in the back) or by **general anaesthetic** (putting you to sleep). You may be given antibiotics prior to your surgery to decrease the risk of getting an infection.

This operation is performed with an instrument called a resectoscope, passed into the bladder through the urethra. No skin incision is required. The bladder tumour is scraped away and removed in small pieces. Bleeding is controlled with cauterization by electric current. The entire procedure usually takes no more than 90 minutes.

At the end of the operation, a **catheter** (drainage tube) may be placed into the bladder through the urethra. A water solution may be used to flush the bladder to wash out any blood in which case you may remain in hospital for a day or two. Your doctor may prescribe a chemotherapy drug to be placed in your bladder soon afterwards in order to decrease the chance of the tumour coming back.

## After your surgery

The catheter may be left in place up to two days until the urine is fairly clear. When you are voiding satisfactorily, you will be discharged, usually about one to three days after your operation. In some cases, you