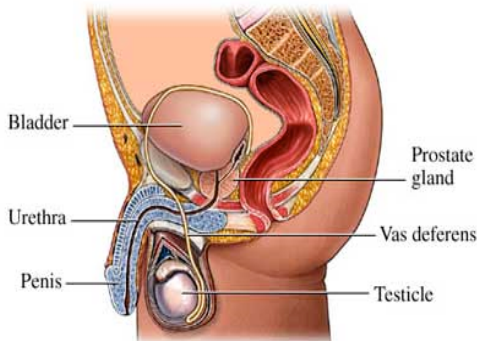


## Transurethral resection of the prostate (TUR-P)

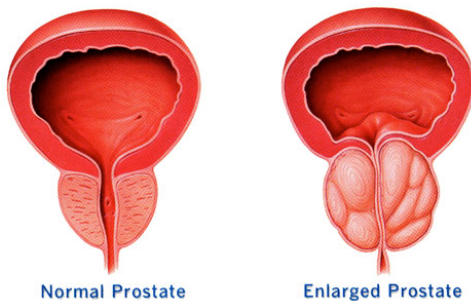
### What is your prostate?



Your prostate is part of your reproductive system. It is a plum-sized gland is found at the base of your bladder. It surrounds your urethra (waterpipe). Your prostate produces nutrients for your sperm and makes up part of the milky fluid when you ejaculate.

### Why is my prostate enlarged?

From around the age of 40, the cells of your prostate begin to swell, increasing the size of your prostate. This is called benign prostatic hyperplasia (BPH), which means extra growth of normal (non-cancerous) cells. This isn't usually serious, but sometimes the prostate grows so large that it puts pressure on your urethra.



This can make it difficult for you to pass urine and may cause other urinary symptoms such as

- Not being able to empty your bladder completely, so you may
- need to go to the toilet more often (frequency)
- Having a weak urine flow and
- Having to strain to pass urine

In the long term a benign prostatic hyperplasia may lead to various degrees of urinary retention with subsequent deterioration of your kidney function.

### What is a TUR-P?

A transurethral resection of the prostate (TUR-P) is an operation to remove the parts of your prostate that are pressing on your urethra, to make it easier for you to pass urine. It involves a surgeon inserting a special tube down your urethra, through which a heated wire loop is passed. This wire loop is used to shave off the overgrown areas of your prostate.

### Why do I need a TUR-P?

Not everyone who develops an enlarged prostate will need treatment. However, your consultant has recommended a TUR-P because of your symptoms. A TUR-P is the most common type of surgery for an enlarged prostate. It will make it easier for you to pass urine and may relieve your other symptoms, although it will not always resolve all of them.

If you do not have treatment your prostate will grow, which may make your symptoms worse and increases the possibility of problems with your bladder and/or kidneys.

### Are there any alternatives?

There are several alternative treatment options outlined below, although they will not necessarily be appropriate for you. Your consultant will discuss these with you if they are suitable for your situation:

**Observation of your symptoms:** some men may want time to think about surgery, or want to wait and see if their symptoms become any worse before opting for surgery.

**Medicines:** there are two types of medicines available. They either shrink your prostate or relax the muscles in your prostate and bladder to improve the flow of urine. However, the effects only last as long as you take the medicines and you may have already tried this option without success.

**Laser prostatectomy:** this is an operation to remove the parts of your prostate that are pressing on your urethra, to make it easier for you to pass urine. It involves a surgeon inserting a special tube down your urethra then using a laser to destroy the prostate tissue or cut it into pieces.

**Open surgery:** this is considered if your prostate is too large to be removed endoscopically.

**Prostatic stent:** This is where an expandable tube is inserted to push back the prostatic tissue, widening your urethra.

**Use of a permanent catheter:** This is an option for men who do not want, or who are not able to have a TUR-P.

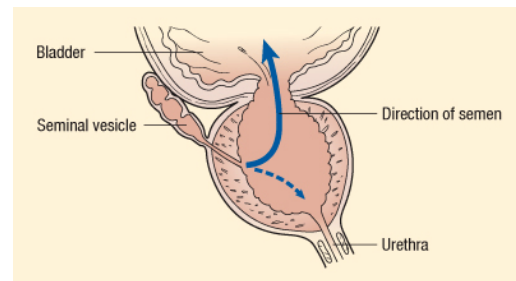
### Preparing for your surgery

You will be offered a choice of dates for your surgery. It is important that you attend your pre-admission appointment which is given to you when you are offered a date for surgery or sent to you in the post. We will assess your suitability for surgery and anaesthetic at this appointment. If you do not attend, we may have to cancel your surgery. You will come into hospital the day of your surgery and should expect to stay for three to four days. You will be shown around the ward when you come into hospital.

### What are the risks of a TUR-P?

There are risks associated with any operation. Your consultant will explain the specific risks for a TUR-P, outlined below, in more detail before asking you to sign the consent form:

**Retrograde ejaculation:** 75% of men do not produce semen when they have an orgasm after a TUR-P. This is a long term side-effect. You will still be able to have an erection and orgasm, but your semen will “backfire” into your bladder.



**Erectile dysfunction:** the nerves that control your erections are very close to the prostate gland. If these are damaged during surgery you may have difficulty getting and maintaining an erection afterwards. This happens in less than 10% of patients having a TUR-P.

**A urine infection:** this can cause symptoms such as pain or burning when passing urine, but can be treated with antibiotics. This happens to about 3% of patients.

**Bleeding:** your urine will be blood stained after the surgery. This may look dramatic but is usually not dangerous. Only in case of very severe bleeding you may require a blood transfusion or a second operation to stop the bleeding. This happens in less than 3% of patients.

**Self catheterisation:** Occasionally, if your bladder is weak as a long term result of your enlarged prostate, you may need to use a

catheter to empty your bladder. If this risk applies to you, your consultant will discuss this with you in more detail.

**Prostate re-enlargement:** Your prostate continues to enlarge even after surgery and in the future you may need a repeat procedure if your symptoms return. This happens to about 10% of patients within 10 years after their surgery.

**Deep vein thrombosis (DVT):** Any surgery carries the risk of DVT. This happens if a blood clot forms in the veins or arteries, most commonly in the legs. The risk after TUR-P is small.

**Injury to the urethra:** endoscopic surgery can lead to delayed scar formation in the urethra. A section of the urethra may narrow – often months or years after the surgery. This will reduce your flow of urine and may require a surgical procedure to widen the urethra again. This happens in 2% of patients after TUR-P.

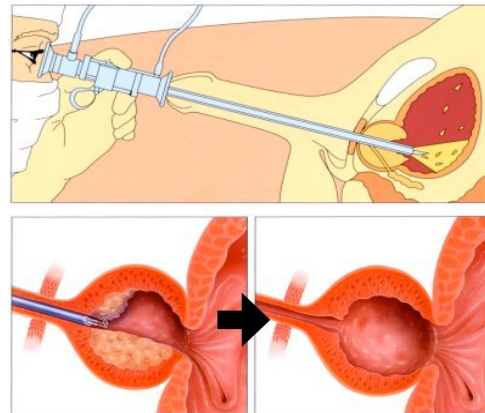
**Loss of control when you urinate (incontinence):** this can be temporary or permanent. It is rare after TUR-P and happens in about 1% of patients.

**TUR-syndrome:** this is where the fluids used to flush your bladder are absorbed into your blood stream. This can cause a salt imbalance in your blood during or immediately after the operation. Your consultant and particularly your anaesthetist will monitor you very closely to prevent this complication.

### What happens during the procedure?

You will have either a full (general) anaesthetic or a spinal anaesthetic where your body will be numb from the waist downwards. Your surgeon will insert a special tube (called a resectoscope) into your urethra. The instrument allows your

surgeon to see a magnified picture of the inside of your urethra, prostate and bladder on a television screen. A heated wire loop will be passed through the resectoscope and the overgrown portion of the prostate will subsequently be shaved off. The pieces of removed prostate will be collected during the surgery and sent for a microscopic examination to check for any abnormal cells. The operation usually takes about 30-40min. When it is finished, a catheter (thin flexible tube) will be passed into your urethra and saline fluid (salt water) will be flushed through your bladder via the catheter to prevent any blockages through blood clots or pieces of tissue.



Once you have recovered from your anaesthetic you will be taken back to the ward. The catheter will remain in your urethra and will be connected to two large bags of saline fluid next to your bed. Your bladder will usually be flushed with fluid for around 12 hours, or until the day after your surgery.

You should not have any pain from the surgery, but you may experience some discomfort from the catheter and your urethra may feel sore. Some men develop bladder spasms (contractions) which can be uncomfortable. If you experience these spasms or have a sudden urge to pass urine, please tell a member of staff, as they can often be relieved in a number of ways.

We encourage you to drink about two and a half litres (about five pints) per day while there is still blood in your urine. Your catheter will usually be removed on the second day after your surgery. We will monitor your urine output and perform bladder scans to ensure that you empty your bladder completely before going home.

### **What if I have problems after surgery?**

You may experience a mild burning feeling or find it a little uncomfortable to pass urine at first. This is because your urethra will be swollen and sore from surgery and catheterisation. This is normal and will not last long.

Some men find that they cannot pass urine when the catheter has been removed. If this happens, a new catheter will be inserted into your urethra and you may need to keep this in for some time to allow your bladder to rest.

It is common to have less control passing urine for a short time after surgery. If you experience this, please tell your nurse who will explain how to perform pelvic floor exercises to improve your control.

Once home, please make sure you drink enough (about 1 ½ - 2 litres of water per day), as poor drinking habits may make it more difficult for you to regain control of your bladder. It also helps to avoid the possibility of a urine infection.

It is also normal to have blood in your urine for a couple of weeks. This may increase about 10-14 days after your TUR-P, as the scab formed on your prostate due to surgery falls off. This is normal and should only last for 24 hours. Drinking a few extra glasses of water should help to clear this.

### **When will I have a follow-up appointment?**

You will be followed up about three months after your surgery. You will be given your microscopic result, which will show

whether the tissue removed has contained any cancerous cells.

### **When can I go back to my normal activities?**

*Passing water-* your flow should be much better immediately after your surgery, however, initially you may need to use the toilet more frequently than before your surgery due to persistent bladder irritation. This will subside over the next couple of weeks. You will speed up your recovery by drinking plenty of fluids.

*Sex* – you should be able to have sexual intercourse soon after surgery, as long as there is no bleeding and you and your partner both feel ready. Please remember that you will most likely not be able to ejaculate as your semen will travel into your bladder rather than through your penis. This is not harmful, - it will pass out of your bladder the next time you pass urine and may make your urine cloudy.

*Driving* – please discuss this with your consultant.

**Christian Seipp MD PhD  
Consultant Urological Surgeon**