

## **Overactive Bladder**

### What Is Overactive Bladder (Oab)?

The main symptom of overactive bladder is the sudden desire to pass urine which is difficult to hold on to (urgency), this is usually associated with passing urine frequently and in small amounts and the need to wake up at night to pass urine (nocturia). Although these symptoms can be caused by many bladder conditions including urinary tract infections, bladder stones, conditions causing obstruction to urinary flow such as prostatic enlargement and neurological diseases, the diagnosis of overactive bladder is usually only made when there is no such detectable problem to explain the symptoms. Up to 1 in 6 adults report symptoms of overactive bladder and in both men and women these symptoms become more common with increasing age.

## **How Is Overactive Bladder Diagnosed?**

The diagnosis is made based on your symptoms and ruling out any other cause as described above. Your consultant will take a history, perform a physical examination and test your urine for infection and blood. You may be asked to complete a bladder diary recording the amount and time you pass urine, any episodes of urgency or incontinence and what liquids you drink. Other tests such as a cystoscopy or urodynamic studies may be recommended depending on the initial findings or how you respond to treatment.

## **How Is Overactive Bladder Treated Initially?**

The treatment of overactive bladder starts with lifestyle changes, such altering the type, quantity and timing of the fluids you drink and conservative therapies such as bladder training. If your symptoms remain troublesome after lifestyle changes and conservative therapies the next step would be drug treatment using either an anticholinergic medication, a beta 3 agonist or a combination of both.

### **What Further Treatment Is Available?**

If your symptoms remain troublesome despite drug treatment and conservative therapies options include intravesical botulinum toxin (Botox®) injections or sacral neuromodulation.

# **Intravesical Botulinum Toxin Injections**

#### What's involved?

This procedure involves passing a telescopic camera (cystoscope) into the bladder and then injecting the bladder wall with a solution containing botulinum toxin-A (Botox®) in multiple spots. The botulinum toxin is



taken up by nerve endings in the bladder wall where it prevents transmission of signals from the nerve to the bladder muscle reducing the involuntary bladder contractions which can cause overactive bladder symptoms. It is normally performed using a flexible cystoscope and lubricating jelly containing local anaesthetic but can also be performed under a short general anaesthetic if necessary. Whether performed using local anaesthetic or general anaesthetic you will be able to go home on the same day. After a few weeks you will have a bladder scan to check that your able to empty satisfactorily.

#### How effective is it?

Around 70% of people will be significantly improved or cured. Unfortunately, the effect of the injections is not permanent but wears off over time. Typically, injections last between 4 and 12 months. When the effect does wear off further injections can be given and most people find that repeated injections maintain the same effect.

#### What are the Risks?

- Mild burning and stinging when you pass urine for around 24 hours after the procedure is expected.
- Blood in the urine for a few days after the procedure is expected.
- Failure to significantly improve symptoms can occur in around 30%.
- Difficulty emptying the bladder in some cases requiring intermittent catheterisation can occur in 6-20% of people. This is more likely to occur when higher doses are used and in cases of neurological disease.
- Urinary tract infections can occur in 2-15%.
- Allergic reactions are rare occurring in less than 0.5%.
- Generalised muscle weakness is rare occurring in less than 0.5%.

### **Sacral Neuromodulation**

#### What's involved?

Sacral neuromodulation involves placing a wire close to the sacral nerve roots which supply the bladder at the bottom of your back. Electrical stimulation of these nerves via the wire can lead to improvement in overactive bladder symptoms. The procedure involves two separate operations which are carried out 2 to 4 weeks apart. During the first procedure a lead is placed close to the S3 or S4 nerve root and connected to a small external battery pack which you wear on a special belt. During the 2 – 4 week test period you will be asked to keep a bladder diary of your symptoms and will have a consultation before the second procedure to determine if the therapy has been successful. If the therapy has worked for you a permanent battery is placed underneath the skin of your buttocks at the second operation. If the therapy has not worked for you the lead is removed. You will be able to go home on the same day after both first and second stages. Either on the day of your procedure or a few days later we will programme your device and show you how to use your smartphone controller. Non-rechargeable and rechargeable devices are available, your consultant will discuss which one is best for you.

#### How effective is it?

Around 70% of people having this treatment will experience significant improvement of their symptoms. If a non-rechargeable device is chosen further surgery to change the battery will be required after around 5 years.



### What are the risks?

- Some mild pain and or bruising at the site is expected.
- Failure to significantly improve your symptoms can occur in around 30%.
- Need for revision surgery for the lead or battery in around 25%
- Persistent pain or discomfort at the site of the stimulator can occur in around 15%.
- Uncomfortable sensation in leg or foot due to the stimulation can occur in around 10%.
- Infection in the wound requiring antibiotic or removal of the device can occur in around 4%
- Undesirable effects on bowel function can occur in 2-10%