

Patient Information - Varicose Veins General Information



1. What are Varicose Veins?

Varicose veins are veins under the skin of the legs, which have become widened, bulging, and tortuous. They are very common and do not cause medical problems in most people. Blood flows down the legs through the arteries, and back up the legs through the veins. There are two main systems of veins in the legs - the deep veins which carry most of the blood back up the legs to the heart, and the veins under the skin, which are less important and which can form varicose veins. All these veins contain valves, which should only allow the blood to flow towards the heart. Failure of the valves allows blood to flow backwards down the veins and produce a head of pressure when standing. This excess pressure leads to dilation of the veins and the appearance of varicose veins.

2. What causes varicose veins?

Varicose veins and spider veins often run in families and there may be a hereditary component. Women are more likely to suffer from varicose veins and up to 50% of women may be affected. Hormonal factors including puberty, pregnancy, menopause, the use of birth control pills, and HRT affect the disease. Other predisposing factors include ageing, standing occupations, obesity and leg injury.

3. How do varicose veins present?

Other than cosmetic embarrassment the commonest symptoms from varicose veins are aching, discomfort, and heaviness of the legs, which are usually worse at the end of the day. Sometimes the ankle can swell, too. These symptoms are not medically serious, but can be treated if they are sufficiently troublesome. In a few people the high pressure in the veins causes damage to the skin near the ankle, and eczema (a red skin rash) can develop. If these skin changes are allowed to progress, or if the skin is injured, an ulcer may result.

Other problems, which varicose veins can occasionally produce, are phlebitis (inflammation of the veins) and bleeding. It does not mean that the varicose veins necessarily have to be treated. The risk of bleeding as a result of knocking varicose veins worries many people, but this is very rare. It will always stop with firm pressure and the veins can then be treated to remove the risk of further bleeding.

4. What tests can be used to investigate varicose veins?

Most varicose veins originate from leaking valves at groin level or behind the knee. It is important to accurately locate the site of the valve leaks. This can be by use of a small probe to assess your veins and detect the direction of blood flow both in the skin veins and in the deep veins. This will indicate where the veins have come from and helps in the planning of any operation that might be required. Sometimes a more detailed scan, called a Duplex scan, will be required which looks in detail at the skin veins and deep veins. It can detect leaking valves and evidence of previous blood clots in the deep veins (deep vein thrombosis or DVT). Very occasionally, if the scan is not clear, an X-ray of the veins, called a venogram, may be required. This involves the injection of dye (contrast) into a vein in the foot. The contrast can be seen outlining the veins in the calf and thigh, and is the best way of detecting previous damage to the deep veins.

5. Do I need treatment?

Very large numbers of varicose vein operations are performed each year in the UK. The highest priority is to treat those with ulcers or a previous history of ulcers. Bleeding from varicose veins, usually around the ankle, is also regarded as a high priority. The aim of all operations for varicose veins is to minimise the risk of developing skin changes or ulceration later in life. Surgery is very effective in achieving this.

6. What does treatment involve?

Support stockings, either to just below knee or full length will usually control the symptoms of aching from varicose veins.

Injections of varicose veins used to be widely available in the past. A chemical is injected directly into the vein, where it causes the blood to clot. If the veins are then compressed with a stocking or bandage the clot will stick to the walls of the vein 'glueing them together'. Over 6-8 weeks, the blood clot slowly shrinks. If adherent to the walls of the vein, then the vein will shrink down too rendering it less visible or even invisible. There is a new method of injecting varicose veins which is gaining interest, called foam sclerotherapy, but this is still under evaluation

Surgical treatment involves an operation which is usually performed under general anaesthesia. There are some new types of venous surgery which are minimally invasive and these include laser ablation and radiofrequency ablation.

7. Is treatment successful?

Stockings are effective in controlling symptoms and preventing skin complications. They are only effective if worn regularly.

Injection of varicose veins can be successful, but the long term outcome of the new treatment of foam sclerotherapy requires further evaluation.

Surgery is followed by a recurrence rate of about 1 in 7 over a ten year period. This recurrence may be due to poorly planned or performed surgery, new vein formation, or due to new valve leaks beginning elsewhere.

8. Can I help myself?

Simple measures such as wearing support stockings will control the symptoms for many people. If you are overweight you should try and lose weight.