

# Duplex/doppler for venous insufficiency

## What is the purpose of this information leaflet?

This is to provide information regarding a test you have been referred for.

## What is a duplex / doppler scan?

This uses a specialised form of ultrasound scanner (known by many people as the type of machine used for scanning babies in the womb). The scanner gives us images of the tissues and blood vessels in the body and information on the blood flow through them.

## What is this test measuring and what is it for?

The scan will tell us about your deep, superficial, and varicose veins. Using the images and measurement of blood flow and direction in the veins, we are able to accurately determine whether the veins and their valves are working and healthy. Veins are the blood vessels which return blood from the tissues to the chest carrying de-oxygenated blood (Arteries take oxygenated blood to the tissues). Most veins contain one-way valves which should only allow flow out of the leg.

## What to expect during the test:

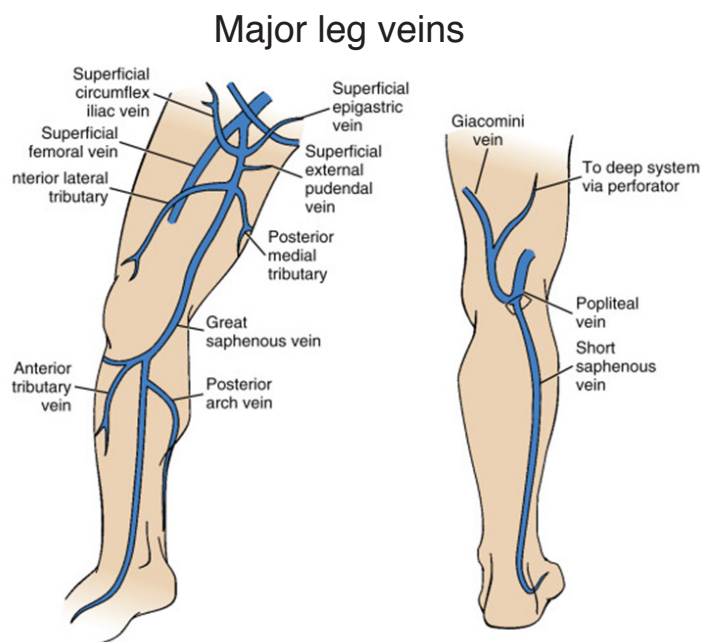
You will lie on a couch with your head on a pillow. The bed will be tilted. The lights will be dimmed. Water based gel is placed on your leg and a small ultrasound probe is placed on your skin. It is slowly moved while the vascular scientist looks at images on the screen of the machine. We will usually do some compression on your leg to enhance the flow through the veins. We may also ask you to occasionally do a valsalva manoeuvre; a breathing exercise which can help to show venous reflux.

## Does it hurt?

The scan is painless but sometimes patients find compression of the calf to be uncomfortable.

## How long does it take?

Usually about 30 minutes for one leg.



## Preparing for your test

No preparation is needed but if we are assessing your leg you will need to expose your leg from the groin downwards to allow access to the ultrasound probe. A loose fitting skirt, dress (or kilt!) may be useful. Trousers will need to be removed if worn. We will do our best to keep you as covered as possible to protect your privacy and dignity.



## Who performs the test?

A qualified vascular scientist will perform the scan, usually with an assistant in the room. Sometimes, with your consent, a vascular scientist trainee may perform your scan but they will be supervised during the scan and in writing the report.

## Will the results be explained to me?

Yes if you ask the scientist for the result. Some patients do not want to know the results.

## How soon will my referring doctor receive my results?

Reports and diagrams are usually written and drawn immediately after the test has been completed and is available on the hospital's information system on the same day.

## Where can I get further advice or information, or change /cancel an appointment?

If you need further advice or want to make changes to your appointment, please contact the Medical Physics Department on **0300 019 4569**, 9am-5pm, Monday to Friday.

More detailed information is available in our waiting area. Or you could visit the following websites:



You can visit the University Hospitals Dorset Website: [www.uhd.nhs.uk](http://www.uhd.nhs.uk) or read the patient information available in the Medical Physics waiting area before your test.



The website of the Society for Vascular Technology of Great Britain and Ireland: [www.svtgbi.org.uk](http://www.svtgbi.org.uk) is the society whose standards we follow in performing our non-invasive vascular diagnostic work.



The Circulation Foundation is the UK Vascular charity: [www.circulationfoundation.org.uk](http://www.circulationfoundation.org.uk). Its mission is to promote awareness into Vascular conditions and to support vital research.

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