What is vascular dementia?
Information in this introductory booklet is for anyone who wants to know more about vascular dementia. This includes people living with vascular dementia, their carers, families and friends. The booklet aims to help you understand more about vascular dementia. It gives an overview of the causes, symptoms and treatments.

The information here does not replace any advice that doctors, pharmacists or nurses may give you. It provides some background information which we hope you will find helpful.

The booklet was updated in January 2016 and is due to be reviewed in January 2018. Please contact us if you would like a version with references or in a different format.

Contents

Introduction  03
What is vascular dementia?  04
Symptoms  06
Diagnosis  08
Treatments  10

More about the condition  12
Risk factors  13
Support  14
Research  15
Dementia is used to describe a group of symptoms – these include memory loss, confusion, mood changes and difficulty with day-to-day tasks.

What is vascular dementia?

Vascular dementia is the second most common cause of dementia and can occur when blood flow to the brain becomes reduced. Some people have both vascular dementia and Alzheimer’s disease – often called mixed dementia.

Vascular dementia can also be called vascular cognitive impairment. Vascular dementia is sometimes given more specific names based on the changes in the brain that cause it.

The most common of these are:

**Stroke-related dementia.** This describes vascular dementia that develops after a stroke (called post-stroke dementia) or after a series of small strokes (called multi-infarct dementia).

**Subcortical vascular dementia.** This is vascular dementia that is caused by changes to very small blood vessels in the brain (often referred to as small vessel disease).

There is more information about these conditions on page 12.
Vascular dementia can have symptoms similar to Alzheimer’s and other forms of dementia. These can include memory loss, disorientation and problems with communication.

There can also be more specific symptoms and these may differ depending on the area of the brain that is affected.

These symptoms may include:

**Thinking skills**
Taking more time to process information and having problems with attention, planning and reasoning.

**Personality changes**
These may include depression and apathy (becoming less interested in things). People may also become more emotional.

**Movement problems**
Difficulty walking or changes in the way a person walks.

**Bladder problems**
Frequent urge to urinate or other bladder symptoms. This can be common in older age, but can be a feature of vascular dementia when seen with other symptoms.

The symptoms of vascular dementia get worse over time. In the later stages the symptoms become more widespread and people need help eating, dressing and toileting. Vascular dementia normally progresses over several years. However, the speed of progression can vary over time and from person to person. There may be a sudden or stepwise change after an event such as a stroke.
Diagnosis

It is important to get the right diagnosis so that the right treatments and help can be given. If you are worried about your health or someone else’s, you should talk to your GP.

If your GP suspects dementia, you may be referred to a memory clinic or another specialist clinic.

You will be asked about your symptoms and medical history. You may have a physical check-up and some memory and thinking tests.

You may also be sent for other tests including brain scans and blood tests.

Together these tests will help a doctor to identify the problems in memory and thinking and the likely cause.

Brain scans such as CT (computerised tomography) or MRI (magnetic resonance imaging) may be helpful in giving a diagnosis of vascular dementia. This is because they allow doctors to look for changes in blood vessels that are common in this type of dementia. Brain scans also help doctors rule out other conditions that could cause similar symptoms.
Treatments

While there are currently no specific treatments for vascular dementia, a doctor may prescribe medication to treat underlying, related, conditions.

This could include treatments for diabetes, stroke, high blood pressure, high cholesterol or heart problems. A doctor may also advise taking up a healthier lifestyle. This could include stopping smoking, taking exercise, maintaining a normal weight and eating healthily.

Some of the symptoms of vascular dementia may be managed by physiotherapy, occupational therapy or speech therapy.

People with vascular dementia may benefit from cognitive therapy. These activities are designed to stimulate thinking skills and engage people. They are often group-based and include games with an emphasis on enjoyment.

For people with vascular dementia and Alzheimer’s together (mixed dementia), there are some drugs that may help with the symptoms. You can discuss your treatment options with your doctor.

To help relieve symptoms of severe anxiety, agitation and aggression, a doctor may first assess someone’s health and environment. This could help identify any causes or triggers of agitation or aggression. Non-drug approaches such as aromatherapy or music therapy may also be considered. This might depend on a person’s preference as well as the availability of treatments.

If non-drug treatments don’t work, a doctor may prescribe an antipsychotic drug. These can have severe side effects and are not suitable for everyone. Their use should be carefully monitored. Your doctor will consider what may be appropriate.

For detailed information about all the treatments available, ask for our ‘Treatments for dementia’ booklet.
More about the condition

Vascular dementia is caused by a reduction in blood flow to the brain. Blood carries essential oxygen and nourishment to the brain and without it, brain cells can die. The network of blood vessels that carries blood around the body is called the vascular system. There are a number of different ways that blood vessels in the brain can become damaged leading to vascular dementia:

**Stroke-related dementia.** This occurs when parts of the brain become damaged following a stroke. A stroke occurs when blood supply to a part of the brain is suddenly cut off. This may cause difficulties in moving, problems with coordination, speech and sight depending on the part of the brain affected. If a stroke causes memory loss and problems with attention, then a person may be diagnosed with post-stroke dementia.

Similar damage can also be caused by small strokes in the brain. These are called transient ischaemic attacks and may be too small for a person to notice. This is sometimes called multi-infarct dementia.

**Subcortical vascular dementia.** This is caused by a series of small changes to blood vessels deep inside the brain. A person usually does not notice these changes but they can, over time, damage parts of the brain that are important for attention, memory and language.

Risk factors

A number of factors may increase the likelihood of damage to blood vessels in the brain. These include smoking, high blood pressure (known as hypertension), high cholesterol, type 2 diabetes, obesity and heart problems. For this reason, all of these factors can increase a person’s risk of vascular dementia.

Although some of these risk factors can have a genetic basis, managing high blood pressure and high cholesterol might help to lower the risk of vascular dementia. Some research suggests that regular exercise and a healthy diet, especially in midlife and beyond, might also help to lower our risk.

In exceptionally rare cases, vascular dementia can be caused by an inherited genetic disorder. This means that the condition passes down through families. One disorder is called CADASIL (cerebral autosomal dominant arteriopathy with subcortical infarcts and leukoencephalopathy). CADASIL occurs in younger people and causes damage to blood vessels in the brain. If you are concerned about rare inherited forms of vascular dementia, you should discuss this with your GP.
Support

There is a range of support organisations that offer practical and emotional support for people with dementia and those helping to care for them.

For more details about dementia, including contact details of support organisations, ask us for our booklet ‘Caring for someone with dementia: organisations that can help’ or visit our website at www.alzheimersresearchuk.org

You can also speak to your GP or nurse for advice.

Research

Alzheimer’s Research UK has funded more than £10 million of pioneering research across the UK into vascular dementia. This is helping to increase our understanding of the condition.

Research is looking at how blood vessels can become damaged in the brain and how this damage causes the symptoms seen in vascular dementia. Our scientists are also working to develop new and innovative ways of preventing and treating vascular dementia.

We believe that dementia can only be defeated through research. Thanks to the generosity of our supporters, we hope to fund many more pioneering studies into vascular dementia.

Find out more

If you have questions about dementia research or want to find out more about how to get involved in research, contact our Dementia Research Infoline on 0300 111 5 111 or email infoline@alzheimersresearchuk.org

The Infoline operates 9.00-5.00pm Monday to Friday. Calls cost no more than national rate calls to 01 or 02 numbers and should be included in any free call packages.
**Send me more information**

For free information, simply complete this slip. You can drop it straight in a post box or put it in an envelope labelled with the freepost address overleaf. Alternatively, phone us on 0300 111 5555.

**I would like to know more about**

| Dementia: symptoms, diagnosis, causes, prevention and care (SCIHAAD) | □ |
| Treatments for dementia (SCIIHFD) | □ |
| Caring for someone with dementia: organisations that can help (SCIHCARE) | □ |
| The latest dementia research (SMTHINK) | □ |

Name

Address

We’d really like to keep you updated with the latest research developments, how your support is making a difference, and fundraising activities that you can get involved in. Your details are always held securely, but if you’d rather not hear from us please tick the relevant box:

No information by post [ ] No information by phone [ ]

If you’re happy for us to contact you by email, please enter your email address here:

If you’re happy for us to contact you by SMS, please enter your mobile number here:

---

**Contact us**
Alzheimer’s Research UK
3 Riverside, Granta Park, Cambridge CB21 6AD

**Supporter care**
T: 0300 111 5555
E: enquiries@alzheimersresearchuk.org

**Dementia Research Infoline**
T: 0300 111 5 111
E: infoline@alzheimersresearchuk.org

www.alzheimersresearchuk.org

---

**We are the UK’s leading research charity aiming to defeat dementia.**

We welcome your comments to help us produce the best information for you. You can let us know what you think about this booklet by contacting us using the details below.