Vascular Dementia

Signs, Symptoms, and Treatment of Multi-Infarct and Other Types of Vascular Dementia

Vascular dementia is the second most common form of dementia and is caused by reduced blood flow to the brain—usually from a stroke or series of strokes. While the strokes may be unnoticeably small, the damage can add up over time, leading to memory loss, confusion, and other signs of dementia. Receiving a vascular dementia diagnosis can be a frightening and stressful experience, but there are many things you can do to manage your symptoms, prevent further strokes, and enjoy a full, rewarding life.

What is vascular dementia?

Vascular dementia refers to a progressive decline in memory and cognitive functioning caused by a blockage or reduction in the blood flow to the brain, often as the result of a stroke. When the blood supply to the brain is interrupted, brain cells are deprived of vital oxygen and nutrients, causing damage to the cortex of the brain—the area associated with learning, memory, and language. Vascular dementia is the second most common type of dementia after Alzheimer’s disease, accounting for up to 40 percent of dementia cases in older adults.

Depending on the person, and the severity of the stroke or strokes, vascular dementia may come on gradually or suddenly, and can range from mild to severe. While there is currently no cure for vascular dementia, there are plenty of steps you can take to slow its development, prevent further strokes, compensate for cognitive losses, and maximize your quality of life.
Multi-infarct dementia: The most common type of vascular dementia

Multi-infarct dementia (MID) is caused by a series of small strokes (sometimes called “mini-strokes” or “silent strokes”) that often go unnoticed. These mini-strokes, also referred to as transient ischemic attacks (TIAs), result in only temporary, partial blockages of blood supply and brief impairments in consciousness or sight. Over time, however, as more areas of the brain become damaged, the symptoms of vascular dementia begin to appear. MID usually affects people between the ages of 60 to 75, and is more common in men than women.

What is mixed dementia?

Although it is rarely diagnosed during life, up to 45 percent of people with dementia are believed to have mixed dementia, where more than one type of dementia occurs simultaneously, usually vascular dementia and Alzheimer’s disease or Lewy Body dementia. The combination of two types of dementia can have a greater impact on the brain than either by itself. Mixed dementia is often indicated by cardiovascular disease and dementia symptoms that get worse slowly over time.

Signs and symptoms of vascular dementia

Vascular dementia affects different people in different ways and the speed of the progression varies from person to person. Some symptoms may be similar to those of other types of dementia and usually reflect increasing difficulty to perform everyday activities like eating, dressing, or shopping.

Behavioral and physical symptoms can come on dramatically or very gradually, although it appears that a prolonged period of TIAs—the mini-strokes discussed above—leads to a gradual decline in memory, whereas a bigger stroke can produce profound symptoms immediately. Regardless of the rate of appearance, vascular dementia typically progresses in a stepwise fashion, where lapses in memory and reasoning abilities are followed by periods of stability, only to give way to further decline.

Common Signs and Symptoms of Vascular Dementia

<table>
<thead>
<tr>
<th>Mental and Emotional Signs and Symptoms</th>
<th>Physical Signs and Symptoms</th>
</tr>
</thead>
<tbody>
<tr>
<td>• Slowed thinking</td>
<td>• Hallucinations and delusions</td>
</tr>
<tr>
<td>• Memory problems; general forgetfulness</td>
<td>• Confusion, which may get worse at night</td>
</tr>
<tr>
<td>• Unusual mood changes (e.g. depression, irritability)</td>
<td>• Personality changes and loss of social skills</td>
</tr>
</tbody>
</table>
Common Signs and Symptoms of Vascular Dementia

- Dizziness
- Leg or arm weakness
- Tremors
- Moving with rapid, shuffling steps
- Balance problems
- Loss of bladder or bowel control

Behavioral Signs and Symptoms

- Slurred speech
- Language problems, such as difficulty finding the right words for things
- Getting lost in familiar surroundings
- Laughing or crying inappropriately
- Difficulty planning, organizing, or following instructions
- Difficulty doing things that used to come easily (e.g. handling money, paying bills, or playing a favorite card game)
- Reduced ability to function in daily life

Vascular dementia treatment

While there is currently no cure for vascular dementia, the earlier any brain damage is caught, the better your chance of preventing dementia, or at least slowing down the progression of the disease. By treating the risk factors that led to vascular dementia, such as high blood pressure or diabetes, you may even be able to reverse some of the symptoms.

Physiotherapy, occupational therapy, and speech therapy can help you to regain some or all of any lost functions following a stroke. A number of medications used to treat the cognitive symptoms of Alzheimer’s disease appear to work for vascular dementia, too. But the most important thing is to minimize your risk of having another stroke and making the dementia worse.

Lower your risk for vascular dementia by reducing your risk for stroke

- Know your blood pressure. If it’s high, work with your doctor to lower it.
- Find out from your doctor if you have atrial fibrillation.
- If you smoke, get help to quit.
- If you drink alcohol, do so in moderation.
- Find out if you have high cholesterol. If so, work with your doctor to control it.
- Keep your blood sugar (glucose) in the normal range.
- If you are diabetic, follow your doctor’s recommendations carefully to control your diabetes.
- Reach or stay at a healthy weight.
- Include exercise in the activities you enjoy in your daily routine.
- Enjoy a healthy, lower sodium (salt) diet.

Source: National Stroke Association
Your doctor may prescribe medications to lower blood pressure and prevent clots from forming, and may change or stop medications that can exacerbate symptoms of dementia, such as sedatives, antihistamines, or strong painkillers. However, adopting healthier lifestyle changes is also a vital part of vascular dementia treatment.

**Lifestyle changes to improve symptoms**

A diagnosis of dementia is scary. But it’s important to remember that many people with dementia can lead healthy, fulfilling lives for years after the diagnosis. Don’t give up on life! As much as possible, continue to look after your physical and emotional health, do the things you love to do, and spend time with family and friends.

**Find new ways to get moving.** Research suggests that even a leisurely 30-minute walk every day may reduce the risk of vascular dementia and help slow its progression. Regular exercise can also help control your weight, relieve stress, and boost your overall health and happiness.

**Create a network of support.** Seeking help and encouragement from friends, family, health care experts, and support groups can improve your outlook and your health. And it’s never too late to make new friends and expand your network.

**Eat for heart health.** Heart disease and stroke share many of the same risk factors, such as high LDL cholesterol (bad cholesterol), low HDL cholesterol (good cholesterol), and high blood pressure. Adopting a heart-healthy diet may help to improve or slow down your dementia symptoms.

**Make it a point to have more fun.** Laughing, playing, and enjoying yourself are great ways to reduce stress and worry. Joy can energize you and inspire lifestyle changes that may prevent further strokes and compensate for memory and cognitive losses.

**Learn how to relax and manage stress.** Stress is a major contributor to high blood pressure and heart disease, so it’s helpful to practice relaxation techniques, such as yoga, meditation, deep breathing, or rhythmic exercise, and know how to quickly reduce stress in the moment by employing one or more of your senses.

**Challenge your brain.** Your brain remains capable of change throughout life, so you may be able to improve your ability to retain and retrieve memories. Set aside some time in the evening to recall the day’s events, which can build memory capacity. Learning new skills, such as a foreign language or how to paint, can also help build brain capacity if done consistently.
Managing memory loss

Managing the symptoms of vascular dementia means learning practical ways to manage memory loss, while staying as optimistic and realistic as possible. Although you may not be able to bring back what’s lost, you can still find ways to make a challenging situation easier.

**Follow a routine.** Regular routines and consistent habits can compensate for a declining memory and help you feel more in control. For example, keep keys on a hook by the door so they’re easier to find. Link medication regimens with other activities, such as eating a meal, to make things easier to remember.

**Use memory aids.** Take some pressure off your memory by using a notebook or smartphone to track to-do lists, appointments, and important names and dates. Post important phone numbers and reminders in a prominent place and label doors, cabinets, and boxes to help you remember what’s inside.

**Be upfront about your condition.** Tell the people you’re around that you’ve had a stroke. This way, they know what to expect and you can alleviate or prevent misunderstandings.

**Communicate your needs.** Ask people to speak slowly or repeat things when necessary. Ask for a message to be broken into smaller parts, and repeat back what you heard. When you can’t think of a word try to find another way to get the meaning across—or just move on in the conversation.

**Maintain social activity.** Holding up your end of a conversation may require more effort but staying in touch with friends and family, face to face, can help maintain cognition. Regularly schedule activities you enjoy that involve interaction with other people.

**Remove distractions.** When attempting to understand long messages or instructions, take away distractions such as TV or radio so that you can better concentrate and take notes.

**Avoid rushing into new tasks.** Be deliberate and stop to think and plan before beginning a task, whether it’s taking out the garbage or conducting a meeting.

**Be patient with yourself.** Getting angry only makes it more difficult to remember. Learning relaxation techniques can help you cope with the frustration and anxiety caused by changes in your memory.

**Allow those close to you to help you.** It’s not easy to admit you need help, but letting those who care about you lend support is important to your independence.
Helping someone with vascular dementia

Caring for a person with vascular dementia can be very stressful for both you and your loved one. You can make the situation easier by providing a stable and supportive environment.

- Modify the caregiving environment to reduce potential stressors that can create agitation and disorientation in a dementia patient.
- Avoid loud or unidentifiable noises, shadowy lighting, mirrors or other reflecting surfaces, garish or highly contrasting colors, and patterned wallpaper.
- Use calming music or play the person’s favorite type of music as a way to relax the patient when agitated.

A stable environment starts with a stable, healthy you. It’s easy to lose sight of your own needs when your loved one is dealing with dementia. But taking care of yourself isn’t optional. Stress and burnout are common in caregivers—and that isn’t a good thing for you or the person you’re caring for. Nurturing and protecting your own emotional and physical health isn’t selfish, it’s the best thing you can do for the person you love. Getting anxious or upset can increase your loved one’s stress or agitation. Try to remain flexible, patient, and relaxed. If you find yourself becoming anxious or losing control, take a time out to cool down. Try not to take problem behaviors personally and do your best to maintain your sense of humor.

Tips for caring for a loved one with vascular dementia

**Create a routine.** Your loved one will feel more comfortable and less agitated when they are on a regular routine and in familiar surroundings.

**Use calendars and clocks.** Place large calendars and clocks around your loved one’s living area. They can help people with dementia reorient if they’ve forgotten the date or time.

**Keep your loved one busy.** Encourage your loved one to continue physical and social activities as long as possible. Whether it’s going for a walk or spending time at the local senior center, it’s important that they have regular activities to participate in. Simple daily chores like folding laundry, watering plants, or peeling vegetables can help keep your loved one busy.

**Provide plenty of stimulation.** Make sure your loved one’s room is colorful and inviting. Is there a nice view outside? If not, you can bring the outdoors inside with some flowers or a plant. Exercise, interaction with different people in one-on-one situations, or playing with a well-trained, docile pet can also help to provide stimulation and increase physical and social activity.
Tips for caring for a loved one with vascular dementia

Be sure to communicate, even if you’re not sure your loved one understands. If it’s time for dinner, for example, say so. Don’t just lead your loved one into the kitchen without explaining what’s going on. Even if they don’t understand your words, use your tone of voice, eye contact, a smile, or a reassuring touch to help convey your message and show your compassion.

Other resources


Vascular Dementia – Provides a thorough definition of the disorder, diagnosis, prognosis, and how it differs from other memory disorders (UCSF Memory Clinic)

Coping Strategies for Vascular Dementia Caregivers – Practical tips for caregivers on how to care for a loved one with vascular dementia. (UCSF Medical Center)

Preventing a Stroke – Ways to reduce your risk of stroke. (National Stroke Association)

Ten Real-Life Strategies for Dementia Caregiving – Strategies for relating to someone with memory loss and dementia and making the caregiving experience easier. (Family Caregiver Alliance)

Hotlines and support

In the U.S.: American Heart Association offers a directory of support groups and online support resources for life after stroke.

Alzheimer’s Association offers a helpline at 0800-272-3900 and a directory of support groups and other dementia services.

In the UK: Alzheimer’s Society offers a national dementia helpline at 0300 222 1122 and a directory of services and support groups.

In Australia: Alzheimer’s Australia offers a helpline at 1800 100 500 and a directory of services and programs.
In Canada: Alzheimer Society Canada offers a helpline at 1-800-616-8816 and support for people living with dementia.

Authors: Lawrence Robinson, Jocelyn Block, M.A., Melinda Smith, M.A., and Jeanne Segal, Ph.D. Last updated: June 2019.