What is dementia?

Information sheet 400

If you, or a friend or relative, have been diagnosed with dementia, you may be feeling anxious or confused. You may not know what dementia is. This factsheet should help answer some of your questions.

The term 'dementia' is used to describe the symptoms that occur when the brain is affected by specific diseases and conditions. These include Alzheimer's disease and sometimes as a result of a stroke.

Dementia is progressive, which means the symptoms will gradually get worse. How fast dementia progresses will depend on the individual. Each person is unique and will experience dementia in their own way.

Symptoms of dementia include:

- Loss of memory - for example, forgetting the way home from the shops, or being unable to remember names and places, or what happened earlier the same day.
- Mood changes - particularly as parts of the brain that control emotion are affected by disease. People with dementia may also feel sad, frightened or angry about what is happening to them.
- Communication problems - a decline in the ability to talk, read and write.

In the later stages of dementia, the person affected will have problems carrying out everyday tasks, and will become increasingly dependent on other people.

What causes dementia?

There are several diseases and conditions that cause dementia. These include:

- **Alzheimer's disease** - The most common cause of dementia. During the course of the disease the chemistry and structure of the brain changes, leading to the death of brain cells (see Factsheet 401, What is Alzheimer's disease?).
- **Vascular disease** - The brain relies on a network of vessels to bring it oxygen-bearing blood. If the oxygen supply to the brain fails, brain cells are likely to die and this can cause the symptoms of vascular dementia. These symptoms can occur either suddenly, following a stroke, or over time through a series of small strokes (see Factsheet 402, What is vascular dementia?).
- **Dementia with Lewy bodies** - This form of dementia gets its name from tiny spherical structures that develop inside nerve cells. Their presence in the brain leads to the degeneration of brain tissue. Memory, concentration and language skills are affected. This form of dementia shares some characteristics with Parkinson's disease (see Factsheet 403, What is dementia with Lewy bodies?).
- **Fronto-temporal dementia (including Pick's disease)** - In fronto-temporal
dementia, damage is usually focused in the front part of the brain. At first, personality and behaviour are more affected than memory (see Factsheet 404, What is fronto-temporal dementia, including Pick's disease?).

Rarer causes of dementia

There are many other rarer diseases that cause dementia, including progressive supranuclear palsy, Korsakoff's syndrome,Binswanger's disease, HIV and AIDS, and Creutzfeldt-Jakob disease (CJD) (see Factsheets 438, What is Korsakoff's syndrome?, 446, What is HIV-related cognitive impairment? and 427, What is Creutzfeldt-Jakob disease?). People with multiple sclerosis, motor neurone disease, Parkinson's disease and Huntington's disease may also be more likely to develop dementia.

Mild cognitive impairment

Some individuals may have difficulty remembering to do things, but a doctor may feel that the symptoms are not severe enough to warrant the diagnosis of Alzheimer's disease or another type of dementia. When this condition occurs, some doctors will use the term 'mild cognitive impairment' (MCI). Recent research has shown that a small number of individuals with MCI have an increased risk of progressing to Alzheimer's disease. However, the conversion rate from MCI to Alzheimer's is small (10-15 per cent), so a diagnosis of MCI does not always mean that the person will go on to develop Alzheimer's.

Who gets dementia?

- There are about 750,000 people in the UK with dementia.
- Dementia mainly affects older people. However, it can affect younger people: there are over 16,000 people in the UK under the age of 65 who have dementia.
- Dementia can affect men and women.
- Scientists are investigating the genetic background to dementia. It does appear that in a few rare cases the diseases that cause dementia can be inherited. Some people with a particular genetic make-up have a higher risk than others of developing dementia.

Can dementia be cured?

Most forms of dementia cannot be cured, although research is continuing into developing drugs, vaccines and treatments. Drugs have been developed that can temporarily alleviate some of the symptoms of some types of dementia. These drugs are known as acetylcholinesterase inhibitors.

The National Institute for Health and Clinical Excellence (NICE) revised guidance on acetylcholinesterase inhibitors to treat some types of dementia, issued in 2006, recommends that people in the moderate stages of some types of dementia should be given treatment with one of these drugs.

Alzheimer's disease

People with Alzheimer's disease may be offered an acetylcholinesterase inhibitor if their non-cognitive symptoms are very distressing and other treatments have not worked or are not
suitable.

**Dementia with Lewy bodies**

People with dementia with Lewy bodies may be offered an acetylcholinesterase inhibitor if their non-cognitive symptoms are very distressing.

**Vascular dementia**

People with vascular dementia should not be offered an acetylcholinesterase inhibitor, except as part of a clinical trial.

The three acetylcholinesterase inhibitor drugs are:

- Aricept (donepezil hydrochloride)
- Exelon (rivastigmine)
- Reminyl (galantamine).

A further drug Ebixa (memantine) was developed to help people in later stages of Alzheimer's disease. It is licenced for use in the UK but NICE does not recommend it as an option for people with moderately severe to severe Alzheimer's disease unless it is being used as part of a clinical trial (research).

**How can I tell if I have dementia?**

Many people fear they have dementia, particularly if they think that their memory is getting worse. Becoming forgetful does not necessarily mean that you have dementia: memory loss can be an effect of ageing, and it can also be a sign of stress or depression. In rare cases, dementia-like symptoms can be caused by vitamin deficiencies and/or a brain tumour. If you are worried about yourself, or someone close to you, it is worth discussing your concerns with your GP.

**Diagnosing dementia**

It is very important to get a proper diagnosis. A diagnosis will help the doctor rule out any illnesses that might have similar symptoms to dementia, including depression. Having a diagnosis may also mean it is possible to be prescribed drugs for Alzheimer's disease. Whether you are someone with dementia or a carer, a diagnosis can help you prepare and plan for the future.

Dementia can be diagnosed by a doctor, either a GP or a specialist. The specialist may be a geriatrician (a doctor specialising in the care of older people), a neurologist (someone who concentrates on diseases of the nervous system) or a psychiatrist (a mental health specialist). The doctor may carry out a number of tests. These are designed to test the person’s memory and their ability to perform daily tasks.

**Can dementia be prevented?**
At present, we are not sure what causes most of the diseases that lead to dementia. This means it is difficult to be sure what we can do to prevent dementia itself. However, the evidence seems to indicate that a healthy diet and lifestyle may help protect against dementia. In particular, not smoking, exercising regularly, avoiding fatty foods and keeping mentally active into old age may help to reduce the risk of developing vascular dementia and Alzheimer's disease.

For details of Alzheimer's Society services in your area, visit alzheimers.org.uk/localinfo
For information about a wide range of dementia-related topics, visit alzheimers.org.uk/factsheets

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Reviewed by Dr Nicholas MacInnes, Research Fellow, Alzheimer's Society

This factsheet is also available in Arabic, Bengali, Chinese, French, Gujarati, Polish, Punjabi, Somali and Tamil.