

# Overview

## Aortic dissection

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The aorta is the largest blood vessel in the body. It is an artery and carries blood from the heart down to the chest and the tummy (abdomen). Many arteries come off the aorta to supply blood to all parts of the body. At about the level of the hips, the aorta divides into two arteries, one going to each leg.

An aortic dissection is a serious condition in which the inner layer of the aorta tears. Blood surges through the tear. This causes the inner and middle layers of the aorta to separate (dissect).

An aortic dissection weakens the wall of the aorta, making it prone to rupture. A dissection may interrupt blood supply to any of the internal organs, arms or legs.

Aortic dissection is rare. It is a medical emergency and needs urgent treatment.

Aortic dissection is often fatal. But early diagnosis and treatment can greatly improve survival.

## Types of aortic dissection

Aortic dissections are divided into 2 types. The type depends on which part of the aorta is affected.

### Type A aortic dissection

This involves a tear in the part of the aorta where it exits the heart in the front of the chest. The tear may extend into the aorta in the back of the chest and may extend into the tummy (abdomen).

### Type B aortic dissection

This involves a tear in the aorta in the back of the chest only. The tear may also extend into the tummy. This is less serious. But it can on some occasions cause blockage of blood flow to kidney, intestine or legs.

# Symptoms of aortic dissection

The main symptom is sudden severe tearing pain in your chest or in your upper back. You can also have pain in your tummy. The symptoms can be mistaken for a heart attack, acute gastritis or lung pain. It can also cause pain in the legs but this is rare.

[Symptoms of aortic dissection](#)

## Causes of aortic dissection

The immediate cause of an aortic dissection is weakness in the aortic wall. There is no known single cause why this weakness happens. High blood pressure over a long period of time may weaken the wall of the aorta, making it more likely to tear.

Some people are born with a condition that causes a weakened wall of the aorta.

These conditions include:

- Marfan syndrome
- Turner's syndrome
- Ehlers-Danlos syndrome

[Causes of aortic dissection](#)

## Diagnosing aortic dissection

Early diagnosis and treatment may help save your life. An aortic dissection must be detected and treated quickly if you are to have the best chance of survival.

Aortic dissection can be difficult to diagnose. This is because the symptoms are like that of many other conditions. It can be confirmed or excluded by an emergency CT scan of the whole aorta or by a Trans Oesophageal Echocardiography.

[Diagnosing aortic dissection](#)

## Treatment of aortic dissection

There are different treatments for type A and type B dissections.

Type A aortic dissection is a very serious and urgent event. Around half of people will die within 1 hour if they do not get to hospital. Treatment involves open heart surgery to repair the dissected aorta. You may also need to have your aortic valve replaced.

A Type B dissection which does not rupture or interfere with blood flow to the abdominal organs or legs does not usually need an operation.

Beta blockers are often used to control blood pressure. This treatment can control and protect the aorta. This can stabilise the immediate situation and reduce the risk of rupture.

## Preventing aortic dissection

If you are at risk of an aortic dissection because of a family history or you have other risk factors you should:

- have your blood pressure monitored - if it's high you will need to take medicine to control it
- have regular CT or MRI scans if your aorta is enlarged
- wear a medical alert bracelet
- avoid extreme sports and weightlifting

The most effective ways to prevent aortic dissection are to take medicine regularly to control high blood pressure.

You can also lower your risk by reducing the risk of damage to your heart and arteries by:

- [eating a healthy diet](#)
- [exercising regularly](#)
- [stopping smoking](#)
- [drinking less alcohol](#)
- not using recreational drugs
- [learning how to manage stress](#)
- [getting a good nights sleep](#)

## Living with aortic dissection

An aortic dissection is a serious condition. Aortic dissection patients should undergo a programme of cardiac rehabilitation.

If you have high blood pressure you will need medicine to make sure that it's kept below 130/80mmHg.

You should not take part in strenuous lifting and extreme sports.

You will need to have regular scans of your aorta to check:

- to make sure any repairs are working and are ok
- the progress of type B medical management
- for any aortic disease along the less-affected parts of the aorta

## Complications of aortic dissection

Complications of an aortic dissection, with or without an operation, may include

- paralysis stroke or death
- weakness due to a long stay in hospital

- loss of your voice ,especially if you your surgeon has operated on your aortic arch
- difficulty with thinking clearly
- problems with your nerves such as tingling fingers or numbness
- difficulty achieving the right balance of medicines or side effects from these
- [anxiety](#), worry, depression, shock or mild [post-traumatic stress disorder \(PTSD\)](#)

# Sláintecare.

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