# Mitral stenosis

## About your mitral valve

Your mitral valve is one of four valves in your heart. It stops the blood going back into the left atrium (in your heart) and the blood vessels from your lungs after each heartbeat. It's around the size of a plughole in a basin and consists of two thin leaflets that meet in the middle.

Usually, your mitral valve lasts your lifetime. However, things can happen to it that may mean you'll need treatment or surgery.

## Mitral stenosis

Mitral stenosis (narrowing) is when the leaflets and ribbons of tissue that hold them in place (chordae tendinae) become thickened and stiff so that the flow of blood from the left atrium into the left ventricle is obstructed. This condition is most often caused by rheumatic fever – an illness that is now very uncommon. Mitral stenosis causes a variety of problems including breathlessness, heart failure, swollen ankles and fluid retention.

If you have significant mitral stenosis, your mitral valve will need to be replaced. This operation is called mitral valve replacement (MVR).

If you need a new artificial valve, it will be either a mechanical valve or a tissue valve.

**Your valve can be treated in three ways.**

1. **Conventional mitral valve replacement.** This involves an open-heart operation where your breastbone (sternum) is divided along its length so your surgeon can get to your heart. Your valve is then replaced. You'll be under general anaesthesia (asleep and feel no pain) for this operation.

2. **Minimal access mitral valve replacement.** This is when a surgeon gets to your heart through a smaller incision (cut), just below the right breast. Your valve is then replaced. You'll be under general anaesthesia. As yet, there's no evidence (proof) to show which of these approaches (conventional or minimal) is the better or safer approach.

3. **Balloon valvotomy.** This procedure is done under local anaesthesia. A balloon is expanded within the thickened valve to open (widen) it. Balloon valvotomy may be advised if your condition is severe and your heart valve is in a suitable condition to have the procedure. It's also called percutaneous mitral commissurotomy.