

# Heart attack and angina

The heart is the organ responsible for pumping blood around the body. It is made up of a muscle known as the *myocardium*. This muscle also requires its own blood supply. If the coronary arteries that supply blood to the heart become blocked, part of the heart is deprived of oxygen.

If the period without blood circulation is brief, there will probably be no damage to the heart. This condition is known as *angina pectoris*. However, if the lack of blood is prolonged, a myocardial infarction will occur, resulting in scarring of the heart that cannot be repaired. The rest of the heart is able to compensate for this damage.

### What are the symptoms?

Pain appears in the center of the chest, like a weight or pressure, and sometimes spreads to the arm, back, or jaw. Discomfort, sweating, and nausea or vomiting may also occur.

Women, older people, and people with diabetes may have different symptoms, such as different chest pain or difficulty breathing, fatigue, palpitations, syncope, or pain in the upper abdomen, which can make diagnosis difficult.

## How is it diagnosed?

Diagnosis is based on the symptoms reported by patients and the results of an electrocardiogram (ECG) and a blood test. An ECG records the activity of the heart on paper. These readings change if you are having a heart attack or experiencing angina at that moment.

#### What should you do when you feel pain?

Stop what you are doing and sit down. Stay calm.

Go to the nearest health center or call 112.

# What should you do if you have experienced an attack before?

Patients with angina pectoris or who have had a heart attack should always carry nitroglycerin in their pocket. Nitroglycerin must be protected from light and carried in a plastic container. If these precautions are not taken, it must be replaced every 6 months.

Frequent use of nitroglycerin does not cause habituation or decrease its effectiveness. Some patients may experience headaches or dizziness due to a drop in blood pressure, but it should be used when needed even if it causes these discomforts.

If pain occurs, sit down and place a nitroglycerin tablet under your tongue or, if you have it in spray form, apply it twice without swallowing saliva.

Repeat this action 5-10 minutes later if you still feel pain.

If after 3 tablets (one every 5 minutes) or 6 spray applications the pain continues (20 or 30 minutes), call the emergency services (112).

If the pain subsides, explain on your next visit that you have had an episode of pain and describe what it was like.

People with heart problems should not smoke under any circumstances. They should also keep their blood pressure and cholesterol levels under control, avoid obesity by eating a healthy diet and avoiding a sedentary lifestyle, and exercise regularly.