

## The Patient with Chest Pain

*El paciente con dolor de pecho*

### INTRODUCTION

Chest pain is a common symptom in the general population due to multiple causes, the most important of which is associated with coronary heart disease. Cardiovascular diseases account for 30% of deaths worldwide, and 1 out of 3 deaths is caused by coronary heart disease.

Chest pain of cardiac origin –known as “angina pectoris” or “angina”– may identify an individual at risk of myocardial infarction or death which can be prevented with early treatment (Figure 1). Early consultation is very important to reduce complications.

Angina is characterized by an oppressive, burning pain in the middle of the chest that may or may not radiate to the neck, jaw, shoulder, left arm, and even the right arm or back.

However, especially in women and elderly individuals, symptoms may be different, with pain at only one site or at different sites –such as the right side of the chest, forearms, wrists, epigastrium (patients call it “pit of stomach”)– and sometimes associated with nausea and vomiting or sweating.

Typically, angina has been described as a pain triggered by physical exertion that goes away when stopping, but that sometimes occurs at rest, after a meal, in the morning during waking hours or under emotional stress.

There are some symptoms “similar to angina” or equivalent, such as excessive fatigue, dizziness, transient exercise-related loss of consciousness, which in some cases can be indicative of heart disease.

### CAN ANYONE HAVE ANGINA?

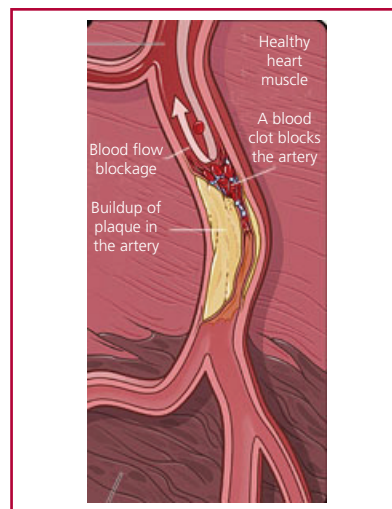
It is a condition that generally affects people older than 50 years, but it may occur at a younger age. Smoking, high cholesterol, high blood pressure, diabetes, emotional stress, or family history of myocardial infarction at an early age are considered predisposing factors (also called “risk factors”).

### WHAT NONCARDIAC CONDITIONS CAN CAUSE A SIMILAR PAIN?

1. Chondritis, a pain at the junction of the ribs with the breastbone, which tends to increase with postural movements.
2. Pericarditis (an inflammation of the sac surrounding the heart), usually after viral infections.
3. Pulmonary embolism (clots in the pulmonary arteries), which usually occurs in patients with prolonged bed rest or after an intervention, particularly trauma surgery.
4. Digestive disorders, such as esophagitis or gastritis, usually associated with reflux.
5. Diseases of the aorta that manifest with sudden and intense chest and/or back pain spreading to the spine.

### IN CASE OF CHEST PAIN, TAKE THESE STEPS:

1. Identify the characteristics of pain, and if it is of suspected cardiac origin:
2. Stop whatever you are doing and call for help immediately, so that a family member, friend or the mobile emergency service goes to the place where you are (your home or workplace).
3. If you are alone or in the street, remember you can call the Emergency Medical Services (SAME) dialing 107 in the City of Buenos Aires, or the Federal Police, dialing 911 in the Province of Buenos Aires.
4. Try not to be alone in such circumstance.
5. Do not go to hospital on foot, and it is always advisable to go with someone else. Do not drive yourself to the hospital, you may develop complications and cause an accident.



**Fig. 1.** Occlusion of a coronary artery. If it is not timely removed, it causes a heart attack.



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### INFORMATION YOU MAY FIND IN THE WEB

- Encuestas Nacionales de factores de riesgo en Argentina (2005-2009-2013). Efectuada por el Ministerio de Salud Pública de la Nación. Dirección de Promoción de la Salud y Control de Enfermedades no transmisibles. [www.msal.gov.ar/ent;vigilanciaent@msal.gov.ar](http://www.msal.gov.ar/ent;vigilanciaent@msal.gov.ar)
- Effect of potentially modifiable risk factors associated with myocardial infarction in 52 countries (the INTERHEART study): case-control study. INTERHEART Study Investigators. *Lancet* 2004;364:937-52.
- Consenso para el manejo de pacientes con síndrome coronario agudo sin supradesnivel del ST (Angina Inestable e Infarto de miocardio sin elevación del ST). Consenso de la Sociedad Argentina de Cardiología. *Rev Argent Cardiol* 2014; 82 (Supl 1).

*The information is intended to be informative and educational and is not a replacement for the professional evaluation, advice, diagnosis or treatment provided by your physician.*

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