

Bronchitis: acute bronchitis

What is bronchitis?

Bronchitis is inflammation of the mucus lining of the bronchial tree (air passages) of the lungs. The inflammation affects the trachea, the large bronchial tubes (called *bronchi*) and the smaller bronchial tubes (called *bronchioles*).

Acute bronchitis refers to the sudden onset of this inflammation, while the term *chronic bronchitis* refers to the more serious long-term condition which follows repeated attacks of acute bronchitis.

What is the cause?

Acute bronchitis is almost always caused by one of the many common respiratory viruses. Most cases begin with an upper respiratory infection such as the common cold. The infection spreads from the nose and throat down the trachea into the bronchial tubes.

Another cause is inflammation from breathing air that contains airborne pollutants such as chemical fumes, dust and smoke that irritate the bronchial tree.

What are the symptoms?

The main symptom is an irritating cough that produces little or no sputum initially but may later bring up greyish or yellowish sputum called phlegm.

Other symptoms include:

- wheezing
- breathlessness
- fever
- discomfort (a feeling of pressure) behind the sternum, made worse by coughing.

How common is acute bronchitis and who gets it?

An occasional attack of acute bronchitis is very common especially in those who live in an unpolluted dry environment and who do not smoke cigarettes. It is relatively rare in fit healthy people.

The risk of getting an attack increases with:

- smoking
- cold or humid weather
- areas of high atmospheric pollution
- chronic obstructive pulmonary disease
- congested lungs from heart failure
- recent illness
- certain ages—very young and old.

What is the outcome?

At least 85% of healthy people who contract acute bronchitis find it improves spontaneously in about 4 to 8 days.

Sometimes, especially in those in the risk categories mentioned, the infection can be complicated by bacterial superinfection. These patients may get worse with

increasingly severe symptoms and cannot shake off the infection.

What are the risks?

There is no significant risk to the lungs if a healthy non-smoker has a single attack of acute bronchitis. However, it can be serious especially in debilitated people where complications such as persistent bronchitis or pneumonia can develop.

Recurrent episodes are a concern in smokers and those with an existing lung disorder such as pulmonary fibrosis. This is dangerous because it can eventually lead to chronic obstructive pulmonary disease.

What is the treatment?

The issue of prescribing antibiotics

Antibiotics are not needed for acute bronchitis especially if you are in good health because it is a viral infection which runs a natural course of recovery. Antibiotics are reserved for those patients whose illness may be complicated by a bacterial infection. Your treating doctor will diagnose this on clinical grounds and perhaps the results of a culture of sputum.

General self-help measures

- Rest at home, not necessarily in bed.
- A warm well-ventilated smoke-free room is best.
- Take aspirin or paracetamol (preferable) for fever or chest discomfort.
- Drink plenty of fluids.
- Take any over-the-counter cough medicine that works for you for a non-productive cough (without sputum).
- A heat pack or warm water bottle placed on the chest may relieve discomfort.
- Steam inhalations using a mentholated preparation in very hot water can clear your nasal and bronchial passages.

In some cases your doctor may prescribe a bronchodilator drug administered by aerosol inhalation to relieve any wheezing.

Note

If you smoke you should try to stop it during the acute attack and then thereafter.

When to seek medical help

- Increased shortness of breath
- High fever and chills
- Chest pain
- Discoloured and/or bloody sputum
- Vomiting
- Other serious symptoms