



Information leaflet

Tuberculosis

ment period. If the medication is not taken correctly, the disease will break out again and people around the patient may become infected again. In such cases, it may no longer be possible to cure the tuberculosis reliably because the medicines may not be effective any more.

The best tuberculosis medicines are of no use without the patient's complete cooperation!

Screening for people who are infected but not yet ill

The people in close contact with a person suffering from TB (i.e. family members, friends, acquaintances, work colleagues) must be tested because they might be infected, later become ill and again infect other people.

What tests are available to your doctor to find out whether you have been infected with tuberculosis bacteria?

About eight weeks after transmission, it is possible to tell with a skin test or a blood test whether someone is infected with TB bacteria.

1. Tuberculin test (Mantoux)

The tuberculin test is a skin test that is applied to the forearm. If hardening of the test area takes place within 3–7 days, this is evidence of possible infection with tuberculosis bacteria.

2. Blood test (gamma-interferon test)

In the laboratory, a blood sample is analysed to find out whether someone has been infected. However, an AIDS test is not done at the same time as this test, unless this is agreed with the patient.

If one or both tests indicate an infection, medication can be used to prevent the disease from developing. This is very important in young children and people infected with HIV. It is often safer to treat infants immediately, irrespective of the test result.

What is tuberculosis?

Tuberculosis (TB) is an infectious disease that is caused by tuberculosis bacteria. The most common form is pulmonary tuberculosis. Someone suffering from the disease can infect his or her family and other people. Tuberculosis is dangerous, especially for small children and people whose immune system is weakened. However, it is curable if treated correctly.

How the disease is passed on

Tuberculosis bacteria are transmitted from person to person via the airways. When they cough, people suffering from TB release minute droplets containing tuberculosis bacteria into the surrounding air. These can then be breathed in by another person. You are at risk of being infected if you come into contact with someone suffering from pulmonary tuberculosis. The longer and closer that contact is, the greater the risk. People suffering from TB who cough up so many tuberculosis bacteria that they can be seen under the microscope in the laboratory are regarded as infectious.

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How the disease spreads in the body

After tuberculosis bacteria have been breathed in, they enter the lungs. Most infected people (around 90%) are able to keep the infection in check and do not become ill. In 10%, however, the disease will develop after a number of weeks, months or years, if the bacteria multiply in the lungs. Infants (under 5 years of age) and people with diseases that lower immunity (e.g. HIV) are more likely to become ill and are more severely affected. Then shadowing can often be seen on X-rays of the lungs. Whenever a person suffering from TB coughs, other people can become infected.

From the lungs the bacteria can also spread to other organs and cause tuberculosis in those organs, e.g. the lymph nodes (commonly in the neck), meninges, bones and abdominal organs.

Symptoms

Tuberculosis often starts with few signs or symptoms.

These include:

- cough, sometimes blood-stained
- weight loss
- lack of appetite
- tiredness
- slight fever
- night sweats
- chest pains

Not all TB patients will feel very ill. However, if you have a persistent cough lasting more than 2–3 weeks and any of the above symptoms, you should consult a doctor.

Diagnosis of tuberculosis

What tests are available to your doctor to find out whether you are suffering from tuberculosis?

1. Test for tuberculosis bacteria

The patient's phlegm (sputum) is examined for bacteria. In the laboratory, the sputum is stained so that the bacteria can be seen under the microscope. Sometimes, however, the bacteria cannot be seen until they have

been growing for several weeks. To achieve this, the sputum is stored in a nutrient medium for bacteria (culture) in the laboratory.

2. Chest X-rays

An abnormal chest X-ray may be evidence of tuberculosis. However, it cannot prove the diagnosis with certainty because other diseases can have the same appearance. This is why it is always necessary to have a sputum test for tuberculosis bacteria carried out in the laboratory.

3. Bronchoscopy

If no bacteria have been found, a bronchoscopy may also be required to make a definite diagnosis. This involves looking into the airways with a thin tube and removing samples for laboratory analysis.

Treatment of tuberculosis

The aim of treatment is to destroy the TB bacteria. The treatment usually lasts six months with several specific medications because the bacteria react only very slowly to the treatment. Even if a patient feels better after a few weeks, it is imperative that the medicines are taken every day and consistently throughout the treat-