TUBERCULOSIS



Tuberculosis (TB) is an infectious disease caused by the bacteria *Mycobacterium tuberculosis*. It is transmitted from one person to another via airborne bacterial particles, which are exhaled by individuals who have active TB infection in their lungs or throat.



Latent TB vs Active TB

Asymptomatic

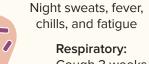
Individual does not feel sick.

TB bacteria are alive, but inactive.

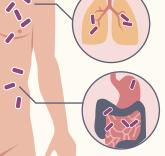
Cannot spread TB

5%–10% of cases will progress to active TB.

Treatment should be offered. If declined, follow with annual symptom assessment and periodic chest X-ray.



Cough 3 weeks or longer, chest pain, hemoptysis



GI: Loss of appetite, unexplained weight loss

Symptomatic

TB bacteria are active. They overwhelm the immune system and multiply.

Infectious when active in lungs and airways

Moves from lungs via bloodstream to other areas such as kidneys, spine and brain

Antibiotic treatment is necessary to prevent complications and transmission to others.

TB Screening

PPD skin test





IGRA blood test



Positive screening indicated exposure to *Mycobacterium* tuberculi: does not indicate if latent, active, or previous BCG vaccine (skin test only). Physical exam and further testing is required.

CLINICAL TIP

When assessing skin test, measure only the area of induration (not redness).

Risk factors are also considered in determining positive skin test.

Diagnosis

If positive skin or blood test:

- Review exposure risk.
- Assess for symptoms.
- Chest X-ray (may show lesions or cavitation)
- Sputum analysis

NOTES



