About Tuberculosis

What is TB?

- Tuberculosis (TB) is an airborne infectious disease caused by Mycobacterium tuberculosis.
- TB most commonly affects the lungs, but it can also affect the brain, spine, kidneys, and other organs.
- TB can be prevented and cured, though new vaccines, diagnostics, and treatments are needed to more effectively combat TB.

How TB Spreads

- TB is spread through the air when a person with active TB coughs, speaks, or sneezes.
- The disease is not spread by touch, food, or surfaces.

How TB is Treated?

TB must be treated with a combination of antibiotics to kill all bacteria, prevent relapse, and prevent the development of drug resistance.

To treat drug-sensitive TB, a person will take:

- a 4-drug combination
- for 6 months of treatment

Drug-resistant TB

- Develops when bacteria becomes resistant to standard drugs
- Can result from incomplete treatment or direct transmission from another person
- Historically required 9 - 24 months of treatment, with up to 14,000 pills and often daily injections
- Newer regimens are only 6 months, are all-oral, and have much better outcomes

Latent vs. Active TB

Latent TB Infection (LTBI)

- TB bacteria are present in the body, but are inactive.
- There are no symptoms.
- Latent TB is not contagious.
- About 1 in 4 people worldwide has latent TB.
- Of those with latent TB, about 5 - 10% will develop active TB in their lifetime.

Active TB Infection

- TB bacteria can multiply in a person's body and cause illness.
- People with TB can be contagious and spread the disease around homes, workplaces, and communities.
- TB can be fatal without proper treatment.

Global TB Burden

- About 10 million people develop TB each year, and about 400,000 of those cases are drug-resistant.
- There are more than 1 million deaths annually from TB and it is the leading cause of infectious disease death worldwide.
- Drug-resistant TB accounts for about 1 in 3 deaths from antimicrobial resistance, and is the leading cause of AMR-related death.
- TB is the leading cause of death among people living with HIV/AIDS.
- TB is present in every country in the world, but disproportionately affects low- and middle-income countries and primarily impacts adults in their most productive years.
- More than half of the annual estimated cases of drug-resistant TB go undiagnosed.

Improved Treatments

- Increase cure rates
- Reduce transmission
- Combat antimicrobial resistance
- Lower health system burden
- Reduce economic hardship for families

Ending TB requires sustained investment in research, innovation, and access.

TB Alliance