

TUBERCULOSIS FACT SHEET



The Bill & Melinda Gates Foundation is committed to reducing the number of people affected by tuberculosis (TB) through the innovative delivery of existing control strategies and development of new and better tools to prevent and treat the disease.

To date, we have invested more than \$750 million in the fight against TB. Through our efforts, we support the goals of the Global Plan to Stop TB—to treat 50 million people and prevent 14 million deaths from the disease by 2015.

PROGRESS ON TB CONTROL

There are encouraging new signs of progress on TB. A wave of new attention and funding is leading to results on a global scale. For example, by 2008, programs supported by the Global Fund to Fight AIDS, TB and Malaria had detected and treated 4.6 million cases of active TB.

Newly available diagnostic tools promise to strengthen TB control efforts and help slow the spread of drug-resistant TB. For example, a test now exists that can identify MDR-TB in a matter of hours—compared with the six weeks required for the test most commonly used today. Quicker diagnosis enables patients to begin appropriate treatment faster, and can help prevent further transmission. Research is also underway to develop new TB vaccines, treatments, and other tools that have the potential to save millions of lives.

OUR APPROACH

The Gates Foundation works with governments, pharmaceutical companies, academic institutions, and nongovernmental organizations to improve the prevention and treatment of TB. Our funding strategy prioritizes the following:

Research the basic biology of the disease

We support research to better understand the basic biology of TB—knowledge that is essential for developing better drugs, diagnostics, and vaccines.

Develop better tests

We support efforts, including work conducted by the Foundation for Innovative New Diagnostics (FIND), to develop rapid, accurate, and affordable diagnostic tests that will quickly identify TB cases and help reduce further transmission.

Develop new vaccines

We fund efforts to develop new, more effective TB vaccines and ensure that they are affordable and available to all who need them. For example, we support the Aeras Global TB Vaccine Foundation in its efforts to develop TB vaccines for infants and adolescents. If a vaccine is proven safe and effective, Aeras will work with partners to ensure it is affordable in developing countries.

Develop more effective drugs

We support the development of more effective and faster-acting first- and second-line TB drugs that can be used by all infected people, including those with drug-resistant TB and those with HIV infection. For example, we fund the Global Alliance for TB Drug Development, which currently has nine drug candidates in its development portfolio, including two in clinical trials.

Make better use of existing tools

While future vaccines, drugs, and diagnostic methods offer great promise, they will take time to develop. Therefore, we support programs to make better use of existing strategies to improve TB control. Our grantees in this area include the Consortium to Respond Effectively to the AIDS/TB Epidemic (CREATE), an alliance of researchers, clinicians, policy makers, AIDS/TB control programs, and communities working to improve TB control strategies in areas with high rates of HIV infection. In addition, with funding from the foundation, the Chinese government is working to introduce TB diagnostic tests, drug regimens, and patient monitoring strategies that could significantly improve the effectiveness of TB control programs.



Raise public awareness about the disease and advocate for funding

We support efforts to inform policymakers and the public about TB, and to encourage increased government and private donor support. For example, we support the RESULTS Educational Fund to mobilize additional TB funding from donors and advocate for expanded access to treatment in countries with high TB burdens.

TB'S GLOBAL IMPACT

Tuberculosis is a potentially fatal disease caused by airborne bacteria that primarily affect the lungs. One-third of the world's population has been infected with the TB bacterium. Although most do not have symptoms and are not contagious, some develop "active" TB, which is contagious.

Currently, more than nine million people develop active TB each year, and 1.7 million people die from the disease. While most TB cases are in Asia, the highest rates of TB are in Africa, where high rates of HIV weaken immune systems and accelerate the spread of TB.

In recent years, TB control efforts have taken on increased urgency due to the emergence of multi-drug resistant TB (MDR-TB), a form of the disease that is resistant to at least two first-line TB drugs, and extensively drug-resistant TB (XDR-TB), which is resistant to both first-line and some second-line drugs. These forms of the disease are especially difficult and costly to treat, and are the result of years of inadequate diagnosis and treatment of TB.

