

Tuberculosis in Blacks

Tuberculosis (TB) is a disease caused by a bacterium called *Mycobacterium tuberculosis*. The disease is spread from person to person through the air. The bacteria usually attack the lungs, but TB bacteria can attack any part of the body such as the kidney, spine, and brain. If not treated properly, TB disease can be fatal.

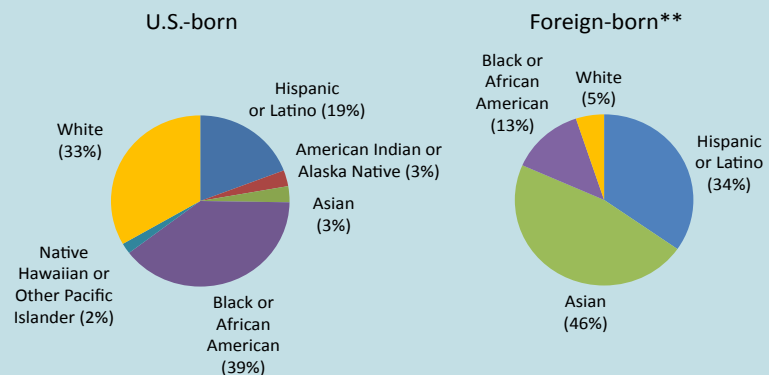
TB disease was once a leading cause of death in the United States, but since 1993 the rates of TB in the country have declined in all groups. In 2011, a total of 10,528 TB cases were reported in the United States; however, blacks continue to have a disproportionate share of TB. The percentage of TB cases in blacks is higher than expected based on the percentage of blacks in the U.S. population. If looking at only people born in the United States, the proportion of TB in blacks is even greater. Although rates of TB in blacks have declined substantially over the past decade, the disparity remains. Addressing the TB disparity among blacks is an important priority; prevention and control efforts should be targeted to this population.

The Numbers

In 2011, TB disease was reported in 1533 non-Hispanic blacks in the United States, accounting for 23% of all people reported with TB nationally.

- Among U.S.-born people reported with TB disease, 39% were non-Hispanic blacks.
- The rate of TB disease was 6.3 cases per 100,000 population, which is over seven times higher than the rate of TB disease in white, non-Hispanic people (0.8 cases per 100,000 population).

Reported TB Cases by Origin and Race/Ethnicity,*
United States, 2011



*All races non-Hispanic. Persons reporting two or more races accounted for less than 1% of all cases.
**American Indian or Alaska Native and Native Hawaiian or Center Pacific Islander accounted for less than 1% of foreign-born cases and are not shown.

Prevention Challenges

TB is a challenging disease to diagnose, treat, and control. Dwindling resources and loss of public health capacity, including access to care and maintaining clinical and public health expertise add to the challenge. It is critical to reach those at highest risk for TB, and to identify and implement innovative strategies to improve testing and treatment.

TB rates are higher for some racial and ethnic groups. This relates to a greater proportion of people in these groups who have other risk factors for TB. Like other communities, blacks face a number of challenges that contribute to higher rates of TB. Challenges include:

- The duration of treatment for latent TB infection and TB disease is lengthy. Patients are often unable or reluctant to take medication for several months. For people with TB disease, inadequate treatment can lead to treatment failure, relapse, ongoing transmission, and development of drug resistance. For people with latent TB infection, medication for a condition with no symptoms of illness is often not a priority.
- Socioeconomic factors impact health outcomes and are associated with poverty, including limited access to quality health care, unemployment, housing, and transportation. These factors can directly or indirectly increase the risk for TB disease and present barriers to treatment of this disease.
- Language and cultural barriers, including health knowledge, stigma associated with the disease, values, and beliefs may also place certain populations at higher risk. Stigma may deter people from seeking medical care or follow up care.

- TB remains a serious threat, especially for people who are infected with human immunodeficiency virus (HIV). People infected with HIV are more likely than uninfected people to get sick with other infections and diseases, including TB.
- Blacks have the most severe burden of HIV of all racial/ethnic groups in the United States. Compared with other races and ethnicities,
 - Blacks account for a higher proportion of HIV infections at all stages of disease—from new infections to deaths.
 - Blacks accounted for an estimated 44% of all new HIV infections among adults and adolescents (aged 13 years or older) in 2010, despite representing only 12% to 14% of the U.S. population.
 - Without treatment, as with other opportunistic infections, HIV and TB can work together to shorten the life of the person infected.



- In addition to HIV, other underlying medical conditions may increase the risk that latent TB infection will progress to TB disease. For example, the risk is higher in people with diabetes, substance abuse (including injection of illegal drugs), silicosis, or those undergoing medical treatments with corticosteroids.
- Delayed detection and diagnosis of TB disease, as well as delayed reporting of TB disease remains a challenge in TB prevention and treatment. Because the number of TB cases in the United States is declining, there is decreased awareness of TB signs and symptoms among health care providers and at-risk populations. Patients may be less likely to seek medical care and health care providers may be less likely to consider TB as the cause.

What CDC is Doing

To achieve TB elimination, ongoing efforts are needed to address the persistent disparities that exist among racial and ethnic minorities in the United States.

CDC is working on projects designed to educate and raise awareness about TB in black communities. In one project, representatives from ten sites where disproportionate cases of TB disease are reported in blacks received training to enhance skills for engaging communities, develop strategies, and sustain partnerships for reducing TB rates.

Other CDC activities include a study to identify the socio-cultural, racial, and health system barriers specifically for blacks with or at risk for TB. The study's goals include the development and testing of interventions to eliminate racial and ethnic disparities in TB rates in blacks; and to make improvements in health-seeking behavior, contact investigations, culturally sensitive case management, and completion of treatment among black TB patients.

Data from a national sample of U.S.-born blacks also will be reviewed to quantify the time to diagnose and treat TB; examine the roles of the patient, provider, laboratories, and TB programs that affect timeliness of diagnosis and treatment of blacks; and evaluate the effect that time of exposure has on transmission. The findings will be used to propose performance goals and indicators for TB programs in an effort to encourage faster diagnosis and treatment in this population.

Addressing the TB disparity among blacks is an important priority; prevention and control efforts should be targeted to this population.

CDC Tuberculosis Website: <http://www.cdc.gov/tb>