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NONTUBERCULOUS MYCOBACTERIA – WHY TREATMENT IS SO DIFFICULT?

Summary

Nontuberculous mycobacteria (NTM) is a group of opportunistic species of mycobacteria other than *Mycobacterium tuberculosis* complex and *Mycobacterium leprae*, which are widespread in the environment occurring in soil, water and dust. Therefore, it is common to localize them in the respiratory, gastrointestinal tract and skin. In the past two decades, increasing number of infections caused by atypical mycobacteria was reported worldwide. Development of molecular biology and new diagnostic tests enables faster distinction of atypical mycobacteria from *Mycobacterium tuberculosis* complex and more accurate identification of the species. Most atypical mycobacteria are naturally resistant to antibiotics commonly used for treatment of both mycobacteriosis and tuberculosis. The drug resistance of NTM involves nonspecific mechanisms, which also occur in other bacteria, and specific mechanisms characteristic for mycobacteria only. Resistance can be innate, determined by the bacterial genome, or acquired, as the result of mutational changes.