

Nontuberculous Mycobacteria



Rapid differentiation and drug susceptibility testing!



Your molecular genetic test system for the detection of resistance to macrolides and aminoglycosides in various clinically relevant NTM.

Your benefits of using GenoType NTM-DR

- **Reliable results:** GenoType NTM-DR allows the simultaneous detection and differentiation of several nontuberculous mycobacteria (NTM) and their resistance to macrolides and aminoglycosides from cultured material. Thus, this test system is an additional tool for the diagnosis and treatment regimen of NTMs.
- **Innovative:** The test can uniquely differentiate between *M. intracellulare* and *M. chimaera* using a proven technology.
- **Rapid results:** Results with detailed information are available within 5 hours only compared to laborious and time-consuming conventional methods.
- **User-friendly:** The well-established DNA•STRIP technology enables manual or automated processing – thus a convenient implementation in your lab is easily possible.
- **CE-marked:** No need for elaborate validation studies.

Facts

The incidence of infections caused by nontuberculous mycobacteria (NTM) is increasing since years and therefore adequate therapeutic regimens are becoming more and more important. Within the group of NTMs, especially the members of the *M. avium* and *M. abscessus* complex are in the focus of interest. Infections caused by those mycobacteria are difficult to treat due to drug resistances. Thus, the treatment outcome differs significantly.

Macrolides are an important component of the antimycobacterial drug therapy. However, resistances to macrolides may limit treatment options and endanger therapeutic success. One potential resistance mechanism is mediated by mutations within the *rrl* gene. Another mechanism that only affects the members of the *M. abscessus* complex is caused by the *erm(41)* gene. This gene influences susceptibility against clarithromycin of the subspecies – therefore the detection of *erm(41)* should be part of molecular genetic resistance testing. Aminoglycosides are also often used to treat NTM diseases. Resistance to aminoglycosides is primarily caused by mutations in the *rrs* gene.

Consequently, the management of NTM infections requires the rapid determination of the resistance status in order to provide an appropriate therapy.

GenoType NTM-DR – Rapid NTM differentiation and resistance testing

GenoType NTM-DR allows the detection of several clinically relevant NTMs including the differentiation between *M. intracellulare* and *M. chimaera*. Furthermore, the mycobacteria resistance to macrolides and aminoglycosides are also detected within the same step. Thus, **GenoType NTM-DR** provides crucial information as a prerequisite for an adequate therapeutic regimen.

