

Plasmid pMRLB73 **Containing** **Gene**
ML0050 (Protein CFP-10) **from**
Mycobacterium leprae

Catalog No. NR-19338

This reagent is the tangible property of the U.S. Government.

For research use only. Not for human use.

Contributor:

BEI Resources

Manufacturer:

Karen Dobos, PhD., Colorado State University, Fort Collins, Colorado, USA

Product Description:

NR-19338 is a recombinant expression vector containing *Mycobacterium leprae* gene ML0050, which encodes culture filtrate protein 10 (CFP-10) [also known as ESAT-6-like protein (EsxB)].^{1,2} Gene ML0050 was amplified by PCR and cloned into pET28b for expression in *Escherichia coli*, strain TOP10. The expressed protein is histidine-tagged and has an observed molecular weight of 10 kDa.

Note: Plasmid pMRLB73 contains the gene required for kanamycin (Ka) resistance. The recommended concentration of Ka in culture is 50 µg/mL.

Material Provided:

Each vial contains approximately 1 µg of plasmid DNA in TE buffer (10 mM Tris-HCl, 1 mM EDTA buffer, pH 8). Please refer to the Certificate of Analysis for lot-specific information.

Packaging/Storage:

NR-19338 was packaged aseptically in cryovials. The product is provided frozen and should be stored at -80°C or colder immediately upon arrival. Freeze-thaw cycles should be avoided.

Citation:

Acknowledgment for publications should read “The following reagent was obtained through BEI Resources, NIAID, NIH: Plasmid pMRLB73 Containing Gene ML0050 (Protein CFP-10) from *Mycobacterium leprae*, NR-19338.”

Biosafety Level: 1

Appropriate safety procedures should always be used with this material. Laboratory safety is discussed in the following publication: U.S. Department of Health and Human Services, Public Health Service, Centers for Disease Control and Prevention, and National Institutes of Health. Biosafety in Microbiological and Biomedical Laboratories. 5th ed. Washington, DC: U.S. Government Printing Office, 2009; see www.cdc.gov/biosafety/publications/bmbl5/index.htm.

Disclaimers:

You are authorized to use this product for research use only. It is not intended for human use.

Use of this product is subject to the terms and conditions of the BEI Resources Material Transfer Agreement (MTA). The MTA is available on our Web site at www.beiresources.org.

While BEI Resources uses reasonable efforts to include accurate and up-to-date information on this product sheet, neither ATCC® nor the U.S. Government makes any warranties or representations as to its accuracy. Citations from scientific literature and patents are provided for informational purposes only. Neither ATCC® nor the U.S. Government warrants that such information has been confirmed to be accurate.

This product is sent with the condition that you are responsible for its safe storage, handling, use and disposal. ATCC® and the U.S. Government are not liable for any damages or injuries arising from receipt and/or use of this product. While reasonable effort is made to ensure authenticity and reliability of materials on deposit, the U.S. Government, ATCC®, their suppliers and contributors to BEI Resources are not liable for damages arising from the misidentification or misrepresentation of products.

Use Restrictions:

This material is distributed for internal research, non-commercial purposes only. This material, its product or its derivatives may not be distributed to third parties. Except as performed under a U.S. Government contract, individuals contemplating commercial use of the material, its products or its derivatives must contact the contributor to determine if a license is required. U.S. Government contractors may need a license before first commercial sale. This material may be subject to third party patent rights.

References:

1. Leprosy: Gene [ML0050](#)
2. Spencer, J. S., et al. “Analysis of Antibody Responses to *Mycobacterium leprae* Phenolic Glycolipid I, Lipoarabinomannan, and Recombinant Proteins to Define Disease Subtype-Specific Antigenic Profiles in Leprosy.” Clin. Vaccine Immunol. 18 (2011): 260-267. PubMed: 21177913.

ATCC® is a trademark of the American Type Culture Collection.

