

Hsp65 Recombinant Protein | groEL recombinant protein

Recombinant M. bovis HSP65, native sequence

CATALOG #	HOST	REACTIVITY	APPLICATIONS
AAA17808	Mycobacterium bovis BCG	Mycobacterium bovis BCG	Western Blot

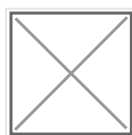
PRODUCT SYNONYMS

Hsp65; Recombinant M. bovis HSP65; native sequence; 60kD chaperonin 2; Antigen A; Cell wall protein A; groEL; GroEL2; GroL2; M. Tuberculosis cell wall protein A; M. Tuberculosis Hsp65; Protein Cpm60 2; groEL recombinant protein

PRODUCT SPECIFICATIONS

Host	Mycobacterium bovis BCG
Reactivity	Mycobacterium bovis BCG
Purity/Purification	Multi-Step Chromatography
Form/Format	20mM Tris, 150mM NaCl, 10% glycerol.
Concentration	0.5mg/mL (varies by lot)
Applicable Applications for groEL recombinant protein	WB (Western Blot)
Certificate of Analysis	This product has been certified >90% pure using SDS-PAGE analysis.
Expression System	E Coli
Cellular Localization	Cytoplasm
Research Area	Heat Shock
Function	Hsp65 isolated from Mycobacterium bovis BCG, is a member of the hsp60 family of heat shock proteins (2, 3). Hsp60s are mitochondrial chaperonins that are typically held responsible for the transportation and refolding of proteins from the cytoplasm into the mitochondrial matrix. In addition to its role as a heat shock protein, Hsp60 functions as a chaperonin to assist in folding linear amino acid chains into their respective three-dimensional structure. Hsp60s are a ubiquitous class of HSPs that specifically promote the folding and assembly of cellular polypeptides in an ATP-dependent manner (1). Specifically, sequence comparison of Hsp65 from different mycobacterium strains showed that the protein sequence of M. bovis BCG is identical to that of M. tuberculosis, and very similar to that of M. leprae, the pathogens that cause tuberculosis and tuberculoid leprosy, respectively (2,4). Mycobacterium bovis BCG Hsp65 was identified as the immunodominant antigen during mycobacterial diseases and vaccination. It is also believed to be the antigen that induces autoimmune disease, such as adjuvant arthritis in rats (5, 6).
Preparation and Storage	-20°C ; 1 year. Avoid freeze / thaw cycle.

IMAGES



SDS-PAGE

SDS-PAGE of 65kDa M. Bovis Hsp65 protein (AAA17808).

ADDITIONAL INFORMATION

Product Categories/Family for groEL recombinant protein	Heat Shock
References	1. Koll H., et al. (1992) Cell 68: 1163-1175. 2. Thole J.E.R., et al. (1985) Infect. Immuno. 50: 800- 806. 3. Thole J.E.R., et al., (1987) Infect. Immuno. 55: 1466- 1475. 4. Shinnick T.M. Sweetser D., Thole J., van Embden J. and Young R.A. (1987) Infect. Immuno. 55: 1932-1935. 5. Van Eden W., et al. (1988) Nature 331: 171-178. 6. Cobelens P.M., et al. (2002) Rheumatology 41: 775- 779. 1. Adamus, G. et. al. (2013). Detection of autoantibodies against heat shock proteins and collapsin response mediator proteins in autoimmune retinopathy. BMC Ophthalmology 2013, 13:48 doi:10.1186/1471-2415-13-48

NCBI AND UNIPROT INFORMATION

NCBI GI #	61221043
NCBI GeneID	1091466
UniProt Accession #	P0A520; M15467
Molecular Weight	~ 65kD
NCBI Official Symbol	groEL
NCBI Protein Information	chaperonin

For Research Use Only. Not for use in diagnostic or therapeutic procedures. Small volumes of product may become entrapped in the seal of the vial during shipment and storage; if necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the cap.

AAA Biotech | Tel: +1 (619) 604-9440 | Fax: +1 (619) 604-9441 | contact@aaabiotech.com
Online datasheet: <https://stage.aaabiotech.com/hsp65-recombinant-protein-mycobacterium-bovis-bcg-wb-western-blot/17808>