

RayBiotech, Inc.

3607 Parkway Lane suite 200 Norcross,GA 30092 Tel: 770-729-2992, 1-888-494-8555

Fax: 770-206-2393

Website: www.raybiotech.com Email: info@raybiotech.com

Certificate of Analysis and Data Sheet

Mouse Anti-HUMAN TLR7

With HRP-conjugated secondary antibody

Catalog No. Target Species: Isotype: DS-MB-03427 Human IgG1

Preparation

Purification: Purified IgG prepared by affinity chromatography on Protein G

Immunogen: Recombinant human TLR7 (amino acids 451-500) purified from *Escherichia coli*.

Fusion Partners: Spleen cells from immunized Balb/c mice were fused with cells of the mouse SP2/0

myeloma cell line.

Formulation

Product Type: Monoclonal Antibody **Product Form:** T Purified IgG - liquid

Buffer Solution: Phosphate buffered saline pH7.4 **Preservative Stabilizers:** 0.09% Sodium Azide (NaN₃)

Approx. Protein Concentrations: IgG concentration 1.0 mg/ml

Specificity

DS-MB-03427 specifically recognizes human TLR7 (toll-like receptor 7), a 121 kDa type I transmembrane protein which belongs to the toll-like receptor (TLR) family, and is predominantly expressed in the spleen, lung and placenta.

TLRs are highly conserved proteins which play a key role in activation of innate immunity, through the recognition of distinct molecular patterns expressed by infectious agents. TLR7 recognizes and interacts with single-stranded RNA (ssRNA) derived from viruses such as influenza, HIV-1 (human immunodeficiency virus type I) and Sendai, and some siRNAs, resulting in the activation of the MyD88/interleukin-1 receptor-associated kinase (IRAK) signaling pathway, and the production of proinflammatory signaling molecules.

Storage

Store at +4°C or at -20°C if preferred.

Storage in frost-free freezers is not recommended.

This product should be stored undiluted. Avoid repeated freezing and thawing as this may denature the antibody. Should this product contain a precipitate we recommend microcentrifugation before use. **Shelf Life:** 18 months from date of dispatch.



RayBiotech, Inc.

3607 Parkway Lane suite 200 Norcross,GA 30092 Tel: 770-729-2992, 1-888-494-8555

Fax: 770-206-2393

Website: www.raybiotech.com Email: info@raybiotech.com

Applications

Options Functions	YES	NO	Not determined	Recommended Work dilution or concentration
Immunoprecipitation			•	
Immunohistology - Frozen			•	
Immunohistology - Paraffin			•	
Immunohistology - Resin			•	
Flow Cytometry			•	
Western Blotting	•			1:1,000-1:2,000
Elisa	•			

Note: other applications are not tested yet. Optimal dilutions should be determined by the users. (1) DS-MB-03427 detects a band of approximately 121 kDa in Ramos cell lysates.

Secondary Antibody Applications

Immunoassay (ELISA, Western blotting): 1:5,000-1:10,000

Reference

1. Kawai, T. and Akira, S. (2006) TLR signaling. Cell Death Differ. 13: 816-825.