



LIST BIOLOGICAL LABORATORIES, INC.

540 DIVISION STREET CAMPBELL CALIFORNIA 95008-6906 USA
408-866-6363 FAX 408-866-6364 EMAIL info@listlabs.com
WEBSITE www.listlabs.com

Product #401
Lot #40139A1
Release Date: October 2012
Recommended Retest Date: September 2018

CERTIFICATE OF ANALYSIS LIPID A, MONOPHOSPHORYL (MPLA) from *Salmonella minnesota* R595 (Re) Lot #40139A1

Contents

Each vial contains 1 mg of Lipid A, monophosphoryl (MPLA), from *Salmonella minnesota* R595 (Re) lipopolysaccharide.

Analysis

Thin Layer Chromatography (TLC).....	7-,6-,5-,4-3-acyl forms present
Mass Spectroscopy.....	7-,6-,5-,4-3-acyl forms present
2-Keto-3-deoxyoctonate (KDO) ¹	0.01%
Phosphate ²	3.0%
Endotoxin by kinetic chromogenic LAL	85,000 EU/mg

Packaging/Reconstitution/Storage

This product is provided as a lyophilized powder, sealed under vacuum. Lipid A is insoluble in water. It may be suspended in DMSO or 0.5% triethylamine. A usable suspension may also be achieved in water by heating to 50°C combined with intermittent vortexing and/or sonication.³ Store at 2-8°C prior to and following reconstitution.

Handling

Good laboratory technique should be employed in the safe handling of this product. Wear appropriate laboratory attire including a lab coat, gloves and safety glasses. Nitrile gloves are recommended when handling lyophilized material.

This product is pyrogenic. Avoid accidental autoinoculation by exercising extreme care when handling in conjunction with any injection device.

This product is intended for research purposes by qualified personnel. It is not intended for use in humans or as a diagnostic agent. List Biological Laboratories, Inc. is not liable for any damages resulting from the misuse or handling of this product.

FOR RESEARCH PURPOSES ONLY. NOT FOR USE IN HUMANS.

References

1. Cynkin, M.A. and Ashwell, G. (1960) *Nature* **186**, 155-156.
2. Ames, B.N. and Dubin, D.T. (1960) *J. Biol. Chem.* **235**, 769-775.
3. Mukerjee, P., Kastowsky, M., Obst, S., Takayama, K. (1999) Lipopolysaccharide Preparations in Aqueous Media in *Endotoxin in Health and Disease*, Brade, H., Opal, S.M., Vogel, S.N., Morrison, D.C. eds., Marcel Dekker, Inc., New York, p. 223-224.

Production: 10 Date: 6/21/17 Management: sc Date: 6/21/17 QA/QC: CRP Date: 6/21/17