

Lipopolysaccharides (LPS)

Technical literature is available at: www.mesgenbio.com. E-mail MesGen Technical Services if you have questions on use of this system: tech@mesgenbio.com



Catalog Number : MG3356

Lot Number : Refer to vial

Form : lyophilized powder, solid

Purified by : phenol extraction

Impurities : <3% Protein (Lowry)

Derived from : *Escherichia coli* 055:B5

Application

An endotoxic O-antigen found of Gram-negative bacteria.

Background

Lipopolysaccharides from *Escherichia coli* 055:B5, is a characteristic component of the cell wall of Gram-negative bacteria. Lipopolysaccharides (LPS) and its lipid A moiety stimulate cells of the innate immune system via the Toll-like receptor 4 (TLR4). Lipopolysaccharides (LPS) are localized in the outer layer of the membrane and are, in noncapsulated strains, exposed on the cell surface. They contribute to the integrity of the outer membrane, and protect the cell against the action of bile salts and lipophilic antibiotics.

Solubility

Soluble in water (5 mg/mL) or cell culture medium (1 mg/mL) yielding a hazy, faint yellow solution, a more concentrated, though still hazy, solution (20 mg/ml) has been achieved in aqueous saline after vortexing and warming to 70-80 °C, and 0.5% triethylamine (extremely soluble) and methanol yields a turbid suspension with floaters, while water yields a homogeneously hazy solution.

Storage

2-8° C

For Research Use Only. Not For Use In Diagnostic Procedures.