

Recombinant Protein Technical Manual Recombinant Rat CLP1/COLEC12 Protein (His Tag)

RPES3710

Product Data:

Product SKU: RPES3710 **Size:** 50μg

Species: Rat Expression host: Baculovirus-Insect Cells

Uniprot: Q4V885

Protein Information:

Molecular Mass: 72.4 kDa

AP Molecular Mass: 90 kDa

Tag: N-His

Bio-activity:

Purity: > 99 % as determined by SDS-PAGE

Endotoxin: $< 1.0 \text{ EU per } \mu \text{g of the protein as determined by the LAL method}$

Storage: Lyophilized proteins are stable for up to 12 months when stored at -20 to -80°C.

Reconstituted protein solution can be stored at 4-8°C for 2-7 days. Aliquots of

reconstituted samples are stable at < -20°C for 3 months.

Shipping: This product is provided as lyophilized powder which is shipped with ice packs.

Formulation: Lyophilized from sterile 20mM Tris, 500mM NaCl, pH 8.0

Reconstitution: Please refer to the printed manual for detailed information.

Application:

Synonyms: Clp1;Nsr2;COLEC12

Immunogen Information:

Sequence: Ala101-Leu742

Background:

CLP1, also known as COLEC12, is a scavenger receptor that displays several functions associated with host defense. It contains 1 C-type lectin domain and 3 collagen-like domains. CLP1 is strongly expressed in placenta and moderately expressed in heart, skeletal muscle, small intestine and lung. It promotes binding and phagocytosis of Gram-positive, Gram-negative bacteria and yeast. CLP1 mediates the recognition, internalization and degradation of oxidatively modified low density lipoprotein (oxLDL) by vascular endothelial cells. It binds to several carbohydrates including Gal-type ligands, D-galactose, L- and D-fucose, GalNAc, T and Tn antigens in a calcium-dependent manner and internalizes specifically GalNAc in nurse-like cells. It binds also to sialyl Lewis X or a trisaccharide and asialo-orosomucoid (ASOR). CLP1 may also play a role in the clearance of amyloid beta in Alzheimer disease.