## **Elabscience**®

## Recombinant Mouse CD14 Protein(Fc Tag)

## Catalog Number: PDMM100142

Note: Centrifuge before opening to ensure complete recovery of vial contents.

Description		
Species	Mouse	
Source	Mammalian-derived Mouse CD14 proteins Pro20-Ala344, with an C-terminal Fc	
Calculated MW	61.3 kDa	
Observed MW	80 kDa	
Accession	P10810	
Bio-activity	Not validated for activity	
Properties		
Purity	> 90% as determined by reducing SDS-PAGE.	
Endotoxin	< 1.0 EU/mg of the protein as determined by the LAL method	
Storage	Generally, 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 $< -20^{\circ}$ C for 3 months.	
Shipping	This product is provided as lyophilized powder which is shipped with ice packs.	
Formulation	Lyophilized from a 0.2 $\mu m$ filtered solution in PBS with 5% Trehalose and 5%	
	Mannitol.	
Reconstitution	It is recommended that sterile water be added to the vial to prepare a stock solution of	
	0.5 mg/mL. Concentration is measured by UV-Vis.	

Data

	М	R
kDa		
80	-	terms.
60		
40	-	
30		
20		
12		

SDS-PAGE analysis of Mouse CD14 proteins , 2µg/lane of Recombinant Mouse CD14 proteins was resolved with SDS-PAGE under reducing conditions , showing bands at 80 KD

Background

## **Elabscience**®

The cluster of differentiation (CD) system is commonly used as cell markers in immunophenotyping. Different kinds of cells in the immune system can be identified through the surface CD molecules associating with the immune function of the cell. There are more than 320 CD unique clusters and subclusters have been identified. Some of the CD molecules serve as receptors or ligands important to the cell through initiating a signal cascade which then alter the behavior of the cell. Some CD proteins do not take part in cell signal process but have other functions such as cell adhesion. Cluster of differentiation 14 (CD14) is a member of the CD system. It takes its name from its inclusion in the CD molecule surface marker proteins. CD14 exists in two forms: a form anchored into the membrane or a soluble form. CD14 was found expressed in macrophages , neutrophil granulocyte and dendritic cells. The major function is to serve as a co-receptor ( along with TLR4 and MD-2) for the bacterial lipopolysaccharide (LPS) and other pathogen-associated molecular patterns