

Product datasheet

Recombinant human MCP1 protein (Active) ab270081

[5 Images](#)

Description

Product name	Recombinant human MCP1 protein (Active)	
Biological activity	Fully biologically active determined by the dose dependent migration of human PBMCs or THP-1 monocytes. ED ₅₀ is ≤10-50 ng/ml, corresponding to a specific activity of 0.1-0.02 x 10 ⁶ units/mg.	
Purity	≥ 95 % SDS-PAGE. =95% by HPLC	
Endotoxin level	≤0.005 Eu/μg	
Expression system	HEK 293 cells	
Accession	P13500	
Protein length	Full length protein	
Animal free	Yes	
Carrier free	Yes	
Nature	Recombinant	
Species	Human	
Sequence	QPDAINAPVT CCYNFTNRKI SVQRLASYRR ITSSKCPKEA VIFKTIVAKE ICADPKQKWV QDSMDHLDKQ TQTPKT	
Predicted molecular weight	9 kDa	
Actual molecular weight	9 kDa	
Molecular weight information	Predicted mass is 8742.08 Da (+/- 10 Da by ESI TOF). Observed mass is 8742 Da.	
Amino acids	24 to 99	
Additional sequence information	N-terminal glycine. Full-length mature chain lacking the signal peptide.	

Specifications

Our [Abpromise guarantee](#) covers the use of **ab270081** in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

Applications	Sandwich ELISA
	SDS-PAGE
	Functional Studies

	Mass Spectrometry
	HPLC
Form	Lyophilized

Preparation and Storage

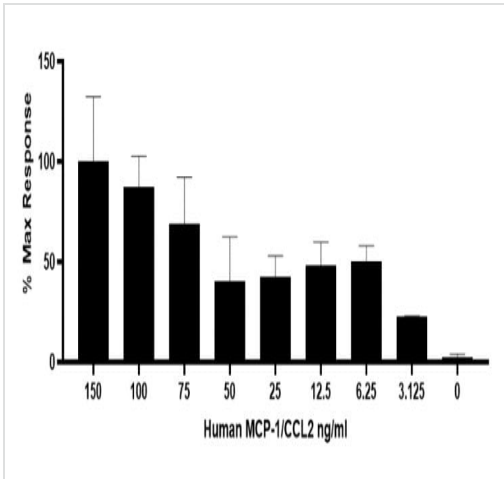
Stability and Storage	Shipped at Room Temperature. Store at Room Temperature. Constituents: 0.727% Dibasic monohydrogen potassium phosphate, 0.248% Monobasic dihydrogen potassium phosphate, 10.26% Trehalose This product is an active protein and may elicit a biological response in vivo, handle with caution.
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Reconstitution	Reconstitute with phosphate buffered saline. Store lyophilized form at room temperature. Reconstitute, aliquot and store at -80°C for 12 months or +4°C for 1 week. Avoid repeated freeze-thaw. Lyophilized contents may appear as either a translucent film or a white powder. This variance does not affect the quality of the product. Lyophilized contents may appear as either a translucent film or a white powder. This variance does not affect the quality of the product.
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General Info

Function	Chemotactic factor that attracts monocytes and basophils but not neutrophils or eosinophils. Augments monocyte anti-tumor activity. Has been implicated in the pathogenesis of diseases characterized by monocytic infiltrates, like psoriasis, rheumatoid arthritis or atherosclerosis. May be involved in the recruitment of monocytes into the arterial wall during the disease process of atherosclerosis.
Sequence similarities	Belongs to the intercrine beta (chemokine CC) family.
Post-translational modifications	Processing at the N-terminus can regulate receptor and target cell selectivity. Deletion of the N-terminal residue converts it from an activator of basophil to an eosinophil chemoattractant.
Cellular localization	Secreted.

Images



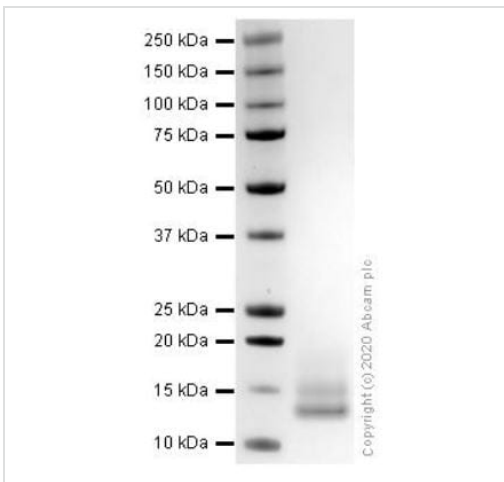
Functional Studies - Recombinant human MCP1 protein (ab270081)

Fully biologically active determined by the dose dependent migration of human PBMCs or THP-1 monocytes.

ED₅₀ is ≤10-50 ng/ml, corresponding to a specific activity of 0.1-0.02 x 10⁶ units/mg.

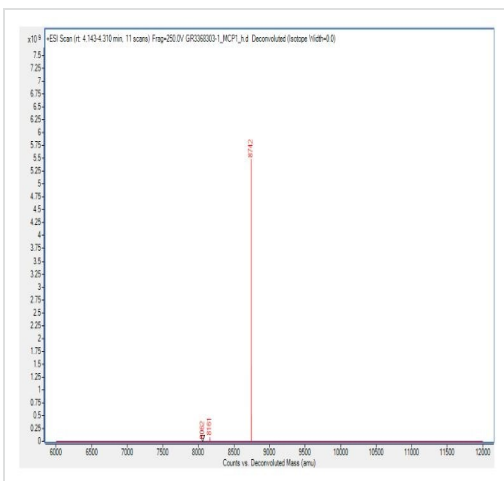
Cell based assay testing is performed on the first lot of protein only and is provided as a reference for protein activity; subsequent lots of protein must pass all biophysical quality control parameters that meet the same parameters as the first lot.

Lot: GR3368303-1



SDS-PAGE - Recombinant human MCP1 protein (ab270081)

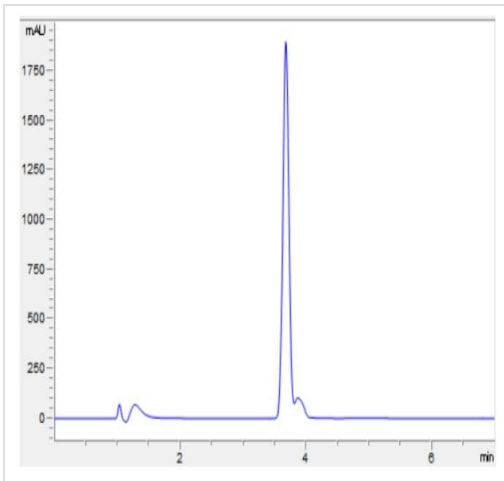
SDS-PAGE analysis of ab270081.



Mass Spectrometry - Recombinant human MCP1 protein (ab270081)

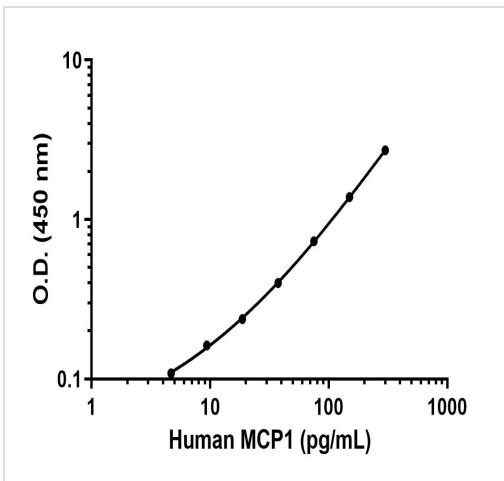
Mass determination by ESI TOF.

Predicted mass is 8742.08 Da (+/- 10 Da by ESI TOF). Observed mass is 8742 Da.



HPLC analysis of ab270081.

HPLC - Recombinant human MCP1 protein (ab270081)



Background subtracted standard curve using Human MCP1 Antibody Pair - BSA and Azide free (ab241803) and Recombinant human MCP1 protein (Active) (ab270081) in sandwich ELISA. The ELISA was performed using the components of the corresponding SimpleStep® kit, which uses the same antibody pair with a different formulation and format.

Sandwich ELISA - Recombinant human MCP1 protein (Active) (ab270081)

Please note: All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES"

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