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Anti-MCP-1 Antibody

Catalog # ABO12256

Product Information

Application	WB, E
Primary Accession	P13500
Host	Rabbit
Reactivity	Human
Clonality	Polyclonal
Format	Lyophilized
Description	Rabbit IgG polyclonal antibody for C-C motif chemokine 2(CCL2) detection. Tested with WB, ELISA in Human.
Reconstitution	Add 0.2ml of distilled water will yield a concentration of 500ug/ml.

Additional Information

Gene ID	6347
Other Names	C-C motif chemokine 2, HC11, Monocyte chemoattractant protein 1, Monocyte chemotactic and activating factor, MCAF, Monocyte chemotactic protein 1, MCP-1, Monocyte secretory protein JE, Small-inducible cytokine A2, CCL2, MCP1, SCYA2
Calculated MW	11025
Application Details	ELISA , 0.1-0.5 □g/ml, Human, - Western blot, 0.1-0.5 □g/ml, Human
Subcellular Localization	Secreted.
Source	Eukaryota
Protein Name	C-C motif chemokine 2
Contents	Each vial contains 5mg BSA, 0.9mg NaCl, 0.2mg Na2HPO4, 0.05mg NaN3.
Immunogen	E. coli-derived human MCP-1 recombinant protein (Position: Q24-T99). Human MCP-1 shares 60.9% and 59.4% amino acid (aa) sequence identity with mouse and rat MCP-1, respectively.
Purification	Immunogen affinity purified.
Cross Reactivity	No cross reactivity with other proteins
Storage	At -20˚C for one year. After r˚Constitution, at 4˚C for one month. It˚Can also be aliquotted and stored frozen at -20˚C for a longer time.Avoid repeated

	freezing and thawing.
Sequence Similarities	Belongs to the intercrine beta (chemokine CC) family.

Protein Information

Name	CCL2
Synonyms	MCP1, SCYA2
Function	Acts as a ligand for C-C chemokine receptor CCR2 (PubMed: 10529171, PubMed:10587439, PubMed:9837883). Signals through binding and activation of CCR2 and induces a strong chemotactic response and mobilization of intracellular calcium ions (PubMed:10587439, PubMed:9837883). Exhibits a chemotactic activity for monocytes and basophils but not neutrophils or eosinophils (PubMed:8195247, PubMed:8627182, PubMed:9792674). May be involved in the recruitment of monocytes into the arterial wall during the disease process of atherosclerosis (PubMed:8107690).
Cellular Location	Secreted
Tissue Location	Expressed in the seminal plasma, endometrial fluid and follicular fluid (at protein level) (PubMed:23765988). Expressed in monocytes (PubMed:2513477).

Background

Monocyte chemoattractant protein-1 (MCP-1), a member of the chemokine (chemotactic cytokine) family, is a potent monocyte agonist that is upregulated by oxidized lipids. MCP-1 is also known as CCL2, SCYA2, MCAF. MCAF is a member of family of factors involved in immune and inflammatory responses. The amino acid sequence deduced from the nucleotide sequence reveals the primary structure of the MCAF precursor to be composed of a putative signal peptide sequence of 23 amino acid residues and a mature MCAF sequence of 76 amino acid residues. MCP-1 plays a unique and crucial role in the initiation of atherosclerosis and may provide a new therapeutic target in this disorder. Human MCP-1 is a 8.7KDa non-glycoprotein, consisting of 99 amino acids in precursor form and 76 amino acids in mature form.

Images

Anti- MCP-1 Picoband antibody, ABO12256, Western blottingAll lanes: Anti MCP-1 (ABO12256) at 0.5ug/mlWB: SW620 Whole Cell Lysate at 40ugPredicted bind size: 11KDObserved bind size: 11KD