

## Recombinant Mouse CCL2/MCP-1 Protein (His Tag)

**Catalog No.** PKSM040978

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

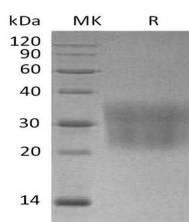
### Description

<b>Synonyms</b>	C-C motif chemokine 2; Monocyte chemoattractant protein 1; Monocyte chemotactic protein 1; MCP-1; Platelet-derived growth factor-inducible protein 1; Small-inducible cytokine A2; Ccl2; Je; Mep1; Scya2
<b>Species</b>	Mouse
<b>Expression Host</b>	HEK293 Cells
<b>Sequence</b>	Gln24-Asn148
<b>Accession</b>	P10148
<b>Calculated Molecular Weight</b>	14.7 kDa
<b>Observed molecular weight</b>	20-36 kDa
<b>Tag</b>	C-His
<b>Bioactivity</b>	Not validated for activity

### Properties

<b>Purity</b>	> 95 % as determined by reducing SDS-PAGE.
<b>Endotoxin</b>	< 1.0 EU per µg of the protein as determined by the LAL method.
<b>Storage</b>	Store at < -20°C, stable for 6 months. Please minimize freeze-thaw cycles.
<b>Shipping</b>	This product is provided as liquid. It is shipped at frozen temperature with blue ice/gel packs. Upon receipt, store it immediately at < -20°C.
<b>Formulation</b>	Supplied as a 0.2 µm filtered solution of PBS, pH7.4.
<b>Reconstitution</b>	Not Applicable

### Data



> 95 % as determined by reducing SDS-PAGE.

### Background

C-C motif chemokine 2 (CCL2) is a member of the C-C or  $\beta$  chemokine family. Mouse CCL2 shares 82% amino acid (aa) identity with rat CCL2 over the entire sequence, and 58%, 56%, 55%, 53% and 53% aa identity with human, equine, porcine, bovine and canine CCL2, respectively. Fibroblasts, glioma cells, smooth muscle cells, endothelial cells, lymphocytes and mononuclear phagocytes can produce CCL2 either constitutively or upon mitogenic stimulation, but

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monocytes and macrophages appear to be the major source. In addition to its chemotactic activity, CCL2 induces enzyme and cytokine release by monocytes, NK cells and lymphocytes, and histamine release by basophils that express its receptor, CCR2. Additionally, it promotes Th2 polarization in CD4+ T cells. CCL2-mediated recruitment of monocytes to sites of inflammation is proposed to play a role in the pathology of atherosclerosis, multiple sclerosis and allergic asthma.