

# **Product datasheet for AM26297PU-N**

#### OriGene Technologies, Inc.

9620 Medical Center Drive, Ste 200 Rockville, MD 20850, US Phone: +1-888-267-4436 https://www.origene.com techsupport@origene.com EU: info-de@origene.com CN: techsupport@origene.cn

## MCP1 (CCL2) Mouse Monoclonal Antibody [Clone ID: MNA1]

### **Product data:**

**Product Type:** Primary Antibodies

Clone Name: MNA1

**Applications:** ELISA, FN, IHC, IP, WB

Recommended Dilution: Immunohistochemistry on Frozen Sections (Ref.1,2): Tissue sections were air dried and

pretreated with 3% hydrogen peroxide to quench endogenous peroxidases. As negative

control the MNA.1 antibody was omitted (Ref.2).

**Immunohistochemistry on Paraffin Sections** (Ref.5,7,9): Tissue sections were fixed in formalin and pretreated with hydrogen peroxide to quench endogenous peroxidases. Antigen retrieval was performed by pressure cooking for 3 minutes in PBS. As negative

control the MNA.1 antibody was omitted (Ref.7).

**Flow Cytometry** (Ref.6): Antibody MNA.1stains intracellular MCP-1. For intracellular staining HUVEC cells were permeabilized with buffer containing 0.1% saponin. The cells were fixed in 4% paraformaldehyde before staining. As negative control a corresponding isotype control antibody was used (Ref.5).

**Functional Assays**: Antibody MNA.1 inhibits migration of monocytes by neutralizing MCP-1

(Ref.1).

Immunoassays (Ref.1,4,8). Immunoprecipitation (Ref.3).

Western blot: A reduced sample treatment and 15% SDS-Page was used. The band sizes are

~14 and 11 kDa (Ref.1).

Reactivity: Human, Porcine

Host: Mouse Isotype: IgG1

Clonality: Monoclonal

**Immunogen:** Recombinant Human MCP-1

**Specificity:** Monoclonal antibody MNA.1 (formerly known as 5D3-F7) recognizes Human natural and

recombinant monocyte chemotactic protein-1 (MCP-1).

No cross-reactivity with MCP-2 or MCP-3 has been detected.





### MCP1 (CCL2) Mouse Monoclonal Antibody [Clone ID: MNA1] - AM26297PU-N

Formulation: PBS

State: Purified

State: Liquid 0.2 µm filtered lg fraction

Stabilizer: 0.1% BSA

**Concentration:** lot specific

**Purification:** Protein G Chromatography

**Conjugation:** Unconjugated

**Storage:** Store undiluted at 2-8°C.

**Stability:** Shelf life: one year from despatch.

**Gene Name:** C-C motif chemokine ligand 2

Database Link: Entrez Gene 6347 Human

P13500

**Background:** Monocyte chemotactic protein-1 (MCP-1) is a 11 kDa protein belonging to the CC subgroup of

the chemokine superfamily, which stimulate the migration of monocytic cells. In contrast, the CXC chemokines predominantly activate polymorphonuclear leukocytes. The coordinated synthesis and release of MCP-1 plays a central role in both acute and chronic inflammatory processes by controlling the influx of phagocytic cells. Furthermore, their state of activation is in concert with primary inflammatory cytokines, such as IL-1, TNF-a, and IL-6. A selective accumulation of MCP-1 in the cerebrospinal fluid (CSF) of AIDS patients with cytomegalovirus encephalitis, but not with other opportunistic infections or primary lymphomas of the central nervous system , has been described. Furthermore, the chemotactic activity of MCP-1 on monocytic cells has been suggested to play a role in psoriasis, rheumatoid arthritis and

atherosclerosis.

Synonyms: C-C motif chemokine 2, SCYA2, MCAF, Small-inducible cytokine A2, MCP-1, HC11, HC-11