P.O. Box 3286 - Logan, Utah 84323, U.S.A. - Tel. (800) 729-8350 – Tel. (435) 755-9848 - Fax (435) 755-0015 - www.scytek.com

Macrophage Marker (Macrophage L1 Protein) (Calprotectin); Clone MAC387 (Concentrate)

Availability/Contents:

Item #	Volume
RA0287-C.5	0.5 ml

Description:

Species:	Mouse
Immunogen:	Affinity purified monocyte membrane preparation
Clone:	MAC387
Isotype:	IgG1, kappa
Entrez Gene ID:	6279 (S100A8/Calgranulin A/MRP-8) & 6280 (S100A9/Calgranulin B/MRP-14) (Human)
Hu Chromosome Loc.:	1q21
Synonyms:	60B8AG; Calgranulin A (CAGA); Calgranulin B (CAGB); Calprotectin L1L subunit; Chemotactic cytokine CP-10; Cystic fibrosis antigen (CFAG); Leukocyte L1 complex light chain; L1Ag; Macrophage L1 protein Calprotectin; Migration inhibitory factor related protein 8; Myeloid-related protein 8 (MRP-8 or P8); Myeloid-related protein 14 (MRP-14 or P14); Neutrophil cytosolic 7kDa protein; NIF; p8; Migration inhibitory factor related protein 14; S100 calcium binding protein A8 (S100A8); S100 calcium binding protein A9 (S100A9); S100A8/S100A9 complex; MA387; Pro-inflammatory S100 cytokine; Urinary stone protein band A
Mol. Weight of Antigen:	12-14kDa (single subunit)
Format:	200µg/ml of Ab purified from Bioreactor Concentrate by Protein A/G. Prepared in 1mM PBS with 0.05% BSA & 0.05% azide.
Specificity:	This antibody recognizes the L1 or Calprotectin molecule, an intra-cytoplasmic antigen comprised of 12-14kDa subunits expressed by granulocytes, monocytes, and tissue macrophages. This antibody reacts with neutrophils, monocytes, macrophages, and squamous mucosal epithelia and has been shown to be an important marker for identifying macrophages in tissue sections.
Background:	Macrophages usually arise from hematopoietic stem cells in the bone marrow. Under migration into tissues, the monocytes undergo further differentiation to become multifunctional tissue macrophages. They are classified into normal and inflammatory macrophages. Normal macrophages include macrophages in connective tissue (histiocytes), liver (Kupffer's cells), lung (alveolar macrophages), lymph nodes (free and fixed macrophages), spleen (free and fixed macrophages), bone marrow (fixed macrophages), serous fluids (pleural and peritoneal macrophages), skin (histiocytes, Langerhans's cell) and in other tissues. Inflammatory macrophages are present in various exudates. Macrophages are part of the innate immune system, recognizing, engulfing and destroying many potential pathogens including bacteria, pathogenic protozoa, fungi and helminthes.
Species Reactivity:	Human, Baboon, Monkey, Cow, Pig, Goat, Horse, Cat, Dog, Rabbit, Guinea pig, Rat, and Mouse. Others not known.
Positive Control:	Tonsil, lymph node, or spleen.
Cellular Localization:	Cytoplasmic
Titer/ Working Dilution:	Immunohistochemistry (Frozen and Formalin-fixed): 0.5-1 µg/ml Flow Cytometry: 0.5-1 µg/million cells

Storage: 2° C 8° C

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U.S.A.

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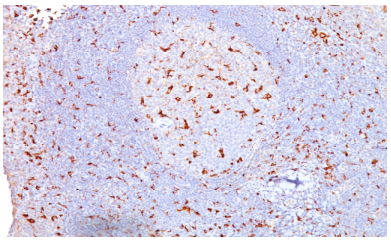
	Immunofluorescence:	0.5-1 µg/ml
	Western Blotting:	0.5-1 µg/ml
	Immunoprecipitation:	0.5-1 µg/500µg protein lysate
Microbiological State:	This product is not sterile.	

Uses/Limitations:

Not to be taken internally.
For Research Use Only.
This product is intended for qualitative immunohistochemistry with normal and neoplastic formalin-fixed, paraffin-embedded tissue sections, to be viewed by light microscopy.
Do not use if reagent becomes cloudy.
Do not use past expiration date.
Non-Sterile.



Formalin-fixed, paraffin-embedded human tonsil stained with Macrophage L1; Clone MAC387.

Ordering Information and Current Pricing at www.scytek.com

Procedure:

1. **Tissue Section Pretreatment (Required):** Staining of formalin fixed, paraffin embedded tissue sections is significantly enhanced by digestion with Trypsin (Two Component Solution). (ScyTek catalog# TSS).

2. **Primary Antibody Incubation Time:** We suggest an incubation period of 30 minutes at room temperature. However, depending upon the fixation conditions and the staining system employed, optimal incubation should be determined by the user.

3. **Visualization:** For maximum staining intensity we recommend the "UltraTek HRP Anti-Polyvalent Lab Pack" (ScyTek catalog# UHP125, see IFU for instructions) combined with the "DAB Chromogen/Substrate Bulk Pack (High Contrast)" (ScyTek catalog# ACV500, see IFU for instructions).

Precautions:

Contains Sodium Azide as a preservative (0.09% w/v).
Do not pipette by mouth.
Avoid contact of reagents and specimens with skin and mucous membranes.
Avoid microbial contamination of reagents or increased nonspecific staining may occur.
This product contains no hazardous material at a reportable concentration according to U.S. 29 CFR 1910.1200, OSHA Hazardous Communication Standard and EC Directive 91/155/EC.

References:

1. Flavell DJ; Jones DB; Wright DH. Identification of tissue histiocytes on paraffin sections by a new monoclonal antibody. Journal of Histochemistry and Cytochemistry, 1987, 35(11):1217-26.

Warranty:

No products or "Instructions For Use (IFU)" are to be construed as a recommendation for use in violation of any patents. We make no representations, warranties or assurances as to the accuracy or completeness of information provided on our IFU or website. Our warranty is limited to the actual price paid for the product. ScyTek Laboratories, Inc. is not liable for any property damage, personal injury, time or effort or economic loss caused by our products. Immunohistochemistry is a complex technique involving both histological and immunological detection methods. Tissue processing and handling prior to immunostaining can cause inconsistent results. Variations in fixation and embedding or the inherent nature of the tissue specimen may cause variations in results. Endogenous peroxidase activity or pseudoperoxidase activity in erythrocytes and endogenous biotin may cause non-specific staining depending on detection system used.

Storage: 2° C 8° C

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