

# CXCL10/IP10 Polyclonal Antibody

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP57998

#### **Product Information**

**Application** IHC-P, IHC-F, IF, ICC, E

Primary Accession
Reactivity
Human
Host
Clonality
Polyclonal
Calculated MW
Physical State
P02778
Human
Puman
Rabbit
Polyclonal
10881
Liquid

Immunogen KLH conjugated synthetic peptide derived from human CXCL10/IP10

**Epitope Specificity** 29-70/98 **Isotype** IgG

**Purity** affinity purified by Protein A

**Buffer** 0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol.

SUBCELLULAR LOCATION Secreted

**SIMILARITY** Belongs to the intercrine alpha (chemokine CxC) family.

**Post-translational** CXCL10(1-73) is produced by proteolytic cleavage after secretion from

modifications keratinocytes.

**Important Note** This product as supplied is intended for research use only, not for use in

human, therapeutic or diagnostic applications.

**Background Descriptions** bs-1502P is one synthetic peptide derived from mouse CXCL10.

Interferon-gamma-inducible 10 kD protein (IP-10), is a CXC chemokine with chemoattractant properties for CD4-positive T cells and inhibits early normal and leukemic hemopoietic progenitor proliferation. IP-10 is produced by a wide variety of cell types ranging from neutrophils and monocytes to hepatocytes, endothelial cells and keratinocytes. The cytokine is reported to be involved in a scala of inflammatory pathologies such as HIV encephalitis, cutaneous T cell lymphoma, chronic hepatitis and acute anterior uveitis. Various observations strongly suggest a role for the CXC chemokines IL-8 and IP-10 in the regulation of angiogenic activity in cancer and in idiopathic

pulmonary fibrosis.

#### **Additional Information**

**Gene ID** 3627

Other Names C-X-C motif chemokine 10, 10 kDa interferon gamma-induced protein,

Gamma-IP10, IP-10, Small-inducible cytokine B10, CXCL10(1-73), CXCL10,

INP10, SCYB10

**Dilution** IHC-P=1:100-500,IHC-F=1:100-500,ICC=1:100-500,IF=1:100-500,ELISA=1:5000-

10000

Format 0.01M TBS(pH7.4) with 1% BSA, 0.09% (W/V) sodium azide and 50% Glyce

**Storage** Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. When

reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody

is stable for at least two weeks at 2-4 °C.

### **Protein Information**

Name CXCL10

Synonyms INP10, SCYB10

**Function** Pro-inflammatory cytokine that is involved in a wide variety of processes

such as chemotaxis, differentiation, and activation of peripheral immune cells, regulation of cell growth, apoptosis and modulation of angiostatic effects (PubMed: 11157474, PubMed: 22652417, PubMed: 7540647). Plays thereby an important role during viral infections by stimulating the activation

and migration of immune cells to the infected sites (By similarity). Mechanistically, binding of CXCL10 to the CXCR3 receptor activates G protein-mediated signaling and results in downstream activation of phospholipase C-dependent pathway, an increase in intracellular calcium

production and actin reorganization (PubMed:<u>12750173</u>, PubMed:<u>19151743</u>). In turn, recruitment of activated Th1 lymphocytes occurs at sites of inflammation (PubMed:<u>12663757</u>, PubMed:<u>12750173</u>). Activation of the CXCL10/CXCR3 axis also plays an important role in neurons in response to brain injury for activating microglia, the resident macrophage population of

the central nervous system, and directing them to the lesion site. This recruitment is an essential element for neuronal reorganization (By

similarity).

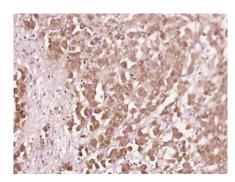
**Cellular Location** Secreted.

**Tissue Location** Mainly secreted by monocytes, endothelial cells as well as fibroblasts.

Expressed by epithelial cells in thymus (PubMed:11157474). Microglial cells

produce CXCL10 in response to viral stimulation (PubMed:12663757).

## **Images**



Paraformaldehyde-fixed, paraffin embedded (Human liver cancer); Antigen retrieval by boiling in sodium citrate buffer (pH6.0) for 15min; Block endogenous peroxidase by 3% hydrogen peroxide for 20 minutes; Blocking buffer (normal goat serum) at 37°C for 30min; Antibody incubation with (CXCL10) Polyclonal Antibody, Unconjugated (AP57998) at 1:500 overnight at 4°C, followed by a conjugated secondary (sp-0023) for 20 minutes and DAB staining.

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.