

**IL1 beta Antibody**  
**Rabbit mAb**  
**Catalog # AP90961****Specification****IL1 beta Antibody - Product Information**

Application	WB
Primary Accession	<a href="#">P01584</a>
Clonality	Monoclonal
<b>Other Names</b>	
Catabolin; Hematopoietin 1; IFN beta inducing factor; IL 1 beta; IL 1B; IL-1 beta; IL1 BETA; IL1B; IL1B; IL1F2; Interleukin 1 beta; Interleukin 1 beta precursor; LAF; OAF;	
Isotype	Rabbit IgG
Host	Rabbit
Calculated MW	30748 Da

**IL1 beta Antibody - Additional Information**

Dilution	WB~~1:1000
Purification	Affinity-chromatography
Immunogen	A synthesized peptide derived from human IL1 beta
Description	Produced by activated macrophages, IL-1 stimulates thymocyte proliferation by inducing IL-2 release, B-cell maturation and proliferation, and fibroblast growth factor activity. IL-1 proteins are involved in the inflammatory response, being identified as endogenous pyrogens, and are reported to stimulate the release of prostaglandin and collagenase from synovial cells.
Storage Condition and Buffer	Rabbit IgG in phosphate buffered saline , pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol. Store at +4°C short term. Store at -20°C long term. Avoid freeze / thaw cycle.

**IL1 beta Antibody - Protein Information****Name** IL1B ([HGNC:5992](#))**Synonyms** IL1F2**Function**

Potent pro-inflammatory cytokine (PubMed:<a href="http://www.uniprot.org/citations/10653850" target="\_blank">10653850</a>, PubMed:<a href="http://www.uniprot.org/citations/12794819" target="\_blank">12794819</a>, PubMed:<a href="http://www.uniprot.org/citations/28331908"

target="\_blank">28331908</a>, PubMed:<a href="http://www.uniprot.org/citations/3920526" target="\_blank">3920526</a>). Initially discovered as the major endogenous pyrogen, induces prostaglandin synthesis, neutrophil influx and activation, T-cell activation and cytokine production, B-cell activation and antibody production, and fibroblast proliferation and collagen production (PubMed:<a href="http://www.uniprot.org/citations/3920526" target="\_blank">3920526</a>). Promotes Th17 differentiation of T-cells. Synergizes with IL12/interleukin-12 to induce IFNG synthesis from T-helper 1 (Th1) cells (PubMed:<a href="http://www.uniprot.org/citations/10653850" target="\_blank">10653850</a>). Plays a role in angiogenesis by inducing VEGF production synergistically with TNF and IL6 (PubMed:<a href="http://www.uniprot.org/citations/12794819" target="\_blank">12794819</a>). Involved in transduction of inflammation downstream of pyroptosis: its mature form is specifically released in the extracellular milieu by passing through the gasdermin-D (GSDMD) pore (PubMed:<a href="http://www.uniprot.org/citations/33377178" target="\_blank">33377178</a>, PubMed:<a href="http://www.uniprot.org/citations/33883744" target="\_blank">33883744</a>). Acts as a sensor of S.pyogenes infection in skin: cleaved and activated by pyogenes SpeB protease, leading to an inflammatory response that prevents bacterial growth during invasive skin infection (PubMed:<a href="http://www.uniprot.org/citations/28331908" target="\_blank">28331908</a>).

### Cellular Location

Cytoplasm, cytosol. Secreted. Lysosome Secreted, extracellular exosome {ECO:0000250|UniProtKB:P10749} Note=The precursor is cytosolic (PubMed:15192144). In response to inflammasome-activating signals, such as ATP for NLRP3 inflammasome or bacterial flagellin for NLRC4 inflammasome, cleaved and secreted (PubMed:24201029, PubMed:33377178, PubMed:33883744). Mature form is secreted and released in the extracellular milieu by passing through the gasdermin-D (GSDMD) pore (PubMed:33883744). In contrast, the precursor form is not released, due to the presence of an acidic region that is proteolytically removed by CASP1 during maturation (PubMed:33883744). The secretion is dependent on protein unfolding and facilitated by the cargo receptor TMED10 (PubMed:32272059)

### Tissue Location

Expressed in activated monocytes/macrophages (at protein level).

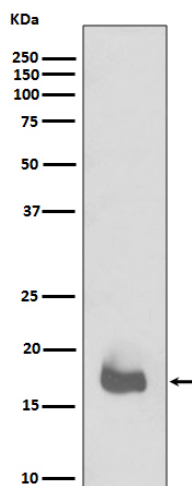
## IL1 beta Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

## IL1 beta Antibody - Images





Western blot analysis of IL1 beta expression in recombinant IL1 beta protein.