10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

# IL33 Antibody (N-term)

**Affinity Purified Rabbit Polyclonal Antibody (Pab)**

**Catalog # AP14363A**

## Specification

### IL33 Antibody (N-term) - Product Information

| | |
|---|---|
| Application | **WB,E** |
| Primary Accession | O95760 |
| Other Accession | NP_254274.1 |
| Reactivity | **Human** |
| Host | **Rabbit** |
| Clonality | **Polyclonal** |
| Isotype | **Rabbit IgG** |
| Calculated MW | **30759** |
| Antigen Region | **50-79** |

### IL33 Antibody (N-term) - Additional Information

**Gene ID** 90865

**Other Names**
Interleukin-33, IL-33, Interleukin-1 family member 11, IL-1F11, Nuclear factor from high endothelial venules, NF-HEV, Interleukin-33 (95-270), Interleukin-33 (99-270), Interleukin-33 (109-270), IL33, C9orf26, IL1F11, NFHEV

**Target/Specificity**
This IL33 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 50-79 amino acids from the N-terminal region of human IL33.

**Dilution**
WB~~1:1000
E~~Use at an assay dependent concentration.

**Format**
Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

**Storage**
Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

**Precautions**
IL33 Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

### IL33 Antibody (N-term) - Protein Information

**Name** IL33 (HGNC:16028)

**Synonyms** C9orf26, IL1F11, NFHEV

**Function** Cytokine that binds to and signals through the IL1RL1/ST2 receptor which in turn activates NF-kappa-B and MAPK signaling pathways in target cells (PubMed:16286016, PubMed:19841166). Involved in the maturation of Th2 cells inducing the secretion of T-helper type 2- associated cytokines (PubMed:17853410, PubMed:18836528). Also involved in activation of mast cells, basophils, eosinophils and natural killer cells (PubMed:17853410, PubMed:18836528). Acts as an enhancer of polarization of alternatively activated macrophages (PubMed:19841166). Acts as a chemoattractant for Th2 cells, and may function as an 'alarmin', that amplifies immune responses during tissue injury (PubMed:17853410, PubMed:18836528). Induces rapid UCP2-dependent mitochondrial rewiring that attenuates the generation of reactive oxygen species and preserves the integrity of Krebs cycle required for persistent production of itaconate and subsequent GATA3-dependent differentiation of inflammation-resolving alternatively activated macrophages (By similarity).

**Cellular Location**
Nucleus. Chromosome. Cytoplasm Cytoplasmic vesicle, secretory vesicle Secreted Note=Secreted and released in the extracellular milieu by passing through the gasdermin-D (GSDMD) pore following cleavage by CELA1 (PubMed:35794369). Associates with heterochromatin and mitotic chromosomes (PubMed:17185418). The secretion is dependent on protein unfolding and facilitated by the cargo receptor TMED10; it results in protein translocation from the cytoplasm into the ERGIC (endoplasmic reticulum-Golgi intermediate compartment) followed by vesicle entry and secretion (PubMed:32272059).

**Tissue Location**
Expressed at high level in high endothelial venules found in tonsils, Peyer patches and mesenteric lymph nodes. Almost undetectable in placenta.

## IL33 Antibody (N-term) - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

## IL33 Antibody (N-term) - Images

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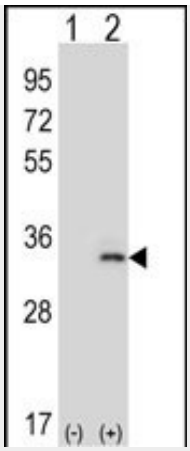


Western blot analysis of IL33 (arrow) using rabbit polyclonal IL33 Antibody (N-term) (Cat. #AP14363a). 293 cell lysates (2 ug/lane) either nontransfected (Lane 1) or transiently transfected (Lane 2) with the IL33 gene.

**IL33 Antibody (N-term) - Background**

Cytokine that binds to and signals through IL1RL1/ST2 and its stimulation recruits MYD88, IRAK1, IRAK4, and TRAF6, followed by phosphorylation of MAPK3/ERK1 and/or MAPK1/ERK2, MAPK14, and MAPK8. Induces T helper type 2-associated cytokines.

**IL33 Antibody (N-term) - References**

Yagami, A., et al. J. Immunol. 185(10):5743-5750(2010)
Masamune, A., et al. Am. J. Physiol. Gastrointest. Liver Physiol. 299 (4), G821-G832 (2010) :
Melen, E., et al. J. Allergy Clin. Immunol. 126(3):631-637(2010)
Corneveaux, J.J., et al. Hum. Mol. Genet. 19(16):3295-3301(2010)
Yu, J.T., et al. Neurobiol. Aging (2010) In press :