

IL37 Antibody (N-Terminus)
Rabbit Polyclonal Antibody
Catalog # ALS16036**Specification**

IL37 Antibody (N-Terminus) - Product Information

| | |
|-------------------|------------------------|
| Application | WB, IF |
| Primary Accession | O9NZH6 |
| Reactivity | Human |
| Host | Rabbit |
| Clonality | Polyclonal |
| Calculated MW | 24kDa KDa |

IL37 Antibody (N-Terminus) - Additional Information**Gene ID** 27178**Other Names**

Interleukin-37, FIL1 zeta, IL-1X, Interleukin-1 family member 7, IL-1F7, Interleukin-1 homolog 4, IL-1H, IL-1H4, Interleukin-1 zeta, IL-1 zeta, Interleukin-1-related protein, IL-1RP1, Interleukin-23, IL-37, IL37, FIL1Z, IL1F7, IL1H4, IL1RP1

Target/Specificity

IL-37 antibody is human specific. Multiple isoforms of IL-37 are known to exist; this antibody will only detect the largest isoform. IL-37 antibody is predicted to not cross-react with IL-36.

Reconstitution & Storage

Long term: -20°C; Short term: +4°C. Avoid repeat freeze-thaw cycles.

Precautions

IL37 Antibody (N-Terminus) is for research use only and not for use in diagnostic or therapeutic procedures.

IL37 Antibody (N-Terminus) - Protein Information**Name** IL37 ([HGNC:15563](#))**Function**

Immune regulatory cytokine that acts as a suppressor of innate inflammatory and immune responses involved in curbing excessive inflammation. Signaling can occur via two mechanisms, intracellularly through nuclear translocation with SMAD3 and extracellularly after secretion and binding to its receptor composed of IL18R1 and IL18RAP. Suppresses, or reduces, pro-inflammatory cytokine production, including IL1A and IL6, as well as CCL12, CSF1, CSF2, CXCL13, IL1B, IL23A and IL1RN, but spares anti-inflammatory cytokines. Inhibits dendritic cell activation.

Cellular Location

Cytoplasm, cytosol. Nucleus. Secreted Note=Stimulation with IL1B leads to colocalization with

SMAD3 mostly in perinuclear regions (PubMed:20935647, PubMed:33674380). Only the CASP1-cleaved mature form translocates into the nucleus upon LPS stimulation (PubMed:18390730). 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, PubMed:33674380).

Tissue Location

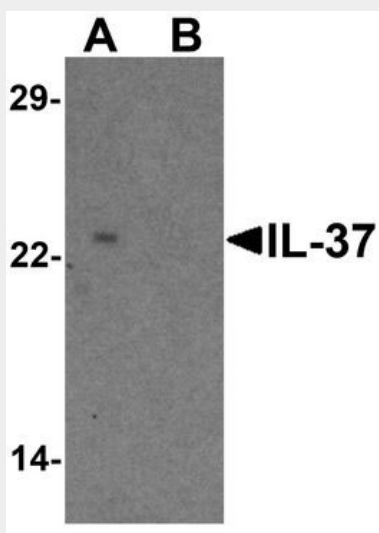
In general, low constitutive expression, if any, in healthy tissues; high expression in inflammatory counterparts, including in synovial tissues from individuals with active rheumatoid arthritis. Isoform A, isoform B and isoform C are expressed in testis, colon, placenta, lung and lymph node. Isoform D and isoform E were found only in testis and bone marrow. Whereas only isoform A is found in brain, only isoform B in kidney and only isoform C in heart

IL37 Antibody (N-Terminus) - Protocols

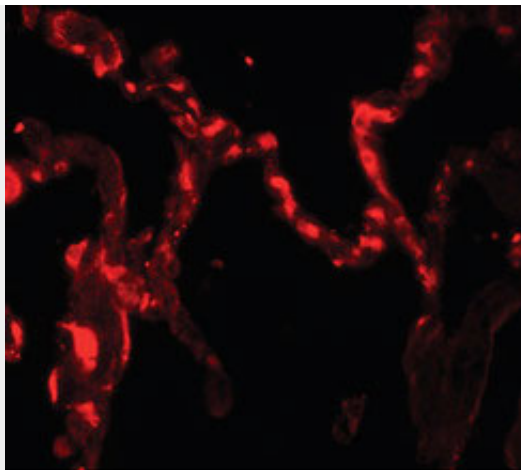
Provided below are standard protocols that you may find useful for product applications.

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

IL37 Antibody (N-Terminus) - Images



Western blot analysis of IL-37 in human lung tissue lysate with IL-37 antibody at 1 ug/ml in (A)...



Immunofluorescence of IL-12A in human kidney tissue with IL-12A antibody at 20 ug/ml.

IL37 Antibody (N-Terminus) - Background

Suppressor of innate inflammatory and immune responses involved in curbing excessive inflammation. This function requires SMAD3. Suppresses, or reduces, proinflammatory cytokine production, including IL1A and IL6, as well as CCL12, CSF1, CSF2, CXCL13, IL1B, IL23A and IL1RN, but spares anti-inflammatory cytokines. Inhibits dendritic cell activation.

IL37 Antibody (N-Terminus) - References

Kumar S.,et al.J. Biol. Chem. 275:10308-10314(2000).
Manoj P.P.,et al.Submitted (JUL-1999) to the EMBL/GenBank/DDBJ databases.
Pan G.,et al.Cytokine 13:1-7(2001).
Smith D.E.,et al.J. Biol. Chem. 275:1169-1175(2000).
Taylor S.L.,et al.Genomics 79:726-733(2002).