

TYK2 Antibody (N-Terminus)
Rabbit Polyclonal Antibody
Catalog # ALS16742**Specification**

TYK2 Antibody (N-Terminus) - Product Information

Application	IHC, WB
Primary Accession	P29597
Other Accession	7297
Reactivity	Human, Mouse, Rat
Host	Rabbit
Clonality	Polyclonal
Isotype	IgG
Calculated MW	133650

TYK2 Antibody (N-Terminus) - Additional Information**Gene ID** 7297**Other Names**

TYK2, Tyrosine kinase 2, JTK1

Target/Specificity

At least three isoforms of TYK2 are known to exist; this antibody only detects the two longest isoforms.

Reconstitution & Storage

PBS, 0.02% sodium azide. Long term: -20°C; Short term: +4°C. Avoid repeat freeze-thaw cycles.

Precautions

TYK2 Antibody (N-Terminus) is for research use only and not for use in diagnostic or therapeutic procedures.

TYK2 Antibody (N-Terminus) - Protein Information**Name** TYK2**Function**

Tyrosine kinase of the non-receptor type involved in numerous cytokines and interferons signaling, which regulates cell growth, development, cell migration, innate and adaptive immunity (PubMed: [8232552](http://www.uniprot.org/citations/8232552)), (PubMed: [7813427](http://www.uniprot.org/citations/7813427)), (PubMed: [7657660](http://www.uniprot.org/citations/7657660)), (PubMed: [10995743](http://www.uniprot.org/citations/10995743)), (PubMed: [10542297](http://www.uniprot.org/citations/10542297)). Plays both structural and catalytic roles in numerous interleukins and interferons (IFN-alpha/beta) signaling (PubMed: [10542297](http://www.uniprot.org/citations/10542297)). Associates with heterodimeric cytokine receptor complexes and

activates STAT family members including STAT1, STAT3, STAT4 or STAT6 (PubMed:10542297, PubMed:7638186). The heterodimeric cytokine receptor complexes are composed of (1) a TYK2-associated receptor chain (IFNAR1, IL12RB1, IL10RB or IL13RA1), and (2) a second receptor chain associated either with JAK1 or JAK2 (PubMed:7813427, PubMed:10542297, PubMed:7526154, PubMed:25762719). In response to cytokine-binding to receptors, phosphorylates and activates receptors (IFNAR1, IL12RB1, IL10RB or IL13RA1), creating docking sites for STAT members (PubMed:7526154, PubMed:7657660). In turn, recruited STATs are phosphorylated by TYK2 (or JAK1/JAK2 on the second receptor chain), form homo- and heterodimers, translocate to the nucleus, and regulate cytokine/growth factor responsive genes (PubMed:7657660, PubMed:10542297, PubMed:25762719). Negatively regulates STAT3 activity by promoting phosphorylation at a specific tyrosine that differs from the site used for signaling (PubMed:29162862).

Tissue Location

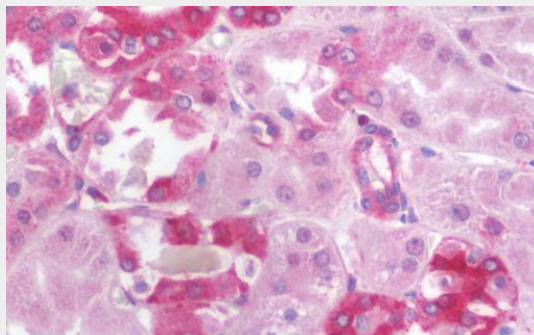
Observed in all cell lines analyzed. Expressed in a variety of lymphoid and non-lymphoid cell lines

TYK2 Antibody (N-Terminus) - Protocols

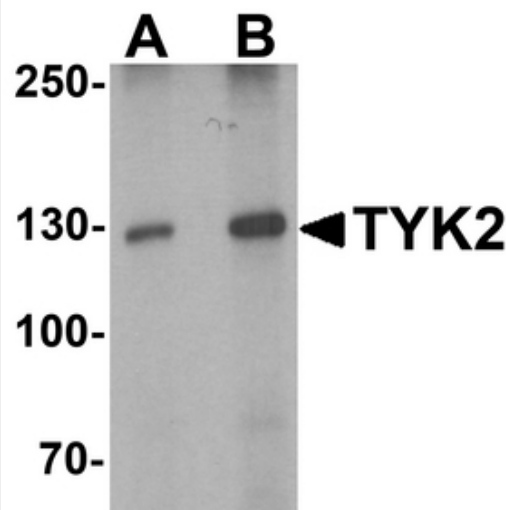
Provided below are standard protocols that you may find useful for product applications.

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

TYK2 Antibody (N-Terminus) - Images



Anti-TYK2 antibody IHC staining of human kidney.



Western blot analysis of TYK2 in human small intestine tissue lysate with TYK2 antibody at (A) 1...

TYK2 Antibody (N-Terminus) - Background

Probably involved in intracellular signal transduction by being involved in the initiation of type I IFN signaling. Phosphorylates the interferon-alpha/beta receptor alpha chain.

TYK2 Antibody (N-Terminus) - References

- Firmbach-Kraft I., et al. Oncogene 5:1329-1336(1990).
- Velazquez L., et al. Cell 70:313-322(1992).
- Krolewski J.J., et al. Oncogene 5:277-282(1990).
- Partanen J., et al. Proc. Natl. Acad. Sci. U.S.A. 87:8913-8917(1990).
- Colamonici O., et al. Mol. Cell. Biol. 14:8133-8142(1994).