

IFN- $\gamma R\alpha$ Polyclonal Antibody

Catalog # AP73578

Product Information

Application	WB, IHC-P
Primary Accession	<u>P15260</u>
Reactivity	Human
Host	Rabbit
Clonality	Polyclonal
Calculated MW	54405

Additional Information

Gene ID	3459
Other Names	IFNGR1; Interferon gamma receptor 1; IFN-gamma receptor 1; IFN-gamma-R1; CDw119; CD119
Dilution	WB~~Western Blot: 1/500 - 1/2000. IHC-p: 1/100-1/300. ELISA: 1/20000. Not yet tested in other applications. IHC-P~~N/A
Format	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.09% (W/V) sodium azide.
Storage Conditions	-20°C

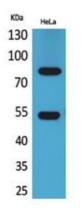
Protein Information

Name	IFNGR1 (<u>HGNC:5439</u>)
Function	Receptor subunit for interferon gamma/INFG that plays crucial roles in antimicrobial, antiviral, and antitumor responses by activating effector immune cells and enhancing antigen presentation (PubMed:20015550). Associates with transmembrane accessory factor IFNGR2 to form a functional receptor (PubMed:10986460, PubMed:2971451, PubMed:7615558, PubMed:7617032, PubMed:7673114). Upon ligand binding, the intracellular domain of IFNGR1 opens out to allow association of downstream signaling components JAK1 and JAK2. In turn, activated JAK1 phosphorylates IFNGR1 to form a docking site for STAT1. Subsequent phosphorylation of STAT1 leads to dimerization, translocation to the nucleus, and stimulation of target gene transcription (PubMed:28883123). STAT3 can also be activated in a similar manner although activation seems weaker. IFNGR1 intracellular domain phosphorylation also provides a docking site for SOCS1 that regulates the JAK-STAT pathway by competing with STAT1 binding to IFNGR1 (By similarity).
Cellular Location	Cell membrane; Single-pass type I membrane protein

Background

Associates with IFNGR2 to form a receptor for the cytokine interferon gamma (IFNG) (PubMed: <u>7615558</u>, PubMed: <u>2971451</u>, PubMed: <u>7617032</u>, PubMed: <u>10986460</u>). Ligand binding stimulates activation of the JAK/STAT signaling pathway (PubMed: <u>7673114</u>). Plays an essential role in the IFN-gamma pathway that is required for the cellular response to infectious agents (PubMed: <u>20015550</u>).

Images



Western Blot analysis of HeLa cells using IFN- γ R α Polyclonal Antibody. Antibody was diluted at 1:500. Secondary antibody was diluted at 1:20000

Immunohistochemical analysis of paraffin-embedded human-liver, antibody was diluted at 1:100

Immunohistochemical analysis of paraffin-embedded human-lung, antibody was diluted at 1:100

Immunohistochemical analysis of paraffin-embedded human-lung, antibody was diluted at 1:100

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