

NLRC4 Antibody (N-term)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP13307a

Specification

NLRC4 Antibody (N-term) - Product Information

Application	WB,E
Primary Accession	<u>Q9NPP4</u>
Other Accession	<u>NP_067032.3</u>
Reactivity	Human
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Calculated MW	116159
Antigen Region	116-145

NLRC4 Antibody (N-term) - Additional Information

Gene ID 58484

Other Names

NLR family CARD domain-containing protein 4, CARD, LRR, and NACHT-containing protein, Clan protein, Caspase recruitment domain-containing protein 12, Ice protease-activating factor, Ipaf, NLRC4, CARD12, CLAN, CLAN1, IPAF

Target/Specificity

This NLRC4 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 116-145 amino acids from the N-terminal region of human NLRC4.

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

NLRC4 Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

NLRC4 Antibody (N-term) - Protein Information

Name NLRC4



Function Key component of inflammasomes that indirectly senses specific proteins from pathogenic bacteria and fungi and responds by assembling an inflammasome complex that promotes caspase-1 activation, cytokine production and macrophage pyroptosis (PubMed:<u>15107016</u>). The NLRC4 inflammasome is activated as part of the innate immune response to a range of intracellular bacteria (By similarity).

Cellular Location

Cytoplasm. Cytoplasm, cytosol {ECO:0000250|UniProtKB:Q3UP24}. Inflammasome

Tissue Location

Isoform 2 is expressed ubiquitously, although highly expressed in lung and spleen. Isoform 1 is highly expressed in lung, followed by leukocytes especially monocytes, lymph node, colon, brain, prostate, placenta, spleen, bone marrow and fetal liver. Isoform 4 is only detected in brain

NLRC4 Antibody (N-term) - Protocols

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

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

NLRC4 Antibody (N-term) - Images



NLRC4 Antibody (N-term) (Cat. #AP13307a) western blot analysis in MDA-MB231 cell line lysates (35ug/lane).This demonstrates the NLRC4 antibody detected the NLRC4 protein (arrow).

NLRC4 Antibody (N-term) - Background

In C. elegans, Ced4 binds and activates Ced3, an apoptotic initiator caspase, via caspase-associated recruitment domains (CARDs). Human Ced4 homologs include APAF1 (MIM 602233), NOD1/CARD4 (MIM 605980), and NOD2/CARD15 (MIM 605956). These proteins have at least 1 N-terminal CARD domain followed by a centrally located nucleotide-binding domain (NBD or NACHT) and a C-terminal



regulatory domain, found only in mammals, that contains either WD40 repeats or leucine-rich repeats (LRRs). CARD12 is a member of the Ced4 family and can induce apoptosis.

NLRC4 Antibody (N-term) - References

Miao, E.A., et al. J. Clin. Immunol. 30(4):502-506(2010) Vinzing, M., et al. J. Immunol. 180(10):6808-6815(2008) Macaluso, F., et al. Exp. Dermatol. 16(8):692-698(2007) Bruey, J.M., et al. Cell 129(1):45-56(2007) Thalappilly, S., et al. FEBS J. 273(12):2766-2778(2006)