Anti-NLRP3 Rabbit mAb

Purified Recombinant Rabbit Monoclonal Antibody

Catalog # R014488

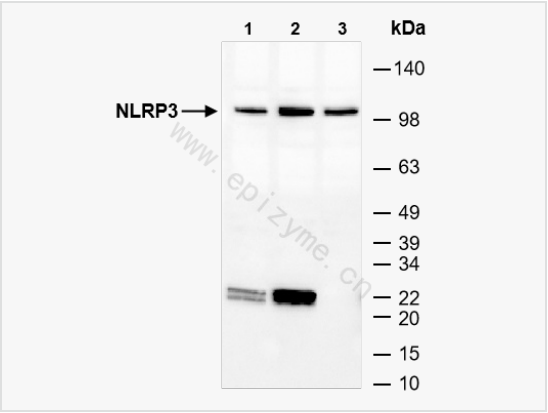
Product Information

Application	WB, IHC-P/IF (Tissue-P), ELISA, IF (Cell)/ICC
Reactivity	Human, Mouse, Rat
Dilution	WB 1:1,000~1:2,000; IHC-P 1:100~1:200; IF 1:50~1:100
Host	Rabbit
Clonality	Monoclonal
Clone No.	23R78N45
Isotype	IgG
Label	Unconjugated
Immunogen	Recombinant protein of human NLRP3
Format	Affinity purified monoclonal antibody supplied in PBS with 0.01% sodium azide and 50% glycerol, pH 7.3.
Storage	Shipped on wet ice. Store at -20°C. Stable for 24 months from date of receipt. Aliquoting is unnecessary for -20°C storage.
Precautions	Anti-NLRP3 Rabbit mAb [23R78N45] is for research use only and not for use in diagnostic or therapeutic procedures.

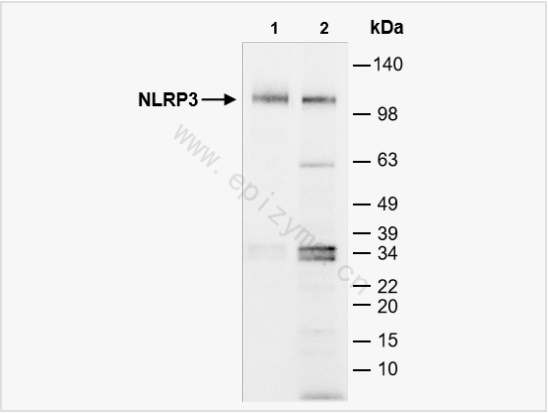
Protein Information

Synonyms	AGTAVPRL, AII/AVP, Angiotensin/vasopressin receptor AII/AVP like, Angiotensin/vasopressin receptor AII/AVP-like, C1orf7, Caterpiller protein 1.1, CIAS 1, CIAS1, CLR1.1, Cold autoinflammatory syndrome 1, Cold autoinflammatory syndrome 1 protein, Cryopyrin, Familial cold autoinflammatory syndrome, FCAS, FCU, LRR and PYD domains-containing protein 3, Muckle-Wells syndrome, MWS, NACHT, NACHT LRR and PYD containing protein 3, NALP 3, NALP3, NALP3_HUMAN, NLR family pyrin domain containing 3, NLRP3, PYPAF 1, PYPAF1, PYRIN containing APAF1 like protein 1, PYRIN-containing APAF1-like protein 1.
Calculated MW	Calculated MW: 118 kDa; Observed MW: 118 kDa
Uniprot ID	Q96P20
Gene ID	114548
Background	This gene encodes a pyrin-like protein containing a pyrin domain, a nucleotide-binding site (NBS) domain, and a leucine-rich repeat (LRR) motif. This protein interacts with the apoptosis-associated speck-like protein PYCARD/ASC, which contains a caspase recruitment domain, and is a member of the NALP3 inflammasome complex. This complex functions as an upstream activator of NF-kappaB signaling, and it plays a role in the regulation of inflammation, the immune response, and apoptosis. Mutations in this gene are associated with familial cold autoinflammatory syndrome (FCAS), Muckle-Wells syndrome (MWS), chronic infantile neurological cutaneous and articular (CINCA) syndrome, and neonatal-onset multisystem inflammatory disease (NOMID). Multiple alternatively spliced transcript variants encoding distinct isoforms have been identified for this gene. Alternative 5' UTR structures are suggested by available data; however, insufficient evidence is available to determine if all of the represented 5' UTR splice patterns are biologically valid. [provided by RefSeq, Oct 2008]

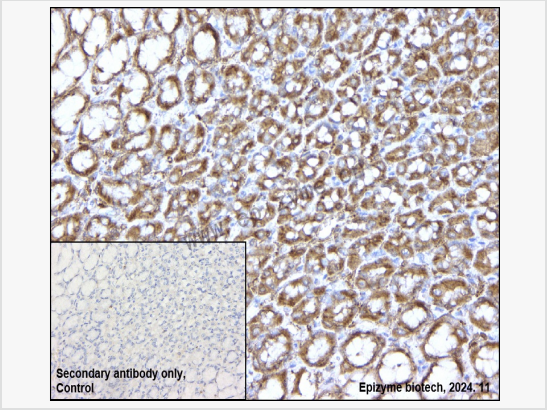
Validation Images



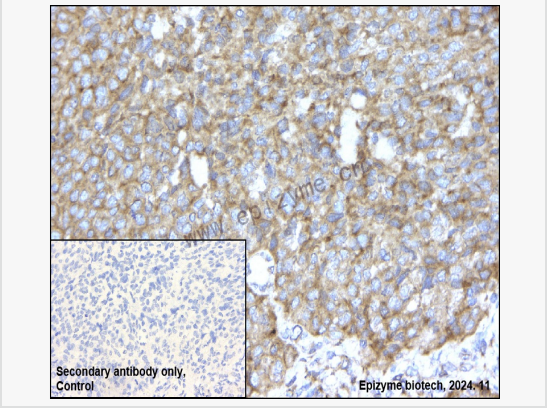
Western Blot - Anti-NLRP3 Rabbit mAb [23R78N45]
All lanes: R014488 at 1:1,000 dilution
Lane 1: HeLa (Human cervix adenocarcinoma epithelial cell) whole cell lysates
Lane 2: HepG2 (Human hepatocarcinoma epithelial cell) whole cell lysates
Lane 3: HCT116 (Human colorectal carcinoma epithelial cell) whole cell lysates
Lysates/proteins at 10 µg per lane.
Secondary antibody: Goat Anti-Rabbit IgG(H+L), HRP Conjugated (Cat. No. LF102) at 1:5,000 dilution
Predicted band size: 118 kDa
Observed band size: 118 kDa
Developed using the ECL technique (Cat. No. SQ201).



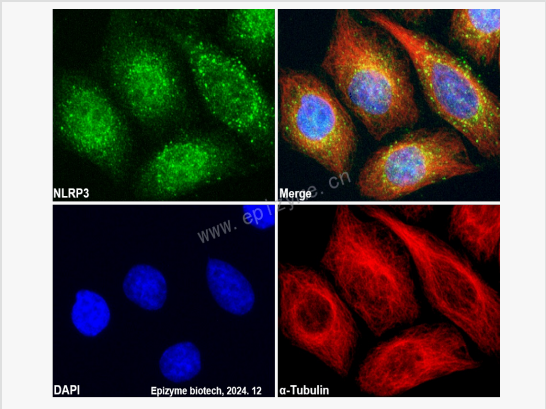
Western Blot - Anti-NLRP3 Rabbit mAb [23R78N45]
All lanes: R014488 at 1:1,000 dilution
Lane 1: Mouse lymph node whole tissue lysates
Lane 2: Rat spleen whole tissue lysates
Lysates/proteins at 10 µg per lane.
Secondary antibody: Goat Anti-Rabbit IgG(H+L), HRP Conjugated (Cat. No. LF102) at 1:5,000 dilution
Predicted band size: 118 kDa
Observed band size: 118 kDa
Developed using the ECL technique (Cat. No. SQ201).



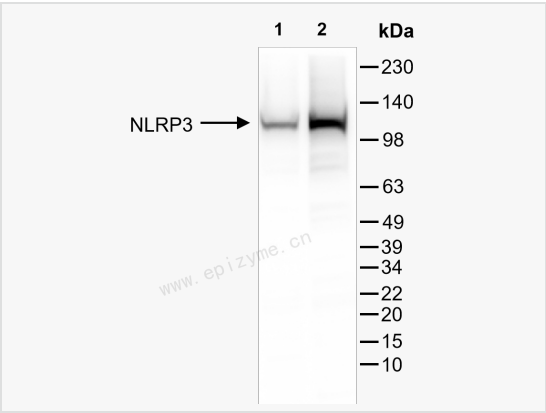
Immunohistochemistry - Anti-NLRP3 Rabbit mAb [23R78N45]
Sample: Paraformaldehyde-fixed, paraffin embedded rat stomach tissue
Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0) for 30 mins.
Primary antibody: R014488 at 1:200 dilution
Secondary antibody: Goat Anti-Rabbit IgG (H+L), HRP conjugated at 1:1,000 dilution
DAB was used as the chromogen.
Counter stained with hematoxylin.
Positive/negative staining were presented.
Only the secondary antibody was used as the negative control.



Immunohistochemistry - Anti-NLRP3 Rabbit mAb [23R78N45]
Sample: Paraformaldehyde-fixed, paraffin embedded human endometrial carcinoma tissue
Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0) for 30 mins.
Primary antibody: R014488 at 1:200 dilution
Secondary antibody: Goat Anti-Rabbit IgG (H+L), HRP conjugated at 1:1,000 dilution
DAB was used as the chromogen.
Counter stained with hematoxylin.
Positive/negative staining were presented.
Only the secondary antibody was used as the negative control.



Immunofluorescence - Anti-NLRP3 Rabbit mAb [23R78N45]
Sample: HeLa cells
The cells were fixed with 4% paraformaldehyde (10 min), permeabilized with 0.5% Triton X-100 for 10 minutes and then blocked with 5% BSA in 0.1% PBS-Tween for 0.5 hours.
Primary antibodies: R014488 at 1:100 dilution and α-tubulin Mouse Monoclonal Antibody (Cat. No. LF209) at 1:100 dilution
Secondary antibodies: Goat anti-Rabbit (488) at 1:1,000 dilution (shown in green) and Goat anti-Mouse (CY3) at 1:1,000 dilution (shown in red)
Nuclei were stained with DAPI (shown in blue).



Western Blot - Anti-NLRP3 Rabbit mAb [23R78N45]
All lanes: R014488 at 1:1,000 dilution
Lane 1 : THP-1 (Human monocytic leukemia cell) whole cell lysates
Lane 2 : THP-1 treated with PMA for 24h, followed by 1ug/ml LPS for 24h whole cell lysates
Lysates/proteins at 10 µg per lane.
Secondary antibody: Goat Anti-Rabbit IgG(H+L), HRP Conjugated (Cat. No. LF102) at 1:5,000 dilution
Predicted band size: 118 kDa
Observed band size: 118 kDa
Developed using the ECL technique (Cat. No. SQ201).