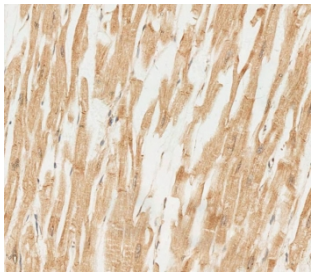
RNF4 Antibody / E3 Ubiquitin-Protein Ligase RNF4 Antibody (F54707)

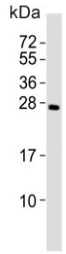
Catalog No.	Formulation	Size
F54707-0.4ML	In 1X PBS, pH 7.4, with 0.09% sodium azide	0.4 ml
F54707-0.08ML	In 1X PBS, pH 7.4, with 0.09% sodium azide	0.08 ml

Bulk quote request

Availability	1-3 business days
Species Reactivity	Human
Format	Purified
Host	Rabbit
Clonality	Polyclonal (rabbit origin)
Isotype	Rabbit Ig
Purity	Antigen affinity purified
UniProt	P78317
Localization	Cytoplasmic, nuclear
Applications	Western blot: 1:500-1:2000 Flow cytometry: 1:25 (1x10e6 cells) Immunohistochemistry (FFPE): 1:25
Limitations	This RNF4 antibody is available for research use only.



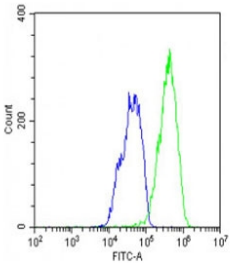
RNF4 Antibody / E3 Ubiquitin-Protein Ligase RNF4 Antibody. Immunohistochemistry analysis of RNF4 in FFPE human heart tissue. IHC staining of FFPE human heart using RNF4 Antibody / E3 Ubiquitin-Protein Ligase RNF4 Antibody demonstrates HRP-DAB brown staining within cardiomyocytes, with signal primarily localized to intracellular compartments consistent with nuclear and perinuclear distribution of this E3 ubiquitin ligase. The staining pattern reflects cellular regions associated with ubiquitin-mediated protein regulation and SUMO-targeted ubiquitination activity, while surrounding tissue architecture remains clearly defined.



Flow cytometry testing of fixed and permeabilized human HepG2 cells with RNF4 Antibody / E3 Ubiquitin-Protein Ligase RNF4 Antibody; Blue=isotype control, Green= RNF4 antibody.



Western blot testing of human LNCaP cell lysate with RNF4 antibody. Expected molecular weight: 15-30 kDa (isoform 1).



RNF4 Antibody / E3 Ubiquitin-Protein Ligase RNF4 Antibody for FACS. Flow cytometry analysis of RNF4 in permeabilized human HepG2 cells. Flow cytometric analysis of fixed and permeabilized human HepG2 cells stained with RNF4 Antibody / E3 Ubiquitin-Protein Ligase RNF4 Antibody shows a clear rightward shift of the RNF4-positive population (green) relative to isotype control (blue). The signal reflects intracellular detection of this nuclear E3 ubiquitin ligase, consistent with its role in SUMO-targeted ubiquitination and regulation of protein turnover pathways.

Description

E3 ubiquitin-protein ligase RNF4 (RNF4), also known as RING finger protein 4, is a nuclear protein that functions as a SUMO-targeted ubiquitin ligase involved in ubiquitin-mediated protein degradation and cellular stress responses. The RNF4 Antibody / E3 ubiquitin-protein ligase RNF4 is specifically suited for studies focused on ubiquitination pathways, enabling detection of RNF4 in systems where SUMO-targeted ubiquitination and protein turnover are actively regulated.

RNF4 Antibody, also referred to as RING finger protein 4 antibody or SUMO-targeted ubiquitin ligase RNF4 antibody, plays a key role in research examining the interplay between SUMOylation and ubiquitination. RNF4 recognizes SUMO-modified substrates and facilitates their ubiquitination, targeting them for proteasomal degradation. This function places RNF4 at a critical junction between post-translational modification pathways, linking SUMO signaling to ubiquitin-mediated protein turnover and cellular homeostasis.

This rabbit polyclonal RNF4 Antibody supports detection of RNF4 in experimental models where ubiquitin signaling and SUMO-dependent protein regulation are under investigation. RNF4 is primarily localized in the nucleus, where it participates in regulation of transcription factors, DNA damage response proteins, and other SUMOylated substrates. Its activity contributes to maintenance of protein quality control and regulation of stress-induced signaling pathways.

RNF4 has been implicated in multiple biological processes, including DNA repair, transcriptional regulation, and response to proteotoxic stress. Through its role as an E3 ubiquitin ligase, RNF4 contributes to selective degradation of SUMOylated proteins, influencing cellular signaling networks and protein stability. Dysregulation of RNF4 activity has been associated with cancer biology and altered cellular stress responses.

An RNF4 Antibody / E3 ubiquitin-protein ligase RNF4 is ideally suited for research applications focused on ubiquitin signaling, SUMO-targeted ubiquitination, and protein degradation pathways. Its positioning as an E3 ubiquitin ligase-focused antibody clearly differentiates it from general RING finger protein reagents and supports mechanistic investigation of post-translational protein regulation.

Application Notes

The stated application concentrations are suggested starting points. Titration of the RNF4 Antibody / E3 Ubiquitin-Protein Ligase RNF4 Antibody may be required due to differences in protocols and secondary/substrate sensitivity.

Immunogen

A portion of amino acids 95-123 from the human protein was used as the immunogen for the RNF4 Antibody / E3 Ubiquitin-Protein Ligase RNF4 Antibody.

Storage

Aliquot the RNF4 antibody and store frozen at -20oC or colder. Avoid repeated freeze-thaw cycles.

Alternate Names

RNF4 antibody, RING finger protein 4 antibody, E3 ubiquitin ligase RNF4 antibody, SUMO-targeted ubiquitin ligase RNF4 antibody

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