

TRIM25 Antibody (Center)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP16857c

Specification

TRIM25 Antibody (Center) - Product Information

Application	WB,E
Primary Accession	<u>Q14258</u>
Other Accession	<u>NP_005073.2</u>
Reactivity	Human
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Calculated MW	70973
Antigen Region	277-306

TRIM25 Antibody (Center) - Additional Information

Gene ID 7706

Other Names

E3 ubiquitin/ISG15 ligase TRIM25, 632n3, Estrogen-responsive finger protein, RING finger protein 147, Tripartite motif-containing protein 25, Ubiquitin/ISG15-conjugating enzyme TRIM25, Zinc finger protein 147, TRIM25, EFP, RNF147, ZNF147

Target/Specificity

This TRIM25 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 277-306 amino acids from the Central region of human TRIM25.

Dilution

 $WB \sim \sim 1:1000$

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

TRIM25 Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

TRIM25 Antibody (Center) - Protein Information

Name TRIM25



Synonyms EFP {ECO:0000303|PubMed:8248217}, RNF147

Function Functions as a ubiguitin E3 ligase and as an ISG15 E3 ligase (PubMed:16352599). Involved in innate immune defense against viruses by mediating ubiguitination of RIGI and IFIH1 (PubMed: 17392790, PubMed: 29357390, PubMed: 30193849, PubMed: 31710640, PubMed:<u>33849980</u>, PubMed:<u>36045682</u>). Mediates 'Lys-63'-linked polyubiguitination of the RIGI N-terminal CARD-like region and may play a role in signal transduction that leads to the production of interferons in response to viral infection (PubMed: 17392790, PubMed: 23950712). Mediates 'Lys-63'- linked polyubiquitination of IFIH1 (PubMed: 30193849). Promotes ISGylation of 14-3-3 sigma (SFN), an adapter protein implicated in the regulation of a large spectrum signaling pathway (PubMed:<u>16352599</u>, PubMed:<u>17069755</u>). Mediates estrogen action in various target organs (PubMed:22452784). Mediates the ubiquitination and subsequent proteasomal degradation of ZFHX3 (PubMed:22452784). Plays a role in promoting the restart of stalled replication forks via interaction with the KHDC3L-OOEP scaffold and subsequent ubiquitination of BLM, resulting in the recruitment and retainment of BLM at DNA replication forks (By similarity). Plays an essential role in the antiviral activity of ZAP/ZC3HAV1; an antiviral protein which inhibits the replication of certain viruses. Mechanistically, mediates 'Lys-63'- linked polyubiguitination of ZAP/ZC3HAV1 that is required for its optimal binding to target mRNA (PubMed:<u>28060952</u>, PubMed:<u>28202764</u>). Also mediates the ubiquitination of various substrates implicated in stress granule formation, nonsense-mediated mRNA decay, nucleoside synthesis and mRNA translation and stability (PubMed: 36067236).

Cellular Location Cytoplasm. Cytoplasm, Stress granule. Nucleus {ECO:0000250|UniProtKB:Q61510}

Tissue Location

Expressed in breast tumors (at protein level). Ubiquitous.

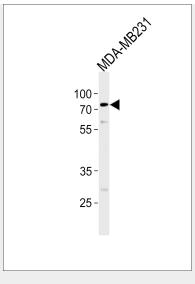
TRIM25 Antibody (Center) - Protocols

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>

TRIM25 Antibody (Center) - Images





TRIM25 Antibody (Center) (Cat. #AP16857c) western blot analysis in MDA-MB231 cell line lysates (35ug/lane).This demonstrates the TRIM25 antibody detected the TRIM25 protein (arrow).

TRIM25 Antibody (Center) - Background

The protein encoded by this gene is a member of the tripartite motif (TRIM) family. The TRIM motif includes three zinc-binding domains, a RING, a B-box type 1 and a B-box type 2, and a coiled-coil region. The protein localizes to the cytoplasm. The presence of potential DNA-binding and dimerization-transactivation domains suggests that this protein may act as a transcription factor, similar to several other members of the TRIM family. Expression of the gene is upregulated in response to estrogen, and it is thought to mediate estrogen actions in breast cancer as a primary response gene.

TRIM25 Antibody (Center) - References

Dai, H., et al. Oncol. Rep. 23(3):795-799(2010) Zhao, J., et al. BMC Med. Genet. 11, 96 (2010) : Gack, M.U., et al. Cell Host Microbe 5(5):439-449(2009) Ludwig, S., et al. Cell Host Microbe 5(5):420-421(2009) Dai, H., et al. Oncol. Rep. 21(2):395-401(2009)