

USP39 Antibody (Center)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP18677c

Specification

USP39 Antibody (Center) - Product Information

Application Primary Accession Other Accession Reactivity Predicted Host Clonality Isotype Calculated MW Antigen Region WB,E <u>Q53GS9</u> <u>Q3TIX9</u>, <u>NP_006581.2</u> Human Mouse Rabbit Polyclonal Rabbit IgG 65381 237-265

USP39 Antibody (Center) - Additional Information

Gene ID 10713

Other Names U4/U6U5 tri-snRNP-associated protein 2, Inactive ubiquitin-specific peptidase 39, SAD1 homolog, U4/U6U5 tri-snRNP-associated 65 kDa protein, 65K, USP39

Target/Specificity

This USP39 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 237-265 amino acids from the Central region of human USP39.

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

USP39 Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

USP39 Antibody (Center) - Protein Information

Name USP39 (<u>HGNC:20071</u>)



Function Deubiquitinating enzyme that plays a role in many cellular processes including cellular antiviral response, epithelial morphogenesis, DNA repair or B-cell development (PubMed: 33127822, PubMed: 34614178). Plays a role in pre-mRNA splicing as a component of the U4/U6-U5 tri-snRNP, one of the building blocks of the precatalytic spliceosome (PubMed: 11350945, PubMed: 26912367). Specifically regulates immunoglobulin gene rearrangement in a spliceosome-dependent manner, which involves modulating chromatin interactions at the Igh locus and therefore plays an essential role in B-cell development (By similarity). Regulates AURKB mRNA levels, and thereby plays a role in cytokinesis and in the spindle checkpoint (PubMed:18728397). Regulates apoptosis and G2/M cell cycle checkpoint in response to DNA damage by deubiquitinating and stabilizing CHK2 (PubMed: 30771428). Also plays an important role in DNA repair by controlling the recruitment of XRCC4/LIG4 to DNA double-strand breaks for non-homologous end-joining repair (PubMed:<u>34614178</u>). Participates in antiviral activity by affecting the type I IFN signaling by stabilizing STAT1 and decreasing its 'Lys-6'-linked ubiquitination (PubMed:<u>33127822</u>). Contributes to non-canonical Wnt signaling during epidermal differentiation (By similarity). Acts as a negative regulator NF-kappa-B activation through deubiquitination of 'Lys-48'-linked ubiquitination of NFKBIA (PubMed: 36651806).

Cellular Location Nucleus

USP39 Antibody (Center) - Protocols

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

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

USP39 Antibody (Center) - Images



USP39 Antibody (Center) (Cat. #AP18677c) western blot analysis in Hela cell line lysates (35ug/lane). This demonstrates the USP39 antibody detected the USP39 protein (arrow).

USP39 Antibody (Center) - Background



USP39 may play a role in mRNA splicing. It is unsure if the protein really exhibits hydrolase activity. Could be a competitor of ubiquitin C-terminal hydrolases (UCHs).

USP39 Antibody (Center) - References

Rose, J. Phd, et al. Mol. Med. (2010) In press : van Leuken, R.J., et al. Cell Cycle 7(17):2710-2719(2008) Sugiyama, N., et al. Mol. Cell Proteomics 6(6):1103-1109(2007) Ewing, R.M., et al. Mol. Syst. Biol. 3, 89 (2007) : Olsen, J.V., et al. Cell 127(3):635-648(2006)