

USP38 antibody - middle region

Rabbit Polyclonal Antibody

Catalog # AI14382

Product Information

Application	WB
Primary Accession	Q8NB14
Other Accession	NM_032557 , NP_115946
Reactivity	Human, Mouse, Rat, Rabbit, Pig, Dog, Guinea Pig, Horse, Bovine
Predicted	Human, Mouse, Rabbit, Dog, Horse, Bovine
Host	Rabbit
Clonality	Polyclonal
Calculated MW	116546

Additional Information

Gene ID	84640
Alias Symbol	FLJ35970, HP43.8KD, KIAA1891
Other Names	Ubiquitin carboxyl-terminal hydrolase 38, 3.4.19.12, Deubiquitinating enzyme 38, HP43.8KD, Ubiquitin thioesterase 38, Ubiquitin-specific-processing protease 38, USP38, KIAA1891
Format	Liquid. Purified antibody supplied in 1x PBS buffer with 0.09% (w/v) sodium azide and 2% sucrose.
Reconstitution & Storage	Add 50 ul of distilled water. Final anti-USP38 antibody concentration is 1 mg/ml in PBS buffer with 2% sucrose. For longer periods of storage, store at 20°C. Avoid repeat freeze-thaw cycles.
Precautions	USP38 antibody - middle region is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	USP38
Synonyms	KIAA1891
Function	Deubiquitinating enzyme that plays a role in various cellular processes, including DNA repair, cell cycle regulation, and immune response (PubMed: 22689415 , PubMed: 30497519 , PubMed: 31874856 , PubMed: 35238669). Plays a role in the inhibition of type I interferon signaling by mediating the 'Lys-33' to 'Lys-48' ubiquitination transition of TBK1 leading to its degradation (PubMed: 27692986). Cleaves the ubiquitin chain from the histone demethylase LSD1/KDM1A and prevents it from degradation by the

26S proteasome, thus maintaining LSD1 protein level in cells (PubMed:[30497519](#)). Plays a role in the DNA damage response by regulating the deacetylase activity of HDAC1 (PubMed:[31874856](#)). Mechanistically, removes the 'Lys-63'-linked ubiquitin chain promoting the deacetylase activity of HDAC1 in response to DNA damage (PubMed:[31874856](#)). Also acts as a specific deubiquitinase of histone deacetylase 3/HDAC3 and cleaves its 'Lys-63'-linked ubiquitin chains to lower its histone deacetylase activity (PubMed:[32404892](#)). Regulates MYC levels and cell proliferation via antagonizing ubiquitin E3 ligase FBXW7 thereby preventing MYC 'Lys-48'-linked ubiquitination and degradation (PubMed:[34102342](#)). Participates in antiviral response by removing both 'Lys-48'-linked and 'Lys-63'-linked polyubiquitination of Zika virus envelope protein E (PubMed:[34696459](#)). Constitutively associated with IL-33R/IL1RL1, deconjugates its 'Lys-27'-linked polyubiquitination resulting in its autophagic degradation (PubMed:[35238669](#)).

Cellular Location

Cytoplasm. Nucleus Note=In response to DNA damage, recruited to DNA damage sites in the nucleus.

Tissue Location

Highly expressed in skeletal muscle. Expressed in adrenal gland.

References

Ota T.,et al.Nat. Genet. 36:40-45(2004).
 Bechtel S.,et al.BMC Genomics 8:399-399(2007).
 Hillier L.W.,et al.Nature 434:724-731(2005).
 Mural R.J.,et al.Submitted (SEP-2005) to the EMBL/GenBank/DBJ databases.
 Nagase T.,et al.DNA Res. 8:179-187(2001).

Images



WB Suggested Anti-USP38 Antibody Titration: 0.2-1 µg/ml
 ELISA Titer: 1:1562500
 Positive Control: HepG2 cell lysate

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.