

SENP6 (SUSP1) Antibody (N-term) Blocking peptide
Synthetic peptide
Catalog # BP1152a**Specification**

SENP6 (SUSP1) Antibody (N-term) Blocking peptide - Product Information

Primary Accession [O9GZR1](#)
Other Accession [NP_056386](#)

SENP6 (SUSP1) Antibody (N-term) Blocking peptide - Additional Information

Gene ID 26054

Other Names

Sentrin-specific protease 6, SUMO-1-specific protease 1, Sentrin/SUMO-specific protease SENP6, SENP6, KIAA0797, SSP1, SUSP1

Target/Specificity

The synthetic peptide sequence used to generate the antibody [AP1152a](/product/products/AP1152a) was selected from the N-term region of human SUSP1. A 10 to 100 fold molar excess to antibody is recommended. Precise conditions should be optimized for a particular assay.

Format

Peptides are lyophilized in a solid powder format. Peptides can be reconstituted in solution using the appropriate buffer as needed.

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C.

Precautions

This product is for research use only. Not for use in diagnostic or therapeutic procedures.

SENP6 (SUSP1) Antibody (N-term) Blocking peptide - Protein Information

Name SENP6

Synonyms KIAA0797, SSP1, SUSP1

Function

Protease that deconjugates SUMO1, SUMO2 and SUMO3 from targeted proteins. Processes preferentially poly-SUMO2 and poly-SUMO3 chains, but does not efficiently process SUMO1, SUMO2 and SUMO3 precursors. Deconjugates SUMO1 from RXRA, leading to transcriptional activation. Involved in chromosome alignment and spindle assembly, by regulating the kinetochore CENPH-CENPI-CENPK complex. Desumoylates PML and CENPI, protecting them from degradation by the ubiquitin ligase RNF4, which targets polysumoylated proteins for proteasomal degradation. Desumoylates also RPA1, thus preventing recruitment of RAD51 to the DNA damage foci to initiate DNA repair through homologous recombination.

Cellular Location

Nucleus

Tissue Location

Highly expressed in reproductive organs, such as testis, ovary and prostate

SENP6 (SUSP1) Antibody (N-term) Blocking peptide - Protocols

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

- [Blocking Peptides](#)

SENP6 (SUSP1) Antibody (N-term) Blocking peptide - Images**SENP6 (SUSP1) Antibody (N-term) Blocking peptide - Background**

Ubiquitin-like molecules (UBLs), such as SUMO1 (UBL1), are structurally related to ubiquitin and can be ligated to target proteins in a similar manner as ubiquitin.^{1,2} However, covalent attachment of UBLs does not result in degradation of the modified proteins.. Like ubiquitin, UBLs are synthesized as precursor proteins, with 1 or more amino acids following the C-terminal glycine-glycine residues of the mature UBL protein. Thus, the tail sequences of the UBL precursors need to be removed by UBL-specific proteases such as SUMO1-specific protease 1 (SUSP1) prior to their conjugation to target proteins.

SENP6 (SUSP1) Antibody (N-term) Blocking peptide - References

Bailey, D., et al., J. Biol. Chem. 279(1):692-703 (2004). Kim, K.I., et al., J. Biol. Chem. 275(19):14102-14106 (2000). Yeh, E.T., et al., Gene 248 (1-2), 1-14 (2000)