

EXOSC4 Antibody (Center) Blocking Peptide
Synthetic peptide
Catalog # BP17249c**Specification**

EXOSC4 Antibody (Center) Blocking Peptide - Product InformationPrimary Accession [Q9NPD3](#)**EXOSC4 Antibody (Center) Blocking Peptide - Additional Information****Gene ID** 54512**Other Names**

Exosome complex component RRP41, Exosome component 4, Ribosomal RNA-processing protein 41, p12A, EXOSC4, RRP41, SKI6

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.

EXOSC4 Antibody (Center) Blocking Peptide - Protein Information**Name** EXOSC4**Synonyms** RRP41, SKI6**Function**

Non-catalytic component of the RNA exosome complex which has 3'→5' exoribonuclease activity and participates in a multitude of cellular RNA processing and degradation events. In the nucleus, the RNA exosome complex is involved in proper maturation of stable RNA species such as rRNA, snRNA and snoRNA, in the elimination of RNA processing by-products and non-coding 'pervasive' transcripts, such as antisense RNA species and promoter-upstream transcripts (PROMPTs), and of mRNAs with processing defects, thereby limiting or excluding their export to the cytoplasm. The RNA exosome may be involved in Ig class switch recombination (CSR) and/or Ig variable region somatic hypermutation (SHM) by targeting AICDA deamination activity to transcribed dsDNA substrates. In the cytoplasm, the RNA exosome complex is involved in general mRNA turnover and specifically degrades inherently unstable mRNAs containing AU-rich elements (AREs) within their 3' untranslated regions, and in RNA surveillance pathways, preventing translation of aberrant mRNAs. It seems to be involved in degradation of histone mRNA. The catalytic inactive RNA exosome core complex of 9 subunits (Exo-9) is proposed to play a pivotal role in the binding and presentation of RNA for ribonucleolysis, and to serve as a scaffold for the association with catalytic subunits and accessory proteins or complexes. EXOSC4 binds to ARE-containing RNAs.

Cellular Location

Cytoplasm. Nucleus, nucleolus. Nucleus. Nucleus, nucleoplasm

EXOSC4 Antibody (Center) Blocking Peptide - Protocols

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

- [Blocking Peptides](#)

EXOSC4 Antibody (Center) Blocking Peptide - Images**EXOSC4 Antibody (Center) Blocking Peptide - Background**

Component of the exosome 3'->5' exoribonuclease complex, a complex that degrades inherently unstable mRNAs containing AU-rich elements (AREs) within their 3'-untranslated regions. Required for the 3'-processing of the 7S pre-rRNA to the mature 5.8S rRNA. Has a 3'-5' exonuclease activity. Plays a role in replication-dependent histone mRNA degradation.

EXOSC4 Antibody (Center) Blocking Peptide - References

Mullen, T.E., et al. Genes Dev. 22(1):50-65(2008)van Dijk, E.L., et al. RNA 13(7):1027-1035(2007)Oh, J.H., et al. Mamm. Genome 16(12):942-954(2005)Andersen, J.S., et al. Nature 433(7021):77-83(2005)Lehner, B., et al. Genome Res. 14(7):1315-1323(2004)