

WDR82 Blocking Peptide (N-term)

Synthetic peptide Catalog # BP20977b

Specification

WDR82 Blocking Peptide (N-term) - Product Information

Primary Accession <u>Q6UXN9</u>

Other Accession <u>Q8BFQ4</u>, <u>Q6NV31</u>, <u>Q5ZMV7</u>, <u>Q58E77</u>, <u>Q640J6</u>

WDR82 Blocking Peptide (N-term) - Additional Information

Gene ID 80335

Other Names

WD repeat-containing protein 82, Protein TMEM113, Swd2, WDR82, TMEM113, WDR82A

Target/Specificity

The synthetic peptide sequence is selected from aa 50-65 of HUMAN WDR82

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.

WDR82 Blocking Peptide (N-term) - Protein Information

Name WDR82 {ECO:0000303|PubMed:17998332, ECO:0000312|HGNC:HGNC:28826}

Function

Regulatory component of the SET1/COMPASS complex implicated in the tethering of this complex to transcriptional start sites of active genes (PubMed:17998332, PubMed:18838538, PubMed:20516061). Facilitates histone H3 'Lys-4' methylation (H3K4me) via recruitment of the SETD1A or SETD1B to the 'Ser-5' phosphorylated C-terminal domain (CTD) of RNA polymerase II large subunit (POLR2A) (PubMed:17998332, PubMed:18838538). Component of PTW/PP1 phosphatase complex, which plays a role in the control of chromatin structure and cell cycle progression during the transition from mitosis into interphase (PubMed:20516061). Together with ZC3H4, but independently of the SET1 complex, part of a transcription termination checkpoint that promotes transcription termination of long non-coding RNAs (IncRNAs) (PubMed:<a



href="http://www.uniprot.org/citations/33913806" target="_blank">33913806, PubMed:33767452). The transcription termination checkpoint is activated by the inefficiently spliced first exon of lncRNAs and promotes transcription termination of lncRNAs and their subsequent degradation by the exosome (PubMed:33767452).

Cellular Location

Nucleus. Chromosome {ECO:0000250|UniProtKB:Q8BFQ4}. Note=Associates with chromatin (PubMed:20516061). Recruited at sites of high RNA polymerase II occupancy (By similarity). {ECO:0000250|UniProtKB:Q8BFQ4, ECO:0000269|PubMed:20516061}

WDR82 Blocking Peptide (N-term) - Protocols

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

Blocking Peptides

WDR82 Blocking Peptide (N-term) - Images

WDR82 Blocking Peptide (N-term) - Background

Regulatory component of the SET1 complex implicated in the tethering of this complex to transcriptional start sites of active genes. Facilitates histone H3 'Lys-4' methylation via recruitment of the SETD1A or SETD1B to the 'Ser-5' phosphorylated C-terminal domain (CTD) of RNA polymerase II large subunit (POLR2A). Component of PTW/PP1 phosphatase complex, which plays a role in the control of chromatin structure and cell cycle progression during the transition from mitosis into interphase.

WDR82 Blocking Peptide (N-term) - References

Clark H.F., et al. Genome Res. 13:2265-2270(2003).
Ota T., et al. Nat. Genet. 36:40-45(2004).
Mural R.J., et al. Submitted (JUL-2005) to the EMBL/GenBank/DDBJ databases.
Lee J.-H., et al. J. Biol. Chem. 280:41725-41731(2005).
Higa L.A., et al. Nat. Cell Biol. 8:1277-1283(2006).