

Catalog # BP1965c

Mes-4 Antibody (Center) Blocking Peptide Synthetic peptide

# Specification

# Mes-4 Antibody (Center) Blocking Peptide - Product Information

Primary Accession

<u>Q9NH52</u>

# Mes-4 Antibody (Center) Blocking Peptide - Additional Information

Gene ID 179824

**Other Names** Histone-lysine N-methyltransferase mes-4, Maternal-effect sterile protein 4, mes-4

# Target/Specificity

optimized for a particular assay.

The synthetic peptide sequence used to generate the antibody <a href=/product/products/AP1965c>AP1965c</a> was selected from the Center region of human Mes-4. A 10 to 100 fold molar excess to antibody is recommended. Precise conditions should be

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.

# Mes-4 Antibody (Center) Blocking Peptide - Protein Information

Name mes-4 {ECO:0000312|WormBase:Y2H9A.1}

Function

Histone methyltransferase. Dimethylates 'Lys-36' of histone H3, a specific tag for epigenetic transcriptional activation. Plays a central role in early development and is responsible for all H3 'Lys- 36' dimethylation until about the 40-cell stage. Indirectly involved in the global inactivation of the X chromosomes in germline cells, possibly by excluding the mes-2-mes-3-mes-6 repressive Polycomb complex from the autosomes (PubMed:<a

href="http://www.uniprot.org/citations/12077420" target="\_blank">12077420</a>, PubMed:<a href="http://www.uniprot.org/citations/16968818" target="\_blank">16968818</a>). Not related to transcription elongation (PubMed:<a href="http://www.uniprot.org/citations/12077420" target="\_blank">12077420</a>, PubMed:<a href="http://www.uniprot.org/citations/12077420" target="\_blank">16968818</a>). Not related to transcription elongation (PubMed:<a href="http://www.uniprot.org/citations/12077420" target="\_blank">12077420</a>, PubMed:<a href="http://www.uniprot.org/citations/16968818" target="\_blank">16968818</a> (PubMed:<a href="http://www.uniprot.org/citations/16968818" target="\_blank">16968818</a> (PubMed:<a href="http://www.uniprot.org/citations/16968818" target="\_blank">16968818</a> (PubMed:<a href="http://www.uniprot.org/citations/16968818" target="\_blank">26365259</a> (PubMed:<a href="http://www.uniprot.org/citations/16968818" target="\_blank">16968818</a> (PubMed:<a href="http://www.uniprot.org/citations/16968818" target="\_blank">26365259</a> (PubMed:<a href="http://www.uniprot.org/citations/16968818" target="\_blank">26365259</a> (PubMed:<a href="http://www.uniprot.org/citations/26365259" target="\_blank">26365259</a> (PubMed:<a href="http://www.uniprot.org/citations/16507136"



target="\_blank">16507136</a>). May regulate the expression of genes required for vulval development (PubMed:<a href="http://www.uniprot.org/citations/16507136" target="\_blank">16507136</a>, PubMed:<a href="http://www.uniprot.org/citations/16710447" target="\_blank">16710447</a>).

# **Cellular Location**

Nucleus. Chromosome. Note=Specifically associated with the autosomes and with the distal tip of chromosome X. Colocalizes with methylated 'Lys-4' of histone H3

### **Tissue Location**

In adults, it is predominantly expressed in the germline, and weakly expressed in intestinal cells

# Mes-4 Antibody (Center) Blocking Peptide - Protocols

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

#### <u>Blocking Peptides</u>

# Mes-4 Antibody (Center) Blocking Peptide - Images

# Mes-4 Antibody (Center) Blocking Peptide - Background

Mes-4 is a histone methyltransferase. This protein dimethylates 'Lys-36' of histone H3, a specific tag for epigenetic transcriptional activation. Mes-4 plays a central role in early development and is responsible for all H3 'Lys-36' dimethylation until about the 40-cell stage. It appears to be indirectly involved in the global inactivation of the X chromosomes in germ line cells, possibly by excluding the mes-2-mes-3-mes-6 repressive Polycomb complex from the autosomes.