

WT1 Antibody (Center E361) Blocking peptide Synthetic peptide Catalog # BP11964c

#### Specification

# WT1 Antibody (Center E361) Blocking peptide - Product Information

Primary Accession

<u>P19544</u>

## WT1 Antibody (Center E361) Blocking peptide - Additional Information

Gene ID 7490

**Other Names** Wilms tumor protein, WT33, WT1

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.

#### WT1 Antibody (Center E361) Blocking peptide - Protein Information

Name WT1

Function

Transcription factor that plays an important role in cellular development and cell survival (PubMed:<a href="http://www.uniprot.org/citations/7862533" target="\_blank">7862533</a>). Recognizes and binds to the DNA sequence 5'-GCG(T/G)GGGCG-3' (PubMed:<a href="http://www.uniprot.org/citations/7862533" target="\_blank">7862533</a>, PubMed:<a href="http://www.uniprot.org/citations/7862533" target="\_blank">7862533</a>, PubMed:<a href="http://www.uniprot.org/citations/17716689" target="\_blank">7862533</a>, PubMed:<a href="http://www.uniprot.org/citations/17716689" target="\_blank">17716689</a>, PubMed:<a href="http://www.uniprot.org/citations/25258363" target="\_blank">25258363</a>). Regulates the expression of numerous target genes, including EPO. Plays an essential role for development of the urogenital system. It has a tumor suppressor as well as an oncogenic role in tumor formation. Function may be isoform-specific: isoforms lacking the KTS motif may act as transcription factors (PubMed:<a href="http://www.uniprot.org/citations/15520190" target="\_blank">15520190</a>). Isoforms containing the KTS motif may bind mRNA and play a role in mRNA metabolism or splicing (PubMed:<a href="http://www.uniprot.org/citations/16934801" target="\_blank">16934801</a>). Isoform 1 has lower affinity for DNA, and can bind RNA (PubMed:<a

href="http://www.uniprot.org/citations/19123921" target="\_blank">19123921</a>).

#### **Cellular Location**

Nucleus. Nucleus, nucleolus. Cytoplasm. Note=Isoforms lacking the KTS motif have a diffuse



nuclear location (PubMed:15520190). Shuttles between nucleus and cytoplasm. {ECO:0000250, ECO:0000269|PubMed:15520190} [Isoform 4]: Nucleus, nucleoplasm

**Tissue Location** 

Expressed in the kidney and a subset of hematopoietic cells

## WT1 Antibody (Center E361) Blocking peptide - Protocols

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

#### Blocking Peptides

# WT1 Antibody (Center E361) Blocking peptide - Images

## WT1 Antibody (Center E361) Blocking peptide - Background

This gene encodes a transcription factor that containsfour zinc-finger motifs at the C-terminus and aproline/glutamine-rich DNA-binding domain at the N-terminus. It has nessential role in the normal development of the urogenital system, and it is mutated in a small subset of patients with Wilm'stumors. This gene exhibits complex tissue-specific and polymorphicimprinting pattern, with biallelic, and monoallelic expression from maternal and paternal alleles in different tissues. Multipletranscript variants have been described. In several variants, there evidence for the use of a non-AUG (CUG) translation initiationsite upstream of and in-frame with the first AUG. Authors of PMID:7926762 also provide evidence that WT1 mRNA undergoes RNAediting in human and rat, and that this process istissue-restricted and developmentally regulated. [provided byRefSeq].

## WT1 Antibody (Center E361) Blocking peptide - References

Sitaram, R.T., et al. Br. J. Cancer 103(8):1255-1262(2010)Dohi, S., et al. Anticancer Res. 30(8):3187-3192(2010)Rocquain, J., et al. BMC Cancer 10, 401 (2010) :Wagner, K.D., et al. J. Cell. Sci. 116 (PT 9), 1653-1658 (2003) :Mitsuya, K., et al. Hum. Mol. Genet. 6(13):2243-2246(1997)