

SIX2 Antibody (Center) Blocking Peptide
Synthetic peptide
Catalog # BP17338c**Specification**

SIX2 Antibody (Center) Blocking Peptide - Product InformationPrimary Accession [Q9NPC8](#)**SIX2 Antibody (Center) Blocking Peptide - Additional Information****Gene ID** 10736**Other Names**

Homeobox protein SIX2, Sine oculis homeobox homolog 2, SIX2

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.

SIX2 Antibody (Center) Blocking Peptide - Protein Information**Name** SIX2**Function**

Transcription factor that plays an important role in the development of several organs, including kidney, skull and stomach. During kidney development, maintains cap mesenchyme multipotent nephron progenitor cells in an undifferentiated state by opposing the inductive signals emanating from the ureteric bud and cooperates with WNT9B to promote renewing progenitor cells proliferation. Acts through its interaction with TCF7L2 and OSR1 in a canonical Wnt signaling independent manner preventing transcription of differentiation genes in cap mesenchyme such as WNT4. Also acts independently of OSR1 to activate expression of many cap mesenchyme genes, including itself, GDNF and OSR1. During craniofacial development plays a role in growth and elongation of the cranial base through regulation of chondrocyte differentiation. During stomach organogenesis, controls pyloric sphincter formation and mucosal growth through regulation of a gene network including NKX2-5, BMPR1B, BMP4, SOX9 and GREM1. During branchial arch development, acts to mediate HOXA2 control over the insulin-like growth factor pathway. May also be involved in limb tendon and ligament development (By similarity). Plays a role in cell proliferation and migration.

Cellular Location

Nucleus {ECO:0000250|UniProtKB:Q62232}.

Tissue Location

Strongly expressed in skeletal muscle. Expressed in Wilms' tumor and in the cap mesenchyme of fetal kidney (at protein level).

SIX2 Antibody (Center) Blocking Peptide - Protocols

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

- [Blocking Peptides](#)

SIX2 Antibody (Center) Blocking Peptide - Images**SIX2 Antibody (Center) Blocking Peptide - Background**

This gene is a member of the vertebrate gene family which encode proteins homologous to the Drosophila 'sine oculis' homeobox protein. The encoded protein is a transcription factor which, like other members of this gene family, may be involved in limb or eye development.

SIX2 Antibody (Center) Blocking Peptide - References

Kumar, J.P. Cell. Mol. Life Sci. 66(4):565-583(2009) Weber, S., et al. J. Am. Soc. Nephrol. 19(5):891-903(2008) Christensen, K.L., et al. Adv. Cancer Res. 101, 93-126 (2008) : Buller, C., et al. Hum. Mol. Genet. 10(24):2775-2781(2001) Boucher, C.A., et al. Gene 247 (1-2), 145-151 (2000) :