

PYCR2 Antibody (Center) Blocking peptide
Synthetic peptide
Catalog # BP11852c**Specification**

PYCR2 Antibody (Center) Blocking peptide - Product Information

Primary Accession [Q96C36](#)

PYCR2 Antibody (Center) Blocking peptide - Additional Information

Gene ID 29920

Other Names

Pyrroline-5-carboxylate reductase 2, P5C reductase 2, P5CR 2, PYCR2

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.

PYCR2 Antibody (Center) Blocking peptide - Protein Information

Name PYCR2

Function

Housekeeping enzyme that catalyzes the last step in proline biosynthesis. In some cell types, such as erythrocytes, its primary function may be the generation of NADP(+). Can utilize both NAD and NADP. Has higher affinity for NADP, but higher catalytic efficiency with NADH (PubMed:2722838, PubMed:6894153). Involved in cellular response to oxidative stress (PubMed:25865492).

Cellular Location

Cytoplasm. Mitochondrion

Tissue Location

Detected in erythrocytes (at protein level) (PubMed:2722838, PubMed:6894153). Expressed in fetal brain (PubMed:25865492).

PYCR2 Antibody (Center) Blocking peptide - Protocols

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

- [Blocking Peptides](#)

PYCR2 Antibody (Center) Blocking peptide - Images

PYCR2 Antibody (Center) Blocking peptide - Background

This gene encodes a member of the Ser/Thr protein kinase family and the TGF β receptor subfamily. The encoded protein is a transmembrane protein that has a protein kinase domain, forms a heterodimeric complex with another receptor protein, and binds TGF- β . This receptor/ligand complex phosphorylates proteins, which then enter the nucleus and regulate the transcription of a subset of genes related to cell proliferation. Mutations in this gene have been associated with Marfan Syndrome, Loeys-Deitz Aortic Aneurysm Syndrome, and the development of various types of tumors. Alternatively spliced transcript variants encoding different isoforms have been characterized.

PYCR2 Antibody (Center) Blocking peptide - References

Inamoto, S., et al. Cardiovasc. Res. 88(3):520-529(2010) Bianchini, G., et al. J. Clin. Oncol. 28(28):4316-4323(2010) Bailey, S.D., et al. Diabetes Care 33(10):2250-2253(2010) Kim, J.N., et al. Toxicology 275 (1-3), 29-35 (2010) Jugessur, A., et al. PLoS ONE 5 (7), E11493 (2010) :