

TXTP Antibody (Center)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP5489C

Specification

TXTP Antibody (Center) - Product Information

Application FC, IHC-P, WB,E **Primary Accession** P53007 Other Accession NP 005975.1 Reactivity Human Host **Rabbit** Clonality **Polyclonal** Isotype Rabbit IgG Antigen Region 142-170

TXTP Antibody (Center) - Additional Information

Gene ID 6576

Other Names

Tricarboxylate transport protein, mitochondrial, Citrate transport protein, CTP, Solute carrier family 25 member 1, Tricarboxylate carrier protein, SLC25A1, SLC20A3

Target/Specificity

This TXTP antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 142-170 amino acids from the Central region of human TXTP.

Dilution

FC~~1:10~50 IHC-P~~1:10~50 WB~~1:1000

E~~Use at an assay dependent concentration.

Format

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

Storage

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

TXTP Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

TXTP Antibody (Center) - Protein Information

Name SLC25A1



Synonyms SLC20A3

Function Mitochondrial electroneutral antiporter that exports citrate from the mitochondria into the cytosol in exchange for malate (PubMed:26870663, PubMed:29031613, PubMed:29238895, PubMed:39881208). Also able to mediate the exchange of citrate for isocitrate, phosphoenolpyruvate, cis-aconitate and to a lesser extent trans- aconitate, maleate and succinate (PubMed:29031613). In the cytoplasm, citrate plays important roles in fatty acid and sterol synthesis, regulation of glycolysis, protein acetylation, and other physiopathological processes (PubMed:29031613, PubMed:29238895, PubMed:39881208).

Cellular Location

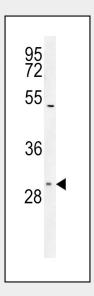
Mitochondrion inner membrane {ECO:0000250|UniProtKB:Q8JZU2}; Multi-pass membrane protein

TXTP Antibody (Center) - Protocols

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

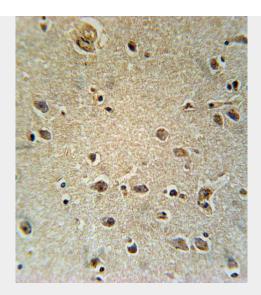
- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- <u>Immunoprecipitation</u>
- Flow Cytomety
- Cell Culture

TXTP Antibody (Center) - Images

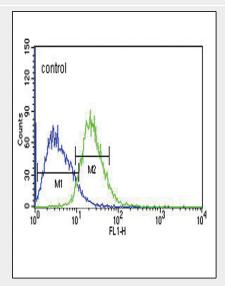


TXTP Antibody (Center) (Cat.#AP5489c) western blot analysis in Jurkat cell line lysates (35ug/lane). This demonstrates the TXTP antibody detected the TXTP protein (arrow).





TXTP Antibody (Center) (Cat. #AP5489c) immunohistochemistry analysis in formalin fixed and paraffin embedded human brain tissue followed by peroxidase conjugation of the secondary antibody and DAB staining. This data demonstrates the use of the TXTP Antibody (Center) for immunohistochemistry. Clinical relevance has not been evaluated.



TXTP Antibody (Center) (Cat. #AP5489c) flow cytometric analysis of Jurkat cells (right histogram) compared to a negative control cell (left histogram).FITC-conjugated goat-anti-rabbit secondary antibodies were used for the analysis.

TXTP Antibody (Center) - Background

Citrate transport protein (CTP) is involved in citrate-H(+)/malate exchange and is important for the bioenergetics of hepatic cells as it provides a carbon source for fatty acid and sterol biosyntheses, and NAD+ for the glycolytic pathway.

TXTP Antibody (Center) - References

Morciano, P., et al. Hum. Mol. Genet. 18(21):4180-4188(2009) lacobazzi, V., et al. Biochem. Biophys. Res. Commun. 386(1):186-191(2009) Trynka, G., et al. Gut 58(8):1078-1083(2009)