

Goat Anti-SLC16A7 / MCT2 Antibody

Peptide-affinity purified goat antibody Catalog # AF1997a

Specification

Goat Anti-SLC16A7 / MCT2 Antibody - Product Information

Application WB
Primary Accession 060669

Other Accession NP 004722, 9194

Reactivity
Host
Clonality
Concentration
Isotype
Human
Goat
Polyclonal
100ug/200ul
IgG

Calculated MW 52200

Goat Anti-SLC16A7 / MCT2 Antibody - Additional Information

Gene ID 9194

Other Names

Monocarboxylate transporter 2, MCT 2, Solute carrier family 16 member 7, SLC16A7, MCT2

Format

0.5 mg lgG/ml in Tris saline (20mM Tris pH7.3, 150mM NaCl), 0.02% sodium azide, with 0.5% bovine serum albumin

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

Goat Anti-SLC16A7 / MCT2 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Goat Anti-SLC16A7 / MCT2 Antibody - Protein Information

Name SLC16A7 (<u>HGNC:10928</u>)

Function

Proton-coupled monocarboxylate symporter. Catalyzes the rapid transport across the plasma membrane of monocarboxylates such as L- lactate, pyruvate and ketone bodies, acetoacetate, beta-hydroxybutyrate and acetate (PubMed:9786900, PubMed:32415067). Dimerization is functionally required and both subunits work cooperatively in transporting substrate (PubMed:32415067).



Cellular Location

Cell membrane; Multi-pass membrane protein. Basolateral cell membrane {ECO:0000250|UniProtKB:P53988}; Multi-pass membrane protein. Cytoplasm {ECO:0000250|UniProtKB:O70451}. Note=Requires the ancillary protein, EMB for plasma membrane localization (By similarity). Colocalizes with BSG in spermatozoa. Detected in the cytoplasm of Sertoli cells (By similarity). {ECO:0000250|UniProtKB:O70451, ECO:0000250|UniProtKB:Q63344}

Tissue Location

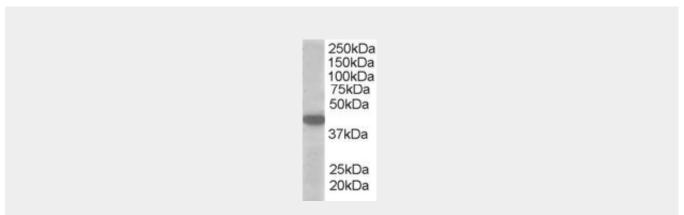
Detected in heart and in blood lymphocytes and monocytes (at protein level) (PubMed:15505343). High expression in testis, moderate to low in spleen, heart, kidney, pancreas, skeletal muscle, brain and leukocyte (PubMed:9786900). Restricted expression in normal tissues, but widely expressed in cancer cells

Goat Anti-SLC16A7 / MCT2 Antibody - 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

Goat Anti-SLC16A7 / MCT2 Antibody - Images



AF1997a (1 μ g/ml) staining of A549 lysate (35 μ g protein in RIPA buffer). Primary incubation was 1 hour. Detected by chemiluminescence.

Goat Anti-SLC16A7 / MCT2 Antibody - References

Expression of monocarboxylate transporters 1, 2, and 4 in human tumours and their association with CD147 and CD44. Pinheiro C, et al. J Biomed Biotechnol, 2010. PMID 20454640.

Personalized smoking cessation: interactions between nicotine dose, dependence and quit-success genotype score. Rose JE, et al. Mol Med, 2010 Jul-Aug. PMID 20379614.

Monocarboxylate transport in human corneal epithelium and cell lines. Vellonen KS, et al. Eur J Pharm Sci, 2010 Feb 19. PMID 20035863.

Hypoxia stimulates lactate release and modulates monocarboxylate transporter (MCT1, MCT2, and MCT4) expression in human adipocytes. P□rez de Heredia F, et al. Pflugers Arch, 2010 Feb. PMID 19876643.

Sequential use of transcriptional profiling, expression quantitative trait mapping, and gene





association implicates MMP20 in human kidney aging. Wheeler HE, et al. PLoS Genet, 2009 Oct. PMID 19834535.