10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.622.0609

SLC2A1 Blocking Peptide (C-term)

Synthetic peptide
Catalog # BP21407b

Specification

SLC2A1 Blocking Peptide (C-term) - Product Information

Primary Accession P11166

SLC2A1 Blocking Peptide (C-term) - Additional Information

Gene ID 6513

Other Names
Solute carrier family 2, facilitated glucose transporter member 1, Glucose transporter type 1, erythrocyte/brain, GLUT-1, HepG2 glucose transporter, SLC2A1, GLUT1

Target/Specificity
The synthetic peptide sequence is selected from aa 464-477 of HUMAN SLC2A1

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.

SLC2A1 Blocking Peptide (C-term) - Protein Information

Name SLC2A1 (HGNC:11005)

Function
Facilitative glucose transporter, which is responsible for constitutive or basal glucose uptake (PubMed:<a href="http://www.uniprot.org/citations/18245775"

SLC2A1 Blocking Peptide (C-term) - Background

Facilitative glucose transporter. This isoform may be responsible for constitutive or basal glucose uptake. Has a very broad substrate specificity; can transport a wide range of aldoses including both pentoses and hexoses.

SLC2A1 Blocking Peptide (C-term) - References

Mueckler M.,et al.Science 229:941-945(1985).
Ota T.,et al.Nat. Genet. 36:40-45(2004).
Mural R.J.,et al.Submitted (SEP-2005) to the EMBL/GenBank/DDBJ databases.
Fukumoto H.,et al.Diabetes 37:657-661(1988).
Yu W.,et al.Submitted (JUN-1998) to the EMBL/GenBank/DDBJ databases.

target="_blank">18245775, PubMed:19449892, PubMed:25982116, PubMed:27078104, PubMed:10227690). Has a very broad substrate specificity; can transport a wide range of aldoses including both pentoses and hexoses (PubMed:18245775, PubMed:19449892). Most important energy carrier of the brain: present at the blood-brain barrier and assures the energy-independent, facilitative transport of glucose into the brain (PubMed:10227690). In association with BSG and NXNL1, promotes retinal cone survival by increasing glucose uptake into photoreceptors (By similarity).

Cellular Location
Cell membrane; Multi-pass membrane protein. Melanosome. Photoreceptor inner segment {ECO:0000250|UniProtKB:P17809}. Note=Localizes primarily at the cell surface (PubMed:18245775, PubMed:19449892, PubMed:23219802, PubMed:25982116, PubMed:24847886). Identified by mass spectrometry in melanosome fractions from stage I to stage IV (PubMed:17081065)

Tissue Location
Detected in erythrocytes (at protein level). Expressed at variable levels in many human tissues

SLC2A1 Blocking Peptide (C-term) - Protocols

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

- Blocking Peptides