

### SPG20 Antibody (C-term) Blocking Peptide

Synthetic peptide Catalog # BP16276b

### **Specification**

# SPG20 Antibody (C-term) Blocking Peptide - Product Information

**Primary Accession** 

**Q8N0X7** 

## SPG20 Antibody (C-term) Blocking Peptide - Additional Information

**Gene ID** 23111

#### **Other Names**

Spartin, Spastic paraplegia 20 protein, Trans-activated by hepatitis C virus core protein 1, SPG20, KIAA0610, TAHCCP1

#### **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.

### SPG20 Antibody (C-term) Blocking Peptide - Protein Information

Name SPART (HGNC:18514)

### **Function**

Lipophagy receptor that plays an important role in lipid droplet (LD) turnover in motor neurons (PubMed:<a href="http://www.uniprot.org/citations/37443287" target="\_blank">37443287</a>). Localizes to LDs and interacts with components of the autophagy machinery, such as MAP1LC3A/C proteins to deliver LDs to autophagosomes for degradation via lipophagy (PubMed:<a href="http://www.uniprot.org/citations/37443287" target="\_blank">37443287</a>). Lipid transfer protein required for lipid droplet degradation, including by lipophagy (PubMed:<a href="http://www.uniprot.org/citations/38190532" target="\_blank">38190532</a>). Can bind and transfer all lipid species found in lipid droplets, from phospholipids to triglycerides and sterol esters but the direction of lipid transfer by spartin and its cargos are unknown (PubMed:<a href="http://www.uniprot.org/citations/38190532" target="\_blank">38190532</a>/a>). May be implicated in endosomal trafficking, or microtubule dynamics, or both. Participates in cytokinesis (PubMed:<a href="http://www.uniprot.org/citations/20719964" target="\_blank">20719964</a>).

### **Cellular Location**

Cytoplasm. Midbody. Lipid droplet Note=Transiently associated with endosomes (PubMed:19580544) Colocalized with IST1 to the ends of Flemming bodies during cytokinesis (PubMed:20719964).



**Tissue Location** 

Ubiquitously expressed, with highest levels of expression detected in adipose tissue

## SPG20 Antibody (C-term) Blocking Peptide - Protocols

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

Blocking Peptides

SPG20 Antibody (C-term) Blocking Peptide - Images

### SPG20 Antibody (C-term) Blocking Peptide - Background

SPG20 is a protein containing a MIT (MicrotubuleInteracting and Trafficking molecule) domain, and is implicated inregulating endosomal trafficking and mitochondria function. Theprotein localizes to mitochondria and partially co-localizes withmicrotubules. Stimulation with epidermal growth factor (EGF)results in protein translocation to the plasma membrane, and theprotein functions in the degradation and intracellular traffickingof EGF receptor. Multiple alternatively spliced variants, encodingthe same protein, have been identified. Mutations associated withthis gene cause autosomal recessive spastic paraplegia 20 (Troyersyndrome).

### SPG20 Antibody (C-term) Blocking Peptide - References

Hooper, C., et al. BMC Biol. 8, 72 (2010): Milewska, M., et al. J. Neurochem. 111(4):1022-1030(2009) Tsang, H.T., et al. Hum. Mol. Genet. 18(20):3805-3821(2009) Edwards, T.L., et al. Biochem. J. 423(1):31-39(2009) Eastman, S.W., et al. J. Cell Biol. 184(6):881-894(2009)