

**Phospho-beclin 1(S64) Blocking Peptide**  
**Synthetic peptide**  
**Catalog # BP3836a**

**Specification**

**Phospho-beclin 1(S64) Blocking Peptide - Product Information**

Primary Accession [Q14457](#)  
Other Accession [NP\\_003757.1](#)

**Phospho-beclin 1(S64) Blocking Peptide - Additional Information**

**Gene ID** 8678

**Other Names**

Beclin-1, Coiled-coil myosin-like  
BCL2-interacting protein, Protein GT197,  
BECN1, GT197

**Target/Specificity**

The synthetic peptide sequence is selected from aa 61-73 of HUMAN BECN1

**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.

**Phospho-beclin 1(S64) Blocking Peptide - Protein Information**

**Name** BECN1

**Synonyms** GT197

**Function**

Plays a central role in autophagy  
(PubMed:<a href="http://www.uniprot.org/c

**Phospho-beclin 1(S64) Blocking Peptide - Background**

Beclin-1 participates in the regulation of autophagy and has an important role in development, tumorigenesis, and neurodegeneration (Zhong et al., 2009 [PubMed 19270693]).[supplied by OMIM].

**Phospho-beclin 1(S64) Blocking Peptide - References**

Koukourakis, M.I., et al. Br. J. Cancer 103(8):1209-1214(2010)  
Jaeger, P.A., et al. Arch. Neurol. 67(10):1181-1184(2010)  
Metzger, S., et al. Hum. Genet. 128(4):453-459(2010)  
Oberstein, A., et al. J. Biol. Chem. 282(17):13123-13132(2007)  
Furuya, N., et al. Autophagy 1(1):46-52(2005)

itations/23184933"  
target="\_blank">23184933</a>,  
PubMed:<a href="http://www.uniprot.org/ci  
tations/28445460"  
target="\_blank">28445460</a>). Acts as  
core subunit of the PI3K complex that  
mediates formation of phosphatidylinositol  
3-phosphate; different complex forms are  
believed to play a role in multiple  
membrane trafficking pathways: PI3KC3-C1  
is involved in initiation of autophagosomes  
and PI3KC3-C2 in maturation of  
autophagosomes and endocytosis. Involved  
in regulation of degradative endocytic  
trafficking and required for the abscission  
step in cytokinesis, probably in the context  
of PI3KC3-C2 (PubMed:<a href="http://www  
.uniprot.org/citations/20643123"  
target="\_blank">20643123</a>,  
PubMed:<a href="http://www.uniprot.org/ci  
tations/20208530"  
target="\_blank">20208530</a>,  
PubMed:<a href="http://www.uniprot.org/ci  
tations/26783301"  
target="\_blank">26783301</a>). Essential  
for the formation of PI3KC3-C2 but not  
PI3KC3-C1 PI3K complex forms. Involved in  
endocytosis (PubMed:<a href="http://www.  
.uniprot.org/citations/25275521"  
target="\_blank">25275521</a>). Protects  
against infection by a neurovirulent strain  
of Sindbis virus (PubMed:<a href="http://w  
ww.uniprot.org/citations/9765397"  
target="\_blank">9765397</a>). May play  
a role in antiviral host defense.

### Cellular Location

Cytoplasm  
{ECO:0000250|UniProtKB:O88597,  
ECO:0000269|PubMed:19713971,  
ECO:0000269|PubMed:21364619}. Golgi  
apparatus, trans-Golgi network membrane;  
Peripheral membrane protein. Endosome  
membrane; Peripheral membrane protein.  
Endoplasmic reticulum membrane;  
Peripheral membrane protein.  
Mitochondrion membrane; Peripheral  
membrane protein. Endosome  
{ECO:0000250|UniProtKB:O88597}  
Cytoplasmic vesicle, autophagosome.  
Note=Interaction with ATG14 promotes  
translocation to autophagosomes.  
Expressed in dendrites and cell bodies of  
cerebellar Purkinje cells (By similarity)  
{ECO:0000250|UniProtKB:O88597,  
ECO:0000269|PubMed:19050071}  
[Beclin-1-C 37 kDa]: Mitochondrion

{ECO:0000250|UniProtKB:O88597}

**Tissue Location**

Ubiquitous.

**Phospho-beclin 1(S64) Blocking Peptide -  
Protocols**

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

- [Blocking Peptides](#)