For Research Use Only

Phospho-PERK/EIF2AK3 (Ser719) Recombinant antibody

Catalog Number:81251-2-RR

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Antibodies | ELISA kits | Proteins
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Basic Information

Catalog Number:
81251-2-RR

Size:
100ul , Concentration: 1000 μg/ml by Nanodrop;

Source:
Rabbit

Isotype:
IgG

GenBank Accession Number:
BC126354

GeneID (NCBI):
9451

UNIPROT ID:
Q9NZJ5

Full Name:
eukaryotic translation initiation factor 2-alpha kinase 3

Calculated MW:
1116 aa, 125 kDa

Observed MW:
140 kDa

Purification Method:
Protein A purification

CloneNo.:
243165A4

Recommended Dilutions:
WB 1:5000-1:50000

Applications

Tested Applications:
WB, ELISA

Species Specificity:
human, mouse

Positive Controls:

WB : NIH/3T3 cells, λ phosphatase treated NIH/3T3 cells

Background Information

EIF2AK3 encodes the protein kinase RNA-like ER kinase (PERK), a key regulator of the unfolded protein response (UPR) in response to ER stress. Under ER stress conditions, activation of PERK is triggered by the dissociation of glucose-regulated protein (GRP) 78 (also known as BiP) from its luminal domain, followed by oligomerization and autophosphorylation. Phosphorylated PERK subsequently phosphorylates eukaryotic translation initiation factor 2 alpha (eif2α), to attenuate global protein translation and reduce incoming ER protein load via upregulated ER chaperone expression. (PMID: 35922637, PMID: 32029570)

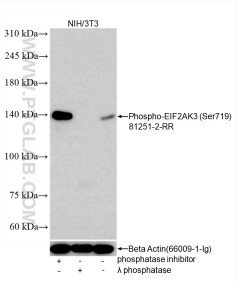
Storage

Storage:
Store at -20°C. Stable for one year after shipment.
Storage Buffer:
PBS with 0.02% sodium azide and 50% glycerol, pH7.3
Aliquoting is unnecessary for -20°C storage

***** 20ul sizes contain 0.1% BSA**

For technical support and original validation data for this product please contact:
T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA)
E: proteintech@ptglab.com
W: ptglab.com

Selected Validation Data



Non-treated NIH/3T3 cells, phosphatase inhibitor treated and λ phosphatase NIH/3T3 cells were subjected to SDS PAGE followed by western blot with 81251-2-RR (Phospho-PERK/EIF2AK3 (Ser719) antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours. The membrane was stripped and re-blotted with Beta Actin (66009-1-Ig) antibody as loading control.