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Goat Anti-BIF-1 / SH3GLB1 Antibody

Peptide-affinity purified goat antibody
Catalog # AF1152a

Specification

Goat Anti-BIF-1 / SH3GLB1 Antibody - Product Information

Application	**WB, IHC, FC, Pep-ELISA**
Primary Accession	Q9Y371
Other Accession	NP_057093, 51100, 54673 (mouse)
Reactivity	**Human**
Predicted	**Mouse, Rat, Dog**
Host	**Goat**
Clonality	**Polyclonal**
Concentration	**100ug/200ul**
Isotype	**IgG**
Calculated MW	**40796**

Goat Anti-BIF-1 / SH3GLB1 Antibody - Additional Information

Gene ID 51100

Other Names
Endophilin-B1, Bax-interacting factor 1, Bif-1, SH3 domain-containing GRB2-like protein B1, SH3GLB1, KIAA0491

Dilution
WB~~1:1000
IHC~~1:100~500
FC~~1:10~50
Pep-ELISA~~N/A

Format
0.5 mg IgG/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-BIF-1 / SH3GLB1 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Goat Anti-BIF-1 / SH3GLB1 Antibody - Protein Information

Name SH3GLB1

Synonyms KIAA0491

Function
May be required for normal outer mitochondrial membrane dynamics (PubMed:15452144). Required for coatomer-mediated retrograde transport in certain cells (By similarity). May recruit other proteins to membranes with high curvature. May promote membrane fusion (PubMed:11604418). Involved in activation of caspase-dependent apoptosis by promoting BAX/BAK1 activation (PubMed:16227588). Isoform 1 acts proapoptotic in fibroblasts (By similarity). Involved in caspase- independent apoptosis during nutrition starvation and involved in the regulation of autophagy. Activates lipid kinase activity of PIK3C3 during autophagy probably by associating with the PI3K complex II (PI3KC3-C2) (PubMed:17891140). Associated with PI3KC3-C2 during autophagy may regulate the trafficking of ATG9A from the Golgi complex to the peripheral cytoplasm for the formation of autophagosomes by inducing Golgi membrane tubulation and fragmentation (PubMed:21068542). Involved in regulation of degradative endocytic trafficking and cytokinesis, probably in the context of PI3KC3-C2 (PubMed:20643123). Isoform 2 acts antiapoptotic in neuronal cells; involved in maintenance of mitochondrial morphology and promotes neuronal viability (By similarity).

Cellular Location
Cytoplasm. Golgi apparatus membrane; Peripheral membrane protein. Mitochondrion outer membrane; Peripheral membrane protein. Cytoplasmic vesicle, autophagosome membrane. Midbody. Note=Association with the Golgi apparatus depends on the cell type (By similarity). Following starvation colocalizes with ATG5 and LC3 autophagy-related protein(s)on autophagosomal membranes (PubMed:17891140). {ECO:0000250, ECO:0000269|PubMed:17891140}

Tissue Location
Highly expressed in heart, skeletal muscle, kidney and placenta. Detected at lower levels in brain, colon, thymus, spleen, liver, small intestine, lung and peripheral blood leukocytes

Goat Anti-BIF-1 / SH3GLB1 Antibody - Protocols

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

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

Goat Anti-BIF-1 / SH3GLB1 Antibody - Images

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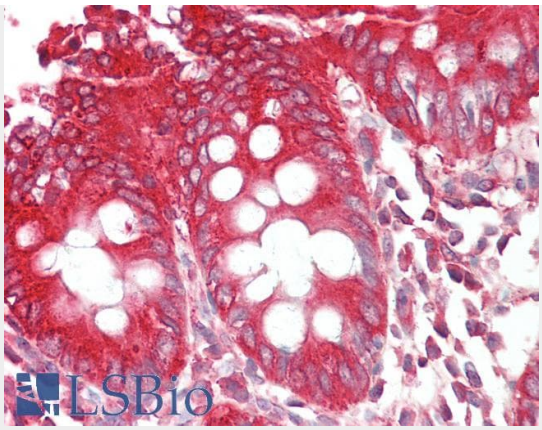
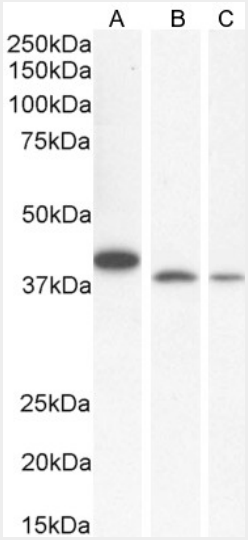
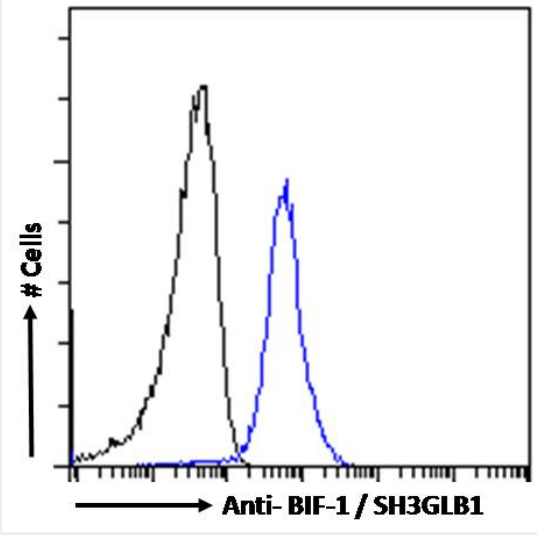


EB05158 (2.5µg/ml) staining of paraffin embedded Human Colon. Steamed antigen retrieval with citrate buffer pH 6, AP-staining.



EB05158 staining (0.1µg/ml) of NIH3T3 (A) , RAW264.7 (B) and KNRK (C) cell lysate (RIPA buffer, 35µg total protein per lane). Detected by chemiluminescence.



EB05158-P1 Flow cytometric analysis of paraformaldehyde fixed A431 cells (blue line), permeabilized with 0.5% Triton. Primary incubation 1hr (10ug/ml) followed by Alexa Fluor 488 secondary antibody (1ug/ml). IgG control: Unimmunized goat IgG (black line)

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Somatic mutation of pro-cell death Bif-1 gene is rare in common human cancers. Kim MS, et al. APMIS, 2008 Oct. PMID 19132989.
Bif-1 and Bax expression in cutaneous Merkel cell carcinoma. Schlauder SM, et al. J Cutan Pathol, 2009 Jan. PMID 19125733.
Endophilin B1/Bif-1 stimulates BAX activation independently from its capacity to produce large scale membrane morphological rearrangements. Etxebarria A, et al. J Biol Chem, 2009 Feb 13. PMID 19074440.