

# Goat Anti-FBP17 / FNBP1 Antibody

Peptide-affinity purified goat antibody Catalog # AF1404a

## Specification

# **Goat Anti-FBP17 / FNBP1 Antibody - Product Information**

Application Primary Accession Other Accession Reactivity Predicted Host Clonality Concentration Isotype Calculated MW WB, E <u>O96RU3</u> <u>NP\_055848</u>, 23048 Human Mouse, Rat, Pig, Dog Goat Polyclonal 100ug/200ul IgG 71307

# Goat Anti-FBP17 / FNBP1 Antibody - Additional Information

Gene ID 23048

**Other Names** Formin-binding protein 1, Formin-binding protein 17, hFBP17, FNBP1, FBP17, KIAA0554

Dilution WB~~1:1000 E~~N/A

Format

0.5 mg lgG/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-FBP17 / FNBP1 Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

# Goat Anti-FBP17 / FNBP1 Antibody - Protein Information

Name FNBP1

Synonyms FBP17, KIAA0554

Function



May act as a link between RND2 signaling and regulation of the actin cytoskeleton (By similarity). Required to coordinate membrane tubulation with reorganization of the actin cytoskeleton during the late stage of clathrin-mediated endocytosis. Binds to lipids such as phosphatidylinositol 4,5-bisphosphate and phosphatidylserine and promotes membrane invagination and the formation of tubules. Also enhances actin polymerization via the recruitment of WASL/N-WASP, which in turn activates the Arp2/3 complex. Actin polymerization may promote the fission of membrane tubules to form endocytic vesicles. May be required for the lysosomal retention of FASLG/FASL.

#### **Cellular Location**

Cytoplasm. Cytoplasm, cytoskeleton. Cytoplasm, cell cortex. Lysosome. Cytoplasmic vesicle. Cell membrane; Peripheral membrane protein; Cytoplasmic side. Membrane, clathrin-coated pit Note=Enriched in cortical regions coincident with F-actin. Also localizes to endocytic vesicles and lysosomes

#### **Tissue Location**

Very highly expressed in the epithelial cells of the gastrointestinal tract, respiratory, reproductive and urinary systems. Also highly expressed in brown adipose tissue, cardiomyocytes, enteric ganglia and glucagon producing cells of the pancreas. Expressed in germ cells of the testis and all regions of the brain

# Goat Anti-FBP17 / FNBP1 Antibody - Protocols

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

- <u>Western Blot</u>
- Blocking Peptides
- <u>Dot Blot</u>
- <u>Immunohistochemistry</u>
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

## Goat Anti-FBP17 / FNBP1 Antibody - Images



AF1404a staining (0.25  $\mu$ g/ml) of human testis lysate (RIPA buffer, 35  $\mu$ g total protein per lane). Primary incubated for 1 hour. Detected by western blot using chemiluminescence.

## Goat Anti-FBP17 / FNBP1 Antibody - Background

The protein encoded by this gene is a member of the formin-binding-protein family. The protein contains an N-terminal Fer/Cdc42-interacting protein 4 (CIP4) homology (FCH) domain followed by a coiled-coil domain, a proline-rich motif, a second coiled-coil domain, a Rho family protein-binding



domain (RBD), and a C-terminal SH3 domain. This protein binds sorting nexin 2 (SNX2), tankyrase (TNKS), and dynamin; an interaction between this protein and formin has not been demonstrated yet in human.

## Goat Anti-FBP17 / FNBP1 Antibody - References

Personalized smoking cessation: interactions between nicotine dose, dependence and quit-success genotype score. Rose JE, et al. Mol Med, 2010 Jul-Aug. PMID 20379614.

FBP17 Mediates a Common Molecular Step in the Formation of Podosomes and Phagocytic Cups in Macrophages. Tsuboi S, et al. J Biol Chem, 2009 Mar 27. PMID 19155218.

Identification of interaction partners for individual SH3 domains of Fas ligand associated members of the PCH protein family in T lymphocytes. Linkermann A, et al. Biochim Biophys Acta, 2009 Feb. PMID 19041431.

EFC/F-BAR proteins and the N-WASP-WIP complex induce membrane curvature-dependent actin polymerization. Takano K, et al. EMBO J, 2008 Nov 5. PMID 18923421.

Curved EFC/F-BAR-domain dimers are joined end to end into a filament for membrane invagination in endocytosis. Shimada A, et al. Cell, 2007 May 18. PMID 17512409.