

# **FMN2 Polyclonal Antibody**

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP58745

# **Specification**

# **FMN2 Polyclonal Antibody - Product Information**

Application IHC-P, IHC-F, IF, E
Primary Accession
Reactivity Rat, Dog, Bovine
Host Rabbit
Clonality Polyclonal
Calculated MW 180106

# FMN2 Polyclonal Antibody - Additional Information

**Gene ID** 56776

## **Other Names**

Formin-2, FMN2

## **Dilution**

<span class ="dilution\_IHC-P">IHC-P~~N/A</span><br \> <span class
="dilution\_IHC-F">IHC-F~~N/A</span><br \> <span class
="dilution\_IF">IF~~1:50~200</span><br \> <span class = "dilution\_E">E~~N/A</span>

#### Format

0.01M TBS(pH7.4), 0.09% (W/V) sodium azide and 50% Glyce

# Storage

Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.

## **FMN2 Polyclonal Antibody - Protein Information**

#### Name FMN2

# **Function**

Actin-binding protein that is involved in actin cytoskeleton assembly and reorganization (PubMed:<a href="http://www.uniprot.org/citations/21730168" target="\_blank">21730168</a>, PubMed:<a href="http://www.uniprot.org/citations/22330775" target="\_blank">22330775</a>). Acts as an actin nucleation factor and promotes assembly of actin filaments together with SPIRE1 and SPIRE2 (PubMed:<a href="http://www.uniprot.org/citations/21730168" target="\_blank">21730168</a>, PubMed:<a href="http://www.uniprot.org/citations/22330775" target="\_blank">22330775</a>). Involved in intracellular vesicle transport along actin fibers, providing a novel link between actin cytoskeleton dynamics and intracellular transport (By similarity). Required for asymmetric spindle positioning, asymmetric oocyte division and polar body extrusion during female germ cell meiosis (By similarity). Plays a role in responses to DNA damage, cellular stress and hypoxia by protecting CDKN1A against degradation, and thereby plays





a role in stress-induced cell cycle arrest (PubMed:<a

href="http://www.uniprot.org/citations/23375502" target="\_blank">23375502</a>). Also acts in the nucleus: together with SPIRE1 and SPIRE2, promotes assembly of nuclear actin filaments in response to DNA damage in order to facilitate movement of chromatin and repair factors after DNA damage (PubMed:<a href="http://www.uniprot.org/citations/26287480" target="\_blank">26287480</a>). Protects cells against apoptosis by protecting CDKN1A against degradation (PubMed:<a href="http://www.uniprot.org/citations/23375502" target=" blank">23375502</a>).

## **Cellular Location**

Cytoplasm, cytoskeleton. Cytoplasm, cytosol. Cytoplasm, perinuclear region {ECO:0000250|UniProtKB:Q9JL04}. Nucleus Nucleus, nucleolus. Cell membrane {ECO:0000250|UniProtKB:Q9JL04}; Peripheral membrane protein {ECO:0000250|UniProtKB:Q9JL04}; Cytoplasmic side {ECO:0000250|UniProtKB:Q9JL04}. Cytoplasmic vesicle membrane {ECO:0000250|UniProtKB:Q9JL04}; Peripheral membrane protein {ECO:0000250|UniProtKB:Q9JL04}; Cytoplasmic side {ECO:0000250|UniProtKB:Q9JL04}. Cytoplasm, cell cortex {ECO:0000250|UniProtKB:Q9JL04}. Note=Colocalizes with the actin cytoskeleton (PubMed:20082305). Recruited to the membranes via its interaction with SPIRE1 (By similarity). Detected at the cleavage furrow during asymmetric oocyte division and polar body extrusion (By similarity). Accumulates in the nucleus following DNA damage (PubMed:26287480). {ECO:0000250|UniProtKB:Q9JL04, ECO:0000269|PubMed:20082305, ECO:0000269|PubMed:26287480}

#### **Tissue Location**

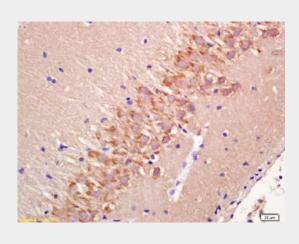
Expressed almost exclusively in the developing and mature central nervous system.

# FMN2 Polyclonal 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

# **FMN2 Polyclonal Antibody - Images**







Tel: 858.875.1900 Fax: 858.875.1999

Tissue/cell: rat brain tissue; 4% Paraformaldehyde-fixed and paraffin-embedded; Antigen retrieval: citrate buffer ( 0.01M, pH 6.0 ), Boiling bathing for 15min; Block endogenous peroxidase by 3% Hydrogen peroxide for 30min; Blocking buffer (normal goat serum, C-0005) at 37°C for 20 min;

Incubation: Anti-FMN2 Polyclonal Antibody, Unconjugated(bs-7748R) 1:200, overnight at 4°C, followed by conjugation to the secondary antibody(SP-0023) and DAB(C-0010) staining