Mouse Monoclonal Antibody to

VASP (phospho-Ser 239)

clone 22E11

Order No.: **0153-100/VASP-22E11**

Size (µg) 100

Lot No.: 0153S

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Isotype	Species Reactivity	Applications	Mol. Weight	Ref.Cell Line	Epitope	Immunogen
IgG1	human, mouse	WB, ELISA flow cytometry	46/50 kDa	HepG2	phosphoserine 239 R K V pS K Q E	phosphopeptide conjugated to hemocyanin

Background and Specificity:

VASP (vasodilator stimulated phosphoprotein) plays an important role in ANF / NO / cGMP Protein kinase and cAMP / cAMP Protein kinase signalling pathways. VASP is expressed in almost all human and animal cell lines; particularly high concentrations are found in thrombocytes, vascular smooth muscle cells and fibroblasts. In cultured cells VASP is associated with focal contacts, cell-cell-contacts, microfilaments and dynamic membrane regions such as the leading edge. *In vitro* binding data show that VASP binds to profilin, zyxin, vinculin, and the *Listeria spp.* surface protein ActA. Functional evidence indicates that VASP is a crucial factor involved in the enhancement of actin filament formation.

Mab VASP-22E11 recognizes VASP only, when Ser 239 is phosphorylated, a site preferred by cGMP-dependent protein kinase (PKG) but also used by cAMP-dependent protein kinase (PKA). The antibody does not crossreact with the non-phosphorylated form of VASP nor with unrelated serine-phosphorylated proteins. Therefore, antibody VASP-22E11 is able to monitor the phosphorylation state of VASP serine 239 as well as PKA activity.

Purification: The antibody was purified from serum-free cell culture supernatant by subsequent thiophilic adsorption and size exclusion chromatography.

Formulation: lyophilized from 1 ml 2 x PBS / 0.09 % Na-azide / PEG and Sucrose.

Reconstitution: Reconstitute with 1 ml H_2O (15 min, RT).

Stability: For long-term storage, freeze lyophilizate upon arrival (-20°C). Upon reconstitution, aliquote and freeze in liquid nitrogen; reconstituted antibody can be stored frozen at -80°C up to 1 year. Thaw aliquots at 37°C. Thawed aliquots may be stored at 4°C up to 3 months.

Avoid repeated freeze / thaw cycles.

Positive Control: #0814: Cell lysate from Forskolin-treated HepG2 cells

Immunoblotting: 0.5 µg/ml for HRPO/ECL detection
Recommended blocking buffer: Casein/Tween 20 based blocking and blot incubation buffer, e.g. nanoTools product #3031-500/CPPT or #3031-3000/CPPT.

Immunoprecipitation: ND

Immunocytochemistry: ND

ELISA: use at 0.05 µg/ml

All products are supplied for research and investigational use only. Not for use in humans or laboratory animals.

Related Products

Blocking peptide for mab VASP-22E11
#2002-100/VASP pSer239

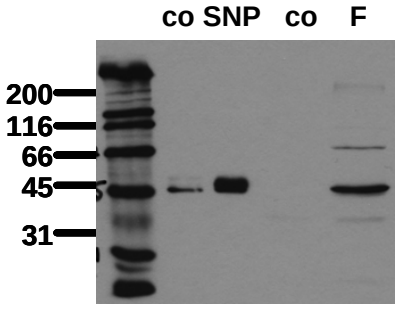
mab to VASP (phospho-Ser 239)
#0047-100/VASP-16C2

mab to VASP (phospho-Ser 157)
#0085-100/VASP-5C6

IMPORTANT!

THE USE OF ANTIBODIES SPECIFIC FOR PHOSPHORYLATED VASP FOR DIAGNOSTIC OR THERAPEUTIC PURPOSES IS PATENTED!

THE ANTIBODY IS SUPPLIED FOR RESEARCH USE ONLY!



Phosphospecificity
Whole cell extracts of control (co) or sodium nitroprusside (SNP) treated human platelets and extracts from control (co) or Forskolin (F) treated HepG2 cells cells were applied to SDS-PAGE and transferred to PVDF membranes. Immunoblots were probed with mab 22E11 (0.5 µg/ ml) for 1h at RT and developed by ECL (exp. time: 30 sec).