

p-FADD (Ser 191): sc-33399

BACKGROUND

In contrast to growth factors which promote cell proliferation, FAS ligand (FAS-L) and tumor necrosis factor (TNF) rapidly induce apoptosis. Cellular response to FAS-L and TNF is mediated by structurally related receptors containing a conserved "death domain" and belonging to the TNF receptor superfamily. TRADD, FADD and RIP are FAS/TNF-RI interacting proteins that contain a death domain homologous region (DDH). TRADD (TNF-RI-associated death domain) and FADD (FAS-associated death domain) are proteins that associate with the death domains of both FAS and TNF-RI via their DDH regions. Overexpression of TRADD leads to NF κ B activation and apoptosis in the absence of TNF. Overexpression of FADD causes apoptosis, which can be blocked by the cow pox protein CrmA, suggesting that FADD lies upstream of ICE and possibly other serine proteases. The receptor interacting protein, RIP, associates with FAS exclusively via its DDH, and this association is abrogated in LPR mutants. Unlike TRADD and FADD, RIP contains a putative amino-terminal kinase domain.

REFERENCES

1. Smith, C.A., et al. 1994. The TNF receptor superfamily of cellular and viral proteins: activation, costimulation and death. *Cell* 76: 959-962.
2. Nagata, S., et al. 1995. The FAS death factor. *Science* 267: 1449-1456.
3. Sato, T., et al. 1995. FAP-1: a protein tyrosine phosphatase that associates with FAS. *Science* 268: 411-414.
4. Cleveland, J.L., et al. 1995. Contenders in FASL/TNF death signaling. *Cell* 81: 479-482.
5. Hsu, H., et al. 1995. The TNF receptor 1-associated protein TRADD signals cell death and NF κ B activation. *Cell* 81: 495-504.
6. Chinnaiyan, A.M., et al. 1995. FADD, a novel death domain-containing protein, interacts with the death domain of FAS and initiates apoptosis. *Cell* 81: 505-512.

CHROMOSOMAL LOCATION

Genetic locus: FADD (human) mapping to 11q13.3; Fadd (mouse) mapping to 7 F5.

SOURCE

p-FADD (Ser 191) is a rabbit polyclonal antibody raised against a short amino acid sequence containing phosphorylated Ser 191 of FADD of mouse origin.

PRODUCT

Each vial contains 200 μ g IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-33399 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

STORAGE

Store at 4° C, ****DO NOT FREEZE****. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

APPLICATIONS

p-FADD (Ser 191) is recommended for detection of Ser 191 phosphorylated FADD of mouse and, to a lesser extent, human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 μ g per 100-500 μ g of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500), immunohistochemistry (including paraffin-embedded sections) (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

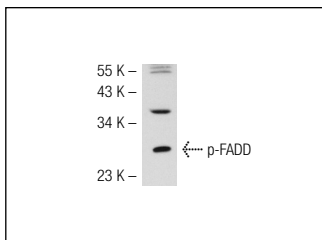
Suitable for use as control antibody for FADD siRNA (h): sc-35352, FADD siRNA (m): sc-35351, FADD shRNA Plasmid (h): sc-35352-SH, FADD shRNA Plasmid (m): sc-35351-SH, FADD shRNA (h) Lentiviral Particles: sc-35352-V and FADD shRNA (m) Lentiviral Particles: sc-35351-V.

Molecular Weight of p-FADD: 30 kDa.

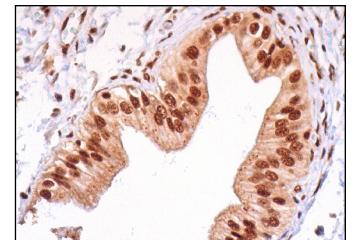
RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western blotting: use goat anti-rabbit IgG-HRP: sc-2004 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible goat anti-rabbit IgG-HRP: sc-2030 (dilution range: 1:2000-1:5000), Cruz Marker™ Molecular Weight Standards: sc-2035, TBS Blotto B Blocking Reagent: sc-2335 (use 50 mM NaF, sc-24988, as diluent), Western Blotting Luminol Reagent: sc-2048 and Lambda Phosphatase: sc-200312A. 2) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) or goat anti-rabbit IgG-TR: sc-2780 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941. 4) Immunohistochemistry: use ImmunoCruz™: sc-2051 or ABC: sc-2018 rabbit IgG Staining Systems.

DATA



p-FADD (Ser 191): sc-33399. Western blot analysis of FADD phosphorylation in SW480 whole cell lysate.



p-FADD (Ser 191): sc-33399. Immunoperoxidase staining of formalin fixed, paraffin-embedded human gall bladder tissue showing nuclear staining of glandular cells.

RESEARCH USE

For research use only, not for use in diagnostic procedures.

PROTOCOLS

See our web site at www.scbt.com or our catalog for detailed protocols and support products.