Caspase-2 Rabbit mAb

Catalog No: #48649

Package Size: #48649-1 50ul #48649-2 100ul



Orders: order@signalwayantibody.com Support: tech@signalwayantibody.com

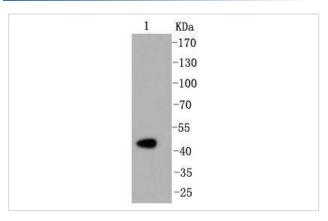
Description

Caspase 2 antibody
2 antibody Caspase2
dy ICH1 protease antibody
ssed developmentally
Protein phosphatase 1

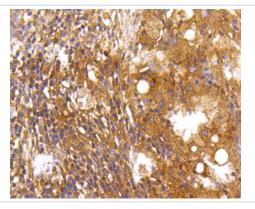
Application Details

WB: 1:1,000-1:2,000 IHC: 1:50-1:200 ICC: 1:50-1:200FC: 1:50-1:100

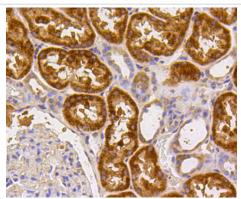
Images



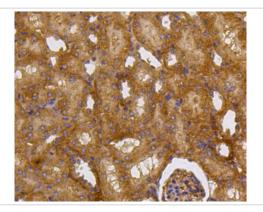
Western blot analysis of Caspase-2 on 293 cell lysate using anti-Caspase-2 antibody at 1/1,000 dilution.



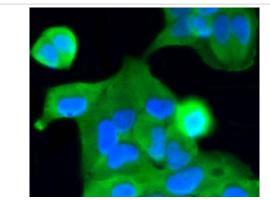
Immunohistochemical analysis of paraffin-embedded human lung cancer tissue using anti-Caspase-2 antibody. Counter stained with hematoxylin.



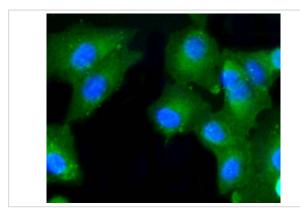
Immunohistochemical analysis of paraffin-embedded human kidney tissue using anti-Caspase-2 antibody. Counter stained with hematoxylin.



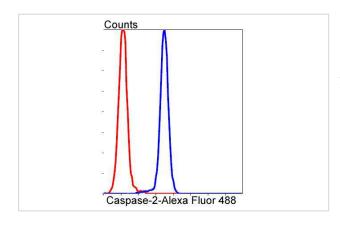
Immunohistochemical analysis of paraffin-embedded mouse kidney tissue using anti-Caspase-2 antibody. Counter stained with hematoxylin.



ICC staining Caspase-2 in Hela cells (green). The nuclear counter stain is DAPI (blue). Cells were fixed in paraformaldehyde, permeabilised with 0.25% Triton X100/PBS.



ICC staining Caspase-2 in A549 cells (green). The nuclear counter stain is DAPI (blue). Cells were fixed in paraformaldehyde, permeabilised with 0.25% Triton X100/PBS.



Flow cytometric analysis of Jurkat cells with Caspase-2 antibody at 1/50 dilution (blue) compared with an unlabelled control (cells without incubation with primary antibody; red). Alexa Fluor 488-conjugated goat anti rabbit IgG was used as the secondary antibody.

Background

Caspase-2 (Nedd2, ICH-1) is an aspartate-specific cysteine protease that is activated in response to various apoptotic stimuli. Caspase-2 is unique among the caspases in that it has features of both upstream caspases (long prodomain) and downstream caspases (DEXD substrate specificity). Caspase-2 is highly expressed in the brain during development, and is expressed at low levels in adult tissue. Specifically, caspase-2 localizes to the mitochondria, the Golgi, the cytoplasm, and the nucleus. Caspase-2 exists as two isoforms, caspase-2L and caspase-2S, which are produced by alternative splicing and differ in their N and C-termini. Caspase-2L acts as a positive regulator of apoptosis, whereas caspase-2S functions as a negative regulator of apoptosis. Following apoptotic stimuli, the caspase-2L precursor undergoes cleavage at Asp-153 to produce a fragment (p30). The p30 fragment undergoes further cleavage to generate a fragment containing amino acids 153-308 (p18) and a fragment containing amino acids 317-435 (p13 or p14). As apoptosis progresses, the p13 (p14) fragment can undergo further processing to yield a fragment containing amino acids 331-435 (p12).

References

Note: This product is for in vitro research use only and is not intended for use in humans or animals.