## PRODUCT DATA SHEET



# **Bioworld Technology CO., Ltd.**

# Caspase-2 p18 (G170) Peptide

Cat No.: BS7019P

## **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).

#### **Swiss-Prot**

P42575

# **Applications**

**Blocking** 

#### **Specificity**

This peptide can be used with studies using BS7019 Caspase-2 p18 (G170) pAb.

# **Purification & Purity**

Synthetic peptide Caspase-2 p18 (G170). (Note: the amino acid sequence is proprietary). The purity is > 98%.

#### **Product**

1 mg/ml in DI water.

#### **Storage & Stability**

Store at  $4\,\mathrm{C}$  short term. Aliquot and store at  $-20\,\mathrm{C}$  long term. Avoid freeze-thaw cycles.

#### **Research Use**

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