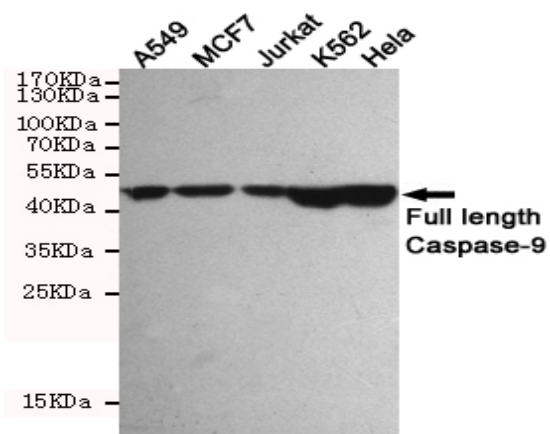


Caspase-9 mouse mAb

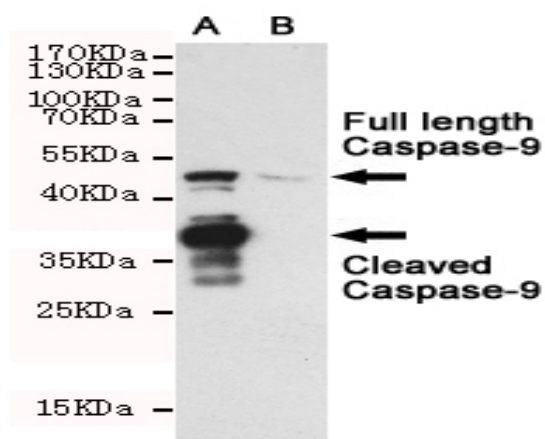
Catalog No :	YM1397
Reactivity :	Human;Transfected
Applications :	WB
Target :	Caspase-9
Fields :	>>Platinum drug resistance;>>p53 signaling pathway;>>PI3K-Akt signaling pathway;>>Apoptosis;>>Apoptosis - multiple species;>>VEGF signaling pathway;>>Thyroid hormone signaling pathway;>>Alzheimer disease;>>Parkinson disease;>>Amyotrophic lateral sclerosis;>>Huntington disease;>>Prion disease;>>Pathways of neurodegeneration - multiple diseases;>>Pathogenic Escherichia coli infection;>>Legionellosis;>>Toxoplasmosis;>>Tuberculosis;>>Hepatitis C;>>Hepatitis B;>>Measles;>>Human cytomegalovirus infection;>>Influenza A;>>Kaposi sarcoma-associated herpesvirus infection;>>Herpes simplex virus 1 infection;>>Epstein-Barr virus infection;>>Human immunodeficiency virus 1 infection;>>Pathways in cancer;>>Colorectal cancer;>>Pancreatic cancer;>>Endometrial cancer;>>Prostate cancer;>>Small cell lung cancer;>>Non-small cell lung cancer;>>Viral myocarditis;>>Lipid and atherosclerosis
Gene Name :	cas9
Protein Name :	Caspase9
Human Gene Id :	842
Human Swiss Prot No :	P55211
Immunogen :	Purified recombinant human Caspase-9 protein fragments expressed in E.coli.
Specificity :	This antibody detects endogenous levels of Caspase-9 and does not cross-react with related proteins.
Formulation :	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Source :	Monoclonal, Mouse

Dilution :	<u>wb dilution 1:1000</u>
Purification :	<u>The antibody was affinity-purified from mouse ascites by affinity-chromatography using epitope-specific immunogen.</u>
Concentration :	<u>1 mg/ml</u>
Storage Stability :	<u>-15 °C to -25 °C/1 year(Do not lower than -25 °C)</u>
Observed Band :	<u>35 46kD</u>
Cell Pathway :	<u>p53;Apoptosis_Inhibition;Apoptosis_Mitochondrial;Apoptosis_Overview;VEGF; Alzheimer's disease;Parkinson's disease;Amyotrophic lateral sclerosis (ALS);Huntington's disease;Pathways in cancer;Colorectal</u>
Background :	<u>CASP9 encodes a member of the cysteine-aspartic acid protease (caspase) family. Sequential activation of caspases plays a central role in the execution-phase of cell apoptosis. Caspases exist as inactive proenzymes which undergo proteolytic processing at conserved aspartic residues to produce two subunits, large and small, that dimerize to form the active enzyme. Caspase 9 can undergo autoproteolytic processing and activation by the apoptosome, a protein complex of cytochrome c and the apoptotic peptidase activating factor 1; this step is thought to be one of the earliest in the caspase activation cascade. Caspase 9 is thought to play a central role in apoptosis and to be a tumor suppressor. Alternative splicing results in multiple transcript variants.</u>
Function :	<u>catalytic activity:Strict requirement for an Asp residue at position P1 and with a marked preference for His at position P2. It has a preferred cleavage sequence of Leu-Gly-His-Asp- -Xaa.,function:Involved in the activation cascade of caspases responsible for apoptosis execution. Binding of caspase-9 to Apaf-1 leads to activation of the protease which then cleaves and activates caspase-3. Proteolytically cleaves poly(ADP-ribose) polymerase (PARP).,function:Isoform 2 lacks activity is an dominant-negative inhibitor of caspase-9.,online information:Caspase-9 entry,PTM:Cleavages at Asp-315 by granzyme B and at Asp-330 by caspase-3 generate the two active subunits. Caspase-8 and -10 can also be involved in these processing events.,similarity:Belongs to the peptidase C14A family.,similarity:Contains 1 CARD domain.,subunit:Heterotetramer that consists of two anti-parallel arranged heterodimers</u>
Subcellular Location :	<u>nucleus,mitochondrion,cytosol,apoptosome,</u>
Expression :	<u>Ubiquitous, with highest expression in the heart, moderate expression in liver, skeletal muscle, and pancreas. Low levels in all other tissues. Within the heart, specifically expressed in myocytes.</u>

Products Images



Western blot detection of Caspase-9 in A549, MCF7, Jurkat, K562 and HeLa cell lysates using Caspase-9 mouse mAb (1:1000 diluted). Predicted band size: 49/37KDa. Observed band size: 49KDa.



Western blot detection of Caspase-9 in CHO-K1 cell lysate (B) and CHO-K1 transfected by Caspase-9 (A) cell lysate using Caspase-9 mouse mAb (1:1000 diluted). Predicted band size: 49/37KDa. Observed band size: 49/37KDa.