

DDB1 mouse mAb

Catalog No :	YM1367
Reactivity :	Human;Mouse;Rat;Monkey
Applications :	WB
Target :	DDB1
Fields :	>>Nucleotide excision repair;>>Ubiquitin mediated proteolysis;>>Hepatitis B;>>Human immunodeficiency virus 1 infection;>>Viral carcinogenesis
Gene Name :	ddb1
Human Gene Id :	1642
Human Swiss Prot No :	Q16531
Mouse Swiss Prot No :	Q3U1J4
Immunogen :	Purified recombinant human DDB1 protein fragments expressed in E.coli.
Specificity :	This antibody detects endogenous levels of DDB1 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 :	wb 1:1000
Purification :	The antibody was affinity-purified from mouse ascites by affinity-chromatography using epitope-specific immunogen.
Concentration :	1 mg/ml
Storage Stability :	-15°C to -25°C/1 year(Do not lower than -25°C)
Observed Band :	127kD

Cell Pathway : Nucleotide excision repair;Ubiquitin mediated proteolysis;

Background : The protein encoded by this gene is the large subunit (p127) of the heterodimeric DNA damage-binding (DDB) complex while another protein (p48) forms the small subunit. This protein complex functions in nucleotide-excision repair and binds to DNA following UV damage. Defective activity of this complex causes the repair defect in patients with xeroderma pigmentosum complementation group E (XPE) - an autosomal recessive disorder characterized by photosensitivity and early onset of carcinomas. However, it remains for mutation analysis to demonstrate whether the defect in XPE patients is in this gene or the gene encoding the small subunit. In addition, Best vitelliform macular dystrophy is mapped to the same region as this gene on 11q, but no sequence alternations of this gene are demonstrated in Best disease patients. The protein encoded by this gene also functions as an adaptor molecule

Function : function:Required for DNA repair. Binds to DDB2 to form the UV-damaged DNA-binding protein complex (the UV-DDB complex). The UV-DDB complex may recognize UV-induced DNA damage and recruit proteins of the nucleotide excision repair pathway (the NER pathway) to initiate DNA repair. The UV-DDB complex preferentially binds to cyclobutane pyrimidine dimers (CPD), 6-4 photoproducts (6-4 PP), apurinic sites and short mismatches. Also appears to function as a component of numerous distinct DCX (DDB1-CUL4-X-box) E3 ubiquitin-protein ligase complexes which mediate the ubiquitination and subsequent proteasomal degradation of target proteins. The functional specificity of the DCX E3 ubiquitin-protein ligase complex is determined by the variable substrate recognition component recruited by DDB1. DCX(DDB2) (also known as DDB1-CUL4-ROC1, CUL4-DDB-ROC1 and CUL4-DDB-RBX1) may ubiquitinate histone H2A, hi

Subcellular Location : Cytoplasm . Nucleus . Primarily cytoplasmic (PubMed:10777491, PubMed:11673459). Translocates to the nucleus following UV irradiation and subsequently accumulates at sites of DNA damage (PubMed:10777491, PubMed:11673459) . .

Expression : Brain,Epidermis,Fetal lung,Peripheral blood,Placenta,Skin,

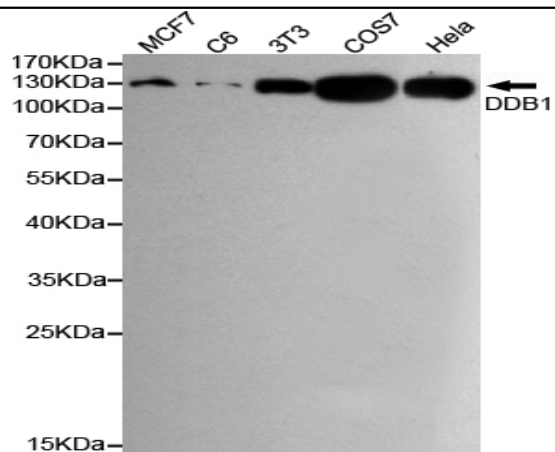
Sort : 5046

No4 : 1

Host : Mouse

Modifications : Unmodified

Products Images



Western blot detection of DDB1 in HeLa, MCF7, COS7, C6 and 3T3 cell lysates using DDB1 mouse mAb (1:1000 diluted), with Super ECL. Predicted band size: 127 kDa. Observed band size: 127 kDa.