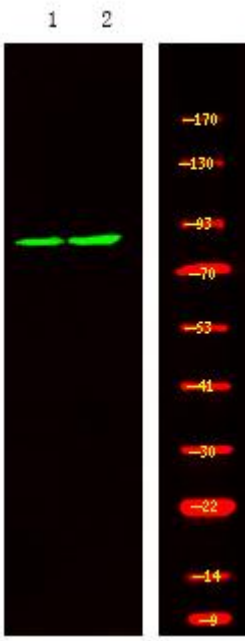
PDE4D (Phospho-Ser578) mouse mAb

Catalog No	BYmab-10558
Isotype	IgG
Reactivity	Human; Mouse;Rat
Applications	WB
Gene Name	PDE4D DPDE3
Protein Name	PDE4D (Phospho-Ser578)
Immunogen	Synthesized peptide derived from human PDE4D (Phospho-Ser578)
Specificity	This antibody detects endogenous levels of PDE4D (Phospho-Ser578) at Human, Mouse,Rat
Formulation	Liquid in PBS containing 50% glycerol, and 0.214% sodium azide.
Source	Monoclonal, Mouse,IgG
Purification	The antibody was affinity-purified from mouse antiserum by affinity-chromatography using epitope-specific immunogen.
Dilution	WB 1:500-2000
Concentration	1 mg/ml
Purity	≥90%
Storage Stability	-20°C/1 year
Synonyms	cAMP-specific 3',5'-cyclic phosphodiesterase 4D (EC 3.1.4.17) (DPDE3) (PDE43)
Observed Band	76kD
Cell Pathway	Apical cell membrane . Cytoplasm . Membrane . Cytoplasm, cytoskeleton . Cytoplasm, cytoskeleton, microtubule organizing center, centrosome . Found in the soluble fraction, associated with membranes, and associated with the cytoskeleton and the centrosome (By similarity). Colocalized with SHANK2 to the apical membrane of colonic crypt cells. .
Tissue Specificity	Expressed in colonic epithelial cells (at protein level). Widespread; most abundant in skeletal muscle. ; [Isoform 6]: Detected in brain. ; [Isoform 8]: Detected in brain, placenta, lung and kidney. ; [Isoform 7]: Detected in heart and skeletal muscle.
Function	catalytic activity:Adenosine 3',5'-cyclic phosphate + H(2)O = adenosine 5'-phosphate.,cofactor:Binds 2 divalent metal cations per subunit. Site 1 may preferentially bind zinc ions, while site 2 has a preference for magnesium and/or manganese ions.,disease:Genetic variations in PDE4D might be associated with susceptibility to stroke type 1 (STRK1) [MIM:606799]. A stroke is an acute neurologic event leading to death of neural tissue of the brain and resulting in loss of motor, sensory and/or cognitive function. PubMed:17006457 states that

	association with stroke has to be considered with caution.,enzyme regulation:Inhibited by rolipram. Activated by phosphatidic acid.,function:Regulates the levels of cAMP in the cell.,pathway:Purine metabolism; cAMP degradation; AMP from cAMP: step 1/1.,PTM:Isoform 2 and isoform 11 are activated by phosphorylation (in vitro), but not isoform 8. Isoform 7 a
Background	This gene encodes one of four mammalian counterparts to the fruit fly 'dunce' gene. The encoded protein has 3',5'-cyclic-AMP phosphodiesterase activity and degrades cAMP, which acts as a signal transduction molecule in multiple cell types. This gene uses different promoters to generate multiple alternatively spliced transcript variants that encode functional proteins.[provided by RefSeq, Sep 2009],
matters needing attention	Avoid repeated freezing and thawing!
Usage suggestions	This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.

Products Images



Western Blot analysis of various cells using PDE4D (Phospho-Ser578) mouse mAb