### For Research Use Only

# HDAC2 Monoclonal antibody

Catalog Number:67165-1-lg Featured Product

3 Publications



**Basic Information** 

Catalog Number: GenBank Accession Number:

67165-1-lg BC031055 GeneID (NCBI): Size: 150ul, Concentration: 2300 ug/ml by 3066

Nanodrop and 1000 ug/ml by  $Bradford_{\mbox{UNIPROT ID}}$ : method using BSA as the standard; Q92769

Source: Full Name: Mouse histone deacetylase 2

Isotype: Calculated MW:

lgG2b 458 aa, 52 kDa; 488 aa,55 kDa

Immunogen Catalog Number: Observed MW: AG21288 55 kDa

**Purification Method:** 

Protein A purification CloneNo.:

1A3E4 Recommended Dilutions: WB 1:5000-1:50000

IHC 1:500-1:2000 IF/ICC 1:400-1:1600

**Applications** 

**Tested Applications:** 

WB, IHC, IF/ICC, FC (Intra), ELISA

Cited Applications: WB, IP, IF, CoIP Species Specificity: Human, mouse, rat Cited Species:

human, rat

Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (\*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0

Positive Controls:

WB: U2OS cells, 4T1 cells, MCF-7 cells, HeLa cells, HEK-293 cells, Jurkat cells, K-562 cells, HSC-T6 cells,

NIH/3T3 cells

IHC: human breast cancer tissue,

IF/ICC: HepG2 cells,

## Background Information

Histone deacetylases(HDAC) are a class of enzymes that remove the acetyl groups from the lysine residues leading to the formation of a condensed and transcriptionally silenced chromatin. Histone deacetylases act via the formation of large multiprotein complexes, and are responsible for the deacetylation of lysine residues at the N-terminal regions of core histones (H2A, H2B, H3 and H4). At least 4 classes of HDAC were identified. As a class I HDAC, HDAC2 was primarily found in the nucleus. HDAC2 forms transcriptional repressor complexes by associating with many different proteins, including YY1, a mammalian zinc-finger transcription factor. Thus, it plays an important role in transcriptional regulation, cell cycle progression and developmental events. This antibody is raised against residues near the C terminus of human HDAC2.

#### **Notable Publications**

Author	Pubmed ID	Journal	Application
Tianrong Xun	35753429	Toxicol Appl Pharmacol	WB,IF,IP
Zhilei Zhang	37867947	iScience	WB,CoIP
Xintian Lan	37764423	Molecules	WB

Storage

Storage:

Store at -20°C. Stable for one year after shipment.

Storage Buffer:

PBS with 0.02% sodium azide and 50% glycerol pH 7.3.

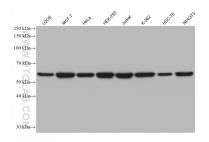
Aliquoting is unnecessary for -20°C storage

\*\*\* 20ul sizes contain 0.1% BSA

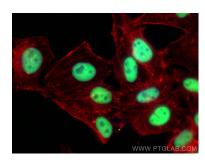
in USA), or 1(312) 455-8498 (outside USA)

This product is exclusively available under Proteintech Group brand and is not available to purchase from any other manufacturer.

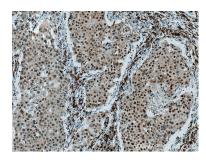
### **Selected Validation Data**



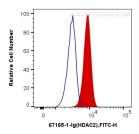
Various lysates were subjected to SDS PAGE followed by western blot with 67165-1-1g (HDAC2 antibody) at dilution of 1:20000 incubated at room temperature for 1.5 hours.



Immunofluorescent analysis of (4% PFA) fixed HepG2 cells using HDAC2 antibody (67165-1-Ig, Clone: 1A3E4) at dilution of 1:800 and CoraLite® 488-Conjugated Goat Anti-Mouse IgG(H+L), CL594-Phalloidin (red).



Immunohistochemical analysis of paraffinembedded human breast cancer tissue slide using 67165-1-lg (HDAC2 antibody) at dilution of 1:1000 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



1X10^6 HepG2 cells were intracellularly stained with 0.4 ug Anti-Human HDAC2 (67165-1-1g, Clone:1A3E4) and CoraLite® 488-Conjugated Goat Anti-Mouse IgG(H+L) at dilution 1:1000 (red), or 0.4 ug Control Antibody. Cells were fixed and permeabilized with Transcription Factor Staining Buffer Kit (PF00011).