## For Research Use Only

## LACTB Monoclonal antibody

Catalog Number:66785-1-lg Featured Product

4 Publications



**Basic Information** 

Catalog Number: GenBank Accession Number:

66785-1-lg BC067288 GeneID (NCBI): Size: 150ul, Concentration: 1600 ug/ml by 114294

Nanodrop and 1000 ug/ml by Bradford<sub>UNIPROT ID:</sub> method using BSA as the standard; P83111

Source: Full Name: Mouse lactamase, beta Isotype: Calculated MW: lgG1 547 aa, 61 kDa Immunogen Catalog Number: Observed MW:

AG12233 50-60 kDa **Purification Method:** 

Protein G purification

CloneNo.: 3C3C3

Recommended Dilutions:

WB 1:1000-1:6000 IHC 1:150-1:600 IF/ICC 1:800-1:3200

**Applications** 

**Tested Applications:** 

WB, IHC, IF/ICC, ELISA Cited Applications

WB, IHC, IF, IP Species Specificity:

human **Cited Species:** human, mouse

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: HeLa cells, HEK-293 cells, HepG2 cells, Jurkat

IHC: human liver cancer tissue,

IF/ICC: A549 cells,

**Background Information** 

LACTB is also named as MRPL56, whic is a component of the large subunit of the mitochondrial ribosome that is encoded by the nuclear genome.LACTB is a mammalian active-site serine protein that has evolved from a bacterial penicillin-binding protein. It promotes intramitochondrial membrane organization and micro-compartmentalization  $through polymerization (PMID: 19858488). \ Northern blot analysis of mouse tissues detected expression at high levels$ in liver, heart, and skeletal muscle, with lower levels in kidney, testis, brain, lung, and spleen (PMID:11707067). The full-length of LACTB is about 61kDa, and a 115aa transit peptide can be removed in the mature form.

## **Notable Publications**

Author	Pubmed ID	Journal	Application
Chunxiao Wang	33273855	Cancer Manag Res	WB
Yawen Ma	33675985	Cancer Lett	WB, IHC, IF
Wenhao Ma	38787728	STAR Protoc	WB,IP

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

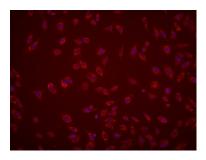
For technical support and original validation data for this product please contact:

T: 1 (888) 4PTGLAB (1-888-478-4522) (toll free in USA), or 1(312) 455-8498 (outside USA)

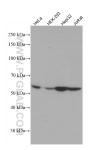
E: proteintech@ptglab.com W: ptglab.com

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

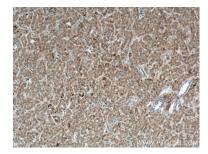
## **Selected Validation Data**



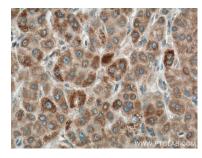
Immunofluorescent analysis of (4% PFA) fixed A549 cells using LACTB antibody (66785-1-1g, Clone: 3C3C3) at dilution of 1:1600 and Multi-rAb CoraLite® Plus 594-Goat Anti-Mouse Recombinant Secondary Antibody (H+L) (Cat.NO. RGAM004).



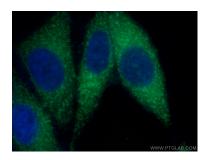
Various lysates were subjected to SDS PAGE followed by western blot with 66785-1-Ig (LACTB antibody) at dilution of 1:3000 incubated at room temperature for 1.5 hours.



Immunohistochemical analysis of paraffinembedded human liver cancer tissue slide using 66785-1-1g (LACTB antibody) at dilution of 1:300 (under 10x lens. Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunohistochemical analysis of paraffinembedded human liver cancer tissue slide using 66785-1-1g (LACTB antibody) at dilution of 1:300 (under 40x lens. Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Immunofluorescent analysis of (4% PFA) fixed HepG2 cells using 66785-1-lg (LACTB antibody) at dilution of 1:100 and Alexa Fluor 488-Conjugated AffiniPure Goat Anti-Mouse IgG(H+L).