

CoraLite® Plus 488-conjugated Alpha Tubulin Monoclonal antibody

Catalog Number: CL488-66031

3 Publications

Basic Information

Catalog Number:

CL488-66031

Size:

1000 µg/ml

Source:

Mouse

Isotype:

IgG2b

Immunogen Catalog Number:

AG18034

GenBank Accession Number:

BC009314

GeneID (NCBI):

10376

UNIPROT ID:

P68363

Full Name:

tubulin, alpha 1b

Calculated MW:

50 kDa

Observed MW:

50-55 kDa

Purification Method:

Protein A purification

CloneNo.:

1E4C11

Recommended Dilutions:

WB 1:300-1:600

IF 1:50-1:500

Excitation/Emission maxima wavelengths:

493 nm / 522 nm

Applications

Tested Applications:

FC (Intra), IF/ICC, WB

Cited Applications:

IF

Species Specificity:

human, mouse, rat, Canine

Cited Species:

human

Positive Controls:

WB : HepG2 cells, HeLa cells, HEK-293 cells, HSC-T6 cells, NIH/3T3 cells

IF : HeLa cells, mouse embryo tissue

Background Information

There are five tubulins in human cells: alpha, beta, gamma, delta, and epsilon. Tubulins are conserved across species. They form heterodimers, which multimerize to form a microtubule filament. An alpha and beta tubulin heterodimer is the basic structural unit of microtubules. The heterodimer does not come apart once formed. The alpha and beta tubulins, which are each about 55 kDa MW, are homologous but not identical. Alpha tubulin is useful for scientists across fields as an internal control due to its high, ubiquitous expression pattern. Tubulin expression may vary according to resistance to antimicrobial and antimitotic drugs. This antibody is CL488(Ex/Em 488 nm/515 nm) conjugated.

Notable Publications

Author	Pubmed ID	Journal	Application
Xueguang Zhang	31571197	Clin Genet	
Chuan Jiang	33968654	Transl Androl Urol	IF
Yaoqiu Wu	36638901	Free Radic Biol Med	IF

Storage

Storage:

Store at -20°C. Avoid exposure to light. Stable for one year after shipment.

Storage Buffer:

PBS with 50% Glycerol, 0.05% Proclin300, 0.5% BSA, pH 7.3.

Aliquoting is unnecessary for -20°C storage

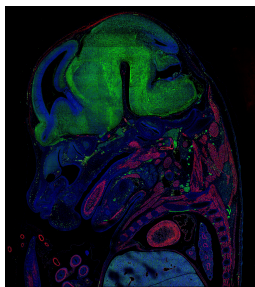
For technical support and original validation data for this product please contact:

T: 4006900926

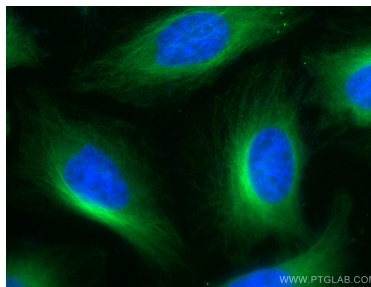
E: Proteintech-CN@ptglab.comW: ptgcn.com

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

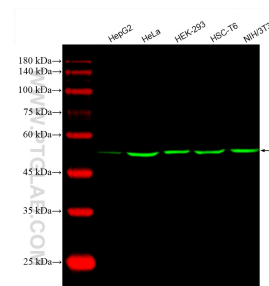
Selected Validation Data



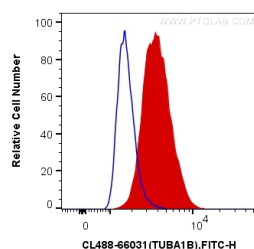
E14.5 FFPE mouse embryo section stained for smooth muscle actin (red, Cat. No 80008-1-RR) and alpha tubulin (green, Cat. CL488-66031). The alpha tubulin was conjugated to CoraLite-488 fluorescent dye. In red, you can see muscle tissue clearly stained including the tongue, heart, and arteries. Nerves and neurons are stained green since they are rich in tubulin. Image credit: @Immunofluorescence on Instagram



Immunofluorescent analysis of (4% PFA) fixed HeLa cells using the CoraLite® Plus 488-conjugated version of this antibody, CL488-66031 (alpha Tubulin antibody), at dilution of 1:100.



Various lysates were subjected to SDS PAGE followed by western blot with CL488-66031 (Alpha Tubulin antibody) at dilution of 1:500 incubated at room temperature for 1.5 hours.



1X10⁶ HepG2 cells were intracellularly stained with 0.4 ug CoraLite® Plus 488 Anti-Human Alpha Tubulin (CL488-66031, Clone:1E4C11) (red), or 0.4 ug Control Antibody. Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer (PF00011-C).