

For Research Use Only

CoraLite® Plus 488-conjugated ATF4 Monoclonal antibody

Catalog Number: CL488-60035

Featured Product



Basic Information

Catalog Number:

CL488-60035

Size:

100ul, Concentration: 1000 ug/ml by Nanodrop;

Source:

Mouse

Isotype:

IgG1

Immunogen Catalog Number:

AG1279

GenBank Accession Number:

BC022088

GeneID (NCBI):

468

UNIPROT ID:

P18848

Full Name:

activating transcription factor 4 (tax-responsive enhancer element B67)

Calculated MW:

39 kDa

Observed MW:

45-50 kDa

Purification Method:

Protein G purification

CloneNo.:

3E4C5

Recommended Dilutions:

IF/ICC: 1:50-1:500

FC (Intra): 0.80 ug per 10⁶ cells in a 100 µl suspension

Excitation/Emission maxima wavelengths:

493 nm / 522 nm

Applications

Tested Applications:

IF/ICC, FC (Intra)

Species Specificity:

human, mouse

Positive Controls:

IF/ICC : A549 cells, HeLa cells

FC (Intra) : HeLa cells,

Background Information

ATF4 is a transcription factor, that accumulates predominantly in osteoblasts, where it regulates terminal osteoblast differentiation and bone formation. As a basic leucine-zipper (bZip) transcription factor, ATF4 can regulate amino acid metabolism, cellular redox state, and anti-stress responses. It also regulates age-related and diet-induced obesity and glucose homeostasis in mammals, and has conserved metabolic functions in flies. Due to its location at chromosome 22q13, a region linked to schizophrenia, ATF4 is considered as a positional candidate gene for schizophrenia. Otherwise, since ATF4 is induced by tumour microenvironmental factors, and regulates processes relevant to cancer progression, it might serve as a potential therapeutic target in cancer. This antibody is a mouse monoclonal antibody raised against full length human ATF4 antigen. The antibody recognizes the 38 kd ATF4 protein and its phosphorylated forms (50 kd). This antibody is conjugated with CL488, Ex/Em 488 nm/515 nm.

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, pH7.3

Aliquoting is unnecessary for -20°C storage

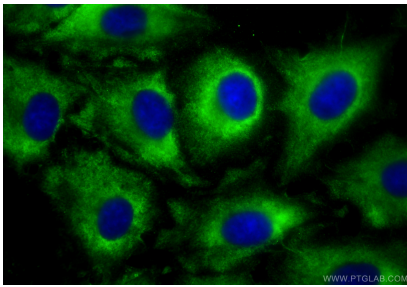
For technical support and original validation data for this product please contact:

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

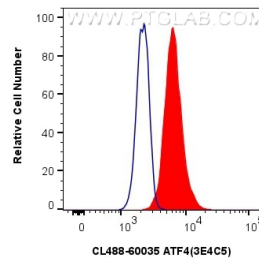
E: proteintech@ptglab.com
W: ptglab.com

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 (-20°C Methanol) fixed A549 cells using CoraLite® Plus 488 ATF4 antibody (CL488-60035, Clone: 3E4C5) at dilution of 1:200.



1X10⁶ HeLa cells were intracellularly stained with 0.8 ug CoraLite® Plus 488 Anti-Human ATF4 (CL488-60035, Clone:3E4C5) (red), or 0.8 ug CoraLite® Plus 488 Mouse IgG1 Isotype Control (MOPC-21) (CL488-65124, Clone: MOPC-21) (blue). Cells were fixed and permeabilized with True-Nuclear Transcription Factor Buffer Set.