For Research Use Only

CEBP Alpha/CEBPA Recombinant antibody

Catalog Number:84668-2-RR

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Basic Information

Catalog Number:
84668-2-RR

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

Source:
Rabbit

Isotype:
IgG

Immunogen Catalog Number:
AG29947

GenBank Accession Number:
NM_004364

GeneID (NCBI):
1050

UNIPROT ID:
P49715

Full Name:
CCAAT/enhancer binding protein (C/EBP), alpha

Calculated MW:
38 kDa

Observed MW:
40-45 kDa

Purification Method:
Protein A purification

CloneNo.:
242101C10

Recommended Dilutions:
WB 1:5000-1:50000

Applications

Tested Applications:
WB, FC (Intra), ELISA

Species Specificity:
human

Positive Controls:

WB : THP-1 cells, U-937 cells, HL-60 cells

Background Information

CEBPA and its isoforms play important roles in lineage determination and gene activation in a variety of cell types by activating transcription from lineage-specific promoters. CEBPA is a DNA-binding protein that recognizes two different motifs: the CCAAT homology common to many promoters and the enhanced core homology common to many enhancers. In hematopoiesis, C/EBPa is a key factor in driving the development of myeloid cells interacting with a variety of factors, including c-Myc, PU.1, and microRNAs. It can also form heterodimers with the related proteins CEBP-beta and CEBP-gamma. The encoded protein has been shown to bind to the promoter and modulate the expression of the gene encoding leptin which plays an important role in body weight homeostasis. CEBPA can interact with CDK2 and CDK4, thereby inhibiting these kinases and causing growth arrest in cultured cells. Several pathways have been implicated as the means by which CEBPA mediates cell cycle arrest and proliferation, including p21, cyclin-dependent kinases and the E2F complex via c-Myc. The calcualted molecular weight of CEBPA is 38 kDa, but modified CEBPA is about 42 kDa (PMID: 19623175).

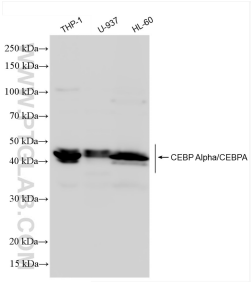
Storage

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

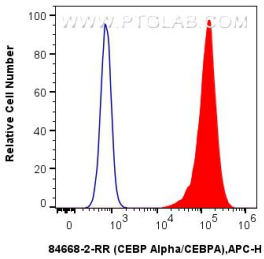
***** 20ul sizes contain 0.1% BSA**

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

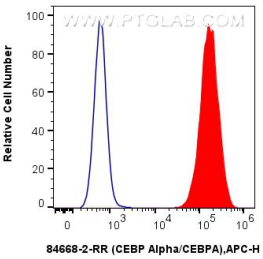
Selected Validation Data



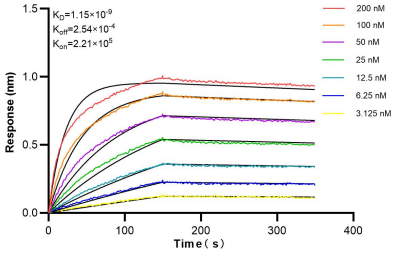
Various lysates were subjected to SDS PAGE followed by western blot with 84668-2-RR (CEBP Alpha/CEBPA antibody) at dilution of 1:10000 incubated at room temperature for 1.5 hours.



1x10^6 HeLa cells were intracellularly stained with 0.25 ug CEBP Alpha/CEBPA Recombinant antibody (84668-2-RR, Clone:242101C10) and APC-Conjugated Goat Anti-Rabbit IgG(H+L)(red), or 0.25 ug Rabbit IgG Isotype Control Recombinant Antibody (98136-1-RR, Clone: 240953C9) (blue). Cells were fixed and permeabilized with True-Nuclear Transcription Factor Buffer Set.



1x10^6 HepG2 cells were intracellularly stained with 0.25 ug CEBP Alpha/CEBPA Recombinant antibody (84668-2-RR, Clone:242101C10) and APC-Conjugated Goat Anti-Rabbit IgG(H+L)(red), or 0.25 ug Rabbit IgG Isotype Control Recombinant Antibody (98136-1-RR, Clone: 240953C9) (blue). Cells were fixed and permeabilized with True-Nuclear Transcription Factor Buffer Set.



Biolayer interferometry (BLI) kinetic assays of 84668-2-RR against Human CEBP Alpha/CEBPA were performed. The affinity constant is 1.15 nM.