For Research Use Only

Cryptochrome 1 Polyclonal antibody

Catalog Number: 13474-1-AP

Featured Product

24 Publications



Basic Information

Catalog Number: GenBank Accession Number: 13474-1-AP BC030519

ze: Genel D (NCBI):

150ul , Concentration: 550 µg/ml by 1407 Nanodrop; Full Name:

Source: cryptochrome 1 (photolyase-like)

Rabbit Calculated MW:
Isotype: 586 aa, 66 kDa
IgG Observed MW:
Immunogen Catalog Number: 60-66 kDa

AG4270

Applications

Tested Applications:

FC, IF, IHC, WB, ELISA

Cited Applications:

CoIP, IF, WB

Species Specificity: human, mouse, rat

Cited Species:

human, rat, mouse

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

buffer pH 6.0

Purification Method:

Antigen affinity purification

Recommended Dilutions:

WB 1:1000-1:5000 IHC 1:50-1:500 IF 1:10-1:100

Positive Controls:

WB: HeLa cells, Y79 cells, mouse liver tissue, rat liver

tissue

IHC: mouse brain tissue, human breast cancer tissue

IF: Hela cells, MCF-7 cells

Background Information

Cryptochrome circadian clock 1 (CRY1) is a flavin adenine dinucleotide-binding protein with MW of 66 kDa. CRY1 is a key component of the circadian core oscillator complex, which regulates the circadian clock. CRY1 predominantly displays evening-time expression and serves as a strong repressor of morning-time elements (E box/E-prime box) when bound to the BMAL1 (ARNTL; 602550)/CLOCK (601851) complex (PubMed: 21236481). This antibody can recognize CRY1 and CRY2 due to the high homology.

Notable Publications

Author	Pubmed ID	Journal	Application
Wen-Ya Huang	28986813	Chin J Integr Med	WB
Guohua Ji	31585206	Free Radic Biol Med	WB
Pieterjan Dierickx	28536247	EMBO Rep	WB

Storage

Storage

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

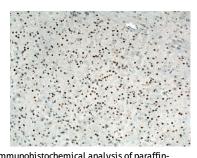
Storage Buffer:

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

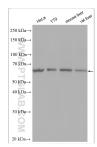
Aliquoting is unnecessary for -20°C storage

*** 20ul sizes contain 0.1% BSA

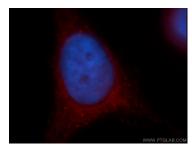
Selected Validation Data



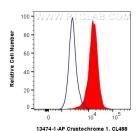
Immunohistochemical analysis of paraffinembedded mouse brain tissue slide using 13474-1-AP (Cryptochrome 1 antibody) at dilution of 1:200 (under 10x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).



Various lysates were subjected to SDS PAGE followed by western blot with 13474-1-AP (Cryptochrome 1 antibody) at dilution of 1:2500 incubated at room temperature for 1.5 hours.



Immunofluorescent analysis of Hela cells, using CRY1 antibody 13474-1-AP at 1:25 dilution and Rhodamine-labeled goat anti-rabbit IgG (red). Blue pseudocolor = DAPI (fluorescent DNA dye).



1X10^6 HeLa cells were intracellularly stained with 0.4 ug Anti-Human Cryptochrome 1 (13474-1-AP) and Coralite® 488-Conjugated AffiniPure Goat Anti-Rabbit IgG(H+L) at dilution 1:1000 (red), or 0.4 ug Rabbit IgG control Rabbit PolyAb (30000-0-AP, Clone:) (blue). Cells were fixed with 4% PFA and permeabilized with Flow Cytometry Perm Buffer (PF00011-C).