

CBP Antibody
Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP51115

Specification

CBP Antibody - Product Information

Application	WB, ICC, IHC-P, E
Primary Accession	O92793
Reactivity	Human, Mouse, Rat
Host	Rabbit
Clonality	Polyclonal
Calculated MW	300 KDa

CBP Antibody - Additional Information

Gene ID 1387

Other Names

CREB-binding protein, CREBBP, CBP

Format

0.01M PBS, pH 7.2, 0.09% (W/V) Sodium azide, Glycerol 50%

Storage

Store at -20 °C. Stable for 12 months from date of receipt

CBP Antibody - Protein Information

Name CREBBP ([HGNC:2348](#))

Synonyms CBP

Function

Acetylates histones, giving a specific tag for transcriptional activation (PubMed: [21131905](http://www.uniprot.org/citations/21131905), PubMed: [24616510](http://www.uniprot.org/citations/24616510)). Mediates acetylation of histone H3 at 'Lys-18' and 'Lys-27' (H3K18ac and H3K27ac, respectively) (PubMed: [21131905](http://www.uniprot.org/citations/21131905)). Also acetylates non-histone proteins, like DDX21, FBL, IRF2, MAFG, NCOA3, POLR1E/PAF53 and FOXO1 (PubMed: [10490106](http://www.uniprot.org/citations/10490106), PubMed: [11154691](http://www.uniprot.org/citations/11154691), PubMed: [12738767](http://www.uniprot.org/citations/12738767), PubMed: [12929931](http://www.uniprot.org/citations/12929931), PubMed: [24207024](http://www.uniprot.org/citations/24207024), PubMed: [28790157](http://www.uniprot.org/citations/28790157), PubMed: [30540930](http://www.uniprot.org/citations/30540930), PubMed: [35675826](http://www.uniprot.org/citations/35675826), PubMed: [9707565](http://www.uniprot.org/citations/9707565))

target="_blank">9707565). Binds specifically to phosphorylated CREB and enhances its transcriptional activity toward cAMP-responsive genes. Acts as a coactivator of ALX1. Acts as a circadian transcriptional coactivator which enhances the activity of the circadian transcriptional activators: NPAS2-BMAL1 and CLOCK-BMAL1 heterodimers (PubMed:14645221). Acetylates PCNA; acetylation promotes removal of chromatin-bound PCNA and its degradation during nucleotide excision repair (NER) (PubMed:24939902). Acetylates POLR1E/PAF53, leading to decreased association of RNA polymerase I with the rDNA promoter region and coding region (PubMed:24207024). Acetylates DDX21, thereby inhibiting DDX21 helicase activity (PubMed:28790157). Acetylates FBL, preventing methylation of 'Gln-105' of histone H2A (H2AQ104me) (PubMed:30540930). In addition to protein acetyltransferase, can use different acyl-CoA substrates, such as lactoyl-CoA, and is able to mediate protein lactylation (PubMed:38128537). Catalyzes lactylation of MRE11 in response to DNA damage, thereby promoting DNA double-strand breaks (DSBs) via homologous recombination (HR) (PubMed:38128537). Functions as a transcriptional coactivator for SMAD4 in the TGF-beta signaling pathway (PubMed:25514493).

Cellular Location

Cytoplasm. Nucleus. Note=Recruited to nuclear bodies by SS18L1/CREST (PubMed:15488321). In the presence of ALX1 relocalizes from the cytoplasm to the nucleus (PubMed:12929931)

CBP Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

CBP Antibody - Images

CBP Antibody - Background

Acetylates histones, giving a specific tag for transcriptional activation. Also acetylates non-histone proteins, like NCOA3 and FOXO1. Binds specifically to phosphorylated CREB and enhances its transcriptional activity toward cAMP-responsive genes. Acts as a coactivator of ALX1 in the presence of EP300.

CBP Antibody - References

Sobulo O.M., et al. Proc. Natl. Acad. Sci. U.S.A. 94:8732-8737(1997).
Giles R.H., et al. Genomics 42:96-114(1997).
Petrij F., et al. Submitted (MAR-1999) to the EMBL/GenBank/DDBJ databases.
Nakajima D., et al. Submitted (MAR-2005) to the EMBL/GenBank/DDBJ databases.
Mural R.J., et al. Submitted (SEP-2005) to the EMBL/GenBank/DDBJ databases.