

CREB3 Antibody (N-term)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP20041a

Specification

CREB3 Antibody (N-term) - Product Information

Application	WB,E
Primary Accession	<u>043889</u>
Other Accession	<u>NP_006359.3</u>
Reactivity	Human
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Calculated MW	41379
Antigen Region	66-94

CREB3 Antibody (N-term) - Additional Information

Gene ID 10488

Other Names

Cyclic AMP-responsive element-binding protein 3, CREB-3, cAMP-responsive element-binding protein 3, Leucine zipper protein, Luman, Transcription factor LZIP-alpha, Processed cyclic AMP-responsive element-binding protein 3, N-terminal Luman, Transcriptionally active form, CREB3, LZIP

Target/Specificity

This CREB3 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 66-94 amino acids from the N-terminal region of human CREB3.

Dilution WB~~1:1000

Format

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

Storage

Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

CREB3 Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

CREB3 Antibody (N-term) - Protein Information

Name CREB3



Synonyms LZIP

Function Endoplasmic reticulum (ER)-bound sequence-specific transcription factor that directly binds DNA and activates transcription (PubMed:<u>9271389</u>, PubMed:<u>19779205</u>, PubMed:<u>10984507</u>, PubMed:<u>15845366</u>, PubMed:<u>16940180</u>). Plays a role in the unfolded protein response (UPR), promoting cell survival versus ER stress-induced apoptotic cell death (PubMed:<u>15845366</u>, PubMed:<u>16940180</u>). Also involved in cell proliferation, migration and differentiation, tumor suppression and inflammatory gene expression. Acts as a positive regulator of LKN-1/CCL15-induced chemotaxis signaling of leukocyte cell migration (PubMed:<u>19779205</u>, PubMed:<u>15001559</u>, PubMed:<u>17296613</u>). Associates with chromatin to the HERPUD1 promoter (PubMed:<u>16940180</u>). Also induces transcriptional activation of chemokine receptors (PubMed:<u>18587271</u>, PubMed:<u>17296613</u>).

Cellular Location

[Isoform 1]: Endoplasmic reticulum membrane; Single-pass type II membrane protein {ECO:0000255, ECO:0000269|PubMed:12138176}. Golgi apparatus. Note=Colocalizes with HCFC1 in neuronal cell bodies of the trigeminal ganglia (PubMed:10623756). Colocalizes with DCSTAMP in the ER membrane of immature dendritic cell (DC) (PubMed:20546900). Colocalizes with CANX, CCR1, HCFC1 in the ER membrane (PubMed:10623756). [Isoform 2]: Nucleus. Cytoplasm Note=Predominantly in the nucleus (PubMed:19779205). Not associated with membranes (PubMed:19779205).

Tissue Location

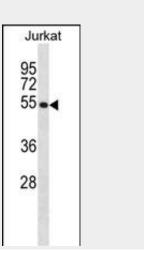
Ubiquitously expressed (PubMed:9271389, PubMed:19779205). Expressed in dendritic cells (DC). Weakly expressed in monocytes (at protein level) (PubMed:20546900)

CREB3 Antibody (N-term) - Protocols

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

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

CREB3 Antibody (N-term) - Images





CREB3 Antibody (N-term) (Cat. #AP20041a) western blot analysis in Jurkat cell line lysates (35ug/lane). This demonstrates the CREB3 antibody detected the CREB3 protein (arrow).

CREB3 Antibody (N-term) - Background

This gene encodes a transcription factor that is a member of the leucine zipper family of DNA binding proteins. This protein binds to the cAMP-response element and regulates cell proliferation. The protein interacts with host cell factor C1, which also associates with the herpes simplex virus (HSV) protein VP16 that induces transcription of HSV immediate-early genes. This protein and VP16 both bind to the same site on host cell factor C1. It is thought that the interaction between this protein and host cell factor C1 plays a role in the establishment of latency during HSV infection. This protein also plays a role in leukocyte migration, tumor suppression, and endoplasmic reticulum stress-associated protein degradation. Additional transcript variants have been identified, but their biological validity has not been determined.

CREB3 Antibody (N-term) - References

Kim, H.C., et al. Cell. Mol. Life Sci. 67(20):3499-3510(2010) Eleveld-Trancikova, D., et al. Mol. Immunol. 47 (11-12), 1963-1973 (2010) : Kang, H., et al. Mol. Endocrinol. 23(11):1746-1757(2009) Mamdani, F., et al. Am. J. Med. Genet. B Neuropsychiatr. Genet. 147B (4), 500-504 (2008) : Audas, T.E., et al. Mol. Cell. Biol. 28(12):3952-3966(2008)