

CHAC1 Antibody
Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP51743**Specification**

CHAC1 Antibody - Product Information

Application	WB
Primary Accession	O9BUX1
Reactivity	Human, Mouse, Rat
Host	Rabbit
Clonality	Polyclonal
Calculated MW	24 KDa
Antigen Region	11 - 70

CHAC1 Antibody - Additional Information**Gene ID** 79094**Other Names**

Glutathione-specific gamma-glutamylcyclotransferase 1, Gamma-GCG 1, 232-, Blocks Notch protein, Botch, Cation transport regulator-like protein 1, CHAC1 {ECO:0000303|PubMed:19109178, ECO:0000312|HGNC:HGNC:28680}

Target/Specificity

KLH conjugated synthetic peptide derived from human CHAC1

Dilution

WB~~ 1:1000

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

CHAC1 Antibody - Protein Information**Name** CHAC1 {ECO:0000303|PubMed:19109178, ECO:0000312|HGNC:HGNC:28680}**Function**

Catalyzes the cleavage of glutathione into 5-oxo-L-proline and a Cys-Gly dipeptide. Acts specifically on glutathione, but not on other gamma-glutamyl peptides (PubMed:27913623). Glutathione depletion is an important factor for apoptosis initiation and execution. Acts as a pro-apoptotic component of the unfolded protein response pathway by mediating the pro-apoptotic effects of the ATF4-ATF3-DDIT3/CHOP cascade (PubMed:19109178). Negative regulator of Notch signaling pathway involved in embryonic neurogenesis: acts by inhibiting Notch

cleavage by furin, maintaining Notch in an immature inactive form, thereby promoting neurogenesis in embryos (PubMed:22445366).

Cellular Location

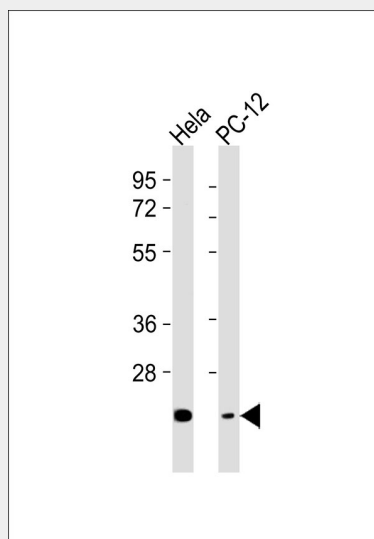
Cytoplasm, cytosol. Golgi apparatus, trans-Golgi network {ECO:0000250|UniProtKB:Q8R3J5}

CHAC1 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](#)

CHAC1 Antibody - Images



All lanes : Anti-CHAC1 Antibody at 1:1000 dilution Lane 1: HeLa whole cell lysates Lane 2: PC-12 whole cell lysates Lysates/proteins at 20 µg per lane. Secondary Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated at 1/10000 dilution Predicted band size : 29 kDa Blocking/Dilution buffer: 5% NFDM/TBST.

CHAC1 Antibody - Background

Negative regulator of Notch signaling pathway involved in embryonic neurogenesis: acts by inhibiting Notch cleavage by furin, maintaining Notch in an immature inactive form, thereby promoting neurogenesis in embryos. May also act as a pro-apoptotic component of the unfolded protein response pathway by mediating the pro-apoptotic effects of the ATF4-ATF3-DDIT3/CHOP cascade.

CHAC1 Antibody - References

Zody M.C.,et al.Nature 440:671-675(2006).

Zheng J.M.,et al.Submitted (JUL-2004) to the EMBL/GenBank/DDBJ databases.

Mungrue I.N.,et al.J. Immunol. 182:466-476(2009).

Chi Z.,et al.Dev. Cell 22:707-720(2012).