10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

EPC1 Antibody (Center)

Affinity Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP20494c

Product Information

Application	WB, E
Primary Accession	Q9H2F5
Other Accession	Q8C9X6
Reactivity	Human, Mouse
Predicted	Rat, Bovine, Canine, Rabbit, Chicken
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Calculated MW	93463
Antigen Region	305-334

Additional Information

Gene ID	80314
Other Names	Enhancer of polycomb homolog 1, EPC1
Target/Specificity	This EPC1 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 305-334 amino acids from the Central region of human EPC1.
Dilution	WB~~1:1000 E~~Use at an assay dependent concentration.
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	EPC1 Antibody (Center) is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	EPC1 {ECO:0000303|PubMed:10976108, ECO:0000312|HGNC:HGNC:19876}
Function	Component of the NuA4 histone acetyltransferase (HAT) complex, a multiprotein complex involved in transcriptional activation of select genes principally by acetylation of nucleosomal histones H4 and H2A (PubMed:14966270). The NuA4 complex plays a direct role in repair of DNA

	double-strand breaks (DSBs) by promoting homologous recombination (HR) (PubMed:27153538). The NuA4 complex is also required for spermatid development by promoting acetylation of histones: histone acetylation is required for histone replacement during the transition from round to elongating spermatids (By similarity). In the NuA4 complex, EPC1 is required to recruit MBTD1 into the complex (PubMed:32209463).
Cellular Location	Nucleus. Cytoplasm {ECO:0000250|UniProtKB:Q8C9X6}

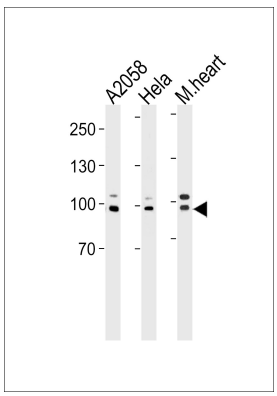
Background

Component of the NuA4 histone acetyltransferase (HAT) complex which is involved in transcriptional activation of select genes principally by acetylation of nucleosomal histones H4 and H2A. This modification may both alter nucleosome -DNA interactions and promote interaction of the modified histones with other proteins which positively regulate transcription. This complex may be required for the activation of transcriptional programs associated with oncogene and proto-oncogene mediated growth induction, tumor suppressor mediated growth arrest and replicative senescence, apoptosis, and DNA repair. NuA4 may also play a direct role in DNA repair when directly recruited to sites of DNA damage.

References

Shimono Y., et al. J. Biol. Chem. 275:39411-39419(2000).
Nunes D.N., et al. Submitted (JUL-2000) to the EMBL/GenBank/DDBJ databases.
Ota T., et al. Nat. Genet. 36:40-45(2004).
Deloukas P., et al. Nature 429:375-381(2004).
Mural R.J., et al. Submitted (SEP-2005) to the EMBL/GenBank/DDBJ databases.

Images



EPC1 Antibody (Center) (Cat. #AP20494c) western blot analysis in A2058,Hela cell line and mouse heart tissue lysates (35ug/lane).This demonstrates the EPC1 antibody detected the EPC1 protein (arrow).

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.