

Overview

**Target Details** 

Alternative Name:

Background:

Target:

## Datasheet for ABIN7155450 anti-CARM1 antibody (AA 209-379) (Biotin)

CARM1

CARM1 (CARM1 Products)



Go to Product page

Quantity:	100 μg
Target:	CARM1
Binding Specificity:	AA 209-379
Reactivity:	Human
Host:	Rabbit
Clonality:	Polyclonal
Conjugate:	This CARM1 antibody is conjugated to Biotin
Application:	ELISA
Product Details	
Immunogen:	Recombinant Human Histone-arginine methyltransferase CARM1 protein (209-379AA)
Isotype:	IgG
Cross-Reactivity:	Human
Purification:	>95%, Protein G purified

Background: Methylates (mono- and asymmetric dimethylation) the guanidino nitrogens of arginyl residues in several proteins involved in DNA packaging, transcription regulation, pre-

mRNA splicing, and mRNA stability. Recruited to promoters upon gene activation together with histone acetyltransferases from EP300/P300 and p160 families, methylates histone H3 at \'Arg-17\' (H3R17me), forming mainly asymmetric dimethylarginine (H3R17me2a), leading to activate transcription via chromatin remodeling. During nuclear hormone receptor activation and TCF7L2/TCF4 activation, acts synergically with EP300/P300 and either one of the p160 histone acetyltransferases NCOA1/SRC1, NCOA2/GRIP1 and NCOA3/ACTR or CTNNB1/betacatenin to activate transcription. During myogenic transcriptional activation, acts together with NCOA3/ACTR as a coactivator for MEF2C. During monocyte inflammatory stimulation, acts together with EP300/P300 as a coactivator for NF-kappa-B. Acts as coactivator for PPARG, promotes adipocyte differentiation and the accumulation of brown fat tissue. Plays a role in the regulation of pre-mRNA alternative splicing by methylation of splicing factors. Also seems to be involved in p53/TP53 transcriptional activation. Methylates EP300/P300, both at \'Arg-2142\', which may loosen its interaction with NCOA2/GRIP1, and at \'Arg-580\' and \'Arg-604\' in the KIX domain, which impairs its interaction with CREB and inhibits CREB-dependent transcriptional activation. Also methylates arginine residues in RNA-binding proteins PABPC1, ELAVL1 and ELAV4, which may affect their mRNA-stabilizing properties and the half-life of their target mRNAs.

Aliases: carm1 antibody, CARM1\_HUMAN antibody, Coactivator associated arginine methyltransferase 1 antibody, Coactivator-associated arginine methyltransferase 1 antibody, Histone arginine methyltransferase CARM 1 antibody, Histone arginine methyltransferase CARM1 antibody, PRMT 4 antibody, PRMT 4 antibody, PRMT4 antibody, Protein arginine methyltransferase antibody, Protein arginine N methyltransferase 4 antibody, Protein arginine N-methyltransferase 4 antibody

UniProt:

Q86X55

Pathways:

Intracellular Steroid Hormone Receptor Signaling Pathway, Regulation of Intracellular Steroid Hormone Receptor Signaling, Regulation of Lipid Metabolism by PPARalpha, Regulation of Muscle Cell Differentiation, Skeletal Muscle Fiber Development, Positive Regulation of fat Cell Differentiation

## **Application Details**

**Application Notes:** 

Optimal working dilution should be determined by the investigator.

Restrictions:

For Research Use only

## Handling

Format:	Liquid
Buffer:	Preservative: 0.03 % Proclin 300 Constituents: 50 % Glycerol, 0.01M PBS, PH 7.4
Preservative:	ProClin
Precaution of Use:	This product contains ProClin: a POISONOUS AND HAZARDOUS SUBSTANCE which should be handled by trained staff only.
Storage:	-20 °C,-80 °C
Storage Comment:	Upon receipt, store at -20°C or -80°C. Avoid repeated freeze.