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#5646

MTA1 (D17G10) Rabbit mAb

For Research Use Only. Not for Use in Diagnostic Procedures.

Applications:	Reactivity:	Sensitivity:	MW (kDa):	Source/Isotype:	UniProt ID:	Entrez-Gene Id:
W, IP, ChIP	H M R Mk	Endogenous	78-82	Rabbit IgG	#Q13330	9112

Product Usage Information

For optimal ChIP results, use 10 µl of antibody and 10 µg of chromatin (approximately 4 x 10⁶ cells) per IP. This antibody has been validated using SimpleChIP[®] Enzymatic Chromatin IP Kits.

Application	Dilution
Western Blotting	1:1000
Immunoprecipitation	1:200
Chromatin IP	1:50

Storage

Supplied in 10 mM sodium HEPES (pH 7.5), 150 mM NaCl, 100 µg/ml BSA, 50% glycerol and less than 0.02% sodium azide. Store at -20°C. Do not aliquot the antibody.

Specificity/Sensitivity

MTA1 (D17G10) Rabbit mAb detects endogenous levels of total MTA1 protein.

Source / Purification

Monoclonal antibody is produced by immunizing animals with a synthetic peptide corresponding to residues surrounding Val632 of human MTA1 protein.

Background

MTA1 (metastasis associated gene 1) was identified in a differential screening of a cDNA library of metastatic and nonmetastatic adenocarcinoma cell lines (1), and was subsequently found to be an integral member of the nucleosome remodeling and deacetylation (NuRD) complex (2,3). MTA1 expression is upregulated under hypoxic conditions and found to enhance angiogenesis through stabilization of HIF-1α (4,5). MTA1 is overexpressed in a wide range of human cancers, and its expression is associated with malignancy and tumor progression (6). MTA1 is an essential downstream effector of c-Myc transformation (7). Recently, MTA1 was demonstrated to play a role in DNA damage response (8,9).

Background References

- Toh, Y. et al. (1994) *J Biol Chem* 269, 22958-63.
- Xue, Y. et al. (1998) *Mol Cell* 2, 851-61.
- Zhang, Y. et al. (1998) *Cell* 95, 279-89.
- Yoo, Y.G. et al. (2006) *EMBO J* 25, 1231-41.
- Moon, H.E. et al. (2006) *Oncol Rep* 16, 929-35.
- Toh, Y. and Nicolson, G.L. (2009) *Clin Exp Metastasis* 26, 215-27.
- Zhang, X.Y. et al. (2005) *Proc Natl Acad Sci U S A* 102, 13968-73.
- Li, D.Q. et al. (2009) *J Biol Chem* 284, 34545-52.
- Li, D.Q. et al. (2010) *J Biol Chem* 285, 10044-52.

Species Reactivity

Species reactivity is determined by testing in at least one approved application (e.g., western blot).

Western Blot Buffer

IMPORTANT: For western blots, incubate membrane with diluted primary antibody in 5% w/v nonfat dry milk, 1X TBS, 0.1% Tween® 20 at 4°C with gentle shaking, overnight.

Applications Key

W: Western Blotting **IP:** Immunoprecipitation **ChIP:** Chromatin IP

Cross-Reactivity Key

H: Human **M:** Mouse **R:** Rat **Mk:** Monkey

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