

**MTRR/MSR Rabbit mAb [CAB8]**

**Cat NO. :A70559**

**Information:**

Applications	Reactivity:	UniProt ID:	MW(kDa)	Host	Isotype	Size
WB,ICC/IF	H	Q9UBK8	78 kDa	Rabbit	IgG	50ul,100ul,200ul

**Applications detail:**

Application	Dilution
WB	1:1000-2000
ICC/IF	1:100,
The optimal dilutions should be determined by the end user	

**Conjugate:**

UnConjugate

**Form:**

Liquid

**sensitivity:**

Endogenous

**Purification:**

Protein A purification

**Specificity:**

Antibody is produced by immunizing animals with a synthetic peptide of Human MTRR/MSR.

**Storage buffer and conditions:**

Antibody store in 10 mM PBS, 0.5mg/ml BSA, 50% glycerol (buffer) .

Shipped at 4°C. Store at -20°C or -80°C.

Products are valid for one natural year of receipt.Avoid repeated freeze / thaw cycles.

**Tissue specificity:**

Found in all tissues tested, particularly abundant in skeletal muscle.

**Subcellular location:**

[Isoform B]: Cytoplasm.,[Isoform A]: Cytoplasm.

**Function:**

Key enzyme in methionine and folate homeostasis responsible for the reactivation of methionine synthase (MTR/MS) activity by catalyzing the reductive methylation of MTR-bound cob(II)alamin (PubMed:17892308). Cobalamin (vitamin B12) forms a complex with MTR to serve as an intermediary in methyl transfer reactions that cycles between MTR-bound methylcob(III)alamin and MTR bound-cob(I)alamin forms, and occasional oxidative escape of the cob(I)alamin intermediate during the catalytic cycle leads to the inactive cob(II)alamin species (Probable). The processing of cobalamin in the cytosol occurs in a multiprotein complex composed of at least MMAHC, MMADHC, MTRR and MTR which may contribute to shuttle safely and efficiently cobalamin towards

**Introduction:** **WB:** Western Blot **IP:** Immunoprecipitation **IHC:** Immunohistochemistry **ChIP:** Chromatin Immunoprecipitation **ICC/IF:** Immunocytochemistry/Immunofluorescence **F:** Flow Cytometry

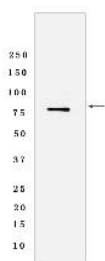
**Cross Reactivity:** **H:** human **M:** mouse **R:** rat **Hm:** hamster **Mk:** monkey **Vir:** virus **Ml:** mink **C:** chicken **Dm** D. melanogaster **X:** Xenopus **Z:** zebrafish **B:** bovine **Dg:** dog **Pg:** pig **Hr:** horse

**For Research Use Only. Not For Use In Diagnostic Procedures.**

MTR in order to produce methionine (PubMed:27771510). Also necessary for the utilization of methyl groups from the folate cycle, thereby affecting transgenerational epigenetic inheritance (By similarity). Also acts as a molecular chaperone for methionine synthase by stabilizing apoMTR and incorporating methylcob(III)alamin into apoMTR to form the holoenzyme (PubMed:16769880). Also serves as an aquacob(III)alamin reductase by reducing aquacob(III)alamin to cob(II)alamin, this reduction leads to stimulation of the conversion of apoMTR and aquacob(III)alamin to MTR holoenzyme (PubMed:16769880)..

## Validation Data:

### MTRR/MSR Rabbit mAb [CAB8] Images



Western blot (SDS PAGE) analysis of extracts from HeLa cells lysates using MTRR/MSR Rabbit mAb [CAB8] at dilution of 1:1000 incubated at 4°C over night

View more information on <http://naturebios.com>

**IMPORTANT:** For western blots, incubate membrane with diluted primary antibody in 1% w/v Milk, 1X TBST at 4°C overnight.