

MTHFD1 Recombinant Mouse mAb

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Catalog # AP94397

Product Information

Application	WB
Reactivity	Human
Predicted	Mouse
Host	Mouse
Clonality	Recombinant
Calculated MW	110 KDa
Physical State	Liquid
Isotype	IgG1, Kappa
Purity	affinity purified by Protein G
Buffer	PBS, Glycerol, BSA.
SUBCELLULAR LOCATION	Cytoplasm.
SIMILARITY	In the N-terminal section; belongs to the tetrahydrofolate dehydrogenase/cyclohydrolase family. In the C-terminal section; belongs to the formate--tetrahydrofolate ligase family.
DISEASE	Defects in MTHFD1 may be a cause of susceptibility to folate-sensitive neural tube defects (folate-sensitive NTD) [MIM:601634]. The most common NTDs are open spina bifida (myelomeningocele) and anencephaly. Genetic defects in MTHFD1 may affect the risk of spina bifida via the maternal rather than the embryonic genotype. Genetic variation in MTHFD1 could be associated with susceptibility to colorectal cancer (CRC) [MIM:114500].
Important Note	This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.
Background Descriptions	This gene encodes a protein that possesses three distinct enzymatic activities, 5,10-methylenetetrahydrofolate dehydrogenase, 5,10-methenyltetrahydrofolate cyclohydrolase and 10-formyltetrahydrofolate synthetase. Each of these activities catalyzes one of three sequential reactions in the interconversion of 1-carbon derivatives of tetrahydrofolate, which are substrates for methionine, thymidylate, and de novo purine syntheses. The trifunctional enzymatic activities are conferred by two major domains, an aminoterminal portion containing the dehydrogenase and cyclohydrolase activities and a larger synthetase domain. [provided by RefSeq, Jul 2008]

Additional Information

Target/Specificity	Ubiquitous.
Dilution	WB=1:500-1000, ICC/IF=1:100-500
Storage	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.

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