

## Product datasheet for **TP302143**

### **MTHFD2 (NM\_006636) Human Recombinant Protein**

#### **Product data:**

<b>Product Type:</b>	Recombinant Proteins
<b>Description:</b>	Recombinant protein of human methylenetetrahydrofolate dehydrogenase (NADP+ dependent) 2, methenyltetrahydrofolate cyclohydrolase (MTHFD2), nuclear gene encoding mitochondrial protein, tra, 20 µg
<b>Species:</b>	Human
<b>Expression Host:</b>	HEK293T
<b>Expression cDNA Clone or AA Sequence:</b>	>RC202143 protein sequence <b>Red</b> =Cloning site <b>Green</b> =Tags(s)

MAATSLMSALAARLLQPAHSCSLRLRPFHLAAVRNEAWISGRKLAQQIKQEVQRQVEEWWASGNKRPHL  
SVILVGENPASHSYVLNKTRAAAVVGINSETIMKPASISEEELLNLINKLNNDNDVGLLVQLPLPEHID  
ERRICNAVSPDKDVGDFHVINVGRMCLDQYSMLPATPWGVWEIIRKRTGIPTLGKNVVAGRSKNVGMP  
MLLHTDGAHERPGDATVTISHRYTPKEQLKKHTILADIVISAAGIPNLITADMIKEGAAVIDVGINRVH  
DPVTAKPKLVGDVDFEGVRQKAGYITVPPGGVGPMTVAMLMKNTIIAAKKVLRLEEREVLKSKELGVATN

**TRTRPLEQKLISEEDLAANDILDYKDDDDKV**

<b>Tag:</b>	C-Myc/DDK
<b>Predicted MW:</b>	34.7 kDa
<b>Concentration:</b>	>0.05 µg/µL as determined by microplate BCA method
<b>Purity:</b>	> 80% as determined by SDS-PAGE and Coomassie blue staining
<b>Buffer:</b>	25 mM Tris-HCl, 100 mM glycine, pH 7.3, 10% glycerol
<b>Preparation:</b>	Recombinant protein was captured through anti-DDK affinity column followed by conventional chromatography steps.
<b>Note:</b>	For testing in cell culture applications, please filter before use. Note that you may experience some loss of protein during the filtration process.
<b>Storage:</b>	Store at -80°C.
<b>Stability:</b>	Stable for 12 months from the date of receipt of the product under proper storage and handling conditions. Avoid repeated freeze-thaw cycles.
<b>RefSeq:</b>	<u><a href="#">NP_006627</a></u>



[View online »](#)

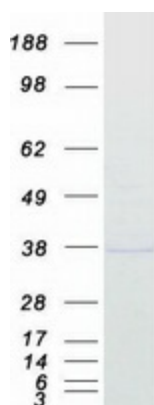
Locus ID: 10797  
UniProt ID: [P13995](#)  
RefSeq Size: 2208  
Cytogenetics: 2p13.1  
RefSeq ORF: 1050  
Synonyms: NMDMC

**Summary:** This gene encodes a nuclear-encoded mitochondrial bifunctional enzyme with methylenetetrahydrofolate dehydrogenase and methenyltetrahydrofolate cyclohydrolase activities. The enzyme functions as a homodimer and is unique in its absolute requirement for magnesium and inorganic phosphate. Formation of the enzyme-magnesium complex allows binding of NAD. Alternative splicing results in two different transcripts, one protein-coding and the other not protein-coding. This gene has a pseudogene on chromosome 7. [provided by RefSeq, Mar 2009]

**Protein Families:** Druggable Genome

**Protein Pathways:** Glyoxylate and dicarboxylate metabolism, Metabolic pathways, One carbon pool by folate

### Product images:



Coomassie blue staining of purified MTHFD2 protein (Cat# TP302143). The protein was produced from HEK293T cells transfected with MTHFD2 cDNA clone (Cat# [RC202143]) using MegaTran 2.0 (Cat# [TT210002]).