10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

Nudt15 antibody - N-terminal region

Rabbit Polyclonal Antibody
Catalog # AI12948

Product Information

Application	WB
Primary Accession	Q8BG93
Other Accession	NM_172527, NP_766115
Reactivity	Human, Mouse, Rat, Rabbit, Zebrafish, Dog, Guinea Pig, Horse, Bovine, Yeast
Predicted	Mouse, Rat, Zebrafish, Chicken, Dog, Guinea Pig
Host	Rabbit
Clonality	Polyclonal
Calculated MW	19576

Additional Information

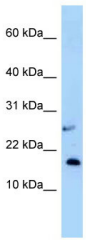
Gene ID	214254
Alias Symbol	6530403O17, A730068G11Rik, MTH2
Other Names	Probable 8-oxo-dGTP diphosphatase NUDT15, 8-oxo-dGTPase NUDT15, 3.6.1.55, 7, 8-dihydro-8-oxoguanine-triphosphatase NUDT15, MutT homolog 2, mMTH2, Nucleoside diphosphate-linked moiety X motif 15, Nudix motif 15, Nudt15, Mth2
Format	Liquid. Purified antibody supplied in 1x PBS buffer with 0.09% (w/v) sodium azide and 2% sucrose.
Reconstitution & Storage	Add 50 ul of distilled water. Final anti-Nudt15 antibody concentration is 1 mg/ml in PBS buffer with 2% sucrose. For longer periods of storage, store at 20°C. Avoid repeat freeze-thaw cycles.
Precautions	Nudt15 antibody - N-terminal region is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	Nudt15 {ECO:0000312|MGI:MGI:2443366}
Function	Catalyzes the hydrolysis of nucleoside triphosphates including dGTP, dTTP, dCTP, their oxidized forms like 8-oxo-dGTP and the prodrug thiopurine derivatives 6-thio-dGTP and 6-thio-GTP (PubMed:12767940). Could also catalyze the hydrolysis of some nucleoside diphosphate derivatives (By similarity). Hydrolyzes oxidized nucleosides triphosphates like 8-oxo-dGTP in vitro, but the specificity and efficiency towards these substrates are low. Therefore, the potential in vivo sanitizing role of this enzyme, that would consist in removing oxidatively damaged forms of nucleosides to prevent

their incorporation into DNA, is unclear (PubMed:12767940). Through the hydrolysis of thioguanosine triphosphates may participate in the catabolism of thiopurine drugs (By similarity). May also have a role in DNA synthesis and cell cycle progression by stabilizing PCNA (By similarity). Exhibits decapping activity towards dpCoA-capped RNAs in vitro (PubMed:32432673). In vitro, it catalyzes the hydrolysis of isoprene pyrophosphates, including (2E)-geranyl diphosphate, isopentenyl diphosphate, (2E,6E)-farnesyl diphosphate and dimethylallyl diphosphate. It may therefore play a role in the control of cellular levels of these metabolites that are essential for multiple cellular processes, including isoprenoids synthesis and protein isoprenylation (By similarity).

Images



WB Suggested Anti-Nudt15 Antibody Titration: 1.0 µg/ml
Positive Control: Mouse Small Intestine