

Product datasheet for TL503995

N6amt1 Mouse shRNA Plasmid (Locus ID 67768)

Product data:

OriGene Technologies, Inc.

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Product Type:	shRNA Plasmids
Product Name:	N6amt1 Mouse shRNA Plasmid (Locus ID 67768)
Locus ID:	67768
Synonyms:	5830445C04Rik; Hemk2; Pred28
Vector:	pGFP-C-shLenti (TR30023)
E. coli Selection:	Chloramphenicol (34 ug/ml)
Mammalian Cell Selection:	Puromycin
Format:	Lentiviral plasmids
Components:	N6amt1 - Mouse, 4 unique 29mer shRNA constructs in lentiviral GFP vector(Gene ID = 67768). 5µg purified plasmid DNA per construct 29-mer scrambled shRNA cassette in pGFP-C-shLenti Vector, TR30021, included for free.
RefSeq:	<u>BC098330</u> , <u>BC116393</u> , <u>BC116394, NM 001159331, NM 026366</u> , <u>NM 026366.1, NM 026366.2,</u> <u>NM 001159331.1</u>
UniProt ID:	Q6SKR2
Summary:	Methyltransferase that can methylate both proteins and DNA, and to a lower extent, arsenic (PubMed:20606008, PubMed:26797129). Catalytic subunit of a heterodimer with TRMT112, which catalyzes N5-methylation of Glu residue of proteins with a Gly-Gln-Xaa-Xaa-Xaa-Arg motif (PubMed:26797129). Methylates ETF1 on 'Gln-185'; ETF1 needs to be complexed to ERF3 in its GTP-bound form to be efficiently methylated (PubMed:20606008, PubMed:26797129). Also acts as a N(6)-adenine-specific DNA methyltransferase by mediating methylation of DNA on the 6th position of adenine (N(6)-methyladenosine) (By similarity). N(6)-methyladenosine (m6A) DNA is significantly enriched in exonic regions and is associated with gene transcriptional activation (By similarity). May also play a role in the modulation of arsenic-induced toxicity by mediating the conversion of monomethylarsonous acid (3+) into the less toxic dimethylarsonic acid (By similarity). It however only plays a limited role in arsenic metabolism compared with AS3MT (By similarity).[UniProtKB/Swiss-Prot Function]
shRNA Design:	These shRNA constructs were designed against multiple splice variants at this gene locus. To be certain that your variant of interest is targeted, please contact <u>techsupport@origene.com</u> . If you need a special design or shRNA sequence, please utilize our <u>custom shRNA service</u> .



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CRIGENE N6amt1 Mouse shRNA Plasmid (Locus ID 67768) – TL503995

Performance Guaranteed: OriGene guarantees that the sequences in the shRNA expression cassettes are verified to correspond to the target gene with 100% identity. One of the four constructs at minimum are guaranteed to produce 70% or more gene expression knock-down provided a minimum transfection efficiency of 80% is achieved. Western Blot data is recommended over qPCR to evaluate the silencing effect of the shRNA constructs 72 hrs post transfection. To properly assess knockdown, the gene expression level from the included scramble control vector must be used in comparison with the target-specific shRNA transfected samples.

For non-conforming shRNA, requests for replacement product must be made within ninety (90) days from the date of delivery of the shRNA kit. To arrange for a free replacement with newly designed constructs, please contact Technical Services at techsupport@origene.com. Please provide your data indicating the transfection efficiency and measurement of gene expression knockdown compared to the scrambled shRNA control (Western Blot data preferred).

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