

ARG83376 1-Methyladenosine ELISA Kit

Package: 96 wells
Store at: 4°C, -20°C, -80°C

Summary

Product Description	ARG83376 1-Methyladenosine ELISA Kit is an Enzyme Immunoassay kit for the quantification of 1-Methyladenosine in Plasma, Serum, Cell / Tissue RNA Sample and Urine
Tested Reactivity	All
Tested Application	ELISA
Target Name	1-Methyladenosine
Conjugation	HRP
Conjugation Note	Read at 450 nm.
Sensitivity	2 ng/mL
Sample Type	Plasma, Serum, Cell / Tissue RNA Sample and Urine
Standard Range	5 - 5000 ng/mL
Sample Volume	50 µL

Application Instructions

Assay Time	~3 hours
------------	----------

Properties

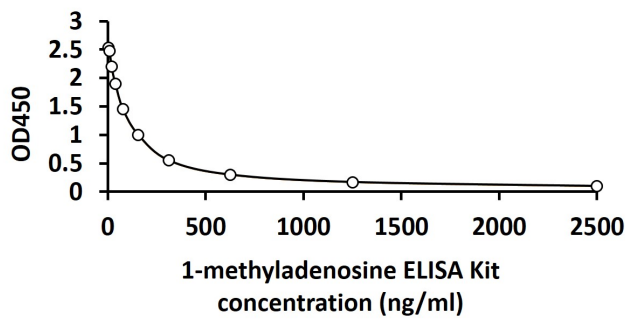
Form	96 well
Storage instruction	Store components at 4°C, -20°C and -80°C. Keep microplate wells sealed in a dry bag with desiccants. Do not expose test reagents to heat, sun or strong light during storage and usage. Please refer to the product user manual for detail temperatures of the components.
Note	For laboratory research only, not for drug, diagnostic or other use.

Bioinformation

Background	<p>1-Methyladenosine is an RNA modification that arises through distinct processes, including enzymatic catalysis and the alkylation of RNA by specific agents.</p> <p>1-Methyladenosine, also known as M1A, belongs to the class of organic compounds known as purine nucleosides. Purine nucleosides are compounds comprising a purine base attached to a ribosyl or deoxyribosyl moiety. 1-Methyladenosine is a strong basic compound (based on its pKa). Precise m6A mapping by m6A-CLIP/IP (briefly m6A-CLIP) revealed that a majority of m6A locates in the last exon of mRNAs in multiple tissues/cultured cells of mouse and human, and the m6A enrichment around stop codons is a coincidence that many stop codons locate round the start of last exons where m6A is truly enriched. The methylation of adenosine is directed by a large m6A methyltransferase complex containing METTL3 as the SAM-binding sub-unit. Insulin-like growth factor-2 mRNA-binding proteins 1, 2, and 3 (IGF2BP1–3) are reported as a novel class of m6A readers.</p>
Function	<p>1-Methyladenosine, a modified nucleoside produced during tRNA processing by methyltransferases, has garnered attention as a potential biomarker for early cancer detection due to its elevated urinary excretion in various cancer forms. Additionally, its presence can be monitored in serum. Moreover,</p>

1-Methyladenosine levels rise during active rheumatoid arthritis, making it a promising indicator for this condition. It finds application in research pertaining to cancer, autoimmune diseases, metabolomics, biomarker discovery and drug discovery studies.

Images



ARG83376 1-Methyladenosine ELISA Kit standard curve image

ARG83376 1-Methyladenosine ELISA Kit results of a typical standard run with optical density reading at 450 nm.