

Product datasheet for TP302136M

AlaRS (AARS) (NM_001605) Human Recombinant Protein

Product data:

Product Type:	Recombinant Proteins
Description:	Recombinant protein of human alanyl-tRNA synthetase (AARS), 100 µg
Species:	Human
Expression Host:	HEK293T
Expression cDNA Clone or AA Sequence:	>RC202136 protein sequence Red=Cloning site Green=Tags(s)

MDSTLTASEIRQRFIDFFKRNEHTYVHSSATIPLDDPTLLFANAGMNQFKPIFLNTIDPSHPMAKLSRAA
NTQKCI RAGGKHNDLDDVGKDVYHHTFFEM LGSWSFGDYFKELACKMALELLTQEFGIPIERLYVTYFGG
DEAAGLEADLECKQIWQNLGLDDTKILPGNMKDNFWEMGDTGPCGPCSEIHYDRIGGRDAAHLVNQDDPN
VLEIWNLVFIQYNREADGILKPLPKSIDTGMGLERLVSVLQNKMSNYD TDLFVPYFEAIQKGTGARPYT
GKVGAEADADGIDMAYRVLADHARTITVALADGGRPDNTGRGYVLRRLRRAVRYAHEKLNASRGFFATLV
DVVVQSLGDAFPELKKDPDMVKDIINEEEVQFLKTL SRGRRILDRKIQSLGDSKTIPGDTAWLLYD TYGF
PVDLTGLIAEEKGLVDM DGFEEERKLAQLKSQKGAGGEDLIMLDIYAIEELRARGLEVTD DSPKYN YH
LDSSGSYVFENTVATVMALRREKMFVEEVSTGQECGVLDKTCFYAEQGGQIYDEGYLVKVD DSSSEDKTE
FTVKN AQVRGGYVLHIGTIYGD LKVG DQVWLFIDEPRRRPIMS NHTATHILNFALRSVLGEADQKGS LVA
PDRLRFDF TAKGAMSTQQIKKAE EIANEMIEAAKAVYTQDCPLAAAKAIQGLRAVFD ETPDPVRVVSIG
VPVSELLDDPSGPAGSLTSVEFCGGTHLRNSSHAGAFVIVTEEAI AKGIRRIVAVTGAE AQKALRKAESL
KKCLSVMEAKVKAQTAPNKDVQREIADLGEALATAVIPQWQKDELRETLKSLKKVMDDLD RASKADVQKR
VLEKTKQFIDSNPNQPLVILEMESGASAKALNEALKLFKM HSPQTSAMLFTVDNEAGKITCLCQVPQNAA
NRGLKASEWVQVSGLM DGGKGGKDVSAQATGKNV GCLQEALQLATSFAQLRLGDVKN

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

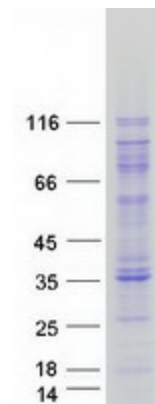
Tag:	C-Myc/DDK
Predicted MW:	106.6 kDa
Concentration:	>0.05 µg/µL as determined by microplate BCA method
Purity:	> 80% as determined by SDS-PAGE and Coomassie blue staining
Buffer:	25 mM Tris-HCl, 100 mM glycine, pH 7.3, 10% glycerol
Preparation:	Recombinant protein was captured through anti-DDK affinity column followed by conventional chromatography steps.



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Note:	For testing in cell culture applications, please filter before use. Note that you may experience some loss of protein during the filtration process.
Storage:	Store at -80°C.
Stability:	Stable for 12 months from the date of receipt of the product under proper storage and handling conditions. Avoid repeated freeze-thaw cycles.
RefSeq:	NP_001596
Locus ID:	16
UniProt ID:	P49588
RefSeq Size:	3344
Cytogenetics:	16q22.1
RefSeq ORF:	2904
Synonyms:	AARS; CMT2N; DEE29; EIEE29
Summary:	The human alanyl-tRNA synthetase (AARS) belongs to a family of tRNA synthases, of the class II enzymes. Class II tRNA synthases evolved early in evolution and are highly conserved. This is reflected by the fact that 498 of the 968-residue polypeptide human AARS shares 41% identity with the E.coli protein. tRNA synthases are the enzymes that interpret the RNA code and attach specific aminoacids to the tRNAs that contain the cognate trinucleotide anticodons. They consist of a catalytic domain which interacts with the amino acid acceptor-T psi C helix of the tRNA, and a second domain which interacts with the rest of the tRNA structure. [provided by RefSeq, Jul 2008]
Protein Pathways:	Aminoacyl-tRNA biosynthesis

Product images:



Coomassie blue staining of purified AARS protein (Cat# [TP302136]). The protein was produced from HEK293T cells transfected with AARS cDNA clone (Cat# [RC202136]) using MegaTran 2.0 (Cat# [TT210002]).