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Product datasheet for TR316517

Deoxyguanosine kinase (DGUOK) Human shRNA Plasmid Kit (Locus ID 1716)

Product data:

Product Type:	shRNA Plasmids
Product Name:	Deoxyguanosine kinase (DGUOK) Human shRNA Plasmid Kit (Locus ID 1716)
Locus ID:	1716
Synonyms:	dGK; MTDPS3; NCPH; PEOB4
Vector:	pRS (TR20003)
E. coli Selection:	Ampicillin
Mammalian Cell Selection:	Puromycin
Format:	Retroviral plasmids
Components:	DGUOK - Human, 4 unique 29mer shRNA constructs in retroviral untagged vector(Gene ID = 1716). 5µg purified plasmid DNA per construct 29-mer scrambled shRNA cassette in pRS Vector, TR30012, included for free.
RefSeq:	<u>NM 001318859</u> , <u>NM 001318860</u> , <u>NM 001318861</u> , <u>NM 001318862</u> , <u>NM 001318863</u> , <u>NM 001929</u> , <u>NM 080915</u> , <u>NM 080916</u> , <u>NM 080917</u> , <u>NM 080918</u> , <u>NR 134893</u> , <u>NR 134894</u> , <u>NR 134895</u> , <u>NR 134896</u> , <u>NR 134897</u> , <u>NR 134898</u> , <u>NM 080916.1</u> , <u>NM 080916.2</u> , <u>NM 080918.1</u> , <u>NM 080918.2</u> , <u>BC015757</u> , <u>BC015757.1</u> , <u>BC001121</u> , <u>BC024019</u> , <u>BM706344</u> , <u>NM 080918.3</u> , <u>NM 080916.3</u>
UniProt ID:	<u>Q16854</u>
Summary:	In mammalian cells, the phosphorylation of purine deoxyribonucleosides is mediated predominantly by two deoxyribonucleoside kinases, cytosolic deoxycytidine kinase and mitochondrial deoxyguanosine kinase. The protein encoded by this gene is responsible for phosphorylation of purine deoxyribonucleosides in the mitochondrial matrix. In addition, this protein phosphorylates several purine deoxyribonucleoside analogs used in the treatment of lymphoproliferative disorders, and this phosphorylation is critical for the effectiveness of the analogs. Alternative splice variants encoding different protein isoforms have been described for this gene. [provided by RefSeq, Jul 2008]
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 custom shRNA service.



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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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