

Product datasheet for TL309021

OriGene Technologies, Inc.

9620 Medical Center Drive, Ste 200 Rockville, MD 20850, US Phone: +1-888-267-4436 https://www.origene.com techsupport@origene.com EU: info-de@origene.com CN: techsupport@origene.cn

SUCLA2 Human shRNA Plasmid Kit (Locus ID 8803)

Product data:

Product Type: shRNA Plasmids

Product Name: SUCLA2 Human shRNA Plasmid Kit (Locus ID 8803)

Locus ID: 8803

Synonyms: A-BETA; A-SCS; LINC00444; MTDPS5; SCS-betaA

Vector: pGFP-C-shLenti (TR30023)

E. coli Selection: Chloramphenicol (34 ug/ml)

Mammalian Cell

Selection:

Puromycin

Format: Lentiviral plasmids

Components: SUCLA2 - Human, 4 unique 29mer shRNA constructs in lentiviral GFP vector(Gene ID = 8803).

5µg purified plasmid DNA per construct

29-mer scrambled shRNA cassette in pGFP-C-shLenti Vector, TR30021, included for free.

RefSeq: NM 003850, NM 003850.2, BC027587, BC027587.2, NM 003850.3

UniProt ID: Q9P2R7

Summary: Succinyl-CoA synthetase (SCS) is a mitochondrial matrix enzyme that acts as a heterodimer,

being composed of an invariant alpha subunit and a substrate-specific beta subunit. The protein encoded by this gene is an ATP-specific SCS beta subunit that dimerizes with the SCS alpha subunit to form SCS-A, an essential component of the tricarboxylic acid cycle. SCS-A hydrolyzes ATP to convert succinate to succinyl-CoA. Defects in this gene are a cause of myopathic mitochondrial DNA depletion syndrome. A pseudogene of this gene has been

found on chromosome 6. [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 <u>custom shRNA service</u>.





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).