

# **Product datasheet for TR309586**

## **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

### SDHD Human shRNA Plasmid Kit (Locus ID 6392)

#### **Product data:**

**Product Type:** shRNA Plasmids

**Product Name:** SDHD Human shRNA Plasmid Kit (Locus ID 6392)

**Locus ID:** 6392

Synonyms: CBT1; CII-4; CWS3; cybS; MC2DN3; PGL; PGL1; QPs3; SDH4

Vector: pRS (TR20003)

E. coli Selection: Ampicillin

Mammalian Cell Puromycin

Selection: Format:

Format: Retroviral plasmids

Components: SDHD - Human, 4 unique 29mer shRNA constructs in retroviral untagged vector(Gene ID =

6392). 5µg purified plasmid DNA per construct

29-mer scrambled shRNA cassette in pRS Vector, TR30012, included for free.

RefSeq: NM 001276503, NM 001276504, NM 001276506, NM 003002, NR 077060, NM 003002.1,

NM 003002.2, NM 003002.3, NM 001276503.1, NM 001276504.1, NM 001276506.1, BC009574, BC009574.1, BC005263, BC012603, BC015188, BC015992, BC022350, BC070307, BC071755, BC071756, NM 001276506.2, NM 001276503.2, NM 001276504.2, NM 003002.4

UniProt ID: 014521

**Summary:** This gene encodes a member of complex II of the respiratory chain, which is responsible for

the oxidation of succinate. The encoded protein is one of two integral membrane proteins anchoring the complex to the matrix side of the mitochondrial inner membrane. Mutations in this gene are associated with the formation of tumors, including hereditary paraganglioma. Transmission of disease occurs almost exclusively through the paternal allele, suggesting that

this locus may be maternally imprinted. There are pseudogenes for this gene on

chromosomes 1, 2, 3, 7, and 18. Alternative splicing results in multiple transcript variants.

[provided by RefSeq, Feb 2013]

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).