

Product datasheet for TR308501

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

UGT1A4 Human shRNA Plasmid Kit (Locus ID 54657)

Product data:

Product Type: shRNA Plasmids

Product Name: UGT1A4 Human shRNA Plasmid Kit (Locus ID 54657)

Locus ID: 54657

Synonyms: GNT1; hUG-BR1; HUG-BR2; UDPGT; UDPGT 1-4; UGT-1A; UGT-1D; UGT1; UGT1-01; UGT1-04;

UGT1.1; UGT1.4; UGT1A; UGT1A1; UGT1A4S; UGT1D

Vector: pRS (TR20003)

E. coli Selection: Ampicillin

Mammalian Cell Puromycin

Selection:

Format: Retroviral plasmids

Components: UGT1A4 - Human, 4 unique 29mer shRNA constructs in retroviral untagged vector(Gene ID =

54657). 5µg purified plasmid DNA per construct

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

RefSeq: NM 007120, NM 007120.1, NM 007120.2, BC121036, BC131623, BC139784, NM 007120.3

UniProt ID: P22310

Summary: This gene encodes a UDP-glucuronosyltransferase, an enzyme of the glucuronidation

pathway that transforms small lipophilic molecules, such as steroids, bilirubin, hormones, and drugs, into water-soluble, excretable metabolites. This gene is part of a complex locus that encodes several UDP-glucuronosyltransferases. The locus includes thirteen unique alternate first exons followed by four common exons. Four of the alternate first exons are considered pseudogenes. Each of the remaining nine 5' exons may be spliced to the four common exons, resulting in nine proteins with different N-termini and identical C-termini. Each first exon encodes the substrate binding site, and is regulated by its own promoter. This enzyme has some glucuronidase activity towards bilirubin, although is is more active on

amines, steroids, and sapogenins. [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).