Product datasheet for TL308618

Hamartin (TSC1) Human shRNA Plasmid Kit (Locus ID 7248)

Product data:

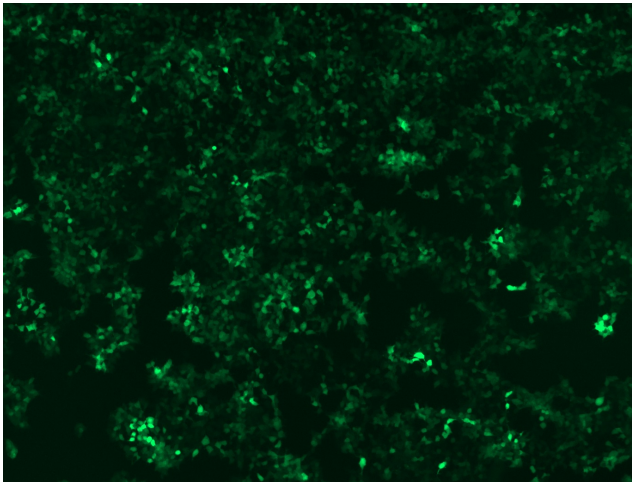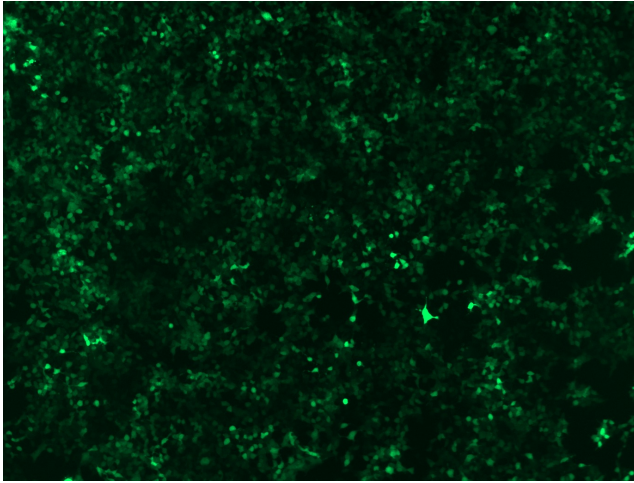|	
Product Type:	shRNA Plasmids
Product Name:	Hamartin (TSC1) Human shRNA Plasmid Kit (Locus ID 7248)
Locus ID:	7248
Synonyms:	LAM; TSC
Vector:	pGFP-C-shLenti (TR30023)
E. coli Selection:	Chloramphenicol (34 ug/ml)
Mammalian Cell Selection:	Puromycin
Format:	Lentiviral plasmids
Components:	TSC1 - Human, 4 unique 29mer shRNA constructs in lentiviral GFP vector(Gene ID = 7248). 5µg purified plasmid DNA per construct 29-mer scrambled shRNA cassette in pGFP-C-shLenti Vector, TR30021, included for free.
RefSeq:	NM_000368, NM_001008567, NM_001162426, NM_001162427, NM_000368.1, NM_000368.2, NM_000368.3, NM_000368.4, NM_001162427.1, NM_001162426.1, NM_001008567.1, BC047772, BC070032, BC108668, BC121000, BC167824, NM_001362177, NM_001162427.2, NM_001162426.2
UniProt ID:	Q92574
Summary:	This gene is a tumor suppressor gene that encodes the growth inhibitory protein hamartin. The encoded protein interacts with and stabilizes the GTPase activating protein tuberin. This hamartin-tuberin complex negatively regulates mammalian target of rapamycin complex 1 (mTORC1) signalling which is a major regulator of anabolic cell growth. This protein also functions as a co-chaperone for Hsp90 that inhibits its ATPase activity. This protein functions as a facilitator of Hsp90-mediated folding of kinase and non-kinase clients, including Tsc2 and thereby preventing their ubiquitination and proteasomal degradation. Mutations in this gene have been associated with tuberous sclerosis. [provided by RefSeq, Apr 2018]
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 techsupport@origene.com. If you need a special design or shRNA sequence, please utilize our custom shRNA service.

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.
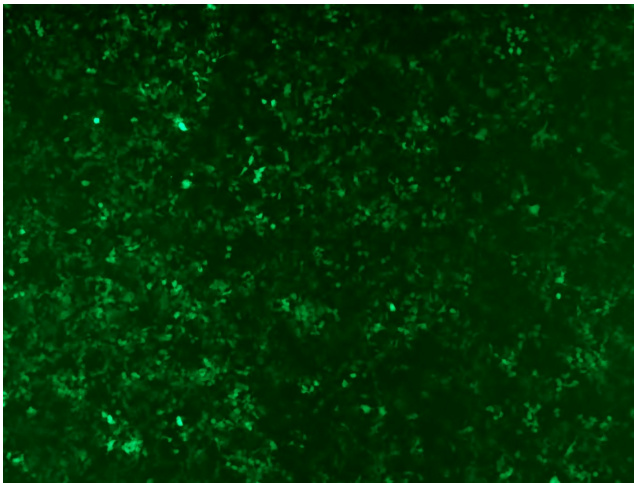
For non-conforming shRNA, requests for replacement product must be made within ninety (90) days from the date of delivery of the shRNA kit. To arrange for a free replacement with newly designed constructs, please contact Technical Services at techsupport@origene.com. Please provide your data indicating the transfection efficiency and measurement of gene expression knockdown compared to the scrambled shRNA control (Western Blot data preferred).

Product images:

GFP signal was observed under microscope at 48 hours after transduction of TL308618A virus into HEK293 cells. TL308618A virus was prepared using lenti-shRNA TL308618A and [TR30037] packaging kit.
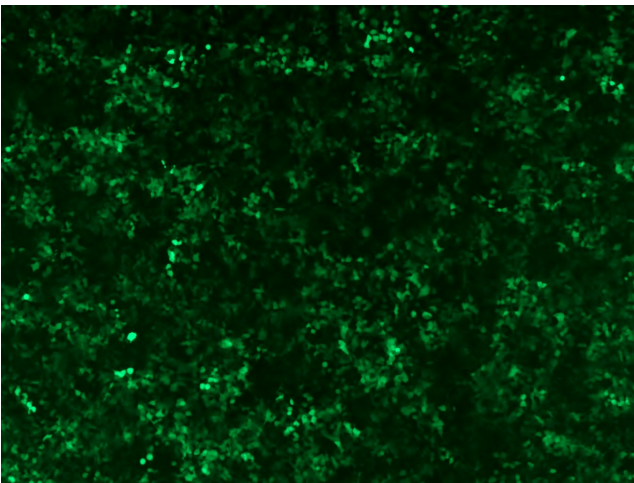
GFP signal was observed under microscope at 48 hours after transduction of TL308618B virus into HEK293 cells. TL308618B virus was prepared using lenti-shRNA TL308618B and [TR30037] packaging kit.

GFP signal was observed under microscope at 48 hours after transduction of [TL308618C] virus into HEK293 cells. [TL308618C] virus was prepared using lenti-shRNA [TL308618C] and [TR30037] packaging kit.

GFP signal was observed under microscope at 48 hours after transduction of [TL308618D] virus into HEK293 cells. [TL308618D] virus was prepared using lenti-shRNA [TL308618D] and [TR30037] packaging kit.