

## **Product datasheet for TL712758**

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## Adh7 Rat shRNA Plasmid (Locus ID 171178)

**Product data:** 

**Product Type:** shRNA Plasmids

**Product Name:** Adh7 Rat shRNA Plasmid (Locus ID 171178)

**Locus ID:** 171178

**Vector:** pGFP-C-shLenti (TR30023)

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

Mammalian Cell Purc

Selection:

Puromycin

Format: Lentiviral plasmids

Components: Adh7 - Rat, 4 unique 29mer shRNA constructs in lentiviral GFP vector(Gene ID = 171178). 5µg

purified plasmid DNA per construct

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

RefSeq: <u>NM 134329, NM 134329.1</u>

UniProt ID: P41682

Summary: Catalyzes the NAD-dependent oxidation of all-trans-retinol, alcohol, aldehyde and omega-

hydroxy fatty acids and their derivatives. Oxidizes preferentially all trans-retinol, all-trans-4-hydroxyretinol, 9-cis-retinol, 2-hexenol, and long chain omega-hydroxy fatty acids such as juniperic acid. In vitro can also catalyzes the NADH-dependent reduction of all-trans-retinal and aldehydes and their derivatives. Reduces preferentially all trans-retinal, all-trans-4-oxoretinal and hexanal. Catalyzes in the oxidative direction with higher efficiency. Therefore may participate in retinoid metabolism, fatty acid omega-oxidation, and elimination of cytotoxic aldehydes produced by lipid peroxidation.[UniProtKB/Swiss-Prot Function]

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).