

## Product datasheet for RC209656L1

#### 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

OriGene Technologies, Inc.

## ALDH1A3 (NM\_000693) Human Tagged Lenti ORF Clone

**Product data:** 

**Product Type:** Expression Plasmids

Product Name: ALDH1A3 (NM 000693) Human Tagged Lenti ORF Clone

Tag: Myc-DDK Symbol: ALDH1A3

Synonyms: ALDH1A6; ALDH6; MCOP8; RALDH3

Mammalian Cell None

Selection:

Vector:pLenti-C-Myc-DDK (PS100064)E. coli Selection:Chloramphenicol (34 ug/mL)

ORF Nucleotide The ORF insert of this clone is exactly the same as(RC209656).

Sequence:

**Restriction Sites:** Sgfl-Mlul

Cloning Scheme:





<sup>\*</sup> The last codon before the Stop codon of the ORF.

**ACCN:** NM\_000693

ORF Size: 1536 bp





### ALDH1A3 (NM\_000693) Human Tagged Lenti ORF Clone - RC209656L1

**OTI Disclaimer:** The molecular sequence of this clone aligns with the gene accession number as a point of

reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone is substantially in agreement with the reference, but a complete review of all prevailing

variants is recommended prior to use. More info

**OTI Annotation:** This clone was engineered to express the complete ORF with an expression tag. Expression

varies depending on the nature of the gene.

**Components:** The ORF clone is ion-exchange column purified and shipped in a 2D barcoded Matrix tube

containing 10ug of transfection-ready, dried plasmid DNA (reconstitute with 100 ul of water).

**Reconstitution Method:** 1. Centrifuge at 5,000xg for 5min.

2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.

3. Close the tube and incubate for 10 minutes at room temperature.

4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid

at the bottom.

5. Store the suspended plasmid at -20°C. The DNA is stable for at least one year from date of

shipping when stored at -20°C.

**RefSeq:** <u>NM 000693.1</u>

RefSeq Size: 3622 bp RefSeq ORF: 1539 bp

Locus ID: 220

UniProt ID: P47895 Cytogenetics: 15q26.3

**Domains:** aldedh

**Protein Families:** Druggable Genome

Protein Pathways: Drug metabolism - cytochrome P450, Glycolysis / Gluconeogenesis, Histidine metabolism,

Metabolic pathways, Metabolism of xenobiotics by cytochrome P450, Phenylalanine

metabolism, Tyrosine metabolism

**MW:** 56.1 kDa

**Gene Summary:** This gene encodes an aldehyde dehydrogenase enzyme that uses retinal as a substrate.

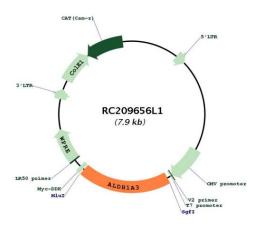
Mutations in this gene have been associated with microphthalmia, isolated 8, and expression

changes have also been detected in tumor cells. Alternative splicing results in multiple

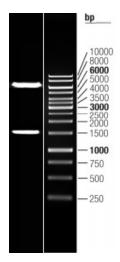
transcript variants. [provided by RefSeq, Jun 2014]



# **Product images:**



Circular map for RC209656L1



Double digestion of RC209656L1 using Sgfl and Mlul