

## Product datasheet for **RG213517**

### DIAPH1 (NM\_001079812) Human Tagged ORF Clone

#### Product data:

Product Type:	Expression Plasmids
Product Name:	DIAPH1 (NM_001079812) Human Tagged ORF Clone
Tag:	TurboGFP
Symbol:	DIAPH1
Synonyms:	DFNA1; DIA1; DRF1; hDIA1; LFHL1; SCBMS
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)
ORF Nucleotide Sequence:	>RG213517 representing NM_001079812 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
GCC**CGATCGCC**

ATGGAGCCGCCCGGGAGCCTGGGGCCCGCCGGGACCCGGGACAAGAAGAAGGGCCGGAGCCAG  
ATGAGCTGCCCTCGGCGGGCGGACGGCGCAAATCTAAGAAATTTCTGGAGAGATTTACCAGCATGAG  
AATTAAGAAGGAGAAGGAAAAGCCCAATCTGCTCATAGAAATTTCTGTCATCATATGGGGATGATCCC  
ACAGCACAGTCATTGCAAGATGTTTCAGATGAACAAGTGTGGTCTCTTTGAACAGATGCTGCTGGATA  
TGAACCTGAATGAGGAGAACAGCAACCTTTGAGGGAGAAGGACATCATCAAGAGGGAGATGGTGTC  
CCAATACTTGTACACCTCCAAGGCTGGCATGAGCCAGAAGGAGAGCTCTAAGTCTGCCATGATGTATATT  
CAGGAGTTGAGGTCAGGCTTGC GGATATGCCTCTGCTCAGCTGCCTGGAGTCCCTTCGTGTCTCTCA  
ACAACAACCTGTGAGTTGGGTGCAAACATTTGGTGTGAAGGCTTGGCCTCCTTATTGGACATTCTTAA  
ACGACTTCATGATGAGAAAGAAGAGACTGCTGGGAGTTACGATAGCCGGAACAAGCATGAGATCATTGCG  
TGCTTGAAAGCTTTTATGAACAACAAGTTTGAATCAAGACCATGTTGGAGACAGAAGAAGGAATCCTAC  
TGCTGGTCAGAGCCATGGATCCTGCTGTCCCAACATGATGATTGATGCAGCTAAGCTGCTTCTGCTCT  
TTGATTTCTACCGCAGCCAGAGGACATGAATGAAAGGGTTTTGGAGGCAATGACAGAAAGAGCTGAGATG  
GATGAAGTGAACGTTTTCCAGCCGCTGCTGGATGGATTA AAAAGTGAACCACTATTGCCTGAAGTTG  
GATGCCTACAGCTGATCAATGCTCTCATCACACCAGCGGAGAACTTGACTTCCGAGTTCACATCAGAAG  
TGAACCTGATGCGTTTGGGGCTACATCAGGTGTTGCAGGACCTTCGAGAGATTGAAAATGAAGATATGAGA  
GTGCAACTAAATGTGTTTATGAACAAGGGGAAGAGGATTCTATGACCTGAAGGGACGGCTGGATGACA  
TTCGCATGGAGATGGATGACTTTAATGAAGTCTTTCAGATTCTCTTAAACACAGTGAAGGATTCAAAGGC  
AGAGCCACACTTCTTCCATCCTGCAGCACTTACTCTTGGTCCGAAATGACTATGAGGCCAGACCTCAG  
TACTATAAGTTGATTGAAGAATGTATTTCCAGATAGTTCTGCACAAGAACGGGGCTGATCTGACTTCA  
AGTGCCCGCACCTCCAGATTGAGATTGAGGGATTAATTGATCAAATGATTGATAAGACAAAGGTGGAGAA  
ATCTGAAGCCAAAGCTGCAGAGCTGAAAAGAAGTTGGACTCAGAGTTAACAGCCCGACATGAGCTACAG



[View online »](#)



**Protein Sequence:** >RG213517 representing NM\_001079812  
Red=Cloning site Green=Tags(s)

```
MEPPGGS LGPGRGTRDKKKGRSPDELPSAGDGGKSKKFLERFTSMRIKKEKEKPNSAHRNSSASYGDDP
TAQSLQDVSDQVLVLFQMLLDMNLNEEKQQLREKDI I IKREMVSYLYTSKAGMSQKESKSSAMMYI
QELRSGLRDMP LLSCELSRVSLNNPVSWVQTFGAEGLASLLDILKRLHDEKEETAGSYDSRNKHEIIR
CLKAFMNNKFGIKTMLETEEGILLVRAMPVAVPNMMIDAAKLLSALCILPQPEDMNERVLEAMTERAEM
DEVERFQPLLDGLKSGTTIALKVGCLQLINALITPAEELDFRVHIRSELMRLGLHQVLQDLREIENEDMR
VQLNVFDEQGEEDSYDLKGRLLDDIRMEDDFNEVFQILLNTVKDSKAEPHFLSILQHL LVRNDYEARPQ
YYKLIIEECISQIVLHKNAGDPDFKCRHLQIEIEGLIDQMIDKTKVEKSEAKAAELEKKLDSEL TARHELQ
VEMKME SDFEQKLQDLQGEKDALHSEKQQIATEKQDLEAEVSQLTGEVAKL TKELEDAKKEMASLSAAA
ITVPPSVPSRAPVPPAPPLPGDSGTIIPPPPAPGDSTTPPPPPPPPPPPPLPGGVCISSPPSLPGGTAIS
PPPLSGDATIPPPPLPEGVGI PPSSSLPGGTAI PPPPLPGSARIPPPPPPLPGSAGIPPPPPPLPGE
AGMPPPPPPLPGGPGIPPPPPFPGGPGIPPPPPGMGMPPPPPFGFVPAAPVLPFGLTPKKLYKPEVQLR
RPNWSKLV AEDLSQDCFWTKVKEDRFENNELFAKLTLTFSAQTKTSKAKKDQEGGEEKSVQKKKVKELK
VLDSKTAQNLSIFLGSFRMPYQEIKNVILEVNEAVL TSMIQNLIKQMPPEQLKMLSELKDEYDDLAES
EQFGVVMGTVPRLRPRLNAILFKLQFSEQVENIKPEIVSVTAACEELRKSEFSNLL EITLLVGNYMAG
SRNAGAFGNISFLCKLRDTKSTDQKMTLLHFLAELCENDYPDVLKFPDELAHVEKASRVS AENLQKND
QMKKQISDVERDVQNFPAATDEKDKFVEKMTSFVKDAQEQYNKLRMMHNSMETLYKELGEYFL FDKKLS
VEEFFMDLHNFRNMFQAVKENQKRRETEEKMRRAKLAKEKAERLEKQKREQLIDMNAEGDETGVMD
SLLLEALQSGAAFRRKRGRPRQANRKAGCAVTSLLASELTKDDAMA AVPAKVSKNSETFPTILEEKELVGR
AS
```

TRTRPLE - GFP Tag - V

**Restriction Sites:**

SgfI-MluI

**Cloning Scheme:**

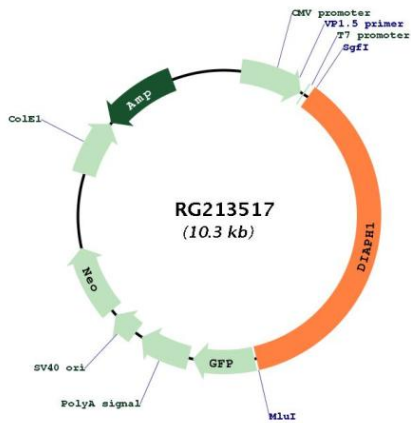


**ACCN:** NM\_001079812

**ORF Size:** 3786 bp

<b>OTI Disclaimer:</b>	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. <a href="#">More info</a>
<b>OTI Annotation:</b>	This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.
<b>Components:</b>	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).
<b>Reconstitution Method:</b>	<ol style="list-style-type: none"><li>1. Centrifuge at 5,000xg for 5min.</li><li>2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.</li><li>3. Close the tube and incubate for 10 minutes at room temperature.</li><li>4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.</li><li>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.</li></ol>
<b>RefSeq:</b>	<a href="#">NM_001079812.3</a>
<b>RefSeq Size:</b>	5718 bp
<b>RefSeq ORF:</b>	3792 bp
<b>Locus ID:</b>	1729
<b>UniProt ID:</b>	<a href="#">O60610</a>
<b>Cytogenetics:</b>	5q31.3
<b>Protein Families:</b>	Druggable Genome, Stem cell - Pluripotency
<b>Protein Pathways:</b>	Focal adhesion, Regulation of actin cytoskeleton
<b>Gene Summary:</b>	This gene is a homolog of the Drosophila diaphanous gene, and has been linked to autosomal dominant, fully penetrant, nonsyndromic sensorineural progressive low-frequency hearing loss. Actin polymerization involves proteins known to interact with diaphanous protein in Drosophila and mouse. It has therefore been speculated that this gene may have a role in the regulation of actin polymerization in hair cells of the inner ear. Alternatively spliced transcript variants encoding distinct isoforms have been found for this gene. [provided by RefSeq, Jul 2008]

Product images:



Circular map for RG213517