

## Product datasheet for **MG227214**

### Apod (NM\_007470) Mouse Tagged ORF Clone

#### Product data:

**Product Type:** Expression Plasmids  
**Product Name:** Apod (NM\_007470) Mouse Tagged ORF Clone  
**Tag:** TurboGFP  
**Symbol:** Apod  
**Mammalian Cell Selection:** Neomycin  
**Vector:** pCMV6-AC-GFP (PS100010)  
**E. coli Selection:** Ampicillin (100 ug/mL)  
**ORF Nucleotide Sequence:** >MG227214 representing NM\_007470  
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
 GCC**CGATCGCC**

ATGGTGACCATGCTGATGTTCTCTGGCCACGCTGGCGGGTCTCTTCACCACAGCCAAAGGACAAAATTTCC  
 ATCTTGGGAAATGCCCGTCTCCTCCTGTGCAAGAGAATTTTGACGTGAAAAAGTATCTTGGAGATGGTA  
 CGAAATGAGAAGATCCCAGCGAGCTTTGAGAAAGGAACTGCATTCAAGCCAACACTCGCTGATGGAG  
 AACGAAAACATCGAAGTGCTAAACAAGGAGCTGAGTCTGATGGAACCATGAACCAAGTAAAGGGTGAAG  
 CCAAACAGAGCAACGTCTCAGAGCCAGCCAAGCTGGAAGTCCAGTCTTCCCGTTGATGCCACCGGCACC  
 CTAATGGATCCTGGCCACTGATTATGAAAACATGCCCCTCGTGTACTCCTGCACCACCTTCTTCTGGCTC  
 TTCCATGTGGATTTTGTGGATTCTTGAAGAAATCCTTATCTCCCTCCAGAAACAATAACCTACCTAA  
 AAGATATCCTTACTTCTAATGGCATCGACATCGAAAAATGACAACAACAGATCAAGCGAACTGCCCGGA  
 CTTCTCTG

**ACGCGTACGCGGCCGCTCGAG** - GFP Tag - GTTTAA

**Protein Sequence:** >MG227214 representing NM\_007470  
 Red=Cloning site Green=Tags(s)

MVTMLMFLATLAGLFTTAKGQNFHLGKCPSPVQENFDVKKYLGRWYEIEKIPASFKEKNCIQANYSLME  
 NGNIEVLNKLSPDGTMNQVKGEAKQSNVSEPAKLEVVQFFPLMPPAPYWLATDYENYALVYSCTTFFWL  
 FHVDFVWILGRNPYLPETITLYLKDILTSNGIDIEKMTTDDQANCPDFL

**TRTRPLE** - GFP Tag - V

**Restriction Sites:** SgfI-MluI

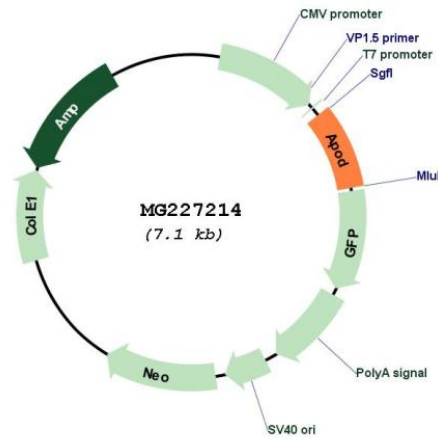


Cloning Scheme:

Cloning sites used for ORF Shutting:



Plasmid Map:



ACCN: NM\_007470

ORF Size: 567 bp

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.

<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_007470.3</a> , <a href="#">NP_031496.2</a>
<b>RefSeq Size:</b>	1862 bp
<b>RefSeq ORF:</b>	570 bp
<b>Locus ID:</b>	11815
<b>UniProt ID:</b>	<a href="#">P51910</a>
<b>Cytogenetics:</b>	16 21.41 cM
<b>Gene Summary:</b>	The protein encoded by this gene is a component of high-density lipoprotein (HDL), but is unique in that it shares greater structural similarity to lipocalin than to other members of the apolipoprotein family, and has a wider tissue expression pattern. The encoded protein is involved in lipid metabolism, and ablation of this gene results in defects in triglyceride metabolism. Elevated levels of this gene product have been observed in multiple tissues of Niemann-Pick disease mouse models, as well as in some tumors. Alternative splicing results in multiple transcript variants. [provided by RefSeq, Aug 2014]