

Product datasheet for **RG206296**

ITGA7 (NM_002206) Human Tagged ORF Clone

Product data:

Product Type: Expression Plasmids
 Product Name: ITGA7 (NM_002206) Human Tagged ORF Clone
 Tag: TurboGFP
 Symbol: ITGA7
 Mammalian Cell Selection: Neomycin
 Vector: pCMV6-AC-GFP (PS100010)
 E. coli Selection: Ampicillin (100 ug/mL)
 ORF Nucleotide Sequence: >RG206296 representing NM_002206
 Red=Cloning site Blue=ORF Green=Tags(s)

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 GCC**CGATCGCC**

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ACGCGTACGCGGCCGCTCGAG – GFP Tag – GTTTAA

Protein Sequence:

>RG206296 representing NM_002206

Red=Cloning site Green=Tags(s)

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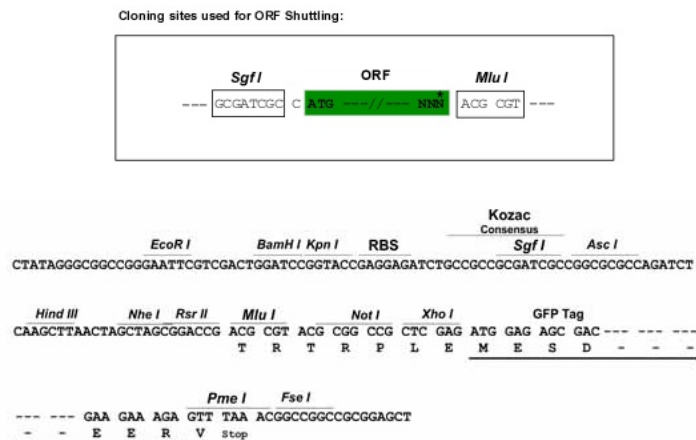
TRTRPLE – GFP Tag – V

Chromatograms:

https://cdn.origene.com/chromatograms/ja2445_c06.zip

Restriction Sites: SgfI-MluI

Cloning Scheme:



ACCN: NM_002206

ORF Size: 3411 bp

OTI Disclaimer: Due to the inherent nature of this plasmid, standard methods to replicate additional amounts of DNA in E. coli are highly likely to result in mutations and/or rearrangements. Therefore, OriGene does not guarantee the capability to replicate this plasmid DNA. Additional amounts of DNA can be purchased from OriGene with batch-specific, full-sequence verification at a reduced cost. Please contact our customer care team at custsupport@origene.com or by calling 301.340.3188 option 3 for pricing and delivery.

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: [NM_002206.2](#), [NP_002197.2](#)

RefSeq Size: 4138 bp

RefSeq ORF: 3414 bp

Locus ID: 3679

UniProt ID: [Q13683](#)

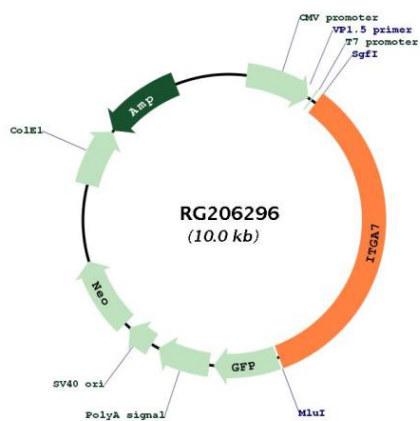
Cytogenetics: 12q13.2

Protein Families: Druggable Genome, Transmembrane

Protein Pathways: Arrhythmogenic right ventricular cardiomyopathy (ARVC), Dilated cardiomyopathy, ECM-receptor interaction, Focal adhesion, Hypertrophic cardiomyopathy (HCM), Regulation of actin cytoskeleton

Gene Summary: The protein encoded by this gene belongs to the integrin alpha chain family. Integrins are heterodimeric integral membrane proteins composed of an alpha chain and a beta chain. They mediate a wide spectrum of cell-cell and cell-matrix interactions, and thus play a role in cell migration, morphologic development, differentiation, and metastasis. This protein functions as a receptor for the basement membrane protein laminin-1. It is mainly expressed in skeletal and cardiac muscles and may be involved in differentiation and migration processes during myogenesis. Defects in this gene are associated with congenital myopathy. Alternatively spliced transcript variants encoding different isoforms have been noted for this gene. [provided by RefSeq, Feb 2009]

Product images:



Circular map for RG206296