

Product datasheet for **RG211534**

PRDM16 (NM_199454) Human Tagged ORF Clone

Product data:

Product Type: Expression Plasmids
Product Name: PRDM16 (NM_199454) Human Tagged ORF Clone
Tag: TurboGFP
Symbol: PRDM16
Synonyms: CMD1LL; KMT8F; LVNC8; MEL1; PFM13
Mammalian Cell Selection: Neomycin
Vector: pCMV6-AC-GFP (PS100010)
E. coli Selection: Ampicillin (100 ug/mL)
ORF Nucleotide Sequence: >RG211534 representing NM_199454
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCC**CGATCGCC**

ATGCGATCCAAGGCGAGGGCGAGGAAGCTAGCCAAAAGTGACGGTGACGTTGTAATAATATGTATGAGC
CCAACCGGACCTGCTGGCCAGCCACAGCGCGGAGGACGAGGCCGAGGACAGTGCATGTCGCCCCATCCC
CGTGGGGCCACCGTCCCCCTTCCCACCAGCGAGGACTTACCCCAAGGAGGGCTCGCCGTACGAGGCC
CCTGTCTACATTCCTGAAGACATTCGATCCCAGCAGACTTCGAGCTCCGAGAGTCTCCATCCCAGGGG
CTGGCCTGGGGTCTGGGCAAGAGGAAGATGGAAGCCGGGAGAGGCTGGGCCCTGCGTGGTGGTGCC
CCGGGCGCGGCAAGGAGACAGACTTCGATGGGAGCAAATACTGACGGACGTGGAAGTGTGCCCCAG
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TCCAGGCCGACCCGGGGAGCCTGCCCTTCTCCACGGCGCCTCCACGTTCCCCGCACTACCCCCGGCT
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CCACCTTAGATTCTGAGGCTTTAAAACATACACTGTGCAGGCAGGCTAAGAACCAGGGTTCTCTGGACGC
TTGGTTGAAGGTCACTGGAGCCAGCTCGGAGTCTGGAGCATTTCACCCCATCAACCACCTC

ACGCGTACGCGGCCGCTCGAG – GFP Tag – GTTAA

Protein Sequence: >RG211534 representing NM_199454
 Red=Cloning site Green=Tags(s)

MRSKARARKLAKSDGDVVNNMYEPNRDLLASHSAEDEAEDSAMSPIPVGGPPSPFPPTSEDFTPKEGSPYEA
 PVYIPEDIPIPADFELRESSIPGAGLGVWAKRMEAGERLGPCVVVPRAAAKETDFGWEQILTDVEVSPQ
 EGCITKISEDLGSEKFCVDANQAGAGSWLKYIRVACSCDDQNL TMCQISEQIYYKVIKDIEPGEELLVHV
 KEGVYPLGTVPPGLDEEPTFRCDCEDELFSKLDLRRHKKYTCGSVGAALYEGLAEELKPEGLGGGSGQA
 HECKDCERMFPNKYSLEQHMVIHTEEREYKCDQCPKAFNWKSNLIRHQMSHDSGKRFECENCVKVFTDPS
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 TQIKCKDCGQMFSTTSSLNKHRRFCEGKNHYTPGGIFAPGLPLTPSPMDKAKPSPSLNHASLGFNEYFP
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 EKYFGPGFMGMQEKKLGSLPYHSAFPFQFLPNFPHSLYPFTDRALAHNLLVKAEPKSPRDALKVGGPSAE
 CPFDLTTKPKDVKPILPMPKGPSAPASGEEQPLDLSIGSRARASQNGGGREPRKNHVVYGERKLGAGEGLP
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 FAAMKADSGSSLQPLPHHPFNFRSPPPTLSDPILRKGKERYTCRYCGKIFPRSANLTRHLRHTHTGEQPYR
 CKYCDRSF SISSNLQRHVRNIHNKEKPFKCHLCNRCFGQQTNLDRHLKKHEHENAPVSQHPGVL TNHLGT
 SASSPTSESDNHALLDEKEDSYFSEIRNF IANSEMNASTRTEKRAMQIVDGSACQPLASEKQEDVEE
 EDDDDLEEDDED SLAGKSQDDTVSPAPEPQAAYEDEEDEEPAASLAVGFDHTRCAEDHEGGLLALPEMP
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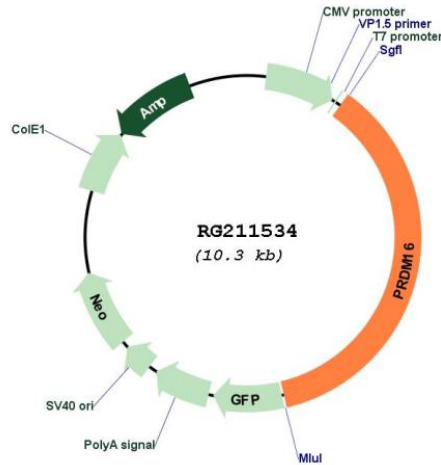
TRTRPLE - GFP Tag - V

Restriction Sites:

Sgfl-MluI

Cloning Scheme:



Plasmid Map:


ACCN: NM_199454

ORF Size: 3771 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.

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_199454.3](#)

RefSeq Size: 8674 bp

RefSeq ORF: 3774 bp

Locus ID: 63976

UniProt ID: [Q9HAZ2](#)

Cytogenetics: 1p36.32

Gene Summary: The reciprocal translocation t(1;3)(p36;q21) occurs in a subset of myelodysplastic syndrome (MDS) and acute myeloid leukemia (AML). This gene is located near the 1p36.3 breakpoint and has been shown to be specifically expressed in the t(1;3)(p36,q21)-positive MDS/AML. The protein encoded by this gene is a zinc finger transcription factor and contains an N-terminal PR domain. The translocation results in the overexpression of a truncated version of this protein that lacks the PR domain, which may play an important role in the pathogenesis of MDS and AML. Alternatively spliced transcript variants encoding distinct isoforms have been reported. [provided by RefSeq, Jul 2008]