

## **Product datasheet for RG213128**

## MAX (NM\_002382) Human Tagged ORF Clone

## **Product data:**

**Product Type:** Expression Plasmids

**Product Name:** MAX (NM\_002382) Human Tagged ORF Clone

Tag: TurboGFP

Symbol: MAX

**Synonyms:** bHLHd4

Mammalian Cell Neomycin

Selection:

Vector: pCMV6-AC-GFP (PS100010)

E. coli Selection: Ampicillin (100 ug/mL)

ORF Nucleotide >RG213128 representing NM\_002382

Sequence: Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC

GCCGCGATCGCC

ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA

Protein Sequence: >RG213128 representing NM\_002382

Red=Cloning site Green=Tags(s)

MSDNDDIEVESDEEQPRFQSAADKRAHHNALERKRRDHIKDSFHSLRDSVPSLQGEKASRAQILDKATEY IQYMRRKNHTHQQDIDDLKRQNALLEQQVRALEKARSSAQLQTNYPSSDNSLYTNAKGSTISAFDGGSDS

SSESEPEEPQSRKKLRMEAS

TRTRPLE - GFP Tag - V

**Restriction Sites:** Sgfl-Mlul



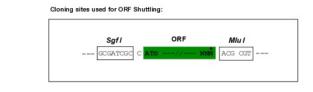
**OriGene Technologies, Inc.** 9620 Medical Center Drive, Ste 200

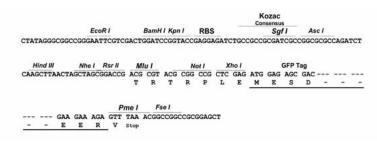
CN: techsupport@origene.cn

Rockville, MD 20850, US Phone: +1-888-267-4436 https://www.origene.com techsupport@origene.com EU: info-de@origene.com



**Cloning Scheme:** 





**ACCN:** NM\_002382

ORF Size: 480 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 <a href="mailto:customer.com">customer.com</a> 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: <u>NM 002382.5</u>

RefSeq Size: 2045 bp RefSeq ORF: 483 bp

Locus ID: 4149
UniProt ID: P61244
Cytogenetics: 14q23.3
Domains: HLH

**Protein Families:** Druggable Genome, Transcription Factors

**Protein Pathways:** MAPK signaling pathway, Pathways in cancer, Small cell lung cancer

**MW:** 18.3 kDa

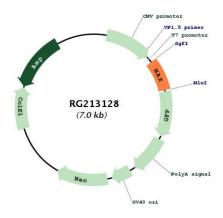
**Gene Summary:** The protein encoded by this gene is a member of the basic helix-loop-helix leucine zipper

(bHLHZ) family of transcription factors. It is able to form homodimers and heterodimers with other family members, which include Mad, Mxi1 and Myc. Myc is an oncoprotein implicated in cell proliferation, differentiation and apoptosis. The homodimers and heterodimers compete for a common DNA target site (the E box) and rearrangement among these dimer forms provides a complex system of transcriptional regulation. Mutations of this gene have been reported to be associated with hereditary pheochromocytoma. A pseudogene of this gene is located on the long arm of chromosome 7. Alternative splicing results in multiple transcript

variants. [provided by RefSeq, Aug 2012]



## **Product images:**



Circular map for RG213128