

# **Product datasheet for MG202008**

## Pttg1 (BC023324) Mouse Tagged ORF Clone

### **Product data:**

**Product Type:** Expression Plasmids

**Product Name:** Pttg1 (BC023324) Mouse Tagged ORF Clone

Tag: TurboGFP

Symbol: Pttg1
Synonyms: PTTG

Mammalian Cell Neomycin

Selection:

**Vector:** pCMV6-AC-GFP (PS100010)

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

ORF Nucleotide >MG202008 representing BC023324

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

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC

GCCGCGATCGCC

TGTTGAATTGCCACCTGTTTGTTACGATGCAGATATT

ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA

**Protein Sequence:** >MG202008 representing BC023324

Red=Cloning site Green=Tags(s)

MATLIFVDKDNEEPGSRLASKDGLKLGSGVKALDGKLQVSTPRVGKVFNAPALPKASRKALGTVNRVAEK PMKTGKPLOPKOPTLTGKKITEKSTKTOSSVPAPDDAYPEIEKFFPFNPLDFESFDLPEEHQISLLPLNG

VPLMTLNEERGLEKLLHLGPPSPLKTPFLSWESDPLYSPPSALSTLDVELPPVCYDADI

TRTRPLE - GFP Tag - V

**Restriction Sites:** Sgfl-Mlul



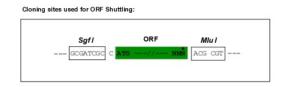
**OriGene Technologies, Inc.** 9620 Medical Center Drive, Ste 200

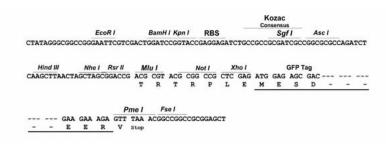
CN: techsupport@origene.cn

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

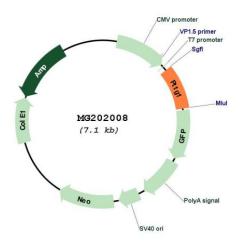


#### **Cloning Scheme:**





#### Plasmid Map:



**ACCN:** BC023324 **ORF Size:** 599 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:** <u>BC023324</u>, <u>AAH23324</u>

RefSeq Size: 746 bp
RefSeq ORF: 599 bp
Locus ID: 30939
Cytogenetics: 11 B1.1

**Gene Summary:** Regulatory protein, which plays a central role in chromosome stability, in the p53/TP53

pathway, and DNA repair. Probably acts by blocking the action of key proteins. During the mitosis, it blocks Separase/ESPL1 function, preventing the proteolysis of the cohesin complex and the subsequent segregation of the chromosomes. At the onset of anaphase, it is ubiquitinated, conducting to its destruction and to the liberation of ESPL1. Its function is however not limited to a blocking activity, since it is required to activate ESPL1. Negatively regulates the transcriptional activity and related apoptosis activity of p53/TP53. The negative regulation of p53/TP53 may explain the strong transforming capability of the protein when it is overexpressed. May also play a role in DNA repair via its interaction with Ku, possibly by connecting DNA damage-response pathways with sister chromatid separation (By similarity).

[UniProtKB/Swiss-Prot Function]