

Product datasheet for **MG220805**

Stk10 (NM_009288) Mouse Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	Stk10 (NM_009288) Mouse Tagged ORF Clone
Tag:	TurboGFP
Symbol:	Stk10
Synonyms:	Gek1; L; Lok; mKIAA4026
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)



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ORF Nucleotide Sequence:

>MG220805 representing NM_009288
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCC**CGCATCGCC**

ATGGCTTTCGCCAATTTCCGCCGCATCTTGCGGTTATCCACCTTCGAGAAGAGAAAGTCCCGTGAATATG
 AGCACGTCGCCCGGACCTGGACCCCAACGATGTATGGGAGATCGTGGGCGAGCTGGGAGACGGCGCCTT
 CGGCAAAGTCTACAAGGCCAAAAACAAGGAGACCGGTGCCCTGGCAGCAGCCAAAGTCATAGAGACCAAG
 AGCGAGGAGGAGCTGGAGGACTACATCGTGGAGATAGAGATCCTGGCCACCTGTGACCACCCGTATATCG
 TGAAGCTCCTGGGGCCTATTACTATGATGGGAAGCTCTGGATCATGATTGAGTTCTGCCCTGGGGGAGC
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 AGCGTGGCCCGCAAAGAGGAGGCCAAGCGGATCCGCCTGGAGCAGGATCGAGACTACGCCAAGTTCCAAG
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 GAATGGCGAGACAAGCTTCGGCCACGAAAAAGGCCCTGGAAGAGGATTTGAACCAGAAGAAGCGGGAAC
 AGGAAATGTTCTCAAATTAAGCGAGGAGGCAGAGCCAGACCCACCCAGCAAGCCAGCAACTT
 CTCCCTACAGCTCTGGGGATGCTTCC

ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA

Protein Sequence: >MG220805 representing NM_009288
 Red=Cloning site Green=Tags(s)

MAFANFRIRLRLSTFEKRKSREYEHVRRDLDPNDVWEIVGELGDGAFGKVKAKNKETGALAAAKVIETK
 SEEELEDYIVEIEILATCDHPYIVKLLGAYYYDGKLVIMIEFCPGGAVDAIMLELDRLGTEPQIQVVCRO
 MLEALNFLHGKRIIHRDLKAGNVLMTLEGDIRLADFGVSAKNLKTQKRDSFIGTPYWMapevvlcetmk
 DAPYDYKADIWSLGITLIEMAQIEPPHHELNPMRVLLKIAKSDPPTLLTPSKWSVEFRDFLKIALDKNPE
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 TSESMYGTSLSADLSLNKETGSLSLKGSKLHNKTLKRTRRFVVDGVEVSIITTSKIISEDEKKDEEMRFL
 RRQELRELRLQKEEHRNQTQLSSKHELQLEQMHRFEQEINAKKKFYDVELENLERQQKQVQEKMEQDH
 SVRRKEEAKRIRLEQDRDYAKFQEQKQMKKEVKSEVEKLPRQQRKESMKQKMEEHSQKQRLDRDFVAK
 QKEDLELAMRKLTTENRREICDKERDCLSKKQELLRDREAALWEMEEHQLQERHQLVKQQLKDQYFLQRH
 DLLRKHKEKEREQMQRYNQRMMEQLKVRQQEKARLPKIQRSDGKTRMAMYKSLHINGAGSASEQREKIK
 QFSQQEEKRQKAERLQQQKQHENQMRDMVAQCESNMSLQQLQNEKCHLLVEHETQKLLKALDESHNQLK
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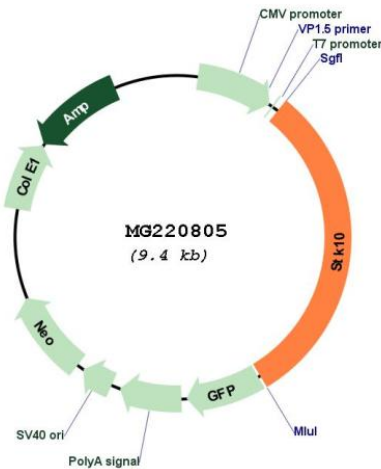
TRTRPLE - GFP Tag - V

Restriction Sites:

SgfI-MluI

Cloning Scheme:



Plasmid Map:


ACCN: NM_009288

ORF Size: 2898 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_009288.2](#), [NP_033314.2](#)

RefSeq Size: 5082 bp

RefSeq ORF: 2901 bp

Locus ID: 20868

UniProt ID: [O55098](#)

Cytogenetics: 11 A4

Gene Summary: This gene encodes a member of the Ste20 family of serine/threonine protein kinases, and is similar to several known polo-like kinase kinases. Mice deficient for this gene product are viable, but exhibit altered integrin-mediated lymphocyte adhesion characteristics. The orthologous gene product in humans can associate with and phosphorylate polo-like kinase 1, and overexpression of a kinase-dead version of the protein interferes with normal cell cycle progression. [provided by RefSeq, Jul 2008]