

Product datasheet for **RG220252**

ITIH3 (NM_002217) Human Tagged ORF Clone

Product data:

Product Type:	Expression Plasmids
Product Name:	ITIH3 (NM_002217) Human Tagged ORF Clone
Tag:	TurboGFP
Symbol:	ITIH3
Synonyms:	H3P; ITI-HC3; SHAP
Mammalian Cell Selection:	Neomycin
Vector:	pCMV6-AC-GFP (PS100010)
E. coli Selection:	Ampicillin (100 ug/mL)



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ORF Nucleotide
Sequence:

>RG220252 representing NM_002217
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCC**CGGATCGCC**

ATGGCATTTCATGGTGGCCCTGTCTCATCTTGGCTCTGCTCTCCAGCTTGGCAGCCTCTGGCTTCCCGA
GAAGCCCTTTTCGGCTGCTTGGGAAACGGAGCCTCCCGGAAGGGTGGCCAATGGCATCGAGGTCTACAG
TACCAAAATCAACTCCAAGGTGACCTCCCGTTTTGCTCACAATGTTGTACCATGAGAGCCGTCAACCGT
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TTGTCTGCTGGTTCGTCACAACAACGGAGAAGGGCTGATTGATGGTGTCCACACTGACTACATTGTCCC
CAACCTGTTT

ACGCGTACGGCGCCGCTCGAG - GFP Tag - GTTTAA

Protein Sequence: >RG220252 representing NM_002217
 Red=Cloning site Green=Tags(s)

MAFAWWPCLILALLSSLAASGFPRSPFRLLGKRSLPEGVANGIEVYSTKINSKVTSRFAHNVVMTRAVNR
 ADTAKEVSDVELPKTAFITNFTLTIDGVTPGNVKEKEVAKKQYEKAVSQGKTAGLVKASGRKLEKFTV
 SVNVAAGSKVTFELTYEELLKRHKGYEMYLKVPKQLVKHFEIEVDIFEPOGISMLDAEASFITNDLLG
 SALTKSFGKKGHVSKPSLDQQRSCPTCTDSLNGDFTITYDVRNRESPGNVQIVNGYFVHFFAPQGLPV
 VPKNVAFVIDISGSMAGRKLEQTKALLRILEDMKEEDYLNILFSGDVSTWKEHLVQATPENLQEARTF
 VKSMEDKGMTNINDGLLRGISMLNKAREEHRIPERSTSIIVIMLTDGDANVGESRPEKIQENVRNAIGGKF
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 LTIEQLLEKRKNAHGEEKENLTARALDLSKYHFVTPLTSMVVTKPEDNERAIADKPGEDAATPVSP
 AMSYLTSYQPQNPYYYVDGDPHFIIQIPEKDDALCFNIDEAPGTVLRLLIQDAVTGLTVNGQITGDKRGS
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 GVTFFVVLHQVWKKHPVHRDFLGFVVDVSHRMSAQTHGLLGQFFQPFDFKVS DIRPGSDPTKPDATLVVK
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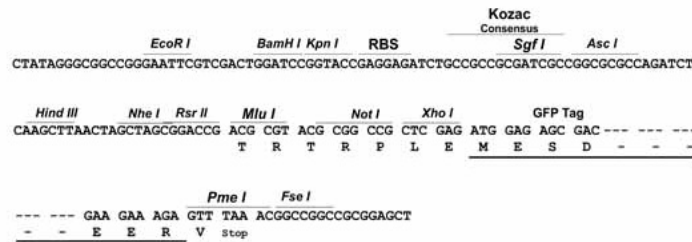
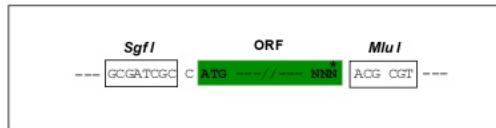
TRTRPLE - GFP Tag - V

Restriction Sites:

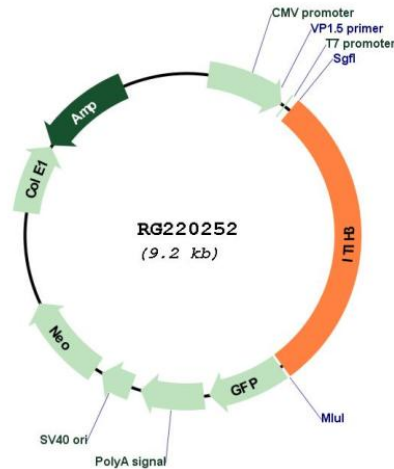
SgfI-MluI

Cloning Scheme:

Cloning sites used for ORF Shuttling:



Plasmid Map:



ACCN: NM_002217

ORF Size: 2670 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_002217.2](#), [NP_002208.2](#)

RefSeq Size: 2809 bp

RefSeq ORF: 2673 bp

Locus ID: 3699

UniProt ID: [Q06033](#)

Cytogenetics: 3p21.1

Domains: VWA, VIT

Gene Summary: This gene encodes the heavy chain subunit of the pre-alpha-trypsin inhibitor complex. This complex may stabilize the extracellular matrix through its ability to bind hyaluronic acid. Polymorphisms of this gene may be associated with increased risk for schizophrenia and major depressive disorder. This gene is present in an inter-alpha-trypsin inhibitor family gene cluster on chromosome 3. [provided by RefSeq, Jul 2015]