

Product datasheet for **MG211781**

Inpp5d (NM_010566) Mouse Tagged ORF Clone

Product data:

Product Type: Expression Plasmids
Product Name: Inpp5d (NM_010566) Mouse Tagged ORF Clone
Tag: TurboGFP
Symbol: Inpp5d
Synonyms: p150Ship; s-SHIP; SHIP; SHIP-1; SHIP1; SIP-145
Mammalian Cell Selection: Neomycin
Vector: pCMV6-AC-GFP (PS100010)
E. coli Selection: Ampicillin (100 ug/mL)
ORF Nucleotide Sequence: >MG211781 representing NM_010566
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCC**CGATCGCC**

ATGCTGCCATGGTCCCTGGGTGGAACCATGGCAACATCACCCGCTCCAAGGCAGAGGAGCTACTTTCCA
GAGCCGGCAAGGACGGGAGCTTCCTTGTGCGTGCCAGCGAGTCCATCCCCGGGCCTACGACTCTGCGT
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GGACACTGAAAGTGCATGTACCACCTGAGTGCCTCCAGAAAACATTCTATGTCTGCCGGGCCAGC
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AGTCTCTGCAGAGGTTGTTTGACCAACAGCTCTCCCCAGGCTTCGCCCACGACCTCAGGTGCCCGGAGA
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CGCATAGTGGTGCTTGCCAAGCCAGAGCATGAGAATCGGATCAGCCATATCTGCACTGACAACGTGAAGA
CAGGCATCGCCAACACCCTGGGAAACAAGGGAGCAGTGGGAGTGTCTTCATGTTCAATGGAACCTCCTT
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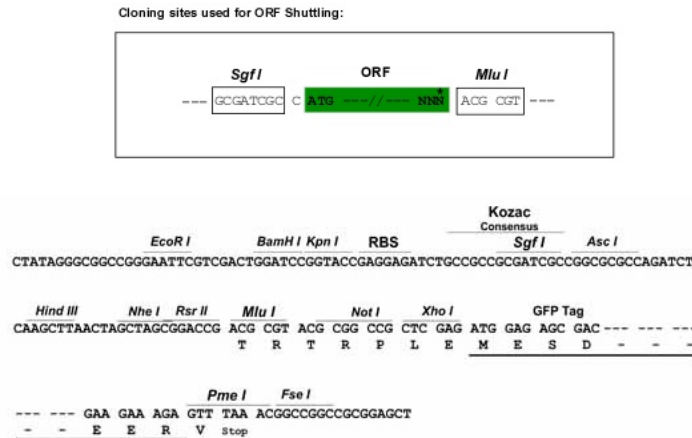
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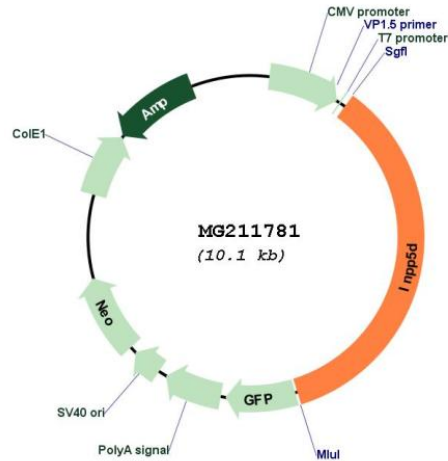
Protein Sequence: >MG211781 representing NM_010566
 Red=Cloning site Green=Tags(s)

MPAMVPGWNHGNITRSKAEELLSRAGKDGSLVRASESIPRAYALCVLFRNCVYTYRILPNEDDKFTVQA
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 EAKDLPLATENPRAPEVTRLSLSETLFQRLQSMDSGLPEEHLKAIQDYLSTQLLLDSDFLKTGSSNLPH
 LKKLMSLLCKELHGEVIRTLPSLESQRLFDQQLSPGLRPRPQVPGGEASPIITMVAKLSQLTSLSSIEDK
 VKSLLHEGSESTNRRSLIPPVTFEVKSESLGIPQKMHKLKVDVESGKLIKKSKDGSSEDFYSHKKILQLI
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 ILRFLALGDKKLSPFNITHRFTHLFWLGDLYRVELPTWEAEAIQKIKQQQYSDLLAHDQLLLERKDQK
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 SDHSPVFATFEAGVTSQFVSKNGPGTVDSQGQIEFLACYATLTKTSQTKFYLEFHSSCLESFVKSQEGEN
 EEGSEGELVVRFGETLPLKPIISDPEYLLDQHILISIKSSDSDESYGEGCIALRLETTEAQHPITYPLT
 HHGEMTGHFRGEIKLQTSQGMREKLYDFVKTERDESSGMKCLKNLTSHDPMRWEPESGRVPACGVSSLN
 EMINPNYIGMPFGQPLHGKSTLSPDQQLTAWSYDQLPKDSSLGPGRGEPPTPPSQPPLSPKFFSSTA
 NRGPCPRVQEARPGDLGKVEALLQEDLLLTKPEMFENPLYGVSVSFPKL VPRKEQESPKMLRKEPPPCPD
 PGISSPSIVLPAQEVEVSKGTSKQAPVPVLGPTPRIRSFTCSSSAEGRMTSGDKSQGPKKASASSQAPV
 PVKRPVKPSRSEMSQQTTPIPAPRPPLPVKSPAVLQLQHSKGRDYRDNTELPHHGKHRQEELGLGRTAMQ

TRTRPLE - GFP Tag - V

Restriction Sites: SgfI-MluI
Cloning Scheme:



Plasmid Map:


ACCN: NM_010566

ORF Size: 4937 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_010566.1](#)

RefSeq Size: 4865 bp

RefSeq ORF: 3576 bp

Locus ID: 16331

UniProt ID: [Q9ES52](#)

Cytogenetics: 1 44.44 cM

Gene Summary:

Phosphatidylinositol (PtdIns) phosphatase that specifically hydrolyzes the 5-phosphate of phosphatidylinositol-3,4,5-trisphosphate (PtdIns(3,4,5)P3) to produce PtdIns(3,4)P2, thereby negatively regulating the PI3K (phosphoinositide 3-kinase) pathways (By similarity). Able also to hydrolyzes the 5-phosphate of phosphatidylinositol-4,5-bisphosphate (PtdIns(4,5)P3) and inositol 1,3,4,5-tetrakisphosphate (PubMed:9367159). Acts as a negative regulator of B-cell antigen receptor signaling. Mediates signaling from the FC-gamma-RIIB receptor (FCGR2B), playing a central role in terminating signal transduction from activating immune/hematopoietic cell receptor systems. Acts as a negative regulator of myeloid cell proliferation/survival and chemotaxis, mast cell degranulation, immune cells homeostasis, integrin alpha-IIb/beta-3 signaling in platelets and JNK signaling in B-cells. Regulates proliferation of osteoclast precursors, macrophage programming, phagocytosis and activation and is required for endotoxin tolerance. Involved in the control of cell-cell junctions, CD32a signaling in neutrophils and modulation of EGF-induced phospholipase C activity. Key regulator of neutrophil migration, by governing the formation of the leading edge and polarization required for chemotaxis. Modulates FCGR3/CD16-mediated cytotoxicity in NK cells. Mediates the activin/TGF-beta-induced apoptosis through its Smad-dependent expression.[UniProtKB/Swiss-Prot Function]