

Product datasheet for **MG202214**

Hspb1 (NM_013560) Mouse Tagged ORF Clone

Product data:

Product Type: Expression Plasmids
Product Name: Hspb1 (NM_013560) Mouse Tagged ORF Clone
Tag: TurboGFP
Symbol: Hspb1
Synonyms: 27kDa; Hsp25
Mammalian Cell Selection: Neomycin
Vector: pCMV6-AC-GFP (PS100010)
E. coli Selection: Ampicillin (100 ug/mL)
ORF Nucleotide Sequence: >MG202214 representing NM_013560
 Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGCCGGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
 GCC**CGATCGCC**

ATGACCGAGCGCCGCGTGCCTTCTCGTGCTGCGGAGCCCGAGCTGGGAACCATTCGGGACTGGTACC
 CTGCACACAGCCGCTCTTCGATCAAGCTTTCGGGGTGCCCGGTTGCCCGATGAGTGGTCGCAGTGTT
 CAGCGCCGCTGGGTGGCCGGATACGTGCGCCCGTCCCGCCGCGACCGCCGAGGGCCCGCGCGGTG
 ACCCTGGCCGACACGCCTTCAGCCGAGCGCTCAACCGACAGCTCAGCAGCGGGTCTCGGAGATCCGAC
 AGACGGCTGATCGCTGGCGCGTGCCTTGACGTCAACCACTTCGCTCCGAGGAGCTCACAGTGAAGAC
 CAAGGAAGGCGTGGTGGAGATCACTGGCAAGCACGAAGAAAGGCAGGACGAACATGGCTACATCTCTCGG
 TGCTTACCCGGAAATACACGCTCCCTCCAGGTGTGGACCCACCTAGTGTCTTCCCTATCCCTG
 AGGGCACACTTACCGTGGAGGCTCCGTTGCCAAAGCAGTCACGCAGTCAGCGGAGATCACCATTCCGGT
 TACTTTCGAGGCCCGCCCAAATTGGGGGCCAGAAGCTGGGAAGTCTGAACAGTCTGGAGCCAAG

ACGCGTACGCGGCCGCTCGAG - GFP Tag - GTTTAA

Protein Sequence: >MG202214 representing NM_013560
 Red=Cloning site Green=Tags(s)

MTERRVPSLLRSPSWEPFRDWYPAHSRLFDQAFGVPRLPDEWSQWFSAGWPYVYRPLPAATAEGPAAV
 TLAAPAFSRALNRQLSSGVSEIRQTADRWRVSLDVNHFAPEELTVKTKEGVVEITGKHEERQDEHGYSR
 CFTRKYTLPPGVDPTLVSSSLSPGTLTVEAPLPKAVTQSAEITIPVTFEARAQIGGPEAGKSEQSGAK

TRTRPLE - GFP Tag - V

Restriction Sites: SgfI-MluI



Cloning Scheme:


ACCN: NM_013560

ORF Size: 627 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_013560.2](#), [NP_038588.2](#)

RefSeq Size: 913 bp

RefSeq ORF: 630 bp

Locus ID: 15507

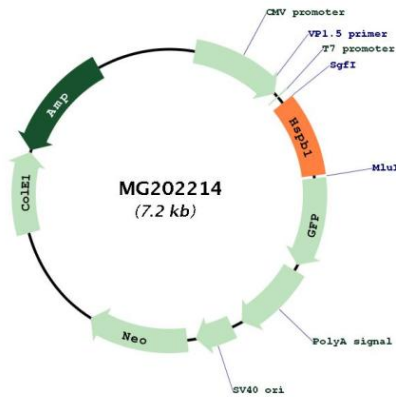
UniProt ID: [P14602](#)

Cytogenetics: 5 75.51 cM

Gene Summary:

Small heat shock protein which functions as a molecular chaperone probably maintaining denatured proteins in a folding-competent state. Plays a role in stress resistance and actin organization (PubMed:17661394). Through its molecular chaperone activity may regulate numerous biological processes including the phosphorylation and the axonal transport of neurofilament proteins (By similarity).[UniProtKB/Swiss-Prot Function]

Product images:



Circular map for MG202214