

Product datasheet for **RC215311**

HES5 (NM_001010926) Human Tagged ORF Clone

Product data:

Product Type: Expression Plasmids
Product Name: HES5 (NM_001010926) Human Tagged ORF Clone
Tag: Myc-DDK
Symbol: HES5
Synonyms: bHLHb38
Mammalian Cell Selection: Neomycin
Vector: pCMV6-Entry (PS100001)
E. coli Selection: Kanamycin (25 ug/mL)
ORF Nucleotide Sequence: >RC215311 representing NM_001010926
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC
GCC**CGATCGCC**

ATGGCCCCAGCACTGTGGCCGTGGAGTGCTCAGCCCCAAAGAGAAAAACCGACTGCGGAAGCCGGTGG
TGGAGAAGATGCGCCGCGACCGCATCAACAGCAGCATCGAGCAGCTGAAGCTGCTGCTGGAGCAGGAGTT
CGCGCGGCACCAGCCCACTCCAAGCTGGAGAAGGCCGACATCCTGGAGATGGCTGTCAGCTACCTGAAG
CACAGCAAAGCCTTCGTCGCCCGCCGCCCAAGAGCCTGCACCAGGACTACAGCGAAGGCTACTCGT
GGTGCCTGCAGGAGGCCGTGAGTTCCTGACGCTCCACGCCGACGACACGCAGATGAAGCTGCTGTA
CCACTTCCAGCGCCCCCGGCCGCGCCCGCCGCGCCCAAGGAGCCCAAGGCGCCGGCGCCGCGCC
CCGCCCGCTCTCCGCAAGGCCACCGCCGCCCGCCGCCGCGCACCAAGCCCGCTGCGGCTCTGGC
GGCCCTGG

ACGCGTACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAATGATATCCTGGATT
ACAAGGATGACGACGATAAGGTTTAA

Protein Sequence: >RC215311 representing NM_001010926
Red=Cloning site Green=Tags(s)

MAPSTVAVELLSPKEKNRLRKPVVEKMRRDRINSSIEQLKLLLEQEFARHQPNKLEKADILEMAVSYLK
HSKAFVAAAGPKSLHQDYSEGYSWCLQEAVQFLTLHAASDTQMKLLYHFQRPPAAPAAPEKAPGAAP
PPALSAKATAAAAAHQACGLWRPW

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

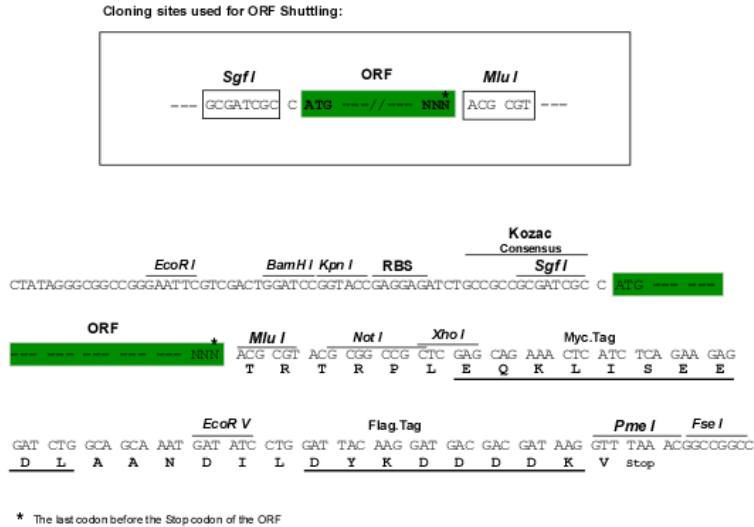
Chromatograms: https://cdn.origene.com/chromatograms/mg2794_b07.zip



[View online »](#)

Restriction Sites: SgfI-MluI

Cloning Scheme:



ACCN: NM_001010926

ORF Size: 498 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_001010926.4](#)

RefSeq Size: 1306 bp

RefSeq ORF: 501 bp

Locus ID: 388585

UniProt ID: [Q5TA89](#)

Cytogenetics: 1p36.32

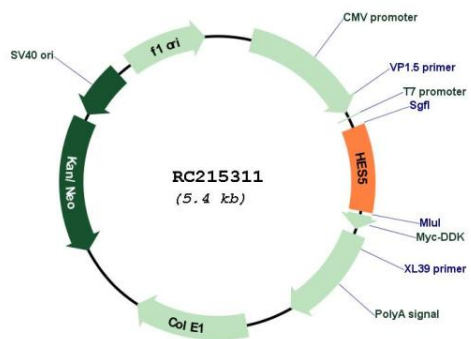
Protein Families: Druggable Genome, ES Cell Differentiation/IPS

Protein Pathways: Notch signaling pathway

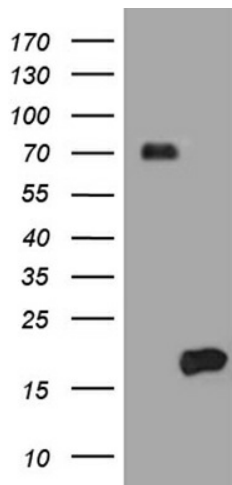
MW: 18 kDa

Gene Summary: This gene encodes a member of a family of basic helix-loop-helix transcriptional repressors. The protein product of this gene, which is activated downstream of the Notch pathway, regulates cell differentiation in multiple tissues. Disruptions in the normal expression of this gene have been associated with developmental diseases and cancer. [provided by RefSeq, Dec 2008]

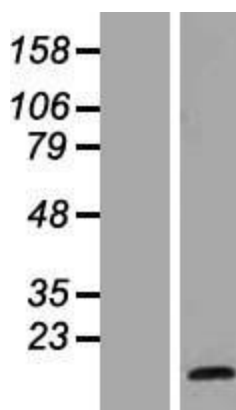
Product images:



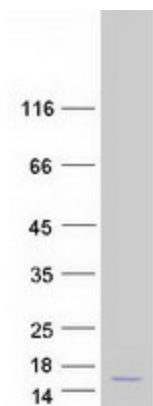
Circular map for RC215311



HEK293T cells were transfected with the pCMV6-ENTRY control (Cat# [PS100001], Left lane) or pCMV6-ENTRY HES5 (Cat# RC215311, Right lane) cDNA for 48 hrs and lysed. Equivalent amounts of cell lysates (5 ug per lane) were separated by SDS-PAGE and immunoblotted with anti-HES5 (Cat# [TA810555])(1:500). Positive lysates [LY423234] (100ug) and [LC423234] (20ug) can be purchased separately from OriGene.



Western blot validation of overexpression lysate (Cat# [LY423234]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from untransfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC215311 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).



Coomassie blue staining of purified HES5 protein (Cat# [TP315311]). The protein was produced from HEK293T cells transfected with HES5 cDNA clone (Cat# RC215311) using MegaTran 2.0 (Cat# [TT210002]).