

## Specifications:

|                |                  |
|----------------|------------------|
| Gene:          | hC10orf54        |
| Accession:     | NP_071436        |
| Insert size:   | 949bp            |
| Concentration: | 10µg at 0.2µg/µL |

## hVISTA/B7-H5/PD-1H cDNA Plasmid

**C10orf54** chromosome 10 open reading frame 54 [ *Homo sapiens* (human) ]

**Also known as:** B7H5; GI24; B7-H5; SISP1; PP2135

### Summary:

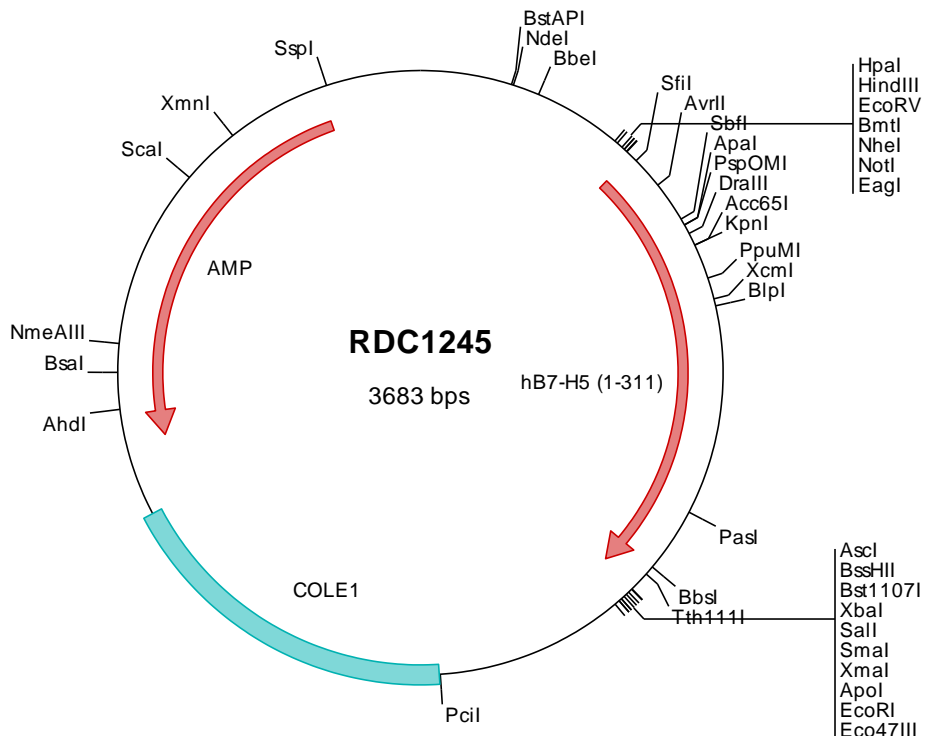
B7-H5 is a member of the Ig superfamily. It is a transmembrane glycoprotein expressed in bone, on embryonic stem cells (ESCs), and on tumor cell surfaces. B7-H5 promotes both MT1 MMP expression and the MT1 MMP mediated activation of MMP 2. B7-H5 undergoes proteolytic cleavage by MT1 MMP, generating a soluble extracellular fragment and a membrane bound fragment. On ESCs, B7-H5 appears to positively interact with BMP 4, potentiating BMP signaling and the transition from an undifferentiated to a differentiated state. Its expression on tumor cells attenuates the anti-tumor immune response and enables more rapid tumor progression.

## Description

This shuttle vector contains the complete ORF for the gene of interest, along with a Kozak consensus sequence for optimal translation initiation. It is inserted NotI to AscI. The gene insert is flanked with convenient multiple cloning sites which can be used to easily cut and transfer the gene cassette into your desired expression vector.

## Preparation and Storage

|             |   |
|-------------|---|
| Formulation | cDNA is provided in 10 mM Tris-Cl, pH 8.5                           |
| Shipping    | Ships at ambient temperature  |
| Stability   | 1 year from date of receipt when stored at -20°C to -80°C           |
| Storage     | Use a manual defrost freezer and avoid repeated freeze-thaw cycles. |



FOR RESEARCH USE ONLY

NOT FOR USE IN HUMANS



### > RDC1245 Plasmid DNA Sequence

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1 tcgcgcggtt cggatgatgac ggtgaaaacc tetgacacat gcagctcccc gagacggtca cagcttgtct gtaagcggat gccgggagca gacaagcccg
101 tcaggggcgc tcagcgggtg ttggcgggtg tetggggctgg cttactatg cggcatcaga gcagattgta ctgagagtgc accatattgc gttgtaaaat
201 ccgcacagat gcgtaaggag aaaataccgc atcaggcgcc attcgccatt caggctgcgc aactgttggg aaggcgatc ggtcggggcc tcttcgctat
301 taaggcagct ggcgaaaggg ggatgtgctg caaggcgatt aagtgggta acggcagggt tttccagtc acgacgtgtg aaaacgacgg ccagtgaatt
401 ggagacgtgt taacaagctt ggatccgata tcgctagcgc ggccgccacc atgggagtc ccacggccct ggaggccggc agctggcgct ggggatccct
501 gctcttcgct ctcttcctgg ctgcgtccct aggtccggtg gcagccttoa aggtcggcac gccgtattcc ctgtatgtct gtcccagggg gcagaacgtc
601 accctcacct gcaggctctt gggocctgtg gacaaagggc aogatgtgac cttctacaag acgtggtacc gcagctcgag gggcgagggt cagacctgct
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1501 aattccacac aacatacgag ccggaagcat aaagtgtaaa gcctgggggtg cctaatgagt gagctaacct acattaattg cgttgcgctc actgcccgct
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2301 gaaggacagt atttggtatc tgcgctctgc tgaagccagt taccttcgga aaaagagtty tagctcttg atccggcaaa caaaccccg ctggtagcgg
2401 tggttttttt gtttgcaagc agcagattac gcgcagaaaa aaaggatctc aagaagatcc tttgatcttt tctacgggg ctgacgctca gtggaacgaa
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3601 aaaagtgcc cctgacgtct aagaaacctt tattatcatg acattaacct ataaaaatag gcgtatcacg aggccttttc gtc

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### > RDC1245 Translated Insert Sequence

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1 mgvptaleag swrwgsl1fa lf1laaslgpv aafkvatpys lvcpegqnv tl1tor1llgpv dkghdvtfyk twyrssrgev gtcserripir nltfqdlhlh
101 hgghqaants hdlagrhg1e sasdhngfn1s itmrlntll1d sglyccl1vve irhhhsherv hgamelqvqt gkdapsncvv ypsssqsden itaaalatga
201 civgilclpl1 illllykqrq aasnra1qel vrmdns1qgi enpgfeasp1 aggp1eakvr hpl1syvaqrq p1esgrh1ls epst1plsppg pgd1vffps1d
301 pvpdspnfev i

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