

Active Recombinant Human TNFRSF1B, Fc Chimera

Cat. No. TNFRSF1B-153H **Lot. No.** (See product label)

SPECIFICATION

Product Overview Recombinant Human tumor necrosis factor receptor 2 was fused to the Fc region of human IgG1 (aa 93-330). The chimeric protein was expressed in modified *human 293 cells*.

Species Human

Source HEK293

Description Tumor necrosis factor alpha (TNF-alpha ; TNF alpha) and the structurally related lymphotoxin-alpha (LT-a) are pro-inflammatory cytokines produced by a variety of immune and non-immune cells in response to multiple stimuli. These stimuli can include bacteria and bacterial products such as LPS, viral infections, T-cell receptor activation and cross-linking of surface immunoglobulin (Ig) on B cells. Expression of TNF-a has been detected in macrophages/monocytes, B-cells, T-cells, basophils, eosinophils, glial cells and mast cells. The effects of TNF-alpha and LT-a are mediated through the TNF receptors, TNF RI and TNF RII.

Theoretical Sequence LPAQVAFTPYAPEPGSTCRLREYYDQTAQMCCSKCSPGQHAKVFCTKTSDTVCD S
CEDSTYTQLWNWVPECLSCGSRCSSDQVETQACTREQNRICRPGWYCALSKQ
EGCRLCAPLRKCR PGFGVARPG TETSDVVCKP CAPGTFSNTSSTD IC RPHQ ICN
VVAIPGNASMDAVCTSTSPTRSMAPGAVHLPQPVSTRSQHTQPT PEPSTA PS TSF
LLPMGPPPAEGIPKVDKKVEPKSCDKTHTCPPCPAPELLGGPSVFLFPPKP K DTL
MISRTPEVTCVVDVSHEDPEVKFNWYVDGVEVHNAKTKPREEQYNST YRV VSVL
TVLHQDW LNGKEYK CRVSNKA LPAPIEKTISKAKGQ PREPQVY TLPPSRD ELTK

 Tel: 1-631-559-9269 1-516-512-3133

 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA

NQVSLTCLVKGFYPSDIAVEWESNGQ PENNYKTTP PVLDSGDG SFFLYSKL TVD K SRWQQGN VFSC SV MH EAL HN HYT QK S LS LSPGK.

Molecular Mass

TNF RII-Fc Chimera migrates as a band between 55 and 80 kDa in SDS-PAGE due to post-translation modifications, in particular glycosylation. This compares with the unmodified TNF RII-Fc Chimera that has a predicted molecular mass of 51.8 kDa.

PI

TNF RII-Fc Chimera separates into a number of isoforms with a pI between 4.5 and 7.0 in 2D PAGE due to post-translational modifications, in particular glycosylation. This compares with the unmodified TNF RII-Fc Chimera that has a predicted pI of 7.9.

% Carbohydrate

TNF RII-Fc Chimera consists of 5-35% carbohydrate by weight.

Purity

>95%, as determined by SDS-PAGE and visualized by silver stain.

Formulation

When reconstituted in 0.5 ml sterile phosphate-buffered saline, the solution will contain 1% human serum albumin (HSA) and 10% trehalose.

Reconstitution

It is recommended that 0.5 ml of sterile phosphate-buffered saline be added to the vial.

Storage

Lyophilized products should be stored at 2 to 8°C. Following reconstitution short-term storage at 4°C is recommended, and longer-term storage of aliquots at -18 to -20°C.

Activity

The ND₅₀ of TNF RII-Fc Chimera is typically 20-50 ng/ml as measured by its ability to neutralize TNF-α mediated cytotoxicity in murine WEHI 164 cells in the presence of actinomycin D.

GENE INFORMATION

Gene Name

TNFRSF1B tumor necrosis factor receptor superfamily, member 1B [Homo sapiens]

 Tel: 1-631-559-9269 1-516-512-3133

 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA

Synonyms	tumor necrosis factor receptor superfamily, member 1B; p75; TBPII; TNFBR; TNFR2; CD120b; TNFR1B; TNFR80; TNF-R75; p75TNFR; TNF-R-II; TNFRSF1B; tumor necrosis factor receptor 2; p75 TNF receptorL; soluble TNFR1B variant 1; tumor necrosis factor beta receptor; tumor necrosis factor binding protein 2;
Gene ID	7133
mRNA Refseq	NM_001066
Protein Refseq	NP_001057
MIM	191191
UniProt ID	P20333
Chromosome Location	1p36.22
Pathway	Adipocytokine signaling pathway; Amyotrophic lateral sclerosis (ALS); Cytokine-cytokine receptor interaction
Function	protein binding; receptor activity; tumor necrosis factor receptor activity

 Tel: 1-631-559-9269 1-516-512-3133

 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA