

DATASHEET

Version 20181206

TIGIT Fc Chimera, Human

Cat. No.: Z03439-100

Size: 100.0 µg

Synonyms: TIGIT; VSIG9; VSTM3; WUCAM; T Cell Immunoreceptor with Ig and ITIM Domains

Description:

T-cell immunoreceptor with Ig and ITIM domains (TIGIT) is also known as V-set and immunoglobulin domain-containing protein 9 (VSIG9), V-set and transmembrane domain-containing protein 3 (VSTM3). It belongs to single-pass type I membrane protein containing an immunoglobulin variable domain, a transmembrane domain and an immunoreceptor tyrosine-based inhibitory motif (ITIM). It binds with high affinity to the poliovirus receptor (PVR) which causes increased secretion of IL10 and decreased secretion of IL12B and suppresses T-cell activation by promoting the generation of mature immunoregulatory dendritic cells. TIGIT is expressed at low levels on peripheral memory and regulatory CD4+ T-cells and NK cells and is up-regulated following activation of these cells.

Recombinant Human TIGIT Fc Chimera produced in HEK293 cells is a polypeptide chain containing 352 amino acids with the C-terminal human IgG1 Fc fragment. A fully biologically active molecule, rhTIGIT has a molecular mass of 50-55 kDa, analyzed by reducing SDS-PAGE and is obtained by chromatographic techniques at GenScript.

Amino Acid Sequence:

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00001 MMTGTIETTG NISAEKGGSI ILQCHLSSTT AQTQVNWEQ
00041 QDQLLAICNA DLGWHISPSF KDRVAPGPGL GLTLQSLTVN
00081 DTGEYFCIYH TYPDGYTGR IFLEVLESSV AEHGARFQIP
00121
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Source: HEK293

Species: Human

Biological Activity: Immobilized CD155 Fc, human (Z03435) at 5 µg/mL (100µL/well) can bind Biotin-TIGIT Fc, Human with a linear range of 6.10-48.83ng/mL when detected by Streptavidin-HRP.

Molecular Weight: 50-55 kDa, observed by reducing SDS-PAGE.

Formulation: Lyophilized from a 0.2 µm filtered solution in PBS, 5% trehalose and mannitol.

Reconstitution: Reconstituted in ddH₂O or PBS at 100 µg/ml.

Purity: > 95% as analyzed by reducing SDS-PAGE.

Endotoxin Level: < 0.2 EU/µg, determined by LAL method.

Storage: Lyophilized recombinant TIGIT Fc Chimera, Human remains stable for up to 6 months at lower than -70°C from date of receipt. Upon reconstitution, Human TIGIT Fc Chimera should be stable for up to 1 week at 4°C or up to 3 months at -20°C. For long term storage it is recommended that a carrier protein (example 0.1% BSA) be added. Avoid repeated freeze-thaw cycles.