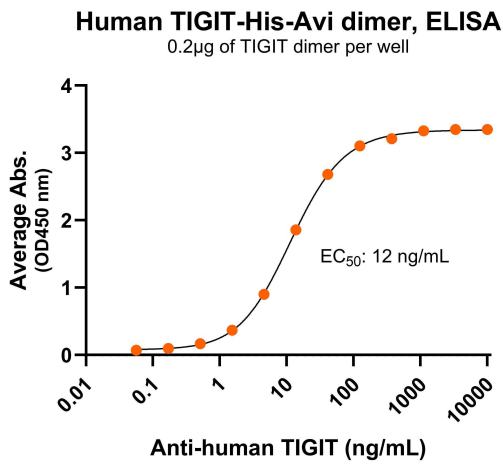
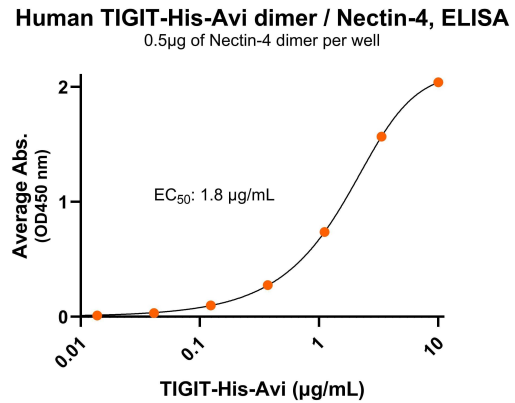


### Bioactivity – Antibody Binding



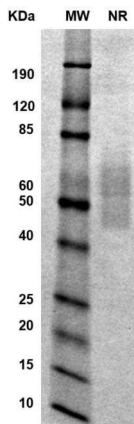
Immobilized TIGIT-His-Avi dimer protein (Cat. No. CSP-24028-03) at 2 µg/mL (100 µL/well) can bind anti-human TIGIT monoclonal antibody with half maximal effective concentration (EC50) range of 6.2-24.8 ng/mL (QC tested).

### Bioactivity – Ligand Binding



Immobilized human Nectin-4 dimer protein (Cat. No. CSP-24016) at 5 µg/mL (100 µL/well) can bind TIGIT-His-Avi dimer protein (Cat. No. CSP-24028-03) with half maximal effective concentration (EC50) range of 0.88-3.53 µg/mL (QC tested).

### SDS-PAGE



MW: Molecular Weight marker reduced condition  
 NR: TIGIT dimer under non-reducing condition

The migration range of the dimer under non-reducing conditions is 50-60 kDa on SDS PAGE.



Bioactive, Human TIGIT Dimer, His-Avi Tag  
Product Code: CSP-24028-03  
For Research Use Only (RUO)

**Expression Host**  
HEK293T

**Purity**  
Greater than 90% dimer form as determined by SDS-PAGE under non-reducing condition

**Protein Construct**  
TIGIT dimer protein (TIGIT protein dimer) contains a TIGIT extracellular domain (UniProt# Q495A1) with a tandem His-Avi tag at the C-terminus. Expressed in HEK293T cell line.

**SDS-Page Molecular Weight**  
60 kDa. The migration range of the dimer under non-reducing conditions is 50-60 kDa on SDS PAGE.

**Shipping Conditions**  
Frozen Dry Ice

**Protein Name**  
TIGIT

**Alternate Name(s)**  
VSIG9, VSTM3

**Amino Acid Range**  
M22-P141

**Formulation**  
0.22µm filtered PBS, pH 7.4

**Stability & Storage**  
-80°C

## Background

Human TIGIT (T-cell immunoreceptor with Ig and ITIM domains) is also known as VSIG9 (V-set and immunoglobulin domain-containing protein 9) and VSTM3 (V-set and transmembrane domain-containing protein 3). TIGIT is a type 1 membrane protein containing an immunoglobulin variable (Ig-V) domain, a transmembrane domain and cytoplasmic domain. TIGIT is an immune receptor present on peripheral memory and regulatory CD4+ T cells and natural killer (NK) cells. TIGIT binds to CD155 (the poliovirus receptor, PVR) with high affinity and binds to CD112 (PVRL2) with lower affinity. Nectin-4 is also a ligand for TIGIT. TIGIT's action is highly dependent on its dimerization at the cell surface. TIGIT plays a role in immune suppression and is a therapeutic target for diseases where immune modulation is critical, including cancer and autoimmune diseases.