

## Anti-TIGIT [nb49] Standard Size Ab03138-10.159

**Isotype and Format:** Human IgG1-Fc fusion

**Clone Number:** nb49

**Alternative Name(s) of Target:** VSTM3; VSIG9; WUCAM; T-cell immunoreceptor with Ig and ITIM domains; V-set and immunoglobulin domain-containing protein 9; V-set and transmembrane domain-containing protein 3

**UniProt Accession Number of Target Protein:** Q495A1

**Published Application(s):** Block, ELISA, FC

**Published Species Reactivity:** Human, Cynomolgus Monkey

**Immunogen:** The original antibody was generated by immunizing camels with human-derived TIGIT extracellular segment as antigen to obtain a high-quality immune nanobody gene library. The library was panned against human TIGIT to obtain this antibody.

**Specificity:** This antibody binds extracellular domain of the human and cynomolgus monkey TIGIT (T cell immunoreceptor with Ig and ITIM domains). TIGIT is a type I transmembrane protein that is a member of the CD28 family within the Ig superfamily of proteins. It is an immune receptor present on some T cells and natural killer cells (NK). It binds the poliovirus receptor (PVR) with high affinity 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.

**Application Notes:** The binding characterization of this antibody towards human and cynomolgus monkey TIGIT was done using ELISA. It was reported that this antibody is capable of blocking the interaction of TIGIT with CD155 on the surface of CT26 cells. This antibody can recognize human TIGIT expressed on CHOZN/TIGIT cells in a flow cytometry. Epitope mapping of this antibody suggested that this antibody binds an epitope different from another anti-TIGIT antibody called Tiragolumab. This antibody in combination with another anti-TIGIT antibody NB66 was used in the development of a bi-epitope bivalent antibody and its was reported that the blocking activity of the bi-epitope antibodies Nb49-Nb66 was significantly improved compared to the single antibody and the control antibody (CN111718415).

**Antibody First Published in:** [PMID:](#)

**Note on publication:**

### Product Form

**Size:** 100 µg Purified antibody.

**Purification:**

Protein A affinity purified

**Supplied In:** PBS with 0.02% Proclin 300.

**Storage Recommendation:** Store at 4°C for up to 3 months. For longer storage, aliquot and store at -20°C.

**Concentration:** 1 mg/ml.

Important note - This product is for research use only. It is not intended for use in therapeutic or diagnostic procedures for humans or animals.