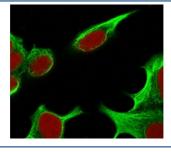


# TNF alpha Antibody [clone TMDa1-1] (V7163)

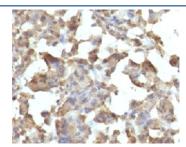
Catalog No.	Formulation	Size
V7163-100UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	100 ug
V7163-20UG	0.2 mg/ml in 1X PBS with 0.1 mg/ml BSA (US sourced) and 0.05% sodium azide	20 ug
V7163SAF-100UG	1 mg/ml in 1X PBS; BSA free, sodium azide free	100 ug

## **Bulk quote request**

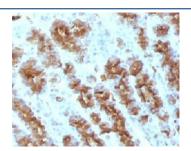
Availability	1-3 business days
Species Reactivity	Human, Rat
Format	Purified
Clonality	Monoclonal (mouse origin)
Isotype	Mouse IgM, kappa
Clone Name	TMDa1-1
Purity	PEG precipitation
UniProt	P01375
Localization	Cytoplasmic and extracellular (secreted)
Applications	Immunofluorescence : 1-2ug/ml Flow Cytometry : 1-2ug/10^6 cells Immunohistochemistry (FFPE) : 2-4ug/ml for 30 min at RT
Limitations	This TNF alpha antibody is available for research use only.



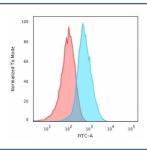
Immunofluorescent staining of PFA-fixed human HepG2 cells with TNF-alpha antibody (green, clone TMDa1-1) and Reddot nuclear stain (red).



IHC testing of FFPE human histiocytoma and TNF alpha antibody (clone TMDa1-1). Staining of formalin-fixed tissues requires boiling tissue sections in 10mM Tris buffer with 1mM EDTA, pH 9, for 10-20 min followed by cooling at RT for 20 min.



IHC testing of FFPE rat stomach and TNF alpha antibody (clone TMDa1-1). Staining of formalin-fixed tissues requires boiling tissue sections in 10mM Tris buffer with 1mM EDTA, pH 9, for 10-20 min followed by cooling at RT for 20 min.



Flow cytometry testing of PFA-fixed human HepG2 cells with TNF-alpha antibody (clone TMDa1-1); Red=isotype control, Blue= TNF-alpha antibody.

#### **Description**

Tumor Necrosis Factor Alpha (TNF alpha) is a cytokine that binds to TNFRSF1A/TNFR1 and TNFRSF1B/TNFBR. It is mainly secreted by macrophages and can induce cell death of certain tumor cell lines. It is potent pyrogen causing fever by direct action or by stimulation of interleukin-1 secretion and is implicated in the induction of cachexia, Under certain conditions it can stimulate cell proliferation and induce cell differentiation. Impairs regulatory T-cells (Treg) function in individuals with rheumatoid arthritis via FOXP3 dephosphorylation. Upregulates the expression of protein phosphatase 1 (PP1), which dephosphorylates the key 'Ser-418' residue of FOXP3, thereby inactivating FOXP3 and rendering Treg cells functionally defective. Key mediator of cell death in the anticancer action of BCG-stimulated neutrophils in combination with DIABLO/SMAC mimetic in the RT4v6 bladder cancer cell line. [UniProt]

### **Application Notes**

Titering of the TNF alpha antibody may be required for optimal performance.

#### Immunogen

Full length human recombinant protein was used as the immunogen for the TNF alpha antibody.

#### **Storage**

Store the TNF alpha antibody at 2-8oC (with azide) or aliquot and store at -20oC or colder (without azide).