

**DESCRIPTION**

<b>Source</b>	Chinese Hamster Ovary cell line, CHO-derived human VSTM2L protein	
	Hemagglutinin Tag (YPYDVPDYA)	Human VSTM2L (Thr25-Leu204) Accession # Q96N03
	N-terminus	C-terminus
<b>N-terminal Sequence Analysis</b>	HA-tag followed by Thr25	
<b>Predicted Molecular Mass</b>	21 kDa	

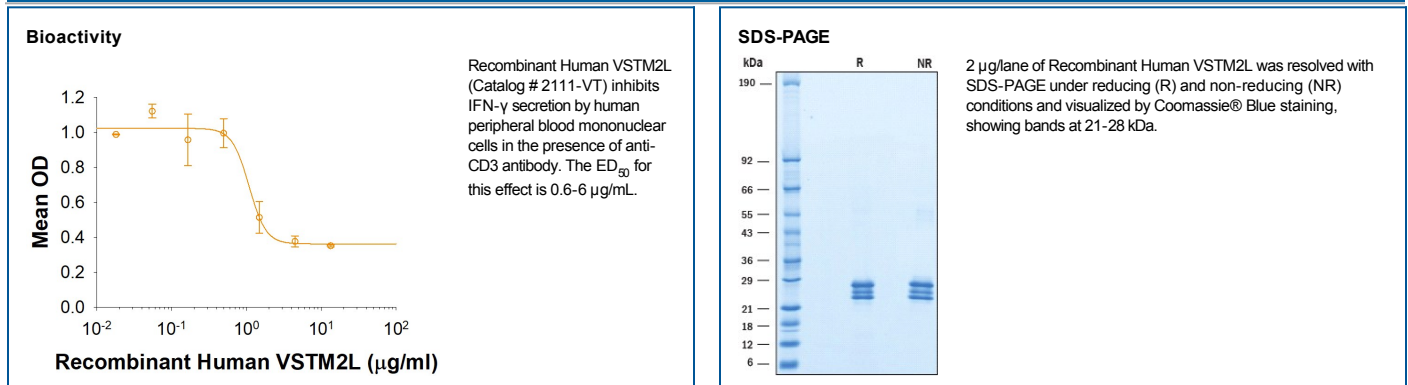
**SPECIFICATIONS**

<b>SDS-PAGE</b>	21-28 kDa, reducing conditions
<b>Activity</b>	Measured by its ability to inhibit anti-CD3 antibody induced IFN-gamma secretion by human peripheral blood mononuclear cells (PBMC). The ED <sub>50</sub> for this effect is 0.6-6 µg/mL.
<b>Endotoxin Level</b>	<0.10 EU per 1 µg of the protein by the LAL method.
<b>Purity</b>	>95%, by SDS-PAGE visualized with Silver Staining and quantitative densitometry by Coomassie® Blue Staining.
<b>Formulation</b>	Lyophilized from a 0.2 µm filtered solution in PBS. See Certificate of Analysis for details.

**PREPARATION AND STORAGE**

<b>Reconstitution</b>	Reconstitute at 200 µg/mL in PBS.
<b>Shipping</b>	The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature recommended below.
<b>Stability &amp; Storage</b>	<ul style="list-style-type: none"> <li>• 12 months from date of receipt, ≤ -20 °C as supplied.</li> <li>• 1 month, 2 to 8 °C under sterile conditions after reconstitution.</li> <li>• 3 months, ≤ -20 °C under sterile conditions after reconstitution.</li> </ul>

**DATA**



**BACKGROUND**

V-set and transmembrane domain-containing protein 2-like protein (VSTM2L), also known as C20 or f102, is a 22 kDa extracellular protein belonging to the Immunoglobulin superfamily. VSTM2L contains an N-terminal signal peptide (aa 1-25), and an Ig-like domain (aa 41-158) with a disulfide bond between Cys62 and Cys142. VSTM2L is expressed primarily in the central nervous system, but is also detected in serum and cultured cells (1). It has been found to be an antagonist of the neuroprotective peptide Humanin (1). Human VSTM2L has a 94% sequence identity to rat and mouse homolog. VSTM2L functions as an inhibitory receptor in macrophages (2). Our in house data show that VSTM2L inhibits the human T cell activation, including anti-CD3 induced IL-2 and IFN-γ secretion, and T cell proliferation.

**References:**

1. Rossini L. *et al.* (2011) FASEB J. **25**:1983.
2. Yu, Z. *et al.* (2001) J. Biol. Chem. **276**: 23816.