

Human CellExp™ CD33/SIGLEC-3

11/20

CATALOG NO:	P1616-20 20 µg P1616-50 50 µg
ALTERNATE NAMES:	gp67; Siglec-3; CD33; Sialic acid binding Ig-like lectin 3; Myeloid cell surface antigen CD33
MOL. WT.	The protein migrates as a band at 70 kDa (Fc and 6xHis tag at the C-terminus).
ACCESSION NO:	P20138; NP_001763.3
PURITY:	≥ 97% by SDSPAGE
SOURCE:	HEK293 cells
ENDOTOXIN:	< 0.1 EU/µg of the protein as determined by LAL method.
AMINO ACID SEQUENCE:	aa Asp18-His259 of human protein. The target protein is expressed with the sequence (Asp18-His259) of human CD33/Siglec-3 fused with an Fc and 6xHis tag at the C terminus.
FORMULATION:	Lyophilized from a 0.22 µm filtered solution of PBS, pH 7.4.
RECONSTITUTION:	Reconstitute to a concentration of 0.1-0.5 mg/ml in sterile distilled water.
BIOLOGICAL ACTIVITY:	The activity was measured by the binding ability in a functional ELISA. Immobilized Human CD33 at 2 µg/ml (100 µl/well) can bind Anti-Human CD33 Antibody in the linear range of 8-20 ng/ml.
STORAGE CONDITIONS:	Keep the lyophilized protein at -20 °C to -80 °C for long term storage. After reconstitution, the protein solution is stable at -20 °C for 3 months or at 2-8 °C for up to 1 week. Protein should be aliquoted and stored at -20 °C or -80 °C. Avoid repeated freeze-thaw cycles.
DESCRIPTION:	CD33 is a member of the immunoglobulin superfamily and SIGLEC (sialic acid binding Ig-like lectin) family. This single-pass type I membrane protein contains one Ig-like C2-type (immunoglobulin-like) domain and one Ig-like Vtype (immunoglobulin-like) domain. It is considered myeloid-specific, but it can also be found on some lymphoid cells. It binds to α2-6- and α2-3-sialylated glycans and sialylated ligands. It acts as an inhibitory receptor since, when it is crosslinked, it becomes phosphorylated on its cytoplasmic ITIM sequence that recruits SHP-1 and SHP-2 phosphatases and negatively regulates cell activation in both myeloid cell lines and activated NK cells. It induces apoptosis in acute myeloid leukemia and is a target for the treatment of leukemia.

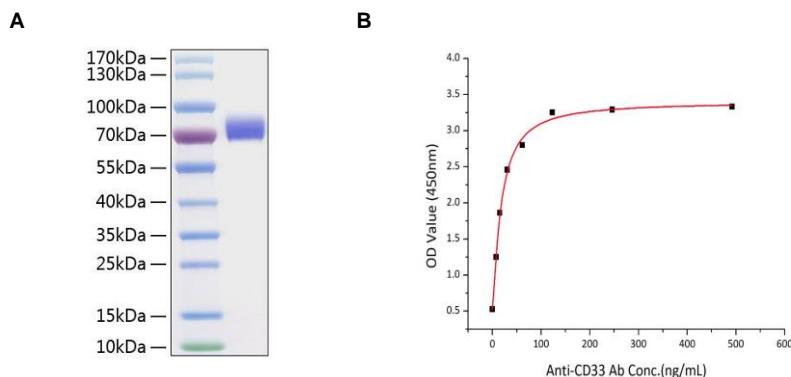


Fig A. Human CD33 protein was loaded on SDS-PAGE and visualized by Coomassie blue stain. The protein migrates as a band at 50-65kDa. **Fig B.** Immobilized Human CD33 at 2 µg/ml (100 µl/well) can bind Anti-Human CD33 Antibody in the linear range of 8-20 ng/ml in ELISA.

RELATED PRODUCTS:

Human CellExp™ CD33 / SIGLEC-3, human recombinant (Cat. No. 7370)
 Human CellExp™ Siglec-2 / CD22 isoform beta, Human Recombinant (Cat. No. P1171)
 Human CellExp™ Siglec-6 / CD327 Protein, Fc Tag (Cat. No. 7882)
 Human CellExp™ Siglec-15, Human Recombinant (Cat. No. P1343)
 Human CellExp™ MAG / Siglec-4a, Human Recombinant (Cat. No. P1480)

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