

Package: 50 μg Human BTN1A1 recombinant protein (Active) (ECD) (Fc-His-tagged, C- Store at: -20°C ter)

Summary

Product Description	HEK293 expressed, Fc-His-tagged (C-ter) Active Human BTN1A1 recombinant protein (ECD).
Tested Reactivity	Hu
Tested Application	FuncSt, SDS-PAGE
Target Name	BTN1A1 (ECD)
Species	Human
A.A. Sequence	Ala27 - Arg242 of Human BTN1A1 (NP_001723.2) with an Fc-6X His tag at the C-terminus.
Expression System	HEK293
Activity	Active
Activity Note	Measured by its ability to inhibit Anti-CD3-induced proliferation of Jurkat Human acute T lymphocyte leukemia cells. The ED50 for this effect is 0.13-0.52 ng/ml.
Alternate Names	BT; BTN; Butyrophilin subfamily 1 member A1; BTN1

Properties

Form	Powder
Purification Note	0.22 μm filter sterilized. Endotoxin level is 97% (by SDS-PAGE)
Buffer	PBS (pH 7.4)
Reconstitution	Reconstitute to a concentration of 0.1 - 0.5 mg/ml in sterile distilled water.
Storage instruction	For long term, lyophilized protein should be stored at -20°C or -80°C. After reconstitution, aliquot and store at -20°C for up to one month, at 2-8°C for up to one week. Storage in frost free freezers is not recommended. Avoid repeated freeze/thaw cycles. Suggest spin the vial prior to opening.
Note	For laboratory research only, not for drug, diagnostic or other use.

Bioinformation

Gene Symbol	BTN1A1
Gene Full Name	butyrophilin, subfamily 1, member A1
Background	Butyrophilin is the major protein associated with fat droplets in the milk. It is a member of the immunoglobulin superfamily. It may have a cell surface receptor function. The human butyrophilin gene is localized in the major histocompatibility complex (MHC) class I region of 6p and may have arisen relatively recently in evolution by the shuffling of exons between 2 ancestral gene families [provided by RefSeq, Jul 2008]
Function	May function in the secretion of milk-fat droplets. May act as a specific membrane-associated receptor for the association of cytoplasmic droplets with the apical plasma membrane (By similarity). Inhibits the proliferation of CD4 and CD8 T-cells activated by anti-CD3 antibodies, T-cell metabolism and IL2 and IFNG secretion (By similarity). [UniProt]

Calculated Mw	59 kDa
PTM	N-glycosylated. [UniProt]
Cellular Localization	Membrane; Single-pass type I membrane protein. Secreted. [UniProt]
Images	

