

LD Biopharma, Inc. 7384 Trade Street, Suite B San Diego, CA 92121 Tel: 858-876-8266 http://www.ldbiopharma.com

- PRODUCT DATA SHEET -

Name of Product:Recombinant Human RELT ProteinCatalog Number:hRP-1978Manufacturer:LD Biopharma, Inc.

Introduction

The protein encoded by human RELT gene is a member of the TNF-receptor superfamily. This receptor is especially abundant in hematologic tissues. It has been shown to activate the NF-kappaB pathway and selectively bind TNF receptor-associated factor 1 (TRAF1). This receptor is capable of stimulating T-cell proliferation in the presence of CD3 signaling, which suggests its regulatory role in immune response. Two alternatively spliced transcript variants of this gene encoding the same protein have been reported.

Full-length extracellular domain form of human RELT cDNA (26 – 162aa, Isoform-I) was constructed with codon optimization gene synthesis and expressed with a T7-His-TEV cleavage site Tag (37aa) fusion at N-terminal. This protein was expressed in E. coli as inclusion bodies. The final product was refolded using our unique "temperature shift inclusion body refolding" technology and chromatographically purified.

Gene Symbol:	RELT (TNFRSF19L)
Accession Number:	NP_055253
Species:	Human
Size:	20 µg / Vial
Composition:	0.2 mg/ml, sterile-filtered, in 20 mM pH 8.0 Tris-HCl Buffer, with proprietary formulation of NaCl, KCl, EDTA, Sucrose and DTT.
Storage:	In Liquid. Keep at -80°C for long term storage. Product is stable at 4 °C for at least 30 days.

Key References

Moua P, et al., *RELT family members activate p38 and induce apoptosis by a mechanism distinct from TNFR1*. Biochem Biophys Res commun. Jul 5. Pii: S0006-291X(17)31350-0 (2017)



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Cusick JK, et al., *RELT induces cellular death in HEK 293 epithelial cells*. Cell. Immunol. 261 (1), 1-8 (2010)

Polek TC, et al., *TRAIL-induced cleavage and inactivation of SPAK sensitizes cells to apoptosis*. Biochem. Biophys. Res. Commun. 349 (3), 1016-1024 (2006)

Applications

- 1. May be used for in vitro RELT mediated T cell stimulation regulation study with this protein either as soluble factor or as coating matrix protein.
- 2. May be used for protein-protein interaction assay.
- 3. Potential anti- pro-inflammatory response target protein for treatment of various autoimmuno-diseases using RELT blocking antibodies.
- 4. As immunogen for specific antibody production.

Quality Control

Purity: > 90% by SDS-PAGE.

Recombinant Protein Sequence

MASMTGGQQMGRGHHHHHHENLYFQGGEFGSENLYFQSTTLWQCPPGEEPDLDPGQGTLCRPCP PGTFSAAWGSSPCQPHARCSLWRRLEAQVGMATRDTLCGDCWPGWFGPWGVPRVPCQPCSWAPL GTHGCDEWGRRARRGVEVAAGASSGGETRQPGNGTRAGGPEETAAQ