

Certificate of Analysis



Recombinant Animal-Free Human RANK Ligand

Catalog Number: 100-19AF

Lot Number: 0117-100-19AF

Product Description

Alternate Names: TNFSF11, TRANCE, OPGL, ODF **Accession/Uniprot Number:** O14788

Description: Receptor activator of nuclear factor kappa-B Ligand (RANK Ligand) is a cell-bound marker related to the tumor necrosis factor (TNF) family of proteins. RANK Ligand plays a critical role in bone metabolism and osteoclast differentiation. T cell expression of RANK Ligand promotes dendritic cell maturation.

Source: Genetically modified *E.coli*. **This product is produced with no animal-derived raw products. All processing and handling employs animal-free equipment and animal-free protocols.**

Predicted MW: Monomer, 19.7 kDa (175 amino acids)

AA Sequence: EKAMVDGSWL DLAKRSKLEA QPFAHLTINA TDIPSGSHKV SLSSWYHDRG WAKISNMTFS NGKLIVNQDG FYYLYANICF RHHETSGDLA TEYLQLMVYV TKTSIKIPSS HTLMKGGSTK YWSGNSEFHF YSINVGGFVK LRSGEESIE VSNPSLLDPD QDATYFGAFK VRDID

Formulation: Lyophilized from a sterile (0.2 micron) filtered aqueous solution containing 10 mM sodium phosphate, pH 7.5

Product Specifications

Specification	Method of Determination	Acceptance Criteria	Result
Purity	Reducing and Non-reducing SDS-PAGE	≥95%	>95%
Endotoxin	Kinetic LAL (50% confidence)	≤ 1 EUs/ug	0.123 EUs/ug
Biological Activity	Activity of RAW-Blue™ cells	ED50 ≤ 50 ng/mL (2.0 x 10 ⁴ units/mg)	ED50 = 40.4 ng/mL (2.5 x 10 ⁴ units/mg)

Product Preparation and Storage

Country of Origin: USA **Shipping:** Room temperature **Storage Prior to Reconstitution:** -20°C

Reconstitution: Sterile water at 0.1 mg/mL **Date of Recon.:** _____ **Initials:** _____

Centrifuge vial before opening. Suspend the product by gently pipetting the above recommended solution down the sides of the vial. DO NOT VORTEX. Allow several minutes for complete reconstitution. For prolonged storage, dilute to working aliquots in a 0.1% BSA solution, store at -80°C and avoid repeat freeze thaws.

Expiration Date: _____ **Date Received:** _____

12 months from date of receipt when stored at -20°C to -80°C as supplied.

1 month when stored at 4°C after reconstituting as directed.

3 months when stored at -20°C to -80°C after reconstituting as directed.

THIS PRODUCT IS FOR RESEARCH USE ONLY AND IS NOT FOR USE IN HUMANS!

Olivia Schneider, PhD 2-26-2018

Quality Control