Cytotoxic T-Lymphocyte Associated Antigen-4/Fc Chimera, His Tag, human recombinant (rHuCTLA-4-His)

Catalog No: 94958
Lot No: XXXXX
Source: *E. coli*
Synonyms: GSE, CD152, IDDM12, CELIAC3, CTLA-4

Background

CTLA-4 is a member of the immunoglobulin superfamily and encodes a protein which transmits an inhibitory signal to T cells. The protein contains a V domain, a transmembrane domain, and a cytoplasmic tail. Alternate transcriptional splice variants, encoding different isoforms, have been characterized. The membrane-bound isoform functions as a homodimer interconnected by a disulfide bond, while the soluble isoform functions as a monomer. Mutations in this gene have been associated with insulin-dependent diabetes mellitus, Graves disease, Hashimoto thyroiditis, celiac disease, systemic lupus erythematosus, thyroid-associated orbitopathy, and other autoimmune diseases.

Description

CTLA-4 human recombinant produced in *E. coli* is a single polypeptide chain containing 149 amino acids (36-161) and having a molecular mass of 15.9 kDa. CTLA-4 is fused to a 23 amino acid His Tag at the N-terminus and purified by proprietary chromatographic techniques.

Physical Appearance

Sterile filtered colorless solution.

Formulation

The CTLA-4 solution (1 mg/1 ml) contains 20 mM Tris-HCl buffer (pH 8.0), 0.4 M urea and 10% glycerol.

Stability

Store at 4°C if entire vial will be used within 2-4 weeks. Store frozen at -20°C for longer periods of time.
For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA). Avoid multiple freeze-thaw cycles.

Purity

Greater than 90% as determined by SDS-PAGE.

Amino Acid Sequence

MGSSHHHHHH SSGLVPRGSH MGSKAMHVAQ PAVVLASSRG IASFVCEYAS PGKATEVRVT VLRQADSQVT EVCAATYMMG
NELTFLDDSI CTGTSSGNQV NLTIQGLRAM DTGLYICKVE LMYPPPYYLG IGNGTQIYVI DPEPCPDSD

Usage

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