Recombinant Human Cardiotrophin-1 (CT-1)

Cat No:HR2R1225

For research use only

Overview

Quantity	10 ?g
Gene Symbol	CTF1
Gene ID	1489
Accession	Q16619
Alternative Name	Recombinant Human Cardiotrophin-1, CTF1, CT1, CT-1
Species	Human
Source	E. coli
Description	Cardiotrophin-1 is a pleiotrophic cytokine and is a member of the IL-6 cytokine family that also includes IL6, IL11, LIF, OSM, CLC and IL31.Full length human CT-1 shares a 79% amino acid sequence identity with murinic CT-1 and both lack a canonical signal sequence. Cardiotrophin-1 interacts with the leukemia inhibitory factor receptor (LIFR) heterodimer and the glycoprotein 130 subunit (gp130) and has the ability to induce cardiac myocyte hypertrophy. It is highly expressed in various skeletal muscles and cardiac tissue, as well as the colon, ovary and prostate, liver, and pancreas, while lower expression levels are found in the lungs, kidney, pancreas, testis, and small intestine.
Functions	ED50 is ? 0.5 ng/mL as determined by the dose-dependent TF-1 cell proliferation.
Formulation	Lyophilized from a 0.2 ?m filtered solution in PBS
Solubility	Reconstitute in sterile 20mM Tris, pH 8.0 at 100?g/mL (containing at least 0.1% human or bovine serum albumin). Further dilutions should be made in aqueous buffers supplemented with carrier protein, such as 0.1?1.0% BSA.
Appearance	Lyophilized Powder
Molecular Weight	21
Purity	>95% as determined by SDS-PAGE
Concentration	<1.0 EU/?g of recombinant protein as determined by the LAL method
Shipping Condition	Ambient Temperature
Storage Condition	The lyophilized protein is stable for at least one year from date of receipt at -70?C. Upon reconstitution, this cytokine can be stored in working aliquots at 2? - 8?C for one month, or at -20?C for six months, with a carrier protein without detectable loss of activity. Avoid repeated freeze/thaw cycles.