

Animal, Bacterial & Viral Free - Low Endotoxin - Ultra Pure - High BioActivity
IL2

Recombinant Human Interleukin-2 HQ

Catalog No.	CRI254A	Quantity:	10 µg
	CRI254B		50 µg
	CRI254C		1 mg
	CRI254D		100 µg
Alternate Names:	TCGF, T-cell growth factor, Aldesleukin		
Description:	Interleukin 2 (IL-2) is a potent immunoregulatory growth factor produced by T-cells following stimulation by mitogens or allogens. IL-2 promotes growth and differentiation of various cells of the immune system, such as activated T-cells and B-cells, NK cells, lymphokine activated killer cells, monocytes and macrophages. It is essential for proper immune response, it may also be an important factor in the natural suppression of autoimmunity. IL-2 may be of use as an anti-tumor agent in cancer therapy. Human and mouse IL-2 share 56% aa sequence identity and exhibit cross-species activity. The Recombinant Human IL-2 HQ contains 133 amino acids and a 16 a.a. histidine based tag for a total length of 149 a.a.		
Gene ID:	3558		
Source:	<i>Hordeum vulgare</i> (barley grain). Barley grain exhibits up to 50 times less protease activity than <i>E. coli</i> or mammalian cells. Barley seed is void of any human or animal viral contaminants, which is ideal for cell culture and <i>in vitro</i> and <i>in vivo</i> biological experiments.		
Molecular Weight:	Predicted MW = 17.5 kDa. The recombinant protein migrates with an apparent MW = 22 kDa in SDS-PAGE.		
Formulation:	Lyophilized from a 0.2 µm sterile filtered solution of PBS, pH 7.2.		
Purity:	>95% by SDS-PAGE		
Endotoxin Level:	<0.005 ng per µg of product (0.05 EU/µg) as measured by turbidimetric kinetic assay.		
Cross-Reactivity:	Human and mouse IL-2 share 56% aa sequence identity and exhibit cross-species activity.		
Biological Activity:	Bioactivity is assayed by measuring the dose dependent effect of human IL-2 on proliferation of CTLL-2 cells. The EC ₅₀ for a typical batch of recombinant human IL-2 is 1.08 ng/ml.		
Specific Activity:	>1 x 10E6 U/mg		
Reconstitution:	Centrifuge vial prior to opening. It is recommended to reconstitute the lyophilized protein in sterile water to a concentration of no less than 100 µg/ml. For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA). The optimal concentration should be determined by the user for each specific application.		
Storage & Stability:	The lyophilized protein, though stable at room temperature for few weeks, is best stored at -20°C to -80°C. Reconstituted protein should be used immediately or stored in working aliquots at -20°C to -80°C. Avoid repeated freeze-thaw cycles.		

NOT FOR HUMAN USE. FOR RESEARCH ONLY. NOT FOR DIAGNOSTIC OR THERAPEUTIC USE.