



Recombinant Protein Technical Manual

Recombinant Human IL0/Interleukin0 Protein

RPES1347

Product Data:

Product SKU: RPES1347

Size: 10µg

Species: Human

Expression host: Human Cells

Uniprot: P22301

Protein Information:

Molecular Mass: 19.6 kDa

AP Molecular Mass: 16 kDa

Tag:

Bio-activity:

Purity: > 95 % as determined by reducing SDS-PAGE.

Endotoxin: < 1.0 EU per µg as determined by the LAL method.

Storage: Lyophilized proteins are stable for up to 12 months when stored at -20 to -80°C. Reconstituted protein solution can be stored at 4-8°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months.

Shipping: This product is provided as lyophilized powder which is shipped with ice packs.

Formulation: Lyophilized from a 0.2 µm filtered solution of 20mM PB, 150mM NaCl, pH 7.4

Reconstitution: Please refer to the printed manual for detailed information.

Application:

Synonyms: Interleukin0; IL0; Cytokine synthesis inhibitory factor; CSIF; IL10; RP11-262N9.1; IL10A; MGC126450; MGC126451; TGIF

Immunogen Information:

Sequence: Ser19-Asn178

Background:

Interleukin 10(IL10), also known as cytokine synthesis inhibitory factor (CSIF), is a secreted protein and belongs to the IL0 family. IL0 is secreted by many activated hematopoietic cell types as well as hepatic stellate cells, keratinocytes, and placental cytotrophoblasts . IL0 is an anti-inflammatory TH2 cytokine that has a critical role in limiting the immune response to pathogens to prevent host damage. As IL0 is produced in several T helper populations, it is proposed that it provides a feedback loop to limit the effector functions of macrophages and DCs on T cells. Once expressed, IL0 signals through the IL0 receptor (ILOR) to activate STAT3. As IL0 is a strong inhibitor of inflammation, it has become a viable biomarker for various diseases and conditions as well as a therapeutic molecule for certain conditions. In addition to elevated levels in parasitic infection, high expression levels of IL0 are also found in retroviral infections inducing immunodeficiency. The immunosuppressive properties of IL0 suggest a possible clinical use of IL0 in suppressing rejections of grafts after organ transplantations.