



# Recombinant Protein Technical Manual

## Recombinant Mouse IL1R2/CD121b Protein (His Tag)

RPES1175

### Product Data:

**Product SKU:** RPES1175

**Size:** 10µg

**Species:** Mouse

**Expression host:** Human Cells

**Uniprot:** P27931

### Protein Information:

**Molecular Mass:** 39.0 kDa

**AP Molecular Mass:** 45-60 kDa

**Tag:** C-6His

**Bio-activity:**

**Purity:** > 95 % as determined by 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 PBS, pH7.4.

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

**Application:**

**Synonyms:** Interleukin receptor type 2; ILR-2; ILRT-2; ILRT2; CD121 antigen-like family member B; CD121b; IL type II receptor; Interleukin receptor beta; ILR-beta; Interleukin receptor type II; CD121b

## Immunogen Information:

**Sequence:** Phe14-Glu355

## Background:

Mouse Interleukin 1 receptor, type II (IL1R2) is a cytokine receptor that belongs to the interleukin receptor family. This protein binds interleukin alpha (IL1A), interleukin beta (IL1B), and interleukin 1 receptor, type I (IL1R1/IL1RA), and acts as a decoy receptor that inhibits the activity of its ligands. ILR2 structurally consisting of a ligand binding portion comprised of three Ig-like domains, a single transmembrane region, and a short cytoplasmic domain. It is expressed in a variety of cell types including B lymphocytes, neutrophils, monocytes, large granular leukocytes and endothelial cells. Mouse IL1RII shares 59% amino acid sequence homology with human IL1 RII in their extracellular domains. The pleiotropic cytokine IL1 is produced to regulate development and maintenance of the inflammatory responses, and binds to specific plasma membrane receptors on cells. Two distinct types of IL1 receptors which are able to bind IL1 specifically have been identified, designated as IL1RI (IL1RA) and IL1RII (IL1RB). IL1R1 contributes to IL signaling, whereas the ILR2 has no signaling property and acts as a decoy for IL.