

Recombinant Protein Technical Manual

Recombinant Mouse IL13RA1 Protein (His Tag)(Active) RPES3848

Product Data:

Product SKU: RPES3848 **Size:** 50μg

Species: Mouse Expression host: HEK293 Cells

Uniprot: NP 598751.3

Protein Information:

Molecular Mass: 37.6 kDa

AP Molecular Mass: 50-55 kDa

Tag: C-His

Bio-activity: 1. Measured by its binding ability in a functional ELISA.2. Immobilized mouse

IL13RA1-His at 10μg/mL (100μL/well) can bind human Fc-IL13, the EC50 of human

Fc-IL13 is $0.5.5 \mu g/mL$.

Purity: > 98 % as determined by SDS-PAGE

Endotoxin: $< 1.0 \text{ EU per } \mu \text{g}$ of the protein 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 sterile PBS, pH 7.4

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

Application: Functional ELISA

Synonyms: Al882074;CD213a1;IL3r[a];Il13ra;NR4

Immunogen Information:

Sequence: Met 1-Thr 340

Background:

Interleukin 13 receptor, alpha 1, also known as IL13RA1/IL3RA1 and CD213A1 (cluster of differentiation 213A1), is a subunit of the interleukin 13 receptor. This subunit forms a receptor complex with IL4 receptor alpha, a subunit shared by IL13 and IL4 receptors. IL13RA1/IL3RA1 serves as a primary IL13-binding subunit of the IL13 receptor, and may also be a component of IL4 receptors. This protein has been shown to bind tyrosine kinase TYK2, and thus may mediate the signaling processes that lead to the activation of JAK1, STAT3 and STAT6 induced by IL13 and IL4. IL13RA1/IL3RA1 binds with low affinity to interleukin3 (IL13). This subunit together with IL4RA can form a functional receptor for IL13. IL13RA1/IL3RA1 also serves as an alternate accessory protein to the common cytokine receptor gamma chain for interleukin-4 (IL4) signaling, but cannot replace the function of IL2RG in allowing enhanced interleukin-2 (IL2) binding activity.