

Product Information

MemDX™ Antibody Discovery - Human IL-4 (25-153) Membrane Protein, Partial, -Avi -His tag, [Biotin]

Cat. No.: **MP0291F**

This product is for research use only and is not intended for diagnostic use.

This membrane protein is Human IL-4 (25-153). It has been tested in SDS-PAGE, ELISA, Cell based assay. We provide this protein to facilitate your membrane protein antibody discovery and development.

Product Specifications

Host Species

Human

Target Protein

IL-4

Protein Length

ECD

Molecular Weight

The protein has a calculated MW of 17.6 kDa. As a result of glycosylation, the protein migrates as 22 kDa under reducing (R) condition, and 21 kDa under non-reducing (NR) condition (SDS-PAGE).

Sequence

AA His 25 - Ser 153 (Accession # AAH67514).

Product Description

Activity

Yes

Application

SDS-PAGE, ELISA, Cell based assay

Expression Systems

HEK293

Tag

Avi tag at the C-terminus, followed by a His tag

Protein Format

Soluble

Form

LYOPH

Reconstitution

Please see Certificate of Analysis for specific instructions.

Endotoxin

<1.0 EU/µg by the LAL method

Conjugation

Biotin

Purity

>95% as determined by SDS-PAGE.

Buffer

Lyophilized from 0.22 µm filtered solution in PBS, pH7.4. Normally trehalose is added as protectant before lyophilization.

Storage

Stored at lyophilized form at -20°C or lower. Avoid repeated freeze-thaw cycles.

The antigen can be stable for 12 months in lyophilized form after storage at -20°C to -80°C, 3 months under sterile conditions after reconstitution after storage at -80°C.

Target

Target Protein

IL-4

Full Name

interleukin 4

Introduction

The protein encoded by this gene is a pleiotropic cytokine produced by activated T cells. This cytokine is a ligand for interleukin 4 receptor. The interleukin 4 receptor also binds to IL13, which may contribute to many overlapping functions of this cytokine and IL13. STAT6, a signal transducer and activator of transcription, has been shown to play a central role in mediating the immune regulatory signal of this cytokine. This gene, IL3, IL5, IL13, and CSF2 form a cytokine gene cluster on chromosome 5q, with this gene particularly close to IL13. This gene, IL13 and IL5 are found to be regulated coordinately by several long-range regulatory elements in an over 120 kilobase range on the chromosome. IL4 is considered an important cytokine for tissue repair, counterbalancing the effects of proinflammatory type 1 cytokines, however, it also promotes allergic airway inflammation. Moreover, IL-4, a type 2 cytokine, mediates and regulates a variety of human host responses such as allergic, anti-parasitic, wound healing, and acute inflammation. This cytokine has been reported to promote resolution of neutrophil-mediated acute lung injury. In an allergic response, IL-4 has an essential role in the production of allergen-specific immunoglobulin (Ig) E. This pro-inflammatory cytokine has been observed to be increased in COVID-19 (Coronavirus disease 2019) patients, but is not necessarily associated with severe COVID-19 pathology. Two alternatively spliced transcript variants of this gene encoding distinct isoforms have been reported.

Alternative Names

BSF1; IL-4; BCGF1; BSF-1; BCGF-1; interleukin-4; B cell growth factor 1; B_cell stimulatory factor 1; binetrakin; interleukin 4 variant 2; lymphocyte stimulatory factor 1; pitrakinra

Gene ID

[3565](#)

UniProt ID

[P24394](#)