

Product datasheet

Recombinant mouse IL-4 protein (Active) ab259406

[1 References](#) [4 Images](#)

Description

Product name	Recombinant mouse IL-4 protein (Active)
Biological activity	Fully biologically active determined by dose dependent increase in HT-2 cell proliferation. ED ₅₀ is ≤1.04 ng/ml, corresponding to a specific activity of 0.96 x 10 ⁶ units/mg.
Purity	≥ 95 % SDS-PAGE. =95% by HPLC
Endotoxin level	≤0.005 Eu/μg
Expression system	HEK 293 cells
Accession	<u>P07750</u>
Protein length	Full length protein
Animal free	Yes
Carrier free	Yes
Nature	Recombinant
Species	Mouse
Sequence	HHGCDKNHL REIIGILNEV TGEFTPCTEM DVPNVLTATK NTTESELVCR ASKVLRFYF LKHGKTPCLKK NSSVLMELQR LFRAFRCLDS SISCTMNESK STSLKDFLES LKSIMQMDYS
Predicted molecular weight	14 kDa
Actual molecular weight	14 kDa
Molecular weight information	Predicted mass is 13615.11 Da (+/- 10 Da by ESI TOF). Observed mass is 13616.32 Da (and + 80 Da due to phosphorylation)
Amino acids	21 to 140
Additional sequence information	Full-length mature chain lacking the signal peptide, N-terminal glycine.

Specifications

Our **Abpromise guarantee** covers the use of **ab259406** in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

Applications Cell Culture

SDS-PAGE
HPLC
Functional Studies
Mass Spectrometry

Form Lyophilized

Preparation and Storage

Stability and Storage Shipped at Room Temperature. Store at Room Temperature.
pH: 6.00
Constituents: 0.727% Dibasic monohydrogen potassium phosphate, 0.248% Monobasic dihydrogen potassium phosphate, 10.26% Trehalose
This product is an active protein and may elicit a biological response in vivo, handle with caution.

Reconstitution Reconstitute with phosphate buffered saline. Store lyophilized form at room temperature. Reconstitute, aliquot and store at -80°C for 12 months or +4°C for 1 week. Avoid repeated freeze-thaw. Lyophilized contents may appear as either a translucent film or a white powder. This variance does not affect the quality of the product. Lyophilized contents may appear as either a translucent film or a white powder. This variance does not affect the quality of the product.

General Info

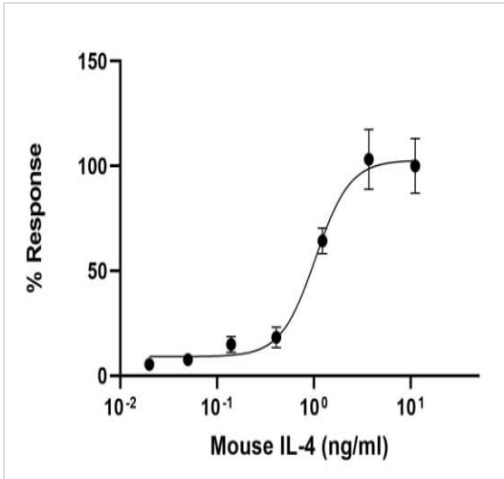
Function Participates in at least several B-cell activation processes as well as of other cell types. It is a costimulator of DNA-synthesis. It induces the expression of class II MHC molecules on resting B-cells. It enhances both secretion and cell surface expression of IgE and IgG1. It also regulates the expression of the low affinity Fc receptor for IgE (CD23) on both lymphocytes and monocytes.

Involvement in disease Genetic variations in IL4 may be a cause of susceptibility to ischemic stroke (ISCHSTR) [MIM:601367]; also known as cerebrovascular accident or cerebral infarction. A stroke is an acute neurologic event leading to death of neural tissue of the brain and resulting in loss of motor, sensory and/or cognitive function. Ischemic strokes, resulting from vascular occlusion, is considered to be a highly complex disease consisting of a group of heterogeneous disorders with multiple genetic and environmental risk factors.

Sequence similarities Belongs to the IL-4/IL-13 family.

Cellular localization Secreted.

Images



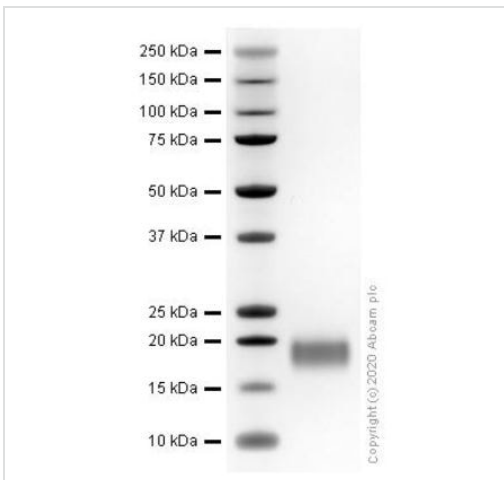
Functional Studies - Recombinant human IL-4 protein (Active) (ab259406)

Fully biologically active determined by dose dependent increase in HT-2 cell proliferation.

ED₅₀ is ≤1.04 ng/ml, corresponding to a specific activity of 0.96 x 10⁶ units/mg.

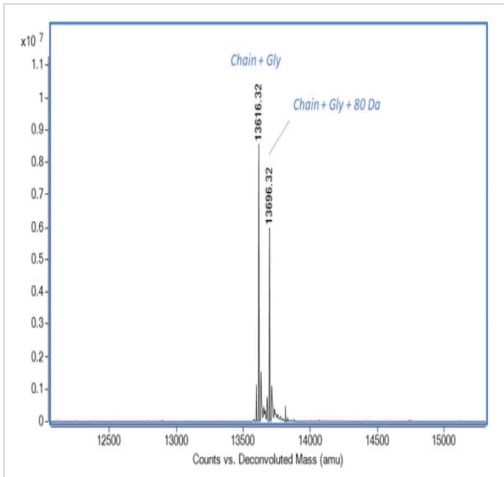
Cell based assay testing is performed on the first lot of protein only and is provided as a reference for protein activity; subsequent lots of protein must pass all biophysical quality control parameters that meet the same parameters as the first lot.

Lot: GR3372567-1



SDS-PAGE - Recombinant human IL-4 protein (Active) (ab259406)

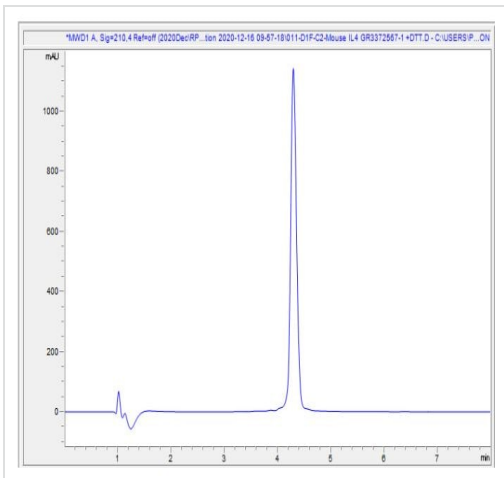
SDS-PAGE analysis of ab259406.



Mass Spectrometry - Recombinant human IL-4 protein (Active) (ab259406)

Determination of mass by ESI TOF.

Predicted mass is 13615.11 Da (+/- 10 Da by ESI TOF). Observed mass is 13616.32 Da (and + 80 Da due to phosphorylation).



HPLC - Recombinant human IL-4 protein (Active) (ab259406)

HPLC analysis of ab259406.

Please note: All products are "FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC PROCEDURES"

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