

Product datasheet

Recombinant dog IL-4 protein (Active) ab233682

[2 Images](#)

Description

Product name	Recombinant dog IL-4 protein (Active)	
Biological activity	TF-1 cell proliferation: ED ₅₀ ≤ 25 ng/mL (≥ 4.0 x 10 ⁴ units/mg).	
Purity	> 95 % SDS-PAGE.	
Endotoxin level	≤1.000 Eu/μg	
Expression system	Escherichia coli	
Accession	O77762	
Protein length	Full length protein	
Animal free	No	
Nature	Recombinant	
Species	Dog	
Sequence	MHNFNITIKEIKMLNILTARNDSCELTVKDVF TAPKNTSDK EIFCRAA TVLRQIYTHNCSNRYLRGLYRNLSSMANKTCSMNEIKKSTL KDFLERLKV IMQKKYYRH	
Predicted molecular weight	13 kDa	
Amino acids	25 to 132	
Additional sequence information	Full length mature chain without signal peptide. Genetically modified E.coli.	

Specifications

Our [Abpromise guarantee](#) covers the use of **ab233682** in the following tested applications.

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

Applications	Functional Studies SDS-PAGE
Form	Lyophilized
Additional notes	Storage: 12 months from date of receipt when stored at -20°C to -80°C as supplied. 1 month when stored at 4°C after reconstituting as directed.

3 months when stored at -20°C to -80°C after reconstituting as directed.

Preparation and Storage

Stability and Storage

Shipped at Room Temperature. Store at -20°C or -80°C.

Constituent: 0.1% Trifluoroacetic acid

Lyophilized from a sterile (0.2 micron) filtered aqueous solution.

This product is an active protein and may elicit a biological response in vivo, handle with caution.

Reconstitution

Reconstitute with sterile water at 0.1 mg/mL. Centrifuge vial before opening. Suspend the product by gently pipetting the above recommended solution down the sides of the vial. DO NOT VORTEX. Allow several minutes for complete reconstitution. For prolonged storage, dilute to working aliquots in a 0.1% BSA solution, store at -80°C and avoid repeat freeze thaws.

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.

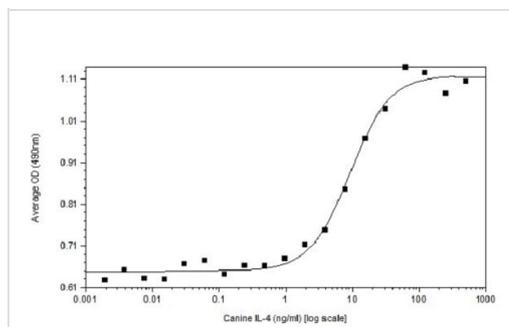
Sequence similarities

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

Cellular localization

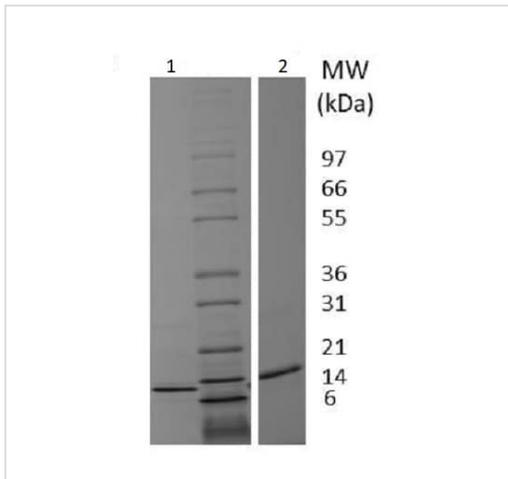
Secreted.

Images



TF-1 cell proliferation: $ED_{50} \leq 25 \text{ ng/mL}$ ($\geq 4.0 \times 10^4 \text{ units/mg}$).

Functional Studies - Recombinant dog IL-4 protein
(Active) (ab233682)



SDS-PAGE - Recombinant dog IL-4 protein (Active)
(ab233682)

SDS-PAGE - Recombinant dog IL4 protein (Active) (ab233682) at
1 µg.

Lane 1: Non-reducing conditions.

Lane 2: Reducing conditions.

4-20% Tris-Glycine gel stained with Coomassie Blue.

Expected MW 12.9 kDa.

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

Our Abpromise to you: Quality guaranteed and expert technical support

- Replacement or refund for products not performing as stated on the datasheet
- Valid for 12 months from date of delivery
- Response to your inquiry within 24 hours
- We provide support in Chinese, English, French, German, Japanese and Spanish
- Extensive multi-media technical resources to help you
- We investigate all quality concerns to ensure our products perform to the highest standards

If the product does not perform as described on this datasheet, we will offer a refund or replacement. For full details of the Abpromise, please visit <https://www.abcam.com/abpromise> or contact our technical team.

Terms and conditions

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