

# Recombinant Mouse TNF-alpha Protein

Catalog No.: RP01071   **Recombinant**   **6 Publications**

## Sequence Information

Species	Gene ID	Swiss Prot
Mouse	21926	P06804

### Tags

C-His

### Synonyms

DIF; Tnfa; TNF- $\alpha$ ; TNFSF2; Tnlg1f; Tnfsf1a; TNFalpha; TNF-alpha;TNF

## Background

## Basic Information

### Description

Recombinant Mouse TNF-alpha Protein is produced by HEK293 cells expression system. The target protein is expressed with sequence (Leu80-Leu235) of mouse TNF-alpha (Accession #NP\_038721.1) fused with a 6×His tag at the C-terminus.

### Bio-Activity

1. Immobilized recombinant Mouse TNF $\alpha$  at 2  $\mu$ g/mL (100  $\mu$ L/well) can bind Human TNFRSF1A with a linear range of 4-53 ng/mL. | 2. Immobilized Recombinant Mouse TNF- $\alpha$  at 2  $\mu$ g/mL (100  $\mu$ L/well) can bind Mouse TNFRSF1B with a linear range of 0.02-0.77 ng/mL. | 3. Recombinant Mouse TNF-alpha induces cytotoxicity in the L-929 mouse fibroblast cell line in the presence of the metabolic inhibitor actinomycin D. The ED50 for this effect is typically 3.55-14.2 pg/mL, corresponding to a specific activity of  $7.04 \times 10^7 \sim 2.82 \times 10^8$  units/mg.

### Shipping

The product is shipped at ambient temperature. Upon receipt, store it immediately at the temperature recommended below.

### Storage

Store at -20°C. Store the lyophilized protein at -20°C to -80 °C up to 1 year from the date of receipt.

After reconstitution, the protein solution is stable at -20°C for 3 months, at 2-8°C for up to 1 week.

Avoid repeated freeze/thaw cycles.

### Operational Notes

For your safety and health, please wear a lab coat and disposable gloves for handling.

## Product Information

### Source

HEK293 cells

### Purification

$\geq 95\%$  as determined by SDS-PAGE;  $\geq 95\%$  as determined by HPLC.

### Calculated MW

18.10 kDa

### Observed MW

18 kDa

### Endotoxin

< 0.1 EU/ $\mu$ g of the protein by LAL method.

### Formulation

Lyophilized from a 0.22  $\mu$ m filtered solution of PBS, pH 7.4. Contact us for customized product form or formulation.

### Reconstitution

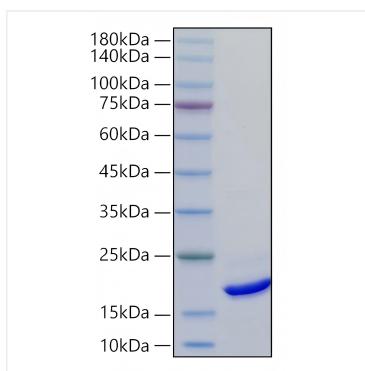
Centrifuge the vial before opening. Reconstitute to a concentration of 0.1-0.5 mg/mL in sterile distilled water. Avoid vortex or vigorously pipetting the protein. For long term storage, it is recommended to add a carrier protein or stabilizer (e.g. 0.1% BSA, 5% HSA, 10% FBS or 5% Trehalose), and aliquot the reconstituted protein solution to minimize free-thaw cycles.

## Contact

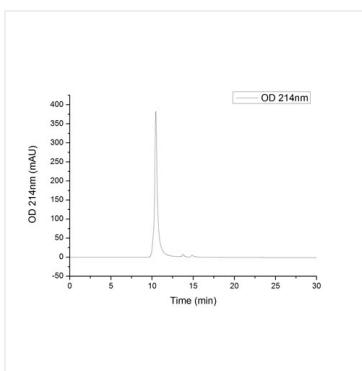
	400-999-6126
	<a href="mailto:cn.market@abclonal.com.cn">cn.market@abclonal.com.cn</a>



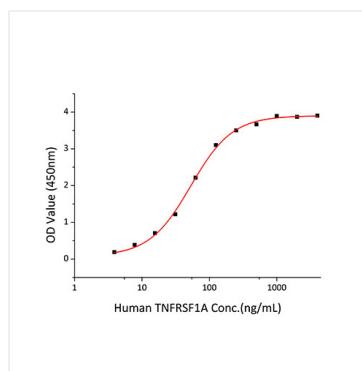
## Validation Data



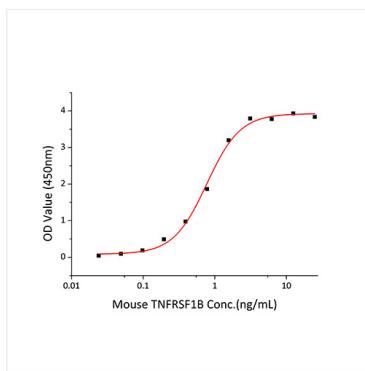
Recombinant Mouse TNF-alpha Protein was determined by SDS-PAGE under reducing conditions with Coomassie Blue.



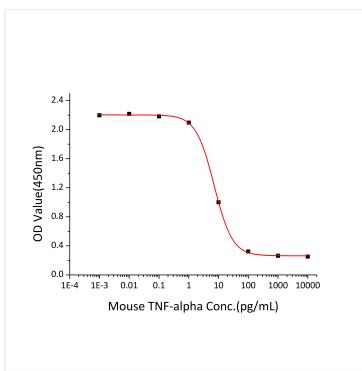
The purity of Mouse TNF-alpha Protein (Cat.RP01071) was greater than 95% as determined by SEC-HPLC.



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Immobilized Recombinant Mouse TNF- $\alpha$  at 2  $\mu$ g/mL (100  $\mu$ L/well) can bind Mouse TNFRSF1B with a linear range of 0.02-0.77 ng/mL.



Recombinant Mouse TNF-alpha induces cytotoxicity in the L-929 mouse fibroblast cell line in the presence of the metabolic inhibitor actinomycin D. The ED<sub>50</sub> for this effect is typically 3.55-14.2 pg/mL, corresponding to a specific activity of  $7.04 \times 10^7$ ~ $2.82 \times 10^8$  units/mg.