

# Recombinant Alpha-1-Antitrypsin (a1AT) Instruction Manual

SIPB452Hu01

**Homo sapiens (Human)**

<b>Source</b>	Prokaryotic expression
<b>Host</b>	E.coli
<b>Endotoxin Level</b>	<1.0EU per 1µg (determined by the LAL method)
<b>Subcellular Location</b>	Secreted, Endoplasmic reticulum lumen
<b>Predicted Molecular Mass</b>	48.0kDa
<b>Accurate Molecular Mass</b>	48kDa(Analysis of differences refer to the manual)
<b>Residues &amp; Tags</b>	Glu25~Lys418 with N-terminal His Tag
<b>Buffer Formulation</b>	20mM Tris, 150mM NaCl, pH8.0, containing 1mM EDTA, 1mM DTT, 0.01% SKL, 5% Trehalose and Proclin300.
<b>Traits</b>	Freeze-dried powder
<b>Purity</b>	> 95%
<b>Isoelectric Point</b>	5.4
<b>Applications</b>	Positive Control; Immunogen; SDS-PAGE; WB.

## SEQUENCE

```
EDPQGD AAQKTDTS HH DQDHPTFNKI  
TPNLAEFAFS L YRQLAHQSN STNIFFSPVS IATAFAMLSL GTKADTHDEI  
LEGLNFNLTE IPEAQIHEGF QELLRTL NQP DSQLQLTTGN GLFLSEGLKL  
VDKFLEDVKK LYHSEAVTN FGDTEEA KKQ INDYVEKGTQ GKIVDLVKEL  
DRDTV FALVN YIFFK GKWER PFEVKDTEEE DFHVDQVTTV KVPMMKRLGM  
FNIQHCKKLS SWVLLMKYLG NATAIFFLPD EGKLQHLENE LTHDIITKFL  
ENEDRRSASL HLPKLSITGT YDLKSVLGQL GITKVFSNGA DLSGVTEEAP  
LKLSKAVHKA VLTIDEKGTE AAGAMFLEAI PMSIPPEVKF NKPFVFLMIE  
QNTKSPLFMG KVVNPTQK
```

## USAGE

Reconstitute in 20mM Tris, 150mM NaCl (pH8.0) to a concentration of 0.1-1.0 mg/mL.  
Do not vortex.

## STORAGE

Avoid repeated freeze/thaw cycles. Store at 2-8°C for one month. Aliquot and store at -80°C for 12 months.

## STABILITY

The thermal stability is described by the loss rate. The loss rate was determined by accelerated thermal degradation test, that is, incubate the protein at 37°C for 48h, and no obvious degradation and precipitation were observed. The loss rate is less than 5% within the expiration date under appropriate storage condition.

## Image

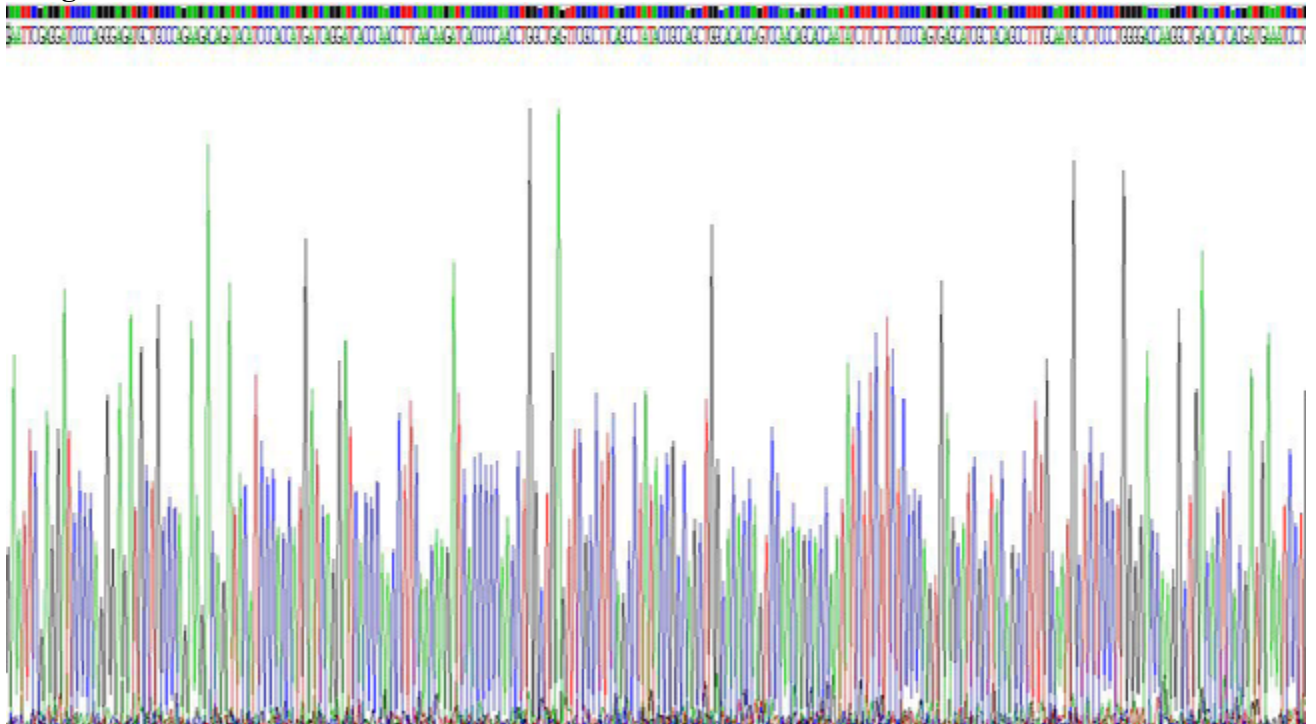


Figure. SDS-PAGE

## **[IMPORTANT NOTE]**

The kit is designed for research use only, we will not be responsible for any issue if the kit was used in clinical diagnostic or any other procedures.

