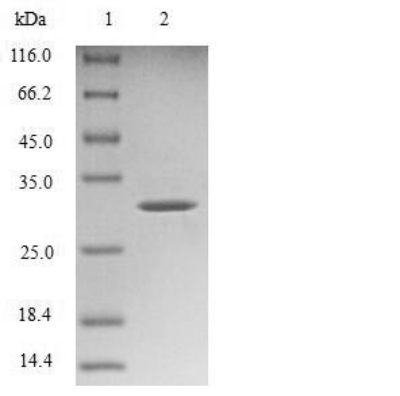
Recombinant Mouse Transthyretin (Ttr)

Product Code	CSB-EP025270MO
Relevance	Thyroid hormone-binding protein. Probably transports thyroxine from the bloodstream to the brain.
Storage	The shelf life is related to many factors, storage state, buffer ingredients, storage temperature and the stability of the protein itself. Generally, the shelf life of liquid form is 6 months at -20°C/-80°C. The shelf life of lyophilized form is 12 months at -20°C/-80°C.
Uniprot No.	P07309
Alias	Prealbumin
Product Type	Recombinant Protein
Immunogen Species	Mus musculus (Mouse)
Purity	Greater than 90% as determined by SDS-PAGE.
Sequence	GPAGAGESKCPLMVKVLDAVRGSPAVDVAVKVFKKTSEGSWEPFASGKTAES GELHGLTTDEKFVEGVYRVELDTKSYWKTLGISPFHEFADVVFTANDSGHRHY TIAALLSPYSYSTTAVVSNPQN
Lead Time	3-7 business days
Research Area	Others
Source	E.coli
Gene Names	Ttr
Expression Region	21-147aa
Notes	Repeated freezing and thawing is not recommended. Store working aliquots at 4°C for up to one week.
Tag Info	N-terminal 6xHis-SUMO-tagged
Mol. Weight	29.6kDa
Protein Description	Full Length of Mature Protein

Image



(Tris-Glycine gel) Discontinuous SDS-PAGE (reduced) with 5% enrichment gel and 15% separation gel.

Description

The preparation of Recombinant Mouse Ttr protein included 3 main steps: construct the expression vector, expression of protein of interest, and protein purification. Every step was performed under a strict QC system so that we got the premium protein. This Ttr was expressed in E.coli at and fused with N-terminal 6xHis-SUMO tag. According to SDS-PAGE, the purity turns out to be 90%+.

Transthyretin (Ttr) is a highly conserved homotetrameric protein, mainly synthetized by the liver and the choroid plexus of brain. The carrier role of TTR is well-known. TTR is a highly conserved protein that is found in several vertebrate species. Recently, sequences homologous to TTR, known as transthyretin-like proteins (TLPs), have been found in bacteria, nematodes, and plants. In Escherichia coli and Caenorhabditis elegans TLPs form homotetramers, like TTR, although without the ability to bind T4. TTR synthesis in brain areas, other than the choroid plexus, has been a controversial subject. The presence of TTR mRNA in murine or human brains has been detected in brain areas such as the cortex, hippocampus, or cerebellum. Besides the liver and the choroid plexus, TTR synthesis has been described in several other tissues. TTR is highly transcribed and translated in the retinal pigment epithelium (RPE), a monolayer of cells that acts as blood barrier for the retina.

Reconstitution

We recommend that this vial be briefly centrifuged prior to opening to bring the contents to the bottom. Please reconstitute protein in deionized sterile water to a concentration of 0.1-1.0 mg/mL.We recommend to add 5-50% of glycerol (final concentration) and aliquot for long-term storage at -20°C/-80°C. Our default final concentration of glycerol is 50%. Customers could use it as reference.