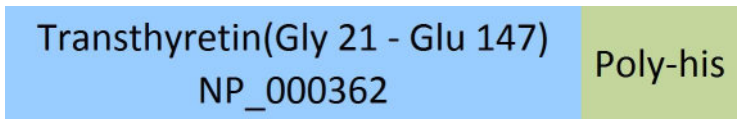
Synonym

Transthyretin,TTR,Prealbumin,TBPA,ATTR,PALB,CTS,CTS1,HsT2651

Source

Human Transthyretin, His Tag (TTR-H5223) is expressed from human 293 cells (HEK293). It contains AA Gly 21 - Glu 147 (Accession # NP_000362).
Predicted N-terminus: Gly 21

Molecular Characterization



This protein carries a polyhistidine tag at the C-terminus.

The protein has a calculated MW of 14.9 kDa. The protein migrates as 17 kDa and 33 kDa under reducing (R) condition (SDS-PAGE) due to the monomer and dimer respectively.

Endotoxin

Less than 1.0 EU per μg by the LAL method.

Purity

>95% as determined by SDS-PAGE.

Formulation

Lyophilized from 0.22 μm filtered solution in PBS, pH7.4. Normally trehalose is added as protectant before lyophilization.

Contact us for customized product form or formulation.

Reconstitution

Please see Certificate of Analysis for specific instructions.

For best performance, we strongly recommend you to follow the reconstitution protocol provided in the CoA.

Storage

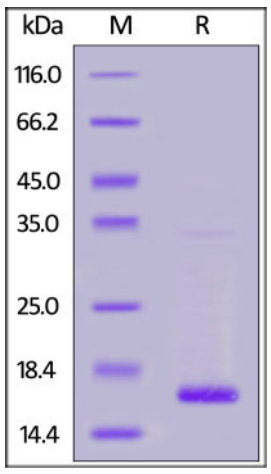
For long term storage, the product should be stored at lyophilized state at -20°C or lower.

Please avoid repeated freeze-thaw cycles.

This product is stable after storage at:

- -20°C to -70°C for 12 months in lyophilized state;
- -70°C for 3 months under sterile conditions after reconstitution.

SDS-PAGE



Human Transthyretin, His Tag on SDS-PAGE under reducing (R) condition.
The gel was stained overnight with Coomassie Blue. The purity of the protein is greater than 95%.

Background

Transthyretin (TTR) is also known as Prealbumin, ATTR, TBPA, PALB, which belongs to the transthyretin family. Transthyretin / TTR is a serum and cerebrospinal fluid carrier of the thyroid hormone thyroxine (T4) and retinol-binding protein bound to retinol. In cerebrospinal fluid TTR is the primary carrier of T4. TTR also acts as a carrier of retinol (vitamin A) through its association with retinol-binding protein (RBP) in the blood and the CSF. Less than 1% of TTR's T4 binding sites are occupied in blood. TTR misfolding and aggregation is known to be associated with the amyloid diseases.

References

(1) Getz R.K., et al., 1999, Exp. Eye Res. 68:629-636.

(2) Herbert J., et al., 1986, Neurology 36:900-911.

(3) Mita S., et al., 1984, Biochem. Biophys. Res. Commun. 124:558-564.

Please contact us via TechSupport@acrobiosystems.com if you have any question on this product.