



Recombinant Protein Technical Manual

Recombinant Human Transthyretin/TTR Protein (His Tag)

RPE1259

Product Data:

Product SKU: RPE1259

Size: 10µg

Species: Human

Expression host: Human Cells

Uniprot: P02766

Protein Information:

Molecular Mass: 14.8 kDa

AP Molecular Mass: 17 kDa

Tag: C-6His

Bio-activity:

Purity: > 95 % as determined by reducing SDS-PAGE.

Endotoxin: < 1.0 EU per µg as determined by the LAL method.

Storage: Lyophilized proteins are stable for up to 12 months when stored at -20 to -80°C. Reconstituted protein solution can be stored at 4-8°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months.

Shipping: This product is provided as lyophilized powder which is shipped with ice packs.

Formulation: Lyophilized from a 0.2 µm filtered solution of 20mM TrisHCl, 150mM NaCl, pH 8.0.

Reconstitution: Please refer to the printed manual for detailed information.

Application:

Synonyms: Transthyretin; ATTR; Prealbumin; TBPA; TTR; PALB;CTS;CTS1;HEL111

Immunogen Information:

Sequence: Gly21-Glu147

Background:

Transthyretin is a secreted and cytoplasm protein which belongs to the Transthyretin family. Transthyretin is detected in serum and cerebrospinal fluid (at protein level). It is highly expressed in choroid plexus epithelial cells. It is also detected in retina pigment epithelium and liver. Each monomer of Transthyretin has two 4-stranded beta sheets and the shape of a prolate ellipsoid. Antiparallel beta-sheet interactions link monomers into dimers. A short loop from each monomer forms the main dimer-dimer interaction. These two pairs of loops separate the opposed, convex beta-sheets of the dimers to form an internal channel. Defects in Transthyretin are the cause of amyloidosis type 1 (AMY1) which is a hereditary generalized amyloidosis due to transthyretin amyloid deposition. Protein fibrils can form in different tissues leading to amyloid polyneuropathies, amyloidotic cardiomyopathy, carpal tunnel syndrome, systemic senile amyloidosis. The disease includes leptomeningeal amyloidosis that is characterized by primary involvement of the central nervous system.