

### Synonym

PTK7,CCK4,CCK-4,Tyrosine-protein kinase-like 7,Protein-tyrosine kinase 7,Protein-tyrosine kinase 7

### Source

Human PTK7, His Tag (PT7-H52H3) is expressed from human 293 cells (HEK293). It contains AA Ala 31 - Thr 704 (Accession # [Q13308-1](#)).

Predicted N-terminus: Ala 31

### Molecular Characterization

PTK7(Ala 31 - Thr 704)  
Q13308-1 Poly-his

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

The protein has a calculated MW of 76.5 kDa. The protein migrates as 90-115 kDa under reducing (R) condition (SDS-PAGE) due to glycosylation.

### Endotoxin

Less than 1.0 EU per µg by the LAL method.

### Purity

>95% as determined by SDS-PAGE.

>90% as determined by SEC-MALS.

### 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

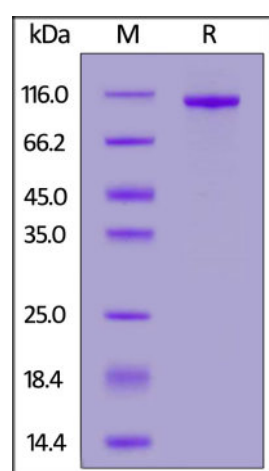
For long term storage, the product should be stored at lyophilized state at -20°C or lower.

*Please avoid repeated freeze-thaw cycles.*

This product is stable after storage at:

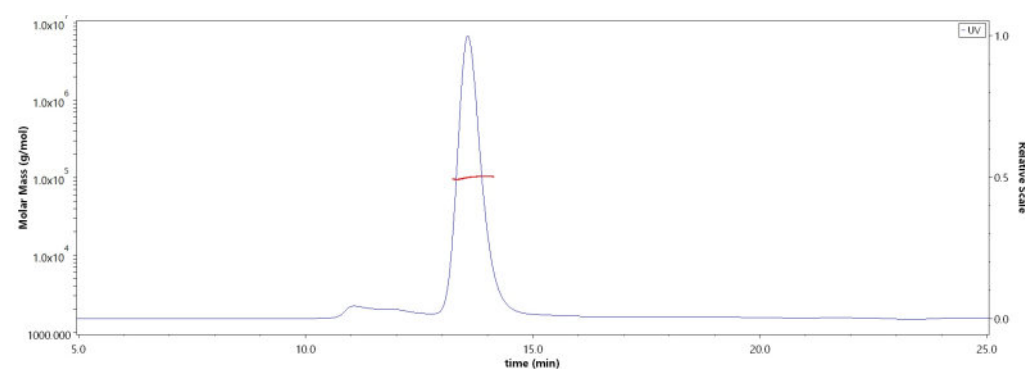
- -20°C to -70°C for 12 months in lyophilized state;
- -70°C for 3 months under sterile conditions after reconstitution.

### SDS-PAGE



Human PTK7, 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%.

### SEC-MALS



The purity of Human PTK7, His Tag (Cat. No. PT7-H52H3) was more than 90% and the molecular weight of this protein is around 90-110 kDa verified by SEC-MALS.

[Report](#)

### Background

PTK7, highly expressed in lung, liver, pancreas, kidney, placenta and melanocytes. Weakly expressed in thyroid gland, ovary, brain, heart and skeletal muscle. Also expressed in erythroleukemia cells. Inactive tyrosine kinase involved in Wnt signaling pathway. Component of both the non-canonical (also known as the Wnt/planar

cell polarity signaling) and the canonical Wnt signaling pathway. Functions in cell adhesion, cell migration, cell polarity, proliferation, actin cytoskeleton reorganization and apoptosis. Has a role in embryogenesis, epithelial tissue organization and angiogenesis.

### **Clinical and Translational Updates**

Please contact us via [TechSupport@acrobiosystems.com](mailto:TechSupport@acrobiosystems.com) if you have any question on this product.