

Human Coagulation factor III/Tissue Factor Protein

Cat. No. TFR-HM203

KACATUS

Description

Source	Recombinant Human Coagulation factor III/Tissue Factor Protein is expressed from HEK293 with hFc tag at the C-terminus.
	It contains Ser33-Glu251.
Accession	P13726-1
Molecular Weight	The protein has a predicted MW of 50.74 kDa. Due to glycosylation, the protein migrates to 65-75 kDa based on Bis-Tris PAGE result.
Endotoxin	Less than 1 EU per µg by the LAL method.
Purity	> 95% as determined by Bis-Tris PAGE
	> 95% as determined by HPLC

Formulation and Storage

Formulation	Lyophilized from 0.22 µm filtered solution in PBS (pH 7.4). Normally 8% trehalose is added as protectant before lyophilization.
Reconstitution	Dissolve the lyophilized protein in distilled water. Please refer to the Certificate of Analysis for detailed instructions.
Storage	-20 to -80°C for 12 months as supplied from date of receipt. -80°C for 3 months after reconstitution. Recommend to aliquot the protein into smaller quantities for optimal storage. Please minimize freeze-thaw cycles.

Background

Tissue factor (also named Coagulation Factor III) is a cell surface glycoprotein responsible for initiating the extrinsic pathway of coagulation. Tissue factor is the primary cellular initiator of blood coagulation via interaction with coagulation factor VII. Aberrant expression of tissue factor is responsible for thrombosis during septic shock, atherosclerosis and cancer.

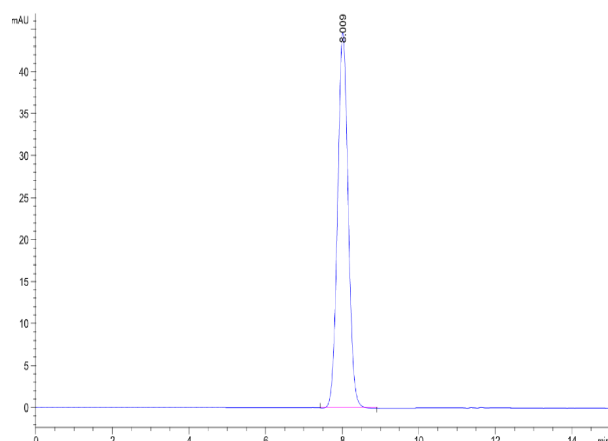
Assay Data

Bis-Tris PAGE



Human Coagulation factor III on Bis-Tris PAGE under reduced condition. The purity is greater than 95%.

SEC-HPLC

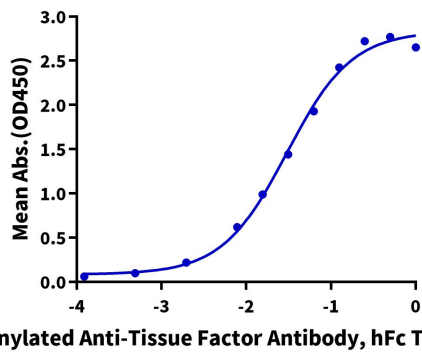


The purity of Human Coagulation factor III is greater than 95% as determined by SEC-HPLC.

Assay Data

ELISA Data

Human Coagulation Factor III, hFc Tag ELISA
0.2µg Human Coagulation Factor III, hFc Tag Per Well



Immobilized Human Coagulation Factor III, hFc Tag at 2µg/ml (100µl/well) on the plate. Dose response curve for Biotinylated Anti-Tissue Factor Antibody, hFc Tag with the EC50 of 30.2ng/ml determined by ELISA.

Bioactivity Data

Measured by its ability to activate Coagulation Factor VII in cleaving a fluorogenic peptide substrate Boc-VPR-AMC. The AC50 is <5.5 µg/mL.