Human ACE2/ACEH Protein

Cat. No. ACE-HM101

Description

Source	Recombinant Human ACE2/ACEH Protein is expressed from HEK293 with His tag at the C-Terminus.
	It contains Gln18-Ser740.
Accession	Q9BYF1-1
Molecular Weight	The protein has a predicted MW of 84.7 kDa. Due to glycosylation, the protein migrates to 85-110 kDa based on Bis-Tris PAGE result.
Endotoxin	Less than 1EU per µg by the LAL method.
Purity	> 95% as determined by Bis-Tris PAGE
	> 95% as determined by HPLC

Formulation and Storage

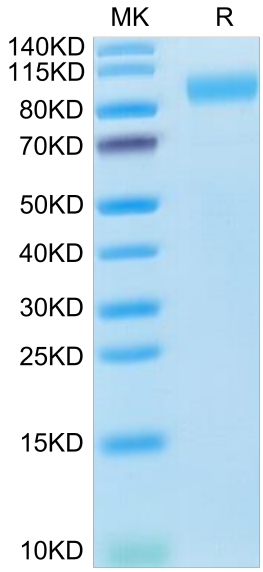
Formulation	Lyophilized from 0.22µm filtered solution in PBS (pH 7.4). Normally 8% trehalose is added as protectant before lyophilization.
Reconstitution	Centrifuge the tube before opening. Reconstituting to a concentration more than 100 µg/ml is recommended. Dissolve the lyophilized protein in distilled water.
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

ACE2 (Angiotensin I Converting Enzyme 2) is a Protein Coding gene. Diseases associated with ACE2 include Severe Acute Respiratory Syndrome and Neurogenic Hypertension.The protein encoded by this gene belongs to the angiotensin-converting enzyme family of dipeptidyl carboxydipeptidases and has considerable homology to human angiotensin 1 converting enzyme. This secreted protein catalyzes the cleavage of angiotensin I into angiotensin 1-9, and angiotensin II into the vasodilator angiotensin 1-7.

Assay Data

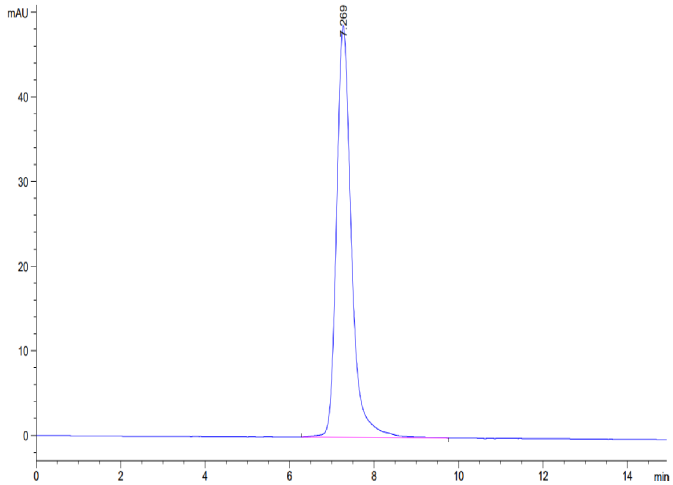
Bis-Tris PAGE



Human ACE2 on Bis-Tris PAGE under reduced condition. The purity is greater than 95%.

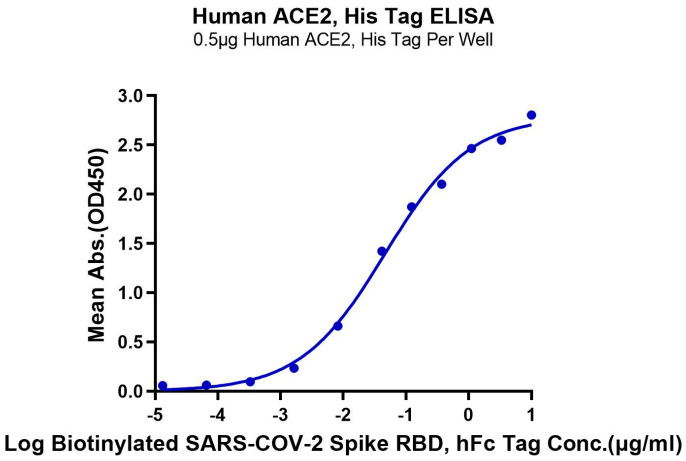
SEC-HPLC

Assay Data



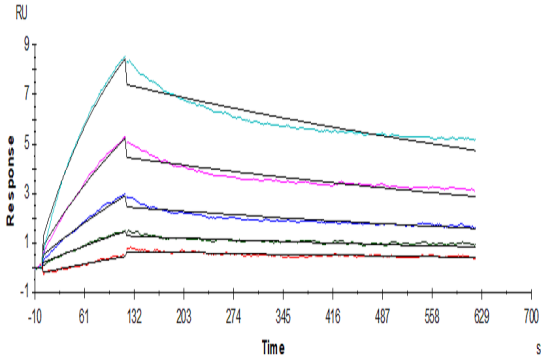
The purity of Human ACE2 is greater than 95% as determined by SEC-HPLC

ELISA Data



Immobilized Human ACE2, His Tag at 5μg/ml (100μl/Well) on the plate. Dose response curve for Biotinylated SARS-COV-2 Spike RBD, hFc Tag with the EC50 of 46.2ng/ml determined by ELISA (QC Test).

SPR Data



SARS-COV-2 Spike RBD captured on Protein A chip, can bind Human ACE2, His Tag with an affinity constant of 11.9nM as determined in a SPR assay (Biacore T200).