Datasheet for ABIN6952427

SARS-CoV-2 Spike S1 Protein (His tag)

6 Images | 9 Publications

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Overview

Quantity:	100 µg
Target:	SARS-CoV-2 Spike S1
Origin:	SARS Coronavirus-2 (SARS-CoV-2)
Source:	HEK-293 Cells
Protein Type:	Recombinant
Purification tag / Conjugate:	This SARS-CoV-2 Spike S1 protein is labelled with His tag.
Application:	SDS-PAGE (SDS), Functional Studies (Func)

Product Details

Sequence:	AA 16-685
Characteristics:	This protein carries a polyhistidine tag at the C-terminus. The protein has a calculated MW of 76.9 kDa. The protein migrates as 100-140 kDa under reducing (R) condition (SDS-PAGE) due to glycosylation. AA 16-685
Purity:	>90 % as determined by SDS-PAGE.
Endotoxin Level:	Less than 1.0 EU per µg by the LAL method.
Biological Activity Comment:	Immobilized 2019-nCoV S1 protein, His Tag at 2 µg/mL (100 µL/well) can bind Human ACE2, Fc Tag with a linear range of 2-20 ng/mL (QC tested).

Target Details

Target:	SARS-CoV-2 Spike S1

Target Details

Abstract:	SARS-CoV-2 Spike S1 Products
Target Type:	Viral Protein
Background:	It's been reported that Coronavirus can infect the human respiratory epithelial cells through interaction with the human ACE2 receptor. The spike protein is a large type I transmembrane protein containing two subunits, S1 and S2. S1 mainly contains a receptor binding domain (RBD), which is responsible for recognizing the cell surface receptor. S2 contains basic elements needed for the membrane fusion.The S protein plays key parts in the induction of neutralizing-antibody and T-cell responses, as well as protective immunity.
Molecular Weight:	76.9 kDa
Gene ID:	43740568
UniProt:	P0DTC2

Application Details

Restrictions:	For Research Use only

Handling

Format:	Lyophilized
Buffer:	PBS, pH 7.4
Handling Advice:	Please avoid repeated freeze-thaw cycles.
Storage:	-20 °C
Storage Comment:	-20°C

Publications

Product cited in:	Fan, Parr, Kang, Gupta: "Point-of-care (POC) SARS-CoV-2 antigen detection using functionalized aerosol jet-printed organic electrochemical transistors (OECTs)." in: **Nanoscale**, Vol. 15, Issue 11, pp. 5476-5485, (2023) (PubMed). Lucas, Klein, Sundaram, Liu, Wong, Silva, Mao, Oh, Mohanty, Huang, Tokuyama, Lu, Venkataraman, Park, Israelow, Vogels, Muenker, Chang, Casanovas-Massana, Moore, Zell, Fournier, Wyllie, Campbell, Lee et al.: "Delayed production of neutralizing antibodies correlates with fatal COVID-19. ..." in: **Nature medicine**, (2021) (PubMed).

Publications

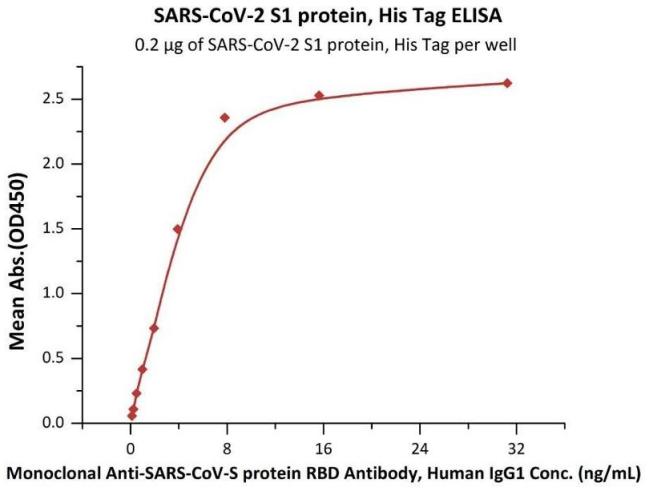
Song, Bartley, Chow, Ngo, Jiang, Zamecnik, Dandekar, Loudermilk, Dai, Liu, Sunshine, Liu, Wu, Hawes, Alvarenga, Huynh, McAlpine, Rahman, Geng, Chiarella, Goldman-Israelow, Vogels, Grubaugh et al.: "Divergent and self-reactive immune responses in the CNS of COVID-19 patients with neurological symptoms. ..." in: **Cell reports. Medicine**, pp. 100288, (2021) (PubMed).

Maritz, Woudberg, Bennett, Soares, Lapierre, Devine, Kimberg, Bouic: "Validation of high-throughput, semiquantitative solid phase SARS coronavirus-2 serology assays in serum and dried blood spot matrices." in: **Bioanalysis**, (2021) (PubMed).

Mazzini, Martinuzzi, Hyseni, Benincasa, Molesti, Casa, Lapini, Piu, Trombetta, Marchi, Razzano, Manenti, Montomoli: "Comparative analyses of SARS-CoV-2 binding (IgG, IgM, IgA) and neutralizing antibodies from human serum samples." in: **Journal of immunological methods**, Vol. 489, pp. 112937, (2021) (PubMed).

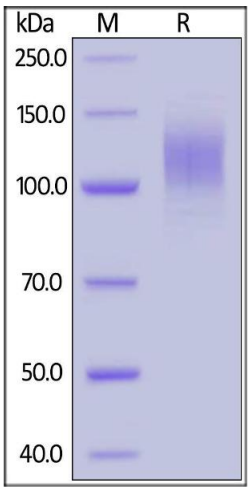
There are more publications referencing this product on: Product page

Images



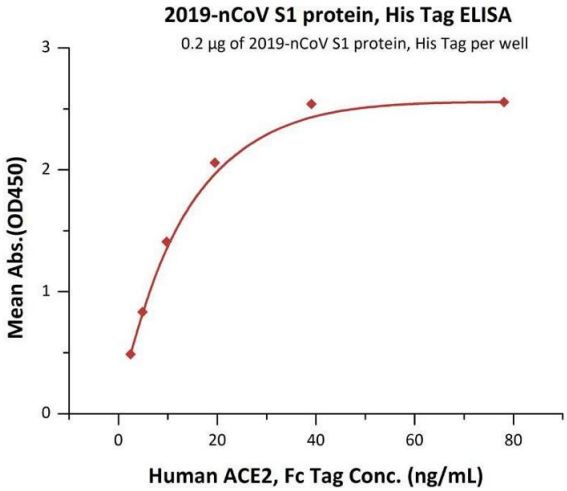
ELISA

Image 1. Immobilized SARS-CoV-2 S1 protein, His Tag (ABIN6952427,ABIN6952430) at 2 μg/mL (100 μL/well) can bind Monoclonal A-CoV-S protein RBD Antibody, Human IgG1 with a linear range of 0.1-4 ng/mL (Routinely tested).



SDS-PAGE

Image 2. 2019-nCoV S1 protein, 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 90%.



ELISA

Image 3. Immobilized 2019-nCoV S1 protein, His Tag (ABIN6952427) at 2 μg/mL (100 μL/well) can bind Human ACE2, Fc Tag with a linear range of 2-20 ng/mL (QC tested).

Please check the product details page for more images. Overall 6 images are available for ABIN6952427.