

32-13556: CoV-2 S1 (319-541), Sf9

Application :	Functional Assay
Alternative Name :	Severe acute respiratory syndrome coronavirus 2, COVID-19, COVID-19 virus, COVID19, HCoV-19, Human coronavirus 2019, SARS-2, SARS-CoV2, SARS2, Wuhan coronavirus, Wuhan seafood market pneumonia virus, SARS-CoV-2 SP RBD, 2019-nCoV SP RBD, 2019-nCoV, 2019-nCoV; Spike RBD Protein.

Description

Source: Sf9, Baculovirus cells.

Sterile Filtered colorless solution.

A human infecting coronavirus (viral pneumonia) called 2019 novel coronavirus, 2019-nCoV was found in the fish market at the city of Wuhan, Hubei province of China on December 2019. The 2019-nCoV shares an 87% identity to the 2 bat-derived severe acute respiratory syndrome 2018 SARS-CoV-2 located in Zhoushan of eastern China. 2019-nCoV has an analogous receptor-BD-structure to that of 2018 SARS-CoV, even though there is a.a. diversity so thus the 2019-nCoV might bind to ACE2 receptor protein (angiotensin-converting enzyme 2) in humans. While bats are probably the host of 2019-nCoV, researchers suspect that animal from the ocean sold at the seafood market was an intermediate host. RSCU analysis proposes that the 2019-nCoV is a recombinant within the viral spike glycoprotein between the bat coronavirus and an unknown coronavirus.

Recombinant Coronavirus 2019-nCoV Spike Glycoprotein-S1 Receptor Binding Domain is a single, glycosylated polypeptide chain containing a total of 232 amino acids (319-541) and having a calculated Mw of 26.2 kDa. CoV-2 S1 (319-541) is fused to a 6 amino acid His-tag at C-terminus, and is purified by proprietary chromatographic techniques.

Product Info

Amount :	2 µg / 10 µg
Purification :	Greater than 95.0% as determined by SDS-PAGE.
Content :	CoV-2 S1 (319-541) solution (0.25mg/ml) contains Phosphate-Buffered Saline (pH 7.4) containing 10% glycerol.
Storage condition :	Store at 4°C if entire vial will be used within 2-4 weeks. Store, frozen at -20°C for longer periods of time. For long term storage it is recommended to add a carrier protein (0.1% HSA or BSA). Avoid multiple freeze-thaw cycles.
Amino Acid :	ADPRVQPTES IVRFPNITNL CPFGEVFNAT RFASVYAWNR KRISNCVADY SVLYNSASFS TFKCYGVSPT KLNDLCFTNV YADSFVIRGD EVRQIAPGQT GKIADYNYKL PDDFTGCVIA WNSNNLDSKV GGNYNLYRL FRKSNLKPFE RDISTEIQY GSTPCNGVEG FNCYFPLQSY GFQPTNGVGY QPYRVVLSF ELLHAPATVC GPKKSTNLVK NKCVMFHFFF HH

Application Note

Measured by its binding ability in a functional ELISA with Human ACE-2.