

Rabbit COVID 19 ORF7a Coronavirus Polyclonal Antibody | anti-COVID-19 antibody

SARS-CoV-2 (COVID-19) ORF7a Antibody

CATALOG # AAA40935	HOST Rabbit	REACTIVITY Virus	APPLICATIONS Immunohistochemistry, ELISA
------------------------------	-----------------------	----------------------------	--

PRODUCT SYNONYMS

COVID 19 ORF7a Coronavirus; Polyclonal Antibody; SARS-CoV-2 (COVID-19) ORF7a Antibody; 2019 Novel Coronavirus; Coronavirus; CoV; COVID-19 virus; HCoV-2; Human Coronavirus 2019; SARS2; SARS-CoV-2; Severe acute respiratory syndrome coronavirus 2; ORF7a; ORF7a protein; Accessory protein 7a; Protein U122; Protein X4; anti-COVID-19 antibody

PRODUCT SPECIFICATIONS

Host	Rabbit
Reactivity	Virus
Clonality	Polyclonal
Isotype	IgG
Purity/Purification	SARS-CoV-2 (COVID-19) ORF7a Antibody is affinity chromatography purified via peptide column.
Form/Format	Liquid. SARS-CoV-2 (COVID-19) ORF7a antibody is supplied in PBS containing 0.02% sodium azide.
Concentration	1mg/mL (varies by lot)
Applicable Applications for anti-COVID-19 antibody	IHC (Immunohistochemistry), ELISA
Immunogen	Anti-SARS-CoV-2 (COVID-19) ORF7a antibody was raised against a peptide corresponding to 15 amino acids near the central domain of SARS-CoV-2 (COVID-19) ORF7a protein. The immunogen is located within 40-90 amino acids of the SARS-CoV-2 (COVID-19) ORF7a protein.
Conjugation	Unconjugated
Protein GI#	1835921947
Homology	Predicted reactivity based on immunogen sequence: SARS-CoV ORF7a: (73%)
Preparation and Storage	SARS-CoV-2 (COVID-19) ORF7a antibody can be stored at 4 degree C for three months and -20 degree C, stable for up to one year. As with all antibodies care should be taken to avoid repeated freeze thaw cycles. Antibodies should not be exposed to prolonged high temperatures.

IMAGES



ELISA

Figure 2 ELISA Validation Antibodies: SARS-CoV-2 (COVID-19) ORF7a Antibody, 9285. A direct ELISA was performed using SARS-CoV-2 ORF7a immunogen peptide (9285P) as coating antigen and the anti-SARS-CoV-2 (COVID-19) ORF7a antibody as the capture antibody. Secondary: Goat anti-rabbit IgG HRP conjugate at 1:20000 dilution. Detection range is from 0.3 ng/mL to 1000 ng/mL



IHC (Immunohistochemistry)

Figure 1 Immunohistochemistry Validation of SARS-CoV-2 (COVID-19) ORF7a in COVID-19 Patient Lung Immunohistochemical analysis of paraffin-embedded COVID-19 patient lung tissue using anti-SARS-CoV-2 (COVID-19) ORF7a antibody (1 & #956;g/mL). Tissue was fixed with formaldehyde and blocked with 10% serum for 1 h at RT; antigen retrieval was by heat mediation with a citrate buffer (pH6). Samples were incubated with primary antibody overnight at 4 & #730;C. A goat anti-rabbit IgG H&L (HRP) at 1/250 was used as secondary. Counter stained with Hematoxylin. Strong signal of SARS-COV-2 ORF7a protein was observed in macrophages of COVID-19 patient lung, but not in non-COVID-19 patient lung.

ADDITIONAL INFORMATION

Related Product Information for anti-COVID-19 antibody	Coronavirus disease 2019 (COVID-19), formerly known as 2019-nCoV acute respiratory disease, is an infectious disease caused by SARS-CoV-2, a virus closely related to the SARS virus (1). The disease is the cause of the 2019-20 coronavirus outbreak (2). SARS-CoV-2 virus proteins include structural proteins, non-structural proteins and accessory factors. The structure of SARS-CoV-2 consists of the following: a spike protein (S), hemagglutinin-esterase dimer (HE), a membrane glycoprotein (M), an envelope protein (E) a nucleocapsid protein (N) and RNA. SARS-CoV-2 non-structural protein is ORF1ab that consists of 16 proteins (nsp1-nsp16), while accessory factors include ORF3a, ORF3b, ORF6, ORF7a, ORF7b, ORF8, ORF9b, ORF7a and ORF7a. ORF7a plays a role as antagonist of host tetherin (BST2), disrupting its antiviral effect. It acts by binding to BST2 thereby interfering with its glycosylation. It may suppress small interfering RNA (siRNA) and may bind to host ITGAL, thereby playing a role in attachment or modulation of leukocytes (3).
Product Categories/Family for anti-COVID-19 antibody	Infectious Disease; COVID-19
References	Gorbalenya. bioRxiv: 2020. Hui et al. Int J Infect Dis. 2020;91:264-266. Taylor et al. J. Virol. 2015; 89:11820-11833.

NCBI AND UNIPROT INFORMATION

NCBI GeneID	43740573
UniProt Accession #	P0DTC7
Molecular Weight	Predicted Molecular Weight: 14kD

For Research Use Only. Not for use in diagnostic or therapeutic procedures. Small volumes of product may become entrapped in the seal of the vial during shipment and storage; if necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the cap.

AAA Biotech | Tel: +1 (619) 604-9440 | Fax: +1 (619) 604-9441 | contact@aaabiotech.com

Online datasheet: <https://stage.aaabiotech.com/polyclonal/covid-19-orf7a-coronavirus-antibody-immunohistochemistry-elisa/40935>