

SARS-CoV/SARS-CoV-2 Nucleocapsid Monoclonal Antibody | anti-NP-CoV antibody

SARS-CoV/SARS-CoV-2 Nucleocapsid Antibody, Chimeric MAb

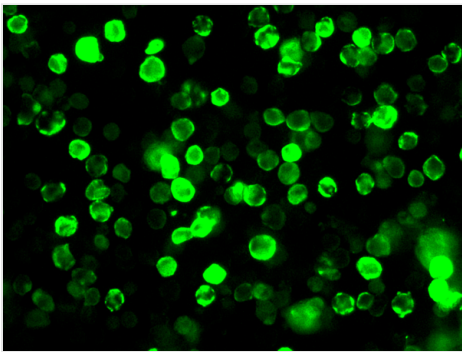
CATALOG #	HOST	REACTIVITY	APPLICATIONS
AAA257781	Chimeric Rabbit/Human	SARS	Immunofluorescence, Immunocytochemistry, Flow Cytometry, Functional Assay, Immunohistochemistry, ELISA, Western Blot

PRODUCT SYNONYMS

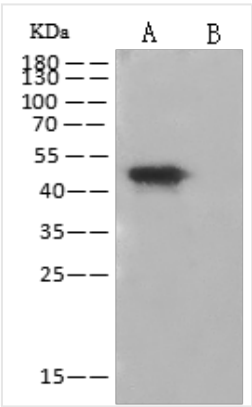
SARS-CoV/SARS-CoV-2 Nucleocapsid; Monoclonal Antibody; SARS-CoV/SARS-CoV-2 Nucleocapsid Antibody; Chimeric MAb; Anti-coronavirus NP Antibody; Anti-coronavirus Nucleocapsid Antibody; Anti-coronavirus Nucleoprotein Antibody; Anti-cov np Antibody; Anti-ncov NP Antibody; Anti-novel coronavirus NP Antibody; Anti-novel coronavirus Nucleocapsid Antibody; Anti-novel coronavirus Nucleoprotein Antibody; Anti-NP Antibody; Anti-Nucleocapsid Antibody; Anti-Nucleoprotein Antibody; anti-NP-CoV antibody

PRODUCT SPECIFICATIONS

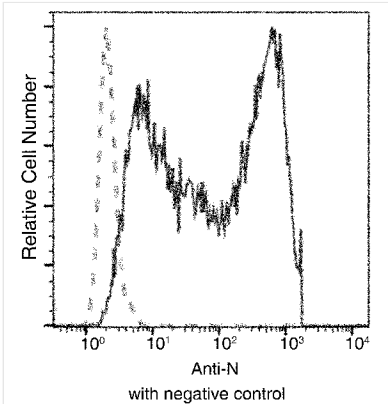
Host	Chimeric Rabbit/Human
Reactivity	SARS
Clonality	Monoclonal
Isotype	Rabbit (variable region)/Human (kappa/IgG1 constant) chimeric antibody
Clone Number	4
Specificity	SARS-CoV Nucleocapsid Protein
Purity/Purification	Protein A
Form/Format	Liquid. 0.2um filtered solution in PBS
Applicable Applications for anti-NP-CoV antibody	IF (Immunofluorescence), ICC (Immunocytochemistry), FCM/FACS (Flow Cytometry), IHC (Immunohistochemistry), ELISA, WB (Western Blot)
Immunogen	Recombinant SARS-CoV Nucleoprotein/NP Protein
Conjugation	Unconjugated
Cross-reactivity	Has cross-reactivity in ELISA with SARS-CoV-2 (2019-nCoV) Nucleocapsid Protein No cross-reactivity in ELISA with MERS-CoV Nucleoprotein protein HCoV-229E Nucleoprotein protein HCoV-NL63 Nucleoprotein protein HCoV-HKU1(isolate N5) Nucleoprotein protein HCoV-OC43 Nucleoprotein
Preparation	It is a chimeric monoclonal antibody combining the constant domains of the human IgG1 molecule with rabbit variable regions, and the variable region was from rabbit monoclonal antibody. The chimeric monoclonal antibody was produced using recombinant antibody technology.
Preparation and Storage	This antibody can be stored at 2-8 degree C for one month without detectable loss of activity. Antibody products are stable for twelve months from date of receipt when stored at -20 degree C to -80 degree C. Preservative-Free. Avoid repeated freeze-thaw cycles. This antibody is shipped as liquid solution at ambient temperature. Upon receipt, store it immediately at the temperature recommended below.



IF (Immunofluorescence)
Immunofluorescence analysis of SARS-CoV-2 Nucleocapsid overexpressed HEK293 Cells were stained with purified anti-SARS Nucleocapsid Chimera Mab, then a FITC-conjugated second step antibody.



WB (Western Blot)
Anti-SARS-CoV / SARS-CoV-2 Nucleocapsid Chimeric monoclonal antibody at 1:2000 dilution. Lane A: SARS-CoV-2 Nucleocapsid overexpressed HEK293 Whole Cell Lysate. Lane B: HEK293 Whole Cell Lysate. Lysates/proteins at 30 ug per lane. Secondary Goat Anti-Human IgG Fc/HRP at 1/1000 dilution. Developed using the ECL technique. Performed under reducing conditions.



FCM/FACS (Flow Cytometry)
Flow cytometric analysis of SARS-CoV-2 Nucleocapsid overexpressed HEK293 Cells were stained with purified anti-SARS-CoV-2 Nucleocapsid Chimeric Mab, then a FITC-conjugated second step antibody. The fluorescence histograms were derived from gated events with the forward and side light-scatter characteristics of intact cells.

ADDITIONAL INFORMATION

Related Product Information for anti-NP-CoV antibody	Background: Coronaviruses are enveloped viruses with a positive-sense RNA genome and with a nucleocapsid of helical symmetry. Coronavirus nucleoproteins localize to the cytoplasm and the nucleolus, a subnuclear structure, in both virus-infected primary cells and in cells transfected with plasmids that express N protein. The coronavirus N protein is required for coronavirus RNA synthesis and has RNA chaperone activity that may be involved in template switch. Nucleocapsid protein is the most abundant protein of coronavirus. During virion assembly, N protein binds to viral RNA and leads to the formation of the helical nucleocapsid. Nucleocapsid protein is a highly immunogenic phosphoprotein also implicated in viral genome replication and in modulating cell signaling pathways. Because of the conservation of the N protein sequence and its strong immunogenicity, the N protein of coronavirus is chosen as a test tool.
References	1. Van Boheemen S, et al. (2012), MBio. 3(6):e00473-12. Bisht H. et al., 2004, Proc Natl Acad Sci. 101 (17): 6641-6. Li W. et al., 2005, Science. 309 (5742): 1864-8.

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.