Resource Summary Report

Generated by RRID on Aug 27, 2026

pcDNA3-SARS-CoV-2-S-RBD-8his

RRID:Addgene_145145
Type: Plasmid

Proper Citation

RRID:Addgene_145145

Plasmid Information

URL: http://www.addgene.org/145145

Proper Citation: RRID:Addgene_145145

Insert Name: Secreted receptor binding domain (RBD; a.a. 333-529) of S protein from SARS-CoV-2

Organism: SARS coronavirus 2

Bacterial Resistance: Ampicillin

Defining Citation: PMID:32753553

Vector Backbone Description: Backbone Marker:Invitrogen; Backbone Size:5332; Vector Backbone:pcDNA3.1(+); Vector Types:Mammalian Expression; Bacterial Resistance:Ampicillin

Comments: Please visit https://www.biorxiv.org/content/10.1101/2020.03.16.994236v1 for BioRxiv preprint.

Plasmid Name: pcDNA3-SARS-CoV-2-S-RBD-8his

Relevant Mutation: Codon-optimized for human cell expression.

Record Creation Time: 20220422T221818+0000

Record Last Update: 20260815T080653+0000

Ratings and Alerts

No rating or validation information has been found for pcDNA3-SARS-CoV-2-S-RBD-8his.

No alerts have been found for pcDNA3-SARS-CoV-2-S-RBD-8his.

Data and Source Information

Source: Addgene

Usage and Citation Metrics

We found 15 mentions in open access literature.

Listed below are recent publications. The full list is available at RRID .

Broderick K, et al. (2025) Human protein interaction networks of ancestral and variant SARS-CoV-2 in organ-specific cells and bodily fluids. Nature communications, 16(1), 5784.

Cavazzini D, et al. (2024) Broad Neutralization Capacity of an Engineered Thermostable Three-Helix Angiotensin-Converting Enzyme 2 Polypeptide Targeting the Receptor-Binding Domain of SARS-CoV-2. International journal of molecular sciences, 25(22).

V??lzke JL, et al. (2023) Efficient Purification of Polyhistidine-Tagged Recombinant Proteins Using Functionalized Corundum Particles. Biotech (Basel (Switzerland)), 12(2).

Fertig TE, et al. (2022) Vaccine mRNA Can Be Detected in Blood at 15 Days Post-Vaccination. Biomedicines, 10(7).

Ventura C, et al. (2022) Maximization of the Minicircle DNA Vaccine Production Expressing SARS-CoV-2 RBD. Biomedicines, 10(5).

Lupitha SS, et al. (2022) A rapid bead-based assay for screening of SARS-CoV-2 neutralizing antibodies. Antibody therapeutics, 5(2), 100.

Chen J, et al. (2022) Sustained Delivery of SARS-CoV-2 RBD Subunit Vaccine Using a High Affinity Injectable Hydrogel Scaffold. Advanced healthcare materials, 11(2), e2101714.

Zhang L, et al. (2022) An engineered ACE2 decoy receptor can be administered by inhalation and potently targets the BA.1 and BA.2 omicron variants of SARS-CoV-2. bioRxiv : the preprint server for biology.

Chan KK, et al. (2021) An engineered decoy receptor for SARS-CoV-2 broadly binds protein S sequence variants. Science advances, 7(8).

Ahmad J, et al. (2021) Structures of synthetic nanobody-SARS-CoV-2-RBD complexes reveal distinct sites of interaction and recognition of variants. Research square.

Ahmad J, et al. (2021) Structures of synthetic nanobody-SARS-CoV-2 receptor-binding domain complexes reveal distinct sites of interaction. The Journal of biological chemistry, 297(4), 101202.

Havranek B, et al. (2021) Computationally Designed ACE2 Decoy Receptor Binds SARS-CoV-2 Spike (S) Protein with Tight Nanomolar Affinity. Journal of chemical information and modeling, 61(9), 4656.

Freeman KG, et al. (2021) A Mycobacteriophage-Based Vaccine Platform: SARS-CoV-2 Antigen Expression and Display. Microorganisms, 9(12).

McAndrews KM, et al. (2020) Heterogeneous antibodies against SARS-CoV-2 spike receptor binding domain and nucleocapsid with implications for COVID-19 immunity. JCI insight, 5(18).

Procko E, et al. (2020) The sequence of human ACE2 is suboptimal for binding the S spike protein of SARS coronavirus 2. bioRxiv : the preprint server for biology.