



# COVID-19 Impact: -The Roundup

This meeting will be recorded and will be available at [www.fmda.org/journalclub.php](http://www.fmda.org/journalclub.php)



# FMDA Journal Club

April 14, 2021

Diane Sanders-Cepeda, DO, CMD – Presenter

# Agenda

- State of the State
- Clinical Updates – Vaccinations & Variants
- Research updates
- Open Discussion

COVID-19 Dashboard by the Center for Systems Science and Engineering (CSSE) at Johns Hopkins University (JHU)



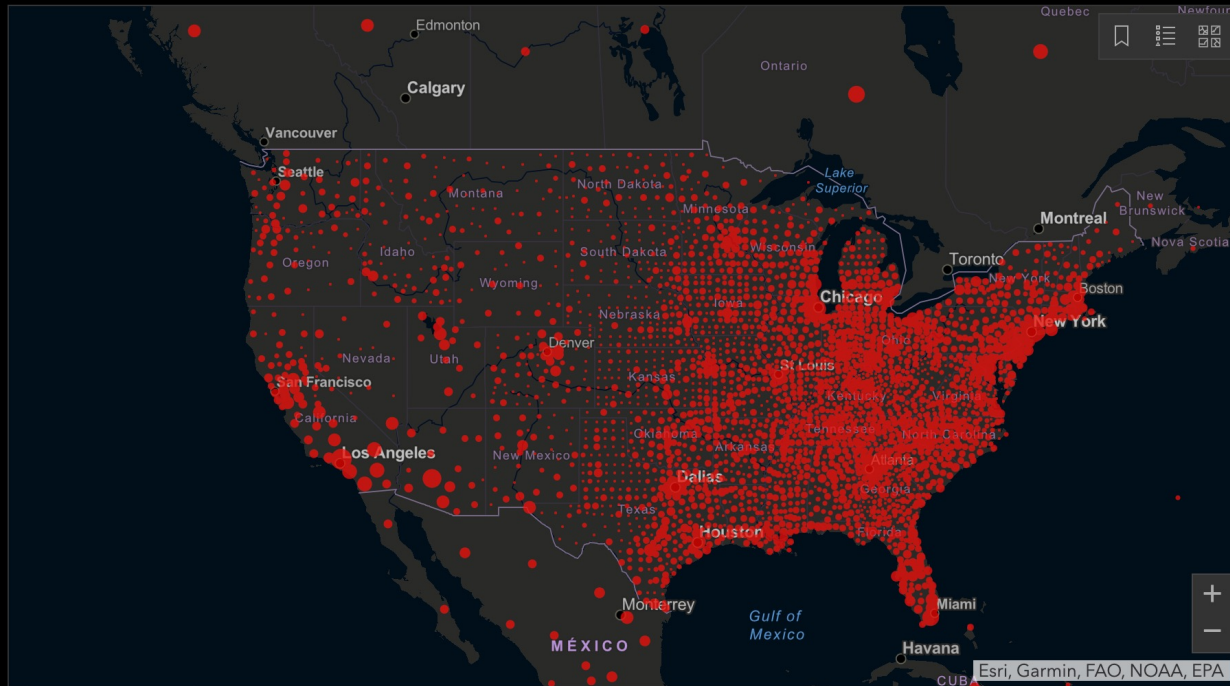
Global Cases **31,346,923**

Cases by Country/Region/Sovereignty

<b>31,346,923</b> US
<b>13,873,825</b> India
<b>13,599,994</b> Brazil
<b>5,167,265</b> France
<b>4,613,646</b> Russia
<b>4,390,801</b> United Kingdom
<b>3,962,760</b> Turkey
<b>3,793,033</b> Italy
<b>3,376,548</b> Spain
<b>3,054,025</b> Germany
<b>2,621,116</b> Poland
<b>2,579,000</b> Argentina
<b>2,560,314</b> Colombia

Admin0 Admin1 Admin2

Last Updated at (M/D/YYYY) **4/14/2021, 7:20 AM**



Cumulative Cases Incidence Rate Case-Fatality Ratio Testing Rate

**192** countries/regions

Lancet Inf Dis Article: [Here](#). Mobile Version: [Here](#). Data sources: [Full list](#). Downloadable database: [GitHub](#), [Feature Layer](#). Lead by JHU CSSE. Technical Support: [Esri Living Atlas team](#) and [JHU APL](#). Financial Support: [JHU](#), [NSF](#), [Bloomberg Philanthropies](#) and [Stavros Niarchos Foundation](#). Resource support: [Slack](#), [Github](#) and [AWS](#).

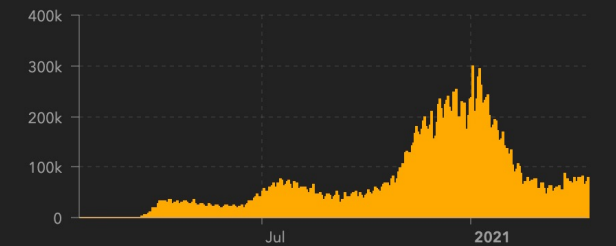
Global Deaths **563,449**

563,449 deaths US

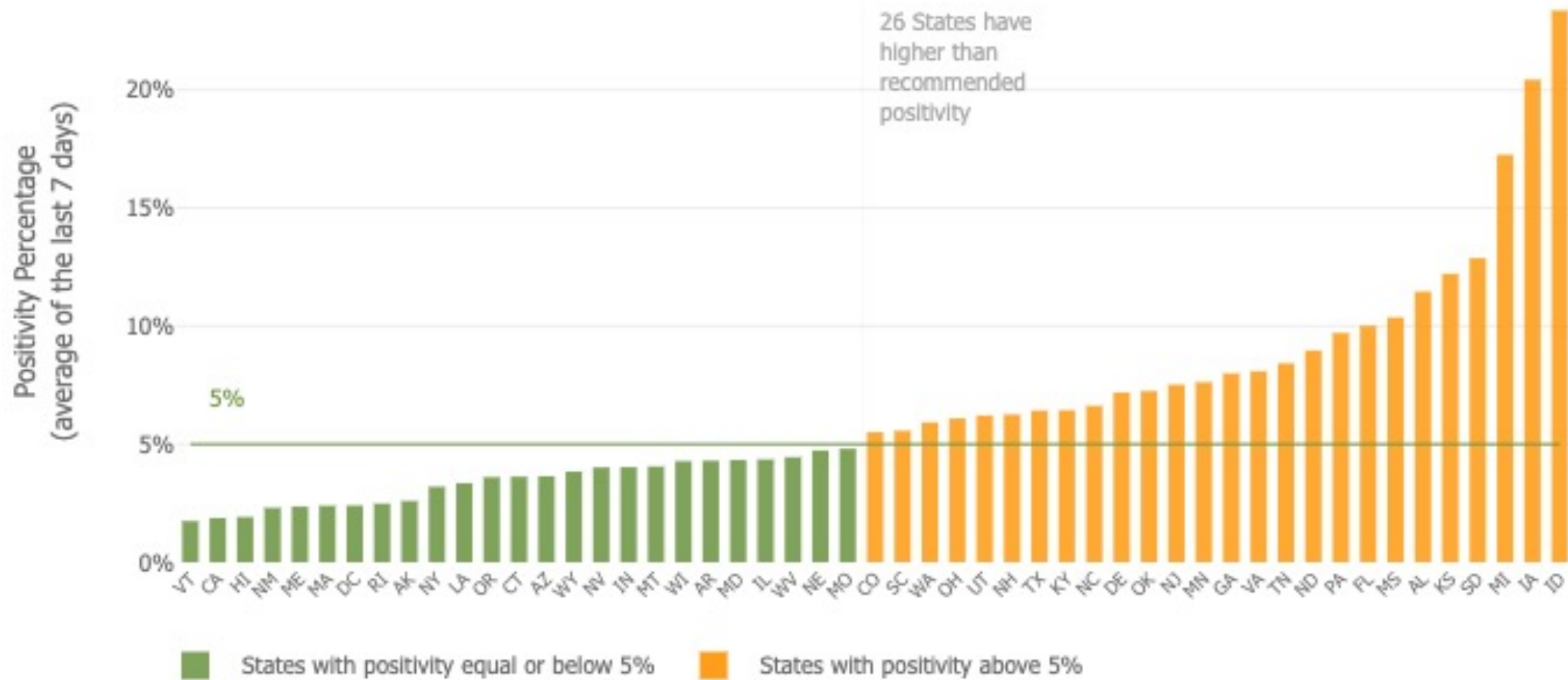
Total Test Results in US **410,410,902**

<b>56,722,428</b> tests California US
<b>47,730,623</b> tests New York US
<b>22,118,906</b> tests Texas US
<b>21,630,508</b> tests Florida US
<b>21,283,370</b> tests Illinois US
<b>19,931,128</b> tests Massachusetts US

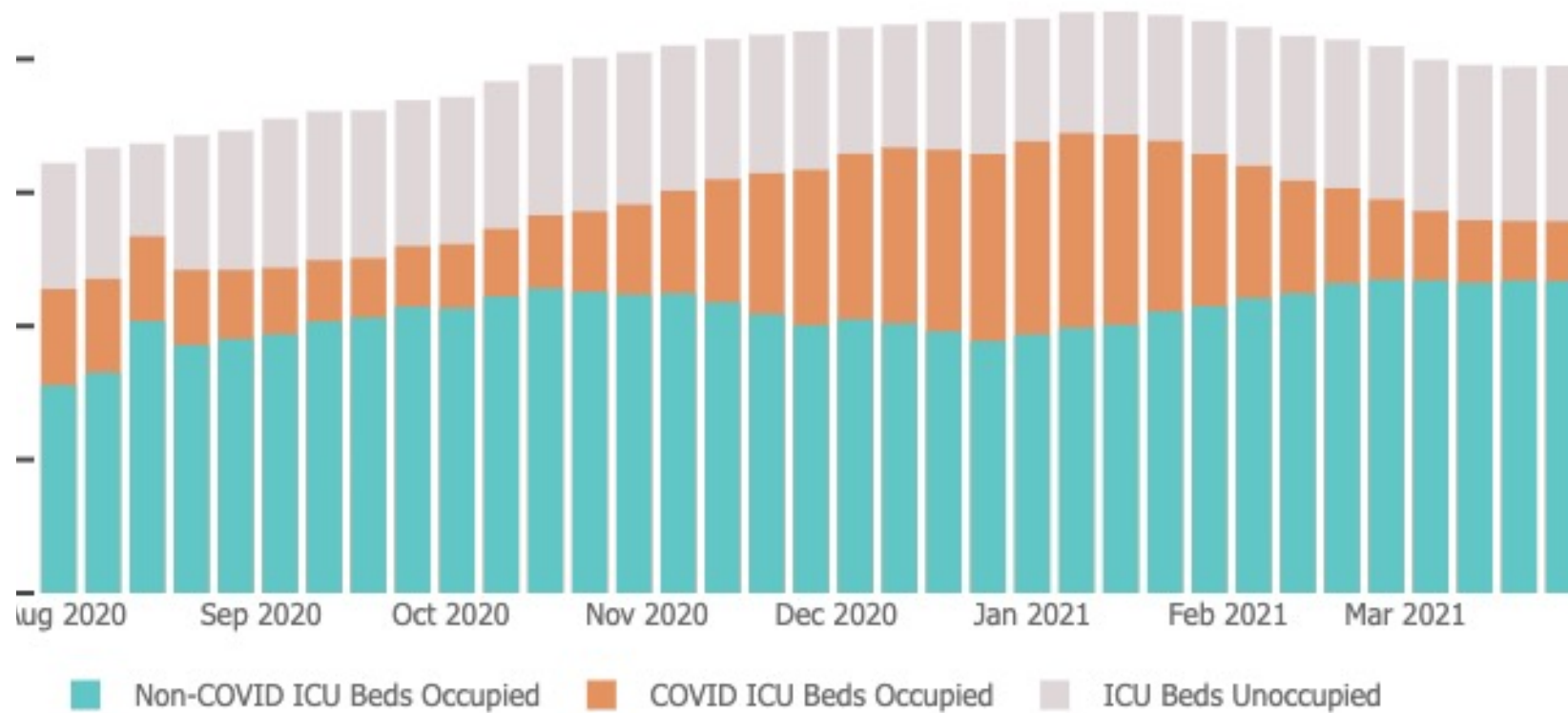
Global Deaths US Test Results US Deaths



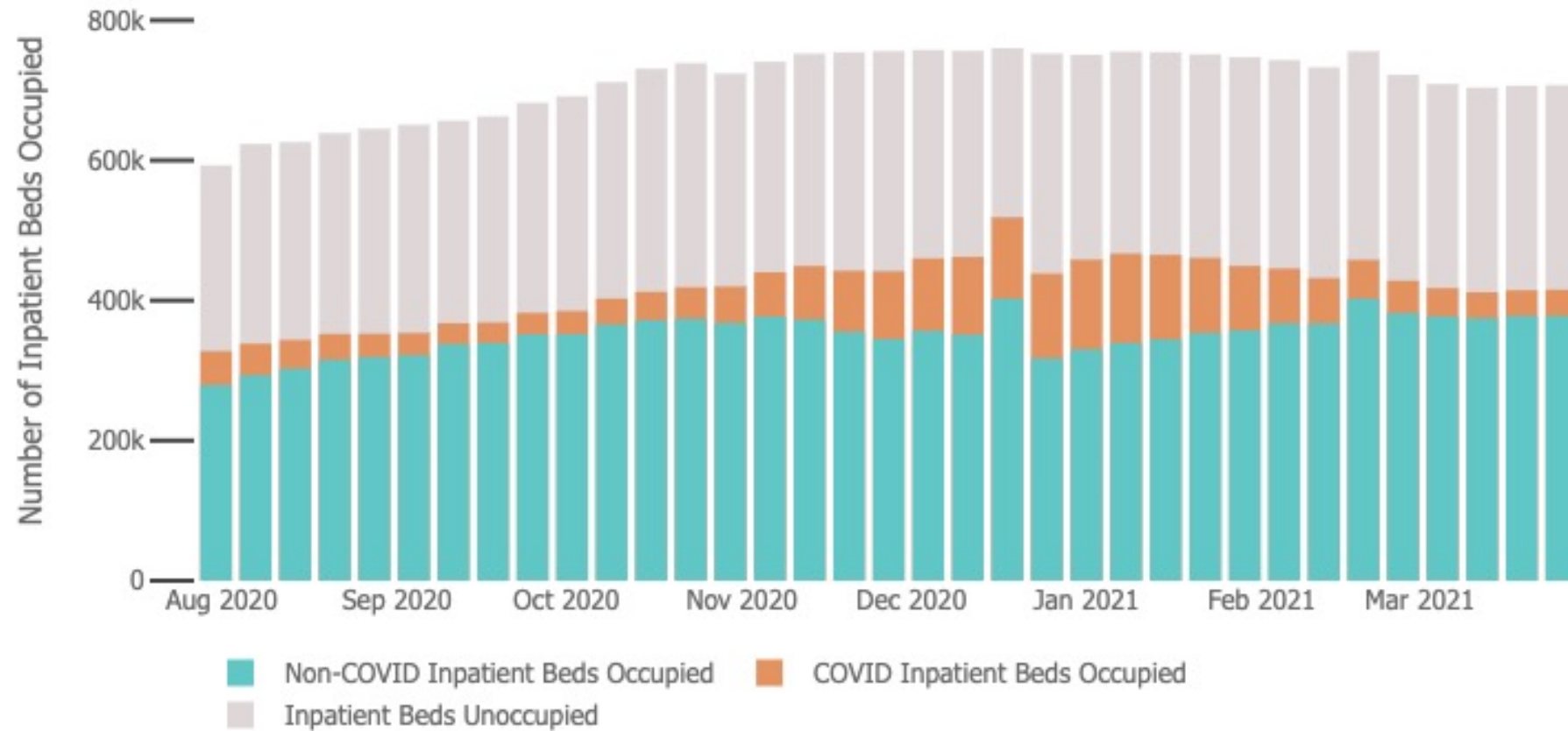
Daily Cases



# US 7 Day trend - ICU Capacity



# US 7 Day trend – Inpatient capacity





# Florida's COVID-19 Data and Surveillance Dashboard

Florida Department of Health, Division of Disease Control and Health Protection

Select a County

# Total Cases

# 2,134,914

Cumulative Data for Florida Residents:

# Positive Residents

# 2,094,670

# Resident Hospitalizations

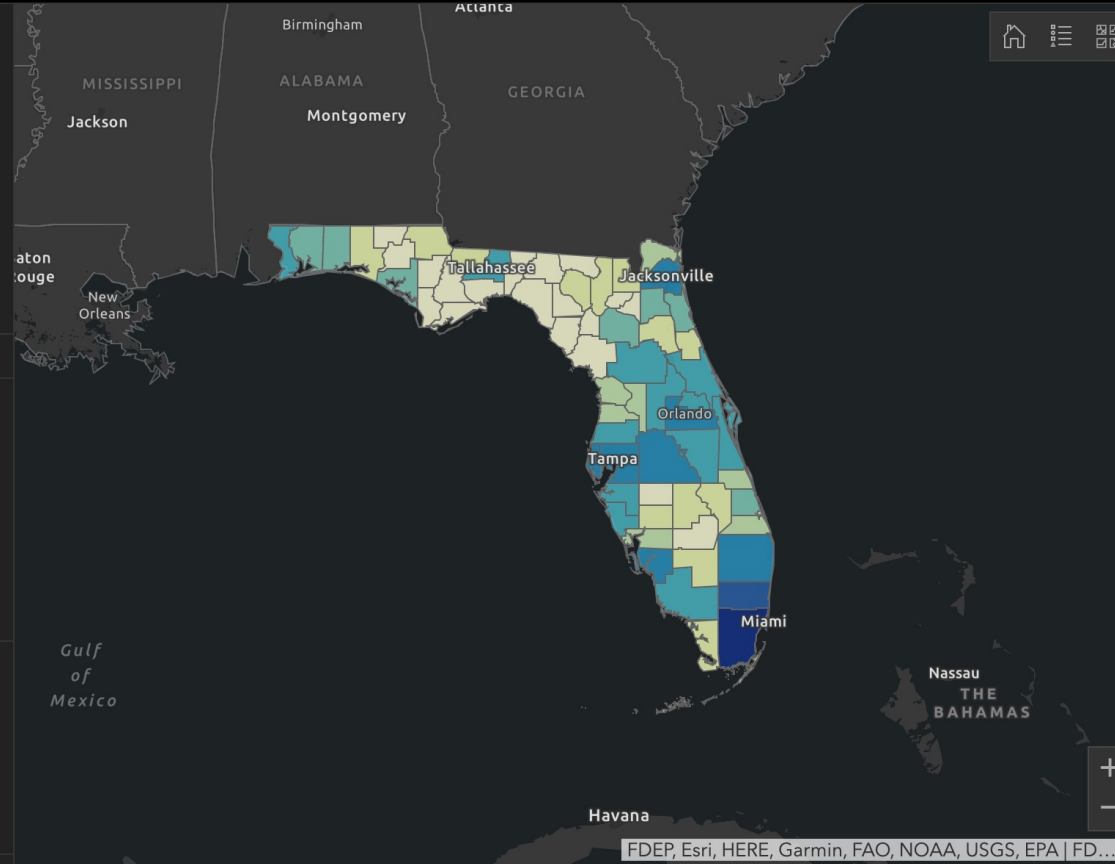
# 87,287

Florida Resident Deaths

# 34,120

Non-Resident Deaths

# 664

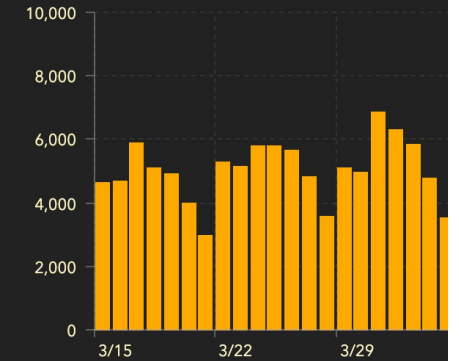


**Data updated Daily**  
**Comparison of counties is not possible because case data are not adjusted by population.**

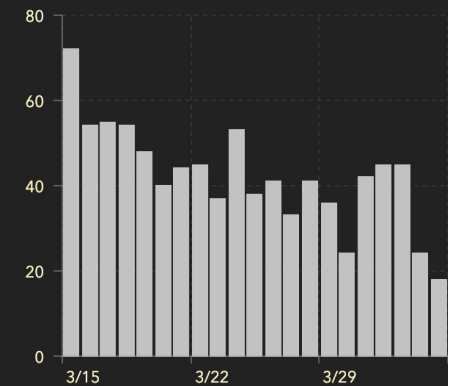
[Click here to access and download data](#)

### Recent Data for Florida Residents (Last 14 Days)

#### New Cases of Residents by Date



#### Resident Deaths by Date of Death



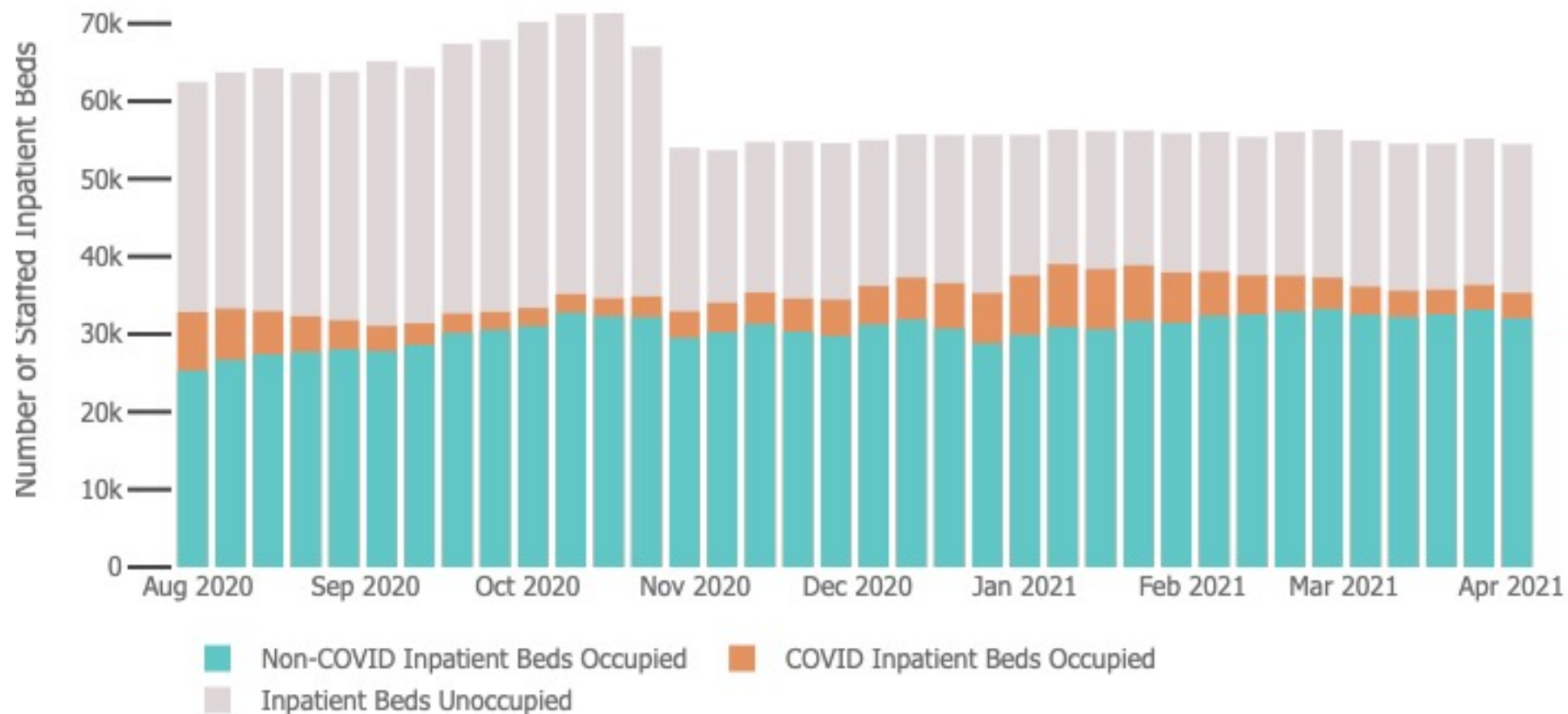
The Deaths by Day chart shows the total number of Florida residents with COVID-19 that died on each calendar day (12:00 AM - 11:59 PM). There are significant delays in reporting, so data within the past two weeks may be incomplete.



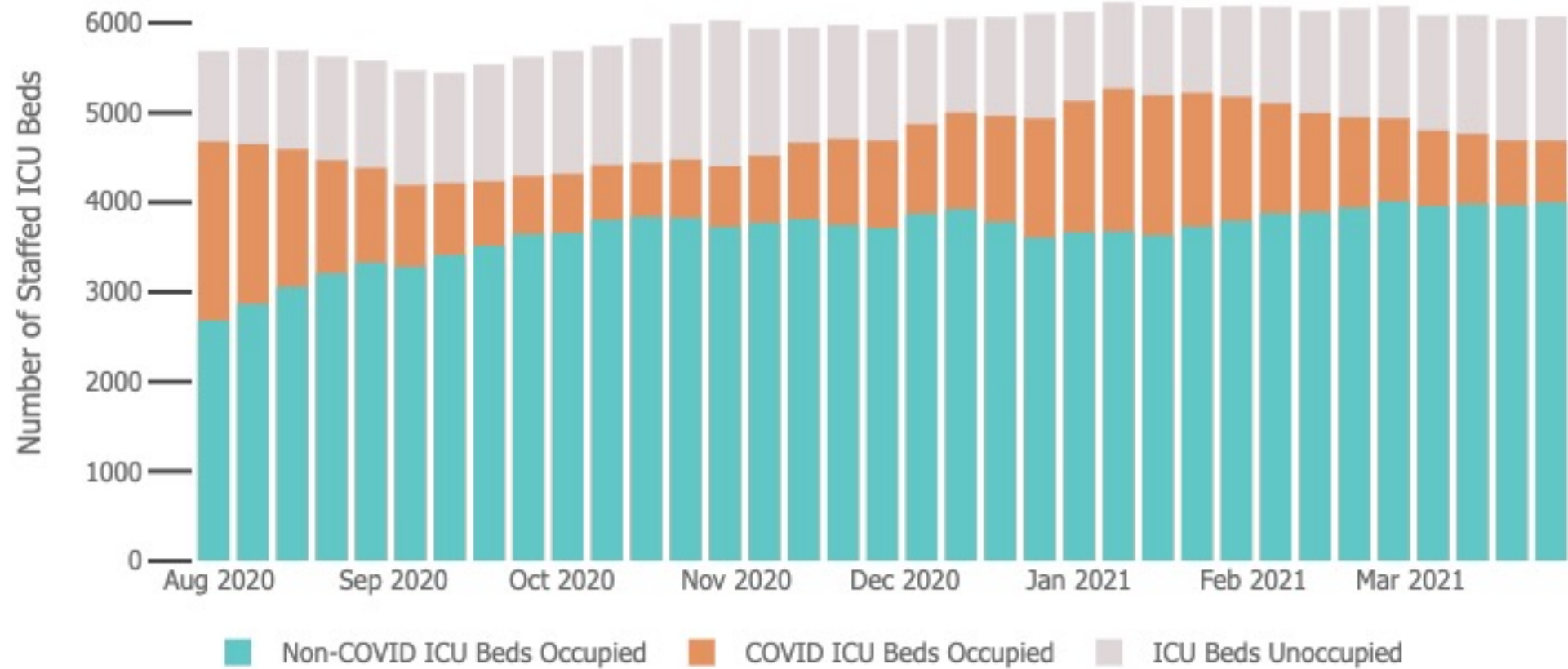
# Florida Trends

- As of 4/12 positivity rate – 8.16%
- As of 4/12 new cases – 9,130
- Positivity rates amongst LTC residents – 0.22%
- Positivity rates amongst LTC staff - 0/19%

# Florida 7 Day Trend – Inpatient Capacity



# Florida 7 Day Trend – ICU Capacity





# Vaccination Updates




# COVID-19 Vaccinations in the United States

Overall US COVID-19 Vaccine | Deliveries and Administration; Maps, charts, and data provided by CDC, updated daily by 8 pm ET<sup>†</sup>

Represents all vaccine partners including jurisdictional partner clinics, retail pharmacies, long-term care facilities, dialysis centers, Federal Emergency Management Agency and Health Resources and Services Administration partner sites, and federal entity facilities.

Total Vaccine Doses		People Vaccinated		
		At Least One Dose	Fully Vaccinated	
Delivered	245,364,805	Total	122,295,530	75,322,283
Administered	192,282,781	% of Total Population	36.8%	22.7%
<a href="#">Learn more about the distribution of vaccines.</a>		Population ≥ 18 Years of Age	121,376,367	75,117,813
		% of Population ≥ 18 Years of Age	47%	29.1%
		Population ≥ 65 Years of Age	43,293,678	34,161,828
		% of Population ≥ 65 Years of Age	79.2%	62.5%

 About these data

CDC | Data as of: Apr 13 2021 6:00am ET | Posted: Apr 13 2021 10:50PM ET

## View:

- Total Doses
- People

## Show:

- Administered
- Delivered

## Metric:

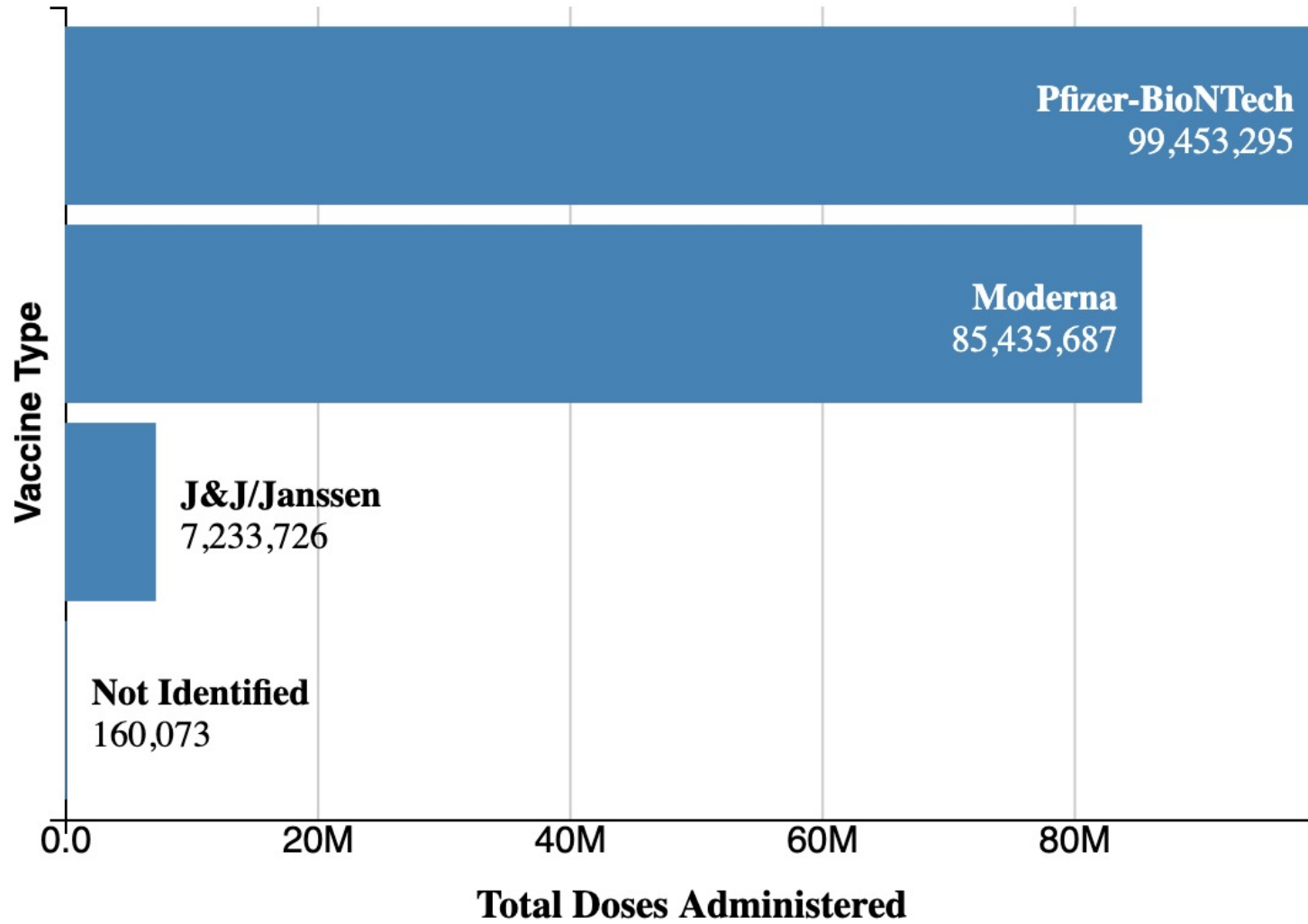
- Count
- Rate per 100,000

## Population:

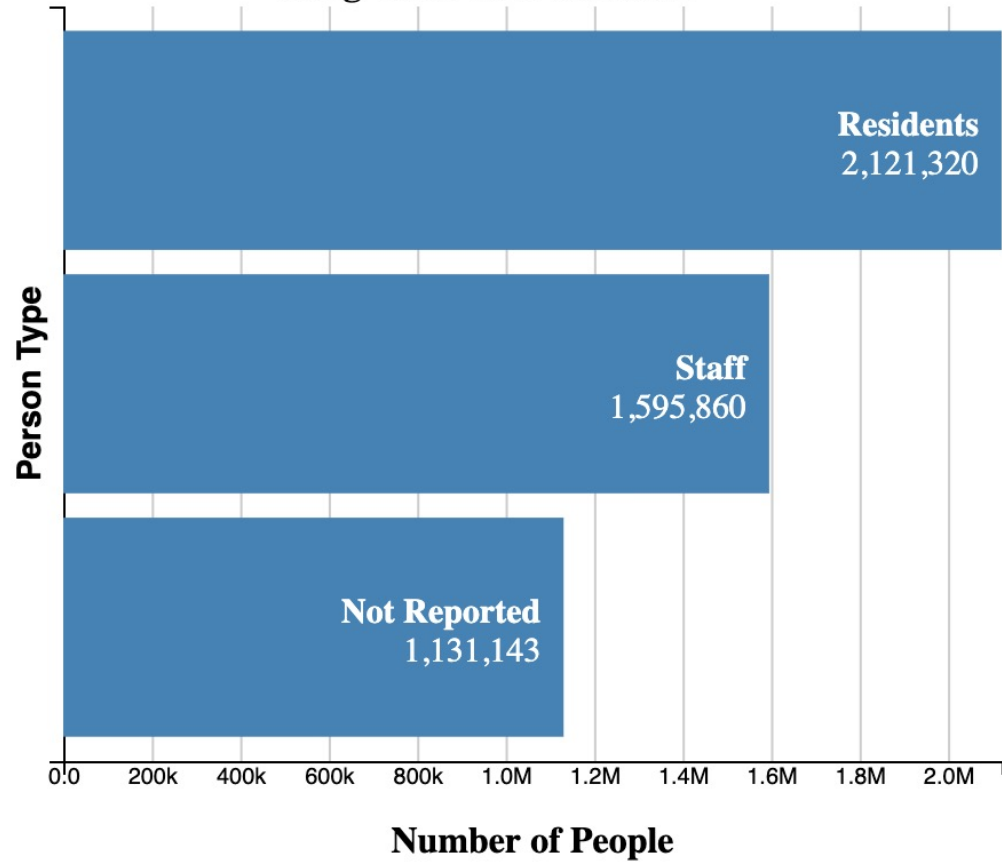
- Total Population
- Population ≥ 18 Years of Age
- Population ≥ 65 Years of Age

This shows the number of doses administered within the state or territory for every 100,000 people of the total population. It does not reflect the residency of the person receiving the vaccine, but where they received it.

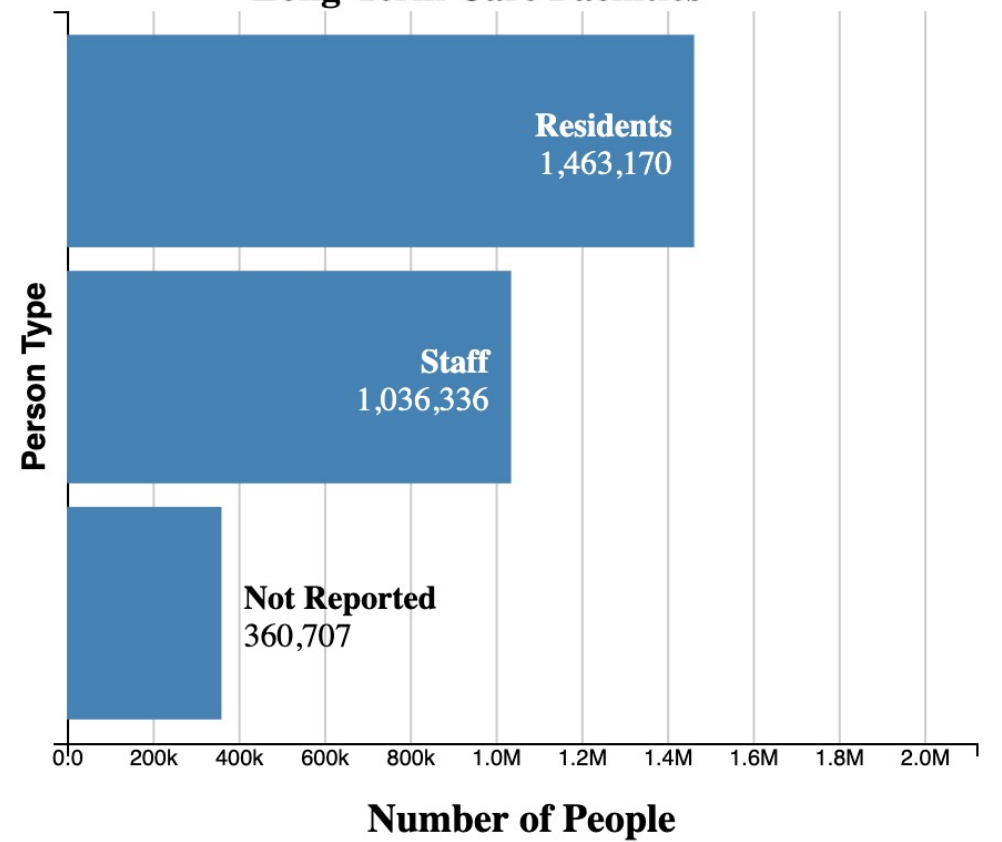
## U.S. COVID-19 Vaccine Administration by Vaccine Type



**Number of People with at least One Dose in Long-Term Care Facilities**



**Number of Fully Vaccinated People in Long-Term Care Facilities**



# COVID Vaccinations

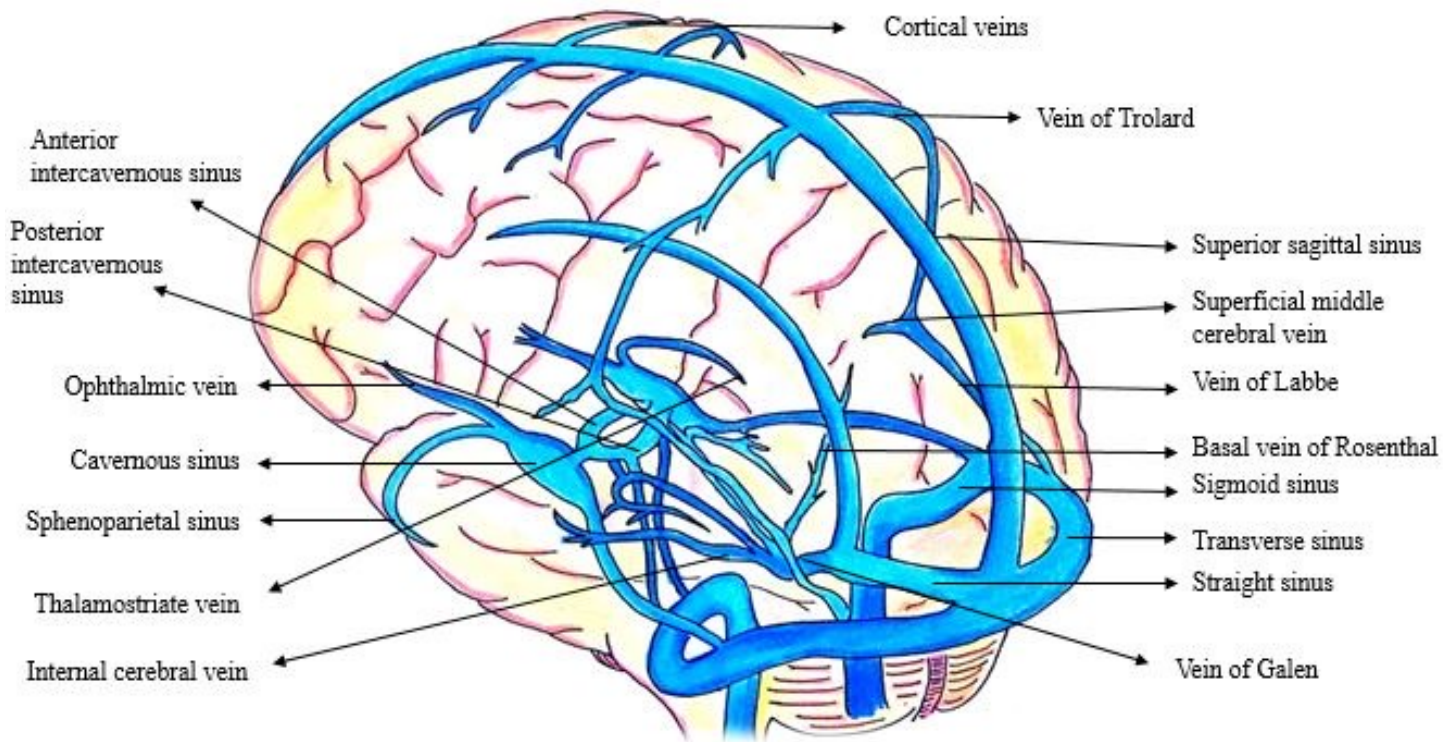
	Pfizer/BionNtech BNT162b1 RNA-based	Moderana mRNA-1237	Johnson & Johnson Ad26.COV2-S	Oxford/AstraZeneca AZD1222	Novavax NVX-CoV2373
Type	mRNA	mRNA	Adenovirus-based	Adenovirus-based	Protein-based vaccine
Dose(s)	2 doses, 21 days apart	2 doses, 28 days apart	Single dose and 2 doses (57 days apart) are being studied	2 doses, 28 days apart	2 doses; 21 days apart
EUA	Approved	Approved	Approved	Not approved	Not approved
Efficiency	95%	95%	66% at preventing mod to severe COVID; 85% overall vaccine efficacy – in preventing severe disease Single dose	70%	89.3%
Availability	Approved in the US Dec 2020	Approved in the US Dec 2020	Approved in the US – Feb 2021	Pending approval in US; Authorized in Europe, and in other countries – <i>**distribution on hold in several countries</i>	Feb. or March 2021 in UK Q1/Q2 in the US



# Joint CDC and FDA Statement on Johnson & Johnson COVID-19 Vaccine

The following statement is attributed to Dr. Anne Schuchat, Principal Deputy Director of the CDC and Dr. Peter Marks, director of the FDA's Center for Biologics Evaluation and Research

# Cerebral Venous Sinus Thrombosis



In combination with  
Thrombocytopenia

6 cases in women,  
ages 18 – 48

Symptoms occurred 6  
to 13 days post  
vaccination

*The* NEW ENGLAND JOURNAL *of* MEDICINE

ORIGINAL ARTICLE

# Thrombotic Thrombocytopenia after ChAdOx1 nCov-19 Vaccination

Andreas Greinacher, M.D., Thomas Thiele, M.D., Theodore E. Warkentin, M.D.,  
Karin Weisser, Ph.D., Paul A. Kyrle, M.D., and Sabine Eichinger, M.D.

ABSTRACT



# What is the Impact on Vaccine Confidence?

---



*The* NEW ENGLAND JOURNAL *of* MEDICINE

MEDICINE AND SOCIETY

Debra Malina, Ph.D., *Editor*

# Escaping Catch-22 — Overcoming Covid Vaccine Hesitancy

Lisa Rosenbaum, M.D.

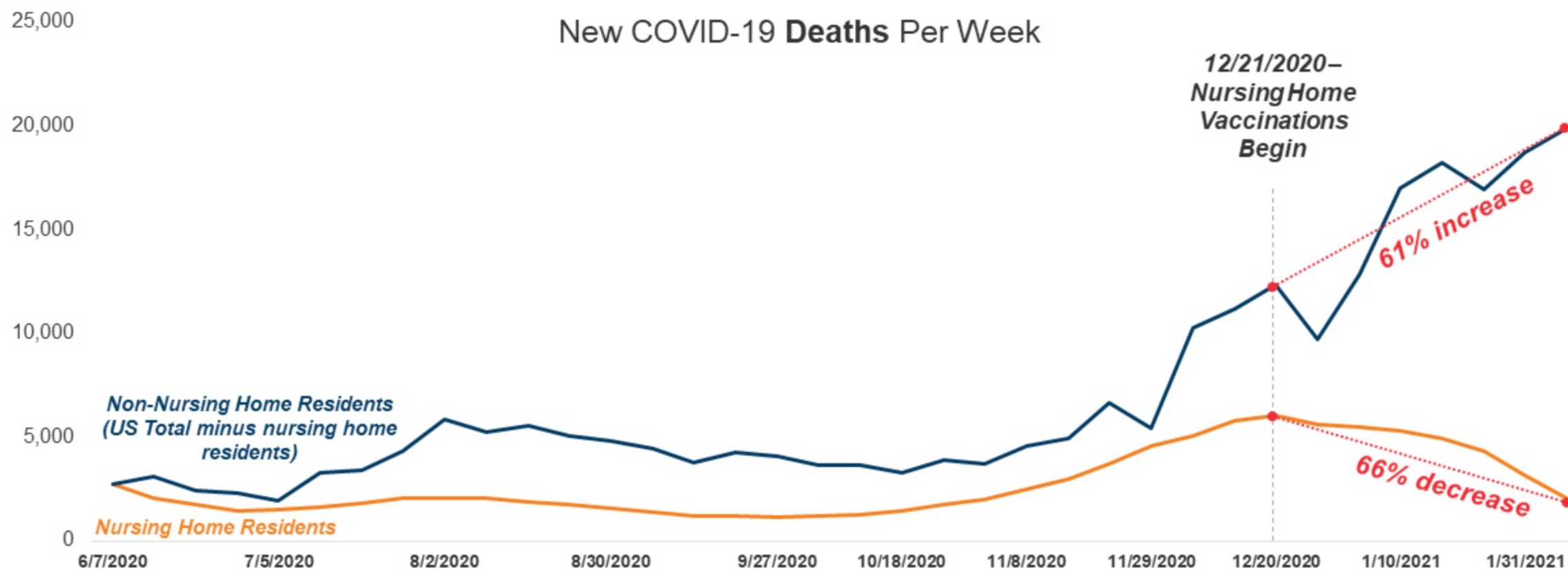


*The* NEW ENGLAND JOURNAL *of* MEDICINE

CORRESPONDENCE

**Antibody Persistence through 6 Months after the  
Second Dose of mRNA-1273 Vaccine for Covid-19**

# Weekly COVID-19 Nursing Home Resident and Non-Nursing Home Resident Deaths in the US, June 2020 – February 2021



NOTES: Nursing home deaths include resident deaths only. Non-nursing home resident deaths calculated as total US deaths minus nursing home resident

COVID-19

# Covid Cases Plummet 83% Among Nursing Home Staffers Despite Vaccine Hesitancy

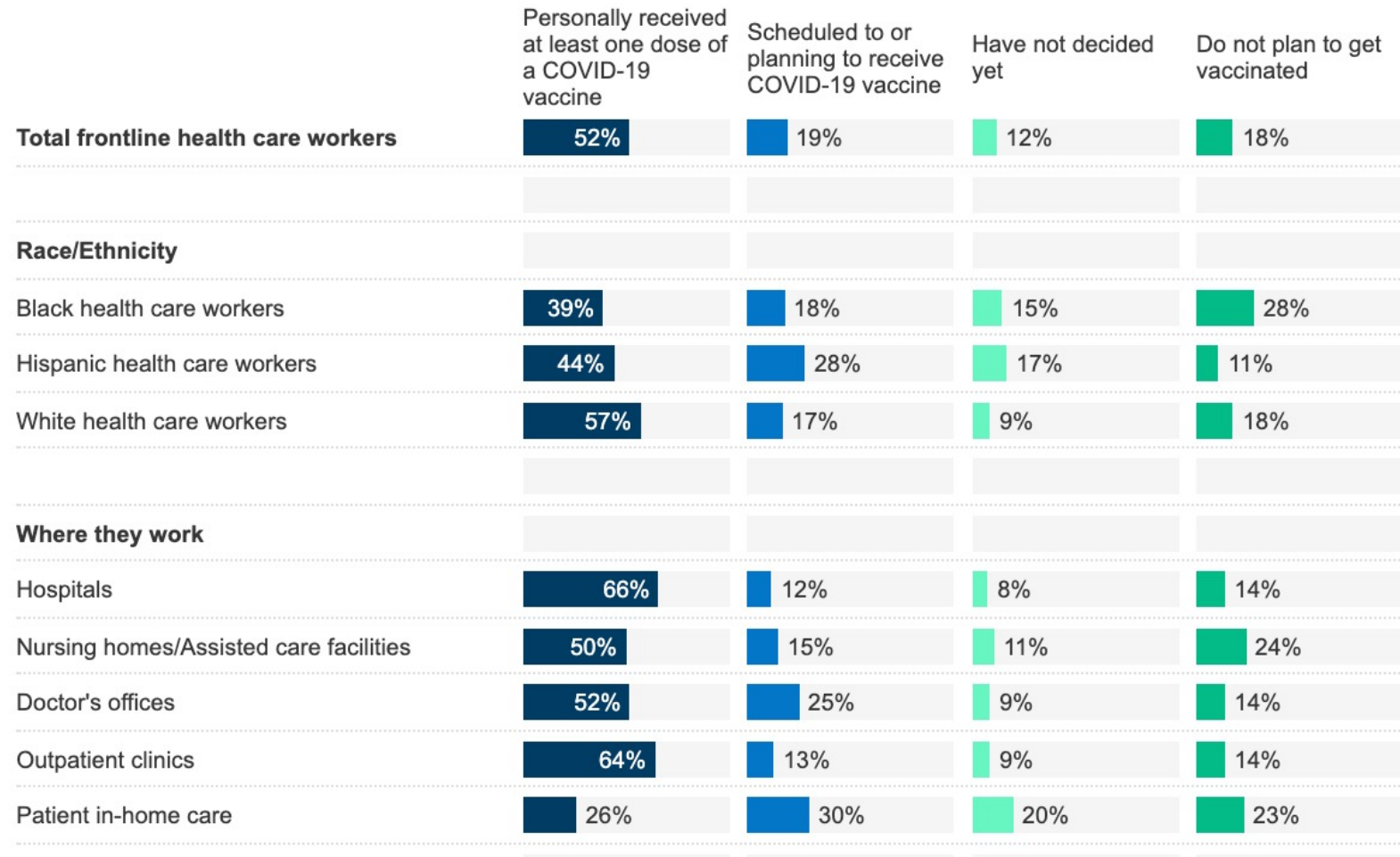
By [Melissa Bailey](#) and [Shoshana Dubnow](#)

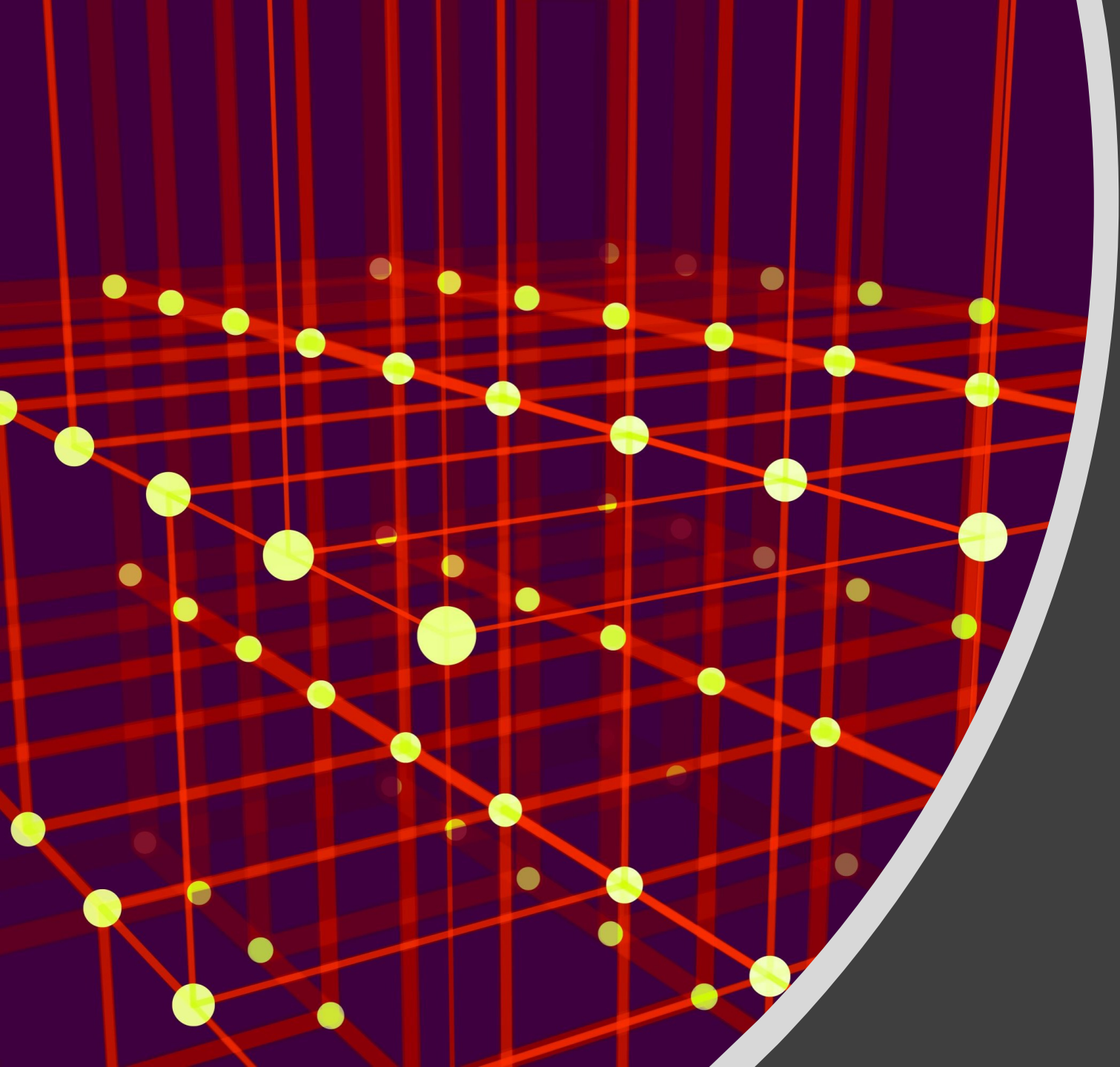
MARCH 15, 2021

 REPUBLISH THIS STORY






## Vaccine Intentions Among Frontline Health Care Workers Differs By Race/Ethnicity, Where They Work, Type Of Work They Do, And Education





# COVID VARIANTS

# Variants of Concern

Name (Pango lineage)	Spike Protein Substitutions	Name (Nextstrain <sup>a</sup> )	First Detected	BEI Reference Isolate <sup>b</sup>	Known Attributes
<b>B.1.1.7</b>	Δ69/70 Δ144Y (E484K*) (S494P*) N501Y A570D D614G P681H	20I/501Y.V1	United Kingdom	<a href="#">NR-54000</a> 	<ul style="list-style-type: none"> <li>• ~50% increased transmission <sup>5</sup></li> <li>• Likely increased severity based on hospitalizations and case fatality rates <sup>6</sup></li> <li>• Minimal impact on neutralization by EUA monoclonal antibody therapeutics <sup>7, 14</sup></li> <li>• Minimal impact on neutralization by convalescent and post-vaccination sera <sup>8,9,10,11,12,13,19</sup></li> </ul>
<b>P.1</b>	K417N/T E484K N501Y D614G	20J/501Y.V3	Japan/ Brazil	<a href="#">NR-54982</a> 	<ul style="list-style-type: none"> <li>• Moderate impact on neutralization by EUA monoclonal antibody therapeutics <sup>7,14</sup></li> <li>• Reduced neutralization by convalescent and post-vaccination sera <sup>15</sup></li> </ul>
<b>B.1.351</b>	K417N E484K N501Y D614G	20H/501.V2	South Africa	<a href="#">NR-54009</a> 	<ul style="list-style-type: none"> <li>• ~50% increased transmission<sup>16</sup></li> <li>• Moderate impact on neutralization by EUA monoclonal antibody therapeutics <sup>7,14</sup></li> <li>• Moderate reduction on neutralization by convalescent and post-vaccination sera <sup>8,12,18,19,20</sup></li> </ul>
<b>B.1.427</b>	L452R D614G	20C/S:452R	US- California		<ul style="list-style-type: none"> <li>• ~20% increased transmissibility <sup>21</sup></li> <li>• Significant impact on neutralization by some, but not all, EUA therapeutics</li> <li>• Moderate reduction in neutralization using convalescent and post-vaccination sera <sup>21</sup></li> </ul>
<b>B.1.429</b>	S13I W152C L452R D614G	20C/S:452R	US- California		<ul style="list-style-type: none"> <li>• ~20% increased transmissibility <sup>21</sup></li> <li>• Significant impact on neutralization by some, but not all, EUA therapeutics</li> <li>• Moderate reduction in neutralization using convalescent and post-vaccination sera <sup>21</sup></li> </ul>

# Variants of Interest

Name (Pango lineage)	Substitution	Name (Nextstrain <sup>a</sup> )	First Detected	BEI Reference Isolate <sup>b</sup>	Predicted Attributes
B.1.526	<b>Spike:</b> (L5F*), T95I, D253G, (S477N*), (E484K*), D614G, (A701V*) <b>ORF1a:</b> L3201P, T265I, Δ3675/3677 <b>ORF1b:</b> P314L, Q1011H <b>ORF3a:</b> P42L, Q57H <b>ORF8:</b> T11I <b>5'UTR:</b> R81C	20C	New York/November 2020		<ul style="list-style-type: none"> <li>• Potential reduction in neutralization by monoclonal antibody treatments</li> <li>• Potential reduction in neutralization by convalescent and post-vaccination sera</li> </ul>
B.1.525	<b>Spike:</b> A67V, Δ69/70, Δ144, E484K, D614G, Q677H, F888L <b>ORF1b:</b> P314F <b>ORF1a:</b> T2007I <b>M:</b> I82T <b>N:</b> A12G, T205I <b>5'UTR:</b> R81C	20C	New York/December 2020		<ul style="list-style-type: none"> <li>• Potential reduction in neutralization by monoclonal antibody treatments</li> <li>• Potential reduction in neutralization by convalescent and post-vaccination sera</li> </ul>
P.2	<b>Spike:</b> E484K, D614G, V1176F <b>ORF1a:</b> L3468V, L3930F <b>ORF1b:</b> P314L <b>N:</b> A119S, R203K, G204R, M234I <b>5'UTR:</b> R81C	20J	Brazil/April 2020		<ul style="list-style-type: none"> <li>• Potential reduction in neutralization by monoclonal antibody treatments</li> <li>• Potential reduction in neutralization by convalescent and post-vaccination sera</li> </ul>

# US COVID-19 Cases Caused by Variants

Updated Apr. 10, 2021

Languages ▾

Print

This page will no longer be updated after April 12, 2021. Current data showing the prevalence of variants in the United States is available in the [COVID Data Tracker](#).

Variant	Reported Cases in US	Number of Jurisdictions Reporting
B.1.1.7	20915	52
B.1.351	453	36
P.1	497	31



# Florida COVID Variant Proportions

---

**UK variant - B.1.1.7 = 52.5%**

---

**South Africa B.1.351 = 0.3%**

---

**US California variants B.1.427/B.1.429 = 7.5%**

---

**Brazil/Japan P.1 = 2.4%**

---

**All other lineages = 37.6%**

[News](#)

---

March 19, 2021

# COVID-19 variant fuels outbreak among nursing home residents, vaccinated or not



[Kimberly Marselas](#)

 Follow @KimMarselas

---

**Research Letter** | Infectious Diseases

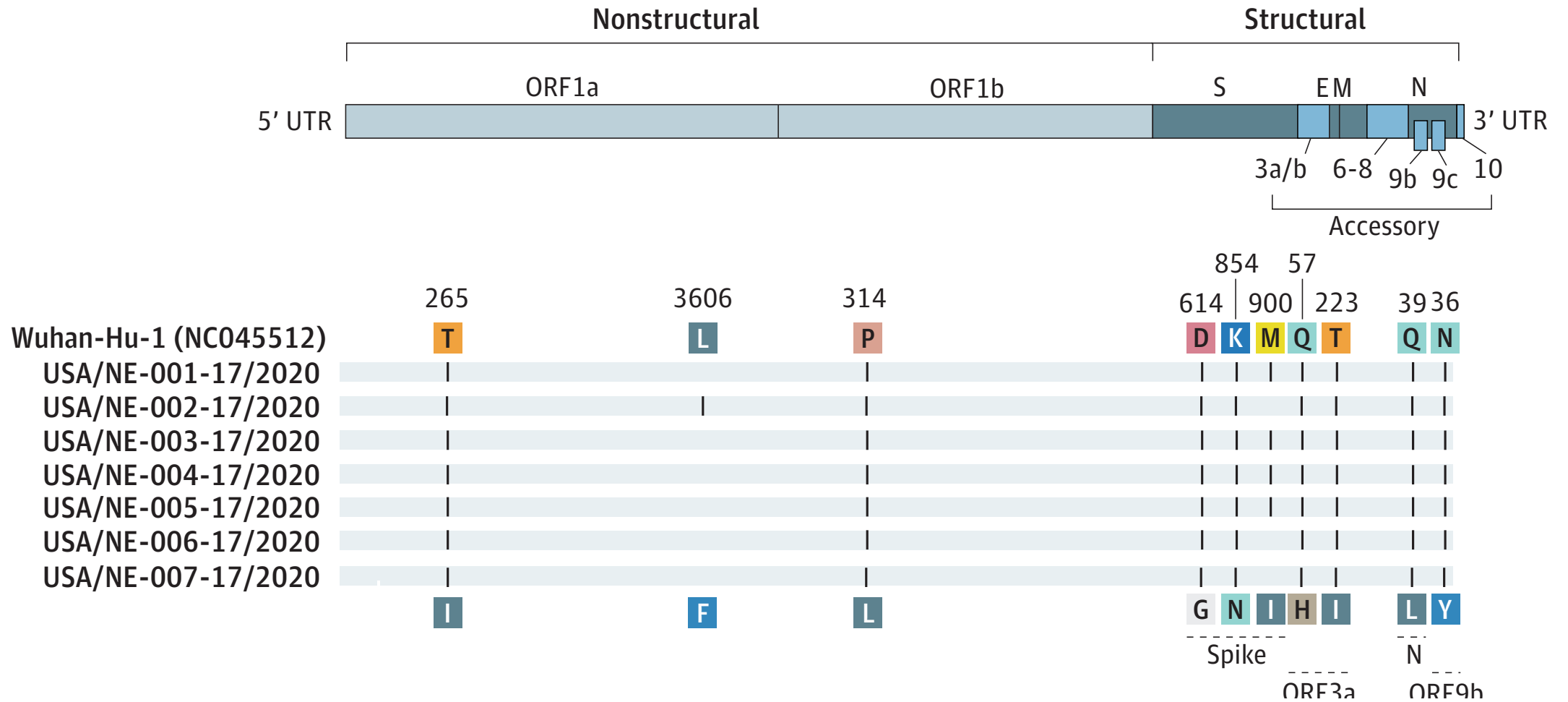
# Genome Analysis for Sequence Variants in SARS-CoV-2 Among Asymptomatic Individuals in a Long-term Care Facility

Baha Abdulhamid, MD, PhD; Peter C. Iwen, PhD; Michael R. Wiley, PhD; Catherine B. Pratt, MS; Steven H. Hinrichs, MD





Figure. Sequence Alignment Between the 7 SARS-CoV-2 Strains and Wuhan Strain With Amino Acid Changes



*The* NEW ENGLAND JOURNAL *of* MEDICINE

CORRESPONDENCE

**Neutralization of SARS-CoV-2 Variants B.1.429 and B.1.351**



*The* NEW ENGLAND JOURNAL *of* MEDICINE

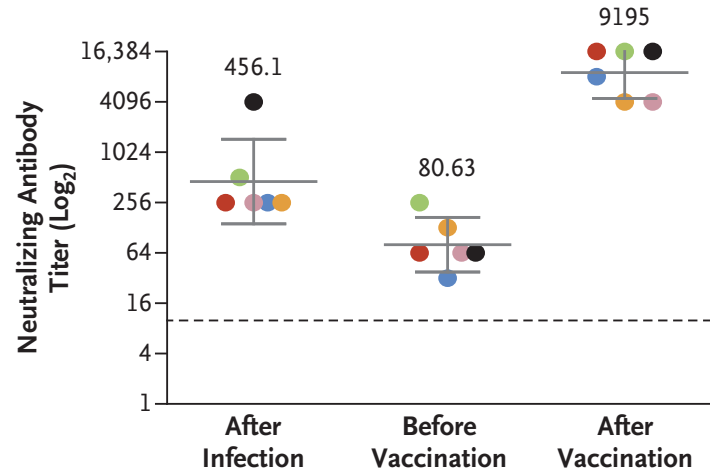
CORRESPONDENCE

**Neutralizing Response against Variants  
after SARS-CoV-2 Infection and One Dose of BNT162b2**

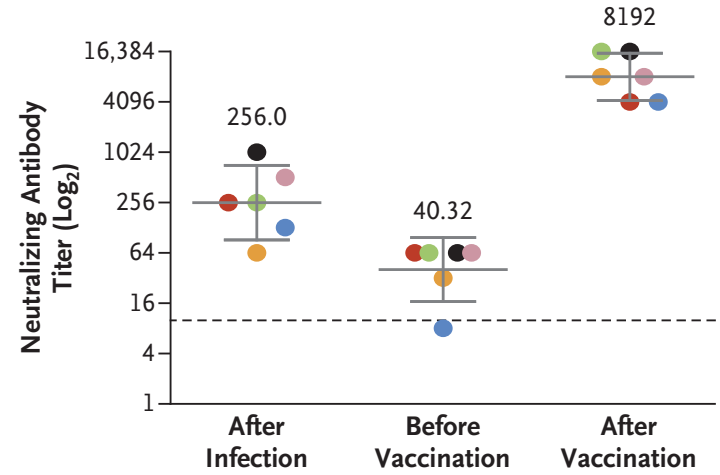


Patients: ● 1 ● 2 ● 3 ● 4 ● 5 ● 6

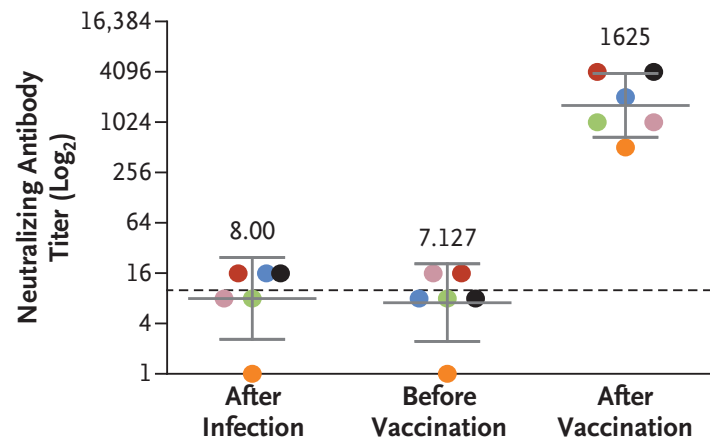
**A Original Virus**



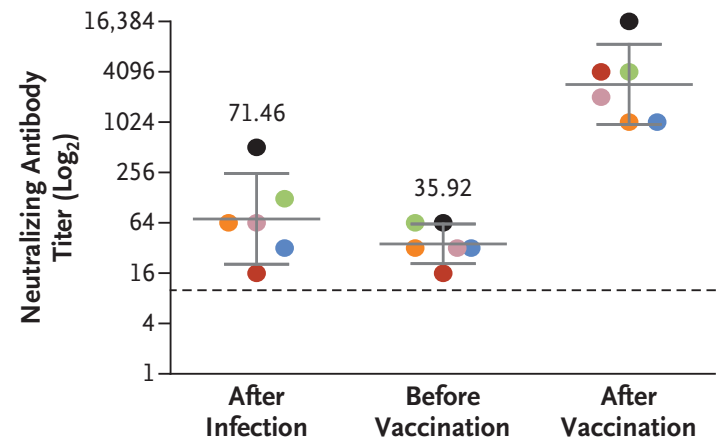
**B B.1.1.7 Variant**



**C B.1.351 Variant**



**D P.1 Variant**





# Revisiting Monoclonal Antibody Treatment....





# Antibody drug cuts COVID-19 death risk by 70 percent

BY JOHN BOWDEN - 03/23/21 12:58 PM EDT

 36 COMMENT

# Increasing Utilization Of COVID-19 Monoclonal Antibodies: Considerations And Promising Practices For States

Mar. 12, 2021 | [Publications](#)



**FOR IMMEDIATE RELEASE**

**March 17, 2021**

**Contact: HHS Press Office**

**202-690-6343**

**[media@hhs.gov](mailto:media@hhs.gov)**

---

# **Biden Administration to Invest \$150 Million to Expand Access to COVID-19 Treatments in Underserved Communities**



# MONOCLONAL ANTIBODY TREATMENTS IN LONG TERM CARE SETTINGS



# AMDA UPDATE ON COVID-19

## COVID-19 Vaccine Education Toolkit



AMDA membership is not required to access AMDA's COVID-19 Vaccination Toolkit, however you will need to create an account (which is free) if you don't already have one.



## New! Monoclonal Antibody Assessment

AMDA members can now access the Monoclonal Antibody Eligibility Criteria Checklist for FREE via the AMDA App

# Research Updates



Filling the need for trusted information on national health issues

TRENDING

[COVID-19 Vaccine Monitor Dashboard](#)

[U.S. Coron](#)



## Coronavirus (COVID-19)

[Home](#) // [Coronavirus \(COVID-19\)](#) // [Factors Associated With COVID-19 Cases and Deaths in Long-Term Care Facilities: Findings...](#)

# Factors Associated With COVID-19 Cases and Deaths in Long-Term Care Facilities: Findings from a Literature Review

[Nancy Ochieng](#) , [Priya Chidambaram](#) , [Rachel Garfield](#)  , and [Tricia Neuman](#) 

Published: Jan 14, 2021



JAMDA

journal homepage: [www.jamda.com](http://www.jamda.com)

Original Study - Brief Report

# Characteristics of Nursing Homes by COVID-19 Cases among Staff: March to August 2020

Kira L. Ryskina MD, MSHP<sup>a,b</sup>, Hyunkyung Yun MSW<sup>c</sup>, Hannah Wang BS<sup>a</sup>,  
Angela T. Chen MA<sup>b,d</sup>, Hye-Young Jung PhD<sup>c,\*</sup>

<sup>a</sup>Division of General Internal Medicine, University of Pennsylvania, Philadelphia, PA, USA

<sup>b</sup>Leonard Davis Institute of Health Economics, University of Pennsylvania, Philadelphia, PA, USA

<sup>c</sup>Department of Population Health Sciences, Weill Cornell Medical College, Cornell University, New York, NY, USA

<sup>d</sup>Perelman School of Medicine, University of Pennsylvania, Philadelphia, PA, USA

**Research Letter** | Geriatrics

March 16, 2021

# Nursing Home Characteristics Associated With Resident COVID-19 Morbidity in Communities With High Infection Rates

Angela T. Chen, MA<sup>1,2</sup>; Hyunkyung Yun, MSW<sup>3</sup>; Kira L. Ryskina, MD, MSHP<sup>2,4</sup>; [et al](#)

» [Author Affiliations](#) | [Article Information](#)

*JAMA Netw Open.* 2021;4(3):e211555. doi:10.1001/jamanetworkopen.2021.1555



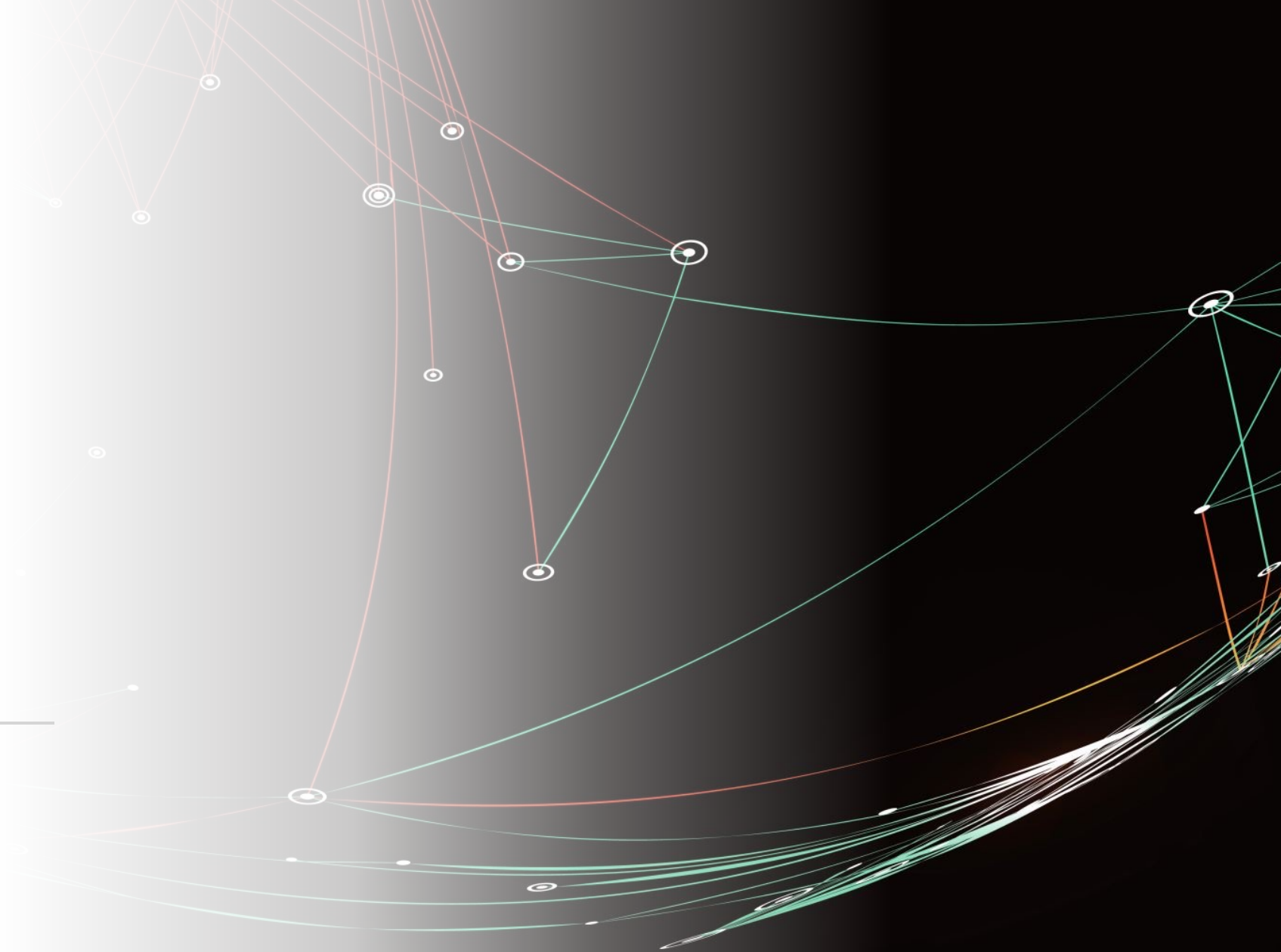
**COVID-19 Resource Center**



# Looking Beyond COVID...

---

Reimagining PALTC Environment



ORIGINAL STUDY | [ARTICLES IN PRESS](#)

# Does Public Reporting of Staffing Ratios and Nursing Home Compare Ratings Matter?

[Pamela B. de Cordova, PhD](#)   • [Mary L. Johansen, PhD](#) • [Peijia Zha, PhD](#) • [Joseph Prado, BA](#) •

[Victoria Field, BA](#) • [Edna Cadmus, PhD](#)

Published: April 13, 2021 • DOI: <https://doi.org/10.1016/j.jamda.2021.03.011>



Brief Report

## Barriers to telehealth access among homebound older adults

Alexander V. Kalicki BS, Kate A. Moody BS, Emily Franzosa DrPH, Peter M. Gliatto MD, Katherine A. Ornstein PhD, MPH ✉

First published: 13 April 2021 | <https://doi.org/10.1111/jgs.17163>

Kate A. Moody is the co-first author.

**Funding information:** Medical Student Research Office of the Icahn School of Medicine at Mount Sinai; National Institute on Aging, Grant/Award Numbers: P30AG028741, R01AG060967

Clinical Investigation

# Self-compassion training for certified nurse assistants in nursing homes

Karen Bluth PhD , Christine Lathren MD, MSPH, Johanna V. T. Silbersack Hickey MSW, Sheryl Zimmerman PhD, Christopher J. Wretman PhD, Philip D. Sloane MD, MPH

First published: 10 April 2021 | <https://doi.org/10.1111/jgs.17155>

**Funding information:** NIH

A blurred, high-angle photograph of a desk. In the foreground, an open notebook with a pen resting on it is visible. To the right, a smartphone is partially seen. The background shows a laptop keyboard and some papers. The overall scene is dimly lit and out of focus, with the text 'Open Discussion' overlaid in the center.

# Open Discussion



THE FLORIDA SOCIETY  
FOR POST-ACUTE AND  
LONG-TERM  
CARE MEDICINE

**400 Executive Center Drive, Suite 208  
West Palm Beach, FL 33401**

**[www.fmda.org](http://www.fmda.org); [www.bestcarepractices.org](http://www.bestcarepractices.org)**



This meeting has been recorded and will be available at [www.fmda.org/journalclub.php](http://www.fmda.org/journalclub.php)