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THE IMPACT ON OUR HEALTH SYSTEM

This is the 23rd update for Regents regarding the SARS-CoV-2 virus pandemic and its impact on the University's health and academic enterprise. I hope the information shared will help everyone have a safe and healthy Labor Day weekend.

COVID-19 BY THE NUMBERS

Since the August 14 update, the number of cases and deaths attributable to COVID-19 has grown. Nationally, more than six million cases and 186,173 deaths have occurred since the start of the pandemic in the U.S., according to the Centers for Disease Control and Prevention ([CDC](#)). On a case per 100,000 basis, the epicenter of new cases has shifted from California and is now in Iowa and Sunbelt states.

California, which has 10 million more people than the second most populous state, continues to have the unfortunate distinction of the most cases in the country, with 717,177 positive SARS-CoV-2 tests and 13,327 deaths, according to the California Department of Public Health ([CDPH](#)). Although those figures are discouraging, total deaths in California as well as deaths per 100,000 persons are less than elsewhere. Better patient outcomes and lower mortality in our state (Figure 2, next page) have come from a number of contributing factors: lessons learned from China, Italy, and New York City; California's early success in flattening the curve and maintaining hospital capacity; infections in younger people; and improved clinical management and therapeutics

Figure 1

County	% Confirmed Positive (14-day average)	New Cases/100K
Sacramento Metro Area—UC Davis		
El Dorado	3.6%	3.6
Nevada	2.2%	4.1
Placer	3.9%	5.3
Sacramento	8.1%	12.0
Sutter	8.9%	15.0
Yolo	5.9%	7.3
Yuba	11.2%	15.9
San Francisco Bay Area—UC Berkeley and UCSF		
Alameda	5.6%	10.6
Contra Costa	6.2%	10.8
Marin	3.0%	5.9
Napa	4.2%	6.5
San Francisco	3.4%	9.8
San Mateo	4.8%	8.6
Santa Clara	3.5%	8.6
Solano	4.3%	9.1
Sonoma	6.5%	15.9
Other Regions		
Riverside	8.6%	10.4
Los Angeles	5.0%	13.1
Merced	11.4%	27.7
Orange	5.6%	5.0
Santa Barbara	6.5%	9.0
Santa Cruz	2.7%	6.3
San Diego	3.7%	5.8



In late July and August, CDPH encountered delays in updating county level positivity rates. Those issues have been resolved, and the department announced plans for a new COVID-19 data reporting system to launch in October.

Governor Newsom's office unveiled a new color-code system to convey a county's status (Figure 1, left).

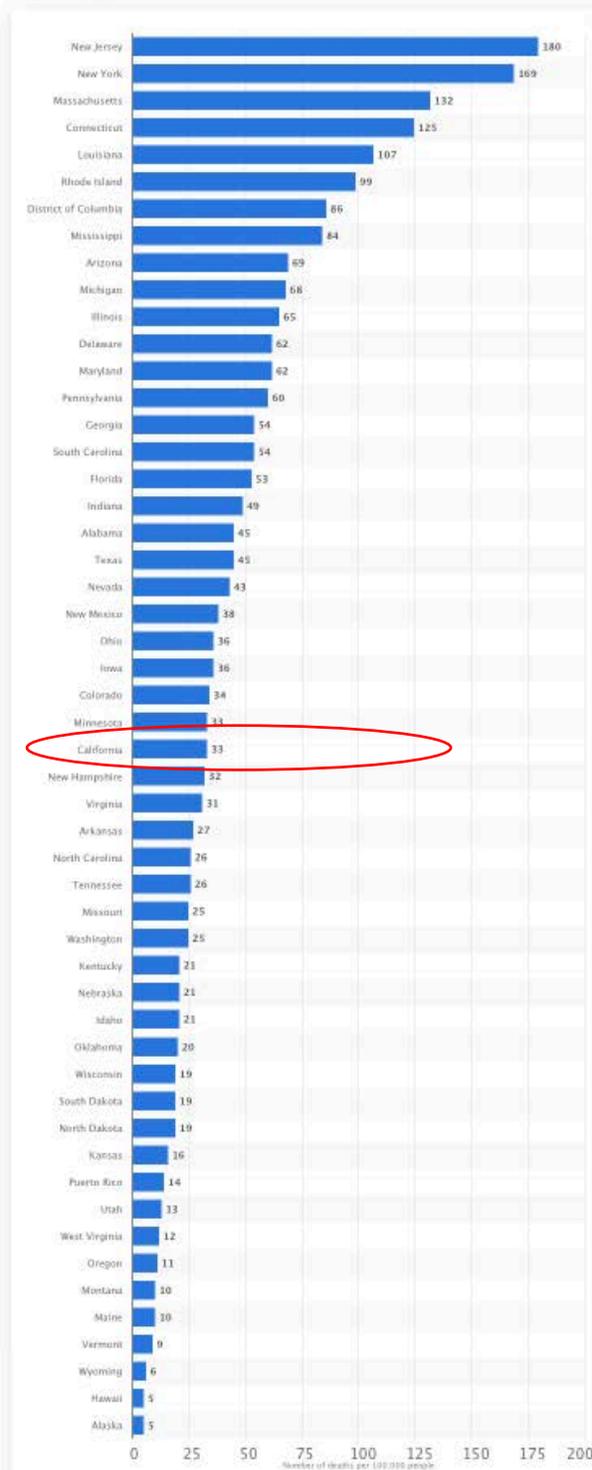
The 4-Tiered approach reflects the number of new cases daily and the percentage of tests returning as positive.

Source: CDPH

Figure 2

Death rates from coronavirus (COVID-19) by state

(per 100,000 people)



Source: Data from Statista, September 2, 2020

Decisions about resumption of business activities are informed by a county's categorization, however, exceptions can be requested.

Purple in Figure 1 indicates counties where the virus is widespread; Red indicates substantial spread; Orange indicates moderate spread; and, Yellow indicates minimal transmission. In addition to this map, you can follow the [weekly updates here](#).

Statewide, the positivity rate has declined to 6%, and the number of hospitalized patients is down to just under 5,000, based on [data from the COVID Tracking Project](#). This reflects a flattening since a post-Memorial Day surge.

While this is encouraging, it is also demonstrates how long it takes to bring down cases and hospitalizations following a surge and is a reminder of the possibility that another surge in cases could result from Labor Day celebrations.

At University of California Health, we have performed nearly 250,000 tests for SARS-CoV2 for our patients and approximately an equivalent number of tests for public health departments, other hospitals, nursing homes and community testing drives.

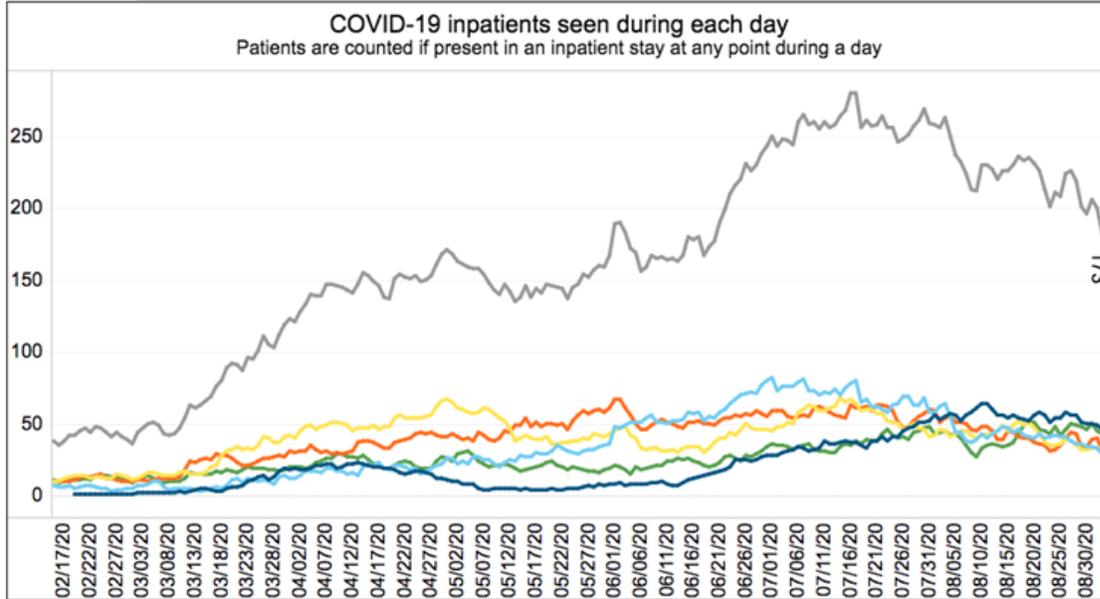
The positivity rate for UCH patients is **2.46%**.

In our hospitals, the number of inpatients with a COVID-19 diagnosis has declined to **173** after an earlier summertime spike. Use of ICUs (60), ventilators (39) and ECMO (8) has also declined (Figure 3, next page).

UC HEALTH CENTERS ACTIVE IN ALL U.S. VACCINE TRIALS

Multiple commercial trials of vaccines to protect against SARS-CoV-2 have entered Phase 3 testing. In Phase 3, a vaccine is given to tens of thousands of people and assessed for efficacy and patient safety. Assuming the data supports advancing the vaccine candidate, it then undergoes regulatory review,

Figure 3 ■ UCD ■ UCI ■ UCLA ■ UCSD ■ UCSF



Source: UCH Data Warehouse

manufacturing and distribution. Trials for Moderna's candidate, mRNA-1273, and Pfizer's candidate, BNT162b2, began in July and August. Trials for AstraZeneca's candidate, AZD1222, begin next week. Others are nearing the testing phase as well. University of California Health is proud to support these nationwide clinical trials for COVID-19 vaccines by enrolling patients across our medical centers.

The trials are part of the federal government's 'Operation Warp Speed' initiative to fast-track multiple options with the expectation that at least one will prove effective. If more than one



UC San Diego Health brings the opportunity to participate in vaccine trials to neighborhoods across the region. SD-area residents can [learn more here](#).

successful vaccine emerges, it could ease concerns about production capacity given the worldwide demand for a preventative. Volunteers are in recruitment for AstraZeneca's trial with a goal of reaching 30,000 participants nationally.

As in all clinical trials, diversity in the control and placebo groups is essential to understand the vaccine's efficacy, contraindications and side effects. UCH centers reach out to their communities to support this diversity, consistent with our commitment to reduce health inequities and ensure scientific integrity.

For example, UC San Diego Health is reaching out to underserved communities to bring the AstraZeneca trial to them. Trial staff will administer the vaccine from a specially equipped bus that will set up shop in parking lots across the cities of San Diego, El Cajon, Imperial Beach, Chula Vista and National City. Those who enroll in the trial will be invited to the site nearest them. UC San Diego Health will also run a satellite trial at El Centro Regional Medical Center in

hard-hit Imperial County. As the number of vaccine trials multiple across UCH locations, you can search by campus and keyword on [UC BRAID's clinical trial roster](#).

	Moderna NCT04470427	Janssen NCT04505722	AstraZeneca NCT04516746	Regeneron NCT04452318	Pfizer NCT04368728
UC Davis					X (closed Aug)
UC Irvine					
UCLA	X		X	X	
UC San Diego	X	X	X		
UCSF		X (VA)	X		

As we pursue vaccine candidates, we continue to work on therapeutics that help those who have developed serious illness from the virus.

UCH MILK BANK READY TO OPEN IN SPITE OF COVID-19

Although these updates focus on COVID-19, it can be refreshing to look at other worthwhile activities underway. One exciting development is the University of California Health Milk Bank, housed at UC San Diego Health.



This week the UCH Milk Bank passed certification from the Human Milk Banking Association of North America (**HMBANA**). It will be the only non-profit milk bank in Southern California, one of only two milk banks in California, and the only milk bank in North America owned and operated by a health system. There are only 30 HMBANA accredited milk banks in North America. It is the first systemwide service introduced for University of California Health.



Dr. Lisa Stellwagen,
executive director, UCH
Milk Bank

The grand opening is expected in early October, the culmination of years of hard work under the leadership of Dr. Lisa Stellwagen and Dr. Jae Kim. They saw the need of new mothers who had difficulty breastfeeding and the potential to leverage the existing infrastructure (screening donors, cold storage, and shipping) of a local blood bank to operationalize this support. With the generous support of donors Hannah and Zach Johnson, who had their own struggles as new parents, the construction began in 2019.

Donations of mother's milk are used with ill, premature and young infants when the mother is unable to breastfeed or does not produce sufficient milk supply. Milk donations are screened, pooled, tested and pasteurized. Donated milk not only provides vital nutrition for the newborn, it also helps new families focus on developing essential emotional bonds with their baby.

We are so grateful to Hannah and Zach Johnson for their support, and the leadership of Dr. Stellwagen, who is professor of pediatrics at UC San Diego School of Medicine and executive director of the UCH milk bank. [Learn more about the milk bank here.](#)

SOME OF THE HEROES OF THE PANDEMIC



Top L: We salute Dr. James Betts, UCSF Benioff Children's Hospital surgeon and a volunteer firefighter ([video](#)).

Top R: UC San Diego Health team members remind all of us about [International Overdose Awareness Day](#).

2nd Row L: Newborn Adalyn Rose, delivered by emergency C-section, leaves UCI Health after her mother was killed by a person suspected of DUI. ([video](#)).

2nd Row Center: Thousands of "[heart hats](#)" are appearing on health care workers thanks to the work of Selena Srabian, a nurse in UCSF Health's ICU, who worked with her sister, Anna Ryan, an ER nurse in Sacramento.

2nd Row R: Andrew M. Subica, assistant professor in UC Riverside's School of Medicine was awarded grant to design a [culturally tailored intervention](#) program to increase Pacific Islanders' use of mental health services.

Bottom L: UCLA Health's [Sound Body Sound Mind program](#) distributed 3,500 home PE kits to local students.

Bottom R: UC Davis Health's [Dr. Rory Stuart](#), an emergency medicine physician, is also a Lt. Col. in the Air Force who was deployed in Afghanistan and worked on COVID-19 response for forces in the region.

IN CLOSING

We are now six months into the pandemic in California with variations of stay-at-home orders and restrictions on activities. Many are understandably impatient to resume a semblance of normal life. We know, however, what happens when we let down our guard. We saw cases increase following Mother's Day, Memorial Day, and the Fourth of July.

As we celebrate Labor Day this weekend, I urge us to be steadfast in our efforts to reduce the spread so these restrictions can be gradually and responsibly relaxed as conditions improve. That said, it is possible to enjoy the long weekend with safety in mind. UC Davis Health has provided the following helpful suggestions:

- * Celebrate outside
- * Keep any gatherings small
- * Mark off 6-foot increments as a reminder
- * Avoid community poured drinks
- * Don't crowd around the food
- * Use lots of hand sanitizer
- * Provide guests with clean masks
- * Remain resolute in your determination to protect yourself and others

As we move from summer to fall, we will all require even more stamina, strength and resilience. Protect your own health by eating a balanced diet, exercising and getting enough sleep.



Keep gatherings small and outdoors, wear a mask and give everyone space to enjoy a healthy holiday.
Source: UC Davis Health

Also, don't forget your flu shot. Influenza vaccine is available in many communities now.

We remain committed at UCH to ending the pandemic through clinical care, education, research and our public service mission to care for all Californians.

Fiat Lux.

With Gratitude.

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