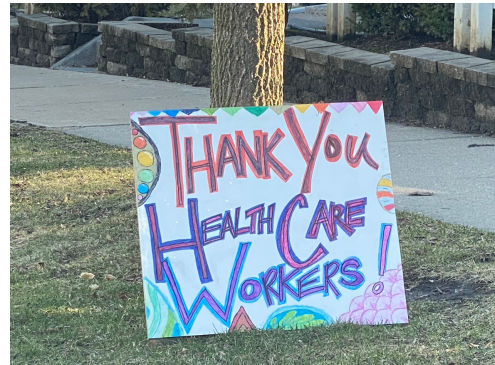
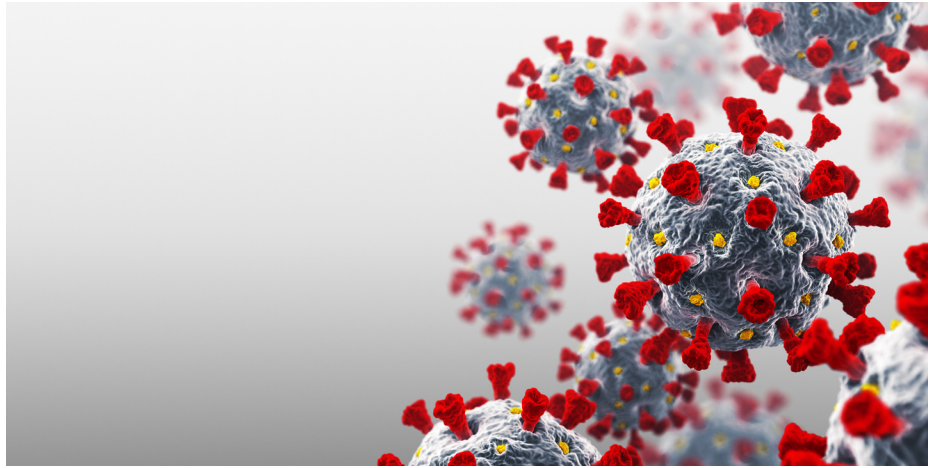
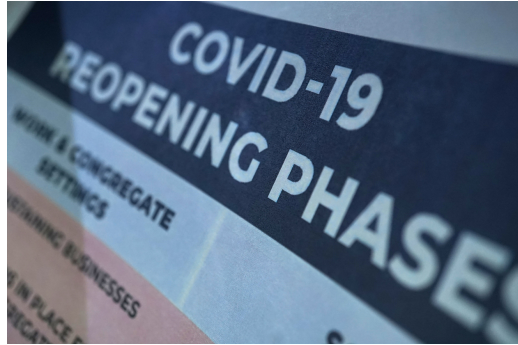




COVID-19 Report

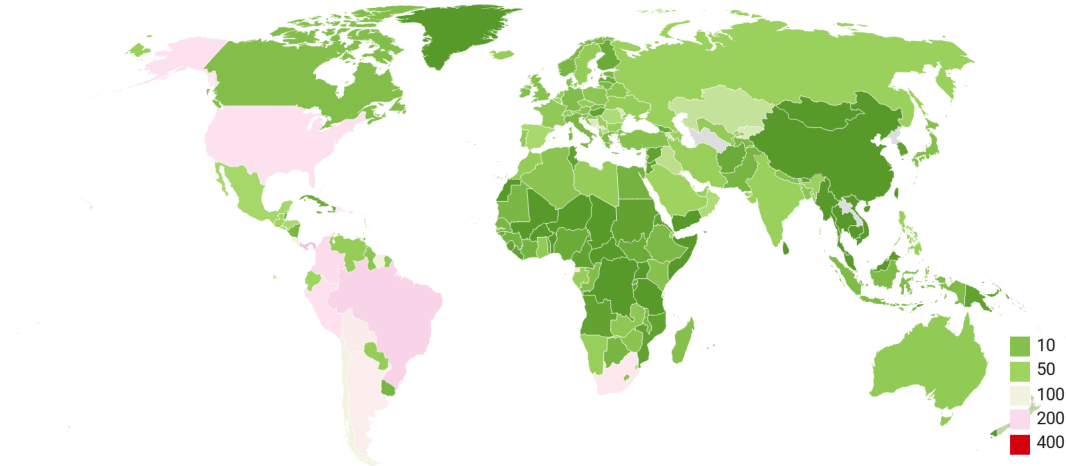
Issue # 125

Tuesday, August 4, 2020

- New cases are declining
 - Declined yesterday for the 3rd consecutive day; continuing a downward trend that started on July 16
 - Down 10.1% on a week-over-week basis
- New infections per capita also trending down
 - Down 11.5% since peaking on July 19
 - Thirty-six states are at least a week past their peak rate; Only Hawaii posted its highest rate in the past 2 days
 - Still, the US rate for the past week is 4th among countries with at least 1,000 total cases
- Stress on the healthcare system is easing
 - COVID-19 census has declined for 3 consecutive days; down 11% since July 23
 - ER visits (%) due to COVID-19 illnesses have declined for past 25 days; now back to mid-June levels
 - Of cases in the hospital, however, % in the ICU is increasing
- Deaths were relatively low for the 2nd consecutive day
 - Less than 1/2 that of each of the preceding 5 days - too early to call a trend!
 - These always lag new cases and thus, we should expect them to be lower in the next few weeks, relative to the past few weeks
- The U.S. still struggling more than most other countries:
 - 10th in deaths per capita but, 48th in deaths per case (of 146 countries with at least 1,000 cases)
 - 4th in new infections per capita last week; 10th in total cases to-date per capita
 - 8th in testing per capita past week; 52nd in rate of new cases: total cases this past week
- Some renewed spikes in certain countries in Asia and Europe:
 - Japan has seen a significant increase in new daily cases in the past month
 - Belgium and Netherlands also have seen increases, although to a lesser degree
 - China, despite new reports, continues to report relatively few new cases

New Daily Infections / 1 Million Population

Trailing 7-Day Moving Average, As of August 3

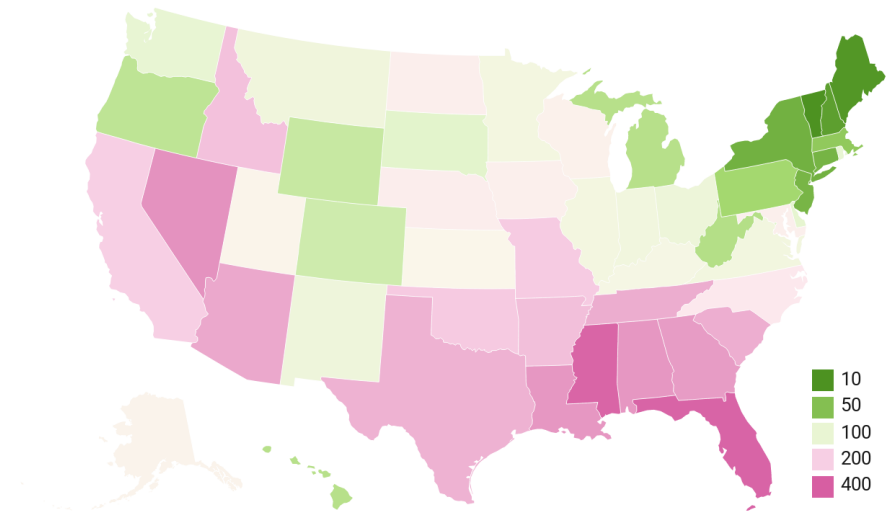


Health Industry Advisor LLC analysis

Map: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

New Daily Infections Per 1 Million Population

Trailing 7-Day Moving Average, As of August 3



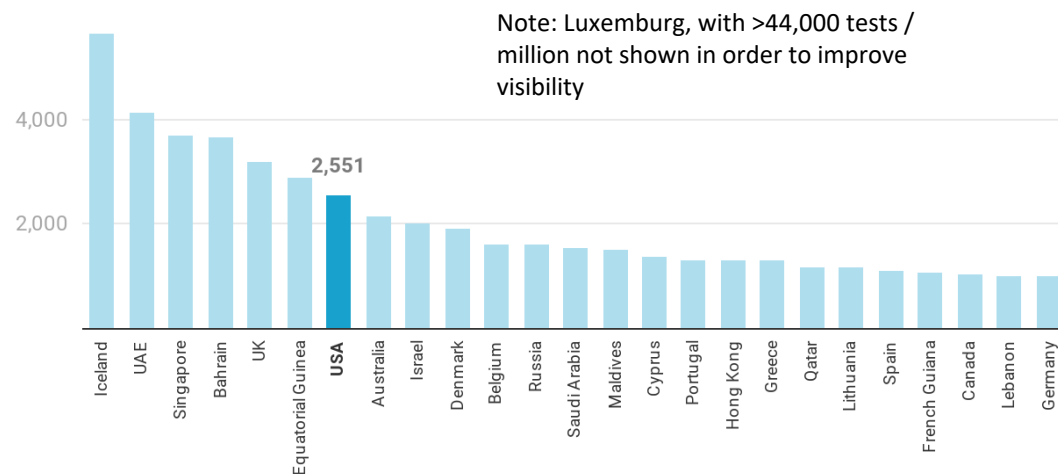
Map: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

Countries With A Minimum of 1,000 Cases

United States ranks 8th in current testing rate, 52nd in the rate of change in total cases

Daily Tests Per 1 Million Population

Trailing 7-Day Moving Average, As of August 3

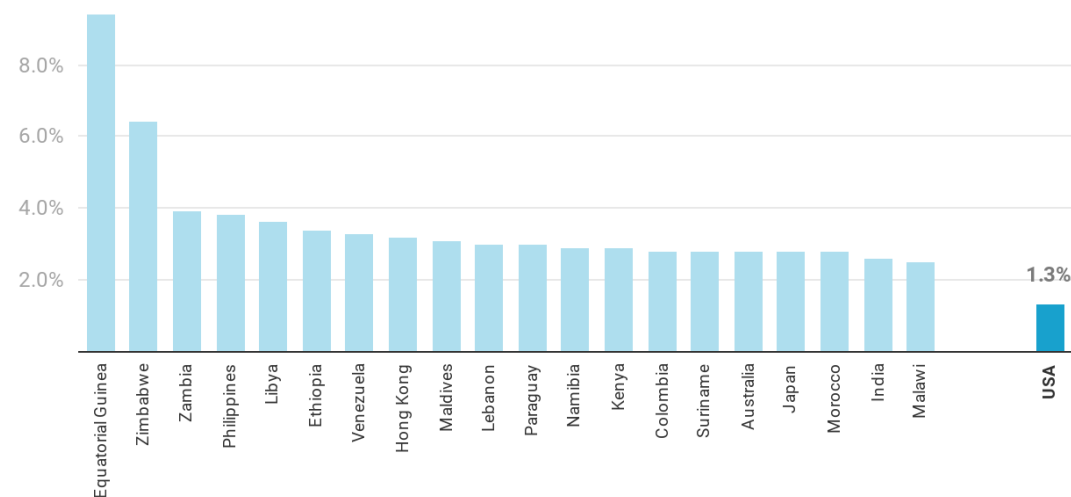


Among 146 Countries with a minimum of 1,000 COVID-19 cases

Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

Daily Change (%) in Total Cases

Trailing 5-Day Moving Average, As of August 3



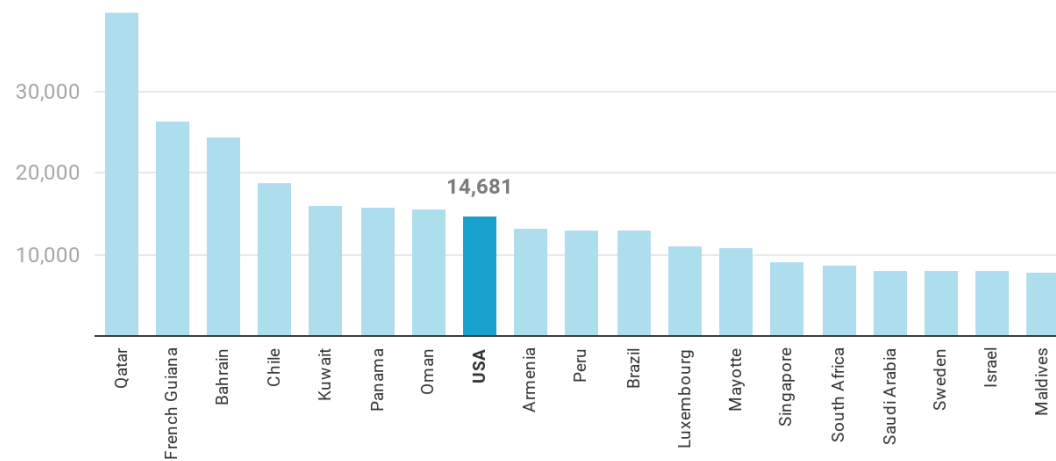
Among 146 Countries With a Minimum of 1,000 COVID-19 Cases

Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

* Among countries with a minimum of 1,000 COVID-19 cases

Total Cases / 1 Million Population

As of August 3

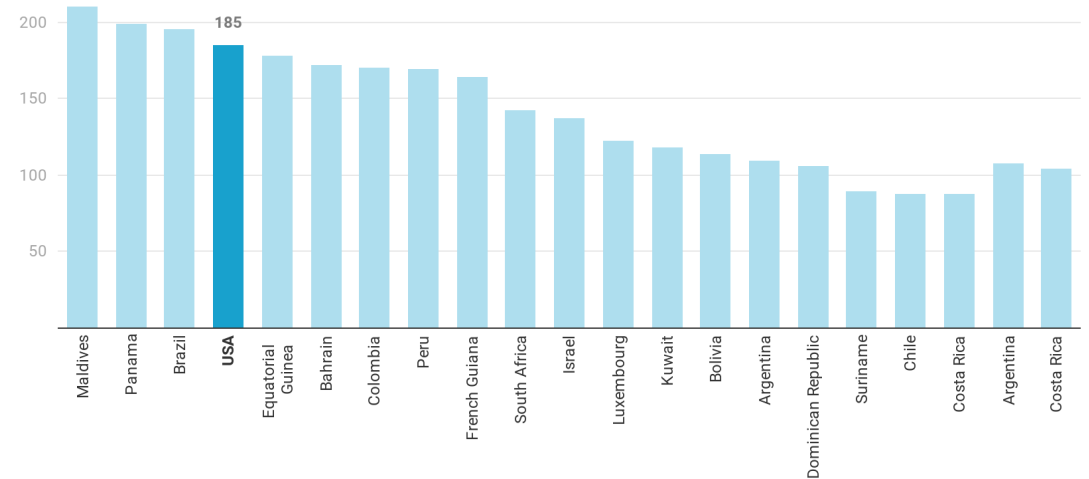


Among 146 Countries with a minimum of 1,000 COVID-19 Cases

Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

New Daily Infections / Million Population

Trailing 7-Day Moving Average, As of August 3



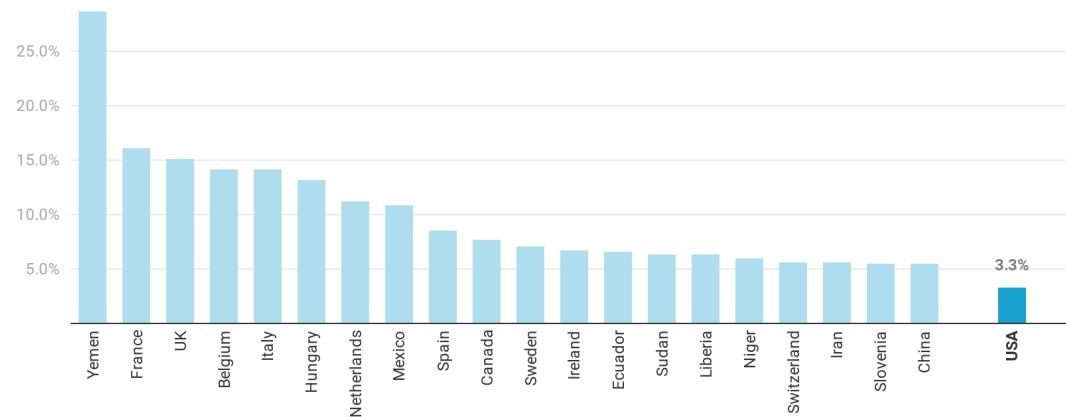
Health Industry Advisor LLC analysis

Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

* Among countries with a minimum of 1,000 COVID-19 cases

Deaths Per Case

As of August 3

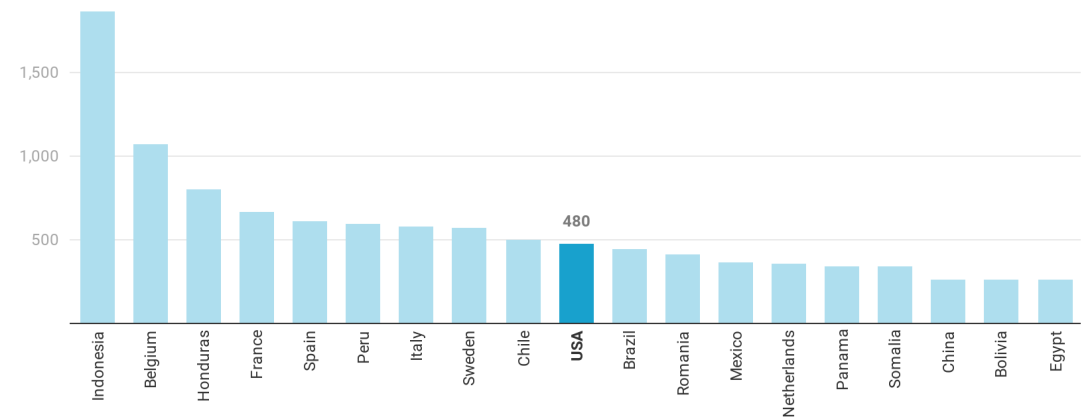


Among 146 countries with a minimum of 1,000 COVID-19 cases

Chart: Health Industry Advisor LLC • Source: The Atlantic's Covid Tracking Project • Created with Datawrapper

Deaths/ Million Population

As of August 3



Among 146 countries with a minimum of 1,000 COVID-19 cases

Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

* Among countries with a minimum of 1,000 COVID-19 cases

Several countries have seen rising new cases over the past month, most notably Japan; China, despite recent news stories, still reports relatively low cases

New Daily Cases

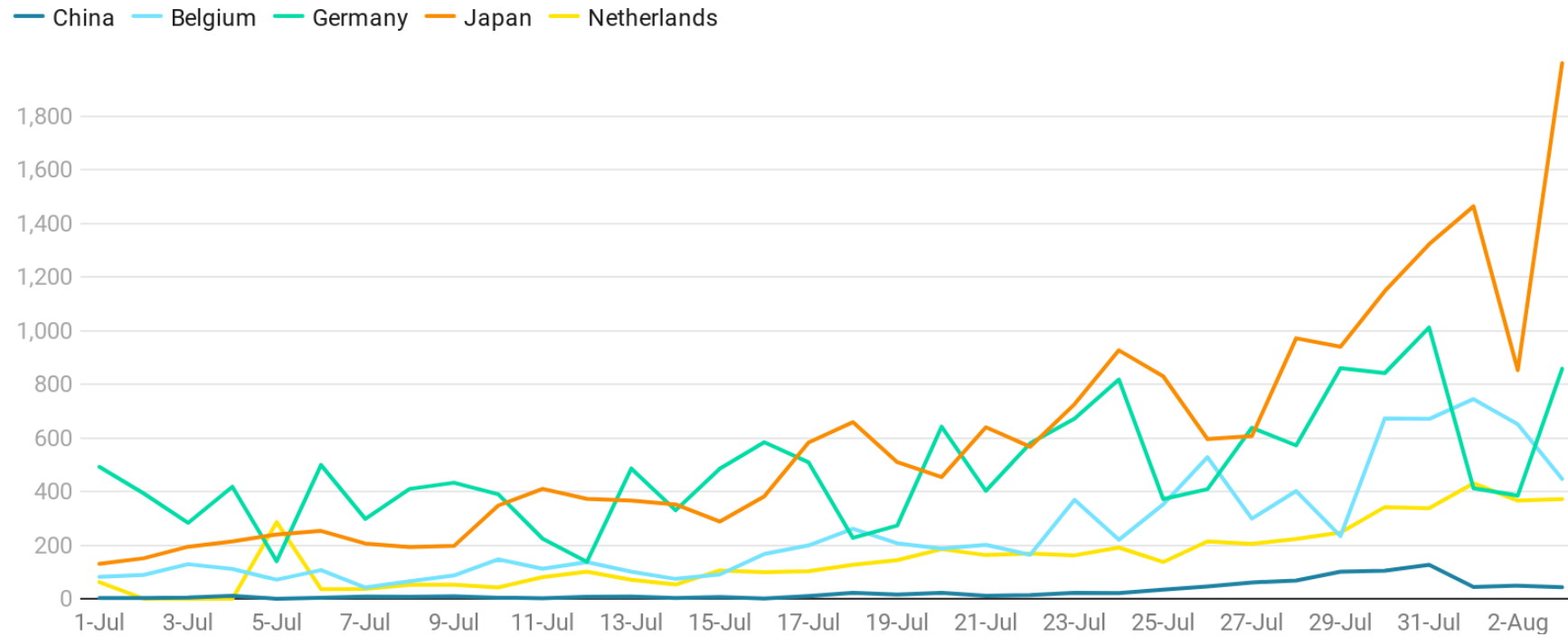


Chart: Health Industry Advisor LLC • Created with Datawrapper

New cases declined yesterday for 3rd consecutive day, continuing a trend that began on July 16; New cases now down 10.1% on week-over-week basis

New Cases

Through August 3

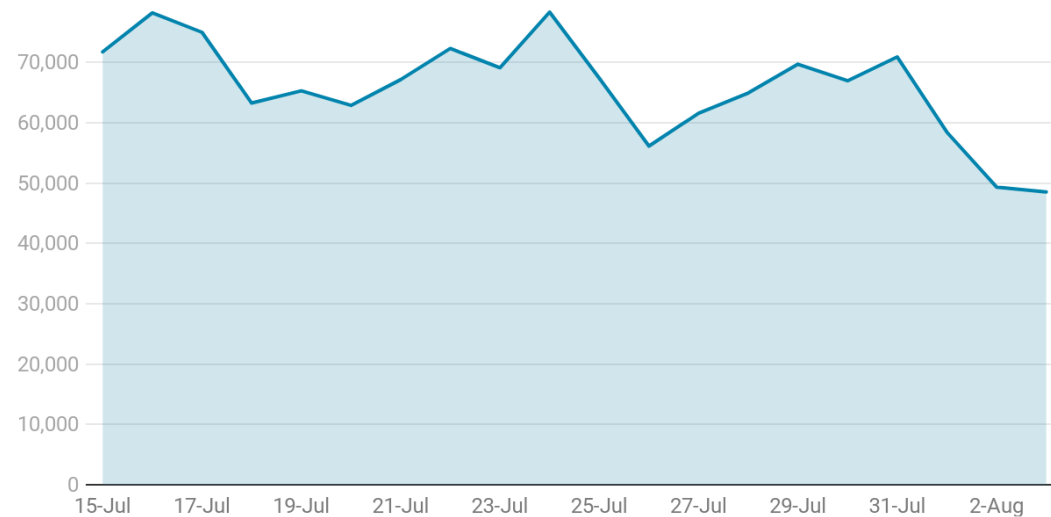
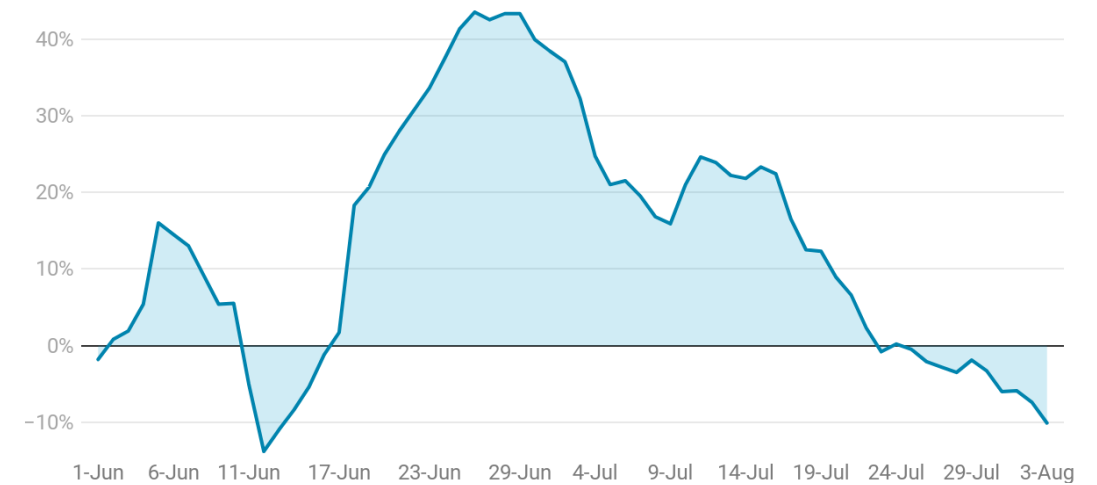


Chart: Health Industry Advisor LLC • Source: eorldometers.info • Created with Datawrapper

Week-Over-Week Change In New Cases

United States, As of August 3



Health Industry Advisor LLC analysis

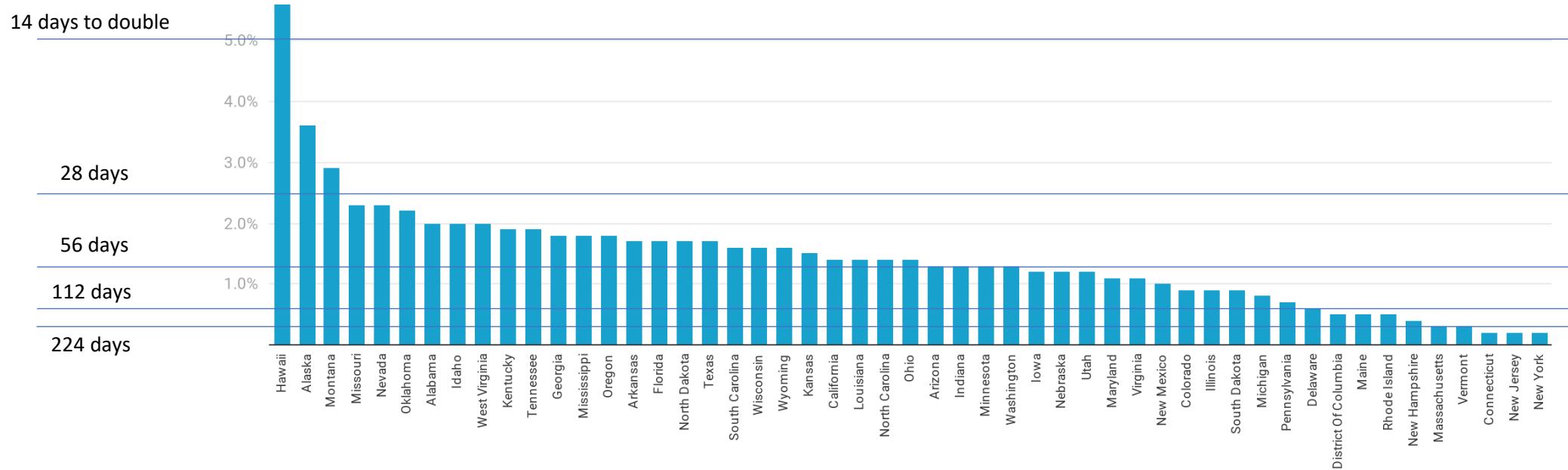
Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

State-By-State

At current rates, cases are doubling every 12-13 days in Hawaii; every 407 days in New York; 55-56 for the United States overall

Growth Rate in Total Cases

Trailing 5-Day Moving Average, As of August 3

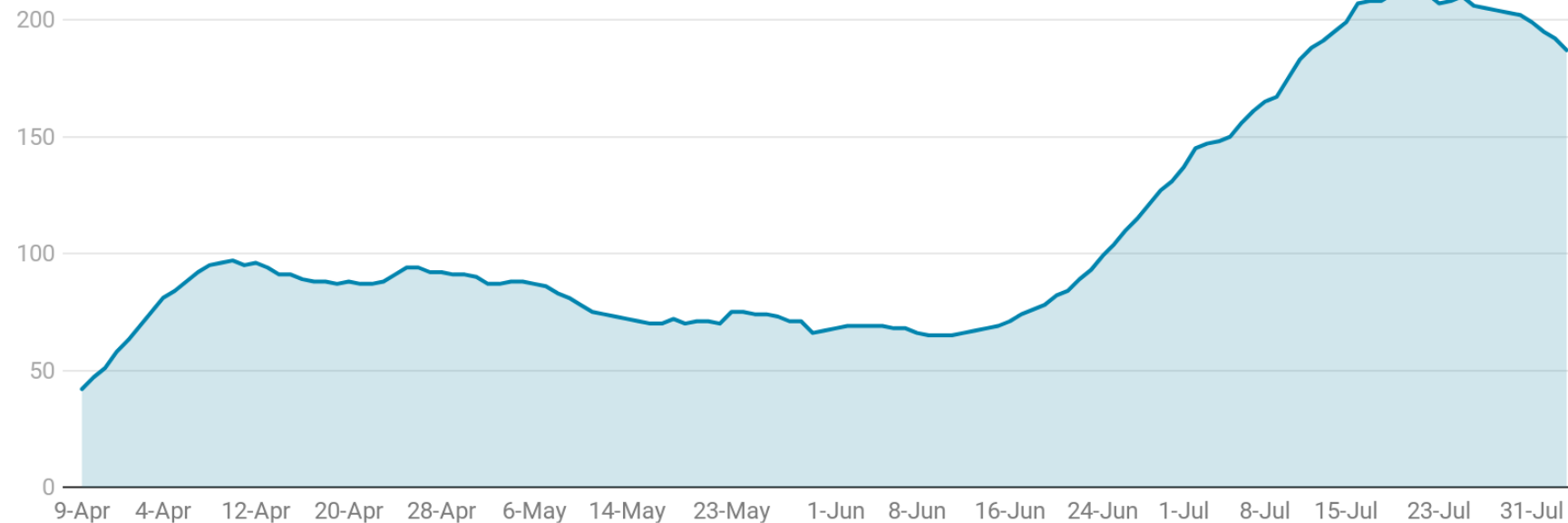


Health Industry Advisor LLC analysis

Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

New Infections Per 1 Million Population - United States

Trailing 7-Day Moving Average, As of August 3



Health Industry Advisor LLC analysis

Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

ing average

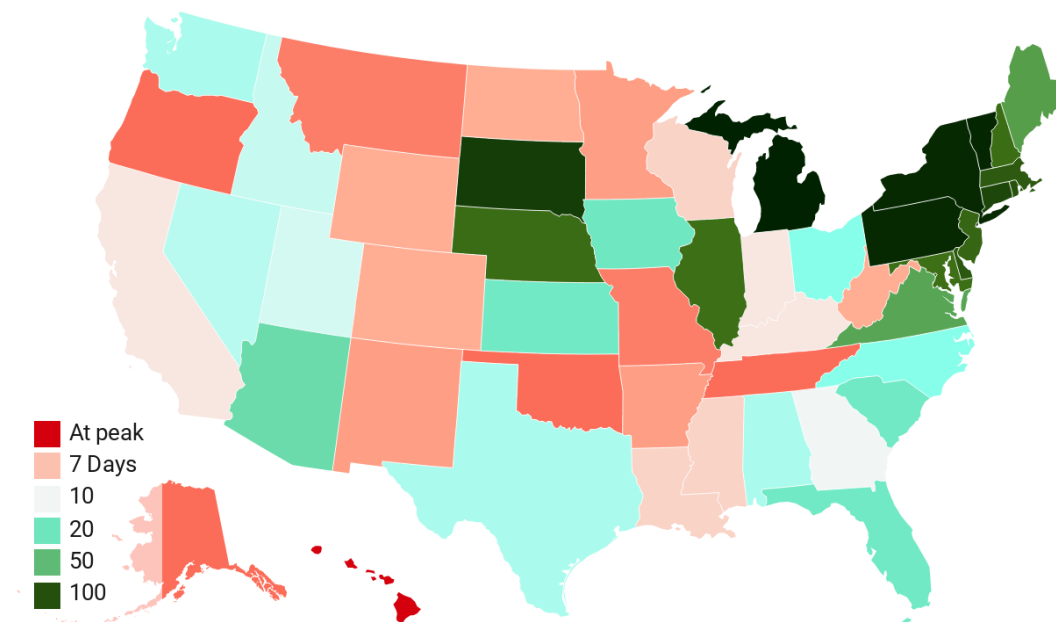
New Infections – Are we turning a corner? Thirty-four states are at least a week past their peak

Are we turning a corner?

- Only Hawaii has experienced its highest rate in past two days
- Fourteen states posted highest rate in the past week
- Six states have gone more than 100 days since their peak

Days Since Peak New Infections Per Capita

Trailing 7-Day Moving Average, As of August 3



Health Industry Advisor LLC analysis

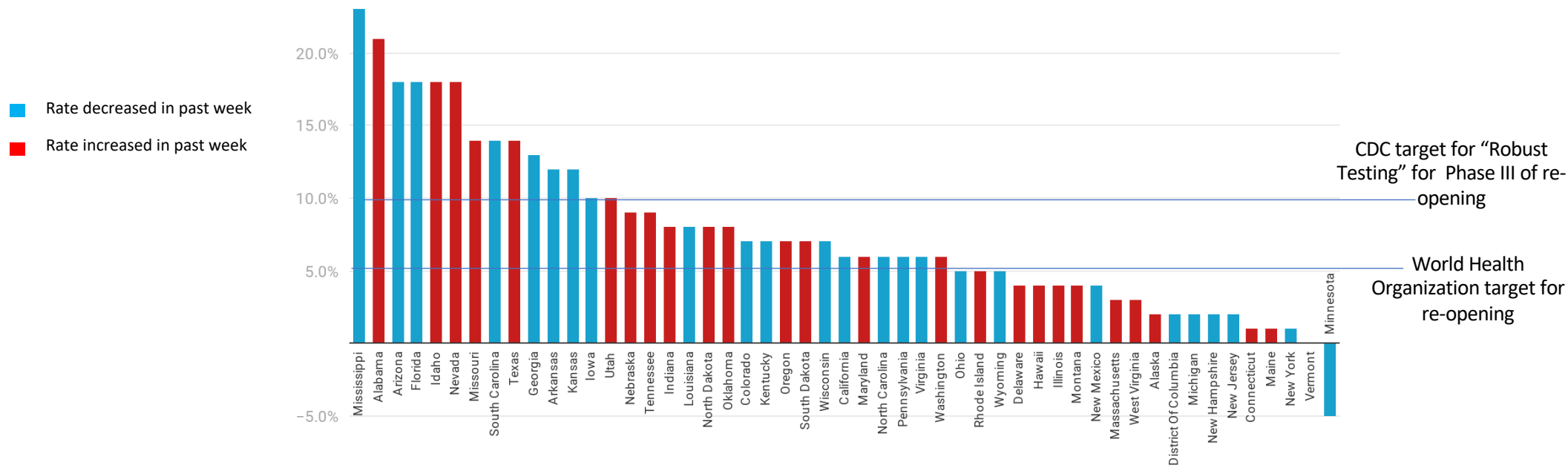
Map: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

State-By-State

Test-Positive rates remain high in at least 12 states - five of these saw their rates increase this week: Alabama, Idaho, Nevada, Missouri & Texas

Test-Positive %

Trailing 7-Day Moving Average, As of August 3



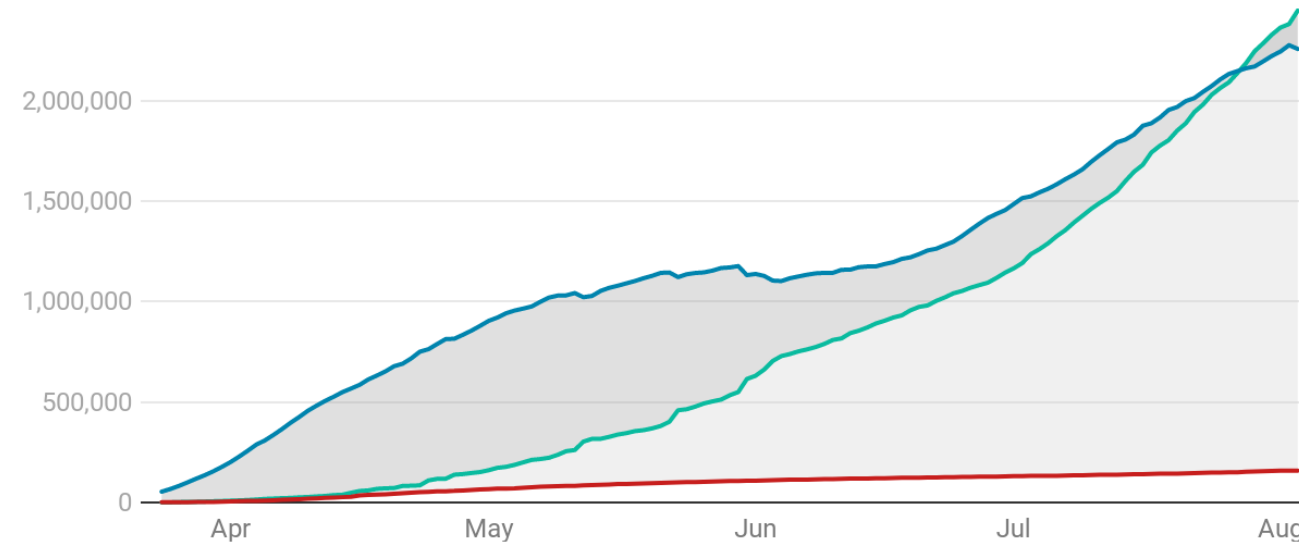
Health Industry Advisor LLC analysis

Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

Active Cases v. Recoveries & Deaths

As of August 3

— Active Cases — Recoveries — Deaths



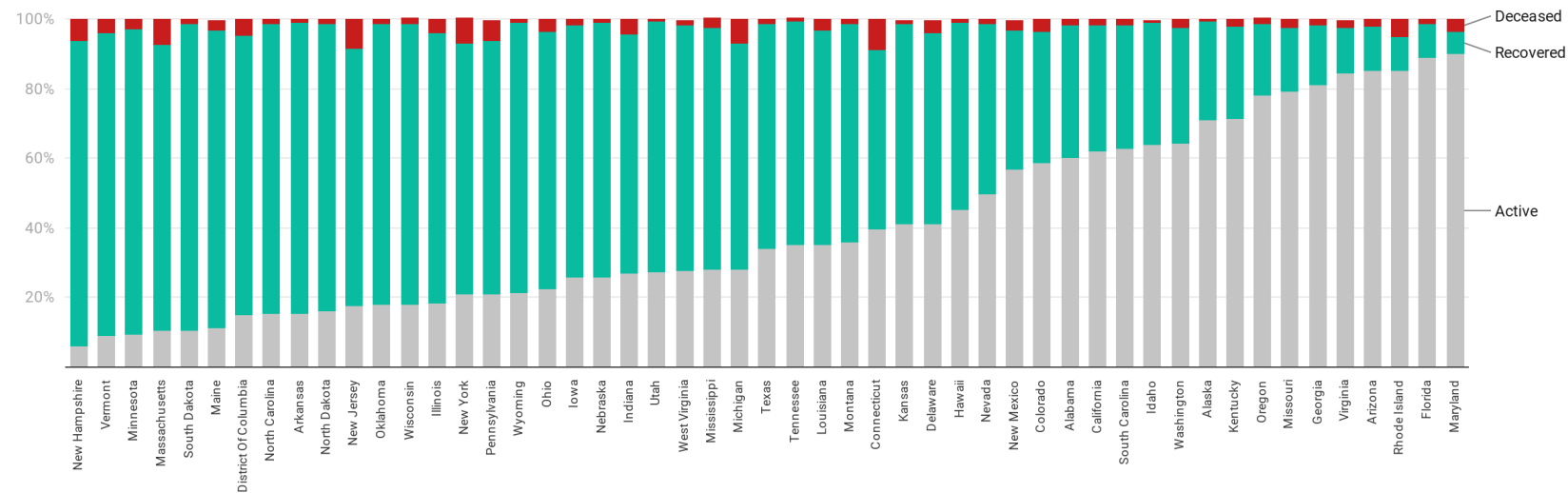
Health Industry Advisor LLC analysis

Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

To-date, < ½ of all cases are still listed as active; just over ½ are considered recovered. A few states may be slow in reporting recoveries

Case Outcomes

As of August 3

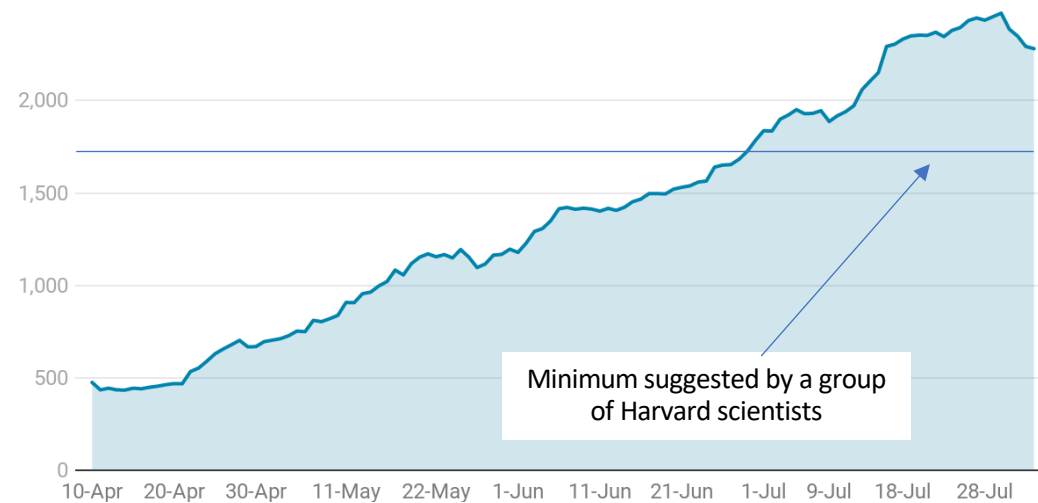


Health Industry Advisor LLC analysis

Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

Daily Tests Per 1 Million - United States

Trailing 7-Day Moving Average, As of August 3

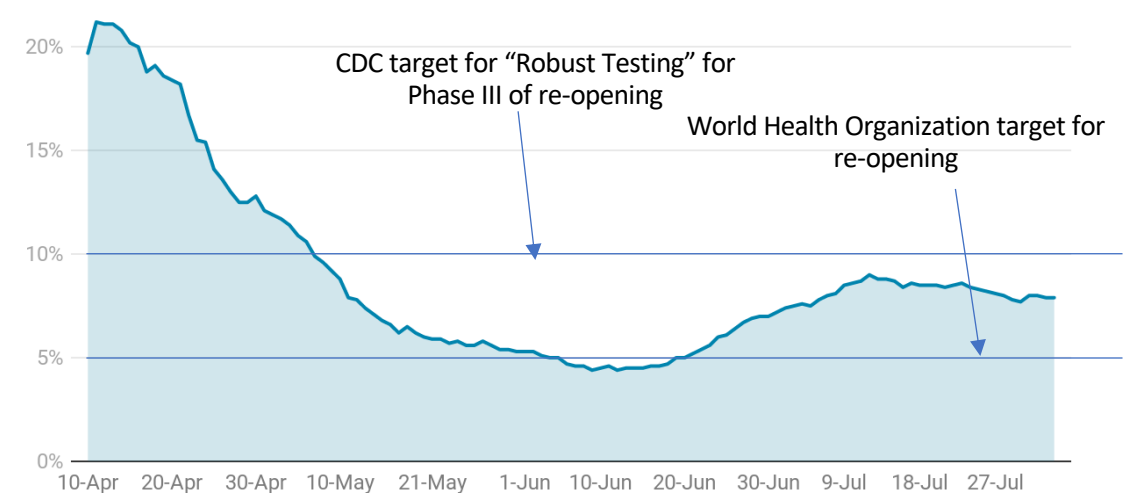


Health Industry Advisor LLC analysis

Chart: Health Industry Advisor LLC • Source: The Atlantic's Covid Tracking Project • Created with Datawrapper

Test-Positive Rate - United States

Trailing 7-Day Moving Average, As of August 3



Health Industry Advisor LLC analysis

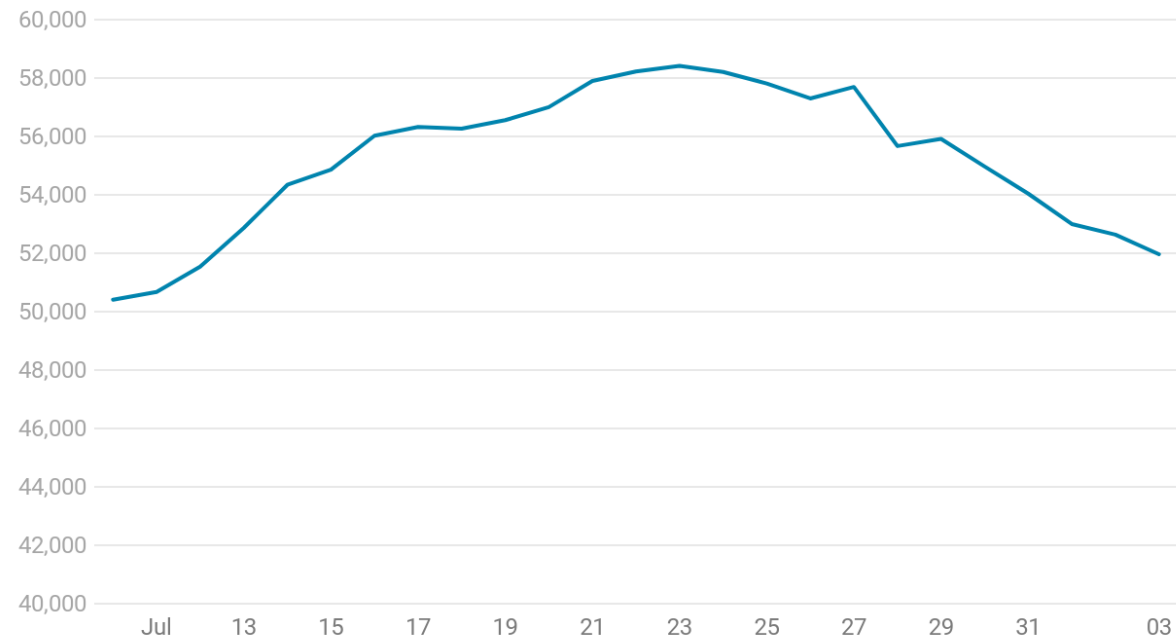
Chart: Health Industry Advisor LLC • Source: The Atlantic's Covid Tracking Project • Created with Datawrapper

United States

COVID-19 hospital census has declined 5 consecutive days; is down 11% since July 23

COVID-19 stress on hospital beds is easing **US: COVID-19 Patients**

As of August 3



Florida data first available on July 10

Data excludes Alabama, Alaska, Hawaii, Idaho, Kansas, Nebraska, and Tennessee - data either not reported or not consistently reported
Data source: Johns Hopkins University Center for Systems Science's Covid Tracking Project • Created with Datawrapper

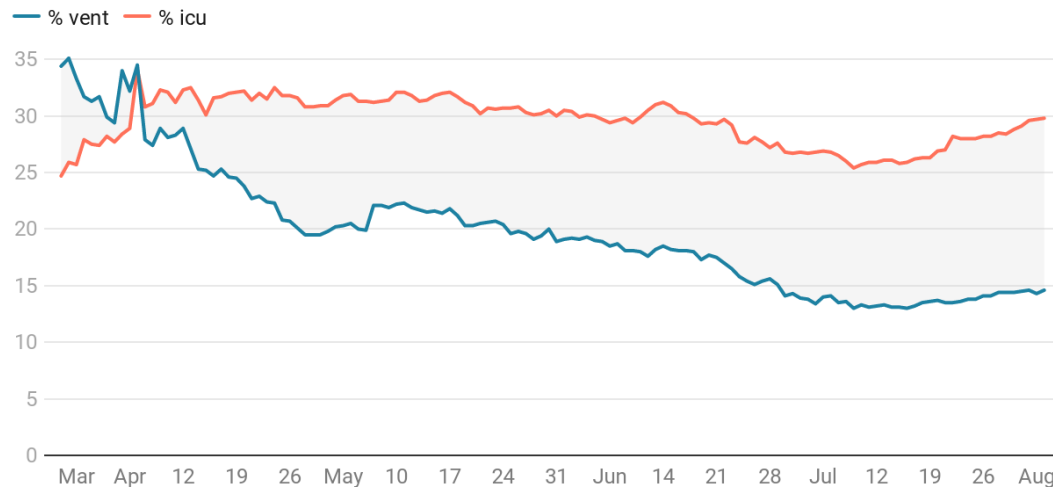
As hospital census declined, the % of patients in the ICU has increased; the % of ER visits related to COVID-19 illnesses is declined to mid-June levels

A greater % of patients are in the ICU

Stress on ERs from COVID-19 cases is diminishing

Severity of Hospitalized Patients

% of patients on ventilators and in the ICU, As of August 3

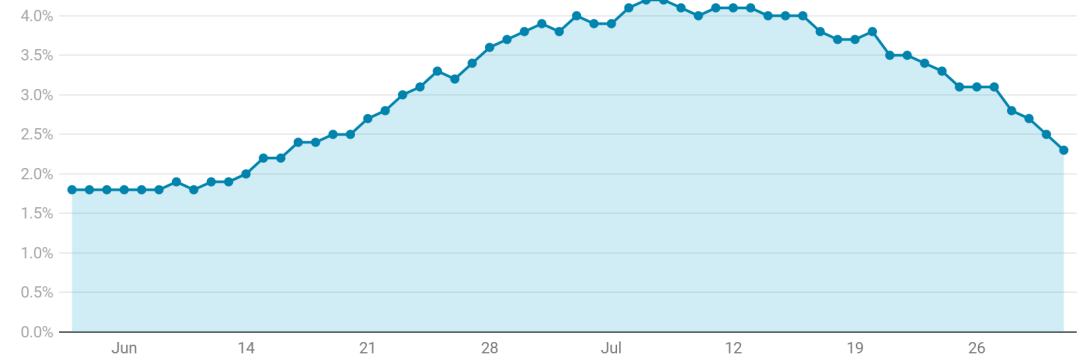


Health Industry Advisor LLC analysis

Chart: Health Industry Advisor LLC • Source: The Atlantic's Covid Tracking Project • Created with Datawrapper

% of Emergency Department Visits for COVID-Like Illness

As of July 31



Health Industry Advisor LLC analysis

Chart: Health Industry Advisor LLC • Source: Centers for Disease Control • Created with Datawrapper

2nd consecutive day with relatively low deaths (<1/2 the preceding 5 days).
There are now 15.4 recovered persons for every death reported to-date

Deaths Recorded With Coronavirus in the U.S.

Trailing 7-Day Moving Average, As of August 3

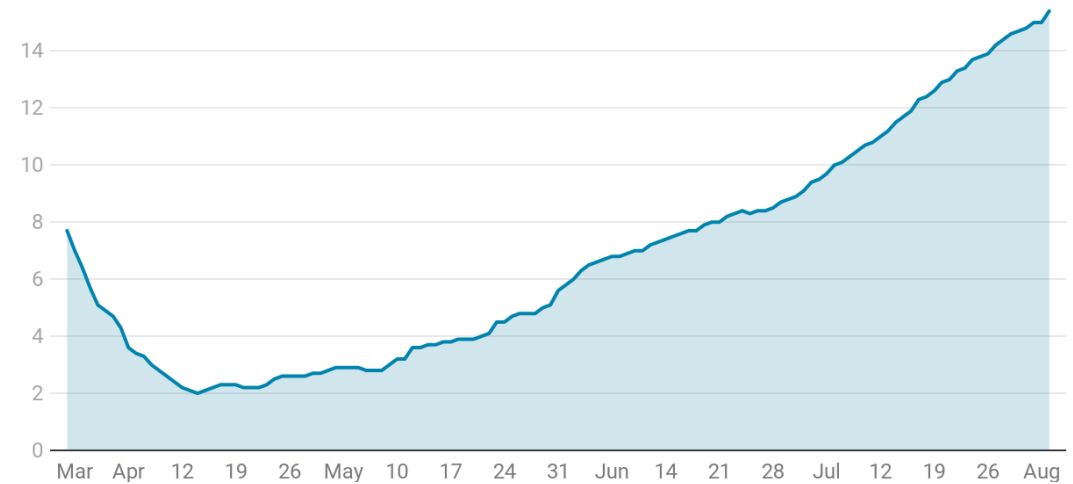


Health Industry Advisor LLC analysis

Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

Recoveries: Deaths - United States

As of August 3



Health Industry Advisor LLC analysis

Chart: Health Industry Advisor LLC • Source: worldometers.info • Created with Datawrapper

States hit early by the coronavirus experienced significantly higher rates of deaths per capita than recently-hit states

Deaths Per Case

As of August 3

- State hard-hit in March-April
- State hard-hit in June-July

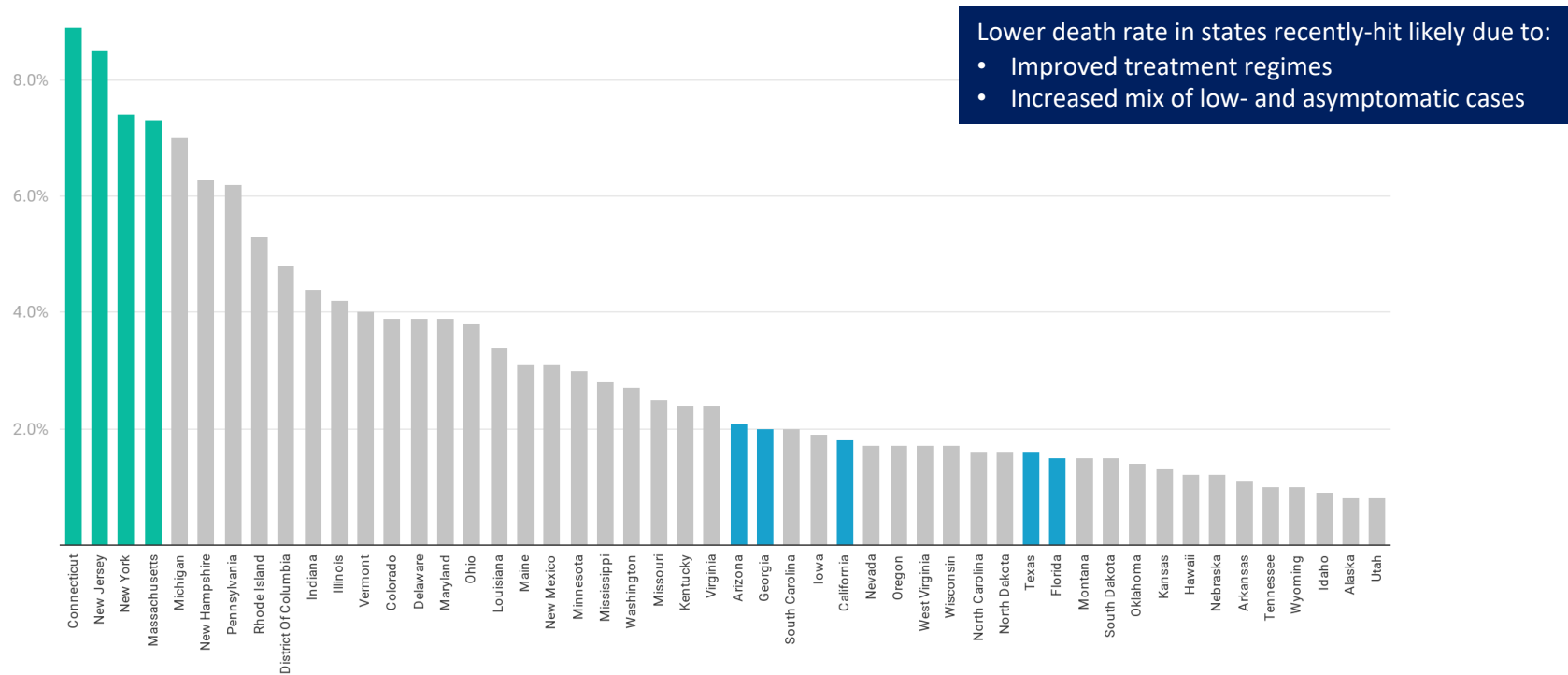


Chart: Health Industry Advisor LLC • Created with Datawrapper

State-By-State

Five states now have at least 2% of the population infected by the virus – Louisiana, Arizona, New York, Florida and New Jersey; Actual rates likely far higher in Louisiana, New York and New Jersey, as only severe cases were identified during early days of virus

Cases / Million

To-date, as of August 3

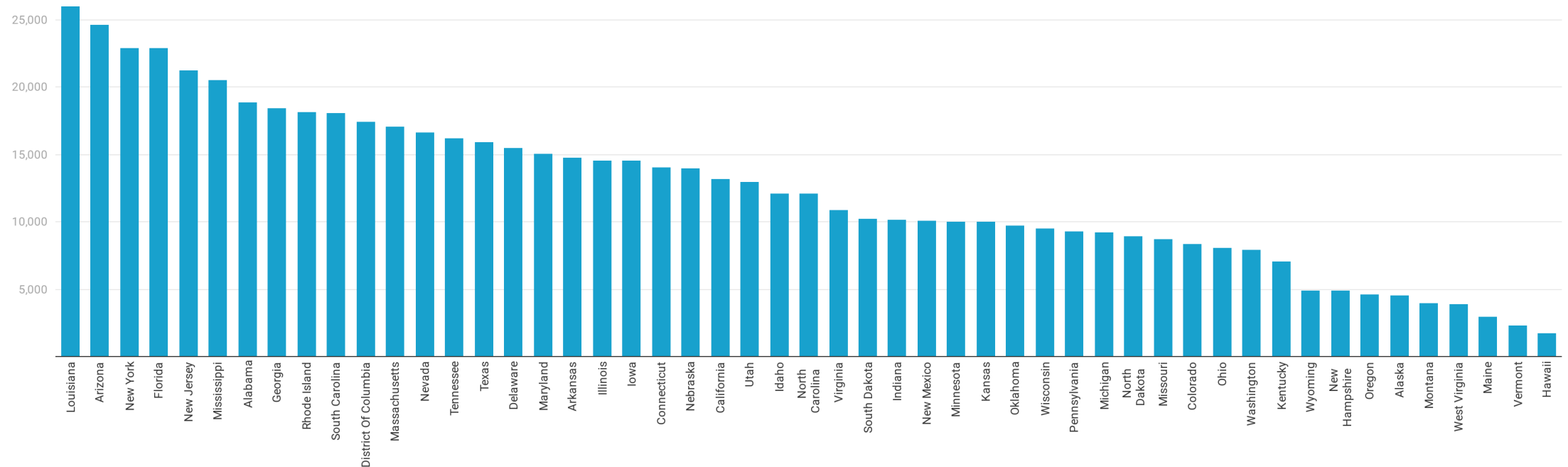


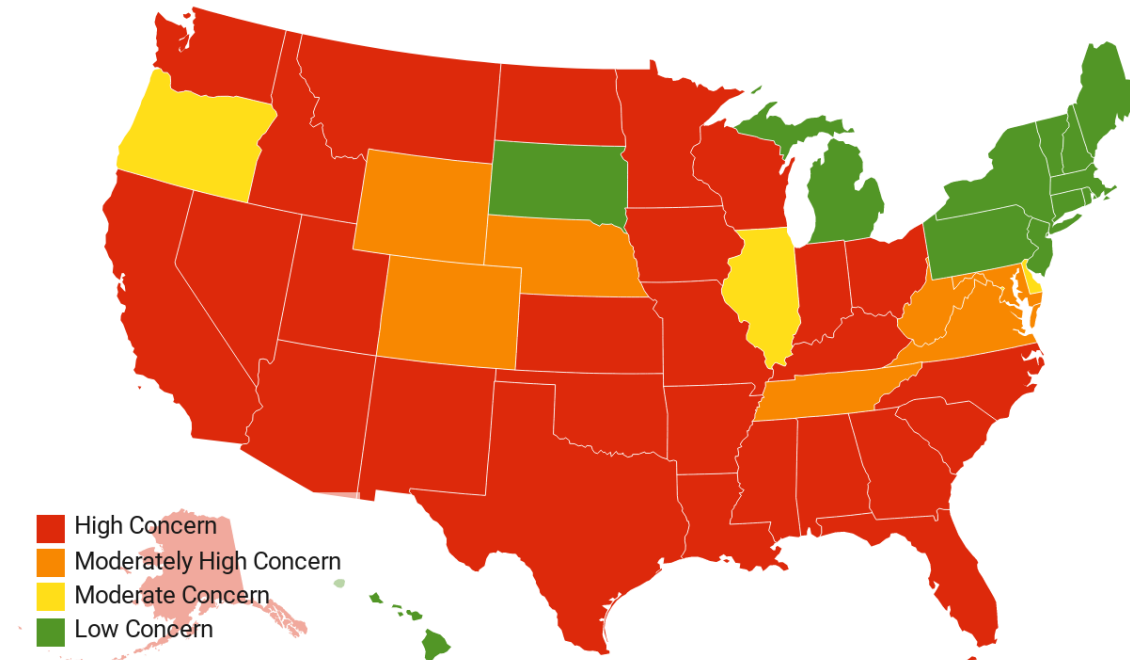
Chart: Health Industry Advisor LLC • Created with Datawrapper

The following data sources are accessed on a daily or weekly basis:

- The Atlantic's Covid Tracking Project: <https://covidtracking.com>
- Worldometers.info: <https://www.worldometers.info/coronavirus/>
- Centers for Disease Control, National, Regional, and State Level Outpatient Illness and Viral Surveillance <https://gis.cdc.gov/grasp/fluview/fluportaldashboard.html>
- Centers for Disease Control, COVID-19 Laboratory-Confirmed Hospitalizations https://gis.cdc.gov/grasp/COVIDNet/COVID19_5.html
- Centers for Disease Control, COVID Data Tracker <https://www.cdc.gov/covid-data-tracker/index.html#mobility>
- Institute for Health Metrics and Evaluation, COVID-19 estimate downloads <http://www.healthdata.org/covid/data-downloads>
- New York Times, Covid-19 data <https://github.com/nytimes/covid-19-data>
- COVID-19 Data Repository by the Center for Systems Science and Engineering (CSSE) at Johns Hopkins University <https://github.com/CSSEGISandData/COVID-19>

Situation remains concerning: ¾ of the country's population resides in a state we consider of "High" or "Moderately High" concern

As of July 25



Map: Health Industry Advisor LLC • Created with Datawrapper