

RUPRI Center for Rural Health Policy Analysis

Rural Data Update

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County-Level 14-Day COVID-19 Case Trajectories

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Background

This document updates maps and tables for the Rural Data Brief “County-Level 14-Day COVID-19 Case Trajectories” (https://ruprihealth.org/publications/policybriefs/2020/County_COVID_Trajectories.pdf). This data brief looks at the new case counts in every US county between March 21, 2021, and April 3, 2021, to quantitatively evaluate 14-day trends in metropolitan, nonmetropolitan, and noncore counties. Previous versions of this document can be found at: https://ruprihealth.org/publications/policybriefs/2020/COVID_Projects.html

Data on confirmed COVID-19 cases were obtained from the Johns Hopkins University COVID-19 Data Repository¹. The number of cases in each county was aggregated for each week in the two-week period, and the totals for each week were compared. To minimize the impact of counties with very minor real variation in weekly counts, those with a change in case count of two or fewer (either increase or decrease) were coded as “Same number, both weeks.” Counties that saw more than a 25 percent increase or decrease in number of cases between the weeks were labelled “notable” (including counties that went from 3 or more to none [notable decrease] and counties that went from none to 3 or more [notable increase]). Counties in the 50 states and the District of Columbia were classified as metropolitan, nonmetropolitan, or noncore based on Urban Influence Codes².

Table 1. 14-day trends^a in newly confirmed COVID-19 cases, by county geography: 3/21/2021 – 4/3/2021

	Metropolitan (n = 1,166)	Nonmetropolitan (n = 641)	Noncore (n = 1,335)
No cases reported	11 (0.9%)	10 (1.6%)	85 (6.4%)
Decreasing, notable ^b	252 (21.6%)	164 (25.6%)	363 (27.2%)
Decreasing, not notable	223 (19.1%)	78 (12.2%)	53 (4.0%)
Same number, both weeks ^c	120 (10.3%)	110 (17.2%)	466 (34.9%)
Increasing, not notable	258 (22.1%)	87 (13.6%)	22 (1.6%)
Increasing, notable	302 (25.9%)	192 (30.0%)	346 (25.9%)

^aComparison of number of new cases in first week of 14-day period with new cases in second week.

^b“Notable” trends indicate weekly changes in new cases exceeding (either increasing or decreasing) 25 percent.

^cIncludes counties with an absolute change in count of two or fewer.



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Table 2. 14-day trends^a in newly confirmed COVID-19 cases, in counties with any cases, by county geography: 3/21/2021 – 4/3/2021

	Metropolitan (n = 1,155 of 1,166)	Nonmetropolitan (n = 631 of 641)	Noncore (n = 1,250 of 1,335)
<i>Any decrease</i>	475 (41.1%)	242 (38.4%)	416 (33.3%)
Notable decrease ^b	252 (21.8%)	164 (26.0%)	363 (29.0%)
Same number, both weeks ^c	120 (10.4%)	110 (17.4%)	466 (37.3%)
<i>Any increase</i>	560 (48.5%)	279 (44.2%)	368 (29.4%)
Notable increase ^b	302 (26.1%)	192 (30.4%)	346 (27.7%)
Increase of 100% or more	58 (5.0%)	55 (8.7%)	186 (14.9%)

^aComparison of number of new cases in first week of 14-day period with new cases in second week.

^b"Notable" trends indicate weekly changes in new cases exceeding (either increasing or decreasing) 25 percent.

^cIncludes counties with an absolute change in count of two or fewer.

Figure 1.

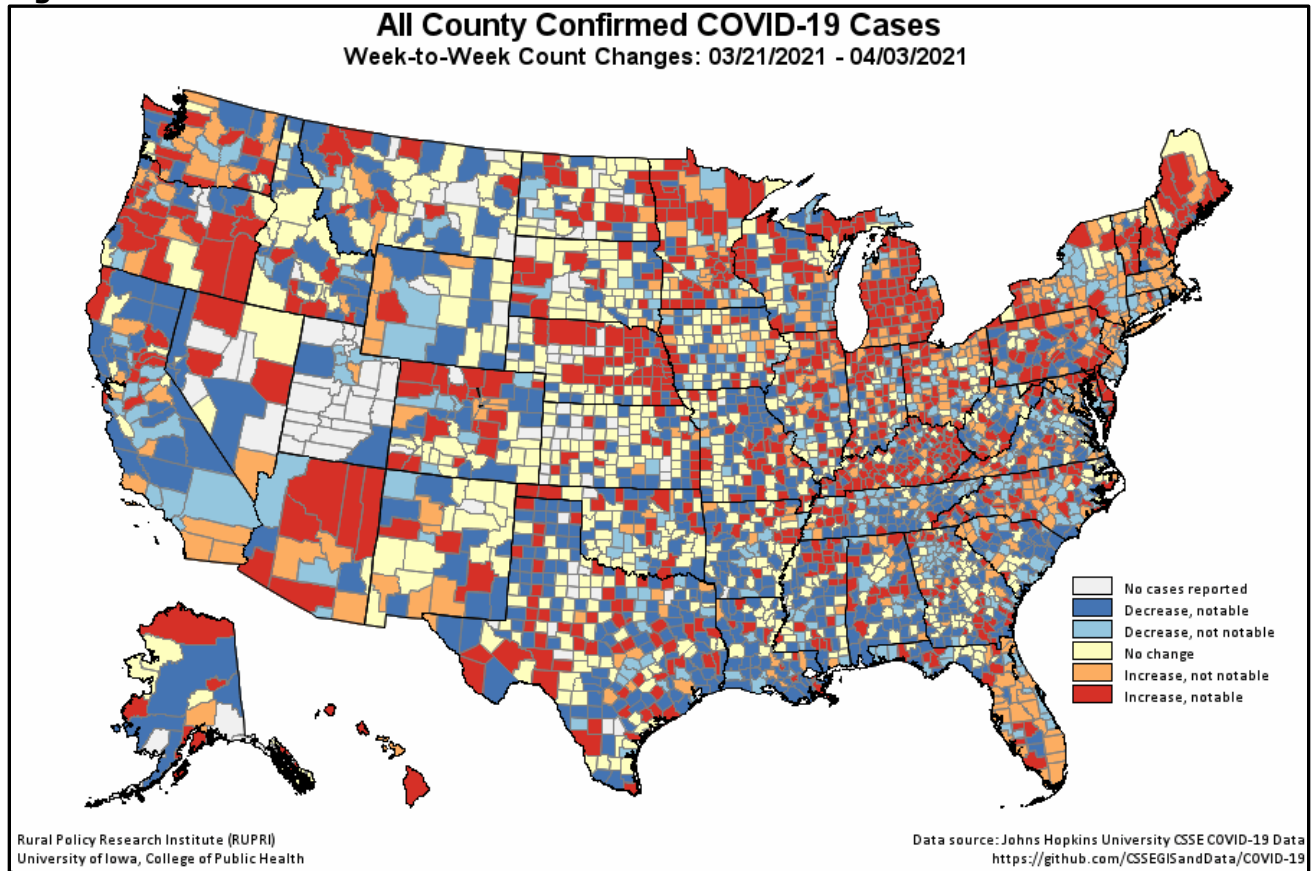


Figure 2.

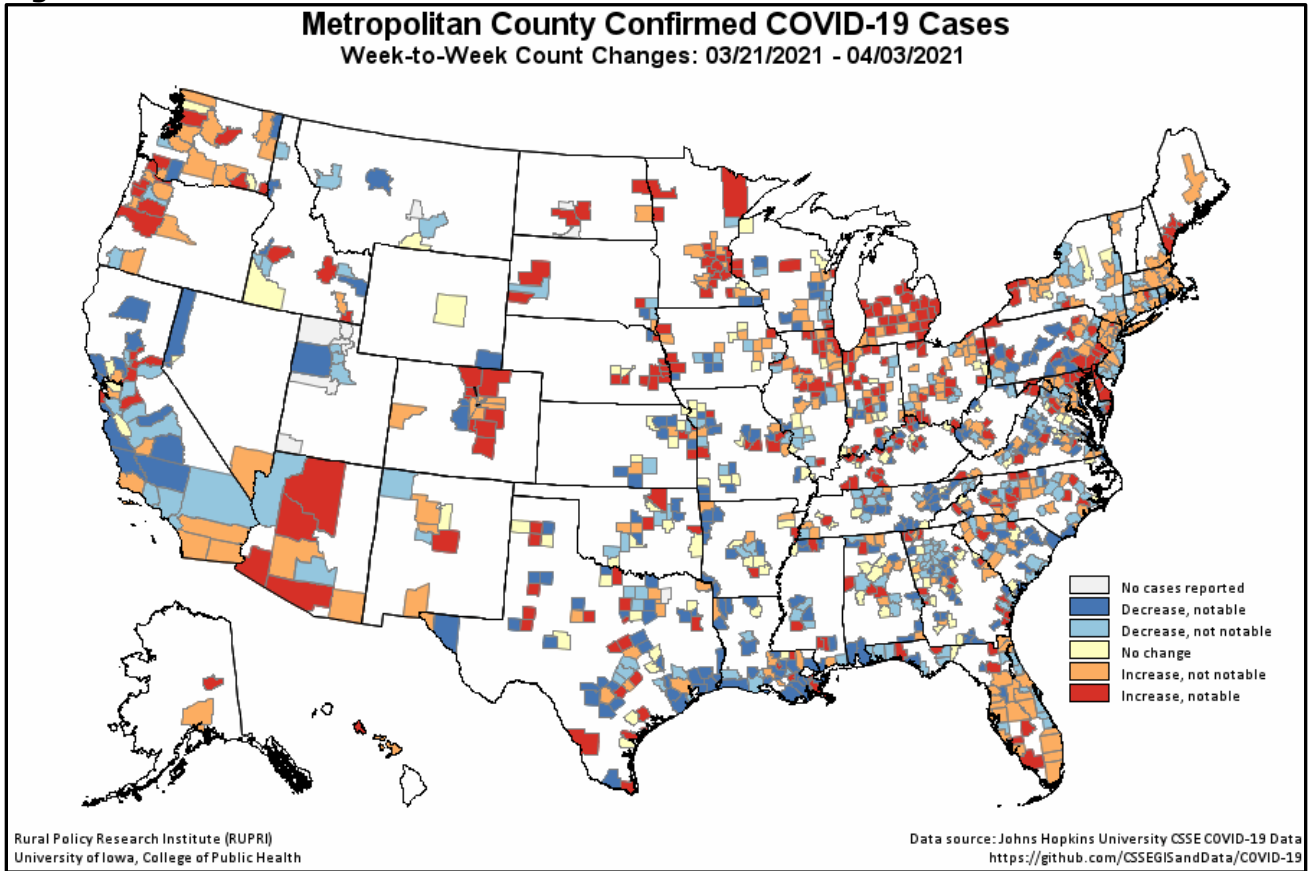


Figure 3.

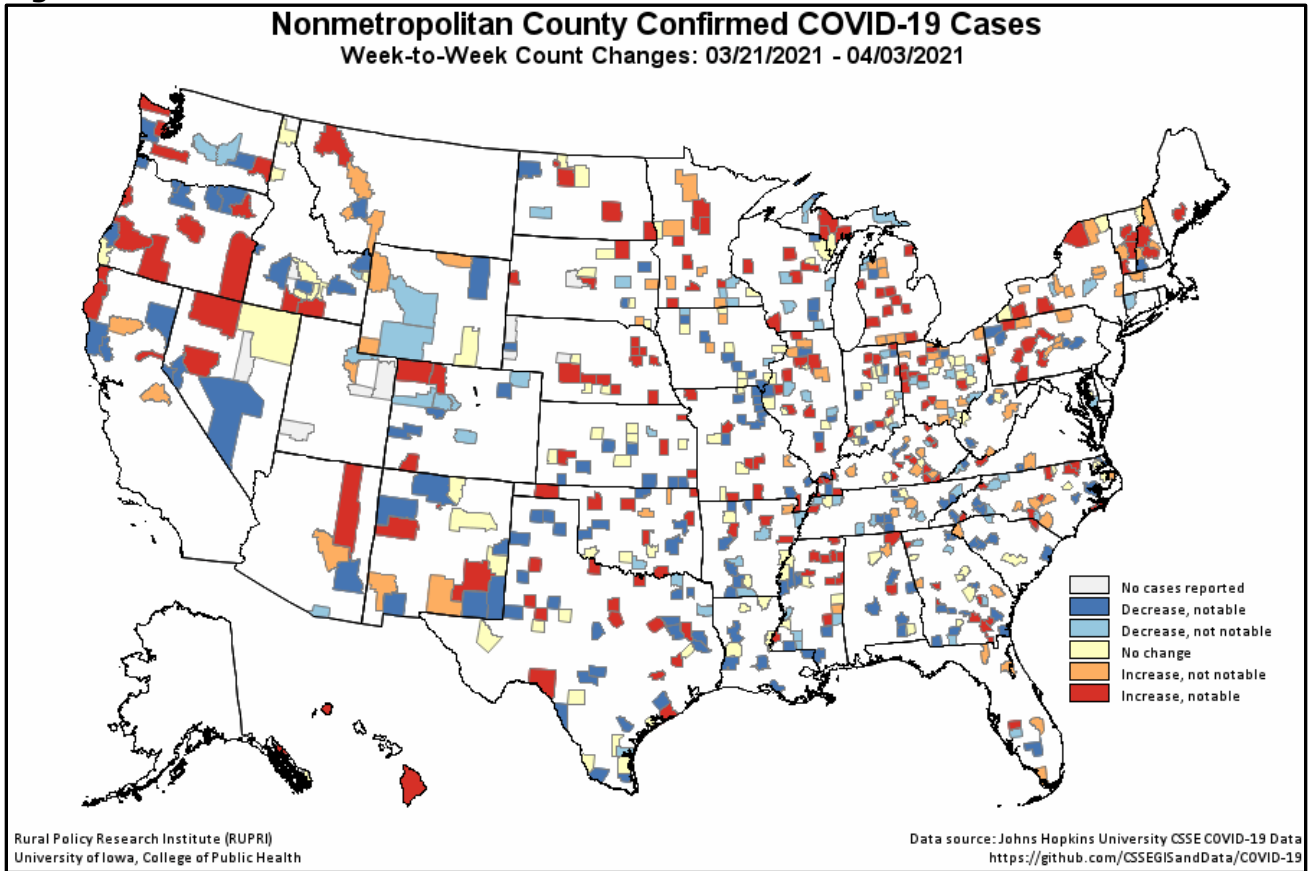
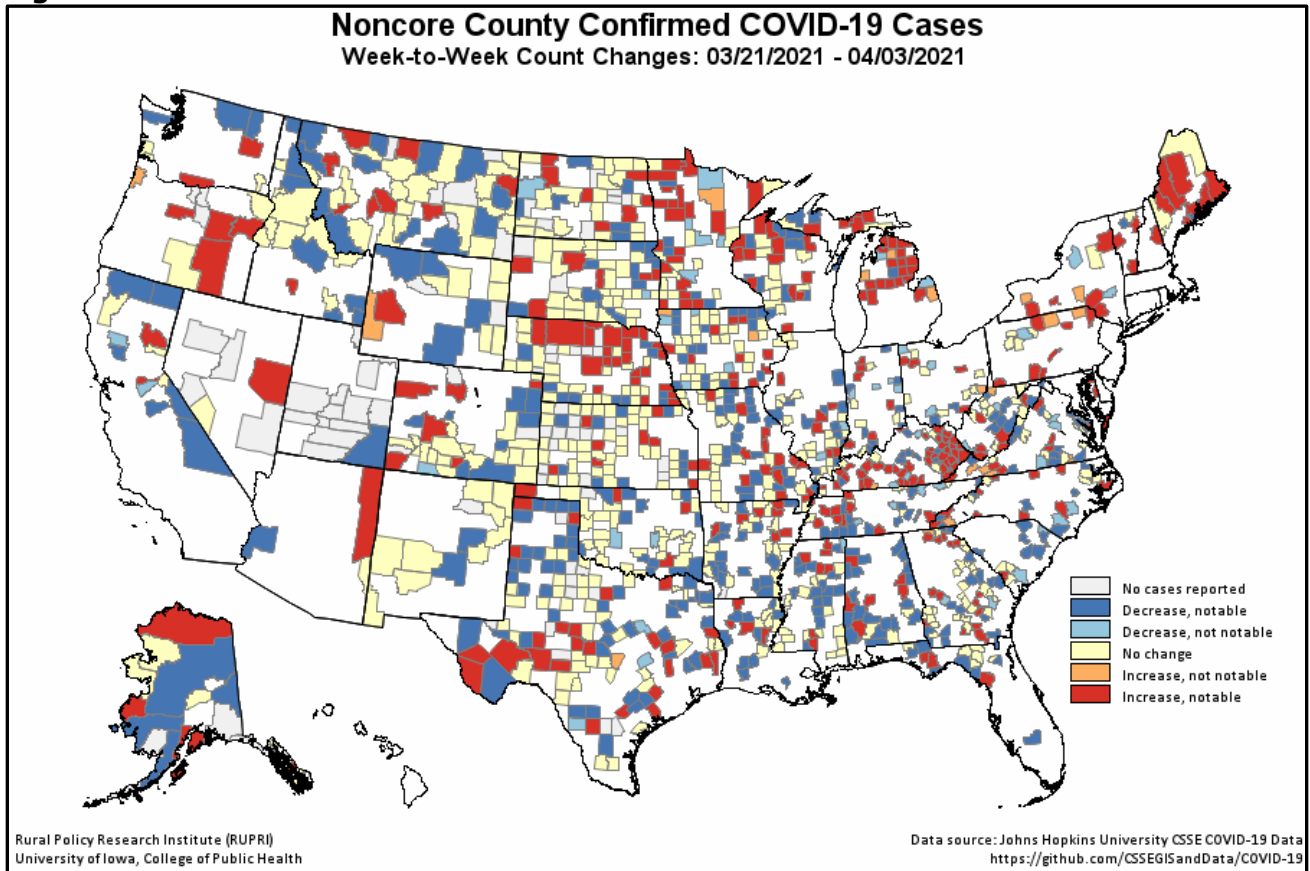


Figure 4.



¹ COVID-19 case and death data for this ongoing report were previously obtained from [USA Facts.org](https://datafairs.org/). Reports after 8/15/2020 use data from the [COVID-19 Data Repository by the Center for Systems Science and Engineering \(CSSE\) at Johns Hopkins University](https://github.com/CSSEGISandData/COVID-19). While both sources employ similar approaches and resources to produce their data, the Johns Hopkins data is released in a more timely fashion making it more suitable for use in these reports.

² U.S. Department of Agriculture, Economic Research Service (2019). "Urban Influence Codes." Retrieved May 20, 2020 from <https://www.ers.usda.gov/data-products/urban-influence-codes/>.