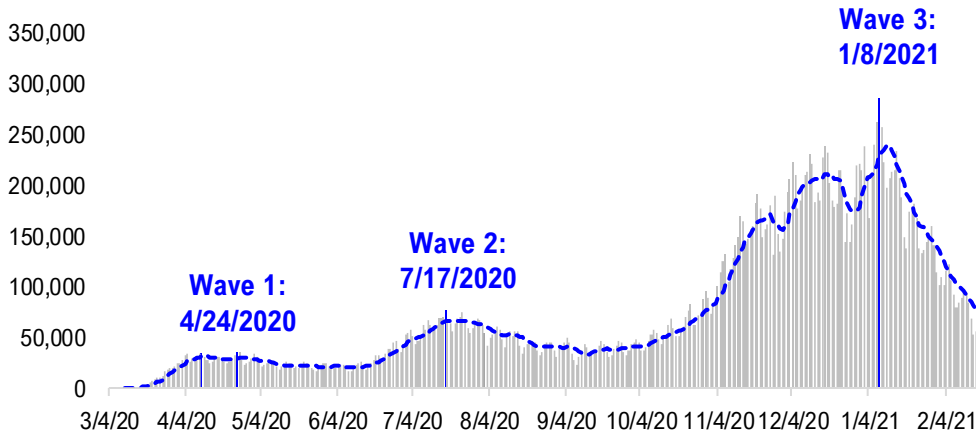


FSInsight Daily COVID-19 Chartbook

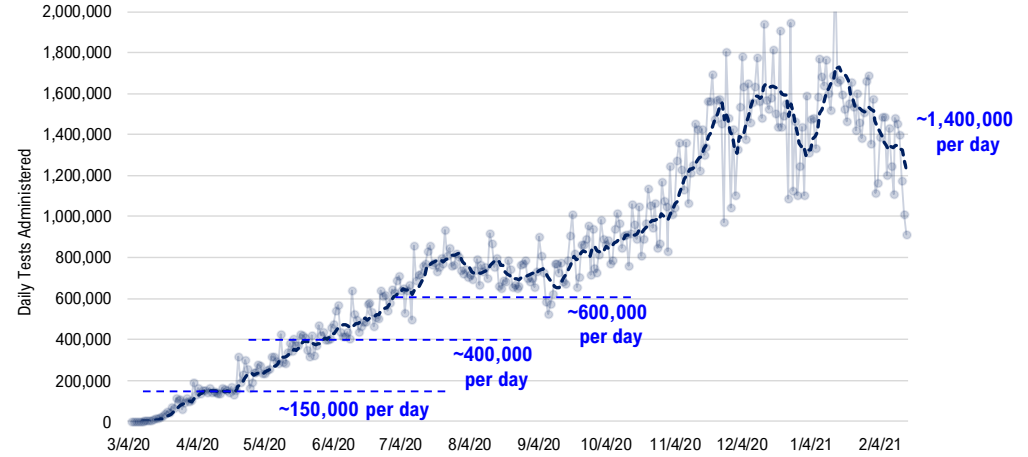


#1: USA COVID-19 Situation at a Glance...

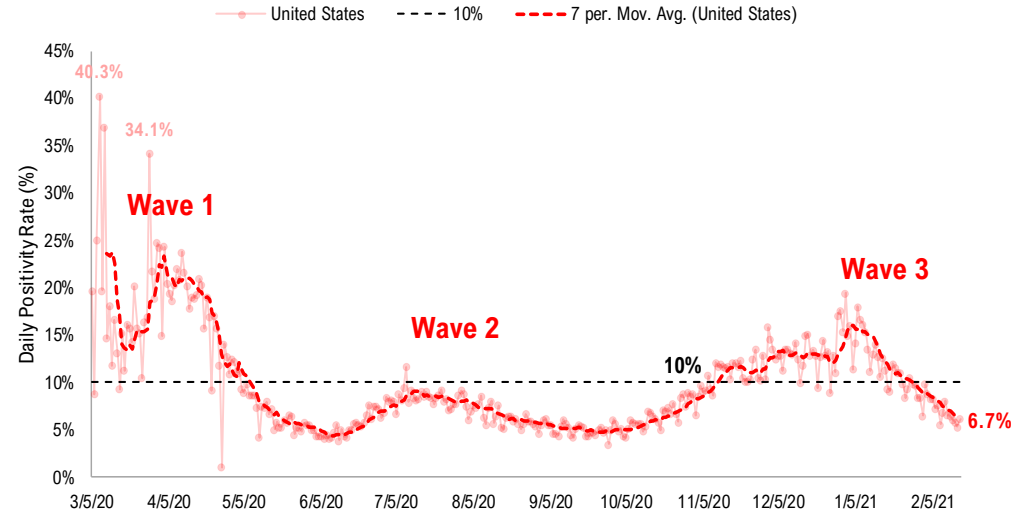
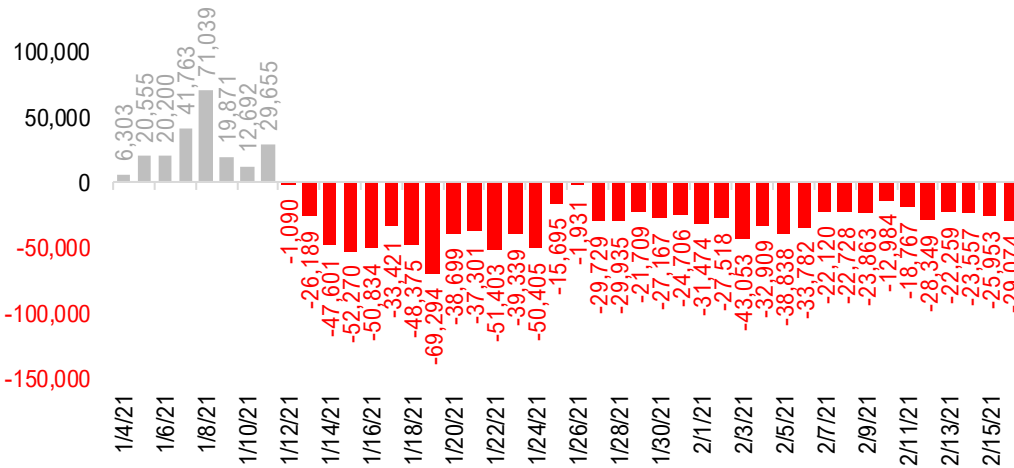
US daily new cases



USA total COVID-19 tests administered

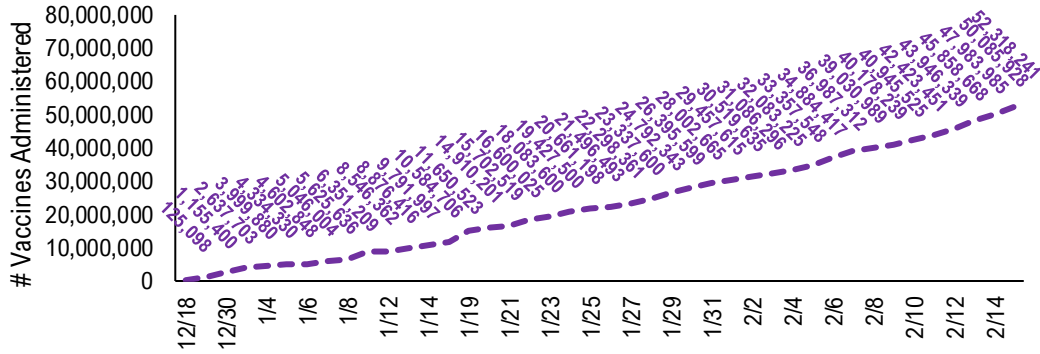


US daily new cases rolling 7D delta

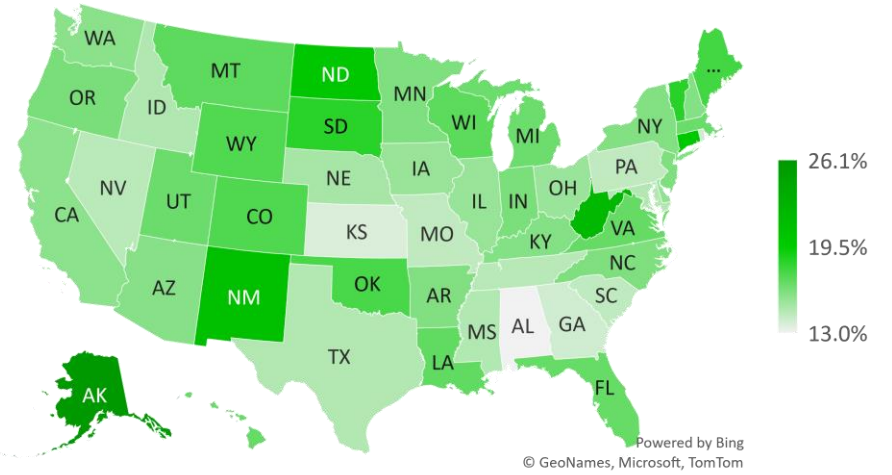


#2: USA COVID-19 Vaccination Progress at a Glance...

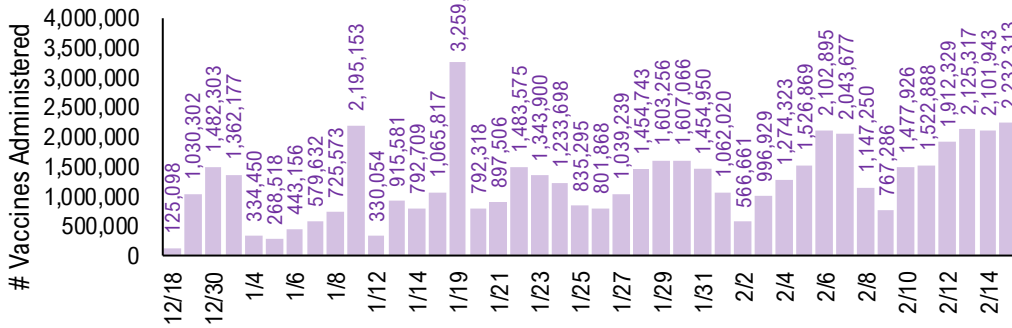
Cumulative Vaccines Administered



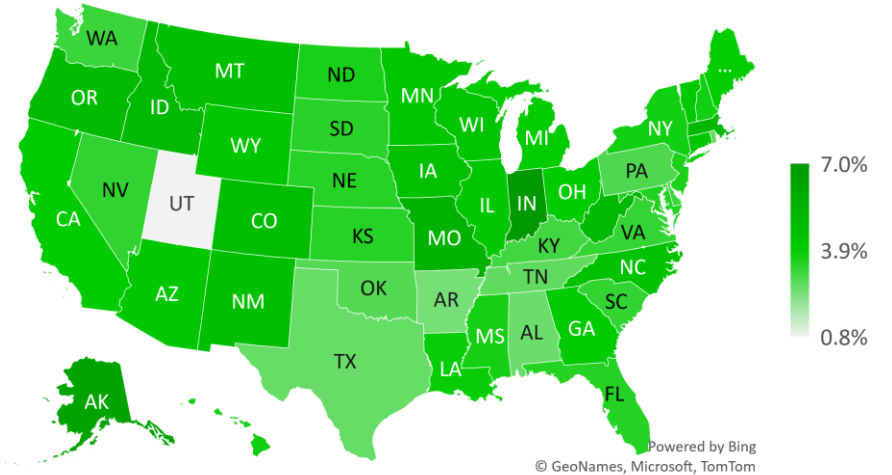
Cumulative Vaccines Administered as % State Population



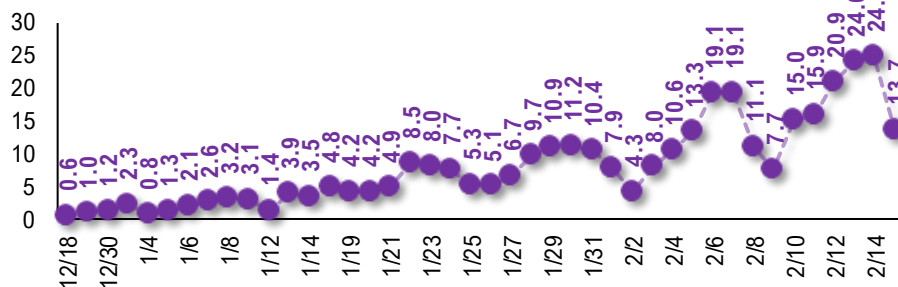
Daily Vaccines Administered



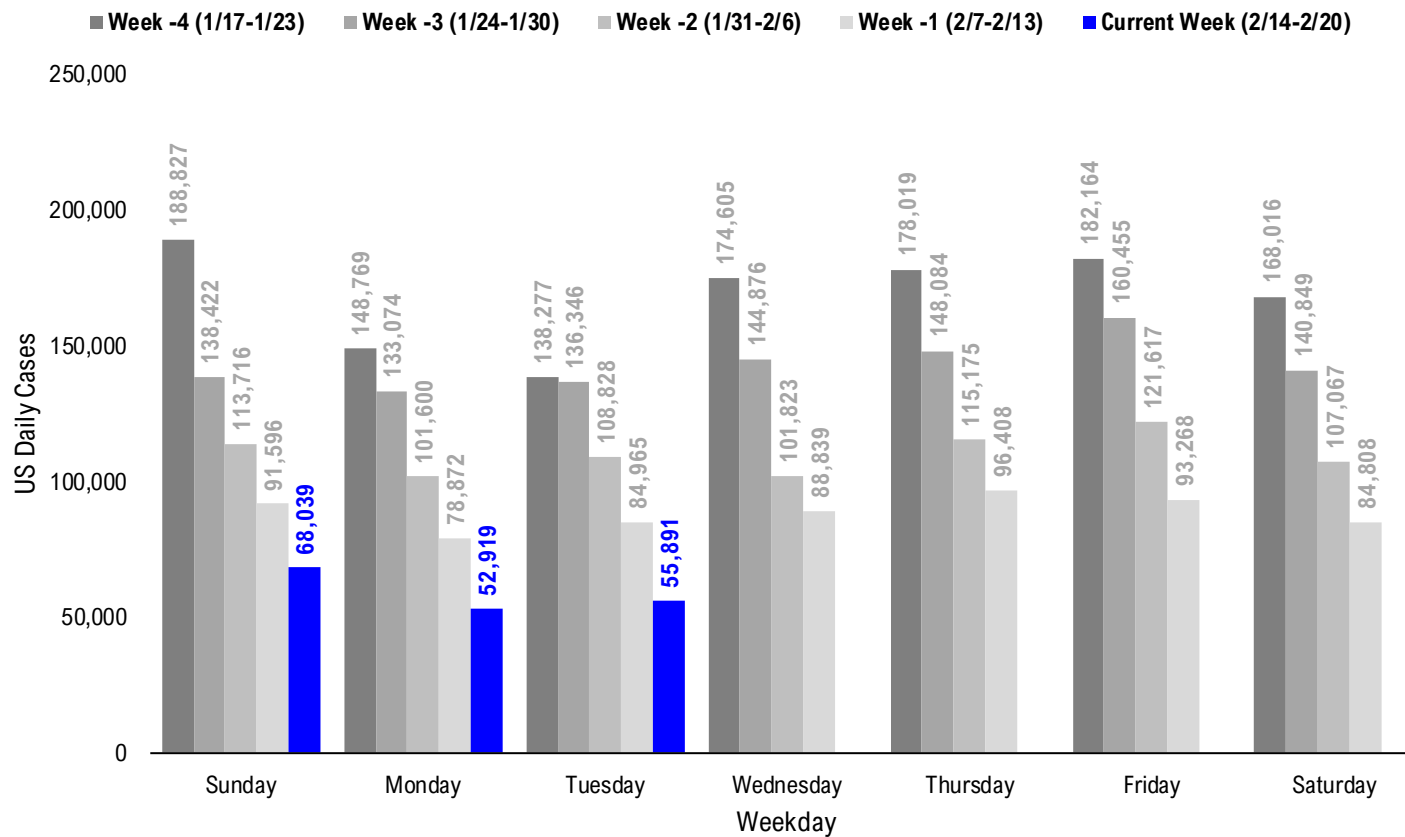
Implied Weekly Vaccines Administered as % State Population



Daily Vaccinations / Daily Cases (7D Avg)



#3: USA COVID-19 Daily Cases Weekday Seasonality (Past 4 Weeks) ...



#4: USA State COVID-19 Situation at a Glance...

	Sorted Daily Cases		Daily Cases (3D avg) per 1mm residents				Hospitalization			
	% US Pop	% US GDP	7D		# Days	% Decline in Daily Cases	7D Net		% Hospitalization / 7D New Cases	
			2/16	Delta			2/16	Delta		7D Net Hospitalization
United States	100%	100%	55.891	-29,074	180	-80	38	-78%	-14.646	-2.7%

	Sorted Daily Cases		Daily Cases (3D avg) per 1mm residents				Hospitalization			
	% US Pop	% US GDP	7D		# Days	% Decline in Daily Cases	7D Net		% Hospitalization / 7D New Cases	
			2/16	Delta			2/16	Delta		7D Net Hospitalization
United States	100%	100%	55.891	-29,074	180	-80	38	-78%	-14.646	-2.7%

States:

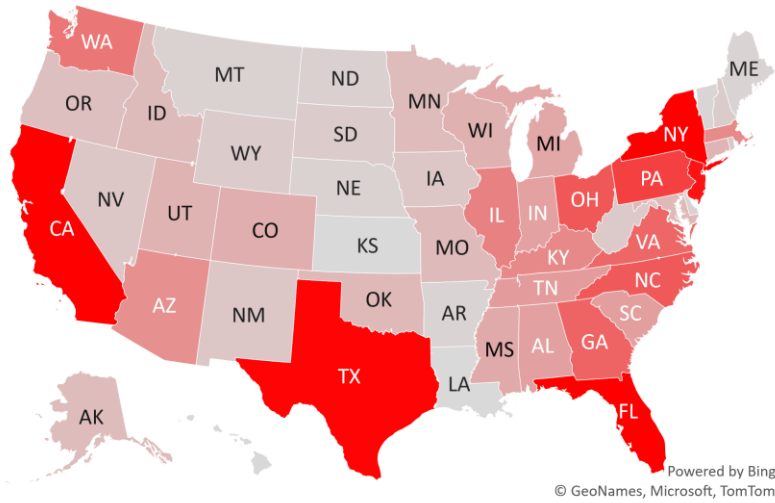
1 New York	5.9%	8.1%	6,753	-1,113	367	-84	38	-60%	-1,255	(2.2%)
2 Florida	6.5%	5.0%	6,297	-726	238	-63	39	-73%	-661	(1.4%)
3 California	11.9%	14.6%	5,692	-2,559	177	-107	37	-86%	-2,829	(4.9%)
4 Texas	8.7%	8.8%	3,308	-7,070	138	-118	40	-82%	-1,740	(3.6%)
5 New Jersey	2.7%	3.0%	3,082	+13	228	-117	38	-67%	-416	(2.2%)
6 Pennsylvania	3.9%	3.8%	2,377	-1,711	179	-115	73	-81%	-534	(2.4%)
7 Ohio	3.5%	3.3%	2,026	-1,181	164	-43	68	-83%	-408	(2.3%)
8 North Carolina	3.2%	2.7%	1,988	-798	242	-93	38	-76%	-416	(1.7%)
9 Georgia	3.2%	2.9%	1,840	-743	166	-92	37	-80%	-570	(3.5%)
10 Virginia	2.6%	2.6%	1,770	-1,521	230	-80	29	-75%	-399	(2.1%)
11 Washington	2.3%	2.7%	1,540	+862	67	-85	83	-88%	-15	(0.3%)
12 Illinois	3.8%	4.2%	1,348	-734	116	-39	95	-89%	-391	(2.7%)
13 Kentucky	1.3%	1.0%	1,241	-1,087	274	-89	39	-76%	-269	(2.8%)
14 Massachusetts	2.1%	2.8%	1,226	-367	226	-67	38	-80%	-305	(2.2%)
15 Arizona	2.2%	1.7%	1,132	-3,249	202	-172	44	-88%	-697	(5.6%)
16 Tennessee	2.1%	1.8%	962	-674	168	-88	60	-89%	-185	(1.5%)
17 South Carolina	1.6%	1.1%	913	-826	354	-73	37	-73%	-235	(1.6%)
18 Alabama	1.5%	1.1%	883	-435	179	-49	40	-83%	-337	(4.3%)
19 Indiana	2.0%	1.8%	878	-252	142	-50	73	-88%	-247	(2.9%)
20 Michigan	3.0%	2.6%	775	+212	68	-10	90	-92%	-236	(3.8%)
21 Mississippi	0.9%	0.6%	734	+78	266	+20	38	-73%	-141	(2.5%)
22 Colorado	1.7%	1.8%	668	-266	119	-52	87	-89%	-97	(1.2%)
23 Wisconsin	1.8%	1.6%	624	-57	88	-21	95	-93%	-114	(2.2%)
24 Utah	1.0%	0.9%	591	-327	183	-60	39	-86%	-62	(1.0%)
25 Connecticut	1.1%	1.3%	580	-289	326	-164	34	-76%	-220	(3.5%)
26 Maryland	1.8%	2.0%	516	-460	115	-75	37	-81%	-267	(4.0%)
27 Oklahoma	1.2%	1.0%	508	-562	211	-150	37	-84%	-109	(1.3%)
28 Missouri	1.8%	1.5%	481	-168	76	-26	94	-91%	-229	(4.7%)

States:

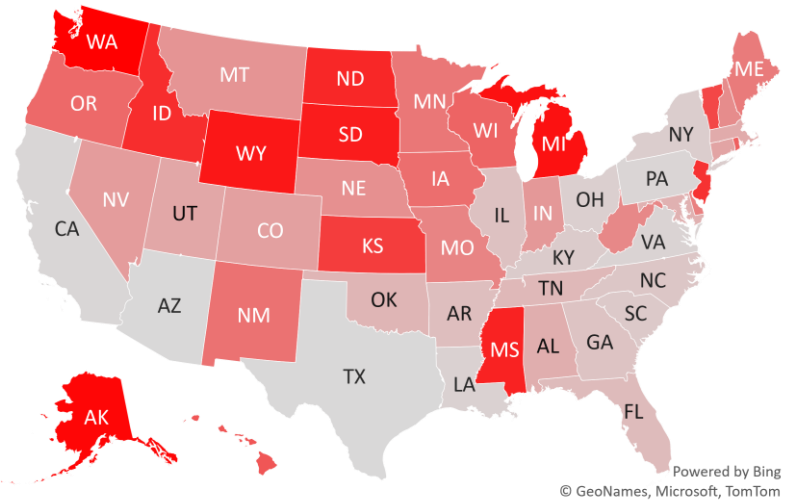
29 Idaho	0.5%	0.4%	462	+25	86	-79	68	-92%	2	0.1%
30 Alaska	0.2%	0.3%	454	+339	207	-35	73	-81%	8	0.9%
31 Puerto Rico	1.0%	0.5%	452	+263	96	+4	59	-73%	-29	(1.8%)
32 Minnesota	1.7%	1.8%	452	-120	108	-12	78	-92%	-6	(0.1%)
33 Oregon	1.3%	1.2%	411	-102	66	-28	72	-84%	-18	(0.6%)
34 New Mexico	0.6%	0.5%	299	-114	123	-47	88	-92%	-79	(2.8%)
35 Iowa	1.0%	0.9%	292	-113	91	-32	95	-93%	-72	(2.3%)
36 Nevada	0.9%	0.8%	290	-256	129	-60	38	-87%	-198	(5.1%)
37 Rhode Island	0.3%	0.3%	285	-45	254	-33	73	-84%	-45	(1.7%)
38 West Virginia	0.5%	0.4%	228	-188	155	-92	44	-85%	-73	(2.8%)
39 South Dakota	0.3%	0.3%	217	+95	146	+43	94	-93%	-12	(1.0%)
40 Wyoming	0.2%	0.2%	215	+169	153	+31	89	-91%	2	0.4%
41 New Hampshire	0.4%	0.4%	198	-221	174	-36	43	-78%	-40	(1.7%)
42 North Dakota	0.2%	0.3%	138	+39	101	+23	94	-96%	9	1.5%
43 Delaware	0.3%	0.4%	130	-149	239	-144	38	-75%	-68	(3.1%)
44 District of Columbia	0.2%	0.7%	130	-15	158	-33	37	-68%	-37	(4.4%)
45 Montana	0.3%	0.2%	127	-247	115	-63	93	-91%	-6	(0.4%)
46 Nebraska	0.6%	0.6%	119	-225	72	-57	89	-95%	-80	(2.4%)
47 Arkansas	0.9%	0.6%	94	-726	88	-135	37	-89%	-137	(4.3%)
48 Maine	0.4%	0.3%	91	-120	87	-54	32	-86%	-25	(2.2%)
49 Vermont	0.2%	0.2%	55	-4	190	+9	38	-44%	-18	(2.2%)
50 Hawaii	0.4%	0.5%	17	-14	23	-10	171	-89%	-25	(5.7%)
51 Guam	0.0%	0.0%	2	-7	18	-42	98	-98%	-2	(7.1%)
52 U.S. Virgin Islands	0.0%	0.0%	0	-7	56	-19	179	-87%	0	0.0%
53 Northern Mariana	0.0%	0.0%	0	+0	0	+0	112	-100%	0	0.0%
54 Louisiana	1.4%	1.3%	0	-1,321	130	-193	40	-89%	-273	(4.5%)
55 Kansas	0.9%	0.8%	0	+0	154	-6	83	-90%	-40	(0.9%)
56 American Samoa	0.0%	0.0%	0	+0	0	+0	0	0%	0	

#5: USA COVID-19 Heat Map...

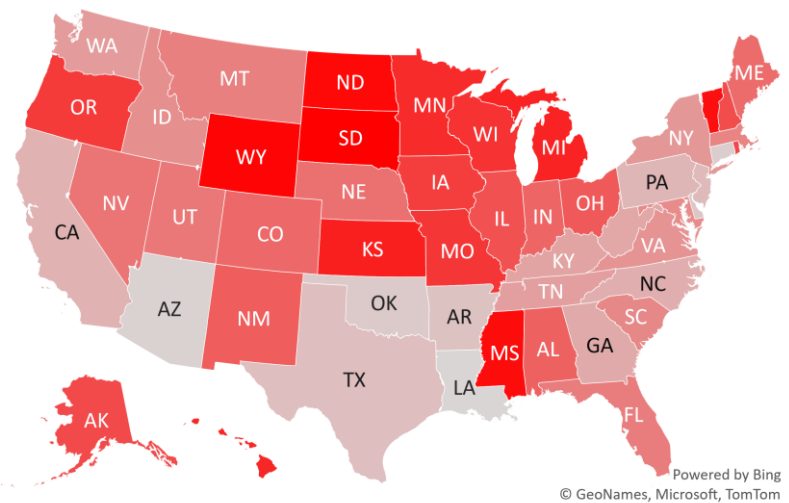
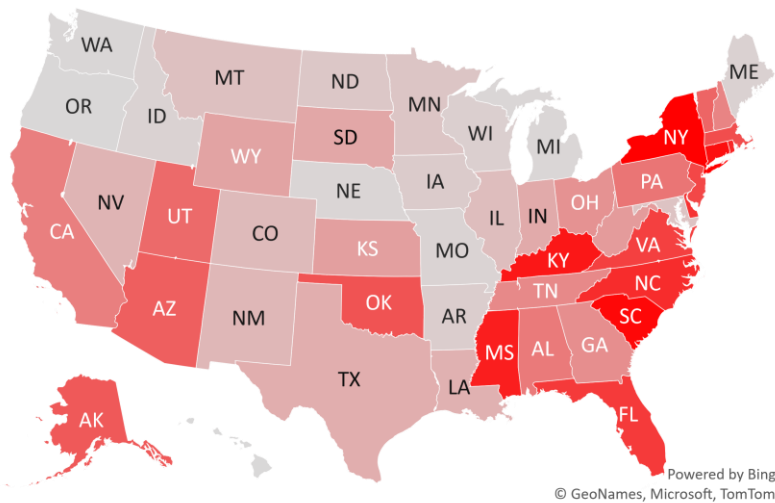
Daily Case Increases



7D Delta in Daily New Cases



Daily Case Increases per 1mm Resident (3D Avg)



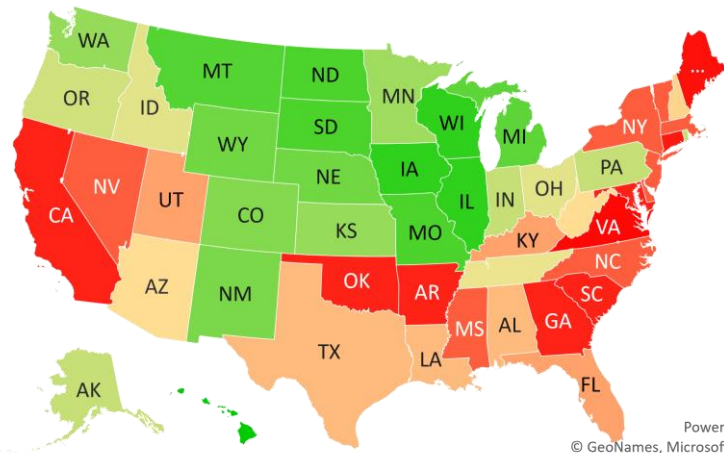
#6: # of Days since Daily Case Peaked by States...

Days since Daily Cases (3D Avg) Peak (as of 2/16)

Sorted				
	Peak Date	2/16/21	% off the Peak	% US Pop
United States	1/9/21	38	-78%	100%
States:				
U.S. Virgin Islands	8/21/20	179	-87%	0.0%
Hawaii	8/29/20	171	-89%	0.4%
Northern Mariana Island	10/27/20	112	-100%	0.0%
Guam	11/10/20	98	-98%	0.0%
Wisconsin	11/13/20	95	-93%	1.8%
Illinois	11/13/20	95	-89%	3.8%
Iowa	11/13/20	95	-93%	1.0%
South Dakota	11/14/20	94	-93%	0.3%
North Dakota	11/14/20	94	-96%	0.2%
Missouri	11/14/20	94	-91%	1.8%
Montana	11/15/20	93	-91%	0.3%
Michigan	11/18/20	90	-92%	3.0%
Wyoming	11/19/20	89	-91%	0.2%
Nebraska	11/19/20	89	-95%	0.6%
New Mexico	11/20/20	88	-92%	0.6%
Colorado	11/21/20	87	-89%	1.7%
Washington	11/25/20	83	-88%	2.3%
Kansas	11/25/20	83	-90%	0.9%
Minnesota	11/30/20	78	-92%	1.7%
Rhode Island	12/5/20	73	-84%	0.3%
Pennsylvania	12/5/20	73	-81%	3.9%
Indiana	12/5/20	73	-88%	2.0%
Alaska	12/5/20	73	-81%	0.2%
Oregon	12/6/20	72	-84%	1.3%
Ohio	12/10/20	68	-83%	3.5%
Idaho	12/10/20	68	-92%	0.5%
Tennessee	12/18/20	60	-89%	2.1%
Puerto Rico	12/19/20	59	-73%	1.0%

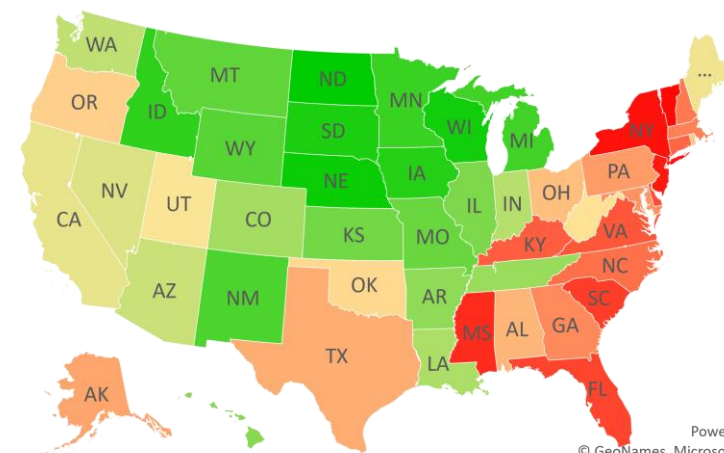
Sorted				
	Peak Date	2/16/21	% off the Peak	% US Pop
United States	1/9/21	38	-78%	100%
States:				
West Virginia	1/3/21	44	-85%	0.5%
Arizona	1/3/21	44	-88%	2.2%
New Hampshire	1/4/21	43	-78%	0.4%
Texas	1/7/21	40	-82%	8.7%
Louisiana	1/7/21	40	-89%	1.4%
Alabama	1/7/21	40	-83%	1.5%
Utah	1/8/21	39	-86%	1.0%
Kentucky	1/8/21	39	-76%	1.3%
Florida	1/8/21	39	-73%	6.5%
Vermont	1/9/21	38	-44%	0.2%
New York	1/9/21	38	-60%	5.9%
Nevada	1/9/21	38	-87%	0.9%
New Jersey	1/9/21	38	-67%	2.7%
North Carolina	1/9/21	38	-76%	3.2%
Mississippi	1/9/21	38	-73%	0.9%
Massachusetts	1/9/21	38	-80%	2.1%
Delaware	1/9/21	38	-75%	0.3%
South Carolina	1/10/21	37	-73%	1.6%
Oklahoma	1/10/21	37	-84%	1.2%
Maryland	1/10/21	37	-81%	1.8%
Georgia	1/10/21	37	-80%	3.2%
District of Columbia	1/10/21	37	-68%	0.2%
California	1/10/21	37	-86%	11.9%
Arkansas	1/10/21	37	-89%	0.9%
Connecticut	1/13/21	34	-76%	1.1%
Maine	1/15/21	32	-86%	0.4%
Virginia	1/18/21	29	-75%	2.6%

Days since Daily Case Peak: Longer = Good



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Daily Cases % off the Peak: Larger Decline = Good



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#7: US New Cases by States... (sorted by today's new cases)

Sorted
7D Ago Last 3-day Trend

LA did not update its COVID dashboard in observance of Mardi Gras...

	2/9/21	2/14/21	2/15/21	2/16/21	vs 7D ago
United States	84,965	68,039	52,919	55,891	-29,074
States:					
New York	7,866	8,316	6,365	6,753	
Florida	7,023	5,436	3,615	6,297	
California	8,251	8,842	6,487	5,692	
Texas	10,378	5,725	2,981	3,308	
New Jersey	3,069	1,781	1,202	3,082	
Pennsylvania	4,088	2,571	1,945	2,377	
Ohio	3,207	1,809	1,915	2,026	
North Carolina	2,786	3,170	2,458	1,988	
Georgia	2,583	1,709	1,730	1,840	
Virginia	3,291	2,575	1,539	1,770	
Washington	678	0	0	1,540	<--higher
Illinois	2,082	1,631	1,420	1,348	
Kentucky	2,328	1,708	723	1,241	
Massachusetts	1,593	1,882	1,573	1,226	
Arizona	4,381	1,947	1,338	1,132	
Tennessee	1,636	1,347	1,143	962	
South Carolina	1,739	3,197	1,358	913	
Alabama	1,318	1,075	674	883	
Indiana	1,130	1,218	777	878	
Michigan	563	0	1,265	775	<--higher
Mississippi	656	1,093	544	734	
Colorado	934	853	533	668	
Wisconsin	681	503	405	624	
Utah	918	710	462	591	
Connecticut	869	0	2,905	580	
Maryland	976	847	722	516	
Oklahoma	1,070	1,266	730	508	
Missouri	649	489	421	481	

Sorted
7D Ago Last 3-day Trend

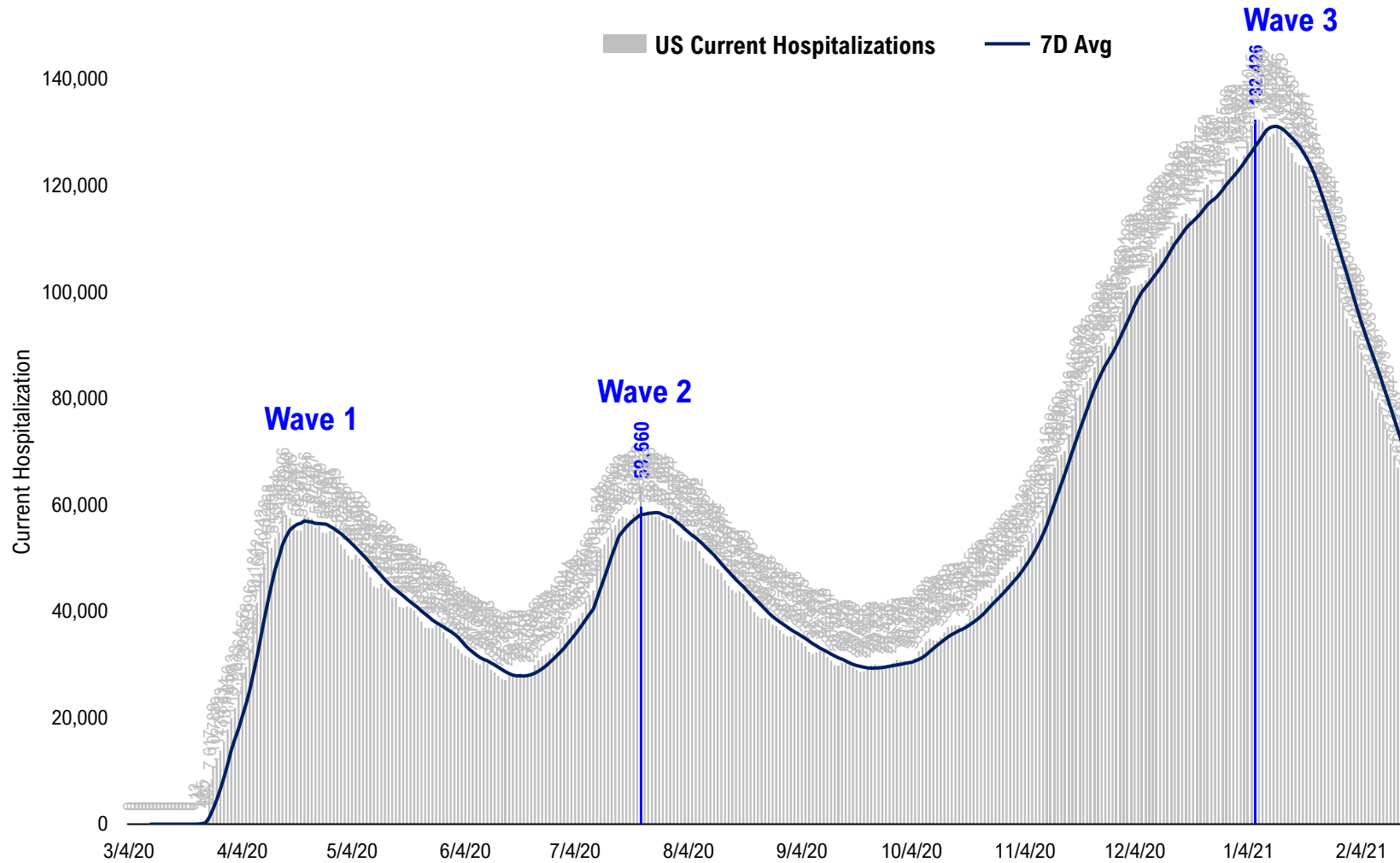
LA did not update its COVID dashboard in observance of Mardi Gras...

	2/9/21	2/14/21	2/15/21	2/16/21	vs 7D ago
United States	84,965	68,039	52,919	55,891	-29,074
States:					
Idaho	437	0	0	462	
Alaska	115	0	0	454	<--higher
Puerto Rico	189	269	203	452	<--higher
Minnesota	572	776	602	452	
Oregon	513	247	183	411	
New Mexico	413	282	190	299	
Iowa	405	355	214	292	
Nevada	546	512	391	290	
Rhode Island	330	320	203	285	
West Virginia	416	306	301	228	
South Dakota	122	110	61	217	<--higher
Wyoming	46	50	0	215	<--higher
New Hampshire	419	280	232	198	
North Dakota	99	46	46	138	<--higher
Delaware	279	331	236	130	
District of Columbia	145	122	83	130	
Montana	374	104	138	127	
Nebraska	344	209	92	119	
Arkansas	820	433	271	94	
Maine	211	110	148	91	
Vermont	59	116	185	55	
Hawaii	31	46	33	17	
Guam	9	3	4	2	
U.S. Virgin Islands	7	0	18	0	
Northern Mariana Islands	0	0	0	0	
Louisiana	1,321	1,312	507	0	
Kansas	0	0	1,348	0	
American Samoa	0	0	0	0	

<--higher - if the state has 20% more daily cases than 7D ago...
Source: Fundstrat, COVID-19 Tracking Project, State Department of Health

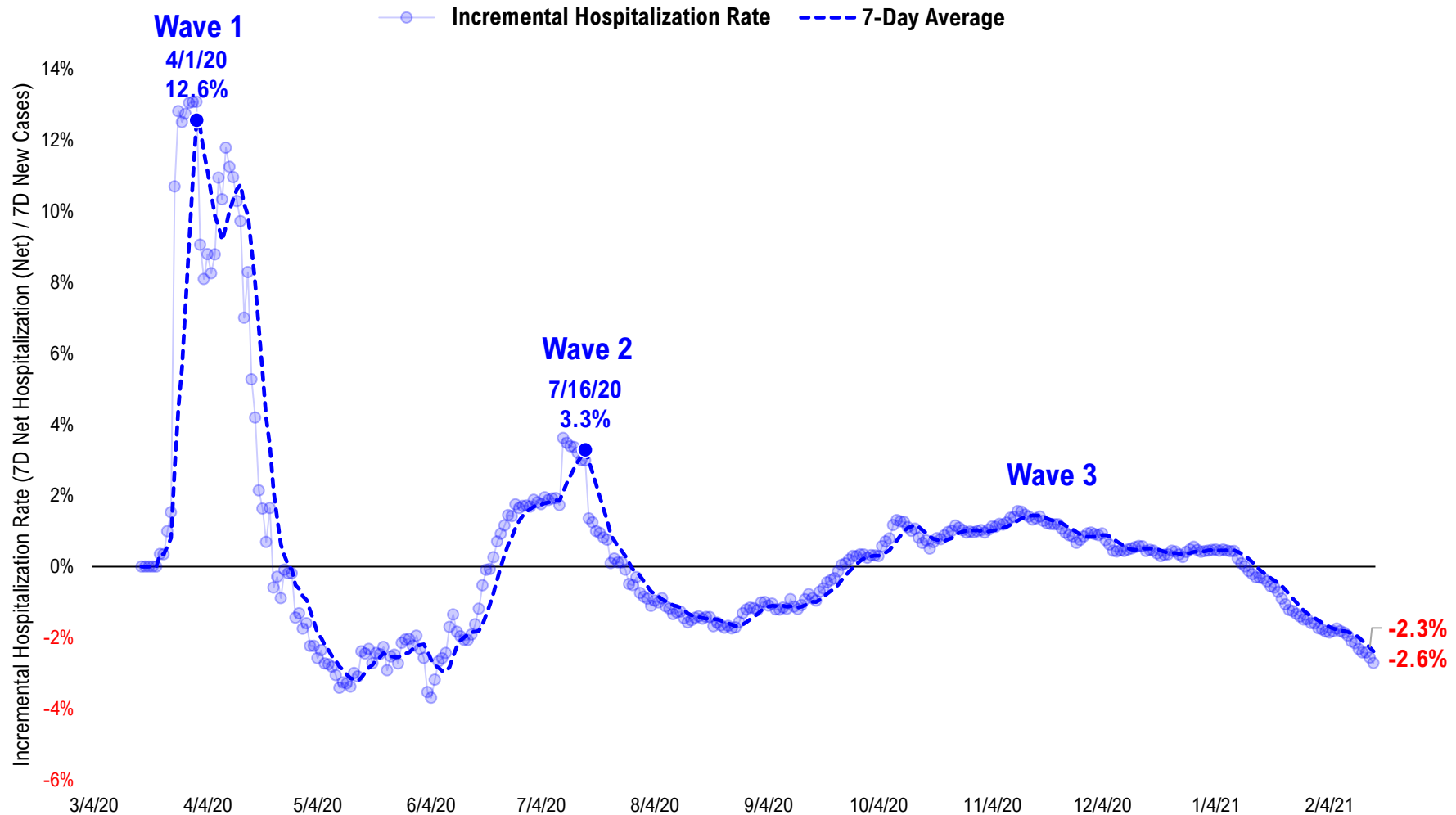
#8: US Daily Hospitalizations...

US Net Hospitalizations (aggregate of 50 states + Washington, D.C.)



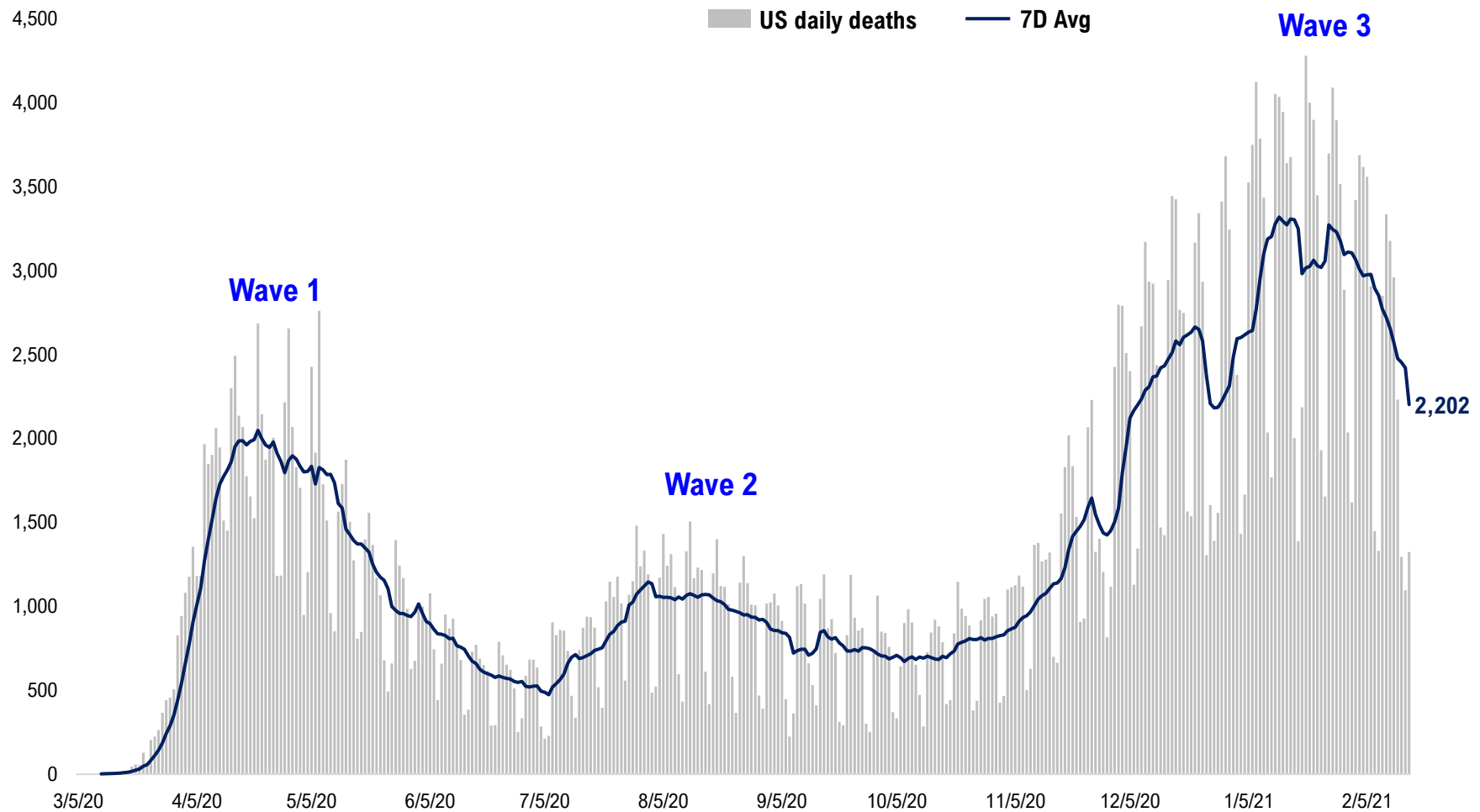
#9: Incremental Hospitalization Rate...

Incremental Hospitalization Rate: 7D Net Hospitalizations / 7D Total New Cases
(aggregate of 50 states + Washington, D.C.)



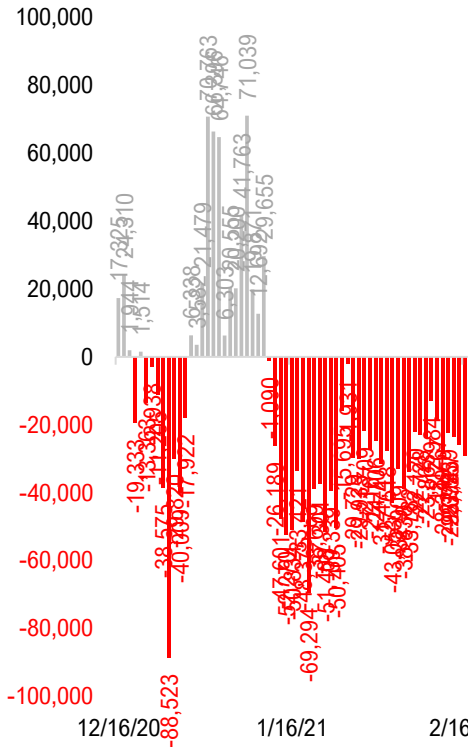
#10: US Daily New Fatalities...

US daily COVID-19 Fatalities

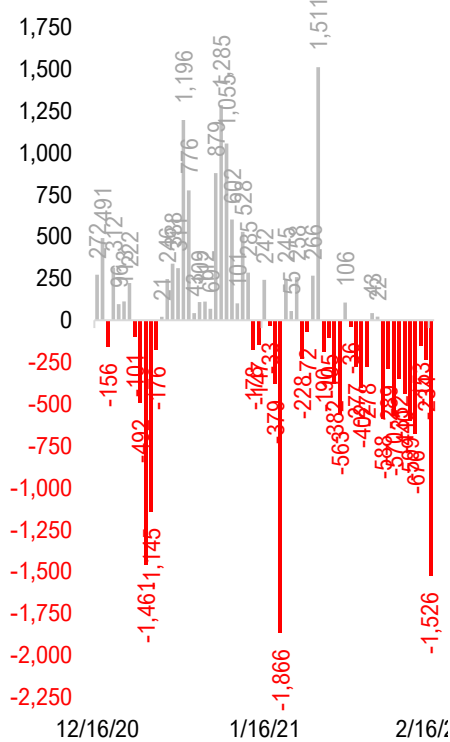


#11: Rolling 7-Day Change in the Key Metrics... (Past 8 Weeks)

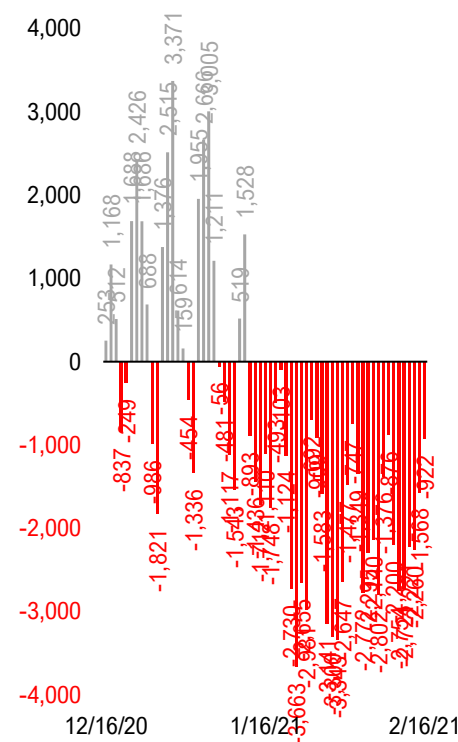
Daily New Cases
(8/10-8/23 ex-CA; 9/4-9/5 ex-IL)



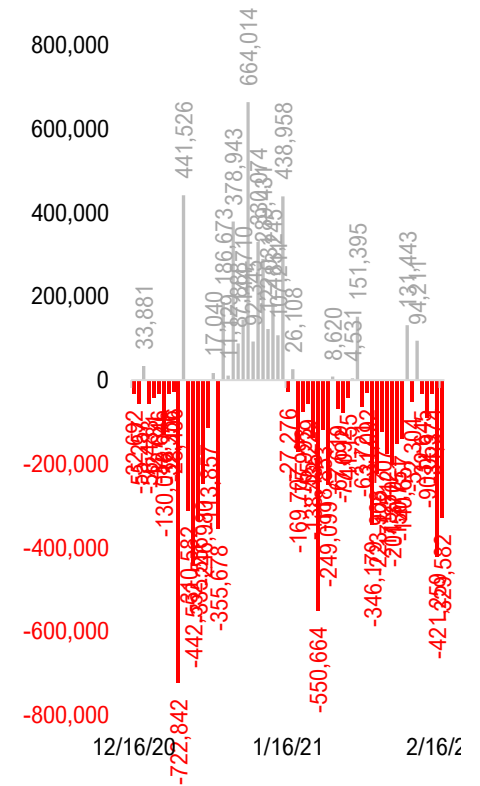
Daily Deaths



Daily Net Hospitalization
(Red = more discharge than admission)

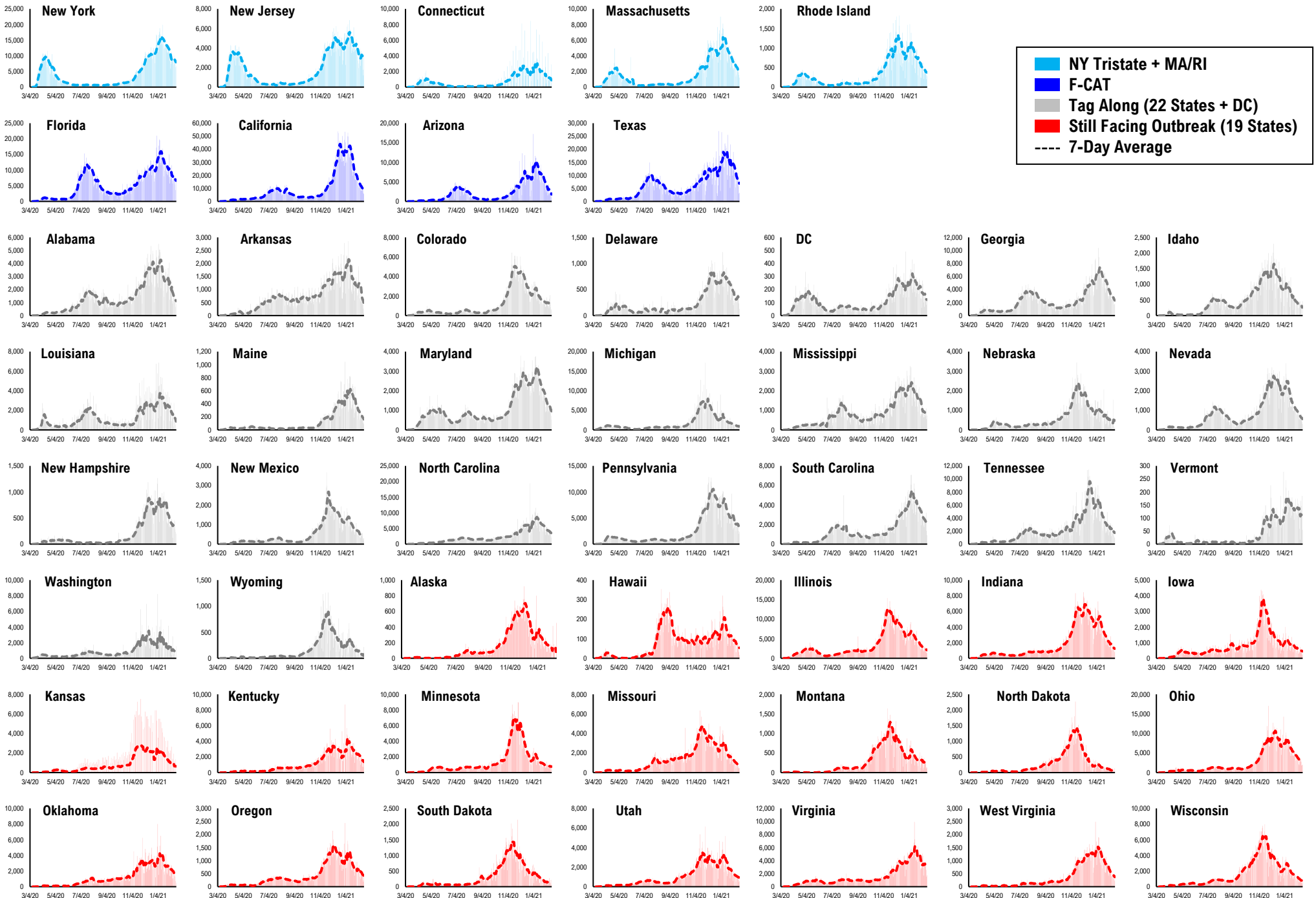


Daily Tests

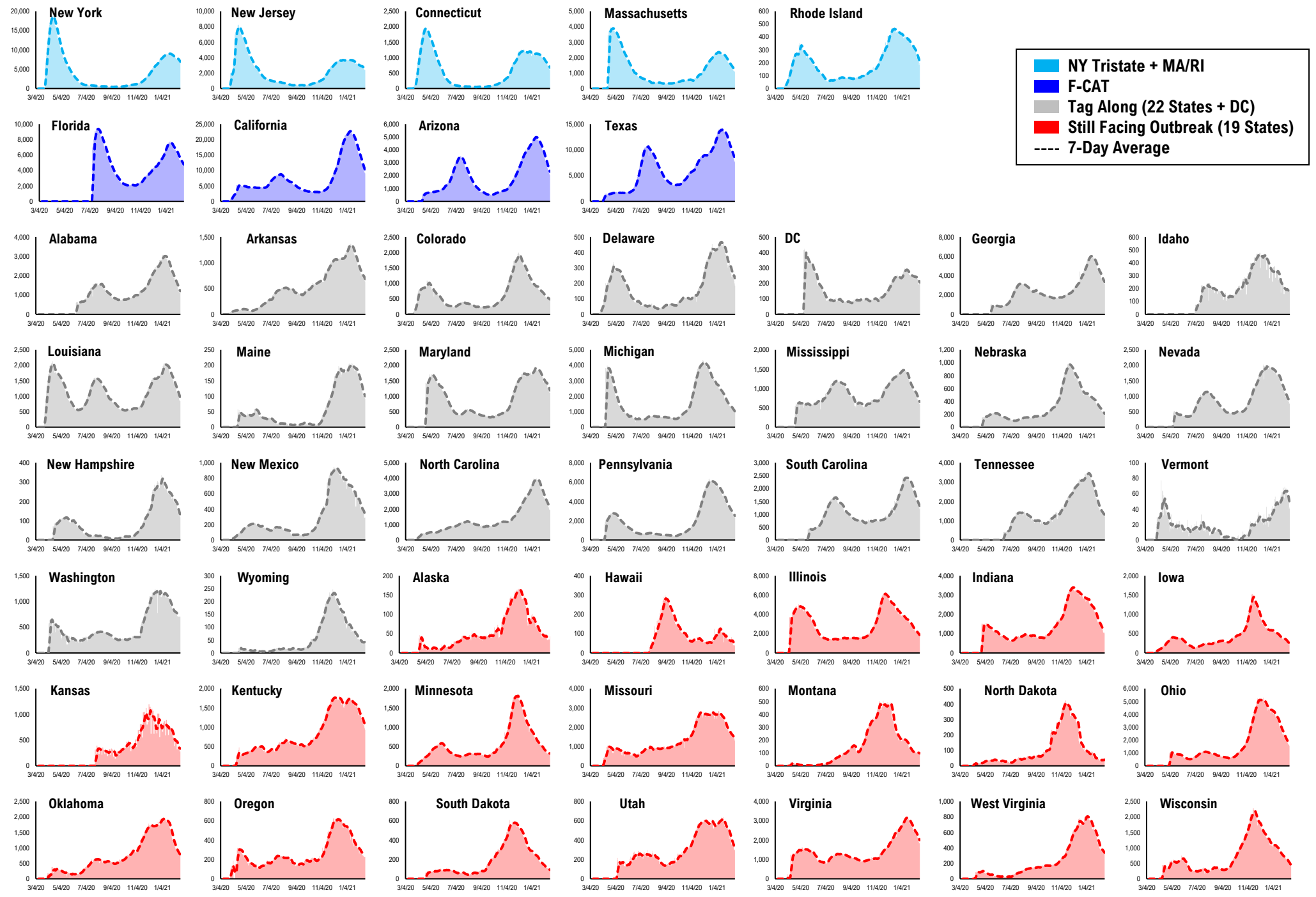


* Ignored California between 8/10 and 8/23, due to its data glitch caused 300,000-case backlog
Source: Fundstrat, COVID-19 Tracking Project, State Department of Health

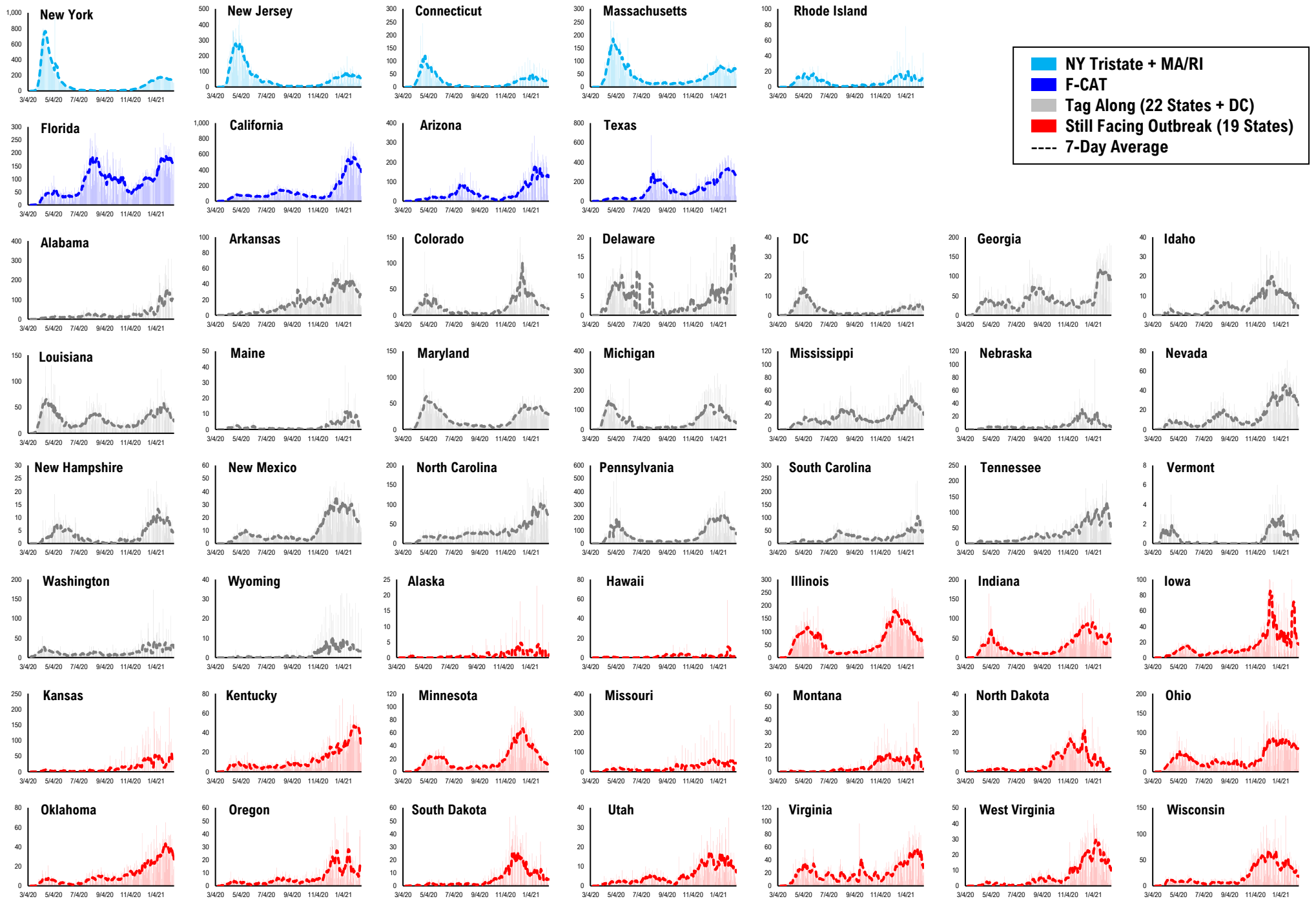
#12: Daily New Cases by States...



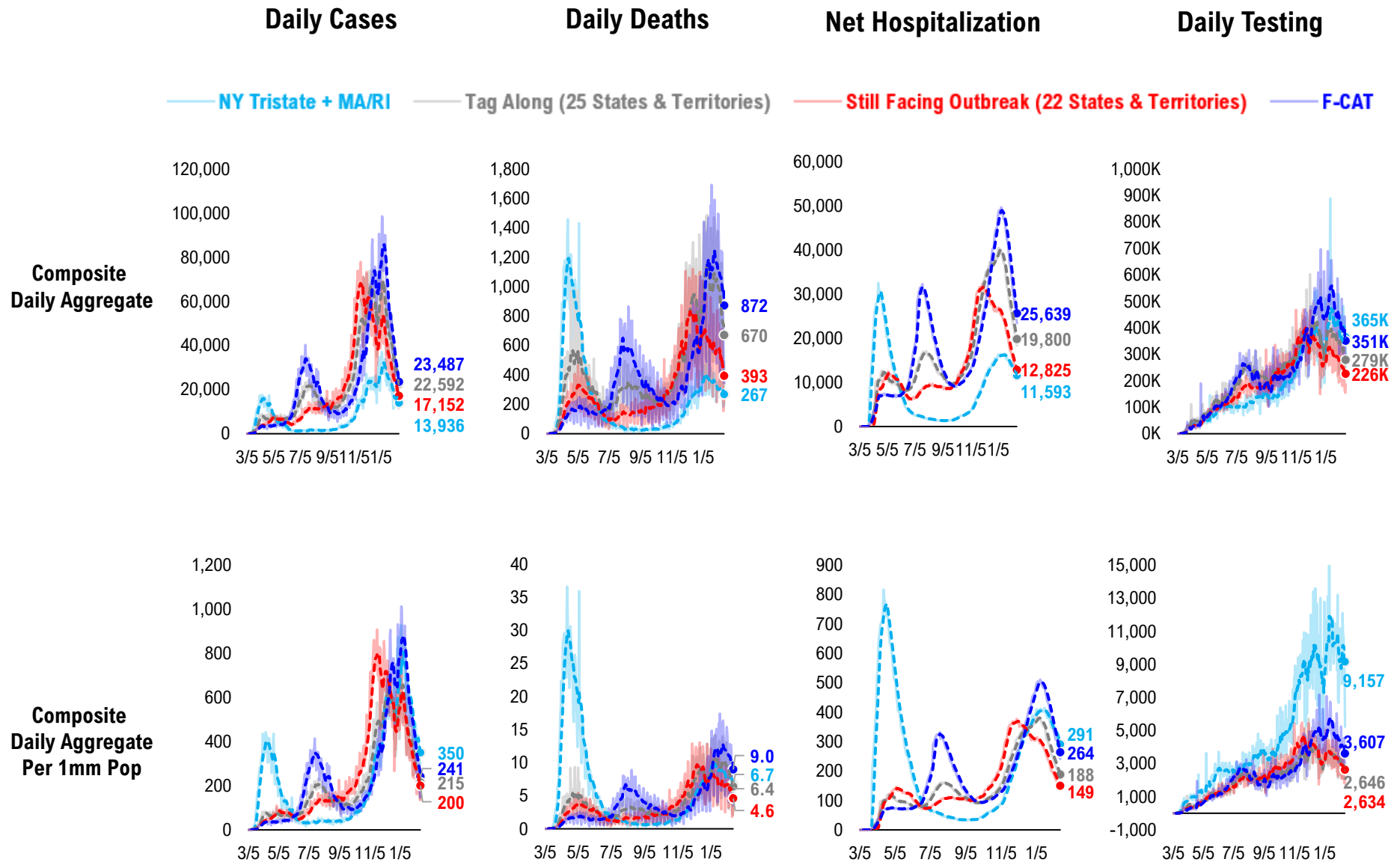
#13: Current Hospitalizations by States...



#14: Daily New Deaths by States...

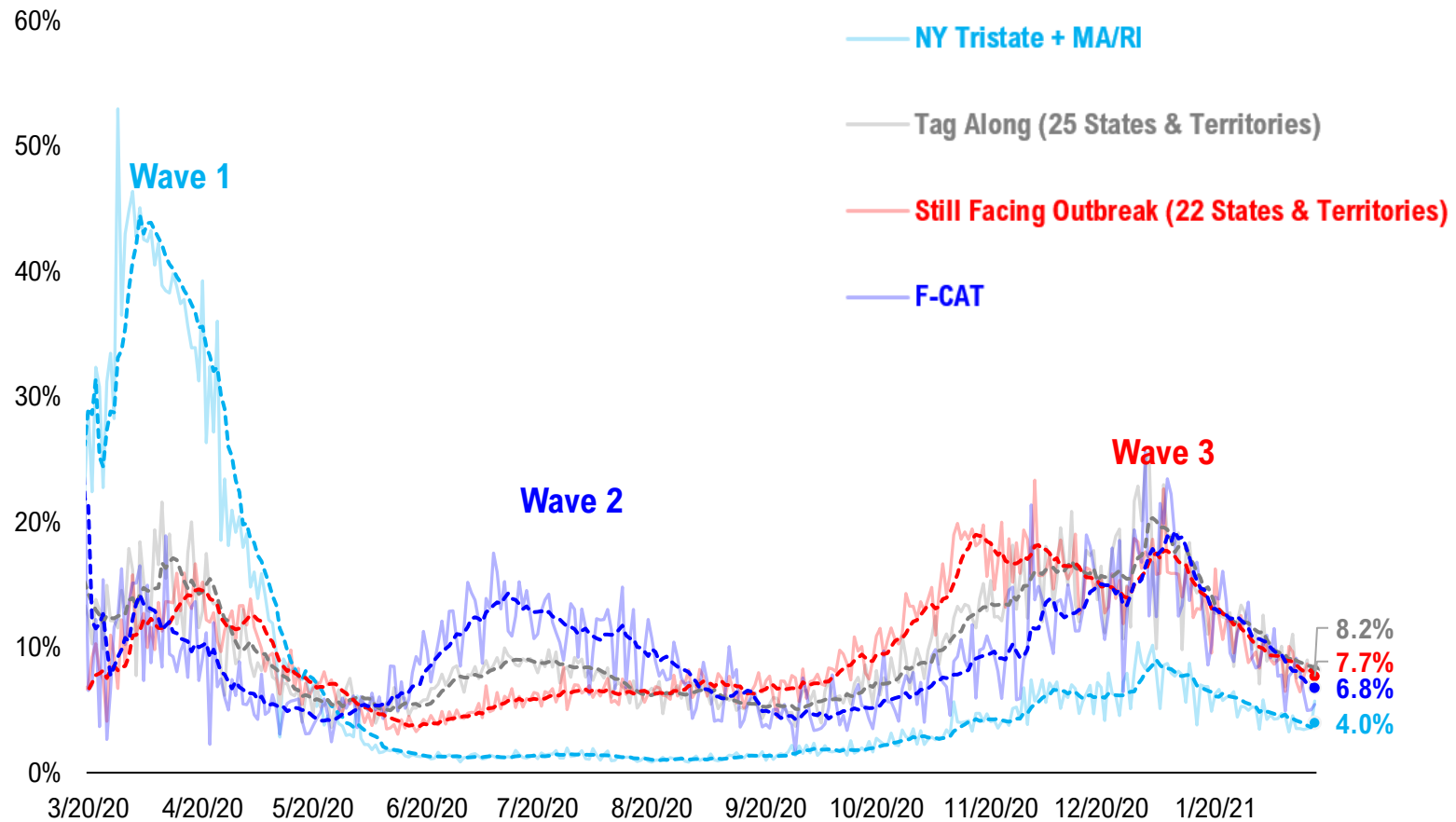


#15: State COVID-19 situation by Tier...

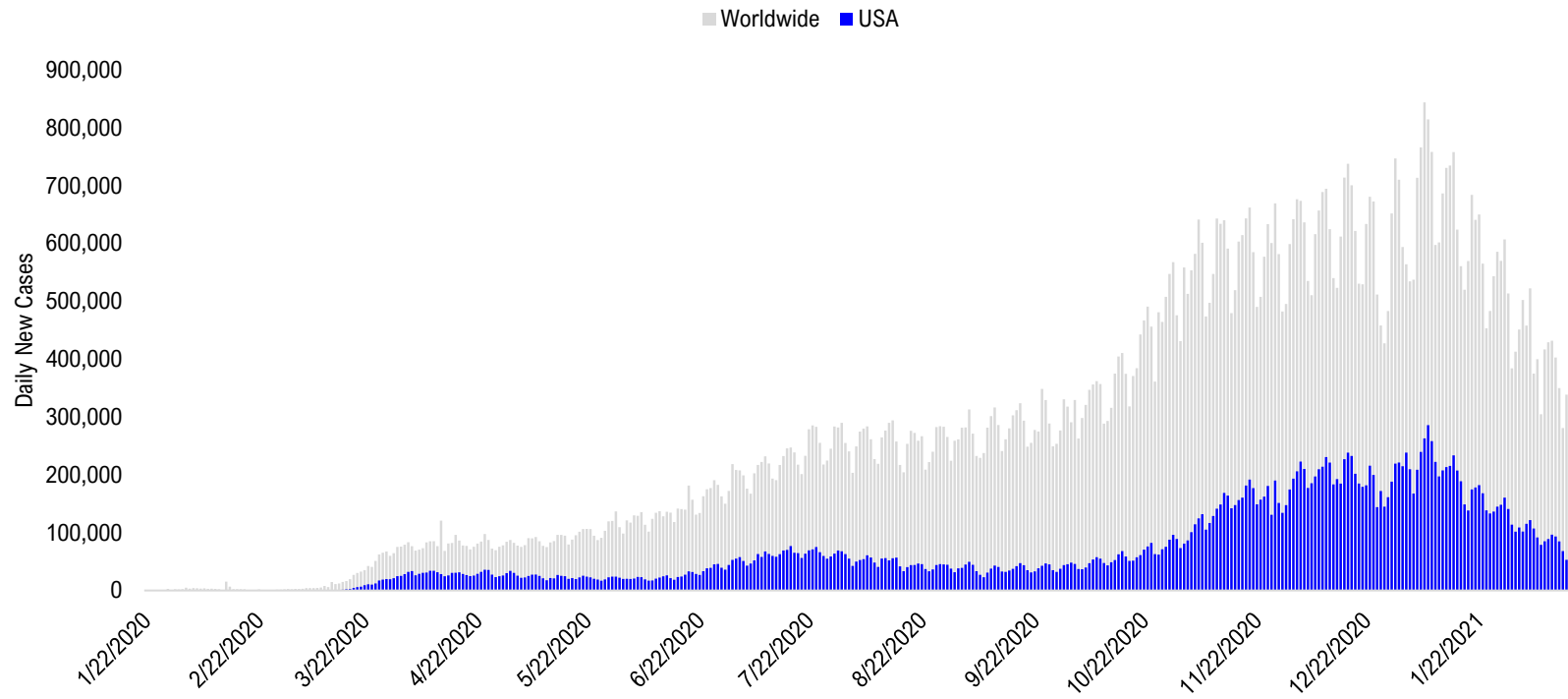


#16: State COVID-19 Daily Positivity Rate by Tier...

Composite Daily Positivity Rate



#17: Global COVID-19 Situation at a Glance...



	Oct 2	Oct 16	Oct 30	Nov 13	Nov 27	Dec 11	Dec 25	Jan 8	Jan 22	Feb 5	Feb 15
Pakistan + India + Bangladesh	84,614	Europe 156,734	Europe 288,225	Europe 301,978	Europe 274,576	Europe 268,935	Europe 249,312	Europe 303,170	Europe 242,053	Europe 189,715	Europe 120,304
Europe	77,884	Latin America 67,981	US + Canada 89,511	US + Canada 157,595	US + Canada 172,703	US + Canada 224,650	US + Canada 191,593	US + Canada 271,266	US + Canada 184,142	US + Canada 116,667	US + Canada 71,177
Latin America	61,009	Pakistan + India + Bangladesh 66,697	Latin America 65,614	Latin America 74,232	Latin America 79,197	Latin America 92,545	Latin America 89,576	Latin America 132,508	Latin America 134,579	Latin America 108,267	Latin America 68,960
US + Canada	47,741	US + Canada 63,472	Pakistan + India + Bangladesh 51,456	Pakistan + India + Bangladesh 49,697	Pakistan + India + Bangladesh 48,359	Pakistan + India + Bangladesh 35,248	Pakistan + India + Bangladesh 26,828	Africa 35,216	Asia ex-India+Pakistan 27,748	Asia ex-India+Pakistan 23,452	Asia ex-India+Pakistan 15,738
Asia ex-India+Pakistan	11,658	Asia ex-India+Pakistan 13,790	Asia ex-India+Pakistan 12,846	Africa 14,813	Asia ex-India+Pakistan 16,287	Africa 19,182	Africa 26,119	Asia ex-India+Pakistan 24,781	Africa 27,183	Africa 15,791	Pakistan + India + Bangladesh 12,160
Africa	8,147	Africa 10,431	Africa 12,181	Asia ex-India+Pakistan 14,319	Africa 14,870	Asia ex-India+Pakistan 17,917	Asia ex-India+Pakistan 18,682	Pakistan + India + Bangladesh 16,059	Pakistan + India + Bangladesh 17,313	Pakistan + India + Bangladesh 14,158	Africa 10,221

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