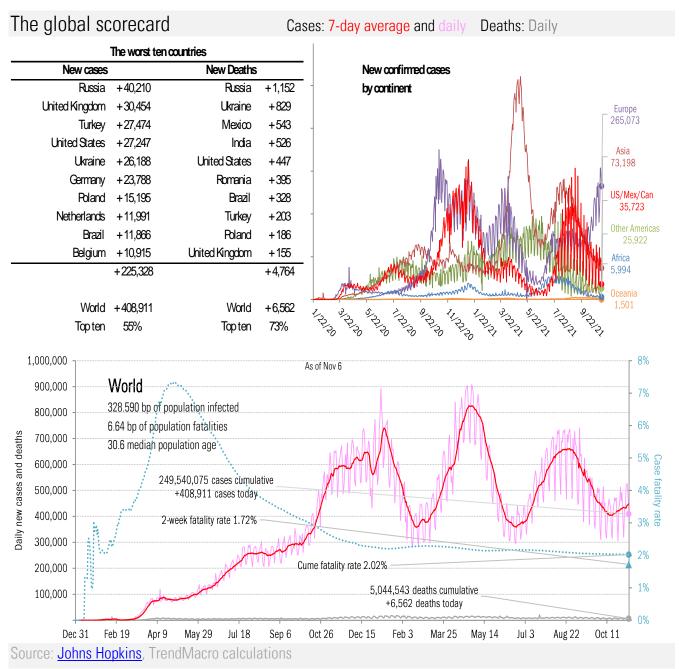


Trend Macrolytics, LLC Donald Luskin, Chief Investment Officer Thomas Demas, Managing Director Michael Warren, Energy Strategist

Data Insights: Covid-2019 Monitor

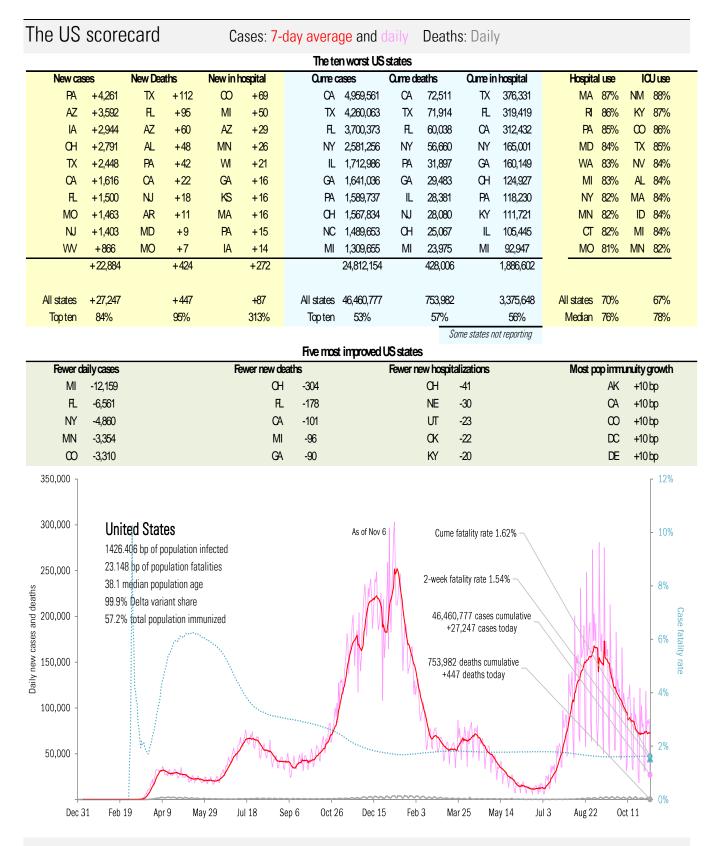
Sunday, November 7, 2021



For more information contact us:

Donald Luskin: 312 273 6766 don@trendmacro.com Thomas Demas: 704 552 3625 tdemas@trendmacro.com

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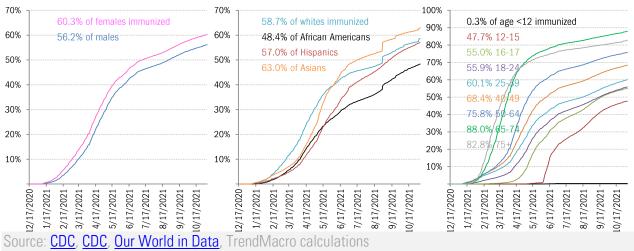


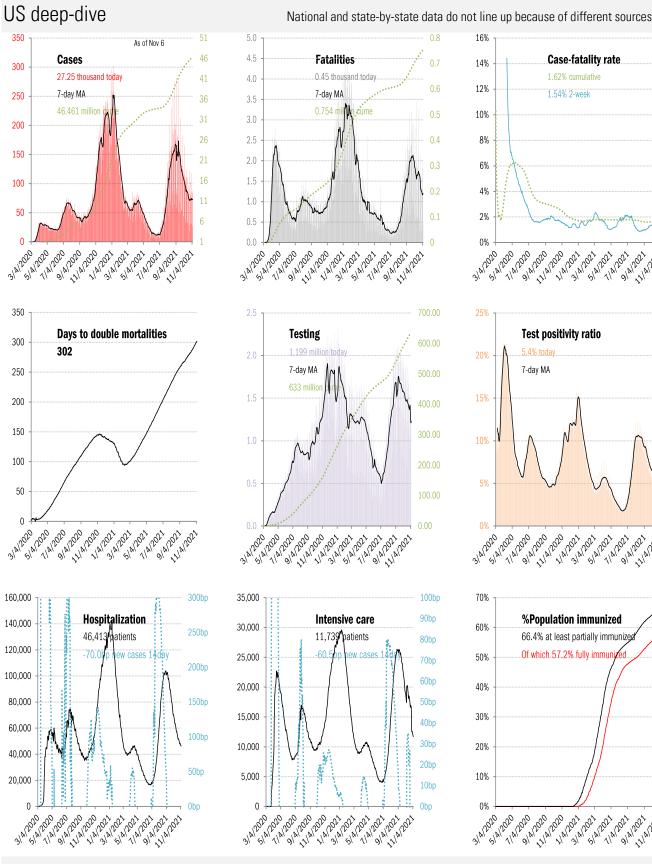
Source: Johns Hopkins, Dept. of Health and Human Services, CDC, TrendMacro calculations

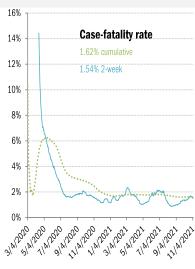
Rolling out the vaccines in the US and the world												
<u> </u>			Ilative						day	Immunity	Full	Partial
Doses 441,417,569							+1.476	million	US	57.2%	66.4%	
Boosters		23,575,723						+0.924	million	UK	67.2%	73.6%
		One	dose	% Pop Ir		nune	% рор	New immune today		France	68.2%	76.0%
Total population		22	28,948,445	69%		98,649,207	59% 50%	+0.205	million	Spain	80.0%	81.5%
Age 12 to 17		,	14,264,051	60%		11,985,747		+0.015 million		Germany	66.5%	69.1%
Age 18 to 64		158,063,318		78%	1:	37,232,634	67%	+0.149 million		ltaly	72.0%	77.4%
Age 65 and over		55,456,513		101%		48,504,390	89%	+0.040 million		Australia	66.8%	74.8%
٢٦٢						Every Am	erican >18	3 immuniz	ed in	Israel	65.3%	71.0%
4%				Best 42 da			dav	ays		Canada	74.8%	78.6%
		C+	ata				udy			Japan	73.4%	78.1%
Moderna		State		Dest	-	by Dec 1	8, 2021			Africa	6.2%	9.2%
38%	Pfizer	At least part	At least partial immunity		71.9		6 of population >18 immuniz		nized	India	24.4%	53.1%
	58%	as % population		Middle 16.6% pre			eviously tested positive			Brazil	57.8%	75.8%
		Full immunity		88.5%			vs 60% adult herd immunity			China	74.3%	80.0%
AK		as % population		Wors	st					Global data differ	s due to source	s, timing
59.9%				WI			As of Nov 6			ME		
53.0%				63.1%					77.5%			
						58.6%					71.0%	
	WA	ID	MT	ND	MN	IL	MI		NY	VT	NH	
	69.9%	49.5%	57.4%	55.5%	65.7%	66.2%	58.6%		74.9%	80.3%	78.5%	
	63.9%	44.2%	50.8%	47.8%	61.5%	60.8%	53.7%		67.1%	71.6%	63.3%	
	OR	NV	WY	SD	IA	IN	OH	PA	NJ	MA		-
	68.8%	63.8%	51.4%	62.9%	60.1%	54.1%	56.1%	79.4%	75.6%	80.9%		
	63.2%	53.3%	44.4%	53.3%	55.8%	50.0%	52.1%	61.0%	66.7%	70.0%		_
	CA	UT	CO	NE	MO	KY	WV	VA	MD	CT	RI	
	75.1%	61.6%	68.1%	61.4%	57.2%	57.9%	49.1%	71.7%	73.3%	79.8%	78.8%	
	61.7%	54.1%	62.0%	56.5%	50.0%	51.0%	41.1%	63.5%	66.2%	71.0%	71.3%	
-		AZ	NM	KS	AR	TN	NC	SC	DC	DE		-
		61.6%	72.7%	63.1%	58.4%	54.9%	65.3%	58.0%	75.9%	69.5%		
		53.4%	62.4%	53.5%	48.3%	48.0%	53.1%	50.3%	63.0%	60.2%		
				OK	LA	MS	AL	GA				
				60.1%	54.1%	52.4%	54.9%	57.3%				
HI				50.4%	47.9%	46.0%	45.0%	48.6%		_		_
79.4%				TX					FL		PR	
60.1%				61.7%					69.5%		82.5%	
				53.6%					60.0%		73.8%	
					-			I		- •		-

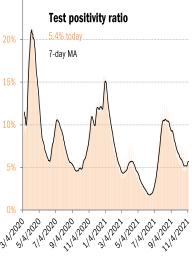
ما بر بر ain a a in the LIC ما لد ام ام ا م

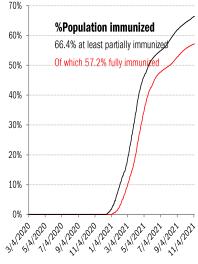
The demographics of US vaccination



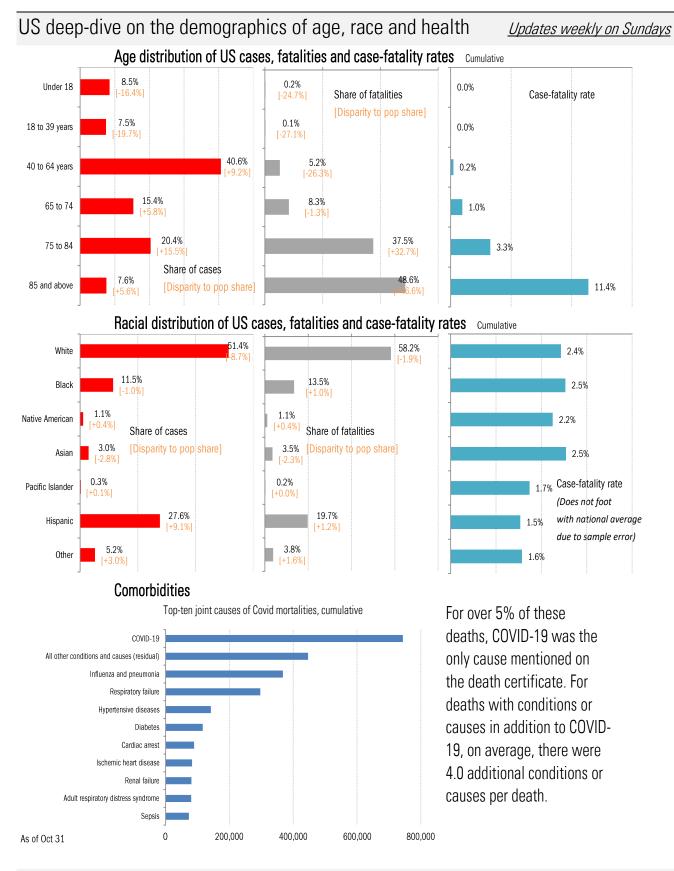








Source: Johns Hopkins, Covid Act Now, TrendMacro calculations



Source: Distributions <u>CDC</u>, Comorbidities <u>CDC</u>, TrendMacro calculations

Recommended reading

An vaccinated woman refuses to sit next to an unvaccinated passenger on a plane *BitChute* November 3, 2021

<u>Queues, Covid and confused messaging plague</u> <u>COP26</u> Pilita Clark *Financial Times* November 5, 2021

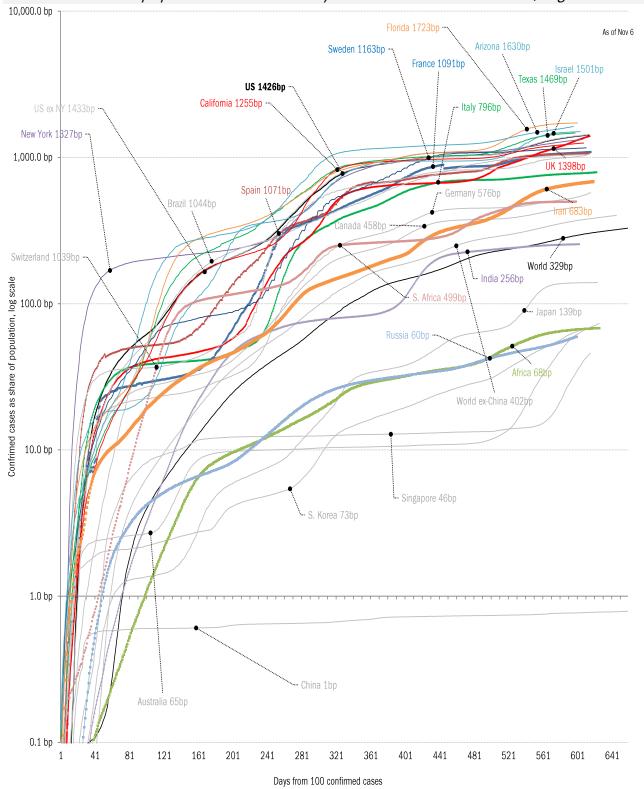
Meme of the day



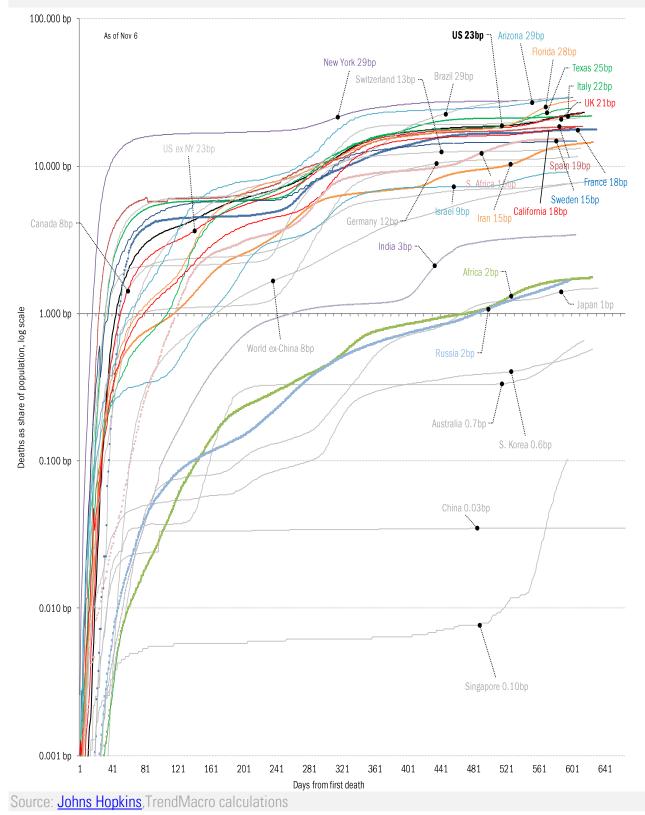
The Babylon Bee 📀 @TheBabylonBee · 12h ···· Pfizer Claims Vaccine Will Reduce Average Daily Child COVID Deaths From Almost Zero To Almost Zero



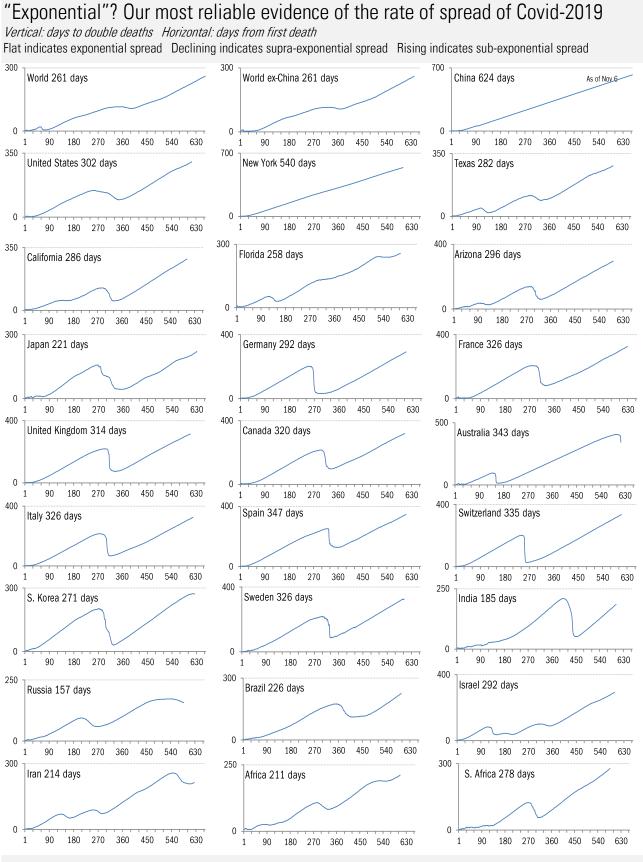
Source: Our beloved clients, Power Line blog "The Week in Pictures" and CTUP



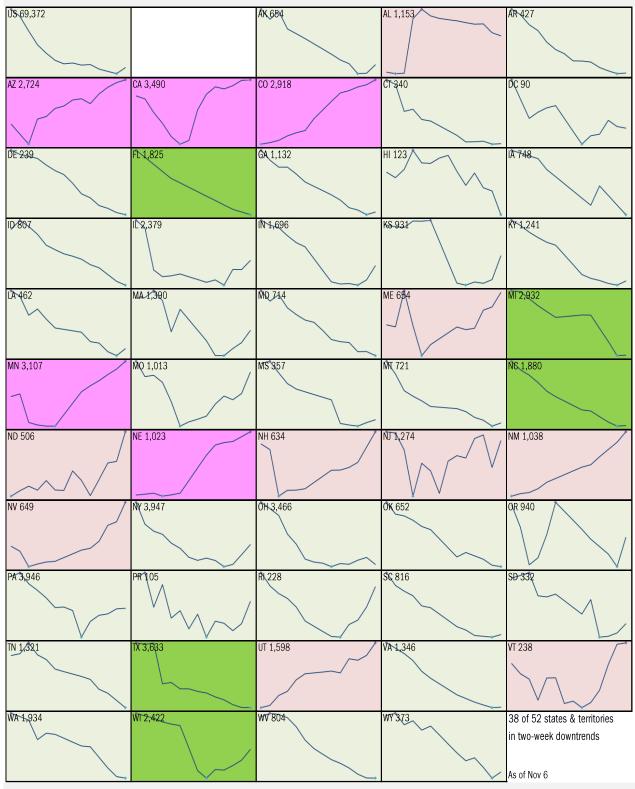
The coronavirus <u>case</u> accelerometer... tracking the world's infection curves *Share of infected population from first day with 100 confirmed cases, log scale*



The coronavirus <u>mortality</u> accelerometer ... tracking the world's fatality curves *Share of deceased population from day of first fatality, log scale*

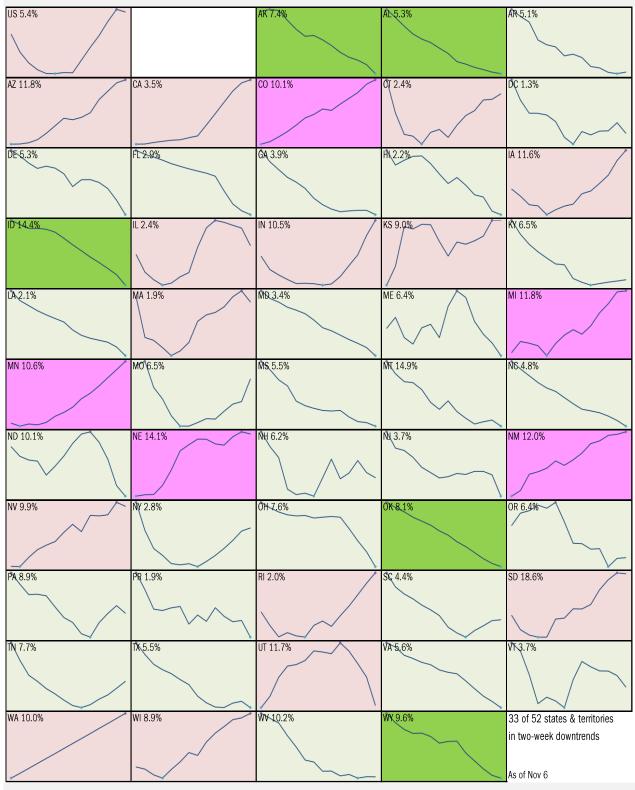


Requirement to <u>Open Up America Again</u>: 14-day "downward trajectory" in new cases *14-day moving average, last 14 days Most recent value displayed* • High • Low Downward trajectory Five best Upward trajectory Five worst



Source: Johns Hopkins, TrendMacro calculations

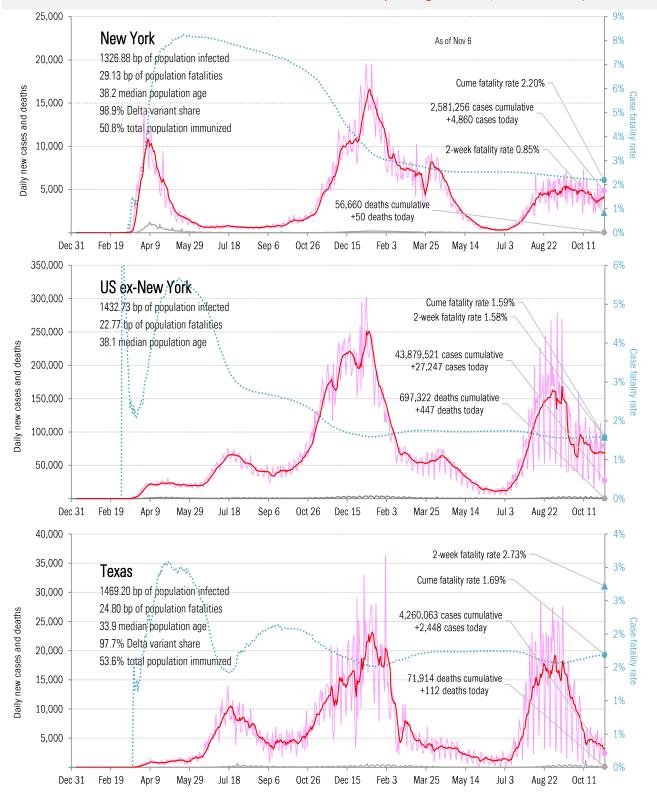
Alt requirement to <u>Open Up America Again</u>: 14-day "downward trajectory" in pos tests *14-day moving average, last 14 days Most recent value displayed* • High • Low Downward trajectory Five best Upward trajectory Five worst



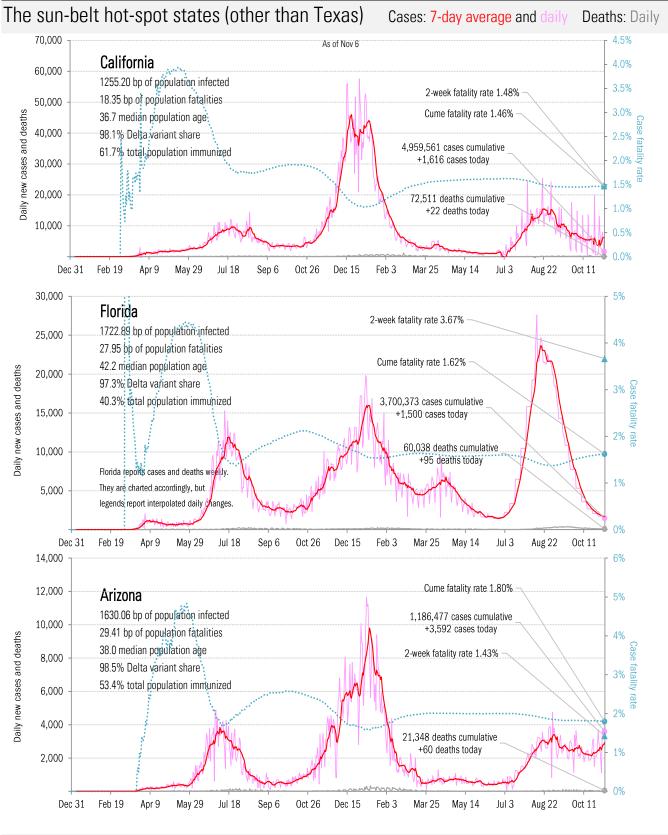
Source: Covid Act Now, TrendMacro calculations

From Ground Zero to the Rio Grande

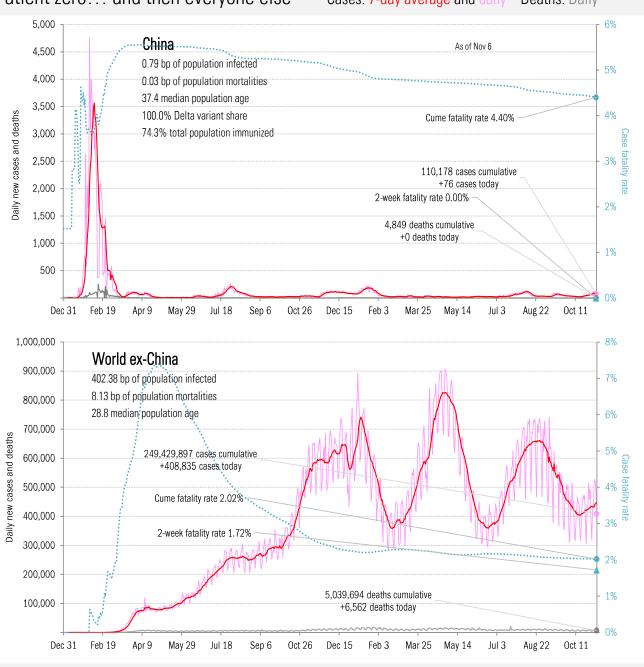
Cases: 7-day average and daily Deaths: Daily



Source: Johns Hopkins, TrendMacro calculations



Source: Johns Hopkins, TrendMacro calculations

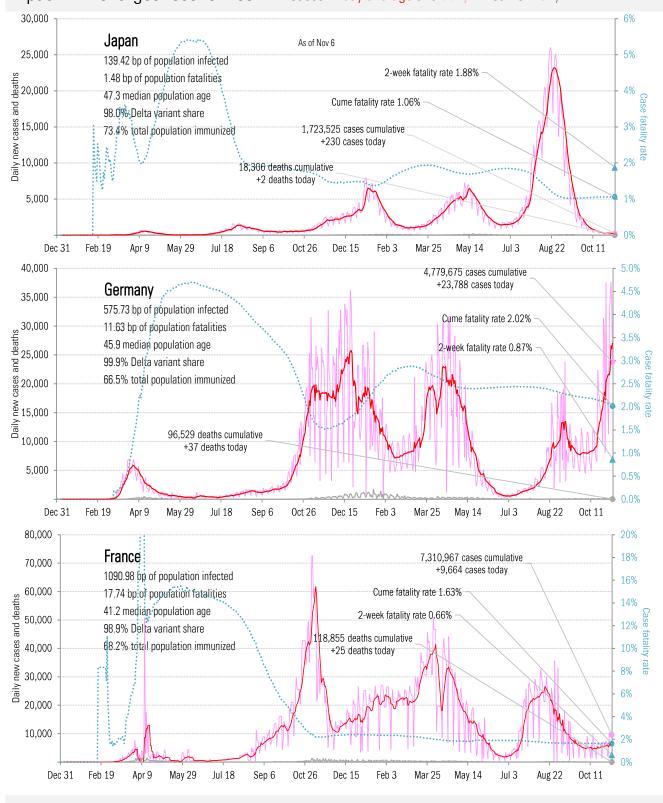


Patient zero... and then everyone else

Cases: 7-day average and daily Deaths: Daily

Source: Johns Hopkins, TrendMacro calculations

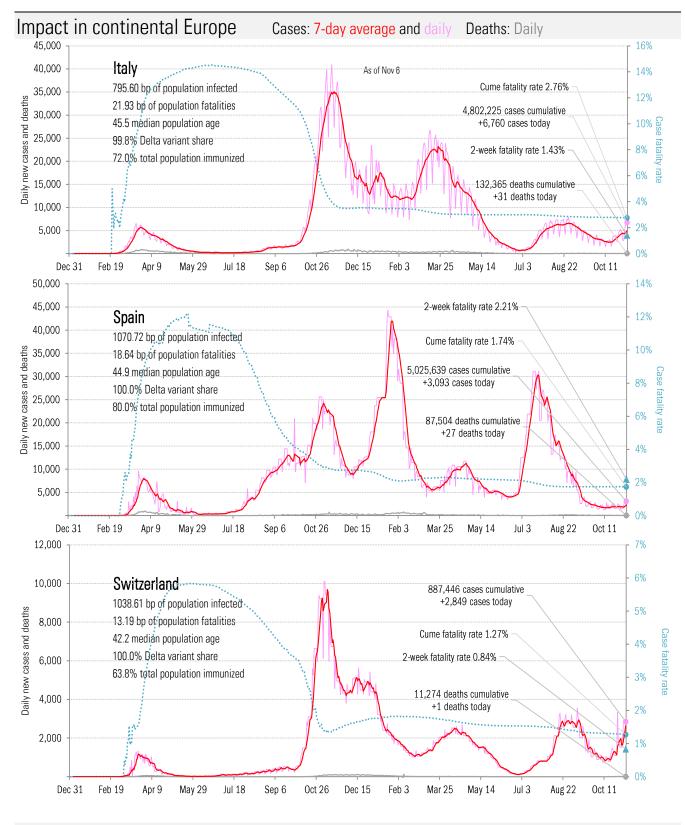
Impact in the largest economies Cases: 7-day average and daily Deaths: Daily

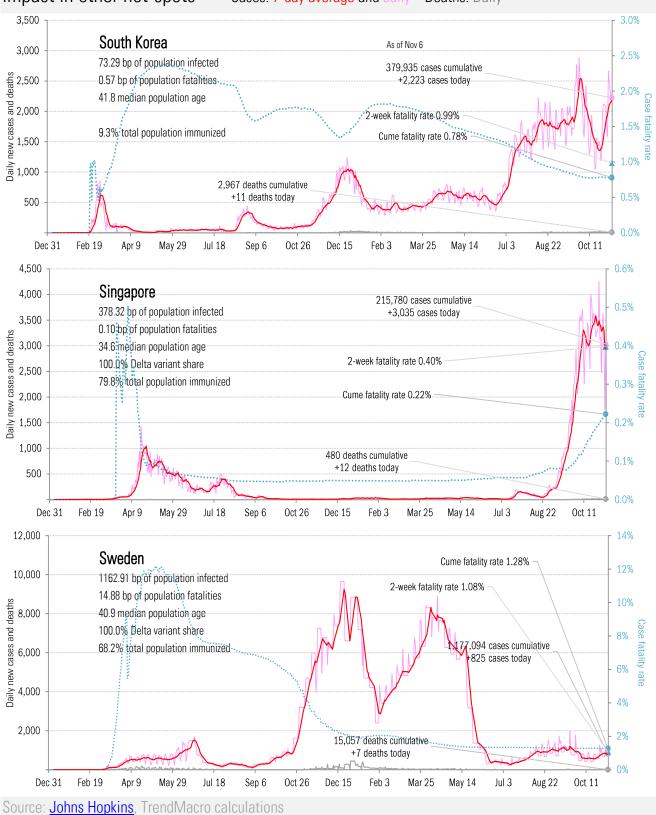


Source: Johns Hopkins, TrendMacro calculations

80,000 18% United Kingdom 16% 70,000 As of Nov 6 1397.97 bp of population infected strap pure set 60,000 50,000 \$80 Met 20,000 30,000 14% 9,317,072 cases cumulative 21.33 bp of population fatalities +30,454 cases today 12% 40.5 median population age 100.0% Delta variant share 10% fatality Cume fatality rate 1.53% 67.2% total population immunized 8% rate 2-week fatality rate 0.37% 6% Alia 20,000 4% 142,174 deaths cumulative +155 deaths today 10,000 2% 0% Apr 9 Dec 31 Feb 19 May 29 Jul 18 Sep 6 Oct 26 Dec 15 Feb 3 Mar 25 May 14 Jul 3 Aug 22 Oct 11 12,000 9.0% Canada 8.0% Cume fatality rate 1.68% 10,000 458.44 bp of population infected 7.0% 7.70 bp of population fatalities 2-week fatality rate 1.00% Daily new cases and deaths 8,000 6.0% 40.8 median population age 100.0% Delta variant share 5.0% 1,737,252 cases cumulative 6,000 74.8% total population immunized +1,288 cases today 4.0% 4,000 3.0% 2.0% 2,000 29,192 deaths cumulative 1.0% +7 deaths today 0.0% May 29 Jul 18 Dec 31 Feb 19 Apr 9 Sep 6 Oct 26 Dec 15 Feb 3 Mar 25 May 14 Jul 3 Aug 22 Oct 11 3,000 4.5% Australia 4.0% 180,314 cases cumulative 2,500 65:18 bp of population infected +1,387 cases today 3.5% 0.66 bp of population fatalities Daily new cases and deaths 2,000 379 median population age 100.0% Delta variant share 2.5% Cume fatality rate 1.01% 1,500 66.8% total population immunized 2.0% 2-week fatality rate 0.57% 1,000 1.5% 1.0% 500 1,815 deaths cumulative +10 deaths today 0.5% 0.0% Apr 9 Aug 22 Dec 31 Feb 19 May 29 Jul 18 Sep 6 Oct 26 Dec 15 Feb 3 Mar 25 May 14 Jul 3 Oct 11



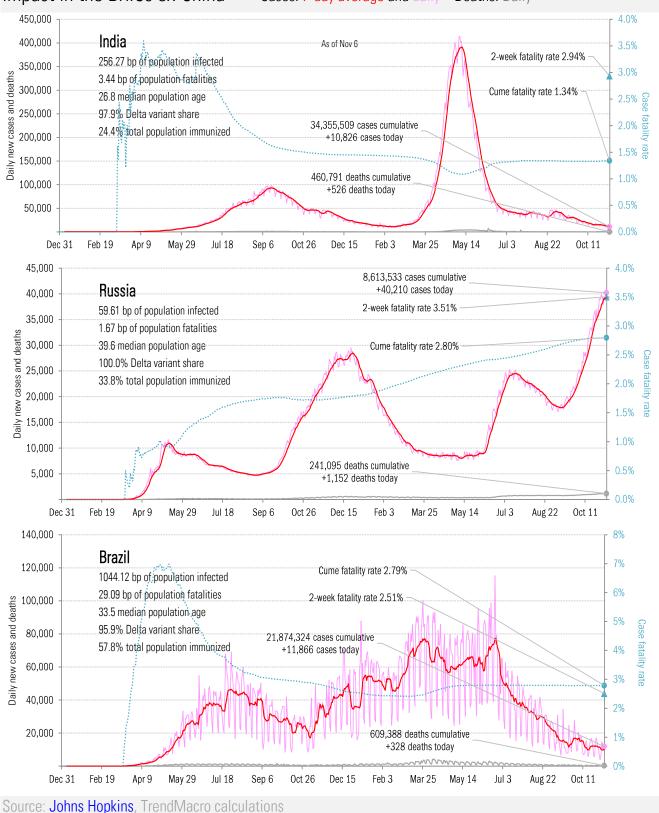




Impact in other hot-spots Cases: 7-day average and daily Deaths: Daily

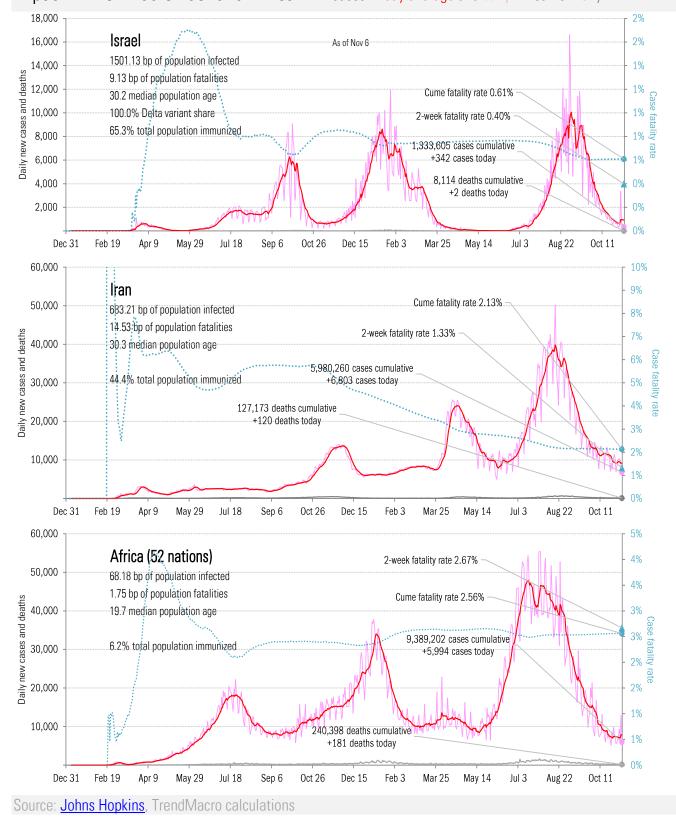
18

Impact in the BRICs ex-China Cases: 7-day average and daily Deaths: Daily

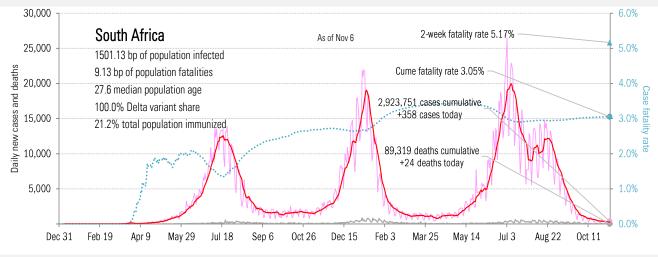


Impact in the Middle East and Africa

Cases: 7-day average and daily Deaths: Daily







Source: Johns Hopkins, TrendMacro calculations