Wuhan Pandemic in 3 Parts

CASF Presentation
April 17, 2021
By Bernie McCune

Quick Review of Part 1 Sept 2020 Presentation

- In Part 1 there was a large section giving an introduction to some famous historical viruses - read it again if you wish and read the paper by Matt Ridley that I'm including in the Reading List

- My quick learning experience related to annual flu viruses

- Brief discussion of the spread of the virus and early knowledge of the virus characteristics

- Flattening the curve and misguided early efforts such as extended lockdowns, lack of early treatment and poor quarantine practices

- Use of faulty models, immunity and infectiousness (NM initial R_0 = 2.4 early and then to 2 or less later in the initial period)

Table 1: Estimated influenza disease burden, by age group — United States, 2017-2018 influenza season

	Symptomatic Illnesses		Medical Visits		Hospitalizations		Deaths	
Age group	**Estimate**	**95% Cr UI**	**Estimate**	**95% Cr UI**	**Estimate**	**95% Cr UI**	**Estimate**	**95% Cr UI**
0-4 yrs	3,678,342	(2,563,438 -7,272,693)	2,464,489	(1,695,054 – 4,904,296)	25,644	(17,871 – 50,702)	115	(0 – 367)
5-17 yrs	7,512,601	(5,899,989 – 10,199,144)	3,906,553	(3,002,375 – 5,356,724)	20,599	(16,177 – 27,965)	528	(205 – 1,392)
18-49 yrs	14,428,065	(12,258,820 – 19,396,710)	5,338,384	(4,262,260 -7,333,716)	80,985	(68,809 – 108,874)	2,803	(1,610 – 6,936)
50-64 yrs	13,237,932	(9,400,614 -23,062,957)	5,692,311	(3,895,925 – 10,028,080)	140,385	(99,691 – 244,576)	6,751	(4,244 – 15,863)
65+ yrs	5,945,690	(3,907,025 – 11,786,777)	3,329,586	(2,139,716- 6,623,717)	540,517	(355,184 -1,071,525)	50,903	(35,989 – 83,230)
All ages	44,802,629	(39,322,959 – 57,928,172)	20,731,323	(17,978,392 – 27,248,302)	808,129	(620,768 -1,357,043)	61,099	(46,404 – 94,987)

* Uncertainty interval

Some Better Ways?

- Immunity, testing and past respiratory disease experience (Spanish flu and other more recent flu cases)
- Early determination of the level of Wuhan lethality
- CDC guidance vs. a number of other suggestions (Wittkowski's idea that is the opposite of lockdown)
- Medicines and protocols for early treatment in a home environment that proved to be extremely controversial
- Isolation of the over 65 y.o. population while allowing the younger population (1 to 55 years of age) to go on with their normal living patterns

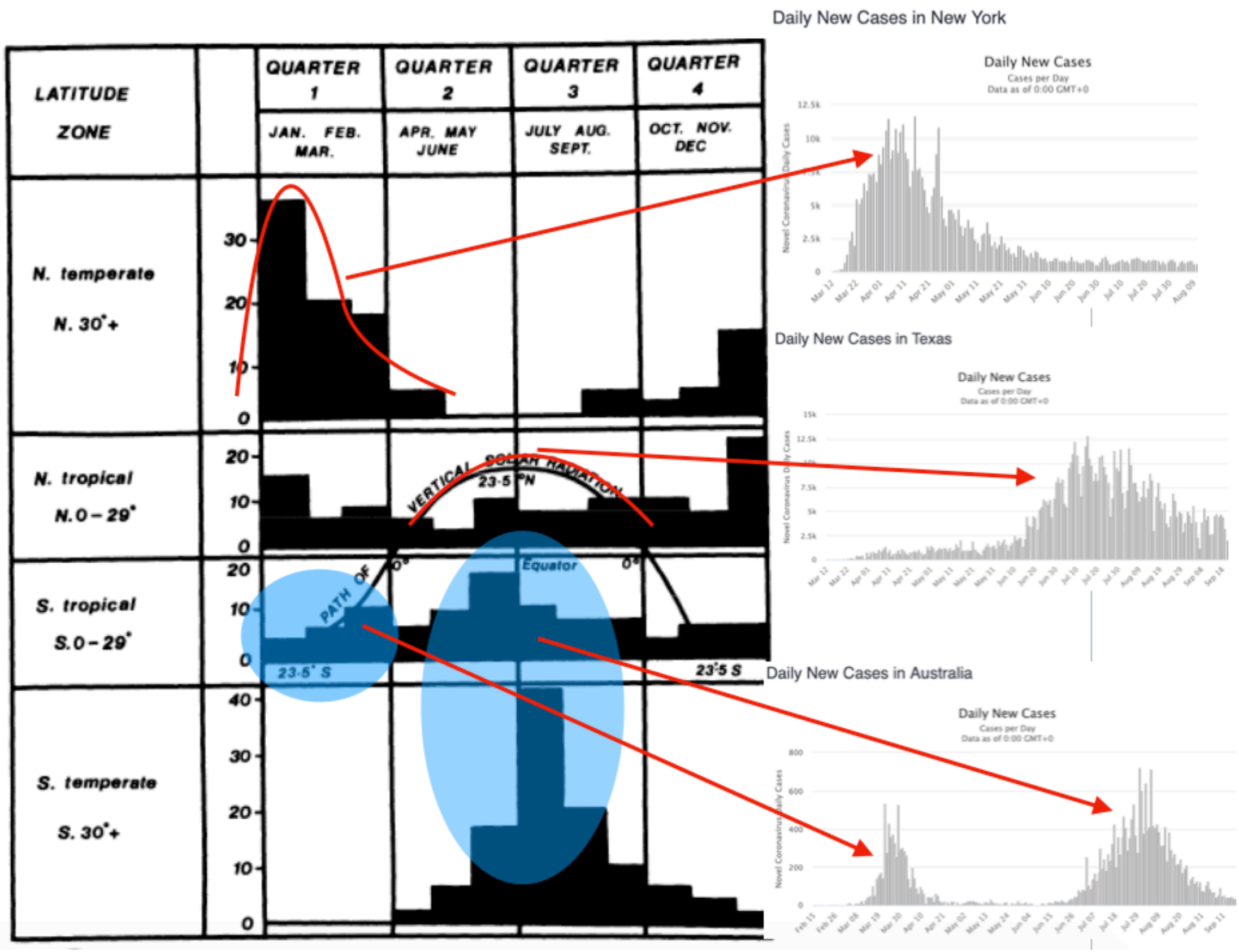
Other bits of wisdom

- R. Edgar Hope-Simpson's seasonal view of flu characteristics as a predictor of future Wuhan activity

- His book published in 1992 is titled "The Transmission of Epidemic Influenza" gives some insight into Covid-19 respiratory disease even though it is not technically a flu

- By late March and early April there was a growing amount of data that could have helped guide Public Health officials to a much better outcome

- Discuss some of the seasonal and regional elements of Hope Simpson even though Wuhan is a corona not a flu virus (season to season severity).


LATITUDE ZONE
QUARTER 1
JAN. FEB. MAR.
QUARTER 2
APR. MAY JUNE
QUARTER 3
JULY AUG. SEPT.
QUARTER 4
OCT. NOV. DEC
N. temperate
N. 30°+
N. tropical
N.0 – 29°
S. tropical
S.0 – 29°
S. temperate
S. 30°+
VERTICAL SOLAR RADIATION
23·5 °N
PATH OF
Equator
0°
23·5° S
23°5 S
Daily New Cases in New York
Daily New Cases
Cases per Day
Data as of 0:00 GMT+0
Daily New Cases in Texas
Daily New Cases
Cases per Day
Data as of 0:00 GMT+0
Daily New Cases in Australia
Daily New Cases
Cases per Day
Data as of 0:00 GMT+0

Actual Wuhan Facts

- Early in the pandemic the mortality rates showed that those people over 55 made up more than 90% of the deaths

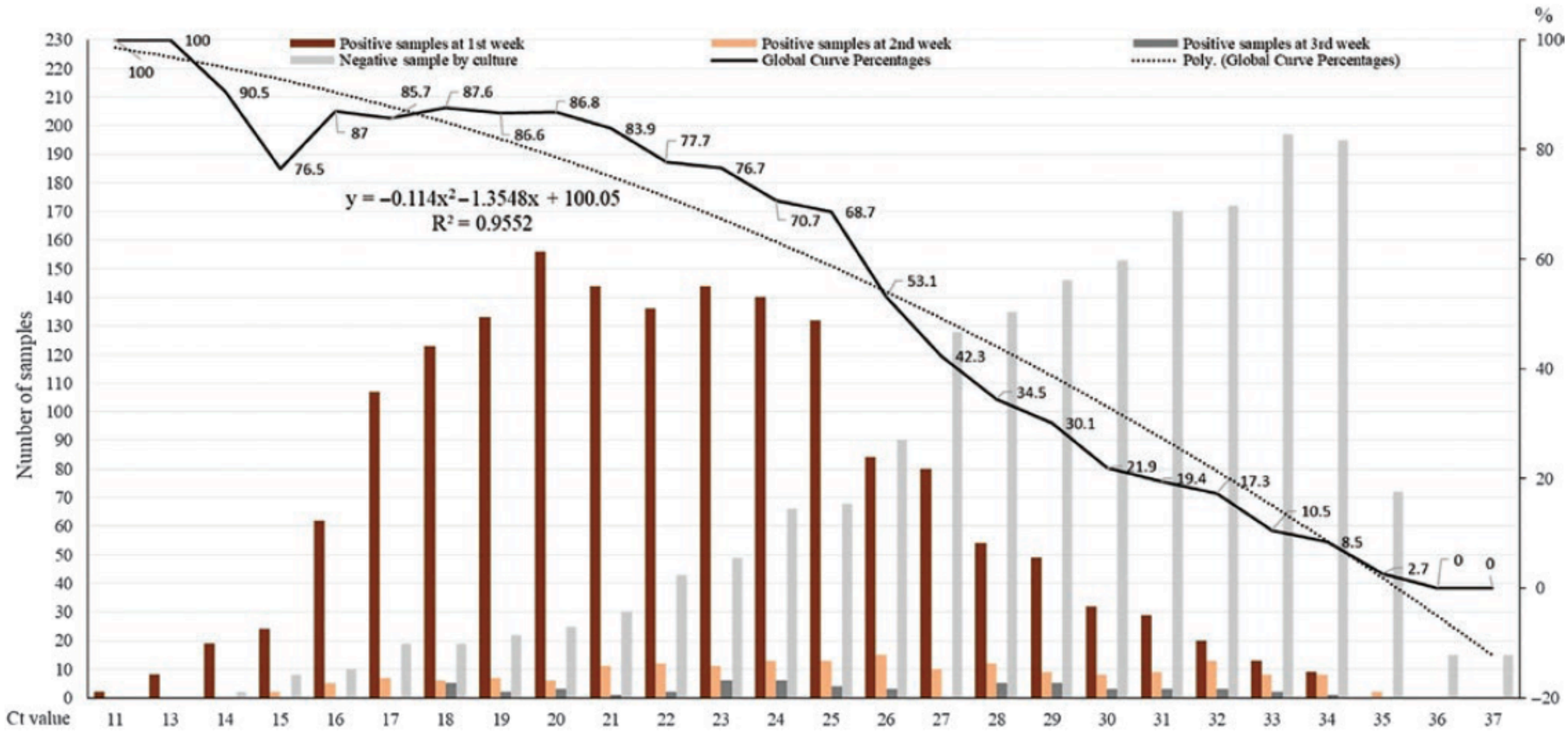
- Folks over 65 make up 14% of the US population and those from 1-55 make up 72% of the population

- Hydroxychloriquine, ivermectin and nebulized pulmi-cort were very effective medicines even though most public health officials, many physicians and the majority of the media considered these treatments to be dangerous

- A brief discussion of PCR testing*/Testemics**, Asian issues and some NM data

*See Reading List attachment **See below Part 2

PCR Test Count (Cycles) vs Sample #s



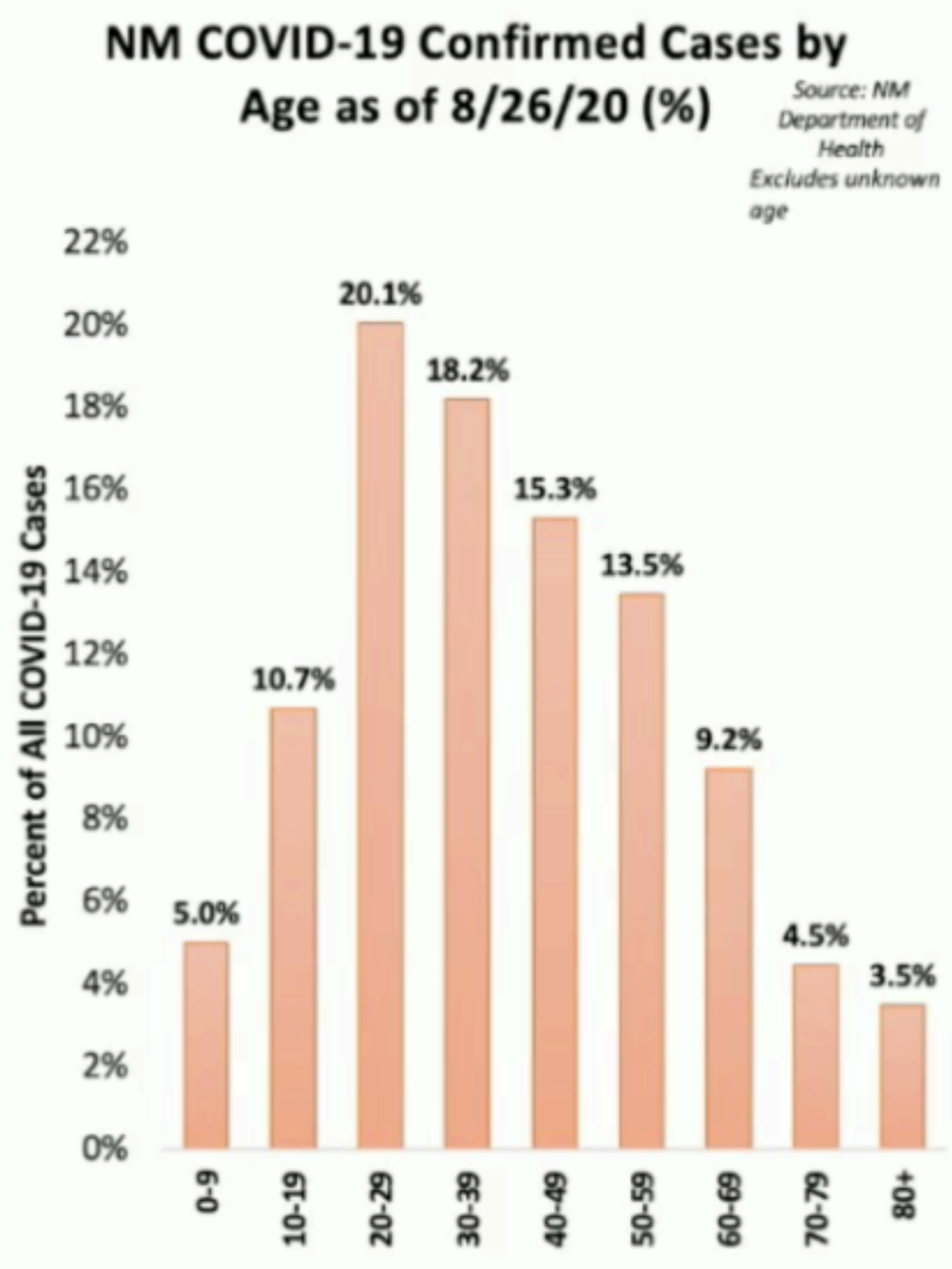
Time of infection 1st week (at most 10 days) when sample taken & optimum counts = 25

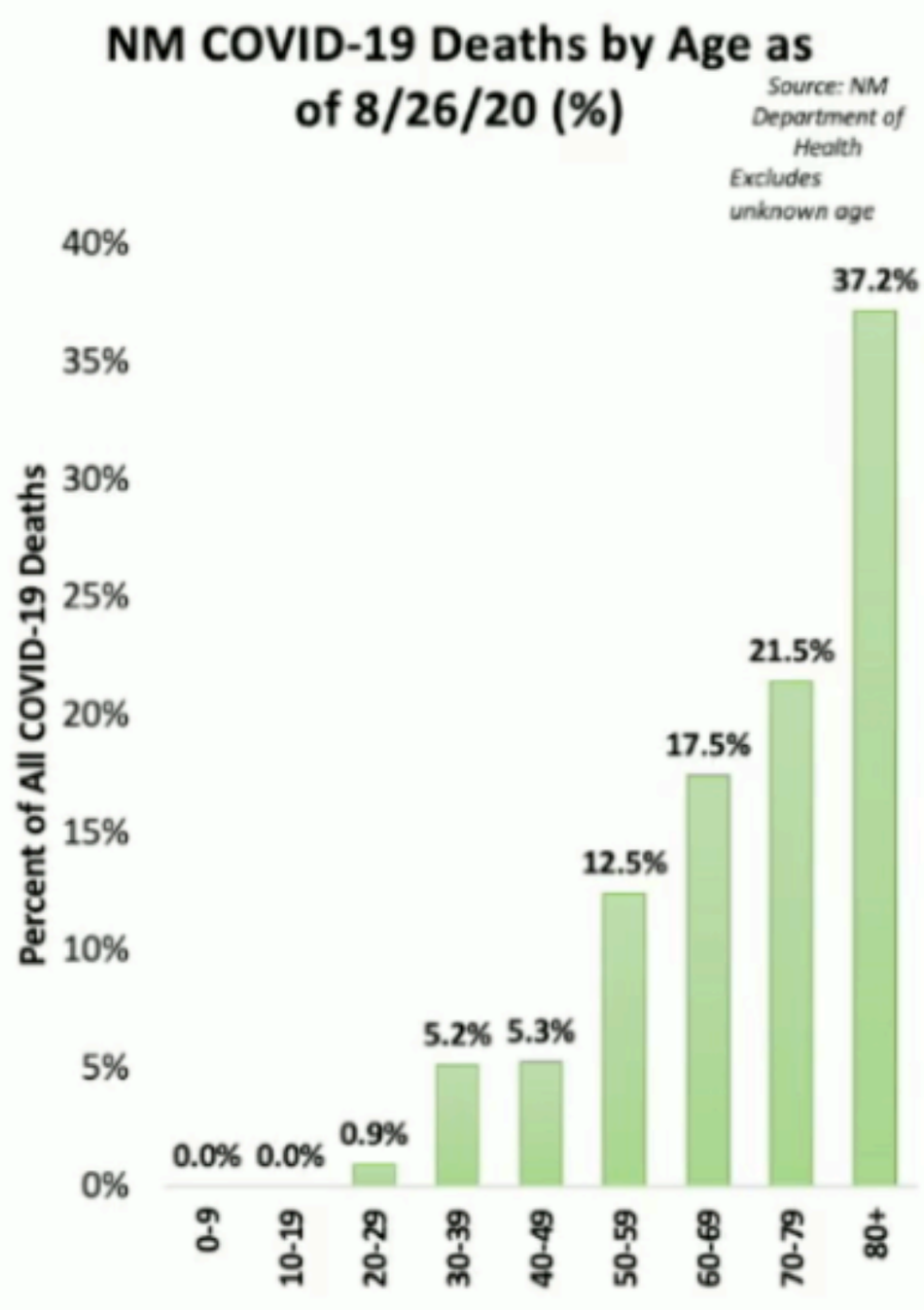
There was mentioned in Dr. Bartlett's video of several Asian countries and their numbers.

Here is a comparison for data from 7-8-2020.

	# of Cases	# of Deaths	# of Recovered	Deaths/Million	Number of Tests
United States	3 million +	133,274	1.325 mill	9233/million	38.3 million
Japan	20,000	977	17,000	8/million	500,000
South Korea	13,181	285	12,000	15/million	1.346 million
Singapore	45,140	26	41,002	4/million	758,000
Taiwan	449	7	438	7/million	77,700
China	83,563	4634	78,500	58/million	90.4 million

It is hard to tell strictly from the numbers what is going on. There have been lots of comments on the lack of tests in the US but look at Japan and Taiwan.





The 3 green bars on the right demonstrate the failure of using cases on the left (red) as a guideline for NM's success plan

Part 2
The Wuhan story after Sept 2020

- A whole new wave of the virus occurred in November 2020 and continued until now

- Did lockdown of the 1st wave drive this new very lethal wave and can Hope-Simpson's insights predict this more catastrophic wave? Previous season activity is an indicator of the following season's contagion level (immunity issues?)

- There is now a lot more data available to discuss some of these second wave questions as well as whether previous public health techniques were the correct ones or not

- Sweden and Asian methods seem to have been more effective

- We still don't really know by how much that early use of FDA approved medicines could have also kept mortality rates down

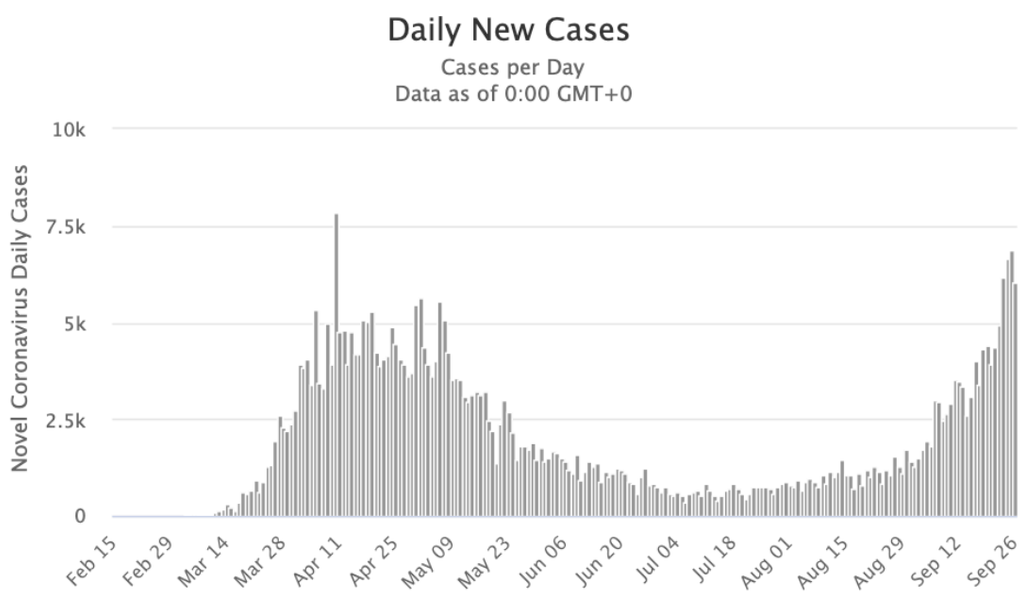
More 2nd Wave Information

- There was a growing controversy over the role of testing played in Wuhan case numbers
- False positive tests from improper PCR test methods was not very well analyzed
- The idea uncovered by Ivor Cummins that testing in these conditions could produce “testemic” or “casedemic” results was actually found in the data (see next slide)
- And death #s by Wuhan was unanimously portrayed as under counted while the CARE gravy train basically payed hospitals for all Wuhan care as well as death by Wuhan
- There were huge numbers of tests done on healthy individuals and very little testing of mortality cases

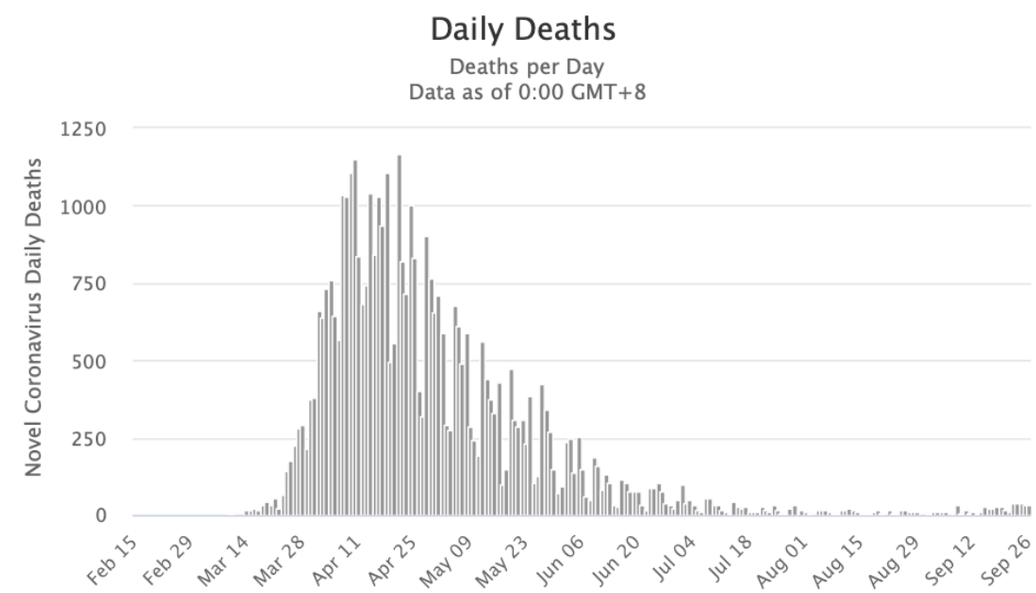
Cases vs. Deaths “Casetemic” or “Testemic”

Case classification and Wuhan testing and death by Wuhan are “murky subjects”

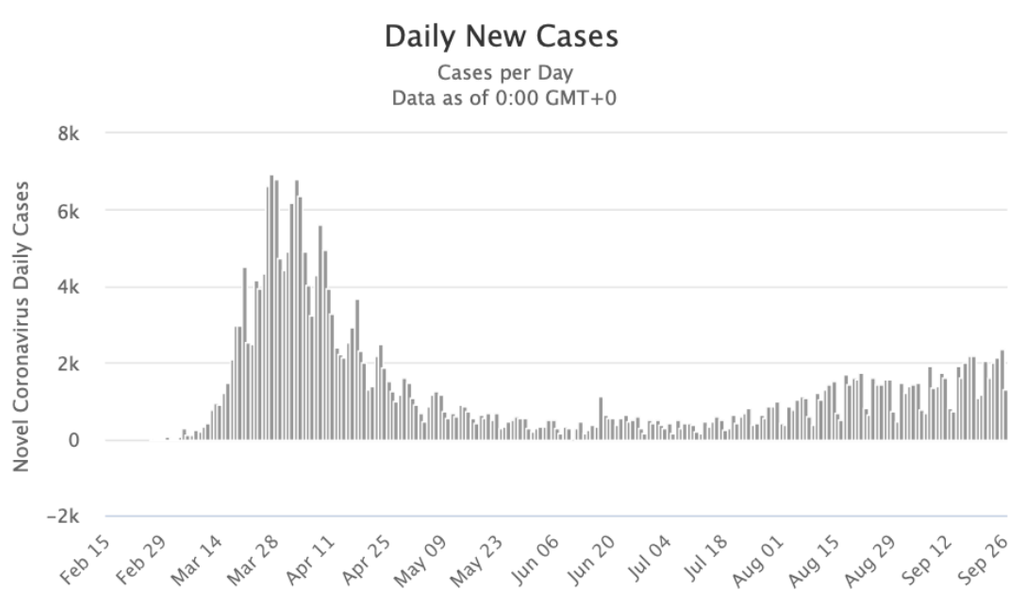
Daily New Cases in the United Kingdom



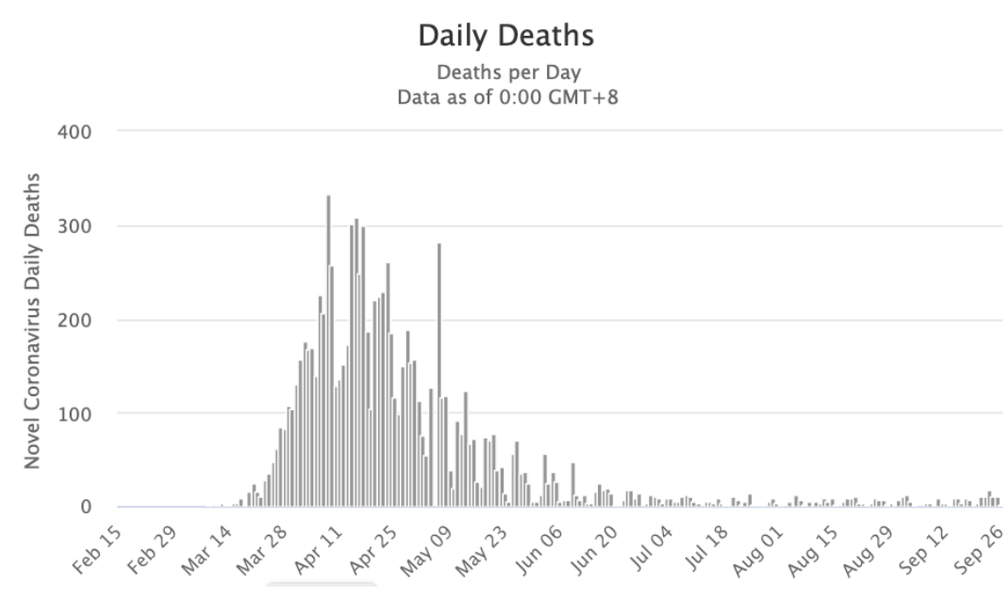
Daily New Deaths in the United Kingdom



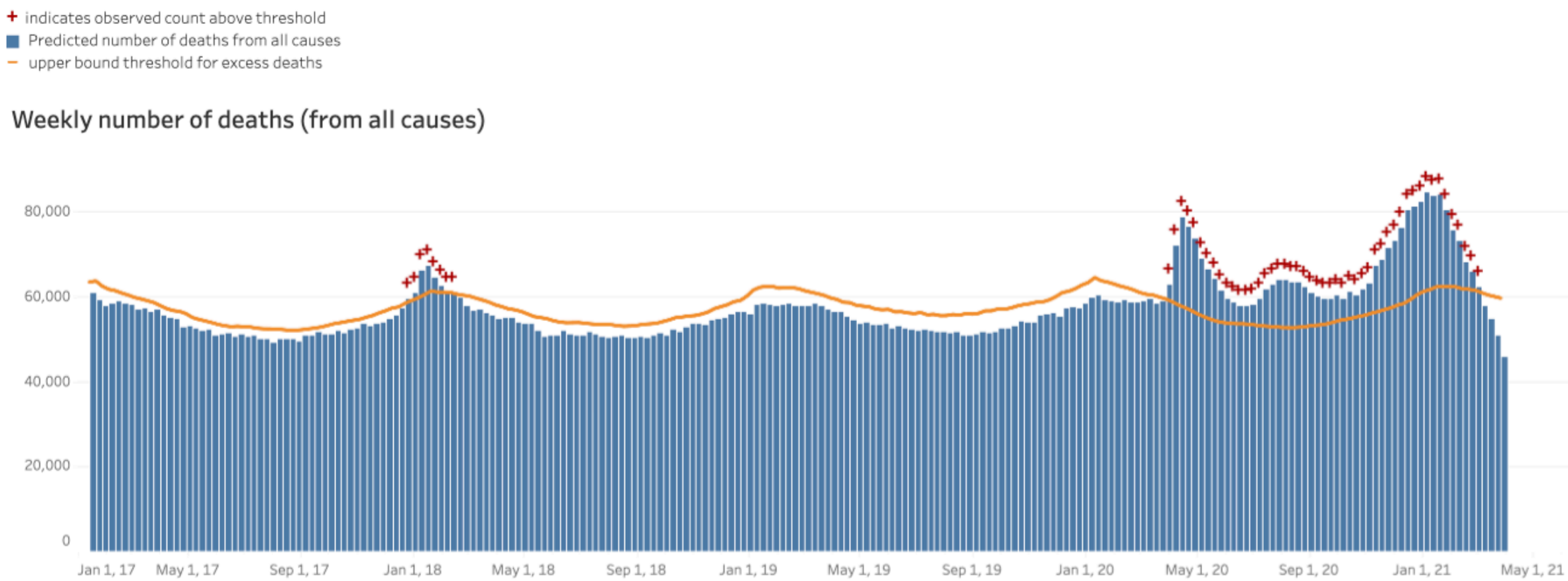
Daily New Cases in Germany



Daily New Deaths in Germany



Recent look at Excess Deaths



- Clearly the last wave in the US was the most deadly. The US also had the most total deaths of all other countries with 575.6K (correlated to the above excess deaths) and with Brazil next at 351.5K.

- There is a clear seasonal element to these waves.

- Both the US and some European countries had very high mortality rates compared to the rest of the world.

Recent Mortality Rates deaths/million

Czechia 2,593 Hungary 2,429 Bosnia-Herzeg. . .2,235 Bulgaria 2,078

Belgium 2,015 NM 1902 Italy 1,886 UK 1864 USA 1,731 Brazil 1,644

Portugal 1,662 Spain 1,632 Peru 1640 Mexico 1,593 Poland 1,545

France 1,508

Sweden 1,342 Several So. America & Switzerland 1,200s Austria 1,071

Less than 1000>500 So. Africa, Russia, Germany, Netherlands, Iran, Ukraine, Canada, Israel, Ecuador

Less than 500>200 India, Denmark, Turkey, Namibia, Greece, Ireland, Tunisa

<100 Pakistan, Malaysia, Bangladesh, Japan

<50 mostly Africa, So. Korea, Hong Kong, Australia **AND Taiwan 0.5 or 11 people**

Dr. Wittkowski's Interesting idea

- What if . . instead of almost a full year lockdowns, only limited 6 week lockdowns of the at risk populations (65+ folks) were used prior to seasonal peaks (2 or 3 times in 2020)?

- Each of the early stages of infection spikes would be monitored nationwide. Let the contagion spread among the younger less at risk part of the greater population of 75 to 80%

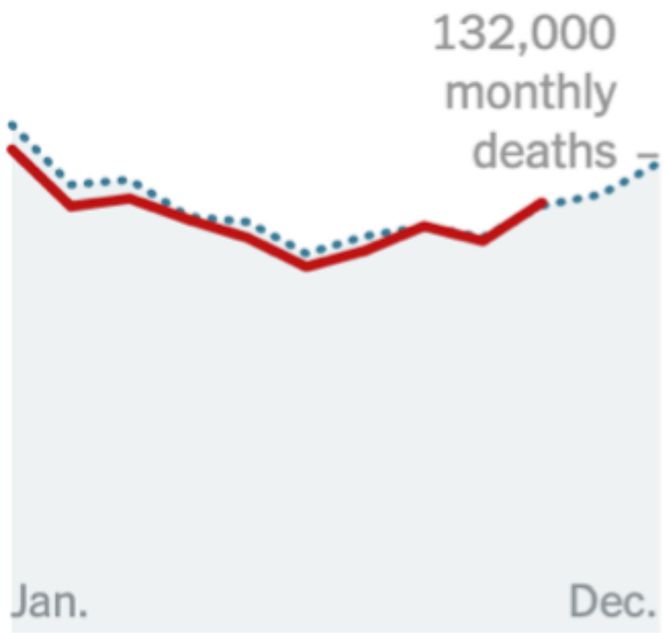
- Anybody getting even mildly sick would be treated by at home medications without worrying too much about what the respiratory disease might be. They would be monitored as needed by chest X-rays.

- Could total deaths have been kept to under 100,000?

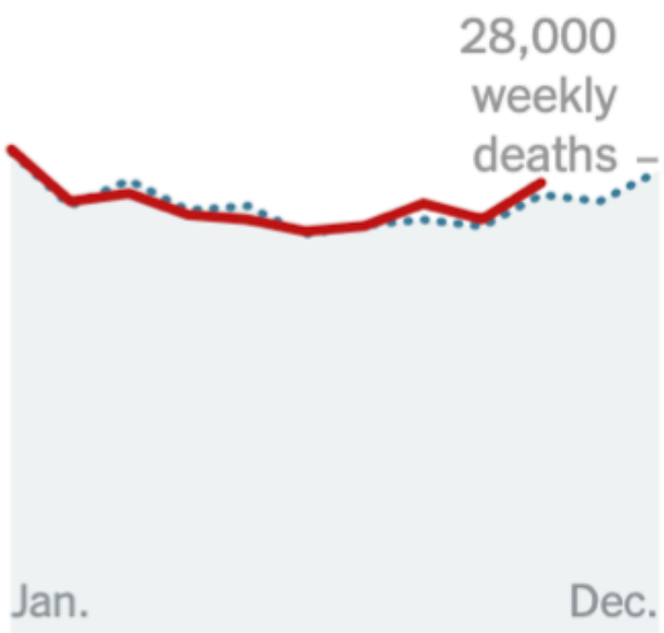
- Probably. And with almost no effect on the majority of us as if it were just a severe flu season.

The Asian Model

- Taiwan, S. Korea and Japan really did protect their old people and did little harm to the rest of the population
- Preparation and plans with successful techniques allowed all these folks to “weather the storm”
- Their excess death record is proof of this claim
- Many nations throughout the world that were using HCQ for malaria show that there were medicines that really worked
- The political and media propaganda in the face of the real science in the US was key to our failure to deal properly with the pandemic



Japan



South Korea

The blue dotted lines are predicted deaths from all causes for the period and the red line is the actual # of deaths that occurred during the pandemic. Both countries remained mostly opened internally while they strictly controlled the folks crossing their borders.

Japan's weekly deaths from all causes are about 33,000/week and Korea's are about 28,000/week. Deaths from all causes in the US are about 60,000/week.

I suspect that if the US population could have carefully followed the Wittkowski method and early treatment of the disease, we might have been able to protect our elderly population in this same manner.

The Japanese already treat all respiratory infections very early and very effectively often without hospitalization. They check on the progress of the infection with X-rays.

Lockdown - just say no

- In the longer version of this presentation there are a number of very negative analytical discussions of lockdown

- Studies in the past few months show that states that locked down ended up with <u>more</u> deaths than those who did not lockdown

- All the other very bad effects just pile the misery on to the death outcomes

- The governor of Florida took a lot of heat while the governor of NY seem to be the hero (at least in the beginning)

Lockdown and many other Pandemic issues - the bottom line

With the US data now readily available, let's look at it and see how the science really emerged. With data obtained from this site https://www.worldometers.info/coronavirus/country/us/ for March 16, 2021, we can see a very simple pattern among several of the mostly larger states in the US. New Mexico had a particularly strange and severe lockdown strategy and it affected many of my friends, family and colleagues so I included NM data.

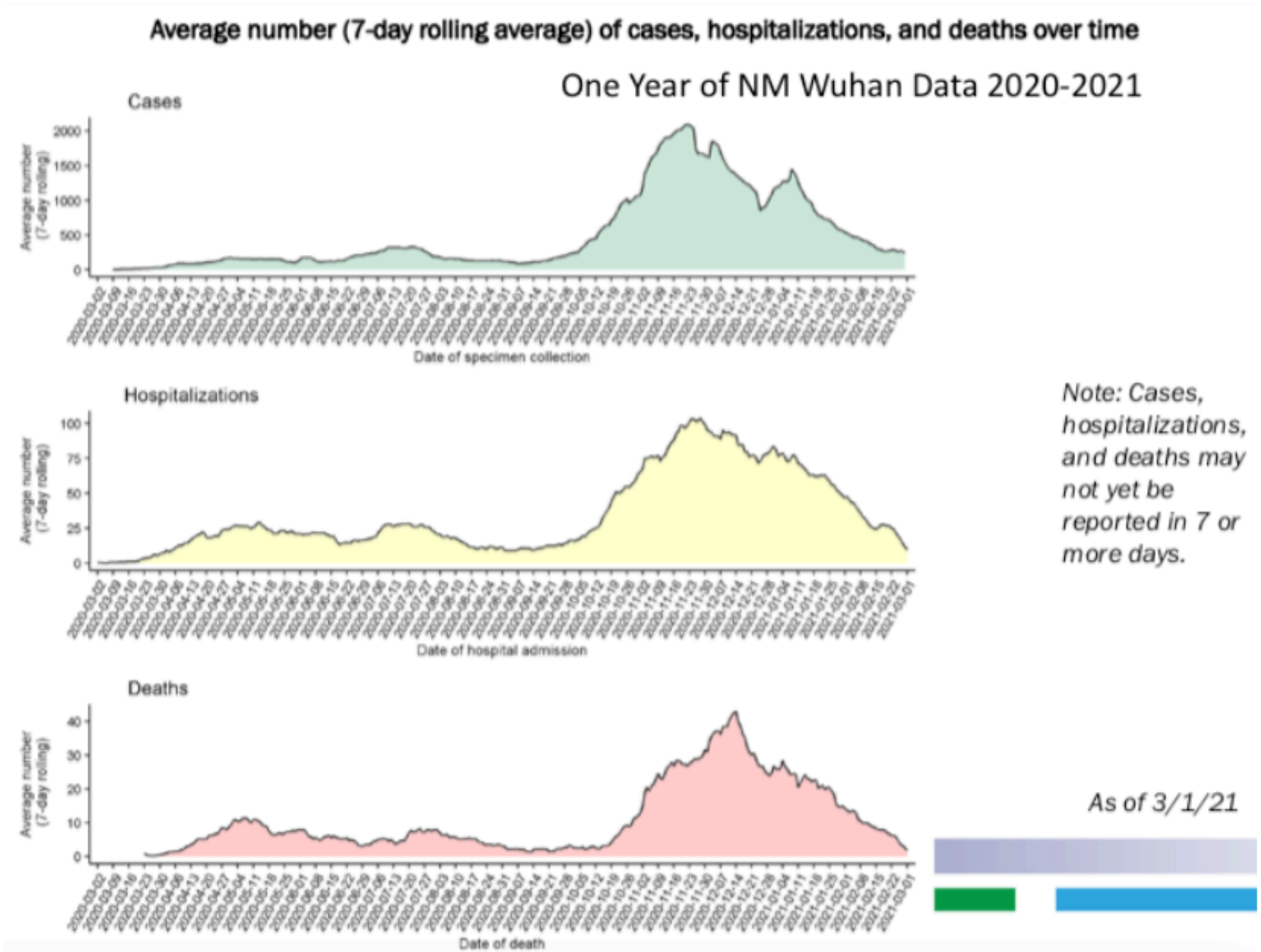
Minus all the drama and detail, I pulled the data for five states that shows what the death rate per million was for the whole period measured on March 16.

New York	Texas	California	Florida	New Mexico
2542 deaths/mil	1617/mil	1425/mil	1515/mil	1841/mil
%65+ → 16.9%	12.5%	14.6%	19.36%	18%

New York and New Mexico win the "dumb as a hammer" prize for ineffective methods. In part 1 I noted that our governor thought that NM was really NY. Well, NY was no poster child for how to deal with the pandemic and NM turned out to be more of the same. And the Neanderthals from Texas seemed brilliant by comparison. Especially when you look at the extremes that NY and NM used to "control" the virus while Texas and Florida were more open and less restrictive of their citizens. Florida's citizens are skewed toward an older population while California has a younger average. Maine has the largest population of 65+ = 309K

A failure of health care and political leadership

- NM Lockdown



- NM was generally quiet from March to early Oct 2020

NM Details

- Activity on all three fronts (cases, hospitalizations, and deaths were moderate until the next season in early October became a serious killer
- A very faint level of activity in April and July could point to lockdown success but lack of herd immunity was very clear by October
- Hope-Simpson and Wittkowski findings indicate that spreading the infection during a short milder early season might have reduced all three of the Wuhan negative indicators later on
- We may never know what that ultimate outcome could have been

Failure of all levels of Healthcare

- Federal, State and local healthcare system were completely unprepared for this pandemic. The Chinese Communist Party was complicit in quickly making it a pandemic but no one including the WHO had much of a clue once things began to happen

- What is remarkable is that most of the above “experts” remained in a state of un-preparedness throughout 2020.

- A few folks in the western countries quickly found some answers while a number of Asian health care experts especially those in Taiwan went into action in December at the very earliest of faint clues of Chinese obfuscation

- The most disturbing issue was the speed at which politicians began their incompetent rampage and the media supported those misadventures with a steady stream of misinformation (propaganda)

Part 3 What can we learn from this?

- Issues about spreading the contagion while reducing the deaths must be discussed openly. The same for deciding to use effective FDA approved drugs that show experimental results and allowing the sharing of medical experiences without the interruption of political opinion and propaganda

- It is simple as my doctor's recent lament "that we have been unable to discuss all these critical issues openly and freely"

- There are some fundamental issues of lack of supplies, looking at the issues in overview and marshaling regional forces in organized fashion so that hot spots can be dealt with without straining national resources

- Local and regional plans need to be tailored for areas where seasonal viral activity will require specialized knowledge and action

More Ideas for the Plan

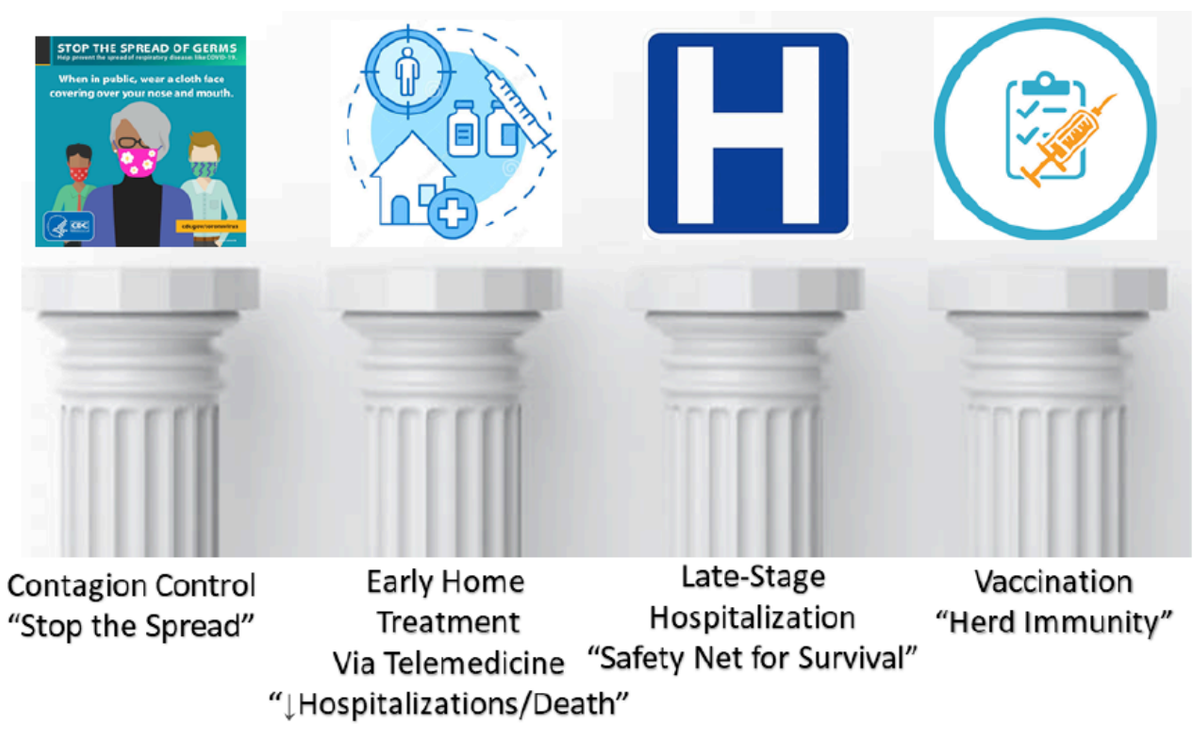
- One good thing during Wuhan was that lots of money and effort were expended to learn a lot more about these respiratory diseases
- Some historical knowledge seems to have been ignored and now needs to be revisited in order to add to our knowledge base
- A plan must include a method to quickly learn the important characteristics of the new virus such as lethality, infection rate, at risk population and so on
- With Wittkowski's solution testing, masks and social distancing are probably only specialized activities to protect only the "at risk" population
- Even Sweden did very poorly early on about recognizing the serious need to protect elder care residents who were at a very significant threat level
- Do we now have a viable plan to do this? I would like to see it?

Where are all the plans?

- Discussion of the idea of short term lockdown should be revisited but some serious open and heated discussions of months long lockdown need to be settled before the next pandemic

- So far the data strongly indicates that China's lockdown idea doesn't work here

- Some of the material in the reading list indicated there has been some thought on this



New Technology Solutions

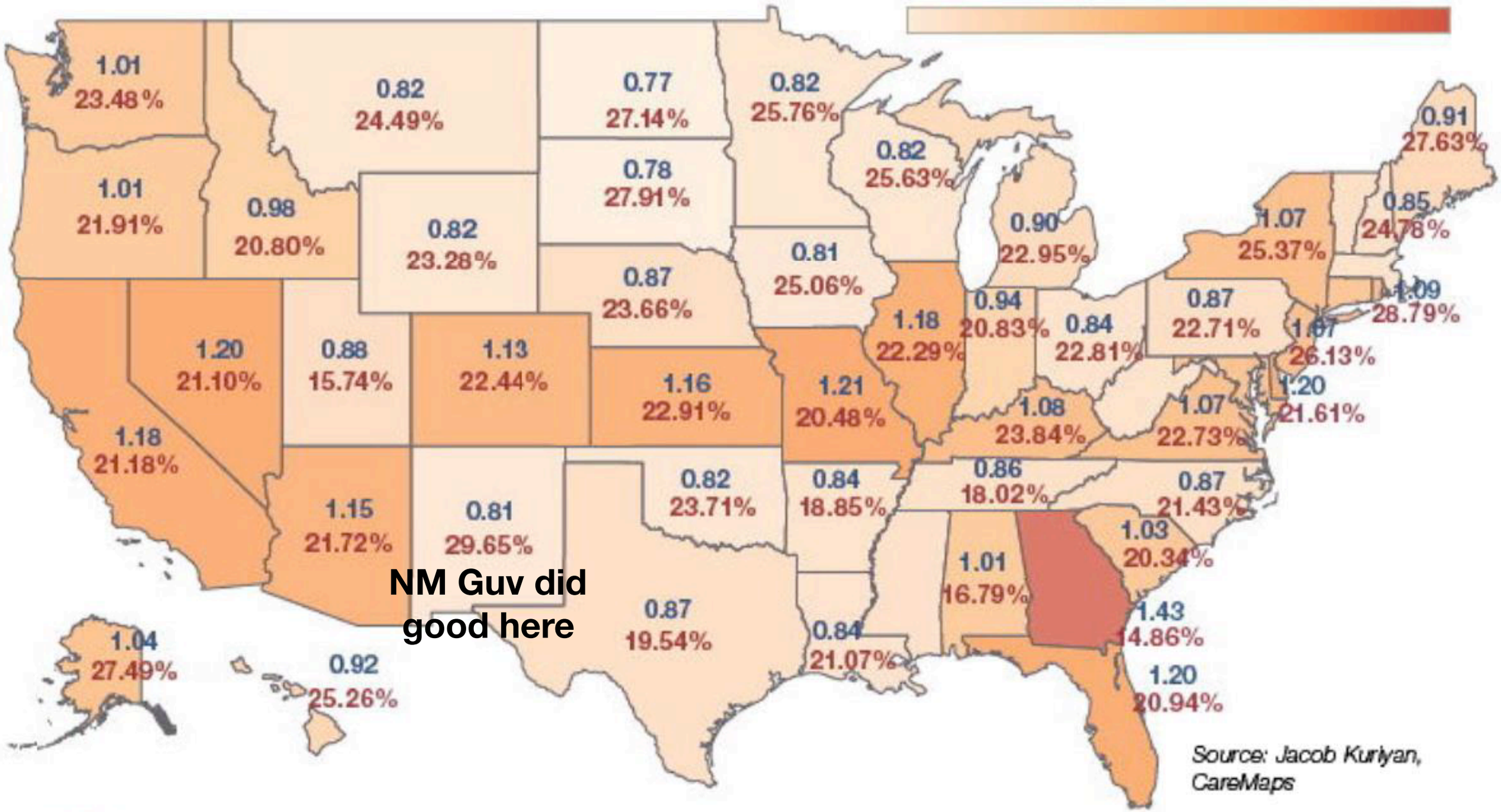
- mRNA and dealing with viral production (or stopping it) in the cells
- What have we learned on this subject? I have not looked much at this but it is a very rich area for new ideas and solutions
- Beware of the “same old same old” problems with China, bureaucratic solutions and lack of vision. What the rest of Asia is doing?
- And simply why did Africa and some of the 3rd world countries end up less affected than we did? HCQ?

More planning and preparation

This is not a political exercise

- Folks need to work harder on this . . . . especially at the state and local level
- Find experienced people like Wittkowski and several of the frontline Drs
- Specialists like Doctors Without Borders and the Taiwanese Public Health staff

Herd immunity and % fully vaccinated



R(eff) takes into account the number immunized versus the number of new infections.
The lower the value of R(eff), the lower the immunity. When it is less than 1, there is herd immunity.

The red number is the percent of population vaccinated, meaning they have received both shots.

Recent Albuquerque Journal article “Has NM gotten to herd immunity?” by Jacob Kuriyan

NM is #1 in the nation in vaccinations. NM probably reached herd immunity on March 16, 2021.

A paper by Kuriyan discusses an old commonly used infectious model developed in the UK called the SIR Model*. S=susseptible I=infected R=removed.

It is a so-called compartmental non-linear model that is unsolvable. He mathematically “rescales” a part of the non-linear SIR equations to solvable linear equations to show a global universal relationship for Covid 19.

The universality of Beta (rate of infection) to Gamma (removal rate) as compared to I/R in global Wuhan data = 1

*W.O. Kermack, and A.G. McKendrick "*A Contribution to the Mathematical Theory of Epidemics*" Proceedings of the Royal Society A. 115 (772): 700–721 (1927)

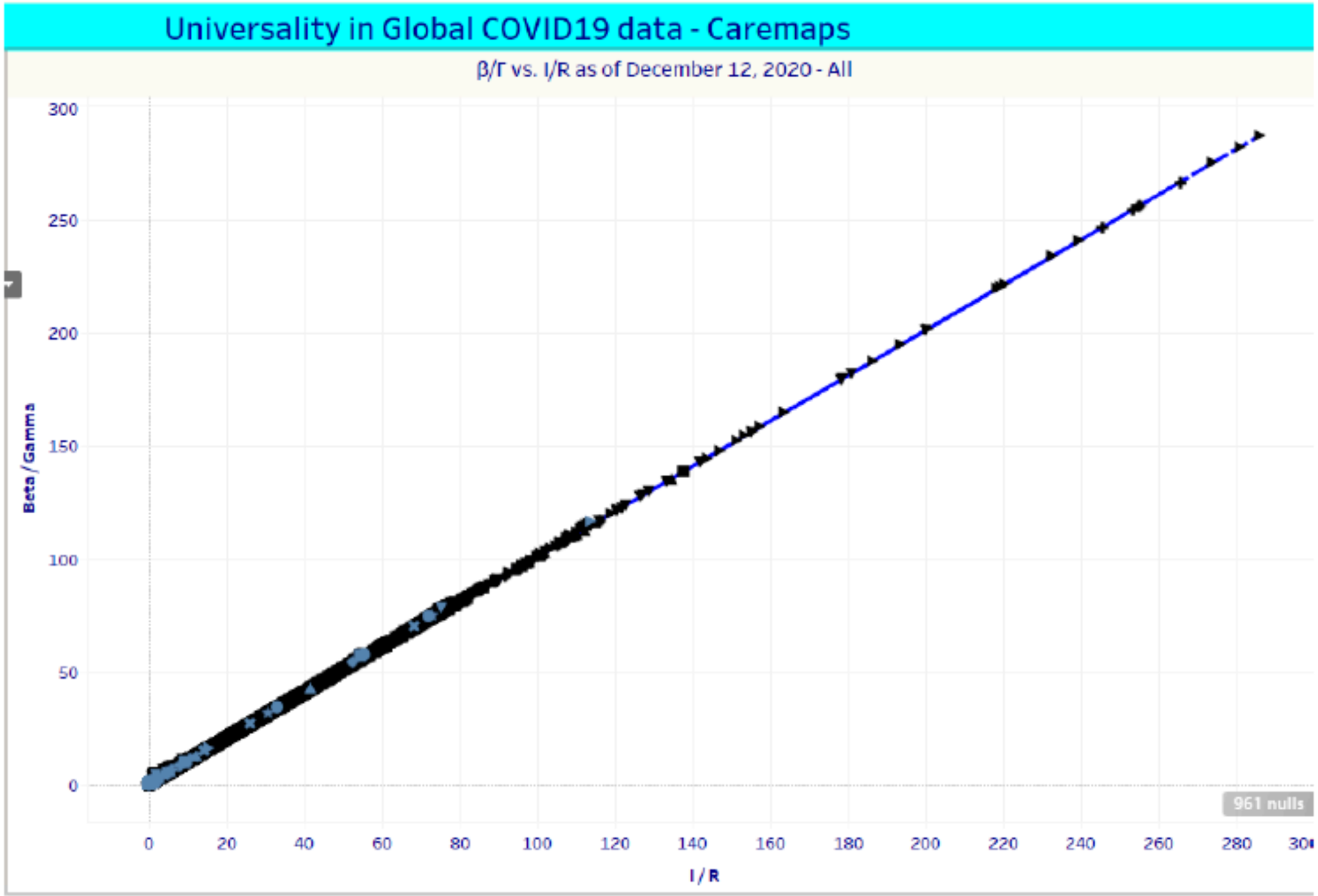


Fig. 1

Global Covid 19 data conform to the universal rule

The points are from data for the period April 1 to December 12, 2020 from all the states in the US, and the 190 countries of the world. All data points fall on a single line, confirming the universal rule. (Screen shot from Tableau.)

He used this same technique with modified SIR equations to find NM Medicaid overpayments in the past. So an infectious model was used to catch bogus healthcare payments and then revert back to characterizing another infections disease - Wuhan!

In his paper he claims that the Swedish attempt to reach herd immunity using a Wittkowski like method failed. He suggests that Sweden would experience massive collateral damage in the attempt. He went on to suggest that other Nordic countries did much better in the face of Wuhan. Ivor Cummings discussed this issue in one of his presentations that was removed from Youtube.

I doubt that he looked very carefully at Wittkowski's technique of ramping up infectious behavior in the low risk population. Or saw Cummings' presentation.