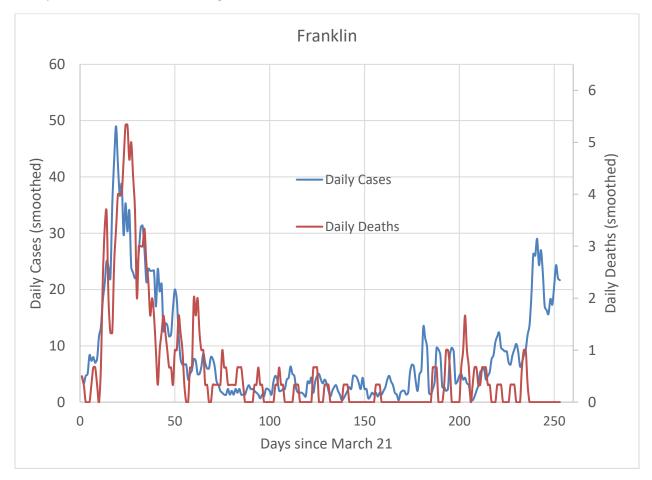
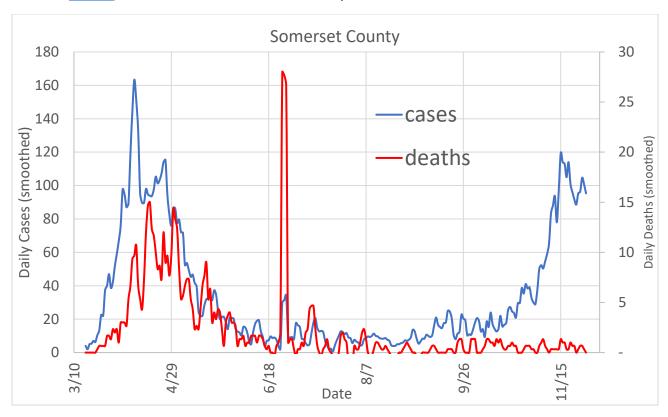
Some good news

Okay, I'll tempt the gods. You may have noticed although the number of cases is rising (474 new cases so far this month), deaths are not rising as fast (4 this month). Compare that to the first 29 days of April with 828 new cases and 91 deaths. 0.8% compared to 10.9% respectively. This led me to look if this is a local phenomenon or if it is more global. First a look at Franklin.



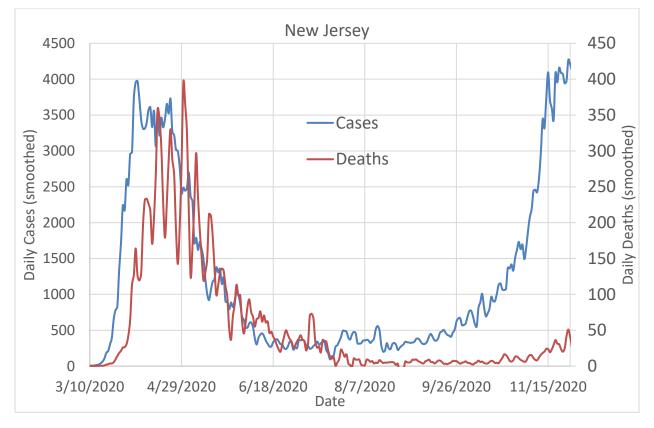
This is a graph over time comparing the number of new daily cases and the number of daily deaths. Notice the vertical axis for cases is on the left and for deaths on the right. Using this scaling, in March/April deaths lagged cases slightly. That doesn't appear to be happening now (yet).

See next page.

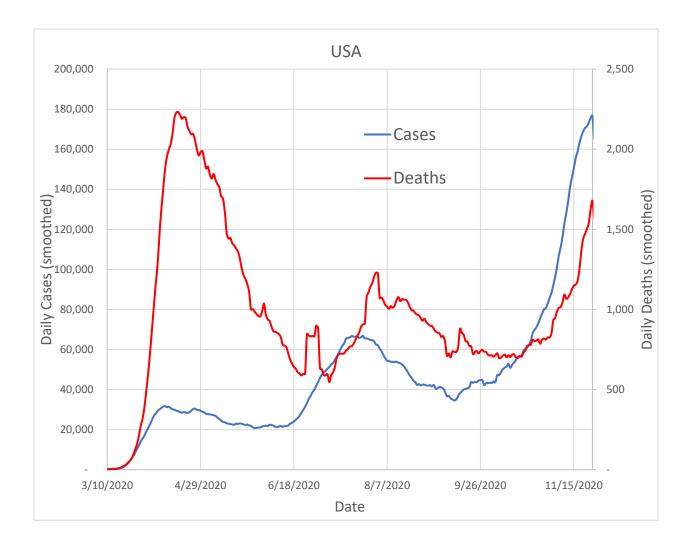


I went to GitHub for data. Let's look at Somerset County.

The trend appears to continue at the county level. (The spike in late June was a data correction.)



And at the state level the pattern is even more pronounced.



Be careful of the scaling as you look at this. The trend is only partially carried over. The ratio of deaths to cases has clearly decreased but not with the same pattern as locally.

I've not seen this reported so I'm going to hypothesize. THIS IS NOW A THERORETICAL DISCUSSION.

1. One reason could be younger people are getting infected more then older people. I have the Franklin data for that, and it seems to be true at the Franklin level the percentage of infected elderly is lower.

↓Dates/Ages→	0-4	5-10	11-18	19-30	31-40	41-50	51-60	61-120
4-15-20	0.0%	0.6%	0.2%	9.8%	14.5%	16.2%	18.7%	39.5%
11-29-20	3.0%	2.1%	6.5%	25.1%	16.1%	17.0%	13.1%	16.7%

2. Similarly, locally it could be LTC facilities are better protected.

- 3. It could be masks not only prevent disease in many cases but decrease the viral load when one is infected thus leading to a less serious illness.
- 4. Hospitals may be better at treating.
- 5. Testing philosophy is different. It used to be we only tested symptomatic people. Now we test others.
- 6. Possibly those who are more vulnerable are sheltered and taking other precautions.
- 7. This next one is VERY theoretical. It is to the virus's evolutionary advantage to mutate to be less lethal. If a host dies the host will not spread the disease. A sick living host gives the virus an edge up. So maybe the virus is becoming less lethal. AGAIN, THIS IS BASIC VIRUS THEORY. I have NO data that indicates it is what is happening.

Not sure what the answer is but I hope it continues. Still, this is not the time to let down your guard. There are many people who have recovered who remain sick for a long time. We don't know the long term effect of this virus. We also don't know if this trend will continue. We will see about the Thanksgiving surge and what affect it could have on the above trend.

Dr. Deborah Brix, of the White House Coronavirus Task Force, is advising people to assume they are infected if they gathered for Thanksgiving. Hmmm, sounds familiar.