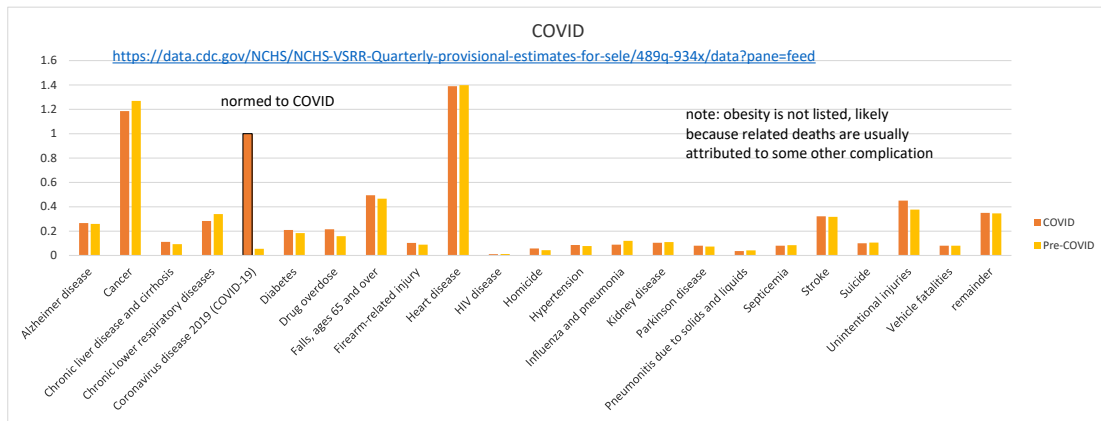
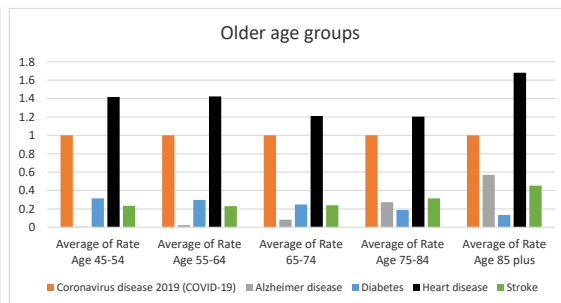
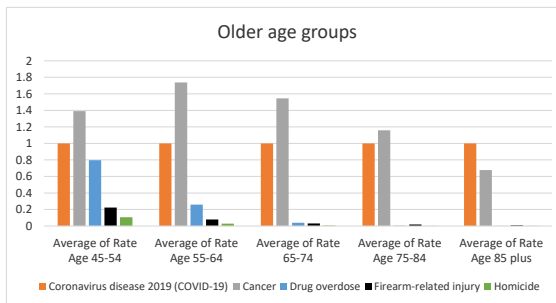
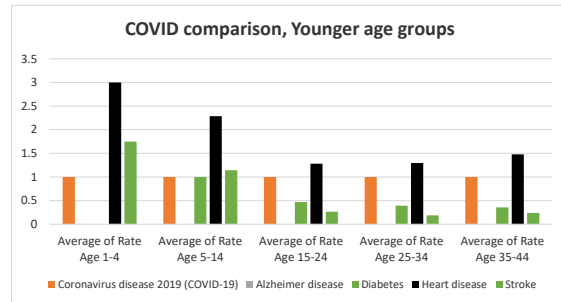
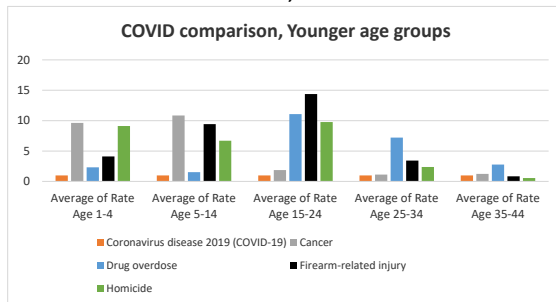


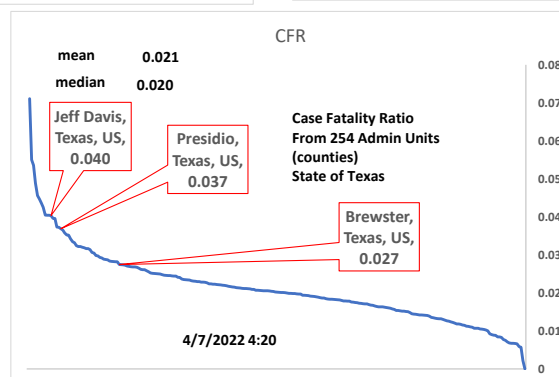
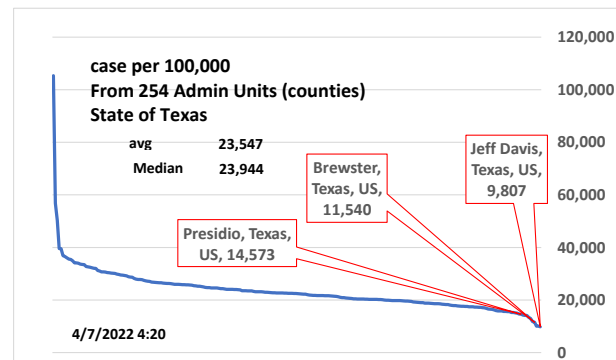
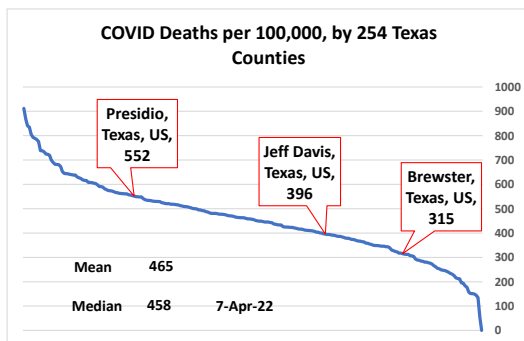
Common causes of death, normalized to COVID. Pre-Covid: 1Q2017 thru 1Q2020, Post-Covid 2Q2020 thru 1Q2021, USA

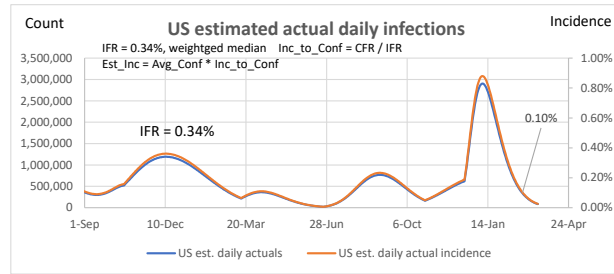
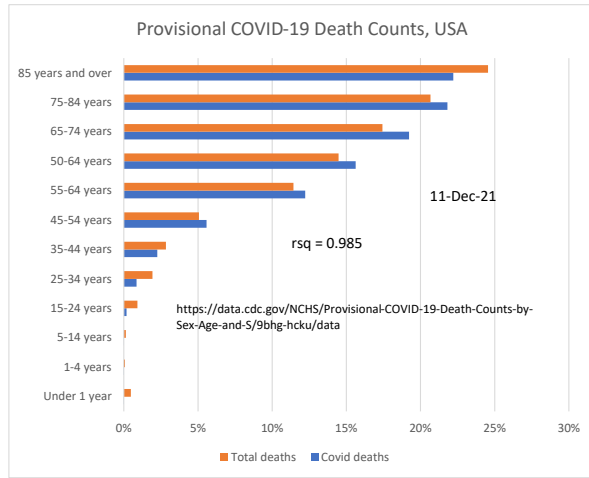


Relative effect of COVID on various age groups, and compared to cause of death. These are all relative to COVID, which is 1.0 on each of four charts, USA



Texas and Tri-county comparisons





False Positives Demonstration

Use 0.19% as estimated daily incidence

Prevalence estimated as avg. infected period of 2 weeks X incidence

95% accuracy of test

| | Positive | Negative |
|----------|----------|----------|
| test pos | 2.527% | 4.867% |
| test neg | 0.133% | 92.473% |
| | 2.660% | 97.340% |

0.19% X 14 = 2.660%

| | |
|--|---------|
| Sensitivity | 7.39% |
| Probability of detection where condition exists | 92.61% |
| True + / (True + & False -) | 95% |
| Specificity | 65.8% |
| Probability of not detecting where condition doesn't exist | 100.00% |
| True - / (True - & False +) | 95% |

False pos. is more than half of total positives.

TRUE + 2.527%/7.39%

FALSE + 4.867%/7.39%

Total

Example only; sensitivity and specificity not necessarily equal.

USA Excess Deaths, 2020 (from CDC data):

| Annualized on 52 weeks | All Cause | All Cause, excl. CV19 | CV19 |
|--------------------------|--------------|-----------------------|-------------|
| 3 yr average before 2020 | 859:100,000 | 859:100,000 | - |
| 2020 | 1016:100,000 | 905:100,000 | - |
| Diff. | 157:100,000 | 46:100,000 | 111:100,000 |

29% of All-Cause excess deaths are non-CV19

USA Excess Deaths, 2021 (from CDC data):

| Annualized on 52 weeks | All Cause | All Cause, excl. CV19 | CV19 |
|--------------------------|--------------|-----------------------|-------------|
| 3 yr average before 2020 | 859:100,000 | 859:100,000 | - |
| 2021 | 1052:100,000 | 909:100,000 | - |
| Diff. | 193:100,000 | 50:100,000 | 143:100,000 |

26% of All-Cause excess deaths are non-CV19

USA Excess Deaths to date (2022, from CDC data):

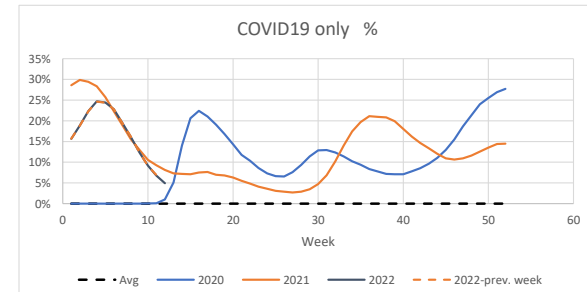
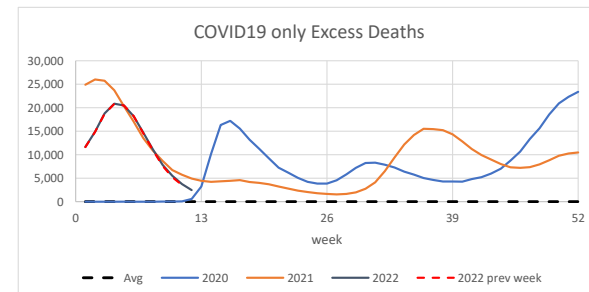
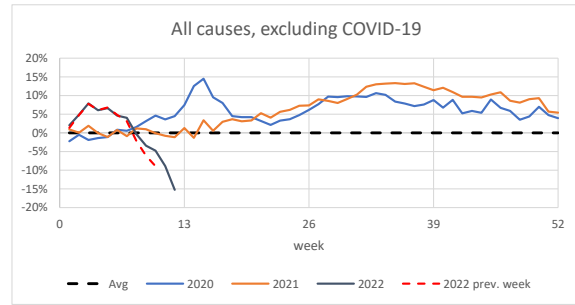
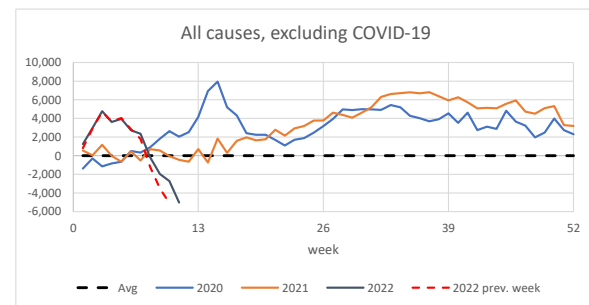
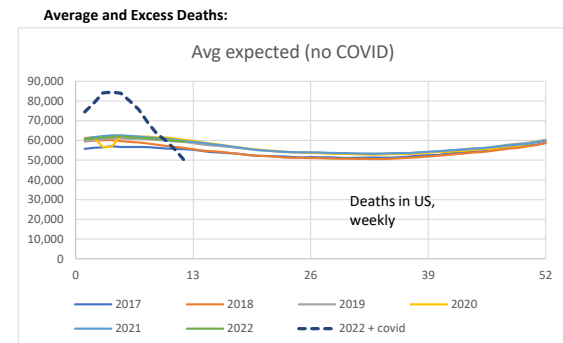
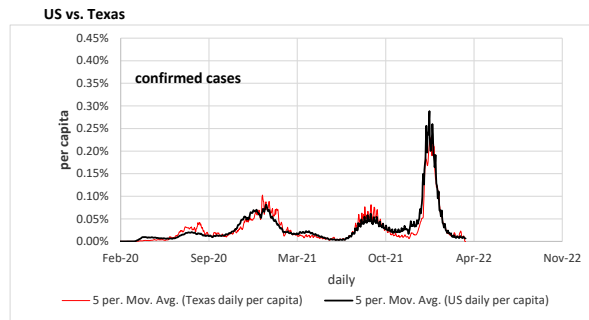
| Week 12 | All Cause | All Cause, excl. CV19 | CV19 |
|--------------------------|-------------|-----------------------|------------|
| 3 yr average before 2020 | 215:100,000 | 215:100,000 | - |
| 2022 | 260:100,000 | 215:100,000 | - |
| Diff. | 45:100,000 | -0.4:100,000 | 46:100,000 |

| 3 yr average |
|--------------|
| 859:100,000 |

-1% of All-Cause excess deaths not CV19

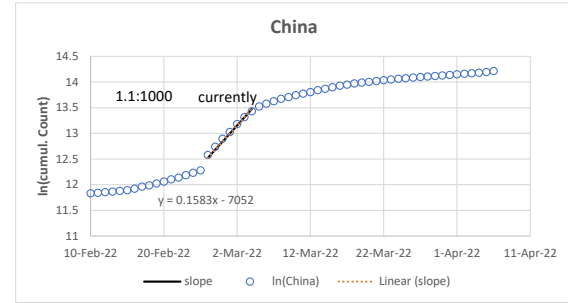
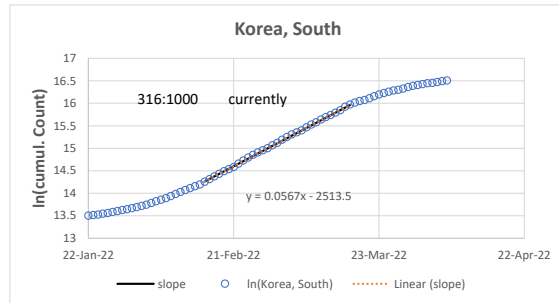
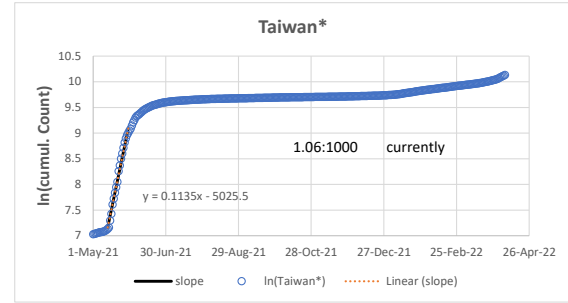
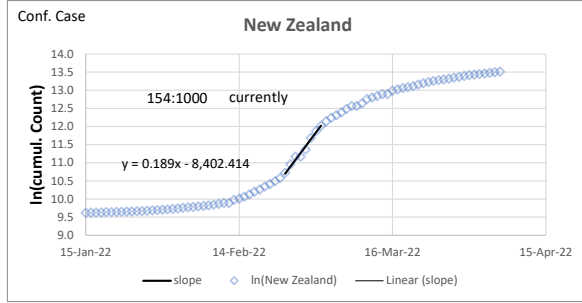
Linear Year Projection 197:100,000

<https://data.cdc.gov/NCHS/Excess-Deaths-Associated-with-COVID-19/xkxf-xrst/data>

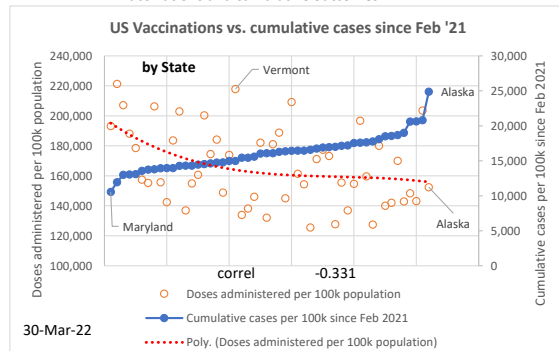


Data in recent weeks are incomplete. Only 60% of death records are submitted to NCHS within 10 days of the date of death, and completeness varies by jurisdiction. Data are not weighted and counts are likely underreported. Therefore, last two weeks of 2022 not shown here. The previous week's data is shown as dashed, to give an idea of the effect of the gradual update.

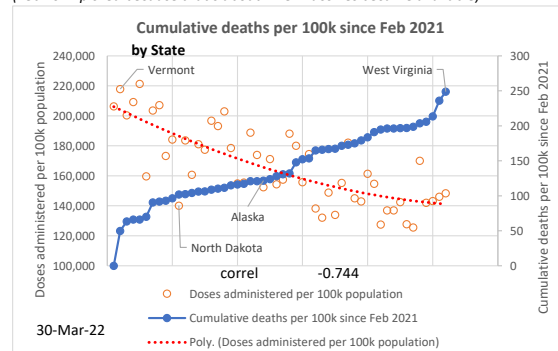
Recent exponential growth examples:



Vaccinations and cumulative outcomes:



(Feb 2021 picked because that's about when vaccines became available)



<https://healthdata.gov/api/views/gqxm-d9w9/files/69321a61-c9f9-4fa5-8999-4ba27b172021?download=true&filename=Community%20Profile%20Report%2020220328.xlsx>

https://github.com/CSSEGISandData/COVID-19/blob/master/csse_covid_19_data/csse_covid_19_daily_reports_us/03-29-2022.csv