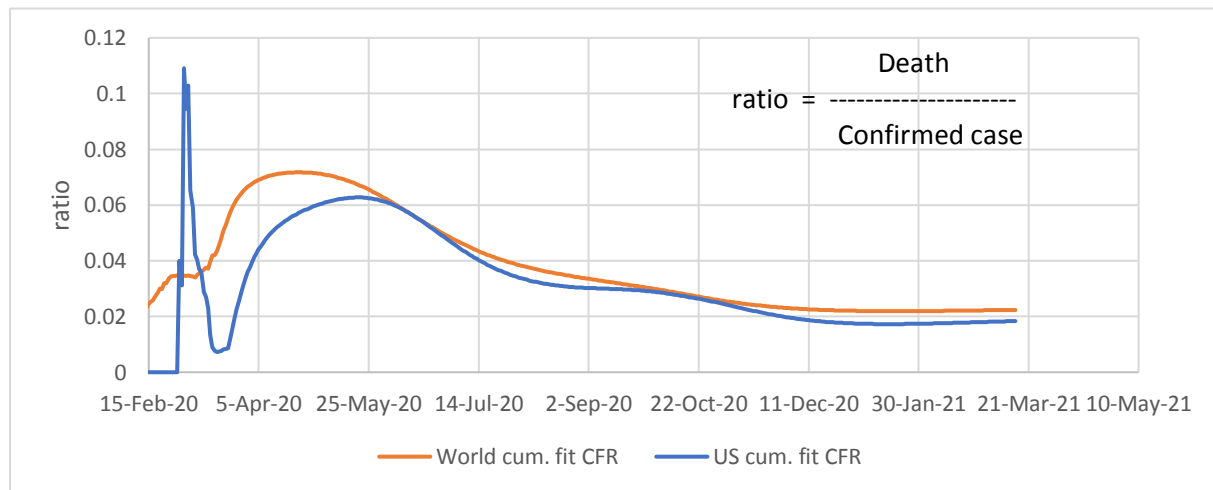
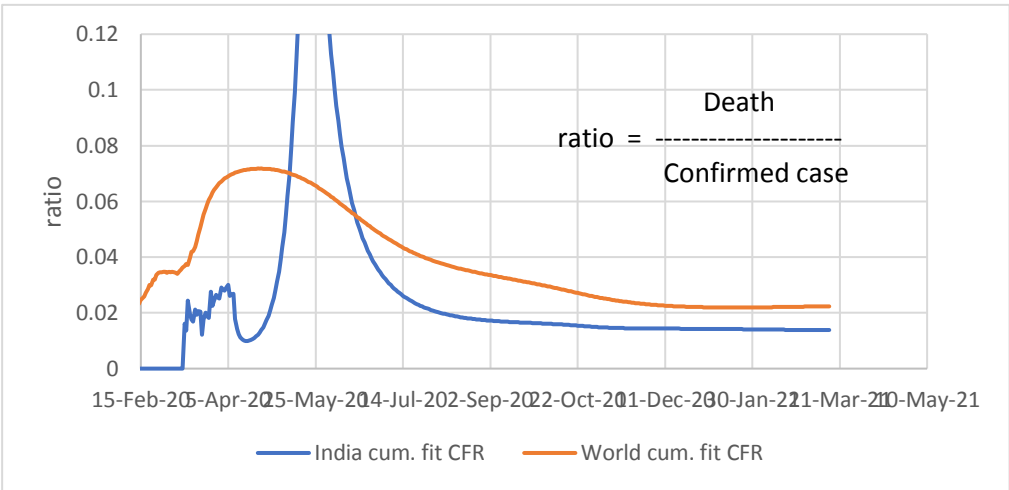
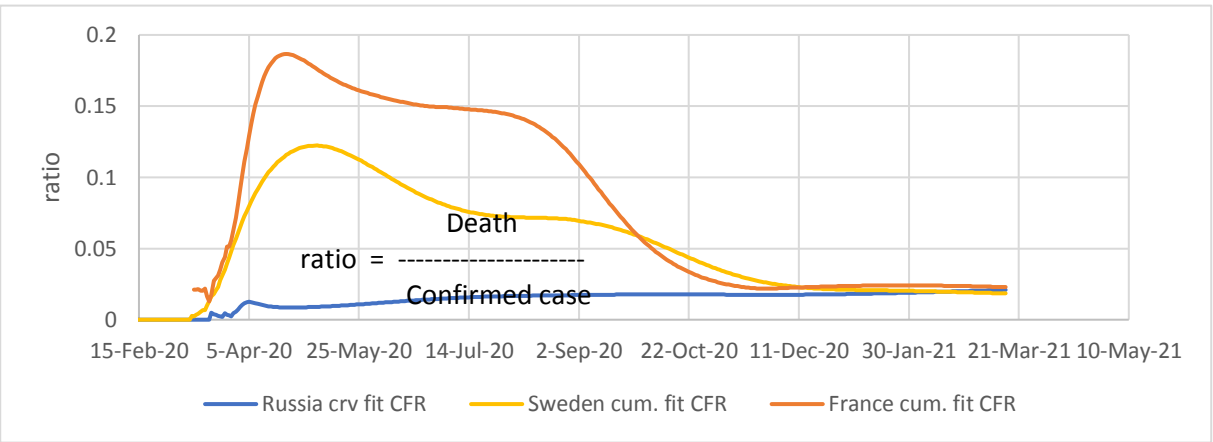
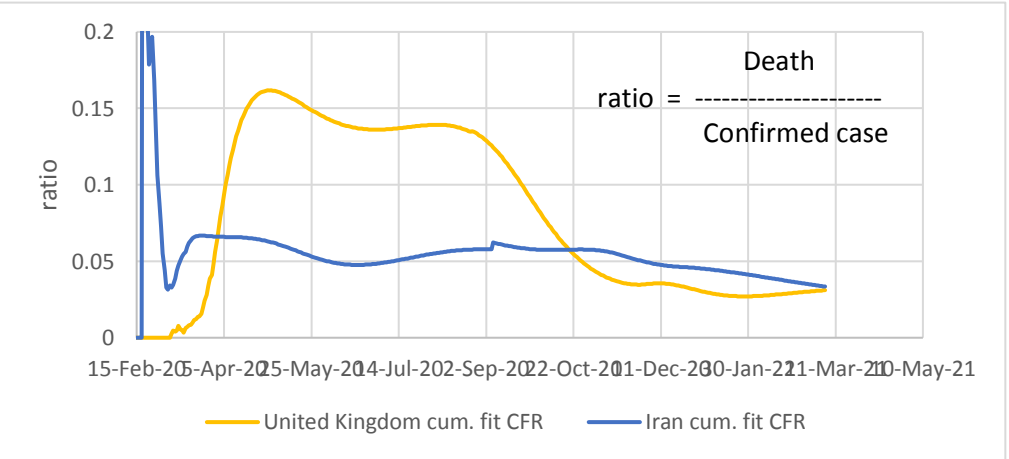
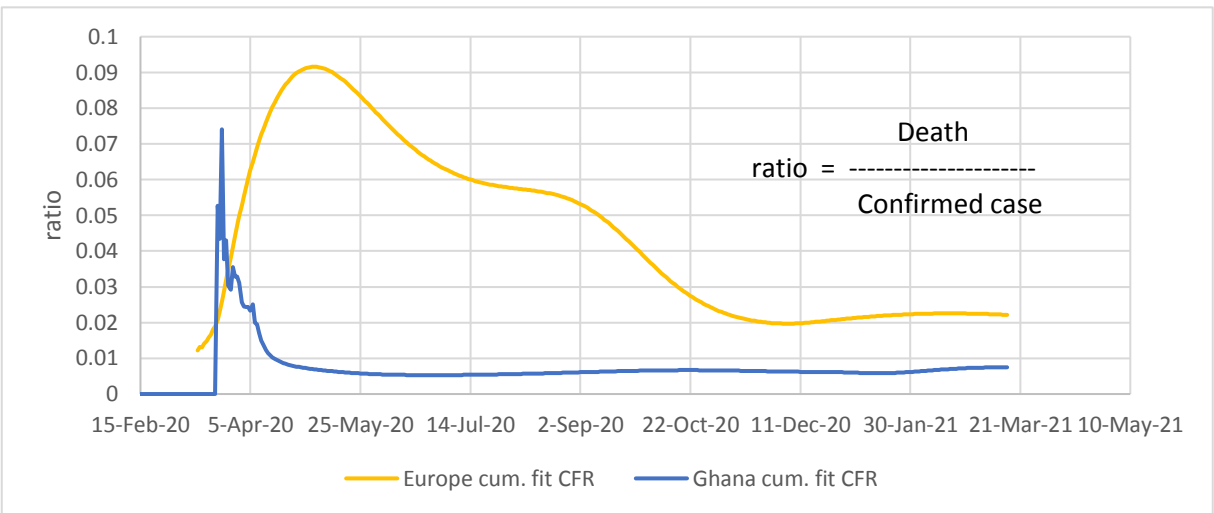
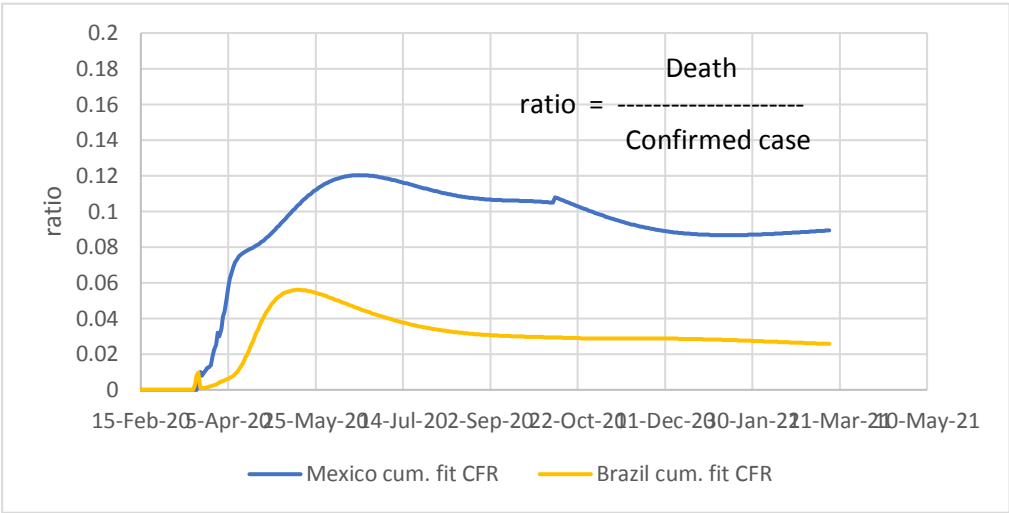
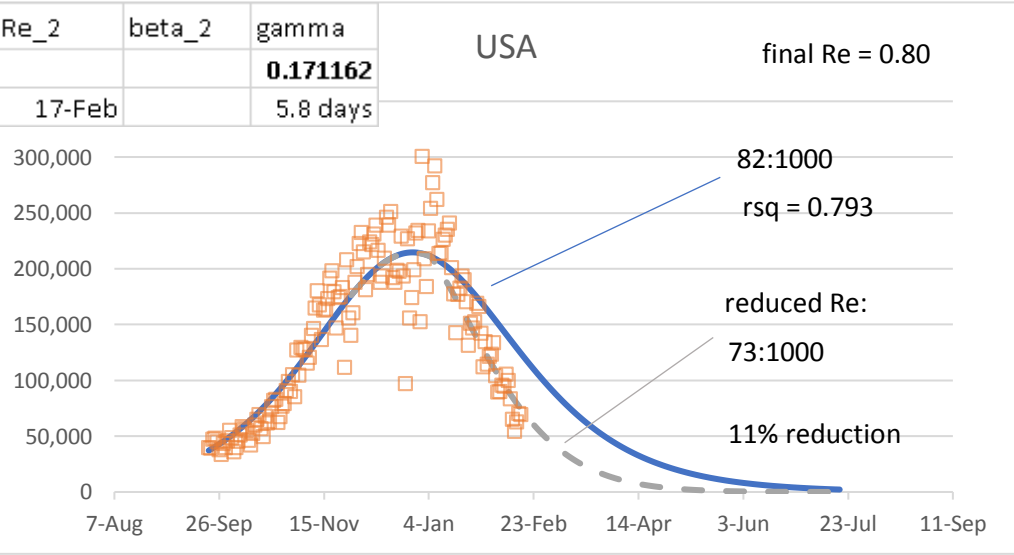


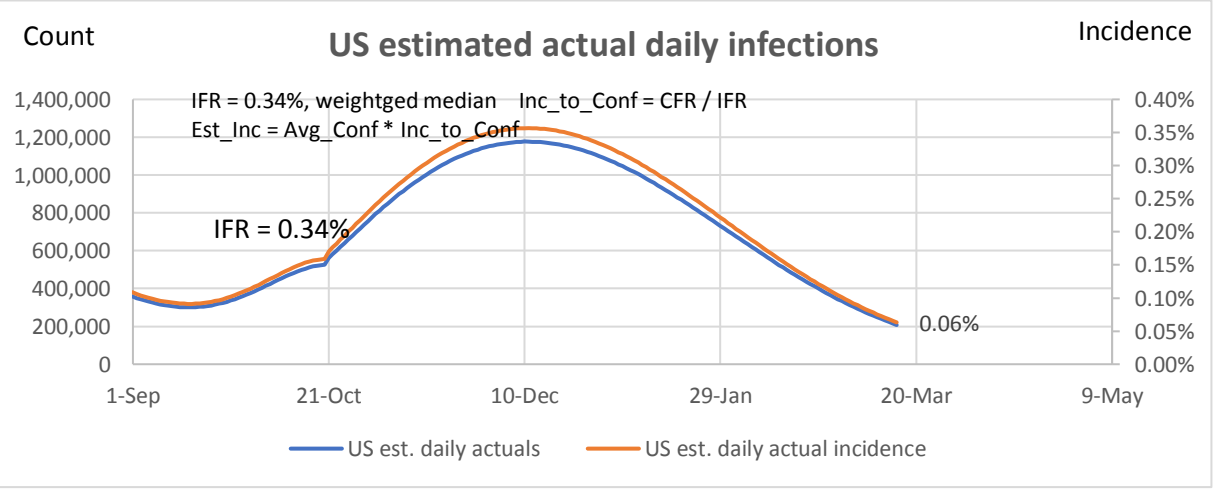
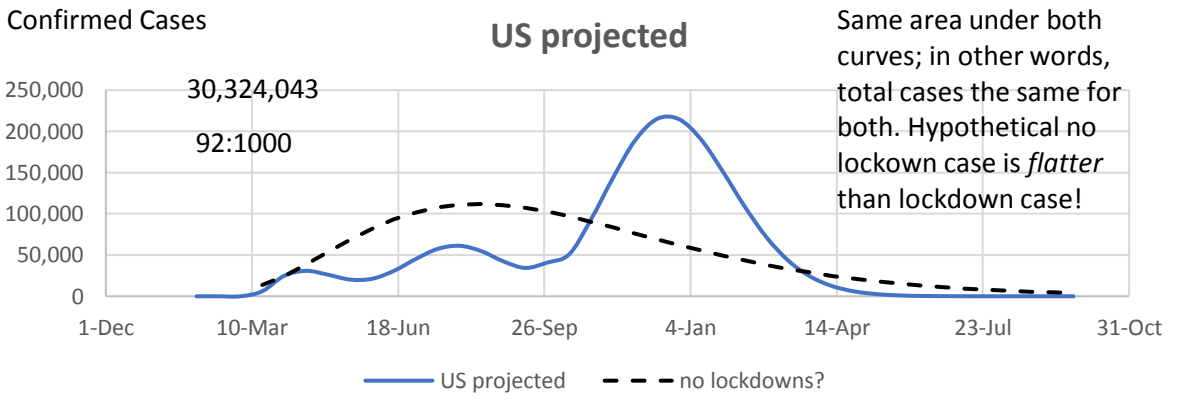
Experimental page : ratios of curve fit deaths to curve fit confirmed cases (CFR)



Demonstration of SIR model where R_e is linearly reduced to 0.80 at the end of the sequence:



Reducing the R_e while keeping gamma constant is the same as reducing contact rate. Contact rate is reduced through isolation, lockdowns, and vaccinations. Seems to indicate timing of start of measures is a big factor. The orange data taken as without measures, but we know certain measures were taken. Hard to determine effect, without a basis of comparison.



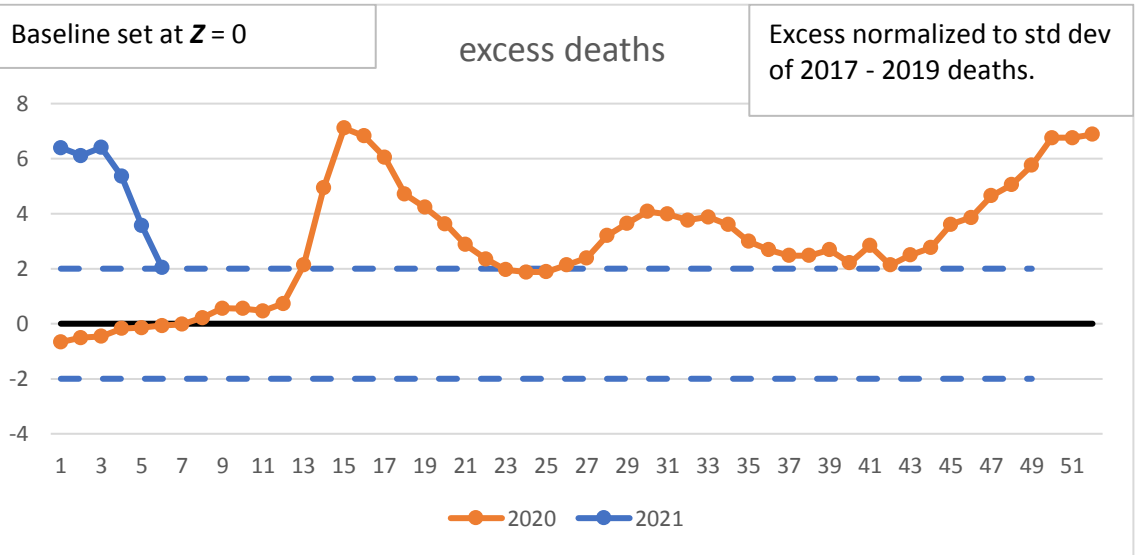
False Positives Demonstration

Use 0.06% from US est. incidence above as estimated daily incidence
Prevalence estimated as avg. infected period of 2 weeks X incidence
99% accuracy of test
0.06% X 14 = 0.840%

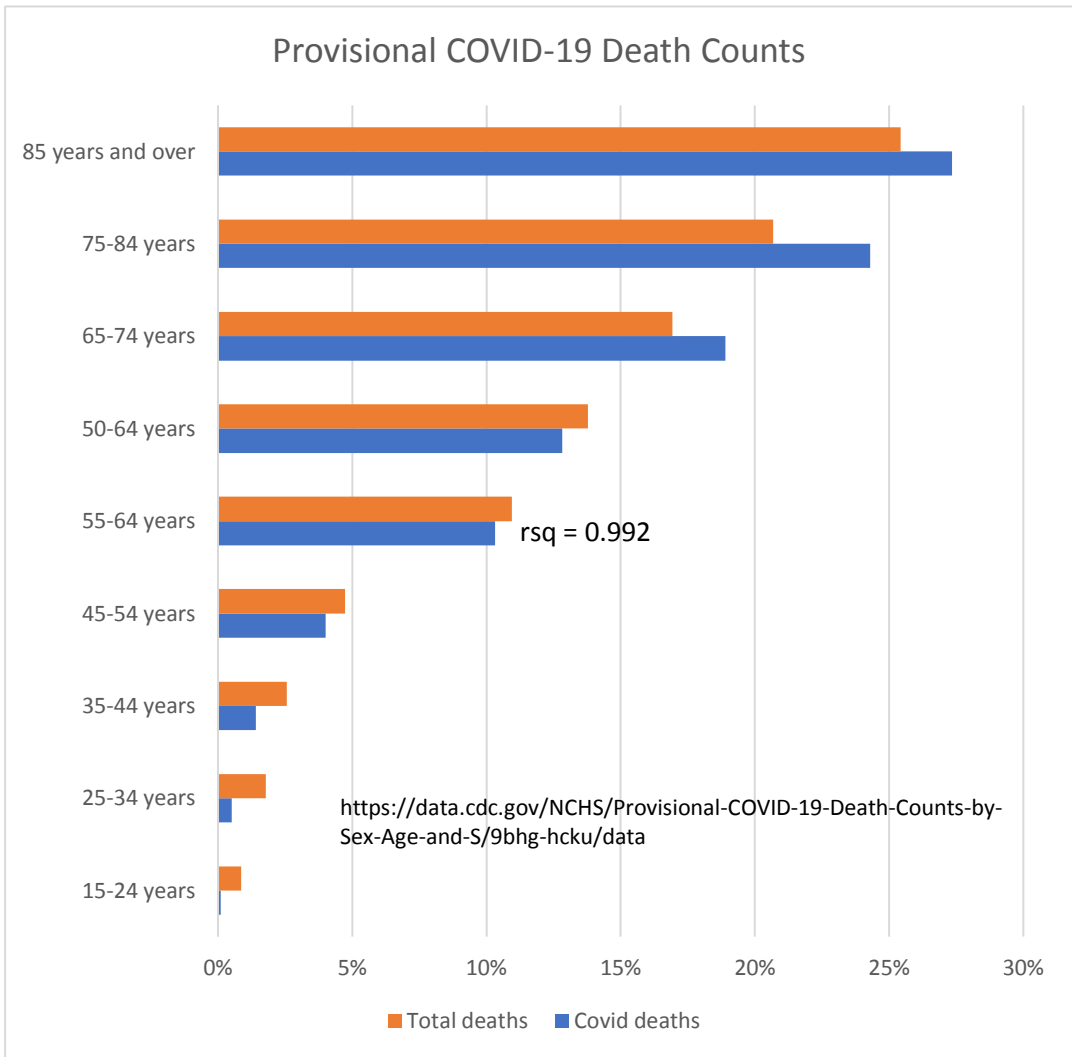
	Positive	Negative	
test pos	0.832%	0.992%	1.82%
test neg	0.008%	98.168%	98.18%
	0.840%	99.160%	100.00%

False pos. is more than half of total positives.
TRUE + 0.832%/1.82% 45.6%
FALSE + 0.992%/1.82% 54.4%
Total 100.00%

Counter-act this tendency by increasing test sensitivity. However this may increase false negatives, the recipients of which may be positive, think they're negative, and go spread it around some more.



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



USA Excess Deaths (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	1012:100,000	902:100,000	-
Diff.	153:100,000	43:100,000	110:100,000

3 yr average
859:100,000

28% of All-Cause excess deaths are non-CV19

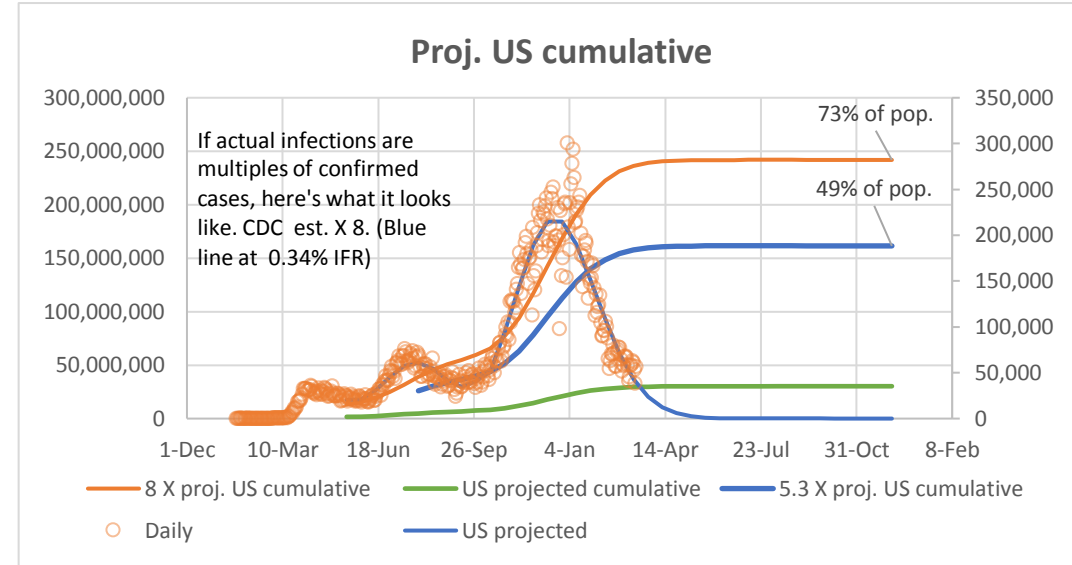
<https://data.cdc.gov/NCHS/Excess-Deaths-Associated-with-COVID-19/xkxf-xrst/data>

$K = 0.318$

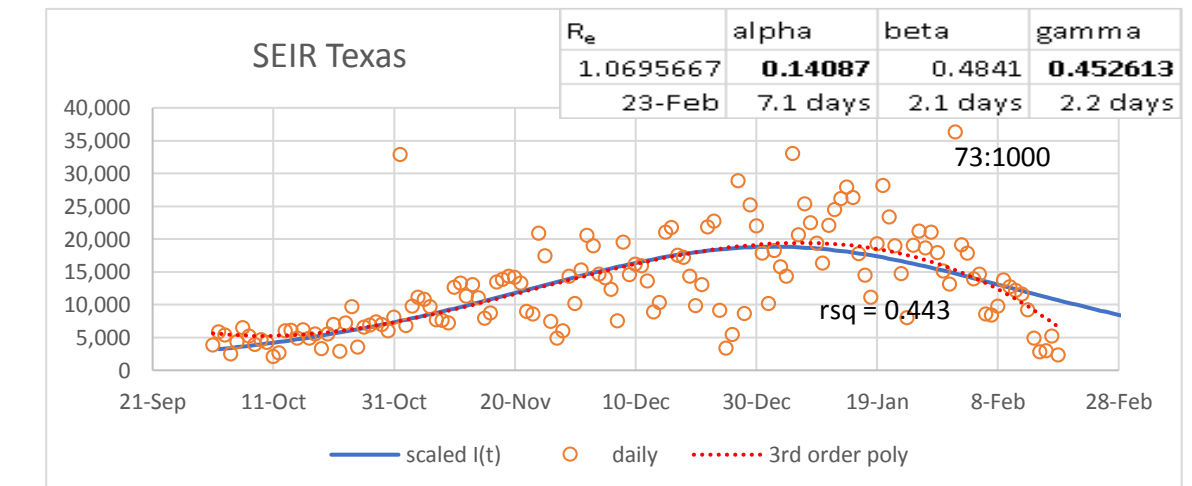
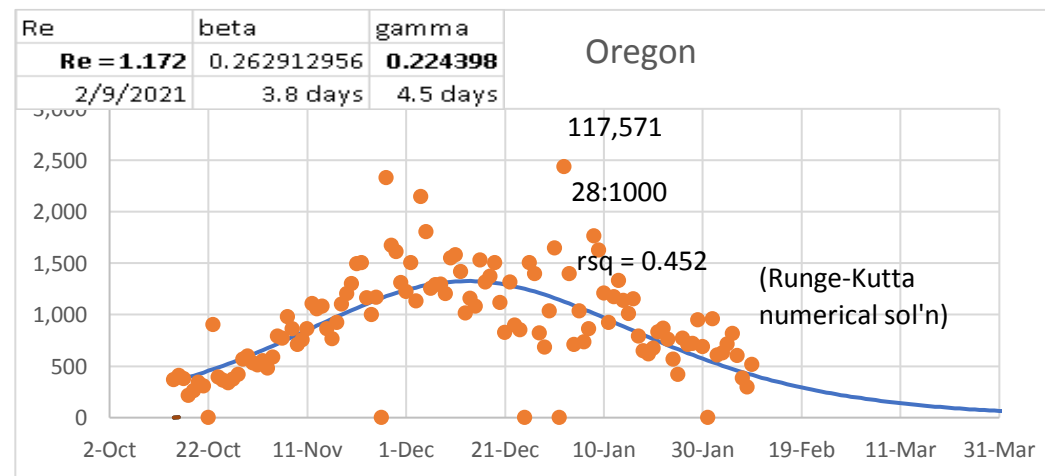
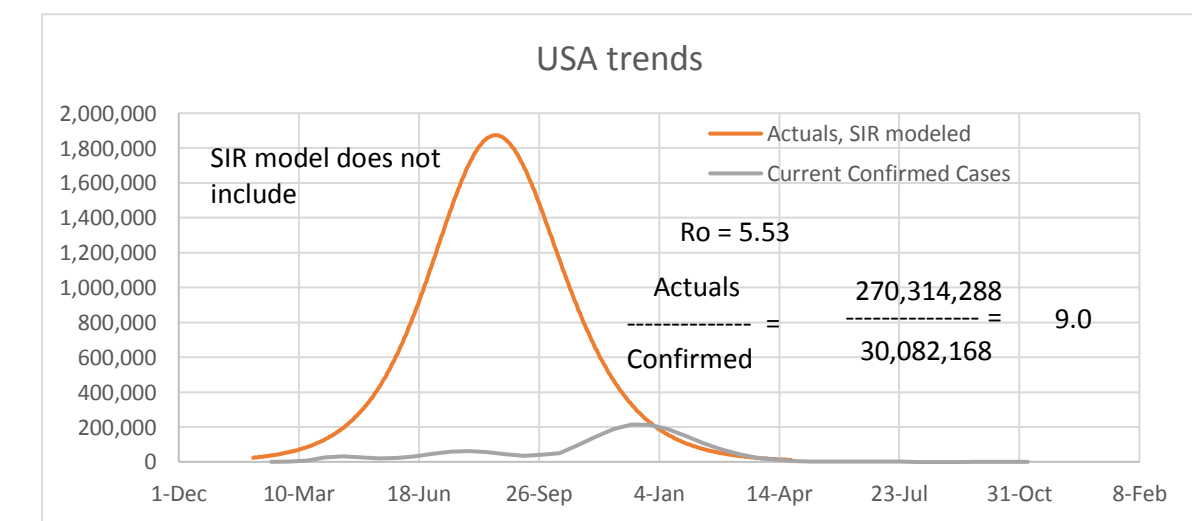
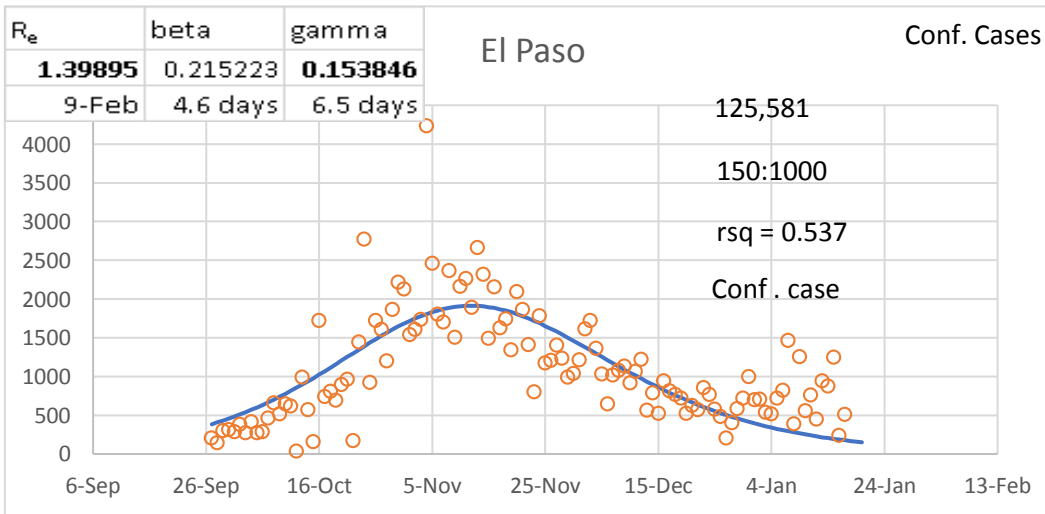
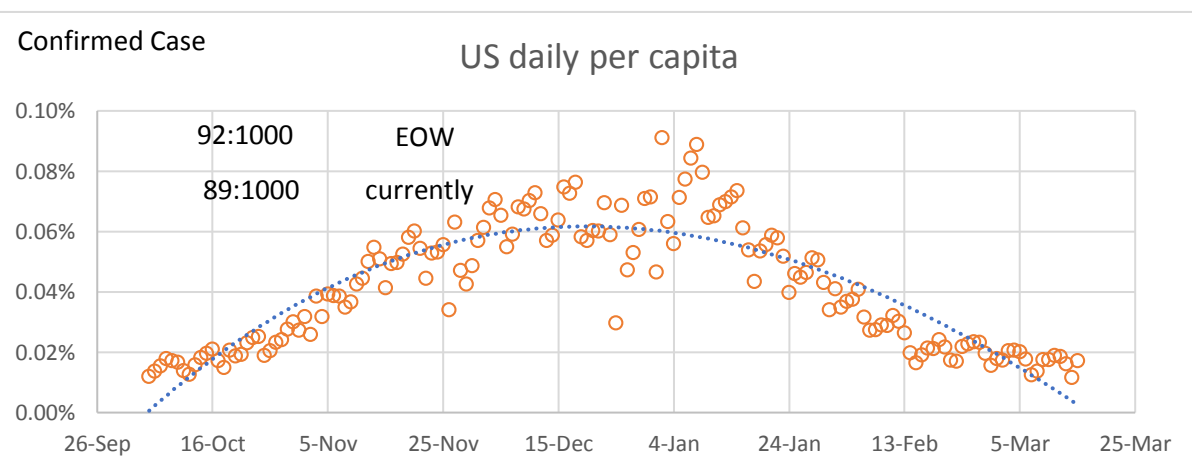
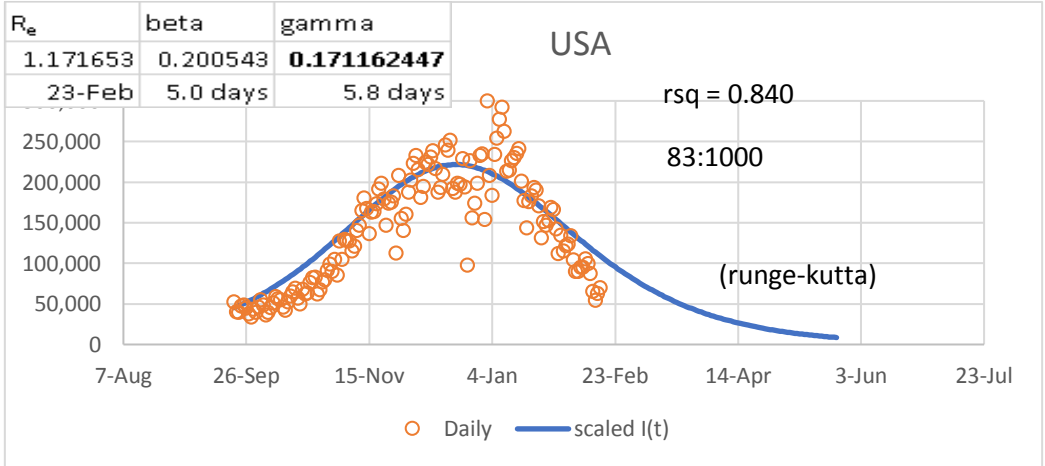
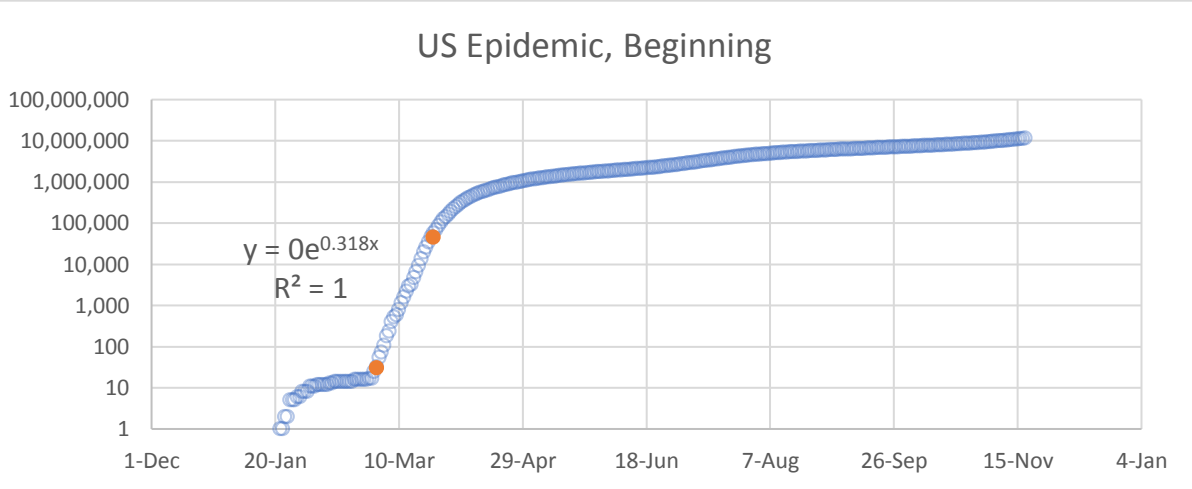
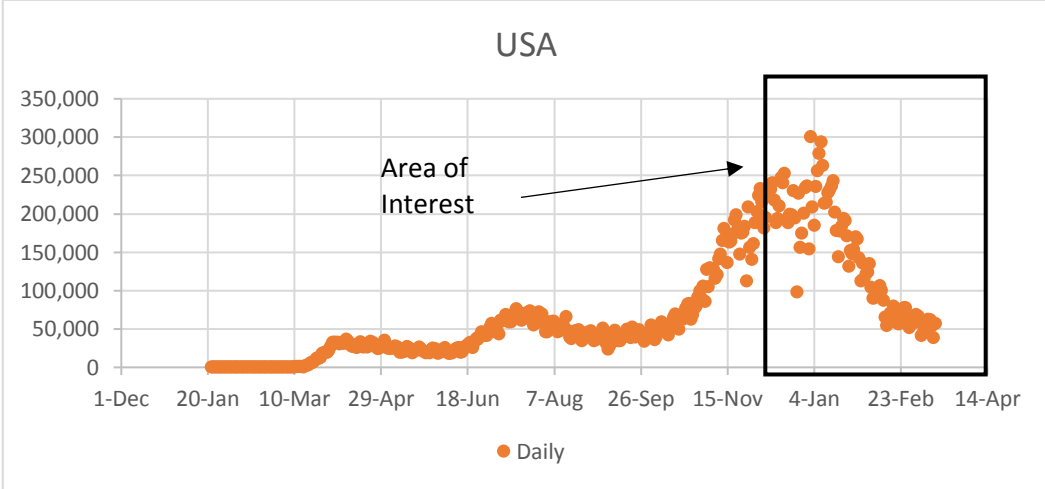
$\gamma = 0.171$ $R_o = \exp(K/\gamma) = 6.42$ 84% <=Herd immunity

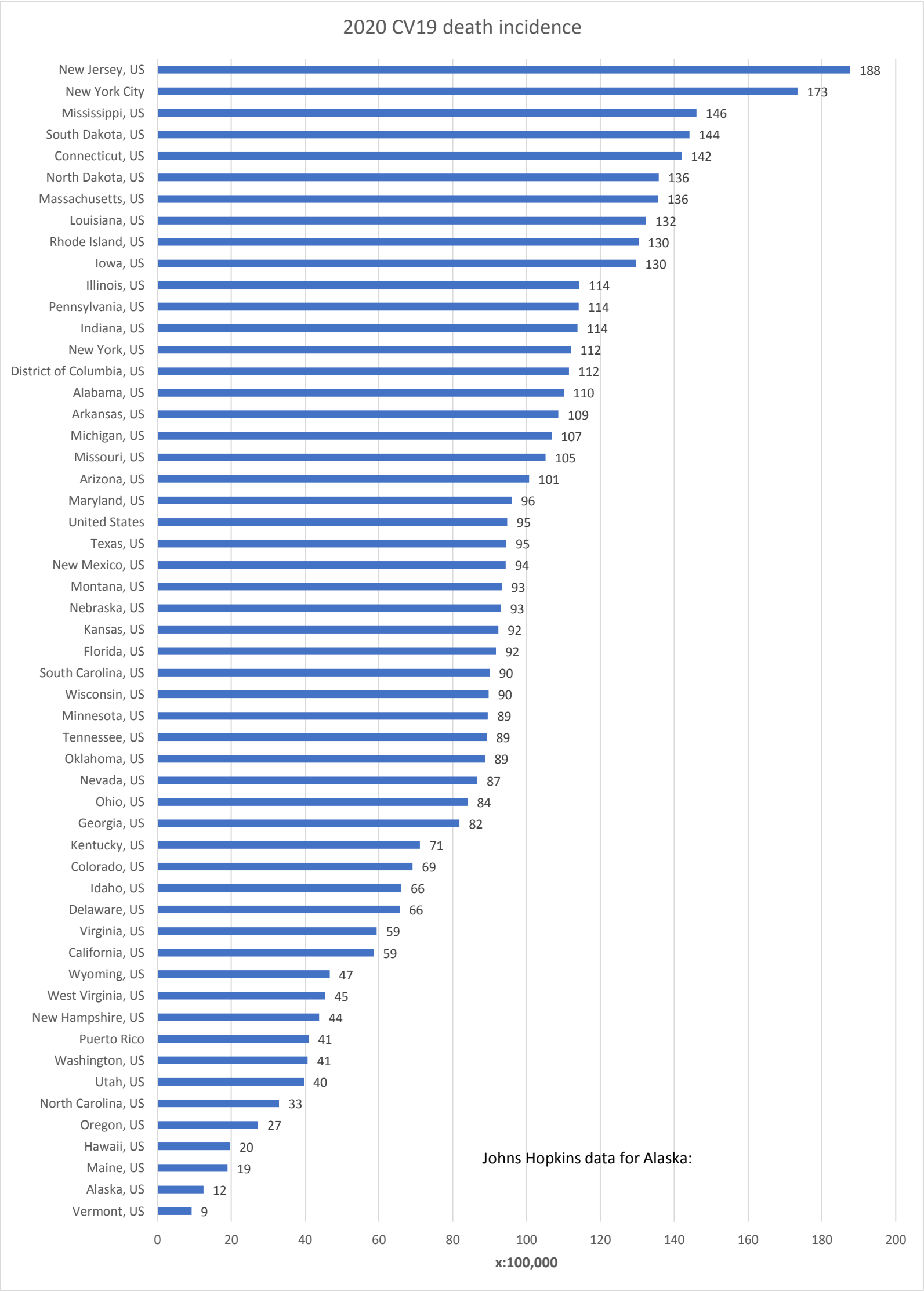
$\gamma = 0.286$ $R > [1 - 1/R_o]/N = 3.04$ 67%

R is recovered variable.



Here are some demonstrations of SIR model, using R_e , gamma, and beta





<https://data.cdc.gov/NCHS/Weekly-Counts-of-Deaths-by-State-and-Select-Causes/muzy-ite6/data>