Reasoning about Fatality Rate of Covid19

Sept 24, 2020

From https://coronavirus.1point3acres.com/en

_ast updated at : 2020-09-24 12:00 CDT

Location	Cases	Deaths	Recovered	Fatality
United States	+13,208 7,091,092	+339 206,228	+1,936 3,802,661	2.9%
World	+262,748 31,779,835	+5,563 975,104	+266,008 21,890,442	3.1%

Location	Cases	Deaths	Fatality
Ø CDC	7,091,092	206,228	2.9%
► California 🔓 🚨 🤌 🗓	+167 796 ,8 17	+3 15,316	1.9%
► Texas 🔓 🗸 🤌 🕦	736,326	15,137	2.1%
▶ Florida 🔓 🚨 🤌 Ø	+2,543 693,042	+177 13,795	2%
▶ New York 🔓 🗸 🤌 🕦	456,922	33,090	7.2%
▶ Georgia 🔓 🚨 🤌 🔗	310,221	6,777	2.2%
▶ Illinois 🔓 🗸 🤌 Ø	279,120	8,508	3%
► Arizona 🔓 🚨 🤌 ⊘	215,284	5,525	2.6%
▶ New Jersey 🏠 🕹 🛕	201,128	16,208	8.1%

The Denominator

- 1. Past Data on "confirmed cases": by <a>State over Time (CDC data)
 - <u>Projection of # of "Confirmed" Cases</u>: predicting the JHU/CDC number, which reflects "confirmed cases" not actual cases.
- 2. Estimating true number of covid infections from seriological tests.
- CDC study; Dr. Redford: 10 times higher, July;
- Eric Topol (Scripps): 8 times higher, Aug.
- Difference reducing with increased testing
 - Projections of "True Number".
 - 4 <u>Model based estimates</u> (ICL, IHME, London, YYG)
 - IHME projections

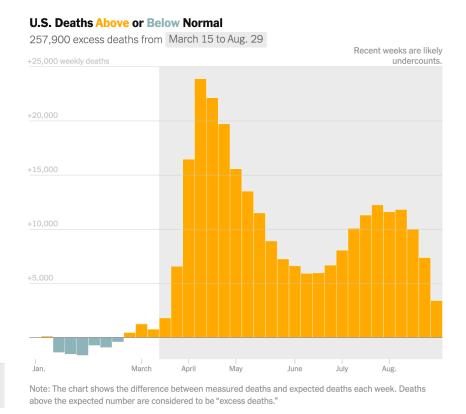
The Numerator

How many of reported deaths should be attributed to Covid? Only 6%?

• "Only 6% of the people actually died from COVID". The others "died from other reasons."

Excess Deaths

- From https://www.nytimes.com/interactive/2020/05/05/us/coronavirus-death-toll-us.html Sept 22, 2020 (CDC data)
- <u>CDC provides detailed information about "excess mortality"</u>, with downloadable datasheets.

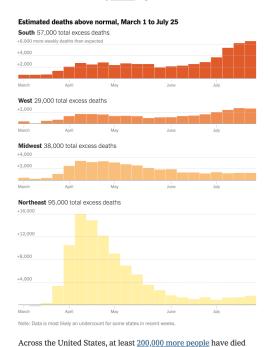


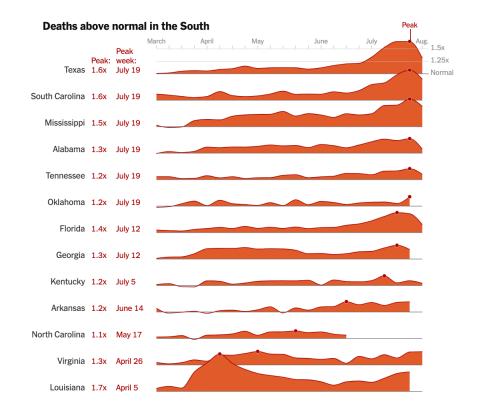
The True Coronavirus Toll

The New York Times

The True Coronavirus Toll in the U.S. Has Already Surpassed 200,000

By Denise Lu Aug. 13, 2020





Epilogue: From The Economist, 9/26/2020

Briefing

Sep 26th 2020 edition >

One million and counting

The covid-19 pandemic is worse than official figures show

But some things are improving, and it will not go on for ever

The excessive force of destiny

The Economist has gathered all-cause mortality data from countries which report them weekly or monthly, a group which includes most of western Europe, some of Latin America, and a few other large countries, including the United States, Russia and South Africa (see lower part of data panel). Between March and August these countries recorded 580,000 covid-19 deaths but 900,000 excess deaths; the true toll of their share of the pandemic appears to have been 55% greater than the official one. This analysis suggests that America's official figures underestimate the death toll by 30% or more (America's Centres for Disease Control and Prevention have provided a similar estimate). This means that the real number of deaths to date is probably a lot closer to 300,000 than 200,000. That is about 10% of the 2.8m Americans who die each year—or, put another way, half the number who succumb to cancer. And there is plenty of 2020 still to go.