Infographic: COVID-19 herd immunity threshold likely varies from region to region

[A] lot of nuance is involved in calculating exactly how much of the population needs to be immune [to COVID-19] for herd immunity to take effect and protect the people who aren't immune.

Let's say the R0 for COVID-19 is 2.5, meaning each infected person infects, on average, two and a half other people (a common estimate). In that case, the herd immunity threshold for COVID-19 is 0.6, or 60%. That means the virus will spread at an accelerating rate until, on average across different places, 60% of the population becomes immune.

At that point, the virus will still spread, but at a decelerating rate until it stops completely.

...

However, things quickly get complicated. The herd immunity threshold depends on how many people each infected person actually infects — a number that can vary by location. The average infected person in an apartment building may infect many more people than the average infected person in a rural setting. So while an R0 of 2.5 for COVID-19 may be a reasonable number for the whole world, it will almost certainly vary considerably on a more local level, averaging much higher in some places and lower in others. This means that the herd immunity threshold will also be higher than 60% in some places and lower in others.

heedrimmunitypdiagram

If enough people are immune, the virus has fewer pe





Only one p

Read the original post