

# THE ALCIVAX

**Alcimed** knows all you want for Christmas is an end to COVID, but this virus is not ready to go quietly into that silent night just yet.

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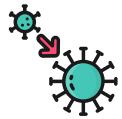


Edition #48 - 22 December 2021

## Welcome to the Omicron-mass

In 2019, SARS-CoV-2 was poised to start ruining people's winter holidays using Chinese New Year to rapidly spread the alpha variant across the world. Pandemic Year 3 will be no different as the omicron variant sweeps across the globe just in time for Christmas. Many of us are asking ourselves, how is this still going on?

Pandemics are an arms race, pitting man against virus. While humanity has rushed to develop vaccines and treatments, SARS-CoV-2 has been picking up tricks of its own, such as increased transmission, higher viral loads, and immune evasion tactics. Based on what we know now omicron is better outfitted for battle than delta, but we are not without our own weapons.



**Omicron**

**4.2X**

more transmissible than the delta variant.

**2 days**

for omicron cases to double compared to 2 weeks for delta.

**3 days**

for omicron symptoms to develop, 4 days for delta

**70X**

faster replication than delta in the respiratory tract



Prefers the bronchi to the lungs



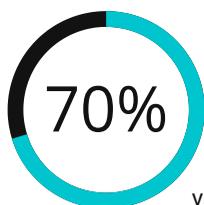
**Humans**

**89%**

reduction in hospitalization and death with Pfizer's PAXLOVID treatment

**10X**

decrease in viral load by Day 5, including omicron, strong reduction of any COVID treatment.



**Prevention of Hospitalization with 2 dose Pfizer vaccine, prior to booster**

Boosters shots increase neutralization to omicron variant providing additional protection.



**CD8 T cell responses not impacted by omicron mutations**

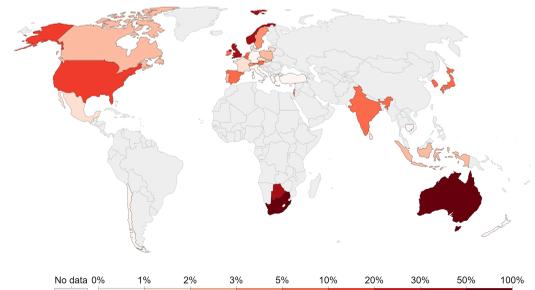


## The COVID Arms Race In Graphs

Omicron is quickly spreading the globe.

Share of SARS-CoV-2 sequences that are the omicron variant, Dec 20, 2021

Share of omicron variant in all analyzed sequences in the preceding two weeks.



Source: CoVariants.org and GISAID - Last updated 21 December 2021, 20:00 (London time)

Note: This share may not reflect the complete breakdown of cases, since only a fraction of all cases are sequenced. Recently-discovered or actively-monitored variants may be overrepresented, as suspected cases of these variants are likely to be sequenced preferentially or faster than other cases.

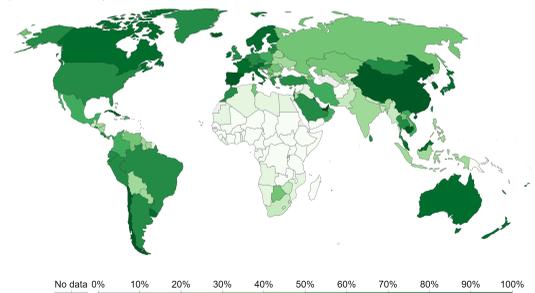
Our World in Data

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47.8% of the world is fully vaccinated for COVID.

Share of the population fully vaccinated against COVID-19, Dec 21, 2021

Total number of people who received all doses prescribed by the vaccination protocol, divided by the total population of the country.



Source: Official data collated by Our World in Data - Last updated 22 December 2021, 08:10 (London time)

Note: Alternative definitions of a full vaccination, e.g. having been infected with SARS-CoV-2 and having 1 dose of a 2-dose protocol, are ignored to maximize comparability between countries.

OurWorldinData.org/coronavirus - CC BY

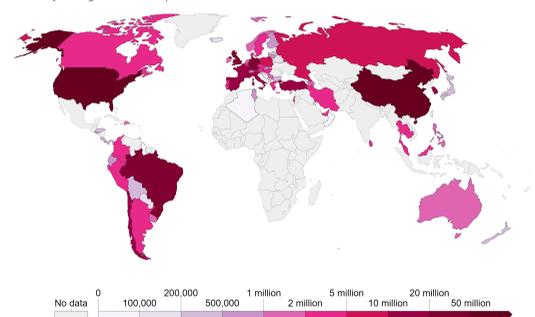
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448M booster doses have been distributed world wide mostly in Asia and Europe.

COVID-19 vaccine booster doses administered, Dec 21, 2021

Total number of vaccine booster doses administered. Booster doses are doses administered beyond those prescribed by the original vaccination protocol.



Source: Official data collated by Our World in Data - Last updated 22 December 2021, 08:10 (London time)

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Our World in Data

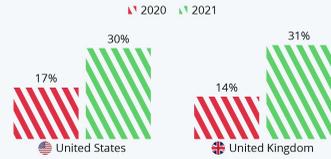
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# The Holidays are Still Happening

## Defiance Grows in Face of Another Covid Christmas

Share of adults saying they will not give up any Christmas traditions or activities in respective years



Respondents could choose from a list of activities including 'Other' and 'Don't know' (multiple). Figures shown here are the share choosing 'None of the above'. n=1,000+ online adults in each country. Conducted in November of each year. Source: Statista Global Consumer Survey



Image Credit: [Statista.com](https://www.statista.com)

With winter holiday celebrations having been largely canceled last year due to COVID-19, there is increasing reluctance to skip those same holiday gatherings this year, despite the rapid rise in Omicron cases. Pandemic fatigue is likely the culprit.

The Netherlands implemented new lockdowns as even other EU governments are slow to implement new restrictions before the end of the holidays. In the UK, isolation period is down to 7 days from 10. Portugal will close nightclubs and bars again after Christmas. But other restrictions in Europe have not been announced.

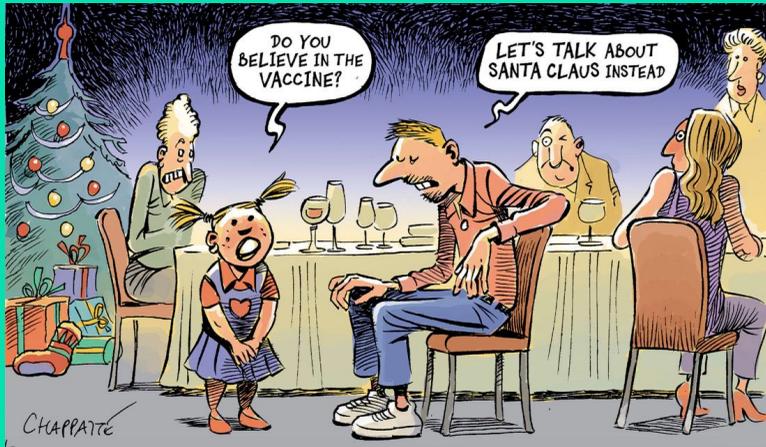


Image Credit: [Chappatte](https://www.chappatte.com)



## It's Not OK To Fake It

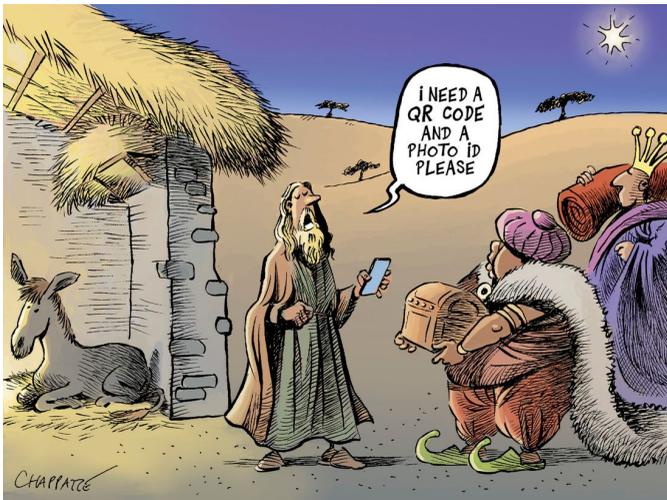


Image Credit: [Chappatte](https://www.chappatte.com)

While COVID passes have been used in Europe to stop the spread of COVID-19 and encourage people to get vaccinated, the French police have found over 180,000 fake health passes as part of 400 ongoing investigations. The penalty for falsifying passes is 5 years in prison and a 75K Euro fine.

This indicates that vaccine resistance is much higher than people may realize and is likely to significantly impact France's ability to control the spread of Omicron in the future.



## But is Omicron worse?

The question that remains is whether or not the omicron variant is milder, the same, or worse at causing disease than any of the other variants. For now the data is mixed so no definitive conclusions have been made. Early reports from South Africa suggested that Omicron may be milder than Delta, but a new report from the UK comparing Omicron to Delta demonstrates that there is no reason to think it is milder than Delta.

The World Health Organization's chief scientist warned on Monday that we should not make quick assumptions as it was too early to conclude the Omicron variant was milder. Given the higher numbers Omicron could still make enough people sick to "overburden" healthcare systems. "...It is probably unwise to sit back and think this is a mild variant, it's not going to cause severe disease, because I think with the numbers going up all health systems are going to be under strain." Soumya Swaminathan told Geneva-based journalists.

The most concerning news with Omicron is the high rate of re-infection.

**5.4X** risk of re-infection compared to Delta variant



## All Joking Aside

The COVID-19 pandemic has been causing supply chain shortages across many industries, but one of the starkest is its impact on the restaurant industry, which has brought the dramatic growth of the industry to a halt.

Restaurants from reasonable to expensive are struggling to remain open with widespread labor shortages across the globe. While the industry has tried to adapt as the pandemic unfolded, the question remains, what is the future of dining out post COVID?



Image Credit: [Bob Gorrell](https://www.bobgorrell.com)

## A Covid Christmas Present

A COVID Christmas Carol



Image Credit: [Bill Bramhall](https://www.billbramhall.com)

The Omi-Grinch



Image Credit: [Patrick Corrigan](https://www.patrickcorrigan.com)

Here Comes COVID



Image Credit: [Tom Purcell](https://www.tompurcell.com)

Boosting Moral



Image Credit: [Chappatte](https://www.chappatte.com)