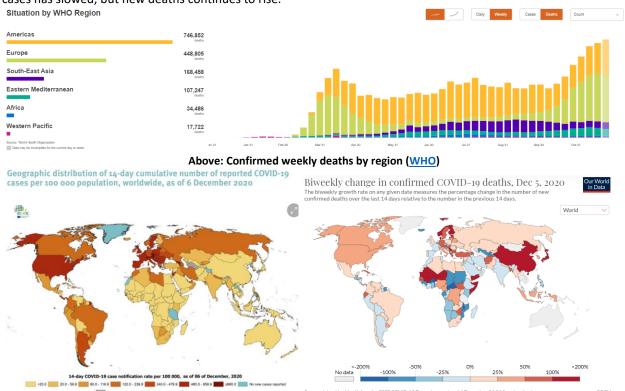
## COVID-19 Update November 29th - December 5th 2020

Over 65.8 million cases confirmed and reported, with over 1.5 million deaths reported to date (unofficially over 67.1 million cases and over 1.5 million deaths, over 19.1 million active cases and over 46.4 million recovered). The US, Brazil, Mexico, are reporting the highest daily incidences in death in the last 24 hours. The United States, Brazil, India, Russia, Italy, Germany, the UK, France, Poland, Iran, Mexico, Ukraine, reporting the highest daily increases, all reporting above 10,000 newly confirmed cases in the past 24 hours. Global accellaration of new cases has slowed, but new deaths continues to rise.



Note: Upper left (ECDC) map changed scale for shading compared to the previous week to give more definition to the many countries reporting exceptionally high caseloads.

## **News / Political Context**

 Countries with highest reported new cases per 1 million daily increases (Dec 5<sup>th</sup>)<sup>2</sup>:

Georgia: 1,366
 Kosovo: 1,149
 Lithuania: 1,046
 Serbia: 1,015
 Croatia: 995

Countries with highest reported new deaths per 1 million (Dec 5<sup>th</sup>)

Kosovo: 31.6
 San Marino: 29.5
 Slovenia: 22.6
 Hungary: 20.0

Bosnia and Herzegovina: 17.4

# Days to reach 10 million new cases

- 1 million to 10 million- 86 days
- 10 to 20 million- 44 days
- 20 to 30 million- 37 days
- 30 to 40 million- 31 days
- 40 to 50 million- 21 days
- 50 to 60 million- 17 days
- Testpositivity is highest in Mexico (48%), Bulgaria (38%), Oman (36%), Serbia (36%), Croatia (36%).
- Daily confirmed deaths doubling most rapidly in, Greece, Sri Lanka, Lithuania, Bulgaria, Slovenia,
   Lativa <sup>3</sup>
- Cases doubling rapidly in Serbia, Lithuania, Georgia, Lativa, Mongoia, Estonia.<sup>4</sup>
- 86% of countries are reporting case mortality ratio (CFR) of 3% or less. However some countries are reporting significantly high CFR such as Yemen, reporting CFR of 28% and Mexico reporting 9.5%.<sup>5</sup>
- Lancet has launched an **independent research group** from WHO looking into the **origins of SARS-CoV-2** led by head of EcoHealthAllience
- Update in <u>WHO guidance</u> for **face masks** to include suggestions for various transmission scenarios and vulnerable groups:
  - Suggestion to wear a face mask indoors whether or not physical distancing can be maintained unless sufficient air circulation can be maintained

<sup>&</sup>lt;sup>1</sup> Official numbers and WHO visualizations available <u>here</u>

<sup>&</sup>lt;sup>2</sup> Our World in Data <u>Incidence</u>

<sup>&</sup>lt;sup>3</sup> https://ourworldindata.org/coronavirus

<sup>&</sup>lt;sup>4</sup> Reference to ECDC data using <a href="https://ourworldindata.org/coronavirus">https://ourworldindata.org/coronavirus</a>

<sup>&</sup>lt;sup>5</sup> Our World in Data

- Those in the high risk group (over 60 or with underlying conditions) are recommended to wear medical masks rather than cloth face coverings
- Anyone providing care or living in the same space as somsone suspected or confirmed with COVID-19 should wear a medical mask
- Children 12 and over are expected to follow same guidelines as adults, children 5-12 recommended to wear masks for source control given specific contexts (especially in high risk settings or around elderly)
- WHO beginning a <u>literature review</u> on the evidence and recommendations to mitigate COVID-19 in aviation and travel sector.
- Mentorship programme/ "twinning" among EMTs with more experience partnering with states or organizations hoping to grow EMT capacity (i.e. Germany partnering recently with Georgia).
- US CDC like several other countries have <u>adjusted quarantine time</u> depending on a number of factors, including if no symptoms are experienced after exposure quarantine can be reduced to 10 days (rather than 14) and reduced to 7 days if a negative test is returned within 48 hours.

#### Africa Region

- The highest number of new cases and deaths were reported from South Africa, Kenya, Ethiopia, and Uganda.
- South Africa has seen a 20% increase in new cases for 3 weeks straight.

#### Americas Region

- The region saw an increase in cases by 3% and deaths by 2%. Countries reporting the highest incidence of cases and deaths include the US, Brazil, Mexico, Comolmbia and Argentina, accounting for 93% of new cases in the region.
- Colombia is reporting a break-down of cases as follows: 70% are at home, 26% in general hospitalization and 3% in intensive care units (ICUs)
- o The **US** represents the highest number of new cases in the region:
  - US reached over 100,000 COVID-19 hospitalizations which is 40% more than at the peak of the previous 2 surges
  - Found social distancing in the US plumited on average leading up to the massive surge in COVID-19

## MENA Region

- There has been a slight reduction reported from the region in cases (1%) and deaths (8%) in the past week. The highest number of new cases are reported from Iran, Jordan, Morocco, Pakistan (IFRC AP region) and Iraq.
- Palestine has seen an increase of new cases and deaths by 43% from the past week. Health services continue to operate with 50% of beds in hospitals and 78% of ICU capacity occupied by COVID-19 patients.

## • European Region:

- While the region has seen an overall decreasing trend for several weeks, it still accounts for 40% of new global cases and 50% of new global deaths as almost half of the countries within the region continue to show an increasing trend. Italy, Russia, Poland, Germany and the UK had the highest number of new cases in the region.
- Case incidence and deaths continues to rise among older age groups. While absolute values in new cases are seeing a slight decrease across the region they remain consistently high suggesting wide-scale transmission.
- o Turkey has seen a 58% increase in cases compared to the previous week
- Serbia has conducted over 1.7 million tests to date, with over 137,000 in the past week and a test positivity of 34%.
- o Test positivity has continued to increase in Croatia, Lativa, Lithuania and Sweden.
- O Hospitalizations: Pooled data from 18 countries reporting to ECDC show that 1.8 patients per100,000 in ICU are COVID-19
- Switzerland has a 14-day incidence of 595.5 new cases per 100,000 population, with 1684 hospitalizations and 1024 deaths in the past 14 days. Current test positivity rate (the proportion of tests that are positive) is 18.6% test positivity (PCR) and 16.7% (antigen) for the last 14-days (test positivity above 5 is considered high).

## Asia Pacific Region:

- India accounts for 80% of all cases in the Southeast Asia region. A decrease in new weekly cases
  was observed in Myanmar, Sri Lanka and the Maldives, whereas an increase was reported from
  Indonesia, Nepal, Thailand and Bhutan. Overall there is a 4% increase compared to the previous
  week.
- The WHO Western Pacific region reported an increase in cases by 12% compared to the previous week with the highest number of new cases reported from Japan, the Philippines, Malaysia, Republic of Korea, and French Polynesia. The Philippines and Japan represent 87% of cases in the region.
- A 39% increase in cases in Indonesia was reported compared the the previous week with test positivity rate estimated at 14%.

 The Republic of Korea saw a 41% increase in cases compared to the previous week. Younger groups appear to be at the root of transmission at this time, including military institutions, educational institutions, sporting facilities, healthcare facilities and gatherings among friends.

## Recent Research/ Evidence

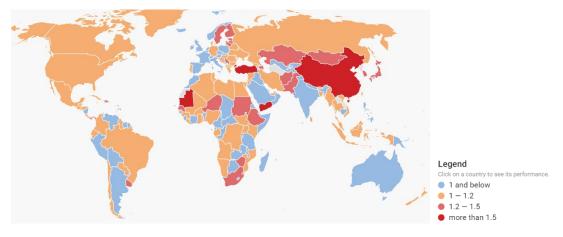
- Study from Harvard and Mass General found that out of all tests that were positive, 1.6% originally had
  falsely tested negatively. Most individuals who had false negatives had symptoms and chest radiography
  that matched COVID-19 cases. The authors recommend repeat testing for individuals suspected of COVID19.
- Researchers have found a significant inverse correlation between mumps titers from MMRII and COVID-19 severity in a study published in <u>American Society for Microbiology</u>. Similar correlations were not found for measles or rubella titers, although more studies are needed.
- By using large-scale self-reported data from a mobile application, researchers in the UK were able to
  identify 75% of the regions with the highest incidence of COVID-19 cases (as reported by UK GOV),
  suggesting practical application of self-reporting symptoms and mobile applications in areas where testing
  may not be as prevalent to inform government strategy and response.<sup>6</sup>
- <u>Study</u> of seroprevalence in the US by American Red Cross and CDC found seroprevalence estimated at 1.4% from December 2019- January 2020 in the US showing the virus was likely circulating at low levels within the US before the first case was known.
- Pre-print study has found a direct correlation between the lifting of Eviction Moratoriums and COVID-19 Incidence and Mortality in the US
- In a cohort study of 9722 patients in NYC to understand racial and ethnic disparities in COVID-19, Black
  and Hispanic patients were more likely to test positive for COVID-19 than white patients, but the same
  trend was not observed (and was lower) for in-hospital CFRs, suggesting neighbourhood and context likely
  play a significant factor in the disproportionate out of hospital COVID-19 deaths among Black individuals.<sup>7</sup>

## **Clinical Trails**

- 49 candidate vaccines in clinical evaluation, 11 of which are at phase 3 evaluation
- UK first to approve Pfizer vaccine for emergency use individuals in long term care facilities and and frontline HCWs are the top categorized for vaccination followed by those at elevated risk of sever disease
- US FDA's Vaccines and Related Biological Products Advisory Committee is scheduled to meet on
  December 10<sup>th</sup> and 17<sup>th</sup> to review Pfizer and Moderna vaccine candidates requests for EAU. On December
  1<sup>st</sup> the US voted to extend the first doses of the vaccine to those in long-term care facilities as well as
  frontline healthcare workers. This will target an estimated 21 million HCWs and 3 million people living in
  LTCF. The next tier in phase one is to include non-medical essential workers and those at risk for severe
  disease including those over 65.
  - US CDC also considering "<u>vaccination cards</u>" for SARS-CoV-2 vaccines
- Solidarity trial of remdesivir, hydroxychloroquine, lopinavir, and interferon regimens found they had little or no effect on hospitalized patients with Covid-19, as indicated by overall mortality, initiation of ventilation, and duration of hospital stay.<sup>8</sup>

## Modeling & Forecasting

• Estimated current effective reproductive rate (<u>Lancet database</u>) as of 1 December 2020



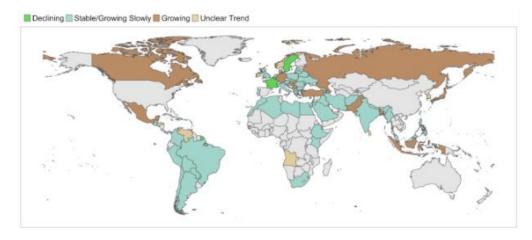
Projections for the reproductive number (ICL weekly projections) 9

<sup>&</sup>lt;sup>6</sup> Lancet 3 Dec 2020

<sup>&</sup>lt;sup>7</sup> <u>JAMA 4 Dec 2020</u>

<sup>&</sup>lt;sup>8</sup> <u>NEJM 2 Dec 2020</u>

Map: Estimates of transmissibility in countries with active transmission for the week. A country is defined to be in the declining phase if the 97.5<sup>th</sup> quantile of the effective reproduction number is below 1. It is defined to be in the growing phase if the 2.5<sup>th</sup> quantile of the effective



## As of December 1<sup>st</sup> estimates for the effective reproductive number:

- Europe: Average of about 1, Highest: Serbia & Denmark: estimated around 1.5
- Asia: Average of about 1, Highest: Japan 1.5
- Africa: Average about 1, Highest: South Africa 1
- MENA (not included): Highest: Palistine (1.5)
- North & Central America: Average of about 1, Highest: Mexico & Belize 1.5
- South America: Average of about 1, Highest: Paraguay: 1.5
- IHME projections for daily infections using current trends, easing of mandates and increased mask use

## **Humanitarian Impacts**

- Great resource for baseline indicators for maternal and child health by country profile developed to use when doing comparisons on how the pandemic has affected vulnerable groups (Countdown to 2030)
- 500,000 more people are expected to die of HIV/ AIDS complications due to challenges faced during the COVID-19 pandemic.
- Mapping of COVID in Humanitarian settings available here depicted below showing COVID-19
   cases compared to where vaccination campaigns have been postponed
- <u>Updated repository of Maternal and Child health and Nutrition relating to COVID-19 can be</u> found here.

# Guidance Launched or Highlighted This week

Weekly update from WHO available here (last updated Epi 1Dec)

- WHO: Rapid hospital readiness checklist: Interim Guidance
- WHO: <u>Updated Interim Guidance on Mask use as well as videos and images</u>
- US CDC Quarantine Guidance

## **Useful Sources**

Some additional sources – such as specific journal articles are shared as a foot note and saved to the "Evidence" folder in Teams.

ALNAP launched COVID-19 response portal

Atlantic COVID-19 Tracker (US focus)

**BMJ COVID-19 resources** 

BMJ living Guidance on clincal treatment for COVID-19 (from WHO, including visuals)

**European Centre for Disease Prevention and Control** 

**End Coronavirus Visualizations** 

Evidence Aid COVID-19 Evidence

Center for Humanitarian Health: COVID-19 Maternal and Child Health, Nutrition Literature Reviews

reproduction number is above 1 and the width of the 95% CrI is less than 1. If the 2.5<sup>th</sup> quantile of the effective reproduction number is below 1 and the width of the 95% CrI is less than 1, we define the phase as stable/growing slowly. If the width of the 95% CrI is more than 1, the phase is defined as uncertain. Note that estimates of transmissibility rely on a constant rate of reporting of deaths. This assumption does not always hold. ICL short term forecast

The COVID tracking project (US focus)

Global Health 5050 Sex desegregated data

**Health Map** 

Imperial College of London

ISARIC COVID-19 resources

Johns Hopkins Center for Health Security and CSSE

**Humanitarian platform for COVID-19** 

The Lancet

LSHTM COVID-19 mapping tool

New England Journal of Medicine

Next Strain (Phylogeny of SARS-CoV-2)

Our world in Data

PLOS COVID-19

**ProMed** 

Switzerland Specific data and charts

WHO

WHO Technical Guidance for COVID-19

MobLabs

MobLabs Domestic and international risk of importing a case

**World Meters**