

Weekly COVID-19 Epidemiological Update - Region of the Americas

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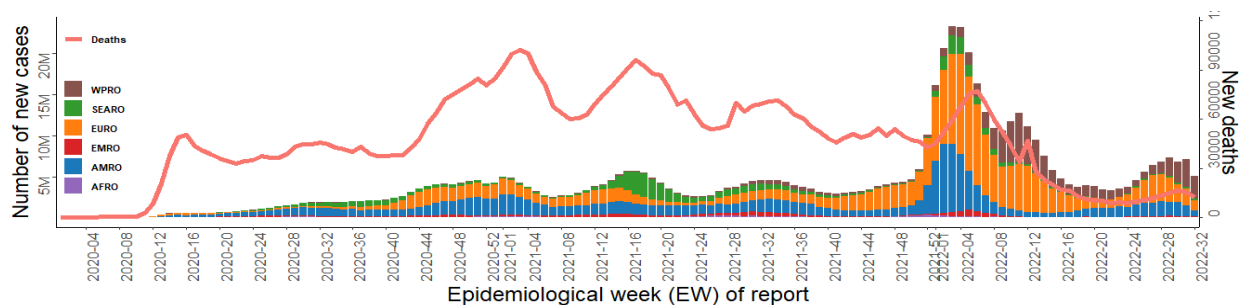
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Executive Summary

- **Since the onset of the pandemic** in 2020 and up to August 16, 2022, a cumulative total of 587 million COVID-19 cases including 6.4 million deaths were reported from all six WHO regions. During epidemiological week (EW) 32, cases decreased in all WHO six regions (range: -40.3 - -10.7%) and deaths decreased in four regions (range: -38.9 - -7%) while they increased in WPRO (30.7%) and SEARO (11.7%).
- **Globally**, approximately 5,275,217 new COVID-19 cases were reported in EW 32 (August 07, 2022-August 13, 2022) - a -26.3% decrease compared to EW 31 (July 31, 2022-August 06, 2022) (**Figure 1**). For the same period, 14,019 new COVID-19 deaths were reported globally – a -12.5% relative decrease compared the previous week.
- **In the region of the Americas**, 1,167,260 cases and 6,160 deaths were reported in EW 32 - a -16.1% decrease in cases and -3.8% decrease in deaths compared to the previous week.
- At the subregional level, **COVID-19 cases** decreased in all four subregions (range: -18.3 - -7.5%), whereas **COVID-19 deaths** increased in all the subregions (range: 1.2 – 8.6%) except for the North American subregion (-7.7%).
- The overall weekly case notification rate for the region of the Americas was 113.8 cases per 100,000 population during EW 32 (136.1 the previous week). Between EW 32 and 31, the 14-day COVID-19 death rate was 12.3 deaths per 1 million population (12.9 the previous two weeks).
- Among 29 countries/territories in the region with available data, **COVID-19 hospitalizations** increased in 5 countries and territories (range: 4.8% - 200%) during EW 32 compared to the previous week. Among 22 countries and territories with available data, COVID-19 **ICU admissions** increased in 8 countries and territories (range: 5% - 100%).

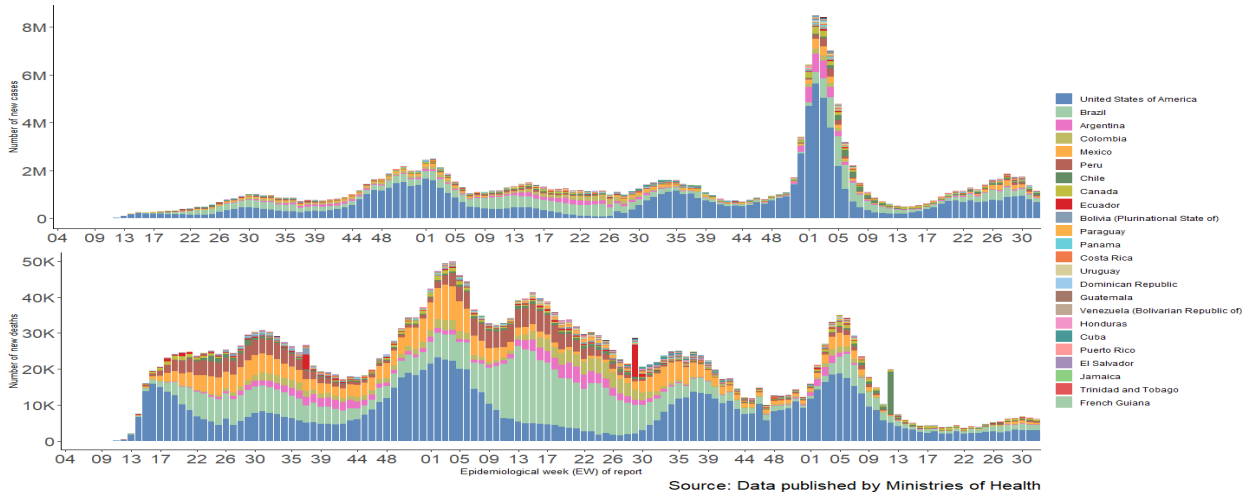
Figure 1: COVID-19 cases and deaths by epidemiological week (EW) of report and WHO region. EW 4, 2020 - EW 32, 2022.



Source: Data from WHO COVID-19 Dashboard

Region of the Americas - An overview

Figure 2: COVID-19 cases and deaths by epidemiological week (EW) of report and country/territory. Region of the Americas. EW 3, 2020 - 32, 2022.



During EW 32, 1,167,260 new **COVID-19 cases** were reported in the region of the Americas - a relative decrease of -16.1% compared to previous week (**Figure 2**). The highest number of COVID-19 cases in during EW 32 was reported from the North American subregion (745,484 cases, -16% decrease compared to the previous week). (**Table 1**). During EW 32, the highest proportion of weekly COVID-19 cases were reported by United States of America (679,653 new cases, -14% decrease), Brazil (153,661 new cases, -24.6%decrease), Chile (72,562 new cases, 14.1% increase).

Table 1: Weekly change (%) in cases and deaths between EW 31 and EW 32 by subregion. Region of the Americas

Subregion	Total Cases	Total Deaths	Cases EW 31	Deaths EW 31	Cases EW 32	Deaths EW 32	% Change Cases	% Change Deaths
Caribbean and Atlantic Ocean Islands	4,115,372	34,407	35,052	93	32,412	101	-7.5%	8.6%
Central America	3,829,327	52,574	41,300	161	36,510	163	-11.6%	1.2%
North America	102,758,011	1,401,111	888,021	3,705	745,484	3,420	-16.1%	-7.7%
South America	62,804,578	1,317,780	427,229	2,447	352,854	2,476	-17%	1.2%

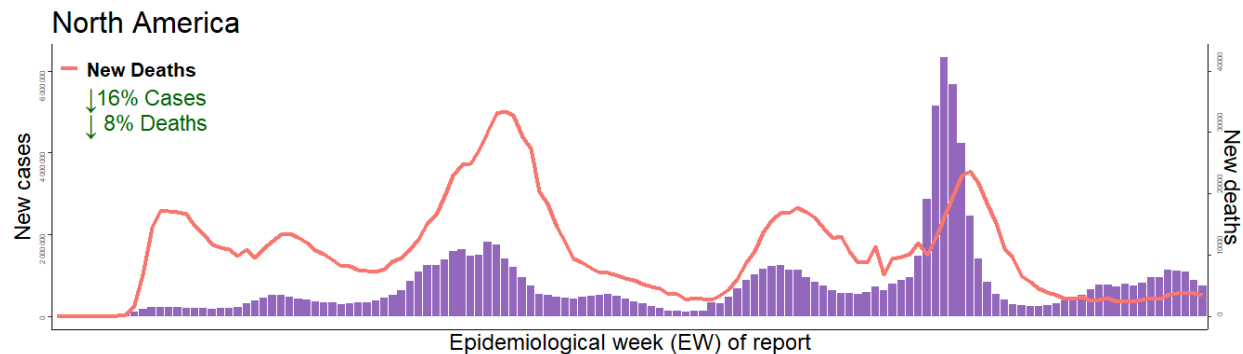
For the same period, 6,160 **COVID-19 deaths** were reported in the region of the Americas - a relative decrease of -3.8% compared to previous week (**Figure 2**). The highest number of COVID-19 deaths in the last week was observed in the North American subregion (3,420 deaths, -7% decrease) (**Table 1**). At the national level, the highest proportion of weekly COVID-19 deaths were reported from the United States of America (2,907 new deaths, -4.3% decrease), Brazil (1,495 new deaths, 3.5% increase), and Peru (344 new deaths, -2% decrease).

A summary of the COVID-19 trends for EW 32 by subregion is presented below.

North America

The overall trends for **COVID-19 cases** have decreased in North America for the five consecutive week, with a 16.1% decrease (n=745,484 new cases) in cases as of EW 32. Similar to the previous week, all three countries in the subregion reported a decline in COVID-19 cases, the largest decline being reported by Mexico (40,627 cases, -41.2 % decrease), followed by the United States of America (679,653 cases, -14 % decrease), and Canada (25,204 cases, -11.9 % decrease).

Figure 3: COVID-19 cases and deaths by epidemiological week (EW). North America. Region of the Americas. EW 3, 2020 - EW 32, 2022.



During the same period, **Weekly COVID-19 deaths** decreased by -7.7% in North America during EW 32 relative to the previous week. The largest decline in deaths were reported by Mexico (250 new deaths, -45.4% decrease), followed by United States of America (2,907 new deaths, -4.3% decrease), and Canada (263 new deaths, 25.8% increase).

During EW 32, among the two countries in North America with available data for **COVID-19 weekly hospitalizations and ICU admissions**, both countries – the United States of America and Canada – reported a slight decline but no substantial changes in weekly hospitalizations and ICU admissions compared to the previous week. The United States reported a total of 42,154 COVID-19 hospitalizations including 4,885 ICU admissions – representing a decline of 3.1% and 2%, respectively – during EW 32 compared to the previous week. Similarly in Canada, COVID-19 hospitalizations and ICU admissions have decreased for the second consecutive week after six weeks of an increasing period – a decrease of 2.3% (n=4,905 hospitalizations) and 13.4% (n=264 ICU admissions) observed during EW 32 compared to the previous week.

The Omicron variant of concern (VOC) sublineages of BA.4 and BA.5 are predominant in the subregion – making up about 99% for EW 32 in the United States of America¹, 94% for the week of 24 July 2022 in Canada.² Similarly in Mexico, the BA.4 and BA.5 sub-lineages made up about 9.7% and 84% of the weekly sequenced sampled as of EW 30.

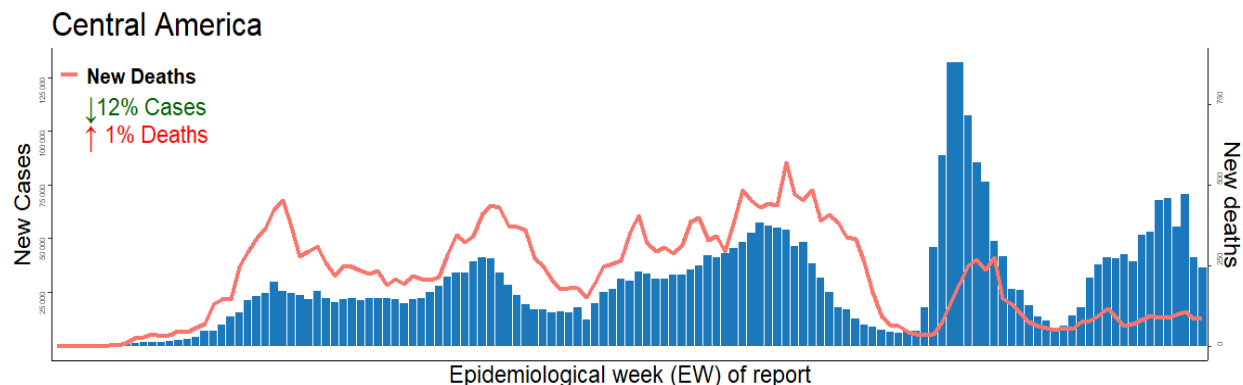
1 The United States Centers for Disease Control and Prevention (CDC). Variant Proportions. Accessed 16 August 2022. Available at: <https://bit.ly/3Obz8cT>

2 Public Health Agency of Canada (PHAC). COVID-19 Epidemiological Update. Accessed 16 August 2022. Available at: <https://bit.ly/3bbFRFr>

Central America

In Central America, COVID-19 incidence for the sub-region has decreased for the second consecutive week with 36,510 new cases reported during EW 32 – a -11.6% decrease compared to the previous week (**Figure 4**).

Figure 4: COVID-19 cases and deaths by epidemiological week (EW). **Central America. Region of the Americas.** EW 6, 2020 - EW 32, 2022.



During EW 32, two countries in the subregion reported an increase in **weekly cases** – Panama (6,479 new cases, 9.2% increase) and Nicaragua (65 new cases, 100% increase). Please note that the relative increase in cases of Nicaragua is a result of a data artifact since data for EW 31 was not available. The remaining four countries and territories in the subregion reported a decline in cases during EW 32. The largest decline was observed in Honduras (2,094 new cases, -61% decrease), Belize (206 new cases, -34.2% decrease), and Costa Rica (11,467 new cases, -13.8% decrease).

For the same period, there were no substantial changes in **weekly deaths** in the subregion – reporting an 1.2% increase (163 new deaths) during EW 32 relative to the previous week (**Figure 4**). Two countries accounting for about 73% of the weekly deaths in the subregion reported an increase during EW 32 – Guatemala (109 new deaths, 19.8% increase) and Panama (10 new deaths, 11.1% increase) compared to the previous week. The remaining five countries and territories either observed a decline (n=3; range: -35.7% - -23.5%) or reported no deaths (n=2) during EW 32.

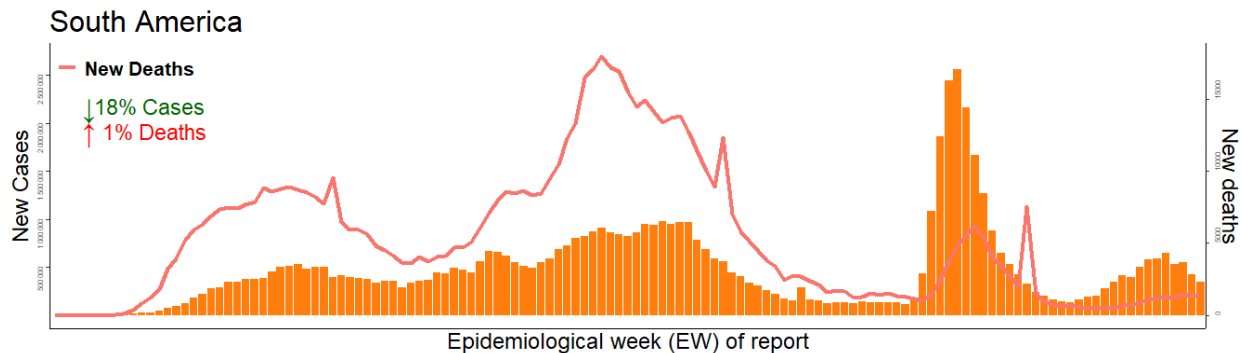
Among four countries/territories with available data for **weekly COVID-19 hospitalizations** in this subregion, similar to the previous week, one country – Panama – reported an increase in weekly hospitalizations (145 hospitalizations, 9.8% increase) during EW 32, while the remaining three countries and territories reported a decline relative to the previous week (range: -33.3 - -11.7% decrease). With regards to ICU admissions, all three countries with data available for weekly COVID-19 ICU admissions reported a decline during EW 32 relative to the previous week – Panama (25 ICU admissions, -19.4% decrease), Honduras (13 ICU admissions, -7.1% decrease), and Costa Rica (46 ICU admissions, -24.6% decrease).

To date, Omicron lineages BA.4 and BA.5 have been reported from four of the seven countries and territories in the subregion respectively – Costa Rica, Panama, Guatemala, El Salvador (BA.4 only), and Belize (BA.5 only).

South America

In South America, COVID-19 incidence has largely decreased for the second consecutive week, with a total of 352,854 new COVID-19 cases being reported during EW 32 – a -17% decrease compared to the previous week (**Figure 5**), primarily due to a large decrease observed in Brazil and Argentina.

Figure 5: COVID-19 cases and deaths by epidemiological week (EW). **South America. Region of the Americas.** EW 3, 2020 - EW 32, 2022.



Out of the 10 countries and territories in the subregion, three countries experienced an increase in **weekly cases** during EW 32 – Uruguay (1,844 new cases, 9% increase), Peru (62,336 new cases, 11.3% increase), and Chile (72,562 new cases, 14.1% increase), while Ecuador reported no substantial changes in cases (3,624 cases, 0.4% increase) compared to the previous week. The remaining countries reported a decline in weekly cases (range: -46.7 - -24.6%), with the largest decreases being observed in Paraguay (2,017 new cases, -46.7% decrease) and Colombia (7,394 new cases, -44% decrease) during EW 32 compared to the previous week.

For the same period, there was no substantial changes in **weekly COVID-19 deaths** in the subregion compared to the previous week. A total of 2,476 COVID-19 deaths were reported in South America, representing a 1.2% increase compared to the previous week. At the country level, two countries reported an increase in the subregion – Argentina (126 deaths, 77.5% increase) and Brazil (1,495 deaths, 3.5% increase) – while the remaining countries and territories reported a decline as compared to the previous week (range: -25 - -1.4%).

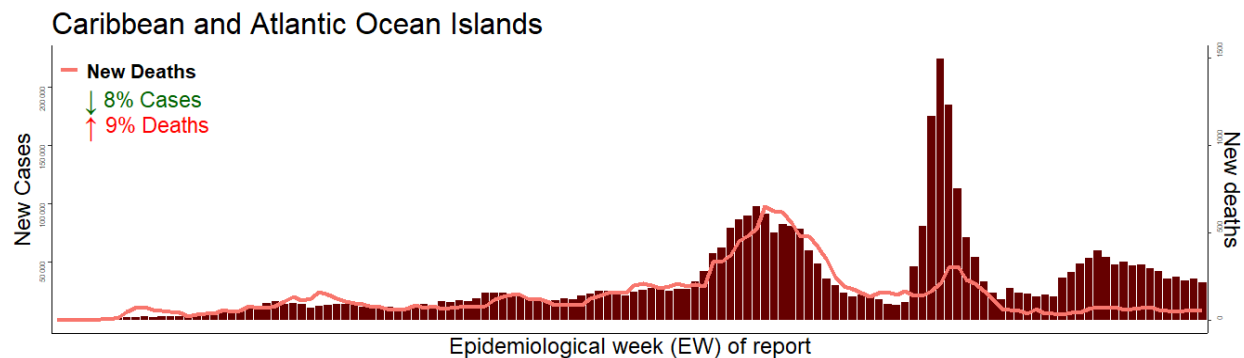
During EW 32, among four countries and territories in the subregion with data available for **COVID-19 weekly hospitalizations**, three observed a decline – Peru (1,323 hospitalizations, -5.9% decrease), Venezuela (Bolivarian Republic of) (866 hospitalizations, -23.8% decline), and Colombia (1,124 hospitalizations, -25.1% decline) while Chile observed no substantial changes (1,685 hospitalizations, -0.4% decrease). Among five countries with available data for **COVID-19 ICU admissions** in this subregion, two countries observed an increase in weekly ICU admissions during EW 32 – Peru (255 ICU admissions, 5.8% increase) and Argentina (487 ICU admissions, 5% increase) – while the remaining three reported a decline compared to the previous week (range: -30.6 - -1.8%).

To date, Omicron lineages BA.4 and BA.5 have been reported from seven and eight out of the 10 countries in the subregion respectively – Argentina, Brazil, Chile, Colombia, Ecuador, Paraguay, Peru, and Venezuela (Bolivarian Republic of) (BA.5 only).

Caribbean and Atlantic Ocean Islands

In the Caribbean and Atlantic Ocean Islands sub-region, **weekly cases** decreased by -7.5% during EW 32 compared to the previous week (**Figure 6**). At the national level, cases increased in eight out of the 34 countries and territories in the subregion (range: 17.9% - 150%) while it declined in 23 countries and territories (range: -100% - -2.2%).

Figure 6: COVID-19 cases and deaths by epidemiological week (EW). **Caribbean and Atlantic Ocean Islands.** Region of the Americas. EW 6, 2020 - EW 32, 2022.



For the same period, **COVID-19 deaths** have increased by 8.6% in the Caribbean and Atlantic Ocean Islands subregion compared to the previous week. Six countries and territories in the subregion observed a relative increase in their weekly deaths in EW 32 for an overall sub-regional increase of 8.6% (101 new deaths) compared to the previous week (range: 15.4 – 183.3%). The remaining countries and territories of the subregion either reported a decline (n=7; range: -100 - -25%) or remained the same (n=21).

Among 19 countries and territories with available data, four countries and territories reported an increase in their weekly **COVID-19 hospitalizations** (range: 4.8 – 200%), with the largest relative increases being observed in Antigua and Barbuda (3 hospitalizations, 200% increase) and Trinidad and Tobago (194 hospitalizations, 21.2% increase) during EW 32 compared to the previous week. Among 12 countries/territories with data available for **COVID-19 ICU admissions**, six reported an increase during EW 32, the highest relative increase being observed in Guyana (2 ICU admissions, 100% increase), Jamaica (5 ICU admissions, 25% increase), and the Dominican Republic (23 ICU admissions, 21.1% increase). The remaining six countries and territories reported a decline (range: -100 - -33.3%).

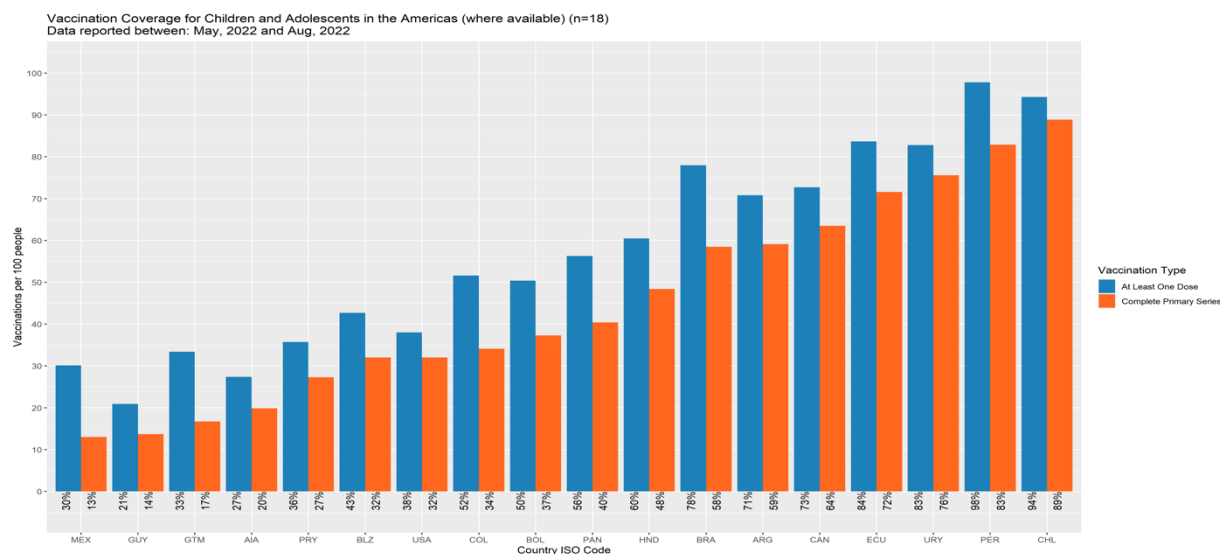
Significant increases in weekly cases in the subregion during EW 32 were reported from the Falkland Islands (Malvinas) (20 new cases, 150% increase), Antigua and Barbuda (33 new cases, 135.7% increase), and Grenada (73 new cases, 102.8% increase) relative to the previous week.

Notable increases in severity trends continued to be observed in Trinidad and Tobago where weekly hospitalizations have been increasing for the past five consecutive weeks – a 21.2% increase (n=194 hospitalizations) observed during EW 32. Although weekly deaths in Trinidad and Tobago have decreased by 64.7% during EW 32 compared to the previous week, cases have been steadily increasing for the past four consecutive weeks – 40.7% increase (n=1,976 cases) observed during EW 32.

To date, Omicron lineages BA.4 and BA.5 have been reported from 16 and 15 out of 34 countries and territories in the subregion, respectively, including the overseas territories of either France, the Netherlands, the United Kingdom, or the United States of America. However, these trends should be interpreted with caution due to presence in differences in sequencing capacity and sampling strategies between countries and territories.

Immunization

Figure 7. The Vaccination Coverage for Children and Adolescents grouped by country ISO Code (where available; n=18). The region of the Americas. As of EW 32, 2022.



WHO / PAHO continue to recommend that people at the highest risk of infection, hospitalization, and mortality from COVID-19 receive all vaccine doses as soon as possible. This category includes children and adolescents under 18 years of age with comorbidities that increase their risk of severe disease. These recommendations were published in the SAGE Roadmap* updated on January 21, 2022.

Vaccination for children and adolescents in the Americas, for 18 countries/territories with reports between May and August 2022 (**Figure 7**). Note that coverage** is varied among the region: between 13% and 89% for primary series coverage in children and adolescents; as is dropout rate***: between 6% and 57%. 4 countries/territories have achieved 70% or higher coverage rate, while 9 remain below 40%.

* <https://www.who.int/publications/i/item/WHO-2019-nCoV-Vaccines-SAGE-Prioritization-2022.1>

** Population based on United Nations (UN) Population Prospects for 2021 and projections from the United States (US) Census Bureau for countries with 100,000 or fewer inhabitants. Note that coverage is calculated based on the specific vaccinating population that is reported by each country/territory.

*** Please note that drop-out rate is calculated as: $(\text{first_doses} - \text{last_doses}) / \text{first_doses} * 100$, where first_doses and last_doses refer, respectively, to the first and last dose of the primary vaccination schedule, disregarding single-dose vaccines.

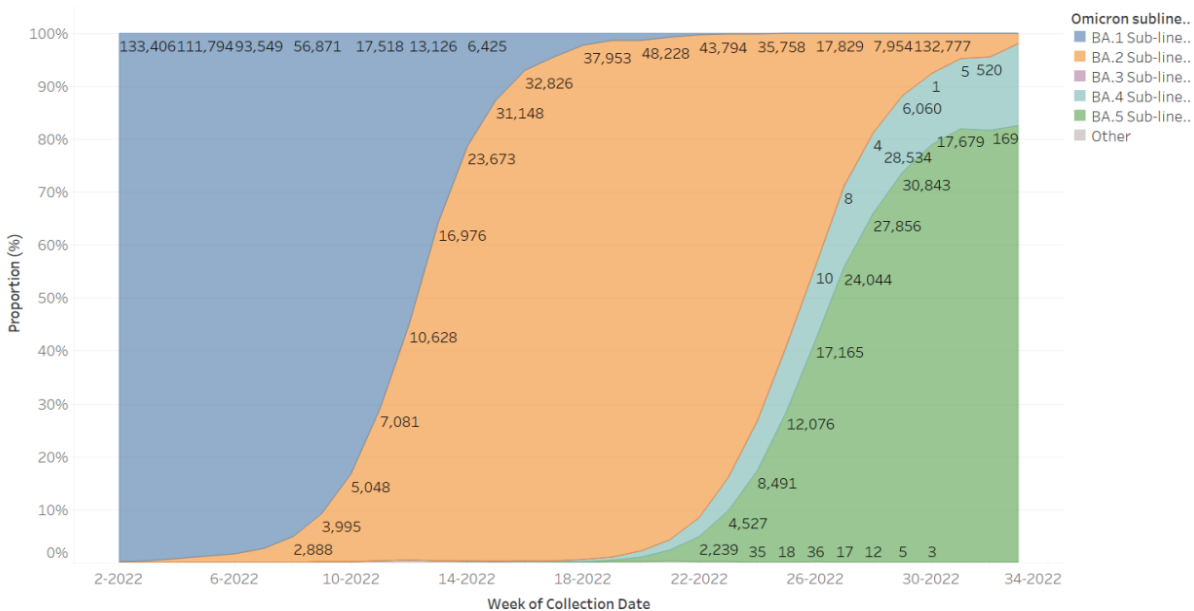
Genomic surveillance

Through PAHO's Genomic Surveillance Regional Network and the work from the Member States, 425,247 full genome sequences of SARS-CoV-2 from Latin America and the Caribbean have been uploaded to the Global Initiative on Sharing All Influenza Data (GISAID) platform up to 16 August 2022.

After the introduction of the Omicron VOC in the Americas at the end of 2021, it has rapidly increased in prevalence and has been officially reported by 54 countries or territories. Omicron is now predominant in all PAHO countries, and few other lineages are currently detected in the Region. Omicron comprises the BA.1 to BA.5 sublineages (or subvariants), which are also subdivided into diverse sublineages based on additional mutations that slightly change the genomic profile but not enough to define a new Variant. Important to notice, there is not (so far) sufficient evidence to infer increased severity or phenotypic impact in either of the sublineages, besides the already established for Omicron.

The cumulative proportion of sequences collected in the Americas from November 2021 to date are: 57.4% of BA.1 (and BA.1 sublineages), 30.0% of BA.2 (and sublineages), 0.01% of BA.3 (and sublineages), 2.7% of BA.4 (and BA.4 sublineages), and 9.9% BA.5 (and BA.5 sublineages). Although BA.1 accounts for the majority of cumulative sequences, BA.2 became predominant in all subregions between weeks 12 and 15 of 2022, and BA.4 and BA.5 became predominant between weeks 25 and 34 (**Figure 8**). The proportion of BA.4 and in particular BA.5 continues to increase throughout the Region. Notably, in the past four weeks, the BA.4 and BA.5 combined represent 92.2%, 90.14%, 83.3%, and 89.4% of the characterized samples in North America, the Caribbean, Central America, and South America, respectively.

Figure 8. Distribution of VOC Omicron sublineages identified by the countries in the Region of the Americas (January-August 2022)



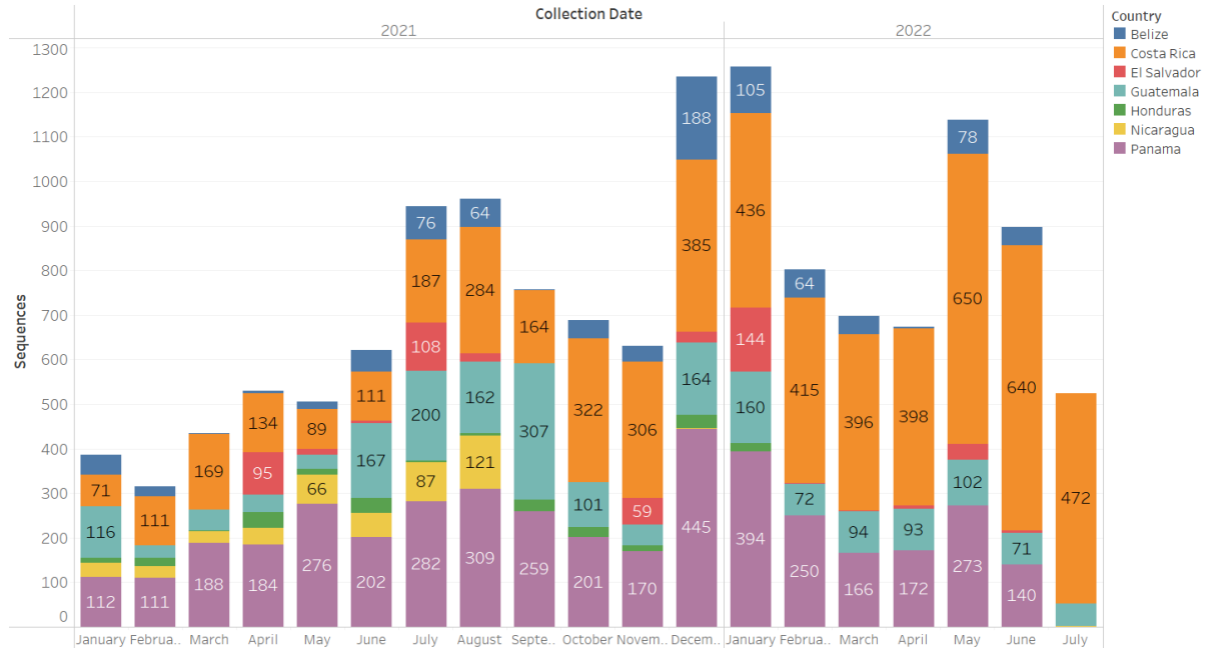
Source: GISAID

Spotlight: Sequencing and genomic surveillance in Central America

During the last 19 months (January 2021 to 9 August 2022), 14,002 whole genome sequences from Central American countries have been generated as part of the genomic surveillance systems (**Figure 9**). As in other subregions, Omicron is vastly predominant with no other “previously circulating” VOC/VOI detected in the past 22 weeks (**Figure 10**). Since Omicron’s first detection, BA.1 and BA.1 sublineages represent the majority (50.9%) of cumulative sequences, while BA.2 and BA.2 sublineages represent 37.9% of the cumulative sequences, and BA.3, BA.4, and BA.5 (with their respective sublineages) represent 0.31%, 5.4%, and 5.5% of cumulative sequences, respectively (**Figure 11**). However, BA.1 was progressively replaced by BA.2 in weeks 10 to 19, and the proportion of BA.4 and BA.5 have been increasing since week 19 (**Figure 12**). When focusing on the past four weeks (19 July to 9 August July), BA.5 is the predominant sublineage (49.2%) while BA.2 and BA.4 account for 16.7% and 34.17% of the sequences, respectively. It is important to note that the majority of sequences for the 4-week period was contributed by Costa Rica.

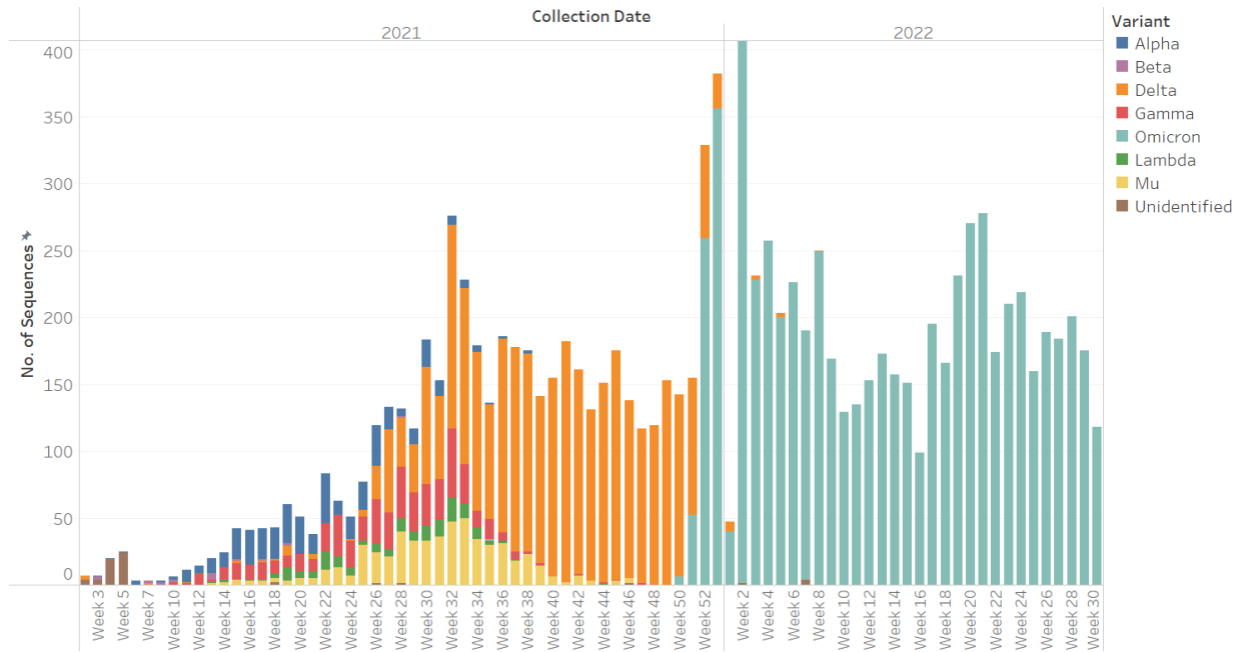
It is important that all countries at PAHO region continue the collection of representative samples for sequencing and to maintain COVID-19 appropriate genomic surveillance.

Figure 9. Number of sequences generated monthly by countries in Central America (January 2021- August 2022)



Source: GISAID

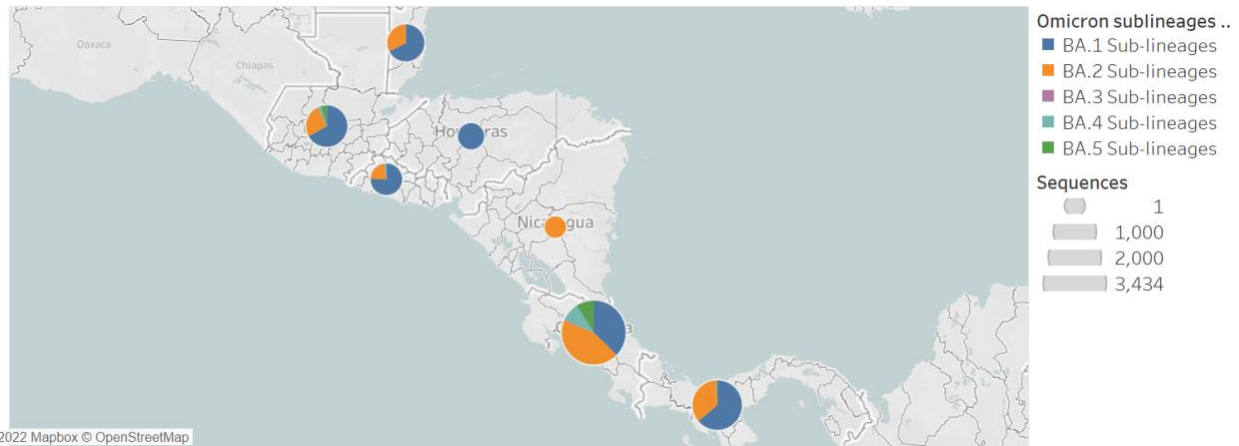
Figure 10. Variants detected and reported by the Countries in Central America (January 2021-August 2022)



Source: GISAID

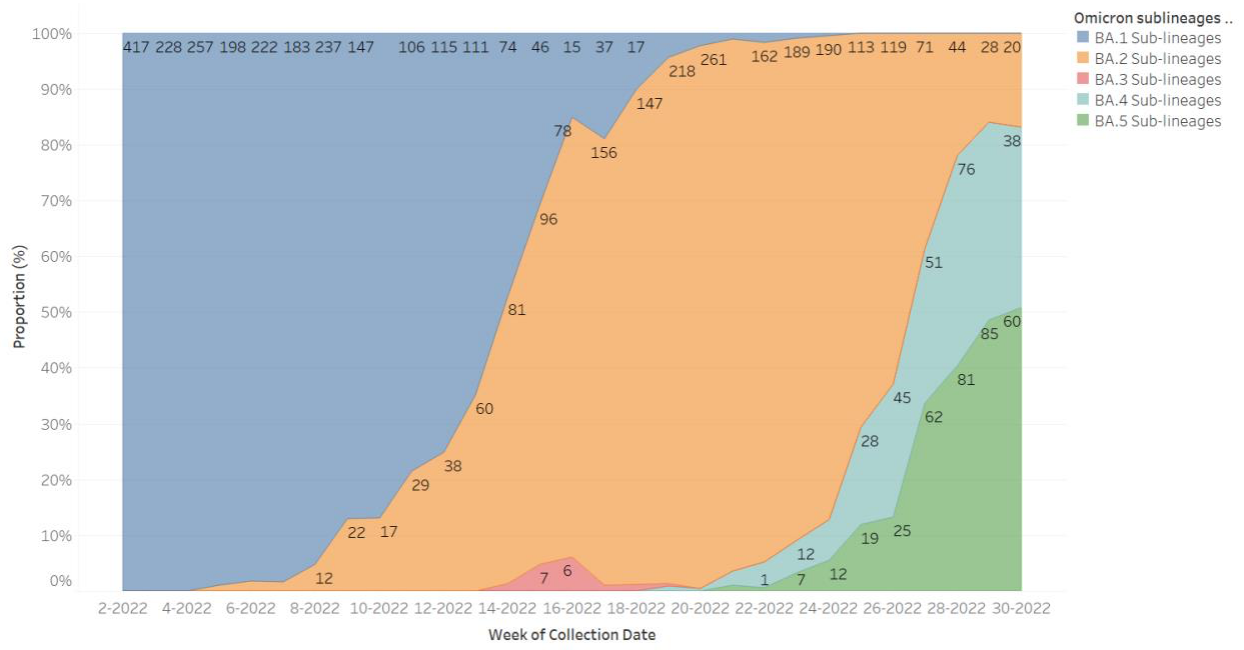
Country-specific data is available at: https://ais.paho.org/phi/viz/SARS_CoV2_variants_regional.asp

Figure 11. Distribution of Omicron sublineages identified by the countries in Central America (November 2021-August 2022)



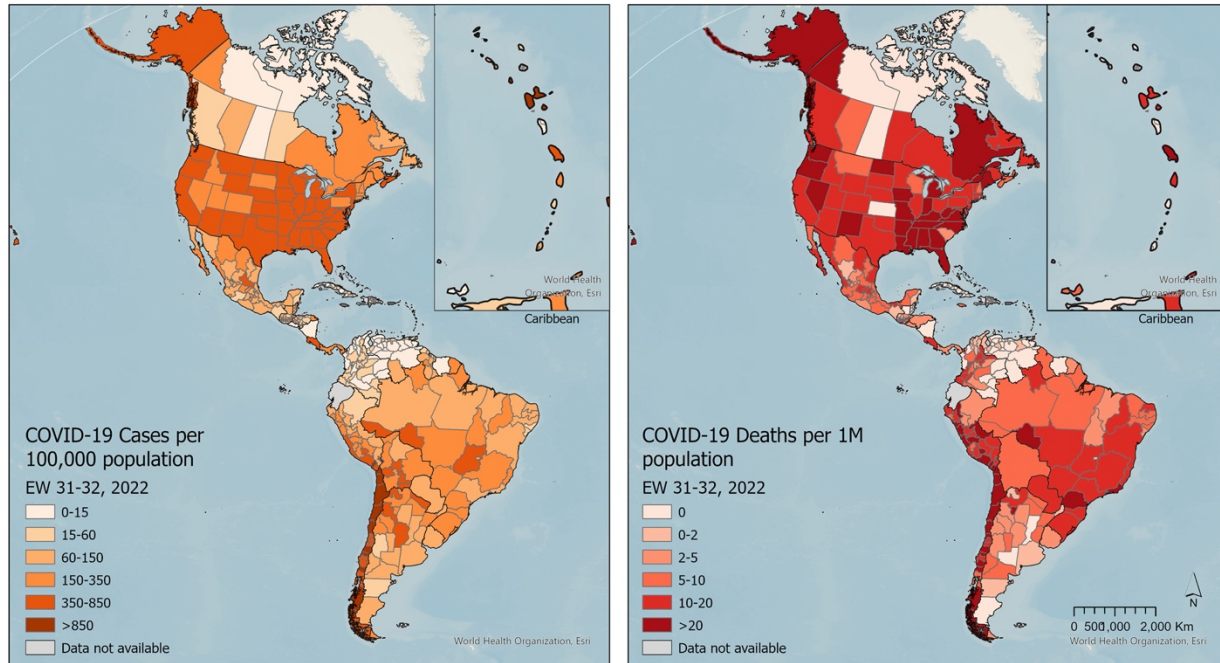
Source: GISAID

Figure 12. Distribution of VOC Omicron sublineages identified by the countries in Central America (January-August 2022)



Source: GISAID

Annex 1. COVID-19 incidence rate per 100,000 population and COVID-19 mortality rate from per 1 million population. Region of the Americas. Between EW 31 and 32, 2022.



The maps (**Annex 1**) represent the COVID-19 incidence rate per 100,000 population and the mortality rate from COVID-19 per 1 million population in the Region of the Americas reported in EW 31 and 32, 2022. At the regional level, incidence and mortality have been decreasing in the past two weeks, compared to the previous two weeks.

At the sub regional level, trends in incidence and mortality have also been declining compared to the previous two weeks. The largest relative decrease in incidence and mortality were observed in Central America. Highest incidences rates for the past two weeks (850 cases per 100,000) were observed in the United States, Chile, Puerto Rico, and Guadeloupe.

In the United States, most states reported between 350-850 cases per 100,000 population, and in Chile most regions reported over 850 cases per 100,000 population. Only a few sub-national territories in Brazil, Argentina, Bolivia, and Peru reported between 350-850 cases per 100,000. In Central America and the Caribbean, most sub-national territories reported below 150 cases per 100,000 over the past 2 weeks.

In terms of mortality, all sub-regions reported decreases (-10%) in number of new deaths compared to the previous 2 weeks. The highest mortality rates (>20 deaths per million people) were observed in Canada (province of Quebec and Yukon territory), the United States (mostly southeastern states), Chile, Peru, Brazil, and the following Caribbean countries and territories: Barbados, Martinique, and Puerto Rico. No new deaths were reported in Cuba over the past two weeks.