

Overseas infectious diseases of priority concern

This factsheet presents information on overseas infectious diseases of priority concern. These include Public Health Emergencies of International Concern (PHEICs) and severe respiratory disease.



Measles cases in 2020 declined after 2019 which saw the most cases in a single year in the 21st century.



Global polio cases increased in 2019 and remained high through to 2021.



The World Health Organization reported that 285.6 million cases of COVID-19 occurred in 2020 and 2021, affecting all but 11 nations globally.



From 2019–2021, Middle Eastern Respiratory Syndrome and non-seasonal influenza continued to be present in multiple countries.

Background information

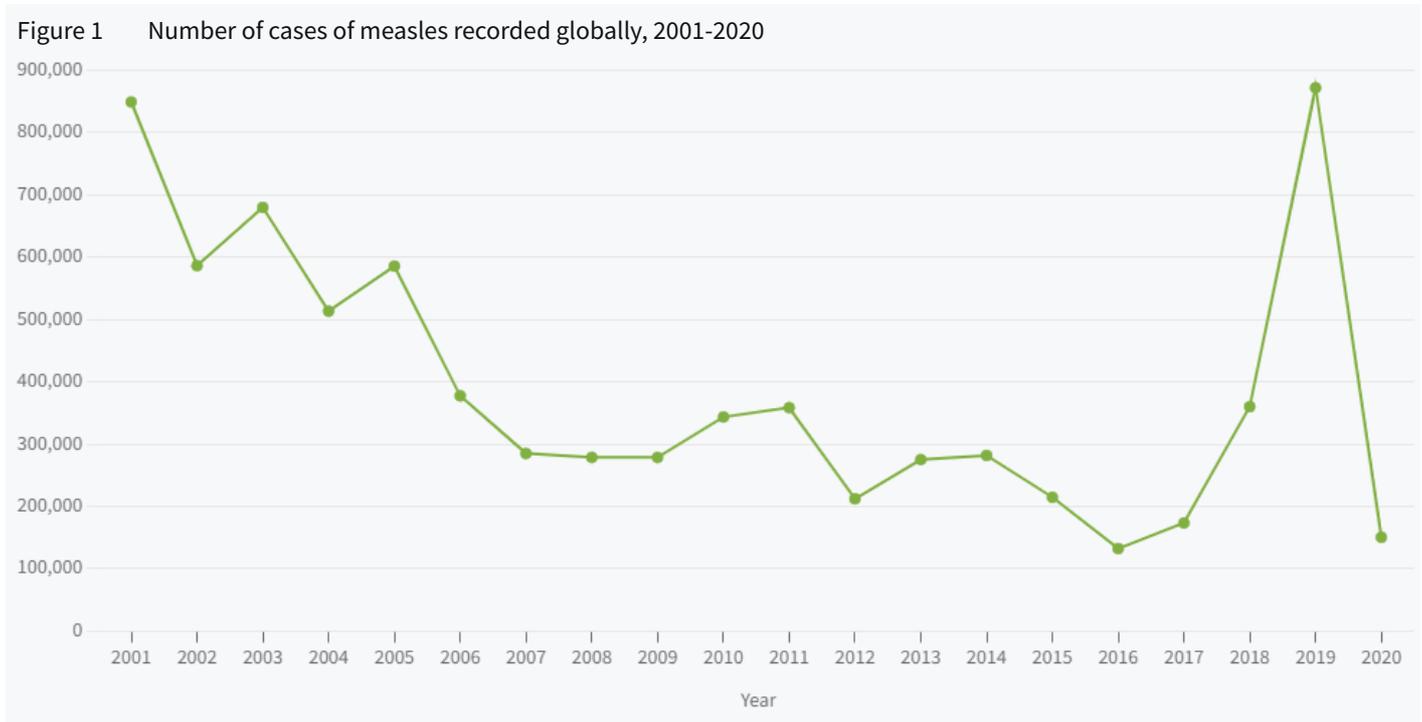
There were two Public Health Emergencies of International Concern (PHEIC), as classified by the World Health Organisation (WHO), in 2021. These are Polio and COVID-19. As well as this, there are multiple respiratory infections including measles, Middle Eastern Respiratory Syndrome (MERS) and non-seasonal influenza, considered priority notifiable diseases to New Zealand. For information surrounding selection of priority notifiable diseases, please visit the [EHINZ website](#) or view the [metadata](#).

The time series maps in this factsheet are not interactive. To access the behind these maps, select the "Download data" option found under each map.

Measles cases decline in 2020 after rapid spike in 2019

Measles is a highly contagious virus spread through droplets from the nose, throat or mouth and causes a fever, cough, and rash (MoH 2022). For information on measles visit the [MoH website](#).

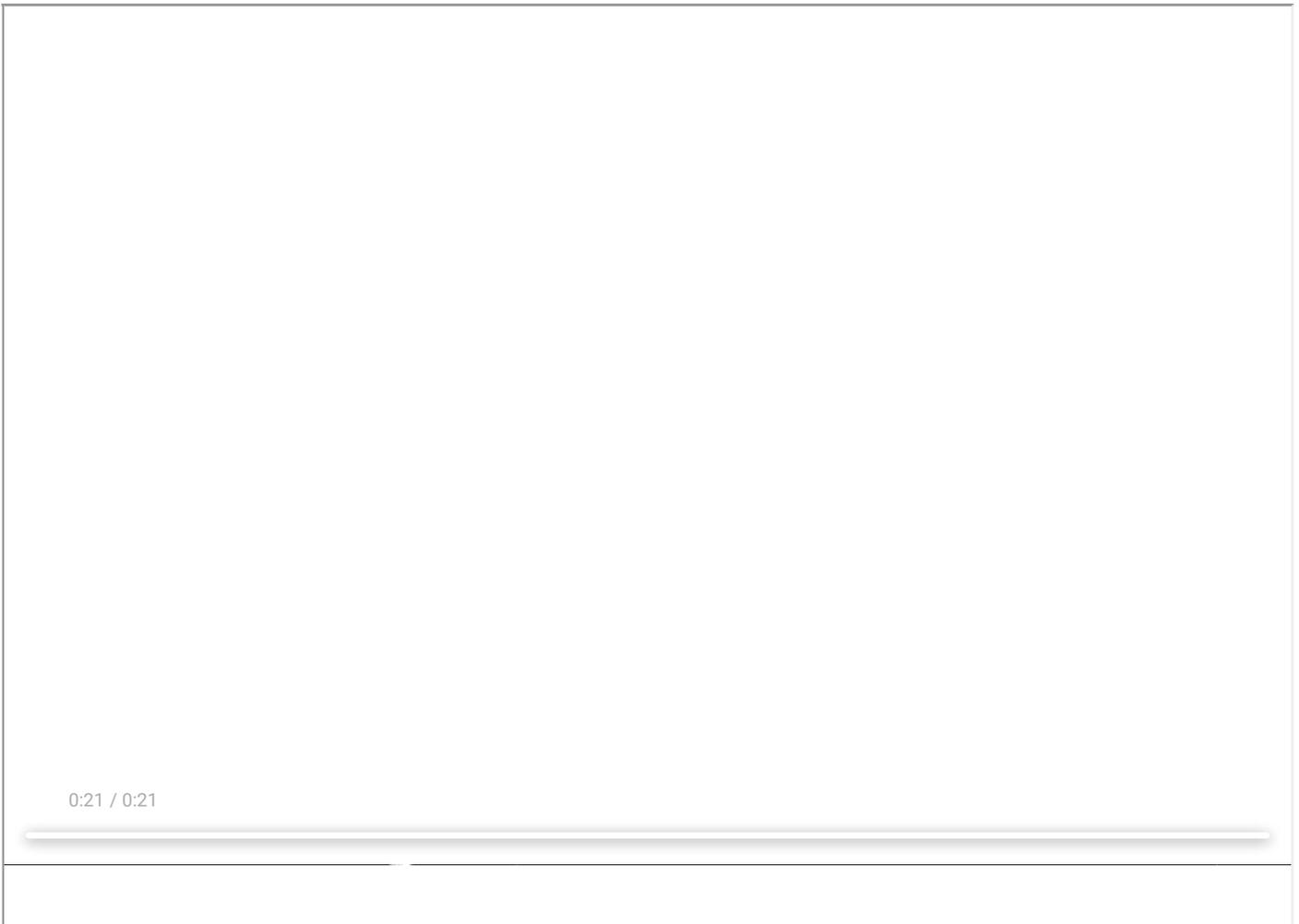
As seen in Figure 1, global measles cases have been declining since the early 2000's. However, cases increased in 2018, spiking in 2019 (871,913 cases) before declining in 2020 (150,554 cases).



Source: WHO 2022b

According to WHO, measles was present in 144 different countries in 2019 and 101 countries in 2020. (WHO 2022a). New Zealand recorded 2,189 cases in 2019 and nine cases in 2020. Figure 2 below presents the number of measles cases by country from 2000–2020. Nations with the highest cases during the most recent spike, 2018 and 2019, were the Democratic Republic of Congo, Madagascar, Ukraine, Brazil, Philippines, Nigeria, India and Pakistan.

Figure 2 Number of measles cases, by country, 2000–2020.



Source: WHO 2022b  [Download data](#)

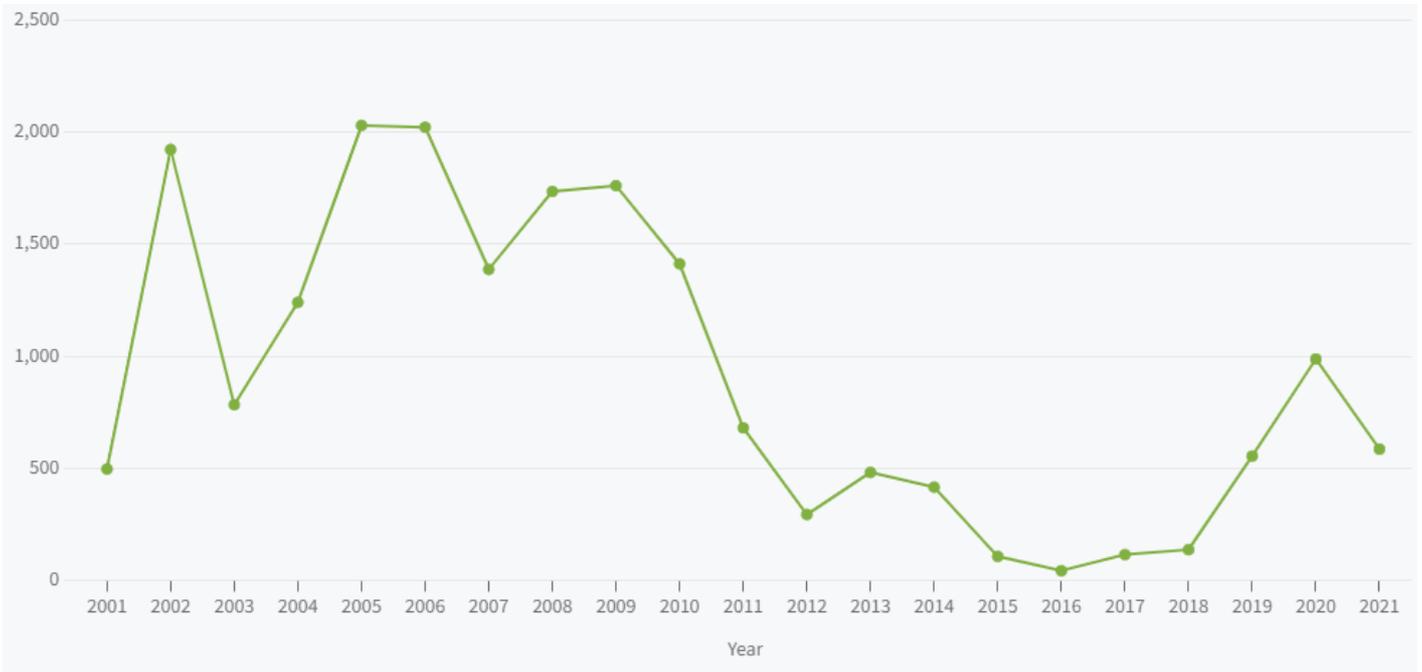
The international health community are concerned that measles cases could increase as international travel resumes following removal of COVID-19 border restrictions and due to disruptions to the global vaccination campaign (CDC 2021).

Polio cases in 2020 and 2021 were the highest in a decade

Polio is a viral disease that can cause severe neurological disability and sometimes death. Circulating vaccine derived poliovirus (cVDPV) is a form of poliovirus occurring in places where vaccination coverage is low (Venkatesan 2022). The 'weakened' virus in the oral polio type 2 vaccine may pass between unimmunized people, mutating and regaining the ability to cause disease. It has not been used globally since 2016. For more information on poliovirus, visit the [MoH website](#).

Polio cases globally have steadily declined since 2009 due to global vaccination programs set up in the 1990's (Venkatesan 2022). However, there were over 500 global cases recorded each year from 2019–2021 (Figure 3). The majority of new cases are cVDPV.

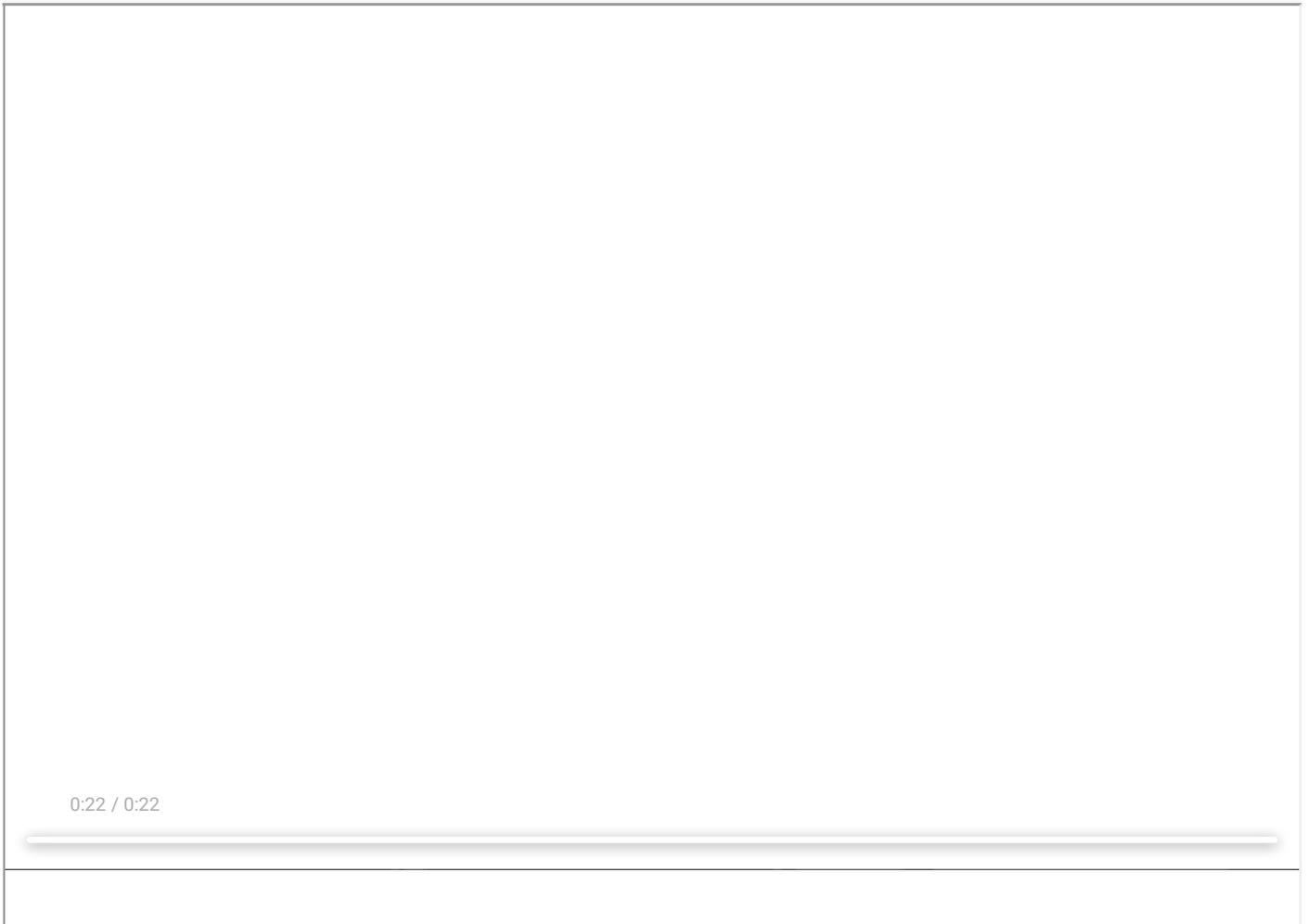
Figure 3 Number of cases of wild poliovirus and circulating vaccine derived poliovirus globally, 2000–2021.



Source: WHO 2022a

Figure 4 below presents the number wild poliovirus and cVDPV cases by country from 2000–2021. From 2019 when this increase began, 31 nations recorded at least one case of wild poliovirus or cVDPV (Figure 4). The worst affected regions over these three years were Nigeria, Afghanistan, Chad, Pakistan and Angola. The last recorded case in New Zealand was in 1977 (ESR 2021).

Figure 4 Number of cases of wild poliovirus and circulating vaccine derived poliovirus, by country, 2000–2021.



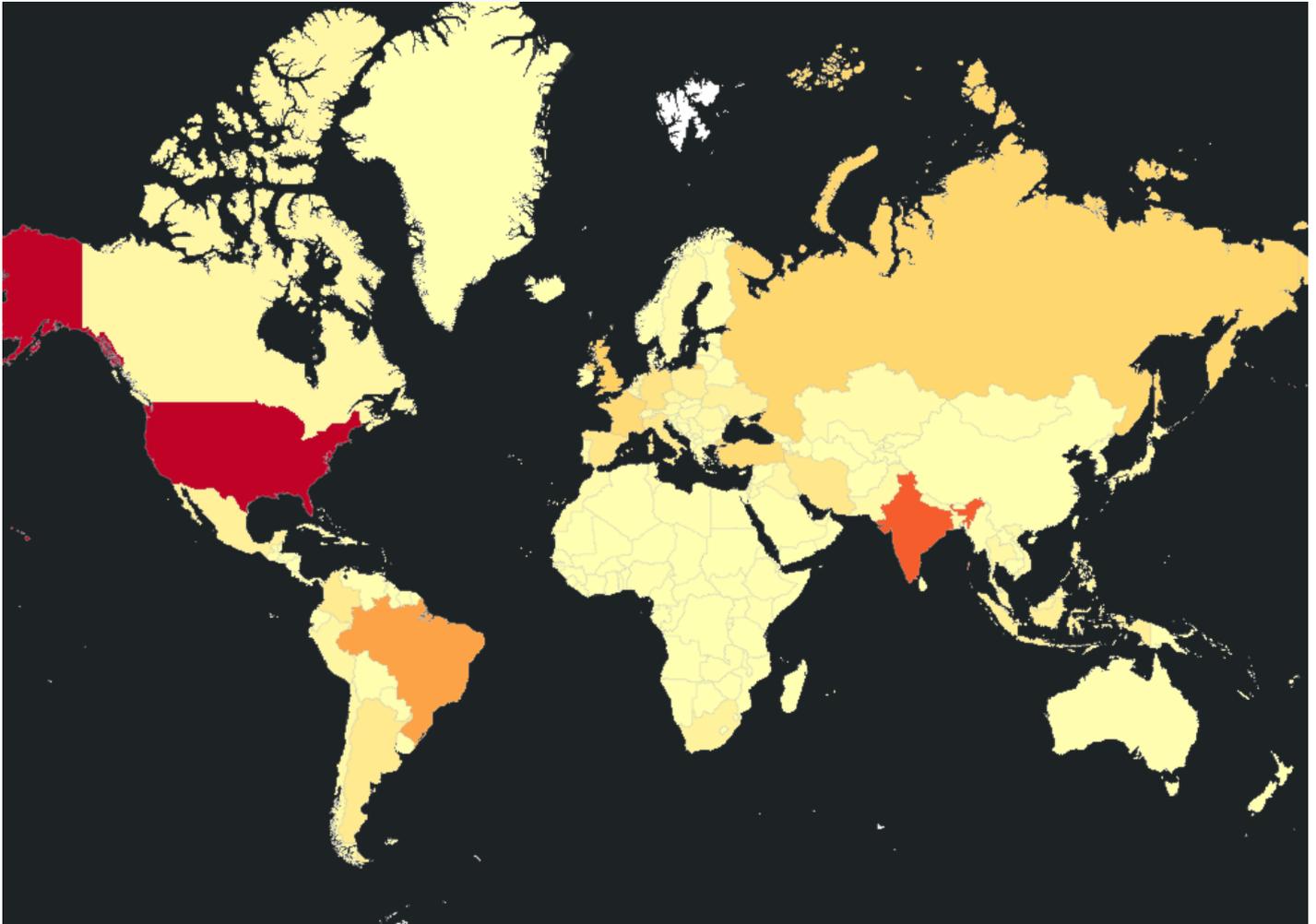
Source: WHO 2022a [Download data](#)

All but 11 nations recorded COVID-19 cases in 2020 or 2021

SARS-CoV-2 is the respiratory virus responsible for the COVID-19 pandemic. The disease first emerged in Wuhan, China (PRC), in late 2019 and quickly spread to most countries and territories (WHO 2021). The most common symptoms are fever, dry cough, and fatigue. For more information about COVID-19, visit the [MoH website](#).

While cases of COVID-19 were identified in 2019, the majority of confirmed cases occurred in 2020 (82.8 million cases) and 2021 (202.9 million cases) (Figure 5), killing an estimated 5.4 million people. COVID-19 remained a PHEIC at the end of 2021 with a global vaccine program underway (WHO 2022c).

Figure 5 Number of cases of COVID-19, by country, 2020–2021



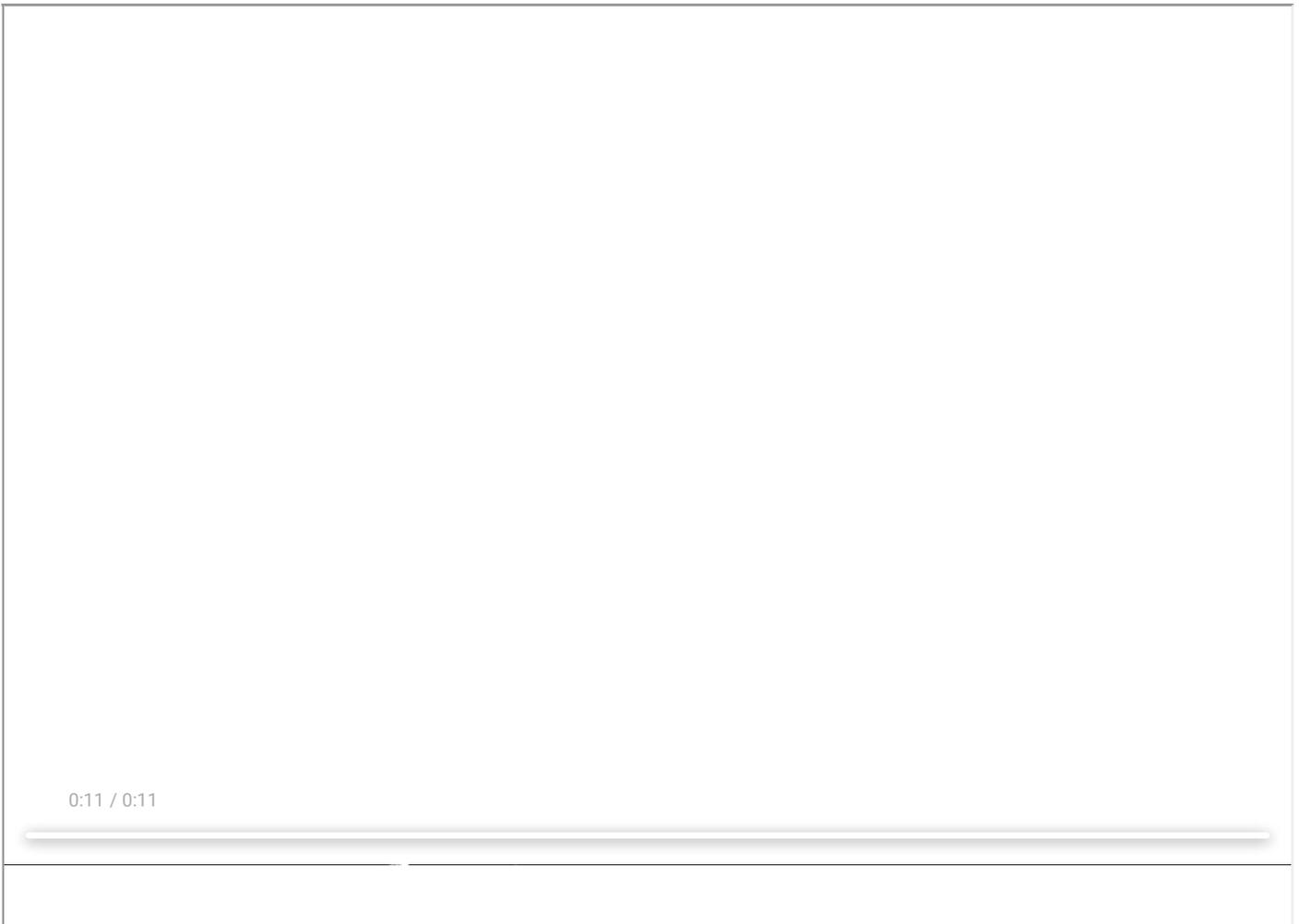
Source: WHO 2022c

MERS and non-seasonal influenzas persist in parts of the world

Despite focus being placed on COVID-19 in past years, multiple other highly infectious respiratory diseases have persisted across the globe, including MERS and non-seasonal influenzas.

Middle East Respiratory Syndrome Coronavirus (MERS-CoV) is a lung disease with a high death rate spread to humans from camels and bats in the Eastern Mediterranean (WHO 2019). Cases were found in the United Arab Emirates and Saudi Arabia in 2021 (Figure 6). For more information about MERS, visit the [MoH website](#).

Figure 6 Countries and territories reporting MERS cases, 2011–2021



Source: WHO 2022d  [Download data](#)

Non-seasonal influenzas are defined as any novel influenza strain that may have pandemic potential. These include avian influenzas, such as H5N1 and H10N3, and swine influenzas, such as H1N2 and H3N2. A case of at least one non-seasonal influenza strain was found in Brazil, China, India and USA in 2021 (Figure 7). For more information about non-seasonal influenza, visit the [MoH website](#).

Figure 7 Countries and territories reporting non-seasonal influenza cases, 2011–2021



Source: WHO 2022d  [Download data](#)

Data for this indicator

Priority notifiable diseases are selected from ESRs annual notifiable disease list. All PHEICs, selected by WHO, are included as well as severe respiratory diseases. Information on vector-borne diseases is currently only investigated from a New Zealand context. For additional information, see the metadata link below.

References

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Further information

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