

# COVID-19 & FLU EXPRESS



*COVID-19 & Flu Express* is a weekly report produced by Surveillance Division of the Communicable Disease Branch of the Centre for Health Protection. It monitors and summarizes the latest local and global COVID-19 and influenza activities.

## Local Situation of COVID-19 Activity (as of Aug 7, 2024)

**Reporting period: Jul 28 – Aug 3, 2024 (Week 31)**

- The latest surveillance data showed that the overall local activity of COVID-19 has continued to increase since June.
- The Centre for Health Protection (CHP) has been closely monitoring the local prevalence of SAR-CoV-2 variants based on the World Health Organization (WHO)'s Tracking SAR-CoV-2 Variants list. The latest surveillance data showed that JN.1 is the most prevalent variant. At the same time, KP.2 is also detected in the sewage surveillance and human infection cases. However, the current information does not suggest JN.1 or KP.2 will cause a more severe disease than the previous prevalent XBB and its descendant lineages.
- Members of the public are advised to maintain strict personal and environmental hygiene at all times for personal protection against COVID-19 infection and prevention of the spread of the disease in the community. High risk people (e.g. persons with underlying medical conditions or persons who are immunocompromised) should adopt additional measures to protect themselves such as wearing mask properly when going to public places. For other details, please visit the COVID-19 information page (<https://www.chp.gov.hk/en/healthtopics/content/24/102466.html>).
- Members of the public are advised to take note of the latest recommendations on the use of COVID-19 vaccines in Hong Kong to protect themselves from serious outcomes of COVID-19. High-risk priority groups are recommended to receive a dose of COVID-19 vaccine at least six months since the last dose or infection, regardless of the number of doses received previously. For more details, please visit ([https://www.chp.gov.hk/files/pdf/consensus\\_interim\\_recommendations\\_on\\_use\\_of\\_covid19\\_vaccines\\_in\\_hong\\_kong\\_17jul.pdf](https://www.chp.gov.hk/files/pdf/consensus_interim_recommendations_on_use_of_covid19_vaccines_in_hong_kong_17jul.pdf)).
- For the latest information on COVID-19 and prevention measures, please visit the thematic website of COVID-19 (<https://www.coronavirus.gov.hk/eng/index.html>).

## Laboratory surveillance for COVID-19 cases

### **Positive nucleic acid test laboratory detections for severe acute respiratory syndrome coronavirus 2 (SARS-CoV-2) virus**

In week 31, the weekly number of newly recorded positive nucleic acid test laboratory detections for SARS-CoV-2 virus was 719 as compared to 796 in the preceding week. (Figure 1.1)

In the first 4 days of week 32 (Aug 4 – Aug 7), the daily number of newly recorded positive nucleic acid test laboratory detections for SARS-CoV-2 virus ranged from 92 to 125.

Since Jan 30, 2023, the cumulative number of positive nucleic acid test laboratory detections was 71,740 (as of Aug 7, 2024).

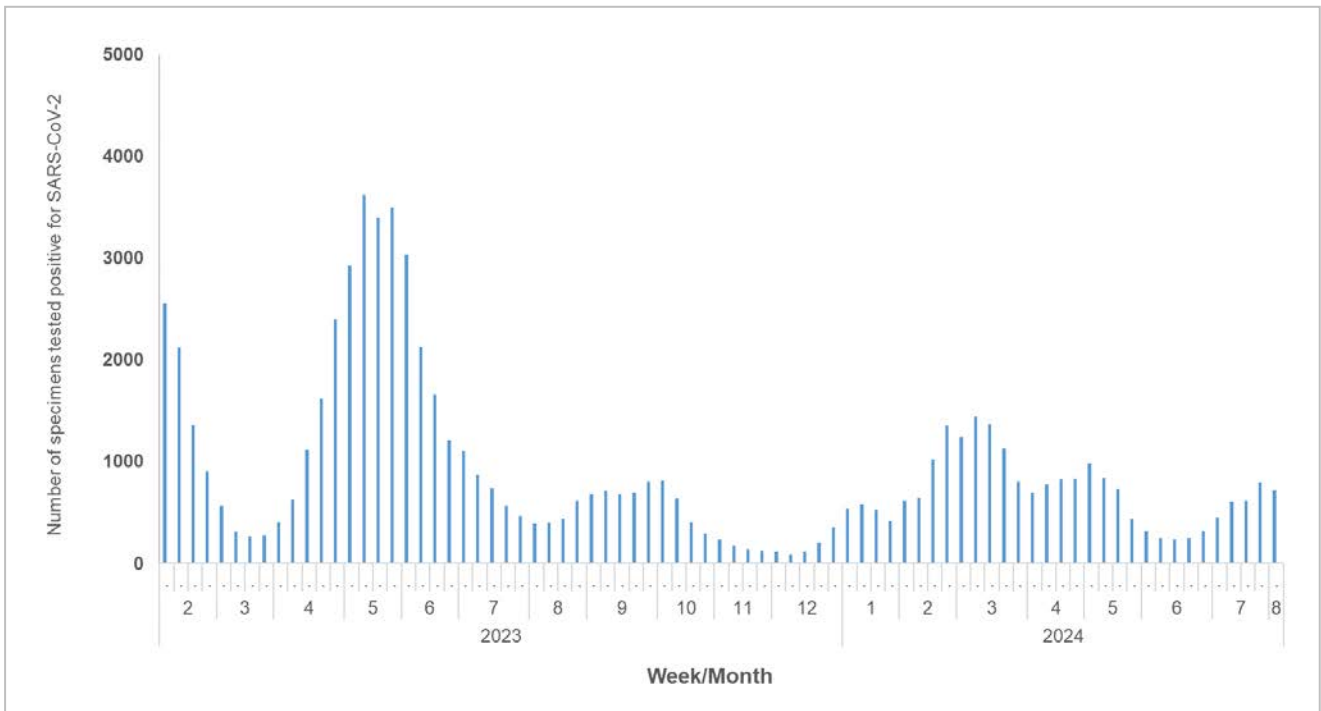


Figure 1.1 Weekly number of positive nucleic acid test laboratory detections for SARS-CoV-2 virus

**Positive detection rate of specimens tested positive for SARS-CoV-2 virus at the Public Health Laboratory Services Branch**

Among the 7,710 respiratory specimens received by the Public Health Laboratory Services Branch (PHLSB) in week 31, 699 (9.07%) were tested positive for SARS-CoV-2 virus as compared to 709 (8.72%) in the preceding week. (Figure 1.2)

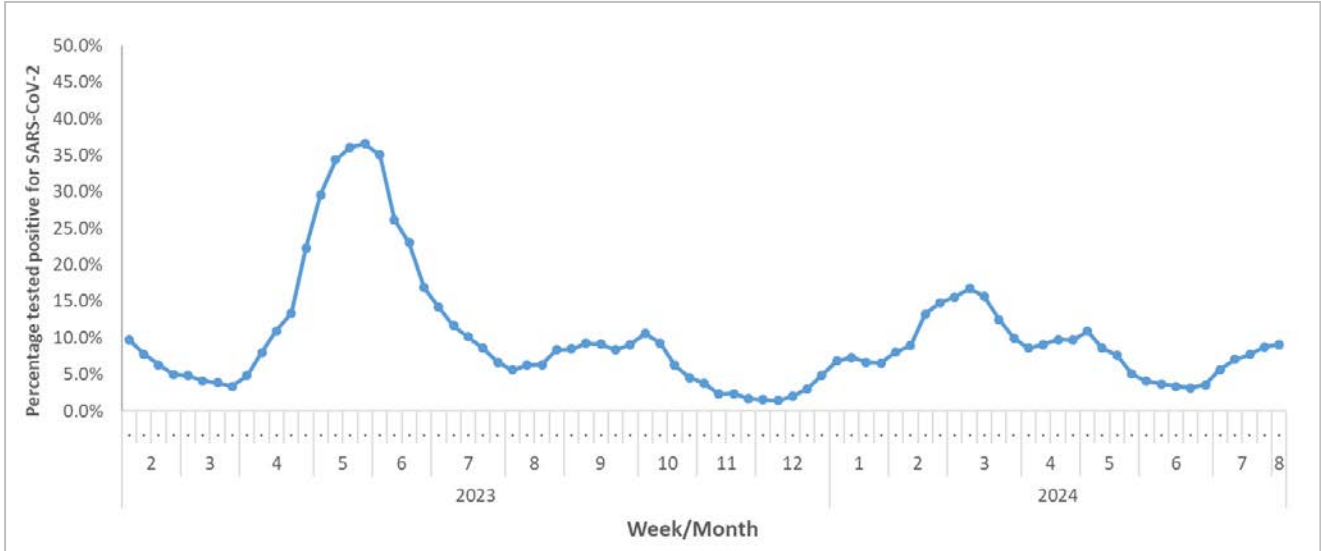


Figure 1.2 Percentage of specimens tested positive for SARS-CoV-2 virus at PHLSB

## COVID-19 outbreak surveillance

In week 31, 7 COVID-19 outbreaks occurring in schools/institutions were recorded (affecting 60 persons), as compared to 5 outbreaks recorded in the previous week (affecting 33 persons). (Figure 1.3)

In the first 4 days of week 32 (Aug 4 – Aug 7), 4 COVID-19 outbreaks occurring in schools/institutions were recorded (affecting 29 persons).

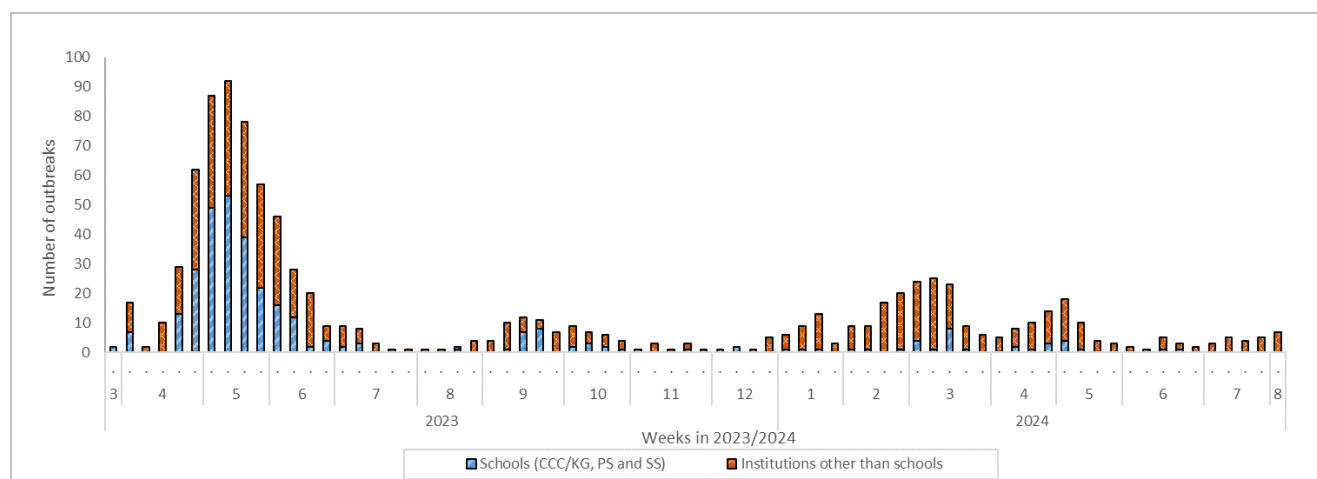


Figure 1.3 COVID-19 outbreaks in schools/institutions

Type of institutions	Week 30	Week 31	First 4 days of week 32 (Aug 4 – Aug 7)
Child care centre/ kindergarten (CCC/KG)	0	0	0
Primary school (PS)	0	0	0
Secondary school (SS)	0	0	0
Residential care home for the elderly	2	4	3
Residential care home for persons with disabilities	3	3	0
Others	0	0	1
<i>Total number of outbreaks</i>	5	7	4
<i>Total number of persons affected</i>	33	60	29

## Surveillance of severe and fatal COVID-19 cases

(Note: The data reported are provisional figures and subject to further revision.)

In week 31, the weekly number of severe COVID-19 cases including deaths with cause of death preliminarily assessed to be related to COVID-19 was 19 as compared to 20 in the preceding week. (Figure 1.4)

Since Jan 30, 2023, the cumulative number of fatal cases with cause of death preliminarily assessed to be related to COVID-19 was 1,352 (as of Aug 3, 2024).

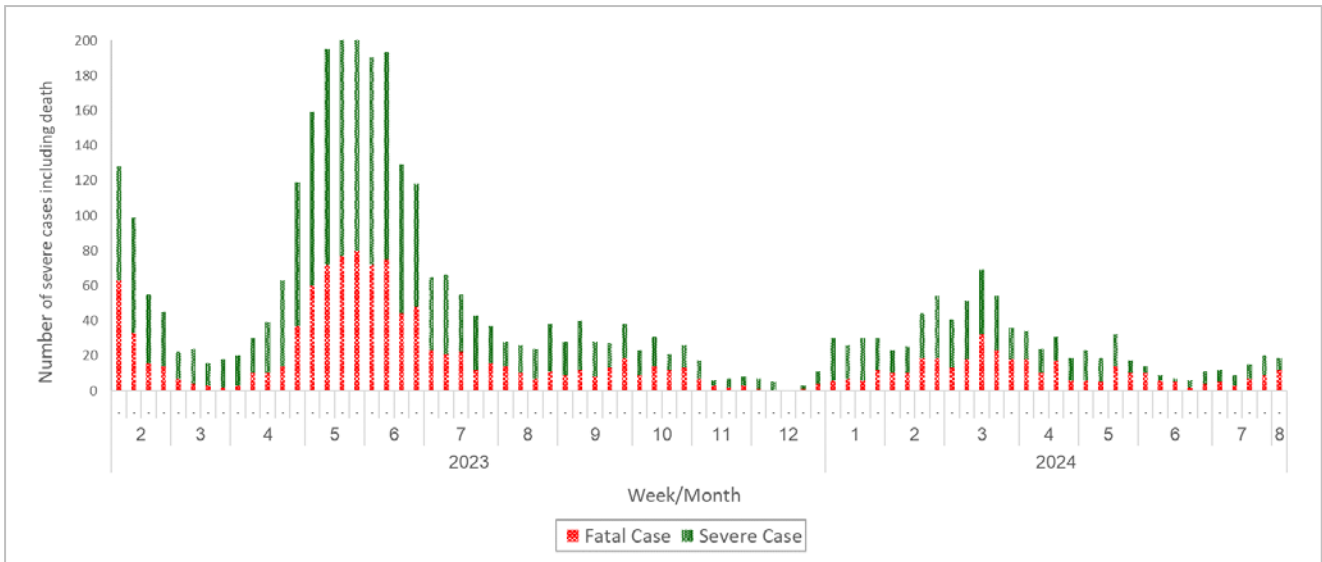


Figure 1.4 Weekly number of severe COVID-19 cases including deaths

## Sewage surveillance of SARS-CoV-2 virus

In week 31, the 7-day geometric mean per capita viral load of SARS-CoV-2 virus from sewage surveillance was around 450,000 copy/L as compared to around 537,000 copy/L in the preceding week. (Figure 1.5)

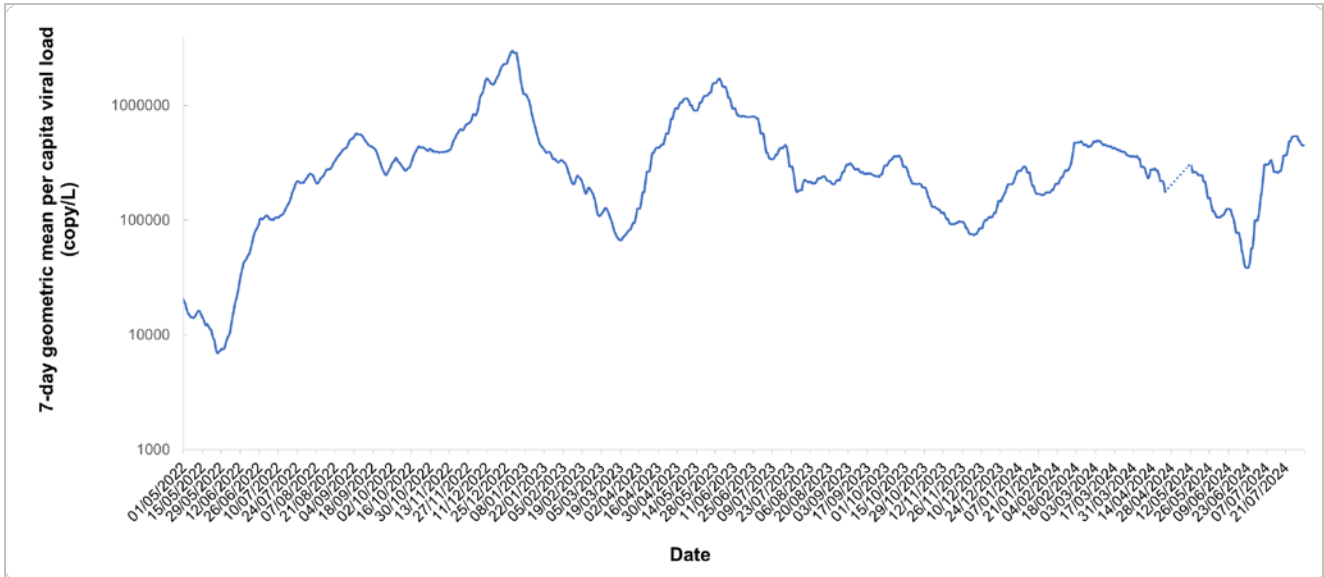


Figure 1.5 7-day geometric mean per capita viral load of SARS-CoV-2 virus from sewage surveillance since May 1, 2022

Note: The dotted line refers to the temporary sewage sampling suspension for a safety review by the Drainage Sewage Department.

## COVID-19 surveillance among sentinel general out-patient clinics and sentinel private medical practitioner clinics

In week 31, the average consultation rate for COVID-19 among sentinel general out-patient clinics (GOPC) and sentinel private medical practitioner clinics were 47.5 (Figure 1.6) and 28.5 (Figure 1.7) COVID-19 cases per 1,000 consultations, respectively.

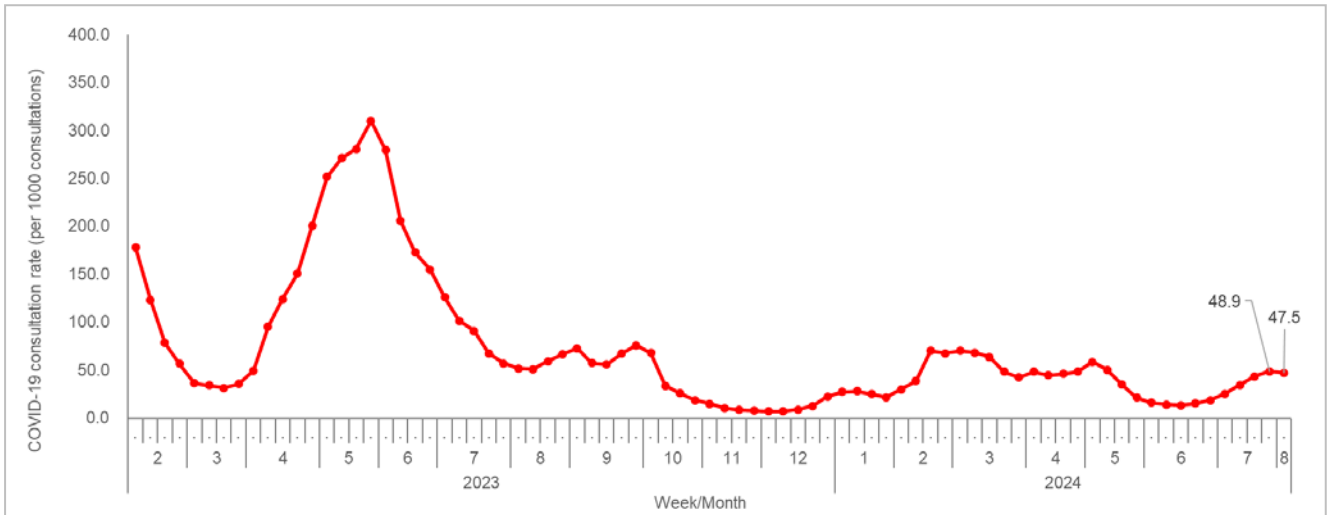


Figure 1.6 Average consultation rate of COVID-19 cases in GOPC

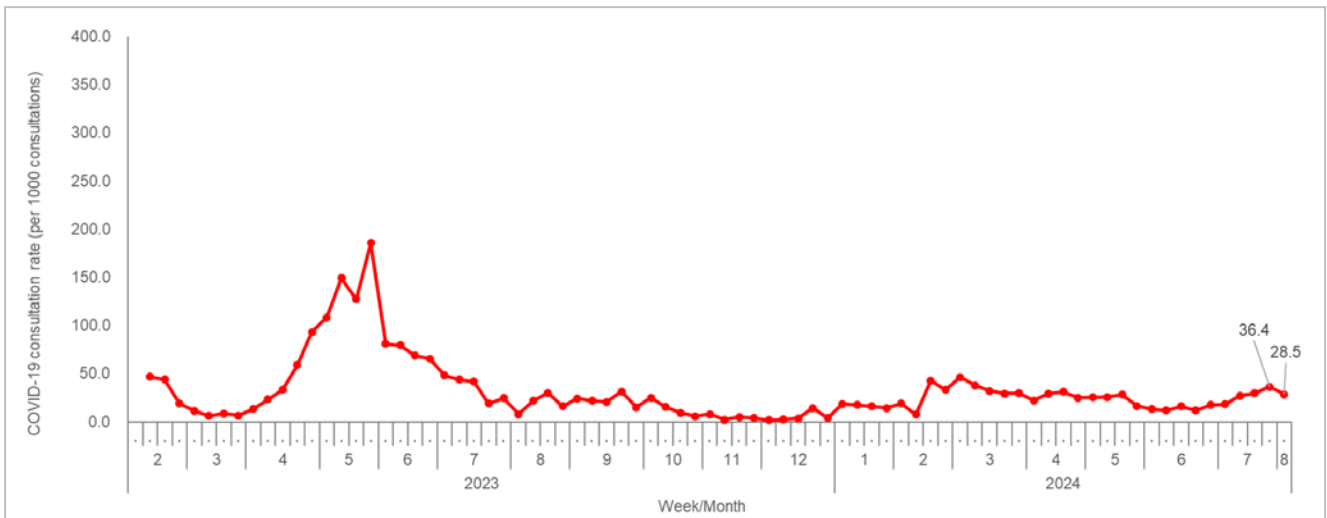


Figure 1.7 Average consultation rate of COVID-19 cases in private medical practitioner clinics

## Surveillance on SARS-CoV-2 variants

CHP conducts surveillance on SARS-CoV-2 variants from sewage samples. The latest surveillance data (as of Jul 24, 2024) showed that JN.1 and its descendant lineages remained the most prevalent variant, comprising 100% of all characterised specimens, and 59% of all belongs to the descendant strain KP.2. (Figure 1.8)

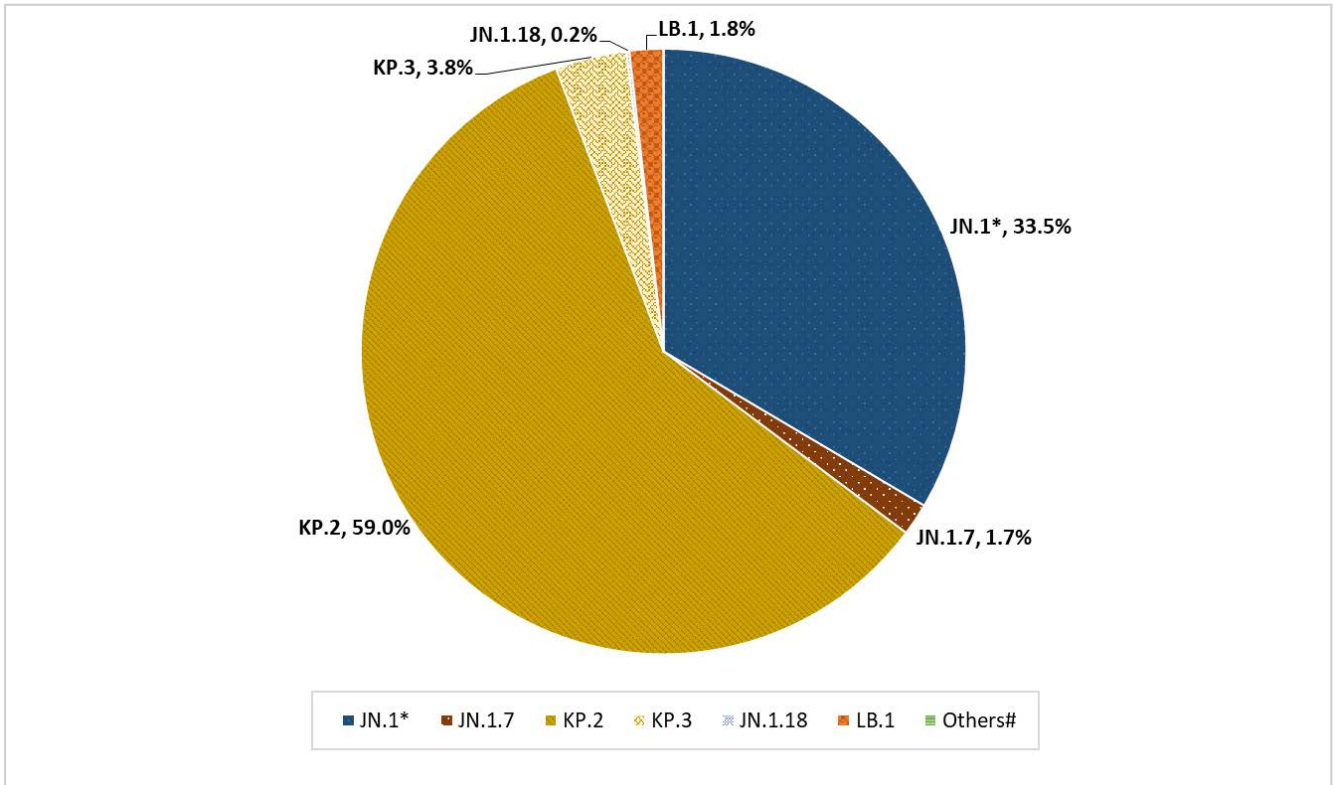


Figure 1.8 Estimated proportion of variants among sewage samples

\*Including JN.1 and its descendant lineages, except those individually specified elsewhere in the table

#Those SARS-CoV-2 variants not classified as variants of interest (VOIs)/ VUMs by WHO

Note: JN.1.7, JN.1.18, KP.2, KP.3 and LB.1 are the descendant lineages of JN.1



CHP also conducted genetic characterisation of 16 specimens obtained from reported severe and fatal cases of COVID-19 between Jul 17 and Jul 30, 2024. The results showed that JN.1 and its descendant lineages remained the most prevalent variant, comprising 100% of all characterised specimens, of which 18.8% (3 cases) belonged to the descendant strain KP.2, and 6.3% (1 case) belonged to the descendant strain KP.3. (Figure 1.9)

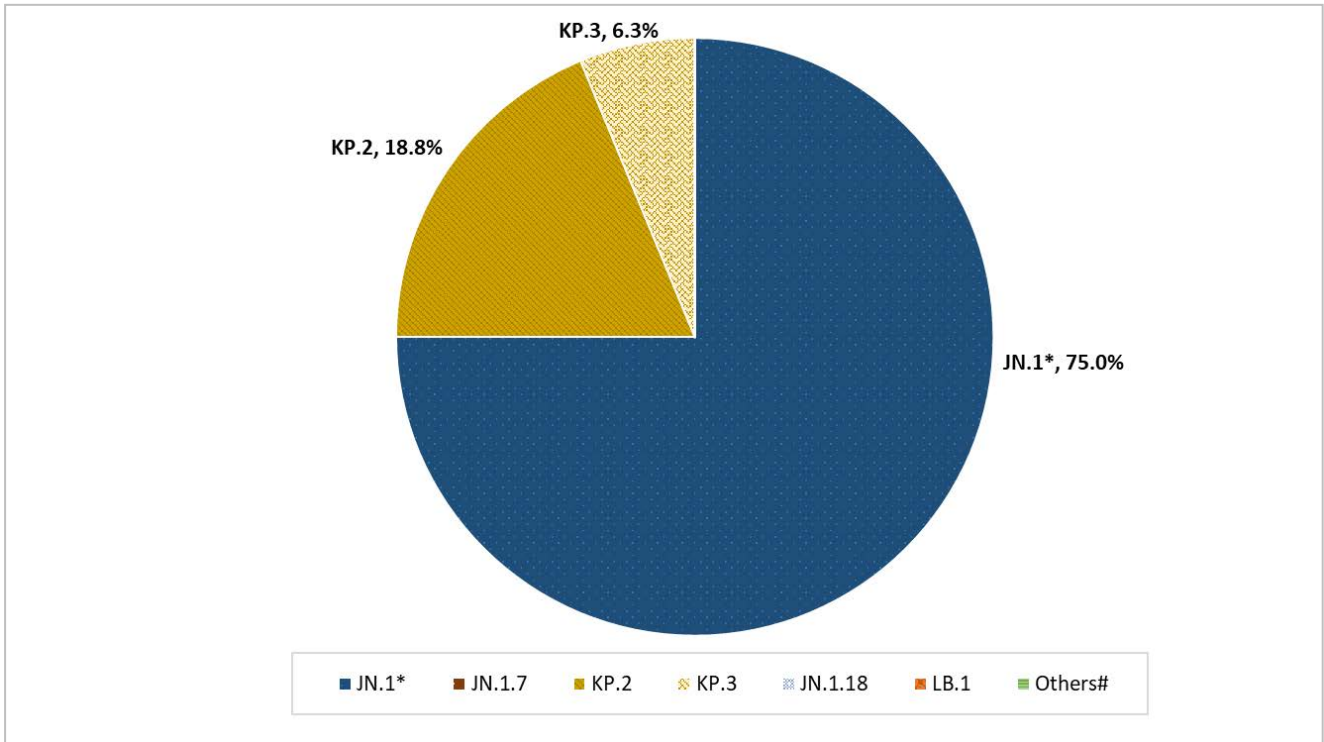


Figure 1.9 Proportion of variants among specimens obtained from reported severe and death cases for COVID-19

\*Including JN.1 and its descendant lineages, except those individually specified elsewhere in the table

#Those SARS-CoV-2 variants not classified as VOIs/ VUMs by WHO

Besides, CHP conducted genetic characterisation for the specimens obtained from some non-severe cases of COVID-19 during the same period. The results showed that JN.1 and its descendant lineages remained the most prevalent variant, comprising 100% of all characterised specimens, of which 10.0% belonged to the descendant lineage KP.2 and 27.5% belonged to the descendant lineage KP.3.

## Global situation of COVID-19 activity

- Globally, as of Jul 21, 2024, there have been 775,731,698 confirmed cases of COVID-19, including 7,054,891 deaths, reported to WHO.
- On Jul 19, 2024, WHO has updated the tracking list of SARS-CoV-2 variants, KP.3.1.1 has been designated as a VUM. Currently, WHO is monitoring two VOIs, which are BA.2.86 and JN.1, and six VUMs, which are JN.1.7, JN.1.18, KP.2, KP.3, KP.3.1.1 and LB.1.
- According to WHO COVID-19 epidemiological update last published on Jul 15, 2024,
  - ◆ Over 135,000 new cases and more than 2,000 new deaths were reported in the last 28 days (May 27 to Jun 23, 2024) globally.
  - ◆ The highest numbers of new 28-day cases were reported from Russia, New Zealand, the United Kingdom, Thailand and Greece. The highest numbers of new 28-day deaths were reported from the USA, Portugal, Russia, New Zealand, Greece and China.
  - ◆ WHO commented that current trends in reported COVID-19 cases were underestimates of the true number due to the reduction in testing and delays in reporting in many countries. Therefore, related data should be interpreted with caution.
  - ◆ Between Jun 17 and Jun 23, 2024, JN.1 is the most reported VOI globally, accounting for 30.3% and having declined from a prevalence of 43.9% between May 27 and Jun 2, 2024. The risk evaluation for JN.1 published on Apr 15, 2024 suggests an overall low public health risk at the global level based on available evidence. During the same period, the prevalence of BA.2.86 remained low at 0.1%. Among the VUMs, the prevalence of two variants showed increasing trends, including KP.3 (24.4% to 40.3%) and LB.1 (5.6% to 7.0%) while the prevalence of JN.1.7 decreased from 2.4% to 1.0%. KP.2 (17.5% to 16.7%) and JN.1.18 (2.2% to 1.9%) remained stable.

### Sources:

1. [WHO COVID-19 dashboard](#), accessed on Aug 8, 2024
2. [Tracking SARS-CoV-2 variants](#)
3. [World Health Organization COVID-19 epidemiological update](#)

## Local Situation of Influenza Activity (as of Aug 7, 2024)

**Reporting period: Jul 28 – Aug 3, 2024 (Week 31)**

- The latest surveillance data showed that the overall influenza activity remained low.
- Influenza can cause serious illnesses in high-risk individuals and even healthy persons. Given that seasonal influenza vaccines are safe and effective, all persons aged 6 months or above except those with known contraindications are recommended to receive influenza vaccine to protect themselves against seasonal influenza and its complications, as well as related hospitalisations and deaths.
- The Seasonal Influenza Vaccination Subsidy Scheme (VSS) 2023/24 has been launched since September 28, 2023, whereas the Government Vaccination Programme (GVP), Seasonal Influenza Vaccination School Outreach (Free of Charge) Programme and the Residential Care Home Vaccination Programme have been launched since October 5, 2023. The public may visit the CHP's Vaccination Schemes page for more details of the vaccination programmes (<https://www.chp.gov.hk/en/features/17980.html>).
- Apart from getting influenza vaccination, members of the public should always maintain good personal and environmental hygiene.
- For the latest information on seasonal influenza and its prevention, please visit the Centre for Health Protection's Seasonal Influenza page ([http://www.chp.gov.hk/en/view\\_content/14843.html](http://www.chp.gov.hk/en/view_content/14843.html)).

### Influenza-like-illness surveillance among sentinel general out-patient clinics and sentinel private medical practitioner clinics, 2020-24

In week 31, the average consultation rate for influenza-like illness (ILI) among sentinel general outpatient clinics (GOPC) was 5.5 ILI cases per 1,000 consultations, which was lower than 6.0 recorded in the previous week (Figure 2.1, left). The average consultation rate for ILI among sentinel private medical practitioner (PMP) clinics was 37.3 ILI cases per 1,000 consultations, which was lower than 44.0 recorded in the previous week (Figure 2.1, right).

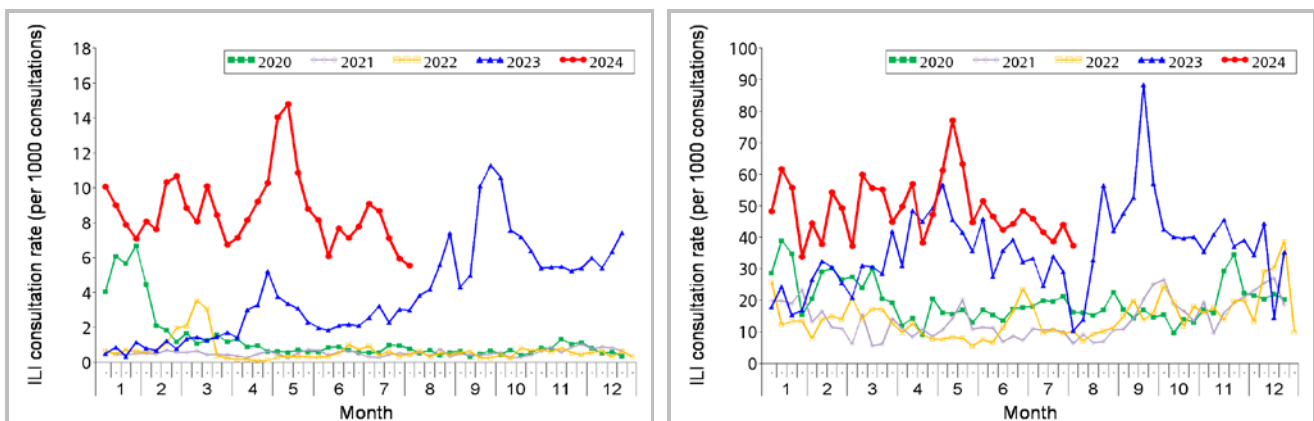


Figure 2.1 ILI consultation rates at sentinel GOPC (left) and PMP clinics (right), 2020-24

Note: The CHP has started to use electronic data on diagnosis coding of patients of the Hospital Authority's GOPC for sentinel surveillance since January 2020, replacing manual data collection in the past.

## Laboratory surveillance, 2020-24

Among the 8,297 respiratory specimens\* received in week 31, 306 (3.69%) were tested positive for seasonal influenza A or B viruses. Among the subtyped influenza detections, there were 232 (81%) influenza A(H1), 50 (17%) influenza A(H3) and 5 (2%) influenza B viruses. The positive percentage (3.69%) was below the baseline threshold of 9.21% and was lower than 4.66% recorded in the previous week (Figure 2.2).

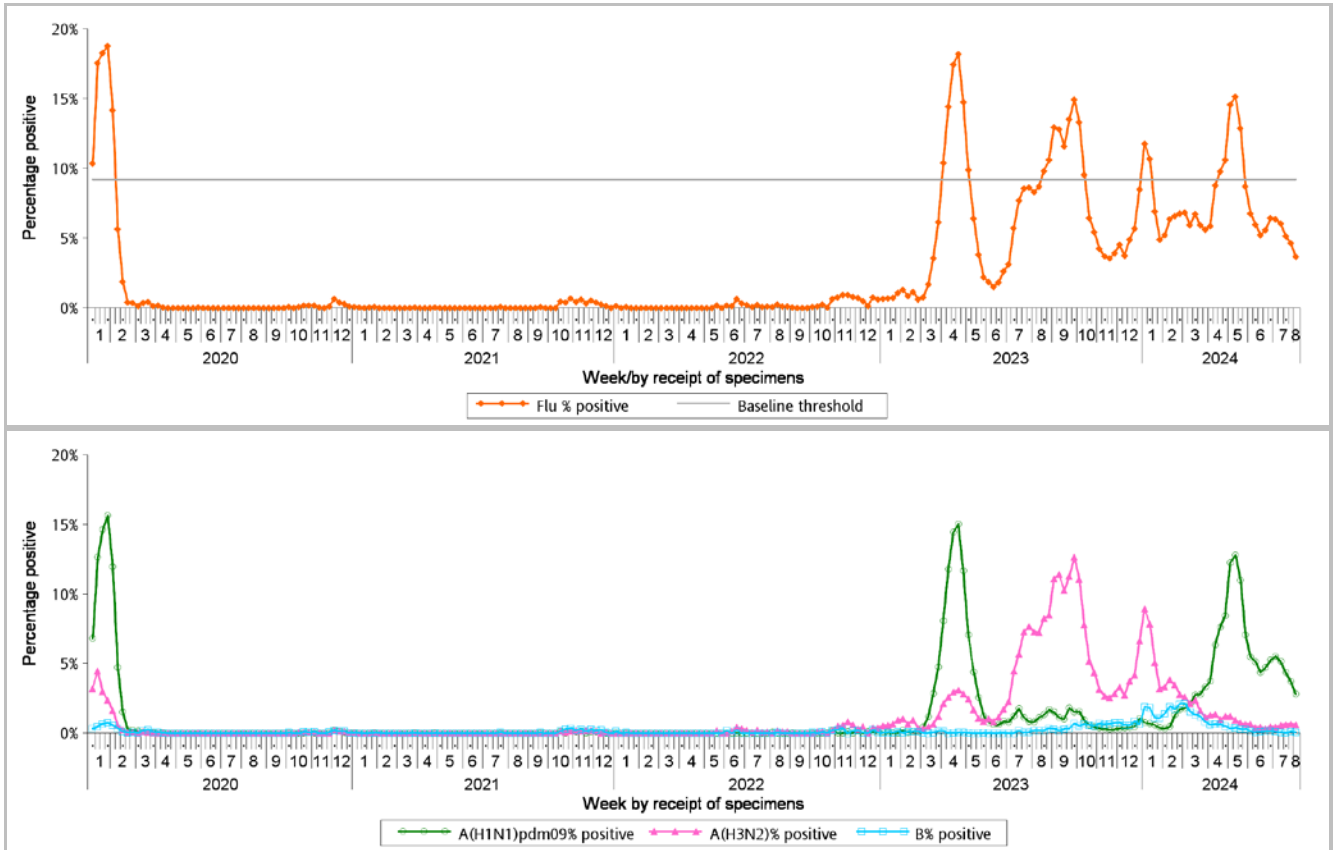


Figure 2.2 Percentage of respiratory specimens tested positive for influenza viruses, 2020-24 (upper: overall positive percentage, lower: positive percentage by subtypes)

[Note: The baseline threshold is 1.96 standard deviation above the average weekly positive percentage during non-season periods from 2014 week 49 to 2019 week 48.]

Remarks: Some specimens may contain vaccine strains from people with recent history of receiving live-attenuated influenza vaccine

## Surveillance of oseltamivir resistant influenza A and B viruses

- In June 2024, there were two new reports of oseltamivir (Tamiflu) resistant influenza A(H1) viruses.
- For the results of previous months, please refer to the following webpage:  
<https://www.chp.gov.hk/en/statistics/data/10/641/695/7068.html>

\* Including 7,710 specimens received by Public Health Laboratory Services Branch, Centre for Health Protection and 587 specimens received by the Hospital Authority

## Influenza-like illness outbreak surveillance, 2020-24

In week 31, 4 ILI outbreaks occurring in schools/institutions were recorded (affecting 18 persons), as compared to 6 outbreak recorded in the previous week (affecting 30 persons) (Figure 2.3). In the first 4 days of week 32 (Aug 4 – 7), 1 ILI outbreaks occurring in schools/institutions were recorded (affecting 6 persons).

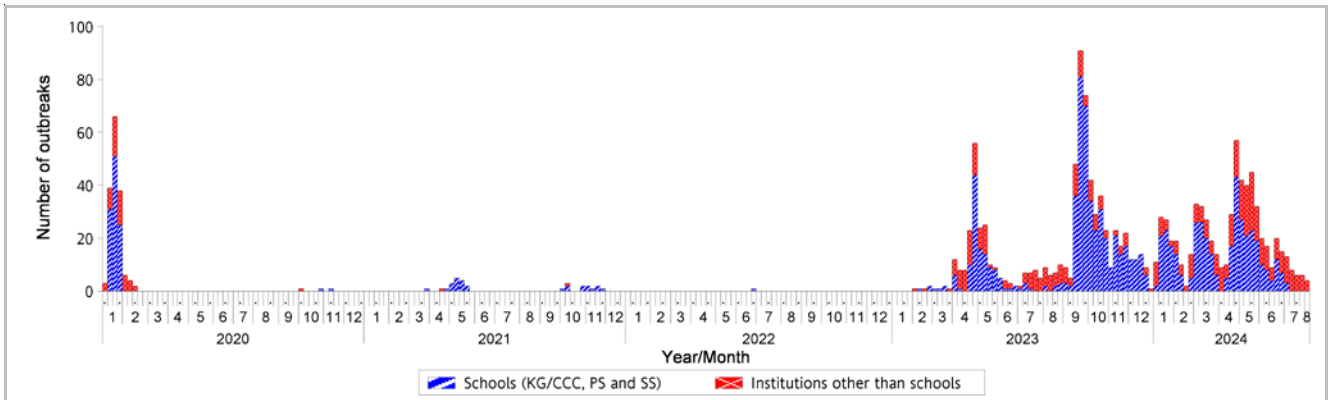


Figure 2.3 ILI outbreaks in schools/institutions, 2020-24

Type of institutions	Week 30	Week 31	First 4 days of week 32 (Aug 4 – 7)
Child care centre/ kindergarten (CCC/KG)	0	0	0
Primary school (PS)	0	0	0
Secondary school (SS)	0	0	0
Residential care home for the elderly	4	3	1
Residential care home for persons with disabilities	1	1	0
Others	1	0	0
<i>Total number of outbreaks</i>	6	4	1
<i>Total number of persons affected</i>	30	18	6

## Influenza-associated hospital admission rates in public hospitals based on discharge coding, 2020-24

In week 31, the overall admission rates in public hospitals with principal diagnosis of influenza was 0.14 (per 10,000 population), which was below the baseline threshold of 0.25 and was lower than 0.31 recorded in the previous week. The influenza-associated admission rates for persons aged 0-5 years, 6-11 years, 12-17 years, 18-49 years, 50-64 years and 65 years or above were 0.52, 0.23, 0.08, 0.03, 0.10 and 0.30 cases (per 10,000 people in the age group) respectively, as compared to 0.99, 0.29, 0.11, 0.05, 0.12 and 0.95 cases in the previous week (Figure 2.4).

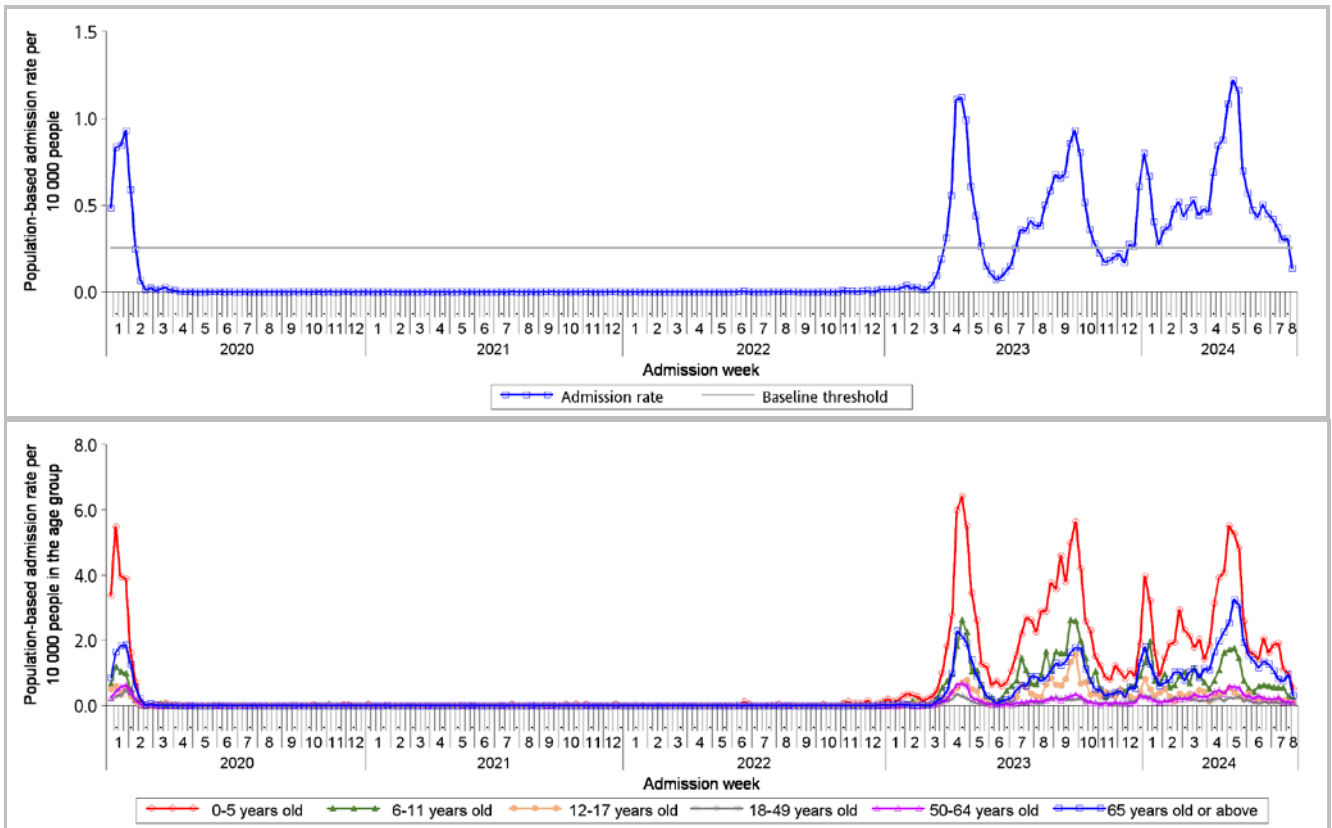


Figure 2.4 Influenza-associated hospital admission rates, 2020-24 (upper: overall rate, lower: rates by age groups)  
 [Note: The baseline threshold is 1.96 standard deviation above the average weekly admission rate during non-season periods from 2014 week 49 to 2019 week 48.]

### Rate of ILI syndrome group in accident and emergency departments, 2020-24<sup>#</sup>

In week 31, the rate of the ILI syndrome group in the accident and emergency departments (AEDs) was 130.0 (per 1,000 coded cases), which was lower than the rate of 147.4 in the previous week (Figure 2.5).

*#Note: This syndrome group includes codes related to ILI such as influenza, upper respiratory tract infection, fever, cough, throat pain, and pneumonia.*

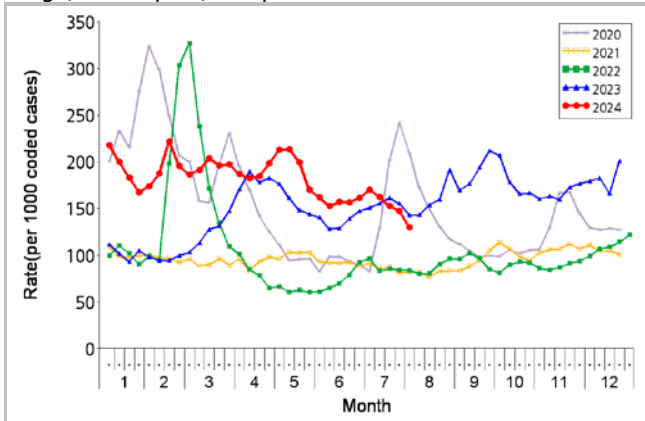


Figure 2.5 Rate of ILI syndrome group in AEDs, 2020-24

### Fever surveillance at sentinel child care centres/ kindergartens, 2020-24

The surveillance for week 30 and 31 was suspended due to summer holiday. (Figure 2.6).

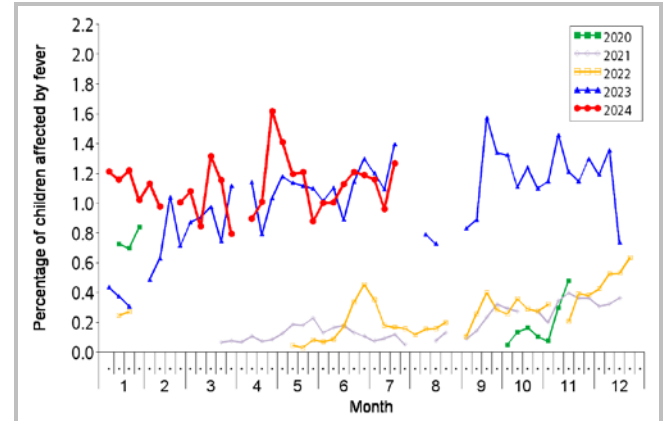


Figure 2.6 Percentage of children with fever at sentinel CCCs/KGs, 2020-24

### Fever surveillance at sentinel residential care homes for the elderly, 2020-24

In week 31, 0.09% of residents in the sentinel residential care homes for the elderly (RCHes) had fever (38°C or above), compared to 0.13% recorded in the previous week (Figure 2.7).

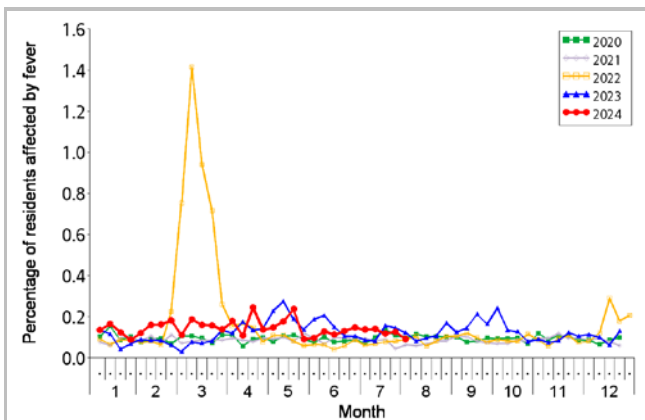


Figure 2.7 Percentage of residents with fever at sentinel RCHes, 2020-24

### Influenza-like illness surveillance among sentinel Chinese medicine practitioners, 2020-24

In week 31, the average consultation rate for ILI among Chinese medicine practitioners (CMPs) was 0.42 ILI cases per 1,000 consultations as compared to 0.21 recorded in the previous week (Figure 2.8).

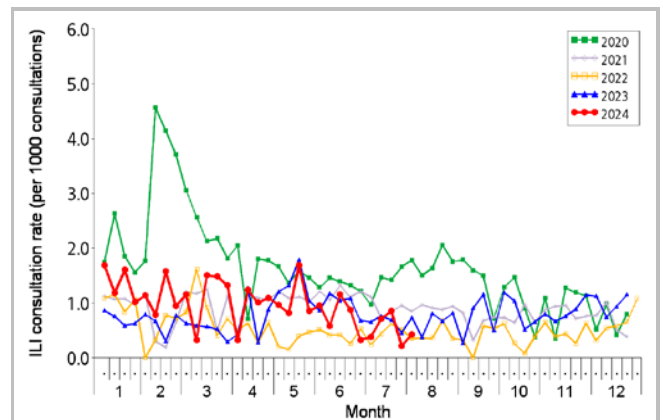


Figure 2.8 ILI consultation rate at sentinel CMPs, 2020-24



## Surveillance of severe influenza cases

(Note: The data reported are provisional figures and subject to further revision.)

### **Surveillance for intensive care unit (ICU) admission/death with laboratory confirmation of influenza among adult patients (Aged 18 years or above)**

Since 2018, the Centre for Health Protection (CHP) has collaborated with the Hospital Authority and private hospitals to monitor ICU admissions and deaths with laboratory confirmation of influenza among adult patients regularly. For surveillance purpose, the cases refer to laboratory-confirmed influenza patients who required ICU admission or died within the same admission of influenza infection. Their causes of ICU admission or death may be due to other acute medical conditions or underlying diseases.

- In week 31, 19 adult cases of ICU admission/death with laboratory confirmation of influenza were recorded (including 13 deaths) as compared to 22 cases (including 14 deaths) recorded in the previous week.

Week	Influenza type			
	A(H1)	A(H3)	B	A (pending subtype)
Week 30	14	1	1	6
Week 31	12	3	0	4

### **Surveillance of severe paediatric influenza-associated complication/death (Aged below 18 years)**

- In week 31 and the first 4 days of week 32 (Aug 4 – 7), there were no cases of severe paediatric influenza-associated complication/death.
- In 2024, 33 paediatric cases of severe influenza-associated complication/death were recorded, in which six of them were fatal (as of Aug 7, 2024).

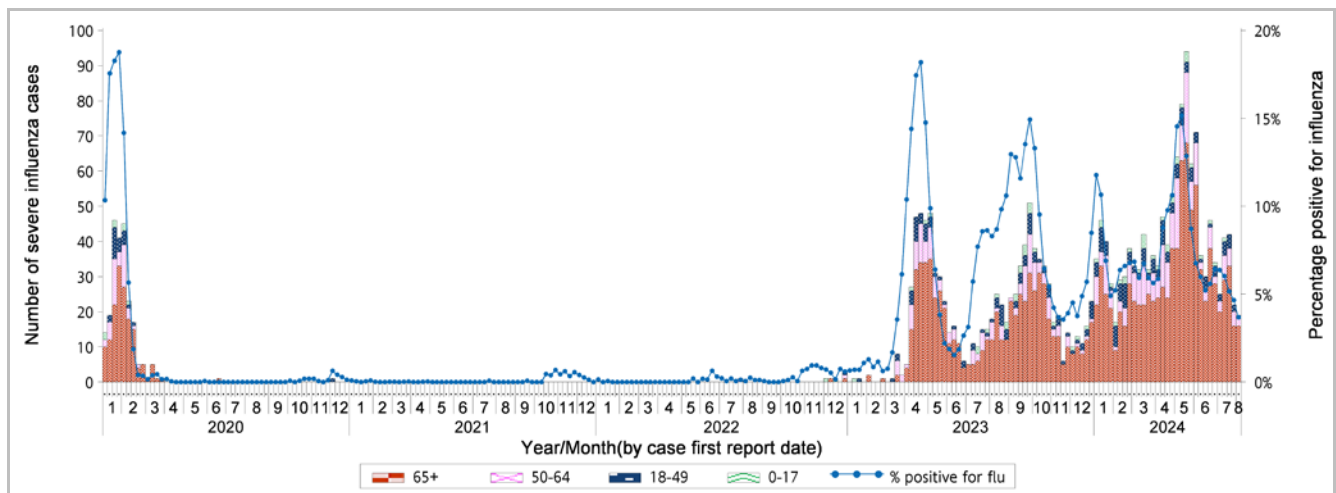


Figure 2.9 Weekly number of severe influenza cases by age groups, 2020-24 (the percentage positive for influenza viruses in Figure 2.2 is also shown in this graph)



## Global Situation of Influenza Activity

In the Northern hemisphere, influenza activity in temperate countries remained low at interepidemic levels. In the Southern Hemisphere, influenza activity in Oceania continued to be elevated. The most commonly detected viruses were influenza A(H3N2) (data up to Jul 21, 2024).

- In the United States (week ending Jul 27, 2024), seasonal influenza activity remained low nationally. The percentage of specimens tested positive for influenza was 0.7%.
- In Canada (Jun 23 to Jul 20, 2024), indicators of influenza activity were decreasing and remained at interseasonal levels. The weekly percentage of tests positive for influenza was 0.6% in week 29.
- In the United Kingdom (week ending Jul 28 2024), influenza activity was at low level. Influenza positivity in England remained low at 1.3% as compared with 1.4% in preceding week.
- In Europe (week ending Jul 28, 2024), influenza activity remained below the 10% positivity epidemic threshold at 1%.
- In Mainland China (week ending Jul 28, 2024), influenza surveillance data showed the percentage of specimens tested positive for influenza in southern provinces decreased, and that in northern provinces was at very low level, with 8.4% and 1.0% in week 30 respectively. Influenza A(H1N1)pdm09 viruses predominated.
- In Taiwan (week ending Jul 27, 2024), the percentage of ILI visits to emergency departments has been below the epidemic threshold for two consecutive weeks, indicating the end of epidemic period. However, the number of influenza cases with severe complications and deaths remained high. Influenza detections in the 4 weeks from week 25 to week 28 were influenza A(H1N1) (68.4%), influenza A(H3N2) (18.4%) and influenza B (13.2%).
- In Australia (fortnight ending Jul 28, 2024), respiratory illness activity in the community has decreased and is currently lower than the proportion observed in the same period in previous years. Among the 22,860 samples tested across sentinel laboratories, 13.9% were positive for influenza, as compared with 16.8% in previous fortnight. Influenza A viruses predominated, with influenza A(H3N2) being the majority among the subtyped influenza A viruses.
- In New Zealand (week ending Jul 28, 2024), indicators of influenza-like illness in the community remained at levels expected for this time of year. Influenza test positivity slightly decreased after being above 30% among the sentinel samples. Influenza A(H1) and A(H3) viruses were co-circulating, but A(H3) became predominating in the past two weeks.

### Sources:

Information have been extracted from the following sources when updates are available: [World Health Organization](#), [United States Centers for Disease Control and Prevention](#), [Public Health Agency of Canada](#), [UK Health Security Agency](#), [European Centre for Disease Prevention and Control \(ECDC\)](#) and [WHO Regional Office for Europe \(WHO Euro\)](#), [Chinese National Influenza Center](#), [Taiwan Centers for Disease Control](#), [Australian Department of Health and Aged Care](#) and [New Zealand Ministry of Health](#).