Virological Surveillance Summary

The total number of specimens and number of positive specimens reported to FluNet by Western Pacific Region countries and areas between week 1 and week 17 of 2022 are presented in Table 1 below. Influenza A and B are co-circulating, however, the majority of cases reported from week 1 to week 17 2022 have been Influenza B (Figure 1). Caution should be taken when interpreting these data as there are reporting delays.

Table 1: Cumulative data reported to FluNet from Western Pacific Region, week 1, 2022 to week 17, 2022

<table>
<thead>
<tr>
<th>Country (most recent week of report)</th>
<th>Total number of specimens processed</th>
<th>Total number of influenza positive specimens</th>
</tr>
</thead>
<tbody>
<tr>
<td>Australia (17 of 2022)</td>
<td>62,787</td>
<td>529</td>
</tr>
<tr>
<td>Cambodia (14 of 2022)</td>
<td>2,386</td>
<td>0</td>
</tr>
<tr>
<td>China (16 of 2022)</td>
<td>174,504</td>
<td>27,746</td>
</tr>
<tr>
<td>Fiji (15 of 2022)</td>
<td>644</td>
<td>209</td>
</tr>
<tr>
<td>Japan (15 of 2022)</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Lao People’s Democratic Republic (16 of 2022)</td>
<td>1,039</td>
<td>0</td>
</tr>
<tr>
<td>Malaysia (16 of 2022)</td>
<td>8,749</td>
<td>406</td>
</tr>
<tr>
<td>Mongolia (16 of 2022)</td>
<td>2,435</td>
<td>171</td>
</tr>
<tr>
<td>New Caledonia</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>New Zealand</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Papua New Guinea</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Philippines (15 of 2022)</td>
<td>409</td>
<td>16</td>
</tr>
<tr>
<td>Republic of Korea (17 of 2022)</td>
<td>1,611</td>
<td>0</td>
</tr>
<tr>
<td>Singapore (16 of 2022)</td>
<td>827</td>
<td>14</td>
</tr>
<tr>
<td>Viet Nam (16 of 2022)</td>
<td>9</td>
<td>0</td>
</tr>
</tbody>
</table>

Figure 1: Number of specimens positive for influenza by subtype, Western Pacific Region, week 16, 2021 to week 17, 2022 (Source: WHO FLUNET)
Influenza surveillance summary

Influenza surveillance in the WHO Western Pacific Region is based on outpatient and inpatient indicator based surveillance (IBS) systems, as well as event-based surveillance. Case definitions, population groups included and data formats differ among countries. This influenza surveillance summary includes countries and areas where routine IBS is conducted and information is available.

The WHO surveillance case definition for influenza-like illness (ILI) is an acute respiratory infection with a measured fever of ≥38°C and cough, with symptom onset within the last 10 days. For SARI, it is an acute respiratory infection (ARI) with a history of fever or measured fever of ≥38°C and cough, with symptom onset within 10 days that requires hospitalization. Sentinel site data should be interpreted with caution since the number of sites reporting may vary between weeks.

Countries in the temperate zone of the Northern Hemisphere

In countries within the temperate zone of the Northern Hemisphere, ILI and influenza activity is similar to the corresponding period from previous years.

Outpatient ILI Surveillance

**China (North)**

During week 16 of 2022, the percentage of visits for ILI at national sentinel hospitals in Northern China was 1.7%, lower than the last week (1.9%), lower than the same week of 2019~2021 (3.6%, 1.9% and 2.3%). *(Figure 2).*

![Figure 2: Percentage of visits for ILI at sentinel hospitals in Northern China, 2018-2022](Source: China National Influenza Center)
**Mongolia**

During week 15 of 2022, the ILI activity in Mongolia decreased to 71 ILI cases per 10,000 population. This is higher than the upper tolerance limit of 39 ILI cases per 10,000 population (Figure 3).

**Republic of Korea**

In week 17 of 2022, the overall weekly ILI rate was 2.8 ILI cases per 1,000 outpatient visits, which was slightly lower compared to the previous week (3.1). The ILI consultation rate has remained below the national epidemic threshold (5.8 ILI cases per 1,000 outpatient visits) and absence of seasonal peaks since week 10 of 2020 (Figure 4). Between 17 April 2022 and 23 April 2022, of 79 samples collected from patients with Acute Respiratory Infection at sentinel surveillance sites, 32.9% and 5.1% tested positive for rhinovirus and coronavirus, respectively.

Figure 3: Proportion of outpatient ILI visits per 10,000 people in Mongolia, 2020-2022
(Source: Mongolia National Influenza Center)

Figure 4: Weekly ILI incidence rate per 1,000 outpatient consultations, Republic of Korea, 2017-2022
(Source: Korean Centres for Disease Control and Prevention)
Sentinel influenza surveillance

**Japan**

In week 15 of 2022, the number of cases reported weekly by sentinel hospital sites remained very low in Japan. The number of cases in 2022 has been consistently low (Figure 5).

![Figure 5: Number of influenza cases reported weekly per reporting sentinel hospital site, Japan 2012-2022](source: Japan National Institute of Infectious Diseases)

**Countries/areas in the tropical zone**

ILI and influenza activity is similar to the corresponding period from previous years in some of the countries and areas in the tropical zone.

**Hong Kong SAR (China) – ILI and hospital Surveillance**

In week 17 of 2022, the average consultation rate for ILI at sentinel general outpatient clinics was 0.2 ILI cases per 1,000 consultations, which was the same as 0.1 reported in the previous week (Figure 6). The average consultation rate for ILI among sentinel private medical practitioner clinics was 7.8 ILI cases per 1,000 consultations, which was lower than 9.2 recorded in the previous week (Figure 7).
China (South) - ILI Surveillance
During week 16 of 2022, the percentage of visits for ILI at national sentinel hospitals in Southern China was 3.9%, higher than the last week (3.0%), higher than the same week of 2019 (4.2%), higher than the same week of 2020 and 2021 (2.4% and 3.4%) (Figure 8).
**Singapore – Acute Respiratory Infection (ARI) Surveillance**

In week 16 of 2022, the average daily number of patients seeking treatment in polyclinics for ARI was 1,467, higher than the previous season in 2021 (**Figure 9**). Of 214 samples tested for influenza in the past 4 weeks, the positivity rate in the community was 0.5%. Of the ten specimens tested positive for influenza in March 2022, all were positive for influenza A(H3N2). (**Figure 10**).

![Average daily polyclinic attendances for ARI in Singapore, 2020-2022](Source: Singapore Ministry of Health)

![Monthly influenza surveillance for ARI in Singapore, 2020-2022](Source: Singapore Ministry of Health)

**Lao PDR**

During week 15 of 2022, 78 ILI cases presented to sentinel sites, which was 172 cases lower than the previous week. Of 4 samples tested for influenza in week 15, 2022, zero (0) cases tested positive (**Figure 11**).

![Weekly number of ILI cases at sentinel sites (2018 to 2022)](Source: Lao National Center for Laboratory and Epidemiology)
Cambodia

In week 16 of 2022, Ministry of Health received data from seven sentinel sites in Cambodia. The number of ILI cases low in Cambodia until week 32 of 2021, but started increase from week 8 of 2022 and peaked in this week (week 16 2022) Since week 35 of 2020, there was one human infection with avian influenza A(H9N2) detected in week 8 of 2021. There have been no positive case in 2022 (Figure 12).

![Figure 12: Number of ILI cases from seven sentinel sites and influenza positivity rate by week, 2020-2022, Cambodia](source: Communicable Disease Control Department, Cambodia Ministry of Health)

Countries in the temperate zone of the southern hemisphere

In the temperate zone of the southern hemisphere, influenza activity is reported during the influenza season, usually starting in May in Australia and New Zealand.

Australia – Laboratory-confirmed influenza

From 11 April to 24 April 2022, there were 1,636 laboratory-confirmed influenza notifications to the National Notifiable Disease Surveillance System (NNDSS). In the year to date, there have been 2,714 notifications of laboratory-confirmed influenza to the NNDSS. The number of notifications in 2022 have increased since March, however overall numbers to date remain below the 5 year average (Figure 13).
New Zealand – Influenza like Illness

Overall, based on multiple sources of surveillance information, influenza-like illness (ILI) activity has remains high in the week ending 22 April 2022. Community ILI activity remains very high for this time of year, driven by the current COVID-19 Omicron outbreak. The rates of Healthstat consultations for ILI are low with limited interpretability at this time of year. The ILI consultation rates in most age groups in the week ending 22 April are below the historical rates (Figure 14). Public Health Units routinely investigate respiratory outbreaks, including laboratory testing of a sample of cases. There has been no influenza virus detected through the surveillance system in 2022 (source).
Pacific Island Countries and Areas (PICs) - ILI Surveillance

In week 16, 2022, low levels of influenza-like illness activity continue to be reported across the Pacific Island Countries and Areas (Figure 15).
Caution should be taken in interpreting these data as there may be changes in the number of sentinel sites reporting to the Pacific Syndromic Surveillance System.

* FSM: Federated States of Micronesia, CMNI: Commonwealth of Northern Mariana Islands

** Figure 15: Reported cases of influenza-like illness in Pacific Island Countries, 2019-2022
(Source: Pacific Syndromic Surveillance System Weekly Bulletin)
Global influenza situation updates

Virological update

Global update

Others:
- Recommended composition of influenza virus vaccines for use in the 2022 southern hemisphere influenza season [Link]
- Recommended composition of influenza virus vaccines for use in the 2022-2023 northern hemisphere influenza season [Link]

WHO's YouTube Channel: film exploring a number of key aspects of the constant evolution of influenza viruses and associated impacts on public health. [Arabic], [Chinese], [English], [French], [Russian], [Spanish]