



## Synopsis

The epidemic of influenza-like illness (ILI) is similar to previous weeks. However, the number of influenza confirmed cases with severe complications remains high. It is essential to monitor subsequent changes in the epidemic situation and be aware of the risk of severe illness.

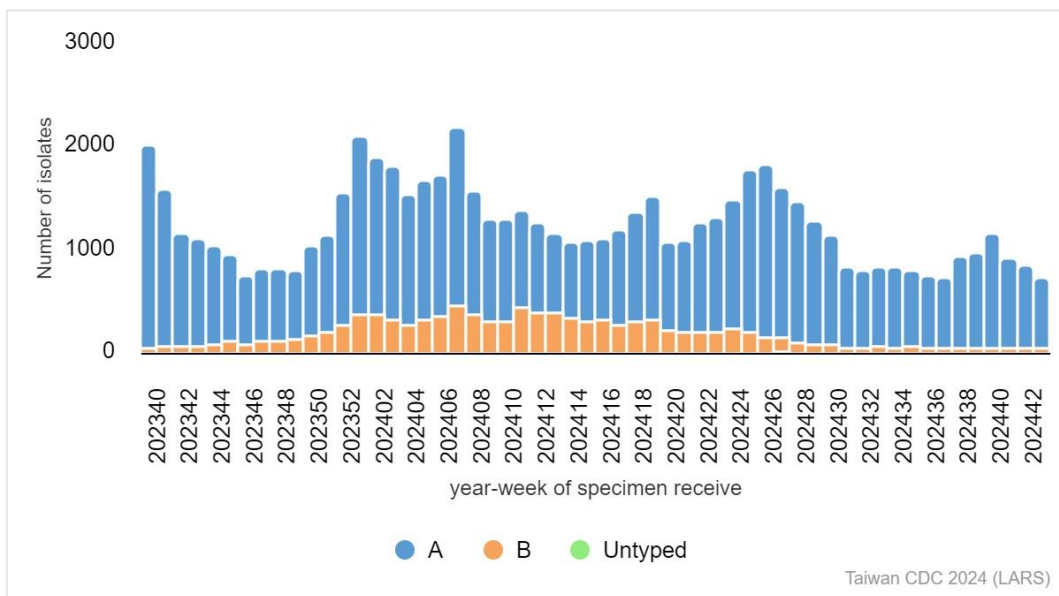
- The trend of visits to outpatient and emergency room (ER) for ILI is similar to previous weeks, but the epidemic may fluctuate due to the temperature change. Continued observation of the ongoing epidemic trends is necessary.
- During the past four weeks, the results of Contracted Virology Laboratories surveillance indicated that among influenza isolates, A/H1N1 was the dominant strain circulating in the community.
- During 2024-2025 influenza season (since October 1, 2024), there have been 142 influenza cases with severe complications, of which 16 cases were fatal. During 2023-2024 influenza season, there were 1,776 influenza cases with severe complications, of which 412 cases were fatal.

## Laboratory Surveillance<sup>1</sup>

### Laboratory Automated Reporting System (LARS)

The number of influenza-positive specimens has shown a decreasing trend recently. Over the last four weeks, influenza A positive specimens accounted for 94%, and influenza B positive specimens accounted for 6%. Data are available at <https://nidss.cdc.gov.tw/>.

Influenza-positive specimens from LARS



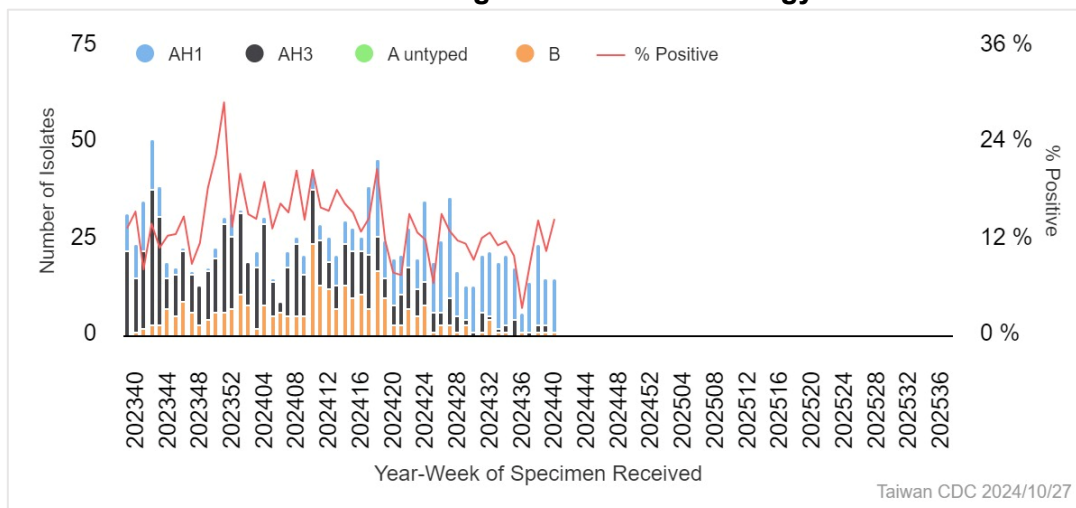
<sup>1</sup> In terms of the surveillance systems in Taiwan, please see: Jian, S. W., Chen, C. M., Lee, C. Y., & Liu, D. P. (2017). Real-Time Surveillance of Infectious Diseases: Taiwan's Experience. Health security, 15(2), 144-153.



## Contracted Virology Laboratories Surveillance

During week 38 to 41, the number of isolated influenza A viruses exceeded Influenza B. Among influenza isolates, A/H1N1 accounted for 88.2%, followed by A/H3N2 (7.4%), and influenza B (4.4%). Data are available at <https://nidss.cdc.gov.tw/>.

Influenza isolates according to Contracted Virology Laboratories



## Antigenicity

During the 2023-2024 influenza season (from Oct 1, 2023 to Sep 30, 2024), 385 of 405 influenza A/H1N1 viruses (95.1%) were antigenically similar to the vaccine reference strain A/Victoria/4897/2022 (H1N1)pdm09, 361 of 389 influenza A/H3N2 viruses (92.8%) were antigenically similar to the vaccine reference strain A/Darwin/9/2021 (H3N2), and 199 of 199 influenza B/Victoria viruses (100%) were antigenically similar to the vaccine reference strain B/Austria/1359417/2021 (B/Victoria lineage).

WHO recommended vaccine strains for the northern hemisphere in the 2023-2024 influenza season	Vaccine-like (%)	Low reactor (%)
A/Victoria/4897/2022 (H1N1)pdm09-like virus	385 (95.1%)	20 (4.9%)
A/Darwin/9/2021 (H3N2)-like virus	361 (92.8%)	28 (7.2%)
B/Austria/1359417/2021 (B/Victoria lineage)-like virus	199 (100.0%)	0 (0.0%)

Note: The hemagglutination inhibition (HI) method was used to investigate the antigenicity, and the titer of the isolated virus was at least 8-fold lower than that of the reference virus, identifying it as a low reactor.

## Antiviral Resistance

The table below summarizes the antiviral resistance to neuraminidase inhibitor (Oseltamivir) of the isolates during the 2023-2024 influenza season.

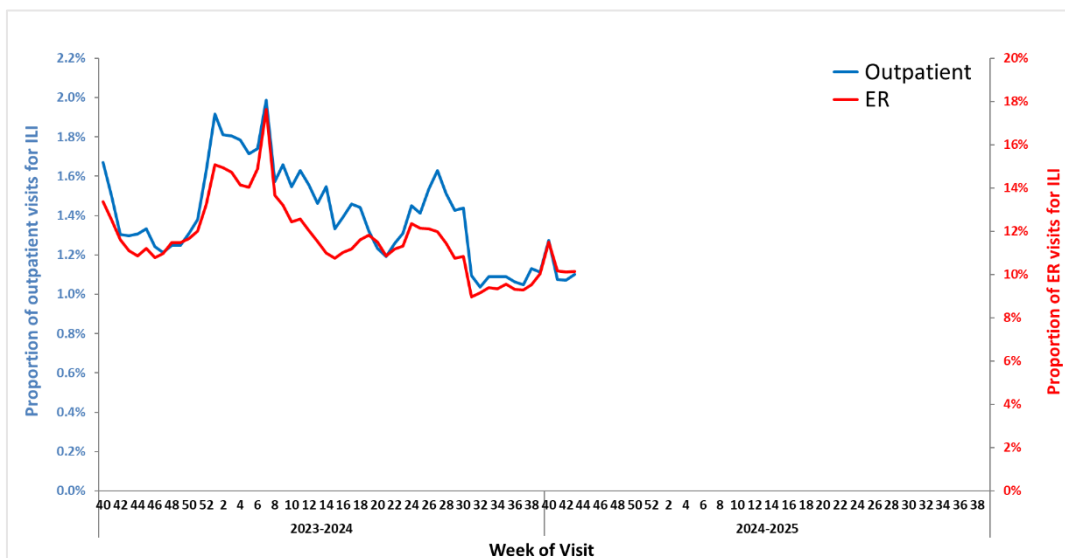
	No. of isolates tested	Resistance Viruses, n (%)
<b>A (H1N1)</b>	422	13 (3.1%)
<b>A (H3N2)</b>	499	2 (0.4%)
<b>B</b>	270	1 (0.4%)



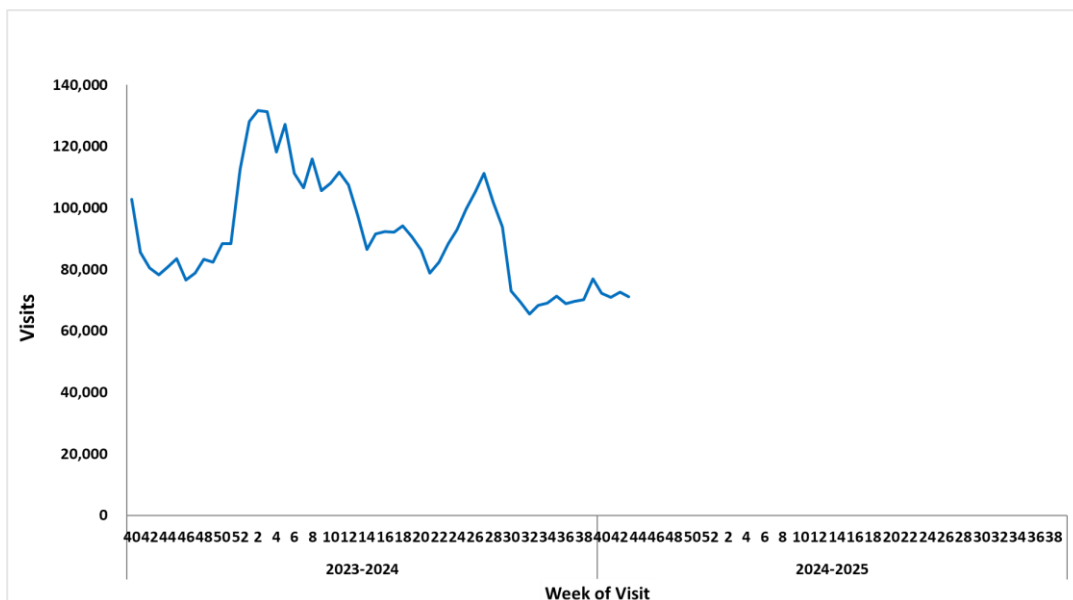
## Influenza-like Illness (ILI) Surveillance

During week 43, the proportions of ILI visits were 1.1% in outpatient and 10.2% in ER, and the total number of visits for ILI was 71,157, all of which remained similar to previous weeks. It is still necessary to monitor subsequent changes in the epidemic situation. Data are available at <https://nidss.cdc.gov.tw/>.

### Proportion of ILI visits in outpatient and ER



### Total number of ILI visits in outpatient and ER



## Influenza Case with Severe Complications

During 2024-2025 influenza season (since Oct 1, 2024), a total of 142 influenza cases with severe complications (130 of H1N1, 7 of H3N2, 3 of untyped influenza A, and 2 of influenza B) were confirmed, of which 16 cases (all H1N1) was fatal.

During 2023-2024 influenza season (from Oct 1, 2023 to Sep 30, 2024), a total of 1,776 influenza cases with severe complications (1,131 of H1N1, 518 of H3N2, 20 of untyped influenza A, and 107 of influenza B) were confirmed, of which 412 cases were fatal (289 of H1N1, 96 of H3N2, 7 of untyped influenza A, and 20 of influenza B).

### Incidence of influenza cases with severe complications and mortality rate during 2024-2025 influenza season

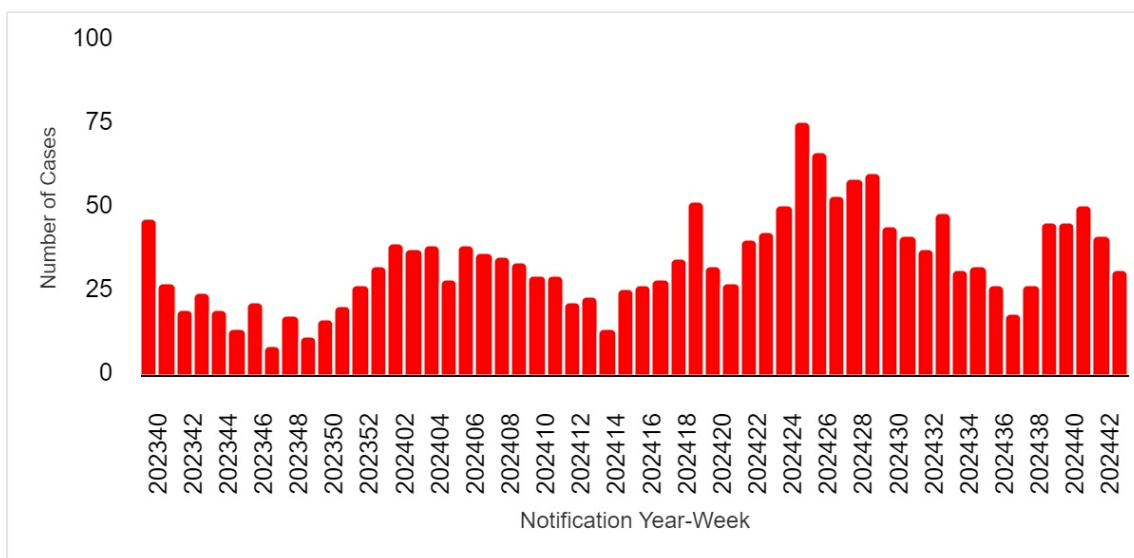
Age Group	Cases	Deaths	Cumulative incidence per 100,000 population	Cumulative mortality per 100,000 population
< 3 y	0	0	0.00	0.00
3-6 y	0	0	0.00	0.00
7-18 y	2	0	0.08	< 0.01
19-24 y	0	0	0.00	0.00
25-49 y	16	1	0.18	0.01
50-64 y	42	5	0.79	0.09
65 +	82	10	1.96	0.24
Total	142	16	0.61	0.07

### Incidence of influenza cases with severe complications and mortality rate during 2023-2024 influenza season

Age Group	Cases	Deaths	Cumulative incidence per 100,000 population	Cumulative mortality per 100,000 population
< 3 y	8	1	1.80	0.23
3-6 y	34	3	4.56	0.40
7-18 y	79	8	3.23	0.33
19-24 y	11	1	0.71	0.06
25-49 y	229	38	2.63	0.44
50-64 y	394	71	7.45	1.34
65 +	1,021	290	24.38	6.92
Total	1,776	412	7.60	1.76



## Notification trend of confirmed influenza cases with severe complications

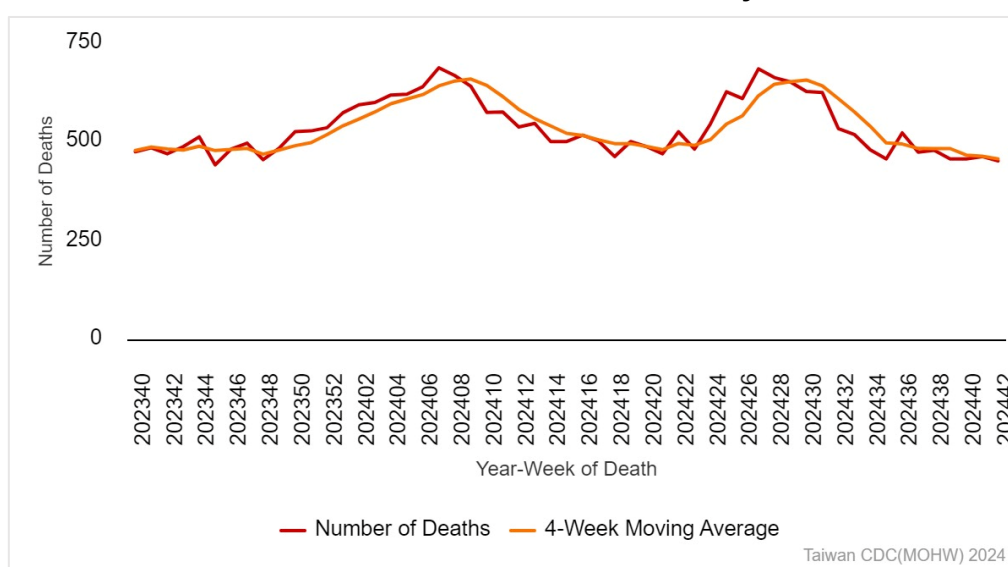


Data are available at <https://nidss.cdc.gov.tw/>.

## Pneumonia and Influenza (P&I) Mortality Surveillance

Based on the Internet System for Death Reporting (ISDR)<sup>2</sup> data, the number of deaths attributed to pneumonia and influenza (P&I) has remained stable recently. The proportion of deaths attributed to P&I for adults aged 65 and older was the highest among the three age groups (0-49, 50-64, and 65+). Weekly data are available at <https://nidss.cdc.gov.tw/>.

### Pneumonia and Influenza Mortality



Taiwan CDC(MOHW) 2024

<sup>2</sup> Medical institutions are required to report any mortality case to the Ministry of Health and Welfare (MOHW) within 7 days after a death certificate is issued through the Internet System for Death Reporting (ISDR). Either the immediate cause of death or the underlying cause of death was used to identify P&I death cases. Only those with keyword texts containing 'pneumonia', 'influenza' or 'common cold' were counted as a P&I death.

