



# INFLUENZA REPORT

2024-2025 Influenza Season

MMWR Week 48 (11/24/24-11/30/24)

**Weekly Report of Influenza and Influenza-like Illness (ILI) Activity**



## Influenza and Influenza-like Illness Activity

### Spread

#### **Sporadic**

Transmission levels remain relatively low across the state

### Flu Activity

#### **Minimal**

Reported influenza activity is minimal across the state

### ILI Activity

#### **Minimal**

Reports of outpatient respiratory illnesses remain low

### Co-circulating

#### **Other Viruses:**

SARS-CoV-2, Pertussis, and low levels of RSV

### Seasonal Data

#### **Types of Flu**

Influenza A and B viruses are circulating

### Subtypes

#### **Primary: A viruses**

Predominately H1N1 and H3N2 viruses reported across the country this week

### Outbreaks

**0**

No newly reported LTCF or school associated outbreaks this week

### Severity

#### **ED Visits**

This week the percentage of ED visits for influenza increased compared to last week

### Deaths

**0**

No locally reported pediatric deaths; two pediatric deaths reported in the US so far this season

### Syndromic

**3**

Three syndromic anomalies were reported this week in Fremont and Laramie counties

### EMS

**18**

Suspected ILI reports this week

### Hot Spots

#### **Tracking Trends**

Most counties continue to report low levels of influenza activity



## Geographic Activity by Regions

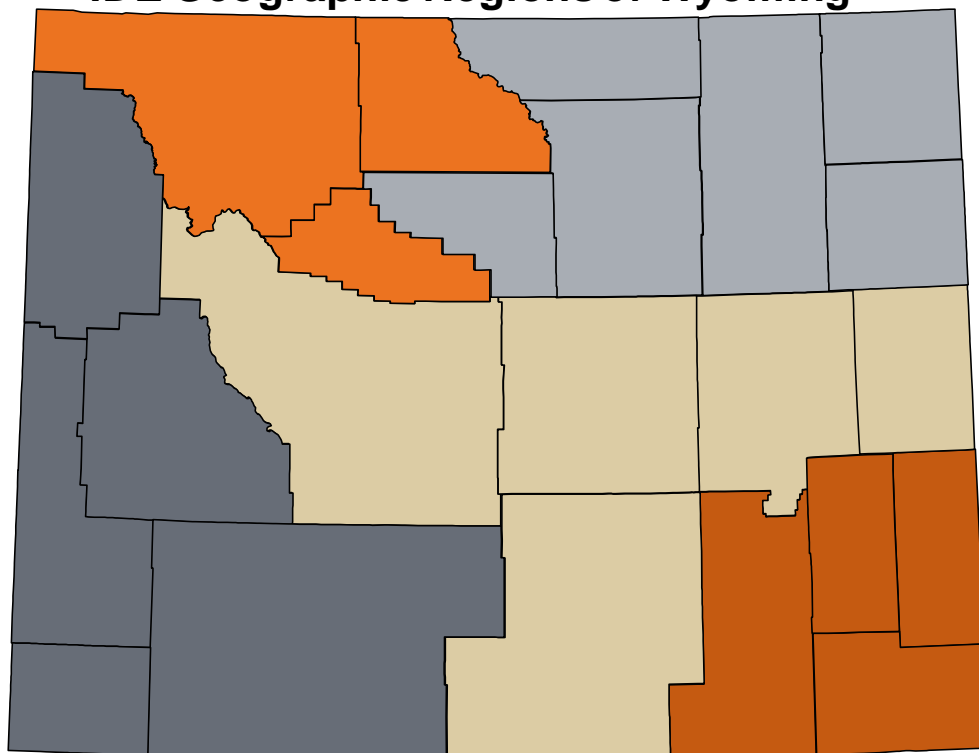
Wyoming as a whole had **minimal** ILI activity this week (MMWR Week 48). Transmission levels remain relatively low across the state.

Healthcare providers in six counties reported ILI activity.

The electronically reported influenza cases represent four Infectious Disease Epidemiology (IDE) Geographic Regions.

Healthcare providers across the state electronically reported **23 cases** of influenza (rapid influenza diagnostic tests and PCR confirmed tests) this week.

### IDE Geographic Regions of Wyoming



- Southeastern (**sporadic**, cases reported in Laramie and Goshen counties)
- Big Horn (**sporadic**, cases reported in Big Horn and Park counties)
- Central (**sporadic**, cases reported in Carbon County)
- Northeastern (**sporadic**, cases reported in Campbell County)
- Western (no reported cases this week)



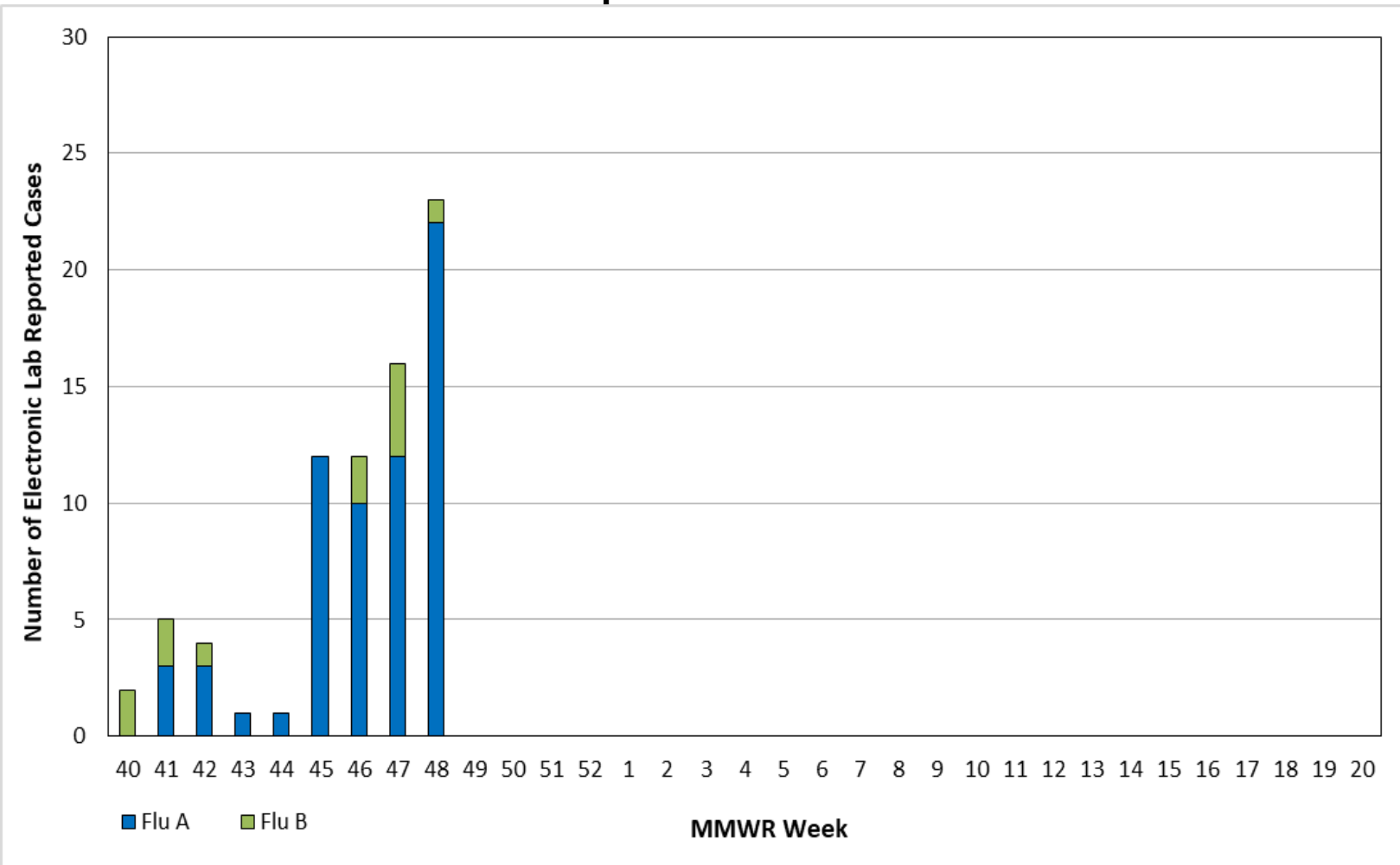
## Public Health Laboratory

The overall volume of samples tested for influenza at the Wyoming Public Health Laboratory has steadily declined following the increasing distribution of the CDC Influenza SARS-CoV-2 Multiplex Assay in addition to at home testing options. We strongly encourage providers across the state to send additional specimens to the WPHL for virologic surveillance. The number of positive influenza specimens electronically reported this week increased compared to week 47.

## Healthcare and Clinical Laboratories

Clinical laboratories across the country most frequently reported **Influenza A/H1N1 and A/H3N2 viruses** co-circulating during MMWR Week 48, with a handful of Influenza B viruses.

### Electronic Lab Reports of Influenza Cases



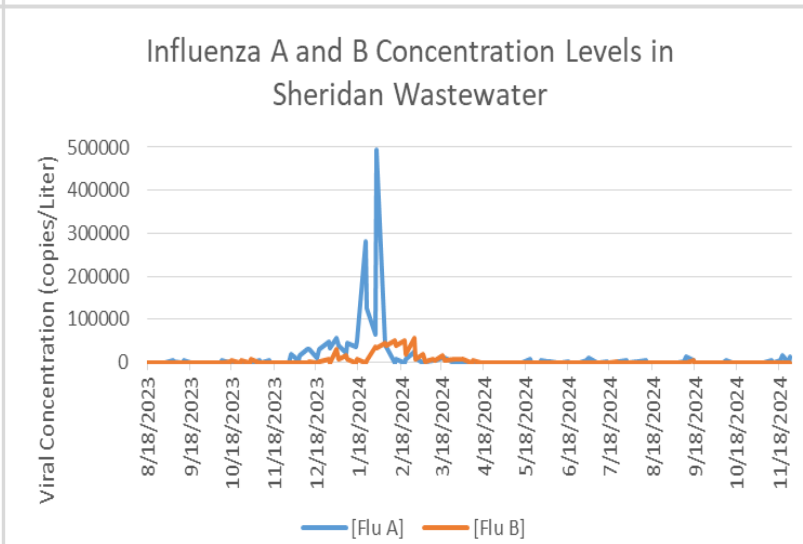
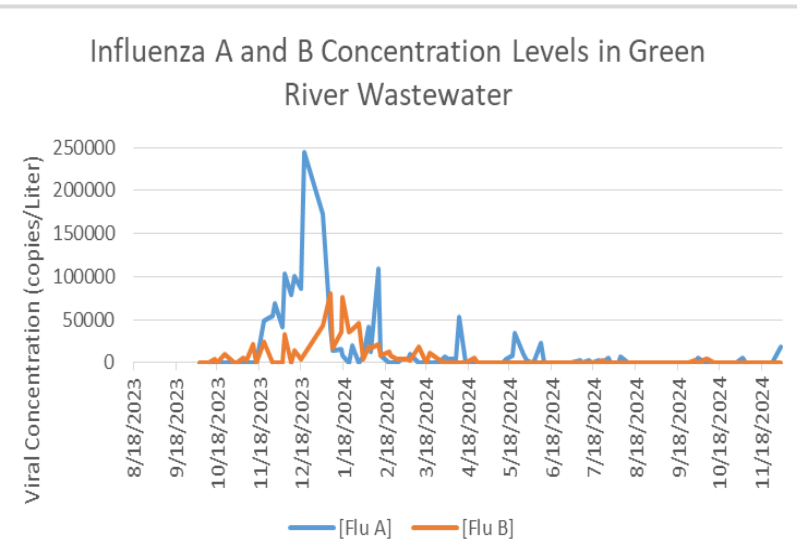
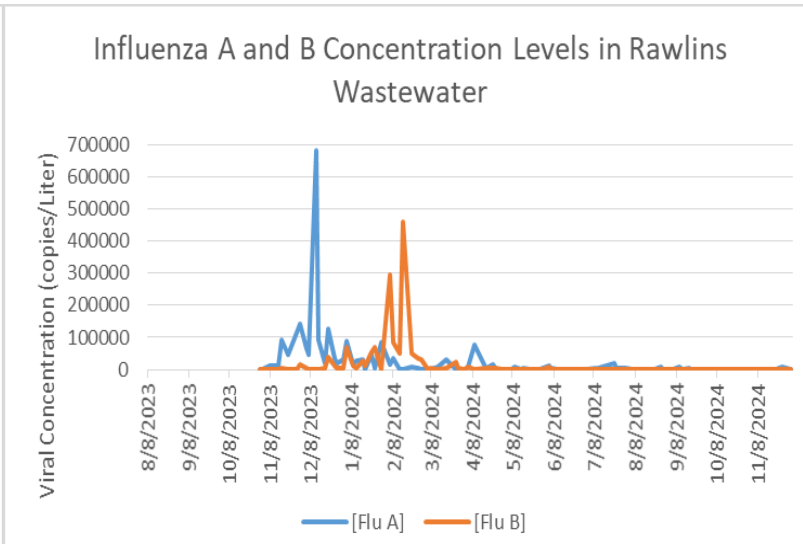
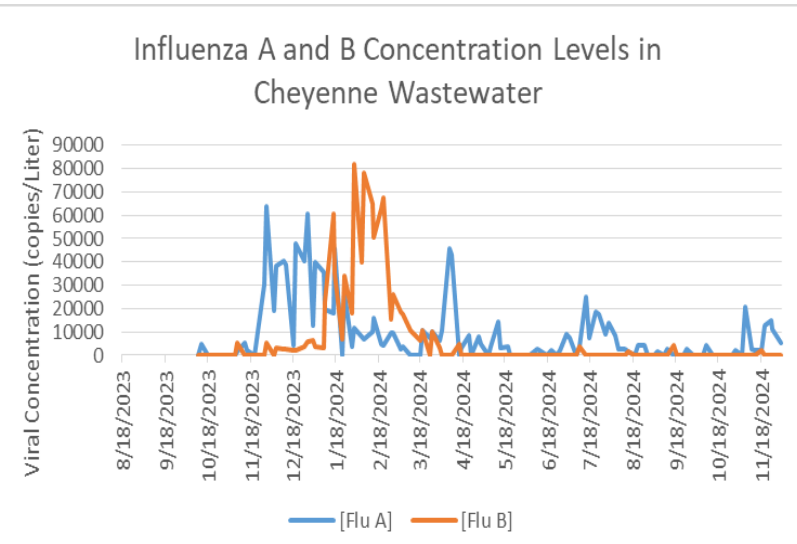
\* This graph is not representative of all influenza cases across the state

# Wastewater Surveillance



## Importance of Wastewater Surveillance:

Here at the Wyoming Public Health Laboratory, we have a team of scientists working to analyze wastewater samples to identify trends in influenza (and many other pathogens). The graphs pictured below depict trend lines for the 2023-2024 influenza season and the start of the 2024-2025 season.



## Sampling and Analysis Methodologies:

For each city, twice a week, we have a wastewater utility operator take a 24 hour composite sample from the influent channel prior to treatment, of which they send us a total of 150mL in three 50mL tubes for us to test. They then ship the samples chilled via priority overnight so that we can run all of our measurements the following day. The sampling procedure is conducted in triplicate, and we take an average of the three to determine the estimated concentration of viral particles present in the wastewater for any given day. We then take the average concentration and divide it by our percent recovery to account for any deviation due to differing levels of present inhibitors. Each plot point on the graph represents the average viral concentration for a set of triplicates, normalized for the percent recovery.

# Influenza-like Illness Surveillance



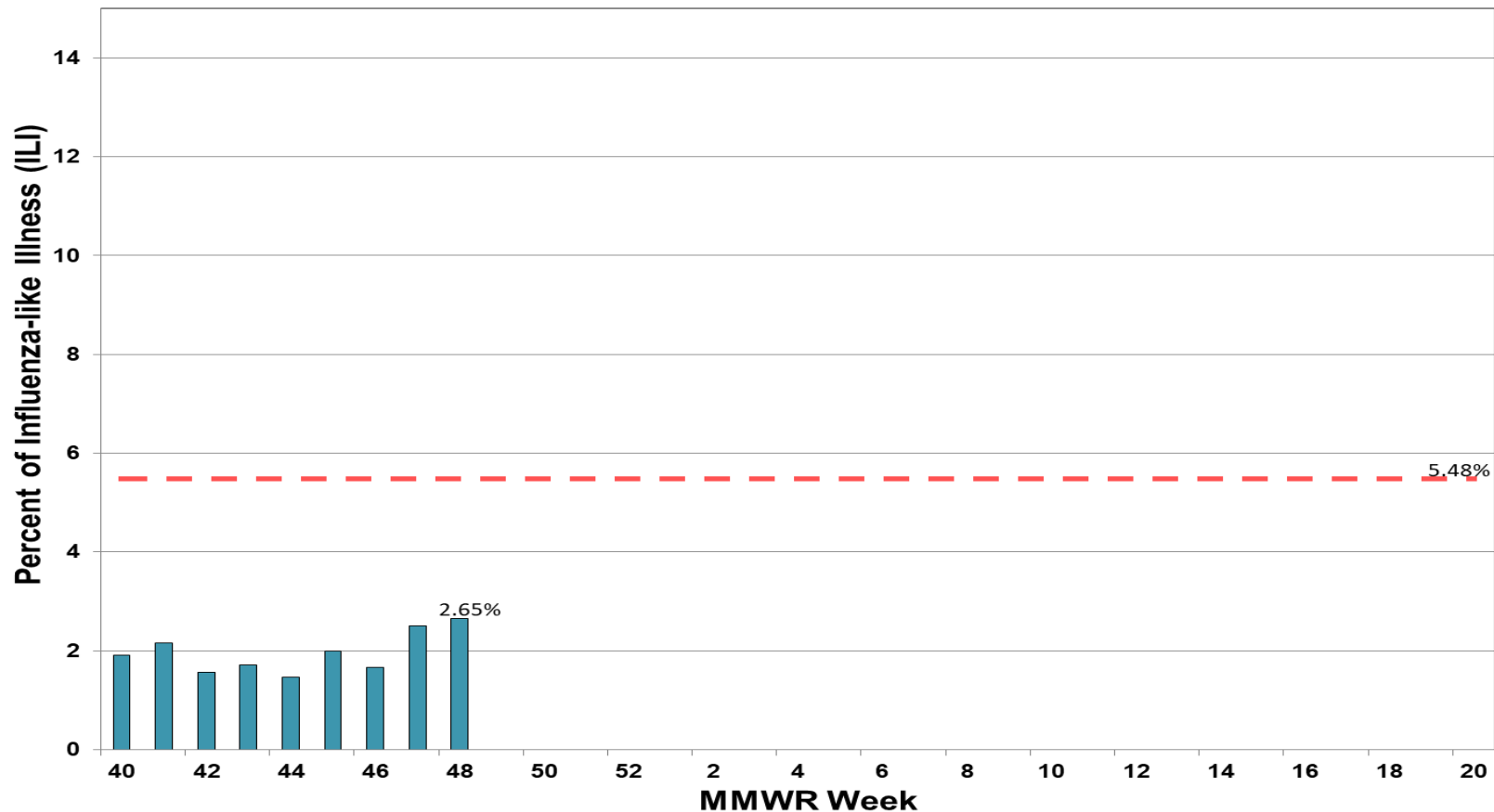
## ILINet Providers

The percent of patient visits to ILINet Sentinel Providers for an influenza-like illness was **2.65%**, which is **below** Wyoming's baseline (**5.48%**), and a slight increase compared to week 47.

The Wyoming Department of Health received reports from less than 50% of the ILINet providers across the state. Therefore, weekly percentages could continue to change as additional values are submitted.

**Key Updates:** Seasonal influenza activity is continuing to increase but remains low nationally. Based on CDC calculations, transmission within Wyoming remained **minimal** this week. Nationally and in HHS regions 2, 6, 7, 8, and 9, the percentage of respiratory specimens testing positive for influenza virus in clinical laboratories increased compared to the previous week. In HHS regions 1, 3, 4, 5, and 10, the percentage of specimens testing positive has been increasing during the past several weeks, but the increase this week compared to the previous week was <0.5 percentage points.

## Weekly Percent of ILI Visits





## Mortality Data

Tracking death certificates is the best surveillance system to capture and identify pneumonia and influenza-associated deaths in Wyoming. According to the CDC, influenza is infrequently listed on death certificates. Also, testing for seasonal influenza infections is not frequently performed, particularly among the elderly, who are at greatest risk for seasonal influenza complications and death. Therefore, public health officials may not identify influenza-associated deaths in many instances; consequently, this surveillance system may underestimate the true impact of influenza-associated deaths across the state.

There have been four pneumonia and influenza (P&I) mortality reports certified since the beginning of the 2024-2025 Influenza Season.

### Monthly P&I Mortality Reports (2020-2025)

