

Influenza & Respiratory Illness Activity Annual Summary 2020-2021

A summary of influenza surveillance indicators prepared by the Division of Infectious Disease Epidemiology Prevention & Control.
Summary of the 2020 - 2021 Influenza Season.

Minnesota Influenza Key Statistics	
Percent of molecular laboratory tests positive	0%
Hospitalizations	35
Most common strain	Influenza B
School outbreaks	5
Long-term care outbreaks	5
Pediatric influenza-associated deaths	0

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[Minnesota Influenza Surveillance \(www.health.state.mn.us/diseases/flu/stats/\)](http://www.health.state.mn.us/diseases/flu/stats/)

[Weekly U.S. Influenza Surveillance Report \(www.cdc.gov/flu/weekly/\)](http://www.cdc.gov/flu/weekly/)

[World Health Organization \(WHO\) Surveillance \(www.who.int/teams/global-influenza-programme/surveillance-and-monitoring/influenza-surveillance-outputs\)](http://www.who.int/teams/global-influenza-programme/surveillance-and-monitoring/influenza-surveillance-outputs)

Neighboring states' influenza information:

Iowa: [Iowa Flu Reports \(idph.iowa.gov/influenza/reports\)](http://idph.iowa.gov/influenza/reports)

Wisconsin: [Influenza \(Flu\) \(https://dhs.wisconsin.gov/influenza/index.htm\)](https://dhs.wisconsin.gov/influenza/index.htm)

North Dakota: [Reported Seasonal Influenza Activity in North Dakota \(www.ndflu.com/default.aspx\)](http://www.ndflu.com/default.aspx)

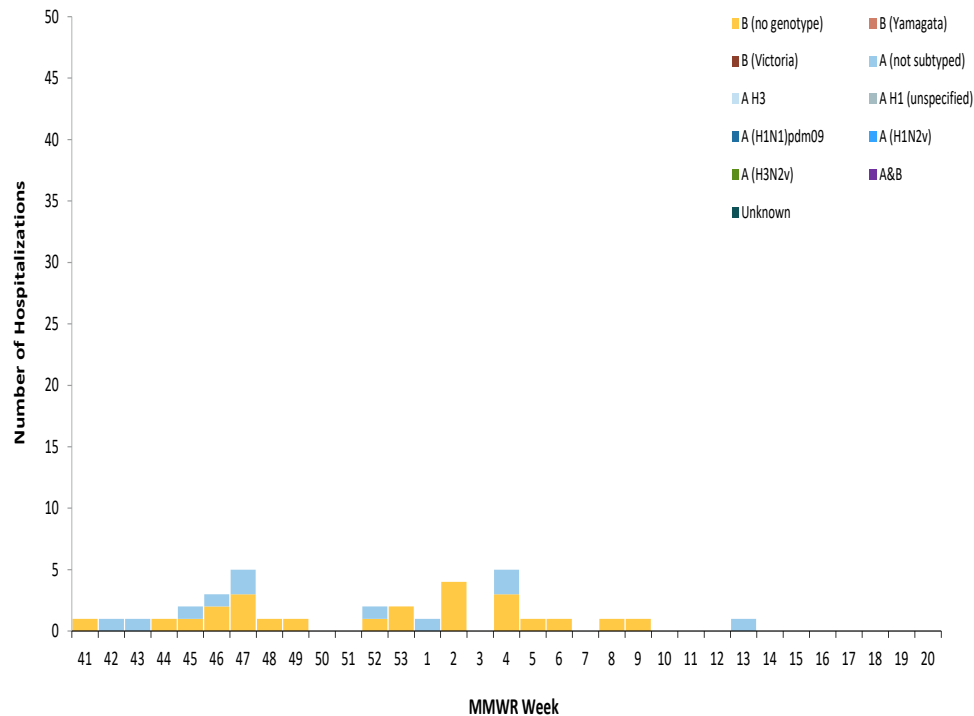
South Dakota: [South Dakota Influenza Information \(doh.sd.gov/diseases/infectious/flu/\)](http://doh.sd.gov/diseases/infectious/flu/)

Due to the COVID-19 pandemic, CDC and MDH will not be posting the weekly geographic spread indicators (no activity, sporadic, local, regional, widespread) this season as they rely on influenza-like illness data (ILI). Because these data are based on symptoms, the cause of ILI cannot reliably be attributed to influenza while COVID-19 is widely circulating.

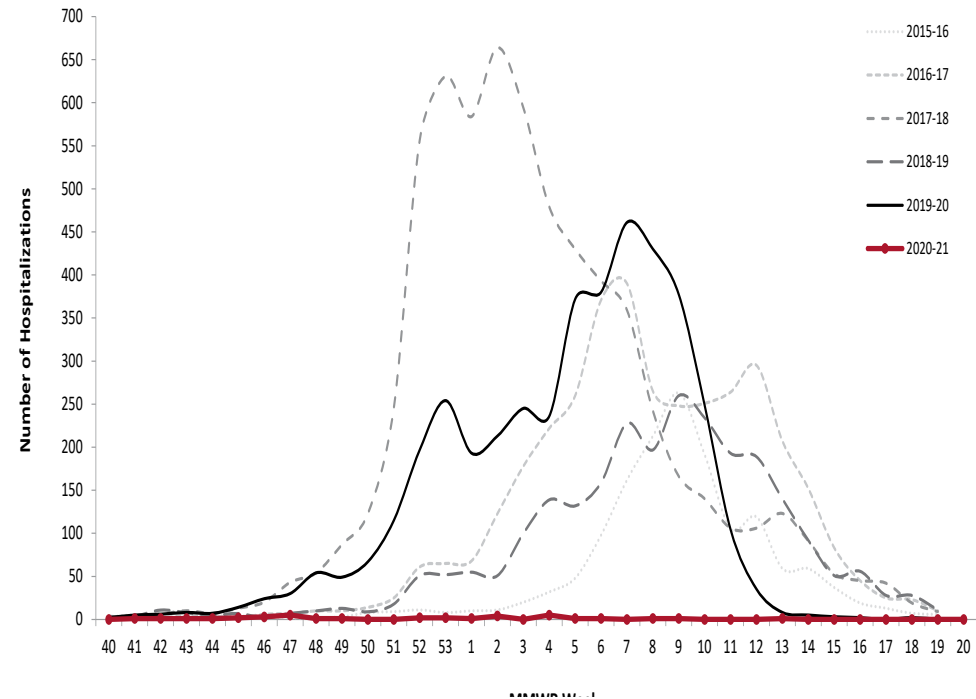
Hospitalized Influenza Surveillance

Hospitalized influenza cases are based on disease reports of laboratory-positive influenza (via DFA, IFA, viral culture, EIA, rapid test, paired serological tests or RT-PCR) and specimens from hospitalized patients with acute respiratory illness submitted to MDH-PHL by hospitals and laboratories. Due to the need to confirm reports and reporting delays, consider current week data preliminary.

Hospitalized Influenza Cases by Type, Minnesota (FluSurv-NET*)



Hospitalized Influenza Cases by Season, Minnesota (FluSurv-NET*)



Total hospitalizations

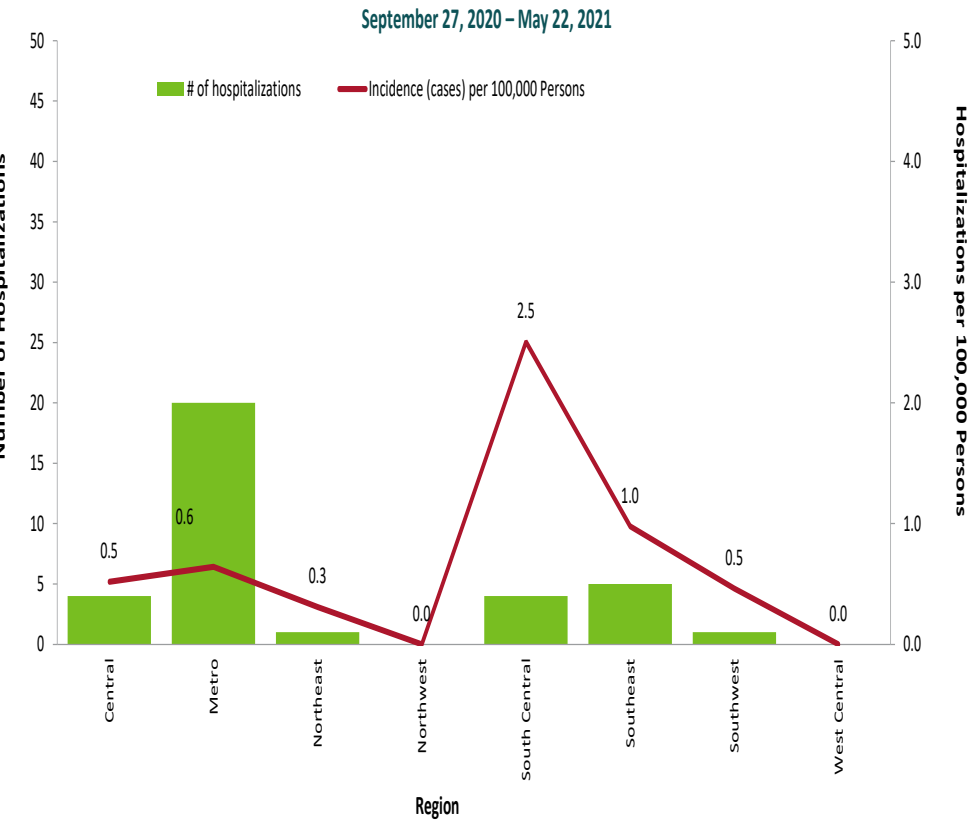
35

*FluSurv-NET = Influenza Surveillance Network

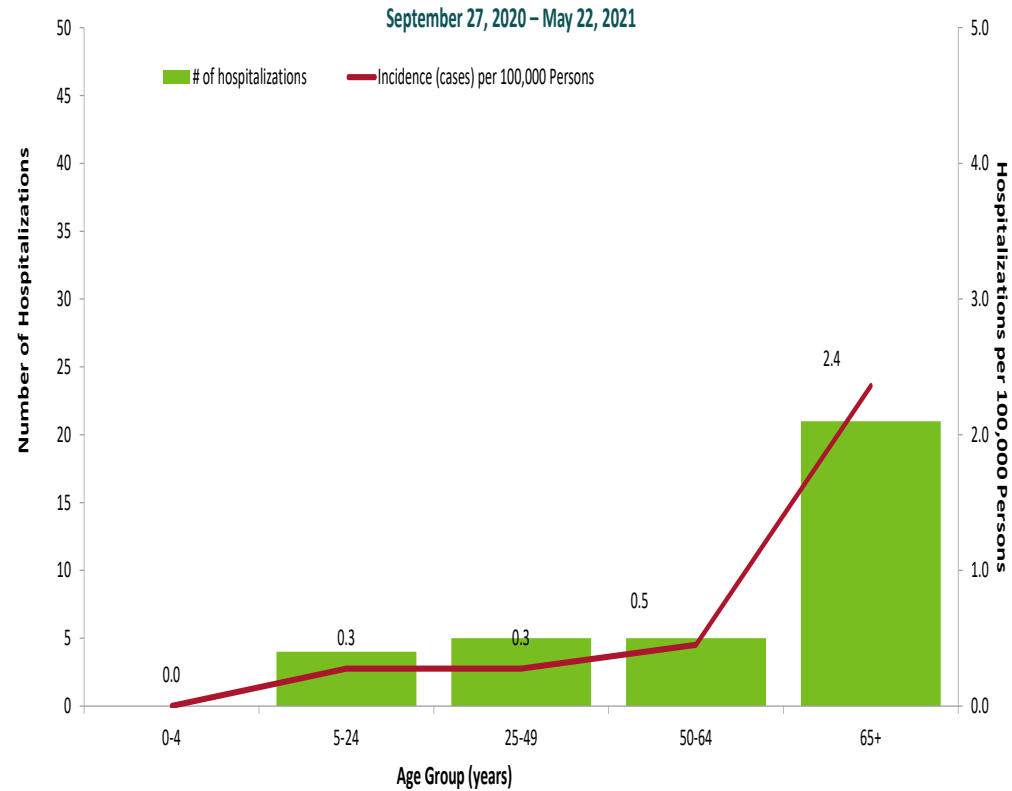
Season	Total hospitalizations (historic)
2015-2016	1,538
2016-2017	3,695
2017-2018	6,446
2018-2019	2,543
2019-2020	4,022
2020-2021	35

Hospitalized Influenza Surveillance (continued)

Number of Influenza Hospitalizations and Incidence by Region, Minnesota



Number of Influenza Hospitalizations and Incidence by Age, Minnesota



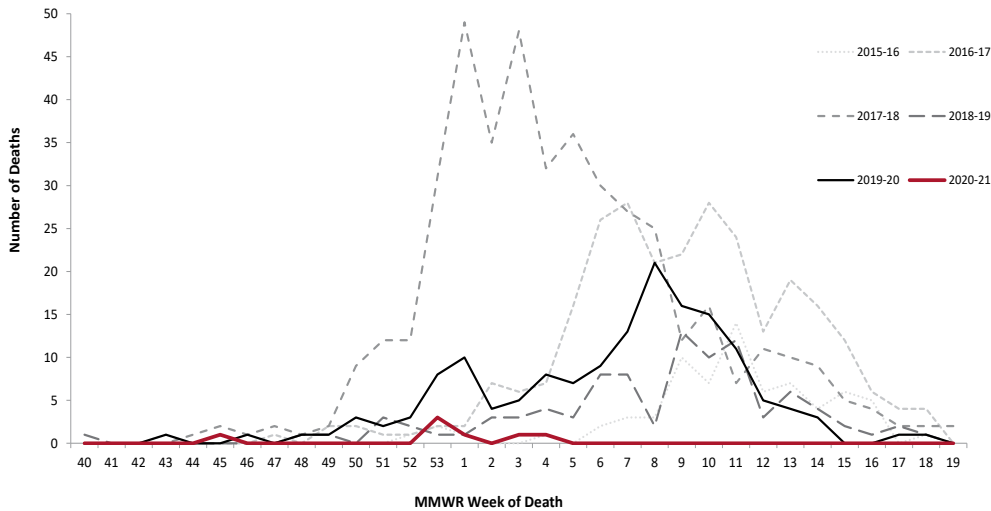
Region	Total
Central	4 (11%)
Metro	20 (57%)
Northeast	1 (3%)
Northwest	0 (0%)
South Central	4 (11%)
Southeast	5 (14%)
Southwest	1 (3%)
West Central	0 (0%)

Median age (years) at time of admission
69

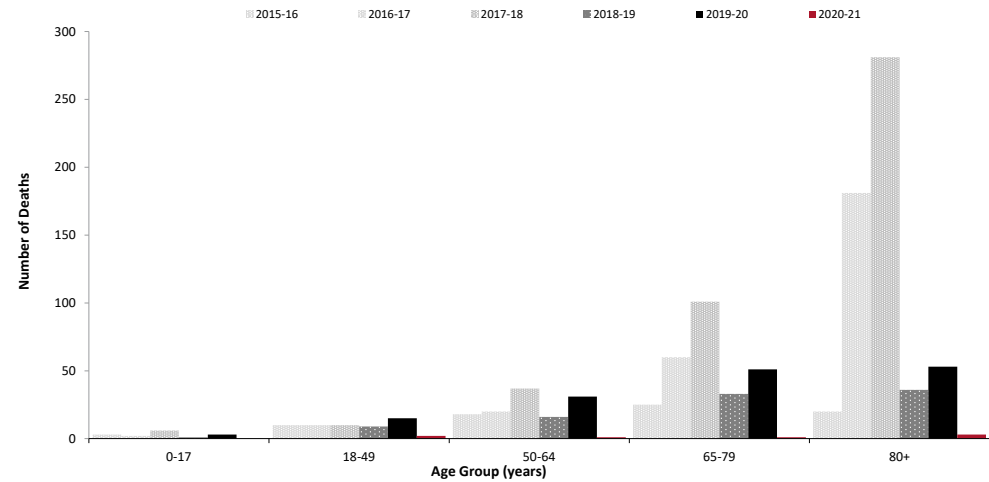
Influenza-Associated Death Surveillance

Influenza deaths are collected via reports from Minnesota’s death certificate database, hospitals, and long-term care facilities. Decedents with influenza listed as a cause of or contributor to death, have recent laboratory confirmation of influenza, or are part of an ongoing influenza outbreak at a long-term care facility are reported to influenza surveillance. Due to the need to confirm reports and reporting delays, consider current week data preliminary.

Deaths Associated with Influenza by Season, Minnesota



Deaths Associated with Influenza by Age Group and Season, Minnesota



Season	Total deaths (historic)	Total pediatric (<18 years) deaths (historic)
2015-2016	76	3
2016-2017	273	2
2017-2018	440	6
2018-2019	126	1
2019-2020	197	3
2020-2021	7	0

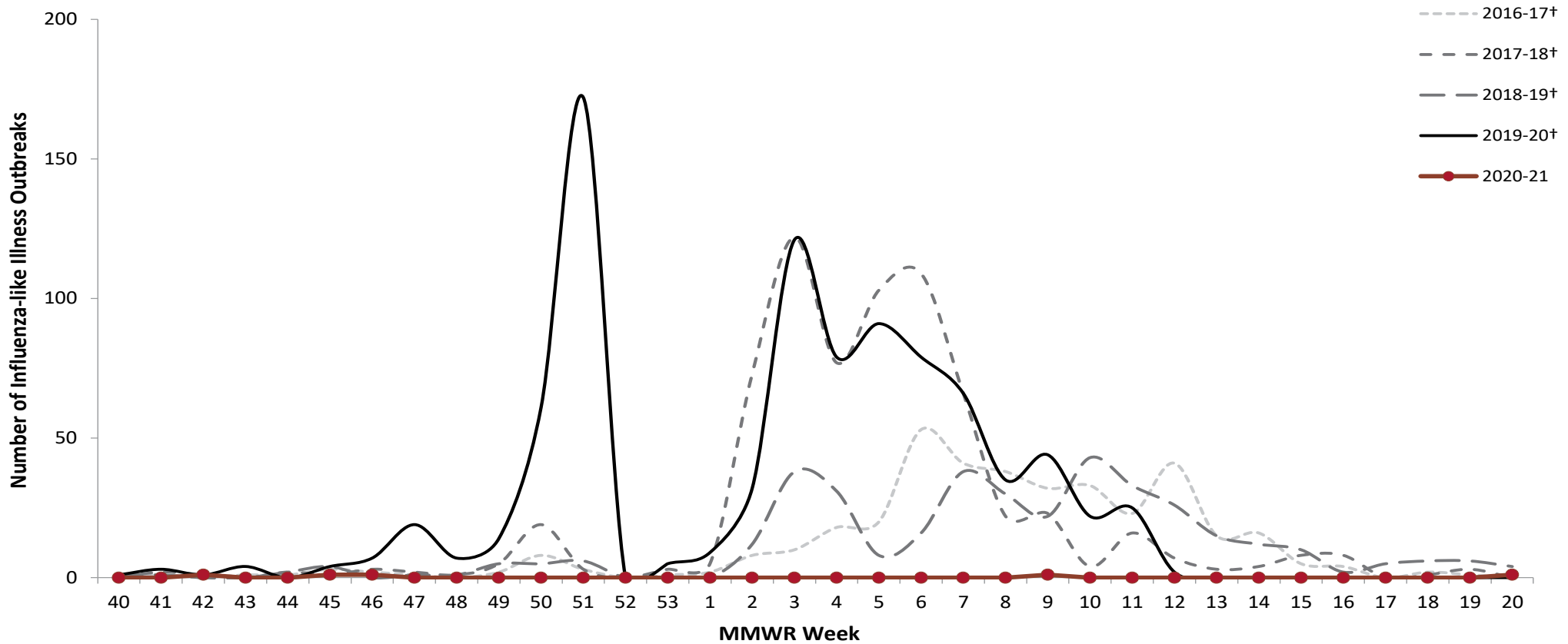
Season	Median age (years) at time of death
2015-2016	68
2016-2017	86
2017-2018	85
2018-2019	75
2019-2020	73
2020-2021	76

*FluSurv-NET = Influenza Surveillance Network

Respiratory Disease Outbreak Surveillance: School Outbreaks

K-12 schools report an outbreak of influenza-like illness (ILI) when the number of students absent with ILI reaches 5% of total enrollment or three or more students with ILI are absent from the same elementary classroom.

Influenza-like Illness (ILI) in Schools by Season



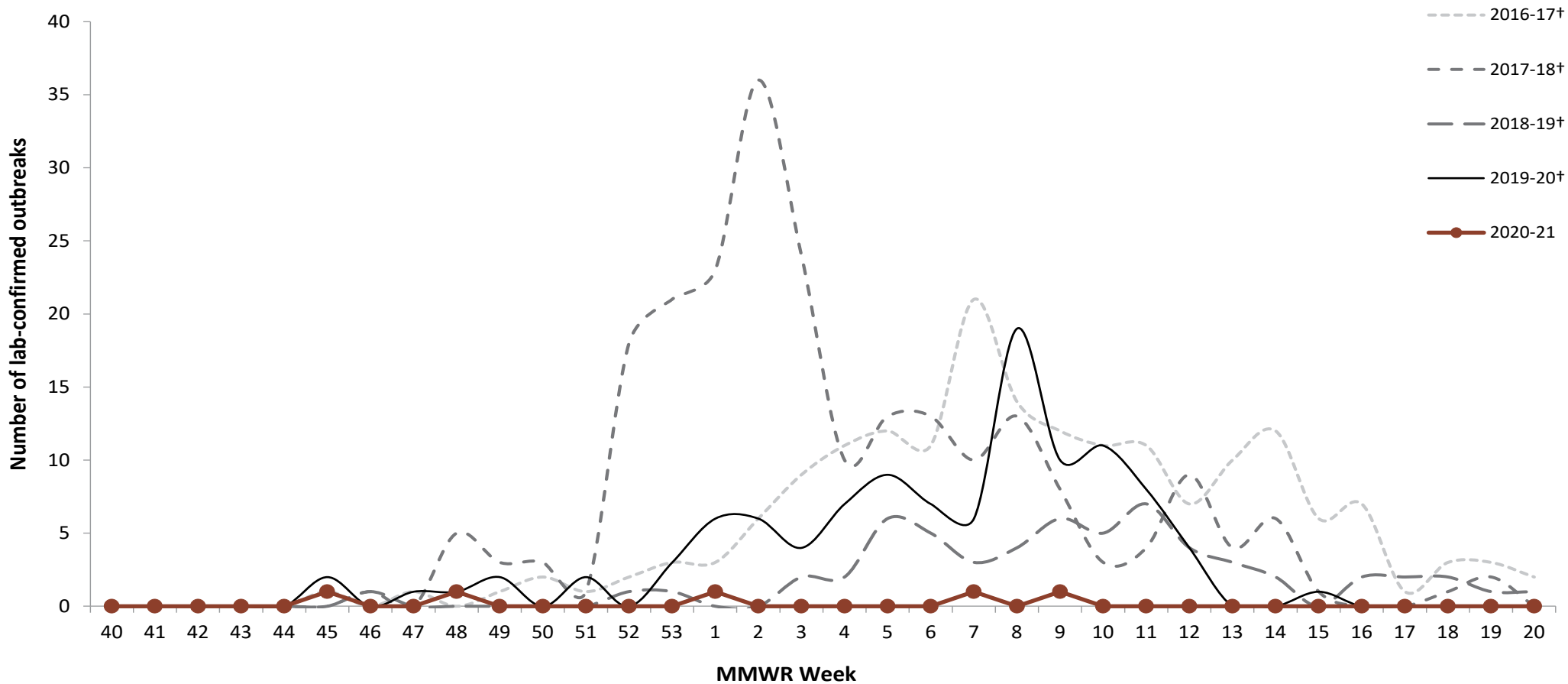
School outbreaks this season	School outbreaks last season
5	921

† The Week 53 value for these seasons is the average of Week 52 and Week 1

Respiratory Disease Outbreak Surveillance: LTC Outbreaks

Long-Term Care (LTC) facilities report to MDH when they suspect an outbreak of influenza in their facility. Laboratory-confirmed outbreaks are reported here.

Confirmed Influenza Outbreaks in LTC by Season



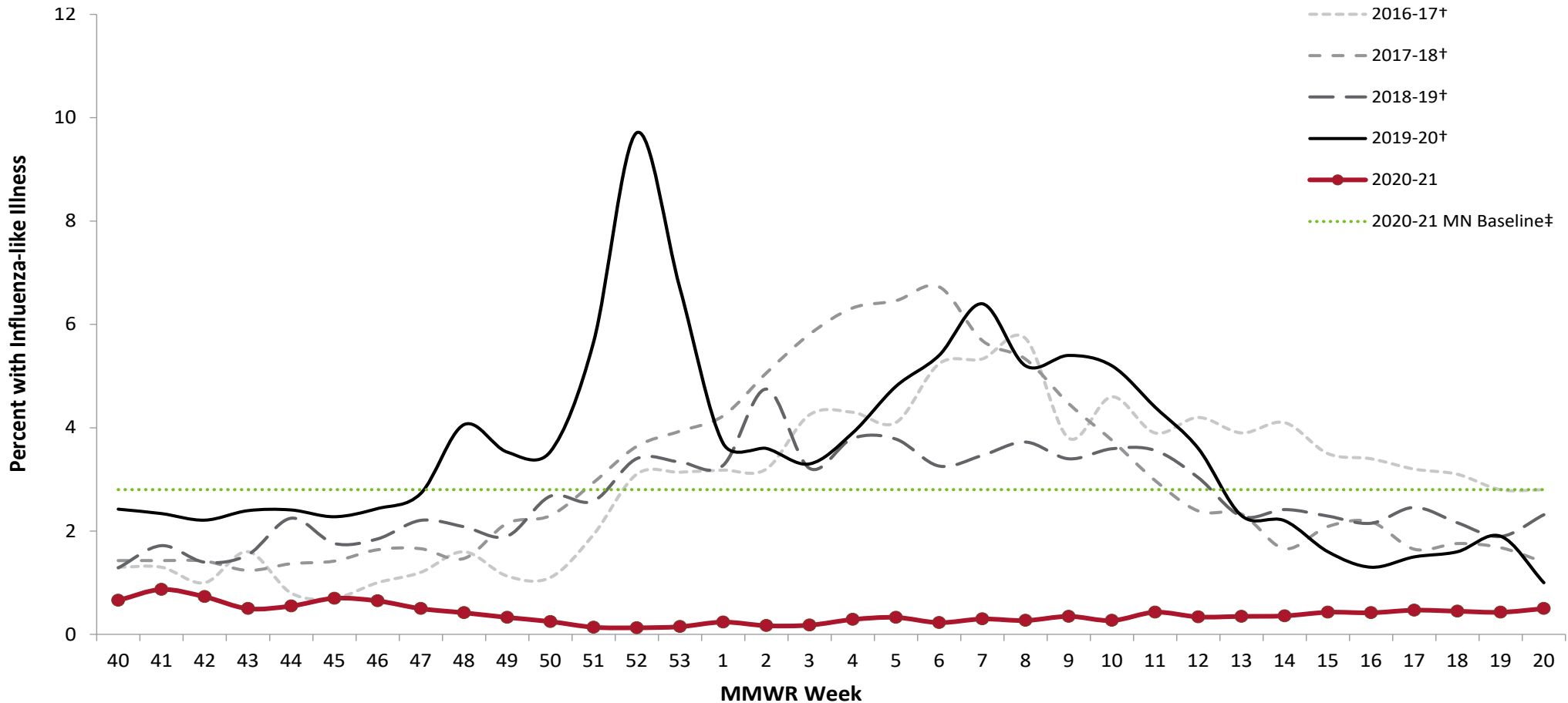
LTC outbreaks this season	LTC outbreaks last season
5	109

† The Week 53 value for these seasons is the average of Week 52 and Week 1

Sentinel Provider Surveillance (Outpatients)

MDH collaborates with healthcare providers who report the total number of patients seen and the total number of those patients presenting to outpatient clinics with influenza-like illness.

Percentage of Persons Presenting to Outpatient Clinics with Influenza-Like Illness (ILI)



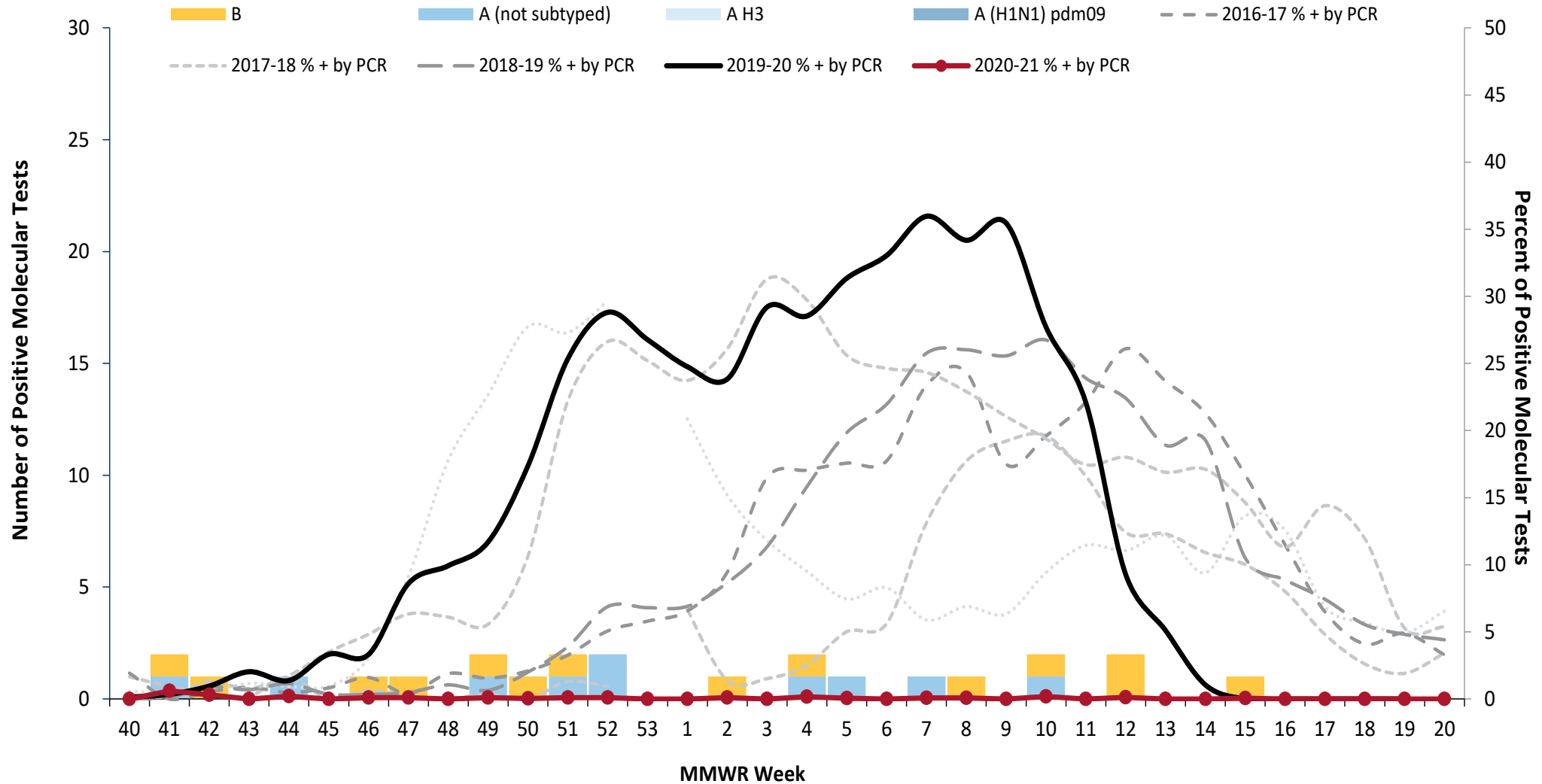
* Indicates current week-data may be delayed by 1 or more weeks

† The Week 53 value for these seasons is the average of Week 52 and Week 1

‡ MN Baseline valid for 2020-21 season only, do not compare it with previous seasons. The baseline is calculated by averaging the ILI percent for non-influenza weeks over the previous four seasons and adding two standard deviations. Non-influenza weeks account for less than 2% of the season's total flu-positive specimens tested at Public Health Labs in HHS Region 5. Weeks where ILI % is above baseline reflect weeks with excess health care visits due to ILI.

Laboratory Surveillance

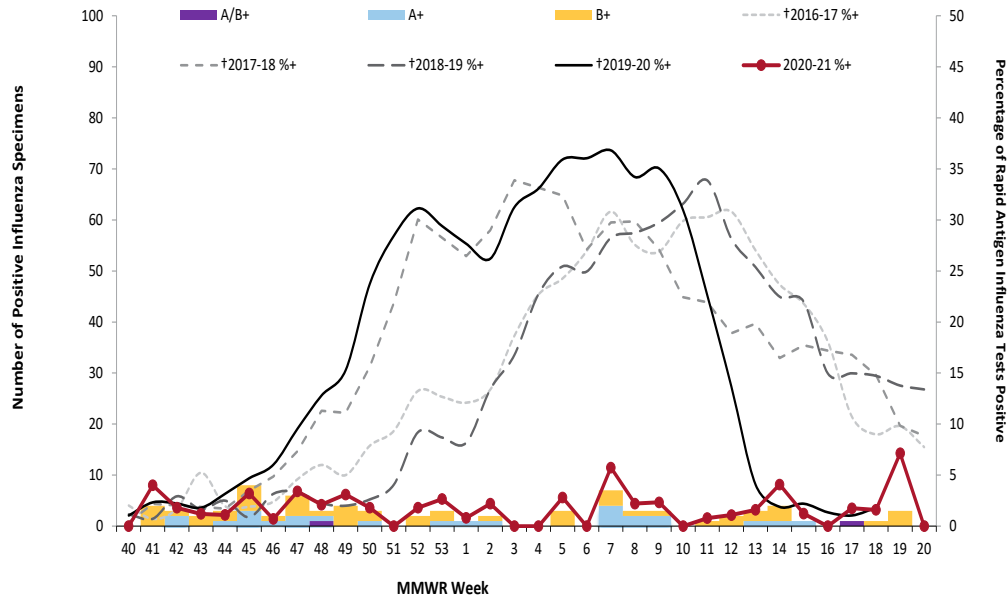
Specimens Positive by Influenza Molecular Test, by Week



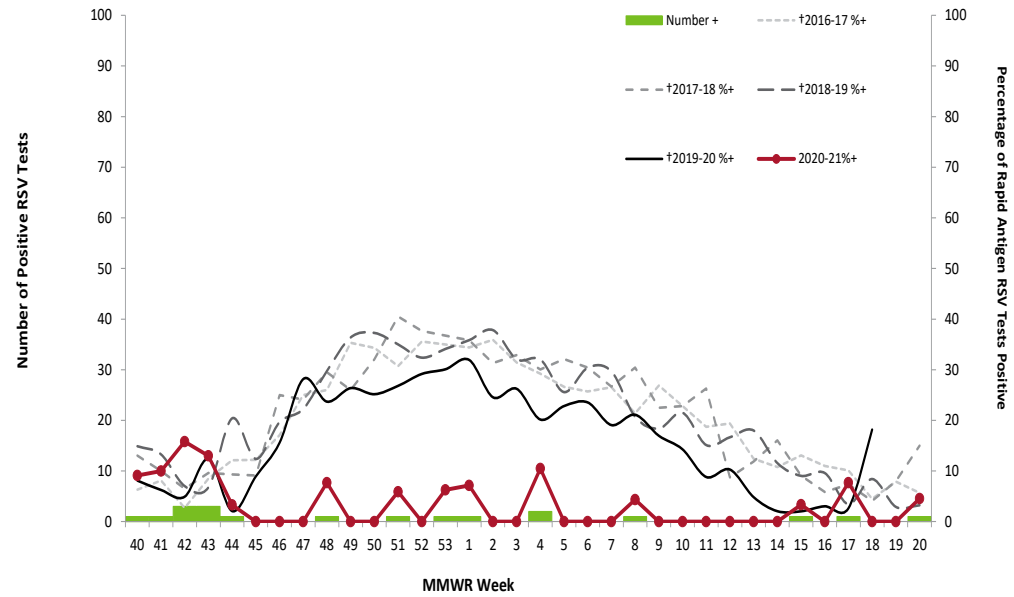
† The Week 53 value for these seasons is the average of Week 52 and Week 1

Laboratory Surveillance (continued)

MLS Laboratories – Influenza Testing Specimens Positive by Influenza Rapid Antigen Test, by Week



MLS Laboratories – RSV Testing Specimens Positive by RSV Rapid Antigen Test, by Week

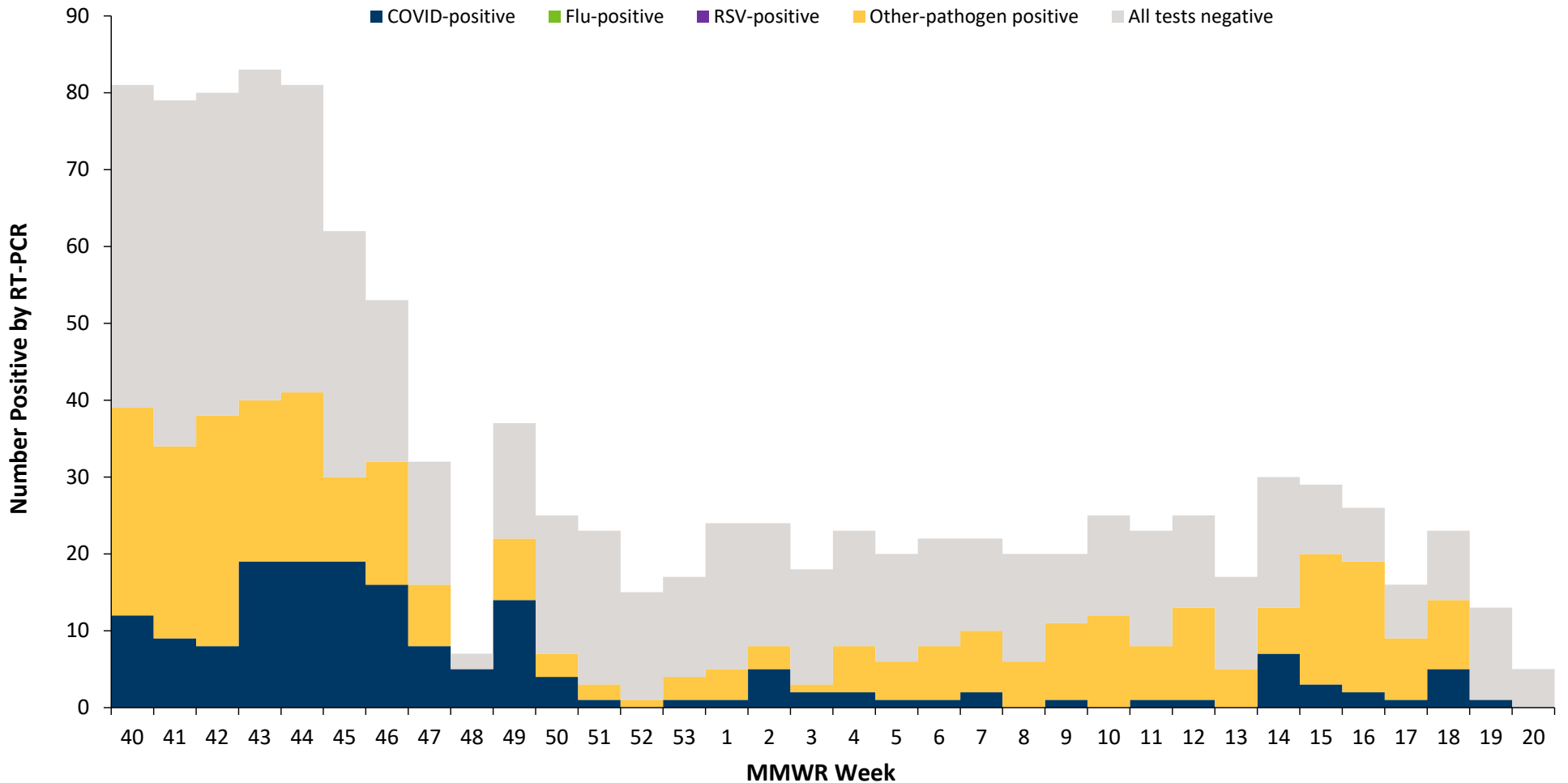


† The Week 53 value for these seasons is the average of Week 52 and Week 1

Minnesota Influenza Incidence Surveillance Project (MIISP)

MIISP surveillance sites collect 10-20 specimens every week on patients presenting with acute respiratory illness with or without fever. The graph below illustrate the number of positive results by virus family detected each week. The primary purpose of these graphs is to visualize the respiratory viruses circulating in Minnesota.

MIISP Testing (Outpatient), by Week



Minnesota Influenza Incidence Surveillance Project (continued)

This table details the specific viruses detected during the 2020-21 Influenza season. Viruses are grouped by the virus family they belong to, with the exception of SARS-CoV-2 (the virus that causes COVID-19), which is singled out from the seasonal coronaviruses that regularly circulate throughout the year.

Pathogen Group	Pathogen	Frequency	Percent of detections
All Negative	None	609	
Adenovirus	Adenovirus	14	3%
Bocavirus	Bocavirus	3	1%
Influenza	Flu A/H1/2009	0	0%
	Flu A/H1/seasonal	0	0%
	Flu A/H3	0	0%
	Flu A/Unknown	0	0%
	Flu A/Unsubtypeable	0	0%
	Flu B	0	0%
Parainfluenza	Parainfluenza-1	0	0%
	Parainfluenza-2	2	0%
	Parainfluenza-3	1	0%
	Parainfluenza-4	5	1%
RSV/Metapneumovirus	Metapneumovirus	10	2%
	RSV	0	0%
Seasonal Coronavirus	Coronavirus-229E	2	0%
	Coronavirus-HKU1	1	0%
	Coronavirus-NL63	30	6%
	Coronavirus-OC43	12	2%
Rhinovirus/Enterovirus	Enterovirus	21	4%
	Rhinovirus	66	13%
	Rhinovirus/Enterovirus (non-differentiated)	153	31%
SARS-CoV-2 (COVID-19)	SARS-CoV-2	171	35%

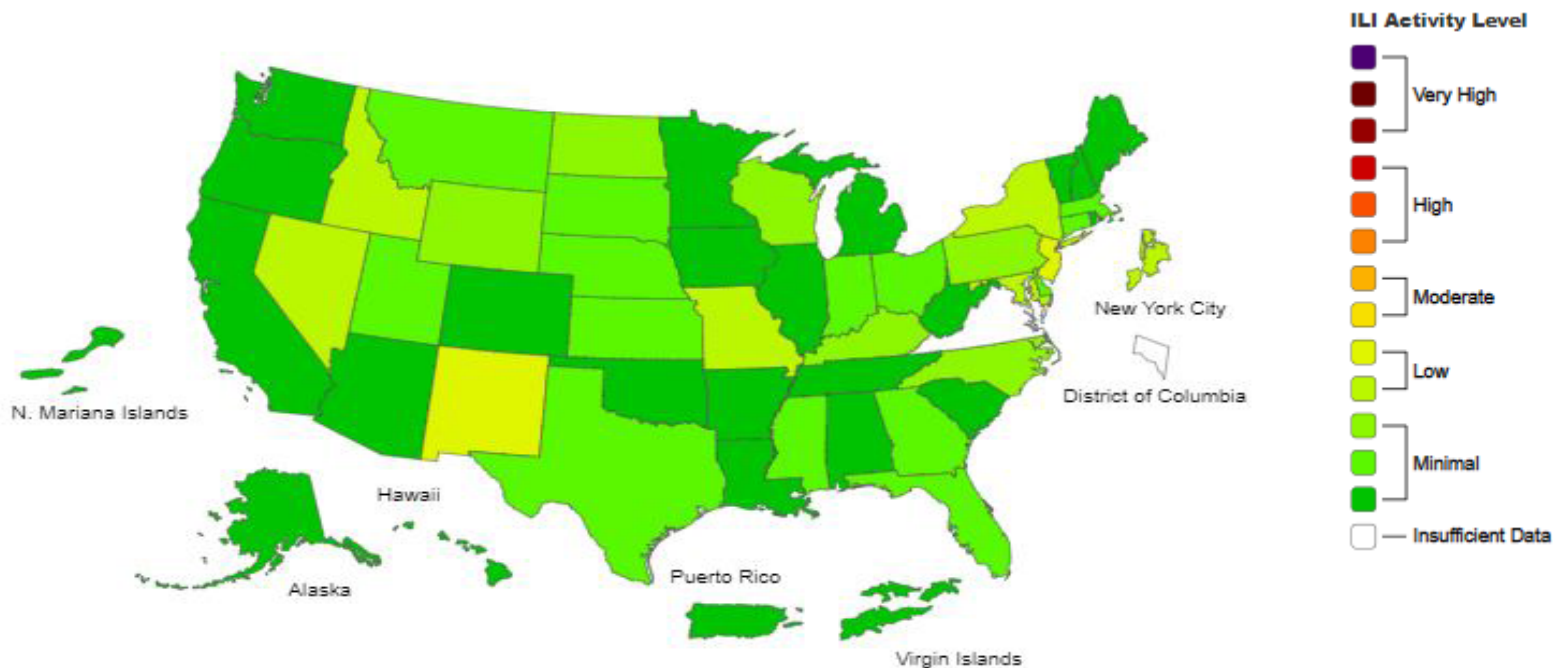
Weekly U.S. Influenza Surveillance Report

2020-21 Influenza Season Week 39 ending October 02, 2021

Seasonal influenza activity in the United States remains lower than usual for this time of year.

- Flu activity is unusually low at this time.
- An annual flu vaccine is the best way to protect against flu and its potentially serious complications.
- There are also flu antiviral drugs that can be used to treat flu illness.

Outpatient Illness: ILINet Activity Map



[CDC National Influenza Surveillance \(http://www.cdc.gov/flu/weekly/\)](http://www.cdc.gov/flu/weekly/)