



BOSTON PUBLIC HEALTH COMMISSION (BPHC)

Communicable Disease Control Division

1010 Massachusetts Ave - Boston, MA 02118

Phone: (617) 534-5611 - Fax: (617) 534-5905

Boston Influenza Report - For the Week Ending 12/8/2018

9/30/2018-12/8/2018 (Week 49)

Reported Cases (Boston Residents)	# (% of total)
Influenza A	110 (87%)
Influenza B	17 (13%)
Influenza A and B	0
Influenza (type unspecified)	0
TOTAL (season-to-date)	127

Boston ED ILI Surveillance*	
This Week ILI% (Week 49)	0.94%
Last Week ILI% (Week 48)	1.08%
State/National ILI Surveillance**	
This Week Massachusetts ILI% (Week 48)	1.49%
This Week National ILI% (Week 48)	2.18%

Summary: As of 12/8/2018, 127 cases of laboratory-confirmed influenza were reported to the Boston Public Health Commission (BPHC) since 9/30/2018, with sixteen (13%) cases requiring hospitalization. One influenza-associated death has been reported to date. The death occurred in an elderly person with underlying medical conditions. Emergency department visits for influenza-like illness (ILI) comprised 0.94% of all ED visits this week.

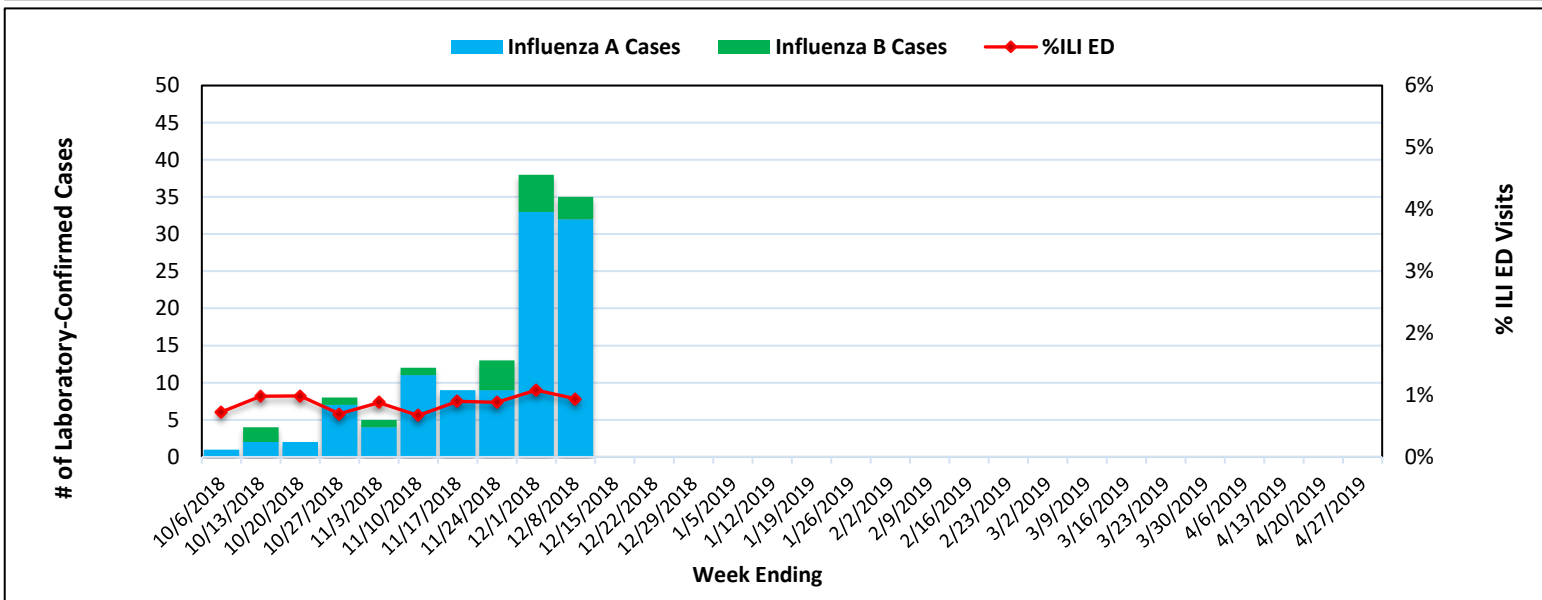
Providers should continue to offer vaccine through the remainder of the season.

Cases of influenza diagnosed in Boston and confirmed by any laboratory test must be reported to BPHC by calling (617) 534-5611 or faxing reports to (617) 534-5905.

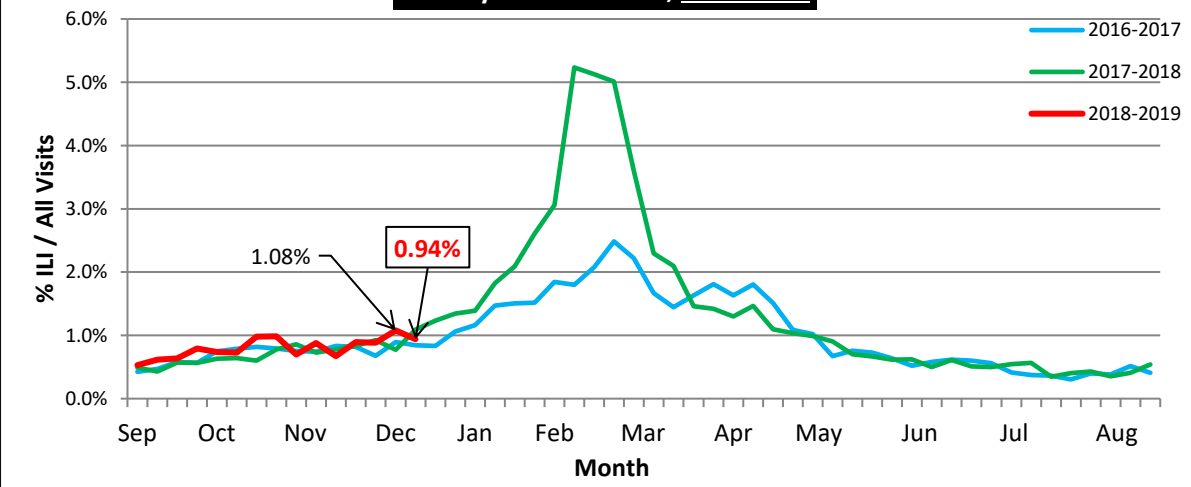
*Influenza-like illness (ILI) is defined as "flu" OR "fever AND (cough OR sore throat)" in ED chief complaint captured by BPHC Syndromic Surveillance System.

**Massachusetts and CDC use a different methodology than the City of Boston to calculate ILI%. Both Massachusetts and National ILI data are calculated using ILInet outpatient surveillance data from sentinel sites (see: <https://www.cdc.gov/flu/weekly/overview.htm> for more information).

Weekly Reported Influenza Cases (in Boston Residents) and % ILI ED Visits, 2018-2019 Season



Weekly % ILI ED Visits, 2016-2019

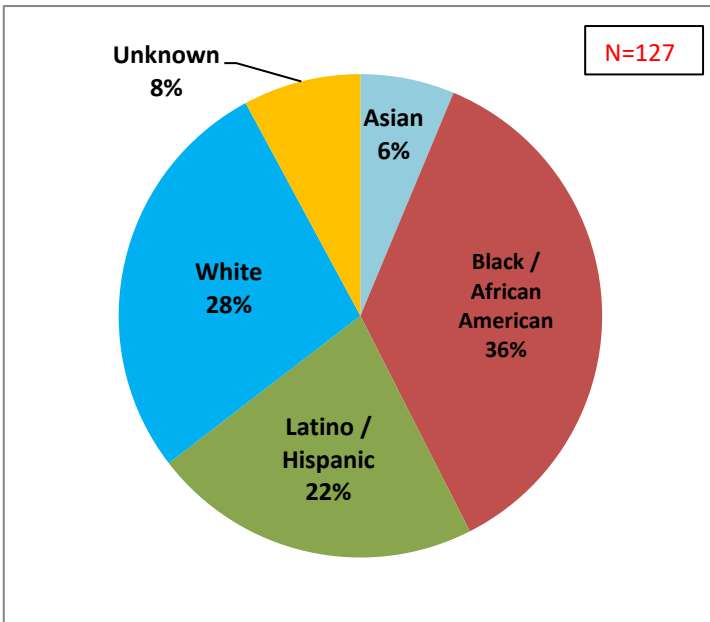


Weekly ILI ED visits are shown from the 2016-2017 season to the present.

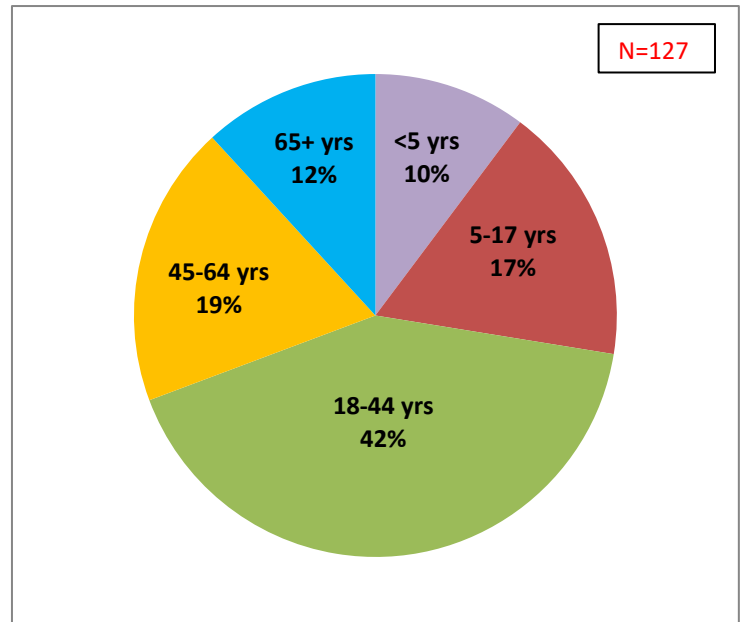
For the week ending 12/8/2018, ILI accounted for 0.94% of ED visits, a decrease of 0.14% from the prior week.

Race/Ethnicity and Age Distribution

**Race/Ethnicity of Confirmed Influenza Cases,
Boston Residents
September 30, 2018 - December 8, 2018**



**Age Distribution of Confirmed Influenza Cases,
Boston Residents
September 30, 2018 - December 8, 2018**



AGE DISTRIBUTION OF CONFIRMED INFLUENZA CASES TO DATE							
2018-2019 Season Compared To 2017-2018 Season							
MMWR WEEK 49							
Season	Predominant A Strain	# Cases STD^	Age Group				
			<5	5-17	18-44	45-64	65+
2018-2019	<i>probably H1N1</i>	127	10% (N=13)	17% (N=22)	42% (N=53)	19% (N=24)	12% (N=15)
2017-2018	H3N2	75	9% (N=7)	5% (N=4)	28% (N=21)	27% (N=20)	31% (N=23)

^STD=season to date

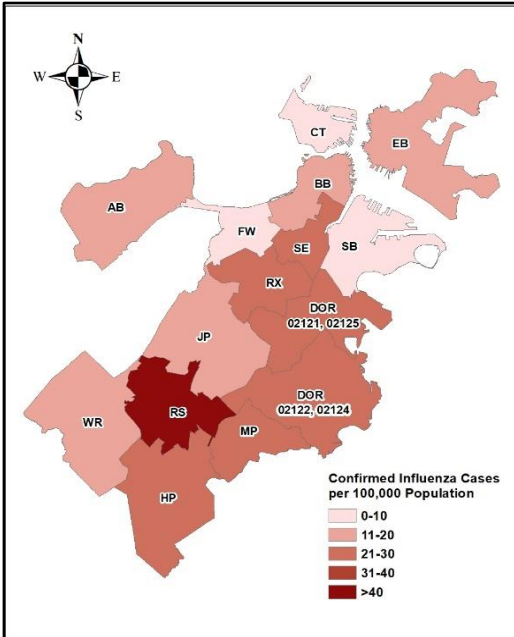
The overall distribution of reported laboratory-confirmed influenza cases by patient age was statistically significant ($p=0.0013$). As of 12/8/2018, children less than 18 years of age are more likely to be reported with laboratory-confirmed influenza in the 2018-2019 influenza season compared to the 2017-2018 influenza season ($P=0.0348$).

CDC reports that H1N1 has been the predominant circulating influenza A subtype for the past several weeks. During the week ending December 1, 2018, 170 (94.4%) of the 180 influenza-positive tests reported to CDC by public health laboratories were influenza A viruses and 10 (5.6%) were influenza B viruses. Of the 152 influenza A viruses that were subtyped, the majority (82.2%) were (H1N1)pdm09. The remaining 17.8% were subtyped as H3N2.

These findings underscore the need for ongoing vaccination in all age groups, particularly children.

Geographic Distribution

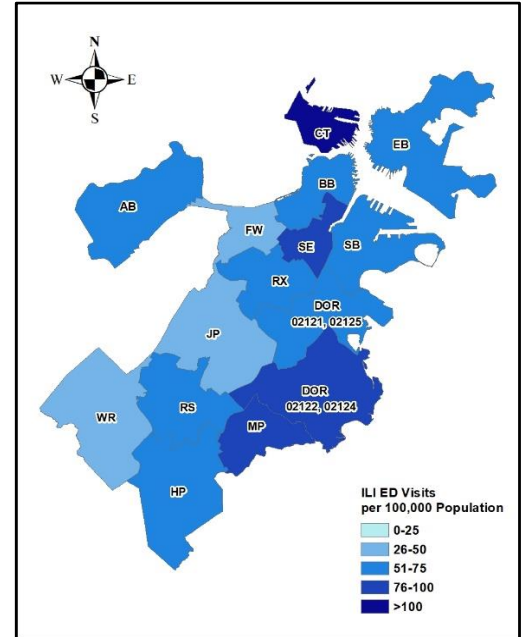
**Rate of Confirmed Influenza Cases
by Neighborhood per 100,000 Population
September 30, 2018 - December 8, 2018**



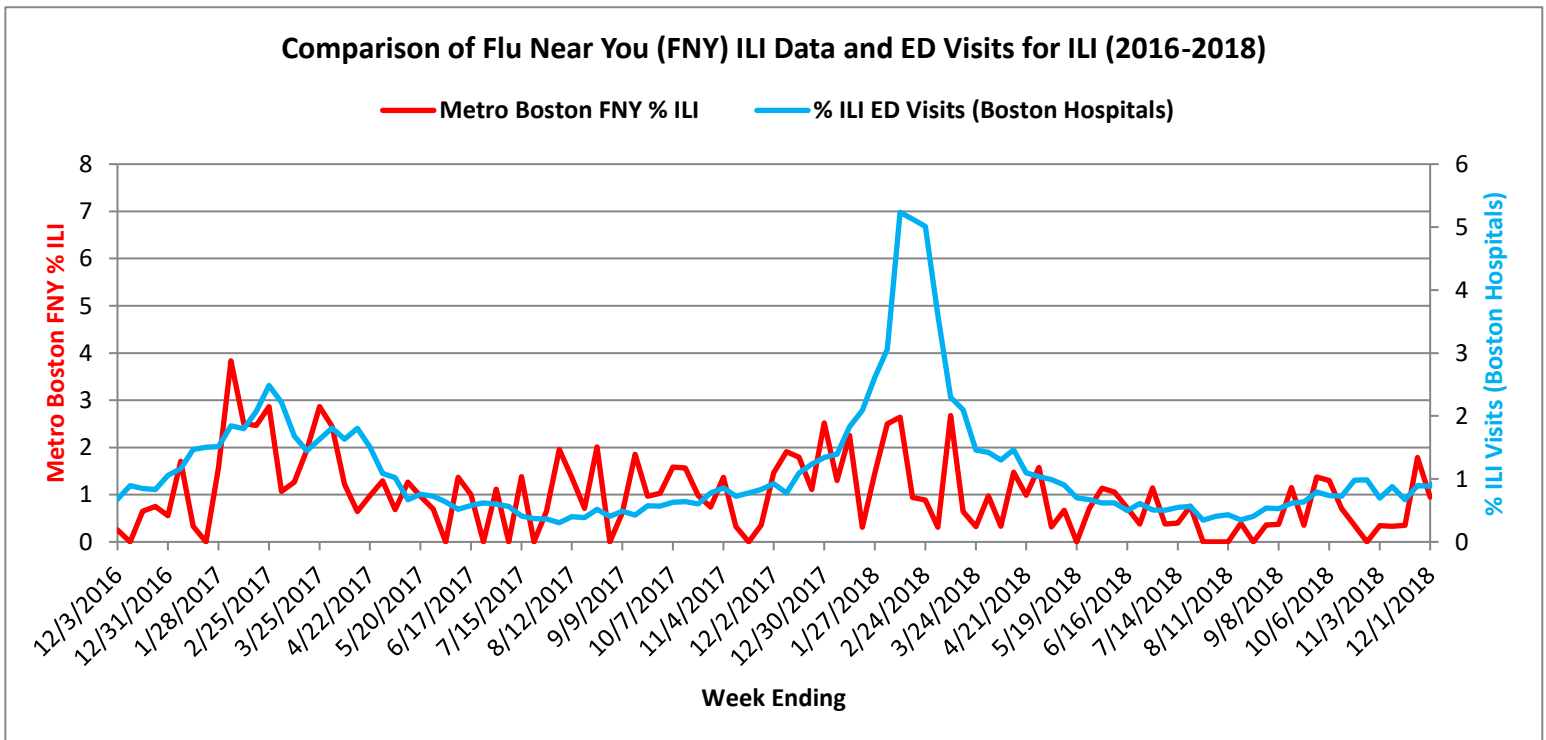
Neighborhood Legend

A/B=Allston/Brighton
BB=Back Bay
CH=Charlestown
EB=East Boston
DOR=Dorchester
FW=Fenway
HP=Hyde Park
JP=Jamaica Plain
MT=Mattapan
RS=Roslindale
RX=Roxbury
SB=South Boston
SE=South End
WR=West Roxbury

**Rate of ILI Syndrome ED Visits
by Neighborhood per 100,000 Population
September 30, 2018 - December 8, 2018**



Comparison of ILI Using *Flu Near You (FNY) ILI Data and ED Visits for ILI, 2016-2018**



**Flu Near You (FNY)* compiles weekly data of ILI activity in the United States. The data come from short, weekly internet-based surveys completed by voluntary participants who indicate whether they are healthy or have experienced any of a short list of symptoms.

The public may participate by enrolling in FNY at: <https://flunearyou.org/>