FIRST WATCH
Helping the Helpers

Seasonal Flu – So NOT in the News in 2020-2021

During previous Seasonal Flu years, I checked the CDC Weekly Influenza Surveillance Report & the Health Canada Weekly Influenza Report every week and typically did a synopsis of the information that might be useful for our customers in protecting their workforce, as well as perhaps alerting First Responders, including EMS agencies, as well as hospitals and other health care providers, to the trends in Flu and ILI occurring from week to week. A short FirstWatch Reginal Influenza Network (RIN) summary was also included.

However, the 2020-2021 Flu Season has been different. I've continued to check the sites but, other than the lack of much in the way of diagnosed Flu cases, even with both the US & Canada doing more flu tests than in other years, Influenza-Like-Illness (ILI) medical visits, have decreased too. Since there is an overlap in some symptoms between COVID 19 and ILI/Flu, this is likely because people with mild to moderate flu symptoms (not absolutely needing prescribed medical care), were likely reluctant to be seen by their PCPs, in clinics, urgent cares, or hospital EDs.

Or, some of the other recommended mitigations helped, such as flu shots (more people took flu shots this year than in other years; many were first timers); telehealth visits with PCPs or urgent care or ED staff; and/or previously arranged antiviral medications for those that have increased risk of complications with Flu. More likely, it was a combination of these factors along with utilizing recommended infection control practices, including following lockdowns, avoiding indoor places other than in their own homes with one's "bubble partners", appropriate mask wearing, washing hands, proper distancing, using hand sanitizer, etc.

In the US, the usual Flu Surveillance Process was modified to still look for Flu, as always, but COVID-19 deaths were rolled in with the typical Pneumonia & Influenza death rates for adults (those ≥ 18 years); pediatric flu-related deaths stayed the same. Canada Health's Flu Surveillance Process looked to be the same. The US is still publishing Weekly Flu Surveillance Reports (releasing Week #15 this week); Health Canada's last posted report was for Weeks 10 & 11 from mid-March. This may be because Canada's COVID cases have rapidly increased to an all-time high and require more concentrated attention and skills from those that normally attend to Flu. No doubt this wouldn't be possible if the flu was providing more than a blip on the case scale.

Graphs for Flu/ILI, in both the US & Canada, are featured below and show a comparison with previous years. It should be noted that the latest reports from both the US & Canada show a slight uptick from the previous report of ILI cases visiting medical providers. In the US, that still only amounted to a change of less than 0.1% and is still way below the National Baseline threshold for this time of year. Canada's case numbers, both in ILI & Flu, are also way below the normal average. Physicians, particularly pediatricians, have also indicated that there are less respiratory viral illnesses seen, in general, and RSV specifically, except for the SARS-CoV-2 virus that causes COVID-19.

Seasonal Flu in the US – As of Week #15, ending 4//17/21 - Influenza Like Illness was responsible for 1.1% of patient visits to healthcare providers. The normal baseline for this time is 2.6%. But, as indicated above, many are not going to their healthcare providers unless absolutely necessary. Canada and the US both report influenza cases being unusually low, with US clinical labs only reporting only 0.1% positivity for flu in Week #15. Hospitals that are part of the FluServ-Net sites reported a cumulative hospitalization rate of 0.8% per 100,000 of population. **This is reported to be 1/9th of the rate reported at this time during the low flu severity season of 2011-2012.** 12.4% of deaths were reported to be related to flu, pneumonia, or COVID-19, with COVID just added for this season. This number is way above the epidemic threshold for this time of year, which is 6.8%. The CDC reports that the majority of these deaths were caused by COVID-19. Only one pediatric death has been reported for the entire season, much lower than previous seasons.

In the US, many of the ILI cases and deaths, and even some of the diagnosed flu cases during the 2019-2020 Flu season, were likely actually COVID-19, or in much smaller numbers, combined Flu/COVID cases.

This is particularly likely when in the Dec 2019 – April 2020 range, when:

1. COVID was not known to be circulating, or at least widely, at the time;
2. It was before **valid** tests were in wide use;
3. The criteria for testing required travel from Wuhan and/or contact with a known case of COVID, therefore preventing the testing of many with symptoms;
4. The only symptoms that allowed for testing were cough, fever, and/or difficulty breathing rather than the large array of symptoms (or lack thereof) that are now accepted as COVID symptomatology.

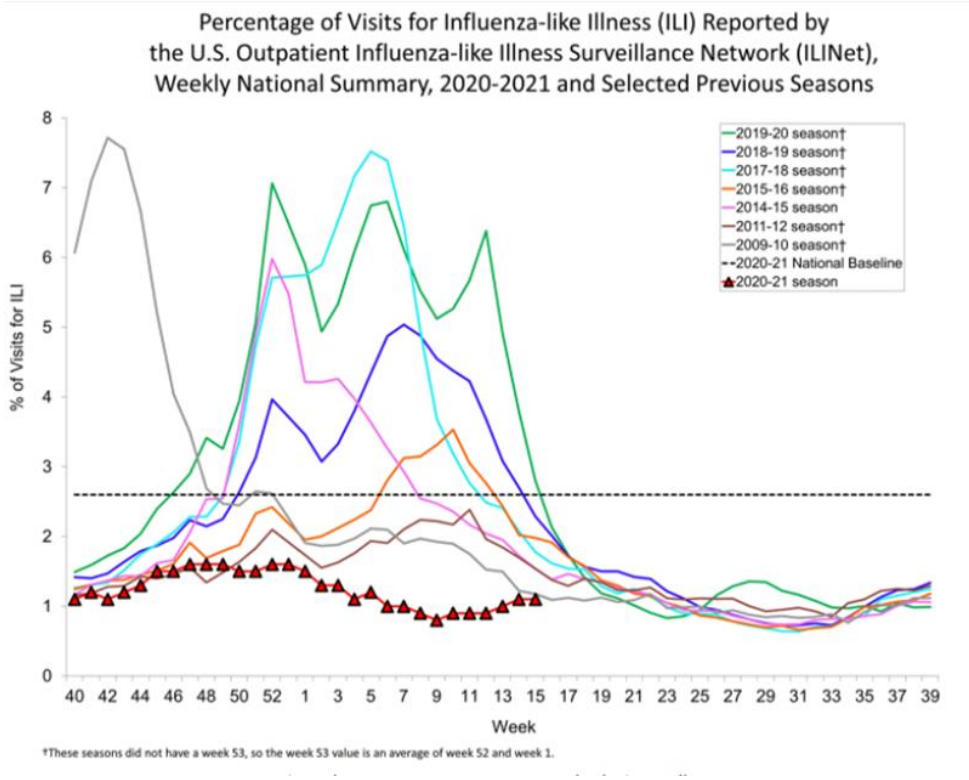
Even a negative test, in the presence of known COVID symptoms is considered, at least for isolation/quarantine purposes, as a presumptive positive test.

Canada's last Weekly (Weeks #10 & 11) Influenza Summary included the following:
"All indicators of influenza activity remain exceptionally low for this time of year, despite continued monitoring for influenza across Canada. To date this season, there has been no evidence of community circulation of influenza despite continued testing above seasonal levels. ***Influenza activity has remained below the threshold required to declare the start of the 2020-2021 Influenza Season."***

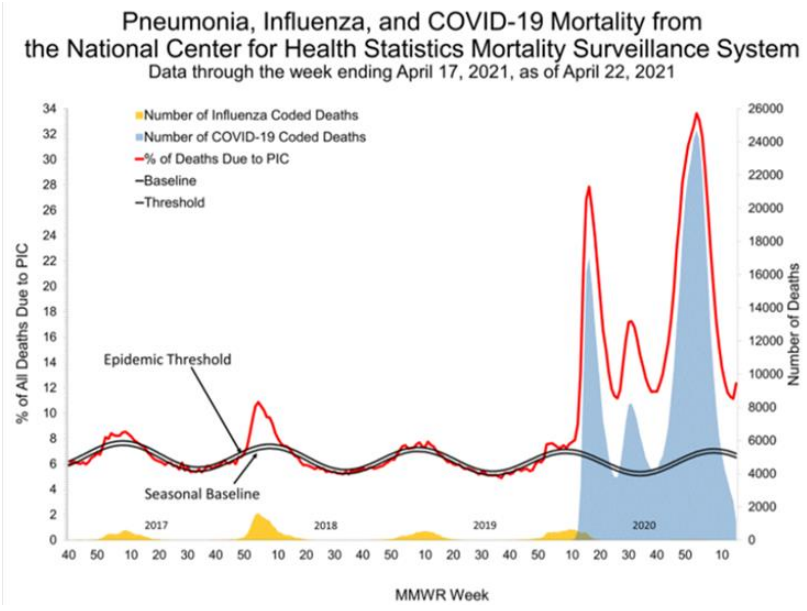
On the following two pages, are graphs representing the last weekly Flu surveillance for both the US and Canada, respectively.
These graphs have ILI & Flu related information, with all of them showing a comparison with previous seasons, either directly (US), or compared to a combined season average (Canada).

Note: PIC is an acronym for Pneumonia - Influenza – COVID-19.

The graph below is a US comparison of the current 2020-21 Season (red triangles) with selected previous seasons. The previously record low season 2011-12 uses a taupe-colored line to represent it. The legend, with all the colors representing the various seasons, is in the upper right-hand corner. The horizontal line (x axis) represents the Flu Weeks; the vertical line (y axis), the percentage of ILI cases.



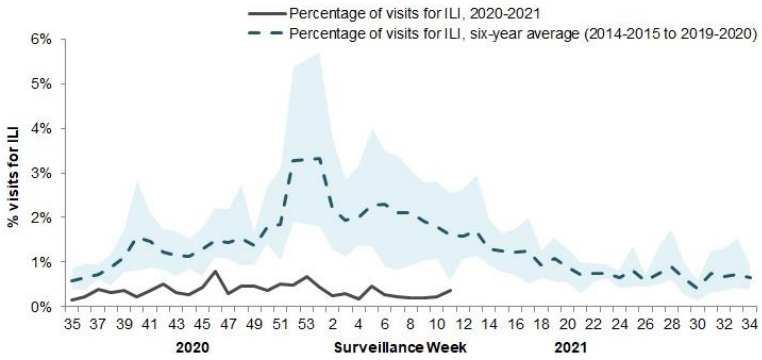
The graph below compares the US death data from 2017 to the present, with influenza-related deaths identified with yellow & COVID deaths in blue. Deaths from pneumonia are represented in the numbers but not by a color (e.g., the white space up to the red line, not colored yellow or blue).



The graph below contains comparison data for Canadian Medical Practitioner visits for ILI during Influenza Seasons from Week 35 through Week10 (week ending 8/29/20 -- 3/13/31 for 2020-21 Season), which is represented by the solid line. The average of ILI cases for years 2014-15 – 2019-2020 is represented by the broken line, with the blue shading indicating the highs & lows.

Figure 4 - Percentage of visits for ILI reported by sentinels by report week, Canada, weeks 2020-35 to 2021-11

Number of Sentinels Reporting in Week 11: 50



The shaded area represents the maximum and minimum percentage of visits for ILI reported by week from seasons 2014-2015 to 2019-2020.

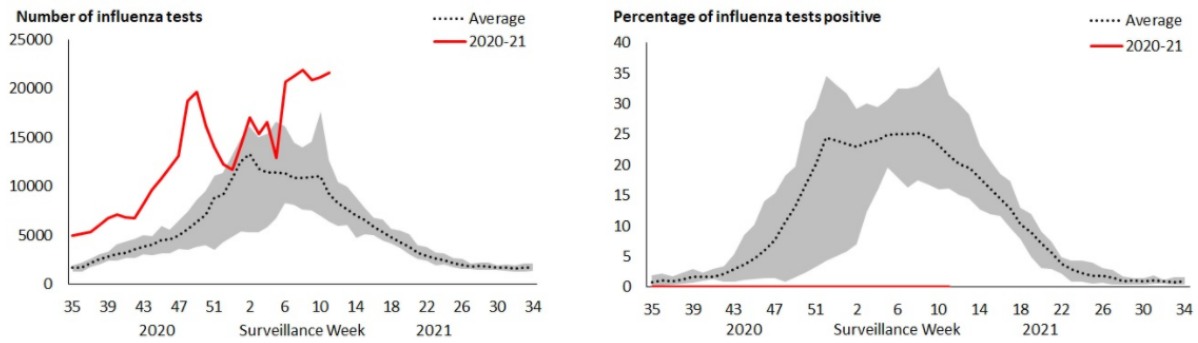
The chart below looks at the number of Influenza (Flu) tests administered on the left side & the percentage of Influenza tests with positive results (diagnosed Flu) for the same data parameters as the chart just above (8/29/20 – 3/13/21), compared to previous seasons.

On the left, the red line represents the number of flu tests done in the 2020-2021 Season, with the dotted line, the average of previous years, and the gray shading representing the highs & lows.

On the right, the red line represents the number of positive flu tests for the 2020-21 Season, while the dotted line indicates the average of previous years, and the gray shading, the highs & lows during those years.

In other words, there were a lot more flu tests than usual done in this current Influenza Season, but the number of positive flu tests were flat on the zero/near zero line.

Figure 3: Number of influenza tests (a) and percentage of tests positive (b) in Canada by week, weeks 2020-35 to 2021-11 as compared to previous seasons



The shaded area represents the maximum and minimum number of influenza tests (a) or percentage of tests positive (b) reported by week from seasons 2014-2015 to 2019-2020.