

Paediatric Respiratory Pathogen Report

Week 49, 5th December – 11th December 2022

- PathWest detected 17 cases of RSV in paediatric patients this week. Proportion positive is similar to levels historically observed at this time of year.
- Other common respiratory viruses detected in paediatric patients this week were adenovirus (61 cases), SARS-CoV-2 (40 cases), hMPV (34 cases) and rhinovirus (24 cases).
- Influenza cases and proportion positive in paediatric patients increased this week.

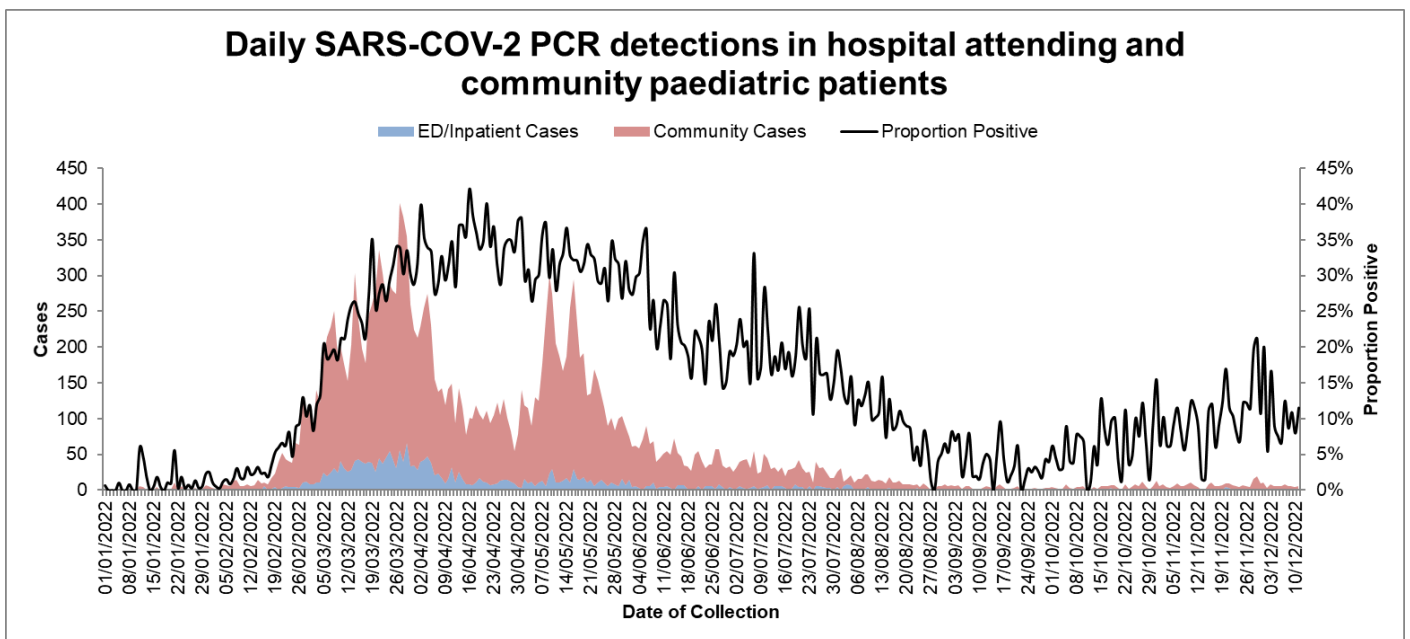


Figure 1: Daily SARS-CoV-2 detections in hospital attending patients and community paediatric patients. Data is for PCR samples tested by PathWest only.

SARS-CoV-2 PCR cases and proportion positive in paediatric patients remain low this week.

Data is representative of all patients attending a hospital (public or private) in Western Australia, for which a respiratory sample was collected and tested at a PathWest laboratory.

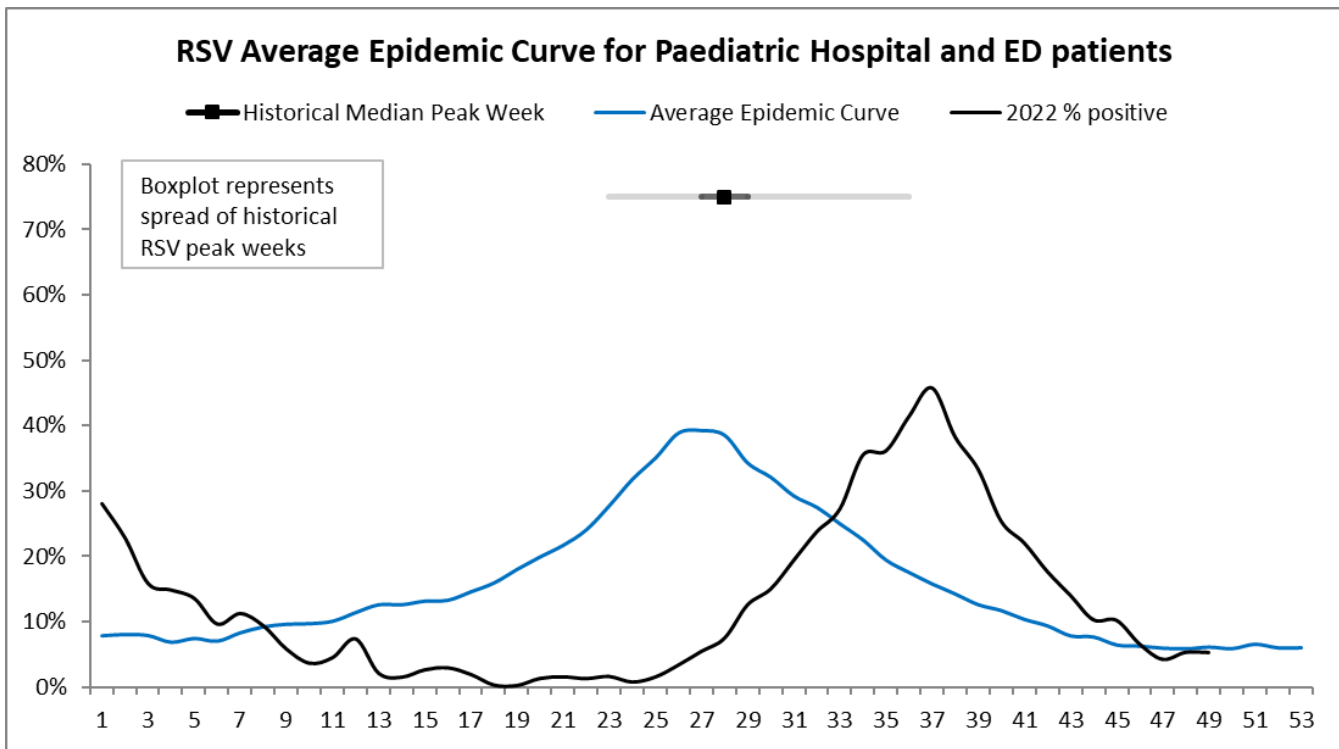


Figure 2: The current season plotted against the Paediatric RSV Average Epidemic Curve. The average epidemic curve was constructed by averaging all seasons measured at PathWest QE2 from 2007-2019. Data represents all WA hospitalised and ED paediatric patients tested by PathWest.

PathWest detected 17 cases of RSV in paediatric patients. Proportion positive (5.3%) is similar to levels historically observed at this time of year.

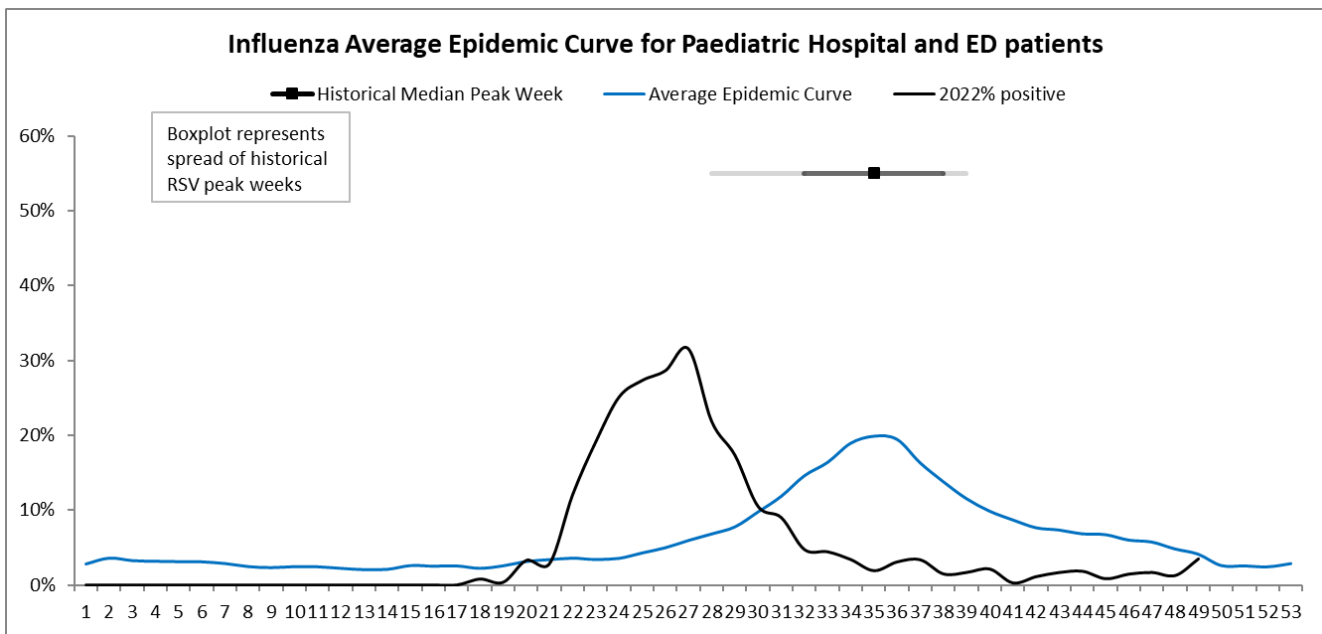


Figure 3: The current season plotted against the Paediatric Influenza Average Epidemic Curve. The average epidemic curve was constructed by averaging all seasons measured at PathWest QE2 from 2007-2019. Data represents all WA hospitalised and ED paediatric patients tested by PathWest.

Influenza proportion positive (3.5%) increased this week and is similar to levels historically observed at this time of year.

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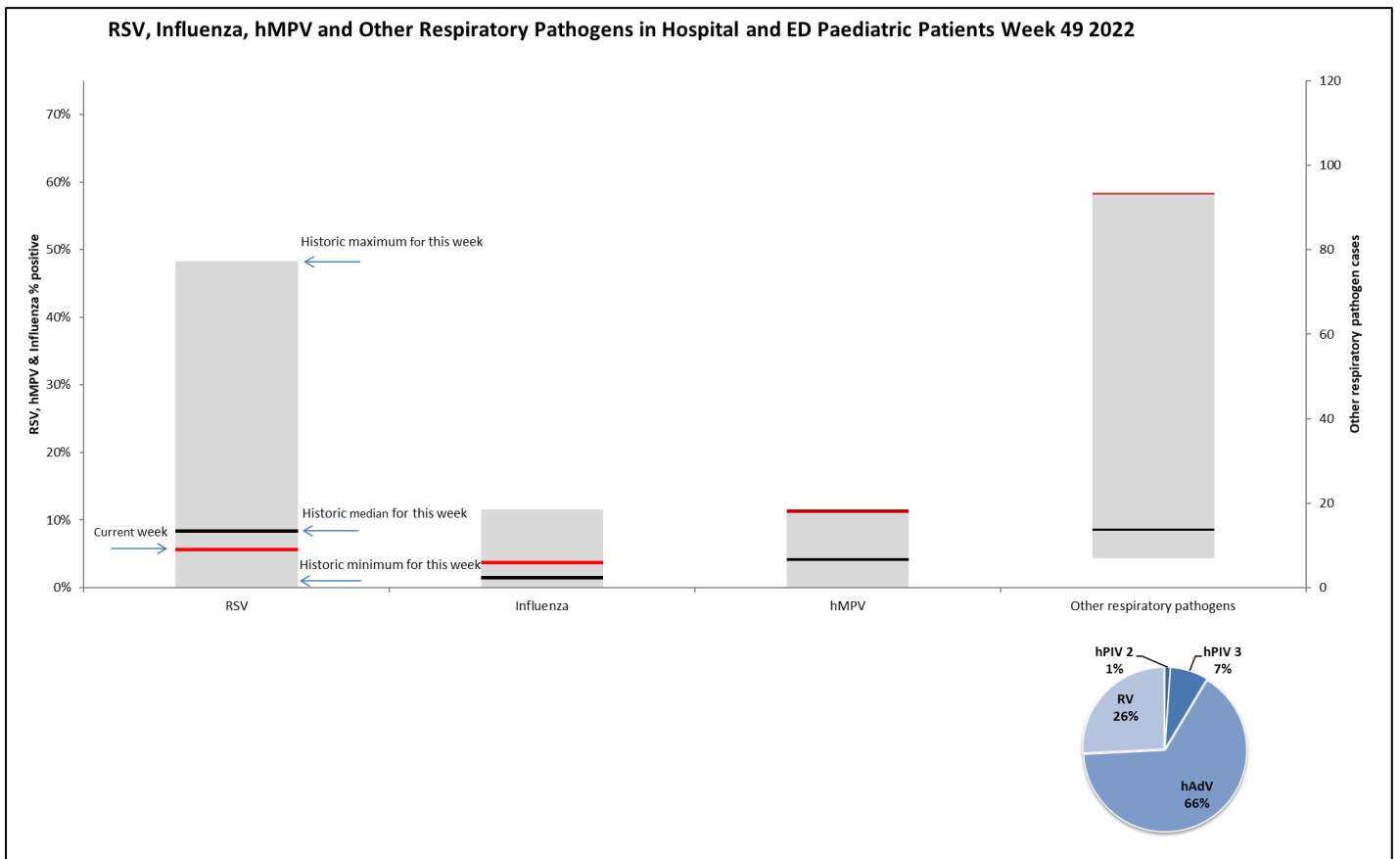


Figure 4: Proportion positive (RSV & influenza) or cases (other respiratory pathogens) for the current week (red line) plotted against the historic range (grey box) and median (black line) for this week. Pie charts represent the breakdown of influenza subtypes and the count of other respiratory pathogens. Data represents hospitalised and ED paediatric patients tested by PathWest. Historic data is for years 2007-2019. Please note: Due to the escalation of rapid PCR testing, the number influenza and RSV positive samples which do not receive a subtyping test has increased.

hMPV and influenza proportion positive (11% and 3.5% respectively) was higher than the historical median (4% and 1.2% respectively) this week. RSV proportion positive (5.4%) was lower than the historical median (8.1%). Other respiratory virus detections were higher than the historical median for this week. These detections were predominantly adenovirus, rhinovirus and parainfluenza viruses. Testing for these viruses is currently higher than it has been in previous years.

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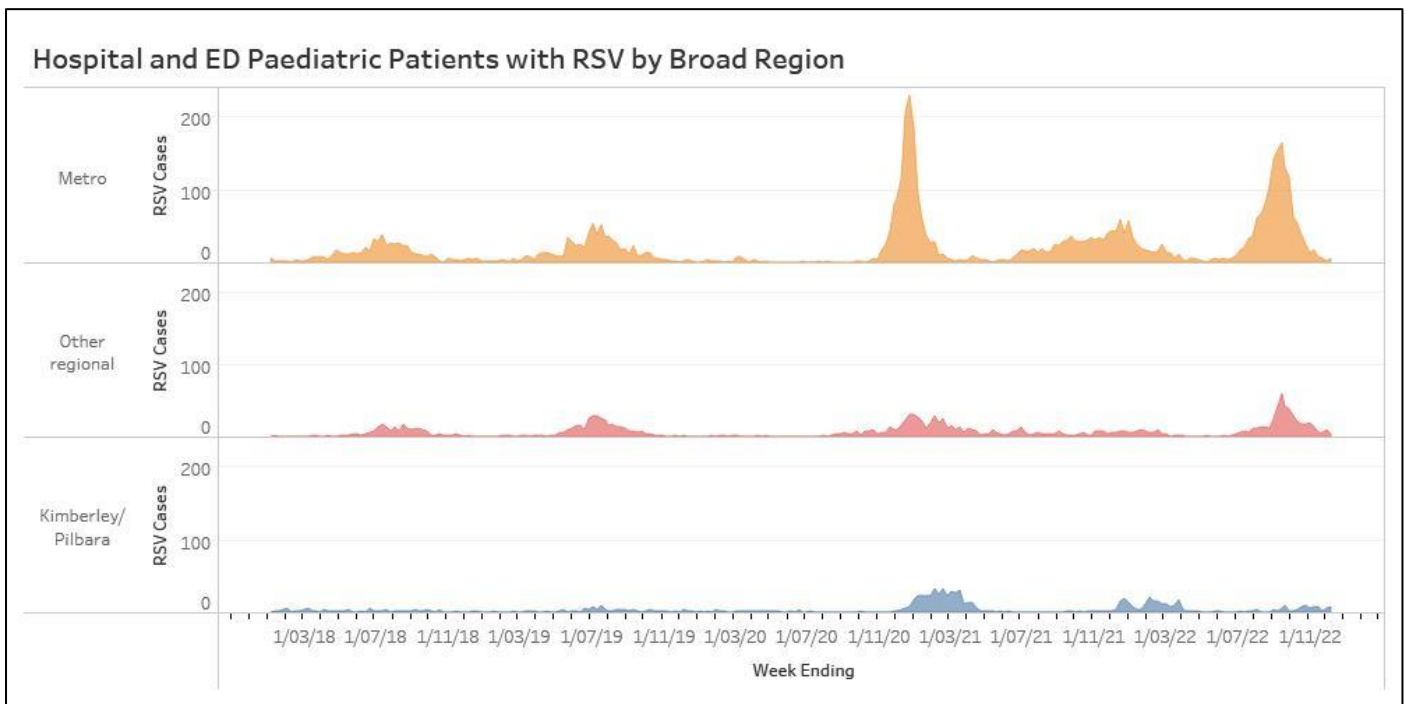


Figure 5: Hospital attending paediatric patients with RSV in Perth metropolitan region, in both Kimberley and Pilbara combined and in the remaining regions combined.

Of the 17 paediatric cases of RSV this week, seven were from the Pilbara, five were from the Metro, two from each of the Kimberley and Midwest and one from the Wheatbelt.

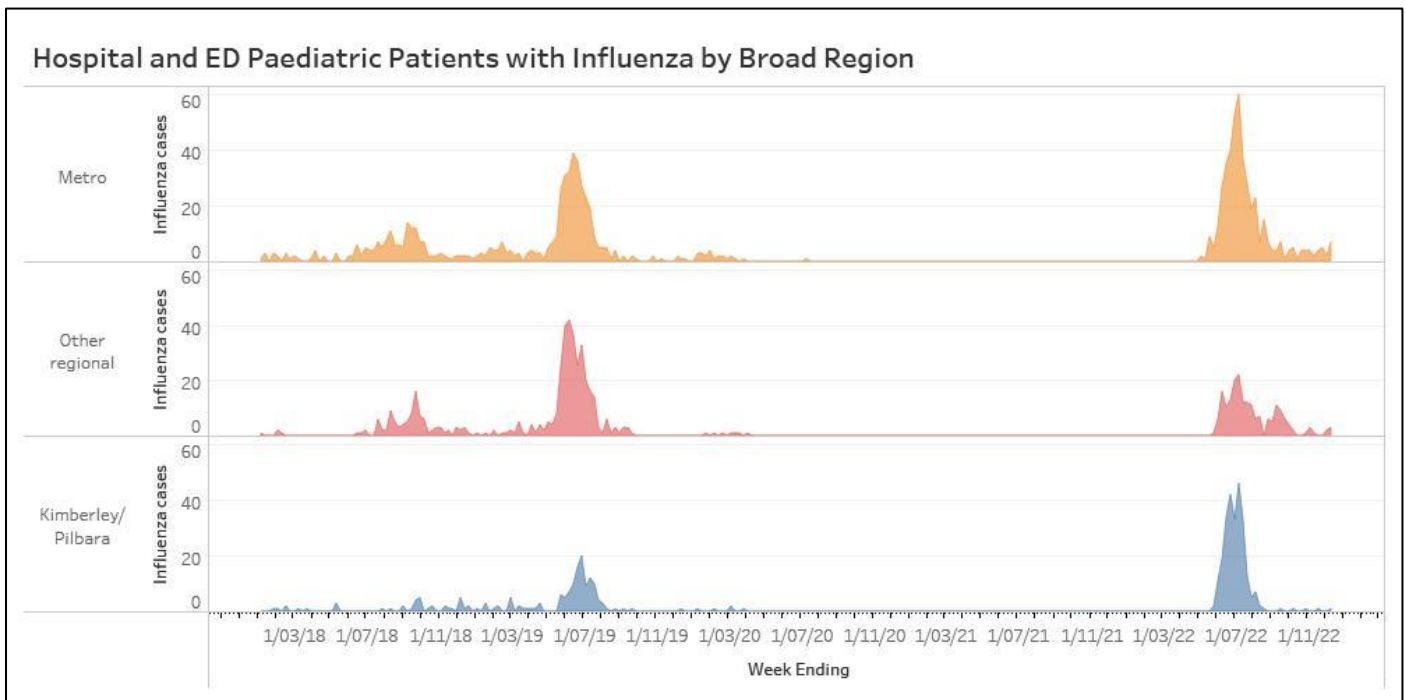


Figure 6: Hospital attending paediatric patients with influenza in Perth metropolitan region, in both Kimberley and Pilbara combined and in the remaining regions combined.

Of the 11 paediatric influenza cases this week, seven were from the Metro area, two from the Southwest and one from each of the Great Southern and Pilbara.

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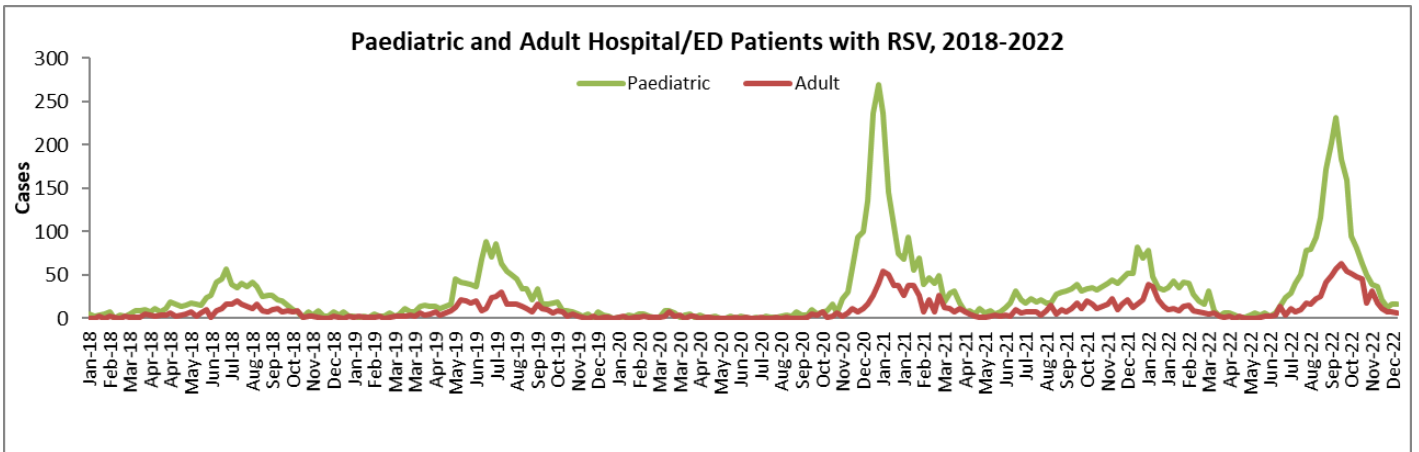


Figure 7: Paediatric and adult hospital attending patients with RSV, 2018-2022.

There were 17 children and 6 adults with RSV who attended a hospital.

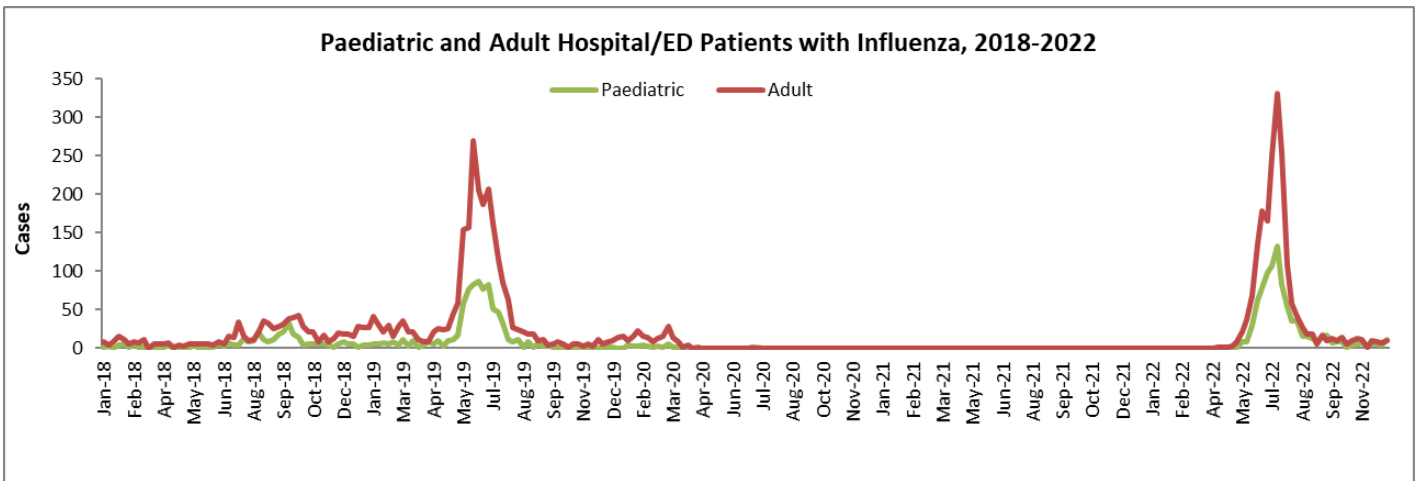


Figure 8: Paediatric and adult hospital attending patients with influenza, 2018-2022.

There were 11 children and 10 adults with influenza who attended a hospital.

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