

Paediatric Respiratory Pathogen Report Week 27, 1 July – 7 July 2024

- Pathwest detected 16 cases of SARS-CoV-2 in paediatric patients this week.
- There were 78 paediatric RSV cases detected at PathWest this week. RSV proportion positive is increasing however remains below levels normally seen at this time of year.
- PathWest detected 90 influenza cases in paediatric patients. Fifty-one cases were influenza A/H3, 6 cases were influenza A/H1, 7 cases were influenza B and 6 case was Influenza A yet to be subtyped.
- Other common respiratory pathogens detected in paediatric patients this week were rhinovirus (55 cases), Adenovirus (32 cases), parainfluenza (22 cases), and *Bordetella pertussis* (3 cases).
- Rhinovirus detections increased this week. This reflects a change in laboratory testing scope which
 has increased the number of Rhinovirus tests performed and does not necessarily reflect increasing
 incidence of this virus.

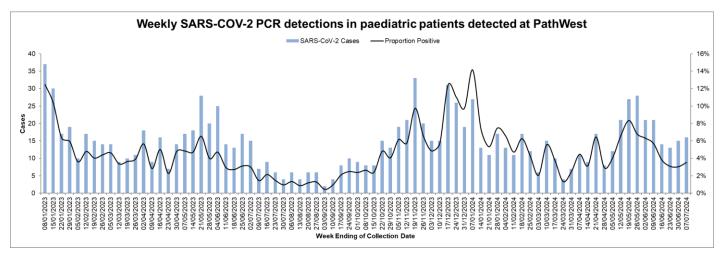


Figure 1: Weekly SARS-CoV-2 detections in hospital attending patients and community paediatric patients. Data is for PCR samples tested by PathWest only.

SARS-CoV-2 cases (n=16) and proportion positive (3.5%) remained stable in paediatric patients this week.



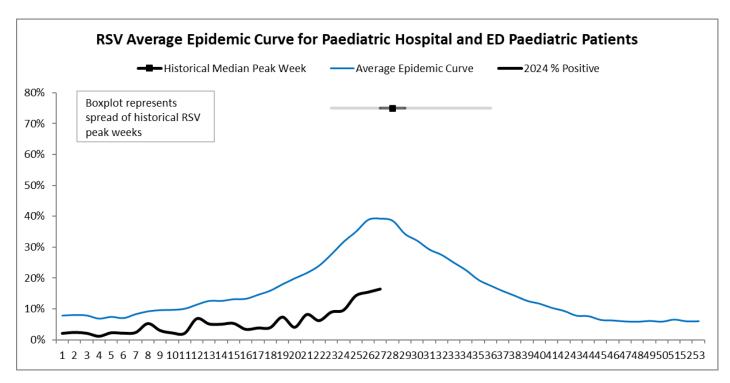


Figure 2: The current season plotted against the Paediatric RSV Average Epidemic Curve. The average epidemic curve was constructed by averaging historic WA seasons using PathWest data from 2007-2019. Data represents all WA hospitalised, and ED paediatric patients tested by PathWest.

RSV proportion positive (16.4%) increased however remains below levels historically seen at this time of the year.

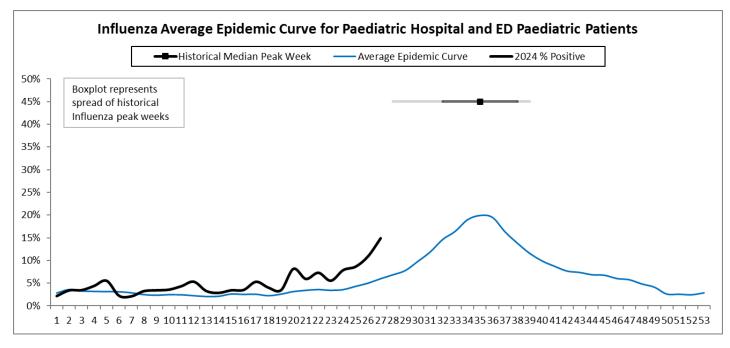


Figure 3: The current season plotted against the Paediatric Influenza Average Epidemic Curve. The average epidemic curve was constructed by averaging historic WA seasons using PathWest data from 2007-2019. Data represents all WA hospitalised, and ED paediatric patients tested by PathWest.

Influenza proportion positive (14.9%) is above levels historically observed at this time of year.



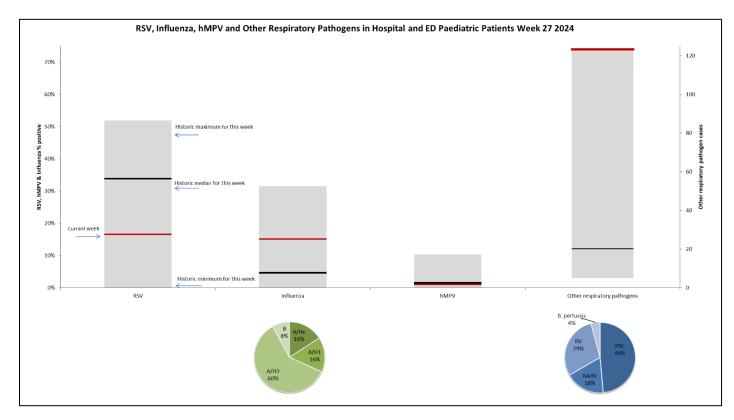


Figure 4: Proportion positive (RSV, hMPV & influenza) or cases (other respiratory pathogens) for the current week (red line) plotted against the historic range (grey box) and median (black line) for this week. Pie charts represent the breakdown of influenza subtypes and the count of other respiratory 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 of influenza and RSV positive samples which do not receive a subtyping test has increased.

RSV proportion positive (16.4%) is lower than the historical median of 33.6%. Influenza proportion positive (14.9%) is higher than the historic median of 4.4% for this week. Other respiratory viruses mainly, Adenovirus, parainfluenza, and rhinovirus were higher than their historic median levels. Testing for these viruses is currently higher than it has been in previous years.



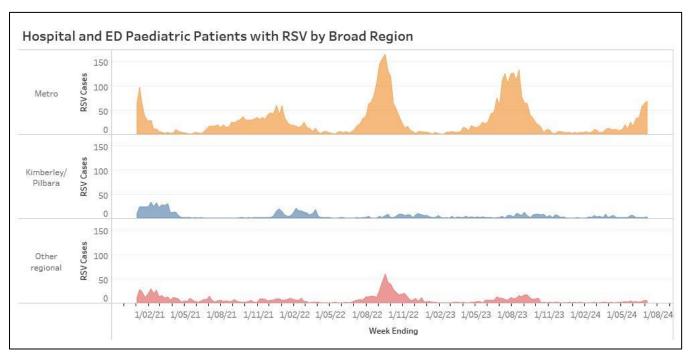


Figure 5: Hospital attending paediatric patients with RSV in Perth metropolitan region, in both Kimberley and Pilbara combined and in the remaining regions combined.

Of the 75 paediatric RSV cases, 68 were from the Metro area, 3 were from the Pilbara, 2 were from the Southwest and there was 1 from each of the Wheatbelt and Goldfields.

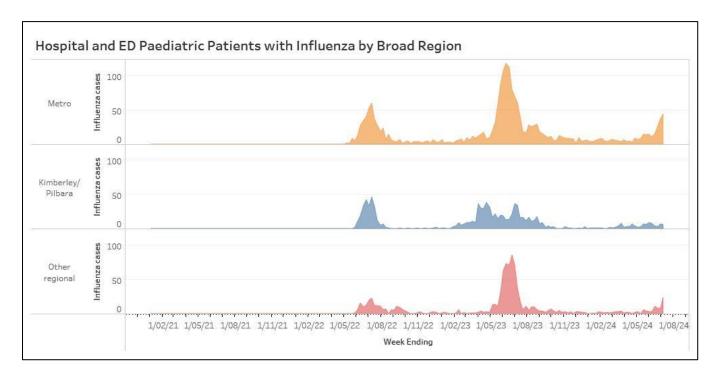


Figure 6: Hospital attending paediatric patients with influenza in Perth metropolitan region, in both Kimberley and Pilbara combined and in the remaining regions combined.

Of the 73 paediatric influenza cases, 44 were from the Metro area, 12 were from the Midwest, 7 were from the Southwest, 6 were from the Pilbara, 2 were from the Great Southern and 1 from each of the Goldfields and Wheatbelt.



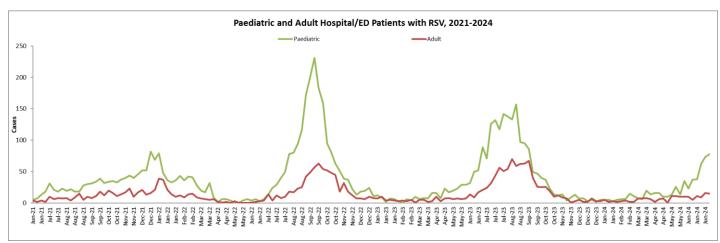


Figure 7: Paediatric and adult hospital attending patients with RSV, 2019-2024.

There were 78 children and 15 adults with RSV who attended a hospital.

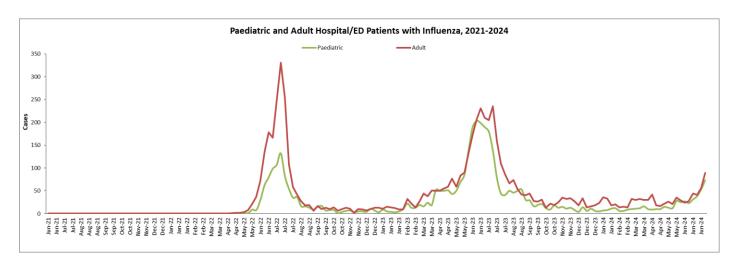


Figure 8: Paediatric and adult hospital attending patients with influenza, 2019-2024.

There were 73 children and 89 adults with influenza who attended a hospital.