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The Kids Are Back In Town – the return of high demand for paediatric emergency care.

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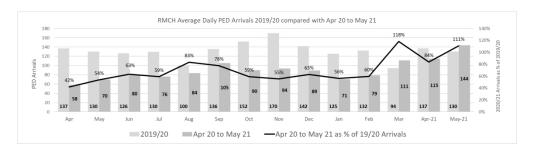


Figure 1. Monthly comparison of children and young people (CYP; <16 years of age at presentation), attending the Paediatric Emergency Department at the Royal Manchester Children's Hospital (RMCH), pandemic (from April 2020) vs. pre-pandemic (2019/20).

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The Kids Are Back In Town – the return of high demand for paediatric emergency care.

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The Kids Are Back In Town – the return of high demand for paediatric emergency care.

More than a year on from the declaration of the SARS-CoV-2/COVID-19 pandemic by the WHO, the disease has now resulted in more than 175M cases worldwide and had a huge indirect impact on much of the global population. While children and young people (CYP) have been relatively spared the direct disease burden of COVID-19, they have been particularly badly affected by indirect effects such as closures of schools and early years settings (see 1 for overview).

In April 2020, we were amongst the first globally to report the observation of markedly decreased attendances to Emergency Departments (EDs) amongst children and young people during the first wave of the pandemic (2). Since the UK's initial pandemic lockdown was enacted on 23 March 2020, the UK has spent more than a year under various local, regional, national, and UK-wide lockdown restrictions and measures to mitigate transmission.

We compared monthly ED attendance data for CYP (< 16 years of age at presentation) from the first full 14 months of the pandemic (April 2020 to May 2021) to the year prior to the start of the pandemic, for a single children's hospital (one of the sites in the original report), in order to see if the pattern of decreased attendance was sustained and to see if there were lessons to be learned as we proceeded through a lifting of restrictions.

INSERT FIGURE 1 ABOUT HERE

Figure 1. Monthly comparison of children and young people (CYP; <16 years of age at presentation), attending the Paediatric Emergency Department at the Royal Manchester Children's Hospital (RMCH), pandemic (from April 2020) vs. pre-pandemic (2019/20).

One striking finding is that, prior to the start of the "roadmap" out of lockdown, the period with the highest percentage of attendances was August 2020. Normally, this period is the quietest for Paediatric Emergency Department (PED) use (3). It is clear that attendances have been impacted by periods of changing local and national restrictions and the impact that this has had on things such as the community spread of other infectious diseases.

For example, in Western Australia, social distancing measures were relaxed from late September 2020, during their spring season. Clinicians there observed increased Respiratory Syncytial Virus (RSV, the causative agent of bronchiolitis) activity in children following this (4). The case numbers continued to rise into the end of the year, notably into Australia's summer period, when RSV transmission is expected to be its lowest. They also observed a greater number of cases than median seasonal peaks from the previous seven years, as well as an increased median patient age.

At the time of writing, many restrictions have been lifted, with a planned date of 19 July 2021 for the final stage of the roadmap when almost all current restrictions in England will be removed, much as they were in Australia during the global South's summer. This presents the question of whether we should be preparing for increased non-COVID-19 respiratory virus transmission during the summer of 2021. This has the potential to increase morbidity in the paediatric population and impose further strain on health services, contributing to the crowding in PEDs that was so common pre-pandemic(although there is emerging evidence that those attending now have lower levels of acuity – using admission rates as a proxy – than

those who attended pre-pandemic). "Rebounding" of ED attendances has already begun across the system (5). We would like to warn our colleagues of the need to prepare for high levels of demand for emergency care for children and young people over the coming months.

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