CONFERENCE ABSTRACT

virtualKIDS – a virtual care service delivering family-centred and integrated paediatric care at scale

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Introduction: Sydney Children's Hospitals Network (SCHN) has been delivering a virtual care strategy, 'virtualKIDS', exploring how patients are cared for closer to home and in collaboration with local services. Since 23 June 2021, the virtualKIDS service has cared for more than 12,000 COVID positive children in the home. The service was challenged to rapidly identify solutions that supported delivering high-quality, safe and integrated paediatric health care at scale – in an environment with rapidly changing advice and guidelines.

Aim: To deliver safe, patient-centred, remote COVID care in the home under the principles of integrated care.

Methods: A scalable integrated model of care and transdisciplinary approach coupled with virtual care, shared care, strong leadership and collaborative partnerships were embedded in virtualKIDS to successfully keep patients well at home and avoid Emergency Department (ED) presentations. 11 sub-teams under the virtualKIDS service were established to ensure a holistic approach was undertaken and an efficient and smooth running of the service.

Results: Between 23 June and 22 November 2021, virtualKIDS cared for 12,229 COVID positive children in the home. Activity peaked in September 2021, with 2,595 active patients who were supported by more than 200 re-deployed nursing, medical, allied health, administration and management staff. The 24/7 family and clinician hotline received 7,299 calls for advice over this period. Remote monitoring was utilised in the form of reviewing oxygen saturation, heart rate and temperature as objective measures to ensure patients remained safe whilst being cared for at home. As an ED avoidance strategy, the virtualKIDS flying squad undertook clinical reviews and swabs in the home – with 855 home visits completed (over three months). Telehealth was also utilised to facilitate remote clinical assessments as a hospital avoidance strategy. As part of evaluating the patient experience, 88% (n=250) of patients and families reported the virtualKIDS service was 'extremely' or 'very' helpful in assisting them. Due to the large social needs of families, over 2525 logistics orders were delivered including over 860 pulse oximeters, 687 thermometers, essential food (600), medications (1597), baby care and personal hygiene items. Key partnerships were formed with health, including regional LHDs, and social agencies to ensure a whole of system approach was delivered.
Conclusion: The successful results of managing 12,229 COVID positive patients in their homes demonstrates the acceptability of rapidly scaling an integrated model of virtual care to a large patient cohort. In the event of a pandemic, key principles of integrated care such as patient-centred shared care, adapted patient safety principles, transdisciplinary approach, collective accountability and collaborative partnerships demonstrated to be fundamental building blocks in successfully caring for COVID positive patients at home.

Applicability/transferability: The virtualKIDS model of care is transferable to paediatric services world-wide, and has been widely adopted across paediatric teams within NSW, Australia.

Sustainability: Future activities include further shared care opportunities through primary care as virtualKIDS works towards COVID being a business as usual model.

Limitations: Areas for service improvement include the ability to care for whole family units together, rather than the children and adults separately.”