Total no of cases – 277

Results
1. A significant rise in the overall incidence of the disease was observed with number of cases doubling over the last 10 years; from 18 in 2009 to 35 in 2018 & 40 in 2019. In 2020, 24 cases were diagnosed till August. To mention, there were 178 KD cases from 2009 to 2017.
2. Majority (80%) of the children presented with complete form of KD.
3. Till 2017 the incidence of coronary artery aneurysms (CAA) was 12 to 15%. A rise in the CAA was observed over the last 2 years with 6 cases in 2018 (17%) & 13 (32.5%) in 2019. It is interesting to note that majority of the 13 patients in 2019 was diagnosed and administered IVIG within 10 days of disease onset and 3 of the 13 children had CAA at diagnosis.
4. There has been a significant increase in IVIG resistant KD. 12 patients with IVIG resistance were recorded from 2009 to 2017. However, in 2018 there were 7 cases (20%) and 10 cases (25%) in 2019. 25 children with resistance to first dose of IVIG received Infliximab since January 2016. All of them had a favourable response with rapid control of fever and CRP.
5. 10 children over the last 4 years have developed giant aneurysms (z score more than 10) in spite of timely initiation of IVIG. 4 of them had persistent ballooning even after Infliximab administration post IVIG.

Conclusions
1. The number of patients diagnosed with KD has doubled over the last 10 years. Whether it is a true increase in incidence or because of increased detection remains speculative.
2. It seems that the disease is behaving more aggressively with higher incidence of coronary aneurysms and IVIG unresponsiveness in spite of timely IVIG administration.

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VIRTUAL FRAC TURE CLINICS SIGNIFICANTLY REDUCE FACE-TO-FACE CONTACTS AND RADIOGRAPHS IN CHILDREN PRESENTING WITH MINOR TRAUMA

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Background Covid-19 has presented major challenges to face-to-face clinical encounters and facilitating safe and effective care remotely that is acceptable to children, parents and healthcare professionals is therefore of significant interest.

Objectives To determine risks and benefits associated with a change in service delivery of paediatric minor injury follow up.

Methods We conducted a prospective audit during introduction of a paediatric virtual fracture clinic (VFC) and associated same-day orthopaedic telephone advice line, staffed by orthopaedic consultants and registrars, on the outcomes of attendances to a dedicated paediatric emergency department at a district general hospital and associated minor injury units spanning nine weeks from April to June 2020, coinciding with the UK’s first national lockdown due to Covid-19. Results were compared to a similar number of cases using standard face-to-face fracture clinics without an orthopaedic advice line during April 2019.

Patients were identified through the department’s established procedure for paediatric x-ray follow up and were included if they were suspected or confirmed to have an acute fracture or soft tissue injury. Patients were excluded from analysis if they presented with a soft tissue infection, wounds without fracture, non-acute injury or condition, were admitted to hospital or had safeguarding concerns. Initial and final diagnosis and management, number of radiographs, missed fractures, hospital attendances for the same injury, ‘did not attend’ episodes, adverse events and unplanned returns were recorded.

Results There was a notable reduction in patient numbers during Covid-19 study period (1.4 vs 4.3 patients per day), commensurate with an overall drop in paediatric attendances during national lockdown. Reasons for attendances were broadly similar between VFC and standard practice groups, with comparable rates of admission (8.1 vs 11.6%).

Compared to the standard practice group, the VFC group demonstrated a significant reduction in average face to face visits per patient (1.8 vs 2.9, p = 0.00001), average number of radiographs per patient (1.5 vs 1.8, p = 0.01) and no increase in rate of unplanned returns (0.06 vs 0.1 per patient). There were 2 instances of difficulty contacting parents for VFC appointments, which were both resolved by parents contacting fracture clinic.

There were 3 instances of missed fractures in the VFC group; 1 was missed in the emergency department and so unrelated to the introduction of VFC, 2 were missed after discussion with the advice line, of which 1 was detected after returning with on-going pain, put into a temporary back slab and discharged after 1 virtual clinic and the other which did not result in any change in management. There was 1 missed fracture in the standard practice group, but this was excluded from analysis due to missing records. Overall management in both groups was similar.

Conclusions Face-to-face appointments for paediatric minor trauma can be safely replaced with a virtual fracture clinic system and associated advice line. This effectively saves each child one attendance per injury and one x-ray for every three children attending with minor injuries. Benefits would include reductions in missed school and work days for children and carers, and financial savings for healthcare organisations.

Quality Improvement and Patient Safety

WADING THROUGH THE PAPERWORK: MAKING COMPLEX PATIENT NOTES EASIER TO NAVIGATE

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Background There has been a significant increase in the number of patients presenting with minor injuries and orthopaedic follow up at our Trust in recent years. The changes in service delivery during the COVID-19 pandemic and associated staff shortages have added to the challenges of managing a busy service. At our Trust, a review of the orthopaedic telephone advice line showed that a large number of outpatient appointments were being rebooked due to parents struggling to find the time to attend. "Virtual Fracture Clinics" have been rolled out in hospitals across England as a way of reducing face-to-face contacts, and our Trust launched a similar service in May 2020.

Objectives To determine whether introducing a telephone advice line instead of a virtual fracture clinic as a means of reducing attendances at the hospital was an effective method of managing orthopaedic follow up appointments.

Methods A retrospective review of all orthopaedic telephone advice line requests was performed. A control group of children attending the fracture clinic for the same injury and a comparison group of children who were referred to an orthopaedic consultation were identified. The mean number of orthopaedic telephone advice line contacts per patient, number of orthopaedic telephone advice line unplanned returns, the mean number of orthopaedic telephone advice line visits per patient, the mean number of orthopaedic telephone advice line unresponsiveness in spite of timely IVIG administration.

Results the admission rate was similar (8.1% vs 11.6%).

Conclusions Face-to-face appointments for paediatric minor trauma can be safely replaced with a virtual fracture clinic system and associated advice line. This effectively saves each child one attendance per injury and one x-ray for every three children attending with minor injuries. Benefits would include reductions in missed school and work days for children and carers, and financial savings for healthcare organisations.
Background Bulky hand-written notes and frequent staff changeovers (due to on-call shift patterns) mean that details of plans for complex or long stay patients can be missed. Muddled verbal handovers are timses and things can be forgotten at the end of busy night shift. Wading through paper notes can be unnecessarily time consuming, making onward referral harder and slower, and mistakes more likely if the clinical problem is difficult to understand. Most paediatric patients are discharged before 7 days, so patients that stay longer than this are likely to have more complex medical needs. This project was conducted at a busy London DGH during the Covid-19 pandemic.

Objectives The overall objectives of the project are to

- Reduce the amount of time wasted reading through paper notes to understand the clinical history.
- For all staff to be able to easily understand the clinical problem and execute the next steps of the management plan.
- Reduce the potential for patient harm through missed clinical plans.
- Prompt teams to consider differentials and alternative management options in challenging clinical scenarios.

Methods Retrospective data was analysed to see the numbers of patients admitted for ≥7 days to get an idea of the scope of the problem. Diagnostic data was gathered using a fishbone diagram to explore the issues surrounding the problem. The Model for Improvement method was used to plan and execute the project. Various change ideas were considered as part of this project and a questionnaire was sent to junior doctors within the department to gauge current feelings about difficulties around making referrals for complex patients.

Results Over an 8 week period, there were between 1–4 patients each week that fulfilled the criteria of admission ≥7 days, with the longest staying for 3 weeks. Each of these patients were discussed with at least one referral centre during their admission and several were diagnostically challenging.

Paediatric juniors were surveyed to gather objective and subjective data on current practise. 13 people responded; 69% had spent >10 minutes going through patient notes prior to making a referral. 75% felt they ‘considerable time’ going through patient notes to make a referral, 76% felt it took longer than necessary and 69% felt that despite this they had still missed important parts of the history.

A weekly proforma was developed to summarise patient notes for anyone admitted for ≥7 days; this has been developed and improved through a series of Plan-Do-Study-Act cycles and will be introduced alongside restarting the weekly complex patient MDT meeting.

Conclusions Initial data indicates that there are enough patients admitted to the Paediatric ward for ≥7 days on a regular basis to merit an intervention. Feedback from colleagues indicates that navigating complex patient notes is a source of frustration and that there is a need to summarise them more effectively. Progress has been delayed due to the Covid-19 pandemic as the Paediatric ward was closed for several months. However now the ward has re-opened there is opportunity to move this project forward, and implement a positive change.

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1089 UNSCHEDULED CARE PRESENTATIONS FOR CHILDREN IN GLOUCESTERSHIRE DURING THE SARS-COV-2 PANDEMIC

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Background The coronavirus pandemic has resulted in major changes to the way children and their families carry about their daily lives. Public health measures have instructed families to stay at home to avoid spreading the infection and as such parents have faced the added challenge of combing educating and caring for their children with working from home. Recent literature highlights a possible increase in child abuse during the coronavirus (SARS-CoV-2) pandemic.

Objectives In view of the concerns raised in the literature, Gloucestershire Paediatric Unscheduled Care Presentations were reviewed to determine local trends and to provide reassurance/concerns as to any local or developing issues.

Managing minor illnesses and reducing accidents is identified as one of the six key high impact areas of the DOH 2018 report which promotes timely interventions to support parents in keeping their children healthy and safe. Injury surveillance is an important component in detecting vulnerable children and their families and is critical in informing local government policy and public health measures for its prevention.

Methods Data was collected on all unscheduled care attendances (in children <16 years) taking place at Gloucestershire NHS foundation Trust’s Emergency Department (ED) and Paediatric Assessment Unit (PAU) across each financial year (April – March). These were categorised according to 11 different injury/illness presentations. Any relevant changes during the pandemic (2020 – 2021) were highlighted and investigated further.

Each dog bite presentation was explored according to patient demographic and location of bite. Each burn presentation was stratified according to patient demographics and type of burn and fracture numbers were compared across the months of the pandemic according to patient age.

Results We have observed a 3-fold proportional increase in dog bites with a significant spike during the first lockdown. There was a disproportional increase in younger children (<5 years) being bitten to the head/face.

Our data showed an overall reduction in fractures by 30% in 2020 in comparison to 2019. There was a considerable reduction in older child (>11 years). Younger children have presented in similar numbers thought to be due to an increase in trampoline use.

There was an overall increase in burns by 10% in 2020 compared to 2019. Thermal contact burns were the most common burn in all age groups apart from <1year, where scalds from hot drinks predominated.