INTERRVENOUS ANTIBIOTIC USE FOR SUSPECTED EARLY-ONSET BACTERIAL INFECTION IN HEALTHY NEONATES: A SINGLE-CENTRE CLOSED LOOP AUDIT

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Aims We aimed to identify and reduce the number of healthy neonates started on intravenous antibiotics for suspected early-onset bacterial infection in a district general hospital, and ensure that practice was commensurate with that set out in the relevant NICE (National Institute for Health and Care Excellence) guidance (CG149).

Methods A retrospective audit was performed using the clinical notes, drug charts and pathology reports of neonates who had been started on antibiotics in two 3 week periods, before and after intervention. The intervention was multifaceted and included the introduction of a neonatal sepsis pro forma and decision aid, (P) in relevant clinical areas, and teaching for junior and senior paediatricians.

Results The number of neonates commenced on antibiotics for suspected infection fell by 43% from 42 to 24 neonates, and compliance with absolute NICE criteria for commence ment of antibiotics improved from 69% to 93%, 76% of neonates in cycle 1 met NICE guidance for consideration of cessation of antibiotics at 36 hours but 77% of these neonates received more than 48 hours of antibiotics; similarly, in cycle 2, 73% of neonates warranted consideration of cessation of antibiotics at 36 hours, but 91% of these received more than 48 hours of antibiotic treatment in total. In 77% of cases in cycle 1% and 82% of cases in cycle 2, the documented rationale for continuing antibiotics past 36 hours in these healthy neonates was that blood culture results had not yet been reported.

Conclusion Our intervention was effective in reducing the number of healthy neonates started on intravenous antibiotics and improving compliance with NICE guideline for commencement of antibiotics. The proportion of neonates receiving a short duration of antibiotics was high despite improvement in following approved criteria, suggesting that there may be room for these criteria to be revised to capture fewer healthy neonates. However, our intervention was not successful in reducing duration of antibiotic use in healthy neonates. Establishing processes to accelerate pathology reporting could be the focus of further interventions to improve compliance with national guidelines and minimise unnecessary antibiotic exposure to healthy neonates.

LEARNING FROM PICU TRANSFERS FROM A PAEDIATRIC EMERGENCY DEPARTMENT AND PAEDIATRIC WARD


Aims Local hospital Paediatricians often rely on updates from retrieval services for information about their patients transferred to Paediatric intensive care units (PICU). This quality improvement project aimed to increase local hospital knowledge about their PICU transfers and identify areas for improvement to enhance patient safety and clinical care.

Methods In November 2016 a new incident log was implemented to collect data on PICU transfers from the Emergency Department and Paediatric ward of one district general hospital. Between January and September 2017, a multi-disciplinary team met monthly to review the Electronic Document and Records Management (EDRM) system of all patients transferred to PICU in the previous month(s). The multidisciplinary team included medical and nursing representation from Paediatric, Emergency and Anaesthetic departments and the outreach resuscitation team. EDRM was reviewed using an adapted RECALL (Rapid Evaluation Cardiorespiratory Arrest with Lessons for Learning) tool. The RECALL tool provided a structured template for retrospective case note review of