

Improving Trainee Comfort with Initiating Rapid Responses for Bronchiolitis

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Pediatric trainees enter residency with varied levels of comfort managing bronchiolitis in the hospital setting. Given that bronchiolitis is one of the most common reasons for hospitalization among children ages 2 years and under, residents benefit from early proficiency in assessing and responding to children with increasing respiratory distress in the setting of bronchiolitis.

Yet, in an initial survey of current residents, many reported discomfort about knowing what management options should be attempted for a child requiring increased respiratory support and when assessment from the PICU may be appropriate.

This quality improvement project aimed to improve resident comfort with assessing management options and articulating rationale for calling a Rapid Response (RRT) for children with signs of worsening bronchiolitis. The QI study team worked with PICU team members to design a curriculum for peer-to-peer education to take place during noon resident education during the spring of 2025.

This curriculum covers basic clinical characteristics of patients with bronchiolitis, existing tests and treatments available on a general pediatrics floor, how to respond to escalating respiratory needs, and the criteria for admission to the PICU. Following each session, students and residents complete a survey on their comfort and perceived knowledge base before and after the session.

Preliminary results suggest formal education improves trainees' comfort, knowledge, and medical rationale for calling an RRT on a patient with bronchiolitis. The primary endpoint of this study will be to track perceptions of impact to resident comfort as a result of noon education sessions. More data is needed to establish statistical significance, which the study team plans to obtain at forthcoming sessions. The project findings can be used to adapt resident curriculum in future years. A dot phrase with an outline of the teaching points was provided to residents at each session for ongoing reference.