Eye Care Protocol in Critically Ill Pediatric Patients on Neuromuscular Blockage

Date: July 6, 2022
Time: 2:00 p.m. to 2:45 p.m.
Place: 204 SCCB

Abstract

Problem: Patients admitted to the pediatric intensive care unit (PICU) are at increased risk for the development of ocular surface disease (OSD) due to impaired ocular mechanisms while intubated, sedated, and on continuous neuromuscular blockade. The purpose of this project is to prevent OSD and vision impairments by increasing the frequency of eye care in accordance with a PICU eye care protocol.

Methods: An observational descriptive study was conducted utilizing retrospective and prospective chart review. Comparisons were drawn between the 2021 pre intervention group and the 2022 post intervention group regarding the impact of linking lubricating eye ointment orders to neuromuscular blockade orders for PICU patients who are on continuous neuromuscular blockade.

Results: A total of 47 (N=47) patients met inclusion criteria, with 25 patients in the 2021 pre-group (n=25) and 22 patients in the 2022 post-group (n=22). Results yielded a significant positive correlation between the mean eye ointment application rate and eye ointment ordering. After the intervention was implemented, patients with artificial tear ointment orders increased by 40% and the mean application adherence rate increased by 72%.

Implications for Practice: The implementation of linking scheduled artificial tear ointment orders to neuromuscular blockade infusion orders in the EMAR yielded a clinically and statistically significant increase in provider eye ointment order rates and in eye ointment application rates.

Defense of Dissertation Committee
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