

Reducing CLABSIs Through a Targeted Pre-Swarm Intervention in a Pediatric Acute Care Unit

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Objectives




- Identify risk factors for CLABSI's in a pediatric acute care setting.
- Describe a targeted, nurse-led CLABSI pre-swarm process.
- Discuss the crucial role clinical associates play in designing practical, nurse-led interventions.



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4 East

- 24-bed acute-care pediatric unit.
- Newborn to 21 years
- Medically Complex patient population
- Primary staff: RNs, Nursing Assistants, Virtual RNs, Nurse Educator, and Nurse Managers




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Why Target CLABSIs?




- Central line-associated bloodstream infections (CLABSIs) significantly impact pediatric patients through
 - Increased morbidity and mortality
 - Prolonged length of stay
 - Higher healthcare costs




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Identified Practice Gap




- Increase in CLABSIs on 4 East
- Inconsistent Use of securement and barrier devices.
- Inconsistent completion and documentation of central line maintenance bundle elements:
 - Line necessity discussion
 - Daily CHG/bathing
 - Daily linen change



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Pre-Intervention State 


- Hospital CLABSI Pre-Swarms led by the Harm Prevention Team
- Pre-Swarm=pro-active safety huddle
- Unit teams contacted Harm Prevention after high-risk concerns were identified



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How We Started

-  Discussed proposal with Harm Prevention and 4 East Leadership
-  Formed a nurse led unit-based CLASBI Pre-Swarm Workgroup
-  Developed goals for our CLABSI Pre-Swarm Project
-  Designed a CLABSI Pre-Swarm Tool



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4 East CLABSI Pre-Swarm Team

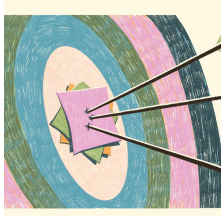

- 4 East Clinical Nurses
- Clinical Nurse Educator
- 4 East Nursing Leadership
- Harm Prevention Team
- 4 East Medical Director



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Goals

- Reduce Unit CLABSI rates
- Improve central line bundle compliance and documentation
- Identify CLABSI risks and implement prevention strategies early





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CLABSI Pre-Swarm: What Happens



- Identify patients admitted or transferred to unit with a central line or newly placed central line
- Conduct a CLABSI pre-swarm within 48 hours
- Identify prevention strategies to be implemented
- Communicate and document at handoff




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Demographics

Line Details

Risk Factors



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Beyond the Bundle interventions for this patient	
<p>Interventions</p> <p>U.S. Observation Bag Lock Adiposol Var Board Alternative Dressing (if)</p>	<p> <input type="checkbox"/> Would care clinical interventions <input type="checkbox"/> Monitor tubing (over catheter dress) <input type="checkbox"/> Line <input type="checkbox"/> Cloning <input type="checkbox"/> Sile <input type="checkbox"/> Valve Clip <input type="checkbox"/> Close Cover <input type="checkbox"/> Other(s): </p>
<p>Line Assessment</p> <p>Is the team discussing utilization and necessity during rounds? Yes/No Comments:</p> <p>Can there be issues with maintaining a clean, dry, and occlusive dressing? Yes/No Comments:</p> <p>What is the primary reason for accessing the line (medication, fluids, etc.)? Are there any concerns regarding line patency? Are there any concerns regarding CLABSI Bundle elements? (Site, line change, bath, etc.) What education needs to be provided for family/caregivers regarding line care? (DAD, handwash, hand hygiene, aseptic technique, etc.) Any concerns that need to be escalated to another team?</p>	<p> <input type="checkbox"/> Yes - document in SBAR when the CLABSI audit <input type="checkbox"/> No - document in SBAR when the CLABSI audit <input type="checkbox"/> Not to complete at all (if not appropriate) </p> <p> <input type="checkbox"/> CLABSI Prevention Plan (total in SBAR) <input type="checkbox"/> Document completed in Medical Notes <input type="checkbox"/> Marked complete on CLABSI Pre-Swarm <input type="checkbox"/> None - Form completed and placed in Flow <input type="checkbox"/> Other </p>
<p>Concerns</p> <p>Canal tubes will be implemented to prevent a CLABSI (beyond the bundle) Yes/No Comments:</p> <p>Has the patient been admitted for at least 24 hours? Yes/No Comments:</p> <p>Follow through: W/HA, when complete</p>	<p>Audit</p> <p>Follow Through</p>

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Interventions

- ✓ Barrier Devices
- ✓ Securement Devices
- ✓ Alternative CVL Dressing
- ✓ Line Positioning

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Documentation

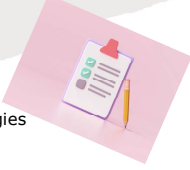

H Handoff

<p>Nursing</p> <p>Illness Severity: (Illness Severity 20061) History 14 y/o Female ID Team ICP, Ileostomy 3/10 Edited by: Lussier, Corne, RH at 4/20/26 18:36</p> <p>Action List: C1 415 Daily Labs Weights Mon/Wed/Fri Wound nurse for Ostomy Teaching CLABSI Pre-Swarm Completed 3/11 Edited by: Lussier, Corne, RH at 4/20/26 18:36</p> <p>Situation Awareness & Contingency Planning:</p> <p>Synthesis by Receiver: I have received handoff from ***. I have had the opportunity to ask questions and summarize the patient's condition, action items and contingency plans.</p>	<p>Patient Summary: P/R/t/c: Crohn's Admit: Abd pain/distention, constipation Neuro- WNL</p> <p>CV: PICC/RUE 3 Fr/ TPN 24 hours CLABSI Pre-Swarm completed Interventions: Family Education to be completed: None Edited by: Lussier, Corne, RH at 4/20/26 18:18</p>
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RN Survey Results

- Increased awareness of CLABSI prevention strategies
- Increased awareness of required CLABSI bundle elements and documentation protocol
- Increased use and documentation of CVL barrier and securement devices
- Increased comfort level in escalating CVL concerns to the medical team
- Increased awareness of CLABSI high-risk factors



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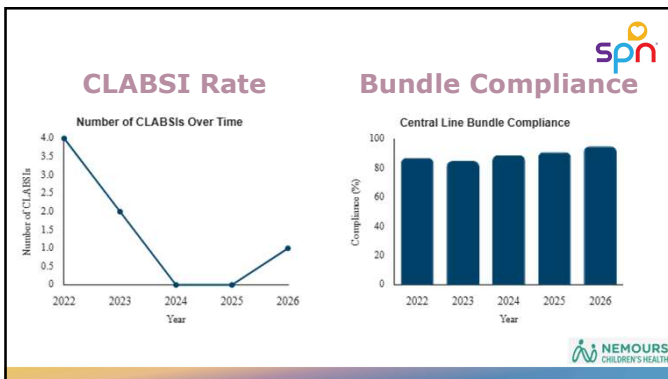


How Are We Doing?

Completed over 230 Pre-Swarms
Over 2 Years CLABSI free



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What's Next



- Integration into electronic documentation
- Continued staff education and sustainability monitoring
- Disseminate and adapt our unit based pre-swarm model across additional units.



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References



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