Examination of the Role of Interprofessional Teamwork in the Implementation and Maintenance of the ABCDE Bundle in Jefferson Intensive Care Units

JCIPE Conference
October 29, 2016

Dena Lehmann, Pharmacy Student
Shoshana Sicks, EdM
Nethra Ankam, MD
Cara McDaniel, PharmD, BCPS
June Andrews Horowitz, PhD, RN, PMHCNS-BC, FAAN
Beth Colburn, DPT
Elizabeth Speakman, EdD, RN, ANEF, FNAP
Jessica Shank, PT, MPT
Ashley Tarkiainen, Medical Student
Today’s Objectives

- Identify three overall barriers and strategies perceived by ICU staff in the implementation and maintenance of the ABCDE bundle.

- Compare and contrast the barriers and strategies identified by profession.

- Evaluate the role of interprofessional collaboration in the implementation and maintenance of the ABCDE bundle in the ICU setting.
Purpose

• Assess the role of interprofessional teamwork in Jefferson intensive care units (ICUs)

• Analyze the attitudes and perceptions of Jefferson ICU staff regarding the ABCDE Bundle and interprofessionalism within their teams via a survey
Background

• ABCDE Bundle rolled out in spring 2014
  • Awakening and Breathing Coordination, Delirium Monitoring and Management, and Early Mobility

• Interprofessional team training workshop held in spring 2014
  • 60 Jefferson ICU interprofessional staff from all units
Survey

• Barriers to and strategies for ABCDE Bundle implementation brainstormed by staff during workshop
• Questions taken directly from the brainstorming session
• Additional questions repeated from pre/post-workshop evaluation
Survey

• Administered in August 2015 over one month

• Advertised in all ICUs and via targeted emails to professional groups
  – e.g., rehabilitation medicine therapists, respiratory therapists, clinical nurse specialists, attending physician staff in various departments, etc.
Respondent Demographics (n = 113)

- Nurse or Nurse Practitioner: 49.56%
- Occupational Therapist: 5.31%
- Pharmacist: 5.31%
- Physical Therapist: 11.50%
- Physician or Physician Fellow: 13.27%
- Respiratory Therapist: 9.73%
- Other*: 6.19%

*Other: Dietician (n = 1); No response (n = 2); Other (n = 2); Speech-Language Pathologists (n = 2)
Cardiovascular ICU, 16%
Surgical ICU, 24%
Medical ICU, 23%
Neurological ICU, 12%
Multiple Units, 9%
No Response, 7%
Units (n = 113)
Top 3 Barriers
1) Coordinating all needed team members and activities
2) Fear/resistance to culture change
3) Timing activities appropriately
Top 3 Strategies used
1) Focused huddle rounds
2) Ongoing education and reinforcement
3) Clearly defining and documenting goals of care for each patient
Summary: Barriers

• Consistent agreement on lack of coordination as perceived barrier

• Fear and resistance to culture change also relatively consistent

• Consensus around leadership support

• Certain professions perceived barriers more so than others:
  • Timing activities appropriately not problematic - Pharmacy
  • Inconsistent goals of care and documentation - Pharmacy
  • Lack of staff support - Occupational Therapy
Summary: Strategies

- Huddle rounds popular, but some variation in usage/inclusion by profession
- Certain professions use particular strategies more so than others:
  - Not empowered for a culture of safety - OT, Pharmacy, PT, Others
  - Metrics and performance outcomes being monitored - Medicine, OT, Respiratory Therapy
  - Not a lot of ongoing education and reinforcement - OT, PT
- Overall, physicians feel that most strategies are being used
Lessons Learned

• Difficult to disseminate survey to all ICU staff
• Difficult to calculate total n and thus the response rate
• Lack of statistical support
Follow-up

- Presented to medical directors of the ICUs and to unit specific councils
- Resource to guide quality improvement projects
Further Investigation

- Attitudinal changes from pre/post-workshop and follow-up survey
- Comparisons between workshop attendees and non-workshop attendees
- Impact of bundle on patient care outcomes
- Perceptions of interprofessional care from patient’s perspective
Questions?