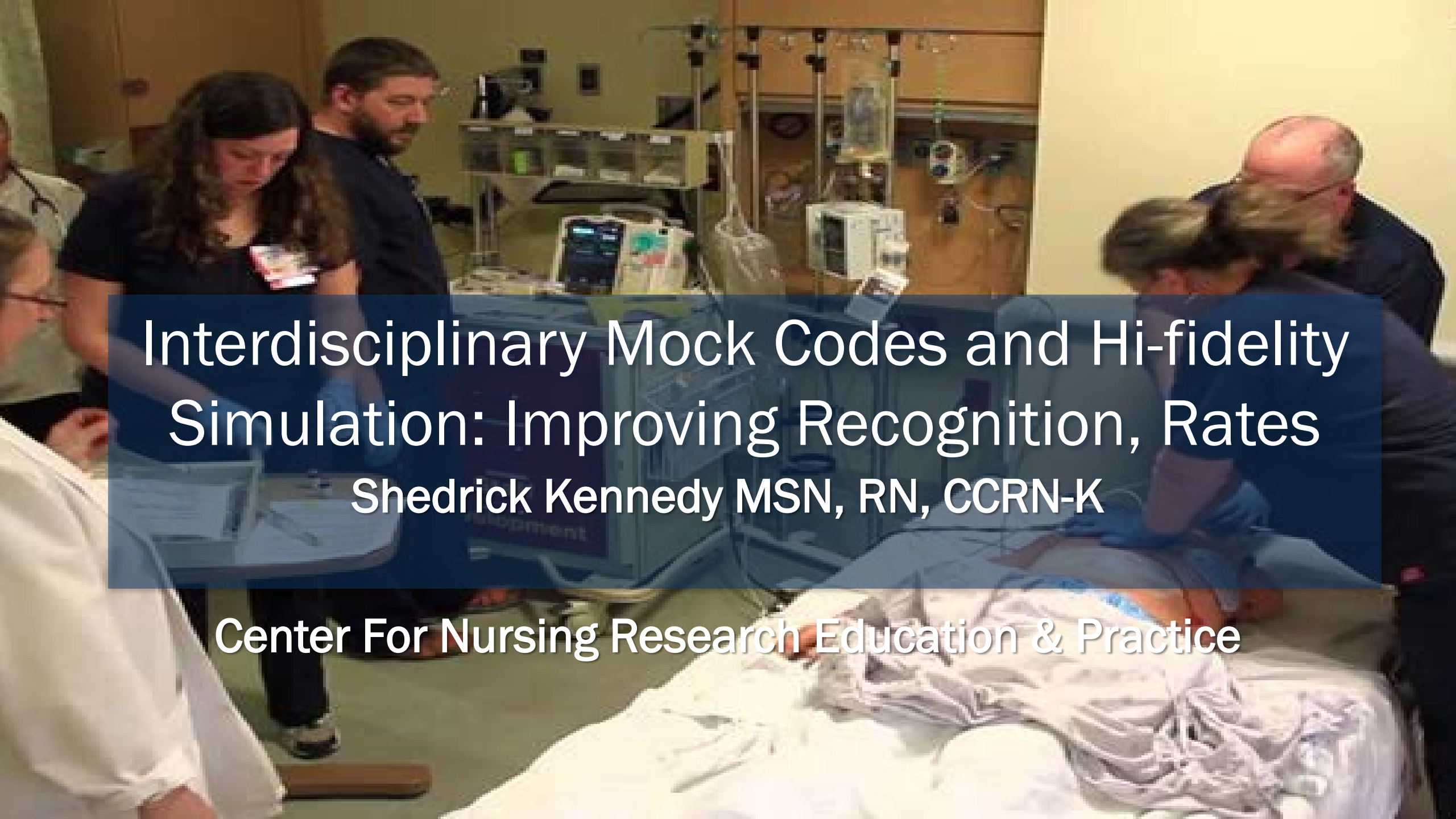


Interdisciplinary Mock Codes and Hi-fidelity Simulation: Improving Recognition, Rates

Shedrick Kennedy MSN, RN, CCRN-K

Center For Nursing Research Education & Practice

Learning Objectives

- Participants will:
  - Implement interdisplicinary mock code training to enhance team performance and improve patient safety.


YOU ARE
THE FATHER!
OMG

Situation

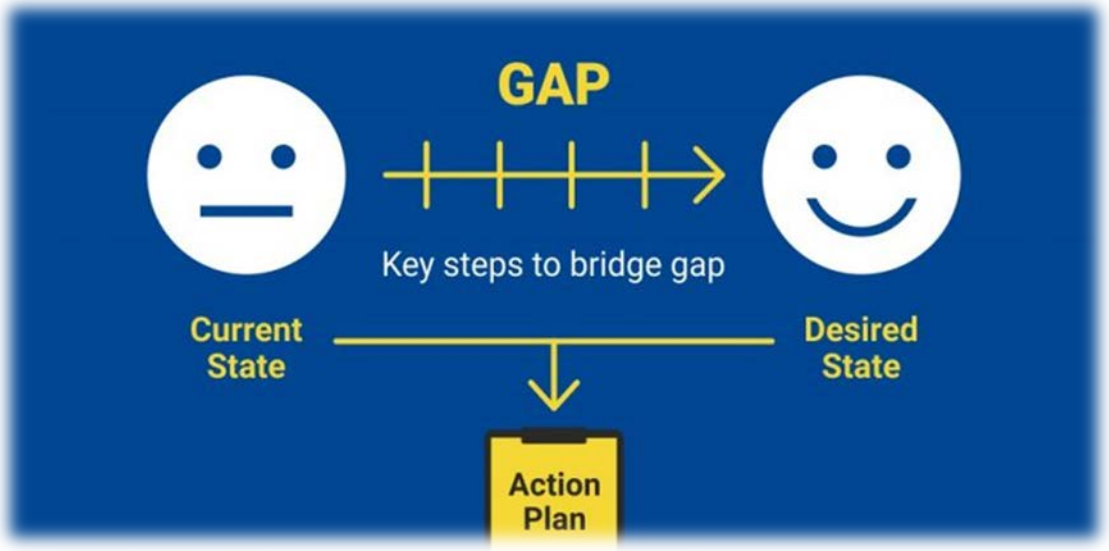
- In-hospital cardiac arrests (IHCA)-loss of circulation prompting resuscitation with chest compressions, defibrillation, or both
- IHCAs occur in over 290 000 adults each year in the United States
- Survival rate of approximately 10.0% to 23.9%
- Highest survival rates
  - Witness arrest
  - Initial rhythms –pulseless ventricular tachycardia and ventricular fibrillation
  - Quality compression and prompt defibrillation

Background

- CODE BLUE events-
  - SCARY and ANXIETY PROVOKING!!!
  - Episodic
- Despite training efforts
  - Skills and knowledge retention decline following BLS/ACLS certification
  - 14% of nurses retained advanced cardiovascular life support skills one year after certification
  - Industry leaders - agreed that 2-year training cycles are not optimal

Assessment

- **MOCK CODES ARE NEEDED!**
  - Gap analysis
    - CPR and Code blue validation during orientation
    - BLS and ACLS certification/recertification
    - Annual Competency (code blue management)
      - Remediation
    - Mock Codes
      - Standardization?
      - Information sharing and best practice dissemination?
      - Collaborative?

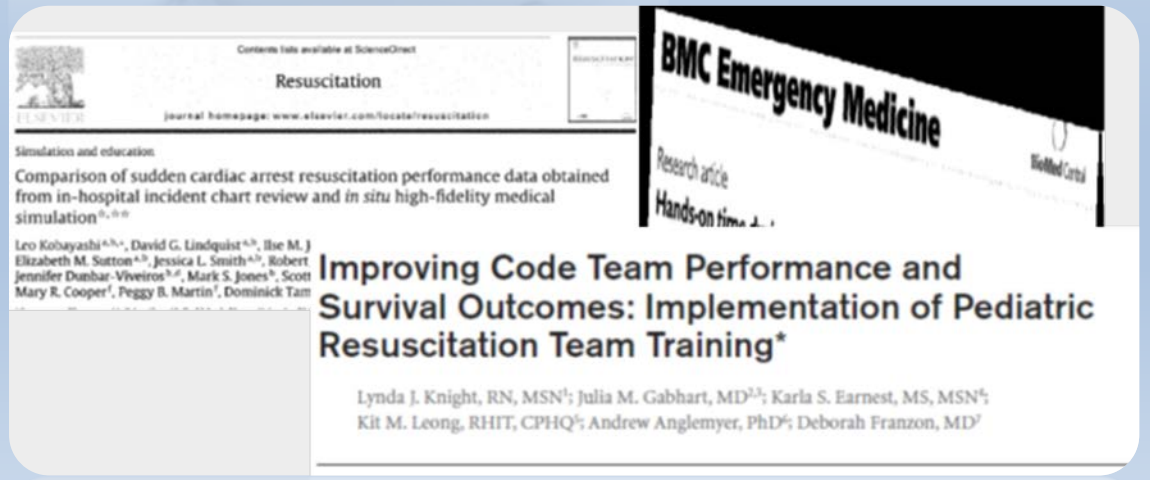


Recommendation

- American Heart Association (AHA), National Academy of Medicine, and The Joint Commission
  - hospitals provide additional, ongoing resuscitation training, such as **in situ** IHCA simulations.

Recommendation

Get With The Guidelines®-Resuscitation for In-Hospital Cardiac Arrests (GWTG)



CARDIOPULMONARY ARREST

ADULT

age >=18 years

Confirmation of airway device placement in trachea: Percent of events who had confirmation of airway device placement in trachea.

Time to first shock <= 2 min for VF/pulseless VT first documented rhythm: Percent of eventswith VF/pulseless VT first documented rhythm in whom time to first shock <=2 minutes of event recognition.

Time to IV/IO epinephrine ≤ 5 minutes for asystole or Pulseless Electrical Activity (PEA): Percent of events where time to epinephrine ≤ 5 minute of asystole or pulseless electrical activity.

Percent pulseless cardiac events monitored or witnessed: Percent of pulseless cardiac patient events were monitored or witnessed

Recommendation

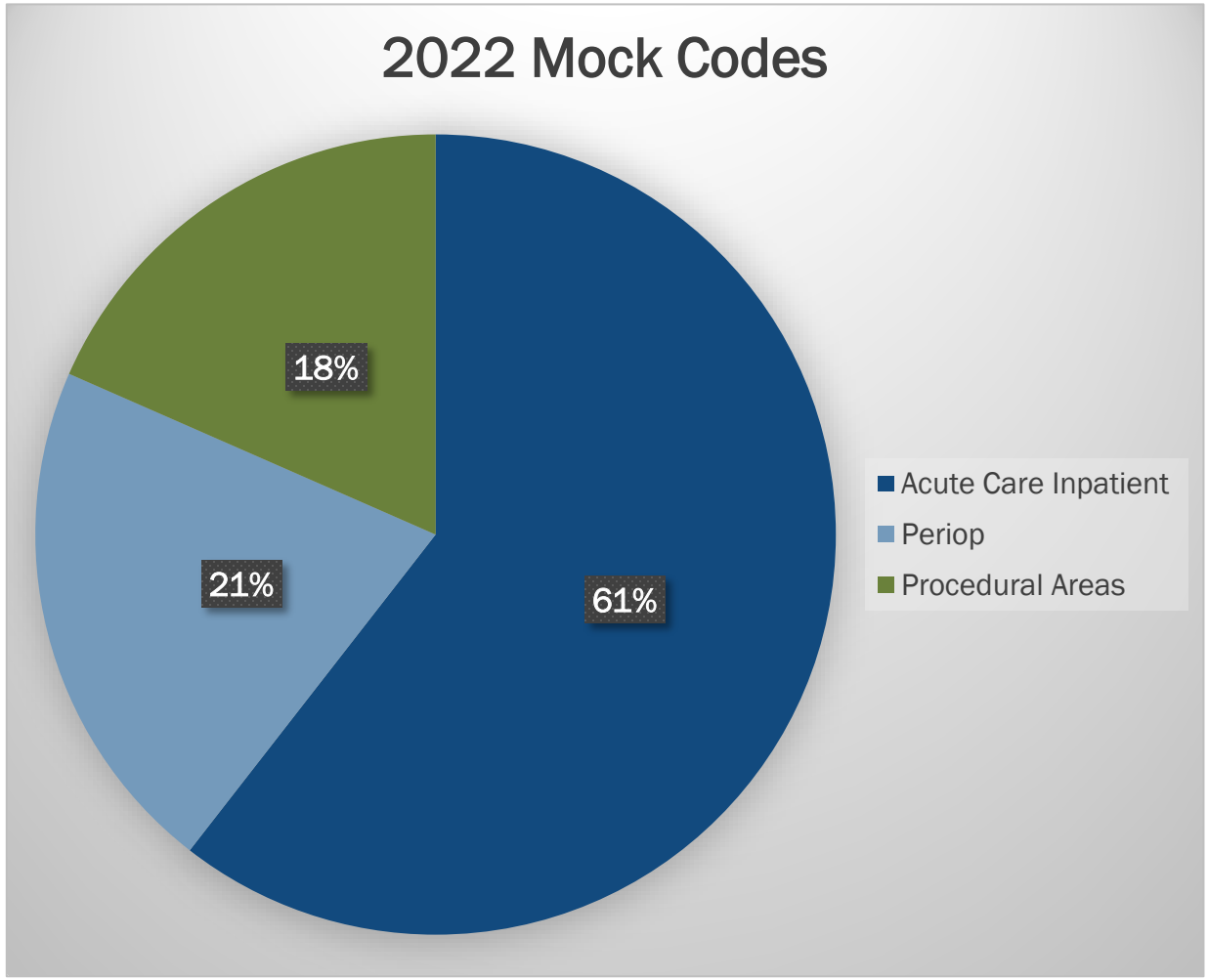
In Situ Training Simulation

- Realistic training environment (patients' rooms, waiting rooms, procedural areas, and showers)
- In Situ Training benefits
  - identify issues with the existing code processes,
  - realistic and interactive training environment

Recommendation

- Vision: Strive to improve patient safety, clinician efficiency, and competency in managing CERT and cardiac arrest events.
- Mission- To improve patient outcomes through resuscitative training. By utilizing in-situ simulation, healthcare team members practice skills, improve knowledge, and build self-confidence in a safe and controlled environment.
- 2023 Mock Code Goal:
  - HMH Professional Development Leaders (PDLs) & Professional Practice Leaders (PPLs) or Designees to conduct 15 mock codes per quarter
  - PPLS or Designees conduct subsequent

Mock Code Outcomes



Annual Mock Code Drills & Overall Performance

2021 vs 2022

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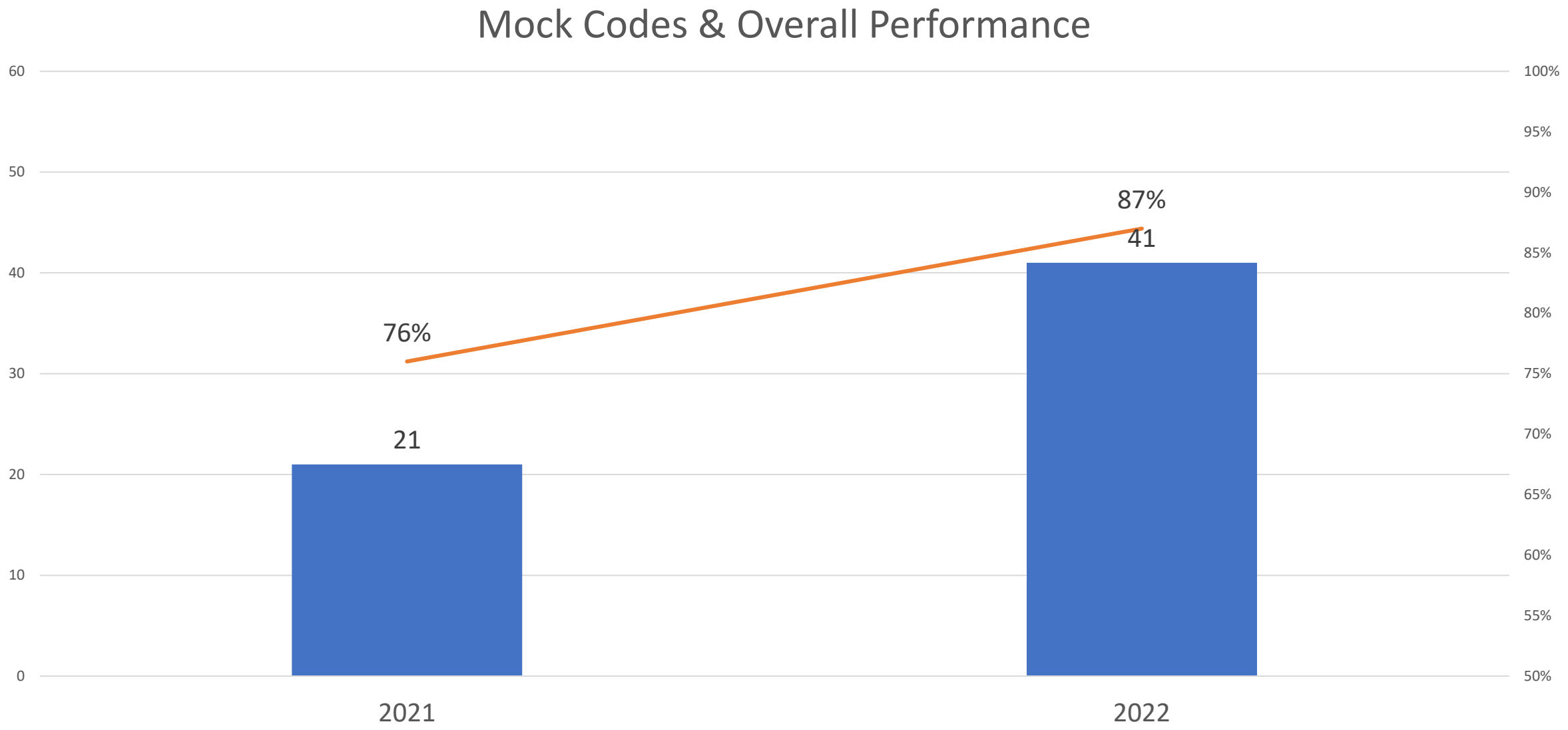
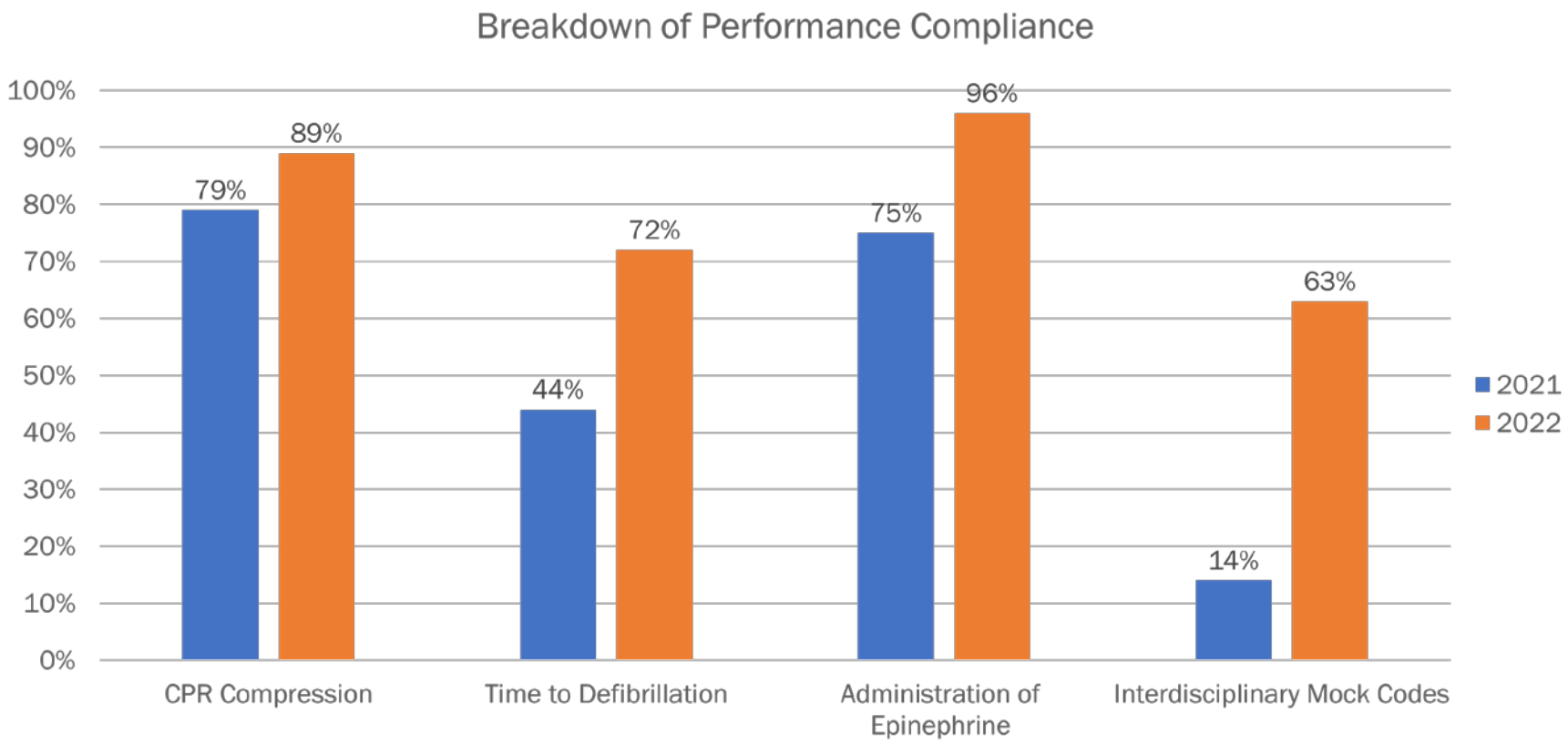
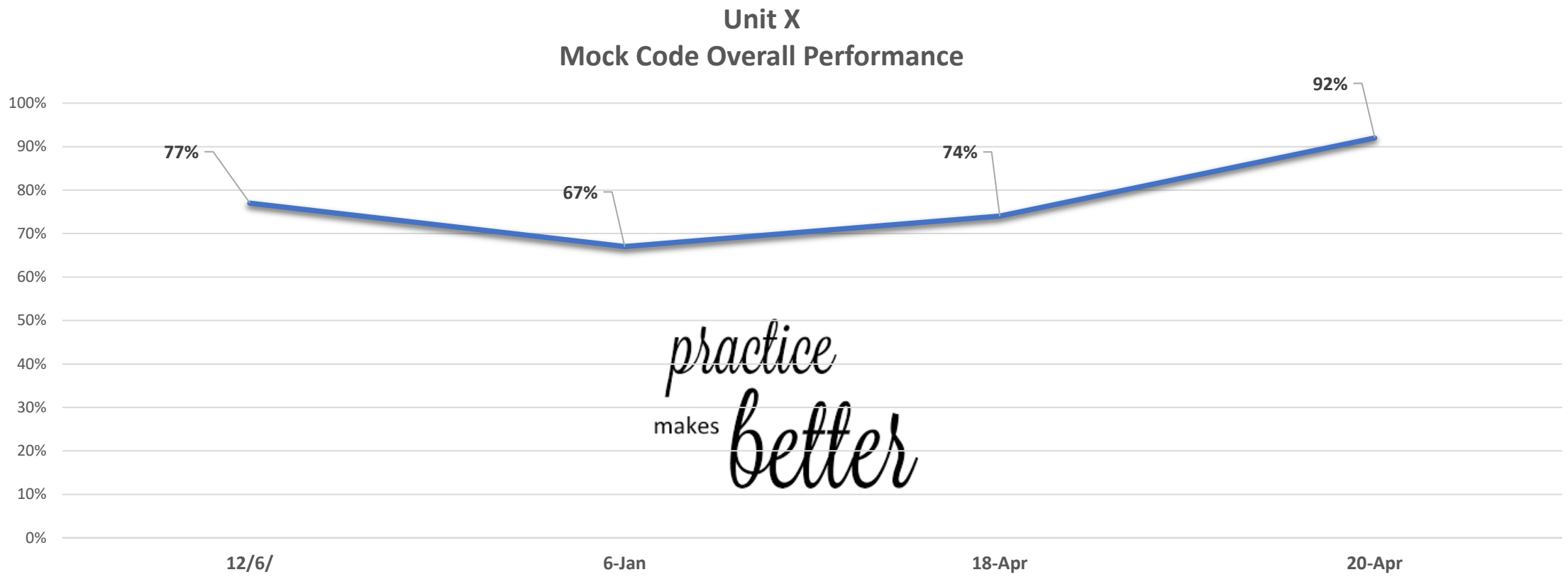


Future-State



- By September 2022, 53% of mock codes had respiratory therapy and APRN participation, and physician involvement increased from 0% to 24%

Highlight -Unit Performance



- CERT-IN-A-BOX

Interprofessional Collaboration

- Code Blue Subcommittee – Reporting
- Interprofessional Education
  - SIM-Based Training
- Residency Boot camps
- APRN Annual Competencies

5 STEPS TO IMPLEMENTING A MOCK CODE PROGRAM

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1. **Recognize the need** for mock Code Blues
2. **Choose a lead** to run your program
3. **Make a plan** that sets mock codes up for success
   - **Utilize Tech and communications**
   - **Virtual evaluators and google sheets**
4. **Collect data** on every mock code
   - Excel spreadsheets for mock Code Blues
5. **Debrief** after each event

Evaluation of Metrics

- **Focus on:**
  - CPR Quality
  - Defibrillation time
  - Ventilation
  - Team dynamics & leadership
  - Communication
  - Documentation

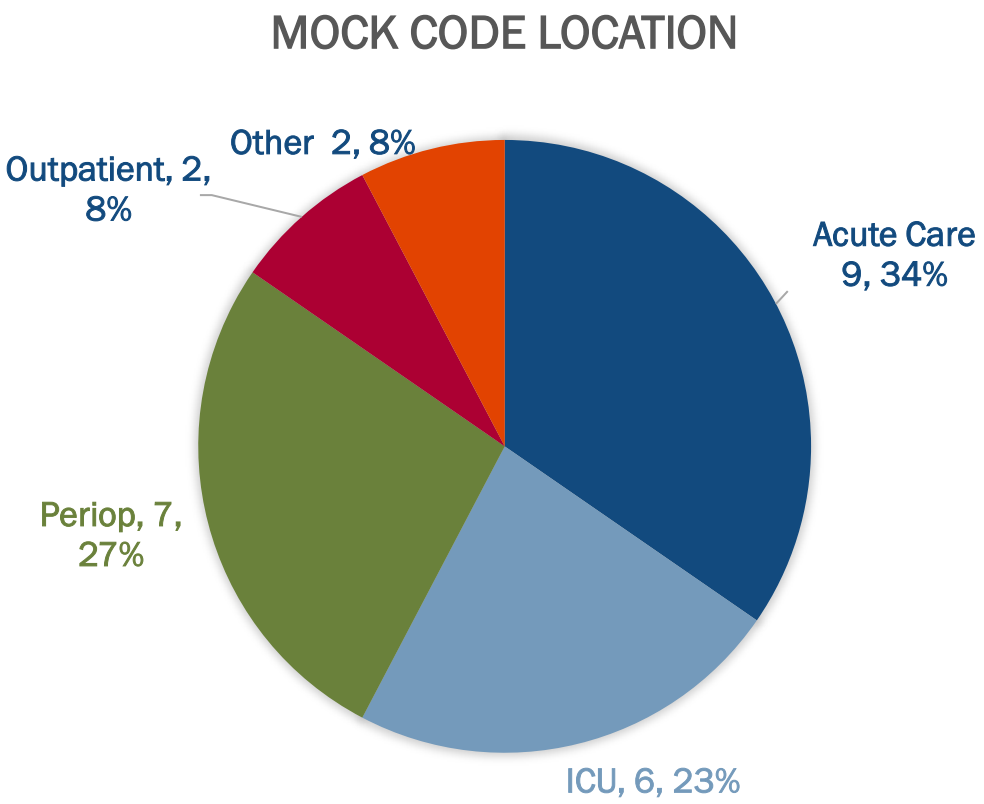
Things to consider

- High fidelity vs. low-to–moderate
  - Equipment
- Buy-in
  - Seeing the vision and value
  - Fidelity

Barriers and facilitators

Mock Code Performance

- 26 house-wide mock codes
- Average 88% compliance rate.



Next Steps

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Mock CERT (RRTs)

Utilize participant questionnaire to evaluate the simulation experience

RQI

25% increase in mock code frequency

Questions?

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