

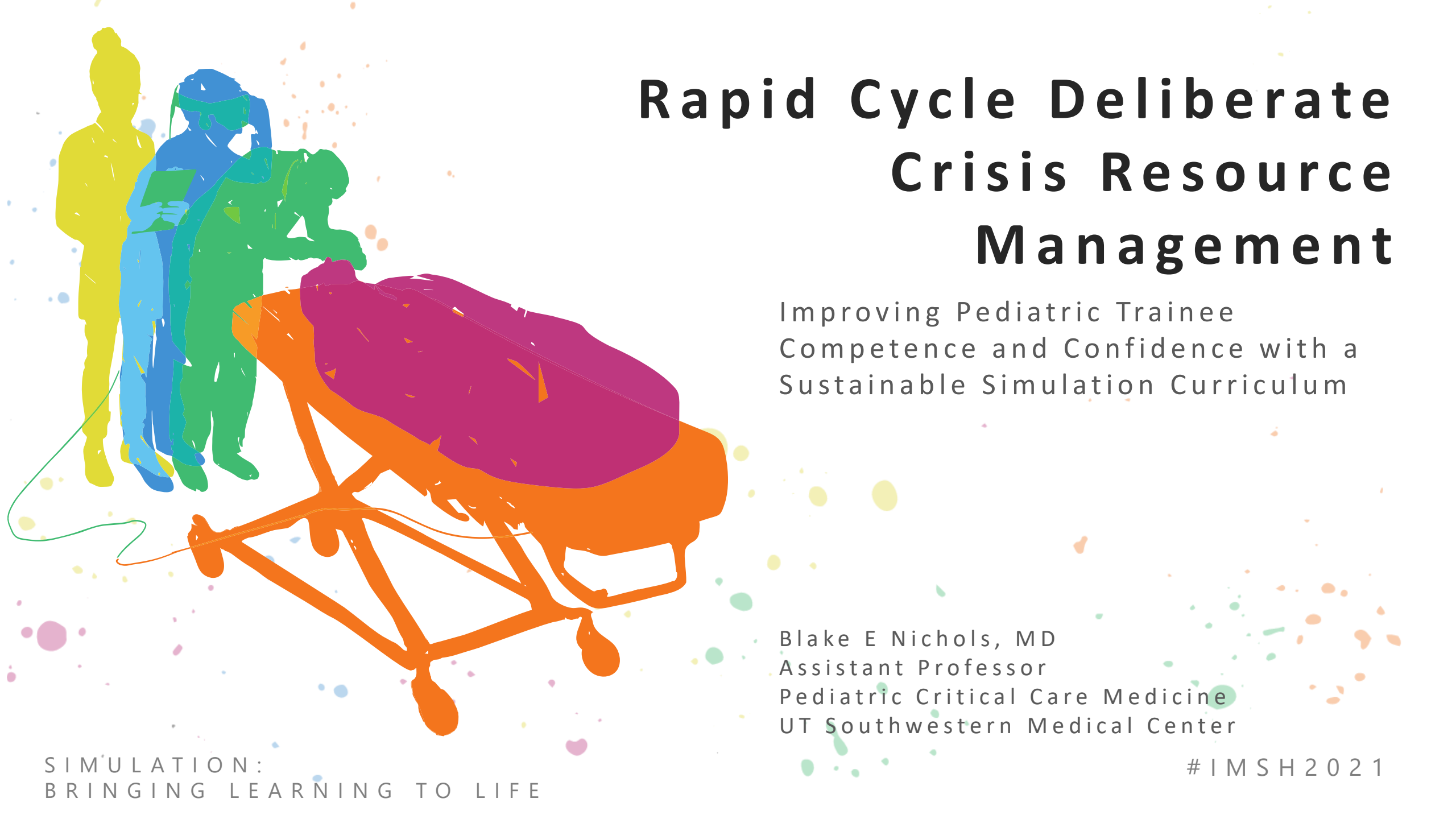
# Rapid Cycle Deliberate Crisis Resource Management

Improving Pediatric Trainee  
Competence and Confidence with a  
Sustainable Simulation Curriculum

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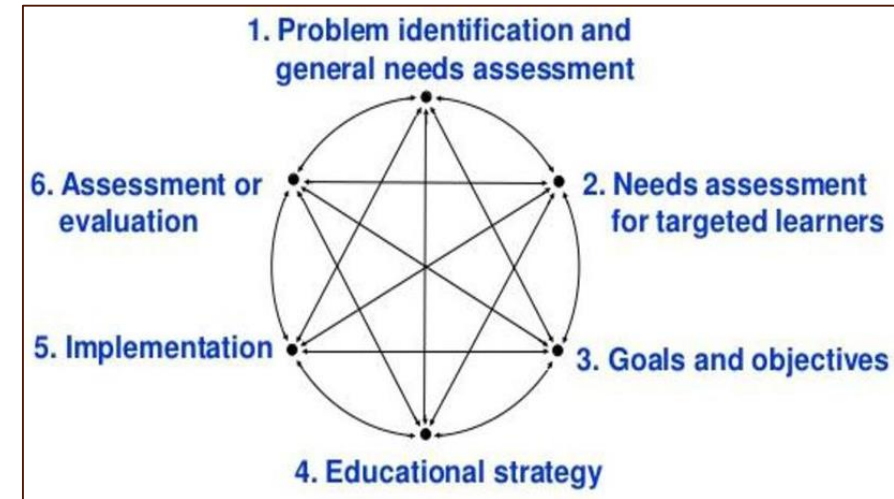
SIMULATION:  
BRINGING LEARNING TO LIFE

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# Curriculum Design

- Using Kern's 6-step approach, we designed a curriculum for UTSW pediatric residency program
- Targeted needs assessment:
  - Residents lack crisis leadership experience and skills
  - Limited time and resources
- Main goal: improve competence and confidence in managing acute crises
- Educational strategy: SBME curriculum using RCDP



# The Simulation

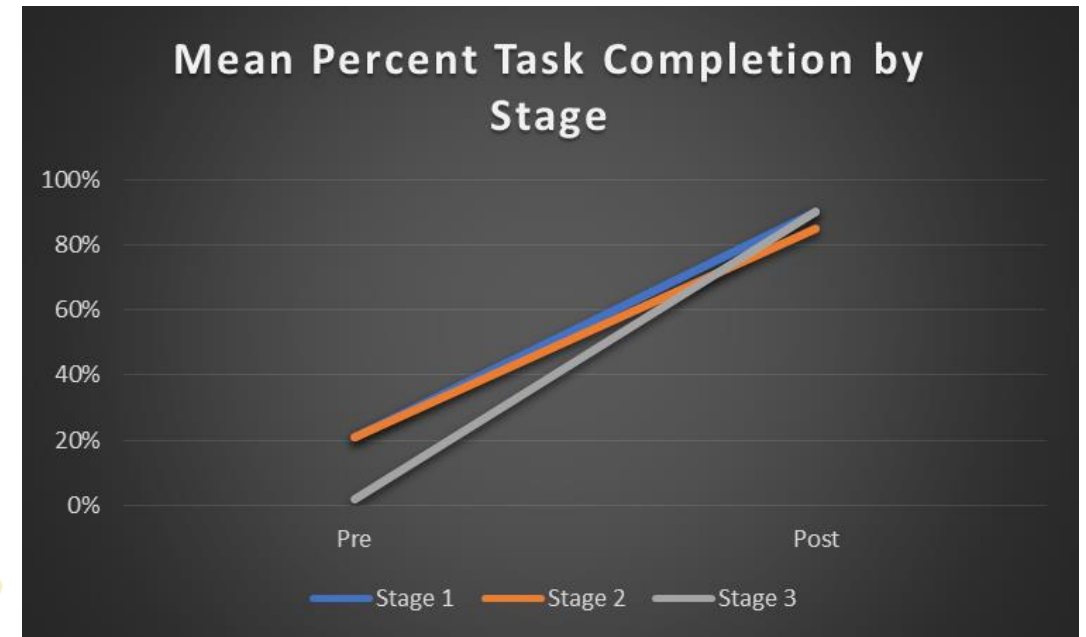
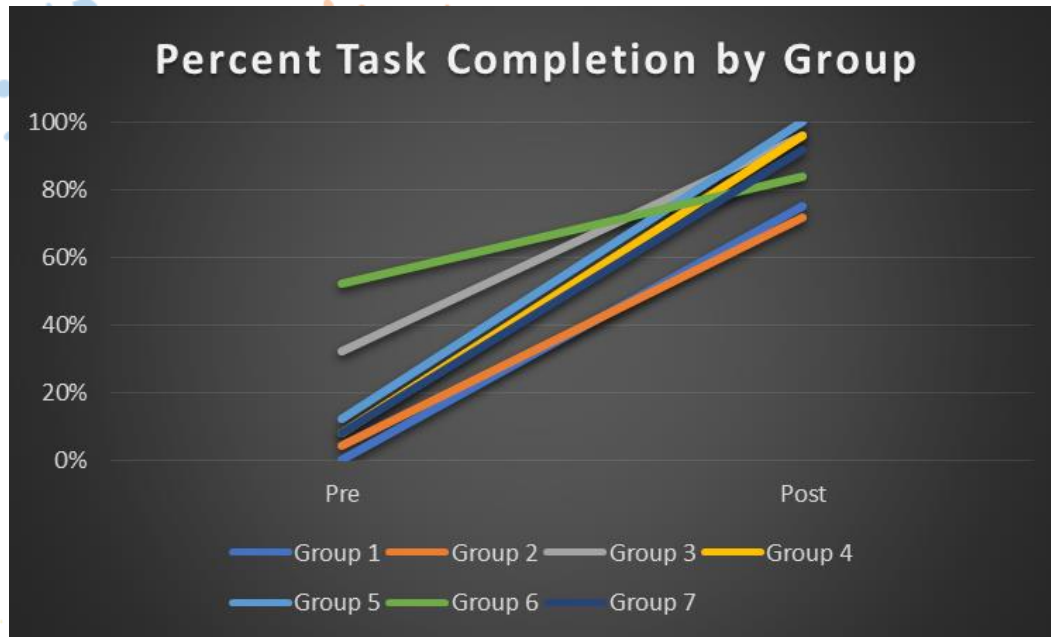
- Crisis on a pediatric ward
- Divided into 3 stages:
  - 1<sup>st</sup>: Unresponsive patient (interns only)
  - 2<sup>nd</sup>: Status epilepticus
  - 3<sup>rd</sup>: Acute respiratory failure
- Focus on calling for help early and appropriate handover
- Run once yearly over 3 hours
  - Goal for 100% of first and third year residents to complete curriculum

# The Debrief

- Previously published task list for this curriculum using stop-points to guide RCDP debriefing\*
  - Collected evidence of content validity
  - 25 stop-points divided between stages
  - Each stop-point fulfills a learning objective
- Maximum of 5 cycles per simulation stage
- Measured resident confidence and competence
- Full run-through of scenario pre- and post-curriculum

\*Nichols. Simul Healthc. 2020.

# Results



- 44 residents (7 groups) completed the curriculum
- Mean percent task completion: 17% pre-curriculum; 88% post-curriculum ( $p < 0.001$ )
- Each stage showed improved task completion
- Universal improvement in resident confidence in responding to, triaging, and leading a crisis scenario



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## THANK YOU!

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