

## IDEA

- Point-of-Care Ultrasound (POCUS) is defined as a goal-directed, bedside ultrasound examination used to answer a specific diagnostic question or to guide the performance of invasive procedures
- The goal of this project is to create a self-directed experience to acquaint learners with POCUS, to develop basic skills, and begin to integrate POCUS into the medical school curriculum using a virtual reality ultrasound simulator

## NEED/RATIONALE

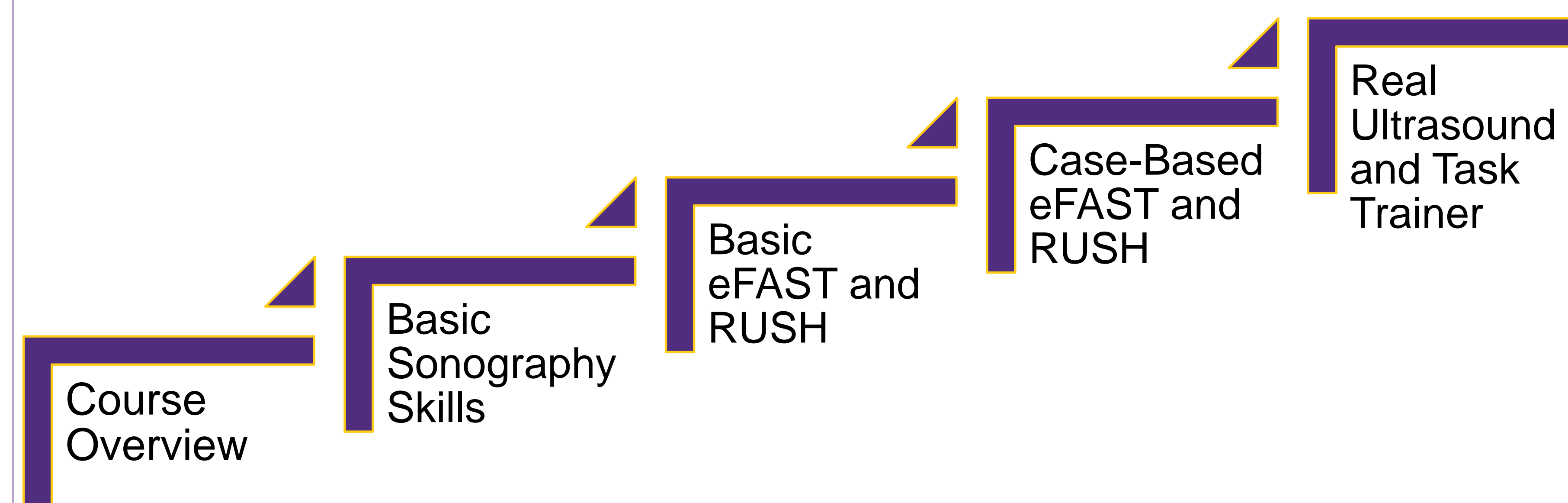
- Due to current demands on faculty time, there is an increased need to develop innovative and independent approaches to assist in educating learners
- To meet the demand for medical student and faculty needs, a self-directed, hands-on, POCUS simulation-based experience was developed

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- Kimberly Fender, M.D.; Dept. of Emergency Medicine
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## METHODS

- Needs assessment: Identify gaps in knowledge, skills, attitudes of the learner
- Establish measurable learning objectives
- Develop a self-directed POCUS curriculum consisting of five sequential educational units
  - Simulation Modality: Surgical Science/Simbionix Ultrasound Mentor Male Simulator Platform
  - Interactive Ultrasound Simulator Training Modules: Sonography Basic Skills, extended Focused Assessment with Sonography for Trauma (eFAST) and Rapid Ultrasound for Shock and Hypotension (RUSH) examination.
  - Online Video-Based Approach: Core Ultrasound.com 5 Minute Sono Videos
  - Include real ultrasound hands-on practice using a task trainer



## EVALUATION PLAN

### Quantitative

- VR ultrasound simulator student performance metrics
- Post-course faculty rating of ultrasound images obtained by learners performing POCUS on Standardized Patients

### Qualitative

- Student-reported quality pre- and post-course surveys

## POTENTIAL IMPACT

The self-directed, simulator-based curriculum has a variety of applications:

- Undergraduate Medical Education
- Graduate Medical Education
- ECU Clinical Faculty Development
- ECU Basic Sciences Faculty Development
- ECU School of Physician Assistant Studies
- ECU Health



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