

A Fresh Look at Simulations for Obstetric Emergency Readiness

Quality in Action

Safety Action Series, Tuesday, July 21, 2026, 1 – 2 pm ET



Advancing ob-gyn care for all.

Before We Get Started



This webinar will be recorded



If you need help during the call, please chat an ACOG staff member



Submit your questions throughout this session using the Q&A box



Any questions following this webinar can be sent to obgynsafety@acog.org

A Partner in Quality and Patient Safety

Quality in Action (QiA) combines ACOG's trusted expertise with real-world services to help hospitals and health systems deliver safer, more equitable care.

- Safety event review
- Plan to support review of patient safety work
- Tailored support for frontline teams
- Designed for measurable impact

Let's improve ob-gyn care—together.

Safety Action Series



A webinar series designed to equip multidisciplinary team members with practical strategies to improve patient safety and quality of care through teamwork and communication excellence, effective debriefing, and leadership engagement.

Upcoming Educational Offerings



Join us!!!

**Implementation of
Perinatal Mental Health
Screening for Parents of
Infants in a Level IV
NICU: A QI Initiative**

**July 28, 2026
1:00-1:45pm ET**

Journal Club (CE)

**Diagnosis and
Management of Ectopic
Pregnancy in the
Emergency Department**

**August 6, 2026
3:00-4:00pm ET**

Summer Webinar Series

**Assessing Pregnancy of
Unknown Location
in the Emergency
Department**

**August 20, 2026
3:00-4:00pm ET**

Continuing Medical Education

We are excited to offer **CME credit** to attendees of this live session

To receive your certificate:

1. **Complete the post-webinar evaluation linked in the follow-up email**
2. **You need to create an ACOG account to complete the survey**

ACCREDITATION INFORMATION

ACCME Accreditation

The American College of Obstetricians and Gynecologists is accredited by the Accreditation Council for Continuing Medical Education (ACCME) to provide continuing medical education for physicians.

AMA PRA Category 1 Credit(s)[™]

The American College of Obstetricians and Gynecologists designates this live activity for a maximum of **1 AMA PRA Category 1 Credits[™]**. Physicians should claim only the credit commensurate with the extent of their participation in the activity.

College Cognate Credit(s)

The American College of Obstetricians and Gynecologists designates this enduring activity for a maximum of **1 Category 1 College Cognate Credits**. The College has a reciprocity agreement with the AMA that allows AMA PRA Category 1 Credits[™] to be equivalent to College Cognate Credits.

Continuing Education Credits

We are excited to offer **continuing education (CE) credit** to attendees of this live session.

To receive your certificate:

- 1. Attend at least 60 minutes of the live activity**
- 2. Complete the post-webinar evaluation linked in the follow-up email**

Certificates will be sent via email in 2 weeks

ACCREDITATION INFORMATION

This activity is approved by the Continuing Education Approval Program of the National Association of Nurse Practitioners in Women's Health for 1 continuing education contact hour, including 0 hours of pharmacology content. **NPWH Activity number 26-18.**

The Continuing Education Approval Program of the National Association of Nurse Practitioners in Women's Health, is accredited as a provider of continuing by the **California State Board of Nursing, Provider Number CEP 13411**

A Fresh Look at Simulations for Obstetric Emergency Readiness

CheyAnne Harris, MSN, RNC-OB, C-ONQS

Erin Higgins, MD, CHSE-A



Advancing ob-gyn care for all.

Today's Speakers



CheyAnne Harris, MSN, RNC-OB, C-ONQS
Christus Health Mt. Pleasant



Erin Higgins, MD, CHSE-A
Cleveland Clinic

Disclosures

- Erin Higgins, MD, CHSE-A is a paid consultant for Laborie Medical Technologies
 - We will not be discussing unlabeled or investigational uses of medical devices or pharmaceuticals during this presentation
- CheyAnne Harris, MSN, RNC-OB, C-ONQS has nothing to disclose

A Note on Inclusive Language

- ACOG recognizes and supports the gender diversity of all patients who seek obstetric and gynecologic care
- Not all birthing people identify as women
 - We may use the words maternal, woman, women interchangeably, along with gender-neutral terms
- We have an interprofessional audience
 - Most of our presentation will focus on our personal experiences
 - Themes are broadly applicable to physicians, nurses, certified nurse-midwives, and advanced practice providers

Objectives

By the end of this webinar, participants will be able to:

- **Explain** how communication, teamwork, and shared understanding influence readiness and response during obstetric emergencies.
- **Identify** practical readiness strategies, such as simulation, drills, and tabletop exercises, to prepare teams and improve coordination across care settings.
- **Describe** how resource readiness and structured reflection (briefs, debriefs, huddles) support learning and continuous improvement over time.

Let's Learn About You!



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Poll Q1

What's your role?

1. Ob/gyn and/or Maternal-Fetal Medicine Physician
2. Family Medicine Physician
3. Midwife (CM/CPM/CNM)
4. Advanced Practice Obstetric Practitioner (WHNP, PA)
5. Labor and/or Postpartum Nurse
6. Nurse Leader
7. Nurse Educator
8. Other

Simulation-Based Education



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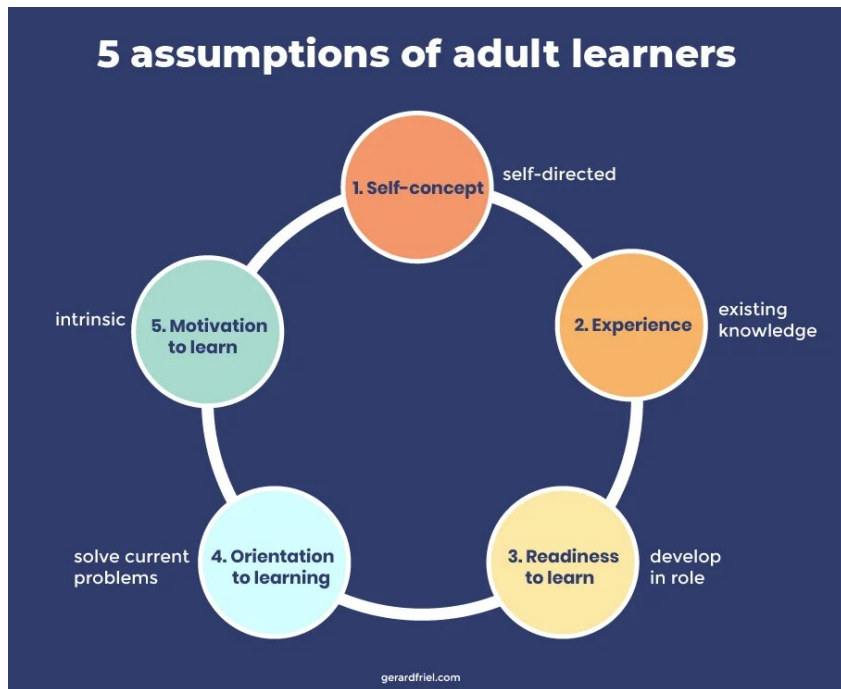
Simulation in Medical Education

- Used for centuries as a teaching methodology
- Several different uses within medicine:
 - Education (e.g. technical skills)
 - Assessment
 - Research
 - Quality/safety initiatives
 - Teamwork and communication



Sources: Mauritshuis, Amusing Planet, University of Virginia

Adult Learning Theory

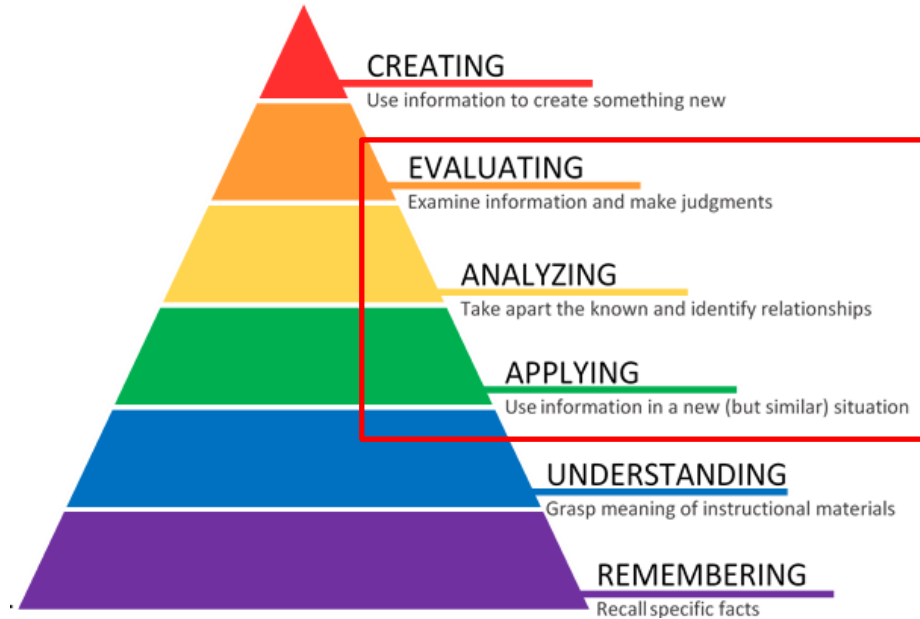


Source: Gerard Friel

- Andragogy was pioneered by Malcolm Knowles in 1970s
- Adults learn by a **different process** than children
- Desire to be involved in planning
- Want activities to have immediate relevance/impact
- **Learning is problem-centered**

Bloom's Taxonomy

- Classifies learning stages according to 6 levels of increasing cognitive complexity
- Useful in writing learning objectives
- Simulation is used in higher levels: apply, analyze, evaluate



Source: University of Florida CITT

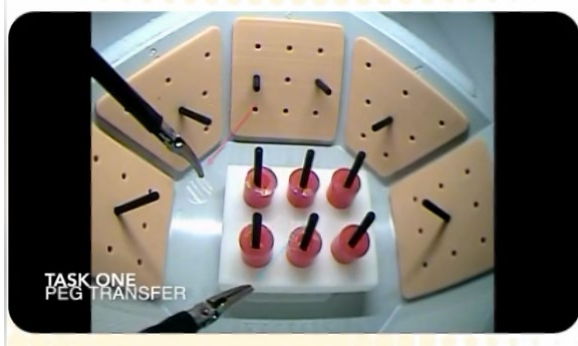
A Transition in Thinking

Learn, see, do



Learn, see, **practice**, **prove**, do, **maintain**

Simulation Modalities



- Task/box trainers
- Virtual/augmented reality trainers
- Screen-based simulations
- Robotic simulators
- Manikin trainers
- Cadaver/animal lab
- Standardized patients
- *In situ* training

Interdisciplinary vs. Interprofessional

- Interdisciplinary
 - Bringing together caregivers from different medical disciplines (e.g. Ob/Gyn and general surgery)
- Interprofessional
 - Bringing together caregivers from different medical professions (e.g. physicians and nurses)
 - May hear reference to Sim-IPE

Benefits of Simulation

- Create a safe environment for learning and making mistakes
- Allow deliberate practice of technical skills
 - Just-in-time training prior to clinical care
- Increase familiarity with high acuity, low frequency (HALO) events
- Improve patient safety and quality
- Test new systems and protocols
 - Opening a new unit/hospital
 - Up-scaling for pandemics and other crises

Benefits of Simulation

- Promote communication and teamwork training
- Support interprofessional education (IPE)
- Provide opportunity for experience and reflection
 - Importance of debriefing
- Role in licensure, certification, and credentialing

Considerations and Limitations

- Realism and learner buy-in
- Financial considerations
- Lack of standardization and validated assessment tools
- Psychological safety of learners
- *In situ* risks
- Upkeep and storage of supplies
- Availability of trained simulation faculty
- Protected time for faculty and learners

(In)equity in Simulation

- High costs for some simulators and software
 - Additional upkeep and subscription costs
- Access to supplies, dedicated spaces
- Availability of trained faculty and staff
- However! Lots of DIY and low-cost resources available



Uterine artery ligation model



PPH model

Simulation in OB/GYN



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Poll Q2

How often does your facility typically conduct obstetric emergency-related simulations and drills?

1. Never
2. 1 – 2 times per year
3. 3 – 5 times per year
4. 6 or more times per year

Poll Q3

How often are individuals required to participate in obstetric emergency-related simulations?

1. Never
2. 1 – 3 times per year
3. 4 or more times per year
4. 1 – 2 times every 2 years
5. Other

Simulation in OB/GYN

- Well integrated into UME and GME
 - OSCEs
 - Transition to residency programs
 - Intern bootcamp
 - Resident and fellow didactics
- Decreased clinical exposure to certain procedures has been noted
 - 80-hour work week
- Increase in minimally-invasive approaches
- Increasing role for simulation to provide training opportunities in these skills and others

15→20
TAH



Simulation in OB/GYN

- Professional development
- Interprofessional team training (e.g. MOST)
 - Teamwork and communication
 - Hospital credentialing
- Patient safety and quality initiatives
- Procedural credentialing (APPs)
- Onboarding of new providers
- New devices/technologies (eg, intrauterine vacuum-induced hemorrhage control devices)

Maternity Care Deserts

- Over 35% of US counties are considered a maternity care desert
- Simulation can be utilized to keep providers up-to-date on OB emergency management
 - HALO exposure
- Can also train pre-hospital non-OB providers (e.g. EMS, EM, general surgery)



Evidence for Obstetric Simulation

- Simulation is particularly useful in training for HALO events
- Draycott et. al. (2008) studied management of shoulder dystocia and resulting neonatal injury
 - 39,000 births over 9 years
 - Significant reduction in neonatal injury after simulation-based training (9.3% to 2.3%, RR 0.25)
- Gossett et. al. (2016) implemented resident training in FAVD to reduce OASIS
 - 26% reduction in 3rd and 4th degree lacerations

Evidence for Obstetric Simulation

- Multiple studies have shown that simulation improves resident performance in the management of a vaginal breech delivery
- Has also been shown to decrease:
 - Decision to incision time for C/S
 - Blood loss and need for transfusion in PPH
 - Early neonatal and 28-day mortality

Creating Simulation-Based Education



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Poll Q4

Are the obstetric simulations multidisciplinary?

1. Yes – ob-gyn, midwives (if you have them), anesthesiology, and nursing staff
2. Yes – ob-gyn physicians (and midwives if you have them) and nurses but not anesthesiology
3. Yes – but neither of the options above
4. No

Initial Planning

- Conduct a needs assessment to identify topic
 - Common scenarios (PPH, HTN)
 - HALO events (maternal cardiac arrest)
 - Communication (end-of-life care, medical error)
- Develop learning objectives
- Select simulation modality (e.g. task trainer, VR)
- Hold a planning meeting
 - Key stakeholders
 - Simulation educators
 - Content experts

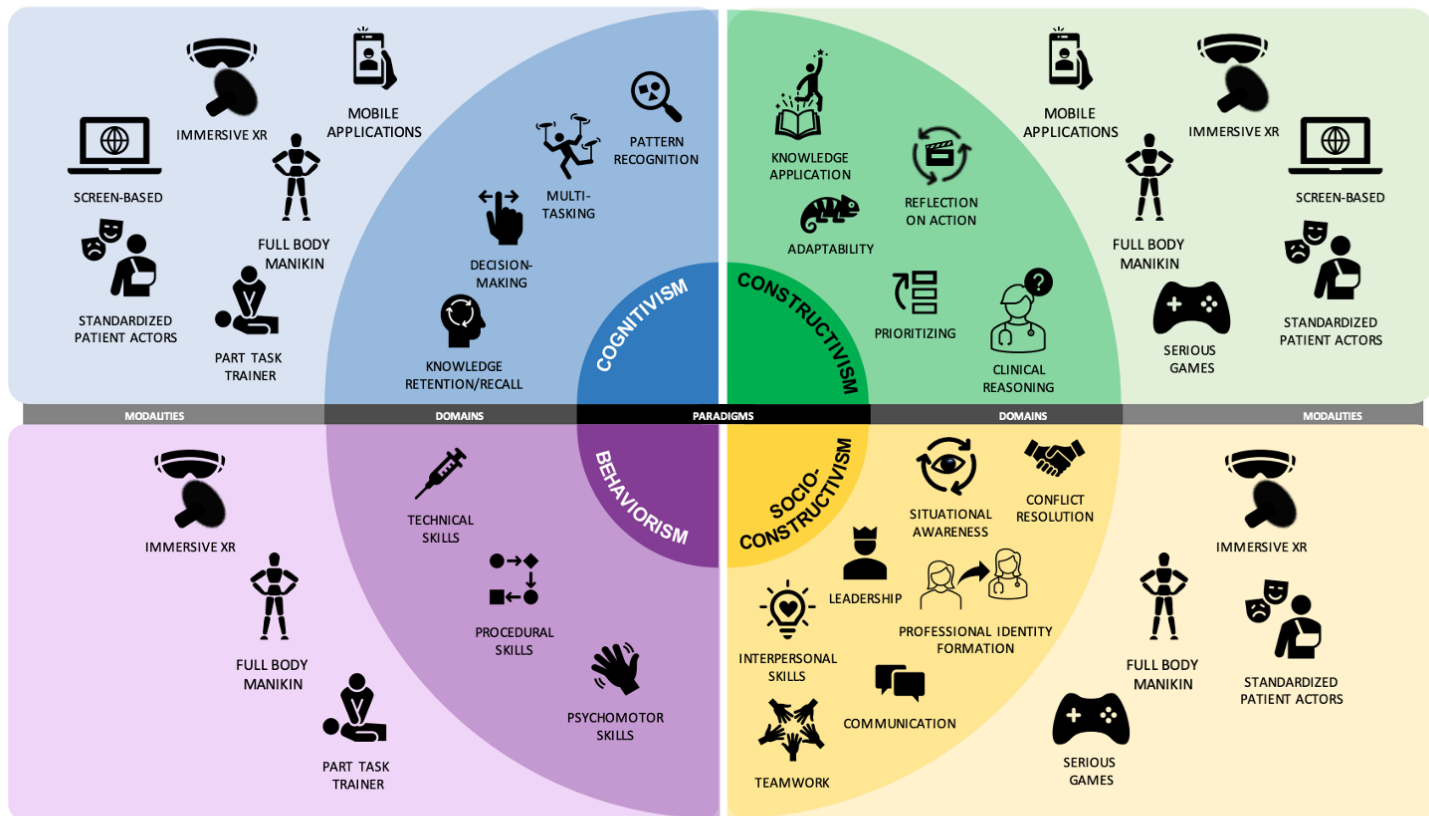
Goals and Objectives

- This is where you start!
 - Determines many elements
- Identify your WHY
 - Recent adverse event
 - New protocol or equipment
 - Teaching new residents
- Guides choice of modality
- Helps focus your scenario and debriefing
 - Acts as a checklist for facilitators
- Can emphasize communication, technical skills, or both



TECHNOLOGY INTEGRATION THROUGH MODALITY MAPPING INITIATIVE (TIMMI)

Developed by the Technology Committee of the Society for Simulation in Healthcare



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Assembling the Team

- Content expert(s)
 - Typically a staff physician
 - Review scenario for medical accuracy
 - Lead debrief (content)
- Simulation expert
 - Have formal simulation training
 - Review scenario for feasibility, fidelity, psychological safety
 - Can help facilitate debrief (structure)
- Nursing educator(s)
- Simulation support staff

Planning and Implementation



Photo credit: Erin Higgins, MD

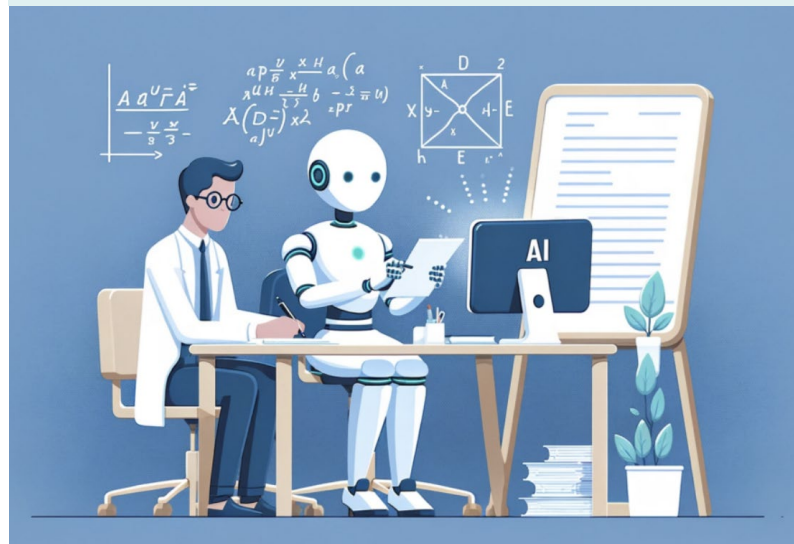
- Develop curriculum
- Conduct a dry run
- Implement training
- Evaluate impact and effectiveness
 - Clinical metrics
 - Learner feedback

Artificial Intelligence in Simulations

- Generative artificial intelligence (AI) can help augment simulation tools and content
- Check your facility's policy on using AI
- AI content may not be accurate, relevant, or up to date
- Thorough reviews are necessary before using AI information



Proceed with caution!



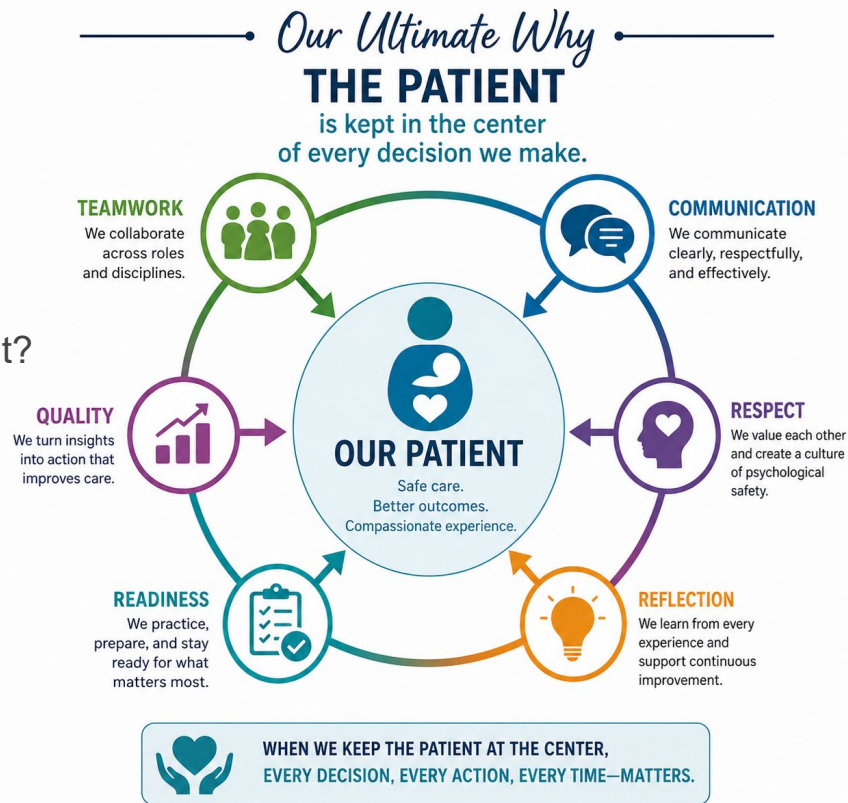
Readiness



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Why?

- To meet a designation requirement? Maybe...
- To identify high-performers? Perhaps...
- To checkmark an HR/Education Dept requirement? Sure...
- To ensure the team feels prepared? Well yes...
- **To make our patients safer? ABSOLUTELY!**



Source: AI Generated

Readiness Requires Strategy

Simulation Goal

- Address roles and responsibilities
- Increase situational awareness
- Enhance communication

Simulation Strategy

- Adult learners learn uniquely.
- Repetition impacts - 8x theory
- “Readiness is a muscle, multiple reps over time.”
- Building successful readiness is with a toolbox, not a single tool.



Same Scenario, Different Experiences

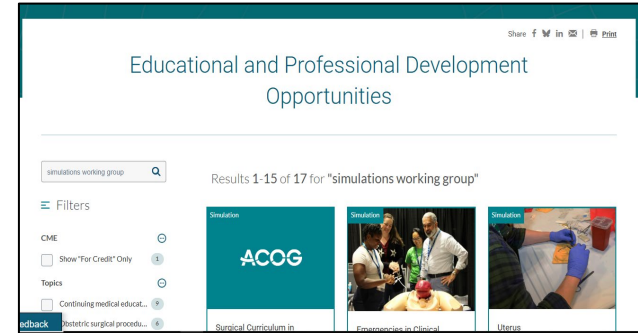
Ex: Postpartum Hemorrhage

Method	
Traditional Simulation	Style: Kinesthetic Benefits: teamwork; all-inclusive; can be anytime Challenges: Attendance/scheduling, learners feel a public platform for mistakes, key learning points can be lost in the “chaos”
Tabletop Simulation	Style: Interpersonal Benefits: Allows for virtual participation and easier scheduling, Conversation feels safer, “pause and go” flow to hone into key points Challenges: Not learning location/space/resources, easier for learners to not engage
Scavenger Hunt	Style: Visual/Spatial, Intrapersonal, Interpersonal (if group-lead) Benefits: Allows for resource location, stimulates thinking if list gives scenarios versus item names, can be personal or group learning, knowledge/concept enrichment Challenges: Fragmented versus care sequence
Case Review Presentation (Q&A)	Style: Auditory Benefits: Realistic/can tie “heartstrings,” safe space to learn with little risk of mistake, offers reflection opportunity Challenges: Not learning location/space/resources, easier for learners to not engage, careful to present sensitive subjects or information
Gamification	Style: Kinesthetic; can be developed to touch all learner types Benefits: teamwork; may be all-inclusive, morale, opportunity to “win” Challenges: Heavier prep work for facilitator, structured to schedule, may lose the key points to the fun of the game

Sim Facilitator's Readiness Toolbox

Here's What We Do... How do I do it?

- Scenarios
- Simulation Type
- Resources & Scenario Cues - “all walks of simulation”
- Key Learning Points/Checkpoints/“Just in Time Education”
- Debrief Tool
- An early adopter attitude



[ACOG Simulation Resources](#)



[AIM National Simulation Resources](#)

Engagement & Communication



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Poll Q5

What are the biggest barriers to effective simulations for your organization?

1. Leadership commitment and support
2. Medical staff attendance
3. Nursing staff attendance
4. Staff to facilitate, observe, and debrief simulations
5. Associated costs
6. Simulation materials and scenarios
7. Other

Engagement

OB Staff

Barriers:

- Education Fatigue
- Schedules

Strategies:

- Offer multiple times/dates/methods
- Snacks/Incentives
- Share outcomes
- Use real cases

OB Providers

Barriers:

- Time
- Skepticism
- Competing Priorities

Strategies:

- Use real cases
- Focus on practical challenges
- Use provider champions
- Involve them early

Other Service Lines

Barriers:

- Unfamiliarity/Nervousness
- Location/Logistics
- Risk/Litigation Awareness

Strategies:

- Set the learning scene
- Go to them
- Get to know them: find their flow and needs



Closed Loop Communication

Share Situational Awareness

- **Provider**
 - "Start magnesium sulfate 4 gm load, then run at 2gm/hr."
- **Nurse**
 - "Starting magnesium sulfate 4gm load now."
 - "Magnesium sulfate 4gm load infusing."
 - "Magnesium 4gm load is complete, and infusing at 2gm/hr"

Stop the Line

- **Provider**
 - "Give the patient 200mg ketorolac IV"
- **Nurse**
 - "I want to clarify that you want the patient to have 200mg of ketorolac IV"

When Communication *Feels* Disrespectful

What We See:

- Tone
- Pushback
- Conflict
- Interruptions



What May Be:

- Fatigue
- Stress
- Hierarchy
- Fear
- Personality Conflict
- Competing Priorities
- Lack of Knowledge

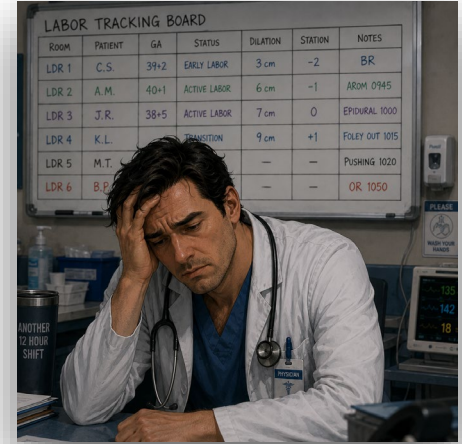


Image Sources: AI Generated

What To Do: Readjust/Redirect

- “Let’s recenter to the patient’s safety”
- “With the patient’s safety in mind, let’s consider...”

Reflect on Readiness

Debriefing on All Angles



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Debrief to Generate Growth

“The simulation is the pregnancy, the debrief is the labor of intervention.”

Learning Zone of Psychological Safety

Ineffective Debrief:

- Blame
- Defensiveness
- Silence

Effective Debrief:

- Curiosity
 - “I’m curious about”
- Reflection
- Learning

Objectivity - Video Playback



Source: AI Generated

From Debrief to QI

This is where simulation becomes organizational improvement.

- Identification of change
- Small test of change
- Measure effectiveness
- Test again!



Source: AI Generated

From Debrief to QI then Back to the Bedside

What Bedside Staff Need to Hear

- We found a gap.
- We fixed it.
- *Because of your participation.*



builds
confidence.



builds
trust.



builds
appreciation.

Simulation Resources

- Society for Simulation in Healthcare (SSH)
- International Nursing Association of Clinical Simulation and Learning (INACSL)
- National organizations (ACOG, ACNM, AWHONN)
- Annual meetings of ACOG, SOGH, SMFM, APGO/CREOG, AWHONN
- ACOG [Emergencies in Clinical Obstetrics \(ECO\)](#) course
- SMFM [Critical Care in Obstetrics](#) course
- Comprehensive Healthcare Simulation: Obstetrics and Gynecology (Springer, 2019)



Future of Simulation

- Likely to see increasing role for simulation in the coming years
 - CME courses
 - Certifying exam and maintenance of certification (ABOG MOC part IV)
 - Certification and credentialing
 - Remediation
 - Re-entry into practice
 - ACGME requirements?

Practice Improvement Activities

COMPLETE ONLY ONE ACTIVITY FROM ONE OF THE AVAILABLE OPTIONS.

My Activities (1) ↕

Modules

Select a module to assess, identify and implement improvements in your clinical practice. Complete follow-up of patient chart reviews.

Quality Improvement/Simulation

Select an approved activity and upload documentation of completion.

Posters, Presentations, and Publications

Submit documentation of your published articles, peer-reviewed presentations at national scientific meetings that describe the implementation and outcomes of a QI project.

Clinically Inactive

Complete the Practice Improvement exemption application if you are not treating patients in any capacity (e.g., retired, administrator, researcher, on sabbatical, etc.).

Reciprocity

Apply for reciprocal credit of CC Part IV Practice Improvement already received by another ABMS member board.

Portfolio Program

Apply to sponsor a Quality Improvement or Simulation activity that you are leading or teaching.

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Questions?

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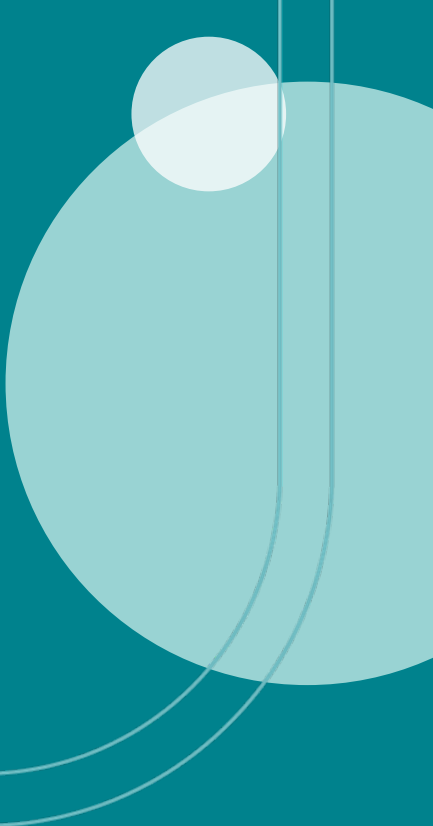
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For more information about Quality in Action
please contact us at obgynsafety@acog.org