ART Program

Anesthesiology Residents as Teachers

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Disclosures

(Does anyone know an organization that is actually willing to fund educational studies?)

- The contents of the ART Program are due to be published in the Journal of Graduate Medical Education's (JGME) December volume, 2012

- Department funding for time of leadership team and materials

- University funding for Standardized Students and Patients via Clinical Learning & Simulation Skills (CLASS) Center

+ Introduction

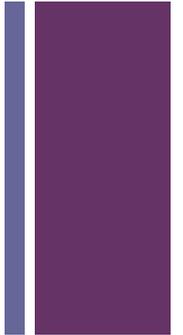Training model

Participants

Requirements

Outline
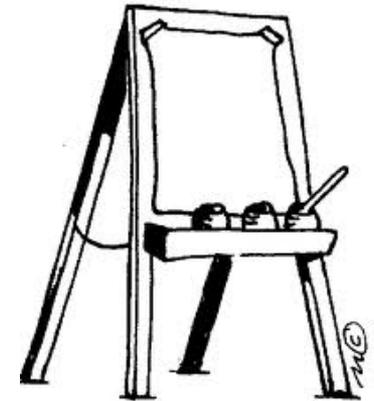
Sessions

Theory

Details

Supplemental Materials

Training Model

- Goal: dispersion of Residents-as-Teachers curriculum throughout institution

- Train-the-trainers
  - Senior educators
  - Junior educators (Anesthesiology Faculty)
  - Anesthesiology faculty receive 1 hour training
  - Anesthesiology faculty create specialty specific cases
  - Timeline
    - Year 1: Senior Educators lead, Juniors observe
    - Year 2: Junior lead, Seniors observe
    - Year 3: Juniors alone with Senior visits

Participants
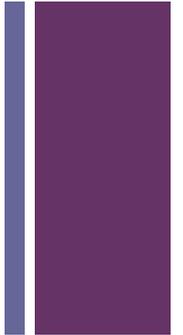
- Demographics
  - 8 residents
  - PGY2 residents (CA-1 class)
  - 2nd or 3rd month of anesthesiology training

- Rationale
  - Availability
  - Open to learning
  - Medical student supervision expectations
    - 2 week anesthesiology requirement for 180 students
    - 4 week anesthesiology AI for roughly 25

Requirements

- Administration
  - Schedule lecture time
  - Reserve rooms
  - Create session packets
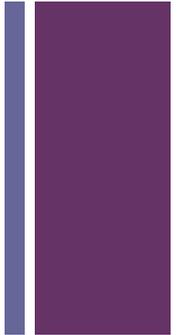 - Schedule standardized students and patients

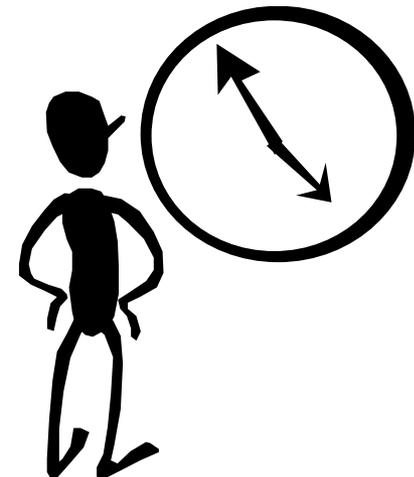# + Requirements

- **Facilities**
  - Conference room
  - Simulator lab for "teaching a skill"
  - Standardized patient exam rooms for residents
  - Optional: video capabilities for review

+ Requirements

- Time
  - Introduction 1 hr
  - Each workshop (6) lasts 1 hour
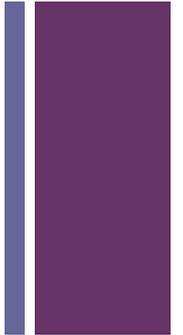 - Wrap-up 1 hr
  - Total time: 8 hours

+ Outline

- Introduction

- 6 Workshops
  - Orienting a new learner
  - Giving feedback
  - Teaching around a case
  - Teaching at the bedside
  - Teaching a skill
  - Giving a mini-lecture

- Wrap-up

+ Sessions

- Generally 2 workshops per session
  - 2 hours total per session,
  - 4 sessions for residents-as-teachers program
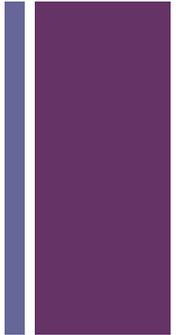
- Session format
  - Introduction
    - Discussion: adult learning principles
    - Pre-test: self evaluation

Theory

- Adult learning
  - Knowles Principles (The Adult Learner, 1998)

1	Need to Know	Feels the need to address own knowledge deficits
2	Self-Concept	Feels responsible for own decisions (self directed)
3	Past Experience	Has experiences, biases, and sense of self

+ Theory

4	Readiness to Learn	Needs to time learning with task or development
5	Orientation to Learning	Learns more effectively in real life context
6	Motivation	Feels internal pressure more than external

+ Sessions
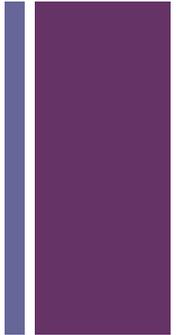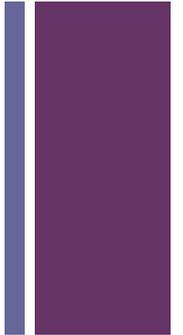
- **Workshops**
  - Review previous workshop
  - Interactive, large group discussion
  - Presentation of 3-P's checklist:
    - Prepare
    - Perform
    - Practice
  - Role play +/- standardized students
  - Large group wrap-up
  - Supplemental materials distributed

+ Sessions

- Wrap-up:
  - Summary discussion: skills application
  - Post-test: self-evaluation
  - Workshop evaluation

+ Supplemental Materials

- 3-P model cards

- Teaching theory articles

- Evaluation
  - Program
  - Self

- Video demonstration

- Role play cases

+ Details: 3P Model

	Workshop	Adult Learning Principle
Prepare	Make goals of exercise clear	Establish clear goals & objectives
	Explore relevance to learner needs & past experience	Teach to learner's needs and encourage integration of past experiences
Perform	Present overview of skill	Calibrate teaching to learner's needs
	Break skill into smallest part	
	Change tactics to fit learning style	

+ Details: 3P Model

	Workshop	Adult Learning Principle
Process	Ask for self assessment	Adjust feedback to learner's needs
	Offer feedback positive/corrective	
	Summarize teaching points	
	Ask learner to summarize take home points	Encourage application of learning to real life
	Provide resources for further learning	Encourage independent learning

+ Details: 3P Model

	Workshop	Adult Learning Principle
Overall	Treat learner with respect	Create safe environment to take risks
	Encourage participation	Elicit participation of learner

Sample Video: Orienting a Learner
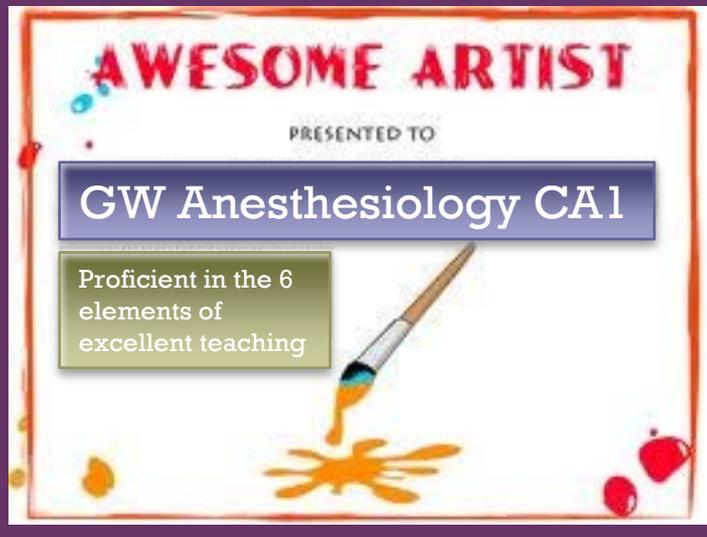
"ER"

Carter, Medical Student

Benton, Chief Resident

Results

2009-2011

AWESOME ARTIST

PRESENTED TO

GW Anesthesiology CA1

Proficient in the 6 elements of excellent teaching

- Self reported improvement in 13 of 14 teaching domains ($P < 0.05$)

- Workshops were rated highly

- Medical student evaluation of residents averaged 4.9/5.0 (previously 4.7)

- 30% increase in medical students choosing anesthesiology at GW

- Increase in residents choosing academic careers (faculty at teaching institution & fellowship) vs. private practice