2\textsuperscript{nd} Annual Education Summit
Concurrent Workshop C—1:15 - 2:30 PM
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EFFECTIVE EVALUATION AND FEEDBACK

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Take a minute to think about and jot down something about a recent challenge or struggle you had with evaluation or feedback.
GOALS FOR PARTICIPANTS

• Reflect on your performance as a teacher
• Define key educational concepts in clinical teaching
• Recognize the importance of evaluation and feedback in teaching and in medicine
  • Recall key principles for effective evaluation and feedback
  • Identify and practice behaviors that are proven to enhance a teacher’s ability and versatility
• Provide a forum for collegial exchange
ROAD MAP

- Introduction (10 mins.)
- Evaluation (25 mins.)
- BREAK (5 mins.)
- Feedback (25 mins.)
- Group Discussion and Wrap Up (10 mins.)
Stanford Faculty Development Center
Educational framework for the analysis and improvement of clinical teaching

- Composed of 7 categories based on:
  - Educational and psychological theories of learning, AND
  - Empirical observation of clinical teaching

Teaching interactions involve specific behaviors that can be observed, modified and adapted to improve teaching.

EDUCATIONAL FRAMEWORK

- LEARNING CLIMATE
- CONTROL OF SESSION
- COMMUNICATION OF GOALS
- PROMOTION OF UNDERSTANDING & RETENTION
- EVALUATION
- FEEDBACK
- PROMOTION OF SELF-DIRECTED LEARNING
Critical Aspects of Teaching and Learning

CONTEXT

TEACHER

CONTENT

LEANER
ROAD MAP

- Introduction (10 mins.)
- Evaluation (25 mins.)
- BREAK (5 mins.)
- Feedback (25 mins.)
- Group Discussion and Wrap Up (10 mins.)
EVALUATION
• Stanford University
• Actual teaching encounters
• Scripted and played by others
EVALUATION
MODEL TAPE
**Definition:** the process by which the teacher assesses the learner’s knowledge, skills and attitudes, based on criteria related to educational goals

**Educational Purpose:** Where is the learner?

**Types of Evaluation**
- Summative
- Formative
EVALUATION: KEY COMPONENTS

1. Observation of Learners
2. Ask Questions
   - Question Type (open or closed)
   - Wait Time
   - Question Level
3. Fostering Self-Assessment
THE STARLING CURVE IN EDUCATION

Learning

Stress

OPTIMAL

COMA

INCONTINENCE
THE STARLING CURVE OF WAIT TIME

OPTIMAL

Likelihood of answer vs. Wait Time
1. Observation of Learners
2. Ask Questions
   - Question Type (open or closed)
   - Wait Time
   - Question Level
3. Fostering Self-Assessment
Recall:
- require learner to recall fundamental medical or patient information, skills or attitudes

Analysis/Synthesis:
- require learner to demonstrate understanding

Application:
- apply recall or analysis/synthesis to a specific patient or situation
SAMPLE VERBS

- **Knowledge:**
  - **Recall:** define, list, name
  - **Analysis:** distinguish, differentiate, compare, categorize
  - **Application:** interpret, apply

- **Skills:**
  - demonstrate, perform, determine the presence of, point out

- **Attitudes:**
  - show consideration, show respect, pay attention
RECALL QUESTIONS: EXAMPLES

- **Knowledge:**
  - “What is the bilirubin level at which you see jaundice?”
  - “What are the major findings of CHF?”

- **Skills:**
  - “How do you put in an art line?”

- **Attitudes:**
  - “Do you find it difficult to interview patients with narcotic dependency?”
ANALYSIS/SYNTHESIS QUESTIONS

- **Knowledge:**
  - “What is the connection between diet and heart disease?”

- **Skills:**
  - “How do the components of the PE relate to each other?”

- **Attitudes:**
  - “What factors are influencing your choice of medical sub-specialty?”
APPLICATION QUESTIONS

Knowledge:
- “What do you plan to do for this patient?”

Skills:
- “Can you show me the steps you would use in a complete cardiac exam on this patient?”

Attitudes:
- “How are your feelings about alcoholics affecting your treatment of this patient?”
1. Observation of Learners
2. Ask Questions
   - Question Type (open or closed)
   - Wait Time
   - Question Level
3. Fostering Self-Assessment
Fostering Self-Assessment

"HOW WELL DO YOU THINK YOU DID?"
Recall:
- “How would you assess your memory of the major causes of hepatic coma?”

Analysis/Synthesis:
- “Are you comfortable with your understanding of the pathophysiologic mechanisms for diarrhea?”

Application:
- “Do you think your knowledge base is adequate to deal with this patient?”
Fostering self assessment entails use of the “Double You” question

What is the ultimate self assessment question?

“Who the --- do you think you are?”
HOW WELL ARE YOU DOING AT EVALUATING YOUR LEARNERS?
BREAK
ROAD MAP

- Introduction (10 mins.)
- Evaluation (25 mins.)
- BREAK (5 mins.)
- Feedback (25 mins.)
- Group Discussion and Wrap Up (10 mins.)
Setting: You are attending on the inpatient ward service. You have an R2 resident, two interns and two medical students on your team.

Observation: You have noticed some issues with your R2 resident

- Remains quiet on rounds, even if the interns and students flounder on their presentations
- Doesn’t seem to know what’s going on with the patients, and is not doing any teaching.
- Seems pre-occupied and more interested in “getting through rounds” than anything else.
- You suspect he/she’s not getting here early enough to pre-round sufficiently on the patients.
**Task:** You feel obligated to talk to this resident about your observations. Turn to the person next to you, and practice giving this resident feedback for the next 2 minutes.
EVALUATION VS. FEEDBACK

Evaluation

Feedback

CONTENT

LEARNER

TEACHER

CONTENT

LEARNER

TEACHER

Feedback

Evaluation
WHY IS FEEDBACK IMPORTANT?
96% of surveyed residents (n=1500) believed feedback was important for learning (Schultz, BMC Central 2004)

Giving high-quality feedback is strongly associated with teaching ratings (Torre, Acad Med 2003)

Constructive and specific feedback can improve learner knowledge and skills (Boehler, Med Ed 2006)

Learners often don’t specifically ask for feedback, they may not recognize it when it is given, and often don’t remember it after it’s done (Sostock, Acad Med, 2002)
The medical education literature suggests:
- Learners want FB
- Teachers say they give FB
- Learners say they don’t receive FB

What might explain this?
Feedback Continuum

Indirect: persuasion, argumentation, questioning, setting goals, observing practice outcomes

Direct
BARRIERS

- I don’t have time
- Someone else can do it
- I’m sure they will figure it out
- I don’t want to hurt their feelings
- I don’t want the learner to retaliate with my evaluations
- I don’t know how to give feedback
FEEDBACK

- **Definition**: The process by which the teacher provides learners with information:
  - about their performance
  - for the purpose of improving their performance

- “Feedback provides information, not judgment”  *Jack Ende*

- “This is rocket science”
# FEATURES OF EFFECTIVE FEEDBACK

- Focused on observed behavior
- Specificity
- Frequency
- Timing
- Positive/negative

- Learner reaction
- Action plan
- Learning Climate
  - Acknowledge learner’s situation
- Communication of Goals
  - Agree on goals with learner
3-LEGGED STOOL

Feedback

LC  CG  EV
FEEDBACK: OTHER CONSIDERATIONS

- Amount (digestible quantities)
- Setting:
  - Brief/informal (on the fly)
  - Formal (often a one on one meeting)

Feedback Continuum

Informal
in-the-moment
on-the-fly

Formal
mid-rotation
end-of-rotation
LEVELS OF FEEDBACK

- Minimal
- Behavioral
- Interactive
MINIMAL FEEDBACK

- Tell learner performance is correct or incorrect
- Agree or disagree with learner’s opinions
- Use nonverbal cues like nodding

  Examples:
  - “No.”
  - “Good.”
  - “That’s correct.”
  - “You made a mistake.”
BEHAVIORAL FEEDBACK

- Describe learner’s performance as behaviors
- Tell learner why performance is correct or incorrect
- Give reasons for agreement/disagreement
- Offer behavioral suggestions for improvement

Examples:
- “Your case presentation was clear and well organized”
- “Your report does not include all of the important test results”
- “I agree with you because...”
- “. . Next time, I think you should try . . “
INTERACTIVE FEEDBACK

- Give feedback on self assessment
- Elicit learner’s reaction to feedback
- Develop an action plan with learner

**Examples:**
- “How did you feel you did?” . . “I noticed that you . .”
- “Do you agree with my observations?”
- ”What do you think about what I’ve said?”
- “What do you want to change?”

**ASK-TELL-ASK approach**
The teacher is handing back our test papers today...

I can hardly wait to see what she thought of mine.
VIDEO CLIP

- Stanford University
- Actual teaching encounters
- Scripted and played by others
Feedback: Model II
http://www.youtube.com/watch?v=lzzlVqgSMsA
PITFALLS OF FEEDBACK

- Mid month feedback: Judge or Coach?
- Group Feedback??

- Vanishing feedback
  - The feedback sandwich translated:
    - I like you
    - You could be a little better but...
    - I like you
Label the feedback

“I would like to give you some feedback about your presentation”
FEEDBACK SUGGESTIONS

- Microfeedback
- Coach every day, not mid month
- Establish a time to meet
- The feedback club sandwich
I like what I see

Here’s how to become even better

I know you can do it, I am confident in your ability

I expect you to work on this

I am happy to help
“Name three things you loved about working with me this month...”
ROAD MAP

- Introduction (10 mins.)
- Evaluation (25 mins.)
- BREAK (5 mins.)
- Feedback (25 mins.)
- Group Discussion and Wrap Up (10 mins.)
REVISIT CHALLENGES FROM INTRO
Recognize:
- The importance of evaluation and feedback in teaching and in medicine
- The crucial link between evaluation and feedback
- The challenges to giving and receiving feedback

Recall key principles for effectively evaluating your learners
- Observation, varying levels of questions (wait time), fostering self assessment
Recall key principles for giving effective feedback
- Varying levels of feedback (Minimal, Behavioral and Interactive)
- Features of effective feedback (specific, timely etc.)

Use behaviors that are proven to enhance your versatility as a teacher
Continue the collegial exchange
Practice what you learned today!!
CLOSING

- Workshop Evaluations
- Sign in sheet