

SMALL GROUP TEACHING & FEEDBACK

WHY TEACH?

- You learn when you teach
- Doctor derived from the word docēre meaning to teach
- You already do it – for your staff, your peers, lay people, patients
- You have to understand the subject to teach it
- It is considered part of your professional responsibility to teach
- It makes medicine fun again – remember that?

FIRST, YOU HAVE TO “STEP ACROSS THE VOID”

- That small air space between you and the students can be quite intimidating to both parties
 - Those silent students staring at you:
 - They are fearing to open their mouths and appear stupid
 - You’re thinking the students expect you to be an oracle on everything
 - RELAX –
 - What you forget is that by just being who you are, you have a vast amount of practical experience and knowledge you don’t even realize you possess
 - Simply **thinking out loud** as you see a patient is invaluable to the student
 - But **you** have to take that first step across the “void” – and that first step sets the tone

THAT FIRST STEP

- Who are you and what do you expect
 - Tell them about yourself, your past, how you got where you are
 - What are your expectations for the rotation - this may take a few rotations to figure out
 - Special instructions based on past experience with students
 - If known, tell them student behaviors that have been less than desirable in past groups –
 - “special handling instructions” for specific faculty, staff and places they may go or meet –
 - Show them around the clinical environment – introduce them to the staff
- In short, make them feel comfortable and like they are members of your team and not outsiders

THAT FIRST STEP

- Who are **they** and what do they expect
 - They may not know,
 - a student on their first clinical rotation is still in the “Reporter” stage (see later) whereas a senior is moving into the “Manager” stage – goes back to assessing the need of the learner or “finding their problem to be solved”
 - What were they told to expect?
 - Where are they from, what is their background? Aspirations?
 - What are their personal and professional interests

THAT FIRST STEP

- What do **we expect** – try to create an “environment of inquiry “
 - Create a “safe” learning environment – non-threatening, non-demeaning, mutual respect, student centered, problem solving,
 - Not anecdotal but evidence based – refer to literature where possible
 - **Generalize** across cases –
 - Give assignments and get reports from learners - send someone to the literature to review a series and report back tomorrow
 - Professionalism- remember these are impressionable students so temper the personal and professional complaints about medicine
 - Participate in conferences, journal clubs, etc.
 - Model behavior – think out loud when examining a patient or solving a case - how would you handle this situation?
 - Set aside specific short times for teaching – sit down with cup of coffee
 - Teach at the bedside – students learn a lot at the bedside

R.I.M.E

- **Students predictably proceed through stages as they develop expertise**
 - **Reporter** – remember when you were a student learning to do an H&P and every word and sentence carried the same weight. Your H&Ps were 10 pages long? But you eventually learned to gather accurate and complete information
 - **Interpreter** – then in your senior year and in residency you learned to prioritize and began to develop expertise in diagnosis but still didn't know too much about managing
 - **Manager** – then in your internship you were thrust into managing and by the end of your residency you were “autonomous”
 - **Educator** – and as a senior resident and later you began to teach others - after all you have to really understand the whole process to teach it

Adapted from :Pangaro, LN. Evaluating Professional Growth: A New Vocabulary and Other Innovations for Improving the Descriptive Evaluation of Students. Academic Medicine, 1999 (Nov) 74: 1203-1207

ADULT LEARNING THEORY *(in one slide)*

- Quite simple – how do you, an adult, best learn how to use a new phone? Read the whole manual ? Absolutely NOT!
 - You start pushing buttons and see what happens
 - then perhaps hit the search function to solve the discreet problem with the phone telling you right or wrong.
 - Only if you get stuck do you go get the tech guy to bail you out.
- Similarly adult learning principles
 - Actively involves the learner
 - Solving a problem they have at the time they have it
 - With immediate feedback

ADULT LEARNING & THE GOOD TEACHER

- Involved me in the learning
- Clearly communicated expectations of performance in advance
- Stimulated my interest
- Gave focused, formative, effective feedback at the time of occurrence – focused on behavior, not person
- Let me practice and try again

ATTRIBUTES OF A GOOD TEACHER

- Listens – REALLY LISTENS to learner
- Clear about expectations
- Enthusiasm for subject – eager to transmit knowledge
- Shows interest through body language
- Looks at the learner - uses their name
- Encourages participation of all
- Good sense of humor
- Doesn't monopolize the discussion
- Acknowledges learners problems / situation
- Invites opinions – open to ideas
- Avoids interruption, ridicule, intimidation

TWO GOOD WAYS TO TEACH

1. Think Aloud

2. The 3 W's

THINK ALOUD

- Students don't want or expect a dissertation on every patient
 - You may not know the latest literature on something but you know a whole lot of medicine – practical, real world medicine
 - But helping students understand your ability at expert decision making is the thing that is most valuable
- Difference in novice and expert decision making is fascinating area of study (see RIME above)
 - To the novice – every piece of information is equally important
 - But experts quickly winnow out the unimportant data and proceed to the diagnosis
- Thinking aloud gives the student a window into how you arrive at a diagnosis – a window into a world you don't even notice because it is second nature

THINK ALOUD - EXAMPLE

<p>this is a 76 year old female presenting with a complaint of 40 lb. weight loss in last few months. Daughter says she appears depressed and doesn't want to eat.</p>	PAUSE	Well this could be anything - cancer, depression, dementia, medications, chronic infection, etc.
<p>the daughter says she takes no medicines and no significant life events have occurred. She has no history of smoking or drinking and her bowel habits have not changed. She does not seem to want to eat.</p>	PAUSE	well - I'm no closer now that before - lets see what else they have
<p>She recently underwent a major work up which was included in the records she brought. She had lots of blood work and x-rays. SMA profiles, B-12, folate levels were all mostly normal. She had a mild NCNC anemia and MRI of chest and abdomen was negative.</p>	PAUSE	This is making a number of malignancies less likely and not sure what to make of normal blood work. Lets see what the physical exam shows.
<p>She is sitting quietly, bent forward in the chair, seeming to stare into space, really adynamic. Her hair and skin are quite fine and smooth. Her pules is 114 and irregular</p>	PAUSE	tachycardia and weight loss in an apathetic appearing older person - We need to check thyroid function tests and be sure she does not have apathetic hyperthyroidism
<p>They checked the TSH as part of the SMA metabolic profile and it wasn;t elevated. In fact it was <0.01 (0.3-4.8 mIU/L</p>	PAUSE	unfortunately people often overlook suppressed TSH - we need a Free T4 and T3RIA

THINK ALOUD

- Can be used a number of ways:
 - As student presents, you can stop them and make comments as in the previous case
 - As you examine a patient stop and talk to student as an aside
 - Patients often like this attention and to see how the doctor thinks of course judgment has to be used here!
 - As student presents you can stop them from time to time and ask what they think is going on or what to ask/do next
 - Importantly – lets you assess their level of understanding so you can target teaching
 - You can use an assessment for evaluation purposes
 - As you present a favorite case from your past – stop from time to time and ask them what to ask or do next and why

3 W's – *even easier to remember*

- What is going on?
- Why do you think that?
- What do you want to do next?
 - Make ONE teaching point
 - Move on – summarize
 - For example, get them to tell you how would they sign this patient out to another student for the night to assess their understanding

ANOTHER POPULAR TECHNIQUE

The 1 Minute Preceptor

- Get a commitment
- Probe for supporting evidence
- Reinforce correct thinking
- Correct errors in thinking
- Teach a general rule

ONE MINUTE PRECEPTOR:

A 5-Step Model

- **Get a commitment** – finding out where the learner is in their understanding
 - What is going on here?
- **Probe for supporting evidence**
 - Why do you think this?
 - What else could it be?
 - Based on what you told what else should we do?
- **Reinforce correct thinking** – specifically what was done well and why
 - NOT general – “you did a good job. “ This is seen for what it is.
 - Specific – you correctly diagnosed the heart murmur by identifying
 - You went in at the right angle with that CVP insertion
- **Correct errors in thinking / actions** – formative feedback is critical especially **at the time of occurrence**
 - However, I would have ordered an Echo in addition to the Chest X-ray and here’s why....
 - I would give local anesthesia before putting in a central line !
- **Then teach a general rule**
 - The most common causes of these type murmurs are....
 - The complications of central lines are.....
- **Move on**

DELIVERING FEEDBACK

EFFECTIVE FEEDBACK

- Safe environment
- Encourage self assessment
 - “How do you think you did? What do you think you could do to improve?”
- Encourage self problem solving
 - “How would you do this better or correctly?”
- Be specific rather than general
 - “What specifically was wrong?”
- Focus on learner behaviors, not person
- Be descriptive, not judgmental
 - Avoid “that was stupid” communications
- Limit amount of information given
- Summarize for closure

IDEAL BEHAVIORS FOR DELIVERING FEEDBACK

- Eye contact
- Enthusiasm
- Ask and encourage questions
- Interested in learner
- Honest
- Well-defined goals
- Clear explanations
- Problem solving emphasis
- Student centered instruction

SUMMARY

- Be sure your team knows who you are as a doctor and person and vice versa
- Lay out the ground rules
- Before seeing next patient outline what learners might see, some major points of the case.
- Use the “3 W’s”
 - What’s going on here ?
 - Why do you think that ?
 - What do you want to do next ?
- Follow with a single teaching point
- Closure and move on
- Set aside time to sit down and have a discussion
 - Make case related assignments for brief reports – not dissertations
- Have feedback
 - One on one,
 - announce it is feed back
 - Encourage self assessment and self feedback – reflection is important
 - Feedback is not generalized praise but focused on specifics
 - Feedback is aimed at behaviors and not the person
- Have fun!