

## *Clinical Faculty as Clinical Coach*

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The analogy of teacher as coach has been a useful one in general education and translates well into the realm of nursing education too (Grealish, 2000). The dictionary definition of *coach* confirms the essential commonality between them: coach (noun)—“a private tutor; one who instructs or trains...” (Merriam-Webster’s Collegiate Dictionary, 2004, p. 236). The similarities between a coach and a teacher are especially noticeable in the clinical practice setting where interactions occur with individuals and small groups of students. When the word *coach* is used as a verb, the value of the analogy is amplified. It is through the motivating and facilitating activities of teaching that faculty, in effect, become coaches. In the context of clinical nursing education, coaching is exemplified in the reciprocal interactions between student and faculty member that occur while the student is acquiring the necessary behaviors and skills that are foundational to clinical nursing practice (Grealish, 2000). For clinical nurse educators, the concept of *coach* is a large part of both who we are (noun) and what we do (verb).

### ■ BEING AN EFFECTIVE TEACHER-COACH

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A considerable body of knowledge has been amassed that identifies the qualities, characteristics, and abilities of effective teachers in the clinical setting (Stokes & Kost, 2005). Many of these likewise appear in other contexts describing successful

**BOX 13-1****Characteristics of an Effective Clinical Nursing Coach**

An effective clinical nursing coach is:

- Enthusiastic about the profession of nursing
- A role model of professional nursing
- Enthusiastic about clinical instruction
- Knowledgeable regarding theoretical foundations of practice
- A clinically competent practitioner
- Flexible
- A skillful communicator
- Fair, respectful, and consistent in interactions with others
- Able to create an environment conducive to learning
- Sensitive to the students' learning needs and styles of learning
- Motivational
- Facilitative

coaches (Blythe & Sweet, 2003). All too often, these aspects of the teacher and coach's character and personality are poorly differentiated from the teaching and coaching methods employed. Box 13-1 illustrates how the characteristics of an effective coach can be applied to faculty involved in clinical nursing instruction.

These broad characteristics subsume many others that can be intuitively extrapolated. For example, a teacher who is a *skillful communicator* is also a good listener. All teaching and learning are constructed on the underpinning of communication (Lichtman et al., 2003). Possessing the quality of *flexibility* allows faculty to alter teaching strategies as circumstances warrant, such as when there is an unexpected change in patient status. Faculty flexibility is also essential for assisting students with diverse learning needs. Students progress at different paces; some require more guidance in connecting theory to practice whereas others find mastering psychomotor skills to be especially challenging. *Fairness* implies that faculty are aware of their own biases and endeavor to control them while teaching and evaluating students. Faculty carry out innumerable activities in order to create environments that are conducive to learning. They strive to assure that learning experiences are appropriate and meaningful and to foster a positive relationship with agency personnel. They also enhance the learning environment through the judicious use of humor (Hayden-Miles, 2002).

As discussed in previous chapters, the appropriateness of humor depends as much on the social and interpersonal context as it does on the content itself. Faculty must work from a foundation of trust and respect, recognizing the individuality of the student and the situation. Honing in on a pearl of wisdom regarding clinical instruction, one expert clinical nursing coach deemed appropriately used humor to be a crucial device for teaching and reducing stress for both students and faculty (Lichtman et al., 2003). For example, when a student

is anxious about performing her very first urinary catheterization on a female patient, faculty might decrease stress before entering the room, while providing the student with a useful clinical tool, by suggesting that when the student is trying to locate the urethra, the patient be asked to cough to make it “wink” back. When faculty laugh at themselves and the situations in which they find themselves, they enhance the learning environment and their relationship with students (Hayden-Miles, 2002).

Faculty teaching clinical nursing courses are expected to be skillful practitioners who are knowledgeable about the theoretical bases of their practice. Tantamount to their practice and theory expertise, they also must endeavor to motivate students while facilitating their learning. Motivation and facilitation are the crux of the teacher-coach role. When students are motivated to learn and engaged in the learning process, clinical faculty coaches are able to choose from a wide variety of pedagogical methods to facilitate that learning.

### ■ MOTIVATING STUDENTS TO LEARN IN THE CLINICAL SETTING

In a study of Taiwanese nursing students, motivation was identified as the most critical factor in the successful transfer of theory to hospital clinical practice (Tsai & Tsai, 2004). The delineation of influences on students’ willingness to learn has been a focal point of study for social psychologists and educational theorists for decades. Theories have been generated that connect learning and motivation, behavior and motivation, and behavior, learning, and motivation (Bastable, 2003). Every theory postulated is an effort to attend to some aspect of the complicated and rather intangible concept of motivation.

In clinical nursing instruction, student motivation is markedly influenced by the learning goals established and the feedback provided. Because faculty teaching clinical courses work with individual students, both the goals and the feedback can be somewhat tailored to meet the unique needs of each student. In order to maximize the effectiveness of the learning process, a clinical coach might consider carrying out a brief motivational assessment of each student.

#### **Motivational Assessments**

Both internal and external factors impact an individual learner’s motivation; these factors can be positive, serving to encourage motivation, or negative, impeding it in a given individual. Redman (2001) sees motivational assessment of the learner to be integral to successful teaching. Such assessments draw heavily on the internal and uniquely individual elements of learning that are encompassed in cognitive learning theories (see Chapter 2). Some of the possible considerations in such a motivational assessment of a nursing student in a practicum course are listed in Box 13-2. The accuracy of this assessment is highly contingent on the degree of trust established within the student-faculty relationship. A trusting relationship is a key constituent of a positive learning environment. Seen as a continuum of degree, the bedrock of trust is laid on the first day of the course (see Chapter 10), and every interaction faculty have with students will affect it. From the students’ perspective, the quality of the current

**BOX 13-2****Aspects of a Student Motivational Assessment**

- Previous learning experiences (i.e., positive and negative outcomes and processes)
- Personal attitudes and beliefs about learning
- Readiness to learn (e.g., interest in the subject, impact of external factors such as demands of other courses or family life)
- Availability of resources to support learning (e.g., library, lab, and computer access; social support; financial status)
- Level of anxiety (moderate level enhances motivation; high or low levels impede it)

relationship also makes an important contribution to motivation in subsequent clinical courses.

Student motivation often waxes and wanes over the course of the term, so assessments might be done more than once, perhaps at the beginning and again at the midpoint of the term. One effective way to collect motivational assessment information is through the students' reflective journals (discussed in detail in Chapter 11). The aspects provided in Box 13-2 can be used to construct questions to be addressed in the students' first journal entries, after the first course meeting prior to the first clinical experience. This approach encourages reflection and provides ample time for students to offer considered responses. Reassessment of motivation could then be done as part of each student's formative midterm evaluation (Chapter 18). Guided by the results of the motivational assessment, while remaining within the parameters of the overall clinical course expectations, individualized learning goals are then prepared and feedback imparted.

**Goal Setting**

"Implicit in motivation is movement in the direction of meeting a need or toward reaching a goal" (Bastable, 2003). Murphy (2005) identifies specific learning goals as an essential tenet of "guided practice," her term for coaching by clinical faculty. The characteristics of student learning goals in clinical courses are summarized in Box 13-3. Cognitive learning theories have contributed significantly to the current application of student learning goals to enhance motivation. Goals established by faculty without student participation are less likely to be attained. Collaborative goal setting can minimize the deleterious effects of negative motivators for the student, bring to the foreground any hidden agendas, and diminish the possibility of learning activities being sabotaged by the student (Bastable, 2003). From a coaching perspective, setting goals in concert with students is seen as a pivotal activity (Grealish, 2000; Broscious & Saunders, 2001; Blythe & Sweet, 2003; Bastable, 2003).

**BOX 13-3****Characteristics of Student Learning Goals**

- Collaboratively established
- Clearly written
- Appropriate to the course and student
- Realistic (attainable but challenging)
- Performance-based
- Based on prior knowledge/experiences
- Short-term (for 1-2 clinical days)

As the learning goals are being collaboratively designed, the clinical coach provides students with the guidance to prepare goals that will be meaningful to them. To be meaningful, goals must be realistic; they should be attainable while still being sufficiently challenging to the student (Grealish, 2000; Westberg & Jason, 2001; Bastable, 2003). When goals are too easy or too difficult, they are not seen by the student as motivational and will most likely be discarded. Goals that are based on past learning are most likely to be realistic and therefore meaningful to a learner (Grealish, 2000). The teaching strategies that ultimately evolve from goals that link new to old learning are also presumed to best promote students' critical thinking skills (Youngblood & Beitz, 2001).

Performance-based learning goals can be cognitive, psychomotor, or affective in nature. The assumption that underlies these goals is that student learning can be inferred from student performance. Since the 1940s, educational objectives have been inexorably associated with the control and manipulation of learners subsumed by *behaviorism*, the dominant psychological theory of the time (Anderson et al., 2001). Tyler, considered the father of educational objectives, had the perspective that the desired consequence of learning was simply a change in behavior (Anderson et al., 2001). Omitting the erroneous assumption of learner control and manipulation inherent in behaviorism, learning goals prepared in concert by faculty and students become the learning target and guide the selection of learning experiences.

Cognitive learning goals reflect an understanding of theoretical concepts, and their attainment can be conveyed by the student in many ways. By preparing concept maps, responding to clinical queries, applying theory in practice activities, reflecting in a journal entry, or completing a self-evaluation, students demonstrate their achievement of cognitive learning goals. A psychomotor skill performance goal addresses carrying out the skill with efficiency, safety, and accuracy and communicating in actions and words an understanding of the conceptual aspects of the skill. Performance-based affective goals describe behaviors reflective of caring, professional ethics, and self-awareness. Faculty can assess their attainment through direct observation, clinical queries, and written work such as process recordings and journaling. If this discussion or the

**BOX 13-4****Sample Cognitive, Psychomotor, and Affective Student Learning Goals****Cognitive learning goals**

- Prepare and carry out a balanced prenatal vegan nutritional teaching plan for Mrs. Smith.
- Create a time management plan to organize the provision of care for four patients.

**Psychomotor learning goals**

- Apply the 5 Rights during the preparation and administration of medications.
- Conduct developmental screening on four children of differing chronologic ages and accurately interpret the results.
- Correctly perform a central line dressing change.

**Affective learning goals**

- Record the interaction of an admission assessment in a process recording and indicate my verbal and nonverbal behaviors that are reflective of caring.
- Discuss in my journal the effectiveness of my collaboration with Mr. Jones and his wife in creating a plan for medication administration.

examples in Box 13-4 are not clear, refer back to the presentation of the domains of learning in the clinical learning context presented in Chapter 2. Evaluative data sources are explored in detail in Chapter 18.

There certainly is a place for long-term goals, which can be worked toward over the course of the term. But to maximize student motivation, breaking large long-term goals into smaller short-term ones will be most beneficial (Grealish, 2000). When goals are established for a single day or 2 of the practicum, both coach and learner can assess the degree of progress attained and modify goals and approaches accordingly. Students will benefit most from goals that are focused on their performance (Grealish, 2000) and worded in a fashion that will facilitate the evaluation of their attainment. Whether the goals are for manual (psychomotor), cognitive, or even affective skill development, clarity of the desired results is imperative.

The collaborative establishment of learning goals can be accomplished in several ways. Ideally, as students evaluate their learning for each day or week, they determine goals for their next clinical experience. Students may have a faculty-designed self-evaluation form to fill out or address their learning through journal entries, concluding with their learning goals for the next clinical experience, obtaining feedback from faculty. There may be brief weekly meetings with faculty for collaborative goal setting, carried out in person or via online discussion (with appropriate confidentiality parameters). In courses using the preceptor model, goals may be established between the students and preceptors while faculty assume a consulting role.

### Providing Feedback: Oreos® and Helium Balloons

The second aspect of motivating students to learn in the clinical setting is the provision of faculty feedback. Feedback to learners is essentially reinforcement for behavior exhibited and is a defining feature of behavioral learning theories (see Chapter 2). In this text, feedback is differentiated from evaluation by virtue of its immediacy and informality. A more formal, written evaluation of learning within a clinical course is typically carried out at a midpoint in the term (formative) and at the end of the term (summative). Formative and summative clinical evaluations are addressed in Chapter 18. Box 13-5 lists techniques for providing feedback in the clinical setting that are discussed in this chapter.

The student's receptivity to faculty feedback is a critical aspect in the efficacy of clinical coaching. For long-term changes to occur, students must be receptive, comprehend, and attach importance to faculty suggestions (Westberg & Jason, 2001). Openness to feedback is highly variable, differing not only between students but also in the same student over time. The degree to which anyone is receptive to feedback is the result of both current and historical experiences (Westberg & Jason, 2001). How parents, peers, supervisors at work, and other faculty have provided feedback will affect how each student responds to their clinical coach's observations and suggestions. One of the most important contributors to students' receptivity to feedback is the quality of their relationship with their current clinical faculty. A trusting and collaborative relationship between faculty and students, one in which students feel supported in their learning, provides an open door to feedback. If that relationship erodes or was

#### **BOX 13-5**

#### **Techniques for Providing Feedback in the Clinical Setting**

- Assess student receptivity
- Work from within a trusting faculty-student relationship
- Provide feedback in close proximity to performance
- Assure privacy for constructive criticism
- Present balanced feedback
- Monitor nonverbal behaviors, emotional tone, and pacing
- Consider the careful use of touch
- Offer the student the opportunity to self-critique
- Begin with positive feedback
- Consider Oreos® and helium balloons
- Limit the focus; prioritize issues
- Be clear, direct, specific; provide descriptive examples
- Use questions to guide student self-evaluation
- Use partial affirmation to guide student self-evaluation
- Link feedback to current and future learning goals

never adequately established, students may believe their faculty are “out to get them,” and the receptivity switch is flipped off. Under such circumstances, students will not hear feedback accurately or value it. Having established the tone for professional interactions and explained the feedback process at the first meeting (see Chapter 10), faculty may find it useful to refer back to their belief that students will accept the feedback provided as a vehicle for both professional and personal growth (Luparell, 2005).

In clinical coaching, feedback assumes a crucial function in motivating students’ learning and needs to be provided as close in time to the students’ performance as possible in order to be most effective (Grealish, 2000; Westberg & Jason, 2001; Weimer, 2003; Bastable, 2003). When feedback is provided in a timely fashion, students are more likely to remember the specifics of their performance and make the necessary modifications accordingly (Westberg & Jason, 2001). Meaningful feedback should be offered both during and following the task at hand, if possible and appropriate. Certainly, there are times when faculty should consider postponing feedback. If the feedback addresses issues that are quite sensitive or personal, the situation was highly emotionally charged or stressful, or the student is pressured and behind schedule, it may be best to defer it for a time (Westberg & Jason, 2001).

To be meaningful, feedback is provided based on the proximity of performance to predetermined guidelines, established standards, or past performance (Bastable, 2003). Feedback can be positive or negative in nature. Positive feedback serves as a reward to students, providing the impetus for continued learning efforts (Bastable, 2003). If students are rewarded for asking questions, stating ideas, and trying out new ways of thinking, they will tend to continue this behavior. The intent of negative feedback, often called “constructive criticism,” is to redirect the learner’s thinking or performance in a more desirable direction. Feedback of this sort must be given with care and be somewhat individualized for the particular student and circumstance. Even when provided with the best of intentions, constructive criticism can be devastating to some students. When providing feedback that could be construed by students as negative, it is always best to do so in a private location where it cannot be overheard by others and cause students embarrassment. Ideally, the feedback provided is rounded, a balance of positive and negative, and presented in a caring and respectful manner (Weimer, 2003).

Feedback is most often provided verbally to students in the clinical setting. Written feedback is discussed in connection with written assignments in Chapter 15. Delivery of verbal feedback encompasses more than just the words themselves; it includes the emotional tone embedded in the words, the pacing of what is said, and the accompanying body language (Westberg & Jason, 2001). The content and impact of verbal feedback is supported, heightened, or sometimes even replaced by faculty’s nonverbal behavioral cues. Nonverbal behaviors must be congruent with the verbal feedback being provided or students are likely to be confused or distracted. As a student responds to questions or performs skills, the faculty coach can convey approval and encouragement by nodding,

smiling, moving toward the student, gesturing in ways that communicate approval and attention, and perhaps by maintaining eye contact or using touch. When students are performing a skill during the provision of patient care, it can be beneficial to have a predetermined signal to communicate to the student it is all right to continue, that the correct injection site has been identified or the student's hand is correctly placed to palpate the fundus of the uterus.

This seems an appropriate time to address faculty's use of touch with students. Patients are generally comfortable being touched by a nurse because of the context; there is an understanding that carrying out the nurse's role requires touching patients. The context is different in teaching, and faculty must be astute regarding the feelings of the individual student and the circumstances involved. Given the complexity of human interactions, interpretations of sexual harassment, and the litigious propensity of American society today, faculty must use considerable caution in their use of touch. Circumstances do change, and the touch that was initially accepted and comforting to a student can be negatively reinterpreted at a later time. Some faculty are simply inherently disinclined to use touch beyond a handshake in their interactions with anyone outside of their nursing practice. This may indeed be the best approach. But if the clinical coach is comfortable and wants to use touch as part of communicating caring, conscientious consideration of the individual student's comfort level as well as the situation is essential. If the faculty member or student is not comfortable, other nonverbal or verbal approaches should be used. Faculty must also be sure their intent is clear and the touch is appropriate. Faculty often make it a policy to avoid touching a student of the opposite gender under any circumstances out of concern that their actions might be misinterpreted. As a caring gesture, a pat on the back or shoulder given as part of feedback or comforting solace at the appropriate time is generally not misconstrued, but it may be best to err on the side of caution.

Feedback sessions may be only a few minutes in length, but it is always important to begin by asking students to critique their own performance. Doing so reinforces the collaborative nature of the process, communicates respect and value, enhances self-awareness, and allows students to acknowledge aspects of their own performance before they are pointed out by faculty (Westberg & Jason, 2001; Weimer, 2003). This approach also can serve to alert faculty of upcoming areas of potential disagreement. Assure that students include their accomplishments, the things they feel good about, so that they will learn to balance their self-analyses. As the coach, affirm aspects of the student's assessment that are congruent with your own, positive or negative, then begin your feedback with a positive observation. Initiating a feedback session with an affirmation has been found to be especially valuable if students are ill at ease, distrustful, or markedly self-disparaging (Westberg & Jason, 2001). Providing negative feedback sandwiched between positive observations, like the layers of an Oreo® cookie, is a useful technique for creating balance and capturing students' attention. The downside of this technique, however, is that students recognize it if it is overused, ignore the positive in anticipation of the negative,

and then focus on the negative and miss the closing positive feedback (Westberg & Jason, 2001). No single method of providing feedback should be used exclusively or excessively. Oreos® taste best when they are not the only food available but instead are an occasional treat!

It is best if a feedback meeting focuses on a restricted scope of behaviors (Weimer, 2003), that is, a single skill performance or patient interview. Overloading students with feedback limits their ability to pay attention to what is said and then process and incorporate it. Prioritizing the feedback to be provided by focusing on the most important features at the moment and postponing others might be most advantageous (Westberg & Jason, 2001).

Feedback should be unambiguous, straightforward, and as precise as possible (Weimer, 2003). Avoid long, meandering, one-sided commentaries. Be as objective as possible in describing behaviors and avoid labeling students. Sometimes subjective feedback is appropriate, but it should always be identified for what it is (Westberg & Jason, 2001). As experienced clinicians, observations are made and conclusions are drawn that are by their very nature subjective. Owning this type of feedback for what it is as it is given to students makes these selective perceptions and personalized interpretations clear for what they are. This can be done by prefacing comments with phrases like “I thought...”, “It appeared to me...”, or “From my point of view...”. Students should be encouraged to see this type of feedback as an opening for dialogue with their coach, a time when they might explicate their thinking or behavior (Westberg & Jason, 2001).

Illustrative examples enhance positive feedback by making desirable behavior more visible to students (Westberg & Jason, 2001) and elucidate constructive criticism by identifying where problems lie. Telling a student, “You did a good job of clarifying Mrs. Smith’s comment about her financial status when you reflected it back to her” is more meaningful than simply saying that good therapeutic communication skills were used. Pointing out to the student that the patient’s hands were shaking and her voice was tremulous during preoperative teaching for a mastectomy helps the student see what was missed and is easier to accept than being told that observational skills are poor.

Clinical coaches may pose questions to guide students in the examination of their behavior and help them focus and draw their own conclusions, thereby increasing their self-awareness. For example, rather than tell a student what was wrong with a dressing change procedure, use guiding questions such as, “What did you notice about the wound when you removed the old dressing?” Whenever questions are posed, allow sufficient time for students to ponder and collect their thoughts. Using more adverbs than adjectives tends to increase the specificity of feedback (Weimer, 2003). The more descriptive the feedback is, the better it serves to guide learning. Students’ most common criticisms regarding feedback about their clinical practice is that it is insufficient, unclear, and lacking in detail (Westberg & Jason, 2001).

Sometimes partial affirmation can be used to combine positive and negative feedback in a qualified approach. This is a useful method because it

acknowledges student efforts and uses what was accurate and right (positive) as a springboard for the student to identify and correct errors. The clinical coach might say to a student, “You did a good job setting up your sterile field. Now, tell me what happened when you turned from the sterile field to the patient.” The student can be guided to identify a problem or error, alleviating some of the distress that could be generated by negative faculty feedback. Other examples of partial affirmation include statements such as, “That’s partially right” and “You’re on the right track.”

It seems to be a culturally derived aspect of human nature that learners generally attend more to criticism than to positive reinforcement. Part of the role of clinical faculty as coach is to endeavor to assure that students truly hear the feedback provided. To help students unaccustomed or uncomfortable with positive feedback, try using the analogy of a helium balloon. It can be used at any point in a feedback session, but starting with the opening positive observation, it can serve to focus students’ attention during the entire feedback period. After proffering that initial positive comment, tell students that compliments are like helium balloons in that they have to be caught and cherished or they float away and are gone forever. Then, tell the students to “grab the string on the balloon” by repeating back the positive observation in their own words while really listening to the content and character of the words. Initially, often feeling embarrassed and reticent, students not only become accustomed to grabbing the string but also come to value the balloon!

To provide the maximal motivational effect, feedback to students should be linked to their learning goals when possible and appropriate. Increased receptivity to feedback has been connected to students’ perceptions that the feedback being given relates to the goals they participated in creating (Westberg & Jason, 2001). Certainly unforeseen opportunities will arise in the clinical setting that were not part of the plan for the day. The student may not have had a previously established goal related to performing a urinary catheterization or participating in a group therapy session. Under those circumstances, a student may be asked to consider how this experience and the feedback provided could be incorporated into future learning goals. Negative feedback can press down on a student like dead weight, impeding the motivation to learn. When criticism has been given, students need assistance in reframing it into new learning goals and encouragement to begin to consider how these new goals might be attained. Students need to be helped to see this as a part of the entire learning experience. In fact, growth cannot occur without making mistakes. Perfection is not only unlikely, it is boring and stagnating!

### **■ FACILITATING STUDENT LEARNING IN THE CLINICAL SETTING**

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Together, students’ learning goals and clinical faculty feedback support the motivation to learn. The clinical coach’s attention then shifts from the role of motivator of learning to that of facilitator of learning. The pedagogies clinical faculty use to facilitate learning are drawn from educational theories and philosophies (Chapter 2) and must be applied with consideration of the course,

setting, and student, as well as the knowledge and abilities of the faculty. Like our students, faculty are individuals; some approaches “fit” better than others, and all of them are unique when they are applied by individual clinical coaches. As they teach, as they did in practice, clinical nursing faculty “... use themselves, their attitudes, tone of voice, humor, [and] skill ... [and] offer ways of being, ways of coping, and even new possibilities” (Benner, 2001, p. 78).

### **Provision of Safe Patient Care**

“Supervising experiential learning requires finding a balance between student independence and teacher control” (McKeachie, 2002, p. 247). Bevis (1988) told nursing faculty that protecting patient safety is but a minimal aspect of their role, yet clinical faculty routinely find this obligation consumes an inordinate amount of their time and effort, often to the detriment of their teaching. The concern for maintaining safety in the clinical setting has resulted in a faculty preoccupation with ensuring the supervision of students and high levels of anxiety when that is not possible. Some tactics clinical faculty may want to consider for facilitating the provision of safe patient care by nursing students are summarized in Box 13-6.

As an application of collaboration, the provision of safe nursing care should be a shared responsibility, with student and faculty contributing what each has to offer (Burst, 2000). Upon graduation, practitioners at the level of advanced beginner should reasonably be expected to provide safe patient care and assure that those they supervise are protecting patient safety. In order to attain that goal, students as novice practitioners must learn how to achieve safe practice with incrementally diminishing faculty guidance and support. By modeling an

#### **BOX 13-6**

##### **Tactics for Facilitating the Provision of Safe Patient Care**

- Approach safe patient care as a collaborative responsibility\*
- Initiate dialogue about legal and ethical obligations for patient safety
- Assist students to incorporate the provision of safe care as a professional value
- Help students learn to assess dangerousness in each clinical course\*
- Identify safe and unsafe behaviors\*
- Anticipate potential safety breaches
- Determine when to ask for help\*
- Name who to ask for help\*
- Establish how to recognize important changes in patient status\*
- Maintain a safe learning space by maintaining a safe distance\*
- Carry out intermittent evaluations of safety assessments
- Monitor for situations where students risk unsafe care\*

\*From Diekelmann, N., & Scheckel, M. (2004). Leaving the safe harbor of competency-based and outcomes education: Re-thinking practice education. *Journal of Nursing Education, 43*(9), 385-388.

awareness of their own practice limitations, faculty communicate to students that this self-assessment is a part of professional nursing practice.

As discussed in Unit II, faculty need to discuss with students their legal and ethical obligations to promote patient safety beginning with the first clinical course. As a part of that discussion, faculty should assist students in incorporating the protection of patient safety to the level of a professional value. Once a disposition toward something or someone reaches this point, it is internalized and becomes a benchmark for guiding actions and judging oneself and others. Students must learn to value patient safety as a part of their nursing education. “To learn to be a nurse is to learn from Day 1 how to always worry about safety and how and where to go for help and when you need it and what back-up looks like” (Diekelmann & Scheckel, 2004, p. 386).

In the context of each clinical course, faculty must help their students understand what behaviors are safe and unsafe, anticipate possible threats to safety, identify when they need help, determine who to approach for assistance when they need it, and recognize what assessment data are indicative of significant changes in their patients’ status. In an application of narrative pedagogy, Diekelmann and Scheckel (2004) discovered that students contemplate assessing dangerousness to a much greater degree than faculty appreciate. A reasonable assumption based on this knowledge could be that believing that only they are the bastions of patient safety, clinical faculty may excessively “hover” over their students or stress out when students are “on their own” in the community. Perhaps by helping students expand their skills in the assessment of danger clinical faculty can back away, relax a bit, and ultimately have more time and energy to teach! For Diekelman and Scheckel (2004), and the faculty and students who participated in this colloquial dialogue, the issue distills to a matter of distance: “Students need a safe space to learn nursing practice, which means teachers must keep their distance, yet still be close enough to protect the patient and student while ensuring students learn to figure out on their own the issues of safety in providing patient care” (p. 388).

Hovering over students and experiencing significant stress when students are not being closely supervised certainly are not the singular province of novice faculty, but these issues seem to be the most extreme for them. Believing it somehow assures patient safety, they may require their students to submit extensive written preparatory papers, and then try to review them as they dash from student to student and site to site. In the name of patient safety, they may pose lists of “factoid” questions about drug side effects and nursing responsibilities associated with treatments, losing opportunities to help students develop skills in critical thinking and clinical judgment. But if not these approaches, how can faculty evaluate students’ danger assessments and determine the optimal distance to maintain? For novice faculty, their expertise in clinical practice holds the answer.

As with appraisals of students’ knowledge base in the clinical setting, the accuracy and thoroughness of students’ danger assessments may be determined through intermittent and random faculty review. Based on faculty’s knowledge

and experience of clinical practice in situations similar to those students are involved in, faculty can determine key safety issues and query the students regarding a sample of them. As with other clinical queries, questions should be posed at a level of complexity appropriate for each student's knowledge and experience, and tap into higher-level thinking skills whenever possible. Students should know in advance the components of their danger assessment and come to the clinical site prepared to address any aspect of it when asked. This is their part of a collaborative approach to patient safety. This week, Susan Student may be asked how she will recognize the most common adverse effects of one or two medications; next time she might be asked to speak to her patient's risk of falling.

At the beginning of the first clinical course, danger assessments might be discussed with the entire clinical group during a preconference so that students can better learn the aspects of the assessment. Danger assessment includes problem anticipation, and posing questions of a "what if" nature help students be more prepared if one of any number of common risks to patient safety occur. Questions such as, "What if the patient wants the side rail left down after you give the preop medication?" or "What if your patient becomes dizzy while you are ambulating him down that long hallway?" help the student develop skill in anticipating potential challenges to patient safety. In each course students may be assigned to evaluate their danger assessments periodically in their reflection journals following their clinical experiences so they can obtain faculty feedback. Danger assessments can be explored as a group activity in postclinical conferences as well. These tactics also can be used by coaches teaching clinical courses where decreased direct faculty availability and the concern for safety can generate high levels of faculty stress (e.g., community-based settings, independent learning experiences, or when collaborative or preceptor models of clinical instruction are employed).

Using their clinical expertise and their judgments regarding the student and the situation, faculty must determine the amount of supervision required. The common mistake novice faculty often make is to oversupervise, hovering over students, increasing student anxiety and the risk for errors, decreasing student confidence, and retarding the development of competent advanced beginner practitioners. Backing off can be difficult, but it can be done with the application of tactics for the provision of safe patient care.

### **Clinical Patient Assignments**

The practice of nursing is learned within the general framework of patient care. Over the course of their academic programs, students learn about nursing by observing, participating in, or supervising the care of patients (clients) in a variety of settings.

Students need experiences in *acting like nurses*—experiences in which students are immersed in a clinical setting. They need enough time to discover the pace and rhythm of the setting and where and how to access information, and they need to understand that they practice as a member of the health care team. They need an opportunity to pull it all together (Tanner, 2002, p. 52).

**BOX 13-7****Tools for Facilitating Learning Through Clinical Patient Assignments****Assignment selection**

- Faculty directed
- Collaboration with faculty/agency personnel
- Student independent selection

**Organization of the assignment**

- Traditional (1 student:1 or more patients)
- Student teams (3 students:1 patient)
- Student pairs (2 students:1 or more patients; senior student/junior student)
- Student supervisor (1 student: agency personnel/junior students)
- Peer mentoring (1 student: several students in the same course)

**Location of the assignment**

- Consistent placements
- Multiple placements

Clinical assignments for students vary with the goals of the course and the resources of the clinical setting. From a faculty perspective, the primary determinants of student clinical assignments are (1) the role the student assumes in the selection of the assignment, (2) the composition of the assignment in terms of number and level of students to number of patients, and (3) the decision to place students in only one or a variety of settings over the term (Box 13-7).

Faculty may make assignments for their students; students may collaborate with faculty and/or agency personnel in determining their assignments; or they may select their own assignments independently. The degree to which students are involved in choosing their clinical assignments also may vary student to student within a course or clinical setting. Typically, clinical coaches assume a more active role in the choice of assignments when students are just beginning their clinical experiences, often making specific assignments for them. As students accrue more expertise and skill in establishing their learning goals, they usually become more involved in the process. Ultimately, the degree to which students self-select their assignments is governed by the programmatic and course outcomes, the beliefs and comfort level of individual faculty, the amount of assistance available within the clinical agency (Stokes & Kost, 2005), and the teaching model being followed. Congruent with the current educational philosophies and frameworks in nursing, student involvement in the learning process is fostered when opportunities for student choice are facilitated. When collaborative or preceptor models are used, students may work with agency personnel directly in assignment selection, and faculty assume a supervisory function. A cooperative approach, with faculty assuming some role in guiding student learning in light of the established learning goals, allows for

more active student learning and the development of personal accountability and responsibility.

Students' learning goals within the context of the course and setting are integral to the selection of assignments. In some cases, this involves an assignment to a particular setting, such as labor and delivery or radiational oncology, where the student must come prepared with a specific set of goals, knowledge, and skills to be applied. If the student is to select an assignment with the assistance of agency personnel, both parties must be clear about the learning goals of the student and the expectations of the course.

The clinical assignment may be carried out in differing organizational patterns of students to patients. The pattern used depends on the course expectations and clinical setting, and additionally, the students' abilities, patient acuity, and the numbers of students, patients, and personnel available (Stokes & Kost, 2005). With the escalating demands on nursing education, faculty must consider new and creative patterns for meeting educational outcomes. Currently, the methods that follow are being used.

What has been termed the "traditional" method involves a single student assigned to one or more patients (Stokes & Kost, 2005). In this approach, students begin their practice education by providing selected aspects of care to a single patient. As students' skill levels develop, the assignment is expanded to the provision of total care to one and then to increasing numbers of patients.

Variations of this approach are created by altering the number of students involved with one or more patients, that is, students work in pairs or as teams of students. Student pairs or teams may be composed of students at the same or differing levels of experience. This technique can be used to meet many different learning goals while responding to environmental constraints.

When the selection of patients is limited, student teams composed of three beginning students in the same clinical group may be assigned to a single patient (Stokes & Kost, 2005). Responsibilities within the assignment may be divided (e.g., one student performs care, one does the necessary research, and one observes and evaluates the care provided). When this tactic is used, students must be clear about their individual responsibilities, which might rotate over a 2-day assignment period. Although the research was done more than 30 years ago, the multiple assignment method has been reported to be at least as and perhaps more effective than the traditional method (Stokes & Kost, 2005).

The use of student pairs is a more common alternative to the traditional clinical assignment. Beginning students can be paired together to address differing aspects of care for a patient. According to Stokes and Kost (2005), assigning two students to one patient with very complex care needs can have a number of benefits. It reduces student anxiety; facilitates student communication and collaboration; enhances the development of organizational and time management skills; reduces the number of patients faculty must attend to; and provides students the opportunity to obtain peer feedback. Again, clarity regarding role responsibilities is essential, and responsibilities may rotate between the two students.

Another approach to student pairs that is increasingly popular is its application with students who are at differing points in their education (Broscious & Saunders, 2001; Schmeiser & Yehle, 2001; Becker & Neuwirth, 2002; Bradshaw, Rule, & Hooper, 2002; Sprengel & Job, 2004). This pattern usually has been incorporated into the academic program and course requirements in most cases, but it also has been used to provide student work-study employment (Becker & Neuwirth, 2002). This “junior/senior”-pairing tactic has been selected as a means to reduce student anxiety and maintain safety in light of decreased acute-care clinical sites and preceptors. The more advanced (senior) student may demonstrate complex skills, guide and supervise a junior student in skill performance, assist in theory application, and even participate in the junior student’s evaluation (Scheiser & Yehle, 2001; Becker & Neuwirth, 2002; Sprengel & Job, 2004). The transition to a new clinical course can be facilitated by having students currently enrolled in the course accept responsibility for assisting the upcoming students for a day, modeling the care delivered and allowing the less experienced students to carry out some of the skills they have already learned. In any situation where students supervise others (peers or agency personnel), it must be done within the parameters of the agency policies and the state Nurse Practice Act.

When students are ready to make the supervision of others the focus of their learning, prior experience in junior/senior-paired assignments can be a valuable foundation. Senior students may then assume the role of team leader, supervising a team composed exclusively of junior students or one in which junior students are incorporated with other agency personnel (Bradshaw, Rule, & Hooper, 2002).

As a part of a given course, students may take on a peer mentoring role in which they are not assigned to a single patient or student, but instead serve as the resource person for a small number of their colleagues in the clinical site (Duchscher, 2001). In this peer-coaching role application, students collaborate in matters of patient care, provide emotional support, assist with the integration of theory and patient data, observe technical and communication skills, and step in to help their peers with patient care as needed. This approach was born from the realities of endeavoring to facilitate student learning given the high acuity and student-faculty ratios and is illustrative of the creative potential of nurse educators.

The final component of facilitating learning through clinical patient assignments deals with student placement. In some clinical courses, students may be rotated to different areas within an agency or go between several different agencies (multiple placements) rather than remaining in a single patient care area during a term (consistent placement). Multiple placements may be necessary to meet the course objectives (e.g., postpartum, labor and delivery, and neonatal nursery), or simply with the rationale of providing more diverse student experiences than would be obtained by remaining on one unit. In the case of a medical-surgical course, consistent placement would require the students to remain on one unit, such as an orthopedic unit, and multiple placements would

result in rotations to several different units, such as orthopedics, medical cardiac, and a general surgery unit, or time spent in the operating room or a critical care unit. In a psychiatric/mental health–nursing course, students may remain in one area for the term or rotate between geriatric and adolescent units, outpatient clinics, or acute and chronic inpatient settings. The only recent study exploring the effect of these two approaches on learning outcomes found no quantitative differences with the instruments used (Adams, 2002).

Qualitatively, agency staff indicated a preference for consistent assignments for the same reasons students see them as beneficial: Consistency was perceived as building student proficiency and the relationships between staff and students. With consistent placements, students were mentored to a greater extent, receiving more assistance transitioning into the professional role. Students' comfort levels with and desire for diversity varies; some students not only prefer but also thrive with multiple placements. Adams (2002) suggests that for these students, alternative means outside of the clinical course time could be designed to provide exposure to various nursing roles and specialties. For beginning students, consistent placement is likely to be less stressful and more beneficial in developing student confidence. But as the students progress through the curriculum, experiencing a broader variety of placements provides new challenges, allows students to experience a range of practice options, and may provide increased skill and depth in the habits of the mind and skills of critical thinking.

### **Clinical Queries**

As nurses are taught to use themselves as therapeutic tools in their interactions with patients, so too do clinical coaches use themselves as educational instruments in their interactions with students. Research has substantiated that oral questions are more effective in facilitating learning than those that are written (Cotton, 2001). By asking students meaningful questions, clinical faculty help students develop the cognitive skills needed to understand the theoretical foundations of their nursing practice, use the habits of the mind and skills of critical thinking, and develop clinical nursing judgment (see Chapter 11). Articulation also serves to extend students' engagement in learning (Murphy, 2005). As novices to nursing, students' anxiety often evokes tunnel vision; clinical queries can help them see the "big picture" in patient care situations. As a facilitative coaching activity, clinical queries only begin by assessing the student's theoretical understanding; the true value of questioning rests in the guidance it provides the student and the cognitive growth it encourages (Grealish, 2000). Clinical questioning is a teaching skill that requires practice and continuous self-assessment.

This technique is often given the misnomer of "the Socratic method" in both the literature and popular educator parlance. The questions used by Socrates as presented in Plato's dialogues were actually designed to lead and persuade (Bevis, 1989). They read like philosophic syllogisms; the classic Socratic method moves the student in a lockstep fashion along a progressive line of reasoning to a specific and predetermined endpoint. The questions that are

truly educationally meaningful are those that compel students to *think* rather than merely *find* an answer (Ironside, 2003). As used in nursing education, questioning is a well-recognized technique for developing heuristic and other higher-order thinking skills needed for a practice discipline where problems are multifaceted and complex (Oermann, Truesdell, & Ziolkowski, 2000).

It is important for clinical faculty to explain to students how the questioning technique will be done and its usefulness in helping them develop thinking skills before it is initiated (Twibell, Ryan, & Hermiz, 2005). This can be done in the initial meeting with students at the beginning of the term. As course expectations and evaluation are reviewed, teaching methods also should be presented. An obvious advantage to this is that all students are given the same information at the same time. Perhaps less obvious is that clinical queries can be demonstrated with a nonnursing, even humorous, example such as the process of deciding what to wear to school or which route to drive. Orientation to clinical questioning is synopsisized in Box 13-8.

The challenge in being an effective interlocutor is in posing questions that stimulate, even necessitate, higher-order thinking on the part of the student. These skills of application, synthesis, analysis, and evaluation are the focus of the majority of questions students will be presented with when they sit for their licensing examination. Lower-order questions are much easier to formulate and do have their place, albeit a limited place. These are factual or descriptive questions that are often prefaced by the words *who*, *what*, *when*, or *where* (Cotton, 2001; McKeachie, 2002; Bastable, 2003). This type of question taps into the student's recall of previously acquired information. Answers to factual questions are straightforward and usually brief. These questions draw their value

### **BOX 13-8**

#### **Preparing Students for the Technique of Clinical Queries**

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##### **What it is**

Clinical questioning is a teaching tool that helps develop thinking skills and enhance learning.

##### **What it is not**

Questions are not designed to diminish you or make you feel badly about yourself. You are not expected to have all the answers (or you wouldn't need to be taking the course!).

##### **Faculty role**

Ask questions that are clear. Ask questions to move student thinking to higher levels of meaning.

##### **Student role**

Listen to the question; take time to think; don't be afraid to say, "I don't know" or "I don't understand the question."

**BOX 13-9****Types and Examples of Lower-Order Clinical Queries****Factual**

What is the normal serum potassium level?  
When does lente insulin exert its peak effect?  
Who is eligible for Medicaid?

**Descriptive**

What does Maslow mean by a *hierarchy of needs*?  
Where should intramuscular injections be administered when a child is not yet walking?  
What is the immunization schedule for the first 2 years of a child's life?

from their ability to act as building blocks for concepts, generalizations, and higher-order questions. Both factual and descriptive questions deal with facts, but descriptive questions require students to logically organize their thoughts and deliver a longer response (see Box 13-9).

When faculty emphasize lower-order questions and reward only “right” answers, students will respond rapidly by memorizing information and will not become the critical thinkers or develop the clinical judgment needed for nursing practice today and in the future. Higher-order questions cannot be answered from memory; they require students to think beyond the facts; to establish relationships and make inferences; to compare and contrast; and to find cause and effect (Cotton, 2001; McKeachie, 2002; Bastable, 2003). Here is the level of application and analysis, of critical thinking. The starting point for higher-order questions is often, but not always, *why*. The question, “Why does exercise increase heart rate?” is a lower-order question that can be answered with a factual physiologic, rote textbook response. The clinical coach also must bear in mind that, depending on the student’s knowledge and experience, what is a lower-order question for one student may be higher-order for another.

Higher-order questions serve specific functions: evaluating, making inferences, comparisons, and predictions (McKeachie, 2002; Bastable, 2003) (Box 13-10). Questions designed to explore evaluation may have rather concrete answers, as in evaluating the effect of a drug, or may lack a right or wrong answer, as in evaluating matters of judgment, value, and choice. In both cases, the higher-order thinking demanded requires the student to establish criteria and then measure the subject against them (McKeachie, 2002; Bastable, 2003). Another type of higher-order question calls for the student to make inferences. When a student takes a premise or a group of facts drawn from recall (lower-order) and then comes to a conclusion based on that information, an inference is drawn. This is a valuable tool for calling the student’s attention to how something recently learned relates to prior learning or for helping the student see reason, motive, or

**BOX 13-10****Types and Examples of Higher-Order Clinical Queries**

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**Evaluative**

How will you know that your patient has tolerated ambulating in the hallway?  
How did you know your intervention was effective?

**Inferential/Interpretive**

Why should the nurse assure that the patient has signed the consent for surgery before preoperative medications are administered?  
The manifestations of pain differ considerably from person to person. How have your patients today shown they were in pain?  
What else might happen if you did that?

**Comparative**

What is the relationship between mental illness and homelessness?  
Is there a connection between the level of education attained and the incidence of abuse?  
What is the relationship between the pathophysiology of emphysema and the manifestations your patient presents with?

**Heuristic/Divergent/Creative**

What would be the effect of a health care system in which nurse practitioners were the dominant health care providers?  
How will this hospital going from not-for-profit to a for-profit status affect how this unit is managed?  
In what ways would closure of this community center affect the community it serves?

cause and effect that can be drawn from the given circumstances (McKeachie, 2002). Responding to these questions involves using deductive or inductive reasoning skills. The student uses deductive reasoning when thinking through from a principle or generalization to the current situation. An otherwise factual question can be moved to a higher-order level that requires deductive reasoning simply by the addition of context. For example, rather than ask a student what a patient should be taught about taking beta-blockers, a clinical coach might say, “Your patient, Mr. Smith, will be taking the beta-blocker metoprolol (Lopressor) when he leaves the hospital. What will you need to teach him related to this medication before he is discharged?” The other approach to inferential questions requires inductive reasoning. Inductive reasoning is used when the student analyzes the current situation and extracts the generalization from the specific situation at hand. Comparative questioning is an especially valuable learning tool and the next type of higher-order question. By helping students relate ideas to one another, look for commonalities and dissimilarities between concepts, and determine whether theories are contradictory, faculty assist

students in making linkages that enable long-term memory acquisition (see Chapter 2). This type of question typically employs the words *compare/contrast*, *connection between*, or *relationship between* (McKeachie, 2002). The final type of higher-order question compels the student to apply analytical and problem solving skills. Generally questions without known answers, those divergent or heuristic questions, are most often predictive in nature and serve to pique student curiosity (Cashin, 1995).

When using clinical queries, additional questions are often required to guide the student beyond the superficial or otherwise help propel thinking forward. These clarifying questions fall between lower- and higher-order questions and so are transitional in nature. Novice faculty will recognize clarifying questions from working with patients in their clinical practice. These questions elicit further information, ask for justification, direct attention to related concepts or examples, or prompt the student's thinking with hints (McKeachie, 2002; Bastable, 2003) (Box 13-11). Sometimes a student's response to a clinical query is unclear to faculty. An effective clinical coach will ask the student to explain an answer in order to identify the accuracy of the thinking process or the point where the student's thinking moved off-track. It is possible that the student may have a good answer that is just different from what faculty had in mind! Student responses to transition questions are then used to loop back to further higher-order questions.

Higher-order clinical queries can promote the development of the habits of the mind and skills of critical thinking discussed in Chapter 11. In some cases the student's cognitive growth is related to the type of question posed, whereas in other circumstances, growth occurs as a result of the querying process as

### **BOX 13-11**

#### **Clarifying Questions to Guide Students' Thinking**

##### **Seeking information**

What do you mean by \_\_\_ ?  
Can you tell me more about that?

##### **Seeking justification**

What data are you using to substantiate that?  
What are the assumptions you are making?

##### **Seeking refocus**

How does this relate to that?  
What else might be responsible for that?

##### **Seeking progression**

What other problems would this produce?  
What other information about the patient do you need to obtain?

a whole. Some aspects of critical thinking are associated with more than one element of questioning, and their placement in Box 13-12 reflects this. The connection of this pedagogy to critical thinking is substantial.

Clinical queries are a teaching strategy that requires focused thinking on the part of faculty and lots of practice! Students benefit the most when their clinical coaches build a question set, a sequence of questions to propel students' thinking to a higher-order (Prince George's County Public Schools). The power of this pedagogy does not rest in a single question, but in the faculty's ability to combine questions of differing types into a pattern that requires the student to use varied critical thinking skills. Beginning with a lower-level question (facts or descriptions), then moving on to higher-order questions is one approach, but is not always a necessary approach. A higher-order question can

### **BOX 13-12**

#### **Relationship of the Habits of the Mind and Skills of Critical Thinking to Clinical Queries**

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##### **Evaluative questions**

- Analyzing
- Applying standards
- Intellectual integrity

##### **Comparative questions**

- Analyzing
- Discriminating

##### **Inferential/Interpretive questions**

- Intuition
- Predicting
- Logical reasoning
- Inquisitiveness

##### **Heuristic/Divergent/Creative questions**

- Creativity
- Transforming knowledge
- Inquisitiveness
- Predicting

##### **Questioning process**

- Confidence
- Contextual perspective
- Flexibility
- Open-mindedness
- Perseverance
- Reflection
- Information seeking

serve as the starting point, or the clinical coach can move smoothly between question types. Setting the focus with the student at the beginning helps avoid tangential thinking, for example, “Let’s talk about Joe’s behavior in group today.” Depending on the desired result, questions can be open-ended to permit the student’s exploration of alternative answers, or they may be closed in order to limit the responses. If the student is asked what the daily requirement for calcium is during pregnancy, one right answer is the result. However, by asking for ways that a lactose-intolerant person can meet the daily calcium requirements, the student is required to access a wider knowledge base.

Questioning as a pedagogical approach in nursing education is truly an art that has not been universally mastered by clinical faculty. There are pitfalls lurking along the query pathway (Box 13-13). Besides asking too many lower-order questions, novice faculty are most prone to make the error of telling rather than asking. Anxious to be seen by their students as clinically knowledgeable and competent, new faculty may dole out information to students on request, actually depriving them of significant learning opportunities. Once a question is posed, faculty may commit another common error by providing students with insufficient time to think about the question and construct a response (Cotton, 2001; McKeachie, 2002). As clinicians, new faculty are familiar with the need to allow patients time to assemble their thoughts after being asked a question, and they are comfortable with silence. But with the stress of a new role as a faculty member, tolerance for that quiet moment following a question may be lessened. In those situations, inexperienced faculty either provide the answer outright for a student, or they operate from the assumption that the student does not know “the answer” and too rapidly fire off another question volley. “It is better to be an open-minded, curious questioner than the font of all knowledge” (McKeachie, 2002, p. 35). Student anxiety climbs as it does for faculty, and the overall value of the teaching technique is then lost.

Those who are new to constructing clinical queries may make the mistake of framing questions in such a fashion that the student needs to read the faculty’s mind in order to be able to respond. The question and the expected reply may seem logical to the faculty, but from the student’s perspective, any response is doomed to failure. It is also important for faculty to listen attentively

### **BOX 13-13**

#### **Common Errors in the Technique of Clinical Queries**

- Asking excessive numbers of factual questions
- Telling; providing the answers
- Allowing insufficient time for processing the question
- Asking questions with arbitrary answers
- Inadequate listening to student responses
- Poor clarifying and redirecting skills

and thoughtfully to student's answers in order to accurately determine the level of student understanding. As student nurses may follow circuitous roads of thought, or struggle to find a word or phrase, inexperienced faculty can "bull-doze" the discussion, pushing it forward in a direction the student did not intend. If a student seems stuck and presents with the classic "deer in the headlights" expression after a question is presented and sufficient thinking time has been allowed, faculty must decide how best to proceed. Usually, if the question is rephrased, the student becomes "unstuck" and can begin to think through a response. Another approach some faculty are quite skilled with is the use of an analogy, in a nursing context or an everyday one. This method is especially valuable for beginning students. For instance, a coach might say, "Drugs bind to cellular receptors much as Legos® attach to one another, so what happens to the patient if I lay a stick across the Lego receptor?" Or, faculty might suggest an answer (right or wrong) and ask the student to identify the supportive evidence. It may be necessary to redirect the student's thinking by stepping back to some prior question or knowledge that is foundational to the current question. Asking several factual or descriptive questions before moving back to one requiring higher-order thinking skills can sometimes decrease student anxiety during clinical queries.

Clinical faculty may assume they are doing a fine job of teaching because they ask their students lots of questions. But when this assumption is explored, it is often the case that although questions are being asked in quantity, they have limited value beyond basic knowledge assessment. Skills are lacking in building question sets, providing sufficient wait time, and guiding student responses. Even when provided in open-ended format, factual questions do little to move the learner to higher cognitive ground unless they are part of a greater pattern. When clinical faculty coach through the skilled application of clinical queries, both faculty and students experience new enthusiasm for active, collaborative learning. A pinnacle experience for faculty often follows: students begin to query themselves and one another! Students achieve a major benchmark in their educational experience when they learn how to learn.

### **Technical/Psychomotor Skills**

The psychomotor skills associated with the discipline of nursing are primarily embedded within the students' earliest clinical educational experiences. Many sound rationales support this curricular approach, but the primary one is that action supersedes communication and higher-level thinking. Experienced clinical faculty will tell their novice colleagues that when a student is able to safely perform a technical skill while carrying on a conversation with the patient, advanced beginner competency has been attained. When students reach their final clinical courses, the procedural aspects of most technical skills have been adequately mastered and are now being refined. The onus of facilitating students' learning of psychomotor skills falls most heavily on faculty teaching foundational and medical-surgical clinical courses and those who work with students in learning resource centers (LRCs).

Still routinely referred to as *psychomotor skills*, the revised taxonomy of educational objectives (Anderson et al., 2001) redefines the knowledge of how to do something that is specific to a subject or discipline as *procedural knowledge* (see Chapter 2). As one of the four dimensions of knowledge (factual, conceptual, procedural, and metacognitive), procedural knowledge encompasses the skills and algorithms, techniques and methods of a discipline, and also the knowledge of when and where to use them (Anderson et al., 2001). The nursing student learning how to insert an intravenous (IV) cannula must also learn the indications for IV therapy, how to select the appropriate site and needle size, and the criteria for determining successful access. In addition to procedural knowledge, complete skill mastery at the advanced beginner level requires factual knowledge (i.e., terminology) and conceptual knowledge (i.e., principles).

The acquisition of procedural knowledge is heavily grounded in behavioral learning theories (see Chapter 2). Technical skills are learned and carried out in a sequential pattern. Students learn to test the balloon on a retention catheter prior to insertion but after they have donned sterile gloves. New skills are learned by building on prior knowledge. Surgical asepsis is learned as a situational extension of medical aseptic technique. Simple skills are learned before progressing to more complex ones. Students first learn to put on sterile gloves and then learn the process of changing a dressing. The quantity and order of steps comprising each psychomotor skill form an “executive subroutine” (Gagné & Driscoll, 1988) that is established and triggered in the learner’s mind by verbal and nonverbal cues provided by the clinical coach. For instance, clinical faculty might remind a student of the executive subroutine of a dressing change by pointing to the Telfa pad or saying, “Put on the Telfa pad before the gauze.” Feedback that is immediate and precise guides the learning process and serves as a reward for successful performance. Without being excessively wordy, faculty must communicate the proximity of the performance to the desired standard. Vague feedback fails to support the learning of psychomotor skills (e.g., “That’s good.”). “The expectancy [of success] that is activated must be confirmed in order to complete the act of learning” (Gagné & Driscoll, 1988, p. 99). Indicating to the student that the injection site has been correctly identified allows progression to the next step and tells the student that site identification was accurately done. Repeated practice of a psychomotor skill facilitates the feedback of the musculoskeletal system, enabling the student to attain both accuracy and smoothness of performance over time (Miracle, 1999).

Behavioral learning theories do not provide the only guidance for facilitating skill acquisition; cognitive learning theories play a role as well (see Chapter 2). Skills are learned within the context of the teacher-student relationship, and as previously discussed, the characteristics and quality of that relationship impact the student’s learning, positively or negatively. All of a student’s previous learning experiences and the feelings that were engendered by them are brought to bear in learning new psychomotor skills. Individual learning preferences and styles can be capitalized on in the process of skill acquisition. Students who are primarily visual learners benefit the most from observing a skill being

performed before attempting to do it themselves. Kinesthetic learners are helped by being encouraged to think about how a skill “feels” and the position of their hands in relation to one another and to the patient. Adult learning theory guides the approach to teaching and learning skills in nursing. Students actively participate in the learning experiences and collaborate with faculty in monitoring their progress. Mental rehearsal is another helpful tool for students learning psychomotor skills. Mentally rehearsing skills provides a mental image of the desired process (Miracle, 1999), and the technique “teaches” muscles how to behave when the skill is performed. The use of mental practice to assist in the learning of complex psychomotor skills has been documented for more than 60 years (Gagné & Driscoll, 1988). The use of imagery for the development and improvement of skill performance is common in sports, and although there is limited nursing research proffering support beyond empirical evidence, what is available is quite encouraging (Miracle, 1999).

Learning theories provide the basis for the tactics and techniques faculty use, whether teaching skills in the LRC or following up practice in the LRC with performance in the clinical setting (Box 13-14). Students must learn that carrying out psychomotor skills is only one aspect of what it is to be a nurse. Technical skill performance, procedural knowledge, is but one knowledge realm tapped in the total process of caring for patients. Competency in all the dimensions of knowledge is required in nursing practice. Once a student has attained some familiarity with manual skills, faculty must incorporate skills into a patient care context and move the student’s thinking to a higher level. Students should be expected to introduce themselves to their patients, prepare them for

**BOX 13-14****Tactics and Techniques for Facilitating Psychomotor Skill Acquisition**

- Foster a positive student-faculty relationship
- Capitalize on individual learning preferences and styles
- Encourage a collaborative approach to skill acquisition
- Ascertain student readiness for learning
- Build on prior knowledge when introducing new skills
- Assure the student has the necessary factual and conceptual knowledge
- Break complex skills into smaller units for initial learning
- Facilitate procedural knowledge by emphasizing sequential patterns
- Establish the boundaries of safety; allow controlled mistakes
- Use mental rehearsal/imagery
- Consider skill demonstration
- Use triggers to cue the executive subroutine
- Provide immediate and precise feedback
- Encourage/provide opportunities for practice
- Place the skill within a patient context
- Use clinical queries to exercise higher-level thinking skills

the skill, and respect their privacy. This also can be done in the LRC through the use of mannequins or simulators within a case scenario format (Tarnow, 2005). In both the LRC and the clinical setting, judicious clinical queries are the best tool for facilitating the habits of the mind and skills of critical thinking while integrating procedural knowledge into the student's armamentarium of knowledge and skills.

One of the most difficult teaching skills for novice faculty to master is determining when and how to intercede when students are performing skills. Permitting students to make controlled mistakes within the parameters of patient safety in the clinical setting in order to see the results can be a valuable learning experience (Lichtman et al., 2003), but must be limited in application with novice practitioners. In the LRC, students must learn the boundaries of safety, but can be permitted to overstep them without consequences to an actual patient. In the clinical setting, inexperienced faculty may step in too early and even take the skill over from the student. Reviewing the procedural aspects with the student and discussing the factual and conceptual knowledge associated with the skill prior to approaching the patient can provide faculty with some assurance that the student is adequately prepared. A second valuable technique is to establish with the student in advance certain verbal or nonverbal cues to be given by faculty during skill performance indicative of correct/incorrect procedural steps. Glancing at faculty intermittently while carrying out the skill, the student knows to proceed when faculty give a slight nod of the head. If the student does get off track, try to make the correction as unobtrusively as possible to avoid dispelling the patient's trust in the student. Telling the student "A little higher" or offering a guiding hand is far superior to completely taking over the skill. With adequate direction, usurping a skill from a student should rarely be necessary, other than during an emergency situation.

Facilitating students' acquisition of psychomotor skills can be carried out first in the LRC or in the clinical setting. Primarily for the benefit of increasing patient safety, reducing student stress, and efficient time utilization in the clinical area, the initial practice of skills in the LRC is most common (see Chapter 12). Faculty can most effectively demonstrate skills in the LRC, and demonstration is known to be a valuable tool to facilitate learning (Miracle, 1999). When demonstrating skills, encourage active student participation in learning by asking questions that tap into the students' factual and theoretical knowledge as well as encourage procedural knowledge development. Questions such as, "What is this called/used for?" "What do I do next?" and "Why am I doing this?" are all examples of this technique. Remember to place the skill within a patient context, however general that may be, by way of checking identification, providing introductions and explanations, showing respect for privacy, ensuring comfort, and of course, handwashing! In the LRC, clinical variables are controlled and students can repeatedly practice skills to correct errors and attain at least a minimal level of proficiency before carrying them out with patients.

Opportunities to perform skills that students have not prepared for in advance do present themselves in the clinical setting. Faculty should consider

how they might address such circumstances well before they occur. Basically, there are three options: (1) the student may be a nonparticipant observer as the skill is performed, (2) the student may assist with the skill, or (3) the student may carry out the skill with adequate direction and supervision. It may be that the skill is far too advanced for the student; in that situation, it is best that the student observe the skill being carried out by a nurse—faculty or staff member. If a skill is otherwise appropriate, faculty must carefully select the student who is to carry it out. Judgment is required to identify the students who have excelled in skill mastery, actively seek out additional learning experiences, and have the time at the moment to invest in an unscripted activity. If the student is to participate in carrying out the skill, the procedure should be methodically “walked through” with the student, supplies and equipment examined, and triggers for cueing established in advance. Under these circumstances, the feedback provided must take into consideration the student’s inexperience with the skill and, perhaps, also provide direction for practice in the LRC after the fact.

Learning technical skills assumes an inordinate amount of student excitement and attention early in the educational experience. It often seems that students must “do nurse things” before they are open to learning the full meaning of what it is to be a nurse. Part of the role of the coach in facilitating skill acquisition is helping students learn to place the technical aspects of nursing in the proper perspective and open their eyes, minds, and hearts to the full scope of what it means to be a nurse.

### **Affective Skill Development**

From the highly tangible aspects of learning to perform technical skills, the transition to the ephemeral affective aspects of nursing practice can feel rather abrupt. However, this is the nucleus of nursing. Affective knowledge is most often perceived of as feelings and emotions, attitudes and values, and the actions derived from them (Krathwohl, Bloom, & Masia, 1956). As previously described, the affective domain is reflected in the nursing student’s degree of self-awareness and behaviors associated with professionalism. Self-awareness can be seen in a student’s written and verbal communication and professional behaviors identified in the fulfillment of expectations for behaviors such as punctuality and appropriate attire. In both of these areas, faculty guide the student’s growth through the feedback provided. But in nursing practice, the internalized affective domain components are externally exemplified primarily through caring behaviors. Caring is the art of nursing, guided by the science of nursing. The development of values, therapeutic communication skills, the knowledge and ability to apply moral and ethical principles, and the entire holistic approach to patient care are all encompassed in the affective domain and are all made tangible in caring nursing practice.

Human caring is the moral context for nursing education (Watson, 1988). In addition to experiences that help students learn to think like a nurse and act like a nurse, they must have experiences that help them learn to *care* like a nurse (Tanner, 2002). “While students must gain knowledge of the human body,

mind, and spirit, this knowledge alone is insufficient without the essential component of caring” (Sappington, 2004, p. 223). Benner and Wrubel (1989) take the position that “... caring is primary. Caring is a basic way of being in the world...” (p. xi). “Caring as a focus of study must be made fundamental to nursing education and practice” (Tarnow & Butcher, 2005, p. 375). Refocusing clinical nursing education on helping students learn the process of caring was a part of the curriculum revolution instigated in the late 1980s (Woolley & Costello, 1988). In 1998, the American Association of Colleges of Nursing identified caring, with all its component behaviors, attitudes, and beliefs, to be a primary aspect of baccalaureate nursing education, and its role in practice was affirmed in the 2003 revision of the American Nurses’ Association Social Policy Statement. If the attainment of caring competencies is to be an expected outcome of nursing education, students should not be graduated who cannot demonstrate them. “If our goal is to ensure that the student assimilates the process of caring for patients by integrating the necessary knowledge and skills, then a greater portion of clinical time should be spent teaching ... the process of caring...” (Woolley & Costello, 1988, p. 91).

Nurse researchers have struggled for decades to describe, define, and measure the concept of caring, but a science of caring may simply never be entirely known (Giguere, 2002). The body of work regarding caring is substantial, and an in-depth examination of it is inappropriate for this venue. Perusing a meta-synthesis of caring from the perspective of the patient (Sherwood, 1997), and a more recent one from the vantage point of nursing education (Beck, 2001), certain commonalities emerge. Caring is by nature interpersonal; it is manifested in the reciprocal connection of faculty with student and nurse with patient. Within this relationship, caring requires self-awareness, openness to the other person, and an offering of self. Empathy, support, being present in the moment, and attentiveness are facets of this caring relationship. Caring requires competence. Clinical competency is an important aspect of caring, whether provided by nurses to patients in clinical practice or imparted by faculty to students in educational settings. In nursing education, competency also includes the maintenance of professional standards and fairness in the evaluation of students. Caring in nurses’ clinical practice generates therapeutic outcomes for patients and a sense of inspiration and fulfillment for nurses. In nursing education, care is contagious; students learn to care when faculty model caring and provide opportunities to develop the skills of caring practice.

Nurse scholars emphasize that the modeling of caring practices by faculty within the context of the student-teacher relationship is essential in the development of students’ caring behaviors (Evans, 2000; Zimmerman & Phillips, 2000; Beck, 2001; Scotto, 2003; Duffy, 2005). “The commitment to care about students is central to concepts of good teaching” (Scotto, 2003, p. 289). Role-modeling caring by clinical coaches is clearly one means of facilitating the learning of caring behaviors by students. Faculty exemplify their caring for students in innumerable ways and Box 13-15 illustrates a few of these. Students witness the openness of caring when faculty share aspects of who they are. Raising children,

**BOX 13-15****Some Caring Behaviors Modeled By Faculty**

- Allowing students to see them as human beings
- Listening attentively
- Making eye contact
- Using a calm tone and conveying warmth
- Responding to questions
- Allowing and encouraging students to ask questions
- Being kind
- Being patient
- Providing encouragement and support
- Being respectful
- Acknowledging and responding to students' emotions
- Respecting individuality
- Being available
- Being fair and consistent in evaluation

having aging parents, a car that will not start, even having a headache, are all part of the human condition, and emotions are a universal language. Faculty must exercise judgment regarding what and when to share, but the act of sharing is a part of caring. Many of the caring behaviors faculty model are related to communication skills, both verbal and nonverbal, whereas others are indicators of empathy, sincerity, and respect. Caring is reflected when faculty offer students anticipatory guidance before encountering disturbing sensory stimuli such as diarrhea or vomitus; coach while assisting and demonstrating a patient transfer from bed to chair; and help students identify the ethical issues in patient care situations. Reason alone tells us that when faculty are caring toward students, the behaviors are likely to be reciprocated and mirrored in the students' practice.

As early as the mid-1950s, psychologists reviewing educational research concluded that there was more than sufficient evidence that, like cognitive and psychomotor behaviors, when the appropriate learning experiences are provided, affective behaviors are developed over time (Krathwohl et al., 1956). Nonetheless, the complexity of the concept of caring makes it especially challenging to create pedagogical approaches to help nursing students develop caring behaviors (Duffy, 2005; Lee-Hsieh, Kuo, & Tseng, 2005). "Teaching students to recognize caring behaviors and to conceptualize caring as the foundation of expert nursing practice remains challenging" (Sappington, 2004, p. 223). Caring practice is the visible outcome of nurses' feelings and emotions, attitudes and values. "Understanding caring as a practice, rather than as pure sentiment or attitudes apart from the practice, reveals the knowledge and skill that excellent caring requires" (Benner, 2001, p. x). The pedagogical approaches

**BOX 13-16****Pedagogical Approaches to Teaching Caring****Reflective journaling**

- Self-awareness development
- Identification of caring behaviors in others
- Values clarification
- Developing a personal philosophy of caring nursing practice

**Clinical conferences**

- Caring narratives
- Role-play
- Exploration of value-laden issues and ethical conundrums in practice

**Written assignments**

- Caring narratives
- Analyses of books, film, art, or poetry from a caring perspective
- Creative writing

**Clinical practice**

- Caring within therapeutic relationships
- Caring in verbal and nonverbal communication
- Caring practices within patient context

to teaching caring must include helping students develop this internal affective foundation and recognize and develop caring behaviors (Box 13-16).

The most common and effective approach described in the literature for helping students explore and enhance their self-awareness is reflective journaling (Duffy, 2005) (see Chapter 11). The process of reflecting on their care endeavors teaches students about caring and provides insight as their caring practices evolve (Schaefer, 2002). Students can be artfully guided to examine the feelings and emotions within their care experiences through teacher-posed questions. These feelings and emotions serve as windows to students' attitudes and values. Self-awareness also can be developed through the observations of others. Sappington (2004) had students keep a "caring journal" to record and examine examples of caring displayed by themselves and others during a clinical practicum. Caring observations might be incorporated into students' reflective journaling, becoming the focus for a period of time, or one part of each weekly or daily entry. Using journaling as one strategy for teaching students about caring, Zimmerman and Phillips (2000) found their students initially had difficulty focusing on feelings, finding it much easier to "talk" about patients. In this case, faculty feedback provided the necessary redirection. Values clarification exercises also can be included in journals to help students examine their feelings about health, illness, and diversity and how these feelings affect the care they provide. The development of a personal philosophy of nursing is a

common assignment in programs of nursing. Recasting this to focus on the caring practice of nursing and placing it in a reflection journal allows individualized feedback of a more intimate nature.

Clinical conferences or seminars, when students gather together as a group, offer another avenue to learning about caring. These venues provide a sanctuary for the safe and open exploration of clinical situations imbued with conflicting values—circumstances in which the ethical principles from the classroom become complicated by real human faces. In the company of their colleagues and with the assistance of clinical coaches, students grapple with the actualities of patients who are unlikable, barriers to communication, and practice challenges with no clear answers. In these situations, the teacher must avoid proselytizing and violating the student's right to explore ideas and values and make choices. Critical thinking simply cannot be fostered if faculty even subtly convey an expectation that students conform to their thinking. "The teacher's task is often directed not so much toward attitude change as toward increased sensitivity to other points of view and increased understanding of the phenomena to which the attitude applies" (McKeachie, 2002, p. 41).

In clinical conferences, students can be introduced to narrative pedagogy as they listen to the caring stories of their peers and faculty (Eifried, 2003). Narrative pedagogy serves to "engage students and teachers in collectively interpreting narrative accounts of their experiences in practice education" (Ironside, Diekelmann, & Hirschmann, 2005, p. 154). Here, narrative pedagogy makes caring more visible. With an understanding of cultural and contextual norms, students can receive help from one another in accessing and verbalizing their feelings, and in reflecting on their practices. Faculty can use this opportunity to assist students in identifying themes of caring within the stories. As they explore one another's narratives, students can identify commonalities in caring behaviors. What it means to know and connect with patients emerges (Ironside et al., 2005).

Role-play during clinical conferences can be another valuable means of allowing students to explore caring behaviors within a therapeutic relationship. Caring can be placed within context by creating miniscenarios dealing with common experiences such as admitting a patient, preparing someone for surgery, working with a dying patient, or those in physical or emotional pain. The group can identify and discuss caring behaviors within the given context, and the student "patient" can describe how it felt when the student "nurse" did or said certain things.

In addition to journaling, students can write caring narratives in more depth and detail as written assignments. As a part of the assignment, students could be asked to apply some of the relevant literature related to caring. This allows students to explore the extensive theoretical foundations of caring and move from the level of theory to that of application. Other approaches to written assignments might include the incorporation of analyses of poetry, books, films, or art in light of caring. Students could explore caring through metaphoric creative writing or the creation of poetry or art.

Students' clinical practice experiences offer many opportunities to focus their attention on caring practices. From their first experience with a patient, students begin to learn the reality of a therapeutic relationship. They learn the role of authenticity and the antecedent role of self-awareness. "Authenticity in therapeutic relationship [sic] is important because healing relationships depend on the nurse's genuine presence and caring. Authenticity requires self-awareness as well as confidence in relationship skills" (Lennerts, 2003, p. 160). Students need to experience the impact of their own personalities, the strengths and limitations of their interpersonal skills, on their relationships with patients (Lennerts, 2003). As they learn to use themselves as therapeutic tools, students begin to learn caring communication. Not surprisingly, students report faculty are less likely to assist them in developing communication skills than in learning technical skills in the clinical setting (Kotecki, 2002). As with all aspects of practice acumen, experiences over time will refine nurses' communication repertoire as they progress through the stages of their professional development (Benner, 2001). Thankfully, the nearly paralyzing fear of saying the wrong thing to a patient that is ubiquitous in the neophyte nursing student population passes with time and experience. From their perspective as students, they know that mistakes are a part of the learning process, but as novice nurses they are aware of the impact mistakes can have on their patients' welfare (Kotecki, 2002).

To help students learn caring behaviors, including those related to verbal and nonverbal communication, Lee-Hsieh, Kuo, and Tseng (2005) used patient interviews to identify specific behaviors by nurses that were seen as reflective of caring. Analyzed and thematically organized, then succinctly worded from the perspective of a patient, these interviews evolved into the "Caring Code" found in the "Clinical Toolbox" (see Chapter 20, p. 343). Students were introduced to the code by their clinical faculty, who reviewed its components and intent with them. Printed on laminated cards that they carried in their pockets, students referred to this "Caring Code" before approaching their patients. Such a teaching tool provides a ready resource "crutch" for student learning. Students reported the "Caring Code" offered guidance in meeting the holistic needs of their patients, helped with the development of empathy and positive relationships with patients, afforded affirmative feedback regarding the care they gave, and encouraged attitudinal and behavioral changes. Faculty offered much the same insights in their evaluation of the teaching strategy. When the efficacy of the strategy was tested using an experimental longitudinal design, the researchers found significantly higher scores in caring behavior in the experimental student group. Designed for use with adult, hospitalized patients, the tool can easily be modified for any setting or patient population, with credit to the original source provided. Content that is not applicable can be removed, and examples can be changed to reflect the clinical context from inpatient pediatrics to community-based settings.

The exploration of caring practices can be focused on patient context in a variety of creative fashions. A patient population (e.g., pediatrics), a concept (e.g., comfort), a setting (e.g., emergency department), or a health/illness topic

(e.g., chronic illness; diabetes) can all become the contextual focal point for the study of caring in clinical practice. Zimmerman and Phillips (2000) describe a number of affective teaching strategies used in a rehabilitation nursing course with both theoretical and clinical components. Classroom experiential learning activities such as conceptual drawings and presentations were augmented in the clinical setting by reflective journaling. Schaefer (2002) applied a theoretical framework of knowing derived from the literature as the basis for reflecting on patient suffering through caring narratives in a graduate course, but the approach could be transposed for use with beginning students.

If caring is indeed primary, synonymous with the work of nursing, clinical nursing faculty are obligated to provide opportunities for students in which affective skills can be learned. The historical emphasis of nursing education on the acquisition of technical skills and tools to “do *things* to, for, and with people” must continue to be reconceptualized (Bevis, 1989, p. 354). The affective aspects of nursing practice are not learned spontaneously in some magical vacuum; caring does not become an inextricable part of students’ nursing practice by oblivious osmotic absorption. By intentionally attending to the expressions of caring in nursing practice, faculty can help students become more self-aware, recognize caring behaviors, and fulfill the fundamental purpose of nursing.

### **Access To Resources**

Students’ knowledge and utilization of resources significantly impacts their ability to be successful in a clinical course, their entire program of learning, and eventually as advanced beginners in practice. The scope of resources is much more than the *Physician Desk Reference* and diagnostic/laboratory test books. Today’s students use more than library and agency materials and personnel as resources in planning, providing, supervising, and evaluating patient care. They also make substantial use of online and computer-based resources.

Mobile technologies, such as personal digital assistants (PDAs), previously limited to advance practice, are beginning to be employed in clinical practice and nursing education (Huffstutler, Wyatt, & Wright, 2002; Miller et al., 2005). PDAs have been found to save personnel time, diminish mistakes, and make it easier and more suitable to seek information at the patient’s bedside (Miller et al., 2005). Software programs are available as companions for textbooks, for purchase, or as online freeware. Programs include drug references, medical dictionaries and abbreviations, laboratory references, and medical terminology in other languages, and more programs continue to evolve. The availability of downloadable drug databases such as the ePocrates Rx™ system from [www.ePocrates.com](http://www.ePocrates.com) eliminate the need for students (or faculty) to tote drug reference texts to the clinical site (Lehman, 2003). In addition to providing ready access to informational references, PDAs also have calendars and memo pads to help organize information, as well as the ability to connect to desktop computers to facilitate backups and transfers of data (Huffstutler et al., 2002). In a study by Miller et al. (2005), nursing students made considerable use of their PDAs and agency personnel while significantly reducing their dependency on their textbooks and clinical faculty.

Increasingly aware of the diminishing half-life of knowledge, clinical coaches are acutely aware that they cannot be the only resource available to their students. They must be knowledgeable regarding the types of resources available and the means to access them, and then serve as a sort of relay station between students and the applicable resources for their needs. All clinical faculty should thoroughly explore services, personnel, and materials available in their clinical agency and educational institution. Then, depending on the focus of the course, other informational avenues may be incorporated into the clinical faculty's repertoire. This might include local branches of national organizations and services such as the American Heart Association, local agencies offering specialized services for the medically indigent or respite care, and valid and reliable online resources for patient teaching materials. As students become resource explorers, they will help supplement their faculty's inventory of resources as well.

It is sometimes difficult for novice faculty to accept that they serve their students far better as information coaches, directing learners to resources rather than simply providing answers themselves. Besides, it is just not possible for any faculty to have all the answers; the stress of that self-expectation can place a monumental weight on a faculty member's shoulders. Realizing the importance of access to tools is itself an eminent teaching tool. Whatever the discipline, a vital goal of postsecondary education is helping students learn where and how to access information.

### **Teaching/Learning Moments**

Carpe momentum—seize the moment, and then make the most of it. Experienced faculty can describe innumerable teaching moments they have had with their students—times when theory was so well integrated into the situation at hand that students' faces glowed with understanding and the pleasure of learning. These instants of incredible joy in the synchronicity of teaching and learning are characterized by a mental receptivity of both faculty and student. Minds merge, insights are discovered, and the empowerment of understanding makes a profound impact on the student. It is in these moments that faculty experience the essence of what it is to be a teacher.

Learning moments cannot be scripted, constructed, or predicted; they arise spontaneously and are by their very nature short-lived and transitory (Reinsmith, 2003). To make the most of these opportunities, faculty must watch for them and be prepared to take advantage of them when they present themselves. Reinsmith (2003) has said that teachers must “learn to live on the balls of their feet, expecting the unexpected” (p. 7). As novice faculty, it is especially challenging to recognize and respond to teaching moments because simply learning to function within the routine parameters of a clinical course consumes so much time and attention. When unexpected occurrences develop in the clinical setting, neophyte faculty often see them as situations to simply survive, to get through, rather than as potential learning moments for students. Until their comfort range on site expands, new faculty can begin by applying some tools

**BOX 13-17****Tools for Teaching/Learning Moments**

- Know and build on students' theoretical and experiential backgrounds
- Change the perspective
- Use everyday analogies
- Draw from reflective journals and critical incidents
- Look, listen, jot down ideas

for identifying and seizing teaching moments in seminars and from within students' reflection journals. As they become more attuned to the teaching-learning process in the clinical agencies, and more relaxed and skilled in their teaching, these tools will become even more helpful to clinical coaches (Box 13-17).

Teaching moments depend a great deal on the faculty's knowledge of what students have learned in their theory classes and experienced in clinical practicum. But more than this, faculty teaching clinical courses come to know their students as individuals, including many of the life experiences and cultural foundations that make each one unique. In a teaching moment, learning is stimulated by the student's personal reality intersecting with an experience or piece of information to ignite an explosion of comprehension. A student's clinical time spent with a dying patient, a woman in labor, a schizophrenic adolescent, or a child with cystic fibrosis can result in the most meaningful learning when faculty are aware of what the student brings to the experience. Issues are embedded in each of these situations, and extracting them for discussion individually or within the clinical group can lead to a wonderful synergism of teaching and learning.

Looking at clinical situations from unexpected perspectives often can make students sit up, take notice, and engage. Encourage students to step into the shoes of other family members or health care professionals in a given situation. Transpose a scenario from a large medical center to a small rural hospital or change a key variable like socioeconomic status. Analogies can be very useful as a pedagogical approach in the clinical setting. Using analogies between clinical situations and routine life experiences can help provide clarity to complicated concepts. This approach is especially useful when the experience used for the analogy is personalized for the individual student.

Teaching/learning moments are more often lost than captured. This happens simply because they are not identified or there is insufficient time to make adequate use of them. Take advantage of students' reflective journal entries and their identification of critical incidents as potential sources. Jot down occurrences and thoughts during or following the time students are in their clinical settings that might be returned to and used later on.

The student response to a teaching/learning moment serves as its own reward for faculty effort. An “aha” space in time has occurred, and both teacher and learner are electrified by the experience. Students will say things such as, “I’ve read and heard about this over and over, but never really understood before. I get it now!” Teaching/learning moments provide additional richness and meaning to the faculty experience.

### **When Things Go Wrong**

There is something to be learned even in the less than desirable circumstances that may arise in students’ clinical practice. For most students, anxiety levels are higher in the clinical practicum than the classroom, and so is the sense of vulnerability (Keith & Schmeiser, 2003). Clinical settings are inherently unpredictable. As students practice applying their fledgling knowledge and skills, they are constantly reminded that they are novices. Others seem so efficient, so capable and skilled; their own inexperience and uncertainty seems that much more obvious to students. When they make an error, or personnel or patients say something hurtful or act in what students perceive as a hurtful way, they can be crushed. In these situations it is the role of the clinical coach to support students emotionally while helping them learn from the experience.

It is a rational and logical statement to say that making mistakes is part of the learning process. It is also rational and logical to say that students are just learning to be nurses; they are not there yet. Intellectually students understand that. But they often impose high expectations on themselves in the clinical setting and can become very distressed when they make a mistake. Probably the most common error that students make in the clinical arena is related to medication administration. Faculty must guide the student through the process of notifying the appropriate people, documenting the occurrence, and taking whatever corrective action is indicated. The next step is to explore with the student how a similar error might be avoided in the future. The coach’s goal is both remedial, in terms of the error itself, and educative to help the student learn from the experience. The process requires a gentle hand. Disparagement from clinical faculty has no real place here; students castigate themselves for mistakes they make far more thoroughly than faculty ever could or would. The learning that occurs from such an experience requires some further thought and reflection when the student is away from the clinical site, as in writing a reflective journal entry, having a subsequent conversation with faculty, or both. Whenever faculty consider sharing a mistake a student has made with the rest of the group for educational purposes, it should always be discussed with the student in advance and never disclosed if the student seems uncomfortable or objects. This is a part of the student’s rights for privacy and confidentiality (see Chapter 6).

Racism, sexism, and harassment are societal realities that students may experience in the microcosm of a clinical agency. Often presenting as a patient who refuses to be cared for by a student because of gender or ethnicity, or a staff member who seems to be constantly badgering students, such conduct is

unfortunately not uncommon. Behaviors that reflect prejudice are hurtful to others wherever they occur, but for vulnerable students the experience can be overwhelming. Students often personalize the attack, perceiving its origin to be in who and what they are rather than in the attitudes, beliefs, or personality of others. Patients have the right to refuse the care of a nurse or a student based on any rationale they choose, regardless of its validity. This is not meant to legitimize patients' prejudices but rather to protect them from additional stress when they are less able to protect themselves. Faculty can use these experiences to help students understand this while beginning to learn to step outside of their own needs and into the role of patient advocate. Prejudice or harassment from agency personnel, however, is not appropriate and should be addressed. How these situations are managed may be partially determined by the policies and procedures of the agency. Depending on the student, staff, and situation faculty may intercede for the student with the staff member or manager or guide the student in addressing the matter directly. Rehearsal through role-playing may be helpful in the latter case. Ignoring the behavior is truly not an option; it does not model professionalism for the student nor does it resolve the problem. Again, student-faculty dialogue should provide the opportunity for the student to express feelings as well as to explore how to deal with such situations when they occur in the future... because they will!

### **Contingency Plans**

As life is unpredictable for students, so it also is for faculty. Faculty get the flu, are called to jury duty, and are otherwise impacted by life's inevitable chance occurrences. For more lengthy periods of faculty absence, such as those required for major illness or surgery, the administrators of the nursing program are typically forced to devise longer-term alternatives such as restructuring faculty assignments or hiring clinicians to provide the needed course coverage. Unfortunately, there are usually no faculty to spare who have the time and ability to step into one or more unfamiliar clinical agencies and provide coverage for short-term faculty absences. It is to each clinical faculty member's advantage to build in some contingency learning experiences for these brief unforeseen absences. Box 13-18 provides some suggestions for consideration.

Faculty need to consider strategies that will develop students' critical thinking skills and are applicable to the individual clinical course while not involving the provision of direct, unsupervised patient care. The value of clinical learning is diminished if faculty simply give students the 1 or 2 days off or consider the time to be "payback" for the time required for completion of course assignments. Contingency plans are most effective and challenging for students if one is prepared for use early and another for later in the term when students are more knowledgeable and experienced in the course content. The assignments and any supportive materials should be centrally located and easily accessible by the students when faculty are unavailable. A file in the library is one option, or materials could be posted online, or e-mailed directly to the students in the clinical group.

**BOX 13-18****Techniques for Making Contingency Plans**

- Make contingency learning experiences that enhance critical thinking skills
- Design plans for both early and later in the term
- Make assignments accessible without faculty assistance
- Suggested approaches:
  - Learning resource center activities
  - Written case studies
  - Field trips
  - WebQuest activities
- Consider additional faculty work required to evaluate learning

Many of the suggestions in Chapters 12, 14, and 15 could be adapted to meet faculty needs for contingency plans. If the learning resource center at your school can provide the necessary support, faculty can arrange for selected computer-based learning activities, or they may prepare case studies for use in role-playing or to be used with mannequins or simulators (Chapter 12). If this is not feasible, written case studies (Chapter 15) can be prepared for students to work on separately or in small groups from home or in the library. Some of the outside experiences and projects discussed in Chapter 14 also might be appropriate. Field trips to pharmacies, grocery stores, food banks, or toy stores are an enjoyable change of pace, and learning goals can be prepared to address foci for different courses and leveled for differing points in the term.

Unforeseen circumstances might present an opportunity to help students integrate the humanities into their nursing practice. Smith et al. (2004) describe a variety of pedagogical approaches for incorporating the arts into graduate nursing education, and some of these could be very effective for beginning nursing students. For example, students could take a field trip to an art gallery, or view preselected pieces of art exemplifying caring, illness, family, or other relevant topics. This experience then forms the basis for students' guided reflection in a paper or journal.

WebQuest activities have the potential to be exciting and entertaining inquiry-based learning experiences for today's computer savvy students. Directed by the faculty-created design, students use the resources of the Internet to gather information and solve problems. In the case of short-term faculty absence, students can obtain the assignment and then work from home. Billings and Kowalski (2004) provide a summary of the application of WebQuests to nursing education and a number of relevant resources. Other helpful online sites include the following:

WebQuest Resources: <http://wneo.org/WebQuests/WebquestResources.htm>  
(additional links provided)

WebQuest News: <http://webquest.org/> (news views about the WebQuest model)

The WebQuest Page: <http://webquest.sdsu.edu/webquest.html> (supported by San Diego State University).

Contingency plans can generate presentations prepared in advance for the clinical group or even guidelines for assignment of group or individual papers. If faculty choose these options, they need to be prepared to adjust other preestablished assignments or seminar plans. Grading criteria cannot be changed once the syllabus has been given to the students (see Chapter 10). It is more efficient, for both faculty and students, if the products of contingency assignments can be incorporated into some preexisting format such as reflective journal entries. The additional work faculty put into the preparation of emergency learning activities should not result in additional work when they return to their courses.

## **SUMMARY**

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A good coach shows enthusiasm and joy for the game. The excitement and pleasure of accomplishment in clinical teaching is primarily derived from the coaching aspect of the faculty role. The feelings engendered when the look in a student's eyes says, "I got it!" are beyond description by all but a poet. And when coaching is well done, faculty know it intuitively, much as they know when they have done well in their clinical practice. Here is the elation that counter-balances the physical and emotional expenditures of teaching. And for the student, having clinical experiences guided by good coaches provides the knowledge and skills essential to the launching of a successful professional life.

## **REFLECTION EXERCISE 13**

### **Thinking About Clinical Coaching**

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- ◆ Conduct a motivational assessment (Box 13-2) on yourself in relation to your own motivation to improve your abilities as a clinical coach.
- ◆ Conduct a self-assessment using the characteristics of an effective clinical coach listed in Box 13-1. Where are your strengths? Your limitations? Create a plan for your growth. Write several learning goals related to enhancing your coaching skills using the information in Box 13-3 as a guide.
- ◆ Consider your experiences in providing feedback to patients and colleagues in your clinical practice. How is providing feedback to students the same? How does it differ?
- ◆ In the clinical course you currently teach or will most likely teach, what approaches to making student assignments would facilitate student learning?
- ◆ Reflect on your current or on a previous clinical practice setting. Choose a single practice day and assess dangerousness in your own clinical practice

(see Box 13-6). How can you use this experience to help students assess dangerousness in their clinical practice?

- ◆ Return to the definitions of the habits of the mind and skills of critical thinking presented in Chapter 11 and examine them in light of the higher-order clinical queries presented in Box 13-12. Does their placement make sense? Are others reasonable? Imagine a nursing student is with you in a recent clinical practice scenario. Create some question sets, using this situation as the foundation, that would be appropriate for a beginning student and others for a student who has nearly completed a nursing program.
- ◆ Consider any psychomotor skill that is performed in your area of clinical practice. Imagine you are teaching this skill to students in an LRC and describe how this would be carried out.
- ◆ Record and reflect on a caring narrative from your clinical practice that would be useful in helping students develop their affective skills.
- ◆ Reflect on the caring behaviors modeled by faculty in Box 13-15. Are there areas you need to work on? How might you do this?
- ◆ Consider the academic, clinical agency, and community informational resources that would be beneficial to nursing students in the course you currently teach or will most likely teach.
- ◆ Consider a learning moment you remember from your own clinical experiences. What were the circumstances? How was that learning facilitated?
- ◆ Think back to a mistake you made or some especially discomfoting experience that happened to you when you were a student. What was done to help you through it? Were things done or said that were counterproductive, made you feel worse? When you make a mistake, how do you want to be treated?
- ◆ What contingency plans might you create for the course you are currently teaching or anticipate you will be teaching?

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