Introduction of the Purcell Clinical Reasoning Tool in a Medical–Surgical Clinical Setting

While teaching baccalaureate nursing students in their first medical–surgical clinical rotation, it was noted that one of the primary areas that students struggled with was weaving multiple pieces of patient information together to determine priorities in care and patient needs. Rather than developing a comprehensive, holistic understanding of the patient, students tended to focus primarily on scientific knowledge alone as the basis for patient care priorities. Over the course of three semesters, a simple, hand-drawn graphic tool, was introduced to help students take multiple pieces of patient information, and create a visual reference and basis for determination of actions in providing care.

The landmark Carnegie national nursing education study in the United States (Benner, Surphen, Leonard, & Day, 2009) introduced the need for deeper development of clinical reasoning in the nursing student. To deepen clinical reasoning, students must broaden their frame of reference beyond scientific knowledge to include multiple sources of reference as the basis for determining priorities in patient care (Benner, 2015). Clinical reasoning is defined as a cognitive process that nurses use multiple pieces of patient information to determine actions and priorities in providing care (Simmons, 2010). In a concept analysis on clinical reasoning, Simmons (2010) noted that clinical reasoning in nursing is equally process and product; that the cognitive process of thinking and analyzing patient information is just as important as the choice made or action taken.

The Purcell Clinical Reasoning Tool was introduced to students to operationalize the cognitive (thinking) process of clinical reasoning and provide a visual guide for nursing actions. The tool uses a simple, hand-drawn figure in the center of an 8.5 × 11-inch blank piece of paper surrounded by pathophysiological and psychosocial concepts (Figure 1). The presence of concepts on the tool (perfusion, oxygenation, protection) provides direction to the student to facilitate comprehensive data collection, and mirrors the method of content delivery in the concept-based curriculum.

After a student has received a change of shift report, reviewed the patient chart, and encountered the patient, the clinical instructor meets with the student to conduct a supervised patient assessment. Prior to the assessment, the instructor uses the blank tool to coach the student to document what is already known about the patient. This is an important point in using the tool as it sets the nursing assessment of the patient as the foundation for clinical reasoning and broadens the student’s frame of reference beyond the physical aspects of the assessment to include multiple types of information. Most students state that they have no assessment information because they have not yet done an assessment. They are unaware that their brief contact with the patient, knowledge gained from report, and record review all provide vital pieces of the overall assessment.

As the instructor coaches the student and information is written onto the tool, the details of vital signs, laboratory results, medical history, diet, mood, presence or absence of visitors at bedside become part of the patient picture. The instructor now coaches the student to apply the information to what might be expected when they go to assess the patient. If the heart rate and blood pressure are adequate, what should the student expect when assessing pulses? If respiratory rate and oxygen saturation are compromised, what should the student expect when assessing breath sounds? By doing this prior to assessing the patient, the student begins to understand that all pieces of patient information come together to form the overall picture of the patient.

After assessing the patient, the student uses the tool throughout the shift to create a visual depiction of the patient and related physical and health problems. To facilitate patient-centered care, students are encouraged to identify not only patient physical problems, but also patient-specific’s such as glasses, hearing aids, and patient mood or temperament when drawing on the figure. As students draw patient details on the figure, they color in or cross out organs and systems that are compromised of sketch urinary catheters and intravenous fluids, illustrate wounds and areas with edema, and so forth (Figure 2). As the image evolves, priority areas of care become evident and provide a basis for the second part of clinical reasoning: decision making.
Benefits of the tool include its simplicity and ease of use in the clinical setting. It can be quickly and easily drawn by the clinical instructor at any time during the clinical day or be provided to each student prior to the start of a clinical rotation. Although the Purcell clinical reasoning tool has been useful in one clinical setting, research across the entire spectrum of pre-licensure nursing education is needed to validate its effectiveness in facilitating the process of clinical reasoning and decision making for nursing students. Additional research on the use of the tool could include its use in a concept-based curriculum and whether it influences application of concepts in the clinical setting.

References

Cynthia V. Purcell DNP, RN, CNE
cpurcell@uiwtx.edu

University of the Incarnate Word

The author has disclosed no potential conflicts of interest, financial or otherwise. doi:10.3928/01484834-20180322-13