

Cultivating Reflective Skills of Professional Students: Interprofessional Perspectives and Strategies

Yolanda Griffiths, OTD, OTR/L, FAOTA, Caroline Goulet, PT, Ph.D., Ken Keefner, Ph.D. RP, Julie Ekstrum, PT, MA, LuAnn Schwery
Creighton University Medical Center School of Pharmacy and Health Professions Omaha, Nebraska

Introduction

The purpose of the educational research project was to uncover and explore the explicit and implicit processes used across three different health care programs to facilitate reflection with developing professionals. How do faculty best prepare students to become reflective practitioners? Where are reflective skills developed in the curriculum and how is reflection assessed? What specific assignments, educational strategies and processes are utilized to promote reflection?

Methods

This multifaceted research project consisted of 4 components that included: a) curricular analysis of course syllabi searching for explicit statements regarding the use of reflection, b) two electronic surveys investigating faculty perspectives on reflection and examining examples of course assignments that facilitated reflective skills, c) thematic analysis of narrative transcriptions from focus groups comprised of faculty who indicated they utilized reflection for student learning, and d) exploring case studies from occupational therapy, pharmacy and physical therapy faculty to understand different levels of reflection utilized for student learning and how reflection was assessed. The research project utilized both quantitative and qualitative methodology. The quantitative data was analyzed using basic descriptive statistics. The qualitative data was examined using independent coding strategies and a thematic reduction process. Two external reviewers were used to verify results.



Analysis of Course Syllabi

One part of the research project targeted the examination of curricular documentation of reflection. Course syllabi from occupational therapy, pharmacy and physical therapy were analyzed with the intent of uncovering where reflective skills were being developed in the curriculum. The research team hypothesized that faculty do not explicitly state the use of reflection in their course objectives or in course assignments, although reflection may be utilized as a teaching tool. If the use of reflection is not explicitly stated in the course syllabi, students may not value the use of reflection or understand the use of reflection as a way to achieve learning objectives. The results of the data indicate that reflection was used least in pharmacy and most in occupational therapy. Also preliminary examination indicates, less than 20% of the occupational therapy and physical therapy course syllabi contained explicit statements regarding the use of reflection in the course objectives. 75 assignments were noted within 44 occupational therapy courses that focused on reflection skills. These assignments included individual reflective journals, small group/pair discussions, short descriptive essays, portfolios and electronic discussion boards.

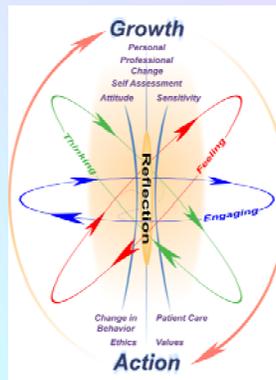
Multifaceted Electronic Surveys

There were two phases of electronic surveys sent to faculty members in the School of Pharmacy and Health Professions. 70% of all faculty participated in the first survey. The first survey asked faculty to state their definition of reflection and identify their use of reflection in courses. Thematic analysis was used to identify frequent factors in defining reflection. Common phrases to define reflection included: contemplation, cognitive process, internal analysis of an event, reviewing feelings and thoughts, self awareness and considering meaning as well as purpose.

Faculty were also asked to submit a specific example of the use of reflection in their course. These examples were rich in breath and depth about the use of reflection. Examples are being compiled to share with faculty in a round table style seminar.

The second survey was sent only to faculty who responded in the first survey that they had utilized reflection in their courses. Thirty faculty participated in the second survey. The second survey asked faculty to describe how they evaluated student reflection, how was reflection useful in meeting course objectives, and what did faculty learn from using reflective activities. Faculty would like to explore more effective or various ways to grade reflection assignments. Some methods of grading include: (a) Pass/Fail, (b) Non-compensatory grading methods, (c) Points for inclusion in the total grade and (d) No grades given for the reflection, only feedback from the instructor.

Graphic Ideation of the Process of Reflection



Reflection is depicted as a dynamic process. Reflection is shown as interactive rings of thinking/cognition, feeling/affect, and engagement/action. The outside ring includes outcomes of self reflection, metacognitive skills, and mindfulness as well as changes in actions regarding care and best practice. This graphic is a work in progress for the grant team as the results of the study are further analyzed and a model of the process of using reflection for teaching and learning is developed.

Faculty Focus Groups

Twenty faculty from occupational therapy, pharmacy and physical therapy participated in four focus groups. These focus groups highlighted the specific use of reflection with course assignments and how reflection was assessed by various instructors. Faculty briefly stated how they defined reflection, described the process they used to enhance reflective skills with students and shared particular assignments utilizing reflection that were successful in meeting learning objectives. Faculty also considered how their teaching may have changed as a result of using reflection. Common themes regarding the definition of reflection included: (a) introspection, mindfulness, awareness, (b) affective domain, feelings, (c) problem analysis, thinking, (d) learning, change, action, and (e) experience. Processes used by faculty to facilitate reflective skills with students included: (a) verbal group discussions, (b) written individual assignments, (c) assignments or course activities related to reflection on action, and (d) various methods of feedback. Faculty discussed assessing reflection using rubrics, trial and error, tiered grading various levels of reflection, and the pros/cons of no grade at all for reflective assignments. Faculty voiced a strong desire to learn more about the use of reflection in teaching and learning including distance based education. Participants in the focus groups discovered successful uses of reflection by faculty in one program (occupational therapy, physical therapy or pharmacy) could be adapted and applied to teaching in another.

Discussion and Implications

Faculty utilized varying definitions of reflection that may have impacted documentation of reflection in course syllabi and responses in the surveys. Different syllabi templates were employed by each of the various health care programs therefore it was difficult to cross check information from course syllabi. The use of two external reviewers added to the reliability and confidence of the themes identified. The case studies constructed by each of the faculty research team members were presented at local, and national conferences in occupational therapy, pharmacy and physical therapy. Sharing of information across disciplines about the use of reflection is beneficial in health care education. Outcomes of the study could have been richer if the student perspective on the use of reflection were also gathered. This is planned as part II of the research study. A tentative graphic depicting the process of reflection was developed as a result of triangulating the results of our analysis from the various parts of the study on reflection. We envision developing a theoretical model for regarding facilitation of reflective skills in health care education. The overall intent of the research project was to examine the processes used to facilitate reflection in the occupational therapy, pharmacy and physical therapy programs at Creighton University and to explore the best educational practices in developing and promoting ethical, caring, reflective health care professionals.

We wish to acknowledge Lindsey Ward, Carrie Knight, Tammie Reyher, and Stephanie Carlstrom as valuable student research assistants; Phil Beagle for the graphic; Dr. Tim Dickel and Mary Sue Wydeven for external review assistance. This project was funded by a Creighton University School of Pharmacy and Health Professions Faculty Research Development Program Grant.

References