

Title:

The Impact of Collaborative Testing on Content Retention in Baccalaureate Nursing Students

Amy Jane Witt, PhD, MSN, BSN

Julie Anne DeHaan, MSN, BSN

Bethany Joy Gerdin, PhD

Department of Nursing, Bethel University, St. Paul, MN, USA

Session Title:

Education Posters Session 1

Keywords:

collaborative testing, nursing education and nursing students

References:

Centrella-Nigro, A.M. (2012). Collaborative testing as posttest review. *Nursing Education Perspectives*, 33(5), 340-341.

Eastridge, J.A. (2014). Use of collaborative testing to promote student success. *Nurse Educator*, 39(1), 4-5. doi: 10.1097/01.NNE.0000437366.96218.f1

Gilley, B. H., & Clarkston, B. (2014). Collaborative testing: Evidence of learning in a controlled in-class study of undergraduate students. *Journal of College Science Teaching* 43(3), 83-91.

LoGiudice, A., Pachia, A., & Kim, J. (2015). Testing together: When do students learn more through collaborative tests? *Scholarship of Teaching and Learning in Psychology*, 1(4), 377-389. doi:10.1037/stl0000041.

Martin, D., Friesen, E., & De Pau, A. (2014). Three heads are better than one: A mixed methods study examining collaborative versus traditional test-taking with nursing students. *Nurse Education Today*, 34(6), 971-977. doi:10.1016/j.nedt.2014.01.004.

Peck, S., Stehle Werner, J., & Raleigh, D. (2013). Improved class preparation and learning through immediate feedback in group testing for undergraduate nursing students. *Nursing Education Perspectives*, 34(6), 400-404. doi:10.5480/11-507.

Rieger, G. W., & Heiner, C. (2014). Examinations that support collaborative learning: The students' perspective. *Journal of College Science Teaching* 43(4), 41-47.

Abstract Summary:

Collaborative testing could revolutionize nursing education by promoting genuine learning in nursing students, and foster characteristics of an effective nurse, such as communication, teamwork, and critical thinking. This testing method is relatively new, however, and limited data exists demonstrating the effectiveness of collaborative testing on content retention and student perception.

Learning Activity:

LEARNING OBJECTIVES	EXPANDED CONTENT OUTLINE
The learner will be able to discuss the impact of collaborative testing on student content retention.	I. Background of collaborative testing in nursing education II. Methods of the study III.

	Results of the study IV. Implications of the study
The learner will be able to describe the students' perception of collaborative testing.	I. Background of collaborative testing in nursing education II. Methods of the study III. Results of the study IV. Implications of the study

Abstract Text:

Purpose. Collaborative testing is an educational method promoting communication and creativity, which are essential qualities of an effective nurse. Collaborative testing is reported to foster peer-mediated learning, problem solving, and content retention. This testing method is relatively new, however, and limited data exists that demonstrate the effectiveness of collaborative testing on content retention and student perception. The objective of this study is to quantify the reported benefits of collaborative testing.

Research Questions. 1). Does collaborative testing improve content retention when compared to traditional exam styles? 2). Are there significant differences in content retention between students who retested collaboratively compared to those who retested individually with notes? 3). What are nursing students' perceptions of the collaborative testing process?

Theoretical Framework. For much of nursing inquiry, pragmatist research is relevant for application to nursing education because it emphasizes the practical, judges the usefulness of inquiry in making change, considers real life situations important in understanding the phenomena, and believes knowledge development is value-laden. It allows various perspectives to address the research question, considering real life situations important in the ongoing understanding of phenomena.

Methods. This study was conducted among junior-level baccalaureate nursing students. Student exam scores, pre and post-collaborative testing data inventories, and demographic information were collected. Students were divided into two groups, and all students took two written exams and two practical exams. All students took each exam individually, retesting immediately afterwards. One group retested in a small, collaborative group while the other section retested individually using class notes. Each student completed one pair of exams using each method. Students were also given a quiz during and after the semester to measure short and long term retention.

Results. The data gathering has completed and the data is currently being analyzed.

Conclusions. Collaborative testing could revolutionize nursing education by promoting genuine learning in nursing students, as well as by fostering critical characteristics of an effective nurse, such as communication, teamwork, and critical thinking.