Nursing Students’ Perceptions of Satisfaction and Self-Confidence with High Fidelity Simulation

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Learning Objectives

By the end of the presentation:

- Participants will be able to quantify nursing students’ satisfaction and self-confidence in learning when high fidelity simulation is used as a teaching strategy.
Introduction

There are few quantitative studies about student satisfaction and self-confidence in learning when simulation is used as the teaching strategy. Learning outcomes may be affected by student satisfaction and self-confidence.
Purpose

To determine if high fidelity simulation provides nursing students with learning experiences which promote satisfaction and self-confidence in preparation for their practice of clinical nursing.
Question

Are nursing students satisfied and self-confident with their learning after completing high fidelity clinical simulations in preparation for clinical nursing practice?
Framework

Alfred Bandura’s Social Cognitive Learning Theory: learning is the interaction between the person’s
- Behavior
- Personal factors
- Environmental factors
Method

Voluntary cross-sectional study after completion of high fidelity clinical simulation session

• Demographic form and questionnaire

• Data analysis:
  Cronbach’s alpha
  Pearson’s r
  Descriptive statistics
Subjects

Third year baccalaureate nursing students enrolled in a medical surgical nursing course
Demographic Profile

Age Distribution
- 30 to 34: 30%
- 25 to 29: 25%
- 24 or less: 25%
- 35 or more: 20%

Ethnicity Distribution
- Caucasian: 40%
- Asian: 35%
- Multiracial: 10%
- Hispanic: 10%
- African American: 5%
Data Collection Instrument

*Student Satisfaction and Self-Confidence in Learning* questionnaire

- Two sections:
  - Satisfaction with Current Learning
  - Self-confidence in Learning
- Responses quantitatively describe students’ attitudes or beliefs
- Developed by National League of Nursing
Questionnaire Responses

Key for scores:

1 = Strongly disagree
2 = Disagree
3 = Undecided
4 = Agree
5 = Strongly agree
Satisfaction with Learning

Histogram of Satisfaction Scores

Satisfaction Score

Percent of Sample

Histogram of Satisfaction Scores
Satisfaction Score
3 4 5
Percent of Sample
0
10
20
30
40
50
60
Self-Confidence in Learning

Histogram of Self-Confidence Scores

Self-Confidence Score

Percent of Sample

Percent of Sample

Self-Confidence Score

2 3 4 5
Scatter Plot of Pearson’s $r$ Correlation

Satisfaction and Self-Confidence

Satisfaction Score

Self-Confidence Score

Satisfaction and Self-Confidence

Satisfaction Score

Self-Confidence Score
Results

Cronbach’s alpha:
0.89 for satisfaction, and
0.80 for self-confidence with learning

Pearson’s r:
0.85 (95% CI .64 to .94, $p < .001$)
## Results

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<th>N</th>
<th>M</th>
<th>SD</th>
<th>Mdn</th>
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<td>Satisfaction</td>
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<td>Self-Confidence</td>
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<td>4.10</td>
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<td>4.0</td>
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Findings

- Students are generally satisfied and self-confident with learning.
- There is a correlation between satisfaction and self-confidence with learning from high fidelity simulation.
Limitations Related to

- Student population
- Lack of a way to measure variances linked to questionnaire responses
- Mechanism to measure changes in student perceptions longitudinally
- Validity of content for simulation session
Conclusion & Recommendations

High fidelity clinical simulation

• Nursing students are satisfied and self-confident with learning
• An effective teaching strategy
• Further research is needed with
  • Diverse student populations enrolled in different nursing courses
  • Longitudinal studies