

# Attitudes of Nurses Toward Research

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## Background

### Abstract

The purpose of this study was to examine the attitudes of nurses toward research. Donabedian's framework of structure, process and outcome is the conceptual model. A convenience sample (n=119) of registered nurses at a midwest hospital answered Boothe's Attitudes on Nursing Research Scale. The scores were analyzed using descriptive statistics, t-tests and ANOVA. Comparisons were made of the top and bottom quartile of item scores.

The results indicate items that reflect structure and process are a subscale of the interest and environment scale. The most positive attitudes of the nurses are related to the benefits and payoff scale. The results of the study revealed no significant differences in overall scores between groups of nurses by academic degrees held or roles in the institution. Rankings of items based on academic degrees and roles held in the institution were significant.

### Background

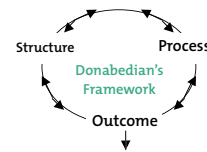
Regulatory and accreditation bodies agree that decisions on how to provide high quality patient care must be founded on research and evidence-based practice. Nursing, as a profession and practice, should be involved and lead these efforts. Research in nursing can be traced back to Florence Nightingale. Her data collection and analysis related to factors affecting soldier mortality and morbidity during the Crimean War led to changes in nursing care and public health outcomes.

Research is now part of professional nursing practice, as defined by the American Nurses Association. However, there is dissonance between research being integral to the profession of nursing and the limited application and utilization of nursing research. An appreciation of the registered nurses' attitudes toward research is warranted.



## Methods

- Design:** quantitative, non-experimental, descriptive study that used a survey methodology
- Sample:** convenience from a 343 bed acute care hospital in the midwest
- Procedure:** self reporting by a computer based program administering the survey
- Instrument:** The Attitudes on Nursing Research Scale (Boothe, 1981) Three Subscales:
  - Interest and Environmental Support - 21 items
  - Payoff and Benefits - 17 items
  - Barriers to Conducting Research - 8 items
- Framework:** Donabedian's paradigm of structure, process and outcome (Donabedian, 1988).



### Research Questions

1. What are the attitudes of nurses toward research?
2. What is the difference in the attitudes of nurses toward research based on their nursing educational level?
3. What are the differences in the attitudes toward research between staff nurses and nurses with leadership roles in the organization?



## Results

The findings are consistent with the literature except for one key difference – the nurses in this study felt they had the ability to influence a change in the organization's practice. This is a strength of this institution. Common barriers include insufficient time, support from administration, understanding research/statistical analysis, and organizational infrastructure.

### Result Demographics:

- Respondents: n=119
- Age: 41.6 years
- Gender: 9% male, 91% female

### Highlights

#### Question 1 (Nurse Attitudes Toward Research)

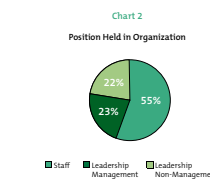
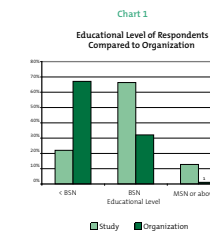
- Overall, attitudes toward research are slightly positive.
- The breakdown of individual items shows attitudes toward research are positive when looking at payoff and benefits of research.
- Items with the least agreement related to interest and environmental support.

#### Question 2 (Difference in Nurse Attitudes Based on Education)

- As educational level increased, the overall scores increased.
- Those with an educational level of a Bachelor of Science in Nursing (BSN) or below were statistically significant on the same items when compared to the Master of Science in Nursing (MSN) and above educational level (as determined by Mann Whitney U) (Chart 1).

#### Question 3 (Difference in Nurse Attitudes Based on Role within Organization)

- T-test results for the two groups (staff and leader) approached statistical significance in scale 1. Leaders were further divided into management and non-management (Table 1, Chart 2).
- The mean ranking of items of the three groups suggests a dissonance between support for initiating research at the clinical level and the attitudes of those who control the resources to make this a reality (as determined by Mann Whitney U).



	Mean	t	df	p	
Scale 1*	61.60	64.61	-1.033	90	0.055
Scale 2**	59.77	57.87	.865	90	0.744

\*Interest and Environmental Support  
\*\*Payoff and Benefits



## Conclusions

### Application

#### Administrative Practice:

- A structural framework supporting nursing research may affect nurses' attitudes toward research.
- Time, support and education were identified as areas for interventions to change the attitudes toward research in nursing.

#### Clinical Practice:

- Findings were consistent with previous research except the organization of interest held an overwhelming belief that research findings advantageous to good patient care can be implemented in the work environment.
- Providing an infrastructure within clinical practice is key.

#### Educational Practice:

- Continued education and mentoring related to statistical and design methods is needed.

#### Further research:

- Research related to interventions to improve nurses' attitudes
- Research on the effects of not requiring a thesis as a graduation requirement and the effect on nursing attitudes
- Future research on the nurses' roles in the organization as they relate to attitudes toward research

#### Limitations:

- The sample size threatens the ability to apply results to the organization or the research community.
- Characteristics (educational level) of respondents are different than the demographics of the organization; making it difficult to generalize the results to the organization.

#### Acknowledgments

The researchers would like to thank the thesis committee members and nurses who participated in the research project.

### Replication Study 1984 vs. 2006

The research project was a replication of a study performed at the institution in 1984. This study showed overall attitudes toward research have not significantly changed over the last 22 years. The attitudes remain fairly positive with a willingness to participate in research with assistance. Insufficient time, lack of support from administration, and lack of understanding statistical analysis are still seen as common barriers.

Boothe's Attitude on Nursing Research Scale	Boothe Data	Bostrom Data	Hofmeister Data
Interest & Environmental Support	0.913	0.834	0.840
Payoff & Benefits	0.874	0.803	0.844
Barriers	0.716	0.645	0.571
Total	0.834	0.877	0.879

Demographics	1984	2006
Hospital Beds	464	343
Population	925	953
Respondents	720	119
Mean Age	33.7	41.6

