Title: A Description of Work Processes Used By Clinical Nurse Specialists (CNS) to Improve Patient Outcomes

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Session Title: Quality Improvement Outcomes
Slot: R 04: Monday, 31 July 2017: 10:15 AM-11:30 AM
Scheduled Time: 10:55 AM

Keywords: Clinical Nurse Specialist, invisible work and leading system-level change

References:


**Research Methods References**


**Abstract Summary:**
This study identified processes used by CNs working in different settings to improve clinical outcomes. Findings demonstrated that CNS practice is situational and contextual; processes used to gain trust, solve problems, and communicate with other disciplines, when done well, are highly effective and often invisible.

**Learning Activity:**

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<td>1. Identify the role of the clinical nurse specialist in improving clinical and fiscal outcomes in specialty populations.</td>
<td>1. Brief overview of clinical nurse specialist role and practice outcomes in the USA</td>
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<td>2. Describe the common processes used by clinical nurse specialists to lead change projects for improved patient outcomes.</td>
<td>2. Examine common processes used by clinical nurse specialists (CNS) working in a variety of practice settings and specialties to advance nursing practice and achieve improved clinical and fiscal outcomes. a. Study purpose b. Significance c. Methods d. Findings</td>
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<td>3. Examine processes used to implement system-level change through the lens of making invisible work visible.</td>
<td>3. Discussion of findings and consistency with existing research/literature a. Standards for CNS practice outcomes b. Consistency of study finding with CNS practice outcomes c. Visible and invisible work</td>
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**Abstract Text:**

**Purpose:**
The purpose of this qualitative descriptive study was to identify common processes used by clinical nurse specialists (CNS) working in a variety of practice settings and specialties to advance nursing practice and achieve improved clinical outcomes.
Background/Significance  Around the world, health care environments are increasingly holding nurses accountable for outcomes. Advanced practice nurses with graduate-level nursing preparation are expected to contribute to improved patient outcomes. Nursing in the U.S.A. recognizes four advanced practice roles – clinical nurse specialists (CNS), nurse practitioners, nurse midwives and nurse anesthetists. Each role contributes to improving outcomes; however, the CNS role historically has led large scale nursing practice initiatives to advance excellent nursing care for specialty populations (Fulton, et al., 2016).

System-level structural and process factors are known to influence CNS practice (Kilpatrick, et al., 2016); however, little is known about the specific processes by which CNSs achieve improved clinical outcomes. Greater understanding of how CNSs achieve outcomes will provide insight into mechanisms for improving health care and capturing CNS practice outcomes in this volatile time of dramatic health care reform.

Methods:

Design: Qualitative descriptive methods described by Sandelowski (2000) were used to identify the elements of how CNSs work and processes used by CNSs in implementing clinical improvement projects. CNSs are guided by professional practice competencies, therefore it is logical to assume that CNS work experiences have common meanings and associated behaviors, and that shared elements of the work process can be explored through the descriptive method.

Ethics: The study was approved by human subject institutional review boards of the investigators’ universities.

Sample/Setting: A purposive sample was used to assure a diverse group. Participants were selected from among National Association of Clinical Nurse Specialist Conference juried abstract presentations describing project-related outcomes. It was believed that the abstract authors, having submitted their work for public presentation, would be willing to discuss how they achieved the outcomes. Each abstract author was recruited via e-mail.

Procedures: Participants attended one of two 60 minute focus groups. A funnel approach was used; the most open ended question was asked first. Participants shared stories about the process of achieving project outcomes, focusing on the thinking and decision making that guided them in working though the project. Responses were probed for details about decisions and actions; similarities and difference in experiences were explored. Discussions were audio-recorded and transcribed verbatim; transcripts were reviewed for accuracy.

Analysis: Qualitative descriptive methods were used to analyze the narratives. Qualitative description can be used to obtain a rich description of the common experiences of a group to obtain straightforward answers to questions (Sullivan-Boai, et al., 2005). Moderated structured interview with low-inference content analysis, all of which were used in this study, are common in qualitative description (Sandelowski, 2000).

A standard content analysis process (Neuendorf, 2002) was used. The team members read the transcripts several times. Transcripts were then divided among the team members and relevant sections (text units), were coded independently. The text units were compared and contrasted and grouped into subcategories independently. Team members revised and labeled the subcategories. The quality of the findings (Miles, et al., 2014) was enhanced by use of all researchers to code and categorize data and a consensus procedure (documented by audit trail) to resolve discrepancies. Demographic data were collected and analyzed using descriptive statistics.

Results:
Seventeen CNSs participated (8 and 9 in each focus group); average 24 years (range: 11-39) as a registered nurse; average 8.6 years (range: 1.5 to 23) worked as a CNS; average age 49.6 years (range: 35 to 62 years); 82% held master’s degree, 18% had a doctorate (DNP or PhD); specialty included 53% adult, 24% acute/critical care, 6% perinatal, 6% pediatrics, 11% other; 15 participants (88%) held advanced certifications including adult (35%), acute/critical care (18%); wound/ostomy (6%), and 6% other.

Findings involved descriptions of CNSs engaged in intricate interactions across a diverse workforce of health professionals and others with varying expertise and interests. The CNS carefully balanced a long term goal with more immediate challenges. The descriptions included detailed accounts of how the CNSs moved a project forward from initial problem identification to the endpoint of success, sustainability and disengagement. Situating Work was the category that emerged to describe the process of fitting the work to context, as each team, unit or division was a unique context requiring adaptations. Situating work included beginning with the end in mind, garnering resources, aligning evidence/data, managing tasks, tailoring strategies, managing the team, developing skills in staff, energizing forward movement, monitoring progress, and removing barriers/meeting the challenges of resistance. Descriptive categories of processes surrounding situating the work included: Identifying a Problem by using staff input and CNS knowledge and expertise; Engaging Stakeholders, which involved identifying stakeholders, conducting preparatory steps for engagement, and onboarding stakeholders; Forecasting, such as reading situation dynamics, seeing possibilities and being open to revisions; Providing Feedback by communicating, providing support and encouragement, and seeking feedback from others; Interfac ing with the System, such as connecting with administration, bridging interdisciplinary teams and connecting within the system, and; Disseminating reports throughout the system including determining what needed to be reported to whom, when and how. These processes were embedded in personal attributes common and essential to CNS practice. Building Trust was described as earning trust of others, using purposeful strategies to build trust, and being trusted in the present and as capital for the future. Having Self-agency included rich descriptions of foundational characteristics representing a culmination of education, experience, and emotional intelligence creating a sense of self-reliance that lead to a willingness to take responsibility and to lead though influence. Self-agency also included nuanced and textured descriptions of how the participants took ownership of and responsibility for advancing nursing practice in their clinical settings.

Conclusion:

Discussion: CNSs are responsible for identifying clinical problems and initiating system-level interventions to prevent or improve management of the problems (Whitman & Pervis, 2015). CNS practice competencies include leading change for improved clinical outcomes (Fulton, et al., 2016). This study provided insight into how CNSs practice and the processes used by CNSs in achieving clinical outcome improvements. The patient-centered activities of CNS have been studied (Norton et al., 2012), the activities related to system-level clinical leadership have been described (Elliott et al., 2012), and the importance of CNS leadership in for the sustainability of a project has been evaluated (Babine et al., 2016). However, these studies provided limited insight into how CNSs work.

CNSs are clinical nursing experts, and the better expert work is done, the less visible it is (Wears, 2012). As CNSs become more engaged in supporting system-level practices of the healthcare team, the more invisible they become (Kilpatrick et al., 2016). The concept of “invisible work” was created to bring sociological attention to work that was unrecognized or undervalued (DeVault, 2014). This study provides insight into the very real but often invisible work processes used by CNSs in supporting and leading healthcare teams and improving outcomes. Much of the supporting and leading of CNS work is articulation work; unacknowledged management of awkward intersections among the social worlds of people, technology and organizations (Hampton & Junor, 2005). For CNSs, this articulation work was facilitated by self-agency. A landmark document (NACNS, 2004) described core CNS professional attributes that included personal integrity, mastery of emotions, positive self-regard, willingness to take risks, knowledge of abilities, openness to self-review, and appreciation of diversity. These attributes were interwoven through the participants’ stories and were central to successful system-level articulation work.
Conclusion: The findings of this study provide insight into CNS practice processes, lend credibility to the CNS’s leadership abilities, and help explain why the CNS role and practice is often considered invisible and ambiguous.

Limitations: Participants were from North American health care systems (USA and Canada), and while structurally different they are similar in the level of health care delivered, thus the findings may not reflect CNS processes used in project work occurring in other systems in different countries. Participants were recruited from among those CNSs reporting successful improvement project outcomes, therefore little can be deduced about processes that were not successful.

Implications for Practice: Regardless of country, CNS-led clinical improvement projects are central in advancing nursing practice and improved outcomes. CNS practice is situational and contextual; processes used by CNSs to gain trust, solve problems, and communicate with other disciplines are essential to CNS practice. CNS education should incorporate these processes into curricula; new CNSs should be mentored in mastering these competencies and developing self-agency. Administrators need to support these critical, though often invisible, CNS work processes because CNS-led improvement initiatives will enhance the CNS role across specialties and settings, support individual CNS job satisfaction, and ultimately improve patient care outcomes.

Future research should provide closer examination of clinical and fiscal outcomes of CNS practice related to improvement projects. Also, studying this phenomenon in other countries where CNSs practice might validate the findings in this study, or reveal other unique characteristics that foster CNS success in achieving health care outcomes would be valuable.