Development of a Scale to Measure Self-Efficacy to Respond to Disruptive Behaviors

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Disruptive behaviors in the nursing workplace contribute to negative outcomes for targeted individuals, patients, and organizations where these behaviors are prevalent. Also referred to as bullying, lateral/horizontal violence, and incivilities, the literature is replete with evidence that disruptive behaviors violate respectful communication between nursing staff and ultimately disrupt patient care. Newly licensed nurses are likely to lack the ability to respond effectively to disruptive behaviors, contributing to a turnover rate as high as 30% during their first year of professional practice. Consequently, nursing students anticipate have begun appealing to educators to provide response training in pre-licensure curricula.

Cognitive rehearsal (CR), a form of cognitive behavior therapy (CBT), has gained popularity as an intervention to increase the ability of nursing students and newly licensed nurses to address disruptive behaviors. Variations of CBT have been utilized extensively in nursing and health care education. These interventions focus on skill or behavior mastery by operationalizing the core concept of self-efficacy through education and the opportunity to practice the skill or behavior.

Self-efficacy is domain-specific and requires particular measurements to determine the effectiveness of each type of training. Currently, there is no published measure for specifically evaluating self-efficacy in responding to disruptive behaviors. The lack of a validated and reliable instrument makes the effectiveness of CR interventions difficult to quantify. Thus, the purpose of this project was to develop a domain-specific, theoretically grounded, valid, and reliable instrument to (1) measure self-efficacy related to responding to disruptive behaviors and (2) evaluate the effectiveness of CR training.

The rigorous two-step Lynn process for content validity was followed in developing the Responding to Disruptive Workplace Behaviors Scale (RDWBS). The first phase, the Development Stage, involved a thorough literature review to describe the full domain of self-efficacy related to responding to disruptive behaviors and to guide item development. Results revealed that self-efficacy is reflected in an interaction of four constructs: cognition, past behavior, affect, and motivation. Aligning with the literature, items developed for the RDWBS were designed to address these four constructs in addition to measuring overall self-efficacy.

In the second phase, Judgment-Quantification Stage, an expert panel of six individuals with expertise in instrument development and SCT established validity/relevance. Scale items were rated on a 1 - 4 scale with anchors of 1 = “Not relevant at all” and 4 = “extremely relevant”. A content validity index (CVI) was calculated for each item on the scale (I-CVI) by averaging assigned scores and for the scale as a whole (S-CVI). Items with I-CVI scores ≥ .78 were considered acceptable for inclusion on the final RDWBS, without major revision. Only two items scored below this accepted benchmark. These items were revised according to panelist feedback for improving clarity and wording and were subsequently retained on the instrument for piloting. The S-CVI was calculated as the proportion of items scoring an average of 3 - 4 points on the relevance scale (S-CVI/Ave). The final S-CVI/Ave = 1, indicating that all items were considered relevant reflections of measuring this domain-specific self-efficacy. Finally, a social desirability item with content aligning with the scale items was added to the final scale for piloting.

The RWDBS was subsequently piloted among senior nursing students (N = 450). Exploratory factor analysis (EFA) was conducted utilizing oblique and orthogonal rotations with the Eigenvalue cutoff set at 1.0. The presence of two factors was revealed through EFA accounting for 63% of variance among participants’ responses. These factor loadings were identical with both types of rotations utilized. The first factor accounted for 46% of variance and included items measuring overall self-efficacy, cognitions, past behaviors, and motivation. The second factor accounted for the remaining 17% of variance, reflecting
items measuring affect. The final RDWBS also demonstrated high internal scale consistency by a Cronbach’s α = .889 and included a total of 13 items measuring self-efficacy to respond to disruptive behaviors in the nursing workplace.

Disruptive behaviors are an unfortunate yet common aspect of the nursing workplace and contribute to a sequela of negative consequences for nursing staff, patients, and organizations. Fortunately, CR training can prepare nursing students to respond effectively to these disruptive behaviors prior to entering the workplace. This instrument is the first of its kind to provide a valid and reliable instrument that nurse educators can use to measure the effectiveness of CR training on increasing response self-efficacy among nursing students. Additional research is needed to further refine the RDWBS as well as to evaluate CR training techniques for improving nursing education practice and retaining newly licensed nurses in the workforce. (750 words)

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Keywords:
Disruptive workplace behaviors, Instrument Development and Self-Efficacy

References:
*Those older than 5 years are considered seminal works and essential to this project.


Abstract Summary:
Self-efficacy to respond effectively to disruptive behaviors can be improved through cognitive rehearsal training, requiring a domain-specific instrument to measure intervention effectiveness. This project describes the development and psychometric properties of a theoretically-guided instrument that can be utilized by nurse educators providing disruptive behavior response training to nursing students.

Content Outline:
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I. Introduction

A. Disruptive behaviors in the nursing work environment
   i. definition and examples
   ii. negative impact of these behaviors
   iii. need for ability to respond effectively
   iv. student preparation, students soliciting this education

B. Educational preparation to increase ability to respond
   i. Cognitive rehearsal (CR)
   ii. Link to theories (Social Cognitive Theory and Theory of Planned Behavior)
   iii. Self-Efficacy as the operationalized concept in CR, theoretical framing of CR
   iv. Steps of CR, links to constructs of self-efficacy

C. Scale development to measure effectiveness of CR training
   i. Validity
   a. Item development- theoretical basis and previously established items/stems
   b. content validity- expert panel
   ii. Piloting
a. Reliability/ N and Cronbach’s α

b. Dimensions/Factor Analysis

iii. Final instrument description

D. Implications

i. Nurse educators, researchers, clinicians/nursing students, newly licensed nurses

ii. Further research required

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Professional Experience: Primary Author on five (5) publications related to this research (2013-2017) Primary Investigator on this research for instrument development (2016-2017) Primary Investigator on current research to measure impact of cognitive rehearsal intervention on longitudinal workplace outcomes. Primary Investigator on previous research (2015) to measure the impact of a cognitive rehearsal training intervention on senior nursing students' self-efficacy to respond to lateral violence. Co-Investigator on current mixed-methods research to explore generational influences on workplace values and patterns.

Author Summary: Dr. Ericka Sanner-Stiehr’s research focuses on the nursing work environment, specifically interventions to increase self-efficacy to respond to disruptive behaviors and variables that impact staff retention. Dr. Sanner-Stiehr’s current research on responding to disruptive behaviors emphasizes the need for educational preparation students to respond to disruptive behaviors to be included in pre-licensure nursing education and national standards for curricula.