Should I Stay or Should I Go: Predicting the Retention and Departure of Graduate Nurses Participating in a Nurse Residency Program

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Research Question

Can the variables, job satisfaction, autonomy and critical thinking, age, ethnicity and unit be used to predict those GNs who complete the nurse residency program and are retained at the study institution from those nurse residents who depart the program early?
Background Literature

- Turnover for graduate nurses during the first year of employment is particularly high with median turnover rates ranging from 35% to 61%.

- Over 25% of GNs who have already worked for two or more institutions six to eight months post graduation and half leave their first employer in the first year.

- Every percentage point in nurse turnover costs the hospital approximately $300,000 annually and hospitals that perform poorly in nurse retention spend an average of $3.6 million more than those hospitals with high retention rates (PwC HRI, 2007).

Research Design

• Retrospective Secondary Analysis
  Nonexperimental
Research Related to GN Job Satisfaction

- Kramer (1974) noted that role transition from student to practicing nurse led to inadequate performance as an RN, powerlessness, dissatisfaction and a high turnover rate.
- Roberts, Jones, and Lynn (2004) examined job satisfaction of recent RN graduates and found that those intending to remain past 12 months were more satisfied with aspects such as schedule, co-workers, interaction, professional opportunities, recognition, control, and responsibility.
Autonomy, Departure and Retention of Graduate Nurses

• Among GNs Kramer (1969) surmised a strong multifactorial relationship among satisfaction, autonomy, and turnover.

• Nurses frustrated with perceived lack of autonomy were more likely to leave the organization (Gerber, Murdaugh, Verran & Milton, 1990).

• Nurses with low autonomy and low social integration reported low job satisfaction and work motivation, poor commitment to the organization, and less intent to stay on the job (McCloskey, 1990).
Critical Thinking, Departure and Retention of Graduate Nurses

• The literature is devoid of studies on critical thinking and its relationship to departure and retention among GNs

• Employers view graduates as deficient in critical thinking skills
  
  Recognizing abnormal physical & diagnostic findings
  Responding to emergencies
  Supervision & delegating

• Expert opinion articles infer that there is a strong relationship between competency and satisfaction and among satisfaction, autonomy and critical thinking

(Boyer, 2002; Herdrich & Lindsay, 2006; UHC, 2006; 2007; 2008; National Council State Boards of Nursing, 2002)
Demographic Influences

**Age**

Found to have predictive value in several studies that have been conducted to investigate the age-job satisfaction relationship in the health care setting.

*(Blegen, 1993; McNeese-Smith and Van Servellen, 2000)*

**Race**

Research studies on the association between satisfaction, autonomy, critical thinking and departure and the variable of race are limited and conflicting in their findings.

*(Smith, Crow, and Hartman, 2007; Jones, Belyea, Gates, Mark, & Pink, 2005)*.

**Type of unit**

Satisfaction and retention were higher on intensive care units and labor and delivery units. Turnover was higher on medicine units than on surgical units *(p < .007)* *(Wakefield et al., 1988)*.
The entire population of GNs who meet the inclusion criteria was used in this study.

Protection of Human Subject Approval for the study was obtained from the Texas Woman’s University Houston Institutional Review Board and The Methodist Hospital Research Institute’s Intuitional Review Board.
Instruments: McCloskey Mueller Satisfaction Scale (MMSS)

- 31 items, five point Likert type scale.
- The literature notes alpha ranging from .89-.91 for total scale indicating high reliability and subscales .52-.89
- *Alpha reliability for scores on the 31 items for the present sample was found to be .94. Alphas for each of the subscales ranged from .58 -.86 (*Satisfaction with co-worker)
- Construct validity found modest to good correlations (.31–.68) were found
Instruments: Control over Nursing Practice scale (CONP)

- 21-items, 7-point Likert type scale from 7 (high) to one (low)
- Scored as a unidimensional (single factor) scale
- Subjects respond to statements about their individual freedom to evaluate and modify nursing practice (Lancero & Gerber, 1995).
- Alpha reliability consistently ranged from .89 and .96
- Alpha reliability for scores for the present sample was found to be .96
- Predictive validity using multiple regression techniques and for construct validity using confirmatory factor analysis found good correlations to autonomy
Instruments: The University HealthSystem Consortium Nurse Residency Exam

- Measures critical thinking
- The test blueprint was developed in partnership with AACN and UHC ad hoc committee of expert educators and administrators.
- Content validity was established with a test blueprint based on the constructs of the curriculum.
- 45 question on line exam
- The benchmark score is 850 (range of 0-1500)
- PBCC .188 indicating an acceptable test.
- KR20 is .7194 indicating acceptable reliability
Results

426 eligible participants
379 (88.75%)
participating in
completing all four
elements of the surveys
and the critical thinking
test (demographic, UHC
critical thinking exam,
CONP and MMSS)
during the study period
ranging from 2006-2009.
Demographics: Those who Remained or Departed
Remained or Departed - Ethnicity

- Black: Remained 78, Departed 18
- White: Remained 178, Departed 29
- Asian: Remained 69, Departed 9
- Hispanic: Remained 32, Departed 6
- Other: Remained 6, Departed 2
### Those who Remained or Departed—Gender

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<td>Departure</td>
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**Gender Distribution**

- **Male**: 55 (Remained), 11 (Departure), Total 66
- **Female**: 308 (Remained), 53 (Departure), Total 361
- **Total**: 361 (Remained), 66 (Departure), Total 427
Remained and Departed-Unit

- Acute Care: 168 Remained, 24 Departure
- Critical Care/ER: 131 Remained, 21 Departure
- Perioperative: 45 Remained, 14 Departure
- Women's Health: 15 Remained, 3 Departure
- Rehab: 4 Remained, 2 Departure

Remained
Departure
## Variables Satisfaction, Autonomy and Critical Thinking

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Those who Remained: Greatest and Least Areas of Job Satisfaction

1. Most satisfied with
   - Immediate supervisor
   - Benefits
   - *Nursing peers*

2. Least satisfied with
   - *Compensation for weekend work*
   - *Child care*
   - *Opportunity to publish*
Those who Left Early: Greatest and Least Areas of Satisfaction

1. Most satisfied with
   - Hours worked
   - Nursing peers
   - Health care delivery methods

2. Least satisfied with
   - Compensation for weekend work
   - Child care
   - Opportunity to publish
Those who Remained: Greatest and Least Areas of Perceived Autonomy

1. Areas of Most Perceived Autonomy
   – Obtain assistance
   – Delivery of holistic care
   – Practice care to best of ability

2. Areas of Least Perceived Autonomy
   – Influence standards of nursing practice
   – Modify or adapt patient care procedures and protocol
   – Introduce new nursing practices and procedures.
Those who Left Early: Greatest and Least Areas of Perceived Autonomy

1. Most perceived autonomy
   – *Obtain assistance*
   – Implement nursing care in an efficient manner
   – Consult with others when solving complex care problems

2. Least perceived autonomy
   – Coordinate my time off duty
   – Act on my own decisions related to care given
   – *Introduce new nursing practices and procedures*
Discussion and Conclusions

- **Job satisfaction, younger age and autonomy** predict those who leave and those who stay with 86.8% accuracy. The strongest influence appears to be job satisfaction.

- Ethnicity, unit of service, and critical thinking did not contribute to the prediction.

- Revised PMCM received mixed support
Discussion and Conclusions

• Job satisfaction, autonomy and age are useful variables in predicting retention-departure

• The characteristics of the GNs in the study sample did not mirror national characteristics of GNs

• The larger body of literature supports the findings regarding job satisfaction and autonomy

• Critical thinking, ethnicity and unit type did not predict retention
Implications and Recommendations

• First study that distinguishes between those GNs who remain and those who leave nurse residency programs at academic medical centers

• Multiple tactics should focus on
  • Extrinsic rewards
  • Maintaining and sustaining relationships with managers and peers
  • Recognizing and enabling the GN to positively contribute to the organizations
  • Providing realistic clinical situations
Future Research

• Study replication that uses a time series design and examines GNs at onset, 1, 6, 12 and 18 months after hire.

• Further studies on school-work transitions that enhance satisfaction, autonomy, critical thinking and retention.

• Study replication that uses a critical thinking measure at onset and 18 months.

• Further studies that test all the factors represented in the full original PMCM model to see if the predictive abilities for group membership could be increased.
Thank You!
Questions?