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## **Implementing and evaluating a mentorship program for new graduate nurses in a medical-surgical unit: A quality improvement pilot**

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**Title**

Implementing and evaluating a mentorship program for new graduate nurses in a medical-surgical unit: A quality improvement pilot

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**Abstract**

The purpose of this quality improvement project was to pilot and test the acceptability of implementing an eight-week voluntary evidence-based mentorship program for new graduate nurses within a medical-surgical unit. This project was guided by the Iowa Model of Evidence-Based Practice and an adaptation of the Academy of Medical Surgical Nurses Mentoring Program. Nurse leaders may want to consider creative ways to incentivize mentees and involve them in tailoring mentoring programs during the final phases of the orientation program.

**Introduction****Background**

New graduate nurses (NGN), operationally defined as a nurse with less than one year of experience, frequently report difficulty transitioning to the practice environment, resulting in decreased job satisfaction and retention rates (Pineau Stam et al., 2015). According to Wolters

Kluwer (2017), NGN turnover rates are estimated at 30%. It can cost healthcare facilities up to \$74,888 to train one new nurse (Szalmasagi, 2018). Literature reveals several challenges that NGNs face in their new work environment such as reality shock and feeling vulnerable, discouraged, frustrated, overwhelmed, and anxious. They sense a lack of support, and experience incivility and burnout syndrome (D'Ambra & Andrews, 2014; Pineau Stam et al., 2015; Schroyer et al., 2020; Szalmasagi, 2018; Witter & Manley, 2013). These early professional experiences lead to a lack of motivation, decreased productivity, and decreased quality of patient care (Gazaway et al., 2016).

Mentorship programs can assist the NGN to connect classroom knowledge with the work environment, and is an essential experience during transition into professional practice (Spiva et al., 2013). Participation in a mentorship program enhances job satisfaction, improves confidence which are primary factors affecting nurses' decisions to stay at an organization (Schroyer et al., 2020). The implementation of mentorship programs in institutions that employ NGNs has been shown to reduce turnover rates, increase the quality of patient care, and empower nurses in professional development (Chen & Lou, 2014; Cochran, 2017; Zhang et al., 2015).

### **Literature Review**

A review of current evidence was completed using a database search of the Cumulative Index to Nursing and Allied Health Literature (CINAHL), OVID, and PubMed. Key search terms included: "new graduate nurse", "nurse retention", "job satisfaction", "mentor", "mentorship", and "turnover". The terms "transition to practice" and "nurse residencies" were also used to review current best practices within these programs. The search was limited to full-text English language articles published between 2011 and 2021. The search yielded 123 results,

all of which were reviewed. After completing a title and abstract review, 18 articles were selected for comprehensive review, and 11 were included in the final literature synthesis.

The literature review provided evidence that a mentorship program for NGNs improves skills, clinical decision making, and confidence, while positively impacting nurse retention rates and job satisfaction, as well as decreased burnout rates (Chen & Lou, 2014; Cochran, 2017; D'Addona et al., 2015; D'Ambra & Andrews, 2014; Gazaway et al., 2016; Pineau Stam et al., 2015; Spiva et al., 2013; Witter & Manley, 2013; Zhang et al., 2015). Findings from published studies support the implementation of a mentorship program.

While there was no uniformity in the specific type of nurse mentorship program, common themes were appreciated among those mentioned in the studies. All studies involved participants employed in hospital settings as NGNs or new to the specific unit and demonstrated mentoring as an effective intervention to foster support and socialization. The mentor-mentee pair was intentionally assigned by a designated person within the facility as a one-to-one relationship for the duration of the program. Although each study utilized a formal training session to orient mentors and mentees to their respective roles and program components, they differed in the length and quantity of support sessions. While all studies described specific program outcomes and a distinct evaluation process, several different measurement instruments were utilized.

Despite the variety in design, all nurse mentorship programs were implemented using a formal process including intentional mentor-mentee matching, a defined time period, and support sessions. Implementation of the mentorship program included leadership by a designated program facilitator who ensured detailed implementation of program elements. Eligible mentees were most commonly NGNs, and all mentors assumed the role voluntarily. Mentees were

evaluated several times during the mentorship programs to assess progress towards the desired outcomes of increased job satisfaction and reduced turnover.

## **Methods**

### **Design**

This quality improvement project utilized a pre- and post-intervention design. It was guided by the Iowa Model of Evidence-Based Practice (Iowa Model Collaborative, 2017) and adapted from the Academy of Medical Surgical Nurses (AMSN) (2012) Mentoring Program. The pilot program consisted of intentional mentor selection, matchmaking and mentor training, online and in-person communication, and incorporated aspects of the clinical organization's existing resources such as education for mentors and mentees, supportive materials such as goal setting worksheets, meeting discussion guides, and an online course which served as a platform to organize and structure the mentoring process. To identify a change from pre to post implementation, job satisfaction, and intent to stay were evaluated and compared at the beginning as well as the end of the eight week pilot program.

### **Setting**

The clinical agency is an acute care community hospital located in the midwestern United States that is part of a larger healthcare organization. The project was conducted on a 29-bed medical-surgical unit staffed by 35 full time and 11 part time RNs. This unit was selected in collaboration with nurse leaders because it had a high turnover rate at the time of the project. The facility does not have an established benchmark for nurse turnover but did recognize a critical need to implement an intervention to retain nursing staff.

### **Sample**

The sample consisted of NGNs and mentors of NGNs. Eligible mentees (n = 10) were NGNs employed on the target unit, who had less than one year of experience in an acute care hospital setting, and had completed orientation. Mentors (n = 22) were eligible if they had worked as a staff nurse on the target unit for at least one year.

### **Procedure**

Facilitating practice change was guided by The Iowa Model (Iowa Model Collaborative, 2017) which is a framework to guide evidence-based practice that commences by identifying current opportunities or concerns within an organization. In this case, an organizational challenge to decrease nurse turnover was selected. After problem identification, a clinical practice question was developed using the population, intervention, comparison, outcome, and time (PICOT) format: In a medical-surgical unit in an acute care setting (P), does implementation of an evidence-based mentorship program for new graduate nurses with less than one year of experience post-orientation, (I) as compared to no mentorship program (C) improve job satisfaction, intent to stay, and decrease attrition rates (O) as measured at eight weeks (T)? Key stakeholders were identified and analysis of the literature suggested sufficient evidence existed to initiate implementation. Organizational needs and priorities were confirmed through an evaluation of quality metrics and retention rates. The elevated turnover rate demonstrated the need to pursue a transition to practice program with a mentorship component. A practice change (formal mentorship program for NGNs) was designed based on established literature as a reference and included the consideration of organizational resources, approvals, collection of baseline data, development of the intervention (formal mentorship program), and evaluation plan (pre- and post-intervention outcome measures). Team members included the DNP student project leaders, unit nurse managers, the nursing education specialist, and staff nurses.

Participants for the implementation of the mentorship program were recruited for voluntary participation through an email invitation to all nursing staff on the unit (n=46) as well as flyers placed in the unit breakroom. The recruitment email (AMSN, 2012). The email introduced the nurse mentorship program and explained the potential benefits, role expectations, time commitment, process for voluntary participation, and invited participation as a mentor or mentee. Additionally it included the Job Satisfaction Survey (JSS) and Intent to Stay Survey (ISS). A reminder email was sent to all staff one week after the initial email.

On the first day of the mentorship program, a virtual Welcome Session was held for mentors and mentees. A virtual platform was selected due to time constraints, social distancing guidelines, and convenience for participants. Project leaders electronically provided participants with educational materials that explained the program aims, mentor/mentee roles and responsibilities, and benefits of formal mentorship. Participants were also given information to enroll in the organization's virtual learning environment (VLE), a web-based platform utilized for digital aspects of the mentorship program. Each participant had five days to review the content and complete any required education or activities. The content of the session integrated Benner's Theory and resources from the parent organization (Benner, 2015). Mentees were encouraged to think about and develop specific, measurable, achievable, relevant, and timely (SMART) goals in collaboration with their mentors. The mentor prompted each mentee to create an individualized mentor plan (IMP) at the start of the program in order to measure goal attainment. Specifically, the IMP listed mentee goals and identified actions needed to achieve them, in addition to timelines and the support required. Mentors also completed through the VLE, education designed to increase mentoring knowledge and skills, and to assist with the self-reflection essential to the mentorship experience.

After the Welcome Session, mentor-mentee dyads met weekly for eight weeks. Participants were encouraged to develop meaningful discussion topics relevant to their individualized goals. However, each dyad was provided a list of weekly discussion points from the program web-platform to prompt and facilitate dialogue. At the end of the eight-week pilot mentorship program, the JSS and ISS were again sent to all unit nursing staff. A virtual closing session was held for all participants where they were given the opportunity to offer feedback to project leaders.

### **Instruments**

The survey tools utilized in the pilot mentoring program were derived from the Academy of Medical-Surgical Nurse's Tool Guide (AMSN, 2012). The primary measurable outcomes of interest are job satisfaction and intent to stay among NGNs. Job satisfaction of each NGN was assessed utilizing the JSS. The JSS is a 24-item survey with Likert scale responses ranging from one to five. Higher scores indicate higher levels of satisfaction. According to the AMSN (2012) the JSS has a Cronbach's alpha of 0.83. The JSS has reliability when used in similar samples (AMSN, 2012). Each mentee completed this instrument at the initiation of the mentorship program and again at the conclusion. Four specific elements were evaluated using the JSS: satisfaction with co-workers, satisfaction with professional opportunities, satisfaction with praise and recognition, and satisfaction with control and responsibility (AMSN, 2012). Participant entry of data was considered consent to participate. The respondent time burden for this instrument was approximately 5 minutes.

The nurses' intent to stay in the job was assessed using the ISS. The ISS consists of an 11-item survey with Likert scale responses from 1 (strongly disagree) to 5 (agree strongly). Cronbach's alpha for internal consistency is 0.77 and has reliability when used in similar samples



(AMSN, 2012). This survey evaluated personal feelings regarding the NGN role. Therefore, intent to stay employed by the organization was evaluated through three components: the meaningfulness of the work, responsibility for the work, and knowledge of the results. The survey was completed by each mentee at the beginning and the end of the program. The respondent time burden for this instrument was approximately 5 minutes.

### **Ethical Considerations**

Permission to conduct the study was obtained from the Institutional Review Boards (IRB) of both the hospital and university and was deemed to be exempt from full review.

### **Data Analysis**

Data needed for this program were collected via the JSS and ISS twice, at baseline (prior to the mentorship program) and again eight-weeks later at the conclusion of the program. Data were gathered and tabulated from the survey data metrics software program. The aim was to determine if there was a difference in job satisfaction and intent to stay before and after the mentorship program among the group of unit nurses that participated and those that did not participate. All data were aggregated.

### **Results**

During program implementation, two of the three mentees withdrew from the program. No mentors volunteered to participate, so project leaders served as mentors.

### **Intent to Stay and Job Satisfaction**

Responses are categorized by RN experience (less than or greater than one year) and volunteer status (whether they were interested in volunteering for the mentorship program). There was a total of seven responses to the pre-mentorship JSS and 11 responses to the pre-

mentorship ISS. There were two responses to both the post-mentorship JSS and ISS, the participating mentee and a staff nurse who did not participate in the mentorship program.

**Table 1**

*Summary of RN Responses to JSS and ISS surveys*

Survey	Time	RN Experience		Volunteers			n
		<1 year	>1 year	Mentee	Mentor	Not Interested	
JSS	Pre	3	4	1	0	6	7
	Post	2	0				2
ISS	Pre	5	6	3	0	8	11
	Post	2	0				2

Summary statistics were calculated for questions 1-11 of the ISS. Table 2. *Summary Statistics Table for ISS Survey*, provides pre and post-mentorship descriptive statistics for each survey question. Question three and eight had ten responses on the pre-mentorship ISS.

**Table 2**

*Summary Statistics Table for ISS Survey*

Question	Time	M	SD	n	Min	Max	Mdn
1. My opinion of myself goes up when I do this job well	Pre	1.36	0.50	11	1.00	2.00	1.00
	Post	1.50	0.71	2	1.00	2.00	1.50
2. My opinion of myself goes up when I do this job well	Pre	4.55	0.52	11	4.00	5.00	5.00
	Post	4.50	0.71	2	4.00	5.00	4.50
3. Generally speaking, I am very satisfied with this job	Pre	3.20	0.92	10	2.00	4.00	3.50
	Post	2.50	0.71	2	2.00	3.00	2.50
	Pre	1.27	0.47	11	1.00	2.00	1.00

4. Most of the things I do on this job seem useless or trivial	Post	1.50	0.71	2	1.00	2.00	1.50
5. I feel a great sense of personal satisfaction when I do this job well	Pre	4.45	0.69	11	3.00	5.00	5.00
	Post	4.50	0.71	2	4.00	5.00	4.50
6. The work I do on this job is meaningful to me	Pre	4.27	0.79	11	3.00	5.00	4.00
	Post	3.50	0.71	2	3.00	4.00	3.50
7. I feel a very high degree of personal responsibility for my work	Pre	4.73	0.47	11	4.00	5.00	5.00
	Post	4.50	0.71	2	4.00	5.00	4.50
8. I frequently think of leaving this job	Pre	3.10	1.37	10	1.00	5.00	3.00
	Post	3.50	2.12	2	2.00	5.00	3.50
9. I feel bad and unhappy when I perform poorly	Pre	4.18	0.60	11	3.00	5.00	4.00
	Post	4.50	0.71	2	4.00	5.00	4.50
10. I am generally satisfied with my work	Pre	3.36	1.03	11	2.00	5.00	4.00
	Post	3.00	1.41	2	2.00	4.00	3.00
11. My personal feelings are unaffected by my job performance	Pre	2.27	1.10	11	1.00	4.00	2.00
	Post	1.50	0.71	2	1.00	2.00	1.50

*Note. Likert responses range from 1=low 5=high scale*

Summary statistics were calculated for questions 1-24 of the JSS. Table 3. *Summary Statistics Table for JSS Survey*, provides pre- and post-mentorship descriptive statistics for each survey question.

**Table 3**

*Summary Statistics Table for JSS Survey*

Question	Time	<i>M</i>	<i>SD</i>	<i>n</i>	Min	Max	<i>Mdn</i>
1. Importance of Work	Pre	4.57	0.53	7	4.00	5.00	5.00

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	Post	3.50	0.71	2	3.00	4.00	3.50
2. Responsibility	Pre	4.43	0.79	7	3.00	5.00	5.00
	Post	3.00	1.41	2	2.00	4.00	3.00
3. Opportunity to use skills and abilities	Pre	4.57	0.53	7	4.00	5.00	5.00
	Post	2.00	1.41	2	1.00	3.00	2.00
4. Decision-making power	Pre	3.29	1.11	7	2.00	5.00	3.00
	Post	3.00	0.00	2	3.00	3.00	3.00
5. Autonomy	Pre	4.43	0.53	7	4.00	5.00	4.00
	Post	3.50	0.71	2	3.00	4.00	3.50
6. Variety of work	Pre	4.14	0.90	7	3.00	5.00	4.00
	Post	3.00	0.00	2	3.00	3.00	3.00
7. Interest level	Pre	3.86	1.21	7	2.00	5.00	4.00
	Post	4.00	1.41	2	3.00	5.00	4.00
8. Complexity	Pre	4.29	0.76	7	3.00	5.00	4.00
	Post	3.50	0.71	2	3.00	4.00	3.50
9. Workload	Pre	3.00	0.58	7	2.00	4.00	3.00
	Post	1.50	0.71	2	1.00	2.00	1.50
10. Staffing	Pre	2.00	0.82	7	1.00	3.00	2.00
	Post	1.00	0.00	2	1.00	1.00	1.00
11. Work conditions	Pre	2.29	1.11	7	1.00	4.00	2.00
	Post	1.50	0.71	2	1.00	2.00	1.50
12. Tension/Pressure	Pre	2.29	0.95	7	1.00	3.00	3.00
	Post	2.00	1.41	2	1.00	3.00	2.00
13. On-job stress	Pre	2.29	1.11	7	1.00	4.00	2.00
	Post	1.50	0.71	2	1.00	2.00	1.50
14. Recognition for work done	Pre	2.71	0.95	7	2.00	4.00	2.00
	Post	2.00	1.41	2	1.00	3.00	2.00
15. Opportunity for professional development	Pre	3.14	0.90	7	2.00	4.00	3.00
	Post	3.50	0.71	2	3.00	4.00	3.50
	Pre	3.14	1.21	7	1.00	4.00	4.00

16. Opportunity for advancement	Post	3.50	0.71	2	3.00	4.00	3.50
17. Relationship with colleagues	Pre	4.14	0.90	7	3.00	5.00	4.00
	Post	3.00	0.00	2	3.00	3.00	3.00
18. Relationship with charge nurses	Pre	3.86	0.90	7	3.00	5.00	4.00
	Post	3.00	0.00	2	3.00	3.00	3.00
19. Relationship with unit manager(s)	Pre	3.57	0.98	7	2.00	5.00	4.00
	Post	3.00	0.00	2	3.00	3.00	3.00
20. Satisfaction with patient care given	Pre	3.57	0.53	7	3.00	4.00	4.00
	Post	2.50	0.71	2	2.00	3.00	2.50
21. Enjoyment of work	Pre	2.86	0.90	7	2.00	4.00	3.00
	Post	2.50	2.12	2	1.00	4.00	2.50
22. Feel Respected	Pre	2.43	1.13	7	1.00	4.00	3.00
	Post	3.00	1.41	2	2.00	4.00	3.00
23. Morale	Pre	2.00	0.82	7	1.00	3.00	2.00
	Post	2.50	0.71	2	2.00	3.00	2.50
24. Motivation to work	Pre	2.57	0.98	7	1.00	4.00	3.00
	Post	2.50	2.12	2	1.00	4.00	2.50

*Note. Likert responses range from 1=low 5=high scale*

### Discussion

Due to limited survey responses, the difference in job satisfaction and intent to stay could not be meaningfully compared. The literature clearly supports the benefits of formal mentorship programs for NGNs. However, less is known about the factors that make mentorship programs effective. This mentorship pilot program incorporated various techniques offered by the literature to address some challenges of role transition among NGNs, but may not have adequately addressed the challenges of staff engagement among experienced nurses who might have served as mentors.

Since no staff nurses volunteered to participate as mentors, project leaders served as mentors. Due to the uneven number of mentees, one project leader mentored two NGNs. As the program progressed two of the three mentees withdrew, so only one project leader served as a mentor. A more robust sample size would have been a stronger indicator of the mentorship program's merits and strength.

The target unit is complex with many admissions, discharges, transfers, and increased patient acuities. Evidence suggests that increased work complexity is associated with higher turnover rates because complex units create conditions in which nurses lack control over their patients (Ten Hoeve et al., 2020). Perhaps this factor affected mentee participation. Further, professional commitment is linked to job demands (resources and emotional exhaustion), and organizational job stressors (high workload, complexity of care). Negative emotions, such as job dissatisfaction, may result from increased job demands and organizational job stressors, reducing professional commitment and increasing turnover (Ten Hoeve et al., 2020). This is reflected in the low autonomy scores on the ISS, and low satisfaction with workload and staffing on the JSS.

The COVID-19 pandemic may also have contributed to decreased participation rates. A series of forced practice changes such as wearing personal protective equipment when providing care, rapidly changing protocols, more patient admissions, increasing bed capacity, and caring for more acutely-ill patients may have contributed to decreased interest in voluntary project participation.

Finally, other environmental factors may have occurred outside of the scope of this project. Of interest, the lowest pre-program JSS scores include workload, staffing, and work conditions. These areas measure organizational practices and are not directly influenced by a program such as the mentorship program. Therefore, mentoring without accompanying attention

to the work environment is unlikely to be effective. Further, the highest pre-program JSS scores include importance of work, autonomy, and relationships with colleagues. This may suggest that nurses participate in informal mentoring relationships whether or not there is an opportunity for a formal mentoring relationship. Providing tools and formal processes to support this informal process may be an additional tool to support NGNs. Moreover, the lowest pre-program ISS scores concerned triviality of work, while the highest scores involved thoughts of leaving and degree of responsibility. Further research could expand on the importance of early relationships and support in the work environment.

### **Acceptability of the Program**

The implementation of an evidence-based mentorship program for NGNs was successful for the participating mentee. Planning, process, and application of resources and evidence is important for future mentorship programs. Project flexibility is a particularly important aspect of pilot projects.

Future mentorship programs should consider how mentors and mentees are paired, and tailored to the needs of the dyad. Although the original intent was to match nurses from the same unit with the help of unit leaders, the lack of mentors required project flexibility. The content of this NGN mentoring program was acceptable and feasible.

The authors requested feedback from the one participant mentee during the closing session. The mentee stated the following:

I have had the pleasure of working with a mentor and I just wanted to let you know that I really appreciated this opportunity. One thing that I think would improve would be keeping mentee mentors in the same hospital/ work areas. Maybe it could be implemented by managers.

Nurse leaders may want to consider creative ways to incentivize NGN mentees and involve them in tailoring NGN mentorship programs during the final phases of the NGN orientation program. A mentorship component could also be incorporated into existing nurse residency programs.

### **Limitations**

There are several limitations to this study. First, the low response rate is a serious limitation of the study. A more robust response rate would have allowed project leaders to meaningfully compare pre- and post- mentorship scores. Also, project leaders were not able to recruit a desired number of participants. Participant recruitment is vital to the success of a pilot project. Future projects should meet with stakeholders to determine most feasible project implementation approaches along with stakeholders. This may increase interest participation.

### **Conclusions**

The purpose of this quality improvement project was to develop and implement a nurse mentorship program. The pilot program was designed based on evidence-based best practices, an adaptation of the organization's current mentorship program, and structural elements from the AMSN Mentor Program (AMSN, 2012). The strength of this pilot project was that its methodology allowed for flexibility and adaptability. The method, aims, and desired outcomes can be adapted to each unit or organizational need. Nurse educators and unit leadership can evaluate and adjust the components of this pilot mentorship program while working with a broad array of relevant stakeholders.

Overall, participants reported moderate to high job satisfaction, regardless of whether or not they participated in the mentorship program. Although no meaningful conclusion can be



made regarding the impact of the mentorship program on job satisfaction or intent to stay, post intervention JSS and ISS scores remained similar to pre-program values.

The complexity of the clinical setting and environmental factors may have influenced low participation in the mentorship program. Yet, the program was successfully developed and implemented. It is possible that the voluntary nature of the program deterred participation in this context. Nurse leaders may want to consider creative ways to incentivize NGN mentees and involve them early in project planning in tailoring NGN mentoring programs during the final phases of the NGN orientation program.

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### **Conflict of interest**

None

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### **References**

Academy of Medical-Surgical Nurses (AMSN). (2012). *AMSN mentoring mentor guide*.

<https://www.amsn.org/sites/default/files/documents/professionaldevelopment/mentoring/AMSN-Mentoring-Mentor-Guide.pdf>

Benner, P. (2015). Curricular and pedagogical implications for the Carnegie Study, educating nurses: A call for radical transformation. *Asian Nursing Research*, 9(1), 1-6.

<https://doi.org/10.1016/j.anr.2015.02.001>

Cochran C. (2017). Effectiveness and best practice of nurse residency programs: A literature review. *Medsurg nursing: official journal of the Academy of Medical-Surgical Nurses*, 26(1), 53–63.

Chen, C. M., & Lou, M. F. (2014). The effectiveness and application of mentorship programmes for recently registered nurses: A systematic review. *Journal of Nursing Management*, 22(4), 433–442. <https://doi.org/10.1111/jonm.12102>

<https://doi.org/10.1111/jonm.12102>

D'Addona, M., Pinto, J., Oliver, C., Turcotte, S., & Lavoie-Tremblay, M. (2015). Nursing leaders' perceptions of a transition support program for new nurse graduates. *The Health Care Manager*, 34(1), 14–22. <https://doi.org/10.1097/HCM.0000000000000043>

<https://doi.org/10.1097/HCM.0000000000000043>

D'Ambra, A. M., & Andrews, D. R. (2014). Incivility, retention, and new graduate nurses: An integrated review of the literature. *Journal of Nursing Management*, 22(6), 735–742.

<https://doi.org/10.1111/jonm.12060>

Gazaway, S. B., Schumacher, A. M., & Anderson, L. (2016). Mentoring to retain newly hired nurses. *Nursing Management*, 47(8), 9–13.

<https://doi.org/10.1097/01.NUMA.0000488861.77193.78>

Iowa Model Collaborative (2017). Iowa model of evidence-based practice: Revisions and validation. *Worldviews on Evidence-Based Nursing*, 14(3), 175-182. DOI:

10.1111/wvn.12223

- Pineau Stam, L. M., Spence Laschinger, H. K., Regan, S., & Wong, C. A. (2015). The influence of personal and workplace resources on new graduate nurses' job satisfaction. *Journal of Nursing Management, 23*(2), 190–199. <https://doi.org/10.1111/jonm.12113>
- Schroyer, C. C., Zellers, R., & Abraham, S. (2020). Increasing registered nurse retention using mentors in critical care services. *The Health Care Manager, 39*(2), 85–99. <https://doi.org/10.1097/HCM.0000000000000293>
- Spiva, L., Hart, P. L., Pruner, L., Johnson, D., Martin, K., Brakovich, B., McVay, F., & Mendoza, S. G. (2013). Hearing the voices of newly licensed RNs: The transition to practice: A qualitative study suggests that new nurses need more guidance and support than they're getting. *The American Journal of Nursing, 113*(11), 24–32. <https://doi.org/10.1097/01.NAJ.0000437108.76232.20>
- Szalmasagi, J. (2018). Efficacy of a mentoring program on nurse retention and transition into practice. *International Journal of Studies in Nursing, 3*(2), 31. <https://doi.org/10.20849/ijsn.v3i2.378>
- Ten Hoeve, Y., Brouwer, J., & Kunnen, S. (2020). Turnover prevention: The direct and indirect association between organizational job stressors, negative emotions and professional commitment in novice nurses. *Journal of Advanced Nursing, 76*(3), 836–845. <https://doi.org/10.1111/jan.14281>
- Witter, A. J., & Manley, J. R. (2013). A quasi-experimental study: Mentoring for the novice nurse in an acute care setting. *Journal of Business and Economics, 4*, 381-396. <http://www.academicstar.us/UploadFile/Picture/2014-6/2014614111952360.pdf>
- Wolters Kluwer. (2017, October 19). *Recruiting & retaining new nurse grads*. <https://www.wolterskluwer.com/en/expert-insights/recruiting-retaining-new-nurse-grads>

Zhang, Y., Qian, Y., Wu, J., Wen, F., & Zhang, Y. (2016). The effectiveness and implementation of a mentoring program for newly graduated nurses: A systematic review. *Nurse education today*, 37, 136–144. <https://doi.org/10.1016/j.nedt.2015.11.027>