NURSE LEADER FATIGUE: IMPLICATIONS FOR WISCONSIN

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Presentation Aims

• Share highlights of research findings:
  • Nurse leader fatigue
  • Current state of fatigue risk management for hospital nurses
• Discuss implications for practice
• Dialogue and provide feedback on recommendations
Background

- Occupational fatigue in nurses is a significant healthcare challenge with implications for patient safety, nurse well-being, and nurse retention
- Addressing fatigue requires both personal management of fatigue and a culture that supports strategies for fatigue risk management
- Leaders’ role to lead, role model and partner on the development of fatigue risk management systems
- However, little is known about nurse leaders perceptions of and experiences with fatigue

Occupational Fatigue in Nurses

- Complex *multidimensional state* (ranging from acute to chronic) that arises when nurses are exposed to *excessive demands* and stressors in their work with *insufficient recovery* or restoration. Fatigue interferes with nurses’ ability to function at normal capacity.
- Related to, but distinct from, burnout and sleepiness constructs.
Conceptual Model of Nurse Fatigue

Significance

Lawsuit: Ohio nurse was 'worked to death'
Background and Significance

- Nurse fatigue recognized as an important challenge to achieving safety and quality in healthcare systems
  - American Nurses Association, Registered Nurses Association of Ontario, The Joint Commission, World Health Organization, Health and Medicine Division of the National Academies of Sciences, Engineering, and Medicine
- Increasing emphasis on design, development, and implementation of fatigue monitoring and risk management systems in nursing

Purpose of Study

- Describe current hospital nurse leader fatigue levels, sources, and consequences of fatigue, and fatigue monitoring and management strategies
Mixed Methods Approach

- Sequential interviews and survey
  - Phase 1: Interviews
    - Semi-structured interviews to gain a rich understanding of nurse leaders’ experiences with fatigue - Managers and CNE
    - Quantitative measures of nurse leaders’ fatigue levels using the Occupational Fatigue Exhaustion Recovery (OFER) scale
  - Phase 2: Survey
    - National 62-item survey of CNE, Directors, and Managers
      - Current fatigue monitoring and risk management practices
      - Implementation status of fatigue policies
      - Perceptions of roles/responsibility in addressing fatigue
      - OFER measures of fatigue levels

Participants

- Phase 1: Semi-structured Interviews
  - 10 nurse managers from two hospitals
  - 11 nurse executives from hospitals across the state
  - 3 patient safety officers
- Phase 2: Online survey
  - 158 participants: 56% Nurse Executives, 30% Directors, 14% Managers
  - 29 different states
    - 94% female; 37-68 years old with a mean (SD) of 51 (9.5) years
    - 69% Masters degree or higher, 39% members of ANA
    - 46% from small (0-99 beds) hospital; 81% from non-profit hospitals
    - 10% from organizations with Magnet or Pathway to Excellence certification
PHASE 1


Nurse Leader Fatigue

- All nurse manager participants experience fatigue at work
  - Several reported experiencing fatigue almost all of the time
  - Multiple dimensions of fatigue including: mental, physical, emotional, and compassion fatigue, as well as sleep deprivation
  - Signs and symptoms of fatigue included: lack of focus, distraction, decreased tolerance, feeling overwhelmed, desire to rest

- Most nurse executive participants also reported experiencing fatigue in their current position
  - Fewer fatigue dimensions: mental and/or emotional fatigue
  - Signs and symptoms of fatigue included: physical tiredness, difficulty focusing, disorganization, making mistakes or decreased quality of work, disengagement, low energy, anxiety about starting another work week, feelings of frustration
Nurse Leader Fatigue

<table>
<thead>
<tr>
<th></th>
<th>OFER Acute Fatigue</th>
<th>OFER Chronic Fatigue</th>
<th>OFER Intershift Recovery</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Range</td>
<td>Mean</td>
<td>SD</td>
</tr>
<tr>
<td>Managers</td>
<td>17-90</td>
<td>54</td>
<td>29</td>
</tr>
<tr>
<td>CNOs</td>
<td>10-90</td>
<td>52</td>
<td>23</td>
</tr>
</tbody>
</table>

Sources of Fatigue - Managers

- Continuous 24-7 accountability (via technology)
- Visibility to staff
- Responsiveness to staff in real-time
- Meetings, email, HR "drama", personnel issues
- Constant interruptions

"...you're on call 24/7 365 days a week so you're never ever off. Even on Christmas or New Year’s or Thanksgiving, ...we got paged on Thanksgiving that staffing was tight. ...So you can't really ever relax." – NM1
Sources of Fatigue - Managers

- Continuous 24-7 accountability (via technology)
- Visibility to staff
- Responsiveness to staff in real-time
- Meetings, email, HR “drama”, personnel issues
- Constant interruptions

“Connecting with the people that need me every day. Just making sure that I’m touching stuff, if they send me an email or they try to stop me in the hall or just being overall present for all 3 shifts. And that weighs a lot on me.” – NM6

Sources of Fatigue - Managers

- Continuous 24-7 accountability (via technology)
- Visibility to staff
- Responsiveness to staff in real-time
- Meetings, email, HR “drama”, personnel issues
- Constant interruptions

“And so my day, really from the minute I hit the floor to the minute I leave, is that constant barragement. I have XX staff, I have XX patients that when I’m here physically, it’s ongoing. And then I’ve got to get to these meetings, and I also have to keep up with my email and I’m supposed to implement, put a new action plan and submit something. That’s what kind of fatigues me is that ongoing interruptions.” – NM9
Sources of Fatigue - Executives

- Meetings
- Long hours
- Work responsibilities/tasks
- Age

“So I would say 80% of what I do, I’m in a room with other people, whether it’s trying to be inspirational, whether it’s a fact finding, I spend 80% in meetings. That in and of itself to me, wears me out.” – NE1

Sources of Fatigue - Executives

- Meetings
- Long hours
- Work responsibilities/tasks
- Age

“As an executive I think it’s more of the mental fatigue because of the responsibility of the entire nursing organization and trying to move them forward to the vision. Helping them learn and maintain nursing standards. Bringing them up to skill levels that we should be at for standards of care.” – NE6
Coping

- Nurse leaders used a variety of strategies in an attempt to manage their fatigue
  - Wellness and restorative strategies - healthy eating and exercise, getting enough rest, and taking vacation
  - Social support, communication, networking activities
  - Setting boundaries, delegation, empowering staff, getting off unit, not checking email

Consequences

- Initial responses related to impact of staff nurse fatigue on nursing staff well-being and quality of care
- Leader fatigue →
  - Personal relationships, life outside of work
  - Likelihood of staying in the role, sustainability
  - Pipeline for future nurse leaders (who will be willing to step into these roles)
  - Decision-making: trickle down impact on nursing staff and patient care

“Low energy levels when I’m not working, certain times, a little anxiety related to Sunday night before starting the work week again” – NE11
Consequences

- Initial responses related to impact of staff nurse fatigue on nursing staff well-being and quality of care
- Leader fatigue ➔
  - Personal relationships, life outside of work
  - Likelihood of staying in the role, sustainability
  - Pipeline for future nurse leaders (who will be willing to step into these roles)
  - Decision-making: trickle down impact on nursing staff and patient care

“… so I talk about in health care [the] sharp end where nurses and patients are is where all the medical accidents happen… yet decisions I make here in this office at the blunt end … decisions I make every day affect the work at the sharp end. So I’m fully aware that I can be tired and still make decisions. It doesn’t seem like they’re having a direct impact on patients yet they potentially could … if I take a short cut on a preventative maintenance for equipment … those kind of decisions do affect safety and I could be making them when I’m fatigued.” – NE10

Overall Findings/Discussion

- Nurse leaders are unique as they both experience relatively high levels of fatigue, and simultaneously have a responsibility to monitor and address fatigue and associated risks in nursing staff
- Nurse managers and executives ~ equivalent levels of acute fatigue, but managers had higher chronic fatigue and lower intershift recovery levels
- Sources point to opportunities to improve health system design – e.g., new coverage models
- Fatigue may have important implications for nurse leader retention and sustainability
  - Trickle-down impacts on patient and staff outcomes
PHASE 2


Conceptual Framework
Multi-Level Fatigue Risk Management Model

### Survey Sample Characteristics – Full Sample

- 158 participants: 56% Nurse Executives, 30% Directors, 14% Managers
- 29 different states
  - 94% female; 37-68 years old with a mean (SD) of 51 (9.5) years
  - 69% Masters degree or higher, 39% members of ANA
  - 46% from small (0-99 beds) hospital; 81% from non-profit hospitals
  - 10% from organizations with Magnet or Pathway to Excellence certification
- 58% have occupancy level > 85% in last month
- 51% have < 12% annual turnover rate among RNs
- 39% have average vacancy rate of RNs of >7%
- 10% routinely mandate overtime

### Survey Sample Characteristics – Wisconsin Leaders

- Wisconsin Leaders
  - 43 participants: 27% Nurse Executives, 63% Directors, 10% Managers
  - 91% female; 33-54 years old with a mean (SD) of 48 (8.9) years
  - 58% Masters degree or higher, 22% members of ANA
  - 60% from small (0-99 beds) hospital; 91% from non-profit hospitals
  - 22% from organizations with Magnet or Pathway to Excellence certification
- 7% have occupancy level > 85% in last month
- 52% have < 12% annual turnover rate among RNs
- 29% have average vacancy rate of RNs of >7%
- 5% routinely mandate overtime
Leader Fatigue Levels

- 42% of WI leaders and 45% of nurse leaders would leave their current role in < 2 years if their fatigue level continues.
Findings - Monitoring

- Regular direct monitoring of nurses’ fatigue levels is rare
  - “I think we should be aware of it [fatigue], I’m not convinced we can monitor it. We can’t put them through a metal detector and see what level of fatigue they’re at.” – CNO
- 7% of WI leaders report that their organization monitors fatigue level among nurses
- Most organizations also not tracking fatigue consequences

<table>
<thead>
<tr>
<th>Item</th>
<th>% (n)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Our organization regularly monitors nurse fatigue</td>
<td></td>
</tr>
<tr>
<td>Strongly Disagree</td>
<td>22 (32)</td>
</tr>
<tr>
<td>Disagree</td>
<td>52 (77)</td>
</tr>
<tr>
<td>Neither Agree nor Disagree</td>
<td>19 (29)</td>
</tr>
<tr>
<td>Agree</td>
<td>7 (10)</td>
</tr>
<tr>
<td>Strongly Agree</td>
<td>0 (0)</td>
</tr>
<tr>
<td>My organization has adequate systems in place to monitor fatigue in individual nurses.</td>
<td></td>
</tr>
<tr>
<td>Strongly Disagree</td>
<td>19 (28)</td>
</tr>
<tr>
<td>Disagree</td>
<td>52 (75)</td>
</tr>
<tr>
<td>Neither Agree nor Disagree</td>
<td>20 (29)</td>
</tr>
<tr>
<td>Agree</td>
<td>9 (13)</td>
</tr>
<tr>
<td>Strongly Agree</td>
<td>0 (0)</td>
</tr>
<tr>
<td>My organization is aware of the sources of fatigue that our nurses experience.</td>
<td></td>
</tr>
<tr>
<td>Strongly Disagree</td>
<td>7 (11)</td>
</tr>
<tr>
<td>Disagree</td>
<td>26 (39)</td>
</tr>
<tr>
<td>Neither Agree nor Disagree</td>
<td>26 (38)</td>
</tr>
<tr>
<td>Agree</td>
<td>37 (55)</td>
</tr>
<tr>
<td>Strongly Agree</td>
<td>4 (6)</td>
</tr>
<tr>
<td>Our organization tracks the consequences of fatigue</td>
<td></td>
</tr>
<tr>
<td>Strongly Disagree</td>
<td>21 (31)</td>
</tr>
<tr>
<td>Disagree</td>
<td>49 (72)</td>
</tr>
<tr>
<td>Neither Agree nor Disagree</td>
<td>19 (29)</td>
</tr>
<tr>
<td>Agree</td>
<td>11 (16)</td>
</tr>
<tr>
<td>Strongly Agree</td>
<td>0 (0)</td>
</tr>
</tbody>
</table>

Current State of FRMS – Decision Tools

- Tools to support decision-making about fatigue were rarely identified
- Existing tools support retroactive vs proactive monitoring of fatigue sources and consequences
  - Reports on hours worked
  - Reports on staffing

<table>
<thead>
<tr>
<th>Item</th>
<th>% (n)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Are there decision support tools that assist you as a leader to make decisions about fatigue management strategies?</td>
<td></td>
</tr>
<tr>
<td>Yes</td>
<td>10 (15)</td>
</tr>
<tr>
<td>No</td>
<td>90 (136)</td>
</tr>
<tr>
<td>My organization has sufficient tools and data monitoring in place to address fatigue.</td>
<td></td>
</tr>
<tr>
<td>Strongly Disagree</td>
<td>27 (41)</td>
</tr>
<tr>
<td>Disagree</td>
<td>50 (75)</td>
</tr>
<tr>
<td>Neither Agree nor Disagree</td>
<td>17 (26)</td>
</tr>
<tr>
<td>Agree</td>
<td>5 (7)</td>
</tr>
<tr>
<td>Strongly Agree</td>
<td>1 (1)</td>
</tr>
</tbody>
</table>
Findings – Fatigue Management

• Majority of participants’ organizations did not have a formal fatigue management system in place
  • ~25% of respondents indicated their organization was implementing some strategies to address fatigue
    • Changing patient assignments
    • Employee assistance programs
    • Self-care strategies
    • Quiet spaces to rest
• Systems approach to addressing nurse fatigue that considers the entire work system is not reported

<table>
<thead>
<tr>
<th>Survey Item</th>
<th>Response</th>
<th>% (n)</th>
<th>WI Data</th>
</tr>
</thead>
<tbody>
<tr>
<td>Does your facility have a policy on limiting nurse shift scheduling to</td>
<td>Yes</td>
<td>57.0% (85)</td>
<td>48% (20)</td>
</tr>
<tr>
<td>mitigate fatigue?</td>
<td>No</td>
<td>43.0% (64)</td>
<td>52% (22)</td>
</tr>
<tr>
<td>Does your facility have a mandated nurse-patient staffing ratio policy?</td>
<td>Yes</td>
<td>14.6% (23)</td>
<td>2% (1)</td>
</tr>
<tr>
<td></td>
<td>No</td>
<td>85.2% (132)</td>
<td>98% (41)</td>
</tr>
<tr>
<td>Does your hospital have a policy that supports nurse napping?</td>
<td>Yes</td>
<td>4.5% (7)</td>
<td>2% (1)</td>
</tr>
<tr>
<td></td>
<td>No</td>
<td>95.5% (149)</td>
<td>98% (41)</td>
</tr>
<tr>
<td>Does your facility provide a formal program or policy for alternative</td>
<td>Yes</td>
<td>2.5% (4)</td>
<td>2% (1)</td>
</tr>
<tr>
<td>transportation home to staff members who are fatigued after their shift?</td>
<td>No</td>
<td>95.5% (150)</td>
<td>98% (41)</td>
</tr>
<tr>
<td></td>
<td>Not known</td>
<td>1.9% (3)</td>
<td></td>
</tr>
<tr>
<td>Does your facility currently provide education to nurse managers/supervisors</td>
<td>Yes</td>
<td>13.3% (20)</td>
<td></td>
</tr>
<tr>
<td>on fatigue risk management?</td>
<td>No</td>
<td>86.7% (130)</td>
<td></td>
</tr>
</tbody>
</table>

Findings – Adoption of Evidence-Based Policies

• Adoption of evidence-based policies to address fatigue is both limited and variable
  • Scheduling ~57%
  • Napping and alternative transportation < 5%
Findings – Organization Level

- Only 27% of nurse leaders believe other hospital leaders are aware of nurse fatigue (24% in WI)
- 75% disagree that addressing fatigue is a priority in their hospital (53% in WI)
- 91% agree it is the role of organizational leadership to address fatigue (88% in WI)
- Critical antecedents for organizational change to implement FRMS are lacking in hospitals

Overall Findings/Discussion

- Data sources and collection strategies that enable regular monitoring of nurse fatigue are needed to adequately address fatigue
- Participants overwhelmingly reported that their organizations are not currently monitoring nurse fatigue levels
- Existing strategies to address fatigue primarily focus on scheduling policies, education about fatigue, and programs to promote self-care
- Published recommendations/policies to address fatigue are not widely implemented
  - Barriers?
Implications - Personal

- Develop and consistently use healthy coping strategies
  - Evidence-based coping strategies:
    - Sleep hygiene
    - Healthy eating
    - Exercise
    - Social support/mentoring
    - Establishing boundaries
    - Role model self care
    - Breaks and time away for recovery
Take time for self awareness

Implications - Unit

• Monitoring staff fatigue
• Implementation of evidence to manage fatigue risks
  • Schedules
  • Breaks
  • Team support
  • …
• Establishing healthy culture of fatigue
  • The ability to say No
  • Just culture
  • Safety culture
## Healthy Fatigue Culture

- Address the challenges
  - Stigma of reporting fatigue
  - Super Nurse
  - Need for Transparency

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## Education on Fatigue

- National Institute for Occupational Safety and Health - Nurse Training Program
- [https://www.cdc.gov/niosh/work-hour-training-for-nurses/](https://www.cdc.gov/niosh/work-hour-training-for-nurses/)
May you know when to rest and when to fly

Implications - Organization

- Prioritize fatigue as important safety/quality issue
- Discuss with leadership team
- Implement data monitoring and management strategies across units
- Implement best practice policies
  - Scheduling, staffing, napping, transportation, training
- Attention to nurse leader fatigue, particularly at manager level
  - New models of coverage/leadership – protected time away for inter-shift recovery
Putting the Pieces Together

Fatigue is a critical challenge

- Develop and adopt Fatigue Risk Management Systems
- Implement innovative policies and tools to better monitor and measure work demands
- Need a macro approach to support
- Consider potential use of learning networks
Thank you for your support!

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Questions and Dialogue