



**National
Association of
Neonatal
Nurses**

The Effect of Staff Nurses' Shift Work and Fatigue on Patient Safety and Nurses' Health

Position Statement #3079

NANN Board of Directors
Revised July 2026

The National Association of Neonatal Nurses (NANN) and its members are committed to efficient, equitable, safe, accountable, and high-quality patient care. As the professional voice of neonatal nurses, NANN recognizes the importance of the maintenance of sleep health for nurses caring for the tiniest patients in the healthcare system. To reduce the risk of fatigue and sleepiness, maintaining sleep health is the responsibility of all nurses and their employers. Current research on staff nurses' shift work and the fatigue associated with it is limited. However, fatigue and sleepiness, especially with shift work and long hours, can be linked to unsafe institutional cultures and environments and to work/life imbalance.

Association Position

Nurses are responsible for independent judgment related to patient care and treatment; therefore, it is imperative that they monitor their own fatigue levels. NANN recommends that neonatal nurses and their employers implement a combination of countermeasures to minimize personal and patient safety risks related to fatigue, shift length, and overtime. First published in 2015 as "The Effect of Staff Nurses' Shift Length and Fatigue on Patient Safety and Nurses' Health," this revised position statement provides updated recommendations for nurses as well as organizations. NANN joins other nursing organizations in recognizing the need for a healthcare culture that supports the prevention of fatigue and sleep deprivation for nurses, including those who care for fragile patients in neonatal intensive care units.

Background and Significance

Ongoing concerns related to shift work and patient safety prompted a number of organizations to issue recommendations regarding fatigue and shift work as early as 2004 by the Institute of Medicine (now the National Academy of Medicine). Those recommendations have been revised and updated as new research is released. Available evidence, although inconclusive, points to a link between shift work, fatigue, suboptimal patient outcomes, and increased healthcare errors (An et al., 2022; Keys, 2020; Scott-Marshall, 2024).

Shift work refers to work hours outside of 7 am–6 pm and can include rotating shifts, extended work hours, and overtime. Shift work significantly increases mental and physical fatigue, with reduced performance occurring on the night shift and during extended hours (Min et al., 2020; Ulupinar & Ulupinar, 2025).

Fatigue is “an extreme sense of tiredness and lack of energy that can interfere with a person’s daily activities” (National Cancer Institute, n.d.). A nurse’s fatigue increases over three consecutive shifts, and this is particularly a concern for night-shift nurses (Cockerham et al., 2023).

There are no clear guidelines to inform neonatal nurse administrators and staff nurses about how to manage shift length and overtime, and there are no known measures that can effectively eliminate the negative effects of shift work. Federal regulations govern working hours in industries such as aviation and transport but not nursing (Scott-Marshall, 2024).

In 2025, the American Nurses Association (ANA) issued a new edition of *Code of Ethics for Nurses*. For the first time, the code included a provision addressing each nurse’s “personal health and safety,” emphasizing the importance of the nurse’s wellbeing to nursing and patient health. This provision states that “nurses have a duty to take care of their own health and safety” (ANA, 2025, p. 18). In 2026, ANA issued a new position statement on nursing fatigue and stated, “Fatigue is both an individual responsibility and a critical organizational imperative to safeguard both nurses’ well-being and patient safety. Nurse fatigue is not a personal failing but a predictable outcome of system failure, making its prevention and mitigation a shared personal, ethical, and organizational responsibility” (p. 1).

These statements from ANA frame the central issue of this discussion: nurses’ health, safety, and fatigue prevention are essential to nurse well-being and to patient safety. However, the profession’s immense responsibilities can contribute to fatigue, burnout, and depression, adversely affecting nurses’ professional and personal lives (ANA, 2025).

The shortage of bedside nurses in today’s healthcare environment places undue burdens on nurses. Nurses are leaving the bedside in record numbers, especially newly licensed nurses (ANA, 2023), with an estimated 33% leaving within their first 2 years of bedside nursing (Tate, 2024). With units understaffed, remaining bedside nurses feel

obligated to pick up additional shifts to ensure patients receive the care they need. This leads to a vicious cycle of inadequate rest and fatigue, exacerbated by the pervasive belief that nurses must fill these gaps (Scott-Marshall, 2024).

Long hours, shift work, increasingly complex patient care, and workplace violence contribute to nurse stress and fatigue (ANA, 2026; Cockerman et al., 2023). In several countries, including the United States, it is standard for nurses to routinely work 12 or more hours. This often is reported to help nurses improve work-life balance (Ejebu et al., 2021), and from a leadership perspective, these longer shifts allow for easier scheduling, fewer handoffs, and reduced staffing costs, including break times and wages (Haller et al., 2020). However, these longer shifts have shown no evidence of increased productivity and are associated with missed care, errors, work-related injuries, higher rates of burnout, and possible legal ramifications (ANA, 2026; Ejebu et al., 2021; Keys et al., 2020).

Risks increase for those working rotating shifts or night shifts. Nurses have reported their alertness decreases and their fatigue increases over the course of a night shift. This could be because they must maintain alertness for an extended time against their circadian rhythm while being less active due to patients being asleep (Farag et al., 2024). In addition, many nurses did not fully recuperate between their work shifts (Alshammari et al., 2025.). When a nurse rotates shifts, their fatigue is elevated and could exacerbate the circadian rhythm misalignment (Booker et al., 2024). This misalignment can prevent nurses from getting the 7 hours of sleep required to maintain health (Caruso et al., 2019), leading to sleep deprivation (Ulupinar & Ulupinar, 2025). Not getting adequate sleep can put a nurse at risk for cardiovascular disease, gastrointestinal and psychological disorders, cancer, type 2 diabetes, injuries, musculoskeletal disorders, adverse reproductive outcomes, and difficulty managing chronic diseases (Caruso et al., 2019; Ulupinar & Ulupinar, 2025). This fatigue and its effects can then lead to nurse absenteeism due to illness (Larsen et al., 2020; Sabzi et al., 2023; Shdaifat et al., 2023).

When a nurse can't work due to sickness, their employer must find staff to cover the missed shift. To cover these assignments, employers often ask volunteers to work overtime. Only about a third of the states have laws that seek to protect employees by prohibiting or restricting mandatory overtime. However, these laws do not address volunteering, contain vague provisions for emergencies that allow facilities to override the limits, and contain no provisions for meals or breaks (Caruso et al., 2019).

When a nurse works overtime or works rotating shifts, they experience inadequate sleep and often do not feel fully refreshed due to insufficient time to recover between their shifts, leading to acute and chronic fatigue (Min et al., 2020; Yamaguchi et al., 2023). This fatigue can lead to a lack of attention to detail and problems with memory, decision making, hand-eye coordination, and fine motor skills (Ulupinar & Ulupinar, 2025). In addition, the nurse accumulates sleep debt and exhaustion, leading to impairments in concentration, vigilance, and motivation (Alshammari et al., 2025). A fatigued nurse might ensure medications are administered and continue to monitor vital

signs but may miss other aspects of patient care (Alshammari et al., 2025). For example in the NICU, one study found that nurses most frequently skipped hourly IV-line assessments and failed to complete infant assessments when they were fatigued (Tubbs-Cooley et al., 2025). Nurses need to be well-rested so they can take care of their patients and identify errors before they reach the patient (Farag et al., 2024.).

Recommendations

Due to the multifactorial nature of shift work and safety outcomes, strategies to reduce fatigue and improve safety should be a collaborative and shared responsibility.

For Employers

1. Promote a culture of safety that recognizes nurse fatigue as an unacceptable risk.
2. Utilize evidence-based scheduling (Alshammari et al., 2025; Min et al., 2022; Scott-Marshall, 2024).
 - a. Limit the number of consecutive 12-hour shifts to three (ANA, 2026).
 - b. Limit the number of hours worked in a 24-hour period to no more than 12 hours and the amount of worked time to no more than 40 hours in 7 days (ANA, 2026). In emergency situations, it may be necessary for a staff nurse to remain on duty for a longer period, but this should be an exception required by unusual circumstances, such as severe weather.
 - c. There should be a minimum of 11 hours off between shifts, 1-2 days off after working night shifts, and 2 rest days after working five 8-hour shifts, four 10-hour shifts, or three 12-hour shifts (Alshammari et al., 2025; Min et al., 2022; National Institute for Occupational Safety and Health, 2024).
 - d. Nurses who work rotating shifts should have forward-rotating schedule where the day shifts are worked first followed by the evening/night shifts (Alshammari et al., 2025; ANA, 2026; National Institute for Occupational Safety and Health, 2024; Ulupinar & Ulupinar, 2025). Nurses should have at least 48 hours off between rotating shifts (Min et al., 2022).
 - e. Incorporate self-scheduling allowing nurses to provide input on their schedules (Al Yahyaei et al., 2025; Alshammari et al., 2025; National Institute for Occupational Safety and Health, 2024).
3. Monitor and ensure adequate staffing through workload analysis, retention, and recruitment. Adequate staffing allows for safe nurse-to-patient ratios, limited overtime, and uninterrupted breaks (Alshammari et al., 2025; Keys, 2020; Min et al., 2022; National Institute for Occupational Safety and Health, 2024).
4. Create and implement a Fatigue Risk Management System (FRMS) that includes a fatigue management policy, fatigue risk management, an anonymous reporting system for employees, incident investigation, fatigue management education, sleep disorder management, and corrective actions for continuous improvement (ANA, 2026; National Institute for Occupational Safety and Health, 2024).

5. Provide education and resources to leadership and nurses regarding shift work, fatigue, poor sleep, and the associated risks (ANA, 2026; National Institute for Occupational Safety and Health, 2024; Scott-Marshall, 2024).
6. Offer organizational wellness programs, including resilience training, mindfulness and mental health support (ANA, 2026; Alshammari et al., 2025; Ulupinar & Ulupinar, 2025).
7. Implement procedures for nurses experiencing fatigue following shift work. Consider offering sleep rooms for nurses to take a nap prior to driving home or providing transportation home for nurses too fatigued to drive home safely (ANA, 2026; National Institute for Occupational Safety and Health, 2024; Scott-Marshall, 2024).

For Bedside Registered Nurses

1. Uphold the ethical responsibility of nurses to arrive at work adequately rested and prepared to provide patient care.
2. Advocate for uninterrupted breaks, adequate staffing, and self-scheduling (Alshammari et al., 2025; ANA, 2026; Keys, 2020; Min et al., 2022; National Institute for Occupational Safety and Health, 2024; Ulupinar & Ulupinar, 2025).
3. Utilize breaks to recharge, do self-care, or take a short nap (ANA, 2026; Booker et al., 2024; Ulupinar & Ulupinar, 2025). Naps of 15-30 minutes can increase alertness (ANA, 2026; National Institute for Occupational Safety and Health, 2024).
4. Limit your schedule to three consecutive 12-hour shifts; no more than 12 hours in a 24-hour period, and no more than 40 hours in 7 days (ANA, 2026). There should be a minimum of 11 hours off between shifts; 1-2 days off after working night shifts; and 2 rest days after working five 8-hour shifts, four 10-hour shifts, and three 12-hour shifts (Alshammari et al., 2025; ANA, 2026; Booker et al., 2024; Min et al., 2022; National Institute for Occupational Safety and Health, 2024). It may be necessary to work longer periods due to emergencies; however, this should be infrequent.
5. Participate in education and training related to the signs, symptoms and causes of fatigue and how to eliminate or mitigate it (ANA, 2026; Booker et al., 2024; Scott-Marshall, 2024).
6. Make sleep a priority. Learn tips and strategies for improving sleep (Booker et al., 2024; National Institute for Occupational Safety and Health, 2024).
 - a. Set a goal of 7-9 hours of good sleep in a cool, dark, quiet environment (ANA, 2026; National Institute for Occupational Safety and Health, 2024; Scott-Marshall, 2024).

- b. Use light therapy to affect alertness. Utilize bright lights to increase alertness and dim lights in preparation for sleep (ANA, 2026; Booker et al., 2024; National Institute for Occupational Safety and Health, 2024; Ulupinar & Ulupinar, 2025).
 - c. Learn and use techniques that promote good sleep, such as deep breathing, meditation, and muscle relaxation (ANA, 2026; National Institute for Occupational Safety and Health, 2024).
 - d. Adjust your diet because it can play an important role in sleep quality. Before going to sleep, avoid alcohol, large meals, and high carbohydrate, spicy, or sugary foods (Booker et al., 2024; National Institute for Occupational Safety and Health, 2024). Control the amount and timing of caffeine intake carefully (Booker et al., 2024; National Institute for Occupational Safety and Health, 2024; Ulupinar & Ulupinar, 2025). If nonpharmacologic strategies are insufficient, stimulants and sleep aids can be used for short periods (National Institute for Occupational Safety and Health, 2024).
7. Participate in organizational wellness programs on topics like resilience training and mindfulness interventions (ANA, 2026; Alshammari et al., 2025; Ulupinar & Ulupinar, 2025).
8. Ensure safe driving.
 - a. Identify strategies to prevent driving while drowsy. Take a nap before driving home, stop driving if you feel drowsy, or consider alternatives like carpooling, ridesharing apps, and public transportation (ANA, 2026; National Institute for Occupational Safety and Health, 2024).
 - b. Learn to recognize the warning signs of drowsy driving, including trouble focusing, frequent blinking or yawning, heavy eyelids, crossing lane lines or drifting onto the shoulder, and missing traffic signs/signals (National Institute for Occupational Safety and Health, 2024).
9. Know and understand your state board of nursing regulations, state and local labor laws, and resources like those available from the Occupational Safety and Health Administration (OSHA) (ANA, 2026).

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