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Health and the Hospital Workplace Environment of US Nurses

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Purpose:

The purpose of this study is to describe registered nurses' (RNs) health, perceived health and their perception of the health and safety of the hospital work environment. Nurses entrusted to support the health of the population are at risk for their own health and safety because of their work environment. A healthy work environment is defined as "one that is safe, empowering, and satisfying" (American Nurses Association, 2016). Despite this, 61% of U.S. RNs are employed in hospitals, one of the most hazardous workplaces (Bureau of Labor Statistics [BLS], 2013; National Institute for Occupational Safety and Health [NIOSH], 2016). Hospital workers suffer work-related injuries at a rate of 6.8 for every 100 full time employees, almost twice the rate in industry (BLS., 2013). Nurses, who constitute the largest segment of hospital employees, collectively are the most vulnerable for multiple workplace safety hazards (BLS, 2015).

Hospital nurses are exposed to multiple health and safety risks: infectious disease, musculoskeletal strain and injury from lifting, positioning and transferring patients, and workplace violence (U.S. Department of Labor, 2013). Workplace hazards put nurses at risk for physical injury but nurses are also subject to workplace stressors of bullying, lengthy hours with little relief, heavy workloads, and lack of respect that may result in high levels of anxiety and depression (Letvak, Ruhm, & McCoy, 2012). Combined, these stressors may result in poor perceived health, low worker productivity and ultimately affect patient care. But there is a lack of research to address these concerns.

Methods:

A cross-sectional descriptive study was used conducted using the American Nurses Association HealthyNurse™ online health risk appraisal data collected from October 2013 to December 2015. A convenience sample of 2,730 RNs (37% of a total of 7,642 RN participants), actively employed in typical hospital subspecialties was included in the analysis. Excluded were nurse participants who self-identified as students, retired, non-employed, licensed advanced practitioners, doctoral prepared, educators, administrators, community health and outpatient specialties. Health conditions diagnosed by a health professional (15) were selected if applicable. Height and weight were calculated to derive body mass index (BMI). Nurses' perceived health measures include: self-rated health (poor to excellent), role limitations (within 30 days), mental health (within 14 days), and emotional support (never to always). Workplace measures included: safety climate, significant risks, safe patient handling and mobility, sharps, bullying/violence, fatigue, workplace wellness, and absent/present. Responses were: select all that apply (risks), yes/no, and Likert-type format of strongly disagree, disagree, neither agree nor disagree, agree, strongly agree, don't know/not sure or N/A.

Results:

The study participants were (White [75%], female [92%], with a mean age of 40 years old. About 45 % had a bachelor in nursing and 42% had less than 5 years of nursing experience. Work characteristics were dayshift (58%), 12-hour shifts (52%), overtime (41%), unplanned overtime (67%), and > 50% felt

obligated to work when ill. Only 48% reported their health was very good or excellent. Nurses reported fatigue 5/14 days, yet, most (70%) get emotional support. Nurses' most common physical health diagnoses were allergies (29.1%), low back pain (21.8%), migraines (17.9%), and hypertension (15.0%); nurses' most common mental health diagnoses were depression (17.8%) and anxiety (14.7%). Healthy weight was attributed to 43% of the nurses (BMI 18.5–24.9 kg/m²), yet 55% were either overweight or obese.

Key workplace findings include risks of workplace stress (80%), musculoskeletal strain/disability (60%), and hospital-acquired infections (45%). Sharps and safe patient handling technology was available in 75-85% of the hospitals, although few nurses (26% and 34%) were involved in the safety technology selection. Fewer than half of the nurses' routinely use lifting technology while greater than 60% experience musculoskeletal pain at work. Nurses (75%) have favorable perceptions of their employers and co-workers' concerns for one another and 90% agree or strongly agree that employees/staff look out for each other's safety and health. Bullying was experienced greatest from peers (56%), patients or family (56%), while slightly less from persons in authority (42%). Workplace wellness scored high (91%) for being smoke-free, with 57% agreeing they have healthy food choices (although more expensive).

Conclusion:

This study examined U.S. hospital nurses' perception of their health, wellbeing, and safety concerns of their workplaces. Using a large sample of nurses from across the US, whose demographics closely match national data for race and gender, the results can be generalized to U.S. hospitals and nurses. Globally, healthcare systems, nurse regulations, and labor standards vary, therefore, caution should be used when comparing the findings. The study found multiple unhealthy work environment factors that may be risks to nurses' health and safety. Nurses' poor perceived health may reflect the difficult challenges of the hospital workplace. Future research is needed to establish a relationship between the workplace environment and nurses' health, patient outcomes and quality of care. Improving the hospital workplace environment may ensure a safe and healthy nursing workforce for the provision of optimal patient care.

Title:

Health and the Hospital Workplace Environment of US Nurses

Keywords:

Hospital registered nurses, Hospital workplace environment and Perceived health

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Abstract Summary:

A cross-sectional study using the American Nurses Association HealthyNurse™ online health risk appraisal data to describe hospital registered nurses' health, perceived health and their perception of the health and safety of the hospital work environment.

Content Outline:

Introduction

Hospitals are among the most hazardous workplaces in the US.

Registered nurses are collectively the largest group of hospital employees.

Hospital nurses' health and safety is at risk due to the hospital work environment

Purpose

The purpose of this study is to describe RNs health, perceived health and their perception of the health and safety of the hospital work environment.

Main point #1: Describe nurses' responses to the hospital workplace health and safety environment.

Supporting point # 1 *Nurses' responses to the workplace safety climate:* Nurses (75%) have favorable perceptions of their employers and co-workers' concerns for one another and 90% agree or strongly agree that employees/staff look out for each other's safety and health.

Supporting point # 2 *Nurses' responses to the workplace risks:* Key workplace findings include risks of workplace stress (80%), musculoskeletal strain/disability (60%), and hospital-acquired infections (45%).

Supporting point # 3 *Nurses' responses to safe patient handling and sharps:* Sharps and safe patient handling technology was available in 75-85% of the hospitals, although few nurses (26% and 34%) were involved in the safety technology selection. Fewer than half of the nurses' routinely use lifting technology while greater than 60% experience musculoskeletal pain at work.

Supporting point # 4 *Nurses' responses to bullying/violence:* Bullying was experienced greatest from peers (56%), patients or family (56%), while slightly less from persons in authority (42%).

Supporting point # 5 *Nurses' responses to fatigue/shiftwork:* Nurse responses to working hours/shift characteristics were dayshift (58%), 12-hour shifts (52%), overtime (41%), unplanned overtime (67%).

Supporting point # 6 *Nurses' responses to workplace wellness:* Workplace wellness scored high (91%) for being smoke-free, with 57% agreeing they have healthy food choices (although more expensive).

Supporting point # 7 *Nurses' responses to being absent or present*. Greater than half of the nurses (55%) feel obligated to report to work when sick.

Main point # 2: Survey results of hospital nurses' perceived health including self-rated health, role limitations, and emotional support.

Supporting point # 1 *Nurses' responses to self-rated health*: Only 48% reported their health was very good or excellent.

Supporting point # 2 *Nurses' responses to role limitations*: Key finding was that nurses reported fatigue 5/14 days.

Supporting point # 3 *Nurses' responses to emotional support*: Most nurses (70%) get enough emotional support.

Main point # 3 Survey results of hospital nurses' actual health

Supporting point # 1 *Nurses' most common health diagnoses*: Nurses' most common physical health diagnoses were allergies (29.1%), low back pain (21.8%), migraines (17.9%), and hypertension (15.0%); nurses' most common mental health diagnoses were depression (17.8%) and anxiety (14.7%).

Supporting point # 2 *Nurses' reported weight and height calculated to body mass index (BMI)*: Healthy weight was attributed to 43% of the nurses (BMI 18.5–24.9 kg/m²), yet 55% were either overweight or obese.

Conclusions:

The study found multiple unhealthy work environment factors that may be risks to nurses' health and safety.

Nurses' poor perceived health may reflect the difficult challenges of the hospital workplace.

Future research is needed to establish a relationship between the workplace environment and nurses' health, patient outcomes and quality of care.

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