

STEPPING IN, STEPPING UP, AND STEPPING OUT: COMPETENCIES FOR INTENSIVE CARE UNIT NURSING LEADERS DURING DISASTERS, EMERGENCIES, AND OUTBREAKS

By Clayton J. Shuman, PhD, MSN, RN, and Deena Kelly Costa, PhD, RN

The novel coronavirus (COVID-19) pandemic has substantially burdened intensive care units (ICUs). Patients with COVID-19, particularly those with severe illness, require ICU care—mechanical ventilation, vasopressors, and other invasive monitoring and support to treat symptoms of the disease. The surge of patients experienced in ICUs across the globe overwhelmed ICUs and hospital supply chains (eg, for ventilators, personal protective equipment). More specifically, the rapid increase in the number of patients with COVID-19 resulted in an exponential increase in demand for critical care nursing. As a result, nurse leaders in critical care settings are well positioned to address the challenges before, during, and after increases in ICU utilization following a disaster and more specifically, COVID-19.

Nurse leader competencies related to disaster preparedness are not well described, and leadership during disaster response and recovery has been discussed even less.¹ Veenema and colleagues² reported that institutional awareness of available resources, understanding of processes, and prior disaster experience increased leadership competence in managing disaster responses. To extend these findings and support development of education and training programs about disaster preparedness for nurse leaders in critical care, we describe a set of disaster preparedness competencies for nurse leaders that is informed by relevant literature, professional organization recommendations, and expert opinion. Achieving competency in disaster preparedness, response, and

recovery will equip critical care nurse leaders to *step in* and engage in new leadership roles and teams, *step up* and handle increased leadership demands, and *step out* and influence policy and public health.

Nurse Leader Competency Domains for Disaster Preparedness, Response, and Recovery

Nurses play a crucial role in planning, implementing practice change, and informing policy to improve local, regional, and national readiness.³ More specifically, numerous recommendations for state-level nursing leadership following natural disasters include development of standardized emergency preparedness plans, leadership infrastructure to support all levels of leadership while providing room for new leaders to emerge, and building and maintaining partnerships with government, academic, and private-sector businesses during disasters.^{4,5} In hospital settings, nurse leaders fill an array of roles at various levels (eg, chief nursing officer, department or section director, unit manager, charge nurse). During unprecedented events, nurses look to their immediate and organizational leaders for support, direction, and information.

Although a nurse leader's competency in disaster planning and preparedness is vital to effective management, it alone is insufficient. Nurse leaders must also have competencies to enact response plans and lead response and recovery efforts. The American Organization of Nurse Leaders (AONL) has established competencies for nurse executives and leaders, such as nurse managers,⁶ post-acute care leaders,⁷ and population health leaders.⁸ Disaster

©2020 American Association of Critical-Care Nurses
doi:<https://doi.org/10.4037/ajcc2020421>

“ To prepare for current and future disasters and pandemics, . . . nurse leaders need to develop skills in 3 key areas: (1) communication, (2) business, and (3) leadership. ”

preparedness is identified as a key skill, but there are many skills that allow a nurse leader to manage effectively during a disaster or pandemic. To guide nurse leaders further in preparing for current and future disasters and pandemics, we summarize AONL recommendations and expert opinion, as well as insight from the current COVID-19 pandemic, to suggest skill development for nurse leaders in 3 key areas: (1) communication, (2) business, and (3) leadership. We argue that communication skills are most central, as communication is intensified during a pandemic and adept communication skills assist the nurse leader to be more competent in the other areas such as personal leadership and equip them for stepping up, in, and out as leaders during crises.⁹

Communication Skills

We suggest 3 types of communication necessary during a disaster—communicating *in* (to staff), communicating *up* (to leaders and managers), and communicating *out* (to policymakers and the community).

Communicating *in* involves routine updates to staff about planning and necessary preparations; this communication builds trust and allows leaders to demonstrate empathy and compassion during crises. Acknowledging the unusual circumstances in a pandemic can help validate the normal human response that many, if not all, clinicians will experience to a very abnormal circumstance.¹⁰ Doing so will assist the nurse leader in managing interpersonal conflict (eg, when a staff nurse refuses to be assigned to a COVID-19 patient) and help instill confidence in their leadership when much is unknown and evolving. Experience and ease with communicating with staff in multiple different forums (eg, email, in person, telephone, videoconferencing) is key.

Communicating *up* involves sharing the needs of the bedside staff and their own departments, units, or hospitals to the executives. Communicating *up* is an everyday occurrence for nurse leaders;

but during a pandemic, leaders should consider being more intentional when communicating with executives. Intentionality allows the leader to advocate for the bedside staff and communicate the needs and issues that arise in the delivery of critical care. For example, during the COVID-19 pandemic, many ICU leaders transitioned to a team nursing model in which 3 ICU nurses and 2 floor nurses are responsible for 4 to 8 patients.¹¹ Under these circumstances, unit nursing leaders are tasked with communicating the necessity and benefits of this staffing model to bedside nursing staff (communicating *in*) while also communicating to hospital executives suggestions to improve the staffing model to optimize ICU nursing's contribution despite limited resources (communicating *up*).

Communicating *out* is arguably the area of greatest skill development for nursing. Despite nursing's role as the largest group of health care providers, often nurses are not involved in key policy decisions or in providing expert opinions in the media; in fact, researchers in one study found that nurses are included in only 2% of all media articles about health care.¹² To capitalize on public trust and nursing's extensive knowledge base, nursing as a profession and nurse leaders as a group need to develop skills in communicating out through advocacy efforts. Seeking training opportunities that provide public policy communication training could enable further skill development in communicating out.

Communicating *in*, *up*, or *out* involves the ability to effectively solicit input, listen, and make adjustments (if possible) based on feedback. Competency in effective communication is a requirement for optimal leadership during public health crises and helps prepare the leader for success in other competency domains such as business and personal leadership skills.

Business Skills

A broad range of business skills are necessary for leaders to lead effectively. Financial competency, strategic planning, and the ability to analyze, interpret, and use data are critical skills during a pandemic like COVID-19, especially for unit-based leaders (eg, nurse managers).

Disasters can have a profound effect on unit budgets. Nurse leaders must have financial competence, including the ability to be financially nimble, innovative, and pragmatic.¹³ Opportunities to minimize

About the Authors

Clayton J. Shuman and **Deena Kelly Costa** are assistant professors, University of Michigan School of Nursing, and members of the Institute for Healthcare Policy and Innovation, University of Michigan, Ann Arbor Michigan.

Corresponding author: Clayton J. Shuman, PhD, MSN, RN, 400 N Ingalls, Ste 4162, Ann Arbor, MI 48109 (email: clayshu@umich.edu).

costs need to originate from both high-level hospital executives and bedside staff. Nurse leaders play an important role in managing these ideas, solutions, and opportunities and can leverage effective communication skills to solicit and communicate solutions between bedside staff and executives. Being able to incorporate creative solutions to keep budgets as net-neutral as possible can build esprit de corps and help manage costs. For example, team nursing models may engender a sense of team and togetherness, while additionally helping to minimize staffing costs associated with increases in ICU admissions, staff unable to work because of illness, and demand for agency nurses.

In addition to financial competence, nurse leaders must be strategic in their thinking, planning, and management specifically as it relates to disaster response and recovery.^{1,2} Examples include development of a disaster preparedness plan, identification of an Incident Command Center, and provision of an effective staff training, including use of simulation. Disaster response plans are informed by environmental scans, stakeholder engagement, and competitor analyses to identify needs, strengths, opportunities, threats, and best practices (eg, staffing models during disasters). Identification of an Incident Command Center for the hospital—and communicating that information to the staff—is critical so that all are receiving the most up-to-date information.⁹ Robust and consistent disaster response training is necessary before disasters, as is training new, redeployed, or reassigned staff during disasters.¹⁴ Nurse leaders maintain responsibility for resourcing and supporting effective training. For example, during the COVID-19 pandemic, as ICUs became overwhelmed with patients and adequate nurse staffing became problematic, timely and effective training of nurses from acute medical/surgical areas to work in the ICU was paramount and could have benefited from simulation training. Future strategic plans could consider adding simulation in team-based nursing care as one component of onboarding acute medical/surgical nurses to prepare nurses and the leadership for strategic redeployment of staff.

Localized data (eg, from the community, hospital, or unit) inform critical decision-making during disasters. Nurse leaders must be competent in identifying relevant data elements needed to inform decisions, analyzing and interpreting data, and using data to support their own decisions.¹⁵ Because nurse leaders influence other decision-makers (eg, hospital executives, policymakers), they must be able to present data-driven recommendations to stakeholders in a meaningful way (eg, data visualization, benchmarking). For example, data regarding positive COVID-19 cases at community long-term care facilities can help

ICU nurse leaders predict potential patient surges or changes to staffing.

Leadership Skills

Competencies in leadership contribute to a nurse leader's effectiveness in managing disaster response and recovery. Understanding the various leadership styles¹⁶ (eg, charismatic, transformational, servant), and how to use them for specific situations can improve staff engagement, workflow, and occupational health and well-being. For example, during the initial changes related to the COVID-19 pandemic, a relational leadership style might have been more necessary and prominent—to communicate to staff that the leaders understood the challenges and empathized with the overwhelming circumstances.¹⁷ Leaders must identify and enact behaviors and actions that help them lead implementation efforts during disasters; examples include developing disaster response plans, persevering through response and recovery, and providing necessary supports to staff.¹⁸ In addition, nurse leaders need to be cognizant of the toll that the disaster or pandemic is taking on them personally. Recognizing this stress, asking for help when needed, and finding ways to care for themselves is a crucial component not to be overlooked. Intensive care unit professional organizations are focused on enhancing clinicians' well-being, and incorporating an emphasis on leaders' well-being in disaster preparedness will undoubtedly help in the long term.

In addition to developing a repertoire of leadership styles, nurse leaders must be competent in evidence-based practice (EBP) and implementation of evidence-based care. Evidence-based practice is the conscientious and judicious use of best available evidence, along with patient preferences and clinician expertise, to inform patient care.¹⁹ Evidence evolves over time, and during disasters it may evolve rapidly. Thus, nurse leaders must be able to identify, analyze, and synthesize available evidence. They must also ensure the delivery of EBP by clinicians on their unit. Shuman and colleagues²⁰ have identified 16 EBP competencies of unit nurse managers. Developing these competencies before crises will help ICU nurse leaders make evidence-informed decisions quickly to address pressing and evolving challenges.

As important as EBP is, being able to implement these practices during a pandemic is a crucial skill. The COVID-19 pandemic necessitated numerous changes to care delivery and staffing owing to disruptions in supply chains, infected/quarantined personnel, evolving evidence about COVID-19 and its treatment, and substantial hits to hospital budgets with temporary cessation of elective procedures.²¹⁻²³ Nurses in the ICU in particular were caring for a very

large surge of patients; thus, identifying and implementing practices to minimize exposure to infection (eg, personal protective equipment policies) or de-implementing practices to increase judicious use of time (eg, reducing nursing documentation burden) become invaluable skills in pandemic circumstances. Nurse leaders are well-positioned to prepare clinical settings and health care organizations to be conducive to rapid change^{24,25} throughout a disaster response and recovery.

Conclusion

Informed by extant literature, AONL-identified competencies, and expert opinion, we suggest 3 areas of focused skill development to ensure leaders, especially leaders in ICU settings, are prepared for future crises. More work is needed to develop and test training programs to foster communication, business, and leadership competencies in nurse leaders. Competent leadership during disasters, like the COVID-19 pandemic, can improve the health care response, outcomes for affected patients, staff safety and well-being, and hospital/unit financial stability. Competence in activities related to communication, business, and personal leadership can prepare nurse leaders to step in to lead teams, step up to new leadership challenges, and step out to influence policy and public health.

FINANCIAL DISCLOSURES

Supported in part by funding from the Agency for Healthcare Research and Quality (K08-HS024552, D.K.C.). The content is solely the responsibility of the authors and does not necessarily represent the official views of the funding agency.

REFERENCES

- Veenema TG, Losinski SL, Newton SM, Seal S. Exploration and development of standardized nursing leadership competencies during disasters. *Health Emerg Disaster Nurs*. 2017;4(1):26-38.
- Veenema TG, Deruggiero K, Losinski S, Barnett D. Hospital administration and nursing leadership in disasters. *Nurs Adm Q*. 2017;41(2):151-163.
- Veenema TG, Griffin A, Gable AR, et al. Nurses as leaders in disaster preparedness and response—a call to action. *J Nurs Scholarsh*. 2016;48(2):187-200.
- Millet CP, Porche DJ. Overburdened systems and dealing with disaster: nursing administrators' experiences and nursing leadership recommendations from a state-level perspective. *Nurs Adm Q*. 2017;41(2):134-143.
- Lam SKK, Kwong EWY, Hung MSY, Pang SMC, Chiang VCL. Nurses' preparedness for infectious disease outbreaks: a literature review and narrative synthesis of qualitative evidence. *J Clin Nurs*. 2018;27(7-8):e1244-e1255.
- American Organization of Nurse Leaders (AONL). *AONL Nurse Manager Competencies*. American Organization of Nurse Leaders; 2015. Accessed July 1, 2020. <https://www.aonl.org/system/files/media/file/2019/04/nurse-manager-competencies.pdf>
- American Organization of Nurse Leaders (AONL). *AONL Nurse Executive Competencies: Post-Acute Care*. American Organization of Nurse Leaders; 2015. Accessed July 1, 2020. <https://www.aonl.org/sites/default/files/aone/nec-post-acute.pdf>
- American Organization of Nurse Leaders (AONL). *AONL Nurse Executive Competencies: Population Health*. American Organization of Nurse Leaders; 2015. Accessed July 1, 2020. <https://www.aonl.org/system/files/media/file/2019/10/population-health-competencies.pdf>
- AlThobaity A, Plummer V, Williams B. What are the most common domains of the core competencies of disaster nursing? A scoping review. *Int Emerg Nurs*. 2017;31:64-71.
- Costa DK, Moss M. The cost of caring: emotion, burnout, and psychological distress in critical care clinicians. *Ann Am Thorac Soc*. 2018;15(7):787-790.
- Halpern N, Tan K. United States Resource Availability for COVID-19. Society of Critical Care Medicine Report. Accessed June 8th, 2020. <https://sccm.org/Blog/March-2020/United-States-Resource-Availability-for-COVID-19>
- Mason DJ, Nixon L, Glickstein B, Han S, Westphal K, Carter L. The Woodhull study revisited: nurses' representation in health news media 20 years later. *J Nurs Scholarsh*. 2018;50(6):695-704.
- Jones C, Finkler SA, Kovner CT, Mose J. *Financial Management for Nurse Managers and Executives-E-Book*. Elsevier Health Sciences; 2018.
- Labrague LJ, Hammad K, Gloe DS, et al. Disaster preparedness among nurses: a systematic review of literature. *Int Nurs Rev*. 2018;65(1):41-53.
- Spitzer R, Miranda E. Enhancing professional role competency through data analytics and evidence-based education. *Nurse Lead*. 2017;15(3):189-192.
- Goleman D. Leadership that gets results. *Harvard Bus Rev*. 2000;78(2):4-17.
- Cummings GG, Tate K, Lee S, et al. Leadership styles and outcome patterns for the nursing workforce and work environment: a systematic review. *Int J Nurs Stud*. 2018;85(2018):19-60.
- Shuman CJ, Ehrhart MG, Torres EM, et al. EBP implementation leadership of frontline nurse managers: validation of the Implementation Leadership Scale in acute care. *Worldviews Evid Based Nurs*. 2020;17(1):82-91.
- Sackett DL, Straus SE, Richardson WS, Rosenberg W, Haynes RB. *Evidence-Based Medicine: How to Practice and Teach EBM*. Churchill Livingstone; 2000.
- Shuman CJ, Ploutz-Snyder RJ, Titler MG. Development and testing of the Nurse Manager EBP Competency Scale. *West J Nurs Res*. 2018;40(2):175-190.
- Bambi S, Iozzo P, Lucchini A. New issues in nursing management during the COVID-19 pandemic in Italy. *Am J Crit Care*. 2020;29(4):e92-e93.
- Griffin KM, Karas MG, Ivascu NS, Lief L. Hospital preparedness for COVID-19: a practical guide from a critical care perspective. *Am J Respir Crit Care Med*. 2020;201(11):1337-1344.
- Rosa WE, Binagwaha A, Catton H, et al. Rapid Investment in nursing to strengthen the global COVID-19 response. *Int J Nurs Stud*. Published online June 4, 2020. doi:10.1016/j.ijnurstu.2020.103668
- Shuman CJ, Liu X, Aebersold ML, Tschannen D, Banaszak-Holl J, Titler MG. Associations among unit leadership and unit climates for implementation in acute care: a cross-sectional study. *Implement Sci*. 2018;13:62. doi:10.1186/s13012-018-0753-6
- Shuman CJ, Powers K, Banaszak-Holl J, Titler MG. Unit leadership and climates for evidence-based practice implementation in acute care: a cross-sectional descriptive study. *J Nurs Scholarsh*. 2019;51(1):114-124.

To purchase electronic or print reprints, contact American Association of Critical-Care Nurses, 27071 Aliso Creek Road, Aliso Viejo, CA 92656. Phone, (800) 899-1712 or (949) 362-2050 (ext 532); fax, (949) 362-2049; email, reprints@aacn.org.