

Disaster and Emergency Preparedness White Paper for Community/Public Health

Nursing Educators Prepared by

Association of Community Health Nursing Educators (ACHNE) Task Force on

Disaster Preparedness

Jody Spiess, PhD, RN Webster University

Pamela Frable, ND RN Texas Christian University

February 2024

FORWARD

The Association of Community Health Nursing Educators (ACHNE) developed documents designed to delineate the scope and function of community/public health nursing (C/PHN) educators, researchers, and practitioners. ACHNE approved and published the original Disaster Preparedness White Paper in 2008. In Spring 2021 ACHNE called for a review and revision of the 2008 White Paper to ensure that the recommendations meet the needs of our changing society. With the COVID 19 pandemic and increasing numbers of other natural and anthropogenic disasters, it was imperative that ACHNE clarify the role of C/PHN educators and community/public health nurses in disaster and emergency preparedness. ACHNE is committed to promotion of the public's health through ensuring leadership and excellence in community and public health nursing education, research, and practice.

The members of ACHNE extend their appreciation to the members of the Disaster Preparedness Task Force for their efforts: Jody Spiess, PhD, RN & Pamela Frable, ND, RN.

ACKNOWLEDGEMENTS

We thank the librarians who helped us complete a thorough search for evidence.

Holly Hubenschmidt, MLS, Director of Library Instruction and Research Service

Julie Laramie, Assessment Librarian

Webster University, Webster Groves, MO



We thank **Linda James**, MSc, RN, Clinical Associate Professor at Sam Houston State University, Conroe, TX, who assisted us in screening and appraising the evidence.

Disaster and Emergency Preparedness White Paper for Community/Public Health Nursing Educators

Nurses, especially community/public health (C/PH) nurses, are essential in preparing for, responding to, and recovering from disasters. The Association of Community Health Nursing Educators (ACHNE, 2023), guided by its mission, “To promote evidence-based education, practice, and scholarship across diverse settings, communities, and populations to support and advance health equity for all through Collaboration, Advocacy, Leadership, and Mentorship (C.A.L.M.),” convened a Task Force in Spring 2021 to review its current position on disaster and emergency preparedness. The aim was to (a) identify the leadership role of community/public health nursing educators in disaster preparedness education and (b) suggest possible essential elements for disaster preparedness in undergraduate and graduate nursing curricula in the United States (US). The Task Force addressed these two aims and provided recommendations for C/PH nurses and ACHNE regarding the role of C/PHN educators and content of disaster and emergency preparedness curricula.

Background

Through its role in reviewing and updating scope and standards, the American Nurses Association [ANA, n.d.] “ensures that nursing responsibilities evolve at the same pace as the demands of public health.” These demands include disasters, which are increasing in risk due to climate change, urbanization, population growth, and poverty (National Oceanic and Atmospheric Administration, 2023). In 2018 worldwide natural disasters resulted in 160 billion \$US in losses with the costliest natural disaster occurring in California at 12.5 billion \$US in insured losses (Langan, 2023). In 2016, human made disasters resulted in 8 billion \$US in losses and included “fires, explosions, and maritime, aviation and rail disasters, in addition to terrorism and social unrest” (Langan, p. 4).

C/PH nurses are integral to the mission of public health due to their knowledge and understanding of communities and populations at risk. While the events of September 11, 2001, brought increased attention to the need for nurses to be prepared to respond to disasters, the COVID-19 pandemic was the critical event that highlighted both the roles and responsibilities of nurses in disaster response and public health emergency management as vital to the Nation’s ability to plan for and respond to such events (National Academies of Sciences, Engineering, and Medicine [NASEM], 2021; National Advisory Council on Nurse Education and Practice [NACNEP], 2023). Compounding this are health disparities that exist for individuals and communities “of color who [also] suffer from the compound disadvantages of racism, poverty, workplace hazards, limited health care access, and preexisting health conditions resulting from the foregoing factors” (NASEM, 2021, p. 1). Therefore, it is even more important that C/PHN educators routinely and consistently provide disaster education to all levels of nursing students, professional nurses in C/PHN settings, and community members.

Undergraduate nursing students cannot develop novice competencies and be ready to respond to disasters without adequate instruction in the nursing curriculum. Advanced level nurses require a higher level of training to lead and develop policy or to serve as designated responders. Disaster nursing preparedness and response is fundamental content for nursing education programs (NASEM, 2021; NACNEP, 2023). Disaster events, such as active shooter incidents or the COVID-19 pandemic, can impact any community. “All nurses, not just emergency department or military nurses, need to be trained in disaster competencies” (Langan, 2023, p. 6).

In *The Essentials: Core Competencies for Professional Nursing Education*, the American Association of Colleges of Nursing (AACN, 2021) explicitly stated that the nursing curriculum needs to include disaster nursing content. Nursing competencies for both entry-level and advanced-level professional nurses must include initiatives to “advance preparedness to protect population health during disasters and public health emergencies” (AACN, 2021, pp. 35-36). The provision of formal disaster nursing education continues to be one of the biggest challenges to meet these competencies which is compounded by limited evidence-based research on best practices for disaster nursing education (Al Harthi et al., 2020). Development of disaster nursing education has the potential not only to enhance nurses’ ability to effectively respond to disaster events but also to improve individual, family, and community outcomes (Al Harthi et al.).

Approach

The Task Force used a modified evidence-based-practice approach to review and update the original position statement. The Task Force identified two background questions to guide their work:

- What are the best practices for the leadership role of C/PHN educators in disaster preparedness education?
- What are the essential undergraduate and graduate nursing curricular elements for disaster preparedness in the US?

In these questions, the term *disaster* referred to both disasters and emergencies, regardless of scale, frequency, or type of onset. According to the United Nations Office for Disaster Risk Reduction (UNDRR, n.d., <https://www.undrr.org/terminology/disaster>), a *disaster* is “A serious disruption of the functioning of a community or a society at any scale due to hazardous events interacting with conditions of exposure, vulnerability and capacity, leading to one or more of the following: human, material, economic and environmental losses and impacts.” The terms *emergency* and *disaster* are often used interchangeably. However, *emergency* typically applies when local resources and capabilities are adequate to plan for, respond to, and recover from the disruptive event. *Disaster* usually refers to disruptive events that overwhelm or seriously challenge the local resources and capabilities available to prepare for, respond to, and recover from the event (UNDRR, n.d.). The Task Force used the term *disaster preparedness* to refer to the knowledge, skills, and attitudes C/PHN leaders, educators, practitioners, researchers, and students need in all phases of the disaster cycle: preparedness, response, recovery, and mitigation/prevention.

Each member of the Task Force searched for evidence to answer the questions. We consulted two research librarians to ensure a comprehensive search and intentionally retrieved evidence we identified as foundational (e.g., American Nurses Association [ANA], 2022; International Council of Nursing [ICN], 2019; Quad Council Coalition Review Task Force [Quad Council], 2018; National Academies of Sciences, Engineering, and Medicine [NASEM], 2021). In addition to the foundational documents, the Task Force identified eight references that could be used to answer Question 1. Some of these references also had content that addressed Question 2. We identified and reviewed four additional references to help answer Question 2. We restricted evidence that was specifically about the COVID-19 public health emergency response because our focus was on all-hazards preparedness. The Centers for Medicare and Medicaid Services (CMS, 2017, p. 1) defined the *all-hazards approach* as “an integrated approach to emergency preparedness planning that focuses on capacities and capabilities that are critical to preparedness for a full spectrum of emergencies or disasters, including internal emergencies and a man-made emergency (or both) or natural disaster.”

Leadership Role of C/PHN Educators in Disaster Preparedness Education

Two Task Force members independently read the evidence relevant to Question 1 and worked together to extract content specific to the question. They discussed and synthesized the evidence. Although none of the sources specifically identified the C/PHN educator as the leader in disaster preparedness education, the Task Force concluded that the available evidence supports the C/PHN educator as the leader. Alfred et al. (2015) stated that disaster nursing education typically falls on C/PHN educators. NACNEP (2023) has called for increased funding and opportunities for nursing faculty to be skilled in the “public health principles and disaster response systems (p. 16). While all nurses must have the basic skills, knowledge, and attitudes to effectively participate in disaster nursing, C/PH nurses are consistently identified as having leadership roles in all aspects of disasters. Emergency preparedness and disaster recovery is one of the eight “unique practice areas” delineated in the Public Health Nursing Scope and Standards (Council of Public Health Nursing Organizations [CPHNO], 2023, p. 3; ANA, 2022). If C/PHN nurses are recognized as leaders in assessment, planning, implementation, and evaluation related to disasters and emergency preparedness, it follows that C/PHN educators have a leadership role in disaster preparedness education. Consequently, C/PHN educators need to take the lead in assuring that prelicensure, graduate, and practicing nurses have access to opportunities that enable them to develop and maintain emergency preparedness knowledge, skills, and attitudes. C/PHN educators can fulfill this role through direct provision of learning experiences, as well as through collaboration and consultation with other nurse educators and leaders in academia and the community.

Five Assumptions Regarding the Leadership Role of C/PHN Educators in Disaster Preparedness Education

Because the evidence did not specifically identify C/PHN educators as the leaders of disaster preparedness education, the Task Force was not able to create a list of best practices for the leadership role. However, the Task Force reviewed, reaffirmed, and updated, as appropriate, the five assumptions regarding the leadership role of C/PHN educators in disaster and emergency preparedness education as outlined in the 2008 White Paper (Kuntz et al., 2008). These assumptions provide a framework for thinking about the best practices for C/PHN educators' leadership role.

Assumption 1: Disaster preparedness requires an organized, multi-sector approach.

Like all public health efforts, disaster preparedness requires a multi-disciplinary approach. There are many key players needed in a disaster, such as local and state health departments, law enforcement, emergency responders, and nurses. Although all 10 Public Health Essential Services have relevance for disaster and emergency preparedness, Essential Service II specifically addresses mitigation and management of health hazards and VIII states the need to build and support a skilled workforce. Healthy People 2030, the U.S. public health agenda, includes 13 emergency preparedness objectives (U.S. Department of Health and Human Services, n.d.). These objectives are aimed at communities, individuals, and organizations with the purpose of increasing the safety and health of populations.

C/PH nurses can work together with stakeholders and community members to assist in meeting these objectives. By fostering partnerships with other disciplines and community organizations prior to a disaster, C/PHN educators have relationships that enable opportunities for students to participate in disaster preparedness, management, and recovery. While nursing students meet learning objectives, communities' benefit from the skills of the students and their C/PHN faculty.

Developing and sustaining interdisciplinary, multisectoral partnerships is a C/PHN educator best practice.

Assumption 2: C/PHN educators' practice is based on professional ethics and established standards of practice and professional performance. At least three guiding documents support the leadership role of C/PHN educators related to disaster preparedness. According to the *Code of Ethics for Nurses* (American Nurses Association, 2015), the nurse owes the same duties to self as to others including: "the promotion of health and safety, preservation of wholeness of character and integrity, maintenance of competence, and continuation of personal and professional growth" (p. 19). For example, Alfred et al. (2015) showed that nursing students and nurses who are personally prepared for a disaster are more likely to participate in disaster response and education. The recently updated *Public Health Nursing: Scope and Standards of Practice* (ANA, 2022), outlined public health standards which relate to disaster preparedness activities. Standard 10 calls for the public health nurse to "collaborate with the population and others in the conduct of nursing practice" and "partner with

stakeholders to navigate population-focused health concerns and effect change in public health policies, programs, and services.” Standards 7, 10, 13, 16, and 18 address collaboration, ethics, research, resource utilization, and advocacy. Standard 5 identifies the professional leadership role and specifically directs the public health nurse to “Contribute to emergency preparedness and response efforts, including the receipt and use of the strategic national stockpile” (p. 85). Standard 4 states the public health nurse must “Use system-level methods, planning models, epidemiology, and other analytic processes to develop, implement, and evaluate population level interventions that address (1) health promotion; (2) prevention of illness, injury, or disease; (3) suffering; and (4) emergency preparedness and response” (p. 77).

Developing and sustaining an ethical, evidence-based public health nursing practice is a C/PHN educator best practice.

Assumption 3: C/PHN educators serve as leaders in the development, recommendations, and/or integration of disaster content in the curriculum. During the COVID-19 pandemic, C/PHN educators provided opportunities for nursing students to experience vaccine clinics, contact tracing, disease investigation and campus-wide program planning. Historically, disaster education curricular content in baccalaureate programs has been embedded in C/PHN courses (Alfred et al., 2015; Chilton & Alfred, 2017). C/PHN textbooks regularly include a chapter or section on community health nursing’s role in disaster preparedness (e.g., Demarco & Healey-Walsh, 2020; Rector & Stanley, 2021; Savage, 2019; Stanhope & Lancaster, 2021). The threat of mass casualty events; increased natural disasters; climate change; the emergence of new and mutating communicable diseases; and human-made events, such as active shooter incidents, results in long term physical and mental health concerns and requires an organized, collaborative, and cohesive approach to disaster nursing education.

Now supported by the *AACN Essentials: Core Competencies for Professional Nursing Education*, C/PHN educators must plan for disaster education in the curriculum and be prepared to lead. According to Veenema et al. (2017), “at a minimum, clear, concrete guidance for the provision of disaster nursing educational programming would establish a foundation for educational programming” (p. 690).

Communicating and demonstrating the value of C/PHN practice and contributions of C/PH nurses throughout the disaster cycle and advocating for C/PH nurses to “have a seat at the table,” in prevention, assessment and planning, response, recovery, mitigation, and preparedness are leadership best practices of C/PHN educators.

Assumption 4: C/PHN educators serve as role models to students and faculty through both professional and community service activities. According to the ICN (2019), there are three levels of nurses who need disaster competencies at varying levels of complexity. Most C/PHN educators would be considered designated responders, Level II nurses. Some C/PHN educators may be qualified as members of deployable emergency response teams, Level III nurses. In the recent pandemic, many C/PHN educators served on university task forces and assisted local health departments with emergency call centers and pandemic plans. Students were allowed to apply disaster

nursing education in real time and C/PHN educators led by example. Educators promote participation with other disciplines in planning facility- or community- wide exercises and drills (ICN, 2019, II.1.1). This means understanding the phases of disaster management and the disaster response system of their own communities. Disaster preparedness teaching and learning strategies are available to C/PHN educators in a variety of formats (Carter et al., 2006). Nurses can volunteer with many agencies, such as the American Red Cross, local Medical Reserve Corps, and the Emergency System for Advanced Registration of Volunteer Health Professionals (ESAR-VHP) (Langan, 2023).

Being a role model by developing and sustaining mentorship, training, and volunteer opportunities in their own practice is a C/PHN educator best practice.

Assumption 5: C/PHN educators recognize the value of established national emergency preparedness competencies, training programs, and curriculum resources. Several documents are available to guide disaster preparedness curriculum content for all nurses including C/PH nurses. The AACN Essentials have requirements for all levels of nursing and include both undergraduate and graduate programs regarding disaster education. The most current version of the ICN Core Competencies in Disaster Nursing Version 2.0 clearly states competencies within eight domains applicable to all professional nurses in any practice setting (ICN, 2019). These competencies are based on the previously released ICN and WHO (2009) competencies; however, the number of domains was reduced from 10 to 8, potentially making the current set easier to implement. According to the ICN (2019, Competency II.1.5) preparedness response nurse educators must “incorporate Level I core competencies in disaster nursing in any basic nursing education programme or refresher course.” To have an effectively prepared disaster nursing workforce, a set of foundational competencies is key. Extensive work has been done by disaster nursing experts which led to the creation of the Society for the Advancement of Disaster Nursing (SADN) and its value statement, “Every nurse a prepared nurse” (Couig et al., 2017). SADN (n.d.) aims to “strengthen communication among nurse researchers and educators concerned with reducing damages caused by disasters” (<https://disasternursing.org/about/>). The site includes a toolkit for disaster nursing educators and a repository for research. Disaster preparedness competencies specifically targeting C/PH nurses include the *Public Health Preparedness and Response Core Competencies* (Association of Public Health Nurses [APHN], 2014).

Developing and sustaining the most up to date knowledge and records of national, local, and expert competencies and resources is a C/PHN educator best practice.

Essential Curricular Content for Public Health Nursing Emergency Preparedness

The second question which the Task Force addressed was, “What are the essential undergraduate and graduate curricular elements for disaster preparedness in the US?” The Task Force asserts that the C/PHN specialty brings to curriculum design both fundamentals of disaster nursing for all nurses and the population-focus and systems thinking and skills necessary for effectively working throughout the disaster cycle. After

reviewing reports of individual disaster education activities (e.g., Stanley et al., 2008; Chiu et al., 2011; Stein, 2017; Wise, 2007, Ireland et al., 2006, Salt et al., 2019), suggested curricula (Weiner, 2005; Stanley & Wolanski, 2015; Eid-Heberle & Burt, 2023), the PHN Scope and Standards (ANA, 2022), and the ICN competencies (2019), the Task Force concluded that the ICN Core Competencies 2.0 outline the body of content to be provided in a comprehensive disaster curriculum for nurse generalists (Level I) and advanced-level nurses (Levels II and III). The Task Force also determined that all ICN competencies, as well as the preparedness competencies in the AACN Essentials, can be mapped to one or more of the existing competencies in the PHN Scope and Standards.

All Nurses Prepared

Veenema et al. (2016, p. 191) established a vision for “a national nursing workforce with the knowledge, skills, and abilities to respond to disasters and public health emergencies in a timely and effective manner.” They posited that nurses with basic knowledge and skills would be better equipped to mitigate harm and keep themselves, their families, patients, and communities safe in times of disaster. Veenema et al. (2017, p. 693) noted the connection between nurses’ disaster preparedness and population health outcomes. NASEM (2021, p. 5) highlighted emergency preparedness and response as a “key area for strengthening nursing” and noted that delineation of nurses’ roles and responsibilities in disaster preparedness and public health emergency response was essential in the face of growing numbers and complexities of disasters coupled with systemic health inequities and the importance of understanding how determinants of health affect population health outcomes (p. 248). NASEM acknowledged nurses’ roles in all phases of disasters and all types of emergency events, while making clear that nurses’ potential to contribute to preparedness, response, recovery, disaster workforce wellbeing, and community health equity requires that nurses have opportunities to develop requisite knowledge, skills, and attitudes (p. 248). In particular, NASEM noted “nursing expertise that draws on both clinical and public health nursing knowledge” can help shape policies at all levels to ensure a nursing workforce prepared and able to serve in disasters (pp. 261-262).

Value of Community/Public Health Nursing

C/PHN scope of practice adds value to foundational education for disaster and emergency preparedness for all nurses. A commitment to social justice and valuing people’s contexts, knowledge, and lived experiences are hallmarks of C/PHN practice (ANA, 2022, pp. 16, 18). These characteristics lead C/PHN nurses to listen and learn from community members, intervene upstream, and act to counter systemic inequities that create barriers to the wellbeing of vulnerable populations in disaster. For example, the basic principles of disaster readiness for all U.S. households are get a kit, make a plan, and be informed. A food insecure household is unlikely to have discretionary resources to build or purchase the supplies for a household preparedness kit. C/PH nurses can assess the household needs and collaborate with community partners to ensure individual households and neighborhoods can achieve the three basic steps of emergency preparedness.

C/PHN educators, nurses, and nursing students share a set of practice principles that enhance their readiness and ability to contribute throughout the disaster cycle. For example, C/PH nurses already incorporate the utilitarian perspective (greatest good for the greatest number of people with the least harm and optimal stewardship of human and material resources) in their practice. The principle of system- and population-focused assessment, policy development, and assurance underpins C/PH nurses' abilities to collaborate with community member and other stakeholders to understand people and local risks and resources, engage in change processes that make communities more disaster resilient, and connect community members, households, and neighborhoods with appropriate resources before, during, and after disasters and public health emergencies. Nurses' ongoing community assessment and networks can help nurses identify emergent concerns, such as problems with drinking water systems or unusual presentations of common illness. C/PH nurses' focus on equity enables them to raise awareness of and teach community member how having equal opportunities for wellbeing – in this case, being able to prepare for, respond to, and recover from disasters – benefits everyone. For example, ensuring that all community members have access to affordable and safe housing that is up-to-code facilitates community recovery and is much more cost effective than completely rebuilding housing that was not constructed to withstand a known disaster risk. Costs to rebuild, in what was a preventable situation, include displacement of people, provision of temporary housing, and razing the remains of decimated housing.

C/PH nurses prioritize primary prevention, while being adept in secondary and tertiary prevention. The primary prevention puts C/PH nurses in a unique position to address root causes of those disasters or conditions that are modifiable. For example, mitigating the effects of seasonal flooding might involve planning for temporary housing and clean-up after flood waters reside. However, as a primary prevention effort, C/PH nurses could collaborate with community members and stakeholders to create housing outside of the flood plain or advocate for more flood resilient housing, thereby eliminating or reducing the need to relocate residents from known flood plains.

Because C/PH nurses actively reach out to people and communities that can benefit from specific services, they are ready to help communities become aware of their risks for disaster and need to prepare. They can teach people skills, such as creating emergency plans, first aid, and how to shelter. Because of their commitment to working with people and communities as equal partners, C/PH nurses listen and discern how to synthesize the wants and needs of communities and their members with best practices for disaster and emergency preparedness. C/PH nurse can inform decision makers about ways to adjust community-wide preparedness, response, and recovery activities so they are culturally and linguistically inclusive of all the people potentially affected by disaster.

Recommended Competency Set

In the 2008 White Paper, there were 14 essential basic competencies for public health nursing in emergencies – four assessment and planning competencies, eight implementation competencies, and two evaluation competencies (Kuntz et al., 2008, pp.

365-366). Although the Task Force originally planned to map these 14 competencies to the current PHN Scope and Standards (ANA, 2022) and AACN Essentials (2021), we ultimately identified the International Council of Nursing Core Competencies in Disaster Nursing (ICN, 2019; ICN 2022) as the most comprehensive, and one of the most frequently cited (Alfred et.al, 2015), disaster nursing-specific set of competencies.

Table 1 illustrates ICN's eight domains and the number of competencies within each domain by level. The ICN (2019, p. 6) described a competency as an "individual measure of applied skills and knowledge that enable people to perform work" and provided guidance for how to state a competency in a meaningful way (action verb; subject matter, performance type, specific task; and context for the competency, p. 6). Level I competencies refer to what nurses, who have completed general nursing education programs and secured approval to practice from their countries, ought to be able to do. Level II competencies refer to what nurses, who aim to be designated disaster responders within their systems, ought to be able to do in addition to Level I competencies. Nurses who have attained Level II competencies and completed further preparation to respond in a variety of disasters and emergencies as part of deployable teams possess Level III competencies. Nurses who master Level III competencies typically have emergency response and preparedness as core elements of their roles, such as frequent responders for major domestic disasters.

Table 1
ICN Domains and Competencies

Domain	Level I	Level II	Level III
1. Preparation and planning	4	5	8
2. Communication	5	4	4
3. Incident management systems	4	4	4
4. Safety and security	5	5	5
5. Assessment	3	4	3
6. Intervention	7	6	8
7. Recovery	4	2	4
8. Law and ethics	3	3	3

The CPHNO (2023) recently published a position statement identifying the competencies outlined in *Public Health Nursing: Scope and Standards of Practice* (ANA, 2022) as the definitive set of C/PHN competencies. The rationale for adopting a singular set of competencies was to clearly communicate the scope of C/PHN practice to internal and external constituents. Further, CPHNO (2023, p. 2) stated, "a singular set of competencies would provide PHN leaders and educators a stronger foundation for teaching public health nursing and incorporating competencies into curricula and residency programs."

This argument for clarity regarding competencies encouraged the Task Force to seek similar clarity in regard to disaster nursing competencies that also highlighted the strengths that C/PHN practice brings to emergency preparedness and disaster

response. In their scoping review of 12 studies, Al Thobaity et al. (2017) reported the most common domains of core competencies in disaster nursing were communication, planning, decontamination and safety, incident command systems, and ethics, all of which are domains in the ICN core competencies. In their scoping review, Loke et al. (2021) described the ICN core competencies as one most widely used in developing disaster nursing education courses. Eid-Heberle and Burt (2023) described the experience of Shenandoah University in implementing and sustaining a required, three-credit course devoted to disaster nursing and anchored by the ICN disaster nursing core competencies.

The Task Force mapped both the ICN Core Competencies in Disaster Nursing and the relevant AACN Essentials competencies to the PHN competencies. We mapped Levels I and II of the ICN competencies (ICN, 2019) to the PHN competencies (ANA, 2022) and determined each of the ICN competencies can be mapped to one or more of the PHN competencies. Domain 3 of the AACN Essentials is Population Health (AACN, 2021, p. 33), which includes Competency 3.6: Advance preparedness to protect population health during disasters and public health emergencies. We mapped the AACN entry-level and advanced-level sub-competencies to the PHN competencies. Each of these AACN sub-competencies can be mapped to one or more of the PHN competencies.

The Task Force identified four PHN competencies as overarching or “umbrella” competencies into which multiple ICN or AACN competencies can map.

Table 2

PHN Umbrella Competencies

PHN Competency	Mapping
5D.8: Contributes to emergency preparedness and response efforts, including the receipt and use of the strategic national stockpile.	Most ICN Level I competencies

<p>4.16A: Uses system-level methods, planning models, epidemiology, and other analytic processes to develop, implement, and evaluate population-level interventions that address (1) health promotion; (2) prevention of illness, injury, or disease; (3) suffering; and (4) emergency preparedness and response</p>	<p>Although this is an advanced level competency within the Planning standard, it addresses planning (which requires assessment), implementation, and evaluation and the breadth of preparedness and response. Most ICN Levels I and II competencies could map here, with the proviso that generalist PHN performance (Level I) would be evaluated based on contributing to or participating in, rather than leading.</p>
<p>10.17 A. Builds functional capabilities of public health emergency preparedness across community sectors.</p>	<p>ICN competencies Levels I and II related to effectively building, sustaining, and functioning within teams and stakeholder groups can map here.</p>
<p>11.14 A. Influences decision-making bodies to improve the professional practice environment and health outcomes.</p>	<p>ICN Levels I and II and AACN entry- and advanced-level competencies related to nurse and workforce safety and wellbeing and systems and policies that support safe practice can map here.</p>

The Task Force concluded that the PHN competencies (ANA, 2022) already encompass the ICN Core Competencies for Disaster Nursing and the preparedness-related AACN Essential Competency 3.6.

The Task Force recommends that C/PHN educators design, implement, and evaluate lessons and curricula rooted in the principles and skills of public health nursing discipline. C/PHN educators can consider the ICN Core Competencies as the primary resource for specific disaster and emergency preparedness nursing content. The Task Force recommends that C/PHN educators customize lessons and curricula using nursing and non-nursing disaster and emergency preparedness resources, such as American Red Cross training in disaster nursing, shelter management, and damage assessment; Medical Reserve Corps training (<https://aspr.hhs.gov/MRC/Pages/index.aspx>); FEMA training and education (<https://training.fema.gov/>) continuing education courses offered online (e.g. <https://nnepi.gwnursing.org/>) or by local emergency preparedness entities. Given that effective and sustained disaster and emergency preparedness require multisectoral and transdisciplinary collaborations that include communities and their members as equal partners, it is important that C/PHN students and practitioners have the opportunity to learn, participate, practice, and debrief with other stakeholders as part of their educational preparation.

Teaching and Learning Activities

Design and implementation of disaster and emergency preparedness education for entry-level and advanced-level nurses varies from a few hours in a nursing education program to full-length, required (Eid-Heberle & Burt, 2023) or optional courses. There are graduate degree and certificate programs available for nurses who want to specialize in disaster nursing and preparedness. Teaching methods include lecture, case studies, virtual reality, virtual and in-person drills that range from table-top to community-wide exercises, discussion, online, self-paced modules (Chiu et al., 2012), nursing externships (Stein, 2017), and participation in actual disaster preparedness, response, and recovery activities (Salt et al., 2019). The Task Force recommends that C/PHN educators utilize a variety of teaching and learning strategies, making sure to include lab, simulation, and/or clinical experiences to reinforce participants' classroom learning. Disaster and emergency preparedness education for nurses can be offered as standalone courses, integrated into C/PHN courses, or threaded throughout the curriculum. The Task Force recommends that C/PHN educators take the lead in designing and consulting on disaster and emergency preparedness teaching and learning activities within the nursing curriculum, regardless of how the nursing program chooses to incorporate disaster nursing content into its overall curriculum.

Summary

C/PHN educators are leaders in the fields of community and public health nursing. Disaster preparedness, response, and recovery are core functions of the C/PHN role. Disaster nursing experts, the ICN, and the AACN are sounding the alarm for the need of comprehensive and coordinated disaster content in schools of nursing. As mass casualty events become a daily occurrence; nurses, as the largest healthcare profession will continue to be called upon to assist communities in disasters. C/PHN educators are essential in ensuring every nurse is a prepared nurse.

Recommendations

C/PHN Educators as Leaders

- Act as the leader for disaster and emergency preparedness content in the nursing academic curriculum
- Role model expectations for prepared nurses:
 - Build personal and family disaster kits
 - Create communication, documents, evacuation, and shelter personal and family plans
 - Be informed about local disasters and emergencies, prevention, and response plans.
- Practice individual, family, and community plans
- Advocate for role of C/PH nurses in academia and in academic community partnerships
- Advocate for C/PH nurses to have leadership roles “at the table”
- Develop a generalist or specialist expertise
- Reach out to provide CNE in community
- Research, dissemination of best practices

Designing Curricula and Learning Activities

- Assess current curriculum
- Use ICN Core Competencies in Disaster Nursing in conjunction with the ANA PHN Scope and Standards to choose content for curricula and learning activities
- Incorporate active learning strategies, simulations, clinical, and community service learning opportunities in conjunction with classroom teaching and learning.
- When possible incorporate learning activities from community disaster partners (e.g. FEMA, American Red Cross, Medical Reserve Corps), so that students earn recognized certificates and complete preparation that make it more likely they can effectively contribute in an actual emergency or disaster
- Develop and sustain relationships with and collaborate with community partners engaged in disaster and emergency management
- Reach out to provide CNE in community
- Don’t reinvent the wheel: use existing evidence and disseminate best practices
- Contribute to original and translational research about C/PHN and disaster nursing and preparedness

Exploring Opportunities

For CPHNO

- Consider collaborating with all member organizations to disseminate a “master” disaster and emergency preparedness nursing position paper
- Explore effective collaboration with the Society for Advancement of Disaster Nursing

For individual C/PH nurses and C/PHN educators

- Find your niche in emergency preparedness and disaster response based on your own interests and skill. Everyone needs the basic competencies. Some can pursue more advanced knowledge and skills.

References

- Alfred, A., Chilton, J., Connor, D., Deal, B., Fountain, R., Hensarling, J., & Klotz, L., (2015). Preparing for disasters: Education and management strategies explored. *Nurse Education in Practice*, 15(1), 82-89.
<https://doi.org/10.1016/j.nepr.2014.08.001>
- Al Harthi, M., Al Thobaity, A., Al Ahmari, W. & Almalik, M., (2020). Challenges for nurses in disaster management: A scoping review. *Risk Management and Healthcare Policy*, 13, 2627-2634. <https://doi.org/10.2147/RMHP.S279513>
- Al Thobaity, A., Plummer, V. & Williams, B., (2017). What are the most common domains of the core competencies of disaster nursing? A scoping review. *International Emergency Nursing*, 31, 64-71.
<https://doi.org/10.1016/j.ienj.2016.10.003>
- American Association of Colleges of Nursing. (2021). *The essentials: Core competencies for professional nursing education*.
<https://www.aacnursing.org/Portals/42/AcademicNursing/pdf/Essentials-2021.pdf>
- American Nurses Association. (2015). *Code of ethics for nurses with interpretive statements* (2nd ed.). Nursesbooks.org.
- American Nurses Association. (2022). *Public health nursing: Scope and standards of practice* (3rd ed.). Nursesbooks.org.
- American Nurses Association. (n.d.). *Public health nursing*.
<https://www.nursingworld.org/practice-policy/workforce/public-health-nursing/>
- Association of Community Health Nursing Educators. (2023). *Mission statement*.
<https://www.achne.org/aws/ACHNE/pt/sp/about>
- Carter, K. F., Kaiser, K. L., O'Hare, P. A., & Callister, L. C. (2006). Use of PHN competencies and ACHNE essentials to develop teaching-learning strategies for generalist C/PHN curricula. *Public Health Nursing*, 23(2), 146-160.
<https://doi.org/10.1111/j.1525-1446.2006.230206.x>
- Centers for Disease Control and Prevention. (2014). *The 10 essential public health services: An overview*.
<https://www.cdc.gov/publichealthgateway/publichealthservices/pdf/essential-phs.pdf>
- Chilton, J. M., & Alfred, D. (2017). An evidence-based educational intervention to improve personal emergency preparedness of nursing students. *Nurse Educator*, 42(4), 212-216. <https://doi.org/10.1097/NNE.0000000000000341>
- Chiu, M., Polivka, B. J., & Stanley, S. A. (2012). Evaluation of a disaster-surge training for public health nurses. *Public Health Nursing*, 29(2), 136–142.
<https://doi.org/10.1111/j.1525-1446.2011.00984.x>
- Couig, M. P., Gable, A., Griffin, A., Langan, J. C., Katzburg, J. R., Wolgast, K. A., Qureshi, K., Dobalian, A., Lavin, R. P., & Veenema, T. G. (2017). Progress on a call to action: Nurses as leaders in disaster preparedness and response. *Nurse Administration Quarterly*, 41(2), 112-117.
<https://doi.org/10.1097/NAQ.0000000000000226>
- Council of Public Health Nursing Organizations. (2023). *CPHNO position statement endorsing one set of national public health nursing (PHN) competencies: American Nurses Association 3rd edition of the Public Health Nursing Scope &*

- Standards of Practice*. <https://www.cphno.org/wp-content/uploads/2023/05/CPHNO-Competencies-Position-Statement-May-2023.docx.pdf><https://www.cphno.org/wp-content/uploads/2023/05/CPHNO-Competencies-Position-Statement-May-2023.docx.pdf>
- Demarco, R. F., & Healey-Walsh, J. (2020). *Community and public health nursing*. (3rd ed.). Wolters Kluwer.
- Eid-Heberle, K., & Burt, S. (2023). Disaster education in the nursing curriculum: Embracing the past, learning from the present, preparing for the future. *Journal of Radiology Nursing*, 42, 155-161. <https://doi.org/10.1016/j.jradnu.2022.10.005>
- International Council of Nurses & World Health Organization. (2009). *ICN framework of disaster nursing competencies*. <http://www.apednn.org/doc/resourcespublications/ICN%20Framework%20of%20Disaster%20Nursing%20Competencies%20ICN%202009.pdf>
- International Council of Nurses. (2019). *Core competencies in disaster nursing: Version 2.0*. https://www.icn.ch/sites/default/files/inline-files/ICN_Disaster-Comp-Report_WEB.pdf.
- Ireland, M. (2006). Integrating disaster preparedness into a community health nursing course: One school's experience. *Disaster Management & Response*, 4(3), 72-76. <https://doi.org/10.1016/j.dmr.2006.03.001>
- Kuntz, S. W., Frable, P., Qureshi, K., & Strong, L. L. (2008). Association of Community Health Nursing Educators (ACHNE): Disaster preparedness white paper for community/public health nursing educators. *Public Health Nursing*, 25(4), 362-369. <https://doi.org/10.1111/j.1525-1446.2008.00717.x>
- Langan, J. (2023). *Preparing nurses for disaster management*. St. Louis, MO: Elsevier.
- Loke, A. Y., Guo, C., & Molassiotis, A. (2021). Development of disaster nursing education and training programs in the past 20 years (2000-2019): A systematic review. *Nurse Education Today*, 99, Article 104809. <https://doi.org/10.1016/j.nedt.2021.104809>
- National Academies of Sciences, Engineering, and Medicine. (2021). *The future of nursing 2020–2030: Charting a path to achieve health equity*. <https://doi.org/10.17226/25982>
- National Advisory Council on Nurse Education and Practice. (2023, January). *Preparing the nursing workforce of future public health challenges* (18th Report for the Secretary of Health and Human Services and the U.S. Congress). <https://www.hrsa.gov/sites/default/files/hrsa/advisory-committees/nursing/reports/nacnep-18th-report.pdf>
- National Oceanic and Atmospheric Administration, National Centers for Environmental Information. (2023). U.S. billion-dollar weather and climate disasters. <https://www.ncei.noaa.gov/access/billions/>
- Public Health Center for National Innovations. (2020). *The 10 essential public health services*. <https://phnci.org/uploads/resource-files/EPHS-English.pdf>
- Quad Council Coalition Competency Review Task Force. (2018). *Community public health nursing competencies*. https://www.cphno.org/wp-content/uploads/2020/08/QCC-C-PHN-COMPETENCIES-Approved_2018.05.04_Final-002.pdf
- Rector, C., & Stanley, M. J. (2021). *Community and public health nursing* (10th ed.).

Wolters Kluwer.

- Savage, C. L. (2019). *Public/community health and nursing practice: Caring for populations*. FA Davis.
- Salt, R. J., Sickora, C., Page, T. L., Martinez, M. L., Cantu, A. G., Schwab, K. W., & Lee, M. (2020). "We didn't forget" Utilizing a community-nurse partnership to promote health in Rockport, Texas after Hurricane Harvey. *Public Health Nursing*, 37(1), 113–120. <https://doi.org/10.1111/phn.12684>
- Society for the Advancement of Disaster Nursing. (2018). *Strategic plan*. <https://disasternursing.org/wp-content/uploads/2018/08/sadn-strategic-plan.pdf>.
- Stanhope, M., & Lancaster, J. (2021). *Community and public health nursing* (9th ed.). Mosby.
- Stanley, S. A., Polivka, B. J., Gordon, D., Taulbee, K., Kieffer, G., & McCorkle, S. (2008). The *ExploreSurge* trailguide and hiking workshop: Discipline specific education for public health nurses. *Public Health Nursing*, 25(2), 166–175. <https://doi.org/10.1111/j.1525-1446.2008.00693.x>
- Stanley, S. A., & Wolanski, T. A. B. (2015). *Designing and integrating a disaster preparedness curriculum: Readyng nurses for the worst*. Sigma Theta Tau International.
- Stein, L. N. M. (2017). A strategy to enhance student experiences in public health emergency preparedness and response: Medical Reserve Corps nursing student summer externship. *Nursing Administration Quarterly*, 41(2), 128-133. <https://doi.org/10.1097/NAQ.0000000000000220>
- United Nations Office for Disaster Risk Reduction. (n.d.). Disaster. Retrieved from <https://www.undrr.org/terminology/disaster>
- U. S. Department of Health and Human Services. (n.d.). Emergency preparedness. Healthy People 2030. <https://health.gov/healthypeople/objectives-and-data/browse-objectives/emergency-preparedness>
- Veenema, T. G., Griffin, A., Gable, A. R., MacIntyre, L., Simons, N., Couig, M. P., Walsh, J. J., Proffitt-Lavin, R., Dobalian, A., & Larson, E. (2016). Nurses as leaders in disaster preparedness and response: A call to action. *Journal of Nursing Scholarship*, 48(2), 187-200. <https://doi.org/10.1111/jnu.12198>
- Veenema, T. G., Proffitt-Lavin, R., Griffin, A., Gable, A. R., Couig, M. P., & Dobalian, A. (2017). Call to action: The case for advancing disaster nursing education in the United States. *Journal of Nursing Scholarship*, 49(6), 688-696. <https://doi.org/10.1111/jnu.12338>
- Wise, G. I. (2007). Preparing for disaster: A way of developing community relationships. *Disaster Management and Response*, 5(1), 14-17. <https://doi.org/10.1016/j.dmr.2006.10.004>