

Data, Science, and Nursing Value

Current Nursing Shortages Could Have Long-Lasting Consequences: Time to Change Our Present Course

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Hospitals, nurses, thought leaders, and policymakers must address the potential long-range impacts of negative depictions of nurses and hospitals. We need to regroup and commit to fixing current and long-standing problems together, rethinking and planning for improving patient care in a post-COVID world, and supporting one another to achieve our aspirations for a better future. A Category 5 nursing shortage must be avoided to ensure the health of the nation, stability of healthcare delivery systems, and future growth of the nursing workforce.

Here we are once again talking, tweeting, and social messaging about an “unprecedented nursing shortage.” Over the past 18 months, the COVID-19 pandemic has inflicted horrible tolls on patients, families, nurses, and healthcare systems. As the highly contagious Delta variant rages and hospital admissions have spiked, growing attention has focused on nursing shortages. This focus prompts questions about whether there are different types of nursing shortages and whether hospitals were facing shortages before the pandemic began. Looking to the future, could unchecked sensationalism and unsubstantiated claims about current shortages negatively affect the capacity of the future post-COVID nursing workforce? Can historical precedents help us anticipate how the nursing workforce might fare over the decade? What can be done to prevent long-lasting shortages?

To address these questions, this commentary begins by distinguishing background shortages from national shortages, discusses factors that were creating shortages in hospitals prior to the pandemic, and concludes by considering how the pandemic, and our collective reactions to it, could impact the growth and stability of the nursing workforce in coming years.

Background vs. National Nursing Shortages

When hearing someone say their hospital is experiencing a nursing shortage, I want to know how large it is, what is the strength and source of

the evidence (high-quality empirical, published/peer-reviewed, or mostly anecdotal), and does the evidence point to a local shortage or one that is spreading and affecting many hospitals and nurses across states and regions of the country.

Background nursing shortages develop when forces temporarily alter the demand or supply of nurses. Such shortages almost always resolve and do not become permanent. For example, consider a hospital where four of seven labor and delivery nurses begin maternity leave at nearly the same time, leaving the hospital facing an acute shortage of nurses with the knowledge and skill needed for this patient care setting. This type of supply side disruption can occur just as easily in other hospital and non-inpatient settings. Or consider a demand-driven background shortage that develops when a new hospital opens in the community and offers wages above the prevailing rate and sign-on bonuses to lure nurses from an established hospital(s). Some nurses will leave their current position for the new hospital, which could create a temporary shortage for the established hospital(s). Eventually, the shortage resolves as new nurses move to the community, local nursing programs graduate additional registered nurses (RNs), or temporary and traveling nurses make up for the shortfall, etc. For different supply and demand reasons, background nursing shortages are always occurring somewhere. They can disrupt operations, but they eventually resolve and do not spread to other communities. Shortages can also be long lasting,

or static, as in the case of hospitals located in rural areas.

In contrast, *national nursing shortages* are more severe, longer lasting, involve many hospitals, and affect access to care, quality, safety, and costs. These large shortages (between 50,000-150,000 unfilled RN positions) occurred frequently from the 1960s to 2000 and resulted in many hospitals curtailing services and closing inpatient units. The last major national nursing shortage was in 2000-2001 when hospitals reported 126,000 open RN positions (Buerhaus et al., 2008). I refer to shortages of this magnitude as a “Category 5 shortage,” though unlike hurricanes which strike a particular area of the country, Cat 5 nursing shortages are national in scope.

Factors Creating Shortage Conditions in Hospitals Prior to the Pandemic

Several factors were affecting supply and demand for nurses in the years leading up to the COVID-19 pandemic. On the supply side, many baby boom (BB) RNs (about 1.2 million or roughly one-third of the total RN workforce) began retiring in 2010. Initially about 60,000 BB RNs retired each year. By the end of the decade, it was estimated this number would increase to approximately 70,000 per year (Buerhaus et al., 2017). The annual exit of RNs resulted in a striking loss of clinical and organizational experience, judgment, leadership, mentorship, relationships with physicians and administrators, and nurses who knew how to overcome barriers to get things done for patients. The nursing workforce will lose more than 2 million years of nursing experience each year between 2020-2030 as the remaining estimated 640,000 BB RNs retire (Buerhaus et al., 2017).

While plenty of new graduates have entered the workforce over the past decade, hospital chief nursing officers and managers confronted the reality that it is not possible to fully replace retiring RNs with new graduate nurses, particularly in intensive care units (ICUs), emergency departments, critical care, and other specialty units. In the years prior to the pandemic, the retirement of thousands of BB RNs was likely creating shortages in some hospitals and exacerbating existing background shortages.

A second pre-pandemic supply-side factor involves the rapid growth of the advanced practice nursing workforce, particularly nurse practitioners (NPs) (Auerbach et al., 2018). While this trend is positive for the nursing profession and healthcare systems, interest in becoming a NP was associated with a reduction of about 80,000 RNs from the nursing workforce between 2010 and 2017 (Auerbach et al., 2020). Most hospitals have programs to onboard new graduate RNs, but in recent years hospitals have reported that after a year or so some RNs left their positions to enter graduate nursing education. Some of these RNs likely continued working while in school, others reduced their hours to part-time, and still other RNs left their positions entirely, leaving hospitals with new positions to fill and absorbing the cost of having invested in RNs’ career development. Growing interest in becoming an NP, combined with highly-experienced RNs retiring from the nursing workforce, likely exacerbated existing background shortages in some hospitals and created shortages in others before the pandemic began.

Turning to demand-side factors, inpatient and outpatient care settings faced increasing growth in demand over the past decade which has made it harder for hospitals to ensure adequate nurse staffing prior to the pandemic’s onset – both numerically and having enough nurses with the needed specialty education and experience. Adding to these difficulties, the inability of some hospitals to address long-lasting issues affecting their interdependent relationship with nurses has led to burnout, distrust, and some nurses to question “Is nursing worth it?”, particularly when they or someone they know was furloughed.

The major demand-side factor affecting hospitals and nurses was, of course, COVID-19. The sudden, unexpected, and overwhelming surge of very sick patients requiring intensive specialty care nursing and medical care was shocking. Hospitals scrambled to find nurses with ICU experience by trying to attract recently retired nurses and employing nurses supplied by temporary and traveling crises nurses. Society became aware that unlike some producers in our economy who can match sudden urges in demand by keeping their manufacturing facilities

open over the weekend to produce the needed extra output, it is not possible for nursing education programs to produce nurses ready for ICUs overnight. Nor is it possible for hospitals to provide the months of mentorship and experience needed to prepare specialty and critical care nurses, particularly when great numbers of patients are seeking care. Before the onset of COVID-19 and throughout the ongoing pandemic, demand for critical care nurses has exceeded available supply.

It is not known whether shortages of critical care nurses will continue after the pandemic subsides, whether shortages will spread to noncritical care areas, and how large such shortages might become and how long they will linger. These questions should not be left to chance. We need to change our current approaches and act differently to avoid prolonged nursing shortages.

The Need to Emphasize Positive Portrayals of Nurses and Hospitals

In the 1990s, policies to reduce healthcare costs shifted to increase the use of managed care. Hospitals had to lower their costs quickly to be competitive and secure contracts with health maintenance organizations. Because hospitals are labor intensive and nurses are among the most highly paid employees, hospitals reduced the number of nurses, among other strategies. While the growth of national employment of RNs slowed (Buerhaus & Staiger, 1996), nurses reacted loudly over concerns about the quality and safety of patient care. National protests by nurses became so loud that an Institute of Medicine committee was established in 1995 to examine the quality of care and nurse staffing in hospitals and nursing homes (Institute of Medicine, 1996). Unfortunately, nurses' persistent outcry had an unintended effect in reducing the attractiveness of nursing as a career. Between 1995 and 2000, enrollment in nursing education programs decreased 4%-6% yearly (Buerhaus et al., 2008). By 2000-2001, a Cat 5 hospital nursing shortage developed. Fortunately, the Johnson & Johnson *Campaign for Nursing's Future*, launched in 2002, provided positive messages and portrayals of

nurses on national media and reversed the downward slide in nursing enrollments.

Today, the negative portrayal of hospitals and persistent imagery of physically worn out and emotionally exhausted nurses is reminiscent of the 1990s. These images are not the work of the media alone but involve nurses themselves, leaders of professional nursing organizations, unions, and hospitals. I am not insensitive to what nurses are enduring (my last clinical position was in a neurosurgical intensive care unit in a major teaching hospital), but rather to call attention to the possible impact of continued albeit unintentional negative stories about nurses on the long-term growth of the nursing workforce. While there is no evidence of declining nursing enrollment in nursing programs, this may not be the case in the future if negative portrayals of nurses and hospitals continue without counterbalancing positive images.

Published projections (and unpublished updates made just before COVID) indicate the number of RNs will grow by 1 million through 2030 (Auerbach et al., 2017). These estimates account for replacing retiring RNs (numerically) over the current decade and *assume* enrollment will continue increasing as has been the case since the early 2000s. These estimates depend on continued entry into nursing education programs and entry into the workforce. Negative stories and depictions of nurses could threaten entry into nursing.

Given ongoing hospital admissions by people infected with COVID variants and the start of flu season, now is the time for hospitals, nurses, thought leaders, and policymakers to consider potential long-range impacts of negative depictions of nurses and hospitals. We need to regroup and commit to fixing current and long-standing problems *together*, rethinking and planning for improving patient care in a post-COVID world, and supporting one another to achieve our aspirations for a better future. We must provide the public with positive portrayals of nurses, showing examples of nurses innovating to improve clinical care, providing clinical and organizational leadership, and inspiring public trust and confidence in nurses and hospitals. We need to control the messaging or face the

possibility of replaying the 1990s. Social media messaging must become more responsible.

The nation needs nurses now more than ever, and it depends on a well-prepared and appropriately sized workforce. A Cat 5 shortage must be avoided to ensure the health of the nation, stability of healthcare delivery systems, and future growth of the nursing workforce. \$

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References

Auerbach, D., Buerhaus, P., & Staiger, D. (2017). Millennials almost twice as likely to be registered nurses as baby boomers were. *Health Affairs*, 36(10), 1804-1807. <https://doi.org/10.1377/hlthaff.2017.0386>

Auerbach, D., Buerhaus, P., & Staiger, D. (2020). Implications of the rapid growth of the nurse practitioner workforce. *Health Affairs*, 39(2), 273-279. <https://doi.org/10.1377/hlthaff.2019.00686>

Auerbach, D., Staiger, D., & Buerhaus, P. (2018). Growing ranks of advanced practice clinicians – Implications for the physician workforce. *The New England Journal of Medicine*, 378(25), 2358-2360.

Buerhaus, P., Auerbach, D., & Staiger, D. (2017). How should we prepare for the wave of retiring baby boomer nurses? *Health Affairs*.
<https://www.healthaffairs.org/doi/10.1377/hblog20170503.059894/full/>

Buerhaus, P., Staiger, D., & Auerbach, D. (2008). *The nursing workforce in the United States: Data, trends, & implications*. Jones-Bartlett, Inc.

Buerhaus, P., & Staiger, D. (1996). Managed care and the nurse workforce. *The Journal of the American Medical Association*, 276(18), 1487-1493.

Institute of Medicine (US) Committee on the Adequacy of Nursing Staff in Hospitals and Nursing Homes. (1996). In G.S. Wunderlich, F. Sloan, & C.K. Davis (Eds.), *Nursing staff in hospitals and nursing homes: Is it adequate?* National Academies Press.