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## Testimony

Before the Subcommittee on Oversight of Government Management, Restructuring and the District of Columbia, Committee on Governmental Affairs, U.S. Senate

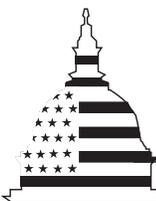
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# NURSING WORKFORCE

## Multiple Factors Create Nurse Recruitment and Retention Problems

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Mr. Chairman and Members of the Subcommittee:

I am pleased to be here today as you discuss issues related to the current difficulties in the recruitment and retention of nurses and concerns about their future supply. The health and long-term care systems in the United States rely heavily on the services of nurses, the largest group of health care workers. Nursing shortages have been reported around the country, and providers and provider associations have been studying the issue. In addition, both state legislators and members of the Congress have proposed legislation to address the problem.

To assist the Congress as it considers the impact of nurse recruitment and retention issues on federally funded health programs, including Medicare and Medicaid, my remarks will focus on (1) what is known about the current supply of nurses, (2) factors contributing to current recruitment and retention difficulties, (3) and factors that will affect the supply of and demand for nurses in the future.

While comprehensive data are lacking on the nature and extent of current difficulties recruiting and retaining nurses, current evidence suggests an emerging shortage. Several factors, including nurses' decreased levels of job satisfaction, are combining to constrain the current supply of nurses. Furthermore, like the general population, the nurse workforce is aging, and the average age of a registered nurse (RN) increased from 37 years in 1983 to 42 in 1998. Additionally, enrollments in registered nursing programs have declined over the past 5 years, shrinking the pool of new workers to replace those who are leaving or retiring. The problem is expected to become more serious in the future as the aging of the population substantially increases the demand for nurses.

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## Background

Registered nurses are responsible for a large portion of the health care provided in this country. RNs make up the largest group of health care providers, and are 77 percent of the nurse workforce.<sup>1</sup> Historically, RNs have worked predominantly in hospitals; in 2000, 59.1 percent of RNs worked in hospitals. A smaller number of RNs work in other settings, such as ambulatory care, home health care, and nursing homes. Their responsibilities may include providing direct patient care in a hospital or home health care setting, managing and directing complex nursing care in

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<sup>1</sup>Bureau of Labor Statistics Data, 1999 Occupational Employment Statistics data.

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an intensive care unit, or supervising the provision of long-term care in a nursing home. In 1999 licensed practical nurses (LPN) composed 23 percent of the nurse workforce. LPNs provide patient care under the direction of physicians and registered nurses, with 32 percent working in hospitals, 28 percent working in nursing homes, and the rest working for doctors' offices, home health agencies, residential care facilities, schools, temporary help agencies, and government agencies.

Individuals usually select one of three ways to become an RN—through a 2-year associate degree, 3-year diploma, or 4-year baccalaureate degree program. As of 2000, 40.3 percent of nurses had received their training through an associate program, while 29.6 percent and 29.3 percent had received their training in a diploma or baccalaureate degree program, respectively. LPN programs are 12 to 18 months in length and generally focus on basic nursing skills such as monitoring patient or resident condition and administering treatments and medications. Once they have completed their education, RNs and LPNs must meet the licensing requirements of their state to be allowed to practice.

The U.S. health care system has changed significantly over the past two decades, affecting the environment in which nurses provide patient care. Advances in technology and greater emphasis on cost effectiveness have led to changes in the structure, organization, and delivery of health care services. While hospitals traditionally were the primary providers of acute care, advances in technology, along with cost controls, shifted some care from traditional inpatient settings to ambulatory, community-based, nursing facility, or home health care settings. The transfer of less acute patients to nursing homes and community-based care settings created additional job opportunities and increased demand for nurses in these settings. This change in service settings has also resulted in decreased lengths of patient stay in hospitals and a decline in the numbers of beds staffed. At the same time, the acuity of patients increased as those patients remaining in hospitals were those too medically complex to be cared for in another setting. In an additional effort to contain costs in the early 1990s, acute care facilities restructured and redesigned staffing patterns, introducing more non-RN caregivers and reducing the number of RNs on staff.

Recent studies have identified a relationship between the level of nurse staffing and the quality of patient care. A recent Health Resources and

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Services Administration (HRSA) study found a relationship between higher RN staffing levels and the reduction of certain negative hospital inpatient outcomes, such as urinary tract infection and pneumonia.<sup>2</sup> Furthermore, a Health Care Financing Administration (HCFA) report to the Congress last year found a direct relationship between nurse staffing levels in nursing homes and the quality of resident care.<sup>3</sup>

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## Evidence Suggests Emerging Shortages of Nurses

Current evidence suggests emerging shortages of nurses available or willing to fill some vacant positions in hospital, nursing home, and home health care settings. National data are not adequate to describe the full nature and extent of nurse workforce shortages, nor are data sufficiently sensitive or current to allow a comparison of the degree of nurse workforce shortages across states, specialties, or provider types.

The nationwide unemployment rate for RNs, which has been low for many years, has recently declined further from 1.5 percent in 1997 to 1.0 percent in 2000, the lowest level in more than a decade.<sup>4</sup> Rising vacancy rates reported by providers provide another indicator of possible excess demand.<sup>5</sup> A survey recently conducted by the Association of Maryland Hospitals and Health Systems reported a statewide average RN vacancy rate for hospitals of 14.7 percent in 2000, up from 3.3 percent in 1997. The Association reported that the last time vacancy rates were at this level was during the late 1980s, during the last reported nurse shortage. As of a June 2001 American Hospital Association survey, 17 state hospital associations reported statewide RN vacancy rate data for 2000 or 2001, and 11 of these states reported vacancy rates of 10 percent or higher. For 2000, California reported an average RN vacancy rate of 20 percent, while in 2001 Florida and Delaware reported nearly 16 percent, and Alabama and Nevada reported an average rate of 13 percent. Other surveys indicate that the difficulty recruiting RNs appears to be affecting a variety of provider types.

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<sup>2</sup>Harvard School of Public Health, Vanderbilt University School of Nursing, and Abt Associates, *Nurse Staffing and Patient Outcomes in Hospitals*, contract No. 230-99-0021, HRSA (Washington, D.C.: HHS, 2001).

<sup>3</sup>HCFA is now known as the Centers for Medicare and Medicaid Services (CMS).

<sup>4</sup>*A Shortage of Registered Nurses: Is It On the Horizon or Already Here?*, 2001.

<sup>5</sup>Caution must be used when comparing vacancy rates from different studies. While nurse vacancy rates are typically the number of budgeted full-time RN positions that are unfilled divided by the total number of total budgeted full-time RN positions, not all studies identify the method used to calculate rates.

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California reported an RN vacancy rate of 8.5 percent for all employers in 1997, with hospitals reporting a rate of 9.6 percent, nursing homes 6.9 percent, and home health care 6.4 percent. A 2000 survey of providers in Vermont found that nursing homes and home health care agencies had RN vacancy rates of 15.9 percent and 9.8 percent, respectively, while hospitals had an RN vacancy rate of 4.8 percent (up from 1.2 percent in 1996).

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## Job Dissatisfaction, Demographic Changes, and Declining Interest in The Nursing Profession Contribute to Recruitment and Retention Problems

Job dissatisfaction is reported to be high among nurses. Nurses report unhappiness with a variety of issues, including staffing, respect and recognition, and wages, and this dissatisfaction is affecting their decision to work in nursing. Furthermore, the nurse workforce is aging and fewer new nurses are entering the profession to replace those who are retiring or leaving.

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## Nurses Report Dissatisfaction with Current Work Environment

Job dissatisfaction may play a significant role in both current and future recruitment and retention problems. A recent Federation of Nurses and Health Professionals (FNHP) survey found that half of the currently employed RNs who were surveyed had considered leaving the patient-care field for reasons other than retirement over the past 2 years.<sup>6</sup> Over one-fourth (28 percent) of RNs in a 1999 study by The Nursing Executive Center described themselves as somewhat or very dissatisfied with their job, and about half (51 percent) were much less satisfied with their job than they were 2 years ago.<sup>7</sup> In that same survey, 32 percent of general medical/surgical RNs, who constitute the bulk of hospital RNs, indicated that they were dissatisfied with their current job. According to a survey conducted by the American Nurses Association (ANA), 54.8 percent of RNs and LPNs responding would not recommend the nursing profession as a career for their children or friends, while 23 percent would actively

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<sup>6</sup>Federation of Nurses and Health Professionals, *The Nurse Shortage: Perspectives From Current Direct Care Nurses and Former Direct Care Nurses* (opinion research study conducted by Peter D. Hart Research Associates)(Washington, D.C.: April 2001).

<sup>7</sup>*The Nurse Perspective: Drivers of Nurse Job Satisfaction and Turnover*, 2000.

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discourage someone close to them from entering the profession.<sup>8</sup> Almost half (49 percent) of current RNs surveyed in another study said that if they were younger and just starting out, they would pursue a different career, rather than becoming a registered nurse.<sup>9</sup>

Inadequate staffing, heavy workloads, and the use of overtime to address staffing shortages are frequently cited as key areas of job dissatisfaction among nurses. Seventy-nine percent of nurses responding to the FHNP survey said they had seen a rise in acuity of patients.<sup>10</sup> When adjusted to reflect the rise in acuity levels, the number of hospital employees on staff for each patient discharged, including nurses, declined by more than 13 percent between 1990 and 1999. This increases the work intensity for individual nurses. According to one survey, of those RNs responding who had considered leaving the patient-care field for reasons other than retirement, 56 percent indicated that they wanted a less stressful and physically demanding job and 22 percent said they were concerned about schedules and hours.<sup>11</sup> The same survey found that 55 percent of current RNs were either just somewhat or not satisfied by their facility's staffing levels, while 43 percent of current RNs surveyed indicated that increased staffing would do the most to improve their job. Another survey found that 36 percent of RNs in their current job more than one year were very or somewhat dissatisfied with the intensity of their work.<sup>12</sup> Officials of unions representing nurses told us the issues of staffing and overtime have been important for their nursing members during recent negotiations. State legislators have also indicated concern—in the first half of 2001 alone, legislation designed to limit mandatory overtime or protect nurses who refuse to work additional hours has been introduced in 10 states.

Registered nurses have also cited the lack of respect and recognition given them, along with their perceived lack of authority, as areas of

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<sup>8</sup>American Nurses Association, *Analysis of American Nurses Association Staffing Survey* (Internet survey compiled by Cornerstone Communications Group for the American Nurses Association)(Warwick, RI, 2001).

<sup>9</sup>*The Nurse Shortage: Perspectives From Current Direct Care Nurses and Former Direct Care Nurses*, April 2001.

<sup>10</sup>*The Nurse Shortage: Perspectives From Current Direct Care Nurses and Former Direct Care Nurses*, April 2001.

<sup>11</sup>*The Nurse Shortage: Perspectives From Current Direct Care Nurses and Former Direct Care Nurses*, April 2001.

<sup>12</sup>*The Nurse Perspective: Drivers of Job Satisfaction and Turnover*, 2000.

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dissatisfaction. In a survey conducted by The Nursing Executive Center, 48 percent of RNs surveyed who had held their current job more than one year indicated that they were very or somewhat dissatisfied with the recognition they receive, while 35 percent were dissatisfied with their level of participation in decision-making.<sup>13</sup> Over half (53 percent) of RNs responding to a survey from the FNHP were either just somewhat or not satisfied by the degree to which they had a voice in decisions, while 47 percent were either just somewhat or not satisfied by the support and respect they received from management.<sup>14</sup>

While surveys indicate that increased wages might encourage registered nurses to stay at their jobs, money is not always cited as the primary reason for job dissatisfaction. According to the FNHP survey, of those RNs responding who had considered leaving the patient-care field for reasons other than retirement, 18 percent wanted more money, versus 56 percent who were concerned about the stress and physical demands of the job.<sup>15</sup> However, the same study reported that 27 percent of current RNs responding cited higher wages or better health care benefits as a way of improving their job. Another study indicated that 39 percent of RNs who had been in their current job for more than 1 year were dissatisfied with their total compensation, but 48 percent were dissatisfied with the level of recognition they received from their employer.<sup>16</sup> The American Hospital Association (AHA) recently reported on a survey that found that 57 percent of responding RNs said their salaries were adequate, compared to 33.4 percent who thought their facility was adequately staffed and 29.1 percent who said that their hospital administration listened and responded to their concerns.<sup>17</sup>

Nurses have also expressed dissatisfaction with a decrease in the amount of support staff available to them over the past few years. Fewer than half the RNs responding to the recent study by the AHA agreed that their

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<sup>13</sup>*The Nurse Perspective: Drivers of Job Satisfaction and Turnover*, 2000.

<sup>14</sup>*The Nurse Shortage: Perspectives From Current Direct Care Nurses and Former Direct Care Nurses*, April 2001.

<sup>15</sup>*The Nurse Shortage: Perspectives From Current Direct Care Nurses and Former Direct Care Nurses*, April 2001.

<sup>16</sup>*The Nurse Perspective: Drivers of Nurse Job Satisfaction and Turnover*, 2000.

<sup>17</sup>AHA and The Lewin Group, "The Hospital Workforce Shortage: Immediate and Future" *Trend Watch*, Vol. 3, No. 2 (June 2001)

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hospital provided adequate support services.<sup>18</sup> Nurses responding to a survey by the ANA also pointed to a decrease of needed support services. Current nurse workforce issues are part of a larger health care workforce shortage that includes a shortage of nurse aides.<sup>19</sup> Nurse aides support nurses and assist patients with activities of daily living such as dressing, feeding, and bathing.<sup>20</sup> Several state and local-level studies cite nurse aide recruitment and retention as a problem for many providers. The shortage among nurse aides may be linked to difficult work conditions as well as dissatisfaction with wages and benefits. Studies have cited low wages and few benefits as factors contributing to nurse aide turnover. Our recent analysis of national data from the Bureau of Labor Statistics indicated that, on average, nurse aides receive lower wages and fewer benefits than workers generally; this is particularly true for those working in nursing homes and home health care.<sup>21</sup> In 1999, the national average hourly wage for nurse aides working in nursing homes was \$8.29, compared to \$9.22 for service workers and \$15.29 for all workers. For nurse aides working in home health care agencies, the average hourly wage was \$8.67, and for nurse aides working in hospitals, \$8.94. Our analysis indicated that many nurse aides have sufficiently low earnings and family incomes to qualify for public benefits such as food stamps and Medicaid.

Studies have also identified the physical demands of nurse aide work and other aspects of the workplace environment as contributing to retention problems. Nurse aide jobs are physically demanding, and have one of the highest rates of workplace injury, 13 per 100 employees in 1999, compared to the construction industry rate of 8 per 100 employees. Additional factors that affect turnover include workloads and staffing levels, respect from administrators, organizational recognition, and participation in decision-making—all very similar to areas of dissatisfaction identified by nurses.

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<sup>18</sup>AHA and The Lewin Group, “The Hospital Workforce Shortage: Immediate and Future”.

<sup>19</sup>*Analysis of American Nurses Association Staffing Survey*, 2001.

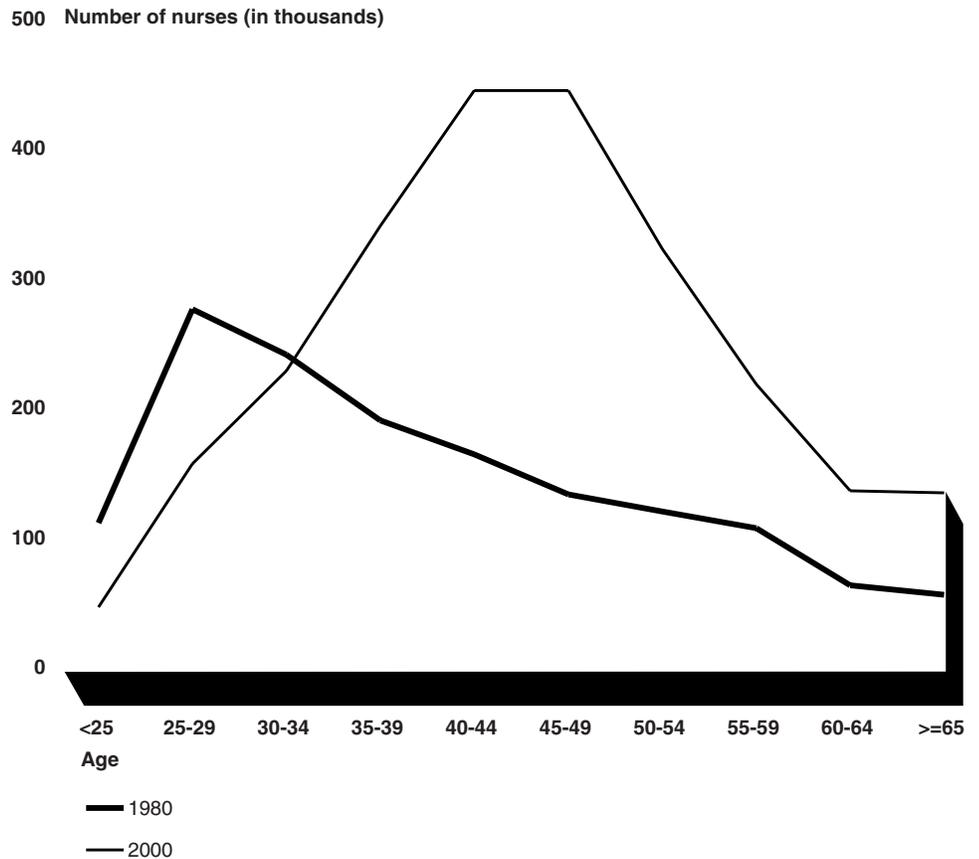
<sup>20</sup>We use the term “nurse aide” to refer to all paraprofessional nursing staff working in health care settings.

<sup>21</sup>See *Nursing Workforce: Recruitment and Retention of Nurses and Nurse Aides is a Growing Concern* (GAO-01-750T, May 17, 2001).

## The Nurse Workforce Is Aging

While job dissatisfaction is a primary reason cited for nurse retention problems, demographic changes are also a contributing factor. As shown in figure 1, there has been a dramatic shift upward in the age distribution of registered nurses in the past 10 years. The average age of the RN population in 2000 was 45, almost 1 year older than the average in 1996. Over half (52 percent) of all RNs were reported to be under the age of 40 in 1980; by 2000 fewer than 1 in 3 were younger than 40.

**Figure 1: Age Distribution of the Registered Nurse Population, 1980 and 2000**



Source: HRSA, *The Registered Nurse Population: National Sample Survey of Registered Nurses*, March 2000.

## Fewer People Have Chosen to Enter the Nursing Profession

While the current nurse population continues to age, fewer young people are choosing nursing as a profession. Over the past 25 years, career opportunities available to women have expanded significantly, and there has been a corresponding decline of interest by women in nursing as a

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career. A recent study reported that women graduating from high school in the 1990s were 35 percent less likely to become RNs than women who graduated in the 1970s.<sup>22</sup> The decline in nursing program enrollments in recent years reflects this development. According to a 1999 Nursing Executive Center Report, enrollment in diploma programs dropped 42 percent between 1993 and 1996, and enrollment in associate degree programs declined 11 percent.<sup>23</sup> Furthermore, between 1995 and 1998, enrollment in both baccalaureate and master's programs also dropped.

In addition to the reduced number of students entering nursing programs, there is concern about a pending shortage of nurse educators. The average age of professors in nursing programs is 52 years old, and 49 years old for associate professors. The average age of new doctoral recipients in nursing is 45, compared with 34 in all fields. From 1995 to 1999, enrollments in doctoral nursing programs were relatively stagnant. Both Arkansas and California have reported that qualified applicants have been turned away from basic RN education because of a lack of institutional resources, including faculty and facilities.

Growth in the number of new RNs has slowed in recent years. The number of new RNs passing the licensing examination declined steadily from 1996 to 2000; in 2000 it was 23 percent lower than in 1996, falling from 96,679 to 74,787. Although the total number of licensed RNs increased 5.4 percent between 1996 and 2000, to a total of 2,696,540—this was the lowest increase ever reported in HRSA's periodic survey of RNs. In contrast, the highest increase in the RN population occurred between 1992 and 1996, when the total number of RNs increased by an estimated 14.2 percent, from 2,239,816 to 2,558,874.<sup>24</sup>

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<sup>22</sup>Buerhaus, Peter I. et al., "Policy Responses to an Aging Registered Nurse Workforce," *Nursing Economics* Vol. 18, No. 6 (Nov.-Dec. 2000).

<sup>23</sup>The Nursing Executive Center, *A Misplaced Focus: Reexamining the Recruiting/Retention Trade-Off* (Washington, D.C.: The Advisory Board Company, Feb. 11, 1999).

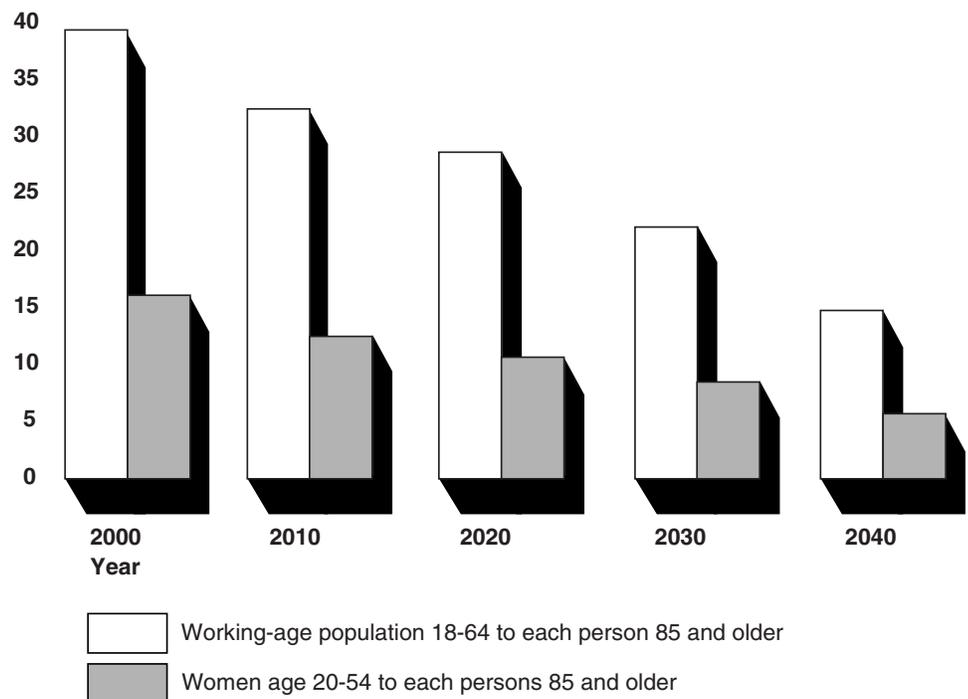
<sup>24</sup>*The Registered Nurse Population: National Sample Survey of Registered Nurses*, Mar. 2000.

## Demand for Nurses Will Continue to Grow As the Supply Dwindles

A serious nurse shortage is expected in the future, as pressures are exerted on both demand and supply. The future demand for nurses is expected to increase dramatically when the baby boomers reach their 60s, 70s, and beyond. The population age 65 years and older will double from 2000 to 2030. During that same time period the number of women between 25 and 54 years of age, who have traditionally formed the core of the nursing workforce, is expected to remain relatively unchanged. This potential mismatch between future supply and demand for caregivers is illustrated by the change in the expected ratio of potential care providers to potential care recipients. As shown in figure 2, the ratio of the working age population, age 18 to 64, to the population over age 85 will decline from 39.5 workers for each person 85 and older in 2000, to 22.1 in 2030, and 14.8 in 2040. The ratio of women age 20 to 54 to the population age 85 and older will decline even more dramatically, from 16.1 in 2000, to 8.5 in 2030, and 5.7 in 2040.

**Figure 2: Decline in Elderly Support Ratio Expected, 2000 to 2040**

45 Workers per person 85 and older



Source: GAO analysis of U.S. Census Bureau Projections of Total Resident Population, Middle Series, December 1999.

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Unless more young people choose to go into the nursing profession, the nurse workforce will continue to age. By 2010, the average age of nurses will be 45.4, while approximately 40 percent of the workforce will be older than 50. By 2020, the total number of full-time equivalent RNs is projected to have fallen 20 percent below requirements.<sup>25</sup>

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## Concluding Observations

Providers' current difficulty recruiting and retaining nurses may worsen as the demand for nurses increases with the aging of the population. Certain changes in the labor market are similar to those that occurred during past nurse shortages. However, impending demographic changes are widening the gap between the numbers of people needing care and available caregivers. Moreover, the current high levels of job dissatisfaction among nurses due to management decisions to restructure health care delivery and staffing may play a crucial role in determining the extent of future nurse shortages. Efforts undertaken to improve the areas of the workplace environment that contribute to job dissatisfaction may reduce the likelihood of nurses leaving or considering leaving the profession, and of fewer people considering entering it. More data that can describe the exact scope and nature of the current problem are needed to assist in planning and targeting corrective efforts. As providers, states, and the federal government focus on the nursing workforce, they have the opportunity to collect and analyze critical information on changes in the supply of and demand for nurses.

Mr. Chairman, this concludes my statement. I would be happy to answer any questions that you or Members of the Subcommittee may have.

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## GAO Contacts and Staff Acknowledgments

For more information regarding this testimony, please contact me at (202) 512-7118 or Helene Toiv at (202) 512-7162. Eric Anderson, Connie Peebles Barrow, Emily Gamble Gardiner, and Pamela Ruffner also made key contributions to this statement.

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<sup>25</sup>American Organization of Nurse Executives, *Perspectives on the Nursing Shortage: A Blueprint for Action*, October 2000.