North Carolina, like many states, faces a serious challenge in meeting its citizens’ long-term care needs with an adequate and stable supply of caring and well trained direct care workers—nurse aides, orderlies, and attendants; home health aides; and personal and home care aides.1 Serious shortages of direct care workers persist in all long-term care related settings in North Carolina, including home care, nursing homes, assisted living and other residential settings.

With our rapidly growing aging population, demand for direct care workers will only increase in the future. Direct care workers provide most of the paid long-term care needed. Among other tasks, these workers help impaired persons with some of the most basic and personal daily tasks most of us are fortunate enough to be able to take for granted: getting in and out of a chair or bed, bathing, dressing, eating, grooming and using the toilet. Direct care workers are essential to achieving quality care and to preserving, to the greatest extent possible, the dignity and independence of persons who must rely on others for help with care needs. This workforce issue is not just an issue of concern to agencies or facilities that employ direct care workers and consumers and families. It is also an issue for states, given the significant investment of public dollars states make on behalf of vulnerable persons who must depend on publicly funded long-term care services.

In 2000, North Carolina spent over $1.5 billion on such services (or approximately 6% of the state’s total state and federal budget in SFY99-2000).2 Nationally, Medicaid funded long-term care expenditures totaled $62 billion in 1999.3

US Bureau of Labor data for 2000 indicate there were approximately 2.2 million direct care workers nationally.4 Of these, about 18% are expected to be working in hospitals (also experiencing shortages) while the overwhelming ma

Susan Harmuth is with the NC Department of Health and Human Services, Office of Long-Term Care. She can be reached at Susan.Harmuth@ncmail.net.

**Figure. Size and Distribution of Direct Care Workforce in the Nation (left) and in the State (right), 2000**
majority work in long-term care. The size and distribution of the nation and state’s direct care workforce in 2000 are shown in the Figure.

### An Overview of the Current Shortage

High turnover rates and severe shortages of direct-care workers have plagued long-term care providers over the past several years irrespective of care setting. A survey by the University of North Carolina at Chapel Hill’s Institute on Aging (2000), showed 100% annual turnover rates in North Carolina nursing homes, 119% in adult care homes, and 53% in home care agencies. Other data substantiating this workforce crisis include an examination of the state’s Nurse Aide Registry data. As of February 2002, a total of 222,000 persons have been trained and/or listed as Nurse Aide I in North Carolina, yet only 41% (91,322) are eligible to work. The remainder (130,928) are in inactive status, so are ineligible to work.

According to recent press reports, the US Department of Health and Human Services is about to release a study showing that 90% of the nation’s nursing homes do not have sufficient staff to care adequately for their residents. The growth in employment for direct care workers is more than double that of projected growth in overall employment (15.2%) during this same period. Between 2000 and 2010, the nation will need an additional 874,000 direct care workers (36.3% increase). In fact, Personal and Home Care Aides rank in terms of the fastest growing occupations between 2000 and 2010. Table 1 shows the projected growth nationally for the three major categories of direct care workers between 2000 and 2010. It is important to note, however, that this increased demand comes well before the first baby boomers begin reaching 85 years of age in 2030.

### Future Demand for Direct Care Workers

**Nationally**: Growth in the elderly population and advances in medicine and medical technology will put increasing demand on long-term care related services as well as the professional and paraprofessional staff needed to provide these services. Persons 85 and older are those most likely to need long-term care. Our nation’s 85+ population is expected to double by 2030 to 8.9 million compared to 4.9 million in 2000. As described by Stephen Dawson, President of the Paraprofessional Healthcare Institute, our nation faces a serious “care gap.” Traditionally, the direct care workforce has comprised women 20 to 54 years of age.

### Table 1. Number of Direct Care Workers by Year

<table>
<thead>
<tr>
<th>Job</th>
<th>2000</th>
<th>2010 Projected</th>
<th>% Increase</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nurse Aides, Orderlies, and Attendants</td>
<td>1,373,000</td>
<td>1,697,000</td>
<td>23.5%</td>
</tr>
<tr>
<td>Home Health Aides</td>
<td>615,000</td>
<td>907,000</td>
<td>47.3%</td>
</tr>
<tr>
<td>Personal &amp; Home Care Aides</td>
<td>414,000</td>
<td>672,000</td>
<td>62.5%</td>
</tr>
<tr>
<td>Total</td>
<td>2,402,000</td>
<td>3,276,000</td>
<td>36.3%</td>
</tr>
<tr>
<td>Net Change Over Decade</td>
<td>+ 874,000</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>


...
In fact, shortages continued to be a major issue in December 2001 when the state’s unemployment rate reached a 17-year high of 6.5%. Similarly, a national survey conducted by the NC Department of Health and Human Services on the direct care workforce in 1999 indicated that recruitment and retention of direct care workers was a major issue for both the state with the lowest unemployment rate at the time (Minnesota, 2.1%) and the state with the highest unemployment rate (West Virginia, 6.8%). An update of this study found shortages of direct care workers a continuing problem in most states, despite the recent downturn in the economy.

Factors other than the economy have a major impact on high turnover rates and the inability to recruit new workers. These jobs are physically demanding and can often be emotionally draining. Direct care workers in long-term care often care for persons with cognitive impairments and/or dementia that can result in difficult communications and disruptive behaviors. In addition, many persons being cared for have chronic illnesses that lead to declining health and death. These are typically low-wage jobs and, in many cases, provide few, if any, employer-paid benefits such as health insurance coverage, retirement benefits, or child care. There is no career path for aides who do not want to achieve a licensed job category (e.g., Licensed Practical Nurse, Registered Nurse), and some direct care workers complain about the lack of exposure to “real-life” job demands during training. Further, even though nurse aides and other direct care workers provide most of the hands-on care, they lack opportunity for meaningful input into patient care planning or health services provision, and they receive inadequate recognition and appreciation by families, residents, or employers. Direct care workers in residential and facility settings, often have to work with less than the scheduled number of aides for a given shift (because of turnover and absenteeism), which leads to greater stress. In contrast, direct care workers who prefer to work in home care settings sometimes find it difficult to schedule full-time work through their employers. To add to all this, nurse aides have high injury rates—ranked third, in fact, behind truck drivers and laborers for the largest number of work-related injuries and illnesses resulting in time away from work.17

Many direct care workers who have been in the long-term care labor force for some time report that, in spite of these barriers, they have chosen to stay because they love taking care of their patients. For many, their work is a “calling.” Even for the most dedicated and caring workers, however, job barriers can become overwhelming and other job opportunities too attractive in terms of physical and emotional demands, pay, benefits, and appreciation. Experienced direct care workers speak candidly about the shortage of workers and wonder whether there will be anyone to take care of them in the future, should they need long-term care themselves, if something isn’t done to address the barriers that are driving trained paraprofessional workers out of the field.

While not the only issue, low wages are a key barrier to the recruitment and retention of direct care workers in long-term care. Direct care workers can often find jobs that are safer, far less physically demanding and emotionally draining, and provide better pay and benefits. An analysis of North Carolina’s 1998 Nurse Aide I Registry, conducted through a joint effort of the NC Department of Health and Human Services, the University of North Carolina Institute on Aging, and the NC Bureau of Labor, found that inactive nurse aides were earning an average of $14,425 per year compared to average annual earnings of $11,358 (~$3,067) for active nurse aides. Those no longer working as nurse aides also had more stable work, typically working one job per year (1.05) compared with almost two per year for active nurse aides (either concurrently or sequentially).

Unfortunately, reliance on public benefits is a reality faced by many direct care workers. During a May 2001 hearing held by the US Senate Committee on Health, Education, Labor and Pensions on nurse and nurse aide workforce issues, William Scanlon, Director of Health Care Issues for the US General Accounting Office, stated that nurse aides working in home care and nursing homes are twice as likely as workers in other occupations to receive public benefits, particularly food stamps and/or Medicaid-covered health benefits. Approximately 14% of direct care workers working in nursing homes or home care received food stamps in 1999 compared to 5.5% for all workers, and approximately 10% of direct care workers received Medicaid

| Table 2. Top 10 States in Projected Number of Additional Direct Care Workers Needed Between 1998-2008 |
|-------------------------------------------------|--------------------------------------------------|
| **State** | **Projected Number Needed** | **Number of Residents Aged 60+, April 2000** |
| 1. New York | 61,800 | 3.2 million |
| 2. Texas | 37,650 | 2.8 million |
| 3. California | 36,900 | 4.7 million |
| 4. Florida | 36,200 | 3.5 million |
| 5. Ohio | 34,750 | 1.9 million |
| **6. North Carolina** | **30,850** | **1.3 million** |
| 7. Pennsylvania | 26,750 | 2.4 million |
| 8. New Jersey | 22,350 | 1.4 million |
| 9. Virginia | 21,800 | 1.0 million |
| 10. Massachusetts | 15,150 | 1.0 million |
covered health care, compared to about 4% for all workers. Overall, 11% of the workforce nationally has an estimated family income at or below the federal poverty level. This compares to approximately 18% of direct care workers.

National and state median wages paid to direct care workers in 2000 are shown in Table 3. Median hourly wages for the three major direct care worker categories have been averaged to develop a composite average hourly wage and annualized wage. To provide a context for considering these wage rates, the chart also compares the annualized wages to the federal poverty level in 2000 for individuals and a family of three.

<table>
<thead>
<tr>
<th>Direct Care Workers</th>
<th>Median Hourly Wage</th>
<th>Annualized Wage</th>
<th>Percent of 2000 FPR*</th>
<th>Percent of 2000 FPR**</th>
</tr>
</thead>
<tbody>
<tr>
<td>National</td>
<td>$8.21</td>
<td>$17,070</td>
<td>204%</td>
<td>121%</td>
</tr>
<tr>
<td>NC</td>
<td>$7.86</td>
<td>$16,356</td>
<td>196%</td>
<td>116%</td>
</tr>
</tbody>
</table>

*FPR (Federal Poverty Rate) for individual = $8,350
**FPR for family of 3 = $14,150

What Are States Doing to Address the Problem?:

States are taking a number of steps to help alleviate the current shortage and attract the growing number of workers needed to meet future demand. State public policy actions generally fall into several major categories including improving wages and benefits, developing career ladder options, broadening the pool of potential workers, improving training, and data collection.

Improving wages and benefits. Some states, such as South Carolina and Texas, have increased reimbursement for one or more services that rely heavily on direct care workers (e.g. nursing home care, home and community care). The states that have chosen this approach typically increase Medicaid reimbursement for certain services, but sometimes increases intended to go to direct care workers are used for that purpose. Some states have established different reimbursement levels for shift differentials (e.g., paying more for night or weekend work). Others have tied increased reimbursement to improved performance by providers/staff. Several states have increased access to publicly funded health insurance coverage, for example, by promoting the availability of the state’s Children’s Health Insurance Programs (such as NC’s Health Choice for Children) or expanding Medicaid to cover uninsured adults.

Developing career ladder options for direct care workers. In Montana, “add-on” training allows Certified Nursing Assistants to become Licensed Practical Nurses (LPNs). Other states, such as Washington and Wisconsin, have standardized training for personal care workers or established a Nurse Aide II program (NC already has such a program). Other states, including Maine, have added new categories for unlicensed workers (e.g., “medication technician” “mentor,”) to recognize specialized skills needed in long-term care settings and to help employers use staff more efficiently and effectively.

Broadening the pool of potential workers. As one example of this effort, Arkansas has implemented a consumer-directed care option in which the patient actually controls the dollars and can hire friends or relatives to provide direct care. Some states have promoted the use of “single-task” workers in residential or nursing home settings, training persons to assist with feeding residents, for instance. For direct care jobs, other states have recruited non-traditional workers including Welfare-to-Work participants, older adults, and immigrants. There have also been efforts to attract high school allied health students to direct care work in long-term care setting, and to develop web-based training or scholarship opportunities.

Improving training. Some states have increased the minimum training hours required for Nurse Aides I; stan-
data collection. Finally, several states, including North Carolina, have established task forces and work groups to collect and analyze available data, examine and discuss direct care workforce issues, and recommend public policy action needed as appropriate.

North Carolina has been working to assess and address the direct care workforce crisis for several years. Since 1999, a number of major initiatives have been implemented. A multi-year initiative funded by the Kate B. Reynolds Charitable Trust was one of the first major efforts taken by the North Carolina Department of Health and Human Services to address direct care worker shortages in long-term care related settings. The activities included data collection and analysis, and the development of training and retention models. Because of the grant, North Carolina routinely collects and compiles annual turnover data from licensed home care agencies, adult care homes and nursing homes (by setting and across settings) using a uniform methodology to track turnover over time within and across care settings. This is a collaborative effort of the Department of Health and Human Services and the North Carolina Institute on Aging at UNC-CH. As part of the collaboration, the state has analyzed the state’s Nurse Aide Registry data to identify competing employment sectors, assess the stability of the Nurse Aide workforce over time, compare wages and job stability of active versus inactive nurse aides, and determine trends in the growth of this workforce.

The state has also developed a training and retention program similar to the “TEACH” (Teacher Education and Compensation Helps) program for nurse aides working in nursing homes. TEACH was instituted to address high turnover rates among child day care workers. Participating nurse aides receive financial and other incentives in exchange for completing additional training and committing to stay with their current employer for a specified period of time. Employers must make a contribution toward the incentives offered (e.g. wage increase, bonus, release time, etc.). Eventually, it is hoped, funding will be available to expand this program to aides working in other long-term care settings. Currently, civil penalty fine money collected from nursing homes is being used to support and pay for this initiative. The state has also helped develop nine training modules to address Nurse Aide I skill gaps as identified by nurse aides themselves and staff development coordinators in nursing facilities. Most of these training modules also are applicable to other settings. In addition to the nine training modules, the General Assembly appropriated $500,000 to the NC Department of Health and Human Services to support the North Carolina Health Care Facilities Association to develop, implement, and evaluate on-site Internet training or other innovative training programs to improve recruitment and retention of nurse aides in nursing homes. An array of marketing materials based on the theme “Be a Hero” were developed and disseminated in an effort to promote the role of nurse aides in nursing homes and to increase interest in this job opportunity. In addition, a comprehensive training program was developed to incorporate quality orientation and mentoring programs in nursing facilities. The Association is also finishing a video documentary that depicts a day in the life of a nurse aide in a nursing facility to illustrate the realities of the work performed by nurse aides and their relationships with families and coworkers.

While no solution has been found to provide low-cost health insurance to direct care workers who are not covered through their job, the state has actively promoted the availability of North Carolina’s Health Choice for the children of nurse aides. The Division of Facility Services’ Nurse Aide Registry has mailed out information about this program to all newly registered nurse aides. The Division of Aging has also sent information about this program to their provider network. Various state level provider associations are also encouraging their members to inform direct care workers about this program.

<table>
<thead>
<tr>
<th>Table 4. NC Comparative Wage Data for 2000</th>
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<tbody>
<tr>
<td><strong>Job Category</strong></td>
</tr>
<tr>
<td>Dental Assistants</td>
</tr>
<tr>
<td>Manicurists</td>
</tr>
<tr>
<td>Textile Knitting/Weaving</td>
</tr>
<tr>
<td>Machine Setters/Operators</td>
</tr>
<tr>
<td>School Bus Drivers</td>
</tr>
<tr>
<td>Telemarketers</td>
</tr>
<tr>
<td>Textile Cutting Machine</td>
</tr>
<tr>
<td>Hairdressers</td>
</tr>
<tr>
<td>Teacher’s Assistants</td>
</tr>
<tr>
<td>Direct Care Workers</td>
</tr>
</tbody>
</table>

The North Carolina Institute of Medicine’s (NCIOM) Long-Term Care Task Force recognized that an adequate and stable supply of trained professionals and paraprofessionals is integral to achieving an improved long-term care system. Many of the recommendations outlined in the report pertaining to nurse aides and other direct care workers are consistent with the major categories of action being taken by other states. Several of the recommendations build upon recommendations put forth and/or initiatives undertaken by the Department of Health and Human Services. Some of the recommendations require legislative action, but other recommendations were targeted at long-term care employers.

The NCIOM recommended that the North Carolina General Assembly appropriate new funds to increase Medicaid reimbursement for nursing home care and personal care services (in-home and in adult care homes) to support the following efforts: a carefully monitored labor enhancement for direct care workers in these settings; a continuing education initiative for aides based on the TEACH model for early childhood workers; development of a career ladder for aide workers in long-term care, by the Division of Facility Services in conjunction with the NC Board of Nursing, NC Center for Nursing, state-level provider associations, and other key stakeholder groups; and on-going collection of data related to the aide workforce. In addition, the Task Force recommended exploring other options to expand the availability of professional and paraprofessional staff working in long-term care settings. While legislation was introduced to implement many of these recommendations, no legislative action was taken because of the state’s current budget crisis.

In spite of the state’s budget situation, the NC DHHS has taken a number of steps to improve the availability and retention of direct care workers. For example, it applied for and received a three-year, $1.6 million grant from the federal Centers for Medicare and Medicaid Services (CMS) to address the direct care workforce shortage in home and community-based care settings. The grant will be used to develop a consumer-directed care model to help broaden the pool of direct care workers in home and community-based settings and support self-determination for consumers in need of long-term care. Other major grant initiatives include a mentoring program for direct care workers; development of competency-based training models linking wage recommendations to specialized competencies, to help establish a career ladder for direct care workers and improve job performance and satisfaction; and an array of public education, awareness, and marketing efforts to recognize the importance of this workforce to the general public and promote recruitment and retention of direct care workers. Some of the funds will be used for on-going data collection and analysis efforts related to North Carolina’s direct care workforce.

These grant activities will be coordinated with other ongoing direct care workforce initiatives that affect direct care workers regardless of long-term care setting. It is essential to recognize that any efforts to develop state-recognized career paths for direct care workers must be designed in such a way that the newly established job categories are based on well-defined specialized skills and competencies. This will enable employers to deploy staff more efficiently, retain well-trained staff, and offer better care for patients. Only then can employers be expected to recognize these new job categories in a manner that results in increased responsibility, status, and wages for the worker.

In keeping with this recipe for successful career path development, the Department of Health and Human Services is collaborating with the Board of Nursing and other key stakeholder groups to develop two new job categories for aide workers. One is a “medication aide” to assist with medication administration. Although initiated in response to a need identified in nursing homes, this category of worker should be useful in other long-term care settings as well, including non-healthcare settings with responsibility for administering medications (e.g. schools and prisons). The second job category, a “geriatric nurse aide” (which may be named something else, is being designed to recognize advanced and specialized skills routinely needed by nurse aides working in nursing homes. This new job category is expected eventually to include core skills also applicable for nurse aides in assisted living and home care settings.

In addition, the North Carolina Long-Term Care Facilities Association recently identified an affordable group health insurance plan, originally developed for workers in a particular fast food chain. The Association plans to market the plan through its member facilities in the near future. It has three benefit coverage options; two include some prescription drug coverage, and all three include a $10,000 life insurance benefit. Coverage is guaranteed issue and premiums are available for individual and family coverage. Employers can make the coverage available to both full- and part-time workers. The policy is intended to help cover basic health care needs (e.g. doctor visits, lab/X-Ray, in-hospital daily benefit, surgery, anesthesia—each with a maximum per-incident, per-day and/or per-year payment limit). The monthly cost for an individual is $45.41 for the lowest coverage option and $115.61 per month for a family of three of more. While it may be viewed as a “bare bones” option, employees may feel it provides enough help with medical costs to be worth the affordable premium. The Association anticipates that most of its member employers will contribute toward the monthly premium for those employees who enroll. The North Carolina Assisted Living Association (NCALA) is also working to help make affordable insurance available to direct care workers; it is currently examining a group health insurance plan that includes four different coverage levels ranging from “bare bones” to a more comprehensive coverage. The NCALA also anticipates that most of its members will contribute toward the employee premium.
for coverage. These are certainly positive steps to address the issue of health insurance coverage for direct care workers. It is also important to note that a workforce survey sent to nursing facilities found that, of those responding, approximately 97% of nursing homes offer health insurance coverage that is at least partially paid by the employer. Responses to a workforce survey conducted by the UNC Institute on Aging also indicated that, of those responding, approximately 65% of home care agencies offered its employees health insurance coverage at least partially paid by the employer.

Conclusion

We cannot assume that the waning of our previously robust state economy will alleviate current shortages of direct care workers across the long-term care spectrum. Although some providers may be experiencing some lessening of the severity of the shortage due to the economic downturn, the data are clear: shortages of direct care workers have continued in North Carolina and across the nation irrespective of unemployment levels.

Demand for these workers is growing rapidly. The difficulty of meeting future demand is exacerbated by the fact that the population of persons who have traditionally filled these jobs is declining. In the absence of timely and successful action to strengthen recruitment and reduce turnover rates, we will not have the necessary numbers of direct care workers needed for long-term care, much less will we succeed in attracting—and keeping—the caring and dedicated workers that family members and society expect and deserve.

While not the only barriers, wages and benefits must be addressed. This is the responsibility of individual employers and state government, given the extent of public funding invested for long-term care services. Although direct care workers who stay in these jobs say it isn't the money that keeps them there, the lure of easier, safer work with better pay and benefits can be a constant and often successful enticement to leave. The job challenges are well known to those who have personal or professional interaction with the long-term care system. Unfortunately, often the general public does not realize or appreciate how difficult and demanding direct care jobs in long-term care can be until they themselves are thrust into a situation where these services are needed. We must do more to increase the visibility and importance of direct care workers. In North Carolina, hairdressers, manicurists, and file clerks are more highly valued in terms of direct care workers (e.g. expanding the scope of nursing practice).

Conclusion

Within and across licensed and unlicensed categories of long-term care, we need professional development opportunities and state-recognized career paths that can respond not only to the needs of direct care workers but also to those of employers and the healthcare delivery system. We must routinely evaluate the tasks and roles performed by both paraprofessional and professional long-term care workers in response to technological and medical advancements, and the impact of other workforce issues on health and long-term care workers (e.g. expanding the scope of nursing practice). We must also take steps to attract new populations of workers who have not traditionally considered employment as direct care workers. Success in this area hinges on the ability to remove the barriers that are already known to contribute to recruitment and turnover problems.

Individual long-term care employers, state-level long-term care provider associations, the NC Community College System, the NC Department of Public Instruction, NC Area Health Education Centers (AHECs), the NC Board of Nursing, the UNCG Institute on Aging, the NC Center for Nursing, the Aging Network, consumer advocacy organizations, nursing and other medical training institutions, and many other key stakeholder groups have stepped up to the plate to assess their roles and responsibilities in addressing the direct care workforce issues. The NC Department of Health and Human Services has also taken a leadership role in shaping public policy in this area. As stakeholders, all of these groups must be invested for the long haul and take responsibility both individually and collectively to meet current and future demands for a stable supply of trained direct care workers sufficient to meet our needs. Succeeding at this endeavor is essential to providing safe, reliable and quality care.

The crisis is already here and, in the absence of appropriate and effective action, shortages will only get worse. The NC Institute of Medicine’s Long-Term Care Task Force Report, published in March 2001, serves as the state’s
blueprint for public policy action on these long-term care workforce issues. The recommendations in that report recognize that solutions to these problems are intertwined with a variety of issues related to the professional long-term care workforce serving these same populations and facilities.

Notwithstanding the state’s budget crunch, these recommendations must remain among our highest priorities for action if we are to address the long-term care needs of North Carolina’s future population.

1 These are the three major occupational categories of direct care workers tracked by the US Bureau of Labor Statistics (BLS), Occupational and Wage data. (Note: BLS includes a 4th category of direct care workers—Psychiatric Aide—which is not included in the data presented. This occupational category included less than 60,000 workers nationally in 2000 and less than 2,500 in North Carolina.)

2 Long-term care expenditures include state-administered public funding for nursing homes care, intermediate care for the mentally retarded (ICF-MR), Community Alternatives Programs; Home Health Aides, In-Home Aide services including Medicaid-funded Personal Care Services, and Personal Care Services provided in adult care homes. Total state budget for SFY1999-2000 was $24.3 billion (Office of State Budget and Management Publication. Post Legislative Budget Summary, 1999-2001).


4 U.S. Bureau of Labor Statistics, 2000 National Occupational Employment and Wage Estimates. Job categories included in the 2.2 million count include Nurse Aides, Orderlies and Attendants, Home Health Aides, and Personal and Home Care Aides—does not include self-employed workers in this count. (Note: an occupational category exists for Psychiatric Aides; this category is not included in the direct care worker counts referenced in this paper, as it represents less than 3% of direct care workers.)

5 Scanlon WJ. Nursing workforce: recruitment and retention of nurses and nurse aides is a growing concern. Testimony before Committee on Health, Education, Labor, and Pensions, US Senate. May 17, 2001, p. 3. (GAO-01-750T) (Nurse Aides in hospitals: 388,280, or approximately 18% of total aide workforce of 2.2 million in 1999)

6 All references to the Nurse Aide Registry reflect persons registered as Nurse Aide I’s. (Note: The NC Board of Nursing maintains the state’s Nurse Aide II Registry. All Nurse Aide II’s must also be listed as Nurse Aide I’s.)


8 Scanlon WJ. Op cit, p.9.


11 Occupational categories included in the calculation: Nurse Aides, Orderlies and Attendants; Home Health Aides; and Personal and Home Care Aides (counts include self-employed workers).


14 Based on State Occupational Projections, 1998-2008, as published by US Bureau of Labor. Total is calculated as sum of additional workers projected for each of the three occupational categories included.


16 Based on Table of State 60+ populations, April 2000, prepared by US Administration on Aging.


18 Scanlon WJ. Op cit, p 23.


21 Annualized wage assumes full-time employment of 2080 hours.

22 US Bureau of Labor Statistics. 2000 National Occupations Employment and Wage Estimates. Wages reflected are an average of the median hourly wage rates for the following three occupational job categories: Nurse Aides, Orderlies and Attendants; Home Health Aides; Personal and Home Care Aides.

23 Premium data based on September 2002 rates as published by the insurance carrier.

24 Based on survey data collected from two sources: UNC Institute on Aging’s workforce survey of nursing homes in 2000-2001 and survey data collected in 2001 from a sample of nursing homes affiliated with the NC Health Care Facilities Association. Reported percentages related to issue of health insurance coverage were practically identical between the two surveys.

25 UNC Institute on Aging survey conducted in 2000-2001 of licensed home health and home care agencies.