Allied Health Workforce Policy Board

Annual Legislative Report

January 2010
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Betsey Smith, Quinnipiac University/CT Conference of Independent Colleges
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The Honorable Roberta Willis, State Representative

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Dr. Alice Pritchard, Executive Director of the Connecticut Women’s Education and Legal Fund serves as an advisor to the Board and is responsible for the production of this report. For more information on the Board’s activities, contact Dr. Pritchard at 860-247-6090 or apritchard@cwealf.org.
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Introduction

The Connecticut Allied Health Workforce Policy Board was established in Public Act 04-220 (An Act Concerning Allied Health Workforce Needs) to conduct research and planning activities related to the allied health workforce. PA 04-220 stated that “allied health workforce” and “allied health professionals” means professionals or paraprofessionals who are qualified by special training, education, skills and experience in providing health care, treatment and diagnostic services, under the supervision of or in collaboration with a licensed practitioner, and includes but is not limited to, physician assistants, registered nurses, licensed practical nurses, certified nursing assistants, home health aides, radiological technologists and technicians, medical therapists and other qualified technologists and technicians.

According to the legislation, the responsibilities of this board include:

1. Monitoring data and trends in the allied health workforce including but not limited to:
   a. The state’s current and future supply and demand for allied health professionals; and,
   b. The current and future capacity of the state system of higher education to educate and train students pursuing allied health professions.
2. Developing recommendations for the formation and promotion of an economic cluster for allied health professions.
3. Identifying recruitment and retention strategies for public and independent institutions of higher education with allied health programs.
4. Developing recommendations for promoting diversity in the allied health workforce including but not limited to racial, ethnic and gender diversity and for enhancing the attractiveness of allied health professions.
5. Developing recommendations regarding financial and other assistance to students enrolled in or considering enrolling in allied health programs offered at public or independent institutions of higher education.
6. Identifying recruitment and retention strategies for allied health employers.
7. Developing recommendations about recruiting and utilizing retired nursing faculty members to teach or train students to become licensed practical nurses or registered nurses.
8. Examining nursing programs at public and independent institutions of higher education and developing recommendations about the possibility of streamlining the curricula offered in such programs to facilitate timely program completion.

The Board began meeting in March 2005 and issued its first report to the legislature in February 2006, followed by reports in 2007, 2008 and 2009. Throughout its tenure, the Board has met regularly to discuss current initiatives in allied health in the state, gaps in workforce data, issues related to educational programming, and recruitment and retention of the workforce, as well as researching and developing solutions to allied health workforce shortages. This report provides a review of current labor market shortage areas, an overview of public and private initiatives to address these shortages as well as recommendations for legislative consideration.
Data and Trends in Allied Health Workforce

CT Department of Labor Data

Data from the Connecticut Department of Labor (CT DOL) indicates that the total estimate of employment levels for health-related occupations, including doctors and dentists, for 2006 was 147,230, while the employment level for 2016 is expected to be 170,900, which is a 16.1% increase for the ten-year period. The allied health occupation with the highest employment level is registered nurses (RNs) with 32,840 jobs in 2006, and a projected 38,560 jobs for 2016 (17.4% increase). The CT DOL projects that the state will need to average 1,114 new registered nurses each year through 2016 to fill expected job openings.

Increases expected in jobs from 2006 - 2016

<table>
<thead>
<tr>
<th>Occupation</th>
<th>Increase (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Medical Assistants</td>
<td>30.7%</td>
</tr>
<tr>
<td>Pharmacy Technicians</td>
<td>28.7%</td>
</tr>
<tr>
<td>Cardiovascular Technologists and Technicians</td>
<td>25.4%</td>
</tr>
<tr>
<td>Home Health Aides</td>
<td>25.4%</td>
</tr>
<tr>
<td>Physician Assistants</td>
<td>18.1%</td>
</tr>
<tr>
<td>Registered Nurses</td>
<td>17.4%</td>
</tr>
<tr>
<td>Surgical Technologists</td>
<td>17.3%</td>
</tr>
<tr>
<td>Licensed Practical Nurses</td>
<td>13.1%</td>
</tr>
<tr>
<td>Medical Records and Health Information Technicians</td>
<td>12.3%</td>
</tr>
<tr>
<td>Nurses’ Aides and Orderlies</td>
<td>11.9%</td>
</tr>
</tbody>
</table>

Licensed Practical Nurses (LPN) had 8,020 jobs in 2006 and are expected to increase by 13.1% to 9,070 in 2016. Nurse aides, orderlies and attendants had 24,660 jobs in 2006, and a projected number of 27,590 for 2016 (11.9% increase). Medical assistants with 4,990 jobs in 2006 are expected to increase to 6,520 by 2016, which is a 30.7% increase over the ten-year period. Other occupations show significant projected increases in employment during the period from 2006-2016: cardiovascular technologists and technicians 25.4%; pharmacy technicians 28.7%; physician assistants 18.1%; home health aides 25.4%; surgical technologists 17.3%; and medical records/health information technicians 12.3%.

Shortages in these occupations are not unique to Connecticut. According to the Health Resources and Service Administration (HRSA), the adequacy of nurse supply varies geographically throughout the nation, with a general consensus that at the national level currently a moderate shortage of registered nurses (RN) exists. The findings of their analysis suggests that the current RN shortage will continue to grow in severity during the next 20 years if current trends prevail and that some states face a more severe shortage than do others. The growth and aging of the population, along with the nation’s continued demand for the highest quality of care, will create a surging demand for the services of RNs over the coming two decades.

Vacancy rate information from the CT Hospital Association (CHA) and 27 of their hospitals shows continued shortages for registered nurses, unlicensed assistive personnel, radiologic technologists, nuclear medicine technologists, respiratory therapists, pharmacists, physical therapists, medical records coders and surgical technologists. However, these occupations are all
experiencing lower vacancy rates than at any point over the last 10 years. CHA contends that it is important to note that the current recession has driven vacancy rates downward due to delayed retirements, increases in part-time employee hours, and employees returning to work due to job loss of a spouse. Buerhaus, Auerbach, and Stagier articulate this effect with regard to the nursing shortage in Health Affairs 28, no. 4 (2009) warning policy makers of the need to continue to address longer-term indicators. Though the 3.4% vacancy rate for RNs appears low, it represents 373 open positions at 27 CT hospitals. Furthermore, this persistent shortage exists despite the production of approximately 1,100 nurses by CT’s institutions of higher education in response to projections of labor market need.

New Grant Activities, Reports and Legislation

**CT Workforce Investment Strategies of Healthcare (WISH) Initiative**

In October 2009, the Office for Workforce Competitiveness (OWC) on behalf of state and local partners, submitted a request for $4,997,851 to the United States Department of Labor for ARRA Health Sector funding to address many of the workforce shortages noted by the CT Department of Labor. The WISH Initiative design incorporates strategies and recommendations from the Allied Health Workforce Policy Board. The Initiative would reach nearly 9,000 participants of whom approximately 5,500 will engage in education and training activities; 4,474 will complete education/training; 3,500 will receive a degree/certificate; and 2,500 will enter unsubsidized employment. WISH serves as a national model for service delivery innovation and integration because of: a) unprecedented levels of partnership across diverse stakeholders; b) the level of service system coordination between work and school settings; c) the deliberate design to systematically replicate and expand best practices and model training/education programs; d) the purposeful approach to accelerate and retain participants in the health care talent pipeline; and e) the management model reinforces statewide and regional coordination to create maximum impact from finite resources. A decision on the grant application is expected in early 2010.

**Alignment of Postsecondary Education and Employment**

A December 2009 report by the Legislative Program Review & Investigations Committee of the CT General Assembly outlines the findings and recommendations of their study to determine whether a formal alignment mechanism exists in CT to match the production of skilled graduates from the state’s higher education institutions with current and projected workforce needs of the state’s employers. The briefing report found an overall lack of alignment of postsecondary education and employment for a majority of occupations examined. However, the study found that some occupations appeared to be particularly aligned, such as registered nurses. In particular, the report noted the work of the Allied Health Workforce Policy Board and suggested its structure could be used as a model for other targeted shortage areas. The advantages of the model include:

- Making decisions collaboratively;
- Acting as a clearinghouse for individual pilot or creative projects being implemented by colleges, universities and other organizations;
- Allowing for creativity at the local/regional level, with ideas shared and dispersed; and,
- Having the ability to propose legislative and non-legislative solutions as one voice.

The AHWPB was encouraged by this recognition and will continue to play this important facilitating role.

**An Act Concerning the Establishment of the SustiNet Plan (PA 09-148)**

This legislative session a bill was introduced and ultimately became law which creates a framework for health care reform. The implementation of these reforms would have an impact on the number and types of health care professionals needed in Connecticut. The SustiNet Board was established as well as subcommittees and task forces on Information Technology, Medical Homes, Health Care Workforce, and Prevention. The Board must submit draft language for an implementation bill by January 1, 2011. The Allied Health Workforce Policy Board has been invited to share their reports and activities with the Workforce Taskforce and will continue to attend meetings to offer assistance and guidance based on the years of experience of our members.
New Occupational Area Explored in 2009

During the course of the past year, the Allied Health Workforce Policy Board conducted a review of the recruitment, retention, training, and education of individuals who provide mental health and addiction services. While the behavioral health field is not explicitly listed as an allied health area in Connecticut legislation, a large proportion of this workforce can be considered part of allied health as it is typically defined. Therefore, the Board felt it was important to include this profession in the exploration of the overall health care needs of Connecticut’s residents.

The Overview:

A basic definition for the behavioral health field includes the diagnosis and treatment of mental health and/or substance use disorders or the diagnosis, treatment, rehabilitation, and recovery of persons with mental and substance use conditions. There are numerous occupations which are included under the behavioral health field. Examples of occupations include but are not limited to:

- Substance Abuse and Behavioral Disorder Counselors
- Educational, Vocational, and School Counselors
- Marriage and Family Therapists
- Mental Health Counselors
- Rehabilitation Counselors
- Counselors, All Other
- Child, Family, and School Social Workers
- Medical and Public Health Social Workers
- Mental Health and Substance Abuse Social Workers
- Social Workers, All Other
- Registered Nurses
- Recreational Therapists
- Respiratory Therapists
- Probation Officer & Correctional Treatment Specialists
- Psychiatric Technicians
- Psychologists
- Psychiatrists
- Licensed Practical and Licensed Vocational Nurses
- Psychiatric Aides

In general, occupations in behavioral health fields are expected to grow. Turnover and vacancy rates are high for several positions within behavioral health, particularly in the private, non-profit sector. The following are broad examples of occupations and the anticipated growth rate according to the Bureau of Labor Statistics. Each behavioral health occupation below is expecting faster growth than the average for all occupations which is 10 percent.

Employment of substance abuse and behavioral disorder counselors is expected to grow by 21 percent. As society becomes more knowledgeable about addiction, more people are seeking treatment. Furthermore, drug offenders are increasingly being sent to treatment programs rather than to jail.

Employment for educational, vocational, and school counselors is expected to grow by 14 percent. Demand for vocational or career counselors should grow as multiple job and career
changes become common and as workers become increasingly aware of counseling services. States require elementary schools to employ counselors. Expansion of the responsibilities of school counselors also is likely to lead to increases in their employment. For example, counselors are becoming more involved in crisis and preventive counseling, helping students deal with issues ranging from drug and alcohol abuse to death and suicide.

Employment of mental health counselors is expected to grow by 24 percent. Under managed care systems, insurance companies increasingly are providing for reimbursement of counselors as a less costly alternative to psychiatrists and psychologists. In addition, there has been increased demand for mental health services as individuals become more willing to seek help.

Jobs for rehabilitation counselors are expected to grow by 19 percent. The number of people who will need rehabilitation counseling will increase as the size of the elderly population, whose members become injured or disabled at a higher rate than other age groups, increases and as treatment for mental health related disabilities increases over time.

Marriage and family therapists will experience growth of 14 percent, which is faster than the average for all occupations, in part because of an increased recognition of the field. It is becoming more common for people to seek help for their marital and family problems than it was in the past.

**The Workforce**

Employment opportunities are numerous for individuals with behavioral health training. As previously stated, people working in the behavioral health field can be employed in diverse settings: state agencies, hospitals, nonprofit social service agencies, etc.

Contracted agencies employ many more mental health professionals than the state agencies do. The field experiences high turn over and there is a significant amount of training needed. The field is experiencing workforce shortages of masters-prepared individuals as well as those that are bi-cultural/bi lingual. These staff need to know not just multiple languages, but how to better serve the population with effective strategies and address co-occurring (mental health & addiction) issues.

The state employs over 5,000 behavioral health workers in the Departments of Children and Families and Mental Health and Addiction Services. Workers can also be found at the Department of Corrections. Currently the state is facing high retirement rates among its most senior staff which leaves questions as whether replacements will be allowed due to the state budget crisis.

Salary ranges are from as low as $17,000 (human service assistants) to as high as $90,000 for a Master’s prepared Registered Nurse. Someone with a bachelor’s degree can be employed in various technician, assistant or aide roles, particularly in inpatient and residential settings. In outpatient services, it is more difficult for bachelors-prepared individuals to obtain reimbursement, so more Master’s level professionals are hired in these settings and have more employment opportunities.
Snapshot of Behavioral Health-related Programs in Connecticut

Community College System

Human Services Degree

All twelve Community Colleges have Human Services programs which graduate students who work in the behavioral health field. The Human Services program is designed to provide education and training for individuals seeking employment in various social service and educational settings. The program is also designed to provide a basis for those who choose to continue their education at other colleges.

The program offers an opportunity to acquire knowledge and skills which will enable individuals to work in a variety of areas. There are specialization courses from which students may select, depending on their areas of interest.

Opportunities in human services are available in social service agencies, community action programs, day care centers, and educational settings, and offer work with a range of individuals from children and the elderly to individuals with emotional or physical problems.

For example, Housatonic Community College’s (HCC) Human Service’s program is designed to prepare qualified students for a wide variety of community counseling-related employment positions in the urban-suburban region of Greater Bridgeport. Career positions are found in such fields as counseling, mental health, social services, substance abuse, community outreach, and gerontology. Instruction is cross-disciplinary and is designed for maximum transferability for those wishing to continue their studies.

HCC offers a generalist program and students are required to take two field experiences completing 180 hours of an unpaid internship. HCC has a maximum of 15 students in each internship section. They have one full-time coordinator and one full-time faculty member and one part time person for 150 students.

The program provides student support and counseling services to a diverse population of students. The average age of students has decreased over the last few years from 36 to 30 years of age. The majority of students are African American or Latina women. Most students require developmental education courses before they can attempt credit level classes. It has been noted that these students bring a strong sense of community to the college and the program as well. Employers have consistently supported the Human Services program over the years. In fact, 88% of local human services agencies surveyed indicted that they had employed graduates from the HCC Human Services program.

The HCC Human Services program has developed strong relationships in the region. There is an Advisory Committee representative of the local community which collaborates with the college to provide strategic guidance for the program. HCC also mails information to agencies to inform them about the program, holds a luncheon to honor field supervisors, and conducts a number of other varied activities to ensure the community is well aware of the offerings at the college.

HCC has articulation agreements with most of the private colleges and the CT State University System with nearly 100% of their credits transferable from the Human Services program. Career placements are made in and out of state, and the local human service agencies assist the college in this effort.
Drug and Alcohol Recovery Counselor (DARC) Program

DARC programs are offered at four CT Community Colleges (Gateway, Manchester, Naugatuck Valley, Tunxis). This is an Associate Degree which educates and trains individuals who seek State of Connecticut certification, employment, job advancement, and increased effectiveness in the field of addiction counseling.

For example, Manchester Community College’s (MCC) DARC program mission is to prepare students to enter the field of alcohol and drug recovery counseling. The program provides students with a strong general education and a solid foundation in counseling theories and techniques, processes and content. Adhering to the code of ethics and gaining a multicultural perspective and critical thinking skills, students learn how to provide care and treatment to those suffering from substance use disorders.

MCC is contributing to nationwide efforts to professionalize the field and wants students to get advanced degrees after obtaining their DARC degrees. The training includes a combination of learning in classrooms and internships. There is an unpaid internship component, requiring students to perform 15 hours a week for two semesters for 6 credits. While this is a generalist degree, there is a significant amount of material covered with students which could be extended into a four year program.

The graduation rate is 93%. Of the students, 68% are women (which is higher than the overall student body which is 54% women) and 34% are minority students. DARC students are mostly part-timers (28% are full-time). Thirty-six percent (36%) of DARC students are 40 years old or older. This is higher than the general MCC student body population (only 11% are 40 years or older). Students are encouraged to take a language (e.g., Spanish). They are recruited via word of mouth and the demand is greater than MCC can handle. They have a 100% pass rate for the certification test which is taken after the completion of training.

Faculty are required to have a master’s degree or higher, and be certified and/or licensed as an addiction counselor so that they can teach to/explain the process. Currently MCC is not looking for additional faculty as they actually have a waiting list of potential faculty which is unusual given the challenges in finding faculty for nursing programs.

Connecticut State University System (CSU System) degree programs

Between the four Universities (Central, Eastern, Southern, and Western) they offer 3 certificate programs, 10 undergraduate and 12 graduate programs related to behavioral health. From 2004 – 2008, across the CSU system (approximately) 230 undergraduate degrees and 73 graduate degrees were awarded.
The chart below indicates the certificates and degree programs available at the four Universities. *(Professions not addressed in this summary of CSU: Nursing, Public Health, Occupational Therapy (no programs), Physical Therapy (no programs)).*

<table>
<thead>
<tr>
<th>Certificate/Degree Programs</th>
<th>CCSU</th>
<th>ECSU</th>
<th>SCSU</th>
<th>WCSU</th>
</tr>
</thead>
<tbody>
<tr>
<td>Certificate in Counseling</td>
<td></td>
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<td></td>
</tr>
<tr>
<td>Certified Alcohol &amp; Drug Counselor</td>
<td></td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td>BA in Psychology</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>BA in Social Work</td>
<td></td>
<td>X</td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>BA in Communication Disorders</td>
<td></td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td>BS in Recreation &amp; Leisure Studies with emphasis on Therapeutic Recreation</td>
<td></td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td>MS in Recreation &amp; Leisure Studies with emphasis on Therapeutic Recreation</td>
<td></td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td>MS in Communication Disorders</td>
<td></td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td>MS in Prof. &amp; Rehab Counseling</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>MS in School Counseling</td>
<td>X</td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td>MS in Marriage &amp; Family Counseling</td>
<td></td>
<td>X</td>
<td></td>
<td></td>
</tr>
<tr>
<td>MA in Psychology</td>
<td>X</td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td>MS in Clinical Mental Health Counseling</td>
<td></td>
<td></td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>MS in Social Work</td>
<td></td>
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<td>X</td>
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</tbody>
</table>

**Connecticut Conference of Independent Colleges**

The Independent Colleges also have students with bachelors and advanced degrees in the behavioral health fields. For example, St. Vincent’s College’s has a behavioral health focus as one aspect of its nursing program. The program is in general studies and they are required to participate in a behavioral health clinical experience. They operate a didactic component in the classroom setting which covers the complete life cycle from infants to the elderly. Students learn about the various disorders related to psychosocial dysfunctions, substance use disorders, bipolar...
disorder, anxiety disorders, personality disorders, psychiatric emergencies, eating disorders, schizophrenia, depression and abuse and neglect.

St. Vincent’s has the clinical facilities at their sister hospital to teach students how to apply the nursing process to the care of their clients. They learn to incorporate the psychopathology of the disease process into their plan of care. Many students will also opt to take a course in Abnormal Psychology as an elective requirement which greatly enhances their understanding of the field. The students have the opportunity to observe and interact with clients from infancy through advanced age. Their program graduates 70 – 75% of the students and almost 100% of graduates stay in Connecticut. They have more applicants than faculty to teach them.

**Challenges to Building the Behavioral Health Workforce**

The presenters raised a number of challenges related to the behavioral health workforce pipeline including:

- Attracting people into professions considered to be low-paying.
- Internship or Field Placement sites: there are a limited number of internship sites, multiple universities access the same sites, and students drop out because of conflicting schedules and/or priorities.
- Faculty shortages: in several of the professions the number of people with terminal degrees graduating each year is less than the number of available faculty positions.
- Variation in licensure and credentialing requirements: most programs are accredited by separate bodies that often have specific faculty requirements or student to faculty ratios. States set their own standards for certification and then professional associations also have their own standards.
- Workforce shortages: there is a need for more workers with master’s degrees and licensure, particularly in social work and marriage and family therapy.
- Need more workers with cultural diversity and bi-lingual capacity to serve diverse populations effectively.
- Workers need improved skills for serving persons with co-occurring conditions (mental health & addiction).
- Need a workforce capable of providing early childhood services.
- Better preparation and ongoing education is needed for paraprofessionals.
- Judicial/probation officers – as the state moves away from institutionalization, probation officers need training on behavioral health issues.
- Need greater coordination as well as regional collaborations on behavioral health workforce development involving higher education, state agencies and private providers including sharing data on the current workforce, vacancies and turnover.
New Initiative:

The Connecticut Workforce Collaborative on Behavioral Health (the Collaborative) was established under the Connecticut Mental Health Transformation State Incentive Grant to develop and implement coordinated statewide planning and action to recruit, train, support, and retain members of this workforce. Their mission is to ensure that Connecticut residents who are experiencing mental health and substance use problems have access to well-prepared individuals who can offer effective and compassionate care. Workforce development efforts have historically been fragmented, and the Collaborative is working to link current efforts and better leverage existing resources. There are fourteen state agencies and the judicial branch participating in this mental health transformation effort.

With grant support, the Collaborative is embarking on a project to gather information on existing behavioral health career pathways, both mental health and addictions, with service populations including children, youth and adults. They will identify at least six other models of career pathways from other fields to inform planning for this project. The pathways information on behavioral health in Connecticut will include, though not be limited to, the following elements: educational programs in institutions of higher education; certificates and degrees awarded by those programs; external (non-educational institution-based) certificates; certifications and licenses available to those with the requisite training and experience; and data on the volume of individuals who are traversing these pathways. By July 31, 2010 a full-report will be disseminated in Connecticut to a broad range of interested stakeholders.

The Collaborative has launched a host of other behavioral health workforce development initiatives, which include supervisor skill development, higher education curriculum reform, and employment of consumers in the behavioral health workforce.

During the course of this review by the Board, a series of strategies were identified that can further strengthen the workforce in behavioral health within Connecticut. These include: (a) conducting a comprehensive study of turnover and vacancy rates in this sector, creating greater specificity regarding the nature and scope of the recruitment and retention problems; (b) collaboration among representatives of selected state agencies and community provider organizations in developing a basic data set for tracking turnover and vacancy rates in behavioral health; (c) meetings of the Workforce Investment Boards with representatives of the behavioral health field to explore strategies for greater collaboration; and (d) an effort by the state agencies involved in the Collaborative to search for strategies to maintain a statewide workforce development infrastructure for mental health and addictions when federal funding ends in September of 2010.
**Current Initiatives to Address Workforce Shortages & Pipeline**

The AHWPB plays a critical role in convening stakeholders who are conducting a variety of initiatives to address workforce shortages. These initiatives have been implemented through federal grants and resources in addition to state and private foundation funding. In order to inventory those activities and promote greater coordination and collaboration, the AHWPB conducted meetings throughout the year to gather information from Workforce Investment Boards, institutions of higher education, high schools, professional associations and state agencies. This section of the report shares a sample of health care workforce initiatives taking place across the state.

**State Agencies**

*Connecticut has a number of state agencies that work independently and collaboratively to promote health care careers. Their focus is on supporting the infrastructure necessary to provide education, training and licensure in health care professions.*

**Department of Higher Education**

The Department of Higher Education continues to encourage pathway programs and transfer and articulation in allied health fields in response to specific workforce needs. Those efforts include the expanded transfer and articulation model for nurse educational mobility, which provides clearer and better pathways for skill development and professional advancement for all nursing students, beginning with certified nursing assistants (CNAs) and licensed practical nurses (LPNs), moving to associate (ADN) and bachelors degree (BSN) nursing programs, and culminating in masters (MSN) and Ph.D. preparation. Also of note is the Department’s work with the Connecticut Community College System, the Connecticut State University System, and the University of Connecticut in the development of transfer and articulation agreements, including guaranteed admission agreements in the health sciences and health-related fields.

The Department of Higher Education worked with the public and independent colleges and universities last year on the review and approval of 18 new degree and certificate programs in the health sciences: 1 certificate program, 2 associate degree programs, 3 baccalaureate degree programs, 7 master's degree programs, 3 doctoral programs and 2 graduate certificates. That is a decrease in new programs (by 13) in the health-related fields over the preceding year.

The state legislature allocated resources to the Department of Higher Education in the last biennial budget to support investments in allied health, nursing and education programs in the state’s colleges and universities. The resources were combined in a unified *Higher Education Health and Education Initiative* Request for Proposals with those allocated to the Department of Public Health and career ladder resources at the Office for Workforce Competitiveness to promote programs that alleviate workforce shortages in these areas. The CT Women’s Education and Legal Fund monitored the first two rounds of 24 grants and provided technical assistance and guidance during project implementation. Both rounds of grants were awarded for youth and
adult programming which expands the pipeline of interested and qualified students in nursing, allied health and education.

**Department of Public Health**

The Department of Public Health has several ongoing programs funded through state and federal allocations that support nursing and allied health professions. The funding and programs include:

- $375,000 was allocated in each year of the two years of the biennial budget to support nursing and allied health workforces including: faculty scholarship programs, recruitment initiatives, student loans, and support for the AHWPB. These funds are included in the *Higher Education Health and Education Initiative*. No funding is allocated for FY 2010.

- $1.2 million was allocated to develop an online licensing renewal system for physicians, nurses, and dentists. This system was implemented on July 15, 2009. By leveraging the available funding and working closely with the Department of Consumer Protection toward reducing redundancies and gaining efficiencies in the licensing process across agencies, DPH is prepared to implement on-line licensing for all licensed health care, environmental health and emergency medical services professionals, and collect valuable workforce data that is currently unavailable but critical in identifying and addressing healthcare workforce shortage issues, over the next several months.

- $240,000 federal grant matched by $118,747 state funds for the Connecticut State Loan Repayment Program focusing on health professional shortages that cause disparities in access to health care effective until the end of FY09 (6/30/09). However, state matching funds are no longer available to access the federal award for FY 2010.

- $60,000 in federal grant monies allocated to the Emergency Medical Services - Children program (EMSC) to fund Pediatric Education for Prehospital Professionals including courses and a statewide conference. $3,500 was received from a separate federal grant through the Heart Disease and Stroke section to procure a slide set to support the education and training of Specialty Care Transport Paramedics.

**CTCareerLadder Initiative**

Public Act 03-142, An Act Concerning Career Ladder Programs was enacted in June 2003 establishing a Connecticut Career Ladder Advisory Committee (CCLAC). OWC continues its facilitation and management of the pilot Career Ladder activities. Over the past five years, the Career Ladder Advisory Committee has provided approximately $1.5 million to pilot projects designed to address obstacles to creating/pursuing career ladders in the health care field. Projects have focused on the transition to college for entry level health care worker by improving their academic competencies and personal skills, developing career pathways, expanding career awareness, better preparing current and future nurses for their roles in hospitals and improving workplace cultures to support recruitment and retention of health care workers.
**High School Initiatives**

*High school programs are focused on preparing young people for careers in allied health and nursing. They provide the foundation courses in English, math and science necessary to pursue higher education as well as offering exposure to health careers.*

**Connecticut Technical High School System**

The CT Technical High School System offers a Health Tech career track for high school students as well as an array of health care training programs for adults. Currently there are six high schools offering the Health Tech program with 316 students enrolled. The system’s adult programs (dental assistant, licensed practical nurse, medical assistant, nursing assistant and surgical technology) have enrolled 490 adult students for the 2009 training cycle.

In collaboration with Charter Oak State College, the CT Technical High School System undertook a process to strengthen their LPN program to ensure student success and create clear pathways to advanced health care professions. The revised entrance requirements (English and intermediate algebra at the college level) and the enhanced curriculum is being implemented with the present class that will graduate in January 2010. Data will be consistently collected beginning with the class of 2010 to determine the impact of these changes on student attrition. These significant changes in the LPN program will allow graduates to obtain 16 college credits in general course work and after completing an on-line bridge course they will also obtain credit for the first year of the nursing courses. Data will also be collected to determine the number of graduates of the LPN program who pursue an associate’s degree. There will be 375 graduates in January 2010. The two evening programs will complete the LPN program in June at Vinal Technical High School and December at Abbott Technical High School.

Due to state financial constraints, operations at J.M. Wright Technical High School in Stamford are suspended. LPN students enrolled in the program are completing the program at Bullard-Havens Technical School in Bridgeport.

Governor Rell’s mitigation plan announced on November 24, 2009, included suspension of all LPN programs at the Connecticut Technical High Schools denying the next class of approximately 400 students’ entrance into the program. This decision closes the only publicly funded LPN programs in the state and will directly impact employers’ ability to hire trained professionals. In addition, this closure diminishes the work that has been done to provide a career pathway from LPN to RN through the state’s public universities.

**Connecticut Comprehensive High Schools**

The State Department of Education has three student readiness programs which operate in comprehensive high schools throughout the state: *Developing Tomorrow’s Professionals* and *Medical Careers Education* which provide academic instruction, workplace learning, and mentoring opportunities to prepare students for health care careers and the *Project Lead the Way Biomedical Sciences Program* which will implement a national four year sequence of biomedical sciences courses to prepare students for post-secondary education and health care careers. Four
high schools currently run PLTW Biomedical Science courses. The four-year curriculum is in the final stages of development and will be piloted as well.

In addition, 23 school districts have nurse aide training programs with 414 students enrolled last year (2008-2009 school year). Three CNA programs are currently not running due to programmatic changes and retirements. In particular, these schools cannot find nurses who are certified to teach the programs to replace retirees. More schools are developing four-year programs of study for medical careers in therapeutic, biotech, and diagnostic areas with internships and articulations with community colleges. Perkins Innovative grants were awarded to two high schools that implemented biomedical career pathways. In the 09/10 school year, the Perkins Innovative grant will focus funds to prepare students for public health careers. Several urban districts are currently investigating the implementation of healthcare pathways/academies next year. Hartford Public High School is continuing to develop their Nursing Academy in collaboration with UConn School of Nursing.

CTCareerChoices Program

The CT Career Choices (CCC) Program, facilitated by the Office for Workforce Competitiveness (OWC) and Education Connection a Regional Education Service Center (RESC), is an initiative to engage high school students in technology-related career development through a project-based, problem solving curriculum that builds upon basic science, technology, engineering and math (STEM) courses and experiential learning activities. Based on national education standards, this curriculum is intended to provide strong foundational and technical skills to students interested in allied health careers.

An initial effort to include biomedical sciences in CCC was undertaken because of the concern about persistent workforce shortages in healthcare professions – particularly nursing and allied health – and the state’s focus on its pharmaceutical and biotechnology-related industries, which are one of a handful of targeted industry clusters for Connecticut economic development. A Bio21 course which focuses on biology in the context of biotechnology is being implemented in six schools this academic year. The Foundations of Health Science and Technology course is designed as an overview of health care occupations and the skills required for success in the health care industry. The course has been articulated for three credits with the community college system and currently is being piloted with 140 students in four high schools, with expansion to additional schools planned for 2010.
Colleges and Universities

Institutions of higher education are emphasizing improvements in the curriculum and delivery of allied health and nursing programs. They are working to promote student success through supports, career education and financial aid and scholarships.

Community College System

The Connecticut Community College System received two USDOL Community-Based Job Training grants featuring healthcare. The first three-year grant: "The Career Pathways Initiative in Nursing and Allied Health" was initially funded from November 2005 through October 30, 2008, and received a no-cost extension through December 31, 2009. The second three-year grant: "The Bridges to Health Careers Initiative" was initially funded from January 2007 through December 31, 2009, and has received a no-cost extension through April 30, 2010.

Both projects focus on targeted advising for health careers and include a joint initiative with the Workforce Investment Boards (WIBs) to provide a dedicated Health Career Advisor in each region. In addition to the Health Career Advisor positions, the CT Community Colleges have implemented the Health Career Pathways Certificate Program, career and advising tools, and a health education and career website as sustainable activities after the grant funding has ended. The website was recently updated and re-launched as the virtual Health Career Academy, including a number of new career exploration links, pathways for high school students and links for faculty and staff. Colleges have also identified a number of strategies that focus on student success and retention, such as targeted summer orientation programs prior to the start of the associate degree health programs. A number of distance learning courses have been developed and others will be developed before the grants end.

Funding from the USDOL for the Community-Based Job Training grants has allowed the CT Community Colleges to utilize numerous strategies to enhance student success in nursing and allied health programs including career decision-making, academic preparation and program retention. Successful strategies have included: health career orientation workshops; health career assessments; targeted advising for health careers; tutoring; financial aid counseling; and workshops designed to improve study-skills, time and stress-management. Curriculum development provided by grant funding resulted in the new "Investigations in Health Careers" course as part of the Health Career Pathways Certificate Program available system-wide in which 1,191 students are currently enrolled. Gateway Community College’s High School Articulations Coordinator has reviewed the “Investigations in Health Careers” course with eleven area high schools. Grant funding also supported an on-line interactive “Health and Safety Training Course” (the former Clinical Orientation Guide) which was developed in partnership with the Connecticut Hospital Association.

Colleges have noted significant improvements in student retention and success due to the strategies that they have been able to utilize with funding from the federal grants. Naugatuck Valley reports 79% overall retention in the Nursing program. In the first year of the grant, the Radiology Technology students achieved a 100% pass rate on the licensure exam. Faculty attributed this to the availability of the lab resource instructor. Naugatuck Valley Community College also reported a 23% increase in the retention of first year Physical Therapy Assistant
students as well as an increase in the graduation rate. Their Respiratory Care program retention rate has increased by 13% as a result of targeted support services, and they have also reported the largest graduating classes for the past two years since inception of the program. Norwalk Community College’s Medical Assisting program reported a 17% in retention after implementing structured study groups.

Targeted retention programs for ESL nursing students, along with the new admission standards, have increased retention in the Nursing program by 20%. For the fall 2009 semester Gateway Community College reported increased retention rates across all allied health programs from the class of 2010 to the class of 2011, as follows: Diagnostic Medical Sonography increased from 75% to 100%, Dietetic Technology from 85% to 95%, Nuclear Medical Technology from 40% to 80%, Radiation Therapy from 50% to 92% and Radiography from 92% to 100%. Manchester Community College noted a significant increase in the number and quality of applicants in all allied health programs since the inception of the Allied Health Advisor position. Three Rivers Community College, in hiring BSN nurses in Master’s programs to serve as embedded tutors for the Nursing program noted not only an increase in student success, but were able to hire the tutors as Nursing faculty.

The Health Career Advisors have advised over 2,000 students since the inception of the USDOL Allied Health Grants, identifying both short and long-term healthcare career plans and pathways to meet student goals. The large majority of advising has been supported by grant funds. The goal of increasing the number of graduates in the targeted nursing and allied health degree programs by 18% has been exceeded.

The successful outcomes of these strategies have resulted in more interested, better prepared, better informed students who will help to meet the critical workforce needs in allied health and nursing. Connecticut Department of Labor records indicate that earnings for students in the targeted degree programs (Nursing, Respiratory Care, Physical Therapy Assistant, Radiologic Technician and Medical Assistant) increased from $23,626 in 2005 to $57,740 in 2008 – a 144% increase. Other notable efforts include capacity building activities for over 21,000 individuals—including students, faculty, counselors and others.

The Bridges to Health Careers Initiative has awarded 1,171 scholarships to date for students participating in noncredit, targeted certificate programs. Eighty-three percent (83%) of scholarship recipients were female. Ethnic diversity of scholarship recipients to date has been as follows: 15% Hispanic/Latino, 4% Asian, 30% Black or African American, 39% White and 12% other.

Core competencies have been identified and validated by employers for the Certified Nurse Aide programs, and will be established for five additional healthcare certificate programs by April, 2010. Students have been provided a variety of services to increase academic success. A site license has been purchased for all twelve colleges to participate in a two-year pilot with Key Train to provide pre-developmental remediation for noncredit students. Funding has been provided to colleges for simulation mannequins, software, and tutoring to help noncredit students succeed in their programs. After incorporating EMT Achieve software in their program, Manchester Community College reported a 52% increase in EMT completion rates and Gateway Community College reported similar gains. A contract with the Eastern Area Heath Education Center (AHEC) resulted in the development of an Allied Health Professional Network that serves as an informal peer support and mentoring portal for new healthcare professionals. More
than 2,400 students and Workforce Investment Act (WIA) participants have received outreach information on legal and social service supports through the CT Women’s Education and Legal Fund.

Sustainable features of the Bridges to Health Careers Initiative will include the Virtual Health Career Academy—an online resource for students interested in pursuing a health career, distance learning modules in medical terminology and cultural competency, common core competencies defined for six targeted certificate programs, online professional development modules for adjunct healthcare faculty, and clinical simulations purchased through the grant. Additional funding is required to continue tutoring and scholarship support for noncredit health career students.

The United States Department of Labor has noted that Connecticut is the only state that has employed statewide solutions, incorporating all of the community colleges, workforce boards, and other public and private partners and are very pleased with this approach. The Health Career Advisors became such a valuable resource to the state’s workforce efforts that the Workforce Investment Boards (WIBs) requested and received American Recovery and Reinvestment Act (ARRA) funding to keep the Advisors in place after the grants ended. Thanks to these federal resources, the Health Career Advisors will continue to be employed through June 30, 2011. USDOL funding represents significant reinforcement for the Community College System’s student success initiatives and is part of the System's legislative agenda which calls for a substantial expansion of full-time faculty through the five-year faculty expansion plan and the parallel proposal to expand student support services.

The Community College System looks to future sustainability of a number of these programs through innovative practices supported by institutions and other partnerships. Some of the programs will become institutionalized such as the Health Career Pathways Certificate Program, on-line courses, and technology tools such as eTutoring and ePortfolio. Other student support services such as the Health Career Advisors and other work in tutoring and advising will need a mechanism in place for future funding beginning in 2010. It is important that the successful programs continue to remain in place to provide the greatest level of student support. The Community College System remains committed to addressing the healthcare workforce shortage in the state during the next several years.

The cost to maintain the currently funded level of college tutors and advisors is significant. The Community College System recognizes the strong impact of these support services on student success and retention and has requested higher levels of funding to support the increased student interest and success. However in a fiscal environment with a 10% increase in enrollment system-wide and a 10% budget shortfall, it is not possible to add these services. The Community College System and WIBs worked with the Allied Health Workforce Policy Board and other partners to submit the WISH proposal mentioned on page 4. The proposal for funding would continue the best practices in outreach, recruitment, education and training, retention and job placement to support the healthcare workforce needs in Connecticut. The CCCS will also continue to seek other grant opportunities in addition to the legislative budget to continue to fund these critical services.

The five Nursing programs within the Community College System are now in the second year of implementing a common approach to associate degree nursing education (ASN) and preparation for Registered Nurse licensure. Students in the second cohort of the program were admitted
beginning fall 2009. The courses in the third and fourth semesters of the four-semester program are being implemented during this academic year (2009-2010) at Capital, Gateway, Naugatuck Valley, Norwalk and Three Rivers Community Colleges, while the courses in the first and second semesters of the curriculum are now in their second year of offering. The five nursing programs continue to be accredited by the National League for Nursing Accrediting Commission (NLNAC); Gateway and Naugatuck Valley Community Colleges both enjoyed extremely successful site visits by the NLNAC during October 2009. The program, representing a system-wide approach to nursing admissions, curriculum and student policies, affords students throughout the state a standard admissions process for any one of the five colleges and an opportunity for seamless transfer between colleges. In an attempt to address workforce needs for graduates throughout the year, Gateway, Norwalk and Three Rivers Community Colleges have begun offering students the opportunity to begin their program in the spring or fall semester, while at the same time enjoying the ability to expand enrollment. The need to convert remaining grant-funded faculty positions to permanent funds continues. The recent downturn in the economy and the bleak forecast going forward makes these challenges more daunting than ever.

Creative approaches to faculty recruitment, development and retention have long been hallmarks of the Nursing programs in the system and will be vital in addressing the nursing faculty shortage. Nursing faculty across the system have expanded their fluency with online teaching and learning by enrolling in programs such as ITeach, to support the integration of additional online learning opportunities for students. A project grounded in partnership with the clinical education community, designed by the CT Community College Nursing Program (CT-CCNP) System Director of Curriculum Operations to assist faculty with the integration of high fidelity simulated teaching and learning into the curriculum, is targeted as a statewide approach for all nursing programs in Connecticut. In keeping with the goals for the advancement of nursing education established by the Connecticut League for Nursing Council of Deans and Directors in 2004, the CT-CCNP has signed a Memorandum of Understanding with the Connecticut Technical High School system and Charter Oak State College to strengthen the ability of Connecticut’s Licensed Practical Nurses to advance their level of education to that of a registered nurse. Faculty statewide came together over the past year to strengthen all aspects of the Connecticut League for Nursing (CLN) LPN to RN Articulation plan that acknowledges curriculum innovations in both the LPN and associate degree nursing programs throughout the state. Leadership of the CT-CCNP has met with each baccalaureate nursing program in the state to align the new curriculum for seamless articulation in support of educational advancement for graduates. As a result of these collaborations, individualized program templates will be created that maximize the transfer of nursing and general education credits beyond the basic recommendations of the CLN RN to BSN Articulation Plan. Some agreements have resulted in offerings of dual admissions for students currently enrolled in the CT-CCNP.

Efforts to market the Nursing program have increased over the past year. The CT-CCNP Nursing Admissions Specialist conducts a rigorous schedule of Nursing Information sessions at all twelve community colleges and attends college fairs through a variety of venues, including the CLN LPN Student Day. These efforts have resulted in an increased awareness of program changes related to admissions requirements and are hoped to attract additional qualified applicants.

The Community College System has also developed two accelerated learning pilot projects to offer intensive summer programs for developmental education students to improve skills
necessary for college-level allied health programs. This project was implemented in summer 2006 and summer 2007. In addition, the dual enrollment initiative, spearheaded by the System allows high school students to take credit courses in math, science and technology in their junior and senior year at the State’s community colleges. The Community College System also participates in the national Achieving the Dream effort to improve student success particularly for low income, minority and under-prepared students. Guaranteed admissions agreements have been signed with the State University System, the University of Connecticut and the Connecticut Technical High School (CTHS) System. The latest agreement calls for a specific translation of successful experiences in the CTHS Licensed Practical Nursing program to college credit in Biology and Psychology.

In addition to the statewide initiatives, individual community colleges are undertaking a variety of activities to increase allied health and nursing programming and improve student success in those programs. For example, in collaboration with Capital Workforce Partners (CWP), Asnuntuck, Capital, Manchester and Tunxis Community Colleges are participating in a long-term care initiative funded by the U.S. Department of Labor and the Robert Wood Johnson Foundation. These grants utilize a multi-level interagency partnership to advance the skills of front-line healthcare workers. The colleges developed curriculum for seven clinical specialty courses, and are responsible for integrating work-based learning activities into specialty courses; instruction at the long-term health care sites; developing and maintaining regular communication with the work-based mentors; and for awarding an industry-recognized CNA Work-Based Learning Clinical Specialty Certificate. Capital Community College and Capitol Region Education Council have collaborated to develop a hybrid design template that blends the adult basic education with the clinical specialty courses taught in the onsite classroom.

CT Conference of Independent Colleges (CCIC)

Fairfield University helped to facilitate the recruitment of the third cohort of graduate students in the Nurse Anesthesia Program in affiliation with the Bridgeport Hospital Nurse Anesthesia Program, conducted onsite recruitment events and has articulation agreements with area community colleges for seamless student transition to the University’s RN-BSN program. In September 2007, the University launched a Clinical Nurse Leader track in the master’s program in which they recruited a cohort of 14 students; the number has since doubled, and there is an additional cohort taking classes at Danbury Hospital. Fairfield is one of 12 nursing schools in the country selected to partner with the Department of Veterans Affairs in launching an initiative begun June 2007, VA Academy, that is geared to expanding the number of nursing faculty, enhancing the professional and scholarly development of nurses, increasing nursing student enrollment by 1,000 and promoting innovations in nursing education. Fairfield’s VA Academy is through its second nursing degree program, which has been in existence since 1992.

Goodwin College offers an array of allied health programs that meet the staffing needs of Connecticut employers and provides students with the knowledge and skills needed to succeed in the workforce. Current allied health programs include bachelor degrees in health science, with tracks in Healthcare Administration and Environmental Health and an RN to BSN completion program. The college offers associate degrees in nursing, health science, medical assisting and respiratory care. Since 2005, over 500 Goodwin nursing graduates have joined the workforce, helping to alleviate the nursing shortage in the state. The Respiratory Care program is the only one in the state offering students the opportunity to fulfill their clinical requirements in the
evening, thus allowing them to remain employed while pursuing their degree. Thirty-two (32) respiratory graduates have entered the workforce since August 2007.

Collegiate certificates are offered in Medical Assisting, Histotechnician, Paramedic and Phlebotomy and Laboratory Services. The Histotechnician (HT) program at Goodwin, which has a 100% pass rate for the National HT Board of Registry test, is the only accredited program in Connecticut and one of two in New England. Due to a shortage in this field, graduates are consistently hired prior to graduation.

Goodwin College has developed a comprehensive developmental educational program offering tutoring, mentoring and career exploration to assist underserved and under-prepared students entering allied health programs. A $15,000 grant from AT&T for a 20 station computer lab assists students in fulfilling admission pre-requisites to allied health programs. A Health Resources and Service Administration (HRSA) federal grant provides scholarships to low-income minority students in the nursing program. And two grants, totaling $119,000, through the Higher Education Health and Education Initiative, funded a nursing computer lab, simulation software and tutoring services for nursing students.

Goodwin College has a number of employer partnerships in place to address workforce shortages: major area hospitals serve as clinical sites for Goodwin nursing students; Eastern CT Health Network (ECHN) allows entry-level workers in their hospitals and doctors’ offices to pursue advance training; Quest Diagnostics allows phlebotomy students to gain practical experience in a clinical setting; and Yale-New Haven Hospital and Hartford Hospital provide clinical preceptors for respiratory care students.

In May of 2009, Goodwin began offering a bachelor’s degree in Health Science and in addition to a degree completion track also received approval by the Department of Higher Education for an RN to BSN completion program.

Sacred Heart University (SHU) has significantly increased its capacity to graduate RNs to meet growing demand and admitted the largest class of sophomores this past fall (N=76). The Nursing Department has concomitantly emphasized student retention, not just recruitment. In December 2007, the Department received a Higher Education Health and Education Initiative grant to offer a remediation program for sophomore nursing students. Eleven students took part in the remediation program and six (6) were able to continue in the nursing program because of the additional help. The Department is now refining its remediation efforts including faculty development and assignments for remediation. The program is now sustaining itself with University support.

SHU received a grant from the Connecticut Health and Educational Facilities Authority (CHEFA) that has provided direct support to 4 faculty pursuing doctorates. Four of the faculty completed their doctorates and remain employed at Sacred Heart. In addition, the Nursing Department implemented a Nursing Education Certificate that may be acquired by RN to BSN students and to MSN students achieving a MSN in Administration, Family Nurse Practitioner or Clinical Nurse Leader. An application for licensure is currently at the Department of Higher Education to add an education track to the existing graduate program.
The CHEFA funds were made available for this academic year and are supporting one faculty member in a doctorate program and scholarships to students taking the nursing education certificate. In addition the funds are supporting student recruitment and faculty development for the Doctor in Nursing Practice program that begins in September, 2010. The implementation of the Bachelor of Science in Health Science in fall 2010 will improve the pipeline for students to fulfill prerequisites and criteria for enrollment in graduate occupational therapy programs. Articulation agreements are planned with Housatonic and Manchester Community Colleges’ Occupational Therapy Assistant (OTA) programs to enable their OTA students to seamlessly complete their baccalaureate degree and enter the graduate Occupational Therapy program.

Fall 2010 curricular revisions for the graduate Occupational Therapy program include the addition of several courses offered in an accelerated online format or hybrid format. Additionally, the program has decreased the number of courses within the program that are prerequisite to each other, thus making the program more flexible and less rigid lock step. The part time option will continue in the new curriculum design. Online formats and an increase in flexibility as to the lock step nature of the curriculum will allow students to complete the program at a time in the day of their choosing with fewer visits to campus, thus allowing adult student in particular to work or fulfill caretaker and parenting roles.

**Saint Joseph College (SJC)** Division of Nursing has expanded enrollment in the traditional baccalaureate program and has maintained full enrollment in the accelerated second degree program that allows students to complete all nursing courses in 16 months. Using a grant from CHEFA, SJC is addressing workforce issues by promoting nursing to middle school students and establishing academic supports to reduce attrition of enrolled students. In addition, the Division was awarded a *Higher Education Health and Education Initiative* grant to support the use of simulation technology and the development of an on-line nursing education program including tuition subsidies for students. The graduate programs at SJC include advanced practice options in family practice or psychiatric-mental health, as well as nursing education.

**Saint Vincent’s College (SVC)** reported a record enrollment of 531 students in fall 2009, a 26% enrollment increase from the previous year. The College enrolled an entering nursing cohort of 117 students in fall 2009 with a second cohort of 40 students expected to begin nursing courses in January 2010. The Radiography Program enrolled 19 students in its entering class. The Continuing Education Department of the college experienced growing enrollments in its programs leading to entry level certifications. Program offerings for the 2009-2010 academic year include: Medical Assisting, Hospital Coding, Health Care Reimbursement, Pharmacy Technology, Multi-skilled Assistant, Central Sterile Processing Technician, Diagnostic Medical Sonography, RN Refresher and a recently developed Computed Tomography (CT Scan) program.

A new student learning center was dedicated in the name of Sr. Marie Burns, D.C. Sr. Burns has served as the chairperson of the College’s Board of Trustees since 2004. She is a strong advocate of education for the poor and underserved. Also a new Nancy Clancy Nursing skills laboratory and classroom is to be dedicated in January 2010.
The College received a second grant from the Marillac-NE Trust to continue its outreach program designed to increase the number of urban minority and male middle and high school students interested in health care careers. One hundred forty-five students (145) attended the “Why Not You” summer camp. Science, nursing, and healthcare faculty mentored participants while they were enrolled in the program and St. Vincent’s College faculty and staff continue to follow-up with the students throughout the academic year. A third grant has been submitted to the Marillac-NE Trust to operate the program during the summer of 2010.

A Higher Education Health and Education Initiative grant provided the funds to increase the length of the summer camp experience to two weeks for new participants. St. Vincent College students were hired to serve as student mentors working directly with camp participants in both supportive and teaching roles. The grant also afforded the utilization of paid nursing and radiography student tutors during the academic year. Monies from the grant have supported the acquisition of additional computerized review materials for NCLEX-RN and the updating of A.D.A.M., benefiting all nursing and radiography students. Grant funds subsidized monthly Lunch Box Sessions, designed to serve as retention mechanisms.

The College has articulation agreements with Fairfield University and Excelsior College to facilitate completion of baccalaureate degrees by associate degree nurses. Articulating students can take additional credits at St. Vincent’s College and transfer those credits to Excelsior College and Fairfield University.

Quinnipiac University continues to increase enrollment to both the traditional and one year accelerated nursing program. The Nursing Department hopes to have an articulation arrangement with the Community College System to offer an RN to BSN option in the next year. The clinical partnerships with Charlotte Hungerford Hospital and Masonicare continue. Each has a Nursing Education Specialist working for both institutions. Quinnipiac's graduate nursing program has received a federal training grant for the fifth consecutive year from the Health Resources and Services Administration of the U.S. Department of Health and Human Services. The grant provides scholarships for students pursuing a master’s of science in nursing. In addition, faculty received a grant for outreach to high school students who are interested in learning more about the nursing profession. These efforts also represent efforts to increase male and minority interest in the nursing profession.

The University of Hartford has a long-standing program at the MSN level in Nursing Education, Management and Public Health. All areas address specialties that face challenges from the continued nursing shortages. The Nursing Education specialty is well enrolled and the Management and Public Health specialty are growing. With the receipt of the Higher Education Health and Education Initiative grant in November the Nursing Department has recruited six individuals from underrepresented populations into the Public Health specialty. Hartford has a post-master’s certificate program for master’s-prepared nurses that was initially funded by a grant and that provides students with content and experiential activity. Hartford also has an RN to BSN program for registered nurses pursuing a bachelor’s degree, who are licensed at the associate’s degree and/or diploma level. The University is working with the Community College System to increase RN mobility into BSN completion programs statewide.

Yale University’s School of Nursing offers MSN and Ph.D. degrees. Yale received a Grants in Area of National Need (GANNS) grant to support doctoral study for individuals from
disadvantaged backgrounds. The GANNS grant supports two to three full-time Ph.D. students yearly, and they admit a total of 4-6 students in the program, which aims to train nursing faculty. Yale has a long-standing MSN program focusing on advanced practice, which leads to preceptor and faculty roles. There are approximately 90 graduates per year from this program.

**CT State University System (CSUS)**

**Central Connecticut State University (CCSU)**

CCSU currently offers two programs leading to a BSN (i.e., an RN to BSN program for Registered Nurses and a generic BSN program). The RN to BSN program has continued to significantly increase in numbers, and has a satellite cohort at Lawrence and Memorial Hospital in New London. Meetings have also occurred with the Community College nursing programs to strengthen articulation agreements. In the generic undergraduate BSN program, now in its second year, there are 58 students in the major and around 100 pre-nursing students. When fully operational, this generic BSN program will have 150 students admitted to the major and moving toward completion of the BSN degree. With support of University and federal money, the Nursing Learning Center is now complete with a new 3G SimMan and SimBaby, along with videotaping capabilities, which the students in the major are using for the first time this fall. This year there is federal appropriation money to award $7000.00 in student scholarships, as well as a curriculum grant award that is exploring ways to enhance retention of “at risk” students.

The nursing faculty have been actively engaged in creating community partnerships to both enhance student learning experiences, but to also promote community engagement with a strong focus on social justice. Faculty and students have been involved in various activities in and around the New Britain area. As the program evolves, innovative practice partnerships will continue to be explored.

**Eastern Connecticut State University (ECSU)**

ECSU does not offer a nursing program; however, in 2008 in cooperation with the University of CT (UCONN) and Southern Connecticut State University (SCSU), they developed plans of study for students who wish to pursue UCONN's MbEIN and SCSU ACE nursing programs. These plans of study ensure that ECSU students are prepared to enter the UCONN and Southern programs immediately upon graduation, enabling them to obtain nursing credentials approximately one year after receiving their bachelor's degree. A pre-nursing program coordinator and advisor has been appointed and a web site has been created to provide information about these plans of study and about nursing preparation and careers in Connecticut.

ECSU continues to offer three programs in public health: a public health certificate, public health minor and a bachelor’s of general studies concentration in public health. These are designed as a pipeline, providing students an opportunity to take the basic courses required for admission to the graduate program in public health at the UCONN Health Center.

**Southern Connecticut State University (SCSU)**

SCSU, celebrating its 40th anniversary as a Nursing Department at the University, continues to offer a variety of educational programs. The generic undergraduate nursing program continues to be in high demand. In fact, during the fall 2008 semester, the nursing major had the highest number of students on the campus for the first time in the University’s history with nearly 900
students on campus declaring nursing as a major. The program is designed so that students complete prerequisite courses and university requirements during the first two years of study and move into the upper division major as a junior level student. The number of graduates from the generic program has increased by 25% over the past 2 years. This year, a federal appropriations grant enabled the Nursing Department to hire a full-time lab staff member. The availability of this support person will be instrumental to their program retention efforts.

In order to increase nursing faculty capacity, the Department has expanded upon its clinical teaching partnership with Midstate Medical Center. Financial payment from SCSU is made directly to the hospital for the release of two advanced practice nurses to provide clinical supervision for students placed at Midstate.

The addition of the Accelerated Career Entry (ACE) program for second-degree students in 2007 has been instrumental to the goal of producing a larger number of graduates in order to address the nursing shortage. This 12 month program has enabled the department to increase its overall number of baccalaureate prepared individuals by 40% over just the last 2 years. To date, 33 students have graduated from the ACE program and there has been a 97% first time pass rate (32 out of 33 students) on the NCLEX-RN exam. There is a strong student demand for this type of program as evidenced by an increase in applications by 75% from the first cohort just 2 years ago.

The Department of Nursing is one of 52 grant recipients of the Robert Wood Johnson Foundation New Careers in Nursing program. This award will enable the Department to award ten $10,000 scholarships to ACE students meeting the eligibility requirements related to increasing the diversity of the workforce. In addition, a federal appropriation grant has enabled the Department to provide scholarships/stipends to ACE students.

The Department of Nursing also offers a program for Registered Nurses seeking a baccalaureate degree. The program is delivered in an online format designed for working adult learners. Over the past 2 years, there has been an increased demand for the program as evidenced by a 50% increase in course enrollment.

The Master’s of Science in nursing program continues to offer tracks in Nursing Education, Family Nurse Practitioner, and Clinical Nurse Leader. Enrollment in the Nurse Educator track has remained relatively flat. In order to address the growing nurse faculty shortage, the Department has received a federal appropriation grant to provide scholarships/stipends to students in the Nurse Educator track. Beginning earlier this year, the Department suspended new admissions into the Family Nurse Practitioner track due to the lack of full-time faculty for this track. The Department is currently searching for a tenure track FNP faculty with hopes of opening enrollment. Demand for the Clinical Nurse Leader track continues to be low. The Department is planning for more aggressive marketing of this track at area healthcare institutions.

Over the last year, the Departments of Nursing at Southern Connecticut State University and Western Connecticut State University have been collaborating on the development of a new Ed.D. in nursing education, a program proposal designed to prepare nurse faculty. This initiative aims to prepare at the doctoral level, specifically in nursing education, up to 80 new faculty members over the next ten years. The FY 2010 Federal Omnibus Appropriations Act provides $300,000 to SCSU and WCSU for this purpose.
Western Connecticut State University (WCSU)

WCSU continues to strive to meet the educational needs of the healthcare workforce in CT and especially in the Western CT region. This is evident in the increasing demand for all of their programs. This year they anticipate graduating 55 students from the generic undergraduate BS in nursing program. This will be the largest graduating class in recent memory. WCSU is proud of the undergraduate program’s continued success as evidenced by the 100% pass rate on the licensure examination by the class of 2009.

The WCSU’s nursing program strives to improve student retention through one on one tutoring, peer tutoring, and more open simulation laboratory times. This is the final year of a federal grant that has been used to hire additional faculty, integrate technology into the classroom and clinical areas and provide additional resources to the students.

Students with an associate’s degree in nursing from any of Connecticut’s Community Colleges have been seamlessly enrolled in the WCSU’s RN to BS in nursing program. This is aligned with the articulation agreements between WCSU and community college partners. This year’s program has grown by 50%.

WCSU also offers a master’s degree in nursing with specialization in Adult Nurse Practitioner and Clinical Nurse Specialist. The enrollment in this program has grown by 30% this year. WCSU admitted the largest cohort in the program’s history in fall 2009. A cohort from this program will graduate in January 2010.

WCSU continues partnering with SCSU in the Master’s nurse educator track and in the development of a doctoral program in nursing education. This collaborative nurse educator program will help to alleviate the dire nursing faculty shortage in CT.

Charter Oak State College

Using its expertise in validating learning and online instruction, Charter Oak State College (Charter Oak) continues to address the nursing shortage through its work to provide career ladders for healthcare workers. In collaboration with the state’s Community College System and the CT League for Nursing (CLN), Charter Oak is helping individuals transition from Licensed Practical Nurse (LPN) to Registered Nurse (RN) through an online bridge course. Two hundred and sixty-three (263) LPNs have completed the course and entered the second year of nursing courses in two-year college RN programs. Because of the changes in the RN and LPN programs, Charter Oak received a grant in October 2008 to update the Bridge course. Working with the CLN, input has been gathered from the deans and directors of the state’s nursing programs, advisory committee and curriculum committees were formed, and data were collected on the 2006-07 program graduates (77% of the students had graduated, 6% were still in the program. The completion rate is higher than the traditional graduation rate.). Based on survey data from the graduates, input from the deans and directors of nursing programs, and changes in nursing practice, the curriculum has been revised and will be offered in the spring.

In addition, Charter Oak offers a series of refresher courses for RNs, LPNs, and Pharmacists to bring them back into the field, with 215 RN Refresher completers, 22 LPN Refresher Completers and 12 Pharmacy completers (many students actually get jobs in pharmacies before they take all three modules). Charter Oak, working with CLN, received funding in January 2008, to revise the RN Refresher course, to develop it into a staff development/licensing format and to examine
alternate ways of delivering the clinical component. The pilot of the staff development format with Danbury Hospital was a success and will be offered to other hospitals who might be interested. The grant also examined how the clinical module is offered. As a result of the review of the clinical module, additional funding was received to develop a virtual model of delivery. The course is currently under development and is slated to go to the State Board of Examiners for Nursing for review and approval in spring 2010.

Charter Oak also developed an online perioperative nursing course to provide RNs with additional training. Started with a grant, the cost of training has now been absorbed by hospitals. There have been 81 graduates prepared to take positions in operating rooms.

Charter Oak, through a CT Career Ladder Initiative grant, conducted an assessment of the Certified Nursing Assistant (CNA) programs in the state and the LPN training curricula used by the CT Technical High School System to identify areas for enhancement and outline career pathways to nursing and other allied health professions. Based on the findings, the LPN program has developed more rigorous entrance requirements, modified its curriculum by adding a laboratory component to its biology curriculum and made minor revisions to its lifespan development content so students can be awarded credit in those areas. Students are required to take intermediate algebra, English composition and general psychology credit courses either online or in the classroom as either prerequisites or co-requisites. The changes in the LPN program went into effect fall 2008 and allow for seamless articulation to the community colleges. In addition, Charter Oak received a supplemental grant to assist the Technical High School in making curriculum changes, developing the science lab for online delivery, and providing tutoring for the algebra course for 08-09. Charter Oak continues to assist the LPN program in the evaluation of transcripts in the area of math and composition.

The following recommendations for the CNA program were made: develop a plan for enhancing the current CNA program by September 2008 to include time frames for obtaining a high school diploma or GED, and the incorporation of career competencies, based on those developed by Capital Workforce Partners and the CT Community College System; explore increasing the number of hours of training from 100 to 150 to include more content in math, English literacy (oral, written, and comprehension), computer literacy (including a possible online GED course), and career competencies; and develop career ladder certificate programs by September 2009 (CNA, CNA Clinical Specialist, CNA Advanced Clinical Specialist, CNA Leadership, CNA Health Care Advancement). The CNA Health Care Advancement certificate includes college credit courses that would help CNAs transfer into college level health career programs. Students completing the specialist certificates and the leadership certificate may be eligible for additional credit once the courses are developed and evaluated by Charter Oak. This effort supplemented the work being done through the Capital Workforce Partner’s Robert Wood Johnson grant. As part of that grant, Charter Oak reviewed the courses developed for the CNAs to determine credit value. A total of 3 credits were recommended for the 6 courses. One course, medical terminology, did not receive a credit recommendation. Those courses would become part of the CNA career advancement levels mentioned above.
University of Connecticut (UCONN) School of Nursing

UCONN offers pre-licensure programs through its BS, with a major in nursing, and it’s Masters Entry into Nursing (MbEIN—the ‘b’ indicating that participants already earned baccalaureate degrees in other disciplines). Annually, between 130 and 140 students complete the BS program.

UCONN received a grant from the Department of Higher Education in 2006 to establish an infrastructure for their certificate program for non-nurse college graduates (MbEIN) that prepares individuals for RN licensure in 11 months. In addition, the school expanded its MbEIN program to the Waterbury area in January 2008 and in January 2009 opened the Stamford program. Private donations are furnishing class and simulation space in Stamford and state support provided a partnership with Naugatuck Valley Community College to add additional sophisticated, high fidelity equipment to its laboratory. The two institutions share this critical class and simulation space to their mutual benefit. When fully subscribed (planned for 2010), an additional 96 individuals will be eligible for licensure each year.

UCONN received $72,000 in federal scholarship funds for disadvantaged students. This was given to such students, so that they could devote more time to study and less to employment to pay their bills. The recipients formed a learning community, where they provide mutual support and share common experiences/concerns associated with enrollment. The students are enrolled in all levels of the programs and thus, those more advanced are able to become exemplars of achievement throughout UCONN’s Nursing programs.

In fall 2008, UCONN opened its new doctorate in nursing practice (DNP) program. Currently there are 32 students with the first five graduates completing the program in December 2009. The majority of the courses are taught on-line, requiring only monthly trips to Storrs. The on-line format is well received and students find their time in Storrs to be highly interactive and intellectually rewarding. The first full time group will complete the program in December 2009. Subsequently, upon the advice of the students, full time students will take the coursework over two academic years. This program prepares nurses, who have completed a master’s degree in nursing and are certified in a clinical specialty, to become leaders in health care agencies. The students’ clinical practice dissertations focus on quality improvement within partner clinical agencies. Well prepared clinical leaders are intended to guide health care systems through change, including translating evidence into practice and creating environments of the highest quality care (recognizing that a skill mix of staff may be necessary). These leaders may also become faculty and, thus, may take elective courses in higher education, such as those in the new Nursing Education certificate program, described below.

The research doctorate (PhD) continues, with 33 students currently enrolled. These graduates are expected to enter academic institutions, where teaching and conducting original research is required.

Beginning in January 2009, UCONN is offering a certificate in Nursing Education. This two course sequence focuses on theories of learning and pedagogy, as well as the pragmatics of syllabi construction, managing a classroom, conducting clinical education, student evaluation and course refinement. Experts from the University’s Center for Undergraduate Teaching and Learning and nursing faculty are collaborating to provide the most robust courses anywhere. This series is excellent preparation for the National League for Nursing’s certificate in Nursing Education, a credential already earned by the nursing faculty in the program.
UCONN has a clinical faculty ladder so that excellence in teaching can be recognized in a manner similar to other faculty’s academic excellence. A doctoral degree is not required, until achievement of the rank of clinical professor of nursing. As they advance on the ladder, clinical faculty members become eligible for multi-year appointments, which is a public acknowledgement of achievement and job security in a time of economic changes.

Over the last three years, UCONN has partnered with various clinical agencies (specialty and general hospitals, visiting nurse associations and services for the elderly) to establish joint appointments for advanced practice nurses. These are win-win situations where an agency has a competent, caring professional for clinical practice and leadership and students are taught by faculty with current clinical skills and a wealth of practice examples to illustrate for their classes. These yearlong appointments also decrease the faculty turnover due to worries about maintaining clinical skills and a practice base. They move in and out of the partner agency all year—bringing science to practice and vice versa.

In order to attract elementary and middle school disadvantaged and underserved children to a nursing career, UCONN established learning communities in Hartford, Waterbury and New London. These programs provide opportunities for assistance with homework, expansion of students’ knowledge about the health professions and concrete advice on what courses are needed to pursue a college degree. One faculty member leads the Nursing Academy’s Advisory Council at Hartford Public High School and brings her exceptional curriculum design and instruction skills to the program. With a Higher Education Health and Education Initiative grant UCONN began a SAT preparation sequence in inner-city Hartford, in collaboration with the Nursing Academy. Also, state funding is supporting a ‘weekend camp’ experience at UCONN for high school students. This camp exposes high school students to college life and helps them realize that it is an experience that is possible and within reach.

Additionally, UCONN received funding from HRSA to provide loans to those individuals engaged in full time master’s or doctoral study that intend to teach upon graduation. When a graduate teaches for four full time years post degree, 85% of their loans will be forgiven.

More than 700 students are enrolled in the school. Faculty with strong programs of research and sophisticated advance practice skills, teach all levels of students exposing even the most novice student to nursing’s best.

**University of Connecticut Health Center--Area Health Education Centers (AHEC)**

The Connecticut AHEC Program at the UCONN Health Center and its four regional offices operate an array of health career recruitment and support initiatives, some of which are described below. In FY 2009, CT AHEC provided services to a total of 3,794 students in grades K-12. Of that number, 3,114 were from underrepresented or disadvantaged backgrounds. An additional 698 students in grades 13-16 participated in an AHEC sponsored event for a total number of 4,492 student participants in FY 2009. A total of 2,470 teachers, parents and guidance counselors participated in AHEC sponsored activities and programs during this same time period.

- The Urban Service Track recruits and prepares a cohort of students in the Schools of Medicine, Dentistry, Nursing, and Pharmacy specifically for practice in Connecticut’s urban underserved communities. Recruitment of under-represented minority and
disadvantaged students and interdisciplinary training are emphasized. For the year ending June 2009, the Urban Service Track enrolled 54 scholars.

- The **Collegiate Health Service Corps (CHSC)** targets college freshmen and sophomore students who are at risk of dropping out of the college, by forming a campus-based support system through service learning for first generation, minority and/or economically disadvantaged college students. Service learning opportunities are created and implemented to empower those populations experiencing health disparities, engaging students with their communities and increasing the likelihood of returning to their community as a health care professional. Service learning specifically integrates academic coursework and community projects, while increasing college student exposure to careers in health care and public health. For the year ending July 30, 2009, 134 college students participated providing 3,696 hours of community service. The majority of students expressed that service learning had a highly favorable impact on their ability to communicate with diverse populations (83%), understand how poverty impacts health (83%), and more willing to work with the population served in the future (100%). Those participating in the CHSC include Eastern, Western, Southern and Central CT State Universities and the University of Connecticut.

- The **Youth Health Service Corps** equips a diverse group of high school students across the state to provide substantive volunteer service in health care agencies. The YHSC curriculum includes Leadership and Service Learning, Vulnerable Populations including Cultural Competency, Ethical and Legal Issues and Health Care Skills. Students also complete CPR certification and an overview of health careers. Students fill a community need for volunteer service while acquiring real life learning experience under the guidance of professional role models. The YHSC program is implemented at each of the 4 regional AHECs in Connecticut. For the year ending July 31, 2009, 267 high school students from 20 high schools completed 11,014 hours of volunteer service in a health care setting. Since the YHSC’s inception in 2004, 465 high school students have completed over 19,892 hours of volunteer service in a health care setting in Connecticut. In 2009, AHEC began collecting post-secondary education information for YHSC members who have graduated high school. Seventeen (17) YHSC members have reported that they have matriculated into college with 12 of those students indicating they are majoring in a health career. These students represent the future health care workforce of Connecticut.

- **Providing Early Acquaintance with Careers in Health Program (PEACH)** provides middle school students with an integrated classroom curriculum, health professional speakers, and visits to nearby hospitals and community colleges. 100 students from North End Middle School in Waterbury participated in the PEACH program during the ’08 – ’09 school year.

- **Careers for the Future Summer Medical Camp** provides high school students with opportunities to shadow medical professionals at the UCONN Migrant Farm Worker Clinics, St. Francis Hospital and Medical Center, and the Hospital of Central Connecticut.

- **Advancing Health Education Careers (AHEC) Summer Institute** is a six-week career exploration and work readiness program for youth, ages 14-16. Activities include:
independent and group research projects, guest presenters, leadership and employability skills building exercises, resume preparation, and health education trainings.

- **The Connecticut Health Careers Academy Program** targets high school students from underserved areas, who work with college student mentors from the University of Bridgeport and Sacred Heart University to promote academic achievement, communication skills, and career development. The program meets twice monthly at the Stratford Library with health professionals presenting their journey through college and experiences in their chosen profession. There are also presentations on Social Networking, Email Etiquette, Resume writing and Interview skills, and assistance on the college application process for students and their parents.

- **The School to Career (Wired Program) Initiative** funded by The Workplace, Inc. is providing Southwestern AHEC with expanded programming to Health Careers Pathways junior and senior high school students in Stratford. The Youth Health Service Corps program is expanded to include job readiness skills incorporated into service learning projects incorporating the WorkKeys evaluation in the fall and spring.

- **International Health Professional Bridge Initiative** is a “Bridge” program or an alternative health careers certification path for foreign born trained health professionals who may not currently have employment in the healthcare industry in Connecticut. The project aims to look at current barriers to obtaining licensure or certification in CT and thereby provide a means for the health care workforce to increase its diversity.

- **The Medical Interpreter Training Program** provides bilingual health care workers with a basic 48-hour, highly interactive, course of instruction covering topics such as interpreting skills, medical ethics, cross-cultural communication, medical terminology, and professional protocols. Advanced training and continuing education programs will be offered in 2010. Course offerings are provided for general public enrollment and are arranged for employers at their requested sites. For the year ending July 30, 2009, over 70 bilingual health care employees completed *Interpreting in Health and Community Settings* and over 100 bi-lingual employees have had their language skills assessed by AHEC per the employer’s requests.

- **The Health Occupations and Technology (H.O.T) Careers in Connecticut** is a comprehensive guide to over 80 health occupations with training programs in Connecticut. The guide includes basic descriptions, academic and training requirements, places of employment, employment trends, licensure/certification, and salary ranges. It is very popular among high school guidance counselors and workforce development counselors.

- **The Promotores de Salud (Health Promoter) Program** is a 40-hour certificate class offered in English and Spanish. It is offered twice a year for a class size of 10-15 adults. Since its inception in 2005, approximately 700 people a year receive health education and health promotion services from the Promotores.

- **The Community Health Worker (CHW) Program** provides a 48-hour training for employees of Community Health Centers who are focusing on enrolling children in HUSKY. This program is in partnership with the Community Health Center Association of CT as part of a Children’s Health Insurance Program Reauthorization Act (CHIPRA).
grant. Over 30 CHWs received training in core competency outreach skills and received assessment of their fieldwork skills, post-training.

- **The Allied Health Professional Network** is a new initiative for current and recent allied health graduates of eight certificate programs across the state’s Community College System, to provide support and motivation to pursue career pathways through continuing education and training. The Network sponsors regionally-based networking meetings at least twice an academic year, produces and distributes a bi-monthly newsletter, and maintains a website and support/peer mentoring chat room. The website receives approximately 80 visitors a month with one-third being repeat visitors. The on-line mentor is a hospital administrator who posts weekly topics related to entering and working in the field of allied health.

- **The Building Bright Futures in Connecticut Program** targets non-mental health professionals who work with children, adolescents, and their families to provide services from a strength-based context in understanding social-emotional development and the cultural implications affecting the concepts of mental health and mental illness. Since the inception of the program in 2008, 300 social service workers and educators have been trained and over 40 people have been trained as instructors to enhance the sustainability of the program.
**Workforce Investment Boards (WIBs)**

The WIBs emphasize employer engagement and building the skills of current and future workers to promote productivity and career advancement. They play a central role in convening regional partners to address the education and training needs of youth and adults and match those skills to the requirements of local employers.

**Capital Workforce Partners (CWP)—North Central Workforce Investment Board**

CWP has developed healthcare focused partnerships with the Capitol Region Education Council, Vernon Adult Education, New Britain Adult Education, 1199 Training & Upgrading Fund, long-term care associations, long-term care employers, hospitals, assisted living communities, and community colleges in the region to provide incumbent Certified Nursing Assistants (CNAs) with new skills and career enhancement opportunities. The CNA Advancement Initiative provides an onsite training program, at no cost to participating workers, which builds the academic, specialty clinical skills, and personal management proficiencies of CNAs, enabling them to earn higher wages, and preparing them for continued study in a more advanced allied health or nursing profession. Long-term care employers select educational opportunities from a menu of services they have identified with their front line employees to better prepare them for potential higher level health career opportunities. CWP is sponsoring the delivery of group culture change activities, onsite adult basic education programs, and community college clinical specialty coursework, and leadership and transition to college courses for employees who are interested in moving from novice to expert in their field and/or future advanced careers in the health professions. Originally four long-term care facilities were involved as a pilot project with the adult education providers. Through a United States Department of Labor High Growth Job Training Initiative grant featuring long-term care, CWP expanded basic skills instruction for CNAs and other frontline workers to 10 sites and included organizational and operational culture change performance functions, and leadership/clinical specialization career tracks through instruction provided by the community colleges in the region.

CWP was also awarded a Robert Wood Johnson/Jobs to Careers grant that allows for enhancement of the CNA Advancement Initiative to enable four employers participating in the USDOL grant to also take part in a work-based learning component. The program provides an on-site, incumbent worker training program targeted at CNAs and other frontline workers, and incorporates work-based learning within clinical specialty tracks offered by area community colleges. This component brings what the students are learning in their classroom, to competencies they are demonstrating on the job. Students are provided onsite mentoring by nursing staff professionals. The program also expands assistance provided to participating sites to create a framework for organizational change and institutionalization of work-based learning by bringing culture change activities onsite to enhance staff communication and client care. This expansion builds upon CWP’s USDOL CNA Advancement Initiative.
CWP provided 163 Individual Training Accounts in 2008/2009 at a value of $417,549. In addition, they worked with 15 companies to provide incumbent worker training at a value of $136,956 and a match of the same amount from the employers.

CWP is also supporting partnerships with local hospitals (Hartford Hospital, Eastern CT Health Network, CT Children’s Medical Center, St. Francis Hospital, and Hospital of Central Connecticut) that have engaged in administering the online School at Work® (SAW) program onsite to enhance developmental academic, communication, and personal management skills for entry-level employees. They have developed a pre-SAW program to provide basic skills remediation for employees interested in SAW. The hospitals contribute a staff coach for the student employees, as well as financial resources, space and computers to sustain the program.

In addition to adult focused activities, CWP is sponsoring summer youth opportunities for students to explore health care careers. Youth have participated in internships with local hospitals, volunteer nursing organizations and other health care employers sponsored through state summer youth employment funding.

**Eastern Workforce Investment Board (EWIB)**

The EWIB Health Pipeline Program represents a partnership between Eastern CT education, industry, and workforce development leaders. The program expands the pool of next generation workers in the healthcare field. The Health Pipeline was a partnership between EWIB, Three Rivers Community College, and EASTCONN with subcontractors New London Office of Youth Affairs and Norwich Youth and Family Services, the four (4) area hospitals, two (2) community health centers, nine (9) high schools from Windham and New London counties and the Eastern CT Area Health Education Center (AHEC).

The Health Pipeline Program was designed to increase student awareness of nursing and allied health careers and to improve student preparation for further study and careers in these fields. There were three program components: student selection, online academic training, and summer internships. Successful completion of online health courses selected by the clinical sites advanced the students into six-week, paid clinical internships. The program recruited 51 students; 39 completed their online coursework, 32 successfully completed the internships. Students completed a portfolio of their experience and high schools agreed to grant academic credit for the experience.

EWIB also continues to partner with area healthcare employers to increase the skills of their current workforce through incumbent worker training projects. Four health companies received training funds this year including: Code One Training, a health & safety training & education firm specializing in basic life support & emergency medical services; Hospice of Southeastern CT; Natchaug Hospital; and St. Joseph Living Center. This represents an investment between the companies and EWIB of over $75,000.

The infusion of ARRA funding and media & labor market reports saying that the health fields are the “best bets” for employment and good wages, has caused dislocated workers and low income adults to continue pursuing healthcare careers through Individual Training Accounts (ITAs) in EWIB’s four CWWorks-East Centers. In an effort to support longer term, higher skilled training, EWIB increased the amount of tuition available per person to up to $6,000 and
increased support services to up to $2,500. EWIB has encumbered nearly $160,000 for 93 people in health training. This is significantly more than the EWIB had available in 2008-2009 for individual training accounts in health care ($77,900). The four top trainings are: CNA (47), Medical Billing (19), Phlebotomy (7), and Pharmacy Tech (6). The top three training institutions were Quinebaug Valley Community College, Educational Training of Wethersfield/New London, and Three Rivers Community College.

With visits to CTWorks-East Centers increasing by ~22% in PY08/09 to 50,000, the Health Career Advisor (HCA) has seen her numbers grow as well. The HCA in the East held 56 Orientation to Health Career Workshops, saw 433 people attend, advised and tested 140. The HCA is working with the forum on the ‘Direct Care Workforce Shortages’.

**Northwest Regional Workforce Investment Board (NRWIB)**

The Northwest Regional WIB remains actively involved with allied health employers in the region as well as the development of allied health education. The development of the educational specifications for the proposed Allied Health and Advanced Manufacturing Intradistrict High School in Waterbury continues. Understanding the need to focus on the science, technology, engineering and math (STEM) curriculum, the NRWIB, in partnership with the Waterbury Department of Education is focusing on the development of an educated pipeline of youth to fill the projected workforce needs in the region.

Using funds received from the Workforce Investment Act (WIA) and a Carl Perkins Incentive award, NRWIB is funding an incumbent worker training program with Danbury Hospital. Using Naugatuck Valley Community College as the training entity, employees will receive intensive instructional interventions for low-wage low-skilled incumbent workers in the healthcare field. The program includes testing, remediation, adult basic education, GED, national external diploma program (NEDP) and workplace occupational skills training. The program will focus on Certified Nursing Assistants with training as unit coordinators, monitor technicians and mobility coaches also included.

The NRWIB continues to commit a significant portion of its funding from the WIA and the Jobs First Employment Services Program (JFES) to training for participants. In the last year, under WIA, the Board issued 144 ITAs in healthcare related fields totaling more than $265,530. Under the JFES Program, a number of clients successfully completed similar programs including dental assistant, phlebotomy and CNA training. Additionally, the WIB spent $33,764 in incumbent worker training with a matched investment of $98,837 by health care employers.

The Health Career Advisor will remain available through ARRA funding. The effectiveness of the Advisor position has proved out with significant numbers of clients attending orientation workshops, taking the HOBET test and receiving counseling. One Stop Career Center clients and community college students were, and remain, the primary target. In the last program year, 378 individuals have attended Healthcare Career orientation workshops and 170 individuals returned for assessment and advising.

**Workforce Alliance—South Central Workforce Investment Board**

The Workforce Alliance continues to partner with local hospitals and long-term care facilities to provide the School at Work (SAW) program onsite to enhance developmental academic,
communication, and personal management skills for entry-level employees. The healthcare facility contributes a staff coach for the student employees, as well as financial resources, space and computers to sustain the program.

Workforce Alliance continues to work on improving outcomes for those entering the health care workforce by institutionalizing services in their One Stop Career Center. These services include use of the Health Occupations Basic Entrance Test (HOBET), as well as the Test of Essential Academic Skills (TEAS) to assess individuals’ readiness and suitability for healthcare education programs. In collaboration with Gateway Community College, Workforce Alliance has been supporting a Health Career Advisor who works with One Stop Career Center clients and community college students to provide assessment, academic advising, career counseling, financial assistance and referrals to educational programs at all levels. From July 2008-June 2009, the Health Career Advisor provided orientation sessions to 171 individuals and provided testing and advising to 454 individuals interested in pursuing health care careers.

An average of 71% of all One Stop customers (across all levels of education and work experience) test below basic proficiency levels in reading and/or math. As such, many are unable to meet the basic requirement for entry into vocational skills programs, or, if they do enter such programs, there is a strong likelihood of frustration and failure. In response, in June 2009, Workforce Alliance began work with New Haven Adult Education to open a Basic Skills Academy. The Academy provides an accelerated, contextualized adult learning model which significantly improves basic skills levels of participants within an average 10-week time frame, and better prepares individuals to enter educational programs that will lead to employment and career advancement.

For the period October 1, 2008 and September 20, 2009, 109 ITAs in healthcare related fields were issued through the South Central CT Works Career Centers. This represents a total investment of $327,000. An additional $90,000 was spent on incumbent worker training.

Additionally, in June 2009, Workforce Alliance began implementing customized training programs using funding from the ARRA. To date, over $1,200,000 in ARRA funding has been allocated to customized programs and services that will help prepare individuals for new jobs and careers. In total, 13 programs have been created in partnership with local community colleges, adult education and other providers. The majority of these programs are in allied health related fields, such as Medical and Dental Assisting, Pharmacy Technician, Certified Nursing Assistant, and training of individuals who will work in various positions within the new Smilow Cancer Center at Yale-New Haven Hospital.

**The Workplace, Inc.—Southwestern Workforce Investment Board**

The Workplace, Inc. is cultivating a pipeline of health care workers to meet the needs of employers in Southwestern Connecticut. Through a variety of programs The Workplace, Inc. has established strong ties with area hospitals and health care providers. It continues to provide group training to disadvantaged youth, participants on state subsidies and the adult and dislocated worker population. From July 2008-July 2009, The Workplace issued 230 ITAs valued at $376,875.

The Workplace, Inc.’s 2009/2010 WIA Youth Program offers youth residing in Southwestern Connecticut with CNA training—a comprehensive program comprised of 240 hours of training
and clinical preparation. The program boasts a 95% pass rate and a 90% placement rate at 90 days. In addition, youth have the option of earning an Emergency Medical Technician (EMT) or Dispatcher credential. In partnership with American Medical Response, youth go through an extensive curriculum to prepare them for the state test. The Workplace, Inc. runs this program in both Bridgeport and Norwalk. The Workplace, Inc. also offers youth a Health and Human Services certificate that prepares them for employment with the Department of Developmental Disabilities.

The year 2009 featured an Incumbent Worker Training (IWT) program administered by The Workplace, Inc. The program at Waveny Care Network addressed the educational needs of front-line staff for wound care and treatment. The need for a Wound Care Specialist on premise had never been greater. The older adult population is more prone to wound development and decreased healing efficiency. The Wound Care Certification & Training project allowed Waveny’s Infection Control Nurse to become certified in wound care. Once certified, she was responsible for training Waveny’s Registered Nursing staff currently consisting of 6 individuals. The Workplace spent over $31,000 in incumbent worker training funds with a match of $44,574 by health care employers.

In addition, The Workplace, Inc. offers occupational skills training and case management to those interested in career advancement through their Academy for Career Advancement and their Career Coach, mobile One Stop Career Center. In particular, they are serving long-term care employers by providing workers with language skills training. In total, 186 individual training accounts were provided for individuals in health care training programs. The Health Career Advisor provided orientation sessions to 457 individuals and 129 returned to testing and advising.

**Partner Agencies**

*Connecticut is fortunate to have partner agencies that collaborate with secondary schools, colleges and universities and Workforce Investment Boards. These partner agencies promote career exploration through hands-on learning and training as well as supporting individuals in their pursuit of education.*

**CTHospital Association**

The Connecticut Hospital Association (CHA) continues to engage in a variety of activities that support the nursing and allied health workforce. CHA offers more than 35 membership meeting groups that provide a regular forum for the exchange of ideas and information among healthcare leaders with similar responsibilities. Meeting groups such as the Laboratory Administrators, Administrative Directors of Radiology and Diagnostic Imaging, Human Resources Executives, and others discuss workforce issues and needs and periodically meet with faculty from programs within the state. Members from a few of these groups have presented before the Allied Health Workforce Policy Board to articulate hospital workforce needs specific to their practice/service areas.

CHA conducted a Hospital Nursing Workplace Environment Assessment project in which over 2000 Registered Nurses communicated their perceptions of working in member hospitals.
Subsequent programming to celebrate and address survey results included a Day of Sharing in which nursing staff and leadership from around the state presented on best practices and discussed challenges; and a very successful educational program on shared governance.

The Association hosts regular meetings of hospital chief nursing officers and deans and directors of Connecticut’s nursing programs. This year the combined group formed the Task Force on Clinical Rotation Models to develop recommendations on models that enhance the integration of new graduate nurses into the workplace and support faculty expansion and development. Finalization of recommendations is expected early in 2010.

Other collaborative projects spearheaded by CHA continue, including the statewide nurse preceptorship program that offers education for new and advanced preceptors, and the Smart Moves campaign for safe patient handling that promotes awareness and education on the use of assistive equipment to avoid manual lifting and in the transfer of patients. The partnership of the Connecticut Nurses’ Association, the Connecticut Association of Not-for-Profit Providers for the Aging, the Connecticut Association of Health Care Facilities, and the Connecticut Association for Home Care and Hospice is planning its fourth annual Smart Moves Forum for February 2010.

**1199 Training and Upgrading Fund**

The 1199 Training & Upgrading Fund is a joint labor/management educational program that provides tuition reimbursement, career counseling and academic support for District 1199 members interested in improving their basic skills, getting their high school diplomas or pursing higher education. The Fund offers critical financial resources for entry-level workers in unionized long-term care facilities interested in personal and professional advancement.

In 2009, in partnership with the Capitol Region Education Council (CREC), the Fund offered adult education classes for 1199 members at the union headquarters in Hartford (basic skills, high school diploma, and transition to college). In 2010 the Fund will partner with the Adult Education Center of Hartford in its high school diploma program, and with Vernon Regional Adult Basic Education in its “Transition to College and Careers” program. English language and adult education classes have been offered on-site at work to employees with assistance from WIBs and community colleges (The Workplace, Inc. and Norwalk Community College did work in Stamford and Capital Workforce Partners has been a recent partner in the Hartford area). Several hundred 1199 members receive tuition reimbursement each semester, and approximately 100 members participate in adult education classes each year.

The Fund has been a partner in several initiatives including the Bridges to Health Care Careers program at Capital Community College and Capital Workforce Partners’ USDOL Grant and Robert Wood Johnson grant initiatives. 1199 Training and Upgrading Fund has been working with national consultants to engage employers in improving the culture of their workplaces to utilize and enhance the skills of their entry-level employees. Efforts have focused on relationship building to change the decision making process and the opportunity for career and personal advancement.

In fall 2008, the Fund went through a strategic planning process, meeting with union officials, members, and stakeholders around the state in order to get input on how to better serve its members. The Fund expects that these regional stakeholder meetings will lead to increased
participation in Fund programs, and also to new partnerships with employers, educational institutions, and other organizations throughout the state.

**CT League for Nursing (CLN)**

The vision statement of the Connecticut League for Nursing is to be the premier nursing organization within the state that facilitates access to education, resources and information for entry and professional advancement in the field of nursing. Their mission is to: foster partnerships between academic and clinical nursing leaders; facilitate access to formal nursing education programs; provide affordable, accessible, and contemporary continuing education programs and forums; and support the National League for Nursing’s initiatives related to Nurse Faculty Development, Nursing Research and Nursing Workforce Demographics. CLN had a number of accomplishments and initiatives in 2009 that supported the nursing community including:

- Published the CLN 2008 CT Nursing Study Nursing on Workforce Demographics Educational and Economic Trends. Distributed study to all Connecticut hospitals, universities and the legislature.

- Partnered with Laerdal Corporation and Educational Facilities throughout CT to present two major Simulation Workshops over the past year. Both were highly successful with record attendance.

- Partnered with Sacred Heart University to implement on-line homecare programs to promote supervisor competencies.

- Integrated CLN’s homecare education to support agencies with new hire orientation and transition to homecare practice.

_The AHWPB believes these initiatives are critical to the state’s ability to meet demands in the health care labor force. Current state investments should be sustained and expanded to allow programs to continue and be replicated statewide. In particular, state funding should be identified to support institutionalization of efforts undertaken with federal and private foundation funding._
Recommendations

Through its deliberations, the AHWPB has identified a number of challenges that must be addressed in order to lessen workforce shortages in allied health and nursing. These challenges require collaboration and investments among a variety of stakeholders including state agencies, colleges and universities, labor unions and employers.

In addition, it is imperative in these difficult economic times that current investments in the state’s education and workforce development agencies are maintained and targeted to high demand occupations such as health care that support Connecticut’s long term competitiveness. Given the state’s financial situation, the AHWPB has limited its recommendations this year to the most critical, long term needs of the health care workforce.

Advancing a Talent Pipeline Initiative for Healthcare Careers

While much work is underway in Connecticut to address the immediate barriers to generating nurses and allied health professionals in the short-term, these initial steps will not be sufficient to address the need over time if more systemic approaches to ensure a continued talent pipeline of qualified workers are not also pursued.

The AWHPB studies have called attention to the fact that Connecticut’s talent pipeline for health care careers is in particularly poor shape because:

- Many applicants to certificate and degree programs lack fundamental skills in literacy, math, science and English and require substantial developmental education to enter a post-secondary allied health program.
- High school students have only a limited understanding of the availability of and range of opportunities in allied health careers and do not connect their high school experience to their college plans.
- There is a significant under-representation of minorities pursuing careers in allied health professions.

Addressing these three critical talent pipeline issues – deficient skill readiness, lack of career awareness and readiness, and low representation of minority students – calls for advancing new partnerships and collaborations and building upon the ongoing efforts in health care training taking place across high schools and post-secondary institutions as well as state agencies and Workforce Investment Boards in Connecticut.

Recommendation 1: Develop a State Strategic Health Care Workforce Plan

Connecticut must develop a long term plan for the health care workforce outlining the needs of employers over the next ten years and the current, and predicted supply of skilled workers. The plan should identify the gap between demand and supply and the capacity of the state’s colleges, universities and other training providers to educate the needed workforce. In addition, the plan should outline how the barriers to career advancement outlined above will be addressed to ensure state investments in training are efficient and effective. The AHWPB should lead this strategic planning process given its membership and five years of work. The AHWPB can help to
centralize data sources including data available from the P-20 Council, Department of Public Health’s licensure database as well as other sources.

The plan should include a broad range of health care occupations and build off of and incorporate other planning efforts that have taken place in the past such as the Hospital Task Force and the current planning under the SustiNet Board’s Workforce task force. The report should also focus on the behavioral health workforce and the planning work being done by the CT Workforce Collaborative for Behavioral Health. With this information, the AHWPB can set forth a plan that positions the legislature to make decisions related to both short and long term investments in the state’s health care workforce and ensure that these disparate planning efforts are coordinated.

Recommendation 2: Provide Student Support Services & Academic Remediation

Sufficient studies and Connecticut pilot projects have shown that embedded tutoring, case management and academic counseling services directly impact student program completion. Most colleges and universities, as well as the technical high school system, have very limited funding for program-specific student services. Colleges should consider a variety of proven strategies to improve student success including shrinking class sizes to provide students with more instructional contact, streamlining developmental courses to allow students to focus on their learning gaps and accelerate their progress and supporting learning communities that provide for cohort development. We recommend that resources for these supports be included in future state appropriations for public educational institutions to ensure student success. In addition, a variety of retention supports have been proposed in the CT Workforce Investment Strategies of Healthcare (WISH) Initiative proposal to the United States Department of Labor. These interventions should be tracked for their effectiveness and replicated with support from future state budgets.

It is also recommended that the legislature authorize the use of state financial aid provided to the state’s public and private colleges and universities for students who are pursuing non-credit certificate programs in our state’s training programs. In particular, EMT and paramedic training and short-term programs in medical billing and coding and phlebotomy can help to address workforce shortages but no state funding is available for training in these short-term occupational areas that support the state’s health care infrastructure.

Recommendation 3: Coordinate Statewide Allied Health Outreach Campaign

While many training programs exist within the State, some of those programs and careers, such as nuclear medical technologists or laboratory technicians, go virtually unnoticed by youth and adults. A coordinated, statewide outreach campaign designed with input from all stakeholders, including AHEC, the Nursing Career Center, One Stop Career Centers and the state’s secondary and post-secondary institutions is recommended. The Health Care Advisors, working in the One Stop Career Centers provided orientations on health care careers for approximately 2,400 individuals between July 2008 and June 2009. This effort can be built upon and more closely coordinated with efforts by these other partners.

This campaign should include general marketing of nursing and allied health careers, training for teachers and guidance counselors, and information and career counseling for parents and students, particularly minority students, on career opportunities and the location of, and
educational requirements for allied health programs. Current funding in each of these agencies’ budgets can be leveraged to start this effort.

**Increasing Higher Education Capacity to Provide Training**

A key issue facing the future of the health care workforce is an insufficient supply of college faculty to provide academic and clinical training. The current faculty workforce is aging and few individuals are pursuing graduate degrees in nursing and allied health. One reason for this shortage is that salary levels of teaching professionals, in allied health and nursing fields in particular, are significantly less than salaries for practitioners. In addition, many bachelor’s and graduate programs are full-time and few current employees are in a position to stop working to advance their careers. These individuals may also have difficulty securing financial aid or scholarships to support their educational programs if they can only attend college part time or earn too much money, even working reduced hours, to qualify for financial aid.

**Recommendation 4: Invest In New Faculty**

Nearly every Connecticut degree program within nursing and allied health is vulnerable to current, or anticipated, faculty shortages. Colleges and universities sought out 27 waivers for nursing faculty from the Nurse Board of Examiners in 2009. Where sufficient faculty exists, it is recognized that securing replacements will be difficult. It is therefore in the best interests of the state to create a proactive plan to develop instructor talent and provide the resources to prepare more professionals to become faculty members. One example is the Scholarship-for-Service model, which has been used successfully in government and the armed forces to produce employees for areas of need and financial resources have been available at Southern CT State University and the University of Connecticut for graduate students interested in becoming college faculty. Connecticut should provide Scholarship-for-Service opportunities for graduate level education to colleges and universities to support expansion of these new scholarship models. These resources will help the state meet its need for health care faculty and ensure we are able to continue training the future workforce.

**Recommendation 5: Expand Allied Health and Nursing Programs**

In order to meet the demand for health care professionals, the state must expand its program offerings at the secondary, post-secondary, and graduate degree levels. In addition, new training opportunities for students and faculty need to be developed in on-line and simulated formats to promote greater access to education programs. The faculty plan commissioned by the AHWPB in 2007 outlined a number of key areas in which program expansion is necessary to meet labor force demands. It is imperative that the faculty resources allocated in the 2010 budget to the state’s colleges and universities be maintained to support the expansion of nursing and allied health programs to meet state workforce demands.

**Promoting Education and Business Partnerships**

A number of creative models have been developed for meeting the educational requirements of schools and the personnel needs of employers. However, many of these partnerships are limited or vulnerable because of the lack of available state resources. These types of public-private partnerships will be critical to the ongoing success of health care training programs.
**Recommendation 6: Support Employer-sponsored Training**

Having employers offer education, especially basic skills classes to their own employees addresses several of the barriers (transportation, work and family obligations, the cost of training, difficulty locating courses) that entry-level workers, particularly recent immigrants, face in terms of accessing basic skills and language skills training. Employer-sponsored courses have the added benefit of enabling employers to develop curricula that focus on the specific skill development and language needs of workers in the health care industry. It is recommended that current state investments in summer youth employment be maintained to support the paid health care internships that have been developed statewide. Furthermore, the state must continue its current investment for incumbent worker training through the Department of Labor and Workforce Investment Boards in order to support the continued viability of hospitals, medical offices and laboratories, and long-term care facilities. During the 2008-2009 fiscal year, the WIBs spent approximately $1.5 million providing individual training accounts to individuals training for health care professions. An additional $300,000 was spent on incumbent worker training with $445,000 contributed by employer partners.

**Conclusion**

The AHWPB has made great strides since its establishment in 2004. The Board has issued four legislative reports and commissioned key studies of faculty shortages and clinical placement opportunities. The Board has convened stakeholders to share information and strategies and to identify ongoing challenges to address health care workforce shortages.

The AHWPB calls on the state and its agencies to target its resources to health care careers. The AHWPB will work with state agencies, colleges and universities, Workforce Investment Boards and other partners to ensure these investments are strategically implemented, monitored and replicated throughout the state.