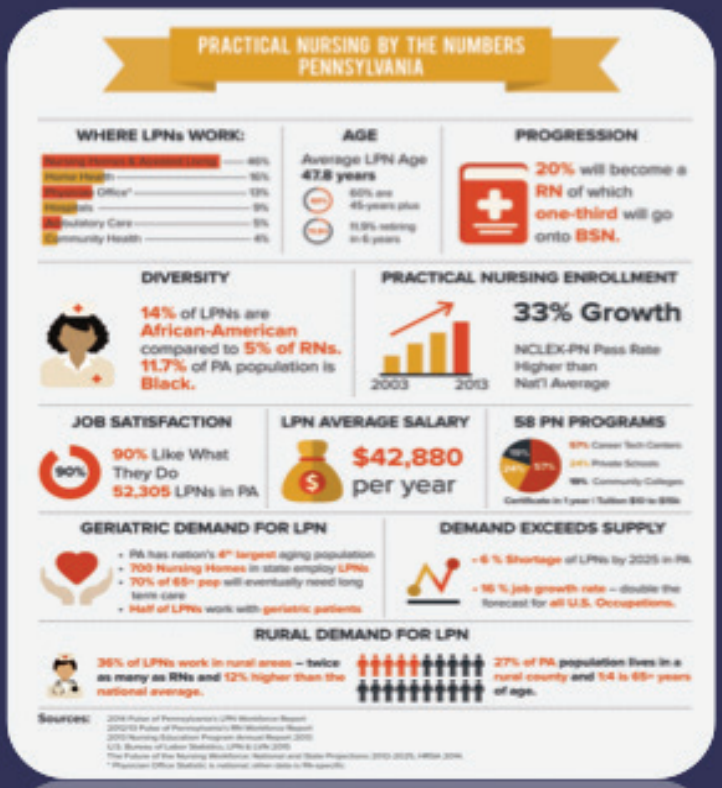
THE PENNSYLVANIA ASSOCIATION OF PRACTICAL NURSING ADMINISTRATORS

PRACTICAL NURSING FRONT & CENTER

THE ROLE, TRENDS & FUTURE OF PRACTICAL NURSING IN PENNSYLVANIA



Pennsylvania Association of

PRACTICAL NURSING ADMINISTRATORS

Pennsylvania Association
PRACTICAL NURSING
ADMINISTRATORS

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Practical Nursing: Front and Center

The Role, Trends and Future of Practical Nursing in Pennsylvania

INTRODUCTION

The role of the Licensed Practical Nurse (LPN) is front and center among a wide range of health care settings throughout the country. Licensed Practical Nurses are found in the frontlines of direct care and in the center of assisting Registered Nurses in developing care plans, conducting focused assessments and collaboration as to the health status and care of patients. The LPN's "front and center" role is so vital in the long-term care industry that skilled nursing and assistive living facilities often consider them the backbone of their nursing team. Nearly half of all nursing care in Skilled Nursing Facilities is provided by Licensed Practical Nurses.[1]

Home health care agencies, hospices, urgent care centers, doctor's offices, rehab centers and prisons all heavily employ Licensed Practical Nurses. And as you'll learn from this White Paper, the demand for LPNs will continue to climb as the nation braces itself for a grey tsunami of chronic care set in motion by the age wave of baby boomers.

We've commissioned this White Paper because we believe it's time to embrace the role of the Licensed Practical Nurse by shedding light on the evolving role of practical nurses in health care, the demand and supply of this position, along with its challenges and future. For decades, there has been the pervasive perception that Licensed Practical Nurses will be phased out in deference to four-year college-educated nurses. As nursing shortages grew over the years, the need for LPNs remained high and the talk of the position phasing out would wane. But even when nursing supply and demand were balanced, the LPN position remained strong as the long-term care industry grew.

In 2011, the Institute of Medicine released a report on "The Future of Nursing: Leading Change, Advancing Health," voluntarily calling for 80 percent of all nurses to acquire a Bachelors of Science in Nursing (BSN) by 2020. This campaign became known as the "BSN 80/20" initiative and it inadvertently gave fodder to the perception that LPNs would, indeed, be phased out. This thinking has been further encouraged by hospitals trending towards hiring BSNs to handle the complex levels of acuity being treated with continuously evolving medical technology while they discharge their patients sooner to skilled nursing facilities that rely on Licensed Practical Nursing. Hospitals are also hiring unlicensed assistive personnel (UAP) to assist nurses, however, some contend that this cost-cutting strategy is replacing the work once performed by Licensed Practical Nurses.

Yet, despite the call for college-degreed nursing to become the entry level degree to the field, the health care industry continues to stimulate demand for Licensed Practical Nurses, and that won't be abating anytime soon. The position's role in meeting the direct care and assessment needs of patients and residents whose education, training and skill-set is geared to hands-on, insightful practical care bodes well for it's continued high demand. On the affordability side, there is no indication that Medicare, state budgets or other third-party payers will be increasing reimbursement rates for home health care, physician visits, hospice care or skilled nursing care in the near future to accommodate the higher salary demands at the BSN level. Nor will families be able to afford to pay for it; they already struggle to cover one-quarter of the nation's long-term care bill out-of-pocket. [2]

In Pennsylvania, the demand for Licensed Practical Nursing will remain one of the highest in the nation due to its ranking as the fourth largest graying state in the country with the largest number of older people living in rural areas that are more affected by nursing shortages. Nearly half of all nursing care in skilled nursing facilities is rendered by Licensed Practical Nurses – not only in direct care but as supervisors, as well. New patients and new venues of care made possible by the Affordable Care Act offer even more career opportunities for practical nursing and nursing on all fronts.

Two years ago, the National League for Nursing, called for the nursing community to explore and implement a timely and inclusive way to support and work with their Licensed Practical Nurse colleagues in a Vision Paper stating that:

> "Licensed Practical Nurses are licensed professionals who share with the entire nursing community a commitment to providing safe, quality, cost-effective care and whose practice behavior is grounded in those shared values. We must ensure that *all* nurses, who touch patients daily in varied health care settings, are acknowledged as *essential partners* to meet the varied needs of today's complex health care system. To accomplish this mandate, it is critical to identify the LPN's current and future role, along with the educational and developmental needs of practical nursing graduates."[3]

It is in this spirit, that this White Paper is written in hopes of advancing the breadth of understanding and appreciation for the Licensed Practical Nurse in Pennsylvania.

The Pennsylvania Association of Practical Nursing Administrators

PRACTICAL NURSING BY THE NUMBERS
PENNSYLVANIA

WHERE LPNs WORK:

- Nursing Homes & Assisted Living ------ 46%
- Home Health ---------- 16%
- Physician Office* ---------- 13%
- Hospitals ---------- 9%
- Ambulatory Care ---------- 5%
- Community Health ---------- 4%

AGE

Average LPN Age
47.8 years

60% are 45-years plus

11.9% retiring in 6 years

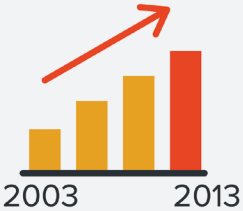
PROGRESSION

20% will become a **RN** of which **one-third** will go onto **BSN.**

DIVERSITY

14% of LPNs are **African-American** compared to **5% of RNs.** **11.7%** of PA population is **Black.**

PRACTICAL NURSING ENROLLMENT



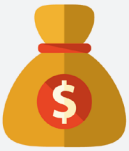
33% Growth

NCLEX-PN Pass Rate Higher than Nat'l Average

JOB SATISFACTION

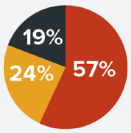
90% Like What They Do
52,305 LPNs in PA

LPN AVERAGE SALARY



$42,880 per year

58 PN PROGRAMS



57% Career Tech Centers
24% Private Schools
19% Community Colleges

Certificate in 1 year | Tuition $10 to $15k

GERIATRIC DEMAND FOR LPN

- PA has nation's **4th largest** aging population
- **700 Nursing Homes** in state employ **LPNs**
- **70% of 65+ pop** will eventually need long term care
- **Half of LPNs** work with **geriatric patients**

DEMAND EXCEEDS SUPPLY

- **6 % Shortage** of LPNs by 2025 in PA
- **16 % job growth rate** – double the forecast for **all U.S. Occupations.**

RURAL DEMAND FOR LPN

36% of LPNs work in rural areas – twice as many as RNs and 12% higher than the national average.

27% of PA population lives in a rural county and 1:4 is 65+ years of age.

Sources:

2014 Pulse of Pennsylvania's LPN Workforce Report
2012/13 Pulse of Pennsylvania's RN Workforce Report
2013 Nursing Education Program Annual Report 2013
U.S. Bureau of Labor Statistics, LPN & LVN 2015
The Future of the Nursing Workforce: National and State Projections 2012-2025, HRSA 2014.
* Physician Office Statistic is national; other data is PA-specific

Developed by the PA Association of Practical Nursing Administrators www.pa-pna.org

I. THE ROLE OF PRACTICAL NURSING

1. History and Scope of Practice

The origins of Licensed Practical Nursing (LPN) begins with a patriotic calling to fill the country's need for nurses on the home front while their registered nurse colleagues cared for wounded soldiers abroad during World War II. The dramatic and rapid deployment of registered nurses during the war created a need to train nurses more quickly than the two-year programs of registered nursing degrees popular at the time without compromising their educational training and ability to competently perform nursing skills. The result yielded practical nursing programs, most of which are offered today through condensed robust programs that can be completed between twelve and 18 months.[4]

Following the war, and subsequent nursing shortages in decades following, the demand remains for practical nurses.[5] Today, the licensed practical nurse position provides the entry point for hundreds of thousands of women and men who seek a career in nursing. On average, one in five practical nurses in Pennsylvania will progress towards two-year Associate Degree Programs to become registered nurses[6] while one-third among them will go onto achieve a Bachelors of Science degree via four-year programs. But the vast majority among the 730,000 LPNs in the United States and the 52,305 licensed in Pennsylvania[7] are drawn to the high touch side of nursing practice in the front lines of direct care.

And what does high-touch, direct care look like? It's explained and detailed through the "Scope of Practice" that governs what Licensed Practical Nurses do.

Scope of Practice

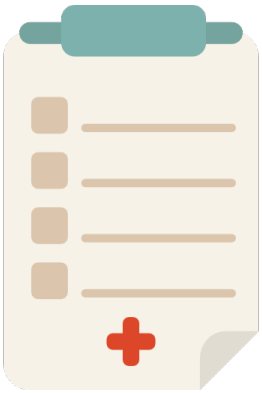
What LPNS can and cannot do is determined, in large part, by each state's nursing licensing body – mostly known as Boards of Nursing. As a result, there is some variance in the role and practice that an LPN plays state by state. For example, after meeting specific education and training requirements, an LPN in Pennsylvania can perform Intravenous (IV) therapy and administer medications whereas in a few states they cannot. Scope of Practice is also identified and promoted by accrediting bodies such as Accrediting Commission on Education in Nursing (ACEN) and Commission for Nursing Education Accreditation (CNEA) that are dedicated to maintaining and advancing the practice standards of nursing.

To learn the parameters of practice among practical nurses in Pennsylvania, we look to the Practical Nurse Law citing the Functions of the LPN (§. 21.145) and subsequent interpretations of the law regarding those functions: (§. 21.414) along with the U.S. Bureau of Labor and Occupational Standards.

Overall, the practice of practical nursing "means the performance of selected nursing acts in the care of the ill, injured or infirm under the direction of a licensed professional nurse, a licensed physician or a licensed dentist which do not require the specialized skill, judgment and knowledge required in professional nursing."[8]

Highlighted Functions of Licensed Practical Nurses in Pennsylvania

- Monitor patients' health by taking vital signs e.g. blood pressure and observing changes in health status.
- Administer basic patient care, including changing bandages and inserting catheters.
- Provide for the basic comfort of patients, such as helping them bathe, dress or eat.
- Discuss the care they are providing with patients, and listen to their concerns.
- Report patients' status and concerns to registered nurses and doctors.
- Maintain records on patients' health in accordance with facility policies.
- Administer medications and therapeutic treatments ordered by authorized practitioners & facility policy.
- Administer immunizing agents and perform skin testing following the education of a State Board of Nursing approved program.
- Initiate and maintain Intravenous Therapy (IV) with additional education & under direct supervision of licensed RN or other authorized healthcare provider.
- Collect venous blood samples.
- Remove simple, uncomplicated sutures.
- Change gastrostomy, tracheostomy and cystostomy tubing when stoma is healed.
- Insert nasogastric tubes.
- Participate as a healthcare team member collaborating on and contributing to patient care plans and ongoing assessment.
- Supervise certificate (non-licensed) personnel such as Certified Nurse Assistants, Medical Assistants and/or other practical nurses.



Core Distinction Between RN and LPN. One of the most distinguishing scope of practice differences between a Registered Nurse (RN) and a Licensed Practical Nurse (LPN) falls under the realm of *assessing* a patient's health status and accordingly, creating *care plans* to address the patient's health care needs.

Developing and overseeing assessments and care plans are considered the role of the Registered Nurse who has the training and education to evaluate and analyze health

status and clinical data. However, the LPN serves a vital role in contributing valuable information and insights towards developing those care plans as clarified by state nursing practice regulations:

> "The LPN is prepared to function as a member of the health-care team by exercising sound nursing judgment based on preparation, knowledge, experience in nursing and competency. The LPN participates in the planning, implementation and evaluation of nursing care using focused assessment in settings where nursing takes place." (Source: Practical Nurse Law; (1) 21:45 Function of the LPN).

Thus, the LPN is not only responsible for directly putting care plans into practice; he or she is continuously conducting *focused assessments* – "an appraisal of an individual's current status and situation, which contributes to comprehensive assessment by the licensed professional nurse and supports ongoing data collection."[9] The LPN's continuous interaction with patients provides an ongoing opportunity to assess a patient's functioning and health status. Augmented with critical thinking skills, the LPN can alert nursing supervisors and other team members that something may be amiss warranting their attention. They focus on caring for patients who are stable; most of whom contend with chronic illnesses and conditions while their Registered Nurse counterparts focus on patients facing acute, unstable conditions.

A focused assessment, as defined by the Pennsylvania State Board of Nursing, is the "appraisal of an individual's current status and situation, which contributes to comprehensive assessment by the licensed professional nurse and supports ongoing data collection." (21.141 Definitions)

The LPN is a *collaborative* team member whose direct care experience with patients or residents provides valuable insight in developing care plans.[10] Practical Nurses, however, do not direct or create care plans or oversee the assessment process on their own.

Overall, the Licensed Practical Nurse plays a central and vital role in providing health care to the public. Most often, you will find them delivering direct care at the frontlines of skilled nursing facilities, assisted living centers, doctor's offices, home health agencies and hospitals. As their title infers, they apply the "practice" of direct, hands-on care with the competency of the clinical skills and knowledge demanded of their licensure status. Their attention is focused on caring for patients who are stable, most of whom contend with chronic illnesses and conditions while their Registered Nurse counterpart focuses on patients

What Leaders in Health Care Say About Licensed Practical Nurses

Home Health Care
"We use the LPNs in daily ongoing care for our *home care and hospice* patients. They do a thorough job providing hands on care, such as wound care and ostomy care and reinforce teaching. They also are excellent aiding us in working with those with a chronic illness that need constant reinforcement to comply with their medical regimen."

Andrea Devoti,*MSN, MBA, RN, CHCE*, Former President and CEO of Neighborhood Health, West Chester
Past President of the National Association of Home Care

. . .

Skilled Nursing Facility Care
"The LPN assumes the role of charge nurse and completes physician orders (e.g. medication and treatment), does focused assessment of resident concerns, communicates with the interdisciplinary team, physicians and families to coordinate care, and manages the nursing assistants. We also have LPN's acting as unit managers who take the added responsibility of assuring that all care is carried out and that issues are addressed with both residents and staff."

Lynne Ahner, RN, MSN, Director of Nursing, Phoebe Ministries|Allentown

. . .

Rehabilitation Hospital
"The LPNs at our *Rehabilitation Hospital* function in a variety of roles including admissions coordinator, case manager and direct care provider. They function to the maximum of their scope of practice and share their excellent clinical and coordination skills."

Barbara Merges RN, Lead Clinical Nurse Educator, Bryn Mawr Rehab Hospital | Malvern

. . .

Pediatric Care
We provide skilled nursing shift care in the homes of *pediatric patients* with many levels of need, including trach, vent, Gastrostomy tube, shunts, oxygen, central lines, TPN, to name a few. The level of skill and expertise, coupled with compassion make the LPN the most valuable part of the patients' in home care.

Maureen O. Pentz, RN, BSN, Clinical Manager, Peritech Home Health Associates |DuBois

. . .

Jails | Correctional Health

"Our LPN staff is a vital part of our day-to-day operations in *correctional health.* Within our company, they hold as much responsibility as our RN staff within their scope of practice, and hold supervisory positions, as well."

Lauren Freeman, RN, HSA |Primecare Medical Inc. at the Lehigh County Jail |Allentown

• • •

Hospice

"I think we should view Licensed Practical Nurses as nurse extenders like we view Physician Assistants as physician extenders. Some of my best experiences in home health care as a team leader are with an LPN. I could case manage twice as many patients with an LPN helping to assure both quality of care and efficiency."

Joni Trizna, RN, BSN, Certified Hospice Palliative Nurse, Case Manager, Neighborhood Hospice, West Chester

THE PRACTICAL NURSING ADVANTAGE

Rewarding Career

Surveys show that nine out of ten LPNs like what they do and enjoy their career in nursing and plan on doing it for a lifetime.

High-Touch Care

LPNs highly interact with and provide direct care to their patients. They help create plans of care, supervise nurse assistants and give direct nursing care from taking vitals, passing medications, administering IVs to wound care and much more.

Affordable Education

Most programs take 1 year of study and clinical practice to become a LPN by passing the national NCLEX-PN exam. Average tuition is between $10,000 – $15,000.

Quickly Get a Job

Most schools report 90 percent job placement quickly following graduation & LPN licensure in nursing homes, home health, doctor offices, urgent care centers, corrections, community health & hospitals.

Employment Growth

LPN jobs will continue to grow 16% to 2025 – more than twice the rate of all occupations. In Pennsylvania, there will be a 6% shortage of LPNs. The growth of the aging Baby Boomer generation will causehigh demand for LPNs for decades.

Solid Living Wage

LPNs can expect to earn $42,880 per year and more with experience. Those who become charge nurses in nursing homes can expect more.

Advance While Working

Flexible “bridge” programs allows a LPN to work and go to school to earn a two-year Registered Nurse degree or a 4 year RN-BSN degree allowing credit for their PN diploma.

Valued Team Member

LPNs are the right-hand for RNs and act as a vital direct-care team member assisting in developing and carrying out nursing care plans. And they bring more diversity to nursing than any other nurse profession.

Developed by the PA Association of Practical Nursing Administrators www.pa-pna.org

2. Where Practical Nurses Work

According to the U.S. Bureau of Labor and Statistics (BLS) Occupational Handbook in 2014, there were 719,900 practical nurses employed throughout the country reporting a median annual wage of $43,170 dollars or $20.76 per hour.[11]

The vast majority of licensed practical nurses work full time, while about 1 in 5 work part time mostly to juggle family life with their careers or pursue further education as a Registered Nurse.

Many LPNs work shifts during nights, weekends, or holidays to meet the 24/7 demands of health care for patients in skilled nursing and acute care facilities. As with other nursing and healthcare careers, practical nurses may opt for extended shifts beyond the standard eight-hour shift.

The work is physically rigorous requiring nurses to remain on their feet most of the time and often helping to lift or assist patients with transferring from chairs, beds, baths and toilets.

In 2014, according to U.S. BLS, the industries that employed the most licensed practical nurses are:

Place of Employment	Percent
Nursing and residential care facilities	38%
Hospitals: state, local, and private	17%
Offices of physicians	13%
Home healthcare services	11%
Government	7%
Other	14%
TOTAL	100%

To gain deeper insights as to where Licensed Practical Nurses work in Pennsylvania, the most recent *2014 Pulse of Pennsylvania's Licensed Practical Nurse Workforce* report indicates a similar national pattern.

Every two years, the PA Department of State's Bureau of Professional & Occupational Affairs and the Department Health's Bureau of Health Planning survey LPNs when they renew their license on employment status and factors related to it such as job satisfaction, amount of hours worked, specialty areas, professional satisfaction, and

intent to remain in nursing. The data does not include first-time licensees or individuals in training.

In 2014, among 52,305 LPN license renewals 95 percent completed the survey, thus, 49,802 practical nurses responded to the survey and offer a solid understanding of the workplace experience for LPNs in the Commonwealth of Pennsylvania.[12]

The 2014 Pulse of Pennsylvania Report on the Practical Nursing Workforce shows the most predominant primary job specialty areas, as follows:

Top Six Employment Specialty Areas of PN in Pennsylvania 2014

Specialty Area	Percent
Geriatric/Gerontology	42%
Home Health	10%
Adult/Family Health	8%
Pediatric/Neonatal	7%
Acute Care/Critical care	5%
Rehab, Mental Health, Medical/Surgical	4% (Each)

Source: 2014 Pulse of Pennsylvania Report on the Practical Nursing Workforce

Top Six Employment Settings of PN in Pennsylvania 2014

Specialty Area	Percent
Nursing Home	38%
Home Health	16%
Hospital	9%
Assisted Living	8%
Ambulatory Care	5%
Community Health	4%

Source: 2014 Pulse of Pennsylvania Practical Nursing Workforce Report

3. Demographic Profile of Licensed Practical Nurses

In terms of demographics of the LPN workforce in Pennsylvania as disclosed by the 2014 "Pulse" report, the average practical nurse is 47.8 years of age while 60 percent of LPNs are 45 years and over. Ninety-three percent are female, 13 percent African/American, 2 percent Hispanic and 84 percent White/Caucasian.

Nearly all (97 percent) live and work in Pennsylvania. Three out of four work full-time while 19 percent work part-time and 7 percent work per diem. Among the 10 percent who report being unemployed, 41 percent say it is due to caring for home and family

while 18 percent reveal that a disability prevents them from working (note that 36 percent of respondents were 55 years and older). The most common place of work for the youngest age groups of practical nursing is skilled nursing facilities.

In large part, Licensed Practical Nurses – nine out of ten – are satisfied and very satisfied with both their career in nursing and their primary job. The 18-24 year old age group and the 65-plus age group indicate being the most satisfied working as a practical nurse among all age groups.

II. THE EDUCATION SECTOR OF PRACTICAL NURSING

1. EDUCATIONAL PROGRAMS IN PENNSYLVANIA

The Pennsylvania Professional Nursing Law and the Practical Nurses Law govern nursing programs in the Commonwealth. In turn, the Pennsylvania State Board of Nursing under the Pennsylvania Department of State develops and oversees regulations based on these laws that prescribe what Practical Nursing programs must fulfill to meet the educational requirements and conduct for nursing schools in addition to the education and practice standards of professional and practical nurses.

As detailed in the most recent "Nursing Education Programs in Pennsylvania Data from the 2013 Nursing Education Program Annual Reports" collected from all nursing programs in the state; the law differentiates between the practice of professional and practical nursing as follows:

> **The practice of professional nursing (registered nurse):** Diagnosing and treating human responses to actual or potential health problems through such services as case finding, health teaching, health counseling, provision of care supportive to or restorative of life and well-being, and executing medical regimens as prescribed by a licensed physician or dentist.
>
> **The practice of practical nursing (licensed practical nurse):** The performance of selected nursing acts in the care of the ill, injured, or infirm under the direction of a licensed professional nurse, a licensed physician, or a licensed dentist that do not require the specialized skill, judgment and knowledge required in professional nursing.

The State Board of Nursing is further charged to establish safe standards for the preparation of registered and practical nurses in approved education programs of which there are four basic types:[13]

- **RN baccalaureate program (RN-BS):** Four-year college degree program of nursing developed under the authority of a regionally accredited university or college.

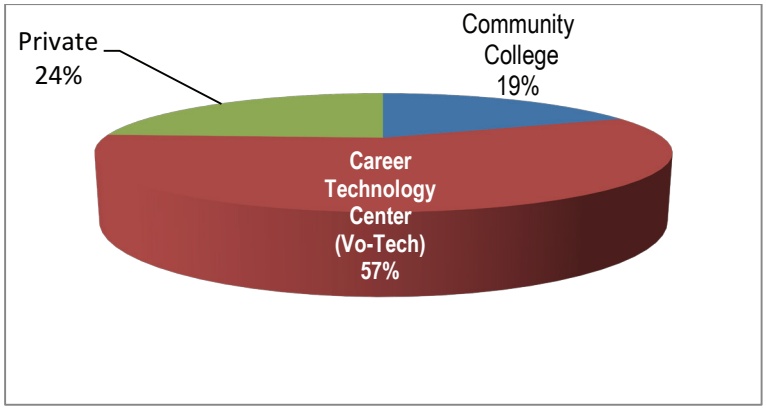
- **RN hospital-based diploma program (RN-DIP):** Approximately a two-year nursing diploma program developed under the authority of a hospital accredited by the Joint Commission.

- **RN associate program (RN-AD):** Two-year college degree program of nursing developed under the authority of a regionally accredited university or college.

- **Licensed practical nursing program (LPN):** A program for the education of practical nurses developed under the authority of a hospital, educational institution, or combination thereof.[14]

As of 2016, there are 58 LPN programs approved by the PA State Department of Nursing. Between 2002 and 2013 there has been a steady growth in the number of programs throughout the state from 42 to 58 programs – an increase of 28 percent. During the past five years, the peak number of 58 programs has held steady and reflects a significantly higher percentage of growth compared to all nursing programs of RN-BS, RN-Diploma, and RN-Associate Degree that show a 7 percent increase. In fact, RN-Diploma programs actually decreased during this time frame by 17 percent, as hospitals opted to no longer offer Practical Nursing programs.

Percentage of Practical Nursing Programs by Type 2013



Number: Community College 11 | Career Tech Centers 33 | Private Licensed 14

Nearly half (48%) of the Practical Nursing Programs in the state are located in rural counties upon which nineteen out of 67 counties in the state do not have *any* nursing program all of which are in rural counties. Twenty-seven percent of Pennsylvania's population lives in rural counties.[15]

2. ACCREDITATION PROCESS

Practical Nursing Programs in the state are approved by the Pennsylvania State Board of Nursing under the Department of State. Beyond state board approval, programs also seek to gain accreditation status for meeting educational and practice standards in the field of education and nursing.

Accrediting bodies review standards and criteria in such areas as: mission and administrative capacity, faculty and staff qualifications that assure student learning outcomes are achieved, student policies and support services foster student learning outcomes, curricula facilitate the achievement of program and learning outcomes in nursing and clinical education, adequate fiscal, physical, technological and learning resources are both sufficient and sustainable and program evaluations provide ongoing assessments that measure student and program outcomes, graduate competencies expected of the profession being accredited and meets the accrediting body's standards.

Practical Nursing Programs voluntarily seek accreditation from educational entities with the authority to award it. Among the 58 programs in the state, accrediting bodies are often affiliated with the "controlling institution" that provides a Practical Nursing program. For example, among the eleven community college programs in the state, nearly all are accredited by Middle States while many of the programs among Career and Technical Schools (formerly known as Vo-Tech schools) and private schools, seek and receive accreditation from the Accrediting Commission on Education in Nursing (ACEN), the Pennsylvania Department of Education, and/or the Accrediting Commission of Career Schools and Colleges (ACCSC). ACEN has granted accreditation status to 41 percent of the Practical Nursing schools in Pennsylvania. Hospital-Diploma schools seek accreditation through the Joint Commission on the Accreditation of Healthcare Organizations (JCAHO) now known simply as "The Joint Commission." Schools may seek and receive accreditation from more than one entity.

Accreditation is a voluntary, peer-review, self-regulatory process by which an accrediting agency recognizes educational programs that meet or exceed standards and criteria for educational quality in its field. The accreditation process assists schools and programs through self-study guides to continuously improve the quality of their program, meet common core educational and, in the case of nursing programs, nurse practice standards, and invest the commensurate resources to achieve results. The accrediting body integrates its review criteria with state and national examination and licensing rules that oversee the preparation for work in the profession to which students are being educated. They also measure benchmarks such as pass rates among students of the school taking their state and/or national licensing exams at the end of their studies.

Other than the benefits gained from the continuous quality improvement (CQI) achieved as a result of going through the accreditation process, the awarding of accreditation allows schools to market themselves as meeting a "gold standard" among their peers strengthening their position to recruit and attract both students and faculty. Furthermore, accreditation offers more availability of financing options for students seeking financial support.

Though there are many advantages for Licensed Practical Nursing programs to become accredited, the "seal of approval" isn't without challenges. Schools operating smaller programs with limited full-time faculty that both teach and oversee clinical placements report that the sizable amount of hours and expense involved in seeking accreditation are beyond their human and financial resources. Programs located in rural counties find it especially difficult to set aside the resources to tackle the rigorous accreditation process.

There have been ongoing discussions as to whether or not all Licensed Practical Nursing Schools in Pennsylvania should seek accreditation by entities that focus on nursing, such as that offered by Accrediting Commission on Education in Nursing (ACEN) or the Commission for Nursing Education Accreditation (CNEA) rather than by an accrediting body that generically reviews educational standards such as Middle States or the Accrediting Commission of Career Schools and Colleges (ACCSC). Currently,
Some posit that accreditation by professional nursing organizations will better assure that educational nursing standards and practices are met, while others believe that as long as schools using entities such as ACCSC show acceptable pass rates on the NCLEX-PN exam and meet program outcomes and goals along with accreditation standards and criteria, then there is no need to use another accrediting body. The authority to make this decision would be made by the Pennsylvania State Board of Nursing.

3. EDUCATIONAL REQUIREMENTS OF PRACTICAL NURSING LICENSURE

The Pennsylvania State Board of Nursing sets forth the curriculum requirements for all licensed nursing programs in the state. The curriculum for a Licensed Practical Nurse must include a minimum of 1,500 hours provided within a time period of not less than 12 months. The Board recommends that a minimum of 40 percent of the total curriculum be theoretical and the remaining 60 percent be in appropriate clinical experience.[16]

A typical course of study covers subject matter that includes:

- Human Anatomy and Physiology
- Legal and ethical principles of nursing practice
- Multicultural nursing concepts
- Medical terminology

- Math and Pharmacology
- Biological functions of cells, tissues, membranes, organs and bodily systems
- Human Health and Diseases
- Nutritional Health
- Focused assessments, care plans, and methods of documentation
- Human Growth and Development from neonatal to geriatric
- Patient safety measures, infection prevention and control
- Medication administration and monitoring
- Pain management and assessment
- End of life care
- Patient hygiene and care
- Patient mobility and transfer practices
- Adult medical surgical care
- Maternal and neonatal nursing
- Pediatric nursing
- Gerontologic nursing, rehabilitation and restorative care
- Psychiatric and mental health nursing practice
- Intravenous Therapy Administration (this requires additional coursework from a nursing board approved program, as does administering immunizations, skin testing, and the performance of venipuncture).

Teaching pedagogies include classroom lectures, case studies, online learning, on-site clinical practicums, interactive high-tech human patient simulator labs, flipped-classrooms, collaborative learning and ongoing evaluative testing to prepare and acclimate students for their NCLEX-PN licensing exam. An overall focus of practical nursing education is to offer students integrated continuous opportunities to apply their knowledge throughout the learning process.

National averages indicate that LPN students can expect to pay tuition of between $10,000 to $15,000 for a one-year program and another $2,500 - $3,500 for out-of-pocket expenses such as books, clinical and lab fees, test prep materials, NCLEX-PN exam and uniforms.[17]

Student loans, grants, scholarships are available to qualifying students to finance their education if the program is accredited by a Title IV-approved entity.

4. ENROLLMENT, ATTRITION AND PASS RATES

A. Enrollment

Since 2003, the total number of students enrolled in Practical Nursing programs both full and part-time throughout Pennsylvania has increased by one-third from 2,772 students to 3,669 in 2013. During the most recent five-year data available (2009-2013), enrollments have steadily grown culminating into a 9 percent growth rate for Practical Nursing during this time period.

This is very similar to enrollment growth of the two-year program of RN-AD at 10 percent. In contrast, RN-BSN program enrollment grew only by 1 percent and RN-Diploma programs decreased by 13 percent.[18]

Of those who apply to enroll in Practical Nursing Programs, 60 percent qualify which is the highest level of qualified applicants among all nursing programs in 2013. In turn, 80 percent of the qualified applicants were admitted to Practical Nursing programs while RN programs admitted 61 percent of their qualified applicants. The most common reasons among RN programs for not being able to admit more students from their qualified applicant pool are lack of physical capacity and limited clinical settings for hands-on training. Practical Nursing programs report “Other” reasons that are most commonly attributed to personal and family reasons among applicants who had been accepted into the program but subsequently did not enroll.[19]

Vacant Seats -- the inability to accept all qualified applicants into a nursing program -- significantly affects enrollment rates. For a fuller discussion on vacant seats, see Section III Supply Factors of this report under Faculty and Clinical Site Shortage.

B. Graduation and Attrition Rates

Between 2002 and 2013, the number of Practical Nurse graduates increased by a remarkable 111 percent reaching 2,613 graduates in 2013 with an estimated 9 percent increase expected in 2014. In comparison, between 2012 and 2013 all RN program graduates decreased by 3 percent whereas PN program graduates increased by 4 percent. The greatest decrease in graduates was among RN-Diploma program students at a 12 percent decrease between 2012-2013. This is partially attributed to the reduction of Diploma Programs from 21 to 19 between 2010 to 2013.

When a student exits a program prior to graduation, it is known as attrition. Nursing programs report attrition statistics for each graduating class to the state. Attrition rates for 2013 increased from the prior year for all nursing programs showing an overall 34 percent attrition rate. Both RN and PN Programs are nearly the same at 34 and 35 percent respectively. The program with the lowest attrition rate is among RN-BSN students at 23 percent; and the group with the highest is RN-AD students at 44 percent.[20]

When queried as to why students leave their programs prior to graduation Practical Nurses are least likely to leave because of academic failure (51%) compared to the combined average of all other nursing programs at 62 percent. Nearly one-quarter of Practical Nurses report that family and personal issues cause them to leave the program, significantly higher than their counterparts who report "Other Reasons" twenty-six percent less.[21]

Fifteen percent of Practical Nursing students who left the program were later readmitted. This number is sizably less than the average of 29 percent for all RN programs. It's likely that the reasons they leave – family and personal issues – are more difficult to overcome than academic failure as experienced by RN students.

C. NCLEX-PN Pass Rates

NCLEX-PN results are reviewed at the end of each examination year extending from October 1 of one year to September 30 of the subsequent year. The data on the numbers of students tested and those who have passed the exam is given to the PA State Board of Nursing each year from the National Council of State Boards of Nursing.

Pennsylvania Practical Nursing students who take the NCLEX-PN exam have consistently passed the exam above national averages from 2011 – 2015 from as high as 8 percent higher in 2012 to 1 percent higher in 2015. Increased thresholds for passing the exam among first-time test-takers has been set by the National Council of State Boards of Nursing. Prior to 2009 the pass rate that nursing education programs were expected to achieve was 60 percent of the graduating class; today it is 80 percent or more among a program's first-time examinees during the examination year.[22]

PN programs, as do all nursing programs, invest a significant amount of resources in preparing students for their national licensing exam by offering training sessions, online study guides, interactive test-taking and exposure throughout their studies to the critical thinking and test-taking skills they will need to take and pass the NCLEX-PN.

III. SUPPLY AND DEMAND OF LICENSED PRACTICAL NURSING

1. SUPPLY FACTORS FOR PRACTICAL NURSING

The supply of practical nurses begins with the number of individuals interested in pursuing a career in nursing, having access to a school offering the program, completing their course of studies and then successfully passing the national licensing exam known as the National Council Licensure Examination (NCLEX-PN).

The attractiveness of a profession in terms of its employability, livable wage and job satisfaction derived from it – are strong and fundamental factors that draw individuals to apply to PN programs. It is a major driver of supply.

And to that end, Practical Nursing does well on all three fronts:

A. Employability

By 2020 it's projected that there will be 370,000 new openings for LPNs nationwide.[23] Many of these positions will open up due to the retirement of Baby Boomers active in the current PN workforce (2015). Overall, this will amass to an "active supply of nursing professionals that will increase steadily from its current 3.5 million nursing professionals to 3.95 million by 2020, including over 3.2 million RNs and 703,000 PNs."[24] The report on "Nursing Supply and Demand Through 2020" by Georgetown University's Center on Education and the Workforce, goes onto say that despite this substantial supply, there still won't be enough nurses to meet demand. In fact, Pennsylvania is projected to experience a 6 percent shortfall of Licensed Practical Nurses by 2025.

Thus, the opportunities for finding a job and being employed will be sizable and steady.

"New Openings" will also be derived from the changing healthcare marketplace and the full implementation of the Affordable Care Act (ACA) that are further explained under "Demand" of this section.

Employability isn't only about securing a job; it's about finding a job that balances work life with family life and allows a pathway towards advancement. Nursing accounts for nearly 60 percent of the 6.1 million jobs in healthcare professional and technical occupations in the United States. And aside from teachers, no other profession employs as many women as does nursing.[25] The ability to work flexible hours including part-time and opportunities to advance

towards higher levels of nursing while supporting a family are significant motivators for those seeking a nursing career.

As a result, many women adopt nursing as a lifelong profession as evidenced by 75 percent of nurses still remaining in the profession after ten years. [26]
Another attractive feature of employability is the progressive pathway of nursing careers. Nearly half of practical nurses (45%) began their careers as certified nursing assistants and within five years attained their LPN license. In 2014, one-in-five report pursuing a higher level of nursing education; among them, 62 percent are seeking a Registered Nurse Associate Degree (two-year) program and 30 percent a Bachelor's of Science Degree in Nursing.[27]

Thus, Practical Nursing is a career that remains highly employable while offering opportunities to progress along the nursing pathway throughout their worklife.

A. Livable Wage

Few careers offer such high levels of employability within a one-year program of education and training and solid earning potential, as does Practical Nursing According to the Pennsylvania Department of Labor & Industry's Center for Workforce Information, a LPN in Pennsylvania in 2016 makes an average annual salary of $42,880 and a mean average rate of $20.62 per hour.[28]
Government, Nursing and Residential Care Facilities and Home Health Care agencies pay among the highest wages for Licensed Practical Nurses.

B. Job Satisfaction

Overall, practical nurses enjoy nursing as a career choice and their jobs. Most plan to remain in the field for a very long time. Among the 32,313 respondents to the biennial license renewal survey of practical nurses in Pennsylvania, nine out of ten were "satisfied or very satisfied" with nursing as a career while 87 percent were "satisfied or very satisfied" with their primary job, in particular.[29]
Younger respondents appear to be the most satisfied with nursing as a career and the majority of them work in geriatrics (mostly nursing homes and assisted living). Working in home health also draws high satisfaction among LPNs. Being valued by the administration was queried of the respondents: those who felt least valued (36%) were among those working in a nursing home while Home Health nurses felt the most valued by the administration.[30] Just over half of practical nurses employed in direct care intend to remain in nursing for the next 16 years.

These findings are similar to a study conducted by lead researcher Dr. Patricia Knecht, Chair of Nursing at Immaculata University, focusing on attributes of job

satisfaction among Licensed Practical Nurses.[31] She found that LPNs who were empowered to fully act within their scope of practice and were valued by their nurse supervisors by seeking their input on patient care via their observations and focused assessments had higher job satisfaction than those who were not given collaborative status: "Lack of clearly defined LPN role and perceived lack of empowerment were described as contributing negatively to LPN job satisfaction. Conversely, LPNs who felt empowered cited empowerment as a critical attribute in job satisfaction."[32]

One of the most contributing factors cited for lack of empowerment is the paucity of clarity from Nurse Practice Acts throughout the country distinguishing the observation and assessment role between the RN and LPN. Lines between the two roles can become especially blurred in long term care settings where LPNs hold positions as charge nurse and are much more likely to have the opportunity to daily assess and observe residents via providing direct care to residents than an RN.

The study also found that LPNs want to gain further education and develop specialized skills that would be recognized in their field, such as certification in working with dementia patients or palliative care. Growth in their career is important to them, however, that doesn't necessarily mean achieving a license as a Registered Nurse: "Many LPNs said that becoming an RN is not a personal goal; they want the opportunities to grow as an LPN."[33]

Overall, LPNs view their career as a "calling" and derive great satisfaction from the connective relationships they develop with residents and family members along with their colleagues. Growth, empowerment, collaboration and feeling valued all contribute towards a work environment that not only increases the quality of life for the LPN but for patients and residents, as well.

Beyond the above three driving factors influencing the supply of Practical Nurses, there are other factors at play when it comes to the Supply-Side of Practical Nursing:

C. Retirement of the workforce

Retirement, of course, provides job openings for those wishing to enter the workforce. One in six (17%) of the 2014 Pulse Report respondents reveal that they do plan on leaving the profession within less than six years and among them, nearly 70 percent are doing so because they are retiring of which three out of four were 60 years and older while the rest of the retiring respondents were nearly all 50 years and older.[34]

The trend of retirement among older age groups can be expected to rise over the next decade signaled by the average age of LPNs who renewed their licenses in 2014 at 47.8 years. In fact, over half (60 percent) were age 45 years and older and one-third were 55 years and older. One in five reported being 60 years and older.[35] The aging of the Practical Nurse workforce will steadily create employment openings for new graduates in the field as demand for nursing care at the Practical Nurse level continues to rise.

D. Faculty Shortage

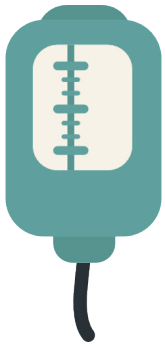
One major challenge that depresses supply of practical nurses is the shortage of nursing faculty available to educate them. The requirement that those teaching RN students must hold a Masters Degree in nursing poses a unique difficulty for programs in rural areas throughout Pennsylvania who don't have ready access to masters prepared nursing faculty. Currently, this shortage isn't as severe for Practical Nursing Programs since faculty may have a BSN to teach. However, if regulations require them to hold a MSN, as well, it will pose a significant challenge.

Overall, the entire country faces a shortage of nursing faculty. The impending retirement of an expected 13 percent of faculty among all nursing programs in Pennsylvania by 2019 and 20.5 percent by 2023 pose the most significant threat in the near future of a faculty shortage in nursing.[36]

The other contributing threat to the faculty shortage is the lack of interest and or incentives among younger nurses to pursue an academic life influenced by lower salaries in academia compared to what they can receive in the private and clinical sector. The demands of time, years of clinical experience and expense required to attain a doctoral degree in nursing is extremely demanding – only 33 percent of all nursing faculty in the entire country has a doctorate in nursing.[37]

F. Clinical Site Shortage

Shortage of clinical sites is due in large part to the need for hospitals, skilled nursing facilities and rehab centers to accommodate all of their local region's schools of nursing and allied health's (e.g. Occupational Therapy, Respiratory Therapy, Physical Therapy) requirement to offer a hands-on, clinical experience for their students.



Nursing education programs are required by state law to establish agreements with clinical agencies to meet curriculum objectives so that students receive a wide range of high quality learning experiences. But the demand can readily exceed supply with just so many clinical spots

available to schools within their community and region.

All nursing programs in the state report that finding clinical sites for their students is difficult: 81 percent among RN-BS programs, 79 percent among RN-AD programs, 53 percent among RN-DIPLOMA programs and 88 percent among PN programs (due in large part to preference being given to RN students or not accepting PN students at settings such as acute care hospitals.[38] The lower rate among Diploma programs is explained by the fact that these programs are offered by hospitals, and thus, providing a clinical experience for them is less difficult than free-standing or university-based programs.

Nearly all nursing programs have invested heavily in high-tech, sophisticated human patient simulator labs to address the clinical site shortage, however, it does not *replace* the need for live clinical experience, it rather complements it.

As a result of these challenges, 59 percent of Practical Nursing Programs in Pennsylvania in 2013 report that they had *vacant seats* -- meaning they could not accept qualified applicants into their program -- amassing to nearly 500 applicants statewide while nearly half of BSN programs also report vacant seats. The most common reasons given by the Practical Nurse Programs for vacant seats were: 44 percent were at *both* physical and clinical capacity and nearly one-third had reached faculty capacity. A resounding 59 percent of Practical Nursing vacancies are located in rural areas.[39]

Despite the challenges affecting supply between 2006 – 2013; the percent of vacant seats has remained relatively steady among PN programs averaging at 51 percent. The number of programs in the state steadily grew from 48 in 2006 to 58 in 2013 showing a 17 percent increase.[40]

2. DEMAND FACTORS FOR PRACTICAL NURSING

A. The Aging Demographic & Chronic Care

One of the most significant factors driving the demand particularly for Practical Nursing and health care in general, is the graying of the U.S. population. Between now and 2030, over 70 million baby boomers will cross the 65 year-old threshold. In 2010 this age group comprised 13 percent of the overall population – 12 times higher than what it was in 1900 -- and by 2050, one in five persons will be 65 years and older.[41]

Pennsylvania is among the four highest-ranking states in the country with the highest percentage of older people among their populations (Florida, West Virginia, Maine and Pennsylvania). The state also nationally ranks fourth in the

percentage of older people 85 years and older and that population segment is expected to exceed over 400,000 by 2030. Today, Pennsylvania heralds an older population of just over 2 million people over the age of sixty-five years and by 2030 they will account for nearly 25 percent (23.5%) of the state's citizenry while the rest of the country's 65-plus cohort will account for one-fifth of the population.[42] [43]

Though many hope to age well and forgo a life of chronic care, the reality is otherwise. Today, the 65-plus year age group accounts for:[44]

34 percent of all surgical procedures
26 percent of all physician office visits
90 percent of all nursing home residents

An estimated 70 percent turning 65 years will likely require long-term care in their lifetime averaging three years of care. Eighteen percent will require more than one year of care in a skilled nursing facility.[45]

To gain a more thorough understanding of the demand for nursing care caused by this graying tsunami, it's best to look at the profile of the nation's Medicare population. Medicare provides health insurance to 39 million people ages 65 and older and 8 million beneficiaries who are under age 65 and permanently disabled. Between 1966 and 2000, the number of people on Medicare more than doubled, and is projected to double yet again to 80 million by 2030.[46]

According to the Kaiser Family Foundation's seminal Medicare Chartbook 2010, the following health profile of Medicare beneficiaries captures the health care demands of this population:[47]

- Nearly 3 in 10 Medicare beneficiaries (28%) report being in Fair or Poor health.
- Ninety percent of non-institutionalized elderly report living with one or more chronic conditions.
- Nearly half (46 percent) grapple with three or more chronic conditions, hypertension and arthritis being the most common at 61 and 64 percent respectively.
- Nearly one-third (31 percent) suffers a cognitive or mental impairment.
- More than one-fourth report being in fair or poor health (28 percent) or having a limitation in activities of daily living (ADL) such as eating, dressing or bathing (29 percent).

- Nearly half (48 percent) of those 85 years and older, have a functional impairment and one-third (33 percent) have a cognitive impairment.
- Among the non-elderly disabled; 68 percent have a mental or cognitive limitation, and 42 percent report a functional impairment.
- Overall, nine of every ten non-institutionalized Medicare beneficiaries report living with one or more chronic illnesses;
- While the prevalence of many conditions increases with age, other conditions, such as diabetes and cognitive or mental impairments, are more prevalent among nonelderly Medicare beneficiaries with disabilities.
- Nearly one-third (30%) had at least one visit to the Emergency Department, 21 percent had an inpatient hospital stay, 8 percent had a Home Health Visit, and 5 percent experienced a Skilled Nursing Facility Stay in 2006.

This overall health status of the country's Medicare population translates into health care costs that comprise approximately 15 percent of the federal budget and 20 percent of total national health spending in 2010 and a rising share of the nation's gross domestic product (GDP). This further accounts for Medicare paying 40 percent of the nation's total home health care spending, 30 percent of hospital spending, and 24 percent of prescription drug costs. Inpatient hospital services continue to account for the largest share of Medicare benefit payments (27 percent), followed by managed care Medicare Advantage plans (23 percent) and payments to physicians (13 percent).[48]

Pennsylvania's Medicare Population

All of this national data is particularly relevant for Pennsylvania as 18 percent of the state's population is a Medicare beneficiary – among the highest proportions in the country. The national average in 2010 was 15 percent. This means that the growing health care needs of this population will not only mirror the country's but it will do so more intensely. Furthermore, the demand for long term care treating the myriad of chronic care conditions among the 65 year-plus population will not be subsiding anytime soon. In fact, population projections show that by 2050 one-in-five persons in the United States will be 65 years and older. In Pennsylvania, it will account for closer to one-third of the population at 29 percent.

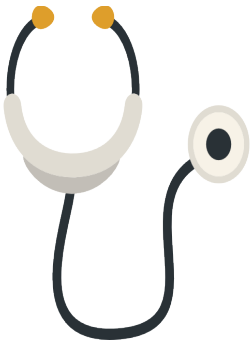
In Pennsylvania, there are over 700 skilled nursing facilities with more than 88,000 beds that on average show a 91 percent occupancy rate. The typical resident is female, widowed and 85 years of age suffering from some form of dementia in addition to three or more chronic conditions, some of which, affects her ability to perform the tasks of adult daily living (e.g. eating, bathing, grooming, mobility). As hospitals discharge older patients more quickly, such as

for hip and knee replacement, the numbers of short-stay residents in skilled nursing facilities requiring intensive rehabilitation is becoming more frequent. Thus, Skilled Nursing Facilities in Pennsylvania are most poised to tap the nursing skills of Licensed Practical Nurses, in large part, due to the role they are licensed to play in providing direct care and overseeing care given by certified nursing assistants. State and federal regulations requiring specific levels of care and appropriately licensed staff rendering it, governs "who provides what" including the payments made accordingly for that care.

As evidenced by 40 percent of Licensed Practical Nurses working in the field of geriatrics and gerontology and 10 percent in home health that treat high numbers of older patients (2014 PA Pulse Report of the PN Workforce); it is clear that the demand for practical nursing is and will remain high in the field of long term care. Though there have been national policy discussions and efforts to eventually require all individuals entering the nursing profession to begin with a four-year baccalaureate degree (BSN), the reimbursement rates by Medicare and other insurers would not at current levels cover the additional costs attributed to the BSN prepared nurse working at skilled nursing facilities.

Thus, from the perspective of employers in the long-term care industry; they will continue to rely on the Practical Nurse, who in large measure, they consider as the backbone of nursing care:

"Nothing is more important for quality care in nursing facilities than staffing. It is critical to have a sufficient number of well trained nurses to care for and assess residents 24 hours a day; 7 days a week. Finding enough qualified nurses is becoming an increasingly larger problem as our society ages. Licensed Practical Nurses are an important component in allowing nursing facilities to meet the growing demand for services for older adults. Currently, 47 percent of licensed nursing hours in long-term care facilities are provided by LPN's.[49] Without LPN's, Pennsylvania's nursing facilities would find it nearly impossible to provide the care required by their residents."



Ron Barth, CEO LeadingAge Pennsylvania

" As hospitals discharge patients earlier, and we see the continuum of care shift from hospitals to skilled nursing facilities, and assisted living and personal care in the home and community – LPNs will play an even greater role than a lesser one. I don't see the phasing out of the Practical Nurse position but rather the growth of it as Baby Boomers age and the demand for their health care continues to escalate."

Eva Bering, Vice-President of Operations
Landis Homes -- A Non-profit Continuing Care Retirement Community
Lititz, Pennsylvania

Nearly, half of all licensed nursing care in skilled nursing facilities in the state is provided by Licensed Practical Nurses and they also provide the majority of licensed nursing care for the 750,000 elderly living in assisted living/residential care facilities across the country.[50]

B. Other Drivers in the Healthcare Marketplace

There are number of other driving forces in the Healthcare Marketplace that will influence the demand for licensed practical nurses.

Shifts Along the Care Continuum. A major force is the shifting of levels of care all along the Long Term Care continuum. As hospitals discharge people sooner and look to skilled nursing facilities to offer short stays for rehabilitation and as same-day and overnight surgical procedures discharge patients directly to their homes and in the hands of home health care providers – the need for skilled nursing care will follow the patient to these changing venues along the continuum. For example, nursing homes and licensed assisted living facilities now provide levels of care that were previously considered only to be practiced within the realm of hospitals (such as wound care, IV therapies, ostomy care).

Conversely, as hospitals focus on complex acute care cases, their demand for Registered Nurses at the BSN and Advance Practice Nurses level has risen. Some hospitals in recent years responding to this care shift, no longer hire Licensed Practical Nurses. This doesn't mean, however, that there are fewer jobs in the aggregate for the Licensed Practical Nurse. Most are gravitating to skilled nursing facilities, assisted living facilities and home health care agencies where their position is in demand. Moreover, as shown by the favorable job satisfaction rates among nurses working in skilled nursing facilities (Pulse Report LPN 2014), the key role the LPN plays as a Charge Nurse overseeing direct care nursing assistants and working as the right hand with the Registered Nurse, offers a challenging and meaningful leadership role that can not be afforded them in the acute care setting dominated by RNs and BSN nurses.

Urgent Care/Retail Clinic Movement. According to Accenture, "Retail clinics and urgent care settings expect to provide significant help to address capacity constraints at hospitals and primary care offices."[51] Today there are approximately 1,900 "convenient care" retail clinics across the country. It is projected that by 2016, the number of retail clinics (such as Walmart, CVS, Walgreen's) will grow to 3,000. In 2013, there were approximately 6,400 urgent care centers in the U.S. of which 38 percent were located in shopping centers and strip malls, and 32 percent in free-standing buildings. The urgent care market is expected to grow 6 percent a year until 2018, according to IBIS World

while Retail Clinics are projected to grow 25 to 30 percent annually. Overall, this sector will offer new job opening from LPNs to Nurse Practitioners.[52]

The Affordable Care Act (ACA). Even though discussions are underway for the 2017 Congress and new President to reconsider various aspects (or all of) the Affordable Care Act, there are two essential ways that this legislation impacts nursing: first, it accesses the doors to health care for millions of people who had lacked health insurance and secondly, it increases financial resources to enable increased enrollment and program completion by nurses. Grants to schools to assure retention of students, assist with tutoring and developing mentorship programs are available. ACA also attempts to remedy the shortage of nursing faculty through a variety of incentives and financial support, for example, in lieu of repaying student loans, a student commits to work as a faculty member for two years. It is not clear as to whether these provisions will be affected by the new Administration.

Since the passage of the Affordable Care Act five years ago, about 16.4 million uninsured people have gained health coverage which dramatically reduced the percentage of Americans without health insurance. In turn, this means that more people will be receiving health care, which will increase the need for nurses and other healthcare providers. A venue that opens new opportunities for health care coordination and direct care is through Accountable Care Organizations (ACOs). These groups of providers and insurers combine their efforts to place patients at the center of their care with the goal of reaching better health outcomes for the patient. In 2016, more than one in fourteen Americans received their health care from one of the 700 ACOs established by Medicare and other payers.[53]

Overall, the health care marketplace will offer steady and strong job opportunities in traditional settings such as skilled nursing and assisted living facilities, home health and physician offices for the Licensed Practical Nurse along with newer opportunities resulting from offering care at home, in the community and removed from acute care settings such as those seen with the growth of the “Convenient Care” and “Urgent Care” movement.

3. Labor Employment Projections for Practical Nursing

The supply of practical nurses begins with the number of individuals interested in pursuing a career in nursing, having access to a school offering the program and being able to complete their course of studies and then successfully passing the national licensing exam known as NCLEX-PN (National Council Licensure Examination). This same entity provides the NCLEX-RN exam for those seeking Registered Nurse

qualification. Nationally, between 2001- 2013, individuals who passed the NCLEX-PN grew by 90,000 new nurses yielding an overall growth rate of 16 percent.[54]

Trends in LPN supply and demand are forecasted by the Health Resources Services Administration (HRSA) in their report, "The Future of the Nursing Workforce: National and State Level Projections 2012-2025." The report indicates that in 2012 approximately 730,000 LPNs were actively working and projected that this number will likely grow by 28 percent by 2025 to 990,900 full-time practical nurses.[55]

However, this is based on workforce trends prior to the Affordable Care Act being fully implemented (experts predict the law will create more jobs for LPNs) and assumes that LPNs train at current levels and new entrants along with attrition rates remain stable. Other studies, such as "Nursing Supply and Demand Through 2020," by Georgetown University's Center on Education and the Workforce, project that there will be less supply and greater demand for LPNs than the supply excess of 6 percent estimated nationally in the HRSA Report. [56]

Though the HRSA Report projects that the *national* LPN supply will slightly exceed demand in 2025, it does cite, however, that the supply of Licensed Practical Nurses in Pennsylvania will not follow national trends and actually shows the inverse with a projected shortfall of Licenses Practical Nurses in 2025 of six percent. Thus, demand will be higher to fill the projected growth of LPN positions in Pennsylvania.

According to the latest available data from the U. S Bureau of Labor Statistics, there were 719,900 LPN jobs in 2014 with a very promising occupational growth rate of 16 percent between 2014-2024 yielding 837,200 jobs within the decade. This growth rate is slightly over twice as high as the national rate forecasted for all occupations in the U. S. economy at 7 percent.[57]

As of 2012, Pennsylvania employed 41,380 licensed practical nurses and by 2025 should expect to fill 44,990 positions.[58] The 2014 Pulse of Pennsylvania's LPN Workforce Report indicates similar numbers of employment among LPNs who responded to the biennial survey when they renewed their license. Of them 37,398 report being employed in nursing some of whom (12 percent) work two jobs which accounts for the discrepancy in figures between BLS Occupational Data and the Pulse LPN 2014 report, and allowing for the two years difference in the data collected.[59]

Practical Nurses who renewed their license and reported being unemployed state that their primary reasons are: opting to take care of home and family (41%), being enrolled in a nursing education program (4%), being disabled (16%) and currently facing some difficulty in looking for a nursing position (16%).[60] Overall, based on supply and demand of the occupation and labor projections

Licensed Practical Nurses can look forward to a steady flow of employment opportunities in Pennsylvania clearly for the next decade and most likely beyond.

IV. PRACTICAL NURSING'S RETURN ON INVESTMENT & FUTURE

1. Return on Investment

A. The Promise of the Progression Pathway

The nursing profession offers a progressive pathway towards advancement in the field all the way from a licensed practical nurse to an advanced practice nurse and ultimately a doctorate. All along this educational continuum, an individual can take incremental steps towards advancement while meeting their economic, family and career needs.

The Nursing Pathway

Licensed Practical Nursing

In Pennsylvania, the State Board of Nursing distinguishes between the "Practice of Practical Nursing," and the "Practice of Professional Nursing." Practical Nursing can be pursued by completing a one-year program upon which graduates receive a certificate and take the national NCLEX-PN licensing exam. They practice nursing under the supervision of a Registered Nurse, physician and/or dentist and their scope of practice focuses heavily on direct care while participating in the planning, implementation and evaluation of nursing care by conducting focused assessments.

Programs are offered by educational institutions approved by the State Board of Nursing mostly provided by public and private Career and Technical Schools and community colleges that seek voluntary accreditation. On average, one out of five Licensed Practical Nurses will go onto to receive additional education and licensure to become a Registered Nurse through "bridge programs," while the vast majority embrace Licensed Practical Nursing as their vocation for a lifetime.

Professional Registered Nurse

The "Practice of Professional Nursing" can be pursued one of three ways:

1. RN-Diploma program usually of two to three years duration provided by and at a hospital. Graduates receive a diploma and take the NCLEX-RN exam to become a Registered Nurse.

2. RN-AD program usually of two years duration and often offered by community colleges, public and private Career and Technical Schools and some universities. Graduates receive a degree and take the NCLEX-RN exam to become a Registered Nurse.

3. RN-BSN is a four-year baccalaureate program upon which graduates receive a Bachelor's in Science degree and take the NCLEX-RN exam to become a Registered Nurse.

Bridge Programs also known as degree-completion programs often offer matriculation agreements that allow nurses to apply their current certificate or degree towards achieving a more advanced nursing degree such as LPN to ASN and ASN to BSN. Accelerated, second-degree bachelor's programs for students who already possess a baccalaureate degree in another field are also available for those wanting to pursue a BSN.

Masters in Nursing (MSN) to Doctorate

Nurses with a BSN who want to advance their careers in higher education can do so by pursuing a Masters in Nursing Degree that will prepare them for a wide range of practice, teaching and leadership roles. Masters-prepared nurses are eligible to further advance to the doctoral level leading to either a research-focused terminal degree (PhD, DNSc, DSN) or a practice-focused Doctor of Nursing Practice degree (DNP). Many of these programs are blended courses with a heavy emphasis on online coursework. With the growing need for more faculty, a variety of programs and incentives are being offered to Registered Nurses to help them effectively and seamlessly move along the education continuum.

Advanced Practice Registered Nursing

As described by the National States Board of Nursing (NSBN), Advanced Practice Registered Nurses (APRN), "are registered nurses educated at Masters or post Masters level and in a specific role and patient population. APRNs are prepared by education and certification to assess, diagnose, and manage patient problems, order tests, and prescribe medications."[61] There are four major practice areas for Advance Practice Registered Nurses who hold a masters degree:

Certified Nurse Practitioner (CNP)
CNPs are educated and practice at an advanced level to provide care, independently, in a range of settings and in one of six patient populations (family/individual across the lifespan, adult-gerontology, neonatal, pediatrics, women's health/gender-related or psych/mental health).

Clinical Nurse Specialist (CNS)
The CNS is educated at an advanced level to care for patients in one of the six populations (family/individual across the lifespan, adult-gerontology, neonatal, pediatrics, women's health/gender-related or psych/mental health).

Certified Registered Nurse Anesthetist (CRNA)
The Certified Registered Nurse Anesthetist is prepared to provide the full spectrum of patients' anesthesia care and anesthesia-related care for individuals across the lifespan. This care is provided in diverse settings, including hospital surgical suites.

Certified Nurse-Midwife (CNM)
The certified nurse-midwife provides a full range of primary health care services to women throughout the lifespan, including gynecologic care, family planning services, preconception care, prenatal and postpartum care, childbirth, and care of the newborn. This care is provided in diverse settings, which may include home, hospital, birth center and a variety of ambulatory care settings including private offices and community and public health clinics.

Nursing offers a range of entry points along its career pathway with bridges that allow a nurse to continue advancing in the profession while working, raising a family or transitioning from another career to nursing. Each year, innovative strategies are being offered to assist those who want to enter the field, as well as those who want to advance.

The commitment to grow an excellent, competent, and well-educated nursing workforce all along the profession's pathway requires that:

> "Nurse educators must continue to work together to ensure that nursing remains an attractive career choice, that graduates from **all** types of nursing education programs are well prepared to enter the workforce, and that these graduates have access to multiple pathways for academic progression, in-order-to meet the challenges of contemporary nursing practice."[62]

C.Fay Raines, PhD, RN and M. Elaine Taglaireni, EdD, RN
"Career Pathways in Nursing: Entry Points and Academic Progression."

PATHWAYS IN NURSING

Licensed Practical Nursing
1 Year
Pass the NCLEX-PN
National Licensure Exam
LPN

Associate Degree in Nursing
2-3 Years
Pass NCLEX-RN
National Licensure Exam
RN

Bachelors Science in Nursing
4 Years
Pass NCLEX-RN
National Licensure Exam
RN-BSN

$43,170

LPN-ADN Bridge

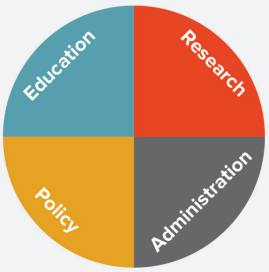
$67,490

ADN-BSN Bridge

$75,484

GRADUATE EDUCATION
MASTERS SCIENCE IN NURSING (MSN)

MSN Prepares Nurses for Positions in:



ADVANCE PRACTICE REGISTERED NURSES
(Requires MSN & Pass National Certification Exam)

Nurse Practitioner (NP)
Median Salary $92,000

Clinical Nurse Specialist (CNS)
Median Salary $94,000

Certified Registered Nurse Anesthetist (CRNA)
Median Salary $149,000

Certified Nurse Midwife (CNM)
Median Salary $79,000

DOCTORAL EDUCATION

Doctorate-prepared nurses hold teaching, research, academic, and high-level management positions in public & private sector.

Masters in Nursing (MSN)
Education, Administration, Research

APRN
Masters as Advanced Practice Nurse

PhD
Doctorate of Philosophy in Nursing

DNP
Doctorate in Nursing Practice

$85,000 to $135,000

Wage Sources: Bureau of Labor Statistics, Occupational Outlook Handbook, 2016-17 for LPN and RN National Annual Median Salary; BSN Salary from American Association of Colleges of Nursing, 2014 National Average. Masters Degree Salaries and Doctoral from Indeed.org, Pennsylvania Annual Median Rates, September 2016.

Developed by the PA Association of Practical Nursing Administrators www.pa-pna.org

B. Diversity, Inclusion and Culturally Competent Care

From the Institute on Medicine's seminal Report on "The Future of Nursing" (2010) to the National League of Nursing's Vision Series on the Role of Practical Nursing (2015), nearly every report discussing the future of nursing calls for a more diverse health care workforce. As the U.S. population continues to become more diverse, so is the need for health care providers to better reflect the people they serve. The Institute of Medicine report and a subsequent review of it five years later, indicates that "a more diverse workforce will better meet current and future health care needs and provide more culturally relevant care."[63] And as the Campaign for Action Diversity Committee sponsored by the Robert Wood Johnson Foundation states, "To better meet America's health needs and contribute to a Culture of Health, the nursing workforce needs to reflect the great multitude of ethnicities, races, and cultures within the country's communities."[64]

The Future of Nursing Progress Report continues to call attention to the lack of diversity among the nursing workforce. According to the report, African Americans make up nearly 14 percent of the U.S. population among those aged *20 to 40 years* (prime working years) while only 9 percent of baccalaureate registered nurses are Black. The disparity is greater among Hispanics with only 7 percent as BSN nurses.

The Licensed Practical Nurse workforce, however, represents more minorities than any other nurse (e.g. RN-Diploma, RN-Associate Degree, BSN). According to the Health Resources and Services Administration, in their "The U.S. Nursing Workforce" Report (2013), nearly one-quarter (23.6 percent) of the LPN workforce is African-American as compared to 9 percent of the RN workforce. Hispanic/Latino nurses in the LPN workforce constitute almost double that of the RN workforce (7.5 percent vs. 4.8 percent). In 2012, about 40 percent of LPNs nationwide were from minority backgrounds – most of whom are African-American.[65]

In Pennsylvania, among the nearly 50,000 respondents to the "2014 Pulse of Pennsylvania LPN Workforce" survey, 14 percent report to be African-American and 2 percent Hispanic or Latino. The most recent "Pulse of Pennsylvania's Registered Nurse Workforce Report for 2012/13" shows that among the 186,659 Registered Nurses licensed in Pennsylvania responding to the annual survey, 5 percent identify as Black and 2 percent as Hispanic/Latino. Thus, Licensed Practical Nurses are significantly more diverse than Registered Nurses; in fact, they are decidedly more than twice as diverse (64 percent).

In 2015, the most recent U.S. Census Bureau statistics available among Pennsylvania's general population of 12,802,503 people, African-Americans account for 11.7 percent among all ages and Hispanics 6.8 percent of the population representing a minority population in Pennsylvania of 18.5 percent.

Thus, state trends show that Pennsylvania is similar to national trends among practical nurses who are more diverse than their professional registered nurse colleagues. However, when comparing how similar the proportion of the LPN workforce in Pennsylvania reflects the racial make up of the state's general population; the state slightly lags behind national trends. The LPN population is 15 percent African-American and Hispanic while both groups account for 18.5 percent of the Pennsylvania general population.

The Licensed Practical Nurse position acts as the entry point to the professional pathway of registered nursing. The accessibility of the program is especially attractive to minorities and adults looking to change a career in terms of:

- Affordability
- Achieving a certificate and license within 12 months.
- Earning a livable wage of $40,000 a year and more to support a family.
- Ability to advance one's education while working along the registered nursing pathway.
- Employability in the high-demand long-term care and community-based care sector.
- Opportunity to practice nursing to the fullest extent of one's training and license.

One of the most significant returns on investing in Licensed Practical Nursing is the opportunity to grow a culturally diverse workforce that will advance health care for all populations. Amidst the multiple ways of pursuing nursing, the Practical Nursing program has consistently been in the forefront in attracting and graduating minority nurses and is in a solid position to create incentives and offer support services to encourage even more people of color to pursue a career in nursing all along its pathway.

Males entering the female-dominant nursing field contribute towards a more diverse workforce via gender. Nationally, men's representation among Licensed Practical Nurses has been growing from 3.9 percent in 1970 to 8.1 percent in 2011.[66] Pennsylvania with 7 percent of LPNs as males is aligned with national trends (2014 Pulse of PA Nursing Workforce Report).

C. Rural Access to Nursing Care and Education: The Practical Nurse Connection

Pennsylvania is one of the most populated states with rural residents in the nation. According to census and state population data presented by the Pennsylvania Rural Health Association, nearly 3.5 million people, or about 27 percent of the state's 12.7 million residents lived among Pennsylvania's 48 rural counties in 2010. On average, Pennsylvania rural residents are older than their urban counterparts and their population is growing: During the decade of 2000 to 2010, the number of rural seniors increased by 5 percent compared to urban seniors increasing by only 1 percent.[67]

The Rural Health Association's most recent "Status Check V Report" on "Pennsylvania Rural Health Care," forecasts that the number of senior citizens 65 years of age and older in rural Pennsylvania is projected to increase by 58 percent between 2010 to 2030 accounting for an estimated 25 percent of the total rural population in the state. This geriatric demographic results in a rural population with greater numbers of older people than children and youth.[68]

As discussed earlier in this report, an aging population creates high demand for health care, especially, in the treatment of chronic conditions, rehabilitation and skilled nursing care. Older people living in rural areas are at higher risks of isolation, loneliness and depression than urban elderly due to lack of public transportation and the reliance on living at home in remote areas without receiving support services. Rural residents, in general, suffer higher poverty rates than urban dwellers and report a higher incidence of malnutrition, obesity, smoking, cardiovascular disease, alcoholism and sedentary lifestyles.[69]

According to the Center for Rural Pennsylvania's Demographics "Quick Facts:" Rural counties have fewer primary care physicians than urban counties and dentists. In 2008, there was one rural primary care physician for every 1,507 residents compared to one primary care physician for every 981 urban citizen. Rural counties also report less hospitals than urban centers, in fact, seven counties have no hospital, at all (2010).[70] The shortage of physicians, nurses and other health care providers translates into less people being diagnosed and treated in rural communities.

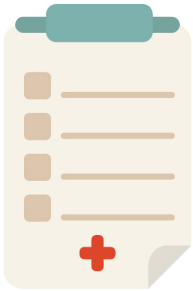
Amidst this challenging health care environment, a sizable number of Practical Nurses work in rural counties in Pennsylvania as evidenced in the 2014 Pulse of Pennsylvania's Licensed Practical Nurse Workforce Report at more than one-third (36 percent) reporting that their primary job providing direct care is located in a rural county.[71] This is significantly more compared to

the 20 percent of Registered Nurses employed in rural counties in Pennsylvania.[72] Nationally, Pennsylvania's rural Practical Nurse Workforce is pointedly higher than the national trend of 24 percent of the LPN workforce living in rural areas and 16 percent of Registered Nurses in rural communities. For comparison, 17 percent of the U.S. population lives in rural areas.[73]

The concentration of practical nursing in rural areas is also reflected by the higher number of Practical Nursing educational programs – nearly half of them – located in rural counties as compared to 27 percent among Registered Nursing programs. Overall, nineteen of sixty-seven rural counties (28 percent) in PA don't have either Practical Nursing or Registered Nursing programs. [74]

All of this portends substantial health care challenges for rural communities of which Licensed Practical Nurses, whether working in schools, primary care clinics, doctor's offices, skilled nursing and assisted living facilities, are front and center among the healthcare workforce. This holds true, even in rural hospitals whereby 29 percent of Licensed Practical Nurses work. Given that rural areas have a lower per capita supply of RNs than urban areas, it is fair to assume that the Licensed Practical Nurse is a very valuable resource now and will be in the future in addressing health disparities among rural communities.[75]

2. The Future: An Agenda for Licensed Practical Nursing



The Pennsylvania Association of Practical Nursing Administrators conducted a survey among their members as to what they believe are important steps PAPNA can take to advance the future of Licensed Practical Nursing in Pennsylvania. In addition, the "Thought Leaders" for this White Paper along with the Executive Committee and all PAPNA members attending a work session at the annual fall conference considered and proposed supplemental strategies beyond the feedback from the survey.

The team also reviewed steps relevant to Pennsylvania that were presented in the National League for Nursing's Vision Series of Living Documents on a "Vision for Recognition of the Role of Licensed Practical/Vocational Nurses in Advancing the Nation's Health."

Overall, the following steps and strategies are presented to ensure and advance Licensed Practical Nursing:

- Promote public, stakeholder and policymaker educational awareness that informs each of the role, value and future viability of Licensed Practical Nursing in Pennsylvania.

- Secure greater representation of Licensed Practical Nursing educators and administrators on advisory committees among stakeholders, the State Nurse Licensing Board and other forums that impact upon the practice and regulating of Licensed Practical Nursing.

- Develop and promote learning partnerships and "Thought Leader" sessions with major health care industry partners that significantly employ LPNs to identify mutual interests and strategies to advance quality health care and enhance the education of LPNs by: exploring emerging healthcare demands, changing needs of patients, ongoing forces influencing supply and demand, workforce preparation expectations among employers of LPN graduates and how to address the shortage of clinical placements for PN students.

- Collaborate with relevant stakeholders on ways to best align education practice and curricula, health care demands and workforce needs with regulations of Licensed Practical Nursing.

- Advocate for funding, tuition reimbursement from employers, flexible work schedules and streamlining of matriculation agreements that promote the ability of Licensed Practical Nurses to progress in their education to RN and BSN should they desire to do so.

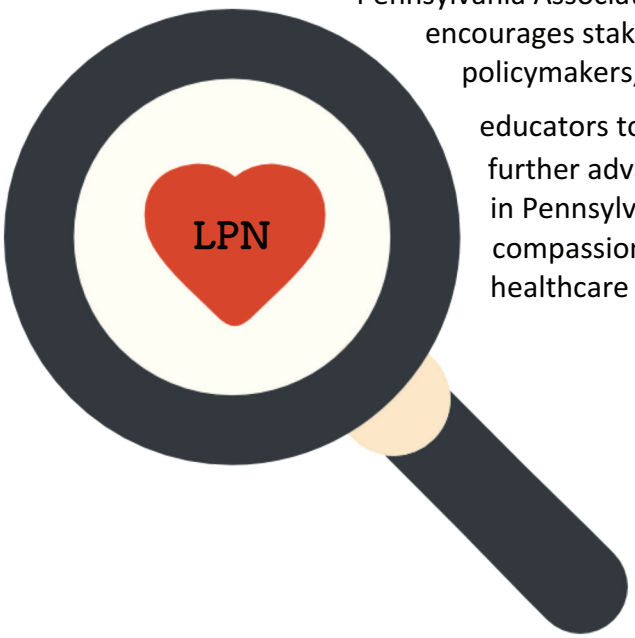
- Promote and assist with the development of a statewide, standardized curriculum that fosters consistency and best practices in Practical Nursing Education.

- Champion the development of advanced practice certifications within Licensed Practical Nursing by collaborating with LPNs, health care employers, educators, PA State Board of Nursing, and Practical Nursing Program Administrators across the Commonwealth.

- Explore ways to strengthen Practical Nursing's asset of attracting diverse and minority populations to the career by meeting with stakeholders and minority nurses to identify opportunities, challenges and innovative strategies to attract a culturally diverse student body and mentor them through successful completion and licensure.

Our Intention

In the spirit of engaging these strategies and reviewing the findings of this report, the Pennsylvania Association of Practical Nursing Administrators encourages stakeholders, consumers, healthcare providers, policymakers, Licensed Practical Nurses and nursing educators to marshall their insights and resources to further advance the status of Licensed Practical Nursing in Pennsylvania as they address and treat with compassion and excellence the ever-escalating healthcare needs of the public.



ACKNOWLEDGEMENTS

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Rhodes also authored a book for the PA Breast Cancer Coalition funded by the CDC, "Breast Cancer: Covered or Not? A Guidebook on Insurance" advising women how to navigate insurance and public programs to finance their treatment. Dr. Rhodes has received numerous state and national awards for her work in public policy and public service. She holds a doctorate in education from Teachers College, Columbia University.

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NOTES

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