The Texas Governmental Public Health Nurse Staffing Survey (TGPHNSS) assesses nurse staffing and related issues in Texas governmental public health agencies. In the spring of 2019, the Texas Center for Nursing Workforce Studies (TCNWS) administered the TGPHNSS to 80 public health agencies in Texas. This included local health departments, public health service regions, and Department of State Health Services (DSHS) and Health and Human Services (HHS) central offices in Austin. DSHS and HHS central office programs will be referred to as state offices. A total of 51 agencies participated for a final response rate of 63.8%.

Please refer to the full set of reports for more details on each topic. The following are highlights and recommendations from the findings of the 2019 Texas Governmental Public Health Nurse Staffing Survey.

### 2019 TGPHNSS: Vacancy and Turnover

Nurse vacancy and turnover rates are among the key measures for assessing a nursing workforce shortage, the severity of the shortage, and changes in the nursing labor market over time. High vacancy and turnover rates can lead to negative outcomes that can affect quality of care such as losing experienced staff and increasing the workload and stress levels of existing staff.\(^1\)

The position vacancy rate describes the proportion of all full-time equivalent (FTE) positions vacant across all responding facilities in an area. The median facility turnover rate describes the mid-point of responses for each facility.

#### Vacancy Rates

Statewide median agency vacancy rates were 0% for RNs, LVNs and APRNs.

The statewide position vacancy rate was 10.8% for RNs, 13.2% for LVNs and 12.8% for APRNs. This was a decrease for RNs (11.7%) and an increase for LVNs (6.5%) and APRNs (9.3%) from 2017.

#### RN Position Vacancy Rate

- RNs had the lowest statewide position vacancy rate for nurse types at 10.8%, slightly lower than reported for 2017 (11.7%).
- For the 40 agencies that reported employment information for RNs, 26 (65.0%) of those agencies had a 0% vacancy rate.
- The highest position vacancy rate for RNs (11.8%) was found among DSHS public health service regions.

#### APRN Position Vacancy Rate

- 10 agencies reported vacancy information for APRN positions, the vacancy rate among those agencies was 12.8%.
- Few agencies reported staffing APRNs (n=10), those that did reported 3 FTE vacancies and 20.5 occupied FTEs.

#### LVN Position Vacancy Rate

- Overall, the statewide position vacancy rate was highest for LVN positions (13.2%).
- Of the 29 agencies who reported employing LVNs, 19 (65.5%) of those agencies had a 0% vacancy rate.
- The Rio Grande Valley reported the highest LVN position vacancy rate (21.1%).

#### Turnover Rates

The statewide median turnover rate was 0% for LVNs, and APRNs, indicating that at least half of responding agencies did not have any staff turnover during the reporting period. RNs had a median turnover rate of 13.8% indicating that at least half of responding agencies experienced turnover.

#### RN Position Median Turnover Rate

- North Texas again had the highest RN vacancy rate for the health regions at 16.9%.
By agency type, the median turnover rate for RNs was lowest among the 22 responding local health departments (0.0%). State offices again had the highest median turnover rate (n=2, 23.8%).

- The median turnover rate for RN positions was higher among agencies in metropolitan counties (n=27, 18.2%) than non-metropolitan counties (n=5, 0%).
- Among agencies located in border counties (n=4), the median turnover rate for RNs was 16.7%, compared to a median turnover rate of 7.1% among agencies in non-border counties (n=28).

APRN Position Median Turnover Rate
7 agencies reported turnover information for APRN positions, and 5 (71.4%) of those agencies had a 0% turnover rate.

For APRNs, the median turnover rate was 0.0% for non-border counties. Turnover information was not able to be calculated for agencies in border counties.

LVN Position Median Turnover Rate
26 agencies reported turnover information for LVNs, and 17 (65.4%) of those agencies had a 0% turnover rate.

The median turnover rate was higher in border counties for LVNs (26.7%) than agencies in non-border counties (0.0%).

Nurses make up 12.4% of the total Texas governmental public health workforce.
Consistent with past studies, RNs made up the majority of the nursing staff mix in 2019 (65.2%).
The proportion of LVNs (29.7%) has been decreasing from 2017.
APRNs comprised 5.2% of occupied nursing staff positions, which was a decrease from 2019 (7.6%).
Few agencies plan on increasing the number of budgeted nurse positions in the next fiscal year and most agencies reported no change in FTEs among all nurse types over the past 2 years.

9 nurse informaticists were employed by 5 agencies, an increase compared to 6 nurse informaticists employed by 3 agencies in 2017.
Increased workload (58.8% of agencies) was again the most frequently reported consequence of inadequate staffing and interim staffing method used (37.3% of agencies).

33 agencies reported currently employing RNs, 38 agencies employed LVNs and 14 agencies reported employing APRNs.
58.8% of responding agencies reported having a position designated with overall administrative responsibility, and 80.0% of those positions were staffed with a RN.

20.0% (n=10) of the agencies that participated in the survey reported having a RN on their board. 100% (n=10) of respondents who did have RN board members reported the RNs had voting privileges.
**2019 TGPHNSS: Recruitment**

- Less than a quarter of agencies reported that they fill RN positions in under 30 days. DSHS Public Health Service regions have the most difficult filling RN positions, with nearly 2/3 indicating that it takes them more than 90 days to fill these types of positions.
- The most frequently used recruitment and retention strategies were paid vacation days and health insurance, 97.9% and 95.8% respectively.
- 78.7% of agencies ranked pay increase as the most impactful intervention on nurse retention.

- Non-competitive salary was the most frequently (69.8% of reporting agencies) reported reason agencies had issues filling vacant positions.

**Texas Governmental Public Health Nurse Staffing Survey Recommendations**

**Vacancy and Turnover**

Respondents reported vacancy rates ranging from 10.8% among RNs to 13.2% for LVNs. The majority of agencies reported experiencing RN turnover. While less than half of agencies reported turnover during the reporting period for LVNs and APRNs, for agencies that did experience turnover, it was as high as 100% for LVNs and 200% for APRNs. To more fully understand the implications of these findings nurse researchers should focus on the following issue for further study:

- Effect of public health nursing staff turnover on economic (e.g. costs of turnover, loss of human capital, cost of unrealized community/public health outcomes, social and economic determinants of health) and non-economic (e.g. quality of care) issues.
- Effect of high vacancy and turnover on continuity of community care.

**Staffing**

According to survey respondents, over half of public health agencies reported increased workload as a consequence of inadequate nurse staffing. Increased workload was also the most frequently used interim staffing method, with 37.3% of agencies reporting the use of this strategy. To more fully understand the implications of these findings nurse researchers should focus on the following issues for further study:

- Effect of public health nursing compensation and promotion opportunities on recruitment and retention in governmental public health agencies.
- Effect of increasing workload as an interim staffing method and how this affects governmental public health nursing safety/quality of work and recruitment and retention.
- Relationships among planning, funding, and optimal nurse staffing roles and responsibilities in public health agencies.
- Unique factors that may adversely affect public health nursing recruitment and retention.
Agency Characteristics

Public health nurses are well-placed to shape and influence a culture of health through effective nursing leadership, but they are underrepresented in leadership roles. Overall, most governmental public health agencies (58.8%) reported having a specific position with overall administrative responsibility for nursing services. However, not all of them were occupied by RNs, and only one-fifth (20.0%) of agencies reported having an RN on their board. Stakeholders should develop and implement solutions to ensure the advancement of RNs, specifically:

- The Texas Department of State Health Services (DSHS) should sustain and elevate the Director of Nursing (DON) position within the department to further state-led efforts to promote the health of communities through public health nursing.
- DSHS should create an executive level position focused on nursing within the department to foster collaboration among different health care professions and promote the health of communities through public health nursing.
- Public health agencies should implement formal career ladders and collaborative governance structures that provide experienced public health nurses with greater autonomy and responsibility and opportunities to serve in leadership roles. This is in line with IOM recommendation 7: Prepare and enable nurses to lead change to advance health.
- In conjunction with formal career ladders, DSHS should include nurse leaders on executive level management teams and in other key leadership positions, both centrally and regionally. This is in line with IOM recommendation 7: Prepare and enable nurses to lead change to advance health.
- Public health agencies should support professional development and leadership training. This is in line with IOM recommendation 7: Prepare and enable nurses to lead change to advance health.
- Public health agencies should establish consistent organizational support for nurses in leadership roles by ensuring effective nurse management structures are in place.
- Public health agencies should recognize the value of nursing input in all program areas and promote the use of RNs on committees, boards, etc. This is in line with IOM recommendation 7: Prepare and enable nurses to lead change to advance health.
- Nurse researchers should focus further study on opportunities to evaluate and improve nursing leadership structures in governmental public health agencies.
Recruitment and Retention

Study results indicate that few agencies plan on increasing the number of budgeted nursing positions in the next fiscal year. Among those that did, opening of new programs or departments was the most frequently reported reason for increasing nursing positions. Similar to respondents to the Hospital, Long Term Care, and Home Health and Hospice Nurse Staffing Studies, governmental public health agencies reported that having relevant experience was the most desirable attribute to employers, and few agencies reported hiring newly licensed RNs. Of the 50 agencies that responded to the question, 5 reported having a transition-to-practice* program. In order to adequately prepare nurses for their role in public health, and to ensure funding for governmental public health nursing positions stakeholders should develop and implement solutions to address these issues, specifically:

- Health departments and agencies should implement the Public Health Accreditation Board’s Standards and Measures related to the promotion of public health as a career including:
  - Documenting the distribution of information to the public about the role and value of public health
  - Developing partnerships with education programs to promote public health as a career
  - Developing a health department specific workforce development plan
- Local health departments, health service regions, and DSHS (public health agencies) should increase the capacity to provide nursing students with meaningful clinical experiences in public health.
- Public health agencies should partner with the Office of Academic Linkages in DSHS to create programs for public health nursing that mirror the Preventative Medicine Public Health Residency Program. This is in line with IOM Recommendation 3: Implement nurse residency programs.
- Agencies and schools of nursing should develop transition-to-practice programs to encourage entry of new nursing graduates into public health. This is in line with IOM Recommendation 3: Implement nurse residency programs.
- Professional organizations and public health agencies should identify and implement mechanisms for advertising positions in public health agencies that may attract nurses who wish to change their job roles or practice settings.
- Professional organizations and public health agencies should create and implement opportunities to ensure that public health nurses receive relevant continuing professional education and training in order to promote and maintain a high level of competence in public health practice.
- Public health agencies should support opportunities for nurses to further their formal education so that nurses may achieve upward career mobility within public health agencies.
- Public health agencies should seek new, sustainable funding sources to create a long term mechanism to hire and retain nurses in governmental public health nursing.

Past recommendations in action:

- Keeping track of the efforts and accomplishments made toward the recommendations can highlight some of the best practices and barriers.
- The Texas Department of State Health Services (DSHS) has a Director of Public Health Nursing (DON) position within the department.

As of 2020, DSHS has agreements with over 28 universities in Texas and 44 universities across the country to place students in a variety of practicum settings, supporting LVN to BSN students, baccalaureate nursing students, and masters and doctoral nursing students throughout the state. The number has steadily risen from only two such agreements in 2011.

*Transition-to-practice: These programs may include extended orientations, prolonged preceptorships, and formal residency programs.