

Using Mandatory NP Data to Understand the Process for Collecting Workforce Data and Disseminating Findings

Robert Martiniano, DrPH, MPA, Nafin Harun, MA, and Shen Wang, MPH, MPA
Center for Health Workforce Studies, School of Public Health, University at Albany

ABSTRACT

Purpose: The objective of the work was to implement a mandatory **New York State** re-registration survey for nurse practitioners (NPs); develop a process for periodically downloading and analyzing the data; and create a public use data file.

Findings: Incomplete or inaccurate responses made it difficult to determine which NPs had more than one response. Survey responses from individual NPs included RN license and NP license number(s) that did not belong to the same individual thereby creating multiple records for the same individual.

Additionally, information on the working status of NPs did not necessarily match hours worked. NPs would indicate they were either working solely as an RN, working outside of health care, or retired, yet would include NP hours in other fields.

It was also difficult to understand where an NP was practicing or his or her specialty. The fields of specialty and setting were not aligned enough to understand the type of care provided and in which settings.

Conclusion: While the NP minimum data set provided a basis for the survey, it also proved problematic in understanding the data. These issues encountered made it difficult to create a unique set of NP records that could be publicly accessed and would accurately describe the NYS NP population. This work has been invaluable in understanding how data collection techniques can inform stakeholders on their health care workforce.

CONTACT

Center for Health Workforce Studies

518-402-0250
info@chwsny.org
www.chwsny.org

INTRODUCTION

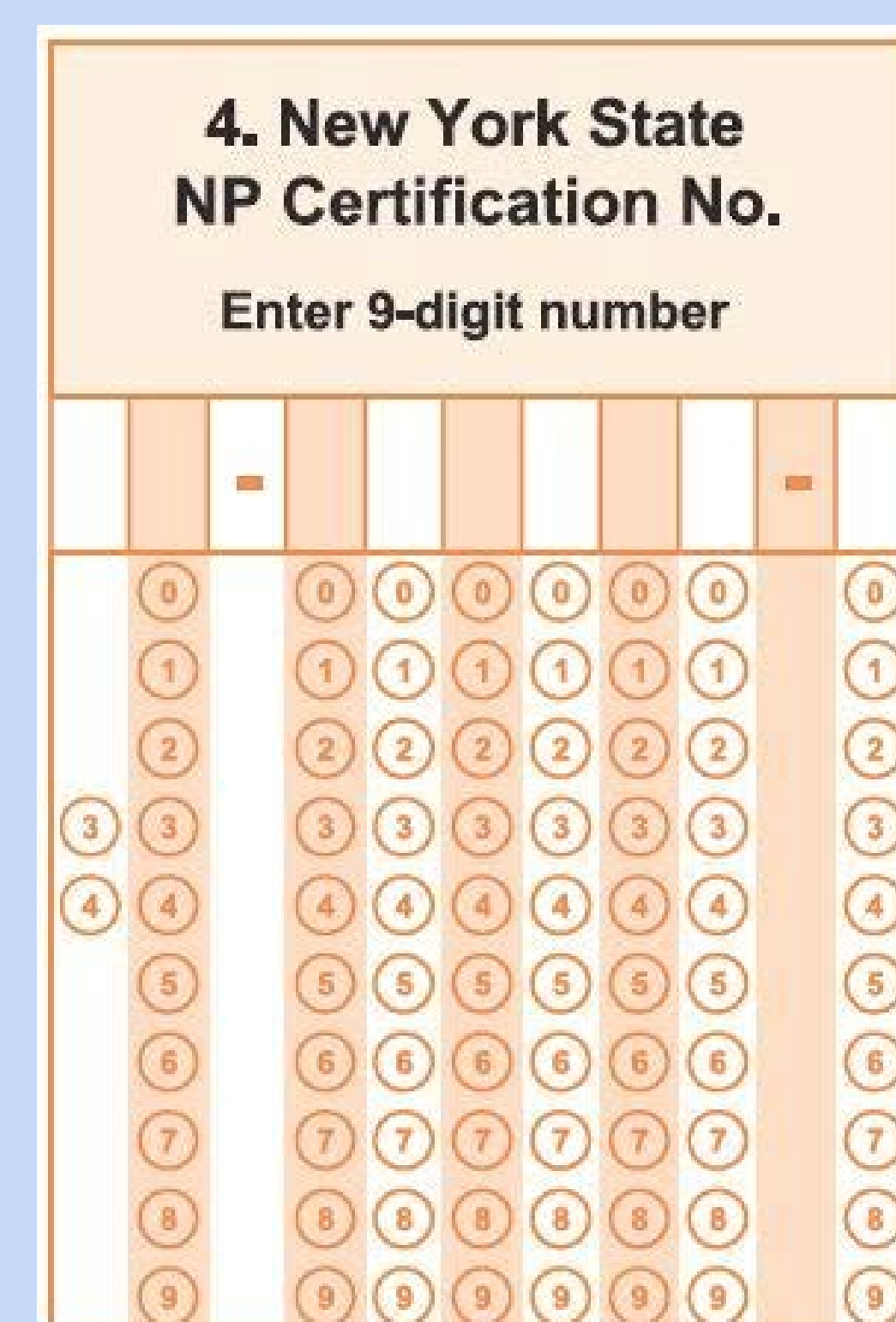
- In 2015, New York State enacted a law expanding the scope of practice of NPs.
- Under the law, NPs were also required to complete a survey during license re-registration that documented demographic, education, and practice characteristics.
- NPs can hold one or more of 16 NP certifications in New York State, and NPs must relicense (complete the survey) for each NP certification held once every three years.
- Data collection began September 1, 2015. Approximately 14,200 NPs completed the survey through December 31, 2017.
- In analyzing the 2016 NP data, a number of problems needed to be addressed to more appropriately describe the NP population.

ISSUES

Some NPs did not understand which number to enter for their New York State NP certification.

- NPs are licensed in NYS as RNs and certified as NPs
 - Use of terminology was confusing
 - NP may list national association certification number
- License numbers can be 6, 8, and 9 digits (asked for 6 digits in the middle)
 - First two numbers - professional code
 - Next six numbers - New York State NP registration number
 - Last two numbers - location number

Original survey



Current survey

4. New York State Nurse Practitioner License Number

Profession Code:

License Number:

ISSUES (cont.)

Researchers struggled with creating unique set of NPs.

- Used a combination of variables to identify unique NPs.
 - RN license number
 - NP certification number
 - National Provider Identifier (NPI)
 - Email address
- Multiple certifications created multiple submissions.
- NPs in New York State are certified in 1 or more of 16 specialties and need separate re-registration for each certification.
- Duplicate submissions for the same certification.
- Missing, inaccurate, or incomplete information (RN license number, NP certification number, NPI) made it difficult to link surveys from the same NP.

Researchers had a difficult time identifying primary care NPs.

- Use HRSA shortage area designation definitions that included health professionals needing to practice in a primary care specialty at an ambulatory care site.
- NPs certified in one or more of 16 specialties in New York State. Not clear which one is primary or if it is being used (e.g., family NP working in a cardiologist office).
- Survey captured setting and specialty.
 - No link to setting and specialty.
 - Could "mark all that apply" for specialty of physician or NP practice. Not sure which one is primary specialty.

18. Which best describes your principal and, as applicable, secondary work setting(s)?

	Primary	Secondary
Health center, clinic, or hospital outpatient	<input type="radio"/>	<input type="radio"/>
Hospice	<input type="radio"/>	<input type="radio"/>
Hospital emergency room/department	<input type="radio"/>	<input type="radio"/>
Independent NP practice	<input type="radio"/>	<input type="radio"/>
Nursing home/long-term care	<input type="radio"/>	<input type="radio"/>
Physician practice	<input type="radio"/>	<input type="radio"/>
State/County public health department	<input type="radio"/>	<input type="radio"/>
Urgent care center	<input type="radio"/>	<input type="radio"/>
Other (please specify)	<input type="radio"/>	<input type="radio"/>

17. If you practice in a private physician office and/or an independent NP practice, please indicate the specialty(ies) of the principal and, as applicable, secondary location(s). (Mark all that apply.)

	Principal	Secondary
Allergy and Immunology	<input type="radio"/>	<input type="radio"/>
Dermatology	<input type="radio"/>	<input type="radio"/>
Family Medicine	<input type="radio"/>	<input type="radio"/>

ISSUES (cont.)

Researchers had a difficult time identifying "active" NPs.

- Work status not always marked correctly.
- Other variables such as hours worked or practice location missing.

14. What best describes your current work status? (Mark all that apply.)

- Working in at least one position that requires NP certification
- Volunteering in a position requiring NP certification
- Working in a position that only requires RN licensure, but not NP certification
- Working, but neither as an RN nor NP
- Not currently working
- Retired

A full set of data was the combination of two different survey revisions.

- The survey was revised in the middle of the first collection cycle.
 - Definitions were revised.
 - Responses were formatted differently
 - Responses were edited.

DISCUSSION

This work has been invaluable in understanding how data collection techniques can inform stakeholders on their health care workforce. It is important to ensure that the questions asked during re-registration reflect the information needed to understand health care workforce capacity.

Lessons learned

- "Mark all that apply" can be problematic.
- Terminology matters and can change.
- Change in variable formats can be problematic.
- Better vetting of the survey was needed prior to survey launch.

The NP minimum data set was used as a starting point in developing New York State's mandatory NP survey. Because of the uniqueness in how NPs are certified in New York State, certain of these questions proved to be problematic when analyzing the data. This in combination with incomplete or missing data, made it difficult to create a unique set of NPs, identify those that were actively practicing, and identify those that were practicing in primary care.

Ultimately, care must be taken in developing a survey to reduce respondent confusion and to ensure that responses are as accurate as possible.