

2012 Indiana Primary Care Clinician Workforce Report

Produced by:

The Indiana Center for Health Workforce Studies

Bowen Research Center, Department of Family Medicine
Indiana University School of Medicine

In collaboration with the:

Indiana Area Health Education Centers Program

August 2012

Authors:

Cynthia K. Lewis, MPH
Zachary T. Sheff, BS, BA
Terrell W. Zollinger, DrPH
Deborah I. Allen, MD



Bowen Research Center
Where research efforts join with real-world experience



2012 Indiana Primary Care Clinician Workforce Report

Produced by:

The Indiana Center for Health Workforce Studies

Bowen Research Center, Department of Family Medicine

Indiana University School of Medicine

In collaboration with

Indiana Area Health Education Centers Program

August 2012

Cynthia K. Lewis, MPH

Zachary T. Sheff, BS, BA

Terrell W. Zollinger, DrPH

Deborah I. Allen, MD

Table of Contents

| | |
|---|----|
| Acknowledgments..... | 5 |
| Executive Summary | 6 |
| Introduction..... | 6 |
| Methods..... | 6 |
| Statewide Primary Care Clinicians | 7 |
| Primary Care Clinicians by AHEC Region | 7 |
| Primary Care Clinicians by ISDH Public Health Region | 7 |
| Conclusion | 7 |
| Chapter 1: Introduction..... | 9 |
| Chapter 2: Methods..... | 11 |
| Inclusion/Exclusion Criteria | 11 |
| <i>Deriving the Primary Care Physician Data Set</i> | 11 |
| <i>Deriving the Primary Care Physician Assistant Data Set</i> | 13 |
| <i>Deriving the Primary Care Nurse Practitioner Data Set</i> | 15 |
| County Level Data Analysis | 17 |
| <i>Calculation of FTE for Maps</i> | 18 |
| <i>County Weighting for Primary Care Physicians</i> | 18 |
| <i>County Weighting for Primary Care Physician Assistants</i> | 19 |
| <i>County Weighting for Primary Care Nurse Practitioners</i> | 19 |
| Chapter 3: Proportion Nearing Retirement Age and Geographical Distributions of Primary Care Clinicians in Indiana | 21 |
| Statewide Data | 21 |
| <i>Primary Care Clinician Workforce Age Characteristics</i> | 21 |
| <i>Maps of Statewide Primary Care Workforce</i> | 22 |
| Statewide County Data Tables..... | 25 |
| <i>Primary Care Clinicians: Urban County Data</i> | 25 |
| <i>Primary Care Clinicians: Rural County Data</i> | 27 |
| Urban Counties Age Data | 29 |
| <i>Primary Care Workforce Characteristics</i> | 29 |
| Rural Counties Data | 29 |

| | |
|---|----|
| <i>Primary Care Workforce Characteristics</i> | 29 |
| HPSA and MUA Designations in Indiana | 30 |
| <i>Indiana Primary Care HPSA Designations</i> | 31 |
| <i>Indiana MUA Designations</i> | 35 |
| Chapter 4: Proportion Nearing Retirement Age and Geographic Distributions of Primary Care Clinicians in Indiana by AHEC Regions | 39 |
| East Indiana (EI) Region..... | 39 |
| <i>Primary Care Workforce Characteristics</i> | 39 |
| <i>Maps of Primary Care Workforce in EI Region</i> | 40 |
| Metropolitan Indianapolis/Central Indiana (MICI) Region..... | 42 |
| <i>Primary Care Workforce Characteristics</i> | 42 |
| <i>Maps of Primary Care Workforce in MICI Region</i> | 43 |
| North Central Indiana (NCI) Region | 45 |
| <i>Primary Care Workforce Characteristics</i> | 45 |
| <i>Maps of Primary Care Workforce in NCI Region</i> | 46 |
| Northeast Indiana (NEI) Region | 48 |
| <i>Primary Care Workforce Characteristics</i> | 48 |
| <i>Maps of Primary Care Workforce in NEI Region</i> | 49 |
| Northwest Indiana (NWI) Region..... | 51 |
| <i>Primary Care Workforce Characteristics</i> | 51 |
| <i>Maps of Primary Care Workforce in NWI Region</i> | 52 |
| South Central Indiana (SCI) Region..... | 54 |
| <i>Primary Care Workforce Characteristics</i> | 54 |
| <i>Maps of Primary Care Workforce in SCI Region</i> | 55 |
| Southwest Indiana (SWI) Region | 57 |
| <i>Primary Care Workforce Characteristics</i> | 57 |
| <i>Maps of Primary Care Workforce in SWI Region</i> | 58 |
| West Central Indiana (WCI) Region..... | 60 |
| <i>Primary Care Workforce Characteristics</i> | 60 |
| <i>Maps of Primary Care Workforce in WCI Region</i> | 61 |

| | |
|--|----|
| Chapter 5: Proportion Nearing Retirement Age and Geographic Distributions of Primary Care Clinicians in Indiana by ISDH Public Health Regions..... | 63 |
| ISDH Public Health Region 1..... | 63 |
| <i>Primary Care Workforce Characteristics</i> | 63 |
| <i>Maps of Primary Care Workforce in Public Health Region 1</i> | 64 |
| ISDH Public Health Region 2..... | 66 |
| <i>Primary Care Workforce Characteristics</i> | 66 |
| <i>Maps of Primary Care Workforce in Public Health Region 2</i> | 67 |
| ISDH Public Health Region 3..... | 69 |
| <i>Primary Care Workforce Characteristics</i> | 69 |
| <i>Maps of Primary Care Workforce in Public Health Region 3</i> | 70 |
| ISDH Public Health Region 4..... | 72 |
| <i>Primary Care Workforce Characteristics</i> | 72 |
| <i>Maps of Primary Care Workforce in Public Health Region 4</i> | 73 |
| ISDH Public Health Region 5..... | 75 |
| <i>Primary Care Workforce Characteristics</i> | 75 |
| <i>Maps of Primary Care Workforce in Public Health Region 5</i> | 76 |
| ISDH Public Health Region 6..... | 78 |
| <i>Primary Care Workforce Characteristics</i> | 78 |
| <i>Maps of Primary Care Workforce in Public Health Region 6</i> | 79 |
| ISDH Public Health Region 7..... | 81 |
| <i>Primary Care Workforce Characteristics</i> | 81 |
| <i>Maps of Primary Care Workforce in Public Health Region 7</i> | 82 |
| ISDH Public Health Region 8..... | 84 |
| <i>Primary Care Workforce Characteristics</i> | 84 |
| <i>Maps of Primary Care Workforce in Public Health Region 8</i> | 85 |
| ISDH Public Health Region 9..... | 87 |
| <i>Primary Care Workforce Characteristics</i> | 87 |
| <i>Maps of Primary Care Workforce in Public Health Region 9</i> | 88 |
| ISDH Public Health Region 10..... | 90 |
| <i>Primary Care Workforce Characteristics</i> | 90 |

| | |
|---|-----|
| <i>Maps of Primary Care Workforce in Public Health Region 10</i> | 91 |
| Chapter 6: Conclusion..... | 93 |
| Appendix 1-A: 2011 Indiana Physician Re-Licensure Survey Instrument..... | 95 |
| Appendix 1-B: 2010 Indiana Physician Assistant Re-Licensure Survey Instrument | 108 |
| Appendix 1-C: 2011 Indiana Nurse Re-Licensure Survey Instrument..... | 143 |

Acknowledgments

We would like to extend our gratitude to all the talented and dedicated individuals who provided valuable and timely assistance to us during the project. Preparing this report required the assistance, cooperation, and effort of many individuals and agency staff. The survey data and additional data elements were provided by the Indiana Professional Licensing Agency through the Indiana State Department of Health.

Many professionals with expertise in this area provided specific direction and insights regarding the data analysis and report generation:

Jennifer Bruner, Staff Attorney, Indiana State Department of Health

Raymond Guest, MPH, PCO Manager, ISDH Office of Primary Care

Biff Williams, PhD., Professor and Dean, Indiana State University, College of Nursing, Health, and Human Services

Marcia Plant Jackson, FNP, Director, Health Policy, Coalition of Advanced Practice Nurses of Indiana

J. Matthew Neal, MD, MBA, CPE, FACP, FACE, Governor, American College of Physicians, Indiana Chapter

Sarah M. Stelzner, MD, Co-President, American College of Pediatrics – Indiana Chapter

Kimberly Harper, MS, RN, Executive Director, Indiana Center for Nursing

The cooperation and support of the Indiana State Department of Health was instrumental in obtaining the survey data and interpreting it. The authors are grateful for the financial support received from the Indiana Area Health Education Centers Program to produce this report.

Cynthia K. Lewis, MPH

Zach Sheff, BS BA

Terrell Zollinger, DrPH

Deborah I. Allen, MD

Executive Summary

Introduction

Primary care clinicians are a critical segment of the health care workforce in Indiana. The Institute of Medicine defined primary care as “the provision of integrated, accessible health care services by clinicians who are accountable for addressing a large majority of personal health care needs, developing a sustained partnership with patients, and practicing in the context of family and community.”¹ For this report, a physician was considered a “primary care physician” if their specialty was one of the following: family medicine, general internal medicine, general practice, internal medicine – pediatrics, and general pediatrics. In addition to these physician specialties, physician assistants and nurse practitioners who also provide primary care and are included in this report as part of the group considered to be primary care clinicians. The purpose of this report is to describe the current state of the primary care clinician workforce in Indiana, their demographic characteristics, practice setting, and geographical locations. The geographical locations are presented in different ways for the various stakeholders. The information presented in this report may be useful for projecting future needs given the current number of providers and proportion nearing retirement as well as the geographical areas where special attention may be needed to insure residents have adequate access to primary care clinicians in the future.

Methods

Data for this report were assimilated from two sources: the Indiana Professional Licensing Agency (IPLA) license files containing basic information about each licensed professional (physicians, physician assistants, and nurse practitioners) and data from the re-licensure survey completed by health professionals when renewing their state licenses. This report summarizes the physician, physician assistant and nurse re-licensure data and responses to the 2011 Indiana Physician Re-Licensure Survey, 2010 Indiana Physician Assistant Re-licensure Survey, and 2011 Registered Nurse Re-Licensure Survey.

These data were filtered to remove all clinicians not actively practicing in Indiana and were then further refined to include only primary care physicians, physician assistants, and nurse practitioners. Two primary measures were used to evaluate the status of Indiana’s primary care workforce: the proportion of primary care clinician full-time equivalents (FTEs) “nearing retirement” (age 55 and older) and the (weighted) ratio of primary care provider FTEs per 100,000 population in each county.

¹ National Research Council. "Front Matter." *Primary Care: America's Health in a New Era*. Washington, DC: The National Academies Press, 1996. 1. Retrieved from <http://www.nap.edu/openbook.php?isbn=0309053994>.

Clinicians were counted by full-time equivalents (FTEs) rather than headcount to more accurately measure the amount of care provided by each. FTEs in each county were weighted by response rate to the appropriate professional survey (physician, physician assistant, and nurses) to account for non-responders.

Statewide Primary Care Clinicians

There were 3,951 primary care clinician FTEs in Indiana (2,880 physician, 96 physician assistant, and 975 nurse practitioner). Across the state, nearly one-third (31%) of all primary care clinician FTEs were nearing retirement (age 55 or older). This rate remained consistent across urban and rural counties (31% and 34%, respectively). Statewide, counties averaged 51 primary care clinician FTEs per 100,000 population. Urban counties contained a total of 3,239 primary care clinician FTEs (2,389 physician, 79 physician assistant, and 772 nurse practitioner). Urban counties averaged 83 primary care clinician FTEs per 100,000 population. Rural counties contained a total of 711 primary care clinician FTEs (491 physician FTE, 18 physician assistant FTE, and 203 nurse practitioner FTE). Of all 92 Indiana counties, 56 contained a primary care Healthcare Professional Shortage Area (HPSA), and 71 contained a Medically Underserved Area (MUA).

Primary Care Clinicians by AHEC Region

Indiana is divided into eight AHEC regions. Compared to the state as whole where 31 percent of primary care clinician FTEs were nearing retirement, AHEC regions varied from a low of 25.7 percent of primary care clinician FTEs nearing retirement (MICI region) to a high of 44.3 percent of primary care clinician FTEs (WCI region). The ratio of primary care clinician FTEs to 100,000 population varied from a low of 20 clinician FTEs per 100,000 population (EI and WCI regions) to a high of 174 clinician FTEs per 100,000 population (MICI region).

Primary Care Clinicians by ISDH Public Health Region

The ISDH divided Indiana into 10 public health regions. ISDH regions varied from a low of 25.6 percent of primary care clinician FTEs nearing retirement (ISDH region 5) to a high of 42.7 percent of primary care clinician FTEs (ISDH region 7). The ratio of primary care clinician FTEs to 100,000 population varied from a low of 18 clinician FTEs per 100,000 population (ISDH region 4) to a high of 183 clinician FTEs per 100,000 population (ISDH region 5).

Conclusion

Across the entire state, most of the primary care clinicians worked full-time (1.0 FTE) and one-third were nearing retirement age. Overall, there were 51 primary care clinician FTEs per 100,000 population, far short of the recommended 100 per 100,000 to provide adequate access to primary care. Comparing urban counties to rural counties, a majority of primary care providers practiced in urban

counties. However, a greater proportion of rural primary care providers were age 55 or older than those working in urban counties. There was notable variation between AHEC and ISDH regions in terms of both proportion of primary care clinician FTEs nearing retirement and ratio of primary care clinician FTEs to population. The findings from this report may be used to identify primary care clinician shortage areas, develop more effective recruitment and retention strategies, and plan additional locations for training primary care clinicians within the state. In general, areas with the lowest ratio of primary care clinician FTEs to population should be the first priorities for increasing the supply of primary care clinicians.

Chapter 1: Introduction

Primary care clinicians are a critical segment of the health care workforce in Indiana. A large and properly distributed primary care workforce can improve the entire health care system by increasing access for the community while helping to reduce cost throughout the system.² The Institute of Medicine defined primary care as “the provision of integrated, accessible health care services by clinicians who are accountable for addressing a large majority of personal health care needs, developing a sustained partnership with patients, and practicing in the context of family and community.”³ This definition emphasizes the primary care clinician’s role as an available, accountable advocate for the patient and the patient’s family. The primary care clinician not only functions as a patient’s point of entry to the health care system, but also coordinates care among any specialists that the patient may need to see. By fulfilling these functions, primary care clinicians can mitigate the fragmentation of the health care system in the United States; reduce cost caused by redundant or unnecessary procedures; and produce better outcomes for patients and their families.

Though primary care is defined by the *function* of clinicians rather than by *specialty*, the specialties that are generally included in primary care are: family physicians, general practitioners, general internists, and general pediatricians. In addition to these physician specialties, physician assistants and nurse practitioners also provide primary care and are included in this report as part of the group considered to be primary care clinicians. Some organizations also include obstetricians/gynecologists and/or geriatricians in their definitions of primary care clinicians. For this report, a physician was considered a “primary care physician” if their specialty was one of the following: family medicine, general internal medicine, general practice, internal medicine – pediatrics, and general pediatrics. Though “general practice” is an antiquated term (replaced by Family Medicine after the development of a board and board requirements) some physicians still identified themselves as general practitioners and were included as primary care clinicians in this report. Physician assistants whose supervising physicians’ specialties were one of the above were also included among the primary care clinicians in this report. Nurse practitioners who spent the majority of their time in primary care were also considered primary care clinicians in this report.

Having an accurate understanding of the personal and professional characteristics of primary care clinicians licensed in Indiana is critical to develop and manage effective programs that recruit and retain these professionals where they are most needed in the state. Quality data about the location of primary

² Green, L., Doodoo, M., Ruddy, G., Fryer, G., Phillips, R., McCann, J., O’Neil, E., & Klein, L. The Robert Graham Center, (2004). *The Physician Workforce of the United States a Family Medicine Perspective*. Retrieved from http://www.graham-center.org/PreBuilt/physician_workforce.pdf.

³ National Research Council. "Front Matter." *Primary Care: America's Health in a New Era*. Washington, DC: The National Academies Press, 1996. 1. Retrieved from <http://www.nap.edu/openbook.php?isbn=0309053994>.

care clinicians in Indiana also will help policymakers and other stakeholders make better-informed decisions in addressing health care professions shortages. The purpose of this report is to provide these needed data. Thus, the findings from this report may be used to identify primary care clinician shortage areas, develop more effective recruitment and retention strategies, and plan additional locations for training primary care clinicians within the state.

This report uses findings from the Robert Graham Center as a benchmark for adequate primary care in an area. The Robert Graham Center was founded in 1997 by the AAFP (American Academy of Family Physicians) as a research center “focused on important policy questions related to family physician services and the general domain of primary care.”⁴ Since 2000 the Robert Graham Center has released annual reports (in addition to more frequent peer-reviewed articles and policy briefs) taking an evidence-based approach to addressing policy issues surrounding family medicine and primary care. The Robert Graham Center’s recommendation of 100 primary care clinician FTEs per 100,000 population as the minimum amount of primary care needed to adequately provide care for a region was used as a benchmark in this report because it is the most current evidence-based figure available.

Data for this report were assimilated from two sources: the Indiana Professional Licensing Agency (IPLA) license files containing basic information about each licensed professional (physicians, physician assistants, and nurse practitioners), and data from the re-licensure survey completed by health professionals when renewing their state licenses. Two primary measures were used to evaluate the status of Indiana’s primary care workforce: the proportion of primary care clinician full-time equivalents (FTEs) “nearing retirement” (age 55 and older) and the (weighted) ratio of primary care provider FTEs per 100,000 population in each county. From the IPLA license dataset, each licensee’s date of birth was extracted to calculate their age. This information was used to determine the proportion of primary care clinician FTEs in Indiana who were nearing retirement age. The re-licensure survey responses were used to determine the average number of hours worked per week to calculate primary care clinician FTEs. Analyses of FTE, retirement age, and ratio of primary care clinician FTEs to population were carried out at the state level (Chapter 3), by AHEC region (Chapter 4), and by ISDH public health region (Chapter 5) in order to provide the most relevant organization of the data for various stakeholders.

⁴ Robert Graham Center website. <http://www.graham-center.org>

Chapter 2: Methods

The Indiana State Department of Health (ISDH) and the Indiana Professional Licensing Agency (IPLA) collaborated in implementing the 2011 Indiana Physician Re-Licensure Survey, 2010 Indiana Physician Assistant Re-licensure Survey, and 2011 Registered Nurse Re-Licensure Survey. All physicians, physician assistants, and nurses who renewed their licenses online were asked to complete a voluntary questionnaire. The data used for this report were extracted from these three survey data files provided by the Indiana State Department of Health along with information taken from IPLA licensing datasets for 2011 physician re-licensure, 2010 physician assistant re-licensure, and 2011 registered nurse re-licensure. Copies of each survey instrument are included in the *Appendix*. The survey instruments included items to gather demographic and professional information, as well as the number of hours worked per week for each respondent used to calculate FTE. The data provided by the IPLA licensure file included date of birth for all licensed clinicians practicing in Indiana at the time of the survey used to calculate the age of the professionals shown in this report. The IPLA licensure and survey datasets were merged by matching the license number of each primary care provider using SAS 9.3.

Each respondent's age was calculated using a reference date that fell in the middle of each profession's re-licensure period since the actual date of renewal was unknown. The reference date used for physicians was May 30, 2011 since surveys were completed from April 30 through June 30, 2011. The reference date used for physician assistants was May 30, 2010 since surveys were completed from April 30 to June 30, 2010. The reference date used for nurse practitioners was September 30, 2011 since surveys were completed from August 31 to October 31, 2011. The merged dataset was then filtered to include only the respondents who met the inclusion criteria for specialty type and actively practicing in Indiana. Also, the merged dataset included only those clinicians who renewed their license electronically. However, estimates of the number of clinicians in geographic areas were weighted by the response rate to account for these missing cases. Consequently, while the number of clinicians shown in the tables who chose each response option is lower than the actual number of clinicians in the state, the percentages who selected each response option is assumed to be representative of all primary care clinicians.

Inclusion/Exclusion Criteria

Deriving the Primary Care Physician Data Set

The total number of physicians who renewed their Indiana license in 2011 was 23,026. Of the 23,026 renewals, 21,400 were completed online and were asked to complete the 2011 Indiana physicians re-licensure survey. Of the 21,400 physicians who were asked to complete the 2011 Indiana physicians re-licensure survey, 19,326 (90.3%) responded to at least one question on the survey. Of the 19,326

respondents, 10,927 physicians indicated that they were currently practicing in Indiana. Of the 10,927 physicians currently practicing in Indiana 86.6% answered *all* non-optional questions in the survey. Table 2.1 displays the license status of Indiana-based physicians who responded to the 2011 Indiana physician re-licensure survey. Nearly all respondents (99.8%) held an active license.

Table 2.1 Current Physician License Status

| Physician License Status | Number | Percent |
|--------------------------|--------|---------|
| Active | 10,904 | 99.8 |
| Probation | 23 | 0.2 |
| Total | 10,927 | 100.0 |

Of the 10,927 Indiana-based physicians who responded to the 2011 Indiana physicians re-licensure survey, 10,289 physicians met the initial inclusion criteria for this report (refer to Table 2.2). Physicians who practiced outside of Indiana, were inactive in medicine, retired from active medical practice, or currently in training to become a physician (residents/fellows) were excluded from the dataset. These respondents were excluded because this report is meant to reflect the primary care clinicians who are available to serve the population-at-large. Overall, 94.3 percent (10,289) of Indiana-based respondents were included in the dataset.

Table 2.2 Current Physician Work Status*

| Physician Work Status | Number | Percent |
|---|---------------|-------------|
| Excluded from Dataset | | |
| Inactive in medicine | 40 | 0.4 |
| Retired from active medical practice | 168 | 1.5 |
| Physician in training (medical resident/fellow) | 413 | 3.8 |
| Total Excluded from Dataset | 621 | 5.7 |
| Included in Dataset | | |
| Physician active in medicine, locum tenens ONLY | 69 | 0.6 |
| Physician active in medicine, not seeing patients | 372 | 3.4 |
| Physician actively seeing patients - Full time | 8,714 | 79.9 |
| Physician actively seeing patients - Part time | 1,134 | 10.4 |
| Total Included in Dataset | 10,289 | 94.3 |
| Total Indiana-based Survey Respondents | 10,910 | 100.0 |
| No Response Given | 17 | |

**These numbers represent survey respondents only.*

Of all Indiana-based physicians who met the inclusion criteria (10,289), 3,183 (29.2%) primary care physicians were identified based on their specialty (refer to Table 2.3). *Specialties included in primary care were: family practice/family medicine, general internal medicine, general pediatrics, general practice, and internal medicine – pediatrics (IM-Peds).* These specialties were determined by the responses provided given on the 2011 physician re-licensure survey. Primary care physicians who were retired, temporarily inactive, in training as a resident or fellow, practicing outside of Indiana, or working for the government or military were excluded from the analyses. Of the 10,289 Indiana-based physicians who met the initial inclusion criteria, a total of 3,183 primary care physicians (29.1%) were selected for inclusion in this report (refer to Table 2.3).

Table 2.3 Current Primary Care Physician Work Status*

| Primary Care Physician Work Status | Number | Percent |
|--|---------------|----------------|
| Excluded from Study | | |
| Non-primary care physician | 7,563 | 69.3 |
| Primary care physician inactive in medicine | 16 | 0.1 |
| Primary care physician retired from medical practice | 51 | 0.5 |
| Primary care physician in training (medical resident/fellow) | 96 | 0.9 |
| Total Excluded from Study | 7,726 | 70.8 |
| Included in Study | | |
| Primary care physician active in medicine, locum tenens ONLY | 16 | 0.1 |
| Primary care physician active in medicine, not seeing patients | 95 | 0.9 |
| Primary care physician actively seeing patients - Full time | 2,605 | 23.9 |
| Primary care physician actively seeing patients - Part time | 467 | 4.3 |
| Total Included in Study | 3,183 | 29.2 |
| Total Indiana-based Survey Respondents | 10,909 | 100.0 |
| No Response Given | 18 | |

*These numbers represent survey respondents only.

Deriving the Primary Care Physician Assistant Data Set

The total number of physician assistants who renewed their Indiana license in 2010 was 708. Of the 708 renewals, 693 were completed online and were asked to complete the 2010 Indiana physician assistant re-licensure survey. Of the 693 physician assistants who were asked to complete the 2010 Indiana physician assistant re-licensure survey, 648 (93.5%) responded to at least one question on the survey. Of the 648 survey participants, 520 physician assistants indicated that they were currently practicing in Indiana. Of the 520 physician assistants currently working in Indiana 76.7% responded to

all non-optional questions in the survey. Table 2.4 displays the license status of Indiana-based physician assistants who responded to the 2010 Indiana physician assistant re-licensure survey. Nearly all respondents (97.7%) held an active license.

Table 2.4 Current Physician Assistant License Status

| Physician Assistant License Status | Number | Percent |
|---|---------------|----------------|
| Active | 508 | 97.7 |
| Expired | 10 | 1.9 |
| Probation | 2 | 0.4 |
| Total | 520 | 100.0 |

Of the 520 Indiana-based physician assistants who responded to the 2010 Indiana physician assistant re-licensure survey, 461 physician assistants met the initial inclusion criteria for this report (refer to Table 2.5). Physician assistants who practiced outside of Indiana, were inactive in medicine, or worked for a government employer were excluded from the analyses. These respondents were excluded because this report is meant to reflect the primary care clinicians who are available to serve the Indiana population-at-large. Overall, 91.8 percent (461) of Indiana-based respondents were included in the dataset.

Table 2.5 Current Physician Assistant Work Status*

| Physician Assistant Work Status | Number | Percent |
|---|---------------|----------------|
| Excluded from Dataset | | |
| Temporarily inactive as a physician assistant | 2 | 0.4 |
| Actively working as a physician assistant in federal government | 3 | 0.6 |
| Actively working as a physician assistant in state government | 7 | 1.4 |
| Actively working as a physician assistant in local government | 2 | 0.4 |
| Actively working as a physician assistant in the military | 4 | 0.8 |
| Actively working as a physician assistant in “other” type of employment | 23 | 4.6 |
| Total Excluded from Dataset | 41 | 8.2 |
| Included in Dataset | | |
| Actively working as a physician assistant | 461 | 91.8 |
| Total Included in Dataset | 461 | 91.8 |
| Total Indiana-based Survey Respondents | 502 | 100.0 |
| No Response Given | 18 | |

**These numbers represent survey respondents only.*

After determining all Indiana-based physician assistants who met the inclusion criteria (461), the respondents were filtered to identify all primary care physician assistants by the specialty of their supervising physicians. *Specialties included in primary care were: family practice/family medicine, general internal medicine, general pediatrics, general practice, and pediatric internal medicine.* Primary care physician assistants who were working for the government or military were excluded from the analyses. Of the 461 Indiana-based physician assistants who met the initial inclusion criteria, a total of 103 primary care physician assistants (20.6%) were selected for inclusion in this report (refer to Table 2.6).

Table 2.6 Current Primary Care Physician Work Status*

| Primary Care Physician Assistant Work Status | Number | Percent |
|--|---------------|----------------|
| Excluded from Study | | |
| Non-primary care physician assistant | 383 | 76.4 |
| Primary care physician assistants not meeting initial inclusion criteria | 15 | 3.0 |
| Total Excluded from Study | 398 | 79.4 |
| Included in Study | | |
| Primary care physician assistant actively working in medicine | 103 | 20.6 |
| Total Included in Study | 103 | 20.6 |
| Total Indiana-based Survey Respondents | 501 | 100.0 |
| No Response Given | 19 | |

*These numbers represent survey respondents only.

Deriving the Primary Care Nurse Practitioner Data Set

The total number of nurses who renewed their Indiana licenses in 2011 was 98,235. Of the 98,235 renewals, 94,216 were completed online and were asked to complete the 2011 Indiana nurse re-licensure survey. Of the 94,216 nurses who were asked to complete the 2011 Indiana nurse re-licensure survey, 88,650 (94.1%) responded to at least one question on the survey. Of the 88,650 survey participants, 54,826 nurses indicated that they were currently practicing in Indiana. Of the 54,826 nurses currently practicing in Indiana 40.8% responded to *all* non-optional survey questions.

Of the 54,826 Indiana-based nurses who responded to the 2011 Indiana nurse re-licensure survey, 53,591 nurses met the initial inclusion criteria for this report (refer to Table 2.7). Nurses who practiced outside of Indiana, were inactive in medicine, retired from medicine, worked only on a non-paid basis, or

worked in a position not related to nursing were excluded from the analyses. These respondents were excluded because this report is meant to reflect the primary care clinicians who are available to serve the community-at-large. Overall, 98.4 percent (53,591) of Indiana-based respondents were included in the dataset.

Table 2.7 Current Registered Nurse Work Status*

| Nurse Work Status | Number | Percent |
|---|---------------|----------------|
| Excluded from Dataset | | |
| Actively working in a paid health care position, but not in nursing | 498 | 0.9 |
| Actively working, but not in nursing or health care | 32 | 0.1 |
| Working in nursing ONLY on a non-paid basis | 84 | 0.2 |
| Retired or permanently inactive as a nurse | 42 | 0.1 |
| Temporarily inactive as a nurse | 67 | 0.1 |
| Unemployed and seeking work as a nurse in Indiana | 168 | 0.3 |
| Total Excluded from Dataset | 891 | 1.6 |
| Included in Dataset | | |
| Actively working in a paid position related to nursing | 53,591 | 98.4 |
| Total Included in Dataset | 53,591 | 98.4 |
| Total Indiana-based Survey Respondents | 54,482 | 100.0 |
| No Response Given | 344 | |

**These numbers represent survey respondents only.*

After determining all Indiana-based nurses who met the inclusion criteria (53,591), the respondents were filtered to identify all primary care nurse practitioners. This was accomplished by including all respondents who, when asked if they currently worked in an Advanced Practice Nursing position, indicated that they were a *Nurse Practitioner – Primary Care*. Of the 53,591 Indiana-based nurses who met the initial inclusion criteria, a total of 1,099 primary care nurse practitioners (2.0%) were selected for inclusion in this report (refer to Table 2.8).

Table 2.8 Current Primary Care Nurse Practitioner Work Status*

| Primary Care Nurse Practitioner Work Status | Number | Percent |
|---|---------------|----------------|
| Excluded from Study | | |
| Non-primary care nurses | 53,357 | 98.0 |
| Primary care nurse practitioners not meeting initial inclusion criteria | 12 | 0.0 |
| Total Excluded from Study | 53,369 | 98.0 |
| Included in Study | | |
| Nurse Practitioner- Primary Care | 1,099 | 2.0 |
| Total Included in Study | 1,099 | 2.0 |
| Total Indiana-based Survey Respondents | 54,468 | 100.0 |
| No Response Given | 358 | |

**These numbers represent survey respondents only.*

County Level Data Analysis

A key component of identifying potential health profession shortage areas is determining the number of existing professionals in each county. Two strategies were employed to create an accurate measure of the availability of primary care clinicians in each county. First, rather than performing a simple headcount of primary care clinicians in each county, the number of full-time equivalent (FTE) primary care clinicians was calculated for each county. The method for calculating and defining FTEs is discussed below. After the FTEs for each county were calculated, the second strategy used to ensure an accurate estimate was to weight the FTEs in each county. The weight was determined by calculating the proportion of licensees who renewed their license electronically and responded to at least one question on their respective professional survey to the total number of license renewals. The weights and their calculations for each profession are explained below. Thus, the counts of the primary care clinician FTEs in each county are estimates of the actual number of primary care clinician FTEs in each county and not the number of survey respondents in each county.

Calculation of FTE for Maps

The data shown on the maps are clinician FTEs rather than a simple headcount because not all respondents indicated that they worked full-time in patient care activities. Thus, measuring the number of primary care clinician FTEs per county provides a more accurate picture of the availability of primary care for the communities of each county. Each respondent had an FTE assigned to them based on their survey response indicating the average number of weekly hours spent in patient care or in professional duties. Because of differences in response options on the survey instruments, the FTEs for primary care physicians and physician assistants were defined slightly differently than nurse practitioners (refer to Tables 2.11 and 2.12).

Table 2.11 FTE Definition for Primary Care Physicians and Physician Assistants

| Average Number of Weekly Hours Spent in Direct Patient Care | FTE |
|--|------------|
| 0 | 0.00 |
| 1 - 9 | 0.25 |
| 10 - 19 | 0.50 |
| 20 - 29 | 0.75 |
| 30 - 39 | 1.00 |
| 40 - 49 | 1.00 |
| 50 - 59 | 1.00 |
| 60 or more | 1.00 |

Table 2.12 FTE Definition for Primary Care Nurse Practitioners

| Average Number of Weekly Hours Spent in ALL Nursing Related Activities | FTE |
|---|------------|
| 1 - 19 | 0.50 |
| 20 - 35 | 0.75 |
| 36 - 40 | 1.00 |
| 41 or more | 1.00 |

County Weighting for Primary Care Physicians

County FTE counts for primary care clinicians were adjusted by a weighting factor to account for the lack of 100% response rates for the surveys. The estimated number of primary care physician FTEs in each county was calculated by summing the number of respondent FTEs in each county of principal practice location, then assigning a weight of 83.9 percent to the sum. The weight was determined by calculating the proportion of all physicians who renewed their license electronically and responded to at

least one question (n = 19,326) to the total number of physician license renewals (n = 23,026) in 2011, yielding a total response rate of 83.9% (refer to Table 2.13). Thus, the counts of the primary care physician FTEs are estimates of the actual number of primary care physicians in each county and not the number of respondents in each county. This weight was used to adjust county FTEs for all primary care physicians.

Table 2.13 Weighting for Primary Care Physician County Level Data

| Physician Weighting for County Level Data | Number | Percent |
|---|---------------|----------------|
| Renewed electronically & responded to at least one question | 19,326 | 83.9 |
| Total physician license renewals in 2011 | 23,026 | |

County Weighting for Primary Care Physician Assistants

The estimated number of primary care physician assistant FTEs in each county was calculated by summing the number of respondent FTEs in each county of principal practice location, then assigning a weight of 91.5 percent to the sum. The weight was determined by calculating the proportion of all physicians assistants who renewed their license electronically and responded to at least one question (n = 648) to the total number of physician license renewals (n = 708) in 2010, yielding a total response rate of 91.5% (refer to Table 2.14). Thus, the counts of the primary care physician assistant FTEs are estimates of the actual number of primary care physician assistants in each county and not the number of respondents in each county. This weight was used to adjust county FTEs for all primary care physician assistants.

Table 2.14 Weighting for Primary Care Physician Assistant County Level Data

| Weighting for Physician Assistant County Level Data | Number | Percent |
|---|---------------|----------------|
| Renewed electronically and responded to at least one question | 648 | 91.5 |
| Total PA license renewals in 2010 | 708 | |

County Weighting for Primary Care Nurse Practitioners

The estimated number of primary care nurse practitioner FTEs in each county was calculated by summing the number of respondent FTEs in each county of principal practice location, then assigning a weight of 90.2 percent to the sum. The weight was determined by calculating the proportion of all nurses who renewed their license electronically and responded to at least one question (n = 88,650) to the total number of nurse license renewals (n = 98,235) in 2011, yielding a total response rate of 90.2% (refer to Table 2.15). Thus, the counts of the primary care nurse practitioner FTEs are estimates of the actual

number of primary care nurse practitioners in each county and *not the number of respondents* in each county. This weight was used to adjust county FTEs for all primary care nurse practitioners.

Table 2.15 Weighting for Primary Care Nurse Practitioner County Level Data

| Weighting for Nurse County Level Data | Number | Percent |
|---|---------------|----------------|
| Renewed electronically and responded to at least one question | 88,650 | 90.2 |
| Total PA license renewals in 2010 | 98,235 | |

Chapter 3: Proportion Nearing Retirement Age and Geographical Distributions of Primary Care Clinicians in Indiana

This chapter presents the statewide proportion nearing retirement age (55 or older) and geographical distributions of Indiana primary care clinician FTEs. The age data are presented for the entire state (Table 3.1), urban counties only (Table 3.4), and rural counties only (Table 3.5). Additionally, the geographic distribution of primary care clinicians (by FTEs per 100,000 population) is presented as a state map of urban counties (Map 3.1) and rural counties (Map 3.2). These geographical data are also presented in tabular form for urban counties (Table 3.2) and rural counties (Tables 3.3). Clinicians age 55 and older were considered to be “nearing retirement” and may need to be replaced by new recruits to the primary care workforce within the next decade to maintain similar levels of FTEs. It should be noted that the FTEs reported in the state map and county tables are *weighted estimates* of FTEs that are meant to estimate the actual accessible workforce of primary care providers to the communities that they serve.

Statewide Data

Primary Care Clinician Workforce Age Characteristics

Table 3.1 displays the primary care physician, physician assistant, and nurse practitioner FTEs in across the entire state by the age group of primary care clinicians. Overall, almost one-third (31.2%) of all primary care clinician FTEs were nearing retirement age. A larger proportion of primary care physicians are nearing retirement age than primary care physician assistants or nurse practitioners.

Table 3.1 State Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs Statewide | Under 55 years old | | 55 years old and over | | Total | |
|---------------------------------------|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 1,932 | 67 | 948 | 33 | 2,880 | 100.0 |
| Primary Care PAs | 75 | 78 | 21 | 22 | 96 | 100.0 |
| Primary Care NPs | 713 | 73 | 262 | 27 | 975 | 100.0 |
| All Primary Care Providers | 2,719 | 69 | 1,232 | 31 | 3,951 | 100.0 |
| No Response Given | | | | | 79 | |

*These numbers represent survey respondents only.

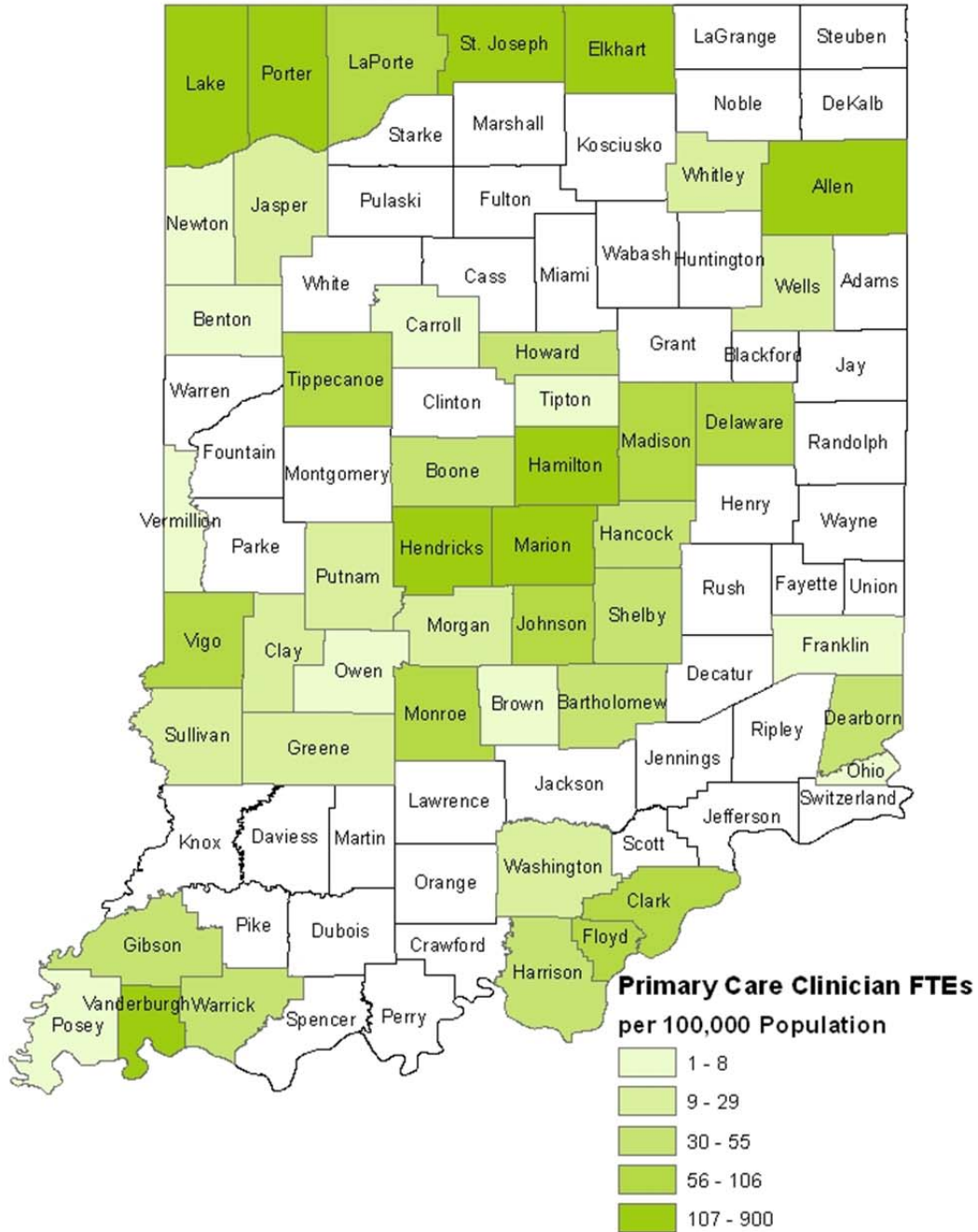
Maps of Statewide Primary Care Workforce

Maps 3.1 and 3.2 display combined FTE data for primary care physicians, physician assistants, and nurse practitioners in urban and rural Indiana counties, respectively. Rural counties were defined by the United States Department of Agriculture as non-metropolitan counties. Map 3.1 displays the primary care clinician FTEs per 100,000 population for all urban counties in Indiana (rural counties appear as grey). Urban counties averaged 83 primary care clinician FTEs per 100,000 population. This ratio is greater than the state average (51 primary care clinician FTEs per 100,000 population), but is still below the Robert Graham Center's recommendation of 100 primary care clinician FTEs per 100,000 population⁵. Eleven of the 45 urban counties in Indiana had greater than 100 primary care clinician FTEs per 100,000 population.

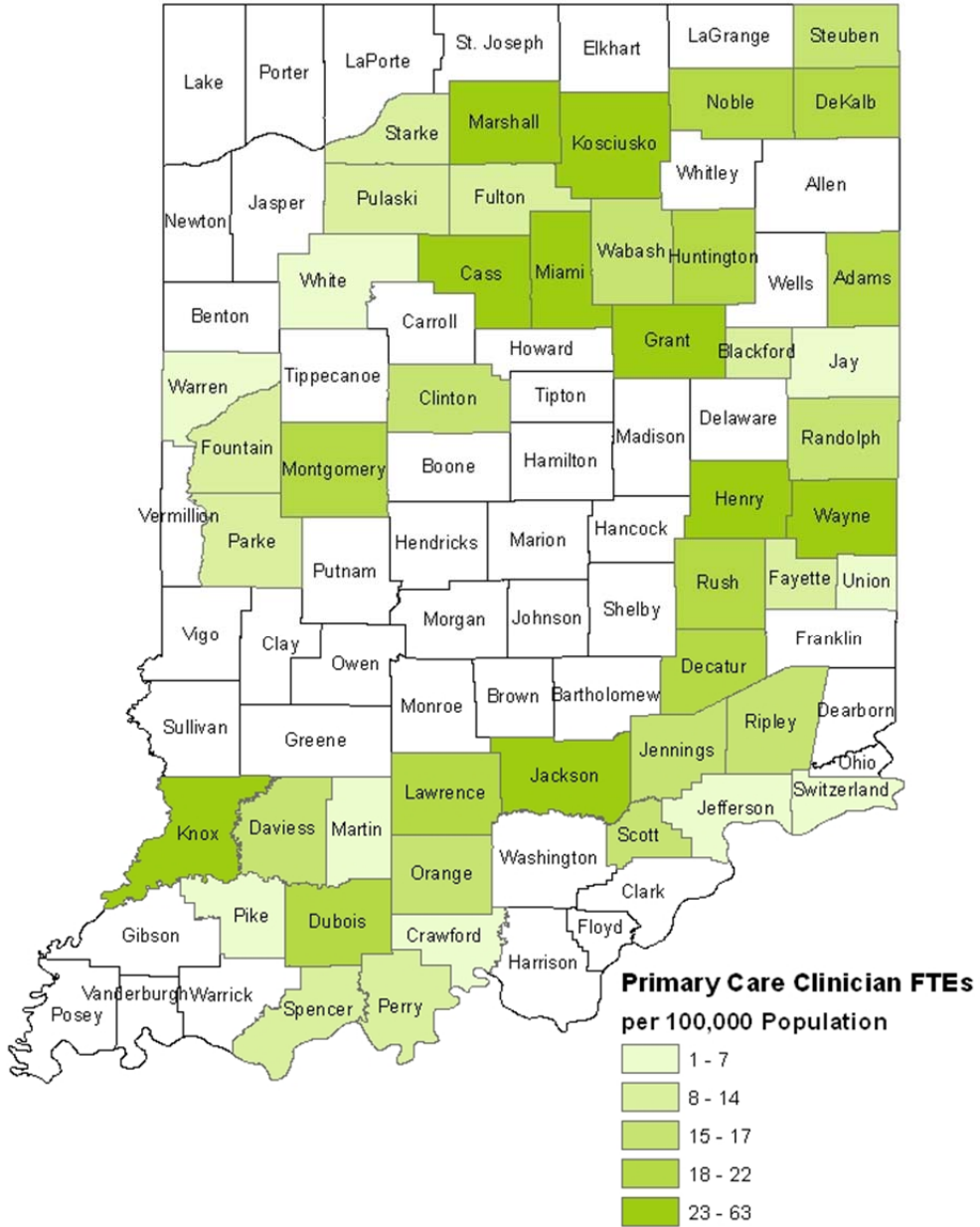
Map 3.2 displays the primary care clinician FTEs per 100,000 population for all rural counties in Indiana (urban counties appear as grey). Rural counties averaged 18 primary care clinician FTEs per 100,000 population. This ratio is less than the state average (51 primary care clinician FTEs per 100,000 population), and is also below the recommendation by the Robert Graham Center of 100 primary care clinician FTEs per 100,000 population. None of the rural counties met this recommendation.

⁵ "Graham Center Workforce Analyses and Resources of Interest." Presented by Andrew Bazemore, MD, PhD, Director Robert Graham Center, May 16, 2012, HRSA Workforce Conference, Washington, DC.

Map 3.1 Indiana Primary Care Clinician FTEs per 100,000 Population in Urban Counties



Map 3.2 Indiana Primary Care Clinician FTEs per 100,000 Population in Rural Counties



Statewide County Data Tables

Primary Care Clinicians: Urban County Data

Table 3.2 shows the total number of primary care physicians, physician assistants, and nurse practitioner FTEs by ratio per 100,000 population in each *urban* county in Indiana. These ratios are weighted using the county weight for each profession discussed in the Methods section. Therefore, these numbers represent an *estimate* of the total number of primary care clinician FTEs available to the communities in each county. Overall, for the state of Indiana, there were 51 primary care clinician FTEs per 100,000 population. Urban counties in Indiana averaged 83 primary care clinician FTEs per 100,000 population. The Robert Graham Center’s research found that, in general there should be 1 primary care clinician FTE for every 1,000 population – or 100 per 100,000 to provide adequate health care in a service area. Counties where the population is older, has more chronic conditions, or other special health care needs would require more primary care clinicians to provide adequate health care. Since many residents of surrounding counties may seek care in the central urban county, a logical service area may be larger or smaller than a county.

Table 3.2 Primary Care Clinician FTEs in Urban Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|---------------|------------------------|---|--|--|---|
| Allen | 355,329 | 151 | 8 | 66 | 225 |
| Bartholomew | 76,794 | 36 | 0 | 15 | 51 |
| Benton | 8,854 | 1 | 0 | 0 | 1 |
| Boone | 56,640 | 36 | 0 | 6 | 42 |
| Brown | 15,242 | 3 | 0 | 2 | 5 |
| Carroll | 20,155 | 1 | 1 | 4 | 6 |
| Clark | 110,232 | 61 | 2 | 24 | 88 |
| Clay | 26,890 | 12 | 2 | 2 | 16 |
| Dearborn | 25,740 | 32 | 1 | 2 | 35 |
| Delaware | 117,671 | 54 | 2 | 21 | 77 |
| Elkhart | 197,559 | 94 | 2 | 28 | 124 |
| Floyd | 74,578 | 47 | 3 | 9 | 60 |
| Franklin | 23,087 | 4 | 1 | 0 | 6 |
| Gibson | 33,503 | 24 | 0 | 7 | 32 |
| Greene | 33,165 | 5 | 1 | 6 | 12 |
| Hamilton | 274,569 | 171 | 8 | 34 | 213 |

Table 3.2 Primary Care Clinician FTEs in Urban Counties (Cont'd.)

| County | 2010 | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|--------------------|------------|--|---|---|--|
| | Population | | | | |
| Hancock | 70,002 | 39 | 1 | 8 | 48 |
| Harrison | 39,364 | 25 | 0 | 6 | 31 |
| Hendricks | 145,448 | 99 | 1 | 12 | 112 |
| Howard | 82,752 | 27 | 5 | 14 | 46 |
| Jasper | 33,478 | 11 | 0 | 3 | 14 |
| Johnson | 139,654 | 71 | 2 | 19 | 92 |
| LaPorte | 111,467 | 69 | 0 | 14 | 83 |
| Lake | 496,005 | 306 | 2 | 78 | 385 |
| Madison | 131,636 | 78 | 1 | 22 | 101 |
| Marion | 903,393 | 679 | 26 | 195 | 900 |
| Monroe | 137,974 | 50 | 3 | 40 | 93 |
| Morgan | 68,894 | 11 | 2 | 5 | 18 |
| Newton | 14,244 | 1 | 1 | 2 | 5 |
| Ohio | 6,128 | 2 | 0 | 1 | 3 |
| Owen | 21,575 | 0 | 0 | 1 | 1 |
| Porter | 164,343 | 88 | 1 | 23 | 112 |
| Posey | 25,910 | 7 | 0 | 1 | 8 |
| Putnam | 37,963 | 21 | 1 | 2 | 24 |
| Shelby | 44,436 | 25 | 3 | 9 | 38 |
| St. Joseph | 266,931 | 170 | 0 | 42 | 213 |
| Sullivan | 21,475 | 12 | 0 | 2 | 14 |
| Tippecanoe | 172,780 | 39 | 0 | 37 | 76 |
| Tipton | 15,936 | 7 | 0 | 0 | 7 |
| Vanderburgh | 179,703 | 139 | 2 | 45 | 187 |
| Vermillion | 16,212 | 4 | 0 | 4 | 8 |
| Vigo | 107,848 | 84 | 0 | 21 | 105 |
| Warrick | 59,689 | 41 | 0 | 14 | 56 |
| Washington | 28,262 | 8 | 0 | 1 | 9 |
| Wells | 27,636 | 21 | 3 | 6 | 30 |
| Whitley | 33,292 | 16 | 0 | 2 | 18 |
| All Urban Counties | 5,054,438 | 63 | 2 | 19 | 83 |
| Statewide | 6,483,802 | 38 | 1 | 12 | 51 |

Primary Care Clinicians: Rural County Data

Table 3.3 shows the total number of primary care physicians, physician assistants, and nurse practitioner FTEs by ratio per 100,000 population in each *rural* county in Indiana. These ratios are weighted using the county weight for each profession discussed in the Methods section. Therefore, these numbers represent an *estimate* of the total number of primary care clinician FTEs available to the communities in each county. Overall, for the state of Indiana, there were 51 primary care clinician FTEs per 100,000 population. Rural counties in Indiana averaged only 18 primary care clinician FTEs per 100,000 population. The Robert Graham Center’s research found that, in general there should be 1 primary care clinician FTE for every 1,000 population – or 100 per 100,000 to provide adequate health care in a service area. Counties where the population is older, has more chronic conditions, or other special health care needs would require more primary care clinicians to provide adequate health care. Since many residents of surrounding counties may seek care in the central urban county, a logical service area may be larger or smaller than a county.

Table 3.3 Primary Care Clinician FTEs in Rural Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|---------------|------------------------|---|--|--|---|
| Adams | 34,387 | 11 | 2 | 6 | 19 |
| Blackford | 12,766 | 8 | 0 | 1 | 9 |
| Cass | 38,966 | 14 | 0 | 12 | 25 |
| Clinton | 33,224 | 13 | 0 | 3 | 16 |
| Crawford | 10,713 | 1 | 0 | 2 | 3 |
| Daviess | 31,648 | 11 | 0 | 6 | 17 |
| DeKalb | 50,047 | 15 | 2 | 6 | 23 |
| Decatur | 42,223 | 15 | 1 | 2 | 18 |
| Dubois | 41,889 | 18 | 0 | 4 | 21 |
| Fayette | 24,277 | 10 | 1 | 2 | 13 |
| Fountain | 17,240 | 5 | 0 | 3 | 8 |
| Fulton | 20,836 | 8 | 0 | 3 | 11 |
| Grant | 70,061 | 44 | 0 | 19 | 62 |
| Henry | 49,462 | 27 | 0 | 13 | 39 |
| Huntington | 37,124 | 18 | 0 | 0 | 18 |
| Jackson | 42,376 | 29 | 3 | 5 | 37 |
| Jay | 21,253 | 5 | 0 | 3 | 8 |
| Jefferson | 32,428 | 2 | 1 | 2 | 6 |
| Jennings | 28,525 | 8 | 1 | 6 | 16 |

Table 3.3 Primary Care Clinician FTEs in Rural Counties (Cont'd.)

| County | 2010 | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|--------------------|------------|--|---|---|--|
| | Population | | | | |
| Knox | 38,440 | 32 | 0 | 11 | 43 |
| Kosciusko | 77,358 | 30 | 2 | 6 | 38 |
| Lagrange | 37,128 | 14 | 1 | 2 | 18 |
| Lawrence | 46,134 | 14 | 0 | 7 | 21 |
| Marshall | 47,051 | 23 | 1 | 9 | 33 |
| Martin | 10,334 | 2 | 0 | 2 | 4 |
| Miami | 36,903 | 17 | 0 | 7 | 23 |
| Montgomery | 38,124 | 15 | 1 | 6 | 22 |
| Noble | 47,536 | 14 | 0 | 5 | 19 |
| Orange | 19,840 | 11 | 0 | 4 | 15 |
| Parke | 17,339 | 5 | 0 | 5 | 10 |
| Perry | 19,338 | 6 | 0 | 3 | 9 |
| Pike | 12,845 | 4 | 0 | 1 | 5 |
| Pulaski | 13,402 | 7 | 0 | 5 | 12 |
| Randolph | 26,171 | 11 | 0 | 7 | 17 |
| Ripley | 28,818 | 13 | 0 | 2 | 16 |
| Rush | 17,392 | 13 | 0 | 6 | 19 |
| Scott | 24,181 | 11 | 1 | 4 | 16 |
| Spencer | 20,952 | 5 | 0 | 3 | 8 |
| Starke | 23,363 | 10 | 0 | 4 | 14 |
| Steuben | 34,185 | 13 | 0 | 3 | 16 |
| Switzerland | 10,613 | 0 | 0 | 1 | 1 |
| Union | 7,516 | 3 | 0 | 2 | 5 |
| Wabash | 32,888 | 11 | 1 | 3 | 15 |
| Warren | 8,508 | 4 | 0 | 1 | 5 |
| Wayne | 68,917 | 42 | 0 | 12 | 53 |
| White | 24,643 | 2 | 0 | 3 | 5 |
| All Rural Counties | 1,429,364 | 13 | 0 | 5 | 18 |
| Statewide | 6,483,802 | 38 | 1 | 12 | 51 |

Urban Counties Age Data

Primary Care Workforce Characteristics

Table 3.4 displays the primary care physician, physician assistant, and nurse practitioner FTEs in all urban counties in Indiana. Overall, less than one-third (30.6%) of all primary care clinician FTEs were nearing retirement age. However, only 20.7 percent of primary care physician assistant FTEs were nearing retirement age.

Table 3.4 Urban Counties Primary Care Provider Age by FTE*

| Primary Care Clinician FTEs in Urban Counties | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 1,625 | 68 | 764 | 32 | 2,389 | 100.0 |
| Primary Care PAs | 62 | 79 | 16 | 21 | 79 | 100.0 |
| Primary Care NPs | 560 | 73 | 212 | 27 | 772 | 100.0 |
| All Primary Care Providers | 2,247 | 69 | 992 | 31 | 3,239 | 100.0 |
| No Response Given | | | | | 66 | |

**These numbers represent survey respondents only.*

Rural Counties Data

Primary Care Workforce Characteristics

Table 3.5 displays the primary care physician, physician assistant, and nurse practitioner FTEs in all rural counties in Indiana. Overall, approximately one-third (33.6%) of all primary care clinician FTEs were nearing retirement age. However, 37.5 percent of primary care physician FTEs were nearing retirement age.

Table 3.5 Rural Counties Primary Care Provider Age by FTE*

| Primary Care Clinician FTEs in Rural Counties | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 307 | 62 | 184 | 38 | 491 | 100.0 |
| Primary Care PAs | 13 | 71 | 5 | 29 | 18 | 100.0 |
| Primary Care NPs | 153 | 75 | 50 | 25 | 203 | 100.0 |
| All Primary Care Providers | 472 | 66 | 239 | 34 | 711 | 100.0 |
| No Response Given | | | | | 13 | |

**These numbers represent survey respondents only.*

HPSA and MUA Designations in Indiana

Health Resources and Service Administration (HRSA) designated Health Professional Shortage Areas (HPSAs) and Medically Underserved Areas (MUAs) are entitled to federal programs that help address the lack of adequate medical service in the area (or population). HPSA and MUA designations are meant to identify areas where the lack of adequate care exists so that programs can be initiated to increase the number of health professionals in the area through monetary incentives and training programs.

Three types of HPSAs exist: primary medical care, dental health care, and mental health care. Because the focus of this report is primary care, only the primary care HPSAs will be reviewed. Primary care HPSAs may encompass a geographic region, a specific population, or a specific facility. It should be noted that the HRSA primary care shortage criteria use physician data only, not the range of clinicians used in this report. A geographic region may be considered a HPSA if there is a ratio greater than or equal to 3,500:1 (population to primary care physician FTE) *or* if there is a ratio greater than or equal to 3,000:1 (population to primary care physician FTE) *and* the population exhibits an unusually high need for primary care services. Additionally, it must be shown that contiguous areas cannot compensate for the lack of adequate medical care. A population can be considered for HPSA designation if the following criteria are met: (1) the population resides in “an area that is rational for the delivery of primary medical care services;” (2) barriers to access exist that prevent the group from seeing local primary care clinicians; and (3) the population resides in an area with a ratio greater than or equal to 3,000:1 (population to primary care physician FTE). Specific facilities may also be designated as HPSAs. These facilities must be “[f]ederal and/or [s]tate correctional institutions or public and/or non-profit medical facilities.” Further guidelines exist for these facilities, but these are not the focus of this report.⁶

MUA designation is based on the Index of Medical Underservice (IMU). The IMU is calculated on several factors and ranges from 0 (completely underserved) to 100 (best served). An IMU less than or equal to 62.0 qualifies an area for MUA designation. There are four factors which are assigned a weighted score to determine an area’s IMU: (1) percentage of population below the poverty level; (2) percentage of population age 65 and older; (3) infant mortality rate; and (4) ratio of primary care physicians per 1,000 population.⁷

⁶ Primary Medical Care HPSA Designation Overview. Health Resources and Services Administration. <http://bhpr.hrsa.gov/shortage/hpsas/designationcriteria/primarycarehpsaoverview.html>

⁷ Medically Underserved Areas & Populations (MUA/Ps). Health Resources and Services Administration. <http://bhpr.hrsa.gov/shortage/muaps/index.html>

Indiana Primary Care HPSA Designations

Fifty-six (60.9%) of Indiana's counties contain at least one primary care HPSA. Of these 56 counties, there are 44 counties that are county-wide primary care HPSAs and 12 counties in which a subset of the county is considered a primary care HPSA. When a HPSA occupies only a small subset of the county the designation is based on either townships or census tracts within that county. The following maps compare the ratio of primary care clinician FTEs to population in HPSAs (Map 3.3) and the ratio of primary care clinician FTEs to population in non-HPSAs (Map 3.4).

Map 3.3 displays the ratio of primary care clinician FTEs per 100,000 population in Indiana primary care HPSAs. The majority of counties containing primary care HPSAs have less than 53 primary care clinician FTEs per 100,000 population. Not surprisingly, primary care HPSAs in larger cities such as Crawfordsville (Montgomery County), Fort Wayne (Allen County), Indianapolis (Marion County), and South Bend (St. Joseph County) had the highest ratios of primary care clinician FTEs to population. However, the HPSA in Evansville (Vanderburgh County) did not follow this trend.

Map 3.3 Primary Care Clinician FTEs per 100,000 Population in Indiana Primary Care HPSAs



Map 3.4 displays the ratio of primary care clinician FTEs per 100,000 population in non-primary care HPSAs around Indiana (the inverse of Map 3.3). Generally, more populous counties had the highest ratios of primary care clinician FTEs to population. Counties that contained smaller primary care HPSAs located within major cities (such as Allen, Marion, Montgomery, and St. Joseph Counties) were still in the highest tier of clinician to population ratios with the exception of Allen County.

Map 3.4 Primary Care Clinician FTEs per 100,000 Population in non-Primary Care HPSAs in Indiana



Indiana MUA Designations

There are currently 71 counties (77.2%) in Indiana that contain a MUA. Of these 71 counties, 33 contain MUAs that include only a subregion of that county. When a MUA occupies only a small subset of the county the designation is based on either townships or census tracts within that county. The following maps compare the ratio of primary care clinician FTEs to population in MUAs (Map 3.5) and the ratio of primary care clinician FTEs to population in non-MUAs (Map 3.6).

Map 3.5 shows the ratio of primary care clinician FTEs per 100,000 population in Indiana MUAs. The majority of MUAs had less than 56 primary care clinicians per 100,000 population. There is notable variation in the geographic location, population, and rurality of MUAs with a high ratio of clinicians to population. Low ratios of clinicians to population in MUAs located in large cities such as Indianapolis (Marion County), Evansville (Vanderburgh County), and Fort Wayne (Allen County) were unexpected since these areas generally display the highest ratios of clinicians to population.

Map 3.5 Primary Care Clinician FTEs per 100,000 Population in Indiana MUAs



Map 3.6 presents the ratio of primary care clinician FTEs per 100,000 population for areas in Indiana that are not MUA designated (the inverse of Map 3.5). In general, the most populous counties had the highest ratio of clinicians to population. Counties containing regions designated as MUAs also showed high ratios of clinicians to population (such as Lake, Marion, and Wayne Counties). This indicates that in some cases the primary care clinicians needed in these MUAs could exist in nearby locations, but barriers such as cost or adequate transportation keep disadvantaged populations from accessing these clinicians.

Chapter 4: Proportion Nearing Retirement Age and Geographic Distributions of Primary Care Clinicians in Indiana by AHEC Regions

This chapter presents the statewide proportion nearing retirement age (55 or older) and geographical distributions of Indiana primary care clinician FTEs by Indiana AHEC region. Clinicians age 55 and older were considered to be “nearing retirement” and may need to be replaced by new recruits to the primary care workforce within the next decade. The age data are presented region by region. Additionally, the geographic distribution of primary care clinicians (by FTEs per 100,000 population) is presented as regional maps. These data are also presented in tabular format for each region. It should be noted that the numbers reported in the maps and county tables are *weighted estimates* of FTEs that are meant to estimate the actual accessible workforce of primary care clinicians to the communities that they serve.

East Indiana (EI) Region

Primary Care Workforce Characteristics

Table 4.1 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in the EI region of Indiana. Over one-quarter (28.9%) of all primary care clinician FTEs were nearing retirement age. The primary care physician workforce had the highest proportion of clinician FTEs nearing retirement (31.3%) and primary care physician assistants had the lowest proportion (16.7%), but there were only 6 primary care physician assistant FTEs in the entire region.

Table 4.1 EI Region Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in EI Region | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 120 | 69 | 55 | 31 | 175 | 100.0 |
| Primary Care PAs | 5 | 83 | 1 | 17 | 6 | 100.0 |
| Primary Care NPs | 46 | 77 | 14 | 23 | 60 | 100.0 |
| All Primary Care Providers | 171 | 71 | 70 | 29 | 240 | 100.0 |
| No Response Given | | | | | 5 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in EI Region

Map 4.1 displays combined FTEs for primary care physician, physician assistant and nurse practitioners in the EI region. The EI region consists of Bartholomew, Dearborn, Decatur, Fayette, Franklin, Henry, Jefferson, Jennings, Ohio, Ripley, Rush, Switzerland, Union and Wayne Counties, out of which only Dearborn, Franklin and Ohio are not rural. The total population of the EI region is 441,920 making it the second least populous AHEC region.

Map 4.1 EI Region Primary Care Clinician FTEs

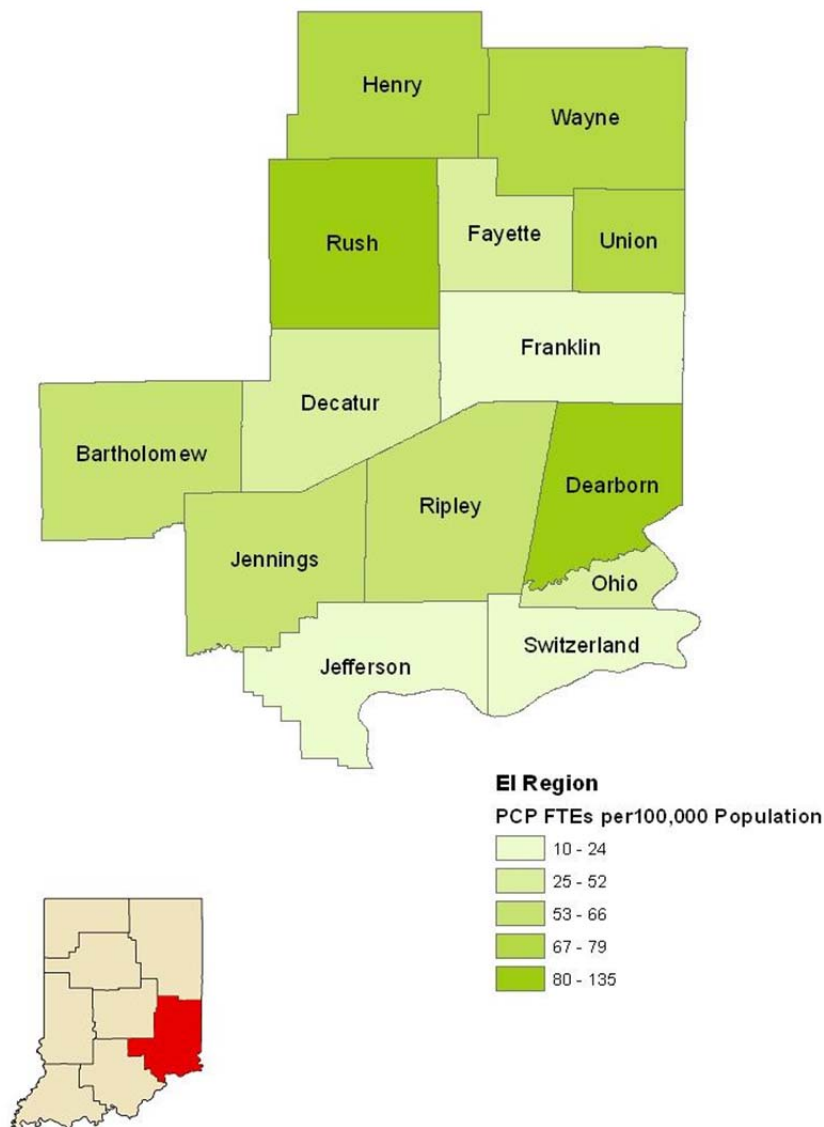


Table 4.2 Primary Care Clinician FTEs per 100,000 Population in EI Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|-----------------|----------------------------|---|--|--|---|
| Bartholomew | 76,794 | 36 | 0 | 15 | 51 |
| Dearborn | 25,740 | 32 | 1 | 2 | 35 |
| Decatur | 42,223 | 15 | 1 | 2 | 18 |
| Fayette | 24,277 | 10 | 1 | 2 | 13 |
| Franklin | 23,087 | 4 | 1 | 0 | 6 |
| Henry | 49,462 | 27 | 0 | 13 | 39 |
| Jefferson | 32,428 | 2 | 1 | 2 | 6 |
| Jennings | 28,525 | 8 | 1 | 6 | 16 |
| Ohio | 6,128 | 2 | 0 | 1 | 3 |
| Ripley | 28,818 | 13 | 0 | 2 | 16 |
| Rush | 17,392 | 13 | 0 | 6 | 19 |
| Switzerland | 10,613 | 0 | 0 | 1 | 1 |
| Union | 7,516 | 3 | 0 | 2 | 5 |
| Wayne | 68,917 | 42 | 0 | 12 | 53 |
| All EI Counties | 441,920 | 15 | 0 | 5 | 20 |

Metropolitan Indianapolis/Central Indiana (MICI) Region

Primary Care Workforce Characteristics

Table 4.3 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in the MICI region. Approximately one-quarter (25.7%) of all primary care clinician FTEs were nearing retirement age. The primary care nurse practitioner workforce had the highest proportion of clinician FTEs nearing retirement (27.7%) and primary care physician assistants had the lowest proportion (13.1%).

Table 4.3 MICI Region Primary Care Provider Age by FTE*

| Primary Care Clinician FTEs in MICI Region | Under 55 years old | | 55 years old and over | | Total | |
|---|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 749 | 74 | 259 | 26 | 1,008 | 100.0 |
| Primary Care PAs | 35 | 87 | 5 | 13 | 40 | 100.0 |
| Primary Care NPs | 202 | 72 | 77 | 28 | 279 | 100.0 |
| All Primary Care Providers | 986 | 74 | 341 | 26 | 1,327 | 100.0 |
| No Response Given | | | | | 22 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in MICI Region

Map 4.2 displays combined FTEs for primary care physician, physician assistant and nurse practitioners in the MICI region. The MICI region consists of Boone, Hamilton, Hancock, Hendricks, Johnson, Madison, Marion, Morgan and Shelby Counties. None of these counties are considered to be rural. The total population of the MICI region is 1,834,672 making it the most populous among the AHEC regions.

Map 4.2 MICI Region Primary Care Clinician FTEs

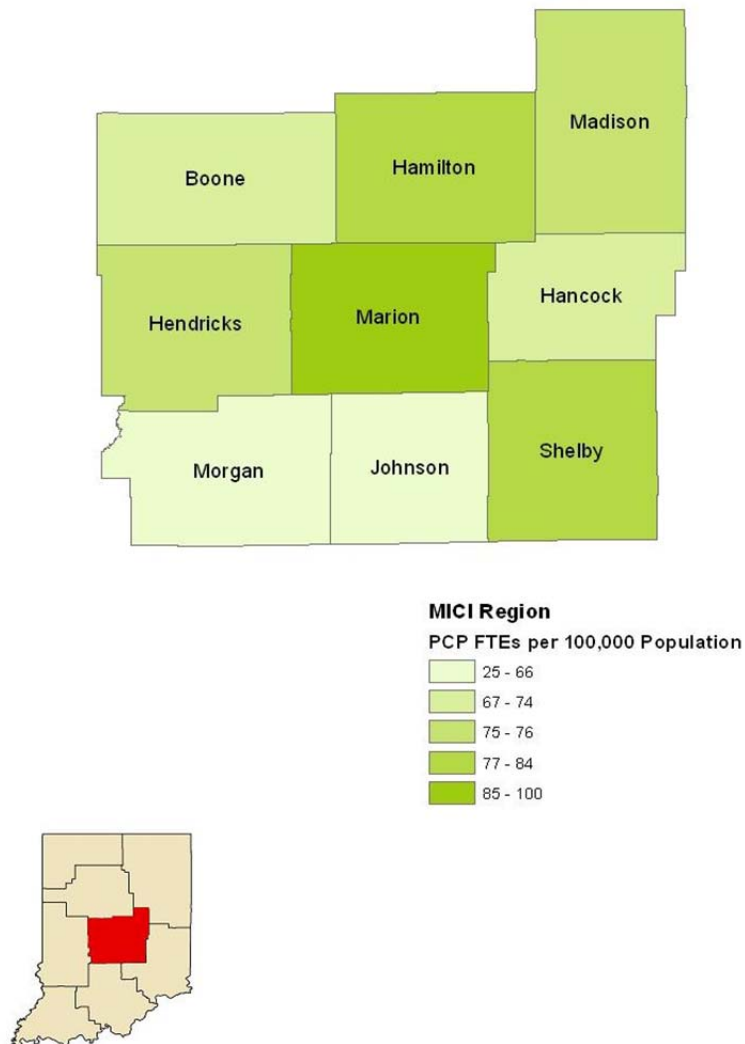


Table 4.4 Primary Care Clinician FTEs per 100,000 Population in MICI Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|-------------------|----------------------------|---|--|--|---|
| Boone | 56,640 | 36 | 0 | 6 | 42 |
| Hamilton | 274,569 | 171 | 8 | 34 | 213 |
| Hancock | 70,002 | 39 | 1 | 8 | 48 |
| Hendricks | 145,448 | 99 | 1 | 12 | 112 |
| Johnson | 139,654 | 71 | 2 | 19 | 92 |
| Madison | 131,636 | 78 | 1 | 22 | 101 |
| Marion | 903,393 | 679 | 26 | 195 | 900 |
| Morgan | 68,894 | 11 | 2 | 5 | 18 |
| Shelby | 44,436 | 25 | 3 | 9 | 38 |
| All MICI Counties | 1,834,672 | 134 | 5 | 34 | 174 |

North Central Indiana (NCI) Region

Primary Care Workforce Characteristics

Table 4.5 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in the NCI region. The primary care physician assistant workforce had the highest proportion of clinician FTEs nearing retirement (72.7%) and primary care nurse practitioners had the lowest proportion (30.9%). However, there were only 5.5 primary care physician assistant FTEs in the entire region.

Table 4.5 NCI Region Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in NCI Region | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 68 | 60 | 45 | 40 | 113 | 100.0 |
| Primary Care PAs | 2 | 27 | 4 | 73 | 6 | 100.0 |
| Primary Care NPs | 54 | 69 | 24 | 31 | 79 | 100.0 |
| All Primary Care Providers | 123 | 63 | 73 | 37 | 197 | 100.0 |
| No Response Given | | | | | 5 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in NCI Region

Map 4.3 displays combined FTEs for primary care physician, physician assistant and nurse practitioners in the NCI region. The NCI region consists of Benton, Carroll, Cass, Clinton, Fulton, Howard, Miami, Pulaski, Tipton, Tippecanoe, and White Counties, out of which Benton, Cass, Clinton, Fulton, Miami, Pulaski, and White are considered to rural. The total population of the NCI region is 468,451 making it the fifth most populous among the AHEC regions.

Map 4.3 NCI Region Primary Care Clinician FTEs

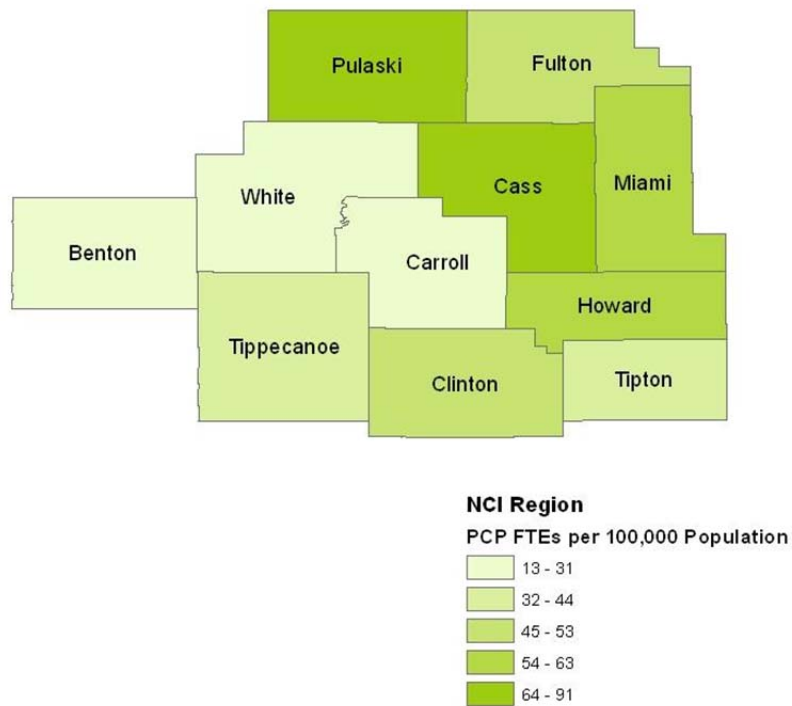


Table 4.6 Primary Care Clinician FTEs per 100,000 Population in NCI Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|------------------|----------------------------|---|--|--|---|
| Benton | 8,854 | 1 | 0 | 0 | 1 |
| Carroll | 20,155 | 1 | 1 | 4 | 6 |
| Cass | 38,966 | 14 | 0 | 12 | 25 |
| Clinton | 33,224 | 13 | 0 | 3 | 16 |
| Fulton | 20,836 | 8 | 0 | 3 | 11 |
| Howard | 82,752 | 27 | 5 | 14 | 46 |
| Miami | 36,903 | 17 | 0 | 7 | 23 |
| Pulaski | 13,402 | 7 | 0 | 5 | 12 |
| Tippecanoe | 172,780 | 39 | 0 | 37 | 76 |
| Tipton | 15,936 | 7 | 0 | 0 | 7 |
| White | 24,643 | 2 | 0 | 3 | 5 |
| All NCI Counties | 468,451 | 12 | 1 | 8 | 21 |

Northeast Indiana (NEI) Region

Primary Care Workforce Characteristics

Table 4.7 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in the NEI region. Less than one-third (31.9%) of all primary care clinician FTEs were nearing retirement age. The primary care physician workforce had the highest proportion of clinician FTEs nearing retirement (35.3%) and primary care physician assistants had the lowest proportion (19.3%).

Table 4.7 NEI Region Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in NEI Region | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 284 | 65 | 155 | 35 | 440 | 100.0 |
| Primary Care PAs | 17 | 81 | 4 | 19 | 21 | 100.0 |
| Primary Care NPs | 126 | 76 | 41 | 24 | 167 | 100.0 |
| All Primary Care Providers | 427 | 68 | 200 | 32 | 627 | 100.0 |
| No Response Given | | | | | 9 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in NEI Region

Map 4.4 displays the combined FTEs for primary care physicians, physician assistants, and nurse practitioners in the NEI region. The NEI region includes Adams, Allen, Blackford, DeKalb, Delaware, Elkhart, Grant, Huntington, Jay, Kosciusko, LaGrange, Noble, Randolph, Steuben, Wabash, Wells, and Whitley Counties. Only Allen, Delaware, Elkhart, Wells, and Whitley Counties are not considered rural. The total population of the NEI region is 1,212,391 making it the second most populous AHEC region in Indiana.

Map 4.4 NEI Region Primary Care Clinician FTEs

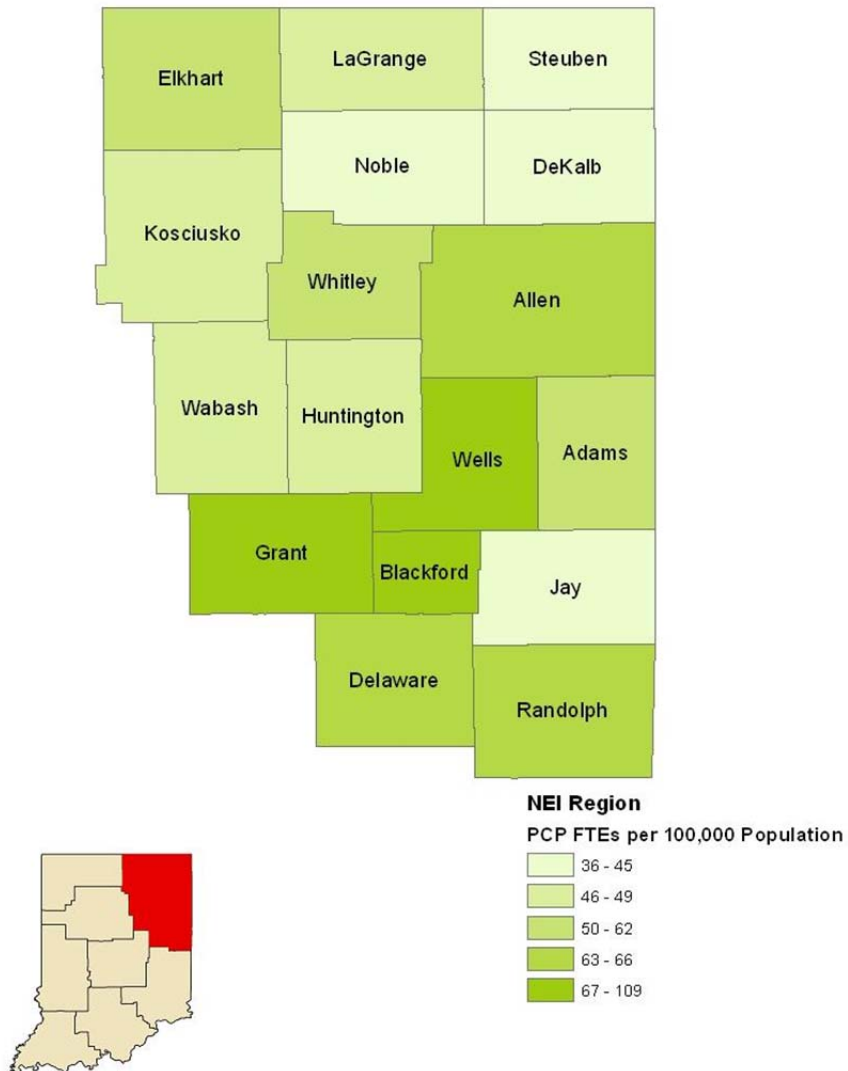


Table 4.8 Primary Care Clinician FTEs per 100,000 Population in NEI Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|------------------|----------------------------|---|--|--|---|
| Adams | 34,387 | 11 | 2 | 6 | 19 |
| Allen | 355,329 | 151 | 8 | 66 | 225 |
| Blackford | 12,766 | 8 | 0 | 1 | 9 |
| DeKalb | 50,047 | 15 | 2 | 6 | 23 |
| Delaware | 117,671 | 54 | 2 | 21 | 77 |
| Elkhart | 197,559 | 94 | 2 | 28 | 124 |
| Grant | 70,061 | 44 | 0 | 19 | 62 |
| Huntington | 37,124 | 18 | 0 | 0 | 18 |
| Jay | 21,253 | 5 | 0 | 3 | 8 |
| Kosciusko | 77,358 | 30 | 2 | 6 | 38 |
| Lagrange | 37,128 | 14 | 1 | 2 | 18 |
| Noble | 47,536 | 14 | 0 | 5 | 19 |
| Randolph | 26,171 | 11 | 0 | 7 | 17 |
| Steuben | 34,185 | 13 | 0 | 3 | 16 |
| Wabash | 32,888 | 11 | 1 | 3 | 15 |
| Wells | 27,636 | 21 | 3 | 6 | 30 |
| Whitley | 33,292 | 16 | 0 | 2 | 18 |
| All NEI Counties | 1,212,391 | 31 | 1 | 11 | 43 |

Northwest Indiana (NWI) Region

Primary Care Workforce Characteristics

Table 4.9 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in the NWI region. Over one-third (34.9%) of all primary care clinician FTEs were nearing retirement age. The primary care physician workforce had the highest proportion of clinician FTEs nearing retirement (36.9%) and primary care physician assistants had the lowest proportion (21.1%). However, there were only 4.75 primary care physician assistant FTEs in the entire region.

Table 4.9 NWI Region Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in NWI Region | Under 55 years old | | 55 years old and over | | Total | |
|---|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 351 | 63 | 206 | 37 | 557 | 100.0 |
| Primary Care PAs | 4 | 79 | 1 | 21 | 5 | 100.0 |
| Primary Care NPs | 114 | 72 | 44 | 28 | 158 | 100.0 |
| All Primary Care Providers | 469 | 65 | 251 | 35 | 719 | 100.0 |
| No Response Given | | | | | 20 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in NWI Region

Map 4.5 shows the combined FTEs of primary care physicians, physician assistants, and nurse practitioners in the NWI region. The NWI region includes Jasper, Lake, LaPorte, Marshall, Newton, Porter, St. Joseph, and Starke Counties. Marshall and Starke Counties are considered rural. The total population of the NWI region is 1,156,882 making it the third most populous AHEC region.

Map 4.5 NWI Region Primary Care Clinician FTEs

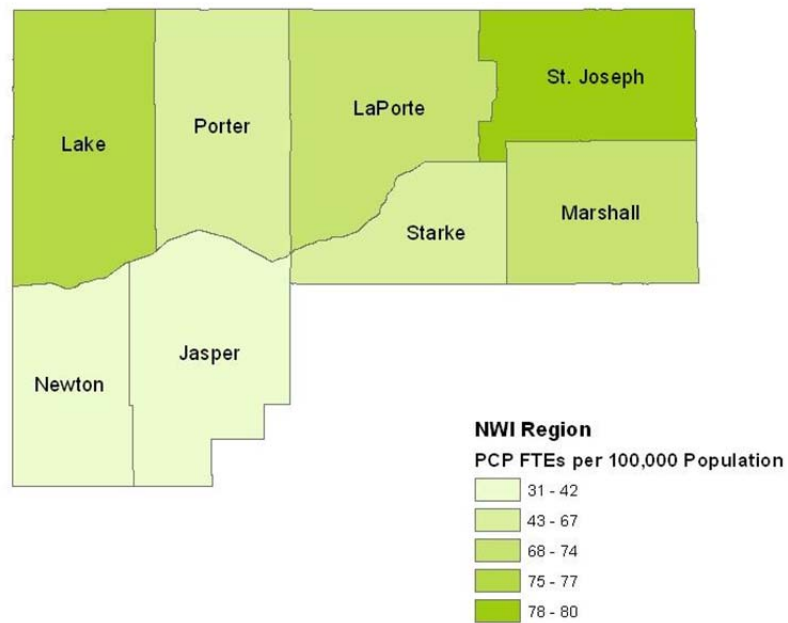


Table 4.10 Primary Care Clinician FTEs per 100,000 Population in NWI Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|------------------|----------------------------|---|--|--|---|
| Jasper | 33,478 | 11 | 0 | 3 | 14 |
| Lake | 496,005 | 306 | 2 | 78 | 385 |
| LaPorte | 111,467 | 69 | 0 | 14 | 83 |
| Marshall | 47,051 | 23 | 1 | 9 | 33 |
| Newton | 14,244 | 1 | 1 | 2 | 5 |
| Porter | 164,343 | 88 | 1 | 23 | 112 |
| St. Joseph | 266,931 | 170 | 0 | 42 | 213 |
| Starke | 23,363 | 10 | 0 | 4 | 14 |
| All NWI Counties | 1,156,882 | 85 | 1 | 22 | 107 |

South Central Indiana (SCI) Region

Primary Care Workforce Characteristics

Table 4.11 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in the SCI region. Approximately one-third (33.7%) of all primary care clinician FTEs were nearing retirement age. The primary care physician workforce had the highest proportion of clinician FTEs nearing retirement (36.9%) and primary care physician assistants had the lowest proportion (16.7%).

Table 4.11 SCI Region Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in SCI Region | Under 55 years old | | 55 years old and over | | Total | |
|---|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 136 | 63 | 79 | 37 | 215 | 100.0 |
| Primary Care PAs | 10 | 83 | 2 | 17 | 12 | 100.0 |
| Primary Care NPs | 69 | 71 | 28 | 29 | 97 | 100.0 |
| All Primary Care Providers | 215 | 66 | 109 | 34 | 324 | 100.0 |
| No Response Given | | | | | 13 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in SCI Region

Map 4.6 displays the combined FTE data of primary care physicians, physician assistants, and nurse practitioners in the SCI region. The SCI region consists of Brown, Clark, Crawford, Floyd, Harrison, Jackson, Lawrence, Martin, Monroe, Orange, Scott, and Washington Counties. Crawford, Jackson, Lawrence, Martin, Orange, and Scott Counties are considered rural. The SCI region is the fourth most populous AHEC region with a total population of 559,230.

Map 4.6 SCI Region Primary Care Clinician FTEs

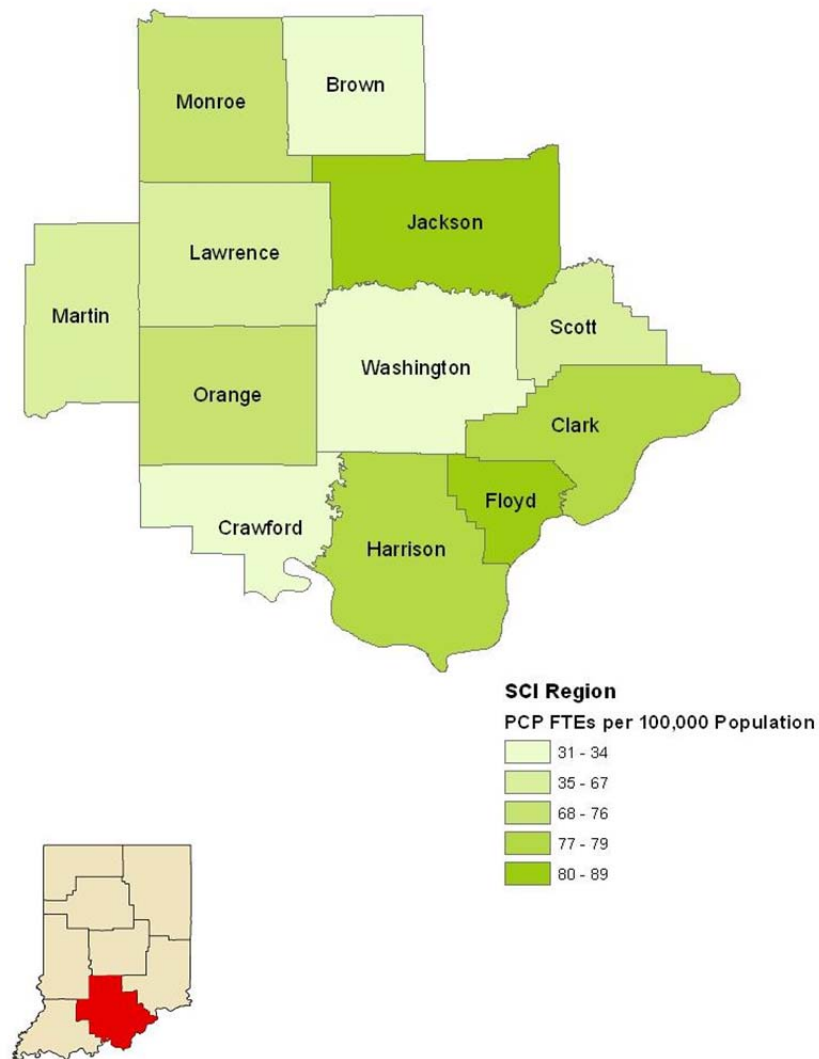


Table 4.12 Primary Care Clinician FTEs per 100,000 Population in SCI Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|------------------|----------------------------|---|--|--|---|
| Brown | 15,242 | 3 | 0 | 2 | 5 |
| Clark | 110,232 | 61 | 2 | 24 | 88 |
| Crawford | 10,713 | 1 | 0 | 2 | 3 |
| Floyd | 74,578 | 47 | 3 | 9 | 60 |
| Harrison | 39,364 | 25 | 0 | 6 | 31 |
| Jackson | 42,376 | 29 | 3 | 5 | 37 |
| Lawrence | 46,134 | 14 | 0 | 7 | 21 |
| Martin | 10,334 | 2 | 0 | 2 | 4 |
| Monroe | 137,974 | 50 | 3 | 40 | 93 |
| Orange | 19,840 | 11 | 0 | 4 | 15 |
| Scott | 24,181 | 11 | 1 | 4 | 16 |
| Washington | 28,262 | 8 | 0 | 1 | 9 |
| All SCI Counties | 559,230 | 22 | 1 | 9 | 32 |

Southwest Indiana (SWI) Region

Primary Care Workforce Characteristics

Table 4.13 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in the SWI region. Less than one-third (31.4%) of all primary care clinician FTEs were nearing retirement age. The primary care physician workforce had the highest proportion of clinician FTEs nearing retirement (36.5%) and primary care physician assistants had the lowest proportion (0.0%). However, there were only 2 primary care physician assistant FTEs in the entire region.

Table 4.13 SWI Region Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in SWI Region | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 152 | 64 | 88 | 36 | 240 | 100.0 |
| Primary Care PAs | 2 | 100 | 0 | 0 | 2 | 100.0 |
| Primary Care NPs | 72 | 82 | 16 | 18 | 88 | 100.0 |
| All Primary Care Providers | 226 | 69 | 103 | 31 | 329 | 100.0 |
| No Response Given | | | | | 1 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in SWI Region

Map 4.7 shows the combined FTE data of primary care physicians, physician assistants, and nurse practitioners in the SWI region. The SWI region includes Daviess, Dubois, Gibson, Knox, Perry, Pike, Posey, Spencer, Vanderburgh, and Warrick Counties, out of which Gibson, Posey, Vanderburgh and Warrick are the only ones that are not considered rural. The SWI region is the third least populous AHEC region with a total population of 463,917.

Map 4.7 SWI Region Primary Care Clinician FTEs

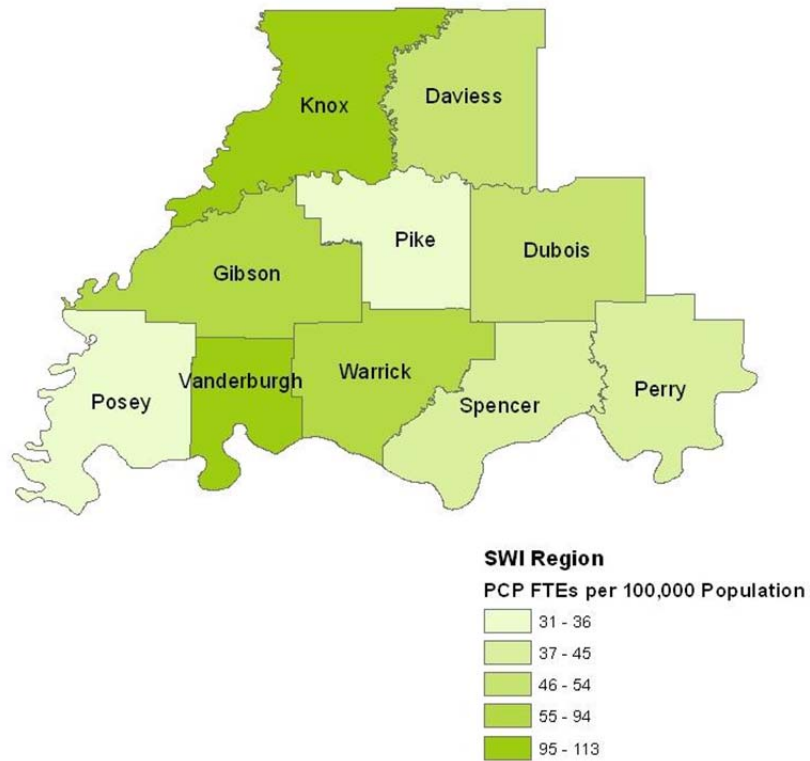


Table 4.14 Primary Care Clinician FTEs per 100,000 Population in SWI Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|------------------|----------------------------|---|--|--|---|
| Daviess | 31,648 | 11 | 0 | 6 | 17 |
| Dubois | 41,889 | 18 | 0 | 4 | 21 |
| Gibson | 33,503 | 24 | 0 | 7 | 32 |
| Knox | 38,440 | 32 | 0 | 11 | 43 |
| Perry | 19,338 | 6 | 0 | 3 | 9 |
| Pike | 12,845 | 4 | 0 | 1 | 5 |
| Posey | 25,910 | 7 | 0 | 1 | 8 |
| Spencer | 20,952 | 5 | 0 | 3 | 8 |
| Vanderburgh | 179,703 | 139 | 2 | 45 | 187 |
| Warrick | 59,689 | 41 | 0 | 14 | 56 |
| All SWI Counties | 463,917 | 29 | 0 | 10 | 39 |

West Central Indiana (WCI) Region

Primary Care Workforce Characteristics

Table 4.15 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in the WCI region. Nearly half (44.3%) of all primary care clinician FTEs were nearing retirement age. The primary care physician assistant workforce had the highest proportion of clinician FTEs nearing retirement (80.0%) and primary care nurse practitioners had the lowest proportion (35.9%). However, there were only 5 primary care physician assistant FTEs in the entire region.

Table 4.15 WCI Region Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in WCI Region | Under 55 years old | | 55 years old and over | | Total | |
|---|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 75 | 54 | 64 | 46 | 138 | 100.0 |
| Primary Care PAs | 1 | 20 | 4 | 80 | 5 | 100.0 |
| Primary Care NPs | 31 | 64 | 18 | 36 | 49 | 100.0 |
| All Primary Care Providers | 107 | 56 | 85 | 44 | 192 | 100.0 |
| No Response Given | | | | | 4 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in WCI Region

Map 4.8 displays the combined FTE data of primary care physicians, physician assistants, and nurse practitioners in the WCI region. The WCI region consists of Clay, Fountain, Greene, Montgomery, Owen, Parke, Putnam, Sullivan, Vermillion, Vigo, and Warren Counties. Fountain, Montgomery, Parke, and Warren Counties are considered rural. The WCI region has a total population of 346,339 making it the least populous AHEC region in Indiana.

Map 4.8 WCI Region Primary Care Clinician FTEs

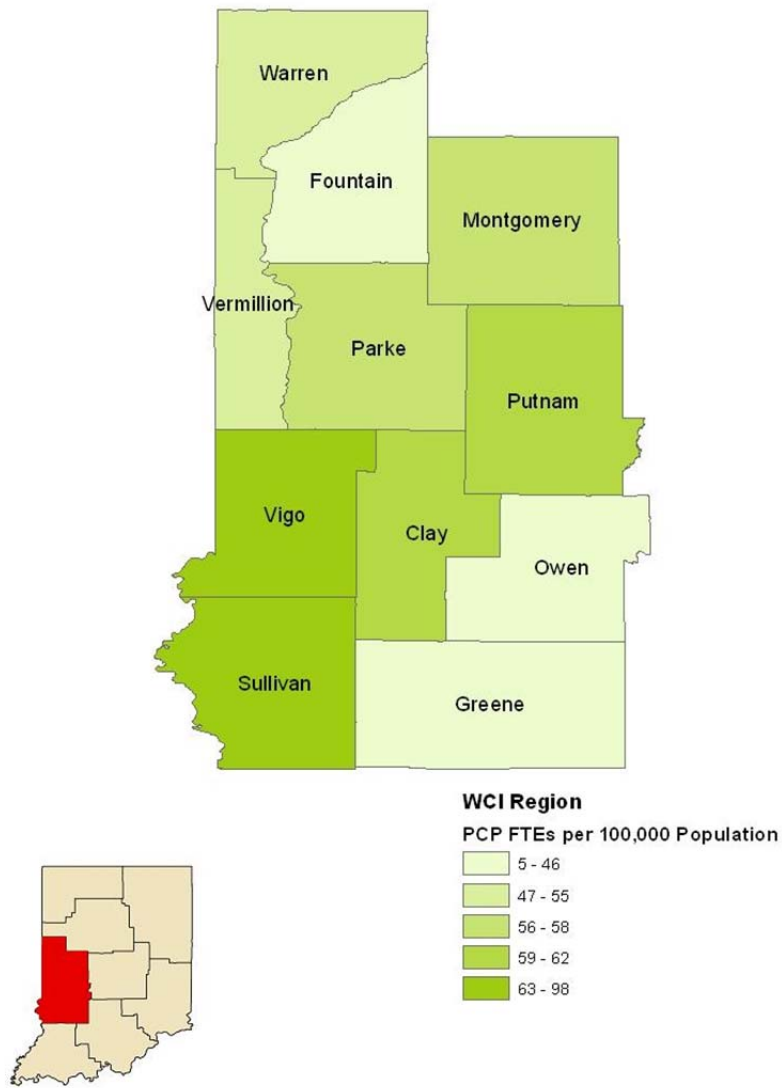


Table 4.16 Primary Care Clinician FTEs per 100,000 Population in WCI Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|------------------|--------------------|---|---|---|--|
| | | | | | |
| Clay | 26,890 | 12 | 2 | 2 | 16 |
| Fountain | 17,240 | 5 | 0 | 3 | 8 |
| Greene | 33,165 | 5 | 1 | 6 | 12 |
| Montgomery | 38,124 | 15 | 1 | 6 | 22 |
| Owen | 21,575 | 0 | 0 | 1 | 1 |
| Parke | 17,339 | 5 | 0 | 5 | 10 |
| Putnam | 37,963 | 21 | 1 | 2 | 24 |
| Sullivan | 21,475 | 12 | 0 | 2 | 14 |
| Vermillion | 16,212 | 4 | 0 | 4 | 8 |
| Vigo | 107,848 | 84 | 0 | 21 | 105 |
| Warren | 8,508 | 4 | 0 | 1 | 5 |
| All WCI Counties | 346,339 | 15 | 0 | 5 | 20 |

Chapter 5: Proportion Nearing Retirement Age and Geographic Distributions of Primary Care Clinicians in Indiana by ISDH Public Health Regions

This chapter presents the statewide proportion nearing retirement age (55 or older) and geographical distributions of Indiana primary care clinician FTEs by ISDH public health region. Clinicians age 55 and older were considered to be “nearing retirement” and may need to be replaced by new recruits to the primary care workforce within the next decade. The age data are presented region by region. Additionally, the geographic distribution of primary care clinicians (by FTEs per 100,000 population) is presented as regional maps. These data are also presented in tabular format for each region. It should be noted that the numbers reported in the maps and county tables are *weighted estimates* of FTEs that are meant to estimate the actual accessible workforce of primary care clinicians to the communities that they serve.

ISDH Public Health Region 1

Primary Care Workforce Characteristics

Table 5.1 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in ISDH region 1. Nearly two-fifths (38.4%) of all primary care clinician FTEs were nearing retirement age. The primary care physician workforce had the highest proportion of clinician FTEs nearing retirement (40.4%) and primary care physician assistants had the lowest proportion (26.7%). However, there were only 3.75 primary care physician assistant FTEs in the entire region.

Table 5.1 ISDH Public Health Region 1 Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in ISDH Region 1 | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 232 | 60 | 158 | 40 | 390 | 100.0 |
| Primary Care PAs | 3 | 73 | 1 | 27 | 4 | 100.0 |
| Primary Care NPs | 74 | 69 | 34 | 31 | 108 | 100.0 |
| All Primary Care Providers | 309 | 62 | 193 | 38 | 502 | 100.0 |
| No Response Given | | | | | 13 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in Public Health Region 1

Map 5.1 displays the combined FTE data for primary care physicians, physician assistants, and nurse practitioners in ISDH public health region 1. Region 1 consists of Jasper, Lake, LaPorte, Newton, and Porter Counties, none of which are considered rural. The total regional population is 819,537 making it the second most populous ISDH region in Indiana.

Map 5.1 ISDH Region 1 Primary Care Clinician FTEs

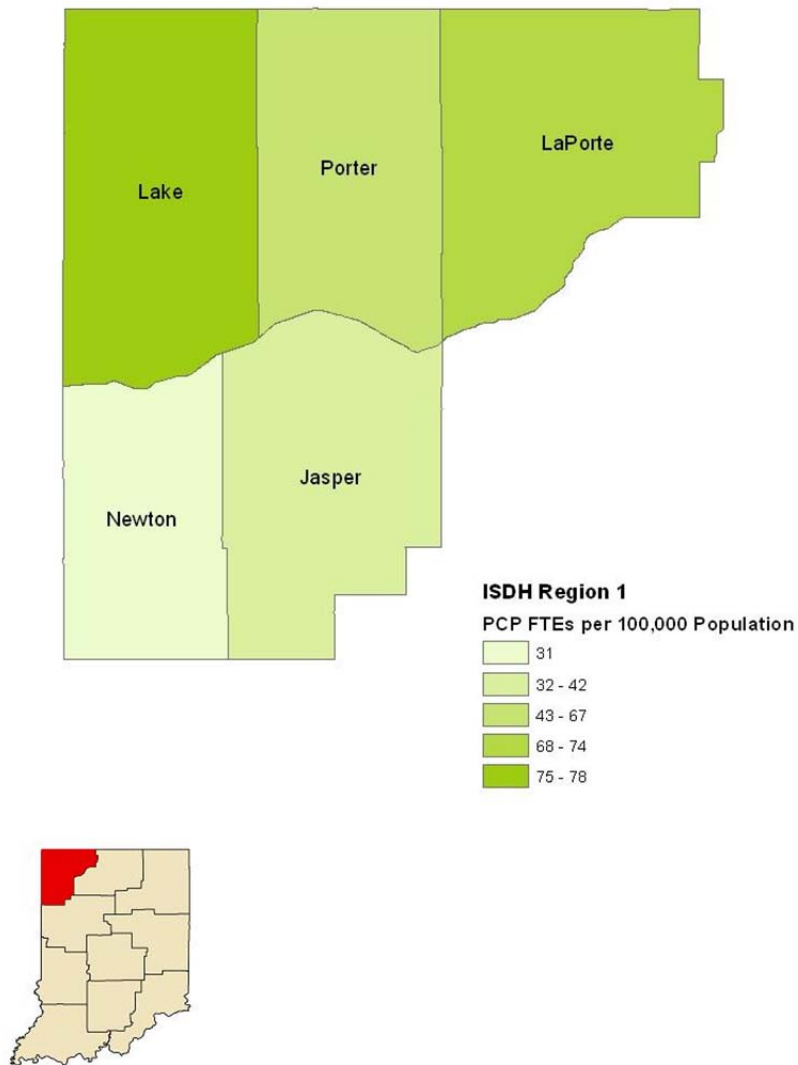


Table 5.2 Primary Care Clinician FTEs per 100,000 Population in ISDH Region 1 Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|---------------------|----------------------------|---|--|--|---|
| Jasper | 33,478 | 11 | 0 | 3 | 14 |
| LaPorte | 111,467 | 69 | 0 | 14 | 83 |
| Lake | 496,005 | 306 | 2 | 78 | 385 |
| Newton | 14,244 | 1 | 1 | 2 | 5 |
| Porter | 164,343 | 88 | 1 | 23 | 112 |
| All ISDH 1 Counties | 819,537 | 95 | 1 | 24 | 120 |

ISDH Public Health Region 2

Primary Care Workforce Characteristics

Table 5.3 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in ISDH region 2. Less than one-third (29.5%) of all primary care clinician FTEs were nearing retirement age. The primary care physician workforce had the highest proportion of clinician FTEs nearing retirement (32.2%) and primary care physician assistants had the lowest proportion (0.0%). However, there were only 4.5 primary care physician assistant FTEs in the entire region.

Table 5.3 ISDH Public Health Region 2 Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in ISDH Region 2 | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 192 | 68 | 91 | 32 | 283 | 100.0 |
| Primary Care PAs | 5 | 100 | 0 | 0 | 5 | 100.0 |
| Primary Care NPs | 68 | 78 | 20 | 22 | 88 | 100.0 |
| All Primary Care Providers | 264 | 71 | 111 | 29 | 375 | 100.0 |
| No Response Given | | | | | 8 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in Public Health Region 2

Map 5.2 shows the combined FTE data of primary care physicians, physician assistants, and nurse practitioners in ISDH public health region 2. Region 2 consists of Elkhart, Fulton, Kosciusko, Marshall, Pulaski, St. Joseph, and Starke Counties, out of which all but Elkhart and St. Joseph are considered rural. Region 2 is the fourth most populous ISDH region with a total population of 646,500.

Map 5.2 ISDH Region 2 Primary Care Clinician FTEs

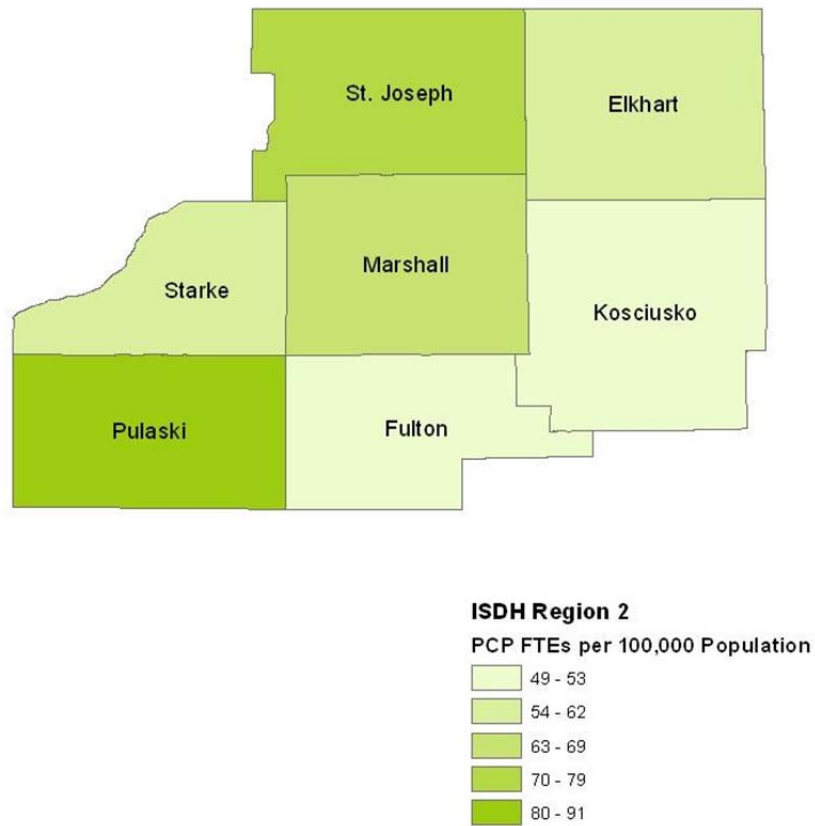


Table 5.4 Primary Care Clinician FTEs per 100,000 Population in ISDH Region 2 Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|---------------------|----------------------------|---|--|--|---|
| Elkhart | 197,559 | 94 | 2 | 28 | 124 |
| Fulton | 20,836 | 8 | 0 | 3 | 11 |
| Kosciusko | 77,358 | 30 | 2 | 6 | 38 |
| Marshall | 47,051 | 23 | 1 | 9 | 33 |
| Pulaski | 13,402 | 7 | 0 | 5 | 12 |
| St. Joseph | 266,931 | 170 | 0 | 42 | 213 |
| Starke | 23,363 | 10 | 0 | 4 | 14 |
| All ISDH 2 Counties | 646,500 | 49 | 1 | 14 | 64 |

ISDH Public Health Region 3

Primary Care Workforce Characteristics

Table 5.5 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in ISDH region 3. Over one-third (34.4%) of all primary care clinician FTEs were nearing retirement age. The primary care physician workforce had the highest proportion of clinician FTEs nearing retirement (38.8%) and primary care nurse practitioners had the lowest proportion (24.4%).

Table 5.5 ISDH Public Health Region 3 Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in ISDH Region 3 | Under 55 years old | | 55 years old and over | | Total | |
|---|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 154 | 61 | 98 | 39 | 251 | 100.0 |
| Primary Care PAs | 11 | 74 | 4 | 26 | 15 | 100.0 |
| Primary Care NPs | 73 | 76 | 24 | 24 | 97 | 100.0 |
| All Primary Care Providers | 238 | 66 | 125 | 34 | 363 | 100.0 |
| No Response Given | | | | | 4 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in Public Health Region 3

Map 5.3 displays the combined FTE data of primary care physicians, physician assistants, and nurse practitioners in ISDH public health region 3. Region 3 consists of Adams, Allen, DeKalb, Huntington, LaGrange, Miami, Noble, Steuben, Wabash, Wells, and Whitley Counties, out of which only Allen, Wells and Whitley Counties are not considered rural. The region has a total population of 726,455 making it the third most populous ISDH region in Indiana.

Map 5.3 ISDH Region 3 Primary Care Clinician FTEs

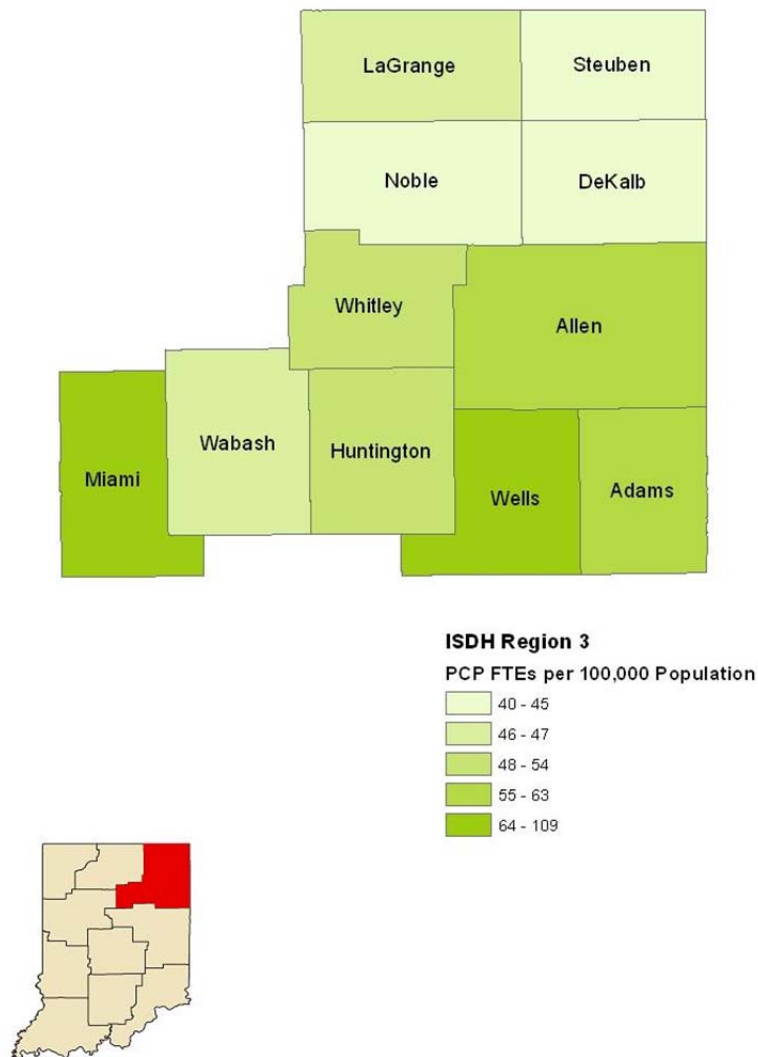


Table 5.6 Primary Care Clinician FTEs per 100,000 Population in ISDH Region 3 Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|---------------------|----------------------------|---|--|--|---|
| Adams | 34,387 | 11 | 2 | 6 | 19 |
| Allen | 355,329 | 151 | 8 | 66 | 225 |
| DeKalb | 50,047 | 15 | 2 | 6 | 23 |
| Huntington | 37,124 | 18 | 0 | 0 | 18 |
| Lagrange | 37,128 | 14 | 1 | 2 | 18 |
| Miami | 36,903 | 17 | 0 | 7 | 23 |
| Noble | 47,536 | 14 | 0 | 5 | 19 |
| Steuben | 34,185 | 13 | 0 | 3 | 16 |
| Wabash | 32,888 | 11 | 1 | 3 | 15 |
| Wells | 27,636 | 21 | 3 | 6 | 30 |
| Whitley | 33,292 | 16 | 0 | 2 | 18 |
| All ISDH 3 Counties | 726,455 | 27 | 2 | 10 | 39 |

ISDH Public Health Region 4

Primary Care Workforce Characteristics

Table 5.7 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in ISDH region 4. Nearly two-fifths (39.0%) of all primary care clinician FTEs were nearing retirement age. The primary care physician assistant workforce had the highest proportion of clinician FTEs nearing retirement (100.0%) and primary care nurse practitioners had the lowest proportion (30.8%). However, there were only 2 primary care physician assistant FTEs in the entire region.

Table 5.7 ISDH Public Health Region 4 Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in ISDH Region 4 | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 43 | 56 | 34 | 44 | 77 | 100.0 |
| Primary Care PAs | 0 | 0 | 2 | 100 | 2 | 100.0 |
| Primary Care NPs | 44 | 69 | 20 | 31 | 63 | 100.0 |
| All Primary Care Providers | 87 | 61 | 56 | 39 | 142 | 100.0 |
| No Response Given | | | | | 3 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in Public Health Region 4

Map 5.4 displays the combined FTE data of primary care physicians, physician assistants, and nurse practitioners in ISDH public health region 4. Region 4 includes Benton, Carroll, Cass, Clinton, Fountain, Montgomery, Tippecanoe, Warren, and White Counties, out of which only Benton, Carroll and Tippecanoe are not considered rural. The region has a total population of 362,494 making it the second least populous ISDH region in Indiana.

Map 5.4 ISDH Region 4 Primary Care Clinician FTEs

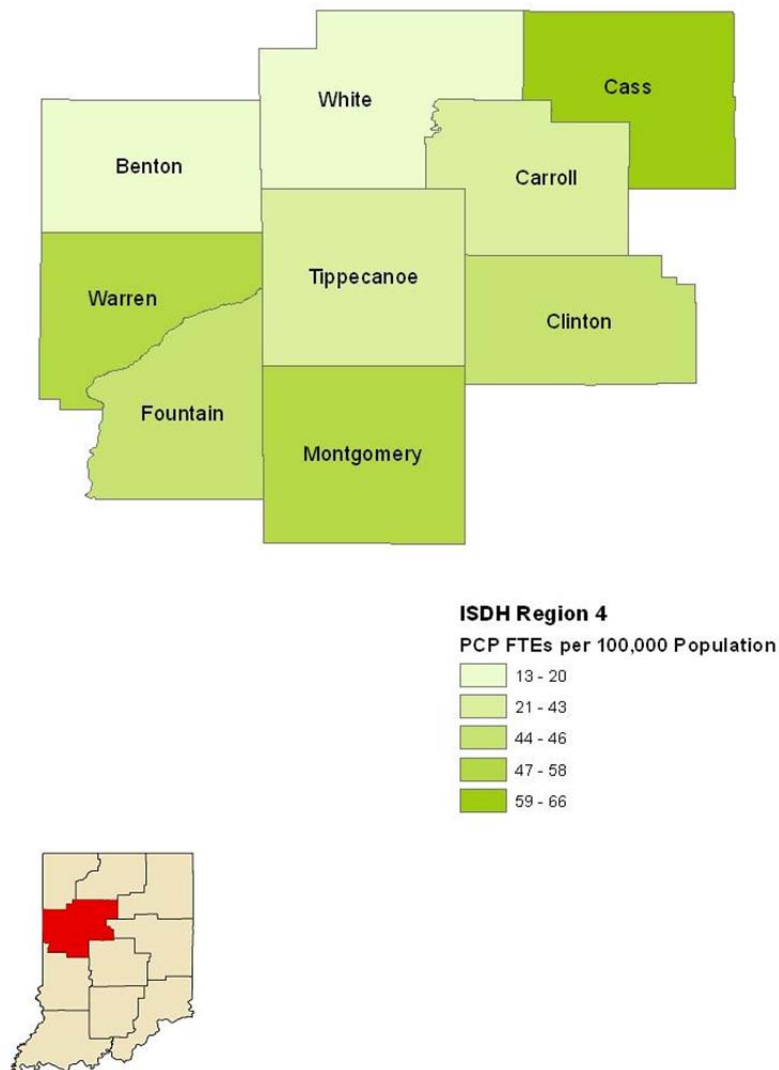


Table 5.8 Primary Care Clinician FTEs per 100,000 Population in ISDH Region 4 Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|---------------------|----------------------------|---|--|--|---|
| | | | | | |
| Benton | 8,854 | 1 | 0 | 0 | 1 |
| Carroll | 20,155 | 1 | 1 | 4 | 6 |
| Cass | 38,966 | 14 | 0 | 12 | 25 |
| Clinton | 33,224 | 13 | 0 | 3 | 16 |
| Fountain | 17,240 | 5 | 0 | 3 | 8 |
| Montgomery | 38,124 | 15 | 1 | 6 | 22 |
| Tippecanoe | 172,780 | 39 | 0 | 37 | 76 |
| Warren | 8,508 | 4 | 0 | 1 | 5 |
| White | 24,643 | 2 | 0 | 3 | 5 |
| All ISDH 4 Counties | 362,494 | 10 | 0 | 8 | 18 |

ISDH Public Health Region 5

Primary Care Workforce Characteristics

Table 5.9 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in ISDH region 5. Approximately one-quarter (25.6%) of all primary care clinician FTEs were nearing retirement age. The primary care nurse practitioner workforce had the highest proportion of clinician FTEs nearing retirement (29.4%) and primary care physician assistants had the lowest proportion (13.5%).

Table 5.9 ISDH Public Health Region 5 Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in ISDH Region 5 | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 707 | 75 | 236 | 25 | 942 | 100.0 |
| Primary Care PAs | 34 | 87 | 5 | 13 | 39 | 100.0 |
| Primary Care NPs | 183 | 71 | 76 | 29 | 260 | 100.0 |
| All Primary Care Providers | 924 | 74 | 317 | 26 | 1,241 | 100.0 |
| No Response Given | | | | | 22 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in Public Health Region 5

Map 5.5 shows the combined FTE data of primary care physicians, physician assistants, and nurse practitioners in ISDH public health region 5. Region 5 contains Boone, Hamilton, Hancock, Hendricks, Johnson, Marion, Morgan, and Shelby Counties. None of these counties are considered rural. The total regional population is 1,703,036 making it the most populous ISDH region in Indiana.

Map 5.5 ISDH Region 5 Primary Care Clinician FTEs

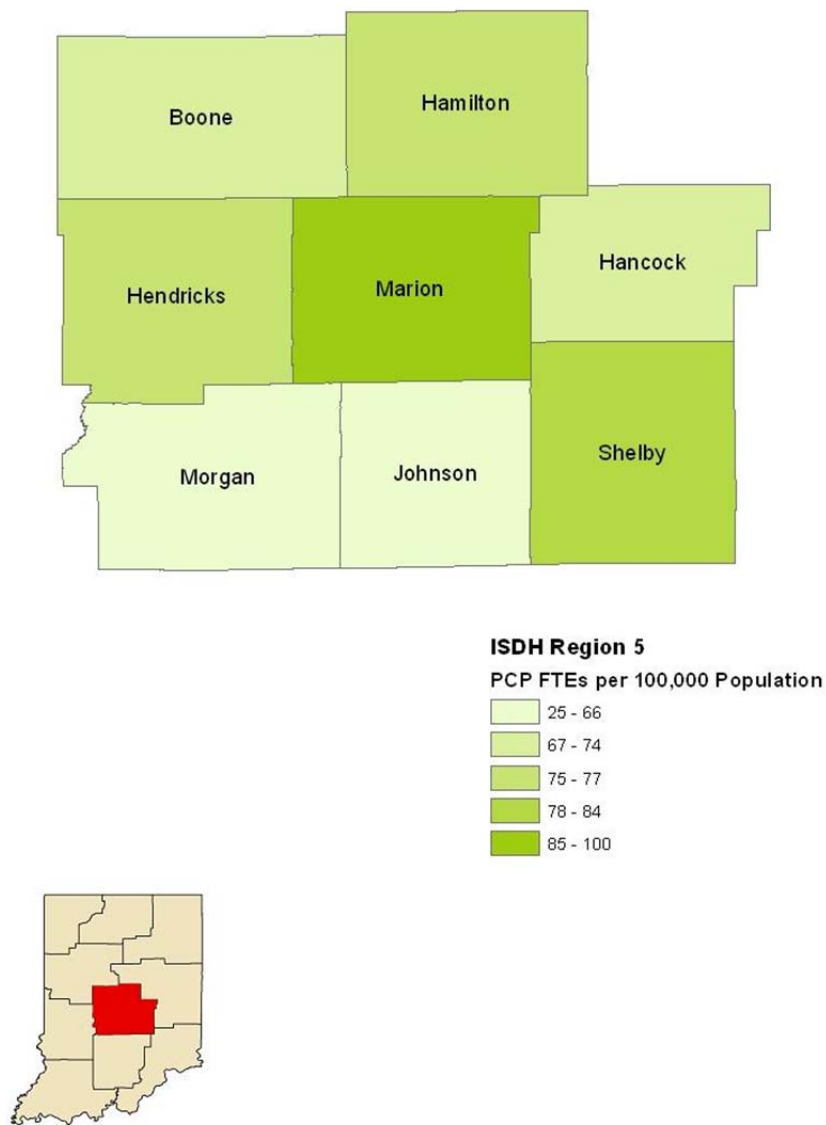


Table 5.10 Primary Care Clinician FTEs per 100,000 Population in ISDH Region 5 Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|---------------------|----------------------------|---|--|--|---|
| Boone | 56,640 | 36 | 0 | 6 | 42 |
| Hamilton | 274,569 | 171 | 8 | 34 | 213 |
| Hancock | 70,002 | 39 | 1 | 8 | 48 |
| Hendricks | 145,448 | 99 | 1 | 12 | 112 |
| Johnson | 139,654 | 71 | 2 | 19 | 92 |
| Marion | 903,393 | 679 | 26 | 195 | 900 |
| Morgan | 68,894 | 11 | 2 | 5 | 18 |
| Shelby | 44,436 | 25 | 3 | 9 | 38 |
| All ISDH 5 Counties | 1,703,036 | 141 | 5 | 36 | 183 |

ISDH Public Health Region 6

Primary Care Workforce Characteristics

Table 5.11 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in ISDH region 6. Less than one-third (31.2%) of all primary care clinician FTEs were nearing retirement age. The primary care physician assistant workforce had the highest proportion of clinician FTEs nearing retirement (35.3%) and primary care nurse practitioners had the lowest proportion (25.9%).

Table 5.11 ISDH Public Health Region 6 Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in ISDH Region 6 | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 182 | 67 | 90 | 33 | 272 | 100.0 |
| Primary Care PAs | 6 | 65 | 3 | 35 | 9 | 100.0 |
| Primary Care NPs | 80 | 74 | 28 | 26 | 108 | 100.0 |
| All Primary Care Providers | 267 | 69 | 121 | 31 | 388 | 100.0 |
| No Response Given | | | | | 7 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in Public Health Region 6

Map 5.6 shows the combined FTE data of primary care physicians, physician assistants, and nurse practitioners in ISDH public health region 6. Region 6 includes Blackford, Delaware, Fayette, Grant, Henry, Howard, Jay, Madison, Randolph, Rush, Tipton, Union, and Wayne Counties, out of which all except Delaware, Howard, Madison, and Tipton are considered rural. The total population of region 6 is 645,810 making it the fifth most populous ISDH region in Indiana.

Map 5.6 ISDH Region 6 Primary Care Clinician FTEs

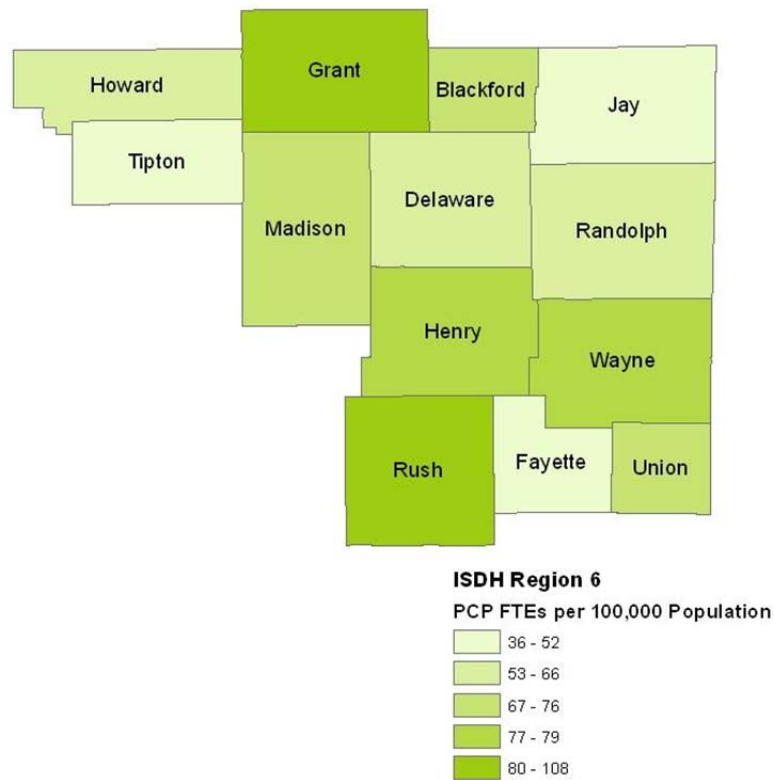


Table 5.12 Primary Care Clinician FTEs per 100,000 Population in ISDH Region 6 Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|---------------------|--------------------|---|---|---|--|
| | | | | | |
| Blackford | 12,766 | 8 | 0 | 1 | 9 |
| Delaware | 117,671 | 54 | 2 | 21 | 77 |
| Fayette | 24,277 | 10 | 1 | 2 | 13 |
| Grant | 70,061 | 44 | 0 | 19 | 62 |
| Henry | 49,462 | 27 | 0 | 13 | 39 |
| Howard | 82,752 | 27 | 5 | 14 | 46 |
| Jay | 21,253 | 5 | 0 | 3 | 8 |
| Madison | 131,636 | 78 | 1 | 22 | 101 |
| Randolph | 26,171 | 11 | 0 | 7 | 17 |
| Rush | 17,392 | 13 | 0 | 6 | 19 |
| Tipton | 15,936 | 7 | 0 | 0 | 7 |
| Union | 7,516 | 3 | 0 | 2 | 5 |
| Wayne | 68,917 | 42 | 0 | 12 | 53 |
| All ISDH 6 Counties | 645,810 | 25 | 1 | 9 | 35 |

ISDH Public Health Region 7

Primary Care Workforce Characteristics

Table 5.13 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in ISDH region 7. Over two-fifths (42.7%) of all primary care clinician FTEs were nearing retirement age. The primary care physician assistant workforce had the highest proportion of clinician FTEs nearing retirement (75.0%) and primary care nurse practitioners had the lowest proportion (34.6%). However, there were only 4 primary care physician assistant FTEs in the entire region.

Table 5.13 ISDH Public Health Region 7 Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in ISDH Region 7 | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 66 | 56 | 53 | 44 | 119 | 100.0 |
| Primary Care PAs | 1 | 25 | 3 | 75 | 4 | 100.0 |
| Primary Care NPs | 26 | 65 | 14 | 35 | 39 | 100.0 |
| All Primary Care Providers | 93 | 57 | 69 | 43 | 162 | 100.0 |
| No Response Given | | | | | 4 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in Public Health Region 7

Map 5.7 shows the combined FTE data of primary care physicians, physician assistants, and nurse practitioners in ISDH public health region 7. Region 7 consists of Clay, Greene, Owen, Parke, Putnam, Sullivan, Vermillion, and Vigo Counties. Parke County is the only rural county in the region. The total population is 282,467 making it the least populous ISDH region in Indiana.

Map 5.7 ISDH Region 7 Primary Care Clinician FTEs

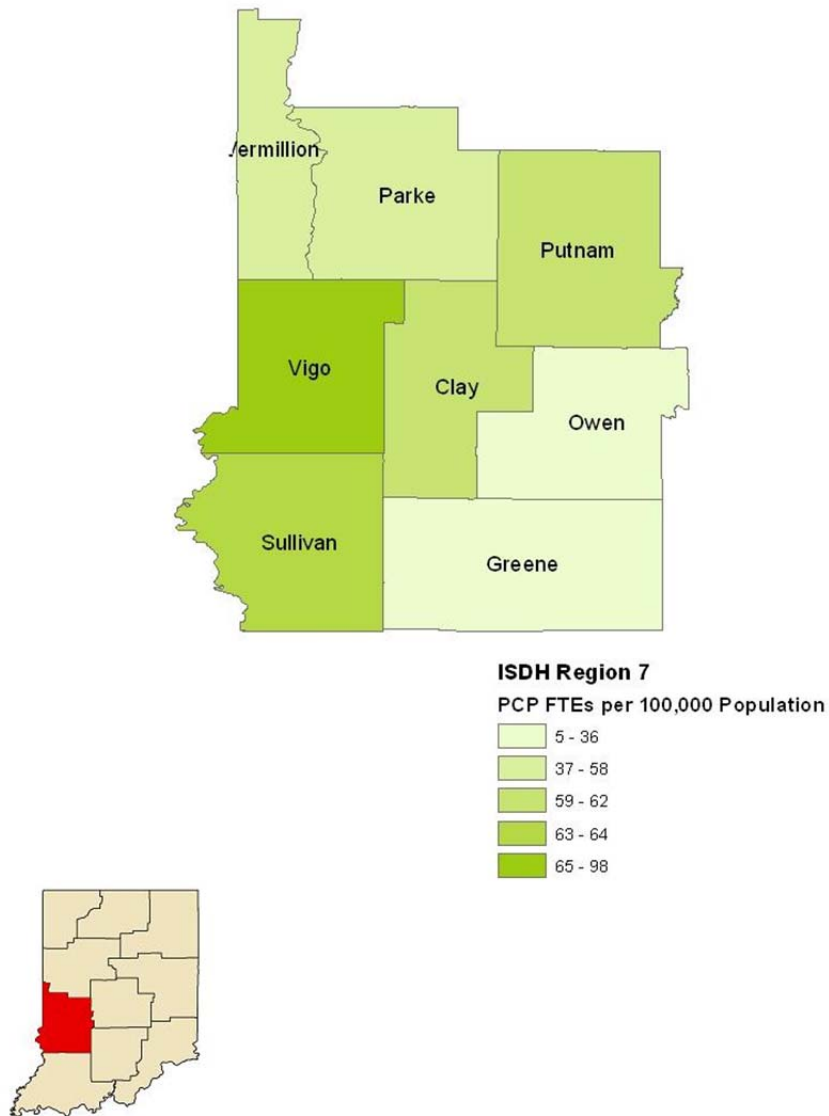


Table 5.14 Primary Care Clinician FTEs per 100,000 Population in ISDH Region 7 Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|---------------------|----------------------------|---|--|--|---|
| Clay | 26,890 | 12 | 2 | 2 | 16 |
| Greene | 33,165 | 5 | 1 | 6 | 12 |
| Owen | 21,575 | 0 | 0 | 1 | 1 |
| Parke | 17,339 | 5 | 0 | 5 | 10 |
| Putnam | 37,963 | 21 | 1 | 2 | 24 |
| Sullivan | 21,475 | 12 | 0 | 2 | 14 |
| Vermillion | 16,212 | 4 | 0 | 4 | 8 |
| Vigo | 107,848 | 84 | 0 | 21 | 105 |
| All ISDH 7 Counties | 282,467 | 18 | 1 | 5 | 24 |

ISDH Public Health Region 8

Primary Care Workforce Characteristics

Table 5.15 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in ISDH region 8. Over one-third (36.8%) of all primary care clinician FTEs were nearing retirement age. The primary care physician workforce had the highest proportion of clinician FTEs nearing retirement (39.5%) and primary care physician assistants had the lowest proportion (16.7%). However, there were only 6 primary care physician assistant FTEs in the entire region.

Table 5.15 ISDH Public Health Region 8 Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in ISDH Region 8 | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|--------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 232.25 | 59.6 | 157.75 | 40.4 | 390 | 100.0 |
| Primary Care PAs | 2.75 | 73.3 | 1 | 26.7 | 3.75 | 100.0 |
| Primary Care NPs | 74 | 68.5 | 34 | 31.5 | 108 | 100.0 |
| All Primary Care Providers | 309 | 61.6 | 192.75 | 38.4 | 501.75 | 100.0 |
| No Response Given | | | | | 6 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in Public Health Region 8

Map 5.8 displays combined FTE data of primary care physicians, physician assistants, and nurse practitioners in ISDH public health region 8. Region 8 includes Bartholomew, Brown, Jackson, Lawrence, Monroe, Orange, and Washington Counties, out of which Lawrence and Orange Counties are considered rural. The total population of region 8 is 366,622 making it the third least populous ISDH region in Indiana.

Map 5.8 ISDH Region 8 Primary Care Clinician FTEs

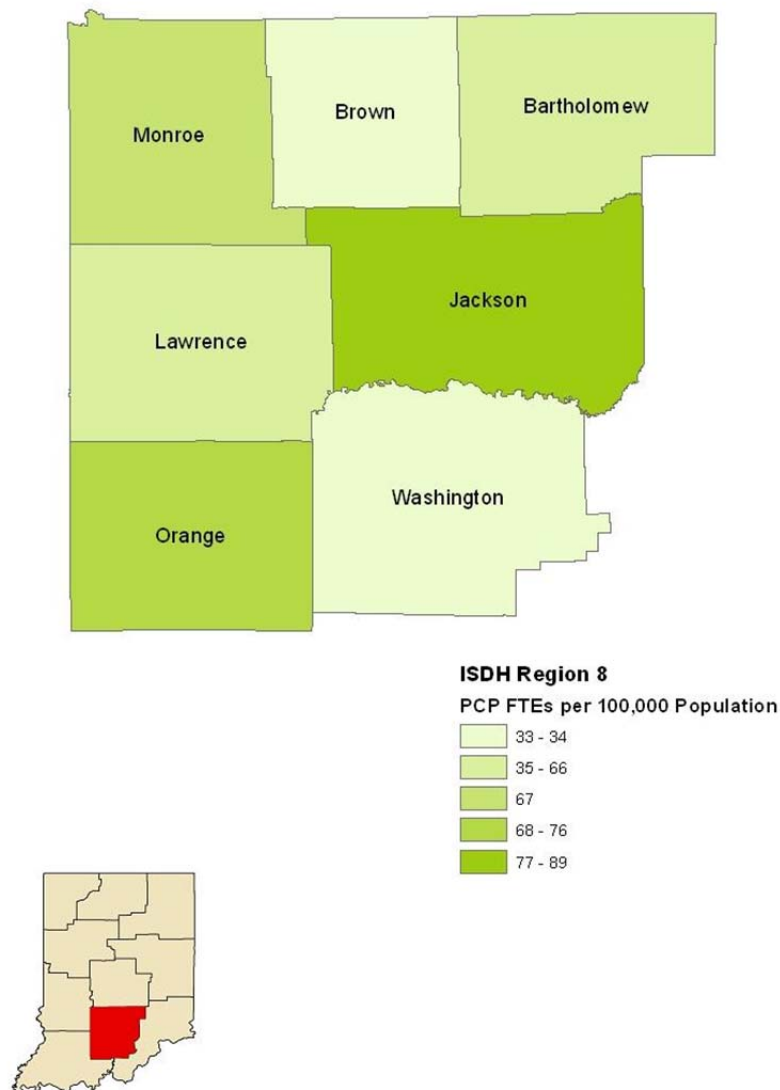


Table 5.16 Primary Care Clinician FTEs per 100,000 Population in ISDH Region 8 Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|---------------------|----------------------------|---|--|--|---|
| | | | | | |
| Bartholomew | 76,794 | 36 | 0 | 15 | 51 |
| Brown | 15,242 | 3 | 0 | 2 | 5 |
| Jackson | 42,376 | 29 | 3 | 5 | 37 |
| Lawrence | 46,134 | 14 | 0 | 7 | 21 |
| Monroe | 137,974 | 50 | 3 | 40 | 93 |
| Orange | 19,840 | 11 | 0 | 4 | 15 |
| Washington | 28,262 | 8 | 0 | 1 | 9 |
| All ISDH 8 Counties | 366,622 | 22 | 1 | 11 | 33 |

ISDH Public Health Region 9

Primary Care Workforce Characteristics

Table 5.17 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in ISDH region 9. Approximately one-quarter (25.4%) of all primary care clinician FTEs were nearing retirement age. The primary care physician workforce had the highest proportion of clinician FTEs nearing retirement (28.7%) and primary care nurse practitioners had the lowest proportion (15.7%).

Table 5.17 ISDH Public Health Region 9 Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in ISDH Region 9 | Under 55 years old | | 55 years old and over | | Total | |
|--|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 129 | 71 | 52 | 29 | 181 | 100.0 |
| Primary Care PAs | 9 | 82 | 2 | 18 | 11 | 100.0 |
| Primary Care NPs | 46 | 84 | 9 | 16 | 54 | 100.0 |
| All Primary Care Providers | 184 | 75 | 63 | 25 | 246 | 100.0 |
| No Response Given | | | | | 10 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in Public Health Region 9

Map 5.9 shows the combined FTE data of primary care physicians, physician assistants, and nurse practitioners in ISDH public health region 9. Region 9 contains Clark, Dearborn, Decatur, Floyd, Franklin, Harrison, Jefferson, Jennings, Ohio, Ripley, Scott, and Switzerland Counties, out of which Decatur, Jefferson, Jennings, Ripley, Scott, and Switzerland Counties are considered rural. The total population of the region is 445,917 making it the fourth least populous ISDH region in Indiana.

Map 5.9 ISDH Region 9 Primary Care Clinician FTEs

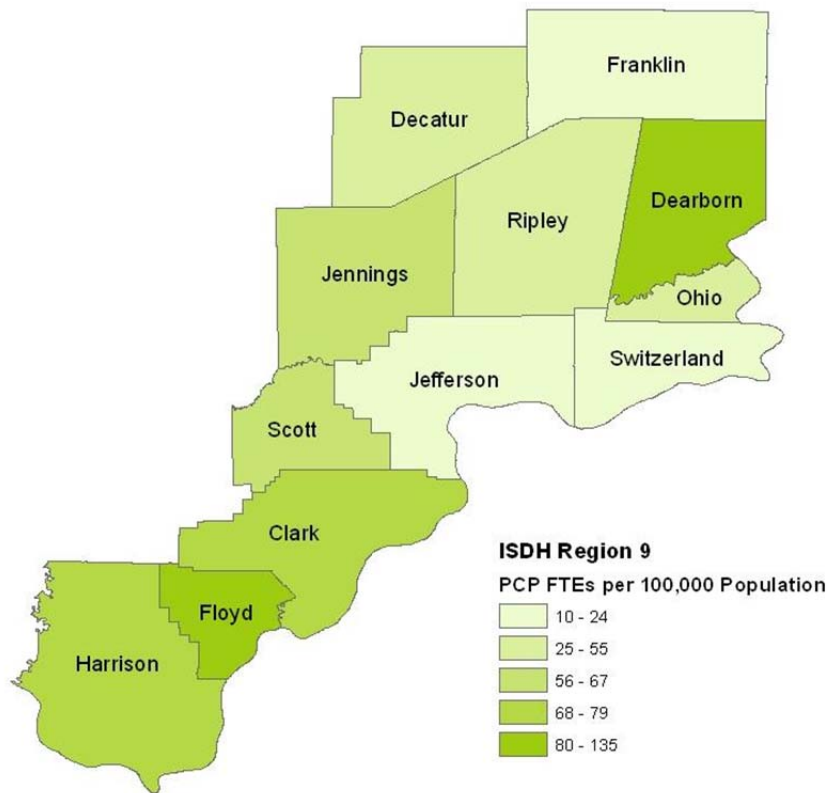


Table 5.18 Primary Care Clinician FTEs per 100,000 Population in ISDH Region 9 Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|---------------------|--------------------|---|---|---|--|
| | | | | | |
| Clark | 110,232 | 61 | 2 | 24 | 88 |
| Dearborn | 25,740 | 32 | 1 | 2 | 35 |
| Decatur | 42,223 | 15 | 1 | 2 | 18 |
| Floyd | 74,578 | 47 | 3 | 9 | 60 |
| Franklin | 23,087 | 4 | 1 | 0 | 6 |
| Harrison | 39,364 | 25 | 0 | 6 | 31 |
| Jefferson | 32,428 | 2 | 1 | 2 | 6 |
| Jennings | 28,525 | 8 | 1 | 6 | 16 |
| Ohio | 6,128 | 2 | 0 | 1 | 3 |
| Ripley | 28,818 | 13 | 0 | 2 | 16 |
| Scott | 24,181 | 11 | 1 | 4 | 16 |
| Switzerland | 10,613 | 0 | 0 | 1 | 1 |
| All ISDH 9 Counties | 445,917 | 19 | 1 | 5 | 25 |

ISDH Public Health Region 10

Primary Care Workforce Characteristics

Table 5.19 displays the primary care physician, physician assistant, and nurse practitioner FTEs in counties in ISDH region 10. Less than one-third (31.6%) of all primary care clinician FTEs were nearing retirement age. The primary care physician workforce had the highest proportion of clinician FTEs nearing retirement (36.8%) and primary care physician assistants had the lowest proportion (0.0%). However, there were only 2 primary care physician assistant FTEs in the entire region.

Table 5.19 ISDH Public Health Region 10 Primary Care Clinician Age by FTE*

| Primary Care Clinician FTEs in ISDH Region 10 | Under 55 years old | | 55 years old and over | | Total | |
|---|--------------------|---------|-----------------------|---------|-------|---------|
| | FTEs | Percent | FTEs | Percent | FTEs | Percent |
| Primary Care Physicians | 153 | 63 | 89 | 37 | 243 | 100.0 |
| Primary Care PAs | 2 | 100 | 0 | 0 | 2 | 100.0 |
| Primary Care NPs | 75 | 82 | 17 | 18 | 91 | 100.0 |
| All Primary Care Providers | 230 | 68 | 106 | 32 | 336 | 100.0 |
| No Response Given | | | | | 2 | |

**These numbers represent survey respondents only.*

Maps of Primary Care Workforce in Public Health Region 10

Map 5.10 displays the combined FTE data of primary care physicians, physician assistants, and nurse practitioners in ISDH public health region 10. Region 10 consists of Crawford, Daviess, Dubois, Gibson, Knox, Martin, Perry, Pike, Posey, Spencer, Vanderburgh, and Warrick Counties. All of these counties except Gibson, Posey, Vanderburgh, and Warrick are considered rural. The total population of Region 10 is the fifth least populous ISDH region in Indiana.

Map 5.10 ISDH Region 10 Primary Care Clinician FTEs

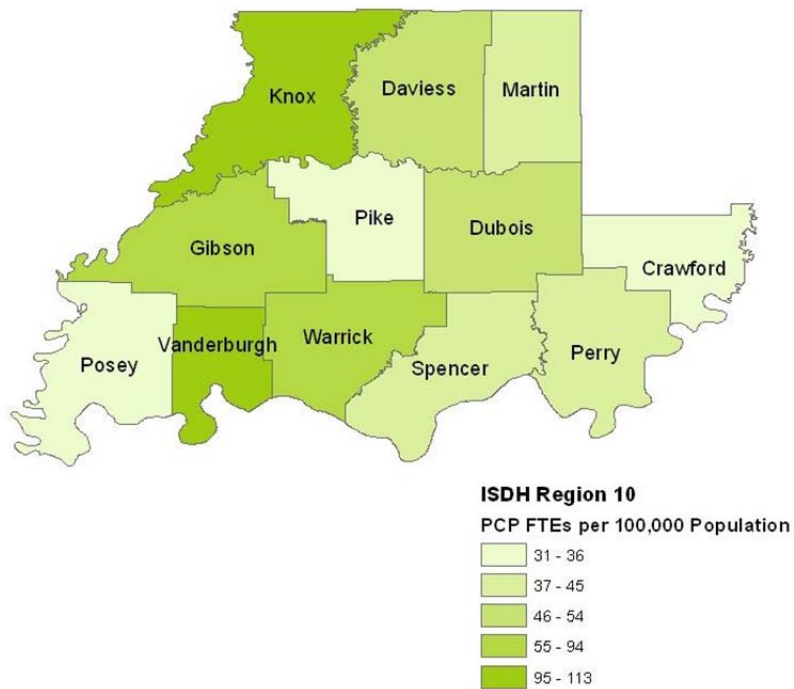


Table 5.20 Primary Care Clinician FTEs per 100,000 Population in ISDH Region 10 Counties

| County | 2010 Population | Primary Care Physician FTEs per 100,000 Population | Primary Care PA FTEs per 100,000 Population | Primary Care NP FTEs per 100,000 Population | Total Primary Care Clinician FTEs per 100,000 Population |
|----------------------|--------------------|---|---|---|--|
| | | | | | |
| Crawford | 10,713 | 1 | 0 | 2 | 3 |
| Daviess | 31,648 | 11 | 0 | 6 | 17 |
| Dubois | 41,889 | 18 | 0 | 4 | 21 |
| Gibson | 33,503 | 24 | 0 | 7 | 32 |
| Knox | 38,440 | 32 | 0 | 11 | 43 |
| Martin | 10,334 | 2 | 0 | 2 | 4 |
| Perry | 19,338 | 6 | 0 | 3 | 9 |
| Pike | 12,845 | 4 | 0 | 1 | 5 |
| Posey | 25,910 | 7 | 0 | 1 | 8 |
| Spencer | 20,952 | 5 | 0 | 3 | 8 |
| Vanderburgh | 179,703 | 139 | 2 | 45 | 187 |
| Warrick | 59,689 | 41 | 0 | 14 | 56 |
| All ISDH 10 Counties | 484,964 | 24 | 0 | 8 | 33 |

Chapter 6: Conclusion

This report describes the primary care workforce (physicians, physician assistants, and nurse practitioners) in Indiana. A total of 3,183 primary care physicians, 103 primary care physician assistants, and 1,099 primary care nurse practitioners were identified from the respective datasets giving a total of 4,385 primary care clinicians included in the report.

Two primary measures were used to evaluate the status of Indiana's primary care workforce: the proportion of primary care clinician FTEs "nearing retirement" (age 55 and older) and the (weighted) ratio of primary care clinician FTEs per 100,000 population in each county. Analyses of FTE, retirement age, and ratio of primary care clinician FTEs to population were carried out at the state level (and urban versus rural counties), by AHEC region, and by ISDH public health region. Across the entire state, most of the primary care clinicians worked full-time (1.0 FTE), one-third were nearing retirement age, and there were 51 primary care clinician FTEs per 100,000 population. A greater proportion of primary care physicians and physician assistants worked full-time than primary care nurse practitioners. A smaller proportion of primary care physician assistants and nurse practitioners were age 55 or older than primary care physicians. Comparing urban counties to rural counties, a majority of primary care providers practiced in urban counties. A smaller proportion of primary care providers working urban counties reported working full-time than those working in rural counties. Each primary care profession (physician, physician assistant, and nurse practitioner) had a greater proportion of rural practitioners who worked full-time than their urban counterparts. However, a greater proportion of rural primary care providers were age 55 or older than those working in urban counties. This may indicate that rural practitioners are working longer hours than urban practitioners and are practicing later in life. One explanation for this is that urban counties had a higher ratio of primary care clinician FTEs per population than rural counties. It should be noted that the Robert Graham Center recommended at least 100 primary care clinician FTEs per 100,000 population to adequately serve the needs of the community. However, only 11 counties in the entire state met this criterion and all of them were urban counties.

Indiana is divided into eight AHEC regions. There was notable variation between regions in terms of both proportion of primary care clinician FTEs nearing retirement and ratio of primary care clinician FTEs to population. AHEC regions varied from a low of one-quarter of primary care clinician FTEs nearing retirement (MICI region) to a high of nearly half of primary care clinician FTEs (WCI region) compared to the state average of one-third of primary care clinician FTEs nearing retirement. . In most regions primary care physicians had the highest proportion of FTEs nearing retirement and primary care physician assistant and nurse practitioner workforces had lower proportions of clinicians nearing retirement. In some cases, regions had too few primary care physician assistants to produce comparable

proportions. These numbers may be indicative of a lack of primary care physician assistants in the state who could help ease the burden on primary care physicians who are nearly all overextended according to ratios of primary care clinician FTEs to population. The EI and WCI regions of Indiana had the lowest ratios of primary care clinician FTEs to population while the MICI region had the highest ratio. Only two regions (MICI and NWI) met the Robert Graham Center's recommendation of 100 primary care physician FTEs per 100,000 population.

The ISDH divided Indiana into 10 public health regions. Like the AHEC regions, there was considerable variation in the proportion of primary care clinician FTEs nearing retirement and ratio of primary care clinician FTEs to population. ISDH region 5 had the lowest proportion of primary care clinician FTEs nearing retirement while ISDH region 7 had the highest proportion. The ratio of primary care clinician FTEs to 100,000 population was lowest in ISDH region 4 and highest in ISDH region 5.

Quality data about primary care clinicians in Indiana can be used to help policymakers and other stakeholders make better-informed decisions in addressing health care professions shortages. The purpose of this report is to provide these needed data. Thus, the findings from this report may be used to identify primary care clinician shortage areas, develop more effective recruitment and retention strategies, and plan additional locations for training primary care clinicians within the state. It should be noted that this report is meant to be descriptive in nature and does not draw any specific policy recommendations. However, in general, areas with the lowest ratio of primary care clinician FTEs to population should be the first priorities for increasing the supply of primary care clinicians. A policy brief will be released following this report that will provide specific policy recommendations based off of the data generated in this report.

Appendix 1-A: 2011 Indiana Physician Re-Licensure Survey Instrument

Your answers to these questions will help the Indiana State Department of Health to respond to emergencies and to identify health professional shortages and geographic shortage areas. The survey is voluntary and will not affect the status of your license.

Thank you very much for your help.

1. What is your current work status in medicine? Consider yourself active in medicine if you are engaged in direct patient care, administration, teaching, or research. **Please select only one.**

DROP-DOWN LIST

Physician actively seeing patients Full Time

Physician actively seeing patients Part Time

Physician in training (medical resident/fellow)

Physician active in medicine, locum tenens ONLY

Physician active in medicine, not seeing patients

Retired from active medical practice

Inactive in medicine

2. Please type the street address of your principal practice location (the location at which you spend the most practice time) and the secondary practice locations and the number of half days per month you spend at each of those locations in the space provided below. If you are retired or inactive, please put the zip code of your residence.

Location #1: _____

(Name) *(Street)* *(City)* *(State) (Zip) (# of half days/month)*

Location #2: _____

days/month *(Name)* *(Street)* *(City)* *(State) (Zip) (# of half*

Location #3: _____

days/month *(Name)* *(Street)* *(City)* *(State) (Zip) (# of half*

Location #4: _____

days/month *(Name)* *(Street)* *(City)* *(State) (Zip) (# of half*

Location #5: _____

days/month *(Name)* *(Street)* *(City)* *(State) (Zip) (# of half*

3. What is your major specialty? **Please select only one.** If you are retired or temporarily inactive, please select the specialty in which you are most experienced.
DROP-DOWN LIST—PLEASE SEE ATTACHED LIST

4. Do you currently see (or accept) Medicaid patients?
DROP-DOWN LIST

Yes

No

5. How many hours per week on average do you spend in direct patient care related activities in medicine (including the paperwork associated with providing care)? **Please select only one.**
DROP-DOWN LIST

- 0
- 1-9
- 10-19
- 20-29
- 30-39
- 40-49
- 50-59
- 60 or more

6. Do you currently provide prenatal care but do not deliver babies?

DROP-DOWN LIST

Yes

No

7. Do you provide both, prenatal care and deliver babies?

DROP-DOWN LIST

Yes

No

8. Do you practice with an advanced practice nurse?

DROP-DOWN LIST

Yes

No

8a. If yes, how many advanced practice nurses do you practice with?

DROP DOWN LIST

Nurse practitioners _____

Clinical nurse specialist _____

Certified nurse midwife _____

9. Do you supervise physician assistants?

DROP-DOWN LIST

Yes

No

9a. If yes, how many physician assistants do you supervise? _____

10. Would you be willing to provide services in case of a bio-terrorism event or other public health emergency? If you answer “Yes,” we may contact you using your PLA contact information.

DROP-DOWN LIST

Yes

No

11. Where did you do your residency and/or fellowship training? **Please select ALL that apply.**

DROP-DOWN LIST

Indiana

Other U.S. state

Canada

Other country (not U.S. or Canada)

12. What is your racial background?

DROP-DOWN LIST

White

Black/African American

Asian

American Indian/Alaskan Native

Native Hawaiian/Pacific Islander

Multiracial

13. What is your ethnic background?

DROP-DOWN LIST

Hispanic or Latino

Not Hispanic or Latino

14. What is your gender?

DROP-DOWN LIST

Male

Female

2011 SPECIALTY LIST

Specialty Name

Addiction Medicine (ADM)

Adolescent Medicine (AMI)

Aerospace Medicine (AM)

Allergy (A)

Allergy & Immunology (AI)

Allergy & Immunology-Diagnostic Laboratory Immunology (ALI)

Alternative Medicine (ALTM)

Anesthesiology (AN)

Anesthesiology-Critical Care (CCA)

Anesthesiology-Pain Management (APM)

Anesthesiology-Pediatric (PAN)

Cardiology-Cardiovascular Disease (CD)

Cardiology-Cardiac Electrophysiology (ICE)

Cardiology-Interventional Cardiology (IC)

Cardiology-Nuclear Cardiology (NC)

Critical Care Medicine (CCM)

Dermatology (D)

Dermatology-Clinical and Laboratory Dermatological Immunology (DDL)

Dermatology-Dermatological Immunology/Diagnostic and Laboratory Immunology (DLAB)

Dermatology-Dermatopathology (DMP)

Dermatology-Pediatric Dermatology (PDD)

Dermatology-Procedural Dermatology (PRD)

Diabetes (DIA)

Emergency Medicine (EM)

Emergency Medicine-Medical Toxicology (ETX)

Emergency Medicine-Pediatric Emergency Medicine (PE)

Emergency Medicine-Sports Medicine (ESM)

Endocrinology, Diabetes and Metabolism (END)

Epidemiology (EP)

Family Practice/Family Medicine (FM)

Family Practice-Adolescent Medicine (AMF)

Family Practice-Geriatric Medicine (FPG)

Family Practice-Sports Medicine (FSM)

Gastroenterology (GE)

General Internal Medicine (IM)

General Practice (GP)

General Preventive Medicine (GPM)

Genetics-Clinical Biochemical Genetics (CBG)

Genetics-Clinical Cytogenetics (CCG)

Genetics-Clinical Genetics (CG)

Genetics-Clinical Molecular Genetics (CMG)

Genetics-Medical Genetics (MG)

Genetics-Molecular Genetic Pathology (MGG)

Geriatrics (GERI)

Gynecological Oncology (GO)

Gynecology (GYN)

Hematology (HEM)

Hematology/Oncology (HO)

Hepatology (HEP)

Hospitalist (HOS)

Immunology (IG)

Infectious Diseases (ID)

Internal Medicine-General Internal Medicine (IM)
Internal Medicine-Cardiac Electrophysiology (ICE)
Internal Medicine-Diagnostic Laboratory Immunology (ILI)
Internal Medicine-Geriatrics (IMG)
Internal Medicine-Pediatrics (MPD)
Internal Medicine-Sports Medicine (ISM)
Legal Medicine (LM)
Maternal & Fetal Medicine (MFM)
Medical Informatics
Medical Management (MDM)
Medical Microbiology (MM)
Neonatal-Perinatal Medicine (NPM)
Nephrology (NEP)
Nephrology-Pediatric Nephrology (PN)
Neurology (N)
Neurology-Child Neurology (CHN)
Neurology-Clinical Neurophysiology (CN)
Neurology-Neurodevelopmental Disabilities (NDN)
Neurology-Neurology/Diagnostic Radiology/Neuroradiology (NRN)
Neurology-Neuromuscular Medicine
Neurology-Neuropsychiatry (NUP)
Neurology-Neuroradiology (RNR)
Neurology-Vascular Neurology (VN)
Neuroradiology-Endovascular Surgical (ESN)
Nuclear Medicine (NM)
Nuclear Radiology (NR)
Nutrition (NTR)

Obstetrics & Gynecology (OBG)
Obstetrics & Gynecology-Critical Care (OCC)
Obstetrics (OBS)
Occupational Medicine (OM)
Oncology (ON)
Ophthalmology (OPH)
Ophthalmology-Pediatric Ophthalmology (PO)
Orthopedic Surgery (ORS)
Orthopedic Surgery-Foot and Ankle (OFA)
Orthopedic Surgery-Hand Surgery (HSO)
Orthopedic Surgery-Orthopedic Musculoskeletal Oncology (OMO)
Orthopedic Surgery-Orthopedic Adult Reconstructive Surgery (OAR)
Orthopedic Surgery-Pediatric Orthopedic Surgery (OP)
Orthopedic Surgery-Sports Medicine (OSM)
Orthopedic Surgery-Surgery of the Spine (OSS)
Orthopedic Surgery-Trauma (OTR)
Osteopathic Manipulative Medicine (OMM)
Otolaryngology (OTO)
Otolaryngology-Pediatric Otolaryngology (PDO)
Otology-Neurotology (NO)
Pain Medicine (PMD)
Palliative Medicine (PLM)
Pathology-Anatomic Pathology (ATP)
Pathology-Anatomic/Clinical Pathology (PTH)
Pathology-Bloodbanking (BBK)
Pathology-Chemical Pathology (PCH)
Pathology-Clinical Pathology (CLP)

Pathology-Cytopathology (PCP)
Pathology-Forensic Pathology (FOP)
Pathology-Hematology (HMP)
Pathology-Medical Microbiology
Pathology-Molecular Genetic Pathology (MGP)
Pathology-Neuropathology (NP)
Pathology-Pediatric Pathology (PP)
Pathology-Selective Pathology (SP)
Pediatrics-General Pediatrics (PD)
Pediatrics-Adolescent Medicine (ADL)
Pediatrics-Critical Care (CCP)
Pediatrics-Developmental Behavioral Pediatrics (DBP)
Pediatrics-Neonatal-Perinatal Medicine (NPM)
Pediatrics-Neurodevelopmental Disabilities (NDP)
Pediatrics-Pediatric Allergy (PDA)
Pediatrics-Pediatric Cardiology (PDC)
Pediatrics-Pediatric Cardiothoracic Surgery (PCS)
Pediatrics-Pediatric Dermatology (PDD)
Pediatrics-Pediatric Diagnostic Laboratory Immunology (PLI)
Pediatrics-Pediatric Emergency Medicine (PEM)
Pediatrics-Pediatric Endocrinology (PDE)
Pediatrics-Pediatric Gastroenterology (PG)
Pediatrics-Pediatric Hematology/Oncology (PHO)
Pediatrics-Pediatric Infectious Diseases (PDI)
Pediatrics-Pediatric Medical Toxicology (PDT)
Pediatrics-Pediatric Otolaryngology (PDO)
Pediatrics-Pediatric Pathology (PP)

Pediatrics-Pediatric Pulmonology (PDP)
Pediatrics-Pediatric Radiology (PDR)
Pediatrics-Pediatric Rehabilitation Medicine (RPM)
Pediatrics-Pediatric Rheumatology (PPR)
Pediatrics-Pediatric Sports Medicine (PSM)
Pediatrics-Pediatric Surgery (PDS)
Pharmaceutical Medicine (PHM)
Pharmacology-Clinical Pharmacology (PA)
Phlebology (PHL)
Physical Medicine & Rehabilitation (PM)
Physical Medicine and Rehabilitation-Spinal Cord Injury (SCI)
Physical Medicine and Rehabilitation-Sports Medicine (PMM)
Plastic Surgery (PS)
Plastic Surgery-Facial Plastic Surgery (FPS)
Plastic Surgery-Head & Neck (PSH)
Preventive Medical Toxicology (PTX)
Proctology (PRO)
Psychiatry (P)
Psychiatry-Addiction (ADP)
Psychiatry-Child Psychiatry (CHP)
Psychiatry-Forensic Psychiatry (PFP)
Psychiatry-Geriatric Psychiatry (PYG)
Psychiatry-Pain Medicine (PPN)
Psychiatry-Psychoanalysis (PYA)
Psychiatry-Psychosomatic Medicine (PYM)
Public Health/General Preventive Medicine (PHP)
Pulmonary Critical Care Medicine (PCC)

Pulmonary Disease (PUD)
Radiation Oncology (RO)
Radiology (R)
Radiology-Abdominal Radiology (AR)
Radiology-Cardiothoracic Radiology (CTR)
Radiology-Diagnostic Radiology (DR)
Radiology-Musculoskeletal Radiology(MSR)
Radiology-Neuroradiology (RNR)
Radiology-Neuroradiology-Endovascular Surgical (ESN)
Radiology-Nuclear Radiology (NR)
Radiology-Pediatric Radiology (PDR)
Radiology-Radiological Physics (RP)
Radiology-Vascular & Interventional Radiology (VIR)
Reproductive Endocrinology (REN)
Rheumatology (RHU)
Sclerotherapeutic Pain Management (SPMO)
Sleep Medicine (SME)
Spinal Cord Injury Medicine (SCI)
Surgery-Abdominal (AS)
Surgery-Colon & Rectal (CRS)
Surgery-Cosmetic (CS)
Surgery-Craniofacial Surgery (CFS)
Surgery-Critical Care (CCS)
Surgery-Dermatologic Surgery (DS)
Surgery-General Surgery (GS)
Surgery-Hand Surgery (HS)
Surgery-Head & Neck Surgery (HNS)

Surgery-Neurological Surgery (NS)
Surgery-Neuroradiology-Endovascular Surgical (ESN)
Surgery-Oral And Maxillofacial Surgery (OMF)
Surgery-Pediatric Cardiothoracic Surgery (PCS)
Surgery-Pediatric Neurological Surgery (NSP)
Surgery-Pediatric Orthopedic Surgery (OP)
Surgery-Pediatric Surgery (PDS)
Surgery-Plastic Surgery (PS)
Surgery-Surgical Oncology (SO)
Surgery-Thoracic Surgery (TS)
Surgery-Transplant Surgery (TTS)
Surgery-Traumatic Surgery (TRS)
Surgery-Urological Surgery (U)
Surgery-Vascular Surgery (VS)
Undersea Medicine and Hyperbaric Medicine (UM)
Undersea and Hyperbaric Medicine-Emergency Medicine (UME)
Urgent Care Medicine (UCM)
Urology (U)
Urology-Pediatric Urology (UP)
Vascular Medicine (VM)
Vascular Neurology (VN)
Other Specialty (OS)

Appendix 1-B: 2010 Indiana Physician Assistant Re-Licensure Survey Instrument

Your answers to these questions will help the Indiana State Department of Health to respond to emergencies and to identify health professional shortages and geographic shortage areas. The survey is voluntary and will not affect the status of your license or your renewal.

Thank you very much for your help.

1. What is your current work status as physician assistant (PA)? **Please choose only one.**

DROP-DOWN LIST

Actively working as a PA (patient care activities, teaching, administration, or research)

Retired as a PA

Temporarily inactive as a PA

2. In which activity do you spend most of your professional time? **Please choose only one.**

DROP-DOWN LIST

Direct patient care/patient care activities

Administration

Physician assistant education

Research

Other

- 3a. What is the major specialty of your primary supervising physician at your principal PA position (the position in which you spend the most time)? **Please choose only one.** If you are not actively working as a PA, please skip to Question 7.

DROP-DOWN LIST

Addiction Medicine (ADM)

Adolescent Medicine (AMI)
Aerospace Medicine (AM)
Allergy (A)
Allergy & Immunology (AI)
Allergy & Immunology-Diagnostic Laboratory Immunology (ALI)
Alternative Medicine (ALTM)
Anesthesiology (AN)
Anesthesiology-Critical Care (CCA)
Anesthesiology-Pain Management (APM)
Anesthesiology-Pediatric (PAN)
Cardiology-Cardiovascular Disease (CD)
Cardiology-Cardiac Electrophysiology (ICE)
Cardiology-Interventional Cardiology (IC)
Cardiology-Nuclear Cardiology (NC)
Critical Care Medicine (CCM)
Dermatology (D)
Dermatology-Clinical and Laboratory Dermatological Immunology (DDL)
Dermatology-Dermatological Immunology/Diagnostic and Laboratory Immunology (DLAB)
Dermatology-Dermatopathology (DMP)
Dermatology-Pediatric Dermatology (PDD)
Dermatology-Procedural Dermatology (PRD)
Diabetes (DIA)
Emergency Medicine (EM)
Emergency Medicine-Medical Toxicology (ETX)
Emergency Medicine-Pediatric Emergency Medicine (PE)
Emergency Medicine-Sports Medicine (ESM)

Endocrinology, Diabetes and Metabolism (END)
Epidemiology (EP)
Family Practice/Family Medicine (FM)
Family Practice-Adolescent Medicine (AMF)
Family Practice-Geriatric Medicine (FPG)
Family Practice-Sports Medicine (FSM)
Gastroenterology (GE)
General Internal Medicine (IM)
General Practice (GP)
General Preventive Medicine (GPM)
Genetics-Clinical Biochemical Genetics (CBG)
Genetics-Clinical Cytogenetics (CCG)
Genetics-Clinical Genetics (CG)
Genetics-Clinical Molecular Genetics (CMG)
Genetics-Medical Genetics (MG)
Genetics-Molecular Genetic Pathology (MGG)
Geriatrics (GERI)
Gynecological Oncology (GO)
Gynecology (GYN)
Hematology (HEM)
Hematology/Oncology (HO)
Hepatology (HEP)
Hospitalist (HOS)
Immunology (IG)
Infectious Diseases (ID)
Internal Medicine-General Internal Medicine (IM)
Internal Medicine-Cardiac Electrophysiology (ICE)

Internal Medicine-Diagnostic Laboratory Immunology (ILI)
Internal Medicine-Geriatrics (IMG)
Internal Medicine-Pediatrics (MPD)
Internal Medicine-Sports Medicine (ISM)
Legal Medicine (LM)
Maternal & Fetal Medicine (MFM)
Medical Informatics
Medical Management (MDM)
Medical Microbiology (MM)
Neonatal-Perinatal Medicine (NPM)
Nephrology (NEP)
Nephrology-Pediatric Nephrology (PN)
Neurology (N)
Neurology-Child Neurology (CHN)
Neurology-Clinical Neurophysiology (CN)
Neurology-Neurodevelopmental Disabilities (NDN)
Neurology-Neurology/Diagnostic Radiology/Neuroradiology (NRN)
Neurology-Neuromuscular Medicine
Neurology-Neuropsychiatry (NUP)
Neurology-Neuroradiology (RNR)
Neurology-Vascular Neurology (VN)
Neuroradiology-Endovascular Surgical (ESN)
Nuclear Medicine (NM)
Nuclear Radiology (NR)
Nutrition (NTR)
Obstetrics & Gynecology (OBG)
Obstetrics & Gynecology-Critical Care (OCC)

Obstetrics (OBS)
Occupational Medicine (OM)
Oncology (ON)
Ophthalmology (OPH)
Ophthalmology-Pediatric Ophthalmology (PO)
Orthopedic Surgery (ORS)
Orthopedic Surgery-Foot and Ankle (OFA)
Orthopedic Surgery-Hand Surgery (HSO)
Orthopedic Surgery-Orthopedic Musculoskeletal Oncology (OMO)
Orthopedic Surgery-Orthopedic Adult Reconstructive Surgery (OAR)
Orthopedic Surgery-Pediatric Orthopedic Surgery (OP)
Orthopedic Surgery-Sports Medicine (OSM)
Orthopedic Surgery-Surgery of the Spine (OSS)
Orthopedic Surgery-Trauma (OTR)
Osteopathic Manipulative Medicine (OMM)
Otolaryngology (OTO)
Otolaryngology-Pediatric Otolaryngology (PDO)
Otology-Neurotology (NO)
Pain Medicine (PMD)
Palliative Medicine (PLM)
Pathology-Anatomic Pathology (ATP)
Pathology-Anatomic/Clinical Pathology (PTH)
Pathology-Bloodbanking (BBK)
Pathology-Chemical Pathology (PCH)
Pathology-Clinical Pathology (CLP)
Pathology-Cytopathology (PCP)
Pathology-Forensic Pathology (FOP)

Pathology-Hematology (HMP)
Pathology-Medical Microbiology
Pathology-Molecular Genetic Pathology (MGP)
Pathology-Neuropathology (NP)
Pathology-Pediatric Pathology (PP)
Pathology-Selective Pathology (SP)
Pediatrics-General Pediatrics (PD)
Pediatrics-Adolescent Medicine (ADL)
Pediatrics-Critical Care (CCP)
Pediatrics-Developmental Behavioral Pediatrics (DBP)
Pediatrics-Neonatal-Perinatal Medicine (NPM)
Pediatrics-Neurodevelopmental Disabilities (NDP)
Pediatrics-Pediatric Allergy (PDA)
Pediatrics-Pediatric Cardiology (PDC)
Pediatrics-Pediatric Cardiothoracic Surgery (PCS)
Pediatrics-Pediatric Dermatology (PDD)
Pediatrics-Pediatric Diagnostic Laboratory Immunology (PLI)
Pediatrics-Pediatric Emergency Medicine (PEM)
Pediatrics-Pediatric Endocrinology (PDE)
Pediatrics-Pediatric Gastroenterology (PG)
Pediatrics-Pediatric Hematology/Oncology (PHO)
Pediatrics-Pediatric Infectious Diseases (PDI)
Pediatrics-Pediatric Medical Toxicology (PDT)
Pediatrics-Pediatric Otolaryngology (PDO)
Pediatrics-Pediatric Pathology (PP)
Pediatrics-Pediatric Pulmonology (PDP)
Pediatrics-Pediatric Radiology (PDR)

Pediatrics-Pediatric Rehabilitation Medicine (RPM)
Pediatrics-Pediatric Rheumatology (PPR)
Pediatrics-Pediatric Sports Medicine (PSM)
Pediatrics-Pediatric Surgery (PDS)
Pharmaceutical Medicine (PHM)
Pharmacology-Clinical Pharmacology (PA)
Phlebology (PHL)
Physical Medicine & Rehabilitation (PM)
Physical Medicine & Rehabilitation-Spinal Cord Injury (SCI)
Physical Medicine & Rehabilitation-Sports Medicine (PMM)
Plastic Surgery (PS)
Plastic Surgery-Facial Plastic Surgery (FPS)
Plastic Surgery-Head & Neck (PSH)
Preventive Medical Toxicology (PTX)
Proctology (PRO)
Psychiatry (P)
Psychiatry-Addiction (ADP)
Psychiatry-Child Psychiatry (CHP)
Psychiatry-Forensic Psychiatry (PFP)
Psychiatry-Geriatric Psychiatry (PYG)
Psychiatry-Pain Medicine (PPN)
Psychiatry-Psychoanalysis (PYA)
Psychiatry-Psychosomatic Medicine (PYM)
Public Health/General Preventive Medicine (PHP)
Pulmonary Critical Care Medicine (PCC)
Pulmonary Disease (PUD)
Radiation Oncology (RO)

Radiology (R)
Radiology-Abdominal Radiology (AR)
Radiology-Cardiothoracic Radiology (CTR)
Radiology-Diagnostic Radiology (DR)
Radiology-Musculoskeletal Radiology(MSR)
Radiology-Neuroradiology (RNR)
Radiology-Neuroradiology-Endovascular Surgical (ESN)
Radiology-Nuclear Radiology (NR)
Radiology-Pediatric Radiology (PDR)
Radiology-Radiological Physics (RP)
Radiology-Vascular & Interventional Radiology (VIR)
Reproductive Endocrinology (REN)
Rheumatology (RHU)
Sclerotherapeutic Pain Management (SPMO)
Sleep Medicine (SME)
Spinal Cord Injury Medicine (SCI)
Surgery-Abdominal (AS)
Surgery-Cardiothoracic
Surgery-Cardiovascular
Surgery-Colon & Rectal (CRS)
Surgery-Cosmetic (CS)
Surgery-Craniofacial Surgery (CFS)
Surgery-Critical Care (CCS)
Surgery-Dermatologic Surgery (DS)
Surgery-General Surgery (GS)
Surgery-Hand Surgery (HS)
Surgery-Head & Neck Surgery (HNS)

Surgery-Neurological Surgery (NS)
Surgery-Neuroradiology-Endovascular Surgical (ESN)
Surgery-Oral And Maxillofacial Surgery (OMF)
Surgery-Pediatric Cardiothoracic Surgery (PCS)
Surgery-Pediatric Neurological Surgery (NSP)
Surgery-Pediatric Surgery (PDS)
Surgery-Plastic Surgery (PS)
Surgery-Surgical Oncology (SO)
Surgery-Thoracic Surgery (TS)
Surgery-Transplant Surgery (TTS)
Surgery-Traumatic Surgery (TRS)
Surgery-Urological Surgery (U)
Surgery-Vascular Surgery (VS)
Undersea Medicine and Hyperbaric Medicine (UM)
Undersea and Hyperbaric Medicine-Emergency Medicine (UME)
Urgent Care Medicine (UCM)
Urology (U)
Urology-Pediatric Urology (UP)
Vascular Medicine (VM)
Vascular Neurology (VN)
Other Specialty (OS)

- 3b. If you hold more than one position as a physician assistant, what is the major specialty of your primary supervising physician at your secondary PA position? **Please choose only one.**

DROP-DOWN LIST

I do not hold more than one position as a PA

Addiction Medicine (ADM)

Adolescent Medicine (AMI)
Aerospace Medicine (AM)
Allergy (A)
Allergy & Immunology (AI)
Allergy & Immunology-Diagnostic Laboratory Immunology (ALI)
Alternative Medicine (ALTM)
Anesthesiology (AN)
Anesthesiology-Critical Care (CCA)
Anesthesiology-Pain Management (APM)
Anesthesiology-Pediatric (PAN)
Cardiology-Cardiovascular Disease (CD)
Cardiology-Cardiac Electrophysiology (ICE)
Cardiology-Interventional Cardiology (IC)
Cardiology-Nuclear Cardiology (NC)
Critical Care Medicine (CCM)
Dermatology (D)
Dermatology-Clinical and Laboratory Dermatological Immunology (DDL)
Dermatology-Dermatological Immunology/Diagnostic and Laboratory Immunology (DLAB)
Dermatology-Dermatopathology (DMP)
Dermatology-Pediatric Dermatology (PDD)
Dermatology-Procedural Dermatology (PRD)
Diabetes (DIA)
Emergency Medicine (EM)
Emergency Medicine-Medical Toxicology (ETX)
Emergency Medicine-Pediatric Emergency Medicine (PE)
Emergency Medicine-Sports Medicine (ESM)

Endocrinology, Diabetes and Metabolism (END)
Epidemiology (EP)
Family Practice/Family Medicine (FM)
Family Practice-Adolescent Medicine (AMF)
Family Practice-Geriatric Medicine (FPG)
Family Practice-Sports Medicine (FSM)
Gastroenterology (GE)
General Internal Medicine (IM)
General Practice (GP)
General Preventive Medicine (GPM)
Genetics-Clinical Biochemical Genetics (CBG)
Genetics-Clinical Cytogenetics (CCG)
Genetics-Clinical Genetics (CG)
Genetics-Clinical Molecular Genetics (CMG)
Genetics-Medical Genetics (MG)
Genetics-Molecular Genetic Pathology (MGG)
Geriatrics (GERI)
Gynecological Oncology (GO)
Gynecology (GYN)
Hematology (HEM)
Hematology/Oncology (HO)
Hepatology (HEP)
Hospitalist (HOS)
Immunology (IG)
Infectious Diseases (ID)
Internal Medicine-General Internal Medicine (IM)
Internal Medicine-Cardiac Electrophysiology (ICE)

Internal Medicine-Diagnostic Laboratory Immunology (ILI)
Internal Medicine-Geriatrics (IMG)
Internal Medicine-Pediatrics (MPD)
Internal Medicine-Sports Medicine (ISM)
Legal Medicine (LM)
Maternal & Fetal Medicine (MFM)
Medical Informatics
Medical Management (MDM)
Medical Microbiology (MM)
Neonatal-Perinatal Medicine (NPM)
Nephrology (NEP)
Nephrology-Pediatric Nephrology (PN)
Neurology (N)
Neurology-Child Neurology (CHN)
Neurology-Clinical Neurophysiology (CN)
Neurology-Neurodevelopmental Disabilities (NDN)
Neurology-Neurology/Diagnostic Radiology/Neuroradiology (NRN)
Neurology-Neuromuscular Medicine
Neurology-Neuropsychiatry (NUP)
Neurology-Neuroradiology (RNR)
Neurology-Vascular Neurology (VN)
Neuroradiology-Endovascular Surgical (ESN)
Nuclear Medicine (NM)
Nuclear Radiology (NR)
Nutrition (NTR)
Obstetrics & Gynecology (OBG)
Obstetrics & Gynecology-Critical Care (OCC)

Obstetrics (OBS)
Occupational Medicine (OM)
Oncology (ON)
Ophthalmology (OPH)
Ophthalmology-Pediatric Ophthalmology (PO)
Orthopedic Surgery (ORS)
Orthopedic Surgery-Foot and Ankle (OFA)
Orthopedic Surgery-Hand Surgery (HSO)
Orthopedic Surgery-Orthopedic Musculoskeletal Oncology (OMO)
Orthopedic Surgery-Orthopedic Adult Reconstructive Surgery (OAR)
Orthopedic Surgery-Pediatric Orthopedic Surgery (OP)
Orthopedic Surgery-Sports Medicine (OSM)
Orthopedic Surgery-Surgery of the Spine (OSS)
Orthopedic Surgery-Trauma (OTR)
Osteopathic Manipulative Medicine (OMM)
Otolaryngology (OTO)
Otolaryngology-Pediatric Otolaryngology (PDO)
Otology-Neurotology (NO)
Pain Medicine (PMD)
Palliative Medicine (PLM)
Pathology-Anatomic Pathology (ATP)
Pathology-Anatomic/Clinical Pathology (PTH)
Pathology-Bloodbanking (BBK)
Pathology-Chemical Pathology (PCH)
Pathology-Clinical Pathology (CLP)
Pathology-Cytopathology (PCP)
Pathology-Forensic Pathology (FOP)

Pathology-Hematology (HMP)
Pathology-Medical Microbiology
Pathology-Molecular Genetic Pathology (MGP)
Pathology-Neuropathology (NP)
Pathology-Pediatric Pathology (PP)
Pathology-Selective Pathology (SP)
Pediatrics-General Pediatrics (PD)
Pediatrics-Adolescent Medicine (ADL)
Pediatrics-Critical Care (CCP)
Pediatrics-Developmental Behavioral Pediatrics (DBP)
Pediatrics-Neonatal-Perinatal Medicine (NPM)
Pediatrics-Neurodevelopmental Disabilities (NDP)
Pediatrics-Pediatric Allergy (PDA)
Pediatrics-Pediatric Cardiology (PDC)
Pediatrics-Pediatric Cardiothoracic Surgery (PCS)
Pediatrics-Pediatric Dermatology (PDD)
Pediatrics-Pediatric Diagnostic Laboratory Immunology (PLI)
Pediatrics-Pediatric Emergency Medicine (PEM)
Pediatrics-Pediatric Endocrinology (PDE)
Pediatrics-Pediatric Gastroenterology (PG)
Pediatrics-Pediatric Hematology/Oncology (PHO)
Pediatrics-Pediatric Infectious Diseases (PDI)
Pediatrics-Pediatric Medical Toxicology (PDT)
Pediatrics-Pediatric Otolaryngology (PDO)
Pediatrics-Pediatric Pathology (PP)
Pediatrics-Pediatric Pulmonology (PDP)
Pediatrics-Pediatric Radiology (PDR)

Pediatrics-Pediatric Rehabilitation Medicine (RPM)
Pediatrics-Pediatric Rheumatology (PPR)
Pediatrics-Pediatric Sports Medicine (PSM)
Pediatrics-Pediatric Surgery (PDS)
Pharmaceutical Medicine (PHM)
Pharmacology-Clinical Pharmacology (PA)
Phlebology (PHL)
Physical Medicine & Rehabilitation (PM)
Physical Medicine & Rehabilitation-Spinal Cord Injury (SCI)
Physical Medicine & Rehabilitation-Sports Medicine (PMM)
Plastic Surgery (PS)
Plastic Surgery-Facial Plastic Surgery (FPS)
Plastic Surgery-Head & Neck (PSH)
Preventive Medical Toxicology (PTX)
Proctology (PRO)
Psychiatry (P)
Psychiatry-Addiction (ADP)
Psychiatry-Child Psychiatry (CHP)
Psychiatry-Forensic Psychiatry (PFP)
Psychiatry-Geriatric Psychiatry (PYG)
Psychiatry-Pain Medicine (PPN)
Psychiatry-Psychoanalysis (PYA)
Psychiatry-Psychosomatic Medicine (PYM)
Public Health/General Preventive Medicine (PHP)
Pulmonary Critical Care Medicine (PCC)
Pulmonary Disease (PUD)
Radiation Oncology (RO)

Radiology (R)
Radiology-Abdominal Radiology (AR)
Radiology-Cardiothoracic Radiology (CTR)
Radiology-Diagnostic Radiology (DR)
Radiology-Musculoskeletal Radiology(MSR)
Radiology-Neuroradiology (RNR)
Radiology-Neuroradiology-Endovascular Surgical (ESN)
Radiology-Nuclear Radiology (NR)
Radiology-Pediatric Radiology (PDR)
Radiology-Radiological Physics (RP)
Radiology-Vascular & Interventional Radiology (VIR)
Reproductive Endocrinology (REN)
Rheumatology (RHU)
Sclerotherapeutic Pain Management (SPMO)
Sleep Medicine (SME)
Spinal Cord Injury Medicine (SCI)
Surgery-Abdominal (AS)
Surgery-Cardiothoracic
Surgery-Cardiovascular
Surgery-Colon & Rectal (CRS)
Surgery-Cosmetic (CS)
Surgery-Craniofacial Surgery (CFS)
Surgery-Critical Care (CCS)
Surgery-Dermatologic Surgery (DS)
Surgery-General Surgery (GS)
Surgery-Hand Surgery (HS)
Surgery-Head & Neck Surgery (HNS)

Surgery-Neurological Surgery (NS)
Surgery-Neuroradiology-Endovascular Surgical (ESN)
Surgery-Oral And Maxillofacial Surgery (OMF)
Surgery-Pediatric Cardiothoracic Surgery (PCS)
Surgery-Pediatric Neurological Surgery (NSP)
Surgery-Pediatric Surgery (PDS)
Surgery-Plastic Surgery (PS)
Surgery-Surgical Oncology (SO)
Surgery-Thoracic Surgery (TS)
Surgery-Transplant Surgery (TTS)
Surgery-Traumatic Surgery (TRS)
Surgery-Urological Surgery (U)
Surgery-Vascular Surgery (VS)
Undersea Medicine and Hyperbaric Medicine (UM)
Undersea and Hyperbaric Medicine-Emergency Medicine (UME)
Urgent Care Medicine (UCM)
Urology (U)
Urology-Pediatric Urology (UP)
Vascular Medicine (VM)
Vascular Neurology (VN)
Other Specialty (OS)

- 3c. If you hold more than two positions as a physician assistant, what is the major specialty of your primary supervising physician at your tertiary PA position? **Please choose only one.**

DROP-DOWN LIST

I do not hold more than one or two PA positions.

Addiction Medicine (ADM)

Adolescent Medicine (AMI)
Aerospace Medicine (AM)
Allergy (A)
Allergy & Immunology (AI)
Allergy & Immunology-Diagnostic Laboratory Immunology (ALI)
Alternative Medicine (ALTM)
Anesthesiology (AN)
Anesthesiology-Critical Care (CCA)
Anesthesiology-Pain Management (APM)
Anesthesiology-Pediatric (PAN)
Cardiology-Cardiovascular Disease (CD)
Cardiology-Cardiac Electrophysiology (ICE)
Cardiology-Interventional Cardiology (IC)
Cardiology-Nuclear Cardiology (NC)
Critical Care Medicine (CCM)
Dermatology (D)
Dermatology-Clinical and Laboratory Dermatological Immunology (DDL)
Dermatology-Dermatological Immunology/Diagnostic and Laboratory Immunology (DLAB)
Dermatology-Dermatopathology (DMP)
Dermatology-Pediatric Dermatology (PDD)
Dermatology-Procedural Dermatology (PRD)
Diabetes (DIA)
Emergency Medicine (EM)
Emergency Medicine-Medical Toxicology (ETX)
Emergency Medicine-Pediatric Emergency Medicine (PE)
Emergency Medicine-Sports Medicine (ESM)

Endocrinology, Diabetes and Metabolism (END)
Epidemiology (EP)
Family Practice/Family Medicine (FM)
Family Practice-Adolescent Medicine (AMF)
Family Practice-Geriatric Medicine (FPG)
Family Practice-Sports Medicine (FSM)
Gastroenterology (GE)
General Internal Medicine (IM)
General Practice (GP)
General Preventive Medicine (GPM)
Genetics-Clinical Biochemical Genetics (CBG)
Genetics-Clinical Cytogenetics (CCG)
Genetics-Clinical Genetics (CG)
Genetics-Clinical Molecular Genetics (CMG)
Genetics-Medical Genetics (MG)
Genetics-Molecular Genetic Pathology (MGG)
Geriatrics (GERI)
Gynecological Oncology (GO)
Gynecology (GYN)
Hematology (HEM)
Hematology/Oncology (HO)
Hepatology (HEP)
Hospitalist (HOS)
Immunology (IG)
Infectious Diseases (ID)
Internal Medicine-General Internal Medicine (IM)
Internal Medicine-Cardiac Electrophysiology (ICE)

Internal Medicine-Diagnostic Laboratory Immunology (ILI)
Internal Medicine-Geriatrics (IMG)
Internal Medicine-Pediatrics (MPD)
Internal Medicine-Sports Medicine (ISM)
Legal Medicine (LM)
Maternal & Fetal Medicine (MFM)
Medical Informatics
Medical Management (MDM)
Medical Microbiology (MM)
Neonatal-Perinatal Medicine (NPM)
Nephrology (NEP)
Nephrology-Pediatric Nephrology (PN)
Neurology (N)
Neurology-Child Neurology (CHN)
Neurology-Clinical Neurophysiology (CN)
Neurology-Neurodevelopmental Disabilities (NDN)
Neurology-Neurology/Diagnostic Radiology/Neuroradiology (NRN)
Neurology-Neuromuscular Medicine
Neurology-Neuropsychiatry (NUP)
Neurology-Neuroradiology (RNR)
Neurology-Vascular Neurology (VN)
Neuroradiology-Endovascular Surgical (ESN)
Nuclear Medicine (NM)
Nuclear Radiology (NR)
Nutrition (NTR)
Obstetrics & Gynecology (OBG)
Obstetrics & Gynecology-Critical Care (OCC)

Obstetrics (OBS)
Occupational Medicine (OM)
Oncology (ON)
Ophthalmology (OPH)
Ophthalmology-Pediatric Ophthalmology (PO)
Orthopedic Surgery (ORS)
Orthopedic Surgery-Foot and Ankle (OFA)
Orthopedic Surgery-Hand Surgery (HSO)
Orthopedic Surgery-Orthopedic Musculoskeletal Oncology (OMO)
Orthopedic Surgery-Orthopedic Adult Reconstructive Surgery (OAR)
Orthopedic Surgery-Pediatric Orthopedic Surgery (OP)
Orthopedic Surgery-Sports Medicine (OSM)
Orthopedic Surgery-Surgery of the Spine (OSS)
Orthopedic Surgery-Trauma (OTR)
Osteopathic Manipulative Medicine (OMM)
Otolaryngology (OTO)
Otolaryngology-Pediatric Otolaryngology (PDO)
Otology-Neurotology (NO)
Pain Medicine (PMD)
Palliative Medicine (PLM)
Pathology-Anatomic Pathology (ATP)
Pathology-Anatomic/Clinical Pathology (PTH)
Pathology-Bloodbanking (BBK)
Pathology-Chemical Pathology (PCH)
Pathology-Clinical Pathology (CLP)
Pathology-Cytopathology (PCP)
Pathology-Forensic Pathology (FOP)

Pathology-Hematology (HMP)
Pathology-Medical Microbiology
Pathology-Molecular Genetic Pathology (MGP)
Pathology-Neuropathology (NP)
Pathology-Pediatric Pathology (PP)
Pathology-Selective Pathology (SP)
Pediatrics-General Pediatrics (PD)
Pediatrics-Adolescent Medicine (ADL)
Pediatrics-Critical Care (CCP)
Pediatrics-Developmental Behavioral Pediatrics (DBP)
Pediatrics-Neonatal-Perinatal Medicine (NPM)
Pediatrics-Neurodevelopmental Disabilities (NDP)
Pediatrics-Pediatric Allergy (PDA)
Pediatrics-Pediatric Cardiology (PDC)
Pediatrics-Pediatric Cardiothoracic Surgery (PCS)
Pediatrics-Pediatric Dermatology (PDD)
Pediatrics-Pediatric Diagnostic Laboratory Immunology (PLI)
Pediatrics-Pediatric Emergency Medicine (PEM)
Pediatrics-Pediatric Endocrinology (PDE)
Pediatrics-Pediatric Gastroenterology (PG)
Pediatrics-Pediatric Hematology/Oncology (PHO)
Pediatrics-Pediatric Infectious Diseases (PDI)
Pediatrics-Pediatric Medical Toxicology (PDT)
Pediatrics-Pediatric Otolaryngology (PDO)
Pediatrics-Pediatric Pathology (PP)
Pediatrics-Pediatric Pulmonology (PDP)
Pediatrics-Pediatric Radiology (PDR)

Pediatrics-Pediatric Rehabilitation Medicine (RPM)
Pediatrics-Pediatric Rheumatology (PPR)
Pediatrics-Pediatric Sports Medicine (PSM)
Pediatrics-Pediatric Surgery (PDS)
Pharmaceutical Medicine (PHM)
Pharmacology-Clinical Pharmacology (PA)
Phlebology (PHL)
Physical Medicine & Rehabilitation (PM)
Physical Medicine & Rehabilitation-Spinal Cord Injury (SCI)
Physical Medicine & Rehabilitation-Sports Medicine (PMM)
Plastic Surgery (PS)
Plastic Surgery-Facial Plastic Surgery (FPS)
Plastic Surgery-Head & Neck (PSH)
Preventive Medical Toxicology (PTX)
Proctology (PRO)
Psychiatry (P)
Psychiatry-Addiction (ADP)
Psychiatry-Child Psychiatry (CHP)
Psychiatry-Forensic Psychiatry (PFP)
Psychiatry-Geriatric Psychiatry (PYG)
Psychiatry-Pain Medicine (PPN)
Psychiatry-Psychoanalysis (PYA)
Psychiatry-Psychosomatic Medicine (PYM)
Public Health/General Preventive Medicine (PHP)
Pulmonary Critical Care Medicine (PCC)
Pulmonary Disease (PUD)
Radiation Oncology (RO)

Radiology (R)
Radiology-Abdominal Radiology (AR)
Radiology-Cardiothoracic Radiology (CTR)
Radiology-Diagnostic Radiology (DR)
Radiology-Musculoskeletal Radiology(MSR)
Radiology-Neuroradiology (RNR)
Radiology-Neuroradiology-Endovascular Surgical (ESN)
Radiology-Nuclear Radiology (NR)
Radiology-Pediatric Radiology (PDR)
Radiology-Radiological Physics (RP)
Radiology-Vascular & Interventional Radiology (VIR)
Reproductive Endocrinology (REN)
Rheumatology (RHU)
Sclerotherapeutic Pain Management (SPMO)
Sleep Medicine (SME)
Spinal Cord Injury Medicine (SCI)
Surgery-Abdominal (AS)
Surgery-Cardiothoracic
Surgery-Cardiovascular
Surgery-Colon & Rectal (CRS)
Surgery-Cosmetic (CS)
Surgery-Craniofacial Surgery (CFS)
Surgery-Critical Care (CCS)
Surgery-Dermatologic Surgery (DS)
Surgery-General Surgery (GS)
Surgery-Hand Surgery (HS)
Surgery-Head & Neck Surgery (HNS)

Surgery-Neurological Surgery (NS)
Surgery-Neuroradiology-Endovascular Surgical (ESN)
Surgery-Oral And Maxillofacial Surgery (OMF)
Surgery-Pediatric Cardiothoracic Surgery (PCS)
Surgery-Pediatric Neurological Surgery (NSP)
Surgery-Pediatric Surgery (PDS)
Surgery-Plastic Surgery (PS)
Surgery-Surgical Oncology (SO)
Surgery-Thoracic Surgery (TS)
Surgery-Transplant Surgery (TTS)
Surgery-Traumatic Surgery (TRS)
Surgery-Urological Surgery (U)
Surgery-Vascular Surgery (VS)
Undersea Medicine and Hyperbaric Medicine (UM)
Undersea and Hyperbaric Medicine-Emergency Medicine (UME)
Urgent Care Medicine (UCM)
Urology (U)
Urology-Pediatric Urology (UP)
Vascular Medicine (VM)
Vascular Neurology (VN)
Other Specialty (OS)

4. What type of employer do you work for in your principal PA position? **Please choose only one.**

DROP-DOWN LIST

Private sector employer

A branch of the military (Army, Navy, etc.)

Federal government

State government
Local government
Other type of employer

5. In what type of setting do you spend most of your time at your principal PA position?
Please choose only one.

DROP-DOWN LIST

Adult day care
Ambulatory care setting (surg./other)
Assisted living facility/unit
College health facility
Community health center/clinic
Community mental health center
Community substance abuse agency
Continuing education/staff development
Drug company
Home health care agency
Hospice
Hospital (in- & out-patient)
Hospital (in-patient only)
Hospital (out-patient only)
Hospital ER/ED
Hospital intensive care/critical care unit
Hospital operating room
Industrial facility
Insurance company
Law firm
Long term acute care facility/unit

Long term/extended care facility/unit
Mental retardation facility/unit
Non-residential care facility/unit (e.g. elder day care)
Occupational health setting
Physician assistant educational program
Physician private practice-solo physician
Physician private practice-single specialty group
Physician private practice-multi-specialty group
Primary care center/clinic
Prison/correctional facility
Psychiatric inpatient facility/unit
Public health department (city, county or state)
Research setting
State agency (other than state public health department)
School-based health facility
Supplemental staffing agency
Surgical center, freestanding
Urgent care center/clinic, free-standing
Other

6. How many hours per week on average do you spend in ALL activities as a physician assistant? **Please choose only one.**

DROP-DOWN LIST

1-9

10-19

20-29

30-39

40-49

50-59

60 or more

7. Would you be willing to provide services in case of a bio-terrorism event or other public health emergency? If you answer “Yes,” we may contact you using your PLA contact information.

DROP-DOWN LIST

Yes

No

8. Are you fluent in any of the following languages? **Please select all that apply.**

DROP-DOWN LIST

African languages

Arabic

Burmese

Cambodian

Chinese

Filipino

French

German

Greek

Hindi

Italian

Japanese

Korean

Pennsylvania Dutch

Polish

Portuguese

Russian

Sign language

Spanish

Tagalog

Thai

Turkish

Vietnamese

9. What is the name of the institution or the state that provided your entry level PA training?
Please choose only one.

DROP-DOWN LIST

Butler University

University of Saint Francis

Lutheran College of Health Professions

Indiana University-Fort Wayne

Alabama

Alaska

Arizona

Arkansas

California

Colorado

Connecticut

Delaware

Florida

Georgia

Hawaii

Idaho

Illinois
Iowa
Kansas
Kentucky
Louisiana
Maine
Maryland
Massachusetts
Michigan
Minnesota
Mississippi
Missouri
Montana
Nebraska
Nevada
New Hampshire
New Jersey
New Mexico
New York
North Carolina
North Dakota
Ohio
Oklahoma
Oregon
Pennsylvania
Rhode Island
South Carolina

South Dakota
Tennessee
Texas
Utah
Vermont
Virginia
Washington
West Virginia
Wisconsin
Wyoming
Non-U.S. PA educational program

10. What is your highest PA credential/degree? **Please choose only one.**

DROP-DOWN LIST

Certificate of completion

Associate

Bachelors

Masters

Doctorate

11. What is the name of the institution or the state in which you earned your highest PA credential? **Please choose only one.**

DROP-DOWN LIST

Butler University

University of Saint Francis

Lutheran College of Health Professions

Indiana University-Fort Wayne

Alabama
Alaska
Arizona
Arkansas
California
Colorado
Connecticut
Delaware
Florida
Georgia
Hawaii
Idaho
Illinois
Iowa
Kansas
Kentucky
Louisiana
Maine
Maryland
Massachusetts
Michigan
Minnesota
Mississippi
Missouri
Montana
Nebraska
Nevada

New Hampshire
New Jersey
New Mexico
New York
North Carolina
North Dakota
Ohio
Oklahoma
Oregon
Pennsylvania
Rhode Island
South Carolina
South Dakota
Tennessee
Texas
Utah
Vermont
Virginia
Washington
West Virginia
Wisconsin
Wyoming
Non-U.S. PA educational program

12. What is your highest degree in any field?

DROP-DOWN LIST

Diploma

Associate

Bachelors

Masters

Doctorate

13. Which of the following best describes your race? **Please select only one.**

DROP-DOWN LIST

American Indian/Native Alaskan

Asian/Pacific Islander

Black/African American

White

Multi-racial

Other

14. Are you of Hispanic origin?

DROP-DOWN LIST

Yes

No

15. What is your gender?

DROP-DOWN LIST

Female

Male

- 16a. Please enter the STREET ADDRESS of your principal practice location (where you work the most hours as a physician assistant). [TEXT BOX]
- 16b. Please enter the CITY of your principal practice location. [TEXT BOX]
- 16c. Please enter the 2-character STATE CODE (example: IN) for your principal practice location. [TEXT BOX]
- 16d. Please enter the 5-character ZIP CODE for your principal practice location.
[TEXT BOX]
- 17a. Please enter the STREET ADDRESS of a secondary practice location. [TEXT BOX]
- 17b. Please enter the CITY of the secondary practice location. [TEXT BOX]
- 17c. Please enter the 2-character STATE CODE (example: IN) for the secondary practice location. [TEXT BOX]
- 17d. Please enter the 5-character ZIP CODE for the secondary practice location.
[TEXT BOX]
- 18a. Please enter the STREET ADDRESS of a third practice location. [TEXT BOX]
- 18b. Please enter the CITY of the third practice location. [TEXT BOX]
- 18c. Please enter the 2-character STATE CODE (example: IN) for the third practice location.[TEXT BOX]
- 18d. Please enter the 5-character ZIP CODE for the third practice location.
[TEXT BOX]

Appendix 1-C: 2011 Indiana Nurse Re-Licensure Survey Instrument

Your answers to these questions are vital to help the Indiana State Department of Health respond to emergencies and identify health professional shortage areas. The survey is voluntary and will not affect the status of your license. Please complete the survey whether you are currently working as a nurse or not.

Thank you very much for your help.

1. What is your current work status in nursing? **Please select only one response.**

DROP-DOWN LIST

- a. Actively working in a paid position related to nursing (Consider yourself actively working in nursing if you are involved in a position where RN licensure is required)
- b. Actively working in a paid position in health care but not in nursing
- c. Actively working, but not as a nurse or in health care
- d. Working in nursing, but **ONLY** on a non-paid basis (volunteer or religious order)
- e. Unemployed and seeking work as a nurse in Indiana
- f. Temporarily inactive as a nurse
- g. Retired or permanently inactive as a nurse

If you checked responses b through g in Question 1, please SKIP to Q13.

2. Please type the street address of your principal practice location. “Principal practice location” is the location in which you work for the most hours as a nurse.

TEXT BOX.

3. What is your gender?

Male

Female

4. What is your racial background?

DROP-DOWN LIST

American Indian or Alaska Native

Asian

Black or African American

Native Hawaiian or Other Pacific Islander

White

Multiracial

5. What is your ethnic background?

DROP-DOWN LIST

Hispanic or Latino

Not Hispanic or Latino

6. Would you be willing to provide services in case of a bio-terrorism event or other public health emergency? If you answer “Yes,” we may use your PLA contact information to contact you.

DROP-DOWN LIST

Yes

No

7. Do you hold more than one paid position as a nurse (more than one employer)?

DROP-DOWN LIST

Yes, 2 paid positions

Yes, 3 paid positions

Yes, 4 or more paid positions

No

8. Please choose the term that best describes your job title for the principal position as a nurse (the position in which you work the most hours). **Please select only one response.**

DROP-DOWN LIST

Advice/triage nurse

Certified Nurse-Midwife (CNM)

Certified Registered Nurse Anesthetist (CRNA)

Charge nurse or team leader

Clinical Nurse Specialist (CNS)

Community health nurse

Consultant

Faculty

First-line management (head nurse, floor supervisor)

Infection control

Informatics nurse

Instructor/lecturer

Legal nurse

Middle management/administration (assistant director, house supervisor, associate dean, department head)

Nurse Practitioner (NP)

Patient care coordinator, case manager, discharge planner

Patient educator

Public health nurse

Quality improvement nurse, utilization review nurse

Researcher

School nurse

Senior management/administration (CEO, vice president, nursing executive, dean)

Staff development director

Staff educator or instructor in clinical setting

Staff nurse or direct care nurse

Surveyor/ auditor/regulator

No position title

Other

9. In your principal position, in what type of clinical specialty did you spend most of your time in? **Please select only one response.**

DROP-DOWN LIST

No patient care

Ambulatory care (including primary care, outpatient settings, except surgical)

Cardiac or cardiovascular care

Chronic care
Community health
Critical care
Dermatology
Education
Emergency or trauma care
Gastrointestinal
General medical surgical
Gynecology (women's health)
Home health
Hospice
Infectious/ communicable disease
Labor and delivery
Long-term care/ nursing home
Neurological
Obstetrics
Occupational health
Oncology
Pediatrics/ neonatal
Primary care
Psychiatric or mental health (substance abuse and counseling)
Public health
Pulmonary/ respiratory
Radiology (diagnostic or therapeutic)
Renal/ dialysis

Surgery (including ambulatory, pre-operative, post-operative, post-anesthesia)

No specific area

Other specialty for a majority of my time

10. Which of the following best describes the setting where you work at your principal position? **Please select only one response.**

DROP-DOWN LIST

Hospital (Exclude nursing home units and all off-site units of hospitals, but include all on-site clinics and other services of the hospitals.)

Non- Federal, short-term hospital, except psychiatric (for example, acute care hospital)

Non-Federal long-term hospital, except psychiatric

Non-Federal psychiatric hospital

Federal Government hospital

Other type of hospital

Nursing Home/Extended Care Facility

Nursing home unit in hospital

Free standing nursing home/extended care facility

Facility for mentally challenged

Other types of extended care facility

Nursing Education Program

LPN/LVN program

Diploma program (RN)

Associate degree program

Bachelor's degree

Higher degree nursing program

Other program

Public or Community Health Setting

Official State Health Department

Official State Mental Health Agency

Official City or County Health Department

Combination (official/voluntary) nursing service

Visiting nurse service (VNS/NA)

Home health service unit (hospital-based)

Home health agency (non-hospital based)

Community mental-health organization or facility (including freestanding psychiatric outpatient clinics)

Substance abuse center/clinic

Community/neighborhood health center

Planned Parenthood/family planning center

Day care center

Rural health care center

Retirement community center

Hospice

Other

School Health Service

Public school system

Private or parochial elementary or secondary school

College or university

Other

Occupational Health (Employee Health Service)

Private industry

Government

Other

Ambulatory Care Setting

Solo practice (physician)

Solo practice (nurse)

Partnerships (physicians)

Partnerships (nurses)

Group practice (physicians)

Group practice (nurses)

Partnership or group practice (mixed group of professionals)

Freestanding clinic (physicians)

Freestanding clinic (nurses)

Ambulatory surgical center

Dialysis center/clinic

Dental practice

Hospital owned off-site clinics

Health Maintenance Organization (HMO)

Other

Other

Correctional facility

Private duty in a home setting

Home-based self-employment

Other

11. What type of work setting best describes where you work for your other nursing position(s)? **Please select only one response.** (Refer to categories in Question 10 for further clarification.)

DROP-DOWN LIST

Hospital

Nursing Home/Extended Care Facility

Nursing Education Program

Public or Community Health Setting

School Health Service

Occupational Health (Employee Health Service)

Ambulatory Care Setting

Insurance Claims/Benefits

Policy, Planning, Regulatory, or Licensing Agency

Other

12. How many hours per week on average do you spend in ALL related nursing activities? **Please select only one response.**

DROP-DOWN LIST

1- 19

20-35

36-40

41 or more

13. Have you ever worked as any of the following? **Please select all that apply.**

DROP-DOWN LIST

Licensed Practice Nurse (LPN/LVN)

CNA (Certified Nurse Aide)

Nursing assistant

Paramedic

Emergency Medical Technician (EMT)

14. What is your highest degree in nursing? **Please select only one response.**

DROP-DOWN LIST

Diploma

Associate

Bachelor's

Master's

Doctorate

15. Since graduating from your initial nursing program, have you completed one of the following formal education programs preparing you for advanced practice nursing?

Yes

No

If you answered "yes," please select any one response.

DROP-DOWN LIST

Clinical Nurse Specialist

Nurse Practitioner

Nurse Anesthetist

Nurse-midwife

16a. Are you currently certified in any of the following Advanced Practice Nursing roles?

Yes

No

If you answered “yes,” please select all that apply.

DROP-DOWN LIST

Clinical nurse specialist

Nurse anesthetist

Nurse-midwife

Nurse practitioner

16b. Are you currently working in any of the following Advanced Practice Nursing roles?

Please select any one response.

DROP-DOWN LIST

Clinical nurse specialist

Nurse anesthetist

Nurse-midwife

Nurse practitioner- Primary care (for e.g., school based clinics, community health clinics)

Nurse practitioner- Other (for e.g., orthopedics, neurology, acute care, ER, cardiology)

17. What other nursing degrees do you plan to pursue in the next 2 years? **Please select all that apply.**

DROP-DOWN LIST

Bachelor’s

Master’s

Doctor of Nursing Practice (DNP)

PhD

I do not intend to pursue further nursing education in the next 2 years

18. Would you be interested in teaching in a nursing program? If you answer “Yes,” we may share your name with Indiana Nursing Workforce Development Coalition?

DROP-DOWN LIST

Yes

No

19. How soon do you anticipate retirement?

DROP-DOWN LIST

Less than 1 year

2-3 years

4-9 years

10 or more years

20. If you are currently not working for pay in nursing, HOW LONG has it been since you stopped working in a paid position as a registered nurse? **Please select only one response.**

DROP-DOWN LIST

Never worked in a paid RN position

Less than 1 year

2-3 years

4-9 years

10 or more years

21. If you are currently not working for pay in nursing, what is the PRIMARY REASON(s) you do not actively working as a nurse? **Please select all that apply.**

DROP-DOWN LIST

I have never worked in a paid position as a registered nurse.

Burnout/stressful environment

Career advancement/promotion to a non-nursing position

Disability/illness

Family obligations

Pursuing a career in a different field

Laid off/downsizing of staff

Inadequate pay/benefits

Relocated

Retired

Other