

# Preparing and Credentialing the Nation's Teachers

The Secretary's 11th Report on the Teacher Workforce



October 2021

U.S. Department of Education  
Office of Postsecondary Education

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**October 2021**

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Data presented in this publication are from states' and jurisdictions' required Title II reports to the U.S. Department of Education in 2015, 2016, 2017, 2018, and 2019. Respondents provided data on numerous check points regarding teacher preparation and credentials, and received technical assistance as needed. Data in this report may be inconsistent with data published in earlier reports, as respondents are able to revise their previous submissions. Prior reports are available at <https://title2.ed.gov>.

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## Executive Summary

*Title II* of the *Higher Education Act of 1965 (HEA)*, as amended in 2008 by the *Higher Education Opportunity Act (HEOA)*, requires states to report annually on key elements of their teacher preparation programs and requirements for initial teacher credentialing, in kindergarten through 12th grade, on a State Report Card (SRC) designated by the Secretary. Under *Title II* of the *HEA*, institutions of higher education (IHEs) that conduct teacher preparation programs, whether traditional<sup>1</sup> or alternative<sup>2</sup> programs, must annually collect and submit data to their respective states. States, in turn, report their information to the U.S. Department of Education (Department) on the SRC.

This 11th report on teacher quality combines and presents information states and jurisdictions<sup>3</sup> reported to the Department in the 2015, 2016, 2017, 2018, and 2019 SRCs,<sup>4</sup> and provides national information on teacher preparation and teacher credentialing. Key findings include:

- Enrollment in teacher preparation programs steadily declined for five years from Academic Year (AY) 2010–11 to AY 2014–15 but has stabilized between AY 2014–15 and AY 2017–18 (see [Figure 2-1](#)).
- Traditional programs consistently enroll a higher number of prospective teachers compared to alternative programs. However, enrollment in traditional programs steadily declined between AY 2010–11 and AY 2017–18, while enrollment in alternative programs has been consistently growing since AY 2014–15 (see [Figure 2-2](#)).
- The gender and race/ethnicity distribution of prospective teachers is different from that of kindergarten (K)–12 students. Overall, the demographics of teacher preparation program participants are more female and white than K–12 students (see [Figure 2-4](#) and [Figure 2-6](#)).

---

<sup>1</sup> Traditional teacher preparation programs often attract individuals who enter college or a graduate program with the goal of becoming a teacher. Traditional programs generally serve undergraduate students who have no prior teaching or work experience and lead, at least, to a bachelor's degree. Some traditional teacher preparation programs may lead to a teaching credential but not to a degree.

<sup>2</sup> Alternative teacher preparation programs often attract candidates who already hold a bachelor's degree, which may be in a specific content area, or may have prior work experience but are seeking to switch careers. As such, alternative programs often serve candidates who have subject-matter knowledge and are the teachers of record in a classroom while participating in their teacher preparation program. Alternative teacher preparation programs may be based in an IHE or outside an IHE. For *Title II* reporting, each state determines which teacher preparation programs are alternative teacher preparation programs.

<sup>3</sup> The entities required to report under *Title II* of the *HEA* are any of the states of the United States, as well as the District of Columbia, the Commonwealth of Puerto Rico, American Samoa, the Commonwealth of the Northern Mariana Islands, Guam, the Freely Associated States (the Republic of the Marshall Islands, the Federated States of Micronesia, and the Republic of Palau), and the U. S. Virgin Islands.

<sup>4</sup> Data from SRCs reported in 2014 and earlier have been published in previous Secretary's Reports (see <https://title2.ed.gov/Public/SecReport.aspx>). This report also includes data from 2014 and earlier, to present trends over time.

- Although there are still disproportionately more white individuals and fewer individuals of other racial/ethnic backgrounds enrolled in teacher preparation programs, the racial/ethnic makeup of teacher preparation program enrollees is gradually shifting: The percentage of non-white enrollees rose from 25 percent in AY 2010–11 to 35 percent in AY 2017–18 (see [Figure 2-5](#)).
- As teacher preparation has grown more racially and ethnically diverse, alternative programs have greater racial and ethnic diversity as compared to traditional programs (see [Figure 2-7](#)). Regardless of the program type, the potential teaching workforce is changing.
- Elementary education and early childhood education are consistently two of the top three subject areas in which program completers are prepared to teach. These subject areas are not identified as teacher shortage areas in most states (see [Figure 2-8](#) and [Figure 2-9](#)).
- Special education, on the other hand, is the most reported subject area with teacher shortages; 53 states and jurisdictions identified shortages of special education teachers. Nationally, teacher preparation programs appear to be responsive to this need: Special education is consistently the subject area with the second highest number of program completers (see [Figure 2-8](#) and [Figure 2-9](#)).
- The national summary pass rate across all teacher preparation programs has trended downward in recent years, from a 96.0 percent passing rate in AY 2013–14 to a 93.3 percent passing rate in AY 2017–18 (see [Figure 3-1](#)). Exploring this downward trend is an opportunity for further research.

# 1. Preparing the Nation's Teachers

Teacher preparation programs serve as the gateway to the teaching profession, preparing prospective teachers with the knowledge, skills, and abilities needed to effectively teach the nation's diverse student population. This chapter presents information about teacher preparation providers and programs, the Teacher Quality Partnership program, and the evaluation of teacher preparation programs.

## Teacher Preparation Providers and Programs

For purposes of *Title II* of the *HEA* reporting, a teacher preparation provider is an institution of higher education (IHE) or other organization offering at least one state-approved teacher preparation program. A teacher preparation provider may be a traditional provider; an alternative, IHE-based provider; or an alternative, not IHE-based provider.<sup>5</sup>

Alternative teacher preparation providers first emerged in the 1980s, offering a new pathway for individuals seeking to earn an initial teaching credential. While traditional teacher preparation providers often attract individuals who enter college with the goal of becoming a teacher, alternative providers often attract candidates who already hold a bachelor's degree in a specific content area and may have prior work experience but are seeking to switch careers. Some alternative providers specifically focus on recruiting prospective teachers in hard-to-staff subjects or hard-to-staff schools in large cities and rural areas. Each state determines its own requirements for alternative routes to a teaching credential, allowing alternative programs and providers to vary significantly from one state to another.

**Traditional teacher preparation providers** often attract individuals who enter college or a graduate program with the goal of becoming a teacher.

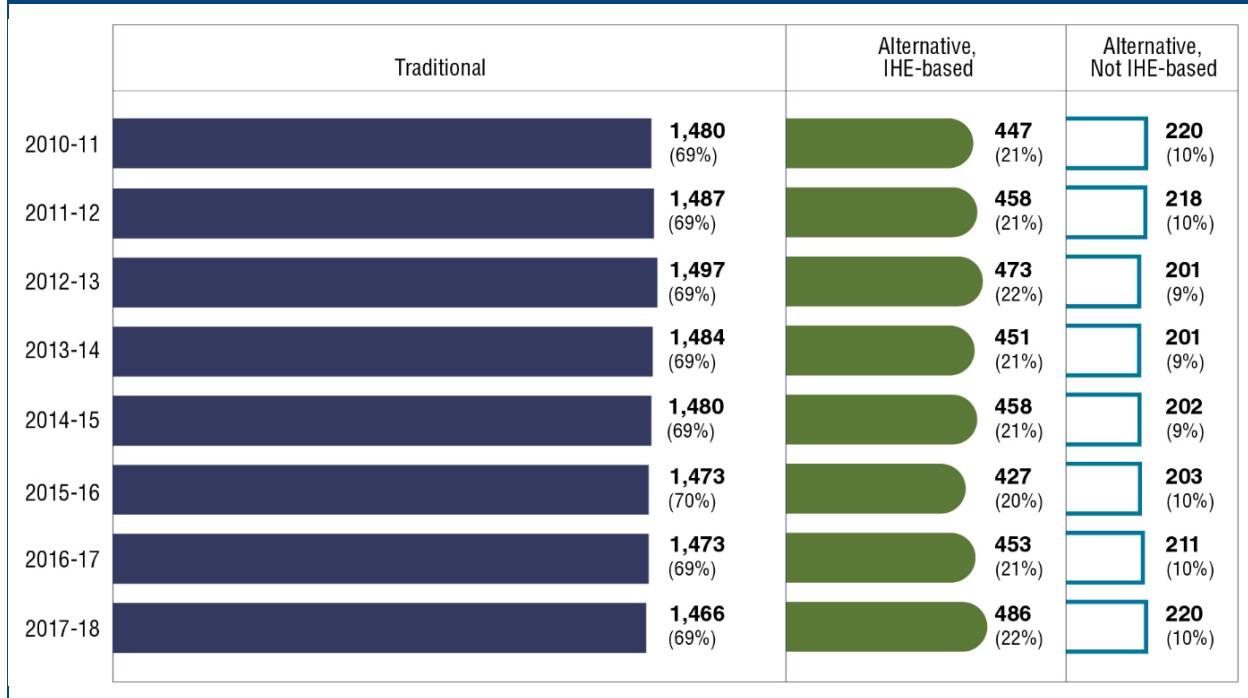
**Alternative teacher preparation providers** often attract candidates who already hold a bachelor's degree in a specific content area or may have prior work experience but are seeking to switch careers.

The proportion of teacher preparation providers by type has remained consistent over the past eight years; traditional teacher preparation providers account for more than two-thirds of all teacher preparation providers (see Figure 1-1).

<sup>5</sup> For *Title II* of the *HEA* reporting, states count IHEs offering both traditional and alternative route teacher preparation programs as two distinct teacher preparation providers.



**Figure 1-1. Number and percentage of teacher preparation providers, by provider type: Academic year (AY) 2010–11 through AY 2017–18**



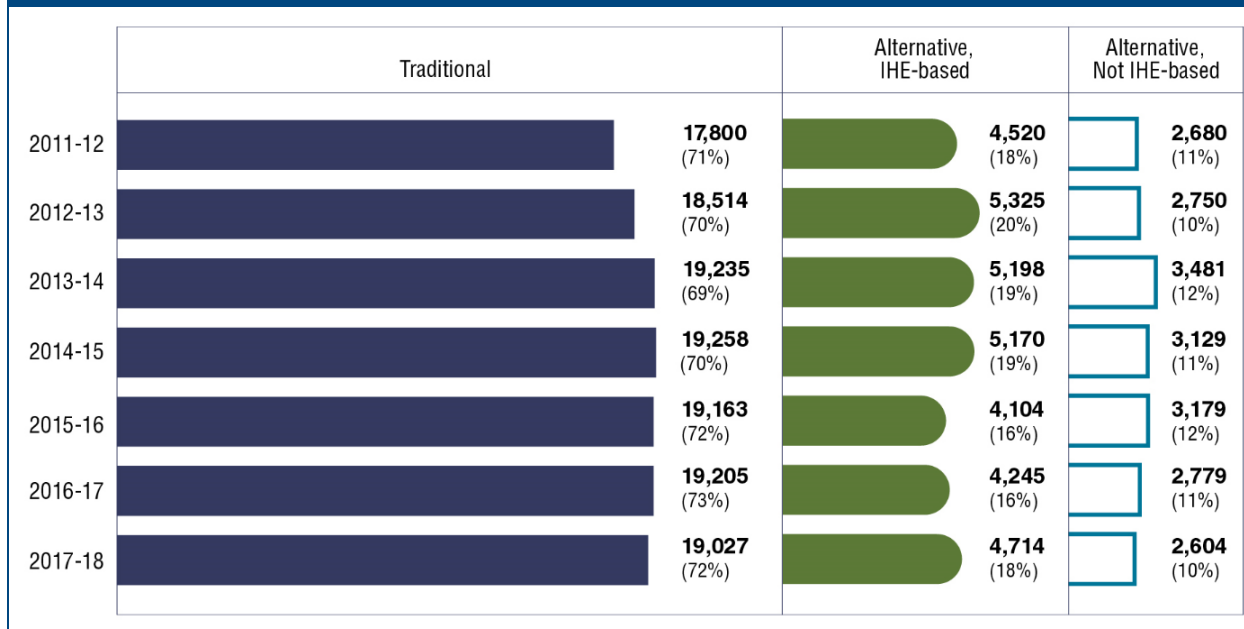
**Note:** Percentages by provider type may not sum to 100 percent each year due to rounding.

**Source:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Higher Education Act Title II* reporting system.

In addition to reporting the number of teacher preparation providers (as shown in Figure 1-1), states also report on the number of unique state-approved teacher preparation *programs* offered by teacher preparation providers. A teacher preparation program is defined as a program offered by a teacher preparation provider that leads to a specific, state teacher credential in a specific field. Many providers offer multiple unique teacher preparation programs.

The number of teacher preparation programs has fluctuated over the years, but the proportion of programs by type has remained fairly stable over the past eight years, with traditional programs accounting for over two-thirds of all teacher preparation programs (see Figure 1-2). Among alternative programs, there were consistently more alternative programs based at IHEs than those not based at IHEs (see Figure 1-2).

**Figure 1-2. Number and percentage of teacher preparation programs, by type: AY 2011–12 through AY 2017–18**



**Note:** Percentages by program type may not sum to 100 percent each year due to rounding.

**Source:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Higher Education Act Title II* reporting system.

## Teacher Quality Partnership (TQP) Program

*Title II* of the *HEA* authorizes the Teacher Quality Partnership (TQP) program, which funds eligible partnerships designed to improve teacher preparation. The TQP program offers competitive grants to partnerships that include IHEs—along with their schools or divisions of education and arts and sciences—partnering with high-need local education agencies and the high-need schools they serve.

The Department awarded a total of 21 TQP grants in fiscal year (FY) 2016 and FY 2018.<sup>6</sup> The Department awarded TQP grants to two types of projects in FY 2016 and FY 2018:

- Projects that create or enhance teacher residency programs primarily focused on preparing elementary education, mathematics, science, and special education teachers
- Projects that reform all pre-baccalaureate or fifth-year licensing programs at the participating IHEs.

<sup>6</sup> A new cohort of TQP grants was awarded in FY 2019; however, as the 2019 TQP grants had not yet been implemented at the time of the data collections included in this report, information on the 2019 grant awards is not provided here.

Of the 21 TQP grants awarded in FY 2016 and FY 2018, eight grants were awarded to partnerships for creating or enhancing teacher residency programs, and 13 were awarded to partnerships for reforming pre-baccalaureate or fifth-year licensing programs purposes (Figure 1-3).



**Source:** U.S. Department of Education, Office of Elementary and Secondary Education. (2020). *Teacher Quality Partnership Program*.

## Evaluating Teacher Preparation Programs

As *Title II* of the *HEA* requires, each state must establish criteria for assessing teacher preparation program performance and identifying low-performing teacher preparation programs and those at risk of being identified as low performing.<sup>7</sup>

Between 2015 and 2019, 20 states and jurisdictions identified teacher preparation programs that were low performing or at risk. Fewer than 1 percent of teacher preparation providers were identified as having low-performing or at-risk programs, including

- 81 Teacher preparation providers were identified as having low-performing programs, and
- 122 Teacher preparation providers were identified as having at-risk programs.

[Appendix B](#) provides a link to the full list of teacher preparation programs identified as low performing and those at risk of being identified as low performing, by year.

<sup>7</sup> Although states are required by federal law to assess whether programs are low performing, a 2015 U.S. Government Accountability Office (GAO) [report](#) revealed that some states failed to do so. Seven states reported to GAO that they did not have a process in place or had not set criteria to identify programs as low performing.

## 2. The Nation's Future Teaching Force

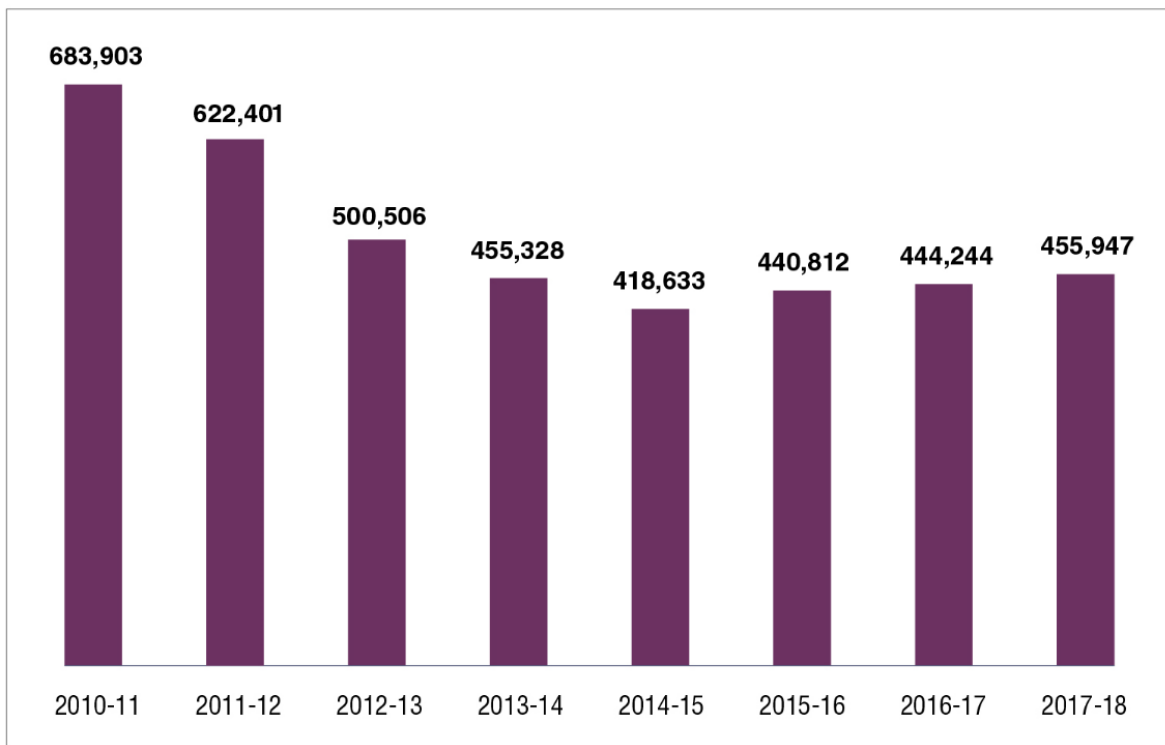
Many individuals enrolling in teacher preparation programs go on to complete the program and then obtain an initial credential for teaching; thus, these individuals provide a glimpse of the nation's future teaching force. As required by *Title II* of the *HEA*, states report the number of teacher candidates enrolled in each state-approved teacher preparation provider. These data include the number of individuals enrolled by program type, gender, and race/ethnicity.

States also report the total number of program completers from each teacher preparation provider, as well as the subject areas in which those program completers are prepared to teach. The subject areas of teacher preparation program completers provide key information for understanding whether teacher preparation programs are preparing the future teaching force to meet critical teacher shortages across the country.

### Enrollment in Teacher Preparation Programs

For purposes of *Title II* of the *HEA* reporting, an enrolled student is defined as a student who has been admitted to a teacher preparation program but who has not yet completed the program in the academic year being reported. An individual who completed the program in the academic year being reported is counted as a program completer and not an enrolled student. States reported a total of 455,947 individuals enrolled in teacher preparation programs in AY 2017–18. Even though this represents an increase in enrollment compared to recent years, enrollment in teacher preparation programs declined for five years from AY 2010–11 until AY 2014–15 (see Figure 2-1).

**Figure 2-1. Overall enrollment in teacher preparation programs: AY 2010–11 through AY 2017–18**

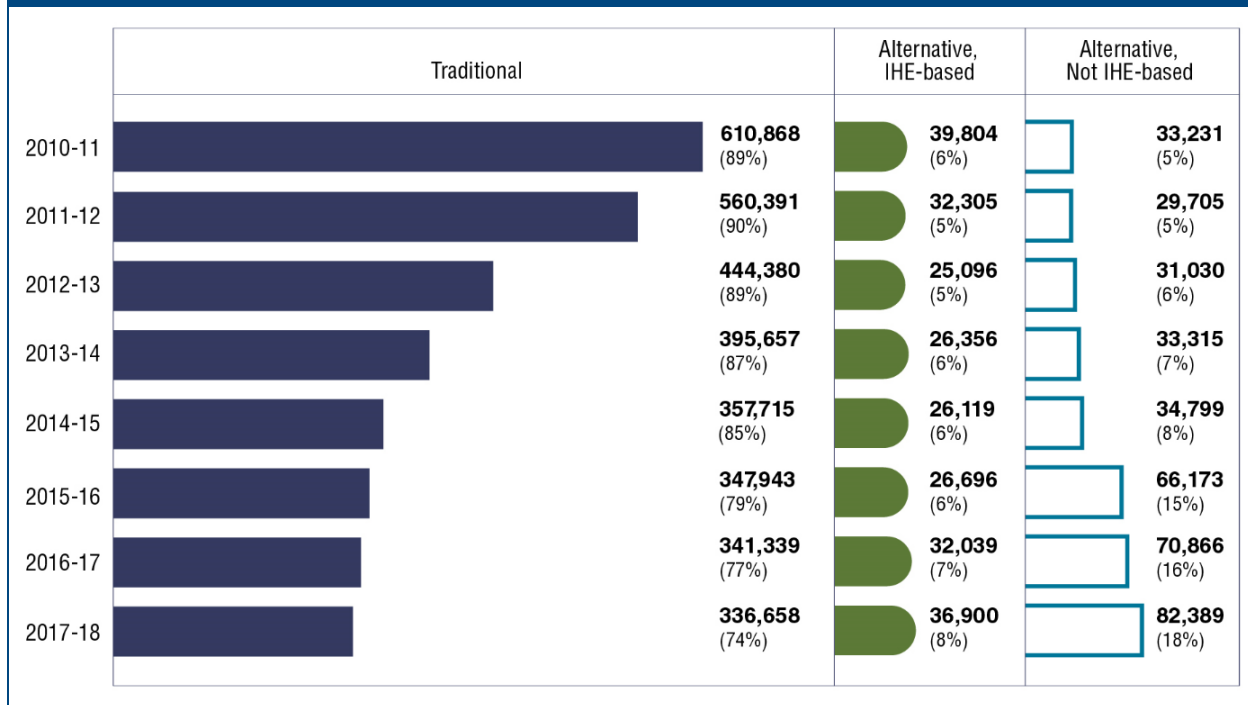


**Source:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Higher Education Act Title II* reporting system.

## Enrollment in Teacher Preparation Programs, by Program Type

Traditional programs consistently enroll a higher number of prospective teachers compared to alternative programs. However, enrollment in traditional programs steadily declined between AY 2010–11 and AY 2017–18, while enrollment in alternative programs has been consistently growing since AY 2014–15 (see Figure 2-2).

**Figure 2-2. Percentage of enrollees in teacher preparation programs, by program type: AY 2010–11 through AY 2017–18**



**Note:** Percentages may not sum to 100 percent in each year due to rounding.

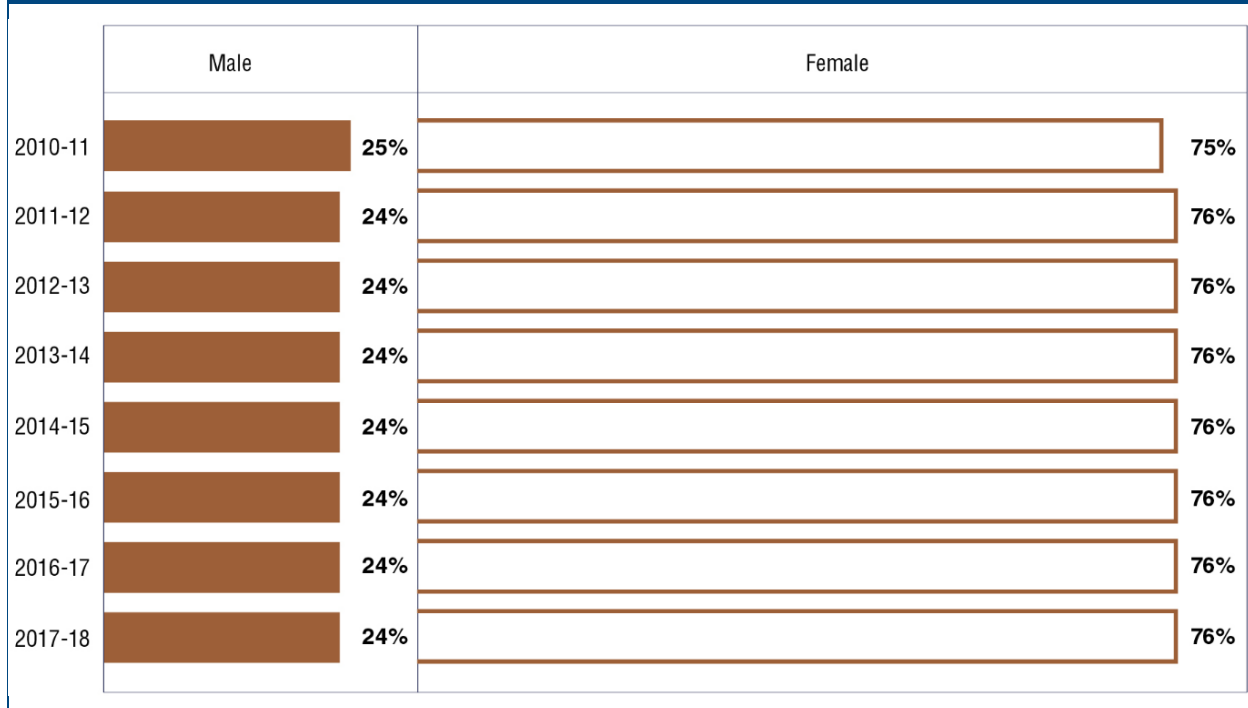
**Source:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Higher Education Act Title II* reporting system.

## Enrollment in Teacher Preparation Programs, by Gender

When comparing the teacher preparation program enrollment data to the national K–12 student population gathered by the Department’s National Center for Education Statistics (NCES), the data shows little demographic overlap of teacher preparation program enrollees and K–12 student populations. In the aggregate, the gender and race/ethnicity of individuals enrolled in teacher preparation programs differ from K–12 students nationwide.

In AY 2017–18, there were 339,027 female enrollees (76 percent) and 109,472 male enrollees (24 percent) (Figure 2-3). This proportion of males and females enrolled in teacher preparation programs has remained consistent (within 1 percentage point) since AY 2010–11.

**Figure 2-3. Percentage of enrollees in teacher preparation programs, by gender: AY 2010–11 through AY 2017–18**



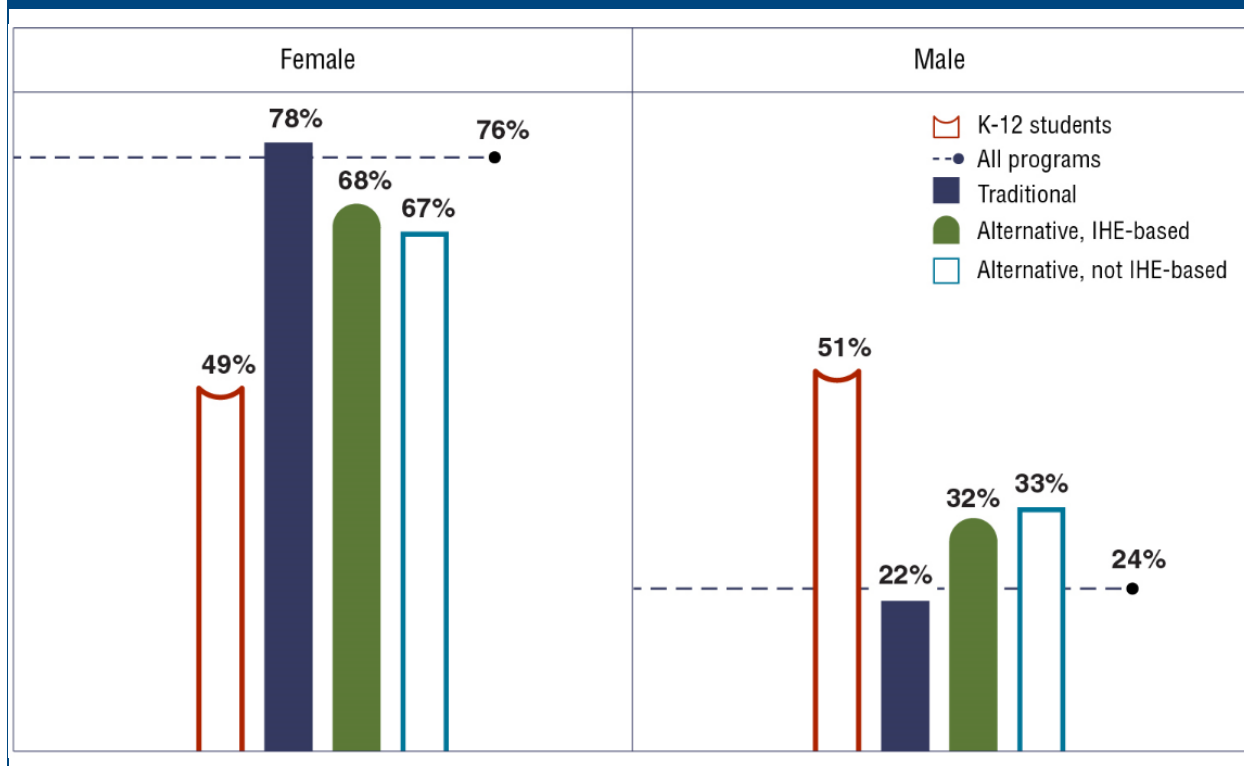
**Source:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Higher Education Act Title II* reporting system.

The proportion of males and females enrolled in teacher preparation programs differs from K–12 students nationwide. In AY 2017–18, nationwide, 49 percent of K–12 students were female, and 51 percent were male.<sup>8</sup> However, more than three-quarters of those enrolled in teacher preparation programs were female (Figure 2-4).

Although there are disproportionately more females enrolled in teacher preparation programs compared to the K–12 student population nationwide, alternative teacher preparation programs have consistently had a larger proportion of male enrollment when compared with traditional teacher preparation programs. In AY 2017–18, about one-third of individuals enrolled in alternative programs were male; in traditional programs, fewer than one-quarter of individuals enrolled were male (Figure 2-4).

<sup>8</sup> U.S. Department of Education, National Center for Education Statistics. (2020). Common Core of Data (CCD).

**Figure 2-4. Percentage of enrollees in teacher preparation programs by program type and gender, and percentage of K–12 students by gender: AY 2017–18**



**Sources:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Higher Education Act Title II* reporting system. U.S. Department of Education, National Center for Education Statistics. (2020). Common Core of Data (CCD).

Although the distribution of prospective teachers by gender differs from K–12 students nationwide, it closely mirrors the distribution of the K–12 current teaching force. The K–12 teaching force has historically been a female-dominated profession; however, the teaching force has become even more female in recent decades. In AY 1980–81, a total of 67 percent of teachers were female; by AY 2011–12, the proportion of females had increased to 76 percent.<sup>9</sup> As displayed in Figure 2-3, however, the gender breakdown of individuals preparing to be teachers has stabilized in the past decade.

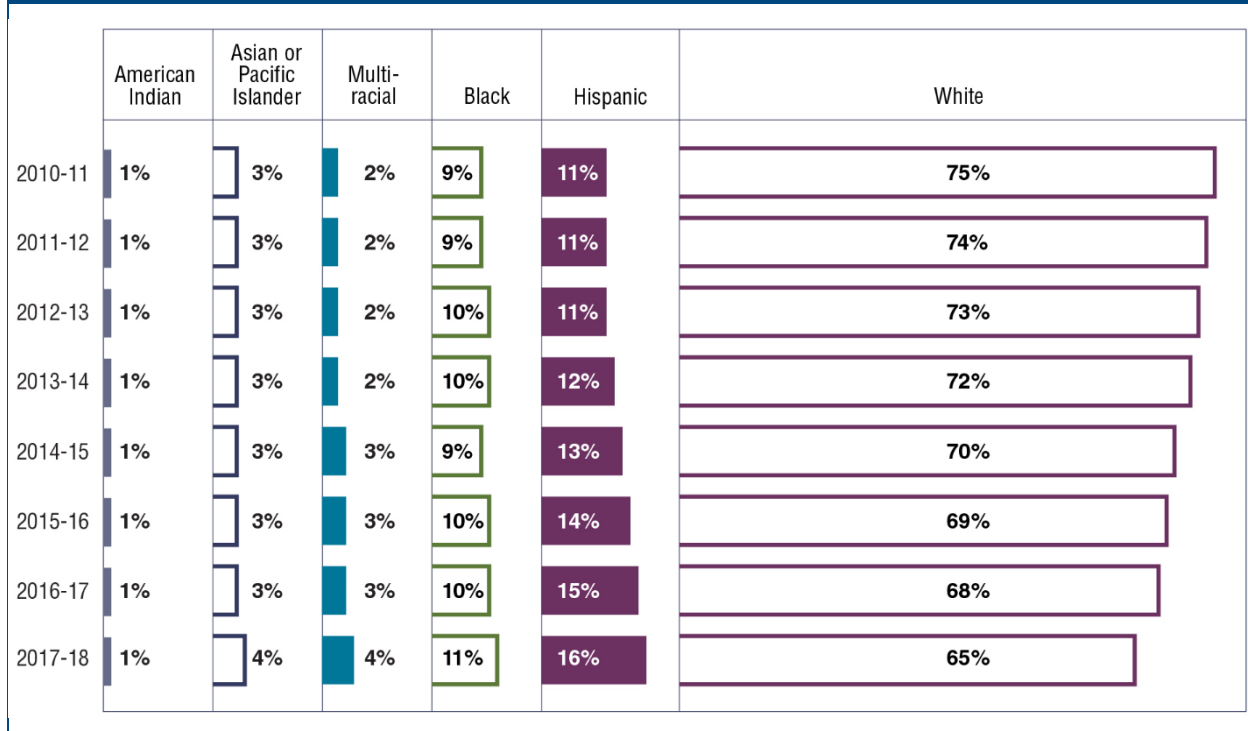
## Enrollment in Teacher Preparation Programs, by Race/Ethnicity

Over the past eight years, there has been a gradual shift in overall enrollment by race/ethnicity. Although there are disproportionately more white individuals and fewer racial and ethnic minorities enrolled in teacher preparation programs, the percentage of white enrollees dropped from 75 percent in AY 2010–11 to 65 percent in AY 2017–18, while the proportion of Hispanic, Asian or Pacific Islander, Black, and Multiracial enrollees increased between AY 2010–11 and AY 2017–18 (see Figure 2-5).

<sup>9</sup> National Center for Education Statistics (NCES). (2011). *Schools and Staffing Survey (SASS) and Teacher Follow-up Survey (TFS)*. Data File. Washington, DC: U.S. Department of Education. Retrieved August 2020, from <http://nces.ed.gov/surveys/SASS/>.



**Figure 2-5. Percentage of enrollees in teacher preparation programs, by race/ethnicity: AY 2010–11 through AY 2017–18**



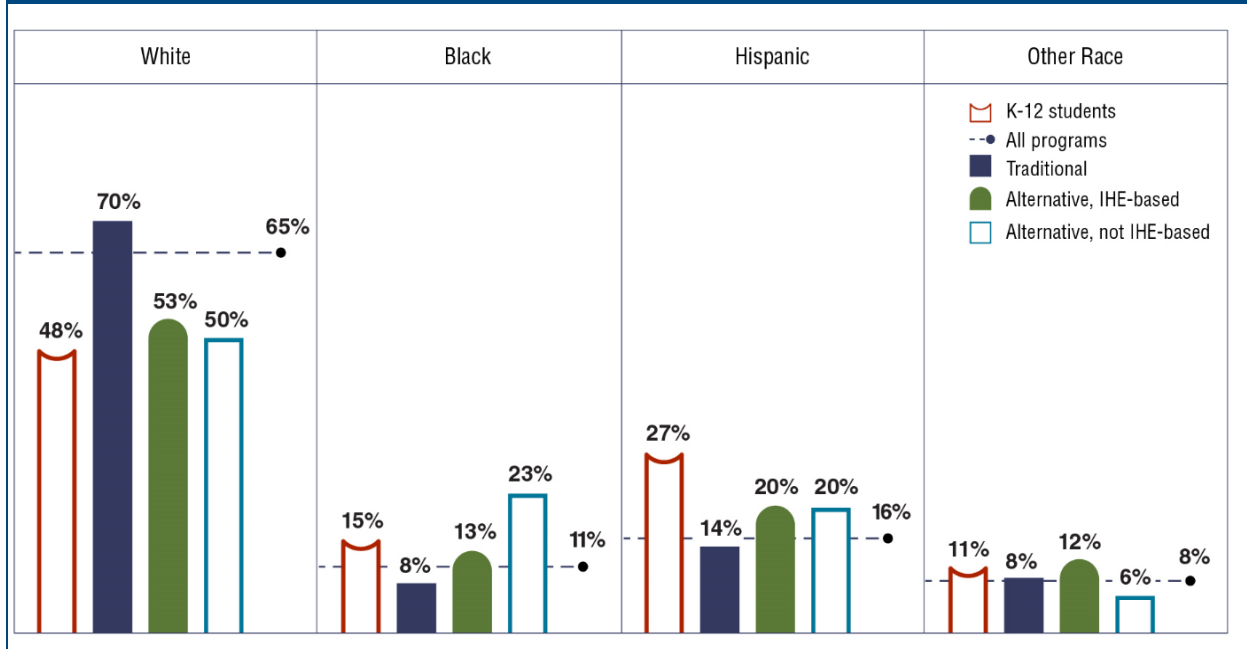
**Note:** Percentages may not sum to 100 percent each year due to rounding. See Appendix A for further methodology descriptions and information about the categories collected.

**Source:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Higher Education Act Title II* reporting system.

Despite this gradual shift, the race/ethnicity of individuals enrolled in teacher preparation programs is still very different from the race/ethnicity of the K–12 student population. In AY 2017–18, individuals enrolled in teacher preparation programs were 65 percent white, while only 48 percent of K–12 students were white (Figure 2-6).

Traditional teacher preparation programs have the largest disparity between the race/ethnicity of individuals enrolled and the race/ethnicity of K–12 students nationwide. In AY 2017–18, individuals enrolled in traditional teacher preparation programs were 70 percent white, compared to 53 percent of individuals enrolled in alternative, IHE-based programs, and 50 percent of individuals enrolled in alternative, not IHE-based programs (Figure 2-6).

**Figure 2-6. Percentage of enrollees in teacher preparation programs by race/ethnicity and program type, and percentage of K–12 students by race/ethnicity: AY 2017–18**

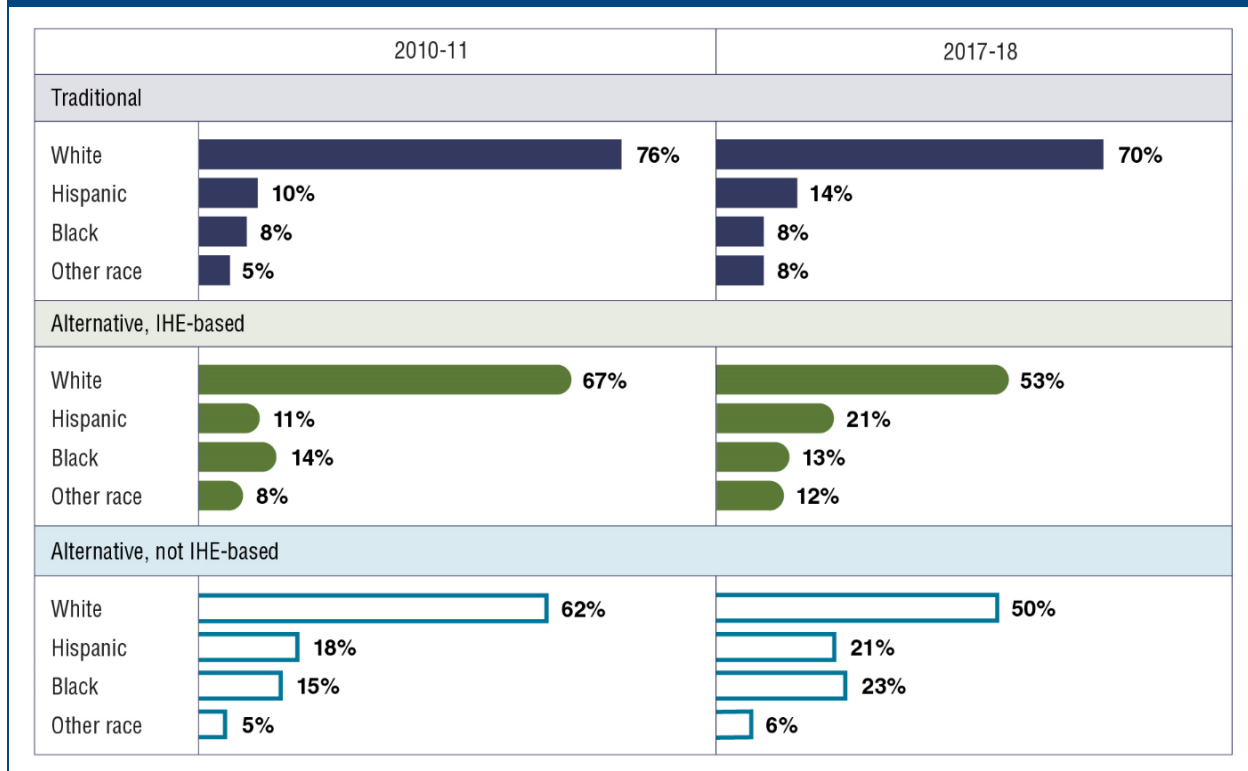


**Sources:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Higher Education Act Title II* reporting system. U.S. Department of Education, National Center for Education Statistics. (2020). Common Core of Data (CCD).

As teacher preparation has grown more racially and ethnically diverse, alternative programs have greater racial and ethnic diversity as compared to traditional programs. Two trends of note include the following:

- The proportion of Black enrollees in alternative, not IHE-based programs has increased from 15 percent in AY 2010–11, to 23 percent in AY 2017–18, while remaining stable within traditional and alternative, IHE-based programs (see Figure 2-7).
- The proportion of Hispanic enrollees has increased over the years across all three program types, but most notably in alternative, IHE-based programs, going from 11 percent in AY 2010–11 to 21 percent in AY 2017–18 (see Figure 2-7).

**Figure 2-7. Percentage of enrollees in teacher preparation programs, by program type and race/ethnicity: AY 2010–11 and AY 2017–18**



**Note:** Percentages may not sum to 100 percent each year due to rounding.

**Source:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Higher Education Act Title II* reporting system.

## Addressing Teacher Shortages

States report teacher preparation program completers disaggregated by the subject areas in which program completers are prepared to teach. This provides a glimpse of how well the future teaching force is prepared to help address the nation's teaching shortages. It is important to note that teachers shortages can also be a retention issue. Therefore, while the data on who is prepared to enter the classroom is important, data on teacher retention and effective approaches to keep teachers in the classroom is as important.

Between AY 2013–14 and AY 2017–18, the most reported subject areas of program completers remained fairly consistent. Elementary education tops the list each year, with about 40 percent of program completers prepared annually to teach elementary education (Figure 2-8).

**Figure 2-8. Number and percentage of program completers by the subject area in which they are prepared to teach: AY 2013–14 through 2017–18**

Subject Area	2013-14	2014-15	2015-16	2016-17	2017-18
Elementary Education	67,590 (37%)	63,470 (37%)	60,236 (38%)	61,391 (38%)	61,473 (40%)
Special Education	29,975 (17%)	28,491 (17%)	26,901 (17%)	26,637 (17%)	26,744 (18%)
Early Childhood Education	25,242 (14%)	23,248 (14%)	23,039 (14%)	22,743 (14%)	22,836 (15%)
English/Language Arts	16,932 (9%)	15,443 (9%)	14,701 (9%)	14,256 (9%)	14,284 (9%)
Mathematics	13,787 (8%)	11,917 (7%)	11,203 (7%)	10,639 (7%)	10,659 (7%)
English as a Second Language	11,316 (6%)	10,081 (6%)	9,896 (6%)	10,173 (6%)	9,172 (6%)
Social Studies	9,927 (5%)	8,461 (5%)	8,083 (5%)	8,112 (5%)	8,646 (6%)
Physical Education and Coaching	7,783 (4%)	6,802 (4%)	6,321 (4%)	5,960 (4%)	6,470 (4%)
Music	6,592 (4%)	6,383 (4%)	6,005 (4%)	5,933 (4%)	5,922 (4%)
Science Teacher Education/ General Science	6,211 (3%)	5,674 (3%)	5,724 (3%)	5,585 (3%)	6,020 (4%)

**Source:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Higher Education Act Title II* reporting system.

States also report on subject areas in which they have teacher shortages, which the Department posts annually in its [Nationwide Teacher Shortage Areas Listing](#). Between AY 2013–14 and AY 2017–18, special education was the most reported subject area of teacher shortages, with mathematics and science trading places over the years for the second and third most reported shortage areas (Figure 2-9).

The number of teacher preparation program completers by the subject areas they are prepared to teach is not directly comparable to the number of states reporting teacher shortages by subject area—and to be sure, there are many geographic and other factors that affect teacher shortages as well. However, reviewing and comparing these two different sets of data is helpful in broadly understanding, nationally, how the field of teacher preparation is responding to critical teacher shortages across the country. Key points revealed by this comparison include:

- Elementary education and early childhood education are consistently two of the top three subject areas in which program completers are prepared to teach. These subject areas are not identified as teacher shortage areas in most states.
- Special education is the most reported subject area with teacher shortages; 53 states and jurisdictions identified shortages of special education teachers in AY 2017–18. Special

education is consistently the subject area with the second highest number of program completers.

- More states are reporting shortages of mathematics teachers. In AY 2013–14, shortages of mathematics teachers were reported in 44 states and jurisdictions; that number grew to 51 states and jurisdictions in AY 2017–18. Mathematics was the fifth most common subject area in which AY 2017–18 program completers were prepared to teach—with 7 percent of program completers prepared to teach mathematics.
- Science was the third most common teacher shortage area in AY 2017–18, with 47 states and jurisdictions reporting shortages. However, only 4 percent of program completers were prepared to teach science in AY 2017–18, placing it ninth on the list of most common subject areas in which program completers were prepared to teach.

**Figure 2-9. Number of states and jurisdictions reporting teacher shortages, by subject area: AY 2013–14 through AY 2017–18**

Subject Area	2013-14	2014-15	2015-16	2016-17	2017-18
Special Education	53	54	53	53	53
Science	46	46	45	49	47
Mathematics	44	48	47	50	51
World Languages	40	40	41	42	44
Language Arts	36	32	37	40	37
Career and Technical Education	30	34	32	35	34
English as a Second Language	30	34	35	35	34
Art and Music Education	19	20	22	27	28
Social Studies	19	20	20	19	23
General Shortages	14	15	16	16	19
Health and Physical Fitness	12	12	13	19	19
Core Subjects	11	12	12	13	12
Early Childhood	7	9	6	7	10

**Source:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Teacher Shortage Areas*. <https://tsa.ed.gov/>.

### 3. Moving from “Future Teachers” to “New Teachers”

As required by *Title II* of the *HEA*, states report on the state standards and assessments required for teaching credentials, as well as the number of individuals earning an initial teaching credential each year. In addition, states annually reflect and report on their efforts to improve the quality of the current and future teaching force.

#### Assessments Required for an Initial Teaching Credential

Each state independently sets the requirements that candidates must meet to receive an initial teaching credential in that state. Most states<sup>10</sup> require that teacher candidates pass an assessment to be eligible for an initial teaching credential.

State assessments required for an initial credential vary across states, and the cut scores that states set, even on the same test, also vary. States—or individual teacher preparation programs—may also require testing at different points during the teacher preparation program. Some teacher preparation programs may require assessments, such as a test of basic skills, as a condition for program entry. Others may require candidates to pass all assessments required for a state teaching credential before they can qualify to complete the program. In both cases, the teacher preparation providers would report 100 percent pass rates on these assessment categories. These shortcomings with the use and calculation of passage rates can make them a misleading indicator that should not be used to make cross-state comparisons or assumptions of program rigor, student success, or other similar measures of quality.

As required by *Title II* of the *HEA*, states report the pass rates on assessments required for an initial teaching credential, by teacher preparation provider.<sup>11</sup> The summary pass rate is a single measure of how test takers from each teacher preparation program fared in passing the assessments they took. Specifically, the summary pass rate is defined as the percentage of individuals who passed all of the tests they took for their area of specialization among those who took at least one test in their specialization areas. The national summary pass rate across all teacher preparation programs has trended downward in recent years, from a 96.0 percent passing rate in AY 2013–14 to a 93.3 percent passing rate in AY 2017–18 (Figure 3-1). The reason for this downward trend is unclear and presents an opportunity for further research.<sup>12</sup>

<sup>10</sup> Although most states require assessments for an initial teaching credential, not all states do. In AY 2017–18, Iowa, Montana, Micronesia, Marshall Islands, and Palau did not require testing for an initial teacher credential.

<sup>11</sup> For pass rate data by individual teacher preparation provider, visit <https://title2.ed.gov>. Click on the Data Tools tab and select the year of reporting under the Pass Rates heading; then, select the state, program type, and record type to view.

<sup>12</sup> Analysis conducted to explore possible explanations revealed no evidence of changes in assessment cut scores driving the downward trend. Analysis also revealed that the downward trend in pass rates occurred in most states, rather than certain states driving the overall downward trend. Analyses of exam difficulty and the number and types of assessments were inconclusive and did not provide a clear explanation for the downward trend in pass rates.

**Figure 3-1.** Percentage of teacher preparation program completers who passed all assessments required for their area of specialization, of those who took at least one assessment: AY 2010–11 through AY 2017–18



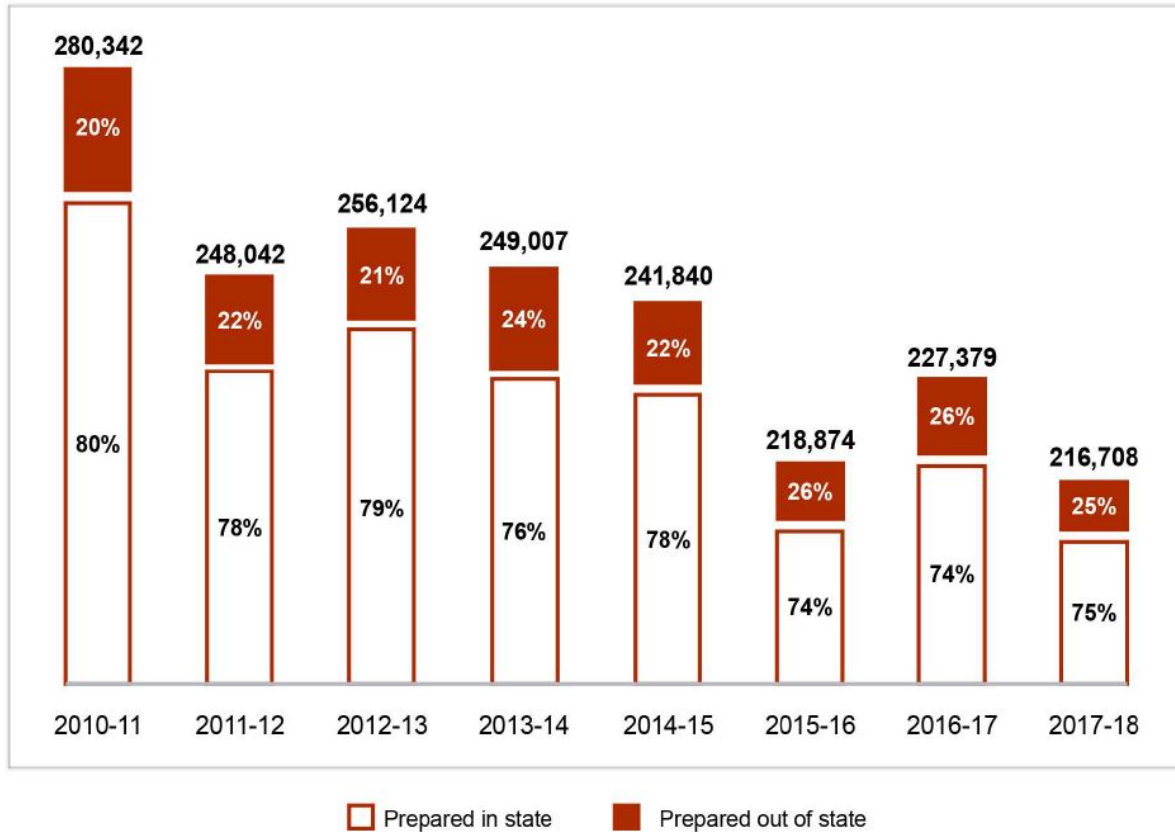
**Source:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Higher Education Act Title II* reporting system.

## Individuals Earning Initial Teaching Credentials

States reported the total number of individuals receiving an initial teaching credential in the state, as well as the subsets of those who completed their teacher preparation in the state and those who completed their teacher preparation in another state. In AY 2017–18, states reported a total of 216,708 individuals receiving an initial teaching credential (Figure 3-2).

Approximately three quarters of all individuals earning an initial teaching credential in AY 2017–18 completed their teacher preparation in the same state in which they earned their teaching license; 25 percent completed their teacher preparation in one state and earned their initial teaching credential in another state (Figure 3-2). This proportion has remained consistent over time.

**Figure 3-2. Total number of individuals receiving an initial teaching credential, and percentage of those completing their teacher preparation in the state or in a different state: AY 2010–11 through AY 2017–18**



**Source:** U.S. Department of Education, Office of Postsecondary Education. (2020). *Higher Education Act Title II* reporting system.

## State Efforts to Improve the Quality of the Teaching Force

States reported annually on their efforts to improve the quality of the current and future teaching force through an open-ended response. The initiatives and efforts that states reported fluctuated from one year to the next with no distinguishable patterns or trends over time. States reported conducting a variety of initiatives between 2015 and 2019, including the following:

- Strengthening teacher preparation program review and/or continuous improvement processes (36 states)
- Increasing professional development opportunities and/or requirements (32 states)
- Improving assessments, including performance assessments, for prospective teachers (32 states)
- Revising teacher certification or licensure processes, structure, or requirements (32 states)



- Strengthening educator recruitment, induction, mentoring, retention, and/or support efforts (32 states)
- Implementing and strengthening educator evaluation processes (31 states)
- Improving data collection and reporting efforts for continuous improvement and accountability (29 states)
- Strengthening, revising, and/or aligning teaching standards (28 states)

Diversifying the educator workforce is an emerging area of focus. In 2015, no states mentioned efforts related to diversifying the educator workforce in their descriptions of efforts to improve the current and future teaching force. In 2019, seven states specifically discussed efforts related to diversifying the educator workforce.

# Appendix A

## Data Notes and Considerations

## Appendix A

### Data Notes and Considerations

This appendix presents information about the *Title II* of the *Higher Education Act of 1965 (HEA)* data collection and data analysis, including the reporting timeline, universe, and response rates; survey instrument; data collection system and data verification; and analysis and data notes.

### Reporting Timeline, Universe, and Response Rates

*Title II* of the *HEA* requires three annual reports on teacher preparation. First, teacher preparation providers report various data to states through the Institution and Program Report Card (IPRC). These data include program entry and exit requirements, supervised clinical experience requirements, enrollment data, program completer data, and the pass rates on state certification and licensure examinations of students completing their programs. IPRC reports to states are due annually on April 30. Second, using reports from teacher preparation providers, as well as other sources, states report annually on key elements of their approved teacher preparation programs and requirements for initial teacher credentialing. States report their information to the U.S. Department of Education (Department) on the SRC annually by Oct. 31. Finally, through the present document, the Secretary of Education reports to Congress on national patterns in these data.

*HEA* makes the submission of the IPRC mandatory for any institution of higher education (IHE) that conducts a traditional teacher preparation program or alternative route to state certification or licensure program and that enrolls students receiving federal assistance under *HEA*.<sup>13</sup> Similarly, *HEA* makes the submission of the SRC mandatory for all 50 states, the District of Columbia, and other U.S. jurisdictions.<sup>14</sup> The data collections do not use sampling but collect data from the entire universe of state-approved teacher preparation programs. The universe for the IPRC data collection is established in November through January, prior to opening the IPRC reporting system in February. The Department works with states to verify the list of state-approved teacher preparation providers and identify the point of contact for each IHE.

IPRC and SRC response rates were 100 percent in 2015, 2016, 2017, 2018, and 2019, and include the full universe of state-approved teacher preparation providers in the United States and U.S. jurisdictions. The Republic of Palau (Palau) does not have an approved teacher certification system established and does not have any IHEs offering state-approved teacher preparation programs. Thus, while Palau does submit an SRC, several sections of the SRC are not applicable to Palau.

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<sup>13</sup> While *HEA* does not specifically require IHEs that do not enroll students receiving federal assistance under *HEA* to report under the Title II requirements, states do not make this distinction for reporting purposes. States collect and report data on all state-approved teacher preparation programs.

<sup>14</sup> The other U.S. jurisdictions that report through *Title II* of the *HEA* are American Samoa, the Commonwealth of the Northern Mariana Islands, the Federated States of Micronesia, Guam, the Republic of Marshall Islands, Palau, the Commonwealth of Puerto Rico, and the U.S. Virgin Islands.

## Instrument

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The SRC survey instrument contains 11 sections and includes much of the institution-level data IHEs reported to states through the IPRC. The SRC survey instrument contains the following items:

- The first two sections consist of the following IHE-level data: teacher preparation programs offered within each institution, program admission and exit requirements, enrollment, supervised clinical experience requirements and participation, program completion data, and program assurances.
- Sections three and four consist of state-level information on the teaching credentials offered in the state and state teacher standards.
- Section five consists of institution-level and state summary pass rates and average scaled scores on assessments required for an initial teaching credential.
- Sections six through eight consist of information on the state's approved alternative routes to a teaching credential, criteria for assessing the performance of the teacher preparation programs in the state, and programs classified as low-performing and at risk of being low-performing in the state.
- Sections nine and 10 consist of descriptions of how teacher preparation programs in the state address shortages of highly qualified teachers and use technology.
- Section 11 consists of a narrative description of state efforts to improve teacher quality.

## Data Collection System and Data Verification

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The Department has used a web-based reporting system to collect SRC data required by *Title II* of the *HEA* beginning with the first *Title II* SRC reports in 2001. Following the 2008 reauthorization of the *HEA*, the Department has provided states with a web-based reporting system through which they can collect the required IPRC data from their respective teacher preparation providers.<sup>15</sup> These reporting systems were developed to conform to the procedures and methodologies the Department established for implementing *Title II* of the *HEA*, and the system has been refined based on input from representatives of teacher preparation programs, states, testing companies, and national organizations. These reporting systems allow for the collection of consistent information across states.

A Title II Support Center is also provided to assist states with their reporting, and affords states numerous opportunities to review, verify, and correct their data during and following the reporting periods. After the IPRC reporting system closes on April 30 each year, the Title II Support Center opens a two-week IPRC state review period and provides each state with a data file containing the full IPRC report data from each institution in the state. The data is in an Excel spreadsheet, allowing states to sort, review, and analyze the data, and follow up with their IHEs as needed for clarifications or corrections. States may compile and submit a list of requested corrections to the institution-level data during this two-week IPRC state review period.

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<sup>15</sup> Forty-eight states, the District of Columbia, and seven U.S. jurisdictions used the IPRC reporting system to collect data from their respective IHE. Florida and Massachusetts opted to use their own data collection systems. Palau does not have an approved teacher certification system established and does not have any IHE offering state-approved teacher preparation programs. Thus, Palau does not use the IPRC reporting system and several sections of the SRC are not applicable to Palau.

The IPRC and SRC reporting systems are linked, so the relevant data elements that states collect from their IHEs through the IPRC in April are automatically loaded into their SRC in the fall. Both the IPRC and SRC reporting systems are designed to ensure that IHEs and states submit complete and accurate data in their reports. The reporting systems contain internal data check functions that assist IHEs and states in identifying missing or incomplete data and increasing reporting accuracy. In both the IPRC and SRC reporting systems, as respondents enter data, the data collection system automatically compares the responses with data from the prior year's submission to help users verify their data. In addition, the systems do not allow users to submit their reports until all required data elements are completed. In the SRC, as states enter data, the data collection system automatically calculates state totals and percentages and compares the responses with state data from the prior year's submission to allow states to easily compare and verify their data.

After the SRC reporting system closes on Oct. 31 each year, the Title II Support Center opens a 2-week state review period. During this time, states have read-only access to their state reports, can review their data for any errors, and may submit requests via email for any necessary edits or corrections. The final data verification step is the state data check. During the state data check, the Title II Support Center provides states with state-level data tables and analyses—such as descriptive analyses of enrollment and program completer data—as well as preliminary national analyses. This step differs from prior verification steps because it allows states to see how their state data compare to the national trends and provides new data analyses. States have a two-week period during which they can review and verify the accuracy of their data.

## Analysis and Data Notes

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The analyses presented in this report were conducted on the entire universe, as opposed to a subset or sample of the data. As such, this report does not refer to sampling methods or significance testing/statistical significance.

This report includes key highlights and emerging stories from SRC data states reported in 2015, 2016, 2017, 2018, and 2019. Unless otherwise noted, all data in this report are from *Title II* of the *HEA* data collection.

## Enrollment

For purposes of *Title II* of the *HEA* reporting, an enrolled student is defined as a student who has been admitted to a teacher preparation program but who has not yet completed the program in the academic year being reported. An individual who completed the program in the academic year being reported is counted as a program completer and not an enrolled student. Thus, when states reported enrollment numbers in the SRC, the number of enrolled students does not include those who also completed the program during that academic year.

## Enrollment by Race/Ethnicity

For purposes of *Title II* of the *HEA* reporting, states report race/ethnicity data on the number of teacher preparation program enrollees who self-reported in each of seven mutually exclusive categories: Hispanic/Latino of any race, American Indian or Alaska Native, Asian, Black or African American, Native Hawaiian or Other Pacific Islander, white, and two or more races. Some individuals choose not to self-report race/ethnicity information, so they are not included in these percentages. Percentages for each racial/ethnic category were calculated by the total number of self-reported enrollees in each category divided by the sum of enrollees across all racial/ethnic categories.

The U.S. Department of Education aggregates K–12 student race/ethnicity data into seven mutually exclusive categories. Students who are classified as Hispanic/Latino of any race are not classified as any other race, and only Non-Hispanic/Latino students are categorized as American Indian or Alaska Native, Asian, Black or African American, Native Hawaiian or Other Pacific Islander, white, or two or more races. Non-Hispanic students who identify with more than one racial/ethnic group will only be categorized as Two or more races and not in each separate race category. For more information on the data collected and why, see the NCES document, [“Forum Guide to Collecting and Using Disaggregated Data on Racial/Ethnic Subgroups.”](#)

## Teacher Preparation Providers

For *Title II* of the *HEA* reporting, a teacher preparation provider is an IHE or other organization offering at least one state-approved teacher preparation program. A teacher preparation provider may be a traditional provider; an alternative, IHE-based provider; or an alternative, not IHE-based provider. For *Title II* of the *HEA* reporting, states count IHE offering both traditional and alternative-route teacher preparation programs as two distinct teacher preparation providers.

## **Appendix B**

Teacher Preparation Programs Designated as  
At-Risk or Low Performing: 2015 Through 2019

## Appendix B

### Teacher Preparation Programs Designated as At-Risk or Low Performing: 2015 Through 2019

Appendix B provides the list of programs identified as at risk or low performing each year between 2015 and 2019, as well as the date each program received the designation. Appendix B is provided as an accompanying Excel file, [available for download here](#).