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Mentoring and Supporting New Teachers

Summary

With the need for teachers in this decade well documented, state policymakers have directed much attention to programs aimed at recruiting new teachers. Less attention has been paid to teacher attrition rates, the reasons teachers leave, and the policy strategies that could help retain them in the profession. Increasingly, researchers are documenting high turnover rates among new teachers. High turnover rates exacerbate the critical shortages of teachers in some regions and subject areas. States, school districts, and schools can ill-afford to lose good teachers at a time when pressure to improve student achievement is increasing. Some states are using induction programs to help new teachers from both traditional and alternative preparation programs, make a successful transition to the classroom and stay in the profession.

New teacher induction programs—such as those in California, Connecticut, other states, and school districts—offer support and guidance to new teachers through mentoring, workshops, additional training, and on-the-job assessments. Several of these programs have proven effective in reducing attrition, improving teaching ability, and increasing job satisfaction among new teachers. Further, veteran teachers are reporting that they also benefit from the interaction with other teachers. Research studies and program evaluations suggest several key elements of an effective teacher induction program. They also offer lessons and guidance for governors, legislators, and other state policymakers interested in creating or improving induction programs in their state.

Why Do New Teachers Need Mentoring and Support?

About one-quarter of new teachers leave the profession within the first three years of teaching. Nationwide, about 30 percent leave within their first five years, and in urban areas about half leave the profession within five years.¹ On average, southern states lose nearly half of their new teachers within five years.² In Tennessee, for example, annual teacher turnover averages about 6 percent. However, among teachers with no previous experience, 36 percent leave within the first four years of teaching and 42 percent leave within the first five years.³ Although many young teachers leave to raise children or for other personal reasons, many others leave for reasons such as a lack of administrative support, poor working conditions, inadequate preparation, low pay, little respect, and limited advancement opportunities.

According to a national study tracking 1992–93 college graduates' teaching careers through 1997, 25 percent of new teachers quit within their first five years to pursue other careers. Another 24 percent said they were leaving because they were not interested in teaching or were dissatisfied with teaching and 10 percent left because they were dissatisfied with teacher salaries and benefits.

Just 6 percent left because of pregnancy or child rearing and another 2 percent left because of a family or personal move.⁴

Other analyses of national data suggest that inadequate administrative support, low salaries, student discipline problems, and limited faculty input into school decision-making contribute to higher teacher turnover rates.⁵ Conversely, teachers with more support from administrators, higher salaries, fewer student discipline problems, and higher levels of autonomy and influence over decision-making are more likely to stay regardless of personal characteristics or school demographics, such as age, gender, subject taught, school poverty, or school location.⁶

Studies from Texas and North Carolina confirm that a lack of administrative support contributes to new teachers' decisions to leave the profession. Nearly 20 percent of new teachers in Texas reported that they left teaching after one year because of a lack of administrative support.⁷ Almost two-thirds of teachers who quit in North Carolina indicated that a lack of administrative support was a factor in their leaving.⁸

Inadequate preparation also affects young teachers' decisions to leave the profession. A survey of former teachers in Florida found that 43 percent of first-year teachers felt that they were "minimally prepared" or "not prepared" to manage their classrooms.⁹ A national survey of public school teachers with less than five years' experience found that 62 percent of them felt that their preparation programs did a "fair" or "poor" job of preparing them to deal with the pressures of teaching.¹⁰

As shortages of teachers—particularly in certain subjects and geographic regions—are becoming increasingly problematic and the importance of quality teaching for student achievement is increasingly demonstrated, schools cannot afford the continued loss of good teachers. In addition, standards-based reforms and high-stakes accountability systems at the federal and state levels demand that all schools and classrooms be staffed with a stable supply of highly qualified teachers. Research by the Project on the Next Generation of Teachers at Harvard University "suggests that the key to addressing shortages lies not in attractive recruitment policies but in support and training for new teachers at the school site."¹¹

Data from new teacher induction programs and pilot studies indicate that new teacher induction programs can improve new teacher retention rates and teaching ability. Improved teacher preparation will also be necessary, but induction programs can be an integral part of a system of educator preparation and development if there is effective coordination between schools of education and school districts. All states, but especially those with critical teacher shortages and rising student enrollments, may find that a strong teacher induction program is a valuable strategy to maintain a stable supply of better-prepared and more highly qualified teachers.

What Is New Teacher Induction?

Teacher induction programs use different activities "to orient, support, assist, train, and assess teachers within their first three years of employment in public schools."¹² These activities include orientation sessions, mentoring programs, staff development courses and workshops, regular sessions with other new teachers, and formative and summative assessments. The activities can last from one to three years. Many states and districts offer a combination of activities during at least a teacher's first year.

According to Recruiting New Teachers, Inc. (RNT), a Massachusetts-based nonprofit organization focusing on the shortage of qualified teachers, "[t]eacher induction is the process of socialization to the teaching profession, adjustment to the procedures and mores of a school site and school system, and development of effective instructional and classroom management skills."¹³ In 1996 the National

Commission on Teaching and America's Future recommended that the first years of teaching be structured like a medical school residency, with beginning teachers regularly communicating with veteran teachers on instructional practices and classroom management as well as receiving constructive feedback and formal evaluations of their performance.¹⁴

Induction is a distinct phase of a teacher's preparation and professional development. It extends beyond the first year of employment and occurs in three stages: survival/discovery, experimentation/consolidation, and mastery/stabilization.¹⁵ Teacher induction programs generally focus on the survival/discovery stage, seeking to provide initial support to new teachers by meeting their immediate needs and guiding their transition into the classroom. Ideally, a formal, structured induction program facilitates this process. It provides the professional and instructional support that new teachers need, including developing collaborative relationships with colleagues; handling the demands and expectations of students, parents, and the school community; and providing assistance with teaching practices, instructional strategies, and course materials.¹⁶

Absent a formal program teacher induction happens haphazardly, so the experiences of new teachers vary by placement and school environment. Until recently, most teachers experienced ad hoc induction, and generally only a lucky few received useful support from a veteran teacher or school administrator. Increasingly, schools, districts, and states are realizing that new teachers need more formal induction, and many states have crafted policies to provide induction programs.

What Are the Elements of Effective Induction Programs and Policies?

Many states have initiated induction programs for new teachers, though only a few of them are fully funding those programs for all new teachers in the state. Many also leave decisions about program structure and content to school districts and schools. Often this approach is more palatable to districts, especially when the state cannot or does not provide full funding. However, giving districts such discretion has led to statewide variation in the substance and quality of induction programs.

A recent study by the North Central Regional Educational Laboratory (NCREL) found that in its seven-state region—Illinois, Indiana, Iowa, Michigan, Minnesota, Ohio, and Wisconsin—"state-level policies have an important impact on adoption rates" among districts. In the NCREL region, more districts have implemented new teacher support programs in states that have "more comprehensive state-level policies either requiring or strongly encouraging support programs." NCREL found that state-level policies also affect program design. Most districts in the NCREL region include one-on-one mentoring, and many programs are mandatory for all new teachers whether or not participation is required by state policy. Other attributes, such as training for mentor teachers or additional professional development for new teachers, are more consistently provided by districts in states that require them to do so.¹⁷

In other regions, too, the structure and content of new teacher induction programs vary considerably by state and district. Yet there are some early indications about what constitutes an effective induction program for new teachers. As governors and other state policymakers craft policies on teacher induction programs, these elements of success can guide their decision-making.

According to RNT, four elements characterize successful induction programs: orientation to the culture of teaching; training in curriculum and management skills; mentoring; and assessments of new teachers.¹⁸ A review of the research reveals several characteristics that are shared by effective teacher induction programs.¹⁹ These programs:

- promote universal participation for new teachers from both traditional and alternative preparation programs;

- use experienced teachers as mentors;
- include mentor preparation;
- facilitate release time or reduced teaching loads for beginning teachers and mentors;
- have earmarked funding;
- are based on clear standards;
- are structured and defined by input from beginning and veteran teachers;
- assess beginning teachers' performance;
- have a subject-specific focus;
- extend throughout the school year and beyond the first year of teaching; and
- provide teachers with working conditions—including placement in subjects that they are qualified to teach, placement with students who are not the most challenging, opportunities to participate in targeted professional development, and opportunities to observe and be observed by veteran teachers—that enable them to focus on strengthening their teaching skills.

Mentoring and release time are often cited as two of the most critical components of an induction program. Data from the National Center for Education Statistics strongly suggest that the benefit of mentoring is linked to the amount of time that a mentor and beginning teacher work together. Only 36 percent of beginning teachers who work with their mentor “a few times a year” report substantial improvements in their professional skills; in contrast, 88 percent of those who work with mentors at least once a week believe the relationship has a major benefit.²⁰

Including an assessment component in teacher induction programs is somewhat controversial. Some educators argue that the functions of providing support to new teachers and reviewing their performance are incompatible. Others argue that effective induction programs provide inductees with formative and summative performance assessments that are tied to state professional standards and academic K–12 standards.²¹ Many model induction programs—including those in California, Connecticut, and Toledo, Ohio—use teacher assessments. In California assessment is used primarily to structure professional development plans for new teachers. The Connecticut teacher induction program uses portfolio assessments during new teachers' second year to determine whether teachers receive the state's second level of certification. In the Toledo model, which several urban school districts have adopted, veteran teachers serve as mentors and make recommendations about contract renewals for new teachers. Without a mechanism to measure new teacher performance, proponents argue that induction programs could retain teachers who may not be well qualified.

Do Teacher Induction Programs Have an Impact?

A 1996 survey by RNT found that induction programs are effective in helping to reduce new teachers' attrition rates. RNT also asserts that “induction programs can make a tremendous difference not only in the kind of teacher produced but also in the learning experiences their students have.”²² Other national, state, and local studies have produced similar findings.

On Teacher Retention

Early studies show that induction programs significantly increase the likelihood that teachers will stay in the profession. According to a National Center for Education Statistics' analysis, among new teachers who participated in an induction program, 15 percent had left the profession within four years. Yet, among new teachers who had not participated in an induction program, 26 percent had left the profession.²³

California. From 1988 through 1992, the California Department of Education and the California Commission on Teacher Credentialing sponsored the California New Teacher Project, a pilot study to examine alternative strategies for supporting and assessing new teachers. The project achieved significantly better retention rates for participant teachers than for non-participant teachers. After one year, at least 91 percent of participating new teachers remained in the profession; 96 percent of them continued teaching in the same district. After two years, at least 87 percent of participating teachers remained in teaching; 93 percent of them stayed in the same district. Further, the retention rate for participating minority teachers was significantly higher than for minority teachers in California overall.²⁴

In 1992 state legislation established the Beginning Teacher Support and Assessment Program (BTSA) to provide new teachers with supervised experiences in schools. The state has gradually extended the program to all new teachers. Recent data show that the program successfully retains the vast majority of participant teachers. In 1999–2000, 129 of 133 programs reported collective retention rates of 96 percent for first-year teachers and 94 percent for second-year teachers.²⁵ Over five years, the program resulted in an attrition rate of 9 percent for beginning teachers. In contrast, the attrition rate among new teachers in California who did not participate in BTSA or a similar induction program was 37 percent.²⁶

Data from Other State and Local Programs. Few state or local teacher induction programs have the long-term impact data that California has on its teacher induction programs, but other programs have collected data showing positive impacts on new teacher retention rates.

- Mentoring is a major component of the Armstrong Atlantic State University branch of the Pathways to Teaching Careers Program in Savannah, Georgia. As of 1999, the retention rate for program participants was 100 percent over five years.²⁷
- A three-year implementation of the Louisiana Framework for Inducting, Retaining, and Supporting Teachers resulted in an 88-percent retention rate of certified new teachers in Thibodaux Parish, Louisiana.²⁸
- The Montana Beginning Teacher Support Program retained 97 percent of participants in the teaching profession after one year, while only 71.5 percent of non-participants remained active.²⁹
- The teacher induction program at Texas A&M University–Corpus Christi has retained 100 percent of its participants for at least five years. In contrast, the statewide retention rate for beginning teachers is approximately 50 percent.³⁰ Texas' induction program includes participation by the preparing institution, support and induction assistance to first-year teachers, a focus on classroom problem-solving, and regular visits by veteran teachers to participants' classrooms.
- Three-quarters of the participants in Wisconsin's Teaching Incentives Pilot Program indicated that they planned to be teaching in five years, compared with only 25 percent of non-participants. Every program participant completed their first year of teaching, while only 83 percent of non-participants did so.³¹

- The Santa Cruz New Teacher Project, a 16-district consortium led by the University of California–Santa Cruz, has seen only 5 percent of participants leave the teaching profession after 12 years. Originally one of the new teacher projects started by the California Department of Education in the late 1980s, the consortium supports beginning teachers through mentoring programs, cohort meetings, and one-on-one counseling.³²
- Three cities that adopted Toledo, Ohio’s teacher induction model have also achieved positive results. The Toledo model funds veteran teachers to work intensively with beginning ones. Many of the beginning teachers have completed a one-year internship prior to being hired. Using this model, Columbus, Ohio, has retained 98 percent of its first-year teachers. A short time ago, Seattle lost half of its new teachers every five years. After implementing an induction program based on the Toledo model, the retention rate rose to more than 90 percent. Finally, Rochester, New York’s teacher turnover rate decreased by 70 percent when the city started an induction program modeled after the one in Toledo.³³

Superintendents in the Midwest have also reported that they believe their new teacher support programs are reducing new teacher attrition. A recent study by NCREL found that most districts in the seven-state region are providing some sort of support to new teachers. Among superintendents in the region who have implemented and rated a new teacher support program, 52 percent reported that the program has been “very successful” in reducing attrition. Only 12 percent rated their program as “not very successful” in reducing attrition.³⁴

Induction programs can also be useful for recruiting new teachers. Forty-seven percent of the superintendents reported that their new teacher support program is “very effective” for recruiting new teachers.³⁵ The survey did not ask the superintendents about their program’s effectiveness in attaining other goals, such as improving teaching ability.

On Teaching and Teacher Quality

Early studies suggest that not only do good induction programs improve teacher retention, but they also influence teaching practices, increase teacher satisfaction, and promote strong professional development and collegial relationships. Research synthesized by the American Educational Research Association shows that beginning teachers who are paired with a mentor are more likely to move beyond concerns about classroom management and concentrate on student learning.³⁶

A California study of teacher induction found that first-year mentoring combined with a university-based teacher education program resulted in more effective teachers than mentoring or teacher education alone.³⁷ In addition, participating teachers indicated other benefits, such as greater career satisfaction and better cooperation and professional relationships with colleagues. Experienced teachers indicated that they, too, received benefits from participating as mentors.³⁸ In Connecticut state reports and evaluations have found that participating new and veteran teachers believe the process promotes greater self-reflection on their work and improves their teaching, interactions with colleagues, professional knowledge, and ultimately student achievement.³⁹

On Student Achievement

For several reasons, little quantitative research has explored the relationship between teacher induction programs and student achievement. However, numerous studies have found a strong relationship between quality teaching and student achievement. Research suggests that teacher quality is the largest single variable in student learning – explaining as much as 40 percent of the difference between students.⁴⁰ Insofar as teacher induction helps retain quality teachers and provides strong professional development for new and veteran teachers, future studies may find a link between

induction programs and student achievement. Currently, few states have the teacher assessments or the ability to link teacher assessments to student achievement data that would be needed to measure teacher induction program impacts on student learning. Further, because teaching ability and student learning are shaped by different factors, it would be difficult for any study to attribute increases in student learning solely to participation in a teacher induction program. However, states may decide that improvements in teacher retention, teaching skills, teacher collaboration, and job satisfaction are significant ends that make investments in strong new teacher induction programs worthwhile.

How Do the Costs of Induction and Attrition Compare?

Another consideration for policymakers is the relative cost of supporting teacher induction programs. A few models suggest that it is more cost-effective to provide teacher induction programs that reduce teacher attrition than to continue to fund recruitment and hiring initiatives to replace large numbers of departing teachers.

A simple formula for estimating the cost of replacing an individual teacher is 25 percent to 35 percent of annual salary plus benefit costs. More sophisticated cost models of teacher turnover incorporate such factors as termination costs, vacancy costs, hiring costs, learning curve costs, and training costs. Using various cost models, last year the Texas Center for Educational Research calculated the state's annual loss attributable to teacher turnover at between \$329 million and \$2.1 billion, based on Texas' average teacher turnover rate of 15.5 percent.⁴¹

Funding teacher induction programs at a level of up to \$5,000 per teacher (in 1990 dollars) is more cost-effective than paying for programs to replace teachers who have left. A 1992 report by the California Commission on Teacher Credentialing found that the California New Teacher Project's investment in new teachers saved money because the project-produced reduction in teacher turnover rates lowered recruitment and hiring costs. After only one year, participating school districts saved 31 cents for every state dollar spent; after two years, the savings amounted to 68 cents for every state dollar spent. The report concluded that the public would recover the initial state investment within a few years and school districts would realize additional savings in future years as the participating teachers continue to teach.⁴²

What Are Some State Models?

More than 30 states have initiated induction programs for new teachers. Fifteen states—Arkansas, California, Connecticut, Idaho, Indiana, Kentucky, Louisiana, Massachusetts, New Jersey, New Mexico, North Carolina, Oklahoma, South Carolina, Virginia, and West Virginia—currently require and at least partially fund induction programs for all new teachers.⁴³

California and Connecticut offer two models for how states are providing induction for new teachers. Both states have experienced and documented some success in improving teacher satisfaction and retention. Ongoing data collection and research studies will provide further information on program effectiveness. In the meantime, these models can provide other states with insights and lessons on how to develop and structure a statewide induction program for new teachers.

California's Beginning Teacher Support and Assessment Program

In 1992 state legislation established the Beginning Teacher Support and Assessment Program to provide new teachers with supervised experiences in schools and to address teacher attrition rates of up to 50 percent in the first years of teaching. BTSA encourages local school districts, county offices

of education, and colleges and universities to work collaboratively to provide new teacher induction programs.⁴⁴ The program has ten defined goals:

- provide an effective transition to teaching;
- improve educational performance of pupils through improved training, information, and assistance for new teachers;
- enable more effective teaching of culturally, linguistically, and academically diverse students;
- ensure professional success and teacher retention;
- provide individualized support to new teachers;
- improve the consistency and rigor of teacher assessments;
- establish an effective and coherent system of performance assessments for teachers that is based on the California Standards for the Teaching Profession, which encompass the necessary skills, abilities, and knowledge of teaching;
- offer every new teacher an individual induction plan based on ongoing assessment;
- ensure continuous program improvement; and
- assure the public that veteran teachers are competent instructors.⁴⁵

In recent years, actions by Governor Gray Davis and the state legislature have helped expand BTSA programs to reach nearly all new teachers in the state. Various configurations of districts and institutions of higher education now provide 145 local BTSA programs to about 29,000 new teachers. Although the programs vary in design and methods, they are guided by state standards that spell out the knowledge and skills that novice teachers should gain. BTSA programs offer support during the first and second years of teaching through mentoring and coaching, summer orientation programs, training workshops, and assessment of professional growth. In addition, the two-year programs provide new teachers with opportunities for formative assessment, individual support, advanced study, and frequent reflection on the practice of teaching. New teachers are also able to visit the classrooms of veteran teachers in other schools. The supporting state agencies provide training for both new and mentor teachers. State and local funds are used to pay for substitutes, freeing mentor teachers to share model lessons by teaching occasional classes for new teachers.

For fiscal 2001, the governor and legislature authorized and appropriated \$104.6 million for BTSA programs. Districts supplement available state funds for a total of about \$5,000 to support each new teacher. Since 1999, districts can also use state funds from the teacher Peer Assistance and Review program to support BTSA programs.⁴⁶

Connecticut's Beginning Educator Support and Training Program

Connecticut's Beginning Educator Support and Training (BEST) program has evolved since it was first enacted in the 1980s. BEST connects teacher standards to national standards and the state's curriculum and student performance standards; provides intensive mentorship experiences to new teachers; and requires every new teacher to complete a portfolio assessment in their first two years of teaching.⁴⁷ New teachers must successfully complete the program within three years of beginning their first teaching jobs to move beyond an initial teaching certificate. School districts must provide each new teacher with a state-trained mentor or team of mentors for at least the first year of the program. Mentors work with new teachers to develop fundamental teaching abilities, such as classroom management, instruction, and student assessment skills, and they assess new teachers' attainment of the state's essential teacher competencies using a state-developed instrument.

Beginning teachers are also encouraged to participate in content-focused support seminars and clinics addressing the essential competencies. The support seminars provide opportunities to experience models of teaching and learning, share ideas, reflect on practice, and explore the meaning of the state's professional teaching standards in a specific content area.

During the second year, beginning teachers focus their attention on developing teaching strategies. Participants prepare portfolios that document planning, teaching, and student learning during a two-week unit of instruction. The portfolios include videotapes of classroom practices, samples of student work, and teacher commentaries and self-assessments. Trained assessors evaluate and score the submissions. Beginning teachers who achieve passing scores earn the second level of certification. Those who do not pass may be eligible for a third year in the program and another opportunity to submit a portfolio. If a candidate is not successful on the first or second attempt, he or she is denied certification to teach in the state's public schools.

The state provides mentor teachers with three days of workshop training in which the mentors learn what the program requires of new teachers, including the expectations for the portfolio and the state's standards for teacher knowledge and skills in each subject area and grade level. The state currently provides about \$200 per new teacher, which can be used for mentor stipends. Most of the program's budget is used for mentor training, workshops to introduce new teachers to the BEST program, and portfolio assessment. By 2004 the state expects that 80 percent of its teachers will have participated in BEST as beginning teachers or as veteran assessors, mentors, or portfolio scorers.⁴⁸

What Can State Policymakers Do?

Well-designed teacher support and mentoring programs can have a positive impact on new teacher retention rates and the development of teaching skills among new teachers. Further, strong programs seem to provide valuable professional development opportunities for veteran teachers who serve as mentors. State policymakers interested in addressing new teacher attrition and the professional development of new and veteran teachers can create or strengthen induction programs. Governors, state legislators, and other state policymakers pursuing the development or improvement of new teacher induction programs should consider the following recommendations.

- **Collect and use data.** To understand the need for and potential impact of a new teacher induction program, state policymakers should collect information on, for example, the number of graduates from state teacher preparation programs and the number taking teaching jobs, other sources of new teachers, teacher attrition and retention rates during the first three to five years, and teachers' reasons for leaving or staying in the profession. These data should be part of a comprehensive state education data system that also provides information on teacher supply and demand, teacher qualifications, and measures of student achievement.
- **Develop policy that effectively supports strong state or local programs.** When developing policy, state policymakers should incorporate the elements of effective induction programs—universal participation; use of experienced teachers as mentors; mentor training; release time or reduced teaching loads for beginning teachers and mentors; stable funding; clear standards; a program structure defined by input from beginning and veteran teachers; performance assessments; a subject-specific focus; and working conditions that enable teachers to focus on strengthening their teaching skills. Further, states whose policies provide more local flexibility in designing programs may need to help districts build their capacity to plan and implement effective programs.
- **Provide adequate and consistent funding.** State policymakers should consider how the level and stability of state funding could affect state or local capacity to implement induction

programs. Costs will vary depending on the program elements implemented and the number of teachers served. States need to ensure that funding is adequate to support the type of induction program envisioned in state policy. District capacity to fund and design programs will also vary, and state funds and guidance can provide continuity and stability.

- **Establish strong links among the policies that form a comprehensive educator development system.** State policymakers should carefully explore how the induction policy will be linked to other policies related to teachers and teaching, such as preparation, licensure, evaluation, and professional development. Well-designed policies create induction programs that are part of a continuous system of teacher preparation and professional development. Induction programs can be a critical link in ensuring that preparation programs and licensure requirements provide new teachers with the knowledge and skills they need to succeed and that evaluation and professional development opportunities help all teachers build their knowledge and skills during their careers.
- **Build program evaluation provisions into state policy.** To know the impact of the program and its cost-effectiveness, state policymakers need to plan and budget for program evaluation. They should build into state policy provisions on collecting information about the effectiveness of different strategies to support new teachers. It is easier to collect relevant data from the start than to reconstruct the information later.

Induction programs for new teachers show promise in helping new teachers transition to the profession, improving the teaching practices of young teachers, and reducing attrition rates among new teachers. Strong induction programs provide new teachers with the support and guidance they need to become effective veteran teachers. Early evidence suggests that as state policymakers continue to fund teacher recruitment efforts and other initiatives in order to ease teacher shortages, they should also consider how a strong teacher induction program could reduce teacher attrition and improve teaching.

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- ⁴⁵ Lynn Lorber, California Governor's Office of the Secretary for Education (January 7, 2002), “Re: Issue Brief—‘Mentoring and Supporting New Teachers,’” [e-mail to author]; and National Association of State Boards of Education Study Group on Coordination and Accountability in Teacher Education, 30.
- ⁴⁶ California Department of Education, “Beginning Teacher Support and Assessment,” at <www.btsa.ca.gov>; and “BTSA—Basics,” at <www.btsa.ca.gov/BTSA_basics.html>.
- ⁴⁷ National Association of State Boards of Education Study Group on Coordination and Accountability in Teacher Education, 29.
- ⁴⁸ Wilson, Darling-Hammond, and Berry, 26.

