# The Principal Pipeline Initiative in Action

POLICY STUDIES ASSOCIATES, INC.

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Commissioned by:

The Wallace Foundation®

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RAND EDUCATION

Preface

This is the fifth report from an evaluation of the Principal Pipeline Initiative, in which six large urban school districts have received support for strengthening novice principals' capabilities through specific strategies. The Wallace Foundation is sponsor of the initiative and of the evaluation, which is conducted by Policy Studies Associates, Inc., and RAND. This report analyzes implementation of the initiative in the participating school districts from grant award in August 2011 through spring 2015. This study of the initiative's implementation was designed to draw lessons about the process and early results of the work done in districts with varying histories in different states and regions. It emphasizes approaches that the districts took and results that emerged during almost four years of implementation. Intended audiences for the report include other school districts that might embark on similar approaches and policymakers who might support such efforts.

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Executive Summary

Strong principals are central to improving schools—indeed, leadership is second only to teaching among school-related factors that influence student achievement. Districts struggle, however, to develop a sufficient pool of highly capable principals. While research has identified strategies that are effective in preparing and supporting school leaders, few districts have pulled together a coherent set of strategies to form a pipeline to the principalship.

Recognizing the need to improve the supply of high-quality principals, The Wallace Foundation launched the Principal Pipeline Initiative (PPI) in 2011. The goal was to test the proposition that districts could produce a large cadre of strong novice principals by making a concerted effort to implement a set of interrelated policies and practices, and that doing so would positively affect school outcomes. Participating districts focused on implementing four key components:

■ Adopting standards of practice and performance to guide principal preparation, hiring, evaluation, and support
■ Improving the quality of preservice preparation for principals
■ Using selective hiring and placement practices to match principal candidates with schools
■ Implementing on-the-job evaluation and support for novice principals (those in their first three years on the job)

Six large districts received multi-year grants of $8.5 million to $13.25 million from the foundation to cover a portion of the start-up costs of developing a principal pipeline. The districts were selected partly because they had already adopted some policies and practices consistent with the PPI components. The foundation also provided technical assistance. The PPI sought not only to institute, grow, and sustain the key components within each participating district, but also to generate examples that other districts might follow.

Principal Pipeline Initiative Districts

■ Charlotte-Mecklenburg Schools, North Carolina
■ Denver Public Schools, Colorado
■ Gwinnett County Public Schools, Georgia
■ Hillsborough County Public Schools, Florida
■ New York City Department of Education, New York
■ Prince George's County Public Schools, Maryland

This report is the fifth and last in a series on PPI implementation that is part of an evaluation by Policy Studies Associates and RAND. Data for the evaluation were collected from late 2011 through spring 2015, using interviews with district administrators, surveys and focus groups of novice principals, and reviews of district documents. Details about study methods appear in the body of this report.

This culminating report summarizes findings about implementation of the four PPI components across the six districts, as of spring 2015 when all components were expected to be up and running. The report details

the implementation approaches, accomplishments, and challenges of participating districts; identifies factors that helped or impeded their progress; highlights lessons learned; and presents implications for policymakers and other districts. An evaluation report about the effects of the PPI on student achievement is scheduled for publication in 2018.

This section summarizes—
- ■ An overall finding about implementation across all six districts.
- ■ Main findings about the implementation of each PPI component.
- ■ Factors contributing to progress in PPI districts.
- ■ Early evidence of results from the perspectives of novice principals and district leaders.
- ■ Persistent challenges faced by districts in redesigning principal pipeline systems.
- ■ Implications for other school districts and policymakers.

Overall Implementation

> To a striking extent, all six districts carried out the kinds of policies and practices called for by the PPI.

All of the districts marshalled the will and capacity to put in place the key PPI components by spring 2015. Consistent with PPI guidance, these districts built tools, programs, partnerships, data systems, and staff capabilities for supporting novice principals.

Local commitment to the initiative actually appeared to strengthen over the years. Districts maintained a focus on the key PPI components despite superintendent transitions in four districts and the many other initiatives under way in all of the districts. District leaders and project directors approached their tasks not as hoops to jump through for a funder but as part of a coherent design.

Standards

> Defining standards and competencies for principals was a powerful first step toward creating a solid principal pipeline.

Districts actively used standards to help align their principal preparation programs, hiring criteria, and on-the-job evaluation rubrics with district priorities for school leadership. The standards brought coherence to district actions and provided a common language for discussing school leadership.

> Standards-writing was not a one-time undertaking but an iterative process.

All districts revised their standards to meet practical challenges as other parts of the pipeline evolved. For example, they clarified wording when questions arose in principal evaluations.

Principal Preparation

> Districts made progress in using data to identify potential principals, creating or strengthening their own preservice programs, and collaborating with universities.

All six districts started or expanded their own district-run principal preparation programs for high-potential assistant principals. Moreover, all districts worked in partnership with university programs to prepare aspiring leaders. As part of these preservice efforts, all districts encouraged principals and other district staff to find and cultivate rising talent.

District leaders and their partners emphasized the value of gathering and systematically using data to continually assess their leader preparation efforts. With training provided by the PPI, districts used a suite of tools (Quality Measures for Education Leadership Systems and Programs) that included indicators and rubrics reviewing program effectiveness in the areas of course content and pedagogy, clinical practice, recruitment and selection, and performance of program graduates.

While district leaders also provided on-the-job leadership experiences as part of preservice preparation for principals, they struggled to mobilize enough sites and mentors.

Principal Hiring and Placement

> Districts acted quickly to make hiring, placement, and principal succession planning more systematic and informed by data.

At the start of the PPI, leaders in all participating districts had at least some concerns about their districts' hiring and placement procedures. These leaders were uncertain whether they were placing the best possible candidate in each school. Most reported using an unsystematic process to fill vacancies one at a time and bemoaned the lack of hard, usable data about candidates.

Districts took early steps to align their hiring procedures and candidate assessments with district standards and competencies for principals. Over the next few years, districts made several improvements in screening and placing principals. By 2014, all districts were using multiple stages of scrutiny and assessment to develop a future pool of high-quality candidates to fill principal vacancies as they arose. By 2015, all districts required aspiring candidates to engage in practical demonstrations of their skills, typically with simulated scenarios.

A crucial step in improving hiring, placement, and succession planning was the development and use of longitudinal data systems, called Leader Tracking Systems (LTS), that collected and maintained information on individual candidates' experience, performance, and assessed competencies. While districts had already begun drawing on data in the hiring process, the LTS made this process easier by pulling together a variety of data in a more usable form.

Evaluation and Support for Novice Principals

> **Districts implemented standards-based systems for evaluating principals' professional practice.**

During the course of the PPI, every district designed or adapted evaluation rubrics for supervisors to use to rate principals on the district's standards and competencies for school leaders. These evaluations covered such areas as instructional leadership, human resource management, school climate, planning, and school management and operations.

In all PPI districts, evaluations became less like a once-a-year meeting and more like structured conversations between principals and their supervisors. Comments from focus groups suggested that evaluations often involved frequent and intensive interactions between principals and supervisors and ongoing discussions of principals' progress toward goals.

> **Most novice principals surveyed viewed these evaluation systems as fair and constructive.**

Novice principals received critical feedback from these evaluation systems. More than half of new principals were told after their 2013-14 evaluations that they needed to improve at least one area of practice, most often related to instructional leadership. Still, survey responses showed that principals had positive perceptions of their district's evaluation process. Challenges remained in making evaluation rubrics more specific and in balancing a desire to differentiate based on principals' experience or school context against the desire to maintain uniformly high expectations.

> **The roles of principal supervisors shifted, with smaller caseloads and a greater focus on instructional leadership.**

PPI districts invested their own resources to hire more principal supervisors so that each could work with fewer principals. Districts also redefined the role of supervisors so they spent less time overseeing compliance and operations and more time helping principals succeed as instructional leaders. The Wallace Foundation grants supported training of the new supervisors.

Supervisors took on pivotal roles in providing on-the-job evaluation and support for principals. A large majority of new principals valued the support received from supervisors.

Principal supervisors were still adapting to their shifting roles, however, and their level of coaching skills varied. Moreover, some supervisors were still expected to carry out administrative tasks, leaving less time to provide support. Districts continued to work on developing supervisors' capacity.

Mentors and coaches stood out as the most highly valued source of support among the new principals they worked with, according to surveys and focus groups. Day-to-day, hands-on support from a mentor or coach helped new principals navigate the challenges of their demanding job.

> District leaders were unsure how—or whether—to continue to use group professional development for on-the-job learning.

In addition to providing induction programs for novice principals and other PPI-related supports, districts continued to offer an array of traditional professional development courses and workshops for principals. In focus groups, principals described these group opportunities as "compliance-oriented," intended for mass consumption, and overloaded with information; and in a survey rated them less highly than they did one-on-one support from mentors, coaches, and supervisors.

Districts tried to find ways to customize their professional development offerings to align them better with principals' needs and their plans for professional growth. But building a professional development system that responds directly, practically, and quickly to principals' needs is challenging and complex work. As of 2015, no district claimed to have successfully done it. The relatively low ratings for traditional district-run professional development raise a more fundamental set of questions about whether it is worthwhile keeping and reshaping these types of courses and workshops.

Rethinking the Position of Assistant Principal

> PPI districts took steps to systematically select, induct, and coach assistant principals to strengthen the pathway to a principalship. Challenges remained, however, in reconciling the instructional leadership and managerial expectations of the assistant principal's position.

In each of the PPI districts, more than two-thirds of novice principals responding to the survey—and sometimes more than 90 percent—came from the ranks of assistant principals. The experience gained in the position was a valuable form of learning—more important than university preparation according to survey responses.

To strengthen the role of assistant principalship in the leadership pipeline, PPI districts sought to use the position as both an apprenticeship and a proving ground for future principals. Most of the PPI districts built standards and evaluation measures for assistant principals that were based on those for principals. Districts also mounted training programs, in-house or with universities, to prepare assistant principals to become instructional leaders in their schools. Some districts provided coaching or mentoring for novice

assistant principals beyond what they would normally get from their principal, or offered other types of induction programs.

Still, assistant principals continued to spend much of their time on managerial duties, which limited their opportunities to practice instructional leadership on the job.

> Districts also had to work with the many assistant principals who would not become principals.

All of the districts had more assistant principals than principal slots, and not all assistant principals showed high potential to advance to a principalship. Thus, districts still faced the challenge of moving some of their assistant principals off the track to a hoped-for promotion.

While these assistant principals could still fill districts' needs for career managers to help run their schools, districts struggled to find ways to differentiate the instructional leadership and managerial functions of the assistant principal's job. Some district leaders wondered whether they should restructure the position. None claimed to have good solutions to this dilemma.

Factors Contributing to Progress

> Three features of the PPI design—local latitude, engagement of top district leaders, and regular opportunities for project directors to learn and share—were particularly helpful to districts.

Observations and interviews suggested that three design features were important to districts' progress in strengthening their principal pipelines. First, although the PPI components were well-defined, districts had the latitude to use different strategies to carry them out and shift their emphases over time. In this way, districts took charge of their own work.

Second, the initiative was designed to engage top district leaders in matters that might otherwise have been handled by human capital departments. Superintendents had ongoing conversations with the foundation and attended the PPI professional learning community meetings. This involvement of top leaders appeared to sustain high-level support for the initiative within districts, cross departmental lines, and help overcome bureaucratic resistance.

Third, the project directors from the six districts met regularly to share ideas and spend uninterrupted discussion and planning time with key members of their own local leadership team. They also had regular opportunities to meet with outside experts and visit each other's districts to gain deeper knowledge of the initiative. The project directors said their work benefited from these opportunities for interaction.

> Districts viewed their principal pipelines as a work in progress and continued to fine-tune them.

Most new tools, programs, and procedures were introduced as pilots. This helped ease the stress about issues like principal evaluation and enabled districts to spot and correct unanticipated problems. Even after these systems became more well-established, districts worked on each pipeline component every year. No district leader characterized any part of the pipeline design as completed and unchangeable. Instead, they continued to refine their systems to incorporate new knowledge, fix flaws, and address new issues.

Evidence of Results

> Since it takes years for changes in principal preparation to affect a new crop of principals, it is too early to expect to see the full effects of the PPI on incoming principals.

The pathway to a principalship usually involves university preparation and a stint as an assistant principal, and often includes another district-sponsored training program. In the PPI districts, the median time elapsed from the beginning of formal preparation to the first principal's job ranged from three to ten years, according to reports from first- and second-year principals in 2015.

Most of the novice principals surveyed had started their formal preparation before their district had begun to implement PPI interventions. Thus, the PPI had not fully reshaped their preparation experience. As of spring 2015, only a minority of incoming principals in PPI districts had obtained *all* of their preparation through new or revised programs that reflected the PPI reforms.

> Early evidence shows some positive results of changes made by PPI districts in principal preparation, hiring, placement, and evaluation.

PREPARATION. The most notable change during the evaluation period was a statistically significant increase in the percentage of novice principals who reported on surveys that their preparation had given them "a strong orientation to the principalship as a career."

HIRING AND PLACEMENT. Districts seemed to get better at placing principals where they were needed. Over the course of the PPI, a higher percentage of novice principals reported that their skills were an "excellent" fit for their school's needs. Top district leaders also viewed changes in hiring and placement as successful. In interviews conducted in 2014 and 2015, most leaders said that incoming principals and assistant principals were demonstrating strong leadership capabilities, especially in instructional leadership.

EVALUATION AND SUPPORT. New principals continued to give good ratings to their mentoring or coaching assistance and gave higher ratings over time to principal supervisors. And despite the introduction of new evaluation practices and measures, new principals' ratings of district evaluation systems were positive and held steady.

Persistent Challenges

> Districts faced persistent challenges in implementing redesigned principal pipelines.

As of 2015, the PPI districts still had work to do to develop the capacity of principal supervisors and other staff to carry out their redesigned pipeline systems. For example, principal supervisors were continuing to learn how to evaluate and coach new principals, even as their time was consumed by administrative tasks in some cases.

In addition, district leaders reported mixed effectiveness in reshaping university preparation programs over which they had little influence.

For some stubborn challenges, research and practical wisdom offered no clear solutions. For example, districts remained unsatisfied with the assessments available to screen aspiring principals for the interpersonal skills needed in organizational leadership. They struggled to tailor conventional group professional development to individual needs, and to balance tensions in the assistant principal's role.

Implications for Districts

> The experience of the PPI districts offers lessons for other districts interested in doing similar work, even districts that are smaller or lack the level of support found in PPI districts.

The following steps would be feasible and could be productive in other large districts, and they could be adapted for districts of any size:

- Defining standards and competencies for principals, or drawing on the recently released Professional Standards for Educational Leaders, is a powerful first step with several potential benefits.

- Procedural changes in the hiring process, such as requiring candidates to demonstrate their skills and drawing on consultants to help identify performance tasks, is a good starting point for improving the caliber of principal candidates.

- District-run preparation programs that are specifically tailored to district priorities and needs and that give hiring managers a chance to observe aspiring principals can be advantageous.

- Leader Tracking Systems—or, for small districts, less elaborate records of individual leaders' accomplishments and career paths—offer useful information for hiring and succession planning. Eventually the results can be used to improve all parts of the pipeline.

- Introducing changes to pipeline components on a pilot basis allows opportunities to learn from experience and revise the components. This can also ease concerns about potential negative impacts.

Policy Implications

Building on the experience of this initiative, policymakers could help districts develop stronger corps of novice principals to lead school improvement.

Examples of supportive policies include the following:

- Supporters of reform could ensure that districts have access to the Professional Standards for Education Leaders and examples of job descriptions, evaluation rubrics, and other usable materials based on these standards.

- Agencies that oversee or support work on principal pipelines could consider a mix of tightly defined components and local latitude for invention in implementation similar to the PPI.

- Seed money could provide expert technical help with hiring procedures or data systems, initial training for principal supervisors and others taking on new roles, opportunities to visit and learn from other districts, and other important start-up resources.

- More work needs to be done to expand the knowledge base and develop and systematically test new approaches for creating a pool of highly capable novice principals.

Policymakers should also recognize that implementing the components of a major, system-level initiative is a multi-year endeavor and that it takes even longer to see the effects of those changes. Patience is required. Still, the PPI districts have demonstrated how to take promising steps in that direction while striving for continuous improvement.

1. Introduction

The Wallace Foundation launched the Principal Pipeline Initiative in 2011 because evidence had shown that school principals are second only to teachers among school-related factors that affect student achievement (Seashore Louis, Leithwood, Wahlstrom, et al., 2010). The initiative aimed to improve the capacity of newly appointed principals in a set of large urban school districts through improvements in preparation, hiring, evaluation, and support, potentially generating an example for other districts to follow. This report is part of an evaluation of the Principal Pipeline Initiative. It summarizes findings of a four-year study of the ways in which the districts carried out the initiative, highlighting what they accomplished, what they learned, and how other districts could apply these lessons.

Six urban school districts participated in the initiative: :

- Charlotte-Mecklenburg Schools, North Carolina

- Denver Public Schools, Colorado

- Gwinnett County Public Schools, Georgia

- Hillsborough County Public Schools, Florida

- New York City Department of Education, New York

- Prince George's County Public Schools, Maryland

The evaluation team studied the work that district leaders did from 2011 through spring 2015, which was the period in which they were expected to put in place their major strategies for improving new principals' instructional leadership. The districts made concerted efforts to strengthen the preparation and support of new principals in a systemic fashion. They addressed four interrelated components of policy and practice, identified by The Wallace Foundation (and described in more detail in the next section of this introduction):

1. Leader standards and aligned job descriptions, preparation, selection, evaluation, and support.

2. Preservice preparation that includes selective admissions to high-quality programs.

3. Selective hiring, and placement based on a match between the candidate and the school.

4. On-the-job evaluation and support addressing the capacity to improve teaching and learning, with support focused on needs identified by evaluation.

The districts were selected in part because they had already launched some policies and practices consistent with these components. The foundation provided multi-year support that included grants of $8.5 million to $13.25 million over five years,[1] along with technical assistance, to support the districts in expanding on existing practices and building strong, sustainable policies and investments in school leadership.

The Principal Pipeline Initiative was designed to test the proposition that a combination of programs, partnerships, policies, and practices could result in cohorts of strong novice principals who would make a difference in school outcomes. The foundation's 2011 request for proposals from districts expressed the initiative's central hypothesis in the following terms (Wallace Foundation, p. 2):

> *If an urban district and its principal training programs provide large numbers of talented, aspiring principals with the right "pre-service" training and on-the-job evaluation and supports, the result will be a pipeline of principals able to improve teaching quality and student achievement district-wide, especially in schools with the greatest needs.*

In other words, the initiative aimed not only to achieve solid implementation in districts but also to test the power of the pipeline to affect student performance. The multi-year evaluation of the Principal Pipeline Initiative therefore has a dual purpose: to analyze the processes of implementing the initiative's components in the participating districts from 2011 to 2015; and then to assess the results achieved in schools led by novice principals who had exposure to the initiative as implemented. A future evaluation report, scheduled for publication in 2018, will answer questions about the initiative's effects on achievement.

This report assesses the implementation of all components of the initiative as of spring 2015. Although the initiative continued to support the districts' continuing work beyond 2015, this was a point at which all components were expected to be up and running. This report recapitulates and extends findings from previous reports that described the districts' plans and first-year activities (Turnbull, Riley, Arcaira, MacFarlane, & Anderson, 2013); analyzed the preparation and support for school leaders offered by districts and their partners (Turnbull, Riley, & MacFarlane, 2013); summed up the status of implementation as of 2014 (Turnbull, Riley, & MacFarlane, 2015); and reported in depth on evaluation and support for novice principals (Anderson & Turnbull, 2016).

The primary purpose of the implementation reports is to inform local decision makers about the possibilities and challenges of following these districts' example. Therefore this report identifies the districts' purposes and strategies in each major part of their work, analyzes what supported or impeded their progress, and reports on early evidence of results from the perspective of district leaders and novice principals. It draws implications for districts and for the policymakers who support them.

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[1] The initial grants ranged from $7.5 to $12.5 million. Supplemental grants in 2013 supported new efforts to strengthen the work of the district staff members who supervised principals.

Background: Intent and Design of the Principal Pipeline Initiative

After a decade of supporting research and program innovations in educational leadership, The Wallace Foundation saw research evidence that a principal has a pivotal role in a school's instructional quality (Seashore Louis et al., 2010) and that urban districts have the power to reshape principal preparation and support (Orr, King, & LaPointe, 2010).

Before and during the Principal Pipeline Initiative, research and analysis have continued to highlight the critical role of principals and possible ways of shoring up their capabilities. A statewide analysis of Texas data identified principal effects on student achievement (Branch, Hanushek, & Rivkin, 2012). Long-term work by the Chicago Consortium on School Research (Bryk, Sebring, Allensworth, Luppescu, & Easton, 2010) identified school leadership as a critical support for school improvement, one that undergirds the other supports (parent-community ties, professional capacity, student-centered learning climate, and instructional guidance). A report from Bain & Company (2013) identified needed innovations in pathways to school leadership and described ways in which some districts have carried out those innovations. The Council of the Great City Schools assessed the principal supervisor role nationally and in Principal Pipeline Initiative districts, with Wallace support, and recommended that the role be clarified and refocused on instructional leadership (Corcoran et al., 2013). Principal evaluation has been the subject of research-based analysis and recommendations (Clifford & Ross, 2012; Davis et al., 2011).

The initiative reflected the belief that districts could do much to develop and support principals as effective instructional leaders if they specified clear expectations for principals in the form of leader standards, reshaped traditional preparation and hiring processes for aspiring principals, and restructured evaluation and learning opportunities for new principals. The major components of the initiative were expected to work together. Preparation, hiring, evaluation, and support would all be aligned to the same standards and thus would be mutually reinforcing. Key elements of each component would be the following;

■ **STANDARDS** for leadership would specify the capabilities and performance that the district wanted in principals, and the district would shape all its policies and practices related to aspiring and novice school leaders around these standards. In addition to using the standards as criteria for hiring principals, districts would ensure that preparation programs would use the standards in admissions and in instruction; that the evaluation of new principals would assess the extent to which they met each standard; and that on-the-job support would specifically address any gaps between standards and performance.

■ **PRESERVICE PREPARATION** programs for aspiring leaders, whether lodged in universities, non-profit organizations, or districts themselves, were required to meet several specifications based on the findings of a major Wallace-supported study of exemplary preservice programs (Darling-Hammond, LaPointe, Meyerson, Orr, & Cohen, 2007). Admissions criteria and program curricula would align with district standards. Drawing also on the findings of Orr and colleagues (2010), the initiative emphasized the importance of ongoing program improvement based on data about the quality of graduates' preparation and, for programs based in universities or nonprofits, a partnership that would give the district a substantial role in shaping the program.

■ In **HIRING AND PLACEMENT**, the initiative called for "rigorous processes of selection and matching." Selection procedures would be designed to collect and consider relevant information about capabilities aligned with district standards. Districts would assign new principals only to schools for which their particular strengths would be a good match.

■ Finally, **ON-THE-JOB EVALUATION AND SUPPORT** for school leaders would also be aligned with standards. Districts would systematically evaluate novice principals' instructional leadership capabilities, give them feedback, and, on the basis of the evaluation results, provide professional development and skilled mentoring to support them in further developing their needed capabilities. (The initiative defined novices as those in their first, second, and third years in the position.) Districts would also provide professional development for assistant principals with potential for advancement.

The initiative also brought the expectation that district policies and practices related to school leaders would build the *district's capacity to advance its educational priorities*. All components would closely reflect the district's strategic priorities and would achieve district-wide scale and long-term sustainability.

Based on the districts' early experience, the foundation incorporated supporting mechanisms into the initiative design:

■ The foundation supported development of a new data system, called a Leader Tracking System, as a repository for individual-level, longitudinal information about aspiring and novice leaders. The system would include data on the individual's preparation and certification history, positions held and the schools in which he or she had held them, assessed skills and performance in each position, and participation in professional development and coaching.

■ When the pivotal role of principal supervisors became evident through district experience and a report of the Council of the Great City Schools (Corcoran et al. 2013), the districts extended their work to include redesigning principal supervisor roles and training an expanded corps of principal supervisors, with the aim of more intensively supporting principals as instructional leaders. The foundation provided supplemental funds for this work.

■ Similarly, the districts were encouraged to provide support for sitting assistant principals. As it became clear that most future principals would spend time in this role, the opportunities for learning and development in the position commanded greater attention.

An important dimension of the initiative was active partnership between grantees and The Wallace Foundation. This included not only each district's ongoing dialogue with senior foundation officials about detailed work plans and budgets, but also extensive opportunities to receive technical assistance from providers vetted by the foundation and to participate in the initiative's Professional Learning Communities. The technical assistance included skilled help for each district in setting up its Leader Tracking System and in using Quality Measures, a suite of tools designed by Education Development Center with Wallace support,

including indicators and rubrics for assessing leader preparation programs in a facilitated review of evidence. Professional Learning Communities were set up for district teams (including superintendents, local project directors, and others), for leaders of principal preparation programs, and for principals. The project directors also had opportunities to visit each other's districts to learn about their peers' work under the initiative.

In relying on large urban school districts to carry out the initiative, The Wallace Foundation took a risk. School districts, especially large ones, have a reputation for volatility in policy and a sad residue of shifting priorities over time (Hess, 1999; Hightower, Knapp, Marsh, & McLaughlin, 2002). They are also criticized for sluggishness in policy execution (Finn & Kanstoroom, 2000; Honig, 2006). The district is not a monolith that moves in an orderly fashion to carry out an external idea, but rather is a collection of subunits with histories, agendas, and incentives that collectively impede coherence (Spillane, 1998). In short, major cross-district initiatives have typically ended with pockets of partial implementation and a renewed conviction that big school districts are both fickle and cumbersome agents of change. It was possible that shifting local priorities would swamp the initial focus on principal leadership or that bureaucratic tangles would slow the work.

In studying implementation of the Principal Pipeline Initiative, this evaluation assessed the extent to which the districts carried out policies and practices consistent with the initiative design. The four major pipeline components—standards, preparation, hiring, and evaluation and support—were central foci of the study. For each component in each district, we assessed what the districts had done to put new practices in place or strengthen what they were already doing. We analyzed what supported or impeded implementation, according to leaders in the district and preparation programs, and how new principals and aspiring principals perceived their experiences with each pipeline component.

Evaluation Methods and Reporting

We offer here an overview of data sources and data analysis for this study of implementation. More details appear in Appendix A.

Data sources

This report is based on an analysis of data collected by the evaluation team from the following sources:

■ Semi-structured interviews with administrators in district central offices and in outside programs that partnered with the districts (e.g., in universities), conducted during annual site visits in spring 2012-15.

■ Focus groups with novice principals and assistant principals (i.e., those in their first, second, and third years in their position) in spring 2013-15.

■ Surveys of novice principals and assistant principals in spring 2013-15.

■ Documents including the districts' proposals, work plans, and progress reports for the foundation.

■ Observation of and participation in cross-site meetings from 2011 through 2015, including observation of presentations and panel discussions by district leaders.

Site-visit interviews were arranged by the project director in each district, responding to specifications from the evaluation team. In each year we requested interviews with the project director, the superintendent (or, in New York City, another high-level official in the central office); other members of the executive team such as the directors of human capital, curriculum and instruction, and data systems; and central-office staff and partner-program leaders who were, collectively, knowledgeable about standards, preparation programs, hiring and placement, supervision, evaluation, and support for principals. Where two or three people worked closely together on a particular function, the team typically conducted a joint interview with them. In some cases, project directors arranged one or more larger group interviews (e.g., the eight principal supervisors in Hillsborough County were interviewed in two groups in 2014, as were the eight principal coaches in that district). Numbers of interviewees are shown in Exhibit 1.

Exhibit 1: District and partner interviewees, by district, 2012-15

District	2012	2013	2014	2015
Charlotte-Mecklenburg	14	22	11	13
Denver	19	21	13	22
Gwinnett County	14	15	16	19
Hillsborough County	17	18	30	18
New York City	8	14	18	15
Prince George's County	19	23	16	16
Total	91	113	104	103

Exhibit reads: In Charlotte-Mecklenburg, 14 district or partner staff members were interviewed in 2012.

The semi-structured interview protocols included not only factual questions about all components but also probes for the respondents' perceptions of what district practices appeared to be serving the intended purposes, what practices appeared to need improvement, and what changes, if any, were under consideration. Respondents were asked more detailed follow-up questions about their particular areas of responsibility.

Focus groups with novice principals and assistant principals addressed their experiences and perceptions related to standards, preparation, hiring, evaluation, and support. Project directors identified the participants for these focus groups.

More complete data were gathered from novice principals and assistant principals in web-based surveys administered annually in spring 2013-15. For principals, all of those in their first three years in the position were surveyed in all districts. For assistant principals, all in their first three years in the position were surveyed in five of the districts; a random sample was surveyed in New York City. The surveys addressed these novice school leaders' perceptions and experiences related to each pipeline component, along with a few questions about their backgrounds and career plans. Surveys were revised from year to year to provide more data on the focal topics for upcoming study reports; thus the 2013 surveys had a few extra questions on preparation experiences, and the 2015 surveys had a few extra questions on principal evaluation and support.

Response rates generally exceeded 80 percent in five of the districts and ranged from 31 to 54 percent in New York City across the years. Appendix A provides information on the response rates and on our procedure for checking for non-response bias in the New York City principal data. (The New York response rate was lowest, 17 percent, among assistant principals in 2013, and we have excluded those respondents from our analysis.)

Data analysis

For this study of initiative implementation across six districts, the district is the primary unit of analysis. Therefore, where this report presents a single frequency drawn from responses across all districts, the analysis gives equal weight to each district. The raw survey responses, if compiled across districts, would over-represent New York City—which had the largest numbers of novice principals—and under-represent the other districts. Because of the significant cross-district differences in numbers of novice principals, we applied post-stratification weights as described in Appendix A so that each district would be equally represented in overall analyses.

The survey data presented in this report were analyzed for change over time in two main ways: (1) by comparing cross-sections of the principal and assistant principal responses gathered in 2013, 2014, and 2015; and (2) by comparing cohorts of principals and assistant principals who started their position at five different time points. The first three cohorts of principals and assistant principals were surveyed in 2013, and one new cohort of first-year principals and assistant principals was surveyed in each of the two subsequent years for a total of five mutually exclusive cohorts. Thus for several analyses in this report we compare the first two cohorts of principals who started their position in 2010-11 or 2011-12 to the last two cohorts of principals who started their position in 2013-14 or 2014-15. Our aim in focusing on these combined cohorts was to maximize the distance in time between the cohorts while boosting the numbers of cases by combining pairs of cohorts. See Appendix A for a more detailed description of cohort assignments and analyses.

Qualitative analysis was iterative. The evaluation team coded interview transcripts and notes according to the components and supporting mechanisms of the Principal Pipeline Initiative. Consistent with the purpose of the implementation study, the analysis for each component emphasized what had been done, what had helped or hindered those steps, what appeared to be working well, what challenges had emerged, and what district leaders wanted to do next. Multiple iterations of analysis identified and refined the specific themes, descriptions, and analyses presented in this report. Drafts were reviewed by the particular team members who visited the site for factual accuracy and revised as necessary. The districts' progress reports to The Wallace Foundation were a supplementary source for detailed factual descriptions of policies enacted; similarly, the initial proposals were a source for facts about policies and practices in place before the initiative. Finally, project directors in the districts conducted a fact-check of this report's text prior to publication.

Organization of this report, and future reporting

Chapter by chapter, this report analyzes the ways in which the six districts tried to improve principal standards and competencies, preparation, hiring and placement, and evaluation and support. For each of these components it identifies key strategies across the districts, then reports on the accomplishments and remaining issues that were evident by spring 2015. An additional chapter analyzes a lingering puzzle that came into view over the course of the initiative: how to incorporate the assistant principal position into strategies for developing future principals. The report ends with a chapter drawing conclusions and implications from these findings on implementation.

The overall Principal Pipeline Initiative evaluation will produce a final report on effects, analyzing achievement and other data from schools led by principals who were exposed to pipeline components as implemented in the districts. That report is scheduled for late 2018.

2. Principal Standards and Competencies: Living Documents in Use

The first component of the Principal Pipeline Initiative, standards, became a driver of district action. Districts embraced the development and use of standards for principals and found these standards helpful. Standards and competencies provided a powerful, aligned structure for principal evaluation, job descriptions, and some preparation programs.

The Problem Facing Districts Initially: Standards Weren't Clear and Weren't Used

Each district already had documents laying out standards for school leadership at the start of the Principal Pipeline Initiative grants in August 2011, but the standards lacked specificity and clout. In general, district leaders said they had a loose patchwork of language about school leadership that did not communicate what the district really wanted principals to know and do. The wording of local standards was often borrowed from a 2008 publication of the Interstate School Leaders Licensure Consortium and various state or local documents, and was not well known or much used in district practice. District leaders saw that they could use revamped standards in consequential decisions in principal hiring and evaluation. They wanted to develop clear, concrete, and actionable statements that could become a shared language about school leadership in the district, communicating behavioral expectations rather than hazy exhortations.

Principal evaluation was an arena in which district leaders readily saw the potential value of clearly stated standards and competencies. They needed to define principal "professional practice" because their states required local educator evaluation to incorporate measures of professional practice. Moreover, district leaders believed that more specific feedback in the evaluation process could benefit principals, and they saw standards as a way to ensure that the feedback reflected district priorities.

Takeaways

1. The use of standards was powerful in helping districts align their actions and policies to their priorities for school leadership.
2. Principal standards shaped the design of preparation programs, hiring criteria, and on-the-job evaluation rubrics.
3. Standards development or adoption was not a one-time event. The standards were living documents that districts continued to clarify based on experience.
4. The wording of standards became a shared language about school leadership within districts, according to interviewees.

Strategies: Putting an Early Version of Standards to Work, and Revising the Standards

Enlisting broad-based committees in drafting standards

Districts launched their work on standards quickly, consulting broadly with local stakeholders and often bringing in expert help. For example, Hillsborough County engaged several committees of principals and assistant principals in developing and refining initial lists of School Leader Standards and Competencies, then asked all principals and assistant principals to vet the resulting competencies. Experienced outside consultants helped with refinements such as streamlining the early draft. In Denver, a small committee of central-office staff and principals developed a first draft in 2011, reflecting state standards, competencies emphasized in a partner program of principal preparation, and national sources. District stakeholders then vetted the draft, and it was shortened with help from consultants. Charlotte-Mecklenburg was required to use state standards but formed a group of district and building leaders and preservice partners to identify key competencies for leadership practice in the district. They identified a subset of the state standards that the district prioritized, calling these their Super Standards.

Revising the standards while using them

The standards did not remain static. All the districts adapted and revised their standards and competencies whenever necessary to meet practical challenges, especially in hiring and evaluation. The continuous improvement was not designed as a structured, systematic process, but it took place in each district as issues arose.

For example, after a 2011-12 pilot of a principal evaluation system based on the new standards, Denver and a consulting firm revised the standards by consolidating related standards and reducing the number of indicators from 22 to 12. Key purposes of those revisions were to clarify performance expectations and to place a greater focus on the leader standard for supporting English language learners, a district-wide priority.

Charlotte-Mecklenburg first built an evaluation instrument and procedures, then rewrote the principal job description to reflect both the evaluation instrument and the standards. Then the district repeatedly fine-tuned recruitment and selection processes, with consulting help, in order to tighten their alignment with the job description. A district official said the revision of competencies and measurement rubrics benefited from the process of figuring out how candidates might demonstrate the skills and beliefs the district described:

> We really worked on [questions like,] for belief in students, what does that mean? To what level do we expect our people to demonstrate that, to be successful as a first-year principal? And so that is when we really began the redesign work and came up with our new competencies, new rubrics.

Hillsborough County formed an Alignment Committee composed of the same individuals who had developed the original standards and competencies, including principals and district-level staff. The committee and consultants used the competencies to drive the redesign of preparation programs, assessment, and support at multiple career stages.

When principal supervisors used a standards-based rubric[2] to evaluate principal performance, some identified gaps and ambiguities in their leadership standards as well as in the rubric. A Denver district leader, for example, said that because principals were expected to develop assistant principals' leadership capacity, this should be clearer in the rubric. District leaders said they heeded the feedback from principal supervisors and tried to convey a rubric's meaning more clearly. Similarly, a leader in Hillsborough County said: "Now, … we're going to do some word changes because as [supervisors] have used [the rubric], they're saying, 'Can we change this word? Because it's a little bit too ambiguous.'"

New York City took a distinctive approach to the development and use of standards for principals. Its School Leader Competencies were reportedly not used well in hiring or evaluation as of 2012. A district leader said at that time: "We've been trying to figure out how to make better use of them, but also to strengthen them to speak more directly to what we expect our principals to do well." Therefore the district launched an in-depth process of reframing the principal evaluation instrument to align closely with the Quality Review, which was a component of the district's consequential evaluation system for schools.

The Quality Review incorporated rubrics and indicators for assessing each school's instructional core, systems for improvement, and school culture. District leaders reasoned that new standards for principal evaluation should correspond to the qualities that the city expected to see in its schools. They set out, therefore, to map backward from the Quality Review Rubric to identify the principal competencies associated with each school-level indicator. Their plan was to use the resulting standards in principal evaluation and also in hiring and preparation. Building acceptance for this approach across offices, with New York State, and with the administrators' union took time. By 2013, however, the new Principal Performance Review was in place, and new indicators aligned to the Quality Review Rubric had replaced the earlier School Leader Competencies in that process.

Accomplishments, Challenges, and Lessons

A mandate to develop standards might have led to pro forma compliance—composing a document and then shelving it. In these districts, however, the mandate led to active, continuing use of the standards. Consistent with the initiative design, districts aligned their principal job descriptions and evaluation rubrics to their standards and competencies. The curricula of some preparation programs, especially those run by the districts themselves, were also aligned to them. It seems that district leaders saw value in these uses of standards and therefore continued to pay attention to their standards documents.

Standards drove coherence in policy and practice

In interviews, district leaders reported that alignment with standards lent valuable coherence to their actions around the principal pipeline. For example, in 2015 a district official in Gwinnett County cited the active use of standards as an important result of participation in the initiative:

What's different because of the PPI grant is that we have become more clear, more aligned, more cohesive with our leader standards. And evidence of that is that the leader standards today, are talked about, discussed, used in any number of learning situations. And before they were not. … We weren't as clear and as cohesive as I believe we are today. So today we … talk about instructional leadership with a much greater clarity than we did, say, three years ago.

The director of a district-run preparation program in New York City commented in 2014 on the quality of learning opportunities for aspiring principals when their lessons were aligned with standards:

This year, it was decided that we should align our content more closely to the Quality Review. … Our faculty also participates in the PPO [Principal Practice Observation] visits, which are the principal rating visits. Our faculty know exactly what people are being rated on…. Literally, one of my people can walk out of a PPO, … go right to class, and say, "This is what you're being required to do as a principal right now. This is what I'm seeing, and this is how you could do better."

In Hillsborough County in 2014, a person closely involved with the ongoing use of standards and competencies described their centrality in the district's work with principals, assistant principals, and aspiring leaders:

In year one I didn't realize how important they were. We developed them, but now when we're going into year three, the competencies drive everything we do. …It's the language that is now being used across the district.

District officials were not the only ones in Hillsborough County to describe the competencies as "a language." An aspiring principal said in a 2015 focus group:

I think what the district views as a principal's scope of responsibilities is very clear…. I've noticed there's a real common language, too, used by all the district-level people when they talk to us, and what their expectations are, and what they hope for the future of the district, and where they want us to put most time, effort, and resources. And whether you're talking to [a district staff member] or a [principal supervisor], or even our new superintendent, everybody's talking the same language.

Superintendent transitions might affect the stability of standards

This initiative proved resistant to the effects of superintendent transition, although a change in top leadership could create temporary uncertainty around the use of standards. New York City had mayoral control of schools, and a new chancellor (the city's term for superintendent) was appointed in 2015 by a newly elected mayor. In early 2015 our interviewees expressed uncertainty about the role of the Quality Review as an anchor for principal evaluation going forward. However, in fact the standards for principals did not change.

In Prince George's County, abrupt leadership changes and impending changes in governance distracted decision makers from the transition to new principal standards, with the result that early implementation was bumpy. The end of an initial trial of a new standards-based evaluation system in 2012 coincided with the superintendent's resignation. An interim superintendent led the district for the next year while the county executive sought and won legislation giving him authority over the district and reorganizing the school board. Under conditions of temporary instability, a small group of hard-working district staff refined the new standards, designed an evaluation system, and submitted the standards to the state for approval in 2013. Principal supervisors and principals had little opportunity to learn about the standards in depth before a new superintendent took office in June 2013 and the approved system had to be rolled out. In the following year, though, district leaders were able to work more intensively to solidify the supervisors' understanding of the standards.

The cases of New York City and Prince George's County illustrate the possibility of discontinuity associated with either a superintendent who brings a new mandate or an unsettled interregnum between superintendents. In contrast, Charlotte-Mecklenburg and Hillsborough County had transitions that did not affect their work on standards. In each of those districts, the person named as interim superintendent and then as superintendent had already been closely involved with the process of standards development and use.

Districts expressed satisfaction with their work on standards

The standards were living documents that districts refined over the years. By 2012, just a year into the initiative, interviewees commented that the initial draft standards had been too-long lists that needed streamlining so that they could be of practical use. In later stages of the work with standards, gaps and ambiguities came to light when the districts used standards to shape principal evaluation or to anchor serious conversations about the work of the principalship. Many interviewees who had been part of the revision process said it had improved the clarity of the documents. Developing and using standards required attention and effort over time, but district staff reported that the work had been worthwhile.

Summary

After the initial editing of first drafts, all versions of the standards were usable tools. And after refinement on the basis of experience, the documents gave increasingly valuable structure and clarity to district policies on evaluation, hiring, and even principal preparation, according to district leaders. Some interviewees reported that standards and competencies for principals provided a shared language that was helpful to principals, aspiring principals, principal supervisors, and district leaders. It seems likely that using and revising the standards also gave district and school staff a chance to deepen their familiarity with them.

The work that the districts did on standards fulfilled their initial hope of communicating specific expectations for principal capabilities and principal performance. The standards helped ground the other Principal Pipeline Initiative components in practical terms, as we discuss in subsequent chapters.

3. Principal Preparation: Investment for the Long Term

The Principal Pipeline Initiative drew on research that identified desirable features for principal preparation (Darling-Hammond et al., 2007; Orr et al., 2010), but districts did not find preparation to be amenable to quick overhaul. They started the work quickly, redesigning or starting in-district preparation programs and working with university and non-profit partners to make changes in existing programs, seeking greater alignment of preparation with their standards and more use of research-based features. However, seeing the results of this work among incoming principals would take time because several years typically elapsed from the start of preparation to the first day on the job as a principal.

The Problem Facing Districts Initially: Preparation Was Largely Outside Their Control

The six districts were eager to hire principals who brought strong skills and knowledge. Their direct power over principal preparation had limits as of 2011, however. Individual educators did not need the district's permission to pursue and obtain certification as school-building leaders by completing a state-approved program in a university or nonprofit organization and meeting other state-established criteria. Districts might have little or no authority over program designs.

District leaders wanted a stronger role in program design and operations and in individual career choices. In order to manage preparation programs and opportunities, however, districts had to work with state requirements, the existing ecosystem of preparation providers, and limits on the resources available for new programs. All these limitations meant that any major structural change would be slow in coming.

Any changes in principal preparation would take time to affect a district's new crop of principals. Aspiring principals had a multi-year journey from the beginning of formal preparation to their first job as a principal, a journey that often included a stint as an assistant principal after receiving initial certification. The median time that elapsed from starting preparation to becoming a principal was ten years in Hillsborough County, three years in New York City, and an average of six years across all six districts, as reported by first- and second-year principals in 2015.

Takeaways

1. The districts reshaped principal preparation through new or revamped in-house programs and data-informed partnerships with other preparation providers.
2. District staff used data and their school visits to identify potential leaders.
3. Districts wanted to offer authentic, on-the-job leadership experience during preparation, but they struggled to mobilize enough sites and mentors for such experience.
4. Improving preparation was not a quick fix for the quality of new principals because principal preparation took years: among these six districts, the median time from starting preparation to becoming a principal ranged from 3 to 10 years.

Strategies: Starting Programs, Spotting Talent, and Bolstering On-the-Job Learning

All the districts took action on principal preparation under the Principal Pipeline Initiative. In various ways they initiated programs and made data-informed program improvements, partnered with universities or nonprofits, stepped up their efforts to spot talent, and worked to strengthen clinical preparation. District-by-district specifics are summarized in Exhibit 2.

Exhibit 2: Summary of initial status and actions taken in principal preparation, 2011-12 through spring 2015, by district		
District	**Status as of 2011-12**	**Key actions taken through spring 2015**
Charlotte-Mecklenburg	Program partnerships in place with a university and a nonprofit. Nonprofit program including a year-long residency.	Co-developed programs with two more universities. Phased down the nonprofit partnership. Piloted a district-run program.
Denver	Program partnerships with a university and a nonprofit. Participants being selected for a district-run program to start in 2012-13. University program including a year-long residency.	Co-developed two more university programs. Operated the new district-run program, with a year-long residency (but allowing the participant to choose an internship in the home school instead). Gained authority from the state to issue principal licenses.
Gwinnett County	Mandatory district-run program for aspiring principals. Optional district-run program for aspiring assistant principals. Partnerships initiated with four universities.	Added a semester-long residency to the district program for aspiring principals. Encouraged principals to hire graduates of the district program for assistant principals. Maintained four university partnerships and added a fifth.
Hillsborough County	Largely mandatory district-run program for aspiring principals. New, mandatory district-run program for aspiring assistant principals. Partnerships initiated with two universities.	Increased selectivity of the district-run programs. Revised content of the district-run program curricula to align with district standards for principals. Maintained the university partnerships and added others.
New York City	Program partnerships with two nonprofits, with residencies. District-run program with a summer residency. Partnerships initiated with two universities. Accountability for the school support networks that included measures of their record of identifying prospective leaders.	Reconfigured university partnerships: selected different universities to participate; shifted the focus of the partnership from changing coursework to changing the internship. Developed guidance for applicants and a common application process for partner programs.
Prince George's County	Program partnership with a nonprofit, with a residency. Partnership initiated with a university. Curriculum being developed, with a partner, for a district-run program to start in 2012-13.	Added university partnerships for a more diversified preparation portfolio. Phased down the nonprofit partnership. Operated the district-run program, and increased its selectivity.

Launching and strengthening programs

All six districts started or expanded their own, district-run principal preparation programs for high-potential assistant principals. Five districts did this in 2011-12, and Charlotte-Mecklenburg followed in 2014. Denver, Prince George's County, and Charlotte-Mecklenburg initiated new programs, while Gwinnett County, Hillsborough County, and New York City worked to strengthen their existing programs.

All of the districts worked with universities, heeding the advice of Wallace-supported research that had found that a program based in a university could have more staying power than one based in the district (Orr et al., 2010). Charlotte-Mecklenburg and Denver already had certification programs custom-designed and jointly led in partnerships with nearby universities. District officials were directly involved in recruiting and screening candidates for admission to the programs. These programs continued, and the two districts added other, similar partnerships. In each of the other four districts, top leaders initiated partnerships with nearby universities. All districts were selective in choosing partners, using criteria such as: philosophical alignment with the district's beliefs about leadership competencies and how to develop them; willingness to communicate often; and openness to program changes. New York City and Prince George's County established dedicated university programs for aspiring leaders, tailored to district standards and needs, with fellowship support for enrollees. Gwinnett and Hillsborough Counties formalized their relationships with selected university programs for administrator certification. District officials met regularly with the program leaders in the universities, seeking to influence program design and curriculum.

Four districts also had prior agreements with selective nonprofit programs that offered an alternate route to principal certification, with a residency. New Leaders prepared principals for high-poverty schools in urban districts across the country including Charlotte-Mecklenburg, New York City, and Prince George's County; the New York City Leadership Academy's core mission at its founding in 2003 was to prepare principals for New York City, with an emphasis on principals for struggling schools; Get Smart Schools (now Catapult Leadership) offered a two-year program in Denver that placed its residents in charter schools, aiming to cultivate innovative leadership. The scope of most of these agreements with nonprofits shrank over the years of the initiative, however. Cost was a factor, as was the districts' perception that they had improved their own capacity to design and carry out in-house preparation.

Systematically assessing programs

District and partner-program leaders pointed to ongoing, systematic discussion of program data as a contributor to the value of partnership arrangements. They used Quality Measures for Education Leadership Systems and Programs, a suite of tools developed by Education Development Center with Wallace support that includes indicators and rubrics for assessing leader preparation programs. It is organized around program components associated with program effectiveness (Darling-Hammond et al, 2007): course content and pedagogy; clinical practice; recruitment and selection; and three components related to graduate performance outcomes (knowledge, skills, and competencies; responsiveness to market demand; and impact on school, teacher, and student performance). The Principal Pipeline Initiative provided facilitators, training, and protocols for districts and program leaders to assess these program components, systematically gathering and rating the evidence.

The districts' Leader Tracking Systems, developed over the years of the initiative, added to the store of data that could readily be used for data-based program improvement. As of 2015, use of the data in these systems for ongoing program assessment was just beginning.

Selectively encouraging individual aspiring leaders

Another strategy involved spotting talent and guiding selected individuals—but not others—to growth opportunities. Looking back in 2015, a top district leader said a goal of participating in the Principal Pipeline Initiative had been to change:

> ... this whole [process of] individual people self-selecting themselves, going into leadership [programs], …when maybe they aren't the right people to eventually be principals, and it's allowing us to be very purposeful, very intentional, and taking [selected individuals] through a very supportive process.

All districts encouraged principals to find and cultivate rising talent, and some expanded the circle of responsibility for developing aspiring principals to include other district staff, including principal supervisors and leaders of district divisions such as curriculum and instruction or special education. District staff who visited schools were responsible for finding and encouraging potential future principals. A New York City official explained in 2012 how the networks and clusters (support teams that provided assistance to schools) were held accountable for identifying leadership talent. A leader in Charlotte-Mecklenburg spoke in 2013 of the responsibility of area administrators: "We see our zone executive directors as capacity builders and talent identifiers for future principals."

Districts that operated in-house preparation programs or collaborated closely with university programs worked to set a high bar, based on district standards, for admission to those programs. Gwinnett and Hillsborough Counties had two opportunities to screen would-be leaders in the admissions processes for their district-operated preparation programs, once with aspiring assistant principals and then with sitting assistant principals who aspired to be principals. A Hillsborough County leader explained the high stakes, saying that selection for its in-house programs offered "a pretty straight line to a hiring process" for a principalship.

All six districts provided aspiring leaders with structured information about preparation opportunities to help them plan. In New York City, the district developed a page on its website with capsule descriptions of all the preparation programs in the district or with which it partnered, with links to their websites, and that page became the second-most widely viewed page on the district's site. By 2015, the district had moved to a single application for multiple preparation programs operated by the district and its partner organizations and universities.

Selective encouragement meant, inevitably, dampening the hopes of some aspiring leaders. In Prince George's County in 2014-15, a district official offered an after-school session for aspiring leaders titled, "So You Want To Be an Administrator." It was well attended. The speaker itemized all the needed credentials and each of many kinds of experience in schools, pausing after each one to ask audience members to raise their hands if

they had that credential or that experience. When most hands were raised at each step, he urged the attendees to think critically about the way they were preparing to compete successfully for principalships.

Strengthening on-the-job learning

Research that informed the Principal Pipeline Initiative said that the clinical component of principal preparation is critically important (Darling-Hammond et al., 2007). Three districts added ambitious clinical arrangements to their own programs: Gwinnett County moved the participants in its principal-preparation program into different schools for 90-day residencies;[3] Denver moved participants into different schools for a full-year residency; and Prince George's County had developed a full-year residency program to start in summer 2015 for selected assistant principals who had completed its principal preparation program. In all the districts, too, one or more stages of preparation involved leadership-related projects that participants carried out in their own schools.

In a shift in direction starting in 2014-15, New York City altered the terms of its agreements with partner universities. Rather than focusing on an effort to reshape the academic curriculum, the new agreements allowed the district to enhance internships. The district shifted funds out of fellowships and into support for mentor principals. A district official commented that this could meet needs of the universities as well as those of the district and participants:

> I think [the universities'] point of frustration was that they didn't have much power to ...hold principals accountable for authentically mentoring their aspiring leaders. ...We have more power to change [mentoring] because we can pay the principal to do it,... and we can require principals to come to some training. And we can also give the schools some money that really enables them to free the person up from their classroom teaching responsibilities so that they actually can engage in an internship.

Accomplishments, Challenges, and Lessons

District leaders believed that their role in preparation had benefits

Looking at their own preparation programs and the closest partnerships with universities, district leaders saw reasons to think that their involvement with the programs was serving district purposes. In particular, they were glad that a selective admissions process gave the district a checkpoint for spotting high-potential leaders; district leaders who conducted class sessions had a chance to observe and size up the rising cohort of principal candidates; and program content tailored to the principalship routines and priorities of the district immersed aspiring leaders in those routines and priorities.

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3 "Residency" was the term used most often for placement in a new setting for an extended period (e.g., at least a month, and up to a full school year) as an apprentice leader.

Alignment with standards was a strength that district leaders cited in some preparation programs, especially their own programs. Districts could use their leader standards both in admissions criteria and in program curricula. Hillsborough County's work on alignment, for example, included use of the district's key competencies in the criteria for admission to district-run preparation, and the alignment committee spent a year on program development, trying to ensure that at each stage of preparation the aspiring principals would have opportunities to develop those specific competencies.

By 2015 only a minority of incoming principals had been through all-new preparation programs

Our surveys can offer only partial evidence on the results of districts' work on preparation because most of the survey respondents had begun their preparation before program changes took place. Among the first- and second-year principals surveyed in spring 2015, the median elapsed time from starting preparation to becoming a principal had been six years, averaged across districts. It was highest in Hillsborough County (ten years) and lowest in New York City (three years). This meant that when the two newest cohorts of principals looked back on the totality of their preparation experience in 2015, as our survey asked them to do, most were looking at experiences that had begun before the Principal Pipeline Initiative began in 2011. The initiative could have affected only part of their formal preparation.

It is not surprising, then, that most responses to our survey did not show statistically significant change in reported experiences across these cohorts of principals. Responses were similar over time on questions about program design features (use of case studies, portfolios, problem-based learning, and field-based or action research projects). They were also similar with respect to the programs' emphasis on instructional leadership and leadership for school improvement.

However, one difference over time was statistically significant: new principals in the later cohorts gave higher ratings on the extent to which their preparation experience, overall, had given them "a strong orientation to the principalship as a career" (Exhibit 3). On that question, the mean among principals who started on the job March 2010 through February 2012 was 4.01 on a five-point scale, and it rose to 4.19 for those who started on the job from March 2013 through February 2015 (t[619]=5.04, p<.05). The percent of novice principals in those cohorts giving the highest response, "to a great extent," is shown for descriptive purposes in Exhibit 3, along with a mean of the percentages across districts.

Exhibit 3: Novice principals reporting preparation gave them a strong orientation to the principalship as a career to a great extent, by district and cohort

Legend:
■ Principals who started on the job from March 2010 through February 2012
■ Principals who started on the job from March 2013 through February 2015

District	2010–2012	2013–2015
CMS (N=25; N=38)	36	50
DPS (N=34; N=40)	29	35
GCPS (N=31; N=29)	52	66
HCPS (N=35; N=34)	9	29
NYC (N=95; N=200)	34	33
PGCPS (N=24; N=35)	29	51
Six-District Mean % (N=6; N=6)	31	44
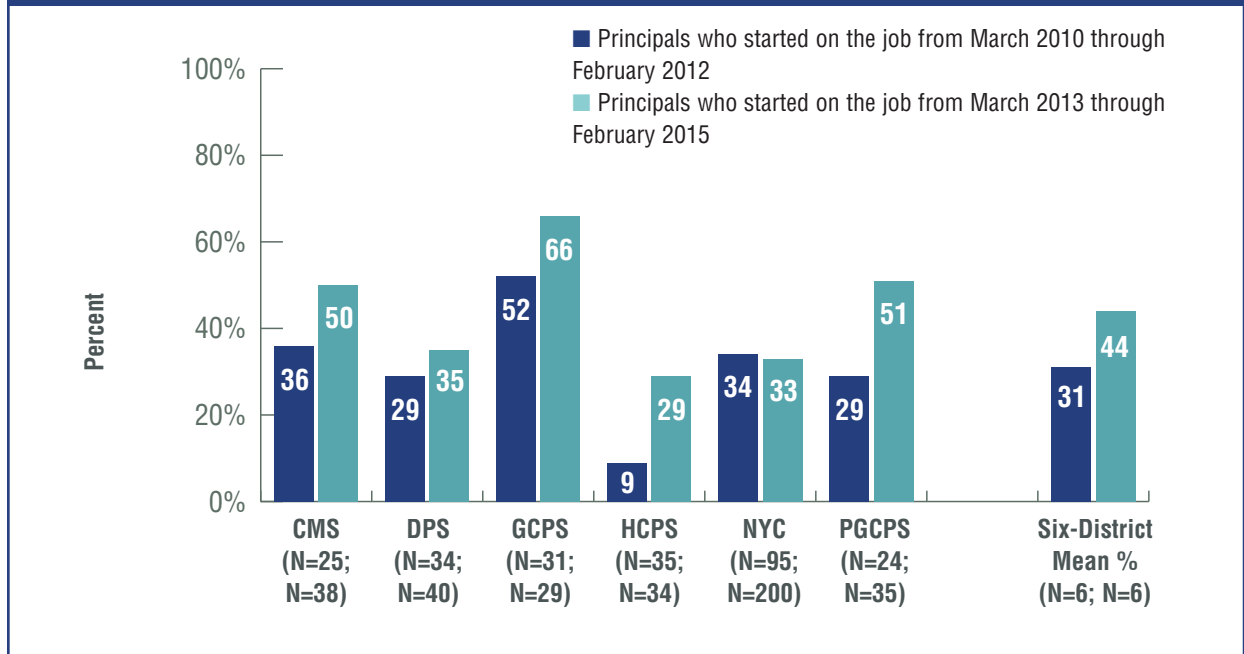
Exhibit reads: The percent of principals who reported that their leadership preparation training program(s) gave them a strong orientation to the principalship as a career "to a great extent" was 36 percent for principals who started on the job from March 2010 through February 2012 and 50 percent for principals who started on the job from March 2013 through February 2015 in Charlotte-Mecklenburg.

Source: Principal Survey for "Evaluation of the Principal Pipeline Initiative," 2013, 2014, and 2015.

Principals' reports of their internship or residency experiences during preparation also did not show consistent changes across districts. However, some positive change was apparent in Denver (although the changes were not statistically significant): some key features of clinical experience received higher ratings from later cohorts of principals compared with the two cohorts who started on the job by February 2012 (Exhibit 4). This change in ratings occurred at the time when Denver instituted a district-run residency.

Exhibit 4: Denver novice principal reports on attributes of their internship/residency, by cohort

I was closely supervised and assisted by knowledgeable school leaders
- 24 | 24 — Started on the job from March 2010 through February 2012 (N=29)
- 44 | 22 — Started on the job from March 2013 through February 2015 (N=32)

I had responsibilities for leading, facilitating, and making decisions typical of an educational leader
- 31 | 34
- 50 | 25

I was able to develop an educational leader's perspective on school improvement
- 28 | 31
- 34 | 44

Percent: 0% 20% 40% 60% 80% 100%

■ To a great extent ■ To a considerable extent

Exhibit reads: Twenty-four percent of principals in Denver who had an internship/residency and who started on the job from March 2010 through February 2012 reported that they had been closely supervised and assisted by knowledgeable school leaders to a great extent, and 24 percent reported this was the case to a considerable extent.

Source: Principal Survey for "Evaluation of the Principal Pipeline Initiative," 2013, 2014, and 2015.

Districts faced practical barriers to a robust clinical experience in principal preparation

Improving clinical experience was a priority, but districts struggled to make it happen. Moving aspiring principals out of their schools for a residency in a different school could be disruptive and expensive, according to district leaders. The vacated position in the original school had to be filled in some way, potentially at a high salary. A cost-saving approach did emerge in Gwinnett County, though, as a district official explained: "We started with hiring part-time folks to backfill. That's where the cost really came, and we've slowly gone to asking principals to repurpose people in their building to backfill." For a teacher leader, temporarily filling the job of assistant principal could offer a chance to develop leadership skills while saving the district the cost of a higher-paid part-time substitute for the assistant principal.

An authentic leadership experience did not occur automatically but depended critically on the will and skill of the sitting principal in the intern's or resident's building, according to district and program leaders. According to district leaders and focus-group participants, some supervising principals readily included

aspiring leaders in instructional leadership activities, but others gave them tasks such as bus and lunchroom duty or assessment logistics that provided limited opportunities for growth. Some internships or residency participants said they spent much of their time shadowing the principal or had little change in responsibility from their previous position.

By 2013, several district leaders spoke of improving their communication with and training of mentor principals, hoping to influence the assignments they gave to aspiring leaders and to build the principals' capacity as talent developers. One district leader prefaced a description of her plans by explaining,

> I haven't done as good of a job at getting their principals in and telling them, "[Leader development] is your responsibility. This is what this candidate needs to learn. You need to make sure they have actual experiences and actually prescribe those things to them and do a better job developing them."

In another district, a leader said of these mentor principals:

> We've started to invest a whole lot more time and attention to how we work with them. How do we support them? How do we help them understand what is the role of the mentor? How they should be creating opportunities for folks to learn on the job?

Summary

It is too early to determine the full effects of the districts' investments in principal preparation. Creating or modifying programs took time. Finding effective and practical structures for internships or residencies was a work in progress. The districts did make progress at a structural level: they initiated and iteratively strengthened programs; they forged partnerships with universities whose institutional stability might improve the chances of stable programming; and they introduced and began to routinize ways of identifying and encouraging potential principals. In short, the districts launched strategies for intervention in principal preparation. They were continuing to refine program design and implementation as of 2015, however.

Our survey data also lend an important perspective on the time horizon for improving the preservice preparation of incoming principals. Interventions designed in 2011 could not shape the entire preservice experience of new principals by 2015—particularly when some of these interventions actually added early stages to a required sequence of preparation experiences. A more complete picture of the effects of changes in principal preparation will have to emerge over the coming years.

4. Principal Hiring and Placement: Quick Wins

District leaders were eager to improve the processes of principal hiring and placement. They moved quickly to develop and refine standards-based processes and gather more data about applicants. Over time, they built and began to use elaborate data systems in hiring, placement, and succession planning.

The Problem Facing Districts Initially: Hiring Was a Pain Point

Leaders in all the districts had at least minor concerns about their procedures for hiring and placement as of 2011-12, and in four districts the concerns were pressing. Top leaders said they felt some uncertainty that they were placing the best possible candidate in each school. Most reported an unsystematic process of filling vacancies one at a time and a lack of hard, usable data about candidates. Only in two districts, Charlotte-Mecklenburg and Gwinnett County, did leaders report having made good progress in their hiring and placement systems before the Principal Pipeline Initiative began. Charlotte-Mecklenburg had created selective "talent pools" for would-be principals and assistant principals, and expected to fill all open leadership positions from among the candidates who had cleared the bar for entry into these pools. Gwinnett required aspiring principals to participate in its selective preparation program and take part in performance assessments before becoming eligible for principal jobs.

Before grant award, the other four districts (Denver, Hillsborough County, New York City, and Prince George's County) essentially posted open positions one at a time and considered applications from anyone holding the state-required certification. Hillsborough County preferred the candidates who had been in its in-house preparation program, and New York City had a "hiring pool" of license holders who had met a few additional requirements set by the state, but these criteria did little to alleviate concerns in either district. Two districts provide examples of the kinds of shortcomings that district leaders were eager to fix:

- In Denver in 2011-12, the hiring process was decentralized and ad hoc. A principal supervisor for a group of schools took the lead in inviting applications for each vacant or soon-to-be-vacant principal position, identifying specific criteria for that position. Applications would then arrive from candidates who saw the job posting. Districtwide, there was dissatisfaction with the effort and the

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> ### *Takeaways*
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> 1. Policies and procedures for principal hiring were not hard to change, and results were visible in survey responses.
> 2. Planning for principal placement became a more systematic, data-informed process. New Leader Tracking Systems offered insights into rising talent and emerging leadership needs.
> 3. New hiring procedures required candidates to demonstrate skills aligned with principal standards.
> 4. Districts still found it hard to spot candidates with the needed interpersonal skills.
> 5. Success in placing principals was increasing, according to principals' reports: novice principals more often reported that their skills were an "excellent" fit with their schools in 2015 than in 2013.

results. Time was spent in screening unqualified applicants; a single candidate might go through half a dozen school-by-school selection processes; and it might turn out that the candidate placed as principal of one school would have been a better fit for a different school that happened to post its vacancy later.

■ Prince George's County relied heavily on interviews to assess candidates, a process that took time and was widely described as "it's who you know." District leaders were also concerned that the lack of specific feedback to applicants meant that aspiring principals would simply continue to apply for vacant positions without having a good opportunity to develop the skills they needed.

Strategies: Using Data in Succession Planning and Multi-Stage Candidate Selection

Districts eagerly implemented a set of procedural changes in hiring. They introduced longer-range planning around possible vacancies, preliminary selection stages for candidates, and simulations designed to reveal candidates' strengths and weaknesses. By 2015 they were in the early stages of using their Leader Tracking Systems to support data-informed hiring and placement. Each district's major changes in hiring are shown in Exhibit 5.

Lengthening the time horizon for succession planning

Changes made in Denver illustrate a systematic approach to succession planning, in contrast to the previous ad hoc system of reacting to vacancies when they arose. Under the new system, top leaders and principal supervisors began identifying specific vacancies and projecting an overall number of vacancies in the fall—something they had not done before. They also discussed assistant principals and others who might be candidates for leadership roles or further preparation. Development of a hiring pool complemented this work of identifying vacancies and possible candidates well in advance. A rolling process of application review produced a principal pool of dozens of candidates by spring. As vacancies arose, the district quickly filled some from the pool, and district leaders were generally confident in late spring that they had a good range of candidates ready for the likely vacancies.

Exhibit 5: Summary of initial status and actions taken in principal hiring and placement, 2011-12 through spring 2015, by district

District	Status as of 2011-12	Key actions taken through spring 2015
Charlotte-Mecklenburg	Selective hiring pool from which principals were to be hired. Centralized selection for the hiring pool. Finalists for specific school vacancies recommended by principal supervisors.	Added practical demonstrations in the selection process for hiring pool and principal positions. Principal supervisors were trained in rating applicants. Began using Leader Tracking System in hiring and placement.
Denver	Candidates identified for each vacancy by principal supervisors, who developed job descriptions and reviewed applications.	Instituted a hiring pool. Succession planning engaged principal supervisors and top leaders in discussing anticipated vacancies and candidates. Added practical demonstrations in the selection process for hiring pool and principal positions. Principal supervisors were trained in rating applicants. Began using Leader Tracking System in hiring and placement.
Gwinnett County	Practical demonstrations used in the selection process for principal positions and for the prerequisite district-run preparation program.	Began using Leader Tracking System in hiring and placement.
Hillsborough County	Hiring based on interviews with top district leaders, with newly standardized procedures.	Succession planning engaged principal supervisors and top leaders in discussing anticipated vacancies and candidates. Added practical demonstrations in the selection process for principal positions and for the prerequisite district-run preparation program. Began using Leader Tracking System in hiring and placement.
New York City	A hiring pool including all candidates who held the appropriate license and had completed simple performance tasks. Identification of candidates by school support networks. Selection by regional superintendents.	Required practical demonstrations on skills aligned with standards for those in the hiring pool. Made the Leader Tracking System available to principal supervisors for use in hiring and placement.
Prince George's County	A new system of practical demonstrations aligned with new principal standards, replacing a previous system that relied on recommendations and interviews.	Refined the components of the selection process. Began using Leader Tracking System in hiring and placement.

Introducing more ways to assess candidates' skills

Prince George's County was a district that moved quickly to revamp its hiring procedures, seeking a new, data-informed basis for hiring. Recommendations and "popularity" were outweighed by new measures that offered promise of greater objectivity and precision, and that were aligned with standards. A district official explained in 2012:

> People must demonstrate that they have the ability to carry out standards—they conduct an observation, they analyze data, they create a vision statement. All these things are a part of the work that has emerged from the standards.

Other districts, too, added steps to their assessment procedures for aspiring leaders, requiring them to demonstrate skills aligned with local leader standards. Consulting firms with expertise in human capital systems in education helped in developing customized tools and procedures. By 2015, assessment procedures in all districts included practical demonstrations, typically with simulated scenarios. Several assessments would occur over a day or more. They could include:

- Role play: the candidate takes the role of principal responding to a difficult semi-scripted scenario.

- In-basket exercise: the candidate prioritizes and addresses a set of tasks and messages that might arrive in an in-basket.

- School data review: the candidate receives a package of school data and makes recommendations for data-informed improvement in that school.

- Teacher observation and feedback: the candidate observes a video of teacher instruction and provides the written or oral feedback that he or she would give to the teacher.

Building a Leader Tracking System to provide insight into rising talent

Districts welcomed the chance to use more data in hiring, a process facilitated by the development of a Leader Tracking System that captured individual, longitudinal data on experience, performance, and assessed competencies. With Wallace Foundation encouragement and financial support, districts pulled together the pieces of data that had resided in separate data systems or on spreadsheets. This was laborious work in most cases, but consultants helped with system design and development. Examples of data that districts began using in hiring and placement included: relevant student achievement data as a teacher and assistant principal; on-the-job evaluation scores as a teacher and assistant principal; experience with certain types of schools and students; language skills; performance on selection and exit assessments in preparation programs; and measured competencies related to instruction and leadership.

As data on candidates increasingly arrived in a standard, user-friendly format, decision makers could find and use relevant facts more readily. In Prince George's County, the summary information was called "the baseball card." In Hillsborough County, a district leader said in 2015 that decision makers were "using the tool…. Not only do you get information about the candidate, you can do a comparison report. So say you're down to five candidates that really all seem good, you can actually click on a comparison report and see them all side by side." Thus, for example, district leaders said in interviews that they might look for a candidate who had experience in particular grade levels or with English language learners and whose measured competencies matched the needs that they saw in the school. None claimed that matching was becoming an exact science, but they welcomed an easier process of spotting candidates whose backgrounds they considered promising matches for a school's most visible needs.

Adding selection stages

By 2014, all districts had selection stages and assessments that preceded—sometimes by several years—the hiring of a principal to fill a vacancy. One key purpose was to ensure a pool of high-quality candidates by using multiple stages of scrutiny. In Gwinnett and Hillsborough Counties, would-be principals faced three selection gates before they could apply for principalships: they had to be selected for the district's assistant principal preparation programs, then selected as assistant principals, and then selected for the district's principal preparation program. Denver and Prince George's County instituted selective pools for aspiring principals, which was a step that Charlotte-Mecklenburg had taken in 2011. New York State tightened the requirements for entry into the hiring pool statewide, and New York City introduced new assessments for candidates who were in the pool, not to disqualify anyone but to inform hiring managers' decisions with additional data.

Systems of selection into a prerequisite program or talent pool also promised to streamline the process of filling principal vacancies by limiting the number of potential applicants for each vacancy. This was a priority. Over the years, staff in some districts complained about a deluge of applications for each open position if they said they had not done enough to limit eligibility—or expressed relief that they had stemmed the tide through limits on eligibility. District managers in Prince George's County cited their vivid memories of the numbers: "We put out a principal posting and over eight hundred applied," said one.

Accomplishments, Challenges, and Lessons

Changes in hiring and placement offered quick wins for districts

Unlike a change in the preparation component of the pipeline, a change in hiring and placement procedures could immediately affect the next cohort of incoming principals. This was evident in new principals' survey responses about simulations as part of the hiring process (Exhibit 6). Among the two earliest cohorts of principals surveyed, who started on the job in 2010-11 and 2011-12, these practical demonstrations had

been part of the application experience (in applying for a talent pool or for a principal position) for 31 percent, across districts. The rate of practical demonstrations rose to 59 percent for the two latest cohorts, those who started on the job in 2013-14 or 2014-15. This was the selection procedure that showed the greatest increase over time.[4] In terms of a weighted overall response across districts, the change was statistically significant.

Exhibit 6: Novice principals reporting participation in practical demonstrations in the principal application and hiring process, by district and cohort

Legend:
- Principals who started on the job from March 2010 through February 2012
- Principals who started on the job from March 2013 through February 2015

District	Principals who started March 2010–Feb 2012	Principals who started March 2013–Feb 2015
CMS (N=26; N=48)	38	77
DPS (N=38; N=44)	34	75
GCPS (N=31; N=29)	32	59
HCPS (N=35; N=34)	9	32
NYC (N=121; N=237)	50	58
PGCPS (N=29; N=41)	24	51
Six-District Mean % (N=6; N=6)	31	59

Exhibit reads: Participation in practical demonstrations as part of their district's formal application and hiring process was reported by 38 percent of principals who started on the job from March 2010 through February 2012 and 77 percent of principals who started on the job from March 2013 through February 2015 in Charlotte-Mecklenburg.

Source: Principal Survey for "Evaluation of the Principal Pipeline Initiative," 2013, 2014, and 2015.

District leaders communicated a noticeable sense of excitement when interviewed about the hiring process. Superintendents whose districts had made changes in information systems or succession planning said they were enthusiastic about those changes. Other interviewees also reported that performance assessments appeared to provide a more authentic understanding of candidates' competencies, compared with the previous interview-based hiring procedures. A Denver principal supervisor interviewed in 2014 summed up the benefits of instituting a talent pool:

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4 Our survey data do not specifically identify the time(s) when a particular respondent applied to a hiring pool or applied for a principalship. We use the time of becoming a principal (i.e., the earliest two cohorts vs. the latest two cohorts) as a rough proxy for the time when groups of respondents experienced the hiring process.

Looking at the principal pool, we have had several changes and have finally gotten to giving us better options for principal candidates. The screening process for candidates to enter into a pool has greatly increased the level of expertise and quality of principals. Doing all the pre-work up front has led to higher-level candidates.

The process of feedback to applicants also improved, addressing another problem that had initially concerned district leaders. About two-thirds of the novice principals who started on the job from early 2013 to early 2015 reported that the hiring process gave them useful feedback. This represented an increase over time, especially at the stage of selection into a hiring pool.[5] Among all novice principals who had applied to a hiring pool, the later cohorts were somewhat more likely than an earlier cohort to say that their professional practice had been informed by feedback from that application, although the change was not statistically significant (Exhibit 7). Perceptions of feedback at the hiring stage showed less change but remained relatively positive, rising from an average of 63 percent of respondents to 69 percent, across districts, agreeing that it had helped inform their practice (Exhibit 8).

Exhibit 7: Novice principals agreeing that as *candidates for a hiring pool* they received useful feedback for their professional practice, by district and cohort
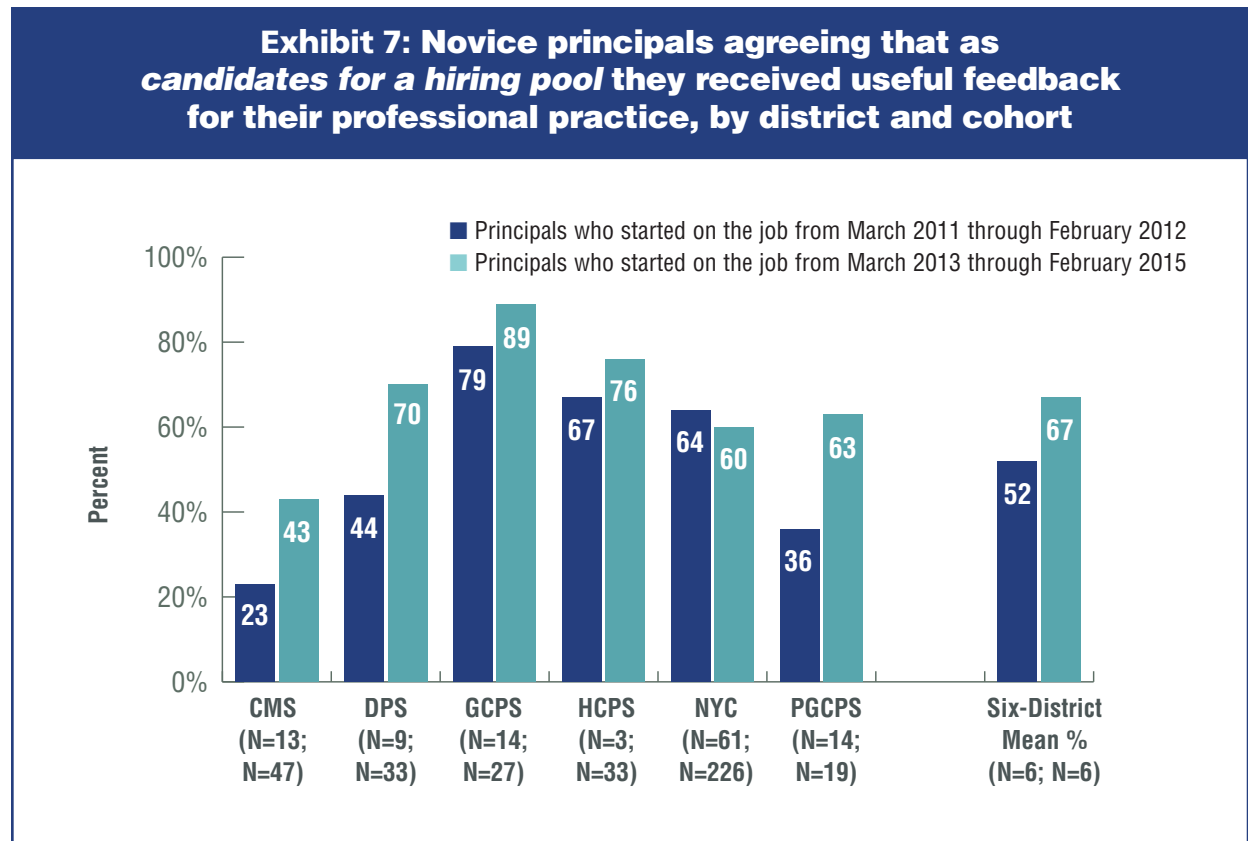
Exhibit reads: Among Charlotte-Mecklenburg principals who had applied for a hiring pool, 23 percent of those who started on the job from March 2011 through February 2012 strongly agreed or agreed that they received feedback from that application process that was useful for purposes of informing their professional practice; 43 percent of those who started on the job from March 2013 through February 2015 strongly agreed or agreed.

Source: Principal Survey for "Evaluation of the Principal Pipeline Initiative," 2013, 2014, and 2015.

5 Because this question was asked for the first time in 2014, we do not have responses from the principals who started on the job in 2010-11; that cohort was surveyed only in 2013.

Exhibit 8: Novice principals agreeing that as *candidates for a principal position* they received useful feedback for their professional practice, by district and cohort

Legend:
- Principals who started on the job from March 2011 through February 2012
- Principals who started on the job from March 2013 through February 2015

District	2011–2012	2013–2015
CMS (N=12; N=46)	58	59
DPS (N=21; N=40)	48	63
GCPS (N=7; N=23)	86	83
HCPS (N=3; N=34)	67	65
NYC (N=53; N=218)	72	70
PGCPS (N=4; N=33)	50	73
Six-District Mean % (N=6; N=6)	63	69

Y-axis: Percent (0% to 100%)
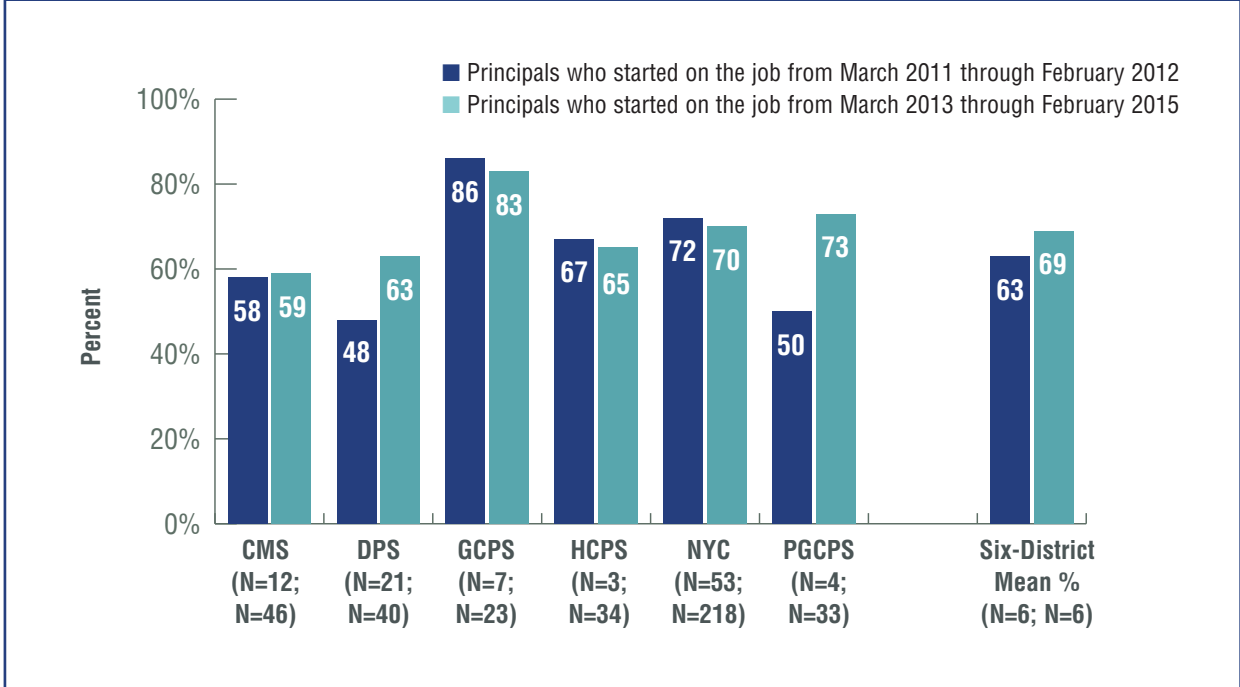
Exhibit reads: The percent of principals who strongly agreed or agreed that they received feedback that was useful for purposes of informing their professional practice as a candidate for principal positions was 58 percent for principals who started on the job from March 2011 through February 2012 and 59 percent for principals who started on the job from March 2013 through February 2015 in Charlotte-Mecklenburg.

Source: Principal Survey for "Evaluation of the Principal Pipeline Initiative," 2013, 2014, and 2015.

Novice principals' perceptions of their fit with their school improved

Districts seemed to get better at placing principals where they were needed. Principals who started on the job at a time from March 2013 through February 2015 were more likely than earlier cohorts to self-report an "excellent" fit with the school in which they were placed (Exhibit 9). The increase in the weighted response across districts was statistically significant. It is possible that this change reflected improvement in the districts' processes for screening and placing principals, which changed over the period of our surveys. Research suggests that this perception of fit could be a leading indicator of retention and success on the job (Kristof-Brown, Zimmerman, & Johnson, 2005).

Exhibit 9: Novice principals reporting an "excellent" fit of their skills, experiences, and interests with the needs of their school, by district and cohort

■ Principals who started on the job from March 2010 through February 2012
■ Principals who started on the job from March 2013 through February 2015

| District	Cohort 1	Cohort 2
CMS (N=26; N=48)	62	77
DPS (N=38; N=44)	50	64
GCPS (N=31; N=29)	71	93
HCPS (N=35; N=34)	69	74
NYC (N=121; N=237)	48	62
PGCPS (N=29; N=41)	62	61
Six-District Mean % (N=6; N=6)	60	72

33
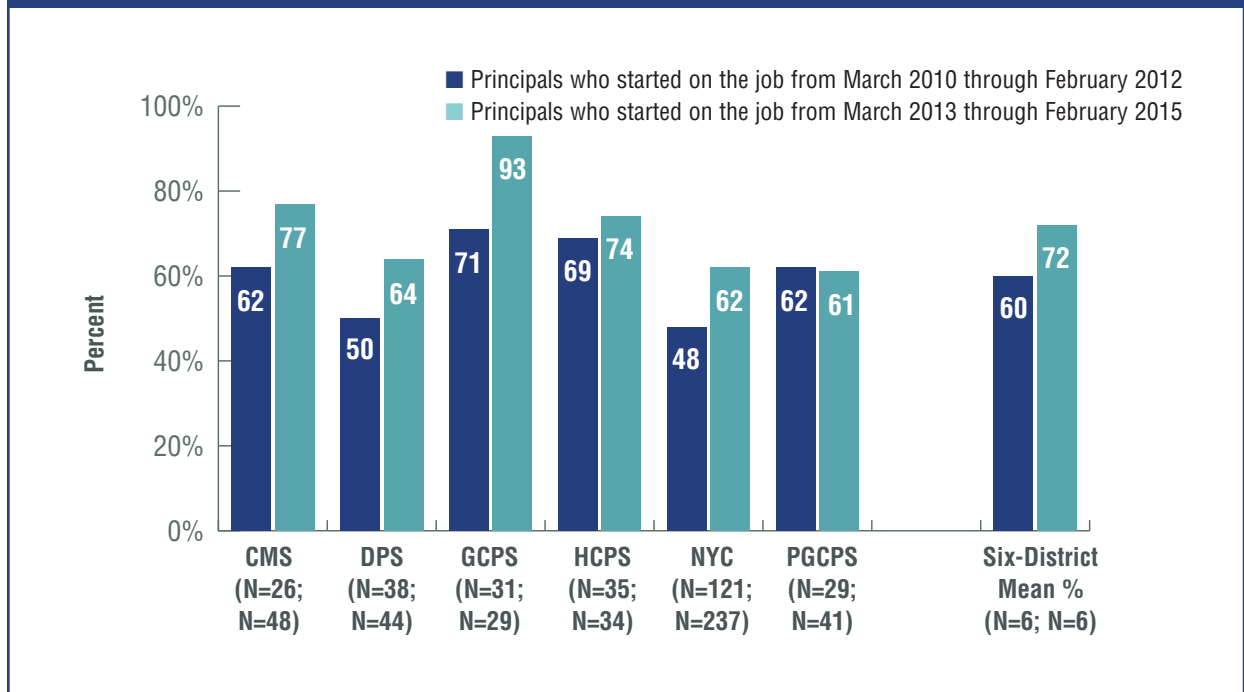
Exhibit reads: The percent of principals who characterized the fit between their skills, experiences, and interests and the needs of the school where they are principal as "excellent" was 62 percent for principals who started on the job from March 2010 through February 2012 and 77 percent for principals who started on the job from March 2013 through February 2015 in Charlotte-Mecklenburg.

Source: Principal Survey for "Evaluation of the Principal Pipeline Initiative," 2013, 2014, and 2015.

The changes in hiring and placement required investments of staff time

The changes made in selection procedures and data systems took nontrivial amounts of staff time, both initially and on a continuing basis, according to interviewees at the district level. In Charlotte-Mecklenburg, for example, several senior district staff members attended each talent-pool candidate's multi-hour session of performance assessments and interviews. As one participant put it, "It has been very time-consuming…. I'm not going to sugar-coat that. We're going to see if all that time commitment is worth it." In New York City, a small and dedicated group of central-office staff and willing principals rated the performance of principal applicants, and the strain associated with the time commitment was clear when we interviewed group members.

For Leader Tracking Systems, much work had to take place in order for individual data to be accessible. Designing and populating a Leader Tracking System took time and required the expertise of specialists whom the districts employed or retained as consultants, as well as assistance and expert review from

consultants whom The Wallace Foundation engaged. In each district there were problems to be solved in pulling the data together and designing user interfaces. In New York City, for example, retrieving data from multiple data systems was a major challenge in the years from 2012 through 2014, according to interviewees working on that task.

User-friendliness was another challenge. District information-technology staff spoke of "being able to talk across the user and technical perspectives" in the effort to find and organize the most relevant data. Focus groups with prospective users began to clarify ways of organizing the information. Still, a staff member said of those prospective users, "When they say what they want, there may be a hundred decisions [still needed] about what they *really* want."

District leaders reported positive perceptions of their new principals, but shortages of some needed skills and dispositions

District leaders were asked in 2014 and 2015 to provide an informal assessment of their latest cohorts of novice principals. In general, they spoke very positively. They especially praised the new principals' knowledge of instruction.

Some kinds of schools continued to pose challenges for leadership selection. It was common for high schools to draw too few strong candidates. Leaders in all districts also acknowledged challenges in finding the right candidates for high-need schools. These could include schools with low student achievement or low family incomes, or schools in which parents of high socioeconomic status made many demands on the principal. District leaders in Charlotte-Mecklenburg and Hillsborough County said in 2014 that they had seen both high-achieving and low-achieving schools pose leadership challenges, and that they still did not have as many strong candidates as desired when a vacancy arose in a school of either kind.

In all districts, top officials expressed concerns that their hiring systems had not done enough to spot those leaders who could effectively build relationships, a positive culture, and a shared sense of commitment among the adults in their school. The following comments about incoming principals, each from a different district, were typical:

> They're very passionate people. They get into the school ready and passionate to make a change, and it's like they're coming in with a sledgehammer and making change, but … they don't realize— it's personal leadership skills, they're missing the boat. No one's following them if they're going in with a sledgehammer. So how do they navigate through that politically?… Are there ways they can navigate it better so it's not as disruptive a change?

> I think sometimes you have to remind them about relationship building. They go in, and sometimes they go head on, tackle things. They have to remember they're not part of the family yet.

> How do you use your positional authority? How do you read the culture of a school? … I would say more of our principals struggle … over their human relations and inability to get the work done through and with people.

With this concern in mind, district leaders said they wished they had better ways to measure emotional intelligence (the term used in Denver) or "micro-political" skills (the term used in Charlotte-Mecklenburg). They regretted having placed some principals whose relationship-building skills turned out to be a poor fit for their schools.

Summary

Top district leaders viewed the changes in hiring and placement processes as successes. A change such as the greater use of simulations for screening candidates could take effect quickly. With systematic consideration of likely vacancies and a pool of vetted aspiring leaders, a district could make more thoughtful matches. Data in the Leader Tracking Systems became available for use in hiring and placement. Even the remaining challenges of finding strong candidates for high schools and for high-need schools were at least coming into clearer focus thanks to more data becoming available earlier.

New principals' perception of their fit with their school improved during the study period, possibly signaling that success on the job was more likely. In general, too, district leaders spoke highly of the capabilities they saw in incoming principals by 2014-15. They wished that they had better ways of anticipating the challenges that a particular candidate would face in forging a strong bond with the teachers and community in a particular school. However, they reported increasing confidence that their new principals' skills in instructional leadership were strong.

5. Evaluation and Support: Help for Novices

Takeaways

1. The roles of principal supervisors changed. Supervisors took on pivotal roles in on-the-job evaluation and support for principals, and districts worked to build supervisors' capacity.
2. Most new principals reported in surveys that evaluation systems were accurate and informed their practice.
3. A large majority of new principals valued the support from supervisors, mentors, and coaches, according to survey reports.
4. Tailoring professional development to principals' individual needs was a continuing challenge for districts.

Districts were interested in using systems of evaluation and support as vehicles for improving new principals' performance. All the districts quickly developed evaluation measures and procedures; most revised these over time; and all worked to build the capacity of principal supervisors as key contributors to both evaluation and support. Principal supervisors, mentors, and coaches generally provided valuable support, according to principals' survey responses. Professional development, however, remained an area of some disappointment.

The Problem Facing Districts Initially: Some Novices Were Struggling

At the start of the initiative, district leaders said that evaluative ratings of new principals' strengths and remaining weaknesses should be linked to more robust systems of professional learning and tailored support. No district wanted to use evaluation as a means to weed out larger numbers of novice principals, and in fact leaders in three districts (Denver, New York, and Prince George's County) were concerned about high rates of voluntary or involuntary principal departures. District leaders wanted to see more novice principals succeed and remain on the job, and they believed that improved systems of evaluation and support could help. They also believed that evaluation rubrics should be aligned with their standards of principal professional practice. The following statements from district leaders in Denver and Prince George's County, respectively, in 2012 typified this view:

> The old evaluation system didn't clearly define what the instructional leadership components looked like. We're taking big steps forward, putting a stake in the ground around those components, with more clarity about overall performance. The old structure didn't have final rating categories. You'd just be renewed or non-renewed.

> We have had the same principal evaluation for years and years. It was perfunctory and didn't get at the leadership standards we wanted.

With respect to support, district leaders recognized that the job of principal could be a lonely one and that more skilled, experienced guidance and coaching might help. About two years into the initiative, a multi-district study by the Council of the Great City Schools, commissioned by The Wallace Foundation, concluded that principal supervisors in large urban districts often lacked the time and training to provide substantial support to principals (Corcoran et al., 2013).

Exhibit 10: Summary of initial status and actions taken in novice principal evaluation and support, 2011-12 through spring 2015, by district

District	Status as of 2011-12	Key actions taken through spring 2015
Charlotte-Mecklenburg	Specific, state-required standards used in evaluation system. A five-year induction sequence with district coaches and partner programs.	Continued to use state standards in evaluation. Hired more principal supervisors and trained them in using the evaluation system and in coaching. Continued and refined the five-year induction program.
Denver	Principal retention based on school performance and conditions. Pilot use of an evaluation system based on emerging leader standards. Principal mentors for novices, consistent with state regulations.	Developed standards and a new evaluation system specifying measures of student growth and professional practice, as required by the state. Hired more principal supervisors and trained them in using the evaluation system. Added executive coaches.
Gwinnett County	A longstanding evaluation system measuring student growth and principal practice. Expanded corps of retired principals as part-time mentors for novices.	Fine-tuned existing evaluation measures. Hired more principal supervisors and trained them in using the evaluation system. Refined mentor roles, materials, and processes.
Hillsborough County	A new state-approved evaluation system. More principal supervisors recently hired, using the new evaluation system and expected to provide coaching in instructional leadership. A new district position of principal coach. A new, two-year principal induction program.	Developed new principal standards and changed the evaluation system to align with them. Trained the principal supervisors in using the evaluation system and in providing feedback. Added and trained more principal coaches to work with supervisors to provide support. Developed cross-division central office team for support.
New York City	Principal retention based on school performance and conditions. Pilot use of a new principal evaluation process. Individual coaching for first-year principals from a partner nonprofit, with optional second year. Support from voluntary networks.	Developed and rolled out a principal evaluation rubric aligned with the Quality Review used in rating schools. Trained principal supervisors in using the evaluation system. Piloted internal coaching.
Prince George's County	Principal retention based on school performance and conditions. Limited feedback to principals. Mentoring from sitting principals who received formal mentor certification.	Developed standards-based evaluation system specifying measures of student growth and professional practice, as required by the state. Hired more principal supervisors and trained them in using the evaluation system. Added two full-time principal coach positions, and began coordinating their work with that of mentors.

Strategies: Creating Standards-Based Evaluation and Systems of Support

Over the years, the districts modified their systems of evaluation and support for principals. They introduced measures of principal professional practice (a step that was required under federal waivers of Elementary and Secondary Education Act accountability provisions, which all six states had received). In implementing their evaluation systems, they tried to ensure accurate, consistent measurement. They also worked to improve supervision and support, linked to evaluation results (Exhibit 10).

Measuring professional practice with instruments based on standards

Every district designed or adapted an evaluation rubric for supervisors to use in rating principals on the district's leadership standards and competencies. Evaluation of principal professional practice was a state requirement in all six states. The areas that the rubrics commonly addressed were instructional leadership, human resource management, school climate and culture, planning, and school management and operations.

Five districts made gradual changes to their evaluation tools and procedures before and during implementation of the Principal Pipeline Initiative. Charlotte-Mecklenburg was a partial exception because the state offered little flexibility and the district moved quickly to apply the state standards, but discussion and training around the use of these standards was ongoing in that district during the initiative. The typical practice among these districts was an initial year of pilot implementation of a system, followed by (1) continuing fine-tuning of the principal standards in consultation with the state; and (2) years of working with the principal supervisors who evaluated principals, aiming to familiarize them with the system, to gather their advice on improving the rubrics and procedures (as discussed in chapter 2), and to develop their skills in giving feedback.

Each district designed the evaluation system to unfold something like a conversation between principals and their supervisors. The systems had procedures for goal setting and evidence gathering crafted to ensure ample opportunities for two-way discussion. Feedback for principals accompanied the process of data collection in hopes of supporting principals' professional growth. Final performance ratings then directed principals' attention more formally to areas of needed improvement.

Redefining the job of principal supervisor

The districts added more supervisors so that each could work with fewer principals, and they worked to change the jobs of principal supervisors. District leaders wanted supervisors to spend less time overseeing compliance and operations and more time helping principals succeed as instructional leaders.

Reducing supervisors' caseload of principals so that they could effectively support practice improvement was a district priority everywhere except in New York City, where the large number of principals made a major reduction in supervisors' caseload impractical. Denver, Gwinnett County, and Prince George's

County had added supervisors before 2014 in order to reduce each supervisor's caseload. The Wallace Foundation gave each Principal Pipeline Initiative district additional funding ranging from $430,000 to $1 million in 2014, as seed money to redefine and strengthen the position. Districts provided training to help supervisors deliver effective feedback, structure their school visits, and coach principals.

Supervisors in all districts spent considerable time in schools. They were expected to collect a variety of evidence from a variety of sources to document and rate principals' professional practice. Generally, this meant school visits that involved discussions with principals, teachers, and other school staff; observations of principal performance, including principal interactions with school staff; and reviews of artifacts, including plans for school improvement and teacher professional development.

All districts worked with their principal supervisors on calibration, that is, an effort to increase consistency and fairness in the principal evaluation system. New York City took a systematic approach with evaluation simulations. Supervisors reviewed videos and artifacts and assembled evidence to rate each indicator of leadership practice. They shared with each other their evidence and rationale for a particular rating, and members of the group discussed whether they agreed. As a district official described it, the purpose was to raise and address questions about consistency: "Are we on the same page? Are we developing a consistent lens for looking at evidence through the rubric? Are we providing a coherent and consistent experience for the field when we go out there?"

Surrounding principals with support

In each district, mentors or coaches offered support to novice principals.[6] In 2014-15 across the six districts, 90 percent of first-year principals, 74 percent of second-year principals, and 38 percent of third-year principals had a mentor or coach. The figures had not changed significantly since 2012-13. The overall percent of novice principals in these districts who reported that they had mentors or coaches in 2014-15 was 69 percent, which was somewhat higher than the 62 percent among all principals in urban districts in 2011-12 on the federal Schools and Staffing Survey (Manna, 2015). Districts varied in the type of support offered, along a continuum from helping principals learn to think for themselves to assisting them in the day-to-day management of their schools.

Several districts enlisted nonprofit or university partners in developing the skills of their mentors or coaches through programs of formal training. District leaders explained that they recognized that helping a novice principal requires specialized skills, and that training can systematically build those skills.

Many mentors and coaches said in interviews that they saw themselves as trouble-shooters, helping principals address the day-to-day problems that arose. Gwinnett County worked to systematize the work of its mentor corps, setting up logs organized around the principal standards on which mentors recorded what skills or tasks they had worked on in each visit to a principal.

The Principal Pipeline Initiative In Action

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6 "Mentoring" and "coaching" did not have consistent definitions across districts. In this report we use "mentors or coaches" and "mentoring or coaching" when presenting cross-district findings but use the local term when analyzing the supports in a particular district.

Hillsborough County and Denver deployed support for principals in networks of six to ten specialized district partners. Hillsborough, for example, developed Area Leadership Teams in 2014 to help principal supervisors better support their principals' needs. The team could include the principal coach, the elementary generalist, curriculum experts in reading, writing, math, and science, the special-education supervisor, the professional development expert for an area, a Response to Intervention[7] facilitator, and a human-resources representative.

Several district leaders described developing principal professional learning communities that meet regularly to discuss problems of practice and receive support from district staff—such as instructional facilitators or assessment specialists—to develop or strengthen a skill or competency. District leaders led formal sessions and often set the agendas.

Charlotte-Mecklenburg had a structured three-year induction program for novice principals at the start of the initiative, which it quickly expanded to a five-year sequence. District coaches worked with principals in groups; nearby universities and nonprofits provided specialized programs year by year.

Principals in all districts also had an array of professional development options available. Some districts offered professional development courses and workshops that principals could access; some partnered with universities (as in Charlotte-Mecklenburg's multi-year induction program) or other providers of professional development.

The districts tried to find ways to customize their professional development offerings for principals, with evaluation results as one possible source of guidance. For example, a Denver official described the intention as "shifting from sort of 'one size fits all' to a more differentiated approach." A first step in that direction was to offer more choice in professional development offerings, but a district leader explained in 2014 that the next step would be to move beyond relying on a voluntary approach and instead determine "how can we guide people" to the resources they needed. As of 2015 no district claimed to have successfully completed this work.

Accomplishments, Challenges, and Lessons

Most principals saw evaluation systems as fair and constructive

Over three years during which the districts changed their systems of principal evaluation, novice principals gave these systems consistently positive reviews on our surveys. Their responses differ from those reported in earlier research which found that, on the whole, principals saw limited usefulness of performance evaluation for professional learning (Portin, Feldman, & Knapp, 2006). Most novice principals who had been evaluated in 2013-14, in every district, agreed that the evaluation system was accurate and fair, provided a

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7 Response to Intervention is a tiered system of interventions for students who show lags in performance, aimed at catching and fixing learning challenges early.

common language for professional practice, set clear and consistent expectations for their performance, and was generally useful for purposes of informing their professional practice and identifying areas in which they needed to improve, according to our survey (Exhibit 11). Principals responded to a five-point scale, and the percentage of respondents giving one of the top two responses is shown in the exhibit, by year. (The other three responses were "somewhat," "minimally," and "not at all.") On an additional question asked only in 2015, 57 percent of responding principals agreed to a great or considerable extent that the previous year's evaluation "provided results that were worth the effort."

Exhibit 11: Principal perceptions of their 2012, 2013, and 2014 performance evaluation			
The performance evaluation system:	**Percent of principals responding "to a considerable extent" or "to a great extent," by evaluation year**		
	2012 evaluation *(N=204)*	**2013 evaluation** *(N=259)*	**2014 evaluation** *(N=300)*
a. Was useful for purposes of informing my professional practice	65%	54%	60%
b. Provided clear expectations for my performance that were consistently and clearly communicated	64	58	66
c. Adequately/accurately reflected my performance	63	54	60
d. Was useful for purposes of identifying/defining my professional development needs	58	50	56
e. Captured the breadth and complexity of my leadership role	58	49	58

Exhibit reads: In 2013, 65 percent of second- and third-year principals in the six districts reported that their 2012 performance evaluation was useful for purposes of informing their professional practice to a considerable extent or to a great extent.

Source: Principal Survey for "Evaluation of the Principal Pipeline Initiative," 2013, 2014, and 2015.

The evaluation systems gave principals suggestions for improvement. More than half of novice principals were told after their 2013-14 evaluations that they needed to improve in at least one area of practice, according to surveys administered in 2015. This was the case for 69 percent of principals who had been in their first year as principals in 2013-14 and 59 percent of those who had been in their second year. Instructional leadership was the area in which they most commonly reported having been told they needed to improve. This is likely to mean both that novice principals had more to learn about instructional leadership and also that principal supervisors were paying particular attention to this area of leadership practice.

Among those novice principals who were given any areas of improvement after a 2013-14 evaluation, about half reported on the survey that they had been told they needed to improve in at least one of the following practices, which we classified as instructional leadership:

- Helping teachers improve their professional practice
- Pressing teachers to set high standards for student learning
- Using data to inform instruction
- Tracking student academic progress
- Conducting instructional planning with teams of teachers

The largest percentages reported needing to improve in interaction with teachers, including helping teachers improve their professional practice and pressing teachers to set high standards for student learning.

Novice principals participating in focus groups expressed general approval of their districts' evaluation systems. Some described particular strengths of these systems, including the regular visits from their supervisors and the feedback conferences that were built into the evaluation procedures. A principal in Gwinnett County, echoing the intentions expressed by many district leaders across the six districts, explained that he did not think of "this big evaluation" but

> …an ongoing conversation all the time about what are your goals, how are you working toward those goals, and are you making progress or not. So it's not sit down and have one meeting and be evaluated with feedback for next year because it's an all-the-time conversation.

Evaluation rubrics were still a work in progress in 2015

Some principals participating in focus groups offered suggestions for improving the evaluation rubrics used to measure their professional practice. Principal supervisors and district staff were working on this. The rubrics often included examples of principal practice to illustrate evidence of effectiveness, but some did not explicitly define the amount and type of data, by standard, that a supervisor would need to assemble in order to evaluate principals accurately. For example, one rubric offered the wording, "Helps teachers and staff set, monitor, and achieve challenging goals based on student outcomes; anticipates, adapts, and persists in the face of obstacles and responds in a positive solutions-oriented manner,"—but it did not specify the type of data a supervisor would use to measure this competency.

District leaders wrestled with tensions between the value of accommodating differences among principals and schools and the value of holding uniformly high expectations. One principal in a focus group voiced this common dilemma when he criticized the system that held his work in a turnaround school to the same standards of performance as principals who were in higher performing schools and principals who had been in their schools longer:

> … so coming in as a new principal this year with no [grace period], the walls are really high [but] you're getting this "Go slow to go fast; build relationships" message and you're like, "Great, that doesn't perfectly align to the framework of how I'm evaluated."

Supervisors in several districts believed that their district's evaluation rubric should differentiate expectations by principal experience or school context, although none of the rubrics in use in 2015 did so. District leaders wrestled with the issue of differentiation, acknowledging that these concerns were legitimate and reasonable. Still, they chose to hold constant the goal of effective leadership in every school. A district leader in Hillsborough County, although aware of the problems, argued that the expectations for all principals had to be the same because "the outcomes for students that we're expecting are the same."

Debate also emerged about whether rubrics should include measures of school practice—that is, the conditions in the school. One administrator in New York City explained that a heavy emphasis on measures of school practice had become a way to "unearth" problems in the school—such as struggling teachers or a negative school culture—that should be a principal's responsibility to solve. "You do not hear people try to skirt responsibility for the [school] piece [anymore]." On the other hand, a supervisor explained that she thought this was a flawed strategy because it crowded out measures of some principal skills: "It doesn't really get to the dispositions, the ability to communicate, the ability to strategize."

Principal supervisors were seen as helpful, although their skills were still developing

Principals in several districts described a sea change in the frequency and quality of supervisor visits to their schools. Having their supervisors in their schools more regularly was a welcome and, in their view, effective policy change. A principal described the supervisor visits in 2014-15 as having an entirely different shape, rhythm, and intensity than in past years:

> …this year, my [supervisor] is seeing me in the midst of the work where he's attending our leadership team meetings, he's at our faculty meetings, he's in our grade-level planning meetings and sharing ways that I might [do things differently], and just really helped focus on what's the data, what's our story, what are we doing well and what are we not doing so well and how can we refine those practices.

Tension between the principal supervisor's dual role of evaluator and support provider did not appear to be a serious problem. Some principals said in focus groups that they were cautious about disclosing their troubles to their supervisors. In general, however, the survey data for 2015 suggested that novice principals viewed supervisor support favorably. While coaches were still the preferred source of support as they had been in the previous year, supervisors were starting to close the gap (Exhibit 12). In 2013-14, there was a statistically significant difference between principal perceptions of the support they received from their mentor or coach and perceptions of the support they received from their supervisor/ evaluator. By 2014-15, the differences had narrowed so much that they were no longer statistically significant.

2013-14 Principal Perceptions

Size of difference in principal perceptions of supervisor/evaluator versus mentor/coach support

2014-15 Principal Perceptions

Size of difference in principal perceptions of supervisor/evaluator versus mentor/coach support

■ Support received from Supervisor/Evaluator in 2013-14 [N(w)=523]
■ Support received from Mentor/Coach in 2013-14 [N(w)=381]
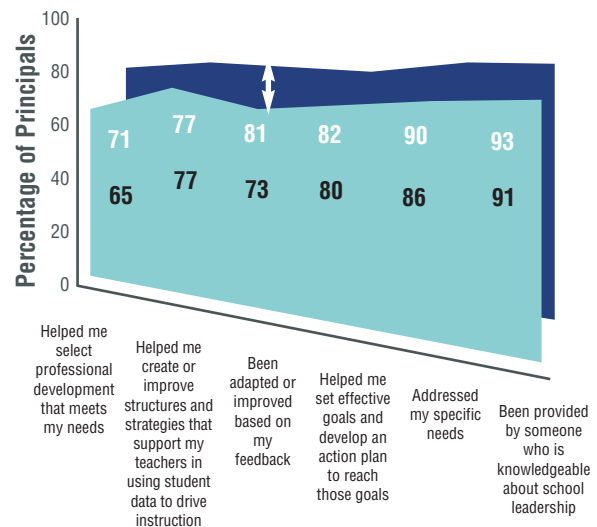
■ Support received from Supervisor/Evaluator in 2014-15 [N(w)=504]
■ Support received from Mentor/Coach in 2014-15 [N(w)=345]

* The difference between supervisor/evaluator and mentor/coach is statistically significant

Exhibit reads: In 2013-14, 73 percent of novice principals who agreed that their mentor/coach had helped them select professional development that meets their needs compared with 58 percent who agreed that their supervisors supported them in this way, which was a difference of 15 percentage points. In 2014-15, the difference between principals who agreed that their mentor/coach versus their supervisor/evaluator helped them select professional development that met their needs had dropped to six percentage points.

Focus group comments suggested that supervisor support could be inconsistent, however. Principals mentioned supervisors who were difficult to work with, were unwilling or lacked the capacity to help a principal address a need, or simply did not show up in the school often enough to help the principal develop professionally. Concerns about supervisors' administrative and central-office obligations came up in each district. One principal said: "…if their job is to be instructional coaches to us as school leaders and 35 percent of their time is taken up by meetings in this [district headquarters] building, how are they coaching us and how are they helping us?"

For some supervisors, shifting into the role of principal supporter and coach was a challenge. Leaders in every district said that the shift away from focusing on operations management made the journey difficult for some supervisors. Some also pointed to the challenge facing novice supervisors—and for the district in guiding them:

> Our [principal supervisors] are still young in their leadership in this capacity, and again, it's about teaching adults. They are not the principal anymore. They are the supporter of principals and that's a different lens and we are still learning what that looks like.

Individual support was perceived favorably, but professional development less so

Principals appreciated their supervisors, as just described, and they expressed particular enthusiasm about their mentors and coaches. Both of these structures for individual support developed over the years of the initiative. Not only did the districts have time to build arrangements and staff skills, but individual school leaders had years of working with assistance providers. A coach traced the influence of the preparation pipeline in describing the depth of training and support principals receive:

> We're getting principals that have had support since the time they were assistant principals, so that's a lot of just one-on-one conversations. … the value of that is just amazing. Because they can ask us anything, and not that we know the answer, but we keep asking them questions and helping them look at their school.

Principals' comments in focus groups painted a picture of the coach or mentor as their lifeline, providing day-to-day, hands-on support that principals said was vital to their immediate survival but that their supervisors usually did not have the bandwidth to provide. Principals described their mentors as "cheerleaders," "someone to bounce ideas off of," "available at all times," "an amazing resource," "the most effective source of support," and a "lifesaver." One principal's description reflected the perspectives expressed by many across the districts:

> Having a [mentor] has probably been the most effective [support]. And I know for my mentor, it's a 24-hour-a-day job. I mean, I've had to have those middle of the night conversations with my mentor about things that keep me up at night, and she's just been very open and very wise and given great advice. So that has probably been the number one [thing] for me as a new principal is having that [mentor].

Having the support of a mentor or coach appeared to raise principals' opinions of the effectiveness of all the support they received from their district. Principals who had mentors or coaches were more likely to rate the support they received from their supervisor and from professional development higher than principals who did not have a mentor or coach in 2015. While the differences in the average ratings of support were not large—means of 4.2 versus 3.8 for supervisor support and 4.0 versus 3.8 for professional development—they were statistically significant. Indeed, the differences suggest that districts' investments in mentors or coaches extended the benefits of all the support principals received.

Systems to link mentoring or coaching with professional development or with principals' individual evaluation results were not fully developed as of 2015. According to the survey responses, it appears that principals and assistant principals struggled to find relevant professional development and pursue their own plans for professional growth.

Although pipeline districts were working to strengthen the alignment, they continued to offer traditional courses and classes that principals in focus groups described as "compliance-oriented," intended for mass consumption, and overloaded with information. No principal referred to district-sponsored professional development as helpful or focused on addressing individual needs. As one district leader explained, even when professional development courses are phenomenal, you still need individualized support to improve as a school leader: "At the end of the day, humans need other humans to help them get better at this work."

The relatively low ratings for traditionally organized professional development suggest that districts might consider scaling back their investment in it. Reasonable questions have emerged about whether current district-run professional development systems are worth shoring up and reshaping. What would it take, for example, for districts to create a system that directly, practically, and quickly responds to principals' needs? A district leader in Denver described the complexities of building such a system: "That's just challenging, to take a principal out of their building, when so much is going on, to offer PD that is just-in-time, that's differentiated, that is really meaningful, and actually moves the growth of that leader."

Summary

Districts implemented standards-based systems for evaluating principals' professional practice, and novice principals received critical feedback from those systems. Their perceptions of the systems remained positive over the years. The districts' efforts to shift the role of principal supervisors to emphasize support with instructional leadership paid off in rising principal ratings of the help they received from supervisors, who were not only their evaluators but also, for some principals, partners in an "all-the-time conversation" about professional practice.

Principals generally expressed appreciation for the one-on-one support they received from mentors, coaches, and supervisors. Group-based professional development was less highly rated, and district leaders continued to wonder how—or whether—to continue trying to use that mode of support for on-the-job learning.

6. The Assistant Principalship: Dilemmas of the Position

Other chapters of this report have focused on problems that district leaders perceived in 2011 and have described the strategies that the Principal Pipeline Initiative offered for addressing those problems during the next few years. The story is a bit different for the assistant principalship: if anything, the problems with that position came into increasingly clear focus over the years of the Principal Pipeline Initiative. District leaders recognized that substantial work lay ahead if they were going to bring coherence to the roles of assistant principals within their leadership pipelines, but they remained unsure of what to do.

Takeaways

1. The assistant principalship had two functions that were hard for districts to reconcile: the position was a training ground for principals but also the place to assign managerial tasks.
2. Districts addressed the pipeline function of the assistant principalship by taking steps toward systematically selecting, inducting, and coaching assistant principals.
3. Assistant principals' opportunities to practice instructional leadership on the job remained somewhat limited.

An Unsolved Problem: How to Position the Role in a Pipeline

High proportions of the districts' novice principals came from the ranks of assistant principals. This was true of more than two-thirds of the novice principals responding to our survey each year in each district. The proportion was more than 90 percent in Gwinnett and Hillsborough Counties, where there was a policy of relying heavily on an in-district pathway to principalship through the job of assistant principal. On the other hand, because all of the districts had more assistant principals than principals, many assistant principals were not destined to advance.

District strategies for working with assistant principals treated them as apprentice principals in some ways. By 2015, districts had moved to offer more advancement opportunities to selected assistant principals. But this collided with two realities: much of the work of the assistant principalship was not about instructional leadership; and many of the people in that job were not likely to become principals.

In a way, districts started with a solution: they hoped to use the assistant principalship strategically, as both apprenticeship and proving ground for future principals. Most of the assistant principals continued to see it this way as well: among first-, second-, and third-year assistant principals responding to our surveys in 2013, 2014 and 2015, over four out of five either planned to apply for principal positions or already had done so. In Charlotte-Mecklenburg and Hillsborough County the proportion was over nine out of ten. Assistant principals reported in the survey that they were attracted to the principalship by the responsibility for student achievement gains and the prospect of influencing school change. The professional status of being a principal motivated relatively few assistant principals, according to their survey responses.

Seeing that they were not necessarily offering assistant principals a solid apprenticeship in instructional leadership and that the selection process for advancement was leaving many assistant principals unsatisfied, district leaders continued to worry about the assistant principalship in 2015. Some wondered whether they should restructure the position. None claimed that they had good ideas about how to address the problems.

Strategies: Trying to Adapt Pipeline Components for Assistant Principals

Basing standards and evaluation measures on those developed for principals

New York City was the only one of the districts that had not built out standards for assistant principals in the same way that they had for principals. An interviewee commented on this fact in 2014, implying that it was an area for future improvement: "An interesting thing in our system is that there's a very rigorous and well-defined set of standards and a process for evaluating both teachers and principals, but not so much for APs."

Interviewees in the other five districts reported that standards for assistant principals were the same as those for principals, but that a principal's level of proficiency or performance was not expected of assistant principals. "Those exact same competencies and beliefs are now being used with our APs, because we expect the same skills, competencies, and beliefs," said a Charlotte-Mecklenburg official—but she then qualified the statement with, "Possibly to a different level for a first-year AP." Other districts had spelled out some differences in expectations. Prince George's County standards for assistant principals closely resembled those for principals, but the indicators were expressed in terms of "supporting" the principal in carrying out functions like the school budget, which officially belonged to the principal. A Denver interviewee said that the stated leader standards were the same for both roles, but added, "the evidence guides are differentiated, so what's 'effective' at the AP level would look slightly different than what's 'effective' at the principal level."

Preparing educators to become building leaders

In their work with preparation programs, the districts sought to improve future principals' skills in instructional leadership. All districts formed partnerships with universities for program improvement. This work changed the preparation of assistant principals, since programs of principal preparation were typically prerequisites for certification as an assistant principal. Hillsborough County also started an in-district preparation program for aspiring assistant principals in 2011, and Gwinnett County added more formal structure to its existing program.

Offering programs and coaching for novice assistant principals

Four districts built induction support for new assistant principals. Hillsborough County launched a two-year induction program for assistant principals under the initiative, focused on individual mentoring. Each

novice assistant principal was assigned a mentor who would supplement the informal mentoring that principals were expected to offer to their own new assistant principals. A cadre of "master mentors" helped to oversee the mentoring. Gwinnett County also introduced mentoring for assistant principals under the initiative. Survey results from assistant principals showed that these districts stood out from others in 2015 for the higher rates of individual mentoring (Exhibit 13).

Exhibit 13: Percentage of novice assistant principals who reported having another mentor or coach besides their principal, by district, by year
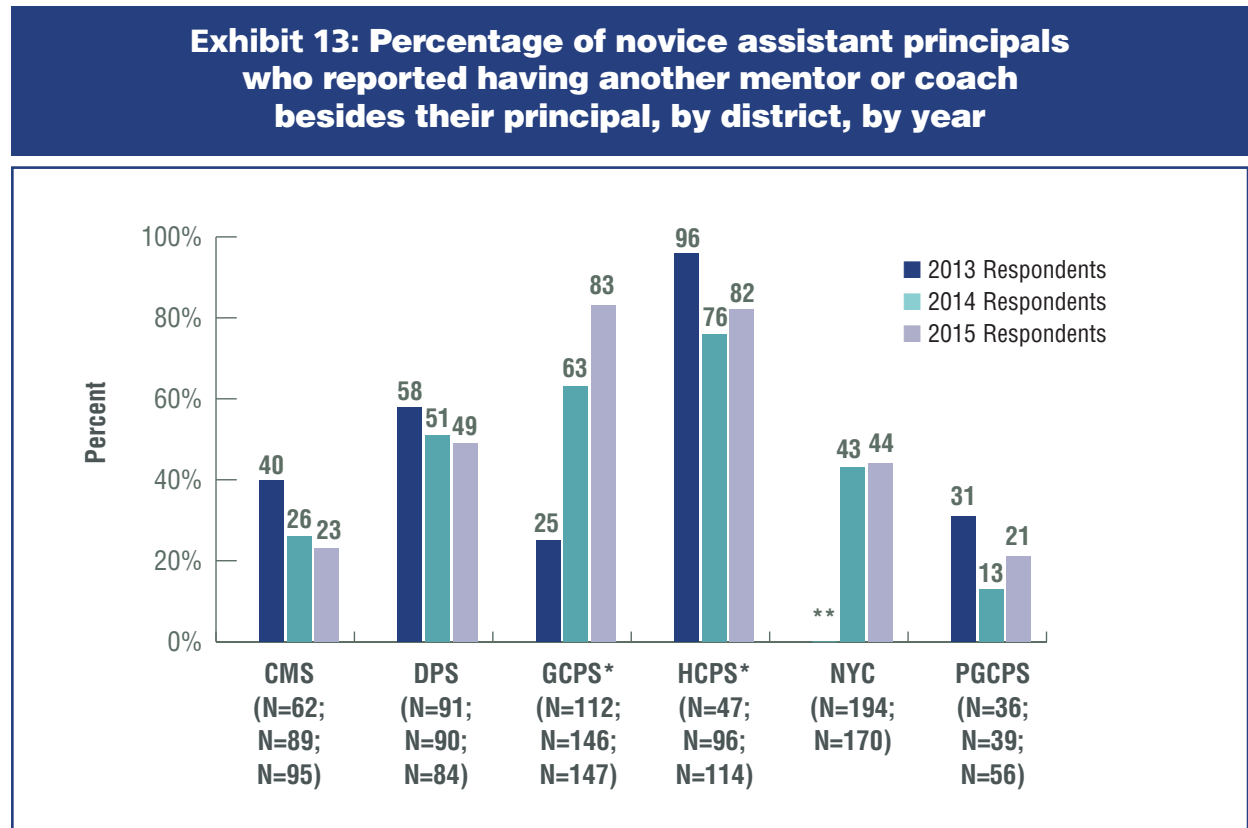
Exhibit reads: The percentage of assistant principals reporting having another mentor or coach besides their principal was 40 percent in 2013, 26 percent in 2014, and 23 percent in 2015 in Charlotte-Mecklenburg.

* A significantly higher percentage reported having a mentor or coach in GCPS and HCPS than in the other districts.

**2013 NYC assistant principal data were not included in analyses due to a low response rate.

Source: Assistant Principal Survey for "Evaluation of the Principal Pipeline Initiative," 2013, 2014, and 2015.

Prince George's County added individualized professional development for assistant principals through a new induction program. A formal program of support for new assistant principals also started up in Charlotte-Mecklenburg. That two-year program included monthly meetings for professional development led by district staff on topics such as instructional coaching and school improvement plans. The district also offered an Assistant Principal Academy at a nearby university designed to help the assistant principals see their opportunities for influence as school leaders. A district official expressed the hope in 2014 that this work would bring results:

> I think that we've recognized that we could do a better job of helping with the induction of our new APs. Because that's our real, best, true pipeline to the principalship, so if we spend a lot more time grooming and developing them it will pay off in the end.

New York City recognized learning opportunities for assistant principals as a possible area for improvement. An official in New York City said:

> There are programs for assistant principals that are designed to help them become principals but not [programs that say,] you just became an AP and you want to learn how to do the job well and you need some support. We don't have strong centrally based programs for that.

Some efforts were under way to ensure that high-potential assistant principals would not be neglected after their initial induction into the position. Charlotte-Mecklenburg created a central-office position in leadership development in 2014, with a mission of building skills among both assistant principals and principals. Denver started a program called AP Ascent in the same year, seeking to bolster assistant principals' skills at a time when they were a few years into the position but not yet on the verge of applying for principalships. A cohort of participants had group sessions together while each took on a leadership project in his or her school. In Hillsborough County, an administrator described the aim of building principals' skills in talent development—but expressed some uncertainty about what principals were doing:

> We did a blended coaching training. …to get our principals thinking differently about working with their APs. We also started the creation of learning plans. ... In the summer, [principals] … set goals with their APs and they're supposed to support their growth. That's where I lose track of, okay, is that happening? So … we are going to do more with principals that have these aspiring leaders…. Because what we want to do is build the capacity of the entire system to improve their coaching and mentoring skills.

Accomplishments, Challenges, and Lessons

Some reported that preparation and support for assistant principals were effective

A top official in Hillsborough County offered an assessment in 2015 of changes made in school-leader preparation that was typical of the positive comments made across districts:

> We are now seeing candidates that are coming to the table for both the assistant principal and the principal role that are so ready. I mean, they're ready to move into that role, the rigor that they have gone through, … the way those programs have now been revitalized, so to speak, or initiated, has really created a right skill set for everyone coming to the table. So that's huge.

In Prince George's County, mentor principals spoke in 2015 of the ways in which their developmental support for new assistant principals had changed.

[It feels] a little different now than it has in the past…. And so they're now tailoring professional development and differentiating by those individuals that just arrived as assistant principals. And I haven't seen that type of development in the past before. And I think they're very appreciative of it…If we want to change the perception of what an assistant principal is, the only way to do that is to change the way that we interact with them. And so that work is new this year also.

In focus groups, new and more experienced assistant principals spoke highly of formal preparation programs and induction programs. Just as important, they repeatedly claimed that the best preparation they received was working day-to-day, in schools, with a principal.

Many assistant principals did not have the benefit of systematic evaluation procedures

Evaluation procedures and rigor were said to vary within districts. The instructions for evaluation generally consisted of variants on principal evaluation systems, but interviewees reported that there were differences in execution within the districts and even within large high schools with multiple assistant principals. One superintendent described the evaluation system as "building the building." The superintendent continued, describing the evaluation system for assistant principals:

I think we're doing evaluations. They're evaluated on the same instrument as principals. Their competencies are the same. We have district wide competencies around leadership, I should say…. [The principals conduct the evaluations.] It really is the quality of the feedback and is as strong as the principal in terms of how seriously they take their role as a developer of people.

The official standards for assistant principals could pose challenges for principals who tried to apply them faithfully in evaluation. By mirroring the standards for principals, the standards could be a poor fit for the job of assistant principal. A principal in a focus group explained some of those challenges, saying that the use of principal standards with assistant principals was:

…confusing both for an assistant principal … [and] for me as a principal. If I'm evaluating my assistant principal and [the standards are] saying she should be doing all the things I'm doing, I don't think that [she should be]. … She doesn't get to set a new vision … because I'm running the school and I have a vision. And as an assistant principal, your job is to get on board with some of those things.

Many assistant principals lacked opportunities to build or maintain instructional leadership skills

An official in one district spoke frankly about how the position of assistant principal might allow skills to atrophy:

I think where we have fallen short is during that time that they're in that assistant principal's role. We have not capitalized on it being a developmental [opportunity]. …They take the position and it

gets very, very narrow. They're doing discipline only…. The role of the assistant principal has got to be redefined, because we're losing capacity when they're in the role. It's actually taking them a step back in most cases.

Another district official gave a similarly bleak assessment: "I would say it's one of the most neglected positions in many districts in terms of professional development, really thinking about where they fit into your pipeline."

Districts had to work with the many assistant principals who would not advance

Because not all assistant principals showed high potential for the principalship, districts faced the challenge of moving some of their ambitious assistant principals off the track to a hoped-for promotion. Changes in principal hiring procedures, such as multiple selection stages, had the effect of narrowing the field of potential applicants, but there were still many assistant principals who cherished the hope of advancing. Gwinnett County leaders were comfortable with the idea that some of their sitting assistant principals were likely to spend their careers in that position, and in that district a sizable group of assistant principals (about 30 percent) responded on the survey that they did not intend to apply for principalships. In other districts, however, leaders expressed concern about the disappointment that lay ahead for current assistant principals who had not shown high potential to meet the district's expectations as principals. These leaders were beginning to strategize about career opportunities other than principalships that might appeal to these assistant principals, such as central-office positions. Such exit strategies for sitting assistant principals could free up their positions for new assistant principals who would bring not only ambition but also skills in instructional leadership.

Complicating this kind of planning, however, was the recognition that districts also needed a cadre of career managers to help run school operations, particularly in large schools. Differentiating instructional leadership tasks from operational management within the assistant principal role became a central dilemma facing the districts as they worked to more formally integrate the role of assistant principal into the leadership pipeline.

Summary

While the core focus of the districts in the Principal Pipeline Initiative was the development of principals, district leaders came to realize the importance of bringing coherence to the position of assistant principal as well as the promise and challenges associated with finding an appropriate place for that position within the pipeline. How to bring coherence was not clear, however. Lightly adapting the tools of standards and evaluation for assistant principals was not necessarily helpful for the assistant principals. Looking ahead, districts had to balance the need to develop and manage staff to help run schools with the need to leverage the role of assistant principal as a stepping stone to the principalship. To complete the work that districts have begun in thinking about and reengineering the role of the assistant principal, they will likely need to follow a similar path to the one they have thus far taken in making system-level improvements in their principal pipelines.

7. Conclusions and Implications

The Principal Pipeline Initiative challenged a group of districts to push beyond the work that they were already doing on school leadership by designing and carrying out system-level improvements based on a general template of key pipeline components. Those components were: school-leader standards and competencies; selective principal preparation programs reflecting district priorities and research-based features; selective, data-informed hiring and placement; and standards-based evaluation accompanied by more intensive support for principals.

Takeaways

1. All six districts carried out the kinds of changes that the initiative called for.
2. Changes in standards and hiring gave the initiative a strong start.
3. More new principals over time said they were an "excellent" fit in their schools, and district leaders saw greater strengths in their instructional leadership.
4. Building capacity for principal preparation and support took years and was still a work in progress.
5. The initiative offers implications for both districts and policymakers.

Results of the Initiative

THE PRINCIPAL PIPELINE INITIATIVE SUCCEEDED IN DRIVING THE INTENDED CHANGES IN POLICY AND PRACTICE. This is a surprising finding because large urban districts do not necessarily respond to outside initiatives with serious, sustained implementation efforts. These districts, however, did just that.

Changes were visible in each component

ALL SIX DISTRICTS MARSHALED THE WILL AND CAPACITY TO PUT THE KEY COMPONENTS IN PLACE BY SPRING 2015:

- They had—and actively used—standards for principals.
- New and revamped preparation programs were running.
- Hiring and selection procedures incorporated more data and longer-term planning.
- New systems of principal evaluation and support were maturing.

Districts had the will and skill to keep improving their pipelines

THE DISTRICTS EMBRACED KEY TECHNOLOGICAL AND STAFFING SUPPORTS for the major components of the principal pipeline: Leader Tracking Systems brought data together to inform hiring and other choices; and principal supervisors took on larger roles in succession planning, principal evaluation, and support for new principals.

MORE BROADLY, DISTRICT LEADERS REFLECTED ON THE PATHWAYS AND LEARNING OP-PORTUNITIES THAT THEY OFFERED to educators at career stages beginning before an assistant principalship and culminating in the role of principal supervisor. By 2015 they had a clearer view of their overall systems of school leadership, appreciating how the components of these systems interacted to shape professional progress over time for individuals and the quality of school leadership for the district. And they were poised to continue taking stock of principal preparation, hiring, evaluation, and support, and to continue iteratively refining these system components.

Early results of system changes were evident among novice principals

DISTRICTS WERE DOING BETTER OVER TIME IN DEVELOPING AND PLACING NEW PRINCIPALS, according to our survey data from those principals. More novice principals over time reported an "excellent" fit between their own capacity and their school placement. Their reports also pointed to a preparation experience that, overall, increasingly fostered their orientation to the principalship as a career and a hiring process that gave them a greater chance to show their skills in practical simulations. Top district leaders reported in interviews in 2014 and 2015 that incoming principals and assistant principals were showing leadership strengths, especially in instructional leadership. The principals' own increasing reports of an "excellent" fit between their skills and their schools' needs were consistent with these reports from district leaders.

NEW SYSTEMS OF EVALUATION AND SUPPORT DREW GOOD RATINGS from the new principals affected by those systems. Those who had mentors or coaches continued to rate that source of assistance positively. Support from principal supervisors garnered higher ratings from novice principals over time. And despite the introduction of new evaluation practices and measures, which might have caused anxiety or unhappiness, new principals' ratings of district evaluation systems held steady rather than dropping.

OVERALL, THEN, WE FOUND THAT THE DISTRICTS SUCCEEDED IN FOLLOWING THE GUIDANCE OF THE PRINCIPAL PIPELINE INITIATIVE; that they built tools, programs, partnerships, data systems, and staff capabilities for supporting novice principals; and that early evidence from principals showed signs of positive results from the work that the districts did. Exhibit 14 summarizes the districts' strategies, challenges, and successes, by component.

Exhibit 14: Summary of implementation strategies and reported results through 2015

	Principal standards and competencies
Strategies	Worked on principal standards at the start of the initiative, incorporating mandated state standards and engaging stakeholders, including principals, in deliberations.
	Continually revisited and revised standards based on pipeline implementation experiences.
	Used the standards and competencies to align components of the pipeline, including building preparation curricula, hiring criteria, and tools for principal evaluation and support.
Challenges	Superintendent transition could affect the stability of standards.
Successes	Districts reported standards gave valuable structure, clarity, and coherence to district policies on principal evaluation, hiring, and preparation.
	Some described the standards as providing a helpful shared language about the principalship.
	Principal preparation
Strategies	Launched new preservice programs, including in-district programs and programs co-developed with partners.
	Worked to strengthen programs through systematic review and communication with partners.
	Developed strategies and culture for identification and selective recruitment of aspiring leaders.
	Worked to improve and expand clinical experience in preservice programs.
Challenges	Changing preservice preparation is a multi-year strategy for improving principal capacity.
	Providing high-quality on-the-job experiences can be costly and relies on mentoring capacity and skill that may be limited.
Successes	Districts believed the portfolios of preparation programs were stronger because they:
	• Used a selective admissions process.
	• Permitted district leaders to conduct classes and personally observe and evaluate rising talent.
	• Tailored program content to district leadership standards, routines, and priorities.

(Continued)

Exhibit 14: Continued

Principal hiring and placement

Strategies	Engaged top-level district leaders in succession planning and placement discussions.
	Introduced systematic data-informed procedures for hiring, including performance assessments such as role playing and school data review.
	Built new individual-level data systems to track experience, performance, and assessed competencies of principals and aspiring principals.
	Incorporated additional selection stages, including hiring pools and preservice program selection and performance.
Challenges	Using performance assessments in the hiring process and developing and using individual-level data systems require significant investments of staff time.
	Selecting principal candidates with strong interpersonal skills is hard, because such skills are difficult to measure during the hiring process.
Successes	Novice principals reported that the hiring process gave them useful feedback.
	Over time, more novice principals reported an "excellent" fit between the needs of their schools and their skills, experiences, and interests.
	District leaders applauded novice principals' strong knowledge of instruction.

Evaluation and support of novice principals

Strategies	Developed an evaluation system that was aligned with principal standards and promoted ongoing, regular discussion between principals and their supervisors.
	Expanded corps of principal supervisors and shifted their role toward supporting principals in instructional leadership.
	Provided support to novice principals through mentors or coaches.
Challenges	In evaluation, uniform expectations were in tension with the differences among principals in years of experience and school context.
	Shifting supervisors away from management and compliance roles and toward skilled principal coaching and support was a work in progress.
	Reshaping professional development to align with principals' individual needs had limited success.
Successes	Novice principals reported that the evaluation system was accurate and useful for informing their practice and described their supervisors, mentors, and coaches as important sources of support.

What Helped the Districts Make Progress

District leaders maintained a focus on the key components of the Principal Pipeline Initiative and made changes that were consistent with those components as originally designed. This was the case despite superintendent transitions in four of the districts (Charlotte-Mecklenburg, Hillsborough County, New York City, and Prince George's County) and despite the many other initiatives under way in all six districts. How did this happen?

Our interviews and observations over time suggest that **THREE FEATURES OF THE INITIATIVE DESIGN MADE A DIFFERENCE. FIRST, THE DESIGN HAD BOTH "TIGHT" AND "LOOSE" ELEMENTS.** The components were defined, and districts were accountable for taking action on each one. However, there was "looseness" in the latitude offered for different tactics and emphases. For example, partnerships with universities could be a centerpiece of principal preparation, as in Charlotte-Mecklenburg, or a complement to in-district preparation, as in Gwinnett and Hillsborough Counties. They could even change direction after a few years, as in New York City's 2014 shift from an effort to influence curriculum to a design for changing the clinical experience within city schools.

SECOND, THE INITIATIVE WAS DESIGNED TO ENGAGE TOP DISTRICT LEADERS in matters that otherwise might have remained routine parts of the work of human-capital departments. Superintendents were part of the ongoing conversation with the foundation and attended the initiative's Professional Learning Community meetings. This appeared to ensure durable high-level support for the initiative within districts.

THIRD, THE INITIATIVE GAVE THE SIX PROJECT DIRECTORS REGULAR OPPORTUNITIES TO MEET TOGETHER, WORK WITH OUTSIDE EXPERTS, AND VISIT EACH OTHER'S DISTRICTS. The Professional Learning Community meetings allowed them to share ideas with each other and also to spend uninterrupted discussion and planning time with key members of their own local leadership team, including the superintendent. The project directors said their work had benefited from all these opportunities for interaction.

SUPPORTED BY THESE DESIGN FEATURES, THE DISTRICTS TOOK CHARGE OF THEIR OWN WORK. Local commitment to the initiative did not erode but actually appeared to us to strengthen over the years. Superintendents actively promoted changes that cut across the purviews of different district divisions, like principal supervisors' new responsibilities, and this in turn reduced the chances that bureaucratic miscommunication or resistance could impede the changes. The local project directors remained passionate advocates of the initiative in their districts, and they deepened their knowledge about challenges and opportunities in the work. They approached their tasks not as hoops to jump through for a funder but as part of a coherent design. Their creativity, confidence, and skills were important assets in keeping commitment alive.

DISTRICTS WORKED ON EACH PIPELINE COMPONENT IN EACH YEAR, striving for continuous improvement as flaws came to light in tools or procedures. They streamlined the initial standards documents for usability; then revisited their standards and evaluation measures as the use of these tools brought

gaps and ambiguities into focus. No district leader characterized any part of the pipeline design as completed and unchangeable. Instead, all remained open to improving their work on the basis of experience from year to year.

Persistent Challenges

THE DISTRICTS STILL HAD WORK TO DO IN DEVELOPING THE CAPACITY TO CARRY OUT REDESIGNED WORK in principal preparation, selection, placement, evaluation, and support as of 2015. For example, principal supervisors were continuing to learn how to evaluate the practice of new principals and coach them effectively for instructional leadership. Moreover, some principal supervisors were still expected to carry out administrative tasks, leaving less time than was needed for principal support.

DISTRICT LEADERS REPORTED THAT THEIR EFFECTIVENESS IN RESHAPING UNIVERSITY PROGRAMS HAD BEEN MIXED. Programs and professors already had curricula that satisfied state requirements, an adequate stream of new enrollees, and a culture that prized academic freedom. They did not have to embrace new program designs, and some reportedly did not. It is possible, however, that changes in these programs are simply slower to take place than the kinds of changes that a district can influence more directly, and that preparation programs were in a process of evolving over time.

SOME CHALLENGES THAT SURFACED DURING THE INITIATIVE WERE STUBBORN ONES FOR WHICH RESEARCH AND PRACTICAL WISDOM OFFERED NO SOLID SOLUTIONS. Districts would have liked to screen aspiring principals for qualities that they described as emotional intelligence, micropolitical skills, or relationship-building skills. They were not yet confident that they had found good ways to do this, although they continued to try. Group-based professional development for new principals was not winning high marks from the principals, and the idea of tailoring these conventional professional development offerings to individual needs, while appealing, was hard to carry out. The role of assistant principal had built-in tensions because it was a stepping stone for some but a dead end for others.

Implications for Districts

The experience of these districts offers lessons for other districts interested in doing similar work. Although these districts benefited from high capacity and the support provided through the initiative, the following steps would be feasible and potentially productive in other large districts, and most of them could be adapted for districts of any size:

■ The process of defining standards and competencies for principals was a powerful first step. Having standards allowed the districts to anchor job descriptions, hiring criteria, and evaluation rubrics in their priorities for principals. Broad-based participation in setting the standards gave them visibility and credibility. Other districts can now consider starting with the recently released Professional Standards for Educational Leaders (National Policy Board for Educational Administration, 2015).

- The hiring process was another productive starting point. Districts addressed their pressing concerns about the caliber of principal candidates by making procedural changes like requiring candidates to demonstrate their skills, drawing on consultant help to identify performance tasks.

- The districts saw advantages in district-run preparation programs that were specifically tailored to district priorities and needs and that gave hiring managers a chance to observe aspiring principals. With the Quality Measures tool, they had a structured process for holding preparation programs accountable for inputs and outcomes. For a smaller district, simpler versions of these approaches could include in-district study groups for aspiring leaders and more regular dialogue with nearby preparation programs about district needs and expectations.

- Leader Tracking Systems offered usable information for hiring and succession planning and, over the longer term, a chance to improve all parts of the pipeline on the basis of results. Elaborate systems would not be needed in the smallest districts, but good records of individual leaders' accomplishments and career paths would be informative in any district.

- Districts introduced most of their new tools, programs, and procedures on a pilot basis, subject to learning and improvement over time. This practice seems to have eased the potential stress around principal evaluation systems. For any new pipeline component, a process of piloting and continuous improvement gave a needed opportunity to spot and correct unanticipated problems.

Implications for Policy

Policymakers who recognize the centrality of the principal in school improvement could offer help for districts in building a stronger corps of novice principals, building on the experience of this initiative:

- These districts found that standards provided a strong start toward an aligned pipeline. Supporters of reform could ensure that districts have access to the Professional Standards for Education Leaders and examples of job descriptions, evaluation rubrics, and other usable materials based on these standards.

- This initiative established four key pipeline components but allowed considerable latitude for local invention and initiative. Other agencies that oversee or support work on principal pipelines could consider a similar mix of tight and loose coupling.

- Seed money could provide important start-up resources: expert technical help with hiring procedures or data systems; initial training for those who are taking on new roles in principal preparation, evaluation, or support; and opportunities to visit and learn from other districts.

■ The knowledge base on development and support of novice principals has room to grow. Districts remained frustrated with the state of the art in identifying high-potential candidates for principal-ships, tailoring principal professional development to address identified weaknesses, and helping assistant principals along their varied career paths. More work in developing and systematically testing new approaches could help.

■ Finally, policymakers supporting this kind of major, system-level initiative should recognize that putting changes in place takes time, and that the effects of those changes will take still more time to emerge. Building a better crop of new principals is a multi-year endeavor that calls for patience.

References

Anderson, L.M., & Turnbull, B.J. (2016). *Building a stronger principalship, Vol. 4: Evaluating and supporting principals*. Washington DC: Policy Studies Associates.

Bain & Company (2013). *Building pathways: How to develop the next generation of transformational school leaders*. Boston: Author.

Branch, G. F., Hanushek, E. A., & Rivkin, S. G. (2012). *Estimating the effect of leaders on public sector productivity: The case of school principals*. Cambridge, MA: National Bureau of Economic Research.

Bryk, A.S., Sebring, P.B., Allensworth, E., Luppescu, S., & Easton, J.Q. (2010). *Organizing schools for improvement: Lessons from Chicago*. Chicago: University of Chicago Press.

Clifford, M., & Ross, S. (2012). *Rethinking principal evaluation: A new paradigm informed by research and practice*. Alexandria: National Association of Elementary School Principals and National Association of Secondary School Principals.

Corcoran, A., Casserly, M., Price-Baugh, R., Walston, D., Hall, R., & Simon, C. (2013, October). Rethinking leadership: The changing role of principal supervisors. Washington DC: Council of the Great City Schools.

Darling-Hammond, L., LaPointe, M., Meyerson, D., Orr. M. T., & Cohen, C. (2007). *Preparing school leaders for a changing world: Lessons from exemplary leadership development programs*. Stanford, CA: Stanford University, Stanford Educational Leadership Institute.

Davis, S., Kearney, K., Sanders, N., Thomas, C., & Leon, R. (2011). *The policies and practices of principal evaluation: A review of the literature*. San Francisco, CA: WestEd.

Finn, C.E. Jr., & Kanstoroom, M. (2000). Afterword. In *Can philanthropy fix our schools? Appraising Walter Annenberg's $500M gift to public education*. Washington DC: Thomas B. Fordham Foundation.

Hess, F.M. (1999). *Spinning wheels: The politics of urban school reform*. Washington DC: Brookings.

Hightower, A.M., Knapp, M.S., Marsh, J.A., & McLaughlin, M.W., Eds. (2002). *School districts and instructional renewal*. New York: Teachers College Press.

Honig, M.I. (2006). *New directions in education policy implementation: Confronting complexity*. Albany NY: State University of New York Press.

Kristof-Brown, A. L., Zimmerman, R., & Johnson, E.(2005). Consequences of individuals' fit at work: A meta-analysis of person-job, person-organization, person-group, and person-supervisor fit. *Personnel Psychology*, 58(2), 2814342.

Manna, P. (2015). *Developing excellent school principals to advance teaching and learning: Considerations for state policy.* New York: The Wallace Foundation.

National Policy Board for Educational Administration (2015). *Professional standards for educational leaders 2015*. Reston VA: Author.

Orr, M. T., King, C., & La Pointe, M. M. (2010). *Districts developing leaders: Eight districts' lessons on strategy, program approach and organization to improve the quality of leaders for local schools. Report prepared for The Wallace Foundation.* Newton, MA: EDC.

Portin, B.S., Feldman, S., & Knapp, M. S. (2006). *Purposes, Uses, and Practices of Leadership Assessment in Education.* Seattle, WA: Center for the Study of Teaching and Policy, University of Washington.

Seashore Louis, K., Leithwood, K., Wahlstrom, K.L. & Anderson, S. E. (2010). *Learning from leadership: Investigating the links to improved student learning.* St. Paul, MN: University of Minnesota, Center for Applied Research and Educational Improvement.

Spillane, J.P. (1998). State policy and the non-monolithic nature of the local school district: Organizational and professional considerations. *American Educational Research Journal, 35* (1), 33-63.

Turnbull, B.J., Riley, D.L., Arcaira, E.R., Anderson, L.M., & MacFarlane, J.R. (2013). *Building a stronger principalship, Vol. 1: Six districts begin the Principal Pipeline Initiative.* Washington DC: Policy Studies Associates.

Turnbull, B.J., Riley, D.L., & MacFarlane, J.R. (2013). *Building a stronger principalship, Vol. 2: Cultivating talent through a principal pipeline.* Washington DC: Policy Studies Associates.

Turnbull, B.J., Riley, D.L., & MacFarlane, J.R. (2015). *Building a stronger principalship, Vol. 3: Districts taking charge of the principal pipeline.* Washington DC: Policy Studies Associates.

Appendix A: Survey Administration, Weighting, and Analyses

Survey Administration and Response Rates

In winter 2013, 2014, and 2015, the study team contacted the Principal Pipeline Initiative project directors in each of the six districts to explain the purpose of the survey and to request the names and email addresses of all first-, second-, and third-year principals and assistant principals. Once we received the principal and assistant principal rosters, we reviewed the lists for accuracy. Web-based surveys were administered in spring 2013, spring 2014, and spring 2015 to all first-, second-, and third-year principals and assistant principals in the six districts. We sent multiple reminder emails to non-responding principals and assistant principals.

Response rates appear in Exhibit A-1.

In the analysis of survey data, due to the relatively low response rate from principals in New York City (50 percent in 2015), we tested for non-response bias to determine whether respondents were representative of all principals in the district. We used New York City's progress reports submitted to The Wallace Foundation to determine whether there were significant differences between the percentages of survey respondents who reported having graduated from particular preparation programs versus the percentages of graduates of those programs reported in the more complete data from the district. This was the only data point in our survey for which frequencies could be obtained from a different and more complete source for comparison. The comparison showed that a few programs were overrepresented among survey respondents (e.g., three programs were overrepresented in 2015). Therefore, additional analyses tested a sample of survey items for differences in responses from graduates of each of those programs versus graduates of all other programs. We found only a few significant differences among group means, and these few significant differences did not follow a clear pattern or cluster within a particular set of items. We therefore determined that within-district survey weights were not necessary for New York City.

Survey Weighting by District

To determine post-stratification survey weights for each district, the inverse of the number of respondents from the district out of the total number of respondents to the survey was divided by six, the total number of districts (Exhibit A-2). For example, in 2015, there were 56 principal respondents in Charlotte-Mecklenburg and 514 total principal respondents from all six districts, resulting in a survey weight of 1.53 (i.e., (514/56)/6). The 2013 and 2014 data from principals and assistant principals were weighted in a similar fashion.

Exhibit A-1: Survey respondents and response rates, by district, 2013 through 2015

District	2013 principal survey		2013 assistant principal survey	
	Number of respondents	Response rate, in percent	Number of respondents	Response rate, in percent
Charlotte-Mecklenburg	43	96%	62	85%
Denver	56	78	91	81
Gwinnett County	39	93	112	85
Hillsborough County	55	90	47	75
New York City	102	31	N/A	N/A
Prince George's County	58	89	36	78
Total	**353**	**57**	**348**	**82**

District	2014 principal survey		2014 assistant principal survey	
	Number of respondents	Response rate, in percent	Number of respondents	Response rate, in percent
Charlotte-Mecklenburg	52	96%	89	84%
Denver	68	83	91	84
Gwinnett County	47	100	146	90
Hillsborough County	42	89	97	82
New York City	269	51	208	54
Prince George's County	63	93	40	87
Total	**541**	**66**	**671**	**73**

District	2015 principal survey		2015 assistant principal survey	
	Number of respondents	Response rate, in percent	Number of respondents	Response rate, in percent
Charlotte-Mecklenburg	56	93%	95	81%
Denver	55	83	87	86
Gwinnett County	41	98	149	87
Hillsborough County	46	81	116	78
New York City	248	50	185	45
Prince George's County	68	96	56	93
Total	**514**	**65**	**688**	**68**

Exhibit reads: In 2013, 43 principals completed the survey in Charlotte-Mecklenburg, comprising 96 percent of all first-, second-, and third-year principals surveyed in the district.

Note: 2013 NYC assistant principal data were not included in analyses due to a low response rate.

Exhibit A-2: Principal and assistant principal survey weights by district and year

District	2013		2014		2015	
	Principal weight	Assistant principal weight	Principal weight	Assistant principal weight	Principal weight	Assistant principal weight
Charlotte-Mecklenburg	1.37	1.12	1.73	1.26	1.53	1.21
Denver	1.05	0.76	1.33	1.23	1.56	1.32
Gwinnett County	1.51	0.62	1.92	0.77	2.09	0.77
Hillsborough County	1.07	1.48	2.15	1.15	1.86	0.99
New York City	0.58	N/A	0.34	0.54	0.35	0.62
Prince George's County	1.01	1.93	1.43	2.80	1.26	2.05

Exhibit reads: The survey weight for Charlotte-Mecklenburg principals in 2013 was 1.37; the survey weight for Charlotte-Mecklenburg assistant principals in 2013 was 1.12.

Note: Survey weights for 2013 assistant principals were calculated out of five rather than six districts. The response rate in New York City among assistant principals was low, so those assistant principal responses were excluded from analysis in 2013.

Survey Analyses

This report presents some analyses of cross-sectional data from 2013 through 2015. The 2013 data included principals and assistant principals who started in their position from 2010 to 2013, the 2014 data included principals and assistant principals who started their position from 2011 to 2014, and the 2015 data included principals and assistant principals who started in their position from 2012 to 2015.

We also had the opportunity to go beyond analyzing cross-sectional data and designate cohorts of principals who started their position at five different time points. The first three cohorts of principals and assistant principals were surveyed in 2013, and one new cohort of first-year principals and assistant principals was surveyed in each of the two subsequent years for a total of five mutually exclusive cohorts.

The month of March was used as a cut point to assign principals and assistant principals into appropriate cohorts, both because the survey was administered in spring and because a principal appointed near the end of the school year could be best considered to belong to the following year's cohort of new principals. We primarily used principal and assistant principal self-reports of their start date, with district survey administration lists as backup, to assign principals and assistant principals to cohorts. See Exhibit A-3 for a detailed explanation of cohort assignments for principals and assistant principals each survey year.

Exhibit A-3: Principal and assistant principal cohort assignments by year

2013	2014	2015
Started position from March 2010 through February 2011 (third-year in position)	Started position from March 2011 through February 2012* (third-year in position)	Started position from March 2012 through February 2013* (third-year in position)
Started position from March 2011 through February 2012* (second-year in position)	Started position from March 2012 through February 2013* (second-year in position)	Started position from March 2013 through February 2014* (second-year in position)
Started position from March 2012 through February 2013* (first-year in position)	Started position from March 2013 through February 2014* (first-year in position)	Started position from March 2014 through February 2015 (first-year in position)

Exhibit reads: In 2013, principals and assistant principals started their positon from March 2010 through February 2013. For survey analyses, principals and assistant principals who started their position from March 2012 through February 2013 were considered first-year principals or assistant principals in 2013; principals and assistant principals who started their position from March 2011 through February 2012 were considered second-year principals or assistant principals in 2013; and principals and assistant principals who started their position from March 2010 through February 2011 were considered third-year principals or assistant principals in 2013.

Note: The cohorts that include an asterisk were surveyed in multiple years.

These cohorts served two analytical purposes: (1) to define who was considered a first-, second-, or third-year principal or assistant principal each survey year, and (2) to compare principals and assistant principals who started the job early in the pipeline initiative to those who started later.

We used the latter method for survey analyses pertaining to respondents' reports of past experiences (for example, features and perceptions of preservice training and hiring) or factual information that would not change over time (such as background information). For these questions, we used the data from the first survey year when each respondent had the opportunity to respond to a question. For questions asked in all three survey years, we were thus able to compare the two cohorts who started on the job in 2010-12 to those who started in 2013-15. In some cases, where survey questions appeared for the first time in the 2014 survey, the comparison was between the single cohort that started in 2011-12 and the two cohorts that started in 2013-15.

Some comparisons in the report are presented along with information about whether the difference between percentages is statistically significant. One method of determining the statistical significance of the difference between two percentages is to compare the confidence intervals of the two percentages. Confidence intervals provide information about the accuracy of estimated percentages. If the confidence intervals for two percentages do not overlap, then the difference is deemed statistically significant.

Appendix B: An Exploratory Comparative Analysis

Our principal survey affords an opportunity for an exploratory comparison of principals' reports on their preparation with the findings of an important prior study (Darling-Hammond et al., 2007) which helped inform the design of the Principal Pipeline Initiative by identifying features of exemplary preparation programs. The prior study surveyed two groups of respondents: graduates of the programs highlighted as exemplars and a national comparison group of principals. Our survey replicates many items about preparation program experiences from that study, allowing a comparison of the results. This analysis allows us to see how the preparation of novice principals compared with both groups, and whether the comparative findings changed over time.

Caveats are in order for these comparisons. One relates to the time that has elapsed between the prior and current research. A national survey conducted in 2013 through 2015 might well be expected to yield results different from those of respondents surveyed in the previous decade. It is likely that the preparation programs for principals hired recently in the Principal Pipeline Initiative districts reflected current trends in school leadership practice, such as newly intensified expectations for data use. Moreover, they might reflect attention to the research on principal preparation that had not yet been reported a decade ago.

With respect to assessments of program content and instructional approaches, and self-reported perceptions of their preparation for specific aspects of leadership, we found that the reports of novice principals in these districts were fairly similar to those of graduates of the exemplary programs studied by Darling-Hammond and colleagues, and somewhat more favorable than those of that study's national sample. This was true in each year of the survey.

In comparisons where the effect size exceeds .50, we interpret the difference as at least moderate in size and therefore likely to be meaningful. Many of the differences that appear in these exhibits, although statistically significant, show small effect sizes; in these cases we do not interpret the apparent differences as being meaningful. Thus, for example, principals in our 2015 survey reported much greater emphasis on leadership for school improvement in their preservice than did Darling-Hammond's *national sample* (d=.80) (Exhibit B-1). On the other hand, we do not view the apparent difference in emphasis on leadership for school improvement between the principals we surveyed and the graduates of Darling-Hammond's *exemplary programs* as meaningful; this is because, although the difference was statistically significant, the effect size was small (d=-.24).

With those caveats and suggestions for interpretation, we show in Exhibits B-1 through B-4 the comparisons between our survey results and those of the prior study.

Exhibit B-1: Principal perceptions of preservice content compared to Darling-Hammond et al. exemplary programs and national comparison, 2013-2015

To what extent were the following qualities/practices true of your formal leadership preparation training?	Darling-Hammond et al. data reported in 2007 **Exemplary Program** *(N=242)*	PPI Evaluation Surveys in 2013 **Principal** *(n=326)*	PPI Evaluation Surveys in 2014 **Principal** *(n=472)*	PPI Evaluation Surveys in 2015 **Principal** *(n=448)*
a. Program content emphasized instructional leadership	4.58	4.27** (d=-.37)	4.43** (d=-.20)	4.25** (d=-.39)
b. Program content emphasized leadership for school improvement	4.49	4.27** (d=-.26)	4.38** (d=-.15)	4.29** (d=-.24)
c. Program gave me a strong orientation to the principalship as a career	4.39	4.06** (d=-.39)	4.20** (d=-.23)	4.06** (d=-.37)

To what extent were the following qualities/practices true of your formal leadership preparation training?	Darling-Hammond et al. data reported in 2007 **National Comparison** *(N=629)*	PPI Evaluation Surveys in 2013 **Principal** *(n=326)*	PPI Evaluation Surveys in 2014 **Principal** *(n=472)*	PPI Evaluation Surveys in 2015 **Principal** *(n=448)*
a. Program content emphasized instructional leadership	4.13	4.27* (d=.17)	4.43** (d=.39)	4.25** (d=.14)
b. Program content emphasized leadership for school improvement	3.63	4.27** (d=.77)	4.38** (d=.99)	4.29** (d=.80)
c. Program gave me a strong orientation to the principalship as a career	3.73	4.06** (d=.39)	4.20** (d=.57)	4.06** (d=.37)

Exhibit reads: Darling-Hammond et al. exemplary programs responses averaged 4.58 and the national comparison responses averaged 4.13 on the extent to which program content emphasized instructional leadership. PPI principal responses averaged 4.27 in 2013, 4.43 in 2014 and 4.25 in 2015. Response means in this table are on a five-point scale in which 1 equals "not at all" and 5 equals "to a great extent."

Note: T-tests were conducted to determine statistical significance; *p<.05 and **p<.01. Effect sizes were calculated using Cohen's *d*. We suggest interpreting effect sizes using *d*=+/- .50 as a minimum threshold for interpreting results as having at least a moderate effect.

Source: Principal Survey for "Evaluation of the Principal Pipeline Initiative," 2013, 2014, and 2015; Principal surveys reported in Darling-Hammond, L., LaPointe, M., Meyerson, D., Orr. M. T., & Cohen, C. (2007). *Preparing school leaders for a changing world: Lessons from exemplary leadership development programs.* Stanford, CA: Stanford University, Stanford Educational Leadership Institute.

Exhibit B-2: Principal perceptions of preservice coursework compared to Darling-Hammond et al. exemplary programs and national comparison, 2013-2015

To what extent were the following qualities/practices true of your formal leadership preparation training?	Darling-Hammond et al. data reported in 2007	PPI Evaluation Surveys in 2013	PPI Evaluation Surveys in 2014	PPI Evaluation Surveys in 2015
	Exemplary Program (N=242)	Principal (n=326)	Principal (n=472)	Principal (n=448)
a. Analysis and discussion of case studies	4.39	3.96** (d=-.38)	4.15** (d=-.25)	3.86** (d=-.43)
b. A portfolio demonstrating your learning and accomplishments	4.36	3.88** (d=-.38)	3.98** (d=-.31)	3.60** (d=-.54)
c. Analysis and discussion of field-based problems/problem-based learning approaches	4.29	3.94** (d=-.30)	4.12** (d=-.18)	3.88** (d=-.34)
d. Field-based projects in which you applied ideas in the field	4.22	3.84** (d=-.31)	3.97** (d=-.23)	3.81** (d=-.33)
e. Action research or inquiry projects	4.00	3.66** (d=-.28)	3.86** (d=-.12)	3.61** (d=-.30)

To what extent were the following qualities/practices true of your formal leadership preparation training?	Darling-Hammond et al. data reported in 2007	PPI Evaluation Surveys in 2013	PPI Evaluation Surveys in 2014	PPI Evaluation Surveys in 2015
	National Comparison (N=629)	Principal (n=326)	Principal (n=472)	Principal (n=448)
a. Analysis and discussion of case studies	3.74	3.96** (d=.19)	4.15** (d=.42)	3.86* (d=.10)
b. A portfolio demonstrating your learning and accomplishments	2.81	3.88** (d=.84)	3.98** (d=.95)	3.60** (d=.57)
c. Analysis and discussion of field-based problems/problem-based learning approaches	3.47	3.94** (d=.41)	4.12** (d=.67)	3.88** (d=.33)
d. Field-based projects in which you applied ideas in the field	3.37	3.84** (d=.39)	3.97** (d=.55)	3.81** (d=.35)
e. Action research or inquiry projects	3.34	3.66** (d=.26)	3.86** (d=.46)	3.61** (d=.21)

Exhibit reads: Darling-Hammond et al. exemplary programs responses averaged 4.39 and the national comparison responses averaged 3.74 on the extent analysis and discussion of case studies was a part of their coursework. PPI principal responses averaged 3.96 in 2013, 4.15 in 2014 and 3.86 in 2015. Response means in this table are on a five-point scale in which 1 equals "not at all" and 5 equals "to a great extent."

Note: T-tests were conducted to determine statistical significance; *p<.05 and **p<.01. Effect sizes were calculated using Cohen's *d*. We suggest interpreting effect sizes using *d*=+/-.50 as a minimum threshold for interpreting results as having at least a moderate effect.

Source: Principal Survey for "Evaluation of the Principal Pipeline Initiative," 2013, 2014, and 2015; Principal surveys reported in Darling-Hammond, L., LaPointe, M., Meyerson, D., Orr. M. T., & Cohen, C. (2007). *Preparing school leaders for a changing world: Lessons from exemplary leadership development programs.* Stanford, CA: Stanford University, Stanford Educational Leadership Institute.

Exhibit B-3: Principal perceptions of their preparedness compared to Darling-Hammond et al. exemplary programs, 2013-2015

To what extent were the following qualities/practices true of your formal leadership preparation training?	Darling-Hammond et al. data reported in 2007	PPI Evaluation Surveys in 2013	PPI Evaluation Surveys in 2014	PPI Evaluation Surveys in 2015
	Exemplary Program (N=242)	Principal (n=326)	Principal (n=476)	Principal (n=444)
a. Engage in self-improvement and continuous learning	3.58	3.38** (d=-.28)	3.36** (d=-.31)	3.35** (d=-.32)
b. Evaluate teachers and provide instructional feedback to support their improvement	3.36	3.10** (d=-.31)	3.24** (d=-.16)	3.09** (d=-.31)
c. Create a collaborative learning organization	3.34	3.17** (d=-.22)	3.24** (d=-.12)	3.19** (d=-.19)
d. Use data to monitor school progress, identify problems and propose solutions	3.31	3.18** (d=-.15)	3.16** (d=-.18)	3.08** (d=-.26)
e. Design professional development that builds teachers' knowledge and skills	3.25	2.87** (d=-.44)	2.96** (d=-.32)	2.86** (d=-.44)
f. Engage staff in a decision making process about school curriculum and policies	3.22	3.13* (d=-.11)	3.11** (d=-.14)	3.04** (d=-.23)
g. Lead a well-informed, planned change process for a school	3.22	3.10** (d=-.15)	3.16 (d=-.08)	3.05** (d=-.21)
h. Engage in comprehensive planning for school improvement	3.22	3.09** (d=-.15)	3.14* (d=-.09)	3.06** (d=-.18)
i. Create a coherent educational program across the school	3.22	2.96** (d=-.32)	3.05** (d=-.21)	2.95** (d=-.33)
j. Redesign school organizations to enhance productive teaching and learning	3.06	2.92** (d=-.16)	2.93** (d=-.15)	2.88** (d=-.21)
k. Understand how different students learn and how to teach them successfully	3.03	2.70** (d=-.38)	2.75** (d=-.32)	2.69** (d=-.36)
l. Evaluate curriculum materials for their usefulness in supporting learning	2.92	2.56** (d=-.39)	2.67** (d=-.28)	2.51** (d=-.44)

Exhibit reads: Darling-Hammond et al. exemplary programs responses averaged 3.58 on how prepared they were to engage in self-improvement and continuous learning. PPI principal responses averaged 3.38 in 2013, 3.36 in 2014 and 3.35 in 2015. Responses on this table are on a four-point scale in which 1 equals "not at all" and 4 equals "very well."

Note: Response means from the Darling-Hammond et al. survey were converted from a five-point scale to a four-point scale to allow for comparisons.

Note: T-tests were conducted to determine statistical significance; *p<.05 and **p<.01. Effect sizes were calculated using Cohen's *d*. We suggest interpreting effect sizes using *d*=+/-.50 as a minimum threshold for interpreting results as having at least a moderate effect.

Source: Principal Survey for "Evaluation of the Principal Pipeline Initiative," 2013, 2014, and 2015; Principal surveys reported in Darling-Hammond, L., LaPointe, M., Meyerson, D., Orr. M. T., & Cohen, C. (2007). *Preparing school leaders for a changing world: Lessons from exemplary leadership development programs.* Stanford, CA: Stanford University, Stanford Educational Leadership Institute.

Exhibit B-4: Principal perceptions of their preparedness compared to Darling-Hammond et al. national comparison, 2013-2015

To what extent were the following qualities/practices true of your formal leadership preparation training?	Darling-Hammond et al. data reported in 2007 National Comparison *(N=629)*	PPI Evaluation Surveys in 2013 Principal *(n=326)*	PPI Evaluation Surveys in 2014 Principal *(n=476)*	PPI Evaluation Surveys in 2015 Principal *(n=444)*
a. Engage in self-improvement and continuous learning	2.91	3.38** *(d=.64)*	3.36** *(d=.62)*	3.35** *(d=.60)*
b. Evaluate teachers and provide instructional feedback to support their improvement	2.82	3.10** *(d=.33)*	3.24** *(d=.54)*	3.09** *(d=.30)*
c. Create a collaborative learning organization	2.69	3.17** *(d=.63)*	3.24** *(d=.71)*	3.19** *(d=.66)*
d. Use data to monitor school progress, identify problems and propose solutions	2.47	3.18** *(d=.82)*	3.16** *(d=.83)*	3.08** *(d=.70)*
e. Design professional development that builds teachers' knowledge and skills	2.50	2.87** *(d=.42)*	2.96** *(d=.51)*	2.86** *(d=.41)*
f. Engage staff in a decision making process about school curriculum and policies	2.70	3.13** *(d=.52)*	3.11** *(d=.52)*	3.04** *(d=.41)*
g. Lead a well-informed, planned change process for a school	2.59	3.10** *(d=.63)*	3.16** *(d=.73)*	3.05** *(d=.56)*
h. Engage in comprehensive planning for school improvement	2.58	3.09** *(d=.63)*	3.14** *(d=.68)*	3.06** *(d=.58)*
i. Create a coherent educational program across the school	2.63	2.96** *(d=.41)*	3.05** *(d=.53)*	2.95** *(d=.40)*
j. Redesign school organizations to enhance productive teaching and learning	2.46	2.92** *(d=.55)*	2.93** *(d=.58)*	2.88** *(d=.51)*
k. Understand how different students learn and how to teach them successfully	2.56	2.70** *(d=.16)*	2.75** *(d=.22)*	2.69** *(d=.14)*
l. Evaluate curriculum materials for their usefulness in supporting learning	2.49	2.56 *(d=.08)*	2.67** *(d=.20)*	2.51 *(d=.03)*

Exhibit reads: Darling-Hammond et al. national comparison responses averaged 2.91 on how prepared they were to engage in self-improvement and continuous learning. PPI principal responses averaged 3.38 in 2013, 3.36 in 2014 and 3.35 in 2015. Responses on this table are on a four-point scale in which 1 equals "not at all" and 4 equals "very well."

Note: Response means from the Darling-Hammond et al. survey were converted from a five-point scale to a four-point scale to allow for comparisons.

Note: T-tests were conducted to determine statistical significance; *p<.05 and **p<.01. Effect sizes were calculated using Cohen's *d*. We suggest interpreting effect sizes using *d*=+/-.50 as a minimum threshold for interpreting results as having at least a moderate effect.

Source: Principal Survey for "Evaluation of the Principal Pipeline Initiative," 2013, 2014, and 2015; Principal surveys reported in Darling-Hammond, L., LaPointe, M., Meyerson, D., Orr. M. T., & Cohen, C. (2007). *Preparing school leaders for a changing world: Lessons from exemplary leadership development programs.* Stanford, CA: Stanford University, Stanford Educational Leadership Institute.

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October 2016