PROGRESS IN THE FIRST FIVE YEARS

An Evaluation of Achieving the Dream Colleges in Washington State

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December 2012

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Community Colleges Count

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Overview

In 2004, Lumina Foundation for Education launched an innovative national reform initiative, Achieving the Dream (ATD), with the purpose of increasing the persistence and completion rates of community college students, especially low-income students and students of color, through evidence-based institutional change. Originally consisting of 26 partner colleges in five states, today more than 150 colleges in 30 states and the District of Columbia participate in ATD, which in 2010 became a national nonprofit organization.

This report examines six community and technical colleges in Washington State that joined the initiative in 2006 ("Round 3") and were provided with grant funding from College Spark Washington and the services of a leadership coach and data coach to facilitate their ATD efforts. The report (1) describes the progress each college made in implementing ATD's "culture of evidence" principles for institutional improvement; (2) examines strategies implemented by the colleges to improve student outcomes, comparing them to interventions developed by the 26 "Round 1" colleges that joined ATD in 2004; and (3) charts trends in student outcomes in the period before and after the Washington colleges joined the initiative.

Key findings for the six Washington ATD colleges are:

- **Progress toward building a culture of evidence.** All but one of the colleges made at least some progress. Two colleges made substantial progress, moving from a low level of implementation to a high level over the five years of their ATD involvement. Specifically, they strengthened student success goals and strategies, increased their institutional research capacities, created institutional effectiveness committees, and strengthened their program review processes.

- **Development of student success strategies.** Several of the colleges — those further along in implementing the ATD culture of evidence principles — made significant systemic changes to programs and services. Compared with the Round 1 ATD colleges, the Washington colleges were more likely to have implemented changes in instruction as opposed to student support services and were more successful in operating improvement strategies at scale.

- **Student outcome trends after ATD implementation.** The average student outcomes across the six colleges appear largely unchanged, as do the racial and economic achievement gaps. The colleges that succeeded in implementing improvement strategies at scale did so only later in the

period under study. It may be too early to see their impact. On the other hand, most of the reforms implemented by the Washington colleges were at the "front end," in that they involved changes to orientation and intake advising as well as to developmental instruction. Improving student completion rates may also require systemic changes to the design of academic programs to ensure that they are well structured and aligned with the requirements for success in further education and, for career-technical programs, success in the labor market.

The report also examines lessons from the experiences of the Washington ATD colleges for other colleges seeking to improve student outcomes.

This study was conducted during a period of both rapid enrollment growth and sharp cuts in state funding. Making systemic changes in practice in ways that the Washington ATD colleges have begun to do and in the other ways recommended in this report requires resources — resources for new and strengthened information systems, for professional development and training, and for coordination. The Washington colleges have shown that even during a period of dramatic cuts in funding, they have been willing to make major changes in practice. The fact that they have reallocated scarce resources toward practices that have the potential to be more effective illustrates their commitment to greater student success.

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Preface

Open-access, low-cost community colleges are increasingly understood as a critical resource for millions of adults who might otherwise be unable to access higher education. Community college degrees and certificates are instrumental for many low-income students seeking jobs that pay a living wage. Yet it is also true that the majority of students who enroll in a community college do not graduate or earn a credential; indeed, many students drop out even before completing developmental coursework that is designed to prepare them for the academic challenges of college-level courses.

Nearly a decade ago, Lumina Foundation for Education launched a bold initiative — Achieving the Dream — to help more community college students, particularly low-income students and students of color, stay in college and earn a certificate or degree. The initiative calls upon colleges to use data on their own students to evaluate institutional programs and services, thus providing a way for faculty and administrators to engage in thoughtful self-assessment, reflection, and decision making that leads to the implementation and evaluation of strategies aimed at increased student success. Achieving the Dream has grown dramatically since its founding in 2004 — more than 150 colleges in 30 states now participate in the initiative.

Since Achieving the Dream began, the Community College Research Center at Teachers College, Columbia University, and MDRC have been examining the ways in which participation in the initiative has affected community colleges and their students. One analysis (Rutschow et al., 2011) covered the 26 institutions that joined the initiative initially in 2004. Another study (Jenkins, Ellwein, Wachen, Kerrigan, & Cho, 2009) reviewed the early Achieving the Dream experiences of 13 colleges — seven in Pennsylvania and six in Washington State — that joined the initiative in 2006.

The study reported on here evaluates the changes to date in the six Washington colleges. It compares their progress after five years of participation in Achieving the Dream with, first, a baseline examination of their progress (Jenkins et al., 2009), and, second, with findings on the progress of the 26 original Achieving the Dream colleges (Rutschow et al., 2011). The study shows that most of the Washington colleges made great progress in building a culture and an infrastructure for evidence-based improvement. Several of the Washington colleges have made significant changes to their programs and services, especially in intake advising and developmental education. Colleges that succeeded in implemented innovations at scale did so rather late in the study period, so it may be too early to see their effects.

One clear implication of the study is that no single intervention that a college undertakes will likely lead to a large increase in college-wide persistence or completion rates.

Rather, the redesign of major programs and functions throughout a college must be considered in order to achieve substantial gains in student success.

Thomas Bailey
Director, Community College Research Center

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This study was conducted through a partnership of the Community College Research Center (CCRC) at Teachers College, Columbia University, and MDRC. CCRC and MDRC researchers collaborated in developing the protocols for the fieldwork and in carrying out the site visits. The authors wish to thank Thomas Brock, Lashawn Richburg-Hayes, Elizabeth Zachry Rutschow, and John Hutchins at MDRC and Thomas Bailey of CCRC for reviewing drafts on which this report is based. We are also grateful to the representatives from the Washington Achieving the Dream colleges and State Board for Community and Technical Colleges who met with us in Seattle in October 2012 to discuss our findings and their implications for improving practice. Thanks to Amy Mazzariello and Wendy Schwartz for their expert editing and formatting of the manuscript, to Donna Chan for her work processing the data, and to Doug Slater for managing the publication process. Finally, we want to thank the Washington community and technical college faculty, staff, and administrators who participated in the various aspects of the study. Their clear dedication to improving outcomes for their students is an inspiration.

The Authors

Executive Summary

This report presents findings from an evaluation of the work on Achieving the Dream (ATD) of the first six Washington State community and technical colleges to participate in the initiative. ATD is a national community college reform movement dedicated to increasing the number of students, particularly low-income students and students of color, who earn postsecondary credentials with marketplace value. Currently over 150 institutions in 30 states and the District of Columbia take part in ATD. The six Washington colleges examined in this report joined the initiative in 2006. These colleges, which in the body of the report are not identified by name in order to optimize learning from their experiences, are Big Bend Community College, Highline Community College, Renton Technical College, Seattle Central Community College, Tacoma Community College, and Yakima Valley Community College.

This report is part of a larger evaluation of ATD being conducted by MDRC and the Community College Research Center (CCRC) with funding from Lumina Foundation for Education. The purpose of the Washington State study, also underwritten in part by College Spark Washington, was to examine the progress made by the Washington ATD colleges in implementing the ATD "culture of evidence" principles for institutional improvement and in improving student outcomes. This report on the Washington ATD colleges examines the following research questions:

- Have the colleges made progress in building a culture of evidence by implementing the ATD principles of institutional improvement?
- What student success strategies did the colleges implement under ATD, and which of these are being implemented at scale?
- Has involvement in ATD changed the way that faculty, staff, and administrators use data? If so, in what ways?
- What have been the trends in student achievement among the Washington ATD colleges? Is there evidence that student progression and outcomes improved during the period after the Washington State colleges joined ATD?

Lumina Foundation and other ATD funders are especially interested to see if the Washington State colleges, which joined the initiative in the third round when it was more fully developed, progressed faster than colleges that joined in the first round. Hence, another focus of this report is to compare the progress of the Washington colleges over the first five years of their involvement in the initiative with that of the "Round 1" ATD colleges.

We collected data for this evaluation through a review of the Achieving the Dream internal reports, field research at all six colleges, a survey of data use by faculty and administrators, and student data shared by the colleges. The study was conducted in two waves: a "baseline" examination of the initial work and early progress of the Washington ATD colleges conducted in 2008, and follow-on research conducted in 2011, the fifth and final year of the colleges' initial implementation work on ATD. To assess the progress made by the Washington colleges, this report compares the findings from the second wave of research in Washington with that of the first wave, which were examined in a 2009 report by CCRC and MDRC (Jenkins, Ellwein, Wachen, Kerrigan, & Cho, 2009). It also compares the progress of the Washington colleges after their first five years in ATD with that of the first round of colleges to join the initiative, which was explored in a 2011 MDRC–CCRC report (Rutschow et al., 2011).

It is important to point out that this study was conducted during a period of both rapid enrollment growth and sharp cuts in state funding. Thus, the Washington ATD colleges were faced with the challenge of making systemic changes to practice in a time of scarce resources.

Progress Building a Culture of Evidence

Table ES.1 shows the progress made by the Washington ATD colleges in implementing practices that reflect the four Achieving the Dream "culture of evidence" principles: (1) leadership committed to improving student outcomes and equity, (2) use of evidence to improve student success, (3) broad engagement of stakeholders in the improvement process, and (4) continuous improvement. The ratings are based on a protocol and rubric the research team used to evaluate how much each college had implemented the ATD principles. For each dimension, the college received a rating from 1 (little or none) to 5 (high level/a lot).

All but one of the colleges made at least some progress toward building a culture of evidence according to the ATD principles. Two colleges made substantial progress, moving from a low level of implementation to a high level over the first five years of their involvement with the initiative.

Table ES.1

Level of Implementation of ATD Culture of Evidence Principles at the Washington Colleges: A Comparison of Spring 2008 and Spring 2011

College	Spring 2008	Spring 2011	Increase in Levels
WA-A	High	Very high	+1
WA-B	Medium	High	+1
WA-C	Low	High	+2
WA-D	Low	High	+2
WA-E	Very low	Low	+1
WA-F	Very low	Very low	0

NOTE: In this report, we do not name colleges but rather use aliases to optimize learning from their experiences.

While it is difficult to compare the six Washington ATD colleges with the 26 Round 1 ATD colleges, it does seem that the Washington colleges, as a group, went at least as far in building a culture of evidence as did the Round 1 colleges. Five years after they joined ATD, we rated four of the six Washington colleges as having implemented the ATD principles at a high level. This means that the college leadership had made strong commitment to improving student outcomes (not just enrollments), that the colleges were actively engaging faculty and staff and using student records and other data to assess the effectiveness of student services, and that they strengthened strategic planning and other infrastructure for continuous improvement. In comparison, only 11 of the 26 Round 1 colleges (or 42 percent) implemented most of the practices associated with a strong culture of evidence by the end of their five-year ATD implementation period.

Bringing about changes in organizational practice is not easy. All of the Washington colleges faced barriers to implementing practices that reflect the ATD principles. At the college that made the least progress in building a culture of evidence, turnover among the college's top leadership made it difficult to sustain a focus on student success. All six colleges initially had trouble accessing the data needed to conduct the longitudinal cohort tracking recommended by ATD because all of the colleges in the state were dependent on an antiquated statewide "legacy" student information system. Three of the colleges built data warehouses to facilitate longitudinal analysis of data, although the others continued to go through the cumbersome process of downloading data from the state system each time they conducted new analyses.

It is also true that bringing about systemic change requires resources. Although the Washington ATD colleges received some funding to support ATD activities (about $100,000 per year during the implementation year), the period under study was one in which per-student

revenues declined due to a sharp increase in student enrollments and sharp cuts in state funding in the wake of the Great Recession. One area essential to change efforts in which some colleges were forced to cut was professional development for faculty and staff. For example, one college eliminated a full-time faculty development staff person whom faculty interviewees praised for helping to support efforts to improve instruction. The alternative, according to the college's administrators, was to reduce resources for instruction.

Despite these challenges, all of the colleges made at least some changes to organizational practice as a result of their participation in Achieving the Dream. Table ES.2 summarizes these changes.

Achieving the Dream Colleges in Washington State

Table ES.2

Major Changes in Organizational Practice Among the Washington Colleges During the First Five Years of ATD

Changes in Organizational Practice	Number of Colleges
Strengthened goals/measures for student success	6
Increased IR staff and capacity	4
Strengthened student success strategy development process	4
Built data warehouse and added programmer	3
Created institutional effectiveness committees	3
Strengthened program review process	2

All six colleges developed goals for student success using measures that were similar to and in some cases adapted from the ATD performance measures. One college went a step further by asking each department to establish student success goals and measures tied to institutional goals. Another strengthened its program review process, with performance measures defined in collaboration with faculty.

Three of the colleges added institutional research (IR) staff who built data warehouses, improved procedures for requesting information, provided data support to student success committees and others, and trained faculty and staff in the use of data. The report includes a case study of one of these colleges that had struggled for years to produce data that college faculty and other stakeholders could trust. The college was successful in building a home-grown institutional effectiveness office, choosing a well-regarded faculty member to head the new office, which sent the message to the faculty that research would focus on instruction. In these

three colleges and one other, the efforts of the IR staff to increase access to data and research was enhanced by "data teams" comprised of faculty, staff, and administrators who helped to "democratize" the use of data at the college, promoting data use among their colleagues and also providing guidance on how to do so.

The three colleges that added IR staff also created standing bodies that were responsible for overseeing efforts to improve student outcomes and institutional effectiveness. Such a committee already existed at another one of the colleges prior to its joining ATD. In some cases the ATD data teams were integrated into these committees; in others, the data teams were separate. In all cases, IR staff worked closely with committee members to help ensure that the decisions they made were based on evidence. All four colleges with such committees also created or strengthened processes for identifying opportunities to improve student success and to develop strategies for doing so.

As part of its strategic planning and improvement process, one college worked with each department to set measurable goals for improving student learning and success. Another college formalized and strengthened its program review process to include a focus on student retention and completion, not just enrollment. The college used this process to decide which programs to eliminate in response to sharp cuts in state funding that occurred during this period. The administration worked with the faculty to develop the metrics to be used. Faculty and department chairs that were interviewed said that the administration was trying to be more transparent and fair in its decisions. The college's strengthened IR capacity and program review process and measures helped to make this possible.

Student Success Strategies

A spring 2011 report by MDRC and CCRC on the progress of the 26 Round 1 ATD colleges yielded three main findings regarding the implementation of strategies for improving student success (Rutschow et al., 2011). First, only one-fourth of all direct student interventions in the Round 1 colleges were designed to change classroom instruction; most of the interventions involved either student support services or academic assistance designed to support instruction in the classroom. Second, across the Round 1 colleges there was a trade-off between the scale and intensity of implemented ATD strategies. Low-intensity strategies, which tended to be support services such as orientation and advising programs, were more likely to be implemented at scale than were high-intensity strategies such as curricular reforms, supplemental instruction, and learning communities, which generally "touched" relatively small numbers of students. Third, while some of the colleges did implement strategies that touched large numbers of students, the majority of all direct interventions at the Round 1 colleges remained small in scale. These findings show the difficulty of implementing interventions on a scale sufficient to reach substantial numbers of students. Yet, as MDRC and CCRC pointed out

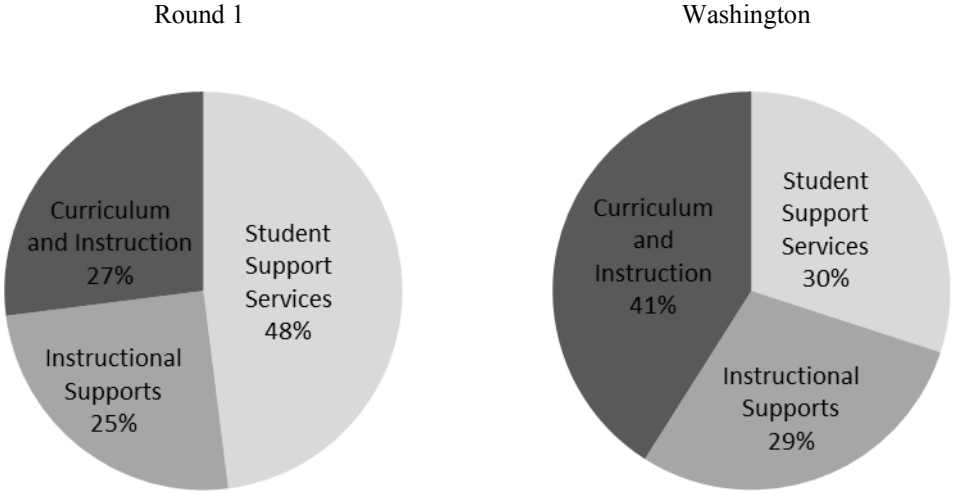
in the 2011 report on the Round 1 institutions, unless colleges can implement high-intensity instructional reforms at scale, they are unlikely to be able to increase completion and success rates for substantial numbers of students.

The Round 1 colleges and the Washington State colleges targeted similar student populations for the majority of their improvement strategies. Both groups of colleges focused on developmental education for the majority of their interventions. At the Round 1 colleges, nearly half of all strategies involved work on this area, and at the Washington colleges the proportion was even higher (56 percent). Furthermore, in both groups, strategies targeting first-year students were the second most common after developmental education.

However, one notable difference between the Round 1 and Washington colleges was that the Washington colleges focused their ATD activities on instruction to a greater extent than did the Round 1 colleges. Among the Round 1 colleges, instructional changes (including both reforms to curriculum and instruction and to instructional supports) made up 52 percent of all direct student success strategies. In Washington, instructional changes accounted for 70 percent of all direct strategies (see Figure ES.1). In this, the Washington colleges may have benefited

Figure ES.1

Proportion of Student Success Strategies by Type Used at Round 1 and Washington ATD Colleges

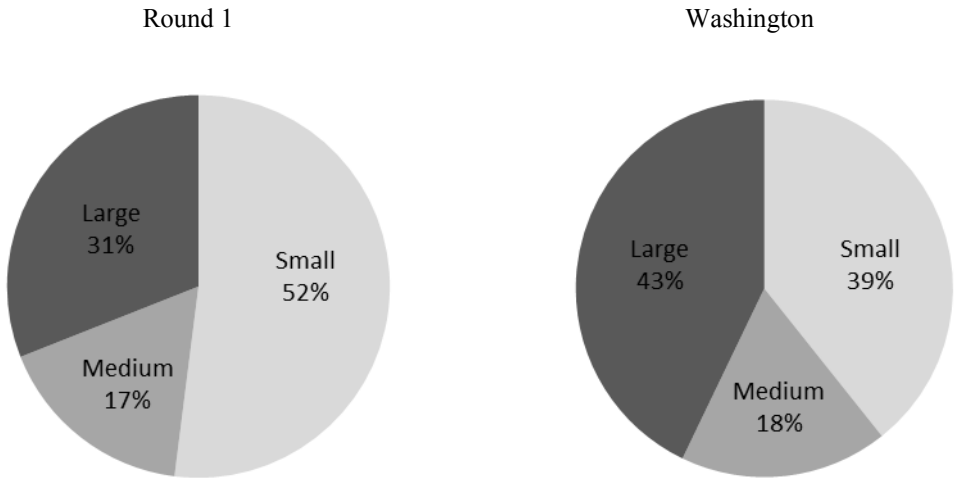


from the experiences of the Round 1 colleges and learned about successful approaches for changing instructional practices.

Another difference between the Round 1 and Washington colleges was the scale of student interventions. Figure ES.2 shows that 31 percent of strategies implemented by the Round 1 colleges were operating at scale (defined as affecting at least 25 percent of the target student population), compared with 43 percent of strategies at the Washington colleges. And in contrast to the Round 1 colleges, the large-scale strategies at Washington colleges were not mostly limited to student services. Over half of the strategies that had reached a substantial number of students in Washington involved changes to instructional practices.

Figure ES.2

Proportion of Strategies Operating at Small, Medium, or Large Scale at Round 1 and Washington ATD Colleges



The research literature on organizational effectiveness suggests that no one innovative practice or even set of discrete practices is sufficient to improve organizational performance. For community colleges, the implication is that to achieve substantial improvements in student outcomes, they will need to make systemic changes in programs and services. From this

perspective, rather than test and scale up discrete interventions, colleges need to redesign major programs and functions at scale.

While we saw some cases among the Round 1 colleges of institutions making systemic changes to programs and services, this was more prevalent among the Washington colleges. For example, one college developed a comprehensive approach to helping first-year students navigate from matriculation to the declaration of a program of study, with the goal of helping them obtain 30 credits by the end of the first year. The multi-pronged approach included early assessment, mandatory orientation, a redesigned student success course, and intrusive advising for students, along with a locally developed software application for tracking student progression and improving advising. As a result of integrating interventions into a more comprehensive model that supports students along a pathway from intake to the accumulation of 30 college credits, the college has seen some initial success in improving the experience of first-year students.

On the instructional front, one college transformed its developmental math sequence to make the math curriculum more relevant to students' academic pathways. In addition to the curricular reform, the strategy reduced the length of the developmental math sequence from three terms to two terms for students not pursuing STEM programs of study. Administrators reported that because the entire developmental math structure had changed, faculty became engaged in deeper conversations about math content and placement procedures more generally. At two other colleges, faculty led efforts to spread effective teaching methods across academic programs.

These cases suggest that the engagement of faculty in the knowledge-building and ownership of reform efforts is an important component of implementing changes in classroom practice at scale. They also suggest that without the active support of administrators to facilitate communication and spread reform efforts, broad faculty engagement and scaling up efforts are likely to be more difficult to achieve (as we saw in at least one of the other colleges). The Washington colleges that were most likely to make systemic changes by redesigning programs and services and by supporting the diffusion of instructional innovations were those that we found to be further along in implementing the ATD culture of evidence principles. This finding supports the idea, central to the Achieving the Dream theory of change, that building a culture of evidence creates the organizational conditions for reforming academics and student services to better serve students.

The approach taken by these colleges was essentially to innovate at scale rather than to scale innovations. Although they did experiment with different approaches, the colleges tended to redesign programs and services college-wide. Such innovations are easier for colleges to sustain since they become part of the way colleges operate. We hypothesize that the colleges

that were able to innovate at scale are those that will see the greatest improvements in performance.

Data Use by Faculty, Administrators, and Staff

We conducted surveys of the use of data by faculty and administrators at the Washington colleges in two waves, one in 2007–08, when the colleges first began to implement their ATD work, and one in 2011, near the end of the five-year implementation phase. Based on the surveys, we found some positive changes in the extent of use of data over time by faculty for teaching-related purposes, particularly at three of the colleges. We observed no changes, however, in the frequency with which faculty used data on academic achievement gaps between students of different races/ethnicities and income levels.

Faculty at three of the colleges perceived an increase in the use of data by their academic departments, particularly for curricular decisions and identifying courses with high failure rates. Yet use of data by administrative departments at the colleges declined between the two waves of the survey. This suggests that use of data for planning purposes waned following the first year or two of participation in Achieving the Dream, when colleges were strongly encouraged and were given help to analyze data on student success.

These findings suggest that some positive changes in attitudes toward and use of data took place during the initial implementation phase of the first six Washington ATD colleges. Moreover, the colleges that made the most progress in implementing practices that reflect the ATD culture of evidence principles were more likely to show evidence of increased data use. However, there were perhaps not as many improvements as we expected at the outset of this initiative, which has among its core principles the creation of a culture of evidence to improve student outcomes. Although we are encouraged by the generally positive changes that occurred, these patterns of improved data use varied across colleges and within colleges between faculty and administrators.

Student Outcome Trends

Using student-level data from the entering fall cohorts of 2003 through 2009, we examined average initiative-wide outcomes across the six Washington colleges on five key ATD performance indicators, measured two years after the students entered college: (1) attempting and completing developmental education (remedial) courses in English and mathematics, (2) attempting and completing the first college-level course (gatekeeper) in English and mathematics, (3) attempting and completing credits, (4) persisting fall-to-fall and year-to-year, and (5) earning certificates or degrees. Each cohort was followed for a two-year

period. For example, the 2009 cohort was tracked through the 2009–10 and 2010–11 academic years.

The main findings from the student outcomes analysis are:

- The average student outcomes across the six colleges appear largely unchanged after the colleges began implementing Achieving the Dream.
- The initiative does not appear to have reduced the achievement gap along racial or economic lines. The gap between students who received Pell grants (a measure of low-income status) and those who did not does appear to decrease over students' academic careers, but this was also true prior to implementation of Achieving the Dream.
- There do not appear to be greater gains associated with Achieving the Dream for some colleges compared with others.

These findings should be interpreted cautiously. The colleges implemented a wide variety of student success strategies, and their strategies seem to be reaching more students than in earlier rounds of the initiative. In this sense, the colleges appear to have built on the experiences of previous rounds of Achieving the Dream, and in recent years, they have been moving closer to affecting large portions of their student populations. With respect to the 2007 through 2009 cohorts included in this analysis, however, the Washington colleges were still reaching relatively small proportions of students through their new strategies. Moreover, few of the colleges reached scale with a comprehensive set of strategies that touch students across the full range of their experiences, even in more targeted areas of the student experience such as intake and remediation, where most of the ATD strategies were focused. It may be that the colleges positively affected students on a smaller scale than these analyses could detect, or that they positively impacted larger numbers of students in subsequent years.

Benefits of Participating in ATD

We asked those we interviewed at the colleges what they saw as the main benefits of participating in ATD. Five of the six colleges indicated that they benefited in substantial ways from participating in the initiative. Table ES.3 lists the main benefits and indicates the number of colleges mentioning each.

Table ES.3

Perceived Benefits of ATD for Organizational Practice at the Washington Colleges

Type of Benefit	Specific Benefit	Number of Colleges
Institutional Research and Data Use	• Greater access to data and stronger capacity to use data in decision-making processes	5
	• Increased use of data to improve college programs and policies	4
	• Use of data for greater transparency in resource allocations/budget decisions	2
	• Strengthened grant writing capacity	2
Student Success Strategies	• Systematic approach to developing strategies based on student outcomes data	4
	• Impetus to develop/expand strategies	2
Initiative Alignment	• Synergy with new accreditation process and with WA Student Achievement Initiative	6

Respondents at five of the six colleges indicated that their organization has benefited from an increased access to and use of data and research on student outcomes. Three colleges mentioned that one benefit of increased IR capacity was a strengthened capacity to pursue grant funding.

Three of the colleges credited their participation in ATD with strengthening the process by which they identify ways to improve programs and services, specifically by improving the quality of data for making decisions about what to improve and how. All six colleges said that ATD helped them better align efforts to improve student completion, particularly those related to meeting the new accreditation standards.

Most of the colleges found their ATD coaches (a leadership coach and a data coach) to be helpful. There was broad agreement among those we interviewed at one college that the both the leadership coach and the data coach challenged the college to improve and, as one respondent said, "kept us accountable." In the last couple years, both coaches at the college have sought to focus college leaders on figuring how to sustain both successful strategies and the overall work on improving outcomes after the initial five years in ATD. Respondents at another college said that their data coach in particular helped to frame the data analyses by asking the right questions and facilitating the process of inquiry and discussions of data by the team. Leaders at a third college said that they would only continue to participate in ATD beyond the initial period if they could have the same leadership coach and data coach.

Lessons for Other Colleges

Based on our in-depth analysis of the experience of the six original Washington State ATD colleges during their first five years in the initiative, we highlight several lessons for the new Washington ATD colleges and others elsewhere seeking to implement similar reforms.

Redesign Programs and Supports at Scale

To achieve substantial improvements in student outcomes, colleges need to make systemic changes in programs and services — no single innovation or even set of interventions will be sufficient to "move the needle" on student completion. From this perspective, rather than test and scale up discrete interventions, colleges should redesign major programs and functions at scale. Rather than try to bring to scale discrete interventions, research on high performance organizations both in and outside of education indicates that improving organizational performance generally requires systemic changes in practice.

Some of the Washington colleges did seek to move beyond implementing discrete interventions to make systemic changes in programs and practices, and several of the colleges succeeded in this. Some of these same colleges also succeeded in promoting diffusion of instructional innovations. In those cases, the colleges seemed to provide a balance between empowering faculty and leaving them alone to try out innovations while at the same time providing support for professional development.

The Washington colleges that were most likely to make systemic changes by redesigning programs and services and supporting the diffusion of instructional innovations were those that we found to be further along in implementing the ATD culture of evidence principles. This finding supports the idea, central to the Achieving the Dream theory of change, that building a culture of evidence creates the organizational conditions for reforming academics and student services to better serve students.

Involve Faculty From the Start in Leading Efforts to Rethink Curriculum and Instruction

Community colleges are unlikely to see substantial improvements in student completion and learning unless there are major changes in classroom practice. Classroom practices are not going to change unless the faculty are convinced of the need to do so and are supported to explore and implement changes. It is critical, therefore, that colleges seeking to improve programs and instruction involve faculty from the start in leading such reforms.

Two or three of the Washington colleges succeeded in making major changes in instructional practice. Faculty at one college revamped its entire developmental mathematics curriculum; at another, a group of faculty spearheaded widespread adoption across departments

of a tested methodology for improving students' comprehension of texts. Colleges that want to engage faculty in reforms should do so early on, being clear about the desired goals but empowering them to decide, in conjunction with their student support services colleagues, how best to achieve them. Colleges should also support the spread of innovative practices by providing the infrastructure and opportunities for faculty and staff across the institution to share their knowledge and experience.

Strengthen Pathways Into and Through Programs of Study

The efforts by the Washington colleges to redesign programs and services were mostly confined to the intake process and developmental education. Over time, as these colleges succeed in implementing these reforms at scale, we hypothesize that these changes will lead to improved success in developmental courses and progression to college-level gatekeeper courses. Most of these reforms were implemented at scale after 2009, so their effects are not likely to be reflected in the data we have on student progression, which only go up to the 2009 first-time fall cohort. In the longer term, however, without systemic changes to colleges' academic programs, we do not see how "front-end" reforms of the sort mainly implemented by the Washington colleges alone can substantially increase student completion and success.

Research suggests that a similar systemic reform may also need to be applied to college-level programs to ensure that they are well structured and aligned with requirements for success in further education and, for career-technical education programs, employment. With a handful of exceptions, the focus of instructional reforms in the Washington colleges was on improving student success in developmental education and introductory college-level math and English. Far less attention was paid to improving student readiness and success in other introductory college courses that serve as gatekeepers to programs in other fields, such as social and behavioral sciences, biological and physical sciences, and business. Taking steps to strengthen programs of study in these fields would also have the effect of broadening involvement by faculty in areas other than English, math, and (in colleges where it is a separate department) developmental education. Colleges also need to strengthen mechanisms to help students choose from among the many programs offered. The work by one college (WA-C) to restructure the intake and advising functions to help students choose a program and earn college credits in it as soon as possible offers a promising model.

Use a Common Set of Performance Measures to Focus Strategy Development and Promote Sharing

Each of the Washington colleges has developed clear goals for student success with accompanying metrics, spurred in part by the new accreditation standards of the Northwest Commission on Colleges and Universities that emphasize the use of metrics and evidence in planning and improvement. Each college has developed its own set of goals and measures. While some of the colleges have borrowed from ATD performance measures, none have adopted them as a set.

While it makes sense for colleges to adopt their own performance measures, from the standpoint of ATD it is problematic that there is not a common set of metrics that colleges across the initiative recognize and pay attention to. Unless colleges focus their reforms on particular metrics, it is unlikely that they will develop innovations that will improve their performance on those metrics. Also, without shared performance measures across colleges, it is difficult for the initiative and colleges participating in it to identify colleges that do improve their performance.

Therefore, we recommend that Achieving the Dream encourage colleges across the initiative to adopt a common set of performance measures for use in developing and examining the effectiveness over time of their own strategies and in comparing colleges on particular measures for the purpose of identifying colleges that have improved their performance over time.

Looking Ahead

Making systemic changes in practice in the ways that most of the original Washington State ATD colleges already have begun to do and in the other ways recommended here requires resources — resources for new and strengthened information systems, for professional development and training, and for coordination. The Washington ATD colleges have shown that even during a period of rising enrollments and dramatic cuts in funding, they have been willing to make major changes in practice. They have done so by reallocating their scarce resources from practices that are not effective to those that are thought to be so. The strong commitment to student success of these colleges, combined both with the interest of other colleges in the state in joining ATD and the willingness of College Spark and Lumina Foundation to support them, makes us optimistic that Washington's community and technical colleges, along with the State Board for Community and Technical Colleges, will find ways in this difficult economic climate to make changes that are necessary to improve student outcomes.

Chapter 1

Introduction

This report presents findings from research conducted by the Community College Research Center (CCRC) and MDRC in spring 2011 on the implementation work of community and technical colleges in Washington State that are participating in Achieving the Dream (ATD). The findings are based on field research, a survey of data use by college personnel, and an analysis of trends in academic performance. The report compares the findings to those of an earlier "baseline" examination of the initial work and early progress of Washington and Pennsylvania ATD colleges that CCRC and MDRC conducted in spring 2008 (Jenkins, Ellwein, Wachen, Kerrigan, & Cho, 2009). It also compares the progress of the Washington colleges after their first five years in ATD with the progress of the first round of colleges to join the initiative, which was examined in a 2011 MDRC–CCRC report (Rutschow et al., 2011).

Overview of Achieving the Dream

Achieving the Dream is a national nonprofit dedicated to contributing to the nationwide effort to increase the number of students, particularly low-income students and students of color, who earn postsecondary credentials with marketplace value. ATD was conceived in 2004 as a reform movement by Lumina Foundation for Education and seven partner organizations: the American Association of Community Colleges; the Community College Leadership Program at The University of Texas at Austin; the Community College Research Center at Teachers College, Columbia University; Jobs for the Future; MDC; MDRC; and Public Agenda. In 2010, Achieving the Dream became an independent nonprofit organization.[1]

ATD and its partner organizations provide participating colleges with technical support to help them actualize their reform plans. Each college works with an ATD leadership coach and data coach (also called a data facilitator) who provide technical assistance for ATD work throughout a one-year planning period and a four-year implementation period. The colleges are encouraged to develop ATD core teams and data teams consisting of representatives from their various divisions to address the work of ATD generally and the efforts to increase data and research capacity at the institution specifically.

[1] For additional information about Achieving the Dream, see the initiative's website, www.achievingthedream.org.

Currently more than 150 institutions in 30 states and the District of Columbia participate in ATD. Colleges joined the initiative in different years, with the first group of participating colleges (located in Florida, New Mexico, North Carolina, Texas, and Virginia) joining in the 2004–2005 academic year. These institutions are referred to as the Round 1 colleges. Six colleges in Washington State were part of the third round of colleges to join ATD in the 2006–2007 academic year, and they are covered in this report. The Washington colleges each received a four-year grant of $400,000 from College Spark Washington during the implementation period.

The Achieving the Dream Culture of Evidence Principles

ATD seeks to improve student success on a substantial scale by fundamentally changing the way that community colleges operate. To accomplish this goal, ATD promotes a comprehensive, evidence-based reform model. Colleges develop a "culture of evidence" in which data on student progression and outcomes are used to make decisions about the design and implementation of programs and services. Four main principles govern the ATD culture of evidence model for institutional improvement: (1) committed leadership, (2) use of evidence to improve programs and services, (3) broad engagement of stakeholders, and (4) systemic institutional improvement.[2]

Committed Leadership

Committed leadership is essential to effect systemic change that will improve student outcomes and narrow gaps in achievement between students of different races/ethnicities and income levels. The college president and other senior administrators marshal support across the institution for an overall vision of student success and for specific efforts to reform policies, programs, and services. Board members and faculty leaders help to support this vision.

Use of Evidence to Improve Programs and Services

The use of data and research to drive institutional improvement is central to the ATD culture of evidence model. Colleges use data on student progression and outcomes to design, deliver, and fund strategies to improve programs and services and to evaluate the effectiveness of those strategies. Data are also used to identify and address achievement gaps.

[2] For a more in-depth description of the model, see Rutschow et al., 2011, pp. 9-13.

Broad Engagement

The widespread engagement of stakeholders across the institution is necessary to bring about sustainable institutional reform. Faculty, staff, administrators, students, and the larger community all are engaged in efforts to enhance student success, and they work collaboratively to develop, evaluate, and improve student success interventions.

Systemic Institutional Improvement

Colleges build an infrastructure to support continuous, systemic improvement. They make substantial changes in policies, organizational infrastructure, and budget allocations that are evidence-based and outcomes-driven. Professional development opportunities for faculty and staff are provided to reinforce student success.

Achieving the Dream Colleges in Washington State

Six colleges in Washington State joined Achieving the Dream during the 2006–2007 academic year. They were selected because they enrolled the highest proportions of low-income students and/or students of color among the 34 community and technical colleges in the state system. The six colleges, along with a group of Pennsylvania colleges that also joined that year, were the third group of colleges to join the initiative and therefore are referred to as the Round 3 colleges. Table 1.1 identifies the Washington colleges and presents enrollment information from 2006–2007 and 2010–2011. This report examines the implementation work at the Washington colleges as of spring 2011, five years after the colleges first joined Achieving the Dream. Throughout the rest of this report, the colleges are not identified by name in order to optimize learning from their experiences.

Table 1.1

Achieving the Dream Colleges in Washington State

College	Location	2006–2007 Enrollment (FTE)	2010–2011 Enrollment (FTE)
Big Bend	Moses Lake	1,487	1,878
Highline	Des Moines	4,687	6,171
Renton Technical	Renton	2,166	2,908
Seattle Central	Seattle	5,138	6,154
Tacoma	Tacoma	4,758	6,360
Yakima Valley	Yakima	3,483	3,771

SOURCE: U.S. Department of Education, National Center for Education Statistics, Integrated Postsecondary Education Data System.

As is evident from Table 1.1, the first five years of the Washington colleges' involvement in ATD was a period of rapid enrollment growth, brought on at least in part by the Great Recession, when many workers returned to college to improve their skills and earn marketable credentials. At the same time — also as a result of the recession — the Washington community and technical colleges suffered major cuts in state funding, which, together with tuition, is their main source of revenue. From FY 2009 to FY 2013, state funding for the community and technical colleges declined by 23 percent. While the legislature allowed tuition increases, they were not sufficient to cover the losses from reduced state funding. With increased revenues from tuition factored in, the net cut to the colleges averaged about 7 percent.

Even as Washington state policy makers were forced to cut funding for community and technical colleges, like their peers across the country, they increased pressure on public colleges and universities to improve outcomes. Partly as a response, in 2007 the State Board for Community and Technical Colleges adopted a performance funding policy called the Student Achievement Initiative, through which colleges receive funding for improving student attainment of "achievement points," earned for both completion of credentials and achievement of intermediate milestones such as taking and passing college-level math or accumulating a substantial number of college credits.

As discussed in this report, most of the Washington ATD colleges saw Achieving the Dream as offering a framework and general approach for bringing about the sorts of changes in practice needed to meet the increasing demands for outcomes and accountability. The emphasis of ATD on building a culture of evidence was also consistent with the new accreditation

standards that place much greater emphasis on the use of evidence in planning and decision making, which the Northwest Commission on Colleges and Universities adopted during this period.

In its goals and approach, Achieving the Dream was consistent with the direction in which the Washington colleges were feeling pressure to go and indeed were already moving in. However, in its emphasis on using evidence for improvement, in its focus on reducing achieving gaps among students, and in other respects, ATD expects colleges to operate in some ways that are very different from what they are accustomed. Making substantial changes in practice requires resources for implementing new approaches and managing the change process, and it also requires the broad engagement of faculty and staff. In examining the efforts of the Washington colleges to change how they managed and delivered programs and services according to the ATD model, it is important to keep in mind that the colleges were operating in a context of rising enrollments and declining state funding. These factors made the task of bringing about systemic changes — difficult in any circumstances — even more challenging for the Washington colleges during their first five years in the initiative.

Research Questions

As part of the overall evaluation of Achieving the Dream, Lumina Foundation funded an evaluation of the Round 3 Washington colleges to examine the progress they made in adopting the ATD culture of evidence model and in improving student success. Thus, this report on the Washington colleges examines the following research questions:

- Have the colleges made progress in building a culture of evidence by implementing the ATD principles of institutional improvement?
- What student success strategies did the colleges implement under ATD, and which of these are being implemented at scale?
- Has involvement in ATD changed the way that faculty, staff, and administrators use data? If so, in what ways?
- What have been the trends in student achievement among the Washington ATD colleges? Is there evidence that student progression and outcomes improved during the period after the Washington colleges joined ATD?

Lumina and other ATD funders were particularly interested in learning whether the Washington colleges, which joined the initiative when it was more fully developed, progressed faster than the colleges that joined in Round 1. So another focus of this report is a comparison of

the progress of the Washington colleges over the first five years of their involvement in the initiative with that of the Round 1 ATD colleges.

Research Methods

We collected data for this evaluation through a review of the Achieving the Dream internal reports, field research, a survey of data use by faculty and administrators, and student records.

Review of Achieving the Dream Internal Reports

Colleges participating in Achieving the Dream are required to submit annual narrative reports to the initiative. They describe each college's progress in implementing the ATD principles of institutional improvement. In addition, the ATD leadership coach and data coach assigned to each college complete assessment and feedback reports several times a year during the implementation period to assess the progress made at each college. Researchers reviewed these documents for each college in Washington prior to conducting the field research.

Field Research

The CCRC–MDRC research team conducted a two-day site visit at each the six Washington colleges in April and May 2011. During these visits, researchers conducted interviews with the college president, vice presidents or deans of instruction and student services, institutional researchers, the Achieving the Dream coordinator, and board members. Group interviews were also conducted with small groups of faculty members, student services staff, and students directly involved with Achieving the Dream efforts, as well as with faculty and staff representatives not directly involved in the initiative. Researchers used a structured interview protocol to maintain consistency in questioning across institutions and contacted college administrators and program leaders to obtain additional information after the site visits had been conducted.[3] The results of the spring 2011 field research were compared with those of site visits conducted in spring 2008 to assess changes in the policies and practices of the colleges over that period.

Survey of Data Use

A panel survey of data use by faculty and administrators at the six Washington colleges was administered in both 2007 and 2011. The CCRC–MDRC research team modified the

[3] The framework used to develop the interview protocols is presented in Appendix A. It is based on the framework used in the baseline field research on the Washington ATD colleges and is the same as the one used in the second wave of field research on the Round 1 colleges.

surveys in 2010 prior to the second administration to capture additional information and details. The sampling frame included all full-time faculty and administrators at the director level or above. Student services staff were also included in the 2011 survey.

Student Records

The colleges submitted student records to the Achieving the Dream database, managed by JBL Associates (a higher education consulting firm) under contract with CCRC. These data contain information on full- and part-time students entering the colleges each fall and their academic outcomes at the colleges in subsequent years. Measures of student outcomes include referral to and completion of developmental sequences in English and math, completion of gatekeeper courses in English and math, attempted and completed credits, persistence from fall semester to fall semester, and credential attainment. These data were collected for cohorts that entered from fall 2003 through fall 2009.

Organization of the Report

This report examines the progress of six Washington Round 3 ATD colleges in building a culture of evidence and improving student outcomes. Chapter 2 assesses the colleges' progress in building a culture of evidence by implementing the four main principles of the ATD model for institutional improvement. Chapter 3 examines the strategies for improving student success implemented by the colleges as part of ATD and compares them with the strategies developed by the first round of colleges to join the initiative. Chapter 4 describes the patterns and extent of data use by college faculty and administrators. Chapter 5 analyzes trends in the academic performance of students at the six colleges using student record data collected through the initiative. Chapter 6 concludes the report by discussing the benefits of participating in Achieving the Dream on the Washington colleges and provides recommendations for enhancing the impact of the initiative both in Washington State and beyond.

Chapter 2

Progress Toward Building a Culture of Evidence

This chapter assesses the progress of the six Washington colleges in building a culture of evidence — that is, in actualizing the four main principles of the Achieving the Dream culture of evidence model for institutional improvement — in the three years between spring 2008 and spring 2011. The principles, described in detail in Chapter 1, are: (1) commitment of leadership to improving student outcomes and equity, (2) use of evidence to improve student success, (3) broad engagement of stakeholders in the improvement process, and (4) continuous, systemic institutional improvement.

First, we present an overall assessment of the progress that colleges have made in implementing the ATD culture of evidence principles by spring 2011. We then explore in more depth the colleges' efforts to adopt practices that reflect the culture of evidence principles and describe barriers faced by the colleges in the process. Next we summarize the main changes in organizational practice at each college that resulted directly from the college's participation in ATD. Finally, we compare the progress in building a culture of evidence at the Washington colleges with the first group of colleges to join the initiative.

The key findings of this chapter are the following:

- Five colleges made progress toward building a culture of evidence; two made substantial progress.
- Leaders at only three colleges made a strong commitment to addressing gaps in achievement by students of color and low-income students, despite the focus of ATD on equity.
- Three colleges added institutional research (IR) staff, and four colleges supplemented the work of IR staff with a "data team" comprised of faculty, staff, and administrators.
- The six Washington colleges, as a group, went at least as far as the Round 1 colleges in building a culture of evidence, although it is difficult to compare them with the 26 first-round ATD institutions.

Overall Assessment of Progress

In spring 2008, when CCRC and MDRC conducted a first round of field research at the Washington colleges, two of the colleges were making progress toward implementing the ATD

culture of evidence principles; both had begun to move in this direction before joining ATD, but participation in ATD helped give their efforts momentum. Two other colleges had made some progress, although many obstacles remained. The remaining two colleges had made very little progress, mainly because of a lack of leadership commitment or, in one case, turnover in relevant top leadership.

Table 2.1 presents an overall assessment of the extent to which the Washington colleges had implemented the ATD culture of evidence principles in spring 2008 and spring 2011, and it indicates the extent of progress that each college made in that period. This assessment is based on a framework and rubric that the CCRC–MDRC research team used to evaluate the extent to which each college had implemented the ATD principles. The protocol was structured to assess each college on 34 dimensions of practice aligned with the four ATD principles. For each dimension, the college received a rating from 1 (little or none) to 5 (high level/a lot). The framework used to develop the protocol is presented in Appendix A. It is based on the framework used in the baseline field research on the Washington State ATD colleges and is essentially the same as the one used in the second wave of field research on the Round 1 colleges. Detailed memos written after each visit were also analyzed to inform each college's overall rating on the level of implementation.

All but one of the colleges made at least some progress toward building a culture of evidence according to the ATD principles. Two colleges — WA-C and WA-D — made substantial progress, moving from a low level of implementation to a high level over the first five years of their involvement with the initiative.

Achieving the Dream Colleges in Washington State

Table 2.1

Level of Implementation of ATD Culture of Evidence Principles at the Washington Colleges: A Comparison of Spring 2008 and Spring 2011

College	Spring 2008	Spring 2011	Increase in Levels
WA-A	High	Very high	+1
WA-B	Medium	High	+1
WA-C	Low	High	+2
WA-D	Low	High	+2
WA-E	Very low	Low	+1
WA-F	Very low	Very low	0

Successes and Challenges in Actualizing the Culture of Evidence Principles

This section examines the extent to which the Washington colleges have adopted practices that reflect the four ATD culture of evidence principles and identifies barriers that the colleges faced in the process. Findings are based on assessments made by CCRC and MDRC researchers during our spring 2011 field research using a framework and protocol similar to those used in our field research in 2008. (The tables illustrating the findings appear after the discussions of the four principles.)

Committed Leadership

Table 2.2a summarizes the extent to which the practices of each college reflect the first principle of the ATD culture of evidence model: leadership committed to improving student outcomes and narrowing achievement gaps.

President and Senior Administrators

Leadership is critical to building a culture of evidence, and the colleges that were further along in implementing the ATD principles had higher levels of leadership commitment. At three of the colleges — WA-A, WA-B, and WA-C — the leaders were committed to evidence-based improvement from the start. The president at WA-D was initially a skeptic, largely because of the perception that data previously collected and reported were unreliable; however, under Achieving the Dream this president became a champion of data-based decision making as a result of the college's success in building an institutional research and effectiveness function that produces data the president and others on campus trust.

The president and top academic administrators at WA-E were not convinced that the Achieving the Dream approach was the best way to improve student outcomes. Instead, they implemented an academic master plan with strategies for improving the quality of teaching and learning at the college. At WA-F, turnover among the college's top leadership made it difficult to sustain a focus on student success. The incoming president and his leadership team were primarily concerned with improving the college's image in the community and developing alternative sources of funding.

Faculty

The faculty members we interviewed at all six colleges were interested in improving student outcomes, but in only three of the colleges were they working together on a widespread basis to improve student success. When WA-A joined ATD, the college already had a history of faculty working together to develop innovations. At WA-B, the impetus to join ATD came from

the college leadership, but faculty — in part as a response to what was perceived as an overly top-down approach to managing the initiative — later took the lead in developing and implementing instructional innovations, particularly the Reading Apprenticeship strategy, which has since been embraced widely by faculty across divisions. (The work of the faculty in implementing Reading Apprenticeship at WA-B is profiled in the next chapter.) At WA-F, ATD project leaders latched onto the efforts of a group of entrepreneurial faculty to enrich teaching and learning through integrative assignments. However, this innovation and others we heard about were not widely propagated among faculty across departments.

Trustees

We interviewed at least one board member at each college. Generally, they were informed about ATD and its purposes and had received periodic reports on their college's progress on the initiative. At four colleges — WA-A, WA-B, WA-C, and WA-D — we heard from trustees that college leadership had improved the quantity and quality of data on student outcomes since their institutions first joined the initiative. For example, a board member at WA-C said that under ATD the college moved from a focus on "just access" to "helping students on a path to completion." This board member indicated that the board generally was attuned to using data for decision making but, given recent funding cuts, data were particularly important for helping decide what programs and services are critical to preserve.

In June 2011, after we had conducted our field research at the colleges, presidents and trustees from all the Washington community and technical colleges participated in the Governance Institute for Student Success (GISS). At this two-day institute, sponsored by the Association of Community College Trustees and the Community College Leadership Program at the University of Texas at Austin, trustees and presidents were presented with detailed reports on student outcomes at their college. The reports were based on performance metrics developed by the state's Research and Planning Commission (the organization of two-year college institutional research directors) that measured for each college rates of progression and completion over time of cohorts of students broken out by the type of program they were enrolled in (e.g., basic skills, transfer, or workforce) and student characteristics. The institute was led by Byron McClenney, one of the founding partners of Achieving the Dream who leads the coaching aspect of the initiative, so the reform principles used reflect those of ATD. Learning events like this promise to raise awareness among college trustees about the completion agenda and the importance of using data to improve student outcomes.

Commitment to Closing Achievement Gaps

In the initial analyses they conducted during the planning year, most of the colleges identified gaps in achievement between White students and students of color. Since joining

ATD, five of the six colleges have experienced changes in the demographics of their surrounding communities, particularly increases in the number of immigrant and low-income residents. These changes have resulted in increasing numbers of disadvantaged students on their campuses.

Serving disadvantaged students is challenging in any period, but especially in times of budget cuts, when services for all students are cut back. Long before joining ATD, WA-B embraced the mission of serving the local community, with a special focus on helping provide access to economic opportunity for underserved residents, especially immigrants. The college considered its adult basic skills programs to be "bridges" to college-level training programs. However, recent research conducted by the college also revealed substantial gaps in achievement levels between White students and African American students. College leaders say they would like to do more to address this gap, but budget cuts have forced them to cut back on student services for all students. Some of the other colleges faced a similar challenge.

Despite challenges such as these, leaders at three of the colleges have made a strong commitment to addressing the issue of achievement gaps. The president of WA-C has made it a priority to address disparities in achievement by race and class. Both within the college and with the local K-12 schools, the president has led sometimes difficult conversations about the achievement gap problem and how to deal with it. On campus, faculty indicated that, after an initial period of discomfort, more of their colleagues were open to having these conversations. As part of ATD, the college implemented several strategies to improve outcomes for students of color. College administrators claim that these efforts have helped to narrow the achievement gap between African American and White students on campus, although they admit they have made less progress on reducing the achievement gap between their Hispanic and White student populations.

At WA-A, the initial ATD data analyses identified three groups of students that were falling behind: immigrants in basic skills courses, students of color (in math especially), and displaced workers seeking retraining for new jobs. The college designed its ATD strategies to help improve achievement among students in these groups. College leaders said that they have made progress in reducing achievement gaps, particularly for students of color in the developmental math sequence and new immigrants in the English as a Second Language (ESL) sequence.

At WA-D, which has seen growth in the number of low-income Hispanic students in its service region, difficult conversations about achievement gaps between Hispanic and White students were hampered by a lack of data that the stakeholders at the colleges could trust. After the college established an institutional research function that produced reliable, trustworthy data (see the case study below, Box 2.1, Building an Effective Home-Grown Institutional

Effectiveness Function), discussions about the achievement gaps could and did take place. As a result, the college's administrative council and board of trustees, as part of the its strategic plan, approved two "core theme objectives" designed to improve equity of access to the transfer and professional-technical programs of the college, and seven objectives designed to improve equity of student achievement. The college's institutional effectiveness team regularly reports on the college's progress toward these objectives. Although it too has experienced an increase in the number of low-income Hispanic students in its community and the college's research shows gaps in achievement between Hispanic and White students, WA-E did not make equity of achievement a strategic institutional focus. Minority student services staff lobbied the college to do more, but most of the college's efforts relied on their initiative; the college's overall response to the problem was limited.

Use of Data and Research for Improvement

Table 2.2b summarizes our assessment of the extent to which the practices of each college reflect the second principle of the ATD culture of evidence model: use of data to improve student success.

IT Capacity

All of the Washington colleges initially had trouble accessing the data needed to conduct the longitudinal cohort tracking recommended by ATD because they were dependent on an antiquated statewide "legacy" student information system. At least two of the colleges — WA-B and WA-D — built data warehouses to facilitate longitudinal analysis of data, although others, including WA-E and WA-F, downloaded data from the state system to conduct their analyses.

IR Capacity and Effectiveness

Three of the colleges — WA-B, WA-C, and WA-D — added IR or IT staff under ATD. One (WA-D) built an institutional effectiveness office from scratch (see the case study below, Box 2.1, Building an Effective Home-Grown Institutional Effectiveness Function). However, the increased IR capacity at these colleges, combined with the greater attention to data and research, also increased internal demand for information. As a result, IR staff reported that they were still spread thin. Both WA-E and WA-F lost their lone IR staff person in the first or second year of the initiative. In both cases, it took time to find a replacement, and they were thus slow in building their IR capacity. All of the colleges reported that they could use additional research staff to meet the demand for research for compliance reporting and college promotion as well as to support improvements in programs and services.

Four of the colleges — WA-A, WA-B, WA-C, and WA-D — supplemented their IR capacity with data teams that helped filter requests for information, determine priorities for research, and build awareness among their colleagues about the potential benefits of collecting data and using it effectively. The IR directors at two of the colleges (WA-A and WA-C) trained colleagues to use data analysis software. At WA-A, deans, department chairs, faculty, and others began to conduct their own analyses to address their information needs (see the case study below, Box 2.2, Democratizing Data Use). They brought questions they could not answer to data team members, who worked with the IR director to find answers. These four colleges used such approaches and the resourcefulness of their IR staffs to compensate for their lack of trained IR personnel and to build IR functions viewed as responsive by their colleagues. In the two remaining cases (WA-E and WA-F), the IR directors worked mainly for the president and senior leadership and focused on compliance reporting, leaving little time to work with faculty and staff.

Box 2.1

Case Study: Building an Effective Home-Grown Institutional Effectiveness Function

For a variety of reasons related to institutional capacity and faculty and staff inexperience with effective date use, WA-D had attempted to establish a research office more than once prior to joining Achieving the Dream, without success.

To increase the possibility of success, the vice president of instruction identified some of the "power users" at the college and gave them release time to work with the newly formed Office of Institutional Effectiveness (OIE). The vice president selected a faculty member to coordinate the OIE who had credibility among her peers because she had taught courses in all three instructional divisions; had headed the faculty union; and had been a grant writer, which made her familiar with data and the other power users at the college. She took the power users on a retreat to discuss how they would create more systematic processes for collecting, analyzing, and reporting data. The OIE focused on identifying and understanding the problems the power users had experienced with data so they could help others in the campus community solve their own problems and also send the message that data would be used to support their work, not to evaluate it.

The OIE built a data warehouse for use in tracking cohorts of students over time and began leading studies to inform efforts to improve programs and services at the college. For example, the college used student and staff focus group data to determine the need for a revised orientation and advising process. Data analysis also revealed the need to address developmental math because 85 percent of incoming students were placing into at least one level of developmental math. A survey of students developed by the college (similar to the Community College Survey of Student Engagement) revealed that students wanted the college to be more prescriptive, which led to the revised orientation and advising process. In another case, OIE staff worked with the psychology department to analyze placement test scores and pass rates for students in their courses to determine the need for prerequisites. Although there was initially some concern about the impact on course enrollments, the department implemented the prerequisites and saw increases in course completion. As word of the psychology department changes spread, the other social sciences departments began asking for data.

The college also used analyses conducted by the OIE to decide which programs and services to keep and which to cut. A math and study skills learning community strategy implemented under ATD was evaluated, and the evaluation found that students receiving this treatment did not have better outcomes than students in stand-alone math courses. This intervention was also costly, so it was discontinued, and the math department developed a lengthened, three-quarter algebra sequence. In another case, the college decided not to cut the writing center, math lab, or learning centers because data showed that these were important to student success. Instead, the college made them self-supporting by charging students a fee that covered the costs of these centers.

Box 2.2

Case Study: Democratizing Data Use

WA-A began its work with Achieving the Dream during a period when the college was transitioning between institutional research directors. Because there was no obvious leadership for the ATD data team (a position frequently filled by a college's IR director and staff), the college asked faculty and staff who were not necessarily data-savvy to participate on the team. This approach to building the data team had several positive consequences. First, it connected the team to a larger range of stakeholders at the college. Faculty and staff who participated on the data team were able to share what they learned about data collection and analysis with colleagues during department meetings, professional development workshops, and informal interactions. This fostered a sharing of approaches to using data that the college's IR director referred to as the "democratization of data" because it helped to involve faculty and staff who were previously unaccustomed to using data and research to improve practice. The WA-A case shows that Achieving the Dream principles can be applied in a college with a culture of bottom-up decision making.

Use of Data for Identifying Gaps and Formulating and Evaluating Strategies

Four of the colleges — WA-A, WA-B, WA-C, and WA-D — used longitudinal cohort analysis at least to some extent to identify the target populations for their ATD strategies. The Achieving the Dream approach of examining the progress and outcomes over time of student cohorts grouped by their characteristics was new to many of those we interviewed at the Washington colleges. For example, administrators at WA-C said that faculty and staff at their college were slow to understand and accept data on student achievement gaps. One reason was the perception among some faculty that the faculty was being blamed for poor student performance. Administrators said that it took at least two years before the high level of mistrust began to subside. Administrators we interviewed attributed the positive change to persistent efforts in multiple venues and occasions to present data on the problem and promote the idea that addressing it was a campus-wide responsibility, not just one the faculty must own.

Only WA-A and WA-D systematically used data to formulate student success strategies. At WA-D, staff from the office of institutional effectiveness worked with faculty and administrators to design intervention strategies and/or grants intended to address achievement gaps, providing longitudinal data, helping to shape strategies and objectives, and developing evaluation plans. The math faculty at WA-A were convinced by data from student focus groups

and surveys to move from an individual mentoring approach to a larger department-wide curricular redesign in order to address the needs of the large numbers of developmental math students more efficiently. Before ATD, discussions about achievement gaps at the college were abstract or based on anecdotal evidence. ATD helped the college pinpoint where those gaps existed and identify at-risk groups (such as the ESL new-immigrant population). The college used outside evaluators and internal evaluations (based on focus groups, surveys, and participation analyses) to understand the effects of programs and services on student success. Even so, college leaders acknowledged that the college did not have a systematic approach to evaluating its efforts to improve student success and to using the results to make further improvements. In contrast, the IR director at WA-B worked with colleagues to build in evaluation as strategies were being designed, and he encouraged colleagues who were writing grants to be explicit about how they would measure success. In the other four colleges, evaluation was an area still in need of improvement.

Broad Engagement in the Improvement Process

Table 2.2c summarizes our assessment of the extent to which the practices of each college reflect the third principle of the ATD culture of evidence model: broad engagement in the improvement process.

Faculty and Student Services Staff

Engagement of faculty and student services staff in using data and research to improve student success is one of the key features distinguishing colleges that were further along in building a culture of evidence from those where such a culture was not well developed. Decision making at WA-A, the college that was furthest along in creating a culture of evidence, was described by those we interviewed as "non-hierarchical" and "bottom-up." The fact that the student success strategies implemented at this college were the product of all-department efforts, not small groups of entrepreneurs, reflects the general culture of collegiality and cooperation at the college. Due in part to the influence of ATD, discussions of data became a regular part of department meetings and strategic planning sessions, and faculty and staff used them to decide how best to serve students. A small percentage of part-time faculty (roughly 10 percent) participated in professional development related to student success.

Although faculty engagement in evidence-based decision making remained very limited at two of the colleges (WA-E and WA-F), the remaining three colleges made clear progress in the first five years they participated in ATD. After some initial resistance, more academic departments at WA-C began using data as part of departmental discussions. The decision by WA-D to choose a well-regarded faculty member to head the newly established office of institutional effectiveness sent the message to the faculty that research would focus on

instruction (see the case study above, Box 2.1, Building an Effective Home-Grown Institutional Effectiveness Function). WA-D also encouraged greater engagement with data at all-campus convocations and professional development sessions designed to encourage faculty to use IR services. At WA-B, institutional research was generally seen as irrelevant to the academic departments, but faculty began to see its importance. In one case, faculty in a program slated to be eliminated due to budget cuts worked with the IR staff to get placement data and convinced the board that the program was still viable and should be retained.

Faculty engagement is, not surprisingly, particularly crucial for efforts to improve instruction. As described in more detail in the next chapter, faculty at four of the colleges were instrumental in developing the instructional innovations implemented as part of ATD. Some faculty at WA-B objected to what they perceived as the top-down way in which strategies were initially developed under ATD. A group of faculty was successful in introducing an innovative approach to teaching reading, which was adopted by instructors from across academic departments. Although they got the idea from a session at one of the ATD Strategy Institutes, the faculty who led this effort explicitly contrasted the grassroots manner in which they introduced and spread this innovation to what they perceived as the top-down orientation of ATD. The vice president for instruction admitted that the initial approach to developing strategies under ATD was misguided, acknowledging that the most successful instructional reforms at the college have all had strong instructor buy-in. According to this vice president, "Instead of saying 'Okay, you're going to be part of this initiative,' faculty need to say 'I want to be part of this effort.'"

Letting faculty take the lead does not always work, however. At WA-D, administrators were determined to let the math faculty decide what to do and to experiment with different approaches. However, faculty within the department disagreed about the best approaches, and as a result the efforts to improve outcomes were disconnected and generally small in scale. Administrators at WA-C seemed to have found a better balance between prodding faculty to improve instruction and giving them the flexibility to decide how best to do so. Particularly in the last couple of years, faculty have taken the lead in introducing innovations, such as University Design for Learning (UDL), discussed in the next chapter. At WA-F, a group of entrepreneurial faculty (including some adjuncts) collaborated to create integrated assignments that encouraged students to think in an interdisciplinary manner. However, because of the lack of strong support from the college for these efforts and for helping to spread instructional innovations across departments, this innovation was confined to a relatively small number of faculty and students.

Instruction–Student Services Collaboration

At two of the colleges, collaboration between student services and academic affairs was already strong even before the colleges joined ATD. Although WA-A's student services staff were not heavily involved in the development of the ATD strategies, which were primarily focused on improving academic programs, both student services staff and academic faculty and administrators reported that collaboration was strong. At WA-B, most of the professional advisors were "embedded" in particular program areas. Faculty and student services staff reported that this strategy facilitated strong collaboration with one another. At WA-F some advisors were also assigned to specific divisions although, overall, the extent to which student services staff worked with faculty to improve programs and practices was less than at WA-B. At WA-C, the work by ATD core and data teams to plan and oversee the implementation of strategies created more opportunities for collaboration between faculty and student services staff, although our interviewees indicated that there was still room for improvement. Student services and academic affairs personnel at WA-D and WA-E reported that although they sometimes worked together, they often worked in their respective "silos." This increased opportunities for collaboration somewhat, although the extent to which student services staff worked with faculty to improve programs and practices was greater at WA-B and at WA-F.

Students

Some of the colleges regularly conducted surveys and focus groups with students to better understand their needs. For example, WA-D had success with a survey instrument that was similar to the Community College Survey of Student Engagement (which is designed to measure student engagement by assessing student behaviors and institutional practices) but less expensive and customized to the college's particular information needs. However, there was little evidence of an established approach for involving students actively in efforts to improve student success at any of the colleges.

External Stakeholders

Of the colleges, WA-C made the most concerted effort to involve external stakeholders in improving student success. The college worked with numerous feeder high schools to conduct ACCUPLACER testing during students' eleventh and twelfth grades and worked with high school counselors on matriculation agreement updates and course selections. The college was an active member of a local network involving partners from K-12, a local foundation, other local colleges and universities, and the local housing authority. These relationships allowed the college's students to access the support services offered by other network partners. One board member of the college was a program officer at a local foundation that helped recruit

more faculty of color at the college and educated faculty on how to better address cultural needs and interests of students of color in the classroom and on campus.

WA-A began to focus on outreach to community groups and building partnerships with organizations in the surrounding area. Its president worked to involve local chambers of commerce, economic development groups, poverty-reduction programs, and local businesses in ATD efforts and other important conversations. In addition, the college held several events to engage the rapidly growing local communities of color with the college culture, including a day-long, Spanish-language-only event for Latinos in the community. Planning is also underway for a youth summit based on the model of the "Black, Brown, and College-Bound" event that is held annually at Hillsborough Community College in Tampa, Florida — one of the Round 1 colleges. These efforts resulted from a heightened awareness of the changing demographics at the college.

While the other four colleges had partnerships with local high schools and community groups, none seemed to be capitalizing on these relationships to support and leverage efforts within the college to improve student outcomes.

Continuous Improvement

Table 2.2d shows our assessment of the extent to which the colleges built an infrastructure to support continuous improvement in accordance with the fourth principle of the ATD culture of evidence model.

Strategic Planning

As reported in Chapter 1, the Northwest Commission on Colleges and Universities recently revised its standards to place more emphasis on the use of evidence in planning and decision making in the institutions it accredits. A senior administrator at WA-A said that, as a result of a confluence of forces — including increased demand for evidence for accreditation; the Student Achievement Initiative (a statewide performance funding initiative); and, most of all, the economy and the state budget cuts — "programs without evidence of effectiveness will be on the chopping block."

The Washington ATD colleges are all responding to these new pressures for evidence-based decision making, albeit in somewhat different ways. For example, WA-B formalized and strengthened its program review process to include a focus on student retention and completion, not just enrollment. The college used this process to decide which programs to eliminate in response to sharp cuts in state funding. The administration worked with the faculty to develop the metrics to be used. Faculty and department chairs interviewed said that the administration

was trying to be more transparent and fair in its decisions. The college's strengthened IR capacity and program review process and measures helped to make this possible.

In response to the new accreditation standards, all of the Washington colleges developed or were in the process of creating "core themes" or goals for student success with measureable indicators. Two of them — WA-C and WA-D — said that they borrowed from the ATD framework and metrics to define their core themes and measures related to student success. The others said they were influenced by Achieving the Dream and other performance measurement frameworks, including the "achievement point" metrics associated with the Student Achievement Initiative, Washington State Board for Community and Technical College's performance funding policy.[4] Although they were guided by ATD and other frameworks, each college developed its own set of metrics based on its particular goals and internal process for defining goals and measures. It should be noted that none of the Washington colleges devoted much time to examining their performance in relation to the ATD performance metrics (which are described in more detail in Chapter 5). We will return to this point in the recommendations presented in the final chapter of this report.

Organizational Infrastructure

Four of the colleges transformed their ATD core and data teams into standing committees responsible for overseeing efforts to improve student outcomes. WA-C merged its ATD core and data teams into an institutional effectiveness leadership team with responsibility for overseeing student success initiatives, deciding which strategies to continue, and improving collaboration between academics and student services. This body advised the president and the board. Responding to the new accreditation requirements, WA-B converted its ATD core and data teams into standing strategic planning and institutional effectiveness teams that met once a month and advised the executive cabinet.

Because the administration at WA-D did not want to create a separate, parallel set of committees for its ATD work, the college integrated its core and data teams into the main governance structure of the college. The core team became the institutional effectiveness (IE) team, and the data team became the Office of Institutional Effectiveness (OIE). The IE team was the central body on campus focused on student success, charged with guiding reform efforts based on data and working with the OIE on the accreditation process. Helping to determine the research priorities of the college and define the indicators for measuring progress on the core themes of the college, it met two to three times each year and was broadly representative of faculty and staff. It also worked with the OIE to identify opportunities for improvement and evaluate improvement strategies (see the case study above, Box 2.1, Building an Effective Home-Grown Institutional Effectiveness Function).

[4] For more information about the Student Achievement Initiative, see Shulock and Jenkins (2011).

WA-A already had a Student Outcomes and Competencies Committee to oversee student success efforts and the setting of learning outcomes. Responding to the push from the college's ATD coaches to use evidence for decision making, the committee made reporting requirements much more rigorous. It worked with the data team established under ATD to expand access to and use of data on students throughout the campus. It also showed the value of creating a central body to coordinate student support efforts and provide access to data and analysis.

The remaining two colleges have yet to establish a committee to monitor and guide efforts on campus to improve student success. WA-E had an instructional council that advised the college leadership on issues related to academic programs, but its focus was primarily on program management and regulation, not on improving student outcomes. The college was considering establishing a body that would be responsible for overseeing student success initiatives but had not done so at the time of our research. WA-F had a strategic enrollment management committee that focused on recruitment but nobody to oversee efforts to improve student retention and completion.

Professional Development

Faculty development at the colleges tended to be decentralized, varying by department, and based on the interest of individual faculty members — in part as a result of lack of resources. For example, WA-B eliminated a full-time faculty development staff person whom faculty interviewees praised for helping to support efforts to improve instruction. The alternative, according to the college's administrators, was to reduce resources for instruction. The college used ATD funds to enable a small group of faculty to travel for training in the Reading Apprenticeship model developed by WestEd, which they subsequently helped to spread across academic departments.

Three of the colleges used ATD funds for professional development. WA-D provided training related to better use of data, and WA-E and WA-C provided professional developmental for those involved in specific ATD strategies. Only WA-A had a process for supporting faculty development in a way that was strategically tied to its student success efforts. A report from the college to ATD on its activities in 2010–2011 indicated that while 80 percent of faculty participated in professional development that reinforced student success efforts, a large majority of student services staff (roughly 95 percent) did not participate.

Table 2.2a

Implementation of Culture of Evidence Principle 1, Committed Leadership, at Washington ATD Colleges, Spring 2011

Indicator	WA-A	WA-B	WA-C	WA-D	WA-E	WA-F
President and senior leadership	Very high	High	Very high	High	Low	Low
Board leadership	Medium	Medium	Medium	Medium	Medium	Medium
Faculty leadership	High	High	Medium	Medium	Low	Low
Commitment to closing achievement gaps	Very high	High	High	High	Low	Very low
Summary Score	*High*	*High*	*High*	*Medium/High*	*Low*	*Low*

Table 2.2b

Implementation of Culture of Evidence Principle 2, Use of Evidence for Improvement, at Washington ATD Colleges, Spring 2011

Indicator	WA-A	WA-B	WA-C	WA-D	WA-E	WA-F
IT capacity	Medium	Medium	Medium	Medium	Low	Low
IR capacity	Medium	Medium	Medium	Medium	Low	Low
IR effectiveness	High	High	High	High	Low	Very low
Use of data for identifying gaps	High	High	High	High	Low	Low
Use of data for formulating strategies	High	Medium	Medium	High	Very low	Very low
Evaluation of strategies/use of findings	High	High	Medium	Medium	Low	Low
Summary Score	*High*	*Medium/High*	*Medium*	*Medium/High*	*Low*	*Low*

Table 2.2c

Implementation of Culture of Evidence Principle 3, Broad Engagement, at Washington ATD Colleges, Spring 2011

Indicator	WA-A	WA-B	WA-C	WA-D	WA-E	WA-F
Full-time faculty	Very high	High	Medium	High	Low	Very low
Part-time faculty	Medium	Low	Low	Low	Very low	Very low
Student services staff	High	High	High	Medium	Medium	Low
Academic-student services collaboration	High	Medium	Medium	Medium	Low	Medium
Students	Low	Low	Low	Low	Low	Low
External stakeholders	Medium	Medium	High	Medium	Low	Low
Summary Score	*Medium/High*	*Medium*	*Medium*	*Medium*	*Low*	*Low*

Table 2.2d

Implementation of Culture of Evidence Principle 4, Continuous Improvement, at Washington ATD Colleges, Spring 2011

Indicator	WA-A	WA-B	WA-C	WA-D	WA-E	WA-F
Strategic planning	High	High	High	High	Low	Low
Organizational infrastructure	High	High	High	High	Low	Very low
Professional development	High	Medium	Medium	Medium	Low	Low
Summary Score	*High*	*High*	*High*	*High*	*Low*	*Low*

Summary of Changes in Organizational Practice Because of ATD

Some of the practices described above were already in place when the Washington colleges joined ATD. Table 2.3 summarizes the major changes in organizational practice undertaken by each college as a direct result of their participation over five years in ATD.

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Table 2.3

Major Changes in Organizational Practice Among the Washington Colleges During the First Five Years of ATD

College	Changes in Organizational Practice
WA-A	• Developed "core theme" goals and measures for improving student success. • Set measurable goals for improving student outcomes in all departments. • Created data team to expand access to data and research to more faculty and staff. • Developed process whereby academic and student services staff work together to use data to identify groups falling behind and devise strategies for improving student outcomes.
WA-B	• Developed "core theme" goals and measures for improving student success. • Hired IR director and analyst who built data warehouse and strengthened data analysis and evaluation. • Evolved ATD core and data teams into standing strategic planning and institutional effectiveness committees. • Strengthened program review process.
WA-C	• Developed "core theme" goals and measures for improving student success. • Added IR staff and increased information systems capacity. • Strengthened and systematized approach to developing and implementing student success strategies. • Merged ATD core and data teams to create standing IE leadership team.
WA-D	• Developed "core theme" goals and measures for improving student success. • Created standing institutional effectiveness team (IE team) and IE office (OIE). • Created data warehouse and hired programmer. • Established procedures for making requests for information from research staff.
WA-E	• Incorporated student success goals into college academic master plan. • Increased analysis by IR for use by president, senior executives, and grant writing.
WA-F	• Developed "core theme" goals and measures for improving student success.

All of the colleges developed goals for student success with measures that were similar to and in some cases adapted from the ATD performance measures. WA-A went a step further by asking each department to establish student success goals and measures tied to the institutional goals. WA-B strengthened its program review process, with performance measures defined in collaboration with faculty.

Three of the colleges — WA-B, WA-C, and WA-D — added institutional research staff who built data warehouses, improved procedures for requesting information, provided data support to student success committees and others, and trained faculty and staff in the use of data. At these three colleges and at WA-A, the efforts of the IR staff to increase access to data and research were enhanced by "data teams" comprised of faculty, staff, and administrators who not only helped to promote the use of data to their colleagues but also provided guidance on how to do so.

The three colleges that added IR staff (WA-B, WA-C, and WA-D) also created standing bodies that were responsible for overseeing efforts to improve student outcomes. Such a committee already existed at WA-A prior to its joining ATD. In some cases the data teams were integrated into these committees; in others, the data teams were separate. In all cases, IR staff worked closely with committee members to help ensure that the decisions they made were based on evidence. In establishing these committees, these colleges also created or strengthened processes for identifying opportunities to improve student success and developing strategies for doing so.

Comparison With the Round 1 Achieving the Dream Colleges

As noted, in funding an evaluation of the ATD work in Washington State, Lumina Foundation and other funders were particularly interested in seeing whether the Washington colleges, having joined the initiative two years after it began (i.e., in the third round), would make faster progress in adopting the ATD culture of evidence principles than colleges that joined in the first round. (The experiences of the Round 1 colleges during their first five years with the initiative were examined in a 2011 report by MDRC and CCRC [Rutschow et al., 2011]).

While it is difficult to compare the six Washington colleges with the 26 Round 1 institutions, it does seem that the Washington colleges, as a group, went at least as far as did the Round 1 colleges in building a culture of evidence.

Figure 2.1 shows the extent to which the six Washington colleges had adopted the ATD culture of evidence principles between 2008, when we conducted our first round of field research, and spring 2011, when we made follow-up visits. Figure 2.2 shows the changes in

level of adoption among the 26 Round 1 colleges between 2006 and 2009. All but one of the Washington colleges made progress in implementing the ATD culture of evidence principles. Two of them, which early on in the initiative had only begun to implement practices consistent with the ATD principles, made very substantial progress later on. Five years after they joined ATD, we rated four of the six Washington colleges as having implemented the ATD principles at a high level. In comparison, only 11 of the 26 Round 1 colleges (42 percent) implemented practices associated with a strong culture of evidence by the end of their five-year ATD implementation period.

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Figure 2.1

Culture of Evidence Implementation: Washington ATD Colleges: Spring 2008 and Spring 2011

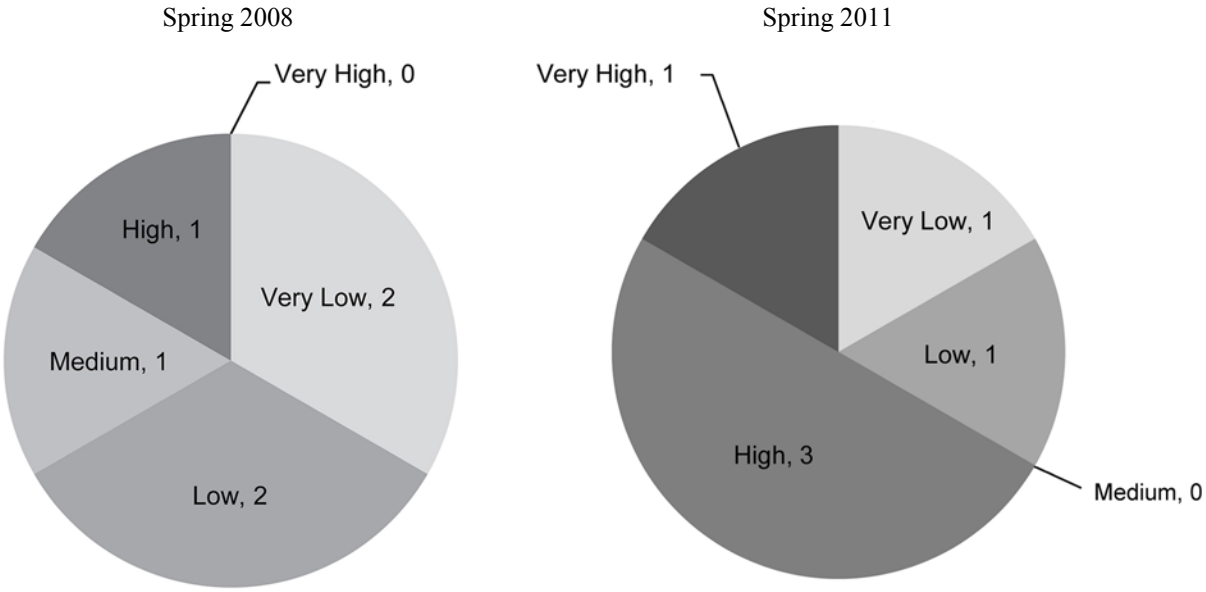
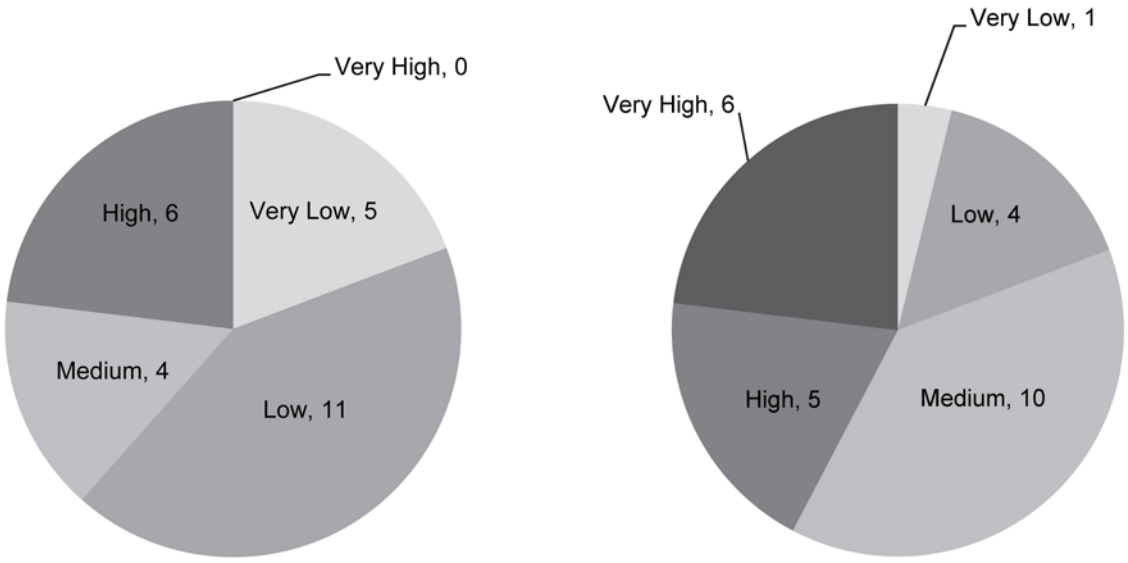


Figure 2.2

Culture of Evidence Implementation: Round 1 ATD Colleges, Spring 2006 and Spring 2009



SOURCE: Rutschow et al., 2011.

Chapter 3

Student Success Strategy Implementation

This chapter examines strategies for improving student success that the six Washington colleges were implementing in spring 2011. It describes the colleges' various strategies and compares them with the strategies implemented by the first group of colleges to join the initiative in 2004–2005 (the Round 1 colleges) that were examined in a 2011 report by MDRC and CCRC (Rutschow et al., 2011).

For our review of Washington ATD colleges' strategies, we classified specific interventions according to their size: small, medium, or large. Small-scale strategies are those that reached 10 percent or less of their targeted population, medium-scale strategies reached between 10 percent and 25 percent of their targeted population, and large-scale strategies reached more than 25 percent of their targeted population.[5] Similarly, we used three classifications of intensity: low, medium, or high. Low-intensity strategies reached students for five or fewer hours per term, medium-intensity strategies reached students for five to ten hours per term, and high-intensity strategies reached students for more than ten hours per term.

The 2011 report by MDRC and CCRC found that most of the strategies implemented by the Round 1 colleges were either small in scale and/or relatively low intensity. Further, most involved changes to student services and academic support programs rather than enhancements of classroom instruction. The report concluded that ATD colleges were unlikely to improve outcomes for a substantial number of students unless they were able to implement their strategies on a larger scale and with greater intensity. Building on the findings of that report, and drawing on research on high-performing educational institutions and non-education organizations and their implications for community colleges, this study focused on the process used by the Washington colleges that were successful in implementing student success strategies at scale. This chapter reports on those efforts and also on work by faculty at the Washington colleges to develop new approaches to instruction and to support the adoption of instructional innovations by their colleagues.

The following are the main findings from our examination of student success strategies in the Washington colleges:

- Five of the six colleges implemented at least one large-scale strategy.

[5] These categories of scale, developed for the report on the Round 1 colleges (Rutschow et al., 2011), made comparisons of scale possible across the two groups of colleges. We asked ATD project staff at each college to estimate a scale range for each of their strategies.

- The colleges focused their strategies more on improving instruction and developed more strategies at a large scale than did the Round 1 colleges.
- Several colleges sought to engage faculty in the development and diffusion of instructional reforms, with varying degrees of success.
- The colleges that went furthest to implement innovations at scale by redesigning programs and services were those that were further along in developing a culture of evidence.

The majority of student success strategies across the Washington colleges targeted students in developmental education and first-year students. While the strategies aim at improving college readiness and persistence among entering students, as discussed in the concluding chapter of this report, colleges may need to focus more attention on reforming college-level programs and supports to ensure that students complete their programs and are prepared for further education and to ensure that students in career-technical programs are prepared for advancement in the labor market.

Student Success Strategies of the Washington Colleges

In spring 2011, the six Washington colleges were implementing nearly 30 "direct" student interventions that they developed as part of Achieving the Dream. Direct strategies are those that reach students personally (as opposed to, say, faculty development, that affects students indirectly through faculty).[6] Table 3.1 summarizes the main strategies implemented in instruction and student services by the six colleges. It indicates that many of the changes to instruction occurred in developmental education programming and that many changes to student services were designed to benefit incoming and first-year students. WA-B and WA-F confined their ATD strategy development efforts to innovations in instruction.

[6] We limit our discussion in this chapter to strategies that affect students directly. Chapter 2 covers other ATD activities, such as increasing institutional research capacity and strengthening faculty professional development. This distinction between direct student strategies and other ATD activities was also made in the evaluation of the Round 1 college strategies (Rutschow et al., 2011).

Table 3.1

Main Changes in Instructional Programs and Student Services at the Washington Colleges Under ATD

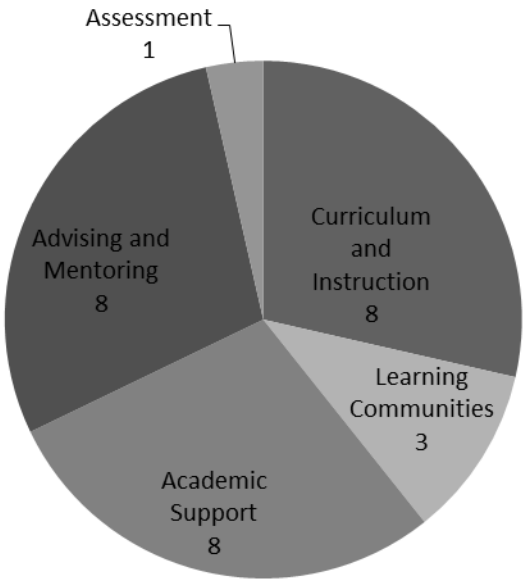
College	Instruction	Student Services
WA-A	• Developmental math sequence transformed to make it relevant to students' academic paths. • Revised developmental English.	• ESL transition center — financial aid and other assistance to help basic skills students transition to college level coursework.
WA-B	• Reading Apprenticeship — discipline-based literacy instruction — instituted. • New math tutoring center.	• None.
WA-C	• Universal Design for Learning instituted. • Supplemental instruction in math and English provided.	• Advising for first-year students revamped. • Standardized student success seminar improved, • Advisor dashboard documenting student satisfaction with services instituted.
WA-D	• Developmental math restructuring (still in process).	• New student orientation and advising revised.
WA-E	• Pre-college math courses restructured.	• New student orientation revised. • Student success course created. • Mentoring program for Latino students added.
WA-F	• Cohorts and study sessions for developmental math sequence created. • Integrative learning assignments implemented.	• None.

NOTE: This table presents the main ATD strategies in instruction and student services at the six colleges but is not an exhaustive list of the direct strategies implemented as part of ATD.

Figure 3.1 shows the distribution of direct student strategies by category across the six colleges. Changes in classroom instruction, which include curriculum and instruction and learning communities, comprise over a third of the direct strategies. The number of strategies that each college implemented varied significantly, ranging from only two to a high of eight. Three of the six Washington colleges — WA-A, WA-B, and WA-D — had implemented only two or three direct strategies at the time of this study.

Figure 3.1

Distribution of ATD Direct Strategies Implemented at the Washington Colleges, Spring 2011



Comparison Between the Washington and Round 1 Colleges

The spring 2011 report by MDRC and CCRC on the progress of the 26 Round 1 colleges had three main findings regarding the implementation of strategies for improving student success (Rutschow et al., 2011). First, only one quarter of all direct student interventions in the Round 1 colleges were designed to change classroom instruction; most of the interventions involved either student support services or academic supports that were designed to improve instruction in the classroom. Second, there was a trade-off between the scale and intensity of implemented ATD strategies across the Round 1 colleges. Low-intensity strategies, which tended to be support services such as orientation and advising programs, were more likely to be implemented at scale than were high-intensity strategies such as curricular reforms, supplemental instruction, and learning communities, which generally reached relatively small numbers of students. Third, while some of the colleges did implement strategies that touched large numbers of students, the majority of all direct interventions at the Round 1 colleges remained small in scale. These findings show the difficulty of implementing interventions on a scale sufficient to reach substantial numbers of students, especially high-intensity instructional

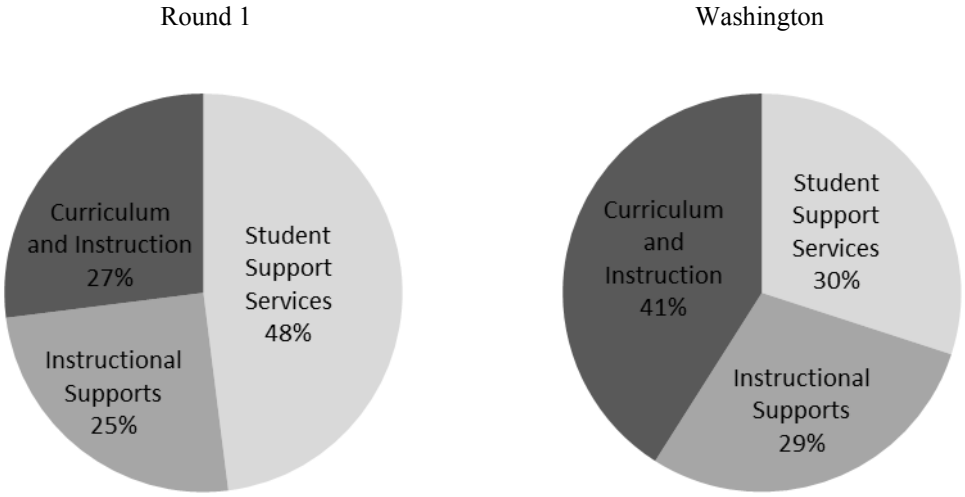
reforms. Yet, as MDRC and CCRC pointed out in the 2011 report, unless colleges can implement high intensity instructional reforms at scale, they are unlikely to be able to increase the completion and success rates for substantial numbers of students.

The Washington State colleges and the Round 1 colleges focused on similar populations for the majority of direct strategies. Both groups of colleges targeted developmental education for the majority of their interventions. At the Round 1 colleges, nearly half of all direct strategies focused on this area, and at the Washington colleges the proportion was even higher (56 percent). Furthermore, in both groups of colleges, strategies targeting first-year students were the second most common after developmental education.

One notable difference between the Round 1 and Washington colleges was that the latter focused their ATD activities on instruction to a greater extent than did the Round 1 colleges. Among the Round 1 colleges, instructional changes (including both reforms to curriculum and instruction and instructional supports) comprised 52 percent of all direct student success strategies. Among the Washington colleges, instructional changes accounted for 70 percent of all direct strategies (see Figure 3.2). Therefore, the Washington colleges may have benefited from the experiences of the Round 1 colleges and learned about successful approaches to change instructional practices. It is also noteworthy that the Round 1 colleges implemented a wider variety of student services strategies than did the Washington colleges. For example, some Round 1 colleges implemented early alert systems and scholarship and financial aid programs, two types of interventions that were not implemented at any of the Washington colleges.

Figure 3.2

Proportion of Student Success Strategies by Type Used at the Round 1 and Washington ATD Colleges



Another difference between the Round 1 and Washington colleges was the scale of student interventions. Institution-wide improvements to student outcomes require interventions that reach a substantial number of students. Thus, Achieving the Dream encourages colleges to develop strategies with the potential to benefit students on a large scale. While the Washington colleges had varying degrees of success developing large-scale strategies in student services and instruction, five of the six colleges implemented at least one large-scale strategy.

Neither the Round 1 college group nor the Washington State college group was able to bring more than half of its strategies to over 25 percent of their target populations, although the Washington colleges did have a greater percentage of large-scale strategies than the Round 1 colleges after four years. Figure 3.3 shows that 31 percent of strategies were operating at scale at the Round 1 colleges, compared with 43 percent of strategies at the Washington colleges. Thus, the Washington colleges may have learned from the experience of the Round 1 colleges, many of which early on tried to implement too many interventions that were not well connected with one another (Rutschow et al., 2011). Three of the Washington colleges — WA-A, WA-B, and WA-C — initially developed a number of small, boutique strategies but soon shifted to strategies that would have a more systemic impact. For example, one college initially planned to implement more than 20 strategies but was encouraged by its ATD coaches to focus on interventions that had a broader impact on students.

In contrast with the Round 1 colleges, the large-scale strategies at the Washington colleges were not predominantly aimed at student services. Over half the strategies that had reached a substantial number of students in Washington involved changes to instructional practices. It is a potentially positive sign that among the Washington colleges more strategies were being developed at scale and more of them involved instructional reforms than in the Round 1 colleges. It is also notable that at the Washington college that had gone furthest to implement the ATD culture of evidence principles — WA-A — all three of its interventions were considered to be large scale (see Chapter 2).

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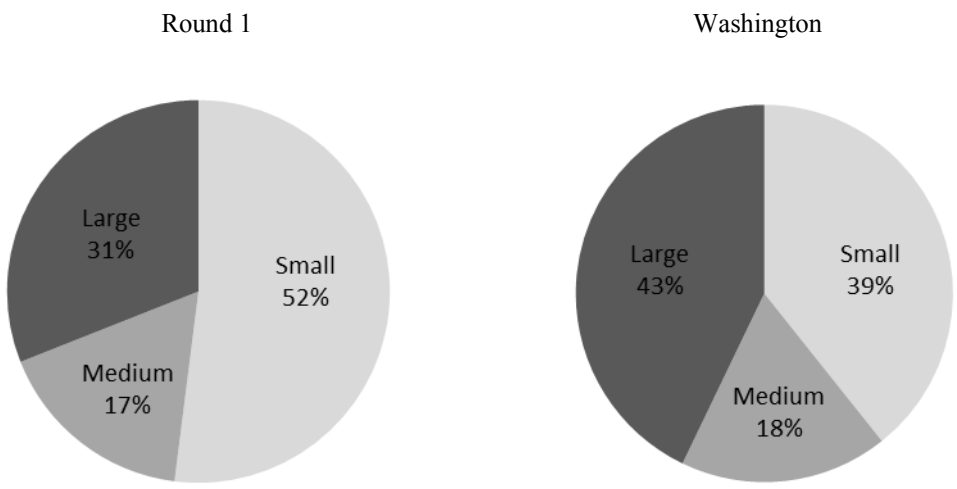
Figure 3.3

Proportion of Strategies Operating at Small, Medium, or Large Scale at the Round 1 and Washington ATD Colleges



The Redesign of Programs and Support Services at Scale

The research literature on organizational effectiveness suggests that no one innovative practice or even set of discrete practices is sufficient to improve organizational performance.[7] The implication for community colleges is that in order to achieve substantial improvements in

[7] For a review of research on organizational effectiveness and improvement in and outside education, and the implications for community colleges, see Jenkins (2011).

student outcomes they will need to make systemic changes in programs and services: no single innovation or even set of interventions will be sufficient to dramatically increase the number of students who complete their education. From this perspective, rather than test and scale up discrete interventions, colleges need to redesign major programs and functions at scale. The research on organizational effectiveness makes clear that redesign efforts need to be well aligned to achieve organizational goals — which in the case of ATD colleges is improved rates of student completion.

Another lesson from research on effective organizations is that for innovations to diffuse through a college and be sustained over time, faculty and staff must be broadly engaged in the innovation process. Faculty in particular must be empowered and supported to lead efforts to improve instruction. The report on the Round 1 colleges indicated that many of them had difficulty engaging faculty. Chapter 2, which discusses organizational changes, indicates that faculty engagement was also a challenge for some of the Washington colleges.

Some of the Washington colleges did attempt to make systemic changes to programs and services. And at some of the colleges a substantial number of faculty members were experimenting with ways to improve instruction, and in some cases their colleges supported them in efforts to disseminate the innovations throughout their campuses. These efforts are described below.

Reforms to Programs and Services

As noted, the majority of the direct interventions implemented as part of ATD in Washington were focused on reforms to instruction. Instructional strategies included changes to curriculum and instruction and instructional supports such as tutoring, supplemental in-class instruction, and other programs to support classroom learning. Student services strategies included changes to orientation and advising and student success courses. Below we describe several notable efforts to redesign programs and processes in student support services and instruction.

Student Services

Much of the reform work in student services involved redesigning programs or creating new interventions for students at the beginning of their educational experience. At four of the colleges — WA-A, WA-C, WA-D, and WA-E — a student services intervention was one of the major efforts conducted as part of ATD. Three colleges (WA-C, WA-D, and WA-E) revised the intake and advising process for incoming students. The fourth college (WA-A) developed a transition center for ESL students.

One Washington college — WA-C — developed a comprehensive approach to helping first-year students navigate from matriculation to the declaration of a program of study, with the goal of helping them obtain 30 credits by the end of the first year. The multipronged approach consisted of practices that existed prior to Achieving the Dream and new strategies developed as part of the initiative; they included early assessment, mandatory orientation, a redesigned student success course, and intrusive advising for students, along with a locally developed software application for tracking student progression and improving advising. As a result of integrating interventions into a more comprehensive model that supports students along a pathway from intake to the accumulation of 30 college credits, the college has seen some initial success in improving the experience of first-year students. According to one administrator, "The combination of strategies appears to be working, and we are continuing to look at ways to shore up the advising process. The sum total of our efforts has led us to some success in getting students to their 30 credits [in their first year]." This idea of the effectiveness of implementing complementary sets of innovative practices is consistent with research on high-performing organizations (Jenkins, 2011).

In contrast with this more comprehensive approach to redesigning the intake and advising process, two colleges — WA-D and WA-E — sought to improve the experience of new students by revising student orientation. At the core of these efforts were changes to institutional policy, including making orientation mandatory and eliminating late registration for first-time students. The colleges reported that the changes to the intake process reached a large number of students and increased first-to-second-term retention rates. However, although large in scale, these redesigned orientation programs involved relatively brief contact with students, raising the question of how much benefit beyond first-to-second-term retention they may have had.

The major student services reform at WA-A was the development of a transition center for ESL students. Recognizing that an extremely low number of ESL students were successfully transitioning to a college-level program, the college developed a one-stop center offering help with advising, financial aid, and academic support to facilitate the transition from ESL courses to college-level programs. The center specifically targeted students at the higher levels in the ESL course sequence. The transition center reached an increasingly larger number of the target population in each year after initial implementation: rates of participation jumped from 47 percent of the target population in AY 2007–2008 to 74 percent in AY 2008–2009. Moreover, transition rates to college-level coursework also increased dramatically: in AY 2007–2008, 12 percent of the target population transitioned, and in AY 2008–2009 the transition rate increased to 20 percent. According to one administrator, the college's approach to serving ESL students "is very different from how it was looked at five years ago," mostly as a result of the ATD work.

Instructional Programs

In addition to redesigning student services, some of the Washington colleges also sought to remake instructional programs. Their efforts tended to focus on developmental education sequences (as mentioned, five of the six colleges reported implementing at least one strategy that targeted students in developmental education courses). Several of the changes were structural and focused on reducing (or, at one college, increasing) the number of required courses in the developmental sequence, developing modularized courses, integrating student success content into existing courses, or implementing a cohort model.

Developmental math sequences in particular were a focus of Achieving the Dream work. Of the 15 strategies related to developmental education across the Washington colleges, 11 targeted developmental math. For example, following the Statway model developed by the Carnegie Foundation for the Advancement of Teaching,[8] WA-A transformed its developmental math sequence to make the math curriculum more relevant to students' academic pathways. In addition to the curricular reform, the strategy reduced the length of the developmental math sequence from three terms to two terms for students not pursuing STEM programs of study. Administrators reported that because the entire developmental math structure had changed, faculty became engaged in deeper conversations about math content and placement procedures more generally. These changes were not fully implemented until spring 2010. According to the college, one year later, as of spring 2011, 75 percent of the roughly 3,000 developmental math students served annually had gone through the new sequence.

The majority of redesign efforts in both instruction and student services targeted students in developmental education or gatekeeper courses, first-year students, or some combination of these groups. As a result, colleges reported improvements in early retention rates and in completion of developmental and gatekeeper courses. In the concluding chapter we argue that for colleges to experience improvements in other measures of performance, particularly completion, they will need to undertake similar changes to degree programs.

Engagement of Faculty to Develop and Disseminate Instructional Innovations

Research on effective organizations inside and outside education indicates the importance of engaging front-line employees in the improvement process. In Washington, four of the ATD colleges — WA-B, WA-C, WA-D, and WA-F — sought to engage faculty in developing and diffusing innovations in instruction, with varying degrees of success. We

[8] For more information, see the Carnegie Foundation for the Advancement of Teaching's website: http://www.carnegiefoundation.org/statway.

describe these efforts below to identify the conditions under which substantial changes are likely to occur.

College leaders can promote faculty engagement by facilitating the dissemination of innovative practices through professional development opportunities and the sharing of knowledge among faculty and staff across the institution. For example, WA-C implemented an instructional reform using the Universal Design for Learning (UDL) framework. UDL is a professional development program that uses research on cognitive science and student learning styles to improve curriculum design, pedagogy, and assessment. At WA-C, the intervention calls for full-time and adjunct instructors to form cohorts of 12 to 15 faculty members who work together over three terms to create and implement UDL strategies. The college found that course completion rates improved by 3 percent or more for students of instructors who participated in UDL. Initially, the intervention was piloted for faculty teaching developmental education and gatekeeper courses, but it has expanded over time to include faculty members from other academic departments. Initial training in UDL created faculty "champions" for the approach. Each term a faculty member was given full-time release to coordinate UDL training activities.

While not mandatory, UDL has slowly gained traction at WA-C. As of spring 2011, over 60 of the more than 400 full- and part-time faculty members had participated in creating and implementing UDL strategies in their classes (primarily in developmental-level and gatekeeper courses). The college is planning to further integrate the intervention in other disciplines as part of college-wide professional development opportunities.

Another organizational practice that encourages broad-scale instructional reform is taking a faculty-driven approach to developing reforms. The most successful direct student intervention developed under Achieving the Dream at WA-B was a Reading Apprenticeship (RA) program that was modeled on the approach developed by WestEd. RA is designed to improve student learning through a structured approach to reading and understanding texts in any discipline. At WA-B, a faculty member learned about the Reading Apprenticeship strategy at an ATD Strategy Institute and introduced the concept to faculty, administrators, and the ATD core team at the college. The strategy was developed by a team of faculty and staff members that described their process as a "grassroots movement," contrasting it with the "top-down" approach initially used for ATD strategy development at the college.

After seeing initial improvements in first-to-second quarter retention for students participating in the intervention and gains in reading on the Comprehensive Adult Student Assessment Systems (CASAS)[9] assessment for basic skills students, the strategy leadership team increased its outreach to involve more faculty members in disciplines across the college

[9] For more information, see CASAS' website: www.casas.org.

and drafted a comprehensive plan for scaling up the program. With the support of the administration, the strategy team developed a Reading Apprenticeship website, disseminated a monthly program newsletter, recruited new participants at department meetings, and created posters and tee shirts promoting the program. The team also embraced the use of data to gather evidence of the program's effectiveness and made this information widely available at the college. As a result of these efforts, senior leaders recognized that having empowered, motivated faculty and staff as change agents increased buy-in among other faculty.

As one administrator noted, "When you identify a strategy, you need to have a champion for it. Reading Apprenticeship is successful because our [faculty member] strategy leader is invested in it." Similarly, a student services staff member said, "Reading Apprenticeship had a slow start, but now people are talking about it all over campus. Anytime you get that kind of enthusiasm, you are well on your way." Encouraged by growing enthusiasm and the support of the administration, the strategy leaders reported that increasing numbers of faculty were participating in Reading Apprenticeship professional development activities. By spring 2011, over 130 faculty members had participated in training in the RA method. Based on this enthusiasm, the college's director of institutional research estimated that in spring 2011 38 percent of all students and 46 percent of students in professional technical courses were taught by instructors who had at least two hours of RA training. No formal assessment has been done on how much these instructors use RA in their classes, however.

The RA intervention suggests that the engagement of faculty in the knowledge building and ownership of reform efforts is an important component of implementing changes in classroom practice at scale. However, without the active support of administrators to facilitate communication and spread reform efforts, broad faculty engagement and scaling-up efforts are likely to be more difficult to achieve. For example, another effort to foster instructional innovation among faculty was an integrative learning program implemented at WA-F. Integrative learning engages faculty from multiple disciplines in a common theme for their coursework to enrich student learning across courses. Similar to the Reading Apprenticeship program, the integrative learning strategy was driven by a core group of motivated faculty. A faculty member noted, "You get into a sticky situation sometimes when the administration gets too involved, because then the expectation is that you have to be involved in this. I think one thing that has made [integrative learning] so powerful is that it is totally voluntary for faculty." In contrast with the interventions described above, however, faculty members involved in integrative learning described a lack of administrative support for their efforts to innovate and scale up their practices. An instructor stated:

> I think Achieving the Dream was very focused on student success, but it wasn't focused enough on the systemic support systems within the college itself. If we don't look at what is supporting faculty and what is supporting the cross-pollination and sharing across the community, then I think you are missing a huge part of what makes a college successful. As an Achieving the Dream college, there were some attempts to bring faculty together, but it felt superficial.

Without the infrastructure to support the sharing of innovative instructional practices, there were limited opportunities to extend the integrative learning strategy to additional faculty across the college, and as a result the strategy was only being used by a small group of instructors. As of spring 2011, about 150 students were participating in the intervention each term, which is approximately 2 percent of the total enrollment and 22 percent of students enrolled in the targeted courses.

At WA-D, administrators were resolved to let math faculty lead the college's efforts to revamp the developmental math curriculum, and faculty were empowered to develop and test different approaches. However, the math faculty was cautious about adopting approaches for which there was not sufficient supporting evidence. The college initially lacked a strong institutional research function that resulted in widespread mistrust of data and a culture not conducive to supporting change and innovation (see Chapter 2 for more information on WA-D's experience). As a result, changes to the developmental math sequence at the college have been slow to develop. The interventions described above suggest that the diffusion of instructional reforms is enabled by several organizational practices. First, colleges should embrace a faculty-driven approach to designing and implementing reforms, especially those related to instruction, rather than a top-down approach. Indeed, a grassroots approach is consistent with research suggesting that faculty and staff must be centrally engaged in the process of improving institutional performance. Second, colleges should support the spread of innovative practices by providing the infrastructure and opportunities for faculty and staff across the institution to share their knowledge and authority. Third, colleges should ensure that faculty and staff understand and believe in the goals of organizational reform. Research suggests that these practices are more likely to result in instructional reforms that are sustainable and scalable.

Innovating at Scale Versus Scaling Innovations

As a group, the Washington colleges seemed to focus more on improving instruction (as opposed to only student services and academic support) than did the Round 1 colleges, with at least two implementing strategies almost entirely related to instruction.

Research on high performing organizations indicates that effective organizations implement integrated, complementary practices that align with organizational goals. Some of the Washington colleges did seek to move beyond implementation of discrete interventions to make systemic changes in programs and practices, and several of them succeeded. Some of these same colleges also succeeded in promoting diffusion of instructional innovations. In those cases, the colleges seemed to provide a balance between empowering faculty and leaving them alone to try out innovations while at the same time providing support for professional development.

The Washington colleges that were most likely to make systemic changes by redesigning programs and services and supporting the diffusion of instructional innovations were those that we found to be further along in implementing the Achieving the Dream culture of evidence principles. This finding supports the idea, central to the Achieving the Dream theory of change, that building a culture of evidence creates the organizational conditions for reforming academics and student services to better serve students.

The approach taken by these colleges was not to scale up innovations per se, although they did experiment with different approaches, but to redesign programs and services at scale — essentially to innovate at scale rather than to scale innovations. Such innovations are easier to sustain since they become part of the way a colleges operates. We also hypothesize that the colleges that were able to innovate at scale are those that will see the greatest improvements in performance.

However, even in these more innovative colleges, efforts to redesign programs and services in Washington were largely confined to the intake process and developmental education. CCRC research suggests that colleges need to take a similar approach to college-level programs. In particular, they should take steps to ensure that their programs are well structured and well aligned with requirements for the successful transition to further education and employment, and that mechanisms are in place to help students enter and complete programs of study as soon as possible (Jenkins & Cho, 2012). We hypothesize that the systemic changes implemented by some of the colleges might lead to improved retention and progression to college-level gatekeeper courses. However, without similar systemic changes to college academic programs, we do not see how the efforts implemented by the Washington colleges alone can increase student completion and success.

Chapter 4

Use of Data by Faculty and Administrators

This chapter presents findings from surveys of data use by community college faculty and administrators. These respondents also reported on their perceptions of the use of student data by their academic and administrative departments (by administrative departments, we mean functional areas such as president's office, admissions, IR, IT, etc.) and by each of their colleges as a whole. Our analysis focused on changes in the use of data over three years at each of the six Washington colleges that joined ATD in the 2006–2007 academic year. We explored changes in the frequency and nature of data use between the first survey, conducted during the 2007–2008 academic year, and the second survey, conducted during the 2010–2011 academic year.

Our analysis yielded the following main findings, which are generally consistent with the findings from the field research:

- There were positive changes in the extent of use of data over time by faculty for teaching-related purposes, particularly at three of the colleges.
- We observed no changes in the frequency with which faculty used data on academic achievement gaps between students of different races/ethnicities and income levels.
- Faculty at three of the colleges perceived an increase in the use of data by their academic departments, particularly for curricular decisions and identifying courses with high failure rates.
- The perceived use of data by administrative departments at the colleges declined over the time between the two surveys. This finding suggests that use of data for planning purposes waned following the first year or two of participation in Achieving the Dream, when colleges were strongly encouraged and helped to analyze data on student success.

The findings suggest that there were some positive changes in attitudes toward and use of data, but perhaps not as many as we expected at the outset of this initiative, which has among its core principles the creation of a culture of evidence to improve student outcomes. Although we are encouraged by the generally positive changes that have occurred, the patterns of improved data use varied across colleges and within colleges between faculty and administrators.

Research Methods

Sample

The sampling frame included all full-time administrators at the director level or above and all full-time faculty. The final sample size for the 2010–2011 survey was 679: 424 faculty, 131 administrators, and 124 student services staff. The overall response rate was 69 percent. WA-A had the highest combined response rate: 79 percent. The response rate for WA-D and WA-E was 73 percent; for WA-B, 69 percent; and for WA-C, 66 percent. WA-F had the lowest combined response rate: 58 percent. Response rates for faculty and administrators in each survey are provided in Table 4.1.

Table 4.1

Response Rates for Each Survey by College

	2007–2008 Survey		2010–2011 Survey	
College	**Faculty (%)**	**Adm. (%)**	**Faculty (%)**	**Adm. (%)**
WA-A	45	61	69	94
WA-B	64	93	67	79
WA-C	66	77	64	77
WA-D	74	80	79	72
WA-E	74	93	62	85
WA-F	46	81	49	91
Mean	62	81	65	83

Survey Design

The surveys used a panel design to enable tracking of behaviors and perceptions over time. The CCRC–MDRC research team developed two instruments in 2007: a faculty survey and an administrator survey. Designed in consultation with leadership and data coaches working with the colleges, we revised the instruments after pilot testing at three ATD colleges that did not participate in the study.

In 2010 we modified the faculty and administrator instruments based on our experiences administering the 2007 survey and to account for the greater attention being paid to assessment in Washington since then. Our goal was to capture more details. For example, we

changed a yes/no question on the frequency or extent of data use to a question whose answer used a 7-point Likert scale. We also added a few questions to obtain information that we had not elicited in 2007–2008. Further, we added a student services instrument in 2010, based on the administrator instrument. Because we did not solicit the views of student services personnel in 2007–2008, an analysis of the 2010 data is not included in this chapter, which examines changes over time. (Analyses of data on the views of student services personnel will be presented in a separate, more comprehensive report on the survey results.)

Each instrument contained approximately 100 items, most of which overlapped, relating to three topics: data accessibility, data use, and familiarity with and involvement in Achieving the Dream. The instruments also included a set of demographic questions about the respondent and his or her role at the college. Most items used a 7-point Likert scale; some questions used a yes/no format.

Both the 2006–2007 and 2010–2011 survey instruments were administered by the Human Resources Research Organization (HumRRO), which developed the web interface; managed the distribution and administration of the survey, both electronically and in paper form; and served as the primary contact for questions and technical difficulties. MDRC and CCRC collaborated with HumRRO during the administration of the survey and were responsible for the coordination with participating colleges and questions about content.

Data Analysis

The survey responses were analyzed to ascertain whether changes occurred between the 2007–2008 and 2010–2011 surveys in the frequency and extent of data use by faculty and administrators at the participating colleges. We conducted a separate analysis for each college, and the results were compared across colleges. To capture differences within colleges between the years covered by each survey, we used chi-squared and Wilcoxon-Mann-Whitney tests. When the median remained the same but the distribution was statistically different, we also examined the frequency distributions and percentage distributions of those variables.

Another set of variables were measured on a Likert scale and captured perspectives on data, extent of data use, barriers to data use, and involvement in Achieving the Dream. These data were explored using *t*-tests to compare differences in the means between the two waves of the surveys.

Extent of Data Use

In general, the survey results suggest that there were few changes in the use of data by faculty and administrators between 2007–2008 and 2010–2011, although some positive changes occurred at three or four of the colleges.

Because most changes were not statistically significant, we only provide items of particular interest in tables (in Appendix B), such as faculty use of data to inform teaching-related practices (Appendix Table B.3). Summaries of survey responses are provided in Appendix Table B.1 (for faculty) and Appendix Table B.2 (for administrators).

Data Accessibility

Between 2007–2008 and 2010–2011, the reported accessibility of data improved among faculty at four of the colleges and among administrators at three colleges.

At four colleges — WA-A, WA-B, WA-D, and WA-F — faculty responses about the accessibility of data improved in at least two of the following areas: accuracy, user friendliness, responsiveness of the IR office, sufficiency of IR staffing, and timeliness of data (see Appendix Table B.1). WA-A's faculty responses showed an increase in the user friendliness of the formatting of data and an improvement in the timeliness of data. WA-B's faculty responses also showed an improvement in the timeliness of data and suggested that the IR office had improved its responsiveness.

For administrators, the reported accessibility increased at three colleges (see Appendix Table B.2). WA-B had the greatest number of areas of increase, including accuracy, formatting, responsiveness of the IR office, clarity of college reports, and timeliness of data. Data from WA-C suggests increases in accessibility in the areas of formatting, IR responsiveness, IR staffing, and timeliness of data. Finally, there was an increase in the reported user-friendliness of data at WA-D.

Use of Data by Faculty and Administrators

Frequency of Data Use by Type

We asked about the frequency with which faculty and administrators reviewed or used data of certain types, including student outcomes and data disaggregated by race/ethnicity or income. The scale was as follows: 1 (never), 2 (once every two to three years), 3 (once every one to two years), 4 (once per year), 5 (two to three times per year), 6 (four to five times per year) and 7 (more than six times per year). Across the 17 types of information we asked about, the six colleges demonstrated few statistically significant changes in the frequency of data use

between the 2007–2008 and 2010–2011 surveys (not shown in tables). The most changes occurred at WA-E, which had statistically significant changes in seven areas, six of which were related to administrators' use of various types of data. Below, we focus on statistically significant ($p < .05$) changes in the use of data by faculty.

Faculty at WA-D increased their use of data on placement scores and grades to more than six times per year from once a year. The faculty at WA-E increased the frequency with which they used placement test scores from a median of two to three times per year to four to five times per year. We also saw increases in the use of research: WA-B faculty increased the frequency with which they used outside research on effective practices, and WA-F faculty increased their use of data from qualitative data sources. Although not the focus of Achieving the Dream, the most consistent increase in data use across the colleges was in the area of faculty use of budget and finance information, with statistically significant increases at four of the six colleges: WA-A, WA-C, WA-D, and WA-F.

Across the colleges, for both faculty and administrators, there were no statistically significant changes in the frequency of use of data on course evaluations, other learning measures, results from external surveys such as the Community College Survey of Student Engagement, and information broken down by income or receipt of financial aid.

Use of Data by Faculty in Teaching-Related Decisions

We examined not only the frequency of data use generally but also the extent of data use for teaching-related decisions. For these questions, the scale ranged from 1 (not at all) to 7 (to a great extent). Appendix Table B.3 shows our findings. Two colleges — WA-C and WA-D — demonstrated statistically significant increases in the reported extent to which faculty were using data on students in their decisions about curriculum, teaching practices, advising students, and identifying students who were struggling academically. At WA-A, there were increases in the reported extent to which faculty were using data and research on students in decisions about curriculum, advising students, and identifying students who were struggling academically, but there was no statistically significant change in their use of data for teaching practices. The remaining three colleges had few or no statistically significant changes in these areas.

Sources of Data on Students

Faculty use of various sources of data generally remained unchanged or declined over the three years between the surveys. There were decreases in the use of college reports by faculty at two colleges: WA-A and WA-F. There was also a decrease in the reported use of student surveys by WA-B faculty. The only increase in the use of a data source was in the use of state databases by WA-A faculty.

Table 4.2 displays the top three sources of data on groups of students by college. For faculty at most of the colleges, requests to the IR/IT office and college-produced reports were the primary sources of data. Also noteworthy is that at four of the six colleges, faculty agreed with the statement that they "generally do not need information on groups of students." This is in contrast with administrators, for whom that response was not as common (see Table 4.3).

As with the faculty, the sources that administrators used for gathering data on groups of students did not change significantly between the 2006–2007 and 2010–2011 surveys. In contrast with the faculty, administrators at three colleges increased their reported use of various sources of data on groups of students. In particular, WA-D's administrators increased their use of the college website, college reports, requests to the IR department, and student surveys. WA-A's administrators increased their use of their college's student information system (SIS), and WA-E's administrators increased their requests to the IR office. The only decrease was in administrators' use of college reports at WA-C. Administrators relied primarily on requests to the IR and IT offices and college reports for information. In terms of their top three data sources, administrators were less likely than faculty to report that they did not need information on groups of students; administrators at WA-F and WA-E also listed the SIS among their top sources (see Table 4.3).

Table 4.2

Faculty's Top Three Sources of Data on Groups of Students by College

Date Source Rank	WA-A	WA-B	WA-C	WA-D	WA-E	WA-F
1	Requests to IR/IT	Generally do not need info on groups of students	Student surveys or focus groups	My department's database	College reports	Requests to IR/IT
2	Generally do not need info on groups of students	Requests to IR/IT	Generally do not need info on groups of students	Requests to IR/IT	Requests to IR/IT	Generally do not need info on groups of students
3	College reports	College reports	Requests to IR/IT	College reports	My department's database	My department's database

Table 4.3

Administrators' Top Three Sources of Data on Groups of Students by College

Date Source Rank	WA-A	WA-B	WA-C	WA-D	WA-E	WA-F
1	Requests to IR/IT	Requests to IR/IT	College reports	Requests to IR/IT	College reports	Requests to IR/IT
2	College reports	College reports	Requests to IR/IT	College reports	Requests to IR/IT	College reports
3	College web site/fact book	State databases or research reports	My department's database	College web site/fact book	SIS	SIS

Reasons for Not Using Data

We investigated respondents' views about specific barriers to using data, including the sense that they were too busy with other responsibilities, that they did not have the skills to use the data, that they did not trust the data, and that the data were irrelevant to their job responsibilities. For these questions, the scale was 1 (not at all), 4 (some), and 7 (to a great extent).

The reported barriers to using data decreased modestly for faculty at two colleges: WA-C and WA-F (see Appendix Table B.1). WA-C faculty reported a decrease from 4.2 to 3.5 in the extent to which they felt too busy to review and use data to inform their teaching ($p < .10$). Over the three years between surveys, the faculty at WA-F reported a decrease in the view that the data were irrelevant to their responsibilities. One increase in perceived barriers occurred at WA-A; there was a statistically significant increase, from 2.3 to 2.7, in the view among faculty respondents that they did not use data because it was not relevant to their job responsibilities.

While there were no changes at three colleges — WA-A, WA-B, or WA-F — in administrators' views of barriers to their use of data, there were decreases at the other three colleges (see Appendix Table B.2). Administrators at WA-C showed a decrease in the view that they did not have the skills and that they did not trust the data. WA-D administrators showed a decrease in their view of being too busy, not having the skills, and the irrelevance of the data.

Administrators at WA-E showed a decrease over the three years in their view that the data were not relevant for their jobs.

Participation in Organized Discussions on Improving Student Success

Achieving the Dream encourages colleges to engage faculty, staff, and other college personnel in evidence-based discussions on ways to improve student outcomes. Our data suggest that there were minimal changes in the participation of faculty and administrators in organized discussions at their colleges on topics related to improving student success. Faculty across the colleges reported that they participated in such discussions once per year or two to three times per year during both 2006–2007 and 2010–2012 surveys. These results suggest that discussions about student success occurred on these campuses at least once per year and in some cases once per semester. We saw only three statistically significant changes in the amount of participation in organized discussions between the surveys (see Appendix Tables B.1 and B.2): a decrease among WA-A faculty in discussions of achievement gaps, an increase in the same area among WA-D administrators, and an increase in discussion about low-income students among WA-E administrators.

Use of Data by Departments

There were a number of statistically significant changes in respondents' perceptions of the use of data by their departments, although not necessarily in the desired direction (see Appendix Tables B.4 and B.5). For survey questions on this topic, the scale was 1 (not at all), 4 (some), and 7 (to a great extent).

The greatest number of perceived changes in the extent of data use by academic departments, as reported by faculty, took place at WA-A (see Appendix Table B.4). The survey data suggest that there were substantial and statistically significant increases in the extent of this college's use of data on students for curricular decisions, teaching, program planning, program evaluations, long-term planning, budgeting and finance, and identification of high failure rate courses among academic departments. Faculty at four of the other colleges also reported an increase in their department's use of data to identify high failure rate courses and revise them. Only WA-B had no statistically significant changes in the use of data by academic departments.

Among administrative departments, survey responses suggest that there was a decrease in the use of data between 2007–2008 and 2010–2011 (see Appendix Table B.5). At four colleges — WA-A, WA-C, WA-D, and WA-F — the changes in the extent of perceived data use were negative, large, and statistically significant as they related to curriculum, program planning, and program evaluations. Survey results from WA-C also suggest that administrators' use of student data to identify areas needing improvement also declined over the three years

between the survey waves. In general, the use of data for long-term planning and budgeting and finance did not change over time.

Use of Data by the Colleges

Although we saw some changes in the use of data by academic and administrative departments, changes in the perceptions of the use of data by the colleges overall were minimal (not shown in tables). The largest statistically significant change occurred at WA-E in the administrators' perceptions of their college's use of outcomes data. In 2007–2008, 70 percent of the survey respondents agreed that their college used data on student outcomes, and in 2010–2011 all of the respondents agreed ($p < .01$). At WA-A, the percentage of administrators who reported that their college used data on students of color and low-income students increased from 67 percent to 92 percent ($p < .10$). The percentage of WA-A administrators who reported that their college used data to inform strategic planning decreased between the two surveys from 100 percent to 92 percent ($p < .10$). These changes were the only statistically significant changes in the perceptions of the colleges' use of data.

Comparison with Findings from Field Research

We compared the findings on the extent to which colleges adopted practices reflecting the ATD culture of evidence principles from the surveys with those from the field research. We expected that colleges that made more progress in implementing practices consistent with these principles would show more evidence of increased data use in the three-year period between the two administrations of the survey.

Table 4.4 compares key findings from the field research on colleges practices related to data and research with findings from the surveys on changes in data use by faculty and administrators. In general, the findings from the field research are consistent with those from the survey. The colleges that made more progress between 2007–2008 and 2010–2011 in implementing practices to strengthen use of data and research for improving student outcomes were more likely to demonstrate increased data use by faculty and administrators according to the survey data.

One exception is WA-C, where the field research found evidence of increased IR capacity achieved in part through efforts to train faculty and staff to access and use data themselves. In contrast, the survey found that while, overall, administrators at the college had increased their use of data on students more in 2010–2011, there was no significant change in data use by faculty. The field research also found increased attention, led by the college's president, to gaps in student achievement based on race and income. The survey, however,

Table 4.4

Comparison of Findings From Field Research and Surveys on Changes in Use of Data on Students at Washington ATD Colleges

College	Change in COE Implementation	Field Research Findings	Survey Findings
WA-A	High to Very high	• Increased focus on gaps in achievement by race/income and basic skills. • Increased engagement of faculty in using data for improvement. • Creation of data team created to supplement IR capacity.	• Increase in faculty discussions of achievement gap data. • Increase in data use by academic departments. • *Faculty perception that IR capacity not adequate.*
WA-B	Medium to High	• Increased IR capacity.	• Increase in administrator perceptions of data accessibility. • Faculty perception that IR capacity is adequate.
WA-C	Low to High	• Increased IR capacity. • Training by IT staff of faculty/staff on data use to supplement IR capacity. • Increased focus on achievement gaps by race/income.	• Increase in administrator use of data on student groups, but not faculty use. • *Faculty perception that IR capacity not adequate.* • *No increase in faculty/department discussions of achievement gap data.*
WA-D	Low to High	• Increased faculty data use for instructional improvement. • Training by IR staff of faculty/staff on data use to supplement IR capacity.	• Increase in data use by individual faculty and academic departments for curriculum and instruction. • Faculty perception that IR capacity is adequate.
WA-E	Very low to Low	• Increased data use by administrators, but not faculty.	• Increase in administrator data use, including data on student outcomes. • No significant increase in data use by faculty.
WA-F	No change	• IR capacity low.	• *Faculty perception that IR capacity increased.*

NOTE: Italicized survey findings indicate where survey finding does not support finding from field research. Non-italicized survey findings are consistent with field research findings.

found no increase in the frequency with which faculty used data on achievement gaps. The field research offers an explanation for this seeming inconsistency: Faculty at the college initially resisted use of data for improvement. While that resistance waned over time, some faculty members still indicated that ATD is perceived as a top-down initiative at the college and that administrators are more invested in ATD than the faculty.

The field research found that WA-A attempted to supplement the capacity of its IR staff through the creation of a data team that helped to promote data use and assisted the IR staff in addressing requests for information from faculty and staff. Despite these efforts, the survey responses indicate that in 2010–2011 faculty still perceived IR at the college to be inadequate to meet their needs. This finding suggests that while there may have been improvements, the college IR staff and data team need to do more to meet the faculty needs for information and research.

At WA-F, the survey results suggest that faculty felt that IR capacity had increased. The field research found that the new IR director, hired after a period in which the institution had no IR staff, was competent but overwhelmed with multiple responsibilities, including accreditation work and supporting the information needs of senior staff, that left little time to work with faculty. Faculty may have perceived an increase in IR capacity, but the view of the IR staff and administrators is that the IR staff capacity was still not sufficient.

Implications of Data Use Findings

By administering the surveys three years apart, we were able to assess changes in faculty and administrator practices and perceptions related to the use of data between 2007–2008 and 2010–2011. While most of the changes we observed were not statistically significant, our analyses did reveal some statistically significant and meaningful changes.

The data sources on groups of students that faculty and administrators used for were mostly unchanged overall; however, there were statistically significant positive changes in the extent to which WA-D administrators reported using the college's website, college reports, requests to the IR department, and college administered surveys to gather data on groups of students. Likewise, while there were not many changes in the frequency with which faculty and administrators used various types of data overall, there were notable changes among faculty at WA-A and WA-D and some changes at WA-C and WA-F.

We did not see any change in the frequency with which faculty used data on academic achievement gaps disaggregated by race/ethnicity or income. Given the focus of Achieving the Dream on improving student outcomes and narrowing the gap between students of different races/ethnicities and income levels, this is a noteworthy finding. However, it is encouraging that

there were increases in data use by faculty for teaching related purposes, particularly among the faculty at three colleges: WA-A, WA-C, and WA-D. In addition, there was an increase in the frequency with which administrators at one college — WA-E — used student outcomes data and disaggregated data.

There were numerous statistically significant positive changes related to the perceived use of data by academic departments. We saw noteworthy increases in faculty perceptions of the extent of data use by their departments at WA-A, WA-D, and WA-E, particularly for informing curricular decisions and identifying courses with high failure rates. WA-A also demonstrated statistically significant increases in the extent to which faculty used data for teaching, program planning, program evaluations, long-term planning, and budgeting and finance.

Unlike the academic departments, administrative departments demonstrated a decrease in the use of data in the three years between surveys. The changes between 2007–2008 and 2010–2011 at four colleges — WA-A, WA-C, WA-D, and WA-F — were negative and statistically significant in the areas of curriculum, program planning, and program evaluations; the use of data for long-term planning and budgeting and finance did not change at any of them. The overall decline in the use of data by administrative departments revealed by the surveys may reflect that data use for planning purposes waned following the first year or two of the colleges' participation in Achieving the Dream. During this period, colleges were strongly encouraged and helped to analyze data on student success to aid in planning the strategies that were implemented in subsequent years.

The survey results were generally consistent with the findings from the field research. Colleges that were found through the field research to have increased their implementation of practices related to the use of data were more likely to have survey results showing increased data use. Overall, the survey results suggest that while Achieving the Dream may have had some positive influence on use of data by faculty and administrators at the Washington colleges, the increases were relatively small and not consistent across all of the dimensions of data use that we examined.

Chapter 5

Student Outcome Trends

This chapter analyzes student outcome trends at the six ATD colleges in Washington State. The goal of Achieving the Dream is to help colleges focus attention on student data and make changes in policies and practices that will improve student outcomes based on these data. Using student-level data from the entering fall cohorts of 2003 through 2009, the trends analysis presented here examines average initiative-wide outcomes across the Washington colleges on five key Achieving the Dream indicators, measured two years after the students entered college:

- Attempting and completing developmental education (remedial) courses in English and mathematics
- Attempting and completing the first college-level course (gatekeeper) in English and mathematics
- Attempting and completing credits
- Persisting fall-to-fall and year-to-year
- Earning certificates or degrees

The previous chapters presented analyses of the colleges' progress toward building a culture of evidence, the student success strategies implemented in the six colleges, and the colleges' use of data. All are key components of the Achieving the Dream model, and they provide a foundation for the colleges' efforts to improve student outcomes. Those chapters suggest that the colleges made some important progress in their efforts, but that the scale of the reforms may not yet be large enough to significantly impact college-wide trends.

The main findings from the student outcomes analysis discussed in this chapter are the following:

- The average student outcomes across the six colleges appear largely unchanged after the colleges began implementing Achieving the Dream.
- The initiative does not appear to have reduced the achievement gap along racial or economic lines. The gap between students who received Pell grants (a measure of low-income status) and those who did not appears to decrease over students' academic careers, but this was also true prior to implementation of Achieving the Dream.

- There do not appear to be greater gains associated with Achieving the Dream for some colleges compared with others.

These findings should be interpreted cautiously. The Washington colleges implemented a wide variety of student success strategies, and they seem to be reaching more students than in earlier rounds of the initiative. In this sense, the colleges appear to have built on the experiences of previous rounds of Achieving the Dream, and in recent years they have been moving closer to affecting large portions of their student populations. With respect to the 2007 through 2009 cohorts included in this analysis, however, the Washington colleges were still reaching relatively small proportions of students through their new strategies.[10] Moreover, few of the colleges reached scale with a comprehensive set of strategies that touched students across the full range of their experiences, even in more targeted areas of the student experience such as intake and remediation, where most of the ATD strategies were focused. It may be that the colleges positively impacted students on a smaller scale than these analyses could detect, or that they positively impacted larger numbers of students in subsequent years.

Research Methods

This chapter uses student data from the ATD database, maintained by JBL Associates, that include student-level demographic characteristics and outcomes for all degree- or certificate-seeking students entering the institutions for the first time in the fall semester. The data do not identify students' participation in different ATD strategies, but they do identify developmental education students in both English and math. For the Washington colleges analyzed in this report, the student outcomes data include the entering fall cohorts of students in 2003 through 2009: four cohorts of students that first enrolled before the initiative began (2003 through 2006 cohorts), and three cohorts that first enrolled after implementation of Achieving the Dream (the 2007 through 2009 cohorts). Two-year outcomes are analyzed for each cohort.[11]

We present several figures that illustrate average institutional trends across the Washington colleges, where each college's average outcome is weighted equally in the analyses. The analyses presented here are purely descriptive. Each figure shows average student outcomes for each of four pre-initiative cohorts prior to colleges implementing Achieving the Dream (2003–2006), and three cohorts after implementation (2007–2009).[12] Although the analyses do address whether the initiative substantially impacted average student outcomes

[10] The 2007 through 2009 cohorts were the most recent ATD cohorts for which two-year outcomes were available for this study.

[11] For the 2009 cohort at WA-B, only one-year outcomes are included, because the college did not submit data for 2011. Alternate analyses that exclude WA-B do not lead to substantially different conclusions than those described in this chapter.

[12] The figures show unadjusted averages for each outcome in each year.

across the six colleges, they do not indicate whether specific Achieving the Dream strategies changed student outcomes, nor whether the initiative as a whole impacted student performance in Washington on a smaller scale.

Such conclusions generally require more rigorous methods, such as randomized controlled trials in which students or colleges are randomly assigned to a treatment group that participates in new ATD programs or to a control group that does not in order to measure the counterfactual — or what would have occurred in the absence of the initiative. The colleges, however, were not selected randomly, and the goal of Achieving the Dream has been college-wide, institutional change that impacts all students. Partly because of this goal, the initiative's leaders determined that randomly assigning students was inappropriate: If the initiative helped transform entire colleges, then both groups of students within a college would be affected, invalidating the research design (that is, there would be no counterfactual). For some evaluations, quasi-experimental methods can provide good estimates of counterfactual outcomes and support stronger claims about causal impacts. For Achieving the Dream, however, quasi-experimental methods are less useful and do not provide causal estimates. Such methods cannot control for many important factors and changes at the colleges that may also affect student outcomes, and they could easily suggest incorrect conclusions.

College-Wide Trends in Student Outcomes

This section analyzes trends in several important student outcome indicators and provides a detailed overview of outcomes for students entering the colleges between 2003 and 2009.[13]

Developmental Education Referrals

Figure 5.1 shows the percentages of each cohort referred to developmental education in English and math, averaged over the ATD colleges in Washington.[14] While the trends of referrals do move up and down in each subject, the results shown in the figures do not suggest large systematic changes associated with the initiative. The top panel of Figure 5.1 shows the percentages of students referred to developmental English in each year of the study, averaged across all institutions. The vertical line at 2006 marks the last entering cohort before the colleges began implementing Achieving the Dream. In 2003, the first year of the pre-initiative period, about 25 percent of the cohort was referred to developmental education in English. Over the next two cohorts, referrals rose to about 29 percent before returning to 25 percent in 2006. In the

[13] Additional trends analyses are provided in Appendix C.

[14] Not all colleges reported data for all outcomes. The figures in this chapter present averages across all colleges that reported data on the given outcomes.

post-initiative period, the reduction in referrals to developmental English continued into 2007. About 20 percent of the 2007 cohort was referred to developmental education, and referrals remained steady at about 21 percent for the next two cohorts. The data, however, do not provide enough information to determine whether the lower percentages of students assigned to developmental English in the post-initiative period represents a continuation of the downward trend that started with the 2006 cohort or a departure from the pre-initiative trends associated with Achieving the Dream.

The bottom panel of Figure 5.1 shows the percentages of students referred to developmental math in each year of the study, averaged across all institutions. Compared with developmental English, many more students were referred to developmental math during the study period. The referral pattern is similar to that of developmental English, with a slight increase in referrals following the 2003 cohort, from 59 percent to 62 percent in the subsequent two cohorts, followed by a reduction in 2006 to 53 percent. As in developmental English, referrals to developmental math level off at about 52 percent, before rising to 56 percent in the last cohort.

It is important to note that the majority of ATD strategies in the Washington colleges targeted developmental education students, but by 2009, when the last cohort analyzed in this study entered college, none of the colleges had implemented strategies at scale that affected all developmental education students. Figure 5.1 shows that a substantial portion of all students in the Washington colleges were referred to some type of developmental education. Most of these students required developmental education in math. Compared with the pre-initiative years, somewhat smaller percentages of students in both subjects were referred under Achieving the Dream. It could be that reforms related to ATD led to small decreases in the percentages of students referred to developmental education, but the changes could also reflect changing student populations. For both English and math referrals, the downward referral trend began prior to implementation of ATD reforms. As discussed in Chapter 1, each of the colleges experienced increasing enrollments over the course of the study, so it is plausible that the student populations may have also changed during this period. In general, however, the trends depicted in Figure 5.1 suggest that there was not a dramatic change in the proportion of students referred to developmental education associated with the implementation of Achieving the Dream.

Developmental Education Completion

Figure 5.2 shows the completion rates for students referred to developmental education sequences in English and math The top panel shows the two-year completion rate for developmental English. The rate fluctuated more widely in the pre-initiative period, reaching a high of nearly 50 percent completion for the 2004 cohort of students and a low of 39 percent for

the 2005 cohort. After the implementation of Achieving the Dream, the completion rate became more stable, generally about 42 percent, but the overall average, and the general trend, do not differ markedly from the pre-initiative period. On average, the pre-and-post-initiative outcomes for developmental education students in English look similar.

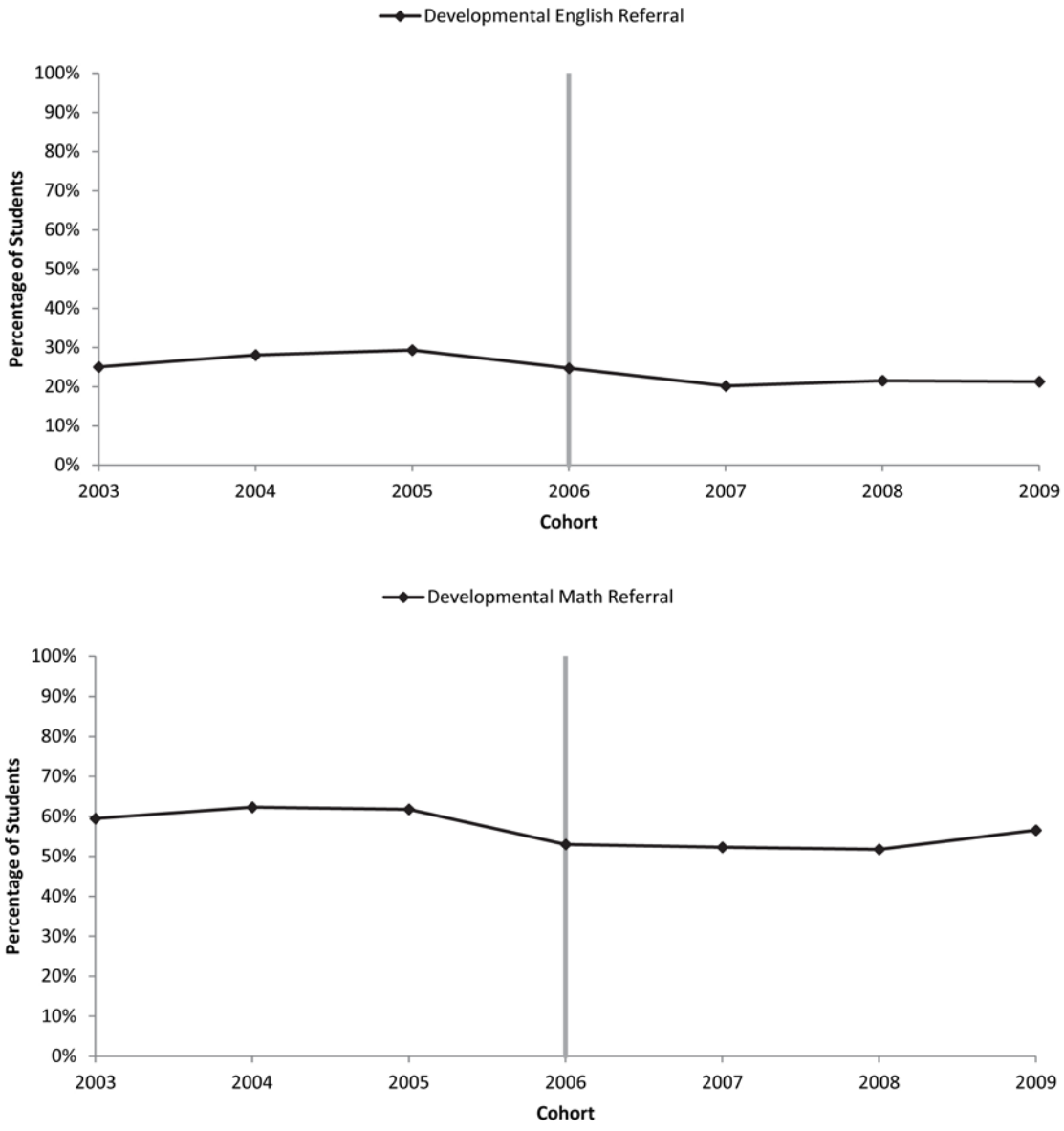
The bottom panel of Figure 5.2 shows the two-year completion rates for developmental math. The pre-initiative trend in math completion also oscillates, averaging between 23 percent and 28 percent completion. As with developmental English, the trend for developmental math remains very similar after implementation of Achieving the Dream. It is relatively stable and similar to what was observed before implementation.

It is important to put these figures in the context of the previous chapters' findings. Most colleges' strategies had not reached a large proportion of the students before the final cohort of students examined here (the 2009 cohort) entered college, although some strategies did reach large numbers of students in subsequent years. Chapter 3, for example, described how one college transformed its developmental math sequence. But in 2009 that math reform had not yet been fully implemented. Two years later, however, in spring 2011, nearly 75 percent of developmental math students had gone through the new math sequence, thereby suggesting that large-scale reforms that did occur may have primarily impacted cohorts of students that are not included in this analysis.

Strategies that are working on a smaller scale, moreover, may not be evident in the average trends depicted here. For example, an impact of 10 percentage points on a developmental education target population would be an impressive improvement in the context of community college reforms. For the Washington colleges, however, it would most likely be invisible in trend lines, such as those in Figure 5.2, because of scaling challenges and other factors at the colleges. For example, most strategies reached fewer than 25 percent of their target population. An improvement of 10 percentage points for 25 percent of targeted students would translate into an increase of only 2.5 percentage points for the entire targeted population at that college. If other colleges reached fewer students, the total average increase would be further diluted. Random fluctuations in the trends could then swamp meaningful changes in student outcomes for smaller subgroups.

Figure 5.1

Trends in Developmental English and Developmental Math Referrals Among All Students: 2003–2009: Washington ATD Colleges

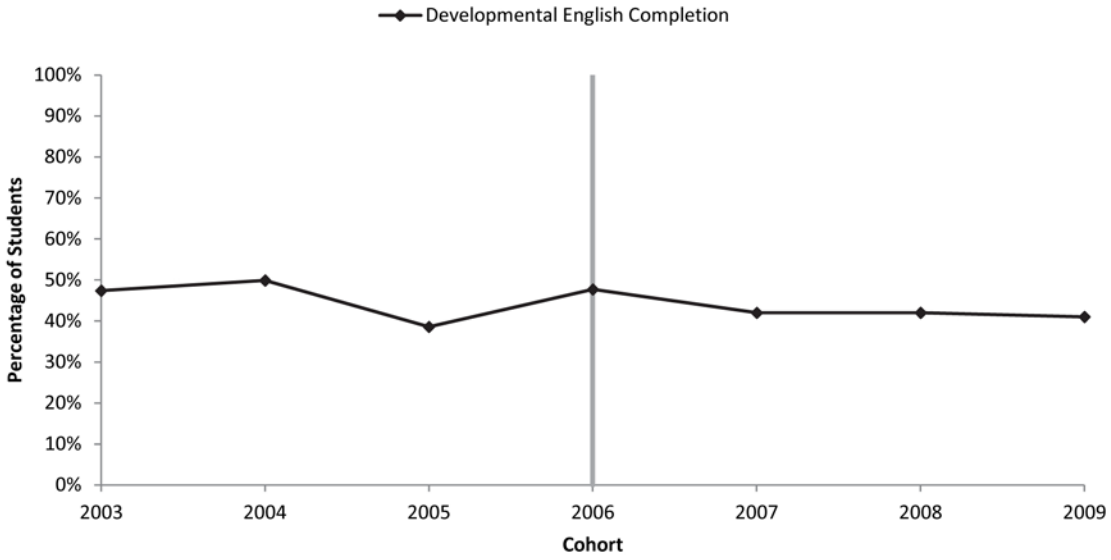


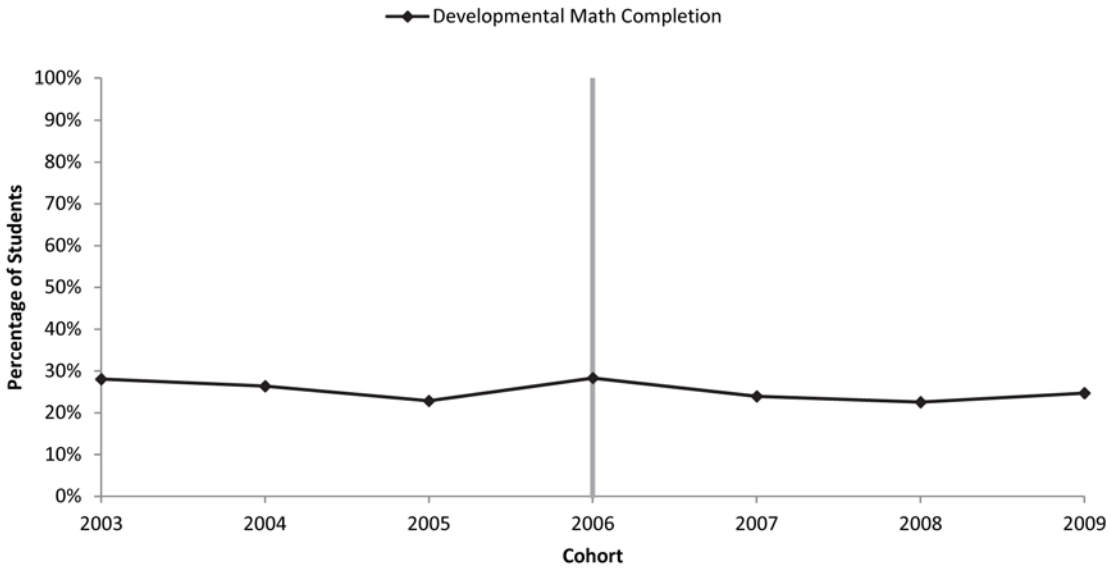
SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. WA-B and WA-D were excluded from the English developmental trend due to lack of data; WA-B was excluded from the math developmental trend due to a lack of data.

Figure 5.2

Trends in Developmental English and Developmental Math Completions Among Students Referred to Any Developmental English or Math Course, 2003–2009: Two Year Outcomes for the Washington ATD Colleges





SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. WA-B and WA-D were excluded from the English developmental trend due to lack of data; WA-B was excluded from the math developmental trend due to a lack of data.

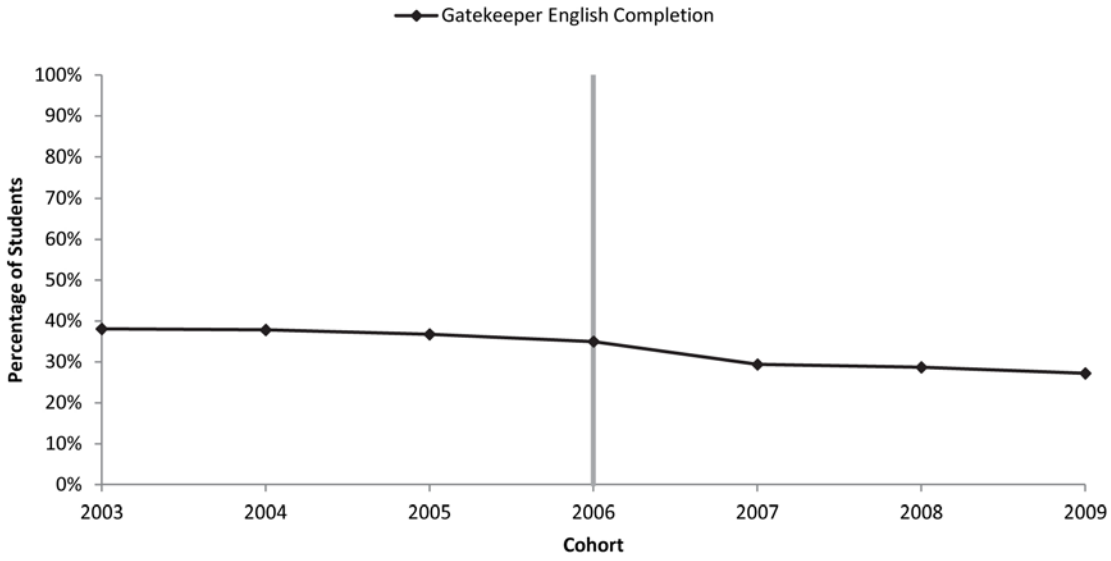
Gatekeeper Courses

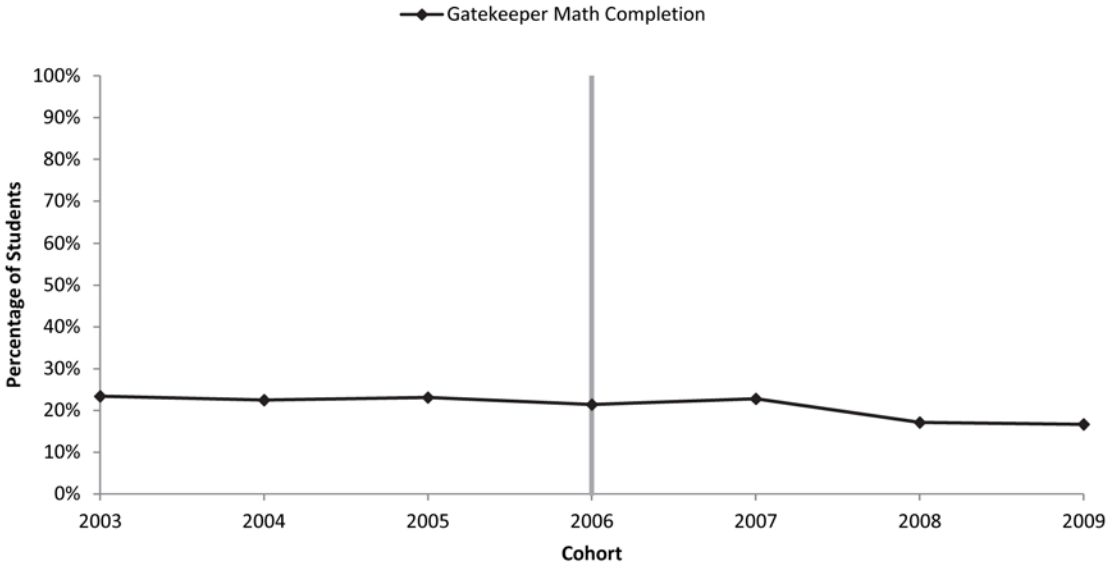
Considerations about the scale of student improvement strategies become even more important when interpreting the next set of figures, where average outcomes extend beyond the developmental education populations to include entire cohorts of students in the Washington ATD colleges. Here, any impacts for a subset of targeted students would be further diluted than those for developmental education students by including non-targeted students in the institution-wide averages. Figure 5.3 shows the proportions of all students who passed gatekeeper courses (the first college-level courses) in English and math within two years. The top panel shows that about 38 percent of students passed gatekeeper English in the 2003 cohort. Over the pre-initiative period, this proportion decreased slowly, to 35 percent for the 2006 cohort. By the end of the follow-up period, less than 30 percent of the 2009 cohort passed gatekeeper English in their first two years in college.

The bottom panel shows that about 23 percent of students passed gatekeeper math in the 2003 cohort. In gatekeeper math, the pass rate also decreased over time, although more slowly than for English. By the end of the follow-up period, about 17 percent of the 2009 cohort passed gatekeeper math in their first two years in college.

Figure 5.3

Trends in Gatekeeper English and Gatekeeper Math Completions Among All Students, 2003–2009: Two-Year Outcomes for the Washington ATD Colleges





SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. Gatekeeper course completion estimates for the 2009 cohort at WA-B consist of only one year of data.

Persistence and College Completion

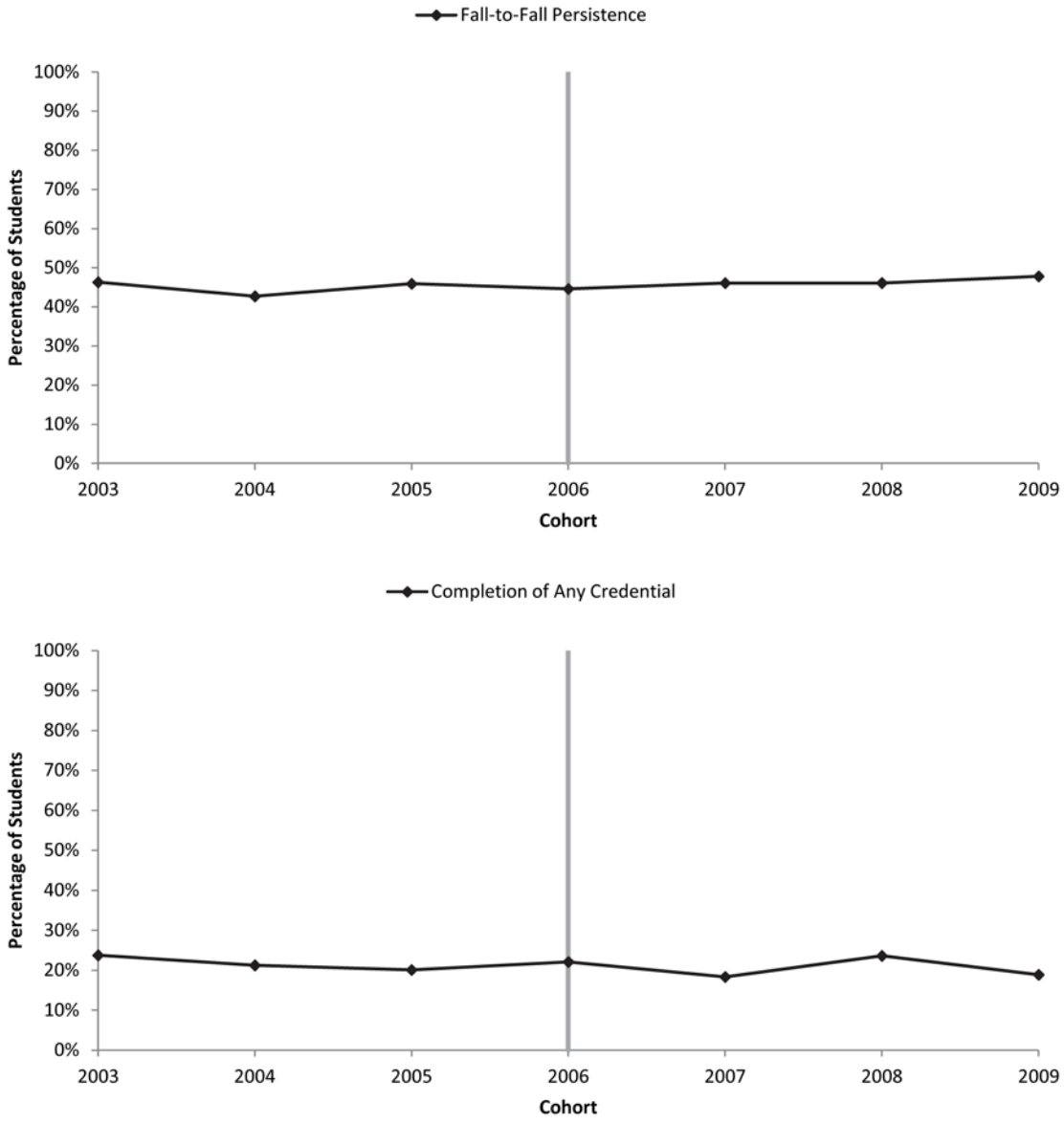
Figure 5.4 shows the final two outcomes considered in this chapter: persistence and completion. The top panel shows the percentage of each cohort persisting into the fall semester following entry. In the pre-initiative period, the percentage of students persisting from fall to fall oscillated between 43 percent and 46 percent. After ATD implementation, the trend slowly increased. By the 2009 cohort, about 48 percent of the cohort persisted into the subsequent fall.

As noted in the conclusion to Chapter 3, the analysis of strategies suggests that impacts on student outcomes were most likely to be observed in possible greater advancement to gatekeeper courses and in improved retention. The trend lines in Figures 5.2 and 5.3 do not suggest that students, on average, were making greater progress through the developmental sequences and gatekeeper courses, but Chapter 3 also suggested that this finding may be related to issues of scale. The top panel of Figure 5.4, however, is more positive. The improvements are marginal but would be encouraging if they are due to reforms at the colleges. It is important, however, to be cautious with these interpretations. Just as the decreasing trends for the gatekeeper courses do not suggest a negative impact due to the initiative, the increasing trend for fall-to-fall retention may have other causes.

Finally, the bottom panel of Figure 5.4 shows the percentages of students who completed any credential within two years, averaged across the six colleges. Here, the trend line oscillates between 18 percent and 24 percent. As with the other outcomes, the post-initiative trend does not differ significantly from the pre-initiative trend.

Figure 5.4

Trends in Fall-to-Fall Persistence and Completion of Any Credential Among All Students, 2003–2009: Two-Year Outcomes for the Washington ATD Colleges



SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. WA-B was excluded from the fall-to-fall persistence trend due to lack of data. The estimate for completion of any credential for the 2009 cohort at WA-B consists of only one year of data. The 2009 cohort at WA-C is not included in the fall-to-fall estimate due to missing data.

Subgroup Trends in Student Outcomes Among the Colleges

An important goal for ATD colleges is the reduction of achievement gaps based on students' race and economic status, and it is useful to know if some colleges have made greater strides in comparison to others. Our analyses suggest that on some measures the achievement gap lessens over students' academic careers at the Washington colleges, at least when disaggregated by economic indicators. This was true during both the pre-initiative and initiative periods, and we did not find evidence that implementation of Achieving the Dream caused these changes or otherwise reduced achievement gaps based on race or economic status.

Figure 5.5 shows the percentages of students referred to developmental English and developmental math by Pell grant status, an indicator of low-income status. The top panel shows that low-income students generally entered college in greater need of developmental education in English than did higher income students. The solid line shows the percentages of Pell grant students and the dashed line shows the percentages of non-Pell grant students. The percentage of Pell grant students referred to developmental education in English moves up and down over the study period, but is consistently higher than the percentage of non-Pell grant students. Likewise, the bottom panel shows that Pell grant students are consistently referred to developmental math at higher rates in comparison to non-Pell grant students.

Figure 5.6 shows the percentages of students who completed gatekeeper courses in English and math, disaggregated by Pell grant status. In contrast with the higher rates of developmental education referral for Pell grant students, Figure 5.6 shows that Pell grant students tended to complete gatekeeper courses at least as frequently as non-Pell grant students. The top panel shows that Pell grant students generally passed gatekeeper English at similar or higher rates when compared with non-Pell grant students. The bottom panel shows that Pell grant students consistently passed gatekeeper math at about the same rate as non-Pell grant students.

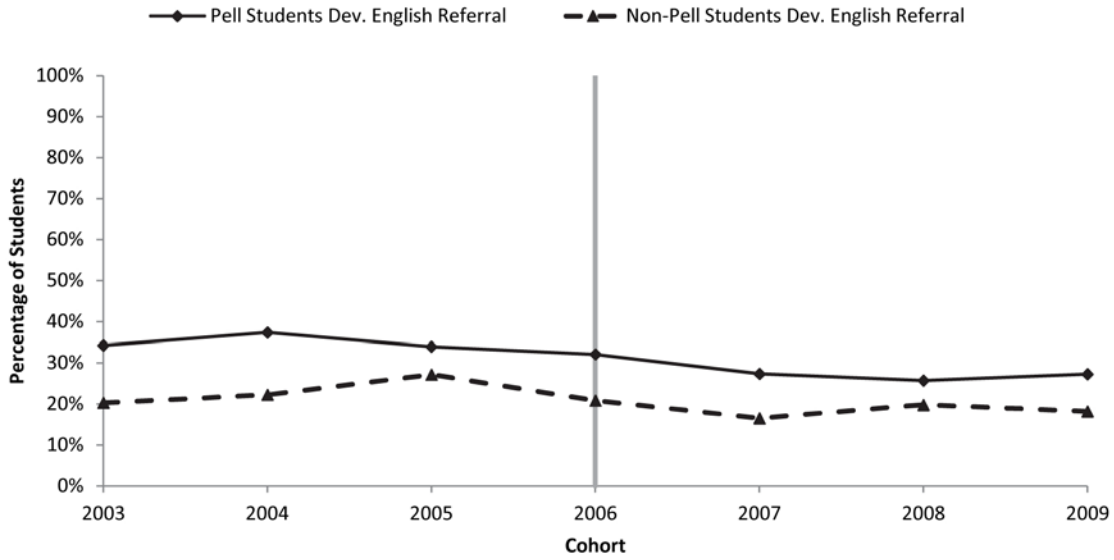
Figure 5.7 shows the percentage of students who persisted from fall-to-fall and who completed any credential within two years, both disaggregated by Pell grant status. The top panel shows that, in fact, Pell grant students appear to have had higher retention rates than non-Pell grant students, a relationship that also appeared in analyses of Round 1 Achieving the Dream colleges (Rutschow et al., 2011). The bottom panel suggests that graduation in two years for Pell grant students is usually very close to the completion rate for non-Pell grant students. Given that Pell grant students, on average, enter college less prepared than non-Pell grant students, these could be encouraging findings. It may also be true, however, that students with stronger intentions to stay in school are more likely to apply for and receive Pell grants. At the

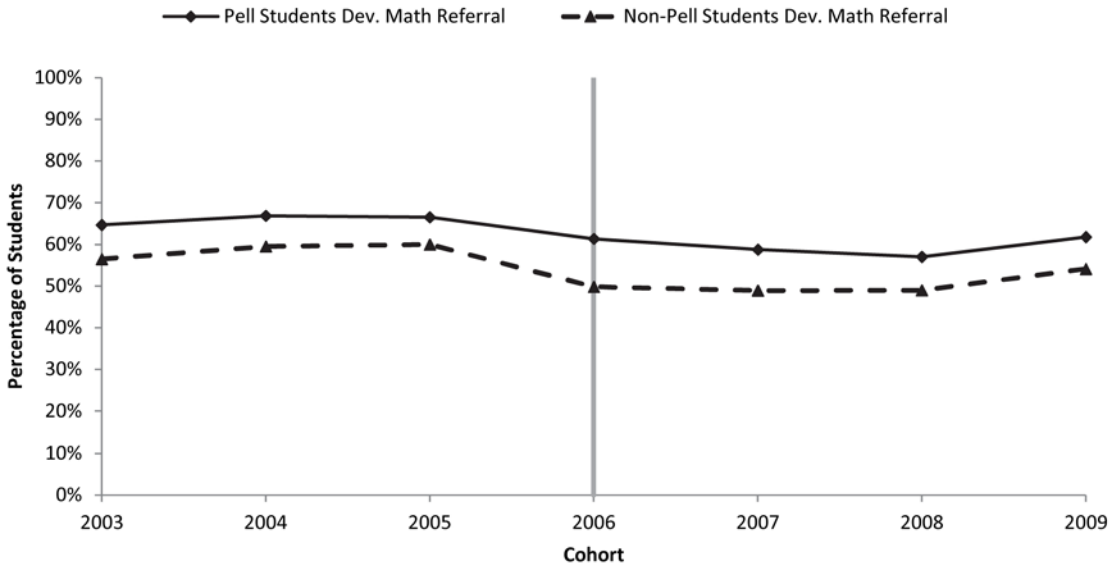
Washington colleges, Pell grant students are also more likely to attend full time, which may indicate a greater likelihood to persist.

This evaluation also examined outcome trends for the colleges individually; we did not find evidence of greater gains associated with Achieving the Dream for some colleges compared with others. Appendix D provides figures for individual colleges that compare average post-initiative outcomes to average pre-initiative outcomes for each.

Figure 5.5

Trends in Developmental English and Developmental Math Referrals Among All Students by Pell Grant Status, 2003–2009: Two-Year Outcomes for the Washington ATD Colleges



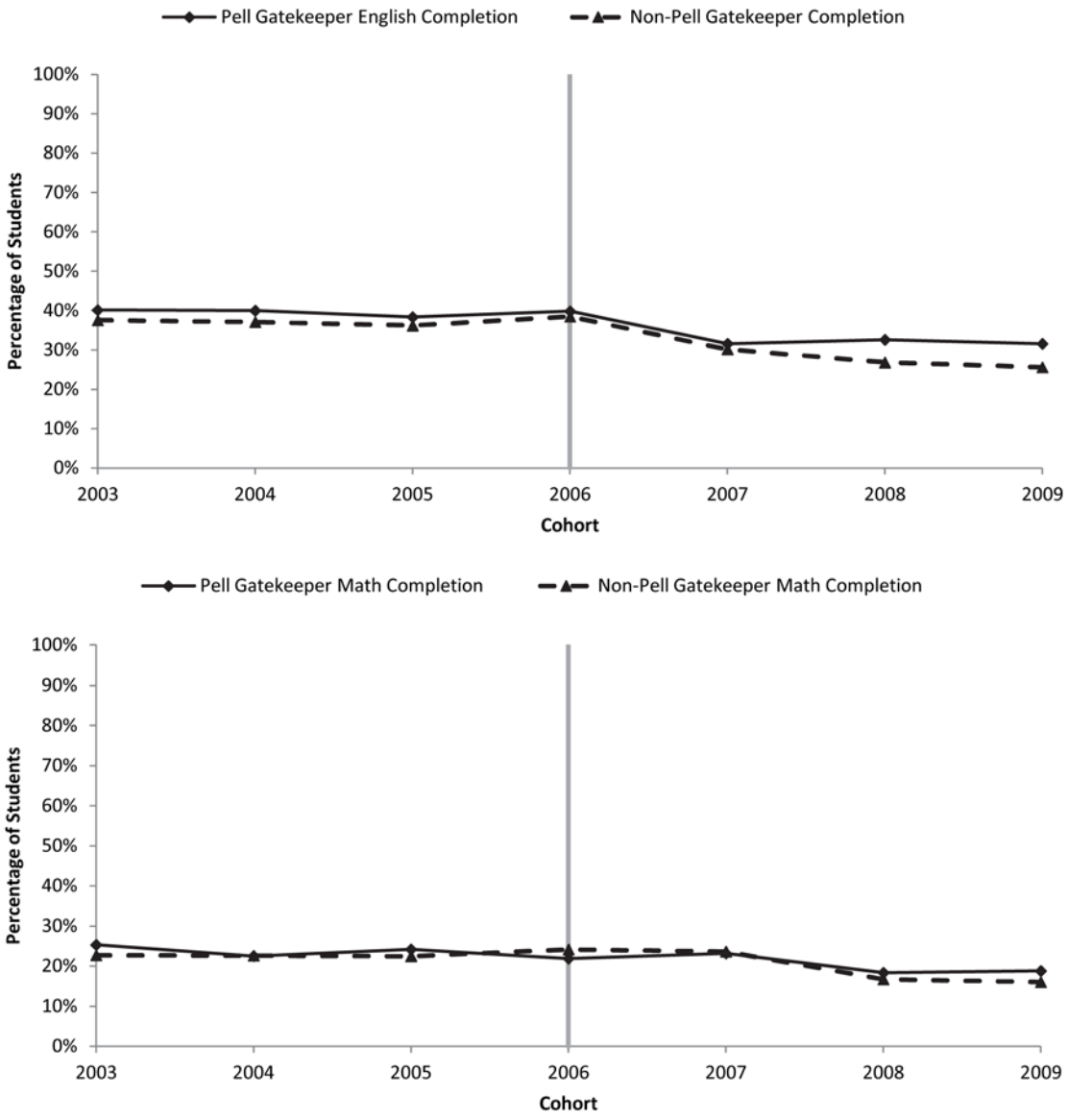


SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. WA-B and WA-D were excluded from the English developmental trend due to lack of data; WA-B was excluded from the math developmental trend due to a lack of data.

Figure 5.6

Trends in Gatekeeper English and Gatekeeper Math Completions Among All Students by Pell Grant Status, 2003–2009: Two-Year Outcomes for the Washington ATD Colleges



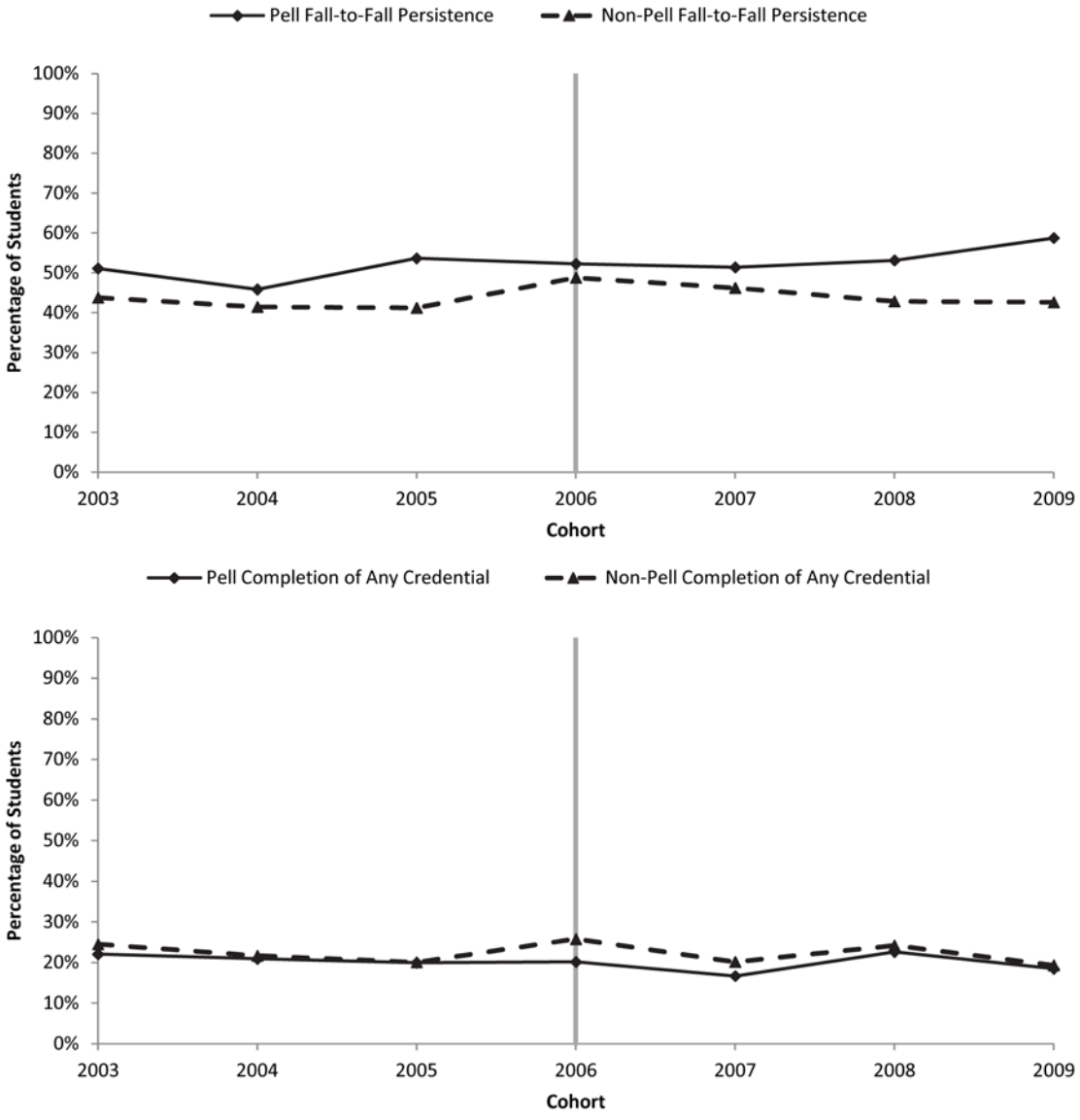
SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. Gatekeeper course completion estimates for the 2009 cohort at WA-B consist of only one year of data.

Achieving the Dream Colleges in Washington State

Figure 5.7

Trends in Fall-to-Fall Persistence and Completion of Any Credential Among All Students by Pell Grant Status, 2003–2009: Two-Year Outcomes for the Washington ATD Colleges



SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. WA-B was excluded from the fall-to-fall persistence trend due to lack of data. The estimate for completion of any credential for the 2009 cohort at WA-B consists of only one year of data. The 2009 cohort at WA-C is not included in the fall-to-fall estimate due to missing data.

Implications of the Outcomes Trends Analyses

The student outcomes analyses described here evaluate whether Achieving the Dream produced large changes in student outcomes at the institutional-level — the primary goal of the initiative. The evaluation was designed to answer this question but not to detect smaller changes, or even large changes affecting small groups of students. Given how implementation proceeded, however, rigorous methods that can detect smaller scale changes may be more appropriate for future evaluations.

The analyses in this chapter do provide a unique look at outcomes trends for seven cohorts of students in the six ATD colleges in Washington. The average trends are consistent with the findings described in previous chapters. In general, at least during the period for which we have data, the colleges' strategies did not reach a sufficiently large number of students to allow detection of changes in institution-wide outcomes, averaged over the six colleges. This does not mean, however, that the strategies have not been effective at a smaller scale. There are trends that suggest broader change in a positive direction, but they must be considered in light of some potentially negative trends in other areas. More broadly, the trends described here show where the colleges are doing well, and where they are most in need of improvement.

Chapter 6

Enhancing the Impact of Achieving the Dream in Washington State and Beyond

This report has examined the Achieving the Dream work of six Washington State two-year public colleges in the first five years after they joined the initiative in 2006. It is part of an overall evaluation of Achieving the Dream funded principally by Lumina Foundation for Education, with additional support from College Spark Washington and other funders. It provides a follow-up to a spring 2008 study of the early progress of the Washington State and Pennsylvania ATD colleges conducted by CCRC and MDRC (Jenkins et al., 2009), assessing the progress that the Washington ATD colleges have made since then. It also compares the progress of the Washington colleges in building a culture of evidence with that of the first round of 26 colleges to join the ATD initiative in 2004.

In this concluding chapter, we summarize our findings about the progress that the Washington colleges have made in building a culture of evidence and implementing strategies to improve student success. We specifically examine Achieving the Dream's influence on the colleges' organizational practice; the perceptions of college leaders, faculty, and administrators about the benefits of participating in the initiative; their views on the usefulness of the assistance provided by the initiative; and other factors that motivated the colleges to increase the use of evidence for improving student outcomes.

Progress of the Washington Colleges in Implementing Systemic Reforms

Comparing the Washington ATD colleges with the Round 1 colleges was of particular interest to Lumina Foundation and other funders that wanted to see if the Washington colleges, having joined the initiative two years after it began, would progress faster than the colleges that joined in the first round.

As reported in Chapter 2, while it is difficult to compare the six Washington colleges with the 26 Round 1 institutions, it does seem that the Washington colleges, as a group, went at least as far in building a culture of evidence as the Round 1 colleges. All but one of the Washington colleges made progress in implementing the ATD culture of evidence principles. Two of them, which early in the initiative had only begun to implement practices consistent with the ATD principles, made very substantial progress later. In fact, we rated four of the six Washington colleges as having implemented the ATD principles at a high level five years after they joined ATD. In comparison, only 11 of the 26 Round 1 colleges (42 percent) implemented

most of the practices associated with a strong culture of evidence by the end of their five-year ATD implementation period. As discussed in Chapter 4, based on the survey we conducted at the Washington colleges early in their ATD participation and then again near the end of the initial five years, we found only modest increases in the use of data by faculty and administrators. However, the largest increases were among colleges that made the most progress in implementing culture of evidence principles.

In Chapter 3 we cited the finding from the MDRC–CCRC report on the Round 1 colleges that most of the strategies they had implemented for improving student success were small in scale (Rutschow et al., 2011). By the end of the five-year period, less than a third (31 percent) of the strategies were larger scale (reaching at least 25 percent of the target population), and those strategies tended to be less intensive. The Washington colleges implemented fewer strategies on average, and while the majority were smaller in scale, more than 40 percent were implemented on a larger scale.

The MDRC–CCRC report on the Round 1 colleges highlighted the issue of the scale of strategies for improving outcomes, arguing that they were unlikely to be effective unless they were implemented at scale. As a result, in this study of the Washington ATD colleges, we took a closer look at how colleges that implemented strategies at scale were doing so. We saw efforts among some of them to redesign programs and services at scale rather than make attempts to bring small interventions to scale. For example, one college redesigned its entire intake and advising system to help first-time students choose a program of study and complete a substantial number of requirements in their chosen program within the first year. Another created an ESL transition center to help adult basic skills students secure financial aid and other supports they needed to advance to college-level coursework. The math department in that same college restructured the developmental sequence in math following the Carnegie Foundation for the Advancement of Teaching's Statway model to make instruction more relevant to students' specific academic pathway.

Only about a quarter of the strategies implemented by the Round 1 colleges involved changes to instruction as opposed to student services or academic support; in contrast, about 40 percent of the reforms implemented by the Washington colleges involved changes to curricula or teaching methods. At two of the Washington colleges, faculty led successful efforts to spread instructional innovations across departments in their institutions.

As a group, the Washington colleges made progress in building a culture of evidence, and some of them were beginning to implement more large-scale or systemic changes in programs, instruction, and support services. Many strategies, however, were still reaching a relatively small proportion of students. Consequently, it simply may be too early to expect large-scale improvements in student success. As with the Round 1 colleges, our analysis of

trends in the ATD measures of student progress and completion did not reveal clear patterns of improvement for the Washington colleges since they first joined ATD. Some strategies, however, may have improved outcomes on a smaller scale than evaluated here.

While we did see promising changes in practice among the Washington colleges, the major changes in instruction and student services were confined to a subset of the colleges, and even in them the changes were in their early stages. The major changes in student services practices were implemented by WA-C, which revamped its intake and advising process to help students get into a program of study as soon as possible. WA-D and WA-E both revamped their new student orientation processes, but left the rest of the advising and other services for new students mostly unchanged. WA-A established a new center to help adult basic skills students transition to college but did not change intake for college-level students. It is important to note that the performance measures we examined in the trend analysis in Chapter 5 did not include measures of the rate at which adult basic skills students transitioned to college.

On the instructional front, as described in Chapter 4, WA-A revamped its developmental math curriculum to better align with students' programs of study. These changes were not fully implemented until spring 2010 and thus are fairly new; yet according to the college, one year later 75 percent of the roughly 3,000 developmental math students served annually had gone through the new sequence. Training of faculty at WA-B in the Reading Apprenticeship program began in late 2009, and by spring 2011 training had been provided to over 130 faculty members who teach nearly 40 percent of all students at the college. On the one hand, this percentage reflects an impressive level of participation; on the other, it shows that training substantial numbers of faculty in new approaches takes time. Even after two years, the majority of faculty had not been trained and no formal assessment had been done on how much those who received training actually used the program in their classes. The efforts to train faculty in the University Design for Learning (UDL) at WA-C focused on instructors in developmental and gatekeeper courses, but as of spring 2011 the majority of the college's faculty had not received UDL training. The changes to instruction implemented by the other three colleges were even smaller in scale.

So, while the Washington colleges as a group are on the right track in focusing more of their efforts on systemic reforms that could affect a substantial number of students, at most of them these changes were still in relatively early stages. Moreover, among the colleges that have implemented reforms at scale, most have done so rather recently — and mostly after the period for which we have data on trends in student outcomes (which went through the 2009 academic year.) Changing practices at scale across the various phases of the student experience takes time, particularly in organizations as complex as community colleges and in the absence of strong incentives to change.

In the five years after they joined the ATD initiative, four of the six Washington colleges had laid the groundwork for systemic reforms in instruction and student services and begun implementing them. Respondents at all of the colleges indicated that their institutions benefited from participating in ATD, whether by helping them build their institutional research capacity, develop a more systematic approach to developing student success strategies, or aligning student completion strategies on campus.

Benefits of Participation in Achieving the Dream

We asked those we interviewed at the colleges what they saw as the main benefits of participating in ATD. Respondents from five of the six colleges indicated that they were doing things differently as a result of participating in ATD; only one college (WA-F) indicated that ATD has not had an impact on practice at the college. Table 6.1 presents the main benefits and indicates the number of colleges mentioning each.

Table 6.1

Perceived Benefits of ATD for Organizational Practice at the Washington Colleges

Type of Benefit	Specific Benefit	Number of Colleges
Institutional Research and Data Use	• Greater access to data and stronger capacity to use data in decision-making processes	5
	• Increased use of data to improve college programs and policies	4
	• Use of data for greater transparency in resource allocations/budget decisions	2
	• Strengthened grant writing capacity	2
Student Success Strategies	• Systematic approach to developing strategies based on student outcomes data	4
	• Impetus to develop/expand strategies	2
Initiative Alignment	• Synergy with new accreditation process and with WA Student Achievement Initiative	6

Respondents at five of the six colleges indicated that their organization benefited from increased access to and use of data and research on student outcomes. Three colleges — WA-B, WA-D, and WA-E — reported that one benefit of increased IR capacity was a strengthened

capacity to pursue grant funding. As the vice president for instruction at one college said, "State funding is being cut. The college is more dependent on grant funding, and grants increasingly need to be supported with evidence." This administrator and the president of WA-D also emphasized that by helping the colleges increase their IR capacity, ATD has enabled them to make budget allocation decisions in a way that is perceived as more transparent and fair. This has been especially useful in a time of dramatic cuts in state funding.

Three of the colleges — WA-A, WA-C, and WA-D — credited their participation in ATD with strengthening the process by which they identify ways to improve programs and services, and specifically by improving the quality of data for making decisions about what to improve and how. All six colleges said that ATD helped them better align efforts to improve student completion, particularly those related to meeting the new accreditation standards.

The Value of Achieving the Dream Assistance

Leadership Coach and Data Coach

Table 6.2 summarizes our assessment, based on interviews at the colleges, of the perceived usefulness of the ATD leadership coaches and data coaches (or data facilitators).

Table 6.2

Perceived Usefulness of ATD Leadership and Data Coaches at the Washington Colleges

College	Leadership Coach	Data Coach
WA-A	Low	High
WA-B	High	High
WA-C	High	High
WA-D	High	Medium
WA-E	Low	Low
WA-F	Medium	Medium

Two of the colleges found their leadership coach and data coach to be very useful. WA-B viewed its leadership coach and data coach as a team and had good rapport with them both. The college's IR director in particular found them especially useful in advising him on the various analyses he was conducting to support the ATD efforts and broader student success

work at the college. College administrators said they would only continue participating in ATD beyond the initial five years if they could have the same coaches. There was broad agreement among those we interviewed at WA-C that the both the leadership coach and the data coach challenged the college to improve and, as one respondent said, "kept us accountable." In the last couple years, both have sought to focus college leaders on figuring how to sustain both successful strategies and the overall work on improving outcomes after the initial five years in ATD.

Respondents at WA-D were generally positive about their coaches and agreed that they asked good questions and held the college accountable. Several respondents said that the coaches helped overcome the president's skepticism about data and convinced the president to champion evidence-based decision making at the college. Staff in the college's Office of Institutional Effectiveness said that while the data coach was helpful on overall strategy for increasing access to useful information, they would have liked to have more help on the technical issues they confronted as they sought to build an IR function at the college from scratch.

Those we interviewed at WA-A were united in saying that the college's data coach was very useful. Respondents said that the data coach helped frame the data analyses by asking the right questions and facilitate the process of inquiry and discussions of data by the college's Achieving the Dream project team. At least one respondent referred to the data coach as "invaluable." College leaders were enthusiastic about continuing to work with that coach. The college found the leadership coach less helpful, saying that the coach did not understand the college's culture and was more accustomed to a top-down approach to decision making and management.

ATD project staff at WA-F were generally positive about both the coaches. However, the IR director expressed some frustration that they asked for data the college could not easily access. Some faculty we interviewed complained that the leadership coach and data coach pressured the college to show results, and as a consequence some of the interventions tried were evaluated too quickly, before the faculty implementing them had time to work out the bugs.

The leadership coach and data coach for WA-E did not seem to be a good fit for the college. Project staff said that they were more focused on strengthening the college's data systems than on the big picture. The IR staff said that the data coach was not responsive to queries when he/she was not on campus for a site visit. Student services staff members hoped they would do more to push the college leadership to focus on gaps in achievement of Hispanic students and to make more substantial changes.

Strategy Institutes

Most of those who had attended at least one ATD Strategy Institute had positive opinions, saying that they were good venues for networking with other colleges engaged in similar work and a useful source of new ideas. At least one of the college reported using strategies introduced at a Strategy Institute.

An academic vice president from one college said that the Strategy Institutes were more useful when the colleges were first learning about the ATD approach, though later Institutes provided a good introduction to the ATD philosophy for new hires. The IR director from another college agreed that they were more helpful initially as the college was learning the ATD approach and suggested that there should be more opportunities for experienced colleges to interact and learn from one another "on advanced topics." A faculty member at another college said that there was too much focus on data and not enough on instruction at the Institutes. The president of yet another college argued that ATD needs to find a "structured and accessible" way for colleges to learn from each another in addition to the annual Strategy Institutes.

Other Influences on Organizational Change

In our interviews at the colleges we sought to get a sense of how much the changes in organizational practice we observed were a result of the college's participation in ATD as opposed to some other factors.

Respondents at every college said that, in addition to Achieving the Dream, the impetus for making these changes came from new accreditation standards established by the Northwest Commission on Colleges and Universities, which required colleges to set measureable goals for improving student outcomes, use evidence for decision making, and continuously improve programs and services. Our interviews at WA-C and WA-D indicated that participating in ATD allowed the colleges to respond to the new accreditation requirements much more easily.

Respondents at at least two of the colleges—— WA-A and WA-B — also mentioned the influence of the Student Achievement Initiative (SAI), a state performance funding system through which colleges receive incentive funding for increasing the rate at which students reach key achievement points.[15] This was particularly the case at WA-A, where faculty not involved with ATD conflated ATD with SAI.

Our assessment is that ATD had the greatest impact on organizational practice at WA-C and WA-D. WA-A and WA-B also made substantial changes in practice during this period that

[15] For more information, see the State Board for Community and Technical College's website: http://sbctc.edu/college/e_studentachievement.aspx. See also the reports on Washington State's Student Achievement Initiative by Jenkins, Ellwein, and Boswell (2009) and Shulock and Jenkins (2011).

were consistent with the ATD model. Interviews at WA-A suggest that ATD provided a framework and approach to making the changes in practice that the college believed were necessary to meet the new requirements of accreditation and the Student Achievement Initiative. Administrators at WA-B also said that ATD helped the college build its data capacity, but accreditation and the cuts in state funding provided the main impetus for these changes.

Lessons for Other Colleges

Encouraged by the accomplishments of the initial six ATD colleges in the state, in 2011 College Spark Washington provided funding for an additional ten two-year colleges to join Achieving the Dream. College Spark recognizes that the new colleges have a lot to learn from the initial six and has asked the experienced colleges to coach the "rookies."

Based on our in-depth analysis of the experience of the six original Washington ATD colleges during their first five years in the initiative, we highlight several lessons for the new Washington ATD colleges and others elsewhere seeking to implement similar reforms.

Redesign Programs and Supports at Scale

Research on high performance organizations both in and outside of education indicates that improving organizational performance generally requires systemic changes in practice. High-performing organizations continually review and, as necessary, redesign their practices to ensure that they are well aligned to achieve organizational goals. Some of the six Washington ATD colleges ended the planning year with long lists of relatively small interventions they intended to implement as part of the initiative. As they began implementation, however, they decided instead to focus on a smaller number of efforts that could be implemented at scale. So, for example, WA-C redesigned its entire intake and advising system to help students choose and enter a program of study quickly, and WA-A restructured its developmental and college-level math sequences to better align with students' intended programs.

Of course, small-scale piloting and evaluation are often appropriate. However, colleges should not waste valuable resources testing approaches that are unlikely to be scalable or sustainable over time with their existing operating resources. Moreover, it is not enough to scale discrete innovations. Instead, colleges need to rethink how innovations fit within their overall policies and practices in a given area and how they might need to be redesigned or restructured to better achieve the desired outcomes with existing resources.

Involve Faculty From the Start in Leading Efforts to Rethink Curriculum and Instruction

Community colleges are unlikely to see substantial improvements in student completion and learning unless there are major changes in classroom practice. Classroom practices are not going to change unless the faculty are convinced of the need to make changes and are supported to explore possibilities and then implement the most promising. It is critical, therefore, for colleges seeking to improve programs and instruction to involve faculty from the start in leading reforms. WA-A, the Washington college that succeeded in making the largest change to instructional practice — completely revamping its developmental mathematics curriculum — benefited from a history of faculty-level innovation and "bottom-up" decision making at the institution. The widespread adoption of the Reading Apprenticeship program for improving students' understanding of texts at WA-B was spearheaded by a group of faculty as a grassroots effort that, if not initiated exactly as a protest against the perceived top-down approach first taken by the college in managing ATD, nevertheless was seen by faculty as a contrast to it. Similarly, faculty at other colleges also led efforts to improve instruction, although perhaps with not as much success as the two examples described here.

Colleges that want to engage faculty in reforms should do so at the outset, being clear about the desired goals, but empowering them to decide, in conjunction with their student support services colleagues, how best to achieve the goals. Colleges should also support the spread of innovative practices by providing the infrastructure and opportunities for faculty and staff across the institution to share their knowledge and experience.

Strengthen Pathways Into and Through Programs of Study

As discussed in Chapter 4, efforts by the Washington ATD colleges to redesign programs and services were mostly confined to the intake process and developmental education. Over time, as the colleges succeed in implementing these reforms at scale, we hypothesize that the changes will lead to improved success in developmental courses and progress toward college-level gatekeeper courses. As we pointed out in Chapter 5 on the trend analysis, most of these reforms were implemented at scale after 2009, so their effects are not likely to be reflected in the data we have on student progress, which only extend to the 2009 first-time fall cohort. In the longer term, however, without systemic changes to colleges' academic programs, we do not see how "front-end" reforms of the sort mainly implemented by the Washington colleges alone can substantially increase student completion and success.

Research suggests that a similar systemic reform may also need to be applied to college-level programs to ensure that they are well structured and aligned with

requirements for success in further education and, for career-technical education programs, employment. Among the Washington colleges, however, the focus of instructional reforms was on improving student success in developmental education and introductory college-level math and English. Far less attention was paid to improving student readiness and success in other introductory college courses that serve as gatekeepers to programs in other fields such as social and behavioral sciences, biological and physical sciences, and business. On exception that should be noted was the Reading Apprenticeship work at WA-B, which involved faculty across disciplines, including those in career fields.

Taking steps to strengthen programs of study in career fields would have the additional effect of broadening involvement by faculty in areas other than English, math, and developmental education in colleges where it is a separate department. Colleges also need to strengthen the mechanisms for helping students choose from among the many programs offered. The work by WA-C to restructure the intake and advising functions, to help students choose a program and earn college credits in it as soon as possible, offers a promising model.

Support Efforts to Improve Instruction Using Program and Course Learning Outcomes

One way to ensure that programs are well structured and aligned with outcome requirements is to support faculty to develop learning outcomes standards for courses and programs, assess students' mastery of these outcomes, and use the results to improve instruction. This was one of the observations of the MDRC–CCRC report on the five-year progress of the Round 1 colleges (Rutschow et al., 2011). Compared with the Round 1 colleges, the Washington colleges as a group devoted more energy to improving instruction. As noted, however, most of these efforts were focused on English and mathematics. Promoting the development and use of learning outcomes would help increase involvement of faculty in improvement efforts across program areas.

The survey results discussed in Chapter 4 did not show a substantial increase in any of the Washington colleges during their initial involvement in ATD in the extent to which faculty participated in discussions related to improving student outcomes. The survey also found little evidence of an increase in the use by faculty of student learning measures other than grades. The survey did show that the extent to which faculty used data for improvement was based on the policies and practices of their department; they were less influenced by the policies and practices of the central college administration. This finding is consistent with the fact that decision making on instruction in community colleges tends to be decentralized, with policies

that affect the classroom practice typically set at the department or division levels. So, to change instructional policy and practice, colleges will need to engage deans and department chairs (and not just faculty members) more extensively than did the Washington ATD colleges.

Use a Common Set of Performance Measures to Focus Strategy Development and Promote Sharing

As reported in Chapter 2, each of the Washington colleges has developed clear goals for student success with accompanying metrics, spurred in part by the new accreditation standards of the Northwest Commission on Colleges and Universities that emphasize the use of metrics and evidence in planning and improvement. While some of the colleges have borrowed from ATD performance measures, none has adopted them as a set. Moreover, to our knowledge, none of the colleges focused much attention on their performance according to the ATD metrics, instead focusing on their own measures.

While it makes sense for colleges to adopt their own performance measures, from the standpoint of ATD it is problematic that there is not a common set of metrics that colleges across the initiative recognize and pay attention to. Unless colleges focus their reforms on particular metrics, it is unlikely that they will develop innovations that will improve their performance on those metrics. Also, without shared performance measures across colleges, it is difficult for the initiative and colleges participating in it to identify colleges that do improve their performance.

Therefore, we recommend that Achieving the Dream encourage colleges across the initiative to adopt a common set of performance measures for use in developing and examining the effectiveness over time of their own strategies and in comparing colleges on particular measures for the purpose of identifying those that have improved their performance over time. One advantage of focusing on improving performance on institution-level aggregate measures is that colleges will be encouraged to make systemic changes involving multiple, coordinated changes in policy and practice aimed at benefiting large numbers of students instead of pursuing small-scale programmatic interventions that have little chance of improving outcomes on a substantial scale.

We suggest that all the Washington State ATD colleges (both the original six and the ten new institutions) consider using the longitudinal cohort measures developed by the Research and Planning Commission for the Governance Institute for Student Success (GISS) meetings for trustees and presidents that were described in Chapter 2. The fact that these measures were developed by the Research and Planning Commission, which is comprised of institutional research staff from each college, might give them credibility across the system. The measures make use of the Student Achievement Initiative data reported by each college to the State Board

for Community and Technical Colleges and thus could be readily calculated and updated by college on a regular basis.

Looking Ahead

Making systemic changes in practice in the ways that most of the original Washington State ATD colleges already have already begun to do and in the other ways recommended here requires resources — for new and strengthened information systems, for professional development and training, and for coordination. The Washington ATD colleges have shown that even during a period of dramatic cuts in funding, they have been willing to make major changes in practice. They have done so by reallocating their scarce resources from practices that are not effective to those that are believed to be so. The strong commitment to student success of these colleges, combined with the interest of other colleges in the state in joining ATD and the willingness of College Spark and Lumina Foundation to support them, makes us optimistic that Washington's community and technical colleges, along with the State Board for Community and Technical Colleges, will find ways in this difficult economic climate to make changes that are necessary to improve student outcomes.

Appendix A

Framework for Measuring College Progress in Implementing the ATD Culture of Evidence Model

The following is the framework for the interview protocol used in the field research. It is based on the one used in the baseline field research on the Washington ATD colleges and is essentially the same as the framework used in the second wave of field research on the first round of colleges to join the initiative. Using the same framework made it possible to assess the progress over time of the Washington colleges and to compare the extent to which they adopted the ATD culture of evidence model with that of the Round 1 colleges.

Framework for Measuring College Progress in Implementing the ATD Culture of Evidence Model

	Related ATD Principle	Ratings of College Progress	1 = little or none… 5 = high level/ a lot
OVERALL ASSESSMENT OF COLLEGE'S PROGRESS IN ACHIEVING THE DREAM			
Effect of Achieving the Dream			
		College's progress toward institutionalizing the ATD "culture of evidence" model of institutional effectiveness	
		Extent to which college sought to/succeeded in improving equity of achievement by race/ethnicity and income groups	
		Overall impact/value added of Achieving the Dream	
Sustainability of Achieving the Dream			
		The college expects that its "culture of evidence" will continue after ATD is over	
		The college expects to continue a majority of its strategies after ATD is over	
Overall Successes and Challenges with Achieving the Dream			
		Level of successes with Achieving the Dream	
		Level of challenges with Achieving the Dream	
		Success/impact of Achieving the Dream strategies	
Usefulness of Achieving the Dream Inputs			
		Coach and Data Facilitator	
		Coach was helpful to college's efforts to build a culture of evidence and improve student success	
		Data facilitator was helpful to college's efforts to build a culture of evidence and improve student success	

Framework continued on the next page

	Related ATD Principle	Ratings of College Progress	1 = little or none… 5 = high level/ a lot
		Meetings and Conferences	
		Strategy Institute was helpful to the college's efforts to build a culture of evidence and improve student success	
		Other ATD events were helpful to the college's efforts to build a culture of evidence and improve student success	
		ATD Grant	
		The role that the $400K grant from ATD played in the college's efforts to implement ATD reforms	
		IMPLEMENTATION OF ATD PRINCIPLES	
		PRINCIPLE 1: COMMITTED LEADERSHIP	
		VISION AND VALUES (1.1) AND COMMITMENT (1.2)	
		PRESIDENT	
	1.1a	President's support for a focus on improving student success	
	1.1b	President's awareness of and commitment to improving achievement gaps for students of differing racial/ethnic and income groups	
	1.2b	President's involvement in implementing Achieving the Dream goals at the college	
		Effect of ATD on president's commitment and vision for student success	
		SENIOR LEADERSHIP (VPs, Deans)	
	1.1a	Senior leadership's support for a focus on improving student success	
	1.1b	Senior leadership's awareness of and commitment to improving achievement gaps for students of differing racial/ethnic and income groups	
	1.2b	Senior leadership's involvement in implementing Achieving the Dream goals at the college	
		Effect of ATD on senior leadership's commitment and vision for student success	
		BOARD	
	1.2a	Board's awareness and support for improving student success	
	1.2a	Board's exposure to reports on student outcomes	
		Effect of ATD on Board's awareness of/support for improving student success	

Framework continued on the next page

	Related ATD Principle	Ratings of College Progress	1 = little or none… 5 = high level/ a lot
		FACULTY AND STAFF	
	1.2c	Faculty leaders' (e.g. department/division heads) support for improving student success	
	1.2c, 3.1	Faculty and staff involved in ATD support for improving student success	
	1.2c, 3.1	Faculty and staff NOT involved in ATD support for improving student success	
		COMMUNICATION	
	1.1c	The college's internal communication about improving student success	
	1.1c	The college's external communication about improving student success	
		PRINCIPLE 2: USE OF EVIDENCE TO IMPROVE, POLICIES, PROGRAMS, AND SERVICES	
		IR AND IT CAPACITY (2.1)	
	2.1a	IT's ability to meet the demands for data and institutional research	
	2.1b	Integrity of policies/practices used to collect and securely store data	
	2.1c	IR's ability to meet the demands for data and institutional research	
	2.1d	IR's involvement in educating faculty and staff on research and data analysis	
		Effect of ATD on increasing IR capacity	
		Effect of ATD on college's respect/need for IR	
		PROCESS FOR IDENTIFYING ACHIEVEMENT GAPS (2.2)	
	2.2a	Longitudinal data on student outcomes collected and analyzed	
	2.2b	Data disaggregated for different student groups (e.g. age, race, gender, etc.)	
	2.2c	Surveys, focus groups, and other qualitative data collected and analyzed	
		Effect of ATD on college's overall data collection and analysis	
		Effect of ATD on college's overall awareness of achievement gaps	

Framework continued on the next page

	Related ATD Principle	Ratings of College Progress	1 = little or none… 5 = high level/ a lot
		PROCESS FOR FORMULATING AND EVALUATING SOLUTIONS (2.3)	
	2.3a	College involves larger campus community in reviewing data on student outcomes.	
	2.3b	College uses data on student outcomes to develop or refine policy and strategies.	
		Effect of ATD on college's use of data to improve programs and policies	
		PRINCIPLE 3: BROAD ENGAGEMENT	
		FACULTY AND STAFF (3.1)	
	3.1a	Faculty's involvement in examining program data and developing strategies	
	3.1b	Faculty's use of research to assess programs and teaching	
	3.1c	Part-time/adjunct faculty's involvement in efforts to improve student success	
	3.1d	Student services staffs' use of research on effective practice to assess programs and strategies	
	3.1e	Collaboration between student services and faculty/instructional staff	
		Effect of ATD on faculty's involvement in efforts to improve student success	
		Effect of ATD on PT/adjunct faculty involvement in efforts to improve student success	
		Effect of ATD on student services involvement in efforts to improve student success	
		Effect of ATD on the collaboration between student services and faculty	
		STUDENTS AND EXTERNAL STAKEHOLDERS (3.2)	
	3.2a	Students' involvement in efforts to improve student success	
	3.2b	Colleges' attempts to bring in external stakeholders in efforts to improve student success	
		Effect of ATD on students' involvement in efforts to improve student success	
		Effect of ATD on colleges' attempts to involve external stakeholders in efforts to improve student success	

Table continued on the next page

	Related ATD Principle	Ratings of College Progress	1 = little or none… 5 = high level/ a lot
PRINCIPLE 4: SYSTEMIC INSTITUTIONAL IMPROVEMENT			
		INSTITUTIONAL MANAGEMENT (4.1)	
	4.1a	College has a strategic planning process that uses data to inform measures and goals for student success	
	4.1b	College has a limited set of priorities to guide their work to improve student success	
	4.1c	College evaluates its programs and services to see if they improve student success	
	4.1d	College makes budget decisions based on evidence of program effectiveness	
	4.1e	College uses external grants to support improve broad efforts to improve student success	
	4.1f	College has made efforts to scale up one or more of strategies	
	4.1g	College's accreditation process is linked with its efforts to improve student success	
		Effect of ATD on college's strategic planning process	
		ORGANIZATION (4.2)	
	4.2a	College has committees that oversee/monitor efforts to improve student success	
		College has integrated the work of the core team with pre-existing or new strategic planning and/or committees to monitor student success	
		College has integrated the work of the Data Team with strategic planning and/or committees to monitor student success	
	4.2b	Meetings, organizational units and work groups regularly focus on student success	
		Effect of ATD on college's organizational structure	
		PROFESSIONAL DEVELOPMENT (4.3)	
	4.3a	Professional development training reinforces efforts to improve student success	
	4.3b	Faculty/staff orientation activities promote a commitment to student success	
	4.3c	Faculty and staff receive training on using data and research	
		Effect of ATD on college's professional development offerings	

Appendix B

Survey Results on Data Use by Faculty and Administrators at the Washington ATD Colleges

Appendix Table B.1

Changes in Faculty Views About the Use of Data on Students Between 2007–2008 and 2010–2011

Survey Item	WA-A	WA-B	WA-C	WA-D	WA-E	WA-F
Accessibility of data:						
The data in the college's SIS are generally accurate and error free	0	0	0	+	0	0
The data I need are generally available in a user-friendly format	+	0	0	+	0	0
The college's IR staff is responsive to requests for information	0	+	0	+	0	0
The college's IR department is adequately staffed for the college's information and research needs	0	+	0	+	0	+
The reports and other information the college provides to administrators are typically clear and easy to follow	0	0	0	0	0	+
I am able to obtain the information I need in a timely fashion	+	+	0	+	0	0
Sources of data:						
Searches using the college's student information system	0	0	0	0	0	0
Data from the college web site or fact book	0	0	0	0	0	0
Reports distributed by the college's institutional research (IR) office or other departments	-	0	0	0	0	-
Requests to the IR or information technology (IT) staff	0	0	0	0	0	0
My department's database	0	0	0	0	0	0
Student surveys or focus groups	0	-	0	0	0	0
State databases or research reports	+	0	0	0	0	0
Other sources	0	-	+	0	0	0
I generally do not need information about groups of students	0	0	+	0	0	0

Table continued on the next page

Survey Item	WA-A	WA-B	WA-C	WA-D	WA-E	WA-F
Participation in organized discussions about the following:						
Improving academic achievement or closing the achievement gaps	-	0	0	0	0	0
Academic needs or performance of students of color	0	0	0	0	0	0
Academic needs or performance of low-income students	0	0	0	0	0	0
Reason for not using data:						
I am too busy with my teaching responsibilities	0	0	-	0	0	0
It is not part of my responsibilities as a faculty member/administrator	+	0	0	0	0	0
I do not have the quantitative and/or qualitative research skills to understand and use data and research	0	0	0	0	0	0
I do not trust the data that are available	0	0	0	0	0	0
The data that are available are not relevant to my role as a faculty member/administrator	0	0	0	0	0	-

KEY:
+ indicates a statistically significant positive change.
- indicates a statistically significant negative change.
0 indicates no change.

Appendix Table B.2

Changes in Administrator Views About the Use of Data on Students Between 2007–2008 and 2010–2011

Survey Item	WA-A	WA-B	WA-C	WA-D	WA-E	WA-F
Accessibility of data:						
The data in the college's SIS are generally accurate and error free	0	+	0	0	0	0
The data I need are generally available in a user-friendly format	0	+	+	+	0	0
The college's IR staff is responsive to requests for information	0	+	+	0	0	0
The college's IR department is adequately staffed for the college's information and research needs	0	0	+	0	0	0
The reports and other information the college provides to administrators are typically clear and easy to follow	0	+	0	0	0	0
I am able to obtain the information I need in a timely fashion	0	+	+	0	0	0
Sources of data:						
Searches using the college's student information system	*	0	0	0	0	0
Data from the college web site or fact book	0	0	0	+	0	0
Reports distributed by the college's institutional research (IR) office or other departments	0	0	-	+	0	0
Requests to the IR or information technology (IT) staff	0	0	0	+	+	0
My department's database	0	0	0	0	0	0
Student surveys or focus groups	0	0	0	+	0	0
State databases or research reports	0	0	0	0	0	0
Other sources	0	0	-	0	-	0
I generally do not need information about groups of students	-	-	0	0	-	-

Table continued on the next page

Survey Item	WA-A	WA-B	WA-C	WA-D	WA-E	WA-F
Participation in organized discussions about the following:						
Improving academic achievement/closing achievement gaps	0	0	0	+	0	0
Academic needs or performance of students of color	0	0	0	0	0	0
Academic needs or performance of low-income students	0	0	0	0	+	0
Reason for not using data:						
I am too busy with my administrative responsibilities	0	0	0	-	0	0
It is not part of my responsibilities as a faculty member/ administrator	0	0	0	0	0	0
I do not have the quantitative and/or qualitative research skills to understand and use data and research	0	0	-	-	0	0
I do not trust the data that are available	0	0	-	0	0	0
The data that are available are not relevant to my role as a faculty member/administrator	0	0	0	-	-	0

KEY:
+ indicates a statistically significant positive change.
- indicates a statistically significant negative change.
0 indicates no change.

Appendix Table B.3

Faculty Members' Reported Extent of Use of Data on Students in Making Teaching-Related Decisions

	WA-A			WA-B			WA-C		
Purpose for Data Use	**07 mean**	**10 mean**	**07–10**	**07 mean**	**10 mean**	**07–10**	**07 mean**	**10 mean**	**07–10**
Curriculum	4.4	4.8	0.4*	4.6	4.7	0.2	4.4	5.1	0.7**
Teaching	4.9	5.3	0.3	5.1	5.3	0.2	4.9	5.4	0.5*
Advising	4.7	5.2	0.5*	4.9	5.3	0.4	4.6	5.2	0.6*
Identification of high failure rate courses	4.6	5.1	0.5*	4.9	5.3	0.4	4.5	5.2	0.7**

	WA-D			WA-E			WA-F		
Purpose for Data Use	**07 mean**	**10 mean**	**07–10**	**07 mean**	**10 mean**	**07–10**	**07 mean**	**10 mean**	**07–10**
Curriculum	4.5	5.0	0.5*	4.4	5.0	0.7	4.4	4.7	0.3
Teaching	4.9	5.4	0.5**	4.7	4.9	0.2	4.5	5.1	0.6*
Advising	4.7	5.7	0.9***	4.6	4.5	-0.1	4.5	4.6	0.1
Identification of high failure rate courses	4.7	5.4	0.7**	4.5	4.5	0.0	4.2	4.6	0.4

***$p < .01$. **$p < .05$. *$p < .10$.

Appendix Table B.4

Faculty Perceptions of Their Departments' Extent of Use of Data on Students in Making Decisions

	WA-A			WA-B			WA-C		
College Area	**07 mean**	**10 mean**	**07–10**	**07 mean**	**10 mean**	**07–10**	**07 mean**	**10 mean**	**07–10**
Curriculum	4.2	5.0	0.8***	4.2	4.9	0.7	5.0	5.3	0.3
Teaching	4.5	5.1	0.6**	4.8	4.9	0.2	5.2	5.3	0.0
Tutoring	4.4	4.5	0.2	4.8	4.8	0.0	5.1	5.4	0.4
Program planning	4.7	5.1	0.5*	4.6	4.8	0.2	5.6	5.2	-0.3
Program evaluations	4.4	5.1	0.7***	4.9	5.2	0.3	5.4	5.4	-0.1
Long-term planning	4.3	4.9	0.6**	4.6	4.7	0.1	5.0	5.2	0.2
Budgeting	3.6	4.4	0.7**	4.4	4.9	0.5	4.7	5.3	0.5*
Identification of high failure rate courses	4.1	4.7	1.0**	3.8	4.2	0.4	4.8	5.4	0.6*
Areas for improvement	4.4	4.8	0.4	4.5	4.2	-0.3	5.0	5.1	0.1

	WA-D			WA-E			WA-F		
College Area	**07 mean**	**10 mean**	**07–10**	**07 mean**	**10 mean**	**07–10**	**07 mean**	**10 mean**	**07–10**
Curriculum	4.9	5.4	0.5*	4.2	5.3	1.1**	4.4	5.0	0.6
Teaching	4.7	5.3	0.6**	4.7	4.9	0.3	4.3	4.9	0.5
Tutoring	4.3	4.7	0.3	4.4	4.6	0.2	4.4	4.9	0.5
Program planning	5.0	5.3	0.3	4.8	4.8	0.0	4.7	4.9	0.2
Program evaluations	4.7	5.1	0.3	4.6	4.8	0.2	5.0	5.1	0.1
Long-term planning	4.7	5.1	0.4	4.5	4.3	-0.1	4.7	5.2	0.5
Budgeting	4.0	4.6	0.6*	3.7	4.0	0.3	4.6	5.1	0.5
Identification of high failure rate courses	4.2	5.5	1.3***	3.8	4.9	1.2**	3.6	4.5	0.9**
Areas for improvement	4.4	4.8	0.4	4.0	4.4	0.4	4.5	4.6	0.1

***$p < .01$. **$p < .05$. *$p < .10$.

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Appendix Table B.5

Administrator Perceptions of Their Departments' Extent of Use of Data on Students in Making Decisions

College Area	WA-A			WA-B			WA-C		
	07 mean	10 mean	Mean diff.	07 mean	10 mean	Mean diff.	07 mean	10 mean	Mean diff.
Curriculum	4.7	3.5	-1.2**	4.8	4.2	-0.6	5.3	3.5	-1.7***
Program planning	5.0	3.6	-1.4**	5.8	4.5	-1.3*	5.6	3.9	-1.8***
Program evaluations	5.4	3.6	-1.8***	6.3	5.1	-1.2*	5.8	4.1	-1.7**
Long-term planning	5.4	5.5	0.1	5.5	5.7	0.2	5.5	4.5	-0.9
Budgeting	5.4	5.3	-0.1	5.5	5.7	0.1	5.6	4.9	-0.7
Areas for improvement	5.5	5.6	0.1	5.0	5.7	0.7	5.9	4.6	-1.4***

College Area	WA-D			WA-E			WA-F		
	07 mean	10 mean	Mean diff.	07 mean	10 mean	Mean diff.	07 mean	10 mean	Mean diff.
Curriculum	5.2	3.2	-2.0***	4.1	3.9	-0.2	4.9	3.9	-1.0*
Program planning	5.3	4.1	-1.2*	4.8	4.5	-0.4	5.4	3.8	-1.7***
Program evaluations	5.2	3.6	-1.6**	4.7	5.6	0.9	5.0	3.7	-1.3**
Long-term planning	5.6	5.7	0.1	4.9	5.7	0.8	5.2	5.5	0.3
Budgeting	5.4	5.8	0.4	5.0	5.9	0.9*	5.5	5.4	-0.1
Areas for improvement	5.7	5.8	0.1	5.0	5.7	0.7	5.3	5.5	0.2

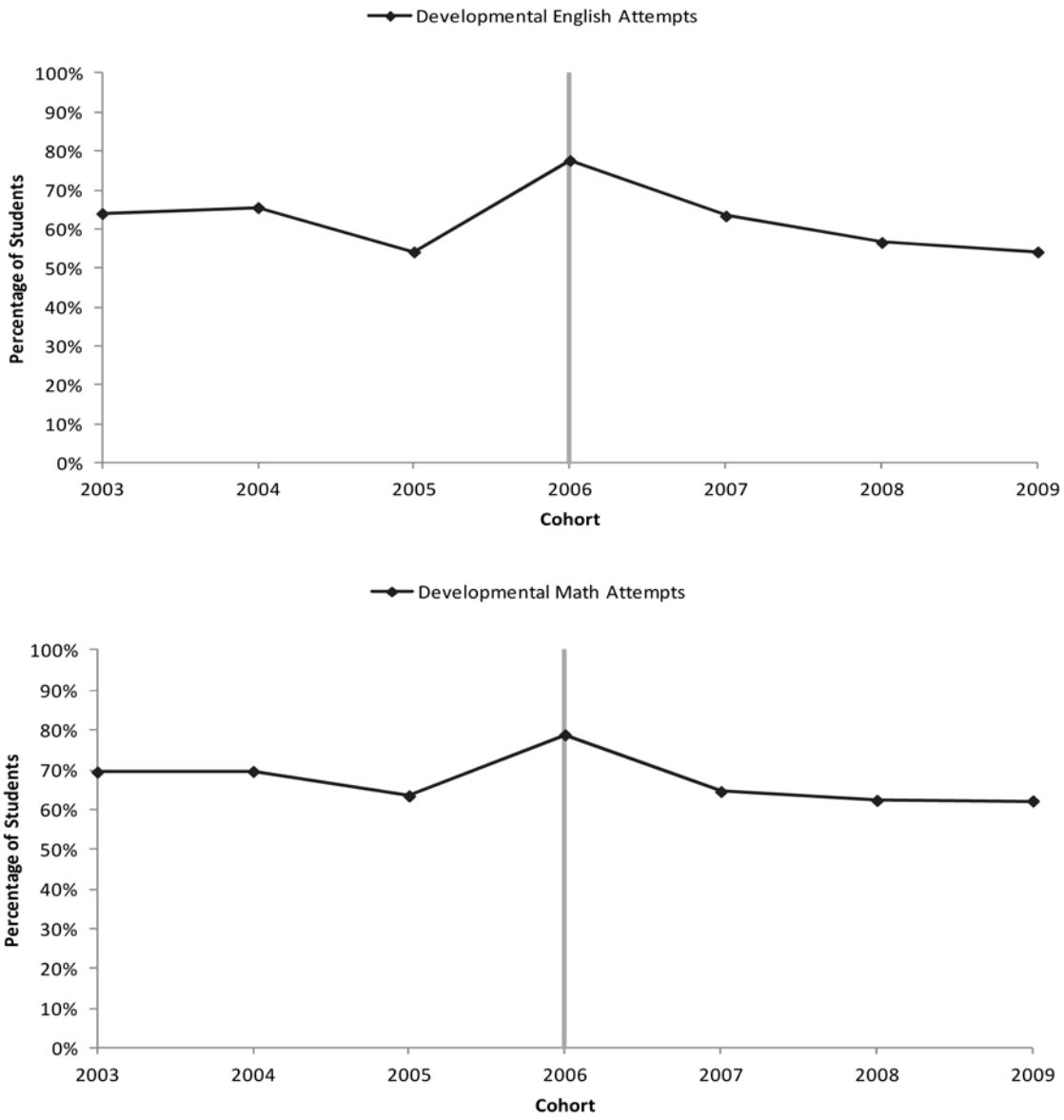
***$p < .01$. **$p < .05$. *$p < .10$.

Appendix C

Additional Student Outcome Trends at the Washington ATD Colleges

Appendix Figure C.1

Trends in Developmental English and Developmental Math Attempts Among All Students, 2003–2009: Washington ATD Colleges

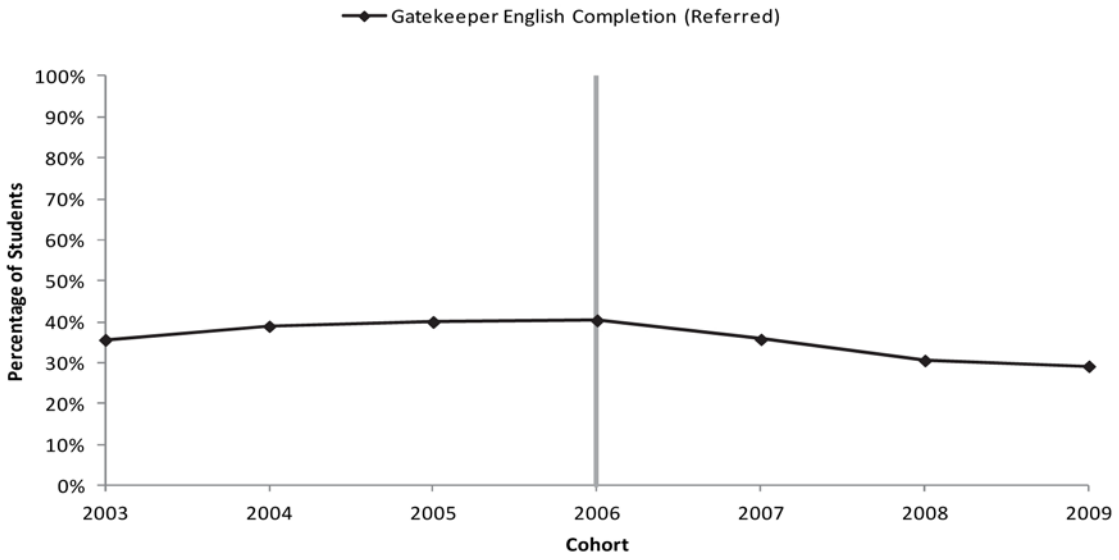


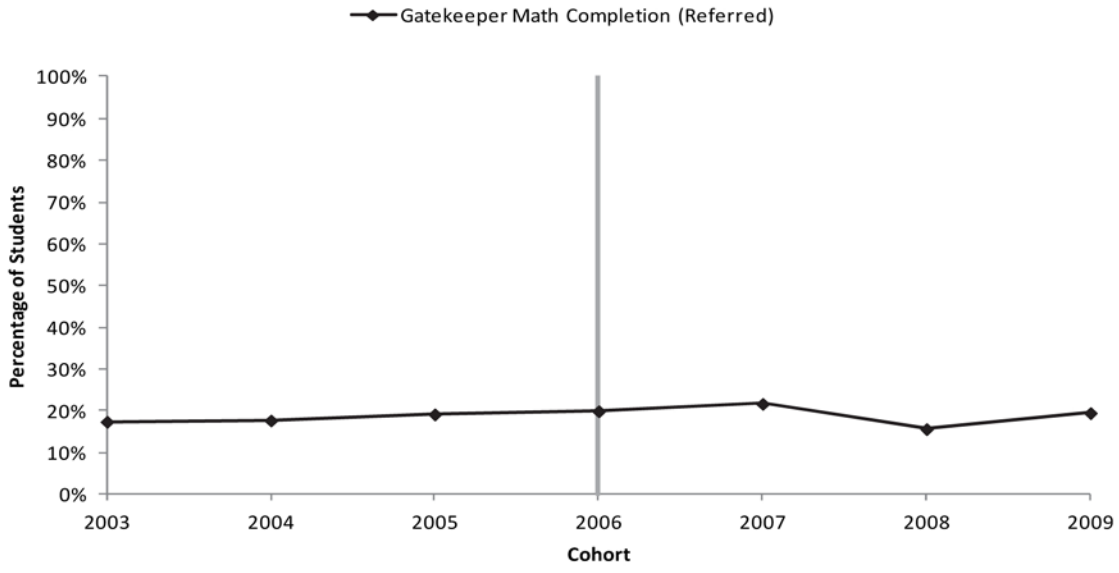
SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. WA-B and WA-D were excluded from the English developmental trend due to lack of data; WA-B was excluded from the math developmental trend due to a lack of data.

Appendix Figure C.2

Trends in Gatekeeper English and Gatekeeper Math Completions Among Students Referred to Developmental Courses, 2003–2009: Washington ATD Colleges





SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. WA-B and WA-D were excluded from the English developmental trend due to lack of data; WA-B was excluded from the math developmental trend due to a lack of data.

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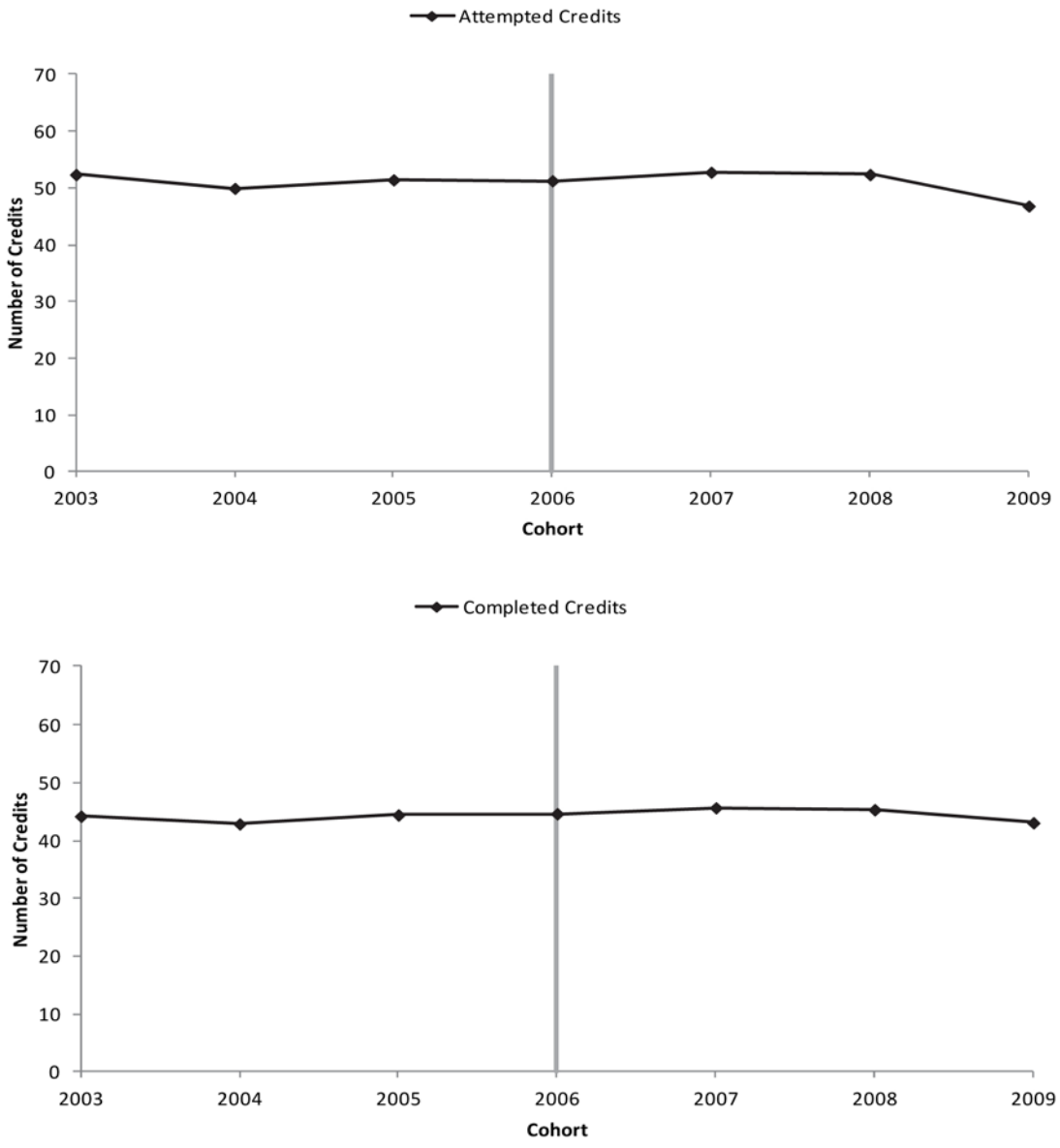
Appendix Figure C.3

Trends in Credits Attempted and Completed Among All Students, 2003–2009: Two-Year Outcomes for Washington ATD Colleges

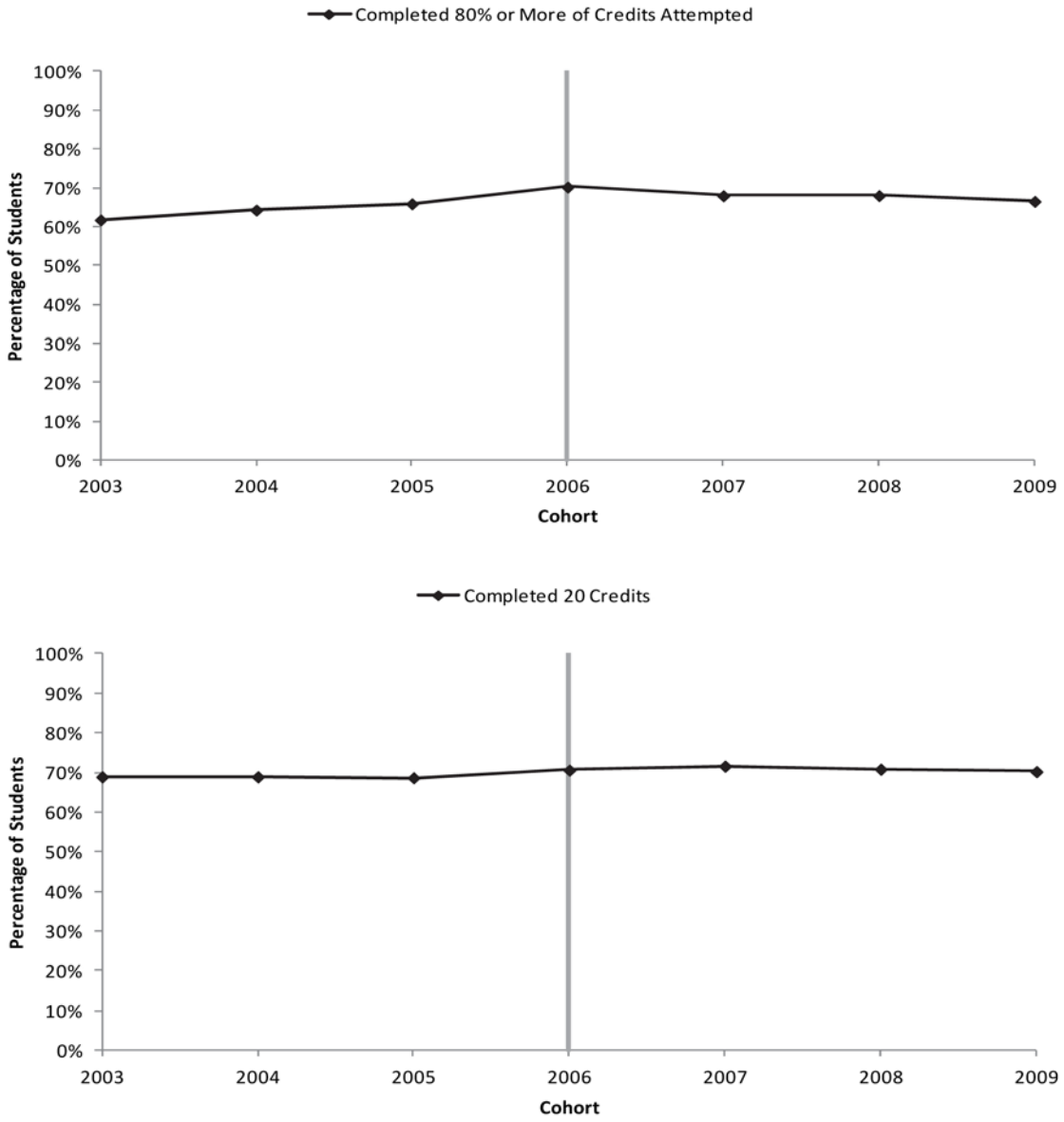


SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. WA-B was excluded from credit-related outcomes due to data concerns. WA-C was excluded from 2009 credits attempted due to missing data.

Appendix Figure C.4

Trends in Credit Milestones of 80 Percent Completion and 20 Credit Completion Among All Students, 2003–2009: Two-Year Outcomes for Washington ATD Colleges

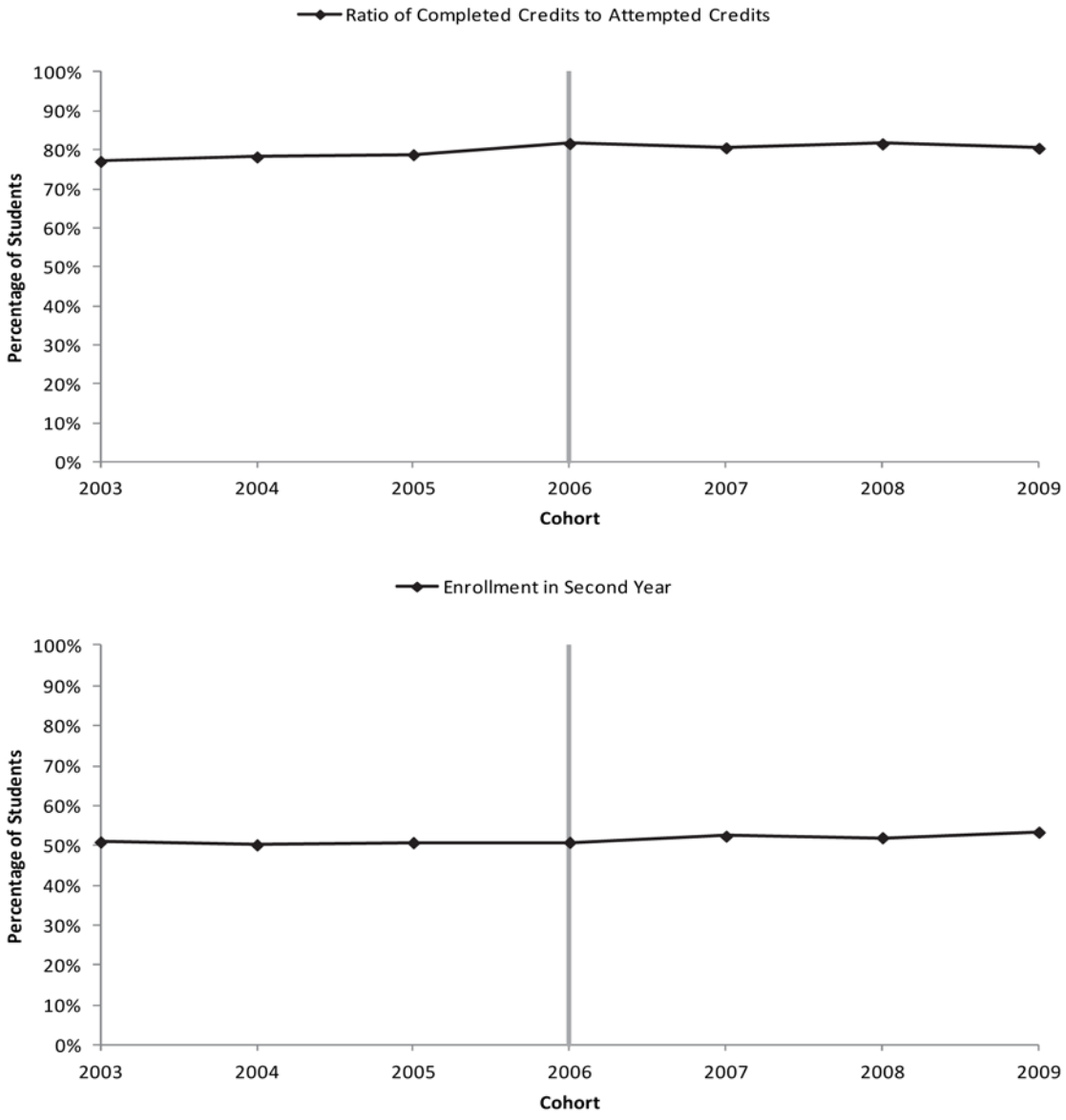


SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. WA-B was excluded from credit-related outcomes due to data concerns. WA-C was excluded from 2009 completion of 80% or more due to missing data.

Appendix Figure C.5

Trends in Ratios of Completed to Attempted Credits and Enrollment in the Second Year Among All Students, 2003–2009: Two-Year Outcomes for Washington ATD Colleges



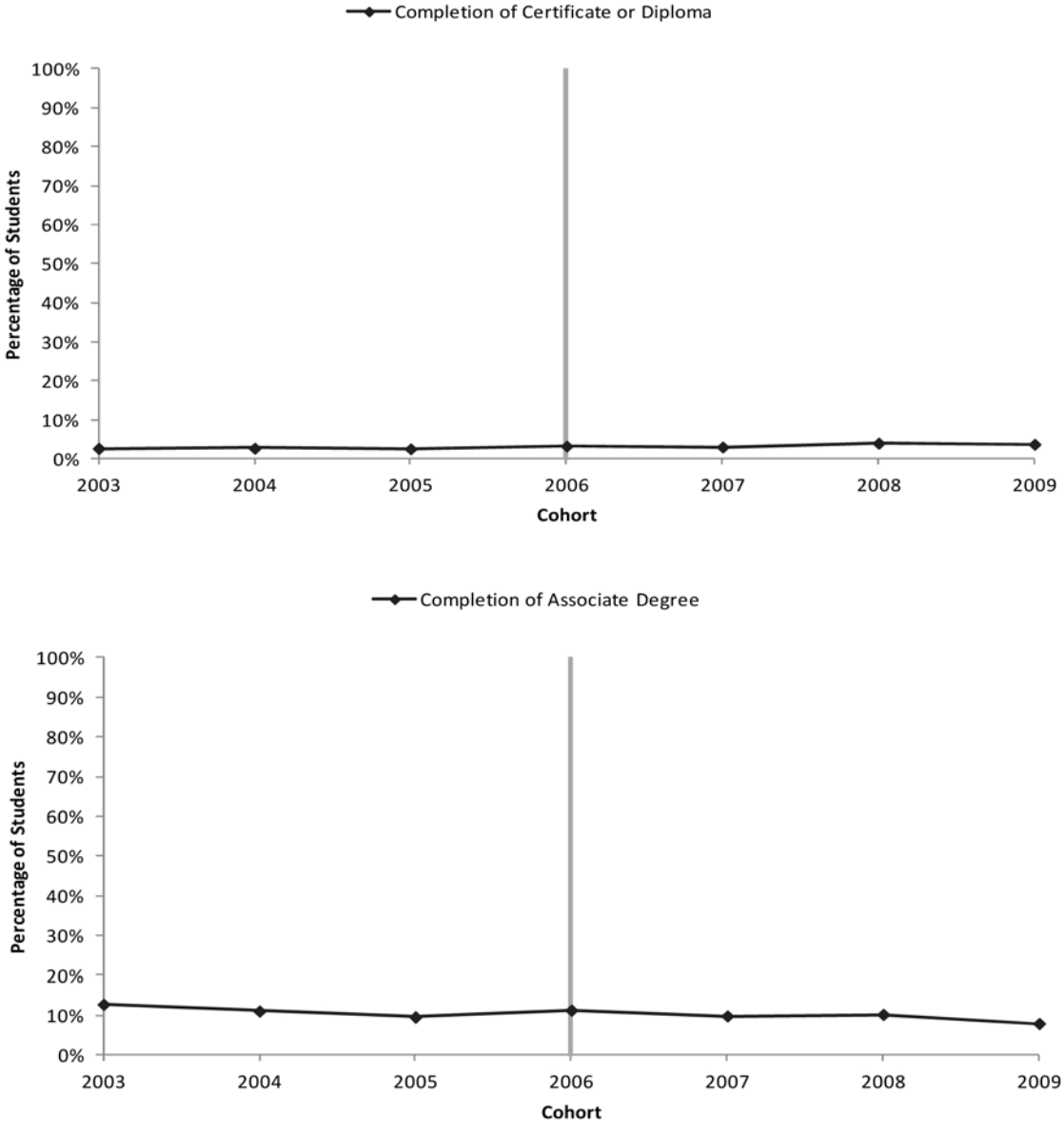
SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. WA-B was excluded from credit-related outcomes due to data concerns. WA-C was excluded from the 2009 credit ratio due to missing data. Enrollment in second year estimates for 2009 omit WA-B and WA-C due to missingness.

Achieving the Dream Colleges in Washington State

Appendix Figure C.6

Trends in Credential Completion by Type Among All Students, 2003–2009: Two-Year Outcomes for Washington ATD Colleges

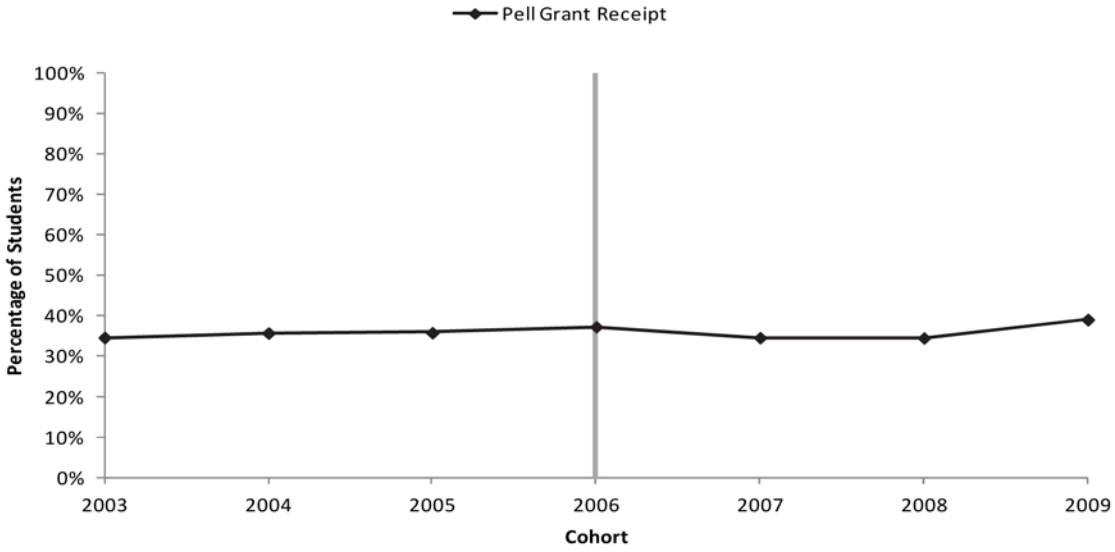


SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream. The estimates for completion of credentials for the 2009 cohort at WA-B consist of only one year of data.

Appendix Figure C.7

Trends in Pell Grant Receipt Among All Students, 2003–2009: Washington ATD Colleges



SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

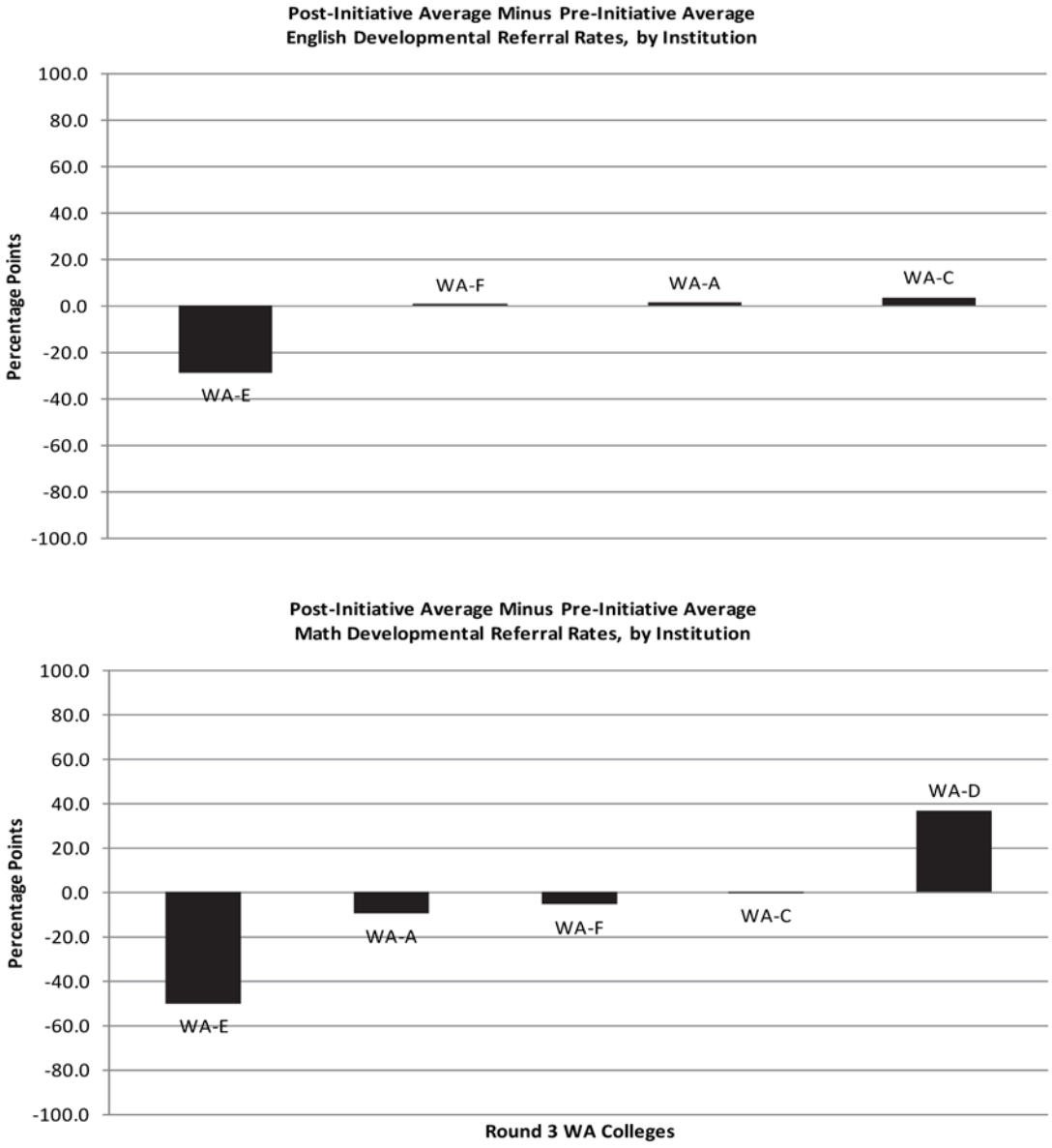
NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. The vertical line shows the last cohort prior to the implementation of Achieving the Dream.

Appendix D

Average Student Outcome Changes at Individual Washington ATD Colleges

Appendix Figure D.1

Average Changes in Developmental English and Development Math Referrals Among All Students, 2003–2009: Washington ATD Colleges



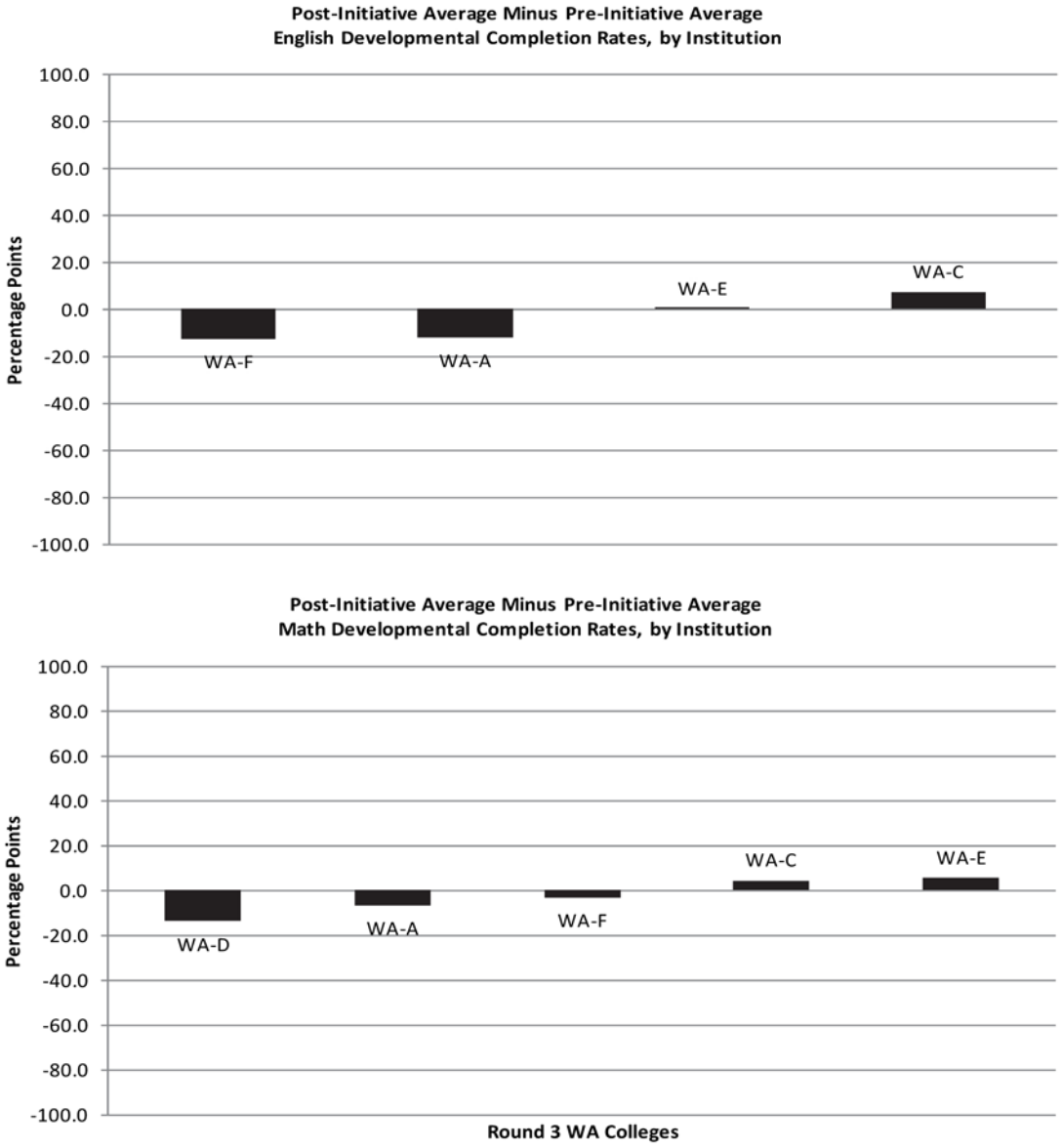
SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. Percentage point change is calculated by subtracting the pre-intervention (2003 to 2006) average from the post-intervention (2007 to 2009) average. WA-B and WA-D were excluded from the English developmental trend due to lack of data; WA-B was excluded from the math developmental trend due to a lack of data.

Achieving the Dream Colleges in Washington State

Appendix Figure D.2

Average Changes in Developmental English and Development Math Completions Among Students Referred to Any Developmental English or Math Course, 2003–2009: Washington ATD Colleges

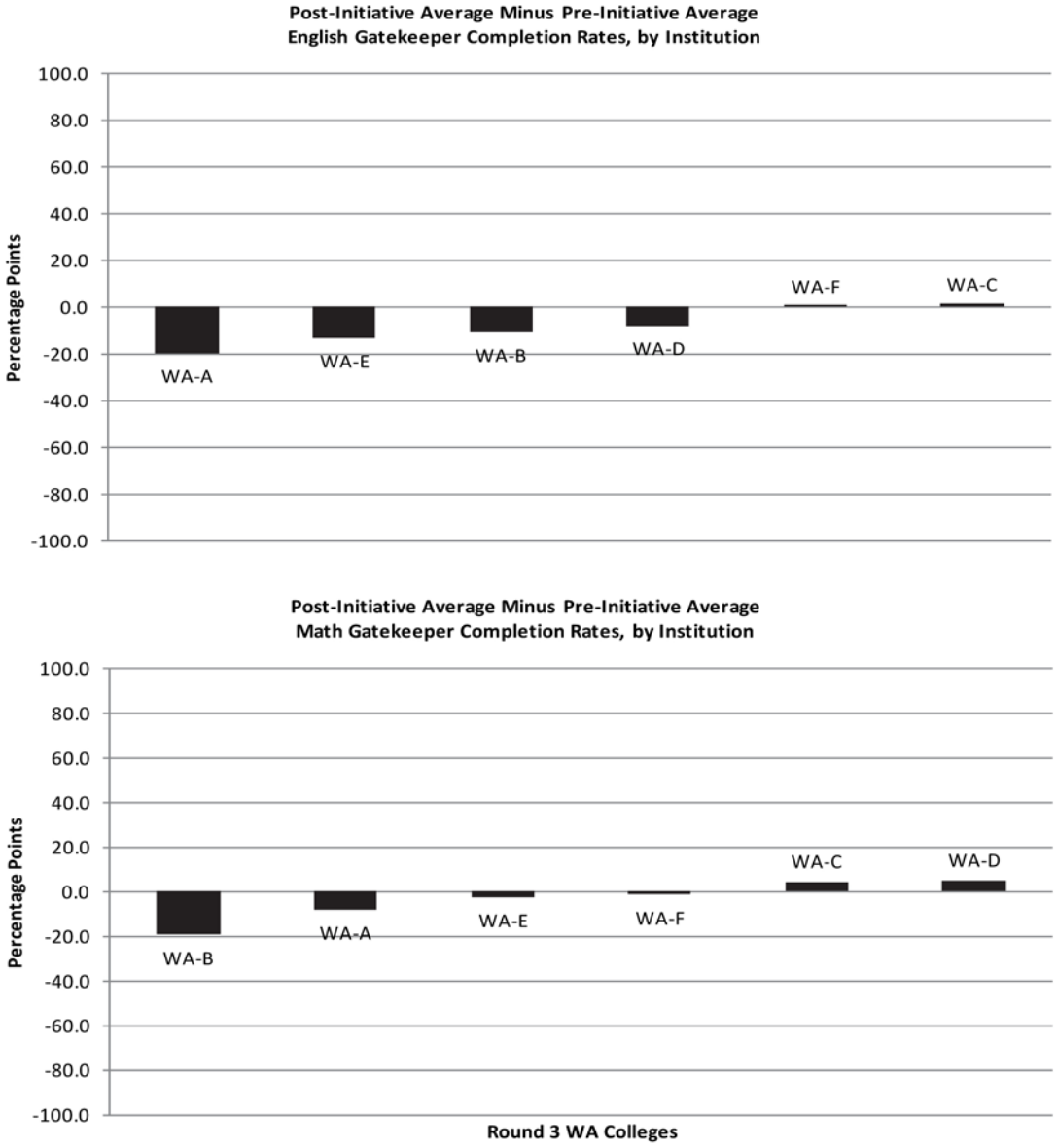


SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. Percentage point change is calculated by subtracting the pre-intervention (2003 to 2006) average from the post-intervention (2007 to 2009) average. WA-B and WA-D were excluded from the English developmental trend due to lack of data; WA-B was excluded from the math developmental trend due to a lack of data.

Appendix Figure D.3

Average Changes in Gatekeeper English and Gatekeeper Math Completions Among All Students, 2003–2009: Washington ATD Colleges

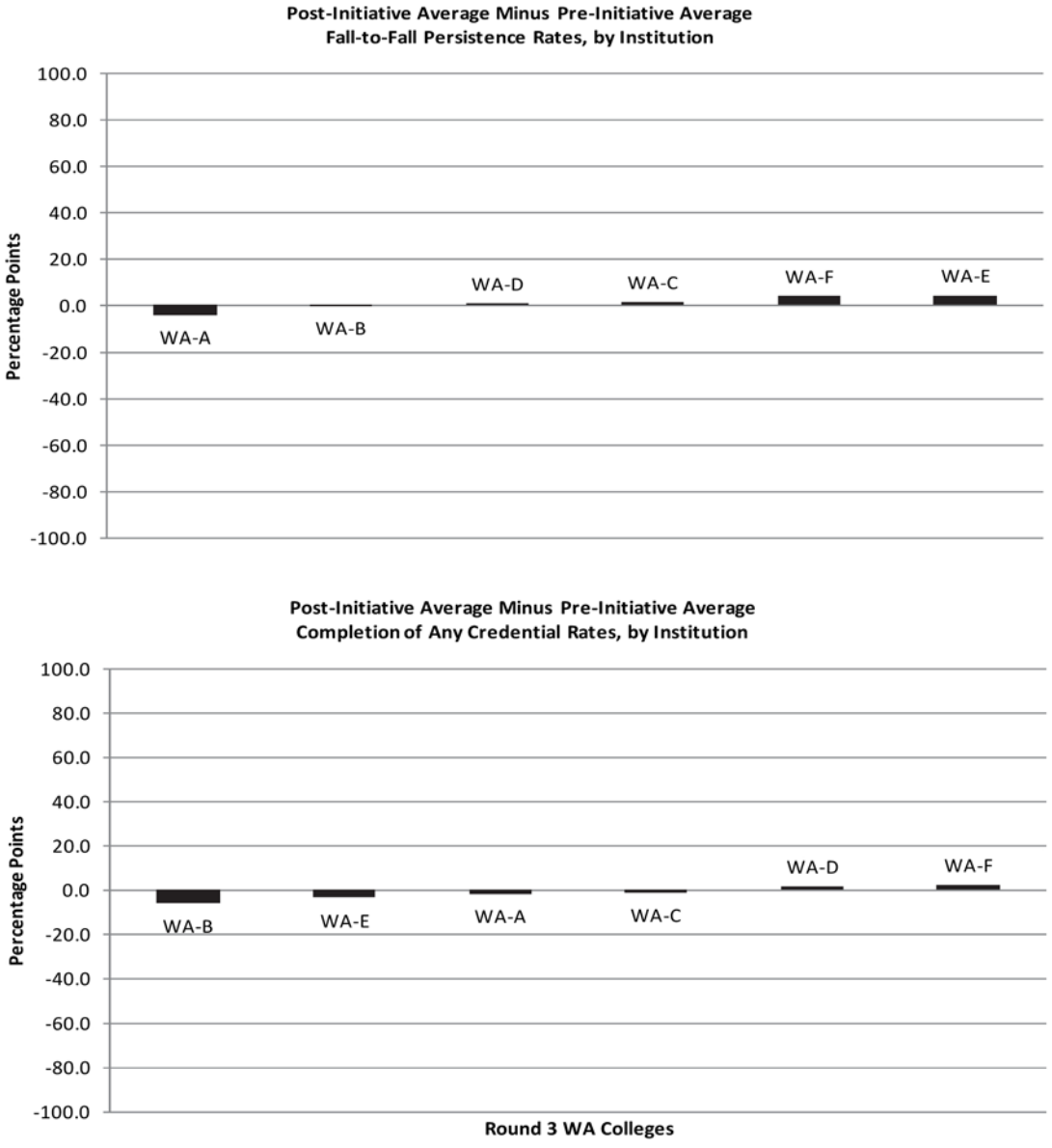


SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. Percentage point change is calculated by subtracting the pre-intervention (2003 to 2006) average from the post-intervention (2007 to 2009) average. Gatekeeper course completion estimates for the 2009 cohort at WA-B consist of only one year of data.

Appendix Figure D.4

Average Changes in Fall-to-Fall Persistence and Completion of Any Credential Among All Students, 2003–2009: Washington ATD Colleges



SOURCE: MDRC calculations using the Achieving the Dream database maintained by JBL Associates.

NOTES: Calculations for these figures used institutional means for all available data for sample members in the fall 2003 through fall 2009 cohorts at Achieving the Dream Round 3 Washington colleges. Percentage point change is calculated by subtracting the pre-intervention (2003 to 2006) average from the post-intervention (2007 to 2009) average. The estimate for completion of any credential for the 2009 cohort at WA-B consists of only one year of data. The 2009 cohort at WA-C is not included in the fall-to-fall estimate due to missing data.

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