

**Something Has Got to Change:**  
Rethinking Special Education



**Future of American Education Project**

Nathan Levenson

**Working Paper 2011-01**



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## Foreword

The headlines tell the tale. Newspapers like the *New York Times*, the *Washington Post*, the *San Francisco Chronicle*, and the *Las Vegas Sun* have described districts wrestling with budget shortfalls. “Budget gap endangers valued school programs.” “School budget cuts threaten gains.” “Public schools getting snared by recession.” “District schools lay off teachers.”

As Eric Osberg and I noted last year in our book *Stretching the School Dollar*, school boards and superintendents have been forced to seek new efficiencies and ways to do better with less. In doing so, school systems have found themselves particularly perplexed by the unique challenges of special education. Federal statute, court rulings, extensive processes, and fraught politics have left many districts disinclined to even seek savings from their substantial outlays on special education.

After all, families with special needs students naturally demand the best available service, and may well resort to litigation to secure it. Districts are prohibited from even considering costs when designing student education plans. The result has been a steady increase in spending accompanied by remarkably little attention to effectiveness or efficiency. There must be a more promising path.

Given the high stakes of doing better on this score, I'm pleased that the AEI education program is able to offer Nathan Levenson's “Something Has Got to Change: Rethinking Special Education.” Levenson, managing director of the District Management Council and seasoned special education expert, draws on his years of experience as a superintendent and special education consultant to offer a litany of field-tested practices for taming out-of-control special education spending while serving students better.

Levenson sketches ways for districts to do far better in four key areas. He explains how to squeeze costs and boost results by:

- better integrating special education with general education classrooms;
- smarter deployment of support staff;
- the use of more sophisticated metrics to gauge effectiveness metrics; and
- employing more strategic management structures.

Such strategies, Levenson argues, equip teachers and administrators to better meet student needs while also helping policymakers provide much-needed targeted support for cost-effective practices. As Levenson notes, “Districts must tackle the twin challenges of controlling special education costs and improving student achievement. In short, we are asking districts to do more with less.”

For educators wrestling with special education costs, the value is obvious. For others, I trust that you will find Levenson's take a thought-provoking first-person account of how to be smarter and more purposive about spending school dollars. For further information on the paper, Nathan Levenson can be reached at [nlevenson@dmcouncil.org](mailto:nlevenson@dmcouncil.org). For other AEI education working papers, please visit [www.aei.org/futureofeducation](http://www.aei.org/futureofeducation). For additional information on the activities of AEI's education policy program, please visit [www.aei.org/hess](http://www.aei.org/hess) or contact Ms. Olivia Meeks at [olivia.meeks@aei.org](mailto:olivia.meeks@aei.org).

– Frederick M. Hess  
Director of Education Policy Studies  
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**Nathan Levenson** is currently Managing Director of The District Management Council, a firm that provides strategic insights and practical solutions to public school districts across the country. Previously, Mr. Levenson served as a school board member, Assistant Superintendent for Curriculum and Instruction in Harvard MA, and Superintendent of the Arlington, MA Public Schools. While in Arlington, Mr. Levenson and his team reduced the number of elementary students reading below grade level by 52% and decreased the high school special education achievement gap by 66%, earning the district multiple commendations from the Rennie Center, the National Blue Ribbon Schools program, the Massachusetts Department of Education Compass Schools program, and School Matters. Mr. Levenson's work has been profiled in The District Management Journal, The Rennie Center for Education Research and Policy's best practices in special education report, School Administrator Magazine, and chronicled in *Stretching the School Dollar* (Harvard Education Press, 2011). Mr. Levenson received a BA from Dartmouth College, an MBA with distinction from Harvard Business School, and is a graduate of the Broad Foundation Superintendents Academy.

“Something has got to change!” Perhaps the only point of agreement among superintendents, school boards, teachers, parents, and commissioners of education is that the status quo for meeting the needs of K-12 students with disabilities is not working very well. The current system is ineffective for students and burdensome to tax payers, and over the next five to ten years, the situation will become even more problematic.

Special education costs are rising rapidly, and the number of students with severe special needs such as autism or emotional and behavioral issues is rising even faster. The performance requirements under No Child Left Behind (NCLB) are demanding higher levels of student achievement, but school budgets are shrinking. Though districts continue to lobby the state and federal government for more funds, they are unlikely to receive additional money given the current economic crisis and the harsh reality that greater spending in the past has not translated into increased learning. Districts must tackle the twin challenges of controlling special education costs and improving student achievement. In short, we are asking districts to do more with less.

During the best of financial times, students with special needs have fared poorly academically. Even high-achieving states like Massachusetts have struggled to help students with special needs reach grade-level mastery. While Massachusetts’ education reform has raised overall student achievement to the highest in the

nation, it has also produced the largest achievement gap between special education and general education students.<sup>1</sup> The rising tide didn’t raise all boats.

The lackluster results for students with special needs are not from lack of effort; school districts are spending an increasing percentage of their total budget on special education. However, most districts cannot actually calculate their total financial commitment to special education. Reported figures often exclude the costs of

facilities for in-district programs, legal expenses, fully-loaded transportation, subcontracted services, and the share of non-special education administration time devoted to special education meetings and problem resolution. In some districts, total special education costs consume 30 percent or more of total

spending.

As a nation, special education spending has risen from 4 percent to 21 percent of total school spending from 1970 to 2005.<sup>2</sup> The pressure for increased spending is only going to intensify: the number of students with special needs is growing, and the number of students with *significant* special needs is increasing even faster.<sup>3</sup>

### The Challenges Are Increasing

Special education students comprise two broad segments: a small number of students with very

**Districts must tackle the twin challenges of controlling special education costs and improving student achievement. In short, we are asking districts to do more with less.**

significant needs, and a large number of students with mild to moderate needs. Obviously, students with significant needs, also known as “severe disabilities,” require more services (and thus greater per pupil expenditures).

The number of students with the more costly severe disabilities is growing fast. The number of students with three of the four most common severe disabilities—health impairments, autism, and developmental delay—are all increasing by double digits each year across the country. The number of students with mild disabilities is also increasing slightly each year. The number of students with moderate disabilities is growing more slowly, but it is still growing. These increases in need will put enormous pressure on school budgets.

As local and state funding declines because of the economic crisis and mounting deficits constrain federal support, it is unlikely that new money will be available to meet the rising needs. In fact, the Nelson Rockefeller Institute forecasts that state revenue will not return to pre-crisis levels for more than six years.<sup>4</sup> Their best-case forecast suggests substantial shortfalls through 2013, even with the sizable federal stimulus dollars taken into account. Factoring in teacher raises, health care costs, and pension commitments, total staffing will not return to prior levels anytime soon.

### Reason For Hope: Some Districts Have Done More with Less

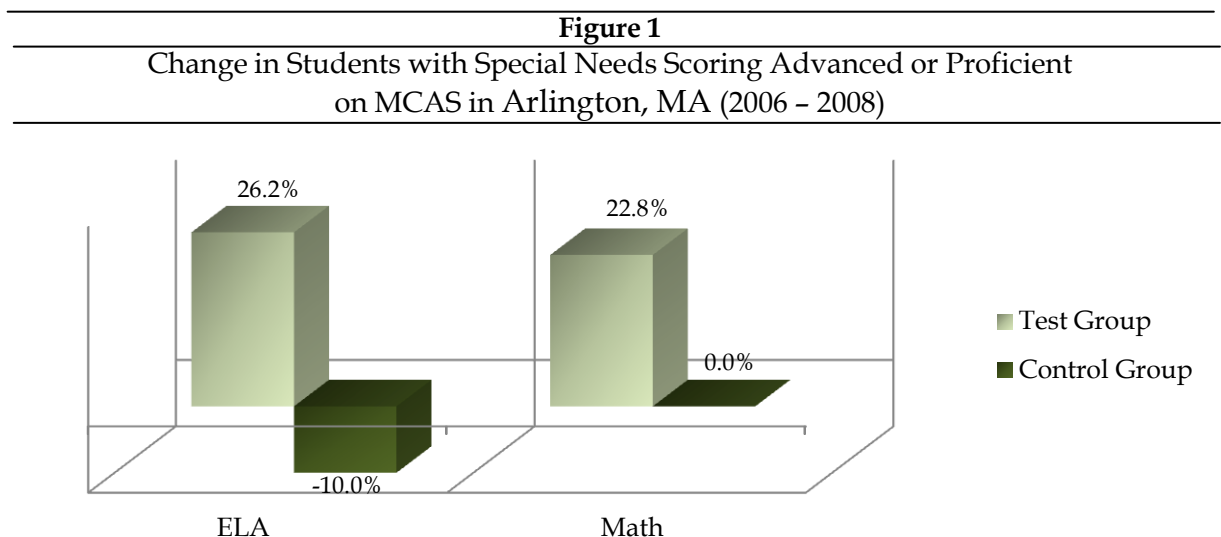
Despite the grim situation, there are reasons to be optimistic. The financial crisis and NCLB sanctions have forced some districts to rethink how they educate students with special needs and to restructure how they provide special education services. Bold efforts have led to big gains in academic achievement and reduced spending.

One school district—Arlington, Massachusetts—exemplifies the benefits of rethinking special education.

In 2005, special education costs in Arlington were climbing, support for students with special needs was spotty, and results weren't acceptable. To make matters worse, Arlington was experiencing a ballooning population of children with autism, tuitions for out-of-district schools were skyrocketing, and special education transportation vendors were hiking prices by as much as 100 percent.<sup>5</sup> Against this backdrop, the district was able to reduce real special education spending, raise student achievement, and, surprisingly, increase parent satisfaction.

#### Higher Math and English Achievement

In a mix of eight elementary and secondary





schools that were participating in the three-year special education reform effort, the number of special education students reaching proficiency increased by 26 percent in English and 22 percent in math. One school, maintaining the old practices, served as a control group. There, student achievement dropped 5 percent during the same period.

During this same period, the district also made large gains in elementary reading proficiency. Since reading is the gateway to all other learning and the most common reason for a referral to special education, these reading gains will help both students and the budget in the future.

- Prior to the reform effort, the district estimated that only 10 percent of struggling elementary readers who started the school year below grade level reached grade level by year's end. After the reform efforts, over 65 percent of struggling readers became proficient readers during the school year.
- Overall, in grades K-5, the number of struggling readers declined by 68 percent, with 92.5 percent of students reading at grade level.
- The program was fully funded by shifting, not adding, resources.

### *Closing the Achievement Gap*

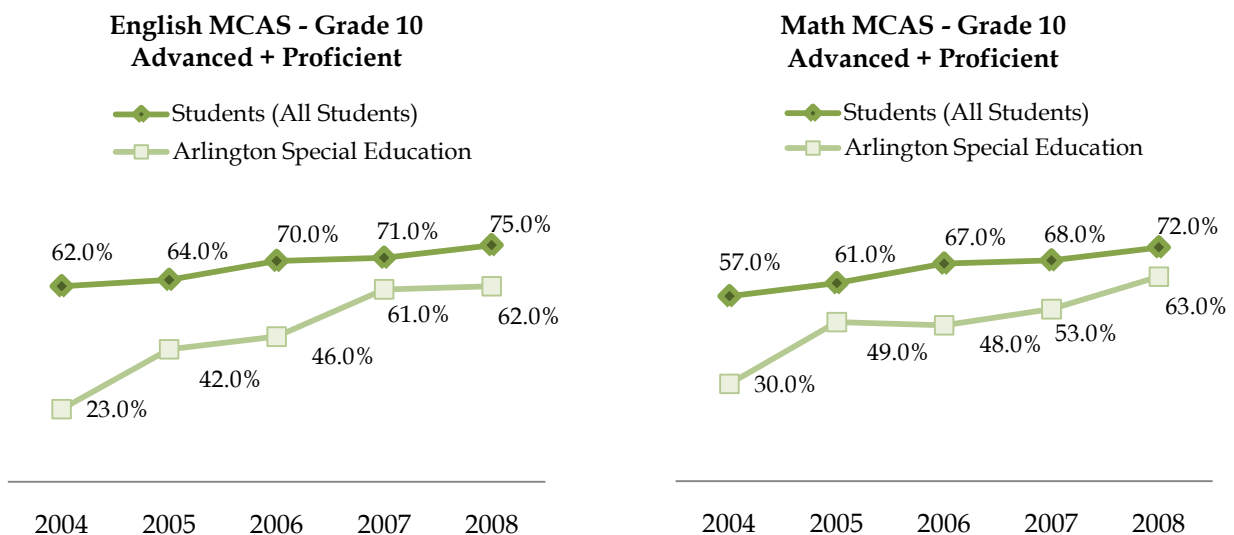
Arlington High School was ranked in the top 2 percent of all high schools in the country by *US News and World Report*, and the entire district was twice recognized by School Matters (a partnership of Standard & Poor's, the Gates Foundation, and the Broad Foundation) for outperforming districts of similar socioeconomic status. In both cases, closing the achievement gap for special education students factored heavily into the award selections. Understandably so: the high school was able to close 65 percent of the special education achievement gap by rethinking how and who provided math and English support. The Rennie Center for Education Research and Policy spotlighted Arlington as exemplifying best practices in special education in its 2009 study, "Seeking Effective Policies and Practices for Students with Special Needs."<sup>6</sup>

### *Less Spending*

How much did it cost to achieve these gains? Nothing! Real per pupil spending on special education actually declined during this period, and because student achievement increased, parents did not fight the cost savings. In fact, parent satisfaction increased.

**Figure 2**

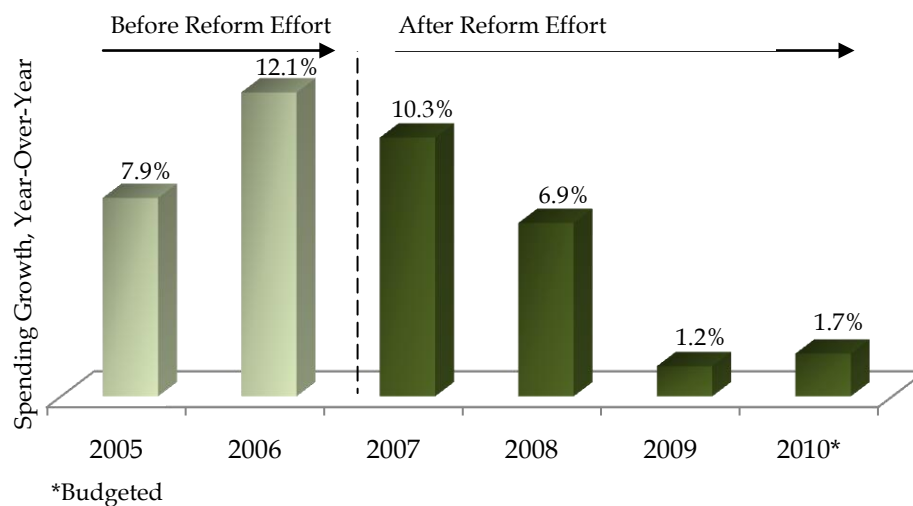
Closing the Achievement Gap Between General Education and Special Education Students on MCAS in Arlington, MA (2004-2008)



- In the first year after the Arlington Public Schools started implementing the reform effort, an independent survey of special education parents found that 50 percent believed the department was more responsive to their child's needs than in the previous year.
- The following year, the special education parents group reported 66 percent of proficiency than the average general education student in the state.<sup>7</sup>
- Even more astounding is that 40 percent of the special education students at the high school in Harvard scored "Advanced" on the state math exam, and 40 percent on the state English test. To put this in perspective, only one-fifth of districts achieved this level of success in English with their *general*

**Figure 3**

Growth in Special Education Spending in Arlington, MA  
(2005-2010)



parents were more satisfied with the special education department.

- Formal parent complaints to the Department of Education dropped from 25 per year to zero.

#### *Savings and Achievement*

Another powerful example of impressive academic achievement despite modest spending is the small district of Harvard, MA during the leadership of a very innovative superintendent. While spending 10 percent less per student than the state average (72 percent of districts in the state spent more than Harvard), high school students with special needs out-performed *general* education students statewide.

- A low-spending district educated students with special needs to reach higher levels of

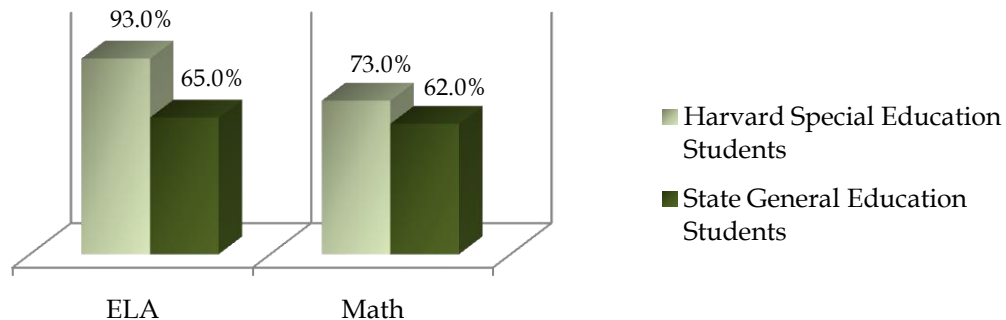
education students, and less than half in math.

From these examples, we can see that *how* districts spend money matters much more than *how much* they spend. The lessons of Arlington, Harvard, and other high performing districts provide four key takeaways for raising achievement of students with special needs while reducing costs.

#### **Focus on Reading and Integration with General Education**

I once asked a room of 25 special education directors to write down their strategies for raising the achievement of students with mild to

**Figure 4**  
 Number of Students Scoring Advanced or Proficient on Grade 10  
 MCAS in Harvard, MA (2004-2005)



moderate special needs, the severity levels that account for over 70 percent of all special education students. Their answers sounded more like slogans than a plan: “Meet the child’s needs,” “Whatever it takes,” “Specialized instruction.” When pressed to explain what a teacher should do as part of these so-called theories of action, 96 percent confessed they didn’t actually know how the buzzwords could be translated into actions in a classroom.

Fortunately, there are three strategies for boosting achievement among mild to moderate special needs kids that are both effective and cost-effective: relentlessly focusing on reading, shifting responsibility to general education, and maximizing student time with content expert teachers.

### *Reading, Reading, Reading*

In real estate, as the adage goes, only three things matter—location, location, and location. Likewise, to raise the achievement of students with special needs, only three things matter—reading, reading, and reading.

- Nationwide, 40 percent of all students in special education have reading as their core challenge.<sup>8</sup>
- Fully 80 percent of students nationwide with the disability “SLD” (specific learning disability) struggle with reading.<sup>9</sup> SLD is the largest disability group, accounting for over 40 percent of students receiving special education services.

- Reading is the gateway to all other learning. Social studies, English, and science cannot be mastered without strong reading skills. Even today’s math instruction is word problem-intensive.

In Arlington, MA, a relentless focus on reading reduced the number of struggling readers by 68 percent. Some urban schools have achieved 95 percent of students reading at grade level. When students can read, not only do their lives change for the better, but referral rates to special education drop by as much as half!

If we look deeper into the research from the National Reading Panel (NRP), the Department of Education’s What Works Clearinghouse, and the experience of best-practice districts, we find that a proven, cost-effective plan for teaching reading to struggling students exists.

The key elements include:

1. Clear and rigorous grade-level expectations for reading proficiency.
2. Frequent measurement of student achievement and growth, which influences instruction.
3. Early identification of struggling readers, starting in kindergarten.
4. Immediate and intensive additional instruction for struggling readers, averaging 30 minutes a day and using more than one pedagogical strategy.
5. Remediation and intervention that is seamlessly connected to each day’s full class instruction.

6. Balanced instruction in the five areas of reading (phonemic awareness, phonics, fluency, vocabulary, and comprehension) as part of a 90-minute per day literacy block.
7. Explicit instruction in phonics in the early grades and comprehension in the later grades.
8. A skilled teacher of reading.

While this plan is well-known, it is seldom followed. Most students with special needs do not receive reading help that even faintly resembles the best practices. In a survey of 165 schools in Massachusetts, only 15 percent came close to following these guidelines.

If so few schools adhere to these best practices, one might assume the plan is controversial or contested. Not so. In interviews with hundreds of elementary principals, classroom teachers, and special education directors, virtually all expressed a desire to implement the NRP recommendations, but they reported that they don't have the funding. None realized that they were already spending 2 to 5 times as much on special education services that weren't as effective.

So how much extra does it cost to fully implement the NRP best-practices compared to the typical reading program? With the special education teachers, paraprofessionals for helping special education students with their academics, reading tutors, Title 1 aides, and other invention programs that are included in many current reading programs, the NRP program costs less for most school districts. In a spot review of six districts spanning small suburban to large urban, all spent at least twice the cost of the NRP program on a smattering of less effective efforts. Some spent five times as much with little to show for the expense.

#### *Vesting Responsibility in General Education*

The second strategy for raising the achievement of special education students does not even involve the special education department at all. Rather, it aims to redesign what and how struggling students are taught in general education.

At its core, special education exists to help students with disabilities learn when their disability gets in the way of learning in general education. The IDEA legislation that has governed special education since 1976 is clear: having a disability does not qualify a student for special education services; only when the disability prevents the student from achieving in general education are they eligible for services.<sup>10</sup> On a less legal note, parents and teachers are not motivated to refer a child to special education if the student is already achieving at grade level. The key element of reducing special education costs is therefore to help students learn in general education, so that fewer students ever need special education.

This helps in two main ways: First, if students never fall behind, they are more likely to graduate. Struggling students often feel labeled as "losers" and are more likely to tune-out or drop out. Second, special education services are the most expensive form of remediation and intervention. The testing, meetings, and paperwork require many staff hours. Auxiliary services, such as speech and language or occupational therapy are unlikely to be requested absent a referral to special education, but are often tacked on to the student's Individualized Education Program (IEP).

For decades, students with special needs had been excluded from the general education setting and relegated to special classes, often in the basement, with few materials, scant curriculum, and no expectations of success. Inclusion, the practice of allowing students with special needs to participate in general education classrooms, became the solution to ineffective, down-in-the-basement special education programs. These more rigorous classes, according to theory, would lead to better results. The commitment to inclusion as a philosophical imperative and a civil right remains strong. Some states like Connecticut mandate that 80 percent of the students with special needs be taught in general education classrooms at least 80 percent of the day, and many districts religiously track minutes of student inclusion daily. However, the same attention to tracking details is largely non-existent when it comes to tracking student achievement.

Inclusion, as a philosophy, is consistent with the values of most school systems, but it is not, in and of itself, a means to close the achievement gap. O’Keeffe and Henderson reviewed all research that evaluated the impact of inclusion, focusing on the disabilities most likely to be included in the general education setting—learning disability, autism, and intellectual disability.<sup>11</sup> In their survey of 38 studies from 1996 to 2009, their most striking finding was that none of the research measured academic achievement. Instead, all of the research focused on social acceptance and peer interactions. This bias in academic research reveals a broader bias in the conventional thinking regarding inclusion: deep down, we have embraced it for social gains, not for learning gains.

**By vesting more responsibility for special needs kids in the hands of general educators, especially content expert educators, schools can save funds while putting kids in front of the best trained teachers.**

After moving to an inclusion model, however, schools quickly remembered why some children need a special class. In general education the pace is too fast, and special education students feel embarrassed to ask questions and become distracted in large classrooms. Instead of working to do more for special needs students in their classrooms, general education teachers have often passed the responsibility off to supplemental, and often costly, educators through adding paraprofessionals, co-teaching, or sending kids to resource rooms. In all models, the special education staff has been tasked with making inclusion work while general education teachers focus on the rest of the students. The result has been lots of time spent in the general education classroom, not much learning, and very high costs. By vesting more responsibility for special needs kids in the

hands of general educators, especially content expert educators, schools can save funds while putting kids in front of the best trained teachers.

#### *Maximizing Class Time with Content Expert Teachers*

When I was a superintendent, I would spend about two hours a week visiting classes. One day, in a special education room in a secondary school, I watched a bright, caring, passionate veteran teacher stand at the board and try to explain the day’s math to one student, Earth science to another, biology to a third, and U.S. history to a fourth. This was the “extra help” intended to allow students with special needs master rigorous grade-level material.

Several thoughts hit me at once: (1) We would never allow this teacher to teach any of those subjects to general education students, as she was not certified in any of the fields. (2) Every student sitting in front of her had already been taught that day by a certified teacher in that subject and was still struggling. We were sending the students to a generalist after they had not learned the material from an expert in the field. (3) Not a single general education math, science, or social studies teacher would agree to teach outside their field, yet we expect special education teachers to teach all subjects. This all seemed crazy.

In many districts, the situation is even more nonsensical. It is common for students struggling in math or English to be removed completely from the regular math or English classes and have a “replacement” class instead. This means a student who has difficulty learning will never have a teacher trained in math or English, only a special education teacher who often has no formal training or expertise in the subject. This model also assumes that no extra time on task is needed. If an hour a day with a math teacher would not be enough, why do we think an hour a day with a non-math teacher is sufficient?

In best practice districts, the general education teacher is the primary instructor for students with mild to moderate special needs. Instead of decreasing the scope or rigor, classes for



struggling students must teach the standard curriculum. The expectation for these students should be the mastery of the same grade-level content as their peers; it will just take them longer. By shifting resources from special education to general education, students with special needs can take the same class for two periods a day in order to have twice the time to learn the material. Class size can also be reduced to 12 to 15 students to allow time for students to ask more questions and to foster individual instruction.

The concept of increasing the time on task and providing extra help, rather than watering down the content, is very consistent with the “standards-based education” movement. Many districts that have closed the special education achievement gap have embraced standards-based education for all students; in fact, these districts often did not think of it as a special education effort at all.

Improving special education through this approach can basically be free. Funding the smaller and extended-time general education classes requires simply shifting FTEs from the special education budget to the math, English, or reading budget; no additional staff is required. Indeed, good instruction and extra help in general education actually reduces the number of students referred to special education, helping the budget further.

### **Rethink How We Deploy Support Staff**

The largest portion of special education spending goes to special education teachers, who are trained in the law, know how to identify disabilities, and are steeped in theories of learning. They are not, however, trained in math, English, or reading, even though most of a special education teacher’s day (about 60 to 75 percent in a random sampling of districts) is spent providing academic instruction. In one affluent district, special education teachers provided 100 percent of extra reading help despite the fact that only 5 percent of them had training in teaching reading. In another district,

## **Behaviorists**

### *A Smart Special Education Investment*

If school districts spent more on behaviorists, both students and the budget would benefit. Most people don’t know what a behaviorist is or does—I didn’t. What I did know was that the number of students with significant emotional issues was increasing, often starting with students as early as kindergarten. The typical “solution” was to hire a 1:1 paraprofessional to shadow the student. This \$150,000 expense (5 years at \$30,000 per year), doesn’t typically treat the root of a behavioral problem; instead, the paraprofessional often just removes the student from the room when a problem occurs. Conversely, behaviorists, specially trained to treat underlying causes of behavior or emotional problems, can address the root causes of the issue.

In one instance from my experience, an elementary teacher advocated strongly for a 1:1 aide for a student prone to outbursts in class. After a review revealed that the outbursts were infrequent, a behaviorist was brought in instead. She observed the student, identified the triggering factors, created a behavior plan for both the student and teacher, codified the warning signs, and coached the teacher. Within a few weeks, no one thought an aide was still needed. Rather than mask the problem by assigning an adult to remove the student during outbursts, the student was taught to minimize the unacceptable behavior. Not only will the student be much better prepared for class and life, but the district also saved the cost of a paraprofessional for five or more years with just a few days of a behaviorist’s time.

principals persuaded parents to remove reading from their child's IEP so that the students could see the general education reading teachers rather than special education staff, who aren't reading teachers at all.

To make matters more problematic, districts have rushed to address the content expertise gap of special education teachers by embracing the costly practice of co-teaching.

### *Co-Teaching*

Few ideas have captured the imagination of special educators more than co-teaching, the practice of teaming a special education teacher with a general education teacher in a regular classroom for students with and without an IEP. The hope is that the general education teacher provides content expertise and the special educator provides modifications and accommodations to students with special needs (and perhaps all the children in the class). Proponents of co-teaching extol it as "the best of both worlds," because it "brings children together rather than separates them" and "finally knocks down the walls between general education and special education." Unfortunately, co-teaching is like dieting. Lots of people want to lose weight and look good in a bathing suit, but actually doing so is hard.

National research indicates that co-teaching seldom raises student achievement. John Hattie, in his epic review of educational research, notes that no studies have shown student gains from co-teaching, and that, on average, co-teaching actually produces less learning than a class with a single teacher.<sup>12</sup> Interviews with hundreds of staff who co-teach revealed a stark divide, with general educators dwelling on special education teachers' lack of qualifications—"They don't know the material any better than the kids"—and special education teachers emphasizing the lack of respect from general educators—"They treat me like an overpaid paraprofessional."

Why the passion for co-teaching? Because classes taught by special education teachers aren't working, and co-teaching is an attempt to infuse content expertise and grade-level standards into special education. In many

districts, co-teaching is a rejection of the past more than it is a coherent theory of action.

When proponents of the co-teaching model are pressed on how to make co-teaching effective, the common answers are:

1. Pair the general education and special education teacher for many years, so they learn how to cooperate.
2. Provide one period a day for both teachers to plan lessons, so that the special education teacher is not seeing the material for the first time when presented to the students.
3. Provide professional development to increase the special education teacher's content knowledge.
4. Set clear roles for each partner and provide paraprofessionals with support.

These steps would be a big help, but they are awfully difficult to pull off and raise a lot of questions. Teacher turnover and bumping based on seniority make long-term teacher pairing rare; how will teachers learn to coordinate and work together? A common planning period requires a reduced teaching load, costing \$30,000/year in extra staffing per co-taught classroom; what about districts who can't afford this expense? Moreover, how many

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Tuesday afternoon professional development sessions will it take to make a non-math teacher a skilled teacher of math? And, what exactly should the special education teacher do while the general education teacher is presenting the material at the board? Can a student listen to two teachers at once? In nearly all districts co-teaching is in lieu of extra help; how can we

expect struggling students to improve when they're getting less instructional time? Good co-teaching is, in short, hard, and when done ineffectively, it can be harmful to students. Co-teaching is also very costly; it requires two teachers, a reduced teaching load for both teachers, and lots of professional development.

For reformers who think this is an easy case to make to districts, a cautionary tale: One district that "loved" co-teaching determined, based on student growth scores, that it had zero benefit compared to similar classes that had just a single general education teacher. This was despite an incremental \$5.4 million investment in co-teaching. When presented with the data, staff supported continuing the co-teaching model because it was "so important." Why smart, caring people would maintain a costly, ineffective practice will be explained in the subsequent section on organizational structure.

Beyond co-teaching there are many examples of other special education dollars that are spent with few gains to show as a result.

#### *Supporting Therapists and Paraprofessionals*

Special education teachers are supported by legions of related service therapists, who provide speech and language, occupational, and physical therapy. While these professionals are important for some students—in full disclosure, I had five years of speech therapy, and it changed my life—they have gained "protected status" while reading, math, and English teachers are expendable in tough budget years. Most districts have many more speech and language therapists than reading teachers.

A statewide study of every general district in Massachusetts found dramatic swings in staffing levels for these types of related services and zero correlation between increased support staff and student achievement.<sup>13</sup> Based on press reports, few, if any, related service staff have been cut during the last few difficult budgets, while many general education staff have been let go. For some districts these can be big lines in the budget. For example, a district of 6,500 students where I used to work was spending over \$8.5 million in special education support staff. A detailed review indicated all student

needs could be met (better met, in fact) for half the cost, a savings of \$4 million, with better scheduling and some outsourcing.

The last line item that can be trimmed and redirected to support what works is a non-teacher line item—paraprofessionals, a.k.a. teaching assistants or aides. The same statewide study that showed no connection between performance and therapist support in Massachusetts found a negative correlation between the number of paraprofessionals and academic achievement. This is a powerful example of the need to spend wisely. Originally conceived as a low cost solution, paraprofessional spending has ballooned in some districts, to the detriment of students and tax payers. Some districts so fully embrace paraprofessionals that 80 percent of academic support is provided by untrained, non-certified staff.

The use of paraprofessionals for inclusion remains very popular with teachers, parents, and principals, and it's a big budget item. In fact, according to the U.S. Department of Education, the number of paraprofessionals in public school systems increased 123 percent between the mid-1980s and the mid-2000s.<sup>14</sup> Paraprofessionals are often seen as the most effective form of support for students with special needs. Parents fight hard to "win" a teaching assistant for their child, justifying the considerable expense due to the huge anticipated benefit. Research by the U.S. Office of Special Education, however, cautions schools that the use of paraprofessionals, like many other well-intentioned special education practices, is often ineffective or even sometimes harmful for children.<sup>15</sup>

An aide hovering beside a student creates a social barrier, stifling peer interaction and defeating one of the primary benefits of inclusion. What's more, a 1:1 aide can *decrease* the instruction a student gets from the classroom teacher, who may actually think that a student with an aide already has 100 percent of an adult's time, unlike classmates without aides. The students with the greatest needs consequently get the least attention from the teacher certified in the subject matter, which is



even more troubling when we look more closely at the credentials of paraprofessionals. In hundreds of classroom visits, I have observed that many paraprofessionals have only a high school degree, and very few have any formal training as a teacher. In the worst case, the aide actually does the work for the student under the guise of helping. It is not uncommon that an “A” student will fail a test if his/her aide is absent.

Optimizing the benefits of aides with an eye to cost-savings can be achieved by more effective management support and strategic scheduling. Effective management of paraprofessionals is seldom the case in most districts. In a typical district with 200 or more aides, as I’ve encountered, almost none of the aides will have a supervisor, and many years will pass between systemic reviews of paraprofessional scheduling. The decision to add an aide to a student’s IEP is typically made independently—without considering what other support exists in the classroom or building.

When paraprofessionals are needed, sophisticated scheduling can allow fewer aides to help more students—up to three times more students. It pays to be very specific about what a student needs and then to target the help. Is math the subject in which the student struggles? Provide an aide during math but not for art, music, and language arts. Is transitioning from home to school the problem? Provide the aide for two hours in the morning, and then let the aide help in another room. Districts can also find cost-savings by using preexisting staff more effectively. For instance, highly trained student-teachers do not count as support under many IEPs. With just slight changes in the wording of some IEPs, schools can assign aides to classes rather than to individual students and use student teachers when available to avoid redundancy.

Parents, teachers and school districts want to help struggling students succeed, but spending money on failed strategies such as co-teaching and paraprofessional support doesn’t help children or taxpayers. In order for special education services to be both effective and efficient, schools and districts must be more

strategic with how we approach instructional support and scheduling. One way to help us towards that goal is to be more serious about building out and leveraging school performance and student achievement data.

## Design and Apply Measures of Effectiveness

No aspect or department affiliated with public education gathers more data than special education, and yet, special education departments make far too many decisions in an information vacuum. The problem is that most districts have the wrong type of data. They collect compliance information as required by state and federal regulations, but they actually need management and comparative data. The relative usefulness of these types of data, though it may not be instantly apparent, is highly divergent, and focusing on the wrong information can lead to ineffective policies.

Take paraprofessional staffing for example. *Compliance data* measures how many staff hours required per IEP are actually delivered each day. *Management data* assesses whether students with paraprofessional support are learning more than those without it. *Comparative data* lets a district know whether it has a higher or lower number of paraprofessionals, adjusted for total enrollment and other factors, relative to similar communities.

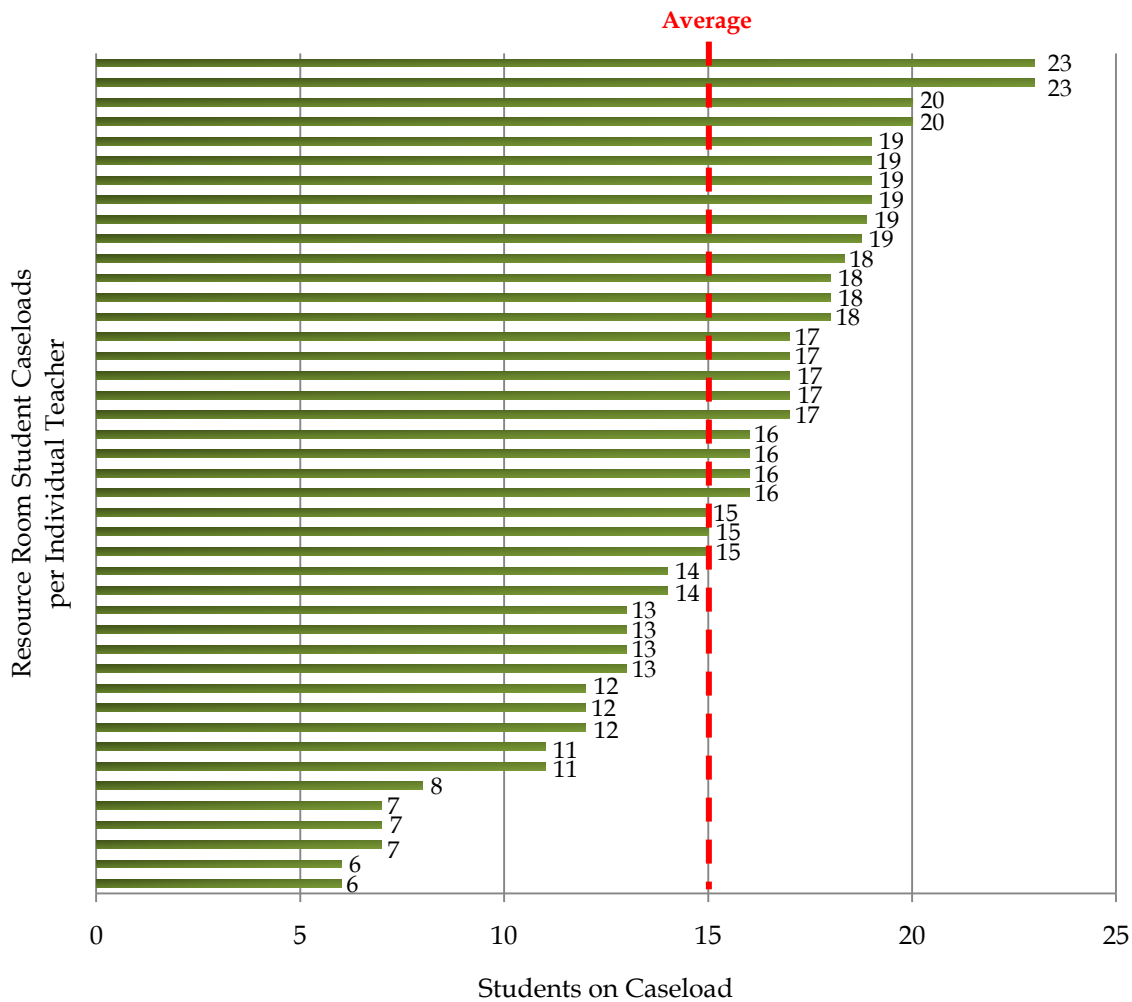
### Management Data

To better understand how the lack of usable data affects special education, we’ll first look at the impact for management data. Unfortunately, few districts track even the most rudimentary management metrics, such as:

- Number of students each special education teacher services
- Number of hours per week each therapist works with students
- Number of paraprofessionals in each school

Why is this information important? Because in the same district, some teachers support twice as many students as others, and some therapists provide twice as much service to students;

**Figure 5**  
Resource Room Student Caseloads per Teacher



further, nobody, not even the teachers and therapists themselves, know this. These very large swings in caseload or workload often occur because special education staff typically make their own schedules and have limited oversight. Even if an administrator wanted to manage their staff efficiently, the data to make thoughtful decisions isn't available. As the business adage says, "What gets measured gets managed," and in special education, this lack of management has become increasingly costly.

General education teaching loads or class sizes are hotly debated and closely monitored. Special education caseloads or class sizes, on the other hand, are left entirely to the teacher themselves.

In nearly every district I have visited, special education therapists decide whether to provide services in groups of 1, 2, or more. Special education teachers in many districts decide whether they will go into a classroom to help 1 or 2 students or pull students from class and help 5 or 6. This is analogous to letting elementary classroom teachers choose whether they have 12 or 24 students in their room each year.

Managing group size can reduce staffing requirements by 40 percent in many districts. In a district of 5,000 students, this could mean over \$2.5 million in reduced costs. The common pushback from staff is that special education is

about student needs, not FTE optimization. This is true, but group size is driven mostly by adult wants, not student needs. In district after district, research has shown that therapist preference drives group size and service delivery. In short, some staff do small groups, some do 1:1, others do push-in (the special education teacher goes into the regular classroom to assist 1 or 2 students), and others, pull-out (the special education teacher provides extra help to 5 -8 students during a study hall). The instruction and support a student receives are thus subject to the whims of fate and the staff to which they are assigned. With better management data, schools could systematize IEP assignments to optimize the quality and

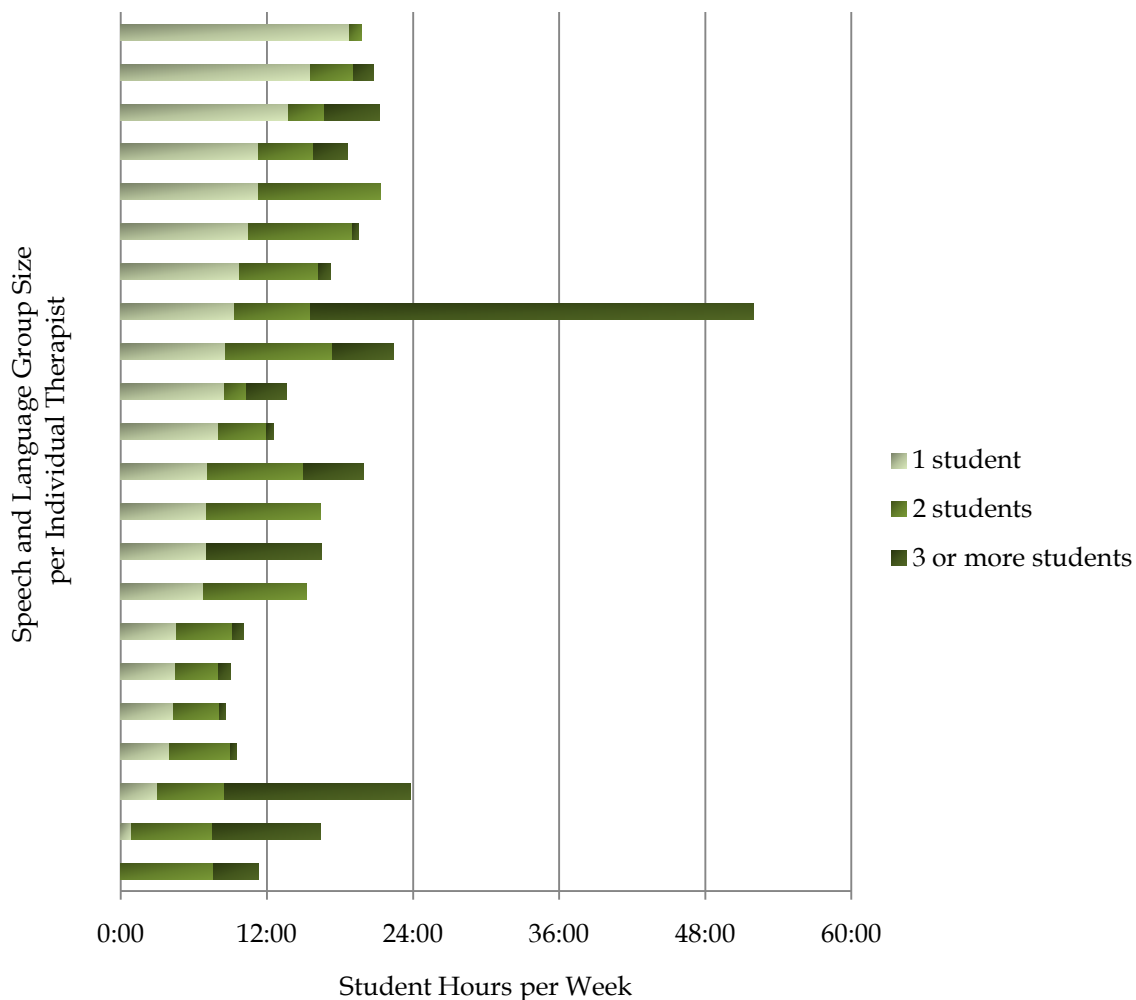
appropriateness of staff pairings.

*Comparative Data*

The management data discussed above describes how a district has allocated its resources—in the past tense. Even more powerful data enables a district to decide proactively how it *will* allocate resources by comparison to similar efforts.

Without an ability to compare, management data is of less value because we aren't learning from other practices already in place. The ability to compare, or benchmark, is essential if schools and districts want to avoid reinventing the wheel each semester. For instance, if

**Figure 6**  
Speech and Language Group Size per Therapist



comparative data indicates that high-performing districts have only one special education teacher for 35 students, and the national average for therapists is 24 students, then it becomes obvious that an opportunity to be more efficient exists. We have seen such comparisons used to great effect in other areas of K-12. Marguerite Roza of the Gates Foundation and the Council of Great City Schools' Mike Casserly both offer a number of ways to use performance, inventory, and staffing metrics from multiple schools in order to identify possible areas for cost-savings.<sup>16</sup>

Comparative data presents the greatest opportunity to shift funds and reduce special education costs while raising student achievement. Why is this a big opportunity? Two reasons: 1) There is no correlation between more services and higher achievement; quality of service matters more than quantity. 2) There is enormous variation in the amount of service and staff provided from district to district.

#### *Identifying Students with Disabilities*

A large part of this variation in implementation and spending stems from a paradox in special education decision-making. Measuring student abilities and disabilities is done with a highly sophisticated test which often takes up to six hours to administer and a few more hours to score. The results are detailed, numeric, and nationally normed; they are also basically ignored in far too many districts.

In surveys and interviews with hundreds of special educators across the country, almost no one could articulate what threshold score or combination of scores would indicate a disability. The few who did have a benchmark in mind were quick to point out that it is not always followed. It is common for staff members to use different test instruments in each school building within the district, making it impossible to create district-wide guidelines. Survey data indicate that most special educators feel that, despite lacking formal criteria, they are able to make consistent decisions, essentially guided by logic similar to that which Justice Stewart used to define pornography: "I know it when I see it."

National and district data, however, suggest otherwise, as wide variance persists. For example:

- Children in Iowa are four times more likely to be found to have a learning disability (LD) than those in Kentucky.<sup>17</sup>
- In one district, 95 percent of students with learning disabilities also receive speech and language services, while in other districts less than one-third do.
- Within a single district, a student could be five times more likely to receive a full-time paraprofessional at one school than if they attended another school in the same district.

The lack of guidelines has significant impact on both students and the budget. Under-identification denies students needed help while over-identification pulls students from the regular classroom and often provides them less rigorous material. The lack of consistent identification criteria also has a significant financial impact. Over-identification requires a district to increase staff, and the arbitrary nature of the decision fosters conflict between parents and the school district.

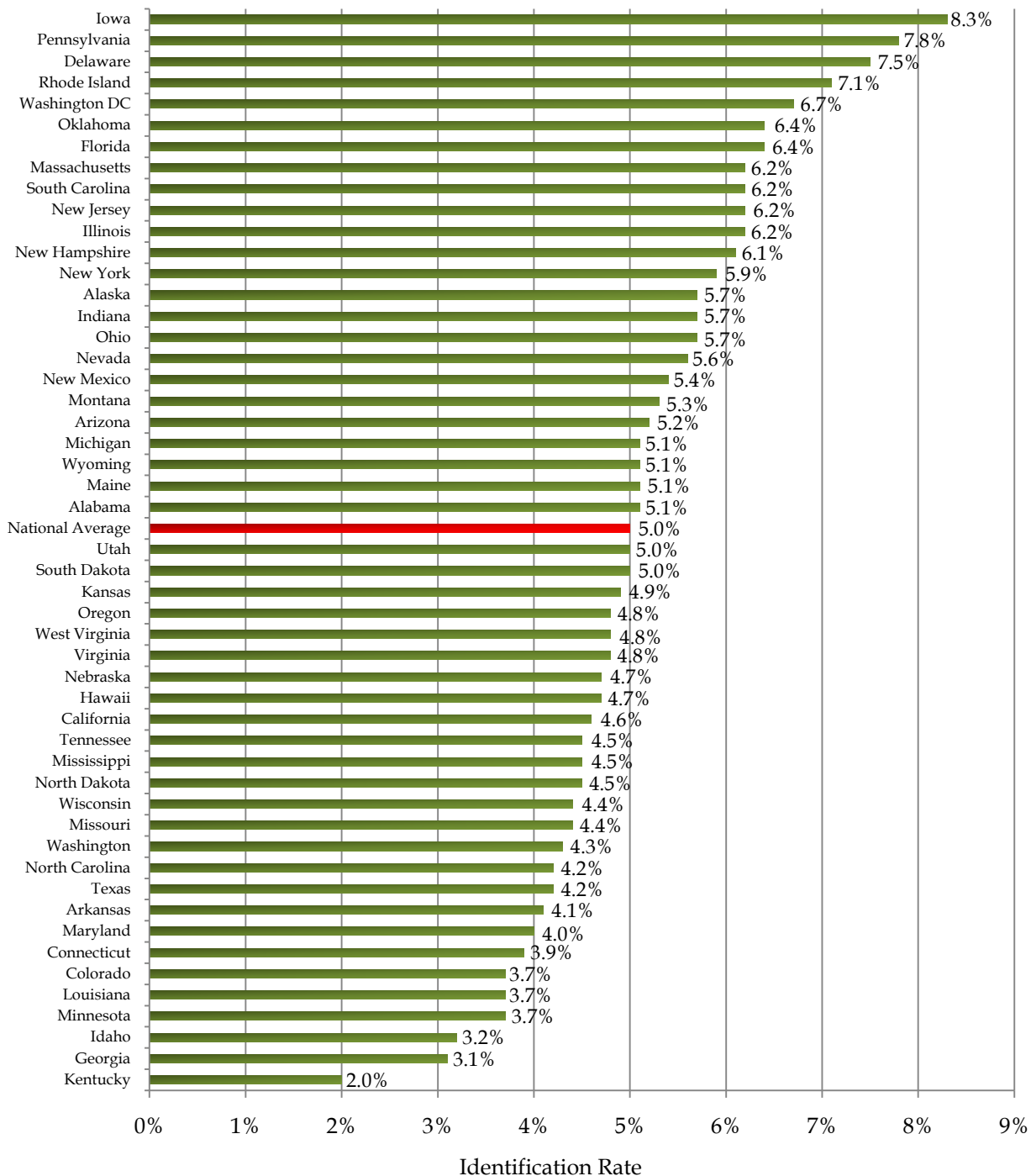
### **Align Management Skills with Responsibilities**

Of the last 100 special education directors I have met, all have been extremely hard-working and passionate about kids. I cannot think of any special education directors, however, who are former math teachers, reading teachers, business managers, or even classroom teachers. This lack of an academic or management background puts many directors in a difficult position to make decisions outside their expertise, often leading to suboptimal organizational structure and leadership.

#### *Leaders with the Wrong Skill Set*

In most districts, you become a special education director by starting out as a special education teacher, a psychologist, or a speech therapist. This useful but narrow set of experiences is of little help when special education directors are asked to oversee math and English instruction for kids with IEPs,

**Figure 7**  
**Specific Learning Disability Identification Rate per State**



manage a vast budget, and coordinate complex scheduling and transportation. Research on district leadership skills reiterates this problematic disparity. In our review of about 50 districts of all types and sizes, for example,

fewer than 10 percent of the special education directors (or their staff) could access basic financial trends, staffing patterns, or a listing of major subcontractors and their hourly rates.

How can a district control costs when it can't even measure them?

The mismatch of skills and responsibility may be acceptable if the special education director has a team with diverse skills or benefits from lots of cooperation from other departments. But nearly all of the members of the special education leadership team in most districts have a similar background to the director. Certainly all districts have the full gambit of skills needed to complement the special education team, but walls, often walls topped with barbed wire, are erected around most special education departments. Curriculum experts and business managers are kept out by the siloed nature of school departments and they are often happy to stay out. "It is so legalistic. I would be afraid to help," said one CFO. The result is that instead of a skilled and experienced CFO, we often see a secretary managing the bills and drafting the special education budget.

The current special education organizational structure of most districts isn't likely to raise achievement or lower costs. The desire to hire similar people and to preserve individual departments makes it unlikely that special education teacher positions will ever be swapped for general education staff, and thus, these departments will never be able to take advantage of the best practices of general education-led instruction. This is unfortunate, since some general education-led strategies can raise achievement and reduce staff needs by a few million dollars for a 5,000 student district. We needn't take this as an indictment of special education directors, but merely as a reflection of non-expert and under-resourced management.

#### *Redesigning Special Education's Organizational Structure*

A new organizational structure, centered on student achievement that combines interrelated functions and responsibilities, will greatly increase student learning. The gains in Arlington, MA, or the outstanding results in Harvard, MA, were possible only because curriculum leaders led the reading, math, and English efforts, and a strong financial team from the business office took the reins of the budget.

Any new structure should clearly establish four areas of responsibility, each led by an administrator with the appropriate skill set: 1) student learning, 2) special education daily operations, 3) social and emotional support, and 4) finance and operations.

## Common Pitfalls of Misaligned Special Education Management

- ❖ The special education department is tasked with developing curriculum for struggling students, when the math and English departments are better trained.
- ❖ Special education transportation in smaller districts is often relegated to a secretary, even though it requires hard bargaining and logistical expertise.
- ❖ Most therapists make their own schedule, but not all therapists are good schedulers.
- ❖ Overseeing obtaining Medicaid reimbursement is often a small, last priority for an overwhelmed special education clerk, who doesn't have the time to maximize revenue.
- ❖ Districts with hundreds or even a thousand paraprofessionals often have no one who oversees them.
- ❖ Special education teachers are asked to run IEP team meetings and enforce discipline when it comes time to hand out services. Since they are teachers, not administrators, they are reluctant to overrule their colleagues. A forceful meeting leader will have no place to eat lunch in the teacher's room the next day.
- ❖ Many districts belong to collaborative or regional service centers, which provide services for children with very significant needs. It is presumed that these co-ops are cost-effective, but typically no one in the district is charged with controlling these costs.



*Student learning* would encompass curriculum, instruction, professional development, student data, RTI, reading, remediation and intervention, and everything else related to student achievement for both general education and special education students. There should be no organizational separation between general education and special education academics so that special education math and reading teachers and paraprofessionals could be hired by and report primarily to the head of math or reading, not the special education director.

*Special education daily operations* would include legal, compliance, IEP testing, related services, and other issues not directly related to student learning. Highly specialized programs (self-contained classes) for students with severe needs should also be part of this area of responsibility. The current special educator director could maintain responsibilities for these functions, which is in line with their training and experience.

*Student social and emotional needs*, including guidance counselors, social workers, and community-based providers, would constitute the third major area of responsibility. Since these types of supports are provided to students with and without special needs, it makes sense to merge any similar general education efforts as well. A head of guidance or a lead school psychologist could run this area.

*Finance and operations* would be run by the business office, not the special education department, and would oversee budgeting, transportation, and expense management. There is no reason that the district CFO shouldn't have primary responsibility for all financial matters, including helping set and manage the special education budget, collecting comparative data, and assisting in determining what practices are cost effective. This may seem like a stretch in some school districts, but most private sector CFOs take on similar roles.

This structure aligns responsibility with skills and brings all the necessary players onto one team, breaking down the silos and reducing the fractured, disconnected support special education students often receive. The new

organization structure will benefit students and taxpayers alike. The other changes outlined in this paper are much more likely to be implemented through the revised leadership structure. It aligns incentives, such as not wanting to protect jobs in one area like special education math vs. shifting to general education math, and infuses much more financial management expertise into the effort.

## Policy Implications

School districts can implement changes to raise achievement of students with special needs while reducing costs, but it's not easy. State and federal agencies can make doing more with less easier by supporting five changes:

1. Focus regulatory oversight on outcomes not inputs.
2. Don't restrict grant dollars to the special education department.
3. Redefine Highly Qualified teachers under NCLB.
4. Collect different types of data.
5. Create unambiguous standards for eligibility and services.

*Focus Regulatory Oversight on Outcomes not Inputs*  
The current system of oversight ensures every special education dollar is spent, but it doesn't ask if it was spent wisely or effectively. The maintenance of effort (MOE) rules, which are part of the federal IDEA (Individuals with Disabilities Education Act) legislation, exemplify this. Each district is audited by the state department of education to ensure they did not reduce spending on special education year to year. While there are lots of ins and outs to the law, most special education directors interpret the intent that increased cost-effectiveness means increased (and unwelcomed) state attention. Other parts of the IDEA regulations reinforce this by decreeing that cost cannot be a factor in determining what services are placed on an IEP. On a practical level, once a service is added to an IEP, it is very difficult for a district to cut back without a parent's consent. Even if a student is doing well, most parents

understandably want the help to continue, so costs keep increasing year by year.

In short, there are powerful forces that drive us to offer “more,” but where are the forces that demand “better”? I attended legal negotiations with a parent who wanted more private reading tutoring. The district was spending \$12,000 per year, and the new plan would cost \$18,000. Why the increase in hours? Because the student had made zero gain in three years! No one thought it odd or acknowledged that this was a failed strategy for the child, but parent, staff, and lawyers thought that more had to be better.

The letter and the spirit of the law completely remove the concept of cost-effectiveness from the discussion. When looking for a placement for a student with severe needs, my out-of-district coordinator identified two schools that would be “perfect” for the student. One cost \$45,000 per year, and the other, \$85,000. I said, “That’s simple. If both are good, then let’s recommend the less expensive one.” The director turned white, looked around the room to be sure no one heard and then scolded me. “It’s illegal to consider the cost! It’s whatever is best for the child.” In the end the student went to the more costly program, mostly because the ride was ten minutes shorter, and the following year, one more teacher had to be let go in order to balance the budget. In a world of declining resources, this can’t be a good decision, and the law shouldn’t encourage it.

#### *Don’t Restrict Grant Dollars to the Special Education Department*

The most recent authorization of IDEA included an important provision that allows 15 percent of federal special education grant funding, in certain situations, to be spent on “early intervening services,” which can include general education remediation and intervention. This is a step in the right direction, but limiting funds intended to help students with disabilities to just special education teachers prevents districts from employing efforts that are proven to help students and cost less.

**I have never heard a single school leader say, or even hint, that special education laws have helped them to do more with less.**

Students who struggle benefit greatly when their remediation and intervention is tightly connected to their core general education instruction, but restricted grants make this seldom the case. Each funding source--IDEA, Title I, and the operating budget--creates a separate staff and program, making integration very difficult, instruction less effective, and costs higher. For instance, in some states like Wisconsin, IDEA-funded special education staff cannot teach classes that also include general education students, once again forcing parallel and duplicative remediation efforts. Block grants from the federal government with fewer strings would increase both effectiveness and cost-effectiveness by allowing general education teachers to provide more instruction to students with special needs.

#### *Redefine Highly Qualified Teachers under NCLB*

NCLB’s highly qualified teacher requirement hasn’t helped students with special needs. The concept of Highly Qualified is great--a skilled teacher in every classroom will help special education students as well as general education--but what skills matter? In most states, the certification required by NCLB to teach reading or math to students with disabilities is certification in special education, not in reading or math. This wouldn’t be allowed for other students. Only a reading teacher can provide reading instruction to general education students, but in many states means that the same reading teacher is prohibited from providing reading instruction to students with special needs, while an untrained paraprofessional can provide instruction.

A few states have adopted a dual certification standard for Highly Qualified teachers, meaning that special educators with no passion or expertise in math can take a few classes to add the math certification. This isn’t sufficient; a great general education math teacher is still a better option for most students who struggle in math. States have the authority to define what they mean by “Highly Qualified,” and they



should take advantage of this authority to revise regulations--and help raise achievement at no added cost--so that content expertise, not training, is the rule in special education.

#### *Collect Different Types of Data*

Most school districts feel overwhelmed by the volume of data submitted to the state, and in turn, to the U.S. Department of Education. It is therefore with reluctance and sheepishness that I suggest that more data should be collected. The current data, which focuses on compliance, not management, has proven unsuccessful in helping district leaders make cost-effective and productivity-based decisions. I offer two specific types of data that could reap significant benefits for student achievement and cost-saving if supported by federal or state efforts.

One, districts need nationally-normed, growth and proficiency reading data at least three times during the school year in grades K-3. Nearly all educators agree that students who struggle to read in third grade would have benefitted greatly from early interventions in kindergarten or first grade, but the reading data required by No Child Left Behind is only collected at the end of third grade, when it is likely too late. A state requirement to conduct already available and already nationally normed tests like DIBELS or DRA would place the appropriate focus in early reading and provide meaningful measures of district, teacher, and student success.<sup>18</sup>

Two, states should support comparative data efforts so that districts can know if their special education staffing levels are high or low, if too many or too few students are being served, and if their service delivery models are more or less effective or efficient. District-to-district comparisons are difficult without common definitions and consistent data; instead, a state department of education is well-suited to creating such common data standards, which in turn would allow districts to make much more informed and cost-effective decisions.

#### *Create Unambiguous Standards for Eligibility and Services*

The last area where policymakers can help districts help children and the budget is to define who is entitled to what services and

when services should end. It is odd that NCLB has set such hard measures of success--a score of 220 is OK, 219 is not--while IDEA is so vague that 100 people could look at the same child and write 100 widely different IEP's or recommend no IEP at all. While school systems generally embrace local control, the lack of unambiguous standards doesn't grant local control; it creates no control at all.

By not establishing clear eligibility requirements and standards for services, policymakers have created an adversarial environment between parent and district, which in turn places a premium on fighting for more services and procedural compliance rather than raising achievement and reducing costs. With eligibility subject to wide interpretation, parents who push get more for their children, and parents with advocates get even more.

It seems unfair to ask each teacher, IEP team, and school to decide where to draw the line. An unambiguous national standard, similar to the National Common Core State Standards being developed by the National Governors Association and the State Education Chiefs, would be fair to children and promote a reasoned discussion of service levels.

## Conclusion

For over 30 years, districts have increased special education spending and staffing. Many special education leaders have little experience in managing cost effectiveness, and many districts believe it is illegal to reduce special education spending. Even more think it is unethical.

In the 15 years I have been thinking about improving special education, I have never heard a single school leader say, or even hint, that special education laws have helped them to do more with less. There are concrete steps that policymakers can take to raise achievement of students with special needs while reducing costs. Now seems like an excellent time to start helping.

<sup>1</sup> Rennie Center for Education Research and Policy, *Seeking Effective Policies and Practices for Students with Special Needs* (Cambridge, MA: Spring 2009).

<sup>2</sup> Frederick M. Hess, "Getting Serious About Bang for the Buck," *Rick Hess Straight Up*, January 25, 2011.

<sup>3</sup> Data compiled from U.S. Department of Education, Office of Special Education Programs, Data Accountability Center. Available at [https://www.ideadata.org/arc\\_toc10.asp#partbCC](https://www.ideadata.org/arc_toc10.asp#partbCC); U.S. Department of Education, National Center for Education Statistics, State Education Data Profiles, Available at <http://nces.ed.gov/programs/stateprofiles/>.

<sup>4</sup> The Nelson A. Rockefeller Institute for Government, *What Will Happen to State Budgets When the Money Runs Out* (February 2009).

<sup>5</sup> Data based on author's personal research.

<sup>6</sup> Rennie Center for Education Research and Policy, *Seeking Effective Policies and Practices for Students with Special Needs* (Cambridge, MA: Spring 2009).

<sup>7</sup> Massachusetts Department of Education, District Profiles. Available at <http://profiles.doe.mass.edu/>.

<sup>8</sup> Rennie Center for Education Research and Policy, *Seeking Effective Policies and Practices for Students with Special Needs* (Cambridge, MA: Spring 2009).

<sup>9</sup> Rennie Center for Education Research and Policy, *Seeking Effective Policies and Practices for Students with Special Needs* (Cambridge, MA: Spring 2009).

<sup>10</sup> Public Law 108-446, 108<sup>th</sup> Congress, *Individuals with Disabilities Education Improvement Act of 2004* (Washington, DC: U.S. Congress, 2004). Available at [http://frwebgate.access.gpo.gov/cgi-bin/getdoc.cgi?dbname=108\\_cong\\_public\\_laws&docid=f:publ446.108](http://frwebgate.access.gpo.gov/cgi-bin/getdoc.cgi?dbname=108_cong_public_laws&docid=f:publ446.108).

<sup>11</sup> Suzanne O'Keeffe and Jennifer Henderson, "Lifting the Restrictions from the Least Restrictive Environment." Presentation at the 2010 Council for Exceptional Children Convention, Nashville, TN, April 21-24, 2010.

<sup>12</sup> John Hattie, *Visible Learning: A Synthesis of Over 800 Meta-Analyses Relating to Achievement* (London: Routledge, 2009).

<sup>13</sup> District and Community Partners report on Special Education for the Massachusetts Department of Elementary and Secondary Education (forthcoming).

<sup>14</sup> Connecticut General Assembly Legislative Program Review & Investigations Committee, *School Paraprofessionals* (2006). Available at [http://www.cilu.org/Docs/School\\_Paraprofessionals\\_%20Briefing\\_Report.pdf](http://www.cilu.org/Docs/School_Paraprofessionals_%20Briefing_Report.pdf).

<sup>15</sup> Michael Giangreco and Stephen Broer, *Guidelines for Selecting Alternatives to Overreliance on Paraprofessionals* (Burlington, VT: Center on Disability and Community Inclusion, University of Vermont, 2003). Available at <http://www.uvm.edu/~cdci/evolve/evolvegsa.pdf>.

<sup>16</sup> Marguerite Roza, "Now Is a Great Time to Consider the Per-Unit Cost of Everything in Education," and Mike Casserly, "Managing for Results in America's Great City Schools," both in *Stretching the School Dollar: How Schools and Districts Can Save Money While Serving Students Best*, eds. Frederick M. Hess and Eric Osberg (Cambridge, MA: Harvard Education Press, 2010).

<sup>17</sup> Data based on author's personal research.

<sup>18</sup> DIBELS (Dynamic Indicators of Basic Early Literacy Skills) is published by the Center on Teaching and Learning at the University of Oregon; available at <https://dibels.uoregon.edu/>. DRA (Developmental Reading Assessment) is published by the Pearson Learning Group; more information available at [www.pearsonschool.com](http://www.pearsonschool.com).