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**HOT AIR:**  
How States Inflate Their Educational Progress Under NCLB

By Kevin Carey

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## Critics on both the Left and the Right have charged that the No Child Left Behind Act tramples states' rights by imposing a federally mandated, one-size-fits-all accountability system on the nation's diverse states and schools.

In truth, No Child Left Behind (NCLB) gives states wide discretion to define what students must learn, how that knowledge should be tested, and what test scores constitute “proficiency”—the key elements of any educational accountability system. States also set standards for high school graduation rates, teacher qualifications, school safety and many other aspects of school performance. As a result, states are largely free to define the terms of their own educational success.

Unfortunately, many states have taken advantage of this autonomy to make their educational performance look much better than it really is. In March 2006, they submitted the latest in a series of annual reports to the U.S. Department of Education detailing their progress under NCLB. The reports covered topics ranging from student proficiency and school violence to school district performance and teacher credentials. For every measure, the pattern was the same: a significant number of states used their standard-setting flexibility to inflate the progress that their schools are making and thus minimize the number of schools facing scrutiny under the law.

Some states claimed that 80 percent to 90 percent of their students were proficient in reading and math, even though external measures such as the federally funded National Assessment of Educational Progress (NAEP) put the number at 30 percent or below. One state alleged that over 95 percent of their students graduated from high school even as independent studies put the figure closer to 65 percent. Another state determined that 99 percent of its school districts were making adequate progress, while others found that 99 percent of their teachers were highly qualified. Forty-four states reported that zero percent of their schools were persistently dangerous.

With the approval of the U.S. Department of Education, many states are reporting educational results under NCLB that defy reality and common sense. In so doing, they are undermining the effectiveness of the law.

Not all states have set lax standards. Some, like Maryland and Massachusetts, have worked hard to set a high bar for achievement and report honest information to the public. But the large variance in data reported by states that have set high standards compared to states with low standards further undermines the credibility of NCLB by creating significant and seemingly arbitrary differences in how the law impacts students and educators from state to state.

Principals and teachers in states that establish high standards under NCLB are under intense pressure to improve, while similar educators in states with low standards are told that everything is fine and they're doing a great job. Students in states that set the bar high for school performance have access to free tutoring and public school choice when their schools fall short; students in identical circumstances in other states must do without.

The result is a system of perverse incentives that rewards state education officials who misrepresent reality. Their performance looks better in the eyes of the public and they're able to avoid conflict with organized political interests. By contrast, officials who keep expectations high and report honest data have more hard choices to make and are penalized because their states look worse than others by comparison.

It is understandable, even predictable, that some state education officials would make these choices.

But their actions threaten NCLB. While the most high-profile opposition to the law has come in the form of lawsuits filed and public relations campaigns waged by national teachers unions, lax state standard-setting may actually be far more harmful to the law in the long run—not by attacking it directly, but by falsely asserting that most of its goals have already been met.

Policymakers and the public won't stand behind an education system that isn't truthful. Thus, federal lawmakers have no choice but to confront the historically contentious issue of how to balance federal and state responsibility for setting education standards. Unless steps are taken to bring state standards in line with reality, NCLB's credibility—and viability—are at serious risk.

## The Pangloss Index

Some states have inflated their performance under NCLB dramatically. To identify the states that report the most optimistic education results, this paper aggregates state rankings on 11 measures contained in the March 2006 state reports into a single ranking, shown on Table 1. Those measures include student proficiency rates in elementary, middle, and high schools, the percent of schools and districts making “adequate yearly progress,” high school graduation and dropout rates, school violence ratings, teacher and paraprofessional qualifications and teacher access to high-quality professional development. The highest ranked states reported the best combined results. (The data used to create these rankings can be found in the Appendix).

In a perfect world, this index would provide an accurate snapshot of education progress, showing parents and policymakers which states are providing the best education to their children and which have the most room to improve.

And some of the rankings seem appropriate—the District of Columbia, which ranks second-to-last on Table 1, also ranks below all other states on measures

**Table 1. The Pangloss Index**

State	Rank	State	Rank
Wisconsin	1	Rhode Island	27
Iowa	2	Pennsylvania	28
Connecticut	3	Georgia	29
Nebraska	4	Michigan	29
South Dakota	5	North Carolina	31
Kansas	6	Arkansas	32
West Virginia	7	Utah	33
Indiana	8	Washington	33
Idaho	9	Arizona	35
North Dakota	10	Kentucky	36
Tennessee	11	New York	37
Virginia	12	Louisiana	38
Mississippi	13	Massachusetts	39
Oklahoma	13	Missouri	40
Vermont	13	Oregon	41
Montana	16	Wyoming	42
New Jersey	17	Alaska	43
Minnesota	18	California	44
Colorado	19	Florida	45
Texas	19	South Carolina	46
Maine	21	Nevada	47
Alabama	22	New Mexico	48
New Hampshire	23	Maryland	49
Delaware	24	District of Columbia	50
Ohio	24	Hawaii	51
Illinois	26		

like the NAEP.<sup>1</sup> Conversely, some states that score well on the NAEP and other independent measures, like Connecticut, appear near the top of Table 1.

But as this report's analysis of the state-reported data shows, state rankings on Table 1 are driven less by real-world education success than by the penchant of some states to misuse their standard-setting flexibility under NCLB to define and report performance data that are contradicted by objective measures. That's why these rankings are called the “Pangloss Index,” after the character in Voltaire's *Candide*. Dr. Pangloss was an inveterate optimist, a man who insisted, in the face of all evidence to

the contrary, that we live in the best of all possible worlds. Far too many states are using their discretion under NCLB to follow Pangloss’ lead.

## Cream of the Crop?

The Pangloss Index ranks Wisconsin as the most optimistic state in the nation. Wisconsin scores well on some educational measures, like the SAT, but lags behind in others, such as achievement gaps for minority students. But according to the Wisconsin Department of Public Instruction, the state is a modern-day educational utopia where a large majority of students meet academic standards, high school graduation rates are high, every school is safe and nearly all teachers are highly qualified. School districts around the nation are struggling to make Adequate Yearly Progress (AYP), the primary standard of school and district success under NCLB. Yet 99.8 percent of Wisconsin districts—425 out of 426—made AYP in 2004–05.

How is that possible? As Table 2 shows, some states have identified the large *majority* of districts as not making AYP. The answer lies with the way Wisconsin has chosen to define the AYP standard.

**Table 2. District Adequate Yearly Progress**

	State	Percent of Districts Making Adequate Yearly Progress, 2004–05
Top Five	Delaware	100.0
	Wisconsin	99.8
	Arkansas	98.0
	South Dakota	98.0
	Michigan	96.3
Bottom Five	South Carolina	21.2
	Maryland	16.6
	West Virginia	9.1
	North Carolina	7.0
	Florida	6.6

NCLB requires states to base AYP designations on the percentage of students who score at the “proficient” level on state tests in reading and math. That percentage is compared to a target percentage, which must be met by both the student body as a whole and by “subgroups” of students, such as students from specific racial and ethnic populations. Districts that fail to make AYP for multiple consecutive years become subject to increasingly serious consequences and interventions.

Wisconsin has a relatively homogenous racial makeup and many small school districts, resulting in fewer subgroups in each district that could potentially miss the proficiency targets. But Wisconsin’s remarkable district success rate is mostly a function of the way it has used its flexibility under NCLB to manipulate the statistical underpinnings of the AYP formula.

AYP results are based on standardized tests, and all tests have a built-in margin of error. Students might do better or worse on a given test depending on the test-maker’s choice of questions. Test results can also vary due to other factors unrelated to student learning, particularly if the group of students tested is relatively small. For these reasons, the U.S. Department of Education allows states to adjust the AYP formula to give districts that miss proficiency targets by a relatively small amount the benefit of the doubt. This makes sense in theory—districts should only be labeled as inadequate if their students are truly not learning enough. But states like Wisconsin have exploited this flexibility to implement a whole *series* of adjustments, to the point where their AYP systems have essentially ceased to function.

## Statistical Games

Wisconsin starts by instituting a “minimum group size,” only measuring subgroups that contain 40 or more students. If a Wisconsin district has, for example, 38 Hispanic students, those scores are not counted, even if few or none of the students pass the test. Nearly all states use minimum group sizes, but many have chosen to measure groups smaller than 40.

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This is only the beginning. Even when subgroups are large enough, individual student test scores in Wisconsin are still given the statistical benefit of the doubt. If a student's score falls below the proficiency level, but falls within a range of scores called a "standard error," their score is considered to be proficient.

After that adjustment, the percentage of students who are proficient is calculated and then compared to the target percentage. In this comparison, the district is given the statistical benefit of the doubt *again*. If the percent proficient is below the target, but falls within a "99 percent confidence interval," the target is considered to have been met. A confidence interval is essentially a "plus or minus" band around the proficiency target, similar to when a poll of likely voters is said to be accurate to within plus or minus a few percentage points.<sup>2</sup>

Ninety-nine percent is a very stringent standard for confidence intervals—voter polls, by contrast, generally use a 95 percent confidence interval. That means that the voting preferences of all voters will be within the plus-or-minus range of the preferences of the polled voters 95 percent of the time. To achieve 99 percent confidence, the plus-or-minus band must be significantly larger, which means that a Wisconsin district's proficiency rate can fall well below the target and still be considered good enough.

Wisconsin also uses a 75 percent confidence interval for its "safe harbor" calculations, which allow under-performing districts to make AYP if they make enough improvement from the previous year. Districts make safe harbor if the percentage of students not proficient drops by at least 10 percent from the year before. Applying a confidence interval means that a district could make safe harbor even if the percent not proficient drops by significantly *less* than 10 percent. In fact, if the subgroup size is small enough, it could make safe harbor even if test scores don't improve *at all*.<sup>3</sup>

Wisconsin then breaks district scores into three levels: elementary, middle, and high school. For

a district to miss AYP, it must fall short (after all of the statistical allowances above) at *all three* levels. If student performance is good in the elementary grades but drops off sharply in middle and high school, the district still makes AYP. This provision also has the effect of splitting student subgroups into smaller sizes and thus reducing the number that meet the minimum size of 40.

Moreover, the district must miss the mark at all three levels *in the same subject*. If elementary and middle school performance is inadequate in reading, while high school performance is too low in math, the district still makes AYP.

Individually, some of these adjustments have merit. Minimum group sizes and confidence intervals, for example, reduce the odds of districts missing AYP due to random statistical variance. But when such allowances and adjustments are combined, multiplied, and layered on top of one another to the degree found in Wisconsin, they have the effect of opening every safety valve in the AYP system until pressure on schools and school systems to improve is exhausted.

All of these adjustments and statistical trap doors have been approved by the U.S. Department of Education, encouraging a statistical "race to the bottom" between states. Few states used the ultra-permissive 99 percent confidence interval in NCLB's first years. But a growing number of states have adopted it after seeing its effectiveness in artificially boosting AYP results. The same is true for other adjustments—as one state department of education employee said of the provision whereby school districts only miss AYP if elementary, middle, and high school students *all* fall short of standards: "It's a new wrinkle this year. Lots of states are doing it."<sup>4</sup>

AYP standards also apply to individual schools. As Table 3 shows, 97 percent of Oklahoma's schools and 95 percent of Rhode Island's schools met AYP standards in those states in 2004–05, compared to 28 percent of Florida's schools and 34 percent of schools in Hawaii.

**Table 3. School Adequate Yearly Progress**

	State	Percent of Schools Making Adequate Yearly Progress, 2004–05
Top Five	Oklahoma	97.0
	Rhode Island	95.0
	Iowa	93.9
	Montana	93.3
	New Hampshire	92.0
Bottom Five	New Mexico	47.3
	Nevada	44.4
	District of Columbia	40.0
	Hawaii	34.0
	Florida	28.2

As a result, a large number of teachers and principals in states like Florida and Hawaii are under intense pressure to boost student achievement to avoid NCLB sanctions, while almost everyone in Oklahoma and Rhode Island is off the hook—not because their actual performance is different, but because the state-defined rules of the game are different.

## The Last Shall Be First

NCLB also gives states near-total discretion to determine what students must learn, how to test that knowledge, and what scores students need to pass the test. This has created large state-to-state variation in the percentage of students who are deemed “proficient.” For example, Table 4 shows that the percentage of fourth-graders deemed by states to be proficient in reading varies from a high of 89 percent in Mississippi to a low of 35 percent in South Carolina.

Is Mississippi really first in the nation in teaching elementary school students to read? Not according to the NAEP, a federally funded test given to a sample of students in every state. It ranks Mississippi next to *last* in fourth grade reading, with

only 18 percent proficient. In fact, the majority of Mississippi fourth-graders don’t even meet the lower, “basic” performance level on the NAEP.

By contrast, Massachusetts has the *highest* fourth grade NAEP reading scores in the nation, yet ranks fifth from the bottom based on the March 2006 reports. State and NAEP assessments don’t cover exactly the same content, so comparisons between the two aren’t totally precise. But these kind of through-the-looking-glass results leave little doubt that states like Mississippi have set academic standards exceptionally low.

**Table 4. Fourth Grade Reading**

	State	Percent Proficient, 2004–05
Top Five	Mississippi	89.0
	Nebraska	88.5
	South Dakota	87.9
	Tennessee	87.1
	Idaho	86.9
Bottom Five	Massachusetts	50.0
	California	47.9
	Wyoming	47.0
	Nevada	41.5
	South Carolina	35.3

## See No Evil

It’s difficult for teachers and students to focus on academic achievement when schools aren’t safe. But while a recent report from the U.S. Department of Education and the U.S. Department of Justice found that overall school violence is down, it also found that violence, theft, bullying, drugs, and weapons are still “widespread.”<sup>5</sup> NCLB gives students in “persistently dangerous” schools the right to transfer elsewhere. But in their 2006 NCLB reports, states asserted that only 28 of the nation’s 95,000 schools are persistently dangerous. As Table 5 shows, only six states reported any persistently dangerous schools at all.

**Table 5. Persistently Dangerous Schools**

State	Number of Persistently Dangerous Schools, 2004–05
Pennsylvania	9
Maryland	6
New York	5
New Jersey	4
Georgia	2
Texas	2

One of those states, Maryland, set standards for dangerousness based on the number of student expulsions or suspensions for arson, sexual assault, physical attacks on student or adults, and possession of drugs, firearms, explosives and other weapons.

Yet many states created standards similar to those in Arizona, which only labels schools as dangerous if an average of four or more firearms are brought to school for three consecutive years. Arizona ignores rape, gang violence, readily available illegal narcotics, and many other indisputably dangerous things. The state has not identified a single persistently dangerous school.

In fairness, states are hampered by local school officials who often under-report incidents of violence. This problem is not unique to K–12 education—colleges and universities have long downplayed incidents of violence on campus as well.

But saying there are no persistently dangerous schools in an entire state—particularly states the size of California, Illinois, or Florida—insults the public’s intelligence. Said Paul Vallas, Chief Executive Officer of the School District of Philadelphia (one of the few districts to consistently report accurate school violence data), “If you have a large urban school district and you say you don’t have any persistently dangerous schools, you’re deluding yourself. The more you conceal, the more suspicious the public becomes.”<sup>6</sup>

## “Highly” Qualified Teachers

Students need qualified teachers to succeed in school. But while almost all classroom teachers have bachelor’s degrees and most have state certification, a significant number of teachers lack specific knowledge of the academic subject they teach. This is particularly true in high-poverty schools and in math and science courses taught in the secondary grades. A 2005 study by Richard Ingersoll of the University of Pennsylvania found that nearly 38 percent of secondary math teachers in high-poverty schools lack an academic major or minor in math or related fields.<sup>7</sup>

To address that problem, NCLB requires all teachers to become “highly qualified,” a standard that includes having a bachelor’s degree, state certification, and specific evidence of content knowledge in the field being taught. Current teachers can demonstrate content knowledge by taking coursework equivalent to a college major or by passing the same test most states now require new teachers to pass.

NCLB provides an alternative to the content knowledge standard, called HOUSSE (High Objective Uniform Standard of State Evaluation). The law gives states broad discretion to define what

**Table 6. Highly Qualified Teachers**

	State	Percent of Core Classes Taught by Highly Qualified Teachers, 2004–05
Top Five	Wisconsin	99.5
	Montana	99.4
	Oklahoma	99.0
	Connecticut	98.9
	Washington	98.9
Bottom Five	Hawaii	74.0
	Utah	72.0
	Nevada	68.1
	DC	51.6
	Alaska	34.3

HOUSSE means. A few states, like Colorado, have elected to require teachers to earn course credits in their subject or pass a standardized test, as the authors of NCLB envisioned. But most states responded by requiring teachers to simply check off a series of boxes on a laundry list of activities that are often only vaguely related to content knowledge, such as serving on school committees, mentoring other teachers or teaching a subject without content knowledge in that subject for a sufficient number of years. In Oklahoma, where 99 percent of teachers are highly qualified, teachers earn HOUSSE credits if their students place well in academic competitions.<sup>8</sup>

Local and national teachers’ unions fought hard to ensure that states would implement permissive HOUSSE provisions in an effort to protect their members’ jobs, and many state departments of education chose to go along. But that comes at a stiff cost to students from disadvantaged backgrounds. Research shows that high-poverty, high-minority schools—the schools that have the biggest challenges in meeting NCLB performance goals—often have great difficulty in recruiting and retaining qualified teachers.<sup>9</sup> Unfortunately, many states have failed to use the NCLB teacher-quality provisions to identify and help schools with teacher shortages.

## Teacher Training and Re-Training

Teachers don’t learn everything they need to know in college; they need to upgrade their knowledge and skills throughout their careers in the classroom. Accordingly, NCLB requires states to report the percentage of teachers receiving “high-quality professional development,” which NCLB defines as “sustained, intensive, and classroom-focused” and “not 1-day or short-term workshops or conferences,” among other things.<sup>10</sup>

Maryland used those guidelines to create a fairly rigorous definition of “high-quality” training and then

sent a survey to every teacher in the state asking them if their actual experiences met that standard. After compiling responses from over 30,000 teachers—almost 55 percent of the workforce—Maryland officials found that only 43 percent of teacher professional development experiences measured up.<sup>11</sup> As Table 7 shows, this was the second-lowest percentage reported by a state, one reason that Maryland ranks near the bottom of the Pangloss Index.

Indiana, on the other hand, was one of five states declaring that 100 percent of their teachers received training that met the NCLB standard. Indiana surveyed *principals* instead of teachers, asking them if they were giving their teachers training opportunities, as required by state law. One-hundred percent said yes. When Education Sector researchers asked Vermont officials how they arrived at their state’s 100 percent figure, they claimed that the federal standards were so broad that any kind of professional development could theoretically fit the bill.<sup>12</sup> Accordingly, they reported that all Vermont teachers received the training they need.

**Table 7. High Quality Professional Development**

	State	Percent of Teachers Receiving High Quality Professional Development, 2003–04
Top Five	Arkansas	100
	Connecticut	100
	Indiana	100
	Montana	100
	Vermont	100
Bottom Five	Nevada	61.0
	North Dakota	47.1
	Hawaii	46.0
	Maryland	43.0
	Oregon	41.0

## High School Graduation Rates

Recent research suggests that only about 70 percent of entering high school students—and only about half of black and Hispanic students—earn a regular high school diploma on time.<sup>13</sup> Given the dim economic prospects faced by high school dropouts, these numbers have justifiably been the source of much recent alarm.

But when the Education Trust, a Washington, D.C., advocacy organization, compared state-reported high school graduation rates to the rates reported recently by independent scholars, it found that nearly every state significantly overstated its success in helping high school students earn degrees.<sup>14</sup> For example, the independent estimates found North Carolina's high school graduation rate to be about 64 percent. But as Table 8 shows, North Carolina reported a considerably more robust rate of almost 96 percent in its March 2006 reports.

The source of the difference isn't hard to find: the 64-percent figure represents the number of students who earned a high school diploma divided by the number who started high school as freshmen four years earlier; the 96-percent figure represents the number of students who earned a high school diploma in four years divided by the number of students who earned a high school diploma in four years or more.

In other words, North Carolina students who dropped out of high school and never graduated didn't count against the state for the purposes of calculating the state's high school graduation rate—*because they didn't graduate*.

Other states with unusually high graduation rates reported the percentage of students who began the year as *seniors* and graduated in one year, not the percent of freshmen who graduated in four years, thus excluding students who dropped out of high school as freshmen, sophomores, and juniors.

Table 8. High School Graduation Rates

	State	High School Graduation Rate, 2003–04
Top Five	Massachusetts	96.2
	North Carolina	95.7
	South Dakota	92.3
	North Dakota	91.5
	Wisconsin	91.2
Bottom Five	Washington	70.1
	Florida	68.7
	Nevada	67.0
	Georgia	65.4
	Alaska	61.2

## A Better Way

The March 2006 No Child Left Behind reports show that when states have the opportunity to define the terms of their own success, many will make themselves look better than they really are. The inclination of state education officials to overstate academic progress is understandable. Most chief state school officers report directly to elected officials and one-third are elected themselves. In providing educational results to the public, they're essentially reporting on their own performance as education leaders. They have every incentive to report—and create—good news.

But that inclination is seriously compromising the credibility and effectiveness of NCLB. The law's architects considered many strategies for holding states accountable for educational success, including financial penalties and specific performance targets on national tests. They ultimately decided against those or other "hard" accountability measures, opting instead for the "soft" accountability of transparency. They reasoned that it would be difficult to win political support for hard measures and that requiring states to publicly report performance would be an acceptable alternative.

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That approach hasn't worked very well. States also filed inaccurate NCLB reports with the U.S. Department of Education in 2003 and 2005. Numerous press reports of the problem did not dissuade states from resubmitting the same suspect numbers in 2006. In fact, transparency has arguably made the problem *worse*, as some states took federally approved strategies like the 99 percent confidence interval, first pioneered in a few states, and made them their own.

There are many different strategies for addressing this problem, not all of which involve new federal mandates. Some educational standards should be "national," or uniform for all states. Others should be state-determined, and some should fall along the continuum between total state autonomy and no state autonomy. This is true for standards for graduation rates, teacher qualifications, school violence and many other issues as well as for standards of academic achievement.

The appropriate degree of uniformity among states depends on the issue. That determination should be informed by two broad principles. First: definitions of success should be common, while the means of success should be diverse. All students deserve the same high benchmarks of academic progress, but state and local educators should be given a great deal of discretion in how they choose to reach those goals. Lawmakers should be wary of education standards that limit opportunities for new ideas and innovation.

Second: standards of success should vary from state to state if there are actual state differences in what those standards measure. State and local variation in standards should also be encouraged if there are opportunities to learn from different state choices.

Those principles suggest that some changes in the current division of state and federal standard-setting responsibility need to be made. High school graduation rates, for example, measure the outcomes of the education system, not the means of achieving an outcome. There's no good reason for graduation

rate definitions to vary from one state to another, and little dispute among reasonable people as to what "on-time high school graduation rate" means. Therefore, all states should use the same definition.

Similarly, huge state variance in the definition of "adequate yearly progress" makes little sense—there's no logical basis for a 99 percent confidence interval in one state and a 95 percent confidence interval in another. States are entitled to their own opinions, but not their own statistics.

Teacher professional development, by contrast, represents the means of education, not the ends. There are many different ways to train classroom teachers effectively, some known and some yet to be discovered. Requiring every state, district or school to approach professional development in the same way makes little sense. The federal government's role in this case should be limited to creating guidelines and enforcing them with audits, peer review by other states, and applying basic standards of reasonableness. In accepting reports of 100 percent success from states that did not even bother to define "high-quality professional development," much less measure how many teachers received it, the U.S. Department of Education has clearly dropped the ball.

On the other hand, foundational educational abilities like reading and math are the same everywhere. States sometimes describe their standard-setting authority as choosing "what students need to know." This is incorrect—our mobile society and increasingly global economy determine the basic set of knowledge and skills that all students need to know to succeed in work and life. States can only choose whether to meet those standards. Clearly, many states are currently falling short.

Subjects like history, art, and music are different, varying significantly among different states and local cultures. And while the foundations of subjects like science don't differ from state to state, there are many different ways to sequence science courses and more choices to make than in reading and math

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as to what content to teach. This argues for giving states more latitude in setting standards for some subjects than for others, to reflect state differences and learn from state choices.

It's particularly complicated to determine how national or uniform teacher standards should be. It makes sense to set minimum standards for teacher qualifications like content knowledge, particularly when disadvantaged students are more likely than other students to be taught by under-qualified teachers. That said, teacher credentials—like teacher professional development—represent the means, not the ends, of education. The qualities of the best teacher for a specific student or school can vary tremendously depending on location and circumstance. Federal policymakers should be wary of limiting the ability of local school officials to hire teachers they believe are best for the job.

Overall, different standards of educational success require different degrees of uniformity. In addition, there are multiple ways to create and enforce standards, some of which don't involve strict definitions written into federal law. Federal policymakers have three main options for standard-setting: voluntary state agreements, federal guidelines enforced by the U.S. Department of Education and explicit federal standards.

In an example of the first option, the National Governor's Association and a host of other education organizations recently created a "Compact on State High School Graduation Data." States signing the compact—all but a handful have done so—agree to "calculate the graduation rate by dividing the number of on-time graduates in a given year by the number of first-time entering ninth graders four years earlier. Graduates are those receiving a high school diploma." While this may seem unremarkable, it is a huge improvement over

the definitions a number of states are using today. North Carolina's nonsensical definition, for example, will soon be a thing of the past. Congress could provide incentives for similar state agreements on other issues.

For the second standard-setting option to be viable, the U.S. Department of Education needs to enforce existing federal guidelines. The Department has held the line in some areas, such as requiring states to hold schools and districts accountable for the performance of student "subgroups." But as this report makes clear, it has failed to enforce even minimal compliance in others. In such cases the U.S. Department of Education's inclinations mirror those of its state counterparts—when faced with the prospect of confronting substandard education systems or reporting bad news about student achievement, it too often backs away. Both Congress and the President should insist that the U.S. Department of Education play a stronger role in enforcing guidelines and preventing states from misusing their autonomy to undermine the goals of NCLB.

And in some cases, Congress will need to consider tightening current guidelines or explicitly setting new, uniform standards in federal law. This will be politically difficult. The Bush administration and the Republican leadership in Congress must walk a tight political line between enforcing the spirit of NCLB and traditional Republican support of "states' rights" while many Democrats are reluctant to support accountability provisions with real teeth for teachers and schools. But unless Congress and the administration strike a better balance between federal enforcement and state autonomy, unless they require the U.S. Department of Education to make states take NCLB requirements seriously, NCLB could ultimately cease to be a credible vehicle of school reform.

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## Data Sources & Methodology

This report is based on data submitted by state departments of education to the U.S. Department of Education through reports called Consolidated State Performance Reports (CSPRs). The latest CSPRs were submitted in March 2006, and were provided to Education Sector by the U.S. Department of Education.

The “Pangloss Index” found on Table 1 of this report is calculated by aggregating state rankings on 11 measures derived from the CSPRs. Those measures are:

- Total number of persistently dangerous schools, 2004–05.
- Statewide high school graduation rate, 2003–04.
- Statewide high school dropout rate, 2003–04.
- Percent of core academic classes taught by highly qualified teachers, 2004–05.
- Percent of qualified Title I paraprofessionals, 2004–05.
- Percent of public schools that made adequate yearly progress, 2004–05.
- Percent of public school districts that made adequate yearly progress, 2004–05.
- Average percent of students proficient or advanced in fourth grade math and reading 2004–05. (Note: This amount, as well as the average proficiency rates in eighth grade and high school, is calculated by averaging separately reported reading and math proficiency rates. If a state reported a proficiency rate in one subject but not the other, the proficiency rate for the reported subject was used.)
- Average percent of students proficient or advanced in eighth grade math and reading, 2004–05.
- Average percent of students proficient or advanced in high school math and reading, 2004–05.
- Percent of teachers receiving high-quality professional development, 2003–04. (Note: States were not required to report this measure in March 2006. This data is derived from the previous CSPR, submitted in 2005).

For each measure, states were ranked so that the states reporting the most positive results were ranked highest. For example, while states were ranked highest if they reported the highest high school graduation rates and highest percent of schools making adequate yearly progress, they were also ranked highest if they reported the lowest number of persistently dangerous schools and the lowest high school dropout rates.

Some states did not submit data for some measures. In those cases, states were, for ranking purposes, assigned the median value of those states that did submit data.

The data submitted by the states for these measures can be found in the Appendix.

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## Endnotes

- <sup>1</sup> Because state academic standards differ from the standards on which NAEP tests are based, comparisons between the two are not exact.
- <sup>2</sup> The U.S. Department of Education has disallowed Wisconsin's practice of allowing for the statistical benefit of the doubt at both the individual student and group level in future years. The 99-percent confidence interval for group scores will remain, but instead of allowing for one standard error of difference for individual student scores, the percentage of proficient students will be adjusted so that districts receive half credit for students who are not proficient but meet the "Basic" performance standard. This has the same effect as the previous policy: districts will be found to meet target percentages of proficient students when the actual percent proficient falls well short.
- <sup>3</sup> Tom Fagan, *States Test Limits of Federal AYP Flexibility*, Center for Education Policy, 2005.
- <sup>4</sup> Personal interview, April 12, 2006.
- <sup>5</sup> Jill F. Devoe, Katharin Peter, Margaret Noonan, Thomas D. Snyder, Katrina Baum, *Indicators of School Crime and Safety:2005*, U.S. Departments of Education and Justice, 2005.
- <sup>6</sup> Gil Klein, "No Child Law Not Working for School Violence," Media General News Service, April 13, 2006.
- <sup>7</sup> Richard M. Ingersoll, "Why Some Schools Have More Underqualified Teachers Than Others," *Brooking Papers on Education Quality 2004*, Dianne Ravitch ed.
- <sup>8</sup> Kate Walsh and Emma Snyder, *Searching the Attic: How States are Responding to the Nation's Goal of Placing a Highly Qualified Teacher in Every Classroom*, National Council on Teacher Quality, 2004.
- <sup>9</sup> Kevin Carey, *The Real Value of Teachers: Using New Information About Teacher Effectiveness to Close the Achievement Gap*, The Education Trust, 2004.
- <sup>10</sup> This information was included as a reporting requirement for the 2003–04 CSPRs, but not for the 2004–05 CSPRs. The information on Table 7 represents the 2003–04 reporting.
- <sup>11</sup> <http://www.marylandpublicschools.org/NR/rdonlyres/DF957230-EC07-4FEE-B904-7FEB176BD978/6292/Statoreporton200304survey.pdf>.
- <sup>12</sup> Personal interview, April 2006.
- <sup>13</sup> Gary Orfield, Daniel Losen, Johanna Wald, and Christopher B. Swanson, *Losing Our Future: How Minority Youth are Being Left Behind by the Graduation Rate Crisis*, The Civil Rights Project at Harvard University and the Urban Institute, 2004.
- <sup>14</sup> Daria Hall, *Getting Honest About Grad Rates: How States Play the Numbers and Students Lose*, The Education Trust, 2005. (Disclosure: Kevin Carey worked for the Education Trust from 2002 to 2005.)

# Appendix

State	Percent of Public School Districts That Made Adequate Yearly Progress (AYP), 2004–05	State	Percent of Public Schools That Made Adequate Yearly Progress (AYP), 2004–05	State	Percent of Students Proficient or Advanced in Fourth Grade Reading, 2004–05
Delaware	100.0	Oklahoma	97.0	Mississippi	89.0
Wisconsin	99.8	Rhode Island	95.0	Nebraska	88.5
Arkansas	98.0	Iowa	93.9	South Dakota	87.9
Maine	98.0	Montana	93.3	Tennessee	87.1
South Dakota	98.0	New Hampshire	92.0	Idaho	86.9
Michigan	96.3	Tennessee	91.9	Colorado	86.6
Iowa	94.2	Wisconsin	91.7	Georgia	85.4
Tennessee	94.1	Kansas	91.4	Alabama	83.2
Vermont	94.1	North Dakota	91.4	Oklahoma	83.0
Kansas	93.3	Vermont	90.8	North Carolina	82.4
Montana	92.9	Nebraska	89.7	New Jersey	81.6
Wyoming	91.7	Mississippi	89.0	West Virginia	81.2
Oklahoma	91.0	Michigan	88.5	Wisconsin	81.0
North Dakota	89.6	Utah	87.4	Maryland	80.9
Pennsylvania	89.6	Arizona	87.0	Washington	79.5
New York	88.4	Louisiana	83.8	Iowa	79.4
Texas	88.4	West Virginia	83.2	Texas	79.0
Indiana	87.7	Virginia	82.7	Utah	78.0
Connecticut	82.0	Washington	82.7	Alaska	76.9
Nevada	82.0	Minnesota	82.0	North Dakota	75.5
Minnesota	80.7	South Dakota	82.0	Montana	74.8
Nebraska	80.7	Georgia	81.8	Indiana	73.0
Mississippi	77.0	Pennsylvania	80.6	Florida	72.0
Arizona	76.0	New York	80.2	Michigan	69.4
Illinois	73.0	Connecticut	80.0	Kentucky	68.0
Washington	70.9	Wyoming	79.6	Louisiana	67.4
Alabama	67.9	Texas	78.5	Connecticut	67.0
Missouri	60.6	Maine	77.0	Arizona	62.6
California	60.2	Ohio	75.7	Hawaii	55.2
Colorado	59.3	Colorado	75.3	Maine	53.0
Utah	59.3	Delaware	74.3	New Mexico	51.8
Louisiana	58.8	Maryland	73.2	Arkansas	51.0
Ohio	55.8	Arkansas	73.0	Massachusetts	50.0
Virginia	50.7	Illinois	71.0	California	47.9
Georgia	45.3	Kentucky	70.0	Wyoming	47.0
Kentucky	44.0	Oregon	67.5	Nevada	41.5
Alaska	40.7	Missouri	65.2	South Carolina	35.3
Massachusetts	39.3	California	61.6	Virginia	N/A
Idaho	38.0	Indiana	59.7	Delaware	N/A
New Mexico	33.7	Alaska	59.0	District of Columbia	N/A
Oregon	33.7	Massachusetts	56.9	Illinois	N/A
District of Columbia	28.0	North Carolina	56.8	Kansas	N/A
South Carolina	21.2	Alabama	53.3	Minnesota	N/A
Maryland	16.6	Idaho	51.0	Missouri	N/A
West Virginia	9.1	South Carolina	49.9	New Hampshire	N/A
North Carolina	7.0	New Mexico	47.3	New York	N/A
Florida	6.6	Nevada	44.4	Ohio	N/A
Hawaii	N/A	District of Columbia	40.0	Oregon	N/A
New Hampshire	N/A	Hawaii	34.0	Pennsylvania	N/A
New Jersey	N/A	Florida	28.2	Rhode Island	N/A
Rhode Island	N/A	New Jersey	N/A	Vermont	N/A

## Appendix (continued)

State	Percent of Students Proficient or Advanced in Fourth Grade Math, 2004–05	State	Percent of Students Proficient or Advanced in Eighth Grade Reading, 2004–05	State	Percent of Students Proficient or Advanced in Eighth Grade Math, 2004–05
North Carolina	91.8	Nebraska	88.3	North Carolina	89.0
Idaho	90.5	North Carolina	87.9	Tennessee	87.2
Colorado	89.6	Tennessee	86.9	Nebraska	85.0
Nebraska	89.6	Colorado	86.8	Virginia	80.6
Tennessee	86.6	Wisconsin	84.0	Connecticut	76.0
Kansas	84.4	Texas	83.0	Colorado	75.7
South Dakota	82.3	Idaho	82.4	Iowa	74.7
Texas	81.0	Georgia	81.2	Utah	73.0
Iowa	80.8	West Virginia	80.1	Wisconsin	72.0
New Jersey	80.2	South Dakota	78.9	Indiana	71.0
North Dakota	79.4	Utah	77.0	West Virginia	70.6
Connecticut	79.0	Virginia	76.5	Idaho	69.6
Mississippi	79.0	Alaska	76.1	Georgia	68.8
Maryland	76.4	Kansas	75.9	South Dakota	68.5
Georgia	75.2	Connecticut	75.0	Oklahoma	68.0
West Virginia	75.1	Delaware	74.8	North Dakota	65.3
Utah	75.0	New Jersey	72.3	Oregon	63.5
Oklahoma	74.0	Illinois	72.1	Alabama	62.8
Alabama	73.8	North Dakota	72.0	Montana	62.5
Indiana	73.0	Oklahoma	72.0	New Jersey	62.4
Michigan	72.0	Iowa	71.7	Pennsylvania	62.4
Wisconsin	71.0	Alabama	69.2	Alaska	62.3
Alaska	68.8	Indiana	67.0	Michigan	62.0
Arizona	68.8	Maryland	66.5	Texas	62.0
Ohio	65.5	Pennsylvania	63.6	Florida	59.0
Florida	64.0	Montana	63.2	Arizona	58.5
Louisiana	63.8	Oregon	62.5	Louisiana	55.5
Washington	60.8	Arizona	62.2	Illinois	53.5
Montana	56.1	Arkansas	57.0	Mississippi	53.0
California	50.6	Mississippi	57.0	Delaware	52.2
Arkansas	50.0	Louisiana	53.9	Maryland	51.9
Missouri	43.0	New Mexico	51.6	Nevada	49.0
Massachusetts	41.0	Nevada	50.8	Massachusetts	39.0
South Carolina	39.5	Florida	44.0	Wyoming	37.3
New Mexico	39.2	Maine	44.0	Kentucky	36.0
Wyoming	39.1	Wyoming	39.2	Arkansas	33.0
Maine	39.0	California	39.0	District of Columbia	32.3
Hawaii	28.8	Hawaii	37.5	California	31.0
Virginia	N/A	District of Columbia	36.1	Maine	29.0
Delaware	N/A	South Carolina	28.6	New Mexico	23.9
District of Columbia	N/A	Kentucky	N/A	South Carolina	22.3
Illinois	N/A	Massachusetts	N/A	Hawaii	20.2
Kentucky	N/A	Michigan	N/A	Missouri	15.5
Minnesota	N/A	Minnesota	N/A	Kansas	N/A
Nevada	N/A	Missouri	N/A	Minnesota	N/A
New Hampshire	N/A	New Hampshire	N/A	New Hampshire	N/A
New York	N/A	New York	N/A	New York	N/A
Oregon	N/A	Ohio	N/A	Ohio	N/A
Pennsylvania	N/A	Rhode Island	N/A	Rhode Island	N/A
Rhode Island	N/A	Vermont	N/A	Vermont	N/A
Vermont	N/A	Washington	N/A	Washington	N/A

## Appendix (continued)

State	Percent of Students Proficient or Advanced in High School Reading/Language, 2004–05	State	Percent of Students Proficient or Advanced in High School Math, 2004–05	State	Total Number of Persistently Dangerous Schools, 2004–05
Georgia	94.8	Georgia	92.0	Alabama	0
Ohio	92.0	Virginia	85.7	Alaska	0
Tennessee	90.7	Ohio	81.6	Arizona	0
Colorado	88.9	Nebraska	80.2	Arkansas	0
Virginia	88.0	North Carolina	79.8	California	0
Nebraska	86.2	Iowa	79.0	Colorado	0
Alabama	85.7	Alabama	78.3	Connecticut	0
Idaho	84.9	Connecticut	76.0	Delaware	0
New Jersey	83.2	South Dakota	75.5	District of Columbia	0
Connecticut	83.0	New Jersey	75.5	Florida	0
Nevada	82.8	Tennessee	74.4	Hawaii	0
Minnesota	79.9	Wisconsin	71.0	Idaho	0
Iowa	76.2	Minnesota	70.3	Illinois	0
West Virginia	75.2	Idaho	70.0	Indiana	0
Utah	75.0	West Virginia	67.5	Iowa	0
Wisconsin	74.0	Arizona	64.4	Kansas	0
Alaska	73.3	Colorado	64.3	Kentucky	0
South Dakota	73.3	Indiana	64.0	Louisiana	0
Washington	72.9	Alaska	63.8	Maine	0
Massachusetts	71.0	Nevada	63.5	Massachusetts	0
North Dakota	70.2	Louisiana	62.8	Michigan	0
Arizona	70.0	Massachusetts	62.0	Minnesota	0
Indiana	68.0	Vermont	60.7	Mississippi	0
Texas	68.0	Texas	60.0	Missouri	0
Delaware	67.9	Mississippi	59.0	Montana	0
Montana	67.0	Florida	59.0	Nebraska	0
Pennsylvania	64.7	Arkansas	56.5	Nevada	0
Kansas	63.2	Montana	55.5	New Hampshire	0
Louisiana	62.8	North Dakota	54.9	New Mexico	0
Oklahoma	61.0	Illinois	52.0	North Carolina	0
Illinois	59.2	Delaware	51.5	North Dakota	0
Michigan	58.7	Maryland	51.2	Ohio	0
Maryland	58.5	Pennsylvania	50.5	Oklahoma	0
New Mexico	56.8	Kansas	50.5	Oregon	0
South Carolina	56.8	Michigan	49.2	Rhode Island	0
Oregon	53.5	South Carolina	48.4	South Carolina	0
Rhode Island	52.2	Wyoming	48.3	South Dakota	0
Wyoming	51.9	Utah	48.0	Tennessee	0
California	49.2	Washington	47.5	Utah	0
North Carolina	47.3	Oregon	46.6	Vermont	0
New Hampshire	46.0	California	45.2	Virginia	0
Arkansas	45.0	Rhode Island	45.1	Washington	0
Vermont	44.6	New Hampshire	39.4	West Virginia	0
Maine	44.0	Kentucky	34.0	Wisconsin	0
Hawaii	42.4	New Mexico	30.3	Wyoming	0
Kentucky	39.0	District of Columbia	29.3	Georgia	2
Florida	37.0	Oklahoma	28.0	Texas	2
Mississippi	36.0	Maine	22.0	New Jersey	4
Missouri	22.9	Hawaii	19.6	New York	5
District of Columbia	19.7	Missouri	16.6	Maryland	6
New York	N/A	New York	N/A	Pennsylvania	9

## Appendix (continued)

State	Percent Of Core Academic Classes Taught by Highly Qualified Teachers, 2004–05	State	Percent of Teachers Receiving High-Quality Professional Development, 2003–04	State	Statewide High School Graduation Rate, 2003–04
Wisconsin	99.5	Arkansas	100.0	Massachusetts	96.2
Montana	99.4	Connecticut	100.0	North Carolina	95.7
Oklahoma	99.0	Indiana	100.0	South Dakota	92.3
Connecticut	98.9	Montana	100.0	North Dakota	91.5
Washington	98.9	Vermont	100.0	Wisconsin	91.2
Idaho	98.4	Virginia	99.3	New Jersey	90.6
Illinois	98.2	Mississippi	99.0	Indiana	90.0
Pennsylvania	97.7	Oklahoma	98.6	Connecticut	89.8
Minnesota	97.6	Ohio	98.0	Iowa	89.8
Missouri	97.1	Idaho	97.7	Minnesota	88.9
Kentucky	96.7	Iowa	96.8	Michigan	88.7
West Virginia	96.0	Maine	96.0	Kansas	87.8
Georgia	95.7	West Virginia	91.7	Pennsylvania	87.7
Virginia	95.6	Texas	91.2	Maine	87.4
Colorado	95.3	Alaska	91.0	Nebraska	86.9
Indiana	95.3	Minnesota	91.0	Illinois	86.6
Nebraska	95.1	New Jersey	91.0	Vermont	86.0
Arkansas	95.0	Pennsylvania	91.0	Ohio	85.9
Iowa	95.0	Wisconsin	90.8	Missouri	85.5
Arizona	94.9	Alabama	89.1	California	85.3
Texas	94.6	Colorado	87.2	Oklahoma	85.1
New Jersey	93.5	Delaware	87.2	New Hampshire	84.8
Mississippi	93.2	Florida	87.2	Texas	84.6
Maine	93.0	Georgia	87.2	Maryland	84.3
Massachusetts	93.0	Illinois	87.2	Mississippi	84.0
New York	93.0	Kansas	87.2	Utah	84.0
South Dakota	92.9	Louisiana	87.2	West Virginia	84.0
New Hampshire	92.6	Nebraska	87.2	Montana	82.9
Ohio	92.6	Rhode Island	87.2	Rhode Island	82.8
Florida	92.4	South Carolina	87.2	Colorado	82.3
Michigan	92.0	South Dakota	87.2	Delaware	81.6
Louisiana	91.7	Arizona	86.0	Kentucky	81.5
Oregon	90.6	New York	86.0	Arkansas	81.3
Kansas	89.3	New Hampshire	85.2	Oregon	80.6
North Dakota	89.0	Kentucky	84.4	Hawaii	80.0
North Carolina	88.0	North Carolina	83.0	Virginia	79.9
Vermont	87.9	Wyoming	82.7	Wyoming	79.2
Wyoming	86.3	Missouri	80.0	New Mexico	78.8
Alabama	81.8	New Mexico	77.8	South Carolina	78.0
Tennessee	80.9	California	77.0	New York	77.0
South Carolina	78.6	Michigan	77.0	Arizona	76.8
New Mexico	77.5	Washington	71.7	Tennessee	75.7
Rhode Island	76.0	District of Columbia	70.0	District of Columbia	71.9
Maryland	75.4	Massachusetts	69.6	Washington	70.1
California	74.0	Tennessee	68.6	Florida	68.7
Hawaii	74.0	Utah	67.0	Nevada	67.0
Utah	72.0	Nevada	61.0	Georgia	65.4
Nevada	68.1	North Dakota	47.1	Alaska	61.2
District of Columbia	51.6	Hawaii	46.0	Alabama	N/A
Alaska	34.3	Maryland	43.0	Idaho	N/A
Delaware	N/A	Oregon	41.0	Louisiana	N/A

## Appendix (continued)

State	Statewide High School Dropout Rate, 2003–04	State	Percent of Qualified Title I Paraprofessionals, 2004–05
Mississippi	1.1	North Dakota	99.7
Wisconsin	1.1	West Virginia	99.6
Kansas	1.5	Iowa	99.0
Iowa	1.6	South Dakota	96.7
Connecticut	1.8	Maine	95.4
Nebraska	1.9	Idaho	94.8
New Jersey	1.9	Kentucky	94.0
Pennsylvania	1.9	Wisconsin	92.6
Virginia	2.1	Tennessee	92.1
Montana	2.4	Texas	90.8
Vermont	2.6	Georgia	89.6
Maine	2.7	Indiana	89.4
North Dakota	2.8	Kansas	87.1
Florida	2.9	New Hampshire	87.0
Michigan	3.0	Washington	87.0
South Dakota	3.0	Arizona	85.0
West Virginia	3.0	Mississippi	85.0
Tennessee	3.1	Rhode Island	85.0
Arkansas	3.3	Oregon	84.2
California	3.3	Illinois	83.0
Alabama	3.4	South Carolina	82.5
Kentucky	3.4	New Mexico	81.5
Missouri	3.4	Alabama	81.3
Ohio	3.4	Minnesota	81.0
Texas	3.6	New York	81.0
Massachusetts	3.7	North Carolina	80.0
New Mexico	3.7	Utah	79.0
Colorado	3.8	Vermont	79.0
New Hampshire	3.8	Missouri	76.5
Maryland	3.9	Virginia	75.5
Oklahoma	3.9	Nevada	74.1
Utah	3.9	California	73.1
New York	4.3	Florida	72.6
South Carolina	4.4	Hawaii	72.0
Wyoming	4.5	Louisiana	71.0
Oregon	4.6	Wyoming	70.6
Hawaii	4.7	Oklahoma	68.0
North Carolina	4.9	Maryland	65.0
Georgia	5.1	Ohio	63.8
Illinois	5.4	Michigan	53.7
Arizona	5.8	Montana	53.0
Nevada	5.8	Colorado	48.2
Washington	5.8	Massachusetts	47.1
Delaware	6.0	Alaska	43.8
District of Columbia	6.6	Arkansas	31.2
Louisiana	7.3	Connecticut	N/A
Alaska	8.2	Delaware	N/A
Minnesota	11.0	District of Columbia	N/A
Rhode Island	17.2	Nebraska	N/A
Idaho	N/A	New Jersey	N/A
Indiana	N/A	Pennsylvania	N/A