

BUILDING A NATION O F LEARNERS **1998** 

# National Education Goals Panel

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# THE NATIONAL EDUCATION GOALS REPORT

Building a Nation of Learners

1998



# The National Education Goals Panel

The National Education Goals Panel (NEGP) is a unique bipartisan and intergovernmental body of federal and state officials created in July 1990 to assess and report state and national progress toward achieving the National Education Goals. In 1994, the Goals Panel became a fully independent federal agency charged with monitoring and speeding progress toward the eight National Education Goals. Under the legislation, the Panel is charged with a variety of responsibilities to support systemwide reform, including:

- · Reporting on national and state progress toward the Goals over a 10-year period;
- · Working to establish a system of high academic standards and assessments;
- · Identifying promising practices for improving education; and
- Building a nationwide, bipartisan consensus to achieve the Goals.

Panel members include eight Governors, four members of Congress, four state legislators, and two members appointed by the President.

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For sale by the U.S. Government Printing Office Superintendent of Documents, Mail Stop: SSOP, Washington, DC 20402-9328 On behalf of the National Education Goals Panel, I am pleased to present the *1998 National Education Goals Report.* This report is the eighth annual report that the Goals Panel has produced since the National Education Goals were established at the beginning of the decade.

The format of this year's *Goals Report* is markedly different from previous years' reports. It has been redesigned so that it is more compact and information is easier to find. This year's report provides more direct comparisons of state performance and gives greater emphasis to state improvement over time. It identifies the states that were the top achievers in each Goal area, as well as those states that made the greatest gains. This information makes it easy to see where we are improving and where much work remains to be done.

I think you will be pleasantly surprised by the findings in this report. Even though the National Education Goals are extremely challenging and we have not yet achieved them, states are making significant progress toward them. Some states have made progress on multiple measures. And states not traditionally thought to be high performers are among those making the biggest improvements.

I commend the students in these states, their teachers, and their parents for the hard work that created these positive results. With continued effort and commitment, we can extend these successes to all states.

Sincerely, Cecil H. Underwood, Chair (1998)

National Education Goals Panel, and Governor of West Virginia

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# The National Education Goals

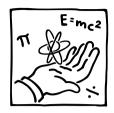


### Goal 1: Ready to Learn

By the year 2000, all children in America will start school ready to learn.

# Goal 5: Mathematics and Science

By the year 2000, United States students will be first in the world in mathematics and science achievement.





### Goal 2: School Completion

By the year 2000, the high school graduation rate will increase to at least 90 percent.

### Goal 6: Adult Literacy and Lifelong Learning

By the year 2000, every adult American will be literate and will possess the knowledge and skills necessary to compete in a global economy and exercise the rights and responsibilities of citizenship.





### Goal 3: Student Achievement and Citizenship

By the year 2000, all students will leave grades 4, 8, and 12 having demonstrated competency over challenging subject matter including English, mathematics,

science, foreign languages, civics and government, economics, arts, history, and geography, and every school in America will ensure that all students learn to use their minds well, so they may be prepared for responsible citizenship, further learning, and productive employment in our Nation's modern economy.



### Goal 4: Teacher Education and Professional Development

By the year 2000, the Nation's teaching force will have access to programs for the continued improvement of their professional

skills and the opportunity to acquire the knowledge and skills needed to instruct and prepare all American students for the next century.

### Goal 7: Safe, Disciplined, and Alcoholand Drug-free Schools

By the year 2000, every school in the United States will be free of drugs, violence, and the unauthorized presence of firearms and alcohol and will offer a disciplined environment conducive to learning.

### Goal 8: Parental Participation

By the year 2000, every school will promote partnerships that will increase parental involvement and participation in promoting the social, emotional, and academic growth of children.







This report is the eighth in a series of annual reports issued by the National Education Goals Panel to measure national and state progress toward the eight National Education Goals. It evaluates progress made since 1990, the year that the National Education Goals were adopted. In addition to summarizing how we stand in relation to achieving the ambitious targets specified in the Goals, this report gives special emphasis to state improvement over time.

The purpose of having a common set of national Goals that all states would work collectively to achieve was to identify the nation's highest education priorities, so that the nation's students — and its future workforce — would be prepared to meet the technological, scientific, and economic challenges of the 21st century. As we approach the year 2000, the American public is eager to know what progress is being made. Where do the nation and the states stand?

This year's report shows that the nation has made some important progress, particularly with regard to Goal 1: Ready to Learn, Goal 3: Student Achievement and Citizenship, and Goal 5: Mathematics and Science. However, the nation is far from where it should be if we expect to achieve the National Education Goals by the end of the decade. Progress has been uneven, and performance has actually slipped in some areas.

But this does not mean that this effort has been in vain. The National Education Goals Panel acknowledges that the Goals are extremely ambitious and that they will not be easy to achieve. They were purposely designed to set high expectations for education performance at every stage of a learner's life, from the preschool years through adulthood. The Goals Panel also recognizes that the amount of effort required to achieve the Goals will be greater for some states than for others, since states began the decade at different starting points.

Despite these challenges, evidence suggests that state efforts are beginning to pay off. Not only have some individual states made remarkable progress toward the Goals, but some have made progress in multiple areas. The National Education Goals Panel realizes that these accomplishments are no small feat, and believes that they deserve to be recognized and celebrated. Our aim is to judge the nation and the states not simply by where they are now, but by how much progress they have made.

# Measuring progress toward the Goals

The Goals Panel uses 26 national and 33 state-level indicators to measure progress toward the eight National Education Goals.<sup>1</sup> These indicators were selected with the assistance of the Goals Panel's advisors, who were asked to recommend a set of measures that were, to the extent possible:

- · comprehensive across the Goals;
- most critical in determining whether the Goals were actually achieved; and
- updated at frequent intervals, so that the Panel could provide regular progress reports.

If policymakers, educators, and the public focus on improving performance on these indicators, the nation should be able to raise its overall level of "educational health" over time.

The sources of the national and state data are largescale data collections, research studies, and assessments conducted by universities, education organizations, and federal agencies such as the National Center for Education Statistics and the

<sup>1</sup> Because some of the indicators have multiple parts, there are 50 national measures and 42 state measures of progress toward the Goals. For example, the national indicator on reading achievement is composed of three measures of progress for Grades 4, 8, and 12. However, only 28 of the national measures and 31 of the state measures have been collected more than once since 1990; these are the maximum numbers of areas in which the Goals Panel can report progress over time. National Center for Health Statistics. Many of the indicators are identical at the national and state levels, such as student achievement in mathematics, science, and reading. However, in some cases, only national data are available and there is no comparable state indicator (for example, student achievement in writing, history, and geography). In other cases, we do have a measure at both the national and state levels, but the data are drawn from different sources and differ in the way they are collected or reported (for example, student drug and alcohol use).

In some cases, limited information is available to measure progress, particularly at the state level. Data gaps exist because states may choose not to participate in some data collections for reasons such as cost or the amount of time required for testing. In other cases, states may have participated in a data collection only once, and change over time cannot be determined without a second data point.

It is important to bear in mind that variations in state demographics account for some differences in performance on the state indicators. For example, states with the highest enrollments of limited English proficient students tend to have the highest percentages of teachers with specific training to teach limited English proficient students.

It is also important to note that this report does not include all Goal-related data that a state may collect. States do collect Goal-related information individually (for example, student achievement, using their own state assessments), but this information is not comparable across states. Only comparable state data are presented in the annual *Goals Reports* to ensure that state comparisons are fair and that changes over time are not due to changes in sampling or the wording of items.<sup>2</sup> The Goals Panel is committed to using a common, reliable yardstick to ensure that differences over time are due to real changes in performance.

### Report format — National data

The information in this report is organized in two sections, one on national progress and one on state progress.<sup>3</sup> America's 1998 scorecard, which summarizes progress on the 26 national indicators, is presented on pages 12-15. A detailed guide to interpreting the scorecard appears on page 11.

Baseline measures of progress, which appear in the first column on the scorecard, were established as close as possible to 1990. These serve as our starting points. For some of the indicators, such as student achievement in mathematics and reading, we hope to reach 100%. For others, such as student drug use and alcohol use, we hope to reach 0%. The most recent measures of performance for each indicator appear in the second column.

The arrows in the third column show our overall progress on each indicator:

- Arrows that point upward indicate where we have made significant<sup>4</sup> progress.
- Horizontal arrows indicate where we have seen no significant change in our performance.
- Arrows that point downward indicate where we have fallen further behind.

(No arrows are shown in cases where we do not yet have a second data point to determine whether performance has improved or declined since the baseline.)

<sup>&</sup>lt;sup>4</sup> In this report, "significance" refers to statistical significance and indicates that the observed differences are not likely to have occurred by chance. All differences in this report that are termed "statistically significant" are measured at the 0.05 level. For more information, see Appendix A.



<sup>&</sup>lt;sup>2</sup> Although the state data presented in this report are comparable, the reader should bear in mind that many variables can contribute to differences in state performance, such as available resources, curricula, and educational practices. The results presented in this report do not control for these variables.

<sup>&</sup>lt;sup>3</sup> The term "state" is used hereafter in this report to refer to the 50 states, the District of Columbia, and the U.S. territories.

Similar 4-page scorecards have been created for each state, the District of Columbia, and five U.S. territories. These scorecards appear in the 1998 Data Volume for the National Education Goals Report. Fach of the indicators on the state scorecards includes a baseline measure, the most recent update, an arrow indicating the direction of change, and the range of state scores in order to show how the state performed in relation to others. National averages are also shown if the data are comparable at the national and state levels. A limited number of printed copies of the 1998 Data Volume are available free of charge from the National Education Goals Panel. In addition, the scorecards and the complete 1998 Data Volume are available on the Goals Panel's Website, at http://www.negp.gov.

### Report format — State data

The second section of this report, which begins on page 16, summarizes state progress toward the National Education Goals. Each of the 33 state-level indicators is profiled on a separate page. Four types of information are presented:

- **1. State status report.** At the top of each state page is a tally of the numbers of states in which performance on the indicator:
  - has gotten significantly better;
  - ↔ has not changed significantly; or
  - has gotten significantly worse.

Only states that have participated in at least two data collections (so that they have both a baseline measure and an update) are included in these counts. Without at least two data points, changes in performance cannot be measured. For some indicators, such as science achievement, data have been collected only once at the state level. In these cases, changes in state performance cannot be reported for any state.

Improvement over time. The first box on each of the state pages identifies all of the states that have made significant progress on the indicator, as measured against their own starting points.

Only states that have made statistically significant improvements are included on these lists. If data have been collected only once at the state level, improvement over time cannot be reported for any state.

3. Highest-performing states. The second box on each of the state pages lists the states that were among the highest performers on the most recent assessment. "Highest-performing" does not necessarily mean that the Goals Panel considers performance in these states to be as high as it should be in order to meet the Goal. It is simply a means of recognizing those states that are doing particularly well relative to others, and that are closest to achieving the Goal by this measure of progress.

### "Highest-performing states" were defined as follows:

- When comparable national data were available, "highest-performing states" were defined as those in which state performance was significantly higher than the national average. This does not mean that merely being "above average" is the target to which states should aspire. It is simply a statistical means of determining which states would be clustered at the upper levels of performance. U.S. averages are shown only when data were comparable at the national and state levels.
- For some of the state indicators, either (a) no comparable national data were available, (b) the indicators differed at the national and state levels, or (c) the data were based on entire populations rather than samples. In such cases, "highest-performing states" were defined as those that placed among the top five states when ranked from top to bottom. More than five states are shown in cases of ties.

- For the international mathematics and science achievement indicators (16a and 16b), "highestperforming states" were defined as those that would be expected to be outperformed by the fewest countries on international mathematics and science assessments.<sup>5</sup>
- 4. Most-improved states. The third box on each of the state pages gives special recognition to the states that have made the greatest improvements over time. These states may not yet be among the highest-performing states in the nation, but they were the most successful at pushing their performance in the right direction. "Mostimproved" does not necessarily mean that the Goals Panel considers the amount of progress made to be sufficient. It is simply a means of recognizing those states that have made the greatest progress toward the Goal by this measure.

"Most-improved states" were defined as the five states that had the greatest percentage-point changes in performance in the appropriate direction, as measured against their own baselines. States are listed only if the amount of change was statistically significant. More than five states are shown in cases of ties, and fewer are shown in cases where fewer than five states made significant improvements.

### **National Findings**

In this year's report the United States received:

- 10 arrows pointing upward for significant improvement;
- ↔ 10 horizontal arrows indicating where there has been no significant change in performance; and
- 8 arrows pointing downward for significant declines in performance.

### Areas of improvement

The 10 arrows that were awarded for significant improvement are associated with Goals 1, 3, 5, and 7:

#### Goal 1: Ready to Learn

- The proportion of infants born with one or more of four health risks has decreased.
- The percentage of 2-year-olds who have been fully immunized against preventable childhood diseases has increased.
- The percentage of families who are reading and telling stories to their children on a regular basis has increased.

#### **Goal 3: Student Achievement and Citizenship**

The percentages of students who are proficient in mathematics have risen in:

- f Grade 4;
- Grade 8; and
- 🕇 Grade 12.

#### **Goal 5: Mathematics and Science**

The proportion of college degrees awarded in mathematics and science has increased. This is true for:

- all students;
- minority students; and
- female students.

# Goal 7: Safe, Disciplined, and Alcohol- and Drug-free Schools

The percentage of students who report that they have been threatened or injured at school has decreased.

<sup>5</sup> See Appendix B for more detailed information.



### Areas of decline

The 8 arrows that were awarded for significant declines in national performance are associated with Goals 3, 4, 6, and 7:

#### **Goal 3: Student Achievement and Citizenship**

The percentage of students who are proficient in reading has declined at Grade 12 (but the percentages have not changed significantly at Grades 4 and 8).

### Goal 4: Teacher Education and Professional Development

The percentage of secondary school teachers who hold a degree in their main teaching assignment has decreased.

### Goal 6: Adult Literacy and Lifelong Learning

- Fewer adults with a high school diploma or less (who need additional training the most) are participating in adult education, compared to those who have postsecondary education.
- The gap between the percentages of White and Black high school graduates who complete a college degree has grown larger.

# Goal 7: Safe, Disciplined, and Alcohol- and Drug-free Schools

- Student drug use has become more widespread.
- The percentage of students reporting that someone offered to sell or give them drugs at school has increased.
- The percentage of public school teachers reporting that they were threatened or injured at school has increased.
- A higher percentage of secondary school teachers report that disruptions in their classrooms interfere with their teaching.

### **State Findings**

### Areas of improvement

In this year's report 18 states received 10 or more arrows pointing upward for significant improvement during the 1990s. North Carolina led the states, with significant improvement on 14 measures, followed by South Carolina with 13, and California, Colorado, and Texas with 12.

Key improvements made by states during the 1990s are as follows:

### Goal 1: Ready to Learn

- 35 states reduced the percentage of infants born with one or more of four health risks.
- 50 states increased the percentage of mothers receiving early prenatal care.
- 47 states increased the proportion of children with disabilities participating in preschool.

### **Goal 2: School Completion**

9 states increased the high school completion rate among young adults.

### Goal 3: Student Achievement and Citizenship

- 27 states increased the percentage of 8th graders who are proficient in mathematics.
- 50 states increased the proportion of scores on Advanced Placement examinations that were high enough to qualify for college credit.

### Goal 4: Teacher Education and Professional Development

17 states increased the percentage of public school teachers who received support from a master or mentor teacher during their first year of teaching.

### **Goal 5: Mathematics and Science**

- 47 states increased the percentage of degrees earned by all students that were awarded in mathematics or science.
- 33 states increased the percentage of degrees earned by minority students that were awarded in mathematics or science.
- 42 states increased the percentage of degrees earned by female students that were awarded in mathematics or science.

### Goal 6: Adult Literacy and Lifelong Learning

- 10 states increased voter registration.
- 39 states increased the percentage of high school graduates who immediately enrolled in college.

### **Goal 8: Parental Participation**

17 states increased the influence of parent associations on public school policies.

### Areas of decline

Areas in which large numbers of states showed significant declines in performance during the 1990s are as follows:

#### Goal 1: Ready to Learn

In 32 states, the percentage of infants born at low birthweight has increased.

#### **Goal 2: School Completion**

In 10 states, the high school dropout rate has increased.

### **Goal 5: Mathematics and Science**

In 15 states, the percentage of degrees awarded to minority students that were in mathematics or science has decreased.

#### Goal 6: Adult Literacy and Lifelong Learning

In 11 states, lower percentages of students are enrolling in college immediately after high school.

# Goal 7: Safe, Disciplined, and Alcohol- and Drug-free Schools

- In 16 states, student marijuana use has become more widespread.
- In 15 states, higher percentages of students report that drugs are available on school property.
- In 37 states, higher percentages of public school teachers report that student disruptions in class interfere with their teaching.

### **Highest-performing states**

The states that were most frequently among the top performers on measures of progress toward the National Education Goals were Maine (21 times), Connecticut (20 times), and North Dakota (17 times). States that are doing particularly well in each of the Goal areas, relative to others, are as follows:

### Goal 1: Ready to Learn

States in New England are consistently among the highest-performing states on the health and preschool measures of progress toward Goal 1. Vermont placed among the highest-performing states on 2 out of 5 indicators; Connecticut, Massachusetts, and Rhode Island placed among the highest-performing states on 3 out of 5 indicators; and Maine and New Hampshire placed among the highest-performing states on 4 out of 5 indicators.

#### **Goal 2: School Completion**

- Fifteen states have already met Goal 2. In 1996, the high school completion rate of the 18- to 24-year-olds in each of these states was already at or above 90%:
  - 1. Connecticut
  - 2. Hawaii
- 9. Nebraska 10. New Hampshire
- 3. Kansas
- 11. New York 12. Utah
- Maine
   Maryland
- 13. Virginia
- 6. Massachusetts
- 7. Michigan
- 8. Minnesota
- West Virginia
   Wisconsin

-6

■ As a general rule, states in the upper Midwest and in New England have the highest percentages of students who are proficient in reading, Iowa, Minnesota, mathematics, and science. Montana, North Dakota, and Wisconsin were among the highest-performing states 3 out of 4 times in these subjects at Grades 4 and 8. Connecticut and Maine placed among the highest performers 4 out of 4 times.

### **Goal 4: Teacher Education and Professional** Development

- In Florida and Oklahoma, nearly half of all public school teachers report that they received support from a master or mentor teacher during their first vear of teaching.
- In North Dakota and Rhode Island, 100% of the public secondary school teachers hold teaching certificates in their main teaching assignments.

### **Goal 5: Mathematics and Science**

- In 8th grade science, 14 states would be expected to perform as well as, or better than, 40 out of 41 nations, including Canada, England, France, Germany, Hong Kong, Japan, Korea, and the Russian Federation. Only Singapore would be expected to outperform these states:
  - 1. Colorado 8. Nebraska
  - 2. Connecticut 9. North Dakota 10. Oregon
  - 3. Iowa
  - 4. Maine 11. Utah
  - 5. Massachusetts 12. Vermont
  - 6. Minnesota<sup>6</sup> 13. Wisconsin
  - 7. Montana 14. Wyoming

### Goal 6: Adult Literacy and Lifelong Learning

Nearly six out of ten adults in Indiana and nearly seven out of ten adults in Washington scored at the three highest levels of proficiency on a 1992 adult literacy assessment.

### Goal 7: Safe, Disciplined, and Alcohol- and Drug-free Schools

South Dakota presents the most favorable conditions regarding school safety, discipline, and student drug and alcohol use. South Dakota placed among the highest-performing states 5 out of 9 times on measures of progress toward Goal 7.

### Goal 8: Parental Participation

Maine, Minnesota, Nebraska, North Dakota, and Vermont each ranked among the highest-performing states on 2 out of 3 measures of progress toward Goal 8.

### **Most-improved states**

The states that ranked among the most-improved states the greatest number of times on measures of progress toward the National Education Goals were the District of Columbia (7 times), followed by Connecticut, North Carolina, South Carolina and West Virginia (6 times each).

Some of the largest percentage-point increases made at the state level during the 1990s are as follows:

### Goal 1: Ready to Learn

- In 1990, nearly half of the infants in the District of Columbia were born with one or more of four health risks that can adversely affect their later health, behavior, and academic achievement. In six years' time, the District of Columbia reduced the proportion of infants born with these health risks by 11 percentage points, from 48% to 37%.
- In 1994, no state had a lower immunization rate for 2-year-olds than Michigan (61%). In three years' time, Michigan increased its immunization rate by 16 percentage points. Nearly 8 in 10 Michigan 2-year-olds are now fully immunized against preventable childhood diseases.

<sup>6</sup> Results for Minnesota are based on actual scores, not estimated scores. See Appendix B.

In 1990, the percentage of mothers in New Mexico who received early prenatal care was 57%, a rate that was 30 percentage points lower than the highest-performing state and among the lowest in the nation. In six years' time, New Mexico increased the percentage of mothers receiving early prenatal care by 12 percentage points. Seven out of ten New Mexican mothers now receive early prenatal care.

#### **Goal 2: School Completion**

In 1990, no state had a lower high school completion rate than Tennessee (77%). Over a sixyear period, Tennessee increased its high school completion rate significantly, to 84%.

#### **Goal 3: Student Achievement and Citizenship**

- Over a six-year period, North Carolina more than doubled the proportion of its 8th graders who are proficient in mathematics, from 9% to 20%.
- In addition, Minnesota and Michigan increased the proportions of their 8th graders who are proficient in mathematics by 11 and 12 percentage points, respectively. Texas increased its proportion of proficient 4th graders by 10 percentage points.

### Goal 4: Teacher Education and Professional Development

In 1991, approximately one-fifth of the public school teachers in Pennsylvania, New York, and Virginia had received support from a master or mentor teacher during their first year of teaching. Three years later, nearly one-third of the teachers in these states had received this kind of support. In North Carolina and Kentucky, the proportions increased from approximately one-fourth to more than one-third.

#### **Goal 5: Mathematics and Science**

Between 1991 and 1995, the proportion of college degrees earned by female students in Connecticut that were awarded in mathematics and science rose from 37% to 47%.

#### **Goal 6: Adult Literacy and Lifelong Learning**

In 1992, only 33% of the high school graduates in the District of Columbia immediately went on to attend a 2-year or 4-year college. By 1996, that figure had jumped 25 percentage points, to 58%.

# Goal 7: Safe, Disciplined, and Alcohol- and Drug-free Schools

During the 1990s, three states and one territory significantly reduced the percentage of public high school students reporting that they carried a weapon on school property: North Carolina, South Carolina, Wisconsin, and American Samoa. In 1997, no state had a lower percentage of students who reported carrying weapons on school property than Wisconsin (5%).

#### **Goal 8: Parental Participation**

- In three years' time, California, Colorado, and Indiana reduced the proportions of public school principals reporting that lack of parental involvement in their schools was a serious problem by nearly half, from approximately 1 out of 5 principals to approximately 1 out of 10.
- The percentages of public school principals reporting that the parent associations in their schools have influence on school policy has nearly doubled in Colorado, New York, and Utah. The percentages have more than doubled in Kentucky and Pennsylvania, and the percentage has tripled in Vermont.



### Conclusions

A logical question that educators and policymakers should now be asking is how the states that were among the top performers, or that made the greatest gains, accomplished these feats. A new "Lessons from the States" series of publications by the National Education Goals Panel will help answer that question. Promising Practices: Progress toward the Goals examines programs and policies implemented by some of the highest-performing and most-improved states that state and local officials believe account for The 1998 volume of Promising their success. Practices focuses on one indicator of progress for each of the eight Goals. It includes case studies of states that are making significant progress on individual indicators, such as raising student academic achievement in mathematics and boosting high school completion rates. A separate publication, Exploring Rapid Achievement Gains in North Carolina and Texas, presents case studies of two states that have shown improvement on multiple measures. In addition, the Goals Panel plans to continue highlighting a different indicator each month in its publication series, the NEGP Monthly. Printed copies of each of these publications can be obtained free of charge from the National Education Goals Panel. Each publication can also be found on the Goals Panel's Website, http://www.negp.gov.

While it is true that the nation still has far to go before achieving the challenging targets set in the National Education Goals, individual states are making progress that deserves our attention. Their progress should inspire and encourage all states.

# National Progress

# Guide to Reading the U.S. Scorecard

	0	2	3
5	Baseline	Update	Progress?
<ol> <li>Children's Health Index: Has the U.S. reduced the percentage of infants born with 1 or more health risks? (1990 vs. 1996)</li> </ol>	37%	34%	+
<ul> <li>6. Reading Achievement: Has the U.S. increased the percentage of students who meet the Goals Panel's performance standard in reading? (1992 vs. 1994)</li> <li>Grade 4</li> <li>Grade 8</li> <li>Grade 12</li> </ul>	29% 29% 40%	30% <sup>ns</sup> 30% <sup>ns</sup> 36%	
<ul> <li>10. History Achievement: Has the U.S. increased the percentage of students who meet the Goals Panel's performance standard in U.S. history? (1994)</li> <li>Grade 4</li> <li>Grade 8</li> <li>Grade 12</li> </ul>	17% 14% 11%	    8	4

- 1 Data in this column represent our starting points. Baselines were established as close as possible to 1990, the year that the National Education Goals were adopted.
- 2 Data in this column represent our current level of performance and are the most recent data available.
- 3 Progress represents progress from the baseline year to the most recent update year.
- **4** Progress is shown by an arrow. Arrows that point upward indicate that we have made progress. Arrows that point downward indicate that we have fallen further behind. Horizontal arrows indicate that performance has not changed or that the change was not statistically significant. (See Appendix A for an explanation of statistical significance.)
- 5 The source of the data and any technical notes for each national indicator are referenced by this number in Appendix A.
- 6 The date(s) in parentheses indicates the year(s) in which data were collected for the national indicator. If there are two dates, the first indicates the baseline year and the second indicates the most recent year in which data were collected.
- **7** ns means that a change from the baseline year to the most recent year was not statistically significant. (See Appendix A for an explanation of statistical significance.)
- 8 means data not available.

U	INITED STATES	Baseline	Update	Progress?
	GOAL 1 Ready to Learn			
1.	<b>Children's Health Index:</b> Has the U.S. reduced the percentage of infants born with 1 or more health risks? (1990 vs. 1996)	37%	34%	<b>†</b>
2.	<b>Immunizations:</b> Has the U.S. increased the percentage of 2-year-olds who have been fully immunized against preventable childhood diseases? (1994 vs. 1997)	75%	78%	+
3.	<b>Family-Child Reading and Storytelling</b> : Has the U.S. increased the percentage of 3- to 5-year-olds whose parents read to them or tell them stories regularly? (1993 vs. 1996)	66%	72%	t
4.	<b>Preschool Participation:</b> Has the U.S. reduced the gap (in percentage points) in preschool participation between 3- to 5-year-olds from high- and low-income families? (1991 vs. 1996)	28 points	29 points <sup>ns</sup>	↔
	GOAL 2 School Completion			
5.	<b>High School Completion</b> : Has the U.S. increased the percentage of 18- to 24-year-olds who have a high school credential? (1990 vs. 1997)	86%	86%	↔
	GOAL 3 Student Achievement and Citizen	iship		
6.	Reading Achievement: Has the U.S. increased the percentage of students who meet the Goals Panel's performance standard in reading? (1992 vs. 1994) • Grade 4 • Grade 8 • Grade 12	29% 29% 40%	30% <sup>ns</sup> 30% <sup>ns</sup> 36%	<b>⇔</b> <b>↔</b> +
7.	<ul> <li>Writing Achievement: Has the U.S. increased the percentage of students who can produce basic, extended, developed, or elaborated responses to narrative writing tasks? (1992)</li> <li>Grade 4</li> <li>Grade 8</li> <li>Grade 12</li> </ul>	55% 78% —	_ _ _	

12

Interpret with caution. Change was not statistically significant.

# **UNITED STATES**

Progress?

### **GOAL 3** Student Achievement and Citizenship (continued)

the percentage of student	nt: Has the U.S. increased ts who meet the Goals Panel's mathematics? (1990 vs. 1996)	13% 15% 12%	21% 24% 16%	† † †
<ul> <li>9. Science Achievement: Happercentage of students w performance standard in</li> <li>Grade 4</li> <li>Grade 8</li> <li>Grade 12</li> </ul>	ho meet the Goals Panel's	29% 29% 21%	 	
<ul> <li>History Achievement: Ha percentage of students w performance standard in</li> <li>Grade 4</li> <li>Grade 8</li> <li>Grade 12</li> </ul>	ho meet the Goals Panel's	17% 14% 11%		
<ul> <li>11. Geography Achievement: the percentage of student Panel's performance stan</li> <li>Grade 4</li> <li>Grade 8</li> <li>Grade 12</li> </ul>		22% 28% 27%		

### **GOAL 4** Teacher Education and Professional Development

12.	<b>Teacher Preparation:</b> Has the U.S. increased the percentage of secondary school teachers who hold an undergraduate or graduate degree in their main teaching assignment? (1991 vs. 1994)	66%	63%	+
13.	<b>Teacher Professional Development:</b> Has the U.S. increased the percentage of teachers reporting that they participated in professional development programs on 1 or more topics since the end of the previous school year? (1994)	85%	_	

# **UNITED STATES**

4. International Mathematics Achievement: Has the U.S. improved its standing on international mathematics			
assessments? (1996) • Grade 4	7 out of 25 oo	untries scored abo	wa tha LLC
• Grade 8		untries scored abo	
• Grade 12		untries scored abo	
<ol> <li>International Science Achievement: Has the U.S. improved its standing on international science assessments? (1996)</li> </ol>			
Grade 4	1 out of 25 co	untries scored abo	ove the U.S
Grade 8	9 out of 40 co	untries scored abo	ove the U.S
• Grade 12	11 out of 20 co	untries scored abo	ove the U.S
<ol> <li>Mathematics and Science Degrees: Has the U.S. increased mathematics and science degrees (as a percentage of all degrees) awarded to:</li> </ol>			
• all students? (1991 vs. 1995)	39%	42%	+
<ul> <li>minorities (Blacks, Hispanics, American Indians/</li> </ul>			
Alaskan Natives)? (1991 vs. 1995)	39%	40%	+
<ul> <li>females? (1991 vs. 1995)</li> </ul>	35%	37%	+

<ol> <li>Adult Literacy: Has the U.S. increased the percentage of adults who score at or above Level 3 in prose literacy? (1992)</li> </ol>	52%	_	
<b>18. Participation in Adult Education</b> : Has the U.S. reduced the gap (in percentage points) in adult education participation between adults who have a high school diploma or less, and those who have additional postsecondary education or technical training? (1991 vs. 1995)	27 points	32 points	÷
<ul> <li>19. Participation in Higher Education: Has the U.S. reduced the gap (in percentage points) between White and Black high school graduates who:</li> <li>enroll in college? (1990 vs. 1996)</li> <li>complete a college degree? (1992 vs. 1997)</li> </ul>	14 points 16 points	11 points <sup>ns</sup> 21 points	↔ +
<ul> <li>Has the U.S. reduced the gap (in percentage points)</li> <li>between White and Hispanic high school graduates who:</li> <li>enroll in college? (1990 vs. 1996)</li> <li>complete a college degree? (1992 vs. 1997)</li> </ul>	11 points 15 points	9 points <sup>ns</sup> 17 points <sup>ns</sup>	<b>↔</b>

Data not available. ns

\_

Interpret with caution. Change was not statistically significant.

# **UNITED STATES**

### GOAL 7 Safe, Disciplined, and Alcohol- and Drug-free Schools

<ul> <li>20. Overall Student Drug and Alcohol Use: Has the U.S. reduced the percentage of 10th graders reporting doing the following during the previous year:</li> <li>using any illicit drug? (1991 vs. 1997)</li> <li>using alcohol? (1993 vs. 1997)</li> </ul>	24%	40%	<b>+</b>
	63%	65% <sup>ns</sup>	↔
<b>21. Sale of Drugs at School:</b> Has the U.S. reduced the percentage of 10th graders reporting that someone offered to sell or give them an illegal drug at school during the previous year? (1992 vs. 1997)	18%	33%	ŧ
<ul> <li>22. Student and Teacher Victimization: Has the U.S. reduced the percentage of students and teachers reporting that they were threatened or injured at school during the previous year?</li> <li>10th grade students (1991 vs. 1997)</li> <li>public school teachers (1991 vs. 1994)</li> </ul>	40% 10%	33% 15%	‡
<ul> <li>23. Disruptions in Class by Students: Has the U.S. reduced the percentage of students and teachers reporting that student disruptions interfere with teaching and learning?</li> <li>10th grade students (1992 vs. 1997)</li> <li>secondary school teachers (1991 vs. 1994)</li> </ul>	17%	18% <sup>ns</sup>	↔
	37%	46%	+

### GOAL 8 Parental Participation

24. Schools' Reports of Parent Attendance at Parent- Teacher Conferences: Has the U.S. increased the percentage of K-8 public schools which reported that more than half of their parents attended parent-teacher conferences during the school year? (1996)	78%	_	
25. Schools' Reports of Parent Involvement in School Policy Decisions: Has the U.S. increased the percentage of K-8 public schools which reported that parent input is considered when making policy decisions in three or more areas? (1996)	41%	_	
26. Parents' Reports of Their Involvement in School Activities: Has the U.S. increased the percentage of students in Grades 3-12 whose parents reported that they participated in two or more activities in their child's school during the current school year? (1993 vs. 1996)	63%	62% <sup>ns</sup>	<b>+</b>

Data not available.

ns Interpret with caution. Change was not statistically significant.

# State Progress

# State Indicator 1. Children's Health Index

Have states1 reduced the percentages of infants born with one or more of four health risks?2

- Better 35 states and the U.S.
- No Change 10 states
  - Worse 4 states

### Improvement over time

Between 1990 and 1996, the U.S. and 35 states (out of 49) significantly reduced the percentages of infants born with one or more of four health risks:

- 1. Alabama
- 2. Arizona
- 3. Colorado
- 4. Delaware
- 5. District of Columbia
- 6. Florida
- 7. Georgia
- 8. Hawaii
- 9. Idaho

- 10. Illinois 11. Iowa
- 12. Kentucky
- 13. Louisiana
- 14. Maryland
- 15. Massachusetts
- 16. Michigan
- 17. Mississippi
- 18. Missouri

- 19. Montana
- 20. Nebraska
- 21. Nevada
- 22. New Hampshire
- 23. North Carolina
- 24. Ohio
- 25. Oregon
- 26. Pennsylvania
- 27. Rhode Island

- 28. South Carolina
- 29. Texas
- 30. Vermont
- 31. Virginia
- 32. West Virginia
- 33. Wisconsin
- 34. Guam
- 35. Puerto Rico

(4000)

~ \*

### **Highest-performing states\***

States with the lowest percentages of infants born with one or more of four health risks:

	(1996)	(	1996)
Hawaii	24%	Georgia	32%
Connecticut	25%	Kansas	32%
Maryland	29%	Massachusetts	32%
Texas	29%	New Hampshire	32%
Minnesota	30%	Virginia	32%
Utah	30%	Idaho	33%
Florida	31%	Illinois	33%
Rhode Island	31%	Nevada	33%
Arizona	32%	U.S.	34%
Colorado	32%	0.0.	01/0
* States that ha	d a signi	ficantly lower	

\* States that had a significantly lower percentage than the U.S. average.

### Most-improved states

States that made the greatest reductions in the percentages of infants born with one or more of four health risks:

(1990)	(1996)	Change*
48%	37%	-11
42%	32%	-10
37%	31%	-7
30%	24%	-7
38%	33%	-6
36%	31%	-6
	48% 42% 37% 30% 38%	48%         37%           42%         32%           37%         31%           30%         24%           38%         33%

(4000)

\*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.

<sup>2</sup> Risks are: late (in third trimester) or no prenatal care; low maternal weight gain (less than 21 pounds); mother smoked during pregnancy; or mother drank alcohol during pregnancy.

See Appendix B for definitions, sources, and technical notes.



### State Indicator 2. Immunizations

Have states<sup>1</sup> increased the percentages of 2-year-olds who have been fully immunized against preventable childhood diseases?

↑ Better 6 states and the U.S.
 ↔ No Change 45 states
 ↓ Worse 0 states

### Improvement over time

Between 1994 and 1997, the U.S. and 6 states (out of 51) significantly increased the percentages of 2-year-olds who had been fully immunized against preventable childhood diseases:

Alabama
 Illinois

- Michigan
   Missouri
- 5. Washington
  - 6. West Virginia

### Highest-performing states\*

States with the highest percentages of fully-immunized 2-year-olds:

	(1997)
Connecticut	87%
Maine	87%
Massachusetts	87%
Alabama	86%
Vermont	86%
New Hampshire	85%
Rhode Island	84%
North Dakota	83%
U.S.	78%
* States that had a signifi percentage than the U.S	, 0

### Most-improved states

States that made the greatest gains in the percentages of fully-immunized 2-year-olds:

	(1994)	(1997)	Change	
Michigan	61%	77%	+16	
West Virginia	66%	82%	+16	
Missouri	64%	78%	+14	
Alabama	75%	86%	+11	
Illinois	68%	76%	+8	



### State Indicator 3. Low Birthweight

Have states' reduced the percentages of infants born at low birthweight (less than 5.5 pounds)?

4

- Better 2 states
- No Change 20 states and the U.S.
- Worse 32 states

### Improvement over time

Between 1990 and 1996, 2 states (out of 54) significantly reduced the percentages of infants born at low birthweight (less than 5.5 pounds):

- 1. District of Columbia
- 2. Virgin Islands

### Highest-performing states\*

States with the lowest percentages of infants born at low birthweight (less than 5.5 pounds):

	(1996)
Alaska	5%
New Hampshire	5%
Oregon	5%
California	6%
Idaho	6%
lowa	6%
Maine	6%
Massachusetts	6%
Minnesota	6%
Montana	6%
Nebraska	6%
North Dakota	6%
South Dakota	6%
Vermont	6%
Washington	6%
Wisconsin	6%
U.S.	7%
* Top 16 states.	

### **Most-improved states**

States that made the greatest reductions in the percentages of infants born at low birthweight (less than 5.5 pounds):

	(1990)	(1996)	Change
Virgin Islands	9%	7%	-2
District of Columbia	15%	14%	-1

# State Indicator 4. Early Prenatal Care

Have states<sup>1</sup> increased the percentages of mothers who began receiving prenatal care during their first trimester of pregnancy?

↑ Better 50 states and the U.S.
 ↔ No Change 4 states
 ↓ Worse 0 states

### Improvement over time

Between 1990 and 1996, the U.S. and 50 states (out of 54) significantly increased the percentages of mothers who began receiving prenatal care during their first trimester of pregnancy:

- 1. Alabama
- 2. Alaska
- 3. Arizona
- 4. Arkansas
- 5. California
- 6. Colorado
- 7. Connecticut
- 8. Delaware
- 9. District of Columbia
- 10. Florida
- 11. Georgia
- 12. Hawaii
- 13. Idaho

- 14. Illinois 15. Indiana
- 16. lowa
- 17. Kansas
- 18. Kentucky
- 19. Louisiana
- 20. Maine
- 21. Maryland
- 22. Michigan
- 23. Minnesota
- 24. Mississippi
- 25. Missouri 26. Montana

- 27. Nebraska
- 28. Nevada
- 29. New Hampshire
- 30. New Mexico
- 31. New York
- 32. North Carolina
- 33. North Dakota
- 34. Ohio
- 35. Oklahoma
- 36. Oregon
- 37. Pennsylvania
- 38. Rhode Island
- 39. South Carolina

- 40. South Dakota
- 41. Tennessee
- 42. Texas
- 43. Vermont
- 44. Virginia
- 45. Washington
- 46. West Virginia
- 47. Wisconsin
- 48. Wyoming
- 49. Puerto Rico
- 50. Virgin Islands

### Highest-performing states\*

States with the highest percentages of mothers who began receiving prenatal care during their first trimester of pregnancy:

	(1996)
Maine	90%
Rhode Island	90%
New Hampshire	89%
Connecticut	88%
Maryland	88%
U.S.	82%
* Top 5 states.	

### Most-improved states

States that made the greatest gains in the percentages of mothers who began receiving prenatal care during their first trimester of pregnancy:

	(1990)	(1996)	Change*
Georgia	73%	85%	+12
New Mexico	57%	70%	+12
Florida	72%	83%	+11
Hawaii	73%	84%	+11
South Carolina	69%	79%	+11
*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding.			

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.



See Appendix B for definitions, sources, and technical notes.

States that mag

# State Indicator 5. Preschool Programs for Children with Disabilities

Have states' increased the numbers of children with disabilities enrolled in preschool (per 1,000 3- to 5-year-olds)?

<b>†</b> –	Better	47 states
↔	No Change	2 states
ŧ	Worse	2 states

### Improvement over time

Between 1991 and 1997, 47 states (out of 51) significantly increased the numbers of children with disabilities enrolled in preschool (per 1,000 3- to 5-year-olds):

- 1. Alabama
- 2. Alaska
- 3. Arizona
- 4. Arkansas
- 5. California
- 6. Colorado
- 7. Connecticut
- 8. Delaware
- 9. Florida
- 10. Georgia
- 11. Hawaii 12. Idaho

### 15. Kansas 16. Kentucky 17. Louisiana

13. Indiana

14. Iowa

- 18. Maine
- 19. Maryland
- 20. Massachusetts
- 21. Michigan
- 22. Minnesota
- 23. Mississippi
- 24. Missouri

- 25. Montana 26. Nebraska
- 27. Nevada
- 28. New Hampshire
- 29. New Mexico
- 30. New York
- 31. North Carolina
- 32. North Dakota
- 33. Ohio
- 34. Oregon
- 35. Pennsylvania
- 36. Rhode Island

- 37. South Carolina
- 38. South Dakota
- 39. Tennessee
- 40. Texas
- 41. Utah
- 42. Vermont
- 43. Virginia
- 44. Washington
- 45. West Virginia
- 46. Wisconsin
- 47. Wyoming
- 47. wyonning

lighest-perfo	rming states*	Most	-improved	states	;
States with the hig children with disab preschool (per 1,00		States that made the greatest gains in the numbers of children with disabilities enrolled in preschool (per 1,000 3- to 5-year-olds):			
	(1997)		(1991)	(1997)	Change
Kentucky	95	West Virginia	43	77	+34
Vaine	79	Arkansas	45	73	+28
Nyoming	78	Kentucky	68	95	+27
West Virginia	77	New Mexico	28	55	+27
Arkansas	73	Kansas	33	58	+25
No comparable nat	ional data available.	Maine	54	79	+25
* Top 5 states.	ional data avallable.	New York	35	60	+25

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.

See Appendix B for definitions, sources, and technical notes.



# **GOAL 2: School Completion**

### State Indicator 6. High School Completion Rates

Have states' increased the percentages of 18- to 24-year-olds who have a high school credential?

- Better 9 states
- No Change 40 states and the U.S.
- Worse 2 states

### Achieved the Goal

Goal 2 states that by the year 2000, the high school graduation rate will increase to at least 90%. In 1996, 18- to 24-year-olds in 15 (out of 51) states had already achieved a 90% high school completion rate:

- 1. Connecticut
- 2. Hawaii
- 3. Kansas
- 4. Maine

- 5. Maryland
- 6. Massachusetts
- 7. Michigan
- 8. Minnesota
- 9. Nebraska 10. New Hampshire
- 11. New York
- 12. North Dakota
- 13. Utah
   14. West Virginia
- 15. Wisconsin
- Improvement over time

Between 1990 and 1996, 9 states (out of 51) significantly increased the percentages of 18- to 24-year-olds who have a high school credential:

- California
   Connecticut
- 4. Maryland
- 5. Michigan

3. Illinois

- 6. North Carolina
- 7. South Carolina
- 8. Tennessee
- 9. West Virginia

### **Highest-performing states\***

States with the highest percentages of 18- to 24-year-olds with a high school credential:

(	1996)		(1996)
Maryland	95%	Wisconsin	91%
Connecticut	94%	Michigan	90%
Hawaii	93%	New York	90%
Kansas	92%	West Virginia	90%
Minnesota	92%	Illinois	89%
Maine	91%	Ohio	89%
Massachusetts	91%	Pennsylvania	88%
New Hampshire	91%	U.S.	86%
Utah	91%	0.0.	0070
* States that had	a signifi	cantly higher	

States that had a significantly higher percentage than the U.S. average.

States that made the greatest gains in the percentages of 18- to 24-year-olds with a high school credential:

Most-improved states

	(1990)	(1996)	Change*
Maryland	87%	95%	+8
Tennessee	77%	84%	+8
South Carolina	83%	89%	+7
West Virginia	83%	90%	+7
Connecticut	90%	94%	+5

\*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding.



# **GOAL 2: School Completion**

# State Indicator 7. High School Dropout Rates

Have states' reduced the percentages of students in Grades 9-12 who leave school without completing a recognized secondary program?



### Improvement over time

Between 1992 and 1995, 3 states (out of 24) significantly reduced the percentages of students in Grades 9-12 who left school without completing a recognized secondary program:

1. California 3. Louisiana\*

2. District of Columbia

\*Data for Louisiana were collected in 1994 and 1995.

### **Highest-performing states\***

States with the lowest percentages of students in Grades 9-12 who left school without completing a recognized secondary program:

	(1995)
Puerto Rico	2%
lowa	3%
Maine	3%
North Dakota	3%
California	4%
Louisiana	4%
Massachusetts	4%
New York	4%
Pennsylvania	4%
Utah	4%
West Virginia	4%
No comparable national data	available.

\* Top 11 states.

### Most-improved states

States that made the greatest reductions in the percentages of students in Grades 9-12 who left school without completing a recognized secondary program:

	(1992)	(1995)	Change*
California	5%	4%	-2
Louisiana**	5%	4%	-2
District of Columbia	12%	11%	-1

\*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding. \*\*Data for Louisiana were collected in 1994 and 1995.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.

See Appendix B for definitions, sources, and technical notes.

### State Indicator 8. Reading Achievement — 4th grade

The National Education Goals Panel has set its performance standard at the two highest levels of achievement — Proficient or Advanced — on the National Assessment of Educational Progress (NAEP). Have states' increased the percentages of public school 4th graders who meet the Goals Panel's performance standard in reading?

↑ Better 1 state
 ↔ No Change 37 states and the U.S.
 ↓ Worse 0 states

### Improvement over time

Between 1992 and 1994, 1 state (out of 38) significantly increased the percentage of public school 4th graders who met the Goals Panel's performance standard in reading:

1. Mississippi

### Highest-performing states\*

States with the highest percentages of public school 4th graders who met the Goals Panel's performance standard in reading:

	(1994)
Maine	41%
Connecticut	38%
North Dakota	38%
Massachusetts	36%
New Hampshire	36%
lowa	35%
Montana	35%
U.S.	30%
* States that had a significar	ntly higher

percentage than the U.S. average.

Most-improved states

States that made the greatest gains in the percentages of public school 4th graders who met the Goals Panel's performance standard in reading:

	(1992)	(1994)	Change	
Mississippi	14%	18%	+4	



### State Indicator 9a. Mathematics Achievement — 4th grade

The National Education Goals Panel has set its performance standard at the two highest levels of achievement — Proficient or Advanced — on the National Assessment of Educational Progress (NAEP). Have states' increased the percentages of public school 4th graders who meet the Goals Panel's performance standard in mathematics?

↑ Better 7 states and the U.S.
 ↔ No Change 32 states
 ↓ Worse 0 states

### Improvement over time

Between 1992 and 1996, the U.S. and 7 states (out of 39) significantly increased the percentages of public school 4th graders who met the Goals Panel's performance standard in mathematics:

- Colorado
   Connecticut
- Indiana
   North Carolina
- 5. Tennessee 6. Texas
- 7. West Virginia

### Highest-performing states\*

States with the highest percentages of public school 4th graders who met the Goals Panel's performance standard in mathematics:

	(1996)	
Connecticut	31%	
Minnesota	29%	
Maine	27%	
Wisconsin	27%	
U.S.	21%	
* States that had a significantly higher percentage than the U.S. average.		

### Most-improved states

States that made the greatest gains in the percentages of public school 4th graders who met the Goals Panel's performance standard in mathematics:

	(1992)	(1996)	Change	
Texas	15%	25%	+10	
Indiana	16%	24%	+8	
North Carolina	13%	21%	+8	
Connecticut	24%	31%	+7	
Tennessee	10%	17%	+7	
West Virginia	12%	19%	+7	



### State Indicator 9b. Mathematics Achievement — 8th grade

The National Education Goals Panel has set its performance standard at the two highest levels of achievement — Proficient or Advanced — on the National Assessment of Educational Progress (NAEP). Have states' increased the percentages of public school 8th graders who meet the Goals Panel's performance standard in mathematics?

Better 27 states and the U.S.
No Change 19 states

Worse 0 states

### Improvement over time

Between 1990 and 1996, the U.S. and 27 states (out of 46) significantly increased the percentages of public school 8th graders who met the Goals Panel's performance standard in mathematics:

- 1. Arizona
- 2. Arkansas
- 3. California
- 4. Colorado
- 5. Connecticut
- 6. Delaware
- 7. Florida

- 8. Hawaii 9. Indiana
- 10. lowa
- 11. Kentucky
- 12. Maryland
- 13. Michigan
- Minnesota

- 15. Montana
- 16. Nebraska
- 17. New Hampshire\*
- 18. New Mexico
- 19. New York
- 20. North Carolina
- 21. North Dakota

- 22. Oregon
- 23. Rhode Island
- 24. Texas
- 25. West Virginia
- 26. Wisconsin
- 27. Wyoming

\* Data for New Hampshire were collected in 1990 and 1992.

### Highest-performing states\*

States with the highest percentages of public school 8th graders who met the Goals Panel's performance standard in mathematics:

	(1996)
Minnesota	34%
North Dakota	33%
Montana	32%
Wisconsin	32%
Connecticut	31%
lowa	31%
Maine	31%
Nebraska	31%
Alaska	30%
U.S.	24%

\* States that had a significantly higher percentage than the U.S. average.

**Most-improved states** 

States that made the greatest gains in the percentages of public school 8th graders who met the Goals Panel's performance standard in mathematics:

	(1990)	(1996)	Change	
Michigan	16%	28%	+12	
Minnesota	23%	34%	+11	
North Carolina	9%	20%	+11	
Connecticut	22%	31%	+9	
Wisconsin	23%	32%	+9	



# State Indicator 10. Science Achievement — 8th grade

The National Education Goals Panel has set its performance standard at the two highest levels of achievement — Proficient or Advanced — on the National Assessment of Educational Progress (NAEP). Have states' increased the percentages of public school 8th graders who meet the Goals Panel's performance standard in science?

### Improvement over time

Improvement over time cannot be determined yet because NAEP has assessed science only once at the state level. The Goals Panel will report state improvements when science is assessed again in 2000.

### Highest-performing states\*

States with the highest percentages of public school 8th graders who met the Goals Panel's performance standard in science:

	(1996)
Maine	41%
Montana	41%
North Dakota	41%
Wisconsin	39%
Massachusetts	37%
Minnesota	37%
Connecticut	36%
lowa	36%
Nebraska	35%
Wyoming	34%
U.S.	29%
* States that had a signific percentage than the U.S	, 0

### **Most-improved states**

States that made the greatest gains in the percentages of public school 8th graders who met the Goals Panel's performance standard in science:

The states that made the greatest improvements over time cannot be identified yet because NAEP has assessed science only once at the state level. The Goals Panel will recognize the most-improved states when science is assessed again in 2000.

### State Indicator 11. Advanced Placement Performance

Have states' increased the number of Advanced Placement examinations receiving a grade of 3 or higher (per 1,000 11th and 12th graders)?

↑ Better 50 states and the U.S.
 ↔ No Change 0 states
 ↓ Worse 1 state

### Improvement over time

Between 1991 and 1998, the U.S. and 50 states (out of 51) significantly increased the numbers of Advanced Placement examinations receiving a grade of 3 or higher (per 1,000 11th and 12th graders):

- 1. Alabama
- 2. Alaska
- 3. Arizona
- 4. Arkansas
- 5. California
- 6. Colorado
- 7. Connecticut
- 8. Delaware
- 9. District of Columbia
- 10. Florida
- 11. Georgia
- 12. Hawaii
- 13. Idaho

- 14. Illinois
   15. Indiana
- 16. Iowa
- 17. Kansas
- 18. Kentucky
- 19. Louisiana
- 20. Maine
- 21. Maryland
- 22. Massachusetts
- 23. Michigan
- 24. Minnesota
- 25. Mississippi
- 26. Missouri

- 27. Montana
- 28. Nebraska
- 29. Nevada
- 30. New Hampshire
- 31. New Jersey
- 32. New Mexico
- 33. New York
- 34. North Carolina
- 35. North Dakota
- 36. Ohio
- 37. Oklahoma
- 38. Oregon
- 39. Pennsylvania

- 40. Rhode Island
- 41. South Carolina
- 42. South Dakota
- 43. Tennessee
- 44. Texas
- 45. Utah
- 46. Vermont
- 47. Virginia
- 48. Washington
- 49. West Virginia
- TO. WOOL VIIGH
- 50. Wisconsin

### Highest-performing states\*

States with the highest numbers of Advanced Placement examinations receiving a grade of 3 or higher (per 1,000 11th and 12th graders):

	(1998)
District of Columbia	235
New York	152
Virginia	149
Connecticut	144
Utah	139
U.S.	88
*Top 5 states.	

### Most-improved states

States that made the greatest gains in the numbers of Advanced Placement examinations receiving a grade of 3 or higher (per 1,000 11th and 12th graders):

	(1991)	(1998)	Change*
Connecticut	83	144	+60
District of Columbia	177	235	+58
New Jersey	81	135	+55
New York	97	152	+54
Massachusetts	82	136	+53
*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding.			

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.



See Appendix B for definitions, sources, and technical notes.

tes\*

### State Indicator 12a. Teacher Preparation — Academic Degrees

Have states' increased the percentages of public secondary school teachers who hold an undergraduate or graduate degree in their main teaching assignment?



#### Improvement over time

Between 1991 and 1994, no state (out of 51) significantly increased the percentage of public secondary school teachers who hold an undergraduate or graduate degree in their main teaching assignment.

Highest-perform	ing states*	Most-improved states
States with the highest public secondary school hold an undergraduate degree in their main tea assignment:	l teachers who or graduate	States that made the greatest gains in the percentages of public secondary school teachers who hold an undergraduate or graduate degree in their main teaching assignment: No state made a significant improvement between 1991 and 1994.
Minnesota North Dakota Rhode Island Nebraska New York Connecticut District of Columbia Vermont Illinois Maryland Massachusetts Pennsylvania Wyoming New Hampshire Indiana Iowa	81% 76% 75% 75% 74% 73% 73% 72% 72% 72% 72% 72% 72% 72% 72% 72% 72	
U.S. * States that had a signific percentage than the U.S.	, .	

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.

### State Indicator 12b. Teacher Preparation — Teaching Certificates

Have states' increased the percentages of public secondary school teachers who hold a teaching certificate in their main teaching assignment?



#### Improvement over time

Between 1991 and 1994, 1 state (out of 51) significantly increased the percentage of public secondary school teachers who hold a teaching certificate in their main teaching assignment:

1. Oklahoma

#### **Highest-performing states**\*

States with the highest percentages of public secondary school teachers who hold a teaching certificate in their main teaching assignment:

	(1994)		(1994)
North Dakota	100%	Vermont	98%
Rhode Island	100%	Arkansas	97%
Connecticut	99%	New Jersey	97%
Kansas	99%	North Carolina	97%
Michigan	99%	Ohio	97%
Nebraska	99%	Oregon	97%
Oklahoma	99%	Utah	97%
Pennsylvania	99%	Wisconsin	97%
West Virginia	99%	Alabama	96%
Wyoming	99%	ldaho	96%
Indiana	98%	Illinois	96%
lowa	98%	Mississippi	96%
Minnesota	98%	New Hampshire	96%
Missouri	98%	New Mexico	96%
Montana	98%	Texas	96%
Nevada	98%	Arizona	95%
South Dakota	98%	U.S.	93%
Tennessee	98%	0.0.	00/0

\* States that had a significantly higher percentage than the U.S. average.

#### **Most-improved states**

States that made the greatest gains in the percentages of public secondary school teachers who hold a teaching certificate in their main teaching assignment:

	(1991)	(1994)	Change
Oklahoma	98%	99%	+1



### State Indicator 13. Teacher Professional Development

Have states' increased the percentages of public school teachers reporting that they participated in in-service or professional development programs on one or more topics since the end of the previous school year?

#### Improvement over time

Improvement over time cannot be determined yet because this information has been collected only once at the state level since 1990. The Goals Panel will report state improvements when this information is collected again in 2000.

#### Highest-performing states\*

States with the highest percentages of public school teachers reporting that they participated in in-service or professional development programs on one or more topics since the end of the previous school year:

	(1994)
Kentucky	98%
California	94%
North Carolina	93%
Texas	93%
Connecticut	92%
District of Columbia	92%
Alaska	90%
lowa	89%
Kansas	89%
Washington	89%
Colorado	88%
Florida	88%
Hawaii	88%
Mississippi	88%
Oklahoma	88%
U.S.	85%
* States that had a signification	antlv hiaher

\* States that had a significantly higher percentage than the U.S. average.

#### Most-improved states

States that made the greatest gains in the percentages of public school teachers reporting that they participated in in-service or professional development programs on one or more topics since the end of the previous school year:

The states that made the greatest improvements over time cannot be identified yet because this information has been collected only once at the state level since 1990. The Goals Panel will recognize the most-improved states when this information is collected again in 2000.

### State Indicator 14. Preparation to Teach Limited English Proficient Students

Have states' increased the percentages of public school teachers with training to teach limited English proficient students?

#### Improvement over time

Improvement over time cannot be determined yet because this information has been collected only once at the state level since 1990. The Goals Panel will report state improvements when this information is collected again in 2000.

#### Highest-performing states\*

States with the highest percentages of public school teachers with training to teach limited English proficient students:

	(1994)
Florida	81%
California	64%
Hawaii	41%
Arizona	40%
New Mexico	39%
Alaska	33%
New York	32%
Rhode Island	29%
Texas	28%
Nevada	27%
Idaho	26%
District of Columbia	25%
Washington	23%
Oregon	22%
U.S.	16%
* States that had a significat percentage than the U.S.	, 0

#### Most-improved states

States that made the greatest gains in the percentages of public school teachers with training to teach limited English proficient students:

The states that made the greatest improvements over time cannot be identified yet because this information has been collected only once at the state level since 1990. The Goals Panel will recognize the most-improved states when this information is collected again in 2000.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.



### State Indicator 15. Teacher Support

Have states' increased the percentages of public school teachers who report that during their first year of teaching they participated in a formal teacher induction program to help beginning teachers by assigning them to a master or mentor teacher?



Worse 1 state

#### Improvement over time

Between 1991 and 1994, the U.S. and 17 states (out of 51) significantly increased the percentages of public school teachers who reported that during their first year of teaching they participated in a formal teacher induction program to help beginning teachers by assigning them to a master or mentor teacher:

- 1. Arizona
- 2. California
- 3. Connecticut
- 4. Delaware
- 5. Florida
- 6. Idaho

- 7. Indiana
- 8. Kentucky
- 9. Missouri
- 10. New York
- 11. North Carolina
- 12. Pennsylvania

#### Highest-performing states\*

States with the highest percentages of public school teachers who reported that during their first year of teaching they participated in a formal teacher induction program to help beginning teachers by assigning them to a master or mentor teacher:

	(1994)	
Florida	48%	
Oklahoma	45%	
Utah	40%	
District of Columbia	39%	
North Carolina	36%	
California	35%	
Kentucky	34%	
Hawaii	33%	
U.S.	27%	
* States that had a significantly higher		

percentage than the U.S. average.

13. South Carolina

- 14. Texas
- 15. Utah
- 16. Virginia
- 17. Wisconsin

#### **Most-improved states**

States that made the greatest gains in the percentages of public school teachers who reported that during their first year of teaching they participated in a formal teacher induction program to help beginning teachers by assigning them to a master or mentor teacher:

	(1991)	(1994)	Change*
North Carolina	24%	36%	+12
Pennsylvania	20%	31%	+11
Kentucky	24%	34%	+10
New York	21%	31%	+10
Indiana	14%	22%	+9
Virginia	21%	30%	+9

\*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.



### State Indicator 16a. International Mathematics Achievement — 8th grade

Have states' improved their international standing in 8th grade mathematics achievement?

#### Improvement over time

Improvement over time cannot be determined yet because a research study designed to predict state performance on international mathematics assessments has been conducted only once. The Goals Panel will report changes in standing in mathematics achievement when international assessments are repeated in 1999.

#### Highest-performing states\*

States that would be expected to score as well as, or better than, 35 out of 41 nations° in 8th grade mathematics in 1995-1996:

lowa Maine Minnesota<sup>†</sup> Montana Nebraska North Dakota Wisconsin

The U.S. scored as well as, or better than, 20 out of 40 nations in 8th grade mathematics.

- <sup>o</sup> Only Belgium (Flemish educational system), the Czech Republic, Hong Kong, Japan, Korea, and Singapore would be expected to outperform these seven states in 8th grade mathematics.
- <sup>†</sup> Results for Minnesota are based on actual scores, not estimated scores. See Appendix B.
- \* Top 7 states.

#### Most-improved states

States that made the greatest reductions in the numbers of countries that would be expected to outperform them on international 8th grade mathematics assessments:

The states that made the greatest improvements over time cannot be identified yet, because a research study designed to predict state performance on international mathematics assessments has been conducted only once. The Goals Panel will recognize the most-improved states when international mathematics assessments are conducted again in 1999.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.



### State Indicator 16b. International Science Achievement — 8th grade

Have states1 improved their international standing in 8th grade science achievement?

#### Improvement over time

Improvement over time cannot be determined yet because a research study designed to predict state performance on international science assessments has been conducted only once. The Goals Panel will report changes in standing in science achievement when international assessments are repeated in 1999.

#### **Highest-performing states\***

States that would be expected to score as well as, or better than, 40 out of 41 nations° in 8th grade science in 1995-1996:

Colorado Connecticut Iowa Maine Massachusetts Minnesota<sup>†</sup> Montana Nebraska North Dakota Oregon Utah Vermont Wisconsin Wyoming

The U.S. scored as well as, or better than, 31 out of 40 nations in 8th grade science.

- Only Singapore would be expected to outperform these 14 states in 8th grade science.
- <sup>†</sup> Results for Minnesota are based on actual scores, not estimated scores. See Appendix B.

\* Top 14 states.

#### Most-improved states

States that made the greatest reductions in the numbers of countries that would be expected to outperform them on international 8th grade science assessments:

The states that made the greatest improvements over time cannot be identified yet, because a research study designed to predict state performance on international science assessments has been conducted only once. The Goals Panel will recognize the most-improved states when international science assessments are conducted again in 1999.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.

### State Indicator 17a. Mathematics Instructional Practices — Small Groups

Have states<sup>1</sup> increased the percentages of public school 8th graders whose mathematics teachers report that they have students work in small groups or with a partner at least once a week?

#### Improvement over time

Improvement over time cannot be determined yet because this information has been collected only once at the state level since 1990. The Goals Panel will report state improvements when this information is collected again in 2000.

#### Highest-performing states\*

States with the highest percentages of public school 8th graders whose mathematics teachers reported that they had students work in small groups or with a partner at least once a week:

	(1996)
District of Columbia	92%
Guam	81%
California	79%
U.S.	66%
* States that had a signific	antly higher

\* States that had a significantly higher percentage than the U.S. average.

#### Most-improved states

States that made the greatest gains in the percentages of public school 8th graders whose mathematics teachers reported that they had students work in small groups or with a partner at least once a week:

The states that made the greatest improvements over time cannot be identified yet because this information has been collected only once at the state level since 1990. The Goals Panel will recognize the most-improved states when this information is collected again in 2000.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.



# State Indicator 17b. Mathematics Instructional Practices — Algebra and Functions

Have states' increased the percentages of public school 8th graders whose mathematics teachers report that they address algebra and functions a lot?

#### Improvement over time

Improvement over time cannot be determined yet because this information has been collected only once at the state level since 1990. The Goals Panel will report state improvements when this information is collected again in 2000.

#### Highest-performing states\*

States with the highest percentages of public school 8th graders whose mathematics teachers reported that they addressed algebra and functions a lot:

	(1996)
Guam	82%
Virginia	73%
Utah	71%
U.S.	57%

\* States that had a significantly higher percentage than the U.S. average.

#### Most-improved states

States that made the greatest gains in the percentages of public school 8th graders whose mathematics teachers reported that they addressed algebra and functions a lot:

The states that made the greatest improvements over time cannot be identified yet because this information has been collected only once at the state level since 1990. The Goals Panel will recognize the most-improved states when this information is collected again in 2000.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.

# State Indicator 17c. Mathematics Instructional Practices — Reasoning and Analytical Ability

Have states' increased the percentages of public school 8th graders whose mathematics teachers report that they address reasoning and analytical ability a lot?

#### Improvement over time

Improvement over time cannot be determined yet because this information has been collected only once at the state level since 1990. The Goals Panel will report state improvements when this information is collected again in 2000.

#### Highest-performing states\*

States with the highest percentages of public school 8th graders whose mathematics teachers reported that they addressed reasoning and analytical ability a lot:

	(1996)
District of Columbia	64%
U.S.	52%

\* States that had a significantly higher percentage than the U.S. average.

#### **Most-improved states**

States that made the greatest gains in the percentages of public school 8th graders whose mathematics teachers reported that they addressed reasoning and analytical ability a lot:

The states that made the greatest improvements over time cannot be identified yet because this information has been collected only once at the state level since 1990. The Goals Panel will recognize the most-improved states when this information is collected again in 2000.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.



### **GOAL 5: Mathematics and Science**

### State Indicator 18. Mathematics Resources — Computers

Have states' increased the percentages of public school 8th graders whose mathematics teachers report that they have computers available in their mathematics classrooms?

#### Improvement over time

Improvement over time cannot be determined yet because this information has been collected only once at the state level since 1990. The Goals Panel will report state improvements when this information is collected again in 2000.

#### **Highest-performing states\***

States with the highest percentages of public school 8th graders whose mathematics teachers reported that they had computers available in their mathematics classrooms:

	(1996)
Tennessee	54%
Alaska	50%
Vermont	44%
District of Columbia	42%
Wyoming	41%
U.S.	30%
* States that had a significantly higher percentage than the U.S. average.	

#### **Most-improved states**

States that made the greatest gains in the percentages of public school 8th graders whose mathematics teachers reported that they had computers available in their mathematics classrooms:

The states that made the greatest improvements over time cannot be identified yet because this information has been collected only once at the state level since 1990. The Goals Panel will recognize the most-improved states when this information is collected again in 2000.

### **GOAL 5: Mathematics and Science**

### State Indicator 19a. Mathematics and Science Degrees — All Students

Have states' increased mathematics and science degrees (as a percentage of all degrees) awarded to all students?

> Better 47 states and the U.S. No Change 5 states Worse 2 states

#### Improvement over time

Between 1991 and 1995, the U.S. and 47 states (out of 54) significantly increased mathematics and science degrees (as a percentage of all degrees) awarded to all students:

- 1. Alabama
- 2. Arizona
- 3. Arkansas
- 4. California
- 5. Colorado
- 6. Connecticut
- 7. District of Columbia
- 8. Florida
- 9. Georgia
- 10. Idaho
- 11. Indiana
- 12. Iowa

- 13. Kansas 14. Kentucky
- 15. Louisiana
- 16. Maine
- 17. Maryland
- 18. Massachusetts
- 19. Michigan
- 20. Minnesota
- 21. Mississippi
- 22. Missouri
- 23. Montana
- 24. Nebraska

- 25. Nevada
- 26. New Hampshire
- 27. New Jersey

- 31. Ohio
- 32. Oklahoma
- 34. Pennsylvania
- 35. Rhode Island

- 37. South Dakota
- 38. Tennessee
- 39. Texas
- 40. Utah
- 41. Vermont
- 42. Virginia
- 43. Washington
- 44. West Virginia
- 45. Wisconsin
- 46. Wyoming
- 47. Puerto Rico

#### Highest-performing states\*

States with the highest percentages of mathematics and science degrees (as a percentage of all degrees) awarded to all students:

	(1995)
District of Columbia	53%
Colorado	51%
Connecticut	50%
Maine	50%
Virginia	50%
U.S.	42%
* Top 5 states.	

Most-improved states

States that made the greatest gains in the percentages of mathematics and science degrees (as a percentage of all degrees) awarded to all students:

	(1991)	(1995)	Change*		
Arizona	26%	34%	+8		
West Virginia	32%	40%	+8		
Connecticut	43%	50%	+7		
Mississippi	33%	40%	+7		
Louisiana	37%	43%	+6		
Montana	38%	44%	+6		
Oregon	41%	47%	+6		
Tennessee	36%	43%	+6		
Virginia	44%	50%	+6		
*Differences between the first two columns may differ slightly from					

the figures reported in the "change" column due to rounding.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.



- 36. South Carolina
- 28. New York 29. North Carolina 30. North Dakota
- 33. Oregon

### **GOAL 5: Mathematics and Science**

### State Indicator 19b. Mathematics and Science Degrees — Minority Students

Have states' increased mathematics and science degrees (as a percentage of all degrees) awarded to minority students (Blacks, Hispanics, American Indians/Alaskan Natives)?

- Better 33 states and the U.S.
- No Change 5 states
  - Worse 15 states

#### Improvement over time

Between 1991 and 1995, the U.S. and 33 states (out of 53) significantly increased mathematics and science degrees (as a percentage of all degrees) awarded to minority students:

- 1. Arizona
- 2. Arkansas
- 3. California
- 4. Colorado
- 5. Connecticut
- 6. District of Columbia
- 7. Indiana
- 8. Iowa
- 9. Kansas

- 10. Louisiana
- 11. Maryland
- 12. Massachusetts
- 13. Minnesota
- 14. Mississippi
- 15. Missouri
- 16. Montana
- 17. Nebraska
- 18. Nevada

- 19. New Hampshire
- 20. North Carolina
- 21. North Dakota
- 22. Ohio
- 23. Oklahoma
- 24. Oregon
- 25. South Carolina
- 26. South Dakota
- 27. Tennessee

- 28. Texas
- 29. Utah
- 30. Vermont
- 31. Virginia
- 32. Washington
- 33. Puerto Rico

#### Highest-performing states\*

States with the highest percentages of mathematics and science degrees (as a percentage of all degrees) awarded to minority students:

	(1995)
New Hampshire	57%
Massachusetts	54%
Connecticut	52%
Maine	50%
Utah	49%
U.S.	40%
* Top 5 states.	

#### Most-improved states

States that made the greatest gains in the percentages of mathematics and science degrees (as a percentage of all degrees) awarded to minority students:

( . . . . .

	(1991)	(1995)	Change*
Nevada	26%	35%	+9
New Hampshire	49%	57%	+8
Oregon	41%	48%	+8
Arizona	22%	30%	+7
North Carolina	38%	45%	+7
North Dakota	40%	47%	+7
*D///	,		

\*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.



### State Indicator 19c. Mathematics and Science Degrees — Female Students

Have states' increased mathematics and science degrees (as a percentage of all degrees) awarded to female students?

A Better 42 states and the U.S.
 ↔ No Change 5 states

#### Worse 7 states

#### Improvement over time

Between 1991 and 1995, the U.S. and 42 states (out of 54) significantly increased mathematics and science degrees (as a percentage of all degrees) awarded to female students:

- 1. Alabama
- 2. Arizona
- 3. Arkansas
- 4. California
- 5. Colorado
- 6. Connecticut
- 7. Florida
- 8. Georgia
- 9. Idaho
- 10. Indiana
- 11. lowa

- Kentucky
   Louisiana
- 14. Maryland
- 15. Massachusetts
- 16. Minnesota
- 17. Mississippi
- 18. Missouri
- 19. Montana
- 20. Nebraska
- 21. Nevada
- 22. New Hampshire

- 23. New Jersey
- 24. New Mexico
- 25. New York
- 26. North Carolina
- 27. North Dakota
- 28. Ohio
- 29. Oklahoma
- 30. Oregon
- 31. Pennsylvania
- 32. Rhode Island
- 33. South Carolina

- 34. South Dakota
- 35. Tennessee
- 36. Texas
- 37. Vermont
- 38. Virginia
- 39. Washington
- 40. West Virginia
- 41. Wisconsin
- 42. Wyoming

#### Highest-performing states\*

States with the highest percentages of mathematics and science degrees (as a percentage of all degrees) awarded to female students:

	(1995)
Colorado	47%
Connecticut	47%
Virginia	46%
Maine	45%
District of Columbia	44%
Massachusetts	44%
U.S.	37%
* Top 6 states.	

#### Most-improved states

States that made the greatest gains in the percentages of mathematics and science degrees (as a percentage of all degrees) awarded to female students:

	(1991)	(1995)	Change*	
Connecticut	37%	47%	+11	
West Virginia	29%	37%	+8	
Mississippi	30%	37%	+7	
Tennessee	32%	38%	+7	
Virginia	39%	46%	+7	
*Differences between the first t	wo columns r	nav differ	sliahtly from	,

\*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding.



### State Indicator 20. Adult Literacy

Have states' increased the percentages of adults who score at or above Level 3 in prose literacy?

#### Improvement over time

Improvement over time cannot be determined yet because this information has been collected only once at the state level since 1990.

1 1 1 1 1 1 A	<b>~</b>		
<b>Highest</b> -	pertor	mina	states*

States with the highest percentages of adults scoring at or above Level 3 in prose literacy:

	(1992)
Washington	69%
Indiana	58%
U.S.	52%

\* States that had a significantly higher percentage than the U.S. average.

#### **Most-improved states**

States that made the greatest gains in the percentages of adults scoring at or above Level 3 in prose literacy:

The states that made the greatest improvements over time cannot be identified yet because this information has been collected only once at the state level since 1990.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.

### State Indicator 21a. Voter Registration

Have states' increased the percentages of U.S. citizens who reported that they registered to vote?

- Better 10 states and the U.S.
- No Change 41 states
- Worse 0 states

#### Improvement over time

Between 1988 and 1996, the U.S and 10 states (out of 51) significantly increased the percentages of U.S. citizens registered to vote:

- 1. District of Columbia
- 4. Nevada

2. Georgia

- 5. New Hampshire
- 3. Kentucky
- 6. New York
- 7. North Carolina
- 10. South Carolina
- 8. Oklahoma
- 9. Pennsylvania

#### Highest-performing states\*

States with the highest percentages of U.S. citizens who reported that they registered to vote:

	(1996)		
North Dakota	91%		
Maine	84%		
Minnesota	81%		
Wisconsin	81%		
District of Columbia	78%		
Alaska	77%		
Missouri	76%		
Montana	76%		
Nebraska	76%		
Oregon	76%		
Rhode Island	76%		
Alabama	75%		
lowa	75%		
Louisiana	75%		
South Dakota	75%		
Michigan	74%		
U.S.	71%		
* States that had a significantly higher percentage than the U.S. average.			

#### **Most-improved states**

States that made the greatest gains in the percentages of U.S. citizens who reported that they registered to vote:

	(1988)	(1996)	Change*	
District of Columbia	69%	78%	+8	
Nevada	58%	66%	+8	
South Carolina	61%	68%	+8	
Kentucky	63%	70%	+7	
New Hampshire	67%	73%	+6	
North Carolina	65%	70%	+6	
Georgia	62%	68%	+5	
*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding.				



### State Indicator 21b. Voting

Have states' increased the percentages of U.S. citizens who reported that they voted?

Better	2	states

No Change 49 states

Worse 0 states and the U.S.

#### Improvement over time

Between 1988 and 1996, 2 states (out of 51) significantly increased the percentages of U.S. citizens who reported that they voted:

- 1. District of Columbia
- 2. South Carolina

#### **Highest-performing states\***

States with the highest percentages of U.S. citizens who reported that they voted:

	(1996)
Maine	69%
Minnesota	69%
Montana	68%
Wyoming	67%
North Dakota	66%
South Dakota	65%
Wisconsin	65%
Oregon	64%
Rhode Island	64%
District of Columbia	63%
lowa	63%
Kansas	63%
Louisiana	63%
Nebraska	63%
Idaho	62%
Washington	62%
California	61%
New Jersey	61%
U.S.	58%
* States that had a significat percentage than the U.S.	, .

#### **Most-improved states**

States that made the greatest gains in the percentages of U.S. citizens who reported that they voted:

	(1988)	(1996)	Change*	
District of Columbia	56%	63%	+8	
South Carolina	50%	55%	+5	
*D:00	,	1.00	1. 1.1. 6	

\*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.

### State Indicator 22. Participation in Higher Education

Have states' increased the percentages of high school graduates who immediately enroll in 2-year or 4-year colleges in any state?



#### Improvement over time

Between 1992 and 1996, 39 states (out of 51) significantly increased the percentages of high school graduates who immediately enrolled in 2-year or 4-year colleges in any state:

- 1. Alabama
- 2. Alaska
- 3. Arizona
- 4. Arkansas
- 5. California
- 6. Colorado
- 7. Connecticut
- 8. Delaware
- 9. District of Columbia
- 10. Florida

- Georgia
   Hawaii
- 13. Indiana
- 14. Kansas
- 15. Kentucky
- 16. Maine
- 17. Maryland
- 18. Massachusetts
- 19. Michigan
- 20. Minnesota

- 21. Mississippi
- 22. Missouri
- 23. Montana
- 24. Nevada
- 25. New Hampshire
- 26. New Jersey
- 27. New Mexico
- 28. New York
- 29. North Carolina
- 30. North Dakota

- 31. Ohio
- 32. Pennsylvania
- 33. Rhode Island
- 34. South Carolina
- 35. Tennessee
- 36. Texas
- 37. Virginia
- 38. West Virginia
- 39. Wyoming

#### **Highest-performing states\***

States with the highest percentages of high school graduates who immediately enrolled in 2-year or 4-year colleges in any state:

	(1996)
Massachusetts	73%
New York	71%
North Dakota	71%
Delaware	67%
California	66%
Rhode Island	66%
Indiantara ara not the	a anna at tha

Indicators are not the same at the national and state levels.

\* Top 6 states.

#### **Most-improved states**

States that made the greatest gains in the percentages of high school graduates who immediately enrolled in 2-year or 4-year colleges in any state:

	(1992)	(1996)	Change*	
District of Columbia	33%	58%	+25	
California	50%	66%	+16	
South Carolina	43%	59%	+16	
Massachusetts	60%	73%	+14	
Delaware	57%	67%	+10	
*Differences between the first two	o columns r	nay differ	slightly from	n

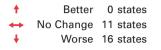
the figures reported in the "change" column due to rounding.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.



### State Indicator 23. Student Marijuana Use

Have states' reduced the percentages of public high school students who reported using marijuana at least once in the past 30 days?



#### Improvement over time

Between 1991 and 1997, no state (out of 27) significantly reduced the percentage of public high school students who reported using marijuana at least once during the past 30 days.

#### **Highest-performing states\***

States with the lowest percentages of public high school students who reported using marijuana at least once during the past 30 days:

	(1997)
Utah	12%
American Samoa	14%
Virgin Islands	15%
lowa	18%
South Dakota	20%

Indicators are not the same at the national and state levels.

\* Top 5 states.

#### **Most-improved states**

States that made the greatest reductions in the percentages of public high school students who reported using marijuana at least once during the past 30 days:

No state has made a significant improvement during the 1990s.



### State Indicator 24. Student Alcohol Use

Have states' reduced the percentages of public high school students who reported having five or more drinks in a row at least once during the past 30 days?



#### Improvement over time

Between 1991 and 1997, no state (out of 28) significantly reduced the percentage of public high school students who reported having five or more drinks in a row at least once during the past 30 days.

#### Highest-performing states\*

States with the lowest percentages of public high school students who reported having five or more drinks in a row at least once during the past 30 days:

	(1997)
Virgin Islands	11%
Utah	17%
District of Columbia	18%
American Samoa	20%
Guam	23%
Indicators are not the san	ne at the
national and state levels.	

\* Top 5 states.

#### **Most-improved states**

States that made the greatest reductions in the percentages of public high school students who reported having five or more drinks in a row at least once during the past 30 days:

No state has made a significant improvement during the 1990s.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.



### State Indicator 25. Availability of Drugs on School Property

Have states<sup>1</sup> reduced the percentages of public high school students reporting that someone offered, sold, or gave them an illegal drug on school property during the past 12 months?

A Better 1 state
 → No Change 7 states
 → Worse 15 states

#### Improvement over time

Between 1993 and 1997, 1 state (out of 23) significantly reduced the percentage of public high school students reporting that someone offered, sold, or gave them an illegal drug on school property during the past 12 months:

1. Virgin Islands

#### **Highest-performing states\***

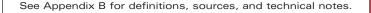
States with the lowest percentages of public high school students reporting that someone offered, sold, or gave them an illegal drug on school property during the past 12 months:

	(1997)
Virgin Islands	15%
lowa	23%
Mississippi	24%
District of Columbia	25%
American Samoa	25%
Indicators are not the sam national and state levels.	ne at the
* Top 5 states.	

#### Most-improved states

States that made the greatest reductions in the percentages of public high school students reporting that someone offered, sold, or gave them an illegal drug on school property during the past 12 months:

	(1993)	(1997)	Change	
Virgin Islands	27%	15%	-12	



### State Indicator 26. Student Victimization

Have states' reduced the percentages of public high school students reporting that they were threatened or injured with a weapon such as a gun, knife, or club on school property during the past 12 months?

1	Better	1 state
$\leftrightarrow$	No Change	23 states
+	Worse	0 states

#### Improvement over time

Between 1993 and 1997, 1 state (out of 24) significantly reduced the percentage of public high school students reporting that they were injured with a weapon such as a gun, knife, or club on school property during the past 12 months:

1. American Samoa

#### Highest-performing states\*

States with the lowest percentages of public high school students reporting that they were threatened or injured with a weapon such as a gun, knife, or club on school property during the past 12 months:

	(1997)
South Dakota	5%
Connecticut	6%
Hawaii	6%
lowa	7%
Kentucky	7%
Montana	7%
New York	7%
Ohio	7%
Vermont	7%
Wyoming	7%
Indicators are not th	a cama at the

Indicators are not the same at the national and state levels.

\* Top 10 states.

#### Most-improved states

States that made the greatest reductions in the percentages of public high school students reporting that they were threatened or injured with a weapon such as a gun, knife, or club on school property during the past 12 months:

	(1993)	(1997)	Change	
American Samoa	15%	9%	-6	



### State Indicator 27. Physical Fights

Have states' reduced the percentages of public high school students reporting that they were in a physical fight on school property at least once during the past 12 months?



#### Improvement over time

Between 1993 and 1997, 1 state (out of 24) significantly reduced the percentage of public high school students reporting that they were in a physical fight on school property at least once during the past 12 months:

1. Nevada

#### Highest-performing states\*

States with the lowest percentages of public high school students reporting that they were in a physical fight on school property at least once during the past 12 months:

	(1997)
South Dakota	11%
Connecticut	13%
Hawaii	13%
Kentucky	13%
Massachusetts	13%
Missouri	13%
Ohio	13%
South Carolina	13%
Vermont	13%
West Virginia	13%
Indicators are not the san	ne at the
national and state levels.	
* Top 10 states.	

#### Most-improved states

States that made the greatest reductions in the percentages of public high school students reporting that they were in a physical fight on school property at least once during the past 12 months:

	(1993)	(1997)	Change	
Nevada	20%	15%	-5	

### State Indicator 28. Carrying a Weapon

Have states' reduced the percentages of public high school students reporting that they carried a weapon such as a gun, knife, or club on school property at least once during the past 30 days?

↑ Better 4 states
 ↔ No Change 20 states
 ↓ Worse 0 states

#### Improvement over time

Between 1993 and 1997, 4 states (out of 24) significantly reduced the percentages of public high school students reporting that they carried a weapon such as a gun, knife, or club on school property at least once during the past 30 days:

- 1. North Carolina\*
- 3. Wisconsin

4. American Samoa

- 2. South Carolina
- \* Data for North Carolina were collected in 1993 and 1995.

#### Highest-performing states\*

States with the lowest percentages of public high school students reporting that they carried a weapon such as a gun, knife, or club on school property at least once during the past 30 days:

	(1997)
Wisconsin	5%
Hawaii	6%
Guam	6%
Connecticut	7%
Louisiana	7%
la dia atawa awa waatata	+ + +

Indicators are not the same at the national and state levels.

\* Top 5 states.

#### Most-improved states

States that made the greatest reductions in the percentages of public high school students reporting that they carried a weapon such as a gun, knife, or club on school property at least once during the past 30 days:

	(1993)	(1997)	Change*
North Carolina**	14%	9%	-5
American Samoa	14%	9%	-5
South Carolina	14%	10%	-4
Wisconsin	9%	5%	-4

\*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding. \*\*Data for North Carolina were collected in 1993 and 1995.



### State Indicator 29. Student Safety

Have states<sup>1</sup> reduced the percentages of students reporting that they did not go to school at least once during the past 30 days because they did not feel safe?



#### Improvement over time

Between 1993 and 1997, 1 state (out of 24) significantly reduced the percentage of students reporting that they did not go to school at least once during the past 30 days because they did not feel safe:

1. American Samoa

	~	-	<u>ب</u> ت م
<b>Highest-</b>	pertorm	ina st	ates*

States with the lowest percentages of students reporting that they did not go to school at least once during the past 30 days because they did not feel safe:

	(1997)
Connecticut	3%
lowa	3%
South Dakota	3%
Wisconsin	3%
Kentucky	4%
Maine	4%
Missouri	4%
Montana	4%
Ohio	4%
Vermont	4%
Wyoming	4%
Indicators are not the	same at the
national and state leve	els.
* Top 11 states.	

#### **Most-improved states**

States that made the greatest reductions in the percentages of students reporting that they did not go to school at least once during the past 30 days because they did not feel safe:

	(1993)	(1997)	Change	
American Samoa	23%	12%	-11	

### State Indicator 30. Teacher Victimization

Have states' reduced the percentages of public school teachers reporting that they were threatened or physically attacked by a student from their school during the past 12 months?

#### Improvement over time

Improvement over time cannot be determined yet because this information has been collected only once at the state level since 1990. The Goals Panel will report state improvements when this information is collected again in 2000.

#### **Highest-performing states\***

States with the lowest percentages of public school teachers reporting that they were threatened or physically attacked by a student from their school during the past 12 months:

	(1994)
North Dakota	8%
South Dakota	8%
California	9%
Maine	9%
Montana	9%
New Jersey	9%
Idaho	11%
Wyoming	11%
Illinois	12%
Kansas	12%
U.S.	15%
* States that had a signifi	cantly lower

percentage than the U.S. average.

#### Most-improved states

States that made the greatest reductions in the percentages of public school teachers reporting that they were threatened or physically attacked by a student from their school during the past 12 months:

The states that made the greatest improvements over time cannot be identified yet because this information has been collected only once at the state level since 1990. The Goals Panel will recognize the most-improved states when this information is collected again in 2000.

<sup>1</sup> The term "state" is used to refer to the 50 states, the District of Columbia, and the territories.



### State Indicator 31. Disruptions in Class by Students

Have states' reduced the percentages of public secondary school teachers reporting that student disruptions interfere with teaching?



#### Improvement over time

Between 1991 and 1994, no state (out of 51) significantly reduced the percentage of public secondary school teachers reporting that student disruptions interfere with teaching.

Highest-perfor	ming states*	Most-improved states
States with the lowe public secondary sch reporting that studer interfere with teachir	nool teachers nt disruptions	States that made the greatest reductions in the percentages of public secondary school teachers reporting that student disruptions interfere with teaching: No state made a significant improvement between 1991 and 1994.
Montana	33%	
North Dakota	33%	
Oklahoma	39%	
Wyoming	39%	
U.S.	46%	
* States that had a sign percentage than the l	,	



### **GOAL 8: Parental Participation**

### State Indicator 32a. Parental Involvement in Schools — Teachers' Perspective

Have states<sup>1</sup> reduced the percentages of public school teachers reporting that lack of parental involvement in their schools is a serious problem?



#### Improvement over time

Between 1991 and 1994, no state (out of 51) significantly reduced the percentage of public school teachers reporting that lack of parental involvement in their schools is a serious problem.

Highest-perfor	ming states*	Most-improved states
States with the lowes public school teacher lack of parental invol schools is a serious North Dakota Minnesota Nebraska Maine Vermont Wyoming	rs reporting that Ivement in their	States that made the greatest reductions in the percentages of public school teachers reporting that lack of parental involvement in their schools is a serious problem: No state made a significant improvement between 1991 and 1994.
Indicators are not the national and state lev * Top 6 states.		



### **GOAL 8: Parental Participation**

### State Indicator 32b. Parental Involvement in Schools — Principals' Perspective

Have states' reduced the percentages of public school principals reporting that lack of parental involvement in their schools is a serious problem?



#### Improvement over time

Between 1991 and 1994, 3 states (out of 51) significantly reduced the percentages of public school principals reporting that lack of parental involvement in their schools is a serious problem:

- 1. California
- 2. Colorado
- 3. Indiana

#### Highest-performing states\*

States with the lowest percentages of public school principals reporting that lack of parental involvement in their schools is a serious problem:

	(1994)
North Dakota	3%
Maine	5%
Massachusetts	5%
Minnesota	6%
Nebraska	6%
Vermont	6%

Indicators are not the same at the national and state levels.

\* Top 6 states.

#### Most-improved states

States that made the greatest reductions in the percentages of public school principals reporting that lack of parental involvement in their schools is a serious problem:

	(1991)	(1994)	Change*
Indiana	19%	9%	-10
California	20%	11%	-8
Colorado	17%	8%	-8

\*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding.

### **GOAL 8: Parental Participation**

### State Indicator 33. Influence of Parent Associations

Have states<sup>1</sup> increased the percentages of public school principals reporting that the parent associations in their schools have influence in one or more of three areas of school policy?

A Better 17 states
 → No Change 34 states
 ↓ Worse 0 states

#### Improvement over time

Between 1991 and 1994, 17 states (out of 51) significantly increased the percentages of public school principals reporting that the parent associations in their schools have influence in one or more of three areas of school policy:

- 1. Alaska
- 2. Arizona
- 3. Colorado
- 4. Idaho
- 5. lowa
- 6. Kentucky

- 7. Massachusetts
- 8. Nevada
- 9. New Mexico
- 10. New York
- 11. Oklahoma
- 12. Pennsylvania
- 13. Rhode Island
- 14. Texas
- 15. Utah
- 16. Vermont
- 17. Wisconsin

### Highest-performing states\*

States with the highest percentages of public school principals reporting that the parent associations in their schools have influence in one or more of three areas of school policy:

	(1994)
Colorado	50%
Alaska	43%
New Mexico	40%
Kentucky	37%
California	36%
Indiantara ara not th	a come at the

Indicators are not the same at the national and state levels.

\* Top 5 states.

#### Most-improved states

States that made the greatest gains in the percentages of public school principals reporting that the parent associations in their schools have influence in one or more of three areas of school policy:

	(1991)	(1994)	Change*
Colorado	28%	50%	+22
Kentucky	17%	37%	+20
Pennsylvania	10%	28%	+18
Vermont	8%	24%	+17
Alaska	27%	43%	+16
New York	18%	34%	+16
Utah	17%	33%	+16
*Differences between the first two columns may differ slightly from the figures reported in the "change" column due to rounding.			



### Technical Notes and Sources for the National Indicators

#### **General Information**

#### Statistical significance

In this report, the term "significance" refers to statistical significance, and indicates that change over time is not likely to have occurred by chance. The majority of indicators in this report are based on samples and not entire populations. For example, mathematics achievement results were obtained by sampling a portion of the nation's 4th, 8th, and 12th graders. This enables the nation and the states to use smaller, cost-efficient samples to predict how the entire student population would have performed on an assessment without testing all of them. This is similar to a public opinion poll that predicts, with a certain degree of confidence, how all individuals would have responded to a set of questions had they all been polled.

It is important to note that any estimate based on a sample contains a small amount of imprecision, or error. The estimate would be slightly higher or slightly lower if a different sample were chosen. Public opinion polls account for this error when they caution that their results are "accurate within plus or minus two percentage points."

If we want to determine whether the nation and the states have made progress over time, we must apply a statistical test to tell us whether there are likely to be differences in actual performance over time in the entire population. The statistical test takes into account not only the difference between the measures, but the precision of the estimate for each measure. If the test indicates that the groups in the entire population are likely to perform differently, we say that the differences are not likely to have occurred by chance, and we can be confident that performance has changed over time. All differences in this report that are termed "statistically significant" are measured at the 0.05 level. For formulas and more detailed technical information, see the 1998 Data Volume for the National Education Goals Report.

#### Goal 1: Ready to Learn

#### 1. Children's Health Index

The percentages of infants at risk are based on the number of births used to calculate the health index, not the actual number of births. The percentage of complete and usable birth records used to calculate the 1996 health index varied from a high of 45% to a low of 24%. Four states (California, Indiana, New York, and South Dakota) did not collect information on all four risks in 1996; five states (California, Indiana, New York, Oklahoma, and South Dakota) did not collect information on all four risks and the territories are not included in the U.S. total.

Risks are late (in third trimester) or no prenatal care, low maternal weight gain (less than 21 pounds), mother smoked during pregnancy, or mother drank alcohol during pregnancy. The National Center for Health Statistics notes that alcohol use during pregnancy is likely to be underreported on the birth certificate.

**Source:** Nicholas Zill and Christine Winquist Nord of Westat developed the concept of the Children's Health Index. Stephanie Ventura and Sally Clarke of the National Center for Health Statistics provided the special tabulations of the 1990 and 1996 birth certificate data needed to produce the index, July 1998.

#### 2. Immunizations

The Goals Panel reports data from 1994 as the baseline year for immunizations. This was the first year for which data were collected using the National Immunization Survey (NIS). In prior years, the Centers for Disease Control and Prevention collected data on immunization using the National Health Interview Survey (NHIS). The Goals Panel does not compare data from NIS and NHIS, due to methodological differences between the two instruments.

"Two-year-olds" are defined as children 19 to 35 months of age. "Fully immunized" is defined as four doses of diphtheria-tetanus-pertussis vaccine, three doses of polio vaccine, and one dose of measles or measles/mumps/rubella vaccine.

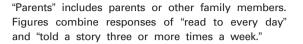
**Sources:** 1994 National Immunization Survey, Centers for Disease Control and Prevention. *Morbidity and Mortality Weekly Report,* August 25, 1995, 619; unpublished tabulations from Abt Associates, July 1997.

1997 National Immunization Survey, Centers for Disease Control and Prevention. *Morbidity and Mortality Weekly Report*, July 10, 1998, 547; unpublished tabulations from Abt Associates, August 1998.

#### 3. Family-Child Reading and Storytelling

The population estimates for the National Household Education Survey (NHES) cover 3- to 5-year-old children who are not yet enrolled in kindergarten. Age from the NHES:93 was established as of January 1, 1993; age from the NHES:96 was established as of December 31, 1995.

In the NHES:93, information on daily reading was collected using two approaches with split-half samples. The two approaches did not result in significantly different estimates for daily reading among 3- to 5-year-old preschoolers. A combined measure using both items for NHES:93 is included in this report.



**Sources:** U.S. Department of Education, National Center for Education Statistics, National Household Education Survey: 1993 School Readiness Interview, unpublished tabulations prepared by Westat, August 1994.

U.S. Department of Education, National Center for Education Statistics, National Household Education Survey: 1996 Parent Interview, unpublished tabulations prepared by Westat, August 1996.

#### 4. Preschool Participation

The population estimates for the NHES cover 3- to 5-year-old children who are not yet enrolled in kindergarten. Age from the NHES:91 was established as of January 1, 1991; age from the NHES:96 was established as of December 31, 1995. Preschool participation includes children enrolled in any centerbased program, including nursery schools, prekindergarten programs, preschools, day care centers, and Head Start.

"High income" is defined as a family income of \$50,000 or more. "Low income" is defined as family income of \$10,000 or less.

**Sources:** U.S. Department of Education, National Center for Education Statistics, National Household Education Survey: 1991 Early Childhood Component, unpublished tabulations prepared by Westat, August 1994.

U.S. Department of Education, National Center for Education Statistics, National Household Education Survey: 1996 Parent Interview, unpublished tabulations prepared by Westat, August 1996.



#### Goal 2: School Completion

#### 5. High School Completion

The high school completion rates for 18- to 24-yearolds are computed as a percentage of the non-high school enrolled population at these ages who hold a high school credential (either a high school diploma or an alternative credential, such as a General Educational Development (GED) certificate, Individualized Education Program (IEP) credential, or certificate of attendance).

**Source:** U.S. Department of Commerce, Bureau of the Census, 1990 and 1997 October Current Population Surveys, unpublished tabulations prepared by the National Center for Education Statistics and MPR Associates, Inc., August 1998.

## Goal 3: Student Achievement and Citizenship

#### 6. Reading Achievement

The National Education Goals Panel has set its performance standard at the two highest levels of achievement — Proficient or Advanced — on the National Assessment of Educational Progress (NAEP). These levels were established by the National Assessment Governing Board.

**Source:** Campbell, J., Donahue, P., Reese, C., & Phillips, G. (1996). *NAEP 1994 reading report card for the nation and the states.* Washington, DC: U.S. Department of Education, National Center for Education Statistics.

#### 7. Writing Achievement

Although student achievement levels have not been established for writing, the data presented in the Goals Report are reported against a standard and do show whether students are performing at acceptable levels.

To conduct the Writing Portfolio Study, NAEP asked a nationally representative subgroup of the 4th and 8th graders who participated in the 1992 NAEP writing assessment to work with their teachers and submit three pieces of writing from their Language Arts or English classes that represented their best writing efforts. Students were asked to give special preference to pieces developed using writing process strategies such as pre-writing activities, consulting with others about writing, and revising successive drafts. They were also asked to select pieces that represented different kinds of writing (i.e., narrative, informative, or persuasive). Papers were scored according to a six-level Narrative Scoring Guide.

**Source:** Gentile, C.A., Martin-Rehrmann, J., & Kennedy, J.H. (1995). *Windows into the classroom, NAEP's 1992 writing portfolio study,* pp. 83 and 85. Washington, DC: U.S. Department of Education, National Center for Education Statistics.

#### 8. Mathematics Achievement

See technical note under indicator 6.

**Source:** Reese, C.M., Miller, K.E., Mazzeo, J., & Dossey, J.A. (1997). *NAEP 1996 mathematics report card for the nation and the states.* Washington, DC: National Center for Education Statistics.

#### 9. Science Achievement

See technical note under indicator 6.

**Source:** Bourque, M.L., Champagne, A., & Crissman, S. (1997). *1996 science performance standards: Achievement results for the nation and states, a first look.* Washington, DC: National Assessment Governing Board.

#### 10. History Achievement

See technical note under indicator 6.

**Source:** Williams, P.L., Lazer, S., Reese, C.M., & Carr, P. (1995). *1994 NAEP U.S. history: A first look.* Washington, DC: U.S. Department of Education, National Center for Education Statistics.

#### 11. Geography Achievement

See technical note under indicator 6.

**Source:** Williams, P.L., Reese, C.M., Lazer, S., & Shakrani, S. (1995). *1994 NAEP world geography: A first look.* Washington, DC: U.S. Department of Education, National Center for Education Statistics.

#### Goal 4: Teacher Education and Professional Development

#### 12. Teacher Preparation

Only secondary school teachers whose main assignment was in mathematics, science, English, social studies, fine arts, foreign language, and special education were included in the analysis of whether a teacher had a degree in his/her main assignment.

Information is not reported for bilingual education or English as a Second Language (ESL) degrees, since relatively few higher education institutions grant degrees in those fields.

"Undergraduate or graduate degree" includes academic or education majors, but does not include minors or second majors.

A secondary teacher is one who, when asked about grades taught, checked:

- "Ungraded" and was designated as a secondary teacher on the list of teachers provided by the school; or
- 6th grade or lower and 7th grade or higher, and reported a primary assignment other than prekindergarten, kindergarten, or general elementary; or
- 9th grade or higher, or 9th grade or higher and "ungraded;" or
- 7th and 8th grades only, and reported a primary assignment other than kindergarten, general elementary, or special education; or
- 7th and 8th grades only, and reported a primary assignment of special education

and was designated as a secondary teacher on the list of teachers provided by the school; or

 6th grade or lower and 7th grade or higher, or 7th and 8th grades only, and was not categorized above as either elementary or secondary.

**Source:** U.S. Department of Education, National Center for Education Statistics, Teacher Surveys of the Schools and Staffing Survey, 1990-91 and 1993-94, unpublished tabulations prepared by Westat, August 1995.

#### 13. Teacher Professional Development

Selected topics for professional development include uses of educational technology, methods of teaching subject field, in-depth study in subject field, and student assessment.

**Source:** U.S. Department of Education, National Center for Education Statistics, Teacher Survey of the Schools and Staffing Survey, 1993-94, unpublished tabulations prepared by Westat, August 1995.

#### **Goal 5: Mathematics and Science**

#### 14. International Mathematics Achievement

**Sources:** U.S. Department of Education, National Center for Education Statistics. (1996). *Pursuing excellence: A study of U.S. eighth-grade mathematics and science teaching, learning, curriculum, and achievement in international context.* NCES 97-198. Washington, DC: U.S. Government Printing Office.

U.S. Department of Education, National Center for Education Statistics. (1997). *Pursuing excellence: A study of U.S. fourth-grade mathematics and science achievement in international context.* NCES 97-255. Washington, DC: U.S. Government Printing Office.

U.S. Department of Education, National Center for Education Statistics. (1998). *Pursuing excellence: A study of U.S. twelfth-grade mathematics and science achievement in international context*, NCES 98-049, Washington, DC: U.S. Government Printing Office.



#### 15. International Science Achievement

Sources: Ibid.

#### 16. Mathematics and Science Degrees

Data include only U.S. citizens and resident aliens on permanent visas, and include institutions in U.S. territories.

Mathematical sciences is the only field of study included in the mathematics category for this report.

Fields of study in the science category for this report include: engineering; physical sciences; geosciences; computer science; life sciences (includes medical and agricultural sciences); social sciences; and science and engineering technologies (includes health technologies).

**Source:** Integrated Postsecondary Education Data System (IPEDS 1991 and 1995), which is conducted by the National Center for Education Statistics. The data were analyzed by Westat, using the National Science Foundation's WebCASPAR Database System, August 1997.

## Goal 6: Adult Literacy and Lifelong Learning

#### 17. Adult Literacy

The U.S. Department of Education and the Educational Testing Service (ETS) characterized the literacy of America's adults in terms of three "literacy scales" representing distinct and important aspects of literacy: prose, document, and quantitative literacy. Each of the literacy scales has five levels, with Level 1 being least proficient and Level 5 being most proficient.

Prose literacy, selected as a national indicator for this report, is defined as the knowledge and skills needed to understand and use information from texts that include editorials, news stories, poems, and fiction; for example, finding a piece of information in a newspaper article, interpreting instructions from a warranty, inferring a theme from a poem, or contrasting views expressed in an editorial.

**Source:** Kirsch, I.S., Jungeblut, A., Jenkins, L., & Kolstad, A. (1993, September). *Adult literacy in America: A first look at the results of the National Adult Literacy Survey,* p. 17. Washington, DC: U.S. Department of Education, National Center for Education Statistics.

#### 18. Participation in Adult Education

Adults 17 years old and older who participated in one or more adult education activities on a full-time, but not on a part-time, basis in the previous 12 months are excluded from both the numerator and denominator in the calculations of adult education participation.

**Sources:** U.S. Department of Education, National Center for Education Statistics, National Household Education Survey: 1991 Adult Education Component, unpublished tabulations prepared by Westat, August 1994.

U.S. Department of Education, National Center for Education Statistics, National Household Education Survey: 1995 Adult Education Interview, unpublished tabulations prepared by Westat, August 1995.

#### 19. Participation in Higher Education

Disparities in college entrance rates between White and minority high school graduates are based on three-year averages (1989-1991 for 1990; 1995-1997 for 1996). "College" includes junior colleges, community colleges, and universities. "College degree" includes Associate's degrees, Bachelor's degrees, and graduate/professional degrees.

**Sources:** U.S. Department of Commerce, Bureau of the Census, October Current Population Surveys, 1989-1991 and 1995-1997; unpublished tabulations from the National Center for Education Statistics, prepared by Pinkerton Computer Consultants, Inc., July 1998.

U.S. Department of Commerce, Bureau of the Census, 1992 and 1997 March Current Population surveys; unpublished tabulations from the National Center for Education Statistics, prepared by Pinkerton Computer Consultants, Inc., July 1995.

#### Goal 7: Safe, Disciplined, and Alcoholand Drug-free Schools

#### 20. Overall Student Drug and Alcohol Use

Use of any illicit drug includes any use of marijuana, hallucinogens, cocaine, heroin, inhalants, or any use of stimulants or tranquilizers not under a doctor's orders.

**Source:** Johnston, L.D., O'Malley, P.M., & Bachman, J.G. (1998, July). *Selected outcome measures from the Monitoring the Future Study for Goal 7 of the National Education Goals: A special report for the National Education Goals Panel.* Ann Arbor: University of Michigan, Institute for Social Research.

#### 21. Sale of Drugs at School

Source: Ibid.

#### 22. Student and Teacher Victimization

Student Victimization

Threats and injuries to students include those made with or without a weapon.

Source: Ibid.

• Teacher Victimization

**Sources:** U.S. Department of Education, National Center for Education Statistics, Fast Response Survey System, Teacher Survey on Safe, Disciplined, and Drug-free Schools, FRSS 42, unpublished tabulations prepared by Westat, August 1994.

U.S. Department of Education, National Center for Education Statistics, Teacher Survey of the Schools and Staffing Survey, 1993-94, unpublished tabulations prepared by Westat, August 1995.

#### 23. Disruptions in Class by Students

· Student Reports

Figure represents responses from students who reported that during an average week, misbehavior by other students interfered with their own learning six times a week or more.

**Source:** Johnston, L.D., O'Malley, P.M., & Bachman, J.G. (1998, July). Selected outcome measures from the Monitoring the Future Study for Goal 7 of the National Education Goals: A special report for the National Education Goals Panel. Ann Arbor: University of Michigan, Institute for Social Research.

· Teacher Reports

Figure represents responses from teachers who "agreed" or "strongly agreed" that student misbehavior interferes with their teaching.

**Source:** U.S. Department of Education, National Center for Education Statistics, Teacher Surveys of the Schools and Staffing Survey, 1990-91 and 1993-94, unpublished tabulations prepared by Westat, August 1995.

#### **Goal 8: Parental Participation**

#### 24. Schools' Reports of Parent Attendance at Parent-Teacher Conferences

Survey respondents were principals or their designees. "More than half" included responses of "more than half" and "most or all" combined. Data includes only those public schools in which the school reported that it held regularly scheduled schoolwide parent-teacher conferences during the year.

**Source:** U.S. Department of Education, National Center for Education Statistics, Fast Response Survey System, Survey on Family and School Partnerships in Public Schools, K-8, FRSS 58, 1996, unpublished tabulations prepared by Westat, August 1996.



# 25. Schools' Reports of Parent Involvement in School Policy Decisions

Survey respondents were principals or their designees. Data include responses of "moderate extent" and "great extent" combined. Policy areas include: allocation of funds; curriculum or overall instructional program; the design of special programs; library books and materials; discipline policies and procedures; health-related topics or policies; monitoring or evaluating teachers; or developing parent involvement activities.

Source: Ibid.

# 26. Parents' Reports of Their Involvement in School Activities

In the NHES:96, data for the three variables included in this report (attendance at a general school meeting, attendance at a school or class event, and acting as a volunteer at the school or serving on a school committee) were collected for a split-half of the sample. The other split-half of the sample included items that were worded slightly differently.

**Sources:** U.S. Department of Education, National Center for Education Statistics, National Household Education Survey: 1993 School Safety and Discipline Component, unpublished tabulations, NCES, August 1995.

U.S. Department of Education, National Center for Education Statistics, National Household Education Survey: 1996 Parent Interview, unpublished tabulations prepared by Westat, August 1996.



# **Technical Notes and Sources for the State Indicators**

# **General Information**

See general technical notes regarding statistical significance in Appendix A.

## Goal 1: Ready to Learn

# 1. Children's Health Index

The percentages of infants at risk are based on the number of births used to calculate the health index, not the actual number of births. The percentage of complete and usable birth records used to calculate the 1996 health index varied from a high of 45% to a low of 24%. Four states (California, Indiana, New York, and South Dakota) did not collect information on all four risks in 1996; five states (California, Indiana, New York, Oklahoma, and South Dakota) did not collect information on all four risks in 1990.

Risks are late (in third trimester) or no prenatal care, low maternal weight gain (less than 21 pounds), mother smoked during pregnancy, or mother drank alcohol during pregnancy.

The National Center for Health Statistics notes that alcohol use during pregnancy is likely to be underreported on the birth certificate.

**Source:** Nicholas Zill and Christine Winquist Nord of Westat developed the concept of the Children's Health Index. Stephanie Ventura and Sally Clarke of the National Center for Health Statistics provided the special tabulations of the 1990 and 1996 birth certificate data needed to produce the index, July 1998.

# 2. Immunizations

The Goals Panel reports data from 1994 as the baseline year for immunizations. This was the first year for which data were collected using the National Immunization Survey (NIS). In prior years, the Centers for Disease Control and Prevention collected data on

immunization using the National Health Interview Survey (NHIS). The Goals Panel does not compare data from NIS and NHIS, due to methodological differences between the two instruments.

"Two-year-olds" are defined as children 19 to 35 months of age. "Fully immunized" is defined as four doses of diphtheria-tetanus-pertussis vaccine, three doses of polio vaccine, and one dose of measles or measles/mumps/rubella vaccine.

**Sources:** 1994 National Immunization Survey, Centers for Disease Control and Prevention. *Morbidity and Mortality Weekly Report,* August 25, 1995, 619; unpublished tabulations from Abt Associates, July 1997.

1997 National Immunization Survey, Centers for Disease Control and Prevention. *Morbidity and Mortality Weekly Report,* July 10, 1998, 547; unpublished tabulations from Abt Associates, August 1998.

# 3. Low Birthweight

**Source:** U.S. Department of Health and Human Services, unpublished tabulations from Division of Vital Statistics, National Center for Health Statistics; prepared by Westat, July 1998.

## 4. Early Prenatal Care

Prenatal care refers to the first visit for health care services during pregnancy.

## Source: Ibid.

## 5. Preschool Programs for Children with Disabilities

The Individuals with Disabilities Education Act (IDEA) supports the improvement of services for very young children with disabilities through several programs, including the Program for Infants and Toddlers with

Disabilities (Part C), the Preschool Grants Program (Section 619 of Part B), and the Early Education Program for Children with Disabilities (Section 623 of Part C). The Congressional mandate required states to have a mandate in place by school year 1991-92 that ensures a free appropriate public education (FAPE) for all eligible 3- to 5-year-old children with disabilities.

Data are based on state information submitted to the U.S. Department of Education, Office of Special Education and Rehabilitative Services (OSERS) on the number of children with disabilities served under IDEA, Part B and Chapter 1 (ESEA State-Operated Programs [SOP]) programs.

**Source:** U.S. Department of Education, Office of Special Education Programs, Data Analysis System (DANS), unpublished tabulations prepared by Westat, July 1998. Percentage of children served is based on U.S. Census Bureau Estimated Resident Population, by state, for July 1996.

#### **Goal 2: School Completion**

#### 6. High School Completion Rates

The high school completion rates for 18- to 24-yearolds are computed as a percentage of the non-high school enrolled population at these ages who hold a high school credential (either a high school diploma or an alternative credential, such as a General Educational Development (GED) certificate, Individualized Education Program (IEP) credential, or certificate of attendance).

Because of small sample sizes, the state-level completion data are calculated using three-year averages. For example, for the baseline year, state data for 1990 reflect an average of 1989, 1990, and 1991. For the most recent update year, state data for 1996 reflect an average of 1995, 1996, and 1997. The figure for the U.S. that is shown on page 22 is for 1997.

Although Nebraska and North Dakota did have 1996 high school completion rates of 91% and 92%, respectively, they do not appear in the list of highestperforming states. This is also the case for South Carolina, which had a high school completion rate of Because the standard errors for these states 89%. were fairly large, their high school completion rates were not significantly higher than the 86% national average when tests of statistical significance were performed. Adjustments for multiple comparisons were made using the Benjamini/Hochberg application of the False Discovery Rate (FDR) criterion. For formulas and more detailed technical information, see the 1998 Data Volume for the National Education Goals Report.

**Source:** U.S. Department of Commerce, Bureau of the Census, 1989-1991 and 1995-1997 October Current Population Surveys; unpublished tabulations prepared by the National Center for Education Statistics and MPR Associates, Inc., August 1998.

#### 7. High School Dropout Rates

The 1991-1992 school year was the first for which states reported school district level data on the numbers and types of dropouts in the Common Core of Data (CCD) Agency Universe Survey. The CCD defined a dropout as an individual who: (1) was enrolled in school at some time during the previous school year; (2) was not enrolled on October 1 of the current school year; (3) has not graduated from high school or completed a state- or district-approved educational program; and (4) does not meet any exclusionary conditions. For the 1991-1992 school year, 12 states and the District of Columbia reported data that were considered to meet the CCD standards to allow publication of their dropout data. For the 1992-1993 school year, 16 states and the District of Columbia reported data that met CCD standards. For the 1993-1994 school year, 23 states and the District of Columbia reported data that met CCD standards. For the 1994-1995 school year, 29 states and the District of Columbia reported data that met CCD standards.

It is important to note that states may require several years to stabilize their dropout reporting systems.

**Sources:** Hoffman, L.M. (1995). *State dropout data collection practices:* 1991-92 school year. Washington, DC: U.S. Department of Education, National Center for Education Statistics.

McMillen, M.M., & Kaufman, P. (1996). *Dropout rates in the United States:* 1994. Washington, DC: U.S. Department of Education, National Center for Education Statistics.

McMillen, M.M., Kaufman, P., & Klein, S. (1997). Dropout rates in the United States: 1995. Washington, DC: U.S. Department of Education, National Center for Education Statistics.

McMillen, M.M. (1998). *Dropout rates in the United States:* 1996. Washington, DC: U.S. Department of Education, National Center for Education Statistics.

Hoffman, L. (1998). *Overview of public elementary and secondary schools and districts: School year 1995-96.* Washington, DC: U.S. Department of Education, National Center for Education Statistics. (Puerto Rico only).

# Goal 3: Student Achievement and Citizenship

# 8. Reading Achievement

The National Education Goals Panel has set its performance standard at the two highest levels of achievement — Proficient or Advanced — on the National Assessment of Educational Progress (NAEP). These levels were established by the National Assessment Governing Board.

In 1992, 43 jurisdictions (states and territories) participated in the 4th-grade reading assessment.

In 1994, 44 jurisdictions participated in the voluntary program. However, two states, Idaho and Michigan, did not meet the minimum school participation guidelines for public schools; therefore, their results were not released. In addition, the District of Columbia withdrew from the Trial State Assessment after the data collection phase. It should also be noted that Montana, Nebraska, New Hampshire, Pennsylvania, Rhode Island, Tennessee, and Wisconsin did not satisfy one of the guidelines for school sample participation rates.

**Source:** Campbell, J., Donahue, P., Reese, C., & Phillips, G. (1996). *NAEP 1994 reading report card for the nation and the states.* Washington, DC: U.S. Department of Education, National Center for Education Statistics.

#### 9. Mathematics Achievement

The National Education Goals Panel has set its performance standard at the two highest levels of achievement — Proficient or Advanced — on the National Assessment of Educational Progress. These levels were established by the National Assessment Governing Board.

Forty jurisdictions (states and territories) participated in the 1990 trial mathematics assessment of 8th graders, and 44 jurisdictions participated in the 1992 state mathematics assessments of 4th and 8th graders.

In 1996, 45 jurisdictions participated in the voluntary assessment of 4th and 8th graders. However, three states (Nevada, New Hampshire, and New Jersey) failed to meet the minimum school participation guidelines for public schools at Grade 8; therefore, their results were not released. The following states did not satisfy one of the guidelines for school sample participation rates at Grade 4: Alaska, Arkansas, Iowa, Michigan, Montana, Nevada, New Jersey, New York, Pennsylvania, South Carolina, and Vermont. The following states did not satisfy one of the guidelines for school sample participation rates at Grade 8: Alaska, Arkansas, Iowa, Maryland, Michigan, Montana, New York, South Carolina, Vermont, and Wisconsin.



**Sources:** Reese, C.M., Miller, K.E., Mazzeo, J., & Dossey, J.A. (1997). *NAEP 1996 mathematics report card for the nation and the states.* Washington, DC: National Center for Education Statistics.

National Center for Education Statistics, 1990 and 1992 NAEP Mathematics Data (revised), October 1996.

#### 10. Science Achievement

The National Education Goals Panel has set its performance standard at the two highest levels of achievement — Proficient or Advanced — on the National Assessment of Educational Progress. These levels were established by the National Assessment Governing Board.

In 1996, 45 states participated in the voluntary program. However, three states (Nevada, New Hampshire, and New Jersey) failed to meet the minimum school participation guidelines for public schools; therefore, their results were not released. The following states did not satisfy one of the guidelines for school sample participation rates: Alaska, Arkansas, Iowa, Maryland, Michigan, Montana, New York, South Carolina, Vermont, and Wisconsin.

**Source:** Bourque, M.L., Champagne, A., & Crissman, S. (1997). *1996 science performance standards: Achievement results for the nation and states, a first look.* Washington, DC: National Assessment Governing Board.

#### 11. Advanced Placement Performance

The Advanced Placement program, sponsored by the College Board, provides a way for high schools to offer college-level coursework to students. At present, one or more course descriptions, examinations, and sets of curricular materials are available in art, biology, chemistry, computer science, economics, English, French, German, government and politics, history, Latin, mathematics, music, physics, and Spanish. Advanced Placement examinations, which are given in May, are graded on a five-point scale: 5 — extremely well qualified; 4 — well qualified;

3 — qualified; 2 — possibly qualified; and 1 — no recommendation. Grades of 3 and above generally are accepted for college credit and advanced placement at participating colleges and universities.

The number of Advanced Placement examinations graded 3 or above per 1,000 11th and 12th graders is presented in this report. The number of 11th and 12th graders includes public and private students. The enrollment figures were arrived at by multiplying the public enrollment by a private-enrollment adjustment factor.

**Source:** The College Board, Advanced Placement Program, Results from the 1991 and 1998 Advanced Placement Examinations, unpublished tabulations, August 1991 and August 1998.

# Goal 4: Teacher Education and Professional Development

#### 12. Teacher Preparation

Only secondary school teachers whose main assignment was in mathematics, science, English, social studies, fine arts, foreign language, and special education were included in the analysis of whether a teacher had a degree in his/her main assignment. Information is not reported for bilingual education or English as a Second Language (ESL) degrees, since relatively few higher education institutions grant degrees in those fields. "Undergraduate or graduate degrees" includes academic or education majors, but does not include minors or second majors.

A secondary teacher is one who, when asked about grades taught, checked:

- "Ungraded" and was designated as a secondary teacher on the list of teachers provided by the school; or
- 6th grade or lower and 7th grade or higher, and reported a primary assignment other than prekindergarten, kindergarten, or general elementary; or



- 9th grade or higher, or 9th grade or higher and "ungraded;" or
- 7th and 8th grades only, and reported a primary assignment other than kindergarten, general elementary, or special education; or
- 7th and 8th grades only, and reported a primary assignment of special education and was designated as a secondary teacher on the list of teachers provided by the school; or
- 6th grade or lower and 7th grade or higher, or 7th and 8th grades only, and was not categorized above as either elementary or secondary.

**Source:** U.S. Department of Education, National Center for Education Statistics, Public School Teacher Surveys of the Schools and Staffing Survey, 1990-91 and 1993-94, unpublished tabulations prepared by Westat, August 1995.

#### 13. Teacher Professional Development

Selected topics for professional development include uses of educational technology, methods of teaching subject field, in-depth study in subject field, and student assessment.

**Source:** U.S. Department of Education, National Center for Education Statistics, Public School Teacher Survey of the Schools and Staffing Survey, 1993-94, unpublished tabulations prepared by Westat, August 1995.

# 14. Preparation to Teach Limited English Proficient Students

Source: Ibid.

## 15. Teacher Support

**Source:** U.S. Department of Education, National Center for Education Statistics, Public School Teacher Surveys of the Schools and Staffing Survey, 1990-91 and 1993-94, unpublished tabulations prepared by Westat, August 1995.

# **Goal 5: Mathematics and Science**

16.	International	Mathematics	and	Science
	Achievement			

International comparisons of student achievement in 8th grade mathematics and science are presented, using data from a newly released research study. This study statistically links state results from the 1996 NAEP with country results from the 1995 Third International Mathematics and Science Study (TIMSS). TIMSS is the most comprehensive international study of mathematics and science achievement conducted to date. TIMSS tested half a million students in 41 countries in 30 different languages. Participating countries included the United States, as well as some of the United States' chief economic competitors and trading partners, such as Japan, Germany, Canada, England, France, Korea, Singapore, Hong Kong, and the Russian Federation.

Linking the two assessments allows us to predict how each state would have performed on TIMSS, relative to the 41 countries that actually participated in the international assessment, on the basis of each state's NAEP performance. The authors of the linking study caution that the technique used to link the two tests can provide only limited information, since NAEP and TIMSS cover different content and were taken by different groups of students at different times. Nevertheless, the technique can provide broad comparisons that tell states which countries' students would be expected to score significantly higher than, similar to, or significantly lower than their own students in mathematics and science on this international assessment.

In 1995, a representative sample of 8th graders in Minnesota took the same mathematics and science assessments as the students in the 41 participating TIMSS nations. Results shown for Minnesota, therefore, are based on actual scores, not estimated scores. Missouri and Oregon also took the same TIMSS assessments in 1997, but their results have not yet been publicly released. **Source:** Johnson, E.G., & Siegendorf, A. (1998). Linking the National Assessment of Educational Progress and the Third International Mathematics and Science Study: Eighth grade results. Report prepared for the U.S. Department of Education, National Center for Education Statistics, NCES 98-500. Washington, DC: U.S. Government Printing Office.

#### 17. Mathematics Instructional Practices

**Source:** NAEP 1996 Mathematics Cross-State Data Compendium for the Grade 4 and Grade 8 Assessment. Findings from the State Assessment in Mathematics of the National Assessment of Educational Progress, NCES 97-495; and unpublished tabulations from Educational Testing Service, August, 1997.

#### 18. Mathematics Resources

Source: Ibid.

#### 19. Mathematics and Science Degrees

Data include only U.S. citizens and resident aliens on permanent visas, and include institutions in U.S. territories.

Mathematical sciences is the only field of study included in the mathematics category for this report. Fields of study in the science category for this report include: engineering; physical sciences; geosciences; computer science; life sciences (includes medical and agricultural sciences); social sciences; and science and engineering technologies (includes health technologies).

No percentages are reported for mathematics and science degrees awarded to minority students in Guam due to insufficient population size.

**Source:** Integrated Postsecondary Education Data System (IPEDS 1991 and 1995), which is conducted by the National Center for Education Statistics. The data were analyzed by Westat, using the National Science Foundation's WebCASPAR Database System, August 1997.

# Goal 6: Adult Literacy and Lifelong Learning

# 20. Adult Literacy

The U.S. Department of Education and the Educational Testing Service (ETS) characterized the literacy of America's adults in terms of three "literacy scales" representing distinct and important aspects of literacy: prose, document, and quantitative literacy. Each of the literacy scales has five levels, with Level 1 being least proficient and Level 5 being most proficient.

Prose literacy, presented in this report, is defined as the knowledge and skills needed to understand and use information from texts that include editorials, news stories, poems, and fiction; for example, finding a piece of information in a newspaper article, interpreting instructions from a warranty, inferring a theme from a poem, or contrasting views expressed in an editorial.

Twelve states (California, Florida, Illinois, Indiana, lowa, Louisiana, New Jersey, New York, Ohio, Pennsylvania, Texas, and Washington) participated in the 1992 State Adult Literacy Survey. The Oregon Progress Board conducted an independent study in 1990, which was validated by the Educational Testing Service. Adults aged 16-65 participated in the 1990 Oregon study; in other states that participated in 1992, the sample included adults aged 16 and older.

**Sources:** Educational Testing Service, unpublished tabulations from the 1992 State Adult Literacy Survey, August 1993. The Oregon Progress Board conducted an independent study in 1990, which was validated by the Educational Testing Service.

#### 21. Voter Registration and Voting

**Sources:** U.S. Department of Commerce, Bureau of the Census, Voting and Registration in the Election of November 1988, Current Population Reports, Series P-20, no. 440 (Washington, DC: U.S. Government Printing Office, 1989), and unpublished tabulations, calculations by Westat.

U.S. Department of Commerce, Bureau of the Census, Voting and Voter Registration in the Election of November 1996, Current Population Reports, Series P-20, no. 504 (Washington, DC: U.S. Government Printing Office, 1998), and unpublished tabulations, calculations by Westat.

#### 22. Participation in Higher Education

Higher education participation rates for 1992 were computed by adding 1991-1992 high school graduates from public schools (reported in the Common Core of Data) and 1990-1991 high school graduates from nonpublic schools (reported in the Private School Universe Survey). Rates for 1996 were computed the same way, using 1995-1996 public school data and 1994-1995 nonpublic school data.

**Sources:** U.S. Department of Education, National Center for Education Statistics, Residence and Migration of First-Time Freshmen Enrolled in Higher Education Institutions: Fall 1992; Common Core of Data 1992-93; and Private School Universe Survey, 1991-92.

U.S. Department of Education, National Center for Education Statistics, Residence and Migration of First-Time Freshmen Enrolled in Higher Education Institutions: Fall 1996; Common Core of Data 1996-97; and Private School Universe Survey, 1995-96.

# Goal 7: Safe, Disciplined, and Alcoholand Drug-free Schools

#### 23. Student Marijuana Use

The information from the Youth Risk Behavior Survey (YRBS) includes only states with weighted data.

**Sources:** Centers for Disease Control and Prevention. (1992). Current tobacco, alcohol, marijuana, and cocaine use among high school students — United States, 1991. Atlanta, GA: Author.

Centers for Disease Control and Prevention. (1994). Current tobacco, alcohol, marijuana, and cocaine use among high school students — United States, 1993. Atlanta, GA: Author.

Centers for Disease Control and Prevention. (1996). Current tobacco, alcohol, marijuana, and cocaine use among high school students — United States, 1995. Atlanta, GA: Author.

Centers for Disease Control and Prevention. (1998). Current tobacco, alcohol, marijuana, and cocaine use among high school students — United States, 1997. Atlanta, GA: Author.

#### 24. Student Alcohol Use

See technical note under indicator 23.

Source: Ibid.

### 25. Availability of Drugs on School Property

See technical note under indicator 23.

**Sources:** Centers for Disease Control and Prevention. (1994). Current tobacco, alcohol, marijuana, and cocaine use among high school students — United States, 1993. Atlanta, GA: Author.

Centers for Disease Control and Prevention. (1996). Current tobacco, alcohol, marijuana, and cocaine use among high school students — United States, 1995. Atlanta, GA: Author.

#### 26. Student Victimization

See technical note under indicator 23.

Source: Ibid.

#### 27. Physical Fights

See technical note under indicator 23.

Source: Ibid.

# 28. Carrying a Weapon

See technical note under indicator 23.

Source: Ibid.

#### 29. Student Safety

See technical note under indicator 23.

Source: Ibid.

# 30. Teacher Victimization

**Source**: U.S. Department of Education, National Center for Education Statistics, Public School Teacher Survey of the Schools and Staffing Survey, 1993-94, unpublished tabulations prepared by Westat, August 1995.

#### 31. Disruptions in Class by Students

See technical note for Goal 4, indicator 12, regarding the definition of a secondary teacher.

**Source:** U.S. Department of Education, National Center for Education Statistics, Public School Teacher Surveys of the Schools and Staffing Survey, 1990-91 and 1993-94, unpublished tabulations prepared by Westat, August 1995.

#### **Goal 8: Parental Participation**

#### 32. Parental Involvement in Schools

**Sources:** U.S. Department of Education, National Center for Education Statistics, Public School Teacher Surveys of the Schools and Staffing Survey, 1990-91 and 1993-94, unpublished tabulations prepared by Westat, August 1995.

U.S. Department of Education, National Center for Education Statistics, Public School Principal Surveys of the Schools and Staffing Survey, 1990-91 and 1993-94, unpublished tabulations prepared by Westat, August 1995.

# 33. Influence of Parent Associations

Areas of school policy include establishing curriculum, hiring new full-time teachers, and setting discipline policy.

In 1990-1991, data from principals reporting that the parent association in their school has substantial influence on hiring new teachers were not reported for the following states due to small sample size: Arkansas, Georgia, Idaho, Kansas, Maine, Massachusetts, Montana, Nevada, New Mexico, North Dakota, Pennsylvania, Rhode Island, Vermont, West Virginia, and Wyoming.

In 1993-1994, data from principals reporting that the parent association in their school has substantial influence on hiring new teachers were not reported for the following states due to small sample size: South Carolina and West Virginia.

In 1990-1991, data from principals reporting that the parent association in their school has substantial influence on setting discipline policy were not reported for the state of Maine due to small sample size.

**Source:** U.S. Department of Education, National Center for Education Statistics, Public School Principal Surveys of the Schools and Staffing Survey, 1990-91 and 1993-94, unpublished tabulations prepared by Westat, August 1995.



# Appendix C

# Acknowledgements

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# **1998 National Education Goals Report**

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