

# Benchmarking for Success: Ensuring U.S. Students Receive a World-Class Education

A report by the National Governors Association, the Council of Chief State School Officers, and Achieve, Inc.



### **National Governors Association**

Founded in 1908, the National Governors Association (NGA) is the collective voice of the nation's governors and one of Washington, D.C.'s most respected public policy organizations. Its members are the governors of the 50 states, three territories and two commonwealths. NGA provides governors and their senior staff members with services that range from representing states on Capitol Hill and before the Administration on key federal issues to developing and implementing innovative solutions to public policy challenges through the NGA Center for Best Practices. For more information, visit www.nga.org.

### **Council of Chief State School Officers**

The Council of Chief State School Officers (CCSSO) is a nonpartisan, nationwide, nonprofit organization of public officials who head departments of elementary and secondary education in the states, the District of Columbia, the Department of Defense Education Activity, and five U.S. extra-state jurisdictions. CCSSO provides leadership, advocacy, and technical assistance on major educational issues. The Council seeks member consensus on major educational issues and expresses their views to civic and professional organizations, federal agencies, Congress, and the public.

#### Achieve, Inc.

Created by the nation's governors and business leaders, Achieve is a bipartisan, non-profit organization that helps states raise academic standards, improve assessments and strengthen accountability to prepare all young people for postsecondary success. At the 2005 National Education Summit, Achieve launched the American Diploma Project (ADP) Network, a coalition that has grown to 34 states, educating nearly 85% of public school students in the United States. The ADP Network is committed to aligning high school expectations with the demands of college, career and life. To learn more about Achieve, visit www.achieve.org.

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### Foreword

We are living in a world without borders. To meet the realities of the 21st century global economy and maintain America's competitive edge into the future, we need students who are prepared to compete not only with their American peers, but with students from all across the globe for the jobs of tomorrow.

States have voluntarily taken the lead in developing standards-based education, but policymakers lack a critical tool for moving forward—international benchmarking. This report is intended to help states take the next steps toward ensuring that American students receive a world-class education that positions them to compete and innovate in the 21st century.

International benchmarking will help state policymakers identify the qualities and characteristics of education systems that best prepare students for success in the global marketplace. The stakes are high, and improving our educational system will require commitment and insight not just from state leaders but many other stakeholders as well. With this in mind, the National Governors Association, the Council of Chief State School Officers, and Achieve, Inc. have joined to provide to states a roadmap for benchmarking their K-12 education systems to those of top-performing nations.

The partners' recommendations were informed by an International Benchmarking Advisory Group consisting of education experts representing education institutions, the business community, researchers, former federal officials, and current state and local officials. The Advisory Group's expertise and experience helped the partners identify the need for international comparisons and provide guidance for benchmarking state education system practices in areas such as standards, accountability, educator workforce, and assessments. The partner organizations will work with states to develop and implement these recommendations.

Governors recognize that new economic realities mean it no longer matters how one U.S. state compares to another on a national test; what matters is how a state's students compare to those in countries around the globe. America must seize this moment to ensure that we have workers whose knowledge, skills, and talents are competitive with the best in the world.

Governor Janet Napolitano Arizona Governor Sonny Perdue Georgia Craig R. Barrett Chairman of the Board Intel Corporation

Co-Chairs, International Benchmarking Advisory Group

To develop this report, the National Governors Association (NGA), Council of Chief State School Officers (CCSSO), and Achieve, Inc. invited national, state, and local education and policy leaders to serve on an International Benchmarking Advisory Group. The Advisory Group provided the three partner organizations with valuable insights and helped frame this bipartisan Call to Action. They collectively support the recommendations herein for internationally benchmarking state K-12 education systems.

### Co-Chairs:

Governor Janet Napolitano, Arizona Governor Sonny Perdue, Georgia Craig R. Barrett, Chairman of the Board, Intel Corporation

### Members:

Steven A. Ballmer, Chief Executive Officer, Microsoft Corporation

Governor Donald L. Carcieri, Rhode Island

- Mitchell Chester, Commissioner of Education, Massachusetts Department of Elementary and Secondary Education
- Christopher Edley, Jr., Dean and Professor of Law, University of California–Berkeley
- Chester E. Finn, Jr., President, Thomas B. Fordham Institute
- Beverly L. Hall, Superintendent, Atlanta Public Schools
- James B. Hunt, Jr., Chairman, the James B. Hunt, Jr. Institute for Educational Leadership and Policy at the University of North Carolina–Chapel Hill and former Governor of North Carolina
- Kati Haycock, President, The Education Trust
- Dwight Jones, Commissioner of Education, Colorado Department of Education

Governor Tim Kaine, Virginia

Janet Murguía, President and Chief Executive Officer, National Council of La Raza

Thomas Payzant, Professor of Practice, Harvard Graduate School of Education

Charles B. Reed, Chancellor, California State University

- Richard W. Riley, Senior Partner with EducationCounsel LLC, former U.S. Secretary of Education, and former Governor of South Carolina
- Andreas Schleicher, Head of the Indicators and Analysis Division, Directorate for Education, Organisation for Economic Co-Operation and Development
- William H. Schmidt, University Distinguished Professor, Michigan State University

Vivien Stewart, Vice President for Education, Asia Society

- Phillip Uri Treisman, Executive Director, The Charles A. Dana Center at the University of Texas at Austin
- Bob Wise, President, Alliance for Excellent Education and former Governor of West Virginia

## I. Executive Summary

A round the globe, governments are eagerly comparing their educational outcomes to the best in the world. The goal is not just to see how they rank, but rather to identify and learn from top performers and rapid improvers—from nations and states that offer ideas for boosting their own performance. This process, known as "international benchmarking," has become a critical tool for governments striving to create world-class education systems.

In American education, "benchmarking" often simply means comparing performance outcomes or setting performance targets (or "benchmarks"). But in business and among education leaders in other countries, it means much more. The American Productivity and Quality Center puts it this way: "Benchmarking is the practice of being humble enough to admit that someone else has a better process and wise enough to learn how to match or even surpass them."

Countries and states have good reason to make the effort. Technological, economic, and political trends have combined to increase demand for higher skills while heightening competition for quality jobs. Rulebound jobs on factory floors and in offices are being automated and outsourced. The world's knowledgeand-innovation economy favors workers who have postsecondary education or training, strong fundamental skills in math and reading, and the ability to solve unfamiliar problems and communicate effectively.

At the same time, new technologies and corporate strategies have opened the global labor market to billions of people from places like Eastern Europe, India, China, and Brazil who had been left out. An increasing variety of work tasks can be digitized and performed nearly anywhere in the world. More jobs are going to the best educated no matter where they live, which means that Americans will face more competition than ever for work.

International trade agreements, such as China's membership in the World Trade Organization in 2001, have hastened this transformation. Since 1980, global trade has grown 2.5 times faster than the global gross domestic product (GDP). Recent estimates put today's world exports at \$12.5 trillion, nearly 20 percent of world GDP. The global economy is here to stay, with recent research suggesting that it is evolving and its impact intensifying at a stunning pace. "Globalization is happening faster than people think," says Vivek Wadhwa, Wertheim Fellow at Harvard Law School's Labor and Worklife program and Duke University Executive in Residence. His recent research shows that companies are no longer just outsourcing production but are farming out *innovation* as well. "Having India and China conduct such sophisticated research and participate in drug discovery was unimaginable even five years ago," he says.

Education is a tremendously important lever for ensuring competitiveness and prosperity in the age of globalization, albeit not the only one. Recent economic studies show that high skills lead to better wages, more equitable distributions of income, and substantial gains in economic productivity. Higher math performance at the end of high school translates into a 12 percent increase in future earnings. If the United States raised students' math and science skills to globally competitive levels over the next two decades, its GDP would be an additional 36 percent higher 75 years from now.

The race is on among nations to create knowledgefueled innovation economies. In Singapore, Germany, China, Brazil, Korea, and other countries around the world, educational improvement is viewed as a critical part of that mission. Nations and states are therefore working hard to benchmark their education systems to establish a solid foundation for economic development in the 21st century. Some are finding innovative ways to measure their students' progress internationally. Others are examining high-performing and fast-improving nations to learn about best practices that they then adapt or adopt to improve their own systems.

American education has not adequately responded to these new challenges. The United States is falling behind other countries in the resource that matters most in the new global economy: human capital. American 15-year-olds ranked 25th in math and 21st in science achievement on the most recent international assessment conducted in 2006. At the same time, the U.S. ranked high in inequity, with the third largest gap in science scores between students from different socioeconomic groups. The U.S. is rapidly losing its historic edge in educational attainment as well. As recently as 1995, America still tied for first in college and university graduation rates, but by 2006 had dropped to 14th. That same year it had the second-highest college dropout rate of 27 countries.

State leaders already are deeply engaged in efforts to raise standards, advance teaching quality, and improve low-performing schools. International benchmarking provides an additional tool for making that process more effective, offering insights and ideas that cannot be garnered solely from looking within and across state lines. To that end, the partner organizations and International Benchmarking Advisory Group call on state leaders to take the following actions: State leaders also should tackle "the equity imperative" by creating strategies for closing the achievement gap between students from different racial and socioeconomic backgrounds in each of the action steps above. Reducing inequality in education is not only socially just, it's essential for ensuring that the United States retain a competitive edge.

Research shows that education systems in the United States tend to give disadvantaged and low-achieving students a watered down curriculum and place them in larger classes taught by less qualified teachers exactly opposite of the educational practices of highperforming countries.

**Action 1:** Upgrade state standards by adopting a common core of internationally benchmarked standards in math and language arts for grades K-12 to ensure that students are equipped with the necessary knowledge and skills to be globally competitive.

Action 2: Leverage states' collective influence to ensure that textbooks, digital media, curricula, and assessments are aligned to internationally benchmarked standards and draw on lessons from high-performing nations and states.

**Action 3:** Revise state policies for recruiting, preparing, developing, and supporting teachers and school leaders to reflect the human capital practices of top-performing nations and states around the world.

**Action 4:** Hold schools and systems accountable through monitoring, interventions, and support to ensure consistently high performance, drawing upon international best practices.

**Action 5:** Measure state-level education performance globally by examining student achievement and attainment in an international context to ensure that, over time, students are receiving the education they need to compete in the 21st century economy.

The federal government can play an enabling role as states engage in the critical but challenging work of international benchmarking. First, federal policymakers should offer funds to help underwrite the cost for states to take the five action steps described above. At the same time, policymakers should boost federal research and development (R&D) investments to provide state leaders with more and better information about international best practices, and should help states develop streamlined assessment strategies that facilitate cost-effective international comparisons of student performance.

As states reach important milestones on the way toward building internationally competitive education systems, the federal government should offer a range of tiered incentives to make the next stage of the journey easier, including increased flexibility in the use of federal funds and in meeting federal educational requirements and providing more resources to implement world-class educational best practices. Over the long term, the federal government will need to update laws to align national education policies with lessons learned from state benchmarking efforts and from federally funded research.

Nations around the world are facing a new education imperative, and many are seizing the historical moment to provide their citizens with better opportunities and stronger economies.

America must seize this moment too, with states leading the way. Many states already are working hard to improve standards, teaching quality, and accountability, but policymakers lack a critical tool international benchmarking. The U.S. can take pride in many aspects of its education system, from the high performance of its teenagers on international civics tests to the strength of its higher education institutions.

But if state leaders want to ensure that their citizens and their economies remain competitive, they must look beyond America's borders and benchmark their education systems with the best in the world. The state mandate to educate all students remains, but the world that students will enter after school has changed.

For Andreas Schleicher, head of the Indicators and Analysis Division at the Organisation for Economic Co-Operation and Development's Directorate for Education, the case for adopting a global view to improving education is undeniable:

It is only through such benchmarking that countries can understand relative strengths and weaknesses of their education system and identify best practices and ways forward. The world is indifferent to tradition and past reputations, unforgiving of frailty and ignorant of custom or practice. Success will go to those individuals and countries which are swift to adapt, slow to complain, and open to change.