The New Commission on the Skills of the American Workforce: The Study

The New Commission on the Skills of the American Workforce is a group of American business, government, civil rights and education leaders that proposed a new framework for American education to boost student performance and raise system efficiency. Their report, *Tough Choices or Tough Times*, recommended dramatic changes to America’s education and training system so that the nation can maintain its standard of living as we advance through the 21st century.
# TABLE OF CONTENTS

<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>THE STUDY</td>
<td>1</td>
</tr>
<tr>
<td>ECONOMICS AND LABOR MARKET STUDY</td>
<td>1</td>
</tr>
<tr>
<td>INDUSTRY STUDIES</td>
<td>2</td>
</tr>
<tr>
<td>EDUCATION SYSTEMS STUDIES</td>
<td>2</td>
</tr>
<tr>
<td>STAFF PAPERS</td>
<td>2</td>
</tr>
<tr>
<td>COMMISSIONED PAPERS</td>
<td>2</td>
</tr>
<tr>
<td>EXPERT INTERVIEWS &amp; FOCUS GROUPS</td>
<td>3</td>
</tr>
<tr>
<td>COMMISSION LEADERSHIP</td>
<td>8</td>
</tr>
<tr>
<td>COMMISSION REPORT STAFF</td>
<td>9</td>
</tr>
</tbody>
</table>
THE STUDY

Commission staff began the research on which the Commission itself relied 18 months before the first meeting of the Commission and continued the research right up to the last meeting. Each sub-study is briefly described below, and the associated papers listed. In most cases, those papers prepared by our staff and the papers commissioned from others are available on NCEE’s website. Extensive field work was required to complete these studies. A list of the nations visited and organizations visited is also included below. All but one of the Background Papers in the report itself were prepared by the staff. The financial analysis of the Commission’s recommendations was prepared by Augenblick, Palaich and Associates (APA) of Denver, Colorado. The authors of that study were Robert Palaich, John Augenblick, John Myers, Douglas Rose, Amy Anderson, Justin Silverstein, and Amanda Brown.

ECONOMICS AND LABOR MARKET STUDY

This study focused on the flows of the international economy as they affect the prospects for economic growth in the United States, with particular attention to the effects on employment and income of advancing technology and the rise of countries that can offer high skills at low wages. The study addressed eight areas, in the following sequence:

- Estimated the contributions of education and innovation (such as patents, R&D spending) to U.S. and global economic growth
- Analyzed the relationship between education and access to middle-class status since 1967 and projected to 2012
- Projected the supply and demand for education in the United States to 2012
- Analyzed the relationship between educational attainment and occupational competencies (knowledge, skills, abilities, work styles, work contexts, values, and interests) based on the U.S. Department of Labor’s Occupational Information Network (O*Net) data
- Measured educational adequacy against criteria that included employability and middle-class jobs
- Estimated the vulnerability of U.S. jobs to offshoring based on the characteristics of the jobs and the skills of current job holders, as reported in O*Net
- Estimated the stock and growth of the global supply of educated workers

A report, *America in the Global Economy*, by Ray Uhalde and Jeffrey Strohl, is available on NCEE’s website.
INDUSTRY STUDIES

We examined eight industries to understand the forces operating on these industries to produce new winners and new losers with respect to companies, countries, and workers; the prospects for growth and decline for these industries and the specific factors affecting those prospects; and the way in which the availability of workers with specific skills in this country and abroad affects investment and location decisions in these industries. A paper edited by Mark Troppe and Peter Carlson, *An Analysis of Market and Skill Changes in Select Industries*, 2006 (available online), synthesizing the Industry Study findings as a whole and the findings in each industry including:

- Biotechnology
- Automotive
- Telecommunications
- Textiles and Apparel
- Entertainment
- Health Care
- Personal Computers
- Software

EDUCATION SYSTEMS STUDIES

We have: identified nations that have consistently scored high on international comparisons of educational achievement on the dimensions that our economic studies identify as important; benchmarked education and training policies and practices in those countries that have the potential for producing substantial gains in system productivity in the United States; and reviewed and synthesized the literature on the sources of creativity and innovation in individuals and identified curricula and pedagogical techniques that have proven effective in promoting those qualities. The result of this work is the following reports and commissioned papers, which are available on NCEE’s website [here](#).

STAFF PAPERS

*Early Childhood Education: Lessons from the States and Abroad*, Lynne Sacks and Betsy Brown Ruzzi


*Overview of Education Ministries in Selected Countries*, Lynne Sacks and Betsy Brown Ruzzi

*Profile of the Indian Education System*, Gretchen Cheney, Betsy Brown Ruzzi and Karthik Muralidharan

*The Challenge from Asia*, Marc Tucker

COMMISSIONED PAPERS

*Analysis of Teacher Retirement System Issues*, Augenblick, Palaich and Associates

*A Survey of College Students about Classroom Teaching as a Career*, Vince Breglio
Comparative Governance, Administration and Finance for Elementary and Secondary Education in Selected Countries, Brian Caldwell and Jessica Harris, Educational Transformations Ltd.

Rethinking and Redesigning Curriculum, Instruction and Assessment: What Contemporary Research and Theory Has to Offer, James W. Pellegrino, University of Illinois at Chicago 2006

Educational and Labor Market Outcomes for the Nation’s Teens and Youth Since the Publication of America’s Choice: A Critical Assessment, Andy Sum, Center for Labor Market Studies, Northeastern University

High Performance and Success in Education in Flemish Belgium and the Netherlands, Toon Dijkstra, European Orientation Programs, Maastricht University of Professional Education


Out-of-School Youth, Tim Barnicle, Senior Advisor, National Center on Education and the Economy

Sources of Innovation and Creativity: A Summary of the Research, Karlyn Adams, University of Pennsylvania

New Foreign Immigrant Workers and the Labor Market in the U.S., Andy Sum, Center for Labor Market Studies, Northeastern University 2006

The Delhi Public School: A Case Study in High Student Achievement, David Marsh, University of Southern California and Judy Codding, America’s Choice, Inc.

State and Local Workforce Systems: An Overview, Mary Gardner Clagett

The staff prepared case studies of the workforce-economic development systems in 5 states:

- Florida
- North Carolina
- Oregon
- Texas
- Washington State

EXPERT INTERVIEWS & FOCUS GROUPS

We conducted a series of interviews with leaders in education, employment, and training policy and practice in the United States and held two focus groups with international graduate students from around the world to hear from them what it takes to succeed in the global economy and what skills and knowledge they and their peers bring to the table. The following is a list of the experts we interviewed.
Roger Altman
Chairman
Evercore Partners, Inc.

Thomas Bailey
George and Abby O’Neill Professor of Economics and Education
Institute on Education and the Economy
Teachers College, Columbia University

Laurie Bassi
Chief Executive Officer
Human Capital Capability

Keith Bird
Chancellor
Kentucky Community and Tech College System

David Calleo
Dean Acheson Professor and Director of European Studies Program
Johns Hopkins University, School of Advanced International Studies

Peter Capelli
George W. Taylor Professor of Management and Director of Center for Human Resources
The Wharton School
University of Pennsylvania

Anil Gupta
Ralph J. Tyser Professor of Strategy and Organization, Management and Organization
Robert H. Smith School of Business, University of Maryland

Jerry Jaznowski
Past-President
National Association of Manufacturers

Peter Morici
Professor of International Business, Logistics, Business and Public Policy
Robert H. Smith School of Business, University of Maryland

Karthik Muralidharan
PhD Candidate, Harvard University
Study Director, World Bank Study on Education in India

Paul Osterman
Nanyang Technological Institute Professor
Institute for Work and Employment Research
Sloan School of Management
Massachusetts Institute of Technology

Bob Templin
President
Northern Virginia Community College

Graham Toft
Senior Fellow
Hudson Institute

Yong Zhao
University Distinguished Professor Educational Psychology and Educational Technology
Director, Center for Teaching and Technology
Director, US-China Center for Research on Educational Excellence
College of Education, Michigan State University
Two focus groups were held with graduate students from Johns Hopkins University, School of Advanced International Studies. Countries represented were:
- Australia
- Belgium
- Denmark
- Hong Kong
- India
- Japan
- Korea
- Netherlands
- Singapore
- United Kingdom

Finally, the staff visited organizations around the world (an asterisk denotes a factory tour in addition to a meeting or interview):

**Australia**

*Sydney*
- Department of Education and Training, New South Wales
- NCVER
- Cherrybrook Technology High School
- Dusseldorf Skills Foundation
- Centre for Regional Education
- Institute of Teachers
- Schools Resourcing Taskforce
- Group Training Australia

*Melbourne*
- University of Melbourne-Parkville
- Australian Council for Education Research
- Department of Skills, Victoria

**Belgium**
- Forem Formation
- Ministry of the Flemish Community
- AVC/CSC
- VDAB
- Institute for the Promotion of Innovation by Science and Technology in Flanders
- European Commission/Union

**Canada**

*Victoria, British Columbia*
- Ministry of Education

**China**

*Beijing*
- Ministry of Education
- China Center for Economic Research
- Peking University, Guanghua Business School
- Beijing Academy of Education Sciences
- Beijing Normal University, US-China Center
- Experimental School, Beijing Normal University
- Beijing 123 Middle School
- U.S. Commercial Service, U.S. Embassy
- Center for Pharmaceutical Information and Engineering Research, Peking University
- All-China Federation of Industry and Commerce
- China Textile Network Co., Ltd.
- China Textile & Apparel Education Society
- Topnew Knitting Group Co., Ltd.
- Intel China Ltd.
- United Technologies International Operations
Shanghai
- Shanghai Municipal Education Commission
- Shanghai Jiaotong University
- Shanghai Trade Office, City of Denver
- State of Washington Trade Development, China Office
- State of Michigan China Office
- Asia Division, Vermont Chamber of Commerce
- Eaton Automotive, Engine Air Management Operations
- Bill Wiggenhorn, founder of Motorola University and Director of Global EduTech Management Group, an educational investment group building a network of new campuses and colleges as well as managing existing education institutions and delivering world-class teaching to major institutions in Southeast Asia

Shenzhen
- Orient Product Services
- Weal-Lam Parts and Tools Ltd., metal fabrication plant
- Rice Lake Weighing Systems, Wisconsin manufacturer of industrial scales
- XtremeMac (iPod accessories emerging business)
- International Information Products (Shenzhen) Co, Ltd., a Lenovo Company, manufacturer of IBM Think Pad computers
- FLX (HK) Ltd., manufacturer of consumer electronics for US export (large manufacturer of personal karaoke machines)
- Sound Choice, Charlotte, NC, a provider of re-recorded music for karaoke
- Sure Advance PCB Ltd., manufacturer of printed circuit boards

Dongguan
- Dongguan University of Science and Technology
- Dongguan Vocational/Technical School
- Dongguan Secondary School
- Beijing Normal Jhu Hai Campus
- SAE Magnetics (H.K.) Ltd. — HDD (subsidiary of TDK), manufacturer of magnetic recording heads, head gimbal assemblies, and head stack assemblies for computer disk drives

Hong Kong
- Education and Manpower Bureau
- Hong Kong Examinations and Assessment Authority
- Chair of Education, University of Hong Kong
- Pui Ching Middle School
- St. Paul’s Convent School
- St. Paul’s Co-educational College

Czech Republic
Prague
- Education Policy Centre, Charles University
- Ministry of Education, Youth and Sport
- Institute for Social and Economical Analysis
- National Institute of Technical and Vocational Education
- CzechInvest
England

London
- Prime Minister’s Delivery Unit
- Department for Education and Skills
- Qualifications and Curriculum Authority
- Office of Standards in Education, England’s Education Inspectorate
- The Leitch Commission
- Learning and Skills Council
- National Employment Panel
- Sector Skills Development Agency
- BT Group
- City and Guilds
- Confederation of British Industry
- Trade Union Congress

Finland

Helsinki
- Ministry of Education
- Finnish National Board of Education
- University of Helsinki, Department of Applied Sciences of Education
- Helsinki School of Economics
- Mikkola Comprehensive School
- Sotunki General Upper Secondary School
- Confederation of Unions for Academic Professionals
- Association of Finnish Local and Regional Authorities; run secondary, vocational, and polytechnics
- Aike Group, Vocational and Adult Education Centers
- Tekes

Porvoo
- Edupoli Regional and Local Vocational Adult Education Centres
- Ministry of Labor
- Porvoo Employment Office
- Neste Oil

France

- Organisation for Economic Co-operation and Development (OECD)

Germany

- Institute Arbeit Und Technik

India

Delhi
- FIITJEE Limited, test prep company for IIT entry
- Oxus Research and Investments, Economics Research Firm
- Gurcharan Das, author of India Unbound, a must-read
- NIIT Limited, supplemental private education tutoring firm
- Editor, Business World
- Confederation of Indian Industries
- Delhi College of Engineering
- Delhi University
- Sardar Patel Vidyalaya School
- Delhi Public School
- National Council of Educational Research and Training
- Navodaya Vidhyalaya (a typical Indian school on the outskirts of Delhi)
- Salwan Public School
- Mira Model School

Chennai/Madras
- Bala Vidya Mandir Senior Secondary School
- Indian Institute of Technology Madras
- Crescent Engineering College
- Brilliant Tutorials Ltd., supplemental private education test prep company
- AAM Matriculation Higher Secondary School
- SRF Vidyalaya School, 90 percent first-generation learners
Bangalore
- Infosys Technologies
- Wipro
- Indian Institute of Management Bangalore
- Indian Institute of Science
- Confederation of Indian Industries Institute of Quality
- Biocon Ltd., biotech firm
- Azim Premji Foundation, Wipro-funded foundation on education and healthcare
- Vidyashilp Academy
- Sri Kumaran Children’s Home, English nursery and primary school

Mumbai/Bombay
- Economic Times
- Aptech Limited, supplemental education provider working in 30 countries
- Jamnabai Narsee School
- Bajaj Lane Municipal School

Ireland
- FAS, Training and Employment Authority
- Department of Education and Science
- Irish Business and Employment Confederation
- Enterprise Ireland
- FORFAS
- Aderra
- Einet
- Irish Congress of Trade Unions
- Ireland-U.S. Chamber of Commerce
- National Qualification Authority of Ireland

Italy
Bologna
- Ministry for Education and Labor
- Fondazione Instituto per il Lavoro
- Format, Employer Association
- CISL
- L’Instituto Salesiano

Rome
- Ministry of Education, University and Research
- Montessori Foundation
- Montessori School in Rome

New Zealand
Wellington
- New Zealand Ministry of Education
- New Zealand Department of Labor
- New Zealand Qualifications Authority
- Ministry of Social Development

COMMISSION LEADERSHIP

William E. Brock
Chairman, The Brock Offices

Marc S. Tucker
Vice-Chairman and Staff Director

Charles B. Knapp
Director of Educational Development, CF Foundation

Morton Bahr
President Emeritus, Communications Workers of America

Judy Codding
President and CEO, America’s Choice, Inc.

Michael Dolan
Executive Vice President and Chief Financial Officer, Viacom