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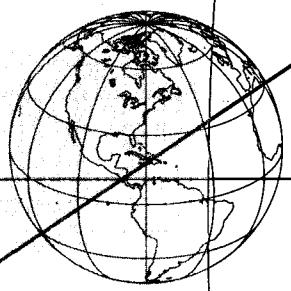
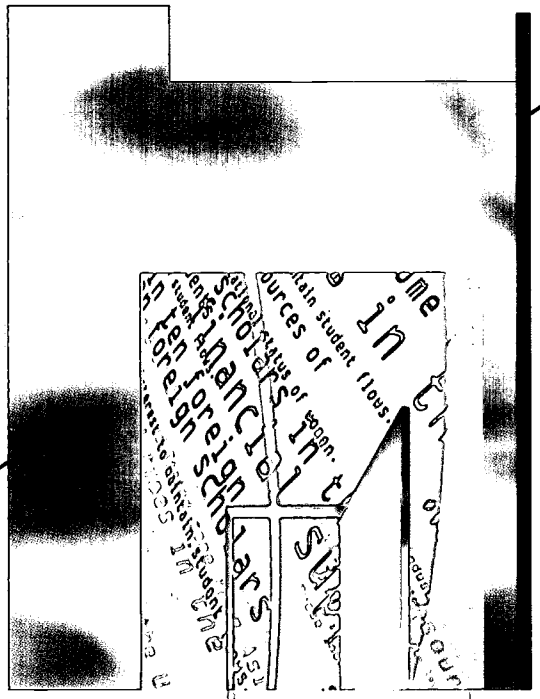
ABSTRACT

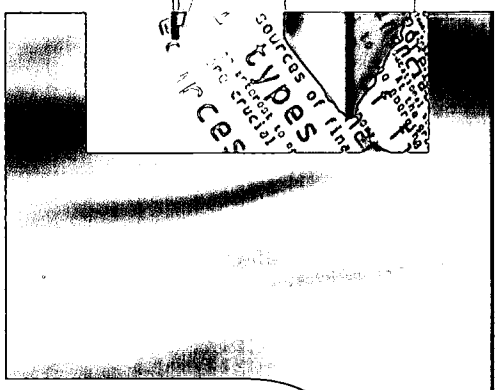
This report examines current and historical data on international student mobility, based on surveys of foreign students and scholars in the United States and U.S. students in study abroad programs and the Cooperative Institutional Research Program. The 65 data tables and 40 figures and accompanying summary text are organized as follows: (1) total number of foreign students in the United States; (2) foreign student enrollment by region of origin, and (3) by country of origin; (4) undergraduate and graduate distribution by county or origin; (5) analyses of foreign students based on the Cooperative Institutional Research Program Freshman Survey data and the International Student Satisfaction Report; (6) distribution of foreign students in the United States by county, region, and state; (7) primary sources of funding and estimated expenditures of foreign students; (8) foreign student enrollments by institution; (9) academic and personal characteristics of foreign students; (10) numbers and destinations of U.S. students studying abroad; (11) number and activities of foreign scholars on U.S. campuses; and (12) description of the methodology used. Several chapters contain brief essays that offer unique perspectives on different aspects of international education by several experts. A final brief chapter lists the data available on the diskette and explains its use. (CH)

1995 - 1996





Open Doors

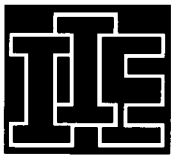


report on international educational exchange

open doors 1995/96

REPORT ON INTERNATIONAL EDUCATIONAL EXCHANGE

Todd M. Davis, Editor



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Telephone: (212) 984-5345

Internet: opendoors@iie.org

Fax: (212) 984-5452

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FOREWORD

Student Exchange in the Post-Modern Era

The post-modern era has seized us as Charles Jencks, one of the founders of the movement, has told us. We live and work in spaces that adhere to post-modern architectural and aesthetic principles. We are employed in occupations that our grandparents would not understand. Even our politics and international relations can be characterized as post-modern. Jencks suggests that the ideas of "plurality," boundary blurring and mixed genres are key dimensions of the current condition. Rather than rejecting the modern as the modern rejected the classical, post-modern thinking acknowledges the modern and pushes beyond it.

International student mobility can be understood as having moved through distinct phases. We can look back to the grand tours and elite exchanges that characterized the pre-war era and label that era as "classical" in that they occurred for academic and social purposes by an academic and economic elite. The "modern" era of exchange began after the Second World War when the U.S. government massively funded reeducation programs for Germans and Japanese. During the next 40 years as the Cold War deepened, exchange in the service of the state was sustained and expanded. Exchange became a means of maintaining solidarity with our allies, showcasing American style welfare-capitalism to third world countries, and building the economies of emerging allies in the hopes of making them more resistant to Communism. With the end of the Cold War, the fundamental rationales for "modern" exchange melted away. Now, in the post-modern era, transnational flows of students occur largely without the benefit of government support. They are driven by individuals who recognize that future prosperity will exist for those who can thrive in the global web of commercial, cultural and information transactions.

As I reflect on how certain we were about the role of exchange during the Cold War I am reminded of our shallow dialogue during the last six years about the future of exchange. Important questions which have not received adequate discussion include the following: what is the role of government in transnational student mobility? Does it have a role and should it? Will the United States continue to attract and retain some of the best young technical minds in the world, now that many Asian countries have begun to reap the benefits of developed educational and economic infrastructures? How will this country protect its domestic labor force from international competition or should we? What are the characteristics of the international students that American higher education will attract in the 21st century, how are they changing and should we care? In the global network, will American college students have the knowledge of others to successfully compete?

My hope is that, this year, concerned parties will begin to fashion a national consensus on international student mobility and to this end *Open Doors* data ought to play a fundamental role. This year's *Open Doors* contains the results of our separate surveys of Foreign Students, U.S. Study Abroad and Foreign Scholars. Next year we look forward to a revitalized survey of foreign students enrolled in Intensive English Programs, supported by the TOEFL Policy Council. *Open Doors 1995/96* also contains the results of a secondary analysis of two national surveys of college students. This analysis will give us the first quantitative, national picture of the background behavior and expectations of undergraduate international students enrolled in our colleges and universities. As in the past, I encourage your active engagement with the *Open Doors* data. Your reactions to the data and the interpretive essays are a good starting point from which to begin constructing a national consensus.

Todd M. Davis
Director of Research
Institute of International Education

New York City
November 6, 1996

Acknowledgments

- The preparation of this report would not have been possible without the support and contributions we received from many individuals and organizations. The Institute of International Education gratefully acknowledges grant support from the Bureau of Educational and Cultural Affairs of the United States Information Agency for the implementation of the Annual Census of Foreign Students, the Foreign Scholars Survey, and the Survey of U.S. Study Abroad and for the production of *Open Doors*.

- The Institute also acknowledges the invaluable assistance of the members of the American Association of Collegiate Registrars and Admissions Officers (AACRAO) and of NAFSA: Association of International Educators in obtaining the data. Leaders and members of the two organizations assist the Institute in the collection and analysis of the data through AACRAO's Group II Committees for International Education and NAFSA's professional sections for advisors to foreign students and scholars (CAFSS), advisers and teachers in English as a Second Language (ATESL) and U.S. students abroad (SECUSSA).

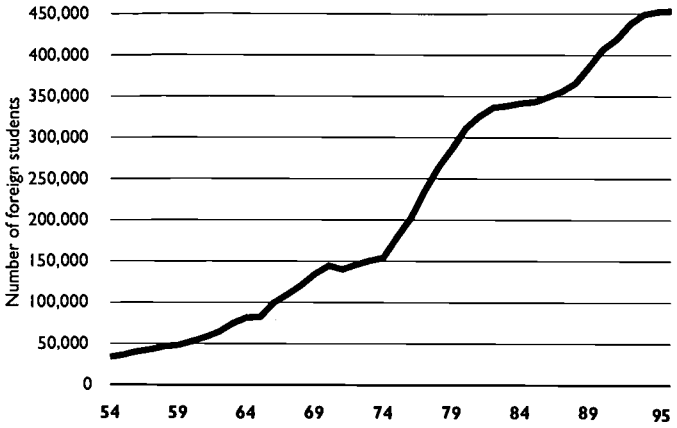
- This report has benefited from the thoughtful writing on the implications of student exchange made by our sidebar contributors. The names of these individuals are given in the bibliographic note which accompanies their essays. We are also grateful for the work of Dr. William Korn at UCLA and Dr. Lanna Lowe with the Noel/Levitz organization. The secondary analysis of their national data sets will add considerably to our understanding of international students.

- Many others inside and outside the Institute contributed their special skills to this report. The production staff for this report was led by Lisa Rhoades. Cover design was executed by Dutton and Sherman Design. Typography and page layout was by Ian Walker Communications. Copyediting of the manuscript was done by Theresa Duhon and Catherine Johntz. Finally we wish to acknowledge our debt to the officers of the Institute of International Education for their commitment to a high quality policy-oriented report.

FAST FACTS: Open Doors 1995/96

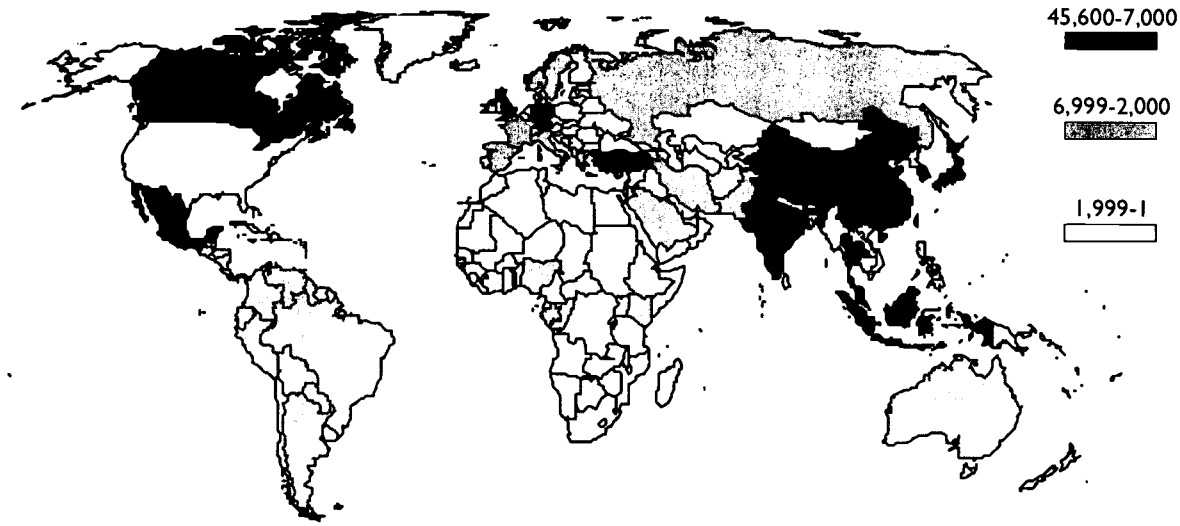
TOTAL FOREIGN STUDENT ENROLLMENT

Despite a 1,200% increase in their numbers since 1954, foreign students make up only 3.1% of the total U.S. higher education enrollment.



Year	Foreign Students	Annual % Change
1954/55	34,232	_
1964/65	82,045	9.7
1974/75	154,580	2.3
1989/90	386,851	5.6
1990/91	407,529	5.3
1991/92	419,585	3.0
1992/93	438,618	4.5
1993/94	449,749	2.5
1994/95	452,635	0.6
1995/96	**453,787**	**0.3**

WHERE THE STUDENTS COME FROM, 1995/96



Place of Origin	1994/95 Number	1995/96 Number	% Change
Japan	45,276	45,531	0.6
China	39,403	39,613	0.5
Korea, Rep of	33,599	36,231	7.8
Taiwan	36,407	32,702	-10.2
India	33,537	31,743	-5.3
Canada	22,747	23,005	1.1
Malaysia	13,617	14,015	2.9
Indonesia	11,872	12,820	8.0
Thailand	10,889	12,165	11.7
Hong Kong	12,935	12,018	-7.1
Germany	8,592	9,017	4.9
Mexico	9,003	8,687	-3.5

Region of Origin	1994/95 Total	1995/96 Total	% Change
Africa	20,724	20,844	0.6
Asia	261,789	259,893	-0.7
Europe	64,811	67,358	3.9
Latin America	47,239	47,253	0.0
Middle East	30,246	30,563	1.0
North America	23,394	23,644	1.1
Oceania	4,327	4,202	-2.9
World Total	**452,635**	**453,787**	**0.3**

FAST FACTS: Open Doors 1995/96

LEADING COUNTIES, 1995/96

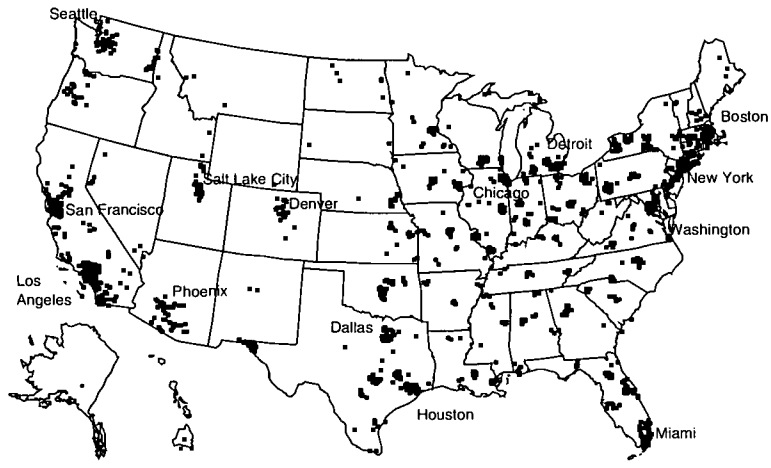
Over half of the country's foreign students are concentrated in only 50 U.S. counties.

County	State	Students
Los Angeles	California	19,510
New York	New York	19,377
Suffolk	Massachusetts	10,571
D.C.	D.C.	9,930
Cook	Illinois	9,735
Middlesex	Massachusetts	8,303
Philadelphia	Pennsylvania	6,772
Dade	Florida	6,131
Maricopa	Arizona	5,649
Honolulu	Hawaii	5,566
Harris	Texas	5,518
San Francisco	California	5,462
Santa Clara	California	5,023
King	Washington	4,954
San Diego	California	4,638
Franklin	Ohio	4,455
Washtenaw	Michigan	4,443
Orange	California	4,421
Dane	Wisconsin	4,039
Allegheny	Pennsylvania	4,019

STATES WITH THE MOST FOREIGN STUDENTS

California remains the leading host state.

U.S. State	1994/95	1995/96	% Change
California	55,685	55,799	0.2
New York	47,510	47,987	1.0
Texas	28,903	27,883	-3.5
Massachusetts	25,929	25,739	-0.7
Illinois	19,173	19,408	1.2
Florida	19,228	18,982	-1.3
Pennsylvania	18,133	17,897	-1.3
Michigan	15,722	16,284	3.2
Ohio	15,733	16,161	2.7
Washington	10,517	10,257	-2.5



WHERE THEY STUDY, 1995/96

Below are the 25 U.S. colleges and universities with the greatest number of foreign students. There are 110 institutions with 1,000 or more foreign students.

Boston U	4,532	Purdue U Main Campus	2,584
New York U	4,242	Texas A&M U	2,572
U of Southern California	4,048	U of Minnesota-Twin Cities	2,548
U of Wisconsin-Madison	3,935	George Washington U	2,545
Ohio State U Main Campus	3,818	U of Maryland College Park	2,544
Columbia U	3,752	U of Houston	2,539
U of Texas at Austin	3,587	Michigan State U	2,521
U of Pennsylvania	3,183	Arizona State U	2,498
Harvard U	3,137	Northeastern U	2,416
U of Michigan-Ann Arbor	3,043	Iowa State U	2,413
U of Illinois Urbana-Champ.	3,038	Brigham Young U	2,357
Cornell U	2,609	Rutgers U	2,325
Stanford U	2,587		

FAST FACTS: Open Doors 1995/96

Primary Source of Funds	Students	%
Personal & Family	307,622	67.8
U.S. College or University	75,056	16.5
Home Govt/University	23,778	5.2
Foreign Private Sponsor	13,296	2.9
Current Employment	10,573	2.3
U.S. Private Sponsor	9,620	2.1
U.S. Government*	4,538	1.0
International Organization	2,859	0.6
Other Sources	6,444	1.4
Total	**452,635**	**100.0**

*Direct funding to students, not including grants to colleges and universities which may also support foreign students.

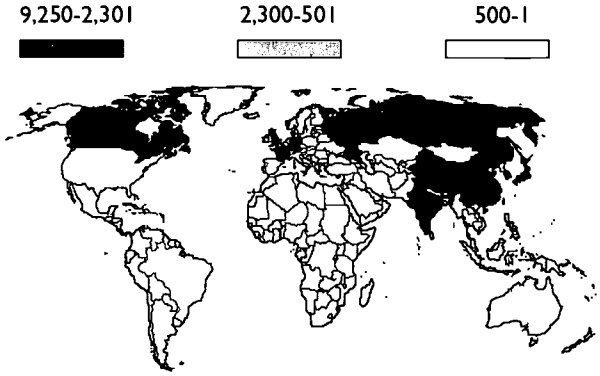
WHAT FOREIGN STUDENTS STUDY, 1995/96

Business and engineering studies remain most popular among foreign students.

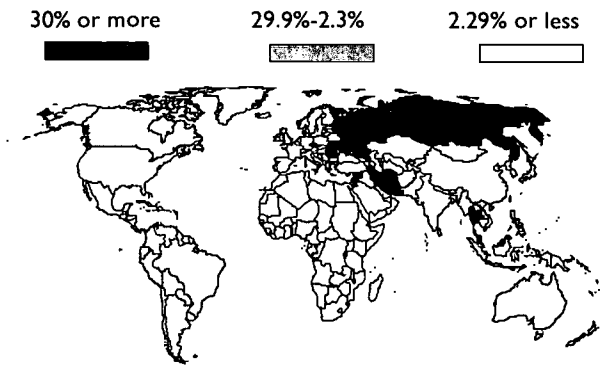
Field of Study	1994/95 Students	1994/95 %	1995/96 Students	1995/96 %	% Change
Business & Management	91,427	20.2	92,632	20.4	1.3
Engineering	72,797	16.1	72,410	16.0	-0.5
Other*	45,720	10.1	42,130	9.3	-8.5
Social Sciences	36,075	8.0	38,242	8.4	5.7
Physical & Life Sciences	36,380	8.0	37,226	8.2	2.3
Math & Computer Sciences	34,937	7.7	35,940	7.9	2.8
Fine & Applied Arts	23,389	5.2	26,749	5.9	12.6
Health Professions	20,728	4.6	20,674	4.6	-0.3
Humanities	16,775	3.7	16,161	3.6	-3.8
Education	14,894	3.3	13,200	2.9	-12.8
Agriculture	8,901	2.0	8,293	1.8	-7.3

*Includes fields such as General Studies, Communications and Law.

COUNTRIES OF ORIGIN OF FOREIGN SCHOLARS (Section 11)



PERCENTAGE CHANGE AMONG COUNTRIES WITH MORE THAN 100 SCHOLARS IN THE UNITED STATES



LEADING PLACES OF ORIGIN OF FOREIGN SCHOLARS (Section 11)

Place of Origin	1994/95	1995/96	% Change
China	9,866	9,228	-6.5
Japan	5,155	5,127	-0.5
Germany	4,369	4,251	-2.7
India	3,912	3,623	-7.4
Korea Rep of	3,163	3,493	10.4
United Kingdom	2,690	2,698	0.3
Russia	1,322	2,432	84.0
Canada	2,498	2,350	-5.9
France	2,410	2,320	-3.7
Italy	1,702	1,584	-6.9
Spain	1,483	1,532	3.3
WORLD TOTAL	**58,074**	**59,403**	**2.3**

MAJOR FIELD OF SPECIALIZATION OF FOREIGN SCHOLARS (Section 11)

Field of Specialization	% 1995/96
Health Sciences	27.6
Physical Sciences	14.3
Engineering	13.4
Life and Biological Sciences	12.8
Social Sciences and History	4.2
Agriculture	3.5
Business Management	2.9
Mathematics	2.8
Computer and Information Sciences	2.7
Foreign Languages and Literature	2.0
All Other Fields	13.5
TOTAL ALL FIELDS	**59,403**

FAST FACTS: Open Doors 1995/96

WHERE U.S. STUDENTS STUDY OVERSEAS

Europe is the destination for approximately two-thirds of U.S. students who study abroad, although this proportion is decreasing slightly.

Host Region	1993/94	1994/95	% Change
Africa	1,477	1,842	24.7
Asia	4,986	5,440	9.1
Europe	51,395	55,289	7.6
Latin America	10,207	11,590	13.5
Middle East	2,174	2,823	29.9
North America	509	590	15.9
Oceana	2,618	3,643	39.2
Multicountry	2,931	3,180	8.5
World Total	**76,302**	**84,403**	**10.6**

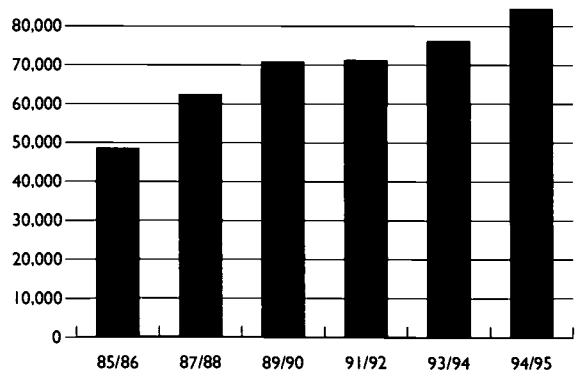
Host Coutries	1993/94	1994/95	%Change
United Kingdom	16,812	19,410	15.5
France	7,919	7,872	-0.6
Spain	6,937	7,473	7.7
Italy	6,410	7,062	10.2
Mexico	4,718	4,715	-0.1
Germany	3,512	3,504	-0.2
Australia	2,360	3,346	41.8
Israel	2,049	2,621	27.9
Costa Rica	1,765	2,302	30.4
Japan	2,229	2,212	-0.8
Austria	2,041	1,489	-27.0
Russia	1,512	1,290	-14.7
China	964	1,257	30.4
World Total	**76,302**	**84,403**	**10.6**

HOST NATIONS FOR U.S. STUDENTS ABROAD, 1994/95

MAJOR FIELD OF STUDY OF U.S. STUDENTS ABROAD

Field of study	1993/94	1994/95	% Change
Social Science & Humanities	28,308	30,879	9.1
Business & Management	10,377	11,415	10.0
Foreign Languages	8,622	8,674	0.6
Fine or Applied Arts	5,875	7,567	28.8
Physical Sciences	4,044	5,712	41.2
Other	5,864	5,392	-8.0
Dual Major	2,747	3,480	26.7
Education	3,052	3,184	4.3
Undeclared	2,756	2,804	1.7
Engineering	1,755	1,881	7.2
Health Sciences	1,297	1,786	37.7
Math or Computer Science	839	1,046	24.7
Agriculture	687	583	-15.1
Total	**76,302**	**84,403**	**10.6**

MORE U.S. STUDENTS GOING ABROAD



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Foreign Student Totals

OVERVIEW

- **The number of foreign students studying in the United States remained nearly unchanged from last year. This year's total of 453,787 is an increase of only 0.3%. This is the smallest growth in foreign student numbers since the early 1970s and continues a six-year trend of decelerating foreign student enrollments.**

- **Again this year, total figures reflect a broad erosion in enrollments from nations which previously had dominated international enrollments. In 1995/96, nine of the leading fifteen places of origin for international students in the United States showed either minimal growth or absolute declines in enrollment.**

- **One measure of the impact international students have on a host country's educational system is the share they hold of the higher education population. While foreign students represent 3.1% of all U.S. higher education enrollments, foreign students are enrolled at greater proportions at higher academic levels. Foreign students represent about 2.5% of all four-year enrollments, 10.1% of graduate enrollments and 33.0% of doctoral degree recipients.**

  Despite the increases in foreign student inflows over the history of the Census, these students' share of the overall U.S. higher education student population increased from only 1.4% in 1954/55 to 3.1% this year. In general, the tremendous growth in the number of Americans attending institutions of higher education during the same period offsets the impact of a growing international population, although percentages of foreign students in some academic fields, especially at the graduate level, are considerable.

To determine what proportion of all undergraduate and graduate students in the United States are foreign students, their numbers were compared to total U.S. enrollments, which were provided by the College Board's 1995/96 Annual Survey of Colleges. This survey determined the total U.S. enrollment in all two-year institutions; all four-year institutions, including doctoral degree-granting and special purpose institutions; and all graduate and first professional degree programs.

The proportion of foreign students at each level was then calculated by comparing the number of foreign students enrolled at each level with the College Board's total enrollment figures.*

- Total two-year enrollment: 5,897,297. Total foreign associate degree enrollment (Section 9): 49,113. Percentage of two-year enrollment: 0.8%.
- Total four-year enrollment: 6,636,443. Total foreign bachelor's enrollment (Section 9): 169,507. Percentage of four-year enrollment: 2.5%.
- Total graduate enrollment: 1,885,512. Total foreign graduate enrollment (Section 9): 190,092. Percentage of graduate enrollment: 10.1%.

* The foreign associate, bachelor's and graduate enrollment figures do not include foreign students who are enrolled in practical training, nondegree or intensive English language programs.

1.0

FOREIGN STUDENT AND TOTAL U.S. ENROLLMENT

Growth in foreign student enrollments have paced increases in U.S. total higher education enrollment.

Year	Foreign Students	Annual % Change[1]	Total Enrollment	% Foreign
1954/55	34,232	_	2,499,800	1.4
1959/60	48,486	2.6	3,402,300	1.4
1964/65	82,045	9.7	5,320,000	1.5
1969/70	134,959	11.2	7,978,400	1.7
1974/75	154,580	2.3	10,321,500	1.5
1979/80	286,343	8.5	11,707,000	2.4
1984/85	342,113	0.9	12,467,700	2.7
1985/86	343,777	0.5	12,387,700	2.8
1986/87	349,609	1.7	12,410,500	2.8
1987/88	356,187	1.9	12,808,487	2.8
1988/89	366,354	2.9	13,322,576	2.7
1989/90	386,851	5.6	13,824,592	2.8
1990/91	407,529	5.3	13,975,408	2.9
1991/92[2]	419,585	3.0	14,360,965	2.9
1992/93	438,618	4.5	14,422,975	3.0
1993/94	449,749	2.5	14,473,106	3.1
1994/95	452,635	0.6	14,554,016	3.1
1995/96	**453,787**	**0.3**	**14,419,252[3]**	**3.1**

[1] Rate of change for accredited institutions. In 1981/82 the number of institutions surveyed decreased due to the elimination from the Census of all institutions that are not listed in the *Higher Educational Directory*, colleges and universities with (a) accreditations, (b) provisional or probationary accreditation or (c) pre-accredited status by a Regional Accrediting Commission.

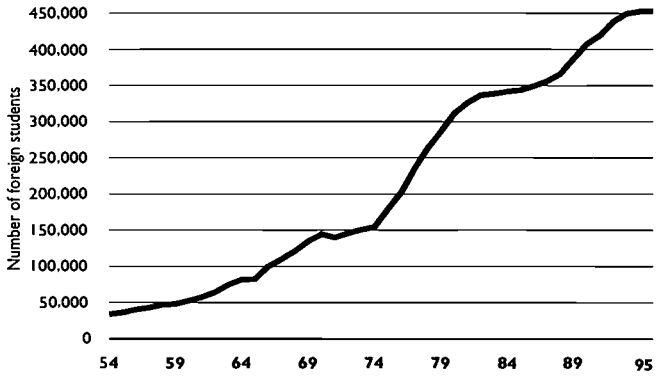
[2] Beginning in 1991/92, the foreign student totals do not include refugees, a category which had been included since 1975/76.

[3] Reported total enrollments from 1954/55 to 1982/83 are from the National Center for Education Statistics, Washington, D.C. The report of total enrollments since 1983 is from the College Board Annual Survey of Colleges Data Base. This year's figure is for fall 1996.

1.a

TRACKING FOREIGN STUDENT FLOW

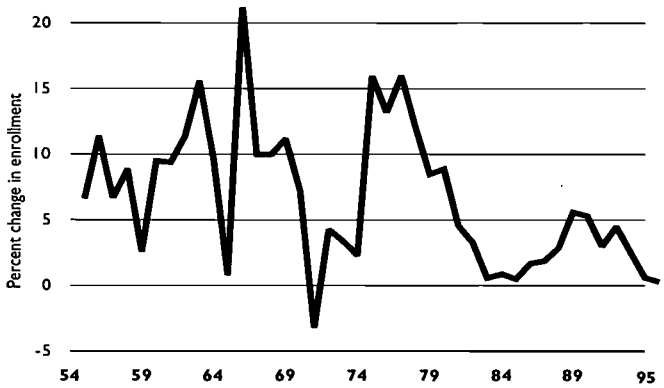
Since the 1950s periods of unsustainable growth have been followed by relatively long periods of minimal growth.



1.b

ERRATIC GROWTH

Annual rates of change have fluctuated widely, increasing as much as 21% in 1966, and declining 3% a few years later. This year's 0.3% increase is comparatively small.



The Architecture of a Plateau

When reading the history of student flows which are written in total numbers and rates of change it is easy to miss the significance of that story. In the present we need some perspective. During the 26 years between 1954 and 1980 only six of those years saw the rate of annual increase fall below 5% per year. In the 15 years since 1980 only two of those years saw increases of greater than 5% in a year. What makes the current pause so profound are the "glory" years between 1975 and 1980. In those five years enrollments doubled, from about 150,000 to over 300,000 enrolled foreign students. The last two years have seen the smallest consecutive annual increases in the history of the census. Prediction is a hazardous occupation but it appears as if this period of minimal change in student flows is likely to continue.

2

REGIONS

Foreign Student Totals by Region

- Since the early 1980s, enrollments from Asia and Western Europe have been the most important sources of growth in the international student population in the United States. This year enrollments from East and South Asia fell, and Western European enrollments remained flat. This continues a trend observed over the past three years.
- Asian students make up over half of the U.S. international student population (57.3%). The new total of 259,893 represents an almost 1% decrease from 1994/95. This year's decline is reflected in either absolute enrollment decreases or in near-level enrollments from many Asian nations that dominated the U.S. foreign student picture for the past 15 years. This continues the pattern of softening enrollments from this region noted over the last two years.
- The number of enrollments from Europe (67,358) represents an increase of 3.9% over last year's figure. This overall increase masks a softening of enrollments from many Western European nations, which are the largest source of enrollments from this region. Enrollments from Eastern Europe are robust and have increased by 13.4% this year.
- Latin American enrollments are level this year with modest increases from South America offsetting declines from Mexico and the Caribbean.
- From the mid-1950s to the mid-1970s, students from the Middle East constituted about one-eighth of the U.S. international student population. The number of Middle Eastern students rose very rapidly in the latter half of the 1970s, mainly due to increased flows from Iran and other OPEC countries, peaking in 1980 at about 29% of all foreign students. Since that time, however, their numbers fell sharply. This year's one percent increase reflects enrollment increases from Turkey, Saudi Arabia, and Kuwait, all significant U.S. allies.
- African enrollments have stabilized after entering a decade-long free-fall since the mid-1980s. This year's regional total reflects both increased student flows from Eastern Africa and declines from elsewhere on the continent.

2.0

FOREIGN STUDENTS BY REGION, 1954/55 - 1995/96

Year	AFRICA Foreign Students	AFRICA % of Total	ASIA Foreign Students	ASIA % of Total	EUROPE Foreign Students	EUROPE % of Total	LATIN AMERICA Foreign Students	LATIN AMERICA % of Total
1954/55	1,234	3.6	10,175	29.7	5,205	15.2	8,446	24.7
1959/60	1,959	4.0	17,808	36.7	6,392	13.2	9,428	19.4
1964/65	6,855	8.4	30,640	37.4	10,108	12.3	13,657	16.6
1969/70	7,607	5.6	51,033	37.8	18,524	13.7	24,991	18.5
1974/75	18,400	11.9	58,460	37.8	13,740	8.9	26,270	17.0
1979/80	36,180	12.6	81,730	28.6	22,570	7.9	42,280	14.8
1984/85	39,520	11.6	143,680	42.0	33,350	9.7	48,560	14.2
1985/86	39,190	9.9	156,830	45.6	34,310	10.0	45,480	13.2
1986/87	31,580	9.1	170,700	48.8	36,140	10.3	43,480	12.4
1987/88	28,450	8.0	180,540	50.7	38,820	10.9	44,550	12.5
1988/89	26,430	7.2	191,430	52.2	42,770	11.7	45,030	12.3
1989/90	24,570	6.4	208,110	53.8	46,040	11.9	48,090	12.4
1990/91	23,800	5.9	229,830	56.4	49,640	12.2	47,580	11.8
1991/92	21,890	5.2	245,810	58.7	53,710	12.8	43,200	10.4
1992/93	20,520	4.7	260,670	59.4	58,010	13.2	43,250	9.9
1993/94	20,570	4.6	264,690	58.9	62,440	13.9	45,240	10.1
1994/95	20,724	4.6	261,789	57.8	64,811	14.3	47,239	10.4
1995/96	**20,844**	**4.6**	**259,893**	**57.3**	**67,358**	**14.8**	**47,253**	**10.4**

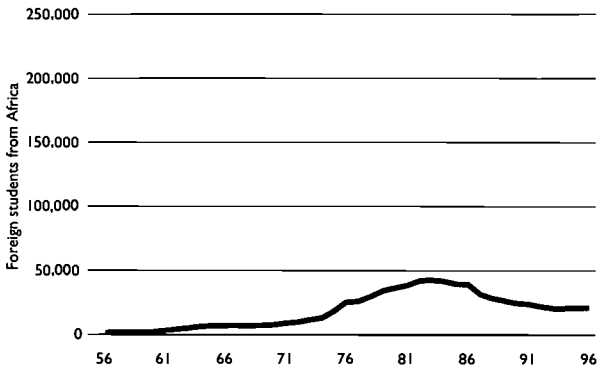
Year	MIDDLE EAST Foreign Students	MIDDLE EAST % of Total	NORTH AMERICA Foreign Students	NORTH AMERICA % of Total	OCEANIA Foreign Students	OCEANIA % of Total	WORLD TOTAL[1]
1954/55	4,079	11.9	4,714	13.8	337	1.0	34,232
1959/60	6,477	13.4	5,761	11.9	568	1.2	48,486
1964/65	9,977	12.1	9,338	11.4	1,265	1.5	82,045
1969/70	13,278	9.9	13,415	9.9	2,077	1.5	134,959
1974/75	23,910	15.5	8,630	5.6	2,650	1.7	154,580
1979/80	83,700	29.2	15,570	5.4	4,140	1.4	286,340
1984/85	56,580	16.5	15,960	4.7	4,190	1.2	342,110
1985/86	52,720	15.3	16,030	4.7	4,030	1.2	343,780
1986/87	47,000	13.4	16,300	4.7	4,230	1.2	349,610
1987/88	43,630	12.2	16,360	4.6	3,620	1.0	356,190
1988/89	40,200	11.0	16,730	4.6	3,610	1.0	366,350
1989/90	37,330	9.7	18,590	4.8	4,010	1.0	386,850
1990/91	33,420	8.1	18,950	4.6	4,230	1.0	407,530
1991/92	31,210	7.3	19,780	4.7	3,870	0.9	419,590
1992/93	30,240	6.9	21,550	4.9	4,300	1.0	438,620
1993/94	29,510	6.6	23,290	5.2	3,860	0.9	449,750
1994/95	30,246	6.7	23,394	5.2	4,327	1.0	452,635
1995/95	**30,563**	**6.7**	**23,644**	**5.2**	**4,202**	**0.9**	**453,787**

[1] Includes students classified as stateless or of unknown origin.

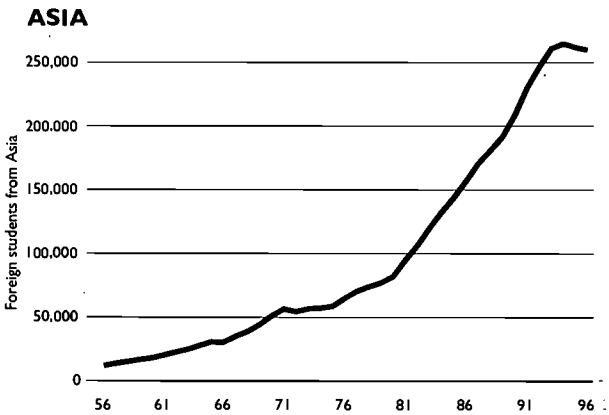
2.a

HOW THE REGIONS COMPARE IN STUDENT FLOWS TO THE UNITED STATES, 1955/56 - 1995/96

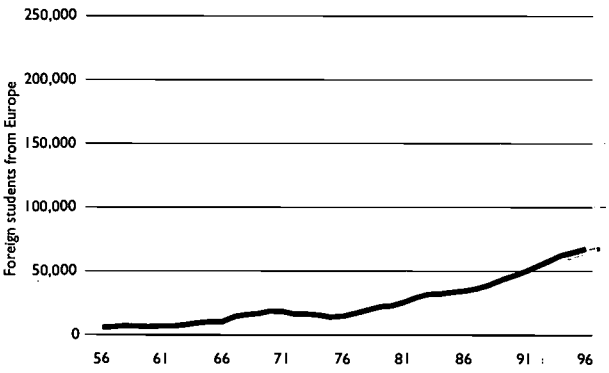
AFRICA



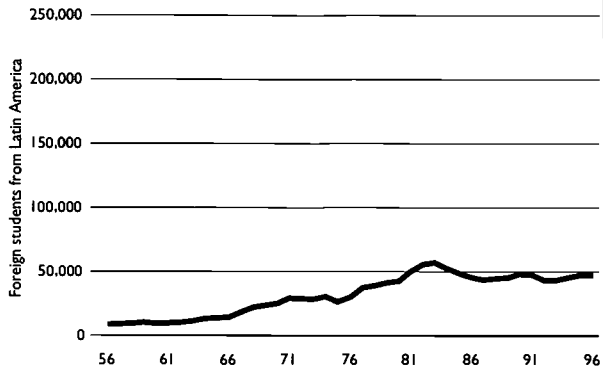
ASIA



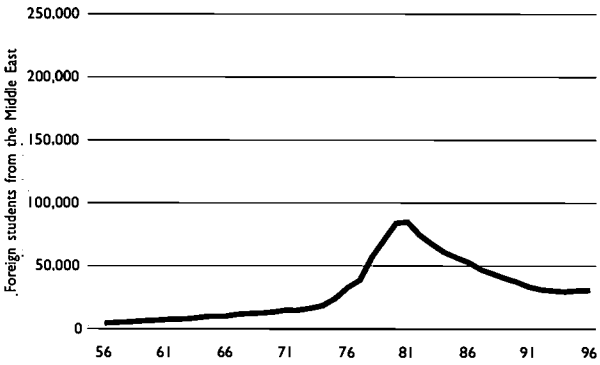
EUROPE



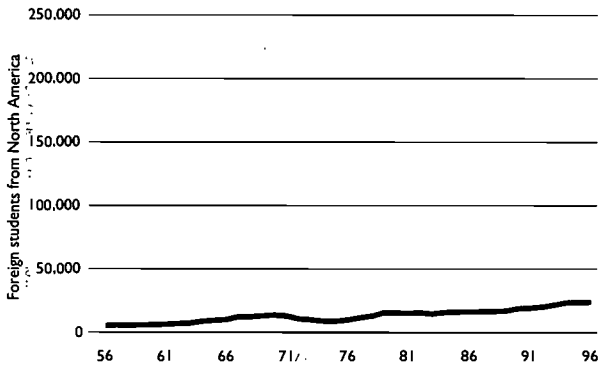
LATIN AMERICA



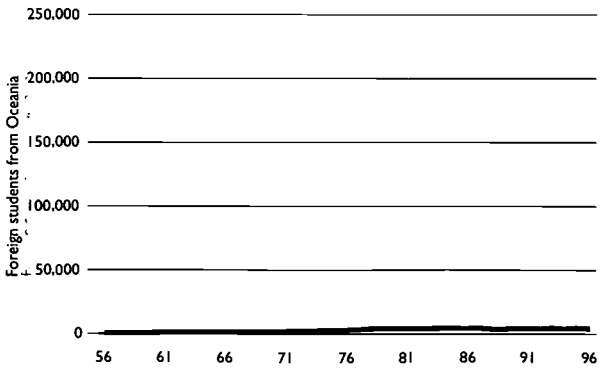
MIDDLE EAST



NORTH AMERICA



OCEANIA



AFRICA

- The number of Africans studying in this country reached a total of 20,844. Africans account for about 4.6% of the foreign students in the United States, the lowest share held by any regional group other than Oceania. At their peak in the early 1980s, African enrollments accounted for nearly 13% of the total, a figure comparable to the share currently held by Europeans.
- Most of the African students in the United States come from nations in East Africa (7,596 or 36%), while a slightly smaller number originates in West African countries (5,818 or 28%). North African students make up one-sixth of all African students (3,422 or 16%). Fewer students come from Southern African (2,657 or 13%) and Central African (1,346 or 6%) countries.
- Of all the African countries, Kenya sends the most (2,934), followed by Nigeria (2,093), South Africa (1,888) and Egypt (1,490).
- African enrollments in this country peaked in the early 1980s, when an influx of students (mainly Nigerians who came during the oil boom of the late 1970s and early 1980s) doubled the total in just ten years. This trend was quickly reversed during the late 1980s and early 1990s, when African enrollments plummeted to half the level of the mid-1980s.

2.1

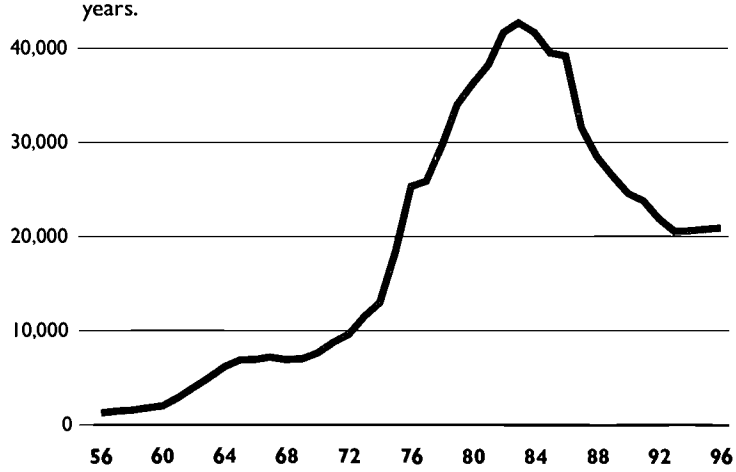
FOREIGN STUDENT TOTALS BY REGION AND SUBREGION, 1995/96

Locality	Number	Region %	World %
AFRICA	**20,844**		**4.6**
Eastern Africa	7,596	36.4	
Central Africa	1,346	6.5	
North Africa	3,422	16.4	
Southern Africa	2,657	12.7	
Western Africa	5,818	27.9	
ASIA	**259,893**		**57.3**
East Asia	166,717	64.1	
South & Central Asia	45,401	17.5	
Southeast Asia	47,774	18.4	
EUROPE	**67,358**		**14.8**
Eastern Europe	18,032	26.8	
Western Europe	49,326	73.2	
LATIN AMERICA	**47,253**		**10.4**
Caribbean	10,737	22.7	
Central America/Mexico	14,220	30.1	
South America	22,296	47.2	
MIDDLE EAST	**30,563**		**6.7**
NORTH AMERICA	**23,644**		**5.2**
OCEANIA	**4,202**		**0.9**
WORLD TOTAL	**453,787**		**100.0**

2.b

TRENDS IN AFRICAN ENROLLMENTS SINCE 1956

The sharp rise and subsequent decline of students from Nigeria helped to shape the spike in African enrollments in the last 30 years.

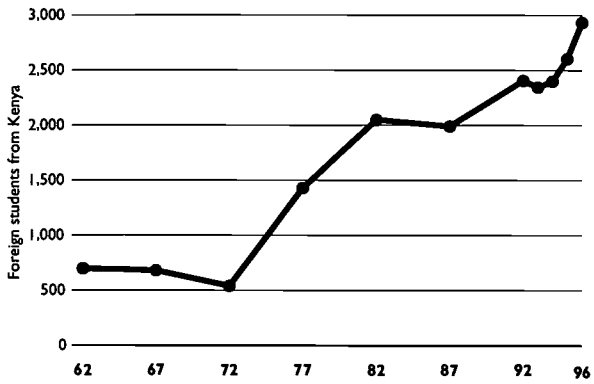


2.c

DRIVING THE TRENDS: AFRICA'S LEADING SENDERS

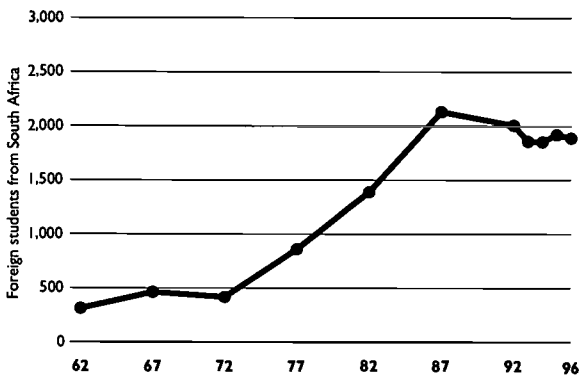
Leading African countries have seen dramatic increases and collapse in student flows. Recent flows from these nations, while very small, have stabilized.

KENYA

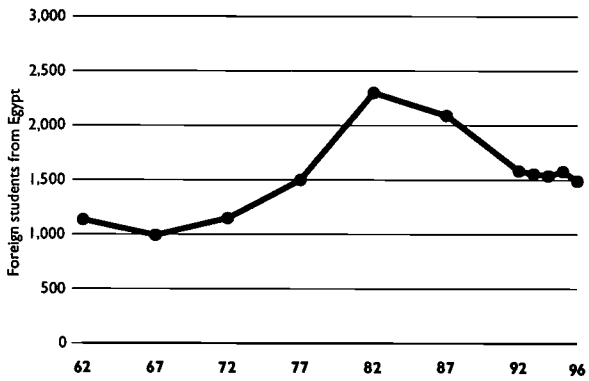


NIGERIA

SOUTH AFRICA



EGYPT



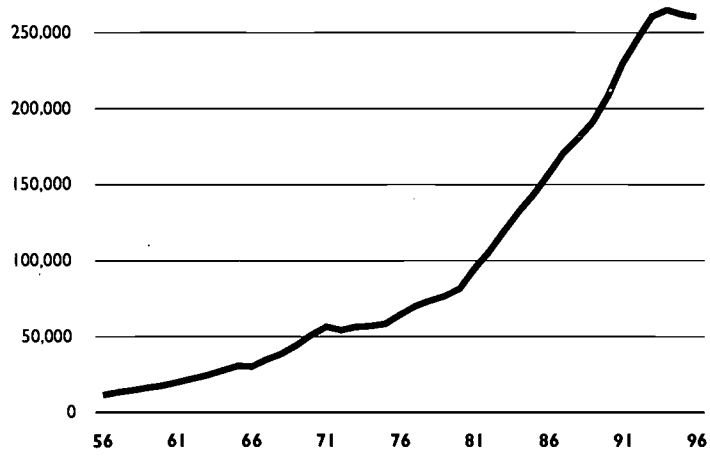
ASIA

- For the second year in a row, the number of Asian students coming to this country for study actually declined. This year Asian enrollments were down 1% to 259,893.
- Asians still comprise over half (57.3%) of the international student population in the United States. Asians have consistently outnumbered students from other regions throughout the history of the Census, but in the 1970s and 1980s their rate of growth increased dramatically. By 1992 the U.S. international student population was approximately 60% Asian.
- Of the three subregions within Asia, only Southeast Asian countries averaged any increase in enrollments this year. East Asian enrollments fell, due to a decline in student enrollments from Taiwan and Hong Kong, as did South and Central Asian enrollments, with fewer students coming from India, Pakistan, Bangladesh and Sri Lanka. Enrollments from the Republic of Korea increased this year by 8%. Increases in the number of students from Thailand, Indonesia and Malaysia helped push Southeast Asian enrollments up by 4%.
- The Asian places of origin with the most students in the United States are Japan (the leading country worldwide with 45,531 students), China (39,613), the Republic of Korea (36,231) and Taiwan (32,702).

2.d

TRENDS IN ASIAN ENROLLMENTS SINCE 1956

While the number of students from Asia is still very large, Asian enrollments have actually declined for the last two years.

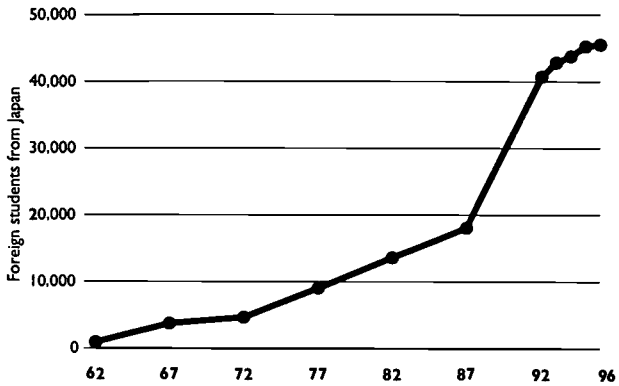


2.e

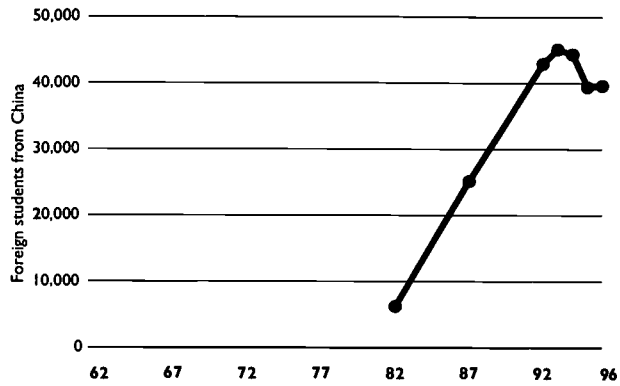
DRIVING THE TRENDS: ASIA'S LEADING SENDERS

This diverse group of Asian senders shows both dramatic drop offs in enrollment rates and, in the case of Korea, robust continued growth in enrollment.

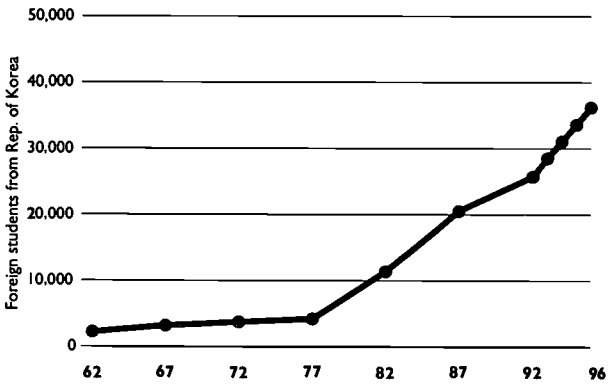
JAPAN



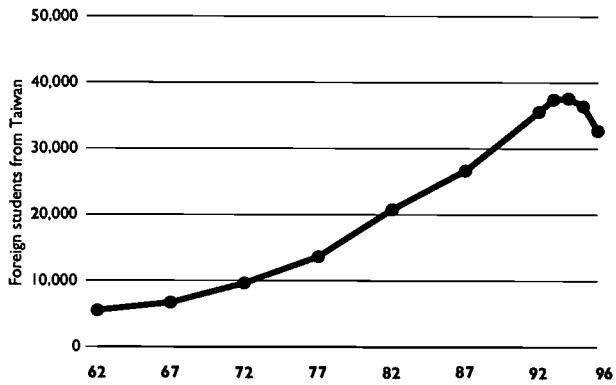
CHINA



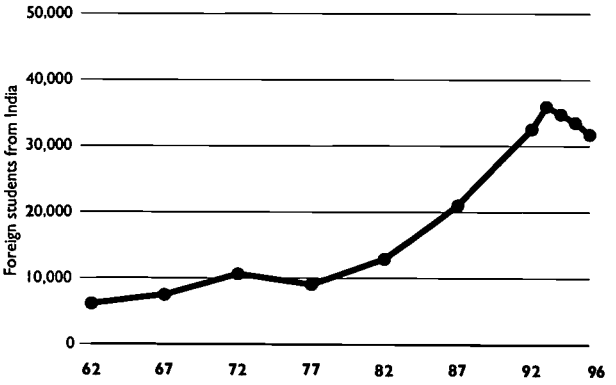
KOREA



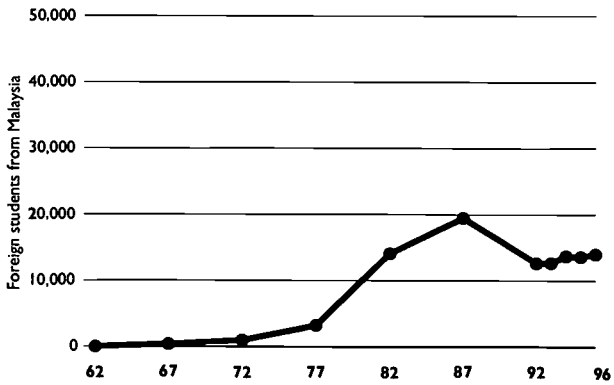
TAIWAN



INDIA



MALAYSIA



International Education: Australia's Potential Demand & Supply

DENIS BLIGHT
IDP Education Australia

IT is predicted that between the years 1995 and 2010, Asia's population will produce a demand for an additional 800,000 international university places, and an additional 1.5 million places will be created in the following 15 years. For many of these international students, Australia will be the destination of choice. In 1995, IDP Education Australia looked at 25 countries as existing or potential markets for Australian higher education. When determining priorities in the marketing of Australian education overseas, Australia needs to look at both developed and developing markets. Australia needs to retain market share in key source countries such as Hong Kong, Malaysia, Singapore and Indonesia. It also needs to look for opportunities to increase market share in those areas where its present share is low, and where the market is expected to grow rapidly over the next 15 years. China, India, Indonesia, Taiwan, Thailand, Malaysia and South Korea, already among Australia's top ten developed markets, are also among the top ten still developing markets.

Australia's share as host of the global flow of students has increased steadily from 1.6% in 1985 to 2.4% in 1990 and to 2.9% in 1992. With 46,400 international students in universities in 1994, Australia's share was an estimated 3.3%. Australia's use of the English language provides a competitive advantage. With students from Asia seeking to learn in English, the English language provides Australia with advantages over Asian countries, over traditional destinations such as Germany and France, and over the countries of the former Soviet Union, which was a very large exporter of education in the 1980s. In terms of English-speaking destination countries, Australia's competitors are the United States, the United Kingdom, Canada and, to a lesser extent, New Zealand. Into the 21st century, the United States and Australia will be the important English speaking destination countries.

The United States, because of its reputation and size as well as its ability to accept very large numbers of students, will remain the most important destination country. It will be to Australia's advantage that much of the

growth in international enrollments will be from Asia. That region's share of international enrollments is forecast to increase from 45% in 1992 to 47% in the year 2000 and 53% in 2010. For students from Asia, Australia is close, and it is in the same time zone. As the use of new technology grows, the fact that Australia is located in the same time zone as Asia will become increasingly important. Australia also is a pleasant and safe place in which to live for one or more years. Australia, because of its advantages, its quality, its internationalization, its commitment to Asia and its focus in marketing international education, will become increasingly important as a destination for international students.

Australia can expect to be host to 5% of the world's international students by the year 2000 and 7.5% by the year 2010. In terms of universities alone, at 5% Australia would have 89,000 students in 2000 and, at 7.5%, 206,000 students in 2010. There are three assumptions behind these projections of Australia's capacity to access a growing share of world demand.

First, Australia must rebuild its confidence in China as a source of international students. Canberra must be confident about students from China if Australia is to build a substantial share of this massive market. Second, Australia must continue to increase its penetration of the market in India. UNESCO figures for 1992 suggest that only 1% of India's international students were in Australia. With a jump of 58% from 1993 to 1994 in the number of students from India, Australia's market share already is increasing. Third, Australia must continue to improve its image in Asia as a world-class provider of high quality international education. Australia's universities, and other education sectors, face a challenge in supplying places for 200,000 international students 15 years from now. Australia's strategy toward international students may need to switch from stimulating demand to increasing supply.

Abstracted from a research report presented to the 1995 International Education Conference by IDP Education Australia. Copies of the full report may be obtained directly from IDP Education Australia, Canberra, Australia.

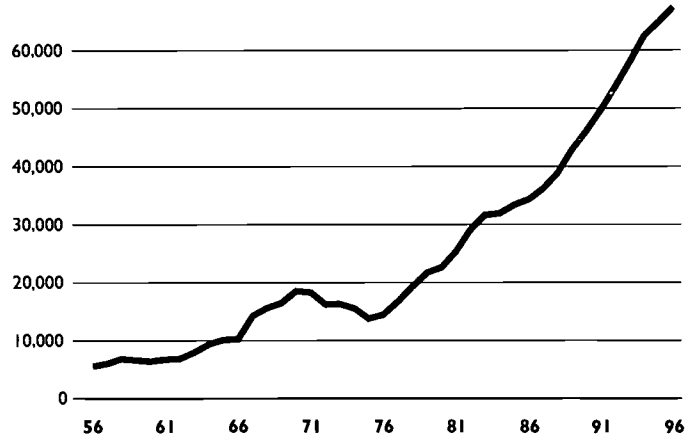
EUROPE

- The number of European students studying in the United States is now 67,358, and Europeans continue to be the second largest regional group after Asians. This year Europeans make up 15% of all of the international students in the United States.
- For the past five years, annual growth in European enrollments has averaged around 8%. This year, however, due to a flattening in the number of students coming from Western Europe (up less than 1% to 49,326), the growth rate has slowed to less than 4%. What growth there is in European enrollments is primarily due to increased numbers of students coming from Eastern Europe. Since the end of the Cold War, the enrollment rates of the Newly Independent States of the former Soviet Union, as well as those of Eastern Europe, have increased dramatically (more than tripling since 1990). The absolute number of students from these nations has risen from 4,780 just five years ago to 18,032 today.
- After growing relatively slowly in the 1950s and 1960s, the rate of enrollments from Western Europe began to accelerate in the mid-1970s. Last year the number of Western Europeans was 48,905. This year that number is 49,326.
- Most European students in the United States originate from Germany (9,017 students), the United Kingdom (7,799), France (5,710), and Russia (5,589).

2.f

TRENDS IN EUROPEAN ENROLLMENTS SINCE 1956

After Asia, Europe has been one of the most important sources of growth in the U.S. international student population. Current growth is primarily from Eastern Europe.

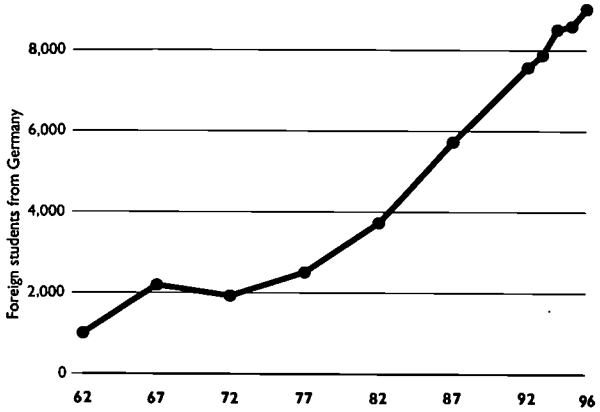


2.g

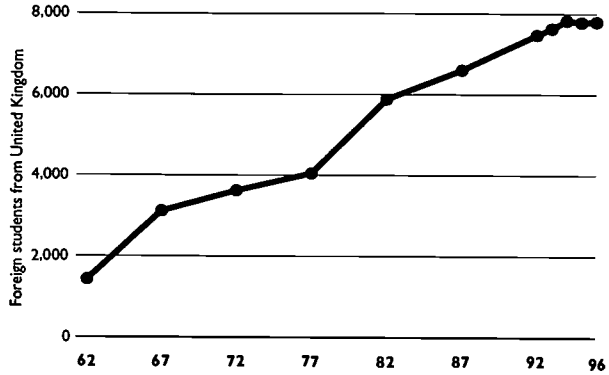
DRIVING THE TRENDS: EUROPE'S LEADING SENDERS

Enrollment growth from Eastern Europe, especially Russia, has been extraordinary. Many Western European countries actually had fewer students studying in the United States. Of the leading countries, Germany continues to show a strong increase in the number of students studying here.

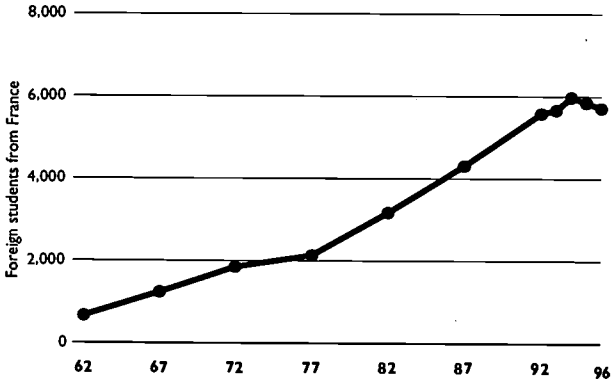
GERMANY



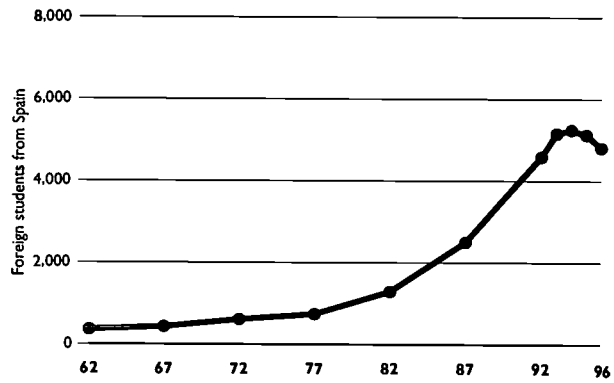
UNITED KINGDOM



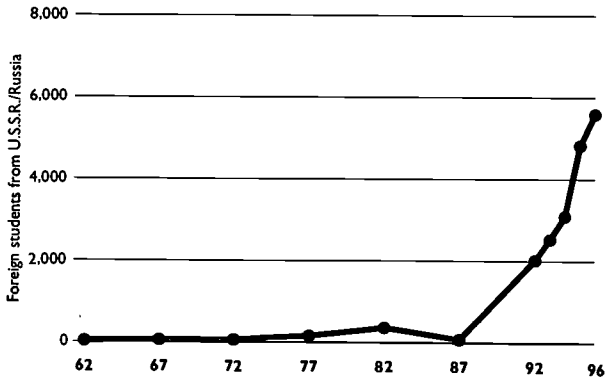
FRANCE



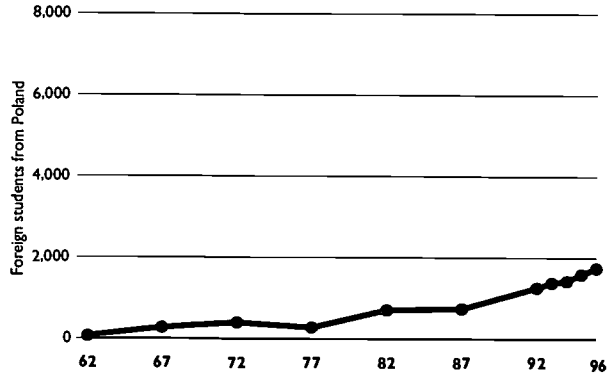
SPAIN



RUSSIA



POLAND



The Russians Are Coming, and the East Europeans, Too

YALE RICHMOND
Washington, D.C.

THE Russians are coming, as well as the Ukrainians, Czechs, Armenians, Estonians, and other students from Eastern Europe and the former Soviet Union. Since the collapse of communism and the breakup of the Soviet Union, the numbers of students in the United States from these countries has increased dramatically. How so?

The fall of communist regimes and their replacement by democratically elected governments has opened new opportunities for study abroad. Previously, quotas for exchange scholarships imposed by the communist governments severely limited opportunities for international education. Exchange opportunities were not publicized, and nominations for students and scholars were made by government agencies rather than through open competitions. Related to quotas were the priorities in exchanges given by the communist governments to studies in science and technology. Finally, in most countries of the region, political reliability—allegiance, or at least non-opposition, to the communist regime was a litmus test universally applied for selection of students and issuance of passports for travel abroad.

Today, a new situation prevails. Opportunities for study abroad are publicized, and selection, in most cases, is made through open competitions. Priority is no longer given to science and technology, and applications have increased greatly in the social sciences and humanities, law, business, and public administration. Moreover, students are now able to receive passports without reference to their political affiliation and some are able to fund, at least partially, the cost of their study abroad. For the latter, many students now have their study abroad paid by families and friends in the host countries. In addition, in recent years new funding for study abroad has been provided by the U.S. government through its Support for East

The Russians Are Coming, and the East Europeans, Too

European Democracy Act and the Freedom Support Act. Private foundations, universities, and colleges have also given support.

Statistics on the numbers of students in the United States from Eastern Europe support the argument that the heavy hand of authoritarian governments did indeed limit the number of exchange opportunities in the past. The largest percentage increases are from those countries where hard-line communist governments maintained the strongest control over study in the West—the Czech Republic and Slovakia, Russia, Ukraine, the Baltic States and other former republics of the Soviet Union. The smallest percentage increases are seen in Poland and Hungary, countries whose communist regimes had less restrictive policies for travel and study abroad. The numbers of students from these two countries remain relatively high, as they have over the past 20 or more years.

This recalls a conversation I had with a high Russian official in the late 1980s when the winds of detente were stirring the Soviet Union. I argued with him that Russia could increase its academic exchanges by ending quota and loosening its controls over foreign travel. "But how will we guarantee that there will be scholarships abroad for our students?" he remonstrated. What the future will bring remains problematic in light of the reduced funding for Fulbright and other exchange programs by a budget-minded Congress. But now that political barriers with Eastern Europe and the former Soviet Union have fallen, exchange opportunities with these countries can be expected to continue their process of normalization.

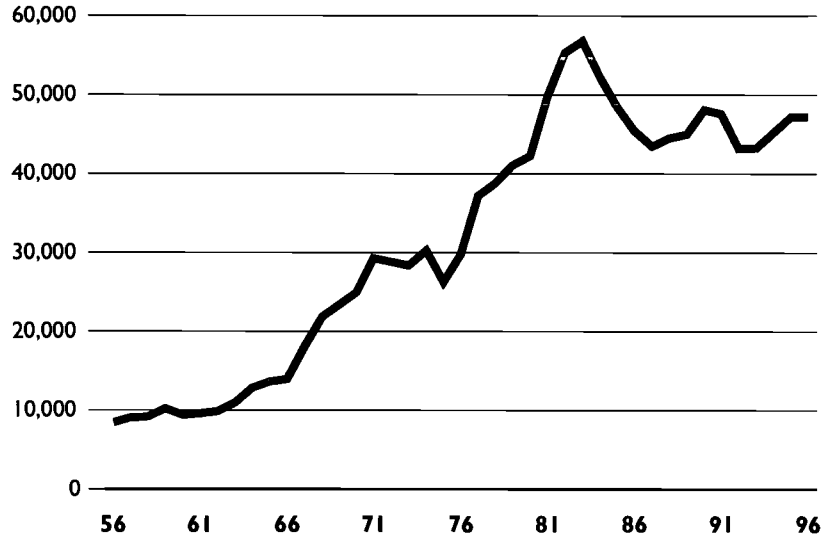
Yale Richmond, a retired foreign service officer who specialized in academic and cultural exchanges, is the author of From Nyet to Da: Understanding the Russians *and* From Da to Yes: Understanding the East Europeans, *from Intercultural Press.*

LATIN AMERICA

- After sharp declines in the earlier part of this decade, Latin American enrollments are flat this year following two consecutive years of growth. This year's total is 47,253. Latin Americans make up 10% of the total foreign student population and are the third largest group after Asians and Europeans. In the 1960s and early 1970s Latin Americans were the second largest group, but they were quickly displaced by an influx of Middle Eastern students in the late 1970s and again by Europeans in the 1990s.
- The number of students from Mexico fell by 3.5% to 8,687. Those from the Bahamas also fell (down 10% to 1,666) while Venezuela (up 9% to 4,456) and Brazil (up 9.6% to 5,497) showed increases.
- Mexico (8,687 students), Brazil (5,497), Venezuela (4,456), Colombia (3,462) and Jamaica (2,943) are the leading countries of origin for Latin American students coming to the United States.

2.b

TRENDS IN LATIN AMERICAN ENROLLMENTS SINCE 1956
Strong enrollments from Veneuela in the late 1970s spiked the overall Latin American numbers. Since then the number of students from this region have fallen and now remain relatively flat.

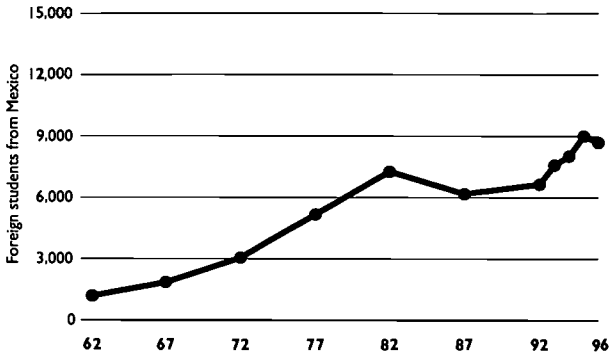


2.i

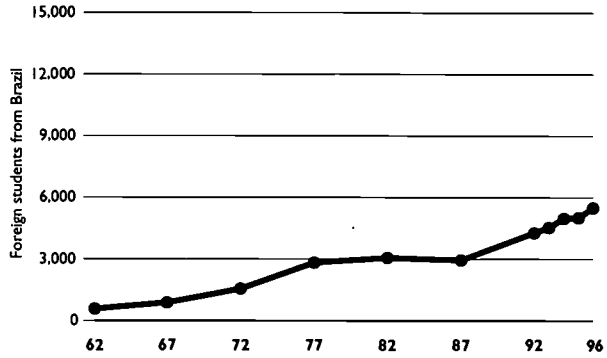
DRIVING THE TRENDS: LATIN AMERICA'S LEADING SENDERS

While the number of students from the leading South American nations has increased, the number of students from Mexico, our NAFTA partner, have not kept pace.

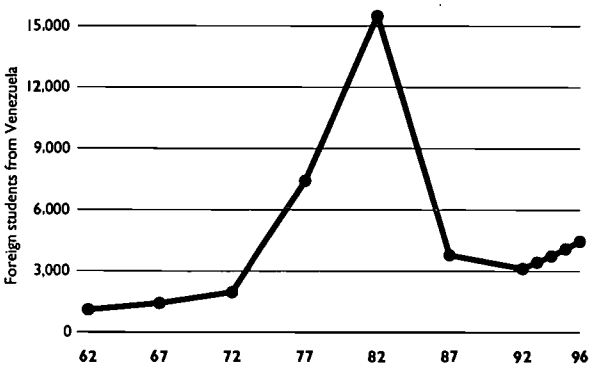
MEXICO



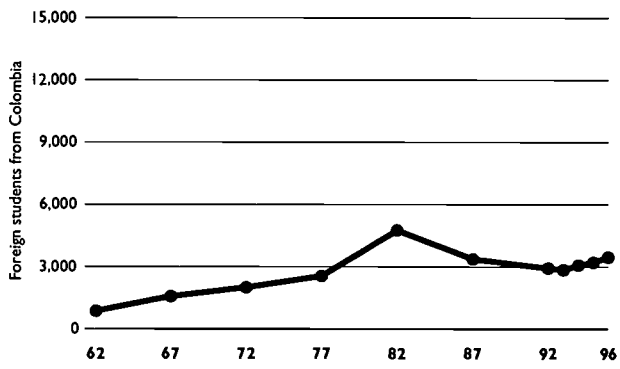
BRAZIL



VENEZUELA



COLOMBIA



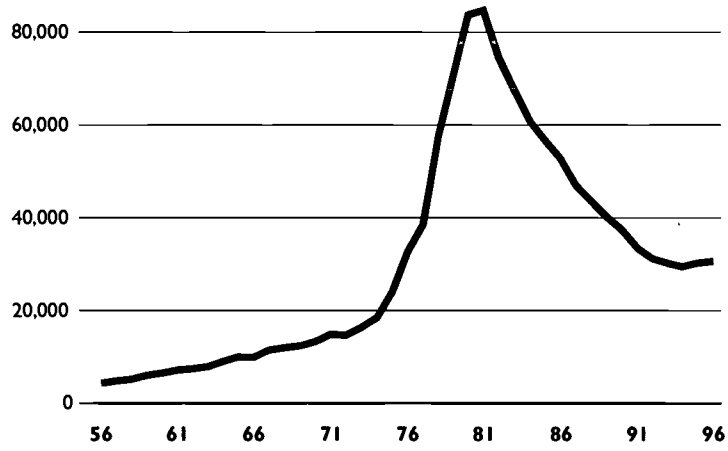
MIDDLE EAST

- This year for the second year in a row Middle Eastern student enrollments are up, reversing a downward trend of nearly 15 years. The Middle Eastern total is 30,536, a 1% increase over 1994/95. Middle Easterners, who make up 7% of the international students in the United States, are the fourth largest regional group after Asians, Europeans and Latin Americans.
- Students from Turkey are the fastest growing group of students coming to the United States from this region. Turkish students now number 7,678 and increased at a rate of 14% this year. Student enrollments from Saudi Arabia are also increasing (up 2.8% to 4,191) as are those coming from Kuwait (up 6.7% to 3,035) and the United Arab Emirates (up 7.8% to 2,233).
- Between 1975 and 1980 the number of students from the Middle East (predominantly from Iran and other OPEC countries) increased by over 200%, rising from almost 24,000 in 1975 to about 84,000 five years later. Since that time, their numbers have fallen by more than half.
- Historically, enrollment trends in this region have been driven by the percentage of students from Iran. In 1980 there were 51,310 students from Iran studying in the United States (the highest total sent by any country in the history of the Census); today that number is less than 3,000. Despite declining numbers, Iran was the leading Middle Eastern country of origin until last year, when its student total was surpassed by the rapid growth in the number of students from Turkey.

2.j

TRENDS IN MIDDLE EASTERN ENROLLMENTS SINCE 1956

Between 1975 and 1980 the number of students from Iran and other OPEC countries increased dramatically, sending overall Middle Eastern numbers up. In recent years flows from Turkey have increased notably.

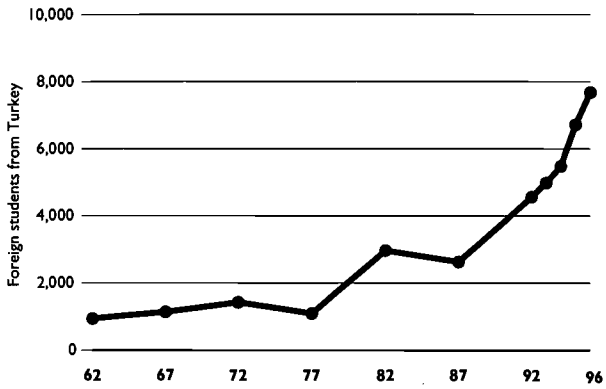


2.k

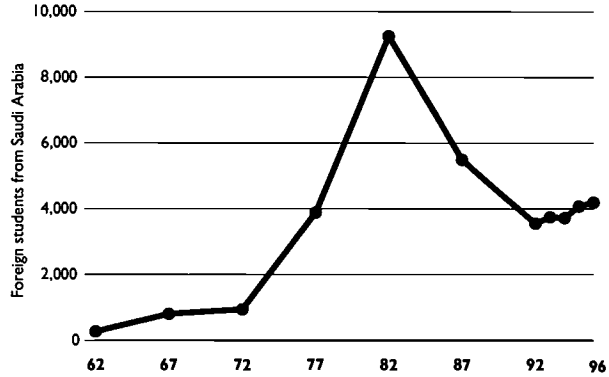
DRIVING THE TRENDS: THE MIDDLE EAST'S LEADING SENDERS

In addition to the quickly rising numbers from Turkey, more students from the United State's Gulf War allies, Saudi Arabia and Kuwait, are also here for study.

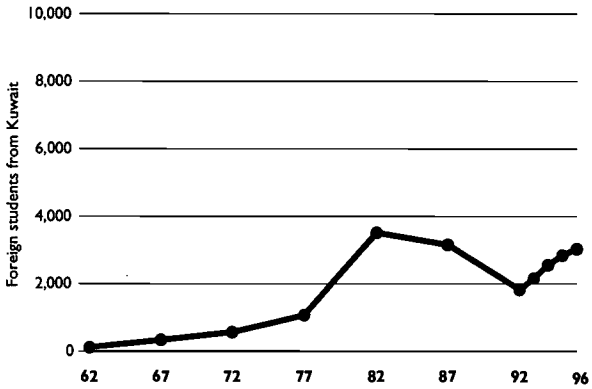
TURKEY



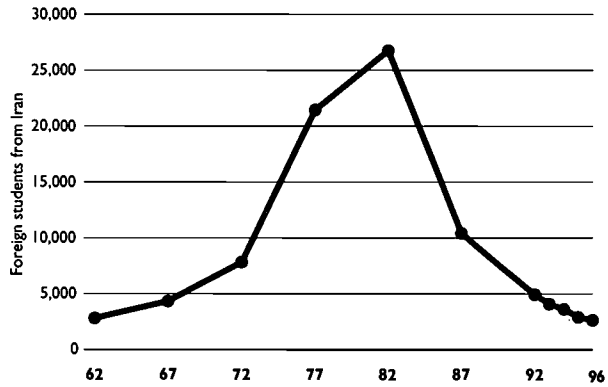
SAUDI ARABIA



KUWAIT



IRAN



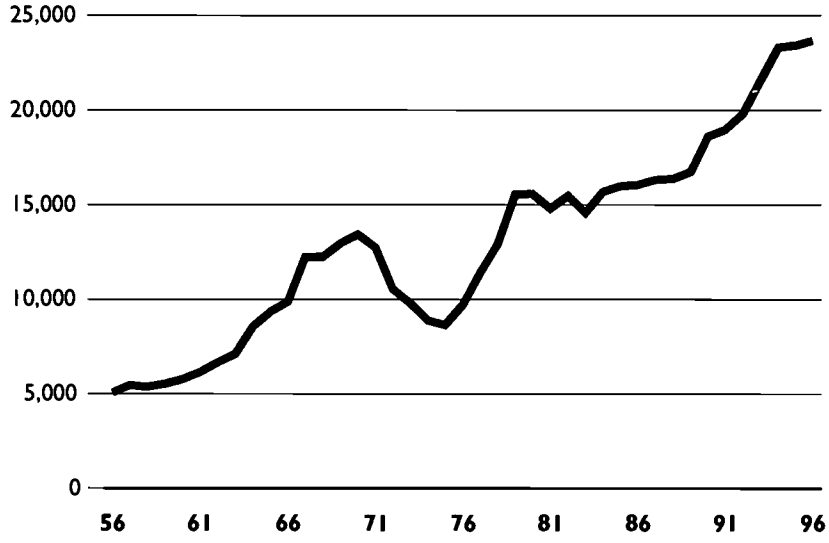
NORTH AMERICA AND OCEANIA

- North American (mainly Canadian) enrollments in the United States have remained essentially level this year. North American students from Canada and Bermuda make up 5.2% of the U.S. international student population, a greater share than is held by either Africa or Oceania. Canadian enrollments are up 1.1% to 23,005. Canada continues to rank sixth among the nations with the most students in the United States, the only non-Asian nation in the top ten.
- Oceanian students (from Australia, New Zealand, the Federated States of Micronesia and other Pacific Islands) comprise the smallest regional group. Their enrollment in U.S. institutions of higher education totals 4,202 this year, down 2.9% from 1994/95. The rise in the number of students from New Zealand was offset by declines from other nations in the region. This decrease parallels the general softening of enrollments from Asia.

2.l

TRENDS IN NORTH AMERICAN ENROLLMENTS SINCE 1956

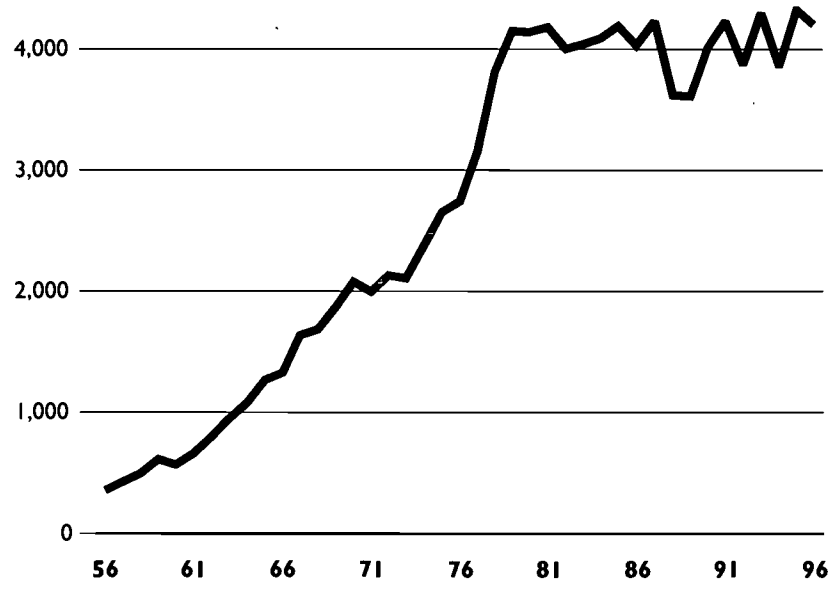
There have been more considerable ups and downs in the flow of students from North America, overwhelmingly Canadian since 1955. Following a period of strong growth in the early 1990s, enrollments from this region (Canada) have plateaued recently.



2.m

TRENDS IN OCEANIAN ENROLLMENTS SINCE 1956

Enrollments from this region peaked in the 1980s and since then have fluctuated moderately. About half of all enrollments from this region are from Australia.



3

Foreign Student Enrollments by Country of Origin

COUNTRIES

- Japan is the leading country of origin for foreign students studying in the United States again this year. Japan's modest rate of increase of less than 1% continues a three year trend of slow growth and is far smaller than that seen over the past decade. The most significant growth sources in Asia for U.S.-bound students–the Republic of Korea and the South East Asian nations of Thailand and Indonesia–all showed increases in their rates of U.S. enrollments this year. This year Korea surpassed Taiwan in student enrollments, becoming the third largest source of U.S.–bound students. China, Taiwan, Hong Kong, India, Pakistan, Sri Lanka, Singapore, Malaysia and the Philippines all showed level or declining enrollments.

- Enrollment trends from many of the leading countries within Western Europe are mixed this year. The United Kingdom, France, Spain and Greece had level or fewer students in the United States while there was a 4.9% increase in German enrollments. Unlike numbers from Western Europe, those from Eastern European countries are uniformly up. The number of students from Russia has increased sharply, as have enrollments from Poland, Romania and Bulgaria. The number of students from most of the other countries within the region is up with percentage increases by country above 10%.

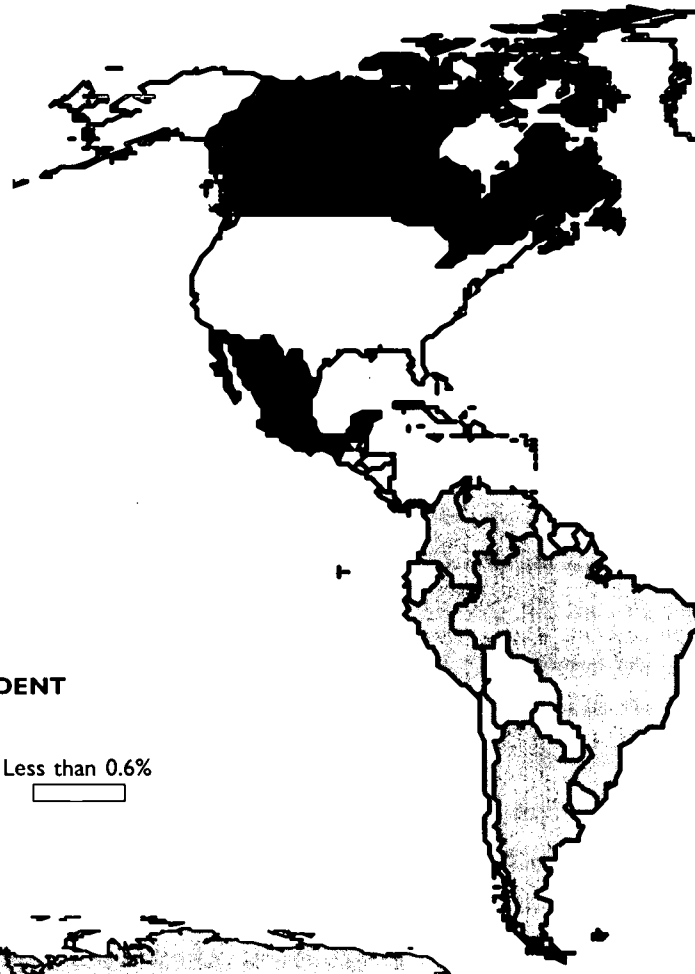
- Enrollments of students from the Middle Eastern countries which had shown increases last year are generally off, with the exceptions of Turkey, Saudi Arabia and Kuwait. Increases noted for these countries, however, are all smaller than those seen last year. It appears likely that the increase in student enrollments from this region noted last year will not be sustained in the future.

- **Since the signing of the North American Free Trade Agreement (NAFTA), the number of Mexican students studying in the United States has grown; however, this year the number of students from Mexico fell by 3.5%. While there have been increases in enrollments from South American countries, the numbers have not been large. The number of students from Canada, the other signer of NAFTA, has increased 8% over the same period of time; this year, as last, however, enrollments from Canada are stable. Collectively, Canada and Mexico account for about 45% of foreign student enrollments from the Western Hemisphere.**

3.a

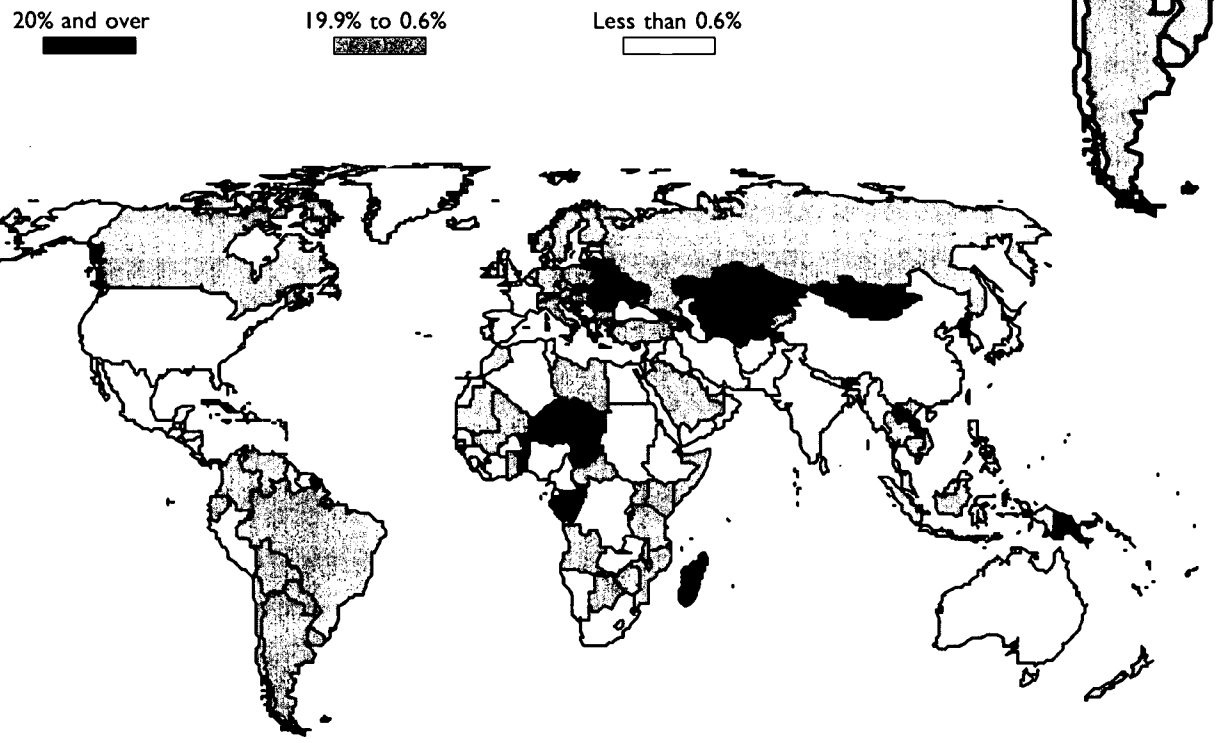
COUNTRIES OF ORIGIN, 1995/96

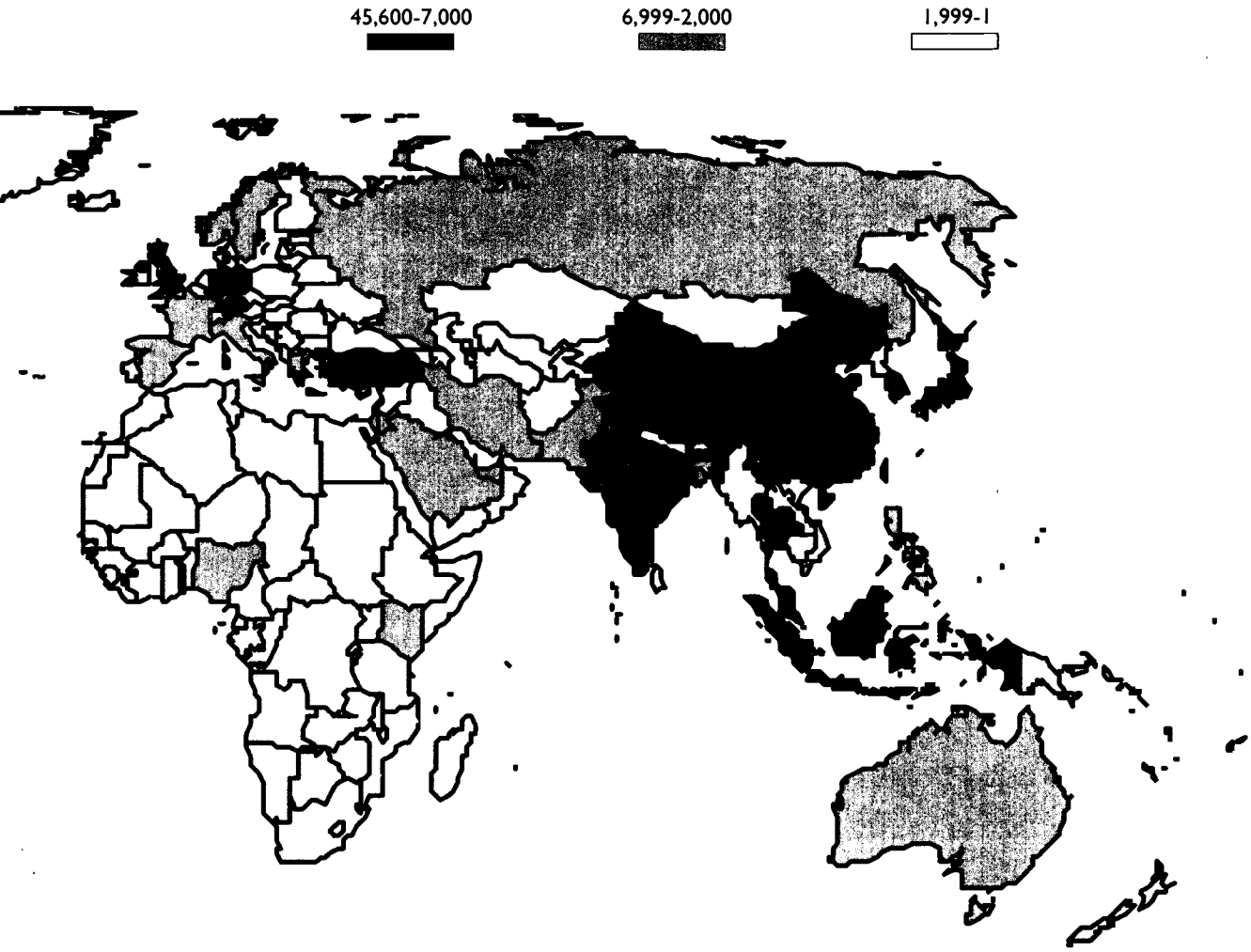
Ten of the top 15 countries of origin are in Asia. Those which are not–Canada, Mexico, Germany, the United Kingdom and Turkey–are spread throughout the globe.



3.b

PERCENTAGE CHANGE IN FOREIGN STUDENT ENROLLMENT, 1994/95 - 1995/96





3.0

FOREIGN STUDENT TOTALS BY PLACE OF ORIGIN, 1994/95 & 1995/96

Place of Origin	1994/95	1995/96	% Change
■ AFRICA	**20,724**	**20,844**	**0.6**
Eastern Africa	**7,139**	**7,596**	**6.4**
Kenya	2,603	2,934	12.7
Ethiopia	1,325	1,328	0.2
Tanzania	704	757	7.5
Zimbabwe	687	742	8.0
Uganda	559	580	3.8
Zambia	354	354	0.0
Malawi	239	260	8.8
Mauritius	222	182	-18.0
Madagascar	77	98	27.3
Somalia	91	98	7.7
Mozambique	78	79	1.3
Burundi	68	64	-5.9
Rwanda	72	55	-23.6
Eritrea	17	26	52.9
Seychelles	18	13	-27.8
Djibouti	18	12	-33.3
Comoros	7	11	57.1
Reunion Island	0	1	-
Eastern Africa, Unspec.	0	2	-
Central Africa	**1,430**	**1,346**	**-5.9**
Cameroon	758	664	-12.4
Zaire	370	316	-14.6
Angola	136	144	5.9
Gabon	67	90	34.3
Congo	22	43	95.5
Chad	25	34	36.0
Central African Republic	22	26	18.2
Equatorial Guinea	16	14	-12.5
Sao Tome & Principe	11	13	18.2
Central Africa, Unspecified	3	2	-33.3
North Africa	**3,522**	**3,422**	**-2.8**
Egypt	1,577	1,490	-5.5
Morocco	912	986	8.1
Sudan	440	380	-13.6
Tunisia	283	271	-4.2
Algeria	251	229	-8.8
Libya	57	60	5.3
Canary Islands	2	6	200.0
Western Sahara	0	0	0.0

Place of Origin	1994/95	1995/96	% Change
Southern Africa	**2,672**	**2,657**	**-0.6**
South Africa	1,919	1,888	-1.6
Botswana	417	495	18.7
Swaziland	150	117	-22.0
Namibia	124	85	-31.5
Lesotho	62	72	16.1
Western Africa	**5,943**	**5,818**	**-2.1**
Nigeria	2,147	2,093	-2.5
Ghana	1,156	1,188	2.8
Senegal	451	446	-1.1
Cote D'Ivoire	406	408	0.5
Liberia	388	349	-10.1
Gambia	403	298	-26.1
Sierra Leone	296	296	0.0
Mali	187	191	2.1
Togo	118	126	6.8
Guinea	105	104	-1.0
Benin	72	91	26.4
Niger	56	72	28.6
Cape Verde	65	67	3.1
Burkina Faso	36	33	-8.3
Mauritania	24	25	4.2
Guinea-Bissau	25	20	-20.0
Saint Helena	0	0	0.0
Western Africa, Unspec.	8	11	37.5
Africa, Unspecified	**18**	**5**	**-72.2**
■ ASIA	**261,789**	**259,893**	**-0.7**
East Asia	**168,190**	**166,717**	**-0.9**
Japan	45,276	45,531	0.6
China	39,403	39,613	0.5
Korea, Republic of	33,599	36,231	7.8
Taiwan	36,407	32,702	-10.2
Hong Kong	12,935	12,018	-7.1
Macao	385	401	4.2
Korea, Dem. People's Rep.	114	137	20.2
Mongolia	45	84	86.7
East Asia, Unspecified	26	0	-100.0
South & Central Asia	**47,836**	**45,401**	**-5.1**
India	33,537	31,743	-5.3
Pakistan	6,989	6,427	-8.0
Bangladesh	3,371	3,360	-0.3

3.0 *(cont.)*

FOREIGN STUDENT TOTALS BY PLACE OF ORIGIN, 1994/95 & 1995/96

Place of Origin	1994/95	1995/96	% Change
Sri Lanka	2,097	1,951	-7.0
Nepal	1,264	1,219	-3.6
Kazakhstan	267	345	29.2
Uzbekistan	109	134	22.9
Afghanistan	111	84	-24.3
Kyrgyzstan	36	41	13.9
Tajikistan	17	33	94.1
Bhutan	21	29	38.1
Turkmenistan	10	21	110.0
Maldives	7	14	100.0
Southeast Asia	**45,763**	**47,774**	**4.4**
Malaysia	13,617	14,015	2.9
Indonesia	11,872	12,820	8.0
Thailand	10,889	12,165	11.7
Singapore	4,473	4,098	-8.4
Philippines	3,472	3,127	-9.9
Vietnam	794	922	16.1
Myanmar	455	392	-13.8
Laos	88	121	37.5
Cambodia	82	93	13.4
Brunei	21	21	0.0
Asia, Unspecified	**0**	**1**	**-**
■ EUROPE	**64811**	**67,358**	**3.9**
Eastern Europe	**15,906**	**18,032**	**13.4**
Russia	4,832	5,589	15.7
Poland	1,593	1,743	9.4
Former Yugoslavia	1,841	1,594	-13.4
Bulgaria	1,396	1,588	13.8
Romania	1,133	1,456	28.5
Ukraine	792	1,215	53.4
Hungary	885	908	2.6
Czech Republic	654	735	12.4
Croatia	478	525	9.8
Former U.S.S.R.	594	477	-19.7
Lithuania	193	252	30.6
Slovakia	166	232	39.8
Albania	133	231	73.7
Bosnia & Herzegovina	152	211	38.8
Georgia	142	195	37.3
Latvia	194	194	0.0
Estonia	226	168	-25.7
Belarus	88	139	58.0
Slovenia	121	125	3.3

Place of Origin	1994/95	1995/96	% Change
Armenia	104	123	18.3
Azerbaijan	80	102	27.5
Macedonia	0	99	-
Moldova	54	71	31.5
Former Czechoslovakia	55	58	5.5
Eastern Europe, Unspecified	0	2	-
Western Europe	**48,905**	**49,326**	**0.9**
Germany	8,592	9,017	4.9
United Kingdom	7,786	7,799	0.2
France	5,843	5,710	-2.3
Spain	5,126	4,809	-6.2
Sweden	3,432	3,889	13.3
Greece	3,699	3,365	-9.0
Italy	2,704	2,780	2.8
Norway	2,123	2,246	5.8
Netherlands	1,847	1,926	4.3
Switzerland	1,630	1,675	2.8
Denmark	1,022	964	-5.7
Austria	887	956	7.8
Ireland	909	956	5.2
Finland	924	938	1.5
Belgium	900	868	-3.6
Portugal	739	744	0.7
Iceland	568	522	-8.1
Luxembourg	65	71	9.2
Malta	63	54	-14.3
Monaco	18	14	-22.2
Liechtenstein	16	9	-43.8
Andorra	9	8	-11.1
Gibraltar	0	2	-
San Marino	3	2	-33.3
Vatican City	0	2	-
■ LATIN AMERICA	**47,239**	**47,253**	**0.0**
Caribbean	**11,286**	**10,737**	**-4.9**
Jamaica	2,878	2,941	2.2
Trinidad & Tobago	2,037	2,087	2.5
Bahamas	1,858	1,666	-10.3
Dominican Republic	976	760	-22.1
Haiti	795	733	-7.8
Barbados	621	508	-18.2
Netherlands Antilles	500	403	-19.4
Antigua	254	230	-9.4

3.0 (cont.)

FOREIGN STUDENT TOTALS BY PLACE OF ORIGIN, 1994/95 & 1995/96

Place of Origin	1994/95	1995/96	% Change
Grenada	214	217	1.4
Cayman Islands	132	191	44.7
Dominica	170	172	1.2
St. Lucia	149	139	-6.7
St. Vincent	118	111	-5.9
Cuba	86	107	24.4
British Virgin Islands	68	76	11.8
Aruba	41	69	68.3
St. Kitts-Nevis	134	68	-49.3
Montserrat	22	25	13.6
Guadeloupe	10	16	60.0
Anguilla	16	15	-6.3
Turks & Caicos Islands	19	13	-31.6
Martinique	7	7	0.0
Windward Islands	2	7	250.0
Leeward Islands	2	2	0.0
Caribbean, Unspecified	177	174	-1.7
Cntrl Amer/Mexico	**14,923**	**14,220**	**-4.7**
Mexico	9,003	8,687	-3.5
Panama	1,409	1,367	-3.0
Honduras	1,148	900	-21.6
Costa Rica	866	840	-3.0
Guatemala	785	775	-1.3
El Salvador	760	770	1.3
Nicaragua	615	593	-3.6
Belize	334	288	-13.8
Cntrl Amer/Mexico, Unspec.	3	0	-100.0
South America	**21,030**	**22,296**	**6.0**
Brazil	5,017	5,497	9.6
Venezuela	4,092	4,456	8.9
Colombia	3,208	3,462	7.9
Peru	2,382	2,246	-5.7
Argentina	1,996	2,168	8.6
Ecuador	1,471	1,503	2.2
Chile	907	1,016	12.0
Bolivia	757	776	2.5
Guyana	467	427	-8.6
Uruguay	319	327	2.5
Paraguay	251	264	5.2
Suriname	153	135	-11.8
French Guiana	6	18	200.0
Falkland Islands	3	1	-66.7
South America, Unspecified	1	0	-100.0

Place of Origin	1994/95	1995/96	% Change
■ MIDDLE EAST	**30,246**	**30,563**	**1.0**
Turkey	6,716	7,678	14.3
Saudi Arabia	4,075	4,191	2.8
Kuwait	2,844	3,035	6.7
Israel	2,692	2,637	-2.0
Iran	2,896	2,628	-9.3
United Arab Emirates	2,071	2,233	7.8
Jordan	2,431	2,222	-8.6
Cyprus	1,962	1,819	-7.3
Lebanon	1,835	1,554	-15.3
Syria	678	628	-7.4
Oman	585	565	-3.4
Yemen	426	404	-5.2
Bahrain	343	392	14.3
Qatar	427	390	-8.7
Iraq	255	186	-27.1
Middle East, Unspecified	10	1	-90.0
■ NORTH AMERICA	**23,394**	**23,644**	**1.1**
Canada	22,747	23,005	1.1
Bermuda	647	639	-1.2
■ OCEANIA	**4,327**	**4,202**	**-2.9**
Australia	2,247	2,244	-0.1
New Zealand	798	848	6.3
Micronesia, Fed. States of	574	413	-28.0
Fiji	147	146	-0.7
Tonga	131	128	-2.3
Western Samoa	123	119	-3.3
French Polynesia	92	90	-2.2
Palau	94	82	-12.8
Papua New Guinea	22	35	59.1
Kiribati	35	23	-34.3
Cook Islands	18	19	5.6
Tuvalu	6	19	216.7
Marshall Islands	10	8	-20.0
Solomon Islands	10	8	-20.0
Vanuatu	9	6	-33.3
Nauru	1	4	300.0
New Caledonia	3	4	33.3
Niue	7	4	-42.9
Wallis & Futana Islands	0	0	0.0
Oceania, unspecified	0	2	-
Stateless	**105**	**30**	**-71.4**
■ WORLD TOTAL	**452,635**	**453,787**	**0.3**

Intensive English Programs in the United States: Challenges Ahead

JOANN GEDDES
Lewis and Clark College, Portland, OR and
RHONA GENZEL
Rochester Institute of Technology, Rochester, NY

DURING the past decade, Intensive English Programs (IEPs) in the United States have played an ever more meaningful role in education, while also contributing significantly to the national economy. Recent data in *Open Doors* and *English Language and Orientation Programs in the United States* point out that since 1985 the number of students coming to the United States each year to study English has increased by 82%. As demand for English language instruction has surged, so, too, has supply. Statistics indicate that the number of IEPs seeking to meet the needs of interested international students also has grown dramatically.

When selecting an IEP, prospective students throughout the world are now faced with a vast array of options from which to choose. Schmidt & Simon surveyed IEP students in the United States, and at the 1995 TESOL Conference they reported that academic qualifications of teachers, quality of the academic programs, class size, and safety of the city were among the primary factors considered by students deciding where to study. Students bound for further academic work also noted that the relationship of the IEP to a college or university was significant. Professionals in the field are thus challenged to hire well-trained faculty and to establish and maintain quality programs. They must also work together to inform their constituencies of the criteria upon which IEPs can be fairly evaluated, compared and selected. At present, TESOL's Accreditation Advisory Committee is working toward the development of an accreditation program for IEPs in the United States that it hopes to have completed by 1998. Accredited programs will meet basic criteria related to hours of instruction, curriculum design, number of levels, and scheduling. Other professional organizations such as the American Association of Intensive English Programs (AAIEP) and University and College Intensive English Programs (UCIEP) currently require members to endorse professional standards and guidelines; furthermore, they must undergo self-studies to ensure compliance in areas of administration, faculty qualifications, curriculum, admissions, student services, marketing and recruitment, and program assessment.

Today's competitive market and the soaring costs of providing educational services demand that programs not only meet the criteria outlined by the organizations above but also contribute to the financial stability of their institutions or parent organizations. In recent years, IEPs in the United States have encountered stiff competition from counterparts in other English speaking nations such as Ireland, England, Canada, Australia and New Zealand. Indeed, it appears that aggressive information and marketing campaigns are being run both by the schools in these countries and by their governments. Noteworthy examples of joint interaction and involvement abound. The British Council, for instance, has actively supported and promoted its country's role in English language instruction by running language schools worldwide. Furthermore, it has recently launched a global program called English 2000 through

Continued...

IEPs in the United States: Challenges Ahead

...Continued

which it is seeking to not only defend, but to increase Britain's share of the IEP market. The Canadian government co-sponsored and hosted a recruiting fair at its embassy in Japan and sent invitations from the ambassador. In Australia, the government conducted a major month-long promotion called "Celebrate Australia" and invited select educational advisors to visit the country and its educational institutions. Similarly, private agents from Japan, Hong Kong, Indonesia, Malaysia, Singapore and Thailand were invited to visit schools in New Zealand as the guests of that country. While it is true that U.S. binational centers and USIA offices provide important recruiting information, and that the Commercial Sections of the American embassies in some countries have sponsored highly successful fairs, few other similar events have taken place. U.S. government support simply does not compare to the very strong and pro-active initiatives by other governments to assist in international student recruitment.

Although *Open Doors* has reported that from 1985-1995 the number of students in IEPs went from 23,956 to 43,522 in the United States, it is clear that many international students choose to study English elsewhere. Alarming information provided by advisors, counselors, agents and students overseas underscores the need for concern and action. The Center for International and Cultural Studies (ICS) in Japan, for example, noted that while the number of Japanese students interested in going to the United States decreased by 5%, inquiries about Canada increased by 5%. According to ICS, the primary reason for this drop appears to have been the "U.S. visa situation." Requirements for more paperwork, the closing of visa offices in Fukuoka and Sapporo, as well as lengthy procedural delays and a higher number of rejected applicants are blamed. In fact, ICS has also reported that while total Japanese student travel overseas was up 11% over the previous year, Japanese students going to Canada went up 33%, Australia was up 26%, and New Zealand rose by 45%. Unfortunately, visa issuance problems similar to those in Japan are present in other countries as well. When the Language Travel Gazette surveyed students about their satisfaction with the United States study visa application process, they found that "dissatisfaction"

was strongest among Korean respondents at 59.5%, Taiwanese at 45%, Hong Kong Chinese at 33%, and Thai at 20%. Dissatisfaction among Japanese respondents was also relatively high at 19.5%, while Saudis were at 18%, and Brazilians at 10%. As the United States government moves to halt illegal immigration and to increase the exportation of education services, it must be careful not to discourage those who come to the United States for legitimate educational purposes. The International Education Exchange Index estimates that the annual financial contribution of foreign students to the United States economy in 1994-1995 was $7 billion. A breakdown of this figure into its component parts would demonstrate the serious impact international students have not only on the state, city or town, but on every neighborhood in which they live.

What do these statistics and trends imply for IEPs in the United States? Without doubt, programs must set and meet instructional standards of excellence, develop greater responsiveness to student needs, ensure opportunities for quality educational and cultural experiences, and establish stronger rapport with overseas counselors and advisors. However, without active support from the United States government through promotional initiatives by American embassies and government offices throughout the world, without simplified immigration procedures and a friendly welcoming atmosphere, they will continue to lose market share. It is incumbent upon IEP professionals to find a way to unite with U.S. representatives overseas in an effort to attract, inform, and interest potential international students. With greater cooperation and interaction, beneficial linkages can and must be forged.

Joann Geddes currently serves as past-president of University and College Intensive English Programs (UCIEP), and as director of the Institute for the Study of American Language and Culture, Lewis and Clark College, Portland, OR.

Rhona Genzel currently serves as past-president of the American Association of Intensive English Programs (AAIEP), and as director of the English Language Institute, Rochester Institute of Technology, Rochester, NY.

3.1

TOP 15 COUNTRIES, SELECTED YEARS 1962/63 - 1995/96

1962/63

Locality	Foreign Students	% of Total
Canada	7,004	10.8
India	6,152	9.5
Taiwan	5,526	8.5
Japan	2,934	4.5
Iran	2,824	4.4
Korea, Rep of	2,233	3.5
Philippines	2,025	3.1
Hong Kong	1,695	2.6
Cuba	1,515	2.3
Greece	1,432	2.2
United Kingdom	1,432	2.2
Israel	1,208	1.9
Mexico	1,189	1.8
Egypt	1,136	1.8
Thailand	1,098	1.7
TOTAL	**39,403**	**60.8**

1972/73

Locality	Foreign Students	% of Total
India	10,656	7.3
Hong Kong	10,298	7.0
Canada	9,679	6.6
Taiwan	9,633	6.6
Iran	7,838	5.4
Cuba	6,859	4.7
Thailand	5,759	3.9
Japan	4,653	3.2
Nigeria	4,092	2.8
Korea, Rep of	3,730	2.6
United Kingdom	3,624	2.5
Mexico	3,054	2.1
Pakistan	2,690	1.8
Philippines	2,586	1.8
Israel	2,113	1.4
TOTAL	**87,264**	**59.7**

1982/83

Locality	Foreign Students	% of Total
Iran	26,760	7.9
Taiwan	20,770	6.2
Nigeria	20,710	6.1
Venezuela	15,490	4.6
Malaysia	14,070	4.2
Canada	14,020	4.2
Japan	13,610	4.0
India	12,890	3.8
Korea, Rep of	11,360	3.4
Saudi Arabia	9,250	2.7
Hong Kong	8,610	2.6
Mexico	7,260	2.2
Lebanon	7,110	2.1
Jordan	6,820	2.0
Thailand	6,800	2.0
TOTAL	**195,530**	**57.9**

1995/96

Locality	Foreign Students	% of Total
Japan	45,531	10.0
China	39,613	8.7
Korea, Rep of	36,231	8.0
Taiwan	32,702	7.2
India	31,743	7.0
Canada	23,005	5.1
Malaysia	14,015	3.1
Indonesia	12,820	2.8
Thailand	12,165	2.7
Hong Kong	12,018	2.6
Germany	9,017	2.0
Mexico	8,687	1.9
United Kingdom	7,799	1.7
Turkey	7,678	1.7
Pakistan	6,427	1.4
TOTAL	**299,451**	**66.0**

Changing Patterns in Graduate Legal Education: Some Potential Social Implications

BRYANT GARTH
American Bar Foundation, Chicago and
YVES DEZALAY
Centre de Sociologie de l'Education et de la Culture, Paris

EVEN 20 years ago, it was quite unusual for an ambitious student from Latin America or elsewhere in the developing world to come to the United States for an advanced degree in the field of law. In the first place, the dictates of development seemed to require technical skills in engineering, medicine, business or other similar disciplines. Law was a generalist degree that was identified more with the status quo than with the requirements of development. In the second place, if a student sought advanced degrees in law, it made almost no sense for a law graduate in a civil law jurisdiction to learn the common law as taught in the United States, and students from former British colonies were naturally inclined to study in Great Britain. Graduates from the civil law jurisdictions would culminate their education with a Paris doctorate in law–often a necessary credential to join the local academic elite.

On the basis of a project that we have had underway for about a year, with funding from the National Science Foundation and the American Bar Foundation, it appears that there are substantial reasons to expect some realignment of these educational patterns. Our research is not directly focused on education, legal or otherwise, but it turns out that education is central to our original concern with the changing role of law and lawyers in relation to internationalization. We have been conducting interviews, beginning in Latin America, about such topics as the human rights movement, transnational trade, the globalization of the securities markets, the negotiation of debt, and environmental protection. We have also studied the growth of international law firms modeled after the great firms in the United States.

While perhaps an exaggeration, it is notable that we were told by one Mexican lawyer that he cannot do business effectively with a Japanese lawyer unless the Japanese lawyer also has an advanced U.S. law degree. Internationalization has brought a spread of the categories, concepts, and practices of U.S. law into countries where law was either of very little relevance to trade and the governance of the "developmental state" or, if relevant, was primarily a variant of Continental law. The new trend, it appears, not only orients lawyers toward the United States, but it also pulls ambitious individuals who want to be "players" in the state and the economy toward legal careers in the U.S. sense. We suggest on the basis of interviews that this trend–if born out by further study–will have a significant impact on the role of law and lawyers in the world outside the United States. The graduate law degree in the United States is indeed making Harvard, NYU and others into global law schools.

That is not to say that this trend is the only one. The reorientation of economics toward the United States is a trend of obvious and related importance, most obviously in the famous "Chicago boys" of Chile and the presidencies of Salinas and Zedillo in Mexico.

Continued...

Changing Patterns in Graduate Legal Education

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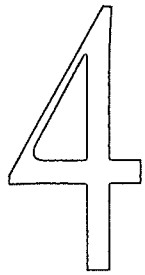
The point of our research is that these patterns are themselves quite socially significant. As suggested above, they will have an important impact on the role of the law and specific legal rules. In addition, there is another social role. If, in fact, advanced foreign degrees in law (and of course other areas) are increasingly vital for a distinguished career outside the United States, it matters even more who can gain access to these educational advantages. While the orientation may change from Paris to the United States, the result in terms of maintaining national hierarchies may be the same.

Yves Dezalay is chargé de recherche de première classe of the Centre National de la Recherche Scientifique with specific connection to the Centre de Sociologie de l'Education et de la Culture in Paris. His publications include "Marchands de droit" *(Fayard, 1992), a study of the "americanization" of legal practice in Europe.*

Bryant Garth is director of the American Bar Foundation, located in Chicago. Prior to coming to the ABF in 1990, he was dean of the Indiana University School of Law - Bloomington. With Yves Dezalay, he recently published a book entitled Dealing in Virtue: International Commercial Arbitration and the Construction of a Transnational Legal Order *(University of Chicago Press, 1996).*



Undergraduate and Graduate Distributions by Country

ACADEMIC LEVEL

- Fewer international students were studying at the graduate level in 1995/96 than in 1993/94 when graduate students accounted for close to 45% of total international enrollment. This year the figure is slightly over 42%. Over the past three years, a larger share of foreign students have been enrolling at either the undergraduate level or in practical training, non-degree and intensive English programs. These latter programs are classified as "other" programs.

- This shift is especially apparent among Asians where enrollments in graduate programs in the United States fell by about 6,500 students this year. In 1993/94 there were 133,606, in 1994/95 the figure fell to 126,564, and this year the number is 120,047. Enrollments in practical training, non-degree and intensive English programs increased over the same period among Asians by about 7,000 students and by about 2,000 classified as undergraduates. Contributing to these changes were enrollment shifts among students from Japan, China, Korea, India, Taiwan and Indonesia.

- The apparently complex pattern of enrollment by academic level from individual countries is related to the development of the home country's tertiary system of education as well as the perceived usefulness of a U.S. degree. Changes in enrollment from particular countries by academic level over time are noteworthy because international students constitute about 10% of all U.S. graduate enrollments, and up to and beyond three times that proportion in fields such as engineering and the physical sciences.

- Long-term trends suggest that as nations become wealthier and develop strong post-baccalaureate educational infrastructures, a U.S. graduate education may become less attractive for many students than home grown opportunities. Consideration of these trends should be important in the ongoing dialogue over the role of international students in U.S. graduate training programs.

4.0

REGIONS AND LEADING PLACES OF ORIGIN BY ACADEMIC LEVEL, 1995/96

Region/ Locality	% Under-Graduate	% Graduate	% Other[1]	Total
AFRICA	**59.7**	**35.9**	**4.4**	**20,844**
North Africa	**44.9**	**48.0**	**7.0**	**3,422**
Egypt	36.7	57.3	6.0	1,490
Morocco	60.2	33.2	6.7	986
Sudan	46.9	47.2	5.9	380
Tunisia	31.2	58.1	10.7	271
Algeria	42.2	43.9	13.9	229
Sub-Saharan Africa	**62.6**	**33.5**	**3.9**	**17,417**
Kenya	69.9	27.4	2.7	2,934
Nigeria	62.4	33.7	3.8	2,093
South Africa	51.0	45.3	3.7	1,888
Ethiopia	70.1	26.6	3.3	1,328
Ghana	53.8	41.5	4.7	1,188
ASIA	**45.7**	**46.2**	**8.1**	**259,893**
East Asia	**44.5**	**46.1**	**9.4**	**166,717**
Japan	70.4	17.2	12.5	45,531
China	12.2	82.1	5.7	39,613
Korea, Republic of	45.1	41.5	13.4	36,231
Taiwan	35.2	57.8	7.0	32,702
Hong Kong	75.3	19.5	5.1	12,018
So & Cntrl Asia	**31.6**	**62.3**	**6.1**	**45,401**
India	19.1	74.3	6.6	31,743
Pakistan	60.6	33.9	5.4	6,427
Bangladesh	62.0	34.6	3.4	3,360
Sri Lanka	54.1	41.8	4.1	1,951
Nepal	68.8	27.3	3.9	1,219
Southeast Asia	**63.1**	**31.4**	**5.6**	**47,774**
Malaysia	83.0	14.0	3.1	14,015
Indonesia	72.7	23.0	4.3	12,820
Thailand	29.6	60.4	10.0	12,165
Singapore	71.7	25.8	2.5	4,098
Philippines	51.6	42.8	5.6	3,127
EUROPE	**51.6**	**39.9**	**8.4**	**67,358**
Eastern Europe	**49.1**	**44.7**	**6.3**	**18,032**
Russia	42.9	48.8	8.3	5,589
Poland	58.0	33.0	8.9	1,743
Yugoslavia (former)	59.8	36.6	3.6	1,594
Bulgaria	54.8	41.9	3.3	1,588
Romania	27.6	70.2	2.2	1,456
Western Europe	**52.6**	**38.2**	**9.2**	**49,326**
Germany	40.6	47.7	11.7	9,017
United Kingdom	59.8	32.2	8.0	7,799
France	46.8	40.9	12.3	5,710
Spain	54.8	35.6	9.6	4,809
Sweden	81.7	14.2	4.1	3,889
LATIN AMERICA	**62.2**	**30.8**	**7.0**	**47,253**
Caribbean	**79.6**	**18.0**	**2.4**	**10,737**
Jamaica	81.7	16.6	1.7	2,941
Trinidad & Tobago	76.3	21.0	2.7	2,087
Bahamas	85.1	13.0	1.9	1,666
Dominican Republic	68.4	25.9	5.7	760
Haiti	85.9	12.2	2.0	733
Cntrl Amer/Mexico	**63.8**	**30.5**	**5.7**	**14,220**
Mexico	58.5	35.3	6.2	8,687
Panama	77.2	16.7	6.0	1,367
Honduras	79.0	17.9	3.1	900
Costa Rica	52.6	41.4	6.0	840
Guatemala	73.1	22.3	4.6	775
South America	**52.8**	**37.2**	**10.0**	**22,296**
Brazil	50.1	40.4	9.5	5,497
Venezuela	53.7	34.1	12.1	4,456
Colombia	48.9	35.2	15.9	3,462
Peru	59.9	34.2	5.9	2,246
Argentina	40.0	50.3	9.8	2,168
MIDDLE EAST	**53.9**	**37.6**	**8.5**	**30,563**
Turkey	36.5	55.8	7.7	7,678
Saudi Arabia	52.2	32.3	15.5	4,191
Kuwait	78.4	12.1	9.5	3,035
Israel	54.1	40.4	5.5	2,637
Iran	44.9	47.8	7.2	2,628
NORTH AMERICA	**57.2**	**37.8**	**5.0**	**23,644**
Canada	56.5	38.5	5.1	23,005
Bermuda	82.4	14.0	3.6	639
OCEANIA	**59.5**	**32.7**	**7.8**	**4,202**
Australia	52.1	40.1	7.8	2,244
New Zealand	49.4	45.4	5.2	848
WORLD	**50.2**	**42.0**	**7.8**	**453,787**

[1] Includes intensive English language, nondegree and practical training.

U.S. - Japanese Scientific Exchange

JEAN M. JOHNSON
Science and Engineering Indicators Program,
National Science Foundation

JAPAN leads as the country of origin of foreign students in U.S. universities, but only a small percentage of these students come to study natural science and engineering (NS&E), and far fewer U.S. students go to Japan to study in NS&E fields. This sidebar highlights the impact of U.S. "open doors" for Japanese students and scholars in NS&E fields and prospects for increasing the flow of U.S. students and researchers to Japan in the future.

Of the 40,000 Japanese foreign students coming to the United States, the large majority (80%) enter undergraduate programs for non-S&E fields of study. Their most popular major fields are business and economics. Relatively few of them study in NS&E fields, representing less than one percent of students studying these fields within Japanese universities and colleges. The real effect of "open doors" on scientific interaction is from foreign students in U.S. graduate programs and, more importantly, from the academic scholars and post-doctoral researchers at U.S. institutions.

U.S. - Japan International Exchange: 1993-1994

Students	39,715
Undergraduates	31,960
Graduate	7,755
Researchers	9,863
Post-doctorate/ U.S. universities	4,055
Foreign scholars/ U.S. universities	5,458
Visiting scientists/ NIH	350
DOE laboratories	N.A.
Total	**49,578**

The approximately 1,300 Japanese foreign students who enter U.S. graduate programs in NS&E fields, while small in number, are important for Japan's industries. Some of these graduate students are part of the industrial liaison programs between American universities and Japanese firms. In 1992, Japanese firms sent 329 of their research and development personnel to U.S. universities for advanced course work and cooperative research. According to Dr. Takiyaniga of Toshiba, the relationship between Japan's high-technology firms and U.S. research universities has been important; researchers in companies want to study with the highest level of research professor in their field. For example, for the past 30 years, Toshiba's career development program has sent its researchers to about ten leading U.S. universities, such as Stanford, Berkeley and MIT, for a period of one to two years as visiting researchers or doctoral students. UC Irvine has become a popular choice for individuals studying biotechnology, machinery, and electronics, as it is situated close to the large Toshiba factory in Irvine for the production of personal computers. In pharmaceutical fields, Toray Industries of Japan sends researchers to U.S. universities (MIT, Harvard, Stanford and UC Berkeley).

Few of these Japanese graduate students remain long enough to complete a lengthy doctoral program of science or engineering in U.S. universities, but the numbers are increasing. In 1994, Japanese foreign students earned 182 doctoral degrees in all fields of science and engineering in

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U.S. - Japanese Scientific Exchange

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U.S. universities, up from 132 such degrees in 1992. About 20% of Japanese foreign students earning doctoral degrees in U.S. universities have firm plans to stay in the United States for some period of time. This "stay-rate" is higher for those in fields of natural science and lower for those in engineering.

In contrast to the relatively modest numbers of Japanese foreign students in NS&E programs, around 4,000 Japanese researchers came to the United States in 1993 for post-doctoral appointments in U.S. universities. In addition, of the 5,458 foreign scholars who joined U.S. universities in that year, over 80% were in fields of natural science, health science, and engineering. Several hundred visiting Japanese scientists also conducted research at NIH laboratories that same year.

Regarding the current U.S. flow to Japan, graduate students from the United States comprise only 1% of the foreign graduate students in Japan, and relatively few of these are in NS&E programs requiring education or training in university research laboratories. A few dozen American graduate students are studying for their master's degree in engineering with Japanese universities; only a few Americans are doing graduate work in fields of natural science in Japan, perhaps stemming from negative attitudes about non-U.S. programs for advanced science education and research.

Prospects for the future

Some science and technology trends in Japan could influence the number and mix of Japanese students studying in U.S. universities, as well as promote the flow of U.S. students and researchers to Japan. The decreasing birth rate in Japan will lower the undergraduate population (currently 2.3 million) by 80,000 students in ten years (2006), requiring closure of some Japanese universities. This may have a small effect on the number of Japanese undergraduate students coming to the United States. As graduate degrees become more important for employment in Japan, more Japanese foreign students may enter U.S. universities at the graduate school level.

U.S. - Japanese Scientific Exchange

Japan's recent Science and Technology Basic Plan (Cabinet: July, 1996) supports doubling the government's science budget to increase basic research, and provides large new funding for competitive research and modernizing equipment and facilities. Realizing that money alone will not improve the quality of research in Japan, the S&T Basic Plan takes steps to remove the current barriers to a quality research environment in Japan. Chief among these are promoting collaboration among the previously segmented sectors of the research community: industry, university and national laboratories, and providing universities the flexibility to hire research assistants and technicians. In addition, Japan is boosting contributions to international research programs and world-class laboratories, as well as funding and hosting big science facilities in Japan.

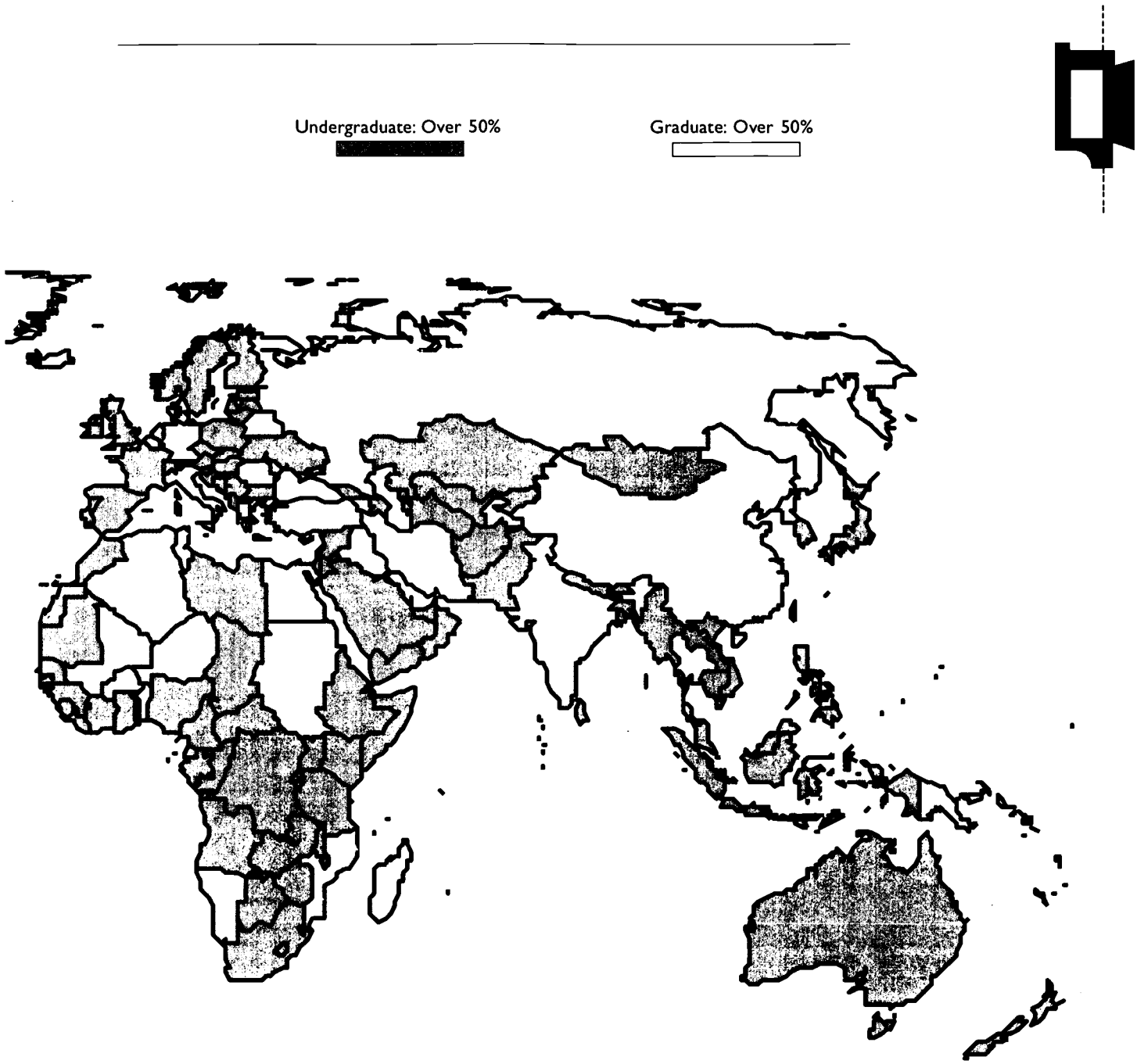
The achievement of these goals in the next five years provides an excellent opportunity for mutual benefit from scientific exchanges at all levels from undergraduate through leading research faculty. The expanded fellowships to Japan for foreign scholars and cooperative research components in these new funding programs provide "open doors" for U.S. faculty in science and engineering, to become more familiar with, and perhaps even involved with, developing the fruits of these large investments in Japan. Through short term fellowships, U.S. scientists and engineers can assess the scientific strengths of Japan's emerging centers of excellence, and perhaps encourage their students toward educational exchange programs in Japan. It is an appropriate role for the Institute of International Education to make more faculty aware of these fellowships and research opportunities, as a necessary step to increasing the flow of U.S. students to Japan. Until faculty become more aware of and involved in the Japanese initiatives to strengthen basic research capabilities, students will not be encouraged to study in Japan.

Jean M. Johnson, senior analyst, Science and Engineering Indicators Program, Science Resources Studies Division, National Science Foundation, 4200 Wilson Blvd., Arlington, VA 22230. For inquiries on exchange programs available through the National Science Foundation, e-mail JKPinfo@nsf.gov.

4.a

ACADEMIC LEVELS OF U.S. STUDY BY COUNTRY OF ORIGIN, 1995/96

International enrollments in U.S. graduate programs are affected by opportunities for advanced study at home. Long-term trends suggest that as nations become wealthier and develop strong post-baccalaureate educational infrastructures, a U.S. graduate education may become less attractive for many students than home grown opportunities.



African Students

Over half of the African students in the United States are studying at the undergraduate level. This is especially true of students from Sub-Saharan countries, particularly Ethiopia, Nigeria and Kenya, where undergraduates outnumber graduates two to one. Close to 70% of the students from Kenya, the largest African sending country, are enrolled as undergraduates, and only among students from South Africa and Ghana are graduate and undergraduate enrollments evenly matched.

Unlike Sub-Saharan Africans, students from countries in North Africa are frequently enrolled at the graduate level. Among the North African national groups, 58.1% of Tunisians are graduate students, as are 57.3% of Egyptians.

4.1

AFRICAN STUDENTS BY ACADEMIC LEVEL, 1995/96

Place of Origin	Undergraduate	Graduate	Other	Total[1]
AFRICA	**12,441**	**7,482**	**921**	**20,844**
Eastern Africa	**5,052**	**2,316**	**227**	**7,596**
Kenya	2,051	805	78	2,934
Ethiopia	931	354	43	1,328
Tanzania	488	242	27	757
Zimbabwe	515	215	13	742
Uganda	315	241	25	580
Zambia	254	92	7	354
Malawi	165	93	1	260
Mauritius	116	57	9	182
Madagascar	39	55	4	98
Somalia	56	42	0	98
Mozambique	27	47	5	79
Burundi	23	39	2	64
Rwanda	28	20	7	55
Eritrea	15	9	1	26
Seychelles	9	2	1	13
Djibouti	11	1	0	12
Comoros	6	2	3	11
Reunion Island	1	0	0	1
Eastern Africa, Unspec.	2	0	0	2
Central Africa	**906**	**369**	**73**	**1,346**
Cameroon	441	199	24	664
Zaire	206	88	22	316
Angola	117	19	9	144
Gabon	67	18	6	90
Congo	23	14	6	43
Chad	19	14	1	34
Central African Republic	15	9	1	26
Equatorial Guinea	9	3	3	14
Sao Tome & Principe	8	4	1	13
Central Africa, Unspecified	1	1	0	2
North Africa	**1,538**	**1,643**	**240**	**3,422**
Egypt	547	853	89	1,490
Morocco	593	327	66	986
Sudan	178	179	23	380
Tunisia	84	158	29	271
Algeria	97	101	32	229
Libya	33	25	1	60
Canary Islands	6	0	0	6
Southern Africa	**1,448**	**1,118**	**90**	**2,657**
South Africa	963	854	71	1,888
Botswana	346	139	10	495
Swaziland	70	39	8	117
Namibia	33	50	1	85
Lesotho	36	36	0	72
Western Africa	**3,492**	**2,036**	**291**	**5,818**
Nigeria	1,307	706	81	2,093
Ghana	639	493	56	1,188
Senegal	287	125	34	446
Cote D'Ivoire	238	126	44	408
Liberia	242	93	14	349
Gambia	252	41	5	298
Sierra Leone	189	97	10	296
Mali	80	102	9	191
Togo	70	47	9	126
Guinea	60	34	10	104
Benin	23	63	5	91
Niger	22	45	5	72
Cape Verde	42	25	0	67
Burkina Faso	10	23	0	33
Mauritania	10	9	6	25
Guinea-Bissau	12	5	3	20
Saint Helena	0	0	0	0
Western Africa, Unspec.	9	2	0	1
Africa, Unspecified	**5**	**0**	**0**	**5**

[1] Due to rounding, individual columns may not add up exactly to the total listed.

4.2

ASIAN STUDENTS BY ACADEMIC LEVEL, 1995/96

Place of Origin	Under-graduate	Graduate	Other	Total
ASIA	**118,693**	**120,047**	**21,155**	**259,893**
East Asia	**74,236**	**76,780**	**15,703**	**166,717**
Japan	32,034	7,819	5,679	45,531
China	4,851	32,512	2,250	39,613
Korea, Republic of	16,333	15,045	4,854	36,231
Taiwan	11,522	18,904	2,276	32,702
Hong Kong	9,055	2,348	615	12,018
Macao	363	28	10	401
Korea, Dem. People's Repub	27	105	6	137
Mongolia	51	19	13	84
South & Central Asia	**14,329**	**28,283**	**2,789**	**45,401**
India	6,049	23,593	2,101	31,743
Pakistan	3,897	2,181	349	6,427
Bangladesh	2,085	1,162	113	3,360
Sri Lanka	1,056	815	80	1,951
Nepal	839	333	47	1,219
Kazakhstan	194	95	56	345
Uzbekistan	71	43	20	134
Afghanistan	65	12	6	84
Kyrgyzstan	21	16	5	41
Tajikistan	15	17	1	33
Bhutan	15	12	2	29
Turkmenistan	8	4	9	21
Maldives	14	0	0	14
Southeast Asia	**30,127**	**14,984**	**2,663**	**47,774**
Malaysia	11,630	1,956	429	14,015
Indonesia	9,325	2,947	548	12,820
Thailand	3,599	7,347	1,219	12,165
Singapore	2,937	1,057	104	4,098
Philippines	1,614	1,337	177	3,127
Vietnam	611	192	119	922
Myanmar	232	115	44	392
Laos	107	10	4	121
Cambodia	55	19	19	93
Brunei	17	4	0	21
Asia, Unspecified	**1**	**0**	**0**	**1**

Asian Students

This year's overall drop in graduate enrollments is especially sharp among students from Asia. The number of Asian graduate students, traditionally high and constituting over 46% of the Asian total, fell off markedly this year to 120,047, a loss of 5%.

The sizable number of students coming from East Asian countries largely determines trends in Asian enrollments. This year graduate level enrollments from most East Asian countries have dropped. The number of graduate students from China (32,512) is down slightly, from Taiwan (18,904) down by 15% and from South Korea (15,045) also down. Graduate enrollments from Hong Kong, only about 19% of that country's total, are down by 5%.

India, the South Asian country with the most students in the United States, is the home country of most graduate students from this region. Just under three-quarters of Indian students in the United States study at the graduate level. This may change in coming years, however, as the number of Indian graduate students, like the graduate populations from many East Asian countries, is falling off. In 1993/94 almost 80% of Indian students studied at the graduate level. This year only 74% of a smaller number of students were so enrolled. Indian graduate level totals are down 4% from 1994/95 to 23,593. Students from other countries within South and Central Asia are predominantly undergraduates.

Southeast Asians overall enroll in undergraduate programs (63%) more often than in graduate ones. Of the students from the leading countries in Southeast Asia, eight in ten Malaysians (83%) and nearly that proportion of Singaporeans (71%) are enrolled as undergraduates. Over half of Thais (60%), however, are enrolled at the graduate level.

European Students

As a whole, European students are well represented at both the undergraduate (51%) and graduate (40%) levels in the United States. A relatively high (8.4%) proportion study at the "other" level, which includes practical training, non-degree and intensive English programs.

A near majority of the students from Eastern Europe are enrolled at the undergraduate level. This is particularly true of students from the former Yugoslavia, almost 60% of whom are enrolled as undergraduates. Students from Bulgaria (54%) and Poland (58%) are also predominantly undergraduate, while Russian graduates outnumber undergraduates only slightly. The Eastern European nation with the highest proportion of students enrolled in U.S. graduate schools is Romania (with 70%). While both graduate and undergraduate enrollments from this region are increasing, their proportions remain stable.

Among the leading Western European countries, the proportion of graduate students is highest among the Germans (47%), while students from Spain and the United Kingdom are predominantly undergraduates (54% and 59%). France also has a higher proportion of undergraduates (46%) than graduates (40%).

4.3

EUROPEAN STUDENTS BY ACADEMIC LEVEL, 1995/96

Place of Origin	Undergraduate	Graduate	Other	Total
EUROPE	**34,784**	**26,892**	**5,682**	**67,358**
Eastern Europe	**8,847**	**8,058**	**1,129**	**18,032**
Russia	2,399	2,726	464	5,589
Poland	1,012	576	156	1,743
Former Yugoslavia	953	584	57	1,594
Bulgaria	870	666	52	1,588
Romania	402	1,022	32	1,456
Ukraine	681	464	70	1,215
Hungary	442	400	66	908
Czech Republic	413	261	61	735
Croatia	331	175	19	525
Former U.S.S.R.	134	319	24	477
Lithuania	136	102	14	252
Slovakia	106	98	28	232
Albania	123	102	7	231
Bosnia & Herzegovina	178	32	1	211
Georgia	99	72	24	195
Latvia	105	78	11	194
Estonia	99	58	11	168
Belarus	64	65	10	139
Slovenia	66	52	7	125
Armenia	45	76	2	123
Azerbaijan	72	26	4	102
Macedonia	75	23	1	99
Moldova	31	33	7	71
Former Czechoslovakia	9	48	1	58
Eastern Europe, Unspecified	2	0	0	2
Western Europe	**25,937**	**18,834**	**4,553**	**49,326**
Germany	3,662	4,304	1,051	9,017
United Kingdom	4,660	2,511	628	7,799
France	2,672	2,336	702	5,710
Spain	2,637	1,712	460	4,809
Sweden	3,177	554	159	3,889
Greece	1,369	1,782	215	3,365
Italy	1,123	1,335	321	2,780
Norway	1,628	510	108	2,246
Netherlands	1,008	717	200	1,926
Switzerland	855	572	248	1,675
Denmark	525	350	88	964
Austria	471	388	97	956
Ireland	527	376	53	956
Finland	558	286	94	938
Belgium	382	416	69	868
Portugal	363	349	32	744
Iceland	222	286	14	522
Luxembourg	39	26	6	71
Malta	36	15	3	54
Monaco	6	3	5	14
Liechtenstein	7	2	0	9
Andorra	6	2	0	8
Gibraltar	2	0	0	2
San Marino	0	2	0	2
Vatican City	2	0	0	2

4.4

LATIN AMERICAN STUDENTS BY ACADEMIC LEVEL, 1995/96

Place of Origin	Under-graduate	Graduate	Other	Total
LATIN AMERICA	**29,384**	**14,554**	**3,313**	**47,253**
Caribbean	**8,543**	**1,929**	**262**	**10,737**
Jamaica	2,402	489	50	2,941
Trinidad & Tobago	1,593	438	56	2,087
Bahamas	1,418	216	32	1,666
Dominican Republic	520	197	43	760
Haiti	629	89	14	733
Barbados	363	129	16	508
Netherlands Antilles	303	93	7	403
Antigua	191	30	8	230
Grenada	169	46	2	217
Cayman Islands	181	10	0	191
Dominica	143	23	6	172
St. Lucia	98	34	7	139
St. Vincent	96	11	3	111
Cuba	66	30	11	107
British Virgin Islands	62	14	0	76
Aruba	57	11	1	69
St. Kitts-Nevis	45	19	4	68
Montserrat	19	6	0	25
Guadeloupe	10	6	0	16
Anguilla	13	1	1	15
Turks & Caicos Islands	9	4	0	13
Martinique	7	0	0	7
Windward Islands	7	0	0	7
Leeward Islands	1	1	0	2
Caribbean, Unspecified	141	32	1	174
Central America/Mexico	**9,078**	**4,331**	**814**	**14,220**
Mexico	5,079	3,070	538	8,687
Panama	1,056	229	83	1,367
Honduras	711	161	28	900
Costa Rica	442	348	51	840
Guatemala	567	173	35	775
El Salvador	625	124	21	770
Nicaragua	393	148	53	593
Belize	205	78	5	288
South America	**11,763**	**8,294**	**2,237**	**22,296**
Brazil	2,754	2,221	522	5,497
Venezuela	2,394	1,521	541	4,456
Colombia	1,693	1,220	549	3,462
Peru	1,346	768	132	2,246
Argentina	866	1,090	211	2,168
Ecuador	1,066	351	86	1,503
Chile	338	580	98	1,016
Bolivia	566	168	42	776
Guyana	312	99	16	427
Uruguay	154	162	11	327
Paraguay	163	74	27	264
Suriname	97	36	1	135
French Guiana	13	4	1	18
Falkland Islands	1	0	0	1
South America, Unspecified	0	0	0	0

Latin American Students

Latin America has the highest proportion of students enrolled at the undergraduate level. Almost two-thirds (62%) of the Latin Americans who study here are undergraduates.

Students from the Caribbean are overwhelmingly undergraduate, with about 80% enrolled in associate or bachelor's degree programs. Among Jamaicans (the most numerous group) the figure is 81%, and for several other national groups within the Caribbean, the percentage is even higher.

Mexico, which has more students in the United States than any other Latin American country, has a relatively high proportion of students in graduate programs (35%). Only Costa Rica has a higher share (41%). Conversely, 77% of the students from Panama are undergraduate, as are a large majority of the students from Honduras (79%) and Guatemala (73%).

Compared to other subregions of Latin America, the proportion of South Americans coming to the United States as undergraduates is relatively small (53%). The proportions of Argentineans (40%) and Brazilians (50%) at this level are particularly low, while Peru's share of undergraduates is highest (60%).

Middle Eastern Students

Middle Easterners who come to the United States for study are more often enrolled at the undergraduate (53%) than the graduate (37%) level.

Turkey, which has more students in the United States than does any other Middle Eastern country, also has the highest proportion of graduate students here (55%).

Students from Kuwait are most often enrolled as undergraduates: close to 78% are in associate or bachelor's degree programs. The majority of Saudi Arabian students are also undergraduate (52.1%), and a comparatively high percentage (16%) are in the "other" category, which for Saudi Arabian students is most often intensive English language training. Israeli and Iranian students are fairly evenly divided between undergraduate and graduate programs.

4.5

MIDDLE EASTERN STUDENTS BY ACADEMIC LEVEL, 1995/96

Place of Origin	Undergraduate	Graduate	Other	Total
MIDDLE EAST	**16,470**	**11,478**	**2,611**	**30,563**
Turkey	2,805	4,282	591	7,678
Saudi Arabia	2,186	1,355	650	4,191
Kuwait	2,380	368	287	3,035
Israel	1,426	1,065	146	2,637
Iran	1,180	1,257	190	2,628
United Arab Emirates	1,735	206	292	2,233
Jordan	1,093	1,012	116	2,222
Cyprus	1,240	525	54	1,819
Lebanon	769	699	86	1,554
Syria	309	263	55	628
Oman	439	80	46	565
Yemen	267	113	24	404
Bahrain	289	79	24	392
Qatar	265	82	43	390
Iraq	86	92	7	186
Middle East, Unspecified	1	0	0	1

4.6

NORTH AMERICAN STUDENTS BY ACADEMIC LEVEL, 1995/96

Place of Origin	Under-graduate	Graduate	Other	Total
NORTH AMERICA	**13,513**	**8,940**	**1,189**	**23,644**
Canada	12,987	8,851	1,166	23,005
Bermuda	526	89	23	639

4.7

OCEANIAN STUDENTS BY ACADEMIC LEVEL, 1995/96

Place of Origin	Under-graduate	Graduate	Other	Total
OCEANIA	**2,502**	**1,373**	**326**	**4,202**
Australia	1,169	900	175	2,244
New Zealand	419	385	44	848
Micronesia, Fed. States of	304	4	105	413
Fiji	125	20	1	146
Tonga	118	10	0	128
Western Samoa	113	6	0	119
French Polynesia	85	5	0	90
Palau	81	1	0	82
Papua New Guinea	13	20	1	35
Kiribati	23	0	0	23
Cook Islands	19	0	0	19
Tuvalu	7	12	0	19
Marshall Islands	8	0	0	8
Solomon Islands	5	3	0	8
Vanuatu	6	0	0	6
Nauru	1	3	0	4
New Caledonia	3	1	0	4
Niue	1	3	0	4
Oceania, unspecified	2	0	0	2
Stateless	**13**	**16**	**1**	**30**
WORLD	**227,787**	**190,776**	**35,167**	**453,787**

North American and Oceanian Students

Just over one-third of the North American students (predominantly Canadian) who come to the United States are enrolled as graduate students.

Oceanian students (students from Australia, New Zealand and the Pacific Islands) are more often undergraduate (59%) than graduate (32%).

Australians, the most numerous groups of Oceanians, are mostly undergraduate (52%), while students from New Zealand are more evenly divided between the two levels (49% undergraduate and 45% graduate).

Enrollment Shifts Over Time:

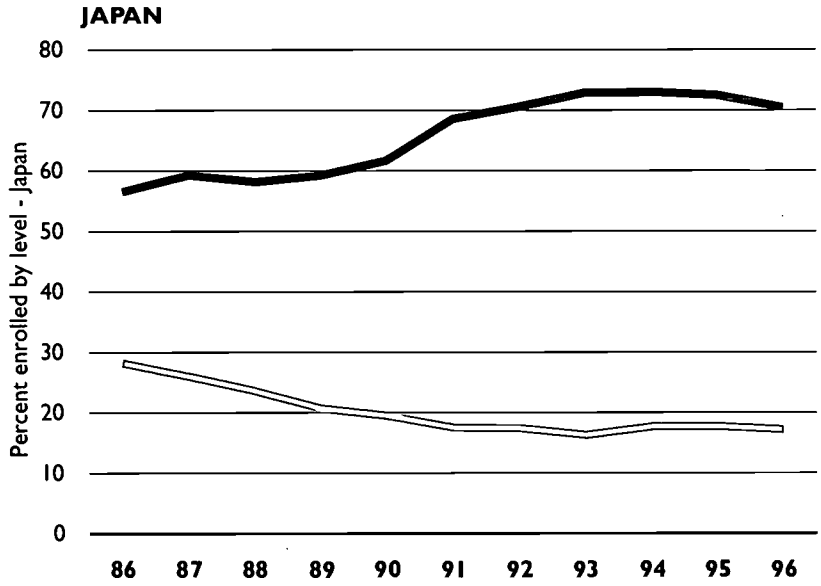
Tight times ahead for graduate education?

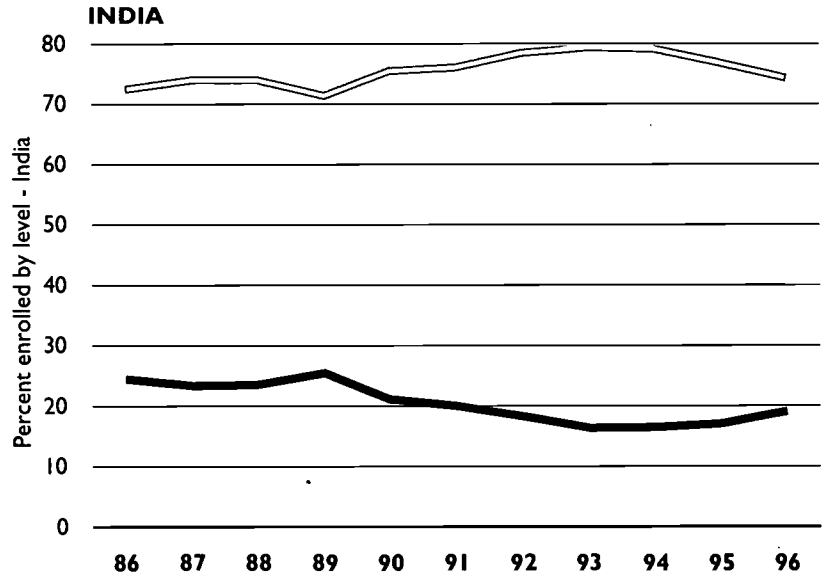
The sharp drop in graduate enrollments from many Asian countries seen over the past several years may be abrupt, but over the past ten years the relative proportion of graduate students from many of the leading home places for foreign students bound for the United States has declined. The enrollment proportions shown here (Figure 4.b) are for the five leading places of origin for foreign students in the United States. The major Asian countries have changed their enrollment mix in significant ways. All of these nations, except China, currently have a smaller proportion of graduate students studying in the United States than they did ten years ago. While the Chinese enrollment mix has changed slightly over time, the total number of Chinese studying in the United States has dropped over the past two years. Part of the drop may be accountable to a shift in visa status by many students from China permitted by the United States after 1989.

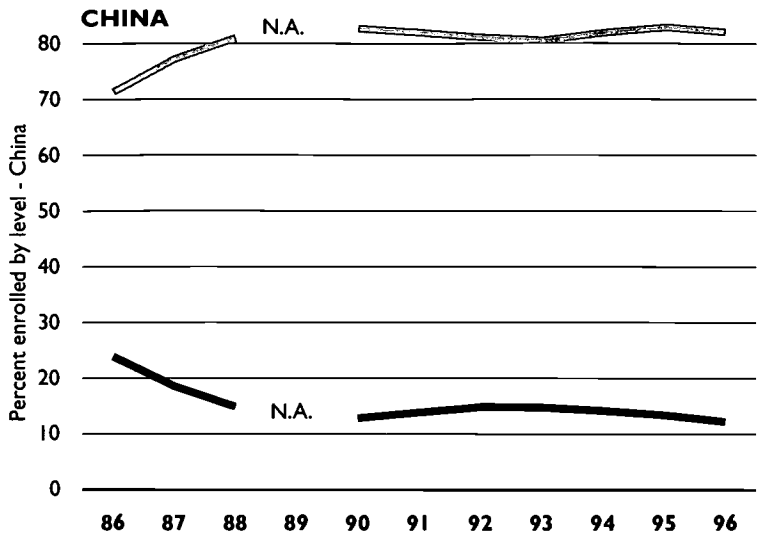
4.b

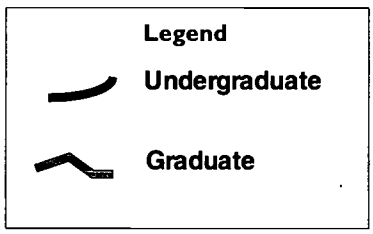
ACADEMIC LEVEL, PROPORTIONS OVER TIME, 1985/86 - 1995/96

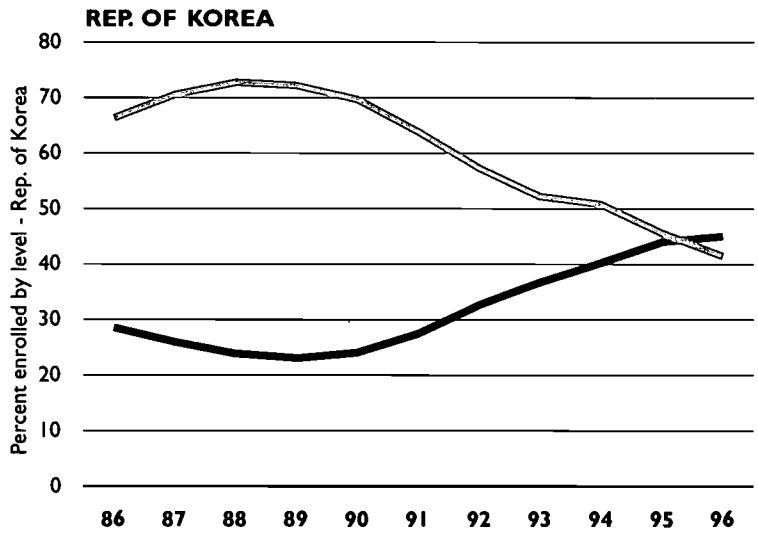
How the enrollment mix by academic level has changed over time for the leading places of origin of foreign students in the United States.

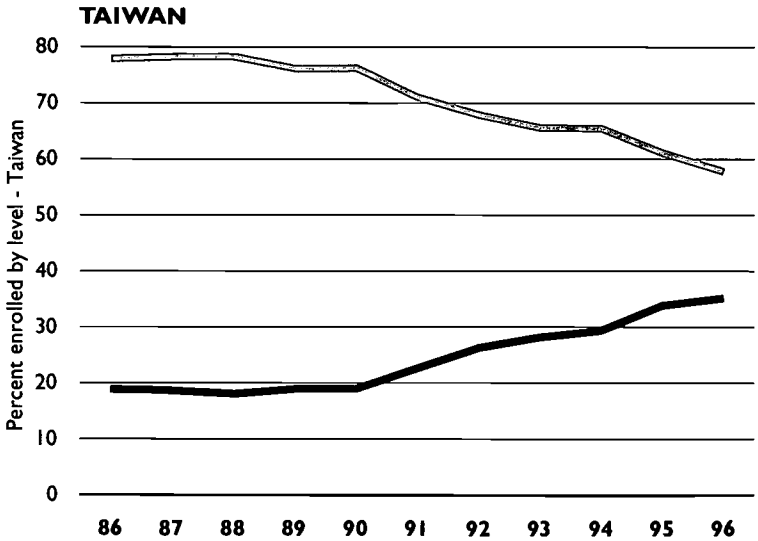





CHINA
N.A.
N.A.
Percent enrolled by level - China
80
70
60
50
40
30
20
10
0
86 87 88 89 90 91 92 93 94 95 96


Legend
Undergraduate
Graduate


REP. OF KOREA
Percent enrolled by level - Rep. of Korea
80
70
60
50
40
30
20
10
0
86 87 88 89 90 91 92 93 94 95 96


TAIWAN
Percent enrolled by level - Taiwan
80
70
60
50
40
30
20
10
0
86 87 88 89 90 91 92 93 94 95 96

5

Two National Surveys

UNDERSTANDING THE INTERNATIONAL STUDENT

Despite the fact that during the 1995/96 academic year there were over 453,000 international students studying in the United States, our knowledge of these students is largely anecdotal. In a recent and widely acclaimed synthesis of over 2,600 studies of U.S. college effects on students, not one study examined the impact of the college experience on foreign students studying in this country.

In an effort to fill the void in our knowledge base concerning international students, *Open Doors*, in consultation with the Cooperative Institutional Research Program (CIRP) and the USA Group Noel-Levitz, conducted secondary analysis of two national surveys of college students. By analyzing their databases for international students, we can develop a clearer picture of the international student and his or her background, behavior, and expectations for study in this country.

There is a general impression on many campuses that international students are "good" students. They are enrolled at many of this nation's finest universities and in fields of study that are considered to be highly selective and technically demanding. What makes for success in college? Recent research on student learning has concluded that the more students are actively involved in the learning process and take greater personal responsibility for their learning, the greater the results will be. In a word, learning requires an investment of time and effort. When students set foot on campus they bring with them more than notebooks and pens. They bring a variety of predispositions and attitudes that may affect their interest or ability to take advantage of what a college has to offer. In turn, a student's background and behavior will shape his or her expectations and assessment of the climate of a campus. Ultimately a student's satisfaction with a college, his or her retention and graduation is shaped by the extent to which that student's behavior and expectations match what a college has to offer.

This section presents the first quantitative effort to characterize the background, behavior, attitudes, future plans, college expectations and satisfaction of foreign undergraduate students studying in the United States. It is our hope that this section will stimulate others to make use of national data sets for the purpose of studying the foreign student phenomena in this country. We further hope that policy makers on campus and nationally will read these findings in an effort to craft policies and programs that will sustain the flow of talented foreign students into our higher education system.

THE CIRP FRESHMAN SURVEY

The data reported was drawn from the twenty-ninth annual report on the characteristics of students attending American colleges and universities as first-time, full-time freshmen in the fall of 1994. This survey was initiated in 1966 and is a project of the Cooperative Institutional Research Program (CIRP) and the American Council on Education. The project is housed at the Higher Education Research Institute at UCLA. It is under the direction of Alexander Astin. The analysis reported in *Open Doors* was conducted by Dr. William Korn who serves as associate director for Operations.

The purpose of the CIRP is to assess the effects of college on students. The CIRP data are among the sources most cited by researchers in this area. The freshmen data reported here are based on the responses of 237,777 students at 461 of the nation's two- and four-year colleges and universities. These data have been statistically adjusted to reflect the responses of the 1.54 million first-time, full-time students entering college as freshmen in fall 1994.

The CIRP Administration Guidelines strongly recommend that the survey be given no later than the first six weeks of school. Most institutions administer it before classes start through orientation programs. However, some institutions include in the survey sample people who are not "first-time, full-time" freshmen. This fortuitous circumstance has enabled us to compare new foreign freshmen and foreign transfer students who have been previously involved in U.S. higher education. All the data reported compares the responses of 3,884 foreign new freshmen and 1,533 foreign transfer students with the U.S. national freshmen norms. Also displayed is the difference, or gap, between the percentage responses of the new foreign and new U.S. freshmen students. The complete analysis conducted by CIRP is included on the disk in the back of this book. The table presented in this section is abstracted from the complete report. Interested readers are encouraged to explore this report in its entirety. Campus officials and researchers are encouraged to contact the CIRP at UCLA Graduate School of Education & Information Studies, 3005 Moore Hall, Mailbox 951521, Los Angeles, CA 90095-1521, by phone at (310) 825-1925 and by Email at HERI@ucla.edu.

5.0

THE CIRP FRESHMAN SURVEY

Tabled numbers are the percent of students responding to each item. Figures add vertically but may not equal 100%.

	Foreign Transfer Students	Foreign New Students	U.S. New Students	Foreign-U.S. Gap
ABOUT THE STUDENT				
Age on December 31, 1994				
18 or younger	8.7	47.4	68.8	21.4
19	16.8	33.4	25.2	-8.2
20	20.2	11.5	2.4	-9.1
21 to 24	40.6	6.2	1.7	-4.5
25 or older	14.8	1.5	1.9	0.4
Racial Background				
White/Caucasian	28.9	31.6	81.5	49.9
African American/Black	8.3	6.1	10.0	3.9
American Indian	0.5	0.4	2.1	1.7
Mexican American/Chicano	0.5	1.5	2.3	0.8
Puerto Rican	0.3	0.1	0.7	0.6
other Latino	8.4	8.5	1.3	-7.2
other	16.6	12.1	1.9	-10.2
Asian American/Asian	40.2	43.1	4.2	-38.9
Student's Religious Preference				
Baptist	3.6	3.3	16.9	13.6
Roman Catholic	18.8	21.3	30.1	8.8
Methodist	1.6	1.8	8.6	6.8
Lutheran	3.0	2.0	6.1	4.1
Other	24.5	25.2	23.8	-1.4
Eastern Orthodox	3.4	4.2	0.4	-3.8
Buddhist	9.9	6.7	0.5	-6.2
Islamic	8.4	8.8	0.4	-8.4
none	27.1	26.8	13.1	-13.7
ABOUT THE STUDENTS' BACKGROUNDS				
Estimated Parental Income				
less than $19,999	32.4	27.1	22.5	-4.6
$20,000 to $39,999	16.7	17.7	24.1	6.4
$40,000 to $59,999	13.7	14.5	24.5	10.0
$60,000 to $99,999	14.2	15.9	22.3	6.4
$100,000 or more	23.2	25.0	12.9	-12.1
Father's Education				
grammar school or less	8.5	5.7	3.7	-2.0
high school graduate	16.0	11.9	27.0	15.1
some college	5.8	5.8	15.7	9.9
college degree	24.0	26.4	23.1	-3.3
graduate degree	29.4	36.3	17.0	-19.3

About the Students

Although the largest group of foreign students like their U.S. counterparts are 18 or younger many more foreign freshmen are older than U.S. freshmen. The vast majority (81%) of U.S. freshmen are white while the largest single foreign group is Asian (43%). American freshmen most often identify themselves as Roman Catholic (30%), Baptist (17%) or "other" (24%). The strongest response to the question of religious preference by foreign freshmen was "none" (27%) followed by Roman Catholic (21%), and "other" (25%).

About the Students' Backgrounds

In general foreign students come from households that were either quite poor or quite wealthy. Most American students are drawn from middle class backgrounds. Foreign students' fathers tend to be much better educated than U.S. students' fathers. The greatest disparity occurs at the graduate level. Fully 36% of foreign freshmen report that their fathers have graduate degrees. The most frequent response for American students is that their fathers are high school graduates. Almost half of foreign students report that their fathers are businessmen. About 10% of foreign students say their fathers are engineers.

About the Students' Academic Preparation

Foreign students appear to be better prepared for the collegiate experience than American students in general. Over 40% of foreign freshmen report earning A grades in high school. In contrast over 50% of American entering freshmen report earning grades of B or lower. Foreign students report excellent preparation in the sciences compared with American students. The only areas where the proportion of American students report stronger preparation than foreign students are in English and American History.

About Choosing the College

Foreign students more so than American students look to the college experience as an opportunity to become more broadly educated individuals. Over 60% of foreign students look to college as a place to become a more cultured person as compared with only 36% of U.S. students. Americans on the other hand look at college for narrow and more instrumental reasons. Fully 77% of U.S. students look to college as a way to a better job and (72%) to more money.

5.0(cont.)

THE CIRP FRESHMAN SURVEY

Tabled numbers are the percent of students responding to each item. Figures add vertically but may not equal 100%.

	Foreign Transfer Students	Foreign New Students	U.S. New Students	Foreign-U.S. Gap
Father's Career				
other	15.0	16.2	25.4	9.2
skilled worker	1.9	2.5	10.0	7.5
semi-skilled worker	1.9	1.3	4.4	3.1
farmer or forester	2.4	1.4	3.9	2.5
unskilled worker	1.0	0.8	3.3	2.5
doctor or dentist	3.8	4.6	2.1	-2.5
engineer	10.4	10.4	7.6	-2.8
business	40.4	46.0	26.1	-19.9
ABOUT THE STUDENTS' ACADEMIC PREPARATION				
Average High School Grade				
A or A+	18.0	20.4	13.2	-7.2
A-	17.4	21.7	14.8	-6.9
B+	22.5	22.8	19.2	-3.6
B	22.9	19.2	24.7	5.5
B-	7.6	7.5	12.5	5.0
C+ or lower	11.7	8.3	15.5	7.2
Met or Exceeded Recommended Years of High School Study				
English (4 years)	67.6	83.7	96.1	12.4
history/American govt (1 year)	88.9	92.4	98.5	6.1
foreign language (2 years)	77.3	82.6	80.8	-1.8
mathematics (3 years)	90.5	95.3	91.9	-3.4
arts and/or music (1 year)	79.1	80.9	75.1	-5.8
computer science (1/2 year)	51.0	61.5	54.8	-6.7
physical science (2 years)	78.5	74.4	46.9	-27.5
biological science (2 years)	74.5	63.7	36.0	-27.7
ABOUT CHOOSING THE COLLEGE				
Reasons Noted as Very Important in Deciding to Go to College				
make more money	49.1	51.1	72.5	21.4
get a better job	60.0	59.5	77.3	17.8
wanted to get away from home	8.7	9.3	18.6	9.3
learn more about things	82.4	81.6	73.0	-8.6
prepare for grad/prof school	59.7	66.9	55.7	-11.2
gain general education	74.1	73.0	59.4	-13.6
improve reading and study skills	57.3	56.7	41.2	-15.5
become a more cultured person	63.8	60.2	36.5	-23.7

5.0(cont.)

THE CIRP FRESHMAN SURVEY

	Foreign Transfer Students	Foreign New Students	U.S. New Students	Foreign-U.S. Gap
Concern About Financing College				
none	42.6	41.1	29.9	-11.2
some	38.7	39.8	51.2	11.4
major	18.8	19.1	18.9	-0.2
Reasons Noted as Very Important in Selecting This College				
low tuition	15.4	12.2	29.0	16.8
wanted to live near home	4.4	7.2	21.0	13.8
size of college	25.1	31.9	35.6	3.7
local college/no other options	3.8	1.8	4.5	2.7
recruited by college rep	7.0	6.5	4.2	-2.3
priv coll counselor advised me	7.5	4.8	2.3	-2.5
offered financial assistance	32.3	32.6	29.6	-3.0
HS guidance counselor advised me	5.2	11.1	7.7	-3.4
teacher advised me	8.5	8.7	4.5	-4.2
offers special programs	29.6	26.5	21.1	-5.4
graduates go to top grad schools	28.6	35.6	25.8	-9.8
good academic reputation	51.7	62.2	48.8	-13.4
ABOUT THE STUDENTS' BEHAVIOR AND ATTITUDES				
Activities Engaged in During the Past Year				
attended a religious service	59.9	63.7	82.6	18.9
was bored in class	9.4	15.2	33.0	17.8
didn't complete homework on time	40.2	51.3	66.2	14.9
drank beer	51.0	44.4	53.2	8.8
felt overwhelmed	11.1	16.4	24.1	7.7
stayed up all night	70.0	74.3	80.7	6.4
participated in demonstration	27.5	34.7	40.4	5.7
drank wine or liquor	55.3	47.7	52.5	4.8
came late to class	45.7	51.1	54.8	3.7
discussed politics	19.9	18.8	16.0	-2.8
performed volunteer work	62.0	73.3	70.1	-3.2
asked teacher for advice	21.1	25.7	19.2	-6.5
was a guest in a teacher's home	33.3	36.4	27.8	-8.6
played a musical instrument	41.5	47.9	37.8	-10.1
tutored another student	50.4	59.4	49.2	-10.2
visited art gallery or museum	78.3	77.0	57.3	-19.7
spoke other language at home	67.4	71.7	7.1	-64.6

Foreign students in general are less concerned about financing their collegiate experience than are American students. In fact over 40% of foreign students report having no concerns at all compared with only 30% of Americans who report no concerns. Foreign students' reasons for selecting a particular college are also quite different from those of U.S. students. Americans make their selection not just on academic reputation (49%) but also on the basis of tuition (low) and proximity to home. Foreign freshmen appear to have much higher expectations for what college experience will enable them to do. Foreign students make their selection largely on the basis of academic reputation (62%) and whether or not a school's graduates are accepted into top graduate schools (35%). In short foreign students appear to be more selective on the basis of a school's academics than are American students.

About the Students' Behavior and Attitudes

Americans are more likely to be religiously involved than foreign students while foreign students are more likely to have visited art galleries or museums. Twice as many U.S. freshmen (33%) report being bored in high school than foreign freshmen (15%). U.S. students were also more likely to drink alcohol, feel overwhelmed, stay up all night and fail to complete homework than foreign freshmen. Foreign freshmen, on the other hand, report in high school the behaviors which, if extended to college, are likely to lead to academic success. They discuss politics, consult teachers, play musical instruments, and tutor other students. Americans see themselves as above average in "stubbornness," "cooperativeness" and "physical appearance." Foreign freshmen's self confidence in academic areas is much stronger than American students'. For example, 55% of foreign students report being in the top 10% in mathematical ability; 67% do so in academic ability. Finally, over 69% of foreign students report spending six or more hours a week studying compared with only 37% of Americans who say they spend a comparable amount of time in study.

5.0(cont.)

THE CIRP FRESHMAN SURVEY

Tabled numbers are the percent of students responding to each item. Figures add vertically but may not equal 100%.

	Foreign Transfer Students	Foreign New Students	U.S. New Students	Foreign-U.S. Gap
Student Rated Self Above Average or Top 10% in				
stubbornness	32.1	33.8	38.4	4.6
cooperativeness	61.7	63.9	68.4	4.5
physical appearance	37.9	36.6	40.1	3.5
self-confidence (social)	45.7	46.1	44.1	-2.0
emotional health	51.4	54.7	52.2	-2.5
understanding of others	63.2	70.3	67.7	-2.6
creativity	49.4	50.7	47.3	-3.4
drive to achieve	67.8	68.3	64.1	-4.2
competitiveness	52.7	58.3	53.9	-4.4
artistic ability	29.8	31.7	24.5	-7.2
sensitivity to criticism	30.2	32.7	24.7	-8.0
self-confidence (intellectual)	55.0	58.9	49.8	-9.1
academic ability	63.5	67.3	53.8	-13.5
mathematical ability	46.9	54.9	37.7	-17.2
Week in the Last Year Spent on				
working (for pay)	18.6	16.7	60.5	43.8
partying	16.7	18.5	30.4	11.9
socializing with friends	63.9	68.9	76.7	7.8
exercising or sports	35.2	41.2	48.7	7.5
household/child care duties	11.0	9.2	13.6	4.4
talking w/teacher outside class	7.5	7.0	4.9	-2.1
reading for pleasure	25.3	21.0	11.8	-9.2
studying or doing homework	68.4	68.8	36.8	-32.0
ABOUT THE STUDENTS' FUTURE PLANS				
Highest Degree Planned Anywhere				
associate (A.A. or equivalent)	2.3	0.6	5.5	4.9
bachelor's (B.A., B.S.)	19.8	14.9	26.8	11.9
master's (M.A., M.S.)	42.2	40.5	37.1	-3.4
Ph.D. or Ed.D	24.3	27.0	13.8	-13.2
Residence Planned During Fall 1994				
with parents or relatives	9.9	12.0	26.0	14.0
fraternity or sorority house	0.2	0.1	0.5	0.4
other private home, apt, room	23.1	6.2	6.1	-0.1
other	4.3	1.1	0.9	-0.2
other campus housing	3.7	2.4	1.6	-0.8
college dormitory	58.9	78.1	64.9	-13.2
Probable Major Field of Study				
Professional	7.6	9.3	18.7	9.4
Education	4.5	3.6	9.9	6.3
Other Fields	5.3	2.9	7.4	4.5
Undecided	2.1	4.5	7.6	3.1
Technical	1.4	1.4	3.5	2.1
Computer Science	4.1	3.3	1.9	-1.4

5.0(cont.)

THE CIRP FRESHMAN SURVEY

	Foreign Transfer Students	Foreign New Students	U.S. New Students	Foreign-U.S. Gap
Biological Sciences	5.4	8.3	6.5	-1.8
Physical Sciences	2.6	4.2	2.4	-1.8
Arts and Humanities	15.0	11.9	9.0	-2.9
Social Sciences	12.7	12.9	9.1	-3.8
Engineering	12.5	12.4	8.1	-4.3
Business	26.8	25.2	16.0	-9.2
Probable Career Occupation				
nurse	0.9	0.9	5.2	4.3
other career	6.5	5.1	9.4	4.3
teacher (elementary)	1.3	1.4	5.3	3.9
therapist (phys/occup/speech)	1.3	1.2	4.2	3.0
teacher (secondary)	3.1	1.8	3.7	1.9
scientific researcher	3.8	3.4	1.7	-1.7
engineer	9.7	9.8	7.1	-2.7
foreign service worker	3.7	3.3	0.6	-2.7
physician	2.4	8.3	5.5	-2.8
business owner or proprietor	8.5	7.1	2.5	-4.6
business executive (management)	16.2	16.3	6.9	-9.4
Student's Estimate: Chances Are Very Good That He/She Will				
get job to pay expenses	19.1	20.7	38.7	18.0
partic in religious activities	10.9	12.0	16.6	4.6
marry while in college	3.9	1.8	5.9	4.1
work full-time while attending	4.7	2.5	5.5	3.0
need extra time for degree	8.3	5.8	8.4	2.6
partic in volunteer/cmty svcs	14.4	19.7	17.3	-2.4
make at least "B" average	51.3	50.4	46.4	-4.0
graduate with honors	27.3	23.4	16.2	-7.2
get bachelor's degree	75.7	76.9	65.7	-11.2
Objectives Considered to Be Essential or Very Important				
raise a family	61.4	63.4	70.6	7.2
be very well off financially	64.2	67.8	73.7	5.9
have admin responsibility	42.5	42.7	39.0	-3.7
write original works	17.5	16.3	12.6	-3.7
achieve in a performing art	15.6	15.5	11.1	-4.4
obtain recog from colleagues	56.9	57.7	53.2	-4.5
keep up to date with politics	35.5	36.6	31.9	-4.7
help others in difficulty	62.7	67.1	61.7	-5.4
create artistic work	19.3	17.7	12.3	-5.4
participate in community action	30.1	30.6	24.4	-6.2
be involved in environ clean-up	35.3	32.7	24.3	-8.4
theoretical contrib to science	24.7	25.7	16.8	-8.9
develop philosophy of life	54.7	53.3	42.7	-10.6
promote racial understanding	46.7	48.2	35.8	-12.4
be successful in own business	60.3	59.3	40.9	-18.4

About Students' Future Plans

The educational aspirations of foreign freshmen are in general higher than those of incoming American students. A greater proportion of foreign students plan on earning a graduate degree than do Americans. During the upcoming year a greater percentage of U.S. students naturally enough plan to live with parents or relatives. Foreign students are proportionally more likely to follow a major in business, engineering and the sciences than are American students. Americans are more likely to look to professional majors including education than are foreign students. Reflecting their field of study choices, foreign students are more likely than Americans to be planning a career in business, medicine, engineering or science than Americans. A larger proportion of foreign students believe they will complete a bachelor's degree, graduate with honors or make at least a B average than do U.S. students. Americans look forward to getting a job to pay expenses and attending religious activities.

When asked about future objectives American incoming freshmen appear to have a very narrow focus. The only areas where they proportionally exceed foreign students are in response to the items for raising a family and becoming financially secure. In all other areas foreign students report proportionally greater interest. This range includes artistic and political endeavors, community involvement, science and business.

THE STUDENT SATISFACTION REPORT

The 1996 International Student Satisfaction Report is part of a comprehensive national student satisfaction study conducted annually since 1993 by USA Group Noel-Levitz. The data represent 346 institutions that utilized the Student Satisfaction Inventory. 3,709 students identified themselves as international students at these institutions. This extract was drawn from the 1996 National Student Satisfaction Report. The national data included four-year public and private, and two-year institutions that utilized the Student Satisfaction Inventory with all or part of their student body. The student populations by institutional type include 44,815 from the four-year public; 66,177 from the four-year private; and 46,262 from the two-year institutions. At the request of *Open Doors* the analysis of this national survey was conducted by Dr. Lana Low who is vice president for retention and assessment services at USA Group Noel-Levitz. The presentation of the findings was completed by *Open Doors*. Campus officials interested in more information about the Student Satisfaction Inventory may contact USA Group Noel-Levitz at 1-800-876-1117.

WHAT EXPECTATIONS ARE MOST IMPORTANT TO INTERNATIONAL STUDENTS?

The five statements of expectation rated as most important by international students were as follows.

Four-Year Private Institutions:

1. Content of courses within my major is valuable.
2. Instruction in my major field is excellent.
3. Campus is safe and secure for all students.
4. The quality of instruction in most classes is excellent.
5. Nearly all faculty are knowledgeable in their fields.

Four-Year Public Institutions:

1. Content of courses within my major is valuable.
2. I am able to register for classes I need with few conflicts.
3. My academic advisor is knowledgeable about requirements in my major.
4. My academic advisor is approachable.
5. Computer labs are adequate and accessible.

Two-Year Institutions:

1. The quality of instruction in most classes is excellent.
2. Classes are scheduled at times that are convenient.
3. Good variety of courses provided on this campus.
4. Campus is safe and secure for all students.
3. My academic advisor is knowledgeable about requirements in my major.

WHAT EXPECTATIONS ARE MOST SATISFYING TO INTERNATIONAL STUDENTS?

The statements of expectation rated as most satisfying by international students were as follows.

Four-Year Private Institutions

1. Library staff are helpful and approachable.
2. My academic advisor is approachable.
3. Nearly all faculty are knowledgeable in their fields.
4. Campus is safe and secure for all students.
5. Faculty are available after class and during office hours.

Four-Year Public Institutions

1. Library staff are helpful and approachable.
2. Campus is safe and secure for all students.
3. Nearly all faculty are knowledgeable in their fields.
4. My academic advisor is knowledgeable about requirements in my major.
5. Content of courses within my major is valuable.

Two-Year Institutions

1. The quality of instruction in most classes is excellent.
2. Students are made to feel welcome on this campus.
3. Campus is safe and secure for all students.
4. My academic advisor is approachable.
5. Classes scheduled at times that are convenient.

The Instrument

The Student Satisfaction Inventory, by which the data were collected, consists of over 70 items that cover the full range of college experiences. Each item is expressed as a statement of expectation. Each statement includes a rating scale of 1 to 7. Students are asked to rate the level of importance they assign to the expectation as well as their level of satisfaction that the expectation is being met. The inventory findings are then presented with three scores for each item: an importance score, a satisfaction score, and a performance gap score that is calculated by subtracting the satisfaction score from the importance score. A large performance gap score on an item indicates that the institution is not meeting the expectation.

Specifically, this study examines three areas. First, it describes the most important expectations to international students. Second, it notes the most satisfied expectations for international students. Finally, a comparison of unmet expectations for both U.S. and international students at four-year-public and private institutions and two-year institutions is presented.

Where Are Campuses Failing to Meet the Expectations of International Students?

The performance gap takes into consideration both the importance score and the satisfaction score by generating a discrepancy score. When the student's level of satisfaction is subtracted from the strength of the student's expectation, the result is a performance gap or unmet expectation. The scales provide a global summary of student responses by grouping items statistically and conceptually into 12 key areas. The following tables summarize the performance gap findings for international students and U.S. students at four-year public and private, and two-year institutions.

Unmet Expectations: International Student Results

International students enrolled across all institutional types had generally larger performance gaps than did most students. In 11 of the 12 areas, international students at four-year private institutions had greater unmet expectations than did the national sample. Only in the area of safety and security were the concerns of international students exceeded by those of students in the national sample.

5.1

PERFORMANCE GAP AT FOUR-YEAR INSTITUTIONS

	International Students		All Students	
Scale	four-year private	four-year public	four-year private	four-year public
academic advising/counseling	1.15	1.43	0.99	1.33
campus climate	1.23	1.26	1.10	1.28
campus life	1.23	1.41	1.05	0.91
campus support services	1.23	1.38	1.02	1.12
concern for the individual	1.22	1.46	1.05	1.37
instructional effectiveness	1.26	1.45	1.07	1.29
recruitment and financial aid	1.41	1.55	1.30	1.50
registration effectiveness	1.26	1.49	1.23	1.48
safety and security	1.42	1.69	1.61	1.94
service excellence	1.19	1.36	1.10	1.36
student centeredness	1.15	1.36	1.01	1.22

5.2 PERFORMANCE GAP AT TWO-YEAR INSTITUTIONS

Scale	International students	All students
academic advising/counseling	1.14	1.04
academic services	1.08	0.92
admissions and financial aid	1.11	1.04
campus climate	0.90	0.86
campus support services	0.74	0.64
concern for the individual	1.05	1.01
instructional effectiveness	0.96	0.92
registration effectiveness	0.89	0.89
safety and security	1.15	1.28
service excellence	0.90	0.88
student centeredness	0.83	0.75

Among international students enrolled in four-year public institutions, the unmet expectations were greater in eight areas than were those of students in the national sample. In the areas of campus climate and safety and security, the unmet expectations of the national group exceeded those of international students. For two-year international students, a similar pattern was noted. For these students, unmet expectations were greater in nine of twelve areas than were those of students in general. The performance gap reported by the national sample exceeded that for international students only in the area of safety and security.

Summary

It can be argued that successful institutions tend to share three basic attributes. They focus on the needs of their students, they continually improve the quality of the educational experience, and they use assessment results to shape their future directions. What can be inferred from the findings presented by the CIRP and Noel-Levitz surveys? In brief we have learned that international students are quite different from U.S. students in a variety of ways that affect their experience of American higher education. They come from backgrounds that have generally prepared them more completely for academic work than have the American students' backgrounds. They look to the collegiate experience hoping for broad intellectual growth as well as high level career preparation. Their behavior and attitudinal predisposition may have built very high expectations for a strong academic experience. Particularly important for these demanding students are the support services (library) and faculty accessibility. These are students who are focused on their studies first. Ultimately, students whose needs are actively addressed by their institution are more likely to be successful in achieving their educational goals and are more likely to graduate than others. For institutions interested in maintaining their international student populations, and for states concerned about global competitiveness, attention to teaching, learning and the support of academics are the margin of success.

6

U.S. DISTRIBUTION

Foreign Student Totals in U.S. Counties, Regions and States

- While international students are found in great numbers throughout the United States, they appear to be aggregated in clusters around major metropolitan areas. When foreign student enrollments are displayed by county, it becomes apparent that a mere handful of cosmopolitan cities attracts the bulk of international students.
- After the Northeast, Midwestern states host more students than any other region, and the South currently hosts more students than the Pacific West Coast. Because the increase in the total international student population was minimal (0.3%) this year, the regional changes were accordingly minimal.
- The states enrolling the most international students are California (55,799), New York (47,987), Texas (27,883), Massachusetts (25,739), Illinois (19,408) and Florida (18,982). New York and California have consistently hosted the largest numbers of foreign students. California has had the highest enrollments since the late 1950s. Massachusetts, third in international enrollments in the mid-1950s, lost ground in the 1960s when more foreign students headed for Michigan and Illinois.
- International student enrollments in Texas are down 3.5% this year. Texas' loss of internationals may be due in part to the decline in the number of Mexicans coming to this country for study. In recent years Texas' international student population has been roughly 11% Mexican.

6.0

FOREIGN STUDENTS IN U.S. REGIONS AND STATES, SELECTED YEARS

State/Region	1959/60	1969/70	1979/80	1989/90	1994/95	19995/96	% Change from 1994/95
Alaska	0	73	185	364	517	524	1.4
California	6,457	22,170	47,621	54,178	55,685	55,799	0.2
Hawaii	151	1,927	2,653	4,190	5,648	5,801	2.7
Oregon	638	2,312	4,853	6,403	6,563	6,704	2.1
Washington	1,031	3,238	6,717	6,858	10,517	10,257	-2.5
Pacific Totals	**8,277**	**29,720**	**62,029**	**71,993**	**78,930**	**79,085**	**0.2**
Colorado	672	1,460	4,184	4,681	6,174	6,349	2.8
Idaho	160	500	989	1,150	1,511	1,457	-3.6
Montana	162	324	401	770	1,135	1,056	-7.0
Nevada	12	109	521	783	1,804	1,712	-5.1
Utah	741	1,915	3,493	4,862	6,642	6,477	-2.5
Wyoming	63	282	435	527	561	489	-12.8
Mountain Totals	**1,810**	**45,90**	**10,023**	**12,773**	**17,904**	**17,540**	**-2.0**
Illinois	2,890	7,795	12,218	16,816	19,173	19,408	1.2
Indiana	1,819	3,230	5,499	7,575	8,835	8,981	1.7
Iowa	776	1,285	4,010	6,735	7,713	7,144	-7.4
Kansas	800	2,005	4,479	6,009	7,268	7,093	-2.4
Michigan	3,259	6,774	10,559	13,555	15,772	16,284	3.2
Minnesota	1,473	2,577	4,142	5,446	6,657	6,777	1.8
Missouri	996	2,896	4,712	6,620	8,755	8,612	-1.6
Nebraska	358	601	1,517	1,918	3,042	3,138	3.2
North Dakota	211	616	512	1,341	1,830	1,519	-17.0
Ohio	1,550	4,121	8,672	13,856	15,733	16,161	2.7
South Dakota	113	262	486	758	931	941	1.1
Wisconsin	1,199	3,450	4,088	6,438	7,354	7,342	-0.2
Midwest Totals	**15,444**	**35,612**	**60,894**	**87,067**	**103,063**	**103,400**	**0.3**
Alabama	311	551	3,220	4,513	5,258	4,873	-7.3
Arkansas	107	235	1,328	1,710	2,848	2,707	-5.0
Delaware	38	311	447	1,003	1,488	1,597	7.3
District of Columbia	2,020	3,949	8,499	9,487	9,045	9,489	4.9
Florida	730	6,939	11,919	20,364	19,228	18,982	-1.3
Georgia	416	1,258	4,472	5,980	7,835	8,859	13.1
Kentucky	293	734	2,208	2,543	3,611	3,667	1.6
Louisiana	815	1,720	5,546	5,535	6,014	5,466	-9.1
Maryland	542	1,670	4,266	6,952	8,457	8,554	1.1
Mississippi	130	387	1,704	1,941	2,183	2,074	-5.0
North Carolina	628	1,594	3,709	5,764	6,106	6,263	2.6
South Carolina	185	368	1,484	2,381	3,093	2,838	-8.2
Tennessee	450	1,295	4,499	4,247	4,822	4,997	3.6
Virginia	275	662	3,374	6,970	8,722	9,164	5.1
West Virginia	118	226	1,453	1,417	1,933	1,819	-5.9
South Totals	**7,058**	**21,899**	**58,128**	**80,807**	**90,640**	**91,349**	**0.8**

■ Perhaps the most dramatic shift came in the late 1960s, when Florida became the fourth most populous state in terms of foreign students; in 1965 it was not even among the top ten. While this initial jump was fueled by arriving refugees from Cuba (first included in the Census in 1967), subsequent growth in Florida's international student population was sustained by enrollments from around the world and especially from the Caribbean and South America. Texas, eighth in 1969/70, leaped to third place a short five years later and drew even more students than New York by the late 1970s, falling again to third place in the following years.

6.0 (cont.)

FOREIGN STUDENTS IN U.S. REGIONS AND STATES, SELECTED YEARS

State/Region	1959/60	1969/70	1979/80	1989/90	1994/95	1995/96	% Change from 1994/95
Arizona	310	1,134	3,798	6,763	7,858	8,916	13.5
New Mexico	515	481	1,240	1,399	1,808	1,724	-4.6
Oklahoma	717	1,554	8,464	5,989	8,064	8,695	7.8
Texas	1,574	4,902	24,416	24,170	28,903	27,883	-3.5
Southwest Totals	**3,116**	**8,071**	**37,918**	**38,321**	**46,556**	**47,218**	**1.4**
Connecticut	573	1,314	2,847	4,636	5,869	6,099	3.9
Maine	84	262	307	902	1,334	1,240	-7.0
Massachusetts	3,136	6,352	12,607	20,840	25,929	25,739	-0.7
New Hampshire	102	356	501	1,262	1,867	1,928	3.3
New Jersey	583	1,738	4,767	9,608	9,701	9,306	-4.1
New York	6,069	17,701	23,509	38,350	47,510	47,987	1.0
Pennsylvania	1,734	5,248	8,919	15,803	18,133	17,897	-1.3
Rhode Island	191	635	949	1,858	2,886	2,990	3.6
Vermont	136	222	702	1,206	860	815	-5.2
Northeast Totals	**12,608**	**33,828**	**55,108**	**94,465**	**114,092**	**114,001**	**-0.1**
Guam	—	113	589	473	353	341	-3.4
Puerto Rico	156	1,049	628	633	717	624	-13.0
Virgin Islands	—	104	130	319	199	229	15.1
Other Totals	**156**	**1,266**	**1,347**	**1,425**	**1,269**	**1,194**	**-5.9**
U.S. TOTAL	**48,486**	**134,959**	**286,343**	**386,851**	**452,635**	**453,787**	**0.3**

METROPOLIS

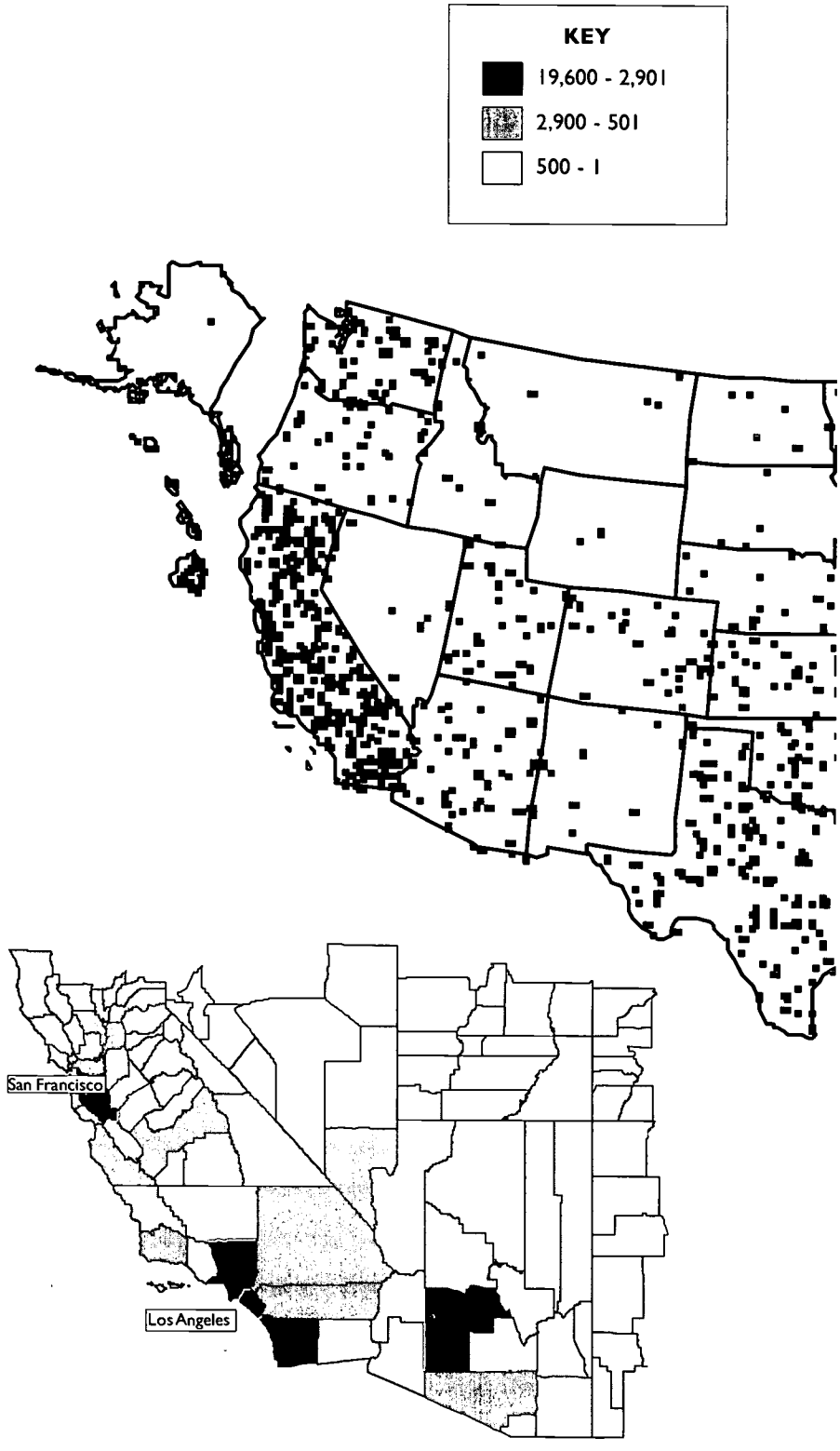
Nearly 25% of all international students are enrolled in universities and colleges located in just ten U.S. counties.

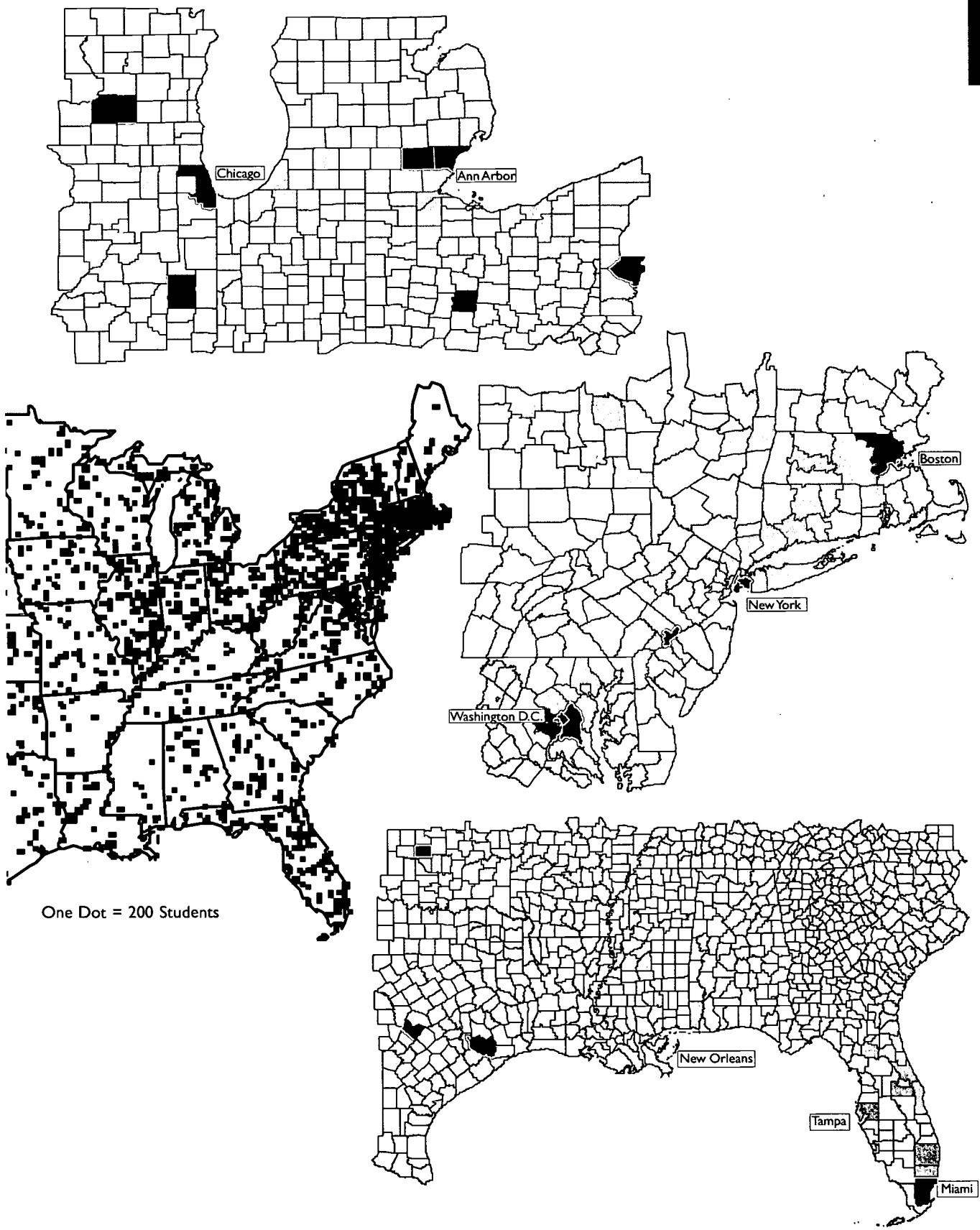
About half of all international students are enrolled in just 50 of the over 3,100 counties in the United States. These global centers of finance, information, technology, media, services and education, and these industries are crucial to the emerging global economy. The presence of international students in these cities reflects the importance of these metropoles for this country and suggests at least one of the means by which these cities will further extend their global reach. Foreign students are part of the boundary blurring that occurs in these metropolitan regions between cultures, ideologies and fields of inquiry.

While Los Angeles County is the leading county in terms of international students (19,510), New York City is the world capital of international education, with over 25,000 students studying in the city's five boroughs.

6.a

DISTRIBUTION OF INTERNATIONAL STUDENTS, 1995/96




Chicago
Ann Arbor
Boston
New York
Washington D.C.
New Orleans
Tampa
Miami
One Dot = 200 Students

6.1

LEADING COUNTIES, 1995/96

Rank	County	State	Number of Students
1	Los Angeles	California	19,510
	New York	New York	19,377
	Suffolk	Massachusetts	10,571
	District of Columbia	District of Columbia	9,930
	Cook	Illinois	9,735
	Middlesex	Massachusetts	8,303
	Philadelphia	Pennsylvania	6,772
	Dade	Florida	6,131
	Maricopa	Arizona	5,649
10	Honolulu	Hawaii	5,566
	Harris	Texas	5,518
	San Francisco	California	5,462
	Santa Clara	California	5,023
	King	Washington	4,954
	San Diego	California	4,638
	Franklin	Ohio	4,455
	Washtenaw	Michigan	4,443
	Orange	California	4,421
	Dane	Wisconsin	4,039
20	Allegheny	Pennsylvania	4,019
	Travis	Texas	3,808
	Champaign	Illinois	3,328
	Alameda	California	3,246
	Kings	New York	3,237
	Fairfax	Virginia	3,141
	Prince George's	Maryland	3,082
	Oklahoma	Oklahoma	3,041
	Wayne	Michigan	2,970
	Erie	New York	2,968
30	Hennepin	Minnesota	2,954
	Queens	New York	2,903
	Fulton	Georgia	2,845
	Tompkins	New York	2,791
	Pima	Arizona	2,751
	Ingham	Michigan	2,739
	Middlesex	New Jersey	2,640
	Utah	Utah	2,630
	Tippecanoe	Indiana	2,589
	Dallas	Texas	2,587
40	Brazos	Texas	2,572
	Nassau	New York	2,512
	Centre	Pennsylvania	2,466
	Cuyahoga	Ohio	2,428
	Story	Iowa	2,413
	Essex	New Jersey	2,410
	Alachua	Florida	2,389
	Providence	Rhode Island	2,344
	Monroe	Indiana	2,340
	Hampshire	Massachusetts	2,337
50	Lane	Oregon	2,324

7

The Primary Sources of Funding and Estimated Expenditures of Foreign Students

THE ECONOMICS OF EXCHANGE

- Over two-thirds (68%) of all foreign students receive most of their funding for U.S. study from personal and family sources, and over three-quarters (76%) receive most of their funding from sources outside the United States.
- The most significant source of funding from within the United States for foreign students, especially foreign graduate students, is the institution the student attends. Colleges and universities in the United States provide the bulk of funding for 16.5% of the students, more than twice as much as all other U.S. sources combined. The U.S. government provides support directly for only 1% of foreign students, but indirectly for many more through grants to U.S. campuses. The college or university provides primary funding for about 34% of foreign graduate students, though much of that funding comes originally from the U.S. government, foundations or other sources.
- Since 1979/80 the most important changes in funding sources for foreign students have been the increased support by U.S. universities and the drop in support by foreign governments. U.S. institutions now support 16.5% of foreign students compared with 9.2% 16 years ago. Sixteen years ago foreign governments supported 13.0% of foreign students compared with the 5.2% supported this year.
- When interpreting primary-source-of-funds data, it should be kept in mind that U.S. colleges and universities are likely to be best informed about the contributions of their own funds and thus the percentage receiving primary support from these institutions may be overstated. The proportion of students receiving major support directly from the U.S. government understates its overall contributions, since government funds are often channelled through a number of programs or awarded directly to a U.S. campus.

7.0

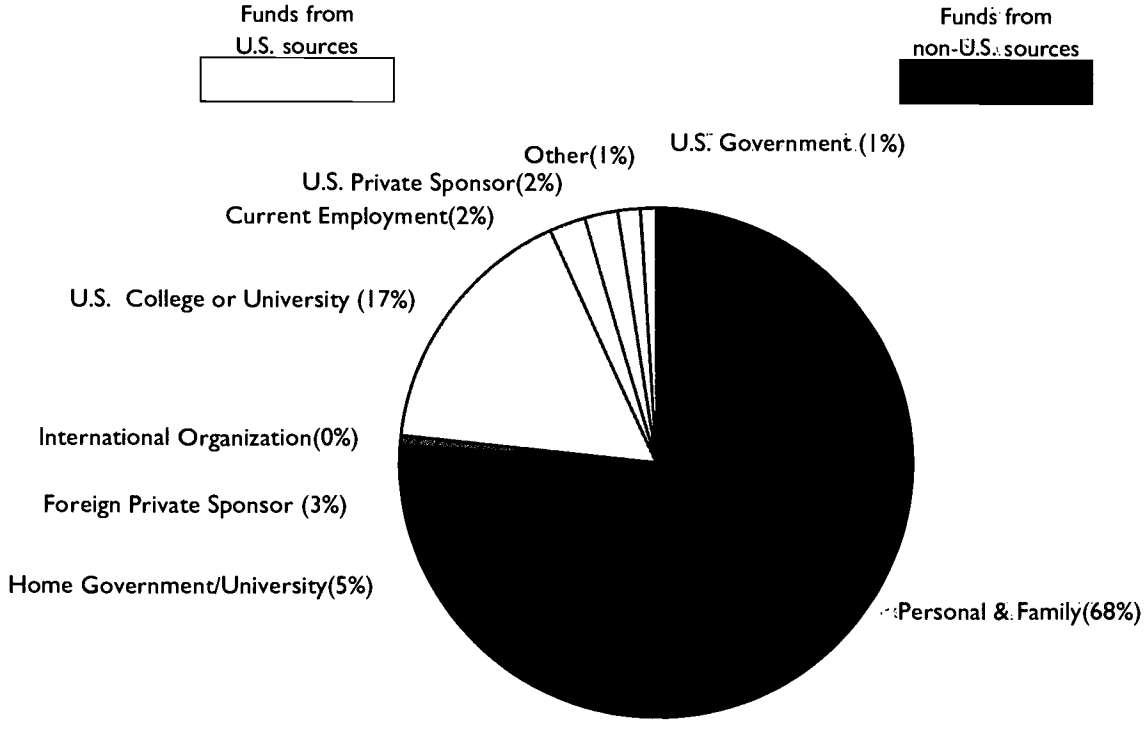
FOREIGN STUDENTS BY PRIMARY SOURCE OF FUNDS, 1994/95 and 1995/96

Primary Source of Funds	1994/95 Foreign Students	% of Total	1995/96 Foreign Students	% of Total	% Change
Personal & Family	309,557	68.4	307,622	67.8	-0.6
U.S. College or University [1]	74,640	16.5	75,056	16.5	0.6
Home Govt/University	23,944	5.3	23,778	5.2	-0.7
Foreign Private Sponsor	11,271	2.5	13,296	2.9	18.0
Current Employment	9,867	2.2	10,573	2.3	7.2
U.S. Private Sponsor	9,913	2.2	9,620	2.1	-3.0
U.S. Government [1]	5,386	1.2	4,538	1.0	-15.7
International Organization	2,218	0.5	2,859	0.6	28.9
Other Sources	5,839	1.3	6,444	1.4	10.4
Total	**452,635**	**100.0**	**453,787**	**100.0**	**0.3**

7.a

FOREIGN STUDENTS BY PRIMARY SOURCE OF FUNDS, 1995/96

A full three-quarters of the international students in the United States receive their primary source of support from non-U.S. sources.



[1] U.S. government grants refer only to those awarded directly to the student; other U.S. government funds may be received indirectly through grants to U.S. universities.

7.1

PRIMARY FUNDING SOURCE WITHIN ACADEMIC LEVEL, 1995/96

At the undergraduate level, eight in ten international students receive their primary support from personal and family funds, but at the graduate level the figure is below 50%.

Primary Source of Funds	Under-graduate	Graduate	Other
Personal & Family	80.5	49.0	62.7
U.S. College or University [1]	6.9	33.9	5.9
Home Govt/University	4.7	6.3	4.1
U.S. Government [1]	0.8	1.4	0.7
Private U.S. Sponsor	2.3	1.9	1.5
Foreign Private Sponsor	2.8	3.4	1.6
Current Employment	0.3	1.2	22.0
International Organization	0.4	1.1	0.6
Other Sources	1.3	1.8	1.1
Total	**100.0**	**100.0**	**100.0**

[1] U.S. government grants refer only to those awarded directly to the student; other U.S. government funds may be received indirectly through grants to U.S. universities.

Primary Source of Funds by Academic Level

- More than eight of every ten international undergraduates (80.5%) draw the bulk of their funding for study from personal and family resources. Less than 7% are funded by any other single source: 6.9% are supported mainly by the U.S. college or university they attend and 4.7% are financed by their home government or university. The U.S. government provides support directly for 0.8% of foreign undergraduates studying in this country.
- Almost half of the foreign graduate students draw the major part of their funding for study in this country from personal and family sources (49%). This proportion is much lower than the proportion of undergraduates who rely primarily on personal and family funds (80.5%).

- Undergraduate and graduate international students also differ in the shares receiving primary support from the schools they attend. While only 6.9% of undergraduates receive the bulk of their funding from U.S. colleges and universities, 33.9% of foreign graduate students receive their primary support from this source, largely in the form of teaching or research assistantships. The U.S. government provides the primary support directly for 1.4% of foreign graduate students studying in this country, and indirectly to many more through research grants to U.S. campuses.

7.2

FOREIGN STUDENTS BY PRIMARY SOURCE OF FUNDS, SELECTED YEARS, 1979/80 - 1995/96
How the primary sources of support have changed since 1979.

Primary Source of Funds	1979/80 % of Total	1984/85 % of Total	1989/90 % of Total	1993/94 % of Total	1994/95 % of Total	1995/96 % of Total
Personal & Family	65.4	66.2	63.7	65.0	68.4	67.8
U.S. College or University	9.2	11.6	18.2	18.3	16.5	16.5
Home Govt/University	13.0	12.0	6.7	5.3	5.3	5.2
Foreign Private Sponsor	3.0	3.0	2.2	2.4	2.5	2.9
U.S. Private Sponsor	1.9	1.9	3.1	2.5	2.2	2.1
Current Employment	2.7	2.1	2.1	2.5	2.2	2.3
U.S. Government	2.0	2.1	2.2	1.3	1.2	1.0
International Organization	NA	NA	0.6	0.5	0.5	0.6
Other Sources	2.8	1.1	1.2	2.2	1.3	1.4
Total	**100.0**	**100.0**	**100.0**	**100.0**	**100.0**	**100.0**

7.3

FUNDING BY CARNEGIE CLASSIFICATION, 1995/96

Undergraduate Source	Research I&II	Doctoral I&II	Master's I&II	Liberal Arts I&II	Community College
Personal & Family	78.0	65.9	83.3	70.4	86.0
U.S. College or University	8.1	9.1	6.2	20.6	0.8
Home Govt/University	7.4	8.2	5.2	3.4	2.2
U.S. Government	0.6	1.2	0.8	0.7	0.9
Private U.S. Sponsor	1.6	2.8	2.0	2.1	3.2
Foreign Private Sponsor	1.7	3.8	1.5	1.2	5.7
Current Employment	0.2	0.5	0.4	0.0	0.5
International Organization	0.5	0.3	0.4	0.3	0.2
Other Sources	1.8	8.1	0.1	1.2	0.4

Graduate Source	Research I&II	Doctoral I&II	Master's I&II	Liberal Arts I&II
Personal & Family	41.1	45.0	77.1	63.3
U.S. College or University	41.0	35.2	12.3	21.9
Home Govt/University	7.2	6.5	3.2	4.2
U.S. Government	1.6	1.3	1.2	0.0
Private U.S. Sponsor	1.2	2.1	2.5	3.4
Foreign Private Sponsor	3.8	3.3	2.0	3.7
Current Employment	1.3	1.3	0.8	1.1
International Organization	1.2	0.8	0.7	0.5
Other Sources	1.7	4.5	0.3	2.1

Primary Source of Funds by Carnegie Classification

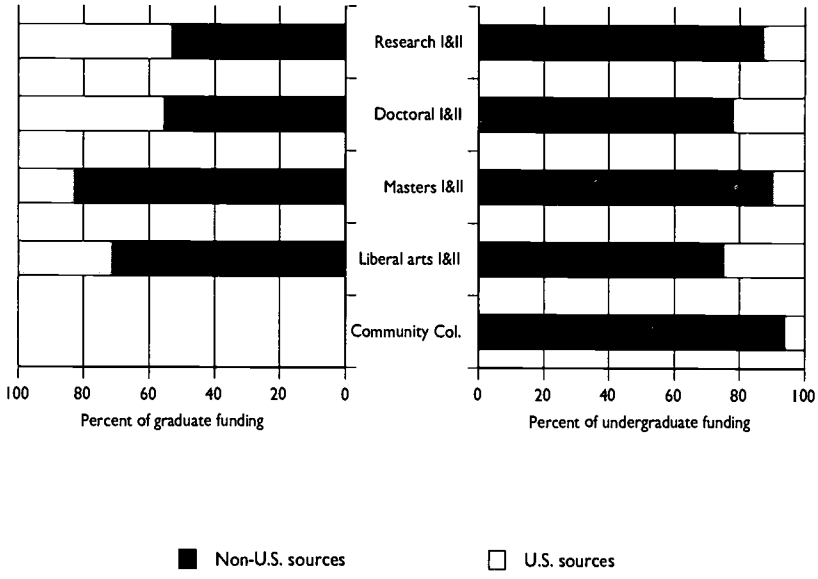
- The pattern of support for foreign undergraduates appears generally similar across different types of institutions by Carnegie Classification. (See Section 8 for a description of the Carnegie Classification scheme.) The bulk of student support comes from personal and family sources in all types of institutions.
- Despite this basic similarity there are several apparent differences between institutional types. Community college students receive the largest share of support across institutional types from personal sources (86%) as well as from U.S. private sponsors (3.2%). Liberal arts institutions provide the largest proportion of undergraduate student support from institutional sources (20.6%).
- At the graduate level, students attending doctoral and research institutions receive the greatest proportion of support from home governments: 7.2% and 6.5% respectively.

- At the graduate level there are important differences between the institutional types in the sources of financial support for foreign students. At research institutions an equal proportion of foreign students receives primary support from their university (41%) and from personal or family sources (41.1%). Just over half of foreign graduate students attending research institutions receive their primary source of support from non-U.S. institutions. Students at master's institutions, in general, provide their own support from personal sources (77%) while 12.3% receive primary support from their institution.

- Generally, across Carnegie types at least 75% of foreign undergraduates (and typically more) receive their primary source of support from non-U.S. sources. At the graduate level, the level of non-U.S. support is considerably lower. While undergraduate funding patterns are relatively similar, considerable variation in the sources of primary support exists at the graduate level by institutional type.

7.b

FUNDING BY CARNEGIE CLASSIFICATION, 1995/96
Across Carnegie types, the percentage of graduate students receiving their primary support from non-U.S. sources is considerably lower than undergraduates.



The Head of the Class?

ROGER PRESTWICH

Minnesota Trade Office, St. Paul, MN

ON April Fool's Day this year, *Business Week's* editorial lamented that students in the United States continue to underperform their counterparts in other major industrial nations. On June 17, a newly released international study of literacy levels prompted U.S. Education Secretary Richard Riley to pronounce that: The United States is second in the world... when it comes to literacy. International comparisons of test scores in literacy, math and science do not always compare apples with apples and great care is needed in their interpretation. However, many domestic surveys have illustrated the low standards of U.S. students and adults in world geography and foreign languages. This suggests that we are not terribly committed to learning much about the world at large. The United States is the richest, most powerful nation in the world. It has achieved this enviable position with the majority of the population managing to survive daily life with very little knowledge or understanding of the rest of the world.

How well informed do we, as politicians, businesspeople and citizens, need to be about the world outside our borders? First, we need to appreciate where the United States stands relative to other nations–the facts and figures. Second, we need to understand much more about those nations and about our relationships with them if we are to avoid flawed decision-making based on insufficient or inaccurate information. We must also recognize that copious quantities of quality information do not guarantee good decision-making. The latter requires the capacity, under a wide variety of circumstances, to interpret, evaluate, understand and act appropriately when making decisions. This in turn demands ability honed by training and experience.

What can states do to assist those in business? The Minnesota Trade Office provides a broad mix of practical export training for the international business community to prepare them for dealing with businesses in other countries and cultures. The Office offers courses ranging from the three-day intensive Export Tools & Techniques to one-day conferences on doing business in a specific market. We offer about 100 of these types of programs and draw an average of 5,000 participants a year.

Continued...

The Head of the Class?

...Continued

Admittedly, in the short run, The Businessperson's Guide to Country X will provide quick and dirty coverage of key business culture characteristics, and more detail is available through intensive international business education programs. In the intermediate run, there are advanced degree programs that address many of the concerns that we might have regarding an international assignment. The Minnesota World Trade Center Corporation, a Minnesota Trade Office affiliate, provides nine- and ten-session programs for export program administrative staff and international business executives.

While meeting the more immediate needs of working in the global village, these shorter term solutions are only a partial answer. This is not an international awareness issue of significance only to government and business types. It affects everyone–and all of us should be walking onto the global playing field far better informed about the game, the rules, and the field itself than we are at present. The implications of this statement are enormous. The entire school-college curriculum needs to be internationalized so that we produce citizens knowledgeable about, and comfortable with, a wide range of peoples and nations. Specialized higher level programs could then cater to the career needs of individuals with specialized concerns.

Setting national educational goals for the year 2000 in this respect is misleading. The time-frame is far too short and relatively little meaningful progress can be achieved in so little time. Internationalizing the curriculum means more than introducing a few unintegrated courses or experiences into the school year. It means re-writing text-books, re-training teachers and re-thinking our entire set of expectations about what our graduates need to know about the world. This is radical surgery and not a band-aid fix.

Just getting by will not cut it. We will have to strive for excellence. If we have the foresight and courage to proceed with such an enormous task, perhaps a world class workforce can be created. The internationalization of our educational system may take at least a generation. The year 2020 offers a more realistic target for educational renewal than the year 2000. A retrospective view from then may demonstrate that our nation's vision of a population with a truly global perspective was finally coming into sharper focus. By then, maybe we will truly be valedictorian of the world class.

Roger Prestwich is the education program director at Minnesota Trade Office, a division of the Minnesota Department of Trade and Economic Development. He is also an adjunct faculty member at the Graduate School of Business, University of St. Thomas.

ESTIMATING THE INESTIMABLE AND APPROXIMATING THE APPROXIMATE:

How Solid is Solid Ground?

As interest in the role of education as a service export has grown, so too has interest grown in the kind of economic contribution that foreign students make to the U.S. domestic economy. Last year *Open Doors 1994/95* presented an analysis of the expenditures that foreign students make for both costs of living and tuition expenses. Our nearly 7 billion dollar figure conformed well to similar estimates by the Department of Commerce. All estimates of these kinds of economic impact are built upon assumptions and samples. It serves us well to consider the limitations of these estimates.

First, it is very difficult for either campus officials or students to untangle the complex mix of financial sources that are used to pay for a college education. Typically a broad mix of sources including personal and grant-based are tapped. Most financial aid data is not shared widely across a campus and for privacy reasons is not shared when individuals might be identified.

Second, how questions about finances are asked in national surveys may affect the conclusions drawn. IIE has asked reporting campus officials to indicate foreign students' "primary source of support." The National Research Council in its Survey of Earned Doctorates asks individual students to indicate their "primary and secondary" sources of support as well as "all sources from which support was received." The CIRP survey asks individual entering freshmen for a dollar estimate of educational expenses received from a list of about 20 possible sources. CIRP then aggregates this data. CIRP reports both the percentages of students receiving any aid and the percentage of students reporting $1,500 or more from a particular source.

Third, the *Open Doors* survey was designed to provide nationally aggregated estimates. Unfortunately there is considerable variation in support source by nationality, field of study, academic level, and institutional type. For the past three years *Open Doors* has presented financial support data by academic level and institutional type (see Table 7.2). For particular subgroups the nationally aggregated estimates will be misleading. For example the proportion of engineering graduate students enrolled in research institutions will have a much larger proportion of their support provided for by university and government sources than the national estimates will suggest.

Fourth, and finally, this is simply difficult data to obtain from either campus officials or individuals. As *Open Doors* has reported in past years (see Table 12.2, p. 155) the response rate to this particular item has consistently been below 45%. We take this as a reflection of the gaps in data sharing among campus offices along with problems in data definition. The National Research Council which surveys individual doctoral graduates (a much smaller respondent pool) about their support sources has obtained higher response rates to the financial item (about 69% in 1994).

We recognize the limitations on the *Open Doors* data. It is encouraging that the CIRP data set for foreign first time students and the NRC data for 1994 doctoral graduates generally conforms with the broad estimates obtained through the *Open Doors* survey. The CIRP survey clearly suggests that parents are the primary source of support for most entering freshmen. If support from savings is taken into account, then personal and family sources far exceed those from the college or university. The NRC data for graduating doctoral students also generally conforms to the *Open Doors* estimates for graduate students at research institutions. Summaries of both surveys are included here for comparison.

7.4

SOURCES FOR EDUCATIONAL EXPENSES, FIRST TIME FRESHMEN: CIRP SURVEY, 1994

Source	% Received Any Aid From	% Received $1,500 or More From
parents or family	85.3	75.8
other college grant	28.2	24.6
other college loan	7.2	5.7
other savings	13.4	5.2
other loan	5.7	4.7
savings from summer work	19.6	4.6
part-time job on campus	23.4	3.9
other private grant	5.8	3.8
other	3.6	2.9
College Work-Study Grant	7.6	1.8
state scholarship or grant	4.1	1.8
other govt aid (ROTC,BIA,GI,etc)	1.6	1.2
Stafford/Guaranteed Student Loan	1.9	0.9
part-time job off campus	5.3	0.7
Supp Educational Oppty Grant	2.1	0.6
full-time job while in college	1.8	0.5
Pell Grant	2.1	0.4
Perkins Loan	0.9	0.4
spouse	1.1	0.4
Vocational Rehabilitation funds	0.5	0.2

7.5

PRIMARY SOURCES OF SUPPORT BY ACADEMIC FIELD, NATIONAL RESEARCH COUNCIL, SURVEY OF EARNED DOCTORATES: 1994

Ph.D. Field	Personal	University	Federal	Other
Agriculture	7.6	55.6	3.5	33.3
Biological Science	6.6	77.3	1.9	14.2
Business Field	24.9	53.2	1.0	20.9
Computer & Math	7.5	82.4	0.5	9.6
Education	37.9	32.3	2.5	27.3
Engineering	12.8	73.5	0.4	13.3
Health Sciences	20.1	54.2	2.1	23.6
Humanities	24.4	61.5	2.6	11.5
Physical Sciences	4.2	87.1	0.5	8.2
Psychology & Social Sciences	19.4	57.2	4.0	19.4
TOTAL	**13.8**	**69.2**	**1.5**	**15.5**

At the graduate level, during the 1994/95 academic year *Open Doors* estimated that university sources exceeded those personal and family sources. The Federal contribution is 2.2% in *Open Doors 1994/95* and 1.5% in the 1994 NRC data set. Inspection of the totals in Table 7.5 appears to show that *Open Doors* data tend to underestimate the contribution of university sources and overestimate the contributions from personal and family sources. It should be kept in mind that the *Open Doors* data include all graduate students, not just Ph.D students. The NRC data also contain a greater proportional representation of students enrolled in engineering and science disciplines than does the *Open Doors* data.

We believe that the data available from the CIRP and NRC surveys gives some confidence to users of the *Open Doors* estimates. As we have indicated previously the *Open Doors* data (collected mostly from registrars and foreign student advisors) was not designed to support analysis for all particular subgroups that readers may have interest in describing. For this more discreet analysis, the collection of individual data directly from students may be a sounder (and more costly) approach.

Cost Of Living Expenditures

- Presented here are estimated cost-of-living expenditures for next year (1996/97) by foreign students in the United States based on information from two sources: 1) the number of foreign students reported for the IIE Annual Census, and 2) the recommended Monthly Maintenance Rates (MMRs) for 1996/97 calculated by IIE for use by the Fulbright scholarship program.
- The MMRs are based on current cost-of-living information and comparative price indices in urban and nonmetropolitan areas. Since living costs vary in different regions of the United States and between urban and nonmetropolitan areas, IIE has located each Fulbright host institution within its appropriate geographical area and provided it with a specific MMR. It should be noted that the MMR includes living costs only; it does not include expenditures for tuition, fees, books, insurance, special equipment, travel or dependents.
- Estimates of foreign students' cost-of-living expenditures in each state is done by multiplying the average state MMR by nine (representing a nine-month academic year) and by the number of foreign students reported in that state. MMRs vary from region to region, and state to state.

7.6

ESTIMATED COST-OF-LIVING EXPENDITURES BY FOREIGN STUDENTS, 1996/97

State	1995/96 Foreign Students	1996/97 Estimated Expenditures
Alabama	4,873	$36,708,309
Alaska	524	$5,385,672
Arizona	8,916	$74,867,652
Arkansas	2,707	$20,489,283
California	55,799	$598,109,481
Colorado	6,349	$52,341,156
Connecticut	6,099	$60,983,901
Delaware	1,597	$13,510,620
District of Columbia	9,489	$106,409,646
Florida	18,982	$151,704,144
Georgia	8,859	$73,830,906
Guam	341	$2,666,961
Hawaii	5,801	$64,739,160
Idaho	1,457	$11,028,033
Illinois	19,408	$182,357,568
Indiana	8,981	$70,644,546
Iowa	7,144	$56,837,664
Kansas	7,093	$53,112,384
Kentucky	3,667	$27,788,526
Louisiana	5,466	$41,421,348
Maine	1,240	$10,858,680
Maryland	8,554	$84,607,614
Massachusetts	25,739	$280,992,663
Michigan	16,284	$145,236,996
Minnesota	6,777	$56,296,539
Mississippi	2,074	$15,306,120
Missouri	8,612	$69,214,644
Montana	1,056	$7,992,864

7.6(cont.)

ESTIMATED COST-OF-LIVING EXPENDITURES BY FOREIGN STUDENTS, 1996/97

State	1995/96 Foreign Students	1996/97 Estimated Expenditures
Nebraska	3,138	$24,175,152
Nevada	1,712	$14,822,496
New Hampshire	1,928	$16,883,496
New Jersey	9,306	$95,144,544
New Mexico	1,724	$14,662,620
New York	47,987	$482,413,311
North Carolina	6,263	$52,928,613
North Dakota	1,519	$11,948,454
Ohio	16,161	$127,267,875
Oklahoma	8,695	$65,186,415
Oregon	6,704	$57,379,536
Pennsylvania	17,897	$167,193,774
Puerto Rico	624	$6,379,776
Rhode Island	2,990	$29,412,630
South Carolina	2,838	$21,480,822
South Dakota	941	$7,097,022
Tennessee	4,997	$38,811,699
Texas	27,883	$217,069,155
Utah	6,477	$54,154,197
Vermont	815	$6,909,570
Virgin Islands	229	$2,009,475
Virginia	9,164	$74,723,256
Washington	10,257	$86,589,594
West Virginia	1,819	$13,424,220
Wisconsin	7,342	$61,122,150
Wyoming	489	$3,701,241
TOTAL	**453,787**	**$4,128,334,173**[1]

[1] Commerce Dept estimates total expenditures by foreign students including tuition to be over $7 billion.

Understanding Economic Impact

Foreign students make educational services purchases (tuition and fees), as well as incurring cost-of-living maintenance expenses, over an academic year's time. These purchases are being seen by many state governments as important service sector "exports" with significant long- and short-term impacts on state economies. IIE's cost-of-living data is drawn from the Institute's Monthly Maintenance Rate (MMR) reports which are used as the basis for Fulbright cost-of-living allowance. These estimates are based on a market basket of expenditures which include housing, food, transportation, entertainment and other household expenditures. They are regionally adjusted for cost-of-living differences throughout the United States.

Caution must be taken not to interpret these data too literally. Any state-level analysis is likely to be somewhat misleading as local areas with colleges and universities are most strongly impacted by student expenditures. These data may be taken as illustrative of the short-term economic impact of international students and as an effort to provide a framework for the dialog over the impact of these students' expenditures. Last year, *Open Doors* estimated that 1994/95's foreign student tuition and fee expenditures exceeded 3 billion dollars. This year IIE estimates that foreign students will spend about 4 billion dollars in living expenses over the 1996/97 academic year. Based on the Commerce Department's estimate that each billion dollars in exports results in the creation of approximately 20,000 U.S. jobs, over 80,000 jobs in this country are being sustained by foreign student cost of living expenditures this year.

Engineers Prepare for World Involvement

HOWARD WAKELAND

University of Illinois, Urbana-Champaign

THE most recent impact on U.S. engineering education comes from a non-technical pressure. It is not caused by new computer capabilities, new materials or processes or new science theories but from the vision of a World Economy. Engineering educators envision their graduates working throughout the world and with modern communication techniques, communicating on a daily basis with professionals in other world regions.

Thus, in addition to the basic mathematics, science, design and engineering course work, they are implementing programs to provide engineering graduates with international capabilities. If the U.S. is to compete in the world market, it must have a cadre of technical professional prepared for world competition. As Senator Paul Simon stated, "You can buy in any language, but sell only in the native language." Recently many U. S. engineering colleges have established international programs and goals to involve from 15% to 25% of their graduates in these programs. Most of these programs emphasize second language capability, social science or humanities course work related to international areas and a period of work, study or travel in other countries. It is my personal belief that "international capability" starts with second language capability.

Engineering schools have attracted many high quality students in recent years. The vast majority have had two or more years of foreign language in high school and nearly half have had four or more years. Thus they have good language backgrounds, but almost exclusively in romance languages. For years we have enrolled these students in engineering without encouraging them to continue language studies in which they have excellent backgrounds. Now we encourage continuation as much as possible. We have also implemented incentives for students to start in non-romance languages.

Because of the heavy course-work most engineering students cannot spend extended periods of time studying a language. Further, their language goals are different than the liberal arts or language major students. Those students seek a high level of fluency in language studies. When starting a new area of language study, engineering programs seek to obtain conversational ability to a level that will allow the graduate to function in a new culture and to have enough foundation to sustain continued language learning. This difference has caused many engineering schools to seek special language courses for their students. At the University of Illinois, Urbana-Champaign, we have developed a series of "quick hit" language programs. For instance, students will be enrolled in a five-hour Chinese course in the spring semester with most of the course work being in the classroom and a low level of homework. Upon completion of that course, the student will be enrolled in a six-week summer program in China. There the student will study Chinese language and culture courses in the morning five days each week, then they are placed

in a work experience program in a laboratory or factory each afternoon. Weekends are used for excursions or travel.

A variety of international programs are available for our engineering students, varying both in length and level of study, including year-long programs, semester programs, summer programs, short visitations, etc. Engineering schools tend to make heavy use of overseas schooling or internships during summer periods. Engineering students are hesitant to divert studies for a semester or year. The summer emphasis allows them to be involved in an international experience without major interruption of their engineering studies. Approximately half of the students will enroll in summer programs. Others seek a longer period involving engineering studies in the foreign location. At the University of Illinois we have developed an "international minor" that can be coupled with any engineering area. For example, a B.S. degree in electrical engineering with a Latin American international minor or a B.S. in mechanical engineering with a minor in German studies.

Ten years ago industrial employers would have taken little interest in such a program, but now seek out graduates with international or second language capabilities. Industrial employers from other countries are beginning to come to the United States engineering college placement offices seeking graduates with international interests. Engineering colleges are experiencing increasing global market orientation.

A few engineering institutional consortiums have developed to provide international programs. The most notable is probably the EAGLE (Engineering Alliance for Global Education) group of 15 U.S. engineering colleges that worked together to have approximately 400 U.S. engineering students learn Japanese through a home institution instruction coupled with a concentrated language program in Japan between 1989 and 1996. In addition approximately 130 of these students worked in Japan to gain experience in that society.

Through these experiences and through my interaction with industry, I have come to believe that the U.S. government should develop and support a technical manpower training program to prepare U.S. engineers and scientists for international involvement. The effort should emphasize basic study areas such as engineering and science combined with second language, cultural and social studies and work or schooling experience abroad. Other governments have been providing these types of programs for their youth for years. I believe we must train a cadre of our technical graduates for international involvement if we are to hold our own in the "world marketplace."

Howard L. Wakeland, associate dean emeritus, College of Engineering, University of Illinois, Urbana-Champaign. He has developed an international program for engineering students involving more than 16 foreign countries. He seeks to have 25% of the University of Illinois engineering graduates with international capabilities.

8

Foreign Student Enrollments on U.S. Campuses

INSTITUTIONS

The purpose of this section is to stimulate and inform the policy dialog on college campuses concerning international students. While foreign students remain a relatively small percentage of overall enrollments in U.S. higher education, at many institutions and within many academic programs foreign students are an important segment. U.S. education is a truly vast and complex enterprise. Our diversified system of public, private, religious and specialized institutions offers a varied set of educational and cultural opportunities. The very diversity of our institutions, from research universities to local community colleges, offers many points of access to U.S. higher education for international students.

Policy discussions are confused by the very diversity of U.S. higher education. Institutions differ considerably in size, location, governance and (especially) mission. Institutions with differing missions and sizes offer very different contexts and ought to be compared with like institutions. Academic policy makers and researchers find the Carnegie Classification system a useful tool in managing this variety, because it provides summary classifications of institutions by mission and, to a lesser extent, by size. Academic administrators who wish to consider institutional policies or organizational features benefit from comparisons with other similar institutions.

This section will present an analysis of foreign student enrollments on U.S. campuses by institutional type and size.

THE Carnegie Classification of Higher Education groups U.S. colleges and universities according to their educational missions.

What is the Carnegie Classification System?

THE Carnegie Classification of Higher Education groups U.S. colleges and universities according to their educational missions. This classification was developed by Clark Kerr in 1970, primarily to improve the precision of the Carnegie Commissions research. Over the years the system has gained credibility and has served as a helpful guide for scholars and researchers.

The Carnegie Classification is not intended to establish a hierarchy among higher learning institutions. Rather, the aim is to cluster institutions with similar programs and purposes. We have in this country a rich array of institutions serving a variety of needs, and there are institutions of distinction in every category of the Carnegie Classification. The Carnegie Classification utilizes survey data from the U.S. Department of Education Integrated Post-secondary Education Data System (IPEDS), the National Science Foundation, the College Board and the 1994 *Higher Education Directory,* published by Higher Education Publications, Inc. (HEP).

Definitions of Types of Institutions:

Research Universities I: These institutions offer a full range of baccalaureate programs, are committed to graduate education through the doctorate and give high priority to research. They award 50 or more doctoral degrees each year. In addition they receive at least $40 million annually in federal support.

Research Universities II: These institutions offer a full range of baccalaureate programs, are committed to graduate education through the doctorate and give high priority to research. They award 50 or more doctoral degrees each year. In addition they receive between $15.5 million and $40 million annually in federal support.

Doctoral Universities I: These institutions offer a full range of baccalaureate programs and are committed to graduate education through the doctorate. They award at least 40 doctoral degrees annually in five or more disciplines.

What is the Carnegie Classification System?

Doctoral Universities II: These institutions offer a full range of baccalaureate programs and are committed to graduate education through the doctorate. They award annually at least 10 doctoral degrees in three or more disciplines, or 20 or more doctoral degrees in one or more disciplines.

Master's Universities and Colleges I: These institutions offer a full range of baccalaureate programs and are committed to graduate education through the master's degree. They award 40 or more master's degrees annually in three or more disciplines.

Master's Universities and Colleges II: These institutions offer a full range of baccalaureate programs and are committed to graduate education through the master's degree. They award 20 or more master's degrees annually in one or more disciplines.

Baccalaureate Colleges I: These institutions are primarily undergraduate colleges with major emphasis on baccalaureate degree programs. They award 40% or more of their baccalaureate degrees in liberal arts fields and are restrictive in admissions.

Baccalaureate Colleges II: These institutions are primarily undergraduate colleges with major emphasis on baccalaureate degree programs. They award less than 40% of their baccalaureate degrees in liberal arts fields or are less restrictive in admissions.

Associate of Arts Colleges: These institutions offer associate of arts certificate or degree programs and, with few exceptions, offer no baccalaureate degrees.

Professional and Specialized Institutions: These institutions offer degrees ranging from the bachelor's to the doctorate. At least 50% of the degrees awarded by these institutions are in a single discipline. Specialized institutions include: theological seminaries; medical schools and other health-related schools; schools of engineering, business, art or law; teachers' colleges and tribal colleges.

Source: The Carnegie Foundation for the Advancement of Teaching

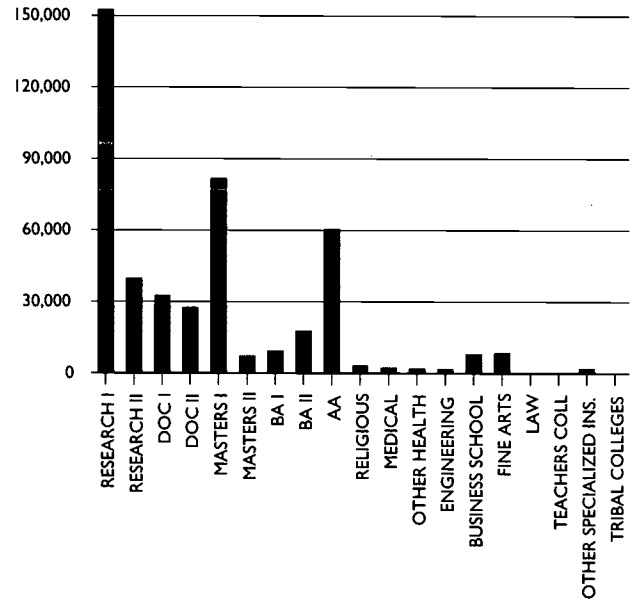
The system is not intended to establish a hierarchy among higher learning institutions, but rather to cluster institutions with similar programs and purposes.

Foreign Student Totals by Carnegie Classification

- When examined by Carnegie Classification, Research I institutions together host the largest number (152,359) of international students. These institutions host just over a third of all international students. The 87 reporting universities host an average of 1,751 international students each.
- Master's I institutions host an average of 197 international students for a total of 81,583, while the Associate of Arts Colleges host an average of 66 foreign students for a total of 60,241.

8.a

FOREIGN STUDENT TOTALS BY INSTITUTIONAL TYPE, 1995/96



8.0

FOREIGN STUDENT TOTALS BY INSTITUTIONAL TYPE, 1995/96

Category	Average # of Foreign Students	Foreign Student Totals	Institutions Reporting
TOTAL CENSUS	**176**	**453,787**	**2,579**
Research I	1,751	152,359	87
Research II	1,072	39,652	37
Doctoral I	649	32,464	50
Doctoral II	457	27,393	60
Masters I	197	81,583	414
Masters II	79	7,058	89
Baccalaureate I	56	9,198	165
Baccalaureate II	44	17,552	400
Associate Degree	66	60,241	917
Religious	24	2,992	124
Medical	69	2,148	31
Other Health	58	1,740	30
Engineering	74	1,624	22
Business School	151	7,685	51
Fine Arts	180	8,264	46
Law	5	23	5
Teachers	20	78	4
Other Specialized	40	1,720	43
Tribal Colleges	3	13	4

8.1

FOREIGN STUDENT ENROLLMENTS BY INSTITUTIONAL TYPE: TOP 30 RESEARCH INSTITUTIONS, 1995/96

Research Institutions	City	State	Foreign Students	Total Enrollments
Boston U	Boston	MA	4,532	29,025
New York U	New York	NY	4,242	35,825
U Southern CA	Los Angeles	CA	4,048	27,589
U Wisconsin-Madison	Madison	WI	3,935	40,005
Ohio State U	Columbus	OH	3,818	48,676
Columbia U	New York	NY	3,752	19,627
U Texas-Austin	Austin	TX	3,587	48,555
U Pennsylvania	Philadelphia	PA	3,183	22,469
Harvard U	Cambridge	MA	3,137	17,328
U Michigan-Ann Arbor	Ann Arbor	MI	3,043	36,617
U Illinois Urbana-Champaign	Champaign	IL	3,038	36,465
Cornell U	Ithaca	NY	2,609	18,781
Stanford U	Stanford	CA	2,587	14,002
Purdue U	West Lafayette	IN	2,584	34,685
Texas A&M U	College Station	TX	2,572	43,031
U Minnesota-Twin Cities	Minneapolis	MN	2,548	36,995
George Washington U	Washington	DC	2,545	19,670
U Maryland College Park	College Park	MD	2,544	32,908
U Houston	Houston	TX	2,539	30,757
Michigan State U	East Lansing	MI	2,521	40,647
Arizona State U	Tempe	AZ	2,498	42,040
Northeastern U	Boston	MA	2,416	26,552
IA State U-Science & Tech	Ames	IA	2,413	24,431
Brigham Young U	Provo	UT	2,357	37,455
Rutgers U	New Brunswick	NJ	2,325	33,774
PA State U-Univ Park	University Park	PA	2,323	39,571
Indiana U-Bloomington	Bloomington	IN	2,300	35,059
So Illinois U-Carbondale	Carbondale	IL	2,291	24,000
Wayne State U	Detroit	MI	2,201	34,280
U Arizona	Tucson	AZ	2,150	33;730

- This information is from a computer analysis of 2,579 colleges and universities that responded to the IIE Annual Census and were classified by the Carnegie Foundation for the Advancement of Teaching.
The Tables, 8.0 to 8.5, and Figure 8.a, present institutional rankings by Carnegie Classification.
Listed are the top 30 foreign student host institutions within classification and their total enrollment.

■ The United States has a major resource in the number and variety of post-secondary institutions. These institutions serve a variety of educational needs of students seeking an international education. International students are a presence at institutions in each Carnegie category.

8.2

FOREIGN STUDENT ENROLLMENTS BY INSTITUTIONAL TYPE: TOP 30 DOCTORAL INSTITUTIONS, 1995/96

Doctoral Institutions	City	State	Foreign Students	Total Enrollment
Florida International U	Miami	FL	2,087	28,227
Western Michigan U	Kalamazoo	MI	1,661	26,537
American U	Washington	DC	1,622	11,299
U North Texas	Denton	TX	1,529	25,114
New School Soc Rsrch	New York	NY	1,480	6,784
Wichita State U	Wichita	KS	1,443	14,568
U Toledo	Toledo	OH	1,430	21,991
U Texas-Arlington	Arlington	TX	1,342	22,121
Drexel U	Philadelphia	PA	1,016	10,210
Georgia State U	Atlanta	GA	1,002	23,651
Florida Atlantic U	Boca Raton	FL	985	15,843
George Mason U	Fairfax	VA	950	24,172
IL Institute Technology	Chicago	IL	941	7,027
NJ Institute Technology	Newark	NJ	880	7,885
U Akron	Akron	OH	863	24,488
U Nevada-Reno	Reno	NV	827	12,000
U Central Florida	Orlando	FL	825	26,174
Old Dominion U	Norfolk	VA	818	17,400
FL Institute Technology	Melbourne	FL	810	4,982
U San Francisco	San Francisco	CA	800	7,833
St. John's U	Jamaica	NY	778	18,216
Portland State U	Portland	OR	765	14,348
Graduate School-CUNY	New York	NY	758	4,272
U Alabama	Tuscaloosa	AL	750	19,494
U Denver	Denver	CO	746	8,337
U Missouri-Kansas City	Kansas City	MO	742	9,858
Boston College	Chestnut Hill	MA	716	14,440
Northern Illinois U	De Kalb	IL	697	22,558
Cleveland State U	Cleveland	OH	694	17,135
SUNY-Binghamton	Binghamton	NY	676	11,979

8.3

FOREIGN STUDENT ENROLLMENTS BY INSTITUTIONAL TYPE: TOP 30 MASTER'S INSTITUTIONS, 1995/96

Master's Institutions	City	State	Foreign Students	Total Enrollment
Hawaii Pacific U	Honolulu	HI	2,152	8,036
City College-CUNY	New York	NY	1,876	14,580
Baruch College-CUNY	New York	NY	1,747	15,064
U Texas-El Paso	El Paso	TX	1,499	16,275
CA State U-LA	Los Angeles	CA	1,353	18,385
U Central Oklahoma	Edmond	OK	1,342	15,630
San Francisco State U	San Francisco	CA	1,225	26,796
Oklahoma City U	Oklahoma City	OK	1,221	4,481
NY Institute Tech	Old Westbury	NY	1,167	6,033
Eastern Michigan U	Ypsilanti	MI	1,148	23,558
CA State U-Long Beach	Long Beach	CA	1,110	26,297
CA State Fullerton	Fullerton	CA	973	22,138
Brooklyn College-CUNY	Brooklyn	NY	965	15,580
San Jose State U	San Jose	CA	948	26,000
U District of Columbia	Washington	DC	862	10,608
U South Alabama	Mobile	AL	771	12,463
National U	San Diego	CA	745	7,638
Rochester Inst Tech	Rochester	NY	744	12,627
Golden Gate U	San Francisco	CA	741	7,000
CA State U-Northridge	Northridge	CA	737	25,015
U Nevada, Las Vegas	Las Vegas	NV	705	19,769
U Bridgeport	Bridgeport	CT	699	1,605
CA State Polytech U/Pomona	Pomona	CA	695	16,000
Embry-Riddle Aero. U	Daytona Beach	FL	667	10,124
U Hartford	West Hartford	CT	666	6,500
Queens College-CUNY	Flushing	NY	664	17,753
U North Carolina Charlotte	Charlotte	NC	628	15,895
Oral Roberts U	Tulsa	OK	624	4,510
U New Haven	West Haven	CT	618	6,000
CA State U-Fresno	Fresno	CA	618	18,017

8.4

FOREIGN STUDENT ENROLLMENTS BY INSTITUTIONAL TYPE: TOP 30 BACCALAUREATE INSTITUTIONS, 1995/96

Baccalaureate Institutions	City	State	Foreign Students	Total Enrollment
Brigham Young U-Hawaii Campus	Laie	HI	788	2,031
Medgar Evers College-CUNY	Brooklyn	NY	450	5,021
Florida Memorial College	Miami	FL	400	1,462
Teikyo Loretto Heights U	Denver	CO	390	446
U Dallas	Irving	TX	330	2,901
Columbia C	Chicago	IL	321	7,327
York College-CUNY	Jamaica	NY	307	6,869
Salem-Teikyo U	Salem	WV	302	787
Lewis-Clark State C	Lewiston	ID	301	3,347
Mount Holyoke C	South Hadley	MA	268	2,048
U Houston-Downtown	Houston	TX	268	7,676
Tri-State U	Angola	IN	251	1,119
U Southern Colorado	Pueblo	CO	251	4,330
Mount Ida C	Newton Ctr	MA	242	2,008
U Findlay	Findlay	OH	232	3,506
U Maine-Presque Isle	Presque Isle	ME	219	1,290
Smith C	Northampton	MA	212	2,937
Lewis & Clark C	Portland	OR	206	3,215
Mercy College	Dobbs Ferry	NY	200	6,276
Savannah State C	Savannah	GA	200	3,198
Dordt College	Sioux Center	IA	193	1,209
U Hawaii at Hilo	Hilo	HI	193	2,650
North Park C	Chicago	IL	184	1,750
Met State C of Denver	Denver	CO	180	17,059
Middlebury College	Middlebury	VT	179	2,016
Ambassador U	Big Sandy	TX	177	860
Oakwood C	Huntsville	AL	172	1,626
Lawrence Technological U	Southfield	MI	169	4,153
Marymount Manhattan C	New York	NY	168	1,896
Macalester C	Saint Paul	MN	163	1,760

8.5

FOREIGN STUDENT ENROLLMENTS BY INSTITUTIONAL TYPE: TOP 30 ASSOCIATE INSTITUTIONS, 1995/96

Associate Institutions	City	State	Foreign Students	Total Enrollment
Northern Virginia CC	Annandale	VA	2,191	38,530
Santa Monica C	Santa Monica	CA	2,152	8,036
Montgomery C-Rockville	Rockville	MD	1,388	14,355
Miami-Dade CC	Miami	FL	1,155	44,287
La Guardia CC-CUNY	Long Island Cit	NY	1,134	10,598
Borough of Manhattan C	New York	NY	1,022	16,334
Pasadena City C	Pasadena	CA	859	25,000
Los Angeles City C	Los Angeles	CA	813	14,500
Broward CC	Fort Lauderdale	FL	800	28,904
Mt. San Antonio C	Walnut	CA	790	21,039
Houston CC System	Houston	TX	727	39,321
Edmonds CC	Lynnwood	WA	722	9,569
Seattle Central CC	Seattle	WA	698	4,500
City C of San Francisco	San Francisco	CA	685	28,000
Orange Coast C	Costa Mesa	CA	615	22,000
Pima CC	Tucson	AZ	601	28,268
Collin County CC Distr	Mc Kinney	TX	594	10,300
East Los Angeles C	Monterey Park	CA	538	14,502
Grossmont C	El Cajon	CA	529	14,500
Bellevue CC	Bellevue	WA	527	17,319
Santa Barbara City C	Santa Barbara	CA	523	11,174
DeKalb C	Clarkston	GA	466	16,075
Rancho Santiago	Santa Ana	CA	442	20,529
Montgomery C-Takoma Pk	Takoma Park	MD	441	4,830
Glendale CC	Glendale	CA	421	14,792
Nassau CC	Garden City	NY	407	21,737
Moraine Valley CC	Palos Park	IL	405	12,813
Sacramento City C	Sacramento	CA	401	16,039
Mesa Community C	Mesa	AZ	388	22,302
Foothill C	Los Altos	CA	375	12,000

- A relatively small number of large institutions host almost half of all international students studying in the United States. The international presence varies widely from institution to institution. When considering this list, it is important to keep in mind that meaningful comparisons are possible only for institutions with similar missions.

8.6

INSTITUTIONS WITH 1,000 OR MORE FOREIGN STUDENTS, 1995/96, RANKED BY FOREIGN STUDENT TOTALS

Rank	Institution	City	State	Total Foreign Students	Total Enrollment	Foreign Student % of Enrollment
1	Boston U	Boston	MA	4,532	29,025	15.6
	New York U	New York	NY	4,242	35,825	11.8
	U Southern California	Los Angeles	CA	4,048	27,589	14.7
	U Wisconsin-Madison	Madison	WI	3,935	40,005	9.8
	Ohio State U-Main Campus	Columbus	OH	3,818	48,676	7.8
	Columbia U	New York	NY	3,752	19,627	19.1
	U Texas-Austin	Austin	TX	3,587	48,555	7.4
	U Pennsylvania	Philadelphia	PA	3,183	22,469	14.2
	Harvard U	Cambridge	MA	3,137	17,328	18.1
10	U Michigan-Ann Arbor	Ann Arbor	MI	3,043	36,617	8.3
	U IL Urbana-Champaign	Champaign	IL	3,038	36,465	8.3
	Cornell U	Ithaca	NY	2,609	18,781	13.9
	Stanford U	Stanford	CA	2,587	14,002	18.5
	Purdue U-Main Campus	West Lafayette	IN	2,584	34,685	7.4
	Texas A&M U	College Station	TX	2,572	43,031	6.0
	U Minnesota-Twin Cities	Minneapolis	MN	2,548	36,995	6.9
	George Washington U	Washington	DC	2,545	19,670	12.9
	U Maryland College Park	College Park	MD	2,544	32,908	7.7
	U Houston	Houston	TX	2,539	30,757	8.3
20	Michigan State U	East Lansing	MI	2,521	40,647	6.2
	Arizona State U	Tempe	AZ	2,498	42,040	5.9
	Northeastern U	Boston	MA	2,416	26,552	9.1
	IA State U	Ames	IA	2,413	24,431	9.9
	Brigham Young U	Provo	UT	2,357	37,455	6.3
	Rutgers U	New Brunswick	NJ	2,325	33,774	6.9
	PA State U-Park	University Park	PA	2,323	39,571	5.9
	Indiana U-Bloomington	Bloomington	IN	2,300	35,059	6.6
	Southern IL U Carbondale	Carbondale	IL	2,291	24,000	9.5
	Wayne State U	Detroit	MI	2,201	34,280	6.4
30	Northern Virginia CC	Annandale	VA	2,191	38,530	5.7
	Santa Monica College	Santa Monica	CA	2,152	21,331	10.1
	Hawaii Pacific U	Honolulu	HI	2,152	8,036	26.8
	U Arizona	Tucson	AZ	2,150	33,730	6.4
	U Hawaii-Manoa	Honolulu	HI	2,148	20,037	10.7
	MA Institute of Technology	Cambridge	MA	2,138	9,957	21.5
	Florida International U	Miami	FL	2,087	28,227	7.4
	U Florida	Gainesville	FL	2,061	38,730	5.3
	U Oregon-Main Campus	Eugene	OR	2,033	17,138	11.9

8.6(cont.)

INSTITUTIONS WITH 1,000 OR MORE FOREIGN STUDENTS, 1995/96, RANKED BY FOREIGN STUDENT TOTALS

Rank	Institution	City	State	Total Foreign Students	Total Enrollment	Foreign Student % of Enrollment
	U California, Berkeley	Berkeley	CA	2,020	30,341	6.7
40	OK State U-Main Campus	Stillwater	OK	1,992	19,125	10.4
	U Missouri-Columbia	Columbia	MO	1,960	22,168	8.8
	U Kansas	Lawrence	KS	1,958	26,127	7.5
	U California, Los Angeles	Los Angeles	CA	1,905	33,923	5.6
	SUNY-Buffalo	Buffalo	NY	1,902	24,493	7.8
	City College CUNY	New York	NY	1,876	14,580	12.9
	U Illinois-Chicago	Chicago	IL	1,818	25,445	7.1
	U Miami	Coral Gables	FL	1,791	13,571	13.2
	U Washington	Seattle	WA	1,765	33,996	5.2
	U Massachusetts-Amherst	Amherst	MA	1,763	24,125	7.3
50	Baruch College CUNY	New York	NY	1,747	15,064	11.6
	U Oklahoma-Norman	Norman	OK	1,718	19,964	8.6
	U Utah	Salt Lake City	UT	1,701	20,203	8.4
	U Chicago	Chicago	IL	1,693	12,178	13.9
	LA State U & A&M C	Baton Rouge	LA	1,685	25,897	6.5
	U Iowa	Iowa City	IA	1,673	27,597	6.1
	Syracuse U	Syracuse	NY	1,672	17,950	9.3
	Temple U	Philadelphia	PA	1,663	29,440	5.6
	Western Michigan U	Kalamazoo	MI	1,661	26,537	6.3
	U Georgia	Athens	GA	1,631	28,753	5.7
60	Northwestern U	Evanston	IL	1,623	15,149	10.7
	American U	Washington	DC	1,622	11,299	14.4
	U Pittsburgh-Main Campus	Pittsburgh	PA	1,619	26,083	6.2
	U North Texas	Denton	TX	1,529	25,114	6.1
	SUNY-Stony Brook	Stony Brook	NY	1,508	17,658	8.5
	U Texas-El Paso	El Paso	TX	1,499	16,275	9.2
	Washington State U	Pullman	WA	1,489	19,229	7.7
	New School Soc Rsrch	New York	NY	1,480	6,784	21.8
	U Kentucky	Lexington	KY	1,475	24,378	6.1
	Georgetown U	Washington	DC	1,456	13,522	10.8
70	Carnegie Mellon U	Pittsburgh	PA	1,456	7,183	20.3
	Wichita State U	Wichita	KS	1,443	14,568	9.9
	U Toledo	Toledo	OH	1,430	21,991	6.5
	VA Polytech Inst & State U	Blacksburg	VA	1,422	26,030	5.5
	U Delaware	Newark	DE	1,415	21,365	6.6
	U Nebraska-Lincoln	Lincoln	NE	1,404	24,695	5.7
	Montgomery C-Rockville	Rockville	MD	1,388	14,355	9.7

8.6(cont.)

INSTITUTIONS WITH 1,000 OR MORE FOREIGN STUDENTS, 1995/96, RANKED BY FOREIGN STUDENT TOTALS

Rank	Institution	City	State	Total Foreign Students	Total Enrollment	Foreign Student % of Enrollment
	Yale U	New Haven	CT	1,356	10,584	12.8
	CA State U, Los Angeles	Los Angeles	CA	1,353	18,385	7.4
	U Central Oklahoma	Edmond	OK	1,342	15,630	8.6
80	U Texas-Arlington	Arlington	TX	1,342	22,121	6.1
	Academy of Art College	San Francisco	CA	1,332	2,850	46.7
	U Cincinnati	Cincinnati	OH	1,323	34,000	3.9
	U California-Irvine	Irvine	CA	1,300	16,773	7.8
	U Rochester	Rochester	NY	1,290	9,740	13.2
	Oregon State U	Corvallis	OR	1,275	14,415	8.8
	U Phoenix	Phoenix	AZ	1,240	18,800	6.6
	U Connecticut	Storrs	CT	1,230	23,182	5.3
	San Francisco State U	San Francisco	CA	1,225	26,796	4.6
	U Colorado-Boulder	Boulder	CO	1,223	24,440	5.0
90	Oklahoma City U	Oklahoma City	OK	1,221	4,481	27.2
	Case Western Reserve U	Cleveland	OH	1,186	9,750	12.2
	Kansas State U	Manhattan	KS	1,174	20,775	5.7
	NY Inst Technology	Old Westbury	NY	1,167	6,033	19.3
	Miami-Dade CC	Miami	FL	1,155	44,287	2.6
	Eastern Michigan U	Ypsilanti	MI	1,148	23,558	4.9
	GA Institute of Technology	Atlanta	GA	1,134	13,036	8.7
	La Guardia CC CUNY	Long Island Cit	NY	1,134	10,598	10.7
	CA State U, Long Beach	Long Beach	CA	1,110	26,297	4.2
	Ohio U Main Campus	Athens	OH	1,090	19,086	5.7
100	U South Carolina-Columbia	Columbia	SC	1,083	26,710	4.1
	Utah State U	Logan	UT	1,081	17,555	6.2
	Brown U	Providence	RI	1,072	7,636	14.0
	U California, San Diego	La Jolla	CA	1,070	18,324	5.8
	North Carolina State U	Raleigh	NC	1,058	27,577	3.8
	Washington U	Saint Louis	MO	1,046	11,482	9.1
	Borough of Manhattan CC	New York	NY	1,022	16,334	6.3
	Drexel U	Philadelphia	PA	1,016	10,210	10.0
	Saint Louis U-Main Campus	Saint Louis	MO	1,009	11,243	9.0
	Georgia State U	Atlanta	GA	1,002	23,651	4.2
110	Duke U	Durham	NC	1,000	11,282	8.9

TOTAL INSTITUTIONS= 110

Meeting Campus Challenges—Armed with Data

JANET SANDOR
Assistant Director, International Services and Programs,
The University of Georgia, Athens, GA

THE Dean just called — he needs to know the number of foreign students who hold graduate assistantships and what percentage these foereign students make up of the total student enrollment. A faculty member has requested your assistance in identifying countries where he might have greater success at student recruitment. You are preparing your budget request for the next academic year and need to justify the increase you have requested. As international educators, we are seldom short of challenges. Rather, we are pulled in many directions, carrying out our agenda, as well as responding to the needs of others. Competing for scarce resources, maintaining high quality programs and services, and advocating for the institution's international mission, we are learning to face challenges, armed with new ammunition — data.

Well-placed data about programs and participants are effective tools in any organizational environment. Data can be used to validate activities, add credibility to the office and its mission, meet present needs and plan for future development. The key to becoming skilled at using data is to start with a basic foundation and increase usage as opportunities present themselves. At one institution, the University of Georgia (UGA), we in the International Services and Programs Office are building on our "data foundation" and share what we have learned through the following examples and suggestions

The data cycle in the UGA international office begins with the yearly statistics of international education participants, which are submitted for the *Open Doors* publication. Once the information is gathered, an international participant profile, a.k.a. Foreign Student and Scholar Factsheet, is prepared. In recent years, the international office has collected additional program information that is useful in public relations efforts, speaking engagements, departmental annual reports, and budget and personnel requests. For example, we record the number and nationality of students participating in programs and the number of requests from outside organizations for speakers and presentations. We also track attendance at office-sponsored events and sources of outside sponsorship for programs and activities.

We've learned that it's not enough to intend to use data. We must develop a plan for incorporating data in our daily activities. At UGA, our primary motives in using data are to reach out to other campus personnel, promote our goals and mission on campus and in the community, and provide helpful information.

Continued...

Meeting Campus Challenges—Armed with Data

...Continued

Our plan:

Quarterly Plan

Fall: Enrollment data and significant changes from previous year.

Winter: Supplemental data used with campus and community press releases with demographics of participating students.

Spring: Economic impact data of foreign students and scholars within the institution and community

Periodic: Local interest information, such as a comparison of UGA's student profile to peer institutions in state, region or nation.

Data inserted during interviews on current events with local newspapers.

National statistics on international education and its economic impact.

Reaching Out

Once the Foreign Student and Scholar Factsheet is prepared, it is distributed to faculty and administrators who interact with the international office; copies are also kept to be used as opportunities arise throughout the year. Decisions on who should receive the factsheet depend on the motives. Are we providing information to personnel who currently are part of the international family on campus, or are we interested in increasing awareness among others? The answer is — yes — to both! Significant changes in enrollment data and highlights of national statistics on the impact of international education are included in an accompanying memo that introduces the yearly Factsheet. The national statistics can be obtained from *Open Doors* and international education facts are readily available from NAFSA: Association of International Educators at world-wide-web site (http://www.nafsa.org). Our cover memo states why the information is important and how it can be used as faculty recruit students, develop international exchange agreements, and plan for international involvement.

Highlights of a Factsheet on Foreign Student Enrollment

- total enrollment, percentage of student body
- graduate enrollment, percentage of graduate student body
- undergraduate enrollment, percentage of undergraduate student body
- number of countries represented on campus
- top ten countries of attendance
- top ten fields of study
- top (3-4) sources of funding, percentage of students represented

Promoting the Global Mission

Developing regular communication to the public information office and local newspapers requires perseverance and an understanding of community interests. When will the information be of interest to the news organization and its readership? During the fall, many local readers are interested in learning about who is attending the university and how enrollment has changed from the previous year. In the winter, we try to spark interest in programs and activities by highlighting these activities and including supporting demographic information. Spring term often finds educational institutions and state legislatures focusing on budgets and resource allocations.

Meeting Campus Challenges—Armed with Data

There's no better time to provide information about the economic impact and other benefits of foreign visitors to our campuses and in our communities. Enrollment figures and source of financial support can be used, along with average cost of living figures, to estimate the revenue brought to local and regional economies.

Use data to present your case. A request for additional resources, whether fiscal, human or physical, has more teeth when documented by data showing increased services to constituents. Data on office contacts or processing of immigration paperwork will be needed to document increased workload.

Promote international education. Factsheets (with local and national information) can be used as handouts during presentations in campus residence halls, meetings of community and civic organizations, or during office visits of domestic students on class assignment. This data can be incorporated in interviews or "on-the-air question and answer" programs of student radio stations.

Provide data on foreign populations to state legislators as they consider legislation that will affect foreign nationals. A recent issue in many states has been the issuance of drivers licenses. Use information from the factsheet to show the number and background of students and scholars who will be affected by the legislation, along with the reasons the legislation is detrimental. Follow with a statement of consequences—the economic impact statement, which establishes that reduced foreign student enrollment and scholar participation will result in loss of outside revenue for the community and state, and hardship to the university.

Increase recognition for your office. Improve communication of the campus international structure by disseminating data about international participants and activities. A secondary benefit of this frequent distribution is that it helps campus players learn more about your office's responsibilities—a "plus" in a de-centralized institution where the word "international" appears in at least a dozen office names.

Meeting Others' Needs

Are you inundated with requests for information? For example, are faculty needing information to make recruitment decisions and development officers considering alumni activities abroad? Minimally, you should develop a quick response by using information from your institution's *Open Doors* report. For more tailored responses, invest in a commercial or locally designed data-management system, where individual reports can be generated by selecting specific data fields. Become an indispensable resource to your campus and community.

Data are tools, and the managing and reporting of it, skills to be honed. Using data in our daily activities adds a new dimension to our professionalism and expertise. It increases our credibility among faculty and administrators who may view the world not through global eyes but through technical lenses. Investing in data-management helps us to tell the international story on our campuses, and at the same time improve it.

Janet Sandor is assistant director of International Services and Programs at the University of Georgia in Athens, GA.

9

Academic and Personal Characteristics of Foreign Students

ACADEMIC/PERSONAL

- Perhaps the most basic things that any academic person needs to know about a teaching situation are who your students are, what their backgrounds are, what they are studying and at what level. This section is concerned with these questions. The first of the three major parts of this section addresses the fields of study chosen by foreign students. For many years foreign students have been an important part of U.S. academic life in many disciplines, especially in science and engineering. These enrollments by field of study are then broken down by college and university type (that is, by Carnegie Classification). Data on foreign student enrollments by discipline is analyzed to show the relationship between institutional type and the academic fields chosen by foreign students.
- The second part of this section focuses on foreign student enrollments by academic level. In Section 4 academic level is examined by nationality. In this section data is examined for trends over time and according to the personal characteristics of foreign students.
- Finally, the third part of this section describes the foreign student population by sex, marital status, enrollment status and visa status. Data for the 1995/96 academic year is presented along with an analysis of trends over time.

Field of Study

- This year enrollment change in nontraditional fields has been mixed. Education enrollments are down (-12.8%) as are those of students who have not declared a major (-12.5%). Enrollments in the arts are up (12.6%) as are those in the social sciences (5.7%). Business enrollments have remained essentially stable (1.3%). The engineering disciplines and the sciences have historically been the major areas of choice among international students, especially among those from the developing nations of Asia. This year enrollments in engineering have again fallen, albeit by less than 1%, while enrollments in math and computer science and in the physical and life sciences increased modestly by 2.0% and 2.3% respectively.
- Business and management continues to be the most popular field of study among foreign students this year. Numbering over 92,000, foreign students concentrating in business fields make up over 20% of the entire foreign student population. Engineering, the second most popular field, enrolls 72,410, or 16%.
- Enrollments in the physical and life sciences total 37,226 (8.2%), with math and computer sciences enrolling a similar amount (35,940 or 7.9%). "Other" fields dropped this year by 8.5% (liberal arts, law, communications, etc.) and enroll 42,130 students, about 9% of all international students.

9.0

FOREIGN STUDENTS BY FIELD OF STUDY, 1994/95 - 1995/96

	1994/95			1995/96		
Field of Study	Foreign Students	% of Total	% Change	Foreign Students	% of Total	% Change
Agriculture, Total	**8,901**	**2.0**	**-4.9**	**8,293**	**1.8**	**-7.3**
Agricultural Sciences	5,348	1.2	2.3	4,286	0.9	-24.8
Agribusiness & Agricultural Production	1,768	0.4	-20.8	2,192	0.5	19.3
Conservation & Renewable Natural Resources	1,786	0.4	-6.1	1,815	0.4	1.6
Business & Management, Total	**91,427**	**20.2**	**4.8**	**92,632**	**20.4**	**1.3**
Business & Management, General	85,422	18.9	3.8	85,920	18.9	0.6
Marketing & Distribution	5,318	1.2	28.2	6,041	1.3	12.0
Consumer, Personal & Misc Services	686	0.2	-13.2	671	0.1	-2.2
Education	**14,894**	**3.3**	**9.1**	**13,200**	**2.9**	**-12.8**
Engineering, Total	**72,797**	**16.1**	**-4.3**	**72,410**	**16.0**	**-0.5**
Engineering, General	65,824	14.5	-5.8	63,929	14.1	-3.0
Engineering-related Technologies	5,182	1.1	10.1	6,383	1.4	18.8
Transportation & Material Moving	852	0.2	-1.3	615	0.1	-38.5
Mechanics & Repairers	377	0.1	29.1	394	0.1	4.3
Construction Trades	311	0.1	107.3	757	0.2	58.9
Precision Production	252	0.1	61.5	332	0.1	24.1

9.0 *(cont.)*

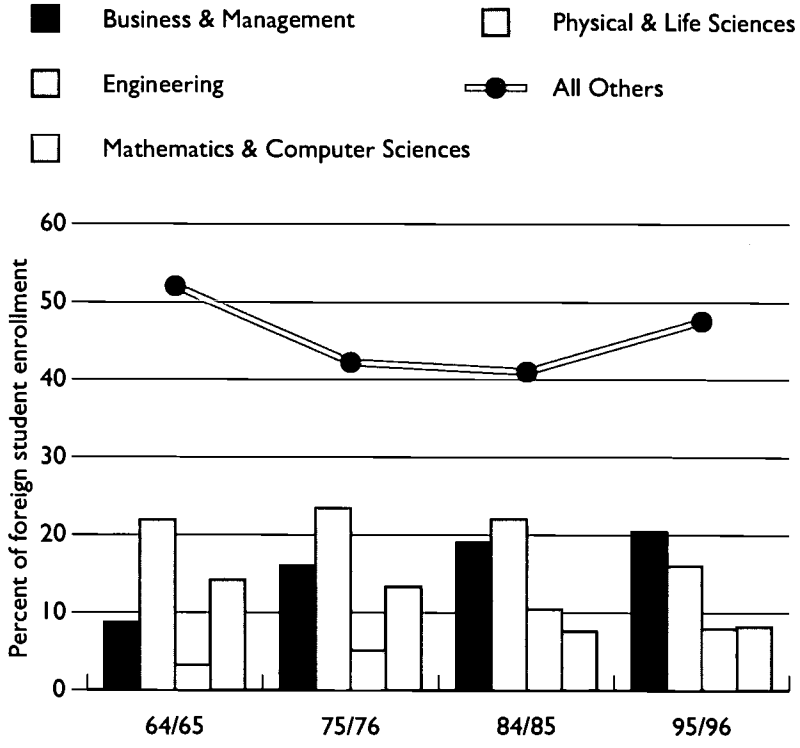
FOREIGN STUDENTS BY FIELD OF STUDY, 1994/95 - 1995/96

Field of Study	1994/95 Foreign Students	1994/95 % of Total	1994/95 % Change	1995/96 Foreign Students	1995/96 % of Total	1995/96 % Change
Fine & Applied Arts, Total	**23,389**	**5.2**	**-2.9**	**26,749**	**5.9**	**12.6**
Visual and Performing Arts	17,655	3.9	-2.7	20,845	4.6	15.3
Architecture & Environmental Design	5,735	1.3	-3.5	5,904	1.3	2.9
Health Professions	**20,728**	**4.6**	**4.8**	**20,674**	**4.6**	**-0.3**
Humanities, Total	**16,775**	**3.7**	**-1.4**	**16,161**	**3.6**	**-3.8**
Letters	5,923	1.3	-4.8	6,065	1.3	2.3
Foreign Languages	4,676	1.0	-3.2	4,678	1.0	0.0
Theology	4,339	1.0	6.2	3,625	0.8	-19.7
Philosophy & Religion	1,837	0.4	-1.4	1,793	0.4	-2.5
Math & Computer Sciences, Total	**34,937**	**7.7**	**-3.4**	**35,940**	**7.9**	**2.8**
Computer & Information Sciences	26,814	5.9	-1.5	27,681	6.1	3.1
Mathematics	8,123	1.8	-9.0	8,259	1.8	1.6
Physical & Life Sciences, Total	**36,380**	**8.0**	**-8.2**	**37,226**	**8.2**	**2.3**
Physical Sciences	18,144	4.0	-11.3	18,520	4.1	2.0
Life Sciences	17,421	3.8	-3.9	17,647	3.9	1.3
Science Technologies	815	0.2	-20.7	1,059	0.2	23.0
Social Sciences, Total	**36,075**	**8.0**	**0.9**	**38,242**	**8.4**	**5.7**
Social Sciences, General	22,897	5.1	-1.2	23,033	5.1	0.6
Psychology	6,000	1.3	6.9	6,270	1.4	4.3
Public Affairs	3,103	0.7	-10.5	3,750	0.8	17.3
Area & Ethnic Studies	1,861	0.4	15.9	2,479	0.5	24.9
Protective Services	545	0.1	4.6	511	0.1	-6.7
Parks & Recreation	1,670	0.4	21.1	2,199	0.5	24.1
Other, Total	**45,720**	**10.1**	**15.4**	**42,130**	**9.3**	**-8.5**
Liberal Arts/General Studies	25,404	5.6	25.7	22,261	4.9	-14.1
Communications	9,311	2.1	6.6	9,522	2.1	2.2
Law	3,453	0.8	12.0	3,464	0.8	0.3
Multi/Interdisciplinary Studies	3,038	0.7	2.5	2,640	0.6	-15.1
Home Economics	2,392	0.5	-6.9	1,991	0.4	-20.1
Library & Archival Sciences	640	0.1	-4.5	676	0.1	5.3
Vocational Home Economics	607	0.1	-2.9	431	0.1	-40.8
Communication Technologies	678	0.1	0.0	943	0.2	28.1
Military Technologies	198	0.0	160.5	202	0.0	2.0
Intensive English Language	**19,222**	**4.2**	**12.1**	**22,231**	**4.9**	**13.5**
Undeclared	**31,392**	**6.9**	**-8.2**	**27,897**	**6.1**	**-12.5**
TOTAL	**452,635**	**100.0**	**0.6**	**453,787**	**100.0**	**0.3**

- Engineering, the favored field among foreign students throughout much of the history of the Census, has experienced greatly decelerated growth in recent years and is now second to business in popularity. In the late 1980s and early 1990s the average rate of growth in engineering enrollments was less than 1%, while during that same period business and management enrollments grew at a rate of 10% a year.
- While math and computer sciences continues to draw a sizable 7.9% of the international student body, growth in these fields has fallen off in recent years. In the early 1980s the average yearly rate of growth was 16%. In the latter part of that decade, however, math and computer sciences were averaging only a 1% yearly increase. During the same period, demand for physical and life science fields went up significantly. In the latter part of the 1980s, the average yearly rate of growth of physical and life sciences was 7%.

9.a

FOREIGN STUDENTS IN SELECTED YEARS, 1964/65 -1995/96
Over the last three decades the number of international students in business fields has increased thirteen fold.



9.1

FOREIGN STUDENTS BY MAJOR FIELDS, SELECTED YEARS

1964/65

Field of Study	Foreign Students	% of Total
Agriculture	3,211	3.9
Business & Management	7,116	8.7
Education	3,999	4.9
Engineering	18,084	21.9
Fine & Applied Arts	3,946	4.8
Health Sciences	4,918	6.0
Humanities	12,137	14.7
Math & Computer Sciences	2,670	3.2
Physical & Life Sciences	11,731	14.2
Social Sciences	12,607	15.3
Other	607	0.7
Intensive English Language	—	—
Undeclared	—	—
TOTAL	**82,045**	**98.3**

1975/76

Field of Study	Foreign Students	% of Total
Agriculture	5,270	2.9
Business & Management	28,670	16.0
Education	9,790	5.5
Engineering	42,000	23.4
Fine & Applied Arts	8,320	4.6
Health Sciences	7,180	4.0
Humanities	15,030	8.4
Math & Computer Sciences	9,060	5.1
Physical & Life Sciences	23,910	13.3
Social Sciences	20,730	11.6
Other	9,380	5.2
Intensive English Language	—	—
Undeclared	—	—
TOTAL	**179,340**	**100.0**

1984/85

Field of Study	Foreign Students	% of Total
Agriculture	7,540	2.2
Business & Management	64,930	19.0
Education	12,140	3.6
Engineering	75,370	22.0
Fine & Applied Arts	15,900	4.7
Health Sciences	13,410	3.9
Humanities	13,030	3.8
Math & Computer Sciences	35,630	10.4
Physical & Life Sciences	25,960	7.6
Social Sciences	25,000	7.3
Other	22,250	6.5
Intensive English Language	11,010	3.2
Undeclared	19,940	5.8
TOTAL	**342,110**	**100.0**

1995/96

Field of Study	Foreign Students	% of Total
Agriculture	8,293	1.8
Business & Management	92,632	20.4
Education	13,200	2.9
Engineering	72,410	16.0
Fine & Applied Arts	26,749	5.9
Health Professions	20,674	4.6
Humanities	16,161	3.6
Math & Computer Sciences	35,940	7.9
Physical & Life Sciences	37,226	8.2
Social Sciences	38,242	8.4
Other	42,130	9.3
Intensive English Language	22,231	4.9
Undeclared	27,897	6.1
TOTAL	**453,787**	**100.0**

9.2

FIELDS OF STUDY BY INSTITUTION TYPE, 1995/96

Engineering now trails behind business in popularity at all but the research institutions.

TYPE OF INSTITUTION

Research Institutions	% Enrollment
Engineering	23.3
Business & Management	13.0
Physical & Life Sciences	11.2
Social Sciences	9.8
Other	7.9
Math & Computer Sciences	7.4
Undeclared	5.0
Health Professions	4.5
Fine & Applied Arts	4.4
Intensive English	3.9
Humanities	3.5
Agriculture	3.2
Education	2.8

Liberal Arts Institutions	% Enrollment
Business & Management	20.6
Undeclared	17.7
Social Sciences	12.4
Other	10.0
Physical & Life Sciences	6.7
Intensive English	5.7
Humanities	5.4
Math & Computer Sciences	4.9
Health Professions	4.5
Fine & Applied Arts	4.2
Engineering	4.0
Education	3.3
Agriculture	0.5

Doctoral Institutions	% Enrollment
Business & Management	22.1
Engineering	17.9
Math & Computer Sciences	10.1
Social Sciences	9.6
Physical & Life Sciences	9.3
Other	6.8
Fine & Applied Arts	5.2
Undeclared	4.8
Intensive English	3.8
Education	3.3
Health Professions	3.2
Humanities	3.2
Agriculture	0.8

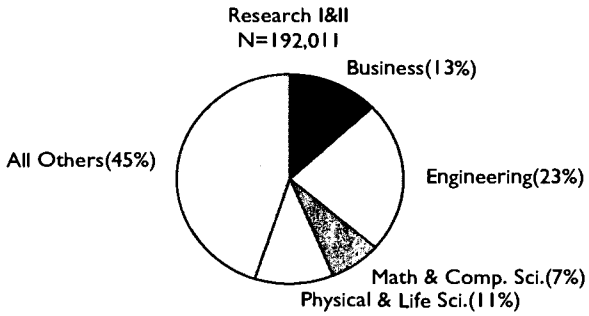
Community & Technical Colleges	% Enrollment
Business & Management	24.0
Other	23.3
Undeclared	9.6
Math & Computer Sciences	7.4
Engineering	7.3
Health Professions	6.9
Intensive English	5.8
Fine & Applied Arts	5.1
Social Sciences	3.8
Physical & Life Sciences	2.6
Education	1.5
Humanities	1.4
Agriculture	1.3

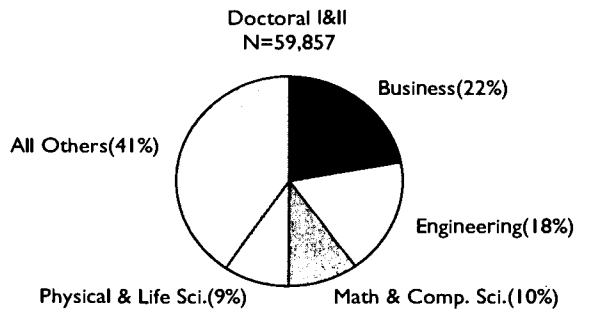
Master's Institutions	% Enrollment
Business & Management	32.4
Math & Computer Sciences	9.6
Engineering	8.8
Other	8.1
Intensive English	8.1
Social Sciences	7.2
Undeclared	5.7
Physical & Life Sciences	5.0
Education	4.3
Fine & Applied Arts	4.1
Health Professions	3.2
Humanities	2.9
Agriculture	0.6

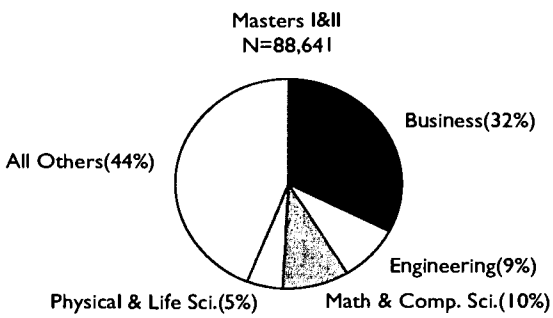
9.b

FIELDS OF STUDY BY CARNEGIE TYPE, 1995/96

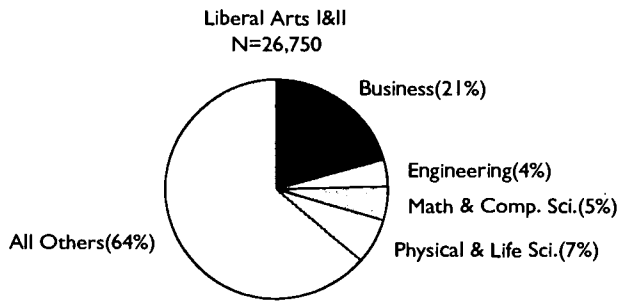
Engineering is the top choice of foreign students at research universities. At doctoral, master's and baccalaureate institutions, business is selected most often.

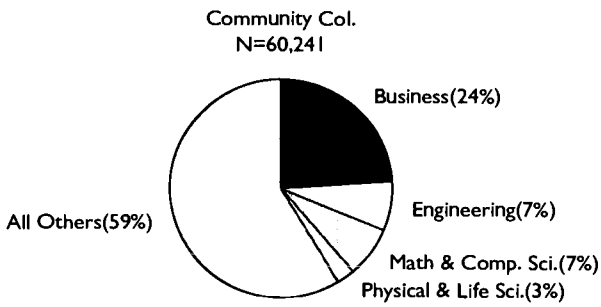






- Over the past two decades the popularity of the humanities has declined considerably. In 1965 it was the third most popular field, enrolling nearly 15% of all international students. By the mid-1970s, however, it drew only about 8%, and since the mid-1980s it has had less than 4% of foreign students. This year the number of international students enrolled in the humanities has continued to slide.
- For foreign students studying at research institutions, engineering (23.3%) is the field of study of choice. At these institutions majors in business (13.0%) and in the physical and life sciences (11.2%) have comparable levels of enrollments.
- At doctoral institutions, business (22.1%) is the preferred major, followed by engineering (17.9%). At institutions of this type, the fewest students are enrolled in fields other than business, engineering and the sciences.
- Master's degree institutions have the highest proportion of students studying business (32.4%). At baccalaureate institutions business (20.6%) is similarly the preferred field. Community colleges have the largest proportion of students studying in other areas (23.3%).





The Stay Rate of Foreign Doctoral Students in Science and Engineering

MICHAEL G. FINN

Oak Ridge Institute for Science and Education

WHAT happens to international students after they graduate? It has always been difficult to find good data on this topic. A new study can at least tell us what proportion has stayed in the United States after graduation. The study was restricted to science and engineering doctorate recipients of U.S. universities who were not U.S. citizens at the time they received their doctorates. Nearly half were still in the United States after several years.

Overall, the stay rate for doctorates was about 41 to 42% for persons who were on temporary visas when they received their degrees, and 48 to 49% for all foreign nationals, including those who were permanent residents at the time they completed their doctorates. These rates describe the 1984 graduates as well as the 1987 and 1988 graduates in 1992.

Stay rates of doctorates differ by field of study. The graduates of physical science and engineering programs have the highest stay rates. Among those graduating with a temporary visa in 1987 or 1988, 48% of engineering doctorates and 46% of physical science doctorates were residing in the United States in 1992. The stay rate for the same cohort was only 32% in life science and 30% in engineering.

The stay rate of U.S. foreign-born doctorates varies substantially by country of citizenship. The table below displays the stay rates of students by nationality. The highest rates were recorded by students from India, the People's Republic of China, and Iran. The lowest rates were recorded by students from Japan, Brazil, and Korea.

The Stay Rate of Foreign Doctoral Students in Science and Engineering

Temporary Residents Receiving Science and Engineering PhDs in 1987-1988 Who Were Working in the United States in 1992, by Field of Doctorate

Percent Working in the United States in 1992

	Engineering	Physical Sciences	Life Sciences
India	77	71	66
Peoples Republic of China	66	67	65
Iran	72	64	47
Other Asia/Pacific	45	49	25
Greece	47	48	34
Taiwan	53	46	42
Mexico	51	46	13*
Other Central/South America	41	44	26
Egypt	20	44	28
Other Africa	45	43	32
Other Europe	38	37	13
Canada	47	32	22
Korea	20	15	20
Brazil	15	12	13*
Japan	12	8	8

** Estimates for Brazil and Mexico were combined in the life sciences category to comply with rules designed to protect the privacy of individuals.*

The study that produced these estimates is unusual because it involves use of Social Security tax records in the United States. Because data had to be combined in fairly large groups to protect the privacy of individual records there is no country-specific data for countries other than those listed in the table.

The citation for report on which this sidebar is based is: Michael Finn, Leigh Ann Pennington, and Kathryn Hart Anderson, *Foreign Nationals Who Receive Science or Engineering Ph.D.s from U.S. Universities: Stay Rates and Characteristics of Stayers.* Oak Ridge, TN: Oak Ridge Institute for Science and Education, 1995. A limited number of copies of the report are available without cost. Contact the author via e-mail: finnm@orau.gov. This study was supported by a grant from the Alfred P. Sloan Foundation.

Michael Finn is a senior economist at the Oak Ridge Institute for Science and Education, Box 117, Oak Ridge, TN 37831-0117. He is currently working on a book on immigrant scientists and engineers in the U.S. labor force.

Asian Winds, American Chills

WENDY FRIEMAN

Science Applications International Corporation, Mclean, VA

RECENT years have seen a decline in the number of graduate students from Asia who receive U.S. degrees, as well as in the proportion of those students who are pursuing degrees in science and engineering. What explains this decline, and what does it mean? The answers right now are largely speculative. It seems likely that a convergence of trends in both the United States and Asia has contributed, with differing opinions among observers as to the significance and permanence of each.

The most immediate and obvious reason for the drop in U.S. enrollment is the emergence of high quality Asian universities. Many of these institutions offer a real alternative that did not exist as recently as a decade ago. A generation of U.S.-trained Asian scholars has gone home to teach their own and establish their own centers of excellence. The investment by Asian governments in "teaching the teachers" has paid off in the establishment of universities, some of which have internationally recognized faculties. The Asian Institute of Technology in Thailand and Tsinghua University in Taiwan are two examples of this. For the children of Asian baby boomers, an Asian university education is not just a viable alternative, but a logical first choice. Their parents did not have that option. The comparative advantage the United States enjoyed in training Asian graduate students between 1950 and 1980 might therefore have been a unique historical event during a specific window in time. This gap was certain to close as conditions improved in Asia.

The existence of home grown universities in Asia is probably not, however, the only reason for declining enrollments in the United States. This shift can also be seen in the context of rapid Asian economic growth, generational change, and shifting perceptions about the costs versus benefits of a U.S. education. Although the United States emerged from the Cold War as a disproportionately large player on the world stage, the immediate relevance of U.S. power to many countries in Asia is less and less clear. Some Asians seem to believe that the United States is pulling back from commitments and involvement in the region. Others are beginning to express the idea that the countries of the region, on general principle, must ultimately look to their own resources. In a more confident and more self consciously assertive Asia, the United States has ceased to be the focus of attention or the obvious destination of choice. When young Asians look at the United States today, they do not see the same country their parents saw. Their image of American society appears to be dominated by stories about U.S. "values" (meaning, typically, the lack thereof), crime, expensive health care, and income inequalities. This image is reinforced by the sense that there is a profound asymmetry between the structure of U.S. and Asian societies. Rapidly growing Asian countries have worked hard to maintain social cohesion at a time when U.S. society has become even more fluid and disaggregated. Doubts about the social system also suggest a less vibrant U.S. economy, perhaps one with fewer career opportunities compared to the market in Asia. In this context, it is possible that the trend away from American universities is being subtly encouraged by Asian governments who are consciously seeking a certain degree of diversity in student training. Asian faculties consist almost exclusively now of U.S.-trained

scholars; Asian governments might want to see the next generation include a mix of U.S., European, and Asian-trained professors.

The reason that the proportion of Asian graduate students enrolled in U.S. engineering, math, and physics has fallen relative to that of Asian graduate students enrolled in business and management programs, which continue to grow in popularity, requires further investigation. Has science become less popular in Asia, or do Asians believe that U.S. universities are better at teaching business than science? There is no question that in many Asian societies, money has now become the measure of success. It is well known that a business degree commands a higher salary than a Ph.D.; virtually everywhere in Asia corporate executives earn more than university professors. Even for those students who remain in the United States, a future in science does not necessarily hold the promise it once did. With declining federal and private investment in research and development, the competition for research money is keen and career paths are uncertain. It is also true that Asians have more trouble finding quality business and management education at home. Asia does not have a pipeline of U.S.-trained business professors comparable to their supply of U.S.-trained scientists and engineers.

If these parallel trends continue, the effects will be measurable and dramatic. International education promotes and supports virtually all major U.S. foreign policy and business objectives, often in subtle and undocumented ways. U.S. business executives, military commanders, or government officials who are trying to navigate a foreign country frequently use relationships with former classmates to short circuit what could be a lengthy and expensive process. Scientists and engineers, in particular, seem to form long lasting ties that transcend distance, language, and politics. American engineers who visit Thailand, China or Indonesia and contact their former classmates, post-docs, graduate students, or lab partners from those countries can tap into special relationships. They sometimes have an entrée with unique access to a country's science and technology infrastructure that is essential for success in collaborative research, joint production and marketing, and even market intelligence. Often the American scientists and engineers involved in this process do not themselves realize the value of these connections. Without them, however, American business would spend considerable time meeting with senior business executives of Asian companies before getting access to the technical staff. Asian firms tend to be more formally and hierarchically managed than most U.S. high technology firms; a pre-existing relationship among scientists or engineers is often a way to cut through layers of the system.

U.S. institutions of higher education are still a magnet for aspiring scholars in all fields from every corner of the globe. Trends suggest that U.S. institutions are now less attractive to Asians than they perhaps once were. It is possible to reverse this trend if the intangible rewards connected to international educational exchange can be more clearly stated. The potential payoff from the influx of Asian students will only increase the benefit to US economic, political, scientific and educational objectives as Asia enters the next century.

Wendy Frieman is director of the Asia Technology Program for SAIC. At SAIC she has responsibilities in marketing, management and research. Ms. Frieman specializes in technology, trade and defense developments in the Pacific Rim.

Academic Level

- The 218,620 students at the undergraduate level, including both associate and bachelor's degree programs, account for about half (48.2%) of the entire foreign student population, while the 190,092 graduate students account for 41.9%. The 45,075 "other" students, including those enrolled in practical training, nondegree and intensive English programs, total 9.9%.
- Undergraduate enrollments fell in both associate and bachelor's programs by 5.6% and 0.1% respectively.

9.3

ACADEMIC LEVEL, 1994/95 - 1995/96

	1994/95			19995/96		
Academic Level	**Foreign Students**	**% of Total**	**% Change**	**Foreign Students**	**% of Total**	**% Change**
Associate	**51,823**	**11.4**	**12.0**	**49,113**	**10.8**	**-5.5**
Bachelor's	**169,677**	**37.5**	**1.4**	**169,507**	**37.4**	**-0.1**
Freshman	34,314	7.6	3.4	32,603	7.2	-5.2
Sophomore	27,379	6.0	-1.3	27,792	6.1	1.5
Junior	33,249	7.3	4.7	33,796	7.4	1.6
Senior	40,126	8.9	6.6	41,931	9.2	4.3
Unspecified	34,609	7.6	-6.5	33,385	7.4	-3.7
Graduate	**191,738**	**42.4**	**-4.6**	**190,092**	**41.9**	**-0.9**
Master's	94,250	20.8	-5.4	97,241	21.4	3.1
Doctoral	67,586	14.9	-3.8	66,568	14.7	-1.5
Professional Training	6,404	1.4	10.6	6,105	1.3	-4.9
Unspecified	23,498	5.2	-7.3	20,178	4.4	-16.5
Other	**39,396**	**8.7**	**12.2**	**45,075**	**9.9**	**12.6**
Practical Training	13,208	2.9	15.6	15,450	3.4	14.5
Non-degree	9,981	2.2	6.2	9,404	2.1	-6.1
Intensive English Language	16,207	3.6	13.5	20,221	4.5	19.9
TOTAL	**452,635**	**100.0**	**0.6**	**453,787**	**100.0**	**0.3**

At the graduate level the number of foreign students has decreased by 1% from last year's total. Programs described as "other" showed the strongest increase, up 12.6% this year.

- While foreign undergraduates have always outnumbered graduates, the discrepancy was much larger in the past. In the 1950s the percentage of graduate students (35%) was much lower. In the 1960s and 1970s the graduate-to-undergraduate ratio was even more, but in the following decade it again tilted strongly in favor of undergraduates. The pattern was changed again in the mid-1980s, when the graduate and undergraduate proportions again approached parity. It remains to be seen if this year's drop in graduate enrollments will continue or is simply a single year occurrence. This decrease in graduate enrollments has surely been affected by the previously noted drops in enrollments from Asia. Students from this area are heavily enrolled at the graduate level.

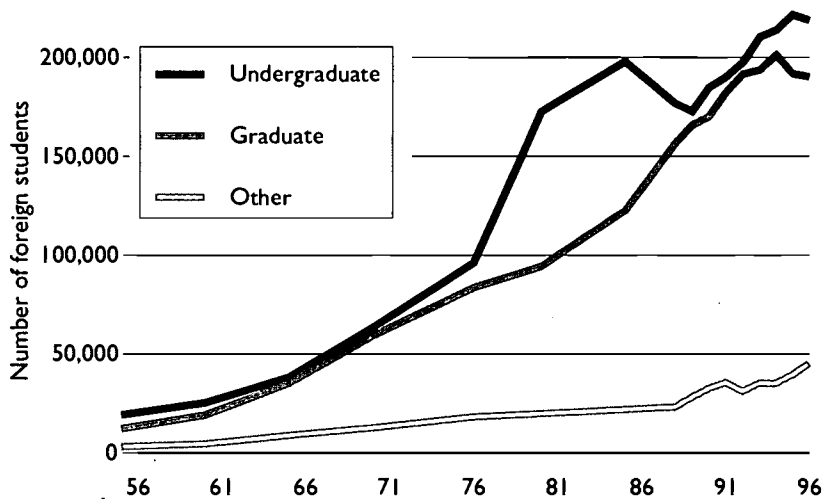
9.4

FOREIGN STUDENTS BY ACADEMIC LEVEL, SELECTED YEARS 1954/55 - 1995/96

Year	Under-Graduate	Graduate	Other
1954/55	19,101	12,118	3,012
1959/60	25,164	18,910	4,412
1964/65	38,130	35,096	8,774
1969/70	63,296	59,112	12,551
1975/76	95,949	83,395	18,073
1979/80	172,378	94,207	19,758
1984/85	197,741	122,476	21,895
1987/88	176,669	156,366	23,152
1988/89	172,551	165,590	28,209
1989/90	184,527	169,827	32,495
1990/91	189,900	182,130	35,500
1991/92	197,070	191,330	31,190
1992/93	210,080	193,330	35,210
1993/94	213,610	201,030	35,110
1994/95	221,500	191,738	39,396
1995/96	218,620	190,092	45,075

9.c

FOREIGN STUDENTS BY ACADEMIC LEVEL, SELECTED YEARS 1955/56 - 1995/96



9.5

PERSONAL AND ACADEMIC CHARACTERISTICS BY ACADEMIC LEVEL, 1995/96

Characteristic	Under-Graduate	Graduate	Other
Gender			
Male	56.1	64.7	55.7
Female	43.9	35.3	44.3
Marital Status			
Single	92.5	72.1	84.3
Married	7.5	27.9	15.7
Enrollment Status			
Full-time	89.3	84.1	85.4
Part-time	10.7	15.9	14.6
Visa Type			
F Visa	87.0	83.4	81.7
J Visa	5.3	11.0	10.4
M Visa	0.4	0.1	0.4
Other Visa	7.2	5.5	7.6
Primary Source of Funds			
Personal & Family	80.5	49.0	62.7
U.S. College or University	6.9	33.9	5.9
Home Govt/University	4.7	6.3	4.1
Current Employment	0.3	1.2	22.0
U.S. Private Sponsor	2.3	1.9	1.5
Foreign Private Sponsor	2.8	3.4	1.6
U.S. Government	0.8	1.4	0.7
International Organization	0.4	1.1	0.6
Other	1.3	1.8	1.1
Field of Study			
Agriculture	1.0	3.1	0.7
Business & Management	25.5	16.8	9.3
Education	1.9	4.3	2.1
Engineering	12.7	21.0	7.1
Fine & Applied Arts	7.6	4.7	2.8
Health Professions	3.9	5.4	3.6
Humanities	2.4	5.1	3.9
Math & Computer Sciences	7.0	9.6	4.0
Physical & Life Sciences	4.9	13.0	3.2
Social Sciences	8.0	10.1	3.3
Other	13.0	5.3	4.8
Intensive English	2.5	0.3	44.8
Undeclared	9.7	1.3	10.3
Number of Students	**218,620**	**190,092**	**45,075**

- The adjoining table presents separate profiles of foreign undergraduate and graduate students, as well as students enrolled in other programs such as practical training and intensive English.
- In general, foreign undergraduates are largely male, single and full-time students who are self-financed. Their major field of study is likely to be business and management. Graduate students are even more likely than undergraduates to be male than female. Graduate students are also primarily full-time students who are slightly more likely to be self-financed than they are to receive support from their host college or university. Unlike their undergraduate counterparts, they are most likely to be enrolled in engineering programs, followed by business and the physical and life sciences. Foreign students in the "other" category of academic level are the most likely to be enrolled part-time. They are also the most likely to receive financial support from current employment. Students in this category are overwhelmingly enrolled in intensive English language programs.
- International students pursuing studies on a full-time basis continue to greatly outnumber those studying part-time, as is evident in Table 9.5. This is not surprising, given the fact that full-time enrollment in most cases is required in order for a foreign student to remain in the United States.

Personal Characteristics

- Since the inception of the Census in 1949, male foreign students have consistently outnumbered female students; both the number and proportion of female international students, however, is rising steadily. In 1995/96 41.1% of all international students studying in the United States were women.
- An examination of Table 9.6 shows that an overwhelming majority of the international students in this country are single. More than eight out of ten (82.6%) are in this category, slightly fewer than in the previous year.

9.6

PERSONAL CHARACTERISTICS, SELECTED YEARS 1976/77 - 1995/96

Year	% Male	% Female	% Single	% F Visa	% J Visa	% Other	% Refugee[1]	Foreign Students
76/77	69.2	30.8	73.7	75.0	10.4	7.3	7.3	203,068
77/78	75.0	25.0	77.4	78.8	9.3	6.9	5.0	235,509
78/79	74.1	25.9	74.7	80.7	9.8	5.7	3.8	263,938
79/80	72.4	27.6	78.6	82.0	7.6	6.4	4.0	286,343
80/81	71.7	28.3	80.1	82.9	6.7	5.6	4.8	311,882
81/82	71.0	29.0	79.3	84.3	6.8	4.9	4.0	326,299
82/83	70.9	29.1	80.1	84.0	7.2	5.2	3.6	336,985
83/84	70.6	29.4	80.1	83.2	8.2	5.2	3.4	338,894
84/85	69.8	30.2	80.4	83.5	8.4	5.1	3.0	342,113
85/86	70.7	29.3	80.0	81.5	9.2	5.7	3.6	343,777
86/87	68.9	31.1	79.7	81.0	11.0	5.2	2.8	349,609
87/88	67.7	32.3	79.8	79.4	12.1	6.1	2.3	356,187
88/89	66.5	33.5	80.9	79.0	12.5	6.5	2.0	366,354
89/90	66.1	33.9	80.1	78.5	12.7	6.4	2.4	386,851
90/91	64.0	36.0	78.5	80.6	11.0	6.4	2.0	407,529
91/92	63.7	36.3	80.7	84.6	9.5	6.0		419,585
92/93	63.0	37.0	82.5	85.5	8.5	6.1		438,618
93/94	62.1	37.9	83.1	86.4	7.7	5.9		449,749
94/95	60.9	39.1	83.4	85.8	7.7	6.4		452,635
95/96	**58.9**	**41.1**	**82.6**	**84.9**	**7.7**	**7.3**		**453,787**

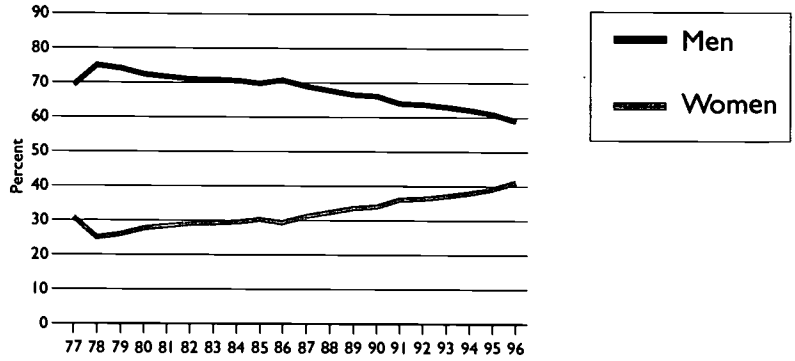
[1] No longer included in the census after 1990/91

- Female representation in the international student body has traditionally been low. In the 1950s, fewer than one-fourth of the foreign students were women (23%), and by the end of that decade that proportion had fallen to a record low of 22%. By the latter half of the 1960s, however, the proportion of women had begun to rise and in 1969 was back up to nearly one-fourth of the international population. Since that time their proportion has risen steadily.

- The vast majority of foreign students (84.9%) hold F visas, which are temporary visas granted to citizens of foreign countries for full-time study in U.S. institutions of higher education. Students with J visas, the visas granted to exchange visitors, make up the second largest group, accounting for 7.7%. Other types of visas are held by 7.3% of foreign students. (Definitions of the various types of visas appear in Section 12 of this publication.)

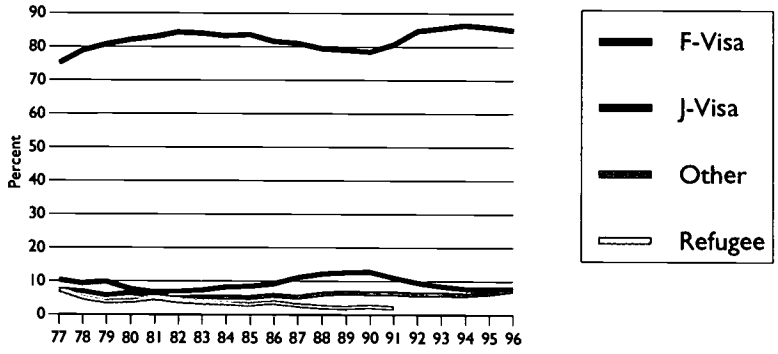
9.d

DISTRIBUTION BY SEX, 1977/78 - 1995/96



9.e

VISA STATUS, 1977/78 - 1995/96



10

Numbers and Destinations of U.S. Students Studying Overseas

U.S. STUDY ABROAD

- **Over the past nine years the number of U.S. students enrolled in study-abroad programs reported in *Open Doors* has increased from 48,500 to 84,400. Much of this growth occurred during the late 1980s. Since 1990 enrollments increased only 2% a year on an annualized basis until this year (1994/95) which saw a strong 10% increase over 1993/94.**
- **The leading destinations for U.S. study-abroad students are the nations of Western Europe, especially the United Kingdom; recently, however, a more diverse group of destinations, including Mexico, Australia, Japan, Costa Rica and Russia, has seen gradual enrollment increases.**
- **Research institutions send the largest number of students abroad each year, with majors in the humanities and the social sciences (36%) predominating. Over the last nine years, nontraditional fields such as business and the technical fields have seen small increases, while the traditional study-abroad areas of the humanities, social sciences and foreign languages have seen proportionate decreases.**
- **While study-abroad enrollments have increased modestly, the length of the sojourn is still rather brief: 53% of students study abroad for one semester or less, and only 14% for an academic year. This trend towards ever shorter sojourns appears to be quite robust.**
- **The "Junior year abroad" model still dominates: 43% of study-abroad students go during that year. Graduate students have remained a very small proportion (7%) of all study abroad enrollments. Most study-abroad students are female (62%) and white (86%).**

- Two years ago IIE redesigned the study abroad survey. The revisions to the survey included new questions about the sources of support for study abroad and about the race/ethnicity of participants. Reporting institutions were also asked to include only those students enrolled for a degree at their own institution, regardless of program sponsorship. Survey forms were sent to 1,206 accredited colleges and universities (those previously identified as having at least one study abroad student) throughout the United States, and information was obtained from 1,019 (84.4%) of the surveyed institutions. This overall survey response rate is identical to last year's 84.4% rate of return.

- A total of 84,403 students received academic credit for study in another country in 1994/95, 8,100 more than the 76,302 reported in 1993/94. When institutions responding this year and last are taken together, 522 institutions this year reported increases in study abroad activity compared with 363 that showed decreased study abroad participation. Of interest is that the average size of the study abroad community on campuses that reported increases is about twice the average size of study abroad communities that reported declines in enrollment.

10.0 HOST REGIONS OF U.S. STUDY ABROAD STUDENTS, 1985/86 - 1994/95

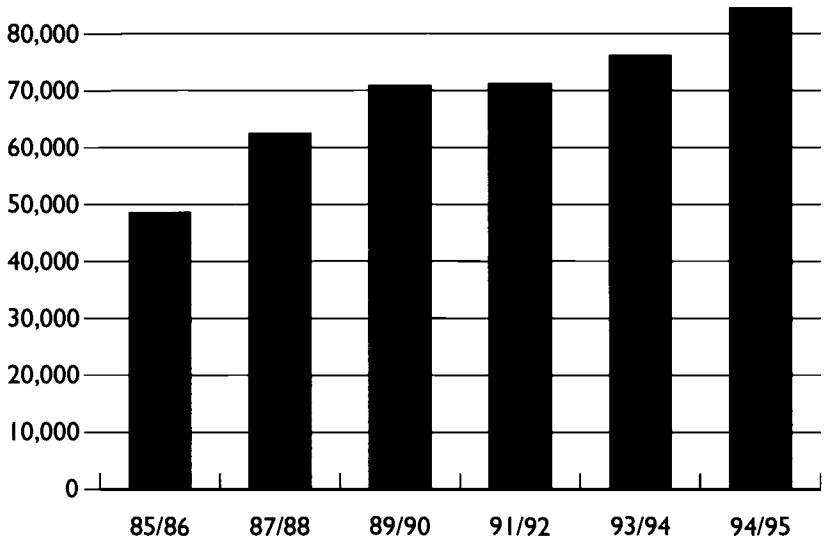
Percent of U.S. Study Abroad Students

Host Region	1985/86	1987/88	1989/90	1991/92	1993/94	1994/95
Africa	1.1	1.2	1.3	1.8	1.9	2.2
Asia	5.4	6.1	5.0	5.9	6.5	6.4
Europe	79.6	75.4	76.7	71.3	67.4	65.5
Latin America	7.0	9.2	9.4	12.3	13.4	13.7
Middle East	4.0	4.7	2.7	2.7	2.8	3.3
North America	0.9	1.4	0.8	0.9	0.7	0.7
Oceania	0.9	1.2	1.9	3.1	3.4	4.3
Multiple Regions	1.0	0.8	2.2	2.1	3.8	3.8
Total	**100.0**	**100.0**	**100.0**	**100.0**	**100.0**	**100.0**
Students Reported	**48,483**	**62,341**	**70,727**	**71,154**	**76,302**	**84,403**

10.a

MORE U.S. STUDENTS GOING ABROAD

While the total number of U.S. students studying abroad for academic credit has increased in the past years their absolute numbers remain small and the length of the sojourn is decreasing.



In short, not only did campuses send more students, but those already sending large numbers grew faster than those with smaller study abroad communities.

- As in past years, Europe was by far the favorite destination for Americans who studied abroad in 1994/95: 65% chose to study there. After Europe was Latin America, hosting 13% of Americans studying abroad. Asia attracted 6%, Oceania and the Middle East about 3% each, Africa 2% and North America (Canada) less than 1%. The most noteworthy changes since 1985/86 are that the share of Americans studying in Europe has fallen by 14% while the share going to Latin America has risen by 7%.
- Six of the top 12 receiving countries were in Western Europe, and they hosted over 59% of all U.S. students studying overseas. The top 12 countries of destination hosted the vast majority (75%) of all American students studying overseas.
- The United Kingdom hosted a full 23% of the American students, followed by France with 9%. The next ten host countries were Spain (9%), Italy (8%), Mexico (6%), Germany (4%), Australia (4%), Japan, Israel and Costa Rica (3%), and Austria and Russia (2%).

10.1
HOST REGION AND COUNTRIES OF U.S. STUDY ABROAD STUDENTS, 1993/94 - 1994/95

Region/ Locality	Total 1993/94	Total 19994/95	% Change
AFRICA	**1,477**	**1,842**	**24.7**
Eastern Africa	**739**	**933**	**26.3**
Kenya	640	795	24.2
Tanzania	67	88	31.3
Madagascar	24	32	33.3
Uganda	3	13	333.3
Zambia	0	3	-
Malawi	2	1	-50.0
Mozambique	0	1	-
Ethiopia	1	0	-100.0
Zimbabwe	2	0	-100.0
Central Africa	**33**	**52**	**57.6**
Cameroon	33	52	57.6
North Africa	**242**	**290**	**19.8**
Egypt	177	206	16.4
Morocco	63	80	27.0
Tunisia	2	4	100.0
Southern Africa	**168**	**143**	**-14.9**
South Africa	120	86	-28.3
Botswana	24	30	25.0
Namibia	11	23	109.1
Swaziland	13	4	-69.2
Western Africa	**295**	**418**	**41.7**
Ghana	114	270	136.8
Senegal	47	52	10.6
Cote D'Ivoire	61	42	-31.1
Nigeria	14	34	142.9
Sierra Leone	20	9	-55.0
Niger	3	5	66.7
West Africa, Unspecified	0	6	-
Africa, Unspecified	36	6	-83.3
ASIA	**4,986**	**5,440**	**9.1**
Eastern Asia	**3,889**	**4,197**	**7.9**
Japan	2,229	2,212	-0.8
China, People's Repub. of	964	1,257	30.4
Korea, Repub. of	373	374	0.3
Taiwan	142	201	41.5
Hong Kong	181	153	-15.5
So/Central Asia	**591**	**638**	**8.0**
India	382	409	7.1
Nepal	128	189	47.7
Sri Lanka	46	21	-54.3
Kazakhstan	13	6	-53.8
Kyrgyzstan	0	5	-
Uzbekistan	0	4	-
Pakistan	21	3	-85.7
Myanmar	0	1	-
Bangladesh	1	0	-100.0
Southeast Asia	**506**	**604**	**19.4**
Indonesia	128	215	68.0
Thailand	185	189	2.2
Vietnam	42	83	97.6
Singapore	52	57	9.6
Philippines	57	44	-22.8
Malaysia	41	16	-61.0
Cambodia	1	0	-100.0
Asia, Unspecified	0	1	-
EUROPE	**51,395**	**55,289**	**7.6**
Eastern Europe	**2,599**	**2,744**	**5.6**
Russia	1,512	1,290	-14.7
Czech Republic	343	450	31.2
Hungary	334	368	10.2
Poland	170	205	20.6
Yugoslavia (former)	33	132	300.0
Ukraine	50	121	142.0
Estonia	37	57	54.1
Bulgaria	20	27	35.0
Belarus	1	23	2200.0
Slovakia	31	19	-38.7
Romania	19	17	-10.5
Latvia	11	14	27.3
Albania	1	8	700.0
Georgia	0	3	-
Macedonia	0	3	-
Croatia	0	1	-
Lithuania	14	1	-92.9
Eastern Europe, Unspecified	23	5	-78.3
Western Europe	**48,796**	**52,388**	**7.4**
United Kingdom	16,812	19,410	15.5
France	7,919	7,872	-0.6
Spain	6,937	7,473	7.7
Italy	6,410	7,062	10.2
Germany	3,512	3,504	-0.2
Austria	2,041	1,489	-27.0
Ireland	1,112	1,191	7.1
Greece	853	935	9.6
Switzerland	750	858	14.4
Netherlands	670	711	6.1
Denmark	370	477	28.9

10.1 (cont.)
HOST REGIONS AND COUNTRIES OF U.S. STUDY ABROAD STUDENTS, 1993/94-1994/95

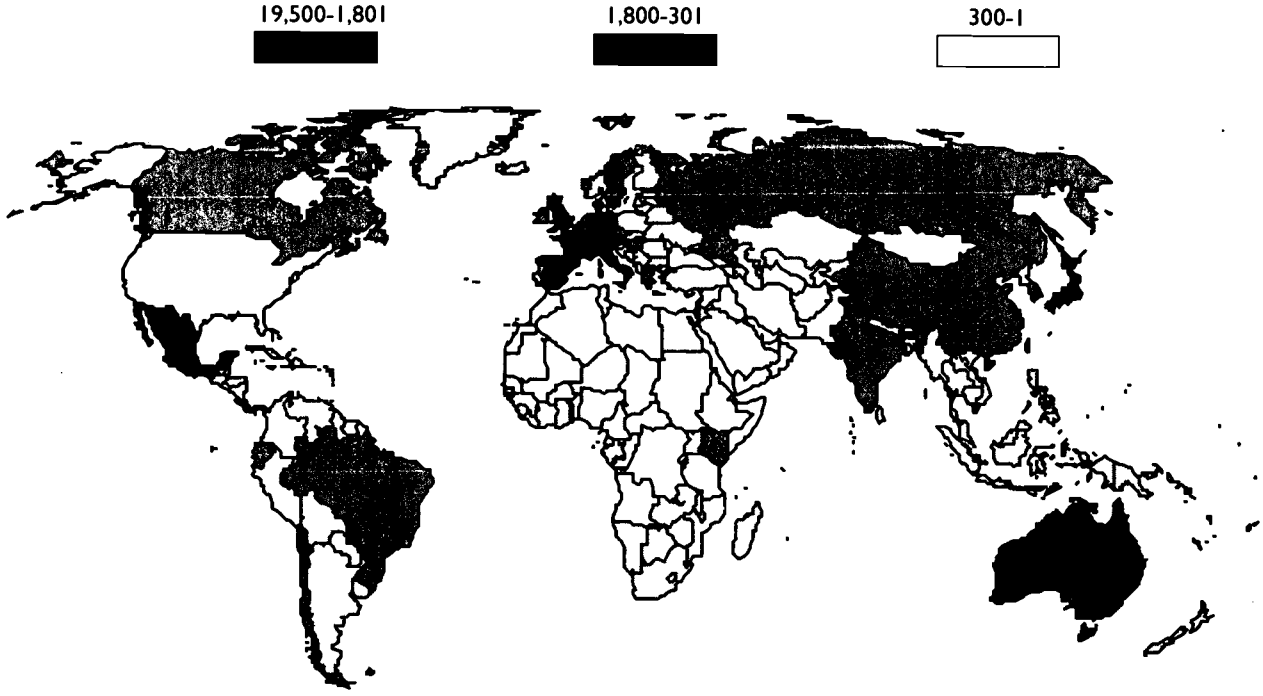
Region/ Locality	Total 1993/94	Total 19994/95	% Change
Sweden	272	404	48.5
Belgium	538	380	-29.4
Luxembourg	306	318	3.9
Finland	120	148	23.3
Norway	83	123	48.2
Portugal	15	27	80.0
Iceland	3	4	33.3
Malta	36	1	-97.2
Monaco	0	1	-
Western Europe, Other	1	0	-100.0
Europe, Unspecified	36	157	336.1
LATIN AMERICA	**10,207**	**11,590**	**13.5**
Caribbean	**961**	**1,196**	**24.5**
Dominican Republic	193	292	51.3
Jamaica	230	276	20.0
Bahamas	224	244	8.9
Martinique	27	61	125.9
Barbados	38	52	36.8
Trinidad & Tobago	28	35	25.0
Cayman Islands	30	30	0.0
Dominica	18	26	44.4
Turks & Caicos Islands	16	25	56.3
Haiti	1	10	900.0
British Virgin Islands	8	4	-50.0
Montserrat	0	4	-
Cuba	1	1	0.0
Antigua	1	0	-100.0
Grenada	13	0	-100.0
Guadeloupe	12	0	-100.0
St. Kitts-Nevis	13	0	-100.0
Caribbean, Unspecified	108	136	25.9
Central Am/Mexico	**7,030**	**7,705**	**9.6**
Mexico	4,718	4,715	-0.1
Costa Rica	1,765	2,302	30.4
Belize	131	232	77.1
Guatemala	192	219	14.1
Honduras	142	144	1.4
Nicaragua	50	51	2.0
El Salvador	4	22	450.0
Panama	28	4	-85.7
Central America, Unspecified	0	16	-

Region/ Locality	Total 1993/94	Total 19994/95	% Change
South America	**2,216**	**2,683**	**21.1**
Ecuador	677	837	23.6
Chile	640	755	18.0
Brazil	332	345	3.9
Argentina	283	275	-2.8
Venezuela	61	205	236.1
Columbia	122	110	-9.8
Peru	20	71	255.0
Bolivia	22	64	190.9
Guyana	14	8	-42.9
Uruguay	9	8	-11.1
Paraguay	2	5	150.0
Latin America, Unspecified	34	6	-82.4
MIDDLE EAST	**2,174**	**2,823**	**29.9**
Israel	2,049	2,621	27.9
Turkey	74	127	71.6
Jordan	8	29	262.5
Saudi Arabia	9	21	133.3
Cyprus	11	10	-9.1
Syria	4	9	125.0
Kuwait	1	3	200.0
Lebanon	1	3	200.0
Quatar	10	0	-100.0
Middle East, Unspecified	7	0	-100.0
NORTH AMERICA	**509**	**590**	**15.9**
Canada	507	573	13.0
Bermuda	2	17	750.0
OCEANIA	**2,618**	**3,643**	**39.2**
Australia	2,360	3,346	41.8
New Zealand	196	234	19.4
French Polynesia	0	17	-
Palau	0	14	-
Fiji	2	12	500.0
Western Samoa	12	12	0.0
Cook Islands	16	6	-62.5
Fed States of Micronesia	28	1	-96.4
Papua New Guinea	1	1	0.0
Marshall Islands	2	0	-100.0
Vanuatu	1	0	-100.0
Multi-country	**2,931**	**3,180**	**8.5**
WORLD TOTAL	**76,302**	**84,403**	**10.6**

10.b

STUDY ABROAD DESTINATIONS, 1994/95

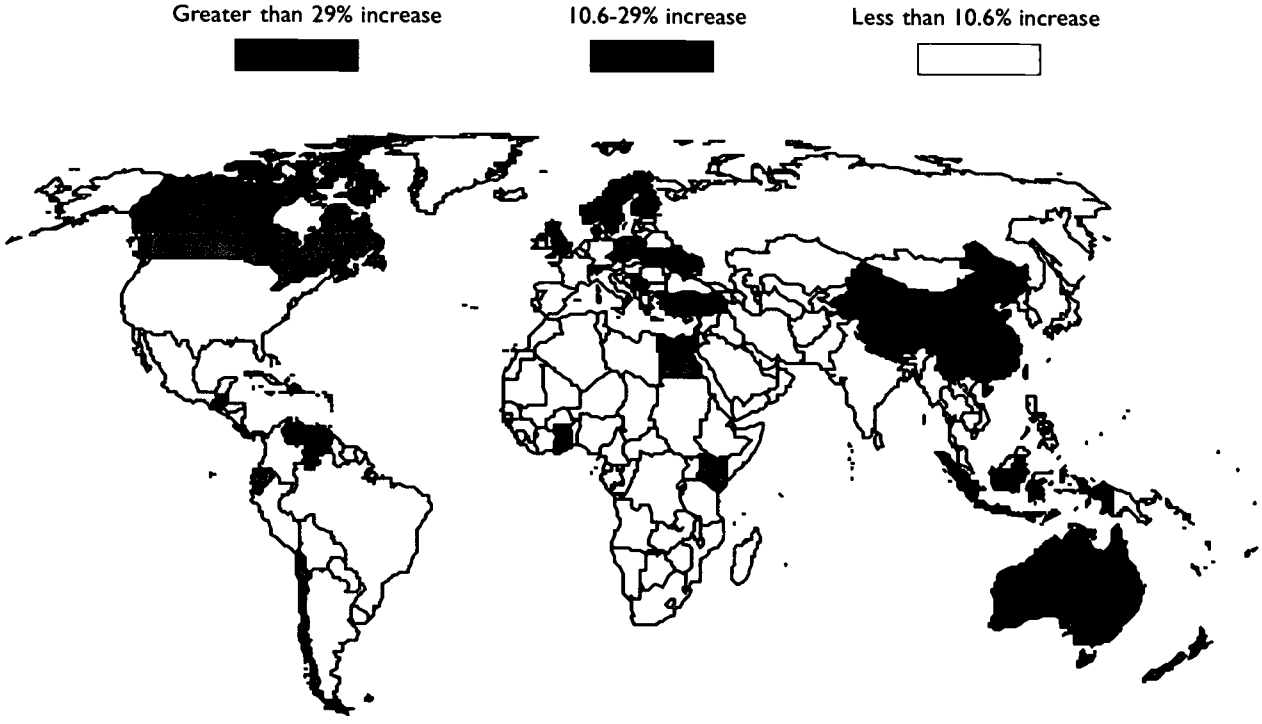
Western Europe is the destination of choice for the largest number of U.S. study abroad students.



10.c

PERCENTAGE CHANGE IN COUNTRIES RECEIVING 100+ U.S. STUDENTS

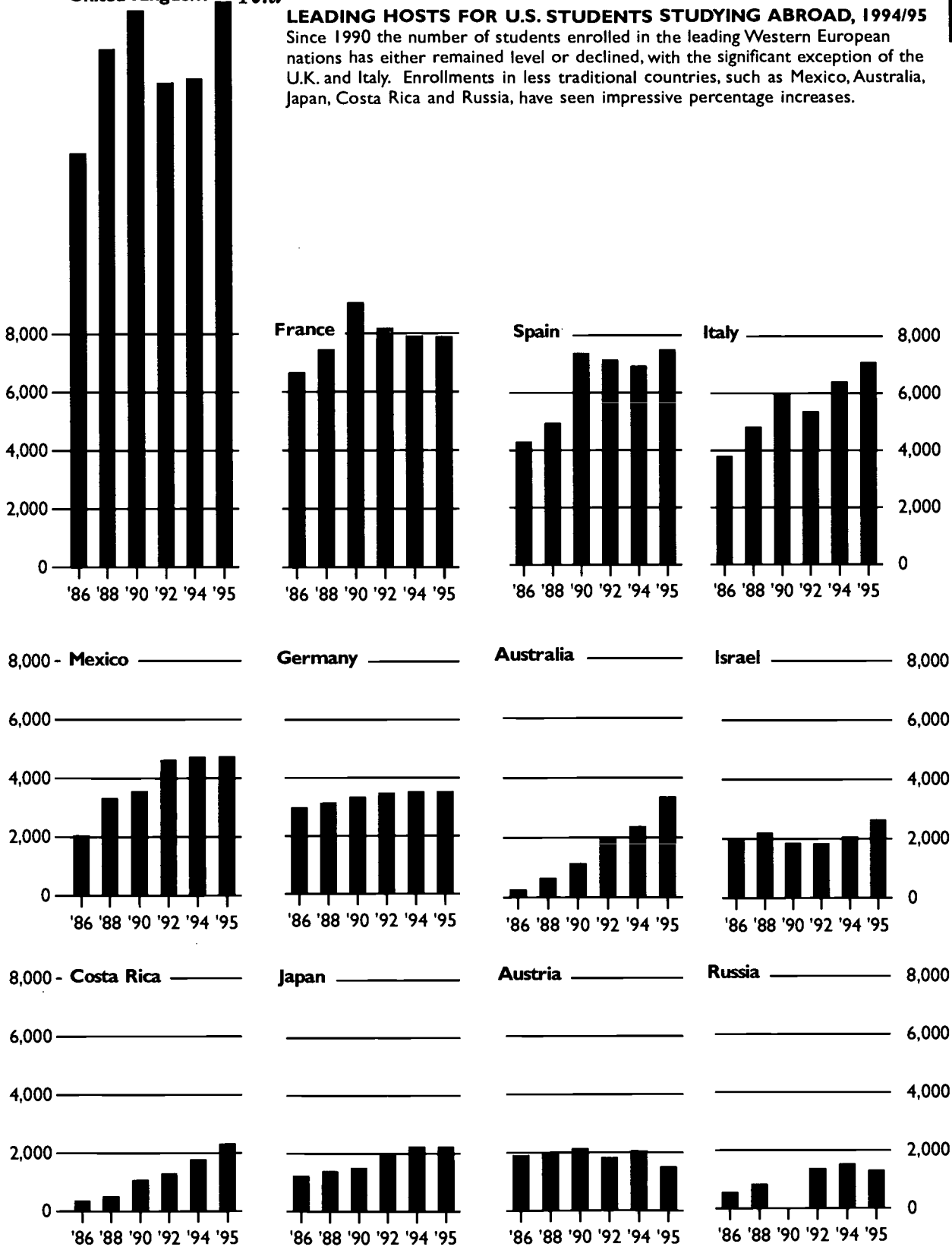
Countries outside of Western Europe are experiencing the largest percent increases in student sojorns.



United Kingdom *10.d*

LEADING HOSTS FOR U.S. STUDENTS STUDYING ABROAD, 1994/95

Since 1990 the number of students enrolled in the leading Western European nations has either remained level or declined, with the significant exception of the U.K. and Italy. Enrollments in less traditional countries, such as Mexico, Australia, Japan, Costa Rica and Russia, have seen impressive percentage increases.



Cooperation and Collaboration in U.S. Study Abroad Programming

MARK ALLYN HOLMAN

University of California, Berkeley

COOPERATION has become a fact of life in study abroad programming. While traditional "in-house" programs catering mainly to a college's own students still exist, the growing trend in study abroad is toward various types of collaborative arrangements by which U.S. colleges and universities, third-party program and service providers, and overseas host institutions join forces to develop, promote, and administer overseas study opportunities.

What is driving this trend toward collaboration? What are the costs and benefits from the perspective of participating colleges? And what are the long-term implications for the overall enterprise of U.S. study abroad? My own recent research among faculty and administrators at some 50 institutions nationwide provides some tentative answers and suggests some challenging questions for scholars and practitioners alike. Cooperation in study abroad, as in other areas of higher education, is nothing new. In fact, the very first Junior Year Abroad program, sponsored in 1923 by the University of Delaware, included students from other colleges. As the number of study abroad programs and U.S. student participants expanded in the post-World War II era, so too did the limited cooperative practices of cross-registration and mutual credit recognition. In the early 1960s, cooperation moved into the realm of joint program planning and development with the founding of several "study abroad consortia"—e.g., the Associated Colleges of the Midwest, the Great Lakes College Association, and the University of California Education Abroad Program. Continuing growth in the 1970s and early 1980s led to establishment of yet other types of collaborative alliances—in the community college sector, in discipline-specific programs, and in new formats such as overseas internships.

What distinguishes interorganizational collaboration in the present era, however, is the dramatic growth both in the scope and variety of such arrangements and in the number of institutions involved. During just the past decade, according to *Open Doors* data, the percentage of students participating in consortially-sponsored (as opposed to "institution-based" in-house) study abroad programs increased from 5.5% in 1985 to more than 26% in 1994. Direct enrollment in programs sponsored by overseas institutions also increased during this period, so that today more than one in every four study abroad participants is enrolled in an "externally sponsored" program. This trend, coupled with increasing financial stringency within international education and U.S. higher education at large, has raised several challenging policy and planning questions at the campus level: portability of campus-based financial aid, the relationship between study abroad and faculty international development, and the liberality of campus policies on credit transfer (as seen in the spread of so-called "approved program lists").

The emergence of such issues suggests, as most interviewees in my study attested, that the primary forces driving increased cooperation in study abroad programming are economic: joining forces

with other campuses and program service providers enables a college or university to accommodate increasing student demand for a wider range of overseas options by achieving the economies of scale available through joint program development and administration. Yet, other factors may also be at work, such as changes in faculty perceptions of the career value and institutional rewards of a stint as resident director, a pronounced trend toward two-career faculty households, and a growing cadre of international education professionals now charged to handle administrative details once assumed by the resident faculty director.

Study abroad programs can bring many benefits to a campus: from educational benefits such as broadening student horizons, developing language skills, cultivating comparative perspective and cross-cultural understanding; to organizational benefits in terms of student recruitment, alumni giving, and faculty development. The challenge before those who would promote study abroad in the current budget-conscious environment is to make the case for "value added" in both educational and organizational terms, focusing on the student experience within the context of wider interests and objectives held by other campus groups and individuals whose support is essential to the success of the enterprise.

What does the trend toward collaboration suggest about the future of study abroad? The answer to this question is being worked out in the institutional policy and strategic planning discussions currently taking place on campuses throughout the country. It seems clear that an efficient network infrastructure is now in place to accommodate further expansion in the number of students taking advantage of a growing range of study abroad options. Decisions as to what to make of this potential, however, remain in the province of each autonomous college or university and its respective governing bodies.

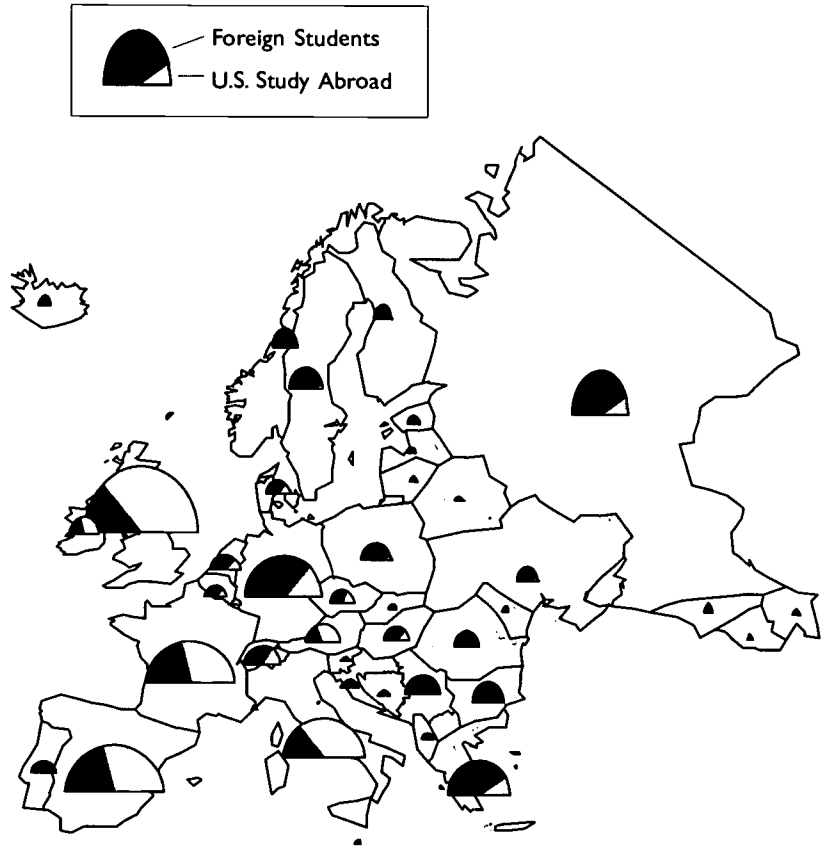
Mark Holman recently completed his Ph.D. at U.C. Berkeley on the topic, "Modeling Alliance in U.S. Study Abroad: Understanding Campus Strategies of Interorganizational Cooperation in Overseas Study Programming." He currently works as director of Resource Development, Office of the Dean, International and Area Studies, U.C. Berkeley. He welcomes your correspondence on this topic. maholman@garnet.berkeley.edu.

- It is especially notable that since 1990 the number of U.S. students studying in the leading Western European nations, with the exception of the United Kingdom, has either remained level or has declined. Enrollments in countries such as Mexico, Australia, Japan, Costa Rica and Russia have seen increases in popularity as sojourn destinations.
- The strongest flows of internationally mobile foreign students have been from the developing world to the economically developed nations. Within the past ten years another tendency has been gaining strength: exchanges between nations of the developed world. It is within the context of these "north-north" exchanges that U.S. study abroad may be understood.
- It is well known that the United States does not have balanced student exchange flows with those nations from which most foreign students in this country originate. Very large numbers of foreign students come to the United States from developing nations of Asia, but very few U.S. students select these countries as sojourn sites. Our exchange relationship with the leading European nations is, however, much more balanced.

10.e

HOW BALANCED IS EXCHANGE: EUROPE

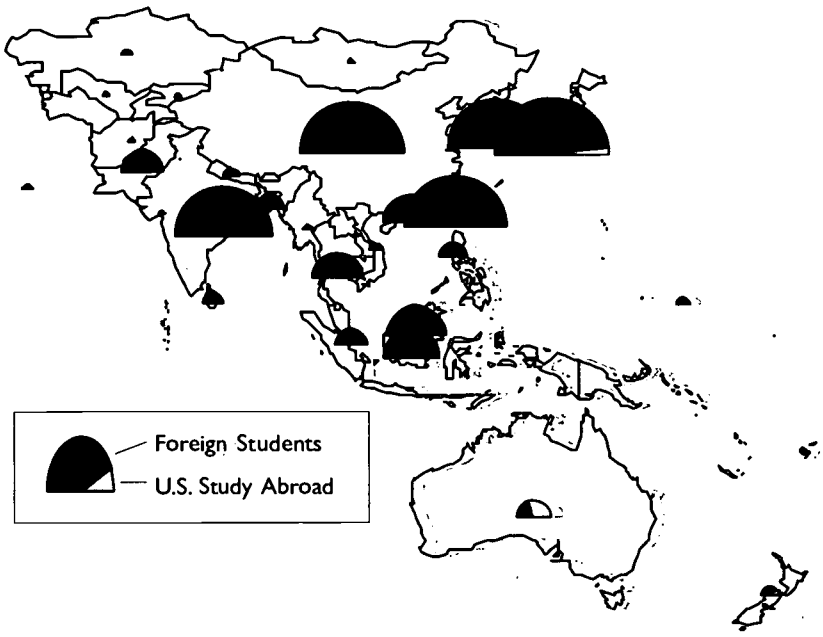
Our exchange relationship with the countries of Western Europe appears roughly balanced. However, this pattern does not hold for Eastern Europe.



10.f

HOW BALANCED IS EXCHANGE: ASIA

Asian countries that send very large numbers of students to the United States receive very few U.S. students in return.



■ Unlike other developed countries, what is striking about our exchange relationship with Japan is the large number of Japanese students studying in the United States. This year more foreign students came to the United States from Japan than from all of the leading Western European nations combined. Compared to other Asian destinations, relatively large numbers of U.S. students also study in Japan, the tenth most popular destination for U.S. students. U.S. study abroad enrollments in Japan exceed those of all the other countries of Asia and Eastern Europe, and many of the receiving countries in Western Europe. Of interest this year is the increase in study abroad sojourns to China. Chinese sojourns showed a 30% increase this year with over 1,200 U.S. students studying in China, almost returning to pre-1989 levels.

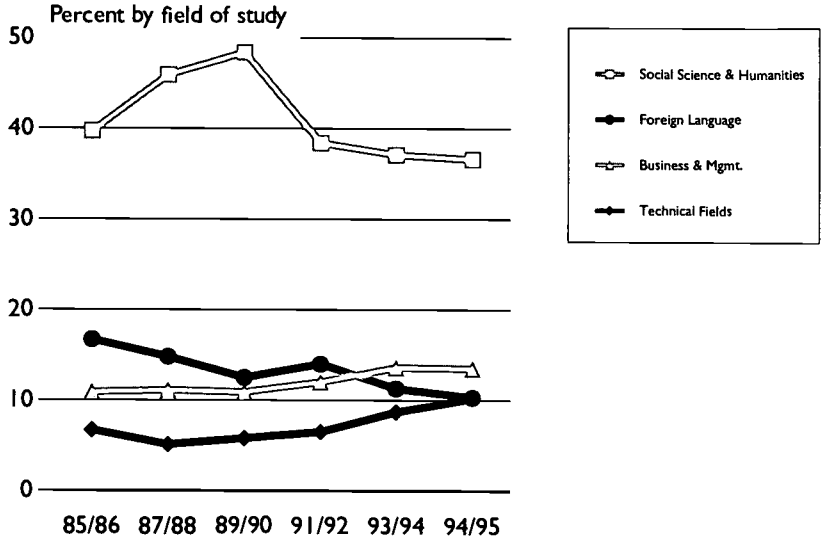
About the Sojourn

- Americans who study abroad do so for very different reasons than foreign students who come to study in the United States. In contrast to foreign nationals in this country, Americans abroad have home-campus majors largely in the humanities and social sciences, with relatively few in engineering and in hard science fields. In 1994/95, the largest group of U.S. students who went abroad to study majored in social sciences and humanities (36%). The second largest group studied toward degrees in business (13%). Relatively large shares of the Americans who studied abroad majored in foreign languages (10%). The fields of engineering, physical and life sciences, and math and computer sciences combined for only 10%.

10.g

BUSINESS OR SHAKESPEARE?

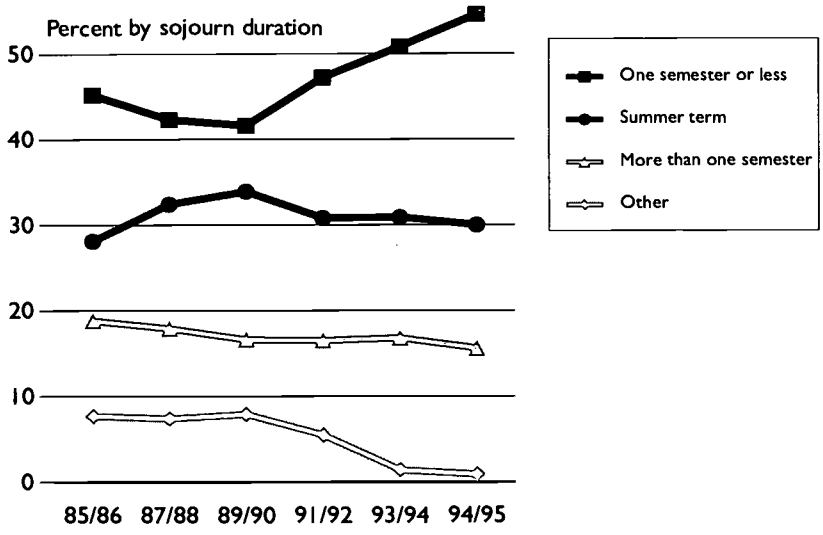
Since 1990 the proportion of U.S. students studying abroad who major in languages, social sciences and humanities has been dropping, while the share in business and scientific fields is on the rise.



10.b

STUDY ABROAD DURATIONS, 1985/86 - 1994/95

The percentage of students who spend more than a semester abroad has fallen over the past years while the percent who go abroad for a shorter period has increased markedly.



These field-of-study patterns have been changing over time, albeit slowly. Since 1990 the proportion of U.S. students who study abroad and major in either the social sciences and humanities or in foreign languages has been dropping, while the share majoring in business, the technical fields and in a wide range of other fields has increased.

- Over 50% of students studying abroad did so for the duration of one semester or less, while only 14% spent the entire academic year in the host country. The second most popular time period for a sojourn was the summer term (30%).

10.2
FIELD OF STUDY AND DURATION OF U.S. STUDY ABROAD, 1985/86 - 1994/95

	Percent of Study Abroad Students						1994/95
Field of study	**1985/86**	**1987/88**	**1989/90**	**1991/92**	**1993/94**	**1994/95**	**Students**
Social Science & Humanities	39.7	45.9	48.4	38.4	37.1	36.6	30,879
Business & Management	10.9	11.1	10.9	12.0	13.6	13.5	11,415
Foreign Languages	16.7	14.8	12.5	14.0	11.3	10.3	8,674
Fine or Applied Arts	6.9	6.4	6.1	9.9	7.7	9.0	7,567
Physical Sciences	3.8	2.5	3.7	3.8	5.3	6.8	5,712
Other	8.2	6.8	6.8	7.6	7.7	6.4	5,392
Dual Major	-	-	-	-	3.6	4.1	3,480
Education	4.1	4.0	4.6	5.7	4.0	3.8	3,184
Undeclared	4.2	3.8	3.4	4.1	3.6	3.3	2,804
Engineering	1.6	1.4	1.3	1.6	2.3	2.2	1,881
Health Sciences	1.7	1.4	1.1	1.1	1.7	2.1	1,786
Math or Computer Science	1.3	1.2	0.8	1.1	1.1	1.2	1,046
Agriculture	1.0	0.7	0.4	0.7	0.9	0.7	583
Total	**100**	**100**	**100**	**100**	**100**	**100.0**	**84,403**

	Percent of Study Abroad Students						1994/95
Duration	**1985/86**	**1987/88**	**1989/90**	**1991/92**	**1993/94**	**1994/95**	**Students**
One Semester	37.3	35.0	35.2	37.5	37.2	39.4	33,286
Summer Term	28.1	32.4	33.9	30.8	30.9	30.0	25,280
Academic Year	17.7	17.5	15.9	15.9	14.3	14.0	11,804
January Term	-	-	-	-	5.6	6.9	5,830
One Quarter	7.9	7.3	6.4	9.7	6.3	4.8	4,018
Fewer than 8 weeks	-	-	-	-	1.7	2.5	2,100
Two Quarters	-	-	-	-	2.0	1.1	940
Other	7.7	7.4	7.9	5.5	1.4	0.9	754
Calendar Year	1.1	0.4	0.7	0.6	0.5	0.5	391
Total	**100**	**100**	**100**	**100**	**100**	**100.0**	**84,403**

10.3
INSTITUTIONAL TYPE, PROGRAM SPONSORSHIP AND FINANCIAL SUPPORT, 1993/94 - 1994/95

Carnegie Category	1993/94 Percent	1993/94 Average	1994/95 Percent	1994/95 Average	1994/95 Students
Research I&II	40.2	274	41.1	312	34,662
Baccalaureate I&II	20.8	52	21.5	60	18,167
Master's I&II	19.0	49	18.5	52	15,652
Doctoral I&II	14.9	139	14.5	146	12,203
Associate	2.9	19	2.3	18	1,980
Other Institutions	2.2	22	2.1	20	1,739
Total	**100.0**		**100**		**84,403**

Program Sponsorship	1993/94 Students	1993/94 Percent	1994/95 Students	1994/95 Percent
Soley own institution	56,006	73.4	60,071	71.2
Other institutions /organizations	20,296	26.6	24,332	28.8
Total	**76,302**	**100.0**	**84,403**	**100**

Institutional Financal Support	1993/94 Reporting Institutions	1993/94 Percent of Respondents	1994/95 Reporting Institutions	1994/95 Percent of Respondents
a) Aid for all institutionally approved study abroad programs	367	46.2	357	62.3
b) Aid for institutionally approved study abroad programs but not other study abroad programs	135	17.0	69	12.0
c) Do not know	129	16.2	9	1.6
d) Other	91	11.4	45	7.9
e) Federal or state aid but no institutional aid	57	7.2	37	6.5
f) Federal aid but not state or institutional aid	16	2.0	56	9.8
Total	**631**	**100.0**	**573**	**100.0**

About the Institutions

- Institutions that sponsor and accept study abroad credits are of all Carnegie types. Traditionally, study abroad experiences were pioneered at selective liberal arts institutions. Today, however, research institutions sponsor the largest proportion, about 41%, of study abroad students.
- Students may access study abroad programs in a variety of ways. Institutions and their study abroad offices develop and manage their own programs, and they and independent consortia may administer programs for other institutions. Fully 71% of study abroad students completed their sojourns under the auspices of their own home institution, while 28% did so under the auspices of other institutions or consortial organizations.
- Institutions provided a range of financing options for student sojourns. Over 62% of reporting institutions indicated that all aid was available to students for study abroad under any sponsorship arrangement. The balance reported some limitations on aid, either state or institutional, for study abroad.

■ The following tables present the leading study abroad institutions in the country by total number of study abroad students. The following tables include the top 25 institutions by Carnegie Classification, as described in Section 8 (Research, Doctoral, Master's, Baccalaureate, and Associate degree institutions), that sent the largest number of students abroad.

10.4
STUDY ABROAD ENROLLMENTS BY INSTITUTIONAL TYPE: TOP 25 RESEARCH INSTITUTIONS, 1994/95

Top 25 Research Institutions	City	State	Study Abroad Students	Total Enrollment
University of California, Santa Barbara*	Santa Barbara	CA	1,557	18,581
University of Delaware	Newark	DE	1,017	21,365
Michigan State University	East Lansing	MI	1,002	40,647
University of Pennsylvania	Philadelphia	PA	997	22,469
University of Texas at Austin	Austin	TX	809	48,555
Georgetown University	Washington	DC	768	13,522
University of Kansas	Lawrence	KS	748	26,127
Syracuse University	Syracuse	NY	729	17,950
Duke University	Durham	NC	706	11,282
University of Illinois Urbana-Champaign	Champaign	IL	702	36,465
Pennsylvania State Univ- Univ Park Campus	University Park	PA	678	39,571
Boston University	Boston	MA	655	29,025
Indiana University at Bloomington	Bloomington	IN	635	35,059
Texas A&M University	College Station	TX	620	43,031
University of Michigan-Ann Arbor	Ann Arbor	MI	618	36,617
University of North Carolina Chapel Hill	Chapel Hill	NC	613	24,299
University of Minnesota-Twin Cities	Minneapolis	MN	607	36,995
Ohio State University Main Campus	Columbus	OH	596	48,676
University of Florida	Gainesville	FL	582	38,730
Cornell University	Ithaca	NY	541	18,781
Yeshiva University	New York	NY	530	5,300
University of Notre Dame	Notre Dame	IN	515	10,303
University of Massachusetts at Amherst	Amherst	MA	490	24,125
University of Colorado at Boulder	Boulder	CO	459	24,440
University of Georgia	Athens	GA	456	28,753

* The UC study abroad system-wide office is housed at UCA-Santa Barbara; system-wide enrollment totals about 240,500.

10.5

STUDY ABROAD ENROLLMENTS BY INSTITUTIONAL TYPE: TOP 25 DOCTORAL INSTITUTIONS, 1994/95

Doctoral Institutions	City	State	Study Abroad Students	Total Enrollment
Miami University-Oxford Campus	Oxford	OH	1,023	16,000
Georgia State University	Atlanta	GA	677	23,651
Dartmouth College	Hanover	NH	671	5,516
Pepperdine University	Malibu	CA	510	7,833
University of Southern Mississippi	Hattiesburg	MS	500	13,814
College of William & Mary	Williamsburg	VA	430	7,586
American University	Washington	DC	427	11,299
Southern Methodist University	Dallas	TX	364	9,172
George Mason University	Fairfax	VA	330	24,172
Wake Forest University	Winston-Salem	NC	317	5,661
Baylor University	Waco	TX	300	12,202
Ball State University	Muncie	IN	281	20,717
Boston College	Chestnut Hill	MA	275	14,440
Illinois State University	Normal	IL	267	19,294
University of New Hampshire	Durham	NH	249	12,414
University of North Texas	Denton	TX	245	25,114
Loyola University of Chicago	Chicago	IL	241	14,361
Texas Christian University	Fort Worth	TX	240	6,822
Northern Arizona University	Flagstaff	AZ	240	20,131
University of Alabama	Tuscaloosa	AL	222	19,494
SUNY at Binghamton	Binghamton	NY	218	11,979
Bowling Green State University	Bowling Green	OH	209	17,000
Northern Illinois University	De Kalb	IL	167	22,558
Indiana University of Pennsylvania	Indiana	PA	155	14,062
University of Denver	Denver	CO	153	8,337

10.6
STUDY ABROAD ENROLLMENTS BY INSTITUTIONAL TYPE: TOP 25 MASTER'S INSTITUTIONS, 1994/95

Master's Institutions	City	State	Study Abroad Students	Total Enrollment
University of Northern Iowa	Cedar Falls	IA	684	12,802
University of St. Thomas	Saint Paul	MN	326	10,421
Appalachian State University	Boone	NC	325	11,641
Samford University	Birmingham	AL	321	4,443
Slippery Rock University of Pennsylvania	Slippery Rock	PA	298	7,493
Elon College	Elon College	NC	296	3,479
James Madison University	Harrisonburg	VA	277	11,927
Weber State University	Ogden	UT	261	14,500
Santa Clara University	Santa Clara	CA	233	7,654
Northeast Missouri State University	Kirksville	MO	232	5,860
University of Richmond	Richmond	VA	229	4,302
Loyola Marymount University	Los Angeles	CA	225	6,667
Ithaca College	Ithaca	NY	205	5,900
SUNY College at Oswego	Oswego	NY	200	8,616
Villanova University	Villanova	PA	200	11,219
Linfield College	Mc Minnville	OR	195	2,204
University of Dayton	Dayton	OH	190	9,753
California State University, Sacramento	Sacramento	CA	186	22,796
University of Wisconsin-Eau Claire	Eau Claire	WI	181	10,300
Rollins College	Winter Park	FL	169	3,281
Trinity University	San Antonio	TX	168	2,482
Loyola College in Maryland	Baltimore	MD	163	6,364
Eastern Michigan University	Ypsilanti	MI	158	23,558
University of Wisconsin-Stevens Point	Stevens Point	WI	151	8,407
Mankato State University	Mankato	MN	150	14,000

10.7

STUDY ABROAD ENROLLMENTS BY INSTITUTIONAL TYPE: TOP 25 BACCALAUREATE INSTITUTIONS, 1994/95

Baccalaureate Institutions	City	State	Study Abroad Students	Total Enrollment
St. Olaf College	Northfield	MN	452	2,936
Colgate University	Hamilton	NY	325	2,612
Colby College	Waterville	ME	301	1,790
Carleton College	Northfield	MN	279	1,909
DePauw University	Greencastle	IN	278	2,082
Dickinson College	Carlisle	PA	268	1,840
Gustavus Adolphus College	Saint Peter	MN	268	2,398
Saint John's University	Collegeville	MN	262	1,859
Middlebury College	Middlebury	VT	261	2,016
Bates College	Lewiston	ME	258	1,599
Union College	Schenectady	NY	241	2,009
Colorado College	Colorado Spring	CO	235	2,014
Wesleyan University	Middletown	CT	234	2,700
Bucknell University	Lewisburg	PA	230	3,719
Wofford College	Spartanburg	SC	216	1,113
Kalamazoo College	Kalamazoo	MI	205	1,268
Ramapo College of New Jersey	Mahwah	NJ	203	4,640
Oberlin College	Oberlin	OH	202	2,823
University of Dallas	Irving	TX	200	2,901
Davidson College	Davidson	NC	199	1,600
Drew University	Madison	NJ	188	2,111
Trinity College	Hartford	CT	186	2,171
Taylor University	Upland	IN	186	1,892
Concordia College-Moorhead	Moorhead	MN	186	2,958
Grinnell College	Grinnell	IA	184	1,261

10.8
STUDY ABROAD ENROLLMENTS BY INSTITUTIONAL TYPE: TOP 25 ASSOCIATE INSTITUTIONS, 1994/95

Associate Institutions	City	State	Study Abroad Students	Total Enrollment
Rockland Community College	Suffern	NY	235	7,978
Los Angeles City College	Los Angeles	CA	169	14,500
Orange Coast College	Costa Mesa	CA	150	22,000
Santa Barbara City College	Santa Barbara	CA	130	11,174
Miami-Dade Community College	Miami	FL	108	44,287
College of DuPage	Glen Ellyn	IL	100	33,920
Palm Beach Community College	Lake Worth	FL	91	16,717
Front Range Community College	Westminster	CO	89	10,249
Glendale Community College	Glendale	CA	87	14,798
City College of San Francisco	San Francisco	CA	84	28,000
Dutchess Community College	Poughkeepsie	NY	78	6,343
Broward Community College	Fort Lauderdale	FL	61	28,904
Nassau Community College	Garden City	NY	48	21,737
Pasadena City College	Pasadena	CA	47	25,000
Montgomery College Rockville Campus	Rockville	MD	39	14,355
Cosumnes River College	Sacramento	CA	38	11,000
Spokane Falls Community College	Spokane	WA	34	5,000
Ventura College	Ventura	CA	32	10,083
Peace College	Raleigh	NC	29	424
Borough of Manhattan Comm Coll CUNY	New York	NY	25	16,334
Fresno City College	Fresno	CA	24	19,136
Lane Community College	Eugene	OR	23	9,328
Chabot College	Hayward	CA	20	14,550
Modesto Junior College	Modesto	CA	20	10,975
Arapahoe Community College	Littleton	CO	19	7,350

10.9
PROFILE OF U.S. STUDY ABROAD STUDENTS, 1993/94 - 1994/95

Academic level	1993/94	1994/95	1994/95 Students
Junior	40.6	43.0	36,257
Bachelor's, Unspecified	19.1	17.5	14,774
Senior	15.6	16.3	13,756
Sophomore	11.8	10.8	9,120
Master's	4.0	4.1	3,486
Graduate, Unspecified	2.3	2.6	2,213
Freshman	3.5	2.5	2,077
Other	0.8	1.5	1,229
Associate	1.6	1.3	1,067
Doctoral	0.7	0.5	424
Total	**100**	**100**	**84,403**
Sex			
Female	62.9	62.2	52,488
Male	37.1	37.8	31,915
Total	**100**	**100**	**84,403**
Race/Ethnicity			
White	83.8	86.4	72,924
Asian-American	5.0	4.9	4,146
Hispanic-American	5.0	4.5	3,827
African-American	2.8	2.8	2,348
Multiracial	3.1	1.1	907
Native American	0.3	0.3	250
Total	**100**	**100**	**84,403**

About the Students

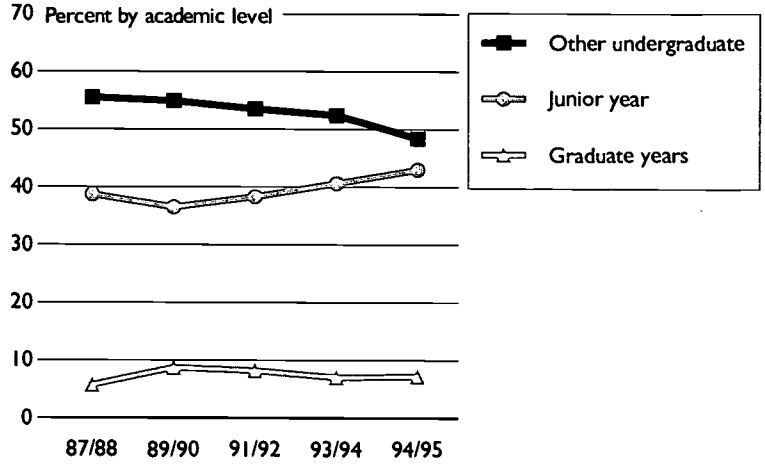
- The vast majority (93%) of the study abroad population was at the undergraduate (bachelor and associate) level. Of those whose academic level was known, the largest group was juniors (43%), followed by seniors (16%), sophomores (10%) and freshmen (2%).
- Less than 8% of the U.S. students who went abroad to study were graduate students. This proportion has remained stable over the past eight years. This contrasts sharply with the European nationals studying in the United States, about 40% of whom were at the graduate level in 1994/95.
- The sex distribution of the U.S. students who travel abroad for study was the inverse of that of the foreign students in the United States. Just over one-third (37%) of the U.S. students abroad were male, while a corresponding two-thirds were female (63%). The male-to-female ratio among U.S. students studying abroad has remained stable since the 1980s.

- American students who participate in study abroad programs are largely white (86%). Hispanic and Asian-Americans constitute about 5% each of the study abroad total. African-Americans and Native Americans were 2.8% and 0.3% of all study abroad students, while 1.1% were identified as multiracial. Some caution must be exercised in interpreting these results, as most institutions do not track study abroad students by their race or ethnicity. Only 33% of all study abroad students could be so identified.

10.i

STUDY ABROAD ENROLLMENTS BY ACADEMIC LEVEL

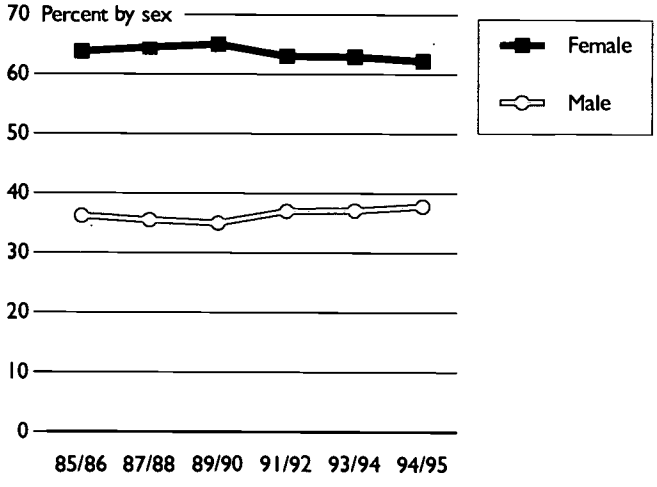
Most U.S. students (41%) who go abroad do so during their junior year.



10.j

STUDY ABROAD ENROLLMENTS BY SEX

Unlike foreign students in the United States, who are mostly male, U.S. students abroad are predominantly female.



International Internships and Active-Reflective Learning

BRIAN J. WHALEN

Boston University

WHEN Boston University's international internship programs were started some 12 years ago, there was relatively little interest in internships as a form of study abroad, yet there was a growing sentiment that the abroad experience could offer different learning opportunities than the traditional study abroad paradigm. Boston's programs have grown from 160 students in London that first year to over 900 students interning in eight different cities around the world.

The growth and success of these programs have come directly from student interest and input. As Tim Perkins, the architect of these programs, stated in a recent *Newsweek* article, "[Students] told us that in certain fields– business, politics and media are just some examples– the only way you can really learn the ropes is as an intern." Couple this with the fact that nearly every professional field is in some way becoming more "international," and you have the reasons behind the popularity of these programs. Moreover, students tell us that they like the way they learn on overseas internship programs, that they enjoy and value the very learning process itself. Beginning last year we sought ways to capitalize further on this fact by introducing programmatic changes to enhance and support the learning process associated with international internships.

Our first step was to add a series of required reflective exercises to the predeparture, on-site, and re-entry portions of the program in which students engage in thorough analysis of what and how they are learning. Beginning with the application itself, students are asked to identify their academic, career, and personal goals, and detail how they plan to accomplish these goals through the program. During the predeparture phase we work with students to define further their objectives based on the realities of the program and their individual backgrounds and abilities. They are forced, some for the first time, to use their resumes as a life-defining document that summarizes their past and points to the shape of their future. Once on-site, this document is again refined and put into a format that works within the particular culture.

Continued...

International Internships and Active-Reflective Learning

...Continued

During the internship students keep a required logbook that encourages a constant process of reflection and analysis. Classroom discussions often focus on students' internship experiences as a way of forming a bridge between the classroom and the world at large. A final project is completed on-site in which a student analyzes the organization with which he or she has interned. In addition, program evaluations now ask students to undertake a self-analysis about their learning. These evaluations are then shared at reentry seminars. These efforts have helped to give a meaningful structure to students' reflections, creating an unbroken thread that helps them to weave together the various dimensions of their experience. As a student returned from Moscow describes, "The whole semester was a process of assessing and reassessing what I was learning, and then trying to act on this."

Reflection is only one, albeit essential, part of the international internship program. Students' learning is an interplay of the reflective and the active, with each giving impetus to the other. An apt image that captures what students experience is a pendulum that swings back and forth in a constant rhythm from reflection to action. This process is best described as "active-reflective learning." It is holistic, encompassing both the experiential and the intellectual, and continuous, involving students in an ongoing process.

This Program to Enhance Active-Reflective Learning (PEARL) has helped to motivate students to take ownership of their learning, to view their internship experience in another culture as an opportunity for directing their academic, career, and personal goals. It is precisely this sense of ownership that makes the international internship such an effective and well-liked learning experience. The evolution of these programs has made them both more appealing and more meaningful for the students who participate in them.

Brian J. Whalen, Ph.D., is associate director of Boston University's International Programs and adjunct senior lecturer in the Intercultural Relations Program at Lesley College. He is founding editor of Frontiers: The Interdisciplinary Journal of Study Abroad.

11

The Number and Activities of Foreign Scholars on U.S. Campuses

FOREIGN SCHOLARS

- This year there were 59,403 foreign scholars attending U.S. institutions, up 2.3% over the 58,074 scholars reported in 1994/95. The changes this year reflect a leveling in scholar flow following two consecutive years of falling numbers. The 1994/95 total was 6.5% less than the 62,148 scholars recorded in 1991/92 (the survey was biennial until last year). Whether these changes in foreign scholar numbers are a reflection of shrinking funding for research and development, strengthened higher education infrastructures in potential scholars' home countries, changing policies of U.S. research universities, or home countries' concerns about "brain drain" remains to be seen. Significantly, many home countries sending fewer students to the United States have also shown a comparable drop in the number of their scholars in U.S. universities.

- Over four in ten (41.9%) of the foreign scholars in the United States come from Asia. Their numbers, however, are decreasing. In 1993/94 Asian scholars numbered over 27,000; this year, that number is just over 24,866. Asians have traditionally had a strong presence among foreign scholars because of the comparatively high numbers coming from China, Japan, India and South Korea. This year, each of these countries except Korea had fewer scholars in the United States than last year. China's number was down 6.5%, Japan's 0.5%, and India's 7.4%. This drop in the number of Asian scholars, particularly those from East Asia, parallels a similar decline among foreign students in general.

- In the case of China, the steep drops observed over the past three years may partially be attributed to a change in visa status accorded to many Chinese scholars in the United States since 1989. In contrast to Asian scholars, the number of scholars from Europe is rising, albeit slightly. European scholars make up over 38% of the scholars here and number over 22,500. Predominant among the Europeans are Germans. German scholars (totaling 4,251) outnumber those from the United Kingdom (2,698), France (2,320), Italy (1,584) and Spain (1,532). Although not as numerous as some Western European groups, Russians (2,432) and Poles (760) also made up a sizable proportion of the European total. The 5.7% increase in scholars from Europe is mostly attributable to increases from countries in Eastern Europe.

- The countries with the largest number of scholars in the United States are China with 9,228, Japan with 5,127, Germany with 4,251, India with 3,623 and Korea with 3,493. While most of the leading countries are in Asia or Europe, two Latin American countries, Brazil and Mexico, also had relatively high numbers of scholars here, with 1,103 and 732 respectively.

11.0

FOREIGN SCHOLAR SURVEY RESPONSE RATE, 1993/94 - 1995/96

Institutions	1993/94	1994/95	1995/96
Surveyed	403	403	409
Responding	347	374	367
Percent Responding	86.1	92.8	89.7
TOTAL	**59,981**	**58,074**	**59,403**

11.1

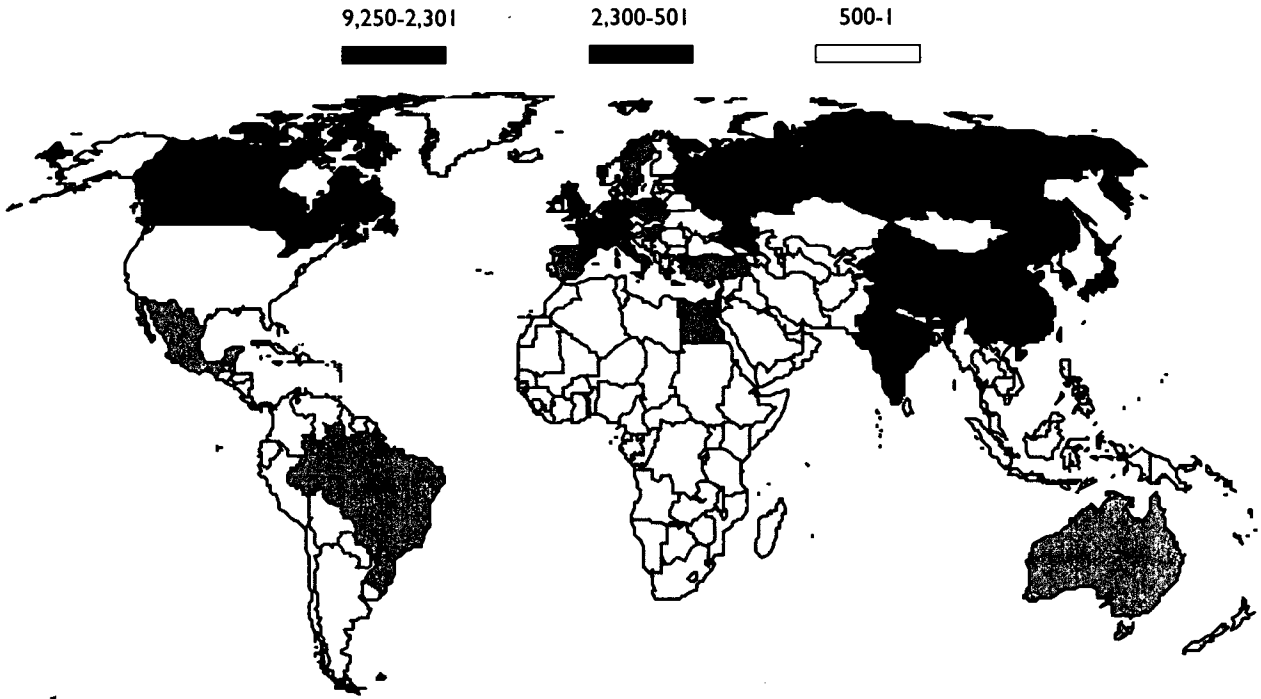
REGION OF ORIGIN OF FOREIGN SCHOLARS IN THE UNITED STATES, 1993/94 - 1995/96

	Percent of Scholars		
Region of Origin	1993/94	1994/95	1995/96
Africa	3.3	3.4	3.4
Asia	45.7	43.4	41.9
Europe	35.6	37.1	38.3
Latin America	5.7	5.9	6.3
Middle East	4.0	4.1	4.4
North America	4.1	4.3	4.0
Oceania	1.6	1.8	1.7
TOTAL	**59,981**	**58,074**	**59,403**

11.a

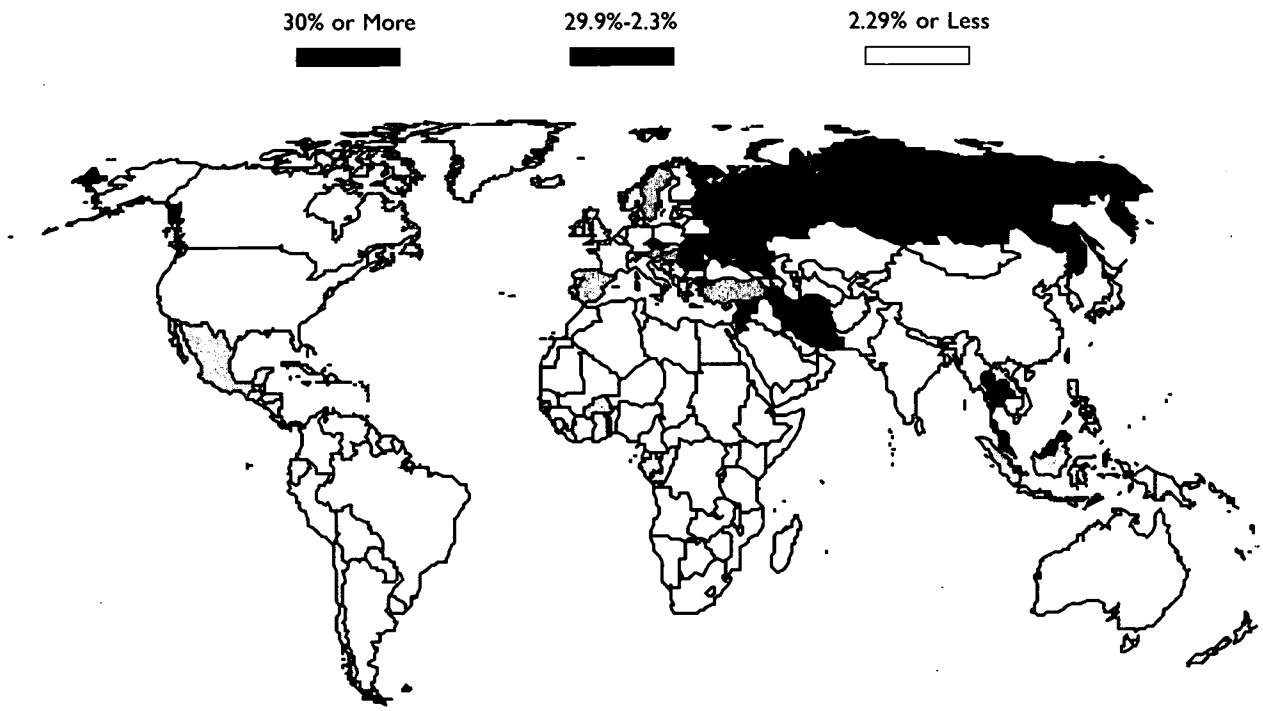
COUNTRIES OF ORIGIN OF FOREIGN SCHOLARS, 1995/96

Most foreign scholars come to the United States from countries within Asia or Europe. China, Japan and Germany are the leading places of origin.



11.b

PERCENTAGE CHANGE AMONG COUNTRIES WITH MORE THAN 100 SCHOLARS IN THE UNITED STATES



11.2

FOREIGN SCHOLAR TOTALS BY LEADING PLACES OF ORIGIN, 1994/95-1995/96

Place of Origin	1994/95	1995/96	% Change
AFRICA	**1,947**	**1,993**	**2.4**
Eastern Africa	**419**	**351**	**-16.2**
Kenya	154	126	-18.2
Tanzania	18	63	250.0
Ethiopia	105	49	-53.3
Zimbabwe	72	36	-50.0
Uganda	10	28	180.0
Zambia	15	13	-13.3
Malawi	18	8	-55.6
Mauritius	6	7	16.7
Mozambique	2	5	150.0
Rwanda	8	5	-37.5
Madagascar	1	3	200.0
Somalia	1	3	200.0
Eritrea	0	2	-
Comoros	0	1	-
Seychelles	0	1	-
Eastern Africa, Unspecified	9	1	-88.9
Central Africa	**37**	**75**	**102.7**
Cameroon	12	35	191.7
Zaire	24	23	-4.2
Congo	1	7	600.0
Central African Republic	0	2	-
Chad	0	2	-
Equatorial Guinea	0	2	-
Gabon	0	2	-
Angola	0	1	-
Sao Tome & Principe	0	1	-
North Africa	**835**	**847**	**1.4**
Egypt	651	603	-7.4
Morocco	43	88	104.7
Algeria	84	73	-13.1
Tunisia	30	46	53.3
Sudan	18	34	88.9
Libya	1	3	200.0
North Africa, Unspecified	8	0	-100.0

Place of Origin	1994/95	1995/96	% Change
Southern Africa	**326**	**303**	**-7.1**
South Africa	314	278	-11.5
Botswana	0	17	-
Swaziland	0	5	-
Namibia	6	2	-66.7
Lesotho	0	1	-
Southern Africa, Unspecified	6	0	-100.0
Western Africa	**329**	**417**	**26.7**
Nigeria	238	237	-0.4
Ghana	39	82	110.3
Senegal	16	25	56.3
Cote d'Ivoire	9	24	166.7
Sierra Leone	6	14	133.3
Mali	2	10	400.0
Benin	2	6	200.0
Gambia	2	5	150.0
Liberia	5	5	0.0
Niger	0	3	-
Togo	3	3	0.0
Mauritania	0	2	-
Guinea	0	1	-
Cape Verde	1	0	-100.0
Western Africa, Unspecified	6	0	-100.0
Africa, Unspecified	1	0	-100.0
ASIA	**25,223**	**24,866**	**-1.4**
East Asia	**19,665**	**19,327**	**-1.7**
China	9,866	9,228	-6.5
Japan	5,155	5,127	-0.5
Republic of Korea	3,163	3,493	10.4
Taiwan	1,220	1,201	-1.6
Hong Kong	255	263	3.1
Mongolia	5	13	160.0
Macao	1	2	100.0

11.2 (cont.)

FOREIGN SCHOLAR TOTALS BY LEADING PLACES OF ORIGIN, 1994/95-1995/96

Place of Origin	1994/95	1995/96	% Change
South & Central Asia	**4,657**	**4,345**	**-6.7**
India	3,912	3,623	-7.4
Pakistan	376	297	-21.0
Bangladesh	149	135	-9.4
Sri Lanka	127	126	-0.8
Nepal	37	73	97.3
Kazakhstan	13	32	146.2
Uzbekistan	10	27	170.0
Kyrgyzstan	27	13	-51.9
Afghanistan	3	7	133.3
Turkmenistan	0	7	-
Tajikistan	3	5	66.7
Southeast Asia	**899**	**1,194**	**32.8**
Thailand	226	341	50.9
Philippines	323	283	-12.4
Malaysia	85	238	180.0
Indonesia	126	134	6.3
Singapore	103	91	-11.7
Vietnam	28	90	221.4
Myanmar	5	9	80.0
Laos	0	5	-
Brunei	0	2	-
Cambodia	3	1	-66.7
Asia, Unspecified	**2**	**0**	**-100.0**
EUROPE	**21,530**	**22,766**	**5.7**
Eastern Europe	**4,032**	**5,619**	**39.4**
Russia	1,322	2,432	84.0
Poland	930	760	-18.3
Hungary	532	547	2.8
Ukraine	134	286	113.4
Czech Republic	181	256	41.4
Romania	136	245	80.1
Bulgaria	193	217	12.4
Yugoslavia (former)	227	185	-18.5
Croatia	37	96	159.5
Slovakia	61	84	37.7
Lithuania	12	71	491.7
Slovenia	38	64	68.4
Georgia	27	57	111.1
Belarus	28	44	57.1
Latvia	10	43	330.0
Armenia	18	42	133.3
Albania	7	36	414.3
U.S.S.R. (former)	23	34	47.8
Estonia	28	32	14.3
Bosnia & Herzegovina	7	31	342.9
Macedonia	.	26	.
Azerbaijan	12	11	-8.3
Czechoslovakia (former)	7	10	42.9
Moldova	1	10	900.0
Eastern Europe, Unspecified	61	0	-100.0
Western Europe	**17,498**	**17,147**	**-2.0**
Germany	4,369	4,251	-2.7
United Kingdom	2,690	2,698	0.3
France	2,410	2,320	-3.7
Italy	1,702	1,584	-6.9
Spain	1,483	1,532	3.3
Netherlands	1,003	1,000	-0.3
Switzerland	783	778	-0.6
Sweden	518	546	5.4
Denmark	390	410	5.1
Greece	413	406	-1.7
Austria	335	366	9.3
Norway	342	308	-9.9
Belgium	299	271	-9.4
Finland	336	263	-21.7
Ireland	200	178	-11.0
Portugal	145	149	2.8
Iceland	70	66	-5.7
Luxembourg	3	15	400.0
Malta	2	5	150.0
Vatican City	0	1	-
Western Europe, Unspec	5	0	-100.0

11.2 (cont.)

FOREIGN SCHOLAR TOTALS BY LEADING PLACES OF ORIGIN, 1994/95-1995/96

Place of Origin	1994/95	1995/96	% Change
LATIN AMERICA	**3,438**	**3,740**	**8.8**
Caribbean	**144**	**317**	**120.1**
Jamaica	29	134	362.1
Trinidad & Tobago	27	59	118.5
Cuba	9	31	244.4
Dominican Republic	12	30	150.0
Barbados	13	17	30.8
Bahamas	7	16	128.6
Haiti	0	7	-
Netherlands Antilles	13	6	-53.8
Antigua	0	3	-
British Virgin Islands	0	2	-
Montserrat	2	2	0.0
Dominica	0	2	-
St. Lucia	0	2	-
St. Kitts-Nevis	1	1	0.0
Anguilla	0	1	-
Grenada	0	1	-
St. Vincent	1	1	0.0
Aruba	2	0	-100.0
Cayman Islands	5	0	-100.0
Caribbean, Unspecified	23	2	-91.3
Central America/Mexico	**729**	**915**	**25.5**
Mexico	634	732	15.5
Guatemala	13	46	253.8
Costa Rica	30	42	40.0
Panama	12	42	250.0
El Salvador	14	23	64.3
Nicaragua	5	17	240.0
Honduras	13	13	0.0
Cent. Amer/Mexico, Unsp	8	0	-100.0
South America	**2,565**	**2,508**	**-2.2**
Brazil	1,107	1,103	-0.4
Argentina	436	444	1.8
Columbia	326	283	-13.2
Venezuela	291	255	-12.4
Chile	185	181	-2.2
Peru	135	129	-4.4
Ecuador	22	48	118.2
Uruguay	24	28	16.7
Guyana	13	13	0.0
Bolivia	13	10	-23.1
Paraguay	12	8	-33.3
Suriname	1	6	500.0
MIDDLE EAST	**2,358**	**2,637**	**11.8**
Israel	1,055	1,031	-2.3
Turkey	605	638	5.5
Iran	170	303	78.2
Jordan	47	160	240.4
Lebanon	154	131	-14.9
Syria	87	121	39.1
Saudi Arabia	100	91	-9.0
United Arab Emirates	65	40	-38.5
Cyprus	18	38	111.1
Iraq	14	34	142.9
Kuwait	28	31	10.7
Oman	0	11	-
Yemen	6	7	16.7
Bahrain	3	1	-66.7
Middle East, Unspecified	6	0	-100.0
NORTH AMERICA	**2,512**	**2,355**	**-6.3**
Canada	2,498	2,350	-5.9
Bermuda	14	5	-64.3
OCEANIA	**1,054**	**1,038**	**-1.5**
Australia	821	797	-2.9
New Zealand	230	236	2.6
Niue	0	2	-
Fiji	1	1	0.0
Vanuatu	0	1	-
Palau	0	1	-
Papua New Guinea	2	0	-100.0
Stateless	0	8	-
WORLD TOTAL	**58,074**	**59,403**	**2.3**

11.3

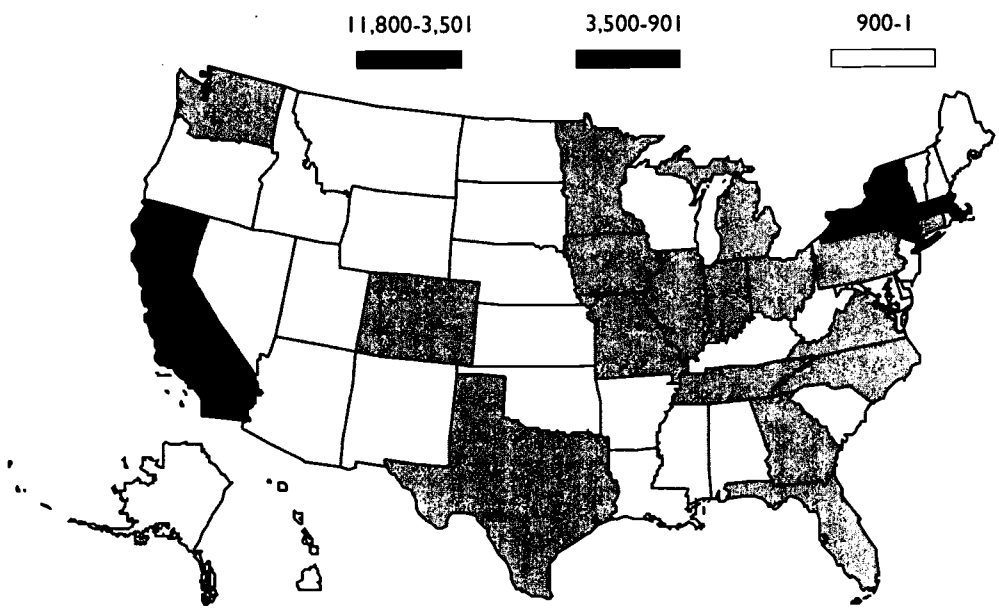
INSTITUTIONS HOSTING THE MOST FOREIGN SCHOLARS, 1994/95 - 1995/96

Institutions	City	Number of Scholars 1994/95	1995/96
Harvard University	Cambridge	2,508	2,301
University of California, Berkeley	Berkeley	2,195	2,208
University of California, Los Angeles	Los Angeles	1,869	1,714
University of California, San Diego	La Jolla	1,295	1,379
Massachusetts Institute of Technology	Cambridge	1,376	1,318
University of California, San Francisco	San Francisco	.	1,300
University of Minnesota-Twin Cities	Minneapolis	1,216	1,219
Cornell University	Ithaca	1,128	1,193
University of Washington	Seattle	1,080	1,185
University of Pennsylvania	Philadelphia	1,244	1,168
University of California, Davis	Davis	1,141	1,160
Georgia Institute of Technology	Atlanta	282	1,099
University of California, Irvine	Irvine	756	865
University of Wisconsin-Madison	Madison	619	847
University of Texas at Austin	Austin	582	802
Yale University	New Haven	.	765
Ohio State University Main Campus	Columbus	743	747
Washington University	St. Louis	692	733
University of Florida	Gainesville	684	731

- Harvard University continues to host the most foreign scholars, despite reporting a smaller number this year. Harvard has 2,301 scholars, about 100 more than the University of California at Berkeley, which with 2,208 scholars was the second largest host. The University of California at Los Angeles was third with 1,714, followed by University of California, San Diego, with 1,379 and M.I.T. with 1,318. These Research I institutions are known to house nationally and internationally recognized programs in the sciences and/or engineering, fields of major interest to foreign scholars (see Section 12 for description of types of institutions surveyed and not surveyed).

11.c

DISTRIBUTION OF FOREIGN SCHOLARS IN THE UNITED STATES, 1995/96



■ California is host to the largest number of foreign scholars (11,723), but Massachusetts (5,274) and New York (4,067) also have considerable numbers in their research universities.

11.4

FOREIGN SCHOLARS BY STATE, 1993/94 - 1995/96

State	1993/94 Total	1994/95 Total	1995/96 Total	% Change
Alabama	808	652	591	-9.4
Alaska	31	50	24	-52.0
Arizona	688	515	835	62.1
Arkansas	207	214	307	43.5
California	9,986	10,314	11,723	13.7
Colorado	1,062	1,156	922	-20.2
Connecticut	60	33	985	2,884.8
Delaware	793	328	363	10.7
District of Columbia	330	731	779	6.6
Florida	1,633	1,820	1,661	-8.7
Georgia	1,030	1,246	2,201	76.6
Hawaii	975	188	188	0.0
Idaho	54	46	321	597.8
Illinois	2,340	2,374	1,741	-26.7
Indiana	1,700	1,438	1,550	7.8
Iowa	830	774	922	19.1
Kansas	595	362	313	-13.5
Kentucky	305	368	445	20.9
Louisiana	444	539	505	-6.3
Maine	47	63	54	-14.3
Maryland	912	668	737	10.3
Massachusetts	5,807	5,185	5,274	1.7
Michigan	1,402	2,165	1,725	-20.3
Minnesota	1,306	1,227	1,231	0.3
Mississippi	255	178	171	-3.9
Missouri	2,154	1,473	1,429	-3.0
Montana	73	93	113	21.5
Nebraska	281	300	244	-18.7
Nevada	141	98	185	88.8
New Hampshire	188	195	240	23.1

11.4 (cont.)

FOREIGN SCHOLARS BY STATE, 1993/94 - 1995/96

State	1993/94 Total	1994/95 Total	1995/96 Total	% Change
New Jersey	1,006	919	520	-43.4
New Mexico	200	210	222	5.7
New York	4,620	4,599	4,067	-11.6
North Carolina	1,511	1,424	1,463	2.7
North Dakota	174	53	57	7.5
Ohio	1,681	1,862	1,920	3.1
Oklahoma	363	450	219	-51.3
Oregon	878	715	792	10.8
Pennsylvania	3,594	3,681	3,277	-11.0
Rhode Island	281	341	399	17.0
South Carolina	486	469	422	-10.0
South Dakota	19	10	23	130.0
Tennessee	1,105	1,197	1,000	-16.5
Texas	3,610	3,574	3,243	-9.3
Utah	338	448	383	-14.5
Vermont	228	207	200	-3.4
Virginia	1,030	1,015	1,017	0.2
Washington	1,202	1,215	1,309	7.7
West Virginia	53	54	40	-25.9
Wisconsin	1,044	750	888	18.4
Wyoming	65	56	103	83.9
Puerto Rico	56	32	60	87.5
U.S. TOTAL	**59,981**	**58,074**	**59,403**	**2.3**

- Research is the primary activity of most of the foreign scholars at U.S. universities around the country. Over three-quarters (82%) of the scholars here are involved solely in research activities. Only 11% were here primarily for teaching, and a smaller 6% were concerned with both. Since the early 1990s, there has been a marked shift away from research combined with teaching, perhaps reflecting a continuing debate on campuses about the role of foreign scholars in teaching activities, particularly at the undergraduate level. While research and graduate education are vital research university functions, a consensus has emerged that the central mission of these institutions is high quality undergraduate education. This emphasis may gradually have reduced the number of teaching posts for foreign scholars.

- The greatest share of scholars are concentrated in the fields of health sciences (27.6%). The next largest group of fields are those most closely tied to the development of technologically-based industrial economies in the home countries of many foreign scholars. These fields include the physical sciences (14.3%) and engineering (13.4%). Despite current U.S. interests in the evolution of the global economy, business was the field of only 3% of the scholars. Social sciences and fields in the humanities also attracted less than 5% of the scholars.

11.5

PRIMARY ACTIVITY OF FOREIGN SCHOLARS IN THE UNITED STATES, 1993/94 - 1995/96

	Percent of Scholars		
Primary Function	**19993/94**	**1994/95**	**1995/96**
Research	79.8	80.7	82.6
Teaching	12.1	12.2	11.5
Both	8.1	7.1	5.9
TOTAL	**59,981**	**58,074**	**59,403**

11.6

MAJOR FIELD OF SPECIALIZATION OF FOREIGN SCHOLARS, 1993/94 - 1995/96

	Percent of Scholars		
Major Field of Specialization	**1993/94**	**1994/95**	**1995/96**
Health Sciences	27.4	28.6	27.6
Physical Sciences	14.7	12.8	14.3
Engineering	11.6	11.9	13.4
Life and Biological Sciences	13.1	14.1	12.8
Social Sciences and History	4.6	4.0	4.2
Agriculture	3.7	3.4	3.5
Business Management	3.2	2.8	2.9
Mathematics	2.9	2.5	2.8
Computer and Information Sciences	2.3	2.3	2.7
Foreign Languages and Literature	2.2	2.3	2.0
Letters	1.5	1.4	1.7
Visual and Performing Arts	1.6	1.2	1.7
Education	1.5	1.8	1.6
Area and Ethnic Studies	1.7	1.8	1.5
Other	2.2	3.1	1.5
Law and Legal Studies	1.2	1.1	1.0
Psychology	0.9	0.9	0.9
Architecture and Environmental Design	0.7	0.7	0.8
Public Affairs	0.7	0.6	0.8
Philosophy and Religion	1.1	1.1	0.7
Communication	0.6	0.6	0.6
Home Economics	0.4	0.4	0.4
Library Sciences	0.3	0.2	0.2
Marketing	0.1	0.1	0.1
TOTAL	**59,981**	**58,074**	**59,403**

11.7

SEX OF FOREIGN SCHOLARS IN THE UNITED STATES, 1993/94 - 1995/96

	Percent of Foreign Scholars		
Gender	**1993/94**	**1994/95**	**1995/96**
Male	75.0	73.8	73.7
Female	25.0	26.2	26.3
TOTAL	**59,981**	**58,074**	**59,403**

- Most foreign scholars in the United States are male. Men outnumber women by almost three to one. The number of female scholars is increasing slightly. In the early 1990s female scholars made up less than 25% of the scholar total; this year their share is 26.3%. In the foreign student population, the ratio of male to female students is closer to 60% - 40%.

11.8

VISA STATUS OF FOREIGN SCHOLARS IN THE UNITED STATES, 1993/94 - 1995/96

	Percent of Foreign Scholars		
Visa Status	**1993/94**	**1994/95**	**1995/96**
J Visa	73.8	76.6	77
H Visa	17.8	16.0	16.2
Other	8.4	7.4	6.8
TOTAL	**59,981**	**58,074**	**59,403**

- Foreign scholars most often arrive in the United States on J visas (77%). While J visas are granted to sponsored students, they are predominantly granted to exchange visitors who come to the United States in a teaching, trainee or research capacity. H visas, the temporary visa granted to persons of extraordinary ability and distinguished merit or to workers performing services unavailable outside the United States, are the visa type of 16% of the scholars. A smaller 7% are on other types of visas.

12

About the Surveys

METHODOLOGY

History of the Census

Since its founding in 1919, the Institute of International Education (IIE) has conducted an annual census of foreign students in the United States. For the first 30 years this effort was carried out jointly by IIE and the Committee on Friendly Relations Among Foreign Students. IIE's first independent publication of the results of the annual census was *Education for One World*, containing data for the 1948/49 academic year. It was renamed *Open Doors* in 1954/55, and began receiving USIA support in the early 1970s. *Open Doors* is generally considered the primary source for basic statistics about foreign students in the United States. The strong response to the *Open Doors* survey (95.7% in 1995/96) means that the survey constitutes the most comprehensive set of data on the U.S. foreign student population.

Research Methodology and Data Characteristics

The data presented in *Open Doors 1995/96* were obtained by the Research Division of IIE through a survey conducted in fall 1995 and spring 1996 of campus officials in 2,715 regionally accredited institutions of higher education in the United States.

■ **Response Rate**

Of the institutions surveyed, 2,579 or 95.7%, responded to the questionnaire, as is shown in Table 12.0. The response rate, although always high, has fluctuated over the history of the Census, reaching the lowest point in the mid-1970s. However, in the past decade, it has been very high, ranging from 92.6% in 1979/80 to 99.5% in 1987/88, then dipping to 92.8% in 1992/93 and this year 95.7%.

■ **Types of Responses**

Over nine-tenths (2,403) of the institutions that responded to the survey reported enrolling international students (Table 12.0). Of the schools with international students, a total of 376 (representing 15.6%) provided only total foreign student counts (Step 1), as shown in Table 12.1. The majority (84.4%), however, provided information not only on the total but on the students' countries of origin, fields of study, academic levels, sex and other characteristics (Step 2) as well.

12.0

INSTITUTIONS SURVEYED AND TYPE OF RESPONSE, SELECTED YEARS 1964/65 - 1995/96

Year	Institutions Surveyed	Institutions w/Foreign Students	Institutions w/o Foreign Students	Total Institutions Responding	% Response
1964/65	2,556	1,859	434	2,293	89.7
1969/70	2,859	1,734	265	1,999	69.9
1974/75	3,085	1,760	148	1,908	61.8
1979/80	3,186	2,651	299	2,950	92.6
1984/85	2,833	2,492	274	2,766	97.6
1989/90	2,891	2,546	294	2,840	98.2
1990/91	2,879	2,543	241	2,784	96.7
1991/92	2,823	2,436	228	2,646	94.4
1992/93	2,783	2,417	166	2,583	92.8
1993/94	2,743	2,451	163	2,614	95.3
1994/95	2,758	2,517	167	2,684	97.3
1995/96	2,715	2,403	176	2,579	95.7

12.1

INSTITUTIONS REPORTING FOREIGN STUDENTS AND TYPE OF RESPONSE, 1993/94 - 1995/96

	1993/94		1994/95		1995/96	
Type of Response	Number	%	Number	%	Number	%
Total Only- STEP 1	486	19.8	338	13.4	376	15.6
Institutional Data-STEP 2	2,128	86.8	2,178	86.6	2,027	84.4
Individual Data- STEP 3	1,745	71.2	-[1]	-[1]	1,470	61.2
TOTAL	**2,451**		**2,516**		**2,403**	

[1] Step 3 data collected biannually, so none requested in 1994/95.

12.2

INSTITUTIONS REPORTING FOREIGN STUDENTS BY INDIVIDUAL VARIABLES, 1995/96

Category	Base Number	% of Foreign Students
Country of Origin	395,079	87.1
Sex	384,755	84.8
Enrollment Status	362,650	79.9
Field of Study	357,863	78.9
Academic Level	346,075	76.3
Visa (Immigration) Status	327,863	72.3
Marital Status	223,941	49.3
Primary Source of Funds	202,319	44.6
Total Reported	**453,787**	

- A high proportion of the colleges and universities with foreign students sent data on all of the characteristics on the questionnaire, as Table 12.2 shows. Some variables commanded a greater number of responses: data on academic level exist for 76.3% of all foreign students reported, country of origin information for 87.1% and field of study breakdowns for 78.9%. Conversely information on the students' primary source of funding and on their marital status is available for less than half of the total number reported (44.6% and 49.3%, respectively).

- The accuracy of this survey or any survey depends upon the joint effect of sampling and nonsampling errors. The data reported here would be somewhat different if a complete census had been obtained. Nonsampling errors arise because of problems in survey design, data processing and nonresponse bias. In general the effects of nonsampling errors are both harder to detect and lead to greater caution in interpretation than error arising from sample variability.

■ Imputation

Throughout this document student counts other than the total foreign student enrollment are determined by imputation. Estimates of the number of students from each country of origin, field of study, academic level and all other breakdowns are imputed from the world total of 453,787 foreign students, which is the actual number of all non-immigrant students reported in the survey in 1995/96. For each imputation, base or raw counts were multiplied by a correction factor which reflects the ratio of difference between the sum of the categories being imputed and the world total. For example, the sum of the number of all students with sex data in this year's Census was 384,755. The ratio of the total reported number of foreign students to those whose sex is known is 1.17941807124. Thus the imputed number of students from each country is derived by multiplying the male and female base or raw student count by 1.17941807124. It should be noted that foreign student numbers vary slightly within this publication. Due to rounding, percentages do not always add up to 100%. This is also true for some imputations. In these instances the total percent column is listed as 100% to indicate that all categories are accounted for. A relatively large discrepancy exists between the academic level figures reported by country and those provided for all foreign students in general. This discrepancy results from the differential response rates to the nationality question and the academic level question. Further, a number of institutions are unable to provide nationality by academic level data.

12.3
PLACES OF ORIGIN IN WORLD REGIONS

1000 AFRICA

1100 Eastern Africa

1115 Burundi
1120 Comoros
1105 Djibouti
1195 Eritrea
1125 Ethiopia
1130 Kenya
1135 Madagascar
1140 Malawi
1145 Mauritius
1150 Mozambique
1155 Réunion
1165 Rwanda
1170 Seychelles
1175 Somalia
1180 Tanzania
1185 Uganda
1190 Zambia
1160 Zimbabwe

1200 Central Africa

1210 Angola
1220 Cameroon
1230 Central African Rep
1240 Chad
1250 Congo
1260 Equatorial Guinea
1270 Gabon
1280 Sao Tomé & Principe
1290 Zaire

1300 North Africa

1310 Algeria
1320 Canary islands
1330 Egypt
1340 Libya
1350 Morocco
1370 Sudan
1380 Tunisia
1360 Western Sahara

1400 Southern Africa

1410 Botswana
1420 Lesotho
1430 Namibia
1440 South Africa
1450 Swaziland

1500 Western Africa

1510 Benin
1585 Burkina Faso
1505 Cape Verde
1535 Cote D'Ivoire
1515 Gambia
1520 Ghana
1525 Guinea
1530 Guinea-Bissau
1540 Liberia
1545 Mali
1550 Mauritania
1555 Niger
1560 Nigeria
1565 St. Helena
1570 Senegal
1575 Sierra Leone
1580 Togo

2000 ASIA

2100 East Asia

2110 China
2120 Taiwan
2130 Hong Kong
2140 Japan
2150 Korea, Democratic People's Rep of
2160 Korea, Republic of
2170 Macao
2180 Mongolia

2200 South and Central Asia

2205 Afghanistan
2210 Bangladesh
2215 Bhutan
2220 India
2260 Kazakhstan
2265 Kyrgyzstan
2225 Maldives, Rep of

12.3(cont.)

PLACES OF ORIGIN IN WORLD REGIONS

2230	Nepal
2235	Pakistan
2245	Sri Lanka
2270	Tajikistan
2250	Turkmenistan
2255	Uzbekistan
2300	**Southeast Asia**
2305	Brunei
2320	Cambodia
2315	Indonesia
2325	Laos
2330	Malaysia
2310	Myanmar
2335	Philippines
2345	Singapore
2350	Thailand
2360	Vietnam
3000	**EUROPE**
3100	**Eastern Europe**
3110	Albania
3189	Armenia
3174	Azerbaijan
3181	Belarus
3193	Bosnia & Herzegovina
3120	Bulgaria
3191	Croatia
3131	Czech Republic
3130	Czechoslovakia (frmr)
3183	Estonia
3188	Georgia
3150	Hungary
3184	Latvia
3185	Lithuania
3194	Macedonia
3187	Moldova
3160	Poland
3170	Romania
3186	Russia
3132	Slovakia
3192	Slovenia
3182	Ukraine
3180	U.S.S.R.(former)
3190	Yugoslavia (former)
3200	**Western Europe**
3203	Andorra
3206	Austria
3210	Belgium
3213	Denmark
3220	Finland
3223	France
3226	Germany
3233	Gibraltar
3236	Greece
3243	Iceland
3246	Ireland
3250	Italy
3253	Liechtenstein
3256	Luxembourg
3260	Malta
3263	Monaco
3266	Netherlands
3270	Norway
3273	Portugal
3276	San Marino
3280	Spain
3283	Sweden
3286	Switzerland
3290	United Kingdom
3240	Vatican City
4000	**LATIN AMERICA**
4100	**Caribbean**
4103	Aruba
4105	Bahamas
4110	Barbados
4115	Cayman Islands
4120	Cuba
4125	Dominican Republic
4130	Guadeloupe
4135	Haiti
4140	Jamaica
4150	Leeward Islands
4155	Anguilla
4151	Antigua
4152	British Virgin Islands
4153	Montserrat

■ Analytic Notes

Much of the weight of analysis in this report is borne by figures and data maps. The use of these graphic devices poses problems that are not shared by numerical analysis. The key difficulty is that there is not a commonly accepted set of fast standards for the production of figures. In this report we have attempted to follow the guidelines for graphical excellence described by Edward Tufte in *The Visual Display of Quantitative Information* (1983) and *Envisioning Information* (1990). In general we have attempted to keep our figures clean to maximize "data ink" and to minimize "chart junk." Further we have attempted to build multivariate figures. These figures, such as the bar chart matrix in the Study Abroad section, require the reader to spend some moments exploring the figures. Our broader intention is to invite discussion, thought and further analysis of student flow data. In the production of our data maps, Tufte's work and Mark Monmonier's volume *How to Lie With Maps* (1991) were helpful. The chances for distortion using data maps are many times greater than for figures. The look and feel of our graphics has been heavily influenced by the graphic excellence of the map and figure displays regularly carried in the *New York Times*. We are also in the debt to practitioners of the art of transforming data into meaning. Individuals such as Dita Smith of the *Washington Post* regularly exemplify the kind of excellence in figurative displays we hope to emulate. In building data maps we have used two principal means to establish grouping categories. For some maps categorizations were made by constructing intervals by means of searching for a "natural break" in the data. For other displays, the "natural break" technique was customized for clarity.

Maps are typically dense multi-layered objects which have an aesthetic quality of their own. In our use of maps we have stripped down their individual information density to better tell a single story. The reader is encouraged to view each map together with others. By considering a series of maps, rather than individual ones in isolation, a reader can add back layers of meaning.

■ **Country Classification System**

The classification of countries into regional groupings reported in Section 2 of this report follows IIE practices which were originated when the *Open Doors* Census was first conducted in 1954.

■ **Guidelines for Release of Census Data**

Reports based on Census data are available to individuals, agencies or corporations for clearly identified purposes of scholarly research, public information or employment recruitment. Reports will be produced for employment recruitment purposes only when the employer has indicated that the openings are for employment in the students' home countries or, in some instances, home regions; students' obligations to the sponsors of their study in the United States and/or to their own governments will be respected; and the corporation or agency does not engage in discriminatory practices. Student names obtained as a by-product of the Census will not be released in any case.

IIE reserves the right to request that the proposed use of data be documented and to withhold data when the request is not deemed to be for appropriate scholarly, public information or employment recruitment purposes.

12.3(cont.)

PLACES OF ORIGIN IN WORLD REGIONS

4154	St. Kitts-Nevis
4160	Martinique
4170	Netherlands Antilles
4180	Trinidad & Tobago
4185	Turks & Caicos Isles
4190	Windward Islands
4191	Dominica
4192	Grenada
4193	St. Lucia
4194	St. Vincent
4200	**Cntrl Amer/Mexico**
4210	Belize
4230	Costa Rica
4240	El Salvador
4250	Guatemala
4260	Honduras
4270	Mexico
4280	Nicaragua
4290	Panama
4300	**South America**
4305	Argentina
4310	Bolivia
4315	Brazil
4320	Chile
4325	Colombia
4330	Ecuador
4335	Falkland Islands
4340	French Guyana
4345	Guyana
4350	Paraguay
4355	Peru
4360	Suriname
4365	Uruguay
4370	Venezuela
2400	**MIDDLE EAST**
2405	Bahrain
2410	Cyprus
2415	Iran
2420	Iraq
2425	Israel
2430	Jordan
2435	Kuwait
2440	Lebanon
2445	Oman
2450	Qatar
2455	Saudi Arabia
2460	Syria
2465	Turkey
2470	United Arab Emirates
2485	Yemen
5000	**NORTH AMERICA**
5110	Bermuda
5120	Canada
6000	**OCEANIA**
6100	**Australia & New Zealand**
6110	Australia
6120	New Zealand
6200	**Pacific Ocean Island Areas**
6210	Cook Islands
6215	Fiji
6220	French Polynesia
6225	Kiribati
6227	Marshall Islands
6260	Micronesia, Federated States of
6230	Nauru
6235	New Caledonia
6250	Niue
6255	Norfolk Island
6263	Palau
6240	Papua New Guinea
6205	Solomon Islands
6270	Tonga
6271	Tuvalu
6245	Vanuatu
6275	Wallis & Futuna Isles
6280	Western Samoa

12.4

MAJOR FIELD OF STUDY CATEGORIES*

AGRICULTURE
- 01 Agricultural, Business and Production
- 02 Agricultural Sciences
- 03 Conservation and Renewable Natural Resources

ARCHITECTURE AND RELATED PROGRAMS
- 04 Architecture and Related Programs

AREA, ETHNIC AND CULTURAL STUDIES
- 05 Area, Ethnic and Cultural Studies

BUSINESS MANAGEMENT AND ADMINISTRATIVE SERVICES
- 52 Business Management and Administrative Services
- 08 Marketing Operations and Distribution

COMMUNICATIONS
- 09 Communications
- 10 Communication Technologies

COMPUTER AND INFORMATION SCIENCES
- 11 Computer and Information Sciences

PERSONAL AND MISCELLANEOUS SERVICES
- 12 Personal and Miscellaneous Services

EDUCATION
- 13 Education

ENGINEERING
- 14 Engineering
- 15 Engineering-related Technologies

FOREIGN LANGUAGES AND LITERATURE
- 16 Foreign Languages and Literature

HEALTH
- 51 Health Professions and Related Sciences

HOME ECONOMICS
- 19 Home Economics
- 20 Vocational Home Economics

LAW AND LEGAL STUDIES
- 22 Law and Legal Studies

ENGLISH LANGUAGE AND LITERATURE/LETTERS
- 23 English Language and Literature/Letters

LIBERAL/GENERAL STUDIES
- 24 Liberal/General Studies

LIBRARY SCIENCES
- 25 Library Sciences

LIFE SCIENCES
- 26 Biological Sciences/Life Sciences

MATHEMATICS
- 27 Mathematics

MILITARY TECHNOLOGY
- 29 Military Technologies

MULTI/INTERDISCIPLINARY STUDIES
- 30 Multi/Interdisciplinary Studies

PARKS, RECREATION, LEISURE AND FITNESS STUDIES
- 31 Parks, Recreation and Leisure Studies

PHILOSOPHY AND RELIGION
- 38 Philosophy
- 39 Theological Studies and Religious Vocations

PHYSICAL SCIENCES
- 40 Physical Sciences
- 41 Sciences Technologies

PSYCHOLOGY
- 42 Psychology

PROTECTIVE SERVICES AND PUBLIC ADMINISTRATION
- 43 Protective Services
- 44 Public Administration and Services

SOCIAL SCIENCES AND HISTORY
- 45 Social Sciences

TRADE AND INDUSTRIAL
- 46 Construction Trades
- 47 Mechanics and Repairers
- 48 Precision Production
- 49 Transportation and Material Moving

VISUAL AND PERFORMING ARTS
- 50 Visual and Performing Arts

INTENSIVE ENGLISH LANGUAGE
- 60 Intensive English Language

UNDECLARED
- 90 Undeclared

* Source: National Center for Educational Statistics, *Classification of Instructional Programs, 1990* (Washington, D.C.: NCES, 1991).

■ Selected Terms

Foreign Student. A foreign student is defined as anyone who is enrolled in courses at institutions of higher education in the United States who is not a U.S. citizen, an immigrant (permanent resident) or a refugee.

F Visa. A student visa granted to bona fide students who satisfy requirements for pursuing a full program of study who enter the United States for a temporary stay and solely to study.

H Visa. A temporary visa, given to persons of extraordinary ability, workers of distinguished merit and ability, workers performing services unavailable in the United States and some trainees.

J Visa. A temporary exchange-visitor visa granted for a variety of educational purposes to students, trainees, teachers, professors, research scholars, international visitors or professional trainees.

M Visa. Issued to students enrolled in a vocational training course (other than English language training) in the United States.

Fields of Study. The fields of study used in this book are those from *A Classification of Instructional Programs 1990*, published by the U.S. Department of Education, National Center for Education Statistics (NCES). See Table 12.4 for a list of major fields of study.

U.S. Regions used in this study are composed of states and territories as indicated in Table 12.5.

■ About the Foreign Scholar Survey

In 1989/90, IIE conducted a pilot survey of approximately 200 major research universities in the United States to determine the number and characteristics of foreign scholars. A second survey was conducted, including a larger number of institutions, in 1991/92 and again in 1993/94 . The 1995/96 survey is the fourth effort following the 1989/90 pilot. The Foreign Scholars survey measures the flow of foreign scholars to doctoral degree-granting institutions of higher education.

12.5

STATES WITHIN U.S. REGIONS

NORTHEAST	State Code
Connecticut	16
Maine	11
Massachusetts	14
New Hampshire	12
New Jersey	22
New York	21
Pennsylvania	23
Rhode Island	15
Vermont	13
SOUTH	
Alabama	63
Arkansas	71
Delaware	51
District of Columbia	53
Florida	59
Georgia	58
Kentucky	61
Louisiana	72
Maryland	52
Mississippi	64
North Carolina	56
South Carolina	57
Tennessee	62
Virginia	54
West Virginia	55
SOUTHWEST	
Arizona	86
New Mexico	85
Oklahoma	73
Texas	74

12.5 (cont.)

STATES WITHIN U.S. REGIONS

MIDWEST	State code
Illinois	33
Indiana	32
Iowa	42
Kansas	47
Michigan	34
Minnesota	41
Missouri	43
Nebraska	46
North Dakota	44
Ohio	31
South Dakota	45
Wisconsin	35
MOUNTAIN	
Colorado	84
Idaho	82
Montana	81
Nevada	88
Utah	87
Wyoming	83
PACIFIC	
Alaska	94
California	93
Hawaii	95
Oregon	92
Washington	91
OTHER	
Guam	90
Puerto Rico	98
Virgin Islands	96

The foreign scholars who are at other types of institutions, such as the National Institutes of Health (NIH) and other national research labs, are not included in this survey, even though they receive substantial numbers of foreign scholars. The 1995/96 foreign scholars survey was mailed to a total of 409 doctoral degree-granting institutions throughout the United States, since most foreign scholars are likely to be in such schools. *The 1989 Summary Report of the Survey of Earned Doctorates* (National Research Council: Washington, D.C.: National Academy Press, 1990) was used as an initial reference source for determining which institutions were to be included in the survey. This basic list was supplemented by institutions who identified themselves as offering a doctoral program in the College Board's annual survey of higher education institutions. For the purposes of this survey, foreign scholars are defined as non-immigrant, non-student academics (teachers and/or researchers). The institutions polled were asked to give us as much information as possible on scholars who were at their institutions in the period from June 1, 1995 to May 31, 1996. The forms requested information on the primary function of the scholars (research, teaching or both), on their geographic origin, field of specialization, sex and immigration status.

Responses were received from 367 of the 409 institutions polled, a response rate of 89.7%, which is down from the 92.8% obtained last year. Not all universities reporting foreign scholars in 1995/96 were able to provide detailed information on the characteristics of their scholars. The proportion of institutions that were able to give breakdowns for individual variables ranged from 90.8% for visa status to 77.1% for primary function. Detailed data on country of origin are available for 88.3% of the total number of scholars reported, on field of specialization for 85.9% and on sex for 81.3%.

While this overall response rate is satisfactory for drawing a general picture of the flows and characteristic of foreign scholars in the United States, the data has limitations. First, the definition of a "foreign scholar" is left up to the reporting institution. Some institutions report only those individuals who have completed terminal degrees, who are working as researchers or teachers and who are not taking further course work. Other institutions will report individuals who may also be teaching or doing research and who are taking course work.

Shifts in definition within an institution over time may also have affected the number of scholars reported. Second, participation in this survey by major academic research institutions is not uniform throughout the country.

The occasional or uneven participation by large institutions which may host over 1,000 foreign scholars may affect overall state participation rates as well as bias other variables such as field of specialization or primary function.

12.6

RESPONSE RATE TO INDIVIDUAL VARIABLES, FOREIGN SCHOLAR SURVEY, 1994/95 - 1995/96

	1994/95 Number	1994/95 Percent	1995/96 Number	1995/96 Percent
Visa Status	53,660	92.4	53,954	90.8
Country of Origin	50,292	86.6	52,452	88.3
Field of Specialization	52,557	90.5	51,041	85.9
Sex	48,318	83.2	48,324	81.3
Primary Function	43,672	75.2	45,787	77.1
Total	**58,074**		**59,403**	

12.7

RESPONSE RATE TO INDIVIDUAL VARIABLES, STUDYABROAD SURVEY, 1991/92 - 1994/95

	1991/92		1993/94		1994/95	
Category	**Number**	**%**	**Number**	**%**	**Number**	**%**
Host Country	59,503	83.6	69,673	91.3	67,097	79.5
Field of Study	32,867	46.2	49,035	64.3	38,704	45.9
Academic Level	46,277	65.0	61,091	80.1	53,670	63.6
Gender	44,532	62.6	61,307	80.3	55,347	65.6
Duration of Study	56,484	79.4	71,031	93.1	65,566	77.7
Race/Ethnicity	-	-	33,067	43.3	27,892	33.0
Program Sponsorship	-	-	69,224	90.7	62,307	73.8
Students Reported	**71,154**		**76,302**		**84,403**	

About the U.S. Study Abroad Survey

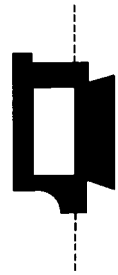
In 1985/86, in response to strong interest in U.S. higher education circles, IIE designed a new survey to gauge study abroad flows. This methodology yields the most comprehensive data on U.S. study abroad, capturing students going abroad through programs sponsored by a U.S. university or other entity, as well as those directly enrolled in overseas institutions. Until 1993/94 the survey has been carried out biennially.

This survey focuses on study abroad for academic credit. The study abroad population has been narrowly defined as only those students who received academic credit from a U.S. accredited institution of higher education after they returned from their study abroad experience. Students studying abroad without credit transfers are not included here. Also not included are U.S. students enrolled overseas for degrees, as reported in UNESCO figures. The number of students who receive academic credit is inevitably lower than the number of all students who go abroad. Hence, the figures presented here give a conservative picture of study abroad activity.

Survey forms were sent to 1,206 accredited colleges and universities throughout the United States which either had reported study abroad students in one of the three previous surveys, or were listed as having study abroad programs in IIE's *Academic Year Abroad* and *Vacation Study Abroad*. Campus officials were asked to provide information on the total number of their own students (students intending to receive their degree from the home institution) to whom they awarded credit for study abroad in 1994/95, including the summer of 1995. They were also asked to provide breakdowns, where possible, on the duration of their study; their academic level, program sponsorship, institutional policies for the award of financial aid, sex, race/ethnicity and current major field of study; and on the countries in which they studied.

This year and last year study abroad officials reported only students studying toward a degree at their institution who participated in study abroad, regardless of whether the reporting school awarded the first credit for the study abroad activity. The purpose of this change was to tie study abroad activity closely to each home campus. Study abroad information was obtained from 1,019 or 84.4% of the 1,206 surveyed institutions. A list of the institutions responding to the survey, and the number of students to whom each institution awarded study abroad credit, is contained in the disk in the back of this publication.

Not all institutions that reported giving credit for study abroad in 1994/95 provided detailed information about the characteristics of the students, as shown in Table 12.7. The proportion of schools that gave breakdowns for individual variables ranged from 33.0% for race/ethnicity to 79.5% for the host country of the sojourn. Followers of *Open Doors* methodology will note a correction in our reporting of response rate to the Field of Study item in the 1993/94 survey. The response was erroneously reported to be 86.2%. The correct response rate, indicated in Table 12.7 was 64.3%.



ODSTATS

All Data, All the Time

THE CARE AND FEEDING OF ODSTATS

- ODSTATS was developed in response to requests from many users who wanted to have access to student mobility data so that they could perform analysis of their own choosing. As interest in mobility data has increased, so too has the interest of many policy makers and analysts who wish to join specialized data sets with *Open Doors* data. Users interested in the management of university enrollments have created their own comparison groups and policy analysts have added country based economic indicators. We are interested in the kinds of questions users pose of these data sets and comments and suggestions for future versions of ODSTATS are welcome. Comments may be directed to: Director, Research Division; Institute of International Education; 809 UN Plaza; New York, NY 10017 or via E-mail at tdavis@iie.org.

WHY ODSTATS?

- This electronic data boutique was developed to allow all users maximum access to the basic tables most frequently called for by users of student mobility data published in *Open Doors*. The user community consists of individuals who operate on a wide variety of computer systems and who have a range of interests and capabilities. For these reasons we have elected to present this data in two file formats; 1) DOS ASCII Tab delimited files – (the .txt files) and 2) Microsoft Excel spreadsheet files (the .xls files). The separate files are presented on a single 3 1/2 inch diskette bound into the *Open Doors 1995/96* edition.

WHAT'S IN ODSTATS?

- ODSTATS contains 8 files in each format (16 files in total). The individual files and variables contained in each are as follows:

1. APP-A96: (.txt or .xls, in each instance) **Foreign Student Enrollment by Institution** - Breakdown of every responding institution to the annual survey. Variables include the unique NRC code, institutional name, city, state, 1994/95 foreign student totals, 1995/96 foreign student totals.

2. APP-B96: **Foreign Scholar Enrollment by Institution** - Breakdown of every responding institution to the Foreign Scholar Survey. Variables include the unique NRC code, institutional name, city, state, 1994/95 foreign scholar totals, 1995/96 foreign scholar totals.

3. APP-C96: **U.S. Study Abroad Enrollment by Institution** - Breakdown of every responding institution to the U.S. Study Abroad Survey. Variables include the unique NRC code, institutional name, city, state, 1993/94 U.S. Study Abroad total and 1994/95 U.S. Study Abroad total.

4. TB3-0: **Foreign Student Totals by Places of Origin, 1994/95 & 1995/96** - An electronic version of Table 3.0 of this volume. Foreign student totals by country for the years 1994/95 and 1995/96, percent change with countries grouped by region and sub-region.

5. TB4-1: **Foreign Student Totals by Academic Level, 1995/96** - Foreign student totals for undergraduates, graduate students and those classified as others and totals by country for the year 1995/96. Countries are grouped by region and sub-region.

6. TB10-1: **U.S. Study Abroad Totals by Places of Origin, 1993/94 & 1994/95** - An electronic version of Table 10.0 of this volume. U.S. Study Abroad student totals by country for the years 1993/94 and 1994/95, percent change with countries grouped by region and sub-region.

7. TB11-2: **Foreign Scholar Totals by Places of Origin, 1994/95 & 1995/96** - An electronic version of Table 11.0 of this volume. Foreign Scholar totals by country for the years 1993/94 and 1994/95, percent change with countries grouped by region and sub-region.

8. CIRP: **Cooperative Institutional Research Program survey results** - A complete set of responses to the 1994 CIRP survey for foreign transfer students, new first time freshmen foreign students and all participating first time U.S. freshmen. Variables included in this file are: student background

demographics, student self assessment, student activities, student career plans, student hours spent in past year, probable major field of study, father's education, career, religion, mother's education, career, education, student sources of financial support, student factors in college selection, student values, social attitudes and political views.

Getting into ODSTATS

- The files on ODSTATS can be read by virtually all computer systems. Before you use ODSTATS remember to write protect the original diskette by closing the write protect tab on the diskette. If you intend to use ODSTATS directly from the diskette be sure to make a backup copy, placing the original diskette in a safe place. For DOS/Windows systems copy ODSTATS from drive A to a directory on your hard drive using the copy procedure appropriate to your system. The files on the diskette occupy over a megabyte of disk space. For Macintosh users, the superdrive will accommodate this diskette. Consult your user's manual for instructions on the use of the Apple File Exchange application, the dos-mac file translation utility provided with every Macintosh.

- ODSTATS files can be opened by any spreadsheet, database and word processing software that can read a tab delimited ASCII file or an Excel 3.0 spread sheet file. Once you have opened an ODSTATS file you can manipulate the data and export it in any way that your application allows.

- ODSTATS ".xls" files are Microsoft Excel (version 3.0) spreadsheet files. We have chosen to include the Excel files on this disk because Excel files are recognized by many other spreadsheet and database programs (including Lotus 123, Quattro Pro, Access, Paradox and Dbase and can be easily opened in or imported to those programs. If your database program does not import Excel files we suggest you use the ASCII text, tab-delimited or ".txt" files.

  Tip: Excel files can also be imported into Word Perfect version 5.1 or higher. Simply start Word Perfect and open the file with the .xls extension. Word Perfect will import the file and present it in table format. Font, pagesize, margins and column widths can be adjusted to make most tables fit an 11 x 8.5 inch landscape page size.

- ODSTATS ".txt" files are DOS ASCII, tab-delimited text files which can be opened in most word processing programs as well as in spreadsheet and database programs. If you choose to open these files in a word processing program, the tabs may need to be adjusted to line up properly. We recommend that these files be used for uploading to microcomputer databases or to mainframe computers.

SO NOW WHAT?

- ODSTATS was created to serve a variety of uses of which some are listed here. Let us know of your particular application!

* Developing institutional comparisons for student recruitment
* Evaluating the effectiveness of different institutional practices with respect to international students by matching ODSTATS data with other institutional data available from the College Board
* Comparing states and regional groupings of states
* Comparing city totals and major metropolitan area totals
* Examining the effectiveness of international aid policies by tracking student flows for selected countries or country groupings
* Comparing national flow data over time with institutional data on foreign students over time
* Assessing institutional strengths and focusing recruitment efforts on groups of students likely to have special interests in particular academic programs

GIVING CREDIT

- In any publication or dissemination of data based on ODSTATS or the *Open Doors* publication, please be sure to include a citation of the source.
- The suggested citation format is as follows:

Open Doors 1995/96
Report On International Educational Exchange, 1996.
Todd M. Davis, ed.
New York: Institute of International Education.

Open Doors

1995-1996

report on international educational exchange

Open Doors is the only comprehensive and accurate information resource on 453,787 international students in the United States.

An easy-to-use format makes extensive use of graphics to highlight key facts and trends in international flows of students and scholars. Expert commentators provide acute analysis of what the *Open Doors* statistics mean now—and for the future.

The Institute of International Education, the largest and most experienced U.S. higher educational exchange agency, has conducted an annual statistical survey of the foreign student population of the United States since 1948. Grant support for this effort is provided by the U.S. Information Agency (USIA). Results are published annually as *Open Doors*.

Open Doors reports on 453,787 international students from over 200 homelands. These students are enrolled at over 2,403 accredited U.S. colleges and universities. *Open Doors* also reports on 59,403 foreign scholars who teach and conduct research on 367 of our nations doctoral degree granting universities. Finally, through a survey of 1,206 colleges and universities that sponsor U.S. students who study abroad, a statistical portrait of the 84,403 U.S. students who studied abroad is presented.

The book provides over 170 pages of data on topics such as national origin and destination, finances, fields of study, academic level and institutional and personal characteristics of these three populations of internationally mobile students and scholars.

NEW! Results of a secondary analysis of two national data sets that describe in detail the attitudes, values, behaviors and degree of satisfaction with their universities of international students studying in this country.

As a bonus, *Open Doors* data is included as a bound-in diskette in formats that are accessible by most popular word processors, database packages and spreadsheets.

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Institute of International Education
809 United Nations Plaza. New York. NY 10017-3580

U.S. DEPARTMENT OF EDUCATION
Office of Educational Research and Improvement (OERI)
Educational Resources Information Center (ERIC)

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