

**Table 809. Federal Research and Development (R&D) Obligations to Selected Universities and Colleges: 2006 and 2007**

[In millions of dollars (24,991.8 represents \$24,991,800,000). For years ending September 30. For the top 40 institutions receiving federal R&D funds in 2007. Awards to the administrative offices of university systems are excluded from totals for individual institutions because that allocation of funds is unknown, but those awards are included in "total all institutions"]

Major institution ranked by total 2007 federal R&D obligations	2006	2007	Major institution ranked by total 2007 federal R&D obligations	2006	2007
<b>Total, all institutions<sup>1</sup> . . . . .</b>	<b>24,991.8</b>	<b>24,998.0</b>	Cornell University . . . . .	299.1	326.1
Johns Hopkins University . . . . .	1,153.2	1,054.9	Pennsylvania State University . . . . .	291.8	320.8
University of Washington . . . . .	612.1	608.0	Case Western Reserve University . . . . .	277.9	278.9
University of Michigan . . . . .	516.2	501.5	University Southern California . . . . .	265.5	260.3
University of Pennsylvania . . . . .	497.5	498.5	University of Rochester . . . . .	252.3	255.2
University of California—Los Angeles . . . . .	477.6	480.0	Northwestern University . . . . .	222.2	254.2
Duke University . . . . .	472.5	470.7	University of Chicago . . . . .	219.8	248.6
University of California—San Francisco . . . . .	441.9	433.4	Emory University . . . . .	228.1	247.9
University of California—San Diego . . . . .	401.2	432.7	University of California—Davis . . . . .	236.4	243.1
Harvard University . . . . .	420.8	429.3	University of Alabama—Birmingham . . . . .	235.4	235.1
University of Pittsburgh . . . . .	425.4	425.9	Baylor College of Medicine . . . . .	236.5	227.9
Columbia University—City of NY . . . . .	467.8	425.7	University of California—Irvine . . . . .	161.3	219.6
Stanford University . . . . .	455.9	424.0	Ohio State University . . . . .	205.9	217.2
Washington University . . . . .	410.7	407.8	University of California—Berkeley . . . . .	228.6	214.2
Yale University . . . . .	361.7	387.3	University of Arizona . . . . .	200.7	212.0
Massachusetts Institute of Technology . . . . .	357.1	380.8	University of Illinois—Urbana . . . . .		
University of Minnesota . . . . .	331.2	370.7	Champaign . . . . .	184.6	210.5
University of Wisconsin—Madison . . . . .	373.7	369.2	Boston University . . . . .	204.7	208.5
University of North Carolina at Chapel Hill . . . . .	343.4	353.5	University of Iowa . . . . .	193.0	208.4
University of Colorado . . . . .	340.1	330.0	The Scripps Research Institute . . . . .	217.5	199.0
Vanderbilt University . . . . .	306.4	329.6	University of Virginia . . . . .	176.3	198.4

<sup>1</sup> Includes other institutions, not shown separately.

Source: U.S. National Science Foundation, *Federal S&E Support to Universities and Colleges and Nonprofit Institutions*, NSF 09-313, 2009. See also <<http://www.nsf.gov/statistics/fedsupport/>>.

**Table 810. Graduate Science/Engineering Students in Doctorate-Granting Colleges by Characteristic and Field: 1990 to 2009**

[In thousands (409.4 represents 409,400). As of fall. Includes outlying areas]

Field of science or engineering	Total			Characteristic								
	1990	2000	2009	Female			Foreign			Part-time		
				1990	2000	2009	1990	2000	2009	1990	2000	2009
<b>Total, all surveyed fields . . . . .</b>	<b>409.4</b>	<b>443.5</b>	<b>573.9</b>	<b>155.5</b>	<b>201.8</b>	<b>269.7</b>	<b>103.0</b>	<b>123.3</b>	<b>163.3</b>	<b>130.8</b>	<b>123.6</b>	<b>145.0</b>
Science/engineering . . . . .	360.6	374.8	497.2	117.9	150.3	212.1	98.9	118.0	155.1	107.5	99.3	120.7
Engineering, total . . . . .	101.0	98.8	136.7	13.8	19.7	31.8	36.9	46.3	62.8	36.7	28.2	35.2
Sciences, total <sup>1</sup> . . . . .	259.6	275.9	360.5	104.2	130.7	180.3	62.0	71.7	92.3	70.8	71.1	85.4
Physical sciences . . . . .	32.9	29.6	37.1	7.7	8.8	12.2	12.2	11.5	14.8	3.9	3.5	3.4
Environmental . . . . .	13.1	13.0	13.9	3.8	5.3	6.4	2.6	2.6	2.7	3.2	2.8	2.7
Mathematical sciences . . . . .	18.1	14.4	20.5	5.6	5.2	7.2	6.4	5.9	8.2	4.7	3.0	4.2
Computer sciences . . . . .	29.2	40.3	45.6	6.8	11.7	11.4	9.7	19.7	22.1	14.1	16.7	15.9
Agricultural sciences . . . . .	11.0	11.3	14.1	3.2	4.8	6.9	3.2	2.4	3.2	2.0	2.4	3.9
Biological sciences . . . . .	46.7	53.1	68.6	21.4	27.8	38.9	11.2	11.6	16.8	7.2	7.6	9.3
Psychology . . . . .	38.5	40.3	46.6	25.5	29.0	34.9	1.7	2.1	2.7	12.0	10.8	12.0
Social sciences . . . . .	70.0	73.9	95.2	30.1	38.1	50.5	15.0	15.8	18.7	23.8	24.3	28.1
Health fields, total . . . . .	48.8	68.8	76.7	37.6	51.5	57.6	4.1	5.4	8.2	23.3	24.3	24.4

<sup>1</sup> For 2009, includes other sciences, not shown separately.

Source: U.S. National Science Foundation, *Survey of Graduate Science Engineering Students and Postdoctorates*, annual. See also <<http://www.nsf.gov/statistics/gradpostdoc/>>.

**Table 811. Non-U.S. Citizens Awarded Doctorates in Science and Engineering by Visa Type and Country of Citizenship: 2000 to 2009**

[For description of science and engineering fields, see Table 815]

Visa and country	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
<b>All non-U.S. citizens . . . . .</b>	<b>7,664</b>	<b>7,953</b>	<b>7,707</b>	<b>8,393</b>	<b>9,164</b>	<b>10,427</b>	<b>11,587</b>	<b>12,371</b>	<b>12,628</b>	<b>12,217</b>
Canada . . . . .	243	253	251	280	337	312	315	341	355	371
Mexico . . . . .	190	186	175	198	164	193	169	166	160	170
Brazil . . . . .	121	130	113	99	124	140	128	111	123	121
United Kingdom . . . . .	64	86	86	77	73	68	77	82	84	78
France . . . . .	64	62	81	68	82	98	106	120	120	112
Germany . . . . .	169	181	164	154	153	145	128	126	137	165
China . . . . .	2,034	2,146	2,121	2,263	2,718	3,281	4,056	4,215	4,072	3,680
Japan . . . . .	166	128	141	170	166	183	187	201	196	188
Korea . . . . .	695	814	807	915	1,003	1,118	1,167	1,089	1,111	1,156
Taiwan . . . . .	611	492	428	407	359	401	403	432	415	511
Thailand . . . . .	149	231	258	307	263	248	194	218	273	193
India . . . . .	726	717	601	688	788	1,033	1,415	1,842	2,061	2,029
Iran . . . . .	40	71	35	45	45	112	124	127	129	137
Turkey . . . . .	248	274	320	348	319	321	321	410	466	444
Science . . . . .	5,213	5,164	5,057	5,475	5,852	6,665	7,289	7,773	8,139	8,006
Engineering . . . . .	2,451	2,789	2,650	2,918	3,312	3,762	4,298	4,598	4,489	4,211
Permanent visa . . . . .	1,409	1,271	1,173	1,099	1,003	1,113	1,252	1,222	(NA)	(NA)
Temporary visa . . . . .	7,661	7,946	7,694	8,384	9,155	10,406	11,525	12,323	(NA)	(NA)

NA Not available.

Source: U.S. National Science Foundation, *Science and Engineering Doctorate Awards*, NSF 09-311, 2009. See also <<http://www.nsf.gov/statistics/nsf09311/>>.