

# UC AND THE NATIONAL RESEARCH COUNCIL RATINGS OF GRADUATE PROGRAMS

In the Fall of 1995, the University of California was the subject of some stunning news when the National Research Council (NRC) announced that more than half of the 229 UC doctoral programs that were evaluated by them ranked in the top 20 in their academic fields in terms of faculty quality -- a record of performance unmatched by any university system in the nation.

Eight programs were ranked No. 1. Further, the NRC found that 78 of the UC programs -- more than a third of those rated -- ranked in the top 10 in their fields. The study confirms what most of us have long known -- that the quality of UC's doctoral programs is truly extraordinary, not just at the mature campuses but across the university system.

The NRC's assessment of doctoral programs contains information on 3,634 courses of study in 41 fields at 274 universities. It includes the views of nearly 8,000 top faculty members nationwide regarding the quality and effectiveness of graduate programs in educating research scholars and scientists. The NRC study, which is conducted every 10 years, is recognized as the most reliable and comprehensive measure of university graduate programs in the nation.

The NRC ratings were for individual departments, and no effort was made to sum across departments to achieve a ranking for universities. Two researchers at Oklahoma State University, David S. Webster, an associate professor of educational administration and higher education, and Tad Skinner, a graduate student in education, have compiled such a ranking, based on the NRC report, and their article, "Rating Ph.D. Programs: What the NRC Study Says...and Doesn't Say," appeared in the May/June 1996 issue of *Change*, the magazine of the American Association for Higher Education. Here is an excerpt from that article as well as some [tables](#) that accompanied their report:

## THE UNIVERSITY OF CALIFORNIA'S OUTSTANDING RATINGS\*

The University of California (UC) system rated extraordinarily well in many areas, as did two of its campuses, UC Berkeley and UC San Diego.

### [UC Berkeley](#)

UC Berkeley rated exceptionally high any way you look at the Report's figures. It achieved the second highest overall mean rating (4.49) of all 274 institutions rated, below only MIT. It had more programs rated in the top 10 in their disciplines (36) than did any other institution, ahead of Stanford (32), Harvard (26), Princeton (22), and MIT (20). It also had the highest proportion of its programs rated in the top 10 in their disciplines (36 of 37, or 97 percent), ahead of Harvard (26 of 30, 87 percent), MIT (20 of 23, 87 percent), Princeton (22 of 29, 76 percent), and Stanford (32 of 43, 74 percent) -- the only other institutions that had more than 70 percent of their programs rated in the top 10. Of Berkeley's 37 programs included in the Report, five were first, or tied for first, in their disciplines. Berkeley was rated first in chemistry and German and was

tied for the rank of 1.5 in mathematics as well as in statistics (although it rated lower in biostatistics) and for the rank of 2.0 in English. Twenty of its programs were rated anywhere from second to fifth (including any ties) in their disciplines, and 11 more were rated from sixth to 10th. The only Berkeley program that rated lower than 10th was cell and developmental biology (13th).

### UC San Diego

UC San Diego rated extraordinarily well, particularly for an institution that became a UC campus as recently as 1964. It was rated 10th in mean score (3.93) for faculty scholarly quality -- higher than older and larger UCLA, higher than any public university campus in the United States except Berkeley, and higher than such highly regarded private universities as Columbia, the University of Pennsylvania, and Northwestern. Two of its programs -- in neurosciences and oceanography -- rated first in the United States. Three more programs at UC San Diego rated from second to fifth, and nine more from sixth to 10th, for a total of 14 of its 29 doctoral programs (48 percent) that were rated in their discipline's top 10.

### The UC System

Impressive as are the ratings of UC Berkeley and UC San Diego, the showing of the UC system as a whole is even more remarkable. Of its 229 programs included in the study, 119 -- or 52 percent -- rank in the top 20 in their disciplines. The nine UC campuses represent only 3 percent of the 274 institutions included, and the eight UC campuses (all but UC San Francisco) that have 15 or more programs rated represent only 8 percent of the 104 institutions in this category. Remarkably, however, these nine house 15 percent of the nation's top 20 programs, 19 percent of its top 10 programs, and fully 20 percent of its top five programs. Six of the nine UC campuses placed one or more programs in the top five in their disciplines and eight of the nine -- all but UC Riverside -- placed one or more programs in the top 10.

The eight UC campuses with 15 or more programs rated, taken as a group, achieve a higher mean score than do the 11 schools in the Big Ten. They score an average of 3.55 in faculty scholarly quality, compared to the Big Ten's 3.37, and 3.38 in program effectiveness, compared to the Big Ten's 3.32. This performance is astonishing, considering that the Big Ten universities, taken as a group, are much older than the UC campuses and have much larger faculties (reputational rankings of doctoral programs generally correlate quite highly with size of program faculty). It is all the more astonishing when one considers that eight of the Big Ten universities -- all except Indiana, Michigan State, and Northwestern -- are, according to the Report, the highest-rated public research universities in their states.

In the past 40 years or so, many states that long had only one state university campus have established one or more other campuses, and some states are developing their new campus(es) to eventually achieve parity with the flagship campus. As of now, however, none of these non-flagship campuses has achieved anything approaching parity with any of the UC's five highest-rated non-flagship campuses.

Of the 12 non-flagship campuses that have 15 or more programs rated, fully seven are UC campuses. The highest rated non-flagship campus that is not part of the UC system, the University of Illinois at Chicago, falls behind five non-flagship UC campuses. In addition, the other four non-flagship campuses -- the SUNY campuses at Buffalo, Albany, and Binghamton, and the University of Wisconsin-Milwaukee--score below all seven UC non-flagship campuses that had 15 or more programs rated. California, with a 1994 population of about 31 million, thus had a state university system in which five of its non-flagship campuses with 15 or more programs included rated above any similar campuses in such populous states as Texas (18 million), New York (18 million), Florida ( 14 million), Pennsylvania (12 million), and Illinois (12 million).

UC's rating is all the more noteworthy considering that in 1978 California passed Proposition 13, which lowered property taxes and is regarded as having severely hurt public higher education. It is even more impressive considering that the Committee polled faculty members for its reputational ratings in May 1993, just after UC had lost many of its most senior faculty members due to the attractive financial incentives it had offered in 1990 and 1991 to induce faculty members to retire early. (Since many other major universities -- especially public universities -- offered attractive buy-outs to their most senior faculty just after the Committee polled faculty members for its reputational rating, the Report may have been well out-of-date by the time it was published last September.)

- [Table 1: Top 50 University Research Programs Rated By Faculty Quality](#)
- [Table 2: Top 20 Institutions in Arts and Humanities](#)
- [Table 3: Top 20 Institutions in Biological Sciences](#)
- [Table 4: Top 20 Institutions in Engineering](#)
- [Table 5: Top 20 Institutions in Physical Sciences and Mathematics](#)
- [Table 6: Top 20 Institutions in Social and Behavioral Sciences](#)

*\* Excerpted with authors' permission from "Rating Ph.D. Programs: What the NRC Report Says...and Doesn't Say," by David S. Webster and Tad Skinner. Reprinted from **Change**, May/June 1996, published by HELDREF PUBLICATIONS, Washington, D.C.*

**Table 1**  
**"Scholarly Quality of Program Faculty"**  
**By Mean Score of All Programs, For Institutions With 15 Or More Programs Rated**

<b>Rank</b>	<b>Institution</b>	<b>Mean Score</b>	<b>Number of Programs Rated</b>
1	Massachusetts Institute of Technology	4.60	23
2	University of California -- Berkeley	4.49	37
3	Harvard University	4.40	30
4.5	California Institute of Technology	4.29	29
4.5	Princeton University	4.29	19
6	Stanford University	4.21	43
7	University of Chicago	4.13	30
8	Yale University	4.08	30
9	Cornell University	3.95	37
10	University of California -- San Diego	3.93	29
11	Columbia University	3.92	34
12.5	University of California -- Los Angeles	3.85	36
12.5	University of Michigan	3.85	41
14	University of Pennsylvania	3.79	36
15	University of Wisconsin -- Madison	3.70	39
16	University of Texas at Austin	3.63	37
17	University of Washington	3.60	39
18	Northwestern University	3.58	30
20.5	Carnegie Mellon University	3.56	15
20.5	Duke University	3.56	33
20.5	University of Illinois at Urbana-Champaign	3.56	37
20.5	Johns Hopkins University	3.56	34
23	University of Minnesota	3.45	39
24	University of North Carolina at Chapel Hill	3.44	34
25	Brown University	3.40	30
26	New York University	3.37	25
27	University of California -- Irvine	3.35	24
28	University of Virginia	3.34	32
29	Purdue University	3.31	25
30	University of Arizona	3.25	29
31	University of Rochester	3.24	28
32.5	Emory University	3.23	33
32.5	Rutgers University -- New Brunswick	3.23	33
34	Washington University	3.22	27
35.5	University of California -- Davis	3.18	26
35.5	Pennsylvania State University	3.18	39
37	Ohio State University	3.18	39
38	Indiana University	3.16	39
39	State University of New York at Stony Brook	3.13	30
40	Rice University	3.11	22
41	University of California -- Santa Barbara	3.08	32
42.5	University of Colorado	3.05	31
42.5	CUNY Graduate School and University Center	3.05	26

44.5	University of Maryland -- College Park	3.04	28
44.5	University of Southern California	3.04	36
46	North Carolina State University	3.03	23
47	Texas A&M University	3.00	27
48	Vanderbilt University	2.99	26
49	University of Massachusetts at Amherst	2.98	31
50	University of Iowa	2.97	33

**Table 2**  
**Top 20 Institutions in Arts and Humanities**  
**(of those with at least 5 of the 11 such programs rated)**

Rank	Institution	Mean Score	Number of Programs Rated
1	University of California – Berkeley	4.36	10
2	Princeton University	4.28	10
3	Harvard University	4.20	11
4	Columbia University	4.12	9
5	Yale University	3.95	9
6	Cornell University	3.93	10
7	University of Pennsylvania	3.88	11
9	University of Chicago	3.85	10
9	Duke University	3.85	8
9	Stanford University	3.85	11
11	University of California -- Los Angeles	3.67	10
12	University of Michigan	3.66	10
13	University of California – Irvine	3.63	6
14	John Hopkins University	3.55	7
15	University of Virginia	3.54	8
16	CUNY Graduate School and University Center	3.45	8
17	Brown University	3.42	10
18	University of Texas at Austin	3.40	10
19	University of California -- San Diego	3.37	6
20	Northwestern University	3.23	7

**Table 3**  
**Top 20 Institutions in Biological Sciences**  
**(of those with at least 3 of the 7 such programs rated)**

Rank	Institution	Mean Score	Number of Programs Rated
1	University of California -- San Francisco	4.67	5
2	Massachusetts Institute of Technology	4.54	5
3	Harvard University	4.43	6
4.5	University of California -- San Diego	4.42	7
4.5	Stanford University	4.42	8
6	Yale University	4.40	7
7	University of California – Berkeley	4.36	5
8	Rockefeller University	4.31	3
9	Washington University	4.19	5

10	Washington University	4.18	7
11	Columbia University	4.15	6
12.5	California Institute of Technology	4.07	6
12.5	Duke University	4.07	7
14	University of Wisconsin – Madison	4.04	7
15	University of Pennsylvania	4.03	7
16.5	University of Chicago	3.99	7
16.5	Johns Hopkins University	3.99	7
18	University of Texas -- Southwestern Medical Center	3.94	5
19	University of California -- Los Angeles	3.93	6
20	Baylor College of Medicine	3.87	6

**Table 4**  
**Top 20 Institutions in Engineering**  
**(of those with at least 3 of the 7 such programs rated)**

Rank	Institution	Mean Score	Number of Programs Rated
1	Massachusetts Institute of Technology	4.65	7
2	University of California – Berkeley	4.47	7
3	Stanford University	4.33	8
4	California Institute of Technology	4.31	6
5	Cornell University	4.16	6
6	Princeton University	4.13	5
7	University of Illinois at Urbana-Champaign	4.05	7
8	University of Michigan	4.00	8
9	University of California -- San Diego	3.92	4
10	University of Minnesota	3.85	7
11	Northwestern University	3.84	7
12	Purdue University	3.83	7
13	University of Texas at Austin	3.82	7
14	Carnegie Mellon University	3.80	5
15	University of Pennsylvania	3.72	5
16.5	University of California -- Santa Barbara	3.70	7
16.5	University of Wisconsin – Madison	3.70	7
18	Georgia Institute of Technology	3.60	7
19	University of California -- Los Angeles	3.50	6
20	Pennsylvania State University	3.44	8

**Table 5**  
**Top 20 Institutions in Physical Sciences and Mathematics**  
**(of those with at least 4 of the 8 such programs rated)**

Rank	Institution	Mean Score	Number of Programs Rated
1	University of California – Berkeley	4.74	8
2	Massachusetts Institute of Technology	4.69	7
3	California Institute of Technology	4.61	6
4	Harvard University	4.50	7
5	Princeton University	4.48	6
6	Cornell University	4.36	7

7	University of Chicago	4.30	7
8	Stanford University	4.22	10
9	University of California -- San Diego	4.07	6
10	University of Texas at Austin	4.40	6
12	University of California -- Los Angeles	3.97	7
12	Columbia University	3.97	8
12	Yale University	3.97	6
14	University of Washington	3.91	9
15	University of Illinois at Urbana-Champaign	3.89	7
16	University of Wisconsin – Madison	3.81	8
17	Brown University	3.73	6
18	Carnegie Mellon University	3.66	5
19	Purdue University	3.58	6
20	Rice University	3.56	6

**Table 6**  
**Top 20 Institutions in Social and Behavioral Sciences**  
**(of those with at least 3 of the 7 such programs rated)**

<b>Rank</b>	<b>Institution</b>	<b>Mean Score</b>	<b>Number of Programs Rated</b>
1	Harvard University	4.61	6
2	University of Chicago	4.56	6
3	University of California -- Berkeley	4.48	7
4	University of Michigan	4.45	6
5	Stanford University	4.43	6
6	Yale University	4.33	6
7.5	University of California -- Los Angeles	4.22	7
7.5	Princeton University	4.22	6
9	University of Wisconsin -- Madison	4.15	7
10	Columbia University	3.97	6
11	University of Pennsylvania	3.94	6
12.5	University of California -- San Diego	3.78	6
12.5	Northwestern University	3.78	6
14	University of Minnesota	3.76	7
15	Cornell University	3.67	6
16	Duke University	3.63	6
17	University of Washington	3.57	7
18	University of North Carolina at Chapel Hill	3.55	7
19	University of Texas at Austin	3.53	7
20	University of Illinois at Urbana-Champaign	3.50	7