



# The Physiologist

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## Association of Chairs of Departments of Physiology 2005 Survey Results

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The Association of Chairs of Departments of Physiology annual survey was mailed to 184 physiology departments throughout the US, Canada, and Puerto Rico. A total of 72 surveys were returned, for a response rate of 39%. This rate is lower than that of the 2003 survey (47%). Of the 72 surveys returned, there were 22 public and 50 private medical schools.

The data provide the reader with general trends of faculty, overall departmental budgets, and space available for research. As a reminder, beginning in 2004, ACDP decided not to include faculty salary information in this report. Because of the limited response rate and variability in departments responding on a year-by-year basis and the completeness of the AAMC salary data, which is more generally used, the ACDP Council decided to no longer collect or report this data. Data are still provided though on tenure, gender, and

ethnicity of faculty (Table 1). Also included in Table 1 for the first time is information on the average number of contact hours for faculty and on the type of medical physiology course being taught.

Student/trainee information is provided by ethnicity for predoctoral and postdoctoral categories, as well as predoctoral trainee completions, stipends provided, and type of support (Table 2).

Institutional information is provided in Table 3. Departmental budget information (Table 4) shows type of support, faculty salaries derived from grants along with negotiated indirect costs to the departments. Table 5 ranks responding Institutions according to their total dollars, research grant dollars, and departmental space. Space averages are presented as research, administration, teaching and other.

For an update of AAMC salary data, please see the accompanying article. ❖

*(continued on page 155)*

## Faculty Information

### Faculty Summary (n=1,616)

	Male	Female	Total
Asian/Pacific Islander	147	42	189
Black (not Hispanic)	5	3	8
Hispanic	33	14	47
Native American	0	0	0
White (not Hispanic)	834	251	1,085
Foreign National	44	23	67
<b>Total</b>	<b>1,063</b>	<b>333</b>	<b>1,396</b>

### Medical Physiology Course Type

	Yes	No	Total Responded
Integrated Disciplines	36	35	71
Traditional	41	30	71
Within Traditional	47	23	70

### Tenure Status in each department by degree

	Tenured	Not Tenured	Not Eligible	Total
MD	0	0	27	27
PhD	274	842	257	1,373
2 Doctorates	5	43	62	110
Other	31	8	0	39
<b>Total</b>	<b>310</b>	<b>893</b>	<b>346</b>	<b>1,549</b>

### For your faculty, what is the average number of hours of student contact (per year) for:

	Student Type	Average (hours)	Number (inst.)
<b>Lab Hours</b>	Graduate	346	41
	Medical	18	41
	Other	50	21
<b>Lectures</b>	Graduate	167	71
	Medical	582	70
	Other	51	45
<b>Small Group</b>	Graduate	69	48
	Medical	35	59
	Other	21	18

### Teaching Interactions

MD/DO	69
DDS	19
DVM	6
Allied Health	41
Pharmacy	16
Other Biomedical	51
Life Science	40
Bioengineering	26
Other	19

## Student/Trainee Information

### Student/Trainee Summary

#### US citizen/resident aliens

Predoctoral male	463	Postdoctoral male	167
Predoctoral female	482	Postdoctoral female	145

#### Foreign

Predoctoral male	229	Postdoctoral male	394
Predoctoral female	228	Postdoctoral female	258

### Ethnicity of each pre- postdoctoral student/trainee

	Pre-doctoral		Postdoctoral	
	Male	Female	Male	Female
Native American	2	4	1	0
Asian/Pacific Islander	39	41	25	36
Black (not Hispanic)	22	42	10	4
Hispanic	19	26	10	9
White (not Hispanic)	381	369	121	96

### US Citizen/Resident alien postdoctoral trainee completions:

	Male	Female
Native American	0	1
Asian/Pacific Islander	7	13
Black (not Hispanic)	1	3
Hispanic	2	3
White (not Hispanic)	77	86
<b>Total</b>	<b>87</b>	<b>106</b>

### Average Annual Stipend (US \$)

	Average	Number
Postdoctoral	36,429.57	69
Pre-doctoral	21,118.97	72

### Predoctoral Trainee Completions Trainees completing doctoral work during year ending 6/30/2005.

Total	
Female	128
Male	119
<b>Total</b>	<b>247</b>

### Foreign National predoctoral trainee completions:

	Male	Female
African	1	0
Asian/Pacific Islander	21	12
Central/South American	4	1
European/Canadian, etc.	5	4
Middle Eastern	1	4
Other	1	0
<b>Total</b>	<b>33</b>	<b>21</b>

## Student/Trainee Information (continued)

	<u>Number of Foreign Pre- Postdoctoral Students/Trainees</u>			
	Predoctoral		Postdoctoral	
	Male	Female	Male	Female
African	2	3	11	1
Asian/Pacific Islander	125	139	241	136
Central/South American	15	9	15	22
European/Canadian, etc.	47	50	86	75
Middle Eastern	26	15	23	14
Other	14	12	18	10
<b>Total</b>	<b>229</b>	<b>228</b>	<b>394</b>	<b>258</b>

	<u>Number of Foreign Pre- Postdoctoral trainees whose primary source of support is:</u>	
	Pre-doctoral	Postdoctoral
Institutional	132	31
Research Grants	327	565
Private Foundations	12	25
Home (foreign) Gov.	12	6
Other	19	11
<b>Total</b>	<b>502</b>	<b>638</b>

## Institution Summary

### Type of Institution

Private	22
Public	50
<b>Total</b>	<b>72</b>

### Space Controlled by Department (n=88)

	<u>Average</u>
Research Space	18,615
Administrative Space	3,776
Teaching Space	2,749
Other Space:	3,258
<b>Total Space</b>	<b>25,827</b>

## Institutional Financial Information

### Budget by Institution

	<u>All</u>	<u>No.</u>	<u>Private</u>	<u>No.</u>	<u>Public</u>	<u>No.</u>	<u>Nonmedical</u>	<u>No.</u>
	<u>Institutions</u>		<u>Medical</u>		<u>Medical</u>			
Institutional (Hard money, e.g, operating costs, state allocations)	\$1,860,736	72	\$1,557,190	20	\$1,720,158	37	\$2,304,860	15
Outside Research Grants and Contracts (direct costs only)	4,922,442	72	5,997,265	20	3,330,565	37	5,439,495	15
Training Grants (direct costs only)	342,906	42	396,105	15	244,129	20	388,484	7
Endowments	252,508	34	262,913	8	402,965	18	91,646	8
Indirect Cost Recovery (amount returned to your department)	355,586	45	649,189	4	167,163	32	250,406	9
Other Budget Support (identify)	380,407	61	575,881	17	324,091	35	241,248	9
<b>Average Departmental Budget</b>	<b>7,646,976</b>		<b>8,576,035</b>		<b>5,829,868</b>		<b>8,269,517</b>	

### Financial Information

Current fringe benefit rate most frequently used for Primary faculty	26.89	(n=75)
Federally negotiated indirect cost rate for FY 05-06 off campus	27.33	(n=58)
Federally negotiated indirect cost rate for FY 05-06 on campus	50.03	(n=72)
Percentage of allocated salary dollars directly returned to your department	71.81	(n=52)
Percentage of indirect costs returned to your department	19.13	(n=45)
Percentage of total faculty salaries derived from research grants (does not include fringe benefits costs)	36.55	(n=73)

## Complete Ranking According to Total Dollars

Rank Total Dollars	Total Dollars	Rank Research Grant Dollars	Research Grant Dollars	Rank Research Dollars/ Faculty	Research Dollars/ Faculty	Rank Total Research Space	Total Research Space	Rank Research Dollars/ sq ft	Research Dollars/ sq ft	No. of faculty
1	\$22,440,731	1	\$19,312,763	2	\$ 689,742	1	49,831	11	388	28
2	21,711,559	3	14,831,517	1	988,768	9	31,125	5	477	15
3	19,802,420	2	16,945,117	4	564,837	8	33,293	4	509	30
4	14,996,313	5	11,033,307	12	394,047	14	27,824	10	397	28
5	13,823,326	6	10,638,920	6	531,946	27	19,670	3	541	20
6	13,621,046	4	13,071,046	9	435,702	38	16,000	1	817	30
7	12,288,963	20	6,477,835	33	223,374	44	14,700	8	441	29
8	11,849,886	7	8,276,782	22	275,893	21	23,039	15	359	30
9	11,672,534	18	6,542,343	8	436,156	26	21,700	21	301	15
10	11,404,066	8	8,231,940	10	433,260	24	22,623	14	364	19
11	10,929,095	13	7,026,912	13	369,837	3	37,738	47	186	19
12	10,725,370	15	6,846,472	3	622,407	25	22,153	19	309	11
13	10,538,633	10	7,566,618	19	315,276	54	13,500	2	560	24
14	10,311,117	12	7,457,542	15	355,121	2	41,083	49	182	21
15	10,009,352	11	7,529,963	18	327,390	34	16,786	7	449	23
16	9,955,653	22	5,692,259	28	258,739	4	37,601	55	151	22
17	9,920,545	14	6,893,400	14	362,811	6	34,392	40	200	19
18	9,853,632	9	7,785,226	7	519,015	30	18,427	9	422	15
19	9,829,001	16	6,653,058	34	221,769	15	27,223	29	244	30
20	9,391,375	23	5,679,520	40	189,317	12	28,872	43	197	30
21	9,260,599	26	4,926,958	44	164,232	31	17,737	26	278	30
22	9,159,797	19	6,486,173	5	540,514	17	26,187	28	248	12
23	9,141,193	27	4,832,988	46	161,100	35	16,726	24	289	30
24	9,080,963	21	5,755,630	20	302,928	29	18,765	20	307	19
25	8,197,718	53	2,486,716	62	113,033	55	12,729	44	195	22
26	7,961,412	24	5,551,274	37	198,260	7	34,361	52	162	28
27	7,856,003	34	4,020,992	39	191,476	22	22,934	51	175	21
28	7,849,242	37	3,906,949	50	150,267	5	34,837	66	112	26
29	7,819,934	40	3,660,195	55	135,563	23	22,707	53	161	27
30	7,756,521	29	4,218,756	26	263,672	20	23,482	50	180	16
31	7,518,125	35	3,973,629	30	248,352	28	19,480	38	204	16
32	7,192,715	33	4,065,835	56	135,528	11	29,614	59	137	30
33	6,996,500	17	6,608,002	25	264,320	10	30,500	34	217	25
34	6,821,952	25	5,542,668	11	426,359	41	15,600	16	355	13
35	6,759,353	39	3,663,733	43	166,533	18	24,954	57	147	22
36	6,660,577	28	4,389,914	23	274,370	64	9,558	6	459	16
37	6,494,989	32	4,087,535	17	340,628	56	12,626	17	324	12
38	6,411,193	51	2,695,142	66	96,255	52	13,624	42	198	28
39	5,693,607	31	4,165,147	21	297,511	45	14,097	22	295	14

Rank Total Dollars	Total Dollars	Rank Research Grant Dollars	Research Grant Dollars	Rank Research Dollars/ Faculty	Research Dollars/ Faculty	Rank Total Research Space	Total Research Space	Rank Research Dollars/ sq ft	Research Dollars/ sq ft	No. of faculty
40	5,658,219	42	3,531,797	29	252,271	47	13,987	27	253	14
41	5,653,011	45	3,088,645	35	220,618	70	8,385	13	368	14
42	5,636,581	30	4,201,806	16	350,151	61	11,384	12	369	12
43	5,612,850	43	3,272,482	45	163,624	13	28,664	64	114	20
44	5,560,308	41	3,621,261	22	278,559	32	17,535	36	207	13
45	5,554,052	54	2,466,436	54	137,024	19	24,166	67	102	18
46	5,403,912	52	2,645,934	49	155,643	49	13,790	46	192	17
47	4,860,878	62	1,585,904	47	158,590	69	8,608	48	184	10
48	4,821,178	65	1,546,023	58	128,835	40	15,628	68	99	12
49	4,788,553	47	3,009,383	24	273,580	50	13,633	33	221	11
50	4,564,602	46	3,028,582	36	216,327	65	9,384	18	323	14
51	4,502,393	44	3,138,973	27	261,581	48	13,938	31	225	12
52	4,496,863	50	2,707,835	31	246,167	57	12,500	35	217	11
53	4,474,133	55	1,965,500	53	140,393	33	17,259	65	114	14
54	4,186,462	60	1,656,561	49	150,596	72	8,102	37	204	11
55	4,072,103	48	2,933,789	32	225,676	43	15,070	45	195	13
56	4,025,624	36	3,917,307	41	186,538	46	14,000	25	280	21
57	3,900,627	59	1,728,295	67	90,963	59	11,730	56	147	19
58	3,697,377	38	3,697,377	60	123,246	16	26,680	58	139	30
59	3,680,797	57	1,851,442	59	123,429	39	15,647	62	118	15
60	3,437,108	67	1,308,724	69	81,795	42	15,511	72	84	16
61	3,420,249	49	2,724,200	38	194,586	66	9,368	23	291	14
62	3,205,998	64	1,550,118	57	129,177	36	16,500	69	94	12
63	3,164,292	63	1,562,535	63	104,169	58	12,009	61	130	15
64	3,067,590	56	1,893,889	51	145,684	67	9,338	39	203	13
65	3,013,428	68	1,226,128	73	47,159	53	13,529	71	91	26
66	2,939,939	66	1,348,190	65	96,299	63	10,042	60	134	14
67	2,879,147	58	1,840,916	42	167,356	68	9,242	41	199	11
68	2,822,066	61	1,596,000	52	145,091	51	13,629	63	117	11
69	2,678,262	69	1,188,044	64	99,004	74	5,165	30	230	12
70	2,588,568	71	782,719	68	86,969	60	11,719	74	67	9
71	2,090,855	76	400,000	75	23,529	37	16,292	76	25	17
72	1,766,242	72	674,850	71	74,983	73	7,291	70	93	9
73	1,493,437	74	502,135	72	62,767	62	11,203	75	45	8
74	1,320,417	75	450,000	70	75,000	76	2,900	54	155	6
75	1,113,412	70	1,022,560	61	113,618	75	4,570	32	224	9
76	60,000	73	640,000	73	71,111	71	8,281	73	77	9

## AAMC Medical School Faculty Compensation Survey

Each year the American Association of Medical Colleges (AAMC) surveys all the US medical schools as to faculty compensation. Because of this, the ACDP (see associated article) decided to no longer collect the same data from its members.

As a supplement to the ACDP survey, the AAMC has agreed to allow the APS to publish selected results from their survey.

Table 1 shows the regional distribution of medical schools responding to the AAMC survey in terms of public medical and private medical. Also shown is the number of physiology

departments in those regions that responded.

Summary statistics on faculty compensation in physiology departments for PhD faculty are given in Table 2. Table 3 shows the changes in salary that have occurred over the past 3 years. The summary statistics for separate regions of the country are given in Table 4.

Table 5 shows the salary comparison between PhD faculty in all basic science departments versus those in physiology departments. ♦

**Table 1. Distribution of Medical Schools Responding to AAMC Medical School Faculty Compensation Survey.**

		Northeast	Midwest	South	West	TOTAL
<b>All</b>	<b>Private Medical</b>	23	11	13	3	50
	<b>Public Medical</b>	12	20	30	13	75
<b>Physiology</b>	<b>All Medical Schools</b>	18	18	30	10	76

**Table 2. Summary Statistics on Physiology Department PhD Faculty Compensation.**

		25th	Median	75th	Mean	No. of Faculty
<b>Chair</b>	All Schools	167,000	201,000	239,000	205,700	76
	Medical Public	164,000	196,000	229,000	195,100	52
	Medical Private	181,000	220,000	283,000	229,000	24
<b>Professor</b>	All Schools	108,000	126,000	149,000	133,200	630
	Medical Public	107,000	122,000	144,000	130,300	427
	Medical Private	110,000	136,000	160,000	139,000	203
<b>Assoc. Prof.</b>	All Schools	79,000	88,000	98,000	89,600	351
	Medical Public	79,000	88,000	99,000	89,300	228
	Medical Private	79,000	89,000	97,000	90,000	123
<b>Asst. Prof.</b>	All Schools	60,000	72,000	83,000	72,000	377
	Medical Public	63,000	73,000	83,000	72,800	241
	Medical Private	58,000	70,000	81,000	71,000	136
<b>Instructor</b>	All Schools	41,000	46,000	52,000	46,800	57
	Medical Public	41,000	47,000	49,000	45,500	29
	Medical Private	42,000	46,000	52,000	48,000	28

**Table 3. Change in Total Compensation for Physiology Department PhD Faculty.**

2004 - 2005		2003 - 2004		2002 - 2003		% Change 2003 - 2004 to 2004 - 2005	
Mean	Median	Mean	Median	Mean	Median	Mean	Median
104,900	96,000	100,800	94,000	97,800	91,000	4.1	2.1

Mean and median values were combined for Assistant, Associate, and Professor

**Table 4. Summary Statistics on Physiology Department PhD Faculty Compensation by Region.**

		Northeast	Midwest	South	West
<b>Chair</b>	25th	191,000	184,000	144,000	195,000
	Median	211,000	200,000	178,000	224,000
	75th	243,000	247,000	229,000	254,000
	Mean	225,000	209,300	185,700	224,100
	Total faculty	18	18	30	10
<b>Professor</b>	25th	117,000	109,000	100,000	117,000
	Median	137,000	126,000	113,000	131,000
	75th	157,000	151,000	141,000	156,000
	Mean	141,000	135,000	122,000	143,000
	Total faculty	163	160	211	96
<b>Assoc. Prof.</b>	25th	82,000	78,000	79,000	81,000
	Median	91,000	87,000	87,000	92,000
	75th	99,000	98,000	96,000	103,000
	Mean	92,000	88,200	88,000	92,600
	Total faculty	86	103	126	36
<b>Asst. Prof.</b>	25th	67,000	56,000	60,000	65,000
	Median	78,000	70,000	71,000	75,000
	75th	86,000	78,000	80,000	89,000
	Mean	77,000	66,700	69,900	76,100
	Total faculty	112	98	128	42
<b>Instructor</b>	25th	44,000	43,000	39,000	
	Median	47,000	47,000	45,000	
	75th	51,000	52,000	50,000	
	Mean	48,000	47,900	44,500	
	Total faculty	20	14	22	1

**Table 5. Salary comparison between all basic science departments and physiology departments.**

		<b>All Basic Science Depts</b>	<b>Physiology</b>
<b>Chair</b>	25th	165,000	167,000
	Median	197,000	201,000
	75th	237,000	239,000
	Mean	202,800	205,700
	Total faculty	539	76
<b>Professor</b>	25th	109,000	108,000
	Median	130,000	126,000
	75th	157,000	149,000
	Mean	137,500	133,200
	Total faculty	3,958	630
<b>Assoc. Prof.</b>	25th	80,000	79,000
	Median	90,000	88,000
	75th	104,000	98,000
	Mean	93,400	89,600
	Total faculty	2,682	351
<b>Asst. Prof.</b>	25th	62,000	60,000
	Median	74,000	72,000
	75th	83,000	83,000
	Mean	73,700	72,000
	Total faculty	3,499	377
<b>Instructor</b>	25th	44,000	41,000
	Median	50,000	46,000
	75th	58,000	52,000
	Mean	52,400	46,800
	Total faculty	581	57