

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
All institutions	-	61,286,610	65,274,393	65,729,007	66,977,566	67,161,428	68,519,962	71,737,194	75,149,390	79,025,976	83,490,430	86,306,106	89,700,890	97,669,577	108,681,008
Johns Hopkins U. ^a	1	2,004,482	2,145,308	2,106,185	2,168,568	2,242,478	2,305,679	2,431,180	2,562,307	2,661,033	2,917,436	3,110,494	3,181,385	3,420,312	3,801,585
U. California, San Francisco	2	935,509	995,226	1,032,673	1,042,841	1,084,031	1,126,620	1,294,261	1,409,398	1,595,732	1,595,098	1,651,073	1,710,036	1,805,950	2,046,539
U. Pennsylvania	3	836,322	886,036	847,077	828,422	828,350	864,068	1,296,429	1,374,293	1,441,931	1,506,285	1,579,364	1,631,950	1,791,311	1,953,617
U. Michigan, Ann Arbor	4	1,184,445	1,279,123	1,322,711	1,375,117	1,349,262	1,369,278	1,436,448	1,530,139	1,600,869	1,675,805	1,673,862	1,639,645	1,770,708	1,925,875
U. Washington, Seattle	5	1,022,740	1,148,533	1,109,008	1,192,513	1,176,340	1,180,563	1,277,679	1,348,220	1,413,902	1,425,601	1,456,902	1,488,645	1,559,708	1,734,091
U. Wisconsin-Madison	6	1,029,295	1,111,642	1,169,779	1,123,501	1,108,564	1,069,077	1,157,680	1,193,413	1,205,518	1,297,331	1,363,931	1,380,075	1,523,513	1,731,949
U. California, Los Angeles	7	936,995	982,357	1,003,375	966,659	948,197	1,021,227	1,037,528	1,076,917	1,318,110	1,306,376	1,392,941	1,454,880	1,536,197	1,721,665
U. California, San Diego	8	943,219	1,009,378	1,073,864	1,075,554	1,067,388	1,101,466	1,087,117	1,133,454	1,265,196	1,353,763	1,403,735	1,425,499	1,533,357	1,705,410
U. North Carolina, Chapel Hill	9	755,284	869,174	884,791	973,007	989,766	966,781	1,045,338	1,102,063	1,136,158	1,153,773	1,159,725	1,205,883	1,361,028	1,549,617
Stanford U.	10	839,839	907,971	903,238	945,450	959,247	1,022,551	1,066,269	1,109,708	1,157,597	1,204,116	1,203,950	1,274,483	1,384,555	1,537,846
Duke U.	11	983,289	1,022,207	1,009,911	992,821	1,036,813	1,036,698	1,055,778	1,126,924	1,167,611	1,226,517	1,196,638	1,237,686	1,390,538	1,507,996
New York U.	12	365,944	430,752	458,645	471,909	523,623	602,041	809,739	917,744	887,558	934,720	947,293	1,063,704	1,276,038	1,457,424
Cornell U.	13	749,721	781,651	802,387	845,184	883,292	954,412	974,199	984,478	1,071,621	1,144,534	1,190,063	1,183,524	1,300,357	1,451,971
Ohio State U.	14	755,194	832,126	766,513	793,373	815,075	817,881	818,464	864,327	875,014	929,250	968,260	1,236,111	1,363,388	1,449,188
Harvard U.	15	583,361	649,774	799,432	1,012,766	933,975	1,013,753	1,077,253	1,123,160	1,173,371	1,239,736	1,239,983	1,254,008	1,308,458	1,435,218
Georgia Institute of Technology	16	615,833	655,375	688,905	730,488	725,550	765,370	790,706	804,301	891,728	960,167	1,048,988	1,114,481	1,231,485	1,405,080
U. Pittsburgh, Pittsburgh	17	822,491	899,386	866,638	872,736	856,806	861,205	889,793	939,706	1,006,513	1,080,951	1,105,532	1,135,416	1,251,998	1,398,078
U. Maryland ^b	18	na	na	na	na	na	na	na	na	na	1,096,600	1,103,062	1,142,264	1,228,550	1,385,302
Columbia U. in the City of New York	19	807,235	878,900	889,487	889,188	890,642	868,159	837,312	893,062	947,504	1,003,615	1,032,909	1,098,570	1,230,924	1,341,952
Yale U.	20	623,510	656,967	656,555	788,784	772,840	803,004	881,765	951,084	990,399	1,072,309	1,094,135	1,165,148	1,191,201	1,326,807
U. Minnesota, Twin Cities	21	786,074	847,419	826,173	858,378	876,870	880,618	910,181	921,681	954,683	1,013,112	1,042,382	1,072,961	1,202,084	1,320,183
Texas A&M U., College Station and Health Science Center	22	689,624	705,720	693,421	820,015	854,214	866,678	892,718	905,474	922,178	952,156	1,130,803	1,147,720	1,152,666	1,277,814
U. Texas M. D. Anderson Cancer Center	23	599,529	663,279	685,814	718,096	794,980	833,406	852,095	888,029	929,710	969,496	1,051,297	1,124,971	1,182,536	1,255,190
Vanderbilt U. and Vanderbilt U. Medical Center	24	504,959	566,031	560,466	571,603	683,890	647,816	640,842	712,036	738,620	776,937	824,803	1,019,273	1,086,223	1,253,156
U. Florida	25	681,548	739,931	696,985	695,063	708,526	739,522	791,294	801,418	865,093	928,639	942,223	959,965	1,085,834	1,250,201

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Pennsylvania State U., University Park and Hershey Medical Center	26	770,449	794,846	797,679	837,880	800,773	791,031	825,561	854,815	908,708	949,679	991,923	970,544	1,019,940	1,206,793
Washington U., Saint Louis	27	695,974	725,039	706,410	684,847	664,752	694,069	741,115	754,462	816,139	887,088	920,215	989,214	1,047,098	1,168,861
U. Southern California	28	592,791	603,294	623,544	645,636	687,222	691,031	702,866	764,322	891,625	909,683	941,198	955,565	1,039,905	1,154,804
Northwestern U.	29	575,078	618,980	631,078	639,781	645,333	656,167	713,491	751,809	805,672	857,069	874,671	913,178	1,000,695	1,114,269
Emory U.	30	529,453	547,316	565,766	575,943	558,600	585,210	614,527	664,888	712,417	794,928	808,792	852,922	958,281	1,094,328
U. California, Berkeley	31	694,049	707,945	730,348	727,002	744,343	788,505	774,255	770,822	796,505	802,931	840,000	846,872	981,035	1,076,754
U. Texas, Austin	32	589,502	632,171	621,538	634,132	585,251	604,376	621,692	652,187	679,781	696,111	797,199	779,348	845,896	1,035,838
Massachusetts Institute of Technology	33	677,138	723,610	824,130	900,524	908,017	930,719	946,159	952,017	964,336	1,009,466	987,968	949,076	989,166	1,000,081
Icahn School of Medicine at Mount Sinai	34	370,666	405,527	400,680	428,654	463,429	508,353	540,296	575,448	640,141	722,241	747,014	820,260	893,968	972,476
U. California, Davis	35	679,915	707,896	713,292	725,734	711,721	721,077	741,892	738,347	788,832	804,282	816,693	817,409	883,807	962,399
U. Arizona	36	586,647	610,565	625,365	629,466	588,088	606,219	604,464	622,200	687,066	734,270	760,975	770,031	824,340	955,424
Arizona State U.	37	329,345	355,215	385,959	405,154	426,651	458,412	518,239	545,016	617,717	639,637	673,357	677,303	797,224	903,779
Indiana U., Bloomington	38	177,520	184,096	184,486	197,897	206,039	485,076	508,766	540,421	566,907	668,157	710,850	695,258	751,309	853,056
Baylor C. of Medicine	39	447,874	466,061	474,700	508,799	496,314	520,220	572,527	604,952	623,396	651,920	685,641	716,976	827,005	847,305
Purdue U., West Lafayette	40	548,980	578,231	602,501	595,739	564,923	558,611	606,302	622,813	631,574	663,927	687,144	679,482	754,627	844,570
Michigan State U.	41	431,373	454,248	507,061	515,707	526,906	558,248	613,369	694,917	715,290	725,708	713,197	710,178	759,229	844,076
Rutgers, State U. New Jersey, New Brunswick	42	428,432	432,306	434,901	493,320	644,116	628,613	630,212	681,719	706,282	657,249	688,077	643,955	712,231	831,719
U. Illinois, Urbana-Champaign	43	515,133	545,669	583,754	743,487	621,733	639,817	625,180	642,084	652,709	677,523	689,176	731,268	765,909	821,023
U. Texas Southwestern Medical Center	44	419,220	431,883	435,085	440,620	434,627	438,824	442,666	461,797	474,260	496,697	595,939	632,134	719,002	800,391
U. Alabama, Birmingham	45	489,845	503,698	453,779	440,796	428,563	516,229	537,825	561,851	588,207	607,863	618,226	644,330	713,480	780,479
Boston U.	46	352,817	355,916	334,496	368,281	367,328	388,336	395,921	421,360	484,205	534,205	583,267	652,096	725,402	773,200
U. Utah	47	379,200	414,316	430,056	494,058	486,140	518,928	350,212	380,295	552,306	601,133	607,061	624,737	670,119	723,713
U. Virginia, Charlottesville	48	276,308	398,096	383,359	385,828	358,576	373,218	397,458	469,682	551,761	613,938	652,002	611,313	662,658	714,457
U. Cincinnati	49	411,269	448,936	433,668	438,642	422,873	436,028	430,579	455,250	480,095	529,796	530,138	551,826	615,070	698,642
U. Colorado Anschutz Medical Campus ^c	50	na	na	na	na	na	na	na	na	na	na	na	562,855	611,358	686,026
U. Iowa	51	444,034	443,893	446,429	435,377	449,147	443,218	473,362	494,280	511,973	508,353	538,583	553,876	594,215	662,134
U. Colorado Boulder	52	349,449	390,677	392,004	385,849	379,475	420,775	453,123	499,389	514,573	513,822	525,674	547,724	611,380	651,924

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
North Carolina State U.	53	360,795	378,154	404,225	417,468	446,112	468,293	489,918	500,445	509,841	541,100	546,290	547,118	583,203	633,251
U. Chicago	54	437,721	453,562	419,631	402,621	390,082	412,536	420,997	433,328	423,993	459,171	458,891	497,651	591,805	628,302
U. Nebraska, Lincoln and Medical Center ^d	55	na	na	na	na	na	na	na	na	na	na	na	na	na	617,372
U. California, Irvine	56	327,594	344,678	350,030	347,773	340,056	329,798	345,319	361,414	426,610	448,967	490,597	523,752	534,947	609,614
Virginia Polytechnic Institute and State U.	57	398,169	450,058	454,417	496,169	513,149	504,282	521,773	522,425	531,636	541,969	556,341	542,045	591,861	598,113
U. Georgia	58	295,339	335,901	351,395	350,225	355,471	374,264	410,345	455,432	453,249	477,536	482,786	493,944	545,631	570,956
Case Western Reserve U.	59	418,164	429,206	431,090	425,788	419,011	401,527	405,655	408,609	434,441	438,994	439,778	421,868	467,389	553,740
Oregon Health and Science U.	60	314,990	334,324	305,530	308,767	314,802	326,915	331,524	348,449	372,180	415,629	446,890	452,812	479,226	517,742
Princeton U.	61	242,570	263,335	275,666	269,908	293,274	279,851	307,653	334,125	365,007	385,739	396,502	404,448	461,185	513,365
U. Miami	62	280,671	323,486	365,301	344,757	345,805	331,036	358,441	367,877	357,104	360,716	381,410	375,841	439,300	509,951
U. Kentucky	63	359,944	372,932	360,776	339,764	328,239	331,705	349,661	378,374	393,034	410,581	417,674	429,241	476,517	504,005
Colorado State U., Fort Collins	64	302,896	330,784	375,919	313,238	307,978	317,219	331,862	338,404	374,955	398,477	407,302	447,197	456,911	498,073
Uniformed Services U. of the Health Sciences	65	134,126	175,365	143,250	164,232	262,489	361,173	256,203	298,370	308,326	417,300	324,510	384,490	277,240	496,441
Scripps Research Institute	66	387,298	400,768	398,673	399,899	386,231	384,161	364,670	354,582	396,839	427,734	444,964	485,435	492,639	494,946
U. Illinois, Chicago	67	362,939	380,828	388,625	367,848	347,888	354,560	337,296	372,619	361,690	382,949	412,147	429,585	440,573	492,936
California Institute of Technology	68	362,172	377,514	379,713	347,105	367,182	374,424	371,060	400,312	391,003	399,931	449,651	438,624	478,142	490,672
Carnegie Mellon U.	69	222,790	242,882	255,933	271,277	251,222	242,004	319,168	328,100	331,383	359,720	386,996	402,376	449,707	484,757
U. Rochester	70	414,655	429,034	389,612	389,355	353,419	346,932	346,165	353,003	370,645	393,960	397,211	409,255	450,805	481,227
Virginia Commonwealth U.	71	197,709	207,756	201,366	196,015	201,858	218,925	225,999	235,464	246,190	255,648	283,874	364,096	411,729	479,930
SUNY, U. Buffalo	72	349,670	353,172	360,226	387,863	386,562	382,935	389,569	401,591	410,220	413,817	422,038	425,349	439,709	471,569
U. Kansas	73	267,961	274,727	286,262	298,498	301,534	311,383	297,933	300,319	339,046	352,643	368,811	385,637	405,267	466,222
U. Missouri, Columbia	74	238,500	230,957	239,810	236,423	237,266	246,684	280,051	293,006	294,686	310,421	332,180	388,779	432,310	462,435
U. South Florida ^e	75	385,029	394,963	443,206	459,409	488,641	485,354	505,965	557,889	385,686	391,325	333,344	385,965	405,166	461,390
U. Oklahoma, Norman and Health Science Center	76	218,089	249,297	240,974	255,674	253,344	242,367	259,998	272,239	283,638	302,679	362,209	380,048	408,656	436,964
U. Delaware	77	153,311	169,746	170,174	179,967	175,563	175,724	176,295	183,428	186,192	206,270	220,445	231,532	368,107	428,128
Iowa State U.	78	250,120	267,641	260,995	266,596	313,263	306,125	328,385	323,584	361,206	358,474	363,107	360,275	393,184	420,823
Florida State U.	79	227,329	230,411	225,378	250,877	252,548	256,449	268,288	282,901	297,661	329,205	350,430	328,604	355,986	414,463
Utah State U.	80	149,169	174,167	157,355	158,352	169,605	175,353	180,590	187,314	219,397	283,917	304,256	325,223	344,851	401,437

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
U. Connecticut	81	237,908	253,792	256,854	242,251	258,056	259,397	265,522	267,647	269,685	285,764	280,131	302,329	367,557	390,165
Rockefeller U.	82	265,750	272,491	292,896	298,474	316,368	323,932	335,136	348,845	353,142	351,089	356,217	357,543	360,877	385,168
Louisiana State U., Baton Rouge	83	289,872	287,841	285,395	283,400	290,076	281,154	291,972	265,168	286,726	296,497	286,733	296,673	344,556	384,268
Washington State U.	84	304,352	320,510	335,930	305,510	288,752	303,214	301,640	331,051	331,424	344,997	335,201	357,648	368,396	378,744
U. Texas Health Science Center, Houston	85	240,772	261,172	236,250	233,256	233,737	234,299	237,016	246,060	258,411	271,525	273,862	308,823	342,633	374,105
Dartmouth C. and Dartmouth Hitchcock Medical Center	86	194,141	210,631	195,930	201,591	212,606	209,646	233,636	308,445	323,927	323,020	326,349	330,226	344,126	366,856
Wichita State U.	87	51,524	63,538	61,279	61,388	58,859	59,940	65,930	78,514	81,137	128,795	153,816	192,042	261,519	366,848
George Washington U.	88	196,917	197,621	196,448	202,428	227,995	241,117	231,829	245,519	260,656	269,799	270,369	266,108	275,483	360,260
Brown U.	89	335,838	344,090	365,120	361,010	341,531	342,040	347,016	212,290	244,838	256,954	266,127	276,331	310,780	353,591
Auburn U., Auburn	90	145,115	163,335	133,013	147,229	142,487	135,899	152,381	190,340	212,925	231,619	255,281	266,374	304,439	349,273
Medical C. Wisconsin	91	191,816	215,358	209,040	201,237	199,713	199,283	199,925	209,618	229,436	251,300	264,325	276,850	309,244	346,691
U. Tennessee, Knoxville ^f	92	150,671	167,456	179,252	193,054	179,041	173,533	183,268	203,800	259,607	247,693	320,407	316,273	324,435	338,847
Oregon State U.	93	216,595	228,814	240,507	232,677	230,963	245,317	254,275	267,068	272,433	263,830	268,385	276,955	297,934	337,985
Georgetown U.	94	159,355	169,916	180,308	178,995	172,726	176,131	183,788	212,319	221,449	240,960	258,659	279,932	313,220	337,006
Albert Einstein C. of Medicine	95	na	na	na	na	na	na	289,660	289,685	297,328	298,824	288,654	301,715	318,314	336,238
Medical U. South Carolina	96	224,632	213,346	236,586	245,451	242,594	243,534	260,098	262,267	282,253	295,600	272,590	277,761	284,553	333,826
U. Notre Dame	97	110,369	134,410	157,691	175,220	182,228	190,954	202,216	212,823	219,993	240,078	227,535	240,324	280,604	331,943
U. Massachusetts, Medical School	98	232,039	262,714	256,090	245,923	241,869	250,338	253,099	279,884	274,211	281,507	279,096	347,337	358,204	326,731
SUNY, Stony Brook U.	99	204,728	211,356	219,744	225,712	211,631	220,580	230,621	238,612	245,016	260,813	263,470	274,516	312,698	324,531
Mississippi State U.	100	231,675	226,070	233,197	206,424	209,729	226,359	239,446	240,972	244,102	264,526	280,485	275,143	303,418	319,684
U. New Mexico	101	211,771	220,565	220,360	227,703	228,849	232,271	239,550	246,597	251,322	239,696	243,375	332,566	331,164	316,026
U. Hawaii, Manoa	102	303,085	318,316	312,311	326,750	324,342	316,497	304,476	292,021	276,388	280,416	275,929	271,768	277,323	313,143
Wake Forest U.	103	192,034	209,134	204,328	182,721	176,380	171,926	170,006	182,227	191,371	238,933	244,643	264,216	269,109	308,972
Florida International U.	104	110,271	110,006	118,058	128,070	132,531	163,033	170,846	177,292	196,180	225,864	236,842	246,075	281,665	306,434
U. California, Santa Barbara	105	225,730	230,435	233,883	236,497	231,322	222,870	230,139	238,246	235,164	243,778	254,434	248,961	278,897	305,483
Temple U.	106	124,528	134,533	138,318	224,087	224,101	227,468	246,392	268,385	276,011	284,301	299,707	299,778	301,395	292,029
Northeastern U.	107	79,949	86,783	107,862	116,088	116,245	122,915	129,040	142,349	166,711	183,998	200,068	211,342	231,607	288,558
Woods Hole Oceanographic Institution	108	181,746	198,775	204,352	198,232	220,016	216,592	212,374	194,088	204,400	229,143	227,573	262,048	255,017	287,825

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Clemson U.	109	174,693	166,350	142,096	152,444	161,070	171,215	183,965	193,268	213,458	218,760	228,597	237,485	263,158	286,503
SUNY, Polytechnic Institute	110	na	na	na	na	412,851	295,313	316,680	308,861	257,358	352,889	355,651	465,273	413,763	284,677
U. Texas Health Science Center, San Antonio	111	207,115	198,655	184,298	175,983	172,716	170,277	194,885	169,200	179,219	188,483	202,572	219,734	238,510	281,078
U. Massachusetts, Amherst	112	169,141	181,297	194,775	190,739	200,199	213,902	214,576	210,416	211,140	223,177	219,389	213,824	245,158	268,657
U. South Carolina, Columbia	113	229,145	201,592	214,901	203,365	206,173	208,736	209,271	208,670	206,355	205,940	219,734	215,374	229,162	262,207
Tulane U.	114	165,513	171,703	164,373	160,414	157,825	152,658	165,438	180,993	193,294	196,933	204,430	205,206	222,605	258,439
Thomas Jefferson U.	115	103,064	104,923	100,506	89,273	118,378	119,631	122,396	142,569	148,573	170,458	171,377	200,393	246,212	258,345
Rice U.	116	97,903	110,235	117,223	131,003	138,536	144,679	154,543	167,277	161,831	182,564	198,681	207,404	216,202	255,115
George Mason U.	117	84,120	88,089	90,198	95,913	98,680	106,410	108,899	112,404	149,138	186,267	218,445	214,207	230,068	252,239
Wayne State U.	118	254,492	259,895	227,070	224,331	218,435	213,878	221,537	227,728	238,859	244,217	243,259	235,519	242,247	250,911
Tufts U.	119	156,106	156,395	160,922	156,525	160,825	168,314	189,085	223,409	213,457	213,285	216,241	224,956	231,224	247,276
U. Central Florida	120	117,985	109,190	116,891	126,681	185,555	215,519	198,211	200,387	215,332	225,085	213,757	218,596	221,488	247,259
West Virginia U.	121	154,926	166,420	169,303	167,144	164,454	170,145	172,477	185,606	185,110	187,512	188,452	199,907	214,081	246,173
Texas Tech U.	122	133,360	149,399	138,026	142,676	159,308	163,897	172,521	191,482	185,742	193,923	199,643	197,739	226,729	240,107
Georgia State U.	123	81,015	92,725	91,148	111,999	123,915	139,596	161,314	200,171	201,235	195,572	202,451	206,472	215,908	237,493
U. Vermont	124	129,856	132,356	115,697	115,486	109,701	114,547	115,611	117,667	128,293	135,859	191,147	195,320	216,307	233,806
U. Texas Medical Branch	125	188,399	193,555	180,888	180,198	178,014	173,506	179,541	185,106	181,831	175,372	180,595	185,759	204,518	233,192
U. Houston	126	119,811	113,709	116,288	130,844	140,597	150,628	162,049	169,431	177,484	195,398	200,428	202,536	240,126	231,942
Montana State U., Bozeman	127	135,084	125,966	124,228	113,136	113,348	108,414	112,073	129,622	125,129	154,811	166,285	193,577	200,820	229,682
U. Dayton	128	93,309	90,557	81,030	84,252	86,881	98,182	116,589	135,214	147,001	165,343	163,718	191,228	211,494	228,723
Oklahoma State U., Stillwater	129	147,094	162,786	166,523	134,500	126,543	129,968	181,617	189,024	188,756	184,276	187,060	198,799	195,041	226,498
U. Louisiana, Lafayette	130	69,412	69,978	65,275	61,887	67,580	77,300	80,099	100,956	124,713	144,187	164,070	181,400	205,201	225,924
U. New Hampshire	131	115,562	143,002	165,156	147,446	147,544	144,735	145,015	145,375	146,430	148,980	156,901	167,373	206,392	223,683
U. Arkansas, Fayetteville	132	113,909	120,007	123,199	125,501	125,824	133,660	145,020	157,791	175,498	180,225	165,887	164,443	184,080	221,525
U. Louisville	133	189,090	197,438	196,842	186,772	183,376	163,262	172,907	177,588	176,655	177,862	198,818	200,362	229,582	220,568
U. Alaska, Fairbanks	134	161,986	165,530	160,407	162,658	155,769	142,742	144,259	152,694	140,917	144,457	152,299	172,957	202,516	218,041
Kansas State U.	135	160,679	169,167	176,141	183,096	184,945	188,721	193,254	196,478	218,299	218,622	213,900	203,846	212,974	217,992
U. California, Riverside	136	130,288	132,238	135,494	132,617	133,558	144,511	152,233	163,632	167,847	177,655	184,894	189,600	199,135	214,802
U. Arkansas for Medical Sciences	137	119,518	122,066	129,056	133,677	131,438	132,451	125,378	128,508	139,187	153,135	174,549	194,709	205,493	209,409
U. California, Santa Cruz	138	143,919	155,617	155,516	150,777	151,734	151,713	151,192	124,344	127,538	142,958	150,400	160,615	176,760	203,883
North Dakota State U.	139	126,419	134,064	135,493	150,173	154,437	153,542	156,297	153,119	145,669	152,381	155,645	164,050	174,904	190,330

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
U. Maine	140	111,282	111,600	92,135	77,583	101,247	79,500	79,222	99,502	106,694	129,913	134,183	146,801	171,931	188,690
U. Nevada, Reno	141	95,423	89,740	85,726	89,797	87,324	90,138	95,475	105,869	144,426	152,128	159,790	175,386	181,782	188,505
U. Alabama, Tuscaloosa	142	40,762	53,633	55,885	55,443	53,140	58,234	62,549	63,282	71,992	83,317	95,200	129,509	163,204	184,880
Syracuse U.	143	107,024	83,686	85,649	70,967	66,321	69,896	84,651	145,705	147,751	154,366	149,652	151,717	157,407	183,850
U. North Dakota	144	76,560	74,882	80,149	68,942	67,595	64,384	70,275	102,823	109,865	110,836	111,663	143,506	147,717	182,195
U. Mississippi	145	110,020	122,765	121,731	108,168	109,922	94,040	121,665	134,542	137,521	158,809	122,960	116,175	152,903	172,176
Drexel U.	146	118,349	115,020	116,768	123,813	131,170	128,027	127,909	138,577	155,908	149,481	143,123	152,752	151,903	169,583
U. Oregon	147	94,107	103,019	105,030	94,522	91,203	79,698	100,754	95,974	111,896	110,664	114,259	139,193	160,500	164,500
U. Alabama, Huntsville	148	75,683	75,724	87,388	101,016	89,325	88,439	96,865	94,376	99,405	109,744	131,648	149,792	169,532	163,428
New Jersey Institute of Technology	149	92,318	100,491	102,851	107,310	106,081	110,512	130,812	142,164	162,349	161,232	163,447	166,587	167,135	161,078
U. Texas, San Antonio	150	56,279	58,667	57,233	53,626	47,061	54,949	59,831	70,163	72,682	84,326	138,586	145,362	147,629	158,453
San Diego State U.	151	99,137	106,591	92,867	86,733	95,674	93,572	90,722	89,187	88,177	92,964	97,710	107,681	129,762	158,013
U. Wyoming	152	55,319	57,549	65,611	65,490	51,422	56,996	112,056	125,032	113,063	80,353	93,061	93,202	139,764	150,124
U. Texas, Arlington	153	71,414	72,483	78,556	86,735	89,175	77,798	87,386	97,197	105,688	123,858	133,793	126,477	133,770	147,265
U. Texas, Dallas	154	82,044	93,230	90,700	98,842	99,727	98,551	106,205	113,205	113,315	126,661	132,192	122,825	130,914	146,779
U. Texas, El Paso	155	68,870	74,069	79,649	83,249	79,537	89,418	91,330	94,565	91,032	106,809	108,628	109,410	130,501	145,724
U. Maryland, Baltimore County	156	87,156	91,657	74,993	71,819	67,833	68,688	70,166	70,406	71,481	80,632	83,867	84,418	110,319	144,262
U. Rhode Island	157	90,016	102,630	114,323	101,898	91,706	93,828	97,900	101,871	104,490	115,160	109,967	129,296	129,102	144,013
SUNY, Binghamton U.	158	72,057	72,539	81,000	76,005	71,382	79,895	85,192	98,089	113,851	104,297	117,870	124,565	130,882	141,685
SUNY, U. Albany	159	359,364	148,625	137,758	137,759	130,955	111,705	120,232	156,386	173,031	181,531	138,088	114,501	129,796	141,671
Texas State U.	160	30,560	33,487	36,664	37,053	39,265	47,694	54,298	60,741	64,322	64,554	70,714	72,510	110,102	141,291
Augusta U.	161	na	na	na	64,033	64,118	67,737	71,338	99,661	99,081	96,502	103,961	116,480	127,313	139,121
Brigham Young U., Provo	162	32,997	37,142	33,843	36,562	38,051	39,126	42,304	43,406	40,755	39,582	38,569	43,916	45,610	137,748
U. Idaho	163	87,207	96,229	97,227	95,891	95,594	97,493	102,457	109,537	111,590	113,107	112,810	105,895	115,603	135,901
U. Montana, Missoula	164	63,540	60,159	59,313	60,189	55,032	60,485	70,059	85,044	90,563	104,665	110,218	121,571	125,603	133,958
Rush U.	165	73,398	79,212	80,300	81,770	80,551	79,048	73,351	74,062	89,101	96,267	94,438	107,398	114,874	132,394
U. Tennessee, Health Science Center	166	81,904	81,220	77,754	71,902	67,841	65,771	71,547	73,393	79,460	96,979	99,716	109,562	115,161	130,472
New Mexico State U.	167	157,872	139,062	141,151	142,365	134,262	132,377	106,282	102,218	96,270	101,457	107,275	110,580	121,472	126,337
Rensselaer Polytechnic Institute	168	83,952	84,834	92,720	92,495	105,608	102,841	101,127	104,797	100,856	103,739	122,753	119,056	121,809	121,706
New Mexico Institute of Mining and Technology	169	51,696	43,857	37,875	32,499	48,338	26,265	19,598	20,491	21,383	24,616	24,591	28,745	89,900	118,735
Cold Spring Harbor Laboratory	170	ne	89,913	84,072	78,236	76,733	84,653	88,943	97,288	115,870	126,773	115,198	114,903	118,034	117,483

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
U. Massachusetts, Lowell	171	59,345	60,013	60,624	63,136	64,591	70,384	68,494	69,677	72,266	83,996	92,216	94,708	111,144	117,336
U. North Texas, Denton	172	31,496	42,475	46,943	49,518	44,180	43,628	37,106	43,789	44,025	78,691	84,239	81,252	93,538	106,665
Colorado School of Mines	173	44,879	48,704	58,836	59,091	59,695	58,349	60,931	59,477	60,372	70,397	78,517	81,443	98,404	104,297
Michigan Technological U.	174	63,471	70,089	71,989	70,689	68,526	69,607	72,536	71,629	78,678	80,443	77,927	81,715	91,084	103,819
Brandeis U.	175	71,006	74,889	74,660	76,060	74,992	74,700	73,435	68,437	61,639	60,825	91,355	95,001	102,378	103,653
Touro U., New York ^d	176	ne	1,247	889	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	100,547
U. Memphis	177	49,517	48,321	51,194	48,141	55,566	46,675	48,321	49,695	64,297	58,700	69,463	67,092	71,271	100,042
U. Nevada, Las Vegas	178	44,457	39,526	34,543	35,935	39,448	42,000	62,825	66,285	83,800	99,445	105,872	101,009	94,967	98,751
U. North Texas, Health Science Center	179	38,862	45,943	46,865	44,904	47,002	46,335	50,567	48,476	49,503	50,124	42,766	50,698	72,675	94,652
U. North Carolina, Charlotte	180	31,814	27,533	25,141	24,764	23,342	24,870	27,815	26,097	39,888	47,187	50,050	51,877	43,126	92,027
Cleveland State U.	181	34,235	55,502	61,111	67,378	61,783	57,662	77,720	83,762	83,641	80,077	78,189	71,451	81,225	87,941
Indiana U.-Purdue U., Indianapolis	182	296,194	322,617	316,914	332,760	324,261	55,973	57,853	58,056	60,501	67,635	70,778	65,330	64,162	87,648
Saint Louis U.	183	46,839	53,179	49,086	48,231	44,481	44,457	42,151	56,402	60,380	66,103	69,528	79,005	82,740	85,921
Howard U.	184	40,080	42,341	45,486	42,789	40,771	47,322	41,038	45,768	45,965	44,163	44,933	52,412	67,594	84,756
San Jose State U.	185	38,241	40,149	34,727	38,326	43,509	45,037	41,662	39,192	41,366	44,309	47,301	60,100	71,695	83,406
U. Texas Rio Grande Valley	186	na	na	na	na	na	na	31,007	29,500	27,125	52,016	56,702	58,187	64,401	82,444
Baylor U.	187	10,925	12,343	10,161	13,616	20,729	24,642	26,767	29,400	31,936	33,304	39,765	48,809	66,014	82,074
William & Mary	188	57,461	58,919	55,805	57,940	59,015	61,554	63,027	64,127	65,269	64,835	66,763	68,801	75,953	81,815
Boston C.	189	50,537	52,253	51,442	50,702	49,724	47,761	54,469	58,088	57,030	61,956	63,063	65,156	68,958	81,425
Van Andel Research Institute	190	ne	ne	ne	ne	ne	40,502	40,040	44,578	55,171	61,738	58,982	65,789	78,626	80,748
Florida Atlantic U.	191	56,472	62,024	65,377	23,967	22,997	21,214	26,750	46,025	48,024	51,085	53,845	58,471	61,748	77,593
Northern Arizona U.	192	28,803	30,785	28,100	30,516	31,590	35,206	39,580	46,253	52,899	58,914	64,456	69,129	66,729	77,533
Naval Postgraduate School	193	103,510	101,363	132,450	94,880	99,032	89,170	65,529	60,386	59,213	67,323	62,903	65,101	64,055	77,364
American U.	194	39,747	46,611	43,526	61,087	63,628	58,325	57,064	56,034	61,741	71,053	71,839	65,912	67,616	76,041
U. Southern Mississippi	195	42,059	46,591	60,079	51,962	51,938	51,840	59,363	61,659	61,336	76,464	72,322	67,417	72,477	75,034
Rochester Institute of Technology	196	38,663	34,889	36,935	36,613	35,945	40,442	45,518	51,263	49,413	58,175	57,777	56,043	62,383	72,405
South Dakota State U.	197	67,552	69,680	68,743	63,843	58,334	58,373	60,677	63,412	63,465	66,794	60,939	51,542	59,590	71,340
Old Dominion U.	198	97,176	102,192	104,579	99,138	67,037	65,092	70,054	67,990	60,321	67,425	65,704	62,332	64,877	71,334

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
U. Massachusetts, Boston	199	56,416	57,040	60,086	60,380	61,186	62,374	64,223	70,019	61,473	62,018	64,219	63,723	65,215	70,978
Louisiana State U., Health Sciences Center, New Orleans	200	59,776	57,007	53,712	49,443	45,486	46,840	43,067	40,785	38,989	40,914	43,419	44,370	53,995	68,707
U. Toledo	201	70,399	74,149	68,228	69,072	61,900	52,354	50,019	50,030	50,320	55,006	54,100	53,169	64,654	67,656
East Carolina U.	202	23,995	28,114	31,990	38,271	29,925	26,549	25,273	26,117	39,074	55,611	57,820	51,662	55,693	67,082
Worcester Polytechnic Institute	203	18,613	22,137	20,232	25,298	29,929	36,130	37,822	33,368	33,067	39,878	43,092	48,702	56,904	66,353
Florida A&M U.	204	53,474	53,326	52,263	51,149	46,367	46,522	45,390	37,578	39,682	42,470	41,319	47,124	50,636	65,159
U. California, Office of the President	205	72,542	63,420	65,627	67,447	50,103	48,341	39,051	46,399	55,676	67,702	60,686	50,848	54,640	63,629
CUNY, City C.	206	46,699	60,648	57,982	55,138	52,654	53,223	62,484	54,627	53,979	52,738	45,632	57,361	65,569	63,159
North Carolina A&T State U.	207	35,297	34,930	35,103	33,994	35,047	35,172	33,759	37,379	38,140	37,339	36,151	40,751	47,908	62,307
U. California, Merced	208	21,591	21,328	22,656	22,909	23,916	29,688	29,370	35,093	38,226	44,890	45,966	45,964	48,147	62,279
Missouri U. of Science and Technology	209	42,263	41,581	38,588	40,397	39,065	35,842	35,756	38,243	42,986	47,807	47,001	54,437	53,357	61,496
U. Puerto Rico, Medical Sciences Campus	210	39,134	64,017	45,649	43,374	40,444	43,316	46,232	42,423	41,216	45,014	37,217	44,111	47,578	61,235
U. Wisconsin-Milwaukee	211	71,181	65,648	61,771	56,587	60,752	63,414	59,813	54,181	55,771	53,773	61,069	55,664	56,822	60,712
Stevens Institute of Technology	212	35,544	41,622	31,929	28,908	30,826	34,082	35,765	35,144	33,060	36,695	44,747	43,386	53,563	60,685
Ohio U.	213	50,440	57,643	57,203	59,734	60,800	61,078	59,117	61,092	53,303	53,735	51,914	49,764	52,465	59,877
Southern Methodist U.	214	18,742	24,453	24,397	22,544	32,401	29,282	31,819	29,879	31,140	42,562	43,081	41,960	57,544	59,749
Kent State U.	215	26,331	27,455	26,507	23,149	25,666	38,069	34,661	42,003	42,792	47,188	50,307	50,408	52,175	58,984
Southern Illinois U., Carbondale	216	69,924	71,130	71,097	70,854	65,256	57,509	53,172	48,416	49,636	41,729	41,617	47,210	46,967	58,291
Morehouse School of Medicine	217	30,669	33,946	37,586	36,638	41,858	33,367	38,774	36,925	33,215	31,289	29,813	32,637	42,489	57,125
Air Force Institute of Technology	218	31,259	31,879	32,746	27,592	23,902	26,866	29,998	35,733	33,360	34,016	35,584	45,703	44,391	56,848
Lehigh U.	219	37,332	32,086	31,992	35,220	37,066	36,788	32,941	36,969	38,674	38,185	38,064	41,279	51,769	56,301
U. Missouri, Kansas City	220	30,163	32,769	29,227	28,829	29,164	26,595	26,292	25,123	25,136	31,956	36,356	33,855	52,657	54,565
CUNY, Graduate Center	221	11,562	11,974	9,173	11,982	7,797	6,175	7,093	8,011	4,781	5,399	4,787	4,265	5,509	54,089
U. Denver	222	15,748	17,004	15,237	19,262	18,183	16,116	21,326	22,289	27,270	36,551	41,349	38,751	45,561	53,484
U. Maryland Center for Environmental Science	223	42,670	50,007	48,224	53,683	50,814	52,235	54,974	55,078	54,136	56,033	54,560	51,201	53,718	53,233

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
SUNY, Upstate Medical U.	224	43,824	39,988	35,897	34,286	33,460	32,453	31,892	35,551	36,674	38,091	41,557	44,870	50,586	53,219
U. South Alabama	225	35,500	42,233	40,172	40,590	41,681	43,722	46,670	41,431	41,056	52,540	51,102	47,610	43,491	53,182
Boise State U.	226	18,731	24,204	27,920	25,690	26,568	31,341	32,085	34,992	41,382	39,824	43,307	46,065	47,617	52,989
Loyola U., Chicago	227	43,903	42,708	45,903	51,676	50,774	48,664	42,672	39,738	39,332	39,223	39,365	44,036	46,169	52,445
Nova Southeastern U.	228	10,116	12,322	12,908	12,712	13,716	14,775	19,559	22,508	23,296	24,567	26,035	24,513	31,189	50,173
Texas Tech U., Health Sciences Center	229	51,282	58,774	61,219	61,412	38,015	40,438	40,235	39,767	37,819	44,072	44,135	41,583	46,574	48,638
Marquette U.	230	14,310	19,876	18,606	20,856	23,633	24,816	28,422	30,034	32,471	37,777	37,136	37,087	40,638	47,819
Rowan U.	231	2,987	3,247	3,783	3,407	8,202	8,044	10,212	12,856	16,247	22,892	26,018	26,458	29,949	47,810
Catholic U. of America	232	21,454	25,397	24,971	23,235	22,331	24,265	25,139	24,282	25,497	24,484	25,221	35,548	38,191	47,022
Portland State U.	233	56,533	58,975	58,489	55,435	54,787	53,872	56,572	48,964	46,911	50,045	43,667	41,311	41,483	46,324
Mercer U.	234	27,298	29,039	31,376	28,892	30,209	32,838	31,735	29,447	34,197	44,128	49,116	51,989	50,222	45,247
Western Michigan U. and Homer Stryker M.D. School of Medicine	235	26,391	25,051	21,073	18,979	18,942	19,679	18,927	22,372	21,184	25,071	24,541	25,314	27,768	45,157
U.S. Air Force Academy	236	62,097	73,607	56,044	57,164	44,663	38,326	55,358	48,287	35,925	43,941	42,197	32,086	36,506	44,880
U. North Carolina, Greensboro	237	22,436	26,121	19,080	16,590	20,723	23,026	23,965	23,231	22,743	26,325	28,966	37,033	41,303	44,521
Morgan State U.	238	12,804	12,803	17,751	15,475	15,720	13,577	15,727	14,978	12,993	13,253	17,193	20,628	29,482	43,868
East Tennessee State U.	239	9,869	10,249	11,213	8,919	7,836	6,930	7,982	9,493	14,043	14,197	13,925	18,449	23,420	42,335
U. Massachusetts, Dartmouth	240	25,725	25,644	22,732	27,326	28,219	26,776	26,824	26,102	26,626	28,036	26,836	28,729	33,136	42,018
Chapman U.	241	3,830	3,547	3,314	4,463	4,794	5,353	6,554	10,626	14,141	19,592	26,660	25,820	34,212	41,791
U. West Florida	242	17,757	21,710	16,221	19,332	19,579	31,232	40,815	35,054	41,035	38,555	37,397	36,837	38,870	40,454
Georgia Southern U.	243	3,704	3,912	5,719	18,069	20,245	17,152	17,395	16,084	12,978	11,166	12,166	37,201	36,362	40,026
Texas A&M U.-Corpus Christi	244	17,266	17,509	15,776	17,418	21,321	24,507	24,786	27,993	30,253	32,944	32,284	30,500	36,014	39,305
Montclair State U.	245	2,255	3,621	5,123	4,568	4,266	4,274	5,207	5,796	7,980	15,588	17,636	17,390	32,202	38,209
Oakland U.	246	12,856	15,868	18,194	16,767	15,196	17,108	16,001	14,561	13,817	18,002	12,949	20,261	38,061	37,263
CUNY, Hunter C.	247	38,900	39,772	41,022	40,059	38,879	36,368	37,094	31,273	33,702	37,478	38,345	33,816	35,348	37,172
California Polytechnic State U., San Luis Obispo	248	19,732	16,532	17,412	16,067	15,096	16,312	18,081	17,979	16,352	25,249	26,605	25,953	33,155	35,830
Louisiana State U., Health Sciences Center, Shreveport	249	30,817	31,021	29,365	28,266	25,004	24,069	23,353	22,560	24,463	26,262	25,321	24,600	29,502	35,624
SUNY, Downstate Health Sciences U.	250	32,512	41,993	43,257	39,354	33,331	28,652	33,735	31,873	34,661	36,015	33,204	34,459	30,918	35,600

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
San Francisco State U.	251	25,615	26,198	30,291	33,885	29,457	26,345	28,273	29,940	30,903	31,888	33,828	i 35,768	36,617	34,466
Teachers C., Columbia U.	252	17,167	18,406	20,805	19,649	20,538	23,269	24,124	24,194	24,477	24,865	22,630	24,335	30,978	34,183
Marshall U.	253	24,501	26,723	18,998	19,617	20,382	19,936	20,687	18,348	20,050	19,622	22,250	23,620	25,692	33,693
Delaware State U.	254	15,200	19,019	15,668	17,295	17,679	15,980	21,320	20,793	21,377	23,017	23,105	i 23,193	29,016	33,499
Illinois Institute of Technology	255	36,554	44,463	32,576	36,722	31,356	34,336	29,826	32,659	33,280	34,334	29,122	29,698	29,791	33,021
Illinois State U.	256	18,417	17,833	17,760	17,589	19,159	18,742	20,408	20,080	21,055	27,082	31,539	24,152	25,510	32,961
SUNY, C. of Environmental Science and Forestry	257	26,916	25,024	i 23,132	i 21,239	19,027	22,051	24,504	27,923	26,610	29,137	29,296	28,440	32,904	32,682
Kennesaw State U.	258	1,854	1,961	i 3,511	i 5,062	2,192	4,762	8,279	9,510	11,214	12,850	17,954	18,880	21,705	32,497
U. Texas Health Science Center, Tyler	259	ne	ne	ne	ne	ne	12,191	11,799	16,292	17,949	i 19,606	i 21,265	27,928	33,872	32,077
Louisiana Tech U.	260	26,020	27,583	26,546	24,949	22,942	23,827	23,104	22,741	24,655	26,143	26,585	27,417	26,591	31,676
Villanova U.	261	10,066	i 10,044	i 8,547	i 7,049	13,700	14,512	14,903	19,037	20,730	22,837	25,505	24,723	25,955	31,513
U. Nebraska, Omaha	262	8,951	9,509	8,376	9,181	9,222	9,422	10,459	12,061	12,943	14,302	16,134	19,006	24,259	30,841
Desert Research Institute	263	34,367	35,331	33,056	27,695	23,778	22,103	29,422	29,440	27,875	26,991	26,428	26,365	28,478	30,716
U. South Dakota	264	30,616	28,959	31,982	33,187	30,700	25,661	25,864	28,358	30,943	32,028	29,279	27,537	30,322	29,855
Rutgers, State U. New Jersey, Newark	265	27,745	35,774	34,797	37,134	28,083	24,387	21,492	25,898	27,206	26,661	28,006	23,854	28,345	29,787
U. Puerto Rico, Rio Piedras	266	30,515	32,582	33,099	29,234	28,793	28,579	23,491	21,204	17,085	24,088	22,895	28,896	28,083	29,202
Northern Illinois U.	267	27,036	21,748	21,823	23,027	16,427	17,722	21,225	19,150	23,280	26,570	25,420	25,261	27,068	29,134
Creighton U.	268	27,700	31,443	32,594	29,983	25,560	23,825	23,510	24,315	20,587	24,039	20,339	23,251	27,609	28,443
Miami U.	269	26,521	26,093	26,311	23,924	21,216	16,108	16,057	17,239	19,658	22,380	24,489	25,138	28,799	28,430
Tennessee State U.	270	12,432	13,468	15,439	16,177	20,068	19,955	19,520	18,108	17,681	15,236	25,942	21,977	i 18,012	28,246
California State U., Sacramento	271	15,207	16,344	14,053	15,564	13,136	17,930	20,676	21,106	21,429	23,544	24,939	23,699	23,795	28,027
Embry-Riddle Aeronautical U.	272	12,189	16,289	19,376	16,484	15,393	11,942	16,761	13,335	16,767	12,478	17,786	19,830	28,650	27,451
CUNY, Graduate School of Public Health and Health Policy	273	na	na	na	na	na	na	na	na	9,751	9,521	12,177	15,035	16,423	26,651
Texas A&M U.-Kingsville	274	17,378	17,114	17,419	18,653	21,819	20,894	21,309	22,633	21,150	22,268	22,745	23,578	23,451	26,401
Wright State U.	275	48,575	48,501	46,213	50,489	54,985	54,289	55,484	59,379	68,035	64,208	49,825	26,259	27,440	26,189
California State U., Fullerton	276	21,776	28,186	22,222	18,478	7,919	5,611	5,755	5,510	6,348	7,173	5,929	9,006	16,642	25,811
Tuskegee U.	277	15,581	15,685	15,991	21,150	24,945	20,740	i 16,535	16,535	16,535	20,562	20,973	21,355	21,941	25,625

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
U. Minnesota, Duluth	278	21,150	23,400	21,530	21,383	21,904	27,550	27,528	24,956	25,189	27,530	26,137	23,767	23,362	25,534
CUNY, Queens C.	279	16,845	23,219	22,399	19,762	23,434	19,092	19,168	15,936	16,676	18,391	16,470	16,063	21,434	25,492
Clarkson U.	280	18,584	17,951	14,809	12,061	13,750	13,406	12,983	15,148	16,927	17,147	15,104	16,765	21,703	25,399
Central Michigan U.	281	7,483	8,671	10,907	12,879	15,015	12,880	14,166	14,652	15,616	17,102	17,448	21,726	25,105	25,363
Florida Gulf Coast U.	282	13,906	17,051	14,393	14,204	9,626	8,992	7,335	6,025	5,115	5,907	6,671	8,197	9,896	24,899
U. Tulsa	283	23,387	19,489	20,270	21,757	27,077	25,066	22,347	20,879	20,072	18,648	18,787	17,187	17,416	24,845
Texas Christian U.	284	5,306	5,595	7,775	8,574	7,872	8,007	6,589	7,255	5,808	6,552	15,326	15,336	18,353	24,050
Eastern Virginia Medical School	285	44,420	36,569	37,745	44,183	43,917	42,296	32,550	28,671	30,010	27,064	20,870	19,415	22,165	23,991
Fordham U.	286	19,289	18,350	19,311	18,822	17,961	20,939	25,374	20,807	20,644	20,287	20,456	16,731	20,432	23,832
Tarleton State U.	287	10,763	10,426	9,393	9,722	10,996	9,825	9,404	10,893	12,503	13,171	14,890	17,729	20,056	23,345
U. North Florida	288	8,041	9,379	7,031	4,480	3,674	3,689	5,141	6,476	9,994	12,341	13,573	15,782	18,394	23,269
Albany Medical C.	289	22,953	20,876	17,735	15,093	16,093	18,043	20,166	20,443	21,187	23,028	23,510	22,443	22,297	23,259
California State U., Northridge	290	29,469	25,654	29,491	9,640	12,991	13,333	16,330	17,979	19,618	21,095	21,228	16,573	19,638	23,093
CUNY, John Jay C. of Criminal Justice	291	5,916	6,205	9,319	7,355	8,633	8,689	9,688	11,934	14,310	12,295	13,939	11,791	16,233	22,967
New School	292	5,178	6,420	7,568	9,219	7,160	8,978	17,425	12,740	13,606	13,421	13,186	14,281	19,218	22,680
U. Colorado Denver ^c	293	na	na	na	na	na	na	na	na	na	na	na	18,039	18,080	22,530
U. Guam	294	5,555	5,626	6,131	6,043	7,075	6,062	7,402	8,842	11,225	12,249	13,043	17,666	20,481	22,388
Loma Linda U.	295	35,990	39,409	31,772	31,715	23,375	25,519	22,977	21,846	19,892	17,938	15,984	14,029	15,517	22,262
Meharry Medical C.	296	27,001	29,055	25,559	22,532	18,997	13,998	14,768	16,782	16,980	18,286	13,870	15,840	17,960	22,002
Southern Illinois U., Edwardsville	297	31,781	33,736	26,992	25,807	18,915	19,051	18,780	17,393	18,420	18,088	18,273	18,044	19,152	21,927
U. North Carolina, Wilmington	298	23,143	22,593	19,722	18,145	14,648	15,564	15,715	16,015	16,955	17,515	16,544	16,656	20,053	21,879
Prairie View A&M U.	299	12,565	15,243	14,552	13,198	12,292	13,123	12,616	13,982	17,278	18,018	18,723	17,582	20,429	21,791
U. Akron	300	52,884	60,352	66,413	69,640	69,528	58,512	58,817	41,326	32,582	30,020	23,496	17,340	19,943	21,525
California State U., Long Beach	301	15,494	14,595	13,696	12,796	10,097	8,830	16,390	18,805	22,880	18,664	16,684	15,134	17,807	21,458
California State U., East Bay	302	1,312	1,644	1,039	934	ne	ne	837	ne	ne	ne	9,072	10,852	19,035	21,312
James Madison U.	303	7,038	7,303	8,891	5,835	4,628	3,712	3,303	3,248	4,191	8,726	10,247	14,687	17,021	21,265
Tennessee Technological U.	304	16,754	13,247	10,233	9,715	10,097	11,082	11,528	12,079	12,765	13,801	14,085	15,387	16,398	20,797
Bowling Green State U.	305	8,124	8,999	8,566	13,157	8,861	7,995	14,460	14,333	17,991	17,026	18,729	18,619	19,342	20,726
U.S. Military Academy	306	22,171	13,799	12,227	11,630	14,819	15,312	13,500	13,617	13,582	10,765	12,473	19,696	20,841	20,493
U. New Orleans	307	35,021	35,359	28,450	24,607	20,614	18,960	15,719	15,939	14,437	15,328	16,594	16,979	21,911	20,396

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
South Dakota School of Mines and Technology	308	28,572	32,070	19,140	12,156	10,524	14,970	15,396	15,541	15,092	12,973	14,490	15,746	20,061	20,337
U. of the Virgin Islands	309	32,350	21,994	25,719	20,041	20,371	20,630	21,215	12,298	11,957	12,236	13,631	15,231	20,259	20,259
U. Alaska, Anchorage	310	16,709	18,620	20,194	20,255	17,150	17,436	19,883	20,861	21,096	21,724	22,713	21,332	21,024	19,850
Charles R. Drew U. of Medicine and Science	311	22,152	22,150	20,580	18,547	20,686	14,128	13,360	15,652	11,490	13,739	13,682	13,228	14,581	19,551
Jackson State U.	312	44,862	49,998	46,943	36,264	26,609	23,908	23,832	22,790	19,465	18,160	15,081	16,157	17,481	19,457
Alcorn State U.	313	10,280	11,397	11,515	11,315	10,060	9,396	8,204	16,129	13,834	14,435	13,710	14,188	16,664	19,141
California State Polytechnic U., Humboldt	314	9,845	9,570	9,510	8,025	8,306	11,218	16,143	15,969	15,044	15,076	14,236	14,103	15,612	18,800
North Carolina Central U.	315	6,870	9,496	11,076	8,979	11,537	12,448	12,463	14,119	14,942	16,227	15,833	14,105	16,600	18,477
Montana Technological U.	316	7,424	6,705	11,765	11,059	11,348	11,595	11,851	13,059	12,666	12,731	12,987	14,933	14,188	18,375
Idaho State U.	317	20,495	21,450	21,179	22,147	20,610	17,866	20,447	18,564	18,081	14,972	14,478	13,953	16,615	17,548
CUNY, Advanced Science Research Center	318	na	na	na	na	na	569	ne	3,541	5,666	8,310	11,373	15,403	16,507	17,309
Towson U.	319	3,052	3,574	2,599	2,800	2,997	3,153	2,303	2,834	3,194	3,423	3,612	3,794	8,788	17,198
New York Medical C.	320	28,400	27,316	23,277	20,243	17,908	17,653	17,311	15,637	16,226	19,398	20,137	18,872	16,461	17,113
Florida Institute of Technology	321	12,054	14,523	17,100	13,298	14,255	14,282	18,860	18,180	17,378	17,876	18,271	23,195	17,706	16,859
Long Island U.	322	832	877	890	915	ne	ne	1,420	2,290	2,405	5,113	13,997	15,059	17,183	16,612
Texas Southern U.	323	7,003	6,318	6,380	6,548	6,038	5,005	4,495	4,722	3,740	4,893	10,138	9,128	12,120	16,287
Western Washington U.	324	10,571	9,498	7,597	8,157	8,567	9,921	10,743	13,014	13,075	11,983	12,823	13,450	15,081	15,874
Alabama A&M U.	325	30,497	30,238	29,979	29,720	29,461	29,202	25,112	21,022	16,932	12,840	8,749	9,180	9,611	15,588
Fort Valley State U.	326	5,310	3,850	3,665	3,688	4,547	4,320	5,138	5,374	3,916	4,563	4,921	4,842	9,969	15,536
Xavier U. Louisiana	327	8,029	9,849	10,606	8,789	9,346	9,588	12,084	12,424	11,784	10,152	11,387	12,799	14,156	15,519
Duquesne U.	328	15,804	16,814	15,547	15,661	15,025	16,159	17,089	17,197	17,420	16,947	17,485	10,521	13,944	14,989
U. Tennessee, Chattanooga	329	10,749	9,251	10,896	7,844	6,239	6,817	5,600	6,352	7,585	9,280	10,834	11,192	12,808	14,671
Missouri State U.	330	7,770	5,584	4,340	3,882	3,782	3,540	3,069	3,215	4,409	5,910	13,131	10,014	11,162	14,654
Salisbury U.	331	3,503	1,852	6,891	6,959	7,923	7,960	8,473	7,731	9,119	9,368	9,496	10,552	10,614	14,557
U. Hawaii, system office	332	ne	ne	ne	ne	ne	ne	ne	ne	12,340	12,159	13,568	12,918	12,646	14,172
Loyola Marymount U.	333	4,557	6,455	5,746	6,766	7,635	6,389	7,504	7,071	7,911	7,272	7,193	12,819	12,773	14,086
U. Puerto Rico, Mayaguez	334	26,475	34,424	32,115	29,225	27,152	28,100	25,491	26,130	24,769	26,877	26,553	18,368	18,274	13,989
Virginia State U.	335	7,466	8,562	10,296	9,535	8,374	7,808	8,147	10,725	10,673	11,457	10,014	10,123	12,326	13,504
DePaul U.	336	4,889	5,798	5,706	5,524	6,415	9,479	9,558	8,561	7,079	6,144	6,557	6,675	8,362	13,267

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Texas Tech U., Health Sciences Center, El Paso	337	ne	ne	ne	ne	23,282	18,889	17,391	16,479	12,556	11,883	10,421	11,360	14,206	13,189
California State U., San Bernardino	338	4,188	11,591	9,303	11,942	13,582	15,317	10,771	12,924	16,702	16,062	10,819	11,607	11,929	13,152
Northeast Ohio Medical U.	339	10,819	13,581	13,358	12,722	15,916	17,103	18,823	19,216	18,231	18,016	15,758	13,853	13,465	13,116
U. San Diego	340	2,934	3,483	4,275	4,554	5,146	4,476	4,734	5,089	5,642	6,036	8,607	7,580	10,143	12,902
U. Missouri, Saint Louis	341	14,628	18,461	19,356	20,869	18,618	12,061	13,460	12,042	12,266	14,432	15,352	14,632	13,247	12,808
Midwestern U.	342	3,626	4,022	5,200	6,292	7,310	8,560	7,732	9,207	10,173	10,343	10,479	10,961	11,069	12,725
Oklahoma State U., Center for Health Sciences	343	4,398	2,815	2,122	2,137	1,805	1,625	2,182	2,454	2,608	5,408	8,378	7,758	8,368	12,500
Sam Houston State U.	344	7,555	5,816	4,349	4,608	3,996	3,086	3,266	3,658	7,152	9,445	12,437	13,315	12,009	11,760
Ball State U.	345	20,477	18,765	11,740	10,357	9,209	10,548	11,763	8,797	11,163	12,145	9,429	8,826	9,932	11,650
Rosalind Franklin U. of Medicine and Science	346	12,426	14,261	15,587	17,401	17,794	16,604	16,760	17,006	16,765	16,126	14,601	13,805	12,988	11,629
Kentucky State U.	347	4,912	4,562	6,859	5,605	5,694	6,017	7,178	8,151	9,125	8,433	7,963	8,756	9,284	11,591
Clark U.	348	7,111	6,861	7,260	5,693	6,168	7,050	6,970	8,453	8,318	10,193	10,277	7,931	8,813	11,539
California State U., San Marcos	349	5,788	6,795	7,802	8,809	8,302	6,432	6,634	6,549	8,348	10,595	13,250	10,213	9,238	11,443
California State U., Fresno	350	8,698	8,597	8,359	7,682	8,109	8,624	8,586	8,102	8,988	8,599	8,856	9,213	12,603	11,411
Central State U.	351	3,233	3,821	3,591	2,771	2,025	1,508	1,643	2,008	3,615	3,766	6,107	8,751	10,274	11,123
U.S. Naval Academy	352	11,093	10,543	9,610	10,816	10,861	9,609	11,374	13,541	14,057	13,621	13,123	10,818	10,664	10,920
U. Michigan, Dearborn	353	6,779	7,554	6,015	6,846	8,176	7,802	7,904	8,315	8,094	8,813	8,777	7,472	8,180	10,839
Wesleyan U.	354	8,397	10,367	8,945	8,120	7,262	7,223	7,740	8,945	10,662	9,958	8,300	8,009	10,101	10,828
U. Maryland, Eastern Shore	355	8,692	8,664	7,309	8,826	8,982	9,700	8,250	7,403	4,941	7,133	8,092	8,636	9,274	10,730
California State Polytechnic U., Pomona	356	6,493	7,198	6,597	6,988	5,455	4,611	5,254	5,863	8,043	6,099	7,396	7,011	7,909	10,722
Pacific U.	357	1,849	1,129	2,110	2,535	2,122	2,016	2,508	7,770	6,264	8,753	5,842	4,690	6,128	10,719
California State U., Monterey Bay	358	5,305	6,959	6,567	6,129	4,787	5,492	5,680	5,397	5,799	6,444	5,874	6,882	8,975	10,678
Pepperdine U.	359	2,672	1,924	2,571	2,400	2,401	2,714	3,178	2,396	1,954	2,170	2,006	2,655	3,775	10,632
Langston U.	360	4,492	5,206	5,326	4,932	8,512	8,126	11,178	11,025	10,872	10,719	14,409	6,345	6,481	10,505
Clark Atlanta U.	361	8,515	8,245	10,406	9,159	9,192	9,945	8,513	8,007	7,833	9,048	8,452	8,892	8,791	10,320
West Texas A&M U.	362	7,346	5,847	6,937	5,510	5,407	4,513	4,048	4,943	4,797	5,437	6,220	9,920	9,438	10,302
California State U., Los Angeles	363	7,714	8,823	7,192	7,659	5,172	5,010	5,371	8,274	9,594	12,476	10,590	9,382	9,839	10,186

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Kean U.	364	ne	1,497	2,029	761	ne	1,064	908	ne	ne	ne	2,201	3,538	5,499	10,062
Gallaudet U.	365	7,652	7,161	6,765	6,769	5,655	4,477	6,947	7,603	7,617	5,382	4,599	6,126	6,360	9,894
Hampton U.	366	14,455	12,414	15,356	12,641	11,169	14,895	14,225	16,482	14,424	13,605	11,402	11,669	11,462	9,769
U. San Francisco	367	2,124	2,668	4,301	2,663	2,764	2,599	2,365	2,602	2,741	2,712	2,161	1,375	2,657	9,633
Middle Tennessee State U.	368	4,793	4,969	7,108	5,718	4,334	4,350	6,164	4,714	7,132	7,673	8,697	22,531	22,631	9,577
Rutgers, State U. New Jersey, Camden	369	3,574	5,079	3,810	5,722	4,919	5,123	4,250	5,103	3,264	3,211	3,950	5,142	6,480	9,527
Western Kentucky U.	370	9,943	8,344	10,639	9,322	8,280	7,854	8,926	10,814	9,617	9,281	8,241	6,944	7,720	9,298
Lamar U.	371	5,829	4,762	3,589	2,605	2,447	2,824	2,783	3,883	3,595	4,848	4,327	4,734	5,304	9,168
U. Northern Colorado	372	2,607	2,078	2,896	3,034	4,176	3,652	4,028	4,538	5,089	4,571	3,738	3,159	3,308	9,064
Bryn Mawr C.	373	7,476	8,388	9,837	9,452	9,143	11,692	10,867	11,146	10,282	9,846	11,575	8,987	9,123	9,039
Western U. of Health Sciences	374	1,786	1,768	3,005	3,721	5,474	4,904	6,895	6,187	5,140	4,951	5,899	6,688	9,029	8,929
U. Arkansas, Little Rock	375	11,007	12,039	10,500	13,107	8,068	7,003	7,604	6,833	8,167	9,975	9,711	7,397	7,530	8,685
Saint Joseph's U.	376	2,918	3,073	2,955	2,921	1,988	2,093	2,171	2,409	2,151	2,851	3,150	2,922	9,041	8,675
Winston-Salem State U.	377	ne	1,179	1,977	841	ne	ne	1,356	1,575	1,629	2,011	5,781	8,123	10,436	8,668
Yeshiva U.	378	314,240	281,334	289,027	271,166	306,826	306,174	46,130	3,258	3,302	2,420	2,763	5,452	7,274	8,661
CUNY, Brooklyn C.	379	6,846	9,306	9,216	8,064	9,407	9,091	9,602	7,393	6,600	6,837	7,074	6,318	6,220	8,535
Appalachian State U.	380	2,898	3,835	4,438	3,051	4,289	3,878	3,146	4,475	3,631	3,268	4,894	4,509	7,189	8,479
Eastern Michigan U.	381	14,133	11,643	12,437	3,128	1,428	1,761	3,815	6,281	6,600	7,175	9,088	7,233	8,025	8,363
Lincoln U., Jefferson City	382	8,475	8,518	7,899	6,585	6,742	6,296	5,826	5,164	4,215	4,581	5,777	7,621	11,500	8,196
Abilene Christian U.	383	662	487	ne	ne	ne	ne	ne	ne	ne	ne	ne	4,597	6,310	8,182
Hofstra U.	384	2,552	2,472	3,237	2,394	3,102	2,585	2,440	1,702	1,662	1,744	1,445	5,545	6,939	8,162
Amherst C.	385	3,628	4,623	5,448	6,275	4,308	4,412	4,260	4,070	4,849	6,325	4,906	4,636	7,177	8,152
U. Hawaii, Hilo	386	14,857	9,934	22,003	16,009	9,323	14,495	11,287	7,008	7,133	6,864	6,992	7,411	8,001	8,112
Southern Connecticut State U.	387	3,840	4,083	3,526	2,012	5,465	5,482	3,243	2,493	2,763	4,627	5,413	5,750	6,286	8,007
U. of the District of Columbia	388	5,012	4,422	4,030	3,073	2,361	2,043	3,469	3,733	2,960	4,800	4,590	8,104	10,779	7,945
U. Central Oklahoma	389	1,786	1,548	1,028	1,067	1,362	7,691	6,275	5,832	5,104	5,682	5,788	5,997	7,070	7,870
South Carolina State U.	390	7,167	10,037	12,909	12,809	12,709	12,607	13,076	14,300	15,130	3,659	4,697	5,735	6,773	7,814
U. Arkansas, Pine Bluff	391	8,343	9,415	9,082	8,911	8,198	8,425	8,873	8,136	8,349	9,024	8,540	8,713	7,506	7,766
Southern U. and A&M C., Agricultural Research and Extension Center	392	ne	6,143	8,122	5,530	5,606	4,761	4,704	5,000	5,296	5,448	4,475	6,164	7,048	7,764
Pennsylvania State U., Behrend	393	3,265	3,183	3,374	3,203	4,282	3,737	5,382	3,804	2,760	3,414	1,743	5,509	6,384	7,614

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Edward Via C. of Osteopathic Medicine	394	ne	2,453	2,576	4,992	2,633	2,237	5,692	8,119	7,601	7,225	7,475	6,629	7,121	7,597
Grinnell C.	394	2,069	1,340	2,735	4,023	3,974	3,723	4,183	4,953	5,573	5,500	5,826	4,122	5,867	7,597
Purdue U., Northwest	396	na	na	na	na	na	na	na	8,924	8,062	5,272	5,839	5,647	6,387	7,504
Philadelphia C. of Osteopathic Medicine	397	1,278	2,401	1,898	2,614	2,209	2,561	2,458	2,969	3,059	3,162	3,360	6,186	6,667	7,459
MGH Institute of Health Professions	398	ne	607	ne	ne	ne	3,931	2,548	2,282	3,328	4,130	3,549	3,037	5,805	7,426
Arkansas State U., Jonesboro	399	11,115	13,435	14,250	10,463	8,099	8,453	8,169	7,952	8,245	8,945	8,640	8,422	8,214	7,323
Claremont Graduate U.	400	7,116	6,589	10,350	9,705	9,540	i 9,375	i 9,210	i 9,045	i 8,880	i 8,715	9,403	7,235	8,382	7,262
C. Charleston	401	14,218	8,320	9,579	10,224	10,034	10,607	10,189	8,927	7,375	7,610	5,728	6,361	6,421	7,231
Seton Hall U.	402	4,003	7,701	6,398	6,489	6,675	7,058	7,244	7,272	6,536	7,056	5,718	5,320	5,741	7,068
Texas A&M U.-Commerce	403	2,679	2,242	2,279	2,541	2,833	3,755	2,943	4,227	3,431	3,403	4,166	3,827	4,955	7,029
U. Colorado Colorado Springs	404	9,088	7,425	4,727	4,721	5,363	6,988	6,812	6,680	5,976	4,720	5,557	5,338	7,761	7,012
Claremont McKenna C.	405	5,725	5,316	5,365	i 5,414	i 5,463	ne 6,094	6,094	5,818	5,693	6,214	5,846	4,515	5,893	6,925
Texas Woman's U.	406	2,271	2,919	4,129	2,704	2,650	2,310	3,014	4,073	4,822	4,477	4,135	4,943	6,029	6,922
Hope C.	407	3,596	4,185	3,376	3,559	3,016	2,932	2,811	3,225	3,179	2,745	3,822	5,211	6,355	6,910
U. North Carolina, Asheville	408	2,671	3,157	3,068	2,647	2,150	2,384	3,348	2,863	3,414	4,602	4,789	4,844	5,973	6,761
U. New England	409	3,560	4,016	5,224	6,637	7,650	7,498	7,566	8,064	6,700	7,346	6,886	6,234	6,664	6,756
Reed C.	410	1,904	1,839	1,837	2,395	3,124	3,050	3,213	1,415	2,607	3,240	5,155	5,132	i 5,922	i 6,750
U. Baltimore	411	4,229	5,944	5,556	5,448	4,990	5,022	5,798	6,851	10,556	12,451	15,054	14,672	6,646	6,615
Williams C.	412	4,691	4,513	4,518	3,857	4,440	5,679	5,747	5,227	5,506	5,188	4,924	i 4,902	i 5,657	i 6,448
California State U., Bakersfield	413	2,083	3,162	1,241	2,602	2,432	3,192	3,161	4,652	5,577	7,591	7,053	6,253	4,815	6,409
Barnard C.	414	3,353	4,046	3,684	2,931	2,738	2,916	3,534	3,730	3,458	4,010	3,748	4,632	4,988	6,320
Wellesley C.	414	8,422	7,242	8,439	9,113	10,127	9,595	11,664	10,326	11,530	8,810	8,088	6,252	6,326	6,320
U. Washington, Tacoma	416	872	1,359	1,845	2,203	2,938	3,618	3,957	3,246	3,006	3,471	3,504	4,291	5,484	6,243
Grand Valley State U.	417	5,044	6,429	i 7,814	i 9,202	8,198	7,453	6,764	6,917	6,968	6,592	6,792	6,809	6,695	6,231
Norfolk State U.	418	5,944	7,140	8,336	6,431	6,936	5,348	7,593	7,296	6,914	8,050	7,153	4,316	3,593	6,194
Northwest Indian C.	419	2,426	2,744	i 2,847	3,247	2,609	1,631	i ne	ne	2,154	2,659	3,650	i 4,641	i 5,632	6,184
West Chester U. Pennsylvania	420	5,584	i 8,103	4,591	1,635	2,793	5,009	5,895	7,293	6,340	6,777	6,414	4,433	5,903	6,132
Azusa Pacific U.	421	ne	3,620	2,056	i ne	ne	7,521	8,898	8,430	8,380	5,598	7,068	5,318	3,389	6,097

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Roseman U. of Health Sciences	422	ne	840	ne	ne	3,021	3,287	3,433	4,167	3,973	4,176	i 4,380	5,985	6,296	6,065
Indiana U. Pennsylvania	423	1,376	1,736	1,809	1,280	938	ne	1,241	2,291	6,450	8,119	6,531	6,180	6,313	6,052
U.S. Army War C.	424	ne	ne	ne	ne	ne	ne	ne	ne	ne	4,418	i ne	4,662	i 5,496	i 6,035
California State U., Chico	425	2,881	2,684	2,492	2,868	2,384	1,837	2,363	1,600	2,452	3,232	4,305	4,209	4,177	5,984
Smith C.	426	4,613	4,529	4,246	4,234	4,283	5,268	4,466	6,055	5,954	6,041	4,685	4,085	5,831	5,954
High Tech High Graduate School of Ed.	427	ne	ne	ne	ne	ne	ne	ne	ne	861	ne	3,304	5,032	6,203	5,939
U. Southern Maine	428	16,358	16,938	13,915	11,725	9,408	i 7,091	i 4,773	7,147	7,414	6,654	5,635	5,480	5,498	5,930
CUNY, Lehman C.	429	3,593	i 3,762	3,228	2,904	3,265	3,130	5,347	4,979	5,556	4,690	4,154	4,181	4,656	5,918
Bucknell U.	430	5,456	5,043	4,009	4,297	4,464	4,140	4,516	i 4,892	i 5,269	5,625	5,051	i 4,476	5,259	5,887
U. Oklahoma, Tulsa	431	ne	ne	ne	ne	ne	4,104	4,962	4,487	6,233	6,373	7,483	7,185	7,945	5,826
Naval War C.	432	ne	ne	2,938	i 2,700	i 2,736	i 2,653	3,210	4,240	i 5,270	5,060	5,944	5,542	5,529	5,819
New York Institute of Technology	433	1,785	2,059	3,013	4,007	5,761	4,169	4,114	3,236	3,832	5,820	3,580	4,465	5,555	5,790
Morehouse C.	434	7,857	8,485	i 9,113	9,581	7,349	6,180	4,315	3,667	4,531	4,564	4,825	4,533	5,664	5,750
U. Washington, Bothell	435	630	2,857	4,285	4,704	7,550	7,657	8,406	10,219	8,097	7,950	7,107	8,311	8,197	5,738
Santa Clara U.	436	3,816	2,407	3,329	2,376	2,883	1,659	2,056	2,145	2,299	2,319	2,682	3,142	4,225	5,679
Swarthmore C.	437	2,984	2,994	3,281	3,415	3,528	2,943	3,211	3,569	3,921	4,203	3,544	3,296	4,225	5,620
Texas A&M International U.	438	2,428	3,121	3,344	3,674	3,441	2,917	3,742	4,745	5,735	6,068	3,067	3,740	4,486	5,602
Oregon Institute of Technology	439	ne	258	ne	ne	ne	2,056	4,027	3,595	i 3,163	4,793	4,267	4,314	5,086	i 5,585
California State U., Dominguez Hills	440	2,743	2,780	2,894	4,671	3,614	i 2,557	2,790	1,858	2,043	1,957	2,065	2,690	4,230	5,558
Providence C.	441	917	758	ne	983	ne	1,329	1,196	1,014	1,215	1,042	1,092	766	ne	5,533
Memorial Sloan Kettering Cancer Center, Louis V. Gerstner Jr. Graduate S. of Biomedical Sciences	442	ne	2,342	2,562	2,979	3,356	3,089	3,177	3,285	3,502	3,769	3,737	3,776	4,954	5,324
Trinity U.	443	1,446	1,355	1,611	3,094	2,992	2,633	2,383	3,274	3,244	3,736	3,472	2,905	3,657	5,296
Dakota State U.	444	ne	1,015	5,709	1,574	1,446	1,152	2,171	2,284	3,619	3,710	4,412	3,416	4,684	5,253
West Virginia State U.	445	3,770	4,176	5,087	4,491	7,221	7,365	5,224	6,305	6,535	5,829	5,775	6,565	6,703	5,226
Southern U. and A&M C., Baton Rouge	446	6,865	6,819	i 6,773	4,920	4,812	4,766	4,322	4,043	4,171	4,492	3,849	4,943	4,344	5,201
Suffolk U.	447	ne	1,624	1,303	1,551	1,534	1,305	1,492	i 1,679	i ne	ne	2,106	2,043	1,401	5,164
Pennsylvania State U., Harrisburg	448	2,734	3,460	2,903	2,230	2,557	3,379	2,558	1,654	2,119	2,805	1,866	2,938	2,927	5,159

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
U. Detroit Mercy	449	1,148	1,462	970	ne	1,320	1,882	3,654	2,748	4,605	5,210	4,786	4,578	5,186	5,142
Colgate U.	450	2,851	2,291	3,268	2,704	2,444	2,721	3,219	3,414	3,823	3,756	2,913	3,306	4,343	4,930
Sul Ross State U.	451	3,039	3,183	2,375	2,159	2,528	2,204	2,015	2,500	2,934	2,352	2,068	3,004	i 3,940	i 4,878
U. Central del Caribe	451	7,122	7,515	7,313	7,095	7,181	6,964	7,090	5,634	4,111	3,953	3,931	3,831	5,053	4,878
Spelman C.	453	3,181	2,273	2,148	1,602	1,595	1,524	1,929	2,079	2,350	2,751	2,750	2,282	2,686	4,877
Fisk U.	454	7,700	4,849	4,058	6,565	i 9,073	9,854	i 10,635	5,017	2,790	4,748	3,904	4,320	4,000	4,867
U. Wisconsin-Superior	455	5,890	6,187	i 6,041	i ne	3,030	i ne	ne	ne	3,068	2,250	2,301	2,602	4,615	4,825
Sacred Heart U.	456	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	972	ne	4,733
CUNY, C. Staten Island	457	3,290	4,188	4,955	3,691	3,731	3,060	3,511	4,250	4,118	i 3,986	3,682	2,860	3,545	4,730
Coastal Carolina U.	458	2,404	2,162	2,412	2,516	2,166	1,862	1,779	1,893	1,631	2,042	1,903	2,245	3,724	4,729
Occidental C.	459	2,289	1,809	1,592	1,634	2,177	1,544	2,008	1,764	1,445	2,458	2,657	3,587	4,139	i 4,718
Toyota Technological Institute, Chicago	460	ne	746	ne	ne	ne	2,543	2,710	2,880	3,251	3,681	5,887	4,967	4,470	4,636
Lawrence Technological U.	461	3,952	3,348	1,483	2,022	1,876	2,528	1,907	1,942	1,668	1,352	1,521	1,764	3,050	4,632
Sonoma State U.	462	858	825	ne	1,938	1,714	1,163	693	ne	ne	ne	1,545	2,957	3,774	4,625
U. Wisconsin-Stevens Point	463	6,766	6,171	i 5,576	4,392	3,919	i 3,446	i 2,973	3,420	i 3,867	i 4,314	i 4,764	4,401	3,740	4,589
U. Northern Iowa	464	3,064	4,248	3,615	3,678	3,711	4,032	3,632	3,303	2,983	3,628	2,970	3,259	3,486	4,564
Colby C.	465	1,782	1,772	1,996	1,822	1,673	1,748	1,903	2,071	2,240	1,852	1,536	1,672	2,530	4,454
SUNY, C. of Optometry	466	3,529	3,738	3,466	3,637	3,481	3,906	4,169	3,304	3,120	2,968	3,477	3,460	4,497	4,423
U. of Health Sciences and Pharmacy in St. Louis	467	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	4,835	5,313	4,280	4,343
CUNY, system office	468	ne	ne	1,817	1,210	1,088	1,782	1,655	1,114	3,253	2,619	1,704	1,664	2,900	4,296
Carleton C.	469	4,575	5,382	4,957	5,848	5,657	6,746	6,385	6,888	5,515	4,388	3,732	3,800	4,358	4,185
Alfred U.	470	4,524	6,084	5,451	6,731	4,655	5,193	3,975	3,231	3,641	5,153	2,780	2,660	3,477	4,154
Pomona C.	471	2,924	3,640	3,259	3,679	3,818	3,538	3,691	3,205	2,983	2,985	2,855	2,146	2,589	4,149
Franklin and Marshall C.	472	3,770	3,439	2,997	3,475	3,105	3,888	3,772	4,385	4,769	5,041	3,623	3,722	4,440	4,111
Trinity C., Hartford	473	1,875	1,934	2,102	1,786	2,131	1,717	1,598	2,856	1,672	1,858	1,428	1,775	1,620	4,099
Haverford C.	474	3,620	2,765	2,588	2,769	2,546	2,633	2,173	2,442	3,041	3,752	4,473	3,835	4,487	4,088
CUNY, Baruch C.	475	2,616	2,645	3,605	2,264	2,183	2,451	2,998	2,543	2,817	2,387	2,396	2,521	3,156	4,084
Keck Graduate Institute	476	ne	2,313	1,920	2,357	2,132	1,722	1,660	i 1,598	i 1,536	i 1,474	i 1,412	i 1,350	i 1,282	4,059
Pace U.	477	3,085	3,732	4,214	3,611	4,373	4,647	5,359	5,028	4,282	3,855	4,272	3,649	3,524	4,056
California State U., Channel Islands	478	ne	524	ne	1,236	3,862	1,949	1,383	1,096	1,248	1,572	1,497	2,341	3,377	3,992
St. John's U., New York	479	1,643	1,786	2,161	2,401	2,507	2,558	2,307	2,542	2,903	2,352	3,282	2,940	3,592	3,955

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Pittsburg State U.	512	1,759	1,687	1,479	1,536	2,475	2,210	2,162	2,255	2,253	2,513	2,173	2,730	2,884	2,979
Middlebury C.	513	2,292	2,408	3,031	2,179	1,450	1,599	1,822	2,043	1,895	1,657	1,720	2,927	2,603	2,975
East Stroudsburg U. Pennsylvania	514	ne	250	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,410	2,928
Davidson C.	515	1,493	1,977	1,400	2,337	1,804	2,377	1,521	1,736	1,638	1,777	2,263	2,466	2,788	2,926
U. Wisconsin-La Crosse	516	4,141	3,862	i 3,583	3,796	3,424	3,615	3,211	3,187	3,569	2,692	2,795	3,001	2,942	2,921
Hawaii Pacific U.	517	ne	1,436	1,390	1,043	1,524	1,241	2,371	2,175	2,114	1,980	1,796	1,849	3,302	2,913
St. Cloud State U.	518	4,184	3,404	2,932	2,912	3,380	4,192	3,497	3,588	3,725	3,275	3,056	2,379	2,226	2,901
Touro U., California	519	1,221	1,779	2,237	2,155	3,067	3,106	3,466	3,122	3,233	3,543	3,551	3,489	2,561	2,877
Southeastern Louisiana U.	520	2,561	1,952	2,121	2,067	1,503	2,670	2,128	2,206	2,039	1,971	2,258	1,723	2,407	2,858
CUNY, New York City C. of Technology	521	231	343	ne	ne	ne	ne	ne	ne	2,418	2,711	2,130	1,367	1,955	2,819
Purdue U., Fort Wayne	522	8,523	8,864	8,570	8,128	7,882	7,052	5,952	5,254	4,945	2,416	2,264	2,495	2,134	2,804
U. Wisconsin-Green Bay	523	1,219	1,239	i 1,259	i 1,279	i 1,299	i 1,320	1,599	1,510	1,454	2,083	1,982	1,879	2,713	2,801
U. Wisconsin-River Falls	524	441	551	i ne	ne	ne	ne	ne	1,072	923	ne	1,107	999	ne	2,772
U. Texas of the Permian Basin	525	1,417	1,232	1,707	1,146	1,532	1,725	1,561	1,152	668	ne	2,105	3,504	3,577	2,769
Lewis and Clark C.	526	2,753	2,778	2,246	3,628	4,713	3,873	3,267	3,438	2,811	2,750	3,350	2,281	2,566	2,686
Tougaloo C.	527	2,978	2,753	2,613	2,639	2,285	2,689	2,473	3,030	3,173	3,380	2,102	2,092	i 2,336	i 2,663
Morehead State U.	528	2,145	2,018	2,174	2,631	1,892	1,838	2,399	2,860	2,434	2,028	1,883	1,754	2,880	2,658
C. New Jersey	529	850	486	ne	ne	ne	ne	ne	1,078	949	ne	1,464	1,912	3,464	2,641
SUNY, Buffalo State U.	530	1,935	2,539	2,970	2,106	1,996	2,366	2,221	1,887	1,928	2,124	2,253	1,962	2,172	2,636
Bowie State U.	531	ne	1,910	1,739	1,422	1,761	1,497	1,927	1,813	1,839	1,911	1,967	1,398	3,351	2,612
Marymount U.	532	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	2,307	1,298	2,601
Vassar C.	533	1,280	1,838	1,258	1,694	1,220	2,854	1,495	1,600	4,185	1,009	1,568	1,606	2,580	2,596
Albany C. of Pharmacy and Health Sciences	534	3,074	3,496	2,639	2,637	3,200	2,533	1,789	2,567	2,732	3,383	3,765	3,687	2,276	2,594
SUNY, Cobleskill	535	1,414	938	ne	908	ne	ne	ne	ne	ne	ne	ne	ne	1,211	2,566
Calvin U.	536	5,010	3,113	3,252	3,466	3,051	2,430	i 1,809	1,456	1,937	1,577	2,107	i 2,637	i 3,169	2,555
Eastern Washington U.	537	3,266	3,910	2,700	2,115	1,867	2,973	3,368	2,000	2,590	2,024	2,282	1,921	2,437	2,546
Lake Superior State U.	538	ne	752	ne	ne	ne	1,170	1,039	1,067	633	ne	ne	ne	2,056	2,545
Elon U.	539	ne	1,523	1,658	2,043	2,184	2,608	2,606	2,407	2,486	2,545	1,968	2,032	1,797	2,544
Western Carolina U.	540	2,376	1,451	1,811	1,028	1,048	1,145	1,305	1,474	1,507	2,633	2,696	2,847	2,783	2,543
Mount Holyoke C.	541	2,788	3,317	3,323	3,118	3,871	3,826	3,403	3,635	3,027	2,979	2,016	2,026	2,112	2,533
Monmouth U.	542	2,195	1,956	904	ne	865	ne	900	ne	ne	1,294	1,729	1,667	1,938	2,517
U. Illinois, Springfield	543	2,096	2,002	2,370	2,276	1,916	2,070	1,683	2,900	2,164	1,876	3,406	2,612	2,881	2,508

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Colorado C.	544	671	1,198	1,248	1,229	1,823	2,247	1,775	2,215	2,560	2,233	2,291	5,467	3,646	2,498
La Sierra U.	545	ne	732	ne	ne	1,057	1,165	1,255	2,202	2,227	1,581	1,647	1,517	2,246	2,496 i
National Defense U.	546	ne	ne	ne	5,865	7,682	5,542	6,447	6,293	4,276	4,231	4,583	3,786	3,920	2,494
New England C. of Optometry	547	1,457	1,751	2,237	2,172	1,234	1,077	980	ne	1,026	1,223	1,150	1,978	1,868	2,491
Franklin W. Olin C. of Engineering	548	ne	1,016	1,777	1,157	1,561	2,136	1,762	1,553	1,254	1,655	1,404	1,627	2,554	2,450
Erikson Institute	549	ne	1,212	2,511	2,001	1,321	2,397	3,117	3,965	3,583	2,279	1,992	1,723	2,068	2,414
Wheaton C., Wheaton	550	ne	1,187	844	ne	1,302	783	ne	1,270	1,751	2,173	1,322	729	ne	2,403
Stockton U.	551	ne	1,455	927	ne	1,374	1,452	807	ne	2,560	2,634	4,236	1,246	1,657	2,386
Skidmore C.	552	2,850	2,113	1,885	1,903	1,811	1,772	1,327	1,859	2,584	3,012	2,412	2,335	1,734	2,384
Hobart and William Smith Colleges	553	1,434	1,566	1,516	2,238	1,221	946	ne	952	ne	1,919	2,114	1,941	3,228	2,373
Virginia Military Institute	554	849	374	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,746	2,350
Benedict C.	555	1,533	3,009	2,754	2,664	2,479	1,373	1,653	1,676	1,934	1,269	649	ne	ne	2,307
California State U., Stanislaus	556	ne	1,487	1,881	1,342	1,136	1,080	1,248	1,365	1,394	1,477	1,843	2,085	1,966	2,305
Dillard U.	557	8,425	7,936 i	7,448	7,741	6,939	9,387	9,566	7,095	6,573	2,772	2,523	2,528	2,270	2,296
U. of St. Thomas (MN)	558	1,330	1,316	1,030	1,424	916	ne	1,266	1,241	1,645	1,870	2,679	5,146	2,476	2,280
Furman U.	559	2,311	2,184	2,049	2,199	1,600	1,928	1,869	2,051	2,064	1,628	2,101	2,431	2,650	2,267
Northeastern Illinois U.	560	711	533	ne	ne	703	ne	ne	1,403	2,442	2,478	2,018	1,913	2,224	2,262
Black Hills State U.	561	2,883	1,643	2,466	3,061	2,380	2,430	2,833	2,109	1,571	2,031	1,499	1,280	1,987	2,260
Florida Polytechnic U.	561	na	na	na	na	na	212	ne	ne	ne	2,006	1,091	1,269	1,725	2,260
U. South Carolina, Aiken	563	337	750	ne	1,309	1,133	1,154	1,445	2,961	2,602	2,481	2,590	2,042	2,595	2,250
U. of the Incarnate Word	564	ne	667	ne	ne	ne	848	ne	ne	1,338	1,800	1,469	1,982	2,064	2,245
C. Wooster	565	988	1,225	966	ne	1,321	1,245 i	ne	1,644	1,494	1,758	1,076	1,396 i	1,717	2,209
U. Louisiana, Monroe	566	2,884	2,812	2,469	2,781	2,267	1,672	2,441	2,297	2,123	2,364	2,362	2,198	3,128	2,203
U. Wisconsin-Eau Claire	567	1,950	1,406	1,362	1,235	915	ne	1,238	1,641	1,227	1,530	1,318	1,852	1,628	2,191
U. Ana G. Mendez, Gurabo	568	6,620	7,098	6,953	6,916	2,694	2,473	2,518	1,777	1,579	3,945	2,049	1,574	1,419	2,132
U. Houston-Clear Lake	569	1,279	1,746	1,769	1,542	1,716	1,535	1,578	1,779	1,251	1,370	1,363	1,716	1,800	2,127
Bates C.	570	1,590	1,897	2,070	2,514	1,584	2,791	1,781	1,853	1,635	2,135	2,303	2,620	2,468	2,118
U. Wisconsin-Oshkosh	571	1,556	2,384	2,331	2,167	1,935 i	1,703 i	ne	1,507 i	1,544 i	1,581 i	1,618 i	1,656	1,990	2,087
U. Puerto Rico, Humacao	572	1,971 i	1,976	1,949	1,455	1,145	784	ne	ne	1,168	1,195	1,456	1,321	1,448	2,074
Northwestern State U. Louisiana	573	1,464	1,189	1,102	1,022	792	ne	1,628	1,373	1,623	2,058	1,940	1,663	1,848	2,057 i
Utah Valley U.	574	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,895	2,015

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Lafayette C.	575	2,089	2,426	1,864	1,947	1,915	1,693	1,553	1,831	1,815	1,554	1,390	1,015	2,059	1,991
U. of the Pacific	576	6,120	4,704	5,291	4,563	4,088	2,734	3,013	2,155	3,014	3,078	1,713	1,371	1,835	1,972
U. Houston-Downtown	577	1,013	1,351	2,267	1,444	2,414	2,459	1,784	2,397	2,508	2,216	2,299	1,828	1,485	1,967
SUNY, Geneseo	578	1,373	2,677	2,132	1,201	1,084	1,314	1,750	1,758	1,939	2,139	1,642	2,070	2,091	1,958
Babson C.	579	ne	696	ne	ne	ne	ne	2,108	1,849	1,917	1,845	2,352	1,286	1,825	1,957
Lipscomb U.	580	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	307	321	ne	1,946
Macalester C.	581	4,389	4,653	1,721	1,457	1,455	1,286	1,562	1,916	1,404	1,808	1,755	1,280	1,691	1,935
Albany State U.	582	740	1,416	2,225	1,658	1,549	1,356	1,496	1,393	1,301	1,491	1,060	880	ne	1,932
Ferris State U.	583	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,915
Liberty U.	584	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,780	1,894	937	ne	1,900
Union C., Schenectady	585	1,984	1,615	1,516	2,402	1,924	1,560	2,150	1,189	1,540	1,740	1,062	1,396	1,479	1,881
SUNY, C. Brockport	586	831	1,248	1,487	1,321	1,192	1,367	1,335	1,289	1,293	1,390	1,719	1,114	1,500	1,877
Northern Michigan U.	587	910	841	ne	ne	ne	ne	1,118	1,339	1,728	1,520	1,523	1,364	1,888	1,871
Alaska Pacific U.	588	434	518	ne	ne	ne	1,246	1,358	1,248	1,544	1,774	1,261	1,036	1,607	1,823
U. Alaska, Southeast	589	1,759	1,274	1,382	1,559	1,512	1,588	1,808	1,621	1,641	1,341	1,264	1,176	1,570	1,822
Marshall B. Ketchum U.	590	ne	ne	ne	ne	1,030	1,468	1,491	1,512	1,451	1,430	1,357	1,351	1,559	1,777
Nevada State C.	591	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,191	1,744
Palmer C. of Chiropractic, Davenport	592	4,693	4,861	4,507	3,774	2,736	1,698	1,510	1,836	1,600	1,650	1,900	2,233	2,050	1,725
Drake U.	593	1,033	966	ne	918	ne	ne	1,558	1,215	1,103	865	ne	1,488	1,691	1,724
St. Olaf C.	593	1,574	1,130	1,518	1,242	1,353	1,346	1,605	1,539	1,155	1,010	1,032	816	ne	1,724
SUNY, C. Plattsburgh	595	1,664	1,098	913	ne	1,008	1,135	1,020	1,003	1,604	1,729	1,452	1,280	1,043	1,722
CUNY, York C.	596	ne	2,180	1,544	999	ne	716	ne	ne	ne	1,621	1,691	1,133	1,912	1,711
Savannah State U.	597	1,874	2,700	1,996	2,613	2,210	1,801	2,267	1,407	1,793	1,720	1,804	1,804	1,888	1,706
U. North Georgia	598	ne	ne	ne	ne	ne	ne	ne	2,064	2,465	2,068	1,905	1,415	1,734	1,643
Elizabeth City State U.	599	5,576	10,455	4,455	4,515	2,988	2,277	1,889	1,340	978	ne	1,473	1,717	1,934	1,641
Lincoln Memorial U.	599	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,641
Norwich U.	601	ne	1,583	1,498	1,825	1,857	1,985	1,249	878	ne	ne	ne	ne	ne	1,637
Colorado State U., Pueblo	602	413	364	ne	ne	ne	ne	ne	ne	ne	3,107	3,104	2,990	3,117	1,624
U. Puget Sound	603	461	530	ne	ne	ne	ne	ne	902	ne	ne	895	ne	1,051	1,613
Johnson C. Smith U.	604	ne	ne	ne	ne	ne	ne	2,094	2,255	2,468	2,148	2,472	2,578	2,685	1,602
SUNY, Oswego	605	783	977	ne	725	ne	ne	ne	1,658	1,982	1,781	1,534	1,003	1,209	1,595
Indiana U., South Bend	606	1,070	1,099	1,219	1,410	1,565	1,619	1,474	1,039	958	ne	ne	898	ne	1,593
Texas A&M U.-San Antonio	606	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,242	1,593
Bentley U.	608	ne	ne	ne	ne	ne	ne	ne	562	ne	ne	ne	ne	1,161	1,589

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Whitman C.	609	1,415	1,142	849	ne	ne	ne	ne	ne	ne	1,083	865	ne	1,270	1,568
Merrimack C.	610	ne	ne	ne	ne	ne	ne	ne	ne	796	ne	503	ne	ne	1,560
Pratt Institute	611	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	2,547	2,325	1,558
Willamette U.	612	2,059	1,940	2,652	1,960	1,698	2,007	2,459	3,147	2,723	1,953	1,546	1,817	2,183	1,542
U. Hartford	613	1,137	2,419	2,007	1,807	1,606	1,701	1,803	1,801	1,073	1,528	1,436	1,252	1,090	1,533
U. Puerto Rico, Cayey	614	927	1,474	1,916	1,726	1,795	1,521	1,415	1,109	1,359	1,870	1,974	1,881	1,390	1,519
Hartford International U. for Religion and Peace	615	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,485
Fairfield U.	616	9,294	9,892	9,331 i	8,769	9,155	5,750	6,174	8,749	1,742	1,279	1,210	849	ne	1,484
U. Wisconsin-Platteville	617	681	715 i	ne	ne	1,000 i	970 i	ne	1,068 i	ne	1,084 i	1,104 i	1,144 i	1,349 i	1,481 i
Saint John's U.	618	640	891	ne	1,444	1,623	1,372	1,459	1,267	1,208	1,191 i	1,130 i	1,125 i	1,298 i	1,479 i
U. South Carolina, Beaufort	619	462	882	ne	ne	ne	892	ne	ne	ne	ne	ne	ne	ne	1,466
Biola U.	620	ne	ne	ne	ne	ne	ne	2,418 i	2,499 i	2,622 i	2,792 i	2,868 i	3,003 i	3,260	1,461
West Virginia School of Osteopathic Medicine	621	594	528	ne	ne	ne	ne	ne	ne	ne	ne	1,311	1,255	1,329	1,459 i
Eastern Connecticut State U.	622	ne	216	ne	ne	1,459	1,149	1,209	1,228	1,100	1,659	1,799	1,646	1,734	1,449
Eastern Kentucky U.	623	3,531	3,782	3,404	2,845	2,221	1,681	1,486	1,248	1,142	1,125	1,010	986	ne	1,446
Northland C.	624	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,096 i	1,265 i	1,442 i
Connecticut C.	625	1,532	1,801	1,740	1,842	1,966	1,900	1,972	1,875	1,349	1,894	1,598	1,244	1,875	1,440
Robert Morris U.	626	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,277 i	1,419
Claflin U.	627	3,252	5,439	5,255	2,661	1,818	1,255	1,772	1,360	1,509	1,746	1,910	1,015	1,179	1,418
Oberlin C.	628	1,985	1,710	1,856	1,670	1,819	1,932	1,305	1,887	1,803	2,076	1,182	776	ne	1,408
C. of Saint Benedict	629	ne	867	ne	1,347	1,451	1,179	1,305	1,122	1,142	1,126 i	1,069 i	1,064 i	1,228 i	1,400 i
Butler U.	630	ne	610	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,691	1,396
United Tribes Technical C.	631	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,387
U. Hawaii, Maui C.	632	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	967	ne	1,376
Kenyon C.	633	428	433	ne	ne	ne	ne	ne	ne	1,227	1,092	908	ne	1,330	1,371
National U. of Natural Medicine	634	ne	791	ne	ne	ne	ne	ne	921	ne	1,245	1,428	850	ne	1,336
St. Edward's U.	635	ne	7,160	5,906	8,040	3,975	9,515	9,325	10,149	10,431	9,650	9,619	9,527	3,393	1,334
Indiana State U.	636	1,541	1,980	1,857	1,238	1,436	1,541	1,763	1,284	1,323	1,682	1,471	1,042	1,354	1,327
Arcadia U.	637	1,649	1,888	956	ne	ne	ne	ne	ne	ne	ne	ne	889	ne	1,321
Radford U.	638	680	784	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,315
Andrews U.	639	1,195	854	ne	ne	ne	ne	ne	ne	ne	1,126	1,033	802	ne	1,255

TABLE 21

Higher education R&D expenditures, ranked by FY 2023 R&D expenditures: FYs 2010–23

(Dollars in thousands)

Institution	Rank	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023
Heidelberg U.	640	ne	1,219 i	ne	1,129	1,539	1,109	1,286	1,621	1,280	1,237	1,125	1,725	1,184	1,254
Manhattan C.	641	498	638	ne	ne	ne	ne	ne	ne	ne	1,190	1,307	1,864	1,641	1,250
U. Virginia's C. Wise	642	481	336	ne	ne	ne	ne	ne	ne	ne	ne	ne	3,310	2,628	1,223
Pennsylvania State U., Altoona	643	671	773	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,215
U. Scranton	644	240	221	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,169
Ursinus C.	645	540	594	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,150
U. of Mary Washington	646	ne	1,374	907	ne	ne	690	ne	ne	1,242	1,315	1,393	1,123	1,229	1,115
Western New England U.	646	ne	1,111	483	ne	ne	ne	1,291	610	ne	ne	ne	ne	2,052	1,115
Gettysburg C.	648	814	669	ne	ne	ne	ne	ne	1,318	1,539	1,664	913	ne	ne	1,099
New C. Florida	649	660	1,046	945	ne	897	ne	ne	998	ne	ne	ne	ne	ne	1,080
Southern U., New Orleans	650	402	706	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	1,004
Gustavus Adolphus C.	651	310	330	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	969
Central Connecticut State U.	652	776	1,451	1,506	1,574	1,185	1,259	1,322	995	ne	1,381	1,572	1,314	1,035	934
Canisius U.	653	221	205	ne	ne	ne	ne	ne	1,546	1,069	950	ne	1,036	1,160	905
Ithaca C.	654	1,077	1,025	1,132	1,245	1,248	972	ne	ne	ne	ne	1,199	1,030	1,000	861
Rhode Island C.	655	ne	8,027	10,389	10,385	8,938	10,080	9,943	9,030	9,287	9,480	10,094	10,990	11,127	839
Framingham State U.	656	ne	ne	ne	ne	ne	ne	ne	1,901	164	ne	2,317	1,790 i	1,263 i	735
U.S. Coast Guard Academy	657	680	490	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	689
U. Puerto Rico, Ponce	658	ne	160	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	659
Lincoln U.	659	1,425	1,336	1,622	965	ne	ne	ne	ne	645	ne	ne	ne	ne	628
Bryant U.	660	ne	316	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	558
William Paterson U.	661	1,051	1,452	ne	ne	ne	ne	1,919	3,012	9,456	10,122	9,603	7,867	7,574	533
Grambling State U.	662	993	2,135	2,179	1,695	1,469	1,863	1,570	5,911	2,981	2,836	2,427	2,124	1,287 i	449
Albion C.	663	ne	799	ne	ne	ne	ne	ne	1,074	1,055	1,040	1,132	847 i	562 i	276
St. Mary's C. Maryland	664	342	427	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	ne	205
All other surveyed institutions	-	2,221,768	2,667,289	2,667,570	2,584,683	1,937,973	1,950,750	2,001,304	2,099,138	2,201,078	1,228,601	1,179,501	596,881	580,130	0

i = imputed. na = not applicable; institution did not exist or did not exist as a separate entity. ne = not eligible; institution did not meet the criteria for inclusion.

^a Johns Hopkins University includes the Applied Physics Laboratory, with \$2,333,049 thousand in total R&D expenditures in FY 2023.^b The University of Maryland includes expenditures from the University of Maryland, Baltimore and University of Maryland, College Park campuses. In FY 2019, the two campuses began reporting as one research unit to reflect their new strategic partnership. This relationship was codified through the University of Maryland Strategic Partnership Act passed by the Maryland General Assembly in 2016. Prior to FY 2019, both campuses reported to the survey as separate institutions.^c The University of Colorado Denver and University of Colorado Anschutz Medical Center report to the survey separately. Prior to FY 2021, expenditures were reported together under University of Colorado Denver and Anschutz Medical Campus.

^d The University of Nebraska, Lincoln and Medical Center includes expenditures from the University of Nebraska, Lincoln; University of Nebraska, Medical Center; and University of Nebraska, Central Administration campuses. Due to a realignment within the University of Nebraska system that occurred on 22 June 2023, the three campuses fall under the leadership of one president. Prior to FY 2023, these three campuses reported to the survey as separate institutions.

^e The University of South Florida includes expenditures from the University of South Florida, Tampa; University of South Florida, Saint Petersburg; and University of South Florida, Sarasota-Manatee campuses. Due to the consolidation of the three campuses that occurred on 1 July 2020, University of South Florida, Saint Petersburg and University of South Florida, Sarasota-Manatee began reporting with the University of South Florida, Tampa as the University of South Florida. Prior to FY 2021, all three campuses reported to the survey as separate institutions.

^f The University of Tennessee, Knoxville includes expenditures from the University of Tennessee Institute of Agriculture. Due to a reorganization within the University of Tennessee system, the Institute of Agriculture now falls under the leadership of the University of Tennessee, Knoxville chancellor. Prior to FY 2020, the University of Tennessee, Knoxville, Institute of Agriculture reported to the survey separately.

^g Touro University, New York includes the Lovelace Biomedical Research Institute. In FY 2023, the Lovelace Biomedical Research Institute joined the Touro University System.

Note(s):

Tied institutions are ranked alphabetically. Ranked institutions are geographically separate campuses headed by a campus-level president or chancellor. Some campuses are part of large, multi-campus universities; some are part of state university systems. For a complete list of campuses that belong to a larger university or system and their aggregate R&D expenditures, see table 6.

Source(s):

National Center for Science and Engineering Statistics, Higher Education Research and Development Survey.