

THE POTENTIAL IMPACT OF PROPOSED FY2018 BUDGET CUTS AND THE NIH'S ROLE IN SUSTAINING THE U.S. ECONOMY

Research funded by the National Institutes of Health (NIH) saves lives, improves health, and offers hope to people affected by disease. Research funded by the NIH also has a significant economic impact in communities across the country, supporting nearly 380,000 jobs and \$65 billion in economic activity in 2016 alone.

This is why the \$5.8 billion cut to the NIH budget contained in the Administration's proposed fiscal year 2018 budget is so alarming. While it is impossible to know what life-changing discoveries won't be made or which cures will be delayed by such a drastic reduction in research funds, it is possible to project the potential economic impact that could result. Using the economic impact data United for Medical Research (UMR) generated for fiscal year 2016 as a baseline, UMR assessed the impact the proposed \$5.8 billion cut could have on jobs and economic activity. **Compared to 2016, there could be a loss of nearly 90,000 jobs and just over \$15 billion in economic activity.**

Congress approved a \$2 billion boost to the NIH budget for FY16 — the first substantial increase in more than 10 years. This made a difference in grants, jobs, and economic activity. The cut to the NIH budget for FY18 proposed by the Administration would have a significant negative impact on NIH research and the jobs and economic activity it supports, more than wiping out the gains seen in 2016.

	FY2015	FY2016	Gain FY15 to FY16	FY2018 Projected	Projected Loss FY16 to FY18
Total NIH research funds awarded in 50 states + DC	\$22.8 billion	\$24.6 billion	\$1.8 billion	\$18.8 billion	-\$5.8 billion
Total jobs supported nationwide	352,349 jobs	379,471 jobs	27,122 jobs	289,991 jobs	-89,479 jobs
Total economic activity nationwide	\$60.717 billion	\$64.799 billion	\$4.082 billion	\$49,519 billion	-\$15.3 billion

The vast majority of the NIH budget goes toward extramural research, supporting the work of scientists in all 50 states and the District of Columbia. These researchers are working on some of our most urgent and chronic health problems. Their work also has a significant impact on economic growth and employment.

NIH research funding directly and indirectly supported 379,471 jobs nationwide in 2016. Moreover, the income generated by these jobs, as well as by the purchase of research-related equipment, services and materials, when cycled through the economy, produced \$64.799 billion in new economic activity in 2016. **A \$5.8 billion cut to research funding in 2018 applied proportionally based on the amount of funding received in each state in 2016 could result in a loss of 1,000 or more jobs in each of 23 states and a total economic loss to states of \$15.280 billion.**

STATES LOSING 1,000 OR MORE JOBS DUE TO NIH BUDGET REDUCTIONS

California 13,581	Washington 3,144	Wisconsin 1,603
Massachusetts 7,314	Florida 2,864	Colorado 1,531
New York 6,491	Ohio 2,857	Connecticut 1,407
Texas 5,528	Michigan 2,551	Virginia 1,272
Pennsylvania 5,129	Georgia 2,525	New Jersey 1,119
Maryland 4,473	Tennessee 1,873	Oregon 1,104
North Carolina 4,426	Minnesota 1,851	Alabama 1,086
Illinois 3,383	Missouri 1,694	

A note about this data: Since 2011, United for Medical Research has provided an analysis of the employment and economic activity attributable to NIH extramural research spending. We rely on the RIMS II model maintained by the Bureau of Economic Analysis, which is part of the U.S. Department of Commerce. This model was last updated by BEA in November 2015. The FY16 analysis and this FY18 projection, along with each of the previous analyses, were conducted by Dr. Everett Ehrlich of ESC Company. The reports are available at: www.unitedformedicalresearch.com/advocacy-reports/

United for Medical Research

The Potential Impact of Proposed FY2018 Budget Cuts on NIH Research Activity by State

State	FY2016 NIH Awards Disbursed (\$M)	Estimated FY2018 NIH Awards Reduction (\$M)	FY2016 Total Employment	Estimated FY2018 Net Jobs	Estimated FY2018 Jobs Lost	FY2016 Economic Activity (\$M)	Estimated FY2018 Net Economic Activity	Estimated FY2018 Lost Economic Activity (\$M)
Alabama	295.0	69.6	4,604	3,518	1,085.6	706.6	540.0	166.6
Alaska	14.6	3.4	389	297	91.8	58.2	44.5	13.7
Arizona	163.4	38.5	3,626	2,771	855.1	534.3	408.3	126.0
Arkansas	96.7	22.8	1,759	1,344	414.7	244.8	187.1	57.7
California	3,686.0	869.2	57,597	44,016	13,581.4	10,235.5	7,822.0	2,413.5
Colorado	350.0	82.5	6,492	4,961	1,530.9	1,029.6	786.8	242.8
Connecticut	510.6	120.4	5,968	4,561	1,407.3	1,185.1	905.6	279.4
Delaware	45.4	10.7	522	399	123.1	122.3	93.5	28.8
District of Columbia	214.2	50.5	657	502	154.9	395.1	301.9	93.2
Florida	531.7	125.4	12,147	9,282	2,864.2	1,698.1	1,297.7	400.4
Georgia	520.6	122.8	10,708	8,183	2,524.9	1,521.7	1,162.8	358.8
Hawaii	54.4	12.8	1,044	798	246.2	153.6	117.4	36.2
Idaho	14.1	3.3	413	316	97.5	64.2	49.0	15.1
Illinois	818.0	192.9	14,348	10,965	3,383.3	2,468.3	1,886.3	582.0
Indiana	225.1	53.1	4,151	3,172	978.8	644.7	492.7	152.0
Iowa	170.1	40.1	2,765	2,113	652.0	403.5	308.3	95.1
Kansas	91.3	21.5	1,611	1,231	379.8	264.4	202.1	62.4
Kentucky	163.6	38.6	2,886	2,205	680.4	431.6	329.8	101.8
Louisiana	141.8	33.4	2,987	2,283	704.3	419.8	320.8	99.0
Maine	75.6	17.8	1,308	999	308.3	176.7	135.0	41.7
Maryland	1,465.6	345.6	18,970	14,497	4,473.1	3,407.5	2,604.0	803.5
Massachusetts	2,572.5	606.6	31,019	23,705	7,314.4	6,011.2	4,593.7	1,417.4
Michigan	669.6	157.9	10,817	8,266	2,550.6	1,735.6	1,326.3	409.2
Minnesota	520.2	122.7	7,849	5,998	1,850.7	1,358.3	1,038.0	320.3
Mississippi	53.5	12.6	1,121	857	264.3	157.8	120.6	37.2
Missouri	509.0	120.0	7,182	5,488	1,693.5	1,238.9	946.7	292.1
Montana	37.3	8.8	706	540	166.5	92.3	70.5	21.8
Nebraska	107.0	25.2	1,871	1,430	441.1	265.3	202.8	62.6
Nevada	31.3	7.4	875	669	206.4	140.7	107.5	33.2
New Hampshire	98.9	23.3	1,301	995	306.9	238.7	182.4	56.3
New Jersey	240.1	56.6	4,745	3,626	1,118.8	890.7	680.7	210.0
New Mexico	99.7	23.5	1,531	1,170	361.0	239.0	182.6	56.4
New York	2,205.9	520.2	27,526	21,035	6,490.5	5,477.0	4,185.5	1,291.5
North Carolina	1,154.3	272.2	18,771	14,345	4,426.2	2,870.0	2,193.2	676.7
North Dakota	22.5	5.3	447	341	105.4	70.0	53.5	16.5
Ohio	734.2	173.1	12,116	9,259	2,856.9	1,979.3	1,512.6	466.7
Oklahoma	90.7	21.4	2,097	1,602	494.4	288.6	220.6	68.1
Oregon	274.6	64.8	4,684	3,580	1,104.5	689.5	526.9	162.6
Pennsylvania	1,570.2	370.2	21,751	16,622	5,129.0	3,974.4	3,037	937.2
Rhode Island	150.8	35.6	1,881	1,437	443.5	312.6	238.9	73.7
South Carolina	179.1	42.2	3,547	2,711	836.4	490.5	374.8	115.7
South Dakota	21.6	5.1	452	346	106.6	63.0	48.1	14.8
Tennessee	512.4	120.8	7,941	6,069	1,872.6	1,306.2	998.2	308.0
Texas	1,097.7	258.8	23,442	17,915	5,527.7	3,679.5	2,811.9	867.6
Utah	185.1	43.7	3,727	2,848	878.8	508.9	388.9	120.0
Vermont	48.8	11.5	752	575	177.4	107.0	81.7	25.2
Virginia	349.5	82.4	5,395	4,123	1,272.1	1,024.9	783.2	241.7
Washington	952.8	224.7	13,331	10,188	3,143.6	2,300.9	1,758.4	542.6
West Virginia	24.0	5.7	578	442	136.2	86.5	66.1	20.4
Wisconsin	421.8	99.5	6,797	5,194	1,602.6	996.2	761.3	234.9
Wyoming	9.5	2.2	267	204	63.0	39.7	30.3	9.4
50 states plus DC	24,592.6	5,798.9	379,471	289,991.5	89,479	64,799	49,519.1	15,280

\$5.8 Billion Fewer Awards

89,500 Jobs Lost

\$15.3 Billion Less Economic Activity

United for Medical Research is a coalition of leading research institutions, patient and health advocates, and private industry that have joined together to seek steady increases in funding for the National Institutes of Health. UMR members include: AdvaMed, Alzheimer's Association, American Association for the Advancement of Science, American Cancer Society Cancer Action Network, American Heart Association, Association of American Universities, Association of Public and Land-grant Universities, BD, Biotechnology Industry Organization, Boston University, Corning, FasterCures, Harvard University, Johns Hopkins University, Massachusetts Institute of Technology, Northwestern University, Pancreatic Cancer Action Network, PhRMA, Research!America, Stanford University, Thermo Fisher Scientific, University of Pennsylvania, Vanderbilt University & Vanderbilt University Medical Center, and Washington University in St. Louis.

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