

National Institutes of Health

Summary of the FY 2011 President's Budget



February 1, 2010

NIH Budget at a Glance

The FY 2011 budget request for the National Institutes of Health reflects President Obama's firm commitment to America's leadership in biomedical research. The increased investment in research and technology is a clear acknowledgment of the potential for science to address some of the major issues that face our Nation and the world.

National Institutes of Health (dollars in millions)

	FY 2009 Omnibus	FY 2009 Recovery Act	FY 2010 Enacted	FY 2011 Estimate	Change from FY 2010 Enacted
Labor/HHS Discretionary Budget Authority (B.A.)	\$30,318	\$10,381	\$31,010	\$32,007	\$997
Interior B.A.	\$78	\$19	\$79	\$82	\$3
Total Discretionary B.A.	\$30,396	\$10,400	\$31,089	\$32,089	\$1,000
Type I Diabetes Initiative	\$150	\$0	\$150	\$150	\$0
Total B. A.	\$30,546	\$10,400	\$31,239	\$32,239	\$1,000
NIH Program Level 1/	\$30,554	\$10,400	\$31,247	\$32,247	\$1,000
<i>Number of Competing RPGs</i>	9,111	7,741	9,251	9,052	-199
<i>Total Number of RPGs</i>	37,068	13,226	36,806	37,001	195
<i>FTEs</i>	17,922	N/A	17,886	18,784	+898

1/ Includes NLM Program Evaluation of \$8.2 million each year.

The FY 2011 discretionary Budget Authority (BA) request for the National Institutes of Health (NIH) is \$32,239 million, an increase of \$1.0 billion, or 3.2 percent above the FY 2010 level. Of this amount, \$32,157 million is requested through the Labor/HHS/Education appropriation bill, and \$82 million for Superfund Research activities through the Interior bill. These FY 2011 funds will enable the nationwide biomedical research community to pursue a number of substantial opportunities for major scientific and health advances.

Scientific Opportunities

The \$1 billion increase in NIH funds will support scientific opportunities in several emerging areas. Innovative high throughput technologies, including DNA sequencing, imaging, and computational biology, represent areas of exceptional promise. The success of the Human Genome Project and several other subsequent major projects provides a powerful foundation for a new level of understanding of human biology, and has opened a new window into the causes of disease. That includes the revelation of hundreds of previously unknown risk factors for cancer, autism, diabetes, heart disease, hypertension, and a long list of other common illnesses that have previously been unapproachable. In the area of cancer, a new ability to achieve comprehensive understanding of the mechanisms responsible for malignancy has already provided insights into diagnostics, and pointed to a whole new array of drug targets. New stem cell research projects

are underway, encouraged by the President's Executive Order on stem cell research, and hold out great promise for applications to diseases like Parkinson's disease, type 1 diabetes, and spinal cord injury. New partnerships between academia and industry promise to revitalize the flagging drug development pipeline. An era of personalized medicine is appearing, where prevention, diagnosis, and treatment of disease can be individualized, instead of using the one-size-fits-all approach that all too often falls short, wasting health care resources and potentially subjecting patients to unnecessary and dangerous medical treatments and diagnostic procedures. Global health research faces new and powerful opportunities to develop better diagnostics and therapeutics for both infectious and non-communicable diseases. Vigorous U.S. support of biomedical research in all these areas promises to save lives, reduce the burden of chronic illness, stimulate the economy, empower new and more effective prevention strategies, and reduce health care costs.

Based on scientific opportunity, increases will be targeted to many trans-NIH specific programs, including:

Therapeutics for Rare and Neglected Diseases (TRND) program: NIH plans to provide an additional \$26 million in FY 2011 to expand this program to a total of \$50 million. TRND will bridge the wide gap in time and resources that often exist between basic research and human testing of new drugs and encourage and speed the development of new drugs for rare and neglected diseases. This program is grounded in, and is intended to complement, existing processes for drug development in the pharmaceutical industry.

Clinical and Translational Science Awards (CTSA): The request includes a total investment of \$500 million for CTSA's. These awards were developed and implemented to reduce the time it takes for laboratory discoveries to become treatments for patients, to engage communities in clinical research efforts, and to train a new generation of clinical and translational researchers.

Basic Behavioral and Social Sciences Opportunity Network (OppNet): The FY 2011 funding level of \$20 million expands this initiative, which was launched by NIH in FY 2010 through funds provided by the American Recovery and Reinvestment Act. This trans-NIH initiative furthers our understanding of fundamental mechanisms and patterns of behavioral and social functioning relevant to the Nation's health and well-being, as they interact with each other, with biology, and the environment. Research results will lead to new approaches for reducing risky behaviors and improving health.

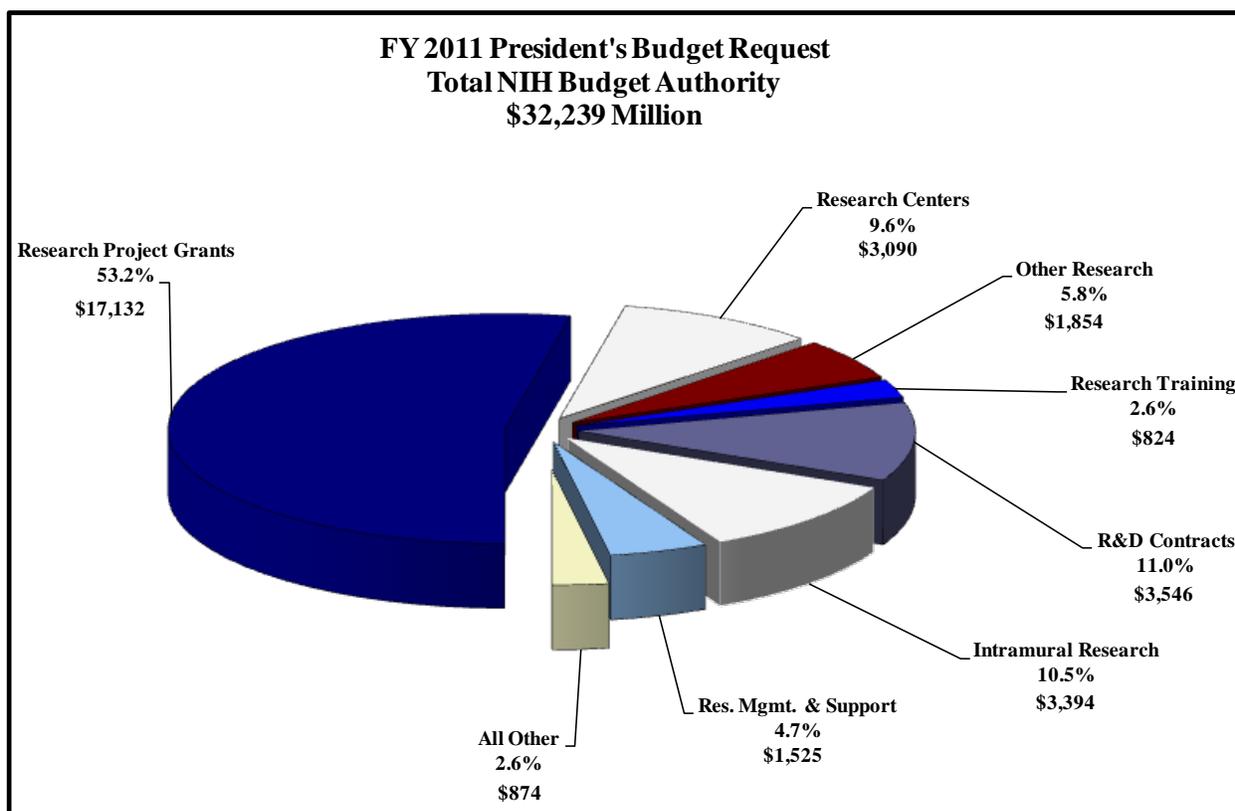
Ruth L. Kirschstein National Research Service Awards: A total of \$824.4 million, which is a 6.0 percent increase over the FY 2010, will be directed to training stipends. This increase sends a clear message to both existing and "would be" scientists that their efforts are valued.

National Nanotechnology Initiative: NIH plans to direct \$382 million, \$22 million or 6.0 percent above the FY 2010 level for NIEHS to continue its efforts in applying technological advancements to a wide array of human health, environmental protection, and safety issues and concerns.

National Synchrotron Light Source-II (NSLS-II): NIH plans to provide \$33 million in FY 2011 to the Department of Energy's construction of a high performance synchrotron light source. In FY 2010 the National Center on Research Resources will contribute \$12 million from their ARRA funds. The FY 2010 and FY 2011 combined investment will be \$45 million for this promising tool for use by the biomedical research community

AIDS Research Program: The FY 2011 request increases the AIDS research program by \$98.7 million or 3.2 percent to \$3,184 million. This program is the largest and most significant effort in AIDS research in the world. In addition, NIH will transfer \$300 million to the Global Fund for HIV/AIDS, Tuberculosis and Malaria.

Cancer and Autism Spectrum Disorders Research: The FY 2011 budget request will continue and reinforce cancer research and investigations into the causes of and treatments for autism spectrum disorders.



Mechanism Discussion

Research project grants (RPGs) are the primary mechanism for funding of investigator-initiated biomedical research; therefore, support for RPGs remains a high priority in the FY 2011 President's Budget. This will enable NIH to maintain support for ongoing research and to support new researchers and new ideas to maintain the vitality of biomedical research.

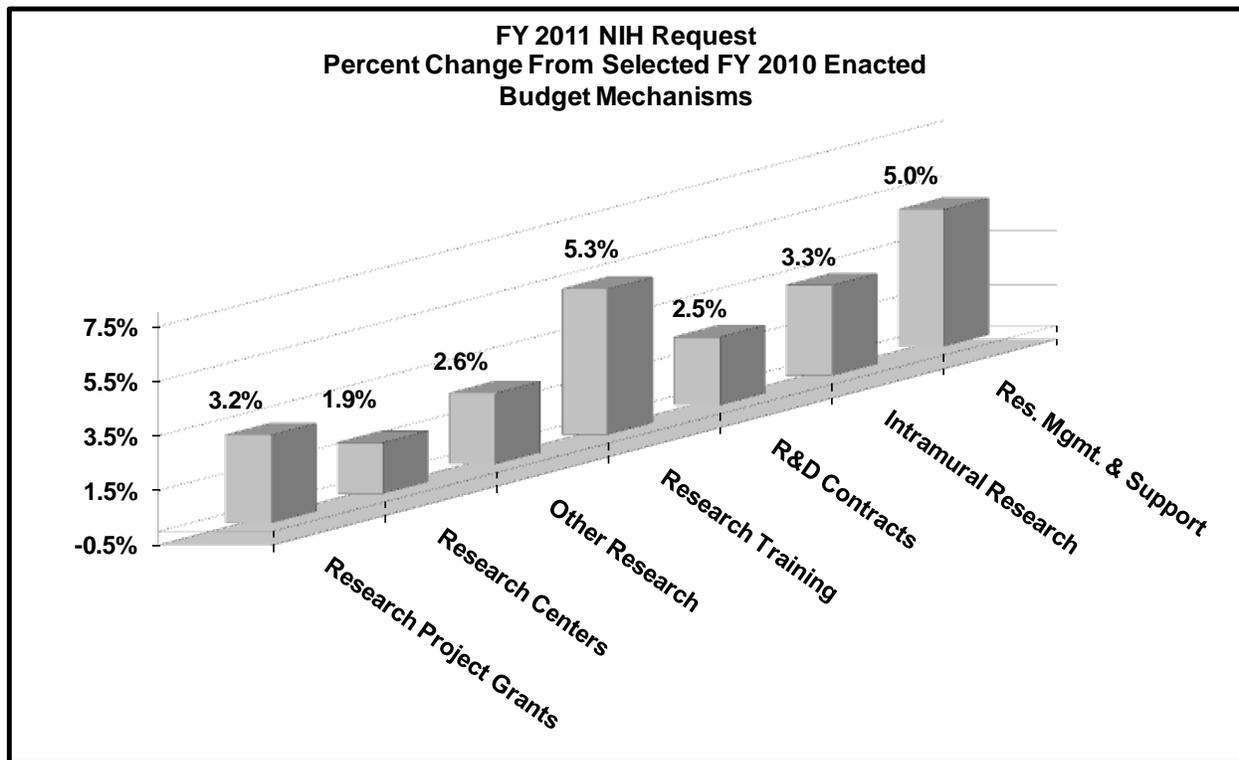
The FY 2011 President's Budget would fund a total of 9,052 competing RPGs, a decrease of 199 RPGs over the estimated FY 2010 level. Competing RPGs total \$4,014 million, a decrease of \$11.5 million or 0.3 percent below FY 2010. Due to the receipt of Recovery Act funds in FY 2009, NIH will temporarily suspend the NIH Director's Bridge Award program in FY 2011.

Inflationary pressure on our research portfolio and scientific purchasing power remains a key concern. For noncompeting continuation awards, the FY 2011 President's Budget provides inflationary increases of 2 percent. The average cost of competing RPGs also increases by 2 percent over the FY 2010 level.

In the FY 2011 President's Budget, NIH proposes to increase support for research centers to \$3,090 million, an increase of \$56.4 million or 1.9 percent increase above the FY 2010 level. This request level will continue to provide program growth for the Clinical and Translational Science Awards (CTSAs).

Support for Other Research increases by \$47 million, or 2.6 percent.

NIH will support 17,164 Full-Time Training Positions (FTTPs), which is 92 FTTPs below the FY 2010 level. The FY 2011 provides training stipend increases of 6.0 percent or \$41.7 million over the FY 2010 level for a total dollar level of \$824.4 million.



R&D contracts increase by \$86.3 million, or 2.5 percent compared to the FY 2010 level, for a total of \$3,546 million. In FY 2011, the Therapeutic Rare and Neglected Diseases Initiative (TRNDI), a trans-NIH program, will increase by \$26 million for a total of \$50 million. The Basic Behavioral and Social Sciences Opportunity Network (OppNet), launched by NIH in FY 2010 through funds provided by the American Recovery and Reinvestment Act, will receive \$20 million in FY 2011; these funds will be provided through a co-funding of 50/50 percent across all the ICs and the Office of the Director. NIH's contribution to the Department of Energy's construction of the National Synchrotron Light Source II will be \$33 million in FY 2011, which combined with the \$12 million provided by NCR from its ARRA funds, is a total of \$45

million for this project. NIH will continue to provide \$300 million for the Global Fund for HIV/AIDS, Tuberculosis and Malaria. The FY 2011 budget increases the share of funds to be provided in the Department set-aside for Program Evaluation endeavors from 2.5 percent in FY 2010 to 2.86 percent in FY 2011.

Support for the NIH intramural research program increases by 3.2 percent above the FY 2010 level, for a total of \$3,394 million. This increase maintains the intramural program at approximately 10 percent of NIH's overall budget.

For FY 2011, RMS would be funded at \$1,525 billion, an increase of \$72.6 million and 5.0 percent above the FY 2010 level. The complexity of science requires more high-level, hands-on, and state-of-the-art skilled managers of scientific portfolios. This increase will provide NIH with sufficient capacity to manage its research portfolios, and to improve stewardship of all funds. In addition, it will enable NIH to expand information technology infrastructure in support of scientific staff, support services for a prevention programs, and education initiatives.

The OD increases by \$43.5 million or 3.7 percent. The FY 2011 request does not include funds for the NIH Director's Bridge Award program, as Recovery Act funds enabled NIH to support additional awards just missing the nominal payline. The NIH Common Fund increases by \$17.5 million. A total of \$194 million is provided for the National Children's Study. Funds in the amount of \$10 million are included in the Office of Behavioral and Social Sciences Research to provide the OD's 50 percent of funding support for the Basic Behavioral and Social Sciences Opportunity Network (OppNet).

The FY 2011 budget request for Buildings and Facilities is \$125.581 million, an increase of \$25.581 million or 25.6 percent over the FY 2010 enacted level. This request provides funds for specific projects in two program areas: Essential Safety and Regulatory Compliance and Repairs and Improvements. These programs and projects will help the NIH to fulfill its continuing commitment to sustain its facilities and improve the overall Condition Index.

NATIONAL INSTITUTES OF HEALTH
FY 2011 President's Budget Request
(\$000s)

Appropriation	FY 2009 Omnibus	FY 2009 Recovery Act 1/	FY 2010 Enacted	FY 2011 President's Budget	2011 PB. +/- 2010 Enacted
NCI	4,967,714	\$1,256,517	5,101,666 2/	5,264,643	\$162,977
NHLBI	3,014,873	762,584	3,095,812	3,187,516	91,704
NIDCR	402,531	101,819	413,076	423,511	10,435
NIDDK 3/	1,910,151	445,393	1,957,364	2,007,589	50,225
NINDS	1,592,851	402,912	1,635,721	1,681,333	45,612
NIAID 4/	4,701,456	1,113,288	4,816,726	4,977,070	160,344
NIGMS	1,997,172	505,188	2,050,972	2,125,090	74,118
NICHD	1,294,519	327,443	1,329,027	1,368,894	39,867
NEI	688,276	174,097	706,765	724,360	17,595
NIEHS	662,667	168,057	689,565	707,339	17,774
NIA	1,080,472	273,303	1,109,800	1,142,337	32,537
NIAMS	524,696	132,726	538,854	555,715	16,861
NIDCD	407,125	102,984	418,657	429,007	10,350
NIMH	1,451,053	366,789	1,489,792	1,540,345	50,553
NIDA	1,032,457	261,156	1,059,446	1,094,078	34,632
NIAAA	450,095	113,851	462,167	474,649	12,482
NINR	141,834	35,877	145,600	150,198	4,598
NHGRI	502,261	127,035	515,876	533,959	18,083
NIBIB	308,108	77,937	316,452	325,925	9,473
NCRR	1,226,000	1,610,088	1,268,519	1,308,741	40,222
NCCAM	125,431	31,728	128,791	132,004	3,213
NCMHD	205,912	52,081	211,506	219,046	7,540
FIC	68,655	17,370	70,007	73,027	3,020
NLM	338,842	83,643	350,607	364,802	14,195
OD	1,247,292	1,336,837	1,177,020	1,220,478	43,458
B&F	125,581	500,000	100,000	125,581	25,581
Type 1 Diabetes 3/	-150,000	0	-150,000	-150,000	0
Subtotal, Labor/HHS	30,318,024	10,380,703	31,009,788	32,007,237	997,449
Interior/Superfund Research Program	78,074	19,297	79,212	81,763	2,551
Total, NIH Discretionary B.A.	30,396,098	10,400,000	31,089,000	32,089,000	1,000,000
Type 1 Diabetes	150,000	0	150,000	150,000	0
Total, NIH Budget Authority	30,546,098	10,400,000	31,239,000	32,239,000	1,000,000
NLM Program Evaluation	8,200	0	8,200	8,200	0
Total, Prog. Level	30,554,298	10,400,000	31,247,200	32,247,200	1,000,000

1/ Funds are appropriated from the American Recovery and Reinvestment Act, 2009 (P.L. 111-5) and are available until September 30, 2010.

2/ Includes \$8,000,000 for facilities repairs and improvements at the NCI Frederick Federally Funded Research and Development Center in Frederick, MD.

3/ Type 1 Diabetes Initiative mandatory funds provided through P.L. 110-173 and P.L. 110-275 in FY 2009 and FY 2010, respectively, are included in NIDDK and subtracted in Type 1 Diabetes to ensure non-duplicative counting.

4/ Includes funds for transfer to the Global Fund for HIV/AIDS, Malaria, and Tuberculosis (FY 2008 - \$294,759,000; FY 2009 - \$300,000,000; and FY 2010 - \$300,000,000).

NATIONAL INSTITUTES OF HEALTH

Budget Mechanism - Total
(Dollars in thousands)

MECHANISM	FY 2009 Actual		FY 2009 Recovery Act Actual		FY 2010 Recovery Act Estimated		FY 2010 Enacted		FY 2011 PB		Change	
	No.	Amount	No.	Amount	No.	Amount	No.	Amount	No.	Amount	No.	Amount
Research Grants:												
Research Projects:												
Noncompeting	26,217	\$11,347,631	0	\$910	4,182	\$1,816,319	25,779	\$11,731,132	26,150	\$12,278,259	371	\$547,127
Administrative supplements	(1,810)	216,894	(3,559)	950,617	(2,917)	399,167	(1,689)	188,293	(1,536)	171,364	(-153)	-16,929
Competing:												
Renewal	2,584	1,313,120	610	275,721	46	18,368	2,940	1,484,747	2,770	1,475,434	(170)	(9,313)
New	6,496	2,576,127	3,308	1,475,880	227	115,705	6,277	2,531,854	6,250	2,530,064	(27)	(1,790)
Supplements	31	6,981	301	148,499	40	17,471	34	8,401	32	8,019	(2)	(382)
Competing	9,111	3,896,228	4,767	2,128,499	367	180,537	9,251	4,025,002	9,052	4,013,517	(199)	-11,485
Subtotal, RPGs	35,328	15,460,753	4,767	3,080,026	4,549	2,396,023	35,030	15,944,427	35,202	16,463,140	172	518,713
SBIR/STTR	1,740	645,587	58	38,241	64	38,560	1,776	653,956	1,799	668,559	23	14,603
Subtotal, RPGs	37,068	16,106,340	4,825	3,544,258	4,613	3,071,060	36,806	16,598,383	37,001	17,131,699	195	533,316
Research Centers:												
Specialized/comprehensive	1,157	2,256,654	183	324,415	162	141,571	1,168	2,263,923	1,197	2,314,845	29	50,922
Clinical research	76	426,138	2	71,932	0	5,664	72	432,404	72	427,860	0	-4,544
Biotechnology	103	144,286	0	28,822	0	1,148	103	150,749	105	155,232	2	4,483
Comparative medicine	47	134,160	0	23,747	0	668	47	127,809	47	131,570	0	3,761
Research Centers in Minority Institutions	23	57,473	0	14,432	0	11,467	23	59,196	23	60,972	0	1,776
Subtotal, Centers	1,406	3,018,711	185	501,225	162	165,271	1,413	3,034,081	1,444	3,090,479	31	56,398
Other Research:												
Research careers	4,166	670,989	36	29,237	15	7,325	4,161	687,847	4,169	700,607	8	12,760
Cancer education	83	31,945	1	1,292	0	0	83	32,438	83	32,762	0	324
Cooperative clinical research	339	404,250	18	33,890	1	2,298	342	410,461	349	421,792	7	11,331
Biomedical research support	122	66,494	90	54,199	432	251,650	123	67,053	123	69,065	0	2,012
Minority biomedical research support	338	106,337	1	14,910	0	1,707	352	106,982	364	110,146	12	3,164
Other	1,644	493,462	75	88,113	376	32,746	1,704	502,291	1,729	519,657	25	17,366
Subtotal, Other Research	6,692	1,773,477	221	232,340	824	295,726	6,765	1,807,072	6,817	1,854,029	52	46,957
Total Research Grants	45,166	20,898,528	5,231	4,277,823	5,599	3,532,057	44,984	21,439,536	45,262	22,076,207	278	636,671
Ruth L. Kirschstein Training Awards:												
Individual awards	3,010	121,653	181	7,724	161	6,841	3,038	123,646	3,086	132,867	48	9,221
Institutional awards	14,280	654,660	303	16,832	14	2,018	14,218	659,108	14,078	691,574	-140	32,466
Total, Training	17,290	776,313	484	24,556	175	8,859	17,256	782,754	17,164	824,441	-92	41,687
Research & development contracts (SBIR/STTR)	2,564	3,387,136	4	385,752	33	329,624	2,607	3,459,304	2,644	3,545,581	37	86,277
Intramural research	(116)	(31,822)	(0)	(0)	(0)	(0)	(105)	(30,492)	(110)	(33,843)	(5)	(3,351)
Intramural research	0	3,230,199	0	10,175	0	62,701	0	3,285,364	0	3,394,123	0	108,759
Research management and support	0	1,425,844	3	153,369	4	115,084	0	1,451,999	0	1,524,615	0	72,616
Extramural Construction	0	0	0	52,108	0	947,892	0	0	0	0	0	0
Office of the Director 1/ (Appropriation)	0	616,503	0	0	0	0	0	632,911	0	658,849	0	25,938
Buildings and Facilities 2/ (Appropriation)	(0)	(1,247,292)	(0)	(0)	(0)	(0)	(0)	(1,177,020)	(0)	(1,220,478)	(0)	(43,458)
NIH Roadmap for Medical Research 3/	0	133,501	0	49,717	0	450,283	0	107,920	0	133,421	0	25,501
Type 1 Diabetes 4/	(0)	(125,581)	(0)	(0)	(0)	(0)	(0)	(100,000)	(0)	(125,581)	(0)	(25,581)
NIH Roadmap for Medical Research 3/	(0)	(541,133)	(0)	(0)	(0)	(0)	(0)	(544,109)	(0)	(561,629)	(0)	(17,520)
Type 1 Diabetes 4/	0	-150,000	0	0	0	0	0	-150,000	0	-150,000	0	0
Subtotal, Labor/HHS Budget Authority	30,318,024	4,953,500	4,953,500	5,446,500	31,089,788	32,007,237	997,449					
Interior Appropriation for Superfund Res.		78,074		0		79,212		81,763		2,551		
Total, NIH Discretionary B.A.	30,396,098	4,953,500	4,953,500	5,446,500	31,089,000	32,089,000	1,000,000					
Type 1 Diabetes 4/		150,000		0		150,000		150,000		0		
Total, NIH Budget Authority	30,546,098	4,953,500	4,953,500	5,446,500	31,239,000	32,239,000	1,000,000					
NLM Program Evaluation		8,200		0		8,200		8,200		0		
Total, Program Level	30,554,298	4,953,500	4,953,500	5,446,500	31,247,200	32,247,200	1,000,000					

1/ Funding for NIH Roadmap for Medical Research and for the NIH Director's Bridge Awards is distributed by mechanism. Roadmap: (funding shown above).

Bridge Awards -- FY 09: 270 awards \$91,250; FY 10: -0-; FY 11 -0-.

2/ Includes the B&F appropriation plus the following included in NCI -- FY 09: \$7,920; FY 10: \$7,920; FY 11 \$7,840.

3/ Included in above mechanisms

4/ Included in NIDDK -- FY 09: \$150,000; FY 10: \$150,000; FY 11: \$150,000.

Numbers of grants identified in FY 2010 and FY 2011 are estimates, and WILL change as applications are received and selected for funding.