



# FY 2014

## The NIH Extramural Loan Repayment Programs Data Book



### FISCAL YEAR 2014 HIGHLIGHTS

October 1, 2013 to September 30, 2014

#### APPLICATION CYCLE:

##### **New and Renewal Awards:**

September 1, 2013 – December 2, 2013



**NIH** National Institutes of Health  
Division of Loan Repayment

## Facilitating the Path to a Biomedical Research Career

The National Institutes of Health (NIH) Extramural Loan Repayment Programs (LRP) help attract and retain early career health professionals by helping them to repay the high educational debt associated with education and training.

Since 1988, the U.S. Congress has created eight loan repayment programs administered by NIH – three for individuals who conduct research as employees of the NIH (Intramural) and five for individuals who conduct research funded by domestic, non-profit institutions or U.S. government organizations (Extramural). Extramural programs are available in five focus areas: Clinical Research, Pediatric Research, Health Disparities Research, Clinical Research for Individuals from Disadvantaged Backgrounds, and Contraception and Infertility Research.

The LRPs repay up to \$35,000 of eligible educational debt per year, and, to be considered for these programs, applicants must commit to performing qualified research for at least two years. They must also possess a doctoral degree or advanced certification; have educational loan debt equal to at least 20 percent of their annual salary; conduct research for an average of at least 20 hours per week; and be a U.S. citizen or permanent resident. Awardees apply for competitive new awards and then may apply for additional one- or two-year competitive renewal awards as long as they continue to meet the eligibility requirements.

## Acronyms

IC = NIH Institutes and Centers

LRP = Loan Repayment Program(s)

New Award = First award

Renewal Awards = Subsequent award(s)

New applicant/application = Applicant/application for a new award (i.e., there may have been prior unsuccessful application attempts for new award)

Renewal applicant/application = Applicant/application for a renewal award (i.e., there may have been prior unsuccessful application attempts for renewal award)

Academic Doctorate = PhD or ScD degree

Physician Doctorate = MD or DO degree

Physician Doctorate + Academia Doctorate = dual MD/PhD degrees

Professional Clinical Doctorate = DDS, DMD, DVM, DPT, ND, OD, PharmD, DrPH, EdD, or PsyD degrees.

## NIH Institutes and Centers\*

### Institutes

National Cancer Institute (NCI)  
National Eye Institute (NEI)  
National Heart, Lung, and Blood Institute (NHLBI)  
National Human Genome Research Institute (NHGRI)  
National Institute on Aging (NIA)  
National Institute on Alcohol Abuse and Alcoholism (NIAAA)  
National Institute of Allergy and Infectious Diseases (NIAID)  
National Institute of Arthritis and Musculoskeletal and Skin Diseases (NIAMS)  
National Institute of Biomedical Imaging and Bioengineering (NIBIB)  
*Eunice Kennedy Shriver* National Institute of Child Health and Human Development (NICHD)  
National Institute on Deafness and Other Communication Disorders (NIDCD)  
National Institute of Dental and Craniofacial Research (NIDCR)  
National Institute of Diabetes and Digestive and Kidney Diseases (NIDDK)  
National Institute on Drug Abuse (NIDA)  
National Institute of Environmental Health Sciences (NIEHS)  
National Institute of General Medical Sciences (NIGMS)  
National Institute of Mental Health (NIMH)  
National Institute on Minority Health and Health Disparities (NIMHD)  
National Institute of Neurological Disorders and Stroke (NINDS)  
National Institute of Nursing Research (NINR)\*\*

### Centers

National Center for Advancing Translational Sciences (NCATS)  
National Center for Complementary and Integrative Health (NCCIH)

\* Participating in the Extramural Loan Repayment Programs

\*\* NINR funds its LRP awardees through NCATS

## The Year in Review

In Fiscal Year (FY) 2014, 2,685 individuals applied to the five Extramural Loan Repayment Programs (LRPs): Clinical Research, Pediatric Research, Health Disparities Research, Clinical Research for Individuals from Disadvantaged Backgrounds, and Contraception and Infertility Research. Of those applicants, 1,357 received either new or renewal awards totaling \$69,007,370. The combined (new and renewal applicants) success rate for the Extramural LRPs was 51 percent.

The Clinical Research LRP received 56 percent (1,495) of all Extramural LRP applications.

New applicants (those not previously funded by the LRP) constituted 60 percent (1,615) of all applications while renewal applicants (those previously funded by the LRP) comprised 40 percent (1,070) of all applications. Success rates for new and renewal applications were 41 and 65 percent, respectively.

The LRPs are open to health professionals with doctoral level degrees or advanced certifications with varying levels of experience. Most new FY2014 awardees are at the beginning their careers, with 56 percent having received their qualifying degrees within the last 5 years and 92 percent within the past 10 years.

Physician doctorates (including dual physician doctorates and academic doctorates, i.e., MD/PhD degrees) comprised 52 percent (701) of the 1,357 awards, while those with academic doctoral level degrees comprised 46 percent (656) of the 1,357 awards.

Seventy-eight percent of new awardees had educational debt greater than \$50,000, with 14 percent having debt levels greater than \$200,000.

Women received 757 (56 percent) of the 1,357 LRP awards. Black/African American applicants received 88 (6 percent) awards, Asians received 140 (10 percent) awards, Hispanics received 87 (6 percent) awards, and American Indians/Alaska Natives received 8 (<1 percent) awards.

The Division of Loan Repayment offers multiple resources for assisting applicants. These resources include two webinars that have been viewed over 7,000 times. There is an overview of the Loan Repayment Programs that summarizes the programs and gives tips for applying, and the Application Tutorial outlines the four sections of the application and shows applicants how to avoid common pitfalls. All of these resources can be found on the LRP web site: [www.lrp.nih.gov](http://www.lrp.nih.gov).

## The Five Extramural Loan Repayment Programs

### **Clinical Research:**

Clinical research is patient-oriented clinical research conducted with human subjects, or research on the causes and consequences of disease in human populations involving material of human origin (such as tissue specimens and cognitive phenomena) for which an investigator or colleague directly interacts with human subjects in an outpatient or inpatient setting to clarify a problem in human physiology, pathophysiology or disease, or epidemiologic or behavioral studies, outcomes research or health services research, or developing new technologies, therapeutic interventions, or clinical trials.

### **Pediatric Research:**

Qualified Pediatric Research is defined as research directly related to diseases, disorders, and other conditions in children.

### **Health Disparities Research:**

The scope of research qualified for this program includes basic research, clinical research, or behavioral research directly related to health disparity populations and the medically underserved. Group is defined as a health disparity population; wherein there is a significant disparity in the overall rate of disease incidence, prevalence, morbidity, mortality, or survival rates in the population as compared to the health status of the general population.

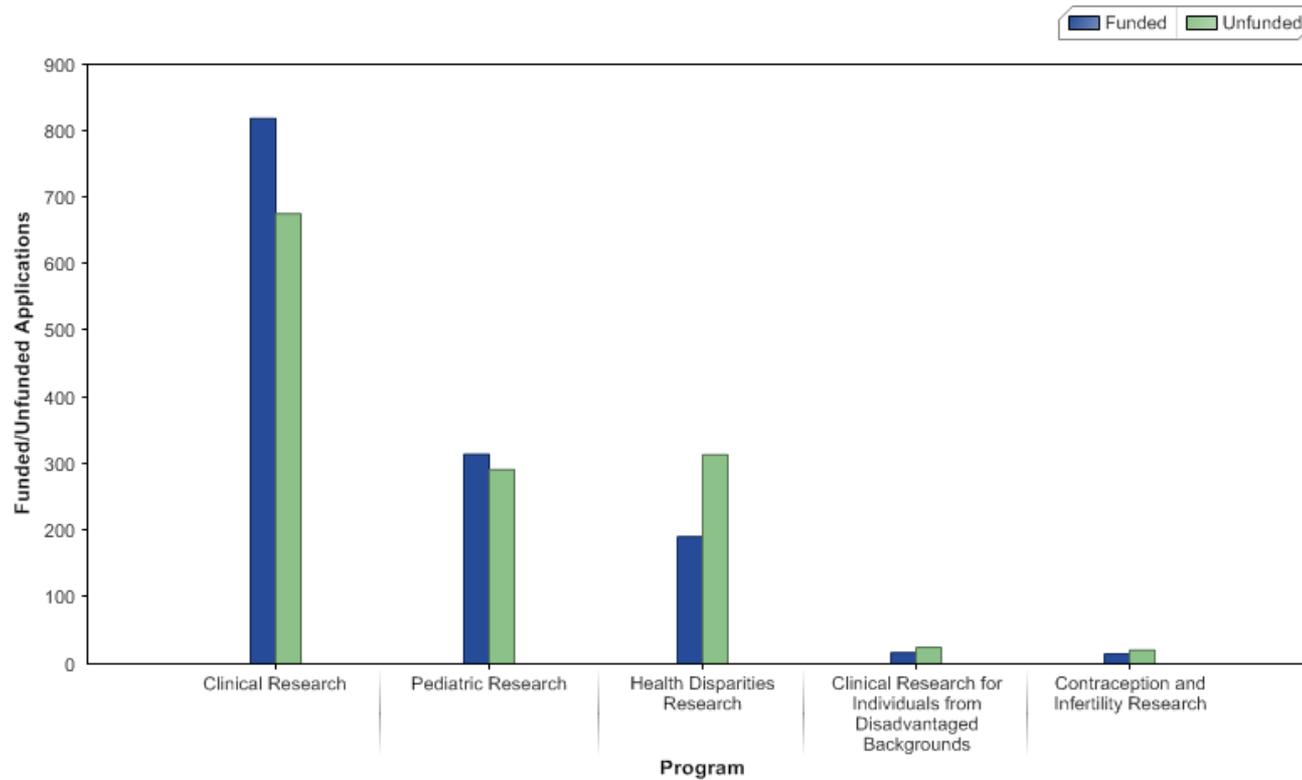
### **Clinical Research for Individuals from Disadvantaged Backgrounds:**

For this program, an individual from a disadvantaged background is defined according to low family income levels set by the U.S. Bureau of the Census – as published in the Federal Register. To meet this low-income requirement candidates must demonstrate their disadvantaged status by submitting (1) a written statement from former school(s) where he/she qualified for Federal disadvantaged assistance, (2) verification of receipt of loans from either the Health Professions Student Loans (HPSL) or Loans for Disadvantaged Student Program, or (3) verification of a scholarship from the U.S. Department of Health and Human Services under the Scholarship for Individuals with Exceptional Financial Need.

### **Contraception and Infertility Research:**

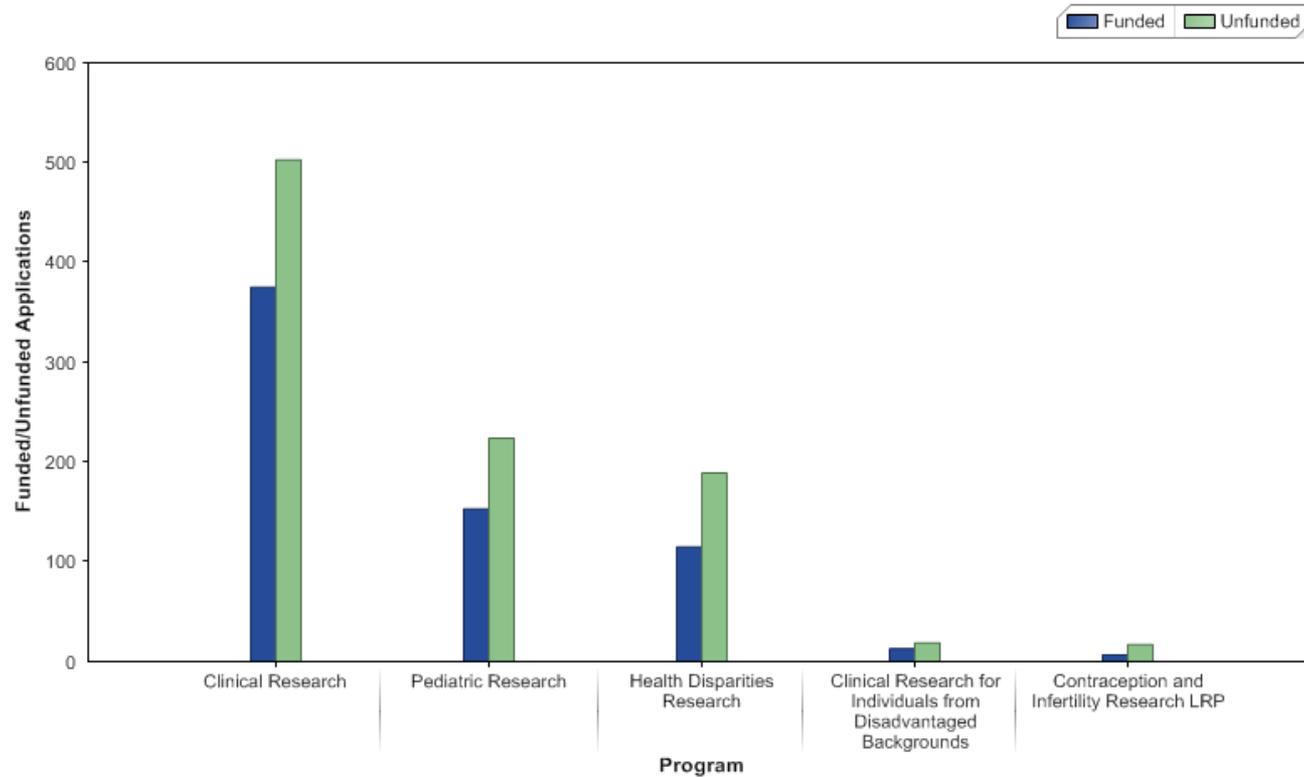
Contraception research is defined as research whose ultimate goal is to provide new or improved methods of preventing pregnancy. Infertility research is defined as research whose long-range objective is to evaluate, treat, or ameliorate conditions which result in the failure of couples to either conceive or bear young.

## Funded and Unfunded Applications by Program (New + Renewal)



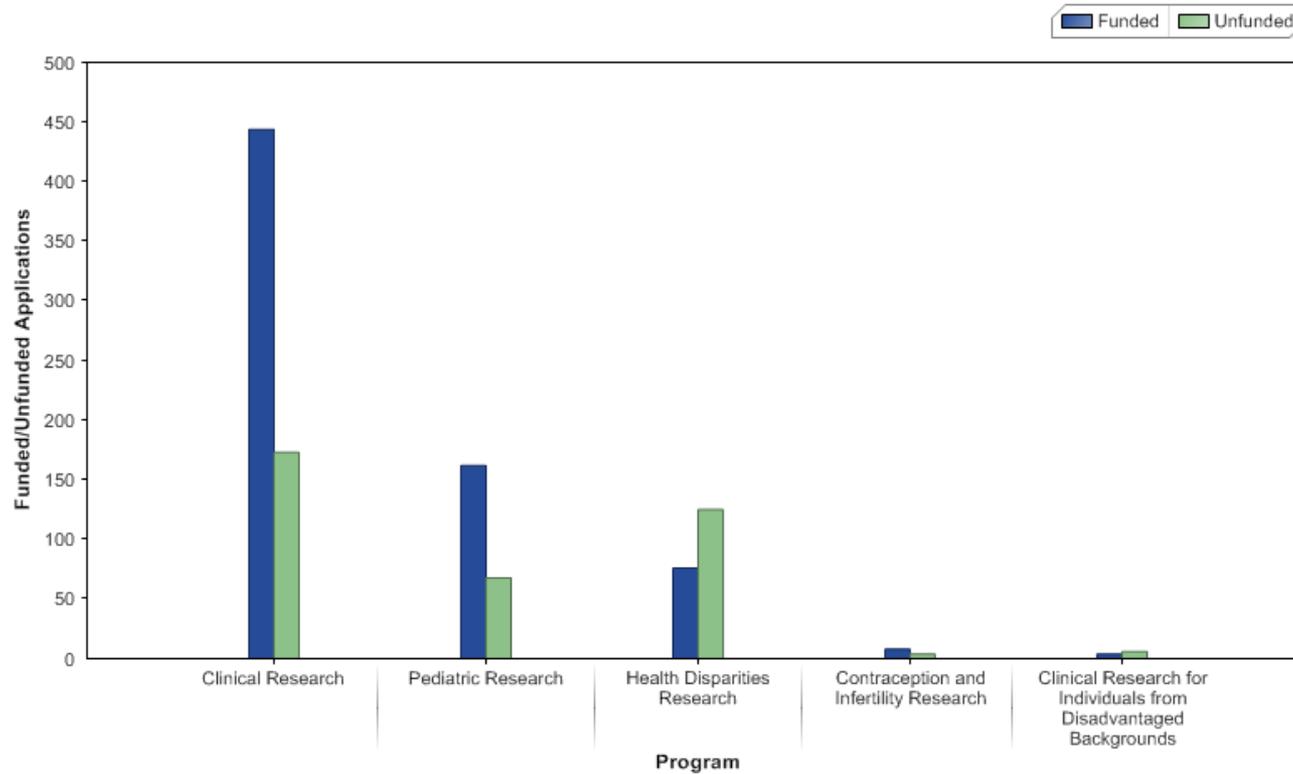
LRP	Clinical Research	Pediatric Research	Health Disparities Research	Clinical Research for Individuals from Disadvantaged Backgrounds	Contraception and Infertility
Applications, N	1495	607	505	42	36
Funded n, %	819, 55	315, 52	191, 38	17, 40	15, 42
Unfunded n, %	676, 45	292, 48	314, 62	25, 60	21, 58

## Funded and Unfunded Applications by Program (New)



LRP	Clinical Research	Pediatric Research	Health Disparities Research	Clinical Research for Individuals from Disadvantaged Backgrounds	Contraception and Infertility
Applications, N	878	377	304	32	24
Funded n, %	375, 43	153, 41	115, 38	13, 41	7, 29
Unfunded n, %	503, 57	224, 59	189, 62	19, 59	17, 71

## Funded and Unfunded Applications by Program (Renewal)



LRP	Clinical Research	Pediatric Research	Health Disparities Research	Clinical Research for Individuals from Disadvantaged Backgrounds	Contraception and Infertility
Applications, N	617	230	201	10	12
Funded n, %	444, 72	162, 70	76, 38	4, 40	8, 67
Unfunded n, %	173, 28	68, 30	125, 62	6, 60	4, 33

## Applications, Awards, and Success Rates by Program

LRP	New + Renewal			New			Renewal		
	Applications	Awards	Success Rate	Applications	Awards	Success Rate	Applications	Awards	Success Rate
	N	n	%	N	n	%	N	n	%
Clinical Research	1,495	819	55	878	375	43	617	444	72
Pediatric Research	607	315	52	377	153	41	230	162	70
Health Disparities Research	505	191	38	304	115	38	201	76	38
Clinical Research for Individuals from Disadvantaged Backgrounds	42	17	40	32	13	41	10	4	40
Contraception and Infertility Research	36	15	42	24	7	29	12	8	67
<b>Total</b>	<b>2,685</b>	<b>1,357</b>	<b>51</b>	<b>1,615</b>	<b>663</b>	<b>41</b>	<b>1,070</b>	<b>694</b>	<b>65</b>

## Funding by Program (New + Renewal)

LRP	Awards	Funding	Mean Award	Standard Deviation
Clinical Research	819	\$40,205,320	\$49,091	\$31,587
Pediatric Research	315	\$17,179,974	\$54,540	\$31,256
Health Disparities Research	191	\$9,444,008	\$49,445	\$30,102
Clinical Research for Individuals from Disadvantaged Backgrounds	17	\$1,162,447	\$68,379	\$22,790
Contraception and Infertility Research	15	\$1,015,621	\$67,708	\$32,744
<b>Total</b>	<b>1,357</b>	<b>\$69,007,370</b>	<b>\$50,853</b>	<b>\$31,378</b>

## Funding by Program (New)

LRP	Awards	Funding	Mean Award	Standard Deviation
Clinical Research	375	\$24,902,984	\$66,408	\$30,350
Pediatric Research	153	\$10,222,875	\$66,816	\$30,886
Health Disparities Research	115	\$6,912,615	\$60,110	\$29,132
Clinical Research for Individuals from Disadvantaged Backgrounds	13	\$985,472	\$75,806	\$19,473
Contraception and Infertility Research	7	\$598,324	\$85,475	\$24,253
<b>Total</b>	<b>663</b>	<b>\$43,622,269</b>	<b>\$65,795</b>	<b>\$30,165</b>

### Funding by Program (Renewal)

LRP	Awards	Funding	Mean Award	Standard Deviation
Clinical Research	444	\$15,302,337	\$34,465	\$24,420
Pediatric Research	162	\$6,957,099	\$42,945	\$26,948
Health Disparities Research	76	\$2,531,393	\$33,308	\$23,817
Contraception and Infertility Research	8	\$417,297	\$52,162	\$32,377
Clinical Research for Individuals from Disadvantaged Backgrounds	4	\$176,975	\$44,244	\$15,416
<b>Total</b>	<b>694</b>	<b>\$25,385,101</b>	<b>\$36,578</b>	<b>\$25,290</b>

## Funding by NIH Institutes and Centers (New)

IC	Awards	Funding	Mean Award	Standard Deviation
NIMHD	128	\$7,898,087	\$61,704	\$28,640
NCI	88	\$6,076,587	\$69,052	\$30,683
NHLBI	67	\$5,161,087	\$77,031	\$26,097
NIMH	62	\$3,369,553	\$54,348	\$31,113
NIAID	51	\$3,728,757	\$73,113	\$27,044
NICHD	48	\$3,274,473	\$68,218	\$30,469
NIDDK	39	\$2,565,182	\$65,774	\$31,603
NIDA	35	\$2,136,498	\$61,043	\$30,252
NINDS	24	\$1,681,992	\$70,083	\$25,672
NIA	17	\$1,051,784	\$61,870	\$37,507
NIAAA	17	\$962,854	\$56,638	\$38,774
NCATS	15	\$937,667	\$62,511	\$33,438
NEI	14	\$1,089,820	\$77,844	\$26,932
NIAMS	12	\$880,437	\$73,370	\$28,246
NIDCD	10	\$425,946	\$42,595	\$33,730
NIEHS	10	\$425,664	\$42,566	\$18,408
NIDCR	9	\$764,978	\$84,998	\$14,631
NIGMS	8	\$677,203	\$84,650	\$17,942
NCCAM	5	\$260,221	\$52,044	\$19,820
NIBIB	2	\$88,155	\$44,077	\$17,510
NHGRI	2	\$165,325	\$82,662	\$20,701
<b>Total</b>	<b>663</b>	<b>\$43,622,269</b>	<b>\$65,795</b>	<b>\$30,165</b>

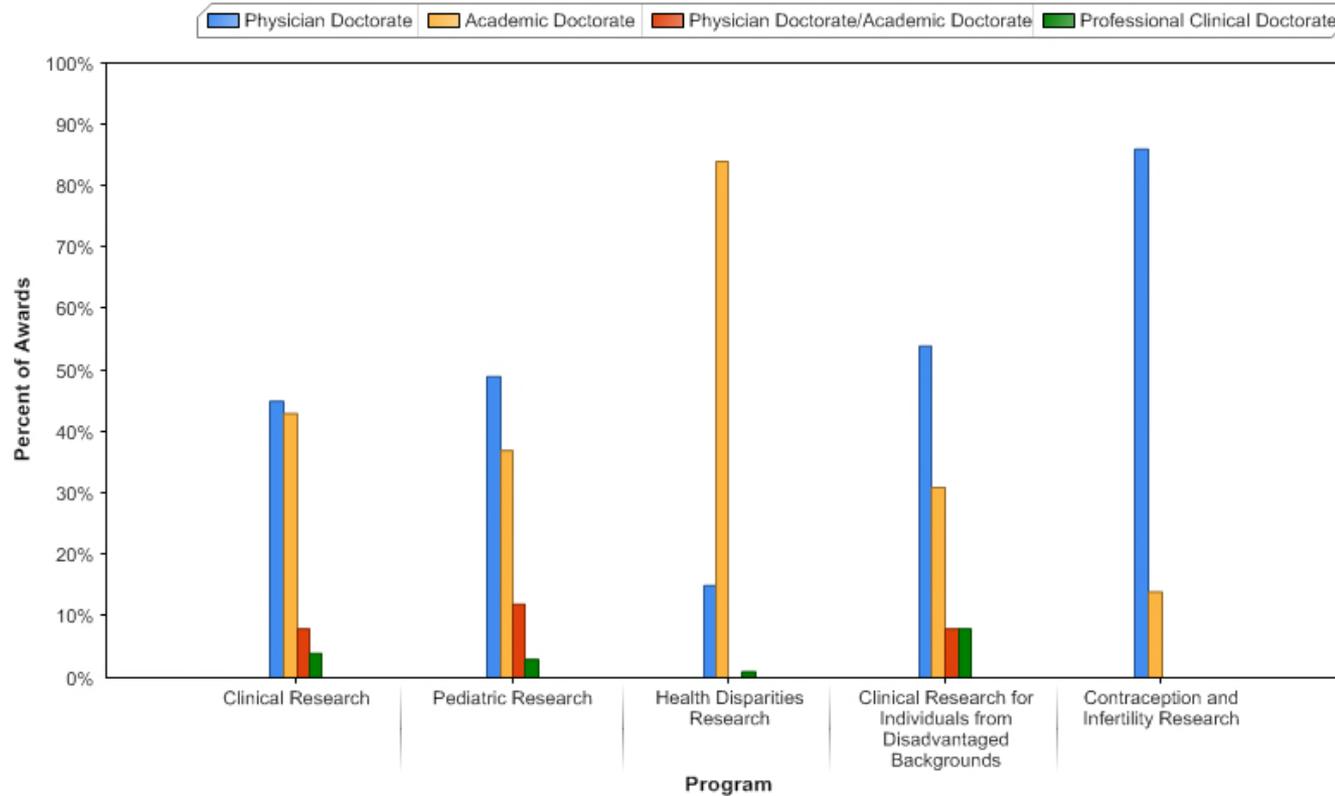
## Funding by NIH Institutes and Centers (Renewal)

IC	Awards	Funding	Mean Award	Standard Deviation
NCI	128	\$4,146,181	\$32,392	\$16,613
NHLBI	82	\$3,776,582	\$46,056	\$31,091
NIMHD	80	\$2,708,368	\$33,855	\$23,523
NICHD	66	\$2,403,751	\$36,420	\$25,484
NIAID	53	\$2,384,543	\$44,991	\$32,276
NIMH	41	\$1,285,528	\$31,354	\$24,084
NIA	35	\$1,093,949	\$31,256	\$14,699
NIDA	34	\$879,150	\$25,857	\$13,817
NCATS	31	\$1,068,481	\$34,467	\$31,732
NIDDK	28	\$1,432,316	\$51,154	\$26,483
NINDS	26	\$1,331,335	\$51,205	\$29,646
NIAAA	23	\$560,805	\$24,383	\$16,932
NIAMS	18	\$823,660	\$45,759	\$32,419
NEI	18	\$585,851	\$32,547	\$23,263
NIDCD	10	\$322,618	\$32,262	\$15,102
NIEHS	9	\$208,838	\$23,204	\$13,068
NIDCR	5	\$165,678	\$33,136	\$14,173
NCCAM	5	\$94,221	\$18,844	\$7,989
NHGRI	1	\$94,668	\$94,668	
NIBIB	1	\$18,577	\$18,577	
<b>Total</b>	<b>694</b>	<b>\$25,385,101</b>	<b>\$36,578</b>	<b>\$25,290</b>

## Applications, Awards, and Success Rates by Post-Degree Years (New)

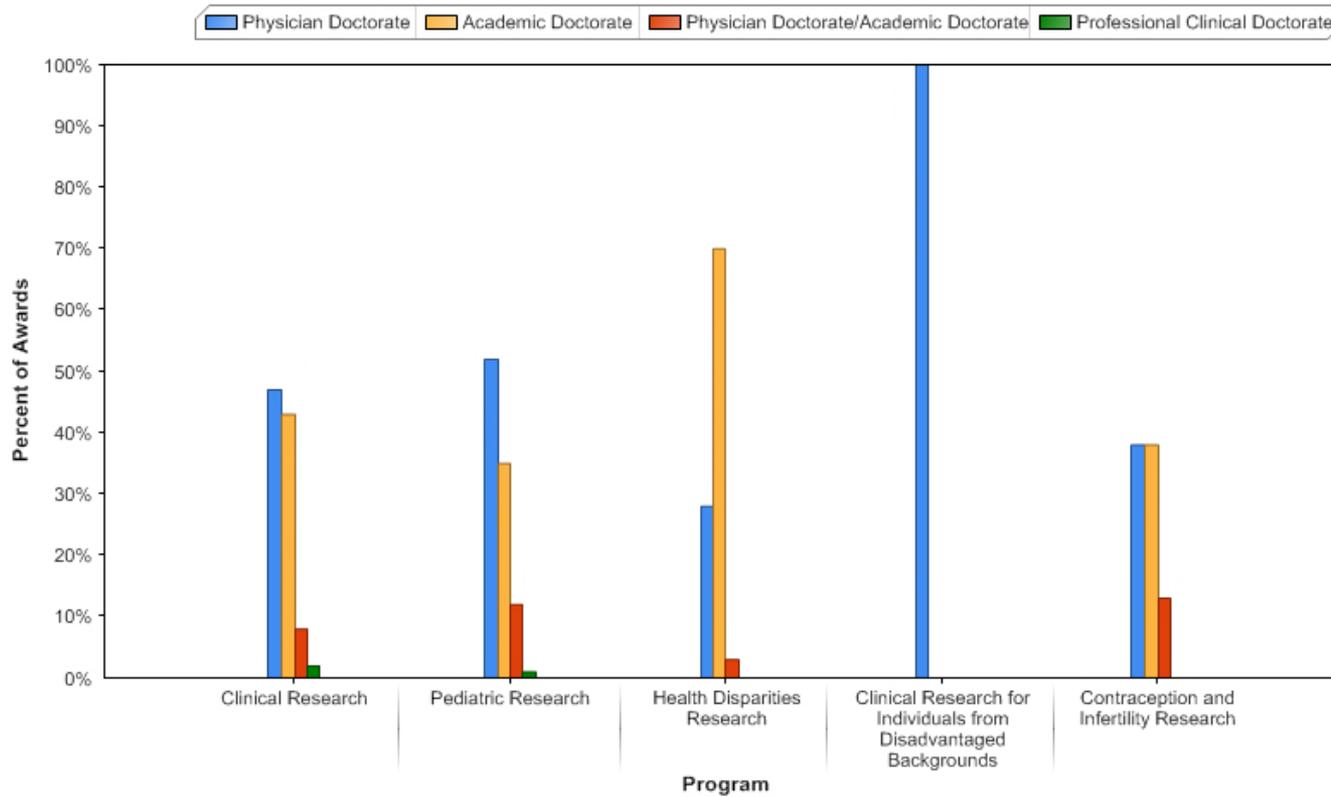
Years Since Degree	Applications	Awards	Success Rate
	N	n	%
<1 Year	18	9	50
1 to 5 Years	890	360	40
6 to 10 Years	582	248	43
11 to 15 Years	111	43	39
15+ Years	14	3	21
<b>Total</b>	<b>1,615</b>	<b>663</b>	<b>41</b>

## LRP Awards by Doctoral Degree (New)



Doctoral Degree	Clinical Research	Pediatric Research	Health Disparities Research	Clinical Research for Individuals from Disadvantaged Backgrounds	Contraception and Infertility Research
Physician Doctorate n, %	168, 45	75, 49	17, 15	7, 54	6, 86
Academic Doctorate n, %	161, 43	56, 37	97, 84	4, 31	1, 14
Physician Doctorate/Academic Doctorate n, %	30, 8	18, 12	0, 0	1, 8	0, 0
Professional Clinical Doctorate n, %	16, 4	4, 3	1, 1	1, 8	0, 0

### LRP Awards by Doctoral Degree (Renewal)

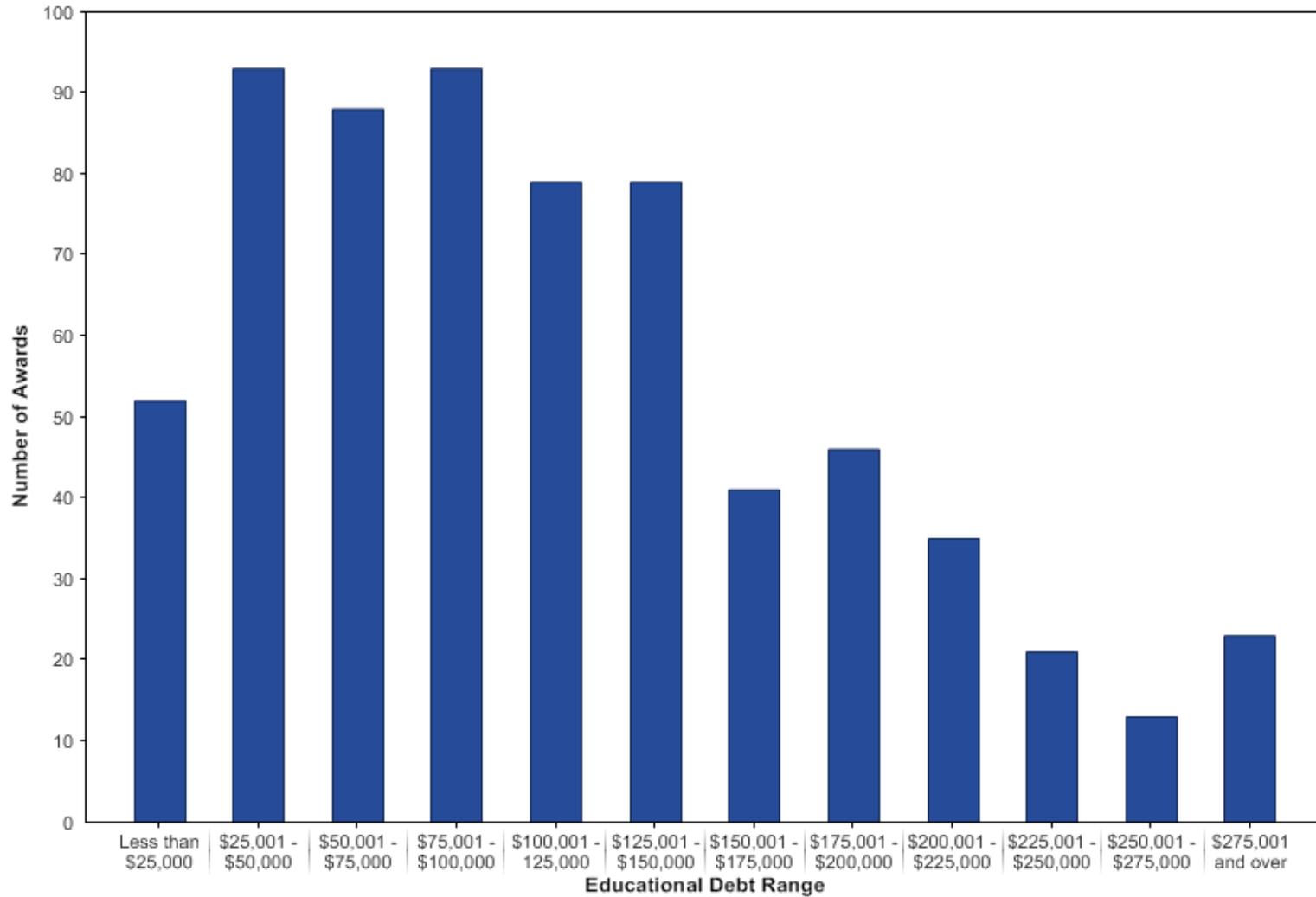


Doctoral Degree	Clinical Research	Pediatric Research	Health Disparities Research	Clinical Research for Individuals from Disadvantaged Backgrounds	Contraception and Infertility Research
Physician Doctorate n, %	208, 47	85, 52	21, 28	4, 100	3, 38
Academic Doctorate n, %	189, 43	56, 35	53, 70	0, 0	3, 38
Physician Doctorate/Academic Doctorate n, %	35, 8	20, 12	2, 3	0, 0	1, 13
Professional Clinical Doctorate n, %	11, 2	1, 1	1, 0	0, 0	0, 0

## Applications, Awards, and Success Rates by Source of Research Funding (New + Renewal)

Source of Research Funding	Applications	Awards	Success Rate
	N	n	%
NIH Only	836	443	53
NIH and Non Profit	1,064	610	57
Non Profit Only	785	304	39
<b>Total</b>	<b>2,685</b>	<b>1,357</b>	<b>51</b>

### Educational Debt Levels of LRP Awardees (New)



## Number of Prior LRP Awards Received by LRP Participants (Renewal)

LRP	1 Prior Awards	2 Prior Awards	3 Prior Awards	4 Prior Awards	5 Prior Awards	6 Prior Awards	Total
Clinical Research	292	106	33	10	3	0	444
Pediatric Research	106	32	18	2	4	0	162
Health Disparities Research	47	20	6	3	0	0	76
Contraception and Infertility Research	6	1	1	0	0	0	8
Clinical Research for Individuals from Disadvantaged Backgrounds	4	0	0	0	0	0	4
<b>Total</b>	<b>455</b>	<b>159</b>	<b>58</b>	<b>15</b>	<b>7</b>	<b>0</b>	<b>694</b>

## Applications, Awards, and Success Rates by Gender (New + Renewal)

LRP	Male Applicants			Female Applicants			Gender Distribution	
	Applications	Awards	Success Rate	Applications	Awards	Success Rate	Male Awards	Female Awards
	N	n	%	N	n	%	%	%
Clinical Research	703	410	58	792	409	52	50	50
Pediatric Research	243	123	51	364	192	53	39	61
Health Disparities Research	137	55	40	368	136	37	29	71
Clinical Research for Individuals from Disadvantaged Backgrounds	20	8	40	22	9	41	47	53
Contraception and Infertility Research	8	4	50	28	11	39	27	73
<b>Total</b>	<b>1,111</b>	<b>600</b>	<b>54</b>	<b>1,574</b>	<b>757</b>	<b>48</b>	<b>44</b>	<b>56</b>

## Awardee Demographics by Ethnicity (New + Renewal)

LRP	Awards	Hispanic or Latino		Not Hispanic or Latino	
	N	n	%	n	%
Clinical Research	819	37	5	782	95
Pediatric Research	315	15	5	300	95
Health Disparities Research	191	29	15	162	85
Clinical Research for Individuals from Disadvantaged Backgrounds	17	6	35	11	65
Contraception and Infertility Research	15	0	0	15	100
<b>Total</b>	<b>1,357</b>	<b>87</b>	<b>6</b>	<b>1,270</b>	<b>94</b>

### Notes:

\*Restricted Data - small-sized groups cannot be reported due to participant confidentiality considerations.

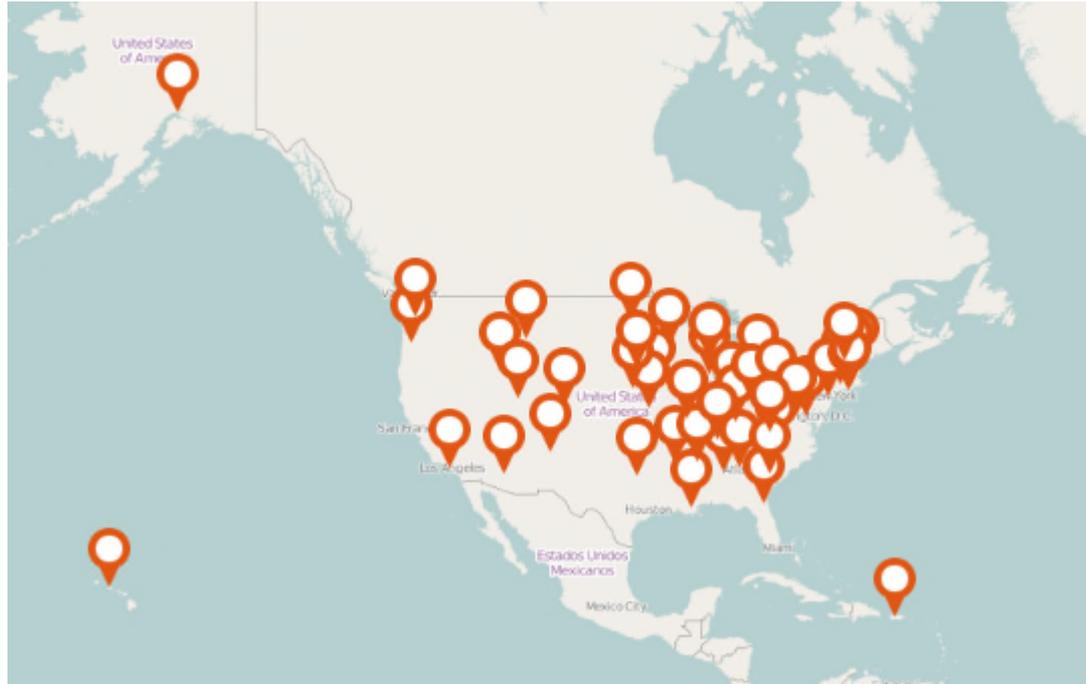
Awardee Demographics by Race (New + Renewal)

LRP	Awards	American Indian or Alaska Native		Black or African American		Asian		Native Hawaiian or Other Pacific Islander		White		More Than One Race		Other / No Response	
		N	n	%	n	%	n	%	n	%	n	%	n	%	n
Clinical Research	819	*	*	18	2	92	11	*	*	613	75	19	2	76	9
Pediatric Research	315	*	*	11	3	31	10	*	*	239	76	*	*	28	9
Health Disparities Research	191	6	3	53	28	14	7	*	*	83	43	8	4	25	13
Clinical Research for Individuals from Disadvantaged Backgrounds	17	*	*	5	29	*	*	*	*	9	53	*	*	*	*
Contraception and Infertility Research	15	*	*	*	*	*	*	*	*	10	67	*	*	*	*
<b>Total</b>	<b>1,357</b>	<b>8</b>	<b>1</b>	<b>88</b>	<b>6</b>	<b>140</b>	<b>10</b>	<b>*</b>	<b>*</b>	<b>954</b>	<b>70</b>	<b>31</b>	<b>2</b>	<b>133</b>	<b>10</b>

Notes:

\*Restricted Data - small-sized groups cannot be reported due to participant confidentiality considerations.

## Number of Awardees by State (New + Renewal)



Number of Participants	States
0	DE,NV,OK,WY
1-25	AK,AL,AR,AZ,DC,HI,IA,ID,IN,KS,KY,LA,ME,MN,MS,MT,ND,NE,NH,NJ,NM,OR,PR,RI,SC,SD,UT,VA,VT,WI,WV
26-50	CO,CT,FL,GA,IL,MI,MO,OH,TN,WA
51-100	MD,NC,PA,TX
101-150	MA,NY
151-200	CA

**Division of Loan Repayment,  
Office of Extramural Programs,  
Office of Extramural Research,  
Office of the Director,  
National Institutes of Health,  
Department of Health and Human Services**

Loan Repayment Programs (LRP) Web Site:  
[www.lrp.nih.gov](http://www.lrp.nih.gov)