



# The ACD Report on Long-Term Intramural Research Program Planning: NIH Response and Implementation Plan

Presented to the ACD - June 12, 2015  
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Deputy Director for Intramural Research



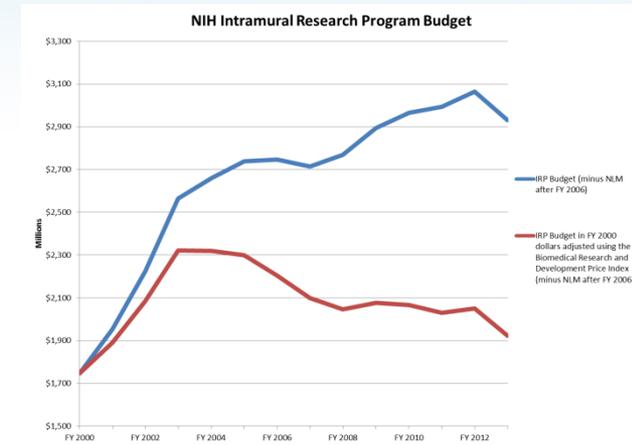
**Intramural Research Program**  
*Our Research Changes Lives*

one program  
many people  
infinite possibilities



# Issues Facing Entire Biomedical Research Enterprise (Intramural and Extramural)

- **Declines in inflation-adjusted funding**
- **Inadequate diversity of the biomedical workforce as the U.S. population becomes more diverse**
- **Need for opportunities and appropriate training for talented students to enter productive career paths**
- **Changes in the methodologies and costs of conducting research**
- **A growing need for more effective translation of laboratory science into clinical applications**



# Summary of Issues from 25 ACD Recommendations

- **Strengthening the Clinical Center and clinical research at the NIH**
- **Promoting diversity**
- **Recruiting and appointing NIH scientists**
- **Supporting new research opportunities**
- **Enhancing intramural-extramural collaborations and team science**
- **Optimizing use of shared resources at NIH**
- **Improving the scientific review process**

# NIH Response and Implementation Plan

## NIH Clinical Center:

- Provide mechanisms to build alliances with the extramural clinical research community
- Enhance the role of the IRP in training the next generation of physician-scientists
- Promote existing programs and new methods for improving the recruitment of clinical investigators
- The CC will genotype all CC patients and conduct comprehensive phenotyping of this valuable cohort of subjects who are seen repeatedly at the CC
- The CC will become a referral center for phenotyping human subjects with unusual genotypes



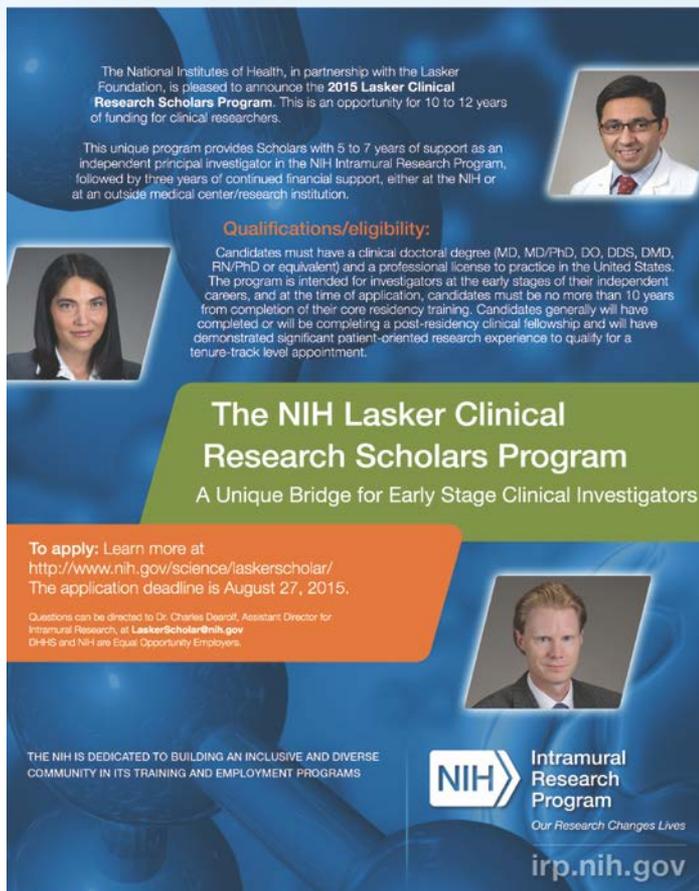
# NIH Response and Implementation Plan

## Diversity of the IRP Workforce:

**NIH will adopt and expand recommendations that will influence workforce diversity at every career level**

- **Trans-NIH search processes for new scientific staff will cast a wider net for talented scientists using more central recruitment**
- **New pathways for career development will be established to allow investigators to graduate to independence**
- **A centralized program for recruitment, mentoring, and career development of post-doctoral fellows will be initiated**
- **We will start a new high school enrichment program and enhanced graduate and medical training programs, adding to an extensive set of programs at the NIH for disadvantaged students**

# NIH Response and Implementation Plan



The National Institutes of Health, in partnership with the Lasker Foundation, is pleased to announce the **2015 Lasker Clinical Research Scholars Program**. This is an opportunity for 10 to 12 years of funding for clinical researchers.

This unique program provides Scholars with 5 to 7 years of support as an independent principal investigator in the NIH Intramural Research Program, followed by three years of continued financial support, either at the NIH or at an outside medical center/research institution.

**Qualifications/eligibility:**  
Candidates must have a clinical doctoral degree (MD, MD/PhD, DO, DDS, DMD, RN/PhD or equivalent) and a professional license to practice in the United States. The program is intended for investigators at the early stages of their independent careers, and at the time of application, candidates must be no more than 10 years from completion of their core residency training. Candidates generally will have completed or will be completing a post-residency clinical fellowship and will have demonstrated significant patient-oriented research experience to qualify for a tenure-track level appointment.

**The NIH Lasker Clinical Research Scholars Program**  
A Unique Bridge for Early Stage Clinical Investigators

**To apply:** Learn more at <http://www.nih.gov/science/laskerscholar/>  
The application deadline is August 27, 2015.

Questions can be directed to Dr. Charles Desroff, Assistant Director for Intramural Research, at [LaskerScholar@nih.gov](mailto:LaskerScholar@nih.gov)  
DHHS and NIH are Equal Opportunity Employers.

THE NIH IS DEDICATED TO BUILDING AN INCLUSIVE AND DIVERSE COMMUNITY IN ITS TRAINING AND EMPLOYMENT PROGRAMS

**NIH** Intramural Research Program  
*Our Research Changes Lives*

[irp.nih.gov](http://irp.nih.gov)

## Recruitment Processes and Career Development:

- **Expand the use of Stadtman and Lasker trans-NIH search processes**
- **Increase the number of positions for Assistant Clinical Investigators**
- **Enhance advertising and outreach for all available positions, including Staff Scientists**

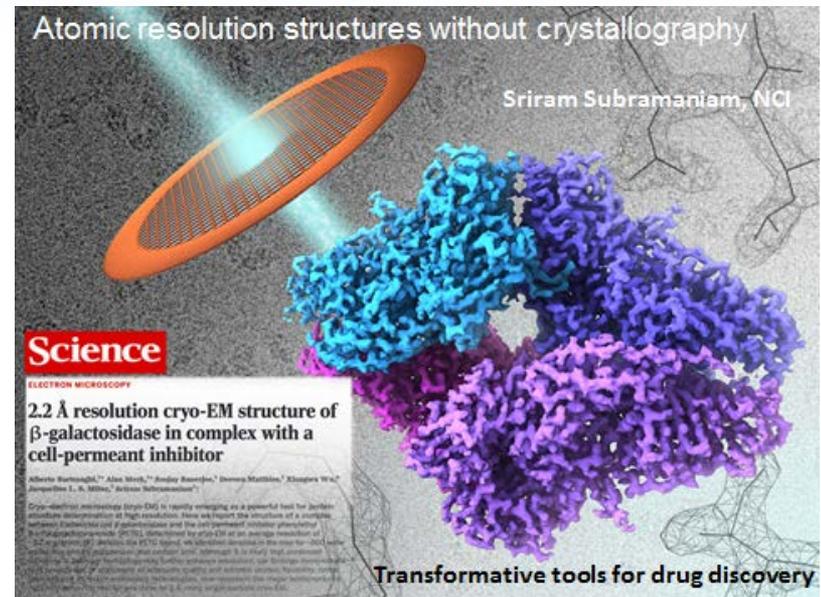
# NIH Response and Implementation Plan

## Program Planning and Investment Funds:

- **Create a central pool of funds and separate funds in each IC to stimulate new initiatives**
- **Eventually aim for 1% of the intramural budget (gradually reaching this level over several years) to facilitate collaborative research opportunities and start-up funds for important recruitments, but not sustained support**
- **NIH will ask scientific experts drawn from the extramural research community and outstanding intramural investigators to identify exciting new research directions that might take advantage of the distinctive environment of the IRP**

# Creating and Using New Technologies at the NIH

- Development of a technology incubator at the NIH including optical microscopy, instrument development, and clinical imaging
- Emphasis on structural biology, especially development of near atomic resolution cryo-EM as a research tool
- Development of a comprehensive phenotyping core at the CC to enhance genotype-phenotype analysis of existing human subjects and serve as a referral center for unusual genotypes
- Enhancement of computational resources for big data analysis



# Shared Scientific Opportunities

**Areas of scientific opportunity identified earlier by the ICs in which the ICs have expertise and are prepared to excel and take a leadership role:**

- **Inflammatory diseases**
- **Cell-based therapies**
- **Microbiome**
- **Drug resistance**
- **RNA biology and therapeutics**
- **Vaccines**
- **Neuroscience, especially compulsive behaviors**
- **Animal modeling**
- **Natural products**

# How NIH Will Stimulate Trans-NIH Efforts

- **Workshops will be convened to define goals and best ways forward**
- **The Scientific Directors have identified the areas for trans-NIH collaboration and are committed to support them**
- **Create a central source of funds to support trans-NIH activities**
- **Encourage recruitments in areas of trans-NIH interest**
- **Recognition by awards, career advancement**
- **Provide resources to facilitate trans-NIH activities:**
  - **Space**
  - **Positions such as for Staff Scientists**
  - **Post-doctoral fellows and other trainees**

# Questions?



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[irp.nih.gov](http://irp.nih.gov)

# *Supplemental Slides Follow*

# Timelines to Progress in the NIH IRP

1988 IOM  
Report

1994 ACD  
Review of the  
IRP

2003 IOM  
Report on NIH  
Organization

2004 Blue  
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Research

2010 SMRB  
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- Foundation for the NIH (1990)
- Director's Discretionary Fund (1990)
- Tenure Program and national searches (1995)
- Title 42 Pay System (1999)

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- More rigorous BSC reviews (1994)
- Central Tenure Committee (1994)
- Diversity Initiatives: WSAs (1994), UGSP (1996), and NIH Academy (2001)
- Training /Mentoring, including GPP (2001)
- Construction of CRC (2005)

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- Criteria for review of intramural research mirrored extramural criteria, including innovation (2005) and conducting high-risk, high-reward projects; added environment to criteria for review to emphasize taking advantage of intramural scientific environment and developing useful collaborations

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- Tenure Guidelines for team members (2007)
- Created ICRSC (2008)
- Appointed DDICR (2008)
- Assistant Clinical Investigators (2008)
- Lasker Clinical Scholars Program (2011)

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- Considered alternate funding strategies for the CC

# Timelines to Progress in the NIH IRP

## 1988 IOM Report

- Foundation for the NIH (1990)
- Director's Discretionary Fund (1990)
- Tenure Program and national searches (1995)
- Title 42 Pay System (1999)

## 1994 ACD Review of the IRP

- More rigorous BSC reviews (1994)
- Central Tenure Committee (1994)
- Diversity Initiatives: WSAs (1994), UGSP (1996), and NIH Academy (2001)
- Training /Mentoring, including GPP (2001)
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## 2003 IOM Report on NIH Organization

- Criteria for review of intramural research mirrored extramural criteria, including innovation (2005) and conducting high-risk, high-reward projects; added environment to criteria for review to emphasize taking advantage of intramural scientific environment and developing useful collaborations

## 2004 Blue Ribbon Panel on IM Clinical Research

- Tenure Guidelines for team members (2007)
- Created ICRC (2008)
- Appointed DDICR (2008)
- Assistant Clinical Investigators (2008)
- Lasker Clinical Scholars Program (2011)

## 2010 SMRB Report on the Clinical Center

- Considered alternate funding strategies for the CC