

## Tenure-Track Opportunities at NIH and Beyond

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# **The NIH Tenure-Track**

- Up to seven years (nine years for clinical and epidemiology investigators) of independent resources to establish your record as an independent scientist before being evaluated for tenure
- Equivalent to an Assistant Professor in a university, except no teaching and no grant writing required
- Government retirement plan and health benefits.
- May be eligible for student loan repayment <u>http://www.lrp.nih.gov/</u>
- Approximately 20-30 T-T hires per year across NIH

https://oir.nih.gov/sourcebook/tenure-nih-intramural-research-program/tenure-trackoverview



## The Main NIH Campus



The NIH has 75 buildings on 322 acres in Bethesda, Maryland Two Metro stops from Washington, DC

## **The NIH Clinical Center**

- Our 240-bed research hospital
- The nation's largest hospital devoted entirely to clinical research
- Winner of 2011 Lasker-Bloomberg Award for Public Service





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## **NIH Has Facilities Around the Country**

- Rockville, Gaithersburg, Frederick and Baltimore, MD (NCI, NIA, NIAAA, NIAID, NIDA)
- Research Triangle Park (Raleigh/Durham), NC (NIEHS)
- Hamilton, MT (NIAID)
- Phoenix, AZ (NIDDK)
- Framingham, Mass. (NHLBI)
- Detroit, MI (NICHD)

http://irp.nih.gov/our-research/our-programs/text



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## **Earl Stadtman Search Mission**

- To provide our Scientific Directors with a diverse group of highly qualified candidates who they may want to hire into tenure-track positions in the NIH Intramural Research Program (IRP)
- Annual search open to all biomedical and behavioral researchers interested in NIH Intramural tenure-track positions
- A chance to present your best ideas, rather than trying to force-fit them to a specific ad



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WWW.NIH.GOV



Positions

Earl Stadtman

### NIH TO RECRUIT OUTSTANDING TENURE-TRACK SCIENTISTS

"Earl Stadtman Investigators," named after the legendary NIH scientist who <u>mentored</u> multiple Nobel Laureates, members of the National Academy of Sciences, and many current leaders in the biomedical community.



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## Proposed 2018-2019 Timeline-Part 1

- August 1, 2018-Application website goes live
- Sept. 30, 2018-Application closing date
- Applications include:
  - CV with bibliography (including mentoring/outreach)
  - Three-page proposal titled Research Goals
  - One-page statement titled Long-term Research Vision and Impact (e.g. why should U.S. taxpayers invest in your research)
  - Three letters of recommendation
- Applicants select two scientific areas for evaluation
- Letters of rec accepted until Oct. 7



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### **2017 Subject Areas and Applicant #s.**

Category*	App#	Category	App#
Biomedical Engineering/ Biophysics/Physics	57	Microbiology/Infectious diseases (non-viral) Molecular and Cellular Neuroscience	46 60
Cancer Biology	80	Molecular Biology/Biochemistry	67
Cell Biology/Cell Signaling	75	Molecular Pharmacology/Toxicology	23
Chemistry/Chemical Biology	23	Neurodevelopment	20
Chromosome Biology/ Epigenetics/Transcription	43	Physiology and Systems Biology RNA Biology	20 45
Computational Biology/ Bioinformatics/Biostatistics/ Mathematics	36	Social and Behavioral Sciences	17
Developmental Biology	33	Stem Cells/Induced Pluripotent Stem Cells	24
Epidemiology/Population Science	s <b>14</b>	Structural Biology	16
Genetics/Genomics	49	Synapses and Circuits	38
Health Disparities	8	Systems and Cognitive Neuroscience	31
Immunology	64	Virology	21
NIH Intramural Research Program	one program many people infinite possib	*Applicants could select two sub-committees for evaluation	

## Proposed 2018-2019 Timeline-Part 2

- Review of applicants by sub-committees to generate top 25% in each area to be forwarded to Scientific Directors
- December-March: 50-80 candidates selected by NIH Scientific Directors for interviews with interested Institutes and Centers
- Usually another 2 years before complete list of hires is known



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### Most ICs Have Hired Earl Stadtman Investigators (Onboard as of April 30, 2018)

NCCIH (1) **NCI/CCR (23), NCI/DCEG (9) NEI (2)** NHGRI(1) **NHLBI (7) NIA (2)** NIAID (7), NIAID/VRC (1) NIAMS (1) NIBIB (2) NICHD (3), NICHD/DIPR (2)

NIDA (1) NIDCR (1) NIDDK (4) NIEHS (2) \*NIMHD (1) NINDS (5) NLM/NCBI (1)

\*Two other investigators have secondary appointments in NIMHD Total= 76



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## Positions N

THE NATIONAL INSTITUTES OF HEALTH

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### 2009

(First Year) 833 Applicants 25 Interviewed 8 Hired

### **Disciplines Represented :**

Cell Biology Epidemiology Genetics Neuroscience Pharmacology Stem Cells Systems Biology

### 2010 (Second Year) 563 Applicants 81 Interviewed 9 Hired

### **Disciplines Represented:**

Behavioral Science Cancer Biology Cell Biology/Cell Signaling Genetics Computational Biology Immunology Molecular Biology/Biochemistry Neuroscience Stem Cells Virology

### 2011

(Third Year) 405 Applicants 80 Interviewed 11 Hired

#### **Disciplines Represented:**

Cancer Biology Cell Biology/Cell Signaling Chemistry Chromosome Biology Computational Biology Developmental Biology Epidemiology Genetics Immunology Neuroscience Stem Cells Structural Biology



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## Positions N

THE NATIONAL INSTITUTES OF HEALTH

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### <u>2012</u>

(Fourth Year) 648 Applicants 88 Interviewed 10 Hired

### **Disciplines Represented :**

Biomedical Engineering Biophysics/Physics Cell Biology Epidemiology Genetics Health Disparities Immunology Neuroscience Social/Behavioral Sciences Systems Biology Virology

### 2013 (Fifth Year)

766 Applicants 96 Interviewed 7 Hired

### **Disciplines Represented:**

Cancer Biology Epidemiology Genetics Health Disparities Immunology Microbiology/Infectious Diseases Molecular Biology/Biochemistry Structural Biology Virology

### <u>2014</u>

(Sixth Year) 745 Applicants 92 Interviewed 8 Hired

### **Disciplines Represented:**

Biomedical Engineering Biophysics/Physics Chromosome Biology/Epigenetics Computational Biology Developmental Biology Epidemiology Genetics Health Disparities Immunology Molecular Biology/Biochemistry Neuroscience Structural Biology Systems Biology Virology



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# Positions NIH

THE NATIONAL INSTITUTES OF HEALTH

WWW.NIH.GOV

### <u>2015</u>

(Seventh Year) 521 Applicants 60 Interviewed 15 Hired

#### **Disciplines Represented :**

**Biomedical Engineering Biophysics/Physics** Cancer Biology **Cell Biology** Chromosome Biology/Epigenetics **Developmental Biology** Epidemiology Genetics **Health Disparities** Immunology Molecular Biology/Biochemistry Neuroscience Social/Behavioral Sciences Stem Cells Structural Biology Systems Biology

Intramural Research Program Our Research Changes Lives <u>2016</u> (Eighth Year) 567 59 Interviewed 8 Hired\*

#### **Disciplines Represented:**

Cancer Biology Cell Biology Developmental Biology Epidemiology Genetics Immunology Microbiology/Infectious Diseases Molecular Biology/Biochemistry Physiology/Systems Biology Virology

### 2017

(Ninth Year) 491 Applicants 52 Interviewed 11 Approved Offers\*

#### **Disciplines Represented:**

Biomedical Engineering Biophysics/Physics Chromosome Biology/Epigenetics Developmental Biology Epidemiology Genetics Physiology/Systems Biology

one program many people infinite possibilities

\*Additional Candidates in the pipeline

## Internal and External Candidates Have Competed Effectively in the Earl Stadtman Search

Hired from Same IC	24 (31.6%)
Hired from different IC	11 (14.5%)
Hired from Outside NIH	41 (53.9%)



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## **Additional Clarification**

 Only the NIH Office of Human Resources can make an official offer of employment. Do not make any irreversible moves (e.g. selling a house, resigning from a job, signing a lease) until you receive an official offer letter from OHR.



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## **Tangible Factors Considered Include**

- Publication Record
- The quality and innovation shown in previous work and research plan
- Your ability to describe your work in writing (proofread carefully) and orally (practice your talks)
- Potential impact on public health
- Do you complement existing expertise?
- Leadership/mentoring/outreach activities
- For clinicians, board certifications
- Previous competitive research support (e.g. fellowships) or other special recognition
- For University positions:
  - Teaching experience
  - Transferrable grants (e.g. K99/R00)

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## **Publication Record**

- Usually need first-author publications (may vary with field) in the #1 or # 2 field-specific journals or other high quality, peer-reviewed journals.
  - Publications do not have to be in "one-word journals"
  - We like to see publications from at least two different research environments (e.g. grad school and postdoc)



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# Things to Include in Your Research Plan or Vision Statement

- Background on the problem(s) you wish to study
- Why it is an important problem
- Details on what approaches and methods you would use to move your field forward in the short term (about 5 years)
- What are the key experiments that have to be done first and why
- Advantages of your approach to the problem
- Tools or skills you have that give you an advantage in tackling this problem



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## Things to Include in Your Research Plan or Vision Statement (cont.)

- What is your vision for your future research and its potential impact
- Potential impact on public health and/or our general understanding of biology
- Can you connect the dots between your research and the treatment of a disease 20 years from now
- Can you anticipate the next steps if you achieve your immediate research goals



## Things to Include in Your Research Plan or Vision Statement (cont.)

- What hypotheses drive your experimental designs?
- Will your experiments help to form or eliminate models of how a biological process, disease or behavior occurs?
- Will your experiments identify intervention points?



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- Multiple projects must appear to be tied together in a logical fashion.
- The number of projects should be appropriate for your projected group size and resources (3-4 persons).
- Your goal is to become a world leader in at least one specific area.
- If your area is technology development, be sure to apply this to an important biological problem.



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## **Less Tangible Factors Considered Include**

- Letters of Recommendation
- Reputation of labs/institutions where you have worked
- Can you make use of the special environment at NIH?



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## **Letters of Recommendation**

- Want people familiar with you as a scientist (your lab PIs are best)
- Need 3 letters
- Internationally-respected active researchers best
- Show them the job ad and your cv, and be sure they think you are highly qualified
- Double check with recruiter to be sure letters arrived



## **An Ideal Letter Says**

- "S/he is best student/postdoc I have ever had in my lab"
- "S/he compares favorably to other postdocs who have gone on to outstanding research careers" (should list names)
- "His/her specific contribution to the work was....."
- "S/he is a highly-intelligent, independent thinker who is ready to run his/her own lab"
- "I do not plan to compete with her/him in her proposed area of research"
- "S/he gets along well with others in the group"
- "S/he has helped others in the lab be more productive"



# Thinking on Your Feet (Surviving a Chalk Talk)

- You should be able to describe your future plans with no electronic aids.
- It should be clear what you want to do first and why. You should be very knowledgeable in your field and able to answer tough questions about problems that could arise in your research.
- Be prepared to answer these two questions:
  - 1. Why did you choose this field of research?

2. How would you go about recruiting staff and fellows in such a way that you would attract a diverse group of highly qualified applicants?



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## **Reasons to Re-apply**

- Your CV has improved
- You have updated your research plan/vision statement
- Your letter writers thought of new nice things to say about you
- Each year there are some new committee members
- Two new Scientific Directors expected this year (NINDS, NIDCR)



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## \*NIH Science Career Options After the Fellowship



Contractor Staff Clinician Assistant Clinical Investigator Tenure-Track Investigator (e.g., Lasker) \*\*Medical Officer

Contractor Research Fellow Staff Scientist Tenure-Track Investigator (e.g., Stadtman)

Contractor Presidential Management Fellow AAAS Fellow \*\*Health Science Administrator \*\*Medical Officer



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\*This list is not exhaustive \*\*Usually open to U.S. Citizens only

# Key Resources for Identifying Scientific Career Opportunities at NIH

- Advertised NIH Intramural postdoc positions <u>https://www.training.nih.gov/career\_services/postdoc\_jobs\_nih</u>
- Link to Selected Positions of Interest to fellows <u>https://www.training.nih.gov/career\_services/jobs</u>
- NIH Intramural Research Program Faculty-Level careers <u>http://irp.nih.gov/careers/tenured-and-tenure-track-scientific-careers</u>
- NIH Office of Human Resources Jobs sites <u>http://www.jobs.nih.gov/</u> <u>http://search.nih.gov/search?affiliate=jobsnih&query=jobs</u>
- Global recruitment for Medical Officers And Health Science Administrators <u>http://www.jobs.nih.gov/globalrecruitment/</u>





### **Questions?**

### See Careers Menu at <u>The NIH Intramural Research Program</u> <u>http://irp.nih.gov/</u>



