



THE AMERICAN
ASSOCIATION OF
IMMUNOLOGISTS

AAI NEWSLETTER

JUNE/JULY 2017



**AAI Members Participate in
Capitol Hill Day, Advocate
for Biomedical Research**

– Details, cover photo captions: p. 6

AAI COURSE IN BIG DATA ANALYSIS IN IMMUNOLOGY

SOLD OUT!
Wait list available

September 6–9, 2017

Johns Hopkins University Montgomery County Campus Rockville, Maryland

www.aai.org/education/courses



The vast amount of immunological data has pushed immunology research into the big data era. The challenge for immunologists is to transition from working with data, to obtaining knowledge that can be used to generate data-driven hypotheses. Knowledge discovery relies on both the availability of accurate and well-organized data, and proper analysis.

The **AAI Course in Big Data Analysis in Immunology** will provide hands-on training in specialized analysis of large immunological datasets. Topics covered include, but are not limited to: reproducibility, introduction to programming (Linux and R), high-throughput flow cytometry data analysis,

RNA sequencing data analysis, downstream analysis, biological data repositories (ImmPort, Immune Epitope Database, and Analysis Resource), and biological networks. This course is taught by leading bioinformatics experts and is suitable for attendees with a background in immunology. Previous programming experience is helpful but is not required. Course attendees will need to bring their own laptops.

This course is sponsored by The American Association of Immunologists, the largest association in the world for professional immunologists.

www.aai.org/education/courses

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About/Departments-Staff



Features

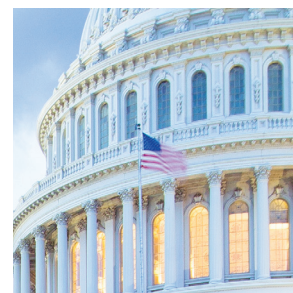
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4 AAI Election Results



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Connect with AAI!


Have a story idea for a future issue of the *AAI Newsletter*? Send us an email! Interested in staying up with the latest on AAI? Keep in touch through our social media channels. Follow us on Twitter, "Like" us on Facebook, and keep abreast of daily developments in the world of immunology.

 @ImmunologyAAI

 @J_Immunol (*The Journal of Immunology*)

 @ImmunoHorizons (*ImmunoHorizons*)

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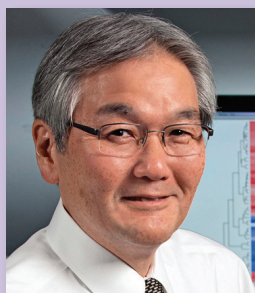
 AAINewsletter@aai.org (story ideas and comments about the *AAI Newsletter*)

2017 AAI Election Results

AAI congratulates the following members on their election to the AAI council and committees. All terms commence July 1, 2017. AAI extends a sincere thanks to all candidates who agreed to stand for election. Twenty-four percent of AAI voting members participated in the election. We thank them for investing in their profession and in the mission of AAI.

COUNCIL

President 2017–2018



Wayne M. Yokoyama, M.D., AAI '84
Investigator - Howard Hughes Medical Institute; Sam J. Levin and Audrey Loew Levin Professor of Arthritis Research; Professor of Medicine and of Pathology and Immunology - Washington University School of Medicine in St. Louis

Vice President 2017–2018



JoAnne L. Flynn, Ph.D., AAI '96
Professor, Department of Microbiology and Molecular Genetics - University of Pittsburgh School of Medicine

Councillor 2017–2021



Mark M. Davis, Ph.D., AAI '88
Investigator, Howard Hughes Medical Institute; Burt and Marion Avery Family Professor, Department of Microbiology and Immunology; Director, Stanford Institute for Immunity, Transplantation and Infection - Stanford University School of Medicine

COMMITTEES

Awards Committee 2017–2020

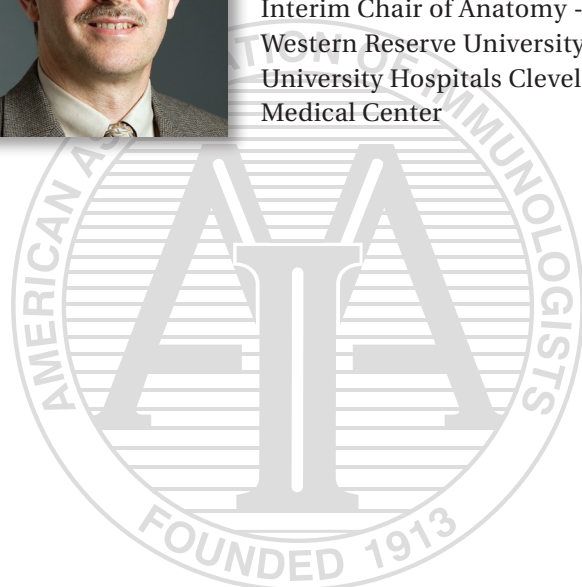


Yasmine Belkaid, Ph.D., AAI '13
Chief, Mucosal Immunology Section - NIAID, NIH

Finance Committee 2017–2020



Clifford V. Harding, M.D., Ph.D., AAI '91
Kahn Professor and Chair of Pathology; Director, Medical Scientist Training Program; Interim Chair of Anatomy - Case Western Reserve University/ University Hospitals Cleveland Medical Center



Nominating Committee 2017–2018



Kate A. Fitzgerald, Ph.D., AAI '06 - Chair

Professor of Medicine and Director, Program in Innate Immunity - University of Massachusetts Medical School



Bonnie B. Blomberg, Ph.D., AAI '82

Professor, Department of Microbiology and Immunology - University of Miami Miller School of Medicine



Ananda W. Goldrath, Ph.D., AAI '05

Professor, Division of Biology Section of Molecular Biology - University of California San Diego



Elizabeth J. Kovacs, Ph.D., AAI '89

Director of Burn Research and Professor, Department of Surgery - University of Colorado Denver / Anschutz Medical Campus



Andrey S. Shaw, M.D., AAI '91

Senior Staff Scientist - Genentech

Program Committee 2017–2020



Carolina B. López, Ph.D., AAI '05

Associate Professor of Microbiology and Immunology, Department of Pathobiology - University of Pennsylvania



Daniel B. Stetson, Ph.D., AAI '09

Associate Professor of Immunology - University of Washington

Publications Committee 2017–2021



Tania H. Watts, Ph.D., AAI '90

Professor and Sanofi Pasteur Chair in Human Immunology, Department of Immunology - University of Toronto

... Coming this summer in the AAI Newsletter

- New AAI President's Message and Profile: Wayne M. Yokoyama, M.D.
- IMMUNOLOGY 2017™ Meeting Photos and Highlights
- AAI Council Welcomes Mark M. Davis, Ph.D.
- 2017-2018 AAI Committee Rosters

89 AAI Members Visit Congress to Advocate for Biomedical Research

In conjunction with IMMUNOLOGY 2017™, AAI was pleased to hold its largest-ever Capitol Hill Day on May 16. A total of 89 AAI members from 21 states participated in the Hill Day visits. The participants met with members of Congress or staff from 85 congressional offices.

The Capitol Hill visits took place approximately two weeks after Congress approved, and President Donald Trump signed into law, a spending bill that included a \$2 billion increase for NIH for fiscal year (FY) 2017 (see “FY 2017 Spending Bill Includes \$2 Billion Increase for NIH,” page 9). As a result, Hill Day participants expressed their gratitude that Congress, for the second year in a row, had prioritized investment in NIH. (This strong congressional statement of support for NIH was especially welcome and important, coming on the heels of a recommendation from President Trump that Congress cut the FY 2017 NIH budget by \$1.2 billion.) Participants also urged members

of Congress to provide NIH with a budget of at least \$35 billion in FY 2018 and to ensure that any funds provided to NIH for 21st Century Cures Act initiatives supplement, but do not supplant, regular NIH appropriations.



Michigan ... L-R: Katrina Hoyer, Thomas Rothstein, Nichol Holodick, Rep. Fred Upton (R-MI, 6th; holding a signed copy of the 21st Century Cures Act), Anita Zaitouna, and Shaun O'Brien

About the cover – Captions for the four Capitol Hill Day photos shown on the newsletter cover are as follows (in order, from top image to bottom):

New York ... L-R: Michael Princiotta, Alicia Soucy, Erin Meegan from the Office of Rep. Brian Higgins (D-NY, 26th), Kelly Singel, Gary Koretzky, and James Kobie

Georgia ... L-R: Alexander Wein, Jennifer “Lori” Blanchfield, and John Klement

Maryland ... L-R: Suzanne Ostrand-Rosenberg, Ziky Ababiya from the Office of Sen. Chris Van Hollen (D-MD), Kathleen Stevens, and Corey Mallett

Minnesota ... L-R: Amir Sadighi Akha, Kristina Burrack, Devavani Chatterjea, and Courtney Malo

To assist with Hill Day, AAI recruited 28 current and former members of the AAI Council and Committee on Public Affairs, as well as former AAI Public Policy Fellows, to lead the groups to—and during—their appointments. AAI is deeply appreciative to the following members who led or co-led these Hill visits:

- | | |
|-----------------------------|--------------------|
| Jennifer “Lori” Blanchfield | Nichol Holodick |
| Lori Borghesi | Katrina Hoyer |
| Tullia Bruno | Stephanie James |
| Kristina Burrack | Louis Justement |
| Judy Cannon | Gary Koretzky |
| Ling Cao | Elizabeth Kovacs |
| David Chaplin | Joshua Obar |
| Devavani Chatterjea | Shaun O’Brien |
| Jonathan Deane | Rebecca Pompano |
| Jeffrey Frelinger | Michael Princiotta |
| Beth Garvy | Linda Sherman |
| William Green | Erica Stone |
| Susanna Greer | Rachel Temple |
| Jonathan Harton | Linda Thompson |

AAI prepared Hill Day attendees by holding two training sessions at IMMUNOLOGY 2017™; AAI Director of Public Policy and Government Affairs Lauren Gross gave a presentation on the state of the NIH budget, the key messages that needed to be communicated during the meetings, and the general dos and don’ts of visiting Capitol Hill.



Tennessee ... L-R: Louis Justement, Michael Korrer, Xizhi Guo, Heather Smallwood, Rep. Steve Cohen (D-TN, 9th), Maureen Ann McGargill, and Merla Hubler



Illinois ... L-R: Elizabeth Sukut from the Office of Sen. Tammy Duckworth (D-IL); Phillip Verhoef; Samia Khan and Elizabeth Kovacs



Hill Day attendees gather into their groups and prepare for the day’s meetings



Kentucky ... L-R: Beth Garvy, Michele Kosiewicz, Rep. John Yarmuth (D-KY, 3rd), Charles Lutz, and Subbarao Bondada



2017 INTRODUCTORY COURSE IN IMMUNOLOGY

July 11–16, 2017 | UCLA Luskin Conference Center | Los Angeles, California

Director: Juan Carlos Zúñiga-Pflücker, Ph.D.

University of Toronto and Sunnybrook Research Institute

Don't miss the most comprehensive introduction to immunology available!

This intensive two-part course, taught by world-renowned immunologists, provides a comprehensive overview of the basics of immunology. This course is for students new to the discipline or those seeking more information to complement general biology or science training. **Part I (July 11–13)** is a detailed introduction to the basic principles of immunology and is suitable for students with a general biology background. **Part II (July 14–16)** is a clinically oriented lecture series focusing on specialty areas.

Parts I and II may be taken independently at the discretion of the student.

Faculty

Juan Carlos Zúñiga-Pflücker, *University of Toronto and Sunnybrook Research Institute*

Introduction to the Immune System

Lewis L. Lanier, *University of California, San Francisco*

Innate Immunity: Introduction to the Cells

Deborah A. Fraser, *California State University Long Beach*

Complement

Helen S. Goodridge, *Cedars-Sinai Medical Center*

Innate Immunity: Introduction to Pattern Recognition and Intracellular Signaling

Wendy L. Havran, *The Scripps Research Institute*

Introduction to Adaptive Immunity

Nilabh Shastri, *University of California, Berkeley*

Antigen Processing and Presentation

Juan Carlos Zúñiga-Pflücker, *University of Toronto and Sunnybrook Research Institute*

MHC Restriction and Thymic Selection

David Nemazee, *The Scripps Research Institute*

B Cell Development and Maturation

Christine Moussion, *Genentech, Inc.*

Dendritic Cells: The Bridge Between Innate and Adaptive Immunity

Michael Croft, *La Jolla Institute for Allergy and Immunology*

Effector T Cell Differentiation and Response

Shane Crotty, *La Jolla Institute for Allergy and Immunology*

B Cell Activation and Humoral Immunity

M. Carrie Miceli, *University of California, Los Angeles*

Signaling in the Immune System

Ninan Abraham, *University of British Columbia*

Cytokines

Stephen M. Hedrick, *University of California, San Diego*

Host-Pathogen Co-evolution in Human Beings: the Red Queen and the Grim Reaper

Megan K. Levings, *University of British Columbia*

T and B Cell Tolerance

Matthias G. von Herrath, *La Jolla Institute for Allergy and Immunology*

Autoimmunity

Michelle Hickey, *University of California, Los Angeles*

Transplantation

Cathryn Nagler, *University of Chicago*

Mucosal Immunology

Marion Pepper, *University of Washington*

Type 2 Immunity

Antoni Ribas, *University of California, Los Angeles*

Tumor Immunology

Robert L. Modlin, *University of California, Los Angeles David Geffen School of Medicine*

Immunity to Bacterial Pathogens

Elina Zuniga, *University of California, San Diego*

Immunity to Viruses

Martin Prlic, *Fred Hutchinson Cancer Research Center*

Immunologic Memory

Nicole Frahm, *Fred Hutchinson Cancer Research Center*

Vaccination

Donald B. Kohn, *University of California, Los Angeles*

Genetic Approaches to Immune-Mediated Diseases

Andrew C. Chan, *Genentech, Inc.*

Bench to Bedside to Bench: Current Issues in Immunology

For complete course details and registration, visit: www.aai.org/Education/Courses

For assistance, contact (301) 634-7178 or meetings@aai.org. Overseas applicants are advised to apply early for visas; for details, visit www.aai.org/Education/Courses/Visa.html.

Financial support for underrepresented minority scientists is available through the FASEB MARC Program; for details, visit www.faseb.org/Professional-Development-and-Diversity-Resources/Travel-Awards.aspx.

FY 2017 Spending Bill Includes \$2 Billion Increase for NIH

Nearly eight months into fiscal year (FY) 2017, Congress approved, and President Donald Trump signed into law, an omnibus appropriations bill that increases the NIH budget by \$2 billion (6.2%) to ~\$34.1 billion. This is the second consecutive year that NIH has received a \$2 billion funding increase and reflects the strong bipartisan support that NIH enjoys in Congress. This year's increase is particularly noteworthy, as it was provided despite a recommendation by President Trump to cut the NIH budget by \$1.2 billion.

The funding increase includes \$352 million previously provided to NIH through the 21st Century Cures Act for four specific programs: The Beau Biden Cancer Moonshot, the Brain Research through Advancing Innovative Neurotechnologies (BRAIN) Initiative, the Precision Medicine Initiative (PMI), and an effort to further the field of regenerative medicine. The recently passed funding bill also includes a number of specific funding allocations:

- a \$400 million increase for research on Alzheimer's disease (for a total funding level of \$1.391 billion);
- a \$120 million increase for the PMI;
- a \$110 million increase for the BRAIN Initiative;
- \$50 million in additional funding for research on antibiotic resistance;
- a \$16.1 million increase for the Clinical and Translational Science Awards program (for a total funding level of \$516.1 million);
- a \$12.5 million increase for the Institutional Development Award program (for a total funding level of \$333.4 million); and
- a \$32 million increase for the NIH Common Fund (for a total funding level of \$695.5 million).

All NIH institutes and centers received additional funding in the FY 2017 spending bill, including an increase of approximately \$270 million (6%) for the National Institute of Allergy and Infectious Diseases, a \$174 million increase (3.4%) for the National Cancer Institute, and a \$448 million increase for the National Institute on Aging (\$400 million of which is earmarked for research on Alzheimer's disease).

Other health and science agencies received more modest funding increases for FY 2017:

- a \$22 million (0.3%) increase for the Centers for Disease Control and Prevention;
- a \$9 million (0.13%) increase for the National Science Foundation; and
- a \$25 million (7.14%) increase for the Agriculture and Food Research Initiative at the U.S. Department of Agriculture.

The foundation for this significant increase was laid last year when the Senate Labor, Health and Human Services, Education, and Related Agencies (Labor-HHS) Appropriations Subcommittee, led by Senators Roy Blunt (R-MO) and Patty Murray (D-WA), passed a bill that included a \$2 billion increase for NIH for FY 2017. The House Labor-HHS Appropriations Subcommittee, led by Representatives Tom Cole (R-OK, 4th) and Rosa DeLauro (D-CT, 3rd), also passed a funding bill with a smaller but substantial increase of \$1.25 billion.

FY 2018 Trump Budget Would Cut NIH Funding by More Than \$7 Billion

AAI Submits Testimony Recommending at Least \$35 Billion for NIH for FY 2018

President Donald Trump released his full budget proposal for fiscal year (FY) 2018 on May 23. The president proposes to cut the NIH budget by approximately \$7.4 billion (~21.5%) from its current funding level of \$34.3 billion to just \$26.9 billion. He also recommends eliminating the NIH Fogarty International Center; establishing a flat, indirect cost reimbursement rate of 10%; reducing the salary cap from Executive Level II (\$187,000) to Executive Level V (\$151,700); and making the Agency for Healthcare Research and Quality, an agency that is currently part of the Department of Health and Human Services, a new NIH institute (the "National Institute for Research on Safety and Quality"). Under the proposed consolidation, the new institute would receive \$272 million in discretionary funding in FY 2018, which would further reduce available funding to current NIH programs.

One of the more detailed NIH proposals contained in the Trump budget is on indirect costs, which are costs that cannot be

Continued, next page

attributed to a specific research project and include facility and administrative expenses, such as utilities, the use of buildings and equipment, and clerical staff. The proposal states, in part, that “[t]he Budget includes an indirect cost rate for NIH grants that will be capped at 10 percent of total research. This approach would be applied to all types of grants with a rate higher than 10 percent currently and will achieve significant savings in 2018. It would also bring NIH’s reimbursement rate for indirect costs more in line with the reimbursement rate used by private foundations, such as the Gates Foundation, for biomedical research conducted at U.S. universities” (<https://www.whitehouse.gov/sites/whitehouse.gov/files/omb/budget/fy2018/msar.pdf>). Because NIH currently spends slightly more than \$6 billion each year on indirect cost reimbursements, even an indirect cost rate of 0% would not offset the cut that President Trump has proposed.

NIH is not the only science/research agency that would suffer under President Trump’s FY 2018 budget: it would also cut the National Science Foundation by \$820 million, the Centers for Disease Control and Prevention by \$1.2 billion, the Agriculture and Food Research Initiative by \$26 million, and the Department of Energy’s Office of Science by \$919 million.

Following the March release of President Trump’s “skinny budget” (a shorter version of his full budget proposal), which recommended \$5.8 billion cut to NIH in FY 2018, AAI Committee on Public Affairs Chair Beth A. Garvy, Ph.D., released a statement (www.aai.org > Public Affairs) expressing deep opposition to the proposed cut. Garvy also quoted 12 key lawmakers, both Republicans and Democrats, who immediately spoke out against the proposed cut to NIH.

On May 25, Garvy submitted testimony on behalf of AAI to the Senate Labor, Health and Human Services, Education, and Related Agencies Appropriations Subcommittee, recommending an appropriation of at least \$35 billion for NIH for FY 2018, in addition to any funding provided to NIH through the 21st Century Cures Act. Garvy included in the testimony the reaction of AAI to President Trump’s FY 2018 budget request:

“AAI is extremely alarmed that President Trump’s FY 2018 budget proposal for NIH includes, among many other concerns, the following: 1) an unprecedented and disastrous budget cut of about 21% that would cause irreparable damage to NIH and to ongoing research across the nation; 2) the elimination of the Fogarty International Center, which would seriously impede NIH’s ability to promote global health and prevent pandemics and other international health crises; and 3) the implementation of an immediate 10% cap on indirect costs to research institutions, which could drive many independent research institutions out of business and cause fiscal havoc at many others.” (To view the full testimony, visit aai.org > Public Affairs.)

Congress continues to demonstrate strong bipartisan support for NIH, as evidenced by the recent \$2 billion funding increase for FY 2017 (after President Trump had proposed cutting the NIH

budget by \$1.2 billion). Just as they did after the release of the skinny budget, members of Congress are speaking out against many different aspects of President Trump’s budget; several have noted that presidential budgets, which serve as a blueprint for federal spending, are often dead on arrival, as the Constitution gives Congress the “power of the purse.” The release of the president’s budget is, therefore, only the first step in the long annual budget and appropriations process.

Congressional Hearing Focuses on Advances in Biomedical Research

The House Labor, Health and Human Services, Education, and Related Agencies Appropriations Subcommittee held an oversight hearing on May 17 on advances in biomedical research, with a focus on the impact of NIH-funded research (to view the full hearing, see <https://appropriations.house.gov/calendar/eventsingle.aspx?EventID=394868>). The hearing included opening remarks from the Subcommittee Chair Tom Cole (R-OK, 4th) and Ranking Member Rosa DeLauro (D-CT, 3rd), as well as testimony from NIH Director Francis Collins, M.D., Ph.D. Collins was accompanied by five NIH institute directors, including National Institute of Allergy and Infectious Diseases Director Anthony Fauci, M.D. (AAI ’73).

In his opening statement, Cole explained that “investment in NIH has been the key driver in making the United States the world leader in biomedical research and has led to vast improvements in life expectancy and quality of life.” DeLauro noted that work at the NIH “represent[s] the power to do more good for more people than anything else within the purview of our government.” Both Cole and DeLauro spoke to the bipartisan congressional support for NIH, highlighting the \$2 billion increase in the NIH budget in the recently passed fiscal year (FY) 2017 omnibus appropriations bill. They also both expressed disappointment with President Trump’s proposed budget cut to NIH for FY 2018, with DeLauro stating that it would “inflict immeasurable harm on one of the jewels of our scientific research.”

Collins thanked the subcommittee for the budget increases that Congress provided to NIH in FY 2016 and FY 2017, which he said will “ensure that our nation remains the global leader in the life sciences and advances in human health.” He highlighted several recent NIH advances in biomedical research that show the “transformational power of investing in basic science,” including the treatment of cancer with immunotherapy. Collins also described the importance of the next generation of researchers to the future of the biomedical research enterprise and explained the economic impact of NIH: the agency directly supports 379,000 jobs and indirectly supports seven million jobs. Members of Congress asked questions about a variety of topics, including the recently proposed NIH Grant Support Index, the impact of the NIH Fogarty International Center, and the role of indirect costs in supporting research.

AAI Welcomes 7th Class of Public Policy Fellows

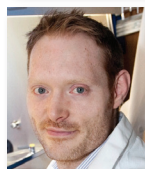
AAI launched the 2017–2018 AAI Public Policy Fellows Program (PPFP) on May 1, 2017. The PPFP is designed to engage postdoctoral fellows and other junior scientists in AAI public policy and legislative activities that impact biomedical research. To date, 60 early-career scientists have completed the program. AAI is pleased to welcome the following new Fellows:



Heather M. Buechel, Ph.D.
Postdoctoral Scholar
University of Pittsburgh



Timothy Rosean, Ph.D.
Postdoctoral Research Associate
University of Virginia



David J. Dowling, Ph.D.
Postdoctoral Research Fellow
Boston Children's Hospital
and Harvard Medical School



Nathaniel Schuldt, Ph.D.
Postdoctoral Fellow
University of Minnesota



Mariana Guerra-Maupome, D.V.M.
Research Assistant/Ph.D. student
Kansas State University
College of Veterinary Medicine



Julie Swartzendruber, Ph.D.
Assistant Professor
Midwestern University



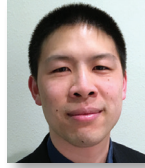
Farrah C. Phillips, Ph.D.
Postdoctoral Research Associate
St. Jude Children's Research Hospital



Melissa M. Walker, Ph.D.
Postdoctoral Fellow
University of Colorado School of Medicine



Rachel S. Resop, Ph.D.
Postdoctoral Research Fellow
University of California Los Angeles



Spencer C. Wei, Ph.D.
Postdoctoral Fellow
University of Texas MD Anderson Cancer Center

AAI will be accepting applications for the 2018–19 PPFP in December. Questions about the program should be directed to AAI Science Policy and Legislative Affairs Specialist Jake Schumacher at jschumacher@aai.org.

CPA Session at IMMUNOLOGY 2017™ Focuses on Trump Budget, NIH Grant Support Index

The AAI Committee on Public Affairs (CPA) hosted a policy session/town hall meeting at IMMUNOLOGY 2017™ entitled “Biomedical Research Priorities in the New Administration and Congress.” The session focused heavily on President Trump’s proposed NIH budget and NIH’s recently proposed Grant Support Index (GSI; see page 12).

Speaker Jocelyn Kaiser, a staff writer at *Science* magazine, provided an overview of emerging policy issues at NIH, including preliminary information on the GSI. CPA Chair Beth Garvy provided details on the \$2 billion funding increase



CPA session attendees wait in line to ask questions and share their thoughts

Continued, next page

that NIH received for fiscal year (FY) 2017 and described the president’s alarming efforts to reduce the NIH budget by \$1.2 billion in FY 2017 and by another \$5.8 billion in his skinny budget request for FY 2018 (see “FY 2018 Trump Budget Would Cut NIH Funding by More Than \$7 Billion,” page 9).

Kaiser and Garvy were joined by two panelists, Wayne Yokoyama, M.D., AAI vice president, and David Chaplin, M.D., Ph.D., chair of the CPA NIH Subcommittee, for the town hall portion of the meeting. Many AAI members welcomed, and took advantage of, the opportunity to ask questions and share their thoughts on a variety of key issues, including the GSI. To solicit as much frank feedback as possible, Garvy announced that AAI had set up a dedicated email address for member comments: GSI@aai.org.



Addressing CPA session attendees, session chair Beth Garvy (left) alongside panelists (L-R) Jocelyn Kaiser, David Chaplin, and Wayne Yokoyama

NIH Abandons Plan for Grant Support Index; Launches Instead the “Next Generation Researchers Initiative”

AAI Urged NIH to Release All Details, Seek Independent Analysis, and Consider Stakeholder Concerns Before GSI Implementation

On May 2, the National Institutes of Health (NIH) announced plans to implement a new policy for allocating grant funding (see NIH Director’s blog, <https://www.nih.gov/about-nih/who-we-are/nih-director/statements/new-nih-approach-grant-funding-aimed-optimizing-stewardship-taxpayer-dollars>). The approach, which was previously referred to as the Research Commitment Index (RCI) and was renamed the Grant Support Index (GSI), was intended to reallocate funding to deserving early stage and mid-career investigators and maximize grant dollar productivity. The GSI would have limited NIH support for individual investigators using a point system that assigned values to grants based on their type, complexity, and size. Investigators would have been capped at 21 points, which is equivalent to three R01 awards.

As described in the blog of NIH Director Francis Collins (see link above), and the Open Mike blog of Deputy Director for Extramural Research Michael Lauer, M.D. (see <https://nexus.od.nih.gov/all/2017/05/02/nih-grant-support-index/>), the GSI was developed to address the fact that 10 percent of NIH-funded investigators currently receive more than 40 percent of available funds. NIH also asserted that “incremental research output gradually diminishes as the amount of support per investigator increases.” Implementation of the GSI would, according to NIH, allow it to fund more investigators, which could “maximize the number of important discoveries that can emerge from the science [NIH] support[s] and thus, returns on the taxpayers’ investments.” Although many important details, including the actual point scale, were not finalized, NIH planned to implement the GSI for applications submitted in September 2017, and said that it would solicit input from the community through comments on the Open Mike blog and during the spring NIH Advisory Council meetings.

Many concerns were raised about whether—and how—the policy would achieve its stated goals, and whether it would have unintended consequences. The concerns included whether use of the GSI would undermine peer review, essentially penalizing those with the “best science,” and whether it would discourage collaboration and the training of the next generation of researchers.

Prior to the NIH May 2 announcement, AAI had invited Dr. Lauer to speak to the AAI Council at its May 12 meeting about the RCI, an offer that Lauer accepted. On May 15, AAI held a “town hall meeting” at IMMUNOLOGY 2017™ to inform meeting attendees about the GSI and allow them to share their opinions and concerns (see related article, page 10). AAI also launched, and publicized, a dedicated email address to solicit additional input from AAI members.

After engaging the immunology community, AAI President Arlene H. Sharpe, M.D., Ph.D.; AAI Vice President Wayne M. Yokoyama, M.D.; AAI Past President Dan R. Littman, M.D., Ph.D.; and AAI Committee on Public Affairs Chair Beth A. Garvy, Ph.D., sent a letter to Dr. Collins and other key NIH officials. The letter expressed support for “the stated goals of this policy: to fund a larger number of deserving early stage and mid-career investigators and to maximize grant dollar productivity,” but requested “that NIH delay implementation of the GSI until: NIH is able to release all details, after which the public is given fair and adequate time to review and consider the proposal through a formal RFI [Request for Information]; an independent body such as the [National Academies of Sciences] is able to analyze and evaluate the proposal; and NIH has time to – and does in fact – consider all comments received as well as seriously consider alternative plans to support early and mid-career [principal investigators].” The AAI letter was highlighted in a recent *Science*

article as one of two sets of comments submitted by scientific societies (see <http://www.sciencemag.org/news/2017/06/critics-challenge-nih-finding-bigger-labs-aren-t-necessarily-better>). The full text of the letter can be accessed at www.aai.org.

On June 5, NIH Principal Deputy Director Lawrence Tabak, D.D.S., Ph.D., met with members of the FASEB Board and with the executive officers and public affairs staff from FASEB societies. At this meeting, Dr. Tabak presented some modifications to the GSI, the most notable being that the NIH now considered the GSI a “pilot” study. Tabak also stated that “the immunologists were particularly exercised” about the GSI. Later that day, Tabak gave a presentation to the National Institute of Allergy and Infectious Diseases Council, during which he stated that a majority of comments that NIH had received were from immunologists.

On June 8, at a meeting of the Advisory Committee to the NIH Director, Collins announced that NIH would not implement the GSI, and will instead launch a program called the “Next Generation Researchers Initiative.” According to Collins, the decision to abandon the GSI was based on community input that expressed “significant concerns about the GSI methodology for assessing research impact, and the potential for application of a GSI-based cap on total support to discourage team science, complex trials, research networks, and the support of infrastructure and training” (see NIH Director’s statement, <https://www.nih.gov/about-nih/who-we-are/nih-director/statements/launching-next-generation-researchers-initiative-strengthen-biomedical-research-enterprise>).

“AAI is very pleased that the NIH Next Generation Researchers Initiative will provide increased support for deserving early stage and mid-career investigators. We look forward to working with NIH to ensure that this new program strikes the right balance between providing this needed support and ensuring that the best scientists, at all career stages, continue to receive ample funding.”

- **AAI President Arlene H. Sharpe, M.D., Ph.D.**

The Next Generation Researchers Initiative will provide increased support for meritorious early-stage investigators as well as mid-career investigators who either just missed funding for their first competitive renewal or are seeking a second Research Project Grant, with a goal of extending the payline to the 25th percentile for these cohorts. The initiative, effective immediately, will provide flexibility to each NIH institute and center to rearrange current priorities and use existing programs and funding mechanisms to provide additional support to deserving early-stage and mid-career investigators. NIH estimates that it will spend about \$210 million on the Initiative in year one, with the goal of reaching a steady state of about \$1.1 billion over the next five years. The full details of the new initiative can be accessed at <https://grants.nih.gov/ngri.htm>. NIH is also accepting comments on the development and implementation of this Initiative at publicinput@od.nih.gov.

AAI welcomes members’ input on this new NIH initiative at NIHNextGen@aai.org.

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Want to hear the latest from The American Association of Immunologists? You can find AAI and its journals, *The Journal of Immunology* and *ImmunoHorizons*, through your favorite social media channels:

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Harvard Medical School*
*Innate Immunity: Pattern Recognition and
Anti-microbial Mechanisms*

Bruce Horwitz, *Brigham & Women's Hospital
Harvard Medical School*
Innate Immunity: Gene Regulation

Paul Kubes, *University of Calgary*
Innate Immunity: Cellular Mechanisms

Wayne M. Yokoyama, *Washington University School
of Medicine*
*NK Cells — Their Receptors and Function in
Health and Disease*

John P. Atkinson, *Washington University School
of Medicine*
*Complement System in Innate and
Adaptive Immunity*

Edward M. Behrens, *Children's Hospital
of Philadelphia*
Dendritic Cells

Eugene M. Oltz, *Washington University School
of Medicine*
*The Generation and Modification of Lymphocyte
Antigen Receptor Genes*

Lisa A. Borghesi, *University of Pittsburgh School
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B Cell Development

Avinash Bhandoola, *NCI, NIH*
T Cell Development

Kai W. Wucherpfennig, *Dana-Farber Cancer Institute
Harvard Medical School*
*MHC-restricted Antigen Presentation
to T Cells*

Leslie J. Berg, *University of Massachusetts
Medical School*
Signaling from Antigen Receptors

David Masopust, *University of Minnesota
Center for Immunology*
T Cell Memory

Joshy Jacob, *Emory University*
B Cell Memory

Arup K. Chakraborty, *Massachusetts Institute
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*Computational Modeling of Immunological
Processes*

Brian A. Cobb, *Case Western Reserve University
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Bruce D. Walker, *Ragon Institute of MGH,
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Immune Response to Pathogens

Jennifer Anolik, *University of Rochester
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B Cell Tolerance and Autoimmunity

David A. Hafler, *Yale School of Medicine*
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Jonathan Kipnis, *University of Virginia School
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Financial support for underrepresented minority scientists is available through the FASEB MARC Program; for details, visit www.faseb.org/Professional-Development-and-Diversity-Resources/Travel-Awards.aspx.

MEMBERS IN THE NEWS

Allison, Casadevall, Rothman Elected to American Academy of Arts and Sciences

James P. Allison, Ph.D., AAI '92; Arturo Casadevall, M.D., Ph.D., AAI '98; and Paul Rothman, M.D., AAI '92, have been elected to the American Academy of Arts and Sciences (AAAS), joining 228 of the world's most accomplished scholars; scientists; writers; artists; and civic, business, and philanthropic leaders as new academy members in 2017.



Jim Allison is a professor and the Vivian L. Smith Distinguished Chair in Immunology at the University of Texas MD Anderson Cancer Center in Houston. Dr. Allison has contributed a broad range of seminal work to the field, including determining the molecular immunology of T cell

activation and the definition of signaling events that lead to differentiation of naïve T cells and those that determine whether antigen receptor engagement will lead to functional activation or inactivation of T cells. An important part of this work, enhancing T cell responses by blocking the inhibitory receptor CTLA-4, has been applied to the development of new strategies for the treatment of autoimmune diseases and for immunotherapy of cancer; in particular, the CTLA-4-blocking drug ipilimumab has had unprecedented results in the treatment of metastatic melanoma. Allison's work has stimulated discovery of additional immune checkpoints and development of experimental drugs to block them, and the resulting clinical trials are demonstrating effectiveness against a variety of other cancers.

Allison is a past AAI president (2001–2002) who served on the AAI Council from 1996 to 2003. He was the 2011 recipient of the AAI Lifetime Achievement Award and received the AAI-Dana Foundation Award in Human Immunology Research in 2008. A past AAI Distinguished Lecturer, Allison has been a major symposium speaker and chair on multiple occasions at the AAI annual meeting, where he has also served as an abstract programming chair. He is a past associate and section editor for *The Journal of Immunology* and has served as an AAI Advanced Course in Immunology faculty member.

A member of the National Academy of Sciences (NAS) and Institute of Medicine (now National Academy of Medicine), Allison has served on numerous review panels on behalf of NIH, NAS, and other institutions. He is the director of the Cancer Research Institute Scientific Advisory Council and a past member of the National Cancer Institute Board of Scientific Counselors and has held editorial appointments on behalf of numerous scientific journals. His many career honors include the Lasker-DeBaKey Clinical Medical Research Award, Breakthrough Prize in Life Sciences, Canada Gairdner International Award, American Society of Clinical Oncology Science of Oncology Award, Lloyd J. Old Award in Cancer Immunology, Novartis Prize for Clinical Immunology, The Economist's Innovations Award for Bioscience, William B. Coley Award for Distinguished Research in Basic and Tumor Biology, Association of American Medical Colleges Award for Distinguished Research in the Biomedical Sciences, Pezcoller Foundation–American Association for Cancer Research International Award for Cancer Research, and NIH Method to Extend Research in Time (MERIT) Award.

A native of Alice, Texas, Allison earned his bachelor's degree in microbiology and doctorate in biological sciences from the University of Texas at Austin. After completing a postdoctoral fellowship in molecular immunology at Scripps Clinic and Research Foundation, Allison joined the faculty of the MD Anderson Science Park–Research Division in Smithville, Texas. In 1985, he was appointed a professor at the University of California, Berkeley, where he directed the Cancer Research Laboratory from 1985 to 2004 and served in a number of other senior posts. From 2004 to 2012, he was a Howard Hughes Medical Institute (HHMI) Investigator and chair of the Immunology Program at Memorial Sloan Kettering Cancer Center and held senior scientific appointments at the Weill School of Medical Sciences of Cornell University. He returned to the University of Texas MD Anderson Cancer Center in 2012, where his current appointments include executive director of the Immunotherapy Platform, deputy director of the David H. Koch Center for Applied Research of Genitourinary Cancers, and associate director of the Center for Cancer Immunological Research.

Continued, next page

MEMBERS IN THE NEWS



Arturo Casadevall is the Alfred and Jill Sommer Professor and Chair of the Department of Molecular Microbiology and Immunology and Bloomberg Distinguished Professor at the Johns Hopkins Bloomberg School of Public Health and a professor of medicine at the Johns Hopkins School of Medicine. Dr.

Casadevall's laboratory pursues a multidisciplinary research program, spanning several areas of basic immunology and microbiology. Much of the laboratory's research focuses on understanding the pathogenesis of the fungal pathogen *Cryptococcus neoformans*, which causes disease in immunocompromised individuals, and on how the host defends against this organism. In recent years, his group has also begun to study other microorganisms, including *Bacillus anthracis* and *Mycobacterium tuberculosis*, and is working to develop antibody-based countermeasures to protect against anthrax and tuberculosis.

A member of the AAI Minority Affairs Committee (MAC), Casadevall is a past presenter of the AAI Vanguard Lecture and has served on multiple occasions as a MAC Roundtable discussion leader at the AAI annual meeting. His additional career appointments include service on multiple NIH study sections and other advisory and review panels on behalf of NIH [including the National Institute of Allergy and Infectious Diseases (NIAID) Board of Scientific Counselors and NIAID Blue Ribbon Panel on Bioterrorism Research], National Science Foundation, National Science Advisory Board for Biosecurity, U.S. Centers for Disease Control, Burroughs Wellcome Trust, U.S. Department of Veterans Affairs, U.S. Department of Agriculture, Institut Pasteur, American Society for Microbiology (multiple committees), American Academy of Microbiology, Medical Mycology Society of America, and more than 15 scientific journal editorial boards. Casadevall's career honors include election to the National Academy of Medicine (formerly Institute of Medicine) and to the American Association for the Advancement of Science, American Society of Microbiology (ASM) Founders Award for Distinguished Service, Albert Einstein College of Medicine Faculty Mentoring Award, ASM William Hinton Award (for mentoring under-represented minority scientists), NIH MERIT Award, Rhoda Benham Award from the Medical Mycology Society of America, Maxwell L. Littman Award (Mycology), Solomon A. Berson Medical Alumni Achievement Award in Basic Science from the New York University (NYU) School of Medicine, and Leo M. Davidoff Society membership for outstanding teaching at the Albert Einstein College of Medicine.

A Cuba native and chemistry graduate of Queen's College, City University of New York, Casadevall received his master's (biochemistry), Ph.D. (biochemistry), and M.D. degrees from

NYU. He completed his medical internship and residency at Bellevue Hospital/NYU Medical Center, a fellowship in infectious diseases at the Albert Einstein/Montefiore Medical Center, and postdoctoral fellowship in the Matthew Scharff lab at the Albert Einstein College of Medicine. He was subsequently named to successive Einstein faculty appointments as assistant, associate, and full professor of medicine and microbiology and immunology and served as chair of microbiology and immunology and director of the Center for Immunological Sciences. In 2015, he assumed his current appointments at Johns Hopkins.



Paul Rothman is the Frances Watt Baker, M.D., and Lenox D. Baker Jr., M.D., Dean of the Medical Faculty of the Johns Hopkins University School of Medicine, vice president for medicine of the Johns Hopkins University, and chief executive officer of Johns Hopkins Medicine. Dr. Rothman's research focused

on cytokines and the role they play during normal leukocyte development as well as abnormal development that can result in leukemia. His lab also investigated the function of cytokines in Th2 responses in the development of allergies and asthma. Much of his work involved investigating how kinases, suppressor of cytokine signaling (SOCS) proteins, and transcription factors impacted lymphocyte differentiation and function in these contexts.

Rothman is a past associate editor for *The Journal of Immunology*. He has served on numerous study sections and other advisory and review panels on behalf of NIH, U.S. Food and Drug Administration, American Lung Association, American Academy of Allergy, Asthma & Immunology, Association of Professors of Medicine, American Thoracic Society, Pew Scholars Program, Israel Cancer Research Fund, and Italian Ministry for Education and Research. A past president of the Association of American Physicians, Rothman has received numerous additional career honors, including election to the National Academy of Medicine, American Society for Clinical Investigation, American Association for the Advancement of Sciences, and American College of Physicians and receipt of the James S. McDonnell Foundation Career Development Award, Pfizer Scholars Award, Pew Scholar in the Biomedical Sciences Award, Leukemia Society of America Scholar Award, Pharmacia Allergy Research Foundation International Award, and NIH Physician Scientist Award.

Raised in Queens, New York, and a biology graduate of the Massachusetts Institute of Technology, Rothman received his M.D. from Yale University. He undertook his medical internship and residency, along with a rheumatology fellowship, at Columbia-Presbyterian Medical Center. In

1986, he was appointed an instructor in clinical medicine at Columbia University College of Physicians and Surgeons, where he completed an HHMI postdoctoral fellowship in biochemistry in the Fred Alt lab. Beginning in 1989, Rothman held successive appointments as assistant professor; chief of the pulmonary, allergy, and critical care division; and associate professor before being named professor of medicine (immunology) and microbiology in 2001. From 2004 to 2012, Rothman served as head of internal medicine and later, dean of the Carver College of Medicine at the University of Iowa, where he also led its clinical practice plan. He assumed his current Johns Hopkins appointments in 2012.

Finn Receives Lloyd Old Award Honors



Olivera (Olja) J. Finn, Ph.D., AAI '83, a past AAI president (2007–2008), is the 2017 recipient of the American Association of Cancer Research–Cancer Research Institute (AACR–CRI) Lloyd J. Old Award in Cancer Immunology. The award annually recognizes an active scientist whose outstanding and innovative research

in cancer immunology has had a far-reaching impact on the cancer field.

Dr. Finn is a distinguished professor of immunology and surgery at the University of Pittsburgh School of Medicine. Her laboratory has a long-standing interest in the study of T cell responses against adenocarcinomas, including breast, pancreatic, colon, and lung cancer, with the goal of designing effective cancer immunotherapies, primarily cancer vaccines. In the 1980s, Finn's laboratory began studying human T cell responses against these tumors and identified an abnormal form of the mucin MUC1 as a tumor antigen. This work led to the development of the immunodominant peptide epitope from this molecule into a vaccine that is being investigated in multiple types of cancer and premalignant conditions. The lab also investigates more basic mechanisms of tumor immunosurveillance and hopes that the knowledge gained from these studies will assist in the development of “universal” vaccines that could protect against both pathogens and cancer.

An elected member of the AAI Council from 2002 to 2009, Finn was the 2016 recipient of the AAI Lifetime Achievement Award, in recognition of her extraordinary career of scientific achievement, leadership of the field, and service to AAI. She is a past member of the AAI Program Committee and AAI Committee on Public Affairs and has served as a major symposium chair and speaker on multiple occasions at the AAI annual meeting. She has also served as a mentor and keynote speaker at career development programs organized by the AAI Committee on the Status of Women and AAI Education Committee, lecturer for the AAI Advanced Course, AAI delegate to the International Union

of Immunological Societies (IUIS) General Assembly, member of the IUIS Council, and chair of the IUIS Gender Equality and Career Development Committee.

Finn's additional career honors include the National Cancer Institute (NCI) Outstanding Investigator Award, Merrill Egorin Scientific Leadership Award from the University of Pittsburgh Cancer Institute, Sadie Gerson Award for Colon Cancer Research, city of Pittsburgh “Olivera J. Finn Day” honors (March 8, 2013), University of Pittsburgh Chancellor's Distinguished Research Award, and multiple outstanding mentoring awards from the University of Pittsburgh. Her advisory and review panel appointments include service on behalf of the Wistar Institute, Colorado Comprehensive Cancer Center, Canadian Vaccines Program, Vaccine and Gene Therapy Institute of Florida, NCI, the V Foundation for Cancer Research, Canadian Institutes of Health Research, American Cancer Society, and European Research Council. Her current and past editorial board appointments include service on behalf of multiple scientific journals, including the *Journal of the NCI*, *Cancer Immunology Research*, *Journal of Experimental Medicine*, *Cancer Prevention Research*, *Clinical Cancer Research*, *Immunology and Cell Biology*, *Cancer Immunology*, and *Immunotherapy*.

Finn received her Ph.D. from Stanford University, where she also completed a postdoctoral fellowship in the Ronald Levy lab. After later serving as a research assistant at Duke University, she was appointed an assistant professor in the Department of Microbiology and Immunology at Duke and then served as an affiliate scientist in the Division of Immunology at Emory University. In 1991, she moved to the University of Pittsburgh as a program leader and associate professor. She served as program leader of the Cancer Immunology Program at the University of Pittsburgh Cancer Institute from 1991 to 2014 and as founding Department of Immunology chair from 2001 to 2013.

Yasmine Belkaid is von Behring Prize Honoree



Yasmine Belkaid, Ph.D., AAI '13, has received the 2017 Emil von Behring Prize in recognition of her exceptional research in mucosal immunology. Presented biennially by Philipps University, Marburg, Germany, the honor for extraordinary contributions to the fields of immunology,

microbiology, or virology is one of the highest endowed German awards in medical science, providing a monetary prize of €20,000, underwritten by GlaxoSmithKline Pharmaceuticals. Dr. Belkaid represents the first woman honoree in the 36-year history of the award.

Belkaid is a senior investigator and chief of the Mucosal Immunology Section in the Laboratory of Parasitic Diseases at the National Institute for Allergy and Infectious Diseases

MEMBERS IN THE NEWS

(NIAID), NIH. Her laboratory focuses on a variety of aspects of barrier immunity. Her early work identified IL-10 and Tregs as major determinants of microbial persistence in the tissues and later demonstrated that the gut was the primary site of peripheral induction of Tregs key to mucosal tolerance. In addition to exploring the long-term consequences of nutrient deprivation on tissue immunity, Belkaid's lab at the NIH also examines how infections can alter host immune homeostasis. More recently, her lab has been working to understand the interactions between the microbiota and the immune system and has demonstrated that commensal bacteria in the gut are required for effective mucosal vaccines and that skin microbes can control skin immunity.

Belkaid has served as a major symposium chair and speaker on multiple occasions at the AAI annual meeting, where she has also served as a table leader at the Careers in Science Roundtable, annually co-sponsored by the AAI Committee on the Status of Women and AAI Education Committee. Her additional career honors and appointments include the Sanofi-Institute Pasteur Award, International Union of Biochemistry and Molecular Biology Gold Medal, elected fellow of the American Academy of Microbiology, NIH Method to Extend Research in Time (MERIT) Award (multiple), NIH Director's Award, and the Ellison Foundation New Scholar Award in Infectious Diseases. She has served on numerous advisory and review panels on behalf of NIH, including the Action Task force on Gender Inequity, Immunology Interest Group, Institutional Biosafety Committee, Working Group on Women in Biomedical Careers, Tenure and Promotion

Committee, Trans NIH Center for Human Immunology, Immunology Interest Group, and Mucosal Immunology and Microbiome Interest Group, as well as for other organizations, including the Kennedy Institute (Oxford), Singapore Immunology Network, Kenneth Rainin Foundation, Howard Hughes Medical Institute–NIH Research Scholars Program, and NIH–University of Pennsylvania Immunology Graduate Program Partnership. Her current and past editorial board appointments include service on behalf of multiple scientific journals, including the *Journal of Experimental Medicine*, *Cell*, *Current Opinion in Immunology*, *Science*, *Mucosal Immunology*, and *PloS for Neglected Tropical Diseases*.

A native of Algeria, Belkaid received bachelor's and master's degrees in biochemistry from the University of Science and Technology Houari Boumediene, Algiers. She obtained her Ph.D. in immunology from Orsay University, Pasteur Institute (France), researching innate responses to *Leishmania* infection. Following a postdoctoral fellowship at NIAID, where her research focused on immune regulation during *Leishmania* infection, she joined the Cincinnati Children's Hospital Research Foundation as an assistant professor in 2002. In 2005, she joined the Laboratory of Parasitic Diseases at NIAID as a tenure-track investigator. She has served since 2014 as director of the NIAID Microbiome Program; since 2008, she has also held an appointment as an adjunct assistant professor of pathology and laboratory medicine at the University of Pennsylvania.



IN MEMORIAM

Daniel R. Salomon, M.D., AAI '11 January 27, 1953–November 10, 2016



AAI offers condolences to the family, friends, and colleagues of The Scripps Research Institute Professor Daniel R. Salomon, M.D., a transplant immunologist, who died of colon cancer last fall at the age of 63. The following Scripps remembrance, first published on the Scripps website on November 14, 2016, appears with that institute's kind permission.

Daniel R. Salomon, a professor at The Scripps Research Institute (TSRI), passed away November 10 after battling his colon cancer for nearly two years. He was 63.

"Dan was a great colleague and a terrific human being," said TSRI President Peter Schultz.

"Dan was the definition of a clinician-scientist and a gifted teacher and mentor," said James Williamson, TSRI's dean of graduate and postdoctoral studies and vice president for academic affairs. "In addition, he was a remarkable person—a theme reiterated by so many colleagues who knew him here at TSRI."

After undergraduate studies at Northwestern University (1973), he received an M.D. from the Stritch-Loyola School of Medicine (1976). He did a medical residency at Cedars-Sinai Medical Center, University of California, Los Angeles, from 1976 to 1979, becoming chief medical resident in 1980. This training was followed by nephrology and

transplantation immunology fellowships at the Brigham and Women's Hospital, Harvard Medical School.

In 1984, Salomon became medical director of the Kidney and Heart Transplant Programs at the University of Florida. In 1990, he moved to the Laboratory of Immunology at the National Institutes of Health to concentrate on basic research in molecular immunology and transplantation.

He arrived at TSRI in 1993, with a joint appointment at Scripps Health's Scripps Green Hospital, where he became co-director of the Center for Organ and Cell Transplantation.

At TSRI, Salomon's research focused on various aspects of transplantation and immunology with a primary focus on the functional genomics of human kidney, liver, and islet transplantation. One major goal was to discover biomarkers for the diagnosis of acute and chronic rejection, the management of immunosuppression, and prognostic markers for transplant outcomes. Another objective in functional genomics was to understand the multidimensionality of transcriptional regulation, including microRNA regulation and alternative splicing in lymphocyte activation. His lab also investigated islet xenotransplantation, the molecular virology of Porcine Endogenous Retrovirus, therapeutic angiogenesis, and applications of gene therapies to cell transplantation.

In a 2013 article on his work (https://www.scripps.edu/newsandviews/e_20130603/salomon.html), Salomon said, "I've worked hard to link my medical interests to basic science, all the way down to cell biology and chemistry. TSRI's science-focused, collaborative environment is perfect for that approach. Doing the best basic science possible and taking every opportunity created by good science and outstanding collaborators to translate the findings to a better understanding of health and disease is why I'm still here."

Salomon published more than 127 manuscripts and 46 chapters, as well as edited three books. In addition, he recently served as president of the Society of Transplantation, as well as in leadership positions on the Regulatory Affairs Committee for the American Society of Gene Therapy; National Institutes of Health (NIH) Islet Cell Resources Steering Committee; NIH Genomics of Transplantation Cooperative Research Program Steering Committee; and Biological Response Modifiers Advisory Committee for the U.S. Food and Drug Administration.

Williamson relates, "Dan was a truly wonderful friend, and many of us got to know him especially well through surfing. We spent countless hours in the water together over the last 10 years, discussing science and politics, and especially the politics of science. We actually got a major grant funded for a project that we conceived over the course of two years of discussions while surfing. Those sessions in the waters of North County really embodied how he viewed life: it was the quality time that counts. As we would depart, tired from a session, I would give him a hug and say, 'Good to be with you!' Yes, Dan, it was good to be with you...for all of us."

Salomon is survived by his wife Lauren; his children Marc and Rennie; his mother; and four grandchildren. The family held a private memorial service.

In memory of Dr. Salomon, a former American Society of Transplantation (AST) president and Transplantation and Immunology Research Network co-founder, the Salomon family and the AST have partnered in the creation of the Frontiers in Transplantation Endowment (FITE).

Reflecting Dr. Salomon's principal goal of improving the lives of those with end-stage organ disease by pushing the boundaries of current research, FITE will support a sustainable award that promotes translational science while advancing the type of transformative research for which he advocated. The award will foster high risk/high payoff science by supporting untested, potentially transformative research ideas or approaches that apply diverse expertise or that engage novel or interdisciplinary perspectives applicable to transplantation science.

Donations to FITE are being accepted on an ongoing basis through the Power2Save fundraising site, where gifts should be designated to the "Daniel R. Salomon Memorial Fund." To donate, visit https://4agc.com/donation_pages/ecff99a5-dcc2-4492-bc79-2e8de94294ce.

To view the AST tribute to Dr. Salomon, visit <https://www.myast.org/about-ast/presidents-blog/memorial-daniel-r-salomon-md>.



EDITOR-IN-CHIEF

The Journal of Immunology

The American Association of Immunologists
seeks applicants for the position of
Editor-in-Chief for *The Journal of Immunology*

The Journal of Immunology (The JI) is a scholarly, peer-reviewed journal owned and published by The American Association of Immunologists (AAI) – a non-profit, professional association representing almost 8,000 scientists world-wide dedicated to the field of immunology. First published in 1916, *The JI* is published twice monthly in print and online.

The Editor-in-Chief (EIC) is responsible for maintaining *The JI* as a definitive resource within the research community. To achieve this goal, the EIC must ensure the scientific excellence of the content and the integrity of the peer-review process. To that end, the EIC will recommend an editorial board for appointment by the AAI Publications Committee and approval by the AAI Council; be responsible for the oversight of editorial conduct and the peer-review process; address concerns of authors; and make final decisions on manuscript publication. The EIC will address allegations of author misconduct and act in accordance with *The JI* Editorial Policies and Practices, and AAI policy.

The EIC is responsible to the AAI Publications Committee and, ultimately, to the AAI Council, and is an *ex officio* member of both groups.

Applications are invited from active AAI members in good standing who have an accomplished scientific career, appropriate editorial experience, strong leadership qualities, and vision for the future of *The JI*.

The term of service for this position is from July 1, 2018 to June 30, 2023. The appointed EIC is expected to overlap with the incumbent EIC starting January 1, 2018, to ensure a smooth transition of responsibilities. A stipend and associated expenses are provided.

Interested individuals are invited to submit an application package that includes a *curriculum vitae*; a succinct letter of interest and qualifications; a statement on the possible conceptual direction of *The JI* in its pursuit of scientific excellence; and innovations that may be considered.

Applications will be accepted through July 7, 2017. Please mail or e-mail them to:

Chair
AAI Publications Committee, c/o AAI
1451 Rockville Pike, Suite 650
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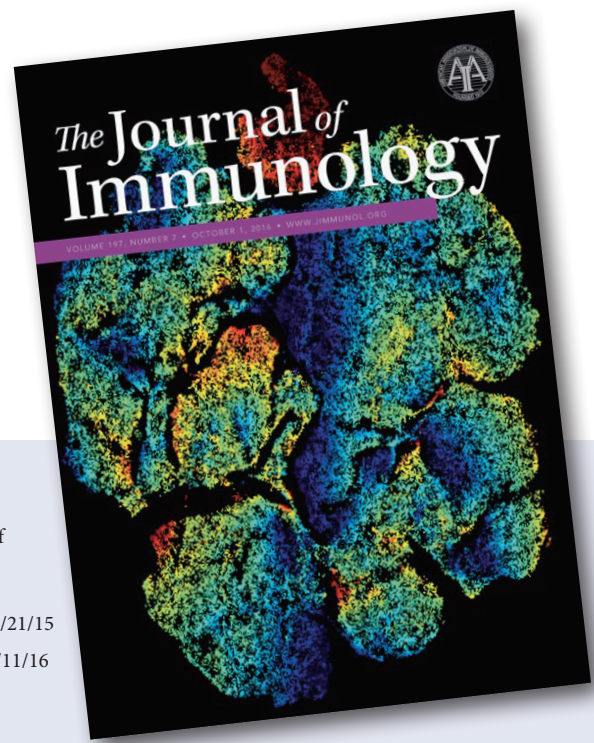
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1. 2015 Journal Citation Reports
2. Eigenfactor is a “metric that uses citing journal data from the entire Journal Citation Report file to reflect the prestige and citation influence of a journal by considering scholarly literature as a network of journal-to-journal relationships”. <http://thomsonreuters.com/content/dam/openweb/documents/pdf/scholarly-scientific-research/fact-sheet/esi-jcr-brochure.pdf>, accessed 12/23/15
3. https://scholar.google.com/citations?view_op=top_venues&hl=en&vq=med_immunology, accessed 12/21/15
4. <http://www.scimagojr.com/journalrank.php?area=2400&country=US&order=h&ord=desc>, accessed 7/11/16
5. <http://nexus.od.nih.gov/all/2016/03/02/nih-publication-impact-a-first-look/>, accessed 3/2/16

2017 Winter Cycle Travel for Techniques Award Recipients

The six AAI members pictured below were selected as recipients of the Travel for Techniques Award for the winter application cycle that concluded in February. The program reimburses up to \$1,500 in travel expenses for a member PI or designated lab member to travel to another laboratory to learn a technique or method that might benefit his or her current or future research goals. Proposals are considered on a rolling basis, with application deadlines in February, June, and October.



Sara Anvari, M.D. (AAI '17)
*Assistant Professor of Pediatrics,
Baylor College of Medicine*

Anvari intends to visit Kari Nadeau's laboratory at Stanford University to learn how to isolate dendritic cells, co-culture dendritic cells with T regulatory cells and optimize proliferation assays

using food antigens as stimulants, and identify food antigen-specific CD4⁺ T cells using tetramers. She plans to apply these techniques to analyze samples from food allergy patients undergoing oral immunotherapy to help in assessing the safety and efficacy of the immunotherapy regimens.



Tesfaye Belay, Ph.D. (AAI '16)
Professor, Bluefield State College

Belay will travel to the laboratory of Ashlesh Murthy at Midwestern University to develop a new mouse line with beta2 adrenergic receptor knockout on CD4⁺ T cells. This will further his studies on the role of norepinephrine receptor-mediated

cellular signaling in the pathogenesis of stress-induced enhancement of severity of chlamydial genital infection and immune response in mice.



Melinda M. Dean, Ph.D. (AAI '16)
*Senior Research Fellow, Australian
Red Cross Blood Service*

Dean will visit Sandra Nance at the American Red Cross Immunohematology Reference Laboratory to be trained in the monocyte monolayer assay, which is used to identify anti-RBC

antibodies that are likely to result in adverse transfusion reactions, and assist in the identification of appropriate units of blood that would be suitable for transfusion to patients with anti-RBC antibodies. This will allow her to return to Australia and implement a comparative assay, ensuring the best possible outcomes for transfusion recipients there.



Kerstin Nundel, Ph.D. (AAI '14)
*Instructor, University of
Massachusetts Medical School*

Nundel will visit the laboratory of Harinder Singh at the Cincinnati Children's Hospital to become an expert in RNA-seq, FAIRE-seq and STARR-seq techniques and the required bioinformatics analysis.

This will further her studies in the analysis of epigenetic changes in B cells in response to BCR/TLR9 co-activation.



Joyce Rauch, Ph.D. (AAI '83)
*Professor, Research Institute of the
McGill University Health Centre*

Rauch's graduate student will travel to the laboratory of Eric Boilard at Laval University to learn the methodology of an immune complex-mediated systemic shock model and analysis of circulating

platelet microparticles. These techniques will enable them to identify the role of platelet microparticles and IgG-mediated anaphylaxis in the systemic shock and premature death observed in their systemic lupus erythematosus model.



Michael Schnoor, Ph.D. (AAI '12)
*Assistant Professor, Centre for
Research and Advanced Studies*

Schnoor will travel to the laboratory of Anuska Andjeikovic at the University of Michigan Medical School to learn analysis of endothelial permeability and leukocyte trafficking in the brain

after middle cerebral artery occlusion-induced brain injury. This will further his studies on the role of actin-binding proteins for the regulation of blood-brain barrier functions in gene-deficient mice in health and disease.

AAI will invite applications for the fall cycle of the program starting August 15, 2017.

The Career Advisory Board

A RESOURCE FOR SENIOR POSTDOCS AND EARLY-CAREER FACULTY



Have you just started your first lab? Trying to juggle research, teaching, and service?

Are you facing new and puzzling issues that an established scientist can answer?

The Career Advisory Board (CAB) is a referral service that matches senior postdocs (start of fourth year and beyond) and early-career PIs who submit requests for guidance on specific career issues with more senior scientists with experience and insights in those areas. The program is not meant to replace the mentoring programs at a scientist's home institution, but rather to serve as a resource for senior postdocs and early-career PIs to obtain advice on a specific question from established investigators outside of their home institutions—often through a single phone call.



ELIGIBILITY: The CAB is open to all senior postdocs (start of fourth year and beyond) and early-faculty AAI members.

APPLY HERE: <http://aai.org/CAB>

Selected Topics

- Balancing family and work
- Timing for first grant submission
- Recruiting
- Handling personnel issues
- Managing a lab
- Finding a mentor
- Building networks
- Preparing for leadership
- Balancing service obligations
- Teaching
- Serving on NIH study sections



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*Donors who contributed twice during the period appear in italics and are listed according to the amount of their combined contributions.

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GRANTS AND AWARDS

July 3

Rheumatology Research Foundation Awards and Grants

- **Prize/Award—*Scientist Development Award*:** Awards of up to \$225,000 for up to three years to support early-career rheumatologists in pursuing innovative research ideas through a structured and mentored research training program
- **Eligibility—**Early-career scientists, fellows in training, or those without significant prior research experience who plan to embark on careers in biomedical and/or clinical research in arthritis and rheumatic diseases
- **Prize/Award—*Investigator Award*:** Up to \$375,000 in funding for up to three years to support junior investigators conducting innovative research in the field of rheumatologic diseases
- **Eligibility—**Junior investigators—basic, translational, and clinical—holding a faculty appointment who are engaged in research relevant to the rheumatic diseases and seek support during the period that they are developing a project that will be competitive for NIH funding (i.e., for the period between their completion of post-doctorate fellowship training and establishment as an independent investigator)
- **Prize/Award—*Innovative Research Award*:** Up to \$400,000 in funding for up to two years in support of independent investigators conducting novel studies that generate new insights into the cause, progression, treatment and outcomes of rheumatic diseases
- **Eligibility—**American College of Rheumatology or Association of Rheumatology Health Professionals members who hold a doctoral degree; have a faculty appointment; exhibit evidence of research independence, scientific productivity, and career accomplishments; and are U.S. citizens or non-citizen nationals or permanent residents or meet the program's alternative qualifying criteria for students/trainees
- **Details—**<https://www.rheumresearch.org/awards-grants>
- **Contact—**(404) 365-1373; foundation@rheumatology.org

July 10

Lupus Research Alliance Research Grants for Novel Approaches to Lupus

- **Prize/Award—**Annual funding of up to \$100,000 for a term of up to three years, providing early-stage support of idea-driven, novel research projects relevant to basic, translational, or clinical investigation in lupus
- **Eligibility—**Established or new investigators in diverse disciplines who hold advanced degrees and are affiliated with institutions of higher learning in the United States; applicants need not have worked in lupus research previously
- **Details—**<http://www.lupusresearchinstitute.org/new-research-grants-novel-approaches-lupus-0>
- **Contact—**Laura Hack, Grants Administrator: (212) 218-2840; researchadmin@lupusny.org

July 14

Burroughs Wellcome Fund Investigators in the Pathogenesis of Infectious Disease Program

- **Prize/Award—**Funding of \$500,000 over five years to support the study of pathogenesis, with a focus on the interplay between human and microbial biology, shedding light on how human and microbial systems are affected by their encounters
- **Eligibility—**Accomplished investigators at the assistant professor level poised to bring multidisciplinary approaches to the study of human infectious diseases and seeking the freedom and flexibility to pursue new avenues of inquiry, including through higher-risk research projects with the potential for significantly advancing understanding of how infectious diseases work and how health is maintained
- **Details—**<https://www.bwfund.org/grant-programs/infectious-diseases/investigators-in-pathogenesis-of-infectious-disease>
- **Contact—**vmcgovern@bwfund.org (indicate “2018 PATH” in subject line)

July 15

Science and SciLifeLab Prize for Young Scientists

- **Prize/Award**—In recognition of outstanding life science research undertaken in earning a doctoral degree, three prizes of \$10,000 and online publication of entrants' award essays, and one grand prize of \$30,000 and publication of recipient's award essay in *Science*; a prize will be presented in each of four categories listed below
- **Eligibility**—Scientists awarded their Ph.D. within the previous two years (i.e., during the 2015 or 2016 calendar years) whose thesis describes research falling within one of the following categories: Cell and Molecular Biology; Genomics and Proteomics; Ecology and Environment; and Translational Medicine
- **Details**—<http://sciencemag.org/prizes/scilifelab/rules>
- **Contact**—SciLifeLabPrize@aaas.org

August 1

Fulbright Israel Postdoctoral Fellowships for American Researchers

- **Prize/Award**—Eight fellowship awards of \$40,000 each to American postdoctoral scholars to pursue research at accredited Israeli institutions of higher education for up to two academic years
- **Eligibility**—Researchers in all disciplines who have secured invitations from prospective host institutions to undertake the research proposed by the applicant
- **Details**—<http://fulbright.org.il/content/fulbright-post-doctoral-fellowships>
- **Contact**—Imri Grinberg, U.S.-Israel Educational Foundation: 011-03-5172392; imrig@fulbright.org.il

August 1

Juvenile Diabetes Research Foundation International Strategic Research Agreements

- **Prize/Award**—In amounts determined by review of project proposals, research funding grants for single or multiple investigators to address critical gaps and challenges and potential breakthroughs in Type 1 diabetes research
- **Eligibility**—Applicants who hold an M.D., D.M.D., D.V.M., Ph.D., or equivalent degree; have a faculty position or equivalent; and represent U.S. and foreign non-profit organizations; public and private universities, colleges, hospitals, and laboratories; units of state and local governments; and eligible agencies of the federal government
- **Details**—<http://grantcenter.jdrf.org/information-for-applicants/grant-mechanism-descriptions/strategic-research-agreements/>
- **Contact**—preawardsupport@jdrf.org

September 1

NIH Director's Pioneer Award

- **Prize/Award**—Funding awards of up to \$700,000 per year for up to five years in support of scientists of exceptional creativity pursuing new research directions to develop pioneering approaches to major challenges in biomedical and behavioral research
- **Eligibility**—Individual principle investigators at all career stages who are currently engaged in a new scientific research direction and will devote at least 51% of effort in the first three years to the highly innovative research proposed; preliminary data are not required
- **Details**—<https://commonfund.nih.gov/pioneer>
- **Contact**—(301) 945-7573; GrantsInfo@nih.gov

September 6

Burroughs Wellcome Fund Career Awards at the Scientific Interface

- **Prize/Award**—To foster the early-career development of researchers transitioning from undergraduate and/or graduate work in the physical/mathematical/computational sciences or engineering into postdoctoral work in the biological sciences, funding of \$500,000 over five years in support of up to two years of advanced postdoctoral training and the first three years of a faculty appointment
- **Eligibility**—U.S. and Canadian citizens or permanent residents, and U.S. temporary residents, dedicated to pursuing a career in academic research
- **Details**—www.bwfund.org/grant-programs/interfaces-science/career-awards-scientific-interface
- **Contact**—(919) 991-5100; rkelley@bwfund.org or ttaylor@bwfund.org (indicate "2018 CASI" in subject line)

September 8

NIH Director's New Innovator Award

- **Prize/Award**—In support of exceptionally innovative research ideas with the potential for unusually high impact on an important biomedical or behavioral research problem, funding awards of up to \$300,000 per year for up to five years
- **Eligibility**—Unusually creative new or early-stage investigators who have no R01 or equivalent NIH grant and are less than 10 years removed from medical internship/residency or receipt of doctoral degree; preliminary data are not required
- **Details**—<http://commonfund.nih.gov/newinnovator/index>
- **Contact**—(301) 945-7573; GrantsInfo@nih.gov



Important Dates for Two AAI Awards Programs

AAI Programs to Benefit Your Lab's Current or Future Research

AAI Careers in Immunology Fellowship

KEY DATES	APPLICATIONS OPEN	APPLICATIONS CLOSE
	JANUARY 15	MARCH 15

These fellowships provide AAI member PIs with one year of salary support for a graduate student or postdoctoral fellow in their labs. Member PIs in good standing with less than \$250,000 (excluding PI's salary) in annual direct costs are eligible to apply.

Selection is based on the potential of the trainee, merit of the project, quality of the training environment, and financial need.

Direct inquiries to fellowships@aai.org.

AAI Travel for Techniques Award Program

AWARDS CYCLE	APPLICATIONS OPEN	APPLICATIONS CLOSE
WINTER	DECEMBER 15	FEBRUARY 15
SPRING	APRIL 15	JUNE 15
FALL	AUGUST 15	OCTOBER 15

The Travel for Techniques Award is given to member PIs, reimbursing up to \$1,500 in expenses for travel to learn a new technique. Member PIs in good standing with less than \$250,000 (excluding PI's salary) in annual direct costs are eligible to apply.

Direct inquiries to awards@aai.org.

These two exciting awards programs were launched by The American Association of Immunologists in 2014, adding significantly to its already robust support for scientists through fellowships, career awards, and travel grants. For more information, visit www.aai.org/awards.

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(hosted by New Mexico Consortium and sponsored, in part, by Los Alamos National Laboratory)
Hotel La Fonda at the Plaza, Santa Fe, NM
https://conferences.newmexicoconsortium.org/conferences/synthetic_immunity_symposium_17

July 11–16, 2017

AAI Introductory Course in Immunology
UCLA Luskin Conference Center,
Los Angeles, CA
<http://www.aai.org/Education/Courses>

July 23–28, 2017

AAI Advanced Course in Immunology
Seaport World Trade Center, Boston, MA
<http://www.aai.org/Education/Courses>

August 10–11, 2017

FASEB MARC Program Postdoctoral Preparation Institute (PPI): Career Transitions—Advancing Biomedical Research Workforce
Gaylord National Resort & Convention Center,
National Harbor, MD
<http://twdprograms.org/>

September 6–9, 2017

AAI Course in Big Data Analysis in Immunology
Johns Hopkins University,
Montgomery County Campus, Rockville, MD
http://www.aai.org/Education/Courses/Big_Data/index.html

September 8–12, 2017

16th European Meeting on Complement in Human Disease
Hotel Scandic Copenhagen,
Copenhagen, Denmark
<http://emchd2017.dk/>

September 11–14, 2017

European Society for Immunodeficiencies (ESID) 2017 Meeting
Edinburgh International Conference Centre,
Edinburgh, UK
<http://esid2017.kenes.com/>

October 5–7, 2017

Leukocyte Memory: Health and Disease, 50th Annual Meeting of the Society for Leukocyte Biology
The Westin Bayshore, Vancouver, BC, Canada
<http://www.leukocytebiology.org/>

October 6–8, 2017

15th International Workshop on Langerhans Cells
Memorial Sloan Kettering Cancer Center,
Zuckerman Research Center Auditorium,
New York, NY
<http://www.lc2017.org/>

October 12–13, 2017

National Cancer Institute's Cancer Immunology and Immunotherapy: From Conception to Delivery
Masur and Lipsett Auditorium, NIH,
Bethesda, MD
<https://ncifrederick.cancer.gov/events/CancerImmunology2017/>

October 23–26, 2017

20th Annual Upstate New York Immunology Conference
The Sagamore Resort and Conference Center,
Bolton Landing, NY
<http://www.amc.edu/NYIC/>

October 26–30, 2017

American College of Allergy, Asthma, & Immunology (ACAAI) 2017 Annual Scientific Meeting
Hynes Convention Center, Boston, MA
<http://annualmeeting.acaai.org/>

November 17–20, 2017

Autumn Immunology Conference (AIC) 2017
JW Marriott, Chicago, IL
<http://www.autumnimmunology.org/>

2018

March 2–5, 2018

World Allergy Organization Meeting 2018
[in collaboration with the American Academy of Allergy, Asthma and Immunology (AAAAI)]
Orlando, FL
<http://www.worldallergy.org/meetings>

March 19–22, 2018

5th Meeting of Regulating with RNA in Bacteria & Archaea
Hotel Sevilla Macarena, Sevilla, Spain
<http://www.rna-meeting.com/>

May 4–8, 2018

IMMUNOLOGY 2018™
AAI Annual Meeting
Austin Convention Center, Austin, TX
www.IMMUNOLOGY2018.org



June 17–21, 2018

ISDCI 2018: 14th International Society of Developmental and Comparative Immunology (ISDCI) Congress
Santa Fe, NM
<http://www.isdci.org/17257/Congress>

September 2–5, 2018

5th European Congress of Immunology (ECI)—Triennial European Federation of Immunological Societies (EFIS) Joint Meeting

Amsterdam RAI Exhibition and Convention Centre, Amsterdam, The Netherlands
<https://www.eci2018.org/home/>

September 16–20, 2018

27th International Complement Workshop

Santa Fe Convention Center, Santa Fe, NM
<https://www.regonline.com/ICW2018>

November 16–19, 2018

Autumn Immunology Conference (AIC) 2018

Chicago Marriott Downtown, Chicago, IL
<http://www.autumnimmunology.org/>

2019

May 9–13, 2019

IMMUNOLOGY 2019™

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San Diego, CA

www.aai.org/Meetings/Future_Meeting.html



2020

May 8–12, 2020

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AAI Annual Meeting

Honolulu, HI

www.aai.org/Meetings/Future_Meeting.html



2021

May 12–16, 2021

IMMUNOLOGY 2021™

AAI Annual Meeting

Philadelphia, PA

www.aai.org/Meetings/Future_Meeting.html



GRIP

Grant Review for Immunologists Program

Get a GRIP: An AAI program designed to help new investigators prepare their NIH grant proposals

The AAI Grant Review for Immunologists Program (GRIP) offers new principal investigators (PIs) access to established PIs for guidance in preparing grant proposals as they embark on their independent careers. Early-career PIs (assistant professors or equivalents) are invited to submit their grants' "Specific Aims" pages to the GRIP coordinator who, with the assistance of a small volunteer subcommittee, will attempt to match each topic of the proposal with the research experience of an established PI. Matches will be made as quickly as possible to allow participants to meet upcoming NIH grant deadlines. Participation is open only to AAI regular members and is strictly voluntary. The program is not intended to supplant internal mentoring programs at applicants' institutions.

To apply, please send your CV and the grant's "Specific Aims" page to infoaai@aai.org. (please write "GRIP" in the subject line)

To volunteer as a mentor, please send your CV and a brief description of your grant-reviewing experience to infoaai@aai.org. (subject line "GRIP")



Program details at aai.org/Education/GRIP

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