NSF Advisory Committee for Business and Operations
Electronic Book
Virtual Spring 2021 Meeting
March 10, 2021

Table of Contents

National Science Foundation
Advisory Committee for Business and Operations
Spring 2021 Virtual Meeting

March 10, 2021
Zoom

Wednesday, March 10, 2021

11:00 am **Welcome/Introductions/Recap**
Co-Chairs: Chuck Grimes and Pamela Webb

11:15 am **Updates: BFA; OIRM; Budget; OLPA**

Presenters: Teresa Grancorvitz, BFA; Wonzie Gardner, OIRM; Caitlyn Fife, BFA; Amanda Greenwell, OD/OLPA

11:45 am **Award Performance Reporting Compliance Challenges**

Presentation:

NSF awards have technical progress reports that are required per 2 CFR 200 (Grant Uniform Guidance), NSF award terms and conditions, the Proposal & Award Policy and & Procedures Guide (PAPPG), and, in some cases, law (America Competes Act). While NSF has many business rules aimed at ensuring the submission of the reports, including sending reminder notices and stopping additional funding to a Principal Investigator (PI), many reports are submitted late and sometimes not at all. NSF is looking for Business & Operations Advisory Committee (BOAC) input to gather insight on what might be the issue from an awardee organization standpoint and what other actions might be taken by NSF to better comply with Federal requirements.

The non-compliance will soon become a larger issue since the latest version of the Uniform Guidance requires NSF to report to the Federal Awardee Performance & Integrity Information System (FAPIIS). FAPIIS is a government-wide database of Awardee material non-compliance and could affect the Awardee's ability to receive additional Federal funds.

NSF wishes to stop the recent trend of PIs submitting their reports closer to the overdue date and does not wish to report Awardees to FAPIIS. Reporting to FAPIIS would provide bad optics for the Awardee organizations as well as NSF.

Committee Action/Feedback

NSF is soliciting the insight of BOAC, as active members of the grants community, in terms of reasons for the non-compliance (why is the community having an issue submitting the reports?) as well as suggestions for other avenues to ensure submission of the required reports. In addition, NSF would like to seek volunteers to assist a working group in implementing additional measures to increase compliance.

Presenters: Kandis Boyd, BFA; Jeff Vieceli, BFA; Thayaga Nandagopal, CISE

Discussants: David Mayo, Kim Moreland, Pamela Webb

12:45 pm **Approval of Subcommittee for Information Technology Related to Renewing NSF**

Presentation:

The Renewing NSF program recommended six bold steps for the "Make IT Work for All" Goal Team.

1. Institutionalize mechanism to partner with industry IT leaders to continuously apply the most advanced IT solutions.
2. Streamline IT Governance to increase transparency and encourage communication and input.
3. Create new mechanism to rapidly incubate, coordinate, and demonstrate IT innovation.
4. Create intuitive and adaptive IT training methodology.
5. Develop plan to address external users' IT and data needs.
6. Appoint Chief Data Officer (CDO) to develop and implement data management plan) are either completed or in process.

To date, progress has been made on all the bold steps; with the exception of the first. We come to the BOAC today to ask a that BOAC form a subcommittee to act as NSF's "industry IT leaders", review NSF's current IT and annually recommend improvements.

Committee Action/Feedback

We would like to initiate the conversation with BOAC and see if there is the potential of a subcommittee. We would like to work with the co-chairs to hold a vote at the next meeting.

Presenters: Dorothy Aronson, OD/CIO; Sean Jones, MPS

Discussant: Tilak Agerwala

1:30 pm **Break**

2:00 pm **The Future of Work: Remote Work**

Presentation:

When the Renewing NSF workforce goal of "Adapting the workforce and the work" was established, it was accompanied by a bold step to assess the workforce desire for and feasibility of a geographically distributed workforce. This idea was a stretch goal for NSF when it was defined in 2018 and was considered something for the longer-term to explore. Fast forward to today and we have turned our mental models upside down on how we work and where we work bringing this bold step front and center.

NSF has adapted how we deliver our mission, how we support our workforce, and how we use technology. Given this, HRM is conducting an analysis of the workforce sentiment and infrastructure required to support remote work. While these findings are being developed and socialized, a fundamental conversation needs to be had around what the NSF of the future looks like.

Committee Action/Feedback

1. We believe our new normal will fall somewhere on the continuum between where we are today with a fully virtual presence and where we were before with a large part of our workforce teleworking one or two days a week. With less face-to-face interactions, how are your organizations thinking about maintaining the elements of the organizational culture that are valued and diminishing those elements that need to adapt?
2. One of the considerations when thinking through support for remote work is in recruiting talent. How should NSF think about recruiting talent to increase diversity and participation from a broader set of institutions for our Federal workforce and rotator program? What are potential pitfalls?
3. NSF senior leadership has to define the vision for the future of work at NSF. Like most organizations, much of what is ahead is uncertain. How should we think about managing that uncertainty while striking a course for our employees?

Presenters: Bill Malyszka, OIRM

Discussants: Bob Lavigna, Theresa Pardo

3:00 pm **NSF Strategic Plan Feedback**

Presentation:

The Government Performance and Results Act (GPRA) of 1993 and GPRA Modernization Act of 2010 requires federal agencies to publish their strategic and performance plans in pursuit of their missions. NSF is working to develop its 2022-2026 Strategic Plan to include strategic goals, strategic objectives, and key strategies to guide agency efforts. The strategic plan anchors a series of implementation-level plans and efforts, including:

- NSF's annual performance plan, which sets specific performance measures, such as budget and schedule execution for major research facility projects, or tracking our progress in making awards in key program areas such as the Big Ideas;
- NSF's Human Capital Operating Plan;
- Individual performance plans of senior executives; and
- Management plans of every NSF solicitation.

A prior Budget & Operations Advisory Committee recommended that NSF maintain a separate strategic goal focused on the management of the agency. Each plan since 2003 has included such a goal. Prior iterations have included: phrases like organizational excellence; stewardship; perform as a model organization; excel as a Federal agency; and most recently, enhance NSF's performance of its mission.

For the next plan, NSF seeks to consider ways to reflect the charge from Director Panchanathan to "strengthen at speed and scale" to ensure NSF is well positioned for a variety of anticipated challenges and opportunities over the next four years.

Committee Action/Feedback

NSF seeks the Committee's insights on how to structure management-related objectives, balancing the need to be a nimble organization to meet the ever-changing landscape while maintaining focus on our essential business operations.

1. How can NSF "strengthen at speed and scale" as a Federal agency?
    - What challenges unique to the Federal landscape should we be aware of?
    - What opportunities should we seize?
2. What lessons can we draw from the work, training, and outreach that we and other organizations have been able to do during the pandemic? How can we best prepare and support our workforce to "strengthen at speed and scale"?
3. How can the plan guide our efforts to balance needs between maintaining essential functions and capturing opportunities to be nimble?

Presenters: Janis Coughlin-Piester, BFA; Stephen Meacham, OD/OIA; Jennifer Plozai, OD/OLPA

Discussants: Chuck Grimes, John Kamensky

4:00 pm **Preparation for Meeting with Dr. Panchanathan and Dr. Crim**

4:15 pm **Break**

4:30 pm **Meeting with Dr. Panchanathan and Dr. Crim**

5:30 pm **Adjourn**

NATIONAL SCIENCE FOUNDATION
Business and Operations Advisory Committee

(Working) Membership List
(a/o 2/26/21) e-mail account current as of 2/26/21

Dr. Tilak Agerwala
IBM Emeritus and Retired IBM Research
Vice President
TMKA Consulting, LLC.
16 Cross Road
Cortlandt Manor, NY 10567
Email: tilak.agerwala@gmail.com
Appt Date: June 2019
Term Expires: December 2021

Dr. Benjamin L. Brown
Director, Facilities Division
Office of Advanced Scientific Computing Research
U.S. Department of Energy Office of Science
1000 Independence Ave SW, SC-31.2 GTN
Washington, DC 20858
Phone: 301.903.7785
Email: ben.brown@science.doe.gov
Appt Date: December 2017
Term Expires: December 2023

Dr. Lee Cheatham
Director, Office of Technology Deployment and Outreach
Pacific Northwest National Laboratory
902 Battelle Blvd
Richland, WA 99354
Phone: (509) 375-6597
Email: lee.cheatham@pnnl.gov
Appt Date: May 2015
Term Expires: June 2021

Cheatham's Assistant: Stephanie Bertron
Email: Stephanie.Bertron@pnnl.gov

Dr. Robert M. Dixon
Consultant
Higher Education Management
3704 Allegretto Circle
Atlanta, GA 30339
Email: dr.robertmdixon@yahoo.com
Phone: 404-245-0972
Appt Date: May 2017
Term Expires: December 2022

Mr. Adam H. Goldberg

Director and Executive Architect, Department of the Treasury
Office of Financial Innovation and Transformation
401 14th Street, SW
Washington, DC 20227
Phone: (202) 874-5734
Email: adam.goldberg@fiscal.treasury.gov
Appt Date: May 2017
Term Expires: December 2022

Mr. Charles Grimes *
Consultant
12604 Little Stones Lane
Herndon, VA 20170
Phone: (571) 455-5326
Email: chuck.grimes@outlook.com
Appt Date: May 2015
Term Expires: June 2021

Mr. John Kamensky
Senior Fellow
IBM Center for The Business of Government
Second Floor, 600 14th Street, NW
Washington, DC 20005
Phone: (202) 551-9341
Email: john.kamensky@us.ibm.com
Appt Date: May 2015
Term Expires: June 2021

Mr. Larry Koskinen
Chief Risk Officer
US Department of Housing and Urban Development
451 7th Street, SW
Washington, DC 20410
Phone: 202-402-7172
Email: larry.a.koskinen@hud.gov
Appt Date: June 2020
Term Expires: December 2022

Mr. Robert Lavigna
Director
Institute for Public Sector Employee Engagement
14 Bailey Way
Madison, WI 53711
Phone: (608) 395- 8472
Email: rlavigna@cpshr.us
Appt Date: June 2020
Term Expires: December 2022

Ms. Rachel E. Levinson
Executive Director, National Research Initiatives
Arizona State University

1800 I St., NW
Washington, DC 20006
Phone: (202) 446-0383
Email: rachel.levinson@asu.edu
Appt Date: May 2017
Term Expires: December 2022

Mr. David Mayo
Director, Office of Sponsored Research
California Institute of Technology
1200 E. California Blvd (273-6)
Pasadena, CA 91125
Phone: 626-395-6219
Email: David.mayo@caltech.edu
Appt Date: June 2020
Term Expires: December 2022

Dr. Joseph Mitchell
Director, Academy Programs
National Academy of Public Administration
1600 K St., NW, Suite 400
Washington, DC 20006
Phone: 571-334-0127
Email: joe.p.mitchell2007@gmail.com
Appt Date: April 2018
Term Expires: December 2023

Ms. Kim Moreland
Associate Vice Chancellor, Director
Research and Sponsored Programs
University of Wisconsin – Madison
21 N. Park St., Suite 6401
Madison, WI 53715-1218
Phone: (608) 263-1083
Email: kmoreland@rsp.wisc.edu
Appt Date: May 2016
Term Expires: December 2021

Theresa A. Pardo, Ph.D.
Director
Center for Technology in Government
University at Albany
187 Wolf Road, Suite 301
Albany, NY 12205
Phone: (518) 442-3892
Email: tpardo@ctg.albany.edu
Appt Date: May 2016
Term Expires: December 2021

Dr. Joel Parriott
Deputy Executive Officer and Director of Public Policy
American Astronomical Society

1667 K Street NW, Suite 800
Washington, DC 20006
Phone: (202) 556-1998
Email: joel.parriott@aas.org
Appt Date: June 2020
Term Expires: December 2022

Mr. William J. Valdez
President
Global Innovation Associates LLC
53 Walnut Avenue
Takoma Park, MD 20912
Phone: (301) 257-6676
Email: billvaldez777@hotmail.com
Appt Date: June 2020
Term Expires: December 2022

Ms. Pamela A. Webb*
Associate Vice President for Research
University of Minnesota
450 McNamara Alumni Center
200 Oak Street SE
Minneapolis, MN 55455
Phone: (612) 624-1648
Email: pwebb@umn.edu
Appt Date: January 2017
Term Expires: December 2022

Webb's Assistant: Laura Geno
Phone: (612) 626-7437
Email: genox003@umn.edu

Ms. Maureen E. Wylie
Federal Chief Financial Officer (Retired)
728 Guilford Ct.
Silver Spring, MD 20901
Phone: (240) 678-7934
Email: Maureen.E.Wylie@gmail.com
Appt Date: June 2020
Term Expires: December 2022

Committee on Equal Opportunities in Science and Engineering (CEOSE)
Liaison to the NSF Advisory Committee on Business and Operations

Dr. Alicia J. Knoedler
Director of Team Innovation
Exaptive, Inc.
124 NW 12th Street
Oklahoma City, OK 73103
Phone: (405) 761-7024
Email: knoedlaj@miamioh.edu
Appt Date: February 2014
Term Expires: January 2023

*** Committee Co-chairs**

NSF Business and Operations Advisory Committee
Member Biographies ~ Spring 2021

Dr. Tilak Agerwala
IBM Emeritus and IBM Vice President (Retired)

Tilak Agerwala's career has focused on developing advanced research programs and game-changing strategic initiatives and on bringing innovative computing technologies to market. With the rapid "digitalization" of our world and the transformative impact this is having, Tilak is interested in applying big data, modeling, simulation, analytics, and augmented intelligence technologies to world class science and engineering, education, and leadership development. He is an IBM Emeritus, Executive-in-Residence, Grove School of Engineering, City College of New York, Adjunct Associate Professor, Pace University, New York, Adjunct Professor, National Institute for Advanced Studies, Bangalore, and Member, TKMA Consulting.

In his IBM career, spanning 35 years, Tilak held executive positions in research, strategy, advanced development, marketing, and business development. He was part of and led teams that developed and delivered leadership cyberinfrastructure technologies and supercomputers to industry, academia, and the national labs. As vice president, Systems, (2002 to 2013), he was responsible for IBM's research and advanced technology activities worldwide in future systems hardware and software technologies, including the BlueGene supercomputer. As vice president of Data Centric Systems (2013-2014) his team established a new paradigm for scalable systems leading to the delivery of the powerful supercomputer, Summit, to Oakridge National Lab.

Tilak is a member of the NSF Advisory Committees on Engineering, Advanced Cyber Infrastructure, and Business and Operations. He was the 2019 Dr. S. Radhakrishnan Chair Visiting Professor at the National Institute of Advanced Studies, Bangalore India. He is a Life Fellow of the IEEE and a recipient of the W. Wallace McDowell Award from the IEEE Computer Society. He has given well over a hundred invited presentations, keynotes, and distinguished lectures at conferences, universities and national laboratories worldwide.

He has a Bachelors of Technology in electrical engineering from the Indian Institute of Technology, Kanpur, India and a Ph.D. in electrical engineering from Johns Hopkins University. From 1975-78, he was assistant professor of Electrical Engineering at the University of Texas, Austin.

Dr. Benjamin L. Brown
Director, Facilities Division, Advanced Scientific Computing Research
U.S. Department of Energy, Office of Science

Dr. Benjamin L. Brown is the Director of the Facilities Division in the Office of Advanced Scientific Computing Research (ASCR). The Division conceives, constructs, and operates world-leading open-access supercomputing, data, and networking facilities to enable the DOE mission and the national research enterprise. The Division's $575M (FY 2021) budget is devoted to operations and major upgrade projects at each of the ASCR Facilities. As Director, Ben leads strategic planning, budget formulation, and operational oversight of these strategic national resources. He is a member of the federal Senior Executive Service.

Ben is also the program manager for the Department's Project Leadership Institute, a leadership development program in project management. Ben has extensive knowledge and expertise in policy development and analysis related to large scale scientific research infrastructure and project management. A common focus in each of these roles is the strategic advancement of science and the DOE mission through cross-institutional knowledge-sharing, strategic planning, and partnership development.

Immediately prior to joining the Office of Science in 2008, Ben worked on energy and climate policy in the U.S. Senate as an American Association for the Advancement of Science (AAAS) Congressional Fellow. Ben is a physicist with experience working in U.S. government laboratories and academic institutions in both the U.S. and U.K; his research focused on optical control of quantum systems and quantum information science. He received his Ph.D. in optics from the University of Rochester and his bachelor's degree in physics from Harvard University.

Dr. Lee Cheatham
Director, Office of Technology Deployment and Outreach
Pacific Northwest National Laboratory

Lee Cheatham has focused his career on leadership in research management and operations, especially in the translation of that research into high-impact commercial products. Lee currently leads the Office of Technology Deployment and Outreach (TDO) at Pacific Northwest National Laboratory (PNNL), a Department of Energy national laboratory focused on making fundamental scientific discoveries and using its foundational capabilities to address key challenges in energy resiliency and national security. TDO's mission is to engage the Laboratory with industry, federal agencies, and state/ regional organizations in developing and licensing PNNL's technology as a basis for commercial products and to realize the greater impact of science and technology for economic growth.

Previously, Lee served as Director of Strategic Partnerships at Brookhaven National Laboratory, and as Chief Operating Officer and General Manager of Commercialization for The Biodesign Institute at Arizona State University. For twelve years prior to Biodesign, Lee led the Washington Technology Center (WTC), an organization chartered by the State of Washington to accelerate growth and expand economic impact of small and medium-sized businesses. WTC funded these companies' collaborations with university researchers and provided programs to ease their access to growth capital.

Lee has private-sector experience as Vice President of Worldwide Product Engineering for a market-leading library software company and founder of a real estate technology and services company. He has served in scientific, engineering, and development positions, as well research program management roles, for energy systems modeling, large-scale environmental and military information systems, and medical device development programs. Lee received his Ph.D. from Carnegie-Mellon University, MS from Washington State University, and BS from Oregon State University, all in electrical engineering.

Dr. Robert M. Dixon
Consultant, Higher Education Management

Robert M. Dixon is a consultant with the Registry for College and University Presidents, which is based in Peabody, MA. Here, he takes on interim leadership assignments at universities that need senior level management while in transition. Among his assignments, he has served as Interim Provost and Vice President for Academic Affairs at Cheyney University and as Vice President for Academic Affairs at the University of Maine at Fort Kent. He is currently serving as Interim Chair of the Department of Industrial and Systems Engineering at North Carolina A & T State University. During the last decade he has developed research interests in Number Theory. His career has involved dual paths of work in teaching and research, and in administrative leadership positions.

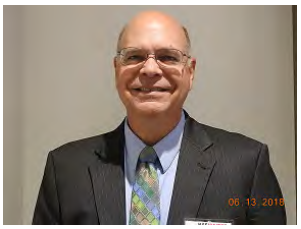
He received a baccalaureate degree in mathematics and physics with high honors from Morehouse College; a Master of Science degree in nuclear physics from Rutgers University; and a doctorate in theoretical nuclear physics from the University of Maryland. Dr. Dixon formerly served as the Dean of the School of Science at Hampton University. Prior to Hampton, he was Provost and Vice President for Academic Affairs at Grambling State University. During a period of 16 years, he was Chair of the Department of Physics at Morehouse College, a period that was characterized by considerable success in the production of graduates in the dual-degree engineering program with the Georgia Institute of Technology, in the production of graduates in physics and mathematics, and the acquisition of funded grants from foundations and federal agencies. In this period, he received funding from the Air Force Office of Scientific Research, the Army Research Office, the Office of Naval Research, the AMOCO Foundation, the General Electric Fund, the William Penn Foundation, and the Sherman Fairchild Foundation. His background includes appointments at Morgan State University, Southern Polytechnic University, and Bishop College. Notably, Dr. Dixon is the founding chair of the M. S. degree program in physics at Atlanta University (now Clark Atlanta University). Upon graduation from Morehouse College, he began a long relationship with the Woodrow Wilson National Fellowship Foundation. He received a Woodrow Wilson Fellowship to attend Rutgers University. His first academic appointment was as a Woodrow Wilson Teaching Intern at Hampton Institute (now Hampton University). During his career he has contributed as a consultant to several programs sponsored by the Foundation. After some years in academe, he served as a Director with an engineering firm. He developed and managed research projects supported by contract with the Department of Energy on nuclear waste disposal.

Throughout his career he has remained active in teaching and research, teaching at undergraduate and graduate levels. He has taught and mentored many students who have obtained the doctorate in physics or engineering. More than fifty of his former students have obtained advanced degrees in engineering, mathematics, or physics. He has maintained an active interest in research in applied mathematics. He is the author of several books and laboratory manuals in physics and articles on many-body scattering theory. He has served as a consultant to many public-school systems and universities on a wide variety of topics, such as diversity, improving the teaching and learning of science and mathematics, the preparation of mathematics teachers, expanding opportunities and increasing diversity in engineering, and improving retention. He is a member of the American Physical Society, the American Association of Physics Teachers, the American Association for the Advancement of Science, and the Mathematical Association of America.

Mr. Adam Goldberg
Director and Executive Architect
Dept. of the Treasury, Office of Financial Innovation & Transformation

Adam Goldberg is the Executive Architect at the Office of Financial Innovation and Transformation (FIT) at the Treasury Department's

Bureau of the Fiscal Service. Within FIT, Adam supports financial management transformation initiatives that lead to government-wide efficiencies. He also serves as a Treasury Advisor to the Minister of Economy and Finance in the Republic of Guinea where he supports the Minister's efforts to improve cash management. Adam joined Treasury after spending six years at the Office of Management and Budget (OMB) as the Chief of the Financial Analysis and Systems Branch where he was responsible for policy development and oversight to implement financial systems, reduce improper payments, and right-size real property. Prior to OMB, he held senior leadership positions at Unisys and Andersen supporting financial management and system improvement efforts at Federal agencies. Adam began his career at the Defense Logistics Agency. Adam holds a BA in Political Science and History from the University of Rochester and an MPA from the Maxwell School of Citizenship and Public Affairs at Syracuse University.



Mr. Charles D. Grimes III
Consultant

Charles (Chuck) Grimes is an independent consultant on HR policy and administration. He has worked with MTCI, a human capital management, training support and delivery, and program management firm; *The Public Manager*, a quarterly journal for public sector learning professionals; and the Departments of Justice, Defense, and Homeland Security. Chuck is active in the Partnership for Public Service's Strategic Advisors to Government Executives (SAGE) program in the COO and CHCO communities.

Chuck recently retired from Federal service, having served as the Chief Operating Officer for the U.S. Office of Personnel Management (OPM). In that role, he managed OPM's human, financial, and other resources to achieve intended program results efficiently, economically, and effectively.

Previously, Mr. Grimes served as the Deputy Associate Director, Employee Services, and Acting Associate Director, Employee Services and Chief Human Capital Officer at OPM. In those roles, he managed governmentwide staffing, compensation, employee and labor relations, employee development, and executive resources policies; agency outreach and veterans support; and OPM's internal human resources operation. He also headed the Performance & Pay Systems center at OPM.

Prior to joining OPM, Mr. Grimes served as the Assistant Director, Compensation Policy, in the Internal Revenue Service's Strategic Human Resources Division. He spent most of his career in the Department of Defense (DOD), where he last served as the Director, Wage and Salary Division, in DOD's Civilian Personnel Management Service. Mr. Grimes received his B.A. in Biology from the University of Virginia and an M.A. in Management and Supervision from Central Michigan University.

Mr. John M. Kamensky
Senior Fellow
IBM Center for The Business of Government

Mr. Kamensky is a Senior Fellow with the IBM Center for The Business of Government in Washington, DC, which sponsors research on management challenges facing government leaders.

During 24 years of public service, he had a significant role in helping pioneer the U.S. federal government's performance and results orientation. He is passionate about creating a government that is results-oriented, performance-based, customer-focused, and collaborative in nature. Prior to 2001, Mr. Kamensky served for eight years as deputy director of Vice President Gore's National Partnership for Reinventing Government. Before that, he worked at the U.S. Government Accountability Office for 16 years where he played a key role in the development and passage of the Government Performance and Results Act of 1993.

During his time with the IBM Center, he has edited or co-authored eight books and writes and speaks extensively on leadership, performance management, collaborative governance, and government reform.

Mr. Kamensky is a fellow of the National Academy of Public Administration and a senior fellow with the Administrative Conference of the United States.

He received a Masters in Public Affairs from the Lyndon B. Johnson School of Public Affairs at the University of Texas at Austin, and a Bachelors of Arts in Government at Angelo State University, in San Angelo, Texas.

Dr. Alicia J. Knoedler
Vice President for Research and Innovation
Miami University

Dr. Alicia J. Knoedler is the newly appointed Vice President for Research and Innovation (VPRI) at Miami University in Oxford, Ohio. As the VPRI, Dr. Knoedler leads strategic growth of research activities at Miami University and oversees the management of its research operations. She also works to expand the culture of research and innovation through an emphasis on high-impact, interdisciplinary work and the development and cultivation of strong and diverse research infrastructure and competitive capacity.

Prior to joining Miami University in 2020, Dr. Knoedler was the Director of Team Innovation at Exaptive, Inc. in Oklahoma City, Oklahoma. Exaptive is an innovation and software solutions startup company based in Oklahoma City, Oklahoma with a platform (Cognitive City) to bring together people, data, and analysis tools to form collaborative communities and encourage boundary crossing behavior in an actively-supported environment. From 2010-2018, she was Executive Associate Vice President for Research and Executive Director of the Center for Research Program Development and Enrichment (CRPDE) at the University of Oklahoma. In these roles, she specialized in working with others across the University on projects and initiatives of significant importance to OU, such as broadening participation of underrepresented groups, faculty recruitment, mentoring, and retention, and resource gap analyses related to research. Within CRPDE, she worked with faculty, students, and other investigators to significantly enhance the research enterprise, focusing on changing the research culture as well as assisting investigators in their efforts to develop more competitive research programs and proposals for external funding. Dr. Knoedler has over 20 years of experience in developing grant proposals for a variety of funding sources, including federal sources, private foundations, and corporations and is a Certified Research Administrator (CRA).

In service and leadership to research development and the national research enterprise, Dr. Knoedler is a founding member, member of the Board of Directors, and was president (2013-2014) of the National Organization of Research Development Professionals (NORDP). She is a member and Vice-Chair of the National Science Foundation's (NSF) Advisory Committee on Equal Opportunities in Science and Engineering (CEOSE) and is a member of NSF's Business and Operations Advisory Committee. She is the former Co-PI of Oklahoma's EPSCoR Research Infrastructure Improvement Track 1 award from NSF, and is a member of APLU's Council on Research, through which she is involved in developing and offering training and professional development opportunities for senior research leaders across the Nation.

Dr. Knoedler holds a B.A. in psychology from Trinity University (San Antonio), and an M.S. and Ph.D. in cognitive psychology from Purdue University. Her research expertise focused on various memory processes and optimal conditions for remembering. She taught quantitative research methodology, statistics, and grant writing for many years at Purdue University, San Jose State University, University of California Santa Cruz, Indiana University, University of Notre Dame, and Penn State University and had an appointment as Adjunct Associate Professor in the Department of Psychology at OU.

Larry Koskinen
Chief Risk Officer
US Department of Housing and Urban Development

Larry Koskinen has served the public interest for more than forty years through executive positions in the federal government, commercial professional services firms, and non-profit organizations—both within the United States and abroad. He is a member of the Federal Senior Executive Service and is currently serving as Chief Risk Officer at the United States Department of Housing and Urban Development, where he leads HUD's departmental enterprise and fraud risk management programs. During his tenure HUD has earned a positive reputation for innovative approaches to the use of advanced data analytics and computational linguistics to identify, understand and remediate program and administrative control weaknesses.

He recently led the Business Transformation Team for NewCore, HUD's administrative shared services partnership with the Treasury Administrative Resource Center, and, at the invitation of the United States Office of Management and Budget, led the project team that drafted the government-wide playbook for federal shared services adoption. Prior to joining HUD, he served as an executive in the federal Inspector General community, managing data analytics, finance, human capital, information technology, strategic planning and support operations at the Treasury Inspector General for Tax Administration and the U.S. Postal Service Office of Inspector General. He has been involved in multiple federal-level government reform efforts, notably the Reagan-era Grace Commission, and the Clinton-era National Performance Review.

Koskinen was a Vice President at the non-profit Council for Excellence in Government (programs of which are now absorbed into the non-profit Partnership for Public Service), and a Vice President at the international development consultancy Development Alternatives, Inc. Prior to that he was Director of Administration and Finance at the non-profit Regional Environmental Center for Central

and Eastern Europe in Budapest. He was Management Officer for Peace Corps International Operations and also Chief Business Architect. He served as a Peace Corps Volunteer in the Philippines.

He holds a Bachelor of Science in photography from the Rochester Institute of Technology, and a Juris Doctorate from American University's Washington College of Law.

Robert J. Lavigna
Director
Institute for Public Sector Employee Engagement

Bob Lavigna has more than 30 years of experience leading government organizations and programs. He is the Director of the *Institute for Public Sector Employee Engagement*, a division of CPS HR Consulting, an independent and self-supporting government agency. The *Institute* helps public-sector and nonprofit organizations measure and improve employee engagement as a key to improving performance and service delivery.

Bob's book, *Engaging Government Employees: Motivate and Inspire Your People to Achieve Superior Performance* (American Management Association), is the first book to focus exclusively on employee engagement in the public sector.

Before joining CPS, Bob served as Assistant Vice Chancellor and Director of HR for the University of Wisconsin. He was also an adjunct Associate Professor in the La Follette School of Public Affairs at Wisconsin.

Bob was also Vice President - Research for the Partnership for Public Service, a nonpartisan nonprofit dedicated to revitalizing the public service by inspiring new generations to serve and helping to transform government. He directed research projects, including "Best Places to Work in the Federal Government," that found new ways for government to attract, develop and retain talent.

Bob also previously served as Director of the state of Wisconsin merit system. He began his career with the U.S. Government Accountability Office (GAO) as an auditor, program evaluator, HR Director of GAO's largest field office, and Assistant to the Assistant Comptroller General.

Bob is an elected Fellow of the National Academy of Public Administration and was selected as a "Public Official of the Year" by *Governing* magazine. The organizations Bob has led also received innovation awards from the Ford Foundation, Society for Human Resource Management, Council of State Governments, International Public Management Association for HR (IPMA-HR), Urban League, and others.

He is a past president of IPMA-HR, and is also a past national chair of the American Society for Public Administration Section on Personnel and Labor Relations. In addition to his book, Bob writes frequently for professional publications and has authored three book chapters on HR. He has spoken across the U.S. and in Canada, Europe, Asia, South America, the Caribbean, Africa, and the Middle East.

He has a B.A. in Public Affairs from George Washington University, an M.S. in HR from Cornell University and has done Ph.D. work at the University of Wisconsin.

Ms. Rachel Elizabeth Levinson
Executive Director, National Research Initiatives
Arizona State University

A twenty five-year veteran of science policy at the national level, Rachel Levinson is the Executive Director of National Research Initiatives for Arizona State University, operating in the university's Washington, D.C. office. She came to ASU in 2005 as the director of the Government and Industry Liaison Office for the Biodesign Institute at Arizona State University. Levinson heads an office responsible for developing policies and strategies that advance the University's research agenda.

Prior to coming to ASU, Levinson was with the Office of Science and Technology Policy in the Executive Office of the President of the United States, where she was the assistant director for life sciences, while on detail from the Office of the Director of the National Institutes of Health. In this capacity, she identified science and technology priorities, developed and advocated Administration objectives, and resolved policy issues in life sciences focusing on laboratory biosecurity, bioterrorism preparedness, biotechnology, biomedical research and technology development and transfer.

Levinson began her career as a biologist for the National Cancer Institute within the National Institutes of Health (NIH) and later moved into the policy arena. She advanced to positions at NIH including deputy director of the NIH Office of Recombinant DNA and senior policy advisor in the Office of Technology Transfer.

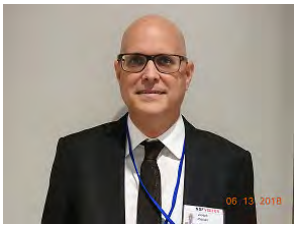
Levinson earned her B.S in Zoology from the University of Maryland at College Park, and her M.A in Science, Technology and Public Policy from George Washington University, School of Public and International Affairs.

David Mayo
Director, Office of Sponsored Research
California Institute of Technology

David Mayo is the Director of the Office of Sponsored Research at the California Institute of Technology. In this capacity he is responsible for pre-award and post-award non-financial services supporting $390M in research awards annually. David is directly responsible for review and interpretation of existing and emerging government policies and regulations, development of institutional policies and procedures, and development and implementation of training programs for campus staff in the area of research administration. Prior to his appointment at Caltech in 2002, David led the pre-award office at the University of California, Santa Barbara, where he worked in research administration in various capacities since 1981.

David has been a member of his professional association, the National Council of University Research Administrators (NCURA) since 1988 and currently serves on its Board of Directors. David served as NCURA President in 2008, received its *Distinguished Service Award* in 2009, and received NCURA's highest honor in 2012, the *Outstanding Achievement in Research Administration Award.* David has served on numerous NCURA working groups and committees. He is a content creator for

NCURA's on-line and in-person training programs, as well as a frequent presenter at its national and regional conferences on topics such as: federal and industry contracting, regulatory compliance, subcontracting, subrecipient monitoring and award management. David currently participates in the Federal Demonstration Partnership, for which he co-chairs its Contracts Subcommittee and is a member of its Subawards Subcommittee. David also participates in the Council on Governmental Relations as a member of its COVID-19 Federal Award Impact Workgroup.



Dr. Joseph P. Mitchell, III
Director of Strategic Initiatives
National Academy of Public Administration

Joe Mitchell is Director of Strategic Initiatives at the National Academy of Public Administration—an independent, nonpartisan, and nonprofit organization chartered by the U.S. Congress to improve government performance. In this role, Dr. Mitchell leads the organization's Grand Challenges in Public Administration program, which is identifying and developing ways to address the most challenging issues facing government today. He also advances cutting edge thought leadership and develops partnerships with other good government groups, American universities, and universities in other countries.

Over the course of his career, he has worked with a wide range of federal cabinet departments and agencies to develop higher-performing organizations, implement organizational change, and strengthen human capital and teams. Most recently, he was at the General Services Administration to stand up its new Office of Shared Solutions and Performance Improvement within the Office of Government-wide Policy. As an Associate Director of this new office, he built and led a team to manage multi-functional and cross-agency projects and initiatives in support of the President's Management Agenda. His team established governance and accountability mechanisms for federal Cross-Agency Priority Goals, revamped performance.gov to become more user-friendly and provide additional information to the public, upgraded and expanded the White House Leadership Development Program and CXO Fellows program, provided technical and management support to the federal executive management councils, and established a procurement vehicle that federal agencies can use to acquire commercial software-as-a-service capabilities for their payroll and work schedule/leave management.

Previously, Dr. Mitchell led and managed the National Academy of Public Administration's organizational studies program, overseeing all of its congressionally-directed and agency-requested reviews and consulting engagements. He has served as project director for studies of the Government Publishing Office, the U.S. Senate Sergeant at Arms, the U.S. Agency for International Development, the National Park Service's Natural Resource Stewardship and Science Directorate, and the Natural Resources Conservation Service at the U.S. Department of Agriculture.

He holds a Ph.D. from the Virginia Polytechnic Institute and State University, a Master of International Public Policy from the Johns Hopkins University School of Advanced International Studies, a Master of Public Administration from the University of North Carolina at Charlotte, and a B.A. in History from the University of North Carolina at Wilmington. He is a member of Phi Kappa Phi, the national academic honor society; Pi Alpha Alpha, the national honor society for public affairs and administration; and the American Society for Public Administration.

Ms. Kim Moreland
Associate Vice Chancellor, Director
University of Wisconsin - Madison

Kim Moreland is the Associate Vice Chancellor for Research and Sponsored Programs at the University of Wisconsin - Madison. She has an MBA from the University of Kansas.

Kim has served on the Board of Directors of the Council on Governmental Relations and chaired the Costing Policies Committee. She is on the Board of the Federal Demonstration Partnership and serves as chair of the Finance Committee. She is a lecturer for Johns Hopkins University in the Master's degree program in Research Administration.

Kim has served as a member of the National Council of University Research Administrators (NCURA) national and international teaching faculty and the national peer review faculty. She is a recipient of NCURA's national Award for Distinguished Service in Research Administration and the Award for Outstanding Achievement in Research Administration. She is a former president of NCURA.

Dr. Theresa A. Pardo
Director, Center for Technology in Government
University at Albany

Theresa A. Pardo, Ph.D., serves as Director of the research institute CTG UAlbany at the University of Albany, State University of New York. She is also a full research professor in Public Administration and Policy at Rockefeller College of Public Affairs and Policy. Under her leadership, CTG UAlbany works closely with multi-sector and multi-disciplinary teams from the U.S. and around the world to carry out applied research and problem solving projects focused on the intersections of policy, management, and technology in the governmental context. CTG UAlbany has broken ground in information and knowledge sharing, smart cities, open government and open data, e-government, social media policy, and mobile technologies and human services delivery.

Dr. Pardo serves as OpenNY Adviser to New York State's Governor Andrew Cuomo and is Chair of the U.S. Environmental Protection Agency's National Advisory Committee. She serves as a member of the User Working Group of the NASA Socioeconomic Data and Applications Center (SEDAC), the Business and Operations Advisory Committee of the U.S. National Science Foundation and the Steering Committee of the U.S. National Science Foundation funded North East Big Data Innovation Hub. Dr. Pardo is founder of the Global Smart Cities Smart Government Research Practice Consortium and has served on numerous UN Expert Groups on a range of digital government and sustainable development related issues.

In 2019 Dr. Pardo was elected a Fellow of the National Academy of Public Administration. She serves as an International Advisor to the E-Government Committee for the China Information Association and in 2016, served as the first female Chair of Oman's Excellence in E-Government Award Jury. Dr. Pardo is also a member of the Series Steering Committee for the International Conference on Theory and Practice of Electronic Governance (ICEGOV), a United Nations University initiative. She is a Past-President of the Digital Government Society.

Dr. Pardo serves on a number of editorial boards for top journals in the fields of digital government and public administration including Government Information Quarterly and Public Management Review. She is co-developer of the top ranked academic program in Government Information Strategy and Management offered by Rockefeller College at the University at Albany, has published over 200 articles, research reports, practice guides, book chapters and case studies and is ranked among the top five scholars in her field in terms of productivity and citations to her published work.

In 2018 and 2019, Dr. Pardo was named as one of the Top 100 Influencers in Digital Government globally. In 2019 she received the Distinguished Service Award from the Digital Government Society. She is a recipient of Government Technology Magazine's Top 25 Doers, Drivers, and Dreamers Award which recognizes individuals throughout the U.S. who exemplify transformative use of technology that is improving the way government does business and serves its citizens. Dr Pardo is a recipient of the University at Albany's Distinguished Alumni Award, the University at Albany's Excellence in Teaching Award, and the Rockefeller College Distinguished Service Award.

Pardo holds a Ph.D. in Information Science from the University at Albany, SUNY.

Dr. Joel Parriott
Deputy Executive Officer and Director of Public Policy
American Astronomical Society

Dr. Joel Parriott is the Deputy Executive Officer and Director of Public Policy at the American Astronomical Society (AAS). Here, he leads the Society's public policy and advocacy efforts and serves on the senior management team having overseen the scholarly journal, scientific conference, and membership departments.

Joel brought to the AAS a decade of experience at the White House Office of Management and Budget (OMB), where he oversaw the budgets and management initiatives for the National Science Foundation (NSF) and the Department of Energy's Office of Science (DOE/SC) and on behalf of the President. He also represented OMB on numerous National Science and Technology Council working groups and subcommittees under the Council's Committee on Science.

Prior to his service at OMB, Joel was a senior program officer at the National Academies of Science, Engineering, and Medicine, where he staffed numerous high-level advisory committee studies on policy issues in physics and astronomy for NSF, DOE/SC, and NASA.

Joel earned his doctorate in astronomy & astrophysics at the University of Michigan. He also holds a Certified Association Executive (CAE) from the American Society of Association Executives.

Bill Valdez
President
Global Innovation Associates LLC

Bill Valdez is a recognized science and technology thought leader who has successfully led science and technology programs in the Federal government and made significant contributions to the effectiveness of government programs to deliver improved mission value to American taxpayers.

Bill retired from the Federal government in 2014 and became an adjunct faculty at American University's Key Leadership Program and began consulting with public and private sector organizations to provide strategic advice on a wide ranging set of issues, including science policy and government modernization/improvement.

Most recently, Bill was the President of the Senior Executives Association (SEA), where he focused on strengthening the Senior Executive Service (SES) through legislative and policy initiatives, building a leadership pipeline for the Executive Branch, working with a broad range of good government groups to modernize the civil service, and restoring a public service ethic to the Federal government.

Bill was a co-editor/author of the *Handbook of Federal Government Leadership and Administration: Transforming, Performing, and Innovating in a Complex World,* and was an author of the IBM Center for the Business of Government's recent report, *Preparing the Next Generation of Federal Leaders: Agency-Based Leadership Development Programs*.

His career with the Department of Energy spanned over 20 years and he held the positions of Director, DOE Office of Economic Impact; DOE's Chief Diversity Officer; Director of Business Services, Office of Energy Efficiency and Renewable Energy; and Director of Planning and Analysis, and Director for Workforce Development within DOE's Office of Science. During this time, Bill became expert in the both programmatic and policy development, along with the operational side of the house including HR, procurement and IT.

From 2005-2014 Bill was the Co-Chair of the Science of Science Policy Interagency Working Group. This IWG sparked a government-wide effort to understand the impact of Federal government S&T programs and to develop tools, data and analytical techniques that are in common use at Federal science agencies today. Agencies are also using those tools and data to provide Congress with better budget proposal analyses and to inform taxpayers about the important benefits S&T programs bring to our Nation.

In addition, Bill was a senior advisor at the White House Office of Science and Technology Policy (OSTP) in the 1990s. Bill was awarded the Presidential Rank Award (meritorious) in 2007 and was elected as a Fellow of the American Association for the Advancement of Science (AAAS) in 2006.

Prior to working at DOE, Bill worked as a Senior Project Manager in private industry where he provided strategic planning services to Asian and European multinational corporations. He also was a reporter in Austin, Texas.

Bill received a Bachelor of Arts from the University of Texas and his Master of Arts in International Economics and Energy Policy from the Johns Hopkins School of Advanced International Studies.

Ms. Pamela A. Webb
Associate Vice President for Research
University of Minnesota

Pamela A. Webb is the Associate Vice President for Research at the University of Minnesota. In this capacity, she is responsible for pre-award and post-award non-financial services supporting about $876M in research awards annually, as well as negotiation of F&A rates, effort reporting, and research policy and education. Prior

to her appointment at the University of Minnesota in 2007, Pamela led pre-award and post-award administration in the Office of Sponsored Research at Stanford University. Pamela has been involved in research administration for 37 years, including 12 years at the University of California-Los Angeles as well as UC Santa Barbara, Northwestern University, and Stanford.

Pamela has served as a national officer of her professional association (the National Council of University Research Administrators, NCURA) and served two terms on NCURA's Board of Directors. In 2009, she received NCURA's *Distinguished Service* award, and in 2016, she received NCURA's highest honor, the *Outstanding Achievement in Research Administration Award*.

She has recently completed her term as Chair of the Council of Governmental Relations (COGR) Board of Directors and continues to serve on their Research Compliance and Administration Committee. She has co-chaired a national conference on Electronic Research Administration; serves as a reviewer for NCURA's Peer Review program; and as faculty for their national Leadership Workshop. Pamela previously served on the Federal Demonstration Partnership Executive Committee and currently co-chairs their Foreign Influence Working Group. Pamela is a frequent presenter at the national and regional level, specializing in subawards, policy development and deployment, as well as helping research administrators learn the complex regulatory environment.

Maureen E. Wylie
Federal Chief Financial Officer (Retired)

Maureen Wylie currently serves on the Board of Directors for SquashWise, which focuses on academics, athletics, and opportunity for Baltimore's youth, as a part of the Squash and Education Alliance. She is also a member of the Partnership for Public Service Senior Advisors to Government Executives (SAGE) program.

Ms. Wylie served as Chief Financial Officer of the U.S. Nuclear Regulatory Commission from July 2014 to December 2019, when she retired and ended her nearly 35-year career in the federal government. She was responsible for all budgeting and financial management for the agency, as well as a critical leader for its Project Aim and Transformation efforts.

While at NRC, Ms. Wylie spear headed efforts to create authoritative data not just for financial management, but also for nuclear reactor and materials program management. She conducted multi-year business process change initiatives that transformed how the agency charged fees to licensees and made the application of data analytics possible. As a member of the government-wide Chief Financial Officers' Council, Ms. Wylie served as its representative on the Technology Business Management Executive Steering Committee (ESC), leading the first full adoption of information technology cost transparency in support of that Cross-Agency Priority (CAP) goal. She was also integral to the Financial Data Transformation (ESC), bringing together the Council's data and information efforts associated with several CAP goals and with efforts to improve transparency in budgeting, financial management, and performance goals.

She previously served as the Chief, Resource and Operations Management for the National Oceanic and Atmospheric Administration (NOAA) in the Department of Commerce from January 2012 through July 2014. She was the principal executive for all matters related to the NOAA's Corporate Services. Prior to that assignment, she also served as NOAA's Chief Financial Officer from 2004. During that period, she led financial management and budgeting for the largest bureau of the

Commerce Department as it responded to increasing mission demands in its critical weather, satellites, and fisheries regulatory functions.

Ms. Wylie also served as the G8, Resources Army National Guard (ARNG), responsible for resource management for the Army National Guard from October 2001, capping nearly twenty years as a Department of the Army civilian in a variety of resource management, base realignment and closure, and facilities management roles. Special assignments during this period included stints at HQ, US European Command J-5, the Congressional Research Service, and the House Armed Services Committee Staff.

A recipient of many awards while with the Army, including the Pace Award for leadership in 1994, she received a Distinguished Executive Presidential Rank Award in 2009 and the NOAA Administrator's award in 2011. Ms. Wylie is the recipient of the Association of Government Accountants 2020 Elmer Staats Award, which recognizes a federal leader who exemplifies excellence in government financial management, outstanding leadership, high ethical standards, and innovative management.

She began government service in 1985 as an Army Presidential Management Intern. Ms. Wylie graduated with honors from Rutgers University with a BA in Political Science in 1982, from Yale University with an MA in International Relations in 1984; and was a 1999 Distinguished Graduate of the Industrial College of the Armed Forces, with an MS in National Resource Strategy. She is also a member of the 1997 class of the Defense Leadership and Management Program and a 2003 graduate of the Federal Executive Institute.

Title	Meeting Date	Fiscal Year	Recommendation	NSF Contact(s)	Status	Explanation/Outcome	Theme
Understanding the Top Five Impacts of the COVID-19 Pandemic on the National Research Community and the NSF Response Presentation	Spring 2020	FY20	A - NSF should address standardization issues with the CFO community. Also CFO's should develop a relationship with the audit community (IG's) as NSF did with the Data Act. The federal community should drive this discussion. B - Additional areas should be analyzed, such as using digitalization and virtual processes to mitigate some challenges. Further, committee member recommends the use of collaboration tools and cyber infrastructure of the future to collect data, in addition to other technology solutions.	Keith Boyea; Alex Wynnyk	CLOSED - Fully Implemented	A. NSF has been a significant contributor to the federal grants assistance community in the area of standardizing processes and data requirements. Since the last BOAC meeting, NSF has served on a small team of agency subject matter experts to develop and review data standards associated with Notice of Funding Opportunities and Notice of Awards data elements as part of OMB's implementation of the GREAT Act and related OMB memos. NSF is also contributing to OMB's efforts to upgrade its Data Standard Elements repository, which is to serve as starting point for financial assistance systems and reporting. As noted in the session, NSF meets monthly with the OIG through a Stewardship Collaborative, where areas of emerging concern ongoing operational issues are discussed. The sessions include learning presentations, topics of the day, and OIG and CFO activities. These sessions have included discussion on COVID this past year, including oversight, monitoring, the health of the research enterprise, and the role that the NSF OIG is playing in the Pandemic Response Accountability Committee (PRAC). B. During COVID, NSF has support multiple collaborative technologies to assist personnel in adjusting to 100% telework. Of significant note is the migration to OneDrive, which provides direct access from NSF computers to documents through the Cloud; use of Zoom to facilitate virtual meetings, and the introduction of MS Teams, a multipurpose collaborative platform that supports file sharing, real time audio, video, and text communication, and asynchronous communication. NSF continues to explore collaborative tools to provide the most effective suite of solutions for responding to external challenges and internal shifts on the opportunities for	Advice on NSF, BFA, & OIRM Ops; Award Administration/Oversight
Enterprise Risk Management in the COVID-19 Environment	Spring 2020	FY20	A- NSF should continue to pay attention to the maturity assessment and risk as this is a 3 to 5 year culture shift B- NSF needs to conform culture around the use of telecollaboration tools and embrace them. Reconsider physical presence of employees as a necessity in the workplace as it can be more expensive and limiting as more people can be included in conversations virtually than was previously possible given physical space limitations. C- The decision to come back to the building should be put into the hands of individual employees. A risk-based approach to this conversation balances the risk to the employee and the risk to the enterprise (NSF). Risk-based return to work is not only possible but is imperative considering the health risk to the employee and the institutional risk based on the position the employee inhabits in the organization. D- NSF and OMB to predesign a set of responses that will serve us in emergency situations and take advantage of the lessons we learn that will help streamline normal research processes.	Mike Wetklow	CLOSED - Fully Implemented	NSF has considered the Committee's advice and incorporated into the upcoming implementation of FY 2021 ERM Plans. NSF has embraced telecollaboration tools and continues to support employees and emphasizes employee safety and regulary solicits and engages employees for feedback through surverys and supervisor-employee discussions. NSF plans for returning to the building are consistent with OMB guidelines.	Advice on NSF, BFA, & OIRM Ops; Change Management

Office of Budget, Finance, and Award Management (BFA) Update
B&O Advisory Committee Meeting Spring 2021
(as of February 23, 2021)

Topics:

- BFA Senior Staff Changes
- Review of NSF's Strategy for Identifying and Responding to Risks and Impacts of COVID-19
- Risk Assessment per the Grants Oversight and New Efficiency (GONE) Act, Public Law 114-117, Section 2(c)
- Financial Statement Audit
- FY 2018 – FY 2021 Government Accountability Office (GAO) Review of NSF Major Research Equipment and Facilities Construction (MREFC)-funded Projects
- GAO Review of Digital Accountability and Transparency Act
- Digital Accountability and Transparency Act Implementation
- Program Management Improvement Accountability Act
- Advanced Monitoring and Audit Resolution
- Management Challenges
- Enterprise Risk Management
- Government Invoicing
- Unique Entity Identifier Initiative
- Proposal & Award Policies & Procedures Guide (PAPPG)
- Virtual Industry Day related to Antarctic Support Contract
- Performance
- Budget Summary

- **BFA Senior Staff Changes**
  - *Budget Division (BD)* –In September 2020, Blane Dahl was hired as the Budget Operations and Systems Branch (BOSB) Branch Chief. Mr. Dahl is returning to NSF after almost six years at the USDA in the Office of Budget and Program Analysis in several key roles. Prior to USDA, Mr. Dahl served for two years as Science Policy Analyst to the National Science Board following five years as the Budget Officer and Staff Associate for Budget and Program Analysis for the Directorate of Education and Human Resources (EHR).
  - *Division of Acquisition and Cooperative Support (DACS)* –
    - In November 2020, Ray McCollum was hired as the Procurement and Cooperative Support Policy Branch Chief. In this position, he will strengthen DACS policy role and providing effective policy guidance to our contracting officers and grants and agreements officers. Ray comes to us from the Department of State where he was a senior contracting officer. Ray also spent about a decade with the General Services Administration in a variety of roles.
    - In January 2021, Eric Schermerhorn was hired as the Contract Operations branch chief. In this position, Eric will lead the contract operations team that support IT and HR service requirements, scientific and administrative support services, and various other operational procurements. Eric comes to us from the National Nuclear Security

Administration at the Department of Energy. Prior to that, Eric worked at the Environmental Protection Agency.

- *Division of Grants and Agreements (DGA)* – In August 2020, Dr. Kandis Boyd, PMP was hired as the Deputy Division Director of DGA. Prior to joining NSF, Kandis served as both Acting Director and Deputy Director of NOAA's Weather Program Office where she managed the grants process to award funds to research institutions.
- *Division for Institution and Award Support (DIAS)* – In January 2021, Shaun Minick was hired as the Chief, Cost Analysis & Pre-award Branch. Prior to joining NSF, Shaun held progressively challenging financial and award management positions at the US Small Business Administration, the US Department of Justice, and the US Department of Labor.

➢ **Review of NSF's Strategy for Identifying and Responding to Risks and Impacts of COVID-19**
In February, the OIG issued a termination letter for its Review of NSF's Strategy for Identifying and Responding to Risks and Impacts of COVID-19. The review was initiated during July 2020. The OIG noted that interviews with NSF personnel and award recipient research administrators along with reviews of documents and presentations from NSF, the National Science Board, and advisory committees showed that NSF is actively working to evaluate and respond to the risks and impacts of the pandemic. The OIG will continue to monitor the impacts the pandemic has on the agency and its recipients, and how NSF responds.

➢ **Risk Assessment per the Grants Oversight and New Efficiency (GONE) Act, Public Law 114-117, Section 2(c)**
On December 7, 2020, the OIG conducted an exit conference covering their observations and suggestions for the GONE Act risk assessment. OIG is not recommending a GONE Act audit. The OIG will be issuing a results memo that will include several recommendations. NSF management will have an opportunity to submit a response to the results memo.

➢ **Financial Statement Audit**
NSF published the audit report on November 16, 2020 in its FY 2020 Agency Financial Report (Chapter 2). The audit report reflects an unmodified (clean) opinion, and no material weaknesses or significant deficiencies identified in the internal controls program for financial reporting. An unmodified opinion means the auditor concluded that the financial statements and accompanying notes are presented fairly, in all material respects (in accordance with U.S. GAAP) and relative to NSF's mission and the stewardship of those resources entrusted to the agency. In addition, NSF continues to be in compliance with the Chief Financial Officer's Act of 1990 and the Office of Management and Budget requirements.

In March 2021, the Office of Inspector General's (OIG) audit firm, Kearney & Company, will hold an entrance conference to begin the FY 2021 financial statement audit.

➢ **FY 2018 – FY 2021 GAO Review of NSF MREFC-funded Projects**
GAO has been required since FY 2018 by Congress to review NSF's oversight of Major Research Equipment and Facility Construction (MREFC) projects on an annual basis. This year's review focused on:

- Comparing the cost and/or schedule estimates for one or more large facilities projects under construction with GAO best practices for cost or schedule estimating.
- Assessing the earned value management data for one or more large facilities projects under construction.
- Reviewing NSF plans for Mid-scale Research Infrastructure Track 2 investments.

The April 2020 GAO report entitled *National Science Foundation: Cost and Schedule Performance of Major Facilities Construction Projects and Progress on Prior GAO Recommendations* (GAO-20-268) had no new recommendations. GAO's evaluation of NSF's revised policies and procedures on cost analysis led GAO staff to conclude in the report that they consider GAO's good practices to be fully implemented. NSF continues to make progress on the remaining corrective actions from the 2018 and 2019 reports.

The FY 2020/2021 engagement letter from GAO was received on September 22, 2020, and the entrance conference was held on October 13, 2020. The first meeting with GAO was held on December 16, 2020 which included a status summary of NSF progress on implementing previous GAO recommendations. The scope of this review also includes the extent to which the COVID-19 pandemic has affected the ability to keep projects on schedule. Routine reports on major facilities in Design and Construction are being provided to GAO as well as specific information upon request. *The exit conference has been scheduled for March 19th.* GAO plans to release its next report in April 2021.

- **GAO Review of Digital Accountability and Transparency Act (DATA Act)**
  In December, GAO issued the report *Agencies Made Progress in Establishing Governance, but Need to Address Key Milestones* (GAO-21-152) for its audit of NSF and three other federal agencies on data governance, including governance over data reported under the DATA Act and related data quality plans. GAO noted in the report that NSF addressed all required components of the data quality plans required by OMB guidance, and NSF received no GAO recommendations related to DATA Act reporting or data quality controls.

- **Digital Accountability and Transparency Act Implementation (DATA Act)**
  Effective July 2020, NSF successfully implemented the requirements of OMB Memorandum M-20-21, *Implementation Guidance for Supplemental Funding Provided in Response to the Coronavirus Disease 2019*, and the DATA Act Information Model Schema 2.0. Under these requirements, NSF transitioned to monthly reporting, including detailed reports on grants and contracts funded under the CARES Act.

- **Program Management Improvement Accountability Act (PMIAA)**
  The workforce analysis to help identify competency and proficiency level gaps for major acquisition and major facilities oversight was completed in October 2020. The training plan for NSF staff overseeing this portfolio is now under discussion. The first phase of this effort, including a means of monitoring staff professional development and updating of NSF documentation, will be completed in Q4 FY 2021 and will implement the related GAO recommendation in GAO-19-227. In Q3 FY 2021, the agency will begin considering application

of a similar workforce analysis to other significant programs that could benefit from PMIAA. This aligns with OMB's objective of applying PMIAA to grants portfolios as well as NSF's plans for workforce development and "Renewing NSF."

As part of PMIAA's annual portfolio review requirement, one of NSF's 2020 Strategic Review recommendations addressed strategic elements related to the Development and Design Stages of major infrastructure projects in support of improved long-term portfolio planning. Implementation strategies for the four recommendations are being developed. NSF anticipates a PMIAA portfolio review with OMB in FY 2021 that is based on a PMIAA implementation "maturity model" being developed through a subcommittee of the Program Management Policy Council.

Background: In December 2016, the PMIAA was signed into law. PMIAA aims to improve program and project management practices within the Federal Government. PMIAA requires that agencies conduct annual portfolio reviews to ensure major programs are being managed effectively, and that OMB conduct reviews of areas identified by GAO as "high risk." OMB's current portfolio focus is on major acquisitions, and NSF currently has no "high risk" portfolios.

- **Advanced Monitoring and Audit Resolution**

  The Resolution and Advanced Monitoring Branch's (RAM) FY 2021 advanced monitoring activities have continued with nine virtual site visits completed as of January 31, 2021. Consistent with the federal position on non-mission critical travel, all remaining site visits will be conducted virtually. Regarding audit resolution, OIG has informed DIAS of plans to issue 16 new audits (including 10 limited-scope COVID reviews) by June 2021. As of February 12, 2021, RAM has received four of the anticipated audit reports.

  RAM closed out FY 2020 having completed 26 advanced monitoring site visits, 120 desk reviews, 47 Post Award Adjustment Reviews, 150 Audit resolutions (including seven OIG audits), and one Targeted Review Assessment which was used to provide business assistance and address issues identified under an OIG investigation.

- **Management Challenges**

  BFA finalized NSF's Progress Report on addressing the FY 2020 Management Challenges and submitted it to the OIG on October 22, 2020, along with a letter from the Director acknowledging receipt of the OIG's FY 2021 Challenges. OIG issued the *Management Challenges for the National Science Foundation in Fiscal Year 2021* on October 15th, having received agency input in July through NSF's draft progress report from last fiscal year. These documents were published in Appendix 2/Chapter 3 of the FY 2020 Agency Financial Report.

  NSF held its annual Management Challenge Kickoff meeting on Tuesday, January 26th. This meeting formally started the FY 2021 progress reporting process for NSF to respond to the FY 2021 Management Challenges. The FY 2021 Management Challenges identified by OIG are:

  - Providing Oversight of Major Multi-User Research Facilities

- Providing Oversight of Grants During a Pandemic
- Managing the Intergovernmental Personnel Act Program
- Providing Oversight of the Antarctic Infrastructure Modernization for Science (AIMS) Project
- Increasing Diversity in Science & Engineering Education and Employment
- Mitigating Threats Posed by Foreign Government Talent Recruitment Programs

Two of these challenges, Providing Oversight of Grants During a Pandemic and Increasing Diversity in S&E Education and Employment, are new for FY 2021. For all challenges BFA is facilitating NSF-wide collaboration to ensure staff leverage existing work to incorporate into the agency progress report strengthening NSF's coordinated actions addressing the challenges, while minimizing duplicative effort.

- **Enterprise Risk Management (ERM)**

  NSF continues to mature its ERM capability consistent with the agency's goal to enhance performance of its mission. In the prior fiscal year, NSF chartered an ERM governance structure to provide additional communication touchpoints for offices, programs, and leadership to discuss enterprise-level risks and opportunities (i.e., risk profiles). This year, NSF will continue leveraging the governance structure by conducting quarterly Risk Captain Community of Practice meetings coordinated with NSF's CXO Council and program leadership to support the effective flow of enterprise risk-related information. Current fiscal year 2021 plans include updating prior year risk profiles and supporting Science Directorates and Offices in identifying emerging risk and opportunity areas.

- **Government Invoicing (G-Invoicing)**

  G-Invoicing is the Government's long-term sustainable solution to improve the management and accounting of Interagency Agreements (7600 A/B, MIPR, 1611). G-Invoicing impacts NSF's Incoming and Outgoing Interagency Agreements, and will provide an online, user-friendly platform to support the management and transparency of these agreements. Treasury has mandated a government-wide implementation date of October 1, 2022 and the agency is on track to meet that date.

  NSF's G-Invoicing project team continues to work with our federal trading partners, Treasury and our iTRAK system integrator on our implementation. We are currently in the design phase and are engaging NSF stakeholders throughout the project. In November 2019, we upgraded our ITRAK Oracle system to enable us to use the government-wide G-Invoicing system patches along with other initiative system changes.

- **Unique Entity Identifier (UEI) Initiative**

  All organizations that do business with the government register with a centralized system called the System for Award Management (SAM). All federal agencies use SAM for managing awards, reporting information, and making payments. Currently, SAM uses the proprietary Dun & Bradstreet Data Universal Numbering System (DUNS number) to organize this information. GSA is replacing the proprietary DUNS number with a government-owned

number called the UEI. The transition to the UEI is slated for April 2022. NSF has formed a UEI Implementation Working Group and initiated activities to meet the implementation date. UEI will impact centralized systems, like SAM, and agencies' systems that use organization identifiers. NSF is working closely with the federal community on this challenging initiative.

- **Proposal & Award Policies & Procedures Guide (PAPPG)**
  NSF published a notice in the Federal Register announcing the availability of a "For comment" draft of the PAPPG (NSF 22-1). The comment period closed on February 12, 2021.

- **Virtual Industry Day related to Antarctic Support Contract**
  On February 16, 2021, the Division of Acquisitions and Cooperative Support and the Office of Polar Programs hosted a virtual industry day, that provided a high-level introduction to over 130 interested potential offerors on the expectations regarding the upcoming re-competition of the Antarctic support contract, scheduled to expire on March 31, 2025. The presentation included a welcome message by Dr. Panchanathan, scientific and logistical overviews presented by OPP, and a commitment to partner with industry to develop an acquisition approach responsive to the needs of the NSF and industry. With a clear understanding of NSF's vision for the future of the program, interested vendors will be able to begin building the necessary partnerships, including small business subcontracting partners, to work towards a contract award that embraces the concepts of partnership, innovation, world-class expertise, project delivery, safety, and diversity and inclusion.

- **Performance**
  Transition-related Change to Public Performance Reporting
  As is standard in Presidential Transition years, OMB will not be reviewing and posting the quarterly Agency Priority Goal (APG) reports on performance.gov. NSF's APG (Expand Public and Private Partnerships) is continuing its work and providing internal reports to leadership per the requirement in the GPRA Modernization Act of 2010. The FY 2021 Performance Report (to be published next February) will include a report on this APG.

  A-11 Part 6 Removal –NSF Response and Status of Reinstatement
  On December 23, 2020, the outgoing Administration removed key performance guidance from Circular A-11. NSF has been in close contact with OMB and other agencies and anticipates that this section of the guidance will be restored in the next few months. NSF is continuing to work to the deadlines in the previously published guidance, per advice from OMB and to maintain internal momentum and messaging consistency.

  Strategic Planning
  The Strategic Planning process is underway. B&O engagement on a management-oriented strategic goal is being sought in another session in this meeting. Per the GPRA Modernization Act of 2010, agency Strategic Plans must be updated concurrent with the presidential cycle, and new plans are published in the year after inauguration (February 2022). A draft of the Strategic Goals and Objectives is due to OMB in June.

FY 2020 Performance Reports

NSF's *Annual Performance Report (APR)* and *Performance and Financial Highlights (Highlights)* report for FY 2020 were published online on January 19th. The APR provides information on the progress NSF has made toward achieving its goals and objectives as described in the NSF's Strategic Plan and Performance Plan. The *Highlights* report summarizes key financial and performance information from the *FY 2020 Agency Financial Report (November 2020)* and *APR*. These three annual accountability reports provide key financial and performance information to NSF's stakeholders and the American people. (Note: in most years, the APR is published with the agency's budget request; in Presidential transition years, however, it is published separately and in advance of the change in administration.)

FY 2022 Performance Plan

The FY 2022 Performance Plan will be issued at the same time as the FY 2022 President's Budget Request to Congress.

- **Budget Summary**

FY 2020 Supplemental Appropriation: CARES Act

NSF received $76 million in the Coronavirus Aid, Relief, and Economic Security Act, P.L. 116-136 (CARES Act) funding, of which $75 million supported a wide-range of research to help the country prevent, prepare for, and respond to the coronavirus pandemic. In addition, NSF drew from its FY 2020 base appropriations and other available funds to support research related to COVID-19. NSF's COVID-19 activities funded 1,172 awards to nearly 2,250 principal investigators in 48 states and the District of Columbia. Details on NSF's COVID-19 response are in the FY 2020 Agency Financial Report (page MD&A-7), issued in November 2020.

FY 2020 COVID-19 Activity Awards and Obligations

(Dollars in Millions)

	CARES Act	All COVID-19
Number of Awards	527	1,172
FY 2020 Obligations (Total)	$76.0	$197.5
R&RA	*$70.0*	*$178.5*
EHR[1]	*$5.0*	*$16.7*
AOAM	*$1.0*	*$1.0*
Other funding	-	*$1.3*

[1]NSF used transfer authority provided in P.L. 116-93, to transfer $5.0 million of R&RA CARES Act funding to the EHR budget account.

FY 2021 Appropriations

- The full year appropriations bill supporting NSF was passed on December 27, 2020.
- NSF received $8,487 million, an increase of $745 million compared to the FY 2021 Request and $208 million above the FY 2020 Enacted level.
- NSF is working with OMB on the FY 2021 Current Plan letter for Congress.

FY 2021 Congressional Guidance - selected examples

- Continued support for Industries of Tomorrow (formerly Industries of the Future).
- QIS investments no less than $210 million, or $66 million above FY 2020 Plan.
- AI investments no more than FY 2021 Request, or $868 million; encouraged efforts in AI workforce development with focused outreach to Historically Black Colleges and Universities, Hispanic-Serving Institutions, Tribal Colleges and Universities, and Minority-Serving Institutions.
- Continued support for Facility Operations Transition pilot at $10 million.
- Congress identified specific priorities and funding levels for more than 70 percent of the total provided to both EHR and R&RA.

FY 2022 Budget Request Process

- NSF FY 2022 OMB Budget was submitted in mid-September 2020.
- Ongoing coordination and negotiation with OMB is anticipated through early March.
- NSF FY 2022 Congressional Request to be submitted in Spring 2021 (estimate).

OIRM Update
for the B&O Advisory Committee Meeting (Spring 2021)

OIRM Senior Staff Changes

- Changes to OIRM Senior Staff since we last saw you in June of last year.
    - In the OIRM Front Office, Peggy Gartner was appointed as Deputy Office Head.
    - Also in the Front Office, Francine Morris was appointed Deputy Director of NSF's Office of Small and Disadvantaged Business Utilization (OSDBU). The OSBDU helps to increase contract and subcontract awards to small and disadvantaged businesses and identifies potential businesses to support the NSF. The OSBDU is an integral part of a diverse and efficient procurement program for NSF.
    - In the Division of Administrative Services (DAS), Maren Williams was appointed as the Division Director. Hilary Haight is serving as the Acting Deputy Division Director.

OIRM Continues to Support the Transition to Virtual Work During the Pandemic

- To ensure safety and health of employees and contractors returning to the building during COVID-19, DAS coordinated the installation of plexiglass barriers for the ID Card Office workstations and the IT Help Central (ITHC) Service Desk in preparation for in-person appointments. Signage was posted at the entrances, elevator lobbies, restrooms, and pantries to advise personnel of Centers for Disease Control and Prevention guidelines and recommendations. Social distancing floor stickers were installed in the elevator lobbies and other locations to remind personnel to stay six feet apart. To ensure population control, DAS provided each Directorate with floorplans for their space to help schedule staff's in-building work schedules while maintaining within building population and physical distancing parameters. Frequent high-touchpoint cleaning continues each day and, when a positive COVID-19 case is identified, specific building areas are electrostatically cleaned immediately.
- In support of building operations and personnel security needs, the ID Card Office opened by appointment only to issue new and renewed PIV cards to employees and contractors and provide fingerprinting services. Since the office opened in June 2020, 1,139 appointments have been completed.
- The mailroom distributed monitors for NSF staff needing a monitor for home use. Due to on-going telework, many staff inquired about availability of a monitor screen for home use. DAS was able to provide surplused monitors from excess inventory to staff that needed them. The mailroom personnel coordinated the distribution of the monitors either by scheduling an appointment for in-person pick-up or by mailing the monitor to an employee's home.
- During this period of almost 100% telework, NSF continues to provide secure, reliable day-to-day operations for our IT systems and services. As the agency adjusted to long-term remote operations, NSF focused on ensuring IT support, remote access capabilities, and collaboration services would be available for agency staff. To further support a remote workforce, the Division of Information Systems (DIS) evaluated and tested products used to remotely repair computer problems and selected LogMeIn Rescue. LogMeIn Rescue was implemented in April,

and DIS has supported users in 4,883 sessions as of the end of February. DIS implemented on-site ITHC support by appointment starting on June 29 for staff and contractors whose IT problems cannot be resolved remotely, and since then 1,642 appointments have been completed. DIS designed and implemented a laptop deployment process enabling the laptop to be shipped to the user. Additionally, to further strengthen remote capabilities, DIS purchased and deployed a new VPN in July.

- The Division of Human Resource Management (HRM) converted New Employee Orientation and onboarding to 100% virtual. HRM continues to offer Employee Assistance Program (EAP) services, emergency back-up dependent care services, wellness services, and more during this time as a way to help ease the impact of the pandemic on staff. Additionally, essential training offerings were redesigned and hosted for NSF staff in an all-virtual environment.
- HRM continued a series of short surveys ("pulse surveys") to assess the impact of the pandemic on staff. To date, there have been six pulse surveys. Overall, staff continue to feel that NSF is handling the situation as well as can be expected, and most feel positively about how NSF has communicated the status of returning to the office. Early survey results indicated about half of the workforce is providing dependent care during work hours – either in the home or outside the home. In an effort to assist employees with managing work time and dependent care needs, HRM has implemented extended Weather and Safety Leave hours (up to 20 hours per pay period) and extended workschedule flexibilities to help accommodate scheduling concerns during this time. The sixth survey was distributed in early January and results will be used to implement additional support for staff during this time. A few key points from the sixth survey are below:
    - When asked when they would feel safe returning to the office, 50% responded “Not until the pandemic is fully over;” 37% responded “Once I receive the vaccine.”
    - 78% (789) of respondents feel that NSF has communicated “Enough” regarding the status of returning to work.
      41% (420) of respondents cited “connectivity/availability issues with NSF services.” 21% (220) stated “hardware failures or other equipment issues” are technological issues they have encountered during the pandemic. Some respondents (1%) also indicated trouble with their home internet services.

New Emergency Response Training Developed

- DAS partnered with colleagues in the NSF Academy to sponsor virtual ALICE (Alert, Lockdown, Inform, Counter, Evade) Active Shooter Training. The training was developed for everyday response and awareness and can be deployed in any environment.

New NSF-Wide DAS Communications

- DAS established an DAS Pulse email alias to provide periodic messaging related to facilities, health and safety information, and operational disruptions or updates to NSF staff. Emergency communications will still be processed through InformaCast, NSF’s emergency notification

system, while more routine communications and updates will be provided through the DAS Pulse email notification.

- DAS designed and published NSF News Central on the NSF intranet. The online version of News Central mimics the in-building version, which displays on monitors throughout the building and provides a variety of information.
- As part of DAS's Strategic Plan execution, customer feedback surveys were developed. The results of these surveys will help DAS to ensure service provision relevancy and enable future services planning for growth and support of the NSF mission.

Other Administrative Service Support

- The Personnel Security and Suitability Section in DAS published a new version of the Contractor Onboarding and Separations Guide to assist contracting officer's representatives and contractors with their roles and responsibilities for onboarding and separation procedures at NSF. The guide is designed to ensure the safety and security of personnel, NSF information, information technology systems, facilities, and equipment.
- The annual property certification began in July and concluded at the end of August. Due to the COVID-19 operating environment, the NSF Property Administrator authorized deviation from the annual in-house certification standard, requiring certification of sensitive personal property (SPP) only if accountability could be obtained safely.
- DAS implemented the NSF Controlled Unclassified Information (CUI) Program. CUI is information the government creates or possesses that a law, regulation, or government-wide policy requires or permits an agency to handle using safeguarding or dissemination controls. DAS published NSF policy, developed a guidebook for staff and contractors, and rolled out an agency-wide training program. DAS continues to work on guidance addressing agreements with external communities (including universities).

Federal Employee Viewpoint Survey (FEVS) 2020

- The 2020 Federal Employee Viewpoint Survey was delayed this year due to the pandemic and was open from September 14, 2020 through November 5, 2020. OPM began releasing data to NSF the week of January 25, 2021.

Personnel Manual (PER)

- HRM is in the final stages of updating 16 PER subchapters and will utilize a similar communication strategy to the PER subchapter publications as it did in 2020.
- All online trainings and resources will be updated to reflect the new policies.

IT News

- NSF continues to prioritize modernizing IT services to improve the external research community's interactions with NSF and to facilitate the work performed by Foundation staff. In

addition to completing system updates related to the 2020 Proposal & Award Policies & Procedures Guide (PAPPG), NSF developed and implemented a new format for Biographical Sketches and Current and Pending Support, which became mandatory October 5, 2020. NSF also completed the migration of primary Awards functions from the legacy Awards system to MyNSF and is now focused on supporting utilities. NSF continued expansion of the Beta.nsf.gov website, another cloud-based solution, with content such as improved functionality to search for funding opportunities, Science Topics and a Science Matters Blog.

- On the Proposal Submission Modernization front, NSF continues to expand the proposal types supported on Research.gov, and NSF is working with Directorates and the community toward the transition of proposal preparation and submission to Research.gov. Research.gov was updated to support Rapid Response Research (RAPID), Early-concept Grants for Exploratory Research (EAGER), and Research Advanced by Interdisciplinary Science and Engineering (RAISE) proposal types. The Research.gov proposal preparation demonstration site, which utilizes a cloud-based solution, was made available to both the research community and NSF staff. The site provides users the ability to perform all proposal preparation functions that can be executed by a Principal Investigator in the actual Research.gov Proposal Submission System.
- NSF partnered with NASA to launch a pilot to explore NASA's eBooks system as a replacement for the legacy NSF Interactive Panel System. The pilot focused on producing an effective, minimally viable pilot system and tested the system for five NSF panels, one each for BIO, ENG, EHR, CISE, and GEO occurring from December through February. If the pilot is successful, analysis for an enterprise-wide roll out will begin.
- NSF continued to provide enhanced data analytics and reporting services by incorporating Tableau Enterprise as a data analytics tool to create interactive graphs and charts in the form of dashboards and worksheets to gain business insights and introduced text search capability.
- While continuing to modernize existing services, NSF is also supporting continued expansion of new technologies and capabilities such as robotic process automation (RPA). Automations are now sending reminder emails to panel and meeting participants, updating subscriber lists and performing other manual and time-consuming tasks.

Budget Update

March 10, 2021

B&O Advisory Committee

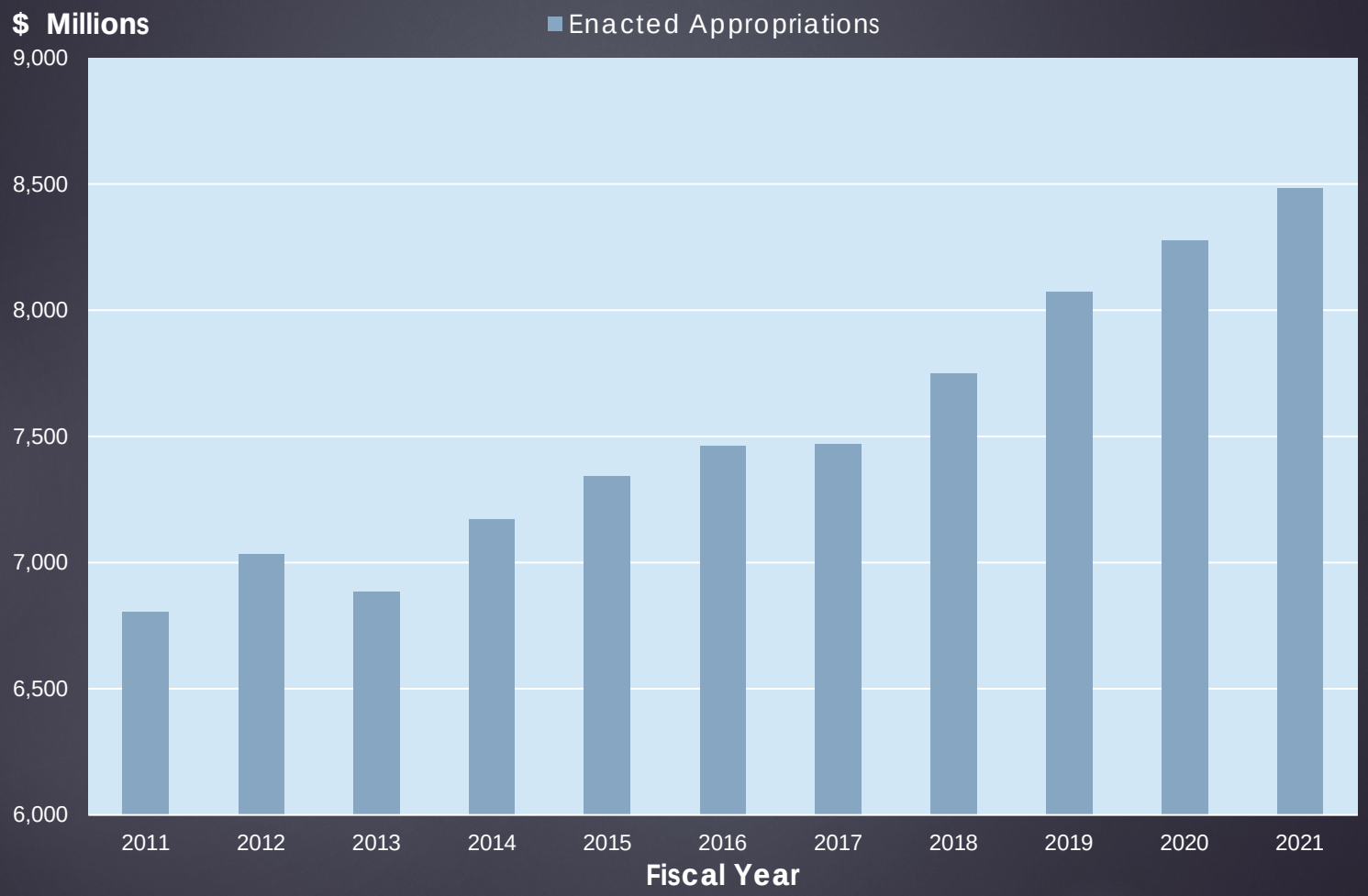
National Science Foundation
Caitlyn Fife, Division Director,
BFA/Budget Division

TOPICS

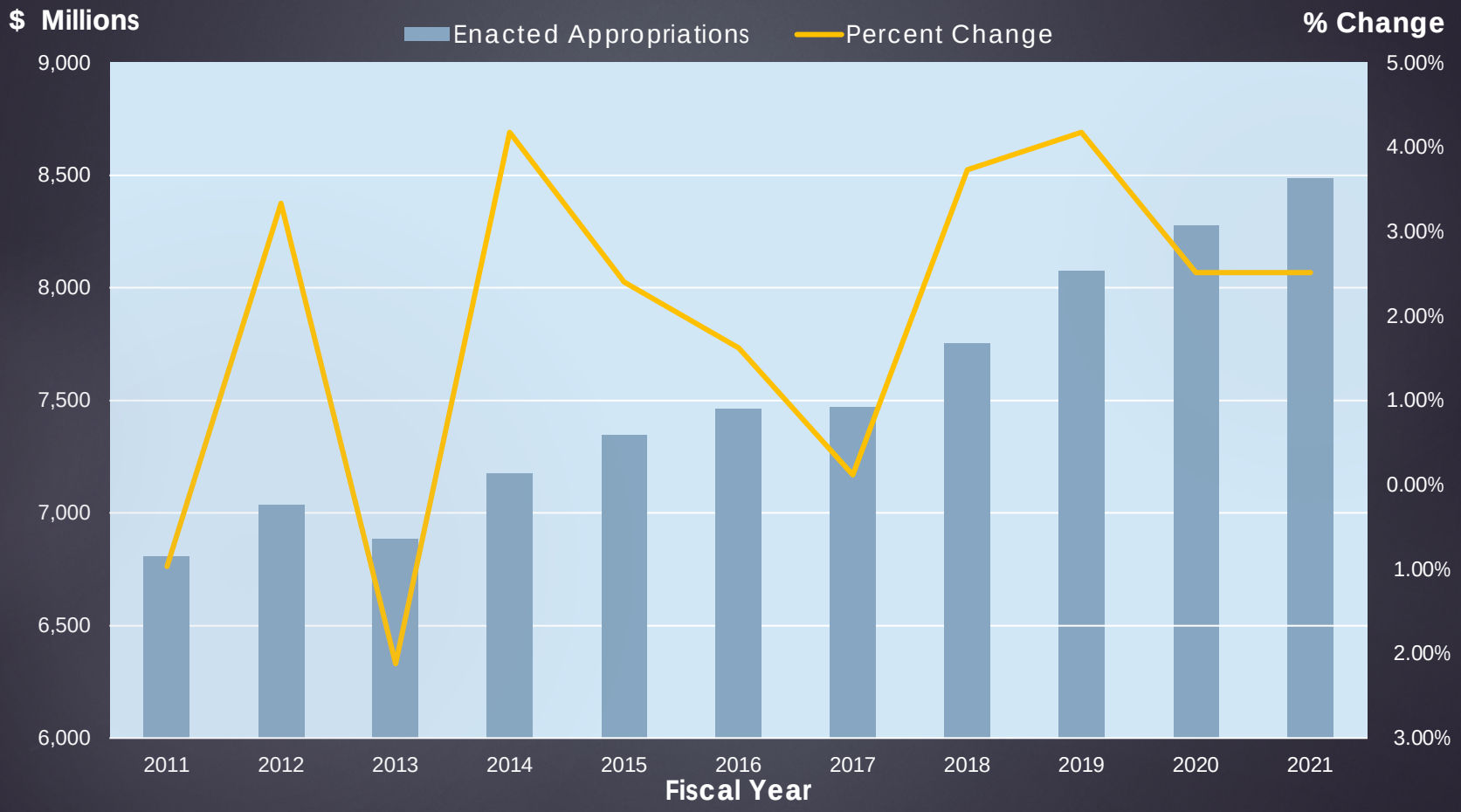
- Budget Context
  - NSF Budget Over the Years
  - NSF Enacted Funding levels FY 2018-2021
- Current Year- FY 2021
  - FY 2021 Budget
  - FY 2021 Administration Priorities
  - FY 2021 Appropriations Account totals
- FY 2022 Planning
  - Where are we in the process?
  - What's next for FY 2021 and FY 2022

Budget Context

NSF BUDGET OVER THE YEARS



NSF BUDGET OVER THE YEARS



Current Year
FY 2021

FY2021 BUDGET

- NSF's FY 2021 Appropriation is $8.5 billion
  - $208 million over the FY 2020 Current Plan ($8.3 billion)
  - $745 million over the FY 2021 Request ($7.7 billion)

(Dollars in Millions)

Account	FY 2020 Current Plan	FY 2021 Request	FY2021 Enacted	FY 2021 Enacted change over FY 2020 Current Plan		FY 2021 Enacted change over FY 2021 Request	
RRA	$6,720	$6,213	$6,910	$190.0	2.7%	$696.7	10.1%
EHR	938	931	968	30.5	3.1%	37.1	3.8%
MREFC	243	230	241	-2.2	-0.9%	11.3	4.7%
AOAM	357	346	346	-11.2	-3.2%	-0.0	0.0%
NSB	5	4	5	-	0.0%	0.3	6.4%
OIG	17	18	18	$1.4	7.6%	-	0.0%
Total	**$8,278**	**$7,741**	**$8,487**	**$208.4**	**2.5%**	**$745.3**	**8.8%**

Totals may not add due to rounding.

CURRENT ADMINISTRATION PRIORITIES

- NSF will align investments with the Administration's "Build Back Better" agenda, including:
  - Prioritize climate-related activities,
  - Promote racial equity,
  - Prioritize COVID-related research,
  - Support economic recovery
  - Continued emphasis on the Industries of Tomorrow (formerly, the Industries of the Future (IotF))

FY 2021 CONGRESSIONAL GUIDANCE

- Continued support for Industries of Tomorrow (formerly Industries of the Future)
  - QIS investments no less than $210M, or $66M above FY 2020 Plan
  - AI investments no more than FY 2021 Request, or $868M; encouraged efforts in AI workforce development with focused outreach to HBCUs, HSIs, Tribal Colleges and Universities, and Minority-Service Institutions

FY 2021 CONGRESSIONAL GUIDANCE (CONT'D)

- EHR is +3.1% above FY 2020 Plan. Congress identified specific priorities and levels for 75% of the total provided.
- Continued support for Facility Operations Transition pilot at $10M

FY 2022 Planning

WHERE ARE WE IN THE PROCESS?

Timeframe	NSF Leadership Activities	Principal NSB Engagement
June 2020	✓ NSF Leadership Retreat #1 OMB FY 2022 Guidance	
July 2020	✓ NSF Leadership Retreat #2	NSB Telecon, July 22
August 2020	✓ OMB/OSTP R&D Priorities M-20-29	NSB Telecon, August 19
September 2020	✓ September 14, 2020: NSF FY 2022 OMB Budget submitted to OMB	
Sept – Feb 2021	✓ FY 2022 Discussions and interactions between NSF and OMB **We are here**	
Estimated Spring 2021	NSF FY 2022 Congressional Justification submitted	

FY 2021-2022: WHAT'S NEXT?

The President's FY 2022 Budget is expected to be released this spring with a high-level "blueprint" ahead of the full details.

Questions?

OLPA UPDATE

Business and Operations Advisory Committee Meeting

WHO WE ARE

Amanda Greenwell
Office Head, OLPA

Chief Business Operations,
Michelle Massie

Chief Government Affairs,
Rob Moller

Chief Public/Media Affairs,
Jennifer Plozai

Chief Creative Services,
Cori Bassett

Historian,
Leo Slater

STRATEGIC COMMUNICATIONS PLAN 2021

National Science Foundation

GOALS

Local and Federal Policymakers

Understand the impact of basic research supported by NSF.

Recognize our role in a favorable way through the legislative process.

Staff

Keep us informed

Seek OLPA out as experts

Are proud to work at NSF and serve as brand ambassadors

Local and Federal Policymakers

Build relationships with members and staff

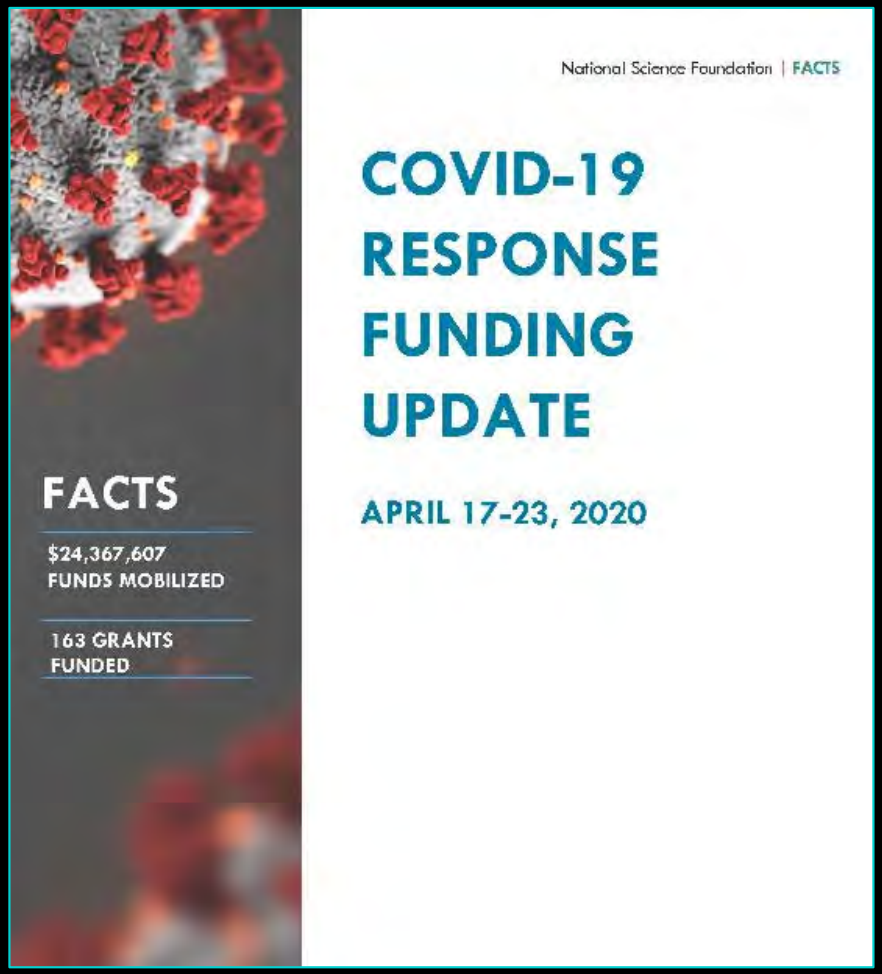
Increase understanding of impacts and outcomes of NSF funding

Staff

Provide training opportunities

Raise awareness of OLPA's resources

Strengthen relationships through increased communications and transparency



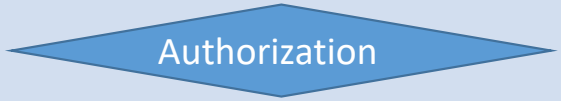
NSF ON THE HILL

$600 million for NSF to Respond to Coronavirus

SEC. 12002. NATIONAL SCIENCE FOUNDATION.

"In addition to amounts otherwise made available, there are appropriated to the National Science Foundation for fiscal year 2021, out of any money in the Treasury not otherwise appropriated, $600,000,000, to remain available until September 30, 2022, to fund or extend new and existing research grants, cooperative agreements, scholarships, fellowships, and apprenticeships, and related administrative expenses to prevent, prepare for, and respond to coronavirus"

NSF's Congressional Committees

House	Senate
Committee on Science, Space & Technology Subcommittee on Research & Technology 	Health, Education, Labor and Pensions Commerce, Science & Transportation Subcommittee on Space and Science 
Committee on Appropriations Subcommittee on Commerce, Justice, Science & Related Agencies 	Committee on Appropriations Subcommittee on Commerce, Justice, Science & Related Agencies 

HOW YOU CAN HELP

KEEP OLPA INFORMED

WORK WITH US ON YOUR MESSAGE

SHARE THE NSF STORY

FIND US

Facebook
facebook.com/US.NSF

Twitter
twitter.com/NSF

Instagram
instagram.com/nsfgov

YouTube
youtube.com/user/VideosatNSF

Pinterest
pinterest.com/USNSF

Science Matters Blog
beta.nsf.gov/science-matters

LinkedIn
linkedin.com/company/national-science-foundation

Sign up for our newsletter at NSF.GOV

Backgrounder: Spring 2021

NSF Advisory Committee for Business and Operations

Nature of Agenda Item: Award Performance Reporting Compliance Challenges

Presentation:

NSF awards have technical progress reports that are required per 2 CFR 200 (Grant Uniform Guidance), NSF award terms and conditions, the Proposal & Award Policy and & Procedures Guide (PAPPG), and, in some cases, law (America Competes Act). While NSF has many business rules aimed at ensuring the submission of the reports, including sending reminder notices and stopping additional funding to a Principal Investigator (PI), many reports are submitted late and sometimes not at all. NSF is looking for Business & Operations Advisory Committee (BOAC) input to gather insight on what might be the issue from an awardee organization standpoint and what other actions might be taken by NSF to better comply with Federal requirements.

The non-compliance will soon become a larger issue since the latest version of the Uniform Guidance requires NSF to report to the Federal Awardee Performance & Integrity Information System (FAPIIS). FAPIIS is a government-wide database of Awardee material non-compliance and could affect the Awardee's ability to receive additional Federal funds.

NSF wishes to stop the recent trend of PIs submitting their reports closer to the overdue date and does not wish to report Awardees to FAPIIS. Reporting to FAPIIS would provide bad optics for the Awardee organizations as well as NSF.

Committee Action/Feedback

NSF is soliciting the insight of BOAC, as active members of the grants community, in terms of reasons for the non-compliance (why is the community having an issue submitting the reports?) as well as suggestions for other avenues to ensure submission of the required reports. In addition, NSF would like to seek volunteers to assist a working group in implementing additional measures to increase compliance.

Contact Persons: Dr. Kandis Boyd, (703) 292-7927, kanboyd@nsf.gov; Jeff Vieceli, (703) 292-4805, jvieceli@nsf.gov

Award Performance Reporting Compliance Challenges

BOAC
Spring 2021 Virtual Meeting

Dr. Kandis Boyd, Deputy Division Director, BFA/DGA

Dr. Thyaga Nandagolpal, Deputy Division Director, CISE/CCF

Jeff Vieceli, Head, System Office, BFA/DIAS

National Science Foundation
WHERE DISCOVERIES BEGIN

Purpose & Outcomes:

Purpose:

To discuss NSF's technical project report submission compliance and new requirements

Outcomes:

Brainstorm additional ideas for increasing compliance seek BOAC volunteer(s) for further input/assistance

National Science Foundation

Agenda:

- Types of Project Reports
- Current Process
- Current Data
- Use and Importance
- Impacts of Overdue Reports
- New Uniform Guidance Requirements
- Improvement Actions
- Questions
- Other Options – Brainstorming
- Next Steps

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Types of Project Reports:

Discussion is Limited to Technical Progress Reports

- Annual Project Report (APR)
- Final Project Report (FPR)
- Project Outcomes Report for the General Public (POR)

Current Process – All Reports

- Policy – 2 CFR 200 (Uniform Grant Guidance)
- Policy - NSF Proposal & Award Policy & Procedures Guide (PAPPG)
- NSF Grant Terms & Conditions
- Reports Automatically created at award approval
- Award duration divided by 12 = number of reports
- System Calculates Due and Overdue Date

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Current Process – All Reports

- Send Reminder Notices when Due
- Follow-up Reminder Notices every 30-days until submitted
- Send Overdue Notices
- Follow-up Overdue Notice every 2-weeks until submitted
- Notices Sent to active personnel – PI and coPIs

Current Process – All Reports

- Notices sent to official Awardee email address
- Notices cc'd to Program Officers
- External - Report Dashboard available in Research.gov
- Internal - NSF Enterprise Report on Project Reports
- Overdue reports block other action approvals for subject award and associated awards

Current Process – APRs

- Due “at least 90-days prior to the end date of the budget period”
- First reminder notice sent at 90-days out
- Reviewed and approved by Managing Program Officer
- Requirement is removed with approval of report

Current Process – FPRs

- Due the day after the award end date
- Overdue 120-days after the end date
- Reviewed and approved by Managing Program Officer
- Requirement is removed with approval of report

National Science Foundation

Current Process – PORs

- Due the day after the award end date
- Overdue 120-days after the end date
- May be Reviewed but is not approved by Managing Program Officer
- Brief (200 words) summary of the project outcomes meant for the general public
- Published to NSF web site verbatim as submitted by the PI
- Requirement is removed with submission

Current Data

- Late Project Reports by Directorate

Directorate	Annual Reports Overdue >45 days
BIO	145
CSE	305
EHR	67
ENG	190
GEO	151
MPS	255
O/D	10
SBE	60
Grand Total	**1183**

Directorate	Final Reports Overdue >45 days
BIO	79
CSE	238
EHR	99
ENG	264
GEO	120
MPS	112
O/D	19
SBE	77
Grand Total	**1008**

National Science Foundation

Current Data

- Top 25 Organizations – Overdue APR

Institution Name	Annual Reports Overdue >45 Days
Massachusetts Institute of Technology	43
Cornell University	30
University of Minnesota-Twin Cities	30
Georgia Tech Research Corporation	29
University of Washington	28
University of Illinois at Urbana-Champaign	27
Carnegie-Mellon University	26
University of California-Berkeley	26
Regents of the University of Michigan - Ann Arbor	25
Stanford University	24
Purdue University	23
University of California-San Diego	23
University of Texas at Austin	23
University of Wisconsin-Madison	23
Columbia University	22
Ohio State University	21
Rutgers University New Brunswick	21
University of California-Davis	21
University of California-Irvine	19
University of Southern California	19
Arizona State University	18
Duke University	18
Oregon State University	18
University of California-Santa Barbara	18
Johns Hopkins University	16

Current Data

- Top 25 Organizations – Overdue FPR

Institution Name	Final Reports Overdue >45 Days
University of California-Berkeley	19
University of Texas at Austin	17
Georgia Tech Research Corporation	16
University of Wisconsin-Madison	15
University of Florida	15
Cornell University	15
Massachusetts Institute of Technology	14
University of California-San Diego	14
University of Washington	13
Pennsylvania State Univ University Park	13
Columbia University	12
Northeastern University	12
Michigan State University	12
Arizona State University	12
Oregon State University	11
Rutgers University New Brunswick	11
Woods Hole Oceanographic Institution	10
Virginia Polytechnic Institute and State University	10
North Carolina State University	10
University of Minnesota-Twin Cities	10
Carnegie-Mellon University	10
University of Illinois at Urbana-Champaign	10
University of Arizona	10
University of California-Davis	9
SUNY at Stony Brook	9

Use and Importance

- Provide an update on the scientific, technical and programmatic progress of the project
- Helps NSF monitor the progress of the project
- Helps document the project
- Helps inform NSF on funding decisions – continued/supplemental funding
- Stewardship - Provide information on the use of Federal funds
- Required by Terms and Conditions/Policy
- POR is required by law (America Competes Act)
- Provides information about accomplishments, products, participants and impacts

Impacts of Overdue Reports

Awardees

- Blocks additional funding for subject award
- Blocks no-fund actions for subject award
- Blocks funding and no-fund actions for associated awards (shared personnel)
- Presents possible audit issues
- May show issues with the PI, the project, and/or the awardee
- No credit for results/accomplishments – publications, products et cetera

Impacts of Overdue Reports

NSF

- Slows down end of year processing
- May result in carry over of funding
- Increases workload
- NSF does not get needed update on the progress of the project making program success and evaluation difficult or impossible
- Presents audit issues
- NSF not in compliance with Federal guidelines
- No reports on training of students or other “core” NSF goals/priorities

New Uniform Guidance Requirement

2 CFR 200 – Published in Federal Register August 13, 2020 – Mainly for submission of FPR and POR

- (i) If the non-Federal entity does not submit all reports in accordance with this section within one year of the period of performance end date, the Federal awarding agency must report the non-Federal entity's material failure to comply with the terms and conditions of the award with the OMB-designated integrity and performance system (currently FAPIIS). Federal awarding agencies may also pursue other enforcement actions per § 200.339.

FAPIIS – Federal Awardee Performance and Integrity Information System

Improvement Actions

- Create a working group
- Review text of the Reminder Notices
- Review who is receiving Notices
- For APRs – Add 120-day Reminder
- Pilot turning off draw down of payments
- Send Non-Compliance Emails to V.P of Research
- Update Research.gov Report Dashboard
- Require use of SPO email alias – distribution list

Questions

- Are there questions?

Other Options

- Brainstorming
- Ideas for improvement

Next Steps

- Move forward on already identified Improvement Actions
- Call for BOAC volunteers

For More Information:

Ask Early, Ask Often!

kanboyd@nsf.gov

tnandago@nsf.gov

jvieceli@nsf.gov

National Science Foundation

WHERE DISCOVERIES BEGIN

Backgrounder: Spring 2021

NSF Advisory Committee for Business and Operations

Nature of Agenda Item: Discuss formation of a subcommittee for providing recommendations on NSF IT

Presentation:

The Renewing NSF program recommended six bold steps for the "Make IT Work for All" Goal Team.

1. Institutionalize mechanism to partner with industry IT leaders to continuously apply the most advanced IT solutions.
2. Streamline IT Governance to increase transparency and encourage communication and input.
3. Create new mechanism to rapidly incubate, coordinate, and demonstrate IT innovation.
4. Create intuitive and adaptive IT training methodology.
5. Develop plan to address external users' IT and data needs.
6. Appoint Chief Data Officer (CDO) to develop and implement data management plan) are either completed or in process.

To date, progress has been made on all the bold steps; with the exception of the first. We come to the BOAC today to ask a that BOAC form a subcommittee to act as NSF's "industry IT leaders", review NSF's current IT and annually recommend improvements.

Committee Action/Feedback

We would like to initiate the conversation with BOAC and see if there is the potential of a subcommittee. We would like to work with the co-chairs to hold a vote at the next meeting.

Contact Persons: Dorothy Aronson (daronson@nsf.gov); Sean Jones (sljones@nsf.gov)

Renewing NSF: Request for advice on IT

- Renewing NSF
- Renewing Pillar - Making IT Work Even Better for All
- Resulting 6 Bold Steps
- Bold Step – Leverage External IT Experts to
- Ask – Subcommittee under the purview of BOAC

Challenges and opportunities

An evolving STEM enterprise:

- NSF is entering an era of transformational change in which some of the most pressing scientific challenges exist at the intersection of disciplines.
- Students are entering a new and rapidly changing workforce in which new skills, proficiencies, and capabilities are needed.

An evolving agency:

- NSF is facing intense workloads.
- There are opportunities to apply NSF-funded innovations to improve our own (agency) processes.

Challenges and opportunities

An evolving STEM enterprise:

- NSF is entering an era of transformational change in which some of the most pressing scientific challenges exist at the intersection of disciplines.
- Students are entering a new and rapidly changing workforce in which new skills, proficiencies, and capabilities are needed.

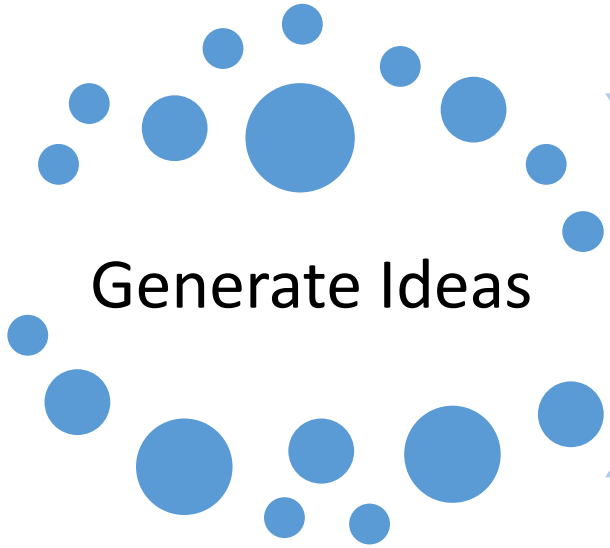
The Renewing NSF Vision:

Enable the Nation's continued global leadership in scientific research and innovation by transforming NSF into an agile organization capable of responding to the evolving landscape.

An evolving agency:

- NSF is facing intense workloads.
- There are opportunities to apply NSF-funded innovations to improve our own (agency) processes.

NSF's approach



Generate Ideas

- Staff brainstorming
- Public comments

Refine and Select

- Analytical framework
- OMB discussions
- Select reform proposals through budget process

Identify, Implement Reforms

- Engage internal and external stakeholders
- Multiyear plan
- Report on progress

Making IT work even better for all

- Implement leading-edge IT solutions that align with our business processes
- Streamline proposal submission, merit review, and award management for NSF staff as well as the broader research community

Streamlining, standardizing, and simplifying processes and practices

- Enhance the efficiency and effectiveness of our business processes to optimize our work
- Increase standardization across NSF units
- Eliminate unnecessary complexity

Adapt NSF's work and workforce

- Optimize the alignment of our staffing with our future work needs
- Maximize employee performance
- Equip our staff with necessary knowledge and tools

Expanding and deepening public and private partnerships

- Grow partnerships with industry, foundations, nonprofits, and U.S. & international agencies
- Bring additional expertise, resources, and capacity to NSF investments

Making IT Work Even Better for All

6 Bold Steps

6. Appoint Chief Data Officer (CDO) to develop and implement data management plan

Making IT Work Even Better for All

6 Bold Steps

5. Develop plan to address external users' IT needs
6. ~~Appoint Chief Data Officer (CDO) to develop and implement data management plan~~

Making IT Work Even Better for All

6 Bold Steps

4. Create intuitive and adaptive IT training strategy
5. Develop plan to address external users' IT needs
6. ~~Appoint Chief Data Officer (CDO) to develop and implement data management plan~~

Making IT Work Even Better for All

6 Bold Steps

3. Create new mechanism to coordinate, incubate, and demonstrate IT innovation
4. Create intuitive and adaptive IT training strategy
5. Develop plan to address external users' IT needs
6. ~~Appoint Chief Data Officer (CDO) to develop and implement data management plan~~

Making IT Work Even Better for All

6 Bold Steps

2. Streamline IT governance
3. ~~Create new mechanism to coordinate, incubate, and demonstrate IT innovation~~
4. Create intuitive and adaptive IT training strategy
5. Develop plan to address external users' IT needs
6. ~~Appoint Chief Data Officer (CDO) to develop and implement data management plan~~

Making IT Work Even Better for All

6 Bold Steps

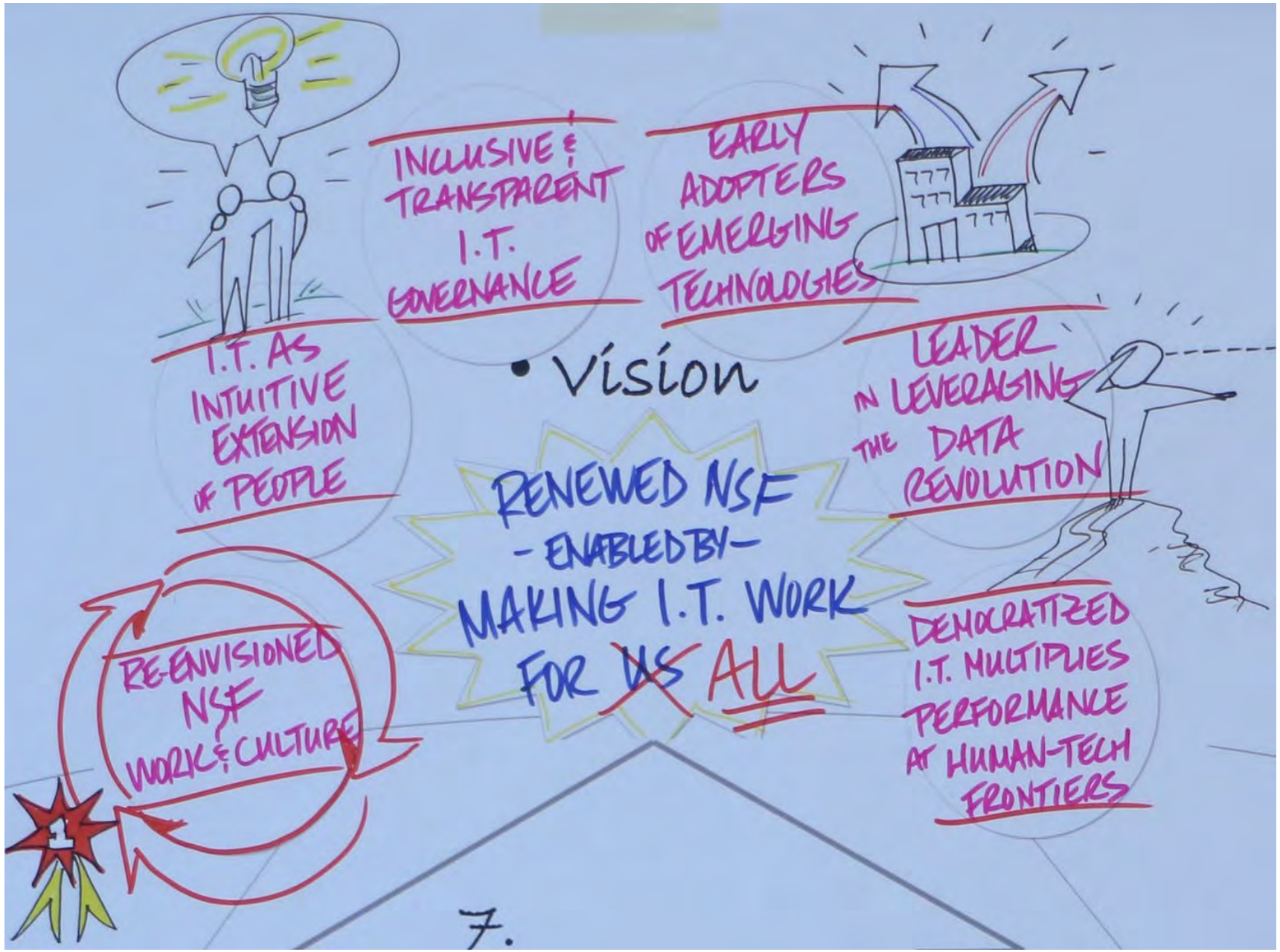
1. Routinely seek advice from industry leaders on NSF IT Strategy
2. ~~Streamline IT governance~~
3. ~~Create new mechanism to coordinate, incubate, and demonstrate IT innovation~~
4. Create intuitive and adaptive IT training strategy
5. Develop plan to address external users' IT needs
6. ~~Appoint Chief Data Officer (CDO) to develop and implement data management plan~~

The Ask…

Routinely seek advice from industry leaders on NSF IT Strategy

- A group of IT experts (feds, industry and others)
- Meet quarterly
- Gives advice once a year in sync with the IT Roadmap development processes
- A standing committee for 2 years, where the need, charge and composition is reevaluated every 2 years

Discussion…


INCLUSIVE & TRANSPARENT I.T. GOVERNANCE
EARLY ADOPTERS OF EMERGING TECHNOLOGIES
I.T. AS INTUITIVE EXTENSION OF PEOPLE
• Vision
LEADER IN LEVERAGING THE DATA REVOLUTION
RENEWED NSF
- ENABLED BY -
MAKING I.T. WORK FOR ~~US~~ ALL
RE-ENVISIONED NSF WORK & CULTURE
DEMOCRATIZED I.T. MULTIPLIES PERFORMANCE AT HUMAN-TECH FRONTIERS
7.

Backgrounder: Spring 2021
NSF Advisory Committee for Business and Operations

Nature of Agenda Item: The Future of Work: Remote Work

Presentation:

When the Renewing NSF workforce goal of "Adapting the workforce and the work" was established, it was accompanied by a bold step to assess the workforce desire for and feasibility of a geographically distributed workforce. This idea was a stretch goal for NSF when it was defined in 2018 and was considered something for the longer-term to explore. Fast forward to today and we have turned our mental models upside down on how we work and where we work bringing this bold step front and center.

NSF has adapted how we deliver our mission, how we support our workforce, and how we use technology. Given this, HRM is conducting an analysis of the workforce sentiment and infrastructure required to support remote work. While these findings are being developed and socialized, a fundamental conversation needs to be had around what the NSF of the future looks like.

Committee Action/Feedback

1. We believe our new normal will fall somewhere on the continuum between where we are today with a fully virtual presence and where we were before with a large part of our workforce teleworking one or two days a week. With less face-to-face interactions, how are your organizations thinking about maintaining the elements of the organizational culture that are valued and diminishing those elements that need to adapt?
2. One of the considerations when thinking through support for remote work is in recruiting talent. How should NSF think about recruiting talent to increase diversity and participation from a broader set of institutions for our Federal workforce and rotator program? What are potential pitfalls?
3. NSF senior leadership has to define the vision for the future of work at NSF. Like most organizations, much of what is ahead is uncertain. How should we think about managing that uncertainty while striking a course for our employees?

Contact Person: Bill Malyszka, (703) 292-7142, wmalyszk@nsf.gov

The Future of Work

Remote Work

Briefing to the BOAC

March 2021

Outline

- Pre-Pandemic
- How We Adapted
- What We Learned
- Engaging Our Workforce
- What We need to Answer

Pre-Pandemic

- The entire workforce, except 11 employees, were assigned to the NSF HQ as their duty station
- NSF values its culture which is grounded in interpersonal relationships and collaboration
- NSF overcame initial resistance to telework by managers over the past few years with many employees regularly teleworking 1 or 2 days a week
- Onboarding and assimilation took place in-person
- Rotators were expected to work at NSF HQ and travel back to their home institutions for IR/D activities
- Still had many paper-based processes

How we Adapted

March 13, 2020 was the last day in the office for most people – their safety was our top priority

Adapted how we work and maintained the mission

- Quickly pivoted to using technology like Zoom and MS Teams
- All virtual panels

Took the employee experience online

- Fully virtual onboarding process and new employee experience
- Whole-person approach to supporting our workforce
- Classroom training offerings re-engineered to be virtual

Our IT was ready to go

- VPN and infrastructure kept business applications available
- Adopted Zoom, MS Teams, and LogMeIn
- Document Routing System
- USA Performance

What We Learned

- Our work can be done anywhere
- We have an infrastructure that is fit for our needs with minor enhancements
- Other agencies are on the path to considering remote work
- Our employees and supervisors are an amazingly resilient group of people dedicated to the NSF mission

Engaging Our Workforce

Bold Step 3: Assess the workforce desire for and the feasibility of a geographically distributed workforce

Kicked off a workgroup in October to conduct this assessment and develop recommendations about the future of work at NSF.

- Agency-wide survey
- Multiple focus group sessions
- Subject Matter Expert (SME) interviews internal & external to NSF
- Evaluating policy/legal constraints
- Reviewed and analyzed existing survey and historical data
- Reviewed the business literature and leading practices from industry

Engaging Our Workforce

Employee Survey asked about the following topics

- Employee preference for telework and remote work
- Benefits of remote work employees anticipate
- Supervisor confidence in managing hybrid workforce
- Supervisor perception of performance during pandemic
- What activities employees feel are best done face-to-face
- Employee anticipated challenges and concerns with hybrid workforce

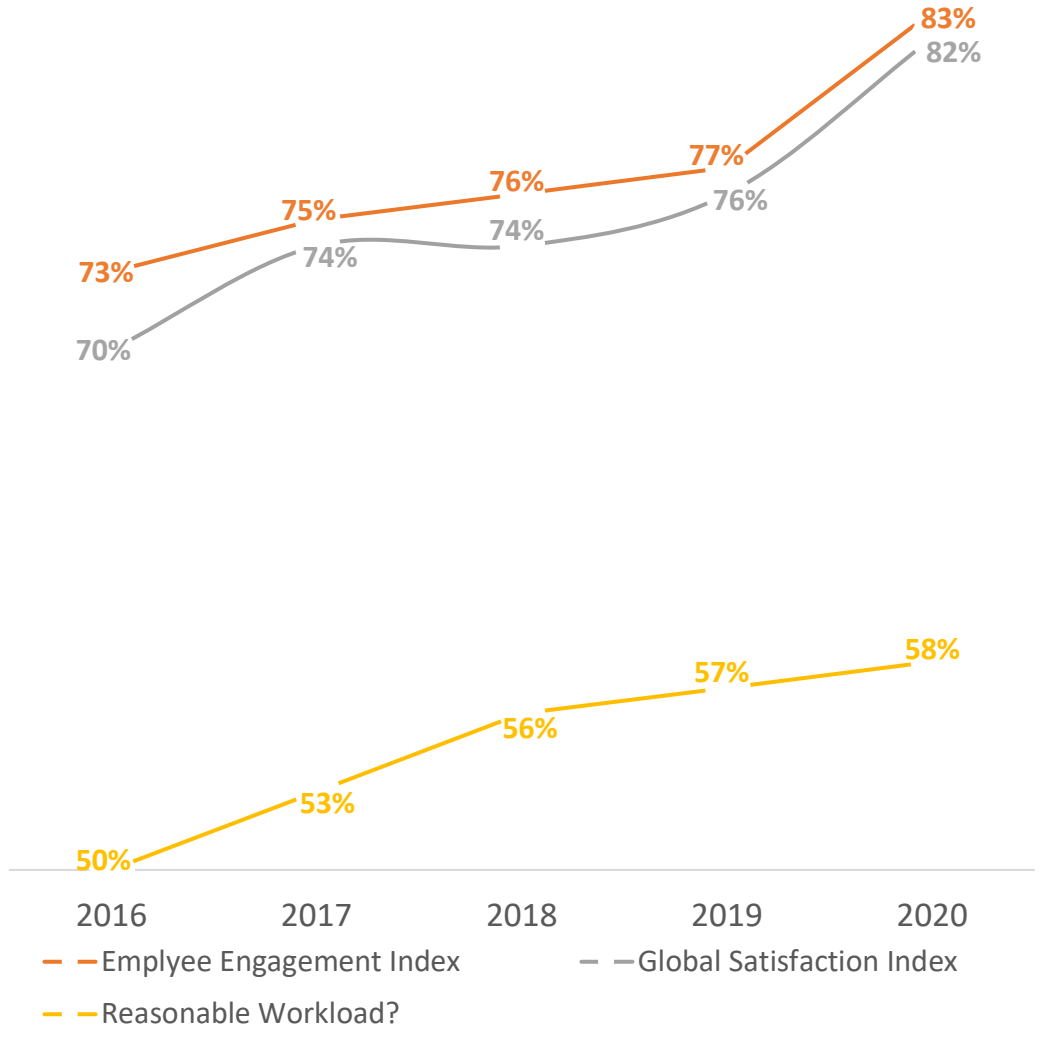
Engaging Our Workforce

2020 FEVS results measured in November

Employee Engagement Index increased 6 points from 2019

Global Satisfaction Index increased 6 points from 2019

Q10, “My workload is reasonable?” increased 1 point



What We Need To Answer

NSF has fundamental questions to answer about the future of work

- What is the workforce's interest in remote work?
- What do we want the future of work to be at NSF?
- What changes to how we deliver our mission are we willing to adopt?
- How do we maintain the parts of the NSF culture we want to preserve?

Backgrounder: Spring 2021
NSF Advisory Committee for Business and Operations

Nature of Agenda Item: Development of the NSF 2022-2026 Strategic Plan

Presentation:

The Government Performance and Results Act (GPRA) of 1993 and GPRA Modernization Act of 2010 requires federal agencies to publish their strategic and performance plans in pursuit of their missions. NSF is working to develop its 2022-2026 Strategic Plan to include strategic goals, strategic objectives, and key strategies to guide agency efforts. The strategic plan anchors a series of implementation-level plans and efforts, including:

- NSF's annual performance plan, which sets specific performance measures, such as budget and schedule execution for major research facility projects, or tracking our progress in making awards in key program areas such as the Big Ideas;
- NSF's Human Capital Operating Plan;
- Individual performance plans of senior executives; and
- Management plans of every NSF solicitation.

A prior Budget & Operations Advisory Committee recommended that NSF maintain a separate strategic goal focused on the management of the agency. Each plan since 2003 has included such a goal. Prior iterations have included: phrases like organizational excellence; stewardship; perform as a model organization; excel as a Federal agency; and most recently, enhance NSF's performance of its mission.

For the next plan, NSF seeks to consider ways to reflect the charge from Director Panchanathan to "strengthen at speed and scale" to ensure NSF is well positioned for a variety of anticipated challenges and opportunities over the next four years.

Committee Action/Feedback

NSF seeks the Committee's insights on how to structure management-related objectives, balancing the need to be a nimble organization to meet the ever-changing landscape while maintaining focus on our essential business operations.

1. How can NSF "strengthen at speed and scale" as a Federal agency?
    - What challenges unique to the Federal landscape should we be aware of?
    - What opportunities should we seize?
2. What lessons can we draw from the work, training, and outreach that we and other organizations have been able to do during the pandemic? How can we best prepare and support our workforce to "strengthen at speed and scale"?
3. How can the plan guide our efforts to balance needs between maintaining essential functions and capturing opportunities to be nimble?

Contact Person:
Janis Coughlin-Piester, 703-292-7853, jacoughl@nsf.gov

National Science Foundation

2022-2026
NSF STRATEGIC PLAN

Budget & Operations Advisory Committee – March 2021

Janis Coughlin-Piester, Steve Meacham, and Jennifer Plozai

2022-2026
NSF STRATEGIC PLAN

Background

Authority

- Government Performance and Results Act of 1993 (GPRA)
- GPRA Modernization Act of 2010

Guidance

- OMB Circular A-11, Part 6
- Development is inherently governmental
- Not a university strategic plan

Timeline

- Development Oct 2020 – Dec 2021
- Initial Draft to OMB June 4, 2021
- Final Publication February 2022

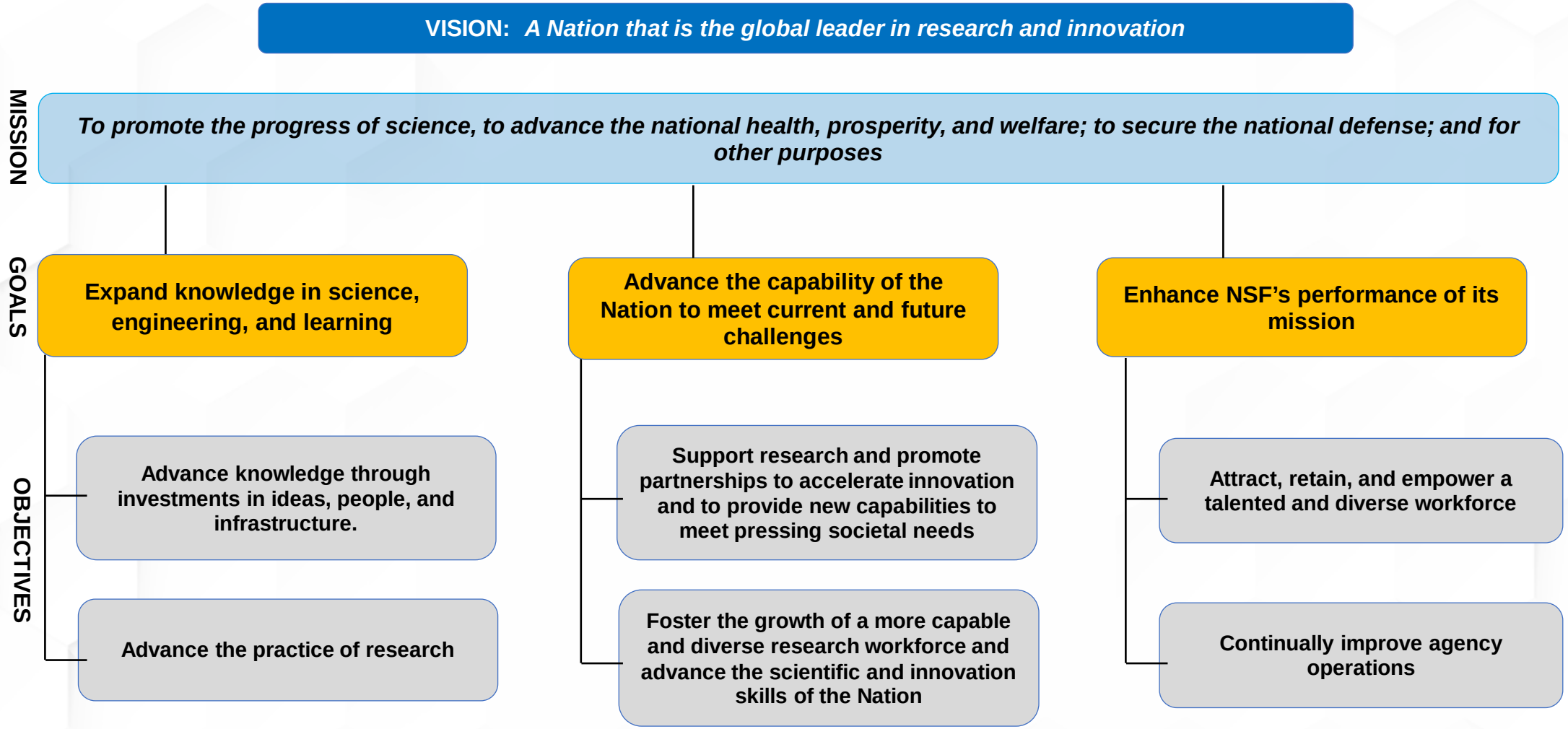
Contributors to the Process

2022-2026
NSF STRATEGIC PLAN

High-level questions for public comment

1. What are the interests, values and emergent science and policy issues that the Strategic Plan should recognize?
2. How can NSF help maintain US leadership in an evolving global research and education landscape?
3. How can the plan best underscore the importance to the Nation of fundamental research and its broader impacts?

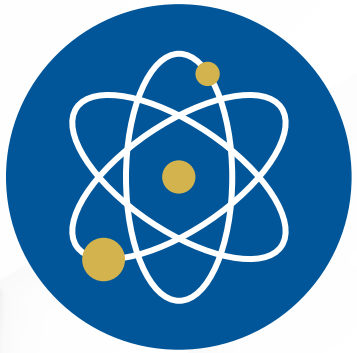
NSF Strategic Plan for Fiscal Years 2018-2022



NSF Strategic Plan Goals 2003 - Present

Title	FYs	Mission Strategic Goals			Management Goal
No title NSF 04-201	2003-2008	Ideas	People	Tools	Organizational Excellence
Investing in America's Future NSF 06-48	2006-2011	Discovery	Learning	Research Infrastructure	Stewardship
Empowering the Nation Through Discovery and Innovation NSF 11-047	2011-2016	Transform the Frontiers		Innovate for Society	Perform as a Model Organization
Investing in Science, Engineering, and Education for the Nation's Future NSF 14-043	2014-2018	Transform the Frontiers of Science and Engineering		Stimulate Innovation and Address Societal Needs through Research and Education	Excel as a Federal Science Agency
Building the Future: Investing in Discovery and Innovation NSF 18-045	2018-2022	Expand knowledge in science, engineering, and learning		Advance the capability of the Nation to meet current and future challenges	Enhance NSF's performance of its mission

Context, Challenges, and Opportunities



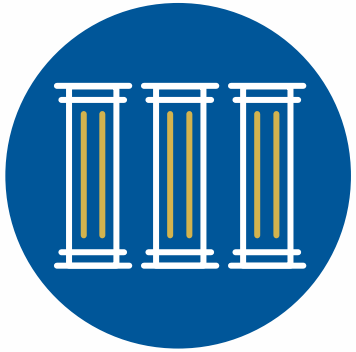
NSB Vision 2030

Research benefits

STEM talent

Geography of innovation

Global S&E community



NSF Vision

Advancing research

Accessibility and inclusivity

Global leadership

Translation, Innovation, Partnerships (TIP)

Administration Pillars

Pandemic response

Economic recovery

Racial equity

Climate change

NSF'S MISSION

To promote the progress of science; to advance the national health, prosperity, and welfare; and to secure the national defense.

Director's Vision

- Advance the frontiers of research into the future
- Ensure accessibility and inclusivity
- Secure global leadership

We are in a **DEFINING MOMENT**

- Intensity of global competition
- Urgent need for domestic talent
- Broad support for science as path for solving global grand challenges

We can accomplish this vision with:

SPEED AND SCALE

2022-2026
NSF STRATEGIC PLAN

Management Goal: Capturing Context, Challenges, and Opportunities

1. How can NSF "strengthen at speed and scale" as a Federal agency?
   - What challenges unique to the Federal landscape should we be aware of?
   - What opportunities should we seize?
2. What lessons can we draw from the work, training, and outreach that we and other organizations have been able to do during the pandemic? How can we best prepare and support our workforce to "strengthen at speed and scale"?
3. How can the plan guide our efforts to balance between maintaining essential functions and capturing opportunities to be nimble?