Behavioral and Social Sciences Research at NIH

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Director, Office of Behavioral and Social Sciences Research (OBSSR)

NICHD Advisory Council Meeting
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Scientific Consultant:
Rosalind (Roz) King, Ph.D., Chief, Scientific Development and Coordination Section, OBSSR
A bit about me…

• Joined OBSSR on July 30, 2023
• NIH Associate Director for Behavioral and Social Sciences Research
• Director, Office of Behavioral and Social Sciences Research

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When asked to reflect upon mistakes in his tenure as NIH Director, Dr. Francis Collins said:

Maybe we underinvested in research on human behavior. (PBS Newshour 12/20/21)

About 1 in 5 American adults have not received any COVID-19 vaccination

(CDC, 2022; Mayo Clinic, 2022)
Without attention to BSSR, the promises of even the greatest biomedical breakthroughs can fall short . . .

• Oral PrEP could be a game-changer but for:
  • Stubbornly low uptake (CDC, 2021).
  • Initial resistance from HIV care systems (Mayer, et al 2020)
  • Stigma in the community (Calabrese & Underhill, 2015; Rosengren, et al, 2021)

• “In the VOICE trials, we learned that we can not determine a product’s efficacy if people do not use it.” (Marrazzo, et al., 2015)
BSSR Shapes Health Policies and Improves Health Outcomes

- Smoking Cessation Programs
- HIV Prevention Strategies
- Physical Activity Promotion
- Dietary Interventions
- Vaccination Campaigns
- Mental Health Interventions
- Adherence to Medical Treatment
- Reducing Health Disparities
OBSSR: Our History and Purpose

The NIH Office of Behavioral and Social Science Research (OBSSR) was created by Congress in 1993 (opened in 1995) to:

- **Coordinate** the health-relevant behavioral and social sciences at NIH.

- **Identify challenges and opportunities** to advance these sciences at NIH.
OBSSR Budget

• With an annual budget of more than $45 billion, NIH is the largest single public funder of biomedical and behavioral research in the world.

• OBSSR’s Budget
  • ~$40.8 million in FY23 (still awaiting FY24 budget).
  • Steady increase over time, with the largest jump in FY22.
  • ~75–80% distributed across NIH Institutes and Centers to co-fund high-quality BSSR that is consistent with the OBSSR mission.
OBSSR Co-Funding Amount by Fiscal Year, 2019–2023

Fiscal Year

2019  $20

2020  $22

2021  $23

2022  $33

2023  $32

Dollars (in Millions)
OBSSR Grant Co-Funding Across NIH ICs, FY23

- NIMH: 21
- NIA: 18
- NICHD: 17
- NIDA: 9
- NHLBI: 9
- NIDDK: 7
- NCCCH: 10
- NCI: 10
- NINR: 7
- NEI: 11
- NIH: 3
- FIC: 7
- NIAIMS: 4
- NIDCD: 6
- NIBIB: 1
- NIAAA: 2
- NCCPO: 3
- NINDS: 5
- NHGRI: 1
- NIAID: 1

$6,000,000
$5,000,000
$4,000,000
$3,000,000
$2,000,000
$1,000,000
$-

NIH National Institutes of Health
Office of Behavioral and Social Sciences Research
NICHD Grants with OBSSR Co-Funding in FY2023

• Biological and social mediators of child wellbeing among ethnic groups in Fragile Families (R01HD076592-10).
• Impact of School-Based Health Centers on Improving Health and Promoting Equity (R01HD109190-01A1).
• Kinship, Nuptiality and Child Health Outcomes in a Low-Income Urban Area (R01HD101613-03).
• Play and Learning Across a Year (PLAY) (R01HD094830-05).
Council of Councils Working Group Input
Recommendations From the Council of Councils Working Group Report (1 of 2)

• Strategic Integration
  • Consistently include BSSR in IC Strategic Plans, link to IC missions.
  • Increase BSSR application in IC research and training initiatives.
  • Foster team science and multidisciplinary integration.

• Expertise and Representation
  • Address gaps in number of staff and increase diversity of BSSR expertise at NIH.
  • Ensure each IC Advisory Council has at least two members with behavioral or public health expertise.
  • Ensure scientific review panels reflect BSSR knowledge and expertise.
Recommendations From the Council of Councils Working Group Report (2 of 2)

• Capacity Building
  • Increase centers, resource grants, and trial networks with BSSR capacity and focus.
  • Engage BSSR expertise early in developing and implementing research policies and practices.

• Data and Diversity
  • Enhance analytical approaches to characterize and track NIH funding trends in BSSR.
  • Use BSSR findings to create evidence-based approaches to workforce diversity.

• Scientific Practice
  • Use BSSR to improve the effective, efficient, equitable, and ethical conduct of science.
FY24 Scientific Priority Areas (1 of 2)

• Behavior Change, Maintenance, and Mechanisms of Impact
  • Theory-informed research on the initiation and maintenance of health-promoting behaviors and the mechanisms (basic behavioral and physiologic) underlying behavioral interventions that promote health.

• Social Connection and Health
  • Research that examines the role of social relationships and interactions (e.g., in dyads, families, and other social groups) on health, including the mechanisms through which social isolation or connectedness accelerate or impede biologic and other disease processes, affect the execution of health behaviors, and impact overall health and well-being.
FY24 Scientific Priority Areas (2 of 2)

• Multi-Level Research
  • Research that examines the interaction of social and behavioral influences on health at multiple levels (i.e., biological, intrapersonal, interpersonal, community, organizational, structural, environmental, policy)

• Integration of BSSR into Biomedical Research
  • Research, training initiatives, and other programs such as workshops that promote and provide opportunities to increase the integration of BSSR within IC activities typically focused mainly on biomedical priorities.

• Health Communication Science
  • Research that examines the effects of health communication on behavior and health outcomes, both at the individual and group levels. Research that examines the evolving communication ecosystem and the processes of trust are of particular interest (e.g., research on health, science, and media literacy; decision-making under uncertainty; patient-provider communication; traditional media and newer communication channels such as social media).
Strategic Planning Process

Assessed Progress and Future Plans: Reviewed progress from the 2017–2021 Strategic Plan and identified future directions and frameworks.

Gathered Input From the Research Community: Issued two Requests for Information (RFIs), reaching out to both the extramural research community and other external collaborators.

Collected Feedback From Federal Partners: Held listening sessions with NIH staff and leadership, and collected input from the NIH BSSR Coordinating Committee.

Refined Priorities and Objectives: Synthesized the feedback from the RFIs and listening sessions, and developed a final version of the 2025–2029 Strategic Plan.
Our Mission and Vision

**Mission**

Enhance the impact of health-related behavioral and social sciences research (BSSR) by:
- Identifying BSSR projects that should be supported by NIH
- Developing and coordinating BSSR initiatives with NIH ICOs
- Integrating BSSR within the larger NIH research enterprise
- Communicating significant BSSR findings within NIH and beyond

**Vision**

We envision a world in which the synergistic integration of the behavioral and social sciences with biomedical research leads to accelerated scientific discovery, effective treatment and health-promotion interventions, and equitable implementation strategies that will improve health for all.
Strategic Priorities

CROSSCUTTING THEME: HEALTH EQUITY

RESEARCH

- Synergistic Inquiry
- Investigation Innovation
- Implementation and Impact: Accelerate Sustained Adoption of BSSR Findings Into Practice and Policy

CAPACITY

- Develop and Diversify the BSSR Workforce

OPERATIONAL

- Uphold Values of Diversity, Equity, Inclusion, and Accessibility (DEIA)
- Build Equitable Partnerships and Collaborations
- Enhance Communication Among Scientists and With the Public
Initiatives Led or Co-Led by OBSSR

• **BRAIN Initiative: Brain Behavior Quantification and Synchronization (BBQS)**
  • Supports the development and validation of next-generation platforms and analytic approaches to precisely quantify behaviors in humans and link them with simultaneously recorded brain activity.

• **Violence Research Initiatives**
  • OBSSR coordinates $12.5 million appropriated to NIH to support research on firearm injury and mortality prevention by taking a comprehensive approach to studying the underlying causes and evidence-based methods of prevention of firearm injury, including crime prevention.
OBSSR-Led Training Programs

• T32 Training in Advanced Data Analytics for Behavioral and Social Sciences Research (TADA)
  • 5 T32HD101442-04 Data Science Training in Demography and Population Health.
  • 5 T32HD101364-04 Computational Social Science Training Program.

• R25 Short Courses on Innovative Methodologies and Approaches in the Behavioral and Social Sciences
  • 5 R25HD108136-02 Modelers and Storytellers: Transdisciplinary Training to Advance Community Health Intervention Research.
Time-Sensitive Opportunities for Health Research

- Establishes an accelerated review/award process to support research to understand health outcomes related to an unexpected and/or time-sensitive event (e.g., pandemic; national policy change; natural disaster).
- Applicants must demonstrate that the research proposed is time-sensitive and must be initiated with minimum delay.
- Supports opportunities where empirical study could only be available through expedited review and funding.
  - The impact of new state restrictions on abortion incidence and safety in the United States (R61HD112921)
OBSSR Support for Maternal Health Initiatives Through IMPROVE

• Career Enhancement Award to Advance the Study of Intimate Partner Violence (IPV) in the Context of Maternal Morbidity and Mortality Research (K18 Clinical Trial Not Allowed).

• Short Courses on Techniques for Measuring Intimate Partner Violence (IPV) in Different Populations (R25 Clinical Trial Not Allowed).
### IMPROVE FY24 Concepts

IMPROVE plans to support additional initiatives, focused on populations that experience health disparities through other funding opportunities in FY24:

<table>
<thead>
<tr>
<th>ICO</th>
<th>Target Population</th>
<th>Project Title</th>
<th>Details</th>
<th>NOFO</th>
<th>Status</th>
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<tbody>
<tr>
<td>OBSSR (Lead), NICHD, NINR</td>
<td>Black/African American, AI/AN, Hispanic, and AA/PI/NH</td>
<td>Career Enhancement Award to Advance the Study of Intimate Partner Violence in the Context of Maternal Morbidity and Mortality Research (K18 Clinical Trial Not Allowed/Required)</td>
<td>To provide experienced maternal mortality investigators with training and career development experiences in IPV research, to integrate violence and IPV-related constructs, theories, and interventions into their programs of research. The goal is to address the intersection of these public health crises and provide empirically supported interventions to prevent maternal mortality.</td>
<td><a href="https://grants.nih.gov/grants/guide/rfa-files/RFA-OD-24-001.html">https://grants.nih.gov/grants/guide/rfa-files/RFA-OD-24-001.html</a></td>
<td>Awards anticipated in June 2024</td>
</tr>
<tr>
<td>OBSSR (Lead), NICHD, NINR</td>
<td>Diverse population</td>
<td>R25 for Short Courses on Integration of Measurement of Intimate Partner Violence into Maternal Health Research with Diverse Populations</td>
<td>To educate researchers on best practices for measuring IPV in populations related to maternal mortality research. The applicants must hold at least one course each of two years and develop programs that can reach a broader audience. The courses can be in-person, hybrid, or fully remote, and the methodologies and approaches taught must be reliably applied across diverse groups. The plan must include disseminating user-friendly course materials to the broader scientific community.</td>
<td><a href="https://grants.nih.gov/grants/guide/rfa-files/RFA-OD-24-002.html">https://grants.nih.gov/grants/guide/rfa-files/RFA-OD-24-002.html</a></td>
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OBSSR Support for Research on Persons with Disabilities

• Provided co-sponsorship for NICHD/NCMRR workshop on Ableism in Medicine and Clinical Research.

• Co-sponsored NICHD/NCMRR’s RFA Understanding and Mitigating Health Disparities experienced by People with Disabilities caused by Ableism (R01 Clinical Trial Optional).

• Jane serves as an ex officio member of NIMHD’s Council.
Upcoming OBSSR Events

June 2024
• Behavioral and Social Science Insights for the Future of Scientific Conferencing – A Workshop (6/6, 6/7, and 6/11)

July 2024
• Director’s Webinar on the intersection of social science, aging, and health disparities with Dr. Rebeca Wong (7/23)

September 2024
• Director’s Webinar on justice-involved individuals and access to healthcare with Dr. Emily Wang (9/17)
Appendix
BSSR Shapes Health Policies and Improves Health Outcomes

1. **Smoking Cessation Programs**: Understanding the psychological aspects of addiction and behavior change has led to the creation of interventions that promote smoking cessation and reduce tobacco-related health issues.

2. **HIV Prevention Strategies**: Studies on risk perception, stigma, and communication have helped develop targeted interventions to promote safe behaviors, increase awareness, and reduce the spread of HIV.

3. **Physical Activity Promotion**: Understanding social determinants and behavioral patterns has led to the development of programs encouraging exercise, ultimately reducing the risk of chronic diseases such as cardiovascular problems and obesity.

4. **Vaccination Campaigns**: Understanding factors influencing vaccine acceptance, addressing vaccine hesitancy, and tailoring communication strategies have improved vaccination rates, preventing the spread of infectious diseases.

5. **Mental Health Interventions**: Evidence-based interventions for mental health issues include therapies, support systems, and awareness campaigns aimed at reducing stigma and promoting early intervention for mental health conditions.

6. **Dietary Interventions**: Social science research on dietary habits and cultural influences has informed public health efforts to combat obesity and related health issues. Tailoring nutrition education and interventions to specific communities has been shown to be more effective in promoting healthier eating habits.

7. **Adherence to Medical Treatment**: Understanding patient behaviors, motivations, and barriers has led to interventions that improve medication adherence and overall health outcomes.

8. **Reducing Health Disparities**: Social science research on disparities based on socioeconomic status, race, and ethnicity can lead to more equitable health outcomes.