Office of Science
Diversity, Equity & Inclusion Initiatives

Presentation to the
High Energy Physics Advisory Panel

July 10, 2019

Dr. Julie Carruthers
Senior Science & Technology Advisor
Office of the Principal Deputy Director
DOE Office of Science
https://science.osti.gov
Diversity, Equity & Inclusion Initiatives

- DEI at the DOE National Labs
- Promoting DEI in SC’s Business Practices
- SC’s Statement of Commitment
- DOE & Interagency Coordination
In 2015, the DOE Office of Science began to take a closer look at the policies and requirements of its 10 DOE national laboratories for fostering diverse and inclusive research environments, as well as policies and procedures for prohibiting discrimination and harassment.

The DOE laboratories are required under their Management & Operating (M&O) Contracts to have in place “innovative strategies for increasing opportunities to fully use the talents and capabilities of a diverse work force,” including promoting diversity through:

- The contractor’s workforce
- Educational outreach
- Community involvement
- Subcontracting and technology transfer

The DOE labs must also meet the requirements set forth in civil rights laws regarding the prohibition of discrimination and harassment and preventing hostile work environments.

Up until that time, oversight of these requirements were largely managed by the SC federal site offices.
A New SC Process for Review of SC Labs’ DEI Efforts

- Since 2006, SC leadership has engaged its 10 DOE labs in annual laboratory planning (ALP) processes whereby SC’s senior management reviewed the labs’ S&T strategic plans, including looking at infrastructure needs and human resources. A recognized best practice in DOE.

- In 2016, borrowing a page from SC ALP playbook, SC established a process for an SC Headquarters-led annual evaluation of the laboratories’ efforts in diversity, equity, and inclusion (DEI).

- In October 2016, the former SC Director issued a memo to the 10 SC laboratories describing:
  1. The steps SC would take to establish uniform guidance for SC laboratories to communicate their DEI strategies to SC, and how SC would review and provide feedback on their strategies, and
  2. A new requirement for the SC laboratories to publically post their workforce demographic data on their public websites, and update the data annually. (Due by April 2017.)

- The Labs were invited to provide feedback on the SC guidance before it was issued in final form.

- The National Laboratory Directors Council (NLDC) came up with a common set of job categories across the DOE lab complex that the labs would use to report demographic information in a consistent manner.
This new process started a shift in oversight from compliance to requiring actionable strategies.

- SC guidance to the 10 labs provided a common set topics the labs should address in their DEI Strategies, including describing their assessment of the lab’s DEI challenges, DEI goals, leadership and staff roles and responsibilities, planned actions, measures of progress and accomplishments, and workforce data.

- SC HQ reviews of the labs’ strategies – including Program Office leadership level review (Associate Directors), and provides detailed feedback to the contractor leadership through in-person meetings with SC senior management and detailed written feedback.

- After three years of this process, SC decided to commence an external peer review of experts to evaluate the laboratories’ DEI efforts. The review occurred in November 2019 and SC is finalizing its official feedback to each of the 10 laboratories.

- The laboratories will be required to address the findings from the peer review as part of their FY 2020 and FY 2021 contractor performance plans.
Emerging DEI Promising Practices at DOE Labs

A few examples in areas critical for institutional leadership in DEI:

Leadership and accountability:

- Strong commitment by leadership to fostering a culture of diversity, equity, and inclusion at the laboratory is demonstrated through visible policies and actions, including personal statements, regular meetings with laboratory staff to communicate the laboratory’s commitment.

- Diversity, equity, and inclusion are communicated as *central* to advancing science and innovation, not an “add-on,” and not about compliance.

- The laboratory understands its DEI challenges by collecting input through multiple mechanisms to get the views and experiences of employees, visiting scientists, users, and students.

- Laboratory DEI goals and strategies are data-driven. Laboratories embrace a scientific approach to evaluating the effectiveness of their actions based on clear measures of success and data.

- Leadership is held accountable for the laboratory’s DEI goals through several mechanisms, including incorporating DEI goals into performance appraisals with clear standards for evaluation.
A few examples in areas critical for diverse hiring and retention:

**Recruiting and Hiring practices:**

- Openly posting and competing all laboratory positions, including postdoc positions. Screening all job postings for gender biased language using reputable commercial software programs.

- Using diverse hiring panels who review applications and conduct interviews.

- Management oversight and review of the diversity of candidate pools before commencing with interviews – and reopening announcement and recruiting if the candidate pools are not diverse.

- Requiring quality diversity and implicit bias awareness and mitigation training of all hiring panel members and hiring managers. And refresher training on a regular basis.

- Using a standard set of interview questions for all candidate interviews.

- Leadership oversight of hiring recommendations (one-over-one review of selection decisions). Leadership is provided the diversity data for applicants and interviewees at each stage in a hiring process.
Emerging DEI Promising Practices at DOE Labs (cont’d)

Professional and leadership development opportunities for employees:

- Providing mentorship opportunities for employees in all stages of their careers, consistent with a defined mentorship strategy.

- Mentoring responsibilities are approached with intentionality, use evidenced-based practices, and set expectations for mentors and mentees. Professional development on effective mentorship and evidenced-based tools and strategies are available to mentors and mentees.

- Paring leadership with managers and supervisors for leadership mentoring.

- Ensuring processes for selecting employees for leadership development programs, including speaking opportunities, are fair and transparent, with attention paid to equitable decision making based on data when making recommendations.

- Considering allowing self-nomination processes for certain professional development opportunities.

- Ensuring clear, objective criteria are used for assessing employees for promotion decision, taking into consideration institutional data on who has had access to opportunities.
Emerging DEI Promising Practices at DOE Labs (cont’d)

Fostering inclusive research environments:

- The laboratory understands its DEI challenges, particularly the laboratory culture, by collecting input through multiple mechanisms to get the views and experiences of employees, visiting scientists, users, and students (climate surveys, focus groups, D&I councils, exit surveys).

- The laboratory has policies, procedures, mechanisms, and networks in place to support the needs of a diverse workforce, and senior managers and supervisors are supportive of their use:
  - Family friendly benefits and policies (flexible work schedules, telework, paid family leave)
  - Employee Resource Groups (women, early career, race/ethnic minority group, LGTBQ+, veterans)

- The laboratory has a zero tolerance posture towards discriminatory, harassing, and unprofessional behaviors, and this message is reinforced at all levels.
  - Employees, users, visitors and, students have multiple options to report an issue or seek advice and are encouraged to speak up.
  - A “zero tolerance” posture means more than just assigning training as a response.
DOE National Labs Workforce Demographic Data (all 17)

DOE Lab Demographics of Research/Technical Management Staff

RESEARCH/TECHNICAL MANAGEMENT (FIRST-LINE AND MID-LEVEL)

- **Women:** 18.17%
- **Under-Represented Minorities:** 8.39%
- **Other People of Color:** 8.70%

CHANGE DATA VIEW:
- All Jobs
- Senior Leadership
- Research/Technical Management
- Operations Management
- Technical Research Staff
- Operations Support Staff
- Post Doctoral
- Graduate Student
- Undergraduate Student

https://nationallabs.org/staff/diversity/ (NLDC Website)
## DOE Lab Workforce Demographics All Job Categories

<table>
<thead>
<tr>
<th>TYPES OF JOBS</th>
<th>TOTAL</th>
<th>WOMEN</th>
<th>%</th>
<th>URM</th>
<th>%</th>
<th>OPC</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Senior Leadership (Director/President, Deputy Director/Vice President, Associate Lab Director)</td>
<td>265</td>
<td>66</td>
<td>24.91%</td>
<td>20</td>
<td>7.55%</td>
<td>9</td>
<td>3.40%</td>
</tr>
<tr>
<td>Research/Technical Management (first-line and mid-level) (Engineering Management, Research Management, Technical Management)</td>
<td>4,552</td>
<td>827</td>
<td>18.17%</td>
<td>382</td>
<td>8.39%</td>
<td>396</td>
<td>8.70%</td>
</tr>
<tr>
<td>Operations (or Research Support) Management (Business Management, Computer Systems, Communications, ESHQ, Facilities Ops, HR, Legal, Tech Transfer, Strategic Planning)</td>
<td>2,963</td>
<td>1,122</td>
<td>37.87%</td>
<td>497</td>
<td>16.77%</td>
<td>190</td>
<td>6.41%</td>
</tr>
<tr>
<td>Technical Research Staff (Non-management: Researchers, Scientists, or Engineers)</td>
<td>21,698</td>
<td>4,014</td>
<td>18.50%</td>
<td>2,218</td>
<td>10.22%</td>
<td>2,808</td>
<td>12.94%</td>
</tr>
<tr>
<td>Operations Support Staff (Non-management: support roles)</td>
<td>25,905</td>
<td>10,602</td>
<td>40.93%</td>
<td>7,426</td>
<td>28.67%</td>
<td>1,165</td>
<td>4.50%</td>
</tr>
<tr>
<td>Post Doctoral (Post-doc employees)</td>
<td>2,699</td>
<td>659</td>
<td>24.42%</td>
<td>233</td>
<td>8.63%</td>
<td>985</td>
<td>36.49%</td>
</tr>
<tr>
<td>Graduate Student (Funded by Lab)</td>
<td>2,541</td>
<td>746</td>
<td>29.36%</td>
<td>382</td>
<td>15.03%</td>
<td>532</td>
<td>20.94%</td>
</tr>
<tr>
<td>Undergraduate Student (Funded by Lab, do not include undergrad student funded by DOE directly i.e. SUJI)</td>
<td>3,113</td>
<td>1,244</td>
<td>39.96%</td>
<td>829</td>
<td>26.63%</td>
<td>392</td>
<td>12.59%</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>63,736</strong></td>
<td><strong>19,280</strong></td>
<td><strong>30.25%</strong></td>
<td><strong>11,987</strong></td>
<td><strong>18.81%</strong></td>
<td><strong>6,477</strong></td>
<td><strong>10.16%</strong></td>
</tr>
</tbody>
</table>

Includes: Laboratory recruited roles (includes roles waived from posting), postdoc employees, and students funded by the lab (not DOE funded students)
Excludes: Unknown ethnicity and multi ethnicities
URN = Under Represented Minorities (e.g.: African American/Black, Hispanic/Latino, and American Indian/Alaskan Native)
OPC = Other People of Color (e.g.: Asian/Asian American and Pacific Islanders).
Includes data from all 17 national labs.

[https://nationallabs.org/staff/diversity/](https://nationallabs.org/staff/diversity/) (NLDC Website)
Promoting DEI in SC’s Business Practices – in Progress

- In 2018, the Office of Science initiated an internal review of its business practices to identify opportunities to better promote diversity, equity, and inclusion in our award making and awards management processes, and better communicate policies, practices, and procedures to our research community. SC established an internal D&I Working Group to carry out this review.

**Charge:**

- Assess what SC is currently doing to improve diversity, equity and inclusion.

- Identify opportunities for SC to demonstrate that diversity, equity, and inclusion are foundation to SC business practices:
  - Through its processes and procedures for research awards to universities and the DOE labs;
  - Through its processes and procedures for PI meetings, workshops, and advisory committees; and
  - Through better outreach and communications (internally and with the SC research communities).
Review of DEI in SC’s Business Practices

I. Information Request on DEI in the 8 SC Program Office business practices, and analysis.

II. Deep Dive into SC’s practices by topic area:

- Existing flexibilities within current financial assistances policies and regulations;
- Solicitation language, use of Letters of Intent and Pre-proposals;
- Peer Review Processes (Proposals: e.g. reviewer selection process, proposal review processes, associated programs manager and reviewer training, and resources/tools);
- Peer Review Processes (Performance reviews: S&T research reviews at DOE sites, and user facilities reviews);
- Workshops/Roundtables and Principal Investigator Meetings;
- FACAs and Subcommittees/COVs; and
- Notional implementation strategies.

Process for discussion of each topic area included:

- Systematic review of current SC policies and procedures; existing practices of some SC programs offices; analysis of outcomes from SC-sponsored equity workshops (2006-2009); COV recommendations (2012 to present); and known policies and practices of other Federal agencies and institutions.
15 Recommendations were generated from the working group in all discussion topic areas. Each recommendation has multiple components and includes the development of resources and tools, guidance and training (e.g. for program managers, reviewers, etc.)

The recommendations are aimed at ensuring that SC’s business processes:

- Are supportive and inclusive of women and underrepresented minorities in STEM fields;
- Allow for more rigorous tracking of diversity of applicants, awardees, and reviewers;
- Limit and mitigate implicit bias behaviors; and
- Encourage inclusive and professional behaviors in all SC sponsored activities.

The full recommendations report is with SC senior leadership for review and concurrence. Upon approval, SC will reconstitute a working group focused on implementation.

Communications to the SC community will be a part of the rollout of any new policies and procedures that SC implements.
DOE Policies Prohibiting Discrimination & Harassment

- Federal civil rights laws* are codified into DOE’s regulations.

- DOE has long had policies in place prohibiting discrimination and harassment by institutions that we fund (at academic institutions, small businesses, and DOE national labs), and by employees.

- To bring awareness to the SC research community of DOE’s policies regarding the prohibition of discrimination and harassment, SC established a website that consolidates DOE’s policies and procedures as they apply to recipients of financial assistance (grants and cooperative agreements), DOE national laboratory contract staff and laboratory visitors, and DOE federal employees.


* e.g. 1964 Civil Rights Act; 1972 Education Amendments; 1973 Rehabilitation Act; 1975 Age Discrimination Act.
DOE Policies Prohibiting Discrimination & Harassment*

Federal Civil Rights Laws

Relationship to DOE

Financial Assistance Recipients
(Colleges, Universities, Small Businesses)

DOE National Labs
(M&O Contractor, visiting scientists, students and users)

Federal Offices
(DOE Federal employees)

Awardee Institution:
• Title IX Coordinator/Office

DOE Lab Contractor:
• HR, ECP
• M&O Title IX Cord

Federal oversight office and alternatives for reporting complaints

DOE Office of Civil Rights & Diversity

Dept of Labor, Office of Federal Contract Compliance Programs

U.S. Equal Employment Opportunity Commission

* Simplified View
The DOE Office of Science (SC) is fully and unconditionally committed to fostering safe, diverse, equitable, and inclusive work, research, and funding environments that value mutual respect and personal integrity...

...SC’s effective stewardship and promotion of diverse and inclusive workplaces that value and celebrate a diversity of people, ideas, cultures, and educational backgrounds is foundational to delivering on our mission. Harnessing a diverse range of views, expertise, and experiences drives scientific and technological innovation and enables the SC community to push the frontiers of scientific knowledge for the betterment of America’s prosperity and security.

Discrimination and harassment undermine SC’s ability to achieve its mission by reducing productivity, discouraging or inhibiting talent retention and career advancement, and weakening the integrity of the SC enterprise overall. SC does not tolerate discrimination or harassment of any kind, including sexual or non-sexual harassment, bullying, intimidation, violence, threats of violence, retaliation, or other disruptive behavior in the federal workplace, including DOE field site offices, or at national laboratories, scientific user facilities, academic institutions, other institutions receiving SC funding, or other locations where activities funded by SC are carried out...

...Beyond issues that may rise to the level of legal action, SC expects the scientific community, particularly those engaging in SC-sponsored activities, to always conduct themselves in a manner that is respectful, ethical, and professional. This renewed commitment is part of SC’s continuing effort to identify opportunities to improve its policies, practices, and communications in furtherance of its core values and its mission.

SC Coordination with DOE OCRD and OSTP

DOE Office of Civil Rights and Diversity (OCRD) administers DOE policies, practices, and procedures related internal civil rights (federal employees), and external civil rights (DOE grantees/Title IX).

DOE Title IX Oversight:
- OCRD and SC coordination on Title IX Oversight with counterparts at other Federal science agencies (e.g. NSF, NASA); some joint Title IX compliance reviews.
- OCRD coordination with Department of Education and Department of Justice.

Interagency Committees and Working Groups:
- OSTP Director priority: Subcommittee on Safe and Inclusive Research Environments, under the NSTC Joint Committee.
- IWG on Inclusion in STEM, under the NSTC Committee on STEM Education.
Acknowledgements

**Office of the Principal Deputy Director:**
- Dr. Lisa Durham (*on detail from ANL*)
- Dr. Katie Schroeder-Spain (*AAAS Fellow*)

**The SC D&I Working Group:**
- ASCR: Claire Cramer
- BER: Sharlene Weatherwax; Seema Singh
- BES: Bruce Garrett
- FES: Curt Bolton
- HEP: Alan Stone; Michael Cooke
- NP: Elizabeth Bartosz
- SBIR: Chris O'Gwin
- WDTS: Jim Glownia

**DOE Office of Civil Rights and Diversity:**
- Patricia Zarate
- Sharon Wyatt
- Ann Augustyn