

## Cross-AG EDIA Working Group update



Thank you to PAC for the invitation and long-term support

Previous presentations to the PAC: June 2021, February 2022, December 2022, June 2023



Everyone is welcome to our meetings, every 4<sup>th</sup> Wednesday at 1 pm ET (next July 24<sup>th</sup>). To join, email planetaryedi+subscribe@psi.edu or check out our website <u>https://www.lpi.usra.edu/idea/working-group/</u>



Co-chairs: Julie Rathbun (Cornell) and Kas Knicely (UAF)



HQ reps: Meagan Thompson (current) and Julie Ziffer (rolling off)

### Land Acknowledgement

- We are on the unceded lands of dozens (hundreds?) of Native American peoples.
- https://native-land.ca
- Good first step, but
   ONLY a first step; more must follow.



### Summary of Accomplishments & Work in Progress

### XAG Work in Progress

- Deconflicting meetings
- Upcoming 2-Day AG style meeting
- NASEM study breakdown.
- Inclusion Plans
- Tasks for Outward facing EDIA Position within NASA.

### Amplifying Community/Grassroots EDIA Efforts

- IDEA Con October 2024
- Mental Health Dr. David Trang
- LPSC pamphlet A Planetary Scientist's Guide to the Trans Experience
- Tribal Relations Nature paper
- Speaker Series (Accessibility in Field Work – Dr. Jen Piatek)

## Deconflicting meetings

#### PLANETARY SCIENCE DIVISION

### **ROSES-2024 Updates - General**

- Worked to deconflict all due dates with religious observances and holidays (thanks Cross-AG DEIA WG!)
- C.17 Planetary Science Enabling Facilities (FSEF) will be solicited in ROSES-24 (and even numbered ROSES years)
- C.20 Interdisciplinary Consortia for Astrobiology Research (ICAR) will be solicited in ROSES-24. However, a full
  program element is not yet available and will likely updated in Summer of 2024.
- C.25 Lunar Mapping Program is a new program element solicited in R-24 intended to enable individual researchers to participate as a member of a geologic mapping team in the planning and execution of campaign-style mapping of selected regions of the Moon.
- F.5 Future Investigators in NASA Earth and Space Science and Technology (FINESST) is run as a crossdiscipline program. Be sure to read the FAQ and reach out to the POs with additional questions.
- Topical Workshops, Symposiums, and Conferences (TWSC-24) in Space and Earth Science and Technology
  - No longer part of ROSES can find on NSPIRES (NNH24ZDA002N)
  - Current solicitation is open until November 30, 2026
  - Please reach out to the appropriate program officer prior to submission



- Several groups, including PSD, have used our calendar of religious observances and affinity group meetings to pick their meeting dates
- Thank you James Roberts
- <u>https://tinyurl.com/XA</u> <u>Gholiday</u>

### Upcoming 2-Day in-person meeting of the XAG EDIA working group

- Why?
  - Many EDIA-related meetings are attended by those members of the community doing EDIA-related work. But, EDIA is the responsibility of everyone in the field.
  - Everyone in the planetary community is invited to the AG-style meeting where we will disseminate information and results from other EDIA-related meetings (among other activities)
- Submitted a TWSC in December 2023 (selected May 2024)
- Tentatively scheduled for August 2025
- Working on picking dates, location, speakers, etc.
- Thank you proposal team: Edgard Rivera-Valentín, Prajkta Mane, Steven Vance, Stephanie Jarmak, Maggie McAdam, Leonardo Regoli, Jessica Noviello, Jen Piatek
- If you want to get involved, please contact us.

## NASEM study: Adv DEIA in Space Missions



The National Academies of SCIENCES • ENGINEERING • MEDICIN

#### CONSENSUS STUDY REPORT

Advancing Diversity, Equity, Inclusion, and Accessibility in the Leadership of Competed Space Missions



- NASEM Advancing DEIA in the Leadership of Competed Space Missions (<u>https://tinyurl.com/DEIAMissions</u>)
  - Published in 2022. No official NASA response.
- Thank you: Alexandra Matiella Novak, Galen Bergsten
- Top recommendations
  - NAC should have an explicit EDIA position
  - Data collection on demographics is vitally important
- Our recommendations to PAC/PSD
  - PAC should have an explicit EDIA position
  - PAC ask NASA to report on progress in collecting demographics as recommended by this study and the planetary decadal survey.
- Our recommendations to the community
  - We support all the report's recommendations to NASA, and also realize that it is easier to make progress when a topdown approach is combined with a bottom-up approach.

### Inclusion Plans (1/2)



We thank NASA for starting the development of an Inclusion Plan Rubric



Several AGs are concerned about Inclusion Plans and turning to XAG WG for advice



Concerned that calls for Inclusion Plans vary by program (R&A vs missons vs SSERVI, etc.)



Concerned that some Inclusion Plan policies may disincentivize PIs from creating diverse teams It is easier to make members of a homogenous group feel as though they belong. If NASA defines inclusion as "full participation, belonging, and contribution" AND if Inclusion plans are only allowed to consider members of the team, then designing an inclusion plan for a homogenous group is easier than for a diverse group. Thus, diverse groups are disincentivized, even though evidence demonstrates that diverse groups produce better science.

# Inclusion Plans (2/2)

### **Recommendations:**

- NASA clarify that inclusion is not just making sure that the current team feels included but that the team should create a space where a person from any background would feel included.
  - This would remove the advantage that homogenous groups receive under the currently understood policies. The exact make-up of a team would become irrelevant because the focus would be on everyone.

To accomplish this and give support to ensure diverse groups, NASA should add the following as allowed expenses in Inclusion Plans:

- EDIA training, including funding to pay experts to administer the training and FTE for team members to attend the training.
- FTE for team members to be involved in EDIA groups, such as the XAG EDIA working group, professional organization EDIA groups, and EDIA groups in their place of employment.

SMD-level outwardfacing EDIA position Recommended by IDEA Con and XAG EDIA WG in 2022

#### June 2022 PAC finding

 "...The PAC urges further coordination between NASA and community efforts, with one option being the outward-facing IDEA-coordination position as well development of a centralized repository of relevant resources, as recommended in the IDEACon report..."

PSD responded that the position should be at the SMD level and that they were prepared to advocate for such a position.

We have created a proposed title, job description, and task list for this position

Thank you: Benita Bell, Kate Craft, Alex Hayes, Sean Hsu, Lynnae Quick, James Roberts, Brad Thomson, Steve Vance

# "Senior Scientist for SMD Workforce and Culture" - task list

Interface with AA for Diversity and Equal Opportunity Provide point of contact for outside agencies, private partners, committees, and/or studies related to EDIA that need to communicate with NASA

Coordinate and promote NASA activities in workforce and culture development

Ensure that requirements for and the review of inclusion plans are consistent across SMD Coordinate on understanding demographics of NSPIRES proposals

Manage completion of workforce surveys in SMD





## 2024 Advancing IDEA in Planetary Science Conference

First meeting in 2022 resulted in several recommendations that have been implemented <u>https://www.hou.usra.edu/meetings/</u> <u>advancingidea2022/</u>

- 2024 conference, October 21-25
  - Abstract deadline August 7
  - <u>https://www.hou.usra.edu/meetings/advancingidea2024/</u>
  - Conveners: Christine Shupla (USRA/LPI), Prajkta Mane (USRA/LPI)
  - Organizing Committee: Ali Bramson (Purdue), Jordyn-Marie Dudley (JSC), Alexander Evans (Brown), Kennda Lynch (NASA HQ), Frances Rivera-Hernández (Georgia Institute of Technology), David Trang (SSI/Hawai'i Pacific University)
  - "We encourage participants from the 2022 conference to provide updates on the progress that has been made in the past two years."



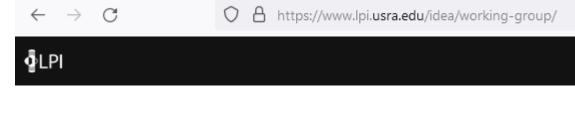
### Mental Health

- The PAC heard from Dr. David Trang at the November 2023 PAC meeting; we have contacted him to assist with next steps.
- Summary of 4 Key takeaways we want to amplify:
  - Need new social scientists (multiple) to take up this work and soon.
  - NASA review panels have been improved by centering discussions around problems of proposals and not the person; let's expand this.
  - Continue surveys that quantify and support workshops that address imposter syndrome (IS) and underappreciation (UA)...
    - ...both for those dealing with these and for managers/leaders to curtail/prevent issues in the first place.
    - Shared Story: ECR support group reported surprise and anticipatory distress at positive recognition.
  - Act on information from surveys like those conducted by Dr. Trang.

## A Planetary Scientist's Guide to the Trans Experience

- Created and shared by Dr. Aster Cowart at LPSC 2024
- Provides one perspective on what it's like to be trans in the field of planetary science.
  - Copy available on XAG website.
- Working with Dr. Cowart to:
  - Develop 1-pager/postcard forms,
  - Further distribute material (e.g., DPS, Cornell AstroBio conference, IDEACon)





### Resources

🛼 A Planetary Scientist's Guide to the Trans Experience

## Tribal Relations

### • See: <u>https://rdcu.be/dErPN</u>

#### and: <u>https://shorturl.at/ncje0</u>

- Calls on NASA to:
  - Adhere to NASA's previous commitments – include Native Nations in the conversation
  - Formally establish an Office of Tribal Relations to prevent incidents like this
    - This was recommended before at IDEA Con 2022 (A.8 from Consensus report)

# A call for Indigenous partnership in the return to the Moon

Frank Tavares, Monica Vidaurri, Adeene Denton, J. A. Grier, Alvin Harvey, Moses Milazzo, Hunter Olson, Parvathy Prem, Daniella Scalice & Aparna Venkatesan

In response to concerns raised by the Navajo Nation on treating the Moon as a grave, NASA has a unique opportunity to advance the conversation with Indigenous communities regarding how we interact with space environments, and who gets to decide.

<section-header>

Check for updates

https://doi.org/10.1038/s41550-024-02251-6

## Speaker Series

- Working on a list of possible speakers and/or topics for the WG to hear from. Open to all and will share slides/recordings via XAG website (<u>https://www.lpi.usra.edu/idea/working-group/</u>).
- Prospective list:
  - Dr. David Trang / Mental health addressing IS and UA (similar to workshop at LPSC 2024)
  - Dr. Alvin Harvey / Commercialization of Space
  - Dr. Jayne Aubele / ethical fieldwork with indigenous populations
    - Alts: Dr.s Kat Gardner Vandy and Daniella Scalice.
  - Dr.s JA Grier or Nicole Cabrera Salazar / difficult conversations
  - Dr. Eddie Gonzalez (EDIA lead at Goddard) / what employers can do
- First Speaker
  - Dr. Jen Piatek on Accessible Field Work July 24<sup>th</sup>, 2024
  - 9:00 AM AKST / 2:00 PM ET

### Creating Spaces for Geoscientists with Disabilities to Thrive

Flexible fieldwork options and more thoughtful recruitment efforts will better open our community to the

By A. M. Marshall and S. Thatcher 2 December 2019



A group participating in an accessible geology field trip with the International Association for Geoscience Diversity in 2016. Looking over the South Rim of the Grand Canyon in Arizona, in the foreground, are Jen Piatek (left) and coauthor Sean Thatcher (right); in the middle distance left to right are Grant Vincent, Anna Todd, and Matt O'Brien; and on the ledge are Amanda Haddock (left) and Will Kilpack. Credit: Anita Marshall

https://eos.org/opinions/creating-spaces-for-geoscientists-with-disabilities-tothrive?mkt\_tok=OTg3LUIHVC01NzIAAAGTX41X\_7Y6VS0UUaDSljaKHq-Xfqm9hVMM7UJqvyApqDHpIDUysFJ7KmrCL6y8BJpjF2Sx0ptl-5ZkSn94p3IwYMea83p3wXVbh1n-bi4sfw

# Findings

## We applaud the EDIA actions NASA is taking, including:

- Deconflicting meetings and ROSES due dates from religious observances and affinity group meetings
- Funding the TWSC for a 2-day in-person meeting of the XAG EDIA WG
- Starting the development of an Inclusion Plan Rubric
- Supporting IDEA Con 2024
- Funding EDIA activities
  - We ask for an update on the Mission: IDEA R&A funding line mentioned at PAC previously

### Co-sign

- SBAG Finding #10 SBAG encourages NASA to continue and expand its support for open science by enhancing infrastructure, providing clear guidance on data and software archiving, and engaging the community through training and feedback opportunities. Open science has the potential to make data more available to all communities, including those typically underserved in the STEM fields.
- MEPAG encourages NASA to continue to provide funding for programs offering opportunities for engagement in missions (e.g., Here to Observe, InSight Seers) and consider adding support to mission budgets to enable these interactions.

### Recommendations

Recommend that **PAC** designate one member explicitly as **EDIA member** and require expertise (parallel to NASEM study's recommendation regarding the NAC) PAC ask NASA to report on progress in **collecting demographics** as recommended by both the NASEM study on Adv EDIA in Space Missions and the planetary decadal survey (OWL). NASA should clarify that inclusion is not just making sure that the current team feels included but that the team should create a space where a person from any background would feel included.

NASA should allow Inclusion Plans to include funding for EDIA training and involvement in EDIArelated groups. PAC raise to the NAC the recommendation that **NASA** establish an office of Tribal relations – as re-iterated in Nature paper NASA should work with NAC to create a "Senior Scientist for SMD Workforce and Culture" and the PSD should continue to advocate for this position.

### What can you do?

- Join us in to help with future meetings or initiatives.
- Our website: <u>https://www.lpi.usra.edu/idea/working-group/</u>
- Subscribe to our email list planetaryedi+subscribe@psi.edu
- Attend our monthly meeting and find out more.
- Email: jar24@cornell.edu, knicelyjoshua@gmail.com



### Back-up/Expanded Detail Slides

## Community Work – Mental Health – Expanded (1/2)

- Dr. Trang doing one more survey, then moving on to treating mental health issues, leaving a data collection gap.
  - Need new social scientists (multiple) to take up this work and soon.
  - Effectiveness of social scientists significantly affected by their rapport with members of the community; need time to build that rapport.
- NASA review panels have been improved by centering discussions around problems of proposals and not the person; let's expand this.
  - DAPR has made sure proposals are judged based on the science, not personal relationships.
  - Expanding this way of thinking and communicating will help NASA reach IDEA goals, as well as simply get the best science and engineering done.

## Community Work – Mental Health – Expanded (2/2)

- Continue surveys that quantify and support workshops that address imposter syndrome (IS) and under-appreciation (UA)...
  - ...both for those dealing with these and for managers/leaders to curtail/prevent issues in the first place.
  - IS and UA identified as two largest issues for planetary scientists.
    - ECRs often express confusion and fear when given positive reinforcement; "expect other shoe to drop".
  - NASA needs to provide time and support necessary for employees and workshop attendees so they can learn these new skills/attend workshops w/out being further overloaded.
- Act on information from surveys like those conducted by Dr. Trang.
  - Appreciate NASA's support of these surveys; now need to act.
  - Action proves NASA is serious about EDIA and will attract those missing demographics and improve science/engineering outcomes; lack of action will have the opposite affect.

# Recommendations – Expanded – EDIA member on PAC

Recommend that **PAC** designate one member explicitly as **EDIA member** and require expertise (parallel to NASEM study's recommendation regarding the NAC) This member should serve on the NASA NAC committee focused on DEIA which was the first recommendation of the NASEM study on Advancing DEIA in the Leadership of Competed Space Mission.

# Recommendations – Expanded – demographic data collection

PAC ask NASA to report on progress in collecting demographics as recommended by both the NASEM study on Adv EDIA in Space Missions and the planetary decadal survey (OWL). [Expanded explanation] Regular collection of demographic data is necessary to identify, track, and effectively address demographic issues and get the best science possible. Further, current demographic collections fail to capture several groups; this makes identifying and remediating issues in regards to these groups within NASA impossible.

# Recommendations – Expanded – Inclusion Plan definition

NASA should clarify that inclusion is not just making sure that the current team feels included but that the team should **create a space where a person from any background would feel included**. [Expanded Explanation]The current definition unintentionally encourages non-diverse groups as this would reduce the work-load on the PI. If everyone is already like the PI, the PI doesn't need to do anything; whereas if co-Is are different, the PI needs to do more work. If the goal is to include everyone, we need to make sure our definitions don't accidentally encourage the opposite.

### Recommendations – Expanded – Inclusion Plan allowed expenses

NASA should allow Inclusion Plans to include funding for EDIA training and involvement in EDIA-related groups.

[Expanded Explanation] Since PIs are responsible for implementing all parts of their proposals, including inclusion plans, they should, at minimum, have basic high-level understanding of how to make their teams equitable and inclusive to all. EDIA training and involvement in EDIA-related groups would give them this basic understanding as well as create a long-term culture of inclusion. Furthermore, training and attendance in EDIA-groups would enable networking to meet experts in EDIA that they might want to work with on their team.

# Recommendations – Expanded – Office of Tribal Relations

PAC raise to the NAC the recommendation that **NASA establish an office of Tribal relations** – as re-iterated in Nature paper [Expanded Explanation]The unfortunate situation with the Peregrine lander has made it explicit that NASA is currently failing to consult with native nations. An office of Tribal Relations (similar to those USGS, USDA, NIH) will improve communication and mitigate future kerfuffles. NASA does currently engage with Ttribal Nations for Scientific Collaboration, Economic Development, Education and Outreach, Environmental Consultation, and Workforce Development, but not consultation in Space Exploration (https://www.nasa.gov/nasa-tribal-

<u>consultation-and-coordination/</u>

# SMD-level outward-facing EDIA position - Expanded

- Position Title: "Senior Scientist for SMD Workforce and Culture"
- Position Description: This position is the primary point of contact and strategist for improving the culture of NASA's broader workforce, primarily focused on those funded externally to NASA (e.g., contractors, grant recipients, etc.) and within third places such as scientific meetings, mission teams, and when engaging with the public. This includes working with NASA's current leadership, including the NASA Associate Administrator for Diversity and Equal Opportunity, to create a culture and best practices in the broader community (including university scientists, contractors, public educators) that promotes inclusivity, equity, and accessibility. The Senior Scientist for SMD Workforce and Culture will ensure consistency in our conduct across institutions by shaping NASA's many programs and activities aimed at identifying and maximizing the ways that equity, diversity, inclusion, and accessibility help us succeed.
- Position Justification: NASA's workforce does not exist in a vacuum, by necessity NASA's employees must interact with members of the broader community, such as University professors, students, soft-money scientists, etc at many different venues (scientific conferences, mission teams, etc.). Ensuring a welcoming and professional environment within the broader culture assists NASA employees.

# SMD-level outward-facing EDIA position – List of Duties - Expanded

- Interface with Associate Administrator for Diversity and Equal Opportunity (currently Elaine Ho) to coordinate outward vs. inward facing programs and initiatives.
  - Work together to ensure that NASA personnel (especially program officers and program executives) who interact with the broader workforce in leadership positions are trained in how to create an equitable and inclusive environment.
    - This includes ensuring that ROSES proposal, mission, and other review panels are diverse and that this diversity is achieved in an equitable way without
      placing unfair expectations on members of one or more underrepresented groups to serve by burdening them with an outsized number of requests for panel
      service or expectations that they serve on a large number of panels each year, compared to the rest of the community. Track panel service across programs to
      ensure that the timing and number of requests to individuals from marginalized groups are reasonable. Work with program officers to compile lists of names,
      institutions, expertise, and contact info for subject matter experts to ensure broad awareness of the community so that the same people are not always asked to
      serve. When panel diversity is not satisfactorily achieved, consider other means to incorporate diverse voices, such as requesting external reviews.
- Provide a primary Point of Contact (POC) for any outside agencies (NSF, NIH, etc.), private partners, committees, and/or studies related to EDIA that need to communicate with NASA
  - This would include interfacing with Advisory and Assessment groups that focus on EDIA activities (e.g., a NASEM or NAC subcommittee on EDIA, the XAG EDIA working group, etc.)
  - Maintain a list of STEM organizations, including both professional societies and grassroots organizations, with goals of nurturing the career development of marginalized groups in STEM (e.g. NOBCChE, NSBP, AISES, NSHP, SACNAS, NSBE, #BlackInAstro).
    - Coordinate with these organizations to ensure that SMD resources, training, and education are shared at annual meetings of these organizations in ways that would not disrupt their programming.
    - Ensure that NASA is a sponsor, or at least a partial sponsor, of the annual conferences and other major activities associated with these organizations.
    - Publish a calendar of annual meeting dates, locations, abstract submission deadlines, and meeting websites for annual conferences put on by these organizations.
  - Maintain a list of names and contact info for physics, chemistry, etc., department chairs at HBCUs, HSIs, and Tribal Colleges and Universities. Note that these schools have very strong STEM programs but the vast majority do not have planetary science, geology or astronomy programs or offer majors in these fields. In most cases, PSD would need to connect with dept. chairs that represent broader STEM fields

# SMD-level outward-facing EDIA position – List of Duties - Expanded

- Coordinate and promote NASA-funded divisional, cross-divisional, and cross-directorate activities in workforce and culture development, including both internally managed programs (e.g., Here To Observe (H2O) in PSD) externally funded groups (e.g. Planetary REACH through the Science Activation program), and mission teams (e.g. Dragonfly Student and Early Career Investigator Program) to ensure they reach appropriate audiences and are centrally advertised.
  - Ensure that NASA programs designed to broaden the science workforce ((e.g. H2O, ICONS, Dragonfly Student and Early Career Investigator Program) are implemented using best practices
    - Hold regular meetings with program coordinators and PIs of missions which are involved with these programs
    - Organize training (e.g. bystander intervention, mentor training) for organizers and members of these programs
  - This would include the coordinated advertisement of professional development activities for scientists funded by NASA (to remedy "siloing") such as:
    - Bystander intervention training (Such as Other Orb)
    - Mentor training opportunities (such as Movement Consulting)
    - Proposal development (e.g., Christina Richey's program)
    - Data management plan training (e.g., how to archive datasets with DOIs)
  - Oversight of the SMD bridge program.
- Coordinate with NASA Program Scientists and the Science Office for Missions Assessments (SOMA) to
  ensure that requirements for and the review of inclusion plans are consistent across proposal calls and
  Announcements of Opportunity (AO) throughout SMD.
  - Support inclusion plan reviews by helping to develop rubrics and making suggestions regarding specific AO language
  - Help to create inclusion plan templates that are consistent across different programs (R&A, missions, etc.)

# SMD-level outward-facing EDIA position – List of Duties - Expanded

- Coordinate with office of the chief scientist on understanding demographics of NSPIRES proposals
  - Make sure multiple axes are considered, especially race considering that the most underrepresented group in science is Black/African-American, Native American, and Latine scientists.
  - Perform longitudinal analyses
  - Tests on DAPR, NoDD, etc. Ensure that these tests include effects on members of underrepresented groups.
- Manage the completion of workforce surveys (e.g., every 3-5 years as recommended for PSD by OWL Decadal Survey and as recommended for all divisions of SMD in the NASEM study for Adv. EDIA in the leadership of competed space missions)
  - Work with social scientists to adhere to best survey practices
  - Ensure that multiple axes are considered, especially race
  - Hire a company to do the survey
  - Oversee implementation of survey
  - Distill and present survey results
  - Conduct surveys of the broader community, including scientists and engineers, but ensure proper questions are asked to understand each community separately.