

# Science and Technical Advisory Committee Meeting Notes

## Friday, June 24, 2022



### Attendees

**STAC Members:** Jim Ammerman, Chris Conroy, Kristin DeRosia-Banick, Dianne Greenfield, Jim Hagy, Beth Lamoureux, David Lipsky, Darcy Lonsdale (New York Co-chair), Jim O'Donnell, Robin Miller, John Mullaney, Suzanne Paton, Julie Rose, Paul Stacey, Mark Tedesco, Maria Tzortziou, Penny Vlahos (Connecticut Co-chair), Mike Whitney, Chester Zarnoch

**CAC Liaisons to STAC:** Sarah Crosby (Maritime Aquarium)

**Others:** Deborah Abibou (CTSG), Mary Arnold (NYSDEC), Zosia Baumann (U Conn), Jordan Bishop (NEIWPC), Robert Burg (NEIWPC), Finnian Cashel (EPA), Phil Colarusso (EPA), Ashley Desrosiers (EPA), Holly Drinkuth (TNC/CAC), Melissa Duvall (EPA), Lillit Genovesi (NYSG), Michele Golden (NYSDEC), Elizabeth Hornstein (NYSG), Kate Knight (CTDEEP), Chris Knightes (EPA), Kristin Krasieski (NYSDEC/NEIWPC), Kristen Laccetti (EPA), Jessica LeClair (UConn), Peter Linderoth (STS), Bill Lucey (STS), Esther Nelson (EPA), Victoria O'Neill (NYSDEC/NEIWPC), Sara Powell (NYSG), Samarra Scantlebury (NYSDEC), Sarah Schaefer-Brown (NYSG), Nancy Seligson (CAC), Matthew Stamas (EPA), Cayla Sullivan (EPA), Alicia Tyson (CTSG), Emily Wilson (UConn), Bessie Wright (EPA), Kimarie Yap (IEC)

➡ **Thanks to:** Bessie Wright for organizing and running the meeting; and Deborah Abibou, Kate Knight, Sara Powell, Sarah Schaefer-Brown, Alicia Tyson, and Bessie Wright for facilitating the breakout groups and taking and compiling the meeting notes. Also, Nikki Tachiki and Jimena Perez-Viscasillas for preparatory discussions prior to the meeting and finally to Kate Knight for most of the final compilation of the notes.

### Introduction

James Ammerman and Penny Vlahos opened meeting expressing thanks to the exiting NY co-chair, Darcy Lonsdale and announcing that Kamazima Lwiza will be NY's new Co-chair.

### Program Updates -- Mark Tedesco

Mark introduced three new EPA LISSO employees, Melissa Duval (who will be very active in the STAC), Ashley Desrosiers (EJ and BIL focus) and Kristen Laccetti (who will also be working on BIL related activities)

### Citizens Advisory Committee Update – Nancy Seligson and Holly Drinkuth

*DC Trip – July 14<sup>th</sup>:*

Nancy and Holly noted this will be the first in person trip to talk with legislators in DC in 3 years.

- Purpose: In general, its great opportunity to raise awareness amongst legislatures regarding the current LISS status/needs. This year's focus will be on preparing for the reauthorization of the LISS Stewardship Act (some revisions that the CAC would like to support are reducing match requirements, and allowing for a higher maximum and removing taxes on grants for nitrogen-removing septic systems)
- Volunteers: Bus can take a total of about 25, currently have 14 CAC members going and looking for STAC volunteers to attend. Penny volunteered and encouraged STAC members to join. Anyone else interested should email [Holly](#) or [Nancy](#) for details.

*Letter to Management Committee:*

Nancy and Holly provided an overview of the CAC letter to management committee and indicated the letter would be shared with the committee through Jim. Some of the highlights discussed:

- Recognition for the increasing funding there also comes an increased tracking, reporting and general administration needs. Therefore, the additional staffing needs are recognized by the committee.
- Focus should be on nonpoint sources.
- Improvement is needed for creating the links between the ecosystem targets and the implementation actions for the non-scientist.
- Improve the transparency and process of the proposals for LISS funding
- Establish a project pipeline (while recognizing that the SRC team has this in their workplan).
- Propose management re-evaluate Indicators and Ecosystem Targets.

*Comments and Questions for CAC:*

- When management looks at the Ecosystem Targets the word ecosystem should be defined as it is currently used with a lot of various meanings.
- CAC would recommend STAC involvement with the review of the Ecosystem Targets

**Brief Update on Recently Funded Science-Related Projects—James Ammerman**

Jim Ammerman provided the highlights of a sampling of projects that were approved at last management meeting for FY22 (note official awards have not yet been made). Projects include the USGS data clearinghouse, multi-partner assessments of seaweed nitrogen and carbon bioextraction, NOAA assessment of oyster disease dynamics, collaborative acidification monitoring, and fecal indicator bacteria monitoring.

*Discussion/Comments:*

- Coordination across projects with similar goals is essential, specifically mentioned today was USGS proposal for data clearing house and on-going efforts in Connecticut regarding the centralized GIS effort.
- Further coordination with Cable efforts should be made. Noted that the seafloor mapping project funded under LISS did leverage this effort and was on-going. Clarification was made that permitting agencies should use that to require more data.

**Eelgrass in Long Island Sound: Update on Current and Planned Activities—Cayla Sullivan**

Cayla presented on a R1 & R2 collaborative tool for supporting the IA that is currently behind schedule, supporting eel grass in LISS. Highlights from that presentation include:

- This project's purpose was to demonstrate the functionality of the tool
- Some of the resources that the project is building from include:
  - [Seasketch.org](https://seasketch.org)
  - The index developed in [Jamie Vaudrey's 2013](#) study
  - The [satellite methods](#) in Keith Colarusso and S. Rego's study
- Two Tiers of Data, the first (highest priority) will be utilized in this first phase (and if time/budget allow others will be added), this first tier consists of:
  - Point Source Data
  - Bathymetry

- Productivity (from satellite methods noted earlier)
- Water Clarity (compilation from STS, URI, USGS...)
- Sea Surface and Bottom Temperature (similar compilation as above sources)
- Sediment texture (Vaudrey study and NRCS has a data set that will be helpful)
- An ORISE fellow will be on-boarded for the analysis needed beyond what the contractor will be doing (building the tool)
- Second tier of data (again if time allows) will be Chlorophyll- $\alpha$ , DO and nutrients

Cayla also provided a summary of other on-going eel grass efforts. Those included:

- Regional Workshop Building Resiliency in Mid- Atlantic and Southern New England.
- LISS is going to have a series of workshops this summer the first of which is scheduled for July 25 11 AM- 1PM. By the third and final meeting the intent is to have a draft strategy to address eel grass in LIS.

Discussion:

- [Guide for Connecticut Shellfish Restoration](#) was released for comment. Comments are to be submitted via email to: [shellfish@uconn.edu](mailto:shellfish@uconn.edu) by July 8<sup>th</sup>
- A request for information on any known areas that would be good studies for eel grass in CT was put out: Mumford Cove was noted as an opportunity to study eel grass connectivity in CT. Other recommendations please let Phil Colarusso know.

## **Environmental Justice (EJ) Presentation and Breakout Group Discussions—Bessie Wright and Facilitators**

*Presentation:*

Bessie Wright provided the background and overview of the LISS EJ efforts. This included: Description of EJ in CCMP, descriptions of Inequality, Equality, Equity, and Justice, and the LISS EJ Workgroup tasks (including today's facilitating EJ conversations within existing workgroups). Six breakout groups then divided six EJ questions to open conversation and ideas to implementing EJ into the STAC workgroup.

### ***Breakout Group Overview Summary***

Six questions were divided and tasked to the workgroups:

1. How can we encourage the consideration and prioritization of environmental justice in research proposals supported by the Long Island Sound Study?
2. How can we encourage more research projects/proposals from academic institutions located in areas with environmental justice concerns? (Team 1)
3. What kind of backgrounds, disciplines, institutions, and perspectives are missing in the current STAC membership? What steps could be taken to help expand and diversify STAC membership? (Team 2)
4. Are there existing or future environmental justice research questions and/or science needs that the Long Island Sound Study should be supporting?
5. How can we ensure that Long Island Sound Study research and implementation projects are benefiting disadvantaged communities? Who benefits from environmental improvement projects (e.g., how far downstream do benefits go) in trying to reach disadvantaged communities? Do these questions constitute a research project?
6. If the STAC developed a 5-year plan, what environmental justice goals, considerations, and actions should be included in the plan?

While the context of these questions differed, the discussion of remedies resulted in a consistent direction. Each group mentioned the opportunity that partnering with universities or community colleges in EJ communities presented and recognized the barriers. The most mentioned action items across all the workgroups coalesced around the following steps:

1. Engaging Universities and Community Colleges in a partnership with the existing LISS Academic institutions to facilitate co-created projects with community perspectives engaged earlier in the process.
2. Establishing a means to maintain that relationship, mentoring students, providing a platform for sharing and co-creating the research questions, and reserving a seat on STAC for organizations intended to represent DEIJ scientists/researchers.
3. With STAC membership expanded as described above, the STAC would have the right voices at the table to address many of the other questions like what would be included in a 5-year plan, or what important data is missing, etc.

Further action items and details were discussed see the below section for the detailed summary by question.

### ***Breakout Groups Individual Question Summaries***

**Q1: HOW CAN WE ENCOURAGE THE CONSIDERATION AND PRIORITIZATION OF ENVIRONMENTAL JUSTICE IN RESEARCH PROPOSALS SUPPORTED BY THE LONG ISLAND SOUND STUDY?**

Team 4: Mark Tedesco, Lillit Genovesi, Paul Stacey, Sara Crosby, David Lipsky

Team 6: Darcy Lonsdale, Bill Lucey, Nancy Seligson, Emily Wilson, Robin Miller

Facilitator: Sarah Schaefer-Brown & Bessie Wright

**Comments Collected:**

- Statement about EJ required for proposals
- Give researchers (both funded and applying) options, opportunities, reading materials, PD's that we think will help them understand and tackle EJ needs
- Continue to update Science Needs document related to EJ-related topics.
- Continue to emphasize collaborators in research proposals that support and address EJ objectives and applications.
- Partnership with community-based organization- give a higher weight
- Provide a connection to local community groups if needed.
- Partner with community colleges and/or public schools in research projects
- Separate RFP track to enable to prioritization of these types of proposals so that we do not have to have those proposals compete with other research proposals
- Dedicated funding
- Reaching out to colleges/universities within EJ communities to ensure they receive RFA
- Large/ Successful University Partners (with LISS Funding) institutions to institution within EJ communities partnering
- Add Points to RFA:
  - Working in the community
  - Providing benefit to the community
  - Institution to Institution partner (comment above)
- How do we address what we don't know? – Online meetings we have been having open the doors for broadening the audience and we often hear about needs at the STAC meetings. Maybe we should invite other universities where research needs are being discussed. Create a STAC seat that is dedicated much like Connecticut's CEEJAC.
- Invite organizations that represent DEI in science/research.
- Spreading research opportunities out in the watershed will help capture more EJ communities.

**Summary:**

Partnerships dominated both conversations and led to the key action item of partnering larger research driven organizations with community colleges within the EJ communities to address the barrier of time commitments of teaching intensive structure and help facilitate the STAC/community relationships.

## Q2: HOW CAN WE ENCOURAGE MORE RESEARCH PROJECTS/PROPOSALS FROM ACADEMIC INSTITUTIONS LOCATED IN AREAS WITH ENVIRONMENTAL JUSTICE CONCERNS?

Team 1: Penny Vlahos, Holly Drinkuth, Melissa Duvall, Robert Burg, Maria Tzortziou, Kristen Laccetti, Ester Nelson

Team 6: Darcy Lonsdale, Bill Lucey, Nancy Seligson, Emily Wilson, Robin Miller

Facilitator: Deborah V Abibou & Bessie Wright

### Comments Collected:

#### *Proposal Process*

- Diverse fields of study - such as behavioral and social sciences
- Add incentive for smaller institution faculty to participate (e.g., teaching, such as field-based projects)
- Reach out to universities, including community colleges, which have large ethnic and racial diversity, and are located in ethnic and racial communities.
- Require DEI efforts in proposals
- Topics requested for research topics (in grant request) - include EJ related focus
- Use EJSCREEN to facilitate this - could ask PIs to use it
- Encourage partnering with smaller institutions
- Institution to Institution partnering (see Q1)
- Add a point system to RFA (see Q1)

#### *Questions and actions responsive to understanding barriers/incentives to participation*

- Clearly identify areas of underserved populations and minority institutions. These can be made partners in the research efforts.
- Understanding barriers
- Mentoring smaller partners
- Early engagement of underserved communities in proposals
- Areas of study or geographic areas?
- Do we know why smaller institutions don't apply? Understand the barriers and address them.
- Developing ideas and research priorities in proposals in collaboration with underrepresented communities to capture the needs of these communities
- Focus on student-level involvement
- Perhaps provide support with grant application process
- Application process is recognized to be intensive: have grant workshops in these areas to help facilitate better proposals. Noted that community colleges are much more focused on teaching and as such its much more teaching intensive, so changing scope of proposals that are expected to incorporate these. A STAC could do a match making effort to connect these people so they could take advantage of the resources of the larger universities to level the playing field.
- Take advantage of SRC conversations in the community and note this potential collaboration to see where there interest is.

#### **Summary:**

Discussion indicated engaging with community colleges, urban universities (any academic institution in an urban environment) was a favorable/key method to better incorporating environmental justice into research projects/proposals. Recognition for differing structures between community colleges and universities may inhibit proposals and ideas from mentoring connections, to proposal topics, to grant support, to classroom/field work. focused projects to overcome the differences in the framework that inhibit involvement.

**Q3: WHAT KIND OF BACKGROUNDS, DISCIPLINES, INSTITUTIONS, AND PERSPECTIVES ARE MISSING IN THE CURRENT STAC MEMBERSHIP? WHAT STEPS COULD BE TAKEN TO HELP EXPAND AND DIVERSIFY STAC MEMBERSHIP?**

Team 2: Cayla Sullivan, Dianne Greenfield, Zofia Baumann, Suzanne Paton, Peter Linderoth

Facilitator: Kate Knight

**Comments Collected:**

- One thing that could be improved is academic institutions located geographically in the city. This could be beneficial institutions in those areas already have the connections with communities that could benefit from these conversations.
- Include local level regardless of status, they will be doing the implementation outcomes.
- At CUNY's 23 campuses there are 189 different nationalities represented, this is an opportunity
- Adding a mentoring program for students at community colleges, an opportunity to connection with high profile researchers.
- Yale Scholars designed to connect students to mentors and pays for internship/stipend. Diversity program. Maybe EPA LISO can help support a program like that – fund a mentorship program to connect folks. Or connect with federal agencies.
- LISFF may be a good vehicle for a Mentoring Program
- CUNY has a program to assign underrepresented community students with laboratories (emphasis on women) this could be an efficient practical connection.
- A lot of universities (and community colleges) may have these programs we should take an inventory of existing programs that could be partnered with. Build on existing mentorship programs and just ask STAC members to volunteer as mentors/open laboratories.
- Linking Sea Grant Extension Professionals' community outreach to their restoration efforts. They will have a lot of creative ideas and talking to them about feedback they are already receiving from the community. FW is planning to look closely with Sea Grant circuit riders for that reason.
- NYSDEC makes connection with outreach community and habitat restoration efforts. Need to think as to how to maintain engagement. These programs are often initiated but get lost, consideration for how to maintain the connection is important aspect to consider at start.
- [ASLO](#) has a program that highlights work and provides a microphone, floor time to share. A series called amplifying voices that is specifically geared towards helping amplify voices from underrepresented area. Discussion about adding to the in person meeting however- frequency should probably be more so than every 2yr. The other way to bring people in, once some of these initiatives are funded originally (re bringing voices to board) making sure research is funded equitably. If they are then they will feel more purpose in participating and it will inspire

**Summary:**

Discussion indicated engaging with community colleges & urban universities and directly with students who may benefit from direct connection to STAC was a favorable/key method with the most discussion. Many potential remedies were offered, the outline of the basic steps to the remedy became the sequence below:

1. Proactively reach out to additional urban universities/community colleges
2. Take an inventory of "mentor like" programs
3. Determine how LISS can support these programs and engage them in LISS STAC

**Q4: ARE THERE EXISTING OR FUTURE EJ RESEARCH QUESTIONS AND/OR SCIENCE NEEDS THAT LISS SHOULD BE SUPPORTING?**

Team 3: Jordan Bishop, Michael Whitney, Phil Colarusso, Kristin Krasesk, Michele Golden, Elizabeth Hornstein

Team 4: Mark Tedesco, Lillit Genovesi, Paul Stacey, Sara Crosby, David Lipsky

Facilitator: Sara Powell & Sarah Schaefer-Brown

**Comment:**

- Risk assessment of LIS seafood consumption
- Communication of seafood consumption risk, especially in Spanish
- Relative risk to EJ communities from climate change, coastal storms, etc.
- Overlay environmental report card for the Sound with the EJ maps?
- Having easily digestible information on the LISS website
- Social science has been identified as a need, including in the communications/outreach/education plan
- Could use some help on building a more diverse research team for LIS proposals - more \$ allows you to build a bigger team, but could be more proactive about DEI
- Focus on a particular area/embayment - what needs are being supported, which aren't? need a matrix of environmental quality to then support human health considerations
- Collect suite of baseline data in targeted EJ communities - would allow for measurable gains... could have dedicated EJ funds for this work
- Include a public presentation component with community partners
- Integrate with findings of the EJ Needs Assessment
- Thinking about how research can provide equity in the LISS, how do we address these issues- apply apple tree justice in the LISS, how do we translate that into practical examples for LISS to take.
- Deeper assessment of inequities and how we are prioritizing addressing those issues to make a difference in people's lives
- Access to waterfront, availability of fishing and shellfishing, other recreational opportunities
- We need to have leaders from communities involved in the decisions on what research we focusing on- looking at the end goal first and then building research questions and projects to get to that end goal.
- Identifying the local concerns- public concerns, unsafe fishing, shellfishing, swimming and then locating the sources of that problem.
- Research that supports community science and community engagement and community involvement.
- Access to safe fishing, boating, recreation. Beautification and improvement of waterfronts for communities.

**Summary:**

The discussion indicated that to really obtain gains in this area it needs to be site specific analysis. The embayments were used as an example to demonstrate how complex and how differing these needs are/could be. This was concluded to be a needed method to assure the multi-faceted science needs are addressed (social, oceanography, biological). One metric discussed was a potential to add social and demographic information to the embayment report cards. A method for implementation for assuring success discussed was engaging the local level and proactively building the larger diverse team.



**Q5: HOW CAN WE ENSURE THAT LISS RESEARCH/IMPLEMENTATION PROJECTS BENEFIT  
DISADVANTAGED COMMUNITIES?**

Team 5: Jim Hagy, John Mullaney, James Ammerman, Jess LeClair, Samarra Scantlebury, Chester Zarnoch,  
Ashley Desrosiers  
Facilitator: Alicia Tyson

**Comment:**

- Lack of resources create an unequal ability to provide a proposal that isn't as competitive.
- The lack of access is partly due to the fact that the experts in grant writing/consulting are primarily not in disadvantaged areas.
- Certain communities have lower tax bases, there for these communities also have less staff and therefore they will be more limited.
- When basic needs are not being met, these won't fall into the priorities.
- Lack of access to the sound provides a lack of connection to the sound.
- A lot of the issues fold back to the predominance of affluence that exists along the sound and the limited access to get there if you are not a direct member of that community.
- Lack of affordable housing and historically the placing industrial parts of coast are limited, and most were developed as summer residence.
- The root cause: Money, Influence, Power
- Benefits to environmental projects when you do include disadvantaged communities:
  - more ecosystem services,
  - improved resilience,
  - improved quality of life,
  - greater access to green space etc. that provide improved mental and physical health opportunities,
  - more people interested in maintaining/improving the environment,
  - a better project,
  - Diverse well-rounded projects
- Actionable items noted:
  - Co-production of not only the project but also the development of the research questions.
  - Engaging the communities where you do work (many don't prescribe the locations they work in) more connections with local entities like community colleges etc. often results in value added.

**Summary:**

Discussion centered around unpacking the potential problem posed in the question above and discussing benefits when communities are included. A key take-away was the co-production of projects is often discussed, but co-production of research questions would be value added approach. Building connections where you already work, like community colleges.

**Q6: IF THE STAC DEVELOPED A 5-YEAR PLAN, WHAT EJ GOALS, CONSIDERATIONS, AND ACTIONS SHOULD BE INCLUDED IN SUCH A PLAN?**

Team 3: Jordan Bishop, Michael Whitney, Phil Colarusso, Kristin Kraseski, Michele Golden, Elizabeth Hornstein  
Facilitator: Sara Powell

**Comment:**

- How do we define communities with EJ concerns?
- Purposefully identify & solicit input from target communities
- LISS should identify EJ communities within the watershed
- Education (8-12k) level is key
- Have a plan to get feedback from groups that represent known areas with EJ concerns?
- EPA EJ Screen tool is based on demographics... is there a finer way to look at it? Understand use of LISS resources by underserved communities who may or may not be directly adjacent
- Determine what the communities do/no not have access to?
- In CT, relative lack of coastal access is an issue - if LISS can help advance this, that would be wonderful
- Re: soliciting input from targeted communities - who is the best person to reach out to? could be variable between communities. want to make sure we aren't proposing work that isn't in line with needs

**Summary:**

Discussion primarily focused on the first steps that would be needed to develop a plan, those are:

1. Identifying the communities, we wish to reach
2. Engaging those communities in developing the plan, get the input to be included in the development. Including those communities that may/may not be directly adjacent to Sound but using the Sound.

**Where do we go from here? (J. Ammerman comments)**

1. This meeting provided a lot of useful ideas but depends on future implementation of them to make progress.
2. Among the first steps will be building partnerships with EJ communities and colleges and likely adding new STAC members from these groups.
3. Further progress will probably depend upon such partnerships but building them will take time and require incentives for all involved.
4. The STAC will need to work with the EJ work group to advance these partnerships.
5. Discussions need to continue, and specific plans should be developed over the next few months to be discussed at the November STAC meeting.