December Meeting STEAB Attendees

Designated Federal Officer (DFO):

• Julie Hughes, STEAB DFO, Policy Advisor, EERE, DOE.

STEAB ATTENDANCE		
BOARD MEMBERS	Present	Absent
Roger Berliner, Council President, Montgomery County Council		X
Susan S. Brown, Deputy Administrator, Wisconsin Division of Energy	X	
Tom Carey , Director, Energy and Rehabilitation Programs, New York State Division of Housing and Community Renewal	X	
William Vaughn Clark, Director, Office of Community Development, Oklahoma Department of Commerce	X	
John H. Davies, Director, Division of Renewable Energy and Energy Efficiency, Kentucky Office of Energy Policy	X	
David Gipson, Director, Energy Services Division, Georgia Environmental Facilities Authority		X
Philip Giudice, Chief Executive Officer, Liquid Metal Battery Corporation		X
Paul Gutierrez, Vice Provost for Outreach Services, Associate Dean and Director, Cooperative Extension Service, College of Agriculture and Home Economics, New Mexico State University	X	
Duane Hauck, Director, Extension Services, North Dakota State University	X	
Robert Jackson, Manager, Michigan Economic Development Office, Michigan Energy Office	X	
Elliott Jacobson, Vice President for Energy Services, Action Energy	X	
Maurice Kaya, Hawaii Renewable Energy Development Venture		X
Ashlie Lancaster, Director, South Carolina Energy Office		X
Lou Moore, Chief, Energy and Pollution Prevention Bureau, Montana		X
Frank Murray, former President and CEO, New York State Energy Research and Development Authority	X	
Steve Payne, Managing Director, Housing Improvements & Preservation, Department of Commerce		X
David Terry, Executive Director, ASERTTI	X	
Malcolm Woolf, Sr. Vice President, Policy and Government Affairs, Advanced Energy Economy	X	
Daniel Zaweski, Assistant Vice President - Energy Efficiency and Distributed Generation Program, Public Service Electric and Gas Company	X	

Contractor Support:

- Emily Zuccaro, SRA, International Inc.
- Stacey Young, SRA, International Inc.

Please note presentations from the December STEAB Meeting can be found online at www.STEAB.org

Welcome and Introductions

Julie Hughes (JH), the Designated Federal Officer (DFO) of the State Energy Advisory Board (STEAB) opened the meeting on Tuesday, December 3, 2013, welcoming the members of the Board to Washington, DC for the first meeting of Fiscal Year (FY) 2014. Noting she read through the STEAB White Paper recommendation document, and conducted calls with members to identify Board priorities and areas of focus, her goal of this meeting is to find points of intersection where the expertise and interests of the Board align with the priorities and needs of the Office of Energy Efficiency and Renewable Energy's Assistant Secretary, Dr. David Danielson. Another goal of the meeting is to leave with a set of proposed focus areas and projects for 2014 that can be presented to the Assistant Secretary. JH then walked the Board through the meeting agenda noting the state and local focus areas of discussion as they are most relevant to the work of the Board. Frank Murray (FM), the Board Chair, called to attention the retiring members of the Board, Duane Hauck (DH), Susan Brown (SB), and John Davies (JD), thanking them for their service on the STEAB. FM told the Board of the ongoing discussions between himself, JH, and EERE senior staff about concerns over the past effectiveness of the STEAB, but at the same time a change in attitude on behalf of EERE towards the Board as the department identifies the resource it has in the depth of knowledge and experience of Board members, FM feels EERE is more willing to work with the STEAB in FY 2014 than ever before and feels STEAB has an opportunity to be beneficial to EERE's mission of establishing good working partnerships and relationships with states. He, like JH, sees the goal of this meeting to work with EERE and identify areas of common action where STEAB can most impact EERE and states.

Discussion with Dr. David Danielson of EERE Priorities, 2014 Opportunities from STEAB's Perspective, and Potential Synergies

Dr. David Danielson, the Assistant Secretary for DOE's Office of Energy Efficiency and Renewable Energy (EERE), spoke to the STEAB about areas in which he sees a connection between what STEAB identified as priority areas and where EERE is looking to advance during FY 2014 and beyond. The new Secretary of Energy, Ernest Moniz, wants all Department of Energy (DOE) offices to "step up the game with the states." This partnership and collaboration with states and DOE is one of the banners Secretary Moniz has put forth for the entire department. Dr. Danielson then asked the STEAB to work with his office to redefine how EERE and STEAB can work together. His sense is that if STEAB works on a limited number of issues or problems and identifies opportunities or solutions related to the question, it offers the best chance for success. If that is how STEAB would like to proceed then EERE will put forward for consideration a few high priority areas for action. He would also like STEAB to tell EERE where states need assistance or guidance so the lines of communication and identification of concerns work both ways. Once areas of focus have been identified, he asked that STEAB deliver an "Engagement Plan" which would enumerate how STEAB and EERE will engage moving forward to address the goals and areas of focus, and also how progress and results will be conveyed to the Office of EERE and Dr. Danielson.

Dr. Danielson then outlined for the Board his highest priority areas as the Assistant Secretary for EERE, but indicated he is open and anxious to hear ideas from the Board, and encouraged feedback and input. The four main areas of focus are as follows:

- 1. President's Climate Action Plan: This is the roadmap for DOE and there are a lot of components dealing with greenhouse gas emissions, appliance standards and other areas where STEAB, EERE and states can make an impact. How can states and DOE work together to push this plan forward and meet the goals of the Plan?
- 2. Clean Energy Manufacturing Initiative (CEMI): This initiative presents many opportunities for engagement between EERE and STEAB. It was launched 8 months ago and the purpose is to capture as much of the value added as possible for clean energy manufacturing, while increasing the country's competitiveness across the board. There will be a national summit in Washington, DC later in December and Dr. Danielson would like to launch a public-private partnership under CEMI, and would like at least one of these partnerships to deal with state engagement. Are there interesting or new models for public-private partnerships, and would those benefit states to advance manufacturing competitiveness?
- 3. The National Labs: How can EERE and DOE work to make the Labs more powerful catalyst of U.S. economic competitiveness? \$800 million of EERE money goes to the Labs and the value we get back from

the Labs needs to be maximized, which is why Dr. Danielson has kicked-off a new National Lab Reinvigoration Initiative (formal name to be revised). He wants to double the commercial impact over the next three years, and get Labs working on problems that matter for business, states and the marketplace. What is already underway that can catalyze more successful commercial impact? How can we increase state and local or regional engagement with the Labs? Maybe there is a chance to develop a competitive award for state and lab partnerships. Big ideas are needed in this area to make the Labs more effective.

4. EERE and other parts of DOE are considering ways to be supportive of state and regional efforts to move forward with greenhouse gas standards for coal plant. The Secretary wants DOE to be at the table with the Environmental Protection Agency (EPA) to help move this initiative forward so what can DOE and the State Energy Program (SEP) do with its budget and resources to be supportive?

Dr. Danielson went on to say there are of course other areas of interest such as sustainable transportation, grid integration, etc. but asked the STEAB members what they saw as opportunities where EERE and states can engage. He also asked how STEAB sees a role for itself in the above 4 areas or in other areas of focus.

Malcolm Woolf (MW) replied that he did not hear any emphasis on the President's State of the Union goal to double energy productivity, but maybe that is an overarching goal of DOE and EERE and should be assumed based on these priority areas, and Dr. Danielson assured him that it is and should be assumed. MW went on to say states are anxious to take that goal and turn it into a blueprint for a plan of action. The issue is no one currently has real ownership over this goal. Is this something DOE is spearheading or the White House? To reach this goal states, the Federal government, local agencies and private companies all have to be invested, and MW noted he has not seen a real call to action on this yet. Dr. Danielson encouraged STEAB to engage on this topic with Jason Walsh and address this with him tomorrow at the STEAB meeting when Mr. Walsh comes to talk about EERE's Strategic Plan, and to also address this with Karen Wayland who will be speaking to the STEAB about how her area within the Office of Energy Policy and Systems Analysis (EPSA) is working to frame this goal.

JD circled back to the goal of CEMI and hoped that the initiative would not solely focus on widgets and turbines, but also take into account traditional manufacturing and how energy efficiency (EE) and renewable energy (RE) technologies and techniques can affect clean energy manufacturing. Additionally, JD asked about the 111(d) EPA ruling and how EERE is getting involved in that. He attended a meeting with stakeholders to address this question and all attendees agreed EERE needed to be involved, but was struggled to determine how. Tom Carey (TC) noted that with the outlined EERE priority areas he didn't hear a lot about energy efficiency goals, specifically. How does the low income sector factor into the four priority areas outlined earlier? Dr. Danielson responded that it sounded as if STEAB wanted to be involved and advise on a broad range of activities. He suggested the Board dig deep into existing activities and identify what is missing in those areas which results in a lack of success, of if it identifies a gap where assistance is needed. FM indicated the Board could spend time reaching out to the Program Managers within EERE to get background information where more details are needed for the Board to better advise EERE. JD reiterated the importance of continued STEAB engagement with Program Managers to ensure a constant stream of information exchange.

Dr. Danielson then asked what big idea could STEAB come up with and share for a FY 2015 state-level initiative as there is occasionally a budget opportunity where a proposal can be brought to the attention of the Secretary. He asked STEAB to think about and propose something to him and EERE within the current fiscal year. Elliott Jacobson (EJ) thanked Dr. Danielson for that. Dr. Danielson asked that the Board develop an "Engagement Plan" so both STEAB and EERE feel ownership to these goals and activities, and STEAB has a clear understanding of how and who to engage with on the EERE side.

It was mentioned that EERE's extensive services can make it difficult for outsiders to know all that's underway or to whom they should reach out for help. Dr. Danielson responded saying that he has seen this as well; when he talks to state leaders they often do not know how to engage with DOE. He indicated a desire to perhaps create a "menu of services" that could be shared with Governors and Mayors listing what EERE is working on and who owns those projects. Perhaps STEAB could help gather and sort through that information and create with EERE a service center of sorts. Vaughn Clark (VC) felt this would be helpful as in his state of Oklahoma very few leaders or citizens are aware of what

EERE and DOE are doing as the discussions around EE and RE are all happening inside academia. He advocated for EERE to come up with an outreach approach that appeals to oil producing states and discusses economic development and advantages to employing EE and RE technologies.

JD asked how EERE was capturing and reporting on the best practices learned under the American Recovery and Reinvestment Act (ARRA) programs. There were a lot of successful programs and states were required to do final reports, but where are those reports? States would like to see those and he is sure there is value to be gained from reviewing lessons learned and best practices. MW added that states really do need to know best-practices and do need a way to plugin to DOE and a "menu" of sorts for Governors would be very helpful as they are in the best position to make an impact in their state. Dr. Danielson then also suggested STEAB could think about an adopt-a-program at EERE where the Board meets with the Program Manager to understand the activities within the program. This information could then be disseminated to state officials to help them plug-in to DOE. Dan Zaweski (DZ) told the group utilities do not interact with State Energy Offices (SEO) and while DOE probably has a solution to many issues facing utilities, like states, they find it hard to interact with the agency and Program Managers. A better exchange of data is needed, and a mechanism needs to be created to open and maintain communication. The Regional Offices used to do that, but since those were closed, there is a huge void that needs to be filled.

Dr. Danielson concluded his discussion with the STEAB by asking them to continue candid discussions with DOE and EERE staff during the meeting and come up with a proposed list of activities and areas of interest on which EERE and STEAB can engage in the form of an Engagement Plan, including descriptions of how that engagement will occur during FY 2014. Laying out a plan of engagement between both groups will help insure both sides are committed to areas of focus.

DOE State and Local Engagement Efforts: How STEAB Can Assist

Alice Madden, the Principle Deputy Assistant Secretary for Intergovernmental and External Affairs, spoke to STEAB about how Secretary Moniz's focus on state and local engagement is being addressed, and how DOE is working to be more relevant and useful to states/consumers, as well as working to fill in holes where opportunities for cross-cut programs exist but have not happened yet. To do this, her office is looking at what tools and assistance states need and identifying opportunities where DOE could assist. Some questions her office are working on include how to help raise awareness of the public as well as state and local governments about what is going on within DOE. She wants to learn more about how DOE can educate other agencies to embrace the President's Climate Action Plan, how her office can help the private sector move forward, and how DOE can help state and local government better utilize DOE's technical assistance. Ms. Madden asked the Board how her office, the Intergovernmental and External Affairs, can be the most effective and what is lacking in terms of information output to states and localities.

FM replied saying how ARRA forced engagement between DOE and states, but since the resources and programs ended information and communication avenues have been lost. EERE's success is dependent on the delivery systems of these programs within the states and DOE needs to actively engage with states, instead of waiting to be contacted. Communication has to be two-ways. JD told Ms. Madden about the Memorandum of Understanding (MOU) between USDA and DOE which facilitated collaborative efforts between SEO's and the Cooperative Extension Network (CES) adding this is a great opportunity for reinvigoration by her office. JD and DH noted they would send Ms. Madden background on this and the signed MOU between the two agencies and continue discussion offline.

JD went on to say that a lot of money comes from DOE to states and that if conditions were put on that money to be more EE and RE focused it could make a big impact. Ms. Madden noted her office is working with banks to discuss how loans and grants for EE and RE initiatives can have far-reaching implications for the local and state economy. MW identified a potential problem area noting a disconnect between the President's goals, DOE's goals, and the actions that are being taken by policy makers with Federal dollars. The President has an aggressive climate goal and DOE has a critical role to play but it is a small part in the larger move to a clean energy economy. Public Utility Commissions (PUC), DOE, states, private entities and consumers all have to be invested. How STEAB can help navigate that problem and bring all these players and parts together. She noted STEAB can assist and the Quadrennial Energy Review underway

right now will address the areas needing assistance, and identify areas where STEAB can bridge a gap between these partners and DOE.

EJ let Ms. Madden know that STEAB has a series of Task Forces that could pair up with the areas of focus in her office and assist with gathering or sharing information. The Task Forces could figure out what is occurring in certain program areas and facilitate cross-education between programs and states. Ms. Madden thanked EJ for this offer and thanked the Board for their feedback and comments and stated that she looks forward to engaging with them in the future.

Opportunities for DOE to Assist in State Discussions on Evolving Utility Business Models to Advance Clean Energy

Bill Hederman, Deputy Director of Energy Systems and Integration and Senior Advisor to the Secretary on Energy Markets, spoke with the STEAB about how his office looks at the effectiveness of utility business models in terms of which models best suit to push forward a clean energy economy. As his office is within the Office of Energy Policy and Systems Analysis (EPSA), the first major task is the analysis of the Quadrennial Energy Review (QER) which has been on hold as they wait for the Presidential Memorandum that authorizes the Agencies to begin work. Once that is out his office can begin outreach to stakeholders and other agencies that are part of this effort. Mr. Hederman indicated the focus of the discussion would be on transmission and distribution infrastructure since that is the first focus area of the QER. He went on say talking about grid modernization with STEAB would help him understand the state perspective. He then noted it would be helpful to hear from STEAB about what is going on in the states with regards to utility business models and get feedback on the need for either new models or different approaches.

JD talked about his experiences in Kentucky with electric cooperatives and the decoupling and the fixed charge on customers. He noted one cooperative is in the middle of a pilot program which puts the majority of charges on the consumer and when that is completed JD will share the results with the STEAB and DOE. DZ commented that the Long Island Power Authority (LIPA) is a large municipal utility and is going through a management and structural reorganization, and pulling together a Utility 2.0 filing. LIPA has talked about changing the revenue model to be more analogous to that of an internet provider; taking fixed costs and dividing by the number of customers, and then adding in transactional costs. Another new issue LIPA is evaluating is factoring in the rise in electric vehicles' draw on the grid.

FM continued saying solar is an issue in New York. There is a demand for solar output in certain areas of some boroughs like Brooklyn and Queens, but on the weekend those are commercial areas and there is power in the grid which no one is using. This was an example, he noted, of regional differences that need to be considered when creating or proposing new utility business models. MW added without broad stakeholder buy-in there can be no changes to the grid or to new business models. He suggested DOE find a nominal amount of money and offer to convene a stakeholder meeting and process, on a voluntary basis, with interested states to bring together the PUC, utilities, SEO, etc. to have a dialogue on the issues, solutions, and concerns surrounding distributed generation and grid integration. Mr. Hederman asked if the outcome of a meeting like this would be a broad operating principle or if the deliverable would be a new model which determines what consumer rates would look like. Clearly each state would be different, but at least getting the players to the table would be a good start. MW commented that the PUC's are key to these discussions, as well as state legislatures which set goals for each state so that any goals or objectives are set correctly and appropriately, and that may require the development of a new business model.

FM reminded the Board that consumers now have more choice over their energy supply and are becoming further empowered by new technologies and advances in the grid. While that is a positive outcome, there are people being left behind: low-income households. DOE should act as a convener of meetings, as MW suggested, but make sure certain consumer groups are not being marginalized. MW replied there are four driving factors to the concerns over existing business models: one is resiliency and reliability, the second policy changes, the third is technological innovation and the fourth is change in consumer expectations. These are issues which need to be addressed by all the players and DOE is in a position to facilitate the kick-off of discussions.

Annual Advisory Board Ethics Training

Wayne Gordon from DOE's Office of General Counsel came to the STEAB meeting and provided the annual ethics training where he discussed the statutory conflicts and regulatory conflicts of interest. He reiterated the point that as a STEAB member one is not allowed to utilize that position for personal or professional gain. If there are conflicts that arise, or potential conflicts, members are to recuse themselves from the discussion and debate, or ask DOE for guidance on how to proceed. Mr. Gordon offered future insight and assistance, as needed, to the STEAB and the DFO, and thanked the Board for their time and attention.

Doubling Energy Productivity and Climate Action Plan: How to Translate Them Into Action and How STEAB Can Help

Jonathan Pershing and Carla Frisch were the next STEAB presenters/speakers. Mr. Pershing is the Deputy Director for EPSA and Ms. Frisch is a Supervisory Program Analyst for EPSA. Mr. Pershing opened his remarks by providing some context about what EPSA is working on and how the Office is organized. EPSA is divided up into five policy groups; energy security, climate, state and local outreach, finance and investment, and grid integration. Melanie Kenderdine is the Director of EPSA and therefore all the programs, and Mr. Pershing is the Deputy Director.

Currently EPSA is focused on the Quadrennial Energy Review (QER) which will be a full review of the energy sector and systems aimed at identifying any shortcomings or constraints. The White House will lead the QER and DOE will act as the Secretariat. The first year of work will focus on infrastructure and transmission, and future years will focus on generation and end use. The QER is related to the President's Climate Action Plan and while DOE is focused on this review, it is also aware and working on other parts of the Climate Action Plan like the 111(b) and (d) rulings that EPA is responsible for and is developing. DOE wants to make sure nothing in these rules compromise energy reliability and resilience. EPSA would like to talk to STEAB about what assistance DOE can offer states in terms of support to help manage the implementation of the upcoming power plant rules, as well as receive suggestions about what may or may not work.

Secondly, Mr. Pershing wants feedback from STEAB and states about the efficiency piece of the Climate Action Plan, specifically with regards to appliance standards and what states can do to increase penetration.

Thirdly, on the loan side, DOE loan authorities and guarantees help buy-down risk. What can DOE do better, and what should DOE do that it is not already doing?

A lot of work in the EE and RE arenas is also underway at the state level, both with and without DOE assistance. How can DOE help states keep these programs rolling, and also increase the scale to the national level?

Ms. Frisch reminded the STEAB that in order to double energy productivity, DOE is looking for feedback on the issues Mr. Pershing mentioned. In the context of 111(d) what types of analysis and tools are states using to plan for reducing greenhouse gas in the power sector and are those things working? EPSA would like to do a deep dive into states existing EE and RE efforts to understand what design features are working and could be useful to other states. Finally, under ARRA DOE spent \$11.6 billion and the agency must be able to fully understand the impact of that investment. How can DOE better understand which programs and initiatives were most successful, and where are these opportunities to make changes in the future? Can STEAB assist EPSA in interpreting and framing all the data collected so it can be put into a useable framework that would be effective for other users?

EJ voiced concern over the comment regarding successful ARRA programs and a need to interpret the data. He asked if EPSA has been in touch with Oak Ridge National Lab (ORNL), and KEMA the contractor, whom are running the SEP Evaluation. He noted STEAB would be happy to assist, but was concerned about whether EPSA was aware of that evaluation. Ms. Frisch noted she and EPSA are aware but do want assistance looking, evaluating, and interpreting the data gathered and reported on during that evaluation process. VC commented on his hope with regard to all the goals of EPSA that the Office really takes a national perspective. There are a lot of successes coming out of states like New York, California, Massachusetts, Minnesota, but there are a lot of states that need more technical assistance, funding and also a policy perspective shift before any EE or RE programs could be successful. Mr. Pershing responded by agreeing with VC and indicating that EPSA is taking a regional perspective and understands it cannot use one state's success as a national

strategy, but that the best practices from some of these successful programs could be replicated nation-wide under different sets of circumstances.

MW reiterated for Mr. Pershing and Ms. Frisch a comment he made earlier in the meeting with regards to the goal of doubling energy productivity. He noted the lofty goal announced by the President had really disappeared from an outsider's perspective and asked about which agency really owned the goal of doubling productivity. Is it DOE, is it another agency, or is it a collection of agencies? From a state perspective there is no firm or identified leadership and the states would greatly benefit from a roadmap or process outline of how the nation may reach this goal. If DOE can help convene meetings to kick-off these conversations about technology, transportation, loans, new utility business models, etc. it will help identify areas where assistance is needed.

JD also indicated a need for DOE to start conversations with EPA about the 111(d) ruling as there are a lot of stakeholders and players which need to be part of that ruling and decision process, and states have not seen any action in that arena. JD remarked that planning for 111(d) needs to be a conversation among all the players. Ideally, the rule will be developed in such a way that states have multiple compliance options. Mr. Pershing asked who EPSA and DOE could talk to at the state level about 111(d), and who at the state level would benefit most from any agency level guidance. VC, JD and TC all noted that the contact person really depends on the state. Sometimes it would be the Director of the SEO, sometimes it would be another agency like Commerce or even the Governor. The first group of people to talk to though should be folks involved with the SEO's, the PUC's and air quality staff within each state.

Mr. Pershing thanked STEAB for their time and asked that as the Board ruminated on these topics and concerns, that STEAB stay in touch via the DFO with EPSA and continue to provide feedback and suggestions on areas where improvements, technical assistance, or guidance is needed.

FM and JH asked the members of STEAB to review their notes and comments from earlier in the day and engage in a roundtable discussion about how to assist DOE and EERE with the many asks and issues outlined by Tuesday's attendees. FM also asked the group to think about how they would engage with EERE as per Dr. Danielson's request to produce and deliver a formal Engagement Plan within the next few weeks. DH suggested maintaining and realigning the existing Task Forces. Those were a way STEAB was able to convene interested parties and gain insight which then came to the Board for further discussion and debate. JD added some house-cleaning may be needed to terminate Task Forces that are no longer relevant based on the day's discussions, and perhaps the identification of new groups with new objectives could be developed in a way that tracks directly with the asks from Dr. Danielson and the EPSA staff. MW agreed with JD that it is important for STEAB to look at Dr. Danielson's areas of focus, as well as to make sure state issues are addressed, and JH volunteered to summarize the goals and calls to action from Dr. Danielson's presentation and walk through them with the STEAB the following day during additional Board discussion.

Overview for STEAB of EERE's Budget Process, Flexibilities, and Constraints

The final attendee of the STEAB meeting on Tuesday, December 3rd, was Merle Sykes, the Chief Financial Officer for EERE. Ms. Sykes provided background information to the DOE and EERE budgetary process walking STEAB members through the steps of the internal budget review, the agency-wide review, and the submission to Congress. She indicated EERE is aware and concerned with cross-cutting programs and areas where there are opportunities to leverage dollars across Offices. The EERE budget is one line item in the larger Energy and Water bill, is discretionary funding, and EERE continuously sees lower funding than what was requested.

She explained the difficulty of moving money across program areas within EERE, clarifying that any time more than \$5 million dollars needs to be moved between individual line items, EERE must do both a reprogramming and write a letter to Congress requesting approval of the move. There is little to no ability for EERE to make changes and move money without legislative approval.

A question was asked about the National Labs' budgets. Ms. Sykes noted that their budgets (with the exception of NREL) are separate from DOE/EERE. EERE funds the Labs' research directly from the EERE technology program offices (e.g., the Buildings Technologies Office funds a study at Oak Ridge National Lab), and would be represented in these individual office budgets as opposed to at the EERE summary level. In general, EERE spends about half of its funding on research done across several National Labs.

FM thanked Ms. Sykes for the overview and her frank discussion and clear description of how EERE's budget is formulated and executed.

STEAB Discussion and First Day Wrap-Up

JH and FM concluded the day's discussion by asking the Board about the upcoming March 2014 meeting at the National Renewable Energy Laboratory (NREL), inviting suggestions for attendees, activities, and tours. JH asked how the STEAB could respond to Dr. Danielson's ask for feedback and input on his four main action areas. EJ suggested what JD and DH noted earlier which was to enhance the STEAB's Task Forces and change their purview to track with EERE and STEAB focus areas. MW agreed saying some of the existing Task Forces were relevant, but others needed a new focus or needed to be terminated to make room for new groups. DH indicated the work of the USDA/DOE Task Force was complete because the MOU had been signed and there is an active working group keeping activities moving forward, and perhaps Alice Madden could become involved with that group as she appeared interested in this initiative. JH reminded the STEAB she would pull together a list of the asks from speakers and present those ideas to the Board tomorrow for in-depth discussion. From there the Board can come up with priorities to focus on during 2014 and consider what Task Forces may be needed, or what Task Forces can take on additional work. The members agreed with this approach and the meeting was adjourned for the day after a reminder about the following day's agenda and schedule.

DOE Energy Policy Systems and Analysis Office: Secretarial State and Local Policy Efforts and STEAB's Role

The first speaker on Wednesday, December 4th, was Karen Wayland, the Deputy Director for State, Local and Tribal Cooperation within EPSA. She reiterated that EPSA was created to coordinate policy advice across several arenas and provide analysis to the Secretary. Ms. Wayland provided follow-up on the QER and reminded the Board this is the first energy review being conducted and the goal is to determine a set of policies which will aid the country in achieving the President's climate goals, as well as determine a set of recommendations, legislative proposals, ideas on deployment, and recommendations for financial incentives to move the country towards modernizing our energy infrastructure. She then walked through the process DOE will be following at each phase, and what questions will be asked to make the QER as productive as possible. She then discussed the engagement and analysis portion about how DOE will interact with states and other stakeholders to review the results. She commented that her team put together questions about the role of states and regions, but wanted from STEAB a list of formal questions states feel need to be addressed in the QER. What information do states need to help identify questions about the state role and policy issues that will feed into the QER?

MW asked about the outcome of the OER. He asked whether the end goal was to ultimately identify barriers to the President's goal of doubling energy productivity and then look at the options and recommendations available to DOE and other agencies and states to reach that goal, whereby the policy recommendations would then turn into action items. Ms. Wayland confirmed this was the case and the QER would identify what the nation's energy needs are, for reaching the 2030 Climate Action Plan deadline. The QER will inform what policies are needed to make that happen. EJ weighedin on the low-income perspective and asked that Ms. Wayland keep that group in mind when developing policy recommendations based on the QER results. David Terry (DT) voiced concern over how complicated a review of this size will be. There are a lot of rapidly shifting energy issues and they are so complex. However, it appears as if EPSA is trying to develop a framework for data gathering and analysis, which will be helpful for states. He reminded her to not underestimate the value of a framework which forces states to also look beyond themselves and towards a national goal. He also encouraged her to include players like the PUC's and utilities, taking into account the economic side of EE and RE integration. Robert Jackson (RJ) agreed with DT and added that states should be involved in this process sooner rather than later as many states have State Energy Plans that could dovetail with this framework for the QER. Ms. Wayland thanked DT and RJ for their comments and noted there will be a stakeholder engagement side to this process and a series of formal meetings will be convened with states and also rural communities to talk about the QER process and proposed outcomes.

VC and JD noted they were pleased to hear that DOE has a desire to involve the states so early in the process, but both reminded her of the regional issues needing consideration when talking about policy, as all states are not on the same

page about the nation's energy issues. Ms. Wayland responded saying the recommendations that arise as part of the QER will not be, or inform, mandates, but will highlight issues and problems states are grappling with and provide varied recommendations on how states can address them. She asked that STEAB share information with her office about the proposed scope of the QER and deliver questions and feedback from a state perspective with regards to the proposed framework discussed earlier.

Ms. Wayland indicated her willingness to engage with STEAB over the next few months on these framework questions and offered to bounce ideas off of STEAB about the stakeholder engagement piece to make sure DOE are talking to the right contacts within the states and regions. Ms. Wayland concluded her discussion by asking STEAB to think broadly about the QER and come up with a list of questions for her and her office to consider while developing the framework and scope. Examples of the types of questions she is looking for are as follows:

- What can be done within existing Federal, state and local, regulatory authority to encourage investments most likely to provide energy services at the lowest cost, environmental cost and cost of unreliability?
- Are current market structures sufficient to encourage reliability?
- What infrastructure alternatives opportunities associated with cross cutting issues such as water and energy nexus and gas infrastructure?

Utilizing the existing outline EPSA already has, her office wants to try and use these questions as part of the overall vision of the QER to make sure the review looks at the big picture. JH replied that the STEAB would be happy to review and send in questions to make sure that DOE, as the QER secretariat, does not miss a critical piece of the puzzle when trying to define our new energy economy.

State Energy Planning: How DOE and STEAB Can Help States Engage in Long-Term Energy Planning to Achieve Their Clean Energy Goals

Ms. Michelle Wyman noted that the Board had likely heard from several speakers about Secretary Moniz's desire to advance and accelerate investment into the state and local governments, working creatively with states to support and push forward the activities that are already underway. Ms. Wyman is Director of Intergovernmental Affairs and her job is to understand what states, local government, and organizations like NASEO, NASCSP, NGA and Board's like STEAB need from DOE and the Federal government. Some of the questions Ms. Wyman posed included:

- The SEP competitive awards were announced the week before, how do states feel about those?
- Additionally, has STEAB played a role contributing to the program on the competitive side?
- Does DOE provide STEAB or state governments an opportunity to have a voice in the awards before they are established?
- Are current funding opportunities sufficiently advertised to states, or could STEAB be a vehicle to help communicate to states about new technologies coming to market, or new funding opportunities available via DOE?

Continuing her thoughts, Ms. Wyman asked what the biggest hurdles are facing states today that impede their ability to actualize a clean energy economy. She asked how her office could play an effective role with that, and facilitate greater coordination at a state and regional level. What are the areas that STEAB and her office can organize around and collaborate on? What formats are useful, such as webinars, technical assistance, or other means of support?

SB indicated that neither states nor STEAB had been involved with the competitive awards, not invited to participate, but the Board would very much like to have that opportunity. She also noted that in her opinion, the biggest hurdle to advancing a clean energy economy in the states is economic. In order for state to feel vested in advancing that goal, there has to be the promise or expectation of both job creation and economic stimulus.

Ms. Wyman responded saying her job is to ask how these programs are working in the states, and to listen to the type of feedback provided by SB. She reiterated her role is to champion state and local programs within DOE and believes that with marginal adjustments the existing programs could be much more useful to states, specifically in ways that SB outlined.

JD added the competitive award process may not be the best model for states and there are much better ways to use those resources to get energy efficiency and renewable energy technology and techniques into the states. Ms. Wyman

commented that in order to make changes, organization like STEAB need to put in writing what works and what does not and send that in to her office and to others within the department. By sending in formal letters outlining concerns or making suggestions for change, DOE has the opportunity and obligation to respond to those letters. VC then added he and his state would like SEP competitive awards to be taken off the table completely noting that if DOE was to look at a map of where the competitive dollars go each year, it is to the same group of states that apply every year, and not all states have the bandwidth or the funding to spend hours on crafting a competitive proposal. RJ and TC agreed with VC, and indicated they had yet to hear DOE outline the value proposition of the SEP competitive awards and advised that DOE use formula funding only, moving forward.

MW provided feedback noting he does not get the sense DOE is focused on market reach and feels DOE is not a player in discussions at the state and local level where there are ongoing discussions about market transformation. He believes that is a missed opportunity and the competitive grants offered by DOE are not really accomplishing what they should be, if the purpose of those awards is to provide funding to states that have identified a gap and are working to close it. Additionally, MW provided his feedback on the Technical Assistance Program (TAP) noting states really feel it is a solution looking for a problem. States do not know how to get information out of the agency and that is an issue.

EJ asked Ms. Wyman how, based on the earlier conversations and feedback, STEAB fits into her work and how the Board can be helpful to EPSA, the Secretary and DOE. Ms. Wyman responded saying that as her office is responsible for engaging with states and gathering feedback STEAB can be most helpful by providing formal communication to her office outlining the suggestions, criticisms, and missed opportunities noted earlier. This type of feedback really validates what her office is all about and receiving this feedback from FACA's which represent state and local interests is very valuable. She went on to say DOE has been able to fully actualize and tell the stories of the return on investment of ARRA projects like the Energy Efficiency and Conservation Block Grants (EECBG). The outcomes and successes of those types of programs are outlined in the data, but tend to be underplayed. At the Secretary level within DOE there are discussions occurring about how best to share this information. Additionally, since EECBG was such a success, DOE is looking at if it can rally resources, including technical assistance, and create a sort of "grand challenge" concept that would reach across agencies like DOE and HUD to try and leverage as much assistance as possible for programs that were successful and could continue to be given the opportunity. Ms. Wyman concluded her comments by encouraging STEAB members to send her ideas, concerns, and questions directly and provided her contact information to the members.

STEAB Public Comment

FM then turned to the portion of the meeting where members of the public are able to comment, ask questions or voice concerns. Seeing as there were no members of the public present, he then asked if there were members of the public on the teleconference line who wished to make a comment. Hearing none he asked if any written comments had been submitted to the DFO for reading during the meeting. JH indicated she had not received any written comments from the public, and in light of that, FM then moved on to the next item on the STEAB's agenda which was Board discussion.

STEAB Member Discussion

FM opened the Board discussion portion of the meeting asking STEAB members how they feel the Board as a whole should move forward in FY 2014 given all of the activities and priorities they had heard from DOE visitors. JH reminded the group she combined the questions, needs, and asks that arose in the previous day's meetings into one document for review and asked the group to reference that during this discussion, while taking into consideration the new ideas posed by the morning's presenters. MW thought many of the ideas the STEAB had already captured in the draft White Paper were discussed during the Board meeting thus far, but felt it would be best to combine those ideas generated after the July 2013 meeting into the asks from the speakers at this current meeting. He also sees STEAB as having two tasks: determining to what extent STEAB wants to weigh-in on these issues, and what there are things the Board could recommend via an official Resolution now to DOE now so as not to lose the momentum gained during discussions with DOE staff.

JH reminded the group of the importance of creating the Engagement Plan which Dr. Danielson asked of the Board. The STEAB needs to determine how to interface more regularly with Dr. Danielson and how best to share

information with his office. She continued asking about ideas that the members have which could be put into writing as immediate feedback. FM replied saying states are not in support of competitive SEP awards and that should be made clear to DOE. TC and VC added that DOE provides too many webinars and too many calls and in his opinion states do not find them very useful. SB noted that DOE does not provide information about their Funding Opportunities in a meaningful or clear way. FM noted DOE needs to be more proactively engaged with the states, including greater engagement with EERE Program Managers.

In light of all of these comments, MW asked what STEAB wants DOE to do with this information. Does the Board want the Program Mangers to be more engaged with STEAB or the states directly? If we are going to send in this type of feedback then the Board also needs to outline prospective outcomes and propose specific actions. MW went on to say that DOE should also evaluate the audience for the TAP program, determining which recipients are finding technical assistance useful and what specific aspects. VC agreed saying states are working to proactively solve their issues without DOE assistance, but that is only because they are unable to access DOE assistance effectively and find the right people to assist with their issues. MW suggested the Engagement Plan not only outline STEAB's communication strategy with Dr. Danielson, but also will outline the aforementioned issues and perhaps form new Task Forces to work on those issues with DOE assistance and guidance, and offer Board help in remedying the issues outlined in the Plan. JH noted that this was aligned with her vision of how the Engagement Plan would be written, and JD suggested adding the issue of the 111(d) rule to the list of concerns.

JH posed a question to the Board regarding how it would like to address its recurrently raised recommendation about how DOE should engage with the EPA on the 111(d) issue. To recap sentiments expressed by the Board, it sounds like there is a general belief that there would be value in DOE beginning conversations with EPA now to ensure that there are multiple, cost-effective compliance options for states that allow for flexibility. JD replied that there is value in DOE getting involved soon with EPA because the "how" of implementing this rule needs to be determined before the final rule is written. He suggested adding this to the Engagement Plan as an issue that STEAB could work on with DOE through the creation of a new STEAB Task Force.

MW asked the members about what they want to achieve as a group over the next year, given there seem to be really five main topics or areas where STEAB could provide meaningful and impactful feedback. Those five areas where DOE has asked for guidance or assistance are with regards to the Weatherization Program; how the Labs can serve as better economic catalysts; the states' role in advancing clean energy manufacturing competitiveness; how DOE can engage with EPA on the 111(d) ruling and what technical assistance DOE should provide to assist states with compliance; and engagement with DOE on the QER. He feels these are the 5 areas of focus for the Board moving forward through FY 2014. JH agreed with MW and asked if the Board had other potential areas of focus.

TC asked about the President's Climate Action Plan and the goal of doubling the nation's energy productivity. Will STEAB put information about how the Board will help with that goal into the Engagement Plan as it ties in with at least two of the five areas MW outlined, or should the Board tackle that as a separate and sixth issue? MW recommended the Board make a recommendation to DOE specifically about that goal and do it immediately as he feels that is the overarching theme of the five focus areas STEAB is considering. JH then suggested the proposed wording of a recommendation, by pulling language from both the draft White Paper and from previous conversations. The recommendation could read something like, "STEAB recommends DOE initiate a public process to develop a comprehensive plan to achieve President's goal of doubling nation's energy productivity by 2030. Such a plan should build on the specific steps already underway across the Federal government and extend to integrate actions by businesses, households and local and state governments. The plan must leverage and harmonize department-wide research, development and deployment efforts to maximize impact and accelerate adoption." MW then also briefly suggested two other recommendations regarding the SEP competitive awards, and having DOE jumpstart state discussions around new utility business models. TC thought another recommendation should be about having DOE look back at ARRA, summarizing what was learned by each state and by EERE to create best-practices and lessons learned. States are asking for this information and DOE is currently unable to provide it.

FM concluded the Board discussion noting the actions moving forward are to send a letter to Dr. Danielson which outlines both a thank you for attending the meeting and briefly summarizes the proposed five focus areas of focus for the

Board in FY 2014. Additionally, with that letter the Board can also submit the Engagement Plan to explain the recommendations in detail. JH agreed that these documents should go to Dr. Danielson in one package and suggested hosting a Board call later in December to review a draft of the plan which would provide an opportunity for additional feedback from Board members including those who were unable to attend the December meeting.

STEAB & EERE Leadership Moving Forward: Recap STEAB's 2014 Plans, Concur on Priorities and Next Steps

FM introduced the final two guests for the December STEAB meeting. Dr. Kathleen Hogan, the Deputy Assistant Secretary for Energy Efficiency, and Jason Walsh, Senior Advisor to the Assistant Secretary, and Acting Director, Strategic Programs, both commented to the members of the STEAB that they hope the Board now has an indication of what EERE and DOE are working on with regards to state and local government, and are looking forward to working together to achieve these goals. Dr. Hogan noted the desire to get state and local governments working with DOE, and would like to work with the Board to tease out some ideas of where there are synergies. Mr. Walsh admitted DOE has spent too much time in the past talking at the STEAB instead of listening to the feedback and acknowledged EERE had not been as focused as they needed to be when participating in past meetings.

JH thanked both Dr. Hogan and Mr. Walsh for attending and indicated that STEAB had, based on its discussions with guests during the past two days, created a list of priorities and focus areas for FY 2014. She noted STEAB will be creating and sending to Dr. Danielson a comprehensive Engagement Plan outlining these five areas. The Plan will also describe how STEAB will deliver recommendations to EERE and will suggest a process for exchanging ideas and information with Dr. Danielson, as requested. While there are additional recommendations to DOE which STEAB will be working on outside of the five proposed focus areas, JH reviewed with Dr. Hogan and Mr. Walsh the five areas determined during previous Board discussion. Those areas are as follows: WAP, CEMI, National Labs as economic catalysts, the QER, and 111(d) compliance. She noted STEAB plans to establish new and re-direct existing Task Forces to tackle these issues in small groups throughout FY 2014.

JH then went on to provide an overview of the key points within these five areas, to give context on where the STEAB was coming from and how they would be addressing these issues. On the work with National Labs and state engagement, the STEAB will be finding ways to make the Labs more powerful catalysts for economic competitiveness at a state level. The Labs can assist states technologically, but the states need to identify for where the technology is needed. With regards to the QER, Ms. Wayland wants STEAB to identify questions which they feel need addressing in order to make sure the QER serves state interests correctly and that nothing vital is overlooked. On the CEMI front, Dr. Danielson asked STEAB to help identify opportunities for public-private partnerships to get states more involved and enthusiastic about the CEMI project. The Weatherization Task Force will continue its dialogue with other partners involved in WAP including NASCSP, NCAF, NEADA and others to make sure the program maintains its network and continues delivering to low-income households and communities. On the 111(d) front STEAB recommends DOE get involved with EPA now to help make sure the "how" of the ruling is determined before the final rule is written.

Mr. Walsh expressed some concern that this is a lot for the STEAB to undertake all at once, but FM replied the Board is looking forward to the challenge, and some of the issues it is addressing already have some work underway and suggestions from efforts made during FY 2013. FM feels the biggest challenge for STEAB will be with CEMI and 111(d). While those efforts will take more time, STEAB can also engage with colleagues at the state level to gain a better understanding of what is being done, or what states hope is done with regards to these areas. MW added that STEAB's response to these areas will be sent to DOE in the form of letters not more than a few pages containing observations and suggestions, but the Board will not be providing full reports on each of these five areas. Mr. Walsh thanked MW for the clarification and agreed that the format sounded appropriate.

Mr. Walsh went on to thank the STEAB for their thoughts and feedback on the EERE Strategic Plan which has been addressed during previous meetings and Board calls. He noted a draft of the plan itself will be provided to the STEAB for their review and comments back to Mr. Walsh directly, and in that draft EERE does address how the Office will be pursuing the President's goal of doubling the national energy productivity by 2030. When the draft plan is made available to the Board, Mr. Walsh will be asking for feedback on the overall strategies and how well articulated they are

and whether EERE has adequately described how it will get from recommendation to implementation. Dr. Hogan added the plan outlines a set of strategic goals, some of which are cross-cutting. Additionally, EERE eventually wants to bring down the cost of these new EE and RE technologies and would like feedback from STEAB on what is going on in the states to address that, and how can state engagement with DOE help break down those market barriers. JH indicated the Board would very much like to be involved with the Strategic Plan and hopes that Mr. Walsh can share the draft with the Board before the New Year, indicating she would coordinate with Mr. Walsh and Dr. Hogan to make sure Board feedback is provided in a timely and constructive manner. JH also indicated that the Engagement Plan STEAB is creating for Dr. Danielson will also be shared with Dr. Hogan and Mr. Walsh as well for their thoughts and comments.

Dr. Hogan asked about other comments members had, and what they had learned in their conversations with DOE visitors over the last couple of days. MW shared his concern about TAP and how states feel it is a solution looking for a problem. It is constantly offered to states, but not on the topics that states really need. There is both a gap in the knowledge and a delay when it comes to getting assistance that is actually needed. By the time enough states realize they need the assistance from DOE, and DOE is able to respond to that ask, states have had to muddle through the issues and problems on their own and have created their own solutions. He suggested EERE reevaluate the audience and delivery mechanisms of this program and work with the states to make it more useful.

FM answered Dr. Hogan's question by indicating states feel that Program Managers have turned too inward and are not interacting or engaging with the states. By turning inward, states are getting less value and learning less about what is going on within the ten EERE program offices. States want to interact with the program offices, but they do not know how to reach the Program Managers. Can EERE change the attitudes of the Managers, or is there something else that needs to change? Mr. Walsh responded to both FM's and MW's concerns noting that yes, offering solutions without first defining a problem is an issue within TAP and that Program Managers are not as engaged with states as they should be. EERE has begun working with state and local governments to define the problems and create a unified and useful state and local web presence that organizes material DOE has to address these problems in a user-friendly way. This then becomes essentially a state/local one-stop-shop giving people real answers to real problems. Could STEAB help beta-test this with EERE? EERE is currently in the process of building this and would like STEAB's feedback and assistance. JW did acknowledge the need to revitalize the dialogue between the EERE technology offices and states. This has been discussed at previous NASEO meetings as well; the question is how to reverse the trend of these technology offices turning inward so that they can better understand the value to them of partnering with states.

MW addressed an earlier suggestion he had to Mr. Walsh and Dr. Hogan noting he would like to see DOE facilitate dialogues between states about how states feel about 111(d) to enable states to begin defining what assistance they may need from the Federal government. DT echoed this idea, stating it would be very valuable to get conversations happening now within a regulatory context with DOE acting as the convener. Mr. Walsh asked that the STEAB bookmark this conversation for future discussion with EERE as it deserves a much more in-depth conversation.

FM and JH thanked both Dr. Hogan and Mr. Walsh for attending the meeting and taking time to discuss these five focus areas with the Board members. JH indicated the STEAB would be meeting in December on a conference call to review the draft Engagement Plan and draft a letter to Dr. Danielson about the focus areas and the immediate recommendations. FM reminded the Board about the upcoming March 2014 meeting in Golden, CO, as well as the monthly Board calls on the third Thursday of each month at 3:30 pm eastern time.

JH and FM then outlined the Task Forces which would be working on the five focus areas and reiterated the work of the WAP Task Force and that it should continue its engagement with other stakeholders and DOE. For the Lab Task Force it was suggested they have a call to discuss how to move forward on Lab and state engagement and work on determining a course of action. Phil Giudice and Maurice Kaya will join the Lab Task Force and they will help address not only the engagement part, but also tie in CEMI with the Lab Task Force as there is a natural fit for the two areas within that group. A new QER Task Force was developed with MW as the Chair, and DT, FM, PG and EJ as members. A State Needs Task Force was established with DT as the Chair, MW and FM as members, but noted more STEAB members as well as members of state air quality control are needed as well, to provide input but not sit formally on the STEAB Task Force.

JH thanked the members of the Board for attending the December meeting and asked if there was additional new business or old business that needed to be addressed. Seeing as there was none, she and FM noted they looked forward to seeing the Board in March in Colorado, and the December 2013 STEAB meeting was adjourned.