

## **DOE FY2013 STAKEHOLDER ENGAGEMENT AND WORKFORCE PLANS**

**December 19, 2012**

Coordinator: Welcome and thank you for standing by.

For the duration of today's call, all participants will be in a listen-only mode.

Today's conference is being recorded. If you have any objections, please disconnect at this time.

I would like now to turn over the call to Mr. Ian Baring-Gould. Go ahead.

(Ian Baring-Gould): Hello everybody and welcome to another WPA webinar from sunny Colorado -- which is fabulous. Our first real snowfall of the season, so it's nice to be here with everybody right before the holidays.

The focus of today's webinar is going to be on the activities within wind-powering America or looking at stakeholder engagement and the workforce plans for the next fiscal year. And we have both (Jonathan) and myself speaking on the different activities and we're going to do basically a slide show back and forth.

Remind everybody that Q&A for this activity is done online. So you'll see up at the top of the screen the little Q&A, tap that and you can type in your questions. We will be holding questions to the end of the presentation.

So without further ado we'll get to the full content here. And again it's (Jonathan) and myself reviewing the activities that the Department of Energy is doing under its stakeholder engagement and outreach activities.

To reminded everybody of kind of what the problem is, that as we deploy wind and as wind becomes more widespread in its deployment there is

certainly defined opposition that is being formed around this that comes from a fear of a change and from kind of the competing technologies that are out there.

And we have three kind figures here. The first one in the lower left is the 20% summary of where we see wind developing -- both land-based and offshore. And as you can see, down there at the bottom we're just starting this process.

Up in the upper right-hand corner, you see the 20% by state -- which all of us should be familiar with.

Something that's a little bit newer and is based on some work that (Suzanne Tegen) and others from the analysis group is looking at is what happens when you start putting in place deployment barriers across the state or across the nation.

And so in the lower right-hand corner we have what would be seen as kind of an extreme barriers in regards to deployment. So the area in red that you see is every place that's within a mile of a residence that someone sleeps in at night.

And so you can clearly see that if kind of the extreme in regards to permitting -- which is being advocated by some -- goes into place, it certainly limits the amount of wind contribution that's going happen. Clearly that's an extreme case.

But I think it highlights the fact that as with kind of the good wind resources that we have as the easy to deployed sites get developed, we're going to have to start deploying in places that are closer to people and that's going to see increased deployment barriers -- whether it's the deployment in this case from

a permitting perspective or wildlife radar transmission and things of that nature.

And so the whole activities that are being undertaken in the stakeholder engagement activity by DOE is trying to address this issue of deployment and the potential costs and impacts that we can see from unrealistic restrictions in regards to where we can deploy wind technologies.

So as the industry matures there are very green field sites that we can use for wind deployment that are away from popular (unintelligible), good access and things of that nature.

And so we really need to start looking at the sites that remain and how we inform people about the impacts of wind technology so that they can make educated decisions about the deployment there.

And as the activities has been done for the past ten years, really trying to provide information that is trusted by all of the sources that are out there.

Certainly the industry produces a lot of great information. But when you're a county commissioner or if you are one of the people that certainly see wind development as a detriment, anything that comes from the industry is seen -- is perceived -- as being bias and therefore suspect.

And so there really needs to be a source of critical and credible information for the stakeholders again which is the main activity in the education and outreach space.

We've done quite a few products and deliverables over the last year. Just a little bit of recapping, lots of work with JEDI. A lot of this is not news to most of the people on the phone.

A neat fact is that the WPA Web sites visit or end up being some of the most highly sought sites within the ERE infrastructure. So we certainly know that the information is getting out and that people are looking to the department to be able to provide this information.

Certainly the newsletter that I'm sure most of you receive, the workshops that we do, a couple of them over the last year that were pretty important, one up in New England that focused on kind of acceptance issues, another one down in the southeast looking at wind development in that part of the country, so continue to look at regional and technical workshops.

A fair amount of permitting work most specifically in the Great Lakes area because the Great Lakes is because it's not in U.S. territorial waters and is actually covered by differing state organizations and a bunch of federal entities, there's not a lead organization. So the department taking a pretty active role in trying to support the regulatory framework around development in the Great Lakes.

A fair amount of training to regulators as well as to other industry or other people in the federal sector in regards to the deployment of wind. Most people know about the wind resource maps. We now have for the first time in this last year wind resource maps for land-based, offshore, community and small wind -- which is fabulous.

And then the webinar series -- which clearly all of you are familiar with. But an archive of over 90 webinars that's available on the WPA site.

And it's with kind of great pleasure that we can say that (unintelligible) (Larry Flowers) and DOE initiated the Wind-Powering America program. Twelve years ago they set their sights on this goal of 30 states with ten megawatts of - or sorry 100 megawatts of wind. And that was done basically as an indicator of how developed the state had - each of the states had become with supplying wind technology.

And within this last year based on a whole lot of work by many different people at the federal, state and local level, we actually achieved that goal. So 30 states with over 100 megawatts with Ohio and Maryland being the last two to cross that line is fabulous.

We also have a goal of 15 states with a gigawatt of wind and we're very close to that. And then as I've talked about expanding the green that we saw on the map down into that lower right corner with much more development looking forwards in the southeast parts of the United States.

So there's a whole series of outreach objectives that we have been using over the last year. I won't go over these in any detail. Most everybody on the line already knows about this. Because most interesting is the work that we're doing to be diving into over the next year.

We're going to be continuing all of these activities -- the newsletter, the podcasts, the all state summit -- so all of the things that we have been doing but we're also branching into a couple of new activities that (Jonathan) is going to pop on here to introduce.

So, (Jonathan), do you want to kind of take on the focuses of this year -- of this upcoming year -- in the outreach area?

(Jonathan Bartlett): Thank you, (Ian). This is (Jonathan Bartlett). I'm here in DOE's headquarters in Washington, D.C., where we still have some okay weather. It doesn't really seem like winter yet.

But as (Ian) has indicated, we have many accomplishments to be thankful for. What we've done in outreach and education in FY '12 and in the very beginning of FY '13 and as this slide indicates our fiscal year 2013 outreach focuses will probably be familiar to a number of people who have logged into this webinar/conference call.

Under the guidance of (Ian) and (Michelle DesAutels), who many of you are familiar with, who was in the program in 2009, '10 and part of '11, there were multiple strategic decisions and workshops like the all state summit where we discussed how Wind Powering America and education and outreach work will continue in the future and transition.

We've had a very successful state wind working group activity. And one of the things that we have discussed during FY '12 and before FY '12 was transitioning to what we're calling a regional resource center strategy.

The RRCs will address and mitigate regional and local barriers to wind deployment. And we will take from the lessons learned and the successes from the state wind working groups -- some of which are obviously still very active -- and expand a regional network.

Within that since some of these areas obviously touch on offshore wind potential generation, we're going to expand our offshore wind outreach and engagement support.

And I should take a moment both to thank (Ian Baring-Gould) and the entire staff in NREL for the education and outreach wind power in America and also here my colleagues within the Wind and Water Power Technologies Office -- in particular (Ben Jackowski) and (Megan Massawa). I'm not sure if they're on this call or not, but everyone should know that a lot of the strategic work and tactical activities that we'll be taking in FY '13 have been driven only by (Ian) and staff but also (Ben) and (Megan).

So on thing to highlight in particular that second bullet the expanded offshore wind outreach and engagement support, it's something that we're particularly enthusiastic about.

We have recently completed a number of let's call them interviews with people who are involved in the industry in outreach and education efforts. And these entities and the people who are working at them have provided us with a considerable amount of feedback regarding DOE's current role within the industry and the niches that exists and these gaps that DOE can help assist in mitigating market barriers and, you know, increasing the speed of deployment.

So that's something that we have taken great consideration into helping to determine our strategy and will influence some of the RRC's activity in FY '13 and beyond.

So one of the other things is we're continuing as (Ian) mentioned the offshore wind JEDI component. The model has been expanded to include offshore wind analysis and we have two analyses that are nearing completion and will be available for public dissemination and they're for the Great Lakes and southeast regions. So they'll be available early on in calendar 2013 and we

will be completing an additional two during fiscal year '13 and those continue in out years as well.

There will be additional reports on socioeconomic impacts in terms of proximity and noise concerns, property values and regulatory assessments as we deem them necessary and fit that will also assist in our process.

And we're thinking about doing higher fidelity resource maps for land-based winds and our market-driven result-based strategy is being developed as I'd indicated. One of the big things that we've worked on is are those interviews with people who are engaged in offshore wind education and outreach.

So moving on if I can get the slide to flip -- which just so you know while I'm technical enabled occasionally - ah, brilliant. Thank you.

So the RRCs, the overarching goal is as I indicated to increase the efficiency and cost effectiveness of our education and outreach activities. And this transition from state-based wind working groups to a regionally based network allows us to take the localized expertise that the state wind working groups had, the information resources, the tools that we have on a national level and ensure informed decision making.

Because as many of if not all of you are aware of the fact that we want the decisions for wind deployment to be fact based. We would much prefer for a bad wind project not to occur than just to get deployments out in the field.

So some of the things that we'll be doing is continuing to host regional meetings to educate and inform stakeholders. We're going to form some working groups on specific issues that are relevant to the regions.

So we'll have national-level messages that will be if you will translated for a particular region and then we'll have specific issues that will be addressed within a region. You know, there might be transmission might be a large issue for one region. Public acceptance might be a bigger issue. Especially in the case of offshore wind deployment, one of the things that we've we want to leverage are experience with land-based wind deployment and appropriately us the best practices from that for offshore wind development.

We're going to training regional entities -- both on a local and a state, county decision maker level. And that's something that we see as sort of a continuous process for the next few fiscal years. And then as people atrit through the system, we'll, you know, intermittently go back and do additional training.

And with these RRCs we intend to leverage larger funding pools between the states while working closely with the current and still existing state wind working groups. And this will allow for stronger and weaker states to collaborate in developing a regional influence.

The RRCs will have a specific benefit to those wanting to learn more about wind technology in distributing community applications -- especially because those are some of our stakeholder group that may not have access to the same type of resources that, you know, larger development companies would have.

So moving on to our next slide this gives you sort of an overview of the different regions. Now we know that, you know, our resources are finite and the scale of the barriers are obviously quite large. So we're going to prioritize on both a national level and then within a regional level to find out, you know, which areas need most of our attention.

And while at least on my end this slide looks a little blurry, I can tell you that for example in the Northwest we're talking about eight gigawatts of deployment and the barrier reduction is creating productive polices, regional transition support, decision maker outreach.

Another place like the southwest it's barriers education and outreach in general, permitting support -- especially on federal lands -- transmission integration support.

And so these are sort of I would envision these regions that you see within the shall we see rounded rectangles as potential regions. This is something that we will quickly address in early calendar 2013. Potentially this could end up being a solicitation for RRCs and funding or it could be something that we self-select and determine.

But we do envision these to be sort of a general guide line as potential regions and the important areas that we'd like them to address in terms of barriers.

And as you see on the next slide, it sort of gives you an overview of offshore wind, funding opportunity and (unintelligible) public acceptance activities.

So very recently we are pleased as a technology office to announce that the offshore wind full awardees have been announced and we are obviously in the process of negotiating with them to activate the initiative.

And one of the things that as the strategic leads of education and outreach for this office we're cognizant of the fact that we want to incorporate education and outreach into the demo awardees activities.

And so that could take a number of different fronts if you will -- creating a Web portal, highlighting the projects and related info, perhaps a potential way for people to give us feedback on the project in terms of their impressions.

It could lead to a creation of an FAQ sort of portion of the Web portal where commonly asked questions are, you know, dealt with and answered so people aren't scrambling to try to figure out, you know, what the information is about the project, where it's going to go, how large it will be, the economic impact.

And we also want to canvas the existing stakeholder engagement tactics -- which we've done. We've had approximately a dozen or so conversations with different entities dealing with stakeholder engagement. And so we're very quickly putting that together into two sort of consolidated best practices of successful approaches and we will use that for offshore wind.

We're looking into each of the awardees stated public acceptance objectives and we'll use that to determine what the best public acceptance factors are that in coordination with an extensive literature review.

We've already mentioned that we have two offshore wind-related JEDI analyses that are close to completion. We have two more planned in fiscal year '13. We're going to work with independent third-party groups to do analysis of stakeholder viewpoints.

And so these are some of the roles for RRCs and we intend to continue to develop a robust connection with the (unintelligible) taskforces. We've found that to be a very favorable venue to make sure that all of the market barrier issues for offshore wind development are taken into account.

And we'll use all these lessons learned from the demonstration projects to support future projects for wider offshore wind project development.

And at this point, I'm going to hand things back off to (Ian) to address some of our overall education and workforce approaches.

(Ian Baring-Gould): So as everybody knows the DOE's program is really broken into two parts. One is the outreach education work that we're doing as we've just talked about all of that work. The second part is really focused on workforce, so education and workforce directed at educational institutions.

And so the rest of this discussion will focus again just what we did with the stakeholder engagement element with the workforce step.

So the activities that the kind of approach that we've been taking it is shown here in this slide working on the development of the wind workforce framework, work with industry to expand the understanding of labor needs -- including a large industry survey that we just completed last year that hopefully will - well not hopefully. The plan is to get a paper on that in the next quarter really looking at the wind workforce, taking the first real step since the 20% report came out and the indications of workforce that came out of that.

Certainly filling gaps in communication with other elements of the federal system in regards to workforce development. Working with community colleges, supporting the development of the North American Academy of Wind Energy, providing a location to collect information and the like and then of course the Wind for Schools program -- which everybody is familiar with.

Some of the accomplishments over the last year certainly the development of the strategic framework to kind of pull together both government and industry experience in regards to the workforce and that's still in draft.

The North American Academy of Wind Energy had its inaugural meeting in the summer of last year at UMass and is going forwards with a lot of great work from many different individuals but also supported by DOE in moving that forwards.

Lots of work in K-12 educational development -- including primarily with need and with kid wind. We'll have a little bit more on the wind application centers and the wind for schools and then certainly hundreds of schools out there that are part of the Wind for Schools network.

Looking at the focuses for FY '13 quickly hand it back to (Jonathan) to announce these different activities and talk about the stuff that we're doing this year that is a little bit different or expanding that we're undertaking.

(Jonathan Bartlett): Thank you, (Ian). So for workforce development folks in fiscal year 2013, you'll see the top bullet refers to a university competition. And I can say without understatement that this has been something that the Wind and Water Power Technologies Office has been extremely pleased to develop.

It will be a competition to enhance turbine performance, grow industry interest, allow students to really do some innovative work, provide access for the students to industry and hopefully inspire as many as we possibly can to choose a career in wind energy.

I'll get into some additional details about that on some of the forthcoming slides.

But we are also going to look into doing an additional round of wind application centers. The stat we have right now was install an additional 150 small wind turbines in K-12 schools.

And we may have gone over it a little quickly due to my own brushing over these stats, but one of the things that we've accomplished during the Wind for Schools effort is to install the number is over 100. We probably don't know exactly what the number is. I think we just had two commissioned last week, so we are over 100 installations during Wind for Schools K-12 efforts -- which is a great accomplishment.

There have been innumerable amount of people, students, technical assistance centers and industry involved in that effort and it goes without saying that we believe that to be a dramatic public acceptance accomplishment.

Putting up a small turbine in a community at a K-12 school allows for a great impact on public acceptance not only in terms of just being able to drive by it and see it but kids who have the opportunity to be exposed to the science and technology and the math and the renewable energy sort of concept are the natural feeders to their parents who may or may not be in favor of new forms of energy generation. And so we're very pleased with that.

One of the things we are focused on completing within the fiscal year is ensuring 100% transparency and availability of the data. And we want to - we will establish a standardized sort of common set of expectations for the wind application centers as we initiate the next round.

We'll be continuing on the water side. We have hydropower and bringing hydrokinetic fellowships and those are designed similar to Wind for Schools

to stimulate academic and career interest in hydropower and also enlarge the United States knowledge base for operating marine and hydrokinetic test centers. I'll give some details to you about those in an upcoming slide as well.

And (Ian) has already indicated we will continue to support the development of North American Academy of Wind Energy.

So as we move on to the next slide, I can provide you with some additional details about the workforce development university competition concept, and that's quite a mouthful.

I don't think - ah good. Thank you for moving that forward. I'm experiencing a small technical difficulty over here.

So the university competition as stated earlier it's to stimulate student interest, industry awareness of an elite next generation workforce and new institutions launching wind training programs and we have the North American wind energy.

So this annual university competition will promote wind and wind energy education. And for those of you who are familiar with or who have attended the Solar Decathlon, it's in that style. It'll be students competing against each other on a team-based effort in a number of wind-related events -- including enhancing and/or designing a turbine based on performance criteria and we have additional events to develop and conduct analysis and a business case.

So this addresses the workforce challenge identified in the 20% report, engage the students, showcases to innovation to industry, motivates wind career choices.

One of the things we are happiest about is we've designed a competition that is multidisciplinary in terms of academic backgrounds. My background is business. I'm both a business undergrad and a MBA. And as I attended both my undergraduate and graduate school work, one of the things both myself and my fellow students were the competition because it allowed for a bit of practical experience of what we were studying in our classes.

So we've designed the competition that will basically -- and this may be too harsh of a word -- but will force students to develop teams that incorporate engineering students, business students, finance, communication, journalism and the teams can focus on their different areas of strength if you will.

You know, one school might have a better mechanical engineering program or electrical (unintelligible), project development, public acceptance, energy storage.

And we plan to have this fund ten teams -- ten teams from ten different schools -- approximately 25,000k in funding from DOE per school. And the initial competition will take place in the spring of 2014. And we've timed this in a way that it will fall right at the end of the spring semester, so students should still be available and won't be headed off to internships.

And so this will allow them to investigate. The teams investigate and develop innovative wind energy concepts, increase their knowledge of barriers to the wind industry and experience designing, building and testing wind turbines perform according to a customized market and a data-derived business plan.

And our theme is to allow the teams to or to proscribe the teams to construct a lightweight transportable wind turbine that can be used to power a small electronic device. Imagine your iPhone, your Android, your BlackBerry.

And so each team must address this market need. They'll develop a business plan. They'll pitch it. It should be a very, very good experience for the team members and good exposure to the industry.

And as stated we intend to do ten subcontracts.

So the business plan and turbine will be evaluated against predetermined, pre-weighted criteria -- market deployment, feasibility, risk reduction, innovation, creativity, originality, the concept cost, how will they present and document what they've developed.

The wind turbines that each team builds will be tested. The prototype will be tested in a wind turbine under specific conditions -- safety, durability, reliability, performance over a period of time for predetermined wind speeds, cut in, minimum voltage requirements.

And the third stage of the competition will be a team-to-team debate and the debates will relate to the actual concept stuff -- you know, the market drivers, the issues related to the product that they have built and built a business plan and a pitch around.

So we are really looking forward to this in 2014. And that this point, I can hand things back to (Ian), so he can go through some of the additional details about how the process will be in terms of timeline.

(Ian Baring-Gould): So the - thank you, (Jonathan). The (RFP) is expected to go out within the next couple of days. And so we now it's right in front of the holidays. Certainly not the most opportune time to release an (RFP) -- especially to

university organizations just as they're either finishing off finals or headed home for the holidays.

But unfortunately they're kind of the construct of the timing of this and the delays in getting the first (RFP) out the door took much longer than we want. And if we push it back too much further, then we impact the schedule to be able to have the team starting in the fall semester next year.

But the (RFP) will go out very quickly and then we'll wait until after the holidays for people to provide questions. The proposals are due at the end of January. And then we'll review the proposals, announce them probably - or announce the (unintelligible) selects -- the ten or so teams -- the universities that will go forwards -- likely in and around wind power in that kind of timeframe.

We'll have an initial kickoff meeting in set for kind of the August and September timeframe. And then the students will get to work with the inaugural competition happening in the spring of '14 in all likelihood around the wind power conference, though that's not been finalized.

The criteria for the (RFP) what NREL and DOE will review are based on five different criteria. Of course all of these are in the (RFP), but the commitment that the university college demonstrates that they want to move forward with this the organization and project planning around the development of the team, how it's going to kind of integrate into the academics of the project or of the school to ensure that the team has the ability to actually develop a product and a team and product that will meet those three requirements.

Fundraising and team support as (Jonathan) mentioned DOE will be putting money into this but certainly there will be other activities that the universities

an colleges -- and/or colleges -- will have to put in this -- whether that's class time devoted to the development of the projects and things of that nature.

There is no defined cost share that is required under this, understanding that it takes time to actually document the cost share. And so this 25% for fundraising and team support allows the universities to indicate the type of cost share that they will provide without having it to be formal cost share.

The integration into the students' course work, we don't want this to be something that is completely independent of what the universities and colleges are doing, so how it integrates into the work that they're doing.

And then the kind of collaboration and testing, the feedback into the rules and requirements, experiences that the teams have in other competitions that they have done. Again this is the inaugural one, so we want to work very closely with the universities to develop the university wind competition so that it's successful over the long term. And so that makes the final element of the criteria.

Switching back to overall and to talk a little bit about the plans for Wind for Schools over the next year kicking it back to (Jonathan). But certainly everybody should keep their eyes out for the notice of the request for proposals because that will be coming out within the next couple of days.

(Jonathan Bartlett): Thank you, (Ian). And we are now looking at some information regarding Wind for schools. In the interests of time and in case any of the listeners have questions, I'm going to go through these a little bit more rapidly in part because I've already given you sort of overview of Wind for Schools before we even got to these slides.

So the objective of the Wind for Schools initiative was to engage college seniors and juniors in wind energy applications and education.

So we see this as sort of dual benefit. The college students get the experience of working on wind energy, learning in their classes but also practical experience of working with the K-12 schools that have wind resources available and can raise the funds to purchase and do a deployment of a small turbine on their campuses.

So the college students get practical experience. It helps them get positions in industry once they've finished their degrees. The students in the K-12 get the experience of not only fundraising but also making a dramatic change to their school campus and get exposed curriculum that is developed from the wind application centers at the schools.

So that's why we view this as a multifaceted success. There's a college impact, an industry impact, a K-12 impact and a public acceptance impact.

So going forward on to the wind application centers there's a lot of text here so let me just give you a quick overview.

It was launched 2005 with the pilot and project in Colorado and it was expanded into two phase. So we now have a total of 11 Wind for Schools wind application centers. And I've already sort of addressed why we believe that this is a positive usage of funds that we have available.

And our intention is to expand to solicitations for Round 3 in fiscal year 2013. And we'll have some additional criteria because we've learned through the process of these first two phases some things that we will modify.

But in general the program will be the same. We will select some wind application centers and work to do additional deployments at K-12 schools.

Slide 24 gives you an overview of the wind application centers, the number of installations of turbines that they have completed thus far and a general number of students impacted.

I can tell you based on attending and speaking at some of the commissionings over the past year that the number of students impacted is vast and I feel quite comfortable with this program thus far.

So the last couple things are on our water power side of the house in terms of education and outreach. We have a marine and hydrokinetic fellowship program that the water power team participates in the EERE what we're currently calling the postdoctoral research program. That program has had a number of name changes. But the purpose of it is to build the next generation of scientific leaders in energy efficiency and renewable energy.

And how we've participated in the postdoc research program is through our MOU with Ireland's equivalent to DOE we have established a fellowship for postdocs or post-master students to do research in Ireland. And the benefit is that they go to a MHK facility in Ireland. They continue some form of research that benefits the U.S. and then bring their new experience back to the U.S. industry.

So we are continuing our participation. We had one fellow, (Arie Posner), over in Ireland doing hydrodynamic modeling research at the University College Cork. We now have two slots available for the next round and I can make sure that any of you who are interested please feel free to contact me. I

can provide you with the link and it's also available within the water power Web site within EERE.

The last item that I want to touch on is the hydro research fellowship program. That is designed very similar to the postdocs but it's for graduate students and doctoral students again doing fellowships. We have a four-year \$3 million grant and it allows for a very diverse and talented pool of fellows to do research and it's across multiple universities.

And in addition the (HRF) we also have a similar program at Penn State. The Penn State program is specific to Penn State, but that (unintelligible) that you see here are very similar. The fellows get funding to complete their degrees and do research that helps stimulate the hydropower industry. And we'll be continuing support of that in some form or fashion in FY '13.

With that I believe that we are ready to open it up for questions. So thank you very much.

(Ian Baring-Gould): Yes we are. So again to remind people going back a slide here to ask questions just go up to the Q&A at the top of screen. You'll see a little thing in there that will allow you to type in your question, so go ahead and do that.

Some of the questions that we have a question for (Jonathan), "Are there any chances of new offshore wind (unintelligible) in FY '13?"

(Jonathan Bartlett): My answer to that is probably not unexpected to you. Our standard operating procedures is any sort of funding opportunity announcements will be announced through the regular official channels -- either through Energy.gov, through FedConnect.

And so if you're not already signed up for instant alerts on different criteria, I encourage you to sign up for them now.

(Ian Baring-Gould): But there's nothing that (unintelligible)...

(Jonathan Bartlett): There's nothing that I can speak to specifically at this point no.

(Ian Baring-Gould): Okay great. A question from (Heather Rhodes Weaver), "Is there expected timing for the JEDI small wind model?"

I think, (Heather), this is what you're referring. We've for the last number of years we've been developing a JEDI model specifically for offshore wind - or sorry for small wind. We have models for large wind. We just developed a model for offshore wind and we have a model under development for small wind.

We expect that to be out very soon and we're certainly looking for industry members within the small wind community wind space to provide us data.

That's one of the biggest issues. We can develop a model that's pretty straightforward, but to be able to populate it with that data so it's really useable is certainly a key question.

And so we're hoping to get that -- the model itself -- out very soon within the next year and then again looking for anybody who is willing to help us on the data.

A question for, (Jonathan), from (Bonnie Ram), "So there are two (RFPs) -- one for the school competition and one for the regional resource centers?" Do you want to answer that, (Jonathan), or I can.

(Jonathan Bartlett): Yes the university competition (RFP) will be hitting the street as (Ian) said within days. And it does not deal with the regional resources centers. That is correct. Assuming we go the route of soliciting for proposals, that would be a separate (RFP).

(Ian Baring-Gould): Yes and so we have a separate (RFP) for the regional resource centers and then there's actually what we're planning on for a third one -- which would be...

(Jonathan Bartlett): The wind application centers.

(Ian Baring-Gould): ...for the wind application centers. So this year you should see three (RFPs) coming out of the program hitting those three different areas.

A question for (Jonathan), "Has the grant-funded report on barriers to wind energy in the Mid-Atlantic been released yet? If so, is there a Web link? If not, when will it become available?"

I'm not sure exactly which report (Debra) is referring to. Is there one that was done under the offshore wind development, (Jonathan)?

(Jonathan Bartlett): Not that I'm aware of, so I will need to - I would need additional information as to which report she believes to be referring to.

(Ian Baring-Gould): We did develop reports based on a number of barrier meetings we had about two years ago. The drafts of those reports were made available and the final summary report that includes all of the regions will be coming out very soon. We're actually planning that to come out before the (RFP) for the

regional resource centers so that it can be used as a source of information for that.

A question for you, (Jonathan), from (Jeremy Firststone), “Why are the fellowships intended to marine renewables and do not include offshore wind power?” Can you refer to that?

(Jonathan Bartlett): Okay in particular because this was a water power-focused actually for the postdoctoral research. However in the future one of the things that we are looking closely at is also providing funds for offshore wind postdoctoral research. So that is something to watch for.

What we intend and will do is provide links to the postdoctoral research awards like notification and application. But for this coming year, it’s our funding is specific to MHK, but that is something we’re considering for future years -- the offshore wind.

(Ian Baring-Gould): Okay great. Another question for you, (Jonathan), from (Peter Bromley), “TV public service announcements useful and/or cost effective as average tools and would they be within DOE’s mandate?”

(Jonathan Bartlett): The PSA, there are some existing PSAs that the Office of EERE call it if you will the front office has developed. We do believe that they are effective - - especially when they take off and become viral.

As a resident of the District of Columbia, I have actually seen some of the advertisements in bus stands. But within the individual technology offices we’re not working on specific PSAs. But we do work with our communications and outreach office for EERE as they develop them.

(Ian Baring-Gould): Great. Thank you, (Jonathan). A question here on, “Where will (RFPs) for the National Wind Collegiate Competition be posted?”

It will be posted in a number of locations -- both on the DOE Wind and Water Office website, on NREL’s Wind Powering America website. There will be news releases that are going out to a number of different locations and press releases, so it will get out hopefully widely. We’ll also be sending it out to a bunch of listservs -- including in the one for the Wind Powering America listserv.

So hopefully you’ll get it relatively quickly about the when it comes out. But certainly expect it within the next couple of days.

Let’s see, a question for (Jonathan) following up from (Heather Rhodes Weaver), “You mention wanting to avoid bad projects. Could you explain what makes a project good or bad?”

(Jonathan Bartlett): Thank you, (Heather). I could say they’ve kind of opened the door for that.

I guess it would be I wouldn’t put a strict definition on this. But if there is not wind resource available or if the project design in itself is faulty or if, you know, false expectations are made in terms of the economic impact to a region or a locality, we would prefer that projects that are developed and deployed have resources available so the turbines will actually spin and that appropriate sets of expectations for what the job and economic impact and the generation will be from a project.

Because the industry as a whole loses out if a project promises the Earth, the sun, the stars and the moon and can’t deliver. It just it only creates a negative

impression of the technology. So that's my general definition of what a bad project would be.

(Ian Baring-Gould): Great thank you. From (Simon), "How much funding is available for the (RFPs) and when is it anticipated for the (RFPs) to be due?"

We haven't quite finalized the exact amount, but we're thinking in the couple of hundred thousands dollars a year per RRC. We're expecting that the (RFPs) will go out in the next quarter, so kind of in the February timeframe we're thinking -- depending on how it all comes together.

And then we'll previewed a fair amount of time for the proposals to come together. We know that this is going to be a complicated process. A regional center has to be able to really show linkages to the state wind working groups and demonstrate that it's tackling regional problems. And so we don't expect a quick turnaround in regards to those -- the proposals for that one.

So my bet is kind of the April-May timeframe, but that's just kind of a shot in the dark at this point in time.

One last question and I can kick this to (Jonathan) or I could provide an answer, "Will the future of the production tax credits affect your activities either way? Will it impact how you conduct outreach?"

(Jonathan Bartlett): You know, I guess I'll take the first crack at that and then I'll let you follow up, (Ian), should you desire.

But, you know, the way we look at things within the program or now the technology office -- Wind and Water Power Technology Office -- our name shifted as well -- is regardless of if there is a PTC available or not, there is a

role for a program in driving the technology forward and reducing the levelized cost of energy and trying to mitigate the barriers for deployment of the technology.

If the PTC were to go away permanently, it makes our role even you can argue a more dramatic need for the industry to continue developing. So I don't think it would. At this point no it would not shift our activities.

I mean while we feel that we have accomplished many things during the years of our existence, there are still some outstanding goals that we have for the program and for the industry.

(Ian Baring-Gould): And this is (Ian). The follow up that I would do is that it certainly changes the message that we were trying to provide and different focuses. I mean for with the PTC in place there are a lot of areas of the country where wind is cost effective on a kilowatt hour basis compared to competing technologies.

With the PTC not in place, it certainly raises the cost of wind and therefore you have to do other - you kind of have to focus on the other activities - variable price of natural gas, the impacts on community development, local energy production. So it certainly changes some of the messaging around the impacts and the benefits of wind technology. But I don't think it changes structurally as (Jonathan) was saying the work that we do and the different approaches we do to get that information out.

One last question again from (Simon) and then we're a little bit over the hour, so we'll close off. "Is it anticipated that Wind Powering America will not the (RFPs) to focus on onshore or offshore wind?" (Jonathan), do you want to take that or I'm happy to?

(Jonathan Bartlett): I'm sorry. Could you repeat that, (Ian)?

(Ian Baring-Gould): Yes. "Is it anticipated that the regional resources centers will focus on onshore and offshore wind?"

(Jonathan Bartlett): Well yes. I mean as appropriate. If we end up with a region that's completely landlocked and no offshore wind resources, it wouldn't.

But based on our general anticipation of regions, we envision a split. It could end up being that, you know, some of RRCs are 70% offshore wind outreach and education focused or technical assistance focused and 30% land based.

But we do envision a blend because the RRCs are going to be basically the focused voice of our national-level initiatives and then the regional voice for the specific barriers within each RRC.

(Ian Baring-Gould): Great. Thank you, (Jonathan).

So just in wrapping up here, thank you all for being here. We will have a webinar in January. Again they're always the third Wednesday of the month at 3 o'clock Eastern.

The next one is on WPA economic development activities and so it's going to focus on a number of different things. The first one being the workforce analysis that I mentioned at the top of this that (Suzanne Tegen) is working on. (Ryan Wiser) is going to talk about updates on the economic impacts of wind and then probably (Eric Lantz) talking about some recent work that they've done looking at jobs and job values within wind development. So that's the webinar for January.

It's still tentative at this point, but I think February will either offshore wind development -- an update on offshore wind now that the (unintelligible) out -- or on wind turbine manufacturing as a second one.

But we'll keep you posted in the e-newsletter and things of that nature.

All of the webinars -- including this one -- are posted on the WindPoweringAmerica.gov Web site typically about seven business days after the webinar is released. But because of the holidays, it might be after the new year that we see that one.

And then last but not least, clearly thanks to the Department of Energy and (Jonathan) for supporting this activity. And our contacts are there if you have any kind of follow on questions that we didn't get to or recommendations for future webinars, things that you would like to see, please don't hesitate to contact anyone of us.

So with all of that, thank you all. Have a wonderful holiday. Be sure contact and reach out if there's anything we can do for you. But if not, enjoy your family and we'll talk to you in the new year. Thanks again and have a good day.

(Jonathan Bartlett): Thanks everyone. Have a happy holidays.