

September 2018 Annex IV Analyst Meeting

1500 GMT Meeting Attendees:	0000 GMT Meeting Attendees:
Jan Sundberg (Sweden)*	Daisuke Kitazawa (Japan)*
Nolwenn Quillien (France)*	Takero Yashido (Japan)
Teresa Simas (Portugal)*	Ou Ling (China)
Juan Bald (Spain)*	Mark Hemer (Australia)*
Melissa Oldreive (Canada)	Andrea Copping (US – PNNL)*
Andrea Copping (US – PNNL)*	Alicia Gorton (US – PNNL)
Mikaela Freeman (US – PNNL)	
Amy Woodbury (US – PNNL)	
Samantha Eaves (US – DOE)	
Heather Sagar (US – NOAA)	

*Country analysts

Andrea presented slides (attached):

- New Annex IV Nations
- Updated Annex IV pages
- Data Transferability Process
- Social and Economic Data in Consenting
- Plans for Next Year
- Annex IV Ambassador Activities
- Roundtable

New Annex IV Nations

We have added India, France and Australia.

Updated Annex IV Pages

Mark – I have a question about the membership page on the Annex IV site. Is it just the OES login or a separate login?

Andrea – We will get you a login, let us know if there are others who you'd like to have access

Data Transferability Process

*Please read the Data Transferability Report documents (sent via email)

Heather – The information was really helpful

Mark – Question about the BMPs. How far down the path of standardization will this go?

Andrea – We've stayed away from that word. There is a push for standards in this industry, though. We just aren't there yet with environmental work, and we may never be. We substituted the BMPs as the half way point.

Mark – I'm interested in how well you've mapped out the regulators in the US and if that would be useful. We've gone through this a little in Australia.

Andrea – Yes, we have a list of about 200 regulators. We found that we have some regulators at the federal level who have clear jurisdictions over laws. At the individual coastal state level, many regulators are responsible for a wide range of regulations. Mikaela looked at webpages for each state to find contacts. We've tended to be inclusive. Of the 200, we don't hear from all of them. But it's a good way to cast a big net. We will share the list. We encourage regulators to reach out to colleagues and provide contacts. When we held online meetings, we reached out to one or two and they gathered more colleagues together, which was helpful.

Andrea – AWTEC will be in Australia next year.

Mark – I think it's October.

Andrea – Let us know what Annex IV can do.

Social and Economic Data in Consenting

Plans for Next Year

Thoughts on convening the virtual group

Sam – Question, I would think you would be targeting the international regulatory community as well the research community? If there are going to be any language barriers?

Andrea – Following up on the second question: great point about language barriers and we will need to think about that. I think we will send out a short set of questions on this to the Annex IV analyst list on the whole idea.

Conferences

Andrea – We will ask for some specifics for workshop ideas for EWTEC

2020 State of the Science

Teresa – I think it is a good idea to have these topics in the SoS, but I believe that the risks that we need to choose towards retirement need to have some support...at least to my knowledge and the experience we have in Portugal these two effects (underwater noise and EMF) are still very present in environmental licenses and there are lots of unknowns and uncertainties. I don't think it is reasonable to retire risks without having data behind that decision. I don't know if we can do that at this time.

Andrea – Fair enough and you're right, we still don't have all the answers and I'm not implying that we do. I'm thinking we may be able to design a process for putting the risks in proportion and having requests for data in proportion, rather than saying the risk is not valid. On EMF I think we are getting fairly close in the US to retiring this risk, based on some studies that have been done, but I do know this issue is getting to be hot in the UK so we need to make sure to look everywhere.

Teresa – Underwater noise and EMF are two of the risks that were identified in the previous SoS version as two effects that we need to concentrate our research on. Going from that to retiring is a big step

Juan – I agree with Teresa, these are still hot topics here and when we want to proceed with consenting. Marine spatial planning is important in consenting. Maybe we can survey the country analysts to see what topics we could include in the new SoS report...?

Andrea – Great idea, I welcome those ideas and your work on them. Marine spatial planning is important. An update on where we are, especially with new Annex IV nations, would be good. Let's see how we can deal with interactions proportionally during consenting processes. I welcome any feedback, thoughts, etc. We will start to draft a preliminary outline and that may be more useful for people to comment on.

Mark – (phone cut out)... marine spatial planning and cumulative risk....

Andrea – Let's put together some thoughts. If you have an approach that would be great. We have very poor tools for evaluating cumulative risks (or effects), but it should be addressed.

Annex IV Ambassador Activities

Everyone should visit the page on the google drive (from Annex IV members' page) to fill in his/her country contributions.

Roundtable

France

Nolwenn – in France we consider offshore wind part of MRE – tidal, wave, offshore wind. We work on the direct and indirect impact of cables on benthic communities. We have also been looking at trophic communities and the impact of offshore wind farms. Working on modeling and now including humans and socio-economic impacts. At France Energies Marine I'm working mostly on biofouling and biocolonization processes.

Portugal

Teresa – Some news about the project we submitted for the study of environmental impacts of MRE specifically ocean energy: the project was approved and Juan is the coordinator. I think it is one of the few projects that has already been approved to specifically study environmental impacts of MRE

Spain

Juan – We are currently in the administrative process of signing contracts. One of the few projects that has been approved for these issues of environmental impacts, working with WavEc and other partners. We hope to sign the contract this month and start the project next month. We hope to have environmental data and marine spatial planning and siting tools, and produce good information.

Australia

Mark – Our efforts are around MRE activities in Australia and environmental effects work. The largest activity is the wave energy research center. We are deploying a single 1 MW device. There is lots of work around resource characterization and effects. Some device hydrodynamic work. There is another wave

energy project - OWC device proposed. There are really no environmental effects components and not much baseline data collection for environmental effects.

Japan

Daisuke – Our regulator conference was cancelled and we need to look for another way to give the regulator survey. IHI will proceed with the ocean turbine project. There are several WEC projects. Sizes are smaller than 100 kW. They are in the development stage, not commercial.

China

Ling - I am not sure I can give you the emails of regulators, but I can share results. If I can get emails of everyone, I can send them. I am not sure of the results now. I must discuss with our group. I can give results by email later for the survey. I would love to take part in the 2020 State of the Science, but I am not sure what we can do now but we can discuss later. We have translated Annex IV materials and would like you to write us a permission to translate the white paper.

United States

Andrea – I just got back from AWTEC in Taipei and I think it was a good opportunity. I presented a paper on data transferability and we also had an additional presentation on the SoS report. We had good audiences, good feedback, and good discussions. In Asia there is a lot of appetite for MRE development, especially some of the smaller devices (less energetic tidal and wave) as there are many areas without sufficient power but where these smaller devices could help. Many of the governments want to learn about environmental effects before they get too far into their development.

There was lots of talk about Open Hydro going out of operation. There is an open hydro device in the Bay of Fundy and EMEC. It is not clear who will be responsible for removing there devices when the time comes.

Additional Comments

Andrea – We will get emails out to everyone with some structured questions about upcoming conferences/workshops.

Andrea – The slides and notes will be posted on the Annex IV members' page.

Mark – What is the potential damage being done to the industry related to the OpenHydro shut down? Has that come up? How will the devices be decommissioned?