EPPR Working Group Meeting

Final Report



Whitehorse, Yukon Canada June 15-16, 2011

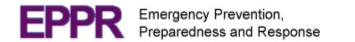
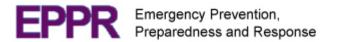


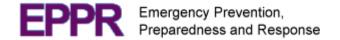
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1. Calling meeting to order

The 2011 EPPR working Group Meeting was hosted by Canada in Whitehorse, Yukon Territory. Ms. Ann Heinrich, EPPR Chair, opened the meeting on June 15, 2011, and thanked Canada for hosting the meeting and for all the preparations to ensure a successful meeting. Ms. Heinrich thanked all for their participation.

2. Welcome by Canadian Hosts

George McCormick, Head of Delegation for Canada, welcomed everyone to the Yukon, and mentioned that Whitehorse is in the traditional territory of the Kwanlin Dun First Nation and the Ta'an Kwach'an Council. He thanked Jenny Trapnell and the Government of Yukon for its support for the meeting. The group then received a welcome and comments from Grand Chief Ruth Massie of the Council of Yukon First Nations. Grand Chief Massie thanked Ambassadors Balton and Vasiliev for the interventions made at the Nuuk Ministerial. She also noted that one of the most significant parts of the meeting would be the discussion of the oil spill preparedness and response task force and that indigenous people would be interested in the outcomes of the discussion and will be participating in task force deliberations.



3.1. Introductions

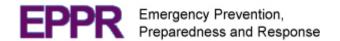
Delegation members from Canada, Denmark, Finland, Norway, the Russian Federation, the United States, Permanent Participants, and Observers introduced themselves to the group. Pia Övelius is the newest Head of Delegation representing Sweden and Nils Westergaard was the Head of Delegation for Denmark/Greenland. Please see Annex 1 for a list of participants.

3.2. Approval of Agenda

The EPPR Chair requested some amendments to the Agenda of the meeting to accommodate availability of speakers. The meeting participants accepted the amended Agenda. Please see Annex 2 for the timed agenda.

4. Outcomes from the 2011 Arctic Council Ministerial meeting

The EPPR Chair reported on the Meeting of the 2011 Arctic Council Ministerial which was convened in Nuuk, Greenland on May 12, 2011. The Chair noted the Arctic Council's concern with the



increase of cruise ship incidents in the Arctic and highlighted some of the issues raised by the nations. Sweden mentioned managing the Arctic; Norway discussed the political challenge of coping with Arctic activities and climate change adaptation; Russia announced Project Support Instrument (PSI) funding of 11 million; the Aleut International Association (AIA) noted the Arctic Council is the only place Permanent Participants have a voice separate from the nations. The Chair noted that the Ministers welcomed the Behaviour of Oil and other Hazardous and Noxious Substances Spilled in Arctic Waters (BoHaSA report) as well as the reports which EPPR prepared on the radiological collaboration prevention and preparedness collaboration between the United States and the Russian Federation: The Source Control Project - 10 years of Cooperation 2000-2010 (2011) and10 years of Exercises (2011). EPPR's upcoming activities and 2011-2013 Work Plan were included in the report to Senior Arctic Officials which was presented to the Nuuk Ministerial. Please see EPPR's 2011-2013 Work Plan at Annex 3. The execution of the Arctic-wide Search and Rescue (SAR) agreement was one outcome from the Nuuk Ministerial that will be relevant to the work of EPPR, as it will likely serve as a model for the oil spill preparedness and response instrument which a newly formed Task Force is tasked with negotiating. See Nuuk Ministerial Declarations at Annex 8.

4.1. Swedish Chairmanship Programme

Pia Övelius, Head of Delegation for Sweden, provided comments on the priorities of the Swedish Chairmanship of the Arctic Council. Ms. Övelius briefed EPPR on plans for the Swedish Chairmanship Program which will include land, sea, and human components. Establishment of AC Permanent Secretariat would take place during the Swedish Chairmanship along with other measures that will strengthen the Council. The Swedish Chairmanship will also implement a communications plan to increase the Arctic Council's visibility, enabling it to keep up with the increased demands for information, and to continue the work of the joint umbrella program with the Nordic States.

4.2. Search and Rescue Agreement

Ambassadors Balton, Eriksson, and Vasiliev provided comments on their observations of the Nuuk Ministerial. Ambassador Vasiliev mentioned that the SAR agreement is a landmark of AC cooperation, with broader consequences for EPPR, such as the establishment of the Oil Spill Preparedness and Response Task Force, and the mandate for EPPR to lead development of prevention guidelines or best practices. Ambassador Balton mentioned that it seems that the Arctic Council is becoming a stronger body based on the groundbreaking work embodied by the successful conclusion of the SAR agreement. Ambassador Eriksson mentioned that the great media interest generated indicated the future attention that the work of the Council will draw results in increased pressure to deliver on what was said in Nuuk.

Ambassador Balton noted that a lot of work done on the SAR task force is relevant to EPPR and the current task force. He stated that it was an honor for him to co chair the SAR Task Force with Ambassador Vasiliev of the Russian Federation. Ambassador Balton recalled that the group met 5 times to achieve a legally binding agreement. The SAR TF was not drawing on a blank slate; in fact they considered Annex 12 to Chicago convention—which was an example of all eight Arctic nations bound by

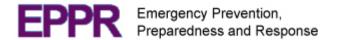


a multilateral agreement. One task of the TF was to look at the patchwork of existing agreements and to determine what the Arctic needed. One of the key decisions involved defining the geographic confines of the agreement and how to apportion applicability of the agreement. Eight areas of application were negotiated with designated boundaries delineating the geographic area for purposes of taking the lead during a SAR event, including how far south each country was willing for the agreement to apply.

Outside of the eight areas, the agreement calls for cooperation of other parties as they have resources to do so. The SAR agreement requires that nations conduct training and engage in a review process to see how the agreement is being implemented. After some consideration the countries decided to make the agreement legally binding based on the recommendation of the task force. Similar consideration will be given to the current task force. Overall the task force was characterized by high degree of collaboration and good will; it was a learning experience to listen to one another. Though differences arose along the way, eventually the group came to solutions everyone accepted. The agreement was signed in French, Russian, and English and entry into force is pending. Canada is acting as the agreement's depository, and has begun implementing activities, agreeing to organize a table top exercise to test scenarios. Ambassador Vasiliev agreed that the signing of the agreement was a very historic point in Arctic cooperation. Countries are working to bring the agreement into force; Russia has already concluded this process, and calls all other Arctic Council member nations to do the same. The next step is to ensure the agreement is implemented. Ambassador Vasiliev also thanked Canada for beginning implementation activities, as this will lead to serious and concrete forms of cooperation, which form the essence of the agreement.

According to Ambassador Vasiliev, the logic and experience from the SAR agreement process can be brought to bear on the TF to address oil spills. The subject may be more complicated, but time can be saved by considering the proposal to apply the same SAR geographic zones to the oil spill agreement, as this was the subject that took up the most time during the SAR TF. He noted that this task force would be characterized by the same level of responsibility and collaboration and based on the same principle—consensus. Every nation's input would be safely protected by this principle. The Russian Federation looks forward to this process and the work ahead.

The floor was opened to other participants who attended the meeting. Cindy Dickson noted that during the landmark SAR agreement the Arctic Athabaskan Council worked closely with colleagues around the table. She also highlighted the importance of understanding the effects human activities have on animals, birds, and all people—and that not just those living along the Coast, and the need of TF negotiators to be aware of this. Mr. Joe Linklater from the Gwich'in Council International (GCI) also stated that for Indigenous people in the Arctic it is important to hear from the states and that the people are an important aspect of the work being done in the Arctic Council. With regard to EPPRspecific work, the focus is not on the impact of human activity on migratory species. We can see that the shoreline and migratory species that share the environmental and ecosystems don't follow national borders or the guidelines of EPPR. Indigenous culture, cultural identity, and spirituality are connected to fish, wildlife, and nature. GCI is interested in the work of EPPR from the aspect of aboriginal human rights—protecting the right to continue traditional subsistence hunting and fishing. In closing he noted that he was looking forward to hearing more from the working group.



4.3. Follow up activities to the BoHaSA report

Ole Kristian Bjerkemo, Head of Delegation of Norway, and responsible for delivering the report at the Nuuk Ministerial, stated that the Ministers are interested in development of follow-up activities for the BoHaSA. The report was distributed during the International Oil Spill Conference. Outreach for the report continued at conferences held at the International Maritime Organization's Oil Pollution Preparedness, Response, and Co-operation convention technical group and in other fora to garner support for follow-up activities. He reported that people in the maritime response community have noted the report and the importance of international cooperation in producing such reports.

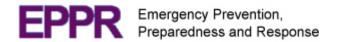
Mr. Bjerkemo added that response to Hazardous and Noxious Substance (HNS) spills is a major challenge, illustrating his remark by showing slides and recounting a recent HNS incident within Norwegian waters. This led to a discussion of whether response to HNS should be addressed by the oil spill response task force or whether it should be considered for discussion by the group focused on prevention.

Regarding the BoHaSA report recommendations it was noted that the work being done to update/address the AMSA report could cover some of the oil-spill related activities that the BoHaSA recommendations identify. Additionally, EPPR or member states may look into cooperation with the oil industry for future oil spill response research and development efforts. This could be in the form of new joint industry projects (JIP) that will involve governmental bodies. Topics for follow-up may include report recommendations on burning, dispersants, and other measures. Mr. Bjerkemo recognized that EPPR should take note of activities of the other AC Working Groups in these areas. Mr. Bjerkemo indicated that Norway will investigate the possibilities to fund an HNS project and suggested that EPPR come up with some project proposals in this area.

Mr. Robert Pond agreed that BoHaSA represented a good baseline effort and that R&D cooperation and HNS were appropriate subjects to include in the overall oil spill agreement. He also noted that there is potential for engagement with private sector, as a JIP Task Force is looking into these issues. He encouraged EPPR to think of ways of involving industry on some useful projects *e.g.*, natural gas pipelines. Igor Veselov also agreed that HNS could be added to new oil spill preparedness and response TF negotiations.

A Canadian delegate reported that the government is working with industry to identify research gaps and priorities so as to avoid duplication of efforts, address key gaps, and add a government research perspective. Sweden has initiated closer cooperation with other countries under the Bonn agreement. The United States will follow-up with the University of Alaska as it develops an Arctic Science & Technology Center to request that it add HNS to its planned program of activities.

Conclusion: Participants decided that the Oil Spill Preparedness and Response Task Force should consider whether to include HNS within the scope of its work. If accepted as an EPPR project, the In Situ Burning guidelines will be a follow-up project for EPPR (see item 14). EPPR should coordinate with industry through Joint Industry Partnership projects that are relevant to HNS and oil spills. EPPR will send a letter to other AC WGs requesting that they address pertinent BoHaSA report recommendations. Finally,



member countries will consider recommendations and develop project proposals for the fall EPPR meeting.

5. The Nuuk Ministerial Mandates - Plenary Discussion Part I: Task Force to Develop an Instrument on Arctic Marine Oil Pollution Preparedness and Response¹

Mr. Robert Pond of the U.S. and Ms. Chantal Guenette facilitated the discussion. Mr. Pond noted that at the last EPPR meeting in November 2010, the United States presented a project concept proposal for EPPR to undertake development of an Arctic Response Cooperation MOU, and during the course of discussions participants agreed on the importance of international stakeholder planning and coordination to ensure maximum resource availability during a catastrophic oil spill or hazardous substance event. The inefficiencies highlighted during the process of coordinating requests for assistance during the Deepwater Horizon explosion and oil spill informed the original EPPR project proposal. During the SAO vetting process the proposal was elevated from an EPPR Working Group concept to a declaration by the Arctic Council Ministers establishing a Task Force (TF) to negotiate an Arctic wide instrument on Oil Spill Preparedness and Response.

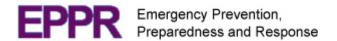
Mr. Pond deferred to the Ambassadors from Sweden, the United States, and Russia for some initial comments. Ms. Guenette noted that EPPR was fortunate to have Ambassadors who will be involved in the TF to hear what EPPR has to offer in terms of expertise, information, and past and current projects. The group would also gain a better understanding and appreciation of the task force and its concerns, interests, and how EPPR could contribute to the TF's work. She welcomed the Minister's suggestions ideas for EPPR to consider.

Ambassador Balton presented a series of substantive and procedural questions for consideration by participants and their respective governments.

Substantive questions:

- 1. Which of the existing oil spill instruments should serve as a model of what we want to do in the Arctic? For example, the 1990 International Convention on Oil Spill Pollution Preparedness and Response Cooperation (OPRC 1990) bilateral and other multilateral agreements; the Baltic Sea Convention; the Joint Marine Contingency plan (US-Canada 2003); the new US and Russia response cooperation instrument which the U.S. and Russia are negotiating; the 1983 Cooperation on Pollution in the North Sea by oil and other harmful substances, which was renegotiated in 2001. Related questions are: a) What do we do with these? b) What are the elements of the instrument we are to develop?
- 2. What are the sources of oil spills that this instrument/agreement will cover? i.e. shipping/oil drill platforms/pipelines

¹ Among other things, EPPR participants considered the following background information during this discussion: the address by the Premier of Greenland, Mr. Kuupik Kleist, and a concept paper on development of an inter-national offshore oil pollution liability regime and compensation fund provided by the Government of Greenland. Participants also considered the discussion paper developed by the co-leaders of the plenary session. See Annex 7.



- 3. What is the geographic scope we would like to cover?
- 4. How far south should the scope of the instrument extend?
- 5. Should the instrument cover marine areas only; or land areas as well?
- 6. Should the instrument address highly noxious substances as was suggested earlier to follow-up on the BoHaSA report?
- 7. Should the scope include a liability and compensation element as suggested by Greenland at the Nuuk Ministerial?
- 8. Should the instrument address commitments to future projects or to research and development?
- 9. Most importantly, should the instrument be legally binding or non-binding?
- 10. Is there a bright line dividing the TF's work on a marine preparedness and response instrument from EPPR's concurrent work on the prevention of marine oil pollution? If so, what is it?

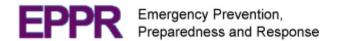
Procedural questions:

- 1. How should the TF and EPPR structure their work to maximize existing expertise and other resources, since it is likely some of the same people will be involved in both?
- 2. When should the first meeting be scheduled?
- 3. Is it helpful to begin the work with a paper outlining the elements of the agreement? If so, who should draft it?
- 4. Who should participate in the work of the TF? Since rescue operations are an inherently governmental function, only government representatives were involved in the negotiation of the SAR agreement. Since oil spill response has wide-ranging impact on communities and the environment, and preparedness and response are inescapably linked to industry, a real question on the minds of the Arctic Council TF is whether the TF will need input from civil society and if so how to provide for that in a meaningful way.

Ambassador Balton asked the group to consider these threshold questions and asked if Ambassador Vasiliev had some ideas he would like to share.

Ambassador Vasiliev thanked EPPR for the invitation to discuss the TF's work. Following the Nuuk Ministerial, he had immediately started thinking about the start of the process and realized that the discussion would need to occur at this EPPR meeting. Although he personally thinks the TF will reach a successful conclusion, he understands that it is a more complicated endeavor than SAR, thus seeking input from EPPR is important. However, it will be up to the TF to ultimately determine how to proceed.

By way of background, Ambassador Vasiliev reported on the results of the Russian interagency meetings conducted after the Nuuk Ministerial. The Russian perspective sees the work as built on the SAR TF experience with full-fledged intergovernmental negotiations. Each country will appoint someone to lead the delegation of relevant government agencies and selected outside participants, who will speak with one voice. The Russian delegation will include industry planning to conduct oil exploration on



the RF's continental shelf. Each Arctic country should provide presentations on current national plans for oil spill preparedness and response, the risks, organizational response structure and organization, etc. in order to develop a common factual basis for identifying existing problems and inform the negotiations. The TF must synthesize common denominators to reach consensus. He agreed with Ambassador Balton's point that there is a need to bring oil producing companies to the table; the presence of the companies with plans on extraction and exploration makes sense.

Ambassador Vasiliev noted the importance of agreement on how to proceed, suggesting the use the SAR negotiation experience and the same model of scheduling five meetings lasting 2-3 days as basis for discussion. During the SAR negotiation the U.S. produced the first draft of a non-binding MOU; this was a good process for the start of discussions which eventually led to the negotiation of a binding agreement. Ambassador Vasiliev noted that the earlier the TF reached consensus on the approach, the better the process would be.

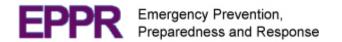
The US paper which accompanied the proposal for the Oil Spill Preparedness and Response Task Force provides a useful starting point for consideration. Ambassador Vasiliev and Ambassador Erikkson agreed with using Ambassador Balton's questions as the starting point for discussion. Ambassador Vasiliev added that the existence of other agreements, such as the regional agreements on oil spills based on OPRC in the Baltic and Caspian Seas, makes the TF better equipped to tackle the gaps. He asked EPPR to consider:

- 1. What is the delta or value-added that the TF can bring;
- 2. Is there a bright line or benchmark spill size which should define when the agreement is to apply? If so, what size spill would initiate application of the agreement?
- 3. What conditions constitute a threat to the environment such that the agreement applies? Should this threat or benchmark be measurable or quantifiable? Ambassador Vasiliev suggested that each TF member be aware of the contents of previously signed agreements so as not to waste time and effort. The TF is a relatively simpler issue if we build on SAR experience.

Ambassador Vasiliev stated that the larger question is how EPPR will work to fulfill its mandate on prevention. He suggested that EPPR establish an expert group with a lead to coordinate information to be shared with the TF. Perhaps, EPPR could have an expert group on prevention of oil spills that meets back to back during the same week as the TF, working in tandem with the TF so that there is parallel production and coordination of the final or preliminary products toward the 2013 target date. Aligning the two processes will bring some necessary synergies, and will result in two separate sets of experts who work on the task force and the prevention deliverable within EPPR.

The timing of the next EPPR meeting should be considered so that the TF can have its first working meeting sooner and the EPPR meetings coincide with the TF meeting to reduce the impact of resources.

Ambassador Eriksson agreed that there should be a parallel process between EPPR and the TF, and that a crucial aspect was to deal with prevention and response aspects of the mandate in tandem to ease communications and information about these subjects. He advocated for getting the process started early and offered Sweden as the host of one of the meetings. Advising that he sees the merit of



a legally binding agreement, he asked countries to take a serious look at the issue. He suggested that the existing U.S. issue overview paper which accompanied the proposal the SAOs sent to the Ministers was a good first outline from which to start discussions.

Mr. Pond thanked the Ambassadors for their comments and opened the floor for comments. The following is a summary of discussion highlights:

- In response to a question from Mr. Bjerkemo of Norway, the sense of the meeting was that while the TF will primarily be concerned with preparedness and response issues to be negotiated, there may be some overlap with EPPR's mandate on prevention, thus close coordination of the work is essential.
- Greenland stated that Arctic Council countries would benefit from joint reflection and
 consideration of its proposal to make a liability compensation regime applicable to the
 Arctic. One of the issues is transboundary spills and the leverage that nations have once
 a spill occurs, however the various delegations had differing views of the need for such a
 regime. One important point is that the Convention on Civil Liability only applies to
 shipping. Canada is a member of the Convention, but it also has a separate domestic
 regime for oil rigs and platforms.
- Post the Exxon Valdez spill, oil companies largely abandoned oil spill research and development in the last 20 years, however in the aftermath of Deepwater Horizon, the oil companies' interest in reviving research may present opportunities that are relevant to EPPR's work.
- On the issue of whether to address spills on land in addition to marine spills, Canada noted that the techniques and experience in spills are similar.
- Volume of the spill may not be the only determining factor in triggering the need to cooperate on response the type of spill; the characteristics of the areas threatened by the spill; the lack of response resources, and other factors may need to be considered, thus flexibility is needed.
- Permanent participants will play a more significant role in this TF because SAR is chiefly
 a governmental function. Chief interest is on prevention, to keep the emergency from
 occurring in the first place, thus EPPR's work on this subject will be very important.
- Permanent participants will be invited to participate in the negotiations, but it will be an intergovernmental agreement.
- One role for EPPR is to bring institutional memory to the work of the TF.
- TF will consider the model to be follow to prescribe the extent of participation by nongovernmental stakeholders in the negotiations.
- Both the TF and EPPR must focus on identifying how much can reasonably be accomplished by 2013.

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- The TF needs to consider existing agreements and the impact that the new agreement
 may have on existing cooperative relationships and activities, as a lot has been gained
 over the years which should be preserved.
- Issues to consider and prioritize include: delivery of response resources (people and equipment) into a spill area; processes for facilitating mutual assistance; the role of industry; how to tackle the lack of infrastructure of in the Arctic; identifying risk; tradeoff between preparedness and response; tailored response priorities to address sensitive areas.

The next steps agreed upon by participants are that, because of its close connection to the work of the TF, EPPR will support the OSPR TF by establishing a Preparedness and Response Expert Group and, whenever possible, convene its meetings in conjunction with the TF. US will take the lead in producing preliminary draft document or outline that will serve as the basis of discussions during the first Task Force meeting.

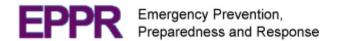
Conclusion: The United States and Canada will co-chair EPPR's Preparedness and Response Expert Group to support the Oil Spill Preparedness and Response Task Force. EPPR meetings will coincide with those of the OSPR TF whenever possible. The US and Canada will also draft a concept paper for consideration by EPPR to establish a correspondence group to focus on some of the practical details that would support negotiations of the Arctic wide Instrument on Oil Spill Preparedness and Response. This expert group would focus specifically on identifying types, quantities and locations of equipment available throughout the Arctic; ensuring that a common lexicon is used in describing the equipment; developing guidance to identify, mobilize and deploy equipment between countries including documentation; and funding and facilitating customs and trade obstacles. Points of Contact for the Response work are Chantal Guenette and Bob Pond.

6. Update on Current Projects

6.1. Arctic Region Oil Spill Response Resource and Logistics Guide - Discussion and Demonstration

Dr. Amy Merten provided an update on the Arctic Region Oil Spill Response and Logistic Guide, an EPPR Pilot Project which Canada and the U.S. co-chair The U.S.-Canada project team is considering the Environmental Response Management Application (ERMA)² as the web-based platform upon which

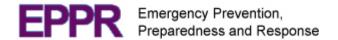
² ERMA® is a web-based Geographic Information System (GIS) tool designed to assist both emergency responders and environmental resource managers who deal with incidents that may adversely impact the environment. The application can assist in response planning and is accessible to both the command post and to assets in the field during an actual response incident, such as an oil spill or hurricane. The data within ERMA also assist in resource management decisions regarding hazardous waste site evaluations and restoration planning. ERMA supports environmental preparedness, response, and recovery efforts by: 1) Providing integrated and timely information to improve decision-making; 2) Integrating and synthesizing various types of information on a single map interface; 3) Providing fast visualization of current information; and 4) Improving communication and coordination among responders and stakeholders.



to build a comprehensive, Arctic-wide electronic data base of, among other things, the location of response equipment caches in the Arctic region, equipment type and their specifications, logistic information concerning ports, air and land facilities, links to authorized national and local responder organizations, location of hospitals, places to stay, and resources needed by responders in near-by communities. Dr. Merten demonstrated how ERMA works, and explained that the web platform was developed by US-NOAA to provide information management and common operating picture for use in both preparedness and response. If the ERMA platform is accepted as the operating platform for the pilot project by the EPPR project team, development costs for the web-based platform would be minimal.

Dr. Merten is the chief of spatial data team and she also provides data management. NOAA has two primary roles, the first as scientific support to USCG on oil spills and the second as a Natural Resource Trustee. ERMA originated from NOAA's partnership with University of New Hampshire's Coastal Response Research Center (CRRC). Under NOAA's sponsorship, the CRRC had been conducting oil and ice research for seven years. NOAA and UNH CRRC joined forces with the US Coast Guard and the US Arctic Research Commission to organize a workshop to identify key strategies, action items, and research needs for preparedness and response to potential Arctic marine incidents. The co-leads for the project were Drs. Merten and Nancy Kinner as co-Directors of the UNH CRRC. Together they coauthored the workshop report, Opening the Arctic Seas: Envisioning Disasters and Framing Solutions, summarizing the Arctic infrastructure needs identified during workshop discussions of the 5 emergency marine scenarios. The collaboration led them to identify the need to quickly provide the information needed for response and restoration electronically and to display the information in the context of the geographical area where the response or restoration would occur. Thus the information data bases and the mapping technology came together to create the ERMA project. Climate change web-mapping initiated the idea of a trajectory map for resources at risk because of the frustration that scientists felt when trying to tell the story of an area during the restoration process. Testing and development of ERMA culminated in using the tool during a huge exercise in March 2010. The tool was then used by the USG during Deepwater Horizon. Admiral Allen designated ERMA as the common operating picture for Deepwater Horizon.

ERMA has two interfaces —one public and one private. Thus ERMA segregates information used by government officials to make decisions during an emergency, which is available only to government officials and their designees, from situational updates disseminated to the public. Dr. Merten demonstrated only the private interface. Dr. Merten noted that lessons learned in data management can be applied to ERMA and to the EPPR pilot. ERMA does not create new data sets, rather it superimposes currently existing data sets and data being gathered in the field by emergency responders onto an electronic map, thus quickly apprising emergency officials and their teams of the situation on the ground. For example ERMA leverages existing ARC GIS, AMS weather data, and automated vessel reporting to include in the electronic map. Her demonstration showed the existing Arctic ERMA footprint and she explained that because Canada is a co-sponsor, the map looks North American-centric. Goals of the program are to represent significant activities, make the data compatible into an overlay from a pdf, and remain focused on data sets relevant for EPPR.



Drills and user training test the ERMA platform in day to day activities, and exercises are being planned. Currently NOAA is partnering with Shell on an exercise in the Puget Sound. There are many user benefits because information is transparent and the system uses open source software. For example, ERMA: can cross boundaries seamlessly, making locally relevant data available quickly and efficiently, thus improving data sharing and communication; is easy to use; can display real time data sets gathered by responders on the ground; can be accessed from anywhere served by the Internet; in addition to response capabilities, ERMA is useful as a planning and preparedness tool; has distributed upload capabilities; is searchable; can be customized to meet an emergency situation as the emergency unfolds; can be tailored to protect sensitive information.

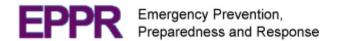
ERMA can be a repository of incident management plans and procedures and other documentation in the form of PDF files; it has the ability for individual agencies to tailor content to their needs. While Dr. Merten focused on ERMA's utility during a response, she mentioned that it can be used in preparedness activities as well.

Norway noted that it employs a similar system and that it would like to contribute information to the project. Denmark indicated its interest in exploring how data can be shared and in arranging for data sharing for the project.

Conclusion: Prototype development is underway in Alaska and Canada. Denmark (Greenland) has committed to providing data and examining potential ERMA fit for their use in Greenland. Norway will contribute information to the project as well. Other nations continue to monitor development at this time. Participants agreed that further development will continue via correspondence group and workshops and the project will continue to develop response and logistics information. Mr. Mike Gill from Canada mentioned the similarity of CAFF and ERMA. Specifically CAFF maintains a sea bird and shore bird colony registry and would like to share some information on the challenges of collecting and sharing information on different platforms. There may be other resources from PAME that could be used from the AMSA data sets as well.

6.2. Search and Rescue Pilot Project Arctic Automated Marine Vessel Emergency Rescue Net work (AAmverNet) – [Note: this presentation was made on June16]

Mr. Ben Strong from the US Coast Guard presented an update on the status of the Arctic Automated Marine Vessel Emergency Rescue Network (AAmverNet), an EPPR pilot project which is based on Amver, a voluntary global ship reporting system, sponsored by the United States Coast Guard and used by search and rescue authorities to arrange assistance to persons in distress at sea. Any rescue coordination center in the world can request ship position data to determine the relative position of ships, tracked by Amver, that are near the distress location. Mr. Strong presented the results of a survey of Amver by EPPR member countries: all countries use some sort of vessel monitoring/tracking system; Amver is mandatory in Canada and the U.S.; and all Arctic nations have vessels enrolled in Amver. According to survey results: Canada has 202 vessels enrolled; Denmark (Greenland/Faroe



Islands) - 12 vessels enrolled; Finland- 7 vessels enrolled; Iceland- 19 vessels enrolled; Norway- 79 vessels enrolled; Russia- 400 vessels enrolled; Sweden- 51 vessels enrolled.

Mr. Strong also underscored the relevance of AAmverNet to the signed SAR agreement. Article 9 section three of the agreement provides: "The Parties shall promote mutual search and rescue cooperation by giving due consideration to collaborative efforts including, but not limited to...using ship reporting systems for search and rescue purposes..." He noted that EPPR can make an immediate and important contribution to enhanced cooperation under the new SAR agreement with the AAmverNet project. He stated that AAmverNet is a force multiplier and can immediately impact Arctic SAR because Amver is a viable platform for linking all eight Arctic member country vessel reporting systems, there are NO development costs, and linking platforms is technically feasible and can be accomplished at minimal or no cost to Arctic member nations. Mr. Strong noted that AAmeverNet is not meant to replace existing systems and when combined with LRIT and AIS data this system helps add to maritime domain awareness for SAR purposes.

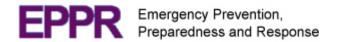
Mr. Strong also noted that Australia, Chile, and Japan have arrangements in place and that commercial ships must report through Amver which has had positive results in rescues at sea. He encouraged the group to have their nationally flagged vessels enroll and report to the Amver system, and to share vessel position information with the Amver system. If all countries participate, a viable Arctic-wide vessel reporting system can be operational by 2013.

Conclusion: The group welcomed the AAmverNet briefing and Greenland indicated that it would be interested in actively participating in the program. A proof of concept will be presented at next EPPR meeting. Mr. Strong welcomed other countries to participate in a proof of concept study.

6.3. Progress on the Arctic Rescue project

Mr. Igor Veselov provided a report on the International Arctic Forum in Russia "The Arctic – Territory of Dialogue" held in September 2010. Around 600 people attended the Forum which was hosted by the Russian Geographical Society. There were over 40 presentations made at 3 plenary sessions with a shared message that peaceful international cooperation in the Arctic region is the key factor in securing the region's successful development in the future. Many of the presentations raised more questions than answers. The Forum has outlined the topics for further extensive research and discussion; the Russian Geographical Society is set to make the Forum an annual event.

Mr. Veselov also presented an update of the Arctic Rescue project series. He informed EPPR that the Russian Federation would host an international scientific – practical conference "Emergency situations in the Arctic: Prevention and Response." The meeting will be held in Yakutsk, Russia from August 22-25, 2011. Mr. Veselov explained that Yakutsk is a leading scientific center run by the Russian Academy of Sciences investigating the problems of the north. The conference will explore SAR in the Arctic; oil spill problems; and protection of people and the environment from hazards, including radiological risks. Mr. Veselov extended the invitation to EPPR Participants and noted that emergency situations in the Arctic and prevention and response experiences would be discussed at the meeting.



Additionally, safety and protection measures for potentially dangerous enterprises in the Arctic will be discussed.

Conclusion: EPPR is invited to the "Arctic Forum" meeting which will examine the development of Arctic transportation systems, and which will take place September 21-22, 2011 in Archangelsk, Russian Federation. The Russian Federation also invited EPPR participants to a conference to be held in August 22-25, 2011 in Yakutsk which will focus on emergency preparedness, SAR, oil spills and radiological risks. Mr. Igor Veselov is the point of contact for both events.

6.4. Progress on the Development of Safety Systems in the implementation of economic and infrastructural projects

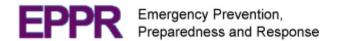
The Russian Federation will be conducting an exercise in the northern part of the Caspian Sea on a Lukoil ice resistant fixed platform. The scenario involves the collision of a tanker with the oil platform, which is located 100 miles from shore, and causes a fire in the open sea and oil spill on shore. Exercise goals include: testing the preparedness of management, EMERCOM, the Ministry of Transportation's response forces and assets (oil spill, fire, and SAR) and to train customs and border services to facilitate border crossings during emergencies. The Russian Federation is cooperating with Norway on the establishment of a joint search and rescue (SAR) center with the jurisdiction of Norway. Mr. Veselov reported that the two countries are joining forces and resources because of the many incidents involving ships so as to jointly improve SAR capabilities as a way of implementing the SAR agreement. Mr. Veselov also indicated that Norway and Russia will conduct a joint SAR exercise in the summer of 2012.

Conclusion: Mr. Veselov asked EPPR participants to consider the Safety Systems joint exercise in the Caspian Sea that focuses on coast guard activities and oil spill response. Ole Bjerkemo invited participants to a SAR and oil spill exercise, and a follow-on workshop to be scheduled in 2012 in northern Norway.

6.5. Update on Radiation Projects

Ms. Maria Holleran Rivera, the United States Head of Delegation, gave a summary of the reports on radiation projects that were delivered to the 2011 Ministerial. One report highlights 10 years of collaboration on Source Control led by the Russian Federation and the United States. The goal of the project was to implement a system for addressing prevention activities and improve safety operations at Russian Federation facilities handling radioactive materials. The second report highlights the 10 years of exercises completed under the auspices of EPPR. She noted the strong level of cooperation between the United States and the Russian Federation over the years to accomplish these results.

Ms. Holleran-Rivera then presented the group with proposed radiological emergency projects. Co-Leads of these projects will be the United States and Russian Federation. The project areas



encompass: Radiation Emergency Exercises, Emergency Rescue Team Equipment, Radiation Emergency Training, Emergency Crisis Center Support, and Community Radiation Information. EPPR's exercises incorporate other EPPR initiatives, including the source control series of hazard assessments, public communications, and technical improvements such as the NOSTRADAMUS and TRACE WIN plume model capabilities. The exercises validate the products and ensure the tools are integrated effectively. Another benefit of the radiological emergency exercise series is the ability to analyze the results and identify areas of the facility's response capability that need improvement. These "lessons learned" also contribute to setting priorities for cooperative activities under these EPPR sponsored projects.

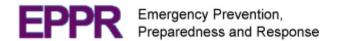
Other projects will involve follow up to lessons learned from exercises in previous years. For example, replacing outdated equipment is a priority for improving the capabilities of rescue teams to respond to potential radiation emergencies. Over the next two years Nerpa Shipyard Emergency Rescue Team equipment will be replaced. Along those same lines, the project to improve crisis center communications at EMERCOM builds upon lessons learned from the IBRAE-RAN Technical Support Center in Moscow and establishes communications between EMERCOM and IBRAE-RAN for technical emergency assistance. Such improvements will include the ability to model effects of radiological events and communicate the results of such analysis through videoconferences. Additionally, the creation of an Audio Visual Training Library at EMERCOM and Rosatom will provide a repository of safety training for workers and supervisors. Finally I-Medical training will be conducted in Sweden which will provide information and practical hands-on training to medical personnel and first responders in case of who treat patients during and after radiation incidents. The medical training will be conducted in early 2012.

Conclusion: Mr. Veselov acknowledged how useful the public radiological information project which the Russian Federation co-leads with the United States had been helpful in informing local populations concerning the events in Fukushima. He also reported that EMERCOM provided assistance to Japanese colleagues, that a team of radiological specialists were sent to the Far East seas to measure radiation in waters near the Russian Federation, and that the results will be published.

Mr. Walter Parker noted the cooperation with the Russian Federation goes back to the first exercise in Bilibino and praised the long-standing efforts of the two nations. Mr. Igor Veselov also noted that the Russian Federation was glad to be an active partner in these important projects. He noted that there is a report to be published on other radiation work in the wake of the Fukushima nuclear incident. Ms. Holleran-Rivera thanked Sweden for hosting the next I medical training and noted that this first medical training may lead to other initiatives in this subject area. The Russian Federation has expressed interest in developing medical response in EPPR.

15. Report from the IOSC conference and outcomes (May 23-26, 2011) and the IMO/WMU Oil Spill Risk Management Conference (March 7-9, 2011)

EPPR information was presented at both the International Oil Spill Conference (May 23-26, 2011) and the IMO/WMU Oil Spill Risk Management Conference (March 7-9, 2011). EPPR was invited to



participate in the OSR Management Conference and Mr. Bob Pond presented information on EPPR. Norm Snow chaired a session as well.

Mr. Bjerkemo noted that there were many good presentations at the IOSC meeting and it was a great opportunity to engage with the international community. He presented EPPR's BoHaSA report during a session on the Arctic. Mr. Pond also attended the IOSC conference and thanked Chantal Guenette for providing copies of the BoHaSA report to conference participants. Noting the value of EPPR participating in relevant conferences, he asked EPPR to consider participating in "Interspill" in March 2012 to engage the entire international community on Arctic OSR issues.

Ms. Chantal Guenette commented that certain themes keep coming up to include: coordination, cooperation, and communication. Ms. Guenette also noted that oil spill technology was discussed and in particular oil mineral aggregates were the topic for two sessions on international planning. Mr. Pond noted that Australia and New Zealand have an interest in what we do in EPPR because of the connection to the Antarctic.

Conclusion: All the papers and presentations from the IOSC are available on the conference website: http://iosc.org/papers posters/search1.asp. EPPR members are encouraged to promote EPPR as appropriate at relevant conferences and meetings, and to provide information back to the Work Group from such venues.

7. Day one wrap up, review of decisions, and adjournment of meeting

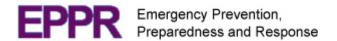
The Chair asked the meeting participants to let the Work Group know of conferences where it would be useful to present and noted that communications and outreach are cornerstones of the Swedish Chairmanship for good reason. She mentioned the finalized EPPR fact sheets as a communication tool and encouraged people to use these as well. The EPPR Chair thanked everyone for their participation and adjourned the meeting.

9. Record of Decisions taken on Day 1

The EPPR Work Group reconvened at the High Country Inn where the EPPR Chair reviewed the decisions taken on day one. The Chair thanked Ms. Jenny Trapnell and the Government of Yukon for their generosity in hosting the previous evening's reception at the Yukon Beringia Interpretive Centre. She noted that guests enjoyed the presentation, delicious refreshments, and instruction from the Interpretive Centre's staff on the atlatl.

10. The Nuuk Ministerial Mandate – Plenary Discussion Part II - Project brainstorming on Nuuk Declaration mandate: develop recommendations and/or best practices in the prevention of marine oil pollution

Mr. Ole Kristian Bjerkemo facilitated the Prevention Brainstorming Session. First EPPR considered the following questions: What is EPPR charged to address from the AC? Would EPPR consider the work to encompass tasks related to catastrophic event response or chronic discharges?



This discussion considered prevention related to shipping activities and then prevention related to oil and gas activities.

Shipping

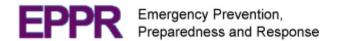
First Mr. Bjerkemo asked if EPPR could consider the structural standards for vessels, crew training or limited to shipping lanes, and ship construction. He maintained that within IMO some of these issues (regarding ship design, maintenance crewing for polar going vessels) already had rules in place; there is also movement underway to strengthen these. He noted that though EPPR may not need to be involved in this area, there may be things EPPR can contribute related to prevention such as best practices for coastal state actions to assist ships in avoiding disasters. Several EPPR members serve on technical committees within IMO and it was noted that many of these issues are addressed under the framework of IMO; therefore EPPR should not establish new rules, but capture best practices. It was noted that each nation should consult their experts and come together to share best practices. Other points made in the discussion include:

- For Canada, prevention is a key element that underpins activity in the Arctic; regulatory regimes are part of prevention; EPPR may want to consider the different bodies involved in this before undertaking this mandate and scope the issue especially to see if there are lessons learned.
- Risk assessment should be done to inform prevention; it would be instructive to focus on lessons learned from the Gulf disaster and also to review the country risk assessments in the Risk Matrix to consider what coastal nations are doing, have done, and can do to prevent incidents.
- EPPR should lead and collaborate where appropriate; one of the first steps is to reach out to AC WG-PAME cooperation in pursuing the effort. The work on Prevention should be a continuous evolving process with workshops to scope the activities—this is not a one-time project.

The question was raised on whether the Prevention group would work in tandem with the TF. EPPR members raised the points that prevention issues are important and that they need to be considered with the discussion of preparedness and response and that consideration should be given to maritime surveillance. It was mentioned that both groups working together may reduce duplication of effort and that the Nuuk Mandate does indicate the need to work in parallel. It was determined that there are practical reasons to coordinate work.

Oil and Gas

EPPR may consider a survey of prevention regimes—including oil and gas regimes—and support a comprehensive approach with pipeline, offshore production facilities, etc. Greenland informed the group that the PAME WG has a project starting in January 2012 which will undertake a review of Health, Safety and Environmental Management Systems and the Use of Best Operating Practices for Offshore Arctic Oil and Gas Drilling Activities. Canada volunteered to take a leadership role to host a workshop and agreed that the work may be done over time. Mr. Walter Parker noted that Alaska has a fair amount of expertise available but would need other experts to address offshore drilling. He mentioned complacency, pressure to reduce costs, and human error as areas to consider in the work on prevention.



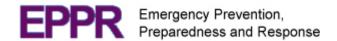
Other issues include buried equipment and untrained response teams. A lot of effort was needed to bring offshore drilling prevention standards up to par.

Mr. Norm Snow noted that industry is spending billions of dollars in prevention in designing blow out preventers, so a great deal of expertise lies outside of EPPR and government. Because of this, EPPR needs to have the involvement of industry in this work and should take the research and design experience into account. Also mentioned was the fact that oil and gas producers have a group dedicated to prevention activity and EPPR should look to involve them, as well as other international standard setting bodies and institutions (e.g., Det norske Veritas - DnV). Those with design and engineering expertise have worked on prevention issues and may have expertise outside of the 8 Arctic nations.

Mr. Fenge noted the level of complexity to our work is compounded by the fact that PAME's AOR Phase 2 deals with policy and law—there is an obvious overlap in our work which should be brought to the attention of the SAOs and ministers. He thought it was important that the messages from EPPR are complimented by PAME's message and that a collaborative process would be important. Mr. Bjerkemo noted that EPPR would need to discuss maritime surveillance further in order to write a proposal for the SAO meeting. Mr. Pokiak advised EPPR that right now community consultations are being done before offshore drilling begins and communities are being told they are first responders but there is no one trained or equipped to conduct a response. Furthermore, companies would not be bidding unless drilling was imminent, so he wants attention focused on training and equipping communities. For example he stated that only 100 people in his community can work as responders and now is the time to identify the need and prepare for this anticipated drilling activity. The work on prevention needs to be more than lip service, he advised.

Members agreed that while traditionally EPPR has not focused on prevention, it would be useful for EPPR to coordinate with other Arctic Council Workgroups to produce a report on Prevention Best Practices in place around the Arctic as a starting point to identifying gaps or overlaps and opportunities for improvement. Canada and Norway agreed to initiate a draft concept paper. The concept paper will then be circulated among members to determine which organizational elements within each country may need to be invited to participate. Contact groups were created for subject areas. The point of contact for development of the Prevention work is Ole Bjerkemo.

Conclusion: Participants agreed to create a Prevention Correspondence Group to lead the Nuuk Ministerial mandate to develop prevention recommendations or best practices. Norway and Canada will co-lead this effort. The Prevention Correspondence Group will conduct its work in parallel with the Oil Spill Preparedness and Response Task Force. The Prevention Correspondence Group will host a scoping workshop in October 2011 during the same week as the first meeting of the Oil Spill Preparedness and Response Task Force. Other AC WGs will be invited to participate. The Prevention Correspondence Group will be responsible for communicating with other Arctic Council Work Groups, and for preparing a prevention project proposal to carry out its work. The next EPPR meeting will take place on one day during the same week of the Task Force and Prevention Correspondence Group.



[Note: the dates for future meetings were determined by correspondence after the EPPR meeting. The Task Force will meet October 17-18; the Prevention Workshop will meet October 19-20; and EPPR will meet October 21. All meetings will be in Oslo, Norway.]

11. Revisiting the Arctic Guide

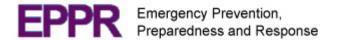
Ms. Ann Heinrich led the discussion on the value of the report and keeping the emergency points of contact for each country up to date. She mentioned that the guide was used for self-reporting on systems each nation had in place for emergency response, updating local agreements, and other pertinent information available on the EPPR website. Comments from the group included the helpfulness of the contact list and updated risks. Others also noted that this was a good reference to EPPR's past work but needed to be updated to be used as an outreach tool. The executive summary for each countries response structures are helpful and the Arctic Guide could be use to inform the Task Force. The group decided to undertake a thirty day review of the Arctic Guide and to update this for the Arctic Council.

Conclusion: By August 1, EPPR members were tasked with providing updates to the Arctic Guide, a directory of response contacts and the oil spill preparedness and response bi-lateral, multi-lateral agreements to which each member nation has committed.

12. Review of the revised Analysis of Agreements (Gap Analysis) and the Environmental Risk Analysis and Matrices and next steps

Ms. Ann Heinrich led the discussion on the Review of the revised Analysis of Agreements (Gap Analysis) and the Environmental Risk Analysis and Matrices and next steps. She stated that the documents provide a background on issues that need to be considered by the Arctic nations in future EPPR work. These historical documents are important to be updated so as to inform EPPR's prevention initiative and to provide valuable information to the Task Force on Oil Spill Response. The revised document was sent to participants shortly before the meeting and the contents were discussed. It was agreed to combine the reports. Comments were invited by September 1. The documents will be finalized after the comment period.

Conclusion: by September 1, EPPR members agreed to provide comments to the report Arctic Emergencies: Current and Future Risks, Mitigation, and Response Cooperation and update Arctic-wide Pollution Source Risk Matrix which summarizes both on water and land based potential sources of pollution throughout the Arctic.



13. Summary of the INAC-funded Oil Spill Preparedness and Response WG of the Beaufort Regional Environmental Assessment (BREA)

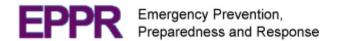
Mr. George McCormick presented an overview of the Beaufort Regional Environmental Assessment (BREA) and the work of the BREA Oil Spill Preparedness and Response Working Group. He noted that the Beaufort Region has a long history of oil and gas activity that dates back to early 1960s. To date, 63 exploration wells have been drilled in the Beaufort Sea without incident. Levels of activity in the region have fluctuated over time, with a recent focus on the deeper offshore areas. Mr. McCormick noted that commensurate with the level of activity, there has been a significant amount of research previously undertaken.

Based on recommendations from the Beaufort Sea Strategic Regional Plan of Action (2005-2008) and to ensure a coordinated and integrated approach to addressing challenges of renewed oil and gas activity, BREA was created on August 20, 2010. BREA is a multi-stakeholder initiative to sponsor regional environmental and socio-economic research that will inform potential offshore oil and gas activities in the Beaufort Sea. The budget of \$21.8 million over five years will support delivery of targeted research efforts in support of an efficient regulatory process. BREA is consistent with the four priority areas outlined in Canada's Northern Strategy and strongly supported by the Inuvialuit, industry, and governments.

The purpose of BREA is to assist the partnering of Inuvialuit communities, industry, governments, and regulators to prepare for oil and gas activity in the Beaufort Sea by: 1) filling regional information and data gaps related to offshore oil and gas activities and 2) supporting efficient and effective regulatory decision making by providing scientific and socio-economic information to all stakeholders. The goals are threefold: to produce relevant regional environmental and socio-economic information that simplifies project-level environmental assessment and regulatory decision-making for oil and gas activities, while strengthening the relationship between environmental assessment and integrated planning and management in the region, and to engage communities by advancing their priorities for oil and gas preparedness.

BREA deliverables include a research program that incorporates traditional knowledge and improving information in key areas. The 2011-2012 programs will be announced this summer. The six Working Groups address key topics in the Beaufort (led by government & Inuvialuit agencies) related to cumulative effects of activity, information management, regional waste management, oil spill preparedness, social, cultural and economic indicators and climate change. Some example Working Group Projects 2012-2013 include resource, training and response capacity gap analysis of Inuvialuit community members; a manual on Applicability of Oil Spill Dispersants in the Canadian Arctic; and a response gap analysis for moving resources into the 'theatre of response.'

Conclusion: The group welcomed Mr. McCormick's briefing and the Chair noted that EPPR would be interested actively participating in relevant future activities. Canada will continue to monitor BREA projects and will identify projects that have potential for collaboration with EPPR.



14. IMO Arctic Region Chapter: In Situ Burn (ISB) of Oil Spills on Water and Broken and Solid Ice Conditions

Ms. Christy Bohl of the United States presented the new response project proposal. She provided an overview of the project proposing that EPPR partner with the International Maritime Organization (IMO) to develop a chapter specific to the Arctic for inclusion in a proposed IMO project. The publication is tentatively titled, "IMO Guidelines for Oil Spill Response - Offshore In-Situ Burning" (IMO ISB Guidelines). The purpose is to assist response planners, responders and government officials in evaluating a situation to determine if ISB is an appropriate response method for an oil spill response in Arctic waters both near coastlines and the high seas in open water, broken ice and solid ice conditions. Ms. Bohl reiterated that the IMO ISB Guidelines will discuss environmental factors to be considered when using ISB, identify equipment that can be used, describe tactics, discuss environmental monitoring during an ISB, provide methods of residue collection and provide nation-specific approval processes. The Chapter is tentatively titled: "In Situ Burn (ISB) of Oil Spills on Water and Broken and Solid Ice Conditions" (Arctic ISB Chapter). This is a 2-year project that will culminate in a document produced electronically and in paper media for distribution and use in the field. A draft outline of the Arctic ISB Chapter is attached to the proposal in Annex 4.

Conclusion: To contribute to the project each country will need to survey oil spill response organizations, environmental agencies, and national response groups to provide input on ISB tactics and practices employed in their waters. They will also need to provide regulations and approval processes specific to approving an ISB for their country. The end product will be a chapter on in situ burning for Arctic that addresses general and nation-specific considerations for employing this method of oil spill response. Finland noted that while it supports the effort that this is not a project it is able to participate because it does not use ISB as a response tool in the Baltic Sea basin; Finland has no position on the use of ISB. Sweden noted that this was their position as well. The group may consider the need to report why two countries do not use ISB as a method and address this in the manual.

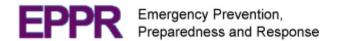
EPPR supports the proposal to draft a chapter on Arctic ISB to be included in an ISB guidelines document which will be proposed for development by the IMO. Canada volunteered to co-lead this effort with the United States. This project is also considered to follow up on the recommendations of the BoHaSA report.

16. Technical Exchanges and Delegation Updates

Permanent Participants and Arctic Council member countries presented briefings on activities relevant to EPPR.

Arctic Athabaskan Council

Ms. Cindy Dickson noted the overwhelming number of meetings associated with involvement in the Arctic Council and the Work Groups. The benefit of attending is to contribute and get a sense of what the groups are doing. Climate change is a human rights issue; it impacts hunting rights and living in



small communities. Climate change affects land claim agreements and is seen as a tool for adaptation. The AAC has been working on the Short-Lived Climate Forcers task force and engaged in strengthening cooperation on the Arctic Council. The AAC is focused on cooperation and projects especially because Canada will soon chair the AC and the AAC intends to contribute to building the agenda. Ms. Dickson noted that Athabaskans are not from the Arctic Coast and that she herself grew up in Old Crow—not far from the coast where her people went to trade. She sees importance in connecting offshore activities and inland communities—something the Work Groups should do in outreach. If the communities are not directly involved they need to monitor or be involved in the working groups. Communication is a big part of the work of the AAC. She asked that EPPR keep in mind the IPS as a means to distribute information on the working group and partner with IPS on communicating our efforts through posters and other such outreach efforts.

Gwich'in Council International (GCI)

Mr. Joe Linklater described the development along Bearing Sea, the McKenzie River and the confluences of the shared lands of the PPs and the government of Canada. He noted that the exchange of information was important. Migratory species are impacted by international development as well. Self-governance initiatives are being undertaken which relate to initiatives undertaken by EPPR. Species impacted by activities undertaken on the coastline impact our way of life and people are looking enhance their cultural lifestyle. In the midst of seeing cultural identity dying off, GCI has increased education on hunting, fishing, and land-based- experiential education. Mr. Linklater stated that "for the indigenous people, it all goes back to the land. Various projects throughout Alaska and Canada attest to the desire to protect our way of life". He added that GCI looks forward to working with EPPR and hopes that EPPR continues to consider working with PPs and Canada on future initiatives.

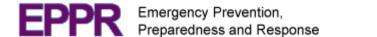
Canada

Transport Canada's National Aerial Surveillance System for Aircraft (assistance in the Gulf of Mexico spill)

Mr. Andre Laflamme of Transport Canada (TC), based in the Marine Safety division in Ottawa,
works on developing a ship-source HNS preparedness and response regime for Canada. On behalf of
Louis Armstrong, he presented another program within his group called the National Aerial Surveillance
Program (NASP). The NASP was started in 1968 to cover Canada's Great Lakes and was later expanded
to include both Coasts in 1991. In 2003 it was transferred to TC from the Canadian Coast Guard. Since
2003, TC has taken many steps to improve the effectiveness of the program. He provided background on
the program, how it evolved since 1968 when they used only one aircraft: a twin engine Cessna, and
involvement in the Deepwater Horizon incident. One of Transport Canada's aircraft was used in the Gulf
of Mexico for 11 weeks last summer in support to the response efforts.

Canada hasn't had a major oil spill since 1988 when the oil barge Nestucca spilled more than 5,000 barrels of bunker fuel and impacted the Vancouver Island area.

Unfortunately, however, an issue which TC faces each year is the accidental or illegal and deliberate discharge of oil. Each year hundreds of oiled birds wash up on Canadian beaches. This situation was at



EPPR Working Group Meeting Whitehorse, Canada June 15-16, 2011

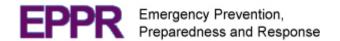
its highest in the late 90s but has gradually reduced since. This year is turning out to be one of the best years TC has seen in a long time as very few reports of oiled birds are reported.

TC believes that illegal discharge is occurring under the cover of darkness and when weather is not conducive to surveillance activities. The goals of the program are to prevent pollution from ships and to protect the marine environment. With the renewed effort that the Canadian Government is putting into the program, the already effective prevention program is expected to improve. The deterrent effort is well known within the shipping community.

The NASP utilizes four aircrafts to patrol the Canadian waters. There are two Dash-8s located in Moncton (NB) and Vancouver (BC); the Moncton aircraft used to patrol the east coast of Canada. This year, TC forecasts that the aircraft in Moncton will perform between 1,000 to 1,200 hours of surveillance and the Vancouver aircraft is expected to log an estimated 600 hours of flight time. Each patrol or flight is roughly 6.5 hours for the Dash-8. A Dash-7 aircraft is based in Ottawa during winter months and in Iqaluit during summer months to patrol the Arctic. This aircraft has the capability of 7.5 hours of airtime and unlike the Dash-8 aircraft it has an observation dome on the top for increased visual observation. Finally, TC has the Provincial Airline or PAL. This aircraft supplements the Dash-8 in Moncton to offer services in the Newfoundland area. The PAL aircraft can provide 5 hours of flight time. All aircraft have been modernized by TC since 2005 and equipped with state-of-the-art remote sensing equipment which was primarily designed for pollution detection. The most recent upgrade is streaming video capability which allows Incident Commanders and Senior Management to see in real-time what the aircrew see on the field. The aircraft provide unmatched capability in North America – the only 3 aircraft of this nature.

The remote sensing equipment can: generate an up-to-date and accurate operating picture for response crews; obtain images and video of pollution; verify satellite imagery; map the spatial extent of the pollution; establish real time communications linkages between the aircraft and the Incident Commanders; and provide positive confirmation through visual field observations to improve the ability to identify false positives (things that are reported as pollution but aren't). There has been an increase in pollution detection which may be attributed to the new MSS6000 on board the aircrafts and the training and experience acquired by the crew. Currently, all aircraft (except the PAL in Newfoundland) are equipped with the Maritime Surveillance System or MSS6000 from the Swedish Space Corporation. The data gathered from this device is beyond expectations and the Swedish Space Corporation has made the system user-friendly and robust. The sensors onboard the 3 aircrafts provide several capabilities such as: Side Looking Airborne Radar (SLAR), Electro-optical Infrared Camera System (EO/IR), Ultraviolet / Infrared Line Scanner (UV/IR), Digital Still & Video Camera Systems, Automatic Identification System (AIS), Satellite Communication System. Mr. Laflamme displayed images of each and an IR image of the thickest oil slick regions, which indicates to decision makers where to concentrate the cleanup efforts. These capabilities led to TC's ability to provide assistance to the DWH response.

There were a series of events that led to Canada's participation to the Gulf of Mexico incident. In March 2010 TC participated in the USCG's Spill of National Significance Exercise; discussions were held regarding mutual aid & TC's Surveillance Capability. On April 21, 2010 the USCG reported a fire following



an explosion on a mobile drilling platform, Deepwater Horizon and on April 30, 2010 a request for assistance from USCG and BP was received by Transport Canada. Aerial surveillance was considered a critical coordination mechanism during the response operations. Daily over flights were required to keep up with the rapidly changing location and condition of surface oil. TC's Dash 8 was the primary aerial reconnaissance asset from May 2 to July 15. The main tasks were to: map the spatial extent of the oil spill, alert in-situ burn and dispersant teams regarding the presence of fresh oil through the Command Centre Liaison, and direct skimmers to the heavy oil. The Canadian aircraft and crew were the main aerial assets used during the response efforts in the Gulf and this unfortunate event resulted in a great learning experience for the NASP. The NASP crews had never used a "tactical surveillance" platform and did not direct water-based responders on a real-time basis from the air before. This presented a challenge and learning experience that Canada is offering to share with others.

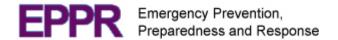
Public Review of Arctic Safety and Environmental Offshore Drilling Requirements

The second presentation on the Public Review of Arctic Safety and Environmental Offshore Drilling Requirements was provided by Mr. Robert LeMay of the National Energy Board of Canada. The National Energy Board (NEB or the Board) is an independent federal regulator established in 1959 to promote safety and security, environmental protection and economic efficiency in the Canadian public interest within the mandate set by Parliament for the regulation of pipelines, energy development and trade. The Board reports to Parliament through the Minister of Natural Resources. Mr. LeMay noted that in response to the disaster in the Gulf of Mexico, the NEB initiated in May 2010 a review of the safety and environmental requirements for offshore drilling in Canada's unique Arctic environment. For the complete text of Mr. LeMay's remarks please see Annex 5.

Conclusion: Mr. Snow noted that he may have a proposal concerning data collection in Canada's western Arctic that would include conducting a workshop similar to the one held by the developers of Arctic ERMA.

Denmark

Mr. Nils Westergaard provided the Denmark/Greenland country update. He informed the group on the updating of the Greenland command contingency plan and noted that work had been done on the sensitivity atlas covering Greenland coastline. The ice situation is an area of concern for the government because there was no ice in Disco Bay this winter; the dog sled patrols noticed their routes were shorter than in years past which also indicate that the ice is diminished. Furthermore, because of the melting ice cruise ships activity have increased; ships with 3000 people routinely travel into formerly restricted passages and through unchartered areas. In addition, these areas have no ice charts and not all of the ships have experienced navigators on board. Response personnel are realizing they will be called in case of an emergency and organizations are beginning to address response procedures. There are regulations for tourists wanting to enter the national park in the northeastern part of Denmark. It is known that some people enter without permission which is dangerous and would be a strain on resources if there is a need for assistance. In this case assistance most likely would not be able to reach those in need in time.



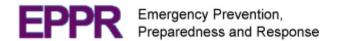
Mr. Westergaard noted that an agreement between Canada and Denmark has never been activated before and would benefit from an update. This may be an area of future collaboration between the countries. Denmark is planning to conduct an oil-spill table top exercise in order to test the national environmental response system. He also informed the group of oil operations taking place of the west coast of Greenland which will require safety measures—the Danes have learned a lot from the DWH incident. Last he mentioned Greenland home rule and the agreement which allows the Danish Navy to patrol and assist in the area.

Finland

Ms. Miliza Malmelin provided the Finland country update and noted that in March 2011 Finland got a new multipurpose vessel, named the Louhi. The Louhi represents state-of-the-art technology in responding to marine oil and chemical spills. The vessel is able to collect oil from the sea in open waters in higher waves than possible by Finland's existing response vessels and can also collect oil in ice conditions with the aid of its special equipment. The Louhi is also designed to combat chemical spills and can collect harmful substances and operate in a chemical cloud without exposing the crew to any risk. The vessel can also be used for emergency towing of vessels, fire-fighting and other rescue operations. The homeport of the Louhi will be in Upinniemi, fairly close to Helsinki and it will improve the readiness to respond to marine pollution in the Gulf of Finland.

Ms. Malmelin informed the group that the Shell Company arranged a conference on June 7-8, 2011 in Helsinki to collect and share state-of-the-art information on oil in ice. The conference resulted in some new ideas mostly concerning conditions in the Baltic Sea, including discussions about establishing a fund for the countries around the Baltic to pay for response equipment. Finland's preparedness for combating oil will be scrutinized twice during the coming autumn and winter: an IMO audit will be conducted and inspections of Finnish implementation of some European Union legislation will be done by the European Maritime Safety Agency.

The Radiation and Nuclear Safety Authority in Finland (STUK) is coordinating a three-year Euro-Arctic regional project called the Collaboration Network on EuroArctic Environmental Radiation Protection and Research (CEEPRA). Project partners are the Murmansk Marine Biological Institute (MMBI) from Russia, the Norwegian Radiation Protection Authority (NRPA), the Finnish Meteorological Institute, the Norwegian Meteorological Institute, and Pöyry Finland Oy. The aim of the project is the establishment of a cooperation network in the EuroArctic region, cross-border exchange of knowledge and skills, improvement of emergency preparedness capabilities and risk assessments in case of nuclear accidents in the region as well as raising awareness and knowledge in the general public. The project will study the current state of radioactive contamination in terrestrial and marine ecosystems in the EuroArctic region by examining environmental samples collected from the Finnish Lapland, Finnmark and Troms in Norway, the Kola Peninsula and the Barents Sea. The results will provide updated information on the present levels, occurrence and fate of radioactive substances in the Arctic environments and food chains. Special attention will be given to collection and analyses of natural products widely used by population in Finland, Russia and Norway, such as berries, mushrooms, fish and reindeer meat. The region-specific risk assessments will be carried out through modeling and



investigation of long-term effects of potential nuclear accidents in the EuroArctic region and possible impacts on the region's indigenous population, terrestrial and marine environments, reindeer husbandry, the natural product sector, tourism and industries.

Due to the nuclear power plant accident in Fukushima, Japan, the Ministry of Employment and the Economy (TEM) requested from the Radiation and Nuclear Safety Authority (STUK) an investigation into how Finnish nuclear power plants are prepared for the effects of floods and other extreme natural phenomena on the functionality of plants and how plants have ensured the availability of electricity during various fault and malfunction situations. The report by STUK to the ministry was delivered in mid May and states that although there is no need for immediate safety improvements, there is reason for power companies to continue investigations into preparation for certain exceptional natural conditions (e.g. extremely high floods, extremely low and high temperatures). Investigations and plans for safety improvements can be compiled in connection with and on the same schedule as stress tests carried out at the request of the EU Council of Ministers during this year.

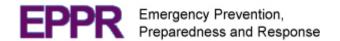
Norway

An update on the work on the Polar Code was provided by Ole Kristian Bjerkemo. He has been updated by Norwegian representatives participating in the work to Develop a Mandatory Code for Ships operating in Polar Waters. The group met in March 2011 and was instructed to further develop the hazard identification for the draft Polar Code and to further consider the environmental issues relating to the draft Polar Code and develop relevant requirements for inclusion in the Code. It was recommended to establish categories of ships operating in Polar Waters: class A- Polar ice covered, class B- Polar open waters, and class C Polar open water vessels including ice-free waters.

Mr. Bjerkemo noted that previous agreement on a two-step approach was reiterated – i.e. the Code should initially apply to SOLAS passenger and cargo ships, taking into account the urgent need for relevant mandatory requirements, and that later, requirements for non-SOLAS ships, such as fishing vessels, may be developed, after consideration by the Organization. Concerning the proposed risk-based structure of the draft Code, a combination of Goal Based Standards (GBS) and prescriptive requirements should be pursued at this stage. It was agreed that the code should not conflict with Antarctic Treaty and UNCLOS provisions and that an environmental protection chapter will be included in the draft Polar Code. Finally, it was decided not to further consider the geographical boundaries of Arctic and Antarctic waters proposed in documents DE 55/12/8 and De 55/12/17, since this would conflict with the provisions in other IMO instruments.

The Correspondence Group was reestablished to further develop the draft Polar Code. The deadline for the first round of correspondence is 10th June. The leader of the Correspondence Group has put together the different proposals made into a matrix with the text of the draft Polar Code included. The members of the Correspondence Group are asked to comment on the various proposals. In this round the discussion is limited to the general chapter and Part A technical chapters.

Mr. Bjerkemo also informed the group of the 1 June 2011 operational status of NAVAREA XIX. In 2010, the International Maritime Organization (IMO) and the International Hydrographic Organization (IHO) expanded the global maritime navigation notification service NAVAREA to Arctic waters. The



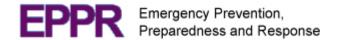
Norwegian Coastal Administration (NCA) has taken the responsibility as coordinator of NAVAREA XIX, which is one of the areas in the IMO / IHO World-Wide Navigational Warning Service (WWNWS). The area that NCA is responsible for covering are the waters between Greenland and the Russian border extending from the middle of the Norwegian coast to the North Pole. NAVAREA XIX has been in trial operation since 1 July 2010 and has sent regular navigational warnings to shipping in this area. From 1 June 2011, the service is fully operational and the Vessel Traffic Center in Vardo is now sending out NAVAREA alerts twice a day.

Reporting on exercise Barents 2011, Mr. Bjerkemo described the activities of the exercise as consisting of four practical field exercises that will take place in Norrbotten, Sweden in September 2011. The scenarios are a train accident, rescue operations of trapped people in a collapsed industrial building and in a tunnel, and a chemical emission in a densely populated area. Emergency actors and organizations from all the Barents Region countries will take part in the exercise. At the center of attention is, in addition to Nordic agreements and national legislation, the Agreement on Emergency Prevention Preparedness and Response signed by Sweden, Finland, Norway and Russia in 2009. It regulates cross-border cooperation in rescue operations in the Barents Region. In concluding, Mr. Bjerkemo thanked Sweden for its assistance in responding to a large oil spill that reached the coast of Fredrikstad, southern Norway, after a container vessel ran aground.

Sweden

Ms. Pia Övelius provided a brief overview of the Swedish Arctic Strategy. The purpose of the Strategy for the Arctic Region is to present Sweden's relationship with the Arctic, together with the current priorities and future outlook for Sweden's Arctic policy with an understanding of the international perspective. The Strategy has three major themes: climate and the environment, economic development, and the human dimension. The priorities in each theme are the starting point for future work. Ms. Övelius noted that the Arctic region is in a process of far-reaching change and that climate change is creating new challenges and opportunities, on which Sweden must take a position and exert an influence. New conditions are emerging for shipping, hunting, fishing, trade and energy extraction, and alongside this needs are arising for an efficient infrastructure. It is in Sweden's interest that new emerging activities are governed by common and robust regulatory frameworks and above all that they focus on environmental sustainability.

She also noted that Sweden sees the Arctic Council as the central multilateral forum for Arctic issues and that it should be strengthened. Sweden will make an effort to promote economically, socially, and environmentally sustainable development throughout the Arctic region. In cooperation with other Arctic countries, Sweden will contribute to data and proposals for action to strengthen the long-term capacity of Arctic communities and environments and their adaptation to a changed climate. Ms. Övelius referenced the SAR agreement and noted the importance of the continued development of regional cross-border cooperation in the area of sea and air rescue and of safety requirements for maritime transportation. She mentioned the potential for negative health and social impacts of increased activity in the Arctic and the effort Sweden would make on behalf of indigenous peoples to maintain their culture, traditions, and knowledge.



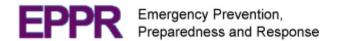
Mr. Bernt Stedt, Swedish Coast Guard, gave a presentation on Sweden's response equipment. One of the newest ships in the Swedish Coast Guard's fleet includes the vessel KBV 003 Amfitrite, the largest vessel in the fleet. Mr. Per Postgård also provided brief remarks to the group on radiation activities and three EPPR related exercises. From February through April 2011 Swedish authorities conducted SAMÖ-KKÖ 2011. This exercise scenario was similar to the Fukushima event with a scenario at a Nuclear Power Plant affecting the southern part of Sweden. The emergency response phase lasted for 36 hours straight—an endurance test for responders and participants. The second phase involved aspects of the long-term recovery needs and was followed by a workshop on achieving long-term recovery. The second exercise Sweden is involved in is Barents Rescue 2011 to occur September 18-23, 2011; the scenario involves a flood, a train derailment, and a chemical spill. This will be the year's largest transboundary exercise in the region. The Swedish Government has also decided, in close consultation with the governments of Finland, Norway, and the Russian Federation to arrange a dedicated international seminar for representatives from countries in the Barents Euro-Arctic Region. The third exercise will focus on an international response to an oil spill. The Swedish Civil Contingencies Agency, together with the Swedish Coast Guard and eight rescue services is arranging an oil spill exercise, BOILEX, from 27 to 29 September 2011 in Nynäshamn, Sweden.

Russian Federation

International Cooperation in Oil Spill Prevention and Combating Oil Spills

Mr. Andrej Bryksin presented a briefing and discussed the increased development of regions in Far North and increasing of risks of possible emergencies related to oil spills. Experience shows that no country in the world can cope alone with a large oil spill, and because of this realization the Russian Federation is focused on revitalizing international cooperation in this area. Mr. Bryksin displayed the organization chart of the Russian Federation's State Marine Pollution Control, Salvage & Rescue Administration. This group implements salvage and rescue of people and vessels, responds to oil spills, and works with marine salvage coordinating centers (MSCC), basin emergency rescue departments (BERD) and their marine specialized units. In the basin of Arctic seas, emergency rescue preparedness is conducted by Murmansk basin emergency rescue departments with a branch in port Archangelsk. There is a plan to create additional coordination points in the ports of Dixon, Tiksi, Pevek, and Provideniya.

On April 6, 2009, the Russian Federation Ministry of Transport issued order #53 "Statement regarding the approval of organizations to work independently from their ministry and national branch on combating oil spill prevention from vessels and objects at sea." This Statement determined the coordination authorities, permanent authorities, forces and resources which are involved for oil spills prevention and combating at sea. Mr. Bryksin also described the international agreements of the Russian Federation in the area of combating oil spills. In the Arctic region at the present time two agreements are in place: the Agreement between the Government of USSR and the Government of USA about cooperation in emergency oil spills combating at Bering Sea and Chukchi seas from May 11, 1989; and the Agreement between the Government of Russian Federation and Government of the Kingdom of Norway about cooperation in oil spills combating at Barents sea from April 28, 1994. Each agreement has a plan: the Joint Contingency Plan of Russian Federation and USA on oil spills combating in Bering



Sea and Chukchi Sea (2001); and the Joint Contingency Plan of Russian Federation and Kingdom of Norway on oil spills combating in Barents Sea (2002).

The most important international agreement is International Convention on oil pollution preparedness response and co-operation (1990) which the Russian Federation joined by adopting resolution 607 of the Government of the Russian Federation on July 23, 2009. By this resolution on the basis of Article 6 of Convention Ministry of Transport of Russian Federation and Federal Agency of Marine and River Transport was appointed as competent national authorities responsible for ensuring of oil spill preparedness and response. Also the authority was given to the Ministry of Transport of Russian Federation to ask the help or take a decision about rendering of assistance to other states.

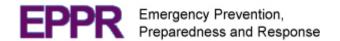
Regulations to manage international cooperation were also adopted to address issues such as border entry, conditions of foreign vessels, air vessels and other transport which are involved in response, and staff, cargo, materials and equipment needed for combating such incidents (approved by resolution of Government of Russian Federation from August 2, 2010 # 592). In this resolution the order of admission through state border and the features of customs clearance for foreign marine and air vessels and means which are involved in oil spill response are determined.

Barents 2010

The most important aspect of international cooperation is the conduct of joint international exercises. On June 9, 2010 in Barents Sea Norwegian and Russian personnel conducted an international exercise on search and rescue of people caught in a disaster and then combating an oil spill. The exercise was organized and conducted by Norway. During the first stage participants managed the disaster by attending to the lifesaving activities involved with the search and rescue of people. During the second stage participants conducted operations to contain and combat the oil spill. The main feature of this exercise scenario was that one of vessels, initially slated to assist in the oil spill elimination operation, was relocated and took part in the search and rescue operation. This aspect of the scenario made the exercise true to life. During the operation the simulated oil spill was completely localized and eliminated. During the final briefing, Norwegian officials noted the good preparation of forces and resources from Russian side during all the stages of exercise. In 2011 in the Gulf of Varanger Fjord we are planning to conduct another complex exercise, «Barents-2011», again with the participation of Nordic partners.

Caspian 2010

The exercise «Caspian-2010» was held on June 16, 2010 in the basin of Caspian Sea. The scenario of this complex, international exercise was: the search and rescue of people in a disaster at sea and management of consequences of marine emergencies related to a marine oil spill. The exercise required participant collaboration in order to manage an oil spill that affected two areas located 90 miles apart from each other. In the end, the exercise objectives were achieved and the plan accomplished; the participants successfully completed their tasks and the goals and objectives of exercise were met. The intense preparation and conduct of exercise received high marks from observers from Republic of Kazakhstan and Republic of Azerbaijan. We hope that the further deepening of international cooperation will contribute to solving the problems of oil spill prevention and responding to spills in the seas especially in the Arctic.



United States

Existing Joint Industry Program Status (JIP) and Future Outlook: Links to EPPR

Mr. John Whitney of NOAA provided a presentation titled "Arctic Oil Spill Response Partnerships: Status and Future Outlooks." He noted some of the ongoing efforts between industry and SINTEF, most notably that the last JIP report on "Oil Spill Contingency in Arctic and Ice Covered waters" involved six oil companies and non-industry partners to include: NOAA, MMS, OSRI, ACS, and the Universities of New Hampshire, Boise State, Rhode Island, and Alaska. From 2009-2011 there was a Barrow JIP on toxicology and biodegradation of crude and dispersed oil in the Arctic marine environment. An Arctic IOGP/JIP was just formed to include 8 companies that will attempt to build on the results of the SINTEF/JIP. Participants signed the final JIP agreement at the IOSC in Portland this past May. Requests for proposals for the various projects will be advertised soon with contracts negotiated later on in fall of 2011. Organizers are currently soliciting participation by government agencies and other institutions and hope to be fully transparent with results.

Mr. Whitney informed the group of the University of Alaska Fairbanks (UAF) -NOAA Partnership to create an Arctic Science and Technology Center with the emphasis on using their combined expertise in Arctic science to advance and inform Arctic oil spill response efforts. He also informed the meeting of the Alaska Clean Seas OSRO/NOAA Partnership to conduct information sharing on the equipment, operations, logistics, and response science (trajectories, oil weathering, etc.) necessary to deal with an Arctic oil spill response. NOAA is taking advantage of and creating opportunities to interact with North Slope Borough native stakeholders – elders, whaling captains, and resident scientists, to capture traditional knowledge as it relates to scientific knowledge. The United States will keep EPPR informed of relevant Joint Industry Program (JIP) projects.

Session conclusion: The group welcomed each presentation and noted that the broad sharing of information is instrumental in leading to development of EPPR strategies, project ideas, avoidance of duplication, and identification of areas that EPPR should address.

17. Administration

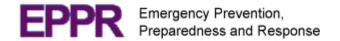
17.1. Revamped website

The secretary reviewed the new website and took feedback from the group. Participants noted that information needed to be presented at the site to include documents and an agenda for the meeting.

Conclusion: Members approved the new website and will let Secretariat know about changes they wish to see to the site. The Secretariat will keep WG apprised of changes and also provide more information on a SharePoint portal for use by the WG and the task force.

17.2. Election of new Chair and Vice Chair

EPPR elected Ole Kristian Bjerkemo as the new Chair and Ann Heinrich as the Vice Chair.



17.3. Record of Decisions

The Chair read the record of decisions for day two and asked for input from the group. Please see Annex 6 for the complete Record of Decisions.

17.4. Scheduling of the Next Meeting and closing of the Meeting

The next meeting location and date are to be determined and will be held in conjunction with the meeting of the Task Force and Prevention Project Group.

[Note: the dates for future meetings were determined by correspondence after the EPPR meeting. The Task Force will meet October 17-18; the Prevention Workshop will meet October 19-20; and EPPR will meet October 21. All meetings will be in Oslo, Norway.]



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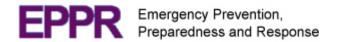
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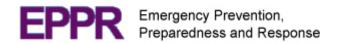
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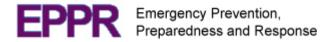
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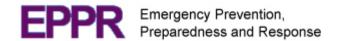
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Mr. Martin Von Mirbach WWF

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Annex 2: Timed Agenda

Agenda for EPPR Working Group Meeting

High Country Inn, Wednesday, 15 June 2011

9:00 a.m. - 9:40 a.m.

- 1. Calling meeting to order (Ann Heinrich, EPPR Chair)
- 2. Welcome by Canadian Hosts (George McCormick, Canada)
- **3.** EPPR Work Group Convenes (Ann Heinrich, EPPR Chair)
 - 3.1. Introductions (EPPR WG Participants)
 - 3.2. Approval of Agenda (EPPR Chair)

9:40 a.m. - 10: 30 a.m.

- 4. Outcomes from the 2011 Arctic Council Ministerial meeting (EPPR Chair)
 - 4.1. Swedish Chairmanship Programme (Pia Övelius, Sweden)
 - 4.2. Search and Rescue Agreement (Chairs of the Task Force)
 - 4.3. Follow up activities to the BoHASA report (Ole Kristian Bjerkemo, Norway)

10:30 a.m. – 11:00 a.m. Coffee Break

11:00 a.m. – 1:00 p.m.

5. The Nuuk Ministerial Mandates - Plenary Discussion Part I: Task Force to Develop an Instrument on Arctic Marine Oil Pollution Preparedness and Response (Facilitators: Bob Pond & Chantal Guenette)

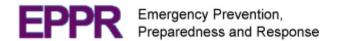
1:00 p.m. – 2:00 p.m. Lunch – Provided for EPPR WG in the High Country Inn

2:00 p.m. - 5:00 p.m. EPPR Work Group Reconvenes

6. Update on Current Projects

2:00 p.m. – 2:45 p.m.

6.1. Arctic Region Oil Spill Response Resource and Logistics Guide - Discussion and



Demonstration (Dr. Amy Merten, USA)

- 2:45 p.m. 3:10 p.m.
 - 6.2. Search and Rescue Pilot Project Arctic Automated Marine Vessel Emergency Rescue Net (Ben Strong, USA)

3:10 p.m. − 3:30 p.m. Coffee Break

- 3:30 p.m. 3:45 p.m.
 - 6.3. Progress on the Arctic Rescue project (Igor Veselov, Russian Federation)
- 3:45 p.m. 4:00 p.m.
 - 6.4. Progress on the Development of Safety Systems in the implementation of economic and infrastructural projects (Igor Veselov)
- 4:00 p.m. 4:30 p.m.
 - 6.5. Update on Radiation Projects (Maria Holleran-Rivera, USA)
- 4:30 5:00 p.m.
- 7. Day one wrap up, review of decisions, and adjournment of meeting (EPPR Chair)
- 5:00 p.m. Meeting adjourns and participants return to hotel

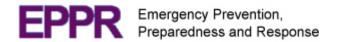
5:40 p.m. Meet vans at the High Country Inn for transport to Yukon Beringia Centre: Participants are invited to the Yukon Beringia Interpretive Centre for a film presentation and reception hosted by the Yukon Government.

Thursday, 16 June 2011

EPPR Work Group Reconvenes – High Country Inn

8:30 a.m. - 8:45 a.m.

- **8.** Opening of Meeting (EPPR Chair)
- 9. Record of Decisions taken on Day 1 (EPPR Chair)
- 8:45 a.m. -10:00 a.m.
- 10. The Nuuk Ministerial Mandate Plenary Discussion Part II Project brainstorming on



Nuuk Declaration mandate: develop recommendations and/or best practices in the prevention of marine oil pollution (Facilitator: Ole Kristian Bjerkemo)

10:00 – 10:30 a.m. Coffee Break

10:30 - 11:00 a.m.

11. Revisiting the Arctic Guide: discussion on the value of the report and currency of emergency points of contact for each country (EPPR Chair)

11:00 - 11:30 a.m.

12. Review of the revised Analysis of Agreements (Gap Analysis) and the Environmental Risk Analysis and Matrices and next steps (EPPR Chair)

11:30 - 12:00 p.m.

13. Summary of the INAC-funded Oil Spill Preparedness and Response WG of the Beaufort Regional Environmental Assessment (BREA) (George McCormick)

12:00 - 12:30 p.m.

New Project Proposals:

14. IMO Arctic Region Chapter: In Situ Burn (ISB) of Oil Spills on Water and Broken and Solid Ice Conditions (Christy Bohl, USA)

12:30 – 1:30 p.m. Lunch – Provided for EPPR WG in the High Country Inn

1:30 - 2:00 p.m.

15. Readout from the IOSC conference and outcomes (May 23-26, 2011) and the IMO/WMU Oil Spill Risk Management Conference (March 7-9, 2011)

2:00 p.m. - 4:45 p.m.

16. Technical Exchanges and Delegation Updates – Permanent Participants and Arctic Council member countries are invited to present on activities relevant to EPPR

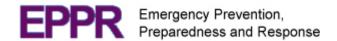
2:00-2:15 Arctic Athabaskan Council

2:15-2:30 Inuit Circumpolar Council

2:30-2:45 Canada

Transport Canada's National Aerial Surveillance System for Aircraft (assistance in the Gulf of Mexico spill) (Josée Lamoureux, Transport Canada)

2:45-3:00 Denmark



3:00 p.m. – 3:30 p.m. Coffee Break

3:30 p.m. - 3:45 p.m. Finland

3:45 p.m. – 4:00 p.m. Norway

Update on the work on the Polar Code (Ole Kristian Bjerkemo)

4:00 p.m. – 4: 15 p.m. Sweden

Swedish Arctic Strategy (Pia Övelius)

4: 15 p.m. – 4:30 p.m. Russian Federation

International Cooperation in Oil Spill Prevention and Combating Oil Spills (Andrej Bryksin)

4:30 p.m. - 4:45 p.m. United States

Existing Joint Industry Program Status (JIP) and Future Outlook: Links to EPPR (John Whitney)

4:45 p.m. - 5:45 p.m.

17. Administration

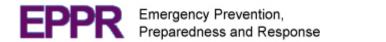
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- 17.1. Revamped website (Secretariat)
- 17.2. Election of new Chair and Vice Chair (EPPR Chair)
- 17.3. Record of Decisions (Chair and Secretariat)
- 17.4. Scheduling of the Next Meeting and closing of the Meeting (Chair)

Annex 3: EPPR Work Plan 2011 – 2013

ACCIDENTAL OIL AND HNS POLLUTION: L – LEAD P- PARTICIPANT

Project	Canada	Denmark/ Greenland	Finland	Iceland	Norway	Russian Federation	Sweden	USA
Provide technical support to the Arctic Council Oil Spill Emergency Preparedness and Response Task Force	Р	Р	Р	Р	Р	Р	Р	Р
Arctic Rescue	Р	Р	Р		Р	L	Р	Р
Development of Safety Systems in Implementation of Economic and Infrastructural Projects	Р	Р	Р		L	L	Р	Р
Follow-up on Behavior of Oil and other Hazardous Substances in Arctic Waters (BoHaSA) Recommendations	P HX) P	R P P	P	L	Р	Р	Р
Update of Analysis of Agreements	Р	Р	Р	Р	Р	Р	Р	L
Update of Environmental Risk Matrix	Р	Р	Р	Р	Р	Р	Р	L
Arctic Region Oil Spill Response Resource and Logistics Guide	L							L
Update the Arctic Guide for Emergency Prevention, Preparedness and Response	Р	Р	Р	Р	Р	Р	Р	Р

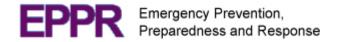


RADIOLOGICAL EMERGENCIES: L – LEAD P- PARTICIPANT

Project	Canada	Denmark/ Greenland	Finland	Iceland	Norway	Russian Federation	Sweden	USA
Improve Technical Analysis Capabilities for Radiological Emergency Response						L		L
Technical Crisis Center support to the EMERCOM Crisis Situation Management Center, Phase II						L		L
Conduct of Radiation Emergency Exercises	Р		Р		Р	L	Р	L
Conduct of Radiation Emergency Training		OR	R			L		L
Emergency Rescue Team Technical Support						L		L
Community Radiation Information	= /	기언.	十个			L		L

NATURAL DISASTERS and OTHER HAZARDS L – LEAD P- PARTICIPANT

Project	Canada	Denmark/ Greenland	Finland	Iceland	Norway	Russian Federation	Sweden	USA
"Managing the cold conditions – A systematic approach"			L		Р	Р	Р	
Pilot Project: Arctic Automated Mutual Assistance Vessel Rescue Network (AAMVERNET)						L		L



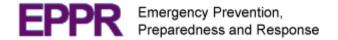
CO-OPERATION WITH OTHERS AND LIAISON ACTIVITIES

Project	Canada	Denmark/ Greenland	Finland	Iceland	Norway	Russian Federation	Sweden	USA
Liaison with PAME working group	Р	Р	Р	Р	Р	Р	Р	Р
Cooperation with Oil Industry	Р	Р	Р		L	Р	Р	Р
Coordination with University of the Arctic								L

OTHER ISSUES L - LEAD P- PARTICIPANT



Project	Canada	Denmark/ Greenland	Finland	Iceland	Norway	Russian Federation	Sweden	USA
Administration: Host EPPR web site							L	Р
EPPR Secretariat					L			



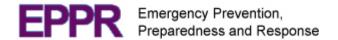
Annex 4: ISB Project Proposal

- 1. **Project Title:** IMO Arctic Region Chapter: In Situ Burn (ISB) of Oil Spills on Water and Broken and Solid Ice Conditions.
- 2. **Project Overview:** The EPPR will partner with the International Maritime Organization (IMO) to develop a chapter for inclusion in an IMO project tentatively titled, "IMO Guidelines for Oil Spill Response Offshore In-Situ Burning" (IMO ISB Guidelines) to assist response planners, responders and government officials in evaluating a situation to determine if ISB is an appropriate response method for an oil spill response in Arctic waters both near coastlines and the high seas in open water, broken ice and solid ice conditions. The IMO ISB Guidelines will discuss environmental factors to be considered when using ISB, identify equipment that can be used, describe tactics, discuss environmental monitoring during an ISB, provide methods of residue collection and provide nation-specific approval processes. The Chapter is tentatively titled: "In Situ Burn (ISB) of Oil Spills on Water and Broken and Solid Ice Conditions" (Arctic ISB Chapter). This is a 2-year project. The Arctic ISB Chapter would be produced in both electronic and paper media to facilitate use in the field. A draft outline of the Arctic ISB Chapter is attached.
- 3. **Lead Organization:** The United States offers to lead or co-lead the project, and invites participation by other Arctic Council Member nations and Permanent Participants.
- 4. **Point of Contact:** United States: Christy Bohl, BOEMRE, christy.bohl@boemre.gov
- 5. **Background Information:** Oil spill response in the Arctic is a challenging proposition given environmental and logistical limitations. With the introduction of ice, snow and limited light, response activities become further limited and in some instances preclude the use of mechanical oil recovery operations. One method of rapidly reducing the volume of oil on the ocean surface is to burn it in place. This is known as in situ burning (ISB). This method of response reduces equipment, personnel and waste management requirements especially during periods when other means of response are rendered ineffective. The purpose of this project is: 1) to develop a chapter for the IMO ISB Guidelines for evaluating a spill scenario to assist in determining if ISB is a viable option and then, 2) provide spill planners and responders with best practices to plan for and conduct an ISB in various arctic conditions.

6. **Detailed Project Description:**

a) Goals:

1) To develop a guide for evaluating an oil spill to assist in determining if ISB is a viable response option in various arctic environmental conditions i.e. broken ice, solid ice



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- 2) Identify tactics, personnel and equipment requirements, logistical support, health and safety concerns, limiting weather conditions, burn monitoring, and waste management requirements that may be considered in preparing for an ISB;
 - 3) Develop generic checklists for conducting an ISB; and
- 4) Identify country specific approval protocols and environmental monitoring requirements for conducting an ISB.

b) Approach:

Review available in situ burn guides, research papers and spill response manuals and incorporate the best practices in one document that is specific to the operational conditions that can be encountered during an oil spill response in the Arctic marine environment. The Arctic ISB chapter would include discussion on assessment strategies, equipment inventories, developing health and safety guidelines and site safety plans, environmental monitoring, and waste collection and management procedures. Annexes would be added to address country specific approval processes and requirements for conducting an ISB.

To contribute to the project each country will need to survey oil spill response organizations, environmental agencies, and national response groups to provide input on ISB tactics and practices employed in their waters. They will also need to provide regulations and approval processes specific to approving an ISB for their country.

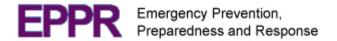
The end product will be a chapter on in situ burning for Arctic that addresses general and nation-specific considerations for employing this method of oil spill response.

b) Estimated Dates of Major Milestones:

1) Obtain EPPR Project Approval – June 2011

2012

- 2) Release Arctic ISB Chapter for review and comment to EPPR/SAOs and IMO (March April 2012)
- 3) Deliver final Arctic ISB Guide Chapter to EPPR/SAO (November 2012)
- c) Implementation strategies -
- 1. Obtain agreement from Arctic countries to participate in the project
- 2. Identify funding source(s) i.e., each participating country bears its own costs and contributes to direct project costs (i.e., printing).

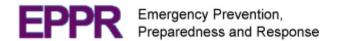


- 3. Identify project co-lead(s) and develop a strong project team of oil spill response experts to develop the chapter
- 4. Coordinate with IMO Committee working on ISB project
- 5. Develop a comprehensive project management plan.
- d) <u>Deliverables and timelines</u> The below proposed timeline is subject to change, and is meant to guide project planning expectations. Project manager will coordinate review periods for EPPR/SAOs and IMO so as to accommodate relevant meeting schedules to the greatest extent possible.

2011 - 2012

- 1) Obtain EPPR Project Approval June 2011
- 2) Form Project Team (July-August 2011)
- 3) Coordinate schedule, etc. with IMO ISB Guide Committee Members (July-August 2011)
- 4) Develop Project Management Plan (July September, 2011)
- 5) Review ISB manuals, ASTM standards and guidance to identify best practices and procedures (on going)
- 6) Collect nation specific approval processes and requirements (July November 2011)
- 7) Develop chapter layout and assign writing assignments (August 2011 February 2012)
- 8) Compile and organize data for draft chapter (January February 2012)
- 9) Release Arctic ISB Chapter for review and comment to EPPR/SAOs and IMO (March April 2012³
- 10) Brief EPPR on status at its semi-annual meetings
- 11) Review comments and incorporate changes (May August 2012)
- 12) Complete final editing and formatting (September 2012)
- 13) Contract for printing and CD production (paper, CD) (August October 2012)
- 14) Deliver Arctic ISB Chapter to EPPR/SAO (November 2012)
- 15) Publicize & disseminate Arctic ISB Chapter (November 2012 June 2013)
- 16) Brief EPPR on status at EPPRs semi-annual meeting.

³ Review dates may change depending on organization's meeting schedule.



e) Timeline Identifying Critical Decision Points:

Subsequent approval schedule to be developed in project plan, which will coordinate IMO and EPPR production schedules; refer to item d) above.

7. Funding:

Each country participating in the project would self-fund activities it undertakes under this project.

8. <u>Link to EPPR Mission / Strategic Plan</u>

The EPPR Working Group is an expert forum designed to:

- Plan and prepare for response to accidents;
- Focus on the environmental implications of emergencies involving oil, hazardous and noxious substances (HNS), radioactive substances, and natural disasters in the Arctic.

This project supports EPPR's third objective which is to:

Improve emergency preparedness programs at local, national, regional and international levels to ensure they are commensurate with the level of risk that exists, including arrangements for mutual assistance.

One of the Initiatives under Objective 3 includes the development of guides as useful tools in emergency preparedness and response.

The project also supports Objective 4, which is to "[i]mprove response capabilities so that they are commensurate with existing threats," and that objective's capacity building initiative, "[t]o maximize the application of research and development, active exchange of knowledge among the Arctic Council countries in the form of educational material" Objective 4 recognizes that "[t]he participation of local and indigenous peoples in the exchange of knowledge and information is very important in achieving successful results."

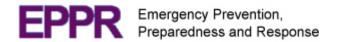
The AMSA Recommendations adopted by Arctic Council Ministers in Tromsø, Norway, requested EPPR to: [c]ontinue to develop circumpolar environmental pollution response capabilities."

This is preparedness and a response project.

9. **Partners**: TBD

10. **Expected Duration**: Start date: July 2011 Completion Date: October - November 2012

11. Final Product:



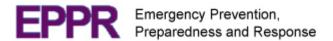
The final product will be a comprehensive IMO ISB Guidelines for employing ISB in the marine environment and EPPR's contribution will be a chapter which specifically addresses ISB in the Arctic marine environment. The Arctic ISB Chapter will provide information for spill response planners, government officials and on-scene oil spill responders on preparing for and conducting an ISB. The Arctic ISB Chapter will be included in the IMO ISB Guidelines scheduled to be produced by the IMO in the fall of 2012.

12. **Other Information**: None at this time.

Attachment: Draft Arctic ISB Chapter outline:

Arctic ISB Chapter Outline

- Challenges and benefits of conducting ISB in ice conditions
 - Restricted access
 - o Locating oil in and under ice
 - Slows weathering
 - Limits effects of winds and waves
 - o Limits spreading of the oil
- Freeze-up (frazil and nilas ice)
 - o thicker slicks required for burn
 - o lower efficiency rates
 - o boom ineffective
 - o oil is being incorporated into the forming ice sheet
- Open water to 3/10 ice concentration
 - Conventional tactics can be used
 - o Less impacts of ice on boom
- 3/10 to 6~7/10 ice concentration
 - o Boom difficult to use
 - Oil concentrates naturally along ice edge and between floes
 - Chemical herders can help thicken slicks
- 6~7/10 to 9+/10
 - Oil concentrated between floes more difficult to access
 - Limited spreading and effects of wind and waves
- Solid ice
 - Once ice is safe contaminated ice and snow can be pushed into pile and burned
 - o Ice and snow can be used to form containment berms and trenches
 - o Oil under ice, ice can be slotted or drilled through to allow oil to surface to burn
 - Spring time oil encapsulated in ice sheet will surface through brine channels and may be burned
- Use of chemical additives

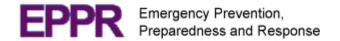


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- o Chemical herder work to contract a spill making it thicker and easier to burn
- o Emulsion breakers to break highly weathered oil to permit burning
- Country Specific ISB Regulations and Requirements
 - o Canada
 - o Denmark
 - o Finland
 - o Greenland
 - o Iceland
 - o Norway
 - o Russia
 - o Sweden
 - United States

Insert regulations/guidelines and/or insert web site addresses to access the information.





Annex 5: NEB Write Up

Emergency Prevention, Preparedness and Response (EPPR) Working Group

Whitehorse, Yukon

2011-06-15/16

NEB presentation

Public Review of Arctic Safety and Environmental Offshore Drilling Requirements

The National Energy Board (NEB or the Board) is an independent federal regulator established in 1959 to promote safety and security, environmental protection and economic efficiency in the Canadian public interest within the mandate set by Parliament for the regulation of pipelines, energy development and trade. The Board reports to Parliament through the Minister of Natural Resources.

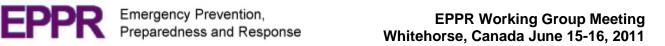
The Board's main responsibilities include regulating the construction and operation of interprovincial and international oil and gas pipelines, international power lines, and designated interprovincial power lines. Furthermore, the Board regulates the tolls and tariffs for the pipelines under its jurisdiction. With respect to the specific energy commodities, the Board regulates the export of natural gas, oil, natural gas liquids (NGLs) and electricity, and the import of natural gas. Additionally, the Board regulates oil and gas exploration and development on frontier lands and offshore areas not covered by provincial or federal management agreements.

In response to the disaster in the Gulf of Mexico, the NEB initiated in May 2010 a review of the safety and environmental requirements for offshore drilling in Canada's unique Arctic environment

This review is to support the ongoing implementation of the requirements for conducting offshore drilling under the *Canada Oil and Gas Operations Act* in compliance with the *Canada Oil and Gas Drilling and Production Regulations*. The review has engaged industry and the public in examining the best available information concerning the hazards, risks and mitigation measures associated with offshore drilling activities in the Canadian Arctic and the measures to both prevent and respond to accidents and malfunctions. The results of the review will be incorporated in the examination, by the Board, of future applications for offshore drilling in the Arctic.

The scope of this review includes:

- Drilling safely while protecting the environment
- Responding effectively when things go wrong
- Lessons learned from accidents, incidents and emergency response exercises, particularly those relevant to northern offshore environments



• Filing requirements (information to be required from an applicant seeking authorization to drill an offshore well)

The review is being conducted in three phases:

Phase 1 – Fact Finding/Information Gathering

Phase 2 – Examination and Consideration of Facts and Information Gathered

Phase 3 – Public Report

The Arctic Review is presently in Phase 2 – Examination and Consideration of Facts and Information

The purpose of Phase 2 is to provide an opportunity for participants to examine and comment on information that has been collected, pose questions, and put forward their views.

Board staff recently held information meetings in May and June in four Northern locations:

- Inuvik, Northwest Territories, 16-17 May 2011
- Whitehorse, Yukon, 19 May 2011
- Iqaluit, Nunavut, 31 May 2011
- Yellowknife, Northwest Territories, 2 June 2011

The Board is also scheduling additional information meetings in other Northern communities in the Inuvialuit Settlement Region (ISR), and Nunavut.

The Board will host a Roundtable Meeting in Inuvik at the Midnight Sun Recreation Centre from 10 to 16 September 2011. The Roundtable will provide participants with an opportunity to examine and comment on all elements of the scope of the Arctic Review, to ask questions and to put forward their views.

All Arctic Review documents and process updates are posted on the National Energy Board's Arctic Review webpage.

Thank you

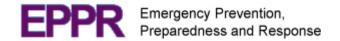
Robert LeMay

Web site links

National Energy Board

http://www.neb-one.gc.ca





Arctic Offshore Drilling Review

http://www.neb-one.gc.ca/clf-nsi/rthnb/pplctnsbfrthnb/rctcffshrdrllngrvw/rctcffshrdrllngrvw-eng.html

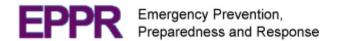
Canada Oil and Gas Operations Act

http://laws-lois.justice.gc.ca/eng/acts/O-7/index.html

Canada Oil and Gas Drilling and Production Regulations.

http://laws-lois.justice.gc.ca/eng/regulations/SOR-2009-315/index.html





Annex 6: Record of Decisions

The following Record of Decisions summarizes decisions made during the EPPR Working Group Meeting.

4.3 Follow up activities to the Behavior of Oil and other Hazardous and Noxious Substances Spilled in Arctic Waters (BoHaSA) report

The Oil Spill Preparedness and Response Task Force should consider whether to include HNS within the scope of its work.

In-Situ Burning will be a follow-up project for EPPR (see item 14).

EPPR should coordinate with industry through Joint Industry Partnership projects that are relevant to Hazardous and Noxious Substances (HNS) and oil spills.

EPPR will address a letter to other AC WGs requesting that they address pertinent BoHaSA report recommendations.

Member Countries will consider recommendations and develop project proposals for the Fall EPPR meeting.

5. The Nuuk Ministerial Mandates - Plenary Discussion Part I: Task Force to Develop an Instrument on Arctic Marine Oil Pollution Preparedness and Response

The United States and Canada will co-chair EPPR's Preparedness and Response Expert Group to support the Oil Spill Preparedness and Response Task Force.

6.1 Arctic Region Oil Spill Response Resource and Logistics Guide - Discussion and Demonstration

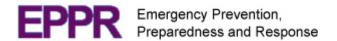
Norway and Denmark/Greenland will provide information on response and logistics to the project.

Project will continue to develop response and logistics information.

6.2 Search and Rescue Pilot Project Arctic Automated Marine Vessel Emergency Rescue Net

Greenland agreed to share information with the Arctic Automated Marine Vessel Emergency Rescue Net (AAMVERNet) project.

6.3 Arctic Rescue Progress on the Arctic Rescue project



EPPR is invited to the "Arctic Forum" meeting to take place September 21-22, 2011 in Archangelsk, Russian Federation. The Russian Federation has also invited EPPR participants to a conference to be held in August 22-25, 2011 in Yakutsk which will focus on emergency preparedness, SAR, oil spills and radiological risks. Igor Veselov is the point of contact for both events.

6.4 Progress on the Development of Safety Systems in the implementation of economic and infrastructural projects

Igor Veselov asked EPPR participants to consider the Safety Systems joint exercise in the Caspian Sea that focuses on coast guard activities and oil spill response.

Ole Bjerkemo invited participants to a SAR and oil spill exercise, and a follow-on workshop to be scheduled in 2012 in northern Norway.

6.5 Update on Radiation Projects

Sweden agreed to host the I-Medical course in the winter of 2011-2012. EPPR will be invited to participate.

13. Summary of the INAC-funded Oil Spill Preparedness and Response WG of the Beaufort Regional Environmental Assessment (BREA)

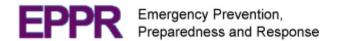
Canada will keep EPPR informed on BREA projects and look for opportunities for EPPR to be involved.

10. The Nuuk Ministerial Mandate – Plenary Discussion Part II - Project brainstorming on Nuuk Declaration mandate: develop recommendations and/or best practices in the prevention of marine oil pollution

Participants agreed to create a Prevention Correspondence Group to lead the Nuuk Ministerial mandate to develop prevention recommendations or best practices. Norway and Canada will co-lead.

The Prevention Correspondence Group will conduct its work in parallel with the Oil Spill Preparedness and Response Task Force.

The Prevention Correspondence Group will host a scoping workshop in October 2011during the same week as the first meeting of the Oil Spill Preparedness and Response Task Force. Other AC WGs will be invited to participate.



The Prevention Correspondence Group will be responsible for communicating with other Arctic Council Work Groups, and for preparing a prevention project proposal to carry out its work. The next EPPR meeting will take place on one day during the same week of the Task Force and Prevention Correspondence Group.

11. Revisiting the Arctic Guide: discussion on the value of the report and currency of emergency points of contact for each country

Participants agreed to update the Arctic Guide in preparation for the work of the Oil Spill Preparedness and Prevention Task Force. Country updates and comments on current text of the Arctic Guide will be submitted to the Secretariat by July 29, 2011.

12. Review of the revised Analysis of Agreements (Gap Analysis) and the Environmental Risk Analysis and Matrices and next steps (EPPR Chair)

Participants agreed to finalize the current draft, titled "Arctic Emergencies: Current and Future Risks, Mitigation, and Response Cooperation," and to present the report before the first meeting of the Oil Spill Preparedness and Response Task Force.

Member Countries will submit revised and new text and any revised risk matrices by September 1, 2011. Updates to the document or matrices should be forwarded to Maria Holleran Rivera.

14. Project Proposal for IMO Arctic Region Chapter: In Situ Burn (ISB) of Oil Spills on Water and Broken and Solid Ice Conditions

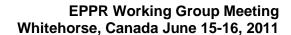
EPPR supports the proposal to draft a chapter on Arctic ISB to be included in an ISB guidelines document which will be proposed for development by the IMO. Canada volunteered to co-lead this effort with the United States. This project is also considered to follow up on the recommendations of the BoHaSA report.

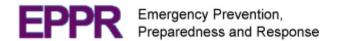
16. Technical Exchanges and Delegation Updates – Permanent Participants and Arctic Council member countries are invited to present on activities relevant to EPPR

The United States will keep EPPR informed of relevant Joint Industry Program (JIP) projects.

17. Administration

Members approved the new website and will let Secretariat know about changes they wish to see to the site. The Secretariat will keep WG apprised of changes and also provide more information on a SharePoint portal for use by the WG and the task force.



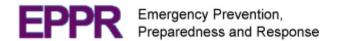


Ole Kristian Bjerkemo was unanimously elected to serve as the new EPPR Chair. Ann Heinrich was elected Vice Chair.

The next meeting location and date are to be determined and will be held in conjunction with the meeting of the Task Force and Prevention Project Group.

[Note: after the EPPR meeting dates and location were decided by correspondence for the prevention workshop, task force, and autumn EPPR meetings. All three meetings will be held in Oslo, Norway during the week of October 17, 2011: the task force meeting on October 17-18, the prevention workshop on October 19-20, and EPPR meeting on October 21.]





Annex 7: Greenland documents for consideration on the Task Force to Develop an Instrument on Arctic Marine Oil Pollution Preparedness and Response.

Document 1: Speech By Kuupik Kleist at Ministerial Meeting

Document 2: Greenland Government concept paper on development of an inter-national offshore oil pollution liability regime and compensation fund

ADDRESS

By Premier of Greenland, Kuupik Kleist. On behalf of Denmark, Faroe Islands and Greenland. The Seventh Ministerial Meeting of the Arctic Council, Ministerial Roundtable, May 12, 2011.

Thank you Madam Chair.

Ministers, Ladies and Gentlemen

In my brief intervention, I would like to address key challenges, opportunities and the priorities of the Arctic Council going forward as far as Denmark, including the Faroe Islands and Greenland, is concerned.

Basically, it is hard to imagine the future without the reality of the Arctic Council at all. The bottom line is that the Council will grow in significance in the years to come, mainly because the Arctic knows no artificial boundaries like the nation-state borders we adhere to today. In this sense, the world will have great expectations of the Council in the future.

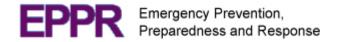
THE USE OF NATURAL RESOURCES

Just like climate change presents challenges when it comes to adaptation, all peoples in the Arctic has to adapt economically as well. For us, it is important to stress the right to develop our own resources, living as well as non-living resources. We are well aware that there are risks involved and we need to address those risks. We are not here to destroy the environment we live off – we have to be responsible guardians of this Earth. We do not see development and environmental protection as two opposite goals. It is not about neither this nor that.

The challenge for us here in the Arctic is to combine what could be interpreted as opposing goals into complementary solutions. We must together ensure that activities take place without causing unnecessary risks to our joint Arctic environment. It is of paramount importance to prevent catastrophes as well as accidents from happening, and therefore we must seek to deploy, and continuously develop, the best available technologies and the best environmental practices in order to reduce the risks to the lowest possible level. However, whenever humans are involved in activities, potential risks are associated. Therefore it is also of paramount importance that we prepare for a worst case scenario across the Arctic.

Therefore, speaking of offshore oil and gas drilling, the Greenland Government believes that there is a compelling need to establish an international mechanism for liability and compensation for oil pollution damage resulting from offshore oil exploration and exploitation. It is our recommendation that we should try and pave the way for the establishment of an international fund that can provide financial security for clean-up activities and compensation in connection with oil pollution from these activities. It is also a cornerstone in our proposal that the oil industry should contribute to provide the financial basis for such a fund.

Greenland continues to acknowledge our national responsibility to ensure that oil companies operating in Greenland seas are fully liable and financial robust to handle all potential commitments and



EPPR Working Group Meeting Whitehorse, Canada June 15-16, 2011

liabilities pursuant to their activities. However as we have seen in so many other areas, often issues are better addressed when we collaborate to find the best solutions. This is the cornerstone of Arctic cooperation. We therefore believe that we can benefit from joint reflection and deliberation upon how this may be addressed at an international level for the benefit of peoples, states and the industry. The Arctic states and communities can play an important role in this, demonstrating our environmental leadership to the world. We will consequently put forward practical suggestions regarding the establishment of an international oil spill fund in connection with the work of the Task Force who is given the mandate of developing an instrument on Arctic marine oil pollution response.

THE RIGHT TO DEVELOPMENT

Though focus on natural science makes perfectly sense in our political thinking and strategic planning, it is equally important to take into account what we, who depend on the health of the Arctic, see as being the most important issue. Arctic is not always about polar bears and ice. What is often neglected in the discussions is the situation of humanity in the Arctic and the conditions in which we live by.

ARCTIC COMMON STANDARDS

At the last ministerial meeting, the Council has endorsed the Arctic Offshore Oil and Gas Guidelines. Oil and gas and other new economic activities are an important field of joint interest and cooperation, and we should continue to build on that.

We see an increasing need to share experiences of economic development activities in the Arctic that are of common interest i.e., mining, fisheries and mega industrial projects, in the context of the Council.

If we – together – can formulate guidelines and minimum standards for new economic activities, the indigenous peoples of the Arctic will be better off in terms of their conservation of traditional knowledge, social structures, cultural practices and, in particular, health. What is needed in general is a more balanced approach to the realities of the indigenous peoples in the Arctic.

In closing, my overall assessment is that it is essential to conserve the democratic governance of the Council in order to maintain the structure of inclusiveness and the principle of consensus decision-making.

In the end, only the Council has the potential and the political will to address issues of relevance to the Arctic peoples, to take advantage of the sophisticated institutions of the member states and, not at least, to ensure that we all keep profiting of the excellent leadership of all involved with this unique council.

Qujanaq - thank you for your attention.

Speech available online:

http://uk.nanog.gl/Emner/News/News from Government/2011/05/address Kuupik ... 31-05-2011

Bureau of Minerals and Petroleum Aatsitassanik !kummatissanillu Pisortaqarfik Råstofdirektoratet



Arctic Council Ministerial Meeting 12 May 2011 Nuuk, Greenland

12 May 2011

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Greenland Government concept paper on development of an international offshore oil pollution liability regime and compensation fund

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Currently an international instrument to address liability and compensation for oil pollution damage resulting from offshore oil and gas exploration and exploitation does not exist. Therefore it is the responsibility of the individual states to formulate terms and conditions regarding liability, financial guarantees and insurance in relation to oil and gas exploration and exploitation.

Greenland already has strict liability provisions and requires significant financial guarantees from the individual companies, including parent company guarantees along with a compulsory insurance.

Greenland acknowledges its national responsibility to ensure that oil companies operating in Greenland offshore areas are fully liable and have financial capacity to meet potential commitments and liabilities regarding their activities. Greenland has a sound and comprehensive liability regime and mechanisms for ensuring financial security.

However, Greenland believes that the international community can benefit from joint reflection and deliberation upon how these issues may be addressed at an international level for the joint benefit of peoples, states and the industry.

Greenland believes there is a compelling and urgent need to establish an international offshore oil pollution liability regime and compensation fund.

The primary benefits would be an international and uniform compensation scheme which ensures:

- (1) that parties suffering damage or loss as a result of oil pollution receive adequate and prompt compensation and
- (2) that oil companies which carry out oil and gas exploration and exploitation pay the compensation - either directly or indirectly by insurance premiums or compensation fund contributions - in accordance with the polluter pays principle.

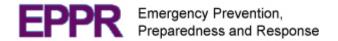
Greenland therefore proposes to develop and implement a new instrument on offshore oil pollution liability and compensation and intends to include appropriate deliberations and work in relation to this in the realm of the Arctic Council Task Force on Oil Spill Preparedness and Response.

Components of an international liability regime and compensation fund

An international liability regime and compensation fund could be based on the following principles:

- The responsible party (licensee or operator) should generally be strictly liable for the damage and obliged to pay compensation to parties suffering damage or loss due to this
- The responsible party should be required to establish and maintain insurance or other financial security to cover compensation claims
- Parties suffering damage or loss including costs to finance clean up of the polluted areas may in some cases be unable to obtain full payment of their reasonable claims from the responsible party and from its insurer or provider of other financial security. In such cases, the parties suffering damage or loss should generally be able to obtain full payment of their claims from an international compensation fund.
- The international compensation fund should have the right to claim reimbursement from the responsible party.
- The financial means of an international compensation fund should be contributed by oil companies which carry out oil or gas exploration or exploitation in states which are parties to the new regime.
- The liability and compensation regime should apply to both national and transboundary/international oil pollution damage





Annex 8: Nuuk Ministerial Declarations

See attached or PDF file attachment here: http://www.arctic-council.org/filearchive/Nuuk%20Declaration%20FINAL.pdf





NUUK DECLARATION

On the occasion of the Seventh Ministerial Meeting of

The Arctic Council

12 May 2011, Nuuk, Greenland

Ministers representing the eight Arctic States, convening in Nuuk, Greenland, for the Seventh Ministerial meeting of the Arctic Council, joined by the representatives of the six Permanent Participant organizations of the Arctic Council,

Recognizing the importance of maintaining peace, stability and constructive cooperation in the Arctic,

Reconfirming the commitment of the Arctic Council to promote environmental protection and sustainable development of the Arctic,

Welcoming the increased cooperation among the Arctic States and peoples in order to address the new challenges and opportunities,

Recognizing that the Arctic is first and foremost an inhabited region with diverse economies and societies and the importance of continued sustainable development of Arctic communities, **recognizing** the rights of indigenous peoples and interests of all Arctic residents, and **emphasizing** the continued engagement of indigenous peoples and communities as a fundamental strength of the Council,

Recognizing that rapidly changing circumstances, in particular the changing climate, have increased the challenges and opportunities facing the Arctic in both volume and complexity, and **underscoring** the importance of strengthening the Arctic Council to address this change,

Hereby:

STRENGTHENING THE ARCTIC COUNCIL

Announce the Agreement on Cooperation in Aeronautical and Maritime Search and Rescue in the Arctic, as the first legally binding agreement negotiated under the auspices of the Arctic Council,

Decide that the Arctic Council should continue to work towards solutions to address emerging challenges in the Arctic utilizing a wide range of approaches,

Decide to strengthen the capacity of the Arctic Council to respond to the challenges and opportunities facing the Arctic by establishing a standing Arctic Council secretariat, hereinafter the Secretariat, in Tromsø, Norway to be operational no later than at the beginning of the Canadian Chairmanship of the Arctic Council in 2013,

Decide to establish a task force to implement the decisions to strengthen the Arctic Council, including any necessary arrangements to establish the Secretariat, and **approve** the composition and mandate of the task force as set out in the Senior Arctic Officials' Report to Ministers 2011 (SAO Report),

Adopt the recommendations of the Senior Arctic Officials (SAOs) on the role and criteria for observers to the Arctic Council as set out in Annexes to the SAO Report , and **decide** to apply these criteria to evaluate pending applicants for observer status,

Adopt the Communication and Outreach Guidelines as set out in the SAO Report and **instruct** the SAOs to develop a Strategic Communications Plan for the Arctic Council,

MAJOR ACCOMPLISHMENTS AND FUTURE WORK

Human Dimension

Note with appreciation and welcome the priority placed on human health issues during the Danish chairmanship, **take note** of the Arctic Health Ministers' Meeting held in Nuuk in February 2011, **recognize** the continued health challenges and **note** the need to improve physical and mental health and well-being and empowerment of indigenous peoples and residents of Arctic communities,

Note the need for a comprehensive overview of human development in the Arctic and **call** for an assessment of the current state of human development in the Arctic and its relationship with climate change and other factors affecting Arctic communities,

Climate Change and Environmental Protection

Recognize that substantial cuts in emissions of Carbon dioxide and other greenhouse gases are the backbone of meaningful global climate change mitigation efforts,

Welcome with appreciation the full report on the assessment of the Arctic Cryosphere entitled "Snow, Water, Ice and Permafrost in the Arctic" (SWIPA), **note with concern** the accelerated change in major components of the cryosphere and the profound local, regional and global effects of observed and expected changes, **emphasize** the need for forward looking Arctic cooperation with a view to increase Arctic resilience and to enhance Arctic Council leadership to minimize the human and environmental impacts of climate change, and **instruct** Senior Arctic Officials to consider how best to follow up on the SWIPA recommendations in the future work of the Arctic Council,

Welcome the Arctic Council reports on Short-Lived Climate Forcers (SLCF), that have significantly enhanced understanding of black carbon, **encourage** Arctic states to implement, as appropriate in their national circumstances, relevant recommendations for reducing emissions of black carbon, and **request** the Task Force and the AMAP expert group to continue their work by focusing on methane and tropospheric ozone, as well as further black carbon work where necessary and provide a report to the next Ministerial meeting in 2013,

Decide to establish a Short-Lived Climate Forcer Contaminants project steering group that will undertake circumpolar demonstration projects to reduce black carbon and other SLCF emissions,

Note with concern that mercury levels continue to rise and present risks to the health of the human population and the wildlife in parts of the Arctic as reported in the 2011 AMAP assessment on mercury in the Arctic, and **support** the ongoing intergovernmental negotiations under the United Nations Environment Programme (UNEP) to conclude a global agreement on mercury that will significantly reduce global mercury use and emissions,

Appreciate actions in support of the implementation of the Stockholm Convention and the Persistent Organic Pollutants (POPs) and Heavy metals protocol of the UNECE Convention on Long-Range Transboundary Air Pollution (LRTAP), and **encourage** countries to continue work to reduce emissions and sign, ratify and enhance the implementation of these Conventions and Protocols,

Reiterate the importance of the use of Arctic Indigenous Peoples' traditional knowledge and capacity-building initiatives in the planning and implementation of measures to adapt to climate change, **recognize** that climate change and

other negative factors have impacted the traditional livelihoods and food safety and security of Arctic Indigenous Peoples and other Arctic residents and communities,

Confirm the commitment of all Arctic states to work together and with other countries to implement the agreements reached in Cancun by the time of the climate talks this year in Durban, South Africa, and in this context **urge** all Parties to the UNFCCC to take urgent action to meet the long-term goal of holding the increase in global average temperature below 2 degrees Celsius above pre-industrial levels,

Decide to establish an expert group on Arctic ecosystem-based management (EBM) for the Arctic environment to recommend further activities in this field for possible consideration by the SAOs before the end of the Swedish chairmanship,

Direct SAOs to review the need for an integrated assessment of multiple drivers of Arctic change as a tool for Indigenous Peoples, Arctic residents, governments and industry to prepare for the future, and, based on that review, to make recommendations for consideration by Arctic Council Deputy Ministers at their next meeting of a possible Arctic Change Assessment, including an Arctic Resilience report,

Arctic marine environment

Decide to establish a Task Force, reporting to the SAOs, to develop an international instrument on Arctic marine oil pollution preparedness and response, and **call for** the Emergency Prevention, Preparedness and Response (EPPR) and other relevant working groups to develop recommendations and/or best practices in the prevention of marine oil pollution; the preliminary or final results of both to be presented jointly at the next Ministerial meeting in 2013,

Welcome EPPR's report "Behavior of Oil and Other Hazardous Substances in Arctic Waters" (BoHaSa) and its contribution to knowledge of the behaviour of oil and other hazardous substances in the Arctic and **encourage** the Senior Arctic Officials to consider the conclusions and recommendations for future Arctic Council activities,

Recognize the important role of the Agreement on Cooperation on Aeronautical and Maritime Search and Rescue in the Arctic for safe transport and enhancing cooperation in assisting people in distress in the Arctic,

Urge the completion as soon as possible of work at the International Maritime Organization to develop a mandatory polar code for ships,

Welcome the progress achieved with the Arctic Ocean Review (AOR) project which considers existing global and regional measures that are relevant for the Arctic marine environment, and **look forward** to the delivery of the final report of the AOR project in 2013, in particular the options and opportunities for strengthening global and regional efforts for the conservation and sustainable use of the Arctic marine environment,

Science and Monitoring

Recognize the importance of the Sustaining Arctic Observing Networks (SAON) process as a major legacy of the International Polar Year for enhancing scientific observations and data-sharing and **accept** the recommendations of the Senior Arctic Officials as contained in the SAO report for the ongoing management of SAON,

Recognize that the International Polar Year (IPY) was the largest circumpolar program on scientific research to date, and **welcome** in 2012 the "Knowledge to Action Conference" in Montreal as the concluding event of IPY and the opportunity it presents to transform knowledge and scientific results into policies that will guide our future actions related to the environment and wellbeing of Arctic communities,

Decide to task the Senior Arctic Officials to consider maximizing the legacy of the IPY by supporting a proposal to arrange an International Polar Decade in light of the rapid climate change of the Arctic and the need for further coordinated research of the Arctic environment and its human dimension,

Welcome the contributions of the Arctic Biodiversity Trends 2010 Report toward understanding the adaptability of nature and living resources in the Arctic to global and regional stressors, and **await** the scientific assessment and policy recommendations from the Arctic Biodiversity Assessment (ABA) scheduled to be completed in 2013,

Congratulate the University of the Arctic (UArctic) on its 10th anniversary, **recognize** its contribution in developing specialized education aimed at building capacity and fostering traditional and scientific knowledge relevant to Indigenous Peoples, Arctic communities and policy-makers, and **encourage** continuous support for the UArctic,

OTHER ISSUES

Adopt the recommendations in the SAO Report to Ministers and **instruct** SAOs to review and adjust, if needed, the mandates of the Arctic Council working groups and task forces and their work plans for 2011-2013,

Reiterate the need to finance circumpolar cooperation, as well as the importance of providing adequate funding to Permanent Participants to support their preparations for, and participation in, the Arctic Council, the working groups, task forces and Arctic Council projects,

Note the Arctic Environment Ministers Meeting in June 2010, and the Arctic Health Ministers meeting in February 2011, and **welcome** further high-level meetings,

Welcome continued cooperation with other relevant bodies,

Thank the Kingdom of Denmark for its Chairmanship of the Arctic Council during the period 2009-2011, and **welcome** the offer of the Kingdom of Sweden to chair the Arctic Council during the period 2011-2013 and to host the Eighth Ministerial meeting in 2013.

