



KOPRI
극지연구소

PAME SUMMARY REPORT 2006-2009 ACTIVITIES

6th Arctic Council Ministerial Meeting
29th of April 2009, Tromsø, Norway

PAME
Protection of the Arctic Marine Environment

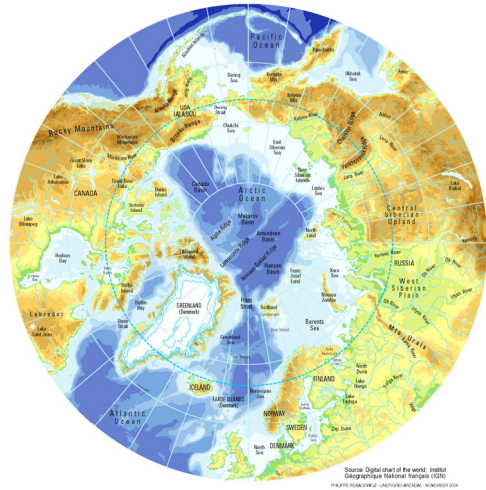


ARCTIC COUNCIL

The PAME Programme

The programme for the Protection of the Arctic Marine Environment (PAME) was established by the Arctic Council Ministers in Nuuk, Greenland, September 1993 with the mandate to address policy and non-emergency pollution prevention and control measures related to the protection of the Arctic marine environment from both land and sea-based activities. These include coordinated action programmes and guidelines complementing existing legal arrangements.

PAME members include National Representatives of the 8 Arctic Council States: Canada, Denmark (including Faroe Islands and Greenland), Finland, Iceland, Norway, Russian Federation, Sweden and United States. Indigenous groups' organizations, termed "Permanent Participants" also participate in PAME, as well as representatives from several observer countries and organizations. Thus, PAME provides a unique forum for collaboration on a wide range of activities directed towards protection of the Arctic marine environment.



ARCTIC SEAS AND COASTAL AREAS

For further information contact:

PAME International Secretariat
Borgir
Nordurslod
600 Akureyri
Iceland

Tel: +354 461 1355

Fax: +354 462 3390

Email: pame@pame.is

Internet: www.pame.is



**PROTECTION OF THE ARCTIC MARINE ENVIRONMENT
PAME WORKING GROUP**

SUMMARY REPORT ON 2006-2009 ACTIVITIES



**6th Arctic Council Ministerial Meeting
Tromsø, Norway
29th of April 2009**



TABLE OF CONTENT

1. INTRODUCTION.....	1
2. DIRECTION FROM SALEKHARD MINISTERIAL DECLARATION.....	1
3. PROGRESS REPORT FOR 2006-2009	1
ARCTIC MARINE STRATEGIC PLAN – IMPLEMENTATION:	1
ARCTIC MARINE SHIPPING ASSESSMENT (AMSA)	2
UPDATING OF THE ARCTIC OFFSHORE OIL AND GAS GUIDELINES:.....	3
UPDATING THE REGIONAL PROGRAMME OF ACTION FOR THE PROTECTION OF THE ARCTIC MARINE ENVIRONMENT FROM LAND-BASED ACTIVITIES (RPA):	4
ECOSYSTEM APPROACH:	5
BEST PRACTICES IN ECOSYSTEM-BASED OCEAN MANAGEMENT IN THE ARCTIC PROJECT (BEPOMAR):	6
4. COLLABORATION WITH PERMANENT PARTICIPANTS, ARCTIC COUNCIL WORKING GROUPS AND OTHER RELEVANT BODIES	6
5. LIST OF DELIVERABLES TO THE 6TH MINISTERIAL MEETING	7
6. PAME WORKING GROUP ADMINISTRATION.....	7
PAME FINANCES:	7
COMMUNICATIONS:	8





1. Introduction

The PAME Working Group addresses policy and other measures related to the protection of the Arctic marine and coastal environment from both land and sea-based activities. These measures include coordinated strategic actions, programmes, assessments and guidelines, complementing existing international arrangements.

2. Direction from Salekhard Ministerial Declaration

The 2006 Arctic Council Ministerial Meeting in Salekhard, Russia endorsed PAME's 2006-2008 activities as follows:

- **Recognize** the development of safe and environmentally secure marine transportation and subsea pipeline development in the Arctic Region as a priority issue closely linked to climate change, technological advance and resource use, which will have economic, social and environmental impact in the Arctic,
- **Take note of** the progress report on the Arctic Marine Shipping Assessment (AMSA) and **encourage** the participating Arctic States and Permanent Participants to provide necessary information so that the full AMSA report, including traditional uses of the offshore by Arctic Indigenous peoples, can be delivered to the Sixth Ministerial Meeting in 2008,
- **Request** PAME to review, update and expand the Regional Program of Action, where necessary, and possibly restructure it to allow for more rapid response to developments and opportunities,
- **Recognize** the importance of the National Programs of Actions as components of the RPA implementation phase, and note the progress in the implementation of the Russian NPA-Arctic.

3. Progress Report for 2006~2009

PAME has held five working group meetings over this period in addition to a number of workshops as noted within each PAME-activity section.

PAME's activities are based on Ministerial mandates as identified in PAME's Work Plan 2006-2009 accompanied by a set of specific actions that have been successfully completed as follows:

Arctic Marine Strategic Plan – Implementation:

- Several of the specific PAME Working Group activities have been aimed at implementation of the Arctic Marine Strategic Plan (AMSP) and related follow up to the Arctic Climate Impact Assessment (ACIA).

Arctic Marine Shipping Assessment (AMSA)

- The Arctic Council's Arctic Marine Shipping Assessment (AMSA) is the culmination of four years of work completed under the leadership of the PAME Working Group. The AMSA report contains a number of findings and recommendations relating to current and future shipping activity in the Arctic which takes into account the advice of experts that contributed to the report, and were further developed through intergovernmental processes in the PAME Working Group and confirmed by Senior Arctic Officials. A team of researchers led by Canada, Finland and the United States reached out to a broad range of stakeholders including, the global maritime industry. With the support of the Permanent Participants, town hall meetings were conducted in a few Arctic communities to obtain local perspectives and concerns about future Arctic marine activity.

- AMSA Report and Research Documents:
 - **AMSA 2009 Report:** Final Arctic Council Report with Findings, Recommendations & Research Opportunities. The *AMSA 2009 Report* provides information to Arctic states, the IMO and others so that they can further enhance marine safety and marine environmental protection in the face of increased shipping activity in the Arctic region. The AMSA 2009 Report also serves to inform interested parties outside the Arctic as to the complexities and challenges of current and future Arctic marine use.
 - **AMSA Research Documents:** Many background/research documents will be available after the 2009 Arctic Council Ministerial meeting to the public/stakeholders through posting on the PAME website and other means. These documents will include an appropriate disclaimer indicating that these do not represent the view of any Arctic State or the Arctic Council.

- A number of expert groups were established to work on each AMSA Section. To support their work, a number of workshops and communication outreach efforts were convened such as:
 - Two scenario workshops held in San Francisco (April 2007) and Helsinki (July 2007).
 - 29-31 October 07 Infrastructure Workshop for AMSA Co-Leads and Contributing Authors Ottawa, Canada.
 - 18-20 March 08 Workshop on Arctic Marine Incidents, University of New Hampshire Coastal Response Research Center, Funding by US NOAA.
 - 25-26 March 08 Ottawa Workshop on Permanent Participant Arctic Marine Use, Funding by Canada's Department of Indian & Northern Affairs.

- 29-30 April 08 - San Francisco Workshop on AMSA Environmental Issues/Impacts Using the AMSA Scenarios; Chapter 6 (Environmental Impacts) outline to be developed.
 - 20-23 July 08 ICETECH08 in Banff, AMSA Sessions.
 - Indigenous Input/Town Hall meetings were convened in Alaska, Canada, Norway (Saami Council) and Iceland (Akureyri and Reykjavik).
 - Extensive networking has been conducted with elements of the global maritime industry; major maritime firms have contributed to the scenarios work.
- Communication efforts have included AMSA website; brochures (in English, Russian, French and Inuktitut); posters; data sharing. The AMSA initiative was profiled at numerous international conferences, workshops and meetings.
 - Other Arctic Council Working Groups have contributed to the AMSA.

Updating of the Arctic Offshore Oil and Gas Guidelines:

- The Arctic Offshore Oil and Gas Guidelines were first published in 1997 and updated in 2002 and again during the 2006-2009 work plan. These Guidelines recommend voluntary standards, technical and environmental best practices, management policy, and regulatory controls for Arctic offshore oil and gas operations.
- The United States as the lead country in Evaluation and Update of the Arctic Offshore Oil and Gas Guidelines convened a PAME Guidelines workshop December 7-8, 2007 in Miami, Florida, immediately following the 2007 International Regulators' Offshore Safety Conference - Improving Offshore Safety Through International Cooperation from December 3 - 6, 2007 in Miami, Florida.
- Inputs have been solicited from Arctic Council country representatives, Permanent Participants, and other experts through the workshop in December 2007, at PAME meetings and through correspondence. This version of the Guidelines has involved substantial contributions from many more participants than the previous version, especially by the Permanent Participants and NGOs.
- The updated guidelines utilized and incorporated additional important Arctic Council guidance and information resources provided since 2002, including the Human Health Report (2003), the Arctic Marine Strategic Plan (2003), the Arctic Climate Impact Assessment (2005) and particularly the AMAP Oil and Gas Assessment and include:
 - Consideration and involvement of affected Indigenous People in all aspects of the process;

- Use of best available technology, best practices, and international standards;
- Use of waste management techniques that avoid routinely discharging pollutants into the marine environment or air;
- Emphasis and guidance on the importance of using specialized monitoring for planning and management of offshore activities.
- The use of integrated and ecosystem-based management of all marine resources and
- Consideration of establishment of special management areas;
- As a result of meetings and active email-based drafting and review sessions, the new Guidelines have undergone the most substantial rewriting and updating in their history including;
 - Sections have been rearranged and combined in a clearer more logical order;
 - New sections have been added including “Compliance Monitoring, Auditing and Verification”, “The Use and Discharge of Chemicals,” and “Emissions to Air;”
 - Many subsections have been substantially rewritten; and
 - An updated and now complete description for all Arctic coastal states of their Environmental Impact Assessment process for offshore oil and gas activities has been added.

Updating the Regional Programme of Action for the Protection of the Arctic Marine Environment from Land-based Activities (RPA):

- The RPA was developed from 1996-1997 and adopted by Arctic Ministers in 1998 as a regional approach to implementing the United Nations Environment Programme (UNEP) Global Programme of Action (GPA).
- Canada and Iceland were the lead-countries for PAME in updating the *Regional Programme of Action for the Protection of the Arctic Marine Environment from Land-based Activities (RPA)*.
- Many changes have occurred in the Arctic marine environment since the publication of the RPA, and in 2006, PAME was tasked by Senior Arctic Officials (SAOs) and Arctic Council Ministers to review, update, and expand the RPA as necessary to respond more effectively to these rapidly changing circumstances. Taking account of a rapidly changing Arctic region is the overarching objective of the RPA update, and as such is an important response to the 2004 Arctic Climate Impact Assessment (ACIA).

- The final draft updated RPA is based on inputs from Arctic Council Working Groups, Permanent Participants and PAME National Representatives and feedback from the RPA Workshop held on September 25th, 2007, in Reykjavik, Iceland
- The RPA has been improved and updated and is an important part of the follow-up to ACIA and the Arctic Council Oil and Gas Assessment. The updated RPA includes:
 - Enhanced integration of recent Arctic Council assessments and knowledge (i.e. AMAP Oil and Gas Assessment (2008), AMAP environmental assessment (2002));
 - Increased emphasis on modern environmental management approaches (i.e. ecosystem-based management);
 - Increased emphasis on ecologically sensitive areas, and habitat alteration and destruction;
 - Increased emphasis on the impacts of climate change (i.e. stability of pollution storage sites, shore erosion, sea ice and permafrost);
 - Increased emphasis on mercury (POPs remain the major concern, however increasing levels of mercury is becoming a priority);
 - New information regarding strategies and actions for States to take in order to meet the objectives related to all significant regional sources (i.e. support collaboration in assessing threats, and exchange best-practices in dealing with all land-based sources of marine pollution);
 - New programme support elements for monitoring and assessing the Arctic marine environment (work with AMAP and CAFF), as well as increasing outreach initiatives with the public and indigenous peoples (i.e. brochures, communication strategies); and
 - Updated data on Russian hot spots (Appendix 2), including a new map identifying 100 hot spots.
- Russia continues to support the RPA through implementation of the Russian NPA-Arctic Project "*The Russian Federation: Support to the National Programme of Action on the Protection of Arctic Marine Environment*".

Ecosystem Approach:

- The United States is the lead for PAME on working towards implementation of the ecosystem approach such as the Large Marine Ecosystem (LME).
- AMSA, the AMAP Oil and Gas Assessment and the updated Regional Programme of Action (RPA) have used the working map of the 17 Arctic LMEs in their work

for descriptive purposes. Further, the Arctic LME approach corresponds with the ecosystem approach promoted within the UNEP Regional Seas, EU Marine Strategy and OSPAR contexts.

- PAME established an LME Experts Group with the aim to develop a methodology that would include socioeconomic considerations and stakeholder participation for evaluating ecosystem change.

Best Practices in Ecosystem-Based Ocean Management in the Arctic Project (BePOMAr):

- The BePOMAr Project is a joint PAME/SDWG project led by Norway.
- The BePOMAr Project produced two reports: a technical background report on Best Practices in Ecosystem-Based Ocean Management in the Arctic and a report on Observed Best Practices (OBP)
- PAME provided input and completed the intergovernmental review process on the Observed Best Practices (OBPs) Report. In reviewing the observed best practices of the Arctic Council Countries have established in developing and implementing ecosystem-based oceans management, the following have been found useful: 1) flexible application, 2) integrated and science based decision-making, 3) commitment to ecosystem-based oceans management, 4) area-based approaches and transboundary perspectives 5) stakeholder participation, and 6) adaptive management.
- PAME did not collectively review or provide input to the BePOMAr technical background report. National inputs were provided directly to the lead country.
- The findings of the (BePOMAr) project complement and provide inputs into the ongoing work of PAME on integrated ecosystem-based management approaches in the Arctic.

4. Collaboration with Permanent Participants, Arctic Council Working Groups and other relevant bodies

- PAME continues to actively communicate with the other working groups of the Arctic Council in implementing its work plan with their representation at PAME meetings.
- The AMAP Oil and Gas Assessment has been fully recognized in the updating of the Offshore Oil and Gas Guidelines as well as in other relevant PAME projects (i.e. AMSA and the Ecosystem-based Approach/LME Project).
- AMAP; CAFF, EPPR and SDWG provided substantive input in updating of the RPA.

- Collaboration and apparent synergies with AMAP and CAFF on the ecosystem approach and, all working groups with particular focus on EPPR and SDWG working groups on the shipping assessment are fully recognized.
- CAFF has emphasized the importance of collaboration within the LME work as it has a direct link with their work plan and mandate. This is also directly linked with a number of activities as identified in the shipping assessment.
- PAME Secretariat continues to participate in UNEP's annual meetings of Regional Seas Conventions and Action Plans. Many of the issues and problems addressed by UNEP have relevance to the Arctic marine environment and the implementation of the RPA.

5. List of Deliverables to the 6th Ministerial Meeting

- PAME 2009-2011 Work Plan
- Arctic Marine Shipping Assessment (AMSA) 2009 Report
- Revised Arctic Council Regional Programme of Action for the Protection of the Arctic Marine Environment from Land-based Activities (RPA)
- Revised Arctic Council Offshore Oil and Gas Guidelines
- Progress Report on the Ecosystem Approach to Arctic Marine Assessment and Management 2006-2008
- The Observed Best Practices (OBP) Report prepared jointly by PAME and SDWG Working Groups.

6. PAME Working Group Administration

PAME Finances:

The finances of the PAME Secretariat are good as a result of a positive response from the member countries in increasing their respective annual contributions and paying them in ISK currency to avoid the discrepancies reflected in the ISK/USD floating exchange rate. The PAME Secretariat provides financial statements including voluntary country contributions and itemized expenditures to the PAME National Representatives at PAME meetings and at the end of each fiscal year.

Communications:

The PAME homepage serves as the main outreach and communication tool. All PAME-related reports, brochures, posters and other resources are available on the homepage at: www.pame.is and many are provided in English and Russian.





PAME

Protection of the Arctic Marine Environment

Borgir, Nordurslod / 600 Akureyri / ICELAND

Tel: +354 461 1355 / Fax: +354 462 3390

Email: pame@pame.is / Homepage: www.pame.is