

2006 Icebreaker and AICC Activities

Carin Ashjian, AICC Co-Vice Chair

AICC



- Margo Edwards (Chair)
 - Carin Ashjian Co-V. Chair)
 - Henrietta Edmonds (Co-V. Chair)
 - Robert Bourke
 - Dale Chayes (RVTEC)
 - Bernard Coakley
 - Rolf Gradinger
 - Peter Minnett
 - Dan Schwartz (RVOC)
 - Rebecca Woodgate
- UNOLS Office

Photo by S. Roberts, HLY0402

AICC Activities 2005/2006

- December 12-13th, 2005 -Meeting in Seattle, WA
- April 18-19th 2006 -Meeting at NSF
- Debrief of one 2006 cruise completed; second to be scheduled
- Reported to National Academy of Science Committee on the Assessment of USCG Polar Icebreaker Roles and Future Needs
- Continued to monitor icebreaker science-local community communication, including urging scientists to contact communities early regarding planned science activities and recommending a single annual planning meeting in Barrow, AK of all interested parties (science, ship, funding agencies, local entities), *including international scientists/ships*, as a useful and efficient means to communicate
- Monitor and maintain interest in issues relevant to Arctic icebreakers from the critical to the near mundane

Healy in 2006

- Four scheduled cruises
 - May 7 - June 5: North-central Bering Sea Biology (Grebmeier/Lovvorn)
 - July 18 - August 22: Chukchi Borderland Seismic Mapping and Sediment Coring (Lawver)
 - Sept.-October: NOAA Mapping (Mayer)
 - October: AUV under-ice testing (Reves-Sohn)



Healy in 2006

- August 17: Lt. Jessica Hill and Petty Officer 2nd Class Steven Duque perished in diver operation in Arctic Ocean 500 miles N of Barrow
- All science operations ceased immediately
- Subsequent cruises (Mayer, Reves-Sohn) cancelled
- Captain Russell relieved of command at end of August; Captain Lindstrom appointed to be new CO on September 30
- Report on cause of accident has not yet been released

Grebmeier/Lovvorn 2006 *Healy* Cruise



- 118 Stations over 30 days
- Water column and benthic sampling
- Marine mammal observations
- Multibeam collected throughout cruise
- Two participants from TREC (Teachers and Researchers Experiencing the Arctic)
- Local resident of Savoonga, St. Lawrence Island joined the cruise for 5 days
- Extensive interaction with local Native Communities before, during, and after cruise
- Two media representatives on ship for last week

Healy in 2007

- Bering Ecosystem Study (BEST): ~ April 9 for 30 days
- Grebmeier/Lovvorn, North-East Bering Sea: ~May 15 for 30 days
- Mayer has requested rescheduling the NOAA mapping cruise for September
- Other cruises? IPY Activities? Presently unscheduled

Polar Sea

- Short-term repairs complete
- Shakedown cruise in late June, including icebreaking
- Will conduct Deep-Freeze 2007 with *Oden*



Polar Star

- Dispatched in January to Antarctica to support Deep Freeze 2006 (breakout of McMurdo Station) after Russian icebreaker *Krasin* lost a blade on one of its screws
- Returned to Seattle and is presently in “Caretaker Status” at USCG Seattle Base



Key Findings of the NAS Report - Sept. 27

- “The US should continue to project an active and influential in both the Arctic and the Antarctic... This requires....polar icebreaking capability to assure year round access....sufficient icebreaking capability to break a channel into...McMurdo Station”
- “The US should maintain leadership in polar research. This requires icebreaking capability to provide access to the deep Arctic and the ice-covered waters of the Antarctic”
- “National interests...require that the US immediately program, budget, design, and construct two new polar icebreakers to be operated by the USCG”

Key Findings of the NAS Report - Sept. 27

- “To provide continuity of US icebreaking capabilities, the POLAR SEA should remain mission capable and the POLAR STAR should remain available for reactivation until the new polar icebreakers enter service.”
- “The USCG should be provided sufficient operations and maintenance budget to support an increased, regular, and influential presence in the Arctic. Other agencies should reimburse *incremental* costs associated with directed mission tasking” (e.g., science missions)
- Polar icebreakers are essential instruments of U.S. national policy in the changing polar regions. To assure adequate national icebreaking capability into the future, a Presidential Decision Directive should be issued to clearly align agency responsibilities and budgetary authorities.

Other things I noticed...

- Ships should be multi-use, should be designed to accommodate science as well as other, non-science CG mission requirements
- Committee identified novel crewing configuration as important to permit longer field seasons

Other AICC Interests

- Continue to improve science support on *Healy* for special equipment intensive cruises (e.g., seismic work) as well as routine data collection and science operations presently under LDEO contract
- Work with all interested parties (local Native communities, scientists, ship operators, funding agencies), including international scientists/ships, to facilitate clear and straightforward communication regarding science plans and upcoming cruises and local community concerns.
- Promote improved communications between USCG, scientists, and funding agencies to best serve needs and goals of science

Next for AICC

- January AICC Meeting in Seattle
- De-briefs for the Lawver cruise
- Continue to advise and assist science community and USCG to facilitate doing science on the icebreakers
- Continue to watch with interest the future of icebreakers
- “Icebreaker Retreat” in December with AICC/science/NSF/USCG to improve relations between all parties and to discuss NAS report
 - 10 people maximum from AICC/NSF/USCG/Science

Transitions....

- Robin Muench will replace Robert Bourke on the AICC in January 2007
- Kate Moran will replace Margo Edwards on the AICC in 2007
- Carin Ashjian will replace Margo Edwards as AICC Chair in 2007