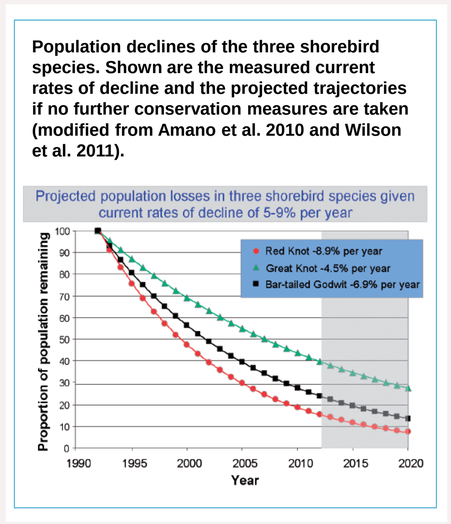
The Arctic Migratory Bird Initiative – Circumpolar Flyway

CAFF Conservation of Arctic Flora and Fauna

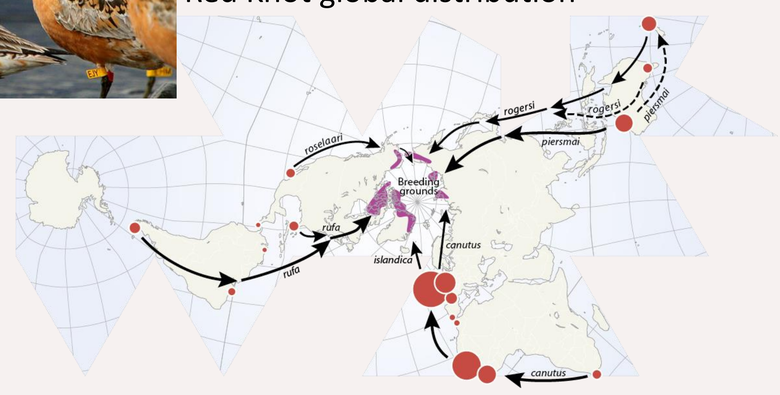
AMBI Arctic Migratory Birds Initiative

AMBI Background: To better understand the status and trends of Arctic flora and fauna the Arctic Council's working group on the Conservation of Arctic Fauna and Flora (CAFF) undertook the Arctic Biodiversity Assessment. Recent global assessments have highlighted that some Arctic-breeding migratory bird species have experienced population declines as much as 80% over the last few decades. The Arctic Migratory Bird Initiative (AMBI) is designed to improve the conservation status and secure the long-term sustainability of declining Arctic breeding migratory bird populations. Through conservation of a shared natural and cultural resource, AMBI will have a positive impact on societies for whom migratory birds are a source of livelihood and spiritual inspiration.



Population declines of the three shorebird species. Shown are the measured current rates of decline and the projected trajectories if no further conservation measures are taken (modified from Amano et al. 2010 and Wilson et al. 2011).

Red Knot global distribution



AMBI provides an early implementation of Recommendation #8 of the Arctic Biodiversity Assessment (http://arcticbiodiversity.is/) to 'reduce stressors on migratory species range-wide, including habitat degradation and overharvesting on wintering and staging areas and along flyways and other migration routes'.

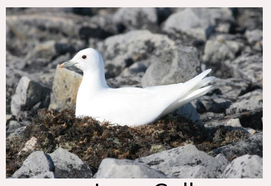
The AMBI Circumpolar Flyway:

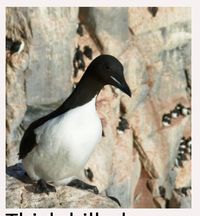
In addition to the traditional flyways identified as areas of concern, the AMBI Expert Group identified a Circumpolar Flyway that covers focal species (mainly seabirds and seaducks) that spend most or all of their life cycle in Arctic regions, and migrate east-west rather than north-south. At a meeting of experts in Montreal in February 2014, bycatch, overharvest, and habitat degradation were identified as the priority conservation issues for focal species on this flyway.

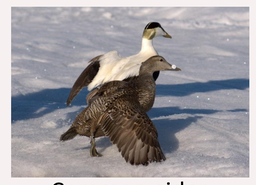
Workplan Objectives:

1. Obtain critical information on key at-sea sites for marine bird aggregations.
2. Mitigate habitat degradation
3. Mitigate seabird and seaduck bycatch
4. Mitigate unsustainable harvest
5. Begin to assess status of poorly known Arctic bird species

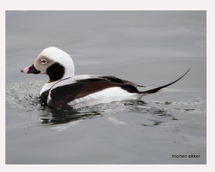
Focal Species:


Ivory Gull


Thick-billed murre


Common eider


Steller's eider

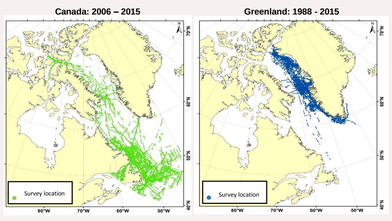

Long-tailed Duck


Snowy Owl

AMBI Circumpolar Activities:

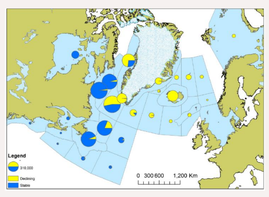
Assessment of marine bird bycatch in Arctic waters – AMBI through the Canadian Wildlife Service (CWS) is supporting increased data collection and analysis of incidental seabird bycatch to assess what species are the most vulnerable to fisheries in the region.

Environment and Climate Change Canada is also currently undertaking a demographic assessment of how the current and projected fisheries with stable levels of bycatch may be affecting seabird populations at the colony and regional scale.



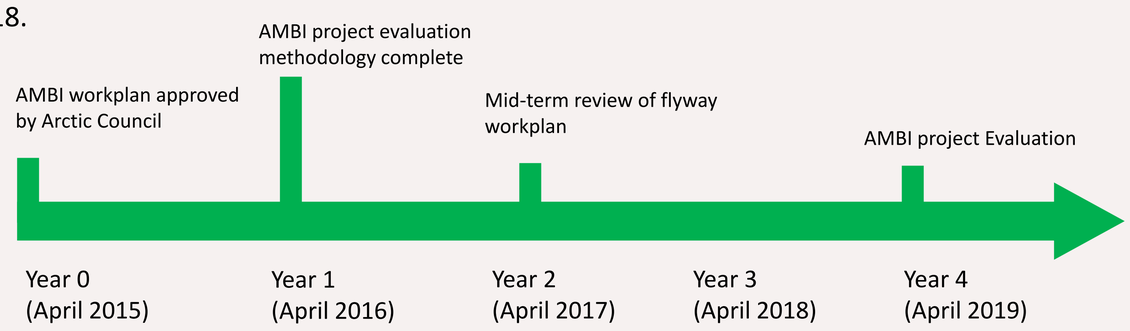
Identification of important seabird habitat – Through CAFF's CBird group there are efforts to merge at-sea distribution data from different countries to help identify regions of international bird importance in the circumpolar region (Wong and Mallory Pers Comm).

Assessment of harvest levels – Through CAFF's C-bird a review of the migration and wintering of thick-billed murres (a species showing declining populations trends) has recently been published, which outlines conservation implications where hunting of this species still occurs in high numbers (Fredericksen *et al.* 2016 *Biological Conservation*).



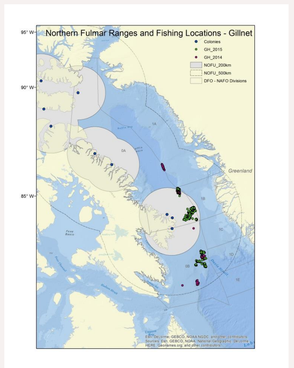
Strong associations between populations status and wintering area detected. Populations wintering in Canadian waters are stable, populations wintering off West Greenland and Iceland are in decline.

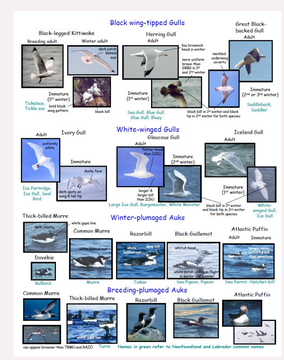
Project Evaluation - AMBI is currently completing the mid-term review of the workplan objectives. The review methodology was approved by the CAFF board in September 2016, and is helping to shape the priorities for the next two years of the project as the first phase of AMBI wraps up in 2018.



Some future steps for AMBI Circumpolar: The first two years of AMBI have focused on gathering data to assess impacts and important areas. The next two years will focus on communicating results to stakeholders to ensure their inclusion in management practices and policies.

1. Continue to improve data collection on seabird bycatch levels in the circumpolar region to undertake demographic assessments examining the potential impacts on seabirds.





2. If deemed necessary work with the fishing industry to develop mitigation practices for gillnet fishing activities.

3. Ensure that important bird areas identified through increased at-sea tracking are incorporated into marine protected area planning processes.

4. Continue to support coordinated efforts to track seabirds at-sea, and examine combined datasets to increase our understanding of how seabirds use marine environments throughout the year.

AMBI Circumpolar is supported by:

ARCTIC COUNCIL

Environment and Climate Change Canada / Environnement et Changement climatique Canada

BirdLife INTERNATIONAL

Circumpolar Seabird Group CAFF