

FLAG EXPEDITION REPORT

Flag Number 24



High Latitudes
Science and Art in the Arctic

Submitted by

Maria Coryell-Martin

June 22, 2011

Flag Number: 24

Title of Expedition: High Latitudes: *Science and Art in the Arctic*

Location of Expedition:

My expedition, *High Latitudes*, was in East Greenland, at about 74 degrees N. Our base of operations was Daneborg Station in the NE Greenland National Park, which provided support for our field camp on nearby Sand Island. This island, located at the mouth of Young Sound at approximately 74°15'44" N, 20°9'44", is a dynamic 300m x 500m sandy subaerial terminal moraine. During the summer months, the island is a popular haul out site for walrus that feed on clams in Young Sound. Arctic Terns, Sabine's Gulls, and Eider Ducks also nest on the predator free island.

In addition to my time on Sand Island, I took a side expedition with NANOK, trapper hut restoration team. We traveled to the nearby Clavering Island and repaired the Dahls Skaer hut (74°9'35" N, 20°18'30" W).

Dates of Expedition:

I left my home on July 17 and returned on August 12, 2010. Reaching the remote Daneborg Station on the East Greenland coast took several days' travel. I met the team in Copenhagen and together we traveled north via Iceland on commercial and then charter flights. (*Full itinerary listed in Attachment 3, p.8*)

This was my first time traveling to East Greenland and working with Dr. Erik Born. In 2005, however, I painted for three months in West Greenland, funded by a Thomas J. Watson Fellowship. During that period I visited diamond prospecting geologists camps, Summit Station (supported by the National Science Foundation), and was hosted as artist-in-residence for seven weeks by the Upernavik Museum. My *High Latitudes* 2011 expedition is a continuation of my passion for the Arctic and raising environmental awareness through art.

Expedition Participants:

- Dr. Erik Born, head scientist
- Sigga Joensen, field assistant and science technician
- Lars Øyvind Knutsen, biologist and field assistant
- Steen Anderson, documentary film-maker and field assistant
- Maria Coryell-Martin, expedition artist and field assistant

Expedition Sponsors and Funding:

The fundraising goal for my *High Latitudes* fieldwork was \$8,000. I raised \$7200, through the support of individuals as well as the Allied Arts Foundation which enabled tax-deductible donations. Dr. Born generously sponsored my field expenses.

Purpose of Expedition:

The Arctic Circle at 66 degrees, 32 minutes north, delineates the beginning of the rugged, expansive, and often frozen Arctic region. Ecosystems with specialized flora and fauna are in delicate balance and vulnerable to changes in climate and pollution. Throughout the Arctic, glaciers are retreating, sea ice is in decline, and the region is under pressure for mineral and oil exploitation.

Before facing these environmental challenges with action, we must first pay attention. My goals in joining Danish scientist Dr. Born for my *High Latitudes* 20110 expedition were to have the opportunity and resources for travel in remote NE Greenland and to learn about local natural and cultural history. On this expedition, I had the opportunity to work with Dr. Born in the tradition of naturalist artists such as Edward Wilson in Antarctica, and to document my experiences and the environment through field sketches, audio recordings, and photographs. This art, and the work it inspires in my studio, contributes to my growing portfolio of polar and glacier-themed art that may be used to promote scientific outreach and environmental stewardship.

The Expedition Experience:

The scientific objectives for Dr. Born were to collect skin samples from the local walrus population as well as to tag five animals with satellite transmitters. Sigga Joensen also aimed to collect data loggers from Arctic Terns that had been tagged in previous years.

As expedition artist, I had time for my own painting as well as meeting other projects based in Daneborg. Members of the Danish military Sirius Dog Patrol shared their experiences with me, I met the National Geographic photographer Paul Nicklen and his team, I accompanied volunteers from the NANOK organization on a trapper hut restoration project, and visited with other geologists, marine biologists, and archeologists in the area. Daneborg, being north of Greenland's native settlements, did not provide me with the opportunity to meet Greenlandic communities.

East Greenland in July and August was mostly snow free, and ice would appear and disappear from Young Sound depending on the wind and currents. Small wildflowers were in bloom and the region hosts nesting colonies of arctic terns,

eider ducks, and Sabine's gulls. I also saw arctic foxes, walruses, seals, arctic hares, musk oxen, and my first polar bear.

As a precaution for polar bears, all field teams are required to carry two rifles, as well as flares and signal pistols. While sketching on Sand Island, I carried the signal pistol with me at all times, and while on the mainland (and further from other people), I carried a radio, signal pistol, and rifle. Dr. Born warned me to be attentive for bears, and that the last documented attack in Greenland was on an artist in the 1920s. I did not want to be next! In spite of our vigilance, we were startled by one young bear on July 23, while watching walruses. When we noticed what appeared to be a young bear advancing down the beach towards us and the walruses, we retrieved the rifle and were relieved as the bear ran into the water and swam up Young Sound. The following week a less fortunate encounter occurred on nearby Clavering Island when a Danish archeologist was attacked. His partner had to shoot the bear, and the archeologist suffered minor injuries to his wrists and thighs.

Once the archeologist was evacuated, marine biologists retrieved the carcass by boat and visited Sand Island. Dr. Born is a polar bear expert, and Steen and Sigga are experienced with taking tissue samples for scientific research, such as investigating pollutants present in the animals. Steen, Sigga, and I boarded the boat and headed to Daneborg to butcher the bear. I interviewed the man who was attacked, and sketched the butchering process. The skin was cleaned and given to the Greenland government, and we respectfully ate polar bear for dinner the following three nights so as to not waste the meat.

After the Sand Island field work, I had the opportunity to join a team from the NANOK organization, which restores old trapper huts along the NE Greenland coast. These huts provide shelter, a stove, and emergency food to anyone who may be in need.

The field work was a fantastic experience with many highlights. I loved lying flat on the warm beach of Sand Island, listening to the walruses breathe while feeling the deep sounds resonate throughout my body, sketching under the midnight sun, and watching ice drift in and out of Young Sound.

Expedition Techniques:

I met Dr. Born in 2009 via email, introduced by our mutual friend and colleague Dr. Kristin Laidre, a biologist who specializes in narwhal and polar bear research. Dr. Born was enthusiastic about my work and collaborating in the field together. He supported much of the field work, applying for permits and arranging transportation. For day to day work on Sand Island, we were a small team and all pitched in on cooking and camp management. I sketched every day, using ink and watercolor media. My small field notebook contains 5" x 7" paper, and I also completed larger 11" x 17", 5.5" x 17" and 8.5" x 11" watercolor sketches. In

addition to painting, I recorded audio with an Olympus LS-10 Linear PCM recorder, and took photos with a Canon G5 camera.

Expedition Results

I completed the expedition with over 100 pages of field sketches, as well as dozens of audio recordings and hundreds of photos. Working with Dr. Born and meeting other professionals gave me the opportunity to learn about the natural and cultural history of the region as I sketched it.

My *High Latitudes* field work fits into the larger context of raising awareness for climate change and promoting environmental stewardship. Since returning home from the field, I have developed a multimedia presentation that I have given in schools as well as at free community events. In March 2011, I participated in the 4-day Polar Science Weekend (PSW) event in Seattle that promotes polar science and education. The event is co-hosted by the Pacific Science Center and University of Washington's Polar Science Center and receives thousands of visitors (attendance in 2009 surpassed 20,000). At PSW, I shared my art and field techniques through an exhibit and presentation, and also gave a "Tools for Observation" workshop.

On my blog, I have published narratives about the expedition which include multimedia features (see attachment 3), and I am developing a hard-bound "Expedition Journal" to be self-published in the fall of 2011. In my studio, I am creating a series of paintings for exhibit November 2011—January 2012 in the Washington State Convention Center.

My next steps include planning future exhibits and expeditions to continue building my portfolio of polar and glacier themed work. Narwhal biologist Dr. Kristin Laidre has invited me to her research camp in spring of 2013, and this fall I will begin applying for grants (*any suggestions are welcome*). I may also collaborate with WINGS member Dr. Erin Pettit who is including my work in an NSF proposal to study Blood Falls in the Dry Valleys of Antarctica. If funded, I will be the team's expedition artist and outreach coordinator.

In advising young explorers, I always offer the advice my first grade teacher gave me: "a creative person is never bored." I like to add to that, "do not be afraid to make up your own job title and follow your dreams!"

Attachment 1: Maps



74° N, East Greenland

Primary locations:

- Daneborg
- Sand Island
- Clavering Island



Attachment 2: Biographies



Dr. Erik Born

Senior Scientist, Greenland Institute of Natural Resources, Department of Birds and Mammals, walrus and polar bear expert

Sigga Joensen

Science technician from the National Environmental Research Institute, assisting with walrus research and Arctic Tern study

Lars Øyvind Knutsen

Biologist and high school teacher, assistant to Dr. Born with walrus research

Steen Anderson

Documentary film maker and editor-in-chief at Hunter's Magazine in Denmark, field assistant and videographer/photographer for Dr. Born

Maria Coryell-Martin

Expedition artist and field assistant

July 17—August 12, 2010

July 17	Seattle—Copenhagen (Denmark)
July 18	Copenhagen layover
July 19	Copenhagen—Reykjavik—Akureyri (Iceland)
July 20	Akureyri—Constable Point—Zackenburg Station—Daneborg (Greenland)
July 21	Daneborg, equipment prep and painting
July 22	Daneborg—Sand Island (by boat) and establish camp
July 23	Sand Island, walrus research and field sketching, (first polar bear sighting), use Sand Island as base for activity through August 1
July 31	Local polar bear attack and visit to Daneborg to butcher and take scientific samples of bear
August 1	Take down camp and return to Daneborg
August 2	Daneborg sketching and meeting geology research teams
August 3	Daneborg—Clavering Island, boat trip with NANOK hut restoration team
August 4	Clavering, sketching
August 5	Clavering, sketching
August 6	Clavering—Daneborg (boat) and helicopter trip to the SW Coast of Shannon Island to look for walruses (none present)
August 7	Daneborg—Sand Island, walrus tagging
August 8	Daneborg, local explorations and sketching
August 9	Daneborg, windstorm delays travel
August 10	Daneborg—Constable Point
August 11	Constable Point—Akureyri—Reykjavik—Copenhagen—
August 12	Arrive Seattle

Narratives

Please visit my website

- <http://expeditionaryart.com/projects/high-latitudes/>
- <http://expeditionaryart.com/blog/2010/08/high-latitudes-part-1-onward-and-upward/>

Attachment 4: Photos

Please visit my website for more images: expeditionaryart.com/projects/high-latitudes/



Arriving Greenland



Sand Island, first sighting



Sand Island field camp with Clavering Island in the distance



Sketching walrus



Restored Dahls Skaer trapper hut by NANOK



Myself, WINGS Flag 24, and walrus on Sand Island

Attachment 4: Sketches

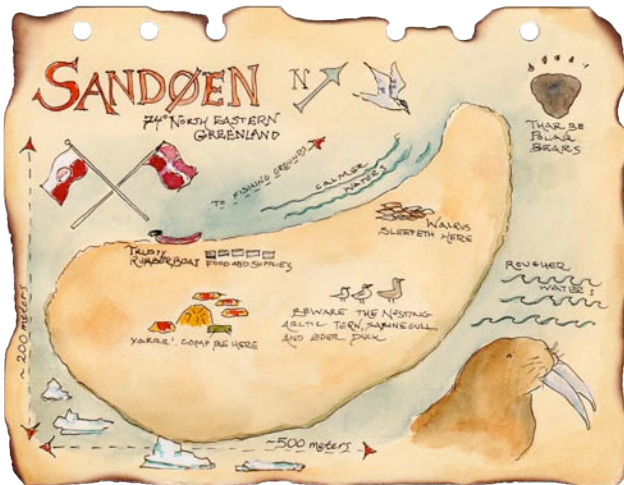
Please visit my website for more images: expeditionaryart.com/projects/high-latitudes/



Walrus studies, 7" x 5" ink and watercolor



Walrus study, 7" x 5" ink sketch



Sand Island Pirate Map, 7" x 5" ink and watercolor



Polar Bear Skin, 7" x 5" watercolor



Sandodden, Restored Hut, 7" x 5" ink and watercolor



Ice off Sand Island, 17" x 11" watercolor