

**NOTES FROM THE DIRECTOR:  
THE ASC AT THIRTY (1988–2018)**

By William Fitzhugh

The Arctic Studies Center (ASC) turned 30 this year. 1988 does not seem that long ago, but the old adage, “time flies when you’re having fun!”, is certainly apt. The occasion of our “pearl” anniversary seems like a good moment to reflect on our past and to share thoughts about what lies ahead.

Our most important accomplishment is surely survival! As a component of the U.S. Government—although shielded by ‘Mother Smithsonian’—survival from one decade to the next is not a given by any means. The ASC began as a special program of the NMNH in 1988 (shortly after passage of the 1984 US Arctic Policy Act) when, with Senator Ted Stevens’ help, the Smithsonian received a line item appropriation from Congress to establish an Arctic Anthropology and Biology program. For lack of funds, the biology part never materialized. A budget of \$250,000 was granted the first year and in 1989 was increased to \$350,000, allowing us to hire a small staff. The remaining funds gave us an operating budget which has since dwindled to zero, being only partially replaced in 2012 by proceeds from the Tiger Burch endowment.

In the years following 1988, **Stephen Loring**, **Igor Krupnik**, and a program assistant (**Kim Wells**) joined the ASC at a time when much of our energy was

devoted to touring *Crossroads of Continents: Cultures of Siberia and Alaska* and laying the groundwork for a regional ASC office in Alaska. During the 1980s, the popularity of the ASC’s *Inua* and *Crossroads* exhibitions demonstrated the need for a permanent Smithsonian presence in Alaska to showcase its collections, engage researchers, and build educational programs. Anchorage won the competition over Fairbanks for our field site, and in 1993 we signed an MOU with the Municipality of Anchorage to partner with the Anchorage Museum, then under the direction of **Patricia Wolf**. **Aron Crowell**,

who had been the co-curator of *Crossroads*, was appointed director of the ASC Alaska office in 1994. Crowell launched his Gulf of Alaska archaeological research program and joined forces with the newly-created Alutiiq Museum in Kodiak to produce ASC’s first community-partnered exhibition, *Looking Both Ways: Heritage and Identity of the Alutiiq People*, which opened in 2001 and toured through 2003. The advantage of having an Alaska base was proven early by the extensive collaboration it allowed

with Alutiiq elders and scholars, and ASC went on to cultivate a broader statewide network of Alaska Native, agency, and university partners.

In 1998 Crowell began working with the Anchorage Museum on a grand exhibition of Smithsonian collections gathered during the heyday of early Alaska natural history and anthropology led by **Spencer Baird** and Alaskan naturalists including **William Healy Dall**, **Robert Kennicott**, **Lucien Turner**, **Edward Nelson**, and **John Murdoch**. The Smithsonian gallery



*The new Rasmuson wing at the Anchorage Museum and SI Secretary Wayne Clough and ASC Anchorage Director Aron Crowell at the opening of the ASC exhibition Living Our Cultures: Sharing Our Knowledge in 2010*



Stephen Loring, Bill Fitzhugh, Dosia Laeyendecker, Kim Wells, Tori Oliver, and Igor Krupnik in 1992

at the Anchorage Museum, and the new museum wing which houses it, took over a decade to plan and build. Funding for the museum expansion came from federal, state, and foundation sources, including a \$50M gift from the late **Elmer Rasmuson Sr.**, then President of the National Bank of Alaska. **Crowell** led a series of “reverse expeditions” to Washington with Alaska Native consultants to research and select over 600 NMNH and NMAI objects for the exhibition, and directed the project in consultation with Alaska Native cultural leaders and educators. **Dawn Biddison**, the Alaska exhibition co-curator and program manager, joined the office in 2003 and has made important contributions in all areas. The completed exhibition, *Living Our Cultures, Sharing Our Heritage: The First Peoples of Alaska*, opened in 2010 and has provided enjoyment and education for hundreds of thousands of visitors from Alaska and around the world. *Living Our Cultures* was designed so that the objects on display can be easily removed for study in collaborative arts, language, and heritage projects, which the ASC Alaska office organizes in collaboration with Alaska Native community partners.

The ASC Alaska office—through its research, exhibitions, and educational programs—has received wide acclaim as a model for innovative museum anthropology and community outreach, demonstrating the potential of cultural heritage as a sustaining and restorative force. **Aron Crowell** has proposed a new Smithsonian exhibition for 2022, when current loan agreements expire, that would explore diverse themes of Circumpolar Indigenous Knowledge from technology and design to ecological understanding and oral tradition. The new exhibit would bring renewed commitment to the Smithsonian-Alaska connection that has been the centerpiece of the Arctic Studies Center’s first thirty years.

Other than activities in Alaska, the ASC’s middle years, 1998–2008, saw many developments on the mall. More completely discussed in our 2008 Newsletter #16, they included major exhibitions like *Arctic: A Friend Acting Strangely* (2006–2007) (the Smithsonian’s pioneering exposition of Arctic climate change); *Ainu: Spirit of a Northern People* (1999) developed with Japanese and Ainu colleagues, and the block-buster, *Vikings: the North Atlantic Saga* (2000), produced with Scandinavian scholars and funding. Along with exhibits and catalogues, we initiated studies of Bronze Age Mongolia, community archaeology in Labrador, environmental archaeology in Southeast Alaska, documentation of indigenous knowledge and observations of climate and sea ice change on St. Lawrence Island, and early Inuit-European contact archaeology on the Quebec Lower North Shore. A string of articles and books appeared on these and other topics.

Many of these activities have continued through the last decade as our programs (like ourselves!) matured. **Aron Crowell** and **Dawn Biddison** developed their museum-based education programs, and **Crowell** collaborated with Tlingit communities investigating connections between oral history, climate, and archaeology. **Stephen Loring** continued archaeological work with the Labrador Innu and became the go-to guy for knowledge about the Smithsonian Arctic collections, photographs, and films. The Quebec archaeological work successfully established the first definitive evidence for Inuit occupancy in the northeastern Gulf of St. Lawrence. **Igor Krupnik** became a lead social science organizer for the International Polar Year 2007–08, and ASC hosted the largest-ever Inuit Studies Conference in 2012. A string of exhibitions appeared, including *Genghis Khan and the Mongol Empire*, *Gifts from the Ancestors: Ancient Ivories from the Bering Strait* (with Princeton Art Museum), *Arctic Journeys—Ancient Memories* (with the National Museum of American Indian), and *Narwhal: Revealing an Arctic Legend* (now at NMNH)—all with illustrated catalogues. Prize-winning books like *Early Inuit Studies* (2016), *Maine to Greenland* (2013), and *Yupik Transitions* (2013) were published, and *the Arctic Crashes: People and Animals in the Changing North* research project was launched, completed, and its concluding book is in press.

We inaugurated an annual Ernest S. Burch Lecture, conducted festivals of Greenland and of Alaska at NMNH, built a huge ASC website and maintain the ASC blog *Magnetic North*. The current *Narwhal* exhibition will be extended by a Smithsonian Traveling Exhibits Service (SITES) tour for several years, and ASC and SITES are developing an exhibition on the boreal forest to promote appreciation for the largest—yet little known—forest on

earth. This *Newsletter* issue provides a window to our diverse activities conducted in the past year.

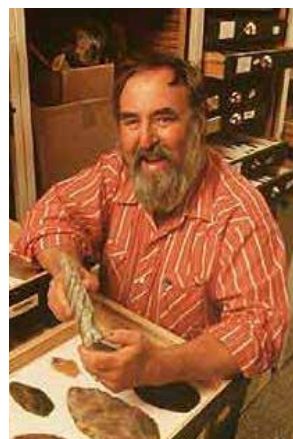
These highlights provide a glimpse of how the ASC has developed over the past thirty years. We owe much to our colleagues for our record. These activities could not have been carried out without a vast network of friends and researchers from NMNH, the Smithsonian, and the wider world. Our research collaborators and associates, our office staff (**Nancy Shorey**, **Dawn Biddison**, and Anthropology and Museum helpers), and a host of Research Associates, students, and interns have brought labor, life, and light to our work.

Looking forward, our next decade will no doubt bring many changes, not least in administration, new research areas, and staff. **Igor Krupnik** has become Chair of Anthropology (as of 2018), and **Ian Owens**—hailing from the Natural History Museum in London—has become Deputy Director of Natural History, assisting museum management with Director **Kirk Johnson**. **John**

**Davis**, art historian from Smith College has become Smithsonian Provost, and our current Secretary, **David Skorton**, will step down in June 2019, and we lost **Dennis Stanford**, a colleague and a friend in April 2019.

Meanwhile, ASC has a plate-full of new programs, like the centennial celebration of **Knud Rasmussen's** 1921–24 Fifth Thule Expedition (FTE), the Danish research enterprise that began in Greenland and ended in Chukotka and established the field of Inuit Studies then known as “Eskimology”. Recently we launched *Fifth Thule Expedition* with an ASC-organized symposium at the 2019 Alaska Anthropological Association meetings in Nome, Alaska. Akin to our seminal Crossroads endeavor that launched the ASC’s “thousand ships,” we expect FTE will provide an exciting new field of opportunities for research, exhibition, collection evaluation, and interaction with colleagues and indigenous partners from—in Rasmussen’s memorable phrase—“across Arctic America.” Stay tuned!

#### DENNIS STANFORD (1943–2019)




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ASC Facebook Account: <https://www.facebook.com/pages/Arctic-Studies-Center/133066950060693>

ASC Anchorage *Sharing Knowledge* website: <http://alaska.si.edu>

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## ASC ANCHORAGE, ALASKA OFFICE

ARTIFACTS TO LIVING ART  
AT QUINHAGAK

By Aron L. Crowell

Artifacts are coming to life at Quinhagak (properly Kuinerraq, “new river channel”), a coastal Yup’ik village of 694 residents just south of Kuskokwim Bay on the Bering Sea. The village has a long and storied history and is today the scene of a cultural revival inspired by discoveries from the past.

The story begins with archaeological excavations at the nearby site of Nunalleq (“old village”), undertaken since 2009 by archaeologist **Richard Knecht** and the University of Aberdeen in partnership with the local Alaska Native village corporation Qanirtuuq Inc. It continues through heritage education projects at the Quinhagak School inspired by the dig, the opening of the village’s own cultural and archaeological research center in August 2018, and the launch in May 2019 of the Arctic Studies Center’s *Yup’ik Twined Baskets: Renewing an Ancestral Art*, a community-partnered arts documentation and teaching project inspired by centuries-old basketry found at the Nunalleq site.

Nunalleq may be the original location of Quinhagak and was founded around 1500 AD alongside an old channel of the Arolik River. Its frozen soils preserve a fabulous abundance of organic artifacts made of grass (baskets, mats, ropes), wood (bentwood boxes, dolls, arrows, animal carvings, dance masks), and bone as well as stone tools and pottery. Human remains and a burned and collapsed sod house riddled with arrow points give evidence of a massacre by raiders from another village in about 1650 AD, an episode that has been carried forward in oral traditions about the pre-contact Bow and Arrow Wars.



*A contemporary open-weave, twined grass basket from Quinhagak. Photo by: Erika Larsen for the University of Aberdeen, courtesy of Richard Knecht*

**Warren Jones**, the president of Qanirtuuq, Inc., recognized the scientific significance of the Nunalleq site when it was first exposed a decade ago by coastal erosion. He also saw a unique opportunity to explore community history, engage Quinhagak youth with their Yup’ik heritage, and connect the artifacts to living arts.



*Lance Anaver of Quinhagak with an issran harvesting basket, 2015. Photo by Erika Larsen for the University of Aberdeen, courtesy of Richard Knecht*



*The Quinhagak Dancers celebrate the culture center opening. Photo by Aron Crowell*



Jones invited Knecht and the University of Aberdeen team to begin scientific excavations and to involve community members and the school. The corporation funded the dig for several years until major grant funding could be obtained from the UK Government's Arts and Humanities Research Council. Qanirtuuq Inc. also constructed the Nunalleq Culture and Archaeology Center, which houses over 60,000 artifacts that were cataloged, conserved, and returned to the village by the University of Aberdeen in time for the Center's grand opening in August. These include over 3,000 woven grass baskets, mats, and fragments that were treated at Aberdeen by conservator **Julie Masson-MacLean**. I attended the opening festivities for the new center and participated in a two-day advisory committee workshop to plan programming and management.

The Arctic Studies Center's upcoming twined grass basketry project in Quinhagak, hosted by Qanirtuuq Inc. and funded by a \$32,000 *Journey to What Matters* grant from The CIRI Foundation, will produce a weaving workshop taught by two distinguished artists from the community—**Grace Anaver** and **Pauline Beebe**—who have retained the knowledge of how to weave open-twined *issran* harvesting baskets. This

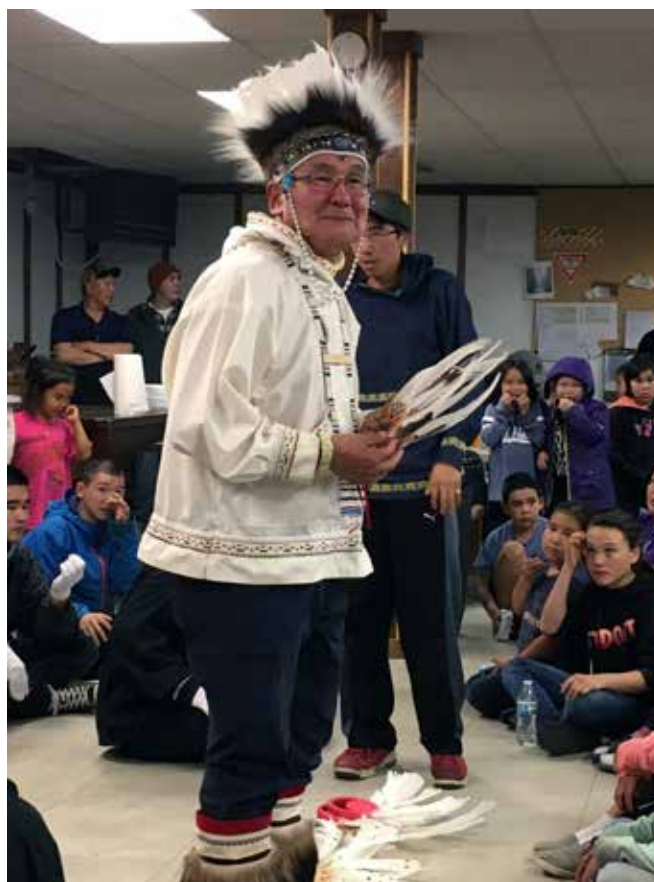
older style of weaving, which was used exclusively by ancestral Yupiit at Nunalleq, was surpassed in popularity a century ago by the newer coiling method, which involves stitching bundles of grass in a spiral to form a stiff, rounded basket. Weaving styles changed under the influence of Moravian missionaries who encouraged coiled basketry as more suitable for the commercial curio market.

Now Quinhagak basket makers are inspired to revive the softer, twined style of weaving for its beauty and adaptability, its heritage value, and its potential to capture new interest in the Alaska Native arts market, where such bags are currently not available. They will have the opportunity to learn the style from Grace and Pauline during the workshop in August and to study archaeological examples in the Nunalleq culture center collections. These examples are beautifully preserved and mounted, and demonstrate various types of knots, spacing, and twisting of the grass strands.

Arctic Studies Center assistant curator **Dawn Biddison** will video-document the workshop and the artists' weaving process for production of an instructional video that will be distributed in the Yup'ik region on DVD and



*Eva Malvich, former director of the Yup'ik cultural center in Bethel, picking beach grass for basket weaving on the shore of the Bering Sea at Quinhagak. Taken on opening day of the Nunalleq Culture and Archaeology Center in Quinhagak.  
Photo by Aron Crowell*



*Chuna McIntyre leads the dancers at the opening of the Nunalleq Culture and Archaeology Center.  
Photo by Aron Crowell*



*A child looking at artifacts in the Nunalleq Culture and Archaeology Center on opening day. Photo by Aron Crowell*

posted on the Arctic Studies Center's YouTube channel. The class will be bilingual in Yup'ik and English, providing the opportunity for linguistic documentation of the basketry lexicon, assisted by Yup'ik translator and community liaison **Jacqueline Cleveland**.

In late July, Dawn will return to Quinhagak to document grass harvesting and preparation. Grass picking was traditionally undertaken in the fall after the first frost when the blades would dry and turn a clean tan color, but with present climate warming and prolonged autumn rains the grass becomes discolored with dark spots. An emerging practice is to harvest grass in mid-summer when it is still bright green, then to carefully hang and dry it for a prolonged period indoors to make it ready for weaving. Grace looks forward to sharing her art and extensive cultural knowledge with members of the Smithsonian National Board when they visit the Alaska office of the Arctic Studies Center on July 22, 2019.

## **EARTHQUAKE REPAIRS TO THE LIVING OUR CULTURES EXHIBITION**

*By Aron L. Crowell*

The Anchorage Museum and the Arctic Studies Center recently hosted an expert "earthquake relief" team of collections and conservation staff from the National Museum of Natural History and National Museum of the American Indian (NMAI), who came to Anchorage on February 24, 2019 to prepare for repairs to the Smithsonian exhibition *Living Our Cultures, Sharing Our Heritage: The First Peoples of Alaska*. Glass end-panels on three of the large exhibition cases cracked during the major earthquake that struck Anchorage on November 30, 2018, and the objects they contained needed to be carefully

removed and placed in temporary storage before case repairs could begin. **Kelly McHugh** and **Adrien Mooney** from NMAI, along with **Dave Rosenthal**, **Kim Cullen Cobb**, and **Allison Butler** from NMNH, worked with the Anchorage Museum's **Monica Shah** and her staff to deinstall 211 objects from the Yup'ik, St. Lawrence Island/Siberian, and Sugpiaq/Unangax cases and to assess all 600 objects in the exhibition for any evidence of earthquake damage. Anthropology Department chair **Igor Krupnik** visited to review the work in progress and to plan additional NMNH staffing commitments needed to complete the project.

The Smithsonian team flew back to Washington DC on March 3, 2019 at the end of a very productive week and will return to Anchorage in early April to reinstall the objects. In the interim, exhibition fabricators **KubikMaltbie** will remove and replace the broken glass panels—each weighing about 1500 lbs—using specialized tools and lift equipment. The gallery, which has been closed since November 30, 2018, is expected to reopen on April 13, 2019 in time for the first spring visitors and to welcome the Smithsonian National Board when it meets in Alaska during July 21–26, 2019.

The magnitude (Mw) 7.1 earthquake on November 30 was an unsettling event, even for Alaskans used to frequent earth tremors, and caused great concern for the safety of the irreplaceable Alaska Native heritage art that is displayed in *Living Our Cultures*. Anchorage and surrounding areas experienced 30 to 60 seconds of severe ground shaking followed minutes later by a strong Mw 5.7 aftershock. The strength, proximity of the epicenter (about 10 miles north of the city) and relatively shallow depth of the earthquake accounted for



*Kelly McHugh (NMAI), Kim Cullen Cobb (NMNH), and Monica Shah (Anchorage Museum) (left to right) inspect a Yup'ik hunting visor for damage after removing it from its exhibition case. Photo by Aron Crowell*



the nearly \$100M in damages it caused to local roads, the Anchorage airport, schools, public buildings, and homes. Fortunately, no buildings collapsed, no lives were lost, and there were surprisingly few injuries. Post-quake settling will continue for months and has caused swarms of aftershocks. From December 2018 through February 2019 the U.S. Geological Survey's Alaska Earthquake Center recorded over 350 perceptible tremors in the Mw 3.0–5.0 range.

The Anchorage Museum escaped significant structural damage, although in older parts of the structure there were dropped ceiling tiles, tumbled offices, a sprinkler release, damaged exhibit cases, and several fallen artworks. Newer additions to the building, including the 2010 wing that houses the Arctic Studies Center, stood up exceptionally well due to modern seismic building codes that were adopted after the devastating Mw 9.2 Alaska earthquake of 1964 (152 times stronger than the November 2018 event). Nonetheless, swaying of the building caused the exhibition cases in *Living Our Cultures* to torque slightly in an east-west direction which caused the glass breakage.

Most importantly, no Smithsonian objects were damaged, which is a great tribute to the extensive seismic engineering that went into design of both the cases and the pole-and-bracket support system on which the objects are mounted. Recognizing that Anchorage is an area of “high seismic vulnerability” with over 40,000 detectable earthquakes per year and occasional very large ones, exhibition designers Ralph Appelbaum, Inc., case builders **ClickNetherfield**, and **KubikMaltbie** produced cases that are suspended from steel beams in the ceiling of the gallery and only partially anchored to the floor, allowing all but the glass panels on the ends of the cases to move independently and thus to not be damaged by opposing motions of the two levels. Inside the suspended cases, which weigh several tons each, the vertical support rods are tensioned and cross-braced to dampen out vibrations and to minimize shaking of the fragile objects. Extra-strong steel, brass, and plexiglass mounts were crafted to securely but softly grip and support

each item. Very heavy objects such as stone lamps or large pieces like fur parkas required special attention to the strength and stability of the mounting system.

The system has been “tested” periodically by earthquakes since it was installed in 2010, including three local temblors greater than Mw 5.0 and a relatively distant Mw 7.1 in January 2016 (epicenter 165 miles SW of Anchorage). None of these events caused any damage to the *Living Our Cultures* objects or cases. During the



*NMAI registrar Adrien Mooney points out cracked glass at the top of the Yup'ik exhibition case in Living Our Cultures. Photo by Aron Crowell*

November 30, 2018 quake, peak ground acceleration at the museum was measured at .27 g (g = gravitational acceleration) by the USGS, higher than in previous events but still well below the 1.0 g design specification used in designing the cases. Other than a Yup'ik hunting visor that partially escaped its mount but did not fall, and a Haida mask that shed an easily replaced feather, the entire exhibit collection came through unscathed. We may conclude that the *Living Our Cultures* exhibition has passed its most severe seismic test to date with flying colors, and that it could in fact withstand much more. Fortunately, the outlook for recurrence of a truly massive “great earthquake” like the one in 1964 is six to eight centuries in the future, according to paleo-seismological studies of earthquake cycles in southern Alaska.

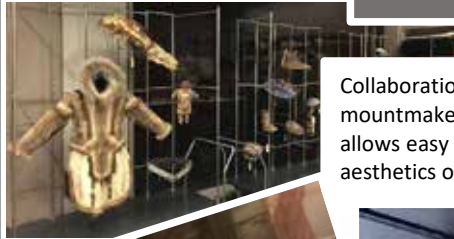
Following the great work accomplished by the Smithsonian conservation team, members of the Smithsonian Council for Arctic Studies (SCAS) toured the gallery with ASC-Alaska Director **Aron Crowell** and **Monica Shah** to learn more about the restoration project. The SCAS is a dedicated friends circle that has contributed substantially to Arctic Studies Center public programs and educational outreach. **Peter Michalski**, **Morgan Christen**, and **Douglas Veltre** joined the tour along with visiting ethnologist **Koji Deriha** (Hokkai-Gakuen University) who has comparative experience of earthquake impacts to museums in Japan. All were pleased to see the great care that the Smithsonian and Anchorage Museum have taken to prepare for natural disasters and to preserve their precious cultural collections.

**THESE MOUNTS ARE MADE FOR QUAKING: A SEISMIC SUCCESS STORY**  
**NMNH and NMAI**

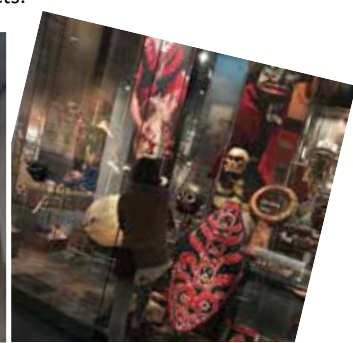


**Living Our Cultures,  
Sharing Our Heritage:  
The First Peoples of  
Alaska**

This exhibit of over 600 indigenous Alaska artifacts from the NMNH and NMAI collections is on loan to the Smithsonian Arctic Studies Center in the Anchorage Museum. The exhibit was conceived as an accessible collection, allowing for hands-on study by Alaska Native elders, artists, and scholars.



Collaboration between exhibit designers, curators, conservators, and mountmakers resulted in the creation of a seismic mounting system that allows easy and safe handling for study but does not interfere with the aesthetics or intention of the objects.



Seismic mitigation efforts were recently put to the test during the magnitude 7.1 earthquake in Anchorage in November 2018. Although several glass panels in the exhibit were broken, no objects were damaged—and only two objects rotated on their mounts.



The success of designing a seismic mitigation system from the building to the object mount, and close collaboration from the project's inception resulted in no damage to Smithsonian collections even through a major seismic event.



**Sponsored by:**  
*National Collections Program and  
Smithsonian Collections Advisory Committee*



## RETURNING RESEARCH: NEW NSF FUNDING FOR A YAKUTAT COMMUNITY REPORT AND VIDEO ARCHIVE

By Aron Crowell

The National Science Foundation's Arctic Social Sciences program awarded a 2018 supplemental grant of \$52,794 to the Arctic Studies Center project *Glacial Retreat and the Cultural Landscape of Ice Floe Sealing at Yakutat Bay, Alaska* (Principal Investigator, **Aron Crowell**). At Yakutat, research combining archaeology, oral traditions, place names documentation, and palaeoenvironmental studies has provided insight into Eyak, Ahtna, and Tlingit cultural and subsistence patterns in a highly productive fiord ecosystem that emerged from under glacial ice only within the last 900 years (Crowell 2015, 2017, n.d.; Ramos n.d.; also see *ASC Newsletters* for 2013, 2014, and 2017). Indigenous hunting of harbor seals (*Phoca vitulina*) among glacial ice floes at the head of the fiord, historically of primary importance for the provision of meat, skins, and oil, has been a central focus of the study.

The purpose of the supplemental grant is to ensure the full return of project results to the Yakutat community and the southeast Alaska region in the form of a Smithsonian book publication and as an extensive video archive of traditional knowledge interviews filmed at Yakutat during 2011–2014. These grant products will also fulfill technical data recovery provisions of a Memorandum of Agreement (MOU) signed by the Yakutat Tlingit Tribe, Sealaska Corporation, National Science Foundation, National Park Service, U.S. Forest Service, and State of Alaska under Section 106 of the National Historic Preservation Act. The multiparty agreement arose from the need for cooperation among both traditional and government owners of the lands around Yakutat Bay where archaeological sites representing various stages of Yakutat human and environmental history were investigated.

The book will present data and conclusions from the project in a format designed for use as a sourcebook for community history. It will build on and supplement **Frederica de Laguna's** masterful *Under Mount St. Elias: History and Culture of the Yakutat Tlingit* (Smithsonian Contributions to Anthropology Vol. 7, 1972) and will be distributed at no cost to Yakutat households, the school, and tribe. Chapters on the fiord environment, glacial history, archaeology, oral traditions, and traditional ecological knowledge will be accompanied by maps, photographs, and scientific illustrations. The volume will include a posthumously-edited introduction by the late **Elaine Abraham** who was a prominent **Gineix Kwáan** clan leader, senior researcher on the Yakutat project, and

chair of the Alaska Native Science Commission (see “Elaine Elizabeth Abraham, Chuu Shaa (1929–2016)” in the 2017 *ASC Newsletter*). Elaine's daughter **Judith Ramos** (Department of Alaska Native Studies and Rural Development, University of Alaska Fairbanks) will contribute a chapter on traditional subsistence practices based on the oral interviews.

The video archive, consisting of more than 70 interviews filmed with Yakutat elders, hunters, and adults and covering a wide range of cultural and historical topics, represents a major compilation of community knowledge. Scenes of seal hunting in the ice, seal butchering and food preparation, and a Gineix Kwáan memorial potlatch are also to be included. Hard-drive copies of the archive will be provided to the Yakutat Tlingit Tribe, Sealaska Heritage Institute in Juneau, and the Smithsonian's National Anthropological Archives (NAA). To facilitate browsing and topical searches all interviews will be paired with full text transcriptions that include time codes so that the corresponding footage can be located and viewed. Linguist **Jeff Leer** (Professor Emeritus, Alaska Native Language Center, University of Alaska Fairbanks) will transcribe and translate spoken Tlingit portions, which are extensive in some interviews. **Dawn Biddison** (Arctic Studies Center, Alaska office) will edit and organize the video archive and prepare transcriptions, assisted by **Heather McClain** (Sealaska Heritage Institute).

In November 2018, **Judy Ramos** and I presented a joint lecture about the project at the Sealaska Heritage Institute's new and vibrantly beautiful



An illustration for the Yakutat community report, “Raven's Flight over Tlákw.aan” by Emily Kearney-Williams, 2017.

*Tlákw.aan*, the first village built by people of the Gineix Kwáan clan after their migration to Yakutat Bay, is depicted on the basis of archaeological evidence as it might have appeared in about A.D. 1575. In oral tradition Raven once tried to fly over the settlement but was overcome by smoke from its many hearth fires



Walter Soboleff cultural center in Juneau. We showed selections from the video archive including **George Ramos, Sr.** (Judy's father) discussing seal hunting and essential hunters' knowledge of ice and current conditions. A second selection was of Yakutat elders visiting a 19<sup>th</sup> century sealing camp where we excavated in 2014. The camp is a highly significant site of community remembrance, and the visit was formally conducted with ceremonies to name and honor ancestors and to give thanks to the land, ocean, and glaciers. At the conclusion Elaine Abraham said, "All the spirits are awake and with us"—a reminder that Yakutat, like many indigenous communities, has deep and sacred connections to its past and its place, and that being invited to conduct research there is a special privilege and responsibility.

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#### **Ramos, Judy**

**n.d.** Tlingit Hunting Along the Edge: Ice Floe Harbor Seal Hunting in Yakutat Alaska. In *Arctic Crashes: People and Animals in the Changing North*, ed. Igor Krupnik and Aron L. Crowell, Smithsonian Institution Scholarly Press, Washington, DC. In press

### **ATHABASCAN MOOSEHIDE TANNING: PROJECT UPDATE**

*By Dawn Biddison*

In the last issue of the Newsletter, *Tanning and Sewing Moosehide in the Dene Way* provided an introduction to the latest project in the Material Traditions series at the Alaska office of the Arctic Studies Center and overview of work from September to December of 2017. This project continued through June 2018. Additional steps for hide tanning were video-documented by **Dawn Biddison**, working on and off around participants'

availability. Stopping and re-starting tanning steps was intentional: considered a necessary practice for making hide work plausible for busy, contemporary lives.

In February, **Helen Dick** (Dena'ina Athabascan elder), **Sondra Shaginoff-Stuart** (Ahtna Athabascan regalia artist and linguist), **Melissa Shaginoff** (Ahtna Athabascan artist) and **Joel Isaak** (Dena'ina Athabascan artist) worked at Sondra's yard and garage in Kenai. Several methods were tried for wringing out a soaked hide, including unsuccessful techniques using modern implements and one successful technique: a traditional twisting and staking-out method that Helen's family used. Next, the hide was scraped and stretched over a sawhorse—what was readily available instead of a scraping beam but lower and less effective—using slate scrapers and dull ulus, over a tarp (to keep it clean). The hide was also stretched out and lashed onto a frame for scraping, a technique that Joel prefers.

In May, Melissa and Joel collected punky wood along highway outside Sterling. Punky wood is at a specific stage of decay and is used for the final smoking of a tanned hide to provide color and water repellency. Work continued at the Isaak family yard in Soldotna, where we joined by **Jeanie Maxim** (Ahtna Athabascan elder) and **Charlie Hubbard** (Ahtna Athabascan elder). A cleaned, dry hide—one option for storing a hide for completing its tanning—was lightly smoked in a tent structure for a few hours, an Ahtna technique to better prepare it for the next stages of soaking, wringing and scraping. The hide was next soaked in a brain solution, then wrung out using the twisting and staking out method. Preliminary scraping began using a traditional scraping beam to support the hide. Also in May, Jeanie visited the Anchorage Museum for an in-depth interview about moosehide tanning with Melissa and Dawn, which included a review of archival photographs to facilitate discussion. At the end of May, Melissa and Dawn traveled to visit Jeanie at her home village of Gulkana, where Jeanie showed Melissa how to cut hair off of a fresh—or in this case freshly defrosted—moosehide. This technique of hair removal differs from the Dena'ina rotting technique (described in the last issue). Work started by cutting down a young spruce tree to shoulder level for a cutting post to support the hide. Three young Ahtna girls out on their bikes stopped by and stayed to watch the process and learn from Jeanie about moosehide tanning in their community.

The video-documentation was completed in June with two additional segments. Outside of her Anchorage apartment, Melissa gave an overview of using a cutting post, scraping log and scraping beam, then she demonstrated how to use a scraping log—set

up on her porch—for cleaning a moose hide with a draw knife. The last segment was an interview with Joel and Melissa recorded at the Anchorage Museum during which they assessed the experimental and varying elements of project processes. Video editing has been ongoing. The completed DVD set of twenty-one videos with over 300 minutes of tightly-edited footage will be available in April of 2019 and posted online to the *Smithsonian Arctic Studies Center Alaska* YouTube channel.

## POLAR LAB: COLLECTIVE

By Dawn Biddison



*“Kalukaq”* by Iñupiaq artist BrittNee Brower, work submitted for her PLC application. Photo courtesy of the artist

*Polar Lab: Collective* is a program that provides emerging Alaska Native artists with an introduction to museum collections research through up-close study of NMNH and NMAI objects in the *Living Our Cultures* exhibition and of the Anchorage Museum collections. This experience advances their development as artists and strengthens the relationship between Alaska Native artists and museums through increased access to staff and collections. Developed by **Dawn Biddison** in partnership with **Monica Shah**, Director of Collections at the Anchorage Museum, artists are selected annually through open-call application and funded with an honorarium and travel costs.

The program hosted four artists in 2018: **BrittNee Brower**, **Susan Emery**, **Jenny Miller** and **Laura Revels**. BrittNee is an Iñupiaq artist raised in Barrow. During her research visit, she focused on studying parka trims, other geometric patterns and graphic

designs found in work from her home region to inform her growing experimentation with three-dimensional work. Susan was raised by her Iñupiaq grandparents in Anchorage. She works primarily in mixed media acrylic painting, often featuring wildlife themes, and studied Iñupiaq objects in order to represent her material cultural heritage in her artwork. Jenny, another Iñupiaq artist, is a photographer and video/sound artist. Originally from Nome, she studied regalia and utilitarian objects to further her work in gender identity, gender roles and sexuality. Laura is a Kaagwaantaan Tlingit storytelling educator and is continuing her training as a bead artist. She founded an indigenous beading group in Anchorage to facilitate teaching traditional arts and her research focused on studying examples of traditional Tlingit beadwork, as well as compiling resources to benefit her group.

Prior to their visit, artists spoke with Dawn and Monica to discuss their interests and to select objects and object types for study. Over two days,



*Iñupiaq artist Susan Emery sketches a ceremonial bowl from Wales, part of the National Museum of the American Indian collection at the Living Our Cultures exhibition.*

*Photo by Dawn Biddison*

they studied pieces taken off exhibit and from collections, and spent time with Anchorage Museum archives staff for additional research. The artists received object photos and documentation, links to online resources for Alaska Native collections and archival photographs, and information about artist opportunities at other museums. You can view a short video about the program’s first participant, Iñupiaq performance artist **Allison Warden** (at <https://polarlab.anchoragemuseum.org/projects/polar-lab-collective>).

## SMITHSONIAN ARCTIC STUDIES CENTER ALASKA YOUTUBE CHANNEL

By Dawn Biddison

Due to changes online at NMNH, the *Sharing Knowledge Alaska* website was shuttered. In its place, **Dawn Biddison** created a **YouTube channel** *Smithsonian Arctic Studies Center Alaska* presenting videos from the Center's collaborative, community-based research and education programs with Alaska Native elders, culture-bearers and artists.

The videos on this channel provide instructional and educational information about Alaska Native languages, arts and lifeways:

- Sewing Gut (13 videos)
- Sculpting Ivory (17 videos)
- Sharing the Dena'ina Language (3 videos)
- The Art of Aleutian Islands Bentwood Hats (9 videos)
- Listen & Learn: St. Lawrence Island Yupik Language and Culture Video Lessons (12 videos)
- Twining Cedar (15 videos), Listen & Learn: Iñupiaq Language and Culture Video Lessons (6 videos)
- Creating Quillwork (8 videos)
- Sewing Salmon (10 videos).

A limited number of DVD copies are still available by request, as well as full resolution HD files.

*Living Our Cultures* YouTube Playlist is <https://www.youtube.com/playlist?list=PL33278BF298794573>



Homepage for the "Smithsonian Arctic Studies Center Alaska" YouTube channel  
<https://www.youtube.com/channel/UCNpC1tX-kqJaSU7ZSxUWAfA>

## NEWS

### NARWHAL EXHIBIT TO TRAVEL

By William Fitzhugh



Exhibition Narwhal: Revealing an Arctic Legend.  
*Model by Paul Brodie*

The Smithsonian Traveling Exhibits Service (SITES) has agreed to produce a traveling version of the National Museum of Natural History exhibition, *Narwhal: Revealing an Arctic Legend*. The SITES exhibit will travel to 10–15 venues in North and possibly Central and South America in 2020–2021. Narwhal—one of the world's most unusual mammals—has been on exhibit at the Smithsonian since August 2017 and has inspired visitors young and old.

The Smithsonian exhibition has been a timely reminder of the changing Arctic world—and of our planet as well. Narwhals—a medium-sized whale—are ice-loving creatures that occupy polar regions around the Circumpolar North. Most of the ca. 180,000 narwhals live in the Canadian Arctic and around the northern coasts of Greenland. A few also are found along the northern coasts of Scandinavia, Russia, and Alaska.

Narwhal evolutionary history is poorly-known, and until recently the function of the male's unique spiraled tusk was a mystery. Theories abounded: for spearing fish? jousting with male rivals? attracting female admirers? Martin Nweeia, a dentist and visiting co-curator of the exhibit with William Fitzhugh, has come up with a new theory based on histological studies and experiments on narwhals in the wild. He and his colleagues believe the tusk serves as a sensory organ to detect changes in their icy environment, particularly water salinity and temperature. Predicting ice conditions, especially rapid freeze-ups that can trap narwhals and result in mass drownings, may be a likely function, because



its tusk nerves, unlike all other mammals, reach the surface of the tooth. Studies underway on the narwhal genome may answer many of the riddles of the narwhal tusk function, its evolution, and adaptive capacity. These studies have been conducted in collaboration with Inuit hunters whose extensive knowledge of the animal from thousands of years of hunting and observation have enriched scientific studies.

To date, the narwhal population, which is not endangered (it's only predators are orcas, humans, polar bears, and ice), is not being affected much by the reduction in Arctic sea ice. Inuit hunters from Pond Inlet have not noticed much change in the numbers of narwhals visiting northern Baffin Island. But as the Arctic ice shrinks to a "last ice area" around northern Greenland, its population will probably decline. Learning about narwhals and the changing Arctic provides a vehicle for educating visitors about climate change, Native subsistence hunting, conservation of the Arctic environment and its animals, and the role of Native peoples as scientific colleagues.

Narwhals have emerged from obscurity and along with Inuit and unicorns, are teaching the world much about a part of the world that is for the first time in human history, becoming a part of the wider world. The SITES tour, accompanied by our prize-winning Narwhal book and educational programming, will extend the Natural History Museum exhibit to new publics.



*This poster about plastic pollution and northern marine mammals is the work of Camilla Nymand Petersen, Greenland.*

*To obtain the poster, contact Camilla Nymand Petersen by e-mail [trilla\\_cnp@yahoo.dk](mailto:trilla_cnp@yahoo.dk)*

## STEARNS A. MORSE RECEIVES PEACOCK MEDAL

*[The following notice from the Dept. of Geosciences, University of Massachusetts, Amherst, June 18, 2018, reports a prestigious award presented to Tony Morse for a wide range of earth science accomplishments, as well as contributions to archeology as field assistant to Elmer Harp and early analyses of Ramah chert. He also built and was master of the R. V. Pitsiulak which enabled his research in northern Labrador, and later facilitated its transfer to the Arctic Studies Centers.—ed.]*



*Tony Morse researching Labrador Oceanography on Blue Dolphin*

**Stearns A. "Tony" Morse**, professor emeritus of Geosciences, has received the Mineralogical Association of Canada's Peacock Medal, its highest award, for "outstanding contributions to the mineral sciences of Canada." The award was presented at a lunch June 19, 2018 during the association's annual meeting in Vancouver, British Columbia.

The 1.5-inch diameter gold medal is intended to recognize the breadth and universality of the awardee's contributions in mineralogy, applied mineralogy, petrology, crystallography, geochemistry or the study of mineral deposits, rather than in a narrow area of expertise, the association states. The Peacock Medal, formerly the Past-Presidents' Medal, is not restricted to Canadian researchers.

Morse says he was "quite thunderstruck" to receive the letter informing him of the honor, and "if not for some of the fine details I might have supposed it a hoax." He adds, "What a wonderful thing to be so honored. And especially pleased to have such a recognition from Canada, where all my realities in our splendid science have germinated."

Morse still has an active research office in geosciences, says department head **Julie Brigham-Grette**, who adds, "We are very excited for the

*recognition of Tony Morse with the Peacock Medal for his wonderful and ongoing career in geology. Even I used one of his textbooks to learn phase diagrams when I was an undergraduate student. This award sheds a strong light on his contributions and legacy in the field.”*

Morse earned his undergraduate degree in geology at Dartmouth College, where his father was an English professor. From 1949–1952, Morse was a field assistant in archaeology and then oceanography on the 100-foot schooner *Blue Dolphin*, studying Labrador fjords. After serving in the U.S. Army, he returned for further study in Labrador fjords in 1954.

Morse went on to earn an M.S. and Ph.D. degrees from McGill University and to be hired by British Newfoundland Exploration Ltd., to study the Kiglapait Layered Intrusion in Labrador. He also studied ice as a mineralogist at the U.S. Army’s Cold Regions Research and Engineering Laboratory in Hanover, New Hampshire. Morse was a member of the geology faculty at Franklin and Marshall College in Lancaster, Pennsylvania, for nine years before coming to the University of Massachusetts Amherst in 1971.

From 1971–1981, he and colleagues from Cornell and Syracuse universities led a large research group studying the Nain anorthosite from the research vessel *Pitsiulak*, supported by the National Science Foundation. Anorthosites, an enigmatic intrusive igneous rock also associated with many layered intrusions, occur only in special places and within a special time interval in the geologic record; in North America chiefly in a belt from Labrador to the Adirondacks. How they form is still not well understood.

Morse’s other research included experiments at the Carnegie Institution of Washington and at Smith College, Northampton, Massachusetts, and studies related to the earliest crust on the Earth and Moon, the nature of the Earth’s core-mantle boundary, and the thermodynamics of rocks and melts. His other honors include life membership in Clare Hall, University of Cambridge, and election as a fellow of the American Geophysical Union.

At the awards lunch, Morse gave a 10-minute talk and later, a half-hour presentation about his scientific and personal history, in particular about his wife **Dorothy Morse**’s role in his career and research. She and their three daughters served as research assistants in Labrador for many years in the field and aboard ship, making the research possible.

## BASQUE AND MI’KMAQ: REVIVING ANCIENT CONNECTIONS

*By William Fitzhugh*

During the week of 24–29 September 2018, a remarkable gathering took place in Sydney, Nova Scotia. Titled *The Atlantiar Conference: Indigenous People’ Roots in the North Atlantic. First Nation Connections Between Basques and Mi’kmaq* engaged scholars, Native people, and others working on Basque and Mi’kmaq culture and history for several days of touring, dining, and sharing research. Organized by **Stephen Augustine** of Cape Breton University (CBU) and Unama’ki College and **Xabi Otero** of Jauzarrea, the outings and conference presentations highlighted past and growing current connections between Basques and Mi’kmaq peoples, a long-distance relationship that has been rekindled by new research and collaboration on both sides of the Atlantic. Among those attending were historians, archaeologists, musicians, linguists, artists, educators, and indigenous Basque and Mi’kmaq. **Dennis Stanford**, **Pegi Jodry**, and **William Fitzhugh** attended from the Smithsonian.

As described by the conference program, “Atlantiar Knekk [was] an international event bringing together ancient cultures of knowledge sharing and celebration of perseverance. The Atlantiar project started as an initiative of Jauzarrea (a Basque organization dedicated to research and preservation of Basque culture) with the launch of a yearly congress of international scholars, including Mi’kmaw, taking place in Arraiotz and Irun from 2012 to 2015. This year, Unama’ki College at CBU re-ignited this research by hosting the Atlantiar Congress on this side of the Atlantic... In Mi’kmaw, ‘Knekk’ means ‘far away’ and ‘Tepaw’ is ‘very near’—far and near reflecting the distance of the Atlantic Ocean spanning from the Basque original home—Euskal Herria—and Mi’kmaki, rekindling ancient friendships, oceans apart, far yet near.”

The week began with tours to nearby locations in northern Cape Breton, the island in northern Nova Scotia famed for beautiful Bras d’Or Lake and the 18<sup>th</sup> century French fortress of Louisbourg that guarded French interests in the Gulf of St. Lawrence until it was taken and destroyed by the British in 1758. The conference spent a day touring the town of Sydney, and others at Louisbourg, the Sydney coal mine and museum, and a nearby Mi’kmaq villages. Travelling by bus, attending receptions with local people and dignitaries, and eating meals together brought the group close and acquainted us



*The Atlantiar conference presenters.  
Photo by Otero/Jauzarrea*

with local history, Mi'kmaq people, and Unama'ki College officials. One of the evening highlights was a musical performance by **Jeremy Dutcher**, who had just received the Canadian Polaris Prize for his restorative renditions of Mi'kmaq songs discovered in the archives of the Canadian Museum of History.

The conference consisted of two days of papers and presentations covering a wide range of Basque and Mi'kmaq studies: archaeological perspectives (**Stanford/Jodry, Fitzhugh, Bruce Bradley, Brad Loewen, Robert Grenier, Laurier Turgeon**); linguistics (**Peter Bakker, Stephanie Inglis, Theo Vennemann, John Koch**); climate change (**Richard Peltier, Stephen Oppenheimer**); Paleolithic and Paleoindian rock art (**Joëlle Darricau, Xabi Otero**); historic Iroquois-Mi'kmaq trade connections (**Ron Williamson, Louis Lesage**); genetics (**Maria Pala**); culture revitalization (**Stephen Augustine, Jeremy Dutcher**); mythology (**Lionel Sims, Kahenta Horn-Miller**); Basque history (**Peio Monteano Sorbet**); comparative Basque and Iroquois religion (**Idola Arana-Beobide**); indigenous policy (**Claude Picard**); and indigenous architecture (**Douglas Cardinal**). Eloquent presentations on Basque and Mi'kmaq culture were delivered by Otero and Augustine, and our discussions were enlivened by “wood percussion” music. The conference program was presented with stunning graphics prepared by Xabi Otero and can be found at <https://www.jauzarrea.com/en/indigenous-peoples-roots-north-atlantic>. Although there is no plan to publish the proceedings, the conference is certain to stimulate scholarly research and appreciation of the importance of 16–18<sup>th</sup> century Basque-Mi'kmaq interaction. This topic and time period will receive more attention in the future as a result of this remarkable international gathering.

## RECLAIMING A PAST

*By Shirley Tagalik*

*[The original effort related to this story was covered in an article by the ASC summer intern of 2006, Avital Friedman, “Recognizing the Reality of a People”—ASC Newsletter 14, 2006, pp.18–19. She has worked for two months under **Igor Krupnik**'s supervision to digitize and catalog some 300 historical slides lend to the Smithsonian by **Thomas Goreau** with the prospect that the pictures taken by his grandfather, photographer **Fritz Goro**, would be eventually reunited with the people who hosted him in 1955. It took us 12 years and several unsuccessful tries to fulfill this pledge—I.K.]*

In May 2018, I received an email message from my niece, **Bernadette Miquusaaq Dean**, from Rankin Inlet, Nunavut. At that time, she had been visiting the Smithsonian Institution's Arctic Studies Center in Washington DC to look at Inuit artifacts and photographs in their collection. **Igor Krupnik**, their Arctic curator, mentioned to her group a collection of some 200 historical photographs of the Ennadai Lake Ahiamut (formerly known as “Caribou Inuit”) and wondered who might be interested in this material. As the majority of the survivors of this Ahiamut group were eventually relocated to Arviat (formerly Eskimo Point), Bernadette brought the existence of the collection to my attention and helped connect me to Igor. From that point on, a new heritage project evolved.

As serendipitous as these things often are, the Aqqumavvik Society in Arviat that operates the community library had just completed a family genealogy for the Aulatjut family, the largest family of the Ahiamut survivor group. The idea for this project also came at a time when the Canadian government had just announced that an apology and long-awaited settlement would be forthcoming for the Ennadai Ahiamut. Obviously the collection housed by the Smithsonian would be of great interest to our people. Igor very kindly informed us that the original slide collection held in Boston by **Thomas Goreau**, the grandson of the photographer **Fritz Goro**, who took the pictures of the Ahiamut, was much larger and put us all in touch. Igor also mailed to us a CD with Goro's scanned photographs of the Ahiamut that had been processed at the Smithsonian more than a decade earlier.

Fritz Goro was a professional photographer who worked for *Life Magazine*. As part of the magazine's series, *The Epic of Man*, in 1955 Fritz was sent to document the lives of a small group of Inuit residing



in the inland areas of Kivalliq around Ennadai Lake. The series was to focus on traditional ways of life and was to capture those ways before groups like the Ahiarmiut were lost to colonization. Government officials had already identified this group of the inland Inuit as amongst “the most primitive” in a 1952 report. In the same year, writer **Farley Mowat** published his book, *People of the Deer*, which sparked wide interest, especially in the U.S., and introduced this group of inland Inuit to the world.

In 1949–1950, another photographer, **Richard Harrington** visited the area and photographed the



*Fritz Goro's photos of 1955 offered remarkable window to the Ahiarmiut past life*

nearby Padlermiut people, many of whom were experiencing a period of starvation resulting from the less predictable caribou migrations. His very evocative photos would have been available to those interested in Inuit conditions in the early 1950s and may have prompted *Life* to consider the photo venture that Fritz Goro undertook, together with the journal writers.

### **The Ahiarmiut Tragic Saga**

The Ahiarmiut people were originally a group of Caribou Inuit who were mainly located in the inland areas reaching from just north of the Manitoba border near Ennadai, northward through the big river and lake systems of the Kazan and Nueltin areas to Gary and Baker Lakes and on up to the Queen Maud Gulf area. Their numbers were hugely reduced in the 1940–1950s as both diseases introduced by the Qallunaat (Southerners) and changes to caribou migration patterns resulted in periods of starvation and death.

The people around Ennadai Lake lived in small family camps and relied on a diet of caribou and fish. They

were highly successful and for many years resisted the lure of trading their lifestyle for one of trapping Arctic fox, as did other Inuit people across the Arctic. In the 1940s there were some southern trappers who travelled through their territories because it was prime fox territory. These traders often provided access to southern foods and goods in exchange for warm caribou clothing, survival information and furs. Also, in the 1940s, the Canadian government built a weather station at the Ennadai Lake and the personnel staffing the station employed local Inuit for small manual jobs and had the women sew warm clothing for them. The Inuit traded labor for food, supplies and cast-off government issued clothing or canvas tents. The station staff was also tasked with providing supplies, when needed, to Inuit as part of the Canadian Family Allowance System. Unlike southern families who received these benefits as a matter of course,

*Ajaaq, the daughter Aulajjut, and her baby son. Ennadai Lake, Canada. Photo by Fritz Goro*



the benefits were withheld from Inuit to prevent their reliance on “handouts.” Unfortunately, Inuit were supposed to request this support when they were in need, but few were ever told about this social benefit and were made to believe that the provisions they received were at the largess of the government officials.

By 1950, government reports began to adopt this tone as well. The Ennadai Lake Inuit were believed to have problems living so close to the weather station. The decision was made to move the population to an area that would be more “accessible.” In 1952, with no consultation or planning, the entire group was relocated to Nueltin Lake with the expectation that they would assist the Sigurson and Martin Trading Company in creating a commercial fishing venture. There was no provision for boats, equipment, or supplies, and



*The Commissioner for Nunavut, Nellie Kusugak with Mary Anowtalik, the oldest surviving member of the Ahirmiut from Ennadai Lake and Minister of Crown-Indigenous Relations, Hon. Carolyn Bennett posing in front of copies of Fritz Goro's photos (courtesy of Shirley Tagalik)*

the traders quickly pulled out of the venture. The Ahirmiut, knowing that the area they had been sent to was poor in animals, simply walked the 52 miles back home to Ennadai Lake. It was here that Fritz Goro and the *Life* team encountered them in 1955.

The team arrived at the lake by float plane in the late summer/fall and spent two months collecting what was to become two series of photos—one captured the lives of the group of Ahirmiut (about 60 people) as they were when the *Life* journalists encountered them. The second series was staged as if people had “returned” to their past. They were photographed wearing authentic caribou fur clothing and using only the tools and equipment that would have been pre-contact, like bows and arrows, even stone tools and spears. The latter photos were then used for the *Life* series about “Stone Age” people. Both sets of photos provide an invaluable record of what was very soon to become the end of this group’s life in their familiar cultural setting.

In another government experiment, the Ahirmiut were relocated again to Henik Lake about 45 miles from a Hudson Bay Post. There they experienced the most horrific conditions from 1957–1958 when extreme starvation decimated their camps. Their dogs starved first and then, without dogs or boats, they were barely capable of seeking assistance or of moving to other areas in search of food. This period was captured in Farley Mowat’s second book published in 1960 and called *The Desperate People*. The few surviving members of this group were eventually relocated to Eskimo Point (now Arviat) in 1959–60. When asked, these devastated people consistently said, “We do not think about the future. We just listen now.” It would take until 2018 before the next generation of Ahirmiut would successfully challenge the Canadian government



*Ahirmiut survivors and descendants, with photo collection as backdrop listening to the Federal government apology (courtesy of Shirley Tagalik)*

about their mistreatment and finally win an apology and financial settlement. A detailed account of the Ennadai Lake Relocations can be found in a book by **Frank Tester** and **Peter Kulchyski** titled *Tammarniit: Inuit Relocations in the Eastern Arctic 1939–63* (1994).

### **The New Life of Goro’s Photos**

It was into this time of celebration that Thomas Goreau, grandson of Fritz Goro, arrived in Arviat in the fall of 2018 to reunite the few surviving Ennadai Ahirmiut and their descendants with the original photographs taken in 1955. Returning exactly 63 years after his grandfather’s visit to Ennadai, Thomas met with an excited group of about 30 people to share a series of photos that had been digitized and made available by the Smithsonian. He shared his dream that more of the vast photo and document archive that his grandfather left may one day be made available as well. He expressed his hope that access to these records would provide the few remaining memory keepers with the materials they could use to build a repository and a way of culture-keeping for the Ennadai Ahirmiut. He said he believed it would help them remain strong in their culture and use the tools of the new culture, digital technology, to build on their cultural strengths of the past.

Both Thomas Goreau’s message to the community and the photo collection he presented as a gift to the Ahirmiut people were welcomed. The survivors remembered his grandfather and were able to share stories of his visit or the stories they had been told as children about his visit. The photos themselves were met with huge interest and emotional outpourings as the faces of then-young and vibrant ancestors crossed the large screen at the community meeting hall.



This collection of some 200 photos, made available by the Smithsonian, is now being housed in the community library and can be accessed by all community members. The library has an ongoing project that is documenting extended family trees. The first family tree completed was that of the family of **Aulajut**, a key Ennadai group leader, and many of Fritz Goro's photos include members of this family. The relevant photos will be added to the family tree and made available for download. The Aquimavvik Society, a local wellness group, has volunteered to provide hard or digital copies of the photographs to families as requested. These are amazing keepsakes for families who would have had no photographs available to them from that period or from any time before the 1960s.

The Aquimavvik Society is committed to seeking new funds to assist with the digitization of additional archival material from this amazing collection. Another goal is to make the pictures available to all of the descendants, for whom it is a way of marking the strength and resiliency of their ancestors, once called a "stone age people." They endured terrible conditions and unthinkable treatment in the past, but their smiling faces have been captured for eternity in this amazing collection of historical photographs. It is definitely a project about reclaiming the past for the children of the future.

### **An Apology to the Ahiarmiut Forced Relocates of Ennadai Lake**

On January 22, 2019 the Ahiarmiut Inuit who were forcibly relocated by the Canadian Federal Government in 1958–59, received an official apology from the Minister of Crown-Indigenous Affairs, The Honorable **Carolyn Bennett**. The Minister and representative of all the Inuit organizations gathered in Arviat, Nunavut

for this important event. The apology has been negotiated by the survivors of the Ennadai Ahiarmiut for many years. This apology marked a righting of past wrongs and provided the Ahiarmiut and their descendants with both financial compensation and an opportunity for reconciliation and healing from a very traumatic history.

A significant contributor to this healing is the amazing collection of photographs made available to the community by the Smithsonian Institution and Thomas Goreau. As a result of this event, it is hoped that new interest in the remaining collection of photographer Fritz Goro will support the addition of more digitalized material to this important archive.

### **“POLAR 2018” MEETING IN DAVOS CELEBRATES IPY ANNIVERSARY**

*By Igor Krupnik*

In summer 2018, the polar science community celebrated two important milestones associated with the recent International Polar Year (IPY) 2007–2008: the 10<sup>th</sup> anniversary of the first “mega”-conference of Arctic and Antarctic scientists organized by IASC (International Arctic Science Committee) and SCAR (Scientific Committee on Antarctic Research) in St. Petersburg in August 2008 and the 15<sup>th</sup> anniversary of the beginning of planning for IPY in July 2003. To commemorate the former event, IASC and SCAR conveyed a similar mega-conference of polar scientists called *Polar 2018. Where the Poles Come Together* in Davos, Switzerland. For eleven days, June 15–26, 2018, the Congress Centre in Davos that famously hosts the *World Economic Forum*, annual winter gatherings of economic and political luminaries were occupied by hundreds of polar researchers from all disciplines and nations.



*Logo of the Polar 2018 Conference*



One short session during that multi-day event on June 22, 2018 was dedicated to the anniversary of IPY under the title, *Mini-Symposium IV: The Legacy and Future of the International Polar Year*. The symposium was co-organized by **Mike Sparrow**, **Paolo Ruti** (both from the World Meteorological Organization, WMO), **Volker Rachold** (formerly IASC Secretary, now with the Alfred Wegener Institute), and **Gerlis Fugmann** (Executive Director, Association of the Early Polar Career Scientists, APECS). The meeting was chaired by **Peter Harrison** (Queen's University, Canada, ret.), who served previously as Deputy Minister of Natural Resources Canada and the Department of Fisheries and Oceans, and was the chair of the IPY *From Knowledge*



*Congress Centre in Davos (from Wikimedia Commons)*

to Action Conference in Montreal in April 2012.

The symposium was actually a panel of six speakers, who presented 6–8-minute blitz talks on particular aspects or outcomes of IPY. They spoke in the following order: **Igor Krupnik** (Smithsonian, “IPY: A Historical Introduction”); **Kelly Falkner** (NSF, Director of the Office of Polar Programs, “Observing Systems”), **Peter Pulsifer** (National Snow and Ice Data Center, University of Colorado—“IPY Data Access”), **Karin Lochte** (biological oceanographer, Bremen University—“Scientific Cooperation”), **Hanne Nielsen** (APECS current President, Australia—“The Next Generation”), and **Louise Huffman** (Dartmouth College—“Education and Communication”). Such a diverse roster of speakers offered a multi-focused projection on IPY 2007–2008 legacies in various fields, even if in a very condensed format.

Below is a short summary of my talk presented at the session; it summarizes some key lessons and messages of IPY 2007–2008 to the next generation of polar researchers.

### IPY: A Retrospective

IPY 2007–2008, whose actual chronology spanned a full decade, from 2001 to 2010–2011 developed into what was called “the largest internationally coordinated planetary research effort of the past 50 years.” An estimated 50,000 researchers, local observers, educators, students, and support personnel from more than 60 nations and numerous indigenous organizations were involved in 228 international projects—170 in science, one in data management and 57 in education and outreach, and in myriad related national activities. IPY marshaled the intellectual resources of scientists from a large spectrum of nations, disciplines, and fields—from atmospheric and solar geophysics to ecology, human health, social sciences, and the humanities. It reached many new constituencies, including polar residents, Arctic indigenous communities, and millions of people with no direct connection to the high latitude regions. It helped raise public awareness worldwide about the significance of polar

*View of Davos (from the conference webpage)*



regions in our planetary system and about the role of polar science in addressing Earth's “new challenges.”

IPY generated a much-expected spike in coordinated research and observation in the Arctic and Antarctica over a two-year period, from March 2007 to March 2009, with many related efforts started earlier and extended beyond that date. By the official closing date of IPY in June 2010, the field of polar research had been re-energized and rejuvenated by a full decade of planning, organization and implementation of various research and public programs and by the entry of new players, such as the social scientists,

indigenous people organizations, early career scholars, educators, media, and arts professionals. IPY also generated a widely anticipated “pulse” (momentum) in the form of substantial new funding for polar research and observational efforts, and a broadened circle of stakeholders in polar science.

### IPY Success: Opportune Timing, Many Sources

A product of the 50-year cycle of its parent initiatives, First, IPY of 1882–1883; Second, IPY of 1932–1933, and IGY of 1957–1958, the fourth IPY of 2007–2008 could not have happened at a more opportune time. It was shaped by major developments of the preceding decade, as the increasingly rapid pace of climate and the resulting environmental shifts in the polar regions became indisputable. The Arctic Climate Impact Assessment (ACIA) launched by the Arctic Council in 1999 (ACIA 2005) and the 3rd IPCC Report of 2001 (IPCC AR-3) generated a new level of scientific and public concern about the impacts of the incoming change—in the polar regions and across the planet, in general.

Besides being rooted in the tradition of the previous large-scale polar ventures, organizers of IPY 2007–2008 drew energy from a widespread longing for a new broad initiative to re-energize the polar science community, international organizations, and agencies in charge of the planning, funding, and research capacity building in the polar regions. These and other factors conjoined in 2001–2002, at the very time when polar researchers began talking about how to celebrate the 50<sup>th</sup> anniversary of IGY 1957–1958. These early talks about a commemorative event, “IGY+50” quickly evolved into planning for a new Polar Year.

IPY was also a product of many driving forces coming from different quarters of the global community of scholars that combined in a concentrated push for a new IPY in the years 2001–2002. One way or the other, the message about a new bi-polar program 50 years after IGY 1957–1958 spread rapidly across various disciplinary groups of scientists and research organizations. It helped generate the

much needed synergies for across-the-board support for new IPY 2007–2008. The key lesson is that it is imperative to have the opportune timing and a large and energized support base for a program of such magnitude to be successfully launched.

### IPY “Playbook”

Other factors contributed to IPY 2007–2008 success, beyond it taking place in the right time. From the very beginning, IPY 2007–2008 was initiated, endorsed, and supported by the same sponsors or their direct successors that supported previous IPY/IGY ventures, namely the International Council of Science Unions (ICSU) and the World Meteorological Organization (WMO). These two organizations, so different in scope and operational profile, offered much needed legitimacy, funding, institutional capacity, and respective constituencies to plan, promote, and successfully implement IPY, much like they did in the previous IPY/IGY ventures. Their role was substantially expanded and enhanced by several new players, like the IASC, SCAR, Arctic Council, Antarctic Treaty Organization, NSF and others.

Like all previous IPY/IGYs, the IPY 2007–2008 had a definitive time focus. It was planned as a synchronous ‘pulse’ in research and observations in both the Arctic and Antarctica within a common two-year time frame, from March 2007 till March 2009. In the tough budget environment of the time it was an understandable goal and a reasonable justification.

Special efforts were undertaken to expand the international and participatory nature of the Polar Year by welcoming the contribution of all potential players; encouraging the new ones; avoiding political competition; and successfully promoting the non-political, non-military, and non-commercial image of polar science. These features were long established in the earlier IPY/IGY ventures and they were strictly enforced in IPY 2007–2008 from the very beginning.

Careful planning for IPY 2007–2008 program and activities was conducted by appointed international



*The banner of IPY panel*



bodies, the IPY Planning Group, 2003–2004, and later, by the ICSU-WMO Joint Committee, 2005–2010. These international bodies were eventually assisted by the International Programme Office and the network of national IPY committees in the participating nations. Again, this structure followed the model established over 140 years ago for the First IPY in the 1870s and it had proved its effectiveness in later ventures.

While relying on this tested “playbook”, the IPY 2007–2008 planners also introduced several critical innovations that distinguished the most recent IPY from its three predecessors.

IPY 2007–2008 presented a new face of contemporary polar scholarship by deliberately expanding its disciplinary range. It openly welcomed contributions from the social scientists, humanities and human health professionals, polar residents, as well as Arctic indigenous experts, organizations, and communities. Altogether, these new players produced the third largest share of research projects, after oceanographers and terrestrial ecosystem specialists. They helped create a new, more inclusive society and humanity-oriented vision of polar science in the 21st century. It also ushered in a new role for education, media, and arts specialists in the era of expanding global communication and public outreach.

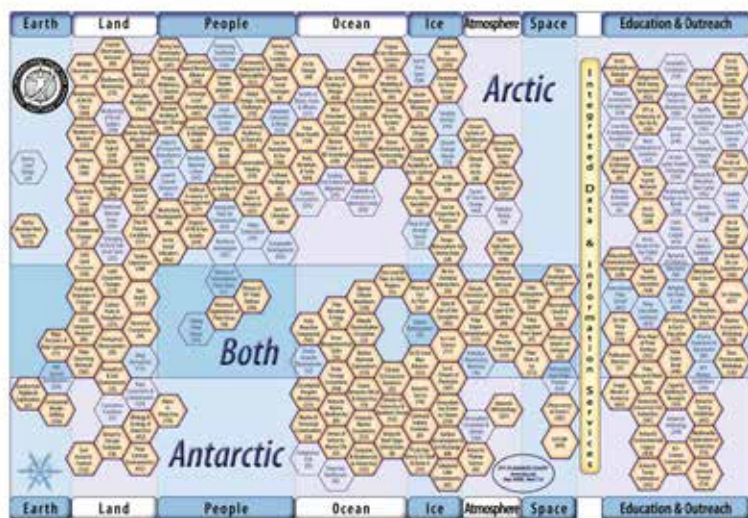
Rather than delegating the full power to the national IPY committees (as occurred in IPY-1, IPY-2 and IGY), the new IPY introduced a bottom-up planning process that was built upon, and took strength from, grass-root activism of individual scientists and science teams. Calls for individual research projects (or “ideas”) for

IPY program were issued four times in 2003–2004, so that the first action of the ICSU-WMO Joint Committee in winter 2005 was to select 228 international research projects out of some 900 (!) submitted proposals for IPY activities. All previous IPY/IGYs relied on powerful national committees or agencies, science unions, and individual luminaries to frame their program.

Lastly, a determined effort was made in IPY 2007–2008 to engage early career scientists and to train the next generation of polar scholars, particularly women and minorities. It was another sign of a much greater role played by the university-based science (hence, more students and young scholars) in IPY 2007–2008, compared to its predecessors dominated by the national research agencies and, before that, by the overwhelmingly male military and navy personnel and governmental-supported scholars. Such institutional build-up of young polar researchers was a wise investment; it helped expand the base for the IPY science, much like its bottom-up nature and inclusion of social scientists, polar indigenous peoples, and educators.

### Doing It Right In 2057?

While history rarely repeats itself, the IPYs did occur four times over the past 140+ years—in 1882–1883, 1932–1933, 1957–1958, and, again, in 2007–2008, that is, have been successfully replicated every 50 and once even in 25 years. If history is a guide, then a move to launch new IPY will be palpable by the late 2020s and the drive for the fifth IPY of 2057–2058 may be unstoppable. The momentum will probably start building by 2050–2052, as indeed happened in the most recent IPY around 2000–2001.



IPY 2007–2008 project “honeycomb chart”  
(Krupnik et al. 2011)

As of today, “Global Change” (or “Change at the Poles”) seems like the most obvious theme for the next IPY in the 2050s—unlike in 2007–2008, when IPY planners went to great length to preserve the multi-focused nature of their venture. The main reason, naturally, is the pace of environmental change in the Arctic and in Antarctica that is breathtaking and far beyond anything that would be considered a “new normal.” Such a rapid pace of change may trigger an even earlier IPY-like effort, particularly in case of visible dramatic shifts, like the summer ice-free Arctic Ocean or a rapid collapsing of the Antarctic or Greenlandic ice sheet. In any case, the topic of “change” is certain to play an ever-large role in the next IPY in the 2050s.

It is highly likely that the bi-polar nature of the previous IPYs (covering the Arctic



and Antarctica) will be transformed to include high mountain periglacial environments. It is also likely that more science effort will be supported internationally, via collaborative bottom-up partnership and broader community-driven base.

*Note: Igor Krupnik served as a member of the U.S. National Committee for the International Polar Year 2007–2008 (in 2003–2004), member of the ICSU-WMO Joint Committee for IPY 2007–2008 (in 2005–2010), and as the lead editor of the Joint Committee’s final report, “Understanding Earth’s Polar Challenges. International Polar Year 2007–2008” (2011).*

### A JAPANESE INTERNATIONAL FORUM ON “MEMORY AND THE MUSEUM”

By Aron Crowell

As public institutions charged with narrating history and representing cultures, world museums increasingly emphasize the recording and presentation of intangible knowledge maintained by source communities, recognizing that curated object collections are material signs of this living heritage that can serve as starting points for dialogue and collaboration. This approach was highlighted by the 23rd Science in Japan forum *Memory and the Museum*, presented by the Japan Society for the Promotion of Science (JSPS) at the National Museum of the American Indian (NMAI) in Washington in June 2018. The program examined, in the words of **Steven Lubar** (Brown University), how collections can serve as “touchstones of past events, evoking emotions, and connecting us to others” and offered examples of collaborative museum and community-based research by Japanese and American scholars.

The forum was the first held by the JSPS in the United States to focus on social sciences and was co-sponsored by an international consortium including the American Association for the Advancement of Science, the National Science Foundation, the Social Science Research Council, the International Union of Anthropological and Ethnological Sciences, and the World Council of Anthropological Associations. After welcoming remarks by **Kohji Hirata** (JSPS Washington office), **Machel Monerkit** (NMAI), and **Kazutoshi Aikawa** (Japanese Ambassador to the Organization of American States) the forum opened with a keynote address by **Kenji Yoshida** (Director-General of Japan’s National Museum of Ethnology), who described the ambitious scope of outreach and source community collaborations by the National Museum of Ethnology in Osaka (also known as the Minpaku), including its global Info-Forum project,



*Presenters and JSPS staff at the Memory and the Museum conference. Photo courtesy of Isao Hayashi, National Museum of Ethnology, Osaka*

international research fellowships, and museology training programs for the developing world with participants from Africa, South America, the Middle East, New Guinea, Southeast Asia, and other regions.

Academic staff of the Minpaku presented aspects of their research including oral histories of the great East Japan Earthquake of 2011 (**Isao Hayashi**); ethnic identity and family heritage as embodied in Alaskan Iñupiaq drum dancing (**Nobuhiro Kishigami**); collaboration with Taiwanese indigenous peoples to interpret historical collections from their communities (**Atsushi Nobayashi**); and participatory archaeology and heritage preservation in the highlands of Peru (**Yuji Seki**). These themes were paired with presentations by American scholars including survivor narratives as the basis for museum depictions of Hurricane Katrina (**Carl Lindahl**, University of Houston); histories and identities encoded by Malian Sogobò puppets and masquerades (**Mary Jo Arnoldi**, National Museum of Natural History); community collaborations at the National Museum of the American Indian to “change the narrative of history” (**Michael Pahn**, NMAI); and comparative studies of indigenous oral traditions and archaeology in Alaska and western Canada (**Aron Crowell**, NMNH).

Proceedings of the Memory and the Museum forum will be presented as full-length papers in a volume of *Senri Ethnological Reports*, edited by Isao Hayashi and anticipated for late 2019. My own paper, *The Truth of Oral Tradition: Multisource Confirmation of Northern Indigenous Histories*, presents archaeological and other evidence for the substantial accuracy of arctic and subarctic oral historical narratives, some centuries old. Oral traditions about the St. Lawrence Island famine (1878–1880 AD), the north Alaskan “summer that never came” (1783 AD), rapid Little



*Aron Crowell presenting “The Truth of Oral Tradition” at the Memory and the Museum conference at the National Museum of the American Indian. Photo courtesy of Isao Hayashi, National Museum of Ethnology, Osaka*

Ice Age glacial advance in Glacier Bay, southeastern Alaska (1700–1770 AD), Ahtna migration to Yakutat Bay (ca. 1450 AD), the era of bow and arrow warfare in Alaska (ca. 900–1850 AD), and the White River Ash volcanic eruption in the Yukon Territory (800 AD) are considered. Most of these examples reflect Arctic Studies Center research in the field and with museum collections in collaboration with indigenous scholars.

The conference was also an opportunity to reflect on the long, productive, and continuing relationship between the Arctic Studies Center and the National Museum of Ethnology (Minpaku). The Minpaku was a crucial partner in development of the Smithsonian traveling exhibition *Ainu: Spirit of a Northern People* in 1999, curated by **William Fitzhugh**, and opened the door to connections and collaborations with Japanese scholars including **Yoshinobu Kotani**, **Toshikazu Sasaki**, **Masahiro Nomoto**, **Koji Deriha**, and **Nobuhiro Kishigami**. The Minpaku has generously invited and funded participation by ASC and other Smithsonian staff in research seminars held in Osaka, most recently a workshop in 2016 on indigenous community collaborations for the Info-Forum project. Currently, the ASC is working with the new National Museum of the Aini, which is borrowing objects from the Hitchcock collection at NMNH for their opening exhibition in 2020.



*Anna Kerttula completes a long, successful career as NSF Arctic Social Science Program Director*

## RESEARCH

### HOMAGE TO ANNA KERTTULA DE ECHAVE

*An ASC Staff tribute*

After sixteen years serving as Social Science Program Director in the NSF Office of Polar Programs, **Anna Kerttula de Echave** stepped down from her post in mid-2018. Her tenure brought enormous change to a US government program supporting social science and humanities research in the Arctic. Thanks to Anna’s persistence, political skills, and the support she received from Polar Programs’ leadership, she was able to advance the scope of research and funding for social sciences multiple times and to make the field far more diverse.

Our association with Anna began during her graduate school days in the 1980s when she was conducting ethnological research in Chukotka and later when she worked with Senator **Ted Stevens** and the Alaska State Governor’s office. She came to NSF in 2002, following in the footsteps of **Noel Broadbent**, **Fae Korsmo** and other predecessors who helped launch the Arctic Social Science Program at Office of Polar Programs. Noel Broadbent’s tenure (1989–1997) had already brought innovations like the introduction of ethical principles in northern research to the conduct of NSF’s polar science, which was heavily slanted toward physical and biological sciences. Like Noel and Fae, Anna continued pushing the boundaries of polar science, outward and inward, convincing OPP that social science and indigenous perspectives are not simply another discipline in a scholarly stew but the central integrative tissue of northern research. Anna’s efforts caused us to see polar science in a perspective that holds Arctic residents, peoples, and cultures as central players in the production of knowledge. By putting people, cultures, and institutions first, she changed the way northern science is done and provided models for how it should be conducted there and elsewhere.

Although as government-sponsored researchers we could not rely on NSF funding for our field studies, Anna’s leadership was instrumental for many of our public, outreach, and knowledge dissemination ventures. These included our periodic ASC “festivals,” several sessions and symposia, and our largest-ever 18<sup>th</sup> Inuit Studies conference at the Smithsonian in October 2012 that brought to DC over 600 participants from across the Arctic.

Anna’s service to the Arctic social sciences community has been highly regarded by her many colleagues and peers, as well as by hundreds of early career scholars whom she helped with funding,



advice, encouragement, research-related travel, and professional connections. One of her principal legacies will be providing educational opportunities for native youth. Anna's office supported all major professional conferences in Arctic social sciences for over 15 years by providing travel funding for early career scholars, Indigenous participants, and researchers from Russia, East European, and Asian countries. She made a significant contribution to the 2003 World Archaeological Congress in Washington by providing funds to facilitate participation of Inuit students from Labrador and Alaska, all of whom subsequently went on to work in cultural resource and heritage management. Anna's latest achievement was the series of six forward-looking workshops, Arctic Horizons. Collaborative Research: Social Science and the High Arctic (<http://arctichorizons.org>) conducted in 2015–2016. These meetings engaged more than 200 scientists, educators, artists, data managers, Indigenous knowledge, and cultural experts from across the Arctic in discussions about the future of the social sciences and humanities in the North.

In 2013, she received a “life-time” membership in the International Arctic Social Sciences Association (IASSA), the group's highest honor. In recognition of her remarkable tenure, colleagues organized a special session honoring her contribution at the 46<sup>th</sup> annual meeting of the Alaska Anthropological Association in Nome (March 1, 2019). Another symposium was organized at the 2019 Society of American Archaeology Annual Meeting to honor her many achievements. One of the SAA presentations, a paper authored by **Ben Fitzhugh, Sven Haakanson, and Catherine West**, described Anna's diplomatic exercise of “soft power” directed towards changing the culture of scientific practice in the North. Anna transformed scholarly practice through the encouragement of junior scholars, especially women, Natives, and members of other academically under-represented groups, and by pushing researchers to work collaboratively and proactively with Indigenous and local communities wherever they work.”

The Arctic Studies Center staff joins our many colleagues in honoring Anna for her lasting contribution to the field and to the community of Arctic social scientists, students, and Indigenous researchers.

## ARCHAEOLOGICAL SURVEYS IN RIGOLET IN 2018

*By William Fitzhugh and Jamie Brake*

At the invitation of the Rigolet community, the Nunatsiavut Archaeology Program and the Smithsonian Arctic Studies Center completed a fourth season of site

survey in the Rigolet region of the central Labrador coast. As in previous years, we aimed to identify and record sites in unexplored areas of Groswater Bay and Eastern Lake Melville. Fieldwork took place during the last two weeks of July in what turned out to be the finest summer weather Labrador can offer. The research team was led by **Jamie Brake** and **William Fitzhugh** accompanied by students from Dartmouth College (**Jacob Marchman**), Williams College (**Halcyon Brown**), Notre Dame (**Alexandria Castellanos**), Yale (**Katherine Meier**), and American University (**Mary Maisel**), supported by *Pitsiulak* skipper, **Perry Colbourne**. Consultations with Rigolet elders and community members provided information on site locations, subsistence resources, and local history.

Rigolet is one of the best-known archaeological regions in Labrador, and its cultures—both Innu and Inuit—



*Mullen's Point settlement site and midden.  
Photo by William Fitzhugh*



*Excavation in Enclosure 3 at the Maritime Archaic site on West Indian Island (GbBj-11) near a cal. 6,600 BP oval pit-house. Photo by William Fitzhugh*





*Remains of the copper mine hoist platform on the southeast shore of Big Black Island. Photo by William Fitzhugh*



*Earth graffiti at North Henrietta Island.  
Photo by William Fitzhugh*



*Tent rings on Bear Island, near Middle River, in the eastern Backway/Back Bay. Photo by William Fitzhugh*

have ancient histories. The earliest Indians, known as Maritime Archaic, appeared shortly after deglaciation of the coast between 8–9,000 years ago. Thereafter, Labrador Maritime Archaic cultures persisted until 3,500 BP, when they were replaced by a series of proto-Innu cultures leading to the Innu of today. The first Paleoeskimo people arrived from the Arctic about 4,500 years ago, followed by Groswater and Dorset cultures, and about 1500 CE by Labrador Inuit. Climate change, shifts in animal resources, and dynamics between Inuit, Innu, and European groups resulted in expansions, contractions, and changes in these cultures, leading to the modern coastal boundary between Innu and Inuit groups between Rigolet and Cartwright, an enclave of Indian occupation in the Davis Inlet region, and the appearance of Europeans in settlements throughout the region in the 18–19<sup>th</sup> centuries.

Our 2018 research continued surveys along the southern shore of Groswater Bay, the eastern side of the Narrows, the southern shore of the Backway, and northeastern Lake Melville. Unlike the northern shore of Groswater Bay where research in the 1960–70s identified many prehistoric sites, sites so far found on its southern shore mostly date to the last 500 years. At Collingham's Cove, Mullen's Cove, and Grassy (John's) Point, we found sites with deep midden deposits similar to those at Broomfield Island, containing 18<sup>th</sup> to 20<sup>th</sup> centuries ceramics, iron tools and traps, square nails, glass beads, and clay pipe fragments, .22 shell cases, and brick. Most of the bones from our test pits were seal, and the deep middens indicated cold weather occupations. Whether these sites are Inuit, settler, or mixed is uncertain, although the presence of glass beads suggests Inuit women may have been present. One of the sites we found in a previous survey—Broomfield Island—is being considered for tourism development. Our hope that one of these grass-covered middens might turn up a Groswater Dorset winter site did not materialize.

In addition to the southern shore survey we returned to West Indian Island in southeastern Groswater Bay to continue investigation of a Maritime Archaic site (GbBj-11) found on the high marine beaches in the center of the island in 2015. At that time we excavated a small oval boulder pit dwelling that produced a radiocarbon date of cal. 6,600 BP. Nearby on this same beach level is a series of boulder-lined enclosures sharing common walls. Test pits in two of the enclosures this year produced no artifacts, flakes, bones, or charcoal. Their function remains mysterious although they are almost certainly a product of the Maritime Archaic occupation. South of the Feature 11 enclosures, a circular tent-ring (Feature 10) with a central hearth at the crest of the beach ridge produced two Ramah chert flakes and charcoal and is probably



a post-Maritime Archaic camp. We also excavated Feature 9, a probable Maritime Archaic boulder pit on the northwestern shore below Feature 11, that had a floor of broken rocks, but no cultural material.

Having arrived in Groswater Bay a day early, and with calm weather with no sea swell, we visited the exposed cove on the east side of George Island and scouted the terraces above its sandy beach. The only archaeological features noticed were boulder caches, caribou bones scattered about the tundra, and caribou trails beaten into the tundra. Rigolet people told us that a few years



*A family memorial to Jack and Dorcas Sheppard.  
Photo by William Fitzhugh*

ago a group of caribou became isolated on the island, reaching it when a cold winter created an ice bridge, but after that, with milder winters, could not regain the mainland, and were killed by hunters or died.

We continued north across the mouth of Groswater Bay to Rattlers Bight and during the afternoon revisited Shell Island, a small skerry south of Winters Cove, where in 1969 we excavated a small site (Shell Island-1, GcBi-11). This site had produced a prodigious amount of biface thinning flakes of Ramah chert, as well as a few flakes of Groswater chert. After some difficulty, we relocated the site and determined its GPS position. Our original interpretation (Fitzhugh 1972) still seems valid; Shell Island is probably a late prehistoric Daniels Rattle or Point Revenge site where Ramah chert quarry blanks were flaked into intermediate stage

preforms destined to supply the extensive southern trade of Ramah chert artifacts known for this period.

Black Island on the north side of Groswater Bay is known from Inuit oral history as an important place for spring and summer camps. This may have been the place where the early settler **William Phippard** found a gold medal on an island amongst "...so many dead Esquimaux" (Townsend 1911: 261). **George Cartwright** saw the medal and recognized it as having once belonged to his brother who had given it to one of a small group of Inuit that Cartwright had brought with him to England. Tragically, all but one of that group died of smallpox before returning to Labrador. The only Inuit survivor was a young woman named **Caubvik**, who was sick with the disease during the return voyage. Though she survived the trip,



Cartwright was convinced after seeing the medal that the sickness had been passed on after he had returned Caubvik to her people (Townsend 1911:260–261).

We found numerous food caches and some habitation evidence in the boulder beaches on the southwest corner of the island, but little evidence of the large camp that is supposed to be here. On the other hand, surveys on the island's southeastern end revealed numerous tent rings and caches. Most surprising was a huge stone-walled structure built of mine tailings around a water-filled, circular mine shaft dating to the early 20<sup>th</sup> century. The quartz-rich tailings had been used to build a platform for supporting a lift to raise rock from the shaft.

A survey trench extended south from the mine across the adjacent raised beach. According to local reports, the mine never produced copper and closed after the manager's son died in an accident.

Surveys on the east side of the Narrows produced evidence of seal caches and an historic era cemetery but no prehistoric sites. The most important place is Summer Cove, where we found a group of tent-rings. This is the largest concentration of Inuit tent sites in the Narrows and appears to date to the 19<sup>th</sup> and 20<sup>th</sup> centuries. Inspection of the northern shore of Henrietta Island revealed several sites of the same period on exposed gravel and slab outwash delta around the mouth of a small river draining the interior of the island. Visitors to this area have written, using small white quartz rocks, the dates "1987", "1992", and "1994" on the exposed gravel surface.

The Backway (also known as Back Bay) is the least-known archaeological area of Hamilton Inlet. Previous surveys identified sites as far east as Haniuk on its north shore. This year we surveyed the southern shore and found small historic tenting sites at Indian Point, South Long Point, and on the western end of Bear Island. Time did not permit exploration of the eastern end of the Backway or the travel route through the "flat-land" waterways leading to the south shore of Groswater Bay. Most of the sites lacked sleeping area borders and appear to be Innu camps. Local reports indicate the inner Backway was part of an Innu route leading from a river emerging from the Mealy Mountains across the lowlands between the Backway and Groswater Bay.

We also surveyed the northern shore of Lake Melville from Valley Bight to Charlie Point. Rigolet people say this coast was used for temporary camps when traveling between Rigolet or Groswater Bay and western Lake Melville. The eastern part of the northern shore of Lake Melville has few islands, harbors, or large rivers to attract permanent settlement. We found small hearths on exposed points and cobble beaches, and at Charlie Point, a series of modern stone inuksuks, but no evidence of extensive use until the recent speedboat era. One of the more interesting areas was a cove on the mainland south of Valley Bight and Andy Island where we found a modern cabin and a cemented stone memorial to the previous occupants, **Jack and Dorcas Sheppard**, installed by their children and relatives.

In 2017, we found a sod-walled Inuit winter dwelling on the north end of St. John Island, which is an excellent place for netting seals through the ice. Test pits in 2018 revealed a large house with a paved interior, a raised sleeping platform in the rear, and a paved entryway that opened onto a paved "patio"



*St. John Island Inuit winter house and midden.  
Photo by William Fitzhugh*

at the end of the entry tunnel. The dwelling dates to the 18<sup>th</sup> century and is the western-most Inuit winter site in Hamilton Inlet. The site is full of seal bones and may have been a staging point for spring caribou hunts in the Mealy Mountains.

As noted in previous reports, Hamilton Inlet has extensive archaeological and heritage resources that could be developed for scholarly and touristic purposes. The most likely opportunities lie with Inuit and Innu sites near the Mealy Mountains National Park, especially studies of Inuit-Innu contact at 18<sup>th</sup> to 20<sup>th</sup> century settlements. While there may have been periods of Inuit-Innu hostility in the 18–19<sup>th</sup> centuries, oral history today indicates frequent peaceful contact and collaboration. These stories could be explored by archaeological work at many of the sites we have identified during the past several years.

### **JESUP-2 TREE KEEPS BEARING FRUITS: NEW PUBLICATIONS ON SIBERIAN ETHNOGRAPHY**

*Jochelson, Bogoras and Shternberg. A Scientific Exploration of Northeastern Siberia and the Shaping of Soviet Ethnography (2018, Erich Kasten, ed. Verlag der Kulturstiftung Sibirien: Fürstenberg/Havel, 288 pp.)*

*By Igor Krupnik*

ASC Newsletter readers and many of our research partners are well familiar with the "Jesup-2" initiative,



a decade-long “centennial” program celebrating the Jesup North Pacific Expedition of 1897–1902, with its several teams working in Northeast Siberia and Northwest North America, under the general leadership of **Franz Boas** (*ASC Newsletter 1, 2a, 6, 9, 10, 12, 13, 14*). The ASC began this program in 1992 and ran it successfully for over a decade—via several scholarly symposia, published volumes, public and collection-based initiatives, small exhibit and website projects (mostly implemented by our partners at the American Museum of Natural History in New York), and other activities. Although the Jesup-2 program unofficially closed in 2003, over the years, new publications continued to appear, like **Sergei Kan**’s monumental book on **Leo Shternberg** (2009), an edited volume *Raven’s Arch* (1903–2002), *The Jesup North Pacific Expedition Revisited* (Tanimoto and Inoue 2009), and scores of research papers and collection discoveries (*ASC Newsletter 12*). Nonetheless, over the years most of the Jesup-2 partners moved on to other research topics.

Unbeknownst to many colleagues in North America, a small research institution in Fürstenberg/Havel, Germany, led by one of the Jesup-2 alumni, Dr. **Erich Kasten** continued to wave the Jesup flag, at least on the Siberian side of the Jesup-2 North Pacific area. Kasten heads a small research foundation called Kulturstiftung Sibirien (Foundation for Siberian Cultures—[www.kulturstiftung-sibirien.de](http://www.kulturstiftung-sibirien.de)) he helped establish in 2010 with the aim of preserving indigenous languages and knowledge systems and enhancing arts and craft traditions of Northern indigenous peoples, particularly across the Russian Far East and Northeast Siberia. Kasten is no stranger to exploring Franz Boas and his legacy; in 1989–90 he produced an exhibit *Maskentaenze der Kwakiutl* (*Kwakiutl Masked Dances*) that was displayed at the Ethnological Museum in Berlin and in 1992, (together with **Michael Duerr** and **Egon Renner**) he edited a volume dedicated to the legacy of Boas in studying people, cultures, and languages of North America.

When we first met Erich at the Jesup-2 “centennial” conference in 1997 at AMNH in New York, he was already firmly working with the Koryak and Itelmen people of the Russian Far East on their contemporary issues of culture and language preservation. He maintained this research focus over the next 20 years; he also visited the Sakha Republic (Yakutia), Chukotka, and other areas once studied by the Jesup North Pacific Expedition. Soon after the Kulturstiftung Sibirien Foundation was launched, he embarked on an ambitious project to reprint the original volumes of the Jesup Expedition series (1898–1933), at least those related to Siberia and make them accessible and

searchable online via the existing PDF files scanned by AMNH, primarily for local users, who have difficulty accessing the original books. His vision also included providing each volume with a new “introduction” to be written by a modern scholar specializing in the respective indigenous nation or its area.

One by one, Kasten’s ambitious plan materialized in the production of a new library of the Jesup volumes called *Bibliotheca Sibiro-pacifica: The Koryak* (by **Waldemar Jochelson**, 2016, with a foreword by **Kasten** and **Michael Dürr**), *Chukchee Mythology* (by **Waldemar Bogoras**, 2016), *The Chukchee* (by **Bogoras**, 2017, with a foreword by **Igor Krupnik**), *The Yakut* (by **Jochelson**, 2018, with a foreword by **Tat’iana Argounova-Low**), and *The Yukaghir and Yukaghirized Tungus* (by **Jochelson**, 2018, with a foreword by **Thomas R. Miller**, another Jesup-2 alumni). This is a monumental shelf of thick volumes in light-beige hard cover that, besides the new introductions, replicate the original AMNH publications of the Jesup Expedition.

In 2018, Kasten made a typical “Jesup-2” move: he compiled these new introductions and several other research papers dedicated to the Jesup Expedition work in Siberia and published them together as an edited volume titled *Jochelson, Bogoras and Shternberg. A Scientific Exploration of Northeastern Siberia and the Shaping of Soviet Ethnography* (2018). The volume includes nine papers, of which four are the above-mentioned new introductions to the reprinted Jesup Expedition volumes. Five other papers in the book explore in more general terms the life and research of two lead figures in the Jesup work in Siberia (**Jochelson** and **Bogoras**) and of their colleague and ideological peer, **Leo Shternberg**, who was instrumental in the foundation of new Russian Siberian ethnography after 1920. These papers that were written by both members of the original Jesup-2 team (**Sergei Kan**, **Tatiana Roon**) and other Siberian specialists (**Anna Sirina**, **Elena Liarskaya**, **Matthias Winterschladen**) offer new perspectives of the famous Siberian “ethno-troika” before and after the Jesup Expedition.

It is refreshing to see the “Jesup-2” tree that we helped plant in 1992 still vibrant and bearing products, including those by people who were too young to join the original Jesup-2 team almost thirty years ago. It provides a useful match to another recent collection published by the Kulturstiftung Sibirien (2016, in German), *Auf Den Spuren Der Modernen Sozial- Und Kulturanthropologie. Die Jesup North Pacific Expedition (1897–1902) im Nordosten Sibiriens* (*On the Trail of Modern Social and Cultural Anthropology. Jesup North Pacific Expedition, 1897–1902 in Northeast Siberia*) edited

by **Diana Ordubadi**, **Matthias Winterschladen**, and **Dittmar Dahlmann**. The latter book contains six more papers on the history of the Jesup Expedition work in Siberia and it even features on its cover the original Boas' draft map of the future Jesup research area that was recovered by **Curtis (Kit) Hinsley** and mailed to AMNH in 2003, where I had a chance to explore and identify it in 2004 based on our knowledge on the history of the expedition (*ASC Newsletter 12:16–17*). It is prudent to say that our (unannounced) closure of the Jesup-2 program in 2003 was perhaps premature, as the field remains active and several younger researchers have replaced members of the original Jesup-2 founding cohort.

### BURCH ENDOWMENT SUPPORT FOR ASC ACTIVITIES IN 2018

By *Igor Krupnik*

2018 was the sixth year, when ASC operations have been strongly bolstered by the funding from the Ernest (“Tiger”) Burch Endowment established by the family of our late colleague, **Ernest “Tiger” Burch, Jr.** (1938–2010). In 2014–2016, the endowment, together with the SI “Grand Challenges” grant was instrumental for the success of our Arctic Crashes project (*ASC Newsletter 21, 22, 23*) that has materialized as a major volume, now in press. It also allowed us to establish an annual “Burch Lecture” series started in 2015.

The Burch Endowment continued to boost the ASC activities, both in Washington and Anchorage, throughout 2018. It covered several research and conference trips by the ASC staff, a portion of expenses for the editorial work on the Arctic Crashes manuscript and for the production of this Newsletter, the ASC membership in ARCUS (Arctic Research Consortium of the U.S.), our contribution to the 2018 SI “Mother Tongue” film festival, and several other activities. As in the prior years, it supported the annual “Tiger Burch” lecture in April 2018.

We had a special speaker for the 2018 Burch Lecture—Dr. **Karen Mager**, Assistant Professor of Environmental Sustainability at the Earlham College in Richmond, IN. Karen is an ecologist studying wildlife populations responses to environmental change; but via her graduate training and research in Alaska, she became interested in indigenous knowledge, oral history, and Native perspectives on animal-human-environmental relations. She is also a contributor to the forthcoming *Arctic Crashes* book.

What made Karen a special Burch speaker was her relations with Tiger in her early research years in Alaska that overlapped with Tiger’s writing on



*Dr. Karen Mager gives the 2018 Ernest S. Burch lecture at the National Museum of Natural History, April 17, 2018.*

*Photo by Igor Krupnik*

his decade-long research on the history of Alaska caribou herds. Karen was the youngest of Tiger’s many correspondents and, perhaps, among the last influenced by personal interactions with him. He would be pleased to see her speaking at his 80<sup>th</sup> birthday on April 17, 2018 at NMNH.

### GHOSTS OF CARIBOU HERDS PAST: EVALUATING HISTORICAL HERD CRASHES USING GENETICS AND INDIGENOUS KNOWLEDGE

By *Karen Mager*

The opportunity to survey a vast landscape is something most of us experience only occasionally,

from the top of a hill or the window of an airplane. In the Arctic tundra of Alaska, the summer landscape is a green matrix surrounding the curved lines and circles of rivers and lakes...and if you're lucky, the chance to spot some caribou, ant-like from the air. Biologists use aerial surveys to count caribou, and biologist **Jim Dau** recalls: "*During the 2009 Western Arctic Herd (WAH) census...we photographed a single group of caribou that numbered >211,000 caribou. That group, even though it was incredibly dense in places, covered well over 30 mi<sup>2</sup> (78 km<sup>2</sup>).*"

However, if you were to travel back in time to the same landscape 100 years earlier, you'd not likely see any caribou. Biologist **Rudolph M. Anderson** wrote in 1913: "*Until a few years ago the coastal plain of Arctic Alaska...was the pasture of vast herds. Only an occasional scattered band is now seen....The caribou are practically extinct....*"

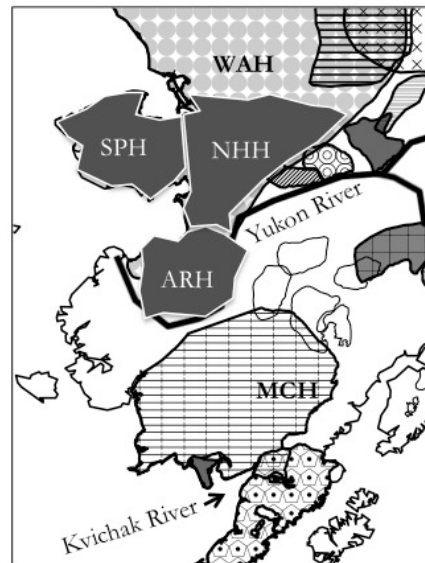
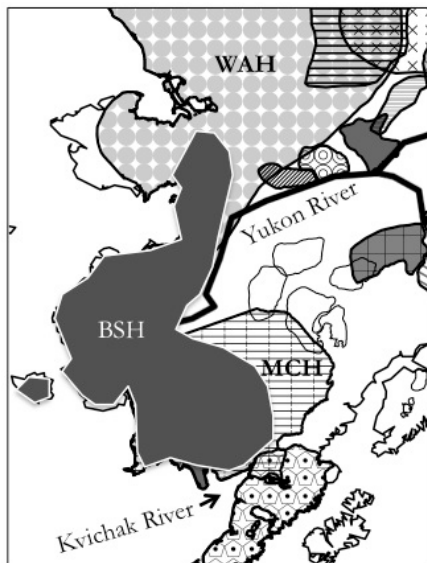
This dramatic change in caribou abundance fascinated anthropologist **Ernest S. "Tiger" Burch** (1938–2010) and me. Both of us heard repeatedly about changes in caribou abundance, distribution, and behavior from Alaska Native elders who we sought to learn from using oral history research. Why did caribou populations crash? How did they recover? What were the caribou doing in the intervening century, and how have those "ghosts of caribou herds past" shaped the caribou herds of today?

I first met Burch, the acclaimed ethnohistorian, during my time as a PhD student at the University

of Alaska Fairbanks, where I was attempting to answer such questions. He was studying the history of caribou herds as well, and in 2009 over coffee in Fairbanks we launched a scholarly conversation that lasted until Burch's death in 2010. We shared obscure historical sources plucked like needles from a haystack. I gave comments on Burch's draft manuscript on the history of caribou in Alaska, and we discussed the implications of the available evidence for caribou biology. I published my findings later in several scholarly papers and my doctoral thesis, and Burch's book, *Caribou Herds of Northwest Alaska: 1850–2000*, appeared posthumously in 2012.

Burch's meticulously researched book reconstructed the historical migratory routes and population trends of caribou herds long before biologists were flying aerial surveys or studying caribou movements with satellite collars. It fills a significant gap in knowledge about caribou biology. My recent research enters into dialogue with Burch's book by adding to research on reindeer-caribou interactions, a subject that interested him greatly, and by using genetic analysis to "test" the historical hypotheses that Burch proposed.

Caribou populations fluctuate in size over decadal time scales across the Arctic. Some herds that crash will later recover. Others will not, due either to extinction or merging with another herd. Some perceived caribou crashes may actually be due to range shifts, emigration, or shifts in behavior. To research historical crashes in caribou herds as well as their interactions with reindeer, I conducted oral history interviews with Iñupiat



Ranges of proposed historical herds from the mid-late 1800s overlaid on a map of modern caribou herd ranges in western Alaska. Scenario 1: Large Bering Seacoast Herd. BSH – Bering Seacoast herd, WAH – Western Arctic herd, MCH – Mulchatna herd (MCH). Scenario 2: Three Small Herds. ARH – Andreafsky River herd, NHH – Nulato Hills herd, and SPH – Seward Peninsula herd (SPH) (approximate herd ranges from Burch 2012:119)



elders, former reindeer herders in Utqiagvik (Barrow) and examined primary historical sources and their interpretation by various authors. Next, I formulated predictions about the population genetic patterns we would expect to find if each alternative historical hypothesis were correct. Finally, I used genetic data from modern herds to evaluate each prediction and provide new understandings of historical caribou herds.

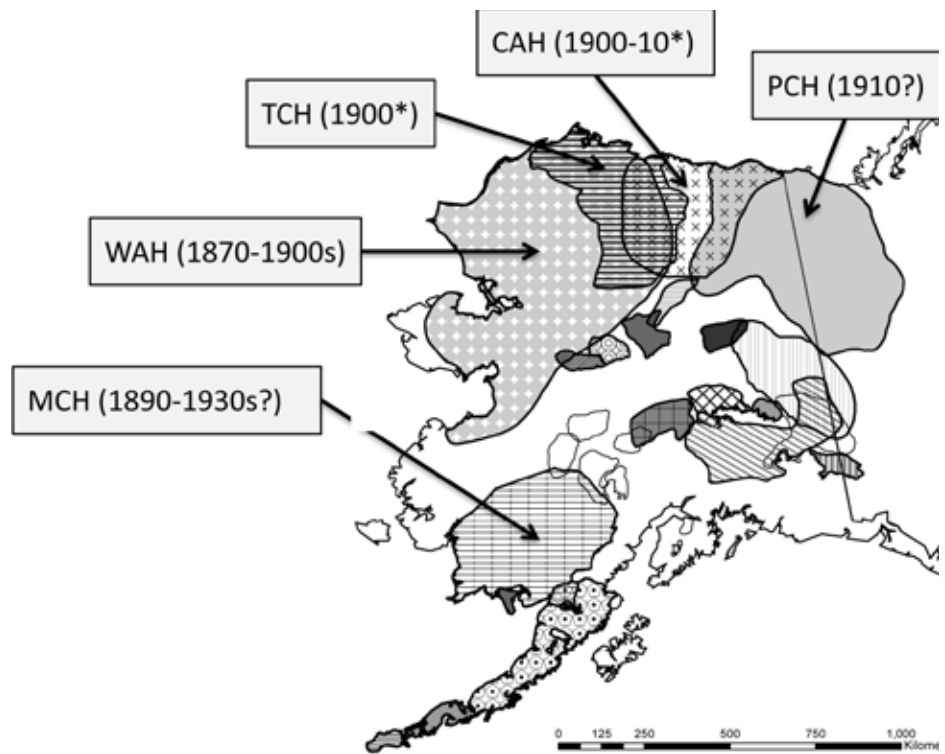
“How” caribou populations crash is an important question for many reasons. Caribou are integral to the livelihoods of many northern peoples, as well as to their natural biological predators (like wolves) and their abundance or scarcity matters to those who depend on them. The “herd” is the unit used by biologists to manage caribou populations, and is defined as a group of individuals born in a particular calving area to which females return each year. Understanding how herds crash and recover is important to tracking their identity and continuity. Additionally, caribou herd declines influence their genetic diversity, which can impact their future adaptive capacity to environmental change.

Burch and I both engaged these “how” questions, relying upon historical documents and oral histories that describe caribou herd crashes in the Bering Sea Region (1870–1900) and the North Slope (1900–1915) of northwestern Alaska. Burch’s careful and extensive analysis of these sources, including oral histories he recorded that recall the direction of travel taken by hunters at different times of year, led him to conclude that up to seven historical caribou herds once lived in a region currently occupied by only four herds. Burch’s interpretation of how each of these herds recovered (or did not), along with my additional research, form the basis of the genetic predictions I test.

Burch’s historical reconstructions differ from those of earlier authors. For example, we know that caribou were numerous in the lower Yukon and Kuskokwim watersheds of western Alaska in the mid-1800s, but interpretations differ regarding who they were, and how they declined. Biologist **Ronald Skoog** (1968) hypothesized that one large, migratory “Bering Seacoast

Herd” spanned the region. This was based on a tantalizing, if uncertain, suggestion of a migratory route from another biologist, **Olaus Murie** (1935), who heard that caribou once crossed the Yukon River heading south to a calving ground, and also migrated northward along the Norton Sound coast in the fall to their wintering grounds. Using the same information along with many additional sources, Burch proposed instead that up to three small herds occupied patches of high quality, montane habitat in the region: the Seward Peninsula Herd, the Nulato Hills Herd, and the Andreafsky River Herd. Which of these interpretations most closely approximates the actual history of caribou in the region? Genetic methods provide a tool to help us answer this question!

There are no caribou herds in the Bering Coast region year-round today; the region is at the southern extent of the Western Arctic herd and the northern extent of the Mulchatna herd but it is rare for animals from either of these to cross the Yukon River. Contact between these herds in the 1800s is conceivable, however. Large, migratory, tundra herds are often closely related to neighboring herds and to more distant herds with which they share an intermediate neighbor. By contrast, small montane herds are often



Map of modern Alaskan caribou herds mentioned, indicating the time period each herd is thought to have crashed (\* indicates herds believed to have gone extinct, and their ranges later recolonized): PCH = Porcupine herd, CAH = Central Arctic herd, TCH = Teshekpuk herd, WAH = Western Arctic herd, MCH = Mulchatna herd

more genetically differentiated. Therefore, if a large Bering Seacoast herd once existed we would expect some evidence of past genetic exchange between the Western Arctic and Mulchatna herds. In analyzing the relationships of these two herds to 18 other caribou herds in Alaska, I found that the Mulchatna herd was more closely related to nine other herds throughout Alaska than it is to the Western Arctic herd. This genetic pattern suggests that the lower Yukon River has been a barrier to genetic exchange, rather than a conduit, historically. Thus, the genetic data are more consistent with Burch's interpretation, that three small and less-migratory herds once lived in this region.

By 1900, these three small herds were extinct and the Western Arctic herd had declined dramatically. Not long after, herds to the east along Alaska's North Slope also crashed. The people of Barrow, Alaska harvested 1,200 caribou in the winter of 1897–1898 to feed men from a stranded whaling ship, but caribou were scarcely seen again in that coastal region until the 1930s. In the intervening years, people in the Barrow area used reindeer introduced from Russia to establish several domestic reindeer herds that numbered in the hundreds of thousands by the 1930s but declined to zero by the 1950s. This complex history begs the question: are the Teshekpuk and Central Arctic herds that inhabit the North Slope today direct descendants of past herds?

Burch concluded from his research that the historical herds in the Teshekpuk and Central Arctic herd ranges went extinct, and were then repopulated via emigration from neighboring herds. An alternative interpretation of these and some additional sources suggest that herds may simply have shifted southward into the mountains, or declined and switched to a non-migratory pattern, rather than going extinct. Thirdly, many local residents and biologists suspected that modern caribou herds were founded by escaped domestic reindeer, which



*Karen interviews Tom Brower III in Utqiagvik (Barrow) in 2008 about caribou and reindeer in the Teshekpuk herd range*

are the same species as caribou and capable of interbreeding. To determine which of these historical interpretations is most likely, I turned to genetics again!

If caribou herds had declined dramatically and then recovered, we would expect to see signatures of a genetic “bottleneck” in herds today, but we find no evidence of this. Alternatively, if the herds went extinct and were then re-established by emigration from the nearby Porcupine or Western Arctic herds, we would expect today's herds to be genetically similar but less diverse than their founders—however, we find no such pattern. Finally, my oral history research with 25 former reindeer herders and caribou hunters in Barrow, including 12 elders who were active herders in the 1920–1940s, suggested extensive opportunities for mixing between caribou and reindeer. The genetic data suggest some interbreeding between caribou and reindeer, however it is clear that modern herds are descended primarily from caribou and not feral reindeer herds. The exact history of North Slope herds remains murky, though genetic data are more consistent with a history of herd persistence rather than the extinction and colonization Burch proposed.

Looking to the past can provide us with models of caribou herd change over time scales beyond the range of modern biological data. Modern satellite collar technology, however, enables us to observe movements of caribou in crashing or expanding herds, and to note how they alter their space use and social associations. These observations raise questions about how we measure herd persistence. If one herd joins another's calving ground for a decade but then “reappears” as caribou begin to use the area again, is it the same herd? If a herd abandons its calving ground but all the females of the herd stick together as they shift to join another herd, is the herd still intact? Links to geographic range and to descendants both affect the adaptive capacity of caribou, and their value to people. This is an exciting new frontier in the study of caribou herd histories, as we begin to have long enough periods of satellite collar data to observe such behavioral changes.

Long-term case studies remind us of the astounding diversity of caribou ecology—their use of landscape, social behavior, and fluctuations in size—recorded across the species' range over time. By taking an expansive, well-researched, and bold approach, Burch extended our understanding of caribou herd dynamics over the time scale of centuries. In doing so, he revealed the likely existence of small herds that are now extinct, and helped to kindle my interest in one of my next projects—studying genetic relationships of some of the small herds that still remain.

## TIES THAT BIND: SUBMARINE CABLES AND SMITHSONIAN RESEARCH

By John Cloud

The electric telegraph, invented in the 19<sup>th</sup> century, has been called “the Victorian Internet”. In the 21<sup>st</sup> century, in our ever more inter-connected digital world, the amalgam we refer to as “The Internet” is increasingly looking like “the Victorian telegraph”. That is because the most important advance in the history of the telegraph was the successful completion of submarine electrical cables linking entire continents across the ocean basins that occupy most of the planet. Near instantaneous transmission of data around the world defines our world.

Since 1866, most of that transmission has occurred underwater. The successes and failures of submarine cable systems have shaped not only our world, but also the history of the Smithsonian.

The original plan for a submarine cable system was to link western Europe and North America across the North Atlantic Ocean. The shortest route is from Ireland to Newfoundland, to the Canadian mainland and then the United States. To successfully lay the cable, the configuration of the bottom of the Atlantic had to be determined. In the 1850s, American and British attempts to do this transformed human knowledge of the deep ocean. Royal Navy Lt. **Joseph Dayman**'s 1857 map and bottom profile of the approach to Newfoundland along the proposed route was foundational to contemporary oceanography.

The first cable was completed in September 1858 and was the wonder of the moment, but within a month the cable had failed. The technology was not ripe enough for the task. By the early 1860s, when there was still no successful Atlantic cable, the Western Union Company in the United States began to explore a route across the Bering Strait from North America to Siberia. The company secured the cooperation of the Russian American Company, the Russian imperial company that owned what became known as Alaska. Together, they launched the Western Union Telegraph Expedition (WUTE). The proposed route would go up the Fraser River in Canada, cross over into the Yukon to Port Clarence on Seward Peninsula, pass under the Bering Strait to Siberia, and from there link to existing Russian telegraph systems. The sketchiness of the WUTE map reflects the poor state of knowledge of the land and peoples that the cable system would pass and affect.

In consultation with Smithsonian Assistant Secretary **Spencer Baird** in 1865, WUTE commissioned the



*William Healey Dall in his WUTE Scientific Corps uniform, 1865*

charismatic Chicago naturalist **Robert Kennicott** to assemble a team of researchers to survey the route, gathering information on everything from geology to people. Kennicott and Baird assembled a team of specialists to survey the terrestrial zone: **J.T. Rothrock**, botany; **Ferdinand Bischoff**, entomology; **Henry Elliott** and **Charles Pease**, ornithology and mammals; **Henry Bannister**, paleontology; and **William Healey Dall**, invertebrates and fish. These became members of the WUTE “Scientific Corps”. There was also the Bering Sea to be dealt with, and for this, WUTE assembled a much larger “Marine Corps” under the charge of the US Revenue Marine Captain **Scammon**, for whom both Scammon’s Lagoon in Baja California, and Scammon Bay, Alaska are named. The joint marine expeditions of the Western Union Company and the Russian American Company became a prelude to the transfer of the vast lands of what became Alaska to the United States in 1867.





*Celebration of Ocean Telegraphing, 1858*

In 1866, in the midst of prodigious efforts by all involved, there were two momentous events: **Robert Kennicott** died mysteriously in the field and a second trans-Atlantic submarine cable was successfully completed. The WUTE project was instantly obsolete and was cancelled. The loss to Western Union and the Russian American Company, however, was the Smithsonian's gain. The surviving members of the Scientific Corps, with their vast collections and their ethnographic research, returned to Washington where Baird helped parlay their results into popular and congressional support for the purchase of Alaska. The brief but productive history of the WUTE has enriched the Smithsonian and the nation ever since.

Submarine cables may seem archaic, but in fact there are more of them being laid every day in the 21<sup>st</sup> century. Humans are profoundly terrestrial, so the underwater cables are largely invisible. But civilization as we presently know it is held together by a vast, expanding aquatic web dating to the Victorian era.

## A BOREAL FOREST INTERLUDE

*By Robert Mullen and Stephen Loring*

Named for Boreas, the Greek God of the North Wind, the Boreal Forest, girds the Arctic with a crown of conifers whose vast expanse creates the world's largest terrestrial ecosystem and the Earth's greatest remaining wilderness. It is a critical component of climate modelling; it contains a sizeable proportion of the world's critical fresh-water wildlife and nesting habitat; and it is the homeland of indigenous cultures whose intellectual heritage is a vestige of humanity's hunter/gather origins. For almost twenty years the Arctic Studies Center has advanced the idea of an exhibition and educational initiative to raise awareness of the tremendous significance of the boreal forest. Plans have surfaced and prospered repeatedly only to be dashed as the Museum's agendas and personnel have changed over time. Through this whole process, the Arctic Studies Center has partnered with **Rob Mullen** and his Wilderness Rivers Expedition Art Foundation (WREAF), working together to fuse scientific, artistic, and indigenous perspectives of the Boreal Forest. This

past year **Carol Bossert** of the Smithsonian Institution Traveling Exhibition Service reignited the embers of a Boreal Forest Exhibition, and served as a catalyst for the Ungava canoe adventure reported below.

A core mandate of WREAF has been to promote and publicize awareness and appreciation of the boreal forest by creating opportunities for artists and researchers to travel in wilderness portions of northern Canada and Alaska. For the summer of 2018, Rob Mullen, with the support of The Center for Circumpolar Studies, Alliance de Industrie Touristique du Québec, Nunavik Tourism, Nunavik Parks, and the Natural Resources Defense Council (NRDC), arranged an expedition to Wiyashakimi (the Lac aux l'Eau Claire/Clearwater Lake meteorite impact crater) in Nunavik (Arctic Quebec). The expedition included a canoe-borne traverse across the Ungava Peninsula from Richmond Gulf on Hudson Bay via the Rivière aux Mélèzes to Kuujjuak at the mouth of the Koksoak River on Ungava Bay. This rarely travelled route was pioneered by the intrepid Canadian geologist, **A.P. Low**, in 1896, who traversed this portion of Eeyou Istchee with the help of Cree/Eeyou informants and guides.

Our 2018 fieldwork was to gather insight and materials for the exhibition and to follow up on the ASC “Animal Crashes” research initiative, particularly to gather data on caribou and the freshwater seals of Ungava, as well as aspects of Innu history and land-tenure in the northwestern corner of Nitassinan.

The WREAF/ASC party consisting of **Stephen Loring**, **Rob Mullen**, videographer/naturalist **Robin Tapley**, and photographer **Steve Gorman**, flew from Montreal to the small Inuit village of Umiujaq on the northeast coast of Hudson’s Bay on August 2. The first 150 miles of our trip would be within the new (2013) Tursujuq National Park. Early in our discussion about an Ungava traverse, Rob’s consultation with park personnel and with Nunavik tourism officials resulted in their extending an invitation to us to spend our first week in Nunavik as their guests on the “Tasiujaq Treasures” excursion. This opportunity gave us a chance to visit the community and explore the spectacular landscapes in the park, including Nastapoka Falls and Richmond Gulf (Lac Guillaume-Delisle). We owe a conspicuous debt of gratitude to Tursujuq Park Operations Manager, **Michel Haarc-Morrisette** and **Isabelle Dubois** of Nunavik Tourism for facilitating our introduction to the Umiujaq and Kuujjuak communities and the wonders of the region’s geology and wildlife.

Our survey party left Umiujaq on a chartered Twin-Otter that flew us into the Clearwater Lakes on August 9th, from whence we followed A.P. Low’s route up the Noonish River, crossing over the Clearwater/Nastapoka



*Close encounters of the Rangifer kind: for several days in late-August small companies of caribou crossing the Rivière aux Mélèzes were never out of sight and occasionally dense enough to prove a navigational hazard! Photo by Rob Mullen*



*The sometimes thought-to-be-extinct Fresh Water Seal of Ungava (*Phoca vitulina mellonae*) photographed in Lacs des Loups Marins. Photo by Rob Mullen*



*An Innu (Eeyou Istchee) raised earthen-walled tent-ring (with a central stone hearth), ca. 1880–1900, above a portage route from the Clearwater Lakes to Ungava. Photo by Stephen Loring*

divide into the Seal Lake country. The Seal Lakes (Lacs des Loups Marins) have a near mythical status as home of a unique population of freshwater seals (*Phoca vitulina mellonae*) whose ancestors became trapped as post-glacial isostatic rebound expelled the Tyrrell Sea from the Hudson Bay lowlands between 8,000 and 3,000 years ago. Although known to Inuit and Innu, and referenced by early Hudson's Bay Company explorers, they remained "unknown to science" until a pair of Carnegie Museum of Pittsburgh naturalists (**J.K. Doult** and **Arthur Twomey**) acquired two during a mid-winter expedition in 1938–1939.

Seal Lake is a large complicated maze of interconnected bays and waterways interspersed with islands and peninsulas that trend southwest-to-northeast for over 80kms. A leitmotif of the few accounts of traversing the lake, from Low's day to recent times, are the dangerous winds and high seas these travelers faced. We were greatly relieved/blessed by moderate westerlies that propelled us, for the most part, safely along. The only lament being that the fair weather precluded intensive archaeological survey for previous Innu/ Eeyou land-use and the documentation of wildlife and subsistence resources. Nevertheless, we were thrilled by encounters with four of the mysterious (but curious) freshwater seals.

At the extreme northeast of Seal Lake our route, a series of short portages led across the Height-of-Land to the Lac du Sem headwaters of the Rivière aux Mélézes (Larch River). The valley of the Mélézes closely approximates the northern tree-line in Quebec and forms the border country between the boreal forest to the south and the arctic tundra stretching northward to Hudson's Straits and Ungava Bay. We followed the river for over 350 kms from its source as a boulder-strewn stream with barely (or not) enough water to float the canoes to its youthful stage of ledge drops and rapids and then a mature and majestic river with long, ferocious, intimidating rapids to its confluence with the Kaniapiskau. There its combined waters formed the Koksoak, which eventually leads to salt-water and tidal extremes at Ungava Bay. We reached the community of Kuujjuak on September 7 and flew back to the States a few days later.

It was quite a privilege to traverse such a historic route, following in the footsteps of A.P. Low and the Hudson's Bay Company explorers like **Nicol Finlayson** and **Erland Erlandson**, whose 1830 traverse led to the establishment of Fort Chimo across the river from Kuujjuak and the beginning of recorded history in Nunavik. We were thus able to compare their experiences and observations on the activities of Innu/Eeyou families they encountered with the relative abandonment of the region today.

On 28 August we reached Lake Natuak, about a third of the way down the river and 170 kms above the confluence with the Kaniapiskau, a large lake-like expansion of the river where Low found Indian families camped to intercept migrating caribou. From the moment we reached the lake and for the following four days we were never out of sight of strings of migrating caribou, often numbering in the hundreds, moving down from the north and crossing the river and lake to the western-shore. The abundance of caribou was reminiscent of the George River herds seen in Labrador prior to a few years ago when the George River herd crashed and is only now beginning to re-build. The abundance of the Leaf herd several hundred miles to the west, speaks to the difficulties of defining caribou demography and herd identity over space and time.

Caribou are a revered icon of the North, and they are a key subsistence component of many indigenous boreal forest cultures as well as an indicator species for the health of the boreal forest ecosystem. While many caribou herds throughout Canada have experienced population crashes over the last decade, our river route provided an exciting opportunity to encounter elements of the Leaf River herd, which is one of the only herds in North America that is doing well. Of additional interest, it is adjacent to and somewhat overlaps the George River herd which has lost over 90% from its 1990s heyday as the largest ungulate herd in the world.

## FIFTH THULE EXPEDITION CENTENNIAL MARCHES ON

*By Igor Krupnik*

In last-year's issue of the Newsletter, the ASC unveiled its plans for a major new international program dedicated to the centennial of the Fifth Thule Expedition (hereafter FTE) of 1921–1924 (*ASC Newsletter* 25:38–42). The story from the year 2018 ended with the announcement of the forthcoming "Fifth Thule session" at the 46<sup>th</sup> annual meeting of the Alaska Anthropological Association (AkAA) held in February 2019 in Nome, Alaska. We are glad to report that this session indeed took place on February 28, 2019; it marked a major advancement in the planning for the international "FTE centennial program."

A lot of work was done in 2018 in preparation for FTE session. In September 2018, I met in Copenhagen with several prospective speakers and FTE centennial contributors. **Bent Nielsen**, Director of the Danish Arctic Institute, hosted a small meeting attended by several Danish scholars interested in the FTE activities. Eventually, they all traveled to Nome and



gave their presentations at the AkAA session. Bent also prepared a small display of archival materials in the possession of the Danish Arctic Institute, including Rasmussen's letters, expedition reports, and an album of expedition photos once owned by famous Danish archaeologist and FTE participant **Therkel Mathiessen**. That direct reach to the expedition's legacy was highly useful to the discussion of future research on the intellectual history of FTE. Following this meeting, **Knud Michelsen**, Arctic Institute associate and the author of several books on his grand-uncle **Knud Rasmussen**, took me on a tour of Rasmussen's family house in Hundested, off Copenhagen and of the nearby Industrimuseet in Frederiksvaerk that houses personal papers of Knud Rasmussen. Another enthusiastic partner who signed for the FTE program was Danish film director **Lene Borch Hansen**, at the Nordisk Film Production, who was the lead power behind the newly released film, *Knud Rasmussen: The Great Enchanter* (2017).

We also explored several venues to bring more Inuit participants to the Nome FTE session, to expand the usual crowd of curators, anthropologists, historians, and ASC researchers. **Aron Crowell** and I submitted (and received) a travel grant from the AkAA to support Inuit participants from Canada—**Pamela Hakongak Gross**, executive director of the Kitikmeot Heritage Society in Cambridge Bay (Iqaluktuuttiaq) in Nunavut and also the town's new mayor, and **Bernadette Metkusak Dean**, educator and heritage worker from Rankin Inlet, Nunavut. The U.S. Arctic Research Commission (special thanks to its executive director **John Farrell**) sponsored **Eileen Norbert**, Nome-born Inuit educator and cultural worker, who recently published a book on historical photography of her grandfather **Charles Menadelook** (1892–1933; *ASC Newsletter* 25). Lastly, through our connections to the Greenlandic Representation at the Danish Embassy in Washington (**Inuuteq Olsen**), colleagues at the Greenlandic National Museum and Archives (Nunatta Katersugaasivia Allagaateqarfialu), and support from the Greenlandic Ministry of Foreign Affairs we were lucky to have Dr. **Mari Kleist**, Greenlandic-born and British-trained archaeologist, originally from Nuuk. Mari provided links to several Greenlandic institutions interested in the FTE centennial program. ASC participants (**Aron Crowell**, **Stephen Loring**, **Bernadette Driscoll Engelstad**) and two Danish scholars (**Birgitte Sonne** and **Daria Schwalbe**) were funded by the ASC Tiger Burch Endowment. It was a deeply symbolic bridge to Burch's legacy, since thirty years prior, Burch and Danish anthropologist **Inge Kleivan** co-edited a special issue of the journal *Études/Inuit/Studies* (1988) dedicated to Knud Rasmussen and the FTE legacy.



*Display of the Fifth Thule expedition documents in the collection of the Danish Arctic Institute. Copenhagen, September 2018. Photo by Igor Krupnik*



*The interior of Knud Rasmussen's house in Hundested, September 2018. Photo by Igor Krupnik*



*Knud Rasmussen's personal papers and books in the archives of the Industrimuseet in Frederiksvaerk, September 2018. Photo by Igor Krupnik*

While funding was secured, nothing went smoothly in late 2018–early 2019, though our troubles had little in common to what Knud Rasmussen and his FTE partners experienced almost 100 years ago. The session to be co-chaired by Aron and I was fully aligned by late December 2018; yet it faced forces beyond our control. On January 2, 2019, the Smithsonian was closed, due to the U.S. government shutdown; that prevented us from entering our offices and it also blocked the use of our travel funds and our very ability to travel. The shutdown ended on January 26; yet the threat of another shutdown loomed until mid-February, leaving most of our plans in the air, since we could not guarantee even our own presence



*The FTE session participants: (left to right, first row) Bernadette Driscoll Engelstad, Daria Schwalbe, Pamela Hagongak Gross, Lene Borch Hansen, Eileen Norbert, and Birgitte Sonne. (Second row) Igor Krupnik, Bent Nielsen, Aron Crowell, Stephen Loring, Ken Pratt, Matt Ganley, Mari Kleist, and Knud Michelsen. Nome, February 28, 2019*

at the session. Plus one should never discount Mother Nature, particularly in the Arctic. The flight from Anchorage to Nome on the night before the session with several speakers on board could not land, because of a heavy snowstorm, leaving those of us in town scrambling for emergency plans. Fortunately, everyone eventually arrived, although some sessions at the conference were moved by a day or two to accommodate late arrivals.

The full-day session with 15 papers ran on February 28, from 9 a.m. until 5:30 p.m. with some 60 people packed in the largest classroom of the UAF Northwest Campus building in Nome that hosted the conference. The papers were organized to cover three major topics: 1) intellectual history of the FTE; 2) its work

in Alaska and specifically in the Bering Strait-Seward Peninsula area, including Russian Chukotka; and 3) the legacy of the FTE, including the role of its museum, archival, photographic and other resources to contemporary scholarship, museum work, and to the people living in the areas covered by FTE team.

My opening presentation covered the history of the FTE centennial effort and also positioned Rasmussen and his team among their peers in Arctic/Inuit research of the era (**Vilhjalmur Stefansson, Roald Amundsen, Diamond Jenness, William Thalbitzer, Christian Leden**), as well as their predecessors from the earlier cohort of explorers (**Franz Boas, Gustav Holm, Fritjof Nansen, Edward Nelson, Lucien Turner**, and others). In the following talk, Knud Michelsen introduced the varying plans—six altogether—that Rasmussen developed between the early 1900s and 1921 for the FTE activities. It was

*Pamela Hakongak Gross (right) presents her paper featuring the map of the Inuinnaït territory and the iconic photo of the 'Copper Eskimo couple' (Ikpukhuak and his wife Higlak) taken by **George Hubert Wilkins** on the Canadian Arctic Expedition, 1913–1916*



remarkable to learn how persistent he was in pursuing his early dream of a big sled-journey across the entire Inuit area that he eventually accomplished at the age of 45. **Stephen Loring's** paper addressed the legacy of **Charles Francis Hall** and other early Arctic travelers, who preceded Rasmussen in relying on Inuit means of transportation, subsistence, clothing, and support by Inuit partners—that were so remarkably missing in the preceding era of the polar exploration. **Birgitte Sonne**, the author of *Agayut: Nunivak Eskimo masks and drawings from the Fifth Thule Expedition, 1921–24, collected by Knud Rasmussen*



(1988) and of the recent seminal volume, *Worldviews of the Greenlanders* (2017) compared beliefs of the Yup'ik people from the Nunivak Island to the general spiritual culture of the Inuit world. The last in these series of talks was given by Bernadette Engelstad, who explored the richness of Inuit clothing design and museum collections assembled by Rasmussen and his Arctic peers, like **Jenness, Amundsen, Stefansson**, also Capt. **George Comer, Rudolf Anderson** during the first three decades of the 20<sup>th</sup> century.

Six following papers addressed various aspects of Rasmussen's work in Alaska and the nearby Chukotka Peninsula during the FTE final leg in summer-fall 1924. Aron Crowell evaluated Rasmussen's materials on Inuit whaling that he recorded in Utqiagvik (Barrow) and Point Hope, particularly in comparison with other data on Inupiat subsistence whaling from the era. **Ken Pratt** (BIA, Anchorage) introduced a poorly known story of Nunivak Island shaman called Najagneq, who was put on trial in Nome in 1924,

thus fortuitously offering Rasmussen a chance to document Nunivak Islanders beliefs and stories from him and his relatives, who were brought to Nome to testify in his trial. **Matt Ganley** (Bering Straits Corporation, Anchorage) examined Rasmussen's materials recorded from King Islanders on the Eagle-Wolf dances, in comparison with

other sources on this ceremonial cycle. Russian historian **Sergei Shokarev** (Moscow, University of the Humanities) submitted his paper (in absentia) on the small native hamlet of Kengiskun (Dezhnev) in Chukotka, where Rasmussen landed on his aborted trip to meet the Russian Eskimo at East Cape. **Eileen Norbert** presented the rare photographs taken by (Charles) **Menadelook**, Inupiat teacher and self-made photographer, whose lively pictures from the same era differed in many aspects from the staged and landscape photography by the FTE members. The last talk in this group by **Daria Schawlbe** (Copenhagen) explored various resources that originated from Rasmussen's short trip to Chukotka, including a major collection of Siberian Native clothing that he purchased a few years after FTE and donated to the Danish National Museum.

The last group of papers explored various resources produced by the FTE and its value to today's

Arctic communities and to the pan-Inuit language and heritage preservation efforts. **Bent Nielsen**, Director of the Danish Arctic Institute summarized major blocs of archival and photographic materials produced by the FTE that are now stored in many institutions in Denmark and elsewhere (including the Smithsonian Institution Archives). **Pamela Gross**, in a joint paper with her research partner, **Darren Keith** presented the story of building electronic *Fifth Thule Expedition Atlas*, a joint online venue by the Kitikmeot Heritage Society, Danish National Museum, and the Geomatics and Cartographic Research Centre at Carleton University, Canada. **Mari Kleist** shared her memories of coming of age in Nuuk, Greenland and the role played by the legacy of Kunuunnguaq (Knud Rasmussen) in the formation of Greenlandic identity and cultural pride. The final presentation by film director **Lene Borch Hansen** was accompanied by clips from her recent film, *Knud Rasmussen: The Great Enchanter* (2017, Nordisk Film Production).

At the conclusion of the session, the group discussed further steps to promote the work of Knud Rasmussen under the "FTE centennial program" in 2021–2024. The discussion was much enlightened by a story told by **Bernadette Metkusak Dean** about her family's connections to Knud Rasmussen and his team forged in winter 1921–1922, when

Bernadette's grandparents hosted the famous explorer in their winter snowhouse on the Southampton Island.

On the closing day of the AkAA conference, the group held a four-hour public session at the Carrie McLane Memorial Museum for conference participants and the Nome residents which was attended by more than 70 people. It started with an hour-long presentation by Pamela Gross and Bernadette Dean who talked about the ways Canadian Inuit communities support their languages, subsistence traditions, and cultural heritage via scores of community grass-root projects. Knud Michelsen delivered a full-hour lecture featuring the life of Knud Rasmussen and his many travels beyond the FTE. Lastly, Lene Borch Hansen showed the complete 55-minute version of the film, *Knud Rasmussen: The Great Enchanter* and talked about its production that, incidentally, included the booking of **Margrete II, the Queen of Denmark** and **Crown Prince Frederik** as its key narrators. The film also



Film director Lene Borch Hansen (right) shows the film *Knud Rasmussen: The Great Enchanter*.  
Photo by Igor Krupnik



featured the Crown Prince driving a dog sled across the snowy Greenlandic landscape, the skill he learned while serving on the Sirius Dog Sled Patrol, annual long-range reconnaissance patrolling of Northeast and North Greenland performed on dog sleds to enforce Danish sovereignty over these remote portions of Greenland. The audience, naturally, welcomed the “royal side” of the story; it also enjoyed the first official premiere of the film in North America that symbolically took place in Nome, in the community Richard Foster Building.

We are grateful to the Alaska Anthropological Association, its former President **Julie Esdale** and its current President, **Amy Phillips-Chan**, the U.S. Arctic Research Commission (**John Farrell**, director), the ASC Burch Endowment, the Danish Arctic Institute, the Greenlandic Foreign Ministry, the Nordisk Film Production, and other entities that provided funds for the session participants to travel to Nome. Papers from the session, plus a few additional contributions will be reworked by the end of this year for publication in 2021 in a book or a special journal issue, so that they appear in print by the centennial of the Expedition. The group also decided to call another meeting in 2021, to expand its effort to popularize the achievements of the FTE. A particular emphasis is to be put on sharing the knowledge about FTE legacy with modern Inuit communities visited by the Expedition, along its long path from Greenland to Alaska. Stay tuned, as more plans to follow in the footsteps of Knud Rasmussen and his FTE peers will be forged in the coming months.

## QUEBEC LOWER NORTH SHORE ARCHAEOLOGY IN 2018

*By William Fitzhugh*

Since 2001, the Smithsonian’s Arctic Studies Center Gateways Project has conducted fieldwork assessing the extension of Paleo-Eskimo and Neo-Eskimo cultures along the Lower North Shore of the Gulf of Saint Lawrence (LNS). This initiative located Groswater culture sites occupied during the Iron Age cold period (mid-1<sup>st</sup> millennium BC) and found extensive archaeological evidence that Inuit expanded onto the LNS during the 17<sup>th</sup> and early 18<sup>th</sup> centuries. In addition to surveys, we tested or excavated Inuit villages at Petit Mécatina (Hare Harbor), Little Canso Island, Bonne-Espérance, and Hart Chalet. Recent research focuses on clarifying the nature of this occupation by investigating economic relationships between Inuit, Europeans, and Innu, as well as exploring Inuit demographics, seasonality, and land use. In 2018, we excavated at Hart Chalet and two sites at Grand Isle. Hart Chalet is a medium-size settlement in Brador, Quebec, that has three winter

houses, two of which have been partially excavated. The Grand Isle Inuit sites are in the municipality of Bonne-Espérance and have three components: a small qarmat-style house; a sod winter house; and pit houses with caches and human remains in a boulder field above Kettle Head. We also briefly excavated a Groswater hearth in Grand Plain and mapped two Inuit houses on Belles Amour peninsula.

The Hart Chalet Inuit site was first investigated at the Hart cottage in Brador by **Clifford Hart** and **René Levesque** in 1968. At that time, it was thought to be a Basque site based on finds of roof tiles and large spikes and nails. In 2013, we excavated trenches through the middle of House 1. In 2014, we tested a midden between H1 and H2 and excavated test pits in the H2 entry, recovering an Inuit ivory needlecase. Both houses had been disturbed, and H2 was overgrown with spruce. In 2015–2017, we excavated House 3. In 2015–2017, we began surveys in St. Paul River, and in 2016–2017 excavated at the Grand Plain Groswater Paleoeskimo site and the Grand Isle-2 Inuit site. 2018 plans called for excavating part of the midden of Hart Chalet House 2, a hearth at Grand Plain, and the remaining sections of Grand Isle-2. We also planned to test the Grand Isle-3 Inuit winter house discovered in 2017.

**Hart Chalet (EiBh-47), House 2.** House 2 had been tested by three 50 cm units in the entry and the NE, SE, and SW quadrants of a 2-meter square inside the door. The 2018 excavation opened a 2x6m trench south of the front (south) wall and completed the 2x2 unit inside the door. All three Hart Chalet houses have the same general features: a roughly 4x8 meter rectangular structure with short 2–3 m long entries, side and rear sleeping platforms, and hearths outside the door.



*Hart Chalet House 2 excavation in progress.  
Photo by William Fitzhugh*

The House 2 excavation revealed superimposed hearths outside the door with 30–50 cm deep deposits of bone mixed with house midden material and artifacts. Most of the bone was caribou, but small amounts of seal and other animals were present. All caribou long bones were split and broken for marrow extraction, and fragments of soapstone cooking vessels were found. Bones were often packed closely together, sometimes burned and mixed with charcoal; patches of charcoal mixed with fish and bird bone were also present.

Unit 12N4E was east of the northern hearth and contained fewer bones, but produced a French coin and other artifacts. The northern part of this unit contained two back-filled pits excavated by Clifford Hart. Unit 12N6W along the east side of the entryway contained cobble hearths filled with charcoal, bone, iron nails and spikes, European ceramics, a few bone artifacts, beads, glass, an iron harpoon and arrow point, and other material. Slabs of whale bone bordered the east and west sides of the entryway, separating the hearths from the entry. Unit 12N8W encompassed the west side of the entry and had three distinct cobble hearths. Broken parts of two soapstone cooking pots were recovered along with nails, beads, ceramics, and other artifacts. The NW quadrant of 14N/8W produced part of a stoneware vessel, beads, and a lead navigation sounding weight. This interior unit did not have a stone pavement; rather, fragments of rotted wood suggest that the floor was covered with planks. Basque tile fragments were present in all excavated units. Besides nails, glass beads, stoneware, glass, and rusted iron fragments and iron tools were common. A few whale bone artifacts were present as well as a perforated caribou shoulder blade and an antler knife handle. Earthenware and clay pipes were not present, suggesting a pre-1650 date. If the coin is similar to the one found in House 3, House 2 should date around

1635–1650. The faunal assemblage mirrors that of Hart Chalet Houses 1 and 3 and Little Canso Island. The hearth build-up suggests an occupation lasting from a few years to a decade or more.

**Grand Isle-2 (EiBk-54).** (Parts of the following two paragraphs are repeated from our 2017 report). For many years, we considered the St. Paul River region as the most likely place for Inuit settlement on the LNS, especially after discovering Inuit winter dwellings at Petit Mécatina, Jacques Cartier Bay, Belles Amour, and Brador. Despite this, preliminary surveys revealed no trace of Inuit settlement. Why would Inuit have chosen not to occupy St. Paul, one of the richest resource zones on the LNS? One possibility was that the region was avoided because it was already occupied by Europeans when Inuit appeared in the early 1600s.

Our 2017 excavations forced us to reassess this theory when houses at found in 2016 at Grand Isle-2 turned out to be Inuit rather than Innu. The structure was eroding at the edge of a shore-side terrace on the north side of Grand Isle and had lost its northern half to shore erosion. The low-mounded house foundation encloses two lateral sleeping benches on either side of a slightly lower central floor area. In 2016 we interpreted the house as an Innu dwelling based on the presence of dark chert debitage, rusted sheet iron, and a  $^{14}\text{C}$  date of AD 1415–1455. This suggested the site might be an early European-contact Indian (Innu) site. However, excavation of the center of the structure in 2017 produced Inuit evidence from the dwelling's floor: Basque roof tiles, Inuit soapstone pot fragments, iron sheet metal, and large iron spikes. These materials were on the remains of a wood floor. Below the floor, a thin humus level representing the original vegetated ground surface contained flakes of chert and charcoal (dated above). Apparently, Inuit



*Finds from the Hart site House 2 midden.  
Photo by William Fitzhugh*



*Florence Hart and her husband Clifford discovered and initiated our work at their 'chalet' near the mouth of the Brador River. Photo by William Fitzhugh*



had built a dwelling at a location previously occupied by prehistoric Innu. Its rectangular shape and sod walls suggest it was an Inuit qarmat used during the fall when summer tents did not provide sufficient protection, but before moving into winter pit-houses.

We returned in 2018 to complete the excavation of the raised benches at the east and west ends. The eastern bench produced an iron spike and fragments of an iron spear point. The western bench revealed nails and the remains of a collapsed roof made of spruce poles. Chert flakes were present in all the soil levels, including the Inuit floor. Inuit may have used turf for flooring that contained chert flakes from prior Indian occupations. There were very few artifacts in the structure other than nails, an iron spear point, and a soapstone pot fragment. Even considering what was lost to erosion, the paucity of finds suggests a brief occupation. Later we learned from **Medric Thomas** and his family, who use **Leonard Thomas'** place as a summer fishing camp, that they used to find bones and arrowheads on the beach below the site.

[From our 2017 report:] In 2017 we also discovered a second Inuit structure (Grand Isle-3, formerly called Grand Isle-2a) on a raised beach about 75 meters upslope (south) of GI-2. Tests in this roughly circular feature about 20 meters in diameter revealed a paved entry passage and a hearth pile containing fire-cracked rock and caribou bones. This structure at first seemed to be a typical Inuit semi-subterranean winter house, but when we tested the house "interior" we found no sign of a floor or cultural level with artifacts, bones, or charcoal. What we thought was an excavated house turned out to be a natural declivity in which Inuit had begun building a winter house. A house pit had not been excavated and no walls were present. The site appears to have been abandoned after creating the entry and hearth. It seems likely that both the rectangular L1



*Grand Isle-2 qarmat excavation showing 20018 excavation and back-filled 2017 house floor. Photo by William Fitzhugh*

(GI-2) feature and the L2 unfinished winter dwelling were seasonal expressions of a single Inuit group that occupied this area for a brief period in the 17<sup>th</sup> century.

**The Grand Isle-2** site complex is our first evidence of Inuit occupation in St. Paul, but it appears to have been a short-lived. This group may also have contributed to the nearby boulder structures where **Charles Martijn** (1974) reported human remains and an Inuit snow-knife at Kettle Head (Grand Isle-1) at the top of the hill a few hundred meters south of Grand Isle-2).

In 2018, we returned to continue exploring GI-2 (L2). We only could spent a few hours at the site, but during that time we exposed a slab-paved entrance passage whose floor deposits included roof tiles, stoneware, nails and spikes, an improvised iron hammer, and other artifacts. The entry leads to a doorway, but beyond that, the structure to the west remains a mystery. Test pits inside the door produced nails, and one test near the door had remains of nailed planks. More work at this site is needed, but our interpretation from 2017 still seems valid: an Inuit winter dwelling that was abandoned before it was completed.

Grand Isle-2 begin to suggest an unusual history of Inuit occupation in St. Paul River. The lack of substantial Inuit settlements such as found elsewhere on the LNS may result from Europeans having established prior "ownership" of this rich resource zone before Inuit appeared on the LNS in the early 17<sup>th</sup> century.

**Grand Plain-1 (EiBj-41)** [from our 2017 field report.] This site is located about a kilometer east of the Old Salmon Bay settlement at the southwestern edge of a huge series of raised beaches north of Wild Cove and above Point Scramble. We found the site in 2016 from flakes of Groswater chert in an RV path. Tests revealed in situ deposits beneath a thin veneer of caribou moss,



*Belles Amour Peninsula boulder house, probably, Indian (ca. 2-3,000 BP). Photo by Mary Maisel*



lichen, and birch shrubs, and we returned in 2017 to obtain a sample of tools and charcoal and excavated a 1x8 meter trench in sandy beach sediment on top of a low rocky ridge. Flakes and tools were scattered evenly across the excavation area. The site produced endscrapers, side-notched and box-based points, flake scrapers, microblades, and ground and spalled burin-like tools. Endscrapers were most abundant, suggesting skin-working activity. No internal features were noted, and no organics remained other than charcoal stains and chunks. Two meters west of the excavation trench is a 30-centimeter high mound of fire-cracked rock containing burned chert. Called “Crossroads Groswater” site in our 2016 field report (2017:74), Grand Plain-1 produced a small Paleoeskimo collection that probably dates ca. 2,400–2,200 BP).

In 2018, we returned and excavated the hearth. Groswater hearths—like remains of their dwellings—are rare, so we had hopes for an interesting excavation. These hopes did not materialize. Our finds were modest, consisting of only a few microblades and debitage, a tiny charcoal sample, and some scorched slab rocks. There was no discernible structure to the hearth beyond a cluster of thin slabs and small cobbles.

**Belles Amours Peninsula.** We visited the Belles Amours Peninsula site for two hours to make a low resolution topographic map of its two Inuit winter houses found by Dumais and Poirier (1994) in 1983. We tested the site in 2007, and Marianne Stopp did the same in 2013, but the site is known only from sketch maps. Our map is not detailed but provides basic contour information for the two houses, each of which has a 4–6 meter long entrance tunnel and exterior earths outside their doors. Both houses are intact with no evidence of disturbance.



*Fitzhugh discussing an artifact with Medric Thomas and Garland Nadeau. Photo by Mary Maisel*

**Blanc Sablon Airport Road Sites.** Reports by local people of stone mounds a couple hundred meters north of the airport road prompted us to investigate. We found two prominent boulder mounds a few hundred meters north of a prominent raised beach whose exposed boulder front runs several hundred meters along the southern side of a former embayment. The terrace front has numerous pit features, some of which are large enough to be dwellings while most are caches. The two mounds, both on the south side of two of the largest pits, are clearly the result of backhoe excavation of pit features. These excavations were probably directly by René Levesque during his work in Blanc Sablon in the early 1968–70.

**Summary.** As in previous years, the 2018 season owed its success to many individuals and organizations, and to a span of excellent summer weather. Our sponsors included Notre Dame University (which supported intern **Alexandra Castellanos**), Dartmouth College (which supported **Jacob Marchman**), the Center for Comparative Archaeology of the University of Pittsburgh (which supported **Igor Chechushkov**) Mayor **Roderick Fequet** of the Municipality of St. Paul, and **Eileen Schofield** and **Garland Nadeau** of the Whiteley Museum of St. Paul Municipality supported by grants from MRC du Golfe-du-Saint-Lauren, a Quebec government economic development agency, Caisse Desjardins Blanc Sablon, and I & S Seafood via **Irving Roberts**. In Brador, we enjoyed the hospitality of **Florence Hart**, who opened her home, cooked meals, and facilitated domestic bliss. Most importantly, she allowed us to excavate at her chalet cottage. We thank the Quebec Natural Resources Department, and the Quebec Ministry of Culture and Communication for permits.

Members of the 2018 field team included **Mary Maisel** (American University), **Halcyon Brown** (Williams College), **Katherine Meier** (Yale University), and **Igor Chechushkov** (University of Pittsburgh). **Boyce Roberts** was our host in Quirpon, and at the Parcs Canada L’Anse aux Meadows site we were invited to become “junior interpreters” for several days by **Mathias Brennan**. **Perry Colbourne** skippered the Smithsonian’s research vessel *Pitsiulak*, and Perry and his wife, Louise, opened their home in Lushes Bight at both ends of the summer. **Anja Herzog** cleaned and catalogued our collections, and **André Bergeron** and the Quebec Conservation Center provided artifact storage and conservation services. Finally, I deeply appreciate assistance provided by **Nancy Shorey** for office and printing support, and to **Mary Maisel**, **Chelsi Slotten** and **Igor Chechushkov** who worked up our field maps, profiles, and data and produced our field report volume.

## THE SMITHSONIAN LABRADOR RADIOCARBON DATE PROJECT

By Jacob Marchman



Jake Marchman at  $^{14}\text{C}$  command central

If you conduct archaeological fieldwork for fifty years, you end up with a treasure trove of data. Such is the case of the Arctic Studies Center. Between 1968 and the present, Dr. **William Fitzhugh** and Dr. **Stephen Loring** and their colleagues have conducted research programs along the east coast of Canada, reaching south to the

Lower North Shore of Quebec and as far north as Killiniq Island in the Hudson Strait and Frobisher Bay in Baffin Island. From these efforts have come bookshelves full of data on stone tools, faunal remains, settlement geography, and, last but certainly not least, radiocarbon dates.

These radiocarbon dates have allowed Smithsonian archaeologists to write the history of culture in this southeastern reach of the Canadian Arctic. Archaeology is a funny business, however. Unlike in other sciences where you can repeat experiments, you only have one chance to get your data right. You destroy a site when you excavate, so it's vital that you carefully preserve all your data. With this in mind, Bill Fitzhugh, Stephen Loring, and I decided it was important to publish the complete archive of the Smithsonian's radiocarbon data, so future researchers would be able to access this invaluable data.

The only problem was that this data didn't exist in one place. Most of it was in old computer printouts, but a lot of it was also in files scattered between Bill and Stephen's offices. Before we could think about publishing these dates, I had to put them in a central database. In some cases, this required manually entering the data. In the case of the computer printouts, I was able to digitize them using an optical character scanner. From there, I could clean, transform, and load the data into our geographic database, using a series of Python scripts. In hindsight, there was such a learning curve here that I probably would have been faster doing it by hand!

After building the database, I had to calibrate the radiocarbon dates to prepare them for publication. It's

a common misconception that radiocarbon dates are the "real" date of an archaeological artifact or site. However, that's not true at all. Radiocarbon dating works by counting the ratio of the radioactive carbon 14 isotope ( $^{14}\text{C}$ ) to the stable carbon 12 ( $^{12}\text{C}$ ) isotope. Over time, the radioactive  $^{14}\text{C}$  in an artifact will decay into nitrogen, leaving behind a higher ratio of  $^{12}\text{C}$ .

Where does the  $^{14}\text{C}$  come from? It turns out that it's produced in the atmosphere when high energy cosmic rays strike a nitrogen atom. When this new  $^{14}\text{C}$  isotope encounters oxygen, it quickly becomes carbon dioxide and is absorbed into plants and trees during photosynthesis. When ancient people make a campfire with wood from one of these trees, the leftover charcoal will have  $^{14}\text{C}$  in it, which will slowly degrade. If you know how much  $^{14}\text{C}$  is in the atmosphere and how fast it decays into nitrogen (it has a half-life of  $5,730 \pm 40$  years), then you can date the campfire by calculating the ratio of  $^{14}\text{C}/^{12}\text{C}$  in a charcoal sample.

The problem is,  $^{14}\text{C}$  doesn't get produced in the atmosphere at a constant rate. To convert a  $^{14}\text{C}$  date into calendar years, we must "calibrate" it.  $^{14}\text{C}$  calibration works by making a correction curve out of control samples from objects of a known date, such as tree rings. Using this curve and a bit of statistics, you can then correct your radiocarbon date to the real calendar date. After building the database, this was our next step. We took the dates, ran them through a calibration protocol (it must be done differently if the date is from a sea animal due to something called the "reservoir effect"), and voila, we know (within a 95% calibrated error range) how old our samples are.

Now, with the database together, it was time to prepare the document for publication. We decided on writing a "date list" which is a common publication format used in the journal *Radiocarbon*. This entails going through and discussing each date and providing interpretation of its significance and validity. Throw in a couple of maps, and you have yourself a date list. It's a time-consuming process, especially with the amount of information we have; but in the end, it will be a valuable document for future archaeologists.

At the time of writing, we're not quite finished, but we want to be done in time to submit our date list to the next volume of *Radiocarbon*. I've had a great time learning about radiocarbon dating and delving into the history of the ASC's research. Despite starts and stops, I am coming away from this project with a much fuller understanding of Labrador's prehistory. I'm sure if I had known when I started what I know now, this would have gone a lot faster. But then it wouldn't have been very much fun, would it?

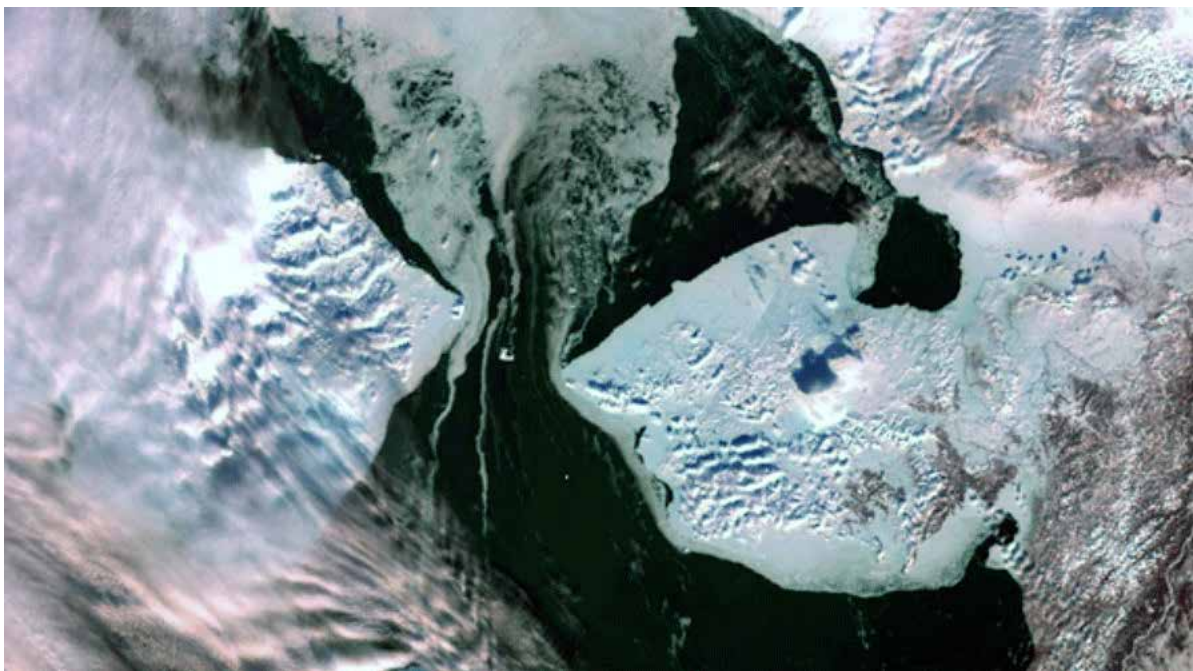


## SIWO OBSERVERS DOCUMENT SHRINKING SEA ICE AND UNPREDICTABLE WALRUS IN THE BERING SEA

By Igor Krupnik, Brad Benter, and Lisa Sheffield Guy

Alaska residents, scholars working in the Western Arctic/Bering Sea region, and general readers concerned about the “warming Arctic” have been recently on alert, due to the record low sea ice extent in the Bering Sea in the winter of 2019. As of this writing (late March 2019), the winter sea-ice maximum extent that is commonly recorded in mid-late March across the Arctic regions was by no means a “maximum” in the Bering Sea. It was just the opposite: by March 1, 2019 the Bering Sea

and weather conditions around their communities. They have been systematically recording their observations and sharing critical data and assessment of the ongoing change. In spring 2010, a network of local community monitors in the northern Bering Sea and Chukchi Sea was organized into what was named “Sea Ice for Walrus Outlook” (SIWO), an offshoot of two earlier observational programs, SIKU (Sea Ice Knowledge and Use) and SIZONeT (Seasonal Ice Zone Network) during the International Polar Year 2007–2008. SIWO observations were originally conducted in four Alaskan communities—Wales, Shishmaref, Gambell, and Nome; they continued in the following years, with two more communities, Savoonga and Diomedea, added to the list lately. SIWO



*NASA image of sea ice distribution in the northern Bering and southern Chukchi Sea (February 28, 2019)*

was literally ice-free. Huge expanses of open water could be seen across the Norton Sound area, off St. Lawrence Island and into the Bering Strait leading to the southern Chukchi Sea; two authors (**Igor Krupnik** and **Brad Benter**) personally observed it when flying to and from Nome during this time. Though the ice has partly returned by mid-March, scholars and media outlets expressed concerns about the impact of the winter ice-free conditions on the Bering Sea marine life and the people who live along its shores.

There is, however, one constituency whose voice has not been heard and whose perspective is critical, namely, local subsistence hunters in rural communities across the northern Bering Sea region. Many of these hunters have been collaborating with scientists and weather/ice services in the effort to monitor sea ice

observations have been commonly conducted from early April until the end of the ice season, formerly in late June. In the past four years, however, the season ended in early June (June 1–9, in 2015–2018), due to the early disappearance of sea ice in the region. Since 2017, the SIWO season has shifted dramatically to both begin and end 2–3 weeks earlier. All personal observations accompanied by photos have been posted onto a special SIWO website <https://www.arcus.org/siwo> that is operated out of the Arctic Research Consortium of the U.S. (ARCUS) office in Fairbanks.

The new, tenth SIWO observational season started on March 15, 2019, with one more community, Brevig Mission on the Seward Peninsula joining the effort. SIWO village monitors report ice and weather conditions, walrus availability and local



hunting effort, take pictures of sea ice from boats and the shore – that are matched with satellite images of ice distribution, synopsis of ice and weather conditions, and ice forecasts provided by specialists at the National Weather Service, Alaska Region and ice specialists. SIWO partners also include the Kawerak, Inc. Eskimo Walrus Commission in Nome, ARCUS, the National Weather Service, and the University of Alaska Fairbanks.

On March 15, 2019, local observers, **Frank (Boogles) Johnson** from Nome, **Robert Tokeinna, Jr.** from Wales, and **Clarence Irrigoo, Jr.** from Gambell reported open water off their communities or a thin sliver of shore-fast ice that is quickly eroding. They and other SIWO monitors will have a critical role in the assessment of what is to happen to the Bering Sea, the Pacific walrus population, and Alaskan subsistence walrus hunting, because of the continuing shrinking and thinning of the ice cover during the winter- and springtime.

Yet in our assessment of what may happen to Bering Sea ice and subsistence walrus hunting in 2019, there is no better comparative body of data than the one from the previous winter-spring season of 2018. According to the summary of ice conditions in the Bering Sea prepared by **Heather McFarland** at the University of Alaska Fairbanks, the freeze-up in winter 2017/2018 was exceptionally late, the new ice was thin, and it was easily broken by the series of strong storms in January and February 2018. Following persistent strong winds from the south—a new phenomenon that is contrary to Native people’s knowledge of the “normal” winter conditions when northern winds prevail—this broken ice was carried out northward, to the Bering Strait and even pushed further north into the Chukchi Sea creating huge expanses of open water, much like in 2019. The overall extent of sea ice in February 2018 was estimated at less than 100,000 sq. mi, about a third of the average extent over 150+

years of available records and 51,390 square miles less ice than in February 2001, the previous record low.

Storms, break-ups, and ongoing cycles of unstable freezing and refreezing continued throughout the month of March 2018, as reported by local monitors: *“After February’s lack of ice, winds shifted abruptly on March 9, bringing sea ice back to Savoonga. Even as ice returned, it is all broken up...no flat pieces and it is real rough. There are patches of open water... biggest open patch in front of town is maybe as big as a football field”* (**Aqef Waghiyi**, Savoonga, March 16).

By April 2018, the ice was mostly gone from the Bering Sea with large stretches of open water extending into the southern Chukchi Sea along the

Alaskan coast—in stark contrast to the “normal” break-up season from 8–10 years ago. Subsistence hunters who observed this unusual condition were as puzzled as ice scientists.

On May 18, 2018, **Clarence Irrigoo Jr.** from Gambell reported *“Very little ice left. Boats are harvesting walrus. Some went very far to the ice—up north 48 nautical miles—and some in the water.”* A similar report from observer **Boogles Johnson**, from Nome from a week prior (May

12, 2018): *“We went out yesterday to the location on the map and didn’t see any ice as far as the eye can see with binoculars. We did find walrus swimming. They are migrating west and north from the Norton Sound to their summer grounds and having to sleep in the water. This is the first time I’ve ever seen walrus sleep in the open water. ... We thought the walrus were a boat since they were sleeping in a group and can be seen from a great distance.”*

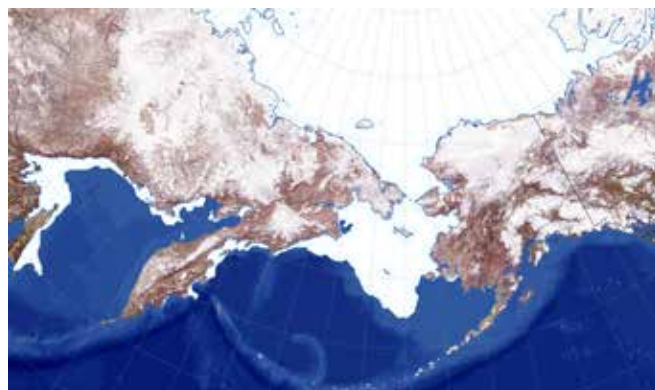
The shore-fast ice was broken off in front of the community of Wales on the first days of May—“super early,” according to local monitor, **Robert Tokeinna, Jr.**, and two weeks earlier than in the 2000s. The main body of Bering Strait cleared of ice in early May, at



*Bering Strait: Summary of the winter conditions (flyer by Heather McFarland, 2018)*



NASA map: Sea ice extent in the North Pacific-Western Arctic, April 29, 2018



NASA map: Sea ice extent in the North Pacific-Western Arctic, April 29, 2013

least along the Alaskan side. As Diomedes monitor **Opik Ahkinga** reported, “On May 2nd, herds of walrus and calves drifted north with the ice floe over the International Dateline. Locals stood on the helipad to watch them pass. ...By early morning the ice had passed and it’s open ocean again. I was told by one of the crewman that five [walruses] were brought back. The boat crew divided their share; this will feed their families well. We are grateful for this hunt and hope to see another ice floe.” (May 4, 2018)

While Native hunters, ice specialists, and marine biologists continue to grapple with the impact of record low winter ice and early break-up in spring 2018 (like is expected in 2019), other questions emerged related to the sea ice-walrus-people interactions. To address them, we may use data on walrus subsistence catch by Alaskan coastal communities that is systematically collected by the Marine Mammals Management (MMM) Division, Alaska Region, of the U.S. Fish and Wildlife Service.

The subsistence catch data have been available for a long stretch of years (see *ASC Newsletter 23*, paper by Krupnik and Benter), including for all years of the SIWO program observations (2010–2018). We may also use hunting records from 2018 as a proxy to assess what may happen in the next few weeks, as herds of walrus start migrating northward past indigenous communities, on their way to summer feeding grounds in the Chukchi Sea.

Two questions loom large: How the record low sea ice and early break-up affected Alaskan subsistence harvest in spring 2018? and What can we learn about the current status of the walrus population from the harvest data and hunters’ observations?

For the former question, the MMM catch records offer a compelling answer. By summer 2018, the cumulative Alaskan subsistence walrus take was 785 animals—higher than in 2017 (700) and above the average of

703 for the past six years (2013–2018). Thus, the unusual sea ice situation did not trigger a catastrophic drop in the Alaskan subsistence walrus catch—as indeed happened in 2013 (*ASC Newsletter 23*).

Yet, the overall fair catch in winter-spring 2018 blurred the sharp differences among individual locations. Two most active walrus hunting communities in Alaska, Gambell and Savoonga on St. Lawrence Island, together harvested 707 walruses, more than in any year since 2013. Brevig Mission, another hunting community on the Seward Peninsula, had its third largest harvest (33) of the past eleven years, 2008–2018. To the contrary, most other communities fared below average (Nome, Toksook Bay, Wales), or even poorly (Diomedes, King Island, Wainwright, Utqiagvik/Barrow). Thirty villages that historically hunted walrus killed no animals at all in 2018, including Hooper Bay, Kivalina, Mekoryuk, Point Hope, Point Lay, Shishmaref, and Togiak. So, to the majority of subsistence hunters, the situation in spring 2018 was by no means “average” or “normal.”

Another obvious outcome of the low ice/early breakup conditions in 2018 was the continuing shift to ever earlier timing of active hunting during the spring season. In Diomedes and Wales, it was the first week of May in 2018. In Gambell and Savoonga on St. Lawrence Island, the prime spring walrus hunting in the years 2000–2013 was generally around mid-May and often extended into early June; in 2018, only 30% of walruses were killed during the month of May (28.7% in Gambell, 30.7% in Savoonga—MMM data. Instead, active hunting now extends into what was traditionally considered the wintertime, that is, into the months of January, February and early March. It already happened in winter 2019, like in the low-ice winters of 2018 and 2017. The time around late March and early April is now a new “peak season” (46 walruses taken in Gambell and 109 in Savoonga, in 2018), and the bulk of the catch in 2018 occurred during the



month of April. Productive hunting in Gambell literally ceased after the third week of May, and in Savoonga, it stopped on the fourth week of May. This dramatic shift in the prime catch time is another indicator of new seasonal patterns, due to the changing ice regime.

We may discern other trends from the MMM catch data for 2018. There has been a significant shift in the past six years from a more even sex-age distribution in Alaskan subsistence catch with a ratio of roughly 55:35:15 of males, females, and calves to a new model, with a much higher share of adult males, around 70:20:10. The respective shares in 2018 were even more skewed—78:16:5. It poses a question first raised by our colleague, marine biologist **Carleton Ray**: Where are the calves and the females? Hunters in all communities report that they are indeed seeing fewer calves and females on their boat trips. So, are females and calves elsewhere? Are they passing beyond hunters' reach, that is, earlier/faster or farther away from shore? Or there is indeed a rapid drop in the share of females and calves in today's Pacific walrus population, another sign of its impending stress?

Hunters believe that all three factors are actually in play. When the Gambell crews did get out in April–May 2018, they never found the herds of females and calves that used to pass by to the west of Gambell on their spring migration (“beyond hunters' reach”). Therefore, they went northward, after the animals) that Savoonga was reporting and that were predominately males (increase in bull walrus catch). Hunters also reported that many of the females they harvested last year had lost their calves, most likely due to drowning—because of storms and no ice floes to travel and to rest on (“fewer calves due to environmental stress”).

Observations of SIWO monitors and other subsistence hunters, therefore, may offer critical insight to the changes in walrus patterns during a rapid restructuring of its habitat that are hard to observe without detailed and expensive biological surveys. The SIWO team (of which the authors are members) planned to have a special workshop with local monitors in February 2019 in Nome. We anticipated to hear their explanations and to share data on the shifting status of sea ice and walrus in the Bering Strait region. Unfortunately, that workshop was cancelled due to government shutdown; we hope to organize it again in winter 2020. In the meantime, the SIWO team will keep monitoring the situation. Interested readers are welcome to visit the SIWO website at [www.arcus.org/siwo](http://www.arcus.org/siwo) or SIWO Facebook page [/seiceforwalrus](https://www.facebook.com/seiceforwalrus) during the SIWO 2019 season to explore the richness of local observations and knowledge of the changing Bering Sea.

## A HOKKAIDO SABBATICAL

*By Ben Fitzhugh*

During their 2018 sabbaticals from the University of Washington, **Ben Fitzhugh** and **Laada Bilaniuk** spent three months in residence in Sapporo, Japan. They each received Invitational Fellowships from the Japanese Society for the Promotion of Science (JSPS) to conduct collaborative research with colleagues at Hokkaido University. Ben worked closely with **Katsunori Takase** to investigate zooarchaeological collections from around coastal Hokkaido. They visited more than 15 museums and examined collections from more than 22 archaeological sites with components spanning the mid-to-late Holocene. Takase-san went out of his way to plan, guide and translate during these trips. The scientific agenda of our tour of Hokkaido museums was to take stock of these collections for possible future research into changes in climate and marine ecosystems tied to human coastal settlement histories and community resilience to variability in maritime food availability. The immediate goals were to identify collections with good preservation, stratigraphic integrity and secure dates or potential. The project is an extension of Fitzhugh and Takase's archaeological research collaborations in the Kuril Islands and relates to the ASC's Arctic Crashes theme. Shortly after the sabbatical visit, Takase-san submitted a pilot JSPS proposal for a first phase of morphological, isotopic, and a DNA research based on the collections from Southeast Hokkaido.

When touring Hokkaido, Katsunori, Ben and often Laada and Larissa visited many of the archaeological sites associated with the collections. Some sites have been converted into educational parks like that of the famous Moyoro Shell Mound site in Abashiri. Before and after the Second World War, major excavations at this site on the seasonally ice-choked Okhotsk Sea coast revealed evidence of large pentagonal pithouses



*Ben Fitzhugh and Katsunori Takase inspect archaeological fauna at the Hokkaido Museum of Northern Peoples in Abashiri on the coast of the Sea of Okhotsk*



and an extensive cemetery including burials with Japanese swords and brass buckles from the Manchurian mainland. This site provided some of the earliest substantial evidence of the enigmatic, marine-specialized Okhotsk Culture. Subsequent research showed the Okhotsk settled and expanded around the coastal regions of the southern and eastern Sea of Okhotsk from southern Sakhalin Island, to the northernmost Kuril Islands. In 1961, **Chester Chard** suggested a link between the Okhotsk and Bering Strait Inuit (Old Bering Sea Culture) because of similarities in marine mammal hunting adaptations. Today the Okhotsk are linked to the cultures of Northern Sakhalin and the lower Amur River region in the earliest centuries of the Common Era. The Okhotsk brought domesticated pigs to Hokkaido and may have introduced the practice of raising bear cubs for sacrifice that developed into the Ainu bear spirit-sending practices continued into the early 20<sup>th</sup> century. Other highlights of the trip included visiting the Shiretoko

*Masuo Sugihara, Takamune Takabatake, Ben Fitzhugh and Katsunori Takase in front of an Okhotsk Culture pithouse reconstruction at the Esashi Okhotsk Museum. Photo by Ben Fitzhugh*



and Nemuro peninsulas adjacent to the southernmost Kuril islands (a break in the weather at Nemuro gave us a clear view of Kunashir and the Habomai Islands); a trip to Okushiri Island off SW Hokkaido and the Aonae Sand Dune site, where Epi-Jomon and Okhotsk people may have traded or even co-occupied a settlement; and a visit to the present Ainu settlement of Nibutani and the workshop of master carver **Toru Kaizawa**.

Having conducted extensive archaeological and paleoenvironmental research in the Kuril Islands and around the North Pacific Rim in Alaska, Ben used the sabbatical trip to become a fulltime student of Hokkaido archaeology, studying the subject in greater depth than was possible from shorter visits

and the limited English literature on the topic—a field still best covered in English by the ASC's 20 year old Ainu exhibit catalog, *Ainu: Spirit of a Northern People* (Fitzhugh and Dubreuil, eds., 1999). Long-time colleagues **Tetsuya Amano** and **Hiroko Ono** (Hokkaido University Museum) took time to give Ben a personal short-course on the details of northern Hokkaido culture history and its links to greater Japanese and mainland NE Asian prehistory. They are collaborating on a project about mobility and migration into and around coastal Hokkaido by the Okhotsk Culture in the early First Millennium CE.

While Ben immersed himself in Hokkaido archaeology, Laada Bilaniuk spent the trip collaborating with linguist Motoki Nomachi on questions of multilingualism and Anglicism in post-Soviet



*Katsunori Takase snaps a photo of Housepit 9 at the Moyoro Shellmound archaeological park in Abashiri. Photo by Ben Fitzhugh.*

Eastern Europe as a guest of the Hokkaido University's Slavic-Eurasian Research Center. **Larissa Fitzhugh**, age 14, joined the trip and finished off her seventh grade at Hokkaido International School, picking up some Japanese and learning to navigate the Sapporo subway system like a native. The Fitzhugh-Bilaniuk family were made welcome in Japan by many long-time friends and collaborators of the ASC, including **Tetsuya** and **Kazuko Amano**, **Hiroko Ono**, **Koji Deriha**, **Nobuhiro Kishigami**, **Kaoru Tezuka**, **Hirofumi Kato** and several others. While there many other friends passed through Sapporo, including Russian collaborators **Olga Shubina** and **Igor Samarin**, **Peter Jordan**, and **Gary Crawford**. Considered a frontier zone to cosmopolitan Japanese, Sapporo is a thoroughfare of Arctic scholars and research collaborations, and a great place to spend a sabbatical.

## COLLECTIONS

## SWISS CURATORS INAUGURATE NETWORK FOR ARCTIC MUSEUM COLLECTIONS

By Florian Gredig, Igor Krupnik, and Martin Schultz

A land-locked nation in the heart of Europe, without a Navy or any colonial ambitions during its long history, Switzerland is an unlikely candidate for being a hub of Arctic ethnographic collecting. Yet, thanks to a long-established tradition of academic learning and because of many devoted private citizens, Swiss museums were able to amass impressive ethnographic and archaeological collections from various parts of the Arctic. Only recently did the Swiss “Arctic riches” receive some attention; this short paper tells the story of an attempt to summarize ethnographic and, partly, archaeological, collections from the North housed at Swiss museums.

Altogether, Switzerland has several hundred museums, large and small—over 500, according to the Swiss “Museum Pass” network, more than 750 if one counts all of the institutional members of the Swiss Museums Association (including Liechtenstein), and 150+ museums with individual entries on Wikipedia. The earliest museums originated in the 1500s and 1600s, primarily from the private and university-based collections of antique books, manuscripts, and curiosities.

Only about a dozen Swiss museums have ethnographic (or archaeological) objects from the Arctic and Subarctic, often of only a few dozen objects. Yet certain institutions house substantial collections of several hundred objects, such as the Basel Historical Museum, the Historical Museum Bern and the Cerny Inuit Museum in Bern, the Nordamerika Native Museum (NONAM), and the Völkerkundemuseum der Universität Zürich (Ethnographic Museum at the University) in Zürich, the Musée d’ethnographie de Genève, and others.

The first documented objects from the North at Swiss museums date back to the 1700s, though most were collected during the 19<sup>th</sup> and 20<sup>th</sup> centuries, even in the last decades of the latter. As our survey indicates, Swiss museum institutions continue to

collect objects from the polar regions, in both Eurasia and North America in the 21<sup>st</sup> century. They are also increasingly taking stock of their possessions by featuring their collections online, in electronic databases, printed materials, and, partly, on exhibits. Only few museums feature any northern objects on their permanent displays, so that the Swiss public, visiting tourists, and foreign professionals are mostly unaware of the riches stored behind the scene.

The first and so far, the only specialized exhibit in recent times displaying northern objects from several Swiss museums called Aiguuq! (“Look here!” in Canadian Inuktitut) was organized in 2008 by the North American Native Museum (NONAM). It was on display for five months and included about 110 objects (according to its printed catalog). NONAM, as well as other museums, also staged several temporary exhibits featuring objects from the North.

## Swiss Arctic Collections Network



“Arctic” section of NONAM permanent exhibit.

Photo by Florian Gredig

In November 2017, some 20 museum specialists representing five institutions met at the Historical and Ethnographic Museum (Historisches und Völkerkundemuseum) in St. Gallen to establish the Swiss Arctic Collections Network (Netzwerk Arktis-Sammlungen Schweiz, NASS), with the aim to facilitate “a comprehensive exchange for people involved in Arctic collections in Switzerland.” They

also held a two-day session with presentations of Arctic collections at individual Swiss museums (St. Gallen, Cerny Inuit Collection, NONAM, Bern Historical Museum) that advanced the collaboration started during the NONAM exhibit of 2008.

On November 9, 2018, the NASS team renamed the group to Network Arctic Collections Switzerland (NACS) and held its second annual meeting at the Völkerkundemuseum in Zürich (followed by an evening visit and reception at NONAM). This time, the spectrum of participating institutions (13) and attendees, including museum workers, agency representatives, and private collectors, was far more diverse. The list of speakers also featured two foreign curators, **Igor Krupnik** (NMNH, Smithsonian Institution) and **Martin Schultz** (Statens museer för världskultur, Stockholm, Sweden), who gave



overviews of the Arctic collections at their respective museums. Schultz also pointed to important historical links between the collections held in Switzerland and Sweden. Two additional Swiss museums also presented session papers—the Völkerkundemuseum in Zürich (by **Maïke Powroznik**) and the Musée d'ethnographie de Neuchâtel (by **Yann Laville**), both with substantial northern holdings. The participants agreed that the 3<sup>rd</sup> NACS meeting would be hosted at the Musée d'ethnographie de Neuchâtel in 2019.

A new issue raised following Krupnik's presentation was the online accessibility of ethnographic objects at Swiss museums. Whereas today each modern museum has an internal electronic collection database, Swiss institutions differ greatly in the ways they open their collections online. There is neither a shared policy nor a common online database (like those in Iceland or in Sweden) that allows to search collections via the Internet—by fellow museum



*Martha and Peter Cerny in the Cerny Inuit Museum. Photo by Igor Krupnik*

researchers, online visitors, and, specifically, by Indigenous people from the object's "home areas." The issue of accessibility is becoming ever more urgent with the growing demand by Arctic indigenous people for cultural resources from their areas often held in distant countries.

Another factor is the ongoing effort to produce an international "guide" for Arctic ethnographic collections at the world's major museums that may be accessed online (see *ASC Newsletter* 24). Following the NACS meeting in Zürich, the three co-authors agreed on the need of a comprehensive summary of Swiss museum holdings from the polar regions and their online accessibility. This work is still ongoing; below we provide short entries on three individual Swiss museums that may be viewed as contributions to the future international online guide. Using the criteria established earlier, the "Arctic"

(or rather "North") is defined broadly, to include the Arctic and Subarctic culture areas in North America, the northernmost (Alaskan) portion of the Northwest Coast, the northernmost regions of the Nordic countries, and the areas populated by Indigenous people across the Russian Arctic and Siberia.

### **Museum Cerny Inuit Collection, Bern**

This unique and privately owned museum started in the early 1990s when **Martha and Peter Cerny** acquired some 120 stone and ivory sculptures, lithographs and rare batiks produced by the contemporary Inuit artists from Arctic Canada. As the collection grew via more acquisitions in the Canadian Inuit communities and at art auctions, new objects made of stone, antler, whalebone, musk ox horn, sealskin, mammoth, and walrus ivory were purchased. They depict animals, people, human-animal metamorphoses, hunting and shamanistic scenes, as well as Inuit daily life. Since the 1990s, pieces from Greenland, Alaska, and, later, from Russia were added, so that the collection now offers a circumpolar coverage of Indigenous artworks.

The museum currently occupies a two-story building in downtown Bern, with two large exhibit halls displaying over 500 objects and a



*Permanent exhibit of modern Inuit art at the Cerny Inuit Museum. Photo by Igor Krupnik*

storage with roughly the same number of works. At ~1,000 object-strong, it represents the largest public display of Northern objects in Switzerland. In addition, the Cerny Museum (formerly, "Cerny Inuit Collection") organized dozens of off-stage exhibits and displays, making it the most active institution in publically presenting Arctic artworks in Switzerland, and, perhaps across Europe.



The museum public website ([www.cernyinuitcollection.com](http://www.cernyinuitcollection.com)) does not provide online access to collections. An internal electronic database (in progress) cites over 900 objects from Arctic Canada alone; they are organized by the home communities (Cape Dorset, Iqaluit, Pangnirtung, Kimmirut, etc.) of their creators. The second largest group (over 80 objects) comes from Siberia, primarily from the ivory craftshop in Uelen, Chukotka and Yamal, West Siberia. The collection also includes a handful of objects from Greenland and Alaska, with no artwork from the Sami areas. The museum is expanding its coverage and is the only Swiss institution actively acquiring modern art and ethnographic objects (clothing, jewelry, ornamentation) from across the circumpolar regions.

### Nordamerika Native Museum (NONAM), Zürich

The Nordamerika Native Museum was founded in 1963 under the name Indianermuseum der Stadt Zürich and is owned by the city of Zürich. It is based on a private collection originally assembled by **Gottfried Hotz** (1901–1977), a Zürich high school teacher who took interest in Native American cultures early in his life. He eventually succeeded in acquiring about 1,000 objects via purchases from private owners and at antique shows, mainly from the Plains/Prairies, Eastern Woodlands and Southwest, before selling his collection to the City of Zurich.

It was only after 1993 that collecting Arctic objects was also actively pursued (particularly after the museum moved to a new building in 2003), so that NONAM now officially presents itself as the museum of “Native American and Inuit cultures.” Notably, the museum acquired many Inuit stone sculptures and art prints from Canada, as well as the private collection of anthropologist **Jean-Loup Rousselot** (former curator at the Staatliches Museum für Völkerkunde in Munich), containing 309 objects from Alaska and Canada. The NONAM currently houses about 400 objects from the Arctic and 300 from the Subarctic, of which a considerable part is on permanent exhibit, making NONAM northern displays the second largest in Switzerland. Indigenous cultures represented are the Inuit/Eskimo of Alaska and Canada, the Gwich’in,

Koyukon, Innu (Montagnais-Naskapi), Slavey, Subarctic Ojibway and the Inland Tlingit (with just a few objects from the Old World polar regions).

NONAM’s permanent exhibits are arranged by the North American culture areas. It has a small catalog (in German) listing more than 760 objects on display. The museum also features a small “soundscape” installation offering sound recordings from the Inuit, Hopi, Navajo, and other Native cultures. A hunting coat of the Innu (Montagnais-Naskapi), made around 1700, is considered to be one of the oldest and finest known pieces of its kind. The museum regularly publishes catalogs of its temporary exhibits, of which many represent polar art and cultures. No online access to the collections is currently provided.

### Bern Historical Museum (Bernisches Historisches Museum), Bern



*Bern Historical Museum. Photo by Igor Krupnik*

Museum collecting in Bern started with the foundation of the Hohe Schule, a predecessor of the University of Bern, in 1528 and of its University museum established in 1894. Today, the museum houses 500,000 objects divided into four main categories: the archaeological collection, the historical collection, the numismatic collection, and the ethnographical collection of roughly 60,000 objects. Though all museum holdings are

computerized, there is no online access and no option for online search besides a handful of featured objects.

The oldest ethnographic objects from the Arctic date back to the third voyage of Capt. **James Cook** and were donated in 1791 by Swiss-born naturalist **John Webber** (anglicised from **Johann Wäber**), who accompanied Cook on his voyage as an artist. A bow, arrows, and throwing darts were collected in Alaska during that trip.

Today’s Arctic collections at BHM are about 1,200 objects strong. The largest portion of about 800 archaeological and 120 ethnographic objects comes from St. Lawrence Island, Alaska, collected in the late 1960s and early 1970s by a team led by archaeologist **Hans-Georg Bandi** (1920–2016). Various Swiss expeditions to Greenland led to a set of about 120 ethnographic objects received also partly from Danish

officials. A small collection of 20 contemporary Greenlandic carvings in stone, ivory, antler and bone, were acquired during the 1970s and 1980s.

From Siberia, around 20 ethnographic objects entered the collections, a Nivkh “chief’s dress” was bought in 1886, and a set of 18 Nanai objects in 1924. Northern Scandinavia is represented by a more substantial number of 120+ Sami objects, mostly from Finland acquired in 1937–1939. The ethnographic objects are accompanied by several hundred photographs, mostly from Bandi’s expeditions to St. Lawrence Island, and a few historic photos from Greenland. None of them are currently displayed in the museum’s permanent exhibits. They are divided between the departments of archaeology and ethnography, with different curators responsible.

### Future Steps

Overall, the Arctic/Northern museum “scape” in Switzerland contains at least 6,000 ethnological and archaeological objects plus several thousand photographs; it is also remarkably diverse. At least seven museums have more than 500–600 objects each, and four museums have over 1,000 objects, including photographs or even more. It is an unexpectedly high number for a small nation, with no history of colonial or imperial ambitions.

Though individual museums differ substantially by regional/ethnic strength of their collections, cumulatively the Swiss museums offer fairly solid coverage of indigenous cultures across the Arctic/Northern regions: over 3,000 objects from Alaska (counting also photos and archaeological specimens); 1,500 objects from Canada (with a good coverage of specific regions), about 500 (500+ in archaeology) from Greenland, and some 650+ objects from Siberia and Arctic Russia. Only the Sami culture of the Northern Europe is relatively underrepresented and hardly any objects come from Iceland.

Whereas Swiss Arctic/Northern collections have some obvious gaps, they also have several “gems” of world significance and excellent quality. These include but are not limited to: over 900 pieces of modern Inuit art from several communities in Canada at the Cerny Inuit Museum; several hundred Central Alaskan Yup’ik photographs and graphic art samples by German anthropologist **Hans Himmelheber** at Museum Rietberg in Zürich; Jean-Loup Rousselot’s collection from the North American Arctic at NONAM (more than 300 objects); a remarkable collection of objects and photographs by **Jean Gabus** from the Hudson Bay Inuit (split between museums in Basel, Neuchatel, and Fribourg); over 50 early-19<sup>th</sup> century

objects from Siberia and Alaska from **Johann Horner** (in Zürich), and others. These and other collection “stars” are poorly known outside Switzerland and even among the Swiss Arctic professionals. It is an urgent task to publicize its significance in international publications and in other languages, including to local audiences across the Arctic regions.

Generally, the Swiss Arctic/Northern ethnological collections remain poorly researched. They have been published but scantily and, by far, lack accessible summaries and printed catalogs. Yet, the Arctic themes are generally very popular with the Swiss audience, as revealed by several temporary exhibits produced by NONAM and the Cerny Museum since 2000.

The online accessibility of Swiss northern collections is still in its infancy and many valuable museum holdings may be accessed through staff curators only. We should, therefore, encourage every effort to make these collections available and better known to museum professionals, the general public, Arctic specialists, indigenous people, students, and interested visitors around the world.

Lastly, our work could not have been completed without the generous assistance of many colleagues at individual Swiss museums, specifically by **Sabine Bolliger-Schreyer** (Bern), **Alexander Brust** (Basel), **Yvon Csonka** (Neuchatel), **Martha Cerny** (Bern), **Yann Laville** (Neuchatel), and **Maïke Powroznik** (Zürich). The summary of Swiss Arctic/northern holdings remains a work in progress; so, please stay tuned for future updates.

### **ERSERSAANEQ—CREATING KNOWLEDGE THROUGH IMAGES**

*By Malu Rohmann Fleisher, Randi Sørensen Johansen, and Michael Nielsen*

In Greenlandic, the word “ersersaaneq” (pronounced: ER-ser-SAA-neck) means creating knowledge through visual images. Many ethnographic objects made by the Greenlandic Inuit are found around the world today in foreign institutions and museums outside of Greenland. This phenomenon is a result of a common practice among major museums during the 19<sup>th</sup> and 20<sup>th</sup> centuries. Institutions would frequently exchange items from various ethnographic collections as both permanent loans and for temporary exhibitions. Over the years, many Greenlandic collections have been loaned and traded or been split apart. In some cases objects have become part of orphaned collections and important provenience information was lost. The Greenland National Museum and Archives is presented with the great

challenge of how to deal with these collections that are now spread over Europe and North America.

Greenland is not unique in that much of its heritage resides overseas. In 2016 the Ersersaaneq project was created to explore this challenge by asking how a small museum with limited resources could use new advances in 3D-capture technology to improve and modernize the digital dissemination of Greenlandic heritage. The project began as a collaboration between three students from Ilisimatusarfik, (University of Greenland) and several senior staff at Nunatta Katersugaasivia Allagaateqarfialu (Greenland National Museum and Archives). Because so many objects of Greenlandic origin now reside overseas in foreign institutions, one of the underlying goals of the project is to have the opportunity to show disparate Greenlandic ethnographic collections in their entirety online. The project builds on the successes of other indigenous efforts at 3D dissemination in North America, Australia, the Pacific Islands and Africa. This project offers a new paradigm in the management of museum objects of Greenlandic origin and has important implications for other national museums with limited resources in other parts of the world.

One of the other underlying objectives was to not simply create 3D images but to document the process and workflow and thereby make it possible to be replicated by other Greenlanders in the future. The plan includes a needed dissemination component that explores finding new ways to organize, manage, develop and digitize the museum's online collections from start to finish. Since there are very few people in Greenland who are specialized in this field, there is an urgent need to develop competency in these areas.

The Ersersaaneq team chose to focus on creating 3D images from East Greenland as there are many unique objects from this part of the country. By displaying each object in its entirety from all angles, the 3D images will give people a better impression of the real shape and color of the object, making the viewer experience more interactive and satisfying than a 2D image. In addition, it will also be possible to reproduce smaller details of the objects which may

possibly hold important information in relation to the objects function and history. Therefore, 3D images will give people an experience of getting closer to the object despite not seeing it in its physical form.

One of the largest ethnographic collections from East Greenland was made by the Danish naval officer and Arctic explorer **Gustav Holm** on his famous Umiaq (women's boat) Expedition, 1883–1885. This collection included special pieces of clothing, sewing implements, furniture, hunting and fishing equipment, art, and a variety of ornamented objects. Today a large part of the collection is located at the Greenland National Museum, but it is well-known that other parts of the collection can be found in the National Museum of Denmark and the Smithsonian Institution. Because of the rich history of the expedition and knowledge—through Holm's publications—of this collection, it was decided that the Holm collection should be the first to be digitized by the Ersersaaneq team.

The collection includes several hundred artifacts, but the current goal by the team is to only digitize a small portion to test and refine the workflow digitization process. Once a selected number of objects are made into completed 3D models, the images will be made public on a dedicated website and freely available to anyone who is interested in gaining a greater knowledge of the culture and history of the Greenlandic Inuit. The Ersersaaneq team has chosen

to display the 3D images on a website platform called Mukurtu, an open-source platform built specifically with indigenous communities, to help them manage and share their cultural heritage online <http://mukurtu.org>. In addition to the 3D images themselves, supplemental information will be provided in both Greenlandic and English to enable an interactive educational experience for both local and global audiences.

When the project began in 2016, the students had absolutely no knowledge of how to make 3D digital models or if there were any people in Greenland who might have some experience with the process. The participants started seeking instruction on the internet about how they could create 3D models quickly and cheaply. After some



*Bag made of sealskin and fish-heads in the Holm collection from East Greenland 332406.  
Photo by Ersersaaneq Project*



research, they found that photogrammetry would be the best and most cost-effective solution. The team tested different photogrammetric software and after some trial and error, decided that Agisoft Photoscan, (now known as Agisoft Metashape) would be the best option for their project needs.

In the beginning, the Ersersaaneq team pieced together what tools and equipment they could find at the Greenland National Museum. Staff helped the students by also providing work space and access to objects in the Holm collection that were on display in the Museum's permanent exhibition. In addition, the team also participated in a short course on best practices in photographing artifacts under controlled settings. It quickly became clear for the team that 3D digitization is not as easy as it first appeared. They could not simply use the same settings on their camera equipment as they use when taking ordinary 2D photos of artifacts, and it was difficult for them to find information about which settings would work best for sets of photos intended to be stitched together in Agisoft. The Ersersaaneq team spent many hours testing different camera settings, tripods, lighting conditions and camera lenses to see what worked best and what did not work at all.

After a year of testing, the team produced its first complete 3D image of an object with no errors. More trial and error led to better understanding of the nuances required to capture different types of objects with different material properties (for example, wood versus metal). After many attempts, they finally managed to find the parameters needed to capture a variety of different objects. This has been no small feat given the limited time, resources and competing demands for a team consisting of full time students also employed on other projects at the Greenland National Museum.

When the Ersersaaneq team felt confident in their techniques for 3D capture, they reached out to the Smithsonian and the National Museum of Denmark with the hopes of gaining access to artifacts from the Holm collection curated by those two institutions.

The Smithsonian was immediately interested in the efforts of the team and arranged access for the team to photograph several East Greenlandic objects from the Anthropology Department stored at the Smithsonian Museum Support Center.

The team was awarded a grant to travel to Washington DC through the Greenlandic government through the Tips-og Lottomidlerne fund. Two members of the team spent 12 days working with members of the Arctic Studies Center and Department of Anthropology in December 2018. Throughout the process, The Smithsonian Institution staff were extremely welcoming and very helpful and created a supportive atmosphere that helped make the entire experience incredibly rewarding for the two Greenlandic students.

During their 12-day visit, the students successfully captured 24 East Greenland objects from the Holm and Ryder collections (**Carl Hartvig Ryder** made the Hekla Expedition to East Greenland in 1891–1892). This may not sound like much, but since it takes about 100–150 photos to convert an object into a 3D model, the students were very happy with the results. And since this was their first experience of taking pictures in unfamiliar surroundings, they also gained valuable experience in adjusting their process to different types of ambient lighting and refining their work-flow to accommodate different work spaces—a

skill that will greatly aid them as they travel to other institutions to create 3D models of objects in the future.

Based on the success of the Smithsonian collaboration, the team has high hopes for its next trip. At the moment, the Ersersaaneq team and the Greenland National Museum are in dialogue with the Danish National Museum to obtain permission to access several East Greenlandic objects from the Holm expedition currently in their collections. Once the 3D models in Denmark are complete, it will be the first time in history that these rare East Greenlandic objects spread over three countries have been displayed together as a virtual online collection.



*Female figurines of wood from the Smithsonian collection showing the distinctive East Greenland hair-do. Photo by Ersersaaneq Project*

Reuniting these objects online helps to fill a gap in our knowledge of the East Greenlandic Inuit before Danish colonization. In addition to their historical value, the items are also directly connected to modern conceptions of Greenlandic identity as they represent an enduring cultural tradition that goes back in time before direct European contact with the East Greenland Inuit. Creating a digital online repository of 3D images is the first step toward bringing greater coherence to the East Greenlandic collection as a whole, while making it universally accessible as a historical and educational resource.

*Special thanks to the following for their assistance: Igor Krupnik, Stephen Loring, William Fitzhugh, Eric Hollinger, David Rosenthal, Hans Harmsen, Daniel Thorleifsen, and Christian Koch Madsen.*

## CURATORS' TOUR: INDIGENOUS ART

*By Bernadette Driscoll Engelstad*

A full-size Anishinaabe birchbark canoe, surrounded by paintings of Canada's famed Group of Seven, presides over the exhibit room in the recently installed permanent collection at the National Gallery of Canada. Not only does the canoe appear completely at home, it enlivens the almost transcendental experience captured in the woodland paintings which surround it. The size and physicality of the canoe impresses the viewer—its elegant form, the soft color of the bark, the scalloped edge along the gunwales, the uniform series of bentwood ribs, and the linear patches of pine tar that mark its surface. In re-envisioning the installation of its collection—renamed *Canadian and Indigenous Art: From Time Immemorial to 1967*—it is as though the National Gallery awakened from a long slumber to the history and vitality of indigenous art, long ignored by the institution. It is a sad and persistent slumber that afflicts many cultural and educational institutions throughout the western hemisphere.



*Study group visiting Canadian museums with indigenous art collections, including Kayla Aubid, Kerry Boyd, Jenny Keller, Michelle Rich, Joe Williams, Laura Youngbird, Dani Fisher, and Bernadette Engelstad. Photo by Dani Fisher*

At the invitation of **Denis Chouinard**, Public Affairs Consul, Embassy of Canada—a dear friend of the Arctic Studies Center—I joined **Kayla Aubid** (MacRostie Art Center, Grand Rapids, MN), **Kerry Boyd** (NMAI), **Jenny Keller** (Gilcrease Museum, Tulsa, OK), **Michelle Rich** (Dallas Museum of Art), **Joe Williams** (Plains Art Center, Fargo, ND), **Laura Youngbird** (Plains Art Center, Fargo, ND), and **Dani Fisher** (General of Canada, Minneapolis) on a cross-Canada tour for curators of indigenous art, organized by the Generals of Canada in Dallas and Minneapolis. Coming from a variety of museum backgrounds (curatorial, educational, exhibits, and administration—often overlapping), we were hosted by directors, curators and museum staff in a behind-the-scenes journey through the transformative change which has taken place in cultural institutions across Canada. Responding to the 94 count “Call to Action” documented in the Report of the Truth and Reconciliation Commission resulting from the searing multi-year testimony of indigenous survivors of the residential school system, cultural institutions across

Canada are urgently re-shaping the narrative of Canadian art history, repositioning the historical marker which has long determined the western European origin of Canadian art history to acknowledge and embrace aboriginal art created before, during, and after Euro-Canadian settlement.

Moving through the galleries of the historical collection at the National Gallery of Canada, archaeological objects are on prominent display. Combs and figure

carvings from the Dorset and Thule periods, on loan from the Canadian Museum of History, are an apt reminder of the ancestral history of the North.

Skillfully crafted, richly aesthetic garments created by indigenous seamstresses provide stunning highlights throughout the exhibit space: a Naskapi caribou hide Ceremonial Coat (c. 1840) sports a swanky collar, striking epaulettes, and finely inked multi-tiered graphic designs in simple and lyrical patterns that both decoratively and spiritually mark the hem, wrists, and shoulders of the garment; the hide dress of a Dene hunter, scraped to a bright white suede, his mitts and

knife sheath decorated with naturally dyed porcupine quill—recalling the neon colors that once thrilled Pop artists in the Sixties; the regalia of a Northwest Coast chief, his status evident in the elaborately carved headdress adorned with the iridescent shimmer of an abalone shell; his shoulders, draped by a Chilkat cape of mountain goat wool, hand-woven in a geometric pattern of black and white, reminiscent of the Op Art movement to captivate the New York art world a few generations later. In reflecting on the archaeological objects, some dating to 2,500 BP, and the finely crafted sartorial art in daily use well before the advent of European settlement, one wonders why the exhibit gallery is not named in the reverse: “Indigenous and Canadian Art: From Time Immemorial...”.

In re-installing the First Peoples Hall at the Canadian Museum of History, curatorial staff worked closely with indigenous advisors. Against the monumental cedar poles and decorated house fronts that speak of the resilience of indigenous communities along the Pacific coast, text panels in the First Peoples Hall document the painful history of indigenous peoples shared across the continent. Statements by then-Prime Minister **John A. Macdonald** are displayed along with excerpts from the testimony of residential school survivors, demonstrating the courage, certitude, and responsibility with which indigenous advisors and museum staff undertook their mission to impart a comprehensive, more truthful rendering of Canadian history—a history shared across the continent.

Arriving in Winnipeg, we were graciously hosted by **Stephen Borys**, Director of the Winnipeg Art Gallery, Chief Curator, **Andrew Keir**, **Julie Nagam**, and **Darlene Wight**, Curator of Inuit Art in the Gallery Boardroom—a setting that brought back memories of sitting at the same table with colleagues working out exhibit issues during my tenure as Associate Curator of Inuit Art (1979–1985). With passion, Stephen Borys described details of the Gallery’s bold initiative to create Canada’s first Centre for Inuit Art. Internationally recognized as the key

center for the exhibition, collection, and publication of Inuit art, the new building—now under construction—will allow the Gallery to showcase its collection of almost 13,000 sculptures, prints, drawings, and textile art by contemporary Inuit artists. Designed by **Michael Maltzan**, an architecture of Los Angeles. The white undulating, multi-storied shape of the new building, finding its creative source in towering islands of floating ice encountered by the architect on travels North, seems to float above street level with a glass fronted entrance way.

Enclosed walkways will connect the two buildings. A circular glass-enclosed core of open storage dominating the center of the new building will allow the Gallery to display over 700 sculptures selected from its extensive collection. In addition to installation work on the permanent collection carried out by Curator of Inuit Art, **Darlene Wight**, a major inaugural exhibition is being planned by a team of guest curators representing the four regions of Inuit Nunaat. They are: **Heather Iglooliorte** (Nunatsiavut), **Krista Ulujuk Zawadski** (Nunavut), **Asinnajaq** (Nunavik), and **Jade Nasogaluak Carpenter** (Inuvialuit Settlement Region).

In a lively presentation, Dr. **Julie Nagam**, Chair in the History of Indigenous Art in North America (a



Left: Smoked hide coat made by Mississauga artist (unknown) for Kahkewaquonaby (Rev. Peter Jones), c. 1844. Smithsonian Institution, Department of Anthropology (E178398-0).  
Right: a wool button blanket cape titled, "Raven on the Colonial Fleet", by Skeen Riece, displaying a hand grenade in glittering sequins. Photo by Bernadette Engelstad





*An Anishinaabe birchbark canoe surrounded by paintings of the Group of Seven in the National Gallery of Canada.  
Photo by Bernadette Engelstad*

joint appointment with the University of Winnipeg), provided a frank overview of the Gallery's shortcomings in its past failure to support the work of Metis and First Nations artists. The 2018 exhibition, *Insurgence/Resurgence*, co-curated by **Julie Nagam** and **Jaime Isaacs**, the Gallery's Curator of Indigenous Art, featured the work of 26 contemporary artists. This is an effort that will continue into the future with the institutional commitment to a biennial exhibition of contemporary Metis, First Nations, and Inuit artists.

Subsequent meetings with **Arlea Ashcroft** of Creative Manitoba, a non-profit assisting indigenous artists with economic and career-building aspects of art production, and **Daina Warren**, Director of Urban Shaman, a well-established gallery of contemporary aboriginal art in the city's Exchange District—soon to open a satellite location in Santa Fe, New Mexico. It emphasized the rich vitality and sustainability of indigenous art production in Winnipeg.

With a final stop in Vancouver, we were hosted by **Anthony Shelton**, Director of the Museum of Anthropology (MOA) at the University of British Columbia, an intellectual force in Vancouver's art world. Accompanying Dr. Shelton on a whirlwind tour of the Museum, he emphasized that the institution's collections and curatorial interests extend well beyond its impressive display of Northwest Coast art, a perspective which sets the latter in a more globally non-western, pan-Pacific environment. Constantly at the forefront of museum innovation—the first museum in North America to feature open storage—MOA's Oral History Technology Lab and multiple, free-standing kiosks with digital images of the collection and catalog data provide critical models of accessibility for the museum world.

With a focus on the theme of transformation, the Vancouver Art Gallery's exhibit, *Metamorphosis*,

highlights recent acquisitions to the collection with several works by contemporary indigenous artists. A female mannequin outfitted in a rigid white corset, dance apron, headdress, sequin button blanket, and sporting a pair of black high-heeled shoes dominates a center gallery. Entitled *Raven on the Colonial Fleet*, the artist, **Skeena Riece** (b. 1975), has painted the corset and dance apron with Northwest Coast imagery; the figure's headdress is adorned with a pair of marten fur pelts, her shoulders are draped in a red wool button cloak edged with a black border. In place of the ancestral clan image traditionally outlined on the back of the cloak, the artist renders the curiously elegant form of a hand grenade carried out in silver sequins.

*Baxwana'tsi: The Container for Souls* (2006) by **Marianne Nicolson** (b. 1969) consists of a brilliantly conceived heirloom box alluding to the ancestral story of Raven releasing daylight, its glass sides etched with Northwest Coast heraldic imagery. Light fixtures within the box project shadows of Northwest Coast imagery on the walls of the small room enclosing the work, filling the space in a three-dimensional surround. Walking through the room, shadows envelop the viewer's body, extending and transforming the kinetic energy of the piece as the viewer becomes an elemental part of the artist's creative statement.

Throughout our journey across Canada, the painful impact of the Truth and Reconciliation hearings on the national psyche was clearly evident. Inscribed at the entrances of museums, art galleries, and exhibit hall. And it personally conveyed in speech as we were welcomed—museum directors and curators formally acknowledged the ancestral and contemporary occupation of the traditional lands beneath our feet by indigenous peoples. Nowhere was this brought more sharply into focus than by the three exhibitions on view at the Museum of Vancouver: 1) *časna?əm*, 2) *Haida Now*, and 3) *There is Truth Here: Creativity and Resilience in Children's Art from Indian Residential and Day Schools*. Emerging from the discovery of ancient burials the exhibition *časna?əm*, presents a moving tribute to the ancestral Musqueam village beneath the modern-day city of Vancouver.

As described by **Vivienne Gosselin**, Director of Collections and Exhibitions, the large nail installed at the entrance to the exhibit gallery represents a fixture of Musqueam domestic culture, a reminder that one's opinions, preconceptions, and biases are to be left outside the door of another's home.

*Haida Now* balances the display of historical belongings with contemporary video and the voices of Haida individuals, sharing intimate thoughts and concerns with the exhibit guest. *There is Truth*

*Here: Creativity and Resilience in Children's Art from Indian Residential and Day Schools* (opening April 5, 2019) presents a collection of drawings, carved ceremonial boxes, and textiles created by students of residential schools in British Columbia and Manitoba. To all of us whose children have returned from school each day with the proud gift of that day's drawing, it is a tearful realization of the isolation these children and their parents experienced, removed from the daily love of their families.

Although the tour program was designed as a means of establishing personal and institutional connections across the border, its impact can be far more significant as cultural institutions, museum staff, and artists look to Canadian institutions and colleagues who are fundamentally reshaping the public understand of North American history.

### **DARKHAD TEXTILE RECOVERY AND CONSERVATION PROJECT**

*By William Fitzhugh, Paula DePriest, Caroline Solazzo and Jamsranjav Bayarsaikhan*

Over the past few years, a tragedy unfolded in the Darkhad region of northern Mongolia where Smithsonian and Mongolian researchers have been working since 2001. In summer 2017, our colleagues, **Jamsranjav Bayarsaikhan**, Research Director of the National Museum of Mongolian History, and **Julia Clark**, Director, Nomad Science Mongolia, were alerted that looters seeking burial goods at a site called Khorig ("taboo," a name for the protected cemeteries of the Mongol Empire Khans) had unearthed more than 100 medieval (or earlier) grave mounds. In the process, the looters cast aside burial garments, many of which were made of luxury silk with gold threads imported from China, Central Asia, or Persia, and fashioned into Mongolian styles.

When the researchers and their teams visited the sites, they found spoil piles filled with textile remains, many made of silk. The textiles were damaged by decay and the trauma of the looters' shovels, but many more—especially the silk materials, although fragmentary, had resisted deterioration and were in relatively good condition. Mounting an emergency salvage program, the team screened the back-fill of 25 looted graves and recovered hundreds of textile fragments, some whose fabrics, designs, and styles were intact. Most likely, the textiles were imported into the Darkhad region from production centers in China, Central Asia, or Persia and had been tailored according to local Mongol fashion. During the medieval period, textiles would have reached

the Darkhad as tributes for the marriages alliances between Chinggis (Genghis) Khan's Royal Family and leaders of the local tribes such as the Oirats. Along with textiles, there were small objects the looters missed: carvings and ornaments, small metal objects, game pieces, and others—all important items documenting life during the Chinggis Khan Empire, as well as in earlier and later times.

The arrival of winter shut down field recovery, and the remaining mounds had to be abandoned. During the fall, Bayarsaikhan contacted **William Fitzhugh** and



*Darkhad deel textile fragment with gold-wrapped thread.  
Photo by Jamsranjav Bayarsaikhan*

**Paula DePriest** at the Arctic Studies Center and the Museum Conservation Institute (MCI), respectively, requesting assistance for conservation and analysis. MCI conservation scientists and conservators, led by **Caroline Solazzo**, pledged support to bring a selection of the salvaged materials to Washington, DC, for preliminary scientific analysis and study during the spring of 2019. In collaboration with **William Honeychurch** (Yale), a Yale University student was funded through the Yale-Smithsonian Internship Program to participate in the analysis. The results from these studies would help develop a plan for the larger recovery planned for summer 2019.

Bayarsaikhan, Clark, Solazzo, DePriest, Fitzhugh, and Honeychurch began discussions about how the field and analysis programs might proceed. Work was already underway in Ulaanbaatar by Bayarsaikhan and Clark with **Kristen Pearson**, Fulbright Fellow (National Museum of Mongolian History and University of Pennsylvania), and **Sandra Vanderwarf**, Textile Conservator (Asian Cultural Council), to stabilize and document the 2018 collections. In March, DePriest, Solazzo, Fitzhugh, Pearson, Clark, and Vanderwarf met in person to



*Darkhad textile fragments with patterns intact.  
Photo by Jamsranjav Bayarsaikhan*

develop a strategy for selecting the materials and types of analytical studies. Meanwhile Bayarsaikhan and colleagues made plans for salvaging more of the graves during the coming summer season. All parties recognized the urgent nature of the effort, both for the materials that had been salvaged in 2018 and for materials that would be recovered in 2019. Exposure to the elements, especially during the spring thaw, would begin a process of rapid decay now that the textiles and other objects have been brought to the surface. Currently, the plan has four goals:

First, to mount a salvage archaeological effort to screen and recover all cultural materials from the 75 remaining looted burials. Since graves tend to cluster according to family, lineage, and social groups, and reveal socio-economic status, the remains would provide information about material, social, and political life of Darkhad Mongolians.

Second, to inventory and stabilize the recovered remains and to provide field documentation (photography, basic description, cataloguing) that would be used to organize and manage the collection, and to provide on-site conservation as needed to prevent loss or deterioration in advance of laboratory study.

Third, to bring a sample of the collection to the Smithsonian for more intensive conservation and stabilization, to conduct physical and chemical studies to identify material constituents (fibers, metallic threads, dyes), and to undertake more detailed documentation and classification following standards developed for Asian textile studies.

Fourth, to train archaeologists, conservators, and students—both Mongolian and American—in field recovery, conservation, and analytical techniques.

The Smithsonian-Yale partnership is likely to play a role in the recovery and analysis phases.

Preliminary inspection of the samples salvaged in 2018 confirmed that these garments and fragments might be one of the most important archaeological collection of medieval textiles ever recovered in Mongolia because of their historic context - representing the Mongol Empire period and its marriage alliances, their noteworthy preservation, and their large number and diversity of individual fragments from a single time period and geographic region. Few archaeological textiles are as well preserved. Although spectacular Mongol period costumes have been found in dry caves, they have been one-off pieces and not representative of a large population or an entire geographic region. Even in China, such finds are rare. The Darkhad Textile Project hopes to turn the tragedy of looting and destruction into an opportunity for salvage, conservation, training, and research on a previously unknown aspect of Central Asian material culture.

We thank those named above for their role in this project and for contributing information and suggestions for this report.

### **TREASURES OFF THE BEATEN TRACK: A VISIT TO THE CRANBROOK INSTITUTE OF SCIENCE (CIS)**

*By Stephen Loring*

In February 2016 **Joan Gero** was in Detroit as the keynote speaker at the Midwestern Andean Conference and I tagged along. She was also invited to speak at the Anthropology Department at Wayne State University at the invitation of our long-ago Smithsonian Repatriation Office colleagues, **Tamara Bray** and **Tom Killion**. Tom took the opportunity to arrange for me to see the Arctic and Subarctic ethnology collections at the Cranbrook in Bloomfield, Michigan. There we were graciously received by **Cameron Wood**, Curator of Collections, and introduced to a small but delightful collection of artifacts from across the North American Arctic from Greenland to Alaska. The collection had been assembled piecemeal over the years, and while much of it lacked the detailed provenance or systematic collecting histories that characterize collections in larger institutions, still it contained a number of extraordinary treasures. I was especially smitten by a stunning small wooden mid-19<sup>th</sup> century carving of a Haida (or perhaps Tsimshian) woman from the Queen Charlotte Islands. The Woman With the Abalone Eyes had a stoic world-weary expression that seemed to resonate over time and space. Other treasures were



glimpsed in the repository which time did not allow me to investigate further, but my imagination had been captured and I knew I would have to return.

That opportunity occurred in the Fall of 2018 when I arranged to participate in Tamara Bray's Museum Studies (ANT 5600) course at Wayne State. We developed an exercise, a hands-on museum practicum, that would allow students to select one of the northern artifacts at Cranbrook Institute of Science (CIS), prepare a condition report, and an object biography. The goal was to determine as much as possible about the history and significance of the objects so we could eventually prepare a report for publication. A few highlights of the work the students and I conducted are indicated below:

The Woman with the Abalone Eyes (CIS.3224) has made a remarkable journey. In addition to her CIS

catalog number, discretely written on the underside, was another number 11/1311 which I instantly recognized as an old Museum of the American Indian/Heye Foundation catalog number! A subsequent check of the National Museum of the American Indian (NMAI) card catalog revealed her to have been purchased by its director, **George Heye**, from W.O. Oldman's Ethnographical Specimens in London in 1922. Oldman was the source for a number of the more remarkable 18<sup>th</sup> and early-19<sup>th</sup> century American Indian artifacts Heye acquired. Heye had a close "working" relationship with **Julius Carlebach**, who ran a very upscale "Primitive" and Ancient Art Gallery in New York City and who was known to negotiate the transfer and sale of objects out of the Heye collection. Having traveled from her home on the coast of British Columbia, to London, and eventually to New York, she arrived at her current Cranbrook repository in 1943/44.



*From left to right and from top to bottom: the woman with the Abalone Eyes (CIS.3224); Haida wooden pipe carving of a white man with arms extended; pair of story knives (CIS.1771); and the whale charm (CIS.4175). Photo by Stephen Loring*

And then there is a second exceptional Northwest Coast wood carving, a pipe, that appears to depict a European man (or perhaps the figurehead from a British or American trading vessel) whose face and hands are carved from bone and whose arms move. Researching this pipe, **Genevieve Prange**, a WSU student, discovered that it had a “twin” at Harvard’s Peabody Museum. Sadly, neither institution has much provenience information on either pipe. For now at least, the name of this master craftsman remains lost in history.

A second moment of *déjà vu* occurred when I picked up a small Yupik ivory snow-knife (CIS.1771) originating from the Yukon-Kuskokwim region of Alaska. This is just like the ones that **Edward Nelson** collected for the Smithsonian, I thought as I turned it over to see “36575–Nelson–Yukon,” the very distinctive numbering and lettering of the Smithsonian catalogers from back in the late-19<sup>th</sup> century. It is fascinating to learn of the degree to which museum collections were being acquired and disseminated throughout the late-19<sup>th</sup> and early-20<sup>th</sup> century and which, I suppose, to some extent, continues to this day. We assume that museum collections are sacrosanct and static when clearly they have always experienced a dynamic life and interaction even when divorced from their original cultural homes.

The CIS collection includes a number of very significant artifacts pertaining to North Alaskan Inupiat whaling. There is a magnificent carved ivory harpoon rest (CIS.4544); a harpoon (CIS.9883) and a pair of whaling charms similar to ones described by Murdoch. One of these (CIS.4175) charms that was important for ensuring a successful whale hunt is a truly unique, outstanding specimen from Point Hope. It consists of two stones in the shape of a bowhead whale bound together with a sealskin line. A smooth black stone, naturally polished by the sea, forms the head of the whale. The proximal end of the stone may have seen use as a blubber pounder before it was transformed into the charm. The shape of the stone mirrors the tapering head and nose of the whale and—amazingly—it has a thin white band that perfectly mimics the diagonal slant of a bowhead’s mouth. The effect is quite realistic and stunning. The back of the whale with its carefully shaped flukes and anatomical details is carved from a soft black stone (probably cannel coal).

Additional surprises included a small assemblage of tools, bones, and artifacts that the American artist, **Rockwell Kent**, recovered from an Inuit burial near Umivik, Greenland: a complete set of Innu painted caribou-skin clothing that was acquired from **Frank Speck** through his arrangement with the trader **Richard White** in Nain, Labrador, ivory carvings from Alaska, and Yup’ik masks.

The Cranbrook Institute of Science (1930) was an outgrowth of the Cranbrook School that had been founded by Detroit newspaper publisher and philanthropist, **George Gough Booth**, on grounds adjacent to his stately home and gardens in Bloomfield Hills, Michigan. The Cranbrook campus has expanded throughout the 20<sup>th</sup> century to become one of the country’s premier academy of arts and architecture. Ironically, the travelling version of the Smithsonian’s Inua exhibition (*Inua: Spirit World of the Bering Sea Eskimo*), with artifacts that Edward Nelson had acquired, came to Cranbrook in 1984–1985, reuniting (at least proximately) objects that had once been part of the same collection while show-casing others that might have been eclipsed by the Cranbrook’s own.

## TWO NMNH “TOTEM POLES” FIND A NEW HOME, NEW NAMES AND NEW STORIES

By Igor Krupnik

In summer 2017, **Michael Lawrence**, NMNH Assistant Director for Exhibitions informed Anthropology Department that museum’s Office of Exhibits was planning to move two Northwest Coast totem poles then-standing in the lobby of the IMAX Theater to a new location in the nearby Sant Ocean Hall. We met with Michael and agreed that the proposed move offered a possibility to revisit the text panels accompanying the poles produced more than a decade ago. The old panels provided mostly museum catalog information and in no way reflected the vision and knowledge of their indigenous creators. It was an opportunity hard to miss.

The NMNH Samuel C. Johnson IMAX was closed in October 2017, after 18 years of service, to vacate space for a new NMNH public restaurant facility. The new construction work started promptly. Meantime, the poles were cleaned and in January 2018 they were quietly moved to a new location in the corner of the Ocean Hall, near the replica of a 45-foot-long North Atlantic Right Whale, named Phoenix, hanging from the ceiling.

As soon as it happened, we established a small team in Anthropology made of **Eric Hollinger**, **Felicia Pickering**, **Gwyn Isaac**, and myself, as the curator responsible for the poles, to work on new panels. Judging from the old collection records pulled out by Felicia, there was some confusion related to the origins of the poles as they were accessioned by the Smithsonian (U.S. National Museum) in the late 1800s. One pole (catalog no. E54297) was reportedly collected by **James G. Swan** (1818–1900), former

“Indian agent” in what is now Washington state and an ardent artifact collector on behalf of the Smithsonian. Swan secured the pole for the “centennial” Philadelphia Exposition of 1876, after which it was accessioned in 1882. From the beginning, it was unclear whether it was originally made by the Tlingit or Haida carvers (though it was listed as “Haida, Queen Charlotte Islands, B.C.” in the original Anthropology catalogue ledger book). The most recent collection record was also quite ambiguous: “Totem pole, ca.1850–75. Probably Tlingit, Southwest Alaska. Cedar, red and black paint; probably collected by James G. Swan. The figures represent a man, a bear, and a frog”.

**C. Brown**, Seattle Art Museum, **Robin K. Wright**, University of Washington, and Steve Henrikson, Alaska State Museum), this pole was definitively identified as coming from the southern Tlingit.

It was no better for the second pole (E205851) acquired in 1900. Even its collection number in the record was accompanied with a question mark. In 1968, it was examined by **George Phebus**, Northwest Coast archaeologist, and NMNH Anthropology Collection Manager, who did a survey of the totem poles in NMNH collections, some of which did not have catalogue numbers written on them. At that time, he mostly made



*Tlingit totem pole (right) with a man, a bear, and a frog collected by James Swan in 1875. Bella Coola/Nuxalk totem pole (left) showing the bear, owl, and beaver sections of a larger pole collected by Iver Fougner in 1900.*

*Photo by Igor Krupnik*

The label in the IMAX lobby reiterated its Haida origin and added another name: “Heraldic pole, Queen Charlotte Islands, Canada. Haida noble’s heraldic pole illustrating ancestral history. The top figure wears chief’s hat showing family wealth. Collected in 1875 by **James Swan** and Haida artist **Johnny Kit Elswa** for 1876 Centennial Exposition, Philadelphia.” Nonetheless, with the help of several experts (**Steve**

his best guess as to which number went to which pole and assigned the # E18925 to a Bella Coola/Nuxalk pole with bear/owl/beaver figures. However, the description in the accession records actually matched another pole, #E205851. So, following the suggestion by **Sally McLendon**, then our prime expert on the Northwest Coast objects, the pole was given a new collection number in 2006. It consisted of five separate sections



representing figures of an eagle at the top, a bear, an owl, a beaver, a mountain goat, and a human at the bottom. Of the original 30-foot (10 m) pole, only one section, featuring the bear, owl, and beaver, was displayed in the IMAX lobby. The eagle, mountain goat and human were stored as separate pieces in our collections facility in Suitland, MD. The note in the accession file from the original collector/donor **Iver Fougner** indicated that the pole came from “the lower Indian Village, Bella Coola, B.C.” The IMAX exhibit panel identified the pole as made “by Tlingit, Bella Bella, or Bella Coola (though Bella Coola is most probably correct)” and listed the crests as “bear, seated owl, and beaver”.

It was obvious that we did not have enough information to solve the riddle. We were very fortunate to add the perspectives of indigenous experts on the meaning and origin of the poles. In May 2013, during the Recovering Voices program community research visit, **Clyde Tallio** (Nuxalk) of the delegation from Bella Bella, Bella Coola and Rivers Inlet communities of British Columbia made the following comment on the latter pole. “The very top figure always represents the form in which your ancestor came from the upper world and it depicts your male lineage. The next figure underneath usually represents the mother, grandmother, or wife because she is uplifting her husband with all that she’s brought to him. At first when we got here, I thought we were looking at a Heiltsuk piece because Nuxalk are fully painted, they’re not supposed to leave any spot unpainted.” He, nonetheless, confirmed that the pole had been almost certainly made by Nuxalk (Bella Coola) carvers. **Eric Hollinger** reached out to Clyde Tallio once again in 2018. Clyde reviewed a new image of the complete pole and provided detailed terminology and comments on its various sections. Hollinger also secured a confirmation from his Tlingit partners that the former pole collected by Swan was most probably made in the southern Tlingit tradition, not by Haida carvers.



*The totem poles in their new locations in the Sant Ocean Hall, together with a case displaying Native American and Hawaiian ocean-related items.*

*Photo by Igor Krupnik*

In February 2018, I prepared drafts of the new panels to accompany the poles based on published and collection data and comments from our team members and indigenous partners. We promptly decided to give the poles a new name, “crest” or “heraldic columns”, following the essay by anthropologist **Robin K. Wright**, since it has been long known that the word “totem” was a misnomer for the columns. Several separate sections of the column E205851 were photographed by the Repatriation Office and a

composite image placing them in their original order was created to add to the exhibit panel and reveal what portions are not displayed in the Ocean Hall. I also believed that our visitors have to know how widely the tradition of installing heraldic (or crest) columns was spread across the Northwest Coast, which Indigenous nations had/have this tradition, and which do not. For that, I produced a map with the names of indigenous Northwest Coast nations and the location of our two columns. We worked for two months on researching specific details and then with **Jill Johnson**, NMNH exhibits developer, **Angela Roberts**, exhibits writer and **Kim Moeller**,

exhibits designer, on finessing the captions and the map.

In April 2018, the new labels were unveiled next to the columns in the Ocean Hall. They read as follows:

(Next to #E54297):

*CONNECTING THE ANCESTORS WITH FUTURE GENERATIONS. Carved cedar columns not only represent ancestors; they embody present and future generations in an unbroken continuity.*

Many indigenous Northwest Coast nations mark their identity and heritage by displaying symbols (or crests) of their ancestral lineages and important spirit figures. In the late 1800s missionaries and government agents discouraged the practice. Many poles fell to the ground

or ended up in museums. Today, poles like these are again standing across the Northwest Coast as symbols of vibrant Native American cultures.

(Map—Tribal areas of Native Northwest Coast nations with crest column tradition)

Crest Column (totem pole). *Southern Tlingit, Tuxekan Island, Alaska. Acquired 1882. James Gilchrist Swan, a U.S. government agent, collected this column in 1875 to be displayed at the U.S. Centennial Exposition of 1876 in Philadelphia*

(Next to #E205851):

#### CARVING THE FAMILY'S HERITAGE IN WOOD

*"Asqayalh," meaning "standing out front," is the Nuxalk word for these carved cedar columns, which represent the family's lineage. Poles carved with the family crests stood in front of large communal houses occupied by an extended family. Here, the eagle represents the family's ancestors when they first came to Earth. The bear, owl, beaver, and mountain goat represent the crests of the mother, father, and grandparents. The human at the bottom depicts the living, high-ranking chief, upholding his lineage.*

(Image of the full column indicating its various sections with their Nuxalk names and identifying the section on display in the Hall)

*Crest Column (totem pole). "Nuxalk (Bella Coola), Q'umk'uts, British Columbia Iver Fougner, a Norwegian-born schoolteacher and Indian agent in the Bella Coola Valley, donated this column to the Smithsonian in 1900."*

As the visitors tour the Ocean Hall and will soon pass by two carved columns on the way to a new museum cafeteria they have an opportunity to read these labels and to learn about the living traditions of Indigenous nations that created them. To us, it was also an important learning experience, namely, that we have to periodically revisit the way we introduce objects of other cultures in our exhibits and museum catalogs.

We hope our Indigenous partners, colleagues, and museum visitors appreciate the amount of attention and goodwill we put into this process. I am grateful to **Felicia Pickering, Eric Hollinger, Gwyneira Isaac, Clyde Tallio, Torben Rick, Michael Lawrence, Jill Johnson, Angela Roberts, Kim Moeller,** and other colleagues and consultants, who helped give a new meaning to what was originally viewed as a technical move of two objects across the museum.

## OUTREACH

### VIKINGS, BASQUES, AND WHALERS: ACTIVITIES AT MYSTIC SEAPORT MUSEUM

By William Fitzhugh

Over the past several years, the Mystic Seaport Museum has launched several excellent exhibitions featuring northern topics, in keeping with Mystic's historical role as an Arctic whaling center holding important collections and archives of the North. Their exhibition *Captain George Comer and the Inuit of Hudson Bay*, opening first at Mystic, came to the Canadian Embassy gallery in Washington DC in May 2018 (ASC Newsletter 25).



Banner for the Mystic Museum's Swedish Viking exhibition.  
Photo by William Fitzhugh

Also in 2018, Mystic opened *Science, Myth, and Mystery: the Vinland Map Saga* which for the first time put Yale's storied Vinland Map on display outside the confines of Yale's Beinecke Library. Mystic's excellent exhibition explored how Yale's promotion of the map's authenticity through a major Yale Press publication, generated a controversy that has subsided only recently with Yale's acceptance of the findings of six decades of research on its 14<sup>th</sup> century parchment, literary analysis, and its 20<sup>th</sup> century ink.

This year, Mystic also opened *The Vikings Begin: Treasures from the Uppsala Museum, Sweden*. This exhibition of spectacular Swedish artifacts explored the origins of Swedish Viking art, culture, and society, emphasizing the role of women in Norse society and how religion and spirituality, trade, ship-building, and warfare created the foundations for the Viking Age. The exhibition program included a series of Viking-related lectures, one of which, on Vikings in the New World, was given by me. The presence at the museum's wharf of the visiting replica Viking ship *Draken Harald Hårfagre* provided tourists with a live experience of Viking era technology and sea-faring.



*Replica Viking ship Draken at Mystic Seaport.  
Photo by William Fitzhugh*

Mystic's current exhibition, *Death in the Ice: the Mysteries of the Franklin Exhibition*, originally created by the Canadian Museum of Nature in Ottawa, documents the discoveries of John Franklin's ships Erebus and Terror, recently found in the western Canadian Arctic. Located with the aid of Inuit knowledge, these finds and their future archaeological exploration will provide the missing chapter to the saga of this ill-starred venture in British Arctic exploration.

Mystic's resources include an important archive of whaling era records, including those of **George Comer** and others whalers, dating to the 19<sup>th</sup> and early 20<sup>th</sup> centuries. The combination of these little-researched written and photographic records and an active curatorial interest and exhibition facilities places the Seaport Museum in an excellent position to promote scholarship and enhance public awareness of the North, historically and in modern times, when climate change is transforming the Arctic, its peoples, culture, and environment. Perhaps Mystic might be interested in exploring another little-known chapter of northern history: the 16–17<sup>th</sup> century Basques and their whaling and Inuit connections.

## NARWHALS AND UNICORNS MEET AT THE MET CLOISTERS

*By William Fitzhugh*

**Pamela Peeters** and **Martin Nweeia** arranged with Dr. Barbara Boehm, curator at The Met Cloisters, part of the Metropolitan Museum of Art, to bring a narwhal event to the Met's lovely medieval "abbey" at the northern tip of Manhattan. The program, "In Pursuit of the Narwhal and the Unicorn," was a series of lectures that took place on Saturday afternoon, 10 November, 2018 when the Cloisters was full of people enjoying, besides many other wonders, the MET's famous Unicorn Tapestries. Nancy Shorey and

I drove up from Washington DC and met Martin and Pamela at **Ted and Sandra Timreck's** home in the old Manhattan Project Building in Lower Manhattan. Ted and Sandra's place has been a rendezvous spot for many ASC film-related projects over the years.

The Met's announcement ran: "Across the millennia and around the globe, elusive one-horned creatures have been celebrated, chronicled, analyzed and depicted. Join us for talks that plumb the history of science to enlighten us about the Unicorn, the Narwhal, and our evolving understanding of our changing environment. Speakers include **William Fitzhugh**, Director and Curator of the Arctic Studies Center of the Smithsonian; **Martin Nweeia**, Harvard/Smithsonian scientist and one of the world's foremost experts on narwhal tusks; **Barbara Drake Boehm**, **Paul and Jill Ruddock**, Senior Curator for The Met Cloisters; and **Pamela Peeters**, Vrije Universiteit Brussels Fellow, and noted environmental economist. The event opens the fifth edition of *Sustainability Week NYC*".

A large crowd gathered for the lectures in one of the Cloister's chapels with the projection screen beneath a suspended medieval crucifix and the lecture podium in the normal place of the pulpit. It was without question the most august place I have ever spoken in. Pamela—Belgian by birth and a promoter of all things Belgian, including its famous chocolates, samples of which she passed out to the audience—had arranged for the Belgian ambassador to the US and members of his staff to attend. Narwhals shared the event with the inauguration of Pamela's fifth annual Earth Sustainability Week program. The two topics merged seamlessly.

**Barbara Boehm** (who gave us a special tour of the Met's magnificent Unicorn tapestries before the program) spoke about the history and the evolution of the unicorn



*Martin Nweeia, Pamela Peeters, Nancy Shorey, and Bill Fitzhugh dine at "The Rockefeller"*



idea in Europe. Martin Nweeia talked about his lab and field studies and the surprising developments leading to recognition, assisted by Inuit, that the narwhal tusk is much more than a tusk—in fact, it is a sensory organ that has evolved to sustain the animal’s life in icy Arctic seas. I gave the audience a virtual tour of the Smithsonian’s narwhal exhibition at the National Museum of Natural History at the Smithsonian Institution. Pamela provided an impassioned talk about sustainability and the need for new thinking about humans and their relationship to nature and the world around us.

We used the occasion to promote Sustainability Week NYC and distribution of our book, *Narwhal: Revealing an Arctic Legend*, edited by Fitzhugh and Nweeia, with contributions by Dr. Boehm and Pamela Peeters. We had just learned that it won the 2018 **William Mills Prize for Arctic non-fiction Polar Books**. Following the program we enjoyed a fine dinner at the Cloisters’ restaurant housed in the summer “cottage” built by **John D. Rockefeller**, the Met philanthropist and visionary who brought Cloisters to New York. The day was a marvelous one thanks to careful planning by Pamela, Barbara Boehm, and the Met’s creative staff.

## BOREAL FOREST EXHIBIT UPDATE

*By Stephen Loring*

There is new life in the Arctic Studies Center’s long held desire to help facilitate an exhibition on the Boreal Forest. Trying to raise public awareness and appreciation of the ecological and cultural significance of the Boreal Forest has long been perceived as an obvious initiative to address the core mandate of the Smithsonian’s National Museum of Natural History: to promote understanding of the natural world and our place in it. The genesis of the exhibition dates back

twelve years or so to the inspiration of Rob Mullen, a wildlife painter and director of the Wilderness River Expedition Art Foundation (WREAF), who recognized the precedent-setting transformative significance of the 1987 **Robert Bateman** retrospective Portraits of Nature at the Smithsonian’s Natural History Museum. This was the first time a major natural history museum had hosted a fine arts exhibition. Rob’s vision of the powerful messaging capacity of art to engage viewers in the majesty and mystery of the northern wilderness was shared by **William Fitzhugh** and **Stephen Loring**. The take-down of the Natural History Museum’s last exhibits of indigenous cultures in North American and the closing of the bird hall had created conspicuous absences which the evolving vision of a boreal forest exhibition addressed. Increasing awareness of the significance of the boreal forest—“the forest nobody knows”—for global climate modelling, recognition of its critical importance to wildlife (migrating song-birds, waterfowl, and iconic northern animals including caribou, moose and wolves), as a homeland for indigenous Algonkian and Dene peoples, and as the loci of global political and economic interests made for a compelling cause. Sadly, institutional support for the boreal forest initiative waxed and waned over the years despite the generous support of T.D. Bank and the Canadian Boreal Initiative in planning grants and programing.

Despite set-backs, seeds planted and long dormant may yet bear fruit (or pine cones as the case may be). In 2017, Loring and Fitzhugh were approached by **Carol Bossert**, Project Director at S.I.T.E.S. (Smithsonian Institution Traveling Exhibition Services), asking about our interest in reviving the Boreal Forest exhibition project as a traveling exhibition. Needless to say, we (and Rob) were thrilled, and a planning meeting was held last February that included several of our old core team. These included **Jeff Wells** (Senior Scientist with



*Abbe Museum canoe and snowshoes.  
Photo by Stephen Loring*



*"Boreal Dawn",  
a painting by Rob Mullen*

the Boreal Song Bird Initiative) and **Steven Young** (Director of the Center for Northern Studies), and **Pete Marra** (Director of the Migratory Bird Center at the National Zoological Park) to bring the SITES team up to date. The team discussed intellectual content, potential venues, and the practical concerns of funding, development, and programming. During the fall Carol reached out to the Canadian Museum of Nature as to their interest in partnering with us in developing and traveling the exhibition. Their Director of Content, **Stacy Wakeford**, was enthusiastic about the collaboration, so we are delighted to have

a Canadian partner going forward. While not the grand extravaganza we once envisioned—walls festooned with paintings by Bateman, the WREAF artists and photographers, the Canadian Group of Seven (Norval Morrisseau and others), snowshoes and birch-bark canoes (those iconic artifacts of the forest!)—we are still excited and pleased to be developing an exhibition with a supporting catalog and educational materials that can be hosted in many venues (including small regional museums, community centers and college campuses) to further awareness and understanding of this critical global ecosystem.



*Map of the three main avian flyways from summering locations in the boreal forest to wintering locations sometimes as far south as Patagonia. Courtesy of Boreal Song-Bird Initiative (<https://www.borealbirds.org>)*

## RESEARCH ASSOCIATES, FELLOWS AND INTERNS

### TIME OF MY LIFE

*By Cooper Abney*



Since I arrived at the Smithsonian, my goal has been to gain necessary training and knowledge for a career in museum science. However, the experience went beyond my expectations regarding what I would see and learn. In addition to seeing parts of the museum, I gained further insight into what a career in this field would entail.

My principal work was in the Arctic Studies Center in the Anthropology Department, under Dr. **William Fitzhugh**. My duties there consisted of setting up a classification system and entering data for experimental lithic tools and field photos from Dr. Fitzhugh's expeditions to Mongolia. Towards the end of my internship, I also made database entries for archaeological sites from field reports as well. Once a week, I'd also work in the Paleobiology Department and work on a database and classification system for brachiopod fossils. While my career goals were primarily centered on paleontology, working in both departments, as well as networking with many different people across the Smithsonian has given me a unique perspective in how my experience can be applied to multiple fields. My experience this summer has been invaluable in giving me hands-on experience in museum operations and collections management. The internship has been a great foundation for grad school and beyond.

### LAUNCHING A CAREER

*By Mitsuyoshi Yabe*

In spite of my strong background in creative arts during my academics for a decade, my Master's thesis on the digital restoration of an old Canadian fortress began my pursuit of a career in Anthropology. When I decided to focus on anthropology, I applied for an internship at the Smithsonian's Arctic Studies Center. An opportunity opened up when Dr. **William Fitzhugh** supported my thesis proposal and he and **Laura Fleming** encouraged me. I worked as an

illustrator under Bill's supervision in January and again in July of 2014 for nearly two months. With Bill providing information to correct my sketches, I designed three digital drawings reconstructing three stages in the occupation of a Basque and Inuit site on the Quebec Lower North Shore, sketching in graphite and coloring in Photoshop. One of the drawings shows Basque whalers sitting near the fire in the late 16<sup>th</sup> and early 17<sup>th</sup> century. I depicted the historical events at this site between the late 16<sup>th</sup> to early 18<sup>th</sup> centuries.

After leaving the internship, I researched the rebuilding of Fort Frontenac using 3D modeling and interactive computer graphic design to create public interest in historical visualization. Three journals published my papers based on the thesis. Also, when I joined the Ontario Archaeological Society for a poster presentation in Midland in 2015, I was awarded Student Poster Award and a Free One-Year Membership. I was invited to make a formal oral presentation by the Council for Northeast Historical Archaeology at the 50<sup>th</sup> Anniversary in Ottawa in 2016.

In the meantime, I worked as a digital designer intern in the Exhibition Department of the American Museum of Natural History in New York from 2015 to 2016. While there, I worked on the British Columbia anthropological project and gained a knowledge of Native Canadians' totem poles, houses, kayaks, artifacts, and tools by managing digital files.

My experiences have now led me to move to Canada where I am pursuing a master's degree in Anthropology at Carleton University. Dr. Fitzhugh and the Arctic Studies Center spurred me on to a career as a digital designer and illustrator in the field of anthropology. My internship helped me launch my future career, so I am hugely grateful to Bill and Laura for taking such great care of me. The internship was one of the most memorable experiences in my life.



*Recreation of 16<sup>th</sup> century Basque whalers at Petit Mecatina site on the Quebec Lower North Shore, by Mitsuyoshi Yabe*



## ARCHAEOLOGY-FORENSICS AND PACIFIC NORTHWEST COAST ART

By Cara Reeves

Working at the Smithsonian National Museum of Natural History, first as an intern and then as an independent contractor with the Arctic Studies Center, I spent almost a full year researching fascinating subjects for the Anthropology and Education & Outreach Departments. I developed collections-based educational resources, participated in outreach, and worked in the Arctic Studies Center assisting with an archaeological field report and a book publication by **William**



**Fitzhugh**. From the staff to the vast resources, the Smithsonian Institution strengthened my skills and knowledge, and I found it a welcoming and rewarding experience both personally and professionally. It was hard to leave, but I had a passion for collections management that had to be explored elsewhere.

After a long search for collections positions, suddenly they were available all over the country. I applied to several positions, but I kept returning to a position in Gillette, Wyoming as the Collections Assistant at the Campbell County Rockpile Museum. I took a chance and applied for the position, keeping my fingers crossed that I would be chosen from the long list of applicants. It was on my way home from the Smithsonian at the end of a 2-hour train ride that I received the news—I got the job!

Within two weeks I had the trip planned and I was on my way to Wyoming, the Wild West! At least that was what I was imagining. I had no idea what to expect of the people, the town, or Wyoming. I was pleased to find that Gillette is a very welcoming town. Over the last year and a half I have had the opportunity to interact with donors and volunteers who have spent their entire lives in Gillette. Through cataloguing collections, installing exhibits, and interacting with donors, I have learned a great deal about this community. Every day working at the Rockpile Museum is a new experience, and I am excited to continue exploring Wyoming, its people, and their place in history.

## THOUGHTS ON A YEAR WITH THE ASC

By Mary S. Maisel



Growing up the idea of working in the National Museum of Natural History was a dream. What was behind the doors hidden within exhibits that I never saw open? What exactly was up the stairs marked “Staff Only”? Being an intern and a contractor with the Arctic Studies Center was a wonderful door into the world of the Smithsonian.

Working through the production of the 2017 Gateway’s Field Report, the 2017 *ASC Newsletter*, and having a small part in the continued

efforts for the “Boat Book” I saw first hand the inner workings of a Smithsonian office. Venturing into Northeastern Canada on the *Pitsiulak* I was able to put my classroom knowledge of archaeology into practical use. Everyday was a surprise working in the ASC. The number of interesting and influential people who pass through that office door is astounding.

In December of 2018, I had to say goodbye for now to the Smithsonian and the ASC. In January of 2019, I began a working as a full-time archaeologist within the Tampa, Florida office of an Australian archaeology firm, Cardno. So far my time has been focused on excavations of Historic Fort Brooke. The work is very rewarding and I use skills gained during the time I spent in the ASC everyday. *The Pitsiulak* and the ASC have allowed me to meet people and see parts of the world that I otherwise would never have had access to and for that I am forever grateful.

## THOUGHTS ON THE ARCHAEOLOGY OF SUSTAINABLE DEVELOPMENT

By Igor Chechushkov

In summer 2018, I sat on the pier of the small fishing town of Cartwright, on the shore of the cold Labrador Sea, and while watching men unloading a crab boat I got to thinking. After almost a quarter of a century as an amateur and then a professional archaeologist,

I have started increasingly to ask myself about the usefulness of my profession for others. There, on the pier, I could not find an immediate satisfactory answer.



The notorious “knowing of the past” and “history armed with a shovel” (common wisdom among Marxist archaeologists from the former Soviet Union) clearly do not meet the criteria of scientific knowledge, because in this case the archaeologist is limited to a more or less detailed antiquarianism and does not reach the theoretical level, that is, does not produce a generalization with predictive power.

Early that year, Dr. **William Fitzhugh** offered me the opportunity to join his fieldwork in eastern Canada and—thanks to financial help from the Center for Comparative Archaeology of the University of Pittsburgh ([comparch.pitt.edu](http://comparch.pitt.edu))—I was able to join my third archaeological field trip outside Russia. My part of the project began in Rigolet, where I enjoyed surveying the shores of the Lake Melville and ended with the excavation and reporting on a 17<sup>th</sup> century Inuit house at Hart Chalet near Blanc Sablon.

After the several days at sea, wandering and waiting for the weather, our boat, Pitsulak, arrived at Cartwright in Sandwich Bay to buy fuel and water. Bill, Perry, and other crew members left for shopping, but I decided to stay and to observe port life. I looked at men of medium height and middle age, unloading a schooner, people who live on the outskirts of the world, where the majority of foodstuffs and resources are bought in exchange for crabs and northern salmon that go into the restaurants of Boston and New York City. When, for one reason or another, the high demand for seafood ends, Cartwright fishermen will have no choice but to move to the agricultural areas of the country or adapt to survive independently, as European colonizers or their Eskimo and Indian neighbors did. As an archaeologist, I know well that this has often happened in human history, and I have no doubt it will happen in the future.

However, what leads to the collapse of small communities such as those I have seen in Labrador’s Cartwright, Bolivia’s Oruro, or Russia’s Varshavka?—all places I visited at least once as an archaeologist. How do they learn to survive while experiencing major environmental or societal shifts:

the formation and collapse of empires, catastrophic natural disasters, or gradual but steady climate change? Obviously, such questions are asked by anthropological archaeologists all over the world, but rarely do these questions lead to answers needed by the people who live here and now and those who will live on our planet in the future.

Meanwhile, archaeology provides an arsenal of tools to formate scientific theories with predictive power, based on extremely long trends. One example of that is Fitzhugh’s brilliant 1972 monograph *Environmental Archeology and Cultural Systems in Hamilton Inlet, Labrador: A Survey of the Central Labrador Coast from 3,000 B.C. to the Present* that describes a complex set of environmental and cultural changes in Labrador from 3,000 BCE to the present. Learning about past ways of sustainable living and facing the threats of climate change could and should contribute toward formulating a rational program of survival for small, dependent communities like those I can see around the world, while broadening my archaeological horizons and learning from the colleagues.

Back in my undergraduate years, the outstanding Russian historian, **Arkady Tsfasman**, said to me that an archaeologist was a man who walks ahead backward. Sitting on that pier at Cartwright, I decided that for me it is the time to turn around and apply our understandings of the past to the future. As an archaeologist, I hope to contribute knowledge that will help the sustainability of human communities, meaning a communal ability to survive, reproduce and provide reasonably healthy, harmless, happy lives to its members.

Wandering through the northern seas, observing deserted islands, visiting still inhabited and already abandoned villages—thanks to Dr. Fitzhugh—I decided that archeology, looking exclusively to the past, is archeology without a future. My own generation of archaeologists should seriously think about how to turn our science to “the science” in the full sense of the word, so that we would be more engaged in a business useful to humanity.

## INTERNING AT ARCTIC STUDIES

*By Seth Clark*

I will never forget the first day I met Dr. **William Fitzhugh**. It was an incredibly humid day in Washington D.C. when I wiped the sweat off of my brow and gathered up the courage to knock on Bill’s front door. I was fresh out of a taxi from the airport, and I would be staying with Bill while I interned with him for the summer. I was rather nervous, but as I grew

to know Bill as a supervisor and as a host I saw there was no need. I was new to world of archaeology, but Bill took great care as a supervisor to ensure I was comfortable with my new work. He was always open to answering any question I may have had about the type of projectile point I held in my hand, or where to find information about specific archaeological sites in his numerous field reports.

Bill's dedication to the study of archaeology is incredible and goes beyond his hours spent at the museum. What I learned most from working with Bill is that the importance of interacting with the public. Bill's passion for discovery is equaled by his desire to spread his knowledge with anybody interested. In my eyes the greatest contribution to the world any curator can make is to share their time and research with the public, and to this cause Bill remained diligent. Whether it be children, visiting friends, other staff members, or a lost intern that pops their head through the door, Bill was always happy to engage with any stranger. The ultimate mission of any museum is to educate, and for this purpose Bill is an inspiration to us all.

### A SURPRISING ROUTINE: LIFE ABOARD PITSIULAK

By Jacob Marchman

For each of the summers of 2015, 2017, and 2018, I made the crazy decision to help Bill with his fieldwork in Labrador. While every rational person was pulling on their swim trunks and to go lounge on a sunny beach, I was pulling on my rubber boots to go get eaten by black flies.

I am being glib, of course. Going to Labrador with Bill is a much better deal than going on a tropical vacation. For one, the seafood is cheaper than it is at a beachside resort. No matter how much you pay for your Barbados vacation, no one is going to pull alongside you in their motorboat and hand you fresh-caught Arctic char. Likewise, no matter how swanky your resort is, you're will never be able to pick enough mussels to fill a 4-gallon pot and then sit around eating them like a piscivorous slug.

I have noticed that my trips with Bill follow a template. They begin with the drive from his home in Vermont to Newfoundland, where the *Pitsiulak* is stored. I always enjoy watching from the car window as the deciduous woodland transitions to boreal forest and then to the windswept tundra hills of Newfoundland. In Newfoundland, we catch up with **Perry Colbourne's** family and prepare the boat for the summer. From

here, we take the *Pitsiulak* north to Quirpon, stay with **Boyce Roberts** while waiting for the wind to change, cross the Strait of Belle Isle and head north to Rigolet, survey, meet with the Inuit elders, excavate, head south to Quebec to escape the August gales, are fed mountains of dessert by Florence Hart, shoot the breeze with Garland, excavate Inuit sites, get eaten by black flies, head to home port in Lushes Bight, and make the bittersweet trip back to the States.

You live on a boat when you travel with Bill, and there will always be maritime adventures, wacky hijinks, and physical comedy. Once, Patrick Jolicoeur fell, clothes and all, into Rigolet Harbor and then shuffled back into the cabin, abashed and dripping wet. In Perry's parlance, this is called "pulling a Patrick."

Sometimes, these events were more nerve-wracking than an unexpected dip. There was the case of the exploding muffler when, for a little while, no one knew where exactly in our wooden boat the billows of black smoke were coming from.

This year, our maritime mishap took place in the Backway, a long narrow inlet south of Rigolet in Hamilton Inlet. We were anchored in the lee of a stubby headland, after an unproductive day of surveying. When the wind changed to the west-northwest, with a falling tide, we swung on the anchor onto a rocky shoal. We spent an agonizing ten minutes hauling on the anchor chain and gunning the engine, as the tide dropped, heeling us farther and farther onto our beam ends. By luck and Perry's deft handling, we were able to work ourselves off the rocks and once more escape unscathed.

As I said, these trips with Bill follow a pattern, but the details always change. Every time you climb aboard the *Pits*, you know you are bound for an adventure, but you don't know what it will be. Every time you put your trowel in the ground, you don't know if you'll find a copper coin or a grub. It's this tension between the repetitious and the unexpected that makes each year a gem.





## AN ORANGUTAN RESEARCHER IN LABRADOR

By Katherine Meier

I've been lucky enough to travel to many far-flung, exotic, and beautiful corners of the world. I've followed orangutans through the rainforests of Borneo, I've sailed up the Atlantic coast on the last wooden whaling ship left on earth, and I've watched the sun rise from atop the tallest peak of Madagascar's central mountains. Yet I consider the summer spent in Labrador and Quebec with **Bill Fitzhugh** and the Arctic Studies Center team easily among my most wonderful and awe-inspiring adventures to date.

It began with a drive up the Northeast Coast, stuffed into Bill's intrepid Subaru, from New Hampshire into Canada. The drive consisted of good conversation with Bill—a wealth of information concerning the history and ecology of the Arctic that could have filled years of car rides—long periods watching the coastal scenery go by with hopes of a moose sighting, and exploratory pit stops at unassuming diners, indulging in the occasional coconut cream pie dinner. Museums and landmarks marked our passage: Historic Fort Louisburg provided many of us our first cannon-fire experience while the Triton Sperm Whale Pavillion taught us the true worth (and source) of ambergris. In Newfoundland, we met our skipper Perry, and, after a few days of preparations and amazing dinners from the lovely Louise, we traded our wheels for the well-oiled motor of the *Pitsiulak* and raced off along the coast towards Labrador!

The next two months were filled with camaraderie, exploration, and generally fantastic times as we traveled from Newfoundland to Rigolet, Labrador, and back down to Lower North Shore Quebec. We would anchor in small inlets where the rocky, coastal islands and snow-capped mainland mountains were the only breaks in the endless North Atlantic sky. We would survey those remote islands, hiking across boreal tundra, trudging caribou-like through the dense, lichen-covered scrub, and stopping briefly



when some early-blooming wild berries graced our path. Bill was always single-minded in his activities, teaching us how to recognize the subtle signs of a peat-covered tent ring or judge the environmental suitability of a suspected campsite. surveying gave way to excavation as we moved to Quebec and the Hart Chalet site. Excavating ancient seal bones and iron nails became odiously mundane in comparison with the whalebone artifacts, toggling harpoon heads, and translucent Ramah chert stone tools we began to find.

It would take pages to enumerate all the unique skills and experiences that I picked up over my summer. Having had little prior training in archaeological methods, I learned so much about how to survey for and excavate historic cultural sites. In doing so, I also osmosed the rich history of the people and places, not only through hearing Bill recount these histories but also through the numerous opportunities we had to speak with and learn from local people along the way. In true anthropological spirit, Bill's easy conversation with everyone we met—long-time friend or complete stranger—always drew out exciting and illuminating stories about our cultural surroundings. Over the summer I also acquired some non-anthropological skills. I learned how to harvest mussels with my toes; how to tie a Double Boleyn knot (thank you, Perry); how to jig for codfish and cast for mackerel; how to maneuver huge rolls of sod; how to identify whales by the characteristics of their spout; how to avoid being carried away by blackflies; and the true meaning of a "Tickle"—the list could go on infinitely!

I could not have spent my summer in a more beautiful place with more wonderful people. Even as I prepare to head out to Africa to begin my Ph.D. fieldwork on chimpanzee ecology, I am acutely aware that all future adventures will be hard-pressed to live up to the wonders of Newfoundland, Labrador, and Quebec, and the fantastic times we had as a team aboard the *Pitsiulak*.

## FROM PUFFINS TO SOAPSTONE POTS: A SUMMER UP NORTH WITH BILL FITZHUGH

By Halcyon Brown

I first met Bill outside the newly opened Narwhal exhibit at the Smithsonian when I was in D.C. researching information on Viking runestones. From the moment Bill began walking my mentor, Loraine Jensen, and me through the exhibit, his wealth of knowledge, experiences, and expertise in the field of arctic studies more than piqued my curiosity. I knew that I had to find some way to further explore arctic studies with Bill. A few months later, I found

myself aboard the *Pitsiulak*, with no experience in archaeology and no idea what to expect. Little did I know, last summer would be a dream come true, well maybe minus the hordes of black flies.

The day would start when Bill ventured down into the bow that housed the kitchen, beds, and dining table. I would wake up to the sound of the stove gas igniting and the rolling boil of the coffee pot. From there, we'd make our way out of our bunks, excited to learn about our plan for the day. Whether we were off surveying or digging, Bill never ceased to amaze me with



his knowledge of the area and the history of the people who have lived on the coast of Labrador and Quebec. He saw stories in the landscape, pointing out tent rings or historic beach terraces. When we were digging at the Hart Chalet site, Bill painted a picture in my head of how the site looked back when it was in use: the whale bone floor, the soapstone pots, harpoons, Basque tiles, a bone refuse pile that was evidence of meals eaten long ago.

We weren't the only ones that loved to hear Bill talk about the past. When we had the chance to visit museums and historic sites, we always had a bit of a crowd following us, made up of other visitors who were captivated by Bill's knowledge, forming an informal tour with Bill as our expert tour guide. I learned so much from his explanations of artifacts and landmarks and also from his relationships with local people from the towns we visited. The years that Bill has been conducting research up north are evident in his friendships with fishermen, local families, archaeologists, and elders. It was an invaluable experience to join Bill and the Rigolet elders for a day of site seeing on Lake Melville. Hearing about their history in the Rigolet and Nunatsiavut region and how the landscape and climate are changing provided a present-day reference for the artifacts, tent rings, and sod houses that we were uncovering with our trowels.

I will not forget the time our wonderful group spent sitting on the deck of the *Pitsiulak*, watching puffins, icebergs, and whales go by, nor will I forget the fresh fish dinners we ate, elbow to elbow around the cozy dining table, hearing stories of past voyages on the *Pitsiulak*.

## MY ASC INTERNSHIP

By Gina Reitenauer



When I applied to spend the final semester of my undergraduate career in Washington, D.C., I had an image in mind: me, on the way to my internship placement, walking by my new friend Henry (the elephant in the lobby of the Smithsonian National Museum of Natural History). But at the time, scoring an internship in the world-renown institution seemed like only a dream. So, when I heard back from Bill Fitzhugh and Nancy

Shorey regarding my inquiry about interning in the Arctic Studies Center (ASC), you can imagine I was excited! Not only would this internship allow me to bring out my passion for history, but it would provide the privilege of working in a building dedicated to the rich places, peoples, and cultures of the world.

And I can certainly say it did! It was always pleasant to be among people who have so much passion for the world around them, and in my case the peoples, residents, and cultures of the North. Having gone on quite a few kayaking adventures with my Dad growing up, I was immediately intrigued by the first task assigned to me: aiding my supervisor in the final stages of the production of his manuscript detailing the history and uses of bark canoes and skin boats among the various cultures and countries of Northern Eurasia.

I spent many weeks working on various stages of the manuscript's production during my time at the Arctic Studies Center, however I also had the opportunity to create a short agency page about the ASC for the Interagency Arctic Research Policy Committee's website, as well as work on the layout and design of the ASC's latest field report. My duties in the Arctic Studies Center may have been completed mostly at my desk in front of bookshelves and a poster on Baleen Whales, but through reading about, and working with materials related to, the various cultures and countries of the Northern world, this internship definitely broadened my horizons beyond the walls of the Smithsonian National Museum of Natural History.

## BOOK REVIEWS

**BETWEEN SEA AND GLACIER: GREENLAND IN CHANGING WORLD, by Wilfred E. Richard**

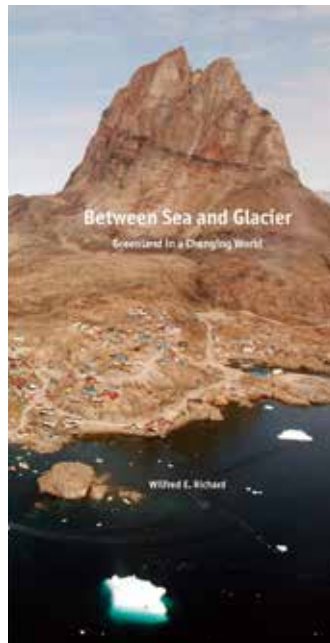
**IPI Press and the Smithsonian Arctic Studies Center and is distributed by Oxbow Press, 2018**

*Reviewed by William Fitzhugh*

**Will Richard** has spent his life exploring northern lands, and in his travels he discovered Uummannaq, a town in Greenland and a people that he and his wife, **Lindsay**, adopted and visited many times. What began in a chance meeting with transplanted Greenland elders at the LL Bean store in Freeport, Maine, initiated a chain of linkages and yearly visits that led to Will and his wife being adopted by the community of Uummannaq, north of Disko Bay.

Richard brings his perspective as anthropologist, geographer, and photographer to bear on cultural and economic shifts that are bringing a new way of life to Greenland with particular attention to the growing effect of climate change on landscapes, animals, and people. Among the stories told are the meteorological expedition led by **Alfred Wegener** (founder of plate tectonic theory), the discovery of Inugssuk Norse-related Inuit culture discovered by Danish archaeologist, **Therkel Mathiasen**, and his young American student, **Frederica de Laguna**, artist **Rockwell Kent** who painted in Uummannaq Fjord and elsewhere in Greenland, and the linguistic and cultural research of **Knud Rasmussen**.

Read about Børnehjemmet, the children's home in Uummannaq where traditional values are taught to children confused by modernization, about Richard's promoting an extension of the International Appalachian Trail into Greenland, and about generations of scientific and cultural exchanges connecting Greenland and New England leading to recent Uummannaq children's recital at the Smithsonian Institution.



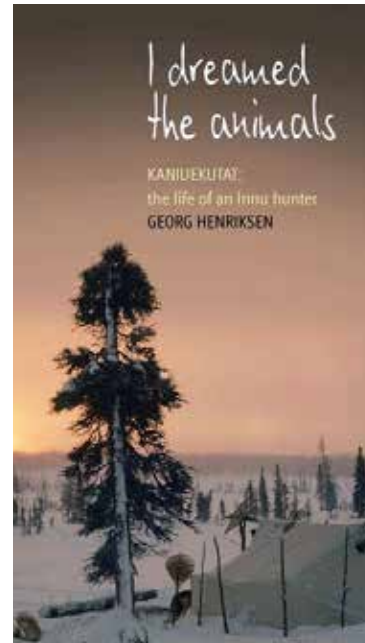
*Between Sea and Glacier* is illustrated by Richard's photographs illustrating the geography, climate, culture, arts, and people of Greenland. In addition to being an eloquent statement on a resilient northern people who can teach the wider world much about "treading softly on the earth", Richard's book initiates a celebration being launched by the Smithsonian and others to commemorate the centennial of *The Fifth Thule Expedition: Greenland to Siberia (1921–24)* led by Greenland's culture hero, Knud Rasmussen.

**I DREAMED THE ANIMALS. KANIUEKUTAT: THE LIFE OF AN INNU HUNTER, by Georg Henriksen**

**Berghahn Books, New York, NY, 2008**

*Reviewed by William Fitzhugh*

This book was published almost ten years ago, but I never got around to reading it until recently. I knew **Georg Henriksen** when he was doing fieldwork with the Innu in Labrador in the late 1960s and early 70s. His ethnography helped me immensely in interpreting the nascent archaeological record we were creating for Labrador and northern Quebec—that, and my several visits with **Maggie** and **Jim Saunders** at their home at the old Hudson Bay Post in Old Davis Inlet (Uipat Utshimsait) before they moved to New Davis Inlet (Utshimassit), and more recently to Natuashish



some miles inland. Henriksen's description of Innu social organization and hunting strategies, of the makushan ritual, periods of starvation, and Innu travel capabilities helped me visualize how pre-Innu peoples known only from their campfires and stone tools had lived in the past, and how these ethnographic models did not conform to what we discovered in Late Maritime Archaic cultures in coastal Labrador.

Georg died shortly after he finished his book and never lived to receive the praise for it accorded by other anthropologists working in Labrador and northern Quebec. His



acknowledgments cite the scholarly and practical assistance provided, among others, by his wife **Berit** and by **Peter Armitage**, with whom he worked for years on Innu land claims issues.

Following years of offering more or less traditional anthropological ethnography, *I Dreamed the Animals* is an annotated oral history created around the stories Georg recorded with **Kaniuikutat**, an Innu whom Georg had hunted with who became concerned that the Innu way of life and beliefs needed to be recorded before they were lost. The sequence of stories begins with traditional culture around hunting and subsistence in the bush, and proceeds through stories and myths about belief, cosmology, ritual, and death, and as the book proceeds, increasingly engages modern issues dealing with government, land claims, racism, schooling, youth rebellion, language and culture loss, and prospects for the future. Kaniuikutat was a gifted story-teller, and Henriksen does a masterful job at preparing the ground for the book's 22 chapters, reflecting on each chapter's significance, and preparing a fine introduction and conclusion. In the process we meet wonderful culture-bearers and learn intricacies of Innu life, beliefs, of their insatiable sociality, sense of community, openness to strangers, generosity in the face of starvation, and many other characteristics that seem threatened in today's world. How this shall pan out for Innu in the future remains to be seen; but Henriksen and Kaniuikutat have given us a beautiful portrait of a people with great humanity who have not been served well by 20<sup>th</sup> century western society.

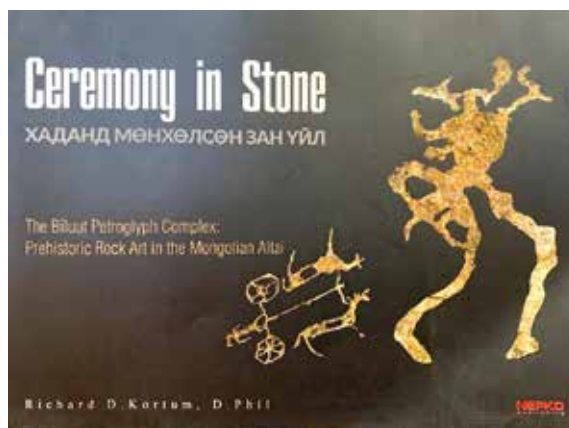
**CEREMONY IN STONE: THE BILUUT PETROGLYPH COMPLEX. PREHISTORIC ROCK ART IN THE MONGOLIAN ALTAI, by Richard D. Kortum**

**NEPKO Publishing, Ulaanbaatar, 2018**

*Reviewed by William Fitzhugh*

**Richard D. Kortum**

has produced a gorgeous introduction to the rock art of the Mongolian Altai. This book serves many functions: as a primer for those unfamiliar with petroglyphs as both art and history; as an introduction to the stunning beauty and diversity of Biluut rock art; and as a warning about the transient nature of even the most enduring products of human expression.



Kortum discovered the Biluut petroglyphs in 2004 and for the following fourteen years returned to systematically document more than 12,000 individual rock art images, most of them found on or around three hills on the northwestern shore of Khoton Nuur, a lake at the edge of the Altai mountains south of the Mongolian city of Ulgii. The location is visually spectacular, with a chain of glaciated Altai peaks rising along the south side of the lake a few kilometers north of Xinjiang on the Mongolia-China border. The region is now part of the Altai Tavan Bogd National Park, which provides a degree of protection while still serving as a homeland for Mongolian Kazakh herders who have lived here for centuries, even millennia.

With grants and support from his university, East Tennessee State, where he was a philosopher of meaning teaching in an English Department, Kortum returned year after year to crawl across the Biluut hills spying out rock art figures carved into the soft metagreywacke polished by eons of glacial ice moving through the Khoton trough. A single tap with a hammerstone or stylus produced a white mark that stood out against the grey geological easel, luring hunters and pastoralists into recording their visions, beliefs, and attitudes to the world around them from Paleolithic times to the present. Just how long ago this history began is still open to question; some images may be 15–20,000 years old, but most begin in the Mesolithic or Neolithic period and become profuse rock canvases in the Bronze, Iron, and Medieval Ages.

From 2010–2012 I joined Kortum to explore the connections between rock art and archaeology in the Biluut region. In collaboration with the National Museum of Mongolia, this NEH-sponsored project produced the first comprehensive culture history of the Khoton region. Thousands of rock art images were recorded, and archaeological surveys and excavations demonstrated 8000 years of human occupation, with earlier sites still to be found. Kortum's rock art publication is the first major outcome out of this project and his years of prior research.

Kortum's text provides an introduction to the region, its geology, and environmental and cultural history. Brief statements discuss, in plain English and translated into Mongolian by **Baigalma Baljinnyam**, their age, who made them, how they were made, their meaning, styles, and other basic information. There follow 150 pages

of images that illustrate the beauty, complexity, and mystery of Biluut's prehistoric artists. One longs for Richard's discussion of each image. But the purpose of this book is not to catalog the art; rather it is to demonstrate that the Biluut complex is one of the premier rock art locations in Central Asia that should be recognized as a worthy member of the Mongolian Altai UNESCO World Heritage rock art complex so well documented by **Esther Jacobsen-Tepfer**.

**A GRAND ADVENTURE: THE LIVES OF HELGE AND ANNE STINE INGSTAD AND THEIR DISCOVERY OF A VIKING SETTLEMENT IN NORTH AMERICA**, by **Benedicte Ingstad**.

McGill-Queen's University Press, 2017.

*Reviewed by William Fitzhugh*

Benedicte Ingstad, daughter of Anne Stine and Helge Ingstad, has written a comprehensive and insightful biography of her parents' lives and discoveries. Helge and Anne Stine both wrote books about their discovery and excavation of the L'Anse aux Meadows Norse (LAM) site from personal and professional perspectives (see list below), but this work is a marvel because it comes from inside the family and recounts stories and provides information only Benedicte could provide. In addition to describing their lives and discoveries, Benedicte, a retired University of Oslo medical anthropologist, interweaves their careers with insight into their personal lives and relationship, probes their psychological foundations, and explores their reactions to triumphs and disappointments.

The book is indeed an adventure. Helge's life careens forward through multi-year expeditions to Arctic Canada, East Greenland, the American Southwest, northern Mexico, Brooks Range Alaska, culminating with his discovery of the Norse site. A lawyer by training but a story-teller and gifted writer and lecturer at heart, his Greenland settlement venture almost secured East Greenland for Norway while his courageous medical and organizational work during and after the Nazi occupation of Norway reads like the hero in a movie script. Driven by freedom, courage, physical stamina, and an intense craving for human justice, Helge's story reveals a man driven by the need to serve and educate humanity. A

major life theme was his exploration of geographical and anthropological frontiers of culture change while living for long periods with indigenous groups.

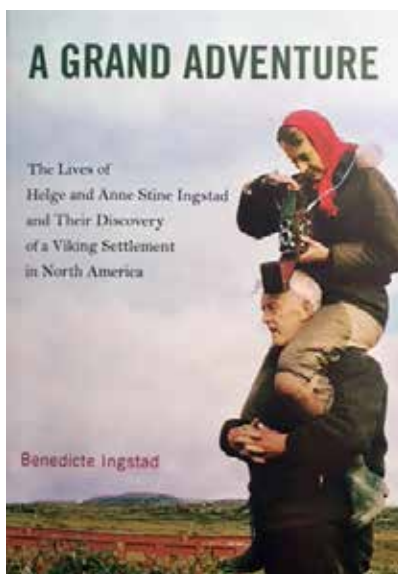
Anne Stine entered Helge's life after he had become a famous explorer and writer. After discovering his 'expeditionary gene' could not be tamed, she developed a professional career in archaeology that led her into museum work and later, textile conservation on the famous Viking Oseberg finds. Their "grand northern adventure" began after Helge's discovery of LAM in 1960 when they teamed up—he as organizer and expedition leader and she as lead archaeologist—to conduct the excavations that proved the identity of the first Norse site in North America. The trials she and Helge endured to gain recognition for their discovery, and for themselves, is told in detail. Benedicte participated in the excavations and ferreted out hidden archival and personal correspondence that reveal the roots of conflicts and tragic misunderstandings that began after the discovery, including instances of defamation, sabotage, and deceit complicated by professional and national rivalries. All is meticulously documented in foot-noted text. Benedicte has set the record straight and forever secured the true Ingstad legacy.

Grand Adventure is also a love story about Anna Stine and Helge that become a trilogy owing to Benedicte's love and admiration for her parents. Her clear-eyed portraits of her parents's psychologies and their relationship is written with candor and sensitivity and shows how their personalities intersected their private, public, and professional lives. No less honest is her description of her own relationship with her parents, which oscillates between detached—almost clinical—observation and tender empathy.

This is a book that inspires. It is a remarkable story, beautifully told, that serves as a family biography of beautiful people whose dedication, courage, and persistence against formidable odds solved one of the most important historical and archaeological questions of our time. Other Ingstad English language works:

**Ingstad, Anne Stine**

**1970** The Norse Settlement at l'Anse aux Meadows, Newfoundland. A Preliminary Report from the Excavations from 1961 to 1968. *Acta Archaeologica* 41: 109–154. Copenhagen.



1977 *The Discovery of a Norse Settlement in America. Excavations at L'Anse aux Meadows, Newfoundland 1961–1968*. Vol. 1. Trans. E. S. Seeberg. Oslo: Norwegian University Press.

2000 *The New Land with the Green Meadows*. Trans. J.K. Stenehjem. Historic Sites Association of Newfoundland and Labrador.

#### Ingstad, Helge

1964 *Vinland Ruins Prove Vikings Found the New World*. National Geographic Magazine. Nov.

1969 *Westward to Vinland. The Discovery of Pre-Columbian House-Sites in North America*. Trans. by E.J/ Friis. London: Jonathan Cape.

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### NARWHAL RECEIVES WILLIAM MILLS BOOK PRIZE

Media Release, July 11, 2018

Rovaniemi—The Polar Libraries Colloquy is pleased to announce the winner of the 2018 William Mills Prize for Non-Fiction Polar Books is *Narwhal: Revealing an Arctic Legend* edited by **William W. Fitzhugh** and **Martin T. Nweeia** (International Polar Institute). This comprehensive, multi-disciplinary book is the companion to a special exhibition at the Smithsonian National Museum of Natural History that unites what is known and erroneous about the medium-sized toothed whales uniquely identifiable by their spiral tusks. The prize winner was announced at an awards ceremony on June 14, 2018, in Rovaniemi, Finland, at the Polar Library Colloquy's biennial conference. The Polar Libraries Colloquy is an international organization of librarians and others interested in the collection, preservation and dissemination of polar information.

The William Mills Book Prize is awarded every two years and honours the best Arctic or Antarctic non-fiction books published throughout the world. The prize was first presented in 2006. It is named in honour of **William Mills**, a polar librarian and author, and a core member of the Polar Libraries Colloquy during its formative years. Twenty-six nominations qualified for consideration this year, the most ever since the inception of the prize. A full list of all titles nominated for the 2018 William Mills Prize, including those titles that were shortlisted, is available on the Polar Libraries Colloquy website <https://polarlibraries.org/william-mills-prize-2018>

## TRANSITIONS

### DANA LEVY (1937–2017) AND PERPETUA PRESS

By Letitia O'Connor

[Ed.: **Dana Levy** and **Letitia O'Connor** founded *Perpetua Press*, which they operated until Dana's death in 2017. For two decades, the ASC worked with Dana and Tish on exhibition catalogs and other publications. They became friends and colleagues and produced award-winning publications. Their success was due to a close husband-and-wife team that brought finely-edited content and beautiful design and typography into sharp focus, and a production process that made authors part of the team, not just the suppliers of content. The following part of a tribute to both Dana and *Perpetua Press* written by Tish called *A Love Affair, with Books*, adapted from <http://www.perpetuapress.com>]



*Perpetua Press*, the studio founded by **Dana Levy** and **Tish O'Connor** produced fine illustrated books for museums, university presses, and trade publishers throughout the United States from 1984 to 2016. With the death of Dana Levy, the legacy *Perpetua Press* added to the time-honored craft of bookmaking ended. Born May 15, 1937, in Los Angeles, Dana completed his bachelor's degree at Art Center College of Design in Los Angeles in 1962. His first design coup was the American Book Award in 1980, for *Anatomy Illustrated*, published by Simon & Schuster—which were the names he chose for his pets, an African gray parrot and Siamese cat.

*Perpetua Press* produced books for various branches of the Smithsonian, and especially enjoyed meeting challenges posed by **Bill Fitzhugh**, Director of its Arctic Studies Center. We worked with museums across the U.S., from the Harvard Art Museums to the Honolulu Academy of Arts, and enjoyed a fruitful collaboration with the University of Washington Press and its long-time publisher, **Don Ellegood**, helping establish it as a major distributor of museum publications. Among the projects we most enjoyed was developing a series of large-format nature photography books for publisher **Hugh Levin**, exploring the Grand Canyon, National Parks, Alaska, Hawai'i, Yellowstone and the Grand Tetons, among other “spectacular” locations.



Our work at Perpetua Press was a continuing education that allowed us to share in the passions and research of many talented scholars and curators, artists and writers. The legacy of that collaboration endures in the books we produced. If they inspire others to seek to understand the complexity and brilliance of this world, that will be the most fitting tribute to Dana's life and work.

### REMEMBERING DONALD W. CLARK (1932–2018)

[Ed.: **Donald Clark** was a long-time friend of the Smithsonian and a pioneer of the archaeology of Kodiak Island, where he grew up, eventually joining the staff of the Archaeological Survey of Canada in Ottawa and becoming a close associate of **Freddie de Laguna**, **Bill Workman**, and **Don Dumond**. His publications on Ocean Bay and other cultures of Kodiak Island and the prehistory of the Yukon and Northwestern Canada are classics.

The following memorial appeared in the Alutiiq Museum Newsletter 2018, 22(4)]

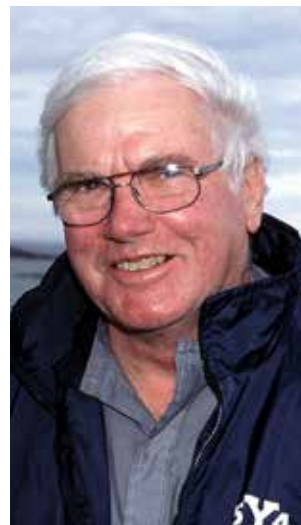
Kodiak archaeologist Dr. **Donald Woodforde Clark** passed away on March 31, 2018 in his home in Canada. Clark, who grew up in Kodiak, was locally known as the “father of Kodiak archaeology”. He was the first researcher to describe the sequence of local cultures, tracking the development of Alutiiq societies over 7,000 years. His detailed studies of everything from slate working, to fur seal hunting, petroglyphs, and the ground squirrels of Chirikof Island remain a foundation for research. He was a generous supporter of the Alutiiq Museum, sharing his time, knowledge, and research notes.

Clark always considered Kodiak his hometown. He moved to the community at age nine, accompanying his parents when they relocated to Alaska during the second World War. His father owned a gas station and auto repair shop in downtown Kodiak. Here, Clark learned to repair cars, but his real interest was the outdoors. Exploring the coast, Clark discovered Kodiak's remarkable archaeology. He went on to earn his Ph.D. from the University of Wisconsin and lead numerous research projects. Many Kodiak people remember Clark. He returned to the island often and

shared his knowledge with kindness and enthusiasm. Few archaeologists study their hometowns, as Clark did, and his personal connections to Kodiak brought his research to life for Alutiiq people hungry for tribal history. To honor his contributions, a brick with Don's name has been added to the Ancestors' Memorial. Qusuciqamken—We will miss you, Don.

### BOB BRYAN (1931–2018): TRACKING *BERT AND I* INTO SUBARCTIC QUEBEC

By Will Richard



It took some years and many projects until I met **Bob Bryan** as minister and bush pilot. Eventually it came about through a series of happenstances beginning on Swan's Island in the Gulf of Maine in the mid-1970s.

My family and my friend **Karl Keim**'s family used to travel annually to Swan's Island, where we camped in a seaside pasture owned by a local subsistence farmer and retired sea captain named

Clyde Torrey. Clyde regaled us with stories, many of which had already been picked up and published already by visiting literati. One of these people was **Perry D. Westbrook**, who wrote *Biography of an Island* (1958). Clyde had embellished his copy of the book with notes about stories he had been collecting. When Marshall Dodge made his way to Swan's Island, he soon discovered the trove of Downeast humor that became part of the folklore base for his and Bryan's joint smash-hit record series, *Bert and I*.

Starting in the late 1990s and for better than a decade, I was a member of a Smithsonian archaeological team, traveling aboard their research boat, *Pitsiulak*, in northern Newfoundland, the Gulf of St. Lawrence, and southern Labrador. In Harrington Harbor on Quebec's Lower North Shore, I began to hear stories about Marshall Dodge's partner, Bob Bryan, who had taken up summer residence in this small island town of Newfoundland fishermen. By then, Bob was the Right Rev. Robert Bryan, part-time Archdeacon of the local Anglican Church. And he was not “just of the cloth”; he was a flying minister whose ministrations spanned the entire rock-bound coast from Kegashga to Cartwright, Labrador in a small yellow Cessna seaplane.

Combining church ministry with his love for “The Labrador” and piloting skills, he had become an “aerial Wilfred Grenfell”, creating the Quebec-Labrador Foundation as a way to promote education and social and civic development along this roadless coast. He related to me how, with the proceeds from the Bert and I recordings, he learned to fly and bought his first plane.

Later, Bob gave me the last autographed copy of *Bert and I* that Marshall Dodge had signed, to which Bob added his signature. On December 13, 2008, at L.L. Bean, the fiftieth anniversary of the first Bert and I album was celebrated by Bob, together with other humorists who had picked up on Downeast humor—people like **Tim Sample** who often partnered with Bob to create *The Best of Bert and I* in 2008 and *Bert and I Rebooted* in 2013.

### DENNIS STANFORD (1943–2019)

by Kirk Johnson, assisted by Anthropology and ASC staff

**Dennis Stanford**, Curator of North American Archaeology at the Smithsonian, passed away on 24 April after a long bout with cancer. He was a beloved member of the National Museum of Natural History, always ready with a joke and smile. He founded and directed the Smithsonian’s Paleoindian Program and was a gifted and passionate archaeologist.

After receiving his Ph.D. from the University of New Mexico where Professor **John Campbell** introduced him to Arctic archaeology, Dennis joined the Department of Anthropology in 1972, launching a 47-year career at the museum. He became one of the best-known archaeologists in North America and had a gift for communicating research to both scholarly and public audiences. At a time when Paleoindian archaeology was still in its formative stage, Dennis helped advance the field through his studies of lithic materials, especially the distinctive stone tools known as Clovis points. His early fieldwork at the Jones-Miller Bison Kill site in Colorado was an exceptionally careful excavation and study of a bison butchery site dating to the Folsom period, roughly 10,000 years ago, and helped set the stage for the rest of his career. The last few decades of his research focused on the origins of the first inhabitants of North America, along with human adaptations to the changing environment as the last Ice Age was ending. He conducted fieldwork in Siberia, northern China, the western Arctic, the Rocky Mountains and, most recently, in the Chesapeake Bay region, seeking the origins of Clovis and earlier peoples. His experimental research on using stone tools to butcher the accidentally deceased Boston zoo elephant named Ginsberg was covered by National Geographic. Using

experimental methods, detailed field recording, and intuition, he led a paradigm shift that established “Pre-Clovis” as an archaeological reality.

Dennis’ Ph.D. work around Utqiagvik (Pt. Barrow), Alaska, introduced Paleoindian excavation techniques into the previously more casual methods of Arctic archaeology. Building on **Henry Collins’** work in Bering Strait, he brought new vigor to the contested topic of Thule origins and its relationship to the preceding Birnirk culture from his excavations at the stratified Walakpa site. While working there, he also discovered Aqmaq, an ancient Palaeoarctic complex. Living with Inupiat hunters who were still pursuing whales in open skin boats provided inspiration for his later idea that European Late Paleolithic Solutrean people reached North America in skin boats by following the southern edge of the North Atlantic pack ice more than 16,000 years ago, a theory he and co-author **Bruce Bradley** presented in *Across Atlantic Ice*. Like Pre-Clovis, the Solutrean hypothesis challenged his colleagues, forcing them to consider unconventional ideas. His most recent work produced evidence of Pre-Clovis sites in Chesapeake Bay.

Dennis was generous in his service to the museum and academic community, serving as chair of the anthropology department from 1993 to 2000, leading the archaeology division multiple times, hosting 32 fellows, and serving on many dissertation committees. His substantial research and service accomplishments are surpassed by his extraordinary contributions to the archaeology collections. Dennis was the excavator/donor of 20 acquisitions totaling 475,000 objects and was the curator of record when an additional 32 acquisitions joined the collections, representing an additional 673,000 items. He will remain one of the foremost contributors to the North American archaeological collections for decades, if not centuries, to come, and his Paleoindian collections have established the Smithsonian as the premier Paleoindian research collection in the world.



## 2018 ASC STAFF PUBLICATIONS

### **Crowell, Aron L.**

**2018** Inuit-Dene Cultural Ecology in Cook Inlet, Alaska since 1000 B.C. *In* *Imagining Anchorage: The Making of America's Northernmost Metropolis*, ed. James Barnett and Ian Hartman, University of Alaska Press, pp. 2–19.

**2018** Sugpiaq (Alutiiq) History and Archaeology on the Kenai Peninsula's Outer Coast. *In* *150 Years: Proceedings of the 2017 Kenai Peninsula History Conference*, edited by S. F. Loshbaugh, pp. 223–230. Skookum Creek Publishing, Seattle.

### **Fitzhugh, William W.**

**2018** The Rigolet Project IV: Mason Island, Snooks Cove, and Lake Melville. *Provincial Archaeology Office 2017 Archaeology Review* 16: 93–100. St. John's, Newfoundland.

**2018** *The Gateways Project 2017: Hart Chalet, Grand Plain, Grand Isle, and Belles Amours*. Provincial Archaeology Office 2017 Archaeology Review 16: 100–110. St. John's, Newfoundland.

### **Hitchcock, Robert, Aron L. Crowell, Alison S. Brooks, John E. Yellen, James I. Ebert, and Alan J. Osborn**

**2018** The Ethnoarchaeology of Ambush Hunting: A Case Study of ≠Gi Pan, Western Ngamiland, Botswana. *African Archaeological Review online* <https://doi.org/10.1007/s10437-018-9319-x>

### **Krupnik, Igor, Rubis, Jennifer and Douglas Nakashima**

**2018** Epilogue: Indigenous Knowledge for Climate Change Assessment and Adaptation. *In* D. Nakashima,

I. Krupnik, and J. Rubis, *Indigenous Knowledge for Climate Change Assessment and Adaptation*. Cambridge, UK: Cambridge University Press and UNESCO Publishing, pp. 280–290.

### **Krupnik, Igor**

**2018** 'Arctic Crashes:' Revisiting the Human-Animal Disequilibrium Model in a Time of Rapid Change. *Human Ecology*: 1–16. doi:10.1007/s10745-018-9990-1

**2018** Waldemar Bogoras and the Chukchee. A Maestro and a Classical Ethnography (reprint). *In* *Jochelson, Bogoras and Shternberg—A Scientific Exploration of Northeastern Siberia*, Erich Kasten, ed. 2018. Furstenberg/Havel: Kulturstiftung Sibirien, pp. 131–168.

### **Loring, Stephen Chelsee Arbour, Napes Ashini and Anthony Jenkinson**

**2018** Pour ramener l'été: À la recherche d'une concordance entre l'histoire innue et l'archéologie. *Recherches amérindiennes au Québec XLVIII*, No. 3:41–54.

### **Nakashima, Douglas, Krupnik, Igor and Rubis, Jennifer**

**2018** *Indigenous Knowledge for Climate Change Assessment and Adaptation*. Cambridge, UK: Cambridge University Press and UNESCO Publishing. 298 pages.

### **Taylor, William, J. Bayarsaikhan, T. Tuvshinjargal, S. Bender, M. Tromp, J. Clark, K. Bryce Lowry, J-K. Houle, D. Staszewski, J. Whitworth, W. Fitzhugh, and N. Boivin**

**2018** Origins of Equine Dentistry. *Proceedings of the National Academy of Sciences of the United States of America*, 115(29): E6707-E6715. doi:10.1073/pnas.1721189115.



This newsletter was edited by *William Fitzhugh, Igor Krupnik, Stephen Loring, Aron Crowell, Dawn Biddison and Nancy Shorey*.  
Designed and produced by *Chelsi Slotten, Nancy Shorey and Igor Chechushkov*





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