

AAOKH NEWS

Issue 13, Summer 2025

Alaska Arctic Observatory and Knowledge Hub



Carla SimKayotuk, February 4, 2025

AAOKH is part of the University of Alaska Fairbanks Troth Yeddha' Campus, on the traditional lands of the Tanana Dene People. We are part of the International Arctic Research Center.

Cite This Publication

Heeringa, K., Glenn, R., Hauser, D., Druckenmiller, M., Jones, J., Thoman, R., Lowe, P., Ahmaogak, J., Adams, B., Leavitt, J., Lisbourne, R., Omnik, G., Schaeffer, R., SimsKayotuk, C., AAOKH News: Alaska Arctic Observatory and Knowledge Hub, Issue XIII [newsletter]. International Arctic Research Center, University of Alaska Fairbanks.

PAĠLAGIVSI! AAOKH AITCHUUTSUURAT QANUQ INUPIAT UQAUSIGIGAI QANUQ SIĶA ALLANĶUQTUQ.

In English: Welcome! AAOKH shares how Iñupiat observers describe rapid environmental changes. Iñupiaq translation by AAOKH program coordinator Roberta Tuurraq Glenn.

IN THIS ISSUE:

- Observer highlights from January through May.
- Working with local youth to monitor ice conditions in Kotzebue
- Summary of winter and spring wind conditions
- Thinner ice recorded during mapping of Utqiagvik's spring whaling trails.
- AAOKH's observations database has a new look and feel, check it out!
- Welcome to two new observers and a student intern.
- AAOKH shares our recently updated values, vision, and mission.



The University of Alaska is an EO/EA Employer and Educational institution and committed to a policy of non-discrimination against individuals on the basis of any legally protected status.: www.alaska.edu/nondiscrimination/.



ATTN: Donna Hauser
International Arctic Research Center
University of Alaska Fairbanks
2160 Koyukuk Drive
P.O. Box 757340
Fairbanks, Alaska 99775

NON PROFIT ORG
ECRWSS
US POSTAGE PAID
FAIRBANKS, AK
PERMIT NO. 2

*****ECRWSEDDM*****

Postal Customer

TUSAAYUGAAT - OBSERVATIONS

TIKIQAQ

— Guy Omnik, AOKH observer in Point Hope —

BREAK-OUT

April 23 - Water pretty much off the south beach. Yesterday ...landed Point Hopes 7th whale. Unfortunately winds picked up later in the evening causing the ice to break off. Most of the crews made it back in time while 3 other crews were on the other side of the open lead. They transported their gear and snowmachines on boats. All crews made it home. Our trail was about 7 miles long about the same distance where the whale was so all the crews that were on the east trail at the whale packed up gear/tents/boats within minutes. We had passed a few cracks on the drive back luckily they just formed and was just inches wide with the widest crack being 3-4 feet long near the beach. The other crews who were on the different trail in front of town had a tougher time being on the other side of the lead, having to transport their gear and snowmachines with their boats

SUCCESSFUL WHALING

May 1 - Been so busy since my last email. Since then Point Hope landed 7 more whales bringing the total to 14 whales landed.



KALI

—Robert Lisbourne, AOKH observer in Point Lay —

BEARS AND CARIBOU

March 12 - 10F with wind chills -40F white out tuttu [caribou] still close by but they on the move migrate southward bound

March 17 - Today polar bear momma and two cubs came into town 200 block area people in town is safe no one got hurt. Highly advised be aware of polar bears in all other coastal villages this is the month they come out of their dens to go hunt for their cub.

QIKIQTAGRUK

— Bobby Schaeffer, AOKH observer in Kotzebue —

NO SMELT

January 22 - The smelt run never came in this year. I've been checking every two days to see if the tomcod and smelt came into the Sound but I have not caught any. It's obvious that the strong storms we experienced this Fall have negatively affected the movement of the tomcod, herring, and smelt. This is a first for me.

March 26 - Local fishermen told me they caught a few Sii [shee fish] outside of Kotzebue and they had mostly tomcod in their stomachs. The smelt runs never occurred this winter.

HEALTHY CARIBOU

January 27 - The tundra has filled in nicely with new snow after the storms we experienced the past two weeks. Folks have been going out and harvesting some caribou. The herd settled in on the hills between the upper Kobuk and Buckland on the Northern Seward Peninsula. Hunters say they are in fairly good shape with some fat in the stomach area and on the rump.

NOT MUCH WIND

April 15 - Two feet of loose snow is unusual up here because we usually get a lot of wind to blow the snow around. Not this winter. We experienced weak low pressures in March that dumped a lot of snow but there was very little wind to blow it around. Locals say it's tough going out in the bush because of all the loose snow everywhere.



UTQIAGVIK

— Joe Leavitt, AAOKH observer —

CHALLENGING WHALING CONDITIONS

May 1—First whale taken on [April] 22nd, the second was about the 30th, the lead has been opening up only $\frac{3}{4}$ of a mile. It kept adding on but the add on kept breaking off. Polar bears sighted near town. Pack ice has been close by also young ice, 5 whales have been lost cause of poor ice conditions.

— Billy Adams, AAOKH observer —

SHIFTING WINDS ANQTD ICE

February 9 - We had an ice event called 'uit' meaning that a lead opened up. This particular event opened up where we called the edge called 'sinnigruaq' meaning where the first open edge was. This was by Gravel Pit area. It opened up when the winds were very calm, so be careful of your surroundings when you are out enjoying the great outdoors.

February 11 - The winds changed and came from the west and by the looks the currents also came from the west and created an ice event called 'ivu' and this is where the pack ice and shore fast ice collide with energy and power creating high ice ridging such as this which appeared to be 30-40 feet high.

April 29 - Whaling has begun in Barrow but it has been very windy making it difficult to get near to a whale.

ULGUNIQ

— Jason Ahmaogak, AAOKH observer in Wainwright —

MILD WINTER

February 22 - Been having a ground storm that'll last over the weekend, the leads have opened up further out, it's been a warm February, our new normal low is -20F when we should be -40F below throughout February.

March 30 -Winds wsw 31, gusting 50. temp 27F. very warm winds, spring has arrived, lots of ice came off with these winds, good warm temps too, lotta fresh snow all over makes it white out conditions.

PRIME SMELT FISHING

February 16 - Still lots of caribou around the village and its prime smelt fishing season.

BIRDS, BEARS, AND CARIBOU

May 22 - Winds east north east 18 gust 21, temp 28F degrees. We started melting during the day the geese have arrived and we still have lots of caribou around the lead is opening back up after being closed a week lots of polar bears this spring another bear was harvested a few days ago.

KAKTOVIK

— Carla SimsKayotuk, AAOKH observer —

STRONG WINDS

January 26 - The last 3 days we have experienced strong winds, with some blowing snow and gusts to 35. On January 24 the multiple open leads turned into a long huge lead, and today it was closed.

February 14 - Strong wind out of the east all day, this being it is gusting to 52, making it feel like -38. The roads keep getting drifted over.



Billy Adams, February 11



Billy Adams, February 9

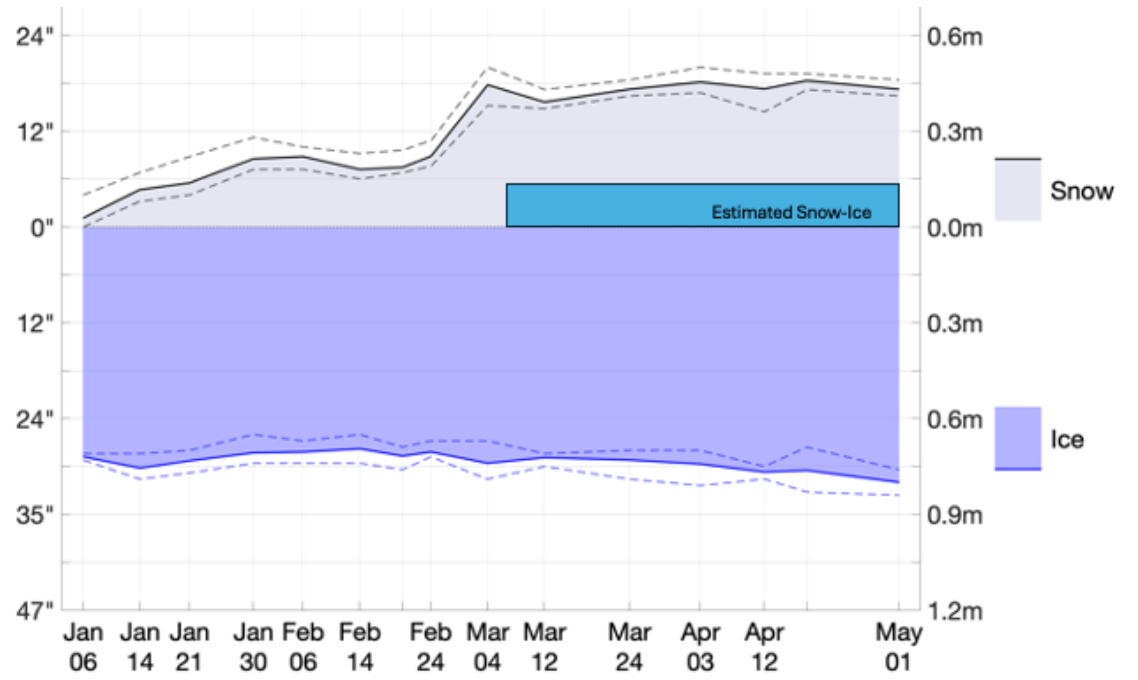


Carla SimsKayotuk, February 14

SEA ICE IN QIKIQTAGRUK

Since 2020, AAOKH has been partnering with the Native Village of Kotzebue (NVOK) to measure the winter ocean and ice conditions in the channel in front of Kotzebue. Taikuu to Tyler Alasuk Kramer for taking ice and ocean measurements all winter! Ty was able to buy his very own guitar with money he made working with us on this project. We're so happy to be supporting the next generation of AK scholars and leaders! Also, thanks to Bobby Schaeffer for help and ongoing observations, Alex Whiting and NVOK for continued support and coordination, and to the North Pacific Research Board for supporting this year's research!

On May 1, sea ice measured about 2.6 ft (0.8 m) and snow measured about 1.4 ft (0.4 m). Ocean temperature and salinity at the site also varied substantially since January. Bobby Schaeffer's observations correspond with the introduction of "snow-ice" or frozen overflow at the ice surface in our ice measurements.



“With a lot of snowfall the past two weeks, the snow load on Kobuk Lake was heavy enough to crack the lake ice and caused overflow in many parts of the Lake. This cold weather should freeze the overflow”. - Bobby Schaeffer

WEATHER & CLIMATE TRENDS

FROM RICK THOMAN, ALASKA CENTER FOR CLIMATE ASSESSMENT AND POLICY, UAF

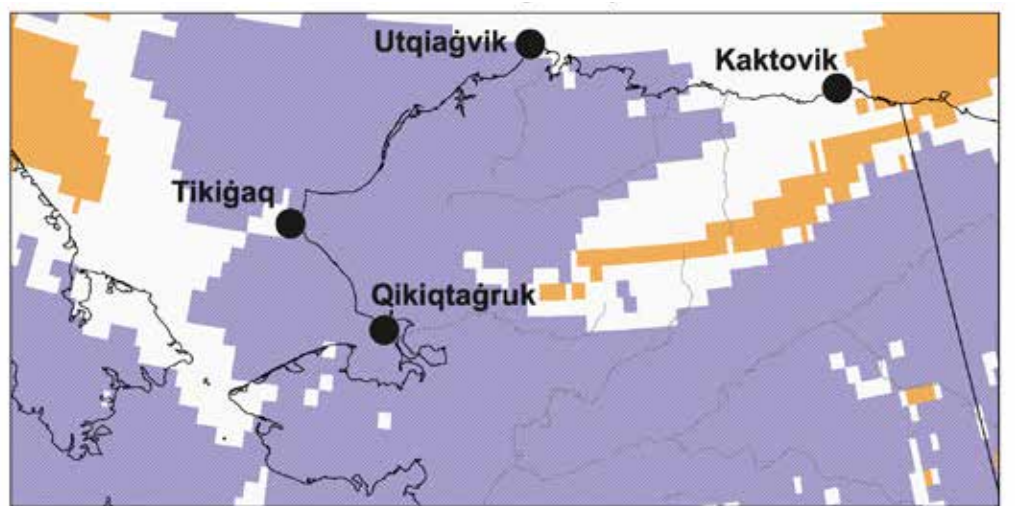
Sea ice: Following near-record low sea ice extent in late summer 2024, the Beaufort Sea froze later than usual. Thicker multi-year ice stayed well north of the Alaska coast. In contrast, ice on the Chukchi Sea formed earlier than in some recent years, allowing more time for thickening, though nearshore ice remained relatively thin most of the winter. Kotzebue Sound ice formed quickly after a severe October storm.

Winds Dec-Feb: From December to February, wind speeds across the Chukchi Sea were well above average—Kotzebue saw 600 hours of 20+ mph winds, over 20% above normal. Mid-winter nearshore Beaufort Sea winds were near average, but thin and limited grounded ice allowed for significant movement including leads opening for short periods in late January near Kaktovik and an Ivu [ice push event] in Utqiagvik in early February after several days of strong S and SW winds.

Winds Mar-April: South of Point Hope, spring brought unusually calm winds—Kotzebue saw its fewest 20+ mph wind hours in over 25 years. North of Point Hope, spring winds were near or above normal. By late April into May, significant leads formed along the Chukchi Sea coast from Peard Bay to south of Point Hope likely related to relatively thin ice as well as winds and current. The late April ice breakout near Point Hope reflected this broader trend, with a lead stretching up to 100 miles at times offshore in mid-May.

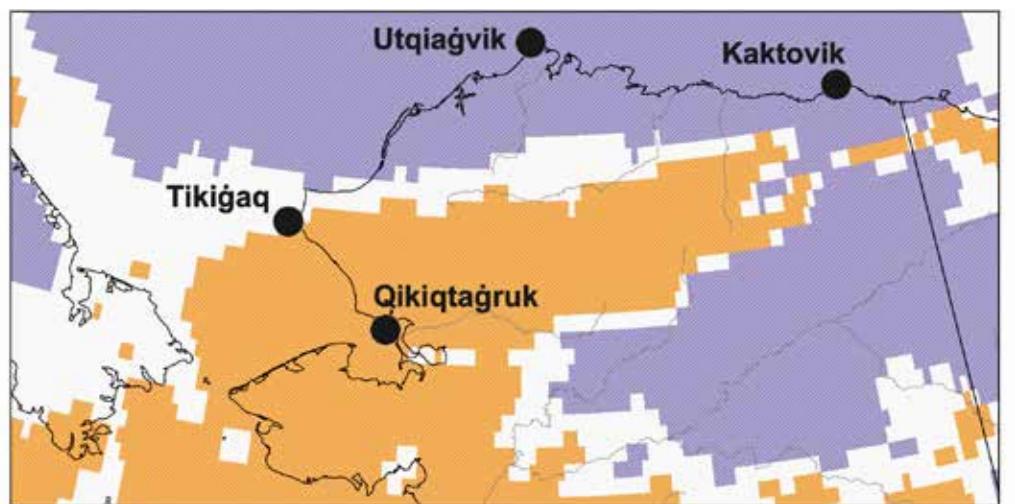
December through February 2025

Average wind speed relative to normal



March through April 2025

Average wind speed relative to normal



Significantly below normal Near normal Significantly above normal

Figures from 1991-2020 Baseline ERA5 courtesy of ECMWF/Copernicus



SPRING ICE TRAILS IN UTQIAGVIK

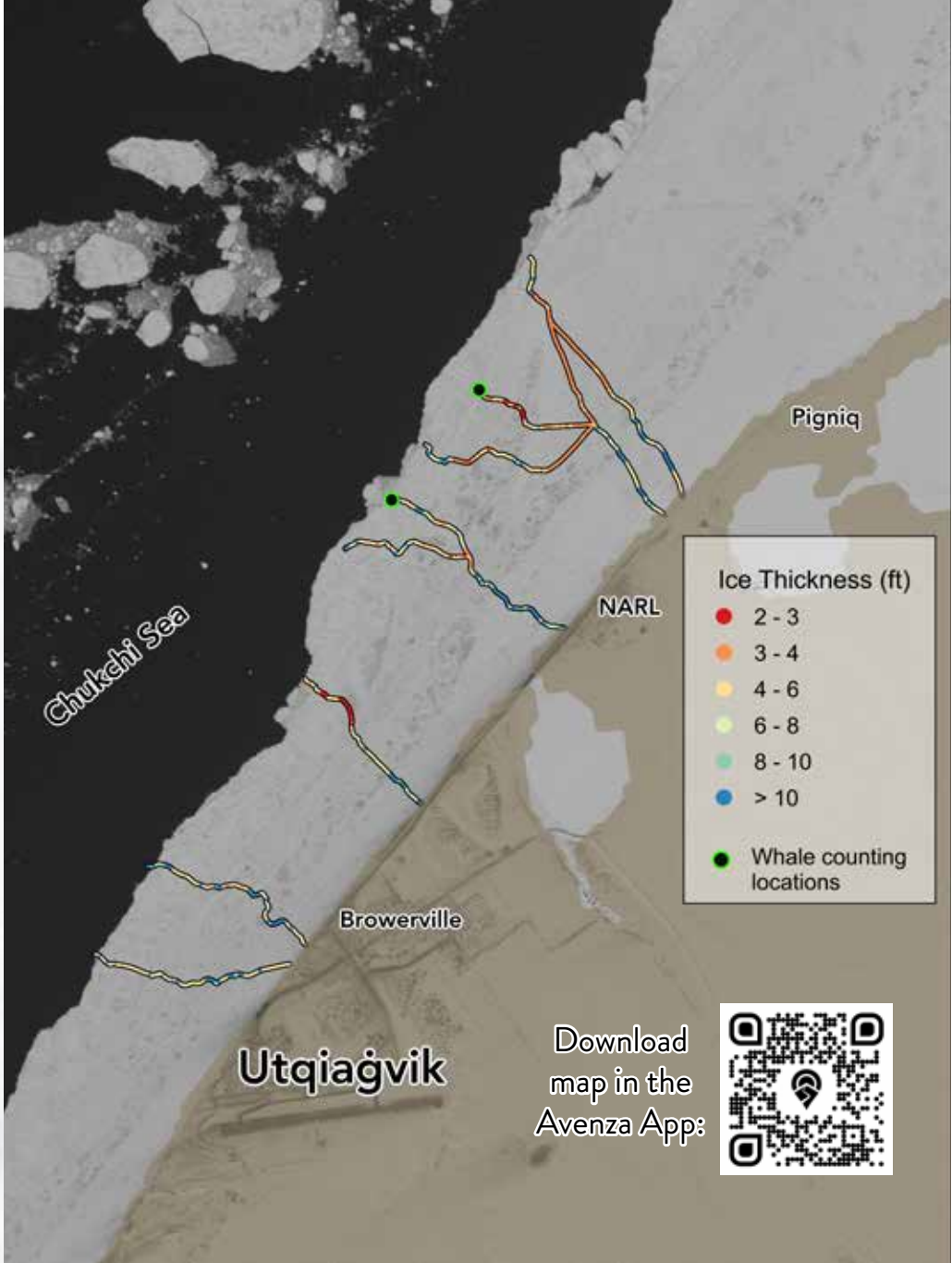
FROM MATT DRUCKENMILLER, NATIONAL SNOW & ICE DATA CENTER

The shorefast ice off Utqiaġvik was very close to shore in comparison to past decades, though similar to the last couple years. The level ice closest to shore was mostly between 4.5 to 5 feet thick and very rough and rubbled. Further out, where ice attached on later in the season, the level ice was between 3-4 feet. Overall, the most common thickness of ice traversed by the ice trails was 3.6 feet. In comparison to ice trail thicknesses from past years, this year was one of the thinnest ice covers during whaling. Since the ice trail thickness surveys began in 2008, the ice cover has decreased in thickness by about a foot.

Few grounded ridges secured the ice during this year's whaling season, though several prominent ridges appeared grounded in waters 55 to 60 feet deep, one of which was used as the Perch (whale counting location) for the NSB Department of Wildlife Management's bowhead whale census.

At the beginning of the whaling season, a storm during April 18-19 of high winds and gusts out of the N to NNE tested the ice, but only small pieces of ice broke away from the edge during this time period and in the days that followed. Crews had to monitor various cracks in the ice, especially near the ice edge.

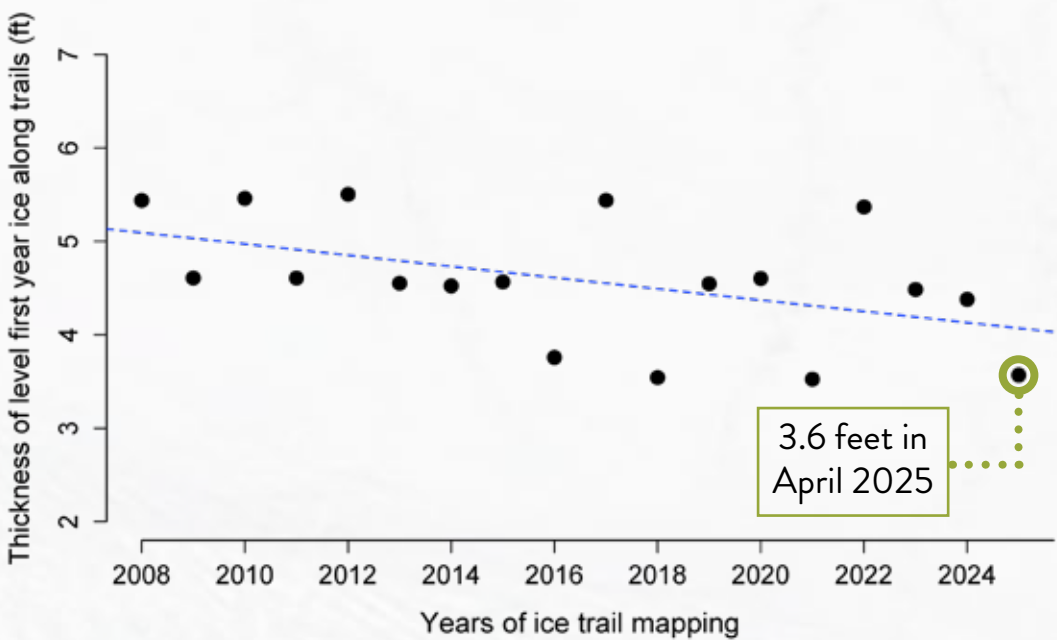
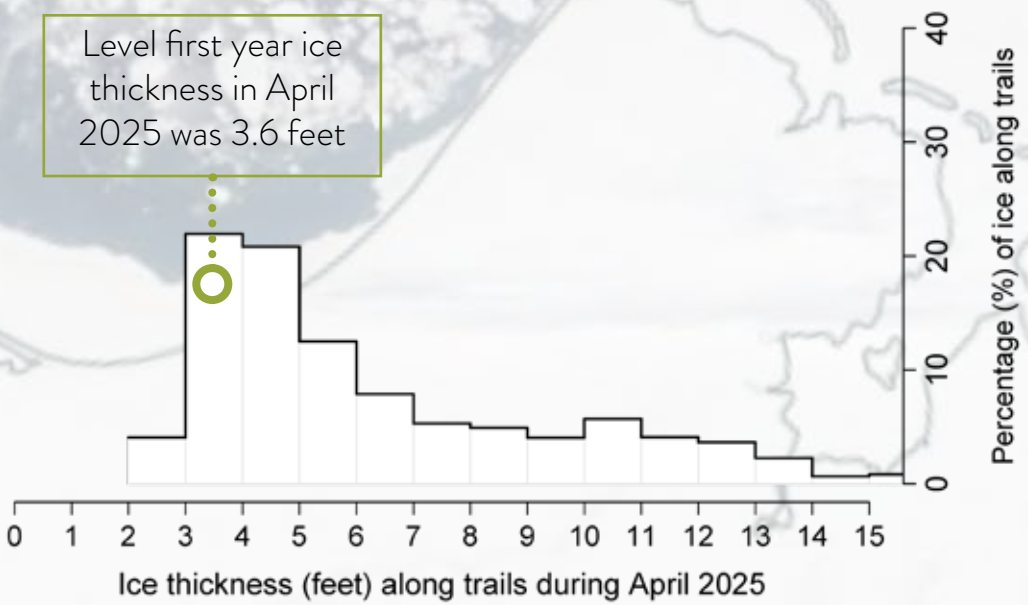
Trail mapping is made possible through support from UIC Science, Alaska Ocean Observing System (AOOS) and AAOKH. We coordinated with the Barrow Whaling Captain's Association, NSB Wildlife, PISCES project, and UAF Sea Ice group.



Map produced by: Josh Jones (AAOKH) and Matt Druckenmiller (National Snow & Ice Data Center) on May 2. Image from Sentinel-2 Satellite on April 27, 2025.



Above: Matt and Josh in April 2025 during a stop in trail mapping near the open lead.



AAOKH DATABASE UPDATE

We have been working on improvements to our online database, which houses observations made since 2006! These updates have streamlined database search functions making it easier to explore observations using the priorities identified by AAOXH observers in 2022. Feedback is welcome, let us know what you think!

Set up an AAOXH new user login and start exploring! Here are some example searches and tips to get you started!
aaokh-data.org



Click submit to see all observations and navigate to the menu at the left to filter observations by community, observer, wildlife, and other conditions.

Search “bear” or “nanuq” to see some cool polar bear photos. Bonus: search “bears lunch” to see how whaling crews and polar bears mingle on the sea ice during spring whaling!

Search today’s date from years past in a community near you and compare this year’s conditions to previous years.

Find some observations from 10+ years ago to see what was going on in other communities, including Gambell, Wales and Savoonga.

AAOKH

SEARCH NEW OBSERVATION ADMIN DASHBOARD ACCOUNT LOGOUT

Search term(s) nanuq

From 2024-05-01 To 2024-06-01

RESET SUBMIT

Showing 1 - 33 of 33 results between 2024-05-01 and 2024-06-01

DOWNLOAD CSV Sort by Date (Newest to Oldest)

2024-06-01	Joe Leavitt	Utqiagvik (Barrow)		EDIT
Last two whale taken. It was a female with a calf but was counted as a regular whale the crew had no way of knowing it had a cause of the ice conditions.				
2024-05-30	Billy Adams	Utqiagvik (Barrow)		EDIT
The past couple days the weather went from 28f to 40f overcast and light mist to clear and sunny! The sun made people get out from researchers to Inupiat. Animals and birds also are happily greeting each other as well as belugas! Please identify the birds and let us know what species they are.				

People

- Billy Adams (9)
- Carla SimsKayotuk (11)
- Guy Omnik (9)
- Joe Leavitt (4)

Communities

- Kaktovik (11)
- Pt. Hope (9)
- Utqiagvik (Barrow) (13)

BARROW HIGH SCHOOL STUDENTS EXPLORE NEW DATABASE

We’re so thrilled to share that our AAOXH team traveled up to Utqiagvik last month to work with Barrow High School (BHS) students in the Iñupiat Language class and North Slope Science classes. The AAOXH team worked with students to think about the importance of environmental observing for travel safety and how Indigenous Knowledge helps us to understand our Arctic environment more holistically. Students explored the newly released database, particularly focusing on observations featuring local place names, people, and amusing photos of polar bears. It was so awesome to work with BHS students and we’re so thankful for Ms. Kim Píkok, Mr. Sanchez and BHS administrators for allowing us time and space in your classrooms. We look forward to working with Kim more on future classroom visits! This project is funded in collaboration with the Alaska Ocean Observing System (AOOS) and the Exchange for Local Observations and Knowledge of the Arctic (ELOKA).



INTRODUCING NEW OBSERVERS

We are so lucky to be working with Jason (Jase) Ahmaogak in Wainwright and Robert Lisbourne in Point Hope. Jase is on the Iceberg 14 Whaling Crew in Wainwright and was described as “400,000 times more efficient than me!” by Billy Adams before being introduced to our group. Jase started with AAOKH in January 2025. Robert was introduced to us by a walrus researcher and approved to work with AAOKH by the Point Lay Tribal Council. Robert started recording observations with AAOKH in February 2025. We are always happy to connect with folks who have been connected to us by other partners and in coordination with Tribal and local organizations.

JASON (JASE) AHMAOGAK

“I’m a local Wainwright whaling captain and hunter. I have lived in Wainwright all my life. Thanks to Billy for reaching out to me and asking if I was interested in being an AAOKH observer for our village. I’m thankful for this great opportunity to make a difference in weather observations for the North Slope. Live to hunt another day!”



ROBERT ALEC LISBOURNE

“My name is Robert Alec Lisbourne Sr. I am 43 years old. My parents are Julius Rexford Sr. & Marie Rexford. I was raised in Barrow and moved to Point Lay in 1993. I have been living here since. I fell in love with the people of Point Lay and most certainly the hunting ground! Smallville big country!! So yes, I am all about nature. My father Julius is a retired whaling captain of Atkaan Crew. Now my sister, Christina Lane is the captain. Much respect to my father for the knowledge he has taught me all about whaling. Now I must continue to teach whaling for the younger generation. I am currently on the North Slope Fish and Game Wildlife committee, a walrus commissioner in the Beluga committee for Point Lay, and now awaiting approval to be part of the Department of Iñupiat History, Language, and Culture (IHLC) commissioner board for Point Lay! I represent the people of Point Lay with the best of knowledge I have!!! Thank you very much.”

NEW INTERN

PETER LOWE

“I am from the southwestern Yup’ik village Togiak, Alaska and am currently pursuing a Bachelor of Science degree in Psychology at UAF. Being from a rural village, I have seen the lack of resources available in rural communities in Alaska for mental health and substance abuse. It is my career and life goal to work towards getting more funding and resources for rural communities in these areas. In my internship with AAOKH, supported by the Alaska Ocean Observing System, I hope to learn from observations and about different approaches to Indigenous-focused research that involve Elders, youth, and community members throughout the research process. A culturally-inclusive and community-collaborative approach is something I want to establish in my own work.”



WHERE WE ARE HEADED

In 2024 with the support of Exchange For Local Observations and Knowledge of the Arctic (ELOKA) and facilitated by Indigenous Evaluation Scholar Malu Castro, AAOKH went through a reflective process to identify our core values that shape our mission and long-term vision. We are excited to share the results of this process with you, which will guide our decisions moving forward.

MISSION

AAOKH's mission is to improve Arctic research and strengthen Indigenous self-determination through Indigenous-led stewardship of environmental observations and knowledge.

VISION

To create a future where Arctic research and policy are strengthened through respectful, collaborative partnerships with Indigenous People, placing Indigenous leadership, knowledge systems, and the voices of Elders, youth, and community members at the heart of understanding and responding to environmental change.

VALUES

1. Knowledge of the environment and animals
2. Uplifting Iñupiat traditions and culture
3. Responsibility to community interests and needs
4. Converging knowledge systems: Indigenous Knowledge and western science
5. Education and leadership for the next generation
6. Observations are accessible while Observers retain data sovereignty
7. Collaborative Relationships built on reciprocity and respect

Carla SimsKayotuk,
January 20, 2025

STEERING GROUP WELCOMES AND GOODBYES

2025 marks a transition for the AAOKH steering committee. We are so grateful for the nearly 10 years of service provide by: Austin Ahmasuk (Nome), Noah Naylor (Qikiqtaġruk), Scott Rupp (UAF), and Todd Brinkman (UAF).

We are excited to welcome new steering group members including: AAOKH Alumni Kimberly Kivvaq Pikok (Utqiaġvik), Native Village of Kotzebue Environmental Director Alex Whiting (Kotzebue), Oceanographer and International Arctic Research Center Deputy Director Claudine Hauri (UAF), and Indigenous Co-Production of Knowledge Researcher Margaret Anamaq Rudolph (UAF).

We are grateful for the continued steering group membership provided by: Lee Kayotuk (Kaktovik), Qaiyaan Harcharek (Utqiaġvik); from UAF Hajo Eicken, Sean Asikłuk Topkok, and Terry Chapin.



Kim Pikok receiving her diploma at UAF Commencement in May 2025!

We are very proud of Kim and excited for her continued involvement in AAOKH as one of the newest members of AAOKH Steering Group.

FUNDING

AAOKH increasingly relies on a diversity of funding sources and partner organizations, including foundations as well as grants from federal agencies. This Newsletter issue has been funded by two awards from the National Oceanic and Atmospheric Administration (NOAA), including the [GOMO Arctic Research Program](#) (Award number) NA20OAR4320271-T3-01S140



arctic-aok.org



@ArcticAOK



aaokh@alaska.edu



907-474-1553