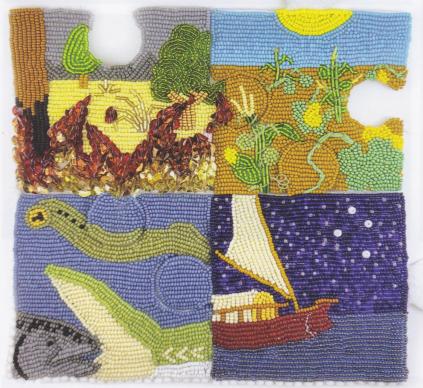
## **SECOND EVENT**

The second event featured Yurok/Karuk artist and scholar Brook Thompson. Her presentation focused on her artwork as an engineer and activist. A full interview with Brook is featured here.



Artwork by Brook Thompson



## TO BOLDLY GO WHERE FEW HAVE GONE BEFORE

**Brook Thompson's Treatise on TEK versus Tech** 



Jeanne Ferris

BROOK THOMPSON
(YUROK/KARUK)
SPENT HER FORMATIVE YEARS IN
OREGON WITH HER
HERO AND PEECHOWOS (GRANDFA-

THER), ARCHIE THOMPSON. A World War II naval veteran, he played a significant role in archiving the Yurok language within his community.

Like Ms. Thompson's ancestral territory that extends into Northern California, her bold future knows no boundaries. Currently, she is on standby: "Zooming" through online classes at Stanford University and waiting impatiently at home base in Portland to attend in person.

A recipient of a Leonardo Imagination Fellowship from Arizona State University's Center for Science, she is now working toward her master's degree in environmental engineering. Tucked competently under her belt, a bachelor of science degree in water issues. Along the way, she resurrected the Portland chapter of the American Indian Science

and Engineering Society. Prestigious awards and internships with civic, civil, and environmental engineering firms have elevated her status as a sought-after panelist and speaker with political and ecological campaigns.

While studying abroad in New Zealand and at universities in North Carolina, Colorado, and Washington, DC, she has immersed herself in the Native American Political Science Leadership Program, Māori worldview, green roof development, sociology, advertising, business, and entrepreneurship. Her US passport has almost as many stamps as she has years on the planet.

"People think scholarships are just given to you because you're Native," Ms. Thompson said. "That is not true at all! I had to earn it." The process resulted in a step-by-step guide in the art of scholarship applications for students available, along with her ASU final project, on her website (www. brookmthompson.com).

With only ten weeks to submit her ASU project, she crammed a crash course in animation and Blender 3D technology, investing 120 hours. "Half of the time went into beading and the other [half] went into editing, audio, and the minuscule details of the website," Ms. Thompson said.

In keeping with her tenacious character and by conscientiously maintaining only positive intent (a steadfast rule for basketweavers), Ms. Thompson taught herself the Native tradition of beading through trial and error over nine years.

With the four values of traditional ecological knowledge (TEK) as an impetus, she created individually beaded pieces representing fire management, agriculture, river keeping, and wayfinding, interlocked like a puzzle and presented as a whole unit. Every piece represents twelve hours of beading, using fire thread with a double-gauge needle.

Ms. Thompson then combined the beadwork with Native specialists speaking about each corresponding value in an audio recording with an accompanying transcription and an animated image.

This writer respectfully paraphrases here a condensed excerpt of each specialist's transcription.

Fire/Forest Management:
Wildfires contribute to global warming due to toxic smoke; suppressing them destroys fire-dependent plants. Prescribed burns and mechanical thinning are land restoration tools. Biochar is a purifier for the soil.

—Margo Robbins (Yurok), Cultural Burn Training Exchange (TREX)

Three Sisters/Agriculture:
Native peoples frame plants as family. The three sister plants are corn, bean, and squash. Corn is the older sister whose stalks the beans grow upon, and the squash is the younger sister who prevents the weeds. Food/plants that are healthy love us back. Respect even inanimate objects like rocks. This is a natural and tangible relationship.

-McKalee Steen (Cherokee), PhD student

River/Water Keeping:

Science compartmentalizes nature by isolating one system, whereas TEK sees nature as connected systems that make a whole. I became a scientist so that my opinion would be heard and could be part of the solution. Healthy fish means healthy waters.

—Keith Parker, M.S. (Yurok), Yurok Tribe senior fisheries biologist, Klamath River harvest management

## Wayfinding:

TEK tells me when it is the best time to do something in the environment. The world of the canoe is to understand the world: migratory patterns of birds, the sun, the moon, how the stars move and clouds change. Finding your way across thousands of miles of the ocean has always been done by observation and through knowledge passed down orally. Oral knowledge is undervalued because it is not written.

—Captain Hoturoa Barclay-Kerr (Māori), master's in Māori Studies, bachelor in anthropology and linguistics

Ms. Thompson was effusive with gratitude for the four participants: "Everyone was so generous with their time. Keith Parker was especially helpful with the audio," she said.

In listening to each expert, one is quickly captured by Ms. Thompson's sustainable development goal and to be "a part of the solution."

"I had no idea how difficult it is for a female to advance in STEM [science, technology, engineering, and mathematics]—no one told me," Ms. Thompson said. "Not only is it still male-dominated, with prejudices toward Native knowledge like oral history not being valid, but I am the only Native American out of six women in a class of thirty."

Ms. Thompson's frustration at remaining invisible in a good ole boy's club echoes many female scientists' experiences. The onset of the twenty-first century has seen slight improvement in inflammatory issues like sexism, racism, or the gender pay gap. A historical breakthrough: Madame Deb Haaland is the first Native American woman to serve in the cabinet.

"Native people need to tell their own story," Ms. Thompson said.
"Even at school, it's a systemic issue that Native knowledge is never referenced. Academics are taking credit."

Ms. Thompson's goal to utilize TEK in engineering, public policy, and social action is a ripple in still waters that will hopefully become charted by more Native women.

"I am so inspired by artists like my uncle, Brian Tripp (Yurok), and Lyn Risling (Yurok/Karuk/Hupa)," Ms. Thompson said. Mr. Tripp and Ms. Risling are highly regarded for revitalizing ceremonial life through artistic engagement in local Indigenous culture.

In her pandemic downtime, Ms. Thompson designed a card game in Yurok called Go Fish, similar to Apples to Apples. With all original artwork, the deck highlights ancestral fish, including the values of TEK, and is soon to be published.

Peechowos is undoubtedly proud of his granddaughter's dedication to embodying Native Strong and tribal artistry. Especially since Ms. Thompson's way of life is his signature farewell: "You be good now."