

Students Attend AISES Camp



Minnie Salmon of Chalkyitsik teaches beadwork to AISES students (counterclockwise) Clifford Cleaver of Galena, Patuk Glenn of Barrow and Alvina Petruski of Beaver.

he Alaska Rural Systemic Initiative (AKRSI) and the American Indian Science & Engineering Society (AISES) cosponsored the Fairbanks AISES Science Camp 97 held July 16th-August 5th. Twenty-nine rural middle school students lived and learned in two worlds. While at UAF campus for eight days, students lived in a dormitory and attended classes in the Natural Sciences Building; then they moved out to Howard Luke's Gaalee'ya Spirit Camp on the Chena River for 13 days, sleeping in tents and attending culture classes with elders as teachers.

Many thanks to Amelia K. Barr-Topkok for creating the new ANKN logo pictured above. Amy is currently working on her BFA in drawing at the University of Alaska Fairbanks.

by Claudette Bradley-Kawagley

Students attended the World Indian Eskimo Olympics, Chena Hot Springs Resort as well as hiking trails and touring the Ft. Knox Gold Mine. Playing basketball in the Student Recreation Center was a popular activity during free time. Cruising the Web in the library computer room was another popular recreation choice of some students. (continued on next page)

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Classroom instruction included Tessellation Mathematics with Claudette Bradley-Kawagley, Native Ways of Sciencing with Oscar Kawagley, Village Science Application with Alan Dick and the Science Projects class with Larry Duffy. Elective classes included: Aurora Science with George Olanna, Athabascan Skin House with Rita O'Brien, Gwich'in Games with Caroline Tritt-Frank and Poetry and Drawing with Travis Cole.

"This morning in class (Village Science Application) we learned how to tie knots. We learned how to tie boats and tie skins together to make a skin boat. . . . This morning in Math we made Tessellations. And in another class (Native Ways of Sciencing) we had to get a rock from the ground; look at it one and a half minutes . . . in a circle close our eyes . . . feel the rocks . . . if we don't think its our (rock) pass it on, if we think its ours keep (it) . . . We opened our eyes and check we have our rocks."

—Kevin Luther of Noatak Rita and Fred Alexander were the elders-in-residence and provided cultural and spiritual leadership for the students during their eight-day stay at the UAF campus. They provided the opening prayers during orientation, the spiritual leadership during the male and female talking circles and also an Athabascan singing and drumming session with Travis Cole at the Natural Sciences Building.

Travis Cole of Allakaket was the artist-in-residence whose talents include poetry, drawing, drumming, singing and dancing the Athabascan way. Travis read his poetry during orientation and taught poetry and drawing in his elective course. His leadership in teaching in Athabascan songs and dancing was invaluable. "I can't wait to dance again... Every time I close my eyes I can hear Travis' voice in my mind singing that song, loud and powerful. I'm really interested in singing and dancing."

-Rose Alexia of Nickolai.

At Howard Luke's Camp students continued academic classes in the great outdoors. The mathematics class became the science projects class. Students had cultural sessions with the elders, played volleyball and had chores like cutting wood, washing dishes and hauling the water.

"I really like this place. It was a good place for us to learn new things."

—Mary Jones of Noatak "This camp is really good. Mostly liked the beading, carving, and song and dances."

—Mary Burns of Noatak "I liked this camp and talking (to) Howard (Luke) and Jonathan (David of Minto). They are funny . . . I want to do more culture classes."

—Clifford Cleaver of Galena. "What's good at Howard Luke camp? The food, outdoor activities, dancing in Elders Hall, the rope class, sauna, talking with elders, potlatch, berry picking and drawing contest."

—Charlene Kallman of Anchorage Students had opportunity to work on science projects, which they will continue in their villages. Each student will enter their projects in one of the two science fairs scheduled for November 20–22, 1997. Students in the Interior will enter projects in Fairbanks and students in the Arctic Region will enter projects in Ambler.

"I learned about other peoples science projects as well as how I could improve my science project... My project was about temperature of ice cellars and how it would change if the temperature would change outside."

—Patuk Glenn of Barrow.

A potlatch with giveaway and Athabascan dancing brought closure to the three weeks of Fairbanks AISES Science Camp 97. Students proudly wore their newly beaded headbands and danced rhythmically to the drum of Travis Cole. The enthusiasm and good feelings were transferred in packing and cleaning up the camp in preparation to go home.

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"I really don't want to leave but I really want to see my parents . . . Since I got to Howard Luke's Camp it seems like I known all my friends for so long . . . it is really hard to leave all my friends behind and go home and see my family because I am really homesick."

—Cynthia Melovidov of St. Paul Thanks to AISES and AKRSI for funding this camp and the many inkind supporters. The students and the camp staff are truly grateful for your support and funds for the Fairbanks AISES Science Camp 97.

A BIG thank you to the organizations and individuals who helped make this year's AISES camp a success:

- ♦ NANA Regional Corporation
- **♦** Cominco
- ♦ Noatak Search and Rescue
- Noatak Lions Club
- ♦ Frontier Air Service
- Bering Air
- ♦ Kawarak
- Warbelow's Air Adventures
- Wright Air
- ♦ Larry's Air Service
- Arctic Slope Regional Corporation
- ♦ Native Village of Barrow
- Louden Village Council
- Top of the Kuskokwim school
- Aleut Corporation
- ♦ Tanagdusix Corporation
- The Central Bering Sea Fisherman's Association
- ♦ Beaver Village Council
- ♦ McDonald's Restaurants
- ♦ Ft. Knox Gold Mine
- ♦ National Bank of Alaska
- Alyeska Pipeline Corp.

Village Science: There is a River

by Alan Dick

There is a river of information that flows through bush Alaska. It is a science river that confronts the "whys" of bush living.

The best opportunity to see it flow is to be around the reuniting of two people who are on the river. There is a mingling current of new thoughts like the confluence of two streams.

"How's your new 40-horse fourstroke (outboard)?" "Runs great, but is too heavy to tilt in shallow water. I smashed two props trying to get to my cabin." "Good on gas?" "Oh, yea, better than I thought. Don't know about the lower unit though. Skeg's thin."

"My chainsaw isn't running like it used to." "You haven't used additives to remove ice have you?" "Well, I might have." "That could be it. That junk eats the seals and your chainsaw is worthless if the crank seals are gone. It's OK in four-strokes, but no good in two-strokes. One time I put bug dope in motor oil to paint my dogs when there were lots of mosquitoes. The next winter I forgot which was which. I mixed gas with that oil and the bug dope ate the seals in my chainsaw the same way."

"Where did you buy that cable? I need 100 feet with an eye on both ends." "I got it from Baileys (logging supply outfit in California). You know how to make an oakie eye (back splice on a cable)?" "No." "Let me show you . . . "

How do you enter this stream? You don't enter from above the river. You enter from below the river. You come in a learner with a little to share. Some people try to be the river and are soon ignored.

The river has always existed. It flows in many directions. It flows freely around campfires and in steambaths, rarely in formal settings. It flows when people are doing things: fixing pipes, building stoves, making boats or sleds. Every village seems to have at least two or three people who flow in that river.

Much of the information is about new products and their application. "I made a hole in my aluminum boat, and tried XXXX to fix it, but it didn't do a bit of good." "Did you clean the aluminum good before you applied it?" "Yea, I scrubbed it with a stainless steel wire brush. A regular wire brush leaves iron contaminants in the aluminum. It still didn't work."

"I put UHMW (ultra high molecular weight white plastic) runners on my sled and they buckled. That stuff expands more than you would think when it warms up." "Gotta put UHMW on hot so it shrinks to the runner when it cools and keep the bolts close together."

Do you want to see the river flow? Like I said, get around two people who live the life: real doers, fishermen, trappers, builders, people who have been apart for a while. Half an encyclopedia flows by in the first hour or two. This knowledge has great value. It saves many hours of frustration when something isn't working right. The information is stored carefully for future recall.

"One time I..." introduces the science lesson of the day. You can't stop the river from flowing. It'll flow as long as curious folks are doing new things.

Alaska Standards for Culturally Responsive Schools

by Ray Barnhardt

For the past several years, Alaska has been developing and adopting "standards" to define what students should know and be able to do as they go through school. In addition, similar standards have been developed for teachers and administrators and this past year a set of "quality school standards" have been circulated by the Alaska Department of Education that may eventually serve as a basis for accrediting schools in Alaska. Since these state standards are written for general use in Alaska, they don't always address some of the special issues that are of critical importance to many schools in rural Alaska, particularly those serving Alaska Native communities and students.

In an effort to provide some guidelines for communities and schools that are attempting to implement the various initiatives of the Alaska Rural Systemic Initiative and Rural Challenge, we have begun to spell out the underlying principles from which we are working and have put them in a "standards" format for consideration by Native people around the state. At

this point, we have drafted cultural standards for students, teachers, curriculum and schools.

The following cultural standards attempt to capture what we have learned over the past two years and thus provide some guidelines against which schools and communities can examine the extent to which they are attending to the cultural well-being of their students. The cultural standards for teachers, curriculum and schools will be included in later issues of Sharing Our Pathways. We emphasize that these are draft standards and invite extensive discussion and comments to help us refine them and eventually put them out for general use throughout the state. If you have any suggestions, please forward them to any of the AKRSI staff. 🔪

DRAFT: Cultural Standards for Students

A. A culturally balanced student is knowledgeable about the history and cultural traditions of the home community.

Students who meet this cultural standard understand:

- their role in relation to the wellbeing of the cultural community and their responsibilities as a community member;
- 2. their own genealogy and family history;
- the place of their cultural community in the regional, state, national and international political and economic systems;
- their stewardship responsibilities to the environment in which they are situated;

- the cultural values, traditions and language of the local community and the role they play in shaping everyday behavior and interaction with others.
- B. A culturally balanced student is able to function effectively in any cultural environment.

Students who meet this cultural standard are able to:

- 1. perform subsistence activities in ways that are appropriate to local cultural traditions;
- make constructive contributions to the governance of their community and the well-being of their family;
- 3. sustain a healthy lifestyle free of alcohol, drugs and tobacco;

- enter into and function effectively in new cultural environments in a variety of rural and urban settings;
- 5. interact with elders in a beneficial and respectful way that demonstrates an appreciation of their role as culture-bearers in the community.
- C. A culturally balanced student is able to engage effectively in learning activities that are based on traditional ways of knowing and learning.

Students who meet this cultural standard are able to:

 learn deep cultural knowledge through intensive interaction with elders;

- participate in and make constructive contributions to the learning activities associated with a traditional camp environment:
- gather oral history information from the local community and provide an appropriate interpretation of its cultural meaning and significance;
- 4. identify and utilize appropriate sources of cultural knowledge to find solutions to local problems.
- D. A culturally balanced student exhibits an awareness and appreciation of the interconnectedness and processes of interaction of all elements in the world around them.

Students who meet this cultural standard exhibit:

- 1. a deep understanding of the inter-relationship between the human, natural and spiritual realms in the world around them as reflected in local cultural traditions and beliefs;
- a deep understanding of the ecology and geography of the bioregion that they inhabit;
- an understanding of the relationship between world view and the way knowledge is formed and used;
- 4. an ability to relate the ideas and concepts from one knowledge system to those derived from other knowledge systems;
- 5. an understanding of how and why cultures change over time;
- an understanding of the changes that occur when different cultural systems come in contact with one another;
- an understanding of and respect for how different cultural values and beliefs interact and impact the relationships of people from different cultural backgrounds;
- 8. a strong sense of identity and place in the world.

E. A culturally balanced student is able to build on the knowledge and skills of the home culture as a foundation from which to achieve personal and academic success throughout life.

Students who meet this cultural standard are able to:

- acquire knowledge and skills from other cultures without diminishing the integrity of their own:
- demonstrate mastery of established state academic content standards and perform academically on a par with all other

- students nationally;
- 3. utilize the knowledge, skills and ways of knowing from their own cultural traditions as a basis to learn what they need to know to succeed throughout life:
- 4. identify appropriate forms of technology to solve local problems while minimizing the negative consequences of their use:
- 5. make judgments regarding the long-term consequences of their actions. ▶

Welcome! Alaska First Nations Research Network Coordinator

«xxxxxxxxxxxxxxxxxx

i! My name is Beth Leonard. I am from Shageluk and have lived in Fairbanks since 1978. I was hired in May as a part-time coordinator for the Alaska First Nations Research Network (AFNRN). The AFNRN is the Alaska chapter of Mokakit, an educational research organization formed by the First Nations people in Canada. My responsibilities include working with the Alaska Native Knowledge Network (ANKN) and the Doyon Foundation in the development of curriculum guides and research materials to assist schools in implementing curriculum on the Alaska Native Claims Settlement Act (ANCSA) and the subsistence way of life.

I am currently working on a database of ANCSA curriculum and resource materials which will be imported into the larger curriculum database by Sean Topkok, the project Indigenous curriculum specialist. Most current ANCSA curriculum materials are oriented toward high-school students. As this part of the project progresses, we will need to define what information students should know about

ANCSA by grade level and also find culturally appropriate ways of integrating this information into the current curriculum. The goal is to build on students' knowledge of ANCSA and subsistence issues throughout their education. I am very pleased to be working with the ANKN and am looking forward to working with the regional coordinators, school districts and educators involved in the project.

Active Reality Research, Part II

o the Native people there are many things in this universe Let that are cyclical and describe a spiral or a circle. Examples of these include the seasons, the solar system, the Native timepiece of the Big Dipper going around the North Star, the atom, the raven's path across the sky visible at certain times (part of the Milky Way spiral), an eddy in the river, a whirlwind and many other examples. In each instance there is a drawing force in the center. In the Native world view, we can think of this as the circle of life. In each Native person's life the central drawing force is the self (Fig. 1). Down through many thousands of years, this is what kept the individual in balance. The energy (self) kept the values, attitudes, and traditions from being flung out. It allowed the Native individual to be constantly in communications with self, others, nature and the spirits to check on the propriety of existing characteristics of life. They knew that life is dynamic. In the process of change in the world views, many of the values have remained the same and are very applicable today.

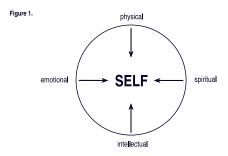
With infringements of new people from other parts of the world, came a weakening of the self with all its strengths of what to be and how to live. At first the circle remained strong. However, with the encroachment of missionaries from various Christian religions, traders, trappers, miners and explorers came diseases unknown to the Native people. Following this came a calamity surmounting any experience that the Native people have ever had. Many elders, shamans, parents, community members and children died as a result of these unknown diseases. With the loss of so many people, especially the shamans who until this time were the healers, left the Native people questioning their own spirituality. Was it really the work of the devil and his evil allies that the Native people subscribed to and believed in as the missionaries

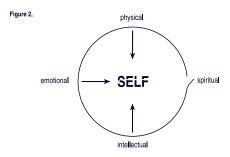
pointed out? This dealt a crushing blow to a people who had direct access and communications with the natural and spiritual worlds through their shamans. The first rent to the circle of life was in the spiritual realm (Fig. 2), and we have been suffering from a spiritual depression ever since. Alaska Native spirituality can in no way be wholly replaced by orthodox Christian religions, Eastern or other ways of knowing about a spiritual life.

Where the break occurs, one side of the curved line becomes more linear to reflect confusion. Through this break occur leaks for new ideas, values and ways of life that cause much doubt about their own world and beliefs. A maelstrom of values, beliefs and traditions result causing a confusion of what to be and what to do. The sense of self becomes weakened, thus

by Angayuqaq Oscar Kawagley

its drawing force is weakened causing some original and traditional ideas of life to be lost. The turmoil, like that of a tornado, continues. The amalgamation of Western and other cultures from throughout the world are mixed with Native traditions. Although the Alaska Native people did not readily accept modern education and religions and gave initial resistance, breaks eventually occurred. If conditions had been different, the Alaska Native





people could have controlled what was allowed into their world view. But such was not the case. The encroachment of various peoples and their cultures overwhelmed the Native people. Not only did these new people come with new ideas, but with new species of dogs, plants, domesticated animals, bacteria and viruses. This not only caused turmoil for the human beings but also caused ecological havoc. Armed with their new technological tools—hunting, trapping and fishing devices—along with

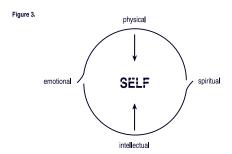
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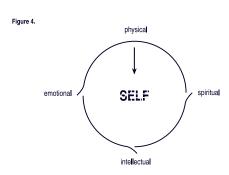
the need to make money to buy these "needed" items, the newcomers battered down sacred ideas of harmony in many Native people.

The next onslaught was in the emotional realm (Fig. 3). Not feeling good about themselves because of the message being told them by the missionaries, teachers, miners, trappers, traders, federal agents and so forth, they became emotionally depressed. They had been told that their languages and cultures were primitive and had no place in the Western or modern world. The educational system was established to dissipate and destroy their languages, spirituality and cultures. The barrage came in many forms from institutions of the colonial hegemonic force. The once proud hunter/provider and successful homemaker now felt little worth living for in their ravaged world. There was nothing promising left to allow them to feel good about themselves, have confidence for self-governance or self-reliance. Only despair was left.

The intellectual arena was the next rupture to occur in this circle of life (Fig. 4). Rationality and empiricism coupled with intuition had been the Native peoples' forte'. Nature was their metaphysic and thus they lived in reality. They had successfully devised their world view to allow them to live life with all its difficulties but developed coping tools and skills to deal with the hard times. Now with their spirituality and emotions on a downward spiral, the people became intellectually dysfunctional. They became docile and robot-like, expecting everything to be done for them. Their original clear consciousness or awareness was now unclear, as if being viewed through a stigmatized and scarred corneal lens. Things were dim, shaded, with some channels opaque and confusion followed. A framework for assimilating new experiences no longer existed.

The last fissure occurred in the





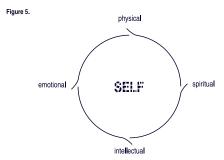
physical well-being whereby the Native people in their demoralized state became susceptible to diseases such as tuberculosis, influenza, cancer and many nutritional deficiencies and psychosocial maladies (Fig. 5). The foundations upon which a whole person was produced by the culture was now broken asunder with a new fragmented culture, a mix of many cultures represented by newcomers, producing fragmented Native youngsters susceptible to new ideas, diseases and yearnings.

The ruptures allowed some aspects of Native characteristics to flow out or become modified by allowing new fragmented ideas, ways of being, thinking, behaving and doing to seep in. This has caused much confusion among the Native people.

The Native ways of science have always been multi-dimensional to include the human, natural and spiritual worlds. This was a conscious effort to keep in balance. Everything on earth, including earth and self, was endowed with a spirit, therefore life. And because of this spirit or energy from the Spirit of the Universe (Ellam Yua), the Native people must do things in ways that no harm nor disrespect happen to life on earth. It then re-

quired that the Native people come up with elaborate rituals and ceremonies to pay homage to all, to maintain or at times to regain balance in one's life or that of the community. They had transcended the need for quantifying and establishing laws of nature.

Much of the subject matter in the schools' curricula is one-dimensional because it is linear. The vaunted mathematical and scientific disciplines and their offspring, the technologies, are often one-dimensional. These tools have the wonderful capacity for new discoveries in other worlds but because of the Western society's need to learn to control nature they lead to confusion and a feeling of being weaned from the life force and its inherit relationships. They are bereft of the values extant in the indigenous societies which open doors for new world discoveries. Western mathematics, sciences and technologies have



values, however, they are proscribed to ambition to learn in depth and greed to use this knowledge for gain. This is arrogance, a senseless and meaningless ambition, leading to the disintegration of the human experience. Through them, the more we know, the less we know about life. This says to me that Western mathematics, sciences and technologies have been superficial, never getting to the meat of things. What has been missing from the great potential of these and the other disciplines?

Part III of this article will appear in the next issue of Sharing Our Pathways.



Alaska Native Science Commission Update

The Board of Commissioners of the Alaska Native Science Commission (ANSC) held their organizational meeting in Anchorage on June 2–3, 1997. Agenda topics covered were:

- History of the ANSC
- Structure and organization of ANSC
- Discussion of goals and concerns
- Review of staff activities
- Status reports on current projects:
 - ANSC workshops
 - Social Transition in the North

by Patricia Longley-Cochran project

- Traditional Knowledge Systems in the Arctic workshops
- Contamination of Subsistence Foods Harvest project
- Pending projects:
 - Contamination of Food Sources conference
 - Traditional Knowledge Documentation project
 - Northern Native Community Development project
 - Catonal project
- Discussion of priorities
- Long term goals
- Funding opportunities
- Discussions with NSF representatives Seyfrit, Siegel-Causey and Broadbent
- Future Meetings

Following the two-day meeting, the commissioners were officially installed at a public reception held in their honor. University of Alaska Anchorage (UAA) chancellor Lee Gorsuch, Alaska Federation of Natives (AFN) vice-president Dorothy Larson, National Science Foundation (NSF) program director Carole Seyfrit and ANSC executive director Patricia Cochran gave the opening remarks and introduced the commissioners to the gathering.

Commissioner Paul John left us with these words of wisdom: "Traditional ways of knowing must be taught along with Western ways in order to avoid confusion. This confusion leads to hopelessness. Our understanding of the land allowed our ancestors to live off the land—no one needed to pack a lunch when they went away from the village."

Traditional Knowledge Systems in the Arctic Workshop

by Patricia Longley-Cochran

The Alaska Native Science Commission, with a grant from the National Science Foundation, held the "Traditional Knowledge Systems in the Arctic" workshop in Anchorage, Alaska March 12–15, 1997. This workshop involved a select group of researchers and indigenous persons who are knowledgeable and experienced in Western science and traditional ways of knowing. The group will begin planning and envisioning ideas, strategies, methods and opportunities that embody Western science and indigenous knowledge and identify and utilize diverse knowledge acquisition systems. This will assist the scientific and indigenous communities in their efforts to incorporate local and traditional knowledge with Western science and research.

A follow-up workshop will bring together a larger and more diverse group of community and research representatives, organizations and individuals involved in Alaska and Arctic research to discuss and review the information crafted in the planning workshop and make recommendations for a final report regarding traditional knowledge systems in the Arctic.

by Peggy Cowan

Alaska RSI Project Coalition

Native students. This coalition encourages its members to design their programs to provide a balanced and integrated consideration of Native and non-Native knowledge and skills, using local examples and resources wherever possible, while at the same time articulating with state and national standards.

to engage their programs in becoming more appropriate for rural

he Alaska Rural Systemic Initiative established a coalition of

organizations active in science and math education in Alaska

The coalition includes organizations and agencies from around the state who are currently working with school districts in math or science education. The membership includes the Alaska Science Teachers' Association, the Alaska Council of Teachers of Mathematics. Alaska Natural Resources and Outdoor Education Association, Alaska Science Consortium, Alaska Math Consortium, Science and Math Consortium for Northwest Schools, Alaska Department of Fish and Game's Project WILD, Alaska Department of Natural Resources' Project Learning Tree, US Forest Service, US Fish and Wildlife Service, National Park Service, Federal Aviation Administration, Alaska Cooperative Extension and the Imaginarium. The coalition will build on the work of the curriculum alignment and village science groups using this work and examples from coalition participants as samples of approaches the organizations might take.

The coalition used two meetings to develop plans to individually and collectively accomplish the goal of assisting multi-graded schools with Native students in strengthening their math and science programs and assisting students in understanding the science and mathematics identified by the state standards.

You've read about some of the

opportunities for AKRSI memorandum of agreement (MOA) partners in earlier Sharing our Pathways, including Susan Roger's article on Project Learning Tree, Stephanie Hoag's article on the Science and Math Consortium for Northwest Schools and Robin Dublin's article on Project WILD. Other coalition activities are modifying existing instructional material programs to be culturally aligned and teaming with AKRSI MOA districts to provide professional development of teachers, administrators, aides and youth. Also, supporting people exchanges between MOA district teachers and teachers in coalition organizations' projects.

A new activity that will initiate this fall is an invitation to AKRSI MOA organizations and districts to join coalition members in unit-building workshops. Coalition members will facilitate teams of Native and Non-Native educators to develop units that are culturally aligned, locally relevant, teach the content of the state standards and model research based practice. For most regions, we plan to have these workshops either before or after this fall's regional consortium meetings. We hope to assist groups that are already working on units by providing a time and a place for them to work and by contributing resources and lesson ideas from coalition members.

If you or your organization are interested in participating in the workshop in your region please contact Peggy Cowan, Alaska Department of Education, 801 W. 10th St., Suite 200, Juneau, AK 99801-1894, 907-465-2826 (phone), 465-3396 (fax), pcowan@educ.state.ak.us (e-mail).

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Aleut Region

by Moses Dirks

The Aleut/Alutiiq region has been pretty quiet this summer. We are continuing to implement the two initiatives for 1997. They are "Elders and Cultural Camps" and "Reclaiming Tribal Histories/Alaska Reawakening Project." This summer we have been in contact with both Kodiak Area Native Association and the Aleutian/Pribilof Islands Association Inc. in implementing and planning for the upcoming initiatives. The following is an update on the activities in the Aleut Region for the summer.

In 1996 the Aleut Region launched its first initiative entitled "Indigenous Science Knowledge Base." A series of meetings were held with the newly formed elders councils in both Kodiak and in the Aleutians. Meetings were held in Kodiak and in Unalaska to gather information on Aleut/Alutiiq Indigenous Science Base Knowledge. As a result of those meetings the Aleut Region produced a cultural atlas on CD-ROM—an interactive cultural atlas of both the Alutiiq and of the Aleut Region. Our memorandum of agreement (MOA) partner responsible for this program was the Oral History Department of the University of Alaska Fairbanks under the directorship of Dr. William Schneider.

The Aleut/Alutiiq elders have requested that the CD-ROM not be put on the ANKN web site since formal guidelines are not yet drafted which address cultural and intellectual property rights. As soon as it is formalized, the Aleut region coordinator will inform the public of those guidelines.

I would like to thank all those who contributed to the making of the CD-ROM for the Aleutian/Pribilof Islands Cultural Atlas. If you are interested in obtaining the atlas, please contact the Aleut region coordinator at (907) 274-3611.

Most of all, we need to acknowledge the elders councils from the

Kodiak Island area and from the Aleutians/Pribilof Islands. Without their input and knowledge of the region, the information gathering would not have been possible.

The following is a summary of the 1997 Aleut/Alutiiq Region initiatives:

Elders and Cultural Camps

An elders-in-residence program and associated cultural camps will be established in the schools and at the University of Alaska rural campuses as a vehicle for integrating Alaska Native expertise into the educational and scientific programs and services offered throughout the state. A roster of recognized experts will be assembled and made available through the Alaska Native Knowledge Network. Guidelines will be established for the protection of the cultural and intellectual property rights of Native people in areas of knowledge, tradition and practice. Native people will be responsible for defining such rights and establish mechanisms for legal protection and redress where those rights are not respected.

Unalaska Public Schools and Kodiak Island Borough School District are assisting in the development

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Dig Afognak

by Sabrina Sutton

fognak Island. This program is called "Dig Afognak." The participants include archaeologists, student interns and other interested parties. The artifacts that are found are sent directly to the Alutiiq Museum in Kodiak for identification, treatment and cataloguing.

The Kodiak Area Native Association (KANA) is in its second year of Spirit Camp. There are two sessions where registered children are flown out to the Dig Afognak site and spend about a week at the camp. KANA has cultural activities that include local Native artists, dancers and elders. It has been a success.

The Alutiiq Academy of Elders Cultural Camp was held at the Dig Afognak facilities on Afognak Island. This was funded from the Kodiak Island Borough School District (KIBSD) and the Alaska Rural Systemic Initiative. The participants included Kodiak school teachers and Alutiiq elders. The dates of the camp were August 10–August 16. The KIBSD coordinator is Teri Schneider. Teri was encouraged to do this camp after experiencing the Old Minto Camp held outside of Fairbanks.

Now you can see that life on the little island is more than just a tourist stop during the summer. ▶

Athabascan Region

by Amy Van Hatten

reetings Everyone! I hope the summer season was favorable for you. In addition to follow-ups with some of the MOA partners and other active participants, many details and suggestions have come together to demonstrate how we listen, learn, live and teach.



—Mike Marshall, fourth grade, Galena

I would like to share some thoughts expressed by Interior teachers and students this past year. First, I will include a few samples of poetry written by Galena teachers after a Project WILD field trip in minus 27 degree weather last October. Following is a short essay about elders written by a Galena City School fourth grader last April in response to stories about local

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of multimedia curriculum materials and also assist in the formation of a Native teachers association within the regions. Aleutian/Pribilof Islands Association Incorporated and the Kodiak Area Native Association are hiring graduate assistants to help organize the formation of an Aleut Academy of Elders, Aleut teachers association and an Aleut cultural camp program.

Reclaiming Tribal Histories/ Alaska Native Reawakening

The Reclaiming Tribal Histories/ Alaska Native Reawakening Project will be coordinated by Harold Napoleon of AFN with assistance from the Aleut regional coordinator. Two communities in the Aleut/Alutiiq region will be selected, preferably one community from the Unangan's Region and one from the Alutiiq Region.

Once this reconstruction is complete, related villages would have the

opportunity to share all they have been through. For many, it will be the first time things long held in their hearts and minds will have been bared. They will have a clearer understanding of themselves and will begin to make sense of the sometimes insensible things that have happened. They will also gain a greater understanding and appreciation of the strengths and accomplishments of their people, along with clearer ideas on what to do to begin solving the problems.

In conclusion, I am indebted to the Unangan/Alutiiq people for giving me the opportunity to work with them for this short time. In August of this month I will be taking a teaching job at Unalaska City Schools. The co-directors are in the process of filling the regional coordinator position. I wish to thank everyone for their support and encouragement. I wish you all luck and success.

weather patterns, subsistence foods, games and observations.

Animal Poetry

by Jenny Pelkola

Didn't see you bird
but I knew you were near
How did I know, you ask?
I know-because
Since the beginning of time
This has been your natural home
What made you stay away
On a beautiful day like today?
Perhaps it was my intrusion
On your beautiful homesite
Or perhaps, you were just a flying about.

Red Poll Reflection

by Charlaine A. Siefert

Blue sky Soaring undisturbed above my head Feathered ice crystals reflecting gold in winter air

Alone
The bird and I
Caught in a circle of time
Pause to reflect on
Infinity

He, with a red cap that matches my nose

I, with a hunger that matches his song Red Poll

Elders

by Harold Warner

I am writing about elders when they were kids. I am writing about myself. These are some things that the elders eat: moose, bear and rabbit. These are things that I eat: fish ice cream, chicken and fish. These are things that the elders did. They used to slide down the bank. They used to throw a ball back and forth over the roof. I slide down and cut wood for fun. I try to make a fish wheel. Now I am done writing about myself and the elders

Thank you for your valuable time. Happy trails. 🔪

Yup'ik Region

by Barbara Liu

Subsistence fish and plants. I finally had a chance to bring fish strips to the recent staff meeting at Howard Luke's Gaalee'ya Spirit Camp on the Tanana River. At the University of Alaska Fairbanks (UAF) campus, we went over both Sean Topkok (AKRSI Indigenous Curriculum Specialist) and Beth Leonard's (Alaska First Nations Research Network Coordinator) work. They are compiling a clearinghouse of indigenous curriculum that will eventually enable everyone to tap into through the computer. Dave Krupa is back. He gave us a tour on a computer sample of Indigenous Science Knowledge Base that the Aleut region worked on last year with their elder council.

Ray Barnhardt and a number of others have developed a draft outlining the Alaska Standards for Culturally Responsive Schools (included in this newsletter). The outline is designed for rural students, teachers, curriculum and schools. It will be on the agenda at the Standards Forum meeting scheduled on September 24th

in Anchorage.

Our region under AKRSI is rotating on our second year themes of Y/Cup'ik Ways of Knowing and Culturally-Aligned Curriculum Adaptation. This year we are sponsoring regional consortiums involving memorandum schools. Last year several state consortiums were held in Anchorage and

Sitka. Our region was well represented with various school personnel and elders. At the last staff meeting in July, we tentatively scheduled the first round of five cultural regional consortiums. The Yup'ik regional consortium is tentatively scheduled for the week of October 13, 1997. Peggy Cowan will be working with our region this coming year. A teleconference to plan for the fall consortium has been arranged.

Lastly, I hope everyone had a good summer with your families. Teachers and students are getting back in classrooms for another school year of activities. With spring and summer products put away ready for use, the following are a few more supplies to collect for a variety of scientific and mathematical activities students can be engaged in. Different types of wood/driftwood used for carving utensils and tools, bundles of grass, moss for its multiple use, good mud for stories and edible and medicinal products such as labrador tea, roots and stinkweed. Nature has so much to offer—thankyou. Until next time, tuaingunricugnarquq! 🔪

A "New" Old Way of Understanding

by Joe Slats

uring the summer of 1997, Kuskokwim Community College in Bethel offered a class entitled *Education 693: Native Ecological Education.* This class was taught by Yup'ik Native elder professors. The elders told the class stories illustrating old traditions, old ideas and old ways of looking at things. As Yup'ik/Cup'ik people of the 90s, students found some of the old ways difficult to comprehend.

The here and now Y/Cup'ik people were brought up in Western schools with Western thought. When we lis-

ten to our elders speak, we listen with our Western ears and use our Western analogies to attempt to comprehend what our forefathers did. Stories told to the class by our elder professor Louise Tall, and our responses to them, are an example of how we as Y/Cup'ik people attempt to translate and comprehend these old Native thoughts and customs.

In order to understand some of the concepts and ideas behind our ancient traditions and customs, we had to try to set aside Western thought processes. We found this to be diffi-

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cult. One of the ideas was that of rewards from the gratitude of orphans and elders. This gratitude is said to be strong or to have power. There is a relationship between the decisions one makes when young to help those in need and the rewards one may reap as an older person. This is the power of the gratitude of the orphans and elders one has helped in the past. The linear thinking of the Western world makes this a difficult concept to comprehend.

Another story Louise Tall told was about the idea of "pretend husband and wife." She told how some young Yup'ik males and females created a "pretend husband or wife." These young individuals would see a person entering through a window to be with them. They would begin to keep themselves clean and to look forward to the evenings with their pretend spouse. They would carry on conversations with this "imaginary" person and not pay attention to other human beings around them. It is said that one female took off to the tundra with her nonbeing male mate. She was not seen or heard from again until a young bowand-arrow hunter found her next to a lake. She had a drying rack with tellegcarags (small swimming birds) and augtuarags (red water birds) carefully skinned and drying. These birds had been caught by her pretend husband and in her mind they were loons. Therefore she had skinned them and hung them to dry.

At one time an individual used ayuq (Labrador tea) to tepkegcaq (smoke herself as perfume) prior to the evening visit of her pretend husband. The male non-being arrived and "Ayurutaanga" (to block the way or entrance). It was learned that smoke was to be used to block the way of non-beings. Other human beings heard the non-being say "Ayurutaanga."

After hearing this story, the class attempted to analyze and comprehend

it. With our Western ways of thinking we concluded that perhaps the young adults in the story were suffering from some form of mental illness.

Louise also discussed shamanism through a number of stories. It became apparent that the shaman played a very important role in the lives of the Yup'ik people long ago. After the arrival of the missionaries, shamanism came to be referred to as "Satan's agent." Western thought has turned what used to be a very important tradition and religion into an unaccepted and evil practice. Here and now Y/Cup'ik people, raised with Western thought, must struggle to make sense of ancient practices and customs. In a short discussion regarding whether shamanism would ever return to the delta, it was felt that perhaps it is too big of a leap for the church community to accept. The elders within the church community are still struggling with the concept of allowing Eskimo dancing to enter their villages. The group felt that a return to some of the shamanistic ways is an important idea and that it will be too late if it must wait for the elder community to accept its reintroduction. The knowledge will be lost or kept from being handed down.

As modern day Y/Cup'ik people living in the 1990s, we have been taught Western ways of thinking and looking at things. If we are to truly understand the lives, stories, thoughts and wisdom of our elders, we must relearn the skills of hearing with Y/Cup'ik ears and seeing with Y/Cup'ik eyes.

ANKN Welcomes Indigenous Curriculum Specialist

Hi! My name is Sean Topkok. I am the Indigenous Curriculum Specialist for the Alaska Native Knowledge Network. Alaska Rural Systemic Initiative has a partnership with the Arctic Research Consortium in the US (ARCUS) to share my position.

As part of my work, I compile, catalog and distribute indigenous curriculum resources. The resources are put into a database which will eventually evolve into several CD-ROMs. Those who have access to the WWW are able to search the database, which is continually updated. The URL is http://uafcde.lrb.uaf.edu/ankn/cbcr.html.

I am Iñupiaq Eskimo/Irish/Norwegian. My Iñupiaq name is *Asiqluq*, named after one of my great-uncles from Teller. My wife Amy and I have a son, Christopher, who will be three years old in October. If you have any resources that you would like to include in the database, you can reach me at (907) 474-5897 or at my e-mail address: fncst@aurora.alaska.edu.

Iñupiaq Region

by Elmer Jackson

gathering sponsored by the Northwest Arctic Borough School District, the American Indian Science & Engineering Society, the National Science Foundation and the Alaska Federation of Natives is to take place on November 20–22, 1997.

Ambler will host the first regional Native Science Fair. Many students in the Iñupiaq and the Athabascan regions will enter Native science fair projects. These projects will have Native science themes. For example one student's project might be the study and development of a scale model of a mudshark (tiktaalig) fishtrap. In the fall, after freeze-up, the Kobuk River people build mudshark traps utilizing long spruce poles. The poles are formed into a circular, square or diamond shape that serves as the trap or holding area for the trapped fish. The Inupiat key to the successful fishing technique is the trap: a one-way entrance made of willow. Once the fish enter, they cannot get back out. They remain in the holding area.

Other science projects might be the process of tanning muskrat skins or the study and research of traditional medicines. The list of possible science fair projects are numerous. The students will need many research questions answered. We ask for help from the elders and parents to teach the children in the Native way of knowing and teaching.

We do not realize that we are involved in science in our daily subsistence way of life. Whether it be trapping, fishing or hunting, science is present in all of the parts. The Iñupiaq translation of science, according to Rachel Craig, is *supayaat kaniqsisautaat*. It translates simply, "everything that the Inupiat understands or knows." Indigenous knowledge is a precious source of

information for survival in the Inupiat subsistence way of life. Presently our elders are the bearers of that indigenous knowledge. They will share their knowledge during the districtwide subsistence curriculum development workshops. This documented information will lead to the development of curriculum for use in the classroom. The school districts that will participate in the development of indigenous Inupiat curriculum are the North Slope Borough School District, the Northwest Arctic Borough School District and the Bering Strait School District. The school districts will participate in the regional Academy of Elders during the district-wide subsistence curriculum development workshops. Every aspect of the Inupiats' subsistence practices will be documented.

Another objective is to involve the

Native educators and to establish a Native teachers association whose membership will include the bilingual teachers. This association will create and develop lesson plans that will be shared with other teachers in the Iñupiaq region. The Bering Strait School District will also implement St. Lawrence Island Yup'ik and Iñupiaq studies materials documentation.

Ilisagvik College and Kawerak, Inc. will provide support for the documentation of Iñupiaq Ways of Knowing and Teaching. The documented information can serve as the basis for the teaching of all subjects in the schools. The college will participate in the development of a prototype curriculum framework based on Iñupiag cultural precepts and principles which will be shared with the other districts in the Iñupiaq region. The North Slope Inupiat Educators Association which will provide guidance for the implementation of an Iñupiaq Academy of Elders, drawing on the support of the Ciulistet Yup'ik Teachers Association and the Association of Interior Native Educators.

If you have any questions, please call. You can reach me in Kiana at (907) 475-2257 or fax the AFN office at 276-7989. Thank you. ▶

A Gathering: Growing Strong Together

by Elmer Jackson

Gathering: Growing Strong Together—United We Will Make a Difference planned by John Stein, Jr and Maniilaq staff was a successful conference—one could notice something positive happening. The nature of the Inupiat caring for one another is one of the values that they have practiced for time immemorial. It was held in Kotzebue June 30–July 3, 1997 and hosted by the Growing Strong Together Committee of Maniilaq Association.

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Southeast Region

by Andy Hope

The Cultural Atlas Design Team has been very busy this year. The team met in Juneau in early July. The following members participated: Dolly Garza, Sitka; Jim Parkin, Angoon School; Tom Thornton, Jimmy George and Mike Ciri, UAS; Sue Stevens and Michael Travis, Sealaska Heritage Foundation; and yours truly. The meeting was facilitated by David Krupa of the UAF Oral History Department. The team decided to organize site teams which will design prototype "modules" to link with the Alaska Native Knowledge Network on the World Wide Web.

The Sitka team will attempt to work with the Tlingit country map or develop a similar Haida map. The Angoon team will work with the Angoon Tlingit place names. The Angoon place name project has been developed by the Southeast Native Subsistence Commission and the Angoon Community Association. The Hoonah team may work with the re-

vised Tlingit Math Book. The Juneau team will work with the Sealaska Heritage Foundation home page and the Axe Handle Academy curriculum.

The team recommended that AKRSI assist Angoon School in their efforts to gain internet access. The team also stressed the need for teamwork and coordination among the AKRSI technology team.

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Maniilaq Association reports that we have become very unhealthy; our people struggle with alcoholism, drug abuse, grief and post traumatic stress disorder while living among diverse cultures: "The time has come to educate ourselves so we can understand why and how these problems have changed our thinking and behavior." There is hope: "gatherings of this sort will help us get our lives back on track to become healthier, happier and to better manage all our affairs." At the beginning of each day an elder opened the conference with a prayer and the lighting of the seal oil lamp by elders May Bernhardt and Mildred Sage. The seal oil lamp symbolizes welcome, unity and hope for the future. The power of spirituality among the

Inupiat is tremendous. Inupiat tribal doctors were present to see patients; traditional healing occurred during the conference. Many visitors attended the conference; one of the presenters told the audience that she had seen the tribal doctors Truman Cleveland and Chris Stein, Sr. and had experienced healing results.

Keynote speakers included Mabel Smith, Clara Segevan, Morris Wilson, Mary Ann Wilson, Tom Smith and John Schaeffer. There were a variety of family classes offered. Many of the them focused on healing, trust, communication and drawing strength from each other. On the last day a potlatch of *niqipiaq* (traditional Native food) was served to the participants.

I attended several meetings over the last few months in an attempt to develop a certificate for Tlingit language teachers. I am optimistic that a program will be in place by the end of this year. It appears that Yukon College will be a key player in this effort. Sealaska Heritage Foundation will serve as the lead entity on this side of the border.

The Alaska Science Consortium sponsored a review of the draft *Tlingit Seaweek Book* on July 28–29 in Sitka. Teachers from across Alaska participated. The team renamed the book, *Lein-git—Tides People: The Tlingit Moon and Tides Resource Book*. The group plans to complete the book by mid-November 1997. Dr. Dolly Garza is heading the editing group.

The AKRSI Southeast Region Elders Council met July 30–31 in conjunction with the Fourth Conference of Tlingit Tribes and Clans. The conference themes were Native Family/Community History and Native Languages. The language workshop participants made a number of editorial changes to the Traditional Tlingit Country map and tribal list. A revised map and list will be published this fall. The next conference will take place in early spring 1998 in either Sitka or Juneau.

Our first Southeast Region planning meeting will take place in early October in Juneau. All southeast consortium partners will be invited to attend. Participants will chart the course for the next year of the AKRSI/ARC.

Correction: In the previous issue of *Sharing Our Pathways* (vol.2, issue 3), we mistakenly identified the photo on page 14. The photo is of Mary Beth Duncan of Angoon. Our apologies to both Mary Beth and Sabrina Sutton for the mistake.

Statewide Upcoming Events

- * The Alaska Native Education Council will be meeting in Anchorage on October 5–7, 1997 at the Westcoast International Inn.
- **✗** AFN Elders' and Youth Conference begins on October 20−22, 1997 in Anchorage.
- X AFN Conference begins half day October 22 and continues all day October 23–25, 1997 in Anchorage.
- X AFN Reception and Banquet is on October 25, 1997.
- X Annual AFN Arts & Crafts Fair is from October 23 through 25th, 1997.

- * Festival of Native Arts Logo/Poster Contest entries due October 15, 1997. Send entries to Festival of Native Arts, University of Alaska Fairbanks, PO Box 756300, Fairbanks, Alaska 99775-6300 or call (907) 474-7181 for information, rules and guidelines.
- X QUYANA ALASKA—Native Dance group performance is on October 22 at the Egan Center in Anchorage.
- * Commissioner Holloway announced that a search has begun for the 1998 Alaska Teacher of the Year. Nominees must be from an Alaska public school; school districts submitting nominations locally with the help of a selection team made up of parent, administration, teacher, student and business or community leader. Nominations can be made to the local selection team by any Alaska citizen. These should be sent into the Department of Education no later than October 24, 1997. There are many excellent teachers in our midst; let's let others know who they are and spotlight them.
- ★ The following are tentative weeks for the fall regional meetings. Check with your regional coordinator to confirm: September 29, Southeast Region; October 13, Yupik Region; October 27, Athabascan Region; November 17, Iñupiaq Region; December 1, Aleut/Alutiiq Region

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