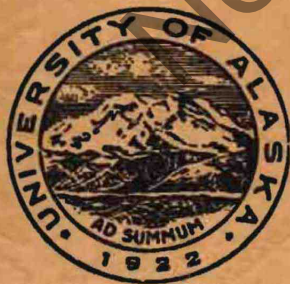


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STABILITY IN ESKIMO NAMING OF BIRDS ON CUMBERLAND SOUND, BAFFIN ISLAND

by

LAURENCE IRVING

It is not surprising that hunters should study the prey upon which their livelihood depends, but it has been interesting for me to verify that inland Alaskan Eskimos know every species of their birds even though only a few of them are significant for food (Irving, 1953 and 1958a). In western arctic America this comprehensive and explicit information about a numerous category of natural objects appears to be coded in specific Eskimo names that constitute phonal keys to a highly cultivated system for storing information in memory. By the use of this nomenclature the information is communicated in conversation and can be transmitted from generation to generation.

I was able to inquire how the eastern Eskimos identify birds while I was with an expedition, led by Dr. J. Sanford Hart for the National Research Council of Canada, for studying reactions to cold among the people at Pangnirtung on Cumberland Sound, Baffin Island, in March and April 1960. I was impressed to find that they recognized and named nearly all species of birds of Cumberland Sound, and I found many resemblances between the names used at Pangnirtung and Eskimo names familiar to me in Alaska. Since Ludwig Kumlien (1879) recorded Eskimo names used for birds at Cumberland Sound 100 years ago, I could also see whether changes in nomenclature had occurred there during a historic period. I was surprised by the evidence of stability of the unwritten Eskimo language, for like most scientists I am dependent upon written catalogs, tabulations, and other indices that are the poor substitutes for my memory of images of living birds.

In March and April 1960 there were few birds about Pangnirtung; and being engaged indoors on physiological studies, I saw only rock ptarmigan (*Lagopus mutus*), snowy owls (*Nyctea scandiaca*), ravens (*Corvus corax*), and a few snow buntings (*Plectrophenax nivalis*) which first appeared before the middle of March. Yet without ability to speak Eskimo I was able to learn from Eskimos who did not speak English that we could agree upon our certain recognition of 38 species, and that we probably knew about 5 more that we were unable to specify because I could not describe them with sufficient accuracy. We had the help in translation of Dr. H. B. Sabeen (Dalhousie University), who is an accomplished student of Eskimo language, some illustrations, and I was familiar with the reports of naturalists who had earlier visited Baffin Island. The discussion and confirmation of our birds proceeded with the extensive use of pantomimes of birds' habits which Eskimos are so keen to appreciate,

and for some species I could suggest the sounds of their calls. Although our gestures and sounds were mere caricatures, we could, nevertheless, appreciate their meaning.

The Eskimos apparently recalled images of the real birds without the intervention of the mnemonic aids of writing and abstract relations that we employ. They were as pleased by my interest for their birds as I was delighted by their hearty enjoyment at sharing the information and the scenes that it recalled, with the result that I quickly gained a happy sense of familiarity with the life of a country in which I had been a stranger.

Informants

My informants at Pangnirtung were Etwanga and Paulosee. Paulosee, aged 32, had recently become a resident of Pangnirtung, but he had lived before as a hunter in camps about Cumberland Sound. Etwanga, aged 54, had been a resident of Pangnirtung for about 20 years as assistant to the medical officer. He had formerly been a hunter and was well acquainted with the people and conditions about Cumberland Sound. Neither man spoke or read English. I chose them as responsible and agreeable men with whom I came in daily contact. During our discussion it was apparent that they were deeply interested in the birds of their country, but I doubt if they were eminent in the community for their knowledge of natural history.

Method of Interrogation

Paulosee and I talked with the help of Dr. Sabeau to interpret English and Eskimo. Dr. Sabeau had been a medical officer in the eastern arctic for some years, and he knew and liked the people as well as their language. He gave more detailed explanations of questions and answers than is usual in translation. As a physician among Eskimos he was familiar with the errors produced by unskilled interrogation, and he carefully screened my questions to reduce the stranger's tendency to suggest answers. Two other Eskimo men, Apa and Amosee, who were present were called upon to some extent for references, but in the main Paulosee answered directly from his own knowledge.

For illustrations we had Peterson's "A Field Guide to the Birds" (1947). If I were not sure that the illustrations were clearly recognized, I could often verify identification through questions about size, habits, sounds, dates of appearance, and likely habitat of the species. After I had become satisfied with the identification of a species with its Cumberland Eskimo name, I mentioned names as I had learned them in Alaska. They were recognized as being either alike or different in sound. In refreshing manner, Paulosee refused to guess and occasionally asked me to revise questions so that he might give his own answer. When I dwelt upon a

description of the pintail duck (*Anas acuta*), Paulosee informed me that my bird looked like a very fine duck and that he would like to see it on Cumberland Sound but that he knew nothing about it.

The conversation with Etwanga proceeded similarly, but occasionally another Eskimo listened for a few minutes. Etwanga seemed ready to add more description, perhaps because his age gave him greater authority. His recognition was certain, and he either gave a name promptly or refused to acknowledge recognition until his doubts were settled. He was puzzled about the illustrations and my poor definitions of species of sandpipers.

Number of Species in the Avifauna

Southeastern Baffin Island was first visited by Martin Frobisher in 1576. It subsequently became an American landfall for the long sequence of British, European, and American whalers and navigators coming to arctic America from the Atlantic Ocean, but they left few records for natural history. Ornithological surveys about Cumberland Sound were made by Kumlien (1879) and by Hantzsch (1914). J. D. Soper (1928) reported on his observations made from 1924 to 1926 and reviewed earlier observations listing 85 species that he or other scientists had reported in the southeastern part of Baffin Island. The area considered by Soper extended beyond the range of Eskimos from Cumberland Sound, and his list included some reports of birds so rare or even conjectural that they would not be designated as normal to the avifauna.

In the various reports I would count Baird's sandpipers (*Erolia bairdii*) and white-rumped sandpipers (*Erolia fusciollis*) as species normal to Cumberland Sound that Etwanga, Paulosee, and I could not distinguish. Each of them gave 3 names for small sandpipers, but I could not describe their appearance well enough to be sure of the species referred to. I believe, however, that Etwanga was satisfied that we both agreed upon identification of the semipalmated sandpiper (*Ereunetes pusillus*) by its manner of calling in flight. I could only define one kind of redpoll (*Acanthis*) in terms of obvious characters. Etwanga and Paulosee did not distinguish the three jaegers (*Stercorarius pomarinus*, *parasiticus*, and *longicaudus*) by different names. One name, Isungak, was used for the three species which resembles that widely used by Alaskan Eskimos for jaeger. Both of them knew that jaegers appeared in several forms but did not seem to have considered whether the difference explicitly differentiated them. Thomas Brower of Barrow (Irving, 1960), Simon Paneak of Anaktuvuk Pass (Irving, 1953), and Charles Sheldon of Kobuk (Irving, 1958a) differentiated three species of jaegers. Paneak and Brower, however, are eminent among Eskimos for their knowledge of natural history.

I estimate that about 45 species would be in the range of view of people around Cumberland Sound. Etwanga designated 38 to me (Table 1). If we could spend a summer together observing real birds and if we were

as diligent and fortunate as the eminent earlier naturalists, I believe that we would find 45 species.

History of Ornithological Information from Cumberland Sound

In the late summer of 1877 Ludwig Kumlien (1879) went with the Howgate Expedition of the United States to Cumberland Sound where their schooner wintered and remained frozen in until the next summer. Most of the time the crew of the little schooner were confined by rough ice to a very limited outlook, but Kumlien used his opportunities like a keen naturalist to prepare a valuable anthropological survey of the Eskimos and a biological survey of birds and mammals of Cumberland Sound. His descriptions aptly quote information obtained from Eskimos, and he was at pains to give 25 Eskimo names for birds (table 1) from Cumberland Sound. In July 1878 the schooner took 16 Eskimos from Cumberland Sound to Godhavn, Greenland, where Governor Fencker, an able and enthusiastic naturalist, and other Danish officials helped Kumlien to acquire information about the birds of Greenland. On Disko Island the Cumberland Eskimos pointed out the turnstone (*Arenaria interpres*) as one of their birds which Kumlien had not seen on Baffin Island. They recognized the ringed plover (*Charadrius hiaticula*) on Greenland and knew that it and the semipalmated plover (*Charadrius semipalmatus*) were different and that both nested on eastern Baffin Island. They told him that cormorants (*Phalacrocorax carbo*) had become rare on Cumberland Sound. These cormorants have not been reported there since Kumlien's time, but they are still found in southwest Greenland, where Salomonsen (1950-51) writes that they are now known by the Eskimo name that Kumlien said was common in 1878 to the Eskimos of Greenland and Baffin Island. Important parts of Kumlien's valuable information are attributable to his discretion and competence in communicating with the Eskimos.

In 1912 Bernhard Hantzsch (1914) was wrecked in Cumberland Sound and lost most of the equipment that he had privately collected for an exploration of Baffin Island during which he planned to cross from the head of Cumberland Sound to the shores of Foxe Basin. Kumlien had remarked upon the importance that this traverse would have for natural history and had given suggestions as to the routes which the Eskimos recommended. After many difficulties Hantzsch assembled inadequate stores for his expedition and set out upon the traverse with the help of local Eskimos. Eventually he reached the shores of Foxe Basin with an Eskimo family who in kindly fashion helped him to travel westward along the barren coast. In late summer, illness and scant food had so weakened him that he had to turn back. In spite of the care of his Eskimo friends, he perished, but they faithfully preserved his journal with its valuable survey of the country and its fauna. Hantzsch reported Eskimo names for 30 species that he saw (Table 1).

History of Stability in Eskimo Names of Birds

Individual Eskimos differ in their ability to discriminate species. When I have had time to become acquainted in an Eskimo village, I have found several influential older men and women who were familiar with the species in their surroundings. Kumlien (1879, p. 83) remarked that although Cumberland Eskimos discriminated between the similar semipalmated (*Charadrius semipalmatus*) and ringed (*Charadrius hiaticulus*) plover, "they confound all the larger gulls under one name." Indifference to related species is not characteristic of all Eskimos, for Etwanga clearly recognized and named for me 4 gulls and a tern (Table 1). Simon Paneak of Anaktuvuk Pass named 4 gulls and a tern (Irving, 1953) as did Charles Sheldon at Kobuk (Irving, 1958a). Etwanga did not designate the 3 jaegers specifically although he recognized differences among them. I have found that it takes long acquaintance and discussion before an Eskimo and I finally understand each others' discrimination of some species, but even trained ornithological colleagues cannot always communicate their recognition of some species without debate. It is sometimes a slow process to discover the knowledge of another person.

It is nevertheless remarkable that these diverse naturalists communicating with Eskimos in languages that are basically so different should come out with Eskimo names written according to their English or German tongue (table 2), which are still obviously the same for most species. A stable convention in nomenclature, especially if it is unwritten, favors accurate communication and cannot be accidental or erroneous.

We should realize that writing introduces a manual process for accumulating errors between the mental acts involved in perceptions and their storage in memories. After reading a list of 25 Eskimo species names attributed to Hantzsch by another author, I noted that 4 names differed from those given by Etwanga. But when I consulted the German publication of Hantzsch's journal records, I found 27 birds named like Etwanga's and only 3 were different. I have not searched to see whether I introduced the error in my first hurried copy.

I think that we can eliminate the likelihood of error in the identification of species. When I uttered Paneak's names to Etwanga, errors in communication probably crept in to increase the appearance of difference. Etwanga's recognition of 19 out of 32 of Paneak's names cannot, however, be either fortuitous or erroneous and is significant of their common relation in the use of language.

Anaktuvuk Pass and Pangnirtung are over 2,000 miles apart and separated by 80 degrees of longitude at an arctic latitude. This geographical separation suggests a long duration of time in which a large resemblance in the naming of birds has persisted in these far separated Eskimo communities.

TABLE 1. *Names of Birds of Eastern Baffin Island*

Species	Kumlien	Hantzsch	Soper	Etwanga
(AOU, 1957)	(1877)	(1912)	(1924)	(1960)
<i>Gavia immer</i>	Toodlik	Tullik	Tudlik	Tudlik
<i>arctica</i>	Codlulik	—	Kudlulik	Kaglulik
<i>stellata</i>	Kuksuk	Kaksau	Kokson	Khaksau
<i>Fulmarus</i>				
<i>glacialis</i>	Oohudluk	Kakkordluk	Oohudluk	Khakhudlo
<i>Phalacrocorax</i>				
<i>carbo</i>	Okaitso	—	—	—
<i>Olor columbianus</i>	—	—	Kuodjuk	Kogjuk
<i>Branta canadensis</i>	—	Nerdlek	—	Nidlerk
<i>bernicla</i>	—	Nerdlernak	—	Nidlerngnak
<i>Chen hyperborea</i>	—	Kangu	Kungo	Kango
<i>Clangula hyemalis</i>	Agingak	Aggek	—	Agerk
<i>Somateria</i>				
<i>mollissima</i>	Metuk	Mittek	Metik	Miterk
<i>spectabilis</i>	Kingalalik	Kingalik	Kingalalik	Kingalalik
<i>Mergus serrator</i>	Pye, Pajk	Pai	Pyle	Paerk
<i>Falco rusticolus</i>	—	Kigavik	—	Kingnuaiuk
<i>peregrinus</i>	—	Kigaviarsuk	Kikkeveokjuk	Kikaviarkjuk
<i>Lagopus lagopus</i>	Akagik	Akkigirk	Arkagik	Akigikvik
<i>mutus</i>	Akagik	Niksartok	Arkagik	Akigerk
<i>Charadrius</i>				
<i>semipalmatus</i>	Koodlukaleak	Kullekulliak	Kudlekaleak	Kudlikuliak
<i>Pluvialis</i>				
<i>dominica</i>	—	Ungalitti	—	Toodlik
<i>Arenaria</i>				
<i>interpres</i>	Telligvak	—	Tellevak	Talikbak
<i>Ereunetes</i>				
<i>pusillus</i>	—	Livilivilakulluk	—	Livilividlak
<i>Phalaropus</i>				
<i>fulicarius</i>	Shatgak	Sagak	Shutgak	Jakjak

Species	Kumlien	Hantzsch	Soper	Etwanga
(AUO, 1957)	(1877)	(1912)	(1924)	(1960)
Lobipes lobatus	Shatgak	—	Shutgak	—
Stercorarius				
parasiticus	Ishungak	Issungak	Ishungak	Issungak
pomarinus	Ishungak	Issungak	Ishungak	Issungak
longicaudus	Ishungak	Issungak	Ishungak	Issungak
Larus hyperboreus	Nowgah	Nauja	Nowyah	Nauyak
argentatus	Nowgah	—	Nowyah	Tasermiuktak
Pagophila eburnea	—	—	—	Kanirk
Rissa tridactyla	Nowavah	—	Nowyavah	Nowyava
Sterna paradisaea	Emukitilak	Immerkotailak	Emakatilak	Imerkotailak
Cephus grylle	Pesholak	Pitsiulak	—	Pitsiolak
Uria lomvia	Akpa	—	—	Akpak
Plautus alle	—	—	—	Akpaliakjuk
Nyctea scandiaca	Opigjuak	Ukpikdjuak	Opigjuak	Ugpigjuak
Corvus corax	Tudluak	Tullugak	Killugak	Tuluak
Eremophila				
alpestris	—	Mannorodligak	Tingodluktuk	Tinguluktuk
Oenanthe oenanthe	—	Erkoligak	Ekuligak	Erkogudligark
		Avioktuk		
Anthus spinoletta	Kung-nuk-took	Nedliayok	Kungnuktuk	Siusiuk
		Kernertak		
Acanthis flammea	Anarak	Saksariak	—	{Kaingak Sirksigiak
Calcarius				
lapponicus	Kiologak	Kaoligak	Kowlegak	Kaugudliark
Plectrophenax				
nivalis	Kopenuak	Koppanoak	Kopenuak	Kopenoavik

TABLE 2. *Resemblance of Eskimo Names in Earlier Reports to Those Given by Etwanga at Pangnirtung*

Source	Like	Unlike	Resemblance (percent)
Kumlien, 1877	22	2	92
Hantzsch, 1912	27	3	90
Soper, 1924-26	24	1	96
Alaska, 1953 (Irving)	19	13	59

Differences in Eskimo Names from Other Localities

Likeness and difference in language can be related to the degree of cultural divergence among its users. In a list of 99 names for birds given to me by Kutchin Indians in arctic Yukon Territory (Irving, 1958b), I could only see that two or three might sound like names given to those species by Eskimos in nearby Alaska (Irving, 1958a). In this respect the two people were completely different. In contrast, the extent of differences among names used by various groups of Eskimos appears small. I believe, however, that accurate comparison of these differences will show traces of the history of cultural change among the different groups of Eskimos.

Forty to fifty species of birds are to be found alike and common in many American arctic localities. For the vicinities of 10 Eskimo communities I have examined lists of the avifauna prepared by naturalists whose identifications of species I could ascertain. These ornithologists were also in a position to know the local Eskimos, and each has reported names for at least 30 of the widespread arctic species. Among 13 common arctic species I found that 4 were named alike in all 10 localities, 4 were alike in 9 localities, 3 in 8 localities, and 2 in 7 localities. The authors used various conventions in spelling Eskimo sounds and did not prepare the names for the purpose of my comparison. Nevertheless it is evident that this groups of species is named much alike by Eskimos across the arctic.

In another group of 17 common species, I found resemblances in the names used across the arctic in from 7 out of 10 for some species to only 3 out of 10 for others. Some of the variations in names of a species appeared to distinguish eastern from western usage, but a common geographical system of variation in naming was not evident. There appeared, for example, 7 different names for the widespread and abundant lapland longspur (*Calcarius lapponicus*) and for the rather common water pipit (*Anthus spinoletta*). It is possible that some species receive different attention that leads Eskimos readily to give them special names.

Many ornithologists are now working among Eskimos, often in association with anthropologists. Within a few years accurate lists of Eskimo

names for birds will become available from many localities and well designated Eskimo groups. With this information new evidence will appear to indicate the geographical distribution of cultural deviations among Eskimo societies. Chronological sequences of contact and separation may also appear through comparison of deviations in the use of language.

Influences for Cultural Change on Baffin Island

The contact of Eskimos with white men has changed the material and implements by which these arctic people subsist. The intervention of white people in Baffin Island has also fluctuated according to interests completely irrelevant to those of the Eskimos and their country. After Frobisher's contact with the Island began in 1576, the expeditions of explorers passing along the coasts occasionally brought in goods and implements which were profoundly different from any in Eskimo experience. A few Eskimos temporarily joined the crews of explorers.

As early as the explorers, whaling ships came from Europe, Britain, and later from America to the waters of Davis Strait. Many of them engaged assistance from Eskimos whom they paid in objects of trivial cost but which, like knives and needles, were novel and of great use to Eskimos. Several stations in Cumberland Sound, established for whaling and rendering oil, at times employed a large share of the local population, contributing to them foreign material and implements. To an unknown extent white and Eskimo blood intermingled, for these social relations between the races are not accurately discussed in the records of trade. Kumlien (1879) observed that venereal disease had been introduced by the whalers and that lung disease probably killed more Eskimos than all other diseases combined. Early in the 1900's, the near extinction of bowhead and right whales in the North Atlantic and the decreasing value of whale oil and whalebone rather suddenly terminated whaling.

At about this time the fur trade expanded vigorously into the arctic and for about 30 years the traders' payments for furs enormously increased imports to the arctic coasts and islands. For a time some Eskimos were wealthy. About 1930 the brief richness of the arctic fur trade was suddenly deflated to a fraction of its former values.

A few missionaries zealously spread their creeds, sometimes in competition with each other that had a disruptive influence upon Eskimo societies. Old British and European folk tunes accompanied by accordion and fiddle were skillfully adopted to lead the complicated steps and figures of the lively jigs and reels that Eskimos must have learned from the vigorous old sailors and fur traders. But it is a sad loss that Eskimo vocal music, the accompanying drums and the formal and, for them, classical dance figures that are still popular in Alaska are not now evident about Cumberland Sound, where their cultivation appears to have ceased. It was to

the benefit of the Eskimos that the influence of their unprincipled shamans dwindled. Erratically at first, but recently to great effect, medical care has treated indigenous ailments and has begun to counteract some that have been introduced from our civilization.

These examples illustrate marked changes in the ways of Eskimos, some of which came about suddenly. The material used by Eskimos has been profoundly modified, and some aspects of their social activities have changed. Although for several hundred years powerfully equipped and organized parties of foreign explorers, whalers, traders, missionaries, and scientists have exploited the few poor inhabitants of Cumberland Sound they have adhered to the old Eskimo concern for knowing their own natural surroundings accurately.

Completeness of the Eskimo identification of birds and precision and stability in their nomenclature is in contrast with popular customs in Europe and America. During the centuries since scientific naming of animals began, scientific accounts of European and American birds have been so inconsistent about applying common or vernacular names to species that if there ever existed a comprehensive popular English nomenclature for avian species it is no longer apparent. But this part of Eskimo culture, transmitted verbally, has remained stable. Meanwhile in many circumstances related to goods, implements, and trade with the outside, Eskimo ways have changed even drastically and have shown their flexible attitude toward the adoption of strange customs. Until now the Eskimos have lived in many small camps so scattered around Cumberland Sound that they have had little schooling and few of them read or speak English. It may be suspected that the introduction of our education will divert their attention from dwelling upon their own environment, and that their concern for local natural history will decline as the irrelevant entertainment of big cities is brought to absorb their interest.

Acknowledgements made in the literature on arctic exploration and science suggest that Eskimo have made greater contributions of accurate and significant information to our scientific knowledge than has been derived from other aboriginal people. Numerically few and scattered and poor in natural resources, Eskimos have tenaciously retained many of the intellectual and social ways of their own culture while they have readily adopted and mastered some of our ways. They still stand out for acuity of observation and for vivid and accurate memory of natural phenomena. Written records supplement the use of memory in science and in the accumulation of knowledge, but writing is not a substitute for memory. Memorized knowledge is often disparaged, but accurate and vivid recollection of the phenomena represented by words is the basis for the systematic and even logical organization of information about natural phenomena. The vivid pictorial memory is cultivated among Eskimos and their names for objects are used in recalling and communicating information. The

individual and social practices for the cultivation of useful memories could be studied among Eskimos and might be found useful in our way of education. If we are to benefit from study of these aboriginal ways it must be before our offer of scanty and superficial schooling replaces the accurate ancient Eskimo methods for obtaining and communicating information.

SUMMARY

For 42 species of birds adjudged normal to the vicinity of Pangnirtung, Cumberland Sound, Baffin Island, two Eskimos who did not write recognized and named orally 38 in their own language. Among Eskimo names reported by Kumlien in 1877, Hantzsch 1912, and Soper in 1924-6, 92%, 90%, and 96% respectively are close to those obtained in 1960. These resemblances in naming cannot be fortuitous, but the differences may result from erroneous communication, which must at any rate have been infrequent. Fifty-three percent of the Baffin Island names are clearly like names for those species obtained from Eskimos of interior Alaska. Communication on this kind of natural history between Eskimo and scientist is accurate. Eskimo nomenclature has been stable at Pangnirtung for 100 years of history. Temporal and geographical separation between Baffin Island and Alaska has brought about some differences in naming that signify cultural change. The accuracy and stability of unwritten Eskimo names illustrates the cultivated character of aboriginal concern for natural objects and phenomena.

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1961

Literature Cited

Hantzsch, Bernard A.

1914. Ornithologisches Tagebuch. Aufzeichnungen während einer Reise in Baffinland. Sitzungsberichte der Gesellschaft naturforschender Freunde zu Berlin, Jahrgang, Nr. 4, pp. 129-165.

Irving, Laurence

1953. The Naming of Birds by Nunamiut Eskimos. *Arctic*, 6(1):35-43, March.
1958a. On the Naming of Birds by Eskimos. *Univ. of Alaska, Anthropological papers*, Vol. 6, No. 2, May, pp. 61-77.
1958b. Naming of Birds as Part of the Intellectual Culture of Indians at Old Crow, Yukon Territory. *Arctic Institute of North American*, 11(2):117-122.
1960. Birds of Anaktuvuk Pass, Kobuk, and Old Crow. *U. S. Nat. Mus., Bull.* 217.

Kumlien, Ludwig

1879. Contribution to the Natural History of Arctic America, made in connection with the Howgate Polar Expedition, 1877-1878. Washington, Gov't. Print. Office.

Peterson, Roger T.

1947. A Field Guide to the Birds. 2nd rev. Boston, Houghton Mufflin.

Salomonsen, Finn

- 1950-51. Grønlands Fugel, the Birds of Greenland. Copenhagen, Ejnar Munksgaard, 3 vol.

Soper, J. D.

1928. A Faunal Investigation of Southern Baffin Island. *Nat. Mus. of Can., Bull.* No. 53, Biol. Series, No. 15.

STERNBERG'S MATERIALS ON THE SEXUAL LIFE OF THE GILYAK

Translated and Edited by Chester S. Chard

INTRODUCTORY NOTE

Waldemar Bogoras and Waldemar Jochelson are familiar figures to American anthropologists, especially to those interested in the northern regions, but the third member of the "Big Three" of Russian anthropology during the first decades of the 20th century, Leo Sternberg (Lev Shternberg in the Russian form), is very little known in this country, largely because none of his major works have been available in English. Like the first two, Sternberg was a political exile in Siberia—in this case among the Gilyak on Sakhalin and on the Amur, whom he came to know intimately. He is our most important source on their social life and religion—these being the aspects of culture that most interested him, to the virtual exclusion of the remainder. Sternberg, it should be noted, was an enthusiastic disciple of Lewis H. Morgan, and his interpretations must be viewed today with this in mind.

Although Sternberg was never associated with the Jesup North Pacific Expedition, as were Bogoras and Jochelson, a major monograph of his on the Gilyak was to be published in translation in the expedition's reports in order to complete the coverage of the "Palaeo-Asiatic" tribes of eastern Siberia. According to the late Professor Robert H. Lowie, the task of translation was entrusted by Franz Boas to Alexander Goldenweiser. However, this projected volume never reached print, and our picture of the "Palaeo-Asiatics" has accordingly remained incomplete.

Sternberg later expanded certain sections of his Gilyak monograph into a separate work, *The Social Organization of the Gilyak*, which was published posthumously in the volume of Sternberg's collected works entitled *Giliaki, Orochi, Gol'dy, Negidal'tsy, Ainy* (Dal'giz, Khabarovsk, 1933)—a volume which is a bibliographic rarity in this country. The chapter (XI) of *The Social Organization of the Gilyak* devoted to the sexual life of this group is perhaps the best of Sternberg's first-hand ethnographic reports. Following a suggestion made to me some years ago by Professor Lowie, my translation of this chapter is herewith offered to a wider audience.

SEXUAL LIFE OF THE GILYAK

The norms of group marriage which afford the Gilyak such wide freedom of sexual intercourse must in themselves promote an excessive development of sexual sensualism. And the customary mode of life of this people, in turn, only contributes to this development. The chief occupation of the Gilyak—fishing—leaves them far too much leisure, while on the other hand the only occupation which could provide an adequate outlet

for their emotional energy—hunting—plays a comparatively insignificant role in Gilyak life. They do not undertake distant hunting expeditions, while the seasonal pursuit of sables, squirrels, foxes and deer—and even the sporadic excursions after the rather mild-tempered local bear—represent nothing particularly dangerous. The art of hunting therefore receives little attention: one sees very few ardent hunters among the Gilyak, in marked contrast to the neighboring Tungus. Nor are the Gilyak familiar with the heroic emotions of war—especially during the past fifty years (i.e. since 1850); and even in former times what they refer to as “war” actually consisted of sporadic clan disputes over revenge or, more often, over women. The Gilyak have never known warfare as a profession, or as the favorite occupation of youth.

It is natural that their emotional energy should be directed chiefly toward sex. The Gilyak begin their sexual life with the onset of puberty, and all their leisure, all their thoughts, they devote to women. This is aggravated by the fact that by no means everyone has the opportunity to contract an actual marriage. An unmarried youth does not content himself with just the women to whom he has access in his own village; nor does he confine himself to the group of women over whom he has legal rights. In fact, the only ones he leaves alone are those in the category that is forbidden to him. When it is a question of romantic adventure, the Gilyak male is deterred neither by time nor distance, as long as there is the possibility of finding a little more female companionship. Most readily of all, of course, a young man will set out for the village where his fathers-in-law live—but he has no objection to journeying to a quite alien community. During my travels young people often voluntarily joined me, offering their services gratis over a period of many weeks: and this was done in the hope of finding opportunities for romantic adventures—not a very difficult feat. Due to the traditional hospitality of the Gilyak, and their craving for any sort of news, the doors of every house are opened wide to any visitor. As a consequence, a Gilyak feels himself at home everywhere. Within a few hours after his arrival in a village he will already have succeeded in visiting every house, relating his news—to which both men and women lend an equally avid ear—while at the same time sizing up any particular woman who may catch his fancy. The rest is a matter of his erotic skill and experience. It is true that, to all appearances, the Gilyak woman conducts herself in an unapproachable manner. Upon the appearance of a strange man she will lower her eyes, remain seated all of the time, frowning, and scarcely replying to the stranger's questions. But this is only an exterior pretense that conceals her inner lust. Unnoticed by the bystanders, she is throwing inquisitive sidelong glances at the new man, which are caught up by him at opportune moments. And if the guest produces a proper impression, the affair is apt to be concluded rather rapidly. The man will track her down at the well, or while berry-picking, or will simply seize her in the entrance passage; whereupon, after a brief symbolic dialogue on the

order of "Let's have a smoke together" (i.e. taking turns having a puff of the same pipe), or "Let me tell you the news", the matter will be settled very readily. Sometimes the visitor will simply remain in the house of his inamorata and, during the night, will cross over to her bed—or vice versa. On other occasions the affair will dispense with words and confine itself to symbolic acts such as touching the breasts or pinching the leg; and if these approaches encounter no rebuff, the consent of the woman is thereby secured. It is interesting to note that the symbolism employed in such erotic propositions is reminiscent of the rituals of the marriage ceremony. For instance, the suggestion of having a smoke together is a facetious imitation of one of the rites. And while pinching the leg or breasts does not figure in marriage ceremonies at the present time among the Gilyak, it is met with even today among certain peoples of North America—for instance among the Lillooet Indians, according to the testimony of Boas and Teit.

Not only the unmarried youths but even elderly married Gilyaks allow themselves freedom of this type in strange villages. Among my fellow travelers on one of my first journeys was a venerable old man, Gibel'ka, who enjoyed wide renown all over Sakhalin owing to his wealth and his remarkable intellect. During halts at villages he would speak jokingly about the local belles just like his young companions, and one day he became carried away to the extent of consulting me as to whether or not he should purchase a particular beauty who had caught his fancy and take her back home—even though he had been married for a long time and could not say enough in praise of his wife. Although it is true that he did not participate in the nocturnal adventures of his young fellow travelers, this was only because the competition was already too hot, having almost reached the point of gun play.

In view of the relative accessibility of women, violent behavior towards them is rare. But I chanced to hear about such cases occurring at seasons when the women repair for several days to places remote from the settlements in order to gather berries and roots. In these instances gangs of youths had carried out actual raids on the defenseless women, not hesitating to employ force if they did not submit voluntarily. However, the actual violence chiefly involved tearing off the breeches (which are made without any opening, as among the Chukchi and Koryak). Expeditions of this type, as indeed the general run of romantic quests outside of one's own kinship circle, are characteristically referred to by a term meaning "to hunt for women". However, this term is also applied to quests for brides, since it has two meanings: to hunt, and also to look for someone or something in general.

Special expeditions to distant strange villages in quest of women are exceptional sporting propositions, so to speak—especially since in distant villages visitors ordinarily meet with strong competition from the local

youths. And since the women already have their established lovers—to say nothing of husbands—special qualities are needed if a man is to achieve easy success in strange regions. I succeeded in meeting such fortunate individuals: they were usually sophisticated story-tellers, good jesters and singers. Such distinguished connoisseurs are not numerous among the Gilyak, however; there is even a special term for them. Ordinarily, a single youth contents himself with the women of his own settlement, or goes visiting to the settlements of his fathers-in-law where a very cordial reception awaits him.

It is very difficult to generalize a picture of the sexual nature of the Gilyak. It is first of all necessary to distinguish married from single people. The former, as long as they remain in their home settlement, are more apt to be preoccupied with guarding their wife from strangers than with initiating extra-marital flirtations. Only when on a journey or while visiting in other settlements do they readily give free rein to their sexual instincts. On the other hand, married women are surrounded by so many temptations in the form of their group husbands and visitors that they readily violate conjugal fidelity at every convenient opportunity—all the more so since many of them are not married for love or to a person of their own age, and hence willingly recoup themselves with extra-marital flirtations. However, from the viewpoint of Gilyak attitudes on decorum, such flirtations represent nothing abnormal, since the greater part of them take place between group husbands and wives. Rightly or wrongly one must award the palm to the women when it comes to excesses among married persons. "With men," say the Gilyak, "one to one is still found good; with women, not just one."

Actual excesses of debauchery do take place among unmarried young people. Here we find such extravagances as the case of the girl Pigunajko who before her marriage was simultaneously engaged in liaisons with fourteen lovers, including her future husband. Or one can cite an example from the Gilyak epos, in which the hero comes to the house of a certain old man to seek a wife. His future father-in-law says to him, "Your wife lives over there in the little hut. People have been coming to her and copulating continually with her; as a consequence she has lost her legs." The bridegroom, however, is not in the least indignant at this disclosure. "What of it?" he replies, "I'll take her away as she is."—evidently not seeing anything peculiar in the situation.

However this sort of thing does not reflect the general picture. Along with the factors of heightened sexuality and sexual capacity there are other restraining factors in operation. Among married women such factors include motherhood and household cares; and finally, among both married and unmarried, there are such feelings as love and modesty. But in general, sexual debauchery plays a not insignificant role in the life of the Gilyak, having both economic and psychic consequences. Ordinarily, the gay

young blades either do not set up a household at all or, if they do, they manage it very negligently. Both in everyday life and in folk-lore one constantly encounters the sharp reproaches and invective of the elders towards the youth for their laziness which stems from this debauchery. Moreover, the Gilyak themselves explain childless marriages on the grounds of debauchery. But most unfortunate of all is the effect of this behavior on the psyche. There is a whole series of nervous ailments specific for the Gilyak, such as *miarechenie* among men and illnesses associated with complete loss of psychic self-control among women, which are the result of debauchery. In the case of women, moreover, these are accompanied by serious transgressions in the area of sexual behavior which in their turn induce phenomena of hysteria.

But along with this extreme sexuality and sexual freedom which we have described, the feeling of love still plays a major role in Gilyak life. The term most widely used for love means both sexual love and the sentiment of love in general towards children, friends, etc. There is a special term for reciprocal love—marriage for love. There are also certain other terms for love, but there are no special words for lover or sweetheart, although one can say “a man whom they love”. In the language of lovers the beloved is called either by the terms “husband” or “wife”, or else by words which mean “my man” or “my woman”. The Gilyak themselves consider love as a normal stage in life through which everyone must pass in their youth. This feeling is very well expressed in a song which I recorded on the Amur, in which a girl complains about her mother's lack of sympathy towards her passion: “Mother, mother, mother dear—perhaps you have forgotten your own youth.”

Parents, however, never reproach their children for these amorous passions. And if young people at times have to listen to the grumbling of their elders, this is most often for purely economic reasons, since in the period of youthful passions people neglect their work and become negligent and untidy. In general, it is inconceivable that parents should react in any way to the sexual activities of their children—even of girls. If a father (or brother) finds out about the fornication of his daughter (or sister), he not only is debarred from using forceful measures against the seducer but may not even challenge him to a duel. One may not even show anger towards a daughter. The amorous passions of children are treated as though they were a completely natural phenomenon. And mothers in particular frequently even serve as agents in the secret love affairs of their children. In many of the songs which I recorded on the Amur, sons are continually addressing their mothers, talking over their amatory worries or asking advice as to where and how to find a sweetheart. Only the cases of love for a person who is in a forbidden category encounter serious and even relentless opposition from parents, who themselves will prompt a daughter to commit suicide. Or a relentless attitude, chiefly on the part

of the father, will be manifested on occasions when love threatens to upset an advantageous marriage contract concluded in childhood; then the girl will forcibly be handed over to the unloved husband. But these are exceptional cases.

The nature of love among the Gilyak does not differ in any way from that of love in civilized society. Coarse sexuality is quite lacking. In fact, in the concept of love among this primitive people we find the entire gamut of this universal human feeling, from the tenderest tones of poetic sentimentality and gentle yearning to the most tempestuous transports of heroic passion undaunted by any obstacle and not hesitating in the resolve to part with life itself.

This psyche of the Gilyak is reflected very well in their love songs, especially in the songs of women. Nature has endowed the Gilyak woman with a depth and delicacy of feeling which she knows how to express in ways and forms: "Night and day I think of you. . . . Like a mother feels for her own. . . . If you go away, I will think only of you; where you have gone, there will I also go. From the well from which we drank together, I will drink you dark shadow. Just as we like the tallest tree in a grove best of all, so you are the best of all people, the most beautiful. Oh, take me with you! I want to become the pouch that hangs on your belt, the bottom of your boat, so that I may be with you. Tears from my left eye fall like rain, my right knee grows weak, becomes motionless; everything is wasting away, my legs no longer move. . . ." Here in these expressions, which I have taken at random from various Gilyak love songs, a woman expresses her love. But even in the songs of men it is remarkable how the same sentimental notes are sounded, how frequent are the references to tears pattering like rain on the knees, the same yearnings over parting, the same sweet daydreams about reunion; and such emotional expressions as "I fell completely in love with you." Only now and then we find breaking through this such crudities as "The joint under the knee of your plump thigh twitches—oh, how I like it!" But never any cynicism.

One may assess the role of love in the life of the Gilyak by the abundance of such song materials. Not every person can relate stories or poems, but everyone knows love songs. And in the love of this people songs play an outstanding part. Songs are the language of lovers. During a rendezvous, lovers sing improvised songs to one another instead of conversing; and if they have no opportunity to meet, they will send songs composed for the occasion through a third person. A special terminology for songs of this kind has even been developed.

We can judge about the intensity of love among the Gilyak by the way in which lovers react in those cases where they encounter insurmountable obstacles. In such instances, suicide is the way out. Obstacles to love are of two kinds. Mostly they are imposed by the parent who forcibly

marries off the woman either through cupidity or reluctance to violate an agreement of infant betrothal; or cases in which the woman is taken by force. In these situations suicides often occur quite a long time after the forced marriage. The woman will first of all attempt to save herself by fleeing from the unloved husband; but if this fails, suicide is the outcome. I can recall a typical case of this sort, in which a girl from the village of Nianivo had been given in marriage against her will. She abruptly ran away from her husband back to her father, who then gave her to her lover, having been tempted by receiving a second bride price from the latter. Her first husband did not become reconciled to this, and seized an opportunity to take her away by force. Six months later the unhappy woman hung herself. Cases are also known where women who escape from unloved husbands have killed the children begotten by the latter.

Men prefer to defend their right to love in a more active manner. Usually, with the help of their kinsmen, they will attempt to abduct the woman by force, nor will they balk at killing the husband of their beloved. One really outstanding instance of heroism in love I recorded in the same village of Nianivo. In my time the richest and most respected man of the local clan was a Gilyak by the name of Nyugun. In his younger years his sweetheart had been forcibly married to another man, whereupon Nyugun killed the latter, for which he was arrested and transported to Nikolaevsk. During this interval the woman's brother again married her against her will to another husband. Escaping from prison, Nyugun set off immediately for the village of his sweetheart. As he approached her house he tore off all his garments except the short pants of modesty, notwithstanding the wintry weather, and in this condition burst into the room, which was crowded with people, and so frightened those present by his stalwart appearance that no hand was raised when he led his sweetheart out and took her home—after which they lived peacefully together for many years.

The most tragic obstacle to love, however, is the status of the lovers in forbidden degrees of kinship. Here their plight is a permanent one, and the parents themselves insist on suicide. In such cases the lovers customarily set forth into the forest and hang themselves side by side on two trees. Before committing suicide they sing songs to each other about their journey into the world beyond the grave where none will oppose their love. Some of these songs have come down to us in the following fashion. It may happen that one of the participants, specifically the man, falls to the ground and after this loses his inclination to repeat the attempt. Such a person preserves for posterity the death song. One of these tragic cases of illegal love became a popular legend. It was a hundred years ago. A girl became involved in a liaison with the younger brother of her father, who shortly after went away on a long trading journey to Manchuria. She had in the meanwhile become pregnant, and when it was impossible to conceal the fact any longer, she committed suicide by hanging herself. When her lover returned, he burned all of the goods which he had brought on her grave,

turned loose the bear which he was fattening for the bear festival, and also hung himself. The song which the unfortunate woman sang at the moment of parting has been preserved. It begins: "Take me with you; I will be the planks in the bottom of your boat. . . . Now we must think only about the afterworld. If you would remember me, keep as a souvenir the catkins that hang on the wall. . . ."

To deal with unrequited love the Gilyak employ magical means. One method is to mix the dried brain of the cuckoo with tobacco and offer it to the girl to smoke. Or secretly sewing a cuckoo feather in her dress. But there are other remedies that are not so innocuous and which may lead to tragic consequences. They say that a person who has partaken of the drug from one of these potions falls into a deep melancholy and dies after a few days. I knew of two men, somewhat russified, who sold such drugs at an exorbitant price and had destroyed several women in this way.

Among the Gilyak, as in our own country, there are shy individuals who cannot bring themselves to make their avowal in person. In such cases old women serve as go-betweens, and for this service it is customary for them to receive "tea"—i.e. a present. At times some sort of a gift is sent through such go-betweens—usually cloth, in which they tie several knots to indicate the number of days until the admirer will come to a rendezvous.

We have yet to speak about the stimuli to love among the Gilyak: what personal traits attract them to the beloved. First of all, of course, there is the aesthetic aspect: beauty, in particular facial beauty. The concept of "beautiful" in the Gilyak language is expressed by the term meaning literally "a good face". It is noteworthy that they appraise beauty not only from their own racial viewpoint. Both men and women like Russian women, and Gilyak women like even those types of European men which from their standpoint are most dissimilar, such as red-heads and blonds. Thus, for example, my friend Bronislaw Pilsudskii, a reddish blond, enjoyed great admiration among the Gilyak not only for his sympathetic attitude towards them, but merely for his attractive personal appearance. They never described him excepting by the term meaning literally "beautiful face", and when he left Sakhalin the Gilyak women recited songs avowing their love to him on parting.

In their love songs they sing not only about facial beauty but also about "white skin like birch bark", luxurious hair (braids down to the loins, sleek hair), gracefulness of gait ("head inclined to one side, smiling he goes", "with long strides he goes"), physical strength, and stature ("legs penetrating into the ground up to the shins").

Of course elegance of clothing plays no small part in the aesthetic appraisal of the beloved. In the love songs we find mentioned (in the case of women) dress embroidered with finery, an abundance of copper bangles,

etc., or (in the case of men) coats of black dog skins, skirts of variegated sealskin, rich facings of small squirrel pelts, etc. The most beautiful summer costume for a woman is a black dress; men show to best advantage in shirts made half of red and half of white or blue material.

But in addition to external appearance, moral qualities are also prized. The features in men which attract women are manliness, reliability ("your voice is like the voice of a respectable man"), or the talents of the conversationalist, the jester and the singer. In women, apart from outward appearance, men are attracted by the traits of femininity which the Gilyak women possess to a great degree—both by nature and through early training. In early childhood a girl is already training herself to speak with quiet melodious voice and to give her face a dreamy coquettish expression. A woman should also have considerable singing talent. By means of their songs the women not only know how to subtly express their love but also how to mischievously ridicule unwanted admirers. Their sarcasm makes free use of hyperbole of every sort. One song compares the nose of the undesirable person to a breathing hole in the ice and to an open door, while his clothing, dog team, harness, etc. are described in a similar vein.

On many occasions I questioned the Gilyak as to whether such sexual perversions as male homosexuality and bestiality were practiced among them. It turned out that no one had ever heard of any instances of homosexuality. A single case of bestiality was recalled, and this with repugnance. It involved one psychically-ill man in a village on the Tym River who copulated with a dog. The general attitude of the Gilyak towards these perversions is clearly evident from the following legend which I recorded:

"The tiger, the snow leopard and even the lion (?) were formerly humans. Once upon a time the god Kur noticed by chance that they were copulating via the anus; whereupon he said in indignation: 'But, once you copulate like beasts, you will remain beasts forevermore'."

Thus it is the feeling of the Gilyak that such perversions are acts which liken a man to a beast.

The attitude of the Gilyak toward hermaphrodites is quite simple: they evidently view it merely as an anomaly and nothing to be abhorred at all. They readily have sexual intercourse with such individuals, and the marriage of hermaphrodites is a customary phenomenon. In view of the fact that intercourse and marriage on the part of hermaphrodites are often confused with homosexuality in the ethnographic literature, I shall adduce some very typical instances of hermaphroditism known to me among the Gilyak.

On Sakhalin I knew of two cases. In the village of Yamy near Alexandrovsk there was an old man named Chubuk who was known by every-

one as a hermaphrodite since up to a certain age he had considered himself a woman (his penis was poorly developed) and had worn women's clothing. Later on his penis attained normal development, he began to dress like a man and ultimately got married. The other case was recorded by me in the village of Myi Gyrk on the western coast of the northern tip of the island. Here I encountered one day two young people sitting on the shore, a man and a woman, who proved to be a married couple. I was immediately struck by the fact that the woman's face seemed like that of a man. My fellow travelers explained that a year previous she had worn men's clothing, considered herself a man and was on very friendly terms as such with her present husband. One day they went fishing and were forced to spend the night together, and it was on this occasion that the hermaphrodite's secret was revealed. Thenceforth they began sleeping together and ended up by getting married—although people had tried hard to talk the young man out of taking this step. Similar cases can readily serve as the basis for legends about transformed people (werewolves, etc.).

On the Amur a Gilyak named Putuk related to me some interesting details about a hermaphrodite friend. The latter up to a certain age had been a girl, but suddenly she noticed that a penis was developing on her: it waxed and waned and then completely disappeared again. She had informed her boy friend about this phenomenon, and he had stolen in at night and convinced himself of the truth of her statements; the next day he told everybody about it. After several more years this person grew a beard and the penis finally developed—although there was also a fully-developed vagina so that it was possible to have intercourse with men. From this time on the person began to dress in men's clothing, soon got married and now is the foremost hunter in the district. He lives normally with his wife but sometimes copulates with men, and considers the latter more pleasurable. He remarks about himself with satisfaction, "I have two chances, two happinesses."

In all, I could count up to five such instances among the Gilyak—as many as Bogoras found among the Chukchi.

The Gilyak have no special ceremonies connected with the attainment of sexual maturity. The sole external indication of girls who have reached puberty is the fact that they begin to wear their hair in two braids. Girls consider the appearance of menstruation—which usually occurs in the thirteenth to fourteenth year—as the moment of reaching sexual maturity, and this is considered as the beginning of marriageable age. Properly speaking, however, the expression "a woman who has noticed her body" serves as the term for a woman who has attained sexual maturity—i.e. a woman whose breasts have developed sufficiently so as to be noticeable. A similar term exists for men—"a man who has noticed his body"—but in this case the word "body" is understood to mean a moustache.

Even before the onset of menstruation mothers prepare their daughters for the impending change in their lives, and instruct them in all the necessary observances and prohibitions towards persons related by blood. The Gilyak of both sexes are fully aware of the significance of menstruation as signalling the moment of sexual maturity, and do not allow themselves any acts of sexual intercourse prior to this. Adult men, it is true, often marry immature girls and sleep under the same blanket with them right from the start, but intercourse begins only at such time as the wife informs her husband of the onset of her first menstruation.

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Not for Resale

ARCHAEOLOGICAL INVESTIGATIONS AT PEDRO BAY, ALASKA

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SAM-JOE TOWNSEND

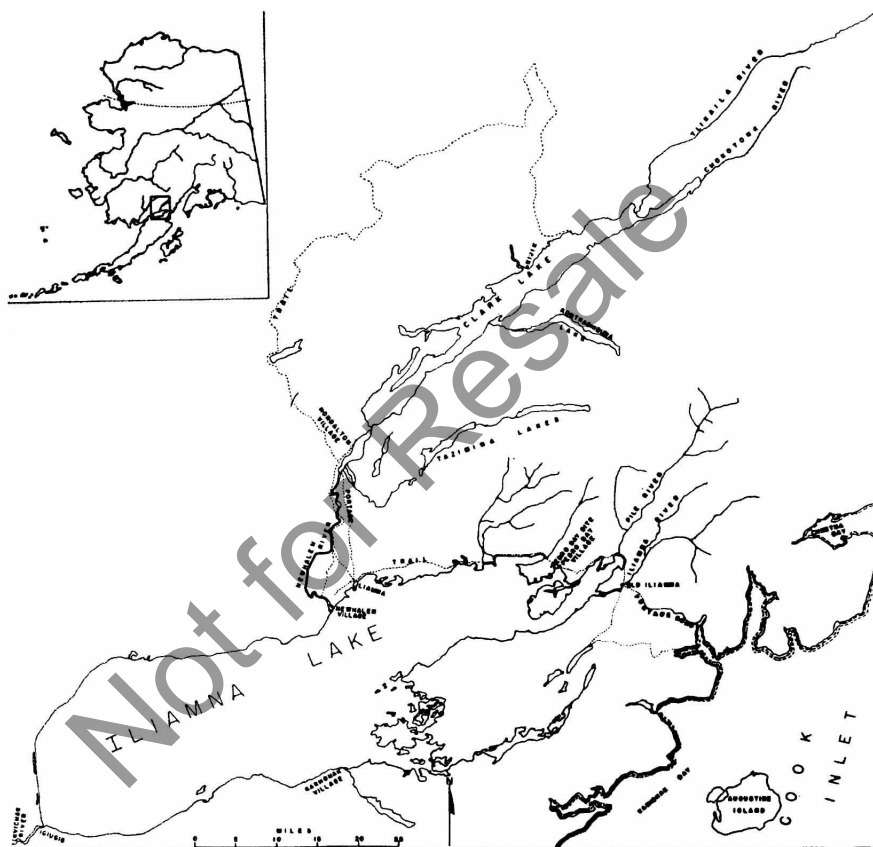
*Introduction*¹

During the summer of 1960, a preliminary site survey of the north shore of Iliamna Lake in southwestern Alaska was conducted by the authors. One particular site, located at Pedro Bay, was selected for excavation. The Iliamna region was chosen for study because it is inadequately known archaeologically and ethnographically. Alex Hrdlicka was at Iliamna Lake in 1931, visiting Severson's (the present village of Iliamna), Big Mountain, Knudson Bay, and Old Iliamna. Hrdlicka excavated several burials in the area, but little archaeological information is available from this work. Cornelius Osgood was also at Old Iliamna for one or two weeks in the summer of 1931 (Osgood, 1937, p. 5), collecting ethnographic information for his monograph, *The Ethnography of the Tanaina*. This represents the only ethnographic work in the Iliamna Lake area, while Frederica de Laguna's *The Archaeology of Cook Inlet, Alaska* (1934) provides the only archaeological material related to Tanaina prehistory. No other modern material of anthropological significance exists for this region.

The Iliamna Lake area is of particular interest because it was, in prehistoric times, a zone of Eskimo and Indian occupancy. Later, the lake was on the periphery of the Russian encroachment into Alaska, and some Russian documents exist from this period. Today Eskimo and Tanaina Indians compose the basic Iliamna Lake population. Eskimo inhabit three of the five settlements on the lake, Europeans are concentrated at Iliamna village, and Tanaina are at Pedro Bay. One large Tanaina settlement, Nondalton, is located twenty miles up the Newhalen River on Sixmile Lake. It has been possible, therefore, to combine data from archaeological excavations, historical documents, and recent ethnography with information of the present inhabitants of the lake to obtain a more comprehensive picture of the Iliamna region through time.

Setting

Iliamna Lake, the largest in Alaska, is approximately 80 miles long and 20 miles wide (Fig. 1). It is in a basin surrounded by 4,000 foot peaks in the northeast and relatively flat terrain in the southwest. Fed by many smaller lakes and rivers, Iliamna drains into Bristol Bay through the Kvichak River. The lake, subject to severe eastern winds, is extremely treacherous for small craft, and people seldom venture far from shore in their skiffs.



ILIAMNA LAKE AREA, SOUTHWESTERN ALASKA

FIGURE 1.

In the eastern sector of the lake, flora is moderately dense spruce forest interspersed with cottonwood, birch, alder, and willow. Thick tundra moss covers the soil, and during August the area abounds in many kinds of berries. Toward the western portion of the lake, the mountains recede from the shore and the forest decreases in density near Iliamna village, becoming a taiga. Further west, cliffs rise abruptly from the water without forming a suitable beach to land a boat.

Moose, caribou, black and brown bear are the predominant large land mammals, and mountain sheep are found in adjacent mountain areas. Pacific harbor seals are reported in the lake, and aquatic and game birds are plentiful. Red salmon run from June through August. Other important fish include pike and trout. On the whole, a rich sub-arctic faunal assemblage prevails.

European Contact and Exploration

After Bering's voyage in 1741, documentary information begins to be available concerning European contacts with the inhabitants of Alaska. However, many scholars, including Jochelson (1933) and de Laguna (1956), have suggested earlier contacts between Asia and southwestern Alaska. On Kayak Island, Bering left several articles, including beads of Chinese manufacture and two iron knives (Birket-Smith and de Laguna, 1938, p. 350, note 2). Soon afterward, Siberian fur hunters began to take advantage of fertile sea-otter grounds, trading glass beads, iron, and other items for furs.

Glottof reached Kodiak in 1762 and traded glass beads of different colors to the Koniags. A boy reported that his people traded with the Alegmuts (Ogulmiut), Tanaina, and Kolosh (Tlingit) but had no knowledge of white men (Bancroft, 1886, p. 144). Five years later, when Krenitzin explored the coast of Alaska beyond False Pass, he found people wearing wooden caps decorated with beads of various colors. We may assume, therefore, that these items were already a medium of exchange outside the immediate Russian sphere of contact, reaching Iliamna Lake.

When Cook explored the southwestern Alaska coast in 1778, Russian trade items were encountered among most of the inhabitants. The Chugach wore "many beads of European manufacture, chiefly of pale blue colour" (Cook, 1784, Vol. 2, p. 305). Cook used white beads in his trading transactions. On the west shore of Cook Inlet, near Kustatan, people came out to the ship in canoes to trade furs. Cook noted lip ornaments were less frequent among people than among the Chugach, while nasal septum ornaments were more common and considerably longer. They had more embroidered work on their clothes, quivers, and knives in cases (Cook, 1784, Vol. 2, p. 335). Petrof (1884, p. 25) states that many of the Tanaina hunting clothes were "embellished with porcupine quills

and grass braiding, head embroidery and fringes while both nose and ears of the men are pierced for insertion of the white shells." Later Osgood (1937, p. 52) reports bead and porcupine quill work. Based on Cook's description and later comments of Osgood and Petrof, it appears that these people were Tanaina. This is the first recorded contact with them. Cook mentioned no European articles specifically for these people, but we may assume they possessed some. When Cook reached Cape Newenham on Bristol Bay later the same year, he found people resembling the Eskimo of Prince William Sound, but they "seemed unacquainted with any civilized nation . . . nor did we observe in their possession any foreign article unless a knife may be considered such. It was a piece of common iron fitted to a wood handle" (Cook, 1784, Vol. 3, p. 16). Russian influence would seem very slight in 1778 on the southern coast adjacent to Iliamna Lake, while northwest of the lake, on the north shore of Bristol Bay, apparently neither white men nor their trade goods were known.

Shelikof settled on Kodiak Island in 1784, but his forces were not yet strong enough to investigate much of the mainland. In 1785, a party was sent to explore the coast adjacent to Kodiak and learned of Iliamna Lake with its several portages to the west side of the peninsula which were supposed to exist. This is the first record of Iliamna Lake (Bancroft, 1886, p. 228).

When Portlock visited Cook Inlet in 1786, there were signs of strife between the Russians and the Eskimo and Indian populations. Many Indian settlements were deserted and the surrounding areas were almost drained of furs.

Meares, in 1788, was approached by two canoes in Cook Inlet from the direction of Smokey Bay (just southwest of Cape Douglas) and presented with a mangled sea-otter. He inferred the people thought he desired the meat rather than the fur. They had no beads and when given some, admired them with a "kind of admiration which is awakened by objects never or seldom seen" (Meares, 1791, p. 311). Apparently lacking contact, the people were presumed to live inland and to have descended one of the rivers that empties into Smokey Bay. These people may have been from the area just south of Iliamna Lake. Although Russian oppression was increasing among the coastal Tanaina, the Iliamna area population seemed little affected at this time by Europeans.

In 1789, Izmailov surveyed the southwest portion of Cook Inlet and Kamishak Bay. Although Iliamna Lake is only a few miles inland from Kamishak Bay, Tikhmenef (1861, p. 32) records no reference by Izmailov to the lake.

Sauer, in 1790, learned of a river that ran from a lake (Iliamna Lake or Naknek Lake ?) into the sea. By this route and a portage over a moun-

tain, an inlet was reached which led to Bristol Bay. This was a frequently used trade route of the Eskimo and Indians.

Bocharof explored some of the northern part of the Alaska Peninsula in 1791, attempting to set up friendly relations with the inhabitants. People on the west side of Cook Inlet from Katmai north had thus far successfully opposed Russian attempts to settle among them. Scant references suggest he reached Iliamna Lake. Friendship with the Indians and Eskimo of the Iliamna area was desired because of a portage that was believed to exist across a narrow neck of land separating Iliamna Lake from the Kvichak River (Bancroft, 1886, p. 325). This was supposed to be one of the main routes of access to Bristol Bay from the Pacific side of the Peninsula. The location of this route is uncertain since there is no land barrier between Iliamna Lake and Kvichak river. References to portages across the Alaska Peninsula in the vicinity of Iliamna Lake are fairly common in the literature. Specific portages are vaguely described, and it is difficult to pin-point them. This is to be expected, however, since the Iliamna region was very poorly known until after 1900.

The Iliamna Lake people experienced their first taste of European violence when conflicts arose between the Shelikof and Lebedef-Lastochkin companies. During their struggles for control of the Cook Inlet area, countless robberies and outrages were perpetrated against Indians and Eskimo. Of the four villages in Iliamna and Nushagak which Bocharof had befriended, the Lebedef-Lastochkin men, in 1792, plundered two and carried the people into captivity. The continued mistreatment of the people in the vicinity of Cook Inlet by the men of the Lebedef-Lastochkin company and Baranof's company during the next eight years led to violent uprisings. In 1798, the Kenai people attacked Russian crews at Iliamna² (Lake Clark ?) and Tounak (Tyonek ?) (Tikhmenef, 1861, p. 71). Bancroft (1886, p. 392) lists these two establishments as Iliamna and Kodiak. Approximately 100 Indian and Eskimo loyal to the Russians and 21 Russians were killed (Tikhmenef, 1861, p. 71). This is the first specific reference to Russians, other than Father Juvenal, in the Iliamna region.

Father Juvenal was sent by the Russian Orthodox Church to contact non-Christian tribes of Iliamna Lake in 1796. When Father Juvenal and his guides left Redoubt St. Nicholas for "Ilyamna country," the trader Laduiguin sent glass and coral beads for barter with the Iliamnas. Apparently, trade was being conducted sporadically with the Iliamnas but travel in the area was then too difficult and uncertain to maintain regular contact (Juvenal, 1952, p. 46). After a month in some village in the area, he was killed by Indians. Based on comments in Juvenal's Journal, the authors tend to believe that he may have reached a Lake Clark Tanaina village, believing this to be Iliamna Lake, and was killed there. However, this matter will be explored further in a forth-coming paper. A Kenai Tanaina told Lisiansky, in 1805, their great hatred for Russian missionaries

began when a missionary (Juvenal) preached too zealously against polygyny. The authors feel that this reason for his murder is suspect.

The Russian American Company was established in 1799, eliminating conflict of commercial interests, but problems with the Indians and Eskimo continued. In a letter to Larionof, agent on Unalaska in 1800, Barancf stated that in July on "Kenai Bay at Iliamna Lake" (location of this bay is unknown) three Russians were killed by rebellious tribes (Bancroft, 1886, p. 394).

During the first 20 years of the 19th century, sporadic expeditions by Davidof, Malakhof, and others were made inland from Cook Inlet. An expedition under Kroasakovsky in 1818, proceeded through Lake Iliamna, down Kvichak River to Bristol Bay, establishing Alexandrovsk at Nushagak.

In 1821, a letter from the Board of Directors mentioned a trading post on Iliamna Lake and its trader, Ereimei Rodionov. This post may have been located at Old Iliamna because Glasanov's map of 1834 showed a post on the east shore of the lake. In 1844, Etolin and Bishop Innokenty mentioned the Iliamna post (Alaska Historical Documents).

From 1836 to 1840 Alaska was swept by a smallpox epidemic which desiccated the population. Bancroft (1886, p. 562) mentioned that the disease spread inland from coast villages. From the magnitude of the epidemic in southwestern Alaska, we may assume that the Iliamna Lake population was also seriously affected by the disease.

In Tikhmenef's summary of the inhabitants of Alaska (1863, p. 376), he stated that a company trading post and native settlement was located at "Iliamna Lake on the river of the same name where there are 340 inhabitants." This village may have been Old Iliamna.

Alaska was purchased from Russia in 1867, and for a decade afterward, the Alaska Commercial Company maintained a post at Iliamna Bay, on Cook Inlet 15 miles from Iliamna Lake (Gorman, 1903, p. 299).

Petrof (1884, p. 17) listed two Athabascan settlements, Chikak and Iliamna, on Iliamna Lake, Kaskinakh, an Eskimo settlement, on Kvichak River near its junction with Iliamna Lake, and Kichik, an Athabascan village, on Kichik Lake (Clark Lake).

By 1898, the Russian Church had a firm hold over the Indians, and people looked to Russia through the priesthood for leadership and protection. (Compilation of Narratives of Exploration, 1900, Elliott, p. 741).

The Site

Pedro Bay is located on the northeastern shore of Iliamna Lake. The bay extends one-half mile in a northerly direction, forming a semi-circle

surrounded by mountains on three sides. The site selected for excavation occupies the top of a 25 foot ridge which projects some 250 yards north from the base of Pedro Mountain (Fig. 2). Below the ridge, the marshy grassland has some standing water throughout the year and a few small meandering streams. Flora on the top of the ridge includes spruce, birch, alder, and cottonwood trees. The ground is covered with tall grass and a mat of tundra moss 6 inches to 12 inches thick.

The Collection

The artifact descriptions which follow have been grouped under eight headings: house construction, fishing, land hunting, tools and manufactures, household, personal adornment, ceremonial or medical, and miscellaneous. Under these headings the artifacts are first described and then compared with other finds from Kachemak Bay in Cook Inlet, Kafia on the Alaska Peninsula, and Uyak on Kodiak Island. Although comparisons are made with other sites where pertinent, the major comparisons have been limited to these three sites for several reasons. First, the Kachemak Bay sequence is clear, covers a considerable time span, and represents the only other excavations within Tanaina Indian territory. Second, Kafia and Uyak represent the only other thoroughly excavated sites in the area.

Since references are made in the comparisons to ethnographic materials collected by Cornelius Osgood, some statement should be made which summarizes the position of the Pedro Bay site. The Pedro Bay site is considered to be a Tanaina Indian community dating from around 1750 to 1800 A.D. The period of occupancy is judged to have been brief because of the slight midden accumulation within the houses and the small number of artifacts. The site probably was abandoned prior to direct Russian contact with the Iliamna Tanaina on Iliamna Lake.

For additional artifact distributional information interested readers should consult Birket-Smith (1929), de Laguna (1934), Birket-Smith and de Laguna (1938), Oswalt (1952a), and Van Stone (1955). For any particular distribution within the six major Tanaina groups, readers may consult Osgood (1937). Supplementing the descriptions and illustrations is an artifact trait list identifying the house in which each artifact was found and relating the artifact to the plate on which it is illustrated.

House Construction

The Pedro Bay site consists of four semi-subterranean house structures and four subterranean fish storage pits (Fig. 2). Three of the houses have two rooms (Fig. 2; 3; 5); one house has only one room (Fig. 2; 4). The smaller rooms are connected to the east wall of the larger rooms by a short semi-subterranean tunnel. The larger rooms have central fireplaces, but Room B, the only small room excavated, did not. The houses have en-

trance passages oriented in a westerly direction probably because of prevailing easterly winds. Organic preservation was poor in all of the structures excavated (House 1, Room A and B; House 2; House 4). Only four wood house log fragments, four bone artifacts, and fragmentary mammal bones were found. No postholes were located. The excavated houses are described in the following paragraphs.

House 1 (Fig. 3)

Both rooms in this house are nearly square in outline. The rooms are designated A and B, the former being the larger. The entrance tunnel is located mid-way along the western wall of Room A. The floor level in both rooms is as much as 44 inches below the present ground surface. The entrance tunnel, as it progresses in a westward direction, gradually slopes down 5 inches below the floor level. Scattered throughout the house are large protruding sections of bedrock which rise one foot above the floor level. A short tunnel, located mid-way along the east wall, connects the two rooms. Room A contained more artifacts than any other structure (Trait List). The dimensions of Room A are: length, 20 feet; width, 20 feet; tunnel length, 10½ feet; tunnel width, 2 feet and 9 inches (maximum). The dimensions of Room B are: length, 12 feet; width, 12 feet; connective tunnel length, 2 feet; connective tunnel width, 2 feet.

House 2 (Fig. 4)

House 2 is unique, being the only structure with one room. The house is roughly square in outline. An entrance tunnel is located mid-way along the west wall and both the tunnel floor and the house floor are a maximum of 48 inches below the present ground surface. Large sections of bedrock protrude two feet above the floor area in some places. The dimensions are: length, 17 feet; width, 20 feet; tunnel length, 7 feet; tunnel width, 2 feet.

House 4 (Fig. 5)

The two rooms of this house are roughly square in outline. The east walls are slightly curved, and the unexcavated smaller room is connected by a short tunnel mid-way along the east wall. The entrance tunnel is located mid-way along the west wall. Both the tunnel floor and the house floor are a maximum of 40 inches below the present ground surface. Bedrock projects two feet above the floor in some places. The dimensions are: length, 17 feet; width, 19 feet; tunnel length, 5 feet 3 inches; tunnel width, 2 feet.

Cache A (Fig. 2)

One subterranean fish cache, designated as Cache A, is square in outline. Only one artifact was found in the cache (Trait List). The dimensions are: length, 5 feet; width, 5 feet; depth, 4 feet.

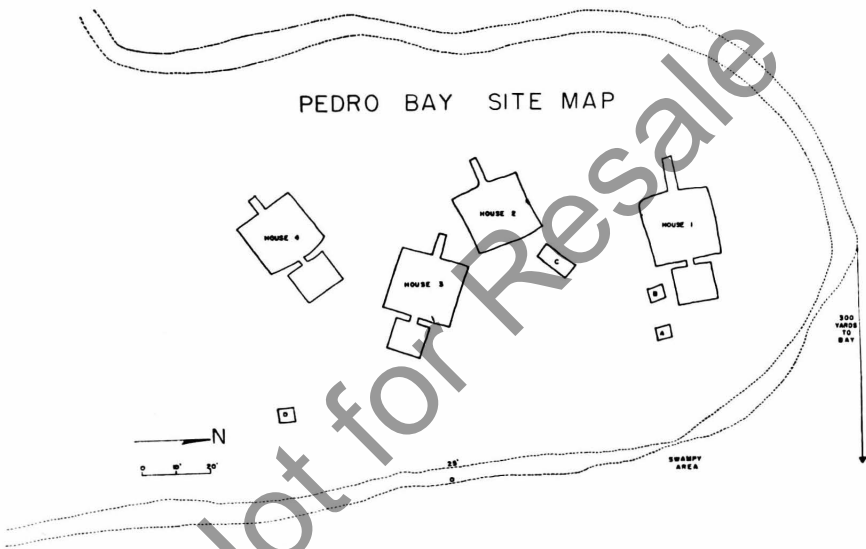


FIGURE 2

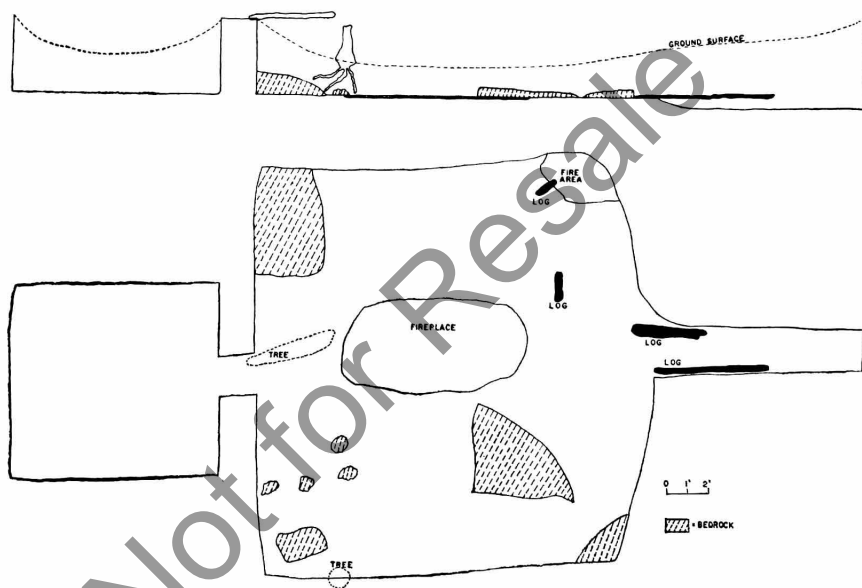


FIGURE 3, HOUSE I.

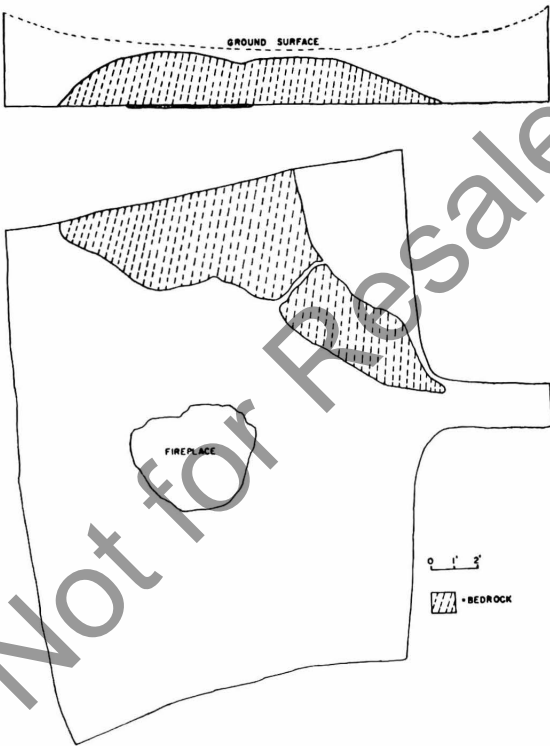


FIGURE 4, HOUSE 2.

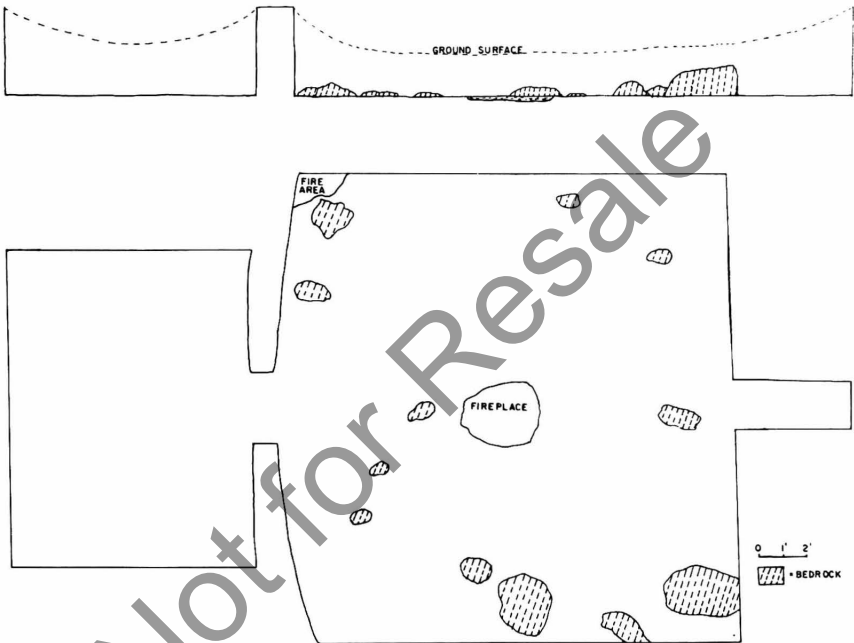


FIGURE 5, HOUSE 4,

Analysis and Comparisons

Since organic preservation was poor throughout the Pedro Bay houses, it is not possible to reconstruct the house types from archaeological data alone. The general characteristics, however, conform with Osgood's (1937, pp. 55-62) ethnographic descriptions of aboriginal Tanaina Indian dwellings. It will be sufficient for the purposes of this paper simply to list those characteristics. They are: semi-subterranean house with semi-subterranean entrance tunnel, central fireplace, and adjoining room. The adjoining room is considered by Osgood (1937, pp. 60-61) to be a bath house. This type of house was a winter dwelling; during the summer months the people moved to favorite fishing places and constructed smaller, less permanent dwellings (Osgood, 1937, p. 59).

Houses similar to those at Pedro Bay are reported from Kachemak Bay III (de Laguna, 1934, p. 142), Susitna Valley late pre-contact sites (Irving, 1957, p. 41), Platinum South Spit and Chagvan Bay sites in Bristol Bay (Larson, 1950, pp. 178-181), and Uyak on Kodiak Island (Heizer, 1956, pp. 17-25). De Laguna notes that the smaller rooms in back of her houses were utilized for bathing and sleeping. The Pedro Bay houses, unlike the Kachemak Bay III houses, contained no fire cracked rock. The late pre-contact Susitna Valley houses are attributed to late Athabascan groups (Irving, 1957, p. 46). The Platinum South Spit and Chagvan Bay houses are very similar in every detail to those found at Pedro Bay. Houses at the Uyak site are generally smaller and differ, having rock lined firepits and short entrance tunnels. For additional discussion of house types see de Laguna (1934, pp. 157-162).

The subterranean fish cache is reported for the Kachemak Bay, Upper Inlet, and Kenai Tanaina but has not been reported for the Iliamna or Lake Clark Tanaina (Osgood, 1937, pp. 42, 56), Kafia, Platinum South Spit, Chagvan Bay, Uyak, or Kachemak Bay III sites. Rectangular storage pits are found, however, at most of the Susitna Valley sites (Irving, 1957, p. 46). The one larger subterranean structure which we have considered as a fish storage cache may have been a menstrual house, since Osgood (1937, p. 162) reports the practice of seclusion of a young girl at puberty in a special structure which may or may not be connected with the main house.

The four excavated houses may be considered to be contemporary. The same approximate floor depth below the present ground surface is maintained in all the houses; the house types are consistent. Structures are adjacent but neither rooms nor tunnels overlap. Artifact types are reasonably uniform throughout the site. All cultural materials were found beneath a 3 to 6 inch volcanic ash layer which probably represents the 1912 Katmai volcanic eruption.

Fishing

Evidence of fishing is limited to one unilaterally multibarbed antler *fish spear dart* (Pl. 1, 1). It has a wedge-shaped tang with a line hole drilled in the base.

Analysis and Comparison

The fish spear dart head with square to rounded tang and line hold has a wide distribution in southwestern Alaska, being reported from Kafia (Oswalt, 1955a, Pl. 7), Kachemak Bay (de Laguna, 1934, Pl. 9), Uyak (Heizer, 1956, Pl. 57, s, t), Bristol Bay (Larsen, 1950, Fig. 55), and ethnographically from the Tanaina (Osgood, 1937, Pl. 11).

Fishing, especially red salmon, was probably very important at Pedro Bay, but because of poor preservation and Tanaina technology, this is not reflected in the artifact inventory. The environment provides an excellent salmon fishing opportunity since this fish occurs in large numbers during June and July of each year, and there is no reason to believe that the opportunity was not utilized to a considerable degree. Indeed, from ethnographic information collected by Osgood (1937), the Tanaina utilized weirs, basket traps, dipnets, fishhooks, and bone fish gorges in their fishing activities as well as the fish spear dart head. Poor preservation may explain the absence of fishing implements since only four artifacts of bone or antler were found in the entire site.

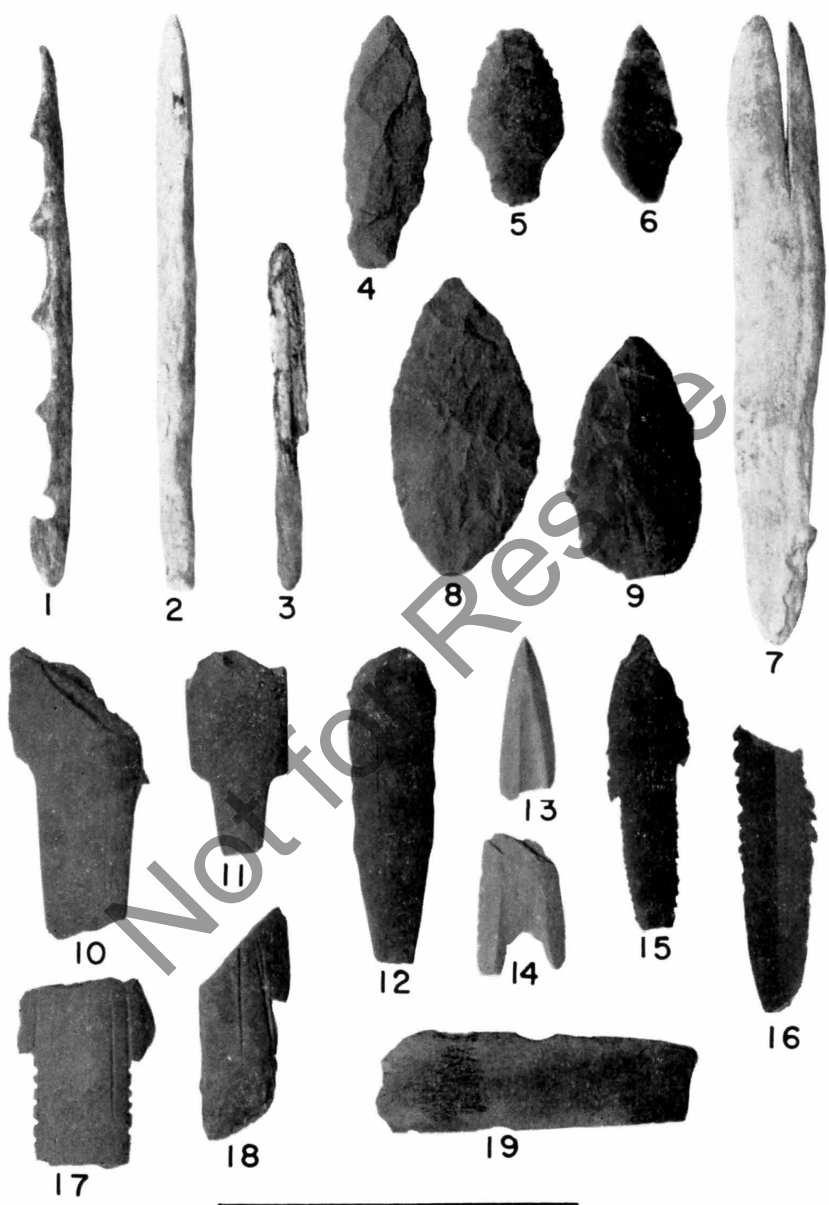
The importance of fishing is indicated also by the presence of four underground fish caches in the site, one for each house (Fig. 2). Other indications, such as fish cutting knives, will be discussed under tools.

No fish bones were recovered from any of the houses or cache A. Local informants stated that in the "old days" the people would throw the fish bones back into the water.

Land Hunting

Arrowheads of antler include two specimens (Pl. 1, 2-3), one of which is barbed. Both are round in cross-section and have wedge-shaped tangs without definite shoulders. Chipped arrowheads include three specimens with shouldered tangs (Pl. 1, 4-6). One specimen has a blunt tip (Pl. 1, 5). Two are made of slate; one is of jasper (Pl. 1, 6). Three ground slate *arrowpoints* have center grooves parallel to the edges (Pl. 1, 13, 14).

One bone *lance blade* has a shouldered wedge-shaped tang near the base (Pl. 1, 7). Two chipped slate lance blades have no tang and are leaf-shaped (Pl. 1, 8, 9). Ground slate *lance blades* include 21 specimens; 8 are fragmentary and unidentifiable types (Pl. 1, 10-12; 15-19). Two have shouldered tangs (Pl. 1, 10, 11); one is shoulderless and has a tang (Pl. 1,



0 cm. 10

PLATE I

PLATE 1

1.	fish spear dart head	8, 9.	chipped slate lance blades
2, 3.	antler arrowheads	10-12.	ground slate lance blades
4, 5.	chipped slate arrowheads	12, 14.	ground slate arrow points
6.	chipped jasper arrowhead	15-19.	ground slate lance blades
7.	bone lance blade		

12); five are bilaterally barbed with seriated parallel edges (Pl. 1, 15-17); one is bilaterally barbed with seemingly straight edges (Pl. 1, 18); one has edges which converge slightly forming a tang (Pl. 1, 19). All of the specimens have bilateral cutting edges.

Analysis and Comparison

According to ethnographic information, land hunting was very important among the Tanaina. Spears, bows and arrows, pitfalls, deadfalls, snares, and dogs were utilized in this subsistence activity (Osgood, 1937, p. 33-37).

Both arrowheads and lance blades show a great diversity in type. Arrowheads include bone points with or without barbs and chipped slate and jasper points. The chipped type is numerically more common. All of the arrowheads are similar to types found at Kachemak Bay II and III (de Laguna, 1934, Pl. 30, 41, 42), but there are no similarities to Kafia. One jasper point was found at Uyak (Heizer, 1956, p. 48).

The one bone lance blade with a shouldered wedge-shaped tang is not found at Kachemak Bay, Kafia, or Uyak, but has been reported ethnographically for the Tanaina (Osgood, 1937, p. 86). It is said to have been used in bear hunting. The tip has a slit which may have been for the insertion of a blade. However, this cannot be definitely determined because of the weathered condition of the bone.

The two leaf-shaped chipped slate lance blades found at Pedro Bay are similar to ones found in Kachemak Bay II (de Laguna, 1934, Pl. 30) and Kafia (Oswalt, 1955a, Pl. 2), but are not found at Uyak.

Ground slate lance blades are numerically predominant and have their closest affinities with blades from Kachemak Bay III (de Laguna, 1934, Pl. 31, 32) although they are also similar to blades from Kafia (Oswalt, 1955a, Pl. 1). This is certainly in agreement with de Laguna's statement that the territorial expansion of the Athabascans at the expense of the Eskimos in late times is accompanied by an increase in the importance of ground slate implements. However, late precontact Athabascan Susitna Valley sites have no trace of a ground slate industry (Irving, 1957, p. 46). Pedro Bay specimens which have distinct lateral barbs occurring at the base of the blade are not found at Kafia but are common at Kachemak

Bay (Oswalt, 1955a, p. 40; de Laguna 1934, Pl. 31), and Uyak (Heizer, 1956, Pl. 44, 45, 46), while specimens with a diamond-shaped cross section are found at all these sites.

A distinctive type of ground slate arrowpoint (Pl. 1, 13, 14) has a triangular groove parallel to the cutting edges on both sides of the blade. This type, which gives a "bayonet" appearance, is found at Pavik in Bristol Bay (Larsen, 1950, Fig. 55, A, 14, 15) and in Kachemak Bay III (de Laguna, 1934, Pl. 31, 5), Uyak (Heizer, 1956, Pl. 46, N), and Kafia (Oswalt, 1955a, Pl. 31).

A number of assumptions may be drawn from the analysis of ground slate blades. The slate was probably derived from a distant source by trade since no local source of the material was reported by Pedro Bay people. Osgood (1937, p. 75) states that trade was extensive between the people of Iliamna Lake, Cook Inlet, and Bristol Bay. As mentioned earlier, a Kodiak boy stated, in 1762, that the Eskimo of Kodiak traded with the Alegmuts, Tanaina, and Kolosh (Bancroft, 1886, p. 144). All the materials recovered (with the exception of a slate lance blank) seem to have been finished when broken and left in the houses. This would suggest the artifacts were roughed out before being traded to the Pedro Bay people and then finished at the site. It must be mentioned, however, that there was an abundance of grinding slabs and slate flakes in the site, but there were no stone saws. The quality of workmanship of the finished product is not high since most of the artifacts give a technologically unfinished appearance showing coarse abrasion scratches, saw marks, and secondary seriated edges (Pl. 1, 17, 18). The wide variety of types would suggest that the people had not reached a high degree of technological competence in the form and medium utilized. However, one specimen with a diamond-shaped cross section (Pl. 1, 16) and one "bayonet type" (Pl. 1, 13) do show a more finished appearance than the other points.

Faunal remains and ethnographic information indicate caribou, moose, brown bear, black bear, beaver, muskrat, lynx, sheep, goat, fox, mink, wolverine, squirrel, porcupine, and other small land mammals. The faunal remains included seal bones although no artifacts connected with sea mammal hunting were found. Osgood (1937, p. 37) reports that sea mammal hunting was practiced by most Tanaina groups; the inland Iliamna Lake group conducted expeditions to Kamishak Bay in Cook Inlet to obtain sea mammals.

Tools and Manufactures

Twenty six *ulu-like knives or scrapers* were found (Pl. 2, 1-8). Outstanding features are the wide variety in tang shapes, size, and cutting edge. On the basis of outline, these scrapers have been divided into eight types as follows:

Type 1—two boulder chip (Tci-Tho) specimens retouched along one edge, one oval and one irregular in outline (Pl. 2, 1).

Type 2—blunted sides converge to a flat top which is shorter than the cutting edge in five specimens (Pl. 2, 2).

Type 3—three scrapers are roughly square in outline; the top and cutting edge are parallel and the same in length (Pl. 2, 3).

Type 4—three specimens are rectangular in shape having sides twice as long as the cutting edge (Pl. 2, 4).

Type 5—the sides converge to a point at the top forming a distinct V-shaped tang in three specimens (Pl. 2, 5).

Type 6—three specimens have expanding and then converging sides which meet and form a flat top (Pl. 2, 6).

Type 7—of these three specimens which are oval in shape, struck from platform cores, and chipped along all edges, two retain part of the platform along one edge (Pl. 2, 7). This type may have been used as men's knives.

Type 8—one specimen, rectangular in outline, shows chipping and grinding on three edges (Pl. 2, 8). The two long sides are parallel and straight; the two short sides are convex, and only one of the edges was used. The top has a hole drilled through the center which served for hafting or suspension.

Three fragments of broken scrapers are made of beach pebble, slate, and schist respectively. The schist fragment is unique, in this collection, since it is the only one which has a notch in one side forming a tang.

Three *end scrapers* are made of flinty material and three are made of slate (Pl. 2, 9-11). One specimen was struck from a prepared core retaining a portion of the platform along one edge (Pl. 2, 11).

One *side scraper* or knife of slate is retouched along all edges and probably was used unhafted (Pl. 2, 12).

A *man's knife blade* of ground slate has bilateral expanding cutting edges and is lenticular in cross-section (Pl. 2, 13). This specimen could have been a lance blade.

Whetstones include seven specimens (Pl. 2, 14-16). Five are roughly rectangular in shape, ground on both sides, and on two or more edges (Pl. 2, 14, 15). One is rectangular in outline and has rounded ends (Pl. 2, 16).

All nine *grinding stones* are beach pebbles with one or more abrasion surfaces (Pl. 3, 1-3). They are irregular in shape; three specimens, which have pitted ends, could have been used as hammerstones (Pl. 3, 3).

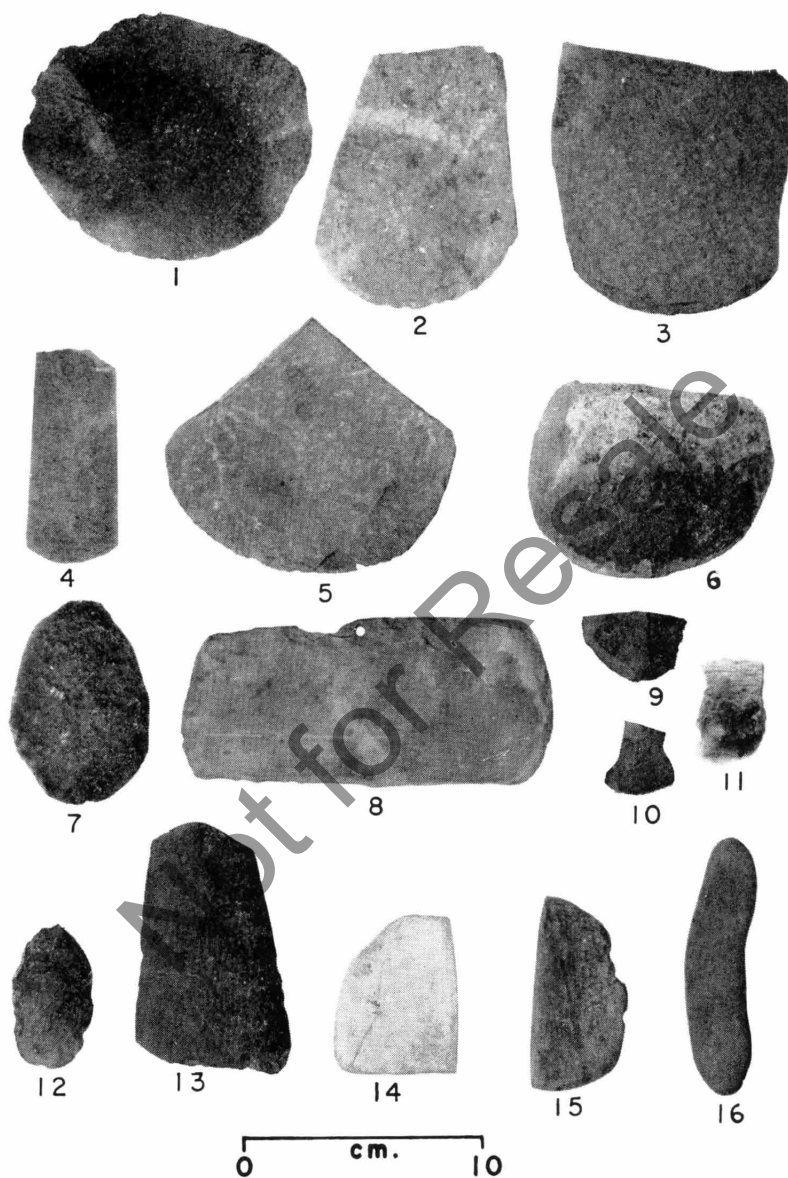


PLATE 2

- | | | | |
|----|--------------------------|--------|--------------------------|
| 1. | ulu-like scraper, Type 1 | 7. | ulu-like scraper, Type 7 |
| 2. | ulu-like scraper, Type 2 | 8. | ulu-like scraper, Type 8 |
| 3. | ulu-like scraper, Type 3 | 9-11. | end scrapers |
| 4. | ulu-like scraper, Type 4 | 12. | side scraper or knife |
| 5. | ulu-like scraper, Type 5 | 13. | man's knife blade |
| 6. | ulu-like scraper, Type 6 | 14-16. | whetstones |

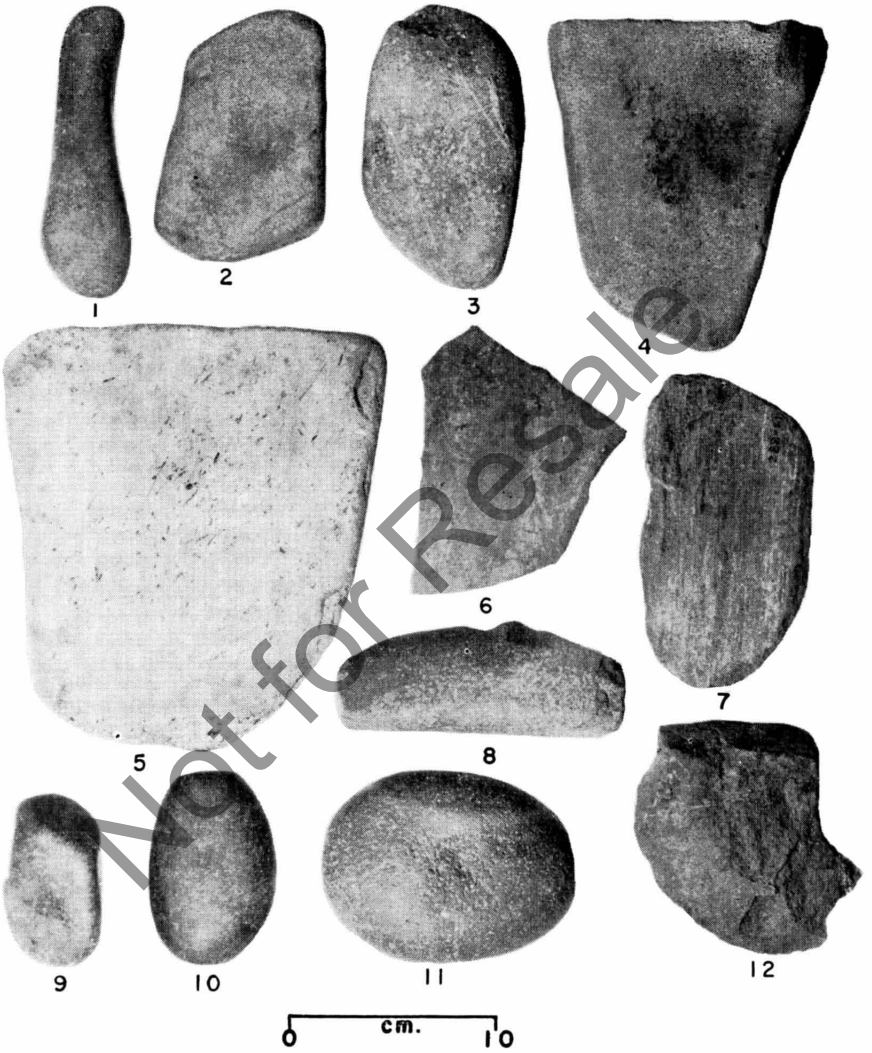


PLATE 3

1-3. grinding stones
4-7. grinding slabs
8. maul

9-11. hammerstones
12. chopper?

Of the ten *grinding slabs*, nine are sandstone and roughly rectangular in outline (Pl. 3, 4-7). Four show traces of red ocher (hemitite); three show signs of extensive use (Pl. 3, 4-6).

One *maul* head of slightly pecked beach pebble has a one-quarter central groove for hafting and blunt, flat ends (Pl. 3, 8).

Four of the five *hammerstones* are beach pebbles; one is basalt (Pl. 3, 9-11). One has been pecked on both ends and two sides (Pl. 3, 11). One hammerstone has smooth ends and was probably used for finer work (Pl. 3, 10). Another has ground surfaces on two sides and is pitted on one end (Pl. 3, 9). This specimen may have been used as a grinding stone. Two are roughly rectangular in outline and show little use.

The *chopper* has an irregular shape and a convex cutting edge (Pl. 3, 12). The top extends beyond the sides and has been ground along the platform end. This specimen may have been used also as an axe or scraper.

Red *ocher* (hemitite) was found throughout the four structures and was probably used extensively as a paint for personal adornment and on artifacts as decoration.

Analysis and Comparison

Ulu-like knives or scrapers are the most numerous single class of artifacts. These were divided into eight types on the basis of outline. While the use of Type 1 (Tci-Tho) is well established, the wide diversity of forms and tang arrangements of the other seven types seems to indicate some specialization in use. Each type has a considerable size range (Type 8, with only one specimen, is an exception). The collection of scrapers may be divided visually into two major groups, larger and smaller. On the basis of information obtained from a Kuskokwim River Eskimo, Oswalt (1955a, p. 31) suggests a specialization of use based on size; the larger scrapers or knives are used for salmon preparation and the smaller used in household tasks. Three Tanaina informants, when asked the function of these specimens, said that the larger scrapers were used in fish preparation, but they had no specific knowledge of the use of the smaller knives.

Pedro Bay ulu-like scrapers occur at Kaflia (Oswalt, 1955a, Pls. 1, 2, 3), Uyak (Heizer, 1956, Pls. 39, 42), and in all stages of Kachemak Bay culture including pre-Russian Indian culture (de Laguna, 1934, p. 61; Pls. 20, 33, 53, 56).

End scrapers occur but are not numerous at Kaflia (Oswalt, 1955a, Pl. 3) and Kachemak Bay (de Laguna, 1934, Pl. 30). They are not reported from Uyak. Pedro Bay side scrapers, differing from those found at Kaflia, were purposely manufactured. Some Pedro Bay side scrapers are similar to one found in Kachemak Bay III (de Laguna, 1934, Pl. 30). No side scrapers are reported from Uyak.

The one man's knife blade found at Pedro Bay is unlike those found at Kafia (Oswalt, 1955a, Pl. 3) and Uyak (Heizer, 1956, Pl. 35). This artifact exhibits finer workmanship than any other single specimen in the collection. It is similar to those found in all periods of Kachemak Bay (de Laguna, 1934, Pl. 32).

Grinding stones have been divided into three major types: whetstones, grinding stones, and grinding slabs. This division was made on the basis of size and form; it is quite possible that many of the specimens may have served more than one purpose.

Whetstones are widely distributed in southwestern Alaska and occur at Kachemak Bay (de Laguna, 1934, Pls. 22, 53, 55), Kafia (Oswalt, 1955a, Pl. 6), and Uyak (Heizer, 1956, Pl. 35).

Grinding stones similar to Pedro Bay specimens also occur at Kafia (Oswalt, 1955a, Pl. 6), Kachemak Bay (de Laguna, 1934, Pl. 21), and Uyak (Heizer, 1956, Pl. 35). They are all beach pebbles which have been modified.

Grinding slabs occur in Kachemak Bay III (de Laguna, 1934, Pl. 18) but are not found at Kafia. Four of the Pedro Bay specimens show traces of red ocher and were probably used in the manufacture of this pigment. Three stone objects with hematite stains were reported from Uyak and discussed under paint mortars (Heizer, 1956, p. 53).

Hammerstones are common to all stages of Kachemak Bay (de Laguna, 1934, Pl. 21). One Pedro Bay type, which has been pecked in the middle of both sides, was not present in the Kachemak Bay sequence. Hammerstones were also found at Uyak (Heizer, 1956, Pl. 34) and Kafia (Oswalt, 1955a, Pls. 5, 6).

Choppers are found at Kafia (Oswalt, 1955a, Pl. 3) but were not reported from Kachemak Bay or Uyak.

Red ocher is found at Kachemak Bay (de Laguna, 1934, p. 117) and Uyak (Heizer, 1956, p. 53) but was not reported from Kafia.

Household

Pottery is limited to two black, crude sherds (Pl. 4, 1). The two sherds found at Pedro Bay were fired in a poorly controlled oxidizing atmosphere. The core color is 2.5Y 2/0 on the Munsell color chart and the surface is 10 YR 3/2 to 2/1 on the Munsell color chart. The surface is not consistent in color and the finish is slightly smoothed. The fracture is crumbling. The temper is coarse and very coarse sand (Wentworth gauge mica) with a few particles of grass. The thickness is 0.6 cm.

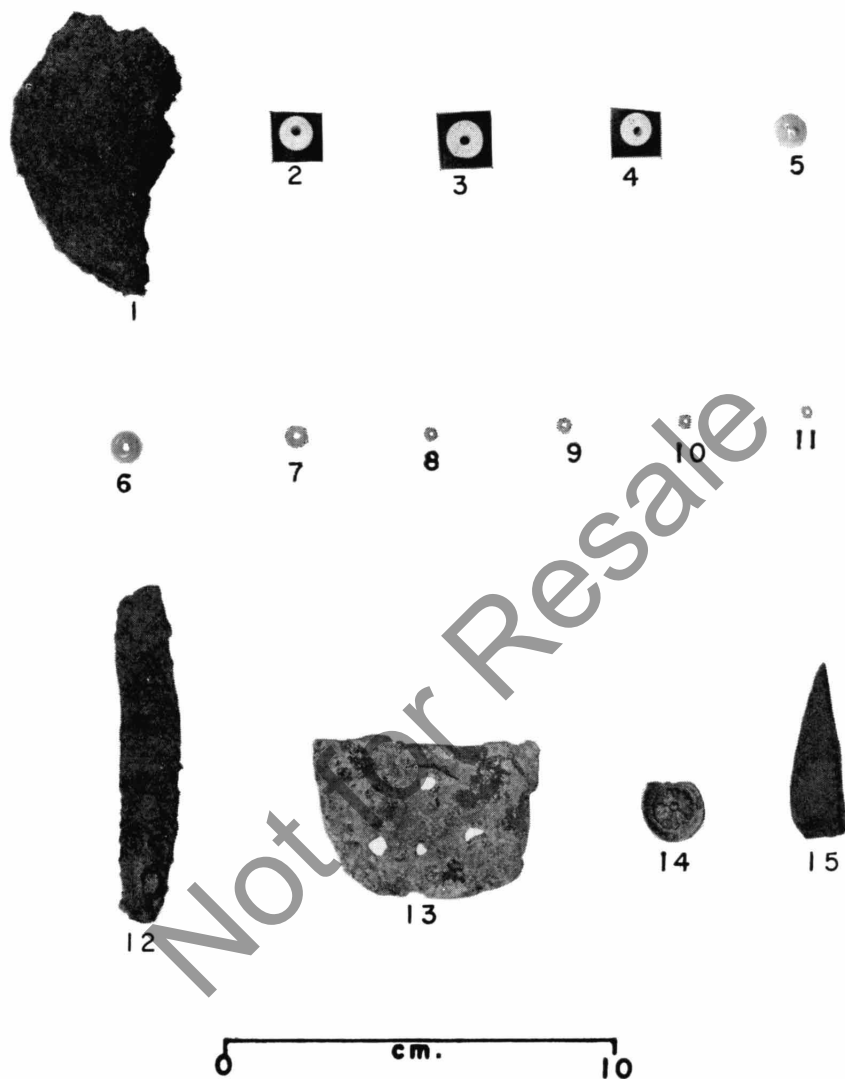


PLATE 4

- | | | | |
|-------|---------------------|-------|----------------------------|
| 1. | pottery sherd | 8. | glass bead, Type 6 |
| 2, 3. | glass beads, Type 1 | 9-11. | glass beads, Type 7 |
| 4. | glass bead, Type 2 | 12. | iron fragment, use unknown |
| 5. | glass bead, Type 3 | 13. | copper object, use unknown |
| 6. | glass bead, Type 4 | 14. | copper button? |
| 7. | glass bead, Type 5 | 15. | lancelet |

Birch bark, which was probably used for household containers and roofing materials, was found in all four structures. Because of poor preservation, no particular designs or shapes could be distinguished.

Analysis and Comparisons

No pottery was found at Kafia or Uyak, but two sherds were found at Kachemak Bay (de Laguna, 1934, Pl. 29). The Kachemak Bay sherds are not similar to the Pedro Bay sherds. Pottery has been reported from the Bristol Bay sites of Pavik, Snag Point, Platinum South Spit, Chagvan Bay, and Nanvak Bay (Larsen, 1950, pp. 178-184). The Pavik thin ware (0.5-0.8 cm.) closely resembles the two Pedro Bay sherds which may have originated at Pavik. It is also interesting that "bayonet" type grooved points, glass beads, iron, and a predominance of ground slate objects as well as similar house types are found at both Pavik and Pedro Bay. Osgood (1937, p. 77) reports that pottery was found only among the Kachemak Bay Tanaina, who may have manufactured it themselves or gained it in trade with the Ingalik at Anvik.

For additional discussion of Alaskan pottery, interested readers may consult Oswalt (1952b, 1953a, 1953b, 1955b), de Laguna (1947), and Van Stone (1954).

Birch bark containers are reported for the Iliamna Tanaina (Osgood, 1937, p. 104) in addition to containers of wood and skin. The use of stone lamps by the Iliamna Tanaina is also reported (Osgood, 1937, p. 108) but has already been shown to be absent from the Pedro Bay collection. Father Juvenal (1952, p. 50) noted that, in contrast to the coastal peoples, the Iliamna (or Lake Clark ?) people used no oil except for oiling bidarkas and the article seemed quite scarce. It may then be inferred that the stone lamp was not used. This might suggest that the introduction of stone lamps into the Iliamna Lake Tanaina culture was after the abandonment of the Pedro Bay site and after 1800.

Personal Adornment

Fifteen *glass beads* of European manufacture were found at Pedro Bay (Pl. 4, 2-11). They have been divided into seven types on the basis of size and color. There are three main sizes: large, medium, and small which are 0.8 cm., 0.6 cm., and 0.4 cm. respectively.

Type 1—two beads are large, opaque white, and irregular in outline (Pl. 4, 2-3).

Type 2—two beads are large, opaque white, and circular in cross-section (Pl. 4, 4).

Type 3—two beads are large, opaque light blue, and circular in cross-section (Pl. 4, 5).

Type 4—one bead is large, opaque dark blue, and circular in cross-section with the sides converging slightly at the top (Pl. 4, 6).

Type 5—one bead is medium, translucent blue, and has been ground flat at both top and bottom (Pl. 4, 7).

Type 6—one bead is small, opaque blue-green, and oval with flat ends in cross-section (Pl. 4, 8).

Type 7—six beads are small, translucent blue, and oval with flat ends in cross-section (Pl. 4, 9-11).

One *bear tooth pendant* was badly deteriorated but may have had a hole drilled in one end for attachment.

Analysis and Comparison

The fifteen glass beads found at Pedro Bay present interesting problems. The distributional and chronological implications of glass beads in the southwestern Alaska area have been discussed by de Laguna (1956, pp. 60-65; p. 211), and it will not be necessary to reiterate the literature.

In the excavations at Pedro Bay, the fifteen beads recovered from three houses are divided into seven types since it is felt that each type is distinct and may have chronological implications for future archaeological work in the area. De Laguna's "Cook" type blue glass bead has been classified as Type 3 in our classification, and the "Glacier Island" (Prince William Sound) black and white type beads were not found at Pedro Bay. Types 1, 2, 4, 6, and 7 are not found at Prince William Sound.

Glass beads were not found at Kachemak Bay, Kafia, or Uyak, but blue, red, and white glass beads were reported from Pavik in Bristol Bay and are considered to date from the nineteenth century (Larsen, 1950, Fig. 55, A, 12, 13).

De Laguna (1956, p. 64) suggests four cultural stages in Prince William Sound. On the basis of glass beads alone, the Pedro Bay site would resemble her protohistoric stage. In conclusion, it seems probable that glass beads were in the Tanaina, Chugach, and Bristol Bay area before 1741 and certainly before Cook's arrival in Cook Inlet in 1778.

Pendants of bear teeth are found at Kachemak Bay (de Laguna, 1934, Pl. 50, 56) but not reported from Kafia or Uyak.

Ceremonial or Medical

One ground slate *lancet* knife has bilateral cutting edges, semi-lunar outline, and is flat in cross-section (Pl. 4, 15).

Analysis and Comparison

This lancet is not found at Kachemak Bay, Uyak, or Kafia, but Osgood (1937, p. 116) reports that lancing was practiced by the Tanaina in order to remove "bad blood." The knife Osgood described, however, is larger and different in form from the Pedro Bay lancet.

Miscellaneous

Two fragments of *iron* were found but are so badly deteriorated that their use could not be determined (Pl. 4, 12).

One circular *copper button* (?) has a flat back and a sunflower design on the front side (Pl. 4, 14). One edge of the button appears to have been broken and there is no apparent means of attaching the object to anything.

One *copper object* has four drilled holes for attaching or hafting (Pl. 4, 13). It is 0.1 cm. in thickness.

Analysis and Comparison

The distributional and chronological implications of iron and copper have been discussed by de Laguna (1956, pp. 60-65). It will be sufficient to point out here that probably both iron and copper were in the area before 1741. On the basis of iron, copper, and beads, the Pedro Bay site would fall between the *later pre-historic* and *protohistoric* of Prince William Sound.

Copper objects are found at Kachemak Bay (de Laguna, 1934, Pl. 49) but are not reported from Kafia or Uyak. The Pedro Bay people could have secured copper in trade from the Copper River Indians as the Cook Inlet Athabascans did (de Laguna, 1934, p. 118). They also could have secured it from a local copper source reported at Knudson Bay on the north shore of Iliamna Lake or from another source located 15 miles east of the Newhalen River (Martin and Katz, 1910, p. 197).

Comparative Summary

From the text comparisons, it is obvious that the archaeological material from the Pedro Bay site most closely approximates the Kachemak Bay III material. The following is a list of comparable traits from Pedro Bay and Kachemak Bay III:

- hammerstones
- grinding stones
- grinding slabs
- boulder chip scrapers
- whetstones
- pottery (two sherds from each)

chipped stone blades: leaf-shaped with straight base
 leaf-shaped with round or pointed base
 oval

chipped stone blades: lance blade
 end scraper blade
 oval scraper

polished stone blades: barbed
 with tang
 leaf-shaped
 triangular lance blade

ulu: curved edge, back notched, unnotched, or with hole

man's knife-like ulu: hafted or unhafted

chipped slate scraper or ulu

dart head: barbed on one side, without blade

bone arrowhead, without blade

pendant: tooth ?

paint: hematite

copper

semi-subterranean house, with semi-subterranean tunnel

central fireplace inside house

Traits which are present at Kachemak Bay III but are absent from Pedro Bay are:

notched stones

splitting adze

planning adze

stone saw

stone lamp

hunter's lamp

ulu: straight edge

double-ended slate scraper

drill

harpoon head

socket-piece

bone shaft

fishhook

bone pin

bone needles

awl

bone scraper

rib flint flaker

wedge

ice-pick

spoon

ornament complex: nose pin, labret, ear plugs

burials

The beaver-tooth draw knife, awls, and bark peeling tools, which are widespread among many northern Athabascans, were not present at Pedro Bay. The absences may be explained in part by the poor organic preservation of the Pedro Bay site since Osgood (1937, p. 103) reports the use of beaver-tooth draw knives at Iliamna as well as the utilization of the bark peeling tool in securing spruce bark for roof covering (Osgood, 1937, p. 56). The stone lamp, although reported from Iliamna (Osgood, 1937, p. 108), was not found at the Pedro Bay site, but local informants knew of its use in the past.

Sea mammal hunting was important at Kachemak Bay, Kafia, Uyak, and Bristol Bay sites, but not one artifact was found at Pedro Bay which would indicate its practice. Sea mammal hunting, however, does seem to have been practiced by the Iliamna Tanaina since Osgood (1937, p. 37) reports that they often conducted excursions to Cook Inlet to hunt sea mammals and gather shellfish. The Pedro Bay site contained several sea mammal bones. In conclusion, it seems that sea mammal hunting, although practiced, was of little economic importance.

Summary and Conclusions

From the standpoint of local (Iliamna Lake, Clark Lake, and surrounding territory) Indian and Eskimo culture in southwestern Alaska, we have divided the historic period into four parts: *Early Russian*, *Middle Russian*, *Late Russian*, and *American*.

Early Russian—1741 to 1784

This period was initiated with the voyage of Bering in 1741 and ended with the establishment of a permanent settlement on Kodiak Island by Shelikof in 1784. A few glass beads of European manufacture were present, and there was a limited use of European iron and native copper.

Middle Russian—1784 to 1799

Shelikof's settlement on Kodiak Island initiated the Middle Russian period, and the founding of the Russian-American Company in 1799 ended the period. The time was characterized by intensive Russian-Indian and Russian-Eskimo interchange and conflict, struggles among Russian fur trading companies for control of the rich fur market, and the introduction of the Russo-Greek Orthodox missionary activity. Glass beads, iron and other European articles increased in abundance, but the Russo-Greek Orthodox religious beliefs found little acceptance as evidenced by the killing of Father Juvenal in the Iliamna region.

Late Russian—1799 to 1867

With the establishment of the Russian-American Company in 1799 the Late Russian period began and ended with the sale of Alaska to the United States in 1867. A relatively peaceful relationship between the Russian-Indian-Eskimo components characterize this period coupled with the unified exploitation of the fur resources by the Russian-American Company monopoly. It marked the end of serious organized native resistance to the Russians. Russo-Greek Orthodox religion was finding acceptance among most of the Iliamna Lake people.

American—1867 to Present

The American period was initiated in 1867 with the sale of Alaska to the United States. Political authority changed, and a different philosophy toward aboriginals became a new basis for administration. This change of administration had little immediate effect upon native life, but through the years the transition from aboriginal culture to Russian subject to American subject to American citizen to State of Alaska citizen has altered the way of life to a considerable extent.

American material goods were substituted for Russian goods, and Protestant and Roman Catholic missionary activity was initiated and continues today. The American missionary activity has found little acceptance among the Indians and Eskimo of Iliamna Lake; the Russo-Greek Orthodox religion is widely accepted and practiced. The majority of the people seem to prefer "the religion that the priests brought."

The Pedro Bay site would fall between the Early and Middle Russian periods, probably around 1750-1800. The site was occupied briefly by a group of Tanaina Indians and was abandoned prior to direct Russian contact on Iliamna Lake. Because of the few trade beads, copper articles, and two iron fragments, the site should be placed between the *later prehistoric* and *protohistoric* described by de Laguna for Prince William Sound.

The task of future archaeological work in this area would now seem to be the delineation, description, and comparison of those *prehistoric* cultures, both Indian and Eskimo, which surely occupied the Iliamna Lake region. Only then will we have a much needed picture of the aboriginal composition and development in this vast and important central region of southwestern Alaska as well as an evaluation of their role within the larger sub-arctic area.

Trait List

	H-1	H-2	H-4	Total
<i>Fishing</i>				
dart head, multi-barbed (Pl. 1, 1)			1	1

	H-1	H-2	H-4	Total
<i>Land Hunting</i>				
arrowhead, antler, barbless (Pl. 1, 2)		1		1
arrowhead, antler, with barb (Pl. 1, 3)		1		1
arrowhead, chipped slate, with tang (Pl. 1, 4-5)	1	1		2
arrowhead, chipped jasper (Pl. 1, 6)		1		1
arrowhead, chipped chert, fragment	1			1
lance blade, bone (Pl. 1, 7)	1			1
lance blade, chipped slate, without tang (Pl. 1, 8-9)	2			2
lance blade, ground slate, shouldered tang (Pl. 1, 10-11)	2			2
lance blade, ground slate, with tang (Pl. 1, 12)	1			1
lance blade or arrowpoint, ground slate, center grove (Pl. 1, 13-14)	2	1		3
lance blade, ground slate, bilaterally barbed, seriated lateral edges (Pl. 1, 15-17)	3	2		5
lance blade, ground slate, bilaterally barbed fragments (Pl. 1, 18)	3			3
lance blade, ground slate, converging lateral edges (Pl. 1, 19)	1			1
lance blade, ground slate, unfinished	1			1
lance blade, ground slate, fragments	7			7
<i>Tools And Manufacture</i>				
ulu-like blades or scrapers				
Type 1 (Pl. 2, 1)	1	1		2
Type 2 (Pl. 2, 2)	2	2	1	5
Type 3 (Pl. 2, 3)	1	1	1	3
Type 4 (Pl. 2, 4)	2		1	3
Type 5 (Pl. 2, 5)		2		3*
Type 6 (Pl. 2, 6)	2		1	3
Type 7 (Pl. 2, 7)	2	1		3
Type 8 (Pl. 2, 8)			1	1
fragments, not classified	1	2		3
end scrapers (Pl. 2, 9-11)	7			7
side scraper or knife (Pl. 2, 12)	1			1
man's knife blade (Pl. 2, 13)	1			1
whetstones (Pl. 2, 14-16)	2	5		7
grinding stones (Pl. 3, 1-3)	3	3	3	9
grinding slabs (Pl. 3, 4-7)	5	5		10
maul (Pl. 3, 8)	1			1
hammerstones (Pl. 3, 9-11)	2	2	1	5
chopper ? (Pl. 3, 12)	1			1
ocher, red	X**	X**	X**	
<i>Household</i>				
pottery sherds (Pl. 4, 1)	2			2
birch bark containers	X**	X**	X**	
<i>Personal Adornment</i>				
glass beads				
Type 1 (Pl. 4, 2-3)	1	1		2
Type 2 (Pl. 4, 4)	1	1		2
Type 3 (Pl. 4, 5)	1	1		2
Type 4 (Pl. 4, 6)	1			1

	H-1	H-2	H-4	Total
Type 5 (Pl. 4, 7)		1		1
Type 6 (Pl. 4, 8)		1		1
Type 7 (Pl. 4, 9-11)	5	1		6
tooth pendant?	1			1

Ceremonial Or Medical

lancet, ground slate (Pl. 4, 15)		1		1
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Miscellaneous

metal fragments, iron (Pl. 4, 12)		1	1	2
metal fragments, copper (Pl. 4, 13)	1			1
metal fragment, copper button ? (Pl. 4, 14)	1			1
wood fragments, use unknown	3			3

* denotes one item found in cache A.

X** denotes traces present but not salvaged.

Notes

¹ The authors wish to express their sincere thanks to the many residents of Iliamna Lake who were so helpful throughout the course of the field work. Gratitude is expressed especially to Mr. and Mrs. Robert Walker, Mr. and Mrs. Holly Foss, Mr. and Mrs. Nels Hedlunds, Mr. Arsene Mulognok, and the staff of the Federal Aviation Authority at Iliamna. We are especially indebted to Dr. Wendell Oswalt, of the University of California at Los Angeles, who suggested and supervised the project and made helpful suggestions concerning the manuscript.

² The present Lake Iliamna was named Shelekof on maps until 1844, and some maps retained this name until after 1857. The present Lake Clark was named Ilima on maps through 1857. On later maps it was included with Iliamna Lake under the name of the latter or was not named at all (Alaska Boundary Tribunal, 1904, vols. 1, 2). Petrof (1884, pl. 17) referred to Lake Clark as Kichik Lake and the village then located there as Kichik. Wilfred Osgood (1904, p. 329) stated that Kichik (or Keeghik) was also named Nikhak. Lake Clark received its present name after its modern discovery by J. W. Clark of the Alaska Commercial Company in 1891 (W. H. Osgood, 1904, p. 326). Because of the change in the name of Iliamna Lake and the similarity of the name Ilima (Lake Clark) to it, there is often doubt as to which lake is being referred to in the literature, and care must be taken in utilizing historical information concerning this area.

Bibliography

Alaska Boundary Tribunal

1904 United States Atlas, Vol. 1. British Atlas, Vol. 2. Senate Document 162, 58th Congress, second session. Washington.

Alaska History Documents

n.d. Vol. 2; Vol. 4. University of Alaska Ms.

Andreyev, A. I. (ed.)

1952 Russian Discoveries in the Pacific and in North America in the Eighteenth and Nineteenth Centuries. Trans: Carl Ginsburg. Published for American Council for Learned Societies by J. W. Edwards, Ann Arbor.

Arctic Bibliography

- 1953 Volumes 1-9. Arctic Institute of North America, Department of Defense. Washington.
- Bancroft, Hubert Howe
1886 History of Alaska 1730-1885, Vol. 33. A. L. Bancroft and Co. San Francisco.
- Birket-Smith, Kaj
1929 The Caribou Eskimos. *Report of the 5th Thule Expedition 1921-24*. The Danish Expedition to Arctic North America in charge of Knud Rasmussen, Vol. 5. Copenhagen.
- Birket-Smith, Kaj and Frederica de Laguna
1938 The Eyak Indians of the Copper River Delta, Alaska. Det Kgl. Danske Vidensk. Selskab. Copenhagen.
- Compilations of Narratives of Explorations in Alaska
1900 56th Congress Senate Committee on Military Affairs, first session. Report. Washington.
- Cook, James
1794 Voyage to the Pacific Ocean 1776-80, Vols. 2 and 3. London.
- Coxe, William
1787 Account of the Russian Discoveries Between Asia and America. Third edition. T. Cadell. London.
- Dall, William Healey
1870 Alaska and Its Resources. Boston.
1877 Tribes of the Extreme Northwest. Contributions to American Ethnology, Vol. 1, Part I. Washington.
- Golder, F. A.
1925 Bering's Voyages, Vol. 2. American Geographical Society. New York.
- Gorman, M. W.
1903 The Iliamna Lake Region, Alaska. *Pacific Monthly*, Vol. 9, pp. 299-304. Portland.
- Heizer, Robert F.
1956 Archaeology of the Uyak Site Kodiak Island, Alaska. *Anthropological Records*, Vol. 17, No. 1. University of California, Berkeley.
- Hrdlicka, Ales
1943 Alaska Diary 1926-1931. Jaques Cattell Press. Lancaster.
- Irving, William N.
1957 An Archaeological Survey of the Susitna Valley. *Anthropological Papers of the University of Alaska*, Vol. 6, No. 1, pp. 37-52. College.
- Jochelson, Waldemar
1933 History, Ethnology, and Anthropology of the Aleut. *Carnegie Institution Publication*. Washington.
- Juvenal, Father
1952 A Daily Journal Kept By the Rev. Father Juvenal, One of the Earliest Missionaries to Alaska, 1796. *Kroeber Anthropological Society Papers*, No. 6, pp. 31-59. Berkeley.
- de Laguna, Frederica
1934 The Archaeology of Cook Inlet, Alaska. Museum of the University of Pennsylvania, Philadelphia.
1947 The Prehistory of North America as Seen from the Yukon. *Memoirs of the Society for American Archaeology*, No. 3. Menasha.

- 1956 Chugach Prehistory; The Archaeology of Prince William Sound, Alaska. University of Washington Press. Seattle.
- Larsen, Helge
 1950 Archaeological Investigations in Southwestern Alaska. *American Antiquities*, Vol. 15, No. 3, pp. 177-187. Menasha.
- Lisiansky, Urey
 1814 A Voyage Round the World in the Years 1803, 1804, 1805, & 1806 in the Ship Neva. London.
- Martin, G. C. and F. J. Katz.
 1910 Outline of the Geology and Mineral Resources of the Iliamna and Clark Lake Region. In: Mineral Resources of Alaska by Alfred H. Brooks et. al. *United States Geological Survey*, Bulletin 442. Washington.
- Meares, John
 1791 Voyages Made in the Years 1788 and 1789 from China to the North West Coast of America in the Ship Nootka. London.
- Osgood, Cornelius
 1933 Tanaina Culture. *American Anthropologist*, Vol. 35, No. 4, pp. 695-717.
 1936 The Distribution of the Northern Athapaskan Indians. *Yale University Publication in Anthropology*, No. 7. New Haven.
 1937 The Ethnography of the Tanaina. *Yale University Publications in Anthropology*, No. 16. New Haven.
- Osgood, Wilfred H.
 1904 Lake Clark, a Little Known Alaska Lake. *National Geographic Magazine*, Vol. 15, pp. 326-331. Washington.
- Oswalt, Wendell
 1952a The Archaeology of Hooper Bay Village, Alaska. *Anthropological Papers of the University of Alaska*, Vol. 1, No. 1, pp. 47-91. College.
 1952b Pottery from Hooper Bay Village, Alaska. *American Antiquity*, Vol. 18, No. 1, pp. 18-29. Salt Lake City.
 1953a Northeast Asia and Alaskan Pottery Relationships. *Southwestern Journal of Anthropology*, Vol. 9, No. 4, pp. 395-407. Albuquerque.
 1953a Recent Pottery from the Bering Strait Region. *Anthropological Papers of the University of Alaska*, Vol. 2, No. 1, pp. 5-18. College.
 1955a Prehistoric Sea Mammal Hunters at Kaffia, Alaska. *Anthropological Papers of the University of Alaska*, Vol. 4, No. 1, pp. 23-61. College.
 1955b Alaskan Pottery: A Classification and Historical Reconstruction. *American Antiquity*, Vol. 21, No. 1, pp. 32-43. Salt Lake City.
- Petrof, Ivan
 1884 Alaska, Its Population, Industries, and Resources. In: Tenth Census of the United States, 1880, Vol. 8. Washington.
- Portlock, Nathaniel
 1789 A Voyage Round the World; but More Particularly to the North-West Coast of America: Performed 1785, 1786, 1787, and 1788 etc. London.
- Sauer, Martin
 1802 An Account of a Geographical and Astronomical Expedition to the Northern Parts of Russia . . . by Commodore Joseph Billings in the Years 1785 & to 1794. T. Cadell. London.
- Tikhmenev, Peter Aleksandrovich
 The Historical Review of the Formation of the Russian-American Company and Its Activity Up to the Present Time. St. Petersburg.
 1861 Part I.

1863 Part II.

(Trans: 1939-40 by Dimitri Krenov. Works Progress Administration. Seattle. Microfilm of Ms. in the library of the University of Alaska. Page references of the text refer to the translation pages.)

VanStone, James W.

1954 Pottery from Nunivak Island, Alaska. *Anthropological Papers of the University of Alaska*, Vol. 2, No. 2, pp. 181-193. College.

1955 Archaeological Excavations at Kotzebue, Alaska. *Anthropological Papers of the University of Alaska*, Vol. 3, No. 2, pp. 75-155. College.

Wickersham, James A.

1927 A Bibliography of Alaskan Literature 1724-1924. *Miscellaneous Publications Alaska Agricultural College*, Vol. 1. Cordova.

Not for Resale

PARTNERSHIP AND WIFE-EXCHANGE AMONG THE ESKIMO AND ALEUT OF NORTHERN NORTH AMERICA*

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This article is a comparative study. It examines certain aspects of the social organization of Eskimo and Aleut groups in North America. It focusses its attention upon institutionalized associations contracted between two or more males. The associations are periodically celebrated by the exchange of gifts; wives are the most valuable gifts exchanged.

The first section of the paper is devoted to a description of the associations. The second portion consists of an analysis of the data. Section three stresses the need for further ethnographic investigation of the phenomena.

Description

The following customs have been noted among the Caribou Eskimo. "When a stranger arrives at a camp it is impolite to drive right up to it.

"In time the stranger is invited into a snow house or a tent, where he is a guest during his stay. Sometimes there is a drum dance in the evening in honor of the new arrival and if the stranger and one of the camp are 'song cousins' there is a distribution of presents (Birket-Smith, 1929, p. 267). Birket-Smith was present in person on one such occasion. He observed that "One day at Eskimo Point a man, Tuktuisuq, who was a 'song cousin' to one of the inhabitants of the place, Nanuik, arrived from the south. At the feast of welcome, which was held in the evening in one of the big deer-skin tents, the door was opened by one of the settlement's own inhabitants". The visitor "... was given a rifle as a present. ..." (*Ibid*, p. 160) The next evening the guest, Tuktuisuq, gave his host a gift. Both gifts represented considerable value.

Among the Copper Eskimo visiting between camps was facilitated in the following manner. "Strangers who come and attach themselves to the group try to connect themselves by marriage, or by establishing definite ties with individual members. Even temporary visitors do the same. When Koksuiik, the Pallick Eskimo from Hudson Bay, paid a three day's

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visit to the Dolphin and Union Strait Eskimos, their foremost man Ikpakuak made him his 'dancing-associate', *Numikattia*. In this way a permanent tie was established between the two men, to last till one of them died or a violent quarrel caused their estrangement. "It is by these two methods, then, by wife exchange and by association in dancing that the Copper Eskimo establishes friendships wherever he goes and travels from group to group without danger" (*Ibid*, pp. 86-87).

Stefansson noted that among the Komallik Eskimo "... wives are exchanged but for seldom more than one night at a time, and seldom except upon the two families meeting after a protracted separation. After another separation this may be repeated. This practice seems to be seldom indulged in except by close friends, partners, sort of blood brothers" (Stefansson, 1914, p. 164).

Among the Eskimo around Bering Strait, "It is a common custom for two men living in different villages to agree to become bond-fellows or brothers by adoption. Having made this arrangement, whenever one of the two men goes to the other's village he is received as the bond brother's guest and is given the use of his host's bed with his wife during his stay. When the visit is returned the same favor is extended the other, consequently neither family knows who is the father of the children ... but the children know each other by a special term and the two men also separate out their relationship and mark it with a unique term" (Nelson, 1896-97, p. 292).

Nelson reported also on a ceremony which he called the Asking Festival. In this rite the entire population of an encampment participated. One of the populace was delegated to hold in his hand a wooden wand-like stick. The wand symbolized his exalted station during the proceedings. Each of the other participants in the rite requested the wand-holder to secure for him an object or favor from some person of the opposite sex. The petitioner specified which individual was to provide the gift. When the petitioner specified an unmarried woman, it was customary to ask her to spend the night hours with him. As were all other requests, this one was granted. Whatever was the nature of the favor or present exchanged between the pair, all persons ... "exchanging presents in this way are considered to hold a certain temporary relationship, termed *i-lo-g'uk*. Formerly those once made *i-lo-g'uk* exchanged presents each succeeding year at this festival. ..." (*Ibid*, p. 360) Similar to the Asking Festival of the Bering Straits people was the Sayak ritual exchange among the Chukotsky (Siberia) Eskimo (Hughes, 1959, p. 82).

Also similar to the Asking Festival was a ceremony observed on the west coast of Hudson Bay. Boas wrote that each time that an *angakok* performed an incantation "... the people must exchange wives. The women must spend the night in the huts of the men to whom they are

assigned" (Boas, 1901, p. 158). Similar to the ceremony which Boas described is the *kaezivae* ceremony on St. Lawrence Island (Hughes, 1960, p. 268) of which more shall be said later.

In an ethnography of the Greenlanders the observer took pains to distinguish between an exchange of wives which recurred between the same two associates and another form of wife-exchange. According to Thalbitzer "Distinction must be drawn between the exchange of wives which took place when the lamps were put out during a cultic festival and lasted for only one night, and that which was the result of an arrangement between two men with a view to the procreation of children, or because of mutual attraction, which continued for a longer period. According to the usual conception of the Ammassalik Eskimo only the latter sort of exchange influenced procreation, while a single copulation was not supposed to bear fruit."

"The child which is procreated after the longer exchange is mentioned by both the men as their 'half-and-half child', no matter which of them it most resembles, and they refer to themselves by an expression which means 'half-cousins' (*awiliareen*) and might also be translated as 'partners', 'fellows who share half-and-half' (*Ibid*, pp. 653-654). Birket-Smith, also, commented that an existential distinction was observed between the two forms of wife-exchange among the Greenlanders (Birket-Smith, 1959, p. 140).

Hawkes, an early observer of the Labrador Eskimo, reported that wife-exchange among this people was institutionalized. He interpreted the custom somewhat differently from most other students of the Eskimo way of life, a point which we shall take up in the next section of the article.

We now turn our attention to the west coast and to its off-shore islands. Shade, who spent a brief period with the Aleut on Unmak Island, provided some evidence that an institutionalized form of partnership existed in the village of Nikolski. He commented that "Another relationship which I never got the meaning of was *ungitkuqing*. This is a verb form which means 'I depend on'. The relationship itself is called *ungitakun*. I do not know what part of speech this is. Afenogin told me that he 'depended on' Fred, in that Fred would always be there to help him in his old age, and that he would always assist Fred when he could. This seems to be some kind of mutual arrangement with special significance. . . ." (Shade, n.d., p. 68 [3]).

The intriguing but isolated bit of information about the Aleutian *ungitakun* relation brings to mind a similar relationship found on the islands of Nunivak and St. Lawrence. Margaret Lantis wrote about Nunivak: "If two men were serious partners . . . then all of their children were partners to each other also, regardless of age and sex differences. Fortunately only the children of the males in these partnerships would

have to continue them [the partnerships], otherwise the number of one's partners would become a burden rather than the aid they were supposed to be. Apparently the relationship arose in the first place by two men agreeing to help each other. . . ." Indeed, when a man visited a village in which lived his partner the former ". . . was given food, physical and moral assistance, the use of implements, the use of a wife if he needed any of these" (Lantis, 1946, p. 243).

Hughes described the ceremony known as *kaezivas*, previously mentioned, by which special associations were inaugurated. "On St. Lawrence Island, in apparent contrast to many other Eskimo groups, this wife-exchange pattern was always formally through a special ceremony which involved various aspects of the religious system. This ceremony, called the *kaezivas*, implicated the closest kinsmen (and their wives) of each *nangsegaek* partner [a man with whom one exchanged wives], and the various sections of the total rite extended over a period of several days. Prominent in it were dancing between the men and the women guests, and in the inner sleeping room where the dances were held, these couples circled a seal-oil lamp. The men of one *ramka* [patrilineage] danced in this fashion with the women of the *nangsaegaek* partner's *ramka*. At some points during the ceremony, every woman exchanged a platter of food or other gifts with the woman who had danced with her husband. On the last day of the ceremony all the men and women who had danced together had sexual relations with each other. With the ending of the ceremony the special relationship between the two main principals was sealed and, unless changed for some reason, held during their lifetimes."

"There is some indication that a special sibling type of relationship prevailed between the male children of the two *nangsaegaek*, as well as the expectation that they, too, would someday establish such a relationship with each other" (Hughes, 1960, pp. 267-269).

Similar to the *nangsaegaek* relationship found on St. Lawrence Island but lacking its elaborate ceremonial inauguration was the *anutswkatiigiit* association in the Point Barrow area. Men who regularly exchanged wives were *anutswkatiigiit*. The children of such partners were *qatanuutigiit*. Spencer described the very close relationship between wife-exchange, the *qatanuutigiit* relationship, and an economic interdependency between the husbands of the two women. "Between partners, especially those of long standing and proven friendship, there could be wife exchange on a temporary basis. This was also true of 'friends', often as between [*sic*] those who had established a joking relationship. Hospitality might involve wife lending, since such hospitality would be extended in any case only to individuals occupying a special status in relation to a host. Wife exchange on a temporary basis took place only between men who occupied a status of formally defined friendship or partnership. Aside from partners and joking partners, there was no institutionalized friendship. Informal good

relations, however, as between men in a whaling crew, in the same *karigi*, might call wife exchanges into being. Men who exchanged wives were *anutaw kattigiit*. The two men involved agreed to exchange their wives and did not consult the women involved" (Spencer, 1959, pp. 83-84). However, "it would be erroneous to assume that the sexual freedom inherent in the cultures of the area was wholly random and uncontrolled. Sexual relations carried with them a degree of responsibility and served to create a series of reciprocal obligations not only between the principals concerned but also between the kin of those involved. A child was told that when he went to some other place where there were no kin, he should seek out such and such a person who would aid him. 'He is your *qatanun*.' An individual could, in traveling, always seek out the children of his father's partners, assuming that in the partnership wives had been exchanged, and demand of them assistance and support. It was freely given. It is worth mentioning that here was a basis for forming new partnerships and it is in this respect that partnerships tended to follow along family lines, the two families involved retaining the relationship" (*Ibid*, p. 86).

Finally, "As a result of the development of this relationship it became necessary to recall the former sexual partners, to keep the tie with them alive, and to inform one's children of their whereabouts. The result was a quasi-kinship. While the family loyalties came first, it nevertheless followed that one attempted to give assistance to one's *qatanuutigiit* whenever possible. It was an important relationship in other ways, as, for example, in terminating a blood feud. If a sexual arrangement could be worked out between a man and woman in the two feuding factions, the respective children then became *qatanuutigiit* to each other and the new existing cooperative relationship forbade further bloodshed" (*Ibid*, pp. 86-87).

Ethnographers among the North Alaskan and Netsilik Eskimo groups discovered the existence of special associations in which especially permissive behavior was prescribed. The association was characterized by raillery and joking by each of the dyads at the expense of the other. In and around Point Barrow this association formally excluded kin relations. Those who railed at one another also esteemed each other. Of this seeming paradox Spencer assures us. Often, between the associates, wife-exchange occurred which further cemented the tie between the two men in the association. The children of the principals were to one another *qatanun*. *Qatanun* held one another in mutual esteem and were expected to cooperate with each other more so than with others who were not bound in either such a relationship or in one of close kinship. The similarity between the joking relationship institutionalized among the North Alaskan Eskimo and that of the 'song-fellows' among the Netsilik (*supra*, p. 3) is striking.

Before bringing to a close the descriptive portion of this article we wish to report on another form of wife-exchange unique in several particu-

lars. In the first place its distribution seemed to be restricted to Greenland. In the second place it seemed to be unassociated with the exchange of gifts or favors other than that of the sexual gratification of the principals. Lastly, the norms of wife-exchange seemed to be devoid of intimation that more close social relationships were cemented by the exchange of favors. Instead of the latter consequence, the women appeared to go indiscriminately to whomever happened to be present in a settlement at the time the ceremony took place. Birket-Smith has commented that "If a catastrophe is imminent there is a general exchange of wives in the settlement, presumably in the belief that by this means one, so to speak, changes one's identity and thus misleads the evil powers" (Birket-Smith, 1959, p. 140). Unfortunately Birket-Smith did not specify as to where such a haphazard distribution of favors was found to exist and, with the exception of the following report, the present author could find nothing similar.

The exception to the above generalization is an exclusively Greenland phenomenon. Thalbitzer, who reported extensively on the Greenlanders of Ammassalik, described the ceremony known popularly as "putting out the lamp". Thalbitzer found this ceremony to include "... indiscriminate mating ... which took place regularly once or twice in the winter". He cited the diary of Hanserak, a Greenland catechist, which noted that the exchange of wives during the time of putting out the lamps "took place about the New Year when guests arrived at the hut" (Thalbitzer, 1941, p. 667).

Descriptive accounts by ethnographers have been presented. These have included descriptions of patterns of behavior: institutionalized associations between two males, and the exchange of gifts inclusive of wives. We have demonstrated that with the exception of the Greenlanders the exchange of wives is not indiscriminate. Wives are most generally exchanged in recurrent fashion between two men. Furthermore the evidence indicated that generally speaking the women exchanged did not participate in a decision as to whether or not they will be lent. In some instances, as we have noted, a man will have formed a special relation with more than one other man. Naturally, his wife will then be exchanged for the wives of those men with whom her husband is bound by the institutionalized association (*vide*, Hughes, 1960, p. 267).

Several authors have offered hypotheses in explanation of the custom of the inauguration of formal associations, and the custom of exchanging wives, found among the Eskimo and Aleut groups of Northern North America.

Hawkes, on the basis of material from Labrador, interpreted the custom of wife-exchange differently from most other students of the cultures of northern North America. He felt that the wife-exchange custom functioned to make available to a man a particular technological ability not

possessed by his own wife, but possessed by the wife of another (Hawkes, 1916, p. 116). For example, if one Labrador man wished to pass a season fishing for salmon, and another Eskimo wished to spend the season hunting game, but the wife of the former was more adept at cleaning hides than in the preparation of fish, then the fish specialist would spend the season with the fisherman, and the other woman with the hunter. Hughes, it would seem, was in partial agreement with such an analysis (Hughes, *op. cit.*, p. 267). Spencer went to some lengths to dispute such an interpretation. Since he made no reference to the writings of either Hawkes or Hughes we assume that the explanation had wide currency (Spencer, *op. cit.*, p. 84).

Birket-Smith interpreted the generalized exchange of wives as a means by which the individuals sought to mislead the "evil powers" in the face of an imminent catastrophe (Birket-Smith, *op. cit.*). On that very same page Birket-Smith proffered an explanation of the other and more widespread custom whereby wives were regularly exchanged between two individuals. He wrote: "Furthermore, it is everywhere a common custom to exchange wives for a long or short period, and the husbands in these cases are so far from being jealous of one another that the exchange of wives is, on the contrary, considered to be one of the most effective means of emphasizing and strengthening a friendship. The conferring of sexual rights is an important social mechanism to create and cement a co-operative bond" (*Ibid.*).

It was Spencer's contention that wife-exchange was for purposes of cementing an already established trading relationship between two men among the Eskimo of North Alaska. It was *not* for purposes of providing one or both men a temporary helpmate in order that he might meet a specialized technological need. He wrote: "Sexual trading, wife-lending, or wife exchange, was called *simmixuat*. The point that it was a sexual matter and not an economic one should be emphasized. It has been said that such exchange might arise of work specialization which each woman commanded. This does not seem to be the case, since in the co-operative situation of community living, work was freely exchanged without reference to sexual privilege" (Spencer, *op. cit.*). The present author finds Spencer's argument cogent and, for reasons to be discussed below, he is sympathetic with the functional explanation advanced by Birket-Smith.

But, Spencer confined to the North Alaskan Eskimo his explanation of the association between institutionalized forms of partnership between two men and the exchange of their wives. On the other hand Birket-Smith generalized to the entire Eskimo area the need for a firmament between two interdependent males as an independent variable, the exchange of wives a dependent variable. Unlike Spencer, Birket-Smith did not suggest that wife-exchange was particularly important between two males unrelated by kinship. The present author finds himself in dis-

agreement with Birket-Smith's first conclusion. We agree that wife-exchange is, indeed, widely distributed throughout the Eskimo culture area, and we suggest further that it might be extended to some Aleut groups. Next, we seek a reason why wife-exchange should be so widely distributed in the Eskimo region, and why it should so often be found to occur between males unrelated by consanguineal bonds.

After perusal of the ethnographic literature on the Eskimo and Aleut it is our finding that in many Eskimo groups men will depend most often and with most intensity upon members of their close kin groups. This finding, we submit, is generalizable to some of the off-shore Aleut societies (*vide*, Berreman, 1953, pp. 236-253; Shade, *op. cit.*, *et. passim*). We take note that the members of St. Lawrence society channelize their dependencies toward the patrilineal kin groups (Hughes, 1958, 1960, *et passim*). In that regard the St. Lawrence Islanders differ from other Eskimo groups in which aid is most often sought from kindred. Ours is not the intention to discuss the social structural or social organizational differences to be discovered between the villagers of St. Lawrence Island and other Eskimo communities. We contend that the differences do little violence to the generalization that in any Eskimo group men will depend most often and most closely upon members of their close kin groups. Among the St. Lawrence Eskimo the ascribed kin group to whom the individual appeals for aid is simply more confined than are the kin resources of the bilaterally organized groups.

We surmise from Hughes' account of the whale-hunters of St. Lawrence Island that although those Eskimos ideally expect most aid and support to come from persons related to them patrilineally, the fact of the matter is that in many instances the membership of the patriline is unable to supply the required assistance. (Hughes, 1960, pp. 254-256). We presume that just as the patrilineage of the St. Lawrence Eskimo fails to supply all of the aid necessary for an individual to successfully pursue his livelihood, so the kindred of bilaterally organized Eskimo groups will fail to provide the quantity or kinds of assistance needed by an individual at various times in his life. We find support for this contention in Spencer. He found that the stability of life among the North Alaskan Eskimos depended upon the opportunities offered the individual to widen the scale of his social relations so as to include non related individuals (Spencer, *op. cit.*, pp. 442-443). In consideration of the inter-dependency between members of the close kin group among Eskimo and in light of the fact that the kin group provides not enough support or not the kind of specialized assistance called for, the following hypothesis is advanced. Among Eskimo groups the more vital the need for a continuous interdependent relationship between two men, and the less important their consanguineal relationship, the more likely it is that the principals will establish an association which is regularly celebrated by the exchange of gifts, inclusive of wives. If this plausible hypothesis is valid we should expect wife-exchange

to occur between members of different patrilineages (ramka) in the St. Lawrence Island society and between residents of different communities among other Eskimos.

It is no accident that the locus of wife-exchanges among the St. Lawrence Eskimos occurs precisely between members of distinct ramkas (Hughes, *op. cit.*, pp. 267-269). Hughes described the parties between whom the *nangsaegaek* relationship was inaugurated. It *never* obtained "... between real brothers or clansmen (recall the avoidance behavior between a man and his brother's wife). It was characteristically a relationship existing between two men of different ramka, and any single individual might have two or more nangsaegaek partners concurrently. Behavior between the two partners, aside from the sexual communism, was modeled after that between brothers, with considerable emphasis on sharing goods and giving unstinted help". Hughes then offered the following explanation for these phenomena. "Such a relationship would seem to be functionally effective in allaying somewhat the deep-rooted antagonisms and conflict between the different ramka which were so easily aroused in the normal course of social life. The nangsaegaek loyalties and bonds of sentiment linking two men of different ramka would tend to dampen, along with the ties an individual might have through his idiosyncratic kindred relationships, what might otherwise be an unchecked ramka solidarity".

In summary form, Hughes advanced a functional explanation as to why the St. Lawrence Eskimos formed the nangsaegaek relationship and why the parties were always of different ramka. The two social customs, i.e., formation of the association and the exchange of wives between the associates, never occurred between real siblings or members of the same patri-clan. Hughes advanced two reasons. Two siblings never formed the nangsaegaek association (which would entail an exchange of their wives) because of the customary avoidance behavior between a man and his brother's wife. The second was of the nature of a final cause explanation. The nangsaegaek relationship and its consequence, the exchange of wives between the principals, was better for the society if it took place between persons in different ramka than if it occurred between members of the same ramka because it widened the scale of sentiments an individual held to the group.

We now address ourselves to the first of Hughes' explanations. Although the latter, did point out the cultural requirements among the St. Lawrence villagers that a man should avoid the wife of his brother, we can find no proscription of the attentions of a man to a woman of his ramka. In fact, "No particular rule of clan endogamy or exogamy prevailed, and a spouse might come from any patriclan" (Hughes, *op. cit.*, p. 276)

We refer now to the second of the explanations advanced by Hughes and we offer an alternative. He argued that the reason why nangsaegaek

associations were always established between ramka was because it was better for the society at large. The reasoning on which our alternative rests derives from the comparative study of the circumstances which surround the association and similar kinds of associations found to recur in northern North America.

We submit that the more close the consanguineal bonds between two men, the less likely they will exchange wives. Note that although our alternative parallels the explanation proffered by Hughes it rests upon entirely different reasoning. The latter is of a mind that a man does not exchange wives with a real or clan sibling because those women are to him in an avoidance class of relationship. Consequently men are required to seek extra-marital sexual gratification in other ramkas for, according to Hughes, such gratification is the underlying motivation for the nangsaegaek. We, in our search for a more general explanation of the phenomena, find it difficult to reconcile Hughes' inference with the widespread prevalence of fraternal polyandry in this culture area (*cf.* Birket-Smith, *op. cit.*, p. 139). It is our contention that men related by close bonds of kinship tend not to exchange their wives because they feel little need to do so. We submit that a close blood relationship between two men is firmament enough to sustain a dyadic relationship characterized by mutual rights and obligations. We expect that in the absence of such close bonds two mutually interdependent males will establish an association which they will celebrate by the recurrent exchange of gifts, inclusive of wives.

Hughes' explication of the nangsaegaek is plausible. Ours is equally plausible; it has additional advantages. It explains far more about St. Lawrence society. Furthermore, it permits a parsimonious hypothesis to explain a phenomenon found widely distributed in Eskimo and Aleut societies of northern North America.

We refer now to the first of the additional advantages our explication possesses. Why do cross- but not parallel-cousins participate in the *magalook* or *iveiyak* ceremony on St. Lawrence Island? This is a "... relatively nonreligious ceremony ... which also implicates the clansmen of the participants. The *magalook* or *eveyak* ceremony was held between the *ilowaek* [cross] cousins and their clan kinsmen. The major feature involved a ceremonial exchange of gifts which began in a song contest between two principals. One *ilowaek* would sing a song asking his cousin for certain gifts of a valuable nature. The cousin would respond with a song, similarly artistic and creative, in which he would also ask for gifts. Then there occurred a symbolic warfare between the clansmen of the two principals, who performed a ritual dance with lances and simulated the wounding of opponents. After this, the gifts including platters of meat, were exchanged by the wives of the two male *ilowaek*, the principals of the ceremony" (Hughes, *op. cit.*, p. 265). Although Hughes elected to emphasize the

hostility (real or simulated) between the cross-cousins and their clansmen, he also took note that the same persons were most important to one another as sources of assistance (*Ibid*, p. 244). In the light of material from other parts of northern North America the present author finds it more illuminating to emphasize the warm and cooperative nature of that relationship. The field data indicate that both antagonism and co-operation are present in the cross-cousin relationship. Hughes has emphasized one aspect of that bond; we chose another.

The fact that celebrants are related to one another through cross- but not parallel-cousins, may be understood by the principle which illuminated the exchange of gifts which customarily took place in this as well as other societies of northern North America. The more vital the need for a continuous interdependent relationship between two men, and the less close the bonds of kinship, the more likely such men will establish an association celebrated by the exchange of gifts, inclusive of wives. Our single hypothesis explains why the nangsaegaek relationship occurs only between ramkas, why it never occurs between real brothers or clansmen, and why the participants in the magalook ceremony are related through cross- but not parallel-cousins.

It is the contention of this article that the institutionalized associations found to recur in the Eskimo and Aleut sectors of northern North America are most economically understood as customs whereby an individual expands the scale of his social relations in order to ensure sources of economic and social assistance other than kin. Those associations provide the Eskimo and Aleut a means to achieve a flexibility in the choice of associates that ascribed kinship bonds do not and cannot provide. Such types of bonds are often made more firm by the exchange of a scarce and valuable commodity: sexual gratification.

Future Research Possibilities

In the contemporary world the peoples of northern North America are beset by changes inaugurated by forces beyond their control. Some of the causes of those changes may be attributed to the removal of Eskimo groups from their traditional locations to heterogeneous urban settlements. Oswalt and Van Stone provide a case in point (Oswalt and Van Stone, 1960, pp. 154-177).

Our ethnographic data and its analysis lead us to expect that all other things remaining equal the individual Eskimo of the new urban settlements will seek to adapt to the novel social environment by engagement of his neighbor in a type of association described in the first portion of this paper. Empirical support for such an expectation comes from the recently congregated villagers of Kaktovik, in Alaska. "At Kaktovik, 15 of the 18 households are bound together by kin ties of either a primary or secondary sort.

The Eskimo practice of extending kinship privileges to nonkin by means of formal partnerships has effectively integrated the three other household units as well" (Chance, 1960, p. 1033).

Settlements to which Eskimos have been removed by the Canadian and United States authorities are pluralistic societies composed of Eskimos and whites. In such heterogeneous settlements the value systems of the whites tend to subordinate the value system of the Eskimos. In one such pluralistic society it was noted that "Ethnocentrism is developed strongly in the Eurocanadian group. Here attitudes of cultural superiority are frequently expressed along with strong criticism of native ways" (Honigsmann, 1952, p. 520). More sweeping are Balickci's comments. "The superior cultural and social position of the Euro-Canadians in the global local society is easily discernible and admitted by both groups" (Balickci, 1960-61, p. 171). If that is the case, and we find no reason to dispute the generalization, we should expect the early disappearance of the custom in which wives are exchanged between associates in the new urban settlements of the north. Paradoxically, it has been our contention that the regular exchange of wives and other valuables between mutually dependent males who are not close kin is precisely the firmament of the only association by which Eskimos traditionally expand the scale of their social relations.

Research among the Eskimo and Aleut societies is desperately needed in order to save for anthropology data which will be irretrievably lost within the very near future. The Eskimo and Aleut cultures have already undergone considerable change and they are continuing to disintegrate at a rapid rate. There still remains time to garner ethnographic data on the extant remnants of the ways of life of those groups.

There is a vast literature on the Eskimo and Aleut peoples, with ethnographic coverage of the former particularly good. But while certain aspects of those ways of life have been more than adequately described, e.g., oral literature, other facets of those cultures have been only touched upon. One facet which, regrettably, has been little explored is the sector of social organization which subsumes the two institutions to which this paper has addressed its attention. Now, before it is too late is the time for intensive investigation of the social organization of the Eskimo and Aleut societies. If not embarked upon quickly the opportunity for such studies will be impossible forever.

Bibliography

- Balickci, Asen
1960 *Ethnic Relations and the Marginal Man in Canada: A Comment Human Organization*, 19, pp. 170-171.
- Berberman, Gerald
1953 *A Contemporary Study of Nikolski: An Aleutian Village*. Unpublished Master of Arts thesis, University of Oregon.
- Birket-Smith, Kaj
1929 *The Caribou Eskimos. Material and Social Life and their Cultural Position, Report of the 5th Thule Expedition, 1921-24*, 5. Copenhagen.
1959 *The Eskimos*, London: Methuen and Co. Ltd.
- Boas, Franz
1888 *The Central Eskimo*, Sixth Report of the Bureau of American Ethnology, pp. 409-671, Washington.
1901 *The Eskimo of Baffinland and Hudson Bay*, Bulletin of the American Museum of Natural History, 15, Part 1, N. Y.
- Chance, Norman A.
1960 *Culture Change and Integration: An Eskimo Example*, *American Anthropologist*, 62, pp. 1028-1045.
- Hawkes, Ernest W.
1916 *The Labrador Eskimo*, Memoir 91, Geological Survey of Canada, Ottawa.
- Honigsmann, John J.
1952 *Intercultural Relations at Great Whale River*, *American Anthropologist*, 54, pp. 510-522.
- Hughes, Charles C.
1958 *An Eskimo Deviant from the "Eskimo" type of Social Organization*. *American Anthropologist*, 60, pp. 1140-1147.
1959 *Translation of I. K. Voblov's "Eskimo Ceremonies"*, *Anthropological Papers of the University of Alaska*, 7, pp. 71-90.
1960 *An Eskimo Village in the Modern World*, Ithaca: Cornell University Press.
- Lantis, Margaret
1946 *The Social Culture of the Nunivak Eskimo*, *Transactions of the American Philosophical Society*, Volume 35, part 3, pp. 156-323.
- Mikklesen, E.
1944 *The East Greenlanders' Possibilities of Existence, Their Production and Consumption*, *Meddlelser om Gronland*, Copenhagen.
- Murdock, John
1892 *Ethnological Results of the Point Barrow Expedition*, 9th annual Report of the Bureau of American Ethnology, Washington.
- Nelson, Edward
1896-97 *The Eskimo about Bering Strait*, 18th Annual Report of the Bureau of American Ethnology, Washington.
- Oswalt, Wendell H. and James Van Stone
1960 *The Future of the Caribou Eskimos*, *Anthropologica*, n.s., 2, pp. 154-177.
- Rasmussen, Knud
1931 *The Netsilik Eskimo*, Nordick Forlag, Copenhagen.
1938 *Knud Rasmussen's Posthumous Notes on the Life and Doings of the East Greenlanders in Olden Times*, H. Ostermann, eidtor; C. A. Reitzels Forlag, Copenhagen.

Shade, Charles I.

- n.d. Ethnological Notes on the Aleuts, Unpublished manuscript in the Human Relations Area Files, New Haven.

Spencer, Robert F.

- 1959 The North Alaskan Eskimo: A Study in Ecology and Society, Smithsonian Institution, Bulletin 171, Washington.

Stefansson, Viljalmur

- 1914 The Stefansson-Anderson Arctic Expedition of the American Museum: Preliminary Ethnological Report, Papers of the American Museum of Natural History, 14, part 1, N. Y.

Thalbitzer, William

- 1941 The Ammassalik Eskimo: Social Customs and Mutual Aid, volume 2, Meddelelser om Gromland, Copenhagen.

Not for Resale

NOTES AND NEWS

ESKIMO REMAINS FROM SHALAUROVA ISLAND, SIBERIA

The present note is intended to bring up to date the coverage of Siberian Eskimo archaeology provided by the writer's two previous papers (Chard 1955, 1960) by summarizing the finds recently reported by Beregovaia (1960) from Shalaurova Island and placing them in context. This small island lies just off the Arctic coast 60 km. east of Cape Shelagskii, the northernmost point of the Chukchi Peninsula. Both Wrangell and Sverdrup had noted remains of ancient dwellings here (Chard 1955:155), but no artifactual material had been recovered on these occasions.

In 1953, personnel of the Ministry of Marine and Inland Water Transport of the U.S.S.R. discovered in the low-lying eastern portion of Shalaurova Island two promontories with steep faces of apparently artificial formation (the term "embankment" is used in this connection); at the rear, they merge with the plateau. These features are 6 and 8 meters high and about 30 meters in diameter. On the highest, at a depth of 40 cm., was found a row of vertical wooden posts on which whale vertebrae had been placed. It is theorized that these promontories may have served as fortifications. To the south of them, directly on the shore, were four house mounds 2 to 4 meters high and 5 to 10 meters in diameter, with a depression in the top of each.

Although these house ruins were not excavated, Beregovaia is confident from the description that they are very similar to those on Aion Island (also unexcavated) and, more importantly, to the partially excavated dwellings not far from the Kolyma River at Cape Baranov and Chetyrekhshtolbovyi Island. (The materials from the latter two are described and illustrated in Beregovaia 1953 and 1954; for an English summary, see Chard 1955:152-154). Characteristic features of these structures include vertical or sloping walls made of thin wooden posts that have been hewn with stone axes, a thick layer of earth on the roof, and situation on a hillock or rise of ground. The Birnirk houses near Point Barrow are regarded as the closest parallels on the American side.

At Cape Baranov and Aion Island there are in addition remains of large structures of conjectural use: perhaps dance houses, or possibly some sort of fortification comparable to that on the promontory of Shalaurova Island or to the 12 meter square log fortification described by the first explorers of the Bear Islands off the Kolyma in 1763 (quoted, with original sketch, in Beregovaia 1960:186-187).

Despite the structural similarities of these sites along the Arctic shore of northeastern Siberia, they are evidently not all contemporaneous. Most commonly the artifacts are typologically transitional Birnirk-Thule. But on Chetyrekhshtolbovyi Island they are probably terminal Thule-Punuk, and in one house there was evidence of trade with the Russians (probably

17th century). On the other hand, the finds from one of the two sites at Cape Baranov (Vtoroi Cove) seem older and show some Old Bering Sea stage affinities.

The exact dating of the Shalaurova settlement must await excavation of the house ruins. However, a small collection of artifacts (Fig. 1) was recovered from a depth of 50 to 70 cm. (beginning of the permafrost layer) at the foot of the northern promontory, and these at least find their closest similarities at Vtoroi Cove (Cape Baranov), since they display primarily Old Bering Sea analogies—especially the toggle harpoon, the ice picks, the bone cup scraper and the bucket handle. This indicates that Shalaurova Island possesses one of the two oldest Eskimo sites known at present on the Arctic coast of Siberia, although the association of the visible house ruins must be held in abeyance for the present.

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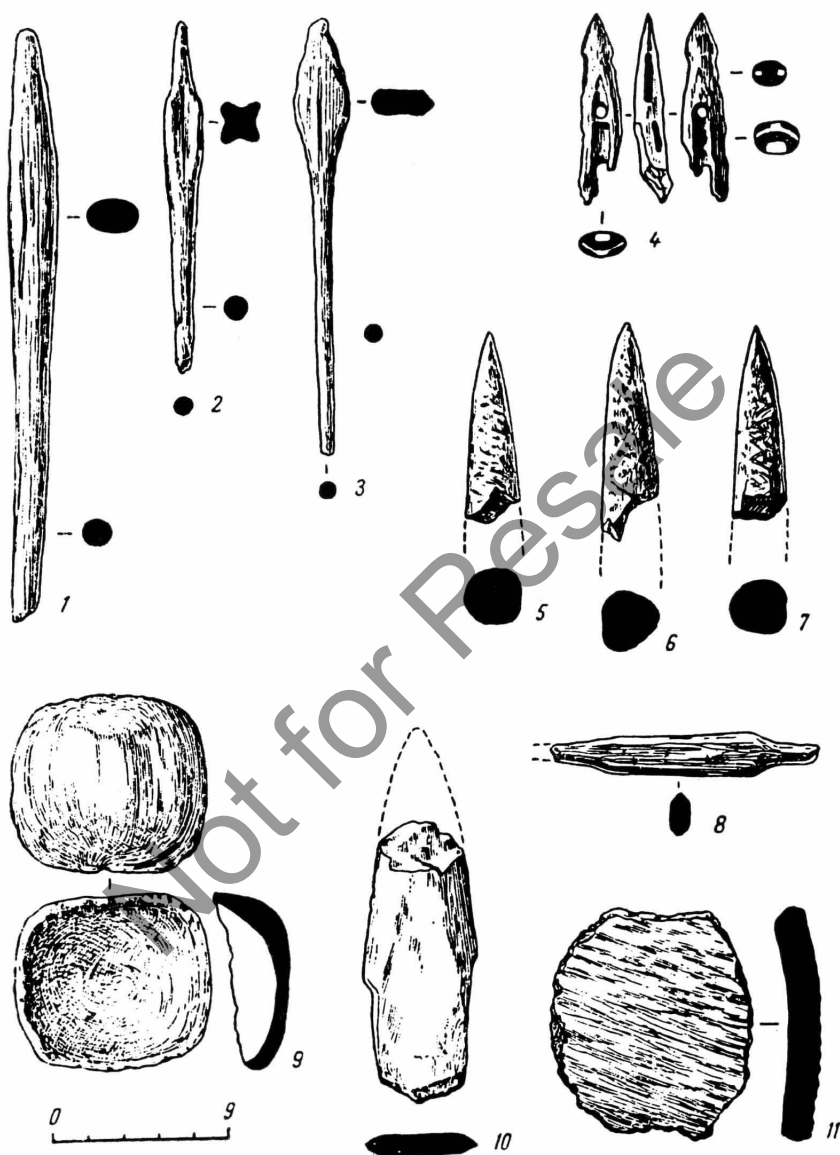


Fig. 1. 1953 Finds on Shalaurova Island (Beregovaia 1960).

1-3: wooden arrow points; 4: harpoon head of walrus ivory; 5-7: harpoon ice picks of walrus ivory; 8: bone handle for a bucket; 9: cup scraper of walrus ivory; 10: slate "man's knife"; 11: potsherd with striations "probably produced with a cord-wrapped paddle" (Beregovaia). Scale in cm.

Bibliography

Beregovaia, N. A.

- 1953 "Nakonechniki Garpunov iz Drevnikh Poselenii Baranova Mysa (Harpoon Points from the Ancient Settlements at Cape Baranov)". *Materialy i Issledovaniia po Arkheologii SSSR*, Vol. 39, pp. 421-445. Moscow-Leningrad.
- 1954 "Arkheologicheskie Nakhodki na Ostrove Chetyrekhshtolbovom (Archaeological Finds on Chetyrekhshtolbovyi Island)". *Sovetskaia Arkheologiia*, Vol. XX, XX, pp. 288-312. Moscow.
- 1960 "Arkheologicheskie Nakhodki na Ostrove Shalaurova (Archaeological Finds on Shalaurova Island)". *Materialy i Issledovaniia po Arkheologii SSSR*, Vol. 86, pp. 183-195. Moscow-Leningrad.

Chard, Chester S.

- 1955 "Eskimo Archaeology in Siberia". *Southwestern Journal of Anthropology*, Vol. 11, No. 2, pp. 150-177. Albuquerque.
- 1960 "Recent Archaeological Work in the Chukchi Peninsula". *Anthropological Papers of the University of Alaska*, Vol. 8, No. 2, pp. 119-130. College.

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