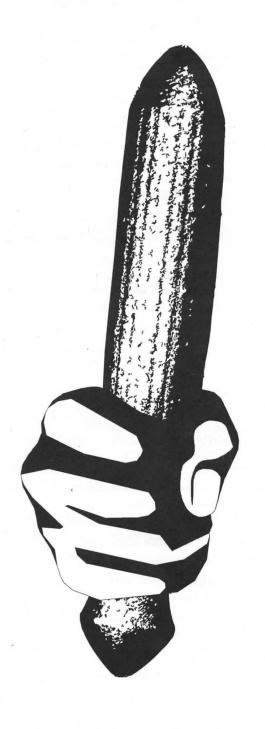
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Human Osteology in British Columbia



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Next meeting: Wednesday 8 September, 1999



#### HUMAN OSTEOLOGY IN BRITISH COLUMBIA

Human skeletal remains in the hands of archaeologists and physical anthropologists has been a controversial issue for at least twenty-five years. The problems seem to stem from a lack of common sense and especially a lack of respect on the part of archaeologists and public officials. Fortunately, in North America, First Nations individuals have presented their views on this issue while governments and academia have heeded these views and incorporated them in their work. The fledgling discipline of archaeology seems to have used the twentieth century to ease some growing pains. The discipline faces the new millenium with a holistic vision and a new sense of maturity which will benefit all individuals residing in North America.

This special topical issue of *The Midden* shows how human osteology helps us to understand past populations while adding to the cultural history of the Northwest Coast. The contributing authors have several years (if not decades) of experience working in archaeology in British Columbia. Human skeletal remains provide us with a "human" insight into the cultural past. We can empathize with those individuals of past millenia who were plagued by arthritis, suffered with a cavity, or who fled in fear and pain as they were clubbed by an assailant.

For a province with such a rich cultural history, I was surprised by the obstacles I faced when studying the human skeletal remains from the Pender Island Canal site (DeRt 2). It is difficult to find published material about human osteology in British Columbia, either for comparative purposes or to provide more details about cultural history. This issue of *The Midden* provides an insight into current issues surrounding human osteology and the current concerns of physical anthropologists. Interested individuals, especially students, will see that physical anthropology is useful for all people of this province and should be encouraged to provide us with a better understanding of the past inhabitants of the Northwest Coast.

Erin Strutt, Assistant Editor

ERIN STRUTT received an MSc in Human Osteology, Paleopathology and Funerary Archaeology from the University of Bradford in England. Her thesis research focused on adult skeletal fractures from the Pender Island Canal site (DeRt 2).

#### Front Page

Stone club from Prince Rupert Harbou and the way it may have been held as a weapon. The head of the club is at the bottom of the figure. See page 5, "Trauma and Warfare at Prince Rupert Harbour," by Jerome S. Cybulski.

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#### Evidence from Gabriola Island

DENTAL NON-METRIC TRAITS	DgRw 4	DgRw 199
extra tooth (mesiodens) in midline of upper jaw	0.06	0.08
upper central incisors: mesial rotation	0.10	0.14
upper second molar: two roots	0.19	0.18
upper third molar: absent or peg-shaped	0.10	0.12
lower central incisor: congenital absence	0.11	0.07
lower first molar: extra (third) root	0.11	0.08
lower first molar: spur of enamel extending between roots	0.69	0.69
lower first molar: cusp 7 present	0.08	0.10
ower second molar: protostylid present	0.10	0.09
ower second molar: cusp 6 present	0.58	0.42
lower third molar reduction: peg-shaped or absent	0.08	0.14

Table 1. Dental non-metric trait frequencies.

INFRACRANIAL NON-METRIC TRAITS	DgRw 4	DgRw 199
scapula: circumflex sulcus present	0.94	0.79
humerus: septal aperture present	0.24	0.20
humerus: supratrochlear spur present	0.07	0.04
ulna: 2 separate facets on trochlear notch	0.77	0.53
femur: third trochanter present	0.24	0.35
patella: vastus notch present	0.20	0.28
tibia: distal articular surface notched	0.20	0.47
alus: os trigonum present	0.13	0.15
calcaneus: anterior and middle talar facets separate	0.68	0.57
calcaneus: anterior facet bipartite	0.10	0.17
cuboid; medial articular facet double	0.20	0.18
metatarsal #1: proximal facet double	0.13	0.10
atlas: condylar facet double	0.20	0.07
atlas: lateral or posterior bridge present	0.22	0.09
ixis: transverse foramen open	0.06	0.07
5th lumbar vertebra: spina bifida	0.10	0.04
ransitional lumbosacral vertebra present	0.22	0.21
acrum: accessory facet for innominate	0.27	0.38

Table 2. Infracranial non-metric trait frequencies.

# BIOLOGICAL RELATIONSHIPS AT THE LOCARNO/ MARPOLE TRANSITION

# THE EVIDENCE FROM GABRIOLA ISLAND

#### by A. Joanne Curtin

The study of human burials from archaeological sites can provide important information about prehistoric behaviour, complementing other lines of archaeological evidence. One such use of osteological data is in the assessment of biological relationships between earlier populations.

Since the beginnings of archaeological research in the Gulf of Georgia region there have been two competing models for the development of ethnographic Coast Salish culture: one stressing *in situ* evolution over thousands of years of continuous occupation, and the other invoking a relatively recent migration of the ancestors of the Coast Salish into the region from some inland location. Those favouring the "discontinuity" model usually cite the Locarno/Marpole transition, about 2,400 years ago, as the time frame for this displacement.

Historically, the discontinuity model has its roots in the early research of Harlan I. Smith, Charles Hill-Tout, and Franz Boas, who claimed to have detected two distinct physical types among the prehistoric skeletal remains from the region, an earlier "narrow-headed" group which was eventually replaced by the migration of "broad-headed" people from the Interior. Charles Borden subsequently presented artifactual evidence in support of this proposition, in the form of supposedly Interior-derived tool types in Marpole artifact assemblages. Neither line of evidence has stood the test of time, and today migration has been largely supplanted by evolution to explain the development of Northwest Coast culture, although some dissenting voices are still heard (e.g., Burley and Beattie 1987).

The skeletal evidence for discontinuity was exhaustively reviewed by Owen Beattie in his 1980 doctoral dissertation, but with inconclusive results. His lack of success may be attributable, at least in

part, to the nature of his data set. The scarcity of relevant skeletal material led Beattie to lump together burials from different sites and various time periods into two large groups: "Early" (Locarno Period and earlier) and "Late" (Marpole Period and later). Even with these manipulations, sample sizes, particularly for the "Early" group, were painfully small, in many cases consisting of a single individual, and as such were often inappropriate for meaningful statistical analysis. The chronological placement of some of the burials is also questionable, since it was based primarily on the original excavators' assessments, in most cases unsupported by radiocarbon dates. Although Beattie clearly favoured the population dislocation model, and was able to demonstrate at least some biological differences between his two groups, in the end he was forced to admit that he could not reject the continuity model on the basis of his analysis.

The opportunity to reexamine the skeletal evidence for continuity/displacement recently arose as a result of my doctoral dissertation research of prehistoric burial practices on Gabriola Island near Nanaimo (Curtin 1998). In response to on-going vandalism and pot-hunting, human skeletal remains were collected from a series of inland burial caves on the island. The two largest caves (DgRw 199) yielded the fragmented and disarticulated remains of more than 100 individuals, in association with Locarno-style artifacts which had been placed in the caves as burial inclusions. All of the skeletons appeared to have been originally deposited on the surface of the caves rather than buried, and many had been cremated prior to interment. Five bone collagen-based radiocarbon dates ranging from  $2420 \pm 70$  to  $3120 \pm 50$  years B.P. confirmed the Locarno age of the burials.

A sample of 64 burials from the nearby False Narrows midden site (DgRw 4), excavated in the late 1960s, was available for comparative analysis. Mortuary practices at False Narrows were more similar to the usual prehistoric pattern, with subsurface interment of flexed, articulated bodies in shallow graves dug into the midden deposits. Although only one of these burials has been directly dated (to  $1640 \pm 50$  years B.P.), both stratigraphic and artifactual associations support a middle to late Marpole/early Gulf of Georgia affiliation for all burials recovered from the site.

The very different mortuary practices represented by the two burial samples could be indicative of a major cultural dislocation occurring about the time of the Locarno/Marpole transition. This hypothesis was tested by assessing the degree of biological similarity between the two samples, as expressed by non-metric traits of the bones and teeth. The biological distance between the two samples was calculated using the multivariate Mean Measure of Divergence statistic (D2). Calculated values of D2 are expected to be small, and not statistically significant, if the two samples were drawn from the same biological population. If the Locarno/Marpole transition was marked by an influx of people from the Fraser Canyon or the Interior, however, significant differences in trait frequencies should be apparent.

### Non-metric Traits of Bones and Teeth

Non-metric traits (also called discrete, epigenetic, or quasi-continuous traits) are minor inherited variations in the shape of bones and teeth. They are described as "minor" because they appear to be adaptively neutral; that is, they are neither advantageous nor detrimental in terms

of survival. Some examples of skeletal non-metric traits are: small accessory bones (ossicles) located in the cranial sutures; accessory holes (foramina) for the passage of nerves and blood vessels; the presence of spurs or bridges of bone in characteristic locations, and variations in the shape of joint surfaces. Non-metric traits of the dentition include variations in number (absence of a tooth normally present; presence of extra or supernumerary teeth), in size (unusually small or pegshaped teeth), and in morphology (shape and number of tooth cusps and roots).

Much of what we now know about the genetics and patterns of inheritance of non-metric traits was learned from years of research on wild populations and inbred lab strains of mice. These studies have demonstrated a strong genetic component to the expression of non-metric traits, and shown that differences in trait frequencies between populations accurately reflect their degree of biological relatedness. Non-metric traits are often more useful than metric traits, such as cranial size and shape, in determining population affinities since they are less influenced by factors such as environment, age, and sex. Another significant advantage is that, unlike metric traits, they can be scored on incomplete and fragmentary bones.

#### Methods

Most previous studies of biological distance using non-metric traits have focused on variants on the skull. Cranial traits were not considered appropriate for this study, however, since the False Narrows skulls are artificially deformed and those of the earlier cave burials are not. Artificial deformation is known to affect the occurrence of some non-metric traits, and the inclusion of such culturally-influenced variables could skew the study results. Instead, this analysis relied on non-metric traits of the teeth and infracranial skeleton. Although infracranial non-metric traits have not enjoyed as widespread an application in studies of population affinities, in theory they should be analogous to cranial traits in their reflection of biological relationships. A total of 43 crown and root variants of the permanent dentition, and 54 morphological variants of the infracranial skeleton were initially scored for both skeletal samples. Data were collected only on adult remains, since some traits are not observable in immature individuals. Traits whose expression was ambiguous or difficult to score consistently were eliminated from consideration. Also deleted were traits that did not occur in both groups, those with very high (>.95) or very low (<.05) frequencies, and

those that showed no variability between groups. Sample sizes varied according to the degree of preservation of different skeletal elements, but only traits with 10 or more possible observations were used in the statistical analysis. In most cases sample sizes were substantially larger (>25). The final list of traits employed in the distance analysis consisted of 11 dental and 18 infracranial variants.

#### **Study Results**

Tables 1 and 2 (see page 2) display the observed frequencies of the selected dental and infracranial non-metric traits in the two study samples. The Mean Measure of Divergence was calculated for each data set separately; in both cases, the resulting biological distance was essentially zero. In other words, the two burial samples could not be differentiated, at least with respect to the traits employed in this analysis. Based on these results, the two burial samples appear to have been drawn from the same biological population, supporting the model of long-term cultural continuity in this region of the Gulf of Georgia. Whether the same pattern holds true for other areas within traditional Coast Salish territory is a matter for future research, assuming that appropriate skeletal samples become available for study.

#### **References Cited**

Beattie, Owen 1980 An Analysis of Prehistoric Human Skeletal Material from the Gulf of Georgia Region of British Columbia. Unpublished PhD dissertation, Department of Archaeology, Simon Fraser University, Burnaby.

Burley, David and Owen Beattie 1987 Coast Salish Origins: Ethnicity and Time Depth in Northwest Coast Prehistory. In *Ethnicity and Culture*, edited by Réginald Auger, Margaret Glass, Scott MacEachern, and Peter McCartney. Pp. 199-207. University of Calgary Archaeological Association, Calgary.

Curtin, A. Joanne 1998 Prehistoric Mortuary Variability on Gabriola Island, British Columbia. Unpublished PhD dissertation, Department of Anthropology, Ohio State University, Columbus.

Joanne Curtin recently completed her PhD in physical anthropology at Ohio State University, and is currently employed as a sessional instructor at Simon Fraser University.

### **DON BUNYAN 1917-1999**

We shall not cease from exploration And the end of all our exploring Will be to arrive where we started And know the place for the first time.

T.S. Eliot

During the 1970s and 1980s, Donald E. Bunyan, avocational archaeologist par excellence, was an active member of the ASBC and well-known to BC archaeologists (see *The Midden Vol. 27/4* for a detailed profile and his contributions to the ASBC). He was a scientist, yet his interests were truly universal and he also appreciated music and literature. Even in Pursuing the Past, his 1978 monograph on BC archaeology, he used poetry as chapter subheadings. He travelled extensively and was an avid outdoorsman, always part of ASBC field trips and projects, and a member of hiking and skiing clubs. However, around 1989 he was diagnosed with Parkinson's disease and spent the last few years of his life in a nursing home, battling the disease with the iron willpower so typical of him. As the disease took an ever more destructive grip on his body, life became increasingly painful for Don. Still, until a short time ago, he faithfully attended ASBC meetings. His suffering, however, was not only physical. Perhaps the most painful aspect of the last stage of Don's life was that communication with other people, so important for this man of the mind, had become impossible. On July 10, shortly before midnight, his battle was over. Don was a good person and we will remember him fondly. Helmi Braches

# TRAUMA AND WARFARE AT PRINCE RUPERT HARBOUR

#### by Jerome S. Cybulski

Next to bony arthritis, trauma is the most common expression of paleopathology found in human skeletal remains. This is good news for the archaeologist (though certainly not the subjects of study) because trauma provides more social and cultural information about earlier populations than other forms of skeletal pathology. The ultimate causes of a bone fracture can be difficult to determine, however, without knowledge of factors seemingly external to the break itself. It is vital that the investigator consider potential patterns of occurrence based on anatomical distribution, age at death and sex, as well as nonosteological findings in the archaeological environment. A knowledge of the mechanics and definitions of skeletal trauma based on modern clinical and forensic studies is an essential additional ingredient for proper interpretation.

Trauma may be attributed to three groups of causes: interpersonal violence, accident, or stress. The last occurs from intense short term physical activity, particularly in young individuals (e.g., fatigue fractures in military recruits), or from disease processes which may weaken bone in older persons (e.g., pathological fractures from osteoporosis). Accidental trauma is a fact of life and will vary in its manifestations depending on culture and habitat (e.g., traumatic fractures from industrial or vehicular accidents). It is, however, the first causative group which generally captures the attention of the student of human society. Interpersonal violence often means "warfare" in earlier populations and warfare may be a marker of social complexity.

Much has been written about warfare on the Northwest Coast, as known from historical records and aboriginal oral traditions. However, relatively little information is available as to its origins and meaning in the archaeological record. It is here that osteology may provide clues given proper interpretation. My interest in this

Figure 2. Stone club from Prince Rupert Harbour (CMC #GbTo-34:1284) and the way it may have been held as a weapon. The head of the club is at the bottom of the figure.

subject took root when I first began to analyze human skeletal remains excavated from midden sites in the Prince Rupert Harbour region on the northern coast of British Columbia. Nine sites from which human skeletal remains were collected were excavated between 1966 and 1987 by George MacDonald, Richard Inglis, Joyce May, Bjorn Simonsen, and the Museum of Northern British Columbia. This work was largely under the auspices of the Canadian Museum of Civilization or, as it was then known, the National Museum of Man. In all, 285 skeletal individuals

were represented, principally by discrete burials but in some cases by disturbed bone in midden debris. Those bones were remnants of once intact interments disturbed by later cultural activities.

Pathology in the collection included signs of osteoarthritis, widespread chronic sinus infection, dental abscesses, middle ear disease, congenital abnormalities, and possible cases of systemic infection. Antemortem or perimortem trauma was prevalent, however, associated in some form with the skeletons of 114 adults and two children. Head or craniofacial injuries were most frequent, present in 54 persons, followed by trauma involving the spine in 42 persons, hand in 24, forearm (ulna, radius, or both bones) in 17, lower leg (tibia or fibula) in 13, foot in ten, clavicle in six, ribs in five, humerus in three, femur in two persons, and knee in two persons. When considered by anatomical region, the numbers of affected individuals exceed the total because many individuals showed multiple injuries. The skeleton of Burial 447 of the Boardwalk site (GbTo 31), for example, exhibited a fractured superior orbital margin and brow ridge, a vertebral body compression fracture, and a fractured clavicle. All told, multiple sites of injury were observed in 43 individuals.

The prevalence of head injuries, as well as other forms of trauma to the upper part of the body, indicates that interpersonal violence was an important causative factor at Prince Rupert Harbour. Additional information comes from details and associated patterns, and from the context of the remains and the presence of certain cultural artifacts in the sites.

Included among the head injuries were 34 depressed cranial vault fractures among 31 persons. Most of those lesions were circumscribed closed concavities of the outer skull table, either healed or in the process of healing when people died. In many cases, there were attendant diag-

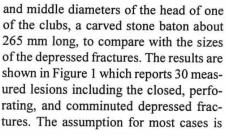
nostic irregularities such as protuberances or other disruptions of the inner table and creases or cracks indicating fracture lines within or adjacent to the lesions. There were three perforating examples, one with margins which were well healed (smoothed or rolled) and two with unhealed margins. The unhealed examples

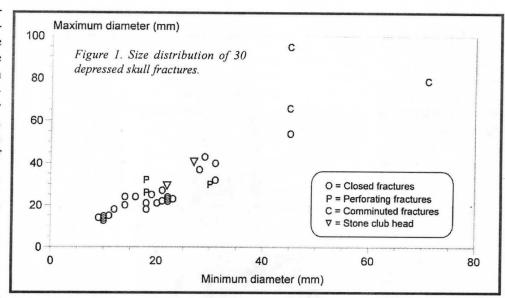
were oval openings with characteristic step fracin tures the margins of the outer table, torn inner table margins, and two or three fracture lines radiating from the marginal points of impact. In Burial 166, a young man interred on Dodge Island (GbTo 18), the fracture lines extended into the superior rim of the left eye socket, a small segment of

which had been displaced by the trauma. Among the 34 lesions were three instances of very large vault openings with healed margins, the likely results of comminution of bone which had been separated from the surrounding vault through massive impact fracturing.

Clinicians group cranial vault fractures into two types, depressed and linear. The former commonly result from personal assaults whereas the latter are more often associated with accidents such as high impact falls or vehicle crashes. Experimental work in the 1940s and 1950s showed that stand-alone linear fractures result when a moving head strikes a stationary object, usually at a point on the skull distant from the impact, while a depressed fracture results when a stationary head is struck by a moving object as in the case of a club or hammer blow. Interestingly, no stand alone linear fractures were apparent in Prince Rupert Harbour skulls, but there were plenty of depressed fractures. Of further interest is that many of the lesions were of a reasonably consistent size to have resulted from blows with stone clubs similar to those found in the midden sites. I measured the greatest

of the clubs, a carved stone baton about 265 mm long, to compare with the sizes of the depressed fractures. The results are shown in Figure 1 which reports 30 measured lesions including the closed, perforating, and comminuted depressed fractures. The assumption for most cases is





that the club was held so that its conicalshaped head affected fracture from a downward or otherwise trajected blow (figure 2). Indeed, funnel-like shapes among the lesions looked like negative impressions of the head of that presumed weapon, and we know from modern forensic investigations that the shape of a head wound may often reveal the shape of the weapon used.

Further evidence for head injury was present in the facial skeletons, including dentitions, of 19 people. Three spectacular cases, all healed, involved cheekbone and upper jaw portions in three men, and in each instance the floor of the associated eye socket had been "blown out" as a result of the impact. Burial 396 from the Boardwalk site also exhibited a funnelshaped depressed fracture just above the orbit of the same side with what appeared to be the same advanced degree of healing. The two fractures could have occurred as part of a singular assault affected by a two-step striking action with the same weapon. With the shaft grasped at its narrowest point just above the head, the conical point of a stone baton could have been used to hammer a blow to the forehead,

an action which would have been rapidly followed by a slap across the face with the longer portion of the club extending beyond the grip.

Significantly more men than women were affected by craniofacial injuries, 37% of Prince Rupert men represented by cranial parts as opposed to 15% of women

> counted in the same way. While this comparison is telling of potential warrior involvement, it is quite possible that not all of the injuries resulted from interpersonal violence. For example, Burial 201, an elderly male at Garden Island (GbTo 23), showed a healed chin fracture which could plausibly have

resulted from an accidental fall. The wrist end of the left radius of this man exhibited a healed intraarticular fracture with displacement of the styloid process, a type of fracture commonly incurred when the hand is used to cushion a fall.

Similarly attributable fractures around the wrist were indicated for seven other persons, one involving a radius, one a radius and ulna, one an ulna, and four involving a hand. The latter each featured a classic intraarticular Bennett's fracture through the base of the thumb metacarpal.

Interestingly, males and females were equally represented by fractures commonly attributed to falls. In other fractures involving the forearm bones and other metacarpals, males predominated. Shafts of forearm bones were broken in 13 instances, and eleven men were involved as opposed to only one women. They are the kinds of fractures which can occur from parrying an assailant's attempted blow to the head or face or when an arm is struck to disarm a weapon. For plausibly like reasons, fractures of outer hand bones (fourth and fifth metacarpals) were exclusively the domain of males (eight cases).

In terms of those affected by trauma, females exhibited more accident and stress-related injuries (about two-thirds of their cases) while males exhibited more violence-related injuries (about two-thirds of their cases). Females at Prince Rupert Harbour were not immune to interpersonal violence but probably not because they, like men, were warriors. In some instances, the fractures shown in females appeared to be more flight related than from face-to-face combat. Five of seven depressed fractures were positioned at the back, top, or side of the skull vault rather than the front of the skull as they were in 78% of male cases.

The fact that there were so many healed fractures due to violence indicates that men buried in the Prince Rupert sites often survived to fight another day. Many may have fought elsewhere, participating in raids on neighbouring villages and returning for eventual burial in their own village cemeteries. That such raids took place was apparent at the Lachane site (GbTo 33) where a complex of decapitated corpses was found in a segment of

the midden. Five headless skeletons were present, three of which were sufficiently intact to reveal perimortem cut marks in the fourth, fifth, or sixth neck vertebrae. Obviously, not everyone successfully fled raids on their villages.

If the osteological findings are any indication, then warfare may have gone on in the Prince Rupert Harbour region for 1,600 years. Radiocarbon readings and stratigraphic placements indicate that the earliest burials with violence related injuries (e.g., Burial 496 of the Lachane site with a healed depressed skull fracture and a forearm shaft parry fracture) dated from about 3100 years B.P. As revealed by the decapitation complex, the raid on Lachane, reputedly a fortress location according to oral tradition, took place about 1750 years B.P. The latest Prince Rupert burials with violence-related trauma appeared to date to about 1500 years B.P. at Garden Island and Parizeau Point (GbTo 30), a date which marks the end of the socalled Middle Pacific or Middle Developmental stage of Northwest Coast prehistory. After that time, there is little

evidence for burial in the region, or for that matter, anything else archaeologically. However, equivalent osteological evidence for violence related trauma at a burial site on the Nass River (GgTj 6 at Greenville) indicates that warfare probably also took place on the north mainland coast of British Columbia during the Late Pacific period.

#### **Further Reading:**

Cybulski, Jerome S. 1992 A Greenville Burial Ground: Human Remains and Mortuary Elements in British Columbia Coast Prehistory. Canadian Museum of Civilization Mercury Series, Archaeological Survey of Canada Paper 146.

Dr. Cybulski is Curator of Physical Anthropology at the Canadian Museum of Civilization in Hull, Quebec. He has worked with osteological data from the north, central, and south coasts of British Columbia, as well as the interior, and is currently researching the biological history of aboriginal north and central coast populations.

### **DEBITAGE**

The BC Archaeology Branch has finally set itself up with a web page, which you can see at: www.archaeology.gov.bc.ca. Among other things, you can download the guidelines for recording archaeological sites, traditional use sites, and culturally modified trees (CMTs). The latter may be in for greater demand with pending implementation of the Resources Inventory Standards for recording CMTs. Accordingly, anyone who bids for a government funded contract will need to guarantee that crew members are certified and that the fieldwork will be supervised by a Certified Crew Leader. The Forestry Continuing Studies Network is coordinating courses that lead to certification; the Archaeology Branch is responsible for quality and content of the courses and for signing the certificates, as well as for providing lists of qualified instructors. Although individuals will be able to challenge some of the courses, with two exceptions everyone regardless of academic qualifications and previous experience will need

to be certified: Dr. Arnoud Stryd and Morley Eldridge will be "grandfathered" and given certification in recognition of their roles in developing the CMT recording procedures.

Dr. David Pokotylo has drawn on two decades of teaching at UBC to write a college textbook that maximizes Canadian content. Published in paperback by Prentice Hall Canada this summer, Introduction to Anthropological Archaeology retails for about \$43. Another book to watch for, by Dr. Julie Stein (University of Washington) on the archaeology of San Juan Island, was recently accepted for publication by the University of Washington Press. Still at the planning stage, DARYL FEDJE (Parks Canada) will be putting together a multi-authored volume on the archaeology of the Queen Charlotte Islands. Contrary to rumour and despite his retirement from the University of Idaho, Dr. RODERICK SPRAGUE continues to edit and produce the journal Northwest Anthropological Research Notes. He is

catching up with the publishing schedule, which fell behind as a result of transition from a departmental to a private undertaking, and requests that subscribers wait patiently and do not inquire about the next issue so that he can get on with the job.

Exploratory excavations at an intertidal wet site in Southeast Alaska this summer produced fragments of semi-rigid netting, a barbed wooden harpoon point, and a handful of other artifacts. Previously salvaged baskets from the site date to 5000 B.P. and there are stake alignments ("fish weir" features) dating to 2000 B.P. Directed by KATHRYN BERNICK, the work is being conducted under the auspices of the SITKA TRIBE of Alaska. Closer to home, Dr. MIKE BLAKE and DR. DANA LEPOFSKY (principal investigators of the 1998 joint UBC-SFU archaeological investigations at Scowlitz) have arranged with the Stó:Lo Nation and the BC Heritage Trust to convert the schoolhouse at Harrison Mills into Fraser Valley archaeological laboratories.

## FOUND HUMAN REMAINS

#### by Lindsay Oliver

For almost two decades the Ministry of Small Business, Tourism and Culture has tried to deal effectively and professionally with accidentally found human remains. While an overall protocol for this material exists, there is no defined policy when dealing with remains at the Band level. First to a discovery scene are the police who then contact the local coroner. If in doubt as to the forensic or non-forensic nature of the material, the remains are forwarded to the Office of the Chief Coroner, Burnaby. When determined to be non-forensic, the Archaeology Branch is notified.

Mr. Jim Pike of the Archaeology Branch has been liaising with the Coroner's office, the respective First Nations concerned and with sending a physical anthropologist to the scene as rapidly as possible. It is particularly important in cases where grave goods are present since a trained archaeologist will note what may be overlooked by other investigators. It has also been found repeatedly that portions of the remains are still present at the site or that the earlier investigation has merely entailed surface collection of obvious elements with little or no attention paid to the site of origin.

Each burial location, recovery and future of the human remains is determined directly between Mr. Pike and the First Nations within whose traditional territories the discovery is made. Frequently the course of action is determined through consultation with the Elders and Council who then relay their wishes back to Mr. Pike.

For a decade it has been my privilege to be the physical anthropologist usually called upon, frequently with little notice, to attend a scene anywhere within the Province. While the major causes for human remains to be uncovered are natural erosion and development, no two burials are alike nor any two situations similar. For a start, reaching the location may be simple (car or walking from a fixed location) or more complex (helicopter, float plane, or boat), and then access may be gained directly with the remains on the surface; in a collapsing riverbank; below

water, or they may be reached by rapelling down into a cave or by crawling into a crevice.

When the remains are determined to be aboriginal, I always contact the First Nations indicated by Mr. Pike prior to going into the field. Occasionally observers are sent to be present during recovery and to take possession of the remains once the work is completed, at other times, reburial takes place immediately in a more secure location selected by the Band. Sometimes I am asked to undertake non-destructive analysis of the remains and artifacts with transferral of the recovered material to be made at a time and location indicated by the Band.

The type of information analysis provides is: sex of the individual, age at death, confirmation of race, and any hard tissue pathologies or trauma experienced during life. Deliberate cranial modification and accompanying artifacts may indicate status of the individual, and occasionally artifacts may suggest possible activities undertaken by the individual during life.

The Found Human Remains Contract has provided an excellent vehicle for public relations. Generally there is great interest shown in the recovery, which is frequently undertaken in a very visible locale. Apart from explaining to the general public what significance the remains have to the Aboriginal community and how much can be learned by controlled excavation, it also provides an opportunity to explain about the Heritage Conservation Act.

Perhaps the most commonly asked question is "How old are they [the remains]?". When I respond that the individual was a young adult, the frustrated public replies "No, no. How long have they been buried?" Again this provides an excellent opportunity to discuss radiocarbon dating and why it is rarely undertaken.

On one occasion a group of young boys watched me excavating a cairn burial. "Oh gross", said one, "we camped on that spot only a couple of weeks ago!" I asked him if anything unpleasant had occurred or if they were "spooked" during their campout. Instead they told me it was great to which I could respond that clearly the an-

cestral remains meant them no harm. We then engaged in a long discussion about the impossible feats and terror attributed to skeletal remains in comic books as opposed to the reality of someone passing away and being lovingly buried and mourned.

On yet another occasion, a small boy asked if he could keep one of the bones as a memento. I asked if he would like to dig up his grandfather so that someone could keep a piece of him as a memento. After thinking for a moment, not only did he give the bone back to me, but he also produced a complete skeleton collected in a plastic bag before I had arrived at the site.

Over the years, skeletal remains have been recovered from the most unusual places: a cranium from a phone booth in Surrey, another from a school locker in Victoria; an anonymous skull from West Vancouver covered in candle wax; two bags of recently-disturbed material dumped in a Burnaby church car park; a highly-polished skull from Vancouver Island; partial remains from a Vancouver dumpster; a teaching skull recovered from display in a clothing store. Unfortunately, the point of origin of these is never known leaving a dilemma as to disposition.

Not all items, however, are what they seem to be. A skull removed from a museum display was found to have a false, acrylic mandible wired to it containing two deer teeth and one dog tooth. Another cranium that had been buried then removed several times, turned out to be a plaster cast. And some years ago following an article published in the Vancouver Sun about the work I do, unusual skeletal material was forwarded to Simon Fraser University where I was completing my master's thesis. One item comprised a composite, articulated teaching skeleton with the teeth glued in the wrong sockets and numerous pathological conditions all put together in one specimen; two "skeletons" turned out to be plaster busts.

With museums becoming increasingly aware of the sensitivity of aboriginal remains, not only have all such items been removed from public display but museums are also co-operating in the repatriation process. Gone are the days when science and inquiry took precedence over Native sensitivities to their ancestral remains. As the Found Human Remains Contract evolved, so has our knowledge and understanding of burial practises and associated changes through time and, more importantly, the recognition that First Nations feel an unbroken link to their ancestors.

With a recent reorganization in the Coroner's department, archaeolgical material dating as far back as 1982 was finally turned over to the Archaeology Branch. A considerable effort has been made in the intervening years to ensure that the current employees of the Coroner's office do not shelve material that is not of concern to them; rather, Mr. Pike has been informed much more rapidly and thus has been able to set in motion the required steps to ensure respectful and rapid recovery where indicated.

The Found Human Remains contract works, usually to the satisfaction of all parties involved. Over the past decade only a few groups have used ancestral remains as a political tool for other purposes; these include private individuals, developers, and two First Nations. On the whole, most parties involved show great sympathy and respect to the situation.

Despite a flurry of rumours about the lucrative side to the contract, it should be noted that the Found Human Remains contract operates on a very small budget. Few individuals would be prepared to travel anywhere in the Province, often within hours of notification, for any other reason that an understanding of the work and the honour of working directly with so many different First Nations. Simply, I love the work I do. I have learned so much from Elders about their traditional knowledge of mortuary practises and I have had the privilege of participating in many different manners of spiritual cleansing and in laying the disturbed remains to rest.

What of the future? Bone finds will continue to be reported in a wide variety of circumstances, but with the possible discontinuation of the contract in its present format, many scenes will remain unattended and the opportunity will exist for developers to ignore their findings. At a point when liaison between the police,

Coroner's office, and the Archaeology Branch has has never been better, it seems that the time and effort made by all to reach this level of co-operation may be put aside and the ignorance shown by many towards ancestral remains will return. It is my hope and that of any trained professional archaeologist and physical anthropologist, that this does not become the result of so many years of hard work. Both our community and those of the First Nations should let it be known that ancestral remains above all other cultural traces left from the past, need to be shown the respect and protection they deserve and that a contract must exist for the expedititious and professional recovery of the ancestoral remains when accidentally

Lindsay Oliver received a BA (honours) and an MA from Simon Fraser University, Her MA thesis specialized in the study of human remains. Since graduation, the focus of her work has been on the recovery of human remains although she does participate in other aspects of the field of archaeology.

### RECENT PUBLICATIONS

Ames, Kenneth M., and Herbert D.G. Maschner. 1999. Peoples of the Northwest Coast. Thames and Hudson, New York/London. 288 pp., illus., refs., index. Price: ISBN 0-500-05091-0 (Hc) \$45.00 US.

Babits, Lawrence E., and Hans van Tilburg, eds. 1998. Maritime Archaelogy: A Reader of Substantive and Theoretical Contributions. Plenum Press, New York. 608 pp., illus. Price: ISBN 0-306-45330-4 (Hc) US \$95.00; ISBN 0-306-45331-2 (Pb) \$49.50 US.

Bailey, Douglas, ed. 1998. The Archaeology of Value: Essays on prestige and the processes of valuation. BAR International Series S730, Oxford. Price: ISBN 0-86054-963-1 (Pb)£35.00.

Dingwall, Lucie, Sally Exon, Vince Gaffney, Sue Laflin, and Martijn van Leusen, eds. 1999. Archaeology in the Age of the Internet - CAA 97 - Computer Applications and Quantitative Methods in Archaeology: *Proceedings of the 25th Anniversary Conference, University of Birmingham, April 1997.* BAR International Series S750, Oxford. Price: ISBN 0-86054-945-3 (Pb)£39.00.

Fagan, Brian M. 1998. Ancient North America: The Archaeology of a Continent. Second Edition. Thames and Hudson, New York/London. 480 pp., illus., refs., index and glossary. Price: ISBN 0-500-27817-2 (Pb) \$34.95 US.

Gosden, Chris. 1999. Archaeology and Anthropology: A Changing Perspective. Routledge, London. 240 pp. Price: ISBN 0-415-16249-1 (Hc) \$119.00; ISBN 0-415-16250-5 (Pb) \$35.99.

Hodder, Ian. 1999. The Archaeological Process: An Introduction. Basil Blackwell Publishers, Oxdord. xiv + 242 pp., illus., bib., index. ISBN 0-631-19884-9 (Hc) \$?; ISBN 0-631-19885-7 (Pb) \$32.00.

Jones, Sian. 1997. The Archaeology of Ethnicity: Constructing Identities in the Past and Present. Routledge, London. 200 pp., illus. Price: ISBN 0-415-14157-5 (Hc) CDN\$105.00; ISBN 0-415-14158-3 (Pb) CDN\$31.99.

King, Thomas F. 1998. Cultural Resource Laws & Practice: an introductory guide. AltaMira Press, Walnut Creek, CA. xiv + 303 pp., figs., bib., apps., index. Price: ISBN 0-7619-9043-7 (Hc) \$?; ISBN 0-7619-9044-5 (Pb) \$22.95 US.

Knapp, A. Bernard, Vincent C Piggott, and Eugenia W. Herbert, eds. 1999. Social Approaches to an Industrial Past: The Archaeology and Anthropology of Mining. Routkedge, London. 288 pp., illus., index. Price: ISBN 0-415-18150-X (Hc) \$105.00.

Knecht, Heidi, ed. 1997. Projectile Technology. Plenum Press, New York. 432 pp., illus. Price: ISBN 0-306-45716-4 (Hc) \$59.5 US.

Shackley, M. Stephen, ed. 1998. Archaeological Obsidian Studies: Method and Theory. Plenum Press, New York. 262 pp. Price: ISBN 0-306-45804-7 (Hc) \$49.50 US.

Taylor, R.E., and Martin J. Aitken, eds. 1997. Chronometric Dating in Archaeology. Plenum Press, New York. 416 pp., illus. Price: ISBN 0-306-45715-6 (Hc) \$95.00 US.

Wass, Stephen. 1997. The Amateur Archaeologist. Routkedge, London. 160 pp., illus. Price: ISBN 0-7134-6896-3 (Hc) \$35.00.

Whitley, David S., ed. 1998. Reader in Archaeological Theory: Post-Processual and Cognitive Approaches. Routledge, London. 368 pp., illus. Price: ISBN 0-415-14159-1 (Hc) \$126.00; ISBN 0-415-14160-5 (Pb) \$34.99.

### **BOOK REVIEWS**

### Gatekeepers and Gatecrashers

# Gender in Archaeology: Analyzing Power and Prestige

By SARAH MILLEDGE NELSON

Altamira Press, Walnut Creek, CA, 1997. 240 pp. Price: ISBN 0-7619-9115-8 (Hc) \$46.00 US; ISBN 0-7619-9116-6 (Pb) \$19.95 US.

Despite a rapidly growing literature, engendered archaeology remains a misunderstood and marginalized aspect of our discipline. Sarah Nelson's Gender in Archaeology: Analyzing Power and Prestige provides the first general synthesis of this recent and diverse body of research. The theoretical premise of Nelson's review is that gender is central to constructing and deconstructing power and prestige both in academe and in the interpretations of past societies. Although the book offers little new insight to those working in this area, it is a good general introduction to the history, theory, and application of genderoriented research.

Nelson's framework of analyzing the interrelationship of gender, power, and prestige is a tenet of feminist research. In archaeology, this analysis is double-edged as it examines both the present practice of archaeology and the interpretation of past cultures. The essential problem is that archaeologists have uncritically and universally interpreted past gender roles and relations as being the same as western stereotypes of gender in the present. This culturally and historically contingent perception of gender premises and gives greater value to men and their activities over those of women, and in doing so maintains established power structures in the discipline. Archaeological power structures determine what topics are con-

sidered valid and important to research and to some extent prescribes their appropriate interpretation through paradigmatic control. Scholars whose research sails within these guidelines are rewarded with funding, publication (visibility) and prestigious academic positions. Central research topics are those that are historically of interest to western men: warfare, exchange of women's labour and fertility, inheritance, property ownership, societal and economic control. In interpreting these issues, men are actively associated with the pursuit of power and prestige whereas powerful and prestigious women are viewed as unnatural, exceptions, "a world gone wrong." Nelson states: "Trivializing women may be accomplished even without comment, by dismissing them as without prestige or power, and therefore without interest." (p. 19). Archaeological evidence contradictory to androcentric viewpoints is explained away through interpretive double standards. Nelson's summary of the feminist critique of archaeology is one that has been wellargued and even acknowledged by some archaeologists over the past decade.

Why then is a feminist perspective in archaeology still marginalized when it reveals obvious bias in archaeological practice? Nelson argues that at stake are bastions of processual research regarding the evolution of political complexity and particularly origin studies. Those who have the most at stake, archaeologists who have built careers on theories and interpretations that are intrinsically androcentric, have become gatekeepers for the discipline. Gatekeepers have the power and position to exclude and marginalize researchers and research that challenges their own. This is not to say that gatekeepers per se are unnecessary. Gatekeepers should evaluate and set aside interpretations that are not supported by archaeological evidence. But what of gatekeepers whose position is based on interpretations built upon untested assumptions about gender relations, who selectively use ethnographic data (also widely criticized as androcentric) and interpretive double standards to support their view of the past? Such gatekeeping is not about protecting objectivity or scientific rigor; it is about power and self-interest. Nelson argues that a feminist-informed gendered archaeology is better science. This does not advocate replacing one bias with another. Instead, a gendered archaeology forces us to critically evaluate assumptions, strengthen interpretations, and to look at gender as a variable to be explained by a more objective scientific practice.

Nelson explores areas of general archaeological interest. In chapters 1 through 3, Nelson reviews the history and theoretical underpinnings of a feminist gendered archaeology. This is an introductory review, and although the feminist critique of science is very well summarized, it is not hard hitting. This provides some comfort for colleagues who suffer strong allergic reactions to anything feminist. In chapters 4 through 8, Nelson explores power and prestige in origins research, the division of labour, families, households, community leadership, and ideology. A strength of the book is the focus on prehistoric archaeology and the particular methodological and theoretical problems of grappling with gender in the archaeological record. This excludes a large literature on gender in historic archaeology and ethnoarchaeology preventing the work from being truly comprehensive on the subject. Nevertheless, Nelson's approach challenges the criticism that a gendered archaeology works best when riding tandem with rich historic or ethnographic text. In the final chapter, Nelson lays out guidelines and suggestions for the future of an engendered archaeology.

A short-coming of Nelson's review, and perhaps of gendered archaeology as a whole, is the lack of balance. Nelson's language and cited studies tend to focus on women. Understandably this results from revisionary efforts to make women's contributions to cultural and biological evolution visible. But a gendered archaeology contends to present a more realistic interpretation of women's and men's sepa-

rate and collaborative roles in the past. Far more individuals (past and present) have little if any power and prestige than those who do. Nelson makes but a few passing references to this issue, but it should be addressed more fully. Failure to do so will continue to ghettoize gendered archaeology as only a woman's issue.

In sum, the book is a valuable contribution to those who are unfamiliar with this literature and want a general overview of the issues. In this regard, Nelson's book is informative and highly readable.

#### **Diane Lyons**

Dr. Diane Lyons is a lecturer in the Department of Archaeology at Simon Fraser University and an instructor at Douglas College. She is currently involved in an ethnoarchaeological study of gender, households and communities in highland Ethiopia and in a study of gender and diet in the Jomon-Yayoi transition in Japan.

### The Archaeology of "Gum San" (Gold Mountain)

### Hidden Heritage: Historical Archaeology of the Overseas Chinese

Edited by PRISCILLA WEGARS

Baywood Publishing Company, Inc., Amityville, NY, 1993 xxvi + 430 pp., illus., tbls., refs., index. Price: ISBN 0-89503-095-0 (Hc) \$46.95 US; ISBN 0-89503-091-8 (Pb) \$ 35.21 US.

In the current literature of historical archaeology, ethnicity has become a frequently encountered research topic. This term designates not only people of distinct cultural and linguistic affiliations (e.g., nationality, religious denominations, etc.), but also includes racial groups, such as African Americans, Native Americans,

Overseas Chinese, and Hispanic Americans. Most archaeological research on ethnicity has tended to concentrate on racial groups, because of their perceived greater visibility within the archaeological record. This publication augments and expands an earlier book on the topic of ethnicity within historical archaeology edited by Robert Schuyler (1980), which contained four chapters pertaining explicitly to the archaeology of Overseas Chinese. The papers found in *Hidden Heritage* provide a good comparative reference for recent archaeological research on the Overseas Chinese within British Columbia. Some examples of recent archaeological investigations of the Overseas Chinese in British Columbia include Diana French's PhD work at the Chinese leper colony on Little D'Arcy Island (French 1995), the 1993 SFU archaeological fieldschool at Barkerville on the original location of the Chih Kuh T'ang House, Ying Ying Chen's PhD 1993-94 investigations of Chinese miners' camps in the greater Barkerville area, and the excavations in Vancouver's Chinatown conducted by Imogene Lim in 1996 (Malaspina and Langara University Colleges) in association with the Archaeological Society of British Columbia (Hooper 1996).

The papers published in this monograph comprise a wide range of research topics and interests covering a broad geographical spectrum. The editor has organized fourteen papers into five sections - rural contexts, urban contexts, work and leisure, analytical techniques, and comparative and theoretical studies. Except for one paper on the Overseas Chinese in New Zealand, the remaining contributions deal with archaeological research in the American West frontier-California, Idaho, Nevada, Oregon, Arizona, and Texas. A review of an edited volume such as this can be a challenging task. Therefore, in order to accomplish this I should like to discuss these papers by concentrating on some identified themes: material culture vernacular architecture, foodways, lifeways (work, labour and leisure), and acculturation/assimilation.

In archaeological studies of historic ethnicity, there is an emphasis on equating the presence of ethnic groups with the identification of distinctive artifact types that are commonly referred as "ethnic markers". Artifacts associated with Chi-

nese ethnicity will include characteristic items such as snuff bottles, ceramics, or opium smoking paraphernalia. In chapter 6 Sando and Felton discuss documentary evidence based on translated 19th century store inventory records for Asian ceramic types and packaged opium. In this paper they provide significant insights into late 19th century Chinese folk taxonomy and consumer behaviour. Wylie and Fike (chapter 10), on the other hand, present a detailed and well-illustrated paper on Chinese opium smoking and related artefacts. Under this thematic heading one can also include the two papers pertaining to scientific analytical methods. The use of manganese and cobalt ratios from x-ray fluorescence spectroscopy and optical emission spectroscopy techniques from the underglaze components to discern manufacture attributes and date ranges for Chinese ceramics is presented by Steele (chapter 11). In chapter 12 Strenger discusses his findings employing spectrographic methods to both source and date Asian porcelains.

Ethnicity research has also concentrated on studies of vernacular architecture. Two papers present 19th century Chinese domestic architecture on the mining frontiers in the US Pacific Northwest and on the South Island in New Zealand. Sisson (chapter 2) discusses the remains of Chinese dwellings recorded during an archaeological survey of the Lower Salmon River basin. Ritchie (chapter 13) interprets the structural remains and types documented in Central Otago for his doctorate research. Both these researchers found that the Chinese structures within their study areas exhibited few vernacular features, and that they defined function rather than style or vernacular influences. They acknowledge the highly adaptive nature of Chinese frontier dwellings, employing a wide range of materials and methods, including rockshelters and caves. Despite the transient and expeditious contexts inherent on mining frontiers, their discussions seem to indicate to me that there may have been more Chinese influences at work than they suggest.

Traditional foodways represent another significant domain where ethnic group behaviour is assumed to be maintained or reproduces social boundaries. Foodways include the materials associated with food preparation, serving and consumption

practices. Two chapters concentrate on the interpretation of faunal remains from Chinese contexts. Longenecker and Stapp (chapter 4) describe the faunal data from the Pierce, Idaho, project, and in chapter 7 Gust compares several Chinese associated faunal assemblages from a number of urban sites (Sacramento, Ventura, and Woodland, California; Lovelock, Nevada; Tuscon, Arizona). Discussions of archaeological data on Chinese diet and foodways are also found within sub-sections of other papers in this monograph.

A number of papers deal with the aspects of the integration of the Overseas Chinese within the capitalist worldeconomy context. A discussion of Chinese agricultural activities in the Salmon River basin is presented in chapter 3 by Fee, who concludes that these small operations played an important part in the local food distribution network that supplied both Chinese and non-Chinese miners in the area. Stapp (chapter 1) discusses research conducted within mining sites at Pierce City, Idaho. Both the documentary and archaeological evidence collected from a salmon cannery on the Columbia River at Warrendale, Oregon, is interpreted by Fagan (chapter 8). Within the urban setting of Tuscon, Arizona, Staski (chapter 5) looks at Chinese-related trash pit features associated with commercial laundry and household deposits dating from the turn of the century. Finally, Wegars in chapter 9 discusses the historical and archaeological evidence for Chinese women and their activities (including prostitution and other occupations) in the American West frontier.

A final topic of interest within ethnicity research concerns the impacts of acculturation and assimilation on minority or marginalized ethnic groups within the context of the Western world system. This issue is raised, addressed, and debated by several contributors in the book. Contrary to the assumptions of ethnic group maintenance above, Gust (p.208) notes that, except for the presence of butchered cat and dog elements, there were "few valid indicators of Chinese ethnicity" within the faunal assemblages, suggesting material acculturation in centres with small Chinese populations. From the data recovered in Tuscon, Staski (p.144-145) implies that a portion of the Chinese community experienced some form of material accul-

turation, while at the same time maintaining strong ethnic boundaries between the Chinese and others through restricting primary social relationships. To Staski, then, rather than concentrating on "changing behavioural repertories," archaeologists should investigate patterns of social structure, such as the distribution of power and intra-group composition. Evidence from the cannery at Warrendale indicates that the acculturation processes on the contract Chinese labourers was superficial and selective, relating to only those Euro-American items that were required in their work-related activities, such as clothing, or certain commodities like alcohol (Fagan p.226-227). In other respects, however, they maintained their traditional Chinese culture and language, particularly in leisure contexts. Therefore, the scale and degree of assimilation and acculturation is dependent upon the particular historical contexts in which various Chinese individuals and communities existed.

Finally, in the concluding paper Greenwood (chapter 14) presents a general overview of research of Overseas Chinese in historical archaeology. She discusses the history of this research, the current state of investigations, as well as a critical assessment of the contributions in this book. More importantly, however, she also provides some ideas about the future research directions, including placing these archaeological studies into broader geographical and sociological frameworks.

Overall, the book is well edited and organized, with a number of illustrations, including figures, maps, tables, and archival and field photographs. For those readers that have an interest in ethnicity in historical archaeology, and in the archaeology of the Overseas Chinese, this book will provide a worth-while reference. Despite the fact that this collection was published six years ago, it still represents a significant contribution to ethnicity research in historical archaeology.

#### References

French, Diana. 1995 Historical and Archaeological Investigations of the D'Arcy Island Leper Colony, 1891-1924. *The Midden* 28(1):10-12.

Hooper, Robin. 1996 ASBC Participation in the Chinatown Dig, 1996. *The Midden* 28(4):13, 20.

Schuyler, Robert L. ed. 1980 Archaeological Perspectives on Ethnicity in America: Afro-American and Asian American Culture History. Baywood Publishing Co., Amityville, New York.

#### **Robbin Chatan**

Robbin Chatan, publications editor for *The Midden*, has a long-standing interest in historical archaeology, and has worked on several projects on historical sites in Western Canada. He is presently enrolled in the PhD program in archaeology at Simon Fraser University. Robbin's doctorate research will look at the material expressions of late 19th century British colonialism at Levuka, Ovalau Island, Fiji.

## A Much Needed Introduction

## The First Nations of British Columbia

By ROBERT J. MUCKLE

UBC Press, Vancouver, 1998. xii + 146 pp., Illus., apps, glossary. Price: ISBN 0-7748-0663-X (Pb) \$19.95.

The topic of First Nations of British Columbia is extensive. Muckle's book provides a useful summary of the numerous issues connected to modern day political reality. The book is organized in four thematic parts: First Nations Defined; Archaeology and First Peoples; Ethnology in British Columbia; and Culture Change and Modernization. Various appendices, a glossary of terms and a selected bibliography are presented at the end of the book.

In part 1 Muckle offers clarification on many terms used by the media, in literature, by academics, consultants, government officials and First Nations peoples themselves. By outlining the history of the terms used today, the cultural and legal meanings of these terms are shown to be not just fancy ways of referring to the subject of First Nations, rather this chapter delineates the purpose of these terms. This initial chapter sets the stage showing that

not all Native peoples are the same and there is great diversity among them.

The author provides a broad sketch on the development of archaeology in British Columbia and the involvement of First Nations in archaeology in part 2. A general overview of the entire province's cultural history sequence is given. This sketch does show the temporal depth and variety of sites present in British Columbia. Although short in terms of detail, this chapter does provide basic knowledge for nonarchaeologist what the archaeology of British Columbia is about. Muckle achieves this by summarizing findings from several important sites: Mount Edziza, Charlie Lake Cave, Skouglund's Landing, Namu, Keatley Creek, Gore Creek, Xá:ytem, and Sproat Lake. Each site provides the reader with a taste of the various ages and site types present in British Columbia.

In the next section of the book, Muckle outlines the rationale for ethnographic research. Beginning as a way to document Native culture during a time when First Peoples were thought to be going extinct, ethnography has come full circle in British Columbia. Native groups are currently doing their own ethnographic research and incorporating it into archaeological and linguistic research. Prime examples are the increasingly common Traditional Use Studies (TUS). Although focused primarily on Northwest Coast culture, this chapter offers basic information about all British Columbia First Nations, the Plateau, Sub-arctic and Northwest Coast. This chapter offers a general understanding of the diversity that exists in this province. The suggested reading list at the end of the chapter is the book's longest and is needed to supplement this huge topic.

Muckle summarizes the more recent events of British Columbia history in part 4. Beginning with the initial European colonization, the subsequent fur trade, gold rushes, and all the associated adverse affects on First Nations populations are told. The unconstitutional placement of Native peoples on reserves and then into residential schools are reviewed in a social political context. I was shocked to discover that the last residential school was closed down as late as 1984. These are negative parts of the past we all must deal with. The more recent cultural revitalization of First Nations groups in Brit-

ish Columbia is presented, beginning with the political organization of Native groups toward authenticating Aboriginal Rights to the current trend of the six step treaty process. It is hoped by many Native groups that the treaty process will finally grant them constitutional rights, citizenship and a place in the economy of British Columbia, abolishing old "Hollywood" images of Native peoples in British Columbia.

The final section consists of the appendices that provide the reader with some additional information about specific groups and affiliations. Each major group is listed and the relationships among them are given. This section further illustrates the diversity of Native cultures in British Columbia.

To help put the treaty process into some context, excerpts from the Royal Proclamation of 1763, the Laurier Memorial of 1910, the Nishga'a Agreement-in-Principle, and groups involved in the processes are given. This maybe the most useful section of the book for those people who do not know the general details of this political issue. This section should be required reading for every person living in this province (including politicians). The definition of these basic words and the context in which they are used is more important than ever. Everyone involved in this process has to be clear what the other is saying. Misunderstanding of meanings and language were some of the initial problems for all governments involved in the treaty process in British Columbia. Once established, the six-step process could finally be started.

In a glossary Muckle provides lists of a number of terms and their present-day meanings. This is a very useful section for the general reader who may or may not understand the intricacies of these words. Each term carries a specific meaning meant to have a political impact. Indeed, after Chief Justice McEachern and the Delgamuukw decision, the First Nations of British Columbia have become as politically savvy in the use of the English language as a lawyer or judge.

This book is meant for a general audience and would serve well for an introductory college or university course on the First Nations of British Columbia. The book has enough data to interest and further inspire a reader to seek more infor-

mation. The book's strength is generality, which is extended at the end of each chapter by a small section of suggested readings. The First Nations of British Columbia will serve those well who are just starting out in anthropology, archaeology, First Nations studies and politics. Without the basic knowledge presented in this book, anyone studying or working in this province will be for the worse. I strongly commend the author for this timely overview and highly recommend this book on that note.

**Rudy Reimer** 

ASBC member Rudy Reimer is an MA candidate at Simon Fraser University and is currently involved in alpine and subalpine archaeology of southwestern British Columbia.



### HERITAGE RESOURCE CENTRE

We had some facts wrong in our editorial of the previous issue of *The Midden*, as Romi Casper kindly pointed out to us.

We mentioned that the former Culture Library is now called Heritage Resource Library and of course that should have been: Heritage Resource Centre.

We mentioned that Romi Casper is the librarian and in fact she is the RESOURCE CLERK. To add insult to injury we misspelled Romi's name. We apologize for our mistakes and any upset it may have caused to Romi and others.

What we did get right, however and that was the message we wanted to pass on—is that the library will continue to provide the usual services this year, and hopefully many years after.

Contact Romi Casper at the Her-ITAGE RESOURCE CENTRE by phone (250) 356-1440 fax 356-7796 or Email: RomiCasper@gems6.gov.bc.ca

### **PERMITS**

#### Issued by the Archaeology Branch, March - May 1999

As always, the assistance of Ray Kenny (Manager, Assessment and Planning Section) and Alan Riches (Branch Secretary) in providing the following information is greatfully acknowledged. A number of recurrent abbreviations appear in this list, and are described herein. The most commonly used abbreviations are "AIA" (Archaeological Impact Assessment), "MoF" (Ministry of Forests), and "CMT" (Culturally Modified Tree). Many forest industry-specific abbreviations occur throughout, including "CP" (Cutting Permit), "FD" (Forest District), "FL" (Forest License), "TSA" (Timber Sales Area), "TFL" (Tree Farm License), and "TL" is (Timber License). Terms often used in legal descriptions also appear: "DL" (District Lot), "Sec" (Section), "Tp" (Township), "Rge" (Range), and "r/w" (right-of-way). Lastly, the following abbreviations refer to the different types of Permit issued by the Archaeology Branch: ALT = Alteration; INS = Inspection; INV = Investigation.

1999-057	Remi Farvacque	INS	AIA/monitoring for construction of Nevis Ltd. Halfway Pipeline between battery site 5-12-87-25 and a central facility at 6-19-88-23, BCGS map sheets 94A.051, .052, and 94A.062
1999-058	Erika Laanela	INS	AIA of MoF SBFEP forestry operations near Matchlee Bay, Aston Creek, and Black Creek, Campbell River FD
1999-059	Doug Meske	ALT	Alterations to DISs 17 by Western Forest Products Ltd. forestry operations within Blocks J108, J122, and J144, Campbell River FD
1999-060	Normand Canuel	INS	AIA of Northwood Inc., MoF and other licensees' forestry operations within the Lakes FD
1999-061	Bjorn Simonsen	INS	Site inventory of selected portions of Esquimalt and Victoria harbours.
1999-062	Sandra Sauer	INV	Excavations at DjPv 36 (original Fort Steele), located on the E side of the Kootenay River within Lot 51, Kootenay Land District
1999-063	Kevin Somerville	ALT	Alterations to CMTs #9 - 13, DkSo 40, by Western Forest Products' forestry operations within and adjacent to Block J114, TFL 19, at Nesook Bay, Campbell River FD
1999-064	Lindsay Oliver	INS	AIA of Cattermole Timber's forestry operations within FL A19202, Blocks 32-1, 32-4, 33-1, and 33-4, Chilliwack FD
1999-065	Remi Farvacque	INS	Post-construction AIA of two Petro Canada seismic lines and associated access roads on and NE of Halfway River IR#168, NE BC
1999-066	Rick Howard	INS	AIA of MoF forestry operations within CP 148-12, S of Seton Lake, Lillooet FD
1999-067	Mike Rousseau	INS	AIA for proposed residential development of DLs 4272, 822, 821, and 823, Fraction of SE Sec 23, Fractions of NE, NW, and SW, Sec 14, and Fraction SE Sec 15, all Tp 100, KDYD, located at the N end of Stump Lake, upper Nicola Valley
1999-068	Ken Halisheft	ALT	Moving of CMT #9, FaSv 11, within InterFor cutblock RB 9, TL TO 416, Restoration Bay area, Mid-Coast FD
1999-069	Hartley Odwak	INS	AIA for proposed limestone quarry, vicinity of Varney Bay, VI
1999-070	Dave Schaepe	INS	Site inventory for DFO proposed fish habitat restoration project along the Chilliwack River in the vicinity of Nesakwatch Creek
1999-071	Rob Field	INS	AIA of MoF forestry operations in Woodlot 1854, Oona River, Porcher Island, North Coast FD
199-072	Duncan McLaren	INV	Systematic data recovery at DhRo 28, Stave River
1999-073	Gail Wada	INS	AIA for MoTH Vancouver Island Highways Project proposed bridge crossing and associated approaches over the Tsolum River
1999-074	Jennifer Jackson	INS	AIA of Riverside Forest Products, West Fraser Mills, Tsi Del Del Enterprises, Lignum, MoF, and other possible licensees' forestry operations within the Chilcotin FD
1999-075	Ian Franck	INS	AIA of Federated Co-operatives, Evans Forest Products, MoF, and other possible li- censees' forestry operations within the Salmon Arm FD
1999-076	Wayne French	ALT	Alterations to CMTs within DfSf 10, DfSf 11, and DfSf 12, by forestry operations in
			TFL 44, within the asserted traditional territory of the Huu-ay-aht First Nation, South Island FD
1999-077	Jason Trenn	ALT	Alterations to a segment of trail recorded as FiRr 6, by Weldwood of Canada (Quesnel Operations), by operations associated with salvage harvesting within CP 12-1 and CP 99 (B98B), blocks 9801, 9808, 9809 of FL A18172, between Punchaw Lake and Fraser River, Quesnel FD
1999-078	Normand Canuel	INS	AIA of Northwood Inc., Takla Forest Managment, Apollo Forest Products, Stuart Lake Lumber, MoF, and other licensees' (including Woodlot holders) forestry operations within the Fort St. James FD

1999-079	Veronica Cadden	INS	AIA of Plateau Forest Products, West Fraser Mills (Fraser Lake Sawmills Division), Canadian Forest Products, MoF, and other licensees' (including Woodlot holders) forestructure within the Venderk of FD.
1999-080	Heather Pratt	INS	estry operations within the Vanderhoof FD AIA of International Forest Products (Campbell River Operations) forestry operations within the Hisnit TO259, Hoiss TO182, and Kleeptee TO193, W Vancouver Island, Campbell River FD
1999-081	Rhea Adama	INS	AIA for proposed subdivision of Lot 1, Plan 32293, DL 4191, Watson Lake, near 105 Mile House
1999-082	Jeff Bailey	INS	AIA for proposed Grotto Mountain Development subdivision of DL 7551, Lot R-1(A), Kootenay Land District, at NE end of Windermere Lake near Invermere
1999-083	Dave Schaepe	INS	AIA of part of DL 701, Grp 2, NWLD, for possible inclusion within Cultus Lake Provincial Park, located in the Columbia Valley S of Cultus Lake
1999-084	Sheila Minni	INS	AIA for Ruby Creek Gravel Pit, located on Hwy 7 between Agassiz and Hope
1999-085	Gail Wada	INS	AIA for proposed land-altering activities relating to establishment of fish habitat by Community Fisheries Development Centre, on the S side of the Fraser River, on and adjacent to the W side of Katzie IR#2
1999-086	James Haggarty	INS	AIA for Balaklava Development Corporation proposed resort development within DL 15125, Rupert Land District, on the W side of Balaklava Island
1999-087	Alison Biely	INS	AIA for proposed residential development within Parcel A of Lot 12, Sec 70, Plan 1957; Lot 1, Sec 69, Plan 33932; Lot 2 Sec 68, Plan 33932; and Parcel F, Sec 67, 67A, and 74
1999-088	Gabriella Prager	INS	AIA of Slocan Forest Group forestry operations within the Fort Nelson FD and N part of the Fort St. John FD
1999-089	Bonnie Campbell	INS	AIA of MoF/SBFEP, Crestbrook Forest Industries (Sparwood, Elko, and Cranbrook Operations), Galloway Lumber Company, and other licensees' forestry operations within the Cranbrook FD
1999-090	Erika Laanela	INS	Site inventory of DL 1378, Clayoquot LD, on the N side of Quait Bay, for Clayoquot Wilderness Resort's construction of a lodge and ancillary developments
1999-091	Susan Woods	INS	AIA of Slocan Group, Weyerhauser Canada Ltd, MoF, and other possible licensees' forestry operations within the Clearwater FD
1999-092	Lindsay Oliver	INV	Recovery and conservation of "accidently found human remains" (99-26B) reported from water-borne debris deposited on the MoTH Seton Portage Road #188 r/w through Slosh IR#1, W of Shalalth on the N shore of Seton Lake; permit does not grant or imply any authorization or access on adjacent federally-regulated lands set aside for
			the Seton Lake Indian Band
1999-093	Bonnie Campbell	INS	AIA of MoF/SBFEP, Crestbrook Forest Industries (Parson and Canal Flats Operations), Slocan Forest Products, and other licensees' forestry operations within the Invermere FD
1999-094	Gabriella Prager	INS	AIA of Weyerhauser Canada Ltd. (Okanagan Falls Division) forestry operations within all parts of the Penticton FD and W parts of the Boundary FD within the asserted traditional territories of the Westbank First Nation and/or the Osoyoos Indian Band, but not in overlap with the asserted interests of other First Nations
1999-095	Tanja Hoffmann	INS	AIA for proposed sale of lands owned by British Columbia Rail Properties Ltd. in Pemberton, N of Pemberton Creek and S of Picker, Prospect, and Frontier Streets
1999-096	Andrew Mason	INS	Site inventory and AIA of McMillan Bloedel's (Stillwater Division) Goat Narrows study area on Powell Lake, within TFL 39, Sunshine Coast FD
1999-097	Jean Bussey	INS	AIA of MoF/SBFEP and Woodlot forestry operations and upgrading of recreational trails within the Penticton FD
1999-098	Bruce Ball	INS	AIA of West Fraser Mills forestry operations for the Penold, Grain Creek, Spanish Lake, Viewland Mountain, Hanceville, Kiyoi Lake, Fletcher Lake, Schultz Creek, Clusko River, and Willan Creek operating areas, within the Williams Lake, Chilcotin, and Horsefly FDs
1999-099	Mary De Paoli	INS	AIA for proposed subdivision of Lot C, Plan 20470, DL 4189/4190/ 4191, LLD, at Watson Lake near 105 Mile House
1999-100	Tanja Hoffmann	INS	AIA for construction and installation of a BC Gas pipeline crossing the Fraser River downstream of the Port Mann Bridge between municipalities of Coquitlam and Surrey
1999-101	Scott Lawrie	INS	AIA of Babine Forest Products, Decker Lake Forest Products, and other licensees' forestry operations within the Lakes FD

1999-102	David Hall	INS	Site inventory for possible "Anvil Island Andesite" quarry locations on Anvil Island, Howe Sound, NWLD
1999-103	Doug Hudson	INV	Excavations at DkRn 5 (Six Mile Site), on the W side of Lillooet River, 5 km upstream from the head of Harrison Lake
1999-104	R.G. Matson	INV	
1999-104		INS	Excavations at DgRn 23, located at Hatzic AIA for MoTH proposed improvements to portions of Hwy 1, between W gate of Mt.
1999-106	Morley Eldridge	INS	Revelstoke NP and W gate of Yoho NP Site inventory and AIA of J.S. Jones Timber and other licensees' forestry operations
1999-107	Martin Handly	INS	in the Murray Creek, Twaal Creek, and Spence Creek watersheds near Spences Bridge AIA of Gorman Brothers and other licensees' forestry operations within the Penticton
1999-108	Bruce Dahlstrom	INS	FD
1999-108	Bruce Damstrom	INS	AIA for salmon hatchery proposed by Aqua-Vision Consulting, on the SE shore of Topaze Harbour, about 500 m S of DL 1840, Coast Land District, as well as a connecting pipeline to Heydon Lake
1999-109	Kevin Twohig	INS	AIA of Ainsworth Lumber Company forestry operations within the 100 Mile House, Horsefly, and Williams Lake FDs
1999-110	Robert Lackowicz	INS	AIA of Tolko Industries and other licensee's forestry operations within the Salmon Arm FD
1999-111	Ian Franck	INS	AIA for residential development of Part of the Remainder of Block 1, DL 4284, Gp 1,
1999-112	Dana Lepofsky	INV	NWD, located at Gunboat Bay, Pender Island Excavations and documentation of house features, burial mounds, and other parts of
1999-113	Richard Brolly	INS	DhRl 16 (Scowlitz Site), near Chilliwack AIA for Sechelt Resort Development, Lot 1, Block B, DL 303, Plan LMP18610, Sechelt,
			Sunshine Coast
1999-114	Martin Handly	INS	AIA of Atco Lumber, Kalesnikoff Lumber, Kaslo and District Community Forestry Society, Pope and Talbot, Slocan Forest Products, MoF, and other licensees' forestry
1999-115	Keary Walde	INS	operations within the Arrow, Kootenay Lake, and Columbia FDs AIA of Louisiana Pacific, MoF/SBFEP and other licensee's forestry operations within
			those parts of map areas 94P/15 & 16, 94A/2 - A/15, 94G/1-2+7-9, and 94H/2 - H/15
			that are of exclusive heritage interest to the Blueberry River FN, and for which the
			proponents have agreed to contract archaeological services directly from the Blueberry River FN
1999-116	Karen Preckel	INS	AIA of Tsi Del Del Enterprises, Riverside Forest Products, Lignum, and other licensees' forestry operations within the Chilcotin FD
1999-117	Martin Handly	INS	AIA for SW portion of NE Sec 6, Tp 23, ODYD, near Kelowna
1999-118	Doris Zibauer	INS	AIA of MoF, Ainsworth Lumber, Weldwood of Canada and other licensee's forestry
			operations withn the 100 Mile House FD
1999-119	Marianne Berkey	INS	AIA of C&C Wood Products, Slocan Forest Products, Tolko Industries (Quest Wood Division), Weldwood of Canada, West Fraser Mills and other licensees' forestry operations within the Quesnel FD
1999-120	Jim Wilkinson	ALT	Alterations to 52 CMTs within DeSe 47 by TFL Forest Ltd. forestry operations in
1999-120	JIII WIKIIISOII	ALI	Block 10-8-J, TFL 46, E side of Nitinat Lake, South Island FD
1999-121	Jim Wilkinson	ALT	Alterations to a single CMT by TF Forest Ltd. forestry operations within Block 10-10-A, TFL 46, E side of Nitinat and Doobah Lakes, South Island FD
1999-122	Peter Merchant	INS	AIA for two MoTH gravel pits, within DL 4758, NWD, near Sargeant Bay N of Coast Hwy 101 (Norwest Pit), and E side of Hwy 101 opposite DLs 3260/6384, NWD (Ruby
			Lake Pit), as well as for two proposed upgrades to Hwy 101 on Sechelt Peninsula
			between Middle Point and Francis Peninsula Road, and on E side of Ruby Lake from
			Egmont Road S for approximately 3 km
1999-123	Robert Lackowicz	INS	AIA of Pope and Talbot, Weyerhauser Canada, and other licensees' forestry opera- tions within the Boundary FD
1999-124	Martin Handly	INS	Site inventory of five potential chert bedrock locations within the Mount Roberts For-
			mation and the Sophie Mountain Formation, situated W of the Columbia River be- tween Castlegar and the Int'l Boundary in the Rossland Range
1999-125	Robert Lackowicz	INV	Systematic data recovery within DkQm 25, at Johnson Creek 12 km S of Edgewood
1999-126	Bonnie Campbell	INS	AIA of MoF/SBFEP (Golden Office), Avery Creek Services, Bell Pole Company, Evans
1777-120	Bonne Campoen	1110	Forest Products, and other licensees' forestry operations within the Columbia FD

1999-127	Bob Craven	ALT	Alterations to CMTs #50-57, #61-76, 78-79, 81-85, and 88-97 within DkSo 33, by Western Forest Products forestry operations in Block H49, TFL 19, on the E side of
			Tlupana Inlet, Campbell River FD
1999-128	Susan Woods	INS	AIA of MoF, Weyerhauser Canada, Tolko Industries, and other licensees' forestry operations within the Kamloops FD
1999-129	Mark Walmsley	ALT	Alterations to DgQa 3, DgQb 1, DgQb 2, DgQb 4, DgQc 1, and DgQc 5 by ground-
			disturbing activities associated with construction of the BC Gas Southern Crossing
			Pipeline between Yahk and the E side of the Columbia River S of Trail
1999-130	Robert Lackowicz	INS	AIA of Gorman Brothers Lumber, Tolko Industries, MoF/SBFEP, Weyerhauser
			Canada, and other licensees' forestry operations within the Vernon FD
1999-131	Martin Handly	INS	AIA of Tolko Forest Industries (Nicola Division) and other licensees' forestry
			operations within the Merritt FD
1999-132	Janet van der	ALT	Alterations to CMTs in GhSo 13 (563-3:1) and GhSo 14 (563-3:2) by
	Giessen		Houston Forest Products' forestry operations in CP 563, Blocks 3A and 3B and
		D.10	associated access road within FL A16827, near Morrison Lake
1999-133	Bonnie Campbell	INS	AIA of MoF/SBFEP, Crestbrook Forest Industries (Creston Operation), West
		*	Kootenay Woodlot Association, Wynndel Box and Lumber, J.H. Huscroft, and other
1000 124	N1 C1	DIC	licensees; forestry operations within the Kootenay Lake FD
1999-134	Normand Canuel	INS	AIA for proposed subdivision of DL 6440, Lot 2, Plan 26767, near Dragon Lake,
1000 125	Marlay Eldridge	INS	Cariboo Land District AIA of MoF, McMillan Bloedel, and other licensees' forestry operations within the
1999-135	Morley Eldridge	111/2	N half of the South Island FD
1999-136	Andrew Martindale	INV	Site inventory within the Gitnadoix and Exchamsiks River drainages and near the
1777-130	Andrew Martindale	1111	mouth of the Skeena River, and excavations at sites including GaTh 2
1999-137	Jeff Bailey	INS	AIA of J.S. Jones, Canadian Forest Products, and other licensees' forestry operations
1999 10.		22.10	in those parts of the Chilliwack FD lying within the asserted traditional territories of
			the Boothroyd, Boston Bar, and Spuzzum First Nations
1999-138	Gary Coupland	INV	Investigations of the McNichol Creek site (GcTo 6) N of Prince Rupert and the
			Boardwalk site (GbTo-31), Phillips Point site (GbTo 28), and Tremayne Bay site
			(GbTo-46) on the E shore of Digby Island, W of Prince Rupert
1999-139	Owen Grant	INS	AIA for proposed building construction at 1767 Beaufort Avenue, Comox, on N side
			of Comox Harbour
1999-140	George Nicholas	INS	AIA for proposed telecommunications tower and ancillary developments on unsur-
			veyed Crown Land at the NW end of Kamloops Lake, near Savona
1999-141	Bruce Low	INS	AIA of Finlay Forest Industries' Thomas Trail forestry road improvements, Ingenika
1000 110	D 0.1	DIG	Arm of Williston Lake, Mackenzie FD
1999-142	Dave Schaepe	INS	AIA of MoF/SBFEP proposed Timber Sale Licenses A58233 (Blocks A-C), A58042
1000 142	W W-1.1-	INIC	(Block A), A68045 (Blocks B-C), and A61093 (Block A), within the Chilliwack FD
1999-143	Keary Walde	INS	AIA for proposed Alaska Highway realignment between Km 825 and 839 (Coal River to Fireside) and possible other sections of the highway within the asserted
			traditional territory of the Lower Post First Nation, as they become known
1999-144	Andrew Mason	INS	Site inventory and AIA Coast Mountain Hardwoods forestry operations within FL
1999-144	Andrew Mason	1145	A32611, Blocks 1-2, 2A, and 3-5, Chilliwack FD
1999-145	Renee Carriere	INS	AIA of West Chilcotin Forest Products and Yun Ka Whu'ten Holdings forestry
1777 115	Tronto Currier	22.00	operations near Anahim Lake within FL A66903 and A56805, Chilcotin FD Western
			Supply Blocks
1999-146	Jean Bussey	INS	AIA of Canadian Hunter Explorations, Anderson Resources, and Union Pacific
	***************************************		Resources oil and gas developments in NE BC.
1999-147	Kevin Twohig	INS	AIA for Bay Arm Rate Payers' Association's proposed electrical transmission line on
			N side of Horsefly Lake, from Hen Ingram Lake FSR (Z Road) to DL 12122,
			Cariboo District
1999-148	Janet van der	ALT	Alterations to CMTs in GhSp 40 by Houston Forest Products' forestry
	Giessen		operations within FL A16827, CP 562, Block 3 and associated access road, S of Haul
		n.:	Lake
1999-149	Chris Engisch	INS	AIA of Western Forest Products' forestry operations within TFL 25 Block 5
1000 150	C1:- II	DIC	(Roderick Operations), and FL A16845 (Tom Bay Operations), Mid-Coast FD AIA of Houston Forest Products and other licensees' forestry operations within the
1999-150	Geordie Howe	INS	Morice FD
			MOUNTER

### CONFERENCES

1999

12-15 November Chacmool, 32nd Annual Conference "Indigenous People and Archaeology" Honouring the Past, Discussing the Present, Building for the Future Calgary, Alberta

> Currently, there is a trend in archaeology in which traditional schools of thought concerning the past are being augmented and adjusted as a result of increased exchanges with indigenous people. This interaction has generated both cooperative efforts and strained relations between indigenous people and archaeologists. The purpose of this conference is to share information on the mutual benefits of cooperative ventures and to open a dialogue on issues of controversy. Now is the time to hear from the many voices that speak for the past, present, and future.

Contact: 1999 Chacmool Conference, Department of Archaeology, University of Calgary, Calgary, AB, T2N 1N4; Tel.: (403) 220-7120; E-mail: chacmool@ucalgary.ca; Web page: http://www.ucalgary.ca/UofC/faculties/SS/ARKY/chacmool.html

2000

5-9 April

Society for American Archaeology (SAA). 65th Annual Meeting Philadelphia, Pennsylvania, USA.

Contact: SAA headquarter office, Society for American Archaeology, 900 Second Street NE #12, Washington, DC 20002-3557. Email: meetings@saa.org. SAAweb: http://www.saa.org.



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