

FAUNAL ANALYSIS OF THE FORKS (WINNIPEG)  
(21K1 to 21K6)

BY PAMELA J. SMITH

1985

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## Introduction

The 1984 excavations at the Forks (Winnipeg) yielded 29,487 faunal remains including approximately 5,397 fish scales. Most of the remains were recovered from the controlled excavations of Fort Gibraltar I (21K4 and 21K6) dating from 1810-16, and Fort Gibraltar II (21K3) dating from 1817. Some of the bones predate the fort occupation and were the remains of prehistoric encampments. Operations 21K1, 21K2 and 21K5 were tests which uncovered small numbers of bone.

All of the faunal elements were examined and identified as specifically as possible, including body part. Evidence of modification (butchering, artifact fashioning, utilization, burning, carnivore chewing, rodent gnawing and weathering) was recorded. Provenience information was retained and minimum numbers of individuals were calculated. The data is used to provide information on the butchering techniques and diet as well as seasonality and lifestyle indicators.

#### Method

The bone was received ready for analysis, having been previously washed and catalogued. The bone was counted and sorted. Evidence of any cultural and non-cultural modifications was recorded.

The unidentifiable pieces were examined and assigned to Class or Order whenever possible. Size ranges were used within taxons in order to reveal more about the species composition of the assemblage than simply reporting a mammal or bird would.

Large mammals refer to bear, deer, moose, elk, bison, horse, cow, pig, sheep and goat. Medium mammals range from muskrat to wolf, and include porcupine, rabbit, hare, river otter, fisher, fox, beaver and lynx. Small mammals include squirrels and small rodents. Large birds refer to crane, swan, goose, hawk, loon, heron and eagle. Medium birds range from Kingfishers to ducks. Small birds are of the size of sparrows and warblers. The medium/large and small/medium categories are used for fragments which cannot be positively assigned to one of the size categories.

The identifiable bone was tentatively identified and set aside for further analysis with the aid of a reference collection. Body part (including left and right data) was recorded for use in calculating minimum numbers of individuals. This information was also useful to see if dietary preferences for certain animal parts existed.



The identifications are reported using common names. The scientific nomenclature can be found in Table 1. Categories such as bison/cow/moose/elk and wolf/dog/coyote/fox were used for bones which were undiagnostic beyond those levels, often due to similarities between the species, incompleteness or poor preservation.

Identification of some elements to groups such as sheep/goat, walleye/sauger and mooneye/goldeye were as much a reflection of the incomplete reference collections as the difficulties in making distinctions. Unless all possible species skeletons are available for comparison it is usually unjustified to make a positive identification. However, habitat preference or size differences can sometimes be used to eliminate certain species.

Although reference books were used as an aid, identifications for the Forks fauna were not finalized until checked against a comparative specimen. When a bone matched one species but other possible species could not be eliminated, c.f. followed by the identification was used to indicate the bone is like the species given, but the identification was not positive.

## Results

The assemblage contained approximately 29,487 pieces, and 28,222 (95.7 per cent) were identified to the level of Class or beyond. Fish scales were estimated to number 5,397 and despite attempts to identify them, their poor condition made it possible only to assign them to class. Of the 24,090 bone and shell remains (excluding the fish scales), 2,379 (9.9 per cent) were identified to order, and 1,795 of these (7.5 per cent of the total) were taken to the family level or further. The faunal summary data by operation can be found in Table 2. Table 3 reveals the relative proportions of the different classes, also by operation. The faunal data for each operation by sub-operation is contained in Tables 4 through 9.

Two specimens from the sample have not been included in the faunal data. These are: an almost complete adult human (*Homo sapiens*), right third metatarsal (foot bone) from 21K6Q4; and a calcined fragment of an appendage from the chitonous exoskeleton of a member of the class Crustacean, Phylum Arthropoda, from 21K3A7.

## Phylum and Class Descriptions

### Phylum Chordata

#### Class Mammal

Mammalian remains represented 30.7 per cent of the total assemblage. Most of the mammal bone was from large mammals. Still, a variety of species was represented and beaver, muskrat and hare appeared particularly significant.

Both domestic and wild species were present, with the domestics being found predominantly in 21K3 and 21K4. Sixteen domestic bones were identified from 21K3 from sub-operations A,C,G and M. There were 31 from 21K4 from sub-operations A,B,G,K,M,R,S,U,V and Y. 21K6 yielded only six domestic bones and these were from sub-operations A,E,N and Y. A single bone from 21K2, sub-operation A, was identified as cow. However, because 61 of the large bovid bones could not be differentiated, they were reported as bison/cow. Therefore, it is possible that more of the sub-operations contained domestic species because some of the bovid bones would likely be cow. These bovid bones were found in many sub-operations which otherwise had no domestic representation: 21K3C,H,J,L and Y; 21K4C; 21K6C,F and P; and 21K1A.

Sheep and goat are very similar osteologically and only certain elements could be distinguished. Possibly records from the fort might indicate which species were present.

Rabbit and hare bones were difficult to assign to species on the basis of osteological characteristics. However, based on the time period and range information the Leporidae bones at the Forks were likely snowshoe hare (*Lepus americanus*). According to Banfield in *The Mammals of Canada* (1981:83), "The snowshoe hare is undoubtedly the most important small game mammal of Canada" and the white-tailed jack rabbit and eastern cottontail did not spread north into Manitoba until after 1885 and 1914 respectively.

#### Class Aves

There were 1,464 bird bones, making up only 5 per cent of the sample. Still, at least 13 species were discovered, including domestic chicken from 21K3 E. Cranes, swans, geese, ducks and grouse were all excellent culinary fare.

It was difficult to discriminate between duck species, but whenever possible the duck bones were assigned to a size category using size ranges given in *Avian Osteology* (Gilbert & Savage 1981): large duck for the many species of the size of canvasbacks, mallards, and pintails; and small duck for those of the bufflehead and teal size.

The Whooping Crane bones were identified first as crane and then as Whooping Crane based on their extreme size and the measurements given in *Avian Osteology* (Gilbert & Savage 1981). The bones listed as simply crane belonged to either Whooping Crane or the Greater Sandhill Crane.

The grouse/prairie chicken bones were likely to be grouse because the Greater Prairie Chicken "apparently colonized southern Manitoba about 1880" (Godfrey 1876: 113).

The hawk bones all appeared to be Red-tailed Hawk (*Buteo jamaicensis*), but those fell into the same size range as Swainson's Hawk (*Buteo swainsoni*), which was a very common prairie bird. Because a comparative skeleton of Swainson's Hawk was lacking it is unjustified to report a positive identification of Red-tailed Hawk.

The single owl specimen found was checked against a number of species and appeared to be from a Snowy Owl (*Nyctea scandiaca*). However, since not all possible species could be checked the identification remains tentative.

#### Class Fish

Fish was the largest class with 56.2 per cent of the collection. Even subtracting the approximate 5,297 scales, which were often found by the hundreds and thousands and were likely from a small number of individuals, there were 11,161 fish as opposed to the 9,053 mammal. Yet these numbers actually tell little about the actual number of individuals present or their relative contributions to the diet. Obviously, two bison provided a lot more to the diet than 19 catfish did. Still, there were at least ten species represented, indicating that a variety of fish were utilized. Catfish was most common, both in number of pieces and in minimum number of individuals, followed by sturgeon in number of fragments only. However, it should be noted that these fish may be disproportionately represented because they were more readily identified than other species. Even the smallest fragment of a sturgeon scute can be recognized, but having a large number of scute pieces still did not allow a calculation of a minimum number of individuals of more than one for sturgeon. The catfish bones were less fragile and more apt to preserve intact than the bones of

goldeye, mooneye, whitefish, walleye, sauger and drum. In fact, most of the unidentified fish bones were fragments, although many were ribs and other hard to identify parts.

#### Class Reptilia

Only a single turtle bone was found: a small carapace (shell) fragment from 21K3.

#### Class Amphibia

There were 560 frog or toad bones recovered. Most of these were from almost complete skeletons: probably seven from 21K6 (one each from C10, C11, C14, C15, C18, R5 and R6); and about two more from 21K3 (E3, G2, G3, L1 and L4).

#### Phylum Mollusca

##### Class Pelecypoda

Seven species of the large freshwater clam were identified. Also, a small number of small fingernail or pea clams were included. Most of the elements of the bivalve category were valve fragments from large clams which lacked teeth or other identifying features. Most of the bivalves (360 of 507) came from 21K3.

##### Class Gastropoda

Of the 79 snails excavated, 71 of them were found in 21K3, principally from suboperations E and J.

#### Minimum Number of Individuals

The minimum number of individuals (MNI) for identified taxa were calculated from the skeletal element with the highest frequency, taking into account the side of the body it came from and the age of the animal.

Calculations were made for 21K1, 21K2, Fort Gibraltar II (21K3), Fort Gibraltar I (21K4 and 21K6) and 21K5 separately. These were then summed to give MNI values for all the areas, provided the areas were discrete. Overall values were also calculated for 21K1 to 21K6 without regard to provenience; these are absolute minimums, even if the independence of the areas could not be established. The MNI values for the mammals, birds, fish, and bivalves can be found in Tables 10, 11, 12 and 13 respectively.

### Seasonality

Some species were available only at certain times of the year. Availabilities are given for species as they applied to the Forks based on the identifications in this report and range information. The season the food was consumed was not necessarily the same season it was procured. Fish caught in the fall could have been dried or smoked, and freezing in the snow would have kept foods in the winter. Also, the spawning season of fish was the time they were most readily available, but this does not preclude the possibility that some were caught by ice fishing.

#### Fish: Spawning Seasons

##### Spring

Northern Pike, Mooneye, Goldeye, Walleye, Sauger, Sturgeon, Sucker, Redhorse

##### Late Spring/Summer

Channel Catfish, Brown Bullhead, Blackhead

##### Summer

Freshwater Drum

##### Fall

Lake Whitefish



Winter

Burbot

## Birds

Spring, Summer and Fall

Trumpeter Swan, Whistling Swan, Canada Goose, migrant  
nesting ducks, Mourning Dove, Passenger Pigeon, Swainson's  
Hawk, Red-tailed Hawk, Gull

Spring and Summer

Migrant nesting birds (except ducks)

Spring and Fall

Whooping Crane, Greater Sandhill Crane, Common Loon

Winter

Snowy Owl, Barred Owl

Year Round

Grouse, Domestic Chicken

## Mammals

Spring, Summer and Fall

Black Bear

Winter Preferred

Fur bearers: Wolf, Lynx, Beaver, Muskrat

Year Round

Porcupine, Hare, Pig, Cow, Sheep, Goat

## Reptiles and Amphibians

Summer

Turtles

Spring and Summer

Frogs, Toads

### Diet and Butchering

A large variety of species was represented by the faunal assemblage. It would appear that use was made of the many available animal resources in the area. In addition to the domestic cow, pig, and sheep or goat, mammals included bear, wolf, possibly dog, lynx, fisher, otter, muskrat, beaver, hare and skunk, all of which were eaten. All were considered palatable but skunk came with the qualifier that it had to be carefully gutted. Apparently horses were only eaten when necessary, probably because they were too valuable (Hurlburt 1977). Although some of these species were represented by a small number of bones (sometimes only one or two), unless the bones came in on a skin, it was likely the meat was used. The whereabouts of the rest of the skeletons can be best accounted for by supposing the bone was either eaten by dogs, burned to a state of unidentifiable fragments, or contained in the soil in areas in and around the site which have not been excavated. Of course, it is likely that much of the skeleton of the large game mammals was never brought to the fort, but butchered where taken.

The bird, fish and bivalve species also indicated that a wide range of food sources were utilized, although, as with the mammals, the minimum number of individuals was low. Because of this it was difficult to attribute relative importance of the various foods to the diet. It can only be said that the assemblage indicates the bulk of the animal meat was provided by the large mammals.

The fauna recovered during excavations at the Forks revealed frequent evidence of butchering. Spiral fractures occurred on almost every large mammal bone as well as some of the smaller mammal bird remains. Although it is impossible to be certain that all of these fractures were the result of butchering, many revealed the percussion marks of having been deliberately hit. These had chop marks from which flakes of bone had been removed. Other bones exhibited saw marks and many had knife marks.

The large mammal bone were extremely fragmented. The long bone shaft pieces were rarely larger than one inch, and the articular ends were often broken but were more intact than the shafts. Fine cut marks appeared on some of the long bones near the articular ends or tuberosities. These were the result of defleshing cuts.

The large mammal ribs were often cut and snapped, chopped or sawn through into two or three pieces. Very few of the pieces which included the articular end were found. Most were mid or distal sections, and many had fine cut marks on them.

The scapulae had cut marks on the neck near the shoulder joint and one had cuts on the spine. The spine and blade were frequently broken. The hips were very chopped up; the acetabulum was separate from the ilium, ischium and pubis. The phalanges were almost all split longitudinally. Few vertebrae but many vertebral processes were found, especially thoracic spinous processes. Those carried the much favoured hump meat. The carpals, tarsals, and sesamoids were intact.

Fewer of the small and medium mammal bones were broken, but some of those, as well as some of the fish and bird, revealed defleshing cut marks.

The deliberate breaking open of many of the large mammal bones would have had at least one purpose in mind.

These bones contained the marrow which was considered a delicacy. However, the bone did not need to be extensively broken as it was just to obtain the marrow. The smashing of the bones may have been for the production of bone glue or bone grease.

For the manufacture of bone glue, the inedible bones like carpals and tarsals were usually used (Hurlburt 1977), but those from the Forks were complete. It would be more likely, based on the pattern of breakage, that bone grease (bone butter) was being made. The butchering was very much like that found by Hurlburt (1977) at Fort White Earth which operated on the North Saskatchewan River in Alberta from 1810 to 1813. Hurlburt makes a good case for the production of bone grease based on almost exact correspondence of the butchering with that of the Calling Lake Cree and with references from the fur trade which refer to the process and the use of the grease. The evidence from the Forks also fits this pattern.

When the numbers of the bones with cut, saw or chop marks was plotted on the Fort Gibraltar I (21K4 and 21K6) excavation map, it was apparent that three of the 40 sub-operations (21K4A,B and K) contained 31 of the 46 bones with cut marks, 31 of the 39 bones with saw marks, and six of the 13 bones with chop marks. These three sub-operations totalled 1,538 of the 6,480 bones from the two operations, making the above figures disproportionate, indicating an area of concentration. In these same three sub-operations, 74 of the 111 dog chewed bones were found, along with the only three fashioned artifacts and three of the seven potentially utilized flakes. The frequency of butchering marks by sub-operation is included in Tables 14 and 15. (A table with a more detailed distribution by lot is on file at Archaeological Research Services, Environment Canada, Parks, Winnipeg.)

#### Other Modifications

A large number of the bones had been burned, either scorched, charred or calcined depending on the extent of exposure to burning. Many also exhibited evidence of having been dog chewed or rodent gnawed, weathered, eroded or root etched. Twelve had been discoloured as a result of their proximity to some object in the soil; the green colour is probably from a copper artifact while the rust colour is probably iron oxide. Tables 14 and 15 give the frequencies of these modifications.

When plotted on the excavation map for Fort Gibraltar I (21K4 and 21K6), it would appear that the burned fragments were distributed throughout. However, they were concentrated in greater numbers in the area of the building (21K6). Almost all of the dog chewed bones were away from the building (21K4), with 74 of 111 coming from the three sub-operations 21K4A,B and K, which also had many of the butchered bones and artifacts.

### Artifacts

A small number of deliberately fashioned artifacts were found. Two were fleshers (21K4A1 and K12) made from a moose and an elk proximal left metatarsal. Two possible netting needles were found from 21K4B5 and 21K3L4. 21K3M7 yielded two artifacts: one thought to be part of a cup and pin game and another which might be a piece of sewing equipment. These are drawn in Figure 1. In addition, other bones exhibited evidence of having been used. These utilized flakes were polished or had chips removed from use.

## References Cited

Banfield, A.W.F.

1981

The Mammals of Canada. University of Toronto Press,  
Toronto.

Gilbert, B.M., L.D. Martin and H.G. Savage

1981

Avian Osteology. Modern Printing Co., Laramie, WY.

Godfrey, W.D.

1976

The Birds of Canada. Bulletin 203, Biology Series 73,  
National Museum of Canada, Ottawa.

Hurlburt, I.

1977

Faunal Remains from Fort White Earth N.W.Co. (1810-1813).  
Human History Occasional Paper, No. 1, Provincial Museum  
of Alberta, Edmonton.



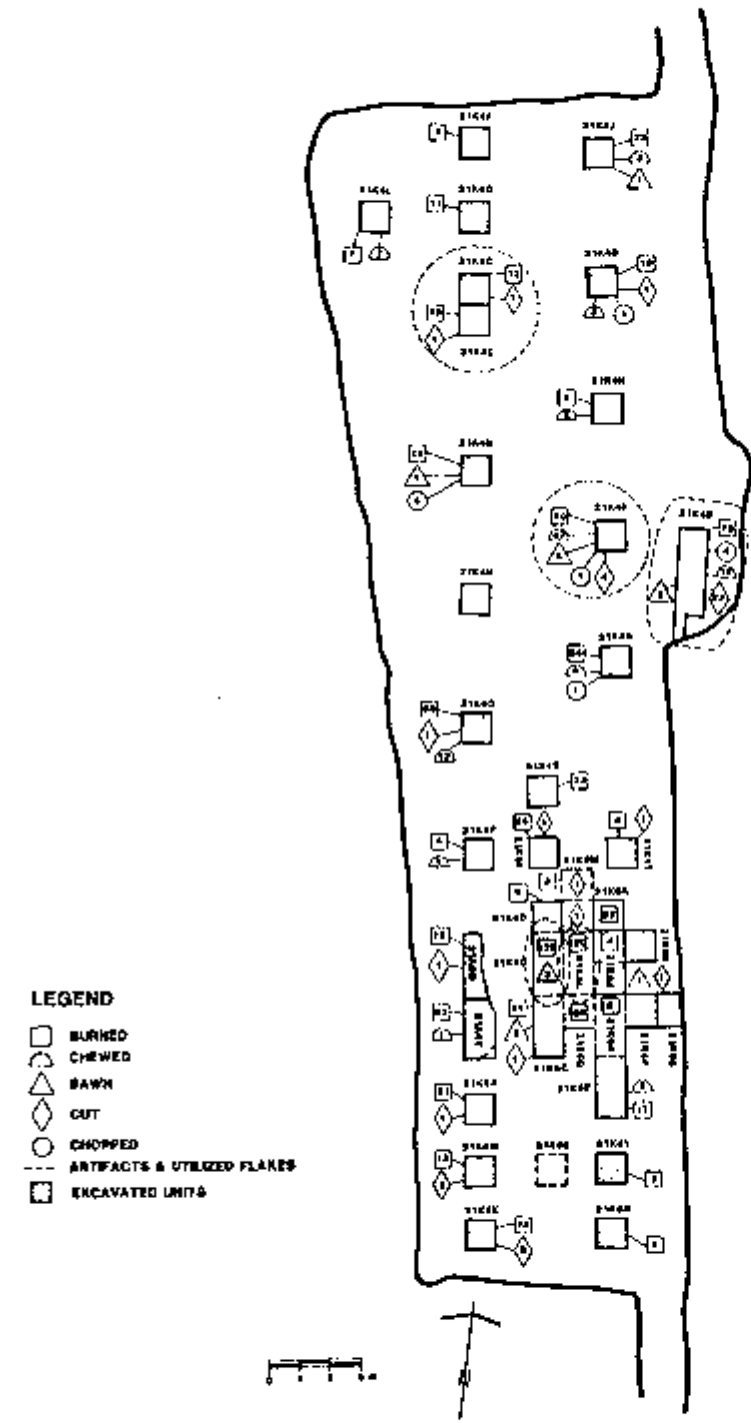


Figure 1. Distribution of modified bone at Fort Gibraltar I, 21K4 and 21K6.

PHYLUM	CLASS	Order	Family	Genus species	Common Name
CHORDATA	MAMMALIA	Artiodactyla	Bovidae	Bison bison	American Bison
				Bos taurus	Domestic Cow
				Ovis aries/Capra hircus	Domestic Sheep/Goat
			Suidae	Sus scrofa	Domestic Pig
			Cervidae	Cervus elaphus	American Elk
				Alces alces	Moose
				Odocoileus sp.	Deer
		Perissodactyla	Equidae	Equus caballus	Domestic Horse
		Carnivora	Ursidae	Ursus americanus	American Black Bear
			Canidae	Canis lupus	Wolf
				Canis sp.	Wolf/Dog/Coyote/Fox
			Felidae	Lynx sp.	Lynx/Bobcat
			Mustelidae	Martes pennanti	Fisher
				Lutra canadensis	River Otter
				Mephitis mephitis	Striped Skunk
		Rodentia	Erethizontidae	Erethizon dorsatum	American Porcupine
			Muridae	Ondatra zibethicus	Muskrat
			Castoridae	Castor canadensis	American Beaver
		Lagomorpha	Leporidae	Lepus sp.	Hare
AVES	Anseriformes	Anatidae			Goose/Duck
				Olor buccinator	Trumpeter Swan
				Olor columbianus	Whistling Swan
				Branta canadensis	Canada Goose
		Galliformes	Tetraonidae	Gallus gallus	Domestic Chicken
				Tetraoninae (subfamily)	Prairie Chicken/Grouse
		Falconiformes	Accipitridae		Hawk
		Columbiformes	Columbidae		Pigeon/Dove
		Gruiformes	Gruidae	Grus americanus	Whooping Crane
				Grus canadensis	Sandhill Crane

Table 1. Taxonomic list of identified remains.

CHORDATA (continued)	
AVES (continued)	
Charadriiformes	
Laridae	Gull
Gauiformes	
Gaviidae	
<i>Gavia immer</i>	Common Loon
Strigiformes	
Strioidae	Owl
FISH	
Acipenseriformes	
Acipenseridae	
<i>Acipenser fulvescens</i>	Lake Sturgeon
Amiliformes	
Salmonidae	
<i>Coregonus clupeaformis</i>	Lake Whitefish
Clupeiformes	
Hiodontidae	
<i>Hiodon</i> sp.	Goldeye/Mooneye
Esocidae	
<i>Esox lucius</i>	Northern Pike
Cypriniformes	
Catastomidae	
<i>Cf. Catastomus</i>	Sucker
<i>Cf. Moxostoma</i>	Redhorse
Ictaluridae	
<i>Ictalurus punctatus</i>	Channel Catfish
<i>Ictalurus</i> sp.	Catfish/Bullhead
Gadiformes	
Gadidae	
<i>Lota lota</i>	Burbot
Perciformes	
Percidae	
<i>Stizostedion</i> sp.	Walleye/Sauger
Sciaenidae	
<i>Aplodinotus grunniens</i>	Freshwater Drum
REPTILIA	
Chelonia	Turtle
AMPHIBIA	
Anura	Frog/Toad
MOLLUSCA	
PELECYPODA	
Eulamellibranchia	
Unionidae	
<i>Anodonta plicata</i>	Three-Ridge
<i>Lampsilis radiata</i>	Fat Mucket
<i>Lampsilis ventricosa</i>	Pocket-Book
<i>Lampsilis</i> sp.	Fat Mucket/Pocket-Book
<i>Ligumia recta</i>	Black Band-Shell
<i>Quadrula quadrula</i>	Maple-Leaf
<i>Lasmigonia complanata</i>	White Heel-Splitter
<i>Proptera alata</i>	Pink Heel-Splitter
Sphaeriidae	Fingernail/Pea Clam
GASTROPODA	
Mesogastropoda	Snail

Table 1 (Continued). Taxonomic list of identified remains.

Forks Fauna:	2IK1	2IK2	2IK3	2IK4	2IK5	2IK6	Total
Large Mammal	1	1	2491	591	2	157	3273
Medium/Large Mammal	0	1	2652	905	0	297	4055
Artiodactyl	0	0	8	29	0	5	43
Bison/Cow/Moose/Elk	1	0	13	15	0	4	33
Bison/Cow	1	0	37	18	0	5	61
Sheep/Goat/Pig	0	0	1	0	0	0	1
Moose/Elk/Deer	0	0	0	7	0	2	9
Moose/Elk	0	1	12	20	0	3	36
Deer	0	0	0	0	0	0	0
Bison	0	0	14	4	0	3	21
Moose	0	0	3	3	0	1	7
Elk	0	0	2	4	0	2	8
Horse	0	0	0	0	0	0	0
Cow	0	1	2	10	0	0	13
Sheep/Goat	0	0	7	5	0	4	17
Pig	0	0	7	7	0	2	16
Carnivore	0	0	1	0	0	1	2
Bear	0	0	1	1	0	1	3
Wolf	0	0	4	0	0	0	4
Wolf/Dog/Coyote/Fox	0	0	10	10	0	2	23
Lynx	0	0	1	5	0	0	6
Fisher	0	0	1	7	0	1	9
Otter	0	0	0	2	0	0	2
Beaver	0	0	21	26	0	23	70
Muskrat	0	0	107	1	0	1	109
Porcupine	0	0	0	1	0	0	1
Hare	0	0	72	18	0	3	93
Skunk	0	0	1	0	0	0	1
Medium Mammal	0	0	111	67	0	94	272
Small/Medium Mammal	1	0	137	51	0	31	220
Small Mammal	0	0	7	18	0	10	35
Small Rodent	0	0	9	12	0	4	25
Mammal	0	0	311	235	0	18	564
Large Bird	0	1	14	8	0	5	28
Medium/Large Bird	0	0	646	47	0	4	697
Whooping Crane	0	0	4	0	0	0	4
Sandhill Crane	0	0	0	0	0	0	0
Crane	0	0	2	0	0	0	2
Trumpeter Swan	0	0	5	0	0	0	5
Whistling Swan	0	0	2	0	0	0	2
Swan	0	0	2	0	0	1	3
Swan/Goose	0	0	0	1	0	0	1
Canada Goose	0	0	5	0	0	1	7
Goose	0	0	2	0	0	0	2
Goose/Duck	0	0	6	0	0	0	6
Large Duck	0	0	106	7	0	3	116
Small Duck	0	0	29	0	0	3	32
Duck	0	0	8	4	0	5	17
Chicken	0	0	2	0	0	0	2
Prairie Chicken/Grouse	0	0	31	1	0	1	33
Pigeon/Dove	0	0	5	1	0	0	7
Gull	0	0	2	0	0	0	2
Loon	0	0	0	1	0	0	1
Hawk	0	0	3	1	0	0	4
Owl	0	0	0	1	0	0	1
Medium Bird	0	0	14	5	0	0	19
Small/Medium Bird	0	0	28	0	0	0	28
Small Bird	0	0	2	3	0	0	5
Bird	1	0	366	44	0	18	432

Table 2. Faunal summary data by operation.

Forks Fauna	2IK1	2IK2	2IK3	2IK4	2IK5	2IK6	Total
Lake Sturgeon	0	0	156	35	0	2	213
Lake Whitefish	0	0	0	1	0	0	1
Goldeye/Mooneye	0	0	25	8	0	0	34
Northern Pike	0	0	6	2	0	0	8
Sucker (Catostomus type)	0	0	11	2	0	1	14
Sucker (Moxostoma type)	0	0	5	3	0	0	8
Sucker	0	0	22	10	0	0	32
Channel Catfish	1	0	218	109	9	23	360
Catfish/Bullhead	0	0	9	26	0	6	41
Burbot	0	0	11	0	0	0	11
Walleye/Sauger	0	0	39	16	0	12	67
Freshwater Drum	0	0	34	5	0	0	39
Fish	8	0	13513	1817	33	176	15648
Turtle	0	0	1	0	0	0	1
Frog/Toad	0	0	216	1	0	343	560
Three-Ridge	0	0	21	0	0	0	21
Fat Mucket	0	0	3	0	0	0	3
Pocket-Book	0	0	5	2	0	0	7
Fat Mucket/Pocket-Book	0	0	2	1	0	1	4
Black Sand-Shell	0	0	2	2	0	0	4
Maple-Leaf	0	0	1	0	0	0	1
White Heel-Splitter	0	0	1	1	0	0	2
Pink Heel-Splitter	0	0	14	5	0	0	19
Fingernail/Pea Clams	0	0	5	30	0	0	35
Bivalve	1	0	325	75	0	29	410
Shell	0	0	71	8	0	0	79
Class Unknown	0	0	529	665	0	72	1266
Total	15	5	22943	5885	44	1415	29487

Table 2 (Continued). Faunal summary data by operation.

	21K1	21K2	21K3	21K4	21K5	21K6	Total
Mammal	4 (26.7)	4 (80.0)	6243 (27.2)	2095 (41.2)	2 (4.5)	705 (43.8)	9053 (38.7)
Bird	1 (6.7)	1 (20.0)	1295 (5.6)	124 (2.4)	0	48 (3.0)	1464 (5.8)
Fish	9 (60.0)	0 NDIV/0!	14229 (62.2)	2656 (40.6)	42 (95.5)	222 (15.7)	16556 (56.2)
Turtle	0	0	1 (0.1)	0	0	0	1 (0.1)
Frog/Toad	0	0	216 (0.9)	1 (0.1)	0	549 (24.2)	566 (1.8)
Bivalve	1	0	360 (1.5)	116 (2.3)	0	38 (2.1)	515 (1.7)
Snail	0	0	71 (0.3)	8 (0.2)	0	0	79 (0.3)
Class Unknown	0	0	525 (2.3)	665 (13.1)	0	72 (5.1)	1262 (4.3)
Total	15	5	22943	5655	44	1415	29497

Table 3. Class frequency and proportion (%) by operation.

Forks Faunal 21K1	A	Total
Large Mammal	1	1
Medium/Large Mammal	0	0
Artiodactyl	0	0
Bison/Cow/Moose/Elk	1	1
Bison/Cow	1	1
Sheep/Goat/Pig	0	0
Moose/Elk/Deer	0	0
Moose/Elk	0	0
Deer	0	0
Bison	0	0
Moose	0	0
Elk	0	0
Horse	0	0
Cow	0	0
Sheep/Goat	0	0
Pig	0	0
Carnivore	0	0
Bear	0	0
Wolf	0	0
Wolf/Dog/Coyote/Fox	0	0
LYNX	0	0
Fisher	0	0
Otter	0	0
Beaver	0	0
Muskrat	0	0
Porcupine	0	0
Hare	0	0
Skunk	0	0
Medium Mammal	0	0
Small/Medium Mammal	1	1
Small Mammal	0	0
Small Rodent	0	0
Mammal	0	0
Large Bird	0	0
Medium/Large Bird	0	0
Whooping Crane	0	0
Sandhill Crane	0	0
Crane	0	0
Trumpeter Swan	0	0
Whistling Swan	0	0
Swan	0	0
Swan/Goose	0	0
Canada Goose	0	0
Goose	0	0
Goose/DUCK	0	0
Large Duck	0	0
Small DUCK	0	0
Duck	0	0
Chicken	0	0
Prairie Chicken/Grouse	0	0
Pigeon/Dove	0	0
Gull	0	0
Loon	0	0
Hawk	0	0
Owl	0	0
Medium Bird	0	0
Small/Medium Bird	0	0
Small Bird	0	0
Bird	1	1

Table 4. Faunal data for 21K1 sub-operations.

Forks Fauna: 21K1	A	Total
Lake Sturgeon	0	0
Lake Whitefish	0	0
Goldeye/Mooneye	0	0
Northern Pike	0	0
Sucker (Catostomus type)	0	0
Sucker (Moxostoma type)	0	0
Sucker	0	0
Channel Catfish	1	1
Catfish/Bullhead	0	0
Burbot	0	0
Walleye/Sauger	0	0
Freshwater Drum	0	0
Fish	8	8
Turtle	0	0
Frog/Toad	0	0
Three-Ridge	0	0
Fat Mucket	0	0
Pocket-Book	0	0
Fat Mucket/Pocket-Book	0	0
Black Sand-Shell	0	0
Maple-Leaf	0	0
White Heel-Splitter	0	0
Pink Heel-Splitter	0	0
Fingernail/Pee Clam	0	0
Bivalve	1	1
Snail	0	0
Class Unknown	0	0
Total	15	15

Table 4 (Continued). Faunal data for 21K1 sub-operations.



Forks Faunal 21K2	R	Total
Large Mammal	1	1
Medium/Large Mammal	1	1
Artiodactyl	0	0
Bison/Cow/Moose/Elk	0	0
Bison/Cow	0	0
Sheep/Goat/Pig	0	0
Moose/Elk/Deer	0	0
Moose/Elk	1	1
Deer	0	0
Bison	0	0
Moose	0	0
Elk	0	0
Horse	0	0
Cow	1	1
Sheep/Goat	0	0
Pig	0	0
Carnivore	0	0
Bear	0	0
Wolf	0	0
Wolf/Dog/Coyote/Fox	0	0
Lynx	0	0
Fisher	0	0
Otter	0	0
Beaver	0	0
Muskrat	0	0
Porcupine	0	0
Hare	0	0
Skunk	0	0
Medium Mammal	0	0
Small/Medium Mammal	0	0
Small Mammal	0	0
Small Rodent	0	0
Mammal	0	0
Large Bird	1	1
Medium/Large Bird	0	0
Whooping Crane	0	0
Sandhill Crane	0	0
Crane	0	0
Trumpeter Swan	0	0
Whistling Swan	0	0
Swan	0	0
Swan/Goose	0	0
Canada Goose	0	0
Goose	0	0
Goose/Duck	0	0
Large Duck	0	0
Small Duck	0	0
Duck	0	0
Chicken	0	0
Prairie Chicken/Grouse	0	0
Pigeon/Dove	0	0
Gull	0	0
Loon	0	0
Hawk	0	0
Owl	0	0
Medium Bird	0	0
Small/Medium Bird	0	0
Small Bird	0	0
Bird	0	0

Table 5. Faunal data for 21K2 sub-operations.

Forks Fauna: 21k2	R	Total
Lake Sturgeon	0	0
Lake Whitefish	0	0
Goldeye/Mooneye	0	0
Northern Pike	0	0
Sucker (Catostomus type)	0	0
Sucker (Notostoma type)	0	0
Sucker	0	0
Channel Catfish	0	0
Catfish/Bullhead	0	0
Burbot	0	0
Walleye/Sauger	0	0
Freshwater Drum	0	0
Fish	0	0
Turtle	0	0
Frog/Toad	0	0
Three-Ridge	0	0
Fat Mucket	0	0
Pocket-Book	0	0
Fat Mucket/Pocket-Book	0	0
Black Sand-Shell	0	0
Maple-Leaf	0	0
White Heel-Splitter	0	0
Pink Heel-Splitter	0	0
Fingernail/Pea Clams	0	0
Bivalve	0	0
Snail	0	0
Class Unknown	0	0
Total	5	5

Table 5 (Continued). Faunal data for 21k2 sub-operations.

Forks Faunal 21K3	A	B	C	D	E	G	H	J	K	Total
Large Mammal	213	234	730	61	251	53	89	431	18	2086
Medium/Large Mammal	250	322	150	44	348	56	123	324	5	1526
Artiodactyl	3	0	1	0	2	0	1	0	0	7
Bison/Cow/Moose/Elk	7	0	1	0	1	0	0	1	1	11
Bison/Cow	13	0	5	1	0	1	1	0	0	20
Sheep/Goat/Pig	0	0	0	0	0	0	1	0	0	1
Moose/Elk/Deer	0	0	0	0	0	0	0	0	0	0
Moose/Elk	3	1	0	2	2	1	2	0	0	11
Deer	0	0	0	0	0	0	0	0	0	0
Bison	1	2	3	0	0	0	1	5	0	12
Moose	1	0	0	1	0	0	0	1	0	3
Elk	1	0	0	0	1	0	0	0	0	2
Horse	0	0	0	0	0	0	0	0	0	0
Cow	0	0	0	0	0	1	0	0	0	1
Sheep/Goat	3	0	0	0	0	0	0	0	0	3
Pig	2	0	0	0	0	0	2	0	0	4
Carnivore	0	0	1	0	0	0	0	0	0	1
Bear	1	0	0	0	0	0	0	0	0	1
Wolf	1	0	0	0	0	0	0	1	0	2
Wolf/Dog/Coyote/Fox	1	0	1	1	0	1	0	0	0	4
Lynx	0	0	0	0	0	0	0	1	0	1
Fisher	0	0	1	0	0	0	0	0	0	1
Otter	0	0	0	0	0	0	0	0	0	0
Beaver	2	0	1	1	4	4	1	2	0	15
Muskrat	20	2	0	1	56	0	1	1	0	81
Porcupine	0	0	0	0	0	0	0	0	0	0
Hare	2	0	4	1	29	2	0	5	0	33
Skunk	1	0	0	0	0	0	0	0	0	1
Medium Mammal	6	0	34	1	5	0	0	0	0	46
Small/Medium Mammal	32	0	35	0	24	0	0	0	1	92
Small Mammal	1	0	1	2	1	0	0	0	0	5
Small Rodent	2	5	0	0	0	2	0	0	0	9
Mammal	37	12	0	0	58	2	17	43	5	176
Large Bird	5	2	0	1	2	0	0	0	0	10
Medium/Large Bird	135	9	0	5	272	0	0	10	0	431
Whooping Crane	2	0	0	0	2	0	0	0	0	4
Sandhill Crane	0	0	0	0	0	0	0	0	0	0
Crane	0	0	0	0	1	0	0	0	0	1
Trumpeter Swan	0	0	0	0	2	0	0	0	0	2
Whistling Swan	0	0	0	0	2	0	0	0	0	2
Swan	1	0	0	0	0	0	0	0	0	1
Swan/Goose	0	0	0	0	0	0	0	0	0	0
Canada Goose	2	1	0	0	2	0	0	0	0	5
Goose	0	0	3	0	2	0	0	1	0	6
Goose/Duck	0	1	3	1	1	0	0	0	0	6
Large Duck	23	4	0	4	36	0	1	5	0	73
Small Duck	7	1	0	0	0	0	0	2	0	10
Duck	3	0	1	0	0	0	0	0	0	4
Chicken	0	0	0	0	2	0	0	0	0	2
Prairie Chicken/Grouse	5	0	0	0	19	0	0	0	0	24
Pigeon/Dove	0	0	0	1	0	0	0	0	0	1
Gull	1	0	0	0	0	0	0	0	0	1
Loon	0	0	0	0	0	0	0	0	0	0
Hawk	0	0	0	0	0	0	3	0	0	3
Owl	0	0	0	0	0	0	0	0	0	0
Medium Bird	0	0	0	0	6	0	0	0	1	7
Small/Medium Bird	0	2	0	0	22	0	0	0	0	24
Small Bird	0	0	0	1	0	0	0	0	0	1
Bird	47	0	11	0	95	1	2	15	0	171

Table 6. Faunal data for 21K3 sub-operations.

Forks Fauna: 21K3	A	B	C	D	E	G	H	J	K
Lake Sturgeon	33	3	1	1	81	6	10	8	0
Lake Whitefish	0	0	0	0	0	0	0	0	0
Goldeye/Boneeye	2	1	2	0	3	3	1	4	0
Northern Pike	1	0	0	0	2	1	0	1	1
Sucker (Catostomus type)	1	0	2	0	0	1	3	0	0
Sucker (Moxostoma type)	0	1	0	0	0	0	0	3	0
Sucker	0	0	4	0	1	3	1	3	0
Channel Catfish	64	1	6	18	34	4	11	29	23
Catfish/Bullhead	0	0	2	1	1	0	2	0	0
Burbot	0	0	0	0	0	4	0	3	0
Walleye/Sauger	10	0	3	2	19	9	1	0	0
Freshwater Drum	22	7	4	2	6	0	23	16	0
Fish	1059	155	386	166	1660	531	1354	2153	46
Turtle	0	0	0	0	1	0	0	0	0
Frog/Toad	0	0	0	1	19	127	0	0	0
Three-Ridge	4	0	0	1	15	0	0	0	1
Fat Mucket	1	0	0	0	0	0	0	0	0
Pocket-Book	1	0	0	0	0	1	0	0	0
Fat Mucket/Pocket-Book	0	0	0	0	1	0	0	1	0
Black Sand-Shell	2	0	0	0	0	0	0	0	0
Maple-Leaf	1	0	0	0	0	0	0	0	0
White Heel-Splitter	1	0	0	0	0	0	0	0	0
Pink Heel-Splitter	2	2	2	0	2	1	2	2	0
Fingernail/Pes Ciama	1	0	1	0	0	4	0	0	0
Bivalve	39	4	3	1	137	10	23	6	2
Shell	0	0	0	0	9	27	4	26	0
Class Unknown	63	5	34	9	197	20	63	21	0
Total	2154	725	1436	357	3625	873	1763	3191	104

Table 6 (Continued). Faunal data for 21K3 sub-operations.

Forks Fauna: 21K3	L	M	N	P	Y	Total
Large Mammal	37	278	29	20	41	2491
Medium/Large Mammal	100	715	90	2	25	2502
Artiodactyl	0	1	0	0	0	0
Bison/Cow/Moose/Elk	1	1	0	0	0	13
Bison/Cow	1	2	0	0	5	37
Sheep/Goat/Pig	0	0	0	0	0	1
Moose/Elk/Deer	0	0	0	0	0	0
Moose/Elk	0	0	1	0	0	12
Deer	0	0	0	0	0	0
Bison	0	1	0	1	0	14
Moose	0	0	0	0	0	3
Elk	0	0	0	0	0	0
Horse	0	0	0	0	0	0
Cow	0	1	0	0	0	2
Sheep/Goat	0	1	0	0	0	7
Pig	0	0	0	0	0	7
Carnivore	0	0	0	0	0	1
Bear	0	0	0	0	0	1
Wolf	0	1	0	1	0	4
Wolf/Goat/Coyote/Fox	0	5	0	0	1	10
Lynx	0	0	0	0	0	1
Fisher	0	0	0	0	0	1
Otter	0	0	0	0	0	0
Beaver	3	3	0	0	0	21
Muskrat	0	26	0	0	0	107
Porcupine	0	0	0	0	0	0
Hare	11	0	1	0	0	72
Skunk	0	0	0	0	0	1
Medium Mammal	1	4	0	0	0	111
Small/Medium Mammal	0	42	3	0	0	137
Small Mammal	1	1	0	0	0	7
Small Rodent	0	0	0	0	0	0
Mammal	25	30	0	0	0	311
Large Bird	0	4	0	0	0	14
Medium/Large Bird	0	215	0	0	0	646
Whooping Crane	0	0	0	0	0	4
Sandhill Crane	0	0	0	0	0	0
Crane	0	1	0	0	0	2
Trumpeter Swan	0	3	0	0	0	5
Whistling Swan	0	0	0	0	0	2
Swan	0	1	0	0	0	2
Swan/Goose	0	0	0	0	0	0
Canada Goose	0	0	0	1	0	0
Goose	0	1	0	1	0	0
Goose/Duck	0	0	0	0	3	5
Large Duck	0	27	0	0	4	106
Small Duck	0	10	0	0	0	29
Duck	0	4	0	0	0	6
Chicken	0	0	0	0	0	2
Prairie Chicken/Grouse	0	6	0	0	0	31
Pigeon/Dove	0	5	0	0	0	0
Gull	0	1	0	0	0	2
Loon	0	0	0	0	0	0
Hawk	0	0	0	0	0	3
Owl	0	0	0	0	0	0
Medium Bird	0	7	0	0	0	14
Small/Medium Bird	4	1	0	0	0	29
Small Bird	0	1	0	0	0	2
Bird	1	196	0	0	0	366

Table 6 (Continued). Faunal data for 21K3 sub-operations.

Forks Faunal 21K3	L	M	N	P	Y	Total
Lake Sturgeon	1	38	0	0	0	156
Lake Whitefish	0	0	0	0	0	0
Goldeye/Honeyeye	1	0	0	0	6	25
Northern Pike	0	0	0	0	0	6
Sucker (Catostomus type)	1	1	0	0	0	11
Sucker (Moxostoma type)	1	0	0	0	0	3
Sucker	6	3	1	0	0	22
Channel Catfish	1	22	2	3	0	218
Catfish/Bullhead	0	3	0	0	0	9
Burbot	0	0	1	0	0	11
Walleye/Sauger	5	7	1	0	2	53
Freshwater Drum	1	11	0	2	0	94
Fish	2699	2842	544	14	4	13813
Turtle	0	0	0	0	0	1
Frog/Toad	62	0	0	0	0	216
Three-Ridge	0	0	0	0	0	21
Fat Mucket	0	2	0	0	0	3
Pocket-Book	1	2	0	0	0	5
Fat Mucket/Pocket-Book	0	0	0	0	0	2
Black Sand-Shell	0	0	0	0	0	2
Maple-Leaf	0	0	0	0	0	1
White Heel-Splitter	0	0	0	0	0	1
Pink Heel-Splitter	0	0	0	1	0	14
Fingernail/Pee Clams	0	0	0	0	0	6
Bivalve	22	58	7	1	0	385
Shell	1	2	0	0	0	71
Class Unknown	24	01	2	0	1	328
Total	3052	4695	652	47	07	22943

Table 6 (Continued). Faunal data for 21K3 sub-operations.

Forks Fauna: 21K4	A	B	C	D	E	F	G	H	J	K	L
Large Mammal	36	211	14	4	3	1	23	14	6	50	4
Medium/Large Mammal	28	187	3	0	30	11	26	4	26	53	6
Artiodactyl	0	8	0	0	1	0	16	0	0	0	0
Bison/Cow/Moose/Elk	0	6	0	0	0	2	1	0	0	2	0
Bison/Cow	12	2	1	0	0	0	1	1	0	1	0
Sheep/Goat/Pig	0	0	0	0	0	0	0	0	0	0	0
Moose/Elk/Deer	0	4	0	0	0	0	0	0	0	1	0
Moose/Elk	0	0	1	0	0	0	1	1	1	1	0
Deer	0	0	0	0	0	0	0	0	0	0	0
Bison	0	1	0	0	0	0	0	0	0	0	0
Moose	1	0	0	0	1	0	0	0	0	0	0
Elk	0	3	0	0	0	0	0	0	0	1	0
Horse	0	3	0	0	0	0	0	0	0	0	0
Cow	1	0	0	0	0	0	0	0	0	0	0
Sheep/Goat	2	0	0	0	0	0	0	1	0	0	0
Pig	0	0	0	0	0	0	0	0	0	0	0
Carnivore	0	0	0	0	0	0	0	0	0	0	0
Bear	0	0	0	0	0	0	0	1	0	0	0
Wolf	0	0	0	0	0	0	0	0	0	0	0
Wolf/Dog/Coyote/Fox	0	4	0	1	0	0	0	3	0	0	0
Lynx	0	0	0	0	0	0	0	0	0	0	0
Fisher	0	0	0	0	0	0	0	0	0	0	0
Otter	0	0	0	0	0	0	0	0	0	2	0
Beaver	0	5	1	1	3	0	4	1	0	0	0
Muskrat	0	0	0	0	0	0	0	0	1	0	0
Porcupine	0	1	0	0	0	0	0	0	0	0	0
Hare	0	12	0	0	1	0	0	0	0	4	0
Skunk	0	0	0	0	0	0	0	0	0	0	0
Medium Mammal	0	15	4	0	0	1	1	1	0	7	0
Small/Medium Mammal	0	45	0	0	1	1	0	0	0	0	1
Small Mammal	0	3	0	0	1	4	0	0	0	0	0
Small Rodent	0	3	2	0	0	0	1	1	1	1	0
Mammal	0	49	10	16	0	42	0	0	2	1	0
Large Bird	0	4	0	0	0	0	0	0	0	0	1
Medium/Large Bird	0	17	0	0	0	0	2	0	0	7	0
Whooping Crane	0	0	0	0	0	0	0	0	0	0	0
Sandhill Crane	0	0	0	0	0	0	0	0	0	0	0
Crane	0	0	0	0	0	0	0	0	0	0	0
Trumpeter Swan	0	0	0	0	0	0	0	0	0	0	0
Whistling Swan	0	0	0	0	0	0	0	0	0	0	0
Swan	0	0	0	0	0	0	0	0	0	0	0
Swan/Goose	0	0	0	0	0	0	0	0	0	0	0
Canada Goose	0	0	0	0	0	0	0	0	0	0	0
Goose	0	0	0	0	0	0	0	0	0	0	0
Goose/Duck	0	0	0	0	0	0	0	0	0	0	0
Large Duck	0	1	1	0	0	0	0	0	0	1	0
Small Duck	0	0	0	0	0	0	0	0	0	0	0
Duck	0	1	0	0	0	0	0	0	0	1	1
Chicken	0	0	0	0	0	0	0	0	0	0	0
Prairie Chicken/Grouse	0	0	0	0	0	0	0	0	0	0	0
Pigeon/Dove	0	0	0	0	1	0	0	0	0	0	0
Gull	0	0	0	0	0	0	0	0	0	0	0
Loon	0	0	0	0	0	0	0	0	0	1	0
Hawk	0	0	0	0	0	0	0	0	0	0	1
Owl	0	1	0	0	0	0	0	0	0	0	0
Medium Bird	0	2	0	0	0	0	0	0	2	1	0
Small/Medium Bird	0	0	0	0	0	0	0	0	0	0	0
Small Bird	1	0	0	0	1	0	0	0	0	0	1
Bird	0	12	0	0	4	0	0	0	0	0	0

Table 7. Faunal data for 21K4 sub-operations.

Forks Fauna: 21K4	A	B	C	D	E	F	G	H	J	K	L
Lake Sturgeon	0	19	1	2	1	0	0	0	9	14	0
Lake Whitefish	0	0	0	0	0	0	0	0	0	0	0
Goldeye/Mooneye	0	5	2	0	0	0	0	0	1	0	0
Northern Pike	0	0	0	0	1	0	0	0	0	1	0
Sucker (Catostomus type)	0	2	0	0	0	0	0	0	0	0	0
Sucker (Moxostoma type)	0	0	0	0	0	0	0	0	0	0	0
Sucker	0	2	0	0	0	0	0	0	1	2	0
Channel Catfish	0	15	7	3	13	1	0	0	6	5	6
Catfish/Bullhead	0	0	0	1	8	2	0	0	1	1	0
Burbot	0	0	0	0	0	0	0	0	0	0	0
Walleye/Sauger	0	0	0	1	3	0	0	0	0	2	0
Freshwater Drum	0	1	1	1	0	0	0	0	0	1	0
Fish	3	247	220	83	242	63	30	7	163	153	76
Turtle	0	6	0	0	0	0	6	0	0	0	0
Frog/Toad	1	0	0	0	0	0	0	0	0	0	0
Three-Ridge	0	0	0	0	0	0	0	0	0	0	0
Fat Mucket	0	0	0	0	0	0	0	0	0	0	0
Pocket-Book	0	1	0	0	0	0	0	0	0	0	0
Fat Mucket-Pocket-Book	0	0	0	0	0	0	0	0	0	1	0
Black Sand-Shell	0	0	0	0	2	0	0	0	0	0	0
Maple-Leaf	0	0	0	0	0	0	0	0	0	0	0
White Heel-Splitter	0	0	0	1	0	0	0	0	0	0	0
Pink Keel-Splitter	0	1	0	0	0	0	2	0	1	0	1
Fingernail/Pee Clams	2	3	0	1	0	4	4	0	15	0	0
Bivalve	1	10	2	0	4	1	3	0	6	7	2
Snail	0	2	4	0	0	1	0	0	0	0	0
Class Unknown	0	114	66	87	60	40	6	4	40	23	0
Total	87	1053	355	205	420	203	136	99	267	393	109

Table 7 (Continued). Faunal data for 21K4 sub-operations.



Ferks Fauna: 21K4	M	N	P	Q	R	S	T	U	V	W	Y	Total
Large Mammal	26	18	1	38	24	15	4	48	10	7	33	591
Medium/Large Mammal	44	36	2	111	59	29	25	61	47	22	22	606
Artiodactyl	0	0	0	0	0	0	1	0	1	0	1	29
Bison/Cow/Moose/Elk	0	4	0	0	0	0	0	0	0	0	0	15
Bison/Cow	0	0	0	0	0	0	0	0	0	0	0	18
Sheep/Goat/Pig	0	0	0	0	0	0	0	0	0	0	0	0
Moose/Elk/Deer	0	0	0	0	0	0	0	0	0	2	0	7
Moose/Elk	0	0	0	0	1	3	0	0	0	0	0	20
Deer	0	0	0	0	0	0	0	0	0	0	0	0
Bison	0	0	0	0	0	0	1	0	0	1	1	4
Moose	0	0	0	1	0	0	0	0	0	0	0	3
Elk	0	0	0	0	0	0	0	0	0	0	0	4
Horse	0	0	0	0	2	1	0	0	0	0	0	2
Cow	0	0	0	0	0	0	0	0	0	0	0	10
Sheep/Goat	0	0	0	0	0	0	0	0	1	0	1	6
Pig	1	0	0	0	0	0	0	5	0	0	1	7
Carnivore	0	0	0	0	0	0	0	0	0	0	0	0
Bear	0	0	0	0	0	0	0	0	0	0	0	1
Wolf	0	0	0	0	0	0	0	0	0	0	0	0
Wolf/Dog/Coyote/Fox	0	0	0	0	2	3	0	0	0	0	0	13
Lynx	0	0	0	3	0	1	0	1	0	0	0	5
Fisher	0	0	0	1	0	0	0	0	0	0	0	7
Otter	0	0	0	0	0	0	0	0	0	0	0	2
Beaver	2	0	1	2	0	0	2	3	0	1	0	26
Nutcrat	0	0	0	0	0	0	0	0	0	0	0	1
Porcupine	0	0	0	0	0	0	0	0	0	0	0	1
Mink	0	1	0	0	0	0	0	0	0	0	0	18
Skunk	0	0	0	0	0	0	0	0	0	0	0	0
Medium Mammal	2	3	0	3	5	2	4	7	2	0	3	67
Small/Medium Mammal	0	0	0	0	0	0	3	3	0	0	1	61
Small Mammal	0	0	0	0	1	0	5	0	1	0	3	16
Small Rodent	0	0	0	0	0	0	3	0	0	0	0	12
Mammal	0	0	11	43	26	0	10	1	0	1	2	233
Large Bird	1	0	1	0	0	0	0	0	0	1	0	0
Medium/Large Bird	3	3	0	0	0	1	0	0	0	0	0	47
Whooping Crane	0	0	0	0	0	0	0	0	0	0	0	0
Sandhill Crane	0	0	0	0	0	0	0	0	0	0	0	0
Crane	0	0	0	0	0	0	0	0	0	0	0	0
Trumpeter Swan	0	0	0	0	0	0	0	0	0	0	0	0
Whistling Swan	0	0	0	0	0	0	0	0	0	0	0	0
Swan	0	0	0	0	0	0	0	0	0	0	0	0
Swan/Goose	0	0	0	0	0	0	0	0	0	1	0	1
Canada Goose	0	0	0	0	0	0	0	0	0	0	0	0
Goose	0	0	0	0	0	0	0	0	0	0	0	0
Goose/Duck	0	0	0	0	0	0	0	0	0	0	0	0
Large Duck	0	0	0	0	0	0	0	2	2	1	1	7
Small Duck	0	0	0	0	0	0	0	2	0	3	0	0
Duck	1	0	0	0	0	0	0	0	0	0	0	4
Chicken	0	0	0	0	0	0	0	0	0	0	0	0
Prairie Chicken/Grouse	0	0	0	0	0	0	0	0	0	0	1	1
Pigeon/Dove	0	0	0	0	0	0	0	0	0	0	0	1
Gull	0	0	0	0	0	0	0	0	0	0	0	0
Loon	0	0	0	0	0	0	0	0	0	0	0	1
Hawk	0	0	0	0	0	0	0	0	0	0	0	1
Owl	0	0	0	0	0	0	0	0	0	0	0	1
Medium Bird	0	0	0	0	0	0	0	0	0	0	0	5
Small/Medium Bird	0	0	0	0	0	0	0	0	0	0	0	0
Small Bird	0	0	0	0	0	0	0	0	0	0	0	3
Bird	0	0	7	3	4	0	0	1	0	0	1	44

Table 7 (Continued). Faunal data for 21K4 sub-operations.

Forka Faunal 21K4	M	H	P	O	R	S	T	U	V	W	Y	Total
Lake Sturgeon	0	1	0	5	3	0	0	0	0	0	0	55
Lake Whitefish	0	0	0	0	0	0	0	0	1	0	0	1
Goldeye/Mooneye	0	0	0	0	0	0	0	1	0	0	0	2
Northern Pike	0	0	0	0	0	0	0	0	0	0	0	2
Sucker (Catostomus type)	0	0	0	0	0	0	0	0	0	0	0	2
Sucker (Moxostoma type)	0	0	0	2	1	0	0	0	0	0	0	3
Sucker	0	0	2	3	0	0	0	0	0	0	0	10
Channel Catfish	0	4	2	13	10	4	3	4	2	1	2	109
Catfish/Bullhead	0	0	0	1	2	0	1	1	1	1	0	26
Burbot	0	0	0	0	0	0	0	0	0	0	0	0
Walleye/Sauger	0	0	0	0	1	0	0	0	0	0	0	16
Freshwater Drum	0	0	0	0	1	0	1	0	0	0	0	6
Fish	74	22	24	144	124	15	60	16	4	1	6	1217
Turtle	0	0	0	0	0	0	0	0	0	0	0	0
Frog/Toad	0	0	0	0	0	0	0	0	0	0	0	1
Three-Ridge	0	0	0	0	0	0	0	0	0	0	0	0
Fat Mucket	0	0	0	0	0	0	0	0	0	0	0	0
Pocket-Book	0	0	0	0	0	0	0	1	0	0	0	2
Fat Mucket/Pocket-Book	0	2	0	0	0	0	0	0	0	0	0	1
Black Sand-Shell	0	0	0	0	0	0	0	0	0	0	0	2
Maple-Leaf	0	0	0	0	0	0	0	0	0	0	0	0
White Heel-Splitter	0	0	0	0	0	2	0	0	0	0	0	1
Pink Heel-Splitter	0	0	0	0	0	0	0	0	0	0	0	5
Fingernail/Paw Clams	0	0	0	0	1	0	0	0	0	0	0	30
Bivalve	3	1	0	5	3	0	3	12	0	0	0	75
Shell	0	0	1	0	0	0	0	0	0	0	0	8
Class Unknown	7	3	55	26	34	1	20	6	10	2	13	625
Total	172	98	105	422	350	75	144	176	80	42	180	5065

Table 7 (Continued). Faunal data for 21K4 sub-operations.

Forks Faunal 21K5	A	Total
Large Mammal	2	2
Medium/Large Mammal	0	0
Artiodactyl	0	0
Bison/Cow/Moose/Elk	0	0
Bison/Cow	0	0
Sheep/Goat/Pig	0	0
Moose/Elk/Deer	0	0
Moose/Elk	0	0
Deer	0	0
Bison	0	0
Moose	0	0
Elk	0	0
Horse	0	0
Cow	0	0
Sheep/Goat	0	0
Pig	0	0
Carnivore	0	0
Bear	0	0
Wolf	0	0
Wolf/Dog/Coyote/Fox	0	0
Lynx	0	0
Fisher	0	0
Otter	0	0
Beaver	0	0
Muskrat	0	0
Porcupine	0	0
Hare	0	0
Skunk	0	0
Medium Mammal	0	0
Small/Medium Mammal	0	0
Small Mammal	0	0
Small Rodent	0	0
Mammal	0	0
Large Bird	0	0
Medium/Large Bird	0	0
Whooping Crane	0	0
Sandhill Crane	0	0
Crane	0	0
Trumpeter Swan	0	0
Whistling Swan	0	0
Swan	0	0
Swan/Goose	0	0
Canada Goose	0	0
Goose	0	0
Goose/Duck	0	0
Large Duck	0	0
Small Duck	0	0
Duck	0	0
Chicken	0	0
Prairie Chicken/Grouse	0	0
Pigeon/Dove	0	0
Gull	0	0
Loon	0	0
Hawk	0	0
Owl	0	0
Medium Bird	0	0
Small/Medium Bird	0	0
Small Bird	0	0
Bird	0	0

Table 8. Faunal data for 21K5 sub-operations.

Forks Fauna: 21K5	A	Total
Lake Sturgeon	0	0
Lake Whitefish	0	0
Goldeye/Mooneye	0	0
Northern Pike	0	0
Sucker (Catastomus type)	0	0
Sucker (Moxostoma type)	0	0
Sucker	0	0
Channel Catfish	9	9
Catfish/Bullhead	0	0
Burbot	0	0
Walleye/Sauger	0	0
Freshwater Drum	0	0
Fish	33	33
Turtle	0	0
Frog/Toad	0	0
Three-Ridge	0	0
Fat Mucket	0	0
Pocket-Book	0	0
Fat Mucket/Pocket-Book	0	0
Black Sand-Shell	0	0
Maple-Leaf	0	0
White Heel-Splitter	0	0
Pink Heel-Splitter	0	0
Fingernail/Pea Clang	0	0
Bivalve	0	0
Snail	0	0
Class Unknown	0	0
Total	44	44

Table 8 (Continued). Faunal data for 21K5 sub-operations.

Forks Fauna 21K6	A	C	D	E	F	G	H	J	K
Large Mammal	15	25	1	10	10	2	2	1	4
Medium/Large Mammal	7	13	11	25	20	5	12	1	0
Artiodactyl	1	1	0	0	0	1	0	1	0
Bison/Cow/Moose/Elk	0	1	0	0	1	0	0	0	0
Bison/Cow	0	2	0	1	1	0	0	0	0
Sheep/Goat/Pig	0	0	0	0	0	0	0	0	0
Moose/Elk/Deer	0	0	0	0	0	0	0	0	0
Moose/Elk	0	0	0	2	0	0	1	0	0
Deer	0	0	0	0	0	0	0	0	0
Bison	0	1	0	2	0	0	0	0	0
Moose	0	0	0	0	0	0	0	0	0
Elk	0	0	0	0	0	0	0	1	0
Horse	0	0	0	0	0	0	0	0	0
Cow	0	0	0	0	0	0	0	0	0
Sheep/Goat	0	0	0	0	0	0	0	0	0
Pig	1	0	0	0	0	0	0	0	0
Carnivore	0	0	0	0	0	0	0	0	0
Bear	0	1	0	0	0	0	0	0	0
Wolf	0	0	0	0	0	0	0	0	0
Wolf/Dog/Coyote/Fox	0	0	0	0	0	0	0	0	0
Lynx	0	0	0	0	0	0	0	0	0
Fisher	0	0	0	1	0	0	0	0	0
Otter	0	0	0	0	0	0	0	0	0
Beaver	0	0	0	3	15	0	0	0	0
Muskrat	0	0	0	0	0	0	0	0	0
Porcupine	0	0	0	0	0	0	0	0	0
Mink	0	0	0	0	0	0	0	0	1
Skunk	0	0	0	0	0	0	0	0	0
Medium Mammal	3	7	0	1	21	15	3	0	12
Small/Medium Mammal	0	0	0	0	0	0	13	0	0
Small Mammal	5	5	0	0	0	0	0	0	0
Small Rodent	1	0	0	0	0	0	0	0	0
Mammal	0	0	0	10	0	0	0	0	0
Large Bird	0	1	0	0	0	1	1	0	0
Medium/Large Bird	0	0	0	1	0	0	0	0	0
Whooping Crane	0	0	0	0	0	0	0	0	0
Sandhill Crane	0	0	0	0	0	0	0	0	0
Crane	0	0	0	0	0	0	0	0	0
Trumpeter Swan	0	0	0	0	0	0	0	0	0
Whistling Swan	0	0	0	0	0	0	0	0	0
Swan	0	0	0	0	0	0	1	0	0
Swan/Goose	0	0	0	0	0	0	0	0	0
Canada Goose	0	0	0	0	0	0	0	0	0
Goose	0	0	0	0	0	0	0	0	0
Goose/Duck	0	0	0	0	0	0	0	0	0
Large Duck	0	1	0	0	0	0	0	0	0
Small Duck	0	0	0	0	0	0	0	0	0
Duck	0	0	0	0	0	0	0	0	0
Chicken	0	0	0	0	0	0	0	0	0
Prairie Chicken/Grouse	0	1	0	0	0	0	0	0	0
Pigeon/Dove	0	0	0	0	0	0	0	0	0
Gull	0	0	0	0	0	0	0	0	0
Loon	0	0	0	0	0	0	0	0	0
Hawk	0	0	0	0	0	0	0	0	0
Owl	0	0	0	0	0	0	0	0	0
Medium Bird	0	0	0	0	0	0	0	0	0
Small/Medium Bird	0	0	0	0	0	0	0	0	0
Small Bird	0	0	0	0	0	0	0	0	0
Bird	0	2	0	0	0	0	5	0	0

Table 9. Faunal data for 21K6 sub-operations.

Forks Faunal 21K6	A	C	D	E	F	G	H	J	K
Lake Sturgeon	0	0	0	0	0	1	0	0	0
Lake Whitefish	0	0	0	0	0	0	0	0	0
Goldeye/Mooneye	0	0	0	0	0	0	0	0	0
Northern Pike	0	0	0	0	0	0	0	0	0
Sucker (Catostomus type)	0	1	0	0	0	0	0	0	0
Sucker (Moxostoma type)	0	0	0	0	0	0	0	0	0
Sucker	0	0	0	0	0	0	0	0	0
Channel Catfish	5	9	1	2	0	3	0	0	0
Catfish/Bullhead	0	0	0	0	0	0	0	0	0
Burbot	0	0	0	0	0	0	0	0	0
Walleye/Sauger	0	0	0	1	2	0	0	0	0
Freshwater Drum	0	0	0	0	0	0	0	0	0
Fish	6	14	7	35	15	6	0	0	0
Turtle	0	0	0	0	0	0	0	0	0
Frog/Toad	1	250	1	0	0	0	0	0	0
Three-Ridge	0	0	0	0	0	0	0	0	0
Fat Mucket	0	0	0	0	0	0	0	0	0
Pocket-Book	0	0	0	0	0	0	0	0	0
Fat Mucket/Pocket-Book	0	1	0	0	0	0	0	0	0
Black Sand-Shell	0	0	0	0	0	0	0	0	0
Maple-Leaf	0	0	0	0	0	0	0	0	0
White-Heel-Splitter	0	0	0	0	0	0	0	0	0
Pink-Heel-Splitter	0	0	0	0	0	0	0	0	0
Fingernail/Pea Clams	0	0	0	0	0	0	0	0	0
Bivalve	0	3	1	11	2	0	0	0	0
Snail	0	0	0	0	0	0	0	0	0
Class Unknown	7	21	0	3	3	1	0	1	0
Total	42	369	25	123	86	27	36	2	34

Table 9 (Continued). Faunal data for 21K6 sub-operations.

Forks Faunal 21K6	L	M	N	P	Q	R	S	Y	Total
Large Mammal	36	4	49	9	16	1	2	0	167
Medium/Large Mammal	73	13	56	0	33	0	0	0	297
Artiodactyl	1	0	0	0	0	1	0	0	6
Bison/Cow/Moose/Elk	0	0	1	0	0	1	0	0	4
Bison/Cow	0	0	0	1	0	0	0	0	5
Sheep/Goat/Pig	0	0	0	0	0	0	0	0	0
Moose/Elk/Deer	0	0	2	0	0	0	0	0	2
Moose/Elk	0	0	0	0	0	0	0	0	0
Deer	0	0	0	0	0	0	0	0	0
Bison	0	0	0	0	0	0	0	0	3
Moose	0	0	1	0	0	0	0	0	1
Elk	1	0	0	0	0	0	0	0	2
Horse	0	0	0	0	0	0	0	0	0
Cow	0	0	0	0	0	0	0	0	0
Sheep/Goat	0	0	0	0	0	0	0	1	4
Pig	0	0	1	0	0	0	0	0	2
Carnivore	1	0	0	0	0	0	0	0	1
Bear	0	0	0	0	0	0	0	0	1
Wolf	0	0	0	0	0	0	0	0	0
Wolf/Dog/Coyote/Fox	0	0	2	0	0	0	0	0	2
Lynx	0	0	0	0	0	0	0	0	0
Fisher	0	0	0	0	0	0	0	0	1
Otter	0	0	0	0	0	0	0	0	0
Beaver	1	0	4	0	0	0	0	0	23
Muskrat	0	0	0	0	0	1	0	0	1
Percupina	0	0	0	0	0	0	0	0	0
Hare	0	0	2	0	0	0	0	0	0
Skunk	0	0	0	0	0	0	0	0	0
Medium Mammal	14	0	7	0	16	0	0	0	94
Small/Medium Mammal	2	0	0	0	4	0	0	0	21
Small Mammal	0	0	0	0	0	0	0	0	10
Small Rodent	0	0	3	0	0	0	0	0	4
Mammal	0	0	1	0	1	0	0	0	12
Large Bird	0	0	2	0	0	0	0	0	3
Medium/Large Bird	0	0	0	0	0	0	0	0	4
Whooping Crane	0	0	0	0	0	0	0	0	0
Sandhill Crane	0	0	0	0	0	0	0	0	0
Crane	0	0	0	0	0	0	0	0	0
Trumpeter Swan	0	0	0	0	0	0	0	0	0
Whistling Swan	0	0	0	0	0	0	0	0	0
Swan	0	0	0	0	0	0	0	0	1
Swan/Goose	0	0	0	0	0	0	0	0	0
Canada Goose	0	0	1	0	0	0	0	0	1
Goose	0	0	0	0	0	0	0	0	0
Goose/Duck	0	0	0	0	0	0	0	0	0
Large Duck	0	0	1	0	0	0	1	0	3
Small Duck	0	0	0	0	0	0	0	0	3
Duck	1	0	0	0	0	0	0	0	6
Chicken	0	0	0	0	0	0	0	0	0
Prairie Chicken/Grouse	0	0	0	0	0	0	0	0	1
Pigeon/Dove	0	0	0	0	0	0	0	0	0
Gull	0	0	0	0	0	0	0	0	0
Loon	0	0	0	0	0	0	0	0	0
Hawk	0	0	0	0	0	0	0	0	0
Owl	0	0	0	0	0	0	0	0	0
Medium Bird	0	0	0	0	0	0	0	0	0
Small/Medium Bird	0	0	0	0	0	0	0	0	0
Small Bird	0	0	0	0	0	0	0	0	0
Bird	0	0	0	0	0	0	0	0	19

Table 9 (Continued). Faunal data for 21K6 sub-operations.

Fork's Fauna: 21K5	L	M	N	P	Q	R	S	Y	Total
Lake Sturgeon	0	0	1	0	0	0	0	0	2
Lake Whitefish	0	0	0	0	0	0	0	0	0
Goldeye/Noonys	0	0	0	0	0	0	0	0	0
Northern Pike	0	0	0	0	0	0	0	0	0
Sucker (Catostomus type)	0	0	0	0	0	0	0	0	1
Sucker (Moxostoma type)	0	0	0	0	0	0	0	0	0
Sucker	0	0	0	0	0	0	0	0	0
Channel Catfish	2	0	0	0	0	1	0	0	23
Catfish/Bullhead	0	0	0	0	0	0	0	0	6
Burbot	0	0	0	0	0	0	0	0	0
Walleye/Sauger	0	0	0	0	0	0	0	0	12
Freshwater Drum	0	0	0	0	0	0	0	0	0
Fish	0	4	58	0	7	15	2	0	173
Turtle	0	0	0	0	0	0	0	0	0
Frog/Toad	0	0	0	0	0	51	0	0	243
Three-Ridge	0	0	0	0	0	0	0	0	0
Fat Mucket	0	0	0	0	0	0	0	0	0
Pocket-Book	0	0	0	0	0	0	0	0	0
Fat Mucket/Pocket-Book	0	0	0	0	0	0	0	0	1
Black Sand-Shell	0	0	0	0	0	0	0	0	0
Maple-Leaf	0	0	0	0	0	0	0	0	0
White Heal-Splitter	0	0	0	0	0	0	0	0	0
Pink Heal-Splitter	0	0	0	0	0	0	0	0	0
Fingernail/Pea Clams	0	0	0	0	0	0	0	0	0
Bivalve	11	0	0	0	1	0	0	0	23
Snail	0	0	0	0	0	0	0	0	0
Class Unknown	3	1	23	0	3	0	0	0	76
Total	155	22	245	10	81	111	3	1	1915

Table 9 (Continued). Faunal data for 21K6 sub-operations.



	FORT GIBRALTER II		FORT GIBRALTER I		Sum	OVERALL 21K1-6
	21K1	21K2	21K3	21K4,6		
Horse	0	0	0	1	0	1
Bison	0	0	2 R/L scapula	1	0	2 R/L scapula
Cou	0	1	1	1	0	2
Moose	0	0	1	1	0	2
Elk	0	0	1	1	0	2
Pig	0	0	1	1	0	2
Sheep/Goat	0	0	1	1	0	2 L radius
Bear	0	0	1	1	0	2
Wolf	0	0	1	0	0	1
Wolf/Dog/Coyote/Fox	0	0	1	1	0	2 R humerus
Lynx	0	0	1	1	0	2
Fisher	0	0	1	1	0	2
Otter	0	0	0	1	0	1
Skunk	0	0	1	0	0	1
Porcupine	0	0	0	1	0	1
Beaver	0	0	1	2 L femur	0	3 L femur
Muskrat	0	0	10 L tibia	1	0	11 L tibia
Hare	0	0	4 R tibia	2 L tibia	0	6 R tibia

Table 10. Minimum number of individuals: mammal.

	FORT GIBRALTER 11		FORT GIBRALTER 1		Sum	OVERALL 21K1-5
	21K1	21K2	21K3	21K4,5		
Whooping Crane	0	0	1	0	0	1
Trumpeter Swan	0	0	1	0	0	1
Whistling Swan	0	0	1	0	0	1
Canada Goose	0	0	1	1	0	2
Large Duck	0	0	6 R humerus	2 R humerus	0	8 R humerus
Small Duck	0	0	3 L humerus	1	0	4 L humerus
Prairie Chicken/Grouse	0	0	6 R tarsomet.	1	0	7 R tarsomet.
Pigeon	0	0	1	1	0	2
Gull/Bird/Shearwater	0	0	3 L tarsomet.	0	0	3 L tarsomet.
Hawk c.f. Red-tailed	0	0	1	1	0	2
Owl c.f. Snowy	0	0	0	1	0	1
Common Loon	0	0	0	1	0	1
Domestic Chicken	0	0	1	0	0	1

Table 11. Minimum number of individuals: bird.

	FORT GIBRALTER II		FORT GIBRALTER I		Sum	OVERALL ZIK1-6	
	ZIK1	ZIK2	ZIK3	ZIK4,5			ZIK5
Lake Sturgeon	0	0	1	1	0	2	1
Lake Whitefish	0	0	0	1	0	1	1
Goideya/Noheya	0	0	3 R opercle	4 R opercle	0	7	7 R opercle
Northern Pike	0	0	4 R dentary	1	0	5	4 R dentary
Sucker (cata)	0	0	1 R opercle	2 R opercle	0	3	3 R opercle
Sucker (moxo)	0	0	3 R maxilla	1	0	4	3 R maxilla
Channel Catfish	1 R cleithrum	0	11 L dentary	6 L dentary	1	21	19 L dentary
Gurbot	0	0	3 otolith		0	3	3 otolith
Walleye/Sawser	0	0	3 R dentary	2 L dentary	0	5	4 R dentary
Freshwater Drum	0	0	14 otolith	1	0	15	15 otolith

Table 12. Minimum number of individuals: fish.

	2IK1	2IK2	FORT GIBRALTER II 2IK3	FORT GIBRALTER I 2IK4,6	2IK5	Sum	OVERALL 2IK1-6
Three-Ridge	0	0	11 R Value	0	0	11	11 R Value
Maple-Leaf	0	0	1	0	0	1	1
Fat Nocket	0	0	2 L Value	0	0	2	2 R Value
Pocket-Back	0	0	3 L Value	2 R Value	0	5	5 R/L Value
Black Sand-Shell	0	0	2 R Value	0	0	2	2 R Value
White Heel-Splitter	0	0	1	1	0	2	2 L Value
Pink Heel-Splitter	0	0	6 L Value	4 R Value	0	10	10 R Value

Table 13. Minimum number of individuals: bivalve.

		Chewed/ Burned		Graded	Cut	Chopped	Sawn	Eroded	Artifact	Used Flake	Domestic Species	Bould (Domestic?)
21K1												
A												*
21K2												
A				1								*
21K3												
A	145	18	33		1	3		2		17		*
B	433	12	6					4				*
C	358	9	27		5	2		2				*
O	6	5	6		2			2		1		*
E	163	18	5		10			1			3	*
G	27	1			1							*
M	181	4	14		1	1		3				*
J	378	33	25					4				*
K	1	13						1				*
L	114	2	1									*
H	68	32	12		3					1		*
N	45	6	1		1			1		2	1	*
P	12	6	1									*
Y	8	18	12									*
	-----	-----	-----		---	---	---	---	---	---	---	*
	1873	178	145		24	6		28		4	6	
21K5												
A												*

Table 14. Frequency of modifications, butchering marks, and artifacts, and presence of domestic species: 21K1, 21K2, 21K3 and 21K5.

	Burned	Gnawed	Chipped/ Cut	Chopped	Sawn	Eroded	Artifact	Flake	Species	Used Domestic	Bovid	(Domestic?)
21K4												
A	3	15	5	1	22	3	1	1	*	*		
B	73	19	22	4	3	9	1	2	*	*		
C	13		1					1	*	*		
D	11		1									
E	10	1	1					1				
F	3							1				
G	10	5	1	1								
H	1	2		1					*	*		
J	22	3			1							
K	70	42	4	1	6	9	1		*	*		
L	7	7				3			*	*		
M	16			4	4				*	*		
N									*	*		
P	4	1							*	*		
Q	62	12										
R	35	4	1	1		1			*	*		
S	25								*	*		
T	6		1						*	*		
U	112					1			*	*		
V	38	1			2			1	*	*		
W	12		2					1	*	*		
X	13		2					4	*	*		
Y	5					2			*	*		
---	557	112	40	13	33	32	3	6				
21K6												
A	8								*	*		
C	41		1		2	17			*	*		
D	9								*	*		
E	17	3				2			*	*		
F	25	1				2		1	*	*		
G	13		1			3			*	*		
H	4					1						
J	4		1		1							
K	27											
L	120		1			1						
M	3		1									
N	31		1			9			*	*		
P									*	*		
Q	60								*	*		
R												
S						1			*	*		
Y												
---	351	4	6	0	3	36	0	1				

Table 15. Frequency of modifications, butchering marks, and artifacts, and presence of domestic species: 21K4 and 21K6.