

NEZ PERCE NATIONAL HISTORICAL PARK ARCHAEOLOGICAL EXCAVATIONS, 1979-1980

Part I

Burial Recovery and Monitoring

by

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with

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Part II

Water Line Trench Emergency Excavations

by

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Part I

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EMERGENCY TESTING AND BURIAL RECOVERY, NEZ PERCE NATIONAL HISTORIC PARK,
SPALDING, IDAHO

by

Karl Gurcke

Introduction

On Monday, 10 September 1979, the National Park Service held ground breaking ceremonies for the new visitor center to be built at the Nez Perce National Historic Park headquarters, Spalding, Idaho. By Tuesday the eleventh, construction crews had bulldozed their way through part of a Native American cemetery spreading human bone, grave goods, and coffin parts over a large mound of earth. On Thursday, 13 September 1979, Roderick Sprague, Director, Laboratory of Anthropology, University of Idaho, and Karl Gurcke, a graduate student from the Department of Sociology/Anthropology, visited the site of the Nez Perce cemetery to assess the damage.

The disturbance consisted of an east-west cut through the northern portion of a small hill upon which the cemetery rested. To the south of the cut was a large mound of top soil that had been piled up during construction. To the north was a deep cut bank that dropped off sharply to a newly made road below (Fig. 1). The larger fragments of human bones found on the back dirt pile and in the cut were collected and concentrations - probable burials - were noted. Next the loose soil on the cut was carefully graded off by machine in an effort to locate additional graves that were in danger. This grading succeeded in uncovering the outlines of five more graves, one of which was located less than 2 m from the cut face.

On the next day a small crew of graduate students from the University under the direction of Sprague arrived to remove the five graves that had been located the previous day (Fig. 2). Burials 2-5 were removed but after conference between representatives of the Nez Perce Tribe, the National Park Service, and the University of Idaho, the decision was made to:

- 1) temporarily shut down construction over the entire site;
- 2) cover Burial 1 without removal;
- 3) alter the design of the road so as to avoid the cemetery;
- 4) mechanically sift through the back dirt pile for human bone;
- 5) return the disturbed area to its original state;
- 6) reinter the human bone to their original position as soon as possible; and
- 7) conduct a testing program on the flat to the west of the cemetery to search for cultural material or burials that would effect the construction of the visitor center.

*a**b*

Fig. 1. The Nez Perce hilltop cemetery as it appeared on 13 September 1979. *a*, view toward the east; *b*, view toward the west.



a



b



c

Fig. 2. Intact burials as exposed by grader and excavation. a, Burial 1 grave outline; b, Burial 2 coffin wood and skull; c, Burial 5 completely exposed. Arrow indicates north.

The crew for the removal of burials 2-5 consisted of four anthropology students: Karl Gurcke, John Moore, Darby Stapp, and Richard Waldbauer.

On Saturday, 15 September, Burial 1 was covered. By 19 September 1979, an archaeological crew had been assembled to begin a testing program in the area of the visitor center. The crew, all tribal members, consisted of Elmer Paul (foreman), Luther Bringing-Good, Guy Broncheau, Bernadine G. Ellenwood, Dave Harrison, Harry E. Jabeth, Alvin Kane, Gabriel McAtty, Benjamin Paul, Alvin Penny, Leonard Peone, Steve Reuben, and Mary Jean Strond. Additional assistance on the back dirt pile was provided by Park Service maintenance supervisor, Milo Anderson and his staff, Tony Henry, Maynard Holt, Fred Jose, and Harold White. Also helping from time to time was Mary Anne Davis and John Myles, both anthropology graduate students from the University. All the crew deserve a special thank you for not only working in bad weather but also enduring the frustration, anger, and feeling of loss inherent in this project. Field direction was by the author with assistance from Keo Boreson and later, Priscilla Wegars. We wish to thank several National Park Service officials: Cathy Blee, Staff Archaeologist, Denver Service Center; Oz Ulrich, project supervisor of construction; Charles F. Bohannon, Archaeologist, Pacific Northwest Region; and finally Robert Morris, Superintendent, Nez Perce National Historical Park, and his staff for their help. Site photographs were by the author while artifact photographs (Chapter by Bies) were taken by Christine McGlinchy. June Berry and Claire Worth handled the finances while typing was ably performed by Mary Condon, Cathy Lubben, and Kris Parker. Maps were drawn by David Petersen.

The original plan for the testing program was to excavate 46, 2x2 m units down to 100 cm in the area subject to construction. Ten of these units were to be located in the visitor center while the remainder were to be located at random on the flat. This constituted a 1% sample of the area under construction. For the first two weeks this plan was followed. A metric grid was set up orientated toward magnetic north and 10 2x2 m units were placed within the visitor center proper, and 2 other 2 x 2 m units were begun just outside and to the east of the visitor center. Because of the approaching winter weather, it was soon deemed impractical to continue with the original plan. Also, and more importantly, the excavations in the visitor center were yielding very few artifacts, so that after consultation between Bohannon, Blee, and Sprague, it was agreed to move to an intensive augering program. At a meeting attended by representatives of the Nez Perce Tribal Executive Committee, the National Park Service, and the University of Idaho on 20 October 1979, it was also decided that the back dirt from the disturbed cemetery would be hand screened through $\frac{1}{4}$ in. mesh, rather than mechanically sifted.

The Operations

The excavation in the visitor center, Op 1, lasted from 19 September to 2 October 1979. In total, 12 2 m lots were excavated and included in this operation and one lot was designated as a general surface collection unit. As noted before, ten of the lots were excavated in the area where the

TABLE 1

Artifact counts by operations excluding Ops 3 and 4¹

Operations	1	2	2 (1 x 1 m)	5	6	7	Total
Artifacts							
Flakes	299	36	312	4	3	2	656
Tools	9	-	8	1	-	-	18
Historic	-	2	1	5	4	1	13

¹Complete artifacts counts and their distribution by operation, lots and levels are available at the Laboratory of Anthropology, University of Idaho.

basement and waterholding tank of the visitor center were to be constructed. The other two lots were outside and to the east of the center. All dirt from these units was dry screened through 1/8 in. mesh. All units were dug in 20 cm levels and most reached a depth of 100 cm below surface. It should be noted here that the surface, in most cases, had already been disturbed because of construction activity and some earth had been removed. Never the less, depth measurements were taken from the ground surface as it existed then. Also, lots 1 and 4 were dug to only 80 cm and then augered in four corners to 100 cm because of the scarcity of artifacts and the hardness of the ground. Lot 12 was dug to 60 cm and Lot 13 was dug to 20 cm and then both augered to 100 cm in four corners because of the change in plans. Artifacts recovered are shown in Table 1 and a general map concerning the placement of the various operations can be seen in Fig. 3.

After the visitor center area had been tested and the units filled in, the second phase of the testing program, a search for graves, was begun. With the help of a small Park Service grader, the earth was carefully scraped off to just below the plow zone, approximately 30 cm deep, in an attempt to locate any unusual soil changes that might indicate a grave. The results proved negative and permission was given to continue excavation of the basement for the visitor center providing an archaeological monitor was present during any earth moving.

Op 2 consisted of 65 auger holes in the area east of the visitor center. This phase lasted from 2 to 8 October 1979. As in the case with all remaining augering operations, an ordinary post hole digger was used and the holes were dug to a depth of 100 cm except in the few places where it was impossible to proceed because of obstructions encountered, mostly large rocks. The auger holes, generally 20 cm wide, were excavated in approximate 20 cm levels and the dirt sifted through a 1/8 in. mesh screen. The same

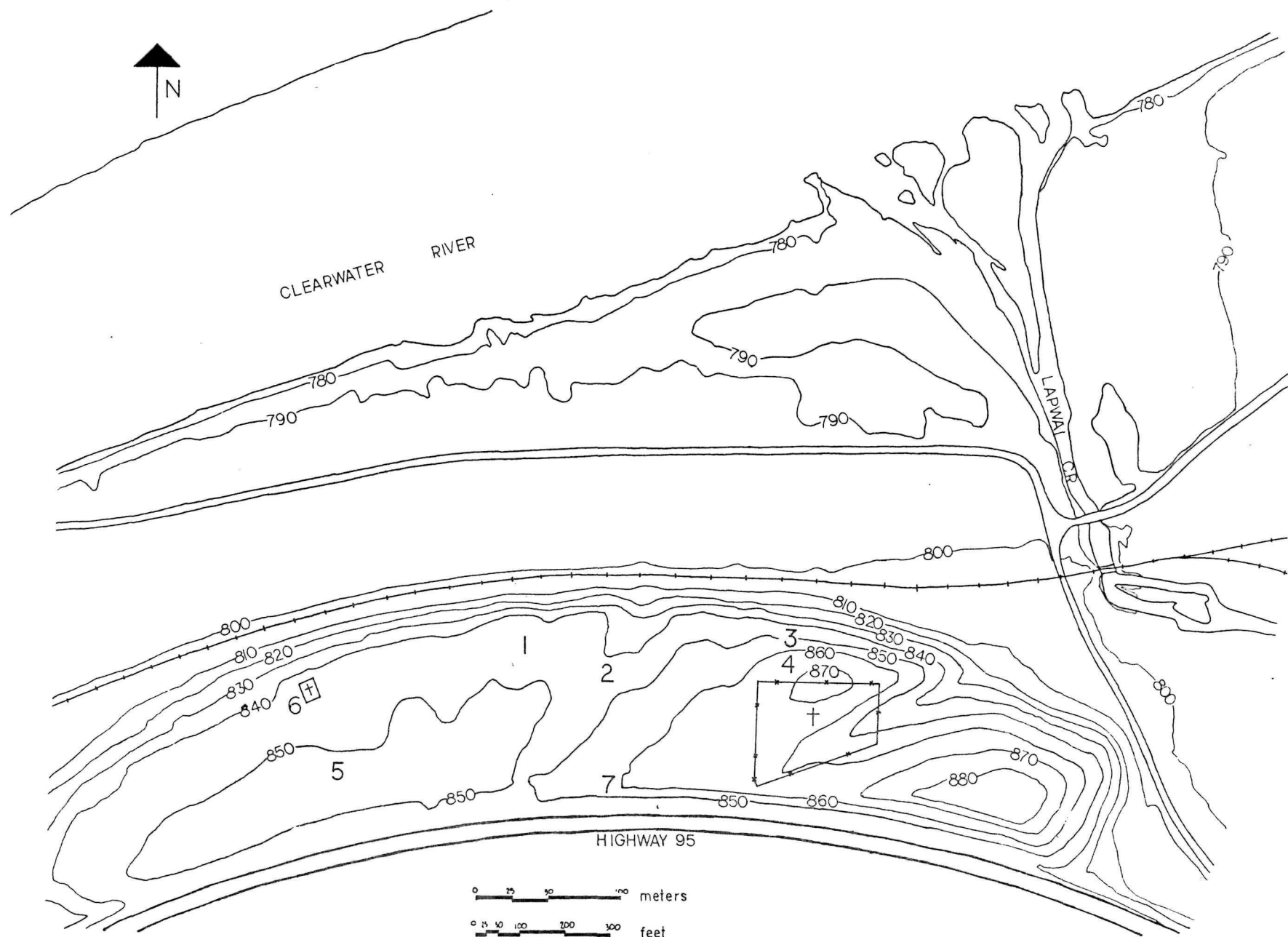


Fig. 3. Site of the emergency test excavations and burial relocation, Spalding, Idaho. Large numbers indicate the approximate position of the seven operations, contours are in feet.

metric grid used for Op 1 was also used for this operation and the auger holes were spaced generally at 30 m intervals except in areas where construction was expected, in which case the auger holes were placed only 5 m apart. In a swale just east of the visitor center lots 1 and 25 encountered a moderate concentration of lithics and two 1 x 1 m lots were excavated to further explore the area. These lots were excavated in 20 cm levels down to a depth of 100 cm in Lot 9 and 120 cm in Lot 25. This concentration was highly restrictive horizontally and probably represents a small lithic working station. Artifact counts for Op 2 are to be found in Table 1.

Op 3 consisted of screening the loose dirt from the bulldozer cut next to the backdirt pile (Fig. 4). This operation began on 5 October and lasted through 12 October 1979. The cut was divided up into lots in an attempt to help the physical anthropologist correlate the human remains and to give a sense of order to the process of collection. The possibility of tying human remains with grave goods was also considered. The width of the lots varied depending upon the width of the cut, between 6-10 m, but the length was fixed at 5 m. The loose dirt was passed dry through 1/8 in. and 1/4 in. mesh screens although the smaller size screens were soon retired when enough larger size screens had been built. Naturally since the area was severely disturbed, and we were screening only the loose earth, no levels were maintained. Nor was it possible to screen all of the loose dirt but every major pile and most of the smaller ones, along the cut edge and in the middle were screened and the area thoroughly raked over in an effort to remove all human bone. Minor digging took place when the coffer dams surrounding the known graves were installed. In most cases no additional burials were discovered but in one instance, the very badly mangled remains of part of an individual had to be removed before a coffer dam could fit. In addition, two other burials were uncovered during the clean up operation but once it was determined they were in fact human, these graves were quickly re-covered with no attempt to document the find. The coffer dams were placed in the exact locations of the known graves and aided in the reburial of those individuals. One additional coffer dam was used to house the rest of the human bones from Ops 3 and 4.

Op 4 entailed screening the huge backdirt pile (Fig. 5). This part of the project took the longest period of time beginning on 11 October and ending on 13 November 1979. Almost two days were lost to rain and toward the end of the project cold weather hampered the work. As with Op 3, this area was divided into 5 m units with the width varying according to the size of the pile. Here, dirt was screened almost entirely with 1/4 in. mesh except occasionally when it was noted that a heavy concentration of seed beads had fallen through the screen. In this case the dirt previously screened was passed through a smaller mesh screen until it was felt that most of the beads had been recovered. The amount of time and money required to sift all of the dirt through smaller size screens was judged prohibitive and with the concurrence of the crew, the larger size screens would again be used. The screened dirt itself was simply placed back into the cut and used as fill. The lot numbering sequence was the same as Op 3 and for a map of both operations see Fig. 6. Artifact descriptions for the combined Ops 3 and 4 are to be found in the Chapter by Michael T. Bies.

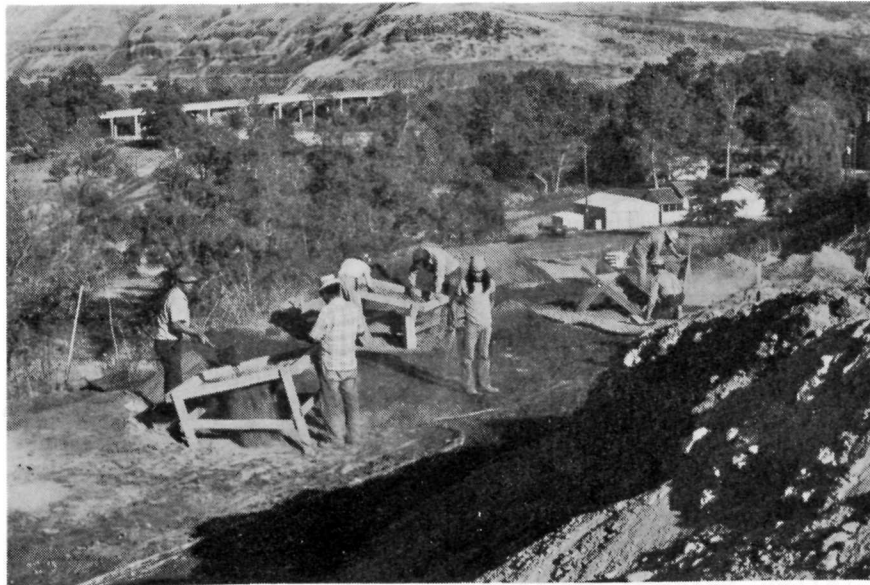
*a**b*

Fig. 4. Sifting dirt from the bulldozer cut, Op 3. *a*, looking northwest, wooden boxes (coffer dams) mark the exact location of known burials and were used in reburying the remains; *b*, looking northeast.



Fig. 5. Excavation nearing the end on a cold mid-November day (Op 4). The barrels on the left were used to house fires that provided a minimal amount of warmth.

In Op 5, the parking lot area, various access roads, and the grassy areas between the roads all to the west of the visitor center, were tested. The auger holes in this operation were dug with the same equipment and to the same depth (100) as in the other augering operation. Levels were also approximately 20 cm wide. However, with this operation most of the holes were spaced 15 m apart although some were spaced closer for various reasons. A total of 73 auger holes were dug in the 6 days between 23 and 30 October 1979. Op 6 started and finished on 29 October 1979. In this operation, 14 auger holes were spaced at 5 m intervals at a distance of 5 m from the existing fence line that encloses the Bredell cemetery. This was done to be sure the cemetery did not extend beyond the fence line (it did not). Op 7, the final one, consisted of 11 auger holes spaced at 5 m intervals and running just outside the National Park Service property fence line and parallel to U.S. Highway 95. This auger line ran from a point just southwest of the junction of the main cemetery fence line with that of the Park Service property line to a point 50 m west. This was done to ensure that the proposed deceleration lane into the park would not encounter anything unusual. Op 7 began and ended on 31 October 1979. Artifact counts are to be found in Table 1. A map of Ops 5, 6, and 7 can be seen in Fig. 3.

CEMETERY (10 - NP - 108)

Operations 3 & 4

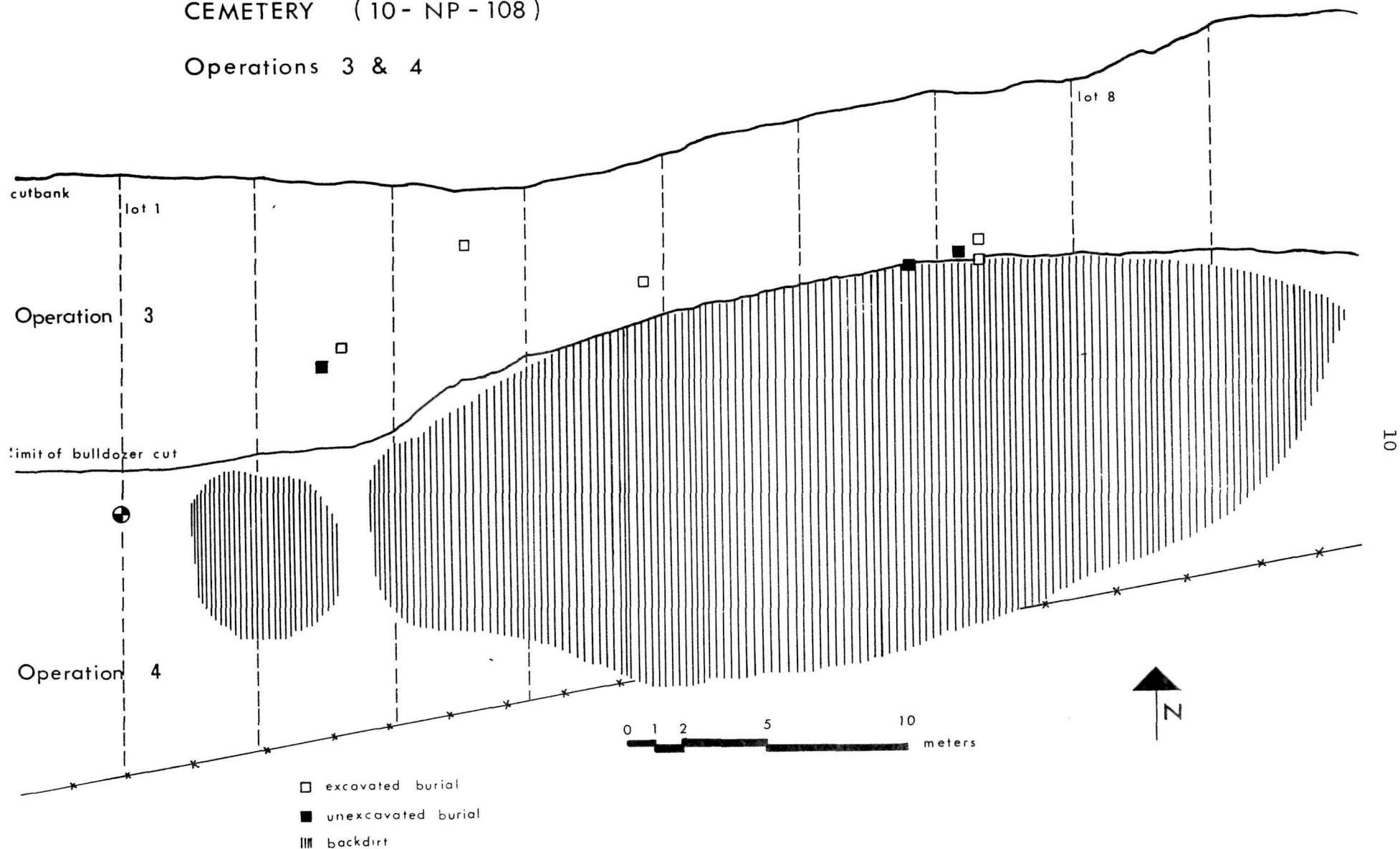


Fig. 6. Map of the Spalding Hilltop cemetery showing the approximate limits of the bulldozer cut, known burials, and the location of Ops 3 and 4.

Monitoring

Construction for the visitor center was completely shut down shortly after the cemetery was disturbed to allow archaeologists time to complete a test excavation of the areas to be impacted by the building program. By 23 October 1979, construction activities were resumed because the archaeological excavations had proved the upper terrace to be devoid of burials and lacking significant cultural material. However, as part of the understanding worked out by all parties, over the first month of the project, it was agreed that an archaeologist monitor all earth moving during the remaining construction. This included watching while the large spoil heap at the west end of the site was moved. This pile was formed at the very beginning when the road running by the cemetery was cut and it was feared that human remains would be found in that pile too. Since no remains were visible, however, it was not felt necessary to screen the pile and as it turned out, no human bones were found during monitoring either.

Monitoring activities commenced on the day construction was resumed and continued intermittently over the next year. In fact, the last day of monitoring took place almost exactly one year from the beginning of the project, 10 September 1980! Archaeologists monitoring earthmoving were Caroline Carley, Karl Gurcke, Christine McGlinchy, and Priscilla Wegars. Crew members from the water line excavations also took part when that project was operating.

The dirt from Op 4 was still being screened when Gurcke began monitoring the excavation of the basement, water tank, and dowsing tank for the visitor center. No cultural materials were found during this period but fragments of animal bone were recovered at the lowest levels of the basement excavation, ca. 11 ft. deep. These bones were later identified as coming from a bison and were not deemed important enough to halt construction. Nothing else was found although more bison bones were discovered in construction trenches in January 1980.

Wegers spent part of February and March 1980, monitoring the construction of the drain field on the lower terrace directly below the visitor center. Some cultural material was recovered which included ceramic, glass, metal, and wooden artifacts as well as a single projectile point. Later a trench was dug from the visitor center to the drain field which cut through at least two historic flumes. These flumes are well known and are the same ones dealt with by David Chance in his 1978 and 1979 excavations. The artifacts recovered from the drain field were also not important enough to delay construction.

In April 1980, Gurcke monitored the realignment of the road that ran past the cemetery hill. This road was pushed further out into space and more fill was brought in to support it. The dirt brought in could not simply be dropped in place but had to be "tied in" to the ground it was to rest on. As a consequence the historic flumes, mentioned above, and which continues around the hillside, were completely destroyed or badly damaged in this area. At the base of the hill a scattering of railroad spikes, glass,

ceramic, and metal fragments as well as some cut animal bone was recovered but not in large enough numbers to indicate a site.

Carley, Gurcke, McGlinchy, and Wegers all took spells at monitoring the removal of dirt from the large spoil heap on the western edge of the construction site at various times during the project. Although some artifacts were found, human bones were not and the very large dirt pile did not have to be screened.

On 2 April 1980, Gurcke surveyed the site of a barrow pit a few miles south of the park on land owned by Mr. Sampson. Construction crews wanted the earth for more filling operations and a careful examination of the cut face of the barrow pit as well as the upper sloped surface revealed no evidence of cultural material. A record check at the University of Idaho also proved negative. However on 5 May 1980, a single human burial was uncovered by the contractor working the barrow pit. The burial was quickly removed by Carley and Sprague and work was allowed to continue at the pit. Wegers monitored the pit during the month of June on the days it was active.

Beginning on 12 May 1980, Carley monitored trenching for the placement of both water and electrical lines on the upper terrace near the cemetery and on the newly constructed road on the lower terrace. Although nothing was found in either trench, there was a scare for a time because the trench on the upper terrace was heading directly toward the previously disturbed cemetery. Carley rerouted the line south and completely around the cemetery avoiding another possible confrontation. In August and September 1980, the large backdirt pile on the west end of the site was monitored for the last time and nothing was found. Fig. 7 lists the monitors in chronological order and their tasks.

The Artifacts

As the artifact counts and distribution figures for Ops 1, 2, 5-7 show (Table 1), there is a small scattering of both prehistoric and historic artifacts in the region impacted by the visitor center. These figures do not show any particular concentration that could be classified as a site with two exceptions. One exception consisted of a moderate but highly restricted lithic concentration in a small swale just east of the visitor center (Op 2, lots 9 and 25). Since this area was not endangered by construction it was left alone. The other exception had to do with a quantity of flakes and a number of projectile points that came out of the loose dirt from Ops 3 & 4. The large amounts of prehistoric artifacts recovered by the screeners in a historic cemetery, would tend to argue that some type of habitation site or work area existed on the hill before it was used as a burial ground. The full extent or importance of this site is unknown and probably will never be known because of its proximity to the cemetery.

Monitor	Dates	Description	Remarks
Gurcke	23 October - 8 November 1979	Excavation for the visitor center	Bison bone fragments recovered
Wegars	23 January 1980	Miscellaneous trenching in the visitor center area	Bison bone fragments recovered
Wegars	14-28 February 1980	Trenching for the drain field	A light scatter of miscellaneous prehistoric and historic artifacts found
Wegars	5, 14 and 17 March 1980	Trench to connect visitor center to drain field	The historic flume was cut by trenching, miscellaneous historic artifacts were found
Gurcke	1-10 April 1980	Realignment of the road by the cemetery	Continuation of historic flume along hillside, destroyed. Miscel- laneous late historic artifacts found along the base of the hill
Wegars	11-16 April 1980	Back dirt pile, west end of upper terrace	Miscellaneous prehistoric and historic artifacts some possibly from the lower terrace recovered
McGlinchy	17-25 April 1970	Back dirt pile, west end of upper terrace	Miscellaneous prehistoric and historic artifacts some possibly from the lower terrace recovered
Carley	12-13, 15-16, 22 May 1980	Trenching for water and electrical lines, upper and lower terrace	Nothing found
Wegars	4, 8-10, 12 June 1980	Sampson's barrow pit	Non-human bone fragments
Carley	29 August 1980	Back dirt pile - west end of upper terrace	Nothing found
Wegars	4-5, 8-10 September 1980	Back dirt pile - west end of upper terrace	Nothing found

Fig. 7. Archaeological monitors at Spalding 23 October 1979 - 19 September 1980.

No analysis was attempted on the lithics recovered from the cemetery because it would serve no useful purpose considering the highly disturbed nature of the sample. These artifacts, however, were not reburied with the other grave goods recovered from the hill because they were not associated with the burials, and are now housed at the Laboratory of Anthropology. Artifacts found during the course of monitoring are also not analyzed here. They represent no more than a casual occupation by both prehistoric and historic peoples and an analysis of the artifacts would tell us little more.

The artifact description by Michael T. Bies covers only those artifacts recovered during the screening of Ops 3 and 4, that could probably be associated with the graves. As noted before, the disturbed area was divided into operations and lots in order to help facilitate the collection process and in the hope that both human remains and artifacts could somehow be brought together. Unfortunately this proved not to be the case although the system brought efficiency to the screening operation. Bones and artifacts would be found in just about every shovel full, but in only a few instances could they be definitely associated together. For example, a number of bracelets were found still encircling the owners' arm. More often, however, the association could not be made. In another example, a rosary made up of amber beads was found scattered from one end of the backdirt pile to the other end. Because of the impossibility of connecting artifacts with graves or even identifying graves, no attempt is made to list the artifacts by lot. Some of the artifacts recovered from Ops 3 and 4 are illustrated on the following pages (Figs. 8-13). It should also be noted that numerous fragments of coffin wood was found scattered throughout the back dirt pile but not collected. On 29 May 1980, all human remains and their associated grave goods were reinterred in a reburial ceremony at the same cemetery from which they had been excavated. May finally they rest in peace.

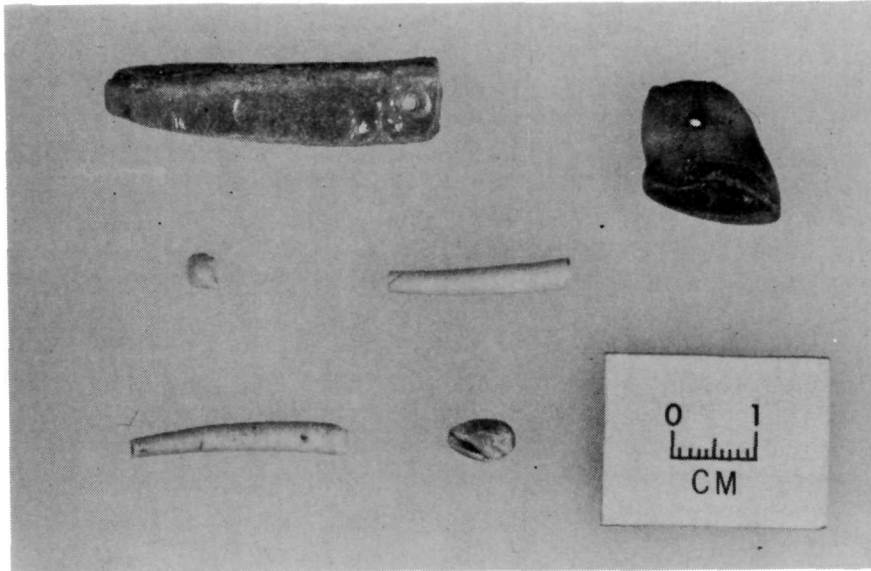
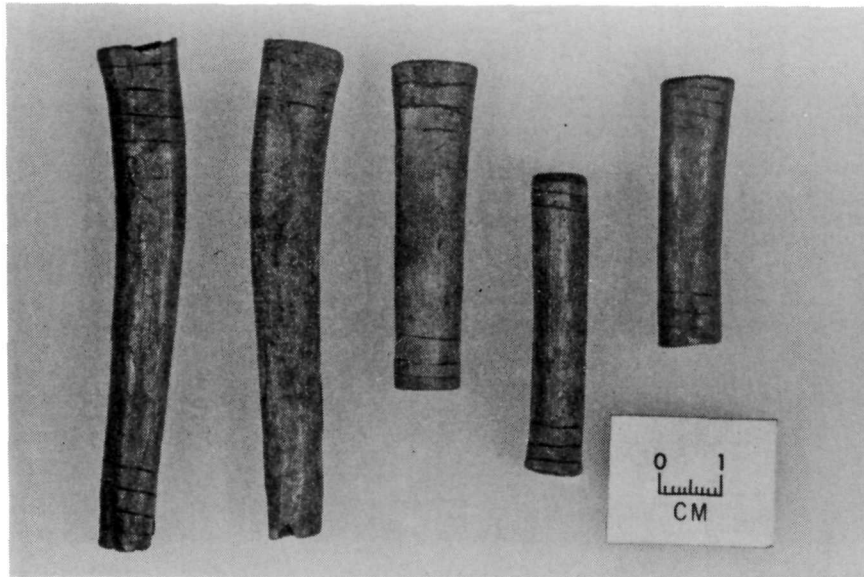
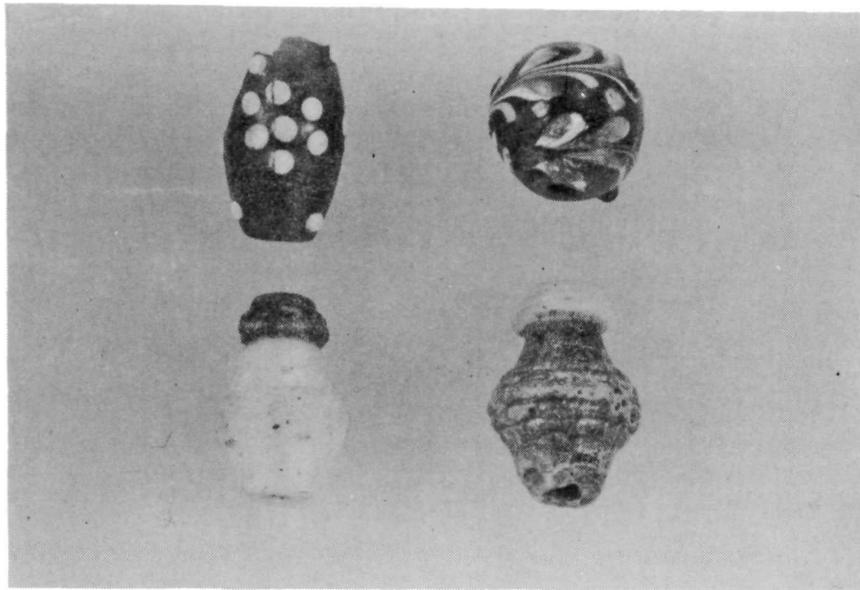
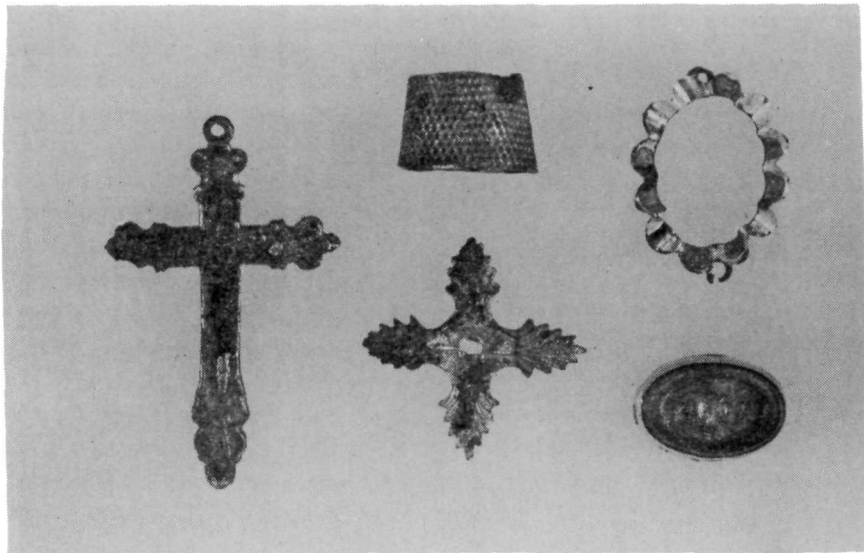
*a**b*

Fig. 8. *a*, Mother of pearl pendant, elk incisor bead, dentalia shell beads, olivella shell beads; *b*, probable bird bone gaming pieces.



a



b

Fig. 9. a, Fancy glass beads; b, Rosary crucifix, stamped non-ferrous metal body, length 4.2 cm, quatrafoil leaf ornament, non-ferrous, non-ferrous metal thimble with top end removed, Gold plated scalloped band fits gold plated metal oval with gold flecked glass face below.

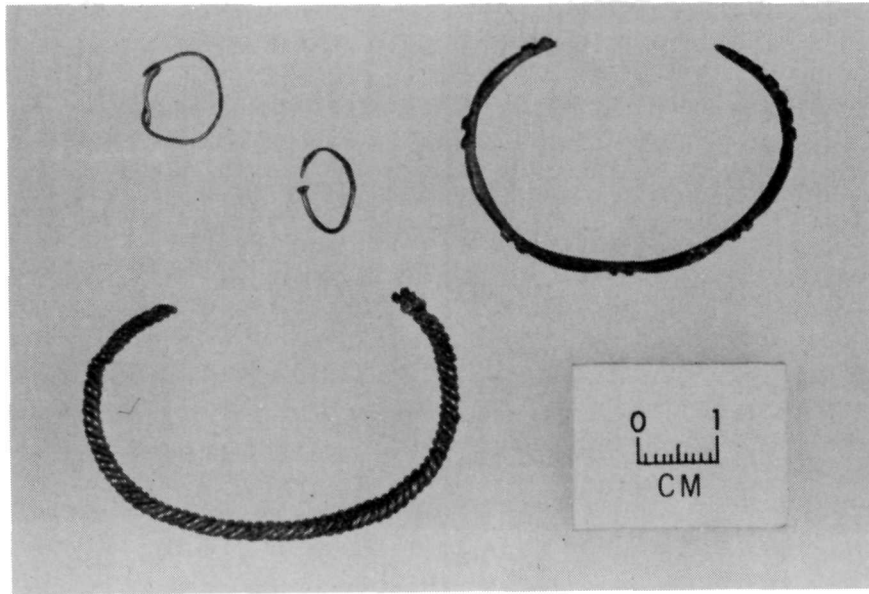
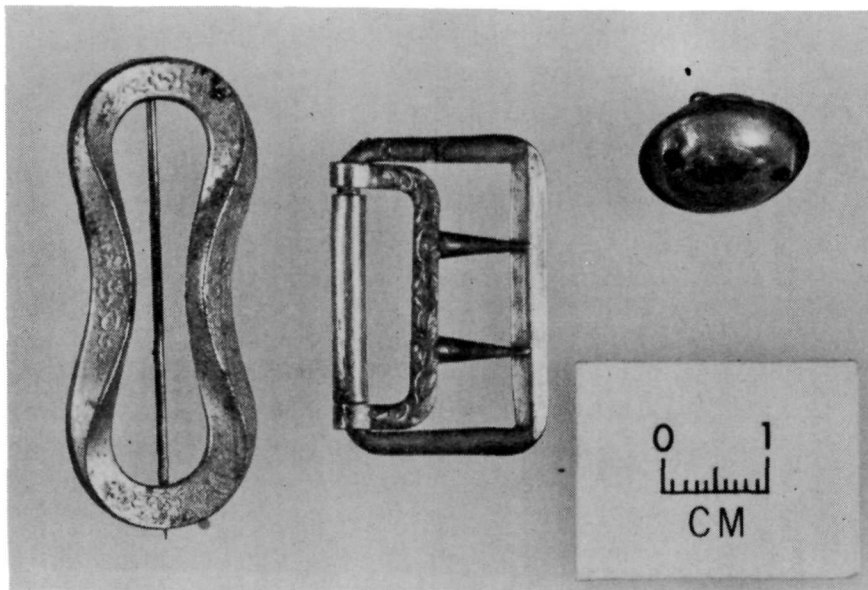
*a**b*

Fig. 10. *a*, 2 non-ferrous ear wires, one 2 strand twisted yellow metal bracelet, one solid yellow metal bracelet; *b*, gold plated ferrous metal pin broach, non-ferrous metal buckle, non-ferrous metal bell.

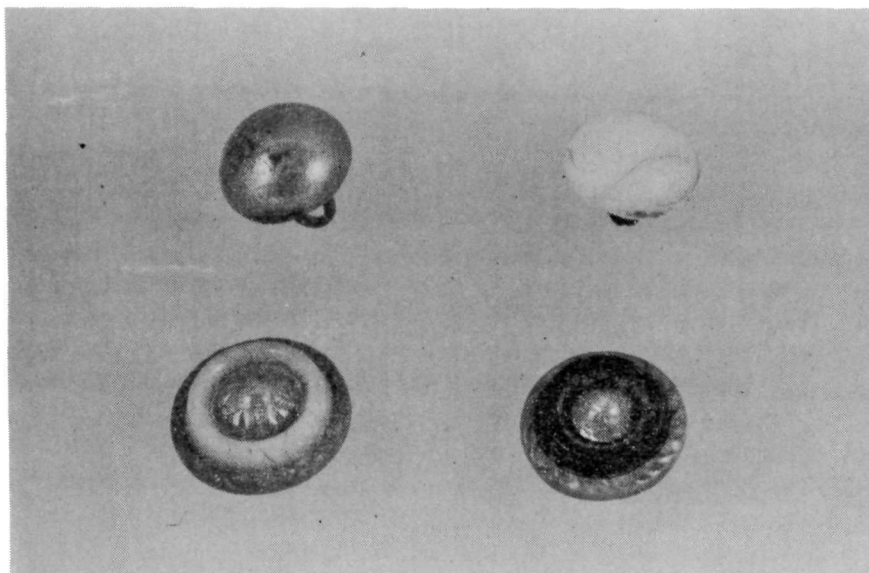
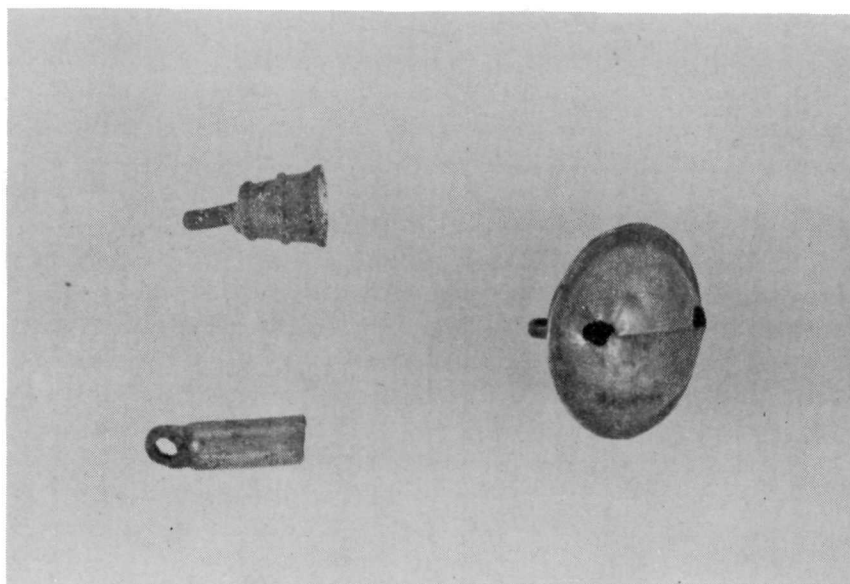
*a**b*

Fig. 11. *a*, Top, non-ferrous metal dome button, white glass dome button, bottom, 4 piece yellow metal buttons, one with white glass, one with black glass (1.3 cm diameter) ; *b*, non-ferrous conical bell, length 1.1 cm, tubular bell, round bell.

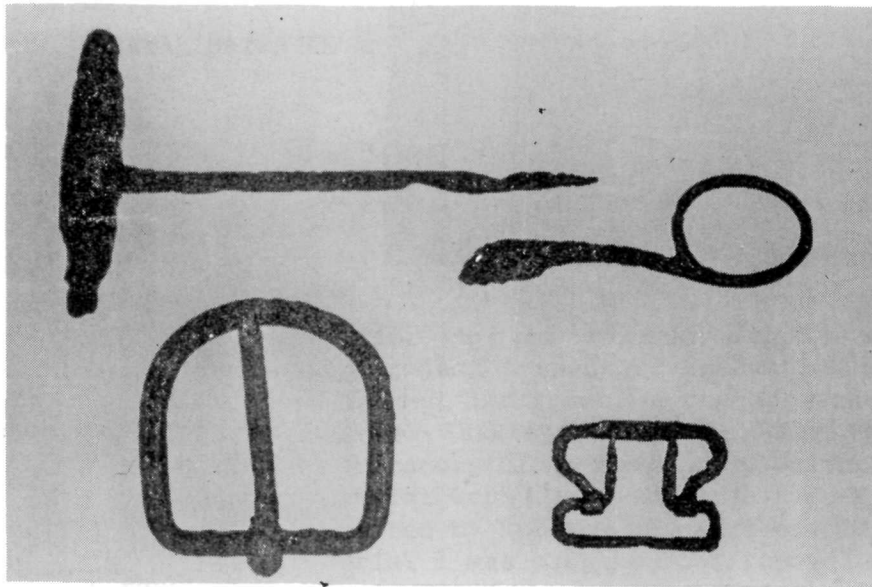
*a**b*

Fig. 12. *a*, Ferrous metal cork screw, length 9.0 cm, scissors fragment, ferrous metal belt buckle, and possible suspender buckle; *b*, probable quirt handle, 5 brass tacks to a row, tack heads 0.9 cm in diameter.

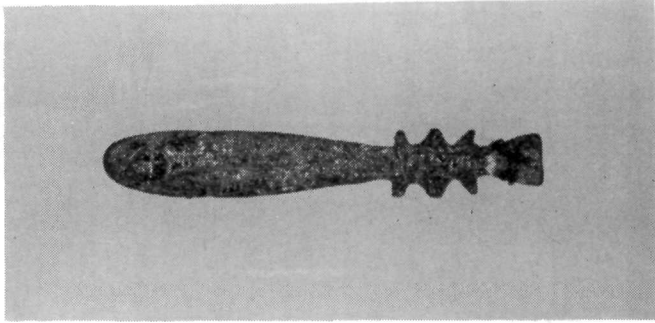
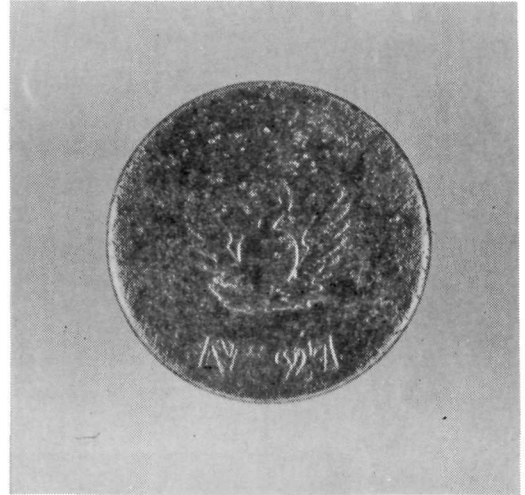
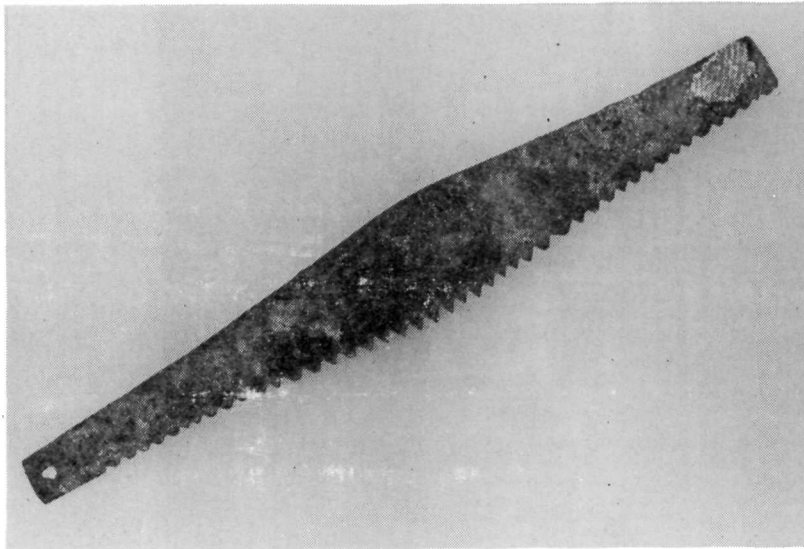
*a**b**c*

Fig. 13. *a*, Non-ferrous metal pendant with wool fabric and thread attached, length 5.5 cm; *b*, Phoenix button, Regiment No. 27, Riviere du Nord, diameter 2.5 cm; *c*, Non-ferrous saw blade bracelet with fabric adhering, length 15.0 cm.

THE SKELETAL MATERIAL AND SPECIFIC GRAVES FROM 10-NP-108B

by

Thomas M. J. Mulinski and Roderick Sprague

Introduction

On 10 September 1979, prior to the arrival of the National Park Service, Denver Service Center, project inspector; excavation was begun for the roadway connecting the proposed interpretive center with the Spalding area. On 12 September, Steven D. Shawley, Historian, Nez Perce National Historical Park notified the Laboratory of Anthropology, University of Idaho that artifacts and skeletal material were discovered in the excavation. On 13 September the site was inspected by Sprague and Gurcke. On 14 September burials 2-5 were removed and Burial 1 was prepared for removal when work was halted by Nez Perce Tribal Executive Committee Chairman, Wilfred Scott. This decision was made by Scott in consultation with several other Tribal Council members present at the site.

Additional details on the subsequent sifting operation have already been described by Gurcke. This section is concerned only with the biological data derived from the recorded burials and the back dirt recovery as analyzed by Mulinski and the cultural data derived from only the five identified burials as analyzed by Sprague. The only cultural data recovered from the back dirt consisted of the artifacts, a description of which is presented by Bies.

While the five burials were at least partially excavated, the overwhelming majority of human bone was inadvertently uncovered by road-building machinery and picked up out of archaeological context and without individual skeletal integrity. The result of this was that a large, jumbled mass of human osseous debris and intact skeletal elements was brought back to the laboratory to be analyzed. Not only did this state of affairs make the analysis arduous, it also severely limited the amount of useful biological information that could be gleaned from the material.

In terms of analysis, the approach that was utilized was similar to one that would be applied to an analysis of the human skeletal remains from an ossuary. The cultural analysis also suffered because even the burials excavated in situ suffered varying degrees of disturbance from the road building operation.

The Burials

Burial 1

This adult of unknown sex was a primary inhumation deposited on the back with the legs extended, the right arm across the chest, the left arm flexed to the shoulder, and the head turned to the left. Orientation was 91° west of true north or virtually due west or down river. The face was facing northeast. The body was covered with transverse cedar boards reminiscent of early historic burial boxes at Asotin (Sprague 1959:22). The boards covered an area 22 x 71 in. Because the skeletal material was immediately reburied, biological data are sketchy.

Burial 2

This child, 10-12 years of age, was a primary inhumation deposited on the back and oriented due west (90° west of north) or down river. The legs were extended, the hands crossed on the pelvis, and the head was looking left and north. The skeleton was covered with longitudinal cedar boards covering an area 17 x 60 in. The skeleton of this individual was quite fragmentary and the bone was in a poor state of preservation.

Burial 3

This sub-adult individual was so badly disturbed that little cultural information could be recovered. It was probably deposited on the back with orientation west (88° west of south). Ironically, the preservation of the bone in this burial was "good" as compared to "fair" for the other four numbered burials. Cedar fragments were present but no specific evidence of a box was found. The skeletal material recovered consisted of three pieces of bone (a parietal fragment, an unidentifiable cranial fragment, and a metatarsal without a distal epiphysis) and a maxillary molar tooth.

Burial 4

This female of 40+ years of age was a primary inhumation extended on the back, with the arms at the sides, and the head looking left with the chin compressed to the chest. The orientation was 91° west of north or almost due west. The face was facing north. The body was covered with longitudinal cedar boards, probably the remains of a burial box. The skeleton was fragmentary and the bone was in a poor state of preservation.

Burial 5

This 50+ year old female was deposited on the back with the legs probably extended but due to severe disturbance this is inferred from secondary evidence. The right arm was to the side but the left was

unknown due to disturbance. The position of the head also was unknown but orientation was determined as 80° west of north or almost due west and down river. The body was contained in a box with longitudinal boards on top. The right hip had evidence of severe chronic osteoarthritis. The skeletal material was fragmentary and incomplete.

The Sampson Burial

On 5 May 1980, soil barrowing operations on the Tully Sampson property between Spalding and Lapwai, uncovered Burial No. 1, 10-NP-179, an 18-21 year old male. The remains were out of context when they were recovered. Even though the skull was in pieces, it was possible to determine that the cranium was artificially deformed. The skeleton of this individual was only about 70%-80% complete although the preservation of the bone was excellent. Artifacts recovered included a smoking pipe made from a 130 mm long section of octagonal rifle barrel and two whole dentalia shells. The remains and associated artifacts were reinterred at the site on 29 May 1980 in compliance with the wishes of the Nez Perce Tribal Executive Committee.

Least Number of Individuals Present

Because of the nature of the recovery of human skeletal remains from 10-NP-108B the first and most difficult operation was to determine the least number of individuals present (LNIP). In order to do this four categories of skeletal remains were set up, as follows: (1) skeletons from burials; (2) miscellaneous skeletons--somewhat complete skeletons from a single archaeological recovery area (e.g., Op 4, Lot 8); (3) fairly complete crania, although not necessarily intact; and (4) individual bones.

Table 2 lists the LNIP for each of the above categories. The total LNIP for the 10-NP-108B is 57, if it is assumed that none of the miscellaneous skeletons are represented in the category of "individual bones." A likely estimate for LNIP would be between 50 and 60. This seems like a fairly large sample size, but again it should be pointed out that the number of individuals available for thorough biological analysis is extremely small.

Demographic Information

Sex and specific age could only be estimated in some cases for skeletons from burials, miscellaneous skeletons, and miscellaneous crania. Traditional criteria were employed to arrive at these estimates (Krogman 1962; Bass 1971). In those instances where the traditional criteria could not be applied because of missing skeletal parts the degree of dental attrition was used to assess relative age. No attempt was made to sex individual bones, except for the few fairly complete innominates; and individual bones were assigned only to a general age category (i.e., either adult or sub-adult).

TABLE 2

Least number of individuals represented in the human skeletal material
in 10-NP-108B

Category of Skeletal Remains	Least Number of Individuals Present
Burials	5
Miscellaneous Skeletons	8
Crania	5
Individual Bones	
a. Adults	15 (based on frontal bones)
b. Sub-adult	<u>24</u> (based on humeri)
Total	57

Table 3 lists the sex and age estimations for 18 individuals from 10-NP-108B. Of these, 11 are adults (61.6%) and seven are sub-adults (38.9%). Among the individual bones, at least 15 adults (38.5%) and 24 sub-adults (61.5%) are represented. The total number of adults and sub-adults among the LNIP, then, is 26 (45.6%) and 31 (54.4%), respectively.

Other Data

Unfortunately, estimated living stature could not be calculated for any of the adult individuals because none of the individuals from burials and none of the miscellaneous individuals had an intact femur or tibia.

Only two crania were complete enough to be evaluated for artificial cranial deformation. One of these was deformed, while the other was not. The artificially deformed cranium exhibited anterior and posterior flattening.

A number of metric and non-metric observation were made when possible. These are on file at the Laboratory of Anthropology, University of Idaho.

Pathologies included slight osseous changes associated with osteoarthritis and degenerative disc disease noted in some skeletons and individual bones; these types of changes are not uncommon in archaeologically-derived skeletal samples. One case does deserve special mention, though. This involves the individual from Burial 5, who exhibited evidence of severe osteoarthritis of the right hip. The acetabulum of the right innominate and the head of the right femur of this elderly female showed marked pathological changes, which indicates a chronic condition.

TABLE 3

Sex and age estimations for individuals from 10-NP-108B.

Designation	Sex	Age
Burial No. 1	?	Adult
Burial No. 2	Juvenile	10-12
Burial No. 3	?	Sub-adult
Burial No. 4	Female	40+
Burial No. 5	Female	50+
Miscellaneous Skeleton No. 1	Male	17-20
Miscellaneous Skeleton No. 2	Juvenile	6-8
Miscellaneous Skeleton No. 3A	Female?	Adult
Miscellaneous Skeleton No. 3B	Infant/Child	Sub-adult
Miscellaneous Skeleton No. 3C	Child/Juvenile	Sub-adult
Miscellaneous Skeleton No. 4	Infant	1-2
Miscellaneous Skeleton No. 5	Female	Adult
Miscellaneous Skeleton No. 6	Female?	40+
Miscellaneous Cranium No. 1	Male	40+
Miscellaneous Cranium No. 2	Adolescent	12-16
Miscellaneous Cranium No. 3	Male?	Adult
Miscellaneous Cranium No. 4	Male?	Adult
Miscellaneous Cranium No. 5	Male?	Adult

Unfortunately the left innominate was represented solely by a fragmentary pubis, while the left femur was absent. Other areas of the skeleton exhibited pathological changes indicative of osteoarthritis but these changes were not as marked as those associated with the right hip.

With regard to evidence of trauma, one of the left clavicles from the collection of individual bones exhibited a healed fracture. Fractured clavicles have been observed by Sprague (1971:183) as having a high incidence among Plateau skeletal populations after the introduction of the horse.

Conclusions

Very little meaningful biological information was collected from the human skeletal remains from 10-NP-108B and because of the nature of the exposure and recovery of these remains. The cultural conclusions are obvious and the archaeological evidence adds nothing new to our knowledge of Nez Perce burial. From abundant informant data we can conclude that the burials observed fit the expected historic pattern of extended burial on the back oriented west (Sprague 1967; Rodeffer 1973).

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ARTIFACT INVENTORY OF SPALDING HILLTOP CEMETERY(10-NP-108B)

BY

Michael T. Bies

Op 3

PERSONAL ITEMS

Clothing

- black fabric fragment, wool pile weave
- 1 reddish brown with greenish stain wool cloth fragment,
plain weave
- 1 copper wire weft, about 40 very fine double strand wires per
inch, and linen warp, about 20 threads per inch brocade pattern
fabric

ARCHITECTURAL ITEMS

Construction

Materials

- 5 wood plank fragments
- 1 window glass fragment 0.22 cm thick

Hardware

- 20 square cut nail fragments
- 1 wire fragment U-shaped

UNKNOWN

Metal

- 4 ferrous metal fragments, possible can fragments
- 1 ferrous metal fragment

Glass

- 5 clear glass fragment, possible bottle fragment

Leather

- 2 black leather fragments

COMMERCE ITEMS

Hunting

- 1 .22 caliber shell casing, headstamp - HI/U/SPEED

Op 4

PERSONAL ITEMS

Clothing

- 1 green (copper corrosion) and brown (rust) spotted plain weave cotton fabric fragment
- 8 black pile weave wool fabric fragments
- 1 reddish brown very fine plain weave cotton fabric fragment
- 2 unknown fabric fragments appears to be several layers of plain weave fabric
- 14 reddish brown wool twill with pile on one side of the fabric
- 4 brown wool plain weave fabric fragments, one with coarse thread stitching
- 2 copper wire weft and linen warp thread, brocade pattern fabric fragments, one with brownish wool twill fabric fragment attached to back
- 10 brown wool twill fabric fragments
- 3 unknown fur fragments
- 2 twisted plant fiber fragments unwoven, possible thread
- 1 green cotton fabric fragment, color may be due to copper corrosion, plain weave
- 3 small soft black leather fragments
- 3 small black leather fragments, possibly boot or shoe fragments
- 1 black leather fragment with two brass tacks, dome head, 1.0 cm diameter, square shank
- 1 yellow metal tack dome head 1.0 cm diameter, square shank
- 1 bone hole button fragment
- 1 leather fragment with two brass tacks attached by bending over the square tack shank, round domed heads 1.0 cm in diameter
- 3 brass tacks with leather fragments attached, probably from above leather fragment
- 2 black leather fragments with weave impressions
- 1 copper wire weft and linen warp brocade fabric fragmented backed with a black pile weave wool fabric fragment, backed with two layers of brown plain weave wool fabric fragment, appears to have been edged with fur trim on one (1) side, layers stitched together with two strand linen thread which connects to another copper wire weft and linen warp fabric fragment and stitches one white glass seed bead to the second fabric fragment
- 3 copper wire weft about 40 very fine double strand wire per inch and linen warp about 20 threads per inch brocade pattern fabric fragment with black pile weave wool fragment stitched to back with linen thread, several hair fragments cling to both sides, may be fur fragments
- 1 copper wire weft and linen warp brocade pattern fabric fragment backed with a black pile weave wool fabric fragment, backed with a brown plain weave wool fabric fragment, backed with two layers of brown plain weave cotton fabric fragment, all layers appear to have been edged with fur trim on one side

and stitched together with linen thread

- 1 copper wire weft and linen warp brocade pattern fabric fragment backed with a black pile weave wool fabric fragment, backed with a brown plain weave wool fabric fragment, black pile weave fabric connects copper wire and linen fabric with another brown plain weave fabric fragment backed with black pile weave wool fragment, fragments of fur and human hair cling to fabric. The layers of fabric are stitched together with two strand linen thread
- 1 copper wire weft and linen warp brocade fabric fragment 1 fancy yellow metal buckle, 3.2 cm wide, 0.4 cm maximum thickness, maximum belt width 2.1 cm, has two teeth mounted on one moveable bar with a vine and leaf impressed pattern, teeth are 1.1 cm apart
- 1 ferrous buckle with belt roller and 1 tang, 2.4 cm maximum belt width, 1.3 cm wide, 2.95 cm long
- 1 ferrous metal buckle, 4.2 cm wide, 4.5 cm long, maximum belt width 3.2 cm one tooth
- 1 ferrous metal buckle (suspender?), 3.2 cm wide, 2.3 cm long, maximum belt width 2.5 cm
- 1 ferrous metal buckle with belt roller and one tooth, 3.3 cm wide, 2.95 cm long, maximum belt width 2.45 cm
- 2 bone 4-hole buttons, 1.5 cm diameter, slightly concave center, rounded border
- 2 bone 4-hole buttons, 1.3 cm diameter, slightly concave center, rounded border
- 2 bone 3-hole buttons, 1.3 cm diameter, flat depressed center, rounded border
- 1 bone 2-hole button, with slight pilot depression 2.45 cm diameter, slightly convex, with brown plain weave wool fabric fragment on back
- 1 bone 5-hole button, 1.8 cm diameter, flat depressed center, rounded border
- 1 bone 3-hole button, rounded border, convex center
- 1 bone button, 4-hole plain, 0.75 cm diameter
- 1 bone button, 3-hole depressed flat center rounded border, 1.3 cm diameter
- 1 bone 4-hole button, diameter 1.4 cm
- 1 bone 2-hole button, diameter 2.45 cm
- 1 bone button fragment
- 2 mother of pearl 4-hole buttons 2.4 cm diameter, flat depressed center, flat border
- 2 mother of pearl 4-hole buttons 1.5 cm diameter, plain slightly concave
- 1 mother of pearl 4-hole button 1.4 cm diameter, flat depressed center, flat border
- 1 shell 4-hole button, 1.25 cm diameter fancy depressed center with circle of dots, flat border with radial curved lines
- 1 shell 4-hole button, 1.25 cm diameter, flat depressed center, flat border
- 1 shell 4-hole button, 1.0 cm diameter, plain flat

- 1 mother of pearl 4-hole button, engraved with pie crust ring with six evenly spaced curved lines in a hexagonal star pattern on a flat border 1.25 cm diameter
- 1 mother of pearl 4-hole button with rounded border and depressed concave center 1.3 cm diameter
- 1 mother of pearl 4-hole button, plain badly eroded and out of round 0.8 cm diameter
- 2 mother of pearl buttons, 4-hole plain 1.0 cm diameter
- 2 mother of pearl buttons, 4-hole plain 0.75 cm diameter
- 1 mother of pearl button, 4-hole rounded border depressed flat center, 1.5 cm diameter
- 1 mother of pearl button, 4-hole flat border depressed flat center, 2.2 cm diameter
- 2 mother of pearl buttons, 4-hole depressed flat center, flat border 1.2 cm diameter
- 2 mother of pearl buttons, 4-hole engraved pie crust ring with six evenly spaced curved lines in a hexagonal star pattern on flat border. 1.25 cm diameter
- 1 mother of pearl 4-hole button, diameter 2.45 cm
- 1 mother of pearl 4-hole button, diameter 0.4 cm
- 3 white Prosser ceramic 4-hole buttons, 1.15 cm diameter
- 3 ferrous metal buttons, ferrous metal backs with 0.9 cm diameter, 0.3 cm thick red glass face, metal backs have corroded and formed a concretion making it impossible to determine details of construction
- 1 ferrous metal button, badly corroded, diameter 2.5 cm, loop shank missing
- 1 white metal plated yellow metal button, 2.35 cm diameter, loop shank, legend on back EXTRA STRONG/PLATED/WARRANTED/5
- 1 white metal plated button 2.0 cm diameter, loop shank Tombac type
- 1 white metal plated yellow metal button 2.1 cm diameter, loop shank
- 2 white metal plated yellow metal buttons 1.9 cm diameter, loop shanks missing
- 1 white metal plated yellow metal button 1.6 cm diameter, loop shank missing
- 1 white metal button 1.6 cm diameter, yellow metal loop shank, with button hole fragment clinging to back
- 1 white metal button 1.6 cm diameter, yellow metal loop shank
- 1 white metal button 1.5 cm diameter with yellow metal loop shank
- 3 yellow metal and white glass four piece buttons, 1.4 cm diameter, 0.6 cm thick, fancy yellow metal back with yellow metal shank, center yellow metal cone shaped estucheon 0.6 cm diameter, 0.3 cm high with radial line design of alternating solid and stipple lines with slight curve, white glass front 1.1 cm diameter, 0.2 cm high with raised border 0.2 cm thick, yellow metal rim 0.3 cm wide crimped to back and white glass has a stippled wave pattern, loop shank is connected to center cone shaped estucheon

- 1 yellow metal and black glass four piece button, 1.3 cm diameter, 0.6 cm thick, center yellow metal cone estucheon 0.4 cm diameter, 0.4 cm high with radial line design of alternating solid and stipple lines with a slight curve attached through button to yellow metal loop shank, black glass front 1.0 cm diameter, 0.2 cm thick, 0.2 cm high, yellow metal rim 0.4 cm wide crimped to black glass front and yellow metal back has border of radial curved lines alternating solid and stipple lines
- 2 white glass dome button with plated ferrous back and loop shank with a possible red or orange pattern on glass side, 1.1 cm diameter, 0.8 cm thick. Fragment missing on one side
- 1 gold gilt yellow metal button 2.0 cm diameter, loop shank missing, legend on back XQ TREBLE GILT STAND COLOR
- 1 yellow metal button 2.0 cm diameter with loop shank
- 1 yellow metal button 1.8 cm diameter with loop shank, thread remnants on loop shank
- 1 yellow metal button 1.8 cm diameter with ferrous metal loop shank
- 1 yellow metal button 1.5 cm diameter with loop shank
- 1 yellow metal sheathed ferrous metal fancy 4-hole button
- 5 yellow metal dome buttons 1.8 cm diameter, 1.35 cm high, yellow metal back and loop shank
- 9 yellow metal dome buttons 1.1 cm diameter, 0.8 cm high with ferrous metal back and yellow metal loop shank
- 1 yellow metal button, 1.1 cm diameter 0.6 cm thick, semi-hemispherical yellow metal body with ferrous back and yellow metal loop shank
- 1 yellow metal dome button with loop shank 1.45 cm diameter 1.0 cm thick, yellow metal back and loop shank 1.1 cm diameter slightly concave
- 1 Phoenix button 2.5 cm diameter loop shank; type 1 style 2 large: No. 27 Riviere du Nord regiment (Strong:1975:74)
- 1 yellow metal dome button 1.6 cm diameter, 1.3 cm high/thick hollow body, shank missing
- 2 yellow metal dome buttons, with yellow metal back and loop shank, 1.8 cm diameter (0.9 cm) thick, back is flat 0.8 cm in diameter
- 1 yellow metal button face, body is missing

Adornment

- 1 yellow metal band bracelet 5.5 cm, long end fragment maximum thickness 0.3 cm maximum width 0.5 cm five grooves on slightly tapered rounded end pattern possibly matches end of above bracelet
- 1 yellow metal band bracelet fragment, center maximum thickness 0.2 cm, maximum width 0.4 cm, elaborate pattern
- 1 yellow metal band bracelet 11.3 cm long; maximum band thickness 0.2 cm; maximum interior width 4.6 cm; maximum band width 0.5 cm; "W" design, parallel lines diagonally across width of band one fan of five lines across outside face of bracelet

- 1 yellow metal band bracelet 10.5 cm long; maximum band thickness 0.2 cm; maximum interior width 4.3 cm; maximum band width 0.7 cm minimum band width 0.4 cm; parallel grooves with notches to outside starting at narrow end go 3/4 distance around bracelet terminates with open triangle pointing towards wide end followed by pair of parallel grooves with notches in center
- 1 yellow metal band bracelet 10.5 cm long; maximum band thickness 0.1 cm; maximum interior width 5.0 cm; maximum band width 0.5 cm, one groove through center of band entire length
- 1 yellow metal band bracelet 15.3 cm long; maximum band thickness 0.1 cm maximum interior width 4.8 cm; maximum band width 0.8 cm; minimum band width 0.4 cm plain with tapered pounded ends
- 1 flattened spiral wire yellow metal bracelet 45 cm long; thickness 0.3 cm width 0.5 cm forms two circles
- 1 yellow metal band bracelet 15.3 cm long; maximum band thickness 0.2 cm; maximum interior width 5.2 cm; maximum band width 0.7 cm; minimum band width 0.4 cm; plain with raised center for entire length
- 1 yellow metal bracelet (on arm) 17 cm long, 0.9 cm wide; 0.2 cm thick, maximum interior width 4.8 cm
- 1 yellow metal band bracelet 15.5 cm long, 0.2 cm thick, 0.7 cm wide; slight taper to rounded end; maximum interior width 4.6 cm (on arm)
- 1 yellow metal band bracelet 16 cm long; maximum width 0.6 cm; 0.2 cm thick; maximum interior width 5.9 cm (on arm)
- 2 yellow metal band bracelets about 16.3 cm long, 0.7 cm wide, 0.2 cm thick; slight taper to rounded end - fused together (on arm)
- 1 yellow metal band bracelet 15.0 cm long, maximum thickness 0.2 cm, maximum width 0.7 cm, minimum width 0.4 cm, maximum interior width 4.4 cm; plain, slightly raised center, length throughout tapered, rounded ends
- 1 yellow metal band bracelet end fragment fits above fragment maximum thickness 0.2 cm, maximum width 0.4 cm, elaborate pattern
- 1 yellow metal bracelet, one end missing, 9.0 cm long, 0.9 cm maximum width, 0.2 cm maximum thickness, with ornate stamped pattern
- 1 plain wire yellow metal bracelet, 11 cm long; maximum diameter 0.3 cm; maximum interior width 4.2 cm
- 2 plain wire yellow metal bracelet, 11 cm long; maximum diameter 0.2 cm; maximum interior width 4.3 cm
- 1 plain wire yellow metal bracelet, 10.8 cm long; maximum diameter 0.3 cm; maximum interior width 4.5 cm
- 1 plain wire yellow metal bracelet with 5 sets of filed grooves; 4 sets of 5 grooves, one of 7 grooves in center; 12 cm long, 0.3 cm maximum diameter; maximum interior width 4.1 cm
- 1 two strand twisted yellow metal bracelet, one piece folded in half and twisted 14.4 cm long; maximum diameter 0.4 cm; maximum interior width 5.3 cm

- 1 plain wire yellow metal bracelet 17.0 cm long maximum diameter 0.3 cm, maximum interior width 4.3 cm, slightly flattened
- 1 plain wire yellow metal bracelet 16.3 cm long maximum diameter 0.4, minimum diameter 0.2 cm, maximum interior width 4.9 cm, no longer true shape, ends taper and each end has 3 grooves
- 1 solid yellow metal bracelet, 10.0 cm long, 0.2 cm wide, 0.2 cm thick, a pattern consisting of four pairs of 0.2 cm close set bumps or knobs 1.2 cm apart, one end appears to be missing the intact end has four knobs or bumps and three shallow grooves, if the pattern was symmetrical 1.3 cm is missing, the pattern appears to have been filed from yellow metal wire
- 1 yellow metal saw blade bracelet 15.0 cm long, maximum width 2.0 cm, minimum width 0.8 cm, minimum thickness 0.05 cm, small cotton? fabric fragment clings to one end, ends taper to straight end hole near each end and about one third of length from each end, teeth start 1.2 cm from one end and run to other end, 45 teeth, size is not uniform, maximum interior width 6.6 cm
- 1 yellow metal band bracelet 9.1 cm long, maximum thickness 0.2 cm, maximum width 0.6 cm, minimum width 0.4 cm, one end gone, taper to end, slightly raised center throughout length
- 1 yellow metal band bracelet 13.5 cm long, maximum thickness 0.3 cm maximum width 0.6 cm, minimum width 0.4 cm, 3 grooves on existing end slight taper to rounded end - corrosion may conceal more elaborate design
- 1 yellow metal wound wire bracelet 10.7 cm long, 0.5 cm wide, 0.2 cm thick
- 3 yellow metal wire fragments, were wound but have been straightened, appear to have been bracelet fragments: No. 1 is 6.3 cm long, No. 2 is 4.4 cm long, #3 is 5.0 cm long with three complete turns still wound, the wound portion is 0.3 cm thick, 0.5 cm wide
- 6 yellow metal round beads 1.1 cm long 1.0 cm diameter, two hemisphere construction, hollow body, one hole in each hemisphere
- 8 yellow metal oval beads 1.2 cm long, 1.1 cm diameter - two hemisphere construction, hollow body, one hole in each hemisphere
- 1 yellow metal tubular bell 1.2 cm long, 0.4 cm diameter, no knocker
- 1 yellow metal conical bell 1.1 cm long, 0.6 cm maximum diameter, bell body has three raised rings which are notched, raised rings are separated by stippled bands, loop shank also has stippled patterns
- 1 yellow metal hawk bell, 1.7 cm maximum diameter, 0.9 cm thick loop shank
- 1 yellow metal tinkler cone 2.8 cm long, 0.6 cm maximum diameter
- 2 small yellow metal tinklers, rolled metal cones maximum diameter 0.5 cm each, 1.7 cm long, minimum diameter 0.2 cm

- 1 ferrous conical wire coil tinkler 0.2 cm wire diameter, coil 1.1 cm maximum diameter, 0.7 cm minimum diameter, 4.35 cm long
- 1 yellow metal wire coil, 2.4 cm long, 0.5 cm diameter, possible tinkler
- 1 yellow metal pendant with wool fabric and thread where fastened, 5.5 cm long, maximum width 0.9 cm, minimum width 0.4 cm maximum thickness 0.1 cm
- 1 yellow metal 2 pronged pendant, maximum length 5 cm, minimum length 2.2 cm, maximum width 1.7 cm, minimum width 1.4 cm, prong width 0.5 cm - corrosion conceals pattern
- 1 yellow metal pendant, 6.0 cm long, minimum width 0.4 cm, maximum width 1.0 cm, maximum thickness 0.2 cm, notches appear to be hand filed
- 1 pin brooch, 4.7 cm long, maximum width 1.9 cm, minimum width 1.5 cm, maximum thickness 0.3 cm, minimum thickness 1.0 cm, the face is gold plated ferrous metal stamped from one piece including a rose and leaf pattern, flat back of gold plated ferrous metal is soldered to face and has a hinged pin soldered to one end pin is intact.
- 1 yellow metal equalateral quatrefoil leaf ornament with a rectangular hole in the center 2.5 cm square, 0.8 cm center wide, stamped from sheet metal with slight relief
- 1 gold plated yellow metal oval with a gold fleck glass face, 1.25 cm long, 1.2 cm wide, 0.5 cm thick, metal rim 0.4 cm high
- 1 gold plated yellow metal scalloped band for oval above, loops on both ends for suspension, 2.4 cm maximum length, 1.8 cm maximum width
- 4 yellow metal square shank tacks 0.9 cm diameter heads with wool fabric around shanks which were bent 90°, two do not have fabric remaining
- 3 yellow metal square shank tacks 0.8 cm diameter heads with wool fabric around broken shanks
- 1 yellow metal square shank tack 1.0 cm diameter head with wool fabric around broken shank
- 2 yellow metal washers 1.1 cm diameter
- 1 yellow metal clip on a leather fragment 0.7 cm long side length, 0.28 cm short side length, 0.8 cm wide
- 1 yellow metal ear wire, 3.5 cm long, 0.8 cm loop on one end
- 1 yellow metal wire hoop 0.9 cm diameter, 0.15 cm wire diameter
- 1 yellow metal ring, 2.0 cm inside diameter, 0.5 cm wide, 0.1 cm thick
- 1 yellow metal ring, 2.0 cm inside diameter, 0.15 cm wide, 0.05 cm thick
- 1 yellow metal wire ring, 1.6 cm maximum diameter, 1.5 cm minimum diameter heavily corroded ends do not join.
- 1 white metal thimble, end appears to have been removed to make a ring, 1.5 cm maximum diameter, 1.3 cm minimum diameter 1.1 cm long
- 1 yellow metal wound wire fragment 0.6 cm long, 0.3 cm diameter, possible tinkler or bracelet fragment
- 4 olivella shell bead fragments

- 1 mother of pearl pendant 4.25 cm long, 0.9 cm maximum thickness, 1.1 cm maximum width, one hole for suspension in thick end
- 3 shell beads, flat round 0.5 cm diameter
- 3 shell beads, flat round 0.6 cm diameter
- 3 shell beads, flat round 0.7 cm diameter
- 1 shell bead, flat round 0.75 cm diameter
- 5 shell beads, flat round 0.8 cm diameter
- 12 shell beads, flat round 0.85 cm diameter
- 15 shell beads, flat round 1.0 cm diameter
- 2 shell beads, flat round 1.4 cm diameter
- 1 shell bead, flat round 1.5 cm diameter
- 1 bear penis? bone ornament, 5.9 cm long, .48 cm maximum diameter, ornament has cut marks on both ends
- 1 bone bead 0.9 cm diameter
- 4 bone beads 0.6 cm diameter
- 14 elk incisor beads
- 13 dentalia shell beads
- 1 quirt handle fragment with 17 brass tacks, 5 to a row, three rows intact; tack heads 0.9 cm in diameter, dome head
- 3 small whip handle fragments; 1 tack each
- 1 domed head brass tack from whip handle
- 16 bone beads, 0.5 cm diameter
- 4 bone beads, 0.55 cm diameter
- 6 bone beads, 0.6 cm diameter
- 1 bone bead, 1.0 cm diameter
- 2 bone beads, 1.3 cm diameter
- 1 bone bead, 1.4 cm diameter
- 1 bone bead, 1.5 cm diameter
- 1 bone bead 1.6 cm diameter
- 4 bone beads, 1.75 cm diameter
- 5 olivella shell beads
- 12 small mother of pearl fragments, possible pendant
- 1 shell fragment, unknown
- 9 shell beads 1.0 cm diameter
- 4 shell beads 0.8 cm diameter
- 2 shell beads 0.7 cm diameter
- 2 shell beads 0.6 cm diameter
- 1 bone bead 1.75 cm diameter
- 3 bone bead fragments with holes intact appear to have been same as above
- 6 bone beads 1.4 cm diameter
- 2 bone bead fragments probably same size as above
- 2 bone beads 0.6 cm diameter
- 1 yellow metal hawk bell, flattened 1.8 cm maximum diameter, 1.5 cm minimum diameter, 0.75 cm thick, shank loop missing
- 1 yellow metal tinkler, flattened cone, 0.5 cm maximum diameter, 0.1 cm minimum diameter, 1.8 cm long
- 1 white metal quatrefoil leaf ornament with square center hole 2.6 cm, square leaf tip to leaf tip, 0.8 cm square between leaves

Ritual

- 1 rosary crucifix yellow metal, stamped metal body of figure gone, 4.2 cm long, 2.15 cm across, 0.5 cm width of laterals

DOMESTIC ITEMS

Housewares and Appliances

Culinary

- 1 ferrous metal corkscrew 9.0 cm long, handle cross piece 5.0 cm long, 1.0 cm maximum diameter, 0.4 cm shaft diameter, shaft fitted to handle with tang
- 1 quartzite hand pecked pestle with round stem above shoulder and oval below, 8.2 cm long, shoulder 3.2 cm high, 4.1 cm maximum diameter, 1.9 cm minimum diameter
- 1 ferrous tablespoon or soup spoon, may have been plated

Gustatory

- 1 bluegrey glazed burnt stoneware rim fragment

Household pastimes

- 1 bird bone gaming piece, three continuous circle grooves on small end, one three turn spiral groove on the large end, 5.6 cm long, 0.9 cm minimum diameter, 1.3 cm maximum diameter
- 1 bird bone gaming piece 8.6 cm long, 1.4 cm maximum diameter; 1.0 cm minimum diameter five turn spiral groove on both ends
- 1 bird bone gaming piece 8.5 cm long, 1.5 cm maximum diameter; 0.9 cm minimum diameter four turn spiral groove on large end
- 1 bird bone gaming piece 5.6 cm long, 1.5 cm maximum diameter; 1.0 cm minimum diameter three full circle grooves on each end
- 1 bird bone gaming piece 5.1 cm long, 1.0 cm maximum diameter; 0.85 cm minimum diameter three full circle grooves on one end and a four turn spiral groove on the other
- 1 bird bone gaming piece 4.6 cm long, 1.3 cm maximum diameter 1.0 cm minimum diameter four turn spiral groove on both ends

Cleaning and Maintenance

Sewing

- 1 scissor fragment, 6.0 cm long, finger hole 2.0 cm long 1.5 cm wide

ARCHITECTURAL ITEMS

Construction

Material

- 7 charred wood fragments
- 1 window glass fragment, 0.17 cm thick.
- 4 small wood fragments, one whittled to a dull point (cedar?)

- 1 wood fragment with square cut nail fragment embedded
- 38 small wood fragments, coffin planking?
- 1 window glass fragment 0.10 cm thick
- 1 window glass fragment 0.12 cm thick
- 1 window glass fragment 0.125 cm thick
- 1 window glass fragment 0.13 cm thick
- 1 window glass fragment 0.225 cm thick

Hardware

- 1 ferrous 12d square cut nail
- 13 ferrous square cut nails, common 10d
- 46 ferrous square cut nails, common 8d
- 54 ferrous square cut nails, common 6d
- 6 ferrous square cut nail, common 4d
- 1 ferrous square cut nail fragment with fabric impressions
- 347 square cut nail fragments, ferrous
- 7 ferrous 1.3 cm tacks (carpet type?)
- 3 ferrous round headed square shank tack
- 1 ferrous wire staple 1.6 cm by 3.8 cm
- 1 staple 4.8 cm long; opening 1.0 cm
- 1 ferrous 1.8 cm chisel point counter sunk oval head nail
0.4 cm diameter, head 0.6 cm diameter (possible barrel
nail?)
- 1 yellow metal eye hook 1 3.7 cm long, 1.6 cm eye diameter
- 1 yellow metal wire hook chain four links, 5.7 cm long,
0.8 cm wide
- 1 ferrous hinge, each half has 2 screw holes, shaft to
connect two halves is missing, one shaft mount is missing,
13.0 cm long, 1.0 cm thick probable coffin hinge
- 1 ferrous threaded fragment 1.0 cm diameter, 1.3 cm long

COMMERCE ITEMS

Agriculture and husbandry

- 1 barbed wire fragment; single standing wire 0.3 cm diameter,
one wire barb wrapped two turns around standing wire barb
length 0.8 cm
- 1 ferrous horseshoe nail, 8 regular head

Hunting

- 4 .22 caliber shell casings
- 1 16 gauge Red Head Reliance 1.3 cm brass shell casing
- 1 12 gauge No. 12 U.S. Ajax 2.5 cm brass shell casing
- 1 12 gauge Remington Express 1.9 cm brass shell casing
- 1 Remington Express 12 gauge shotgun shell brass casing 2.1
cm long
- 1 shotgun pellet 0.42 cm diameter
- 1 .22 caliber slug has been shot, probably long rifle

UNKNOWN ITEMS

Glass

- 6 clear glass light green bottle fragments
- 1 clear glass bottle fragment with lettering ...HIR...

- 1 clear slightly purple glass fragment with rim edge possible jar or vase fragment
- 1 clear glass fragment, bottle with lettering ...ITER...
- 1 clear glass fragment, bottle with lettering ...T...
- 1 clear glass fragment, bottle with lettering ...E...
- 6 clear glass bottle fragments, heavily hydrated
- 2 clear glass bottle fragments, slightly hydrated
- 2 clear glass bottle fragments
- 16 clear green glass bottle fragments one with embossed letters (incomplete), three fragments fit base fragment below
- 1 clear green glass bottle base fragment, fits three fragments above, 5.0 cm diameter
- 1 clear green glass bottle finish fragment
- 2 clear glass melted fragments
- 1 clear glass flat fragment 0.3 cm thick
- 1 clear glass flat fragment 0.15 cm thick
- 1 clear glass very thin fragment (light bulb?)
- 1 clear glass jar, two piece mold, hand rolled finish, 5.1 cm maximum diameter, 3.8 cm minimum diameter, 5.1 cm tall to shoulder, 1.3 cm tall shoulder to finish, finish is about 0.5 cm tall and 0.5 cm thick
- 1 white glass fragment

Metal

- 1 aluminum? foil fragment, possible bottle seal
- 218 ferrous metal fragments, two with orange paint pigment, at least 15 with spots of yellow paint, possible can fragments
- 1 ferrous fragment, can rim
- 1 ferrous metal fragment with crimped lip
- 1 ferrous disk 1.4 cm diameter 0.6 cm thick, possible button body
- 1 ferrous metal fragment, with rolled round edge, can?
- 1 ferrous metal fragment, no features too thick for can, 2.45 cm by 3.8 cm
- 1 ferrous metal fragment, badly corroded, appears to be in several layers; also has fabric impressions, possible cloth purse rim fragment
- 1 ferrous metal can, soldered overlapping side seam, crimp soldered bottom seam, crease for push-on lid 1.0 cm high, can 6.4 cm diameter, 7.7 cm tall
- 1 ferrous metal disc fragment 2.25 cm diameter (possible button body?)
- 4 ferrous metal fragments (possible purse closure fragments?) pieces form a 10.0 cm long, 6.4 cm wide, 0.6 cm thick artifact with 0.3 cm halves hinged - hinge intact, made of about 0.6 cm thick pieces riveted together, possibly over cloth
- 1 ferrous metal can fragment, 6.4 cm diameter, 7.8 cm high, soldered button seam, drop press stamped bottom with slight crimp, overlapped no crimp soldered side seam, 0.8 cm high shrunk top rim for drop stamp top, 25% of can gone; part of a red label remains, illegible

- 1 ferrous metal can top, 6.4 cm diameter, 1.3 cm lip, lip soldered to top with slight crimp
- 2 ferrous metal can fragments slightly crimped soldered tin
- 1 ferrous metal fragment about 3.8 cm by 2.45 cm rectangle, no seams but thin, like can without curve
- 1 ferrous metal fragment with fold 3.8 cm by 1.3 cm possible can fragment
- 1 ferrous metal fragment 5.7 cm long possible can rim
- 2 ferrous metal fragments with 90°turn 2.45 cm by 1.9 cm
- 1 ferrous metal fragment 1.9 cm long, 0.6 cm wide, 0.6 cm thick; may be gear tooth stop
- 1 ferrous metal fragment, 0.9 cm long, 0.6 cm diameter
- 3 fragments of a concretion of wood, fabric, and ferrous metal (coffin?)

Leather

- 1 leather strap fragment 13.5 cm long, 2.3 cm wide, 0.2 cm thick
- 1 leather strap fragment 8.3 cm long, 1.9 cm wide, 0.2 cm thick

Seeds

- 1 seed, squash?
- 1 seed hull
- 2 small round seeds
- 1 seed hull (plum? type)

Miscellaneous

- 2 nonmagnetic concretions of white and red material
- 1 reddish orange paper fragment about 1.3 cm square
- 2 burnt clay fragments

GLASS TRADE BEADS FROM 10-NP-108B

by

Roderick Sprague

As principal investigator of the project, I took the prerogative of analyzing the beads. Because of the typical administrative pressures, the analysis did not start until hours before the reburial. The result is that, except for Op 3 and all seed beads, no Munsell Color designations were determined (Table 4). The terminology is consistent with that utilized in previous analyses from the Laboratory of Anthropology and as found in a work scheduled for publication in *Historical Archaeology*.

None of the bead types were typical of these found *only* in the first half of the nineteenth century or the twentieth century but several were types found only in the latter half of the nineteenth century. The only beads not previously reported in Nez Perce territory are the three biconical types. To the best of my knowledge, these 6½ beads are unique to North American bead literature. A guess date for the disturbed burials based only the beads would be 1850-70.

TABLE 4

Description of Glass Trade Beads from 10-NP-108B

Manufacture	N	Shape	Diaph. ¹	Color	Munsell	Diameter (mm)	x	Length (mm)	
10-NP-108 Op 3									
Drawn	1	seed bead	Op.	white	N 9.5	2.2		1.7	
	1	seed bead	Op.	robins egg blue	10B 4/8	3.6		2.4	
	1	seed bead	Op.	blue	5B 4/10	3.4		2.1	
	1	seed bead	Trp.	green	2.5BG 4/6	2.8		3.0	
	3	seed bead	Op.	Cornaline d'Aleppo	7.5R 3/12 : N 9.5	3.8-4.4		2.3-2.4	
	4	pony bead	Op.	white	N 9.5	3.7-4.6		3.4-4.4	
	7	pony bead	Op.	Cornaline d'Aleppo	7.5R 3/12 : N 9.5	4.6-5.4		3.0-3.4	
Wound	1	globular	Op.	white	N 9.5	9.3		9.7	
	3	oval	Op.	white	N 9.5	6.4		11.0	
	1	globular	Tp.	amber	5YR 7/16	6.4		6.7	
10-NP-108 Op 4									
Drawn	293	seed bead	Op.	white	N 9.5	2.7-3.9		1.8-3.1	
	208	seed bead	Op.	black	N 0.5	2.9-3.8		2.0-3.1	
	60	seed bead	Op.	robins egg blue	10B 4/8	2.7-3.6		2.2-2.9	
	3	seed bead	Tp.	dark blue	7.5B 2/10	1.8		1.0	
	3	seed bead	Op.	dark blue	7.5B 2/10	3.4-3.5		2.5	
	8	seed bead	Tp.	dark green	2.5BG 4/6	2.6-2.9		2.0	
	1	seed bead	Op.	yellow	5Y 8/14	1.7		1.4	
	9	seed bead	Tp.	red	7.5R 3/12	1.8-3.3		1.2-2.2	
	98	seed bead	Op.	Cornaline d'Aleppo	7.5R 4/14 : N 9.5	3.3-4.4		1.7-3.2	

Manufacture	N	Shape	Diaph.	Color		Diameter (mm)	x	Length (mm)	Comments
10-NP-108 Op 4									
Drawn	3	pony	Op.	Cornaline d'Aleppo		5.0		3.7	
	6	pony	Tp.	dark green		4.0-5.0		4.1-5.4	
	7½	tubular	Op.	Cornaline d'Aleppo		4.5-7.7		5.4-9.7	
	15	tubular faceted	Tp.	clear		3.6-5.4		34.9-39.2	
Drawn & ground	2	tubular faceted	Tp.	clear		4.2-4.4		28.4-28.6	broken specimens of above
	8	tubular faceted	Tp.	milk white		5.1-6.4		4.6-5.4	
	1	tubular faceted	Tp.	light blue		5.8		4.6	
	1	tubular faceted	Tp.	light blue		7.2		6.8	
	8	tubular faceted	Tp.	light blue		8.7-9.2		7.0-8.2	
	19	tubular faceted	Tp.	dark blue		4.2-5.9		4.6-6.6	
	21	tubular faceted	Tp.	dark blue		6.6-9.2		6.6-8.1	
	1	tubular faceted	Tp.	light green		8.4		3.4	
	1	tubular faceted	Tp.	green		5.6		6.8	

Manufacture	N	Shape	Diaph.	Color	Diameter (mm)	x Length (mm)	Comments
10-NP-108 Op 4							
Drawn & ground	1	tubular faceted	Tp.	green	7.3	6.7	
	1	tubular faceted	Tp.	green	8.4-8.6	7.5-7.9	
	3	tubular faceted	Tp.	green	9.2	7.5	
	1	tubular faceted	Tp.	amber	6.2	5	
Wound	1	globular	Op.	white	5.9	5.7	
	6	globular	Op.	white	7.6-7.7	10.6-11.1	
	1	globular	Op.	white	9.8	8.8	
	1/2	globular	Op.	white	3.8	3.4	with wound indentations
	6	globular	Op.	Cornaline d'Aleppo	9.0-10.9	9.6-10.4	
	2	globular	Op.	Cornaline d'Aleppo	9.7	13.0	with white dot flower applique decorations on outer red, Fig. 9a
	1	globular	Op.	Cornaline d'Aleppo	10.2	10.2	with white swirled combed decoration on outer red, Fig. 9a
	1	oval	Op.	white	5.2	9.0	
	1	oval	Op.	white	6.5	10.7	
	6	oval	Op.	white	6.2	5.7-6.4	
	1	oval	Op.	Cornaline d'Aleppo	4.4	6.2	with white applique flowers on outer red
	1	disk	Op.	white	6.5	2.5	
	1	torus	Op.	white	6.7	5.3	
	1	barrel	Op.	robins egg blue	3.6	5.4	
	1	biconical	Op.	white	10.3	15.9	with wound decoration around circumference with yellow dots, red winding on one end (clearly only one end) forming biconical area 7.2 in. in diameter, Fig. 9a
	4 1/2	biconical	Op.	robins egg blue	6.5-7.0	16.7-17.9	with white winding on one end forming bi- conical area 8.0-8.3 in diameter, Fig. 9a
	1	biconical	Op.	white	10.9	13.6	with red central decoration in white with yellow dots
	29	globular	Tp.	amber	6.4-7.6	4.7-7.6	13 still attached to brass chain (crucifix?)
	1	globular	Tp.	red	6.9	6.1	
	13	globular	Tp.	robins egg blue	6.2-7.1	5.2-5.9	
	41	globular	Tp.	dark blue	5.9-10.0	4.1-7.6	
	8	globular	Tp.	dark green	6.4-7.0	3.3-6.5	
	1	globular	Tp.	dark green	10.2	9.2	
	7	oval	Tp.	red	4.2-5.1	5.4-7.6	
	1	double oval	Tp.	red	4.0	13.7	
	1	torus	Tp.	green	5.8	3.8	
	1	torus	Tp.	green	6.8	3.7	
mandrel pressed	1	globular	Op.	light blue	8.7	7.4	

¹Diaphaneity abbreviations are Op. = opaque and Tp. = transparent. No beads were determined to be translucent.

Part II

Water Line Trench Emergency Excavations

by

Caroline D. Carley

with

Priscilla Wegars and Julia G. Longenecker

ABSTRACT

The site of 10-NP-108, located within the boundaries of the Nez Perce National Historical Park and the Nez Perce Indian Reservation in northern Idaho, is also known as Spalding. The prehistory of the area is that of the Nez Perce and their occupation over thousands of years. The historic period dates to the arrival of Reverend Henry Spalding in 1836 followed by the establishment of the Nez Perce Indian Agency in 1861 and the platting of the town of Spalding at the turn of the century.

With the construction of a new interpretive center within the park boundaries an area of possible historic significance would be disturbed by a road and water line trench. Several test excavations were necessary to determine the extent of the prehistoric and historic remains in the area within the road right-of-way. Information from these tests led to the conclusion that a water line trench might disturb the location of the Office of the Nez Perce Indian Agency building. The 1980 emergency excavations of the trench were carried out to retrieve information concerning the Indian Agency Office.

The nineteenth century material recovered from the excavations could not be attributed definitely to the Indian Agency Office, nor were in situ structural materials encountered which could be assigned to this occupation. However, parts of four canals probably dating to the nineteenth century were encountered and privies and dumps dating to the late 1920s and early 1930s were excavated. Interestingly, the twentieth century components were located within the areas of the nineteenth century canals and a number of artifacts indicated several phases of dumping activity.

ACKNOWLEDGEMENTS

Field work took place between 15 April and 2 May 1980 with a crew ranging from 6 to 25 people under the direction of Caroline Carley with Dr. Roderick Sprague as Principal Investigator. Donna Olson, CETA Director of the Nez Perce Tribal Administration helped to provide a large number of people for the excavation, among who were: Elmer Paul, Leonard Peone, Bernadine Ellenwood, Frances Henry, Calvin Joye, Luther BringingGood, Mary Miles, Jody Connor, Alvin Kane, Jeffrey Ellenwood, John Conner, David White, Adrian Holt, Charles Ellenwood, Sandra Kessler, Melvin Pierre, Larry Lawyer, Julius Ellenwood, Bill Wheeler, Bill Swift, Basil George, Roberto Lopez, Ric Cervantes, and Jonesy Scott. Other members of the crew included Christine McGlinchy, Lowell Campbell, Sam Obermayr, Pamela Liggett, Mark Chavez, Mike Bies, Meg Burns, Tim Jones, Jim McKie, JoAnn McMillen, Smoke Pfieffer, and Lee Sappington. Based on his past experience at the site, Karl Gurcke assisted in the early logistics of field work. When possible, Priscilla Wegars acted as assistant director and did much of the recording of features. Pamela Liggett and Mark Chavez mapped stratigraphic profiles. Chris Fuhrman assisted with equipment and supplies at all times of the day and usually with short notice. During excavations the National Park Service provided a sheltered facility for use by the crew and storage of equipment.

After the field work the Laboratory of Anthropology provided work study help for the cataloguing of artifacts. Priscilla Wegars began the initial bottle and glassware analysis identifying fragmented labels and marks with a keen eye and also analyzed all ceramics from the site with Keith Landreth and Mary Condon adding details to the ceramic identification. Faunal and lithic analyses were conducted by Julia G. Longenecker. Lee Sappington and Joe Martin helped identify cartridge marks and Michael Pfieffer identified pipe fragments. Heidi Mead, Ken Kettener, and David Petersen drafted maps and artifacts and Mary Condon assisted in the typing of the report.

Stephen Shawley of the Nez Perce National Historical Park helpfully answered questions during historical research as did a number of other people questioned in regard to various products and manufacturers represented at the site. These people included Inge Dortmund of the Oregon Historical Society, Walter J. Swanson of Crescent Manufacturing Company, Mickey Karpas of the Oakland Museum, and Gladys L. Rosenfeld of Portland, Oregon. Ray Anderson of University of Idaho's Interlibrary Loan service assisted in our research by acquiring sources not readily available to us. Dr. Frank C. Leonhardy readily gave advice on report photography and David H. Chance helpfully answered questions concerning his past work at 10-NP-108.

Discussions with my colleagues Lee Sappington, Priscilla Wegars, and Tim Jones helped to sort out numerous questions of site interpretation. Last, but not least, is the typist who skillfully pulled the last threads of the report together, Catherine Lubben.

INTRODUCTION

Spalding, Idaho is located within the boundaries of the Nez Perce National Historical Park and the Nez Perce Indian Reservation on the Clearwater River in northern Idaho (Fig. 1).

Historical Background

In 1836, Reverend Henry Harmon Spalding and his wife established the Lapwai Mission among the Nez Perce on the Clearwater River at the mouth of Lapwai Creek. Spalding, wishing to be as self-sufficient as possible and to also make farmers of the Nez Perce, planted gardens and orchards (Thompson 1972:17) and established an elaborate irrigation system using canals (Chance 1980:personal communication).

In 1861, the Nez Perce Indian Agency was established in this same vicinity. A number of structures made up the Agency Complex, among which were: houses, barns, sheds, blacksmith and carpenter shops, storehouses, hospital, church, saw and grist mills, school house, and the Office building (Thompson 1972:Map 5). The Indian Agency remained here until 1902, when it moved to the town of Lapwai (Thompson 1972:89).

With the opening of the Nez Perce reservation to settlement in 1895, the town of Spalding came into existence. The Spalding Townsite Company leased land from the Nez Perce and laid out the town south of the Indian Agency. The founders saw the area as the "gateway to the plateau country" from which agricultural products could be shipped via railroads and steam boats. Though businesses were established, a Northern Pacific Railroad spur line built up the Lapwai Valley in 1899 ended Spalding's role as a shipping point. By 1903 only a few stores and two hotels remained (Thompson 1972:176).

A small settlement continued at Spalding and in 1911 Watson's Store was established by Lewis and Margaret Watson. For over 50 years the store "sold all kinds of articles from beads to butter, from wash tubs to waistcoats . . . In its prime, it was an example of the country store that has become glorified in the American memory--with one difference: most of its customers were Nez Perces" (Thompson 1972:182-183). The store continued in business until illness in 1964 forced the Watsons to retire (Thompson 1972:183). Except for what is known of Watson's Store, written history of the Spalding area ends with the history of the Nez Perce Indian Agency.

Today Watson's Store is property of the Nez Perce National Historical Park and exhibits merchandise similar to that sold at the store between 1910 and 1930. In addition to Watson's Store, the Spalding area consists of the National Park, Post Office, and several residences.

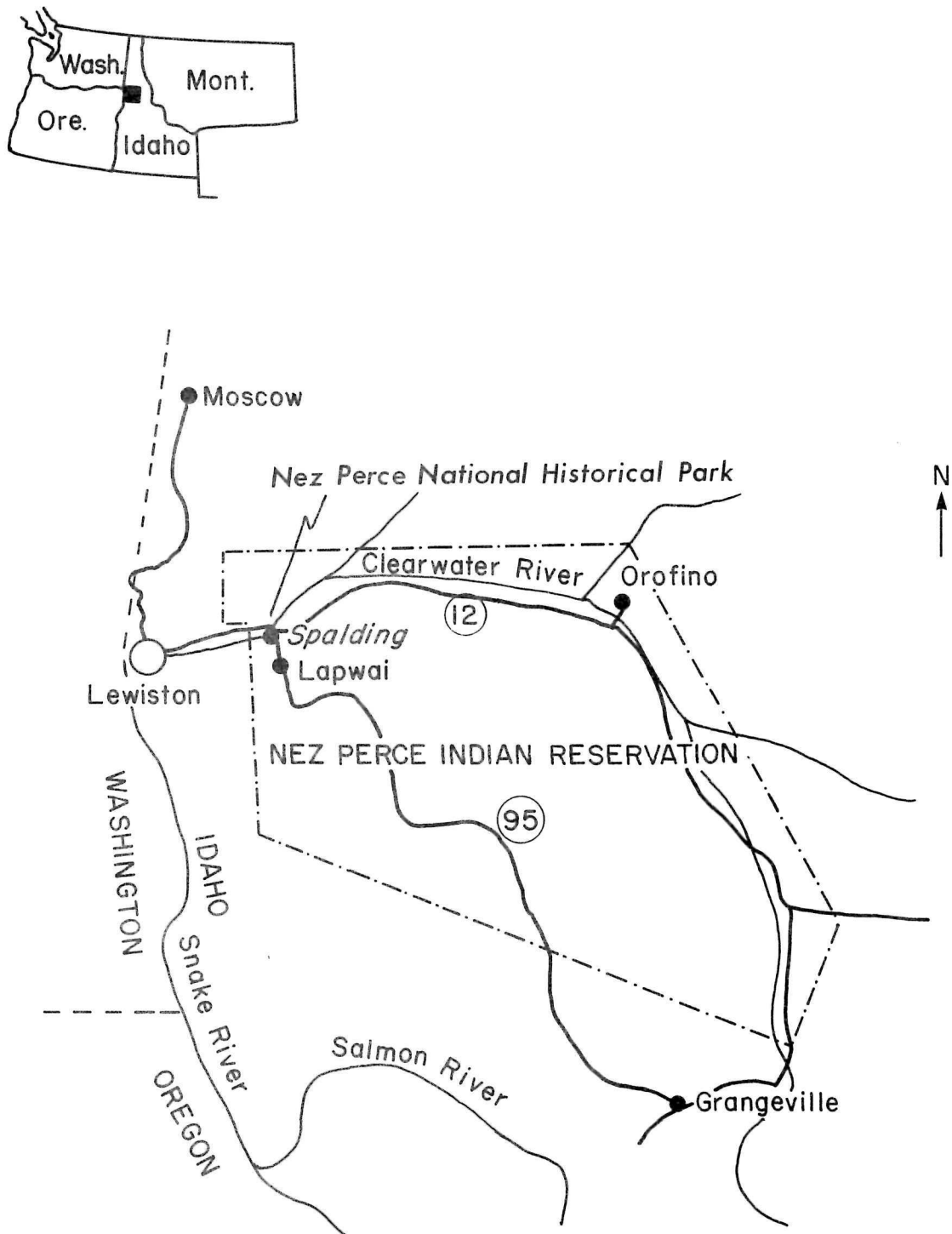


Fig. 1. Location of Spalding, Idaho.

Field Work

Past Excavations

In 1978 a testing program was conducted by David H. Chance through the Laboratory of Anthropology at the University of Idaho in a proposed road right-of-way at 10-NP-108 within the National Park boundaries. The new road would lead from the park and picnic area to the new Interpretive Center on Interstate 95 and it was possible that the route would disturb Agency period structures.

The objective of the testing program was to determine (1) if there were significant historic archaeology deposits deriving from the Nez Perce Indian Agency, (2) if prehistoric deposits were present, and (3) to determine stratigraphic history of the irrigation canal that cut across the line of the road. Using an 1878 photograph, the location of the Indian Agency Office and Council room was calculated to be just outside of the right-of-way, while the Sutler Store appeared to fall within the project zone. Excavations concentrating on this area found burned artifacts and mixed nineteenth and twentieth century components. Though disturbance seemed apparent it was thought that information could be recovered from the Sutler's Store through further excavations. Prehistoric materials, among them, the Lapwai component, were also located (Chance 1978a). Additional work during the summer determined that the area of the Sutler's Store had been occupied by a later building which burned. Plowing or grading had mixed artifacts from the two occupations. Seven canals were located in profile (Chance 1978b). The objective of further work in 1979 was to salvage prehistoric pit houses that lay within the proposed right-of-way (Chance 1979).

Emergency Excavations 1980

With continuing construction of the new Interpretive and Visitor Center it became obvious that a trench for a new water line would run very near to or through what Chance had calculated to be the area of the Indian Agency Office. In an effort to retrieve information which the water line trench might disturb, University of Idaho Laboratory of Anthropology archaeologists were requested to excavate the trench (Fig. 2).

Field work began April 15 and continued to May 2, with 16 working days and a crew of archaeologists ranging from 6 to 25 people (Fig. 3). The Nez Perce Tribal Administration provided a large number of people to work on the excavations. Building contractors staked the route of the water line which followed a magnetic north south line 24 m, then turned 45° west for an additional 16 m. This was then divided into 40 1 m² excavations units and all units were taken to a depth of 110 cm in 10 cm levels (Fig. 4). A line for an additional connecting east-west slit trench was later added by the contractors. This trench was 7 m in length and 50 cm in width and excavated to a depth of 80 cm.

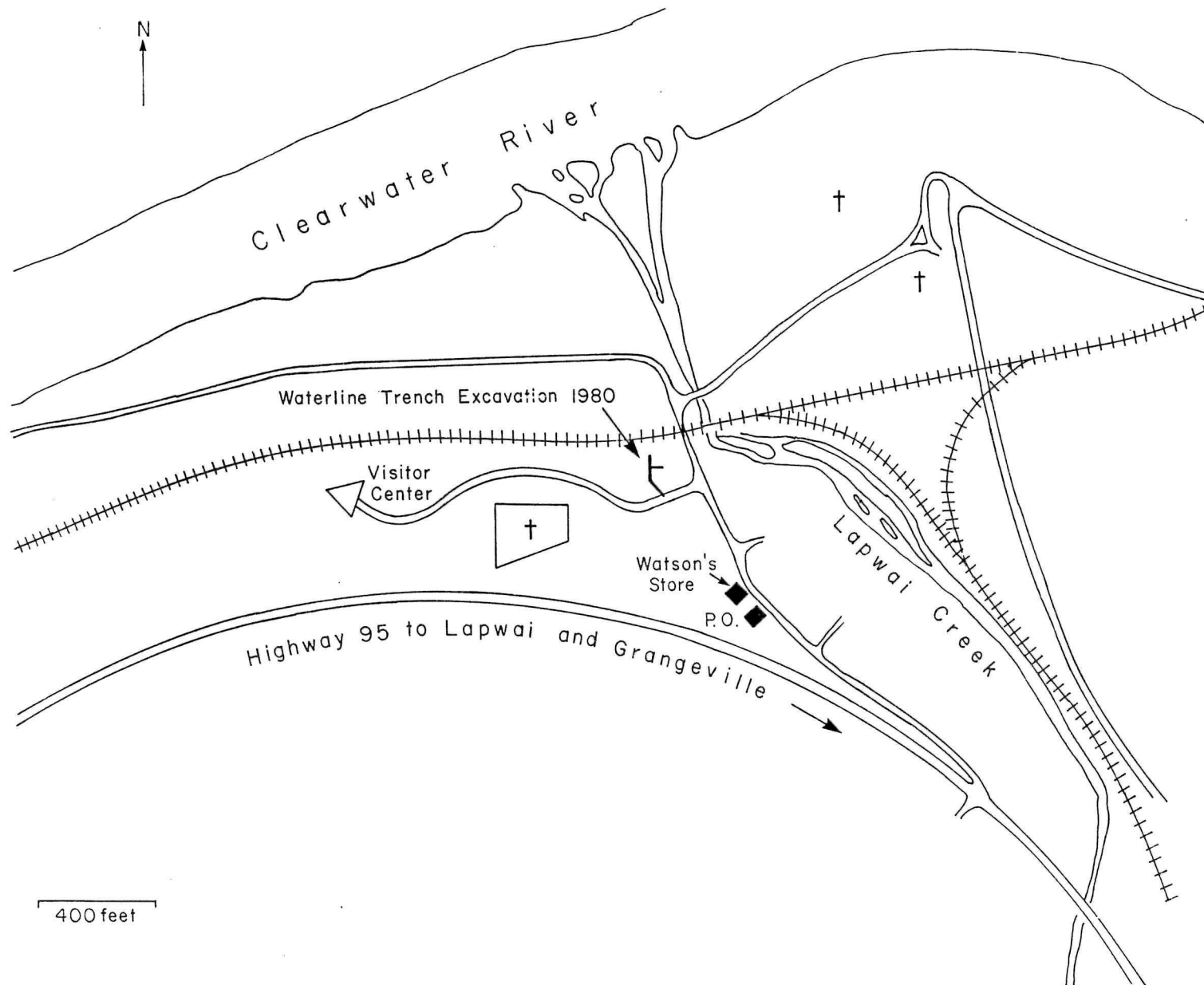


Fig. 2. Location of water line trench in Nez Perce National Historical Park.

*a**b*

Fig. 3. 10-NP-108 water line trench excavations. *a*, looking south; *b*, looking northwest.

*a**b*

Fig. 4. 10-NP-108 water line, spring 1980. *a*, looking northwest before excavations; *b*, looking north after excavations.

Additional utility trench lines necessitated 41 auger holes at 1 meter intervals and various depth of 10 cm levels to be put in near the road east of the excavations. The north-south line consisted of 18 50 cm deep holes and the east-west line 17 1½ m deep holes east of the road and 6 2 m deep holes under the road itself. Only a few flakes and several glass fragments were recovered among the 41 auger holes.

Among the features encountered during excavation of the water line trench were canals, privies, and dumps. The boundaries of the canals were difficult to determine during excavation, showing up primarily in profile as the trench cut through them. The canals were quite large, each covering several units and numerous levels and appearing to be oriented in a northwest/southeast direction. Though the actual use of the canals probably dates to the Mission or Agency periods (Chance 1978b:8), artifacts recovered from the canals date to both nineteenth and twentieth centuries. In cases in which the canals were allowed to fill without disturbance of intensive artifact deposition, natural stratigraphy of sand and gravel is present. Later activity at the site was concentrated in the areas of these canals. Four privies intruded through the lowest levels of Canal 1 and dumping of trash increased in the upper levels of both Canal 1 and Canal 2. These activities date to the 1920s and 1930s.

For further discussion the excavation units and levels have been collapsed and combined into analytical units based upon stratigraphy, artifact distribution, and artifact analysis. These descriptive and interpretive units were determined after the field work and during artifact analysis as different components became evident (Table 1, Fig. 5).

TABLE 1

Excavation Units

	0-5	6-13	41-47	14-20	21-26	27-30	31-40
Levels							
1-4	Other	Dump A	Dump A	Dump B	Other	Other	Other
5-11	Other	Canal 1	Canal 1	Canal 2	Canal 3	Other	Canal 4

Little was recovered outside of the canals, privy features or dump areas. What few items were found outside of these proveniences have been combined under the term "other."

Excavation Units 0-5

The upper levels of units 0-5 were disturbed by activity related to the nearby well and pump house. Feature 1 in Unit 3 was a trench for NPS utility lines (Fig. 6). The lower levels (Stratum 3) were undisturbed and contained most of the in situ lithic materials from the site.

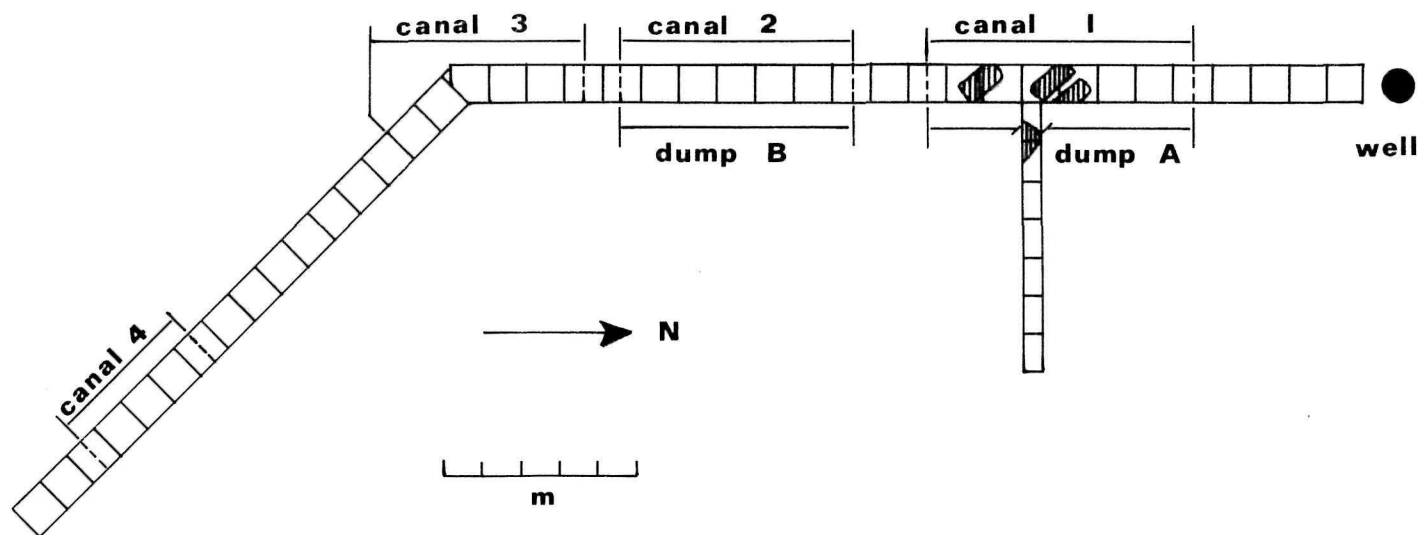


Fig. 5. Plan view of approximate boundaries of major features: canals, dumps, and privies.

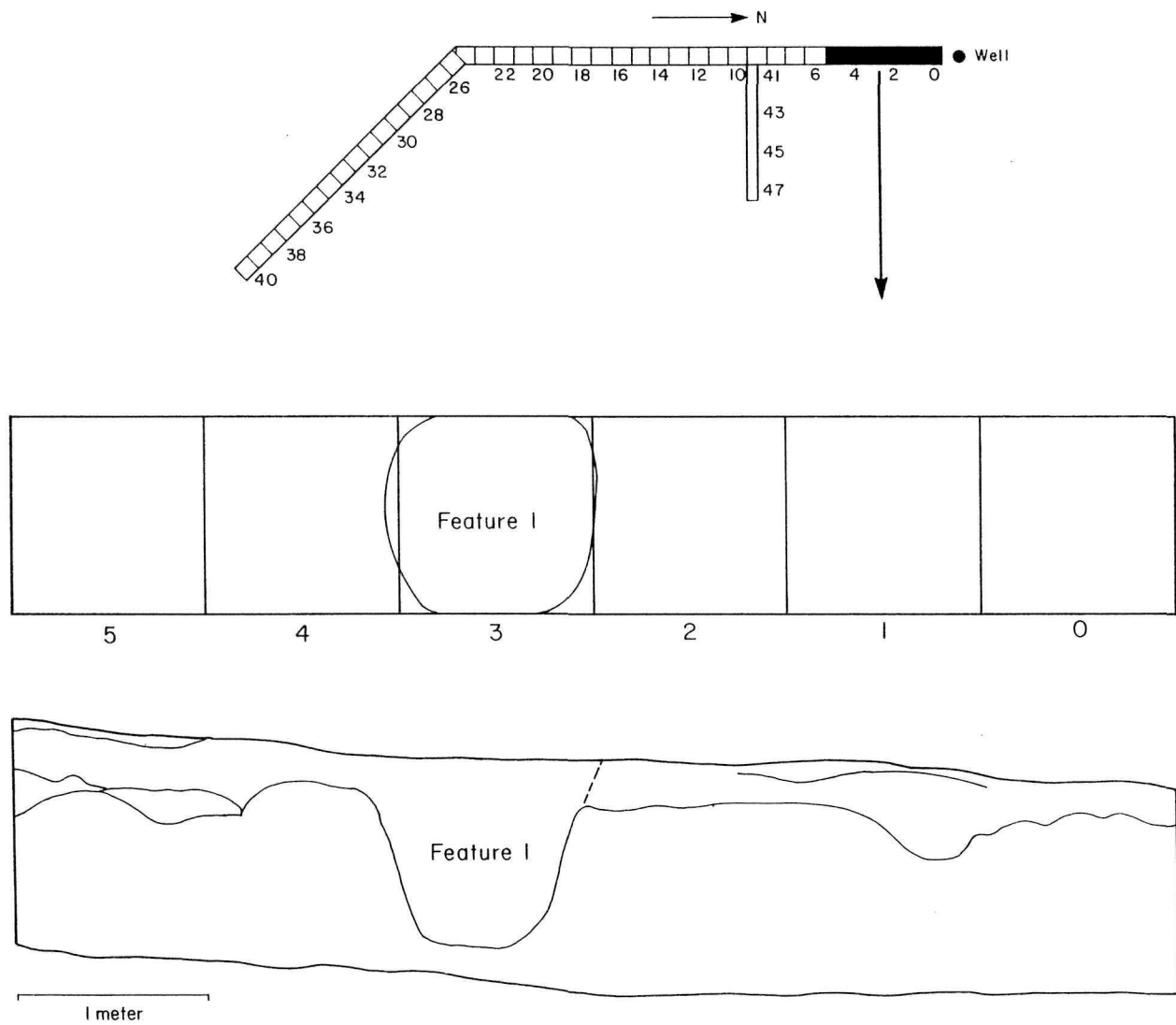


Fig. 6. Plan view and profile of excavation units 0-5.

Excavation Units 6-13, 41-47

Canal 1 - The lower levels of Canal 1 were intruded through by twentieth century privies, features 10, 18, 15, and 17, which appeared at approximately 50-60 cm below surface. The upper levels of the canal area were filled with debris, Dump A. Only a portion of stratified canal fill remained intact (Figs. 7, 8).

Feature 10 - This privy pit measured 120 cm in length, 65 cm in width and ca. 60 cm in depth (Figs. 7, 9). The fill of the privy was loose organic soil mixed with lime and compact grey soil. Both the lime and dirt appeared to have been used to periodically fill the privy during use. Artifacts from the privy consisted almost entirely of bottles located in a stratum of loose soil and fecal matter. Based on the artifact analysis, primarily the bottles, this privy dates 1924-1932 and can possibly be narrowed further to 1924-1928.

Feature 18 - Only a small portion of this privy was excavated, as only the northwest corner was cut by the slit trench and units 41 and 42. The privy consisted of loose organic fill mixed with lime and ash. Because it was not fully exposed the exact size of the privy is unknown, though it can be estimated to have measured at least 60 cm in width. It is uncertain whether it was a one-hole or two-hole privy, but based on information of other privies at the site, it was probably a two hole privy and thus measured about 120 cm in length. The privy was 80 cm deep (Fig. 8). Contents of Feature 18 were similar to those of Feature 10. A large number of bottles were recovered which date the privy to before 1930. It is possible that the super structure was burned after use, as the upper levels of the pit consisted of burned soil and charcoal.

Feature 15 - Another privy, Feature 15, measured 115 cm in length, 55 cm in width, and 40 cm in depth (Fig. 7). Unlike other privies at the site, Feature 15 did not contain lime or ash. It was filled with loose, organic soil; newspaper; seeds; canning jars; window glass; bottles; and ceramic wares. A ceramic vessel from this feature, made by "Homer Laughlin," post dates 1933.

Feature 17 - Feature 17 was an additional privy separated from Feature 15 by a 10 cm septum or bulk. Similar in size to Feature 15, this privy measured 125 cm in length, 57 cm in width, and ca. 100 cm in depth (Fig. 7). The privy was filled alternately, but sporadically, with ash and soil. Artifacts consisted of canning jars, bottles, ceramic wares, and other artifacts. Just above Feature 17 were pockets of orange burned soil (Feature 13) and a layer of scattered ash which may suggest burning of the privy structure. A ceramic vessel matching that of the dated Homer Laughlin piece from Feature 15 was recovered from this privy. Thus, both privies post date 1933.

All four privies were of similar size, shape and orientation and in the same vicinity (Fig. 10). The datable artifacts suggest that Feature 10 and Feature 18 are earlier than Feature 15 and Feature 17.

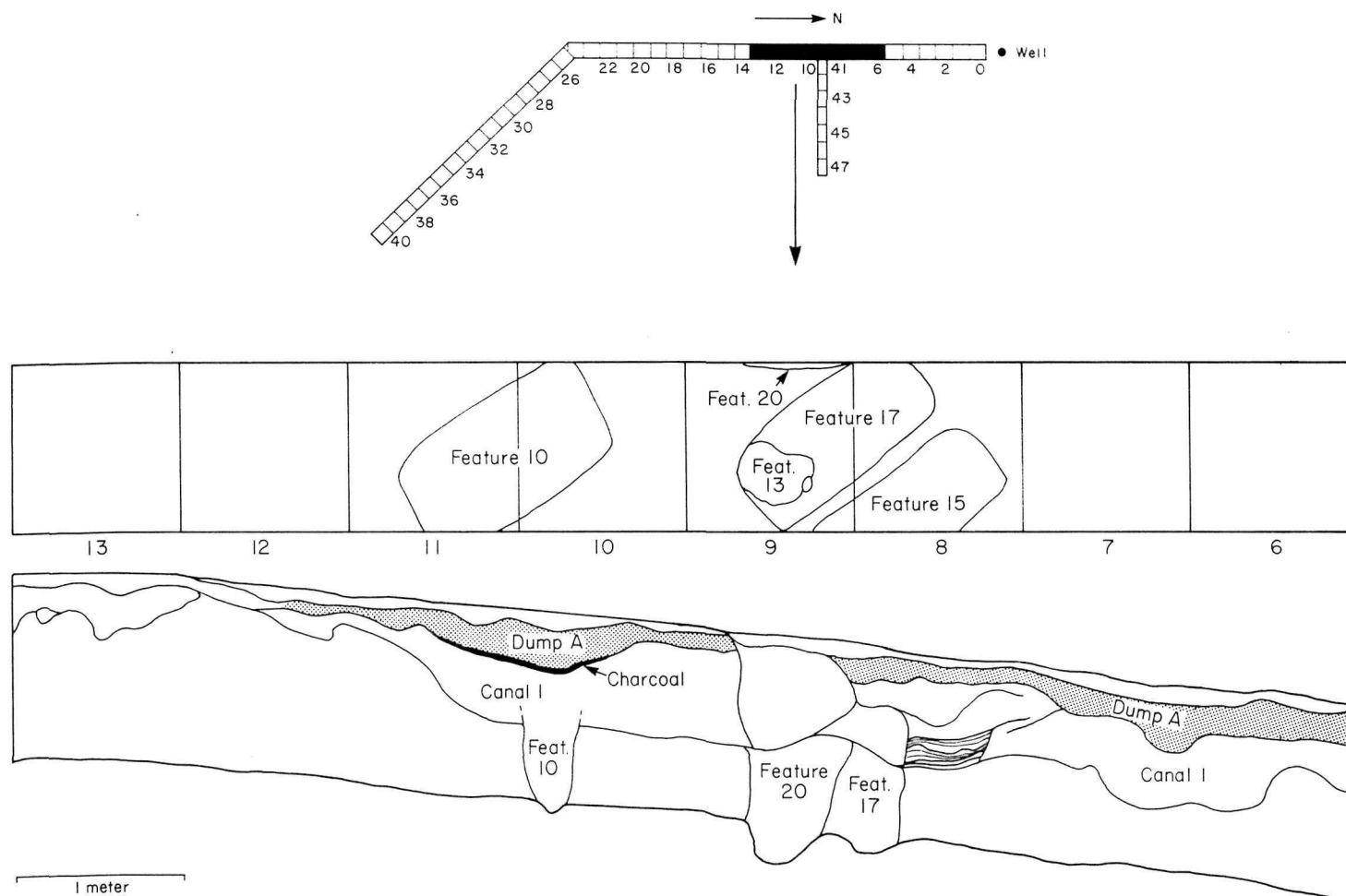


Fig. 7. Plan view and profile of units 6-13; Canal 1, Dump A, and privies.

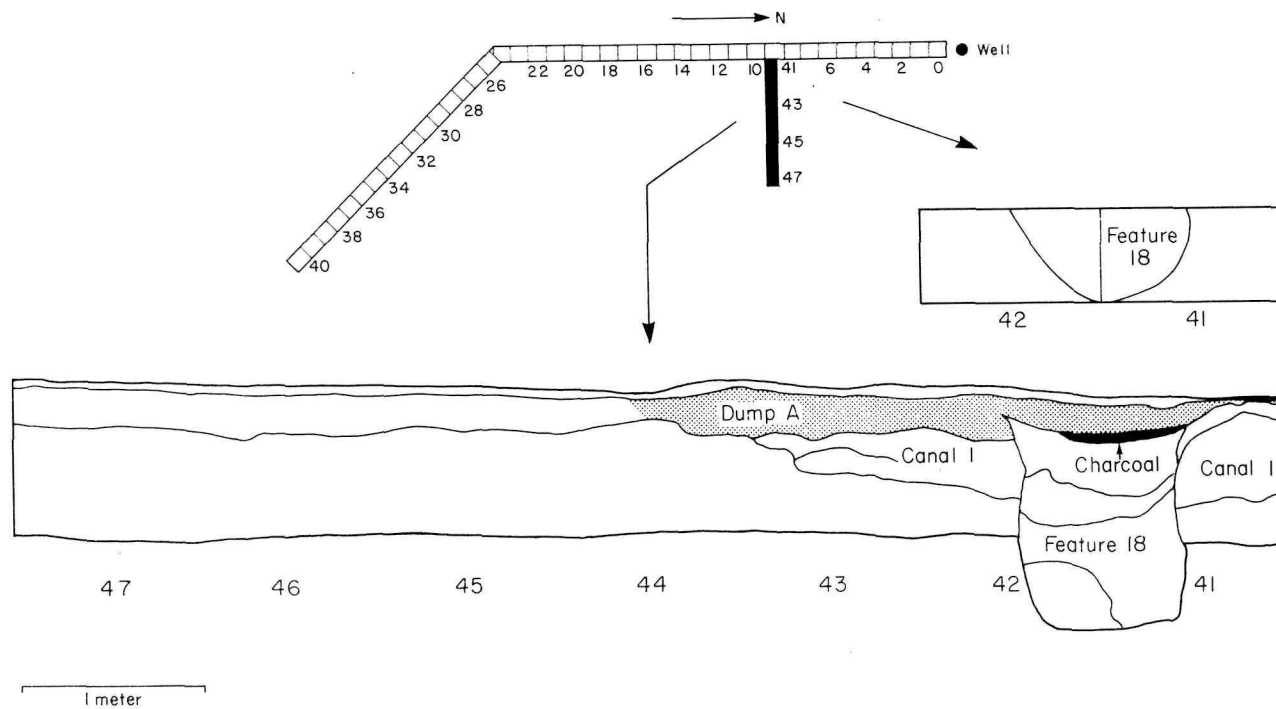


Fig. 8. Plan view and profile of units 41-47; Canal 1, Dump A, and Privy Feature 18.

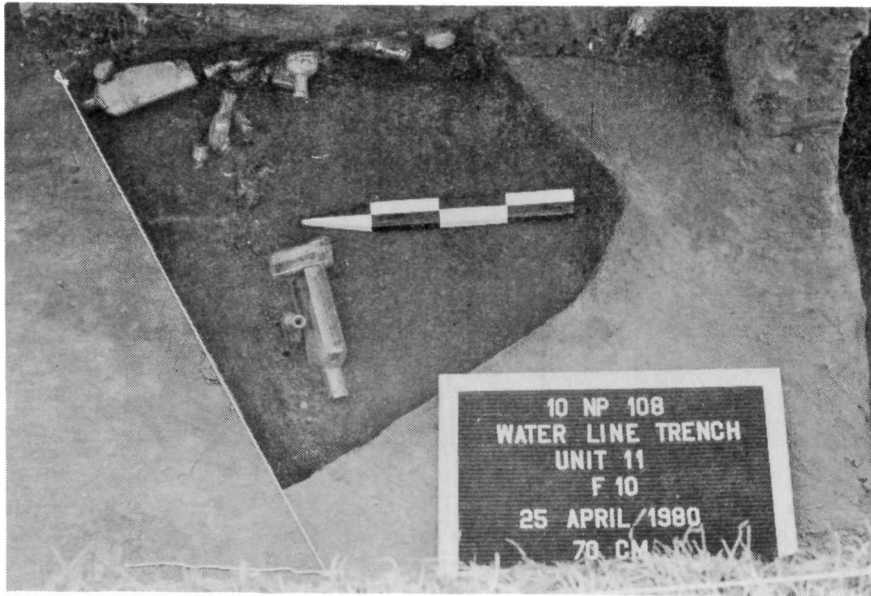
*a**b*

Fig. 9. 10-NP-108 water line trench excavation features. *a*, southwest corner of privy, Feature 10; *b*, Canal 3 in west wall profile of trench.

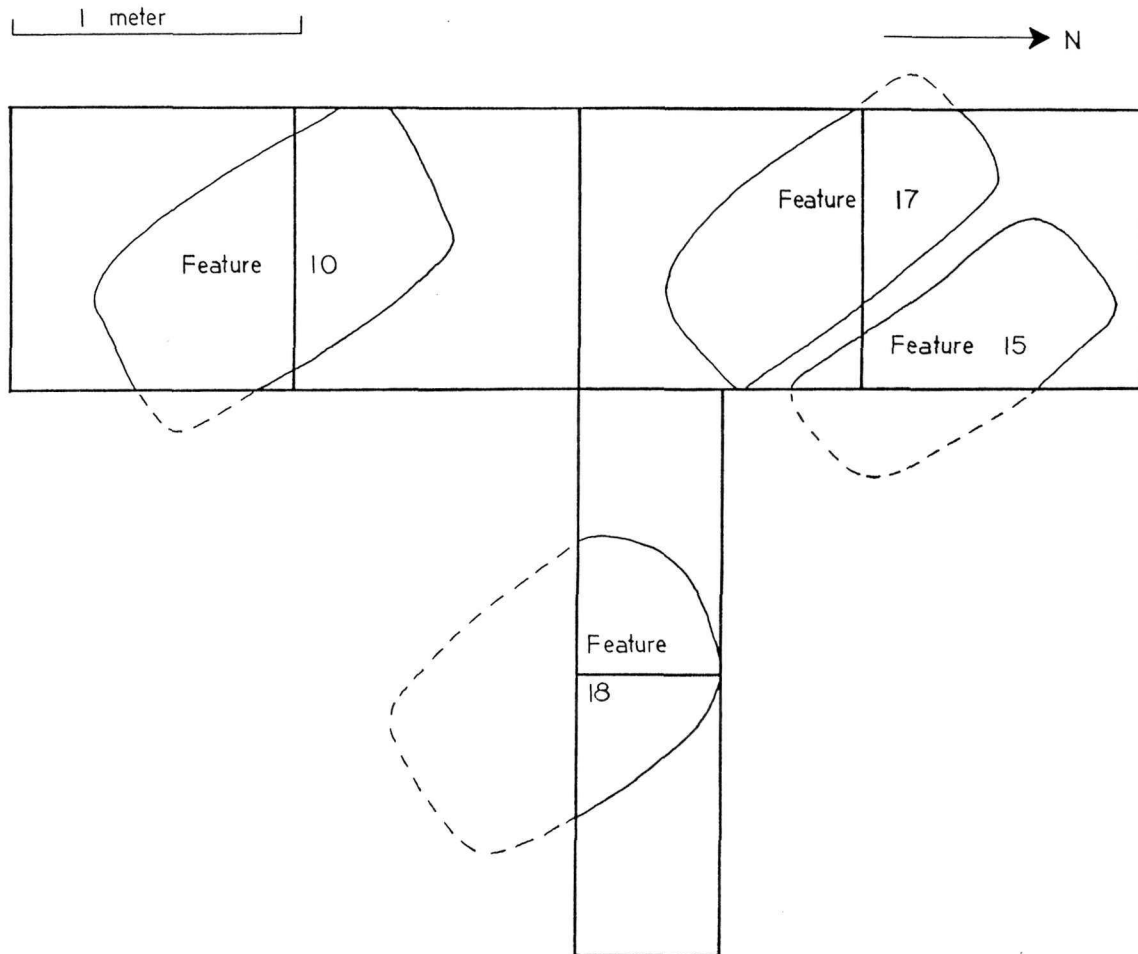


Fig. 10. Location and orientation of four privy features.

Dump A - When the privies were no longer in use the area became filled with a scattering of cultural debris. Though artifacts were more dense in the uppermost or later levels, 1-2, dumping had begun in levels 3 and 4, just above the privies (Figs. 7, 8). The cultural materials from this dump area extended horizontally beyond the boundaries of the canal area. The materials from Dump A consisted of items such as buttons, clothespin springs, and fragmented pieces of glass and ceramic.

Excavation Units 14-20

Canal 2 - The lower levels of Canal 2 were filled with debris of rock, wood, and some nails recorded as Feature 5. The upper levels of the canal area were filled with relatively large, densely deposited cultural materials later designated as Dump B. A small portion of stratified canal fill remained intact at the northern edge of the canal (Fig. 11).

Feature 5 - Feature 5 consisted of large rocks at 40-100 cm below surface in units 15-17 (Fig. 11). The angular rocks, averaged 50 cm in diameter and were located in the lowest levels of Canal 2. Soil at this depth was mottled and loose with rocks packed tightly together. Artifacts found in association were primarily nails and glass fragments. Some wood in poor condition was noted. For the following artifact discussions and tallies, artifacts from the Feature 5 rock concentration are under the heading "Canal 2."

Dump B - Artifact densities increased in the upper levels of the canal at 30-40 cm below surface, becoming increasingly more dense in the uppermost levels, 10-20 cm below surface. This artifact concentration, designated Dump B, spread over several units, but was primarily found in units 15, 16, and 17 (Fig. 11). Artifacts included pots and pans, bottles, ceramic wares, and glasswares.

Excavation Units 21-26

Canal 3 - The lowest and earliest levels of Canal 3, especially at the northern edge, retained the stratigraphy of canal fill. Fine lenses of sand, gravel, and clay could be seen in profile (Figs. 12, 9).

Feature 16 - Within the boundaries of the canal was a concentration of butchered bone extending from a depth of 50 to 70 cm and over the north side of Unit 26. The bone from Feature 16 is discussed in the "food remains" section of the domestic items.

Excavations Units 27-40

Canal 4 - Because the trench began an uphill climb due to the increased angle of the slope and because road work had already cut and filled on top of these southernmost excavation units, the bottom of Canal 4 was not

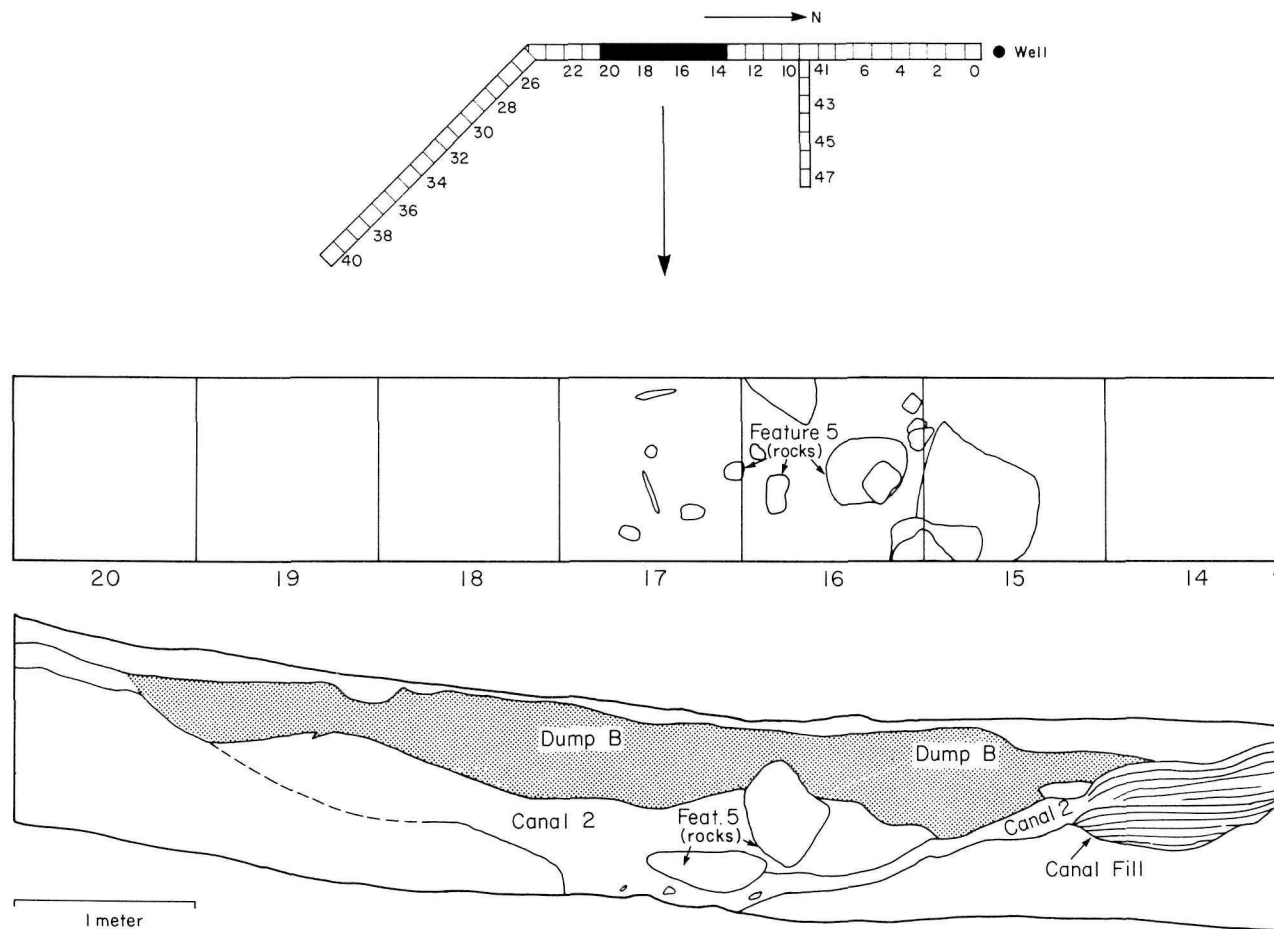


Fig. 11. Plan view and profile of units 14-20: Canal 2, Dump B, Feature 5.

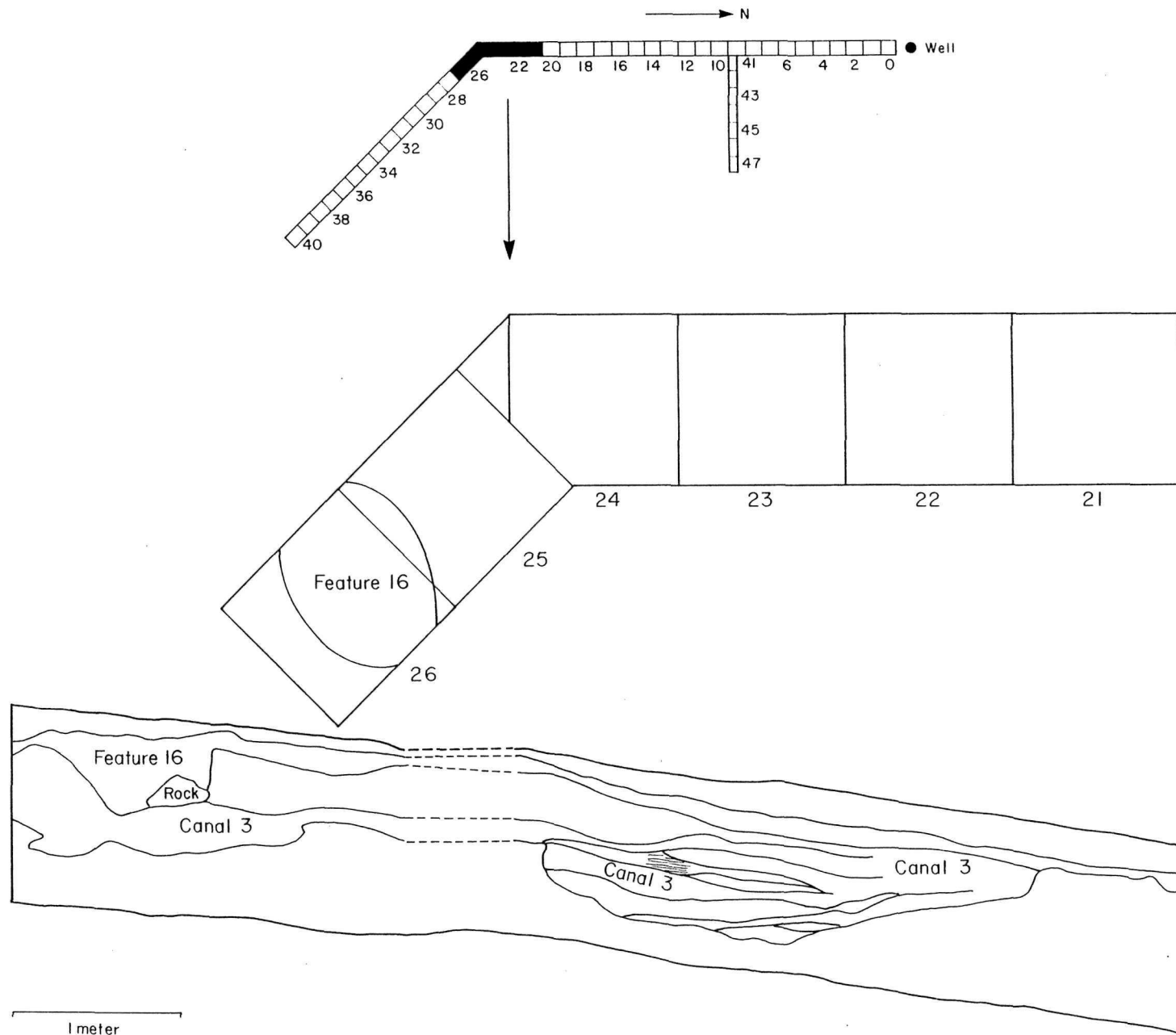


Fig. 12. Plan view and profile of units 21-26: Canal 3 and Feature 16.

exposed when the required 110 cm depth had been reached. This canal appeared to be the largest and most intact canal cut through during the trench excavations, and lenses of sand, gravel, and clay were seen throughout the lower levels of excavation, though time did not allow detailed mapping of the fine stratigraphy (Fig. 13b).

Feature 9 - Feature 9 in Unit 30 was an area between canals 3 and 4 in which artifacts extended below the surface area and feature boundaries were vague. Below the surface a shallow trench and board were recorded as Feature 9 (Fig. 13a). As artifact analysis continued tallies of nail distribution showed wire and cut nails extending deeper than the originally recorded Feature 9 and deeper than other areas outside of the canals. The significance of this feature, defined primarily by the presence of nails at lower levels, is still unknown.

Artifacts

A range of nineteenth and twentieth century artifacts were recovered from the water line trench excavations, though the majority of items date to the 1920s and 1930s. Of these, a large percentage are buttons, bottles, jars, pots, pans, ceramic wares, and glasswares, most of which are from the privies and dump areas. The excavations only cut through the dump areas and privy Feature 18, so artifacts from these proveniences are only a sample of what may exist.

To aid in the interpretation of activities at the site and the sequence of such activities, the artifacts have been divided into general functional categories. These divisions are based on attempts to (1) present a coherent description of similar artifacts within material and functional classes, (2) gain knowledge of the material culture of the occupants of the site, and (3) understand the various areas, levels, and kinds of artifact deposition. Containers, generally used for specific purposes and discarded soon after this purpose has been fulfilled, have been grouped within one functional category--containers. This category includes bottles, jars, cans, and the lids and caps to these containers. Though it can be argued that a cosmetic jar is a personal item and a canning jar a domestic or household item, for the purpose of this study, containers such as these are treated separately from other artifact categories. Because of their unique function, the category of domestic items includes kitchenwares, glasswares, and ceramic wares as well as furniture, wall, door and window hardware. Items used and found primarily within a home, probably used by more than one person until broken, worn out, or torn down are included within this category. Somewhat misleading is the term "kitchenwares," this is not a strict functional category to include everything used in the kitchen, but rather refers to *metal* items of the home, usually found in the kitchen. Personal items include clothing, hardware, toys, and other items probably used by one person and lost easily. Construction and maintenance items include tools and materials necessary for construction, maintaining, or destroying buildings, fences, and gardens. Machinery and transportation are under one heading for the simple fact that often farm machinery and transportation were one and the same.

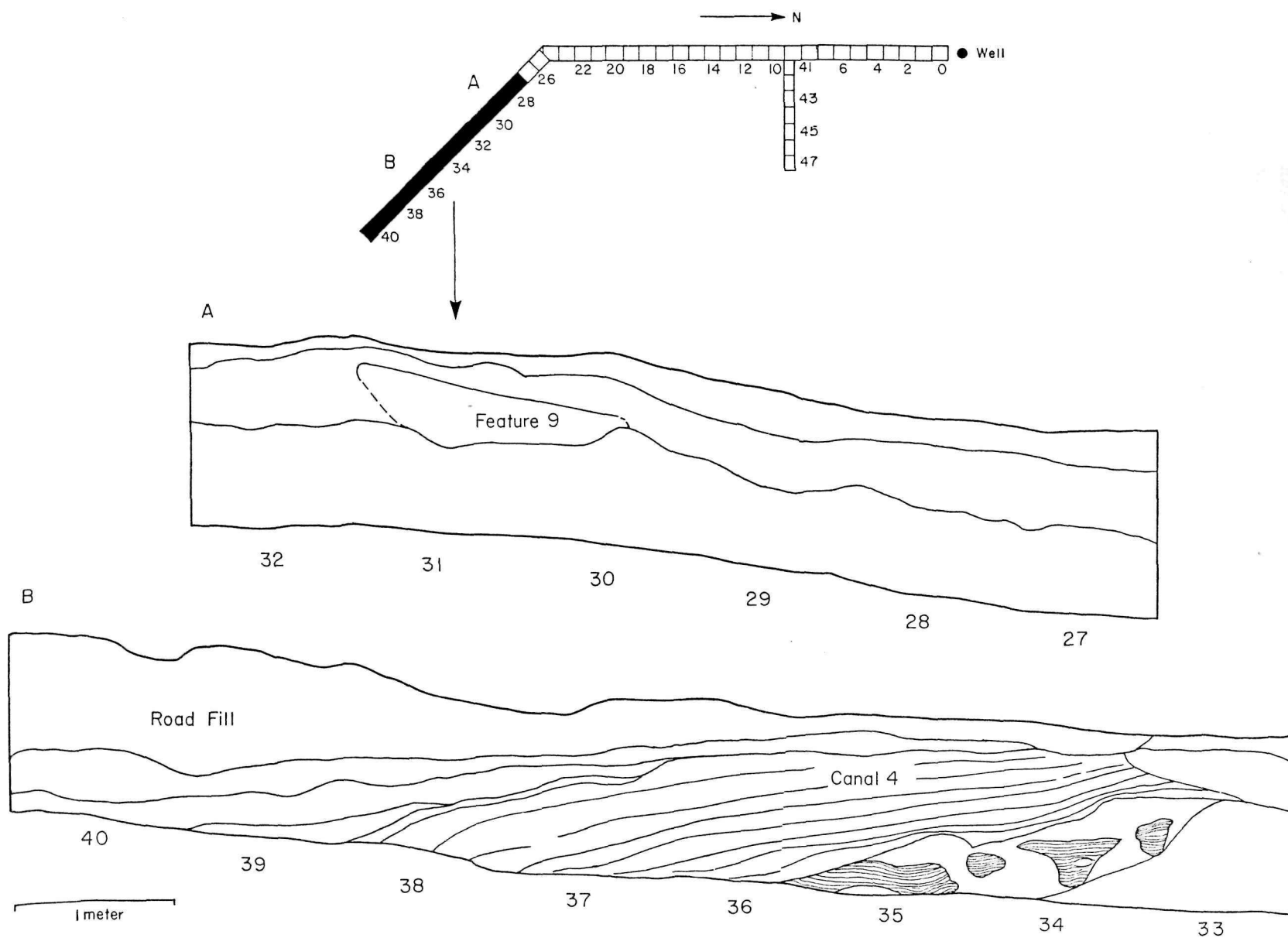


Fig. 13. Profiles of units 27-40. a, profiles of units 27-32: Feature 9; b, profile of units 33-40: Canal 4.

Though all artifacts, regardless of how fragmentary, have been catalogued, time and money did not allow detailed analysis of the more fragmentary and less diagnostic items.

CONTAINERS

Bottles

Due to the number and kinds of bottles and jars recovered, a typology has been constructed based on the shape of the container, shape of the finish, and probable contents. Where possible, identified shapes of bottles and finishes are based on nineteenth and twentieth century catalogues of bottle manufacturers (Table 2). Manufacturing techniques are discussed and manufacturing marks have been identified in most cases (Table 3).

Functional categories are Food, Beverage, Medicine, and Cosmetic. The Food category includes commercial foods such as food additives, extracts, spices, preserves and condiments, and also home foods such as those of canning jars. The Beverage category has been divided into alcohol, including beer, wine, and liquor, and into non-alcohol. Medicines are divided into patent and prescription. Patent medicines are defined as those which were sold nationwide and usually came in embossed bottles. These were most popular in the late nineteenth century. Prescription medicines are those which were probably prescribed by a doctor or druggist on an individual basis and bottled by the pharmacist. The Cosmetics category includes such things as perfume, cold cream, and shoe polish.

Since more details can be discerned, and with more confidence, from complete bottles than from fragmented rims and bases, this section has been separated into bottles, bottle rims, and bottle bases for description and discussion purposes.

Food Bottles: Extracts (Table 4)

Flat Extract, Packer Finish, Bottle Type 1, (Fig. 14a) - This bottle type is represented in sizes of 2, 4, and 6 oz. All are clear and machine made with cork closures.

All bottles were manufactured by the Illinois Pacific Glass Company between 1902 and 1930 though the base marks vary (Toulouse 1971:268). Twenty-three 2 oz. bottles are marked with IPG within a triangle, while the remaining 19 2 oz. bottles and all 4 oz. (5) and 6 oz. (3) bottles are marked with the company's mark of IPGCO within a diamond.

Remnants of green and red paper labels on several specimens made it possible to identify the product as Royal Club Brand Extract of Vanilla by Lang and Company of Portland Oregon. Though parts of labels only remained on several of these bottles they are all assumed to have contained the same product.

TABLE 2

Bottle shapes

Bottle shape	Size (ounces)	Reference	Bottle type	Number
Flat extract	2, 4, 6	Putnam 1965:49	1	50
St. Louis Flat Extract	2	Putnam 1965:50	2	14
Full Measure Extract	2, 4	Putnam 1965:51	3	5
Tall Ball Neck Panel	4	Putnam 1965:47	4	1
Root Beer Extract	2, 4	Putnam 1965:39	13, 15	48
Taper Extract	2	Putnam 1965:54	12	1
Square Taper	4		8	10
Rectangular Taper	2, 4		5	6
French Square	2, 4	Putnam 1965:30	7, 9	10
Practical Oval	2	Putnam 1965:23	11, 25	2
Graduated Double Scale				
Crown Oval	2	Putnam 1965:28	18	1
Royal Oblong	2	Putnam 1965:24	10	1
Graduated Double Scale				
Philadelphia Oval flask	12	Putnam 1965:171	14	1
Oval flask	16		16	3
Beer	12		20	1
Soda	6½		21	1
Cologne	2	Dominion post-1913:52	6	5
Toilet accessory	-1	Official Gazette of the U.S. Patent Office 1934:528	19	1
Paneled Polish	2	Putnam 1965:64	17	1
Canning jar	16, 32		22, 23, 24	5
Round pickle/preserve	8		26	1
Band salad dressing	10	Putnam 1965:227	27	1
Castor oil/long neck panel	2	Putnam 1965:52	28	2
4 sides panelled				
Oval	12		29	1
Cold cream	3		30	1
Round cosmetic	1½		31	1

TABLE 3
Manufacturing marks on bottles








Mark	Bottle Manufacturer	Dates	Reference	Bottle types	Contents	Number
	Diamond Glass Company Royersford, Pennsylvania	post-1924	Toulouse 1971:550	2, 7a	Extracts	15
 LYRIC	Illinois Glass Company Alton, Illinois	1916-1929	Toulouse 1971:264	11, 25	Prescription medicine	2
	Pacific Coast Glass Co. San Francisco, California	1925-1930	Toulouse 1971:414	13 16 21	Extract Liquor Soda	36 2 1
I.P.C.CO.	Illinois Pacific Glass Co. San Francisco, California	1902-1930	Toulouse 1971:268	7	Prescription medicine	1
	Illinois Pacific Glass Co. San Francisco, California	1902-1930	Toulouse 1971:268	1 5 13 15 16	Extract Extract Extract Extract Extract	23 2 10 1 1
	Illinois Pacific Glass Co. San Francisco, California	1902-1930	Toulouse 1971:268	6 1 5	Cologne Extract Extract	2 30 1
	Puget Sound Glass Company Anacortes, Washington	1924-1929	Toulouse 1971:427	13	Extract	1
	Unknown			12	Extract	1

TABLE 4
Food bottles: extracts

Shape	Finish	Bottle type	Color	Volume oz.	Product Manufacturer	Dates	Bottle Manufacturer	Date	Privies F10 F18		Total
Flat extract	Packer	1a	Clear	2	Lang and Co.	1884-1932	Illinois Pacific Glass Co.	1902-1930	14	28	42
Flat extract	Packer	1b		4	Lang and Co.	1884-1932	Illinois Pacific Glass Co.	1902-1930	2	3	5
Flat extract	Packer	1c		6	Lang and Co.	1884-1932	Illinois Pacific Glass Co.	1902-1930		3	3
St. Louis Flat Extract	Packer	2	Clear	2	Lang and Co.	1884-1932	Diamond Glass Co.	Post-1924	14		14
Full Measure Extract	Patent/ Extract	3a	Clear	2	Lang and Co.	1884-1932			2		2
Full Measure Extract	Patent/ Extract	3b		4	Lang and Co.	1884-1932			3		3
Tall Ball Extract	Patent/ Extract	4	Clear	4					1		1
Rectangular Taper	Double Bead	5a	Clear	2	J.A. Folgers and Co.	1900-1929	Illinois Pacific Glass Co.	1902-1930	2	3	5
Rectangular Taper	Double Bead	5b		4	J.A. Folgers and Co.	1900-1929			1		1
Square Taper	Patent/ Extract	8	Clear	4	Closset & Devers	Pre-1928			2	8	10
Taper Extract	Patent/ Extract	12	Clear	2	Garrett & Co.					1	1
Root Beer Extract	Cork & seal	13a	Clear	2	Crescent Mfg. Co.		Pacific Coast Glass Co.	1925-1930		13	13
Root Beer Extract	Cork & seal	13a	Clear	2	Crescent Mfg. Co.		Illinois Pacific Glass Co.	1902-1930		10	10
Root Beer Extract	Cork & seal	13a	Clear	2	Crescent Mfg. Co.		Puget Sound Glass Company	1924-1929		1	1
Root Beer Extract	Cork & seal	13b	Clear	4	Crescent Mfg. Co.		Pacific Coast Glass Co.	1925-1930		23	23
Root Beer Extract	Prescription	15	Clear	2			Illinois Pacific Glass Co.	1902-1930		1	1



Fig. 14. Extract bottles. a, Type 1; b, Type 2; c-d, Type 3.

Max Lang established the firm of Lang and Company in Portland, Oregon in 1884 (Inge Dortmund 1980:personal communication) after working with Haas Brothers of San Francisco (Zumwalt 1980:267). According to Langs' daughter (Gladys Rosenfeld 1981:personal communication) the firm developed into the largest wholesale grocery company in the Northwest with houses in Portland, Medford, Astoria, Eugene, Nyssa, Lewiston, and Boise. The firm was called the Intermountain Grocery Company in eastern Oregon and Idaho (Gladys Rosenfeld 1981:personal communication), but also seems to have been known as General Grocery in Portland (Inge Dortmund 1980:personal communication) and the National Grocery Company of Seattle (Zumwalt 1980:267).

According to two sources (Inge Dortmund 1980:personal communication; Zumwalt 1980:267) Max Lang died in 1918 and his wife died in 1931. According to their daughter, however, Max Lang, not his wife, died in 1931 (Gladys Rosenfeld 1981:personal communication). All three sources agree that the firm ceased to exist no later than 1932.

Among Lang and Company products other than extracts was Royal Club Brand Olive Oil (Zumwalt 1980:267).

All Lang and Company extract bottles of this kind were recovered from two privies, features 10 and 18. Thirty three were from Feature 18 and 16 from Feature 10. Six oz. bottles were recovered only from Feature 18. In both features, 2 oz. bottles were by far the most common.

St. Louis Extract, Packer Finish, Bottle Type 2 (Fig. 14b) - All specimens of this shape and finish have a 2 oz. capacity, are machine made, and are clear with cork closures.

The bottle manufacturer appears to have been Diamond Glass Company of Royersford, Pennsylvania, identified by the base mark of a diamond. If the mark has been correctly identified, the bottles post date 1924 (Toulouse 1971:550).

Paper label fragments again made it possible to identify the contents of these bottles as Royal Club Brand Extract of Vanilla, produced by Lang and Company of Portland before 1932.

All 14 bottles were recovered from one privy, Feature 10.

Full Measure Extract, Patent/Extract Finish, Bottle Type 3 (Fig. 14c-d) - Five Bottle Type 3 specimens were recovered in 2 oz. and 4 oz. sizes. All are clear, blown in cup bottom mold with hand applied finishes.

"FULL MEASURE EXTRACT," preceded by "2 oz." or "4 oz.," is embossed on the two side panels. Lang and Company's Royal Club Brand Extract of Vanilla also filled these bottles.

No bottle manufacturer mark was evident.

All five bottles were recovered from Feature 10.

Tall Ball Neck Panel, Patent/Extract Finish, Bottle Type 4 (Fig. 15a) - One Tall Ball Neck Panel bottle with a hand applied Patent/Extract Finish was recovered from Feature 10. The bottle was blown in a cup bottom mold and has a capacity of 4 oz. The size, shape, and finish indicate that it is an extract bottle.

Rectangular Taper, Double Bead Finish, Bottle Type 5 (Fig. 15b, c)) - Six bottles were recovered with the J. A. Folger and Company monogram. All are machine made and clear. Five bottles have a capacity of 2 oz. and one has a 4 oz. capacity.

Three bottles have distinct base marks of Illinois Pacific Glass Company. Two are marked with "IPG" in a triangle and one is marked with "IPCCO" in a diamond. The other bottles do not have readable base marks, though they are present. Both marks of the glass company date 1902-1930 (Toulouse 1971:268).

J. A. Folger's is now known almost exclusively for coffee products, but prior to 1929 the company was best known for spices, flavoring materials, extracts, and tea. The monogram present on these six bottles did not come into use until after 1900/1910. When all but the coffee business was sold in 1929, the monogram, as well as Folger's "Pioneer" and "Golden Gate" trademarks, were discontinued in favor of "Folger" (Toulouse 1971:274-275). Thus, the monogram dates 1900-1929.

The contents of Bottle Type 5 has been identified as extract based on the size and shape of the bottle and the use of the Folger's monogram for such products. Of the six bottles present, four are from Feature 10 and three from Feature 18.

Square Taper, Patent/Extract Finish, Bottle Type 8, (Fig. 15d) - Ten 4 oz., machine made, Closset and Devers bottles were recovered. The Closset and Devers monogram is located on the upper portion of the bottle body and the base is marked with "CLOSSET & DEVERS."

Joseph Closset is believed to have been the first coffee merchant on the west Pacific Coast. According to city directories, he began a coffee and spice business in Portland in 1881. He was joined by Arthur H. Devers in 1884, formerly with Folger, Schilling and Company, then later with A. Schilling and Company. The Closset and Devers firm began as a small business and grew quickly. By 1928 the Portland firm was located within a six story building and annex with sales amounting to over one million dollars. About this time, Closset and Devers discontinued its spice department and specialized in coffee and tea. They featured Golden West Coffee, Nu-Ray-A Tea and Golden West Teas. The company continued until 1950 (Inge Dortmund 1981:personal communication).

The Closset and Devers bottles recovered from the site have been identified as extract bottles based on their size and shape. They are presumed to pre-date 1928, the year Closset and Devers discontinued their spice business and began to specialize in coffee and teas. All ten bottles were recovered from two privies. Eight are from Feature 18, and two from Feature 10.



Fig. 15. Extract bottles. *a*, Type 4; *b* and *c*, Type 5, *d*, Type 8.

Taper Extract, Patent/Extract Finish, Bottle Type 12, (Fig. 16a-b) - One 2 oz. Virginia Dare Extracts bottle was recovered from Feature 18. It is machine made and marked on side panels with "VIRGINIA DARE EXTRACTS/GARRETT AND CO. INC." The base is marked with "BO," each letter is in a small square. This mark has not been identified to date.

Root Beer Extract, Cork and Seal Finish, Bottle Type 13, (Fig. 16c-d) - All 47 Type 13 bottles were recovered from one privy, Feature 18. Twenty three are of 4 oz. capacity, and the remaining 24 are 2 oz. size.

The machine made bottles were manufactured by at least three different glass companies. All 4 oz. and 13 2 oz. bottles were made by Pacific Coast Glass Company of San Francisco between 1925 and 1930 and are marked with "PC." Ten 2 oz. bottles were made by Illinois Pacific Glass Company also of San Francisco between 1902 and 1930. All have the base mark of "IPG" within a triangle. It is interesting to note that these two companies merged in 1930 (Toulouse 1971:414). One additional base mark found on only one bottle may be that of the Puget Sound Glass Company of Anacortes, Washington and would date between 1924 and 1929 (Toulouse 1971:427).

The bottle shape has been identified as Root Beer Extract based on Putnam (1965:39). The company's advertisement states that: "This is a modified French Square, with special finish and extra heavy blown, so as to bear carriage well."

The cork-and-seal finish on the bottles has also been identified from an advertisement of the catalogue which states that "This new and remarkable Cap combining as it does, the merits of the 'Crown Cork' and the 'Lightening Stopper,' will appear to every user of a bottle whose contents are not to be entirely consumed at first opening . . . The special bottle finish required costs no more than any other . . ." (Putnam 1965:266). The cork-and-seal caps (Fig. 16e) were recovered only in association with these bottles from Feature 18. Most of the bottles recovered retained their caps, though they were quite rusted and not readily recognizable. It is not known what dates caps of this kind were in use.

Though the bottle shape has been identified as Root Beer Extract, it is believed that these bottles contained vanilla extract. Partial paper label remnants of blue and white with some lettering led to the tentative identification of the product as Crescent Vanilla Extract made by Crescent Manufacturing Company of Seattle, Washington. Correspondence confirmed (Walter J. Swanson 1981: personal communication) that prior to 1930 the firm packaged Crescent True Vanilla in square bottles with cork-and-seal caps.

Root Beer Extract, Prescription Finish, Bottle Type 15, (Fig. 16f) - One machine made bottle was recovered from Feature 18 which has embossed below one shoulder "CONTENTS/2 FL.OZ." The base mark, "IPC" within a diamond is again of the Illinois Pacific Glass Company dating 1902-1930. Based on the bottle shape and the marked fluid ounces, this bottle has been classed as an extract bottle.



Fig. 16. Extract bottles. *a* and *b*, Type 12; *c*, Type 13 (4 oz.); *d*, Type 13 (2 oz.); *e*, Cork-and-Seal cap; *f*, Type 15.

Food Bottles: Preserves and Condiments (Table 5)

Round Pickle/Preserve, Screw Top Finish, Bottle Type 26, (Fig. 17c) - This clear, machine made, 8 oz. bottle or jar was probably used for pickles, preserves, or condiments. It was manufactured by Illinois Pacific Glass Company between 1902 and 1930, identified by the base mark of "IPGCO" within a diamond. The bottle was recovered from Dump B.

Band Salad Dressing, Screw Top Finish, Bottle Type 27, (Fig. 17a, b) - One E. R. Durkee and Company bottle, which probably contained salad dressing, was recovered from Dump B. Machine made, with a screw top and 10 oz. capacity, the shoulder of the bottle is marked "E.R. DURKEE & CO., NEW YORK" and the base is marked with the familiar Durkee pottery mark. Because a gauntlet, an earlier Durkee trade mark, does not appear as a trade mark on this bottle, it is believed to post date 1929 (Toulouse 1971:182).

Food Bottles: Canning Jars (Table 6)

Canning Jar, Beaded Neck Finish, Bottle Type 23, (Figs. 18, 19a, b) - A two quart canning jar made by Kerr Glass Manufacturing Company of Portland, Oregon was recovered from Feature 17. The body is marked with "Economy Trademark" dating the jar to 1903-1912. However the base is marked with "KERR GLASS MFG CO/PAT/PORTLAND, OREGON" which dates it more narrowly to 1904-1909 (Toulouse 1971:175), (Fig. 18).

Two additional Kerr canning jars with beaded neck finish were also recovered from Feature 17. They differ from the Economy jar in that they were made by the Kerr Glass Manufacturing Company in Sand Springs, Oklahoma and the name "KERR" now appears with "ECONOMY/TRADEMARK," dating the two jars to 1915-1919 (Toulouse 1977:42) (Fig. 19a, b).

The beaded neck finish of the jars is a single strip of glass just below the top of the jar. With this kind of finish the containers would have been sealed with a metal lid having a heat softening compound and a spring clip band to hold it in place (Toulouse 1971:175).

Canning Jar, Mason Beaded Neck Seal Finish, Bottle Type 22, (Fig. 19c) - Two Kerr canning jars recovered from two privies, features 17 and 15, have a Mason Beaded Neck Seal finish. As an improvement over the "Economy" jars they sealed with a metal disc with a heat-softening compound, and screw thread. "In 1915 Kerr patented a combination of thin metal disc, having a ring of heat-softening material that rested on top of the Mason jar opening, and held in place by a metal screw band with a cut-out center" (Toulouse 1977:143). Kerr indicated this method of sealing on the jars with "KERR/SELF-SEALING/TRADE MARK REG . . ." The Mason beaded neck seal replaced the styles of the top seal and shoulder seal. Now a bead around the neck allowed the jar to be sealed here, instead of at the shoulder (Toulouse 1977:106).

TABLE 5

Food bottles: preserves/condiments

Preserve/condiments	Shape	Finish	Color	Volume ounces	Product Manufacturer	Bottle Manufacturer	Dates	Privies F15 F17	Dump B	Total
Bottle type 26	Round pickle/ preserve	Screw top	Clear	8		Illinois Pacific Glass Co.	1902-1930		1	1
Bottle type 27	Band salad Dressing	Screw top	Clear	10	E.R. Durkee		Post 1929		1	1

TABLE 6

Food bottles: canning jars

Canning jars	Shape	Finish	Color	Volume ounces	Bottle Manufacturer	Dates	Privies F15 F17	Dump B	Total
Bottle type 23a	Canning jar	Beaded neck	Grey	16	Kerr	1915-1919	1		
23b				32	Kerr		1		1
23b				32	Kerr	1904-1909	1		1
Bottle type 22a		Mason beaded	Grey	16	Kerr		1		1
22b				32	Kerr	1920-1940	1		1

TABLE 7

Beverage bottles: alcohol

Alcohol	Shape	Finish	Color oz.	Volume	Product Manufacturer	Dates	Bottle Manufacturer	Dates	Privies F18 F15	Total
Bottle type 14	Philadelphia oval flask	Brandy	Clear	12					1	1
16	Oval flask	Brandy	Clear	16			Illinois Pacific Glass Co.	1902-1930	1	1
16	Oval flask	Brandy	Clear	16			Pacific Coast Glass Co.	1925-1930	2	2
20	Beer	Crown	Amber	12					1	1
Non-Alcohol										
Bottle type 20	Soda	Crown	Clear	6½	Idaho Beverage	post-1925	Pacific Coast Glass Co.		1	1

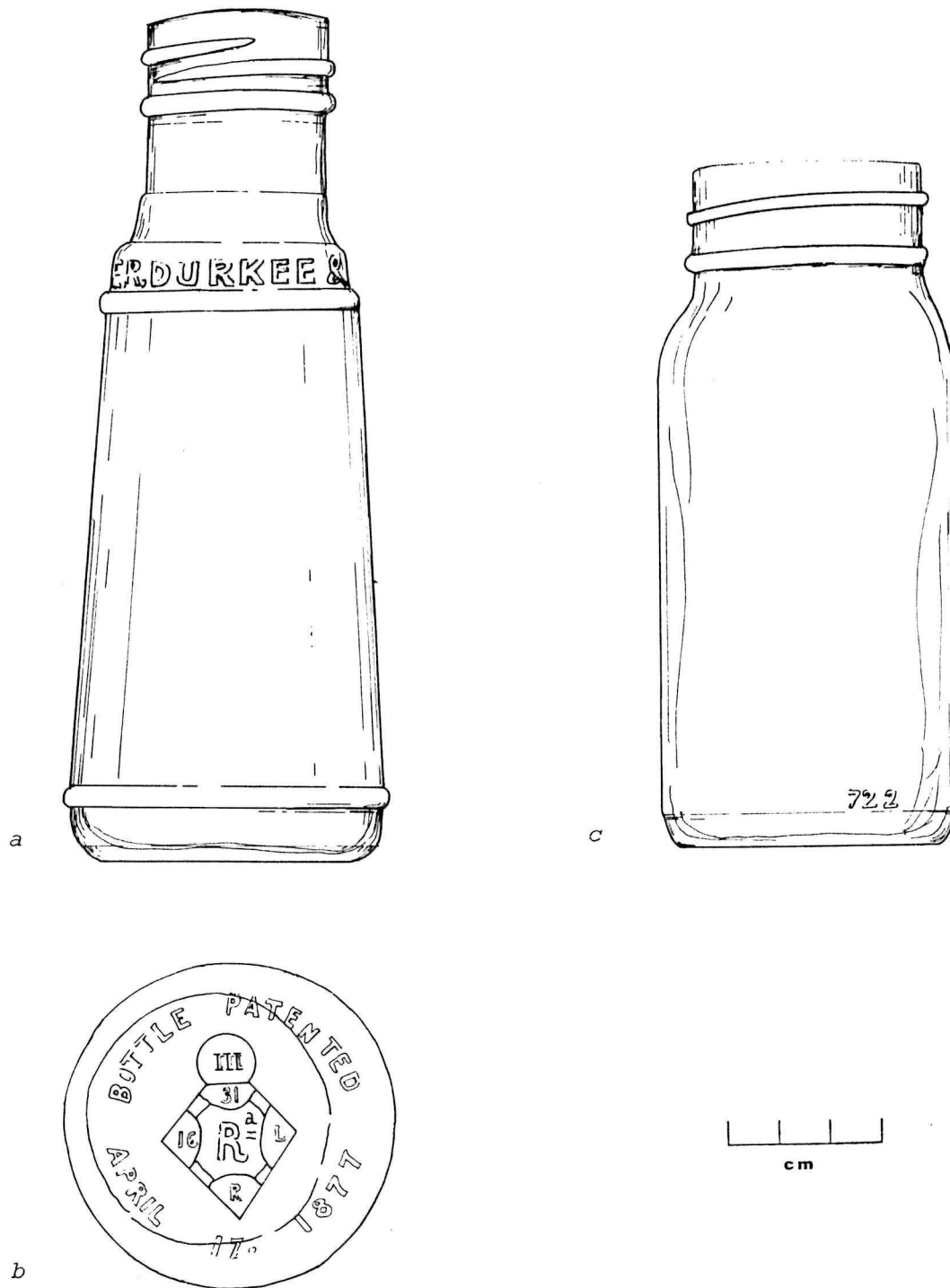


Fig. 17. Food bottles: preserves and condiments. a-b, Type 27; c, Type 26.



Fig. 18. Food bottles: canning jar, Type 23.



Fig. 19. Food bottles: canning jars. a-b, Type 23; c, Type 22.

The 2 quart jar from Feature 15 is marked with "KERR/SELF-SEALING/TRADE MARK REG./WIDE MOUTH/MASON" and dates 1920-1946 (Toulouse 1977:43). The one quart jar from Feature 17 is similarly marked, but instead of "TRADEMARK REG" appearing directly underneath "SELF-SEALING" the work "PATENTED" appears somewhat below this. To date, this particular combination of markings has not been found in major references. Both jars were made by the Kerr Glass Manufacturing Company in Sandsprings, Oklahoma.

Beverage Bottles: Alcohol (Table 7)

Philadelphia Oval Flask, Brand Finish, Bottle Type 14, (Fig. 20a) - One clear, machine made Philadelphia Oval Flask was recovered from Feature 18. Though resembling the flask of Bottle Type 16, a slightly concave front/back makes this bottle somewhat smaller, having a capacity of only 12 oz. rather than 16 oz.

According to one informant (Edgar C. Bryan:personal communication), a flask such as this was known as a bootlegger flask, appearing to contain a pint, though it contained only 12 oz. The concave front/back side made it easy to carry in one's boot, back pocket, or belt. Bryan also noted that it was not unusual that the flask had no mark identifying the manufacturer.

Flask, Brandy Finish, Bottle Type 16, (Fig. 20b) - Two clear 16 oz. flasks, machine made, were recovered from one privy, Feature 18. One bottle was manufactured by Illinois Pacific Glass Company 1902-1930 and has a base mark of "IPG" within a diamond. The other flask was made by Pacific Coast Glass Company between 1925 and 1930 and is marked with "PC."

Beer, Crown Finish, Bottle Type 20, (Fig. 21a) - One complete amber, machine made bottle with crown finish, identified as a beer bottle was recovered from Feature 17. It has a capacity of 12 oz.

Beverage Bottles: Non Alcohol

Soda, Crown Finish, Bottle Type 21, (Fig. 21b) - One clear, machine made soda pop bottle was recovered from Feature 15. It is marked near the base with the Pacific Coast Glass Company mark of "PC" dating 1925-1930. The body is marked with "IDAHO BEVERAGES LEWISTON, IDAHO/NET CONTENTS 6-1/2 FLD. OZ." In 1925 the Lewiston Bottling works, which began in 1894, changed its name to Idaho Beverage (Adams, Gaw, and Leonhardy 1975:117).

Medicine Bottles: Prescription (Table 8)

French Square, Prescription Finish, Bottle Type 7, (Fig. 22a) - Of the nine bottles recovered, two bottles of 4 oz. capacity were manufactured with the blown-in-mold and hand tooled finish techniques. All six of the 2 oz. size and one 4 oz. bottle were completely machine made.

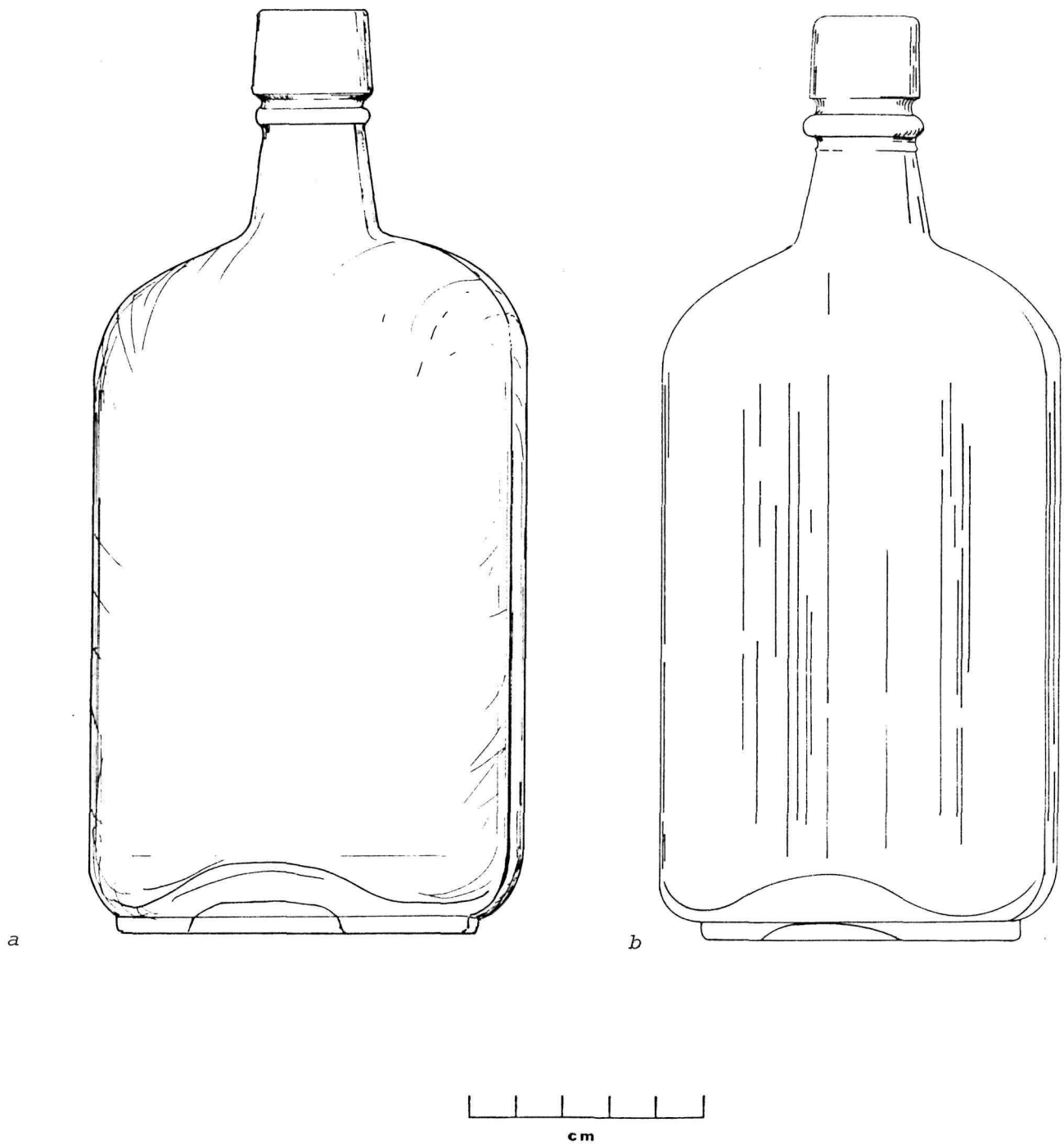


Fig. 20. Beverage bottles: Alcohol. *a*, Type 14; *b*, Type 16.

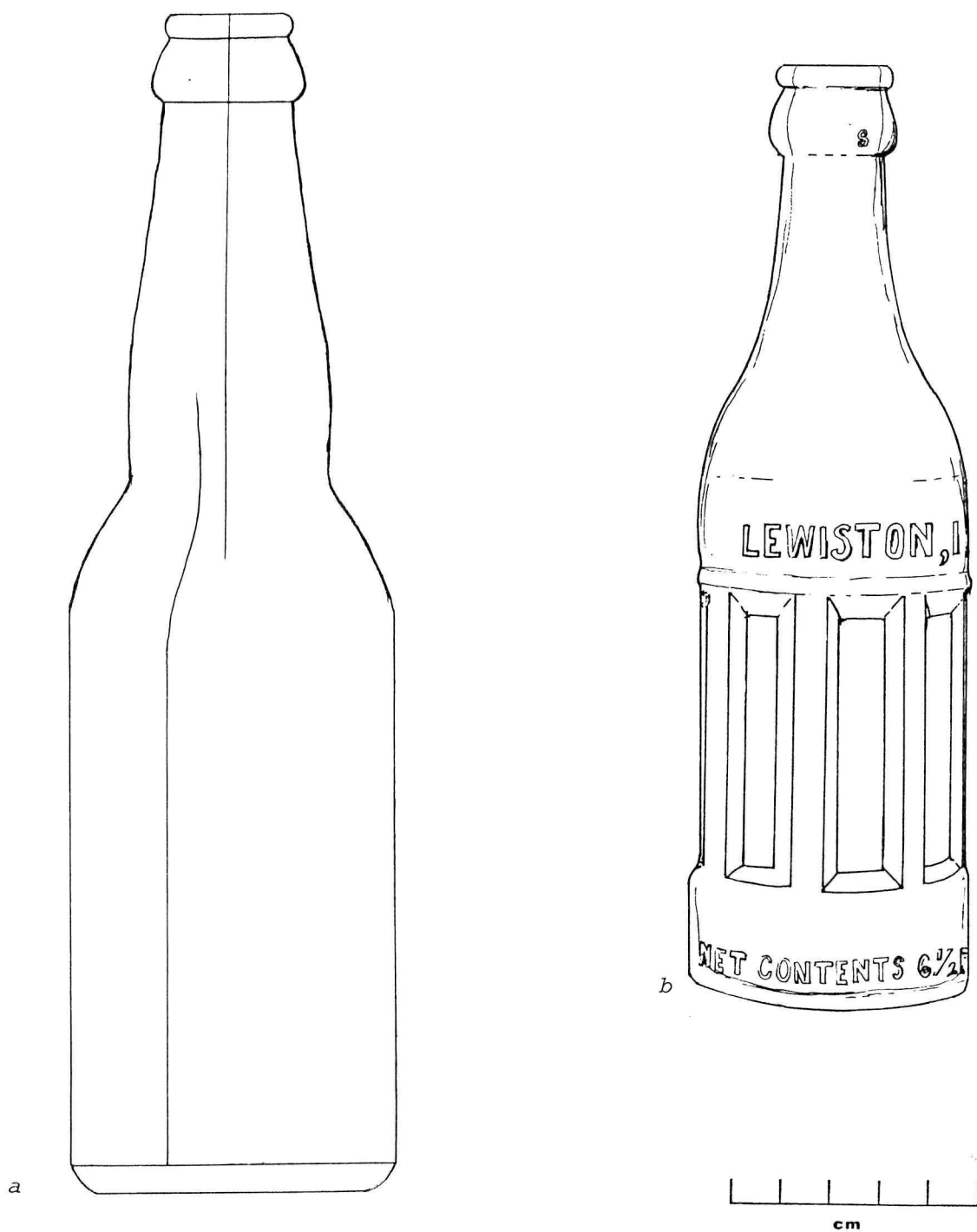


Fig. 21. Beverage bottles. *a*, beer bottle, Type 20; *b*, soda bottle, Type 21.

TABLE 8
Medicine bottles

Prescription Bottle Type	Shape	Finish	Color	Volume oz.	Product Manufacturer	Dates	Bottle Manufacturer	Dates	Privies F10 F18 F17	Dump B	Canal 1	Total
7a	French square	Prescription	Clear	2			Diamond Glass Co.	post-1924	6			6
7b	French square	Prescription	Clear	4			Illinois Pacific Glass Co.	1920-1930	1			1
7b	French square	Prescription	Clear	4					2			2
9	French square	Prescription	Clear	4	Darling's Prescription Pharmacy	1915-1918			1			1
10	Royal oblong Graduated Double Scale	Reinforced extract	Clear	2					1			1
11	Practical oval Graduated Double Scale	Reinforced extract	Clear	2			Illinois Glass Co.	1916-1929		1		1
18	Crown oval	Reinforced extract	Clear	2						1		1
25	Practical oval Graduated Double Scale	Screw top		2			Illinois Glass Co.	1916-1929			1	1
Patent Bottle												
28	Castor oil or Long Neck Band	Oil finish	Aqua/ lt.green	N/A	R.V. Pierce, M.D.						2	2
29	Oval	Packer		N/A	Lydia Pinkham				1			1
31	Mentholatum	Screw top	Milk glass	1 1/2							1	1

TABLE 9
Cosmetic bottles

Bottle Type	Shape	Finish	Color	Volume oz.	Product Manufacturer	Dates	Bottle Manufacturer	Dates	Privies F10 F17	Dump B	Canal 1	Total
6	Cologne	Prescription	Clear	2			Illinois Pacific Glass Co.	1902-1930	5			5
19	Toilet accessory	Screw top	Clear	<1 oz.						1		1
30	Cold cream	Screw top	White	3						1		1
17	Paneled polish	Lug screw top	Clear	2 oz.	Shinola				1			1



Fig. 22. Prescription medicine bottles. a, Type 7; b, Type 9; c, Type 10; d, Type 11; e, Type 18; f, Type 25.

Six 2 oz. bottles were manufactured by Diamond Glass Company after 1924 as evidenced by the diamond base mark. One bottle has the mark of "I.P.G.CO." on one side near the base and is presumed to have been made by Illinois Pacific Glass Company between 1902-1930.

The contents of the bottles have been identified as prescription medicine based on the bottle size and shape and the prescription finish.

French Square, Prescription Finish, Bottle Type 9, (Fig. 22b) - One 4 oz. bottle from a pharmacy in Oakland, California was recovered from Feature 10. The blown-in-mold with hand applied prescription finish bottle was marked on the front panel with "DARLING'S/PRESCRIPTION PHARMACY/OAKLAND, CAL."

Chester Darling opened a drug store in Oakland in 1907 and was listed as "Chester F. Darling and Company Druggists Prescriptions a Speciality." By 1911 Darling had a second Oakland drug store and by 1914 he was listed as "Darlings Prescription Pharmacy." In 1918 Darling's business listing was that of "Darling's Pharmacy." Thus, the Darling's Prescription Pharmacy appears to date between 1915 and 1918. In a reaction to the patent medicine business it was not uncommon at this time to stress prescriptions and as the Oakland area had a well established glass bottling industry, many products, including drugs, were routinely bottled in made to order bottles (Mickey Karpas 1981:personal communication).

This bottle is the earliest dated bottle from the excavations and was found in a context (Feature 10) where other datable bottles suggest a 1925-1930 occupation. It is assumed that this 1915-1918 bottle was discarded at about the same time as the others in the privy, ten years after it was made.

Royal Oblong, Graduated, Double Scale, Reinforced Extract Finish, Bottle Type 10, (Fig. 22c) - This 2 oz. medicine bottle, blown in a mold with a hand-applied finish, has a graduated double scale marked in ounces and cubic centimeters. It was recovered from the privy, Feature 10.

Practical Oval, Graduated, Double Scale, Reinforced Extract Finish, Bottle Type 11, (Fig. 22d) - This bottle type was machine made with a graduated double scale and 2 oz. capacity. The base is marked with "I" within a diamond and "Lyric" below this. Though it is not known for certain what the significance of "Lyric" is, it is assumed that the bottle was made by Illinois Glass Company between 1916 and 1929 (Toulouse 1971:264). The one specimen was recovered from a privy, Feature 18.

Crown Oval, Reinforced Extract Finish, Bottle Type 18, (Fig. 22e) - This prescription medicine bottle is clear and machine made, retaining a thick, syrup-like residue inside. The bottle is marked with the medical symbol for 2 oz.

Practical Oval, Graduated Double Scale, Screw Top finish, Bottle Type 25, (Fig. 22f) - A complete prescription medicine bottle was recovered from Dump B. The bottle has a graduated double scale and a capacity of 2 oz.

The base has the Illinois Glass Company mark of a diamond with an "I" in the center dating 1916-1929 (Toulouse 1971:264). The "Lyric" mark is embossed below the diamond. The bottle is machine made and clear.

Medicine Bottles: Patent (Table 8)

Caster Oil/Long Neck Panel, Oil Finish, Bottle Type 28, (Fig. 23) - Two broken bottles of Dr. Pierce's Golden Medical Discovery were recovered from the lower levels of Dump B. They were manufactured in a three piece cup bottom mold and the oil finishes were hand tooled. Though the capacity is unavailable due to their fragmented nature, the bottles measure ca. 8½ in. high, 3 in. wide, and 1½ in. thick. One is light green and the other is aqua. The front panel is embossed with "DR. PIERCE'S/GOLDEN/MEDICAL DISCOVERY." On each side panel is "R.V. PIERCE M.D." and "BUFFALO, N.Y."

In 1903 R. V. Pierce sued *Ladies Home Journal* for reporting that his Golden Medical Discovery contained opium which he had taken out of the product ten years earlier (Wilson and Wilson 1971:132).

Oval, Packer Finish, Bottle Type 29, (Fig. 24a) - A rim and shoulder from an aqua colored Lydia E. Pinkham's Vegetable Compound bottle was recovered from Feature 18. It is classed as a complete bottle because the extent of information available allows its identification and an estimation of its size.

The shoulder is marked very vaguely with "14 FL. OZ." Enough of the bottle remains to determine that the product was Lydia E. Pinkham's Vegetable Compound, a product high in alcohol content (Wilson and Wilson 1971:71) and sold as a cure for female complaints (Munsey 1970:68).

Mentholatum, Screw Top Finish, Bottle Type 31, (Fig. 24b, c) - A round, white milk glass container with a 1½ oz. capacity was recovered from the upper levels of Canal 1. The base of the screw top jar is marked "METHOLATUM/REG./TRADEMARK."

Cosmetic Bottles (Table 9)

Cologne, Prescription Finish, Bottle Type 6, (Fig. 25a) - All five 2 oz., machine made bottles were manufactured by the Illinois Pacific Glass Company and exhibit the firm's base mark of "IPGCO" within a diamond dating to 1902-1930 (Toulouse 1971:268).

The unusually tall neck on the french square-like bottle led to their identification as cologne bottles using the Dominion catalogue of glass (Post 1913). All bottles were recovered from one privy feature, Feature 10.

Toilet Accessory, Screw Top, Bottle Type 19, (Fig. 25b) - This extremely small bottle, 1½ in. high and 1 in. in diameter, is probably a perfume bottle. The Official Gazette of the U.S. Patent Office, Vol. 442 of 8 May 1934 shows a design for a "toilet accessory" container similar to this bottle. The bottle was recovered from Feature 17.

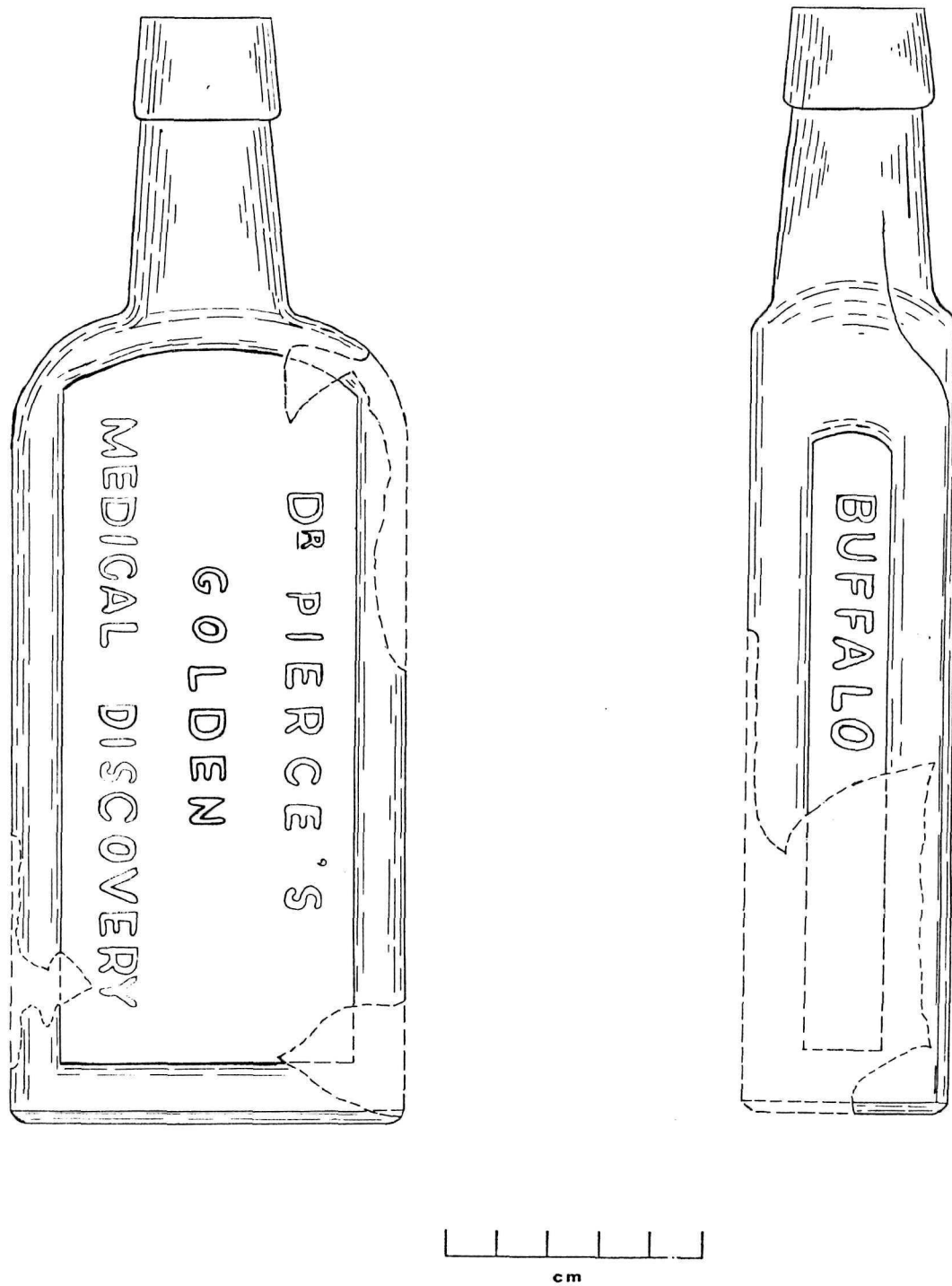


Fig. 23. Patent Medicine bottle: Dr. Pierce's Golden Medical Discovery, Type 28.



Fig. 24. Medicine bottles. a, Lydia Pinkham's Vegetable Compound, Type 29; b-c, Mentholatum, Type 31.

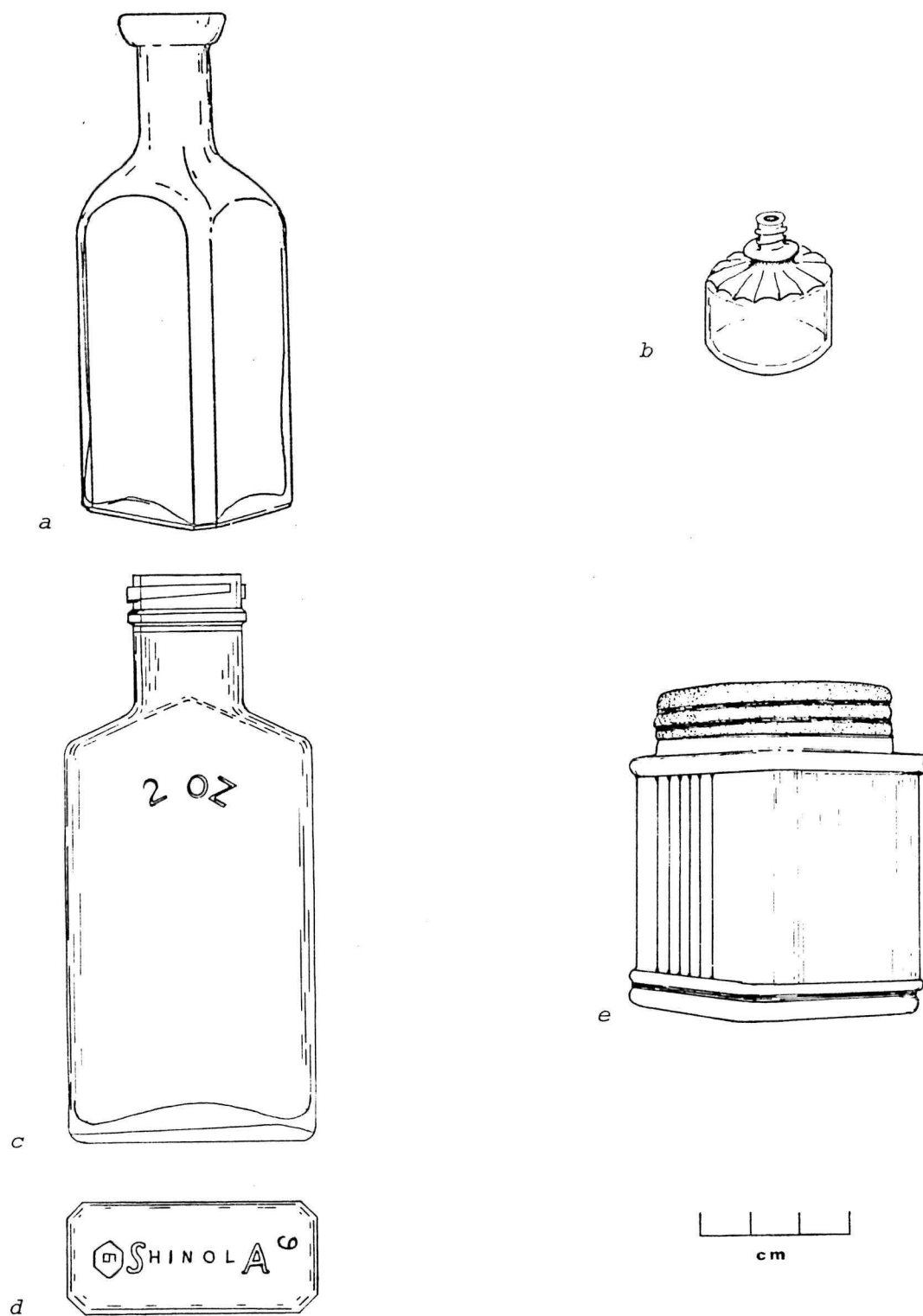


Fig. 25. Cosmetic bottles. a, cologne, Type 6; b, toilet accessory, Type 19; c-d, shoe polish, Type 17; e, cold cream, Type 30.

Paneled Polish, Lug Screw Top Finish, Bottle Type 17, (Fig. 25c, d) - This clear 2 oz. bottle was recovered from a privy, Feature 17, and traces of white shoe polish are evident inside the bottle. The base is marked "SHINOLA" and the front/back panel is marked with "2 OZ."

Cold Cream, Screw Top Finish, Bottle Type 30, (Fig. 25e) - A milk glass cosmetic jar with a 3 oz. capacity and a zinc screw-top lid was recovered from Dump B. The square jar is assumed to have contained cold cream or a similar product.

Discussion

Of the 174 bottles recovered from the site, 167 (96%) were recovered from the privy features. Most of these (91%) were from features 10 and 18. A very small number (3%) of the bottles were recovered from Dump B and none were recovered from Dump A (Table 10).

TABLE 10
Distribution of bottles

	Privies			Dump	Canal	Other	Total
	F10	F18	F15	F17	B	1	
Food bottles							142
Extracts	41	94					135
Preserves/condiments					2		2
Canning jars			1	4			5
Beverage bottles							6
Alcohol		4	1				5
Non-alcohol			1				1
Medicine bottles							18
Prescription	11	1		1	1		14
Patent		1			2	1	4
Cosmetic bottles/jars	5			2	1		8
							8
Totals	57	100	3	7	6	1	174

Bracketing the dates of bottles based on their product and manufacture dates (Table 11), Feature 10 predates 1932 and Feature 18 predates 1930. Based on the presence of Bottle Type 8, the features may predate 1928. Though it is possible that the privies date as early as 1884, it is likely that their beginning date is nearer to 1925. Thus, Feature 10 probably dates 1924-1932 and Feature 18 dates 1925-1930 or more generally, the features date to the late 1920s. Dating Feature 15 and Feature 17 by bottle manufacture dates is more difficult. Fewer bottles were recovered and of these most were canning jars. Because canning jars are used over and over, unlike most other containers, it is difficult to use their dates with any confidence. With canning jars as indicators, we can only say that Feature 15 postdates 1920 and Feature 17 postdates 1904. One soda bottle, Type 21, from Feature 15 dates 1925-1930. The two datable bottles from Dump B suggest that it too predates 1930.

Of the total bottles recovered, most (78%) have been identified as extract bottles and these were recovered from features 10 and 18 only. Five different companies manufacturing extracts have been identified by fragmented labels, monograms, and bottle shapes (Table 12). All but one company which was represented by one bottle, were Pacific West Coast firms. Two additional unknown companies are represented by other bottles. The companies represented by the bottles recovered from the two privies are: Lang and Company and Closset and Devers, both of Portland; J. A. Folger's of San Francisco; Crescent Manufacturing Company of Seattle; and Garrett Company of New York. Of the 135 extract bottles 51% are Lang and Company's Royal Club Brand Vanilla Extract and 35% are Crescent Vanilla Extract, Portland and Seattle firms.

It is interesting to note that of the Lang and Company bottles recovered, three different sizes, three different shapes, and apparently three different bottle companies are represented among the 69 bottles, all predating 1932 and the majority (72%) dating between 1902 and 1930. Of the 47 Crescent bottles recovered, two sizes, one shape, and three companies are represented, most (77%) of which are from one company dating 1925-1930. One thing held in common by all of these bottles is that they apparently contained vanilla extract.

Flavoring extracts at this time were considered one of the conveniences of the modern housewife (Kessler and Higby 1927:5). They were used to make wholesome desserts "appealing to the natural taste of children as well as gratifying the more cultivated taste of grown ups" (*Good Housekeeping*, September 1920:112). Such desserts were easy to make by adding one or two *teaspoons* of extract.

An essential ingredient of extracts is alcohol. "No satisfactory substitute for alcohol, as a solvent flavoring extract manufacture, has ever been developed, in spite of years of experimentation" (Kessler and Higby 1927:10). Alcohol contents of extract was such that during Prohibition manufacturers were advised in how-to books " . . . to keep close touch with the nearest prohibition office, to follow the spirit as well as the letter, of the existing regulations, and to maintain records containing sufficient

TABLE 11

Dates of bottles from 10-NP-108
 bracket dates based on product and bottle manufacturers

Bottle Type	Contents	Dates	Privies			Dump B
			F10	F18	F15	
1	Extract	1902-1930	16	34		
2	Extract	1924-1932	14			
3	Extract	1884-1932	5			
5	Extract	1902-1929	3	3		
8	Extract	pre-1928	2	8		
13	Extract	1925-1930		36		
	Extract	1902-1930		10		
15	Extract	1902-1930		1		
26	Pickles/preserves	1902-1930				1
28	Salad dressing	post-1929				1
16	Liquor	1902-1930		1		
		1925-1930		1		
7	Prescription medicine	post-1924	6			
		1902-1930	1			
9	Prescription medicine	1915-1918	1			
6	Cologne	1902-1930	5			

TABLE 12

Bottled products from 10-NP-108

Product Manufacturer	Product	Dates	Reference	Bottle Types	Number
Crescent Manufacturing Company Seattle, Washington	Crescent True Vanilla Extract	pre-1935	Swanson 1981: personal communication	13	47
Closset and Devers Portland, Oregon	Extract	pre-1928	Dortmund 1981: personal communication	8	10
Darlings Prescription Pharmacy Oakland, California	Prescription medicine	1915-1918	Karpas 1981: personal communication	9	1
E. R. Durkee and Company New York	Salad dressing	post-1929	Zumwalt 1980:128 Toulouse 1971:82	27	1
Garrett and Company, Inc. Brooklyn, New York	Virginia Dare extracts			12	1
Idaho Beverages Lewiston, Idaho	Soda	post-1925	Adams, Gaw, & Leonhardy 1975:117	21	1
J.A. Folger's and Company San Francisco, California	Extract	1900-1929	Toulouse 1971:274, 275	5	6
Lang and Company Portland, Oregon	Royal Club Brand	1884-1932	Dortmund 1980: personal communication; Zumwalt 1980:267	1	20
	Extract of vanilla			2	14
				3	5
	Mentholatum			31	1
Shinola	Shoe polish			17	1

detail that he may give a complete accounting, at any time, of quantities of alcohol received and disposed of" (Kessler and Higby 1927:13).

It was not uncommon for those who could not obtain alcohol, for one reason or another, to substitute vanilla extract, among other things, in its place. When it was illegal to sell alcohol to Native Americans they bought vanilla extract instead. In Clarkia, between 1917 and 1924 "The store had vanilla extract bottles of all sizes. I was doing a great business by the time Oral saw what I was doing and warned me that it was illegal to sell alcohol to the Indians" (Russell 1979:28).

In the Spalding area, alcohol was illegal as early as 1910 when Nez Perce county went dry (*Lewiston Morning Tribune* 1910). Then, on 1 January 1916, the state of Idaho became dry (Brosnan 1935:359). By Federal Prohibition of 1920, it had been illegal for Spalding inhabitants to consume alcohol for ten years. In addition to the county, state, and federal prohibition of alcohol was the fact that alcohol could not be sold on the Nez Perce reservation, of which Spalding was a part.

The privy features containing the extract bottles date ca. 1925-1930, during Federal Prohibition. Feature 18 also contained a "bootlegger's" flask and three whiskey flasks which could have held home-made liquor. Neither features 10 nor 18 contained beer bottles, though beer bottles are present in Feature 15 which is believed to date after Prohibition. It is probably safe to conclude that the contents of the 135 extract bottles recovered from the two privies were consumed for alcohol and not used for baking purposes. This was also suggested as an explanation for the number of extract bottles recovered at Silcott, though beer bottles were also found in association (Adams 1977:56), unlike the Spalding materials. Feature 10 also contained 11 medicine bottles and 5 cologne bottles, all of which may have contained products with high alcohol content. Although alcohol could not be obtained from Watson's store, extracts could.

In contrast to features 10 and 18, features 15 and 17 contained no extract bottles, and unlike features 10 and 18, canning jars were present in these two privies. A complete beer bottle was also represented as were additional rims and bases.

Few complete bottles were recovered outside of the privies, and these were only from Dump B.

Bottle Rims, Bases, and Marked Fragments

The functional classes to which the bottle rims and bases have been assigned are more general and tentative than those of the complete bottles. The typology has been based on shape and probable contents (Table 13, Fig. 26). For purposes of discussion, hand tooled rims are presumed to be earlier than machine made rims and blown-in-mold bases earlier than machine made. Whereas most bottles were recovered from the privy features, the majority of the bottle rims and bases are from outside of the privies and

TABLE 13

Finish shapes for complete bottles and rims

Shape	Reference	Represented by		Totals	Fig. No.
		Bottle Type	Rim Type		
Packer	Putnam 1965:20	1, 2, 29	4	66	26a
Patent/Extract	Whitall Tatum & Co. 1902; Putnam 1965:20	3, 4, 8, 12	2	23	26b
Prescription	Putnam 1965:20	6, 7, 9, 15	1	38	26c
Cork-and-seal	Putnam 1965:266	13	-	47	26d
Reinforced Extract	Whitall Tatum & Co. 1902	10, 18, 11	19	4	26e
Double Bead		5	-	6	26f
Oil	Putnam 1965:20	28	5	5	26g
Double Ring	Dominion post 1913:12		6	2	26h
Beaded Neck Seal	Toulouse 1977:130	23	11	6	26i
Mason Beaded Neck Seal	Toulouse 1977:106	22	13	9	26j
Mason Shoulder Seal	Toulouse 1977:106		12	3	26k
Mason Top Seal	Toulouse 1977:106		14	3	26l
Lug Seal			15	1	26m
Lug Screw Top		17		1	26n
Screw Top		19, 26, 27, 30, 31	16, 18	34	26o
Brandy	Putnam 1965:20	14, 16	8	6	26p
Champagne	Whitall Tatum & Co. 1902		7	1	26q
Crown		20, 21	9	7	26r
Crown Beaded			10	1	26s
Flared Extract			20	1	26t
Plain Finish			21	1	26u
Blow Over	Whitall Tatum & Co. 1902		22	1	26v

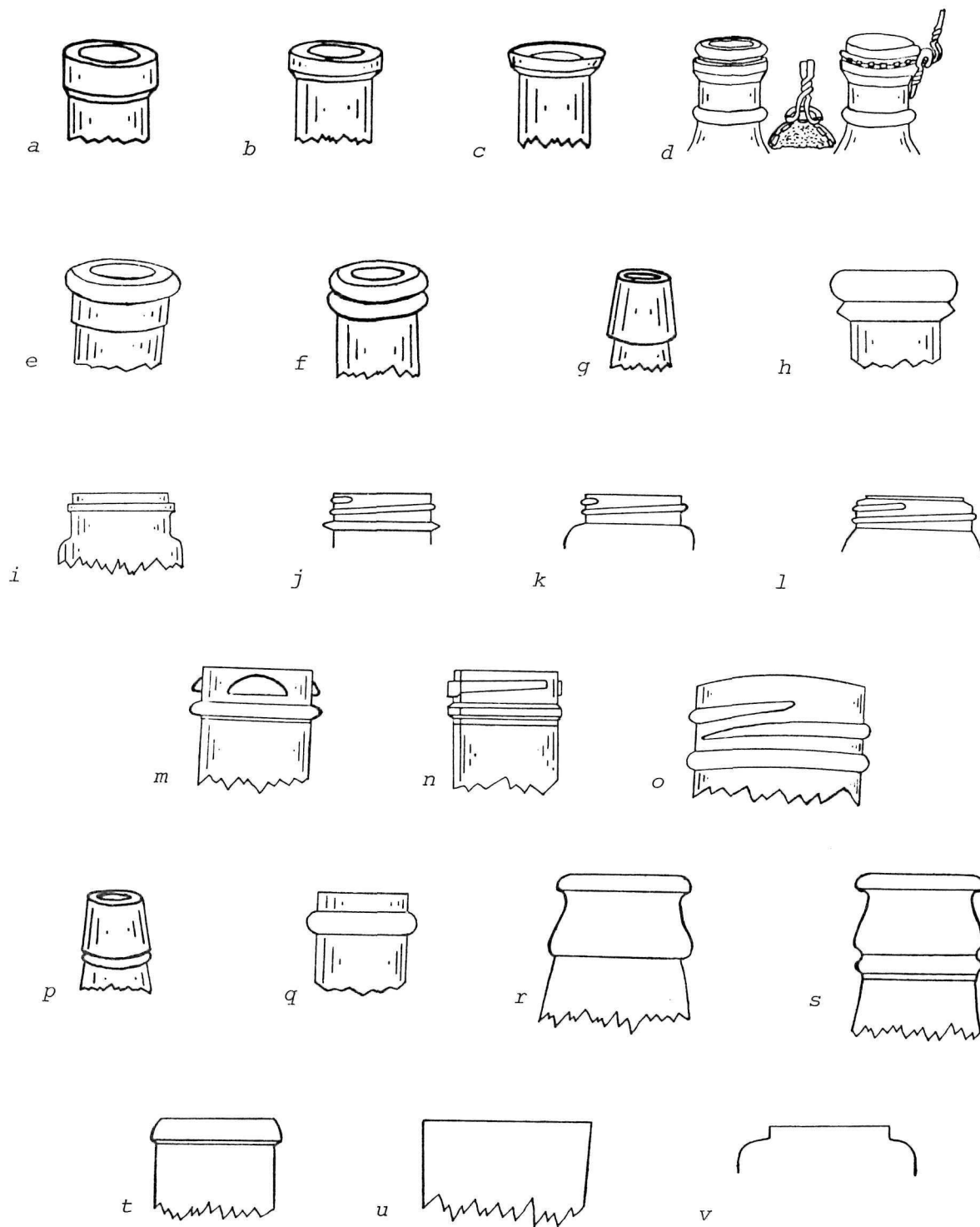


Fig. 26. Finish shapes described in Table 13.

while Dump A had no complete bottles, rims and bases from this provenience were numerous.

Bottle Rims

Thirty five percent of the rims have been assigned to the medicine category (Table 14). The majority of these are from Dump A, most are prescription finish and all are hand made. As this assemblage postdates 1933 and contains a number of machine made rims, the distribution of these rims in this area suggests mixing of earlier and later materials. Mixing is also evident at the lower levels of canals 2 and 4 where both machine made and hand tooled rims are present, and Canal 1 contained a single machine made rim.

Twenty one percent of the rims are those of canning jars coming from the two dumps and Feature 17. The alcohol rims were also recovered from these proveniences and Feature 15. No alcohol or canning jar rims were from Feature 10 or Feature 18.

Bottle Bases

Thirty seven percent of the bottle bases identified are alcohol and from the two dumps and Feature 15. Of these, the majority are beer bottle bases. No alcohol bases were recovered from Feature 10 or Feature 18. The one free blown base, also alcohol, was recovered from Canal 2 (Table 15).

Only five bases are marked. Three beer bottle bases, Type 5, from Feature 15 are marked: (1) "NET CONTENTS 22OZ" on the side, (2) "BB" on the base (Fig. 27a), (3) basal mark of a five point star and the letter B (Fig. 27b). An oval liquor base, Type 11, is marked "FULL PINT." One food or medicine base from Feature 18, Type 16, has the Illinois Pacific Glass Company's familiar "IPG" within a triangle dating 1902-1930 (Toulouse 1971:268). The fragmented Base Type 7 is marked with "...SSON & ROBE" (Fig. 27c).

Identified Marked Fragments

Identified marked bottle fragments were largely those of patent medicines and canning jars (Table 16).

Among the patent medicines at the site were Dr. Wistar's Balsam of Wild Cherry for coughs, colds, whooping cough, and other throat and chest ailments, and Dr. Pitcher's Castoria "a vegetable preparation for assimilating the food and regulating the stomachs and bowels of Infants and children" (Wilson and Wilson 1971:72, 99). Chamberlain's Colic, Cholera and Diarrhoea Remedy and another medicine of Dr. R. V. Pierce's were also represented. Dr. H. James' Cannabis Indica with Craddock and Company Proprietors of Philadelphia, Pennsylvania was recovered, but no further information pertaining to this medicine was found.

TABLE 14
Distribution of bottle rim types

Finish shape	Rim type	Contents	Hand Tooled	Machine made	Color	Proveniences
Screw top	16	Food:condiment		2	Aqua	Dump B (2)
Beaded neck seal	11	Food:canning jar		3	Clear	F17 (2) Dump A (1)
Mason shoulder seal	12	Food:canning jar		2	Aqua	Dump A (1) Dump B (1)
Mason beaded neck	13	Food:canning jar		7	Clear, aqua	Dump A (1) Dump B (5) Canal 2 (1)
Mason top seal	14	Food:canning jar		3	Clear	Dump A (3)
Champagne	7	Alcohol:wine	1		Olive green	Canal 2 (1)
Brandy	8	Alcohol:liquor		3	Clear, green	Dump B (2) Canal 4 (1)
Crown	9	Alcohol:beer		6	Amber	F15 (1) F17 (1) Dump A (1) Dump B (1)
Prescription	1	Medicine		22	Clear, amber	Dump A (12) Dump B (3) Canal 4 (1) Other (6)
Screw top	18	Medicine		1	Cobalt blue	Dump A (1)
Reinforced extract	19	Medicine		1	Clear	Canal 1 (1)
Plain	21	Medicine		1	Clear	Canal 2 (1)
Extract/patent	2	Food/medicine		6	Clear, aqua	F15 (1) Dump A (2) Dump B (4)
Packer	4	Food/medicine		1	Clear	Dump B (1)
Oil	5	Food/medicine		4	Aqua, amber	Dump A (4)
Double ring	6	Food/medicine	2		Aqua	Dump A (2)
Blow over	22	Food/medicine	2		Clear	Dump B (2)
Flared extract	20	Unknown		1	Clear	Dump B (1)
Lug seal	15	Unknown		1	Clear	Dump B (1)
Crown beaded	10	Unknown		1	Aqua	Dump B (1)

TABLE 15

Distribution of bottle base types

Base shape	Base type	Contents	Manufacture	Color	Provenience
Round	4	Food:condiment	Post bottom mold	Aqua	Canal 2(1)
Round	9	Food:condiment	Automatic machine	Clear	F15(1), Dump A(1)
Round	8	Food:condiment	Automatic machine	Clear	Dump B(1)
Round	2	Food:canning jar	Automatic machine	Aqua	Dump B(3)
Round	1	Alcohol:wine	Free blown	Olive green	Canal 2(1)
Round	5	Alcohol:beer	Automatic machine	Amber	F15(4), Dump A(1)
					Dump B(2)
Oval	11	Alcohol:liquor	Automatic machine	Clear	Dump B(1)
Rectangular	15	Alcohol:liquor	Automatic machine	Clear	Canal 4(1)
Round	3	Medicine	Cup bottom mold	Aqua	Dump A(1) Dump B(1)
Oval	10	Medicine	Cup bottom mold	Clear aqua	Dump B(1) Canal 4(1)
Rectangular	14	Medicine	Automatic machine	Clear	Canal 4(1)
Rectangular	16	Food/medicine	Automatic machine	Clear	F18(1), Dump A(1)
Rectangular/ paneled	18	Food/medicine	Automatic machine	Clear, aqua	Dump B(2)
Round	7	Unknown	Ovens machine	Amber	Canal 1 (1)

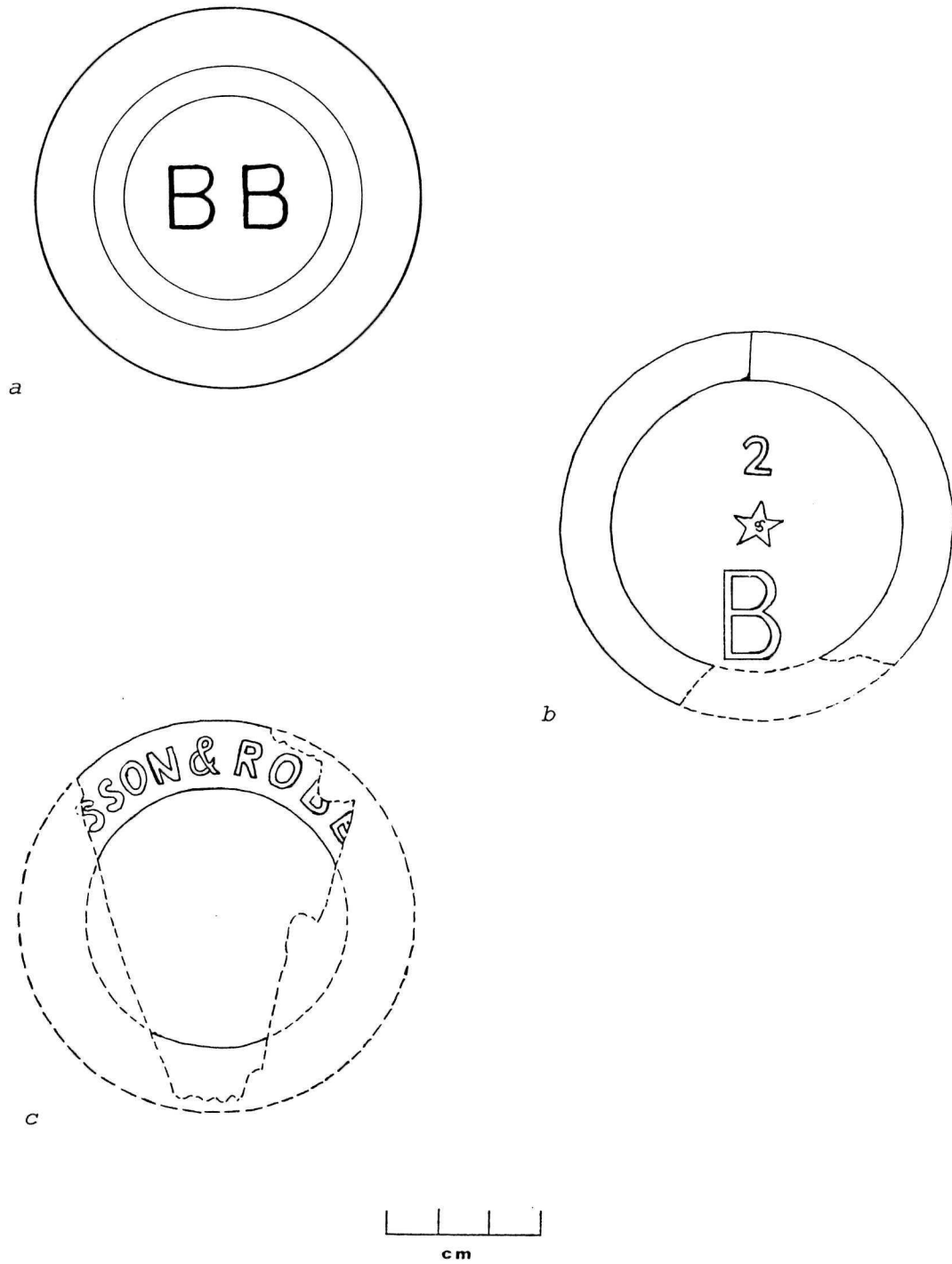


Fig. 27. Marked Bases. *a*, base Type 5; *b*, base Type 5; *c*, base Type 7.

TABLE 16

Distribution of identified marked glass fragments

	Dump A	Dump B	Canal 2	Canal 4	Other
Medicine	3	2	1	1	
Patent	2	1	1	1	
Dr. H. James	1				
Dr. Wistar's	1				
Dr. Pritcher's		1			
Chamberlain's				1	
Dr. Pierce's			1		
Prescription	1	1			
Canning jars	3	28			1
Economy	1	1			
Kerr Self Sealing		5			
Kerr		6			
Kerr/Economy	1	3			
Ball/Mason	1	11			1
Boyd		2			
Food	3	3			
Extract		3			
J.A. Folger Pioneer		1			
Closset & Devers	3	2			
Condiment					
"Sauce"	2				
"Fruit"	1				

The patent medicine fragments were recovered from various proveniences throughout the site, including predominantly 1920s and 1930s deposits. This may indicate mixing of artifacts.

Canning jars represented by marked fragments include: Economy, Kerr, Ball Mason, and Boyd Mason, some of which were not seen in Feature 15 and Feature 17 where canning jars were recovered. These fragments were primarily from the dumps, though a small fragment was recovered from Canal 4.

Other food bottles represented by fragments included J. A. Folger's (1850-1929) extract or spice, Closset and Devers (pre 1928) extract or spice, a "sauce" bottle and a "fruit" jar.

The datable fragments from Dump B predate 1929 and are also seen on bottles from features 10 and 18. Another datable fragment from Dump A, Pacific Coast Glass Company (1925-1930), predates 1930. Dump A covers features 15 and 17 which postdate 1933.

Cans

Cans from the site were not numerous, though they may have been at one time. Those recovered were from the dump areas and from the privies. No cans were noted in the canals.

The cans which could be identified are those which would have served as canisters with contents to be reused time after time, unlike cans used only for packaging then thrown away after they were opened and the contents used. Another way of describing such difference is that of resealability (Adams 1977:51). Food cans for fruits and vegetables were not resealed after they were opened, while cans of baking powder and spices were.

The resealable cans from the site are pocket tobacco tins (Fig. 28b), chemical cans (Fig. 28a), and spice containers (Fig. 28e), and of these, pocket tobacco tins were the most numerous. Can keys (Fig. 28c, d), ranging in size from 1 3/8 in. to 3 1/2 in. in length; can handles; and can lugs; add to the evidence that cans, other than those identified, were used at the site. Such cans would have contained canned meats, peanut butter, lard, syrups, oils, and other canned condiments. Only three nonresealable cans were identified (Table 17).

Fragments of seams, can tops, and can bases were recovered and of the few in which manufacture could be discerned, both hole-in-top and open-top techniques are represented. It is not known whether fragments were from resealable or nonresealable containers.

If only those cans and can parts that are identified are considered then one must conclude that canned food was not common at the site. Canned condiments, and perhaps canned meats, represented by a spice can, can keys, and can handles were present, but it does not appear that canned fruits and vegetables were present in great quantity. There is always the possibility that preservation of resealable and nonresealable cans is unequal.

Tube

The upper portion of a tube marked "J.C.PENNY CO. MAJESTIC" from Dump A is presumed to be a toothpaste tube (Fig. 28f).

Caps and Lids

Canning Jars

Four different styles of canning jar lids were recovered from the site: zinc and porcelain, metal lid with spring clip, metal lid with screw band, and glass.

The zinc screw cap with porcelain liner was used over a long period of time by home canners. The zinc screw cap was patented in 1858 and the porcelain liner patented in 1869 as a guard against possible metallic tastes

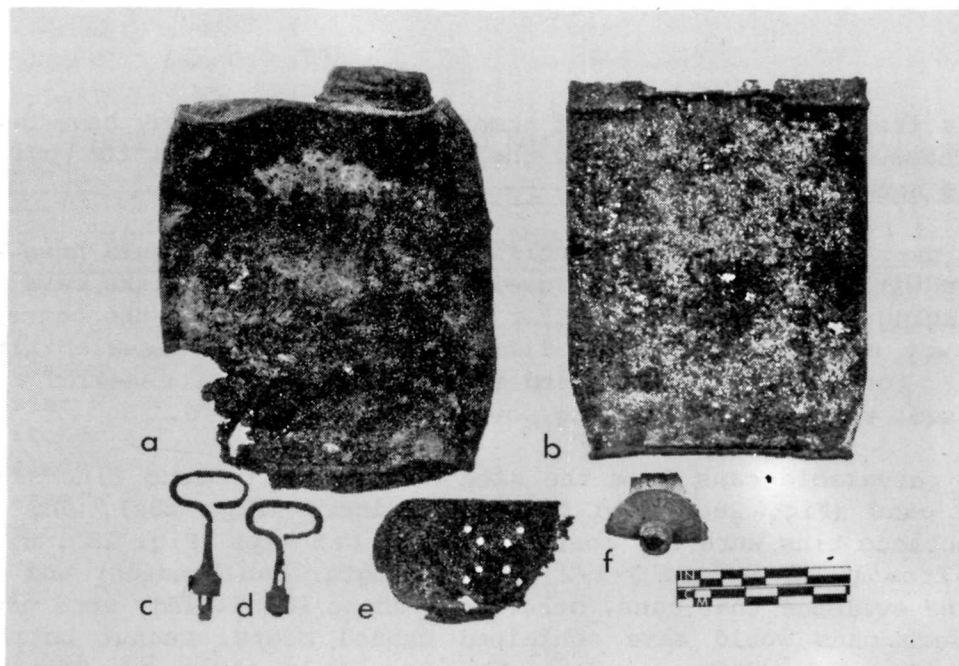


Fig. 28. Cans. a, oil/chemical can; b, tobacco tin; c-d, can keys; e, spice can top; f, "Majestic" tube top.

TABLE 17

Distribution of cans

	Privies			Dumps		Other
	F18	F15	F17	A	B	
Cans						
Pocket tobacco tins				4	2	
Oil/chemical				1		
Spice			1			
Food (nonresealable)						
Round (3 in. diameter)				1		
Round (2-3/4 in. diameter)						2
Rectangular (3 in. x 2 in. x 3 in.)					1	
Can parts						
Can keys	2	1	1	3	4	
Can handles	1			1	3	
Can lugs				2	5	
Tube						
Toothpaste				1		

of the jar contents. The caps were used first with Mason's shoulder seal jar, then with the beaded seal jar developed later (Toulouse 1977:106, 116). Except for a rubber gasket which was placed on the shoulder of the Mason jar, the cap could be used over and over until broken or worn out. A number of these caps were recovered from the site, primarily Dump B, as were numerous pieces of broken porcelain liners (Fig. 29a). Fragments of red rubber gaskets, in poor condition, were also found.

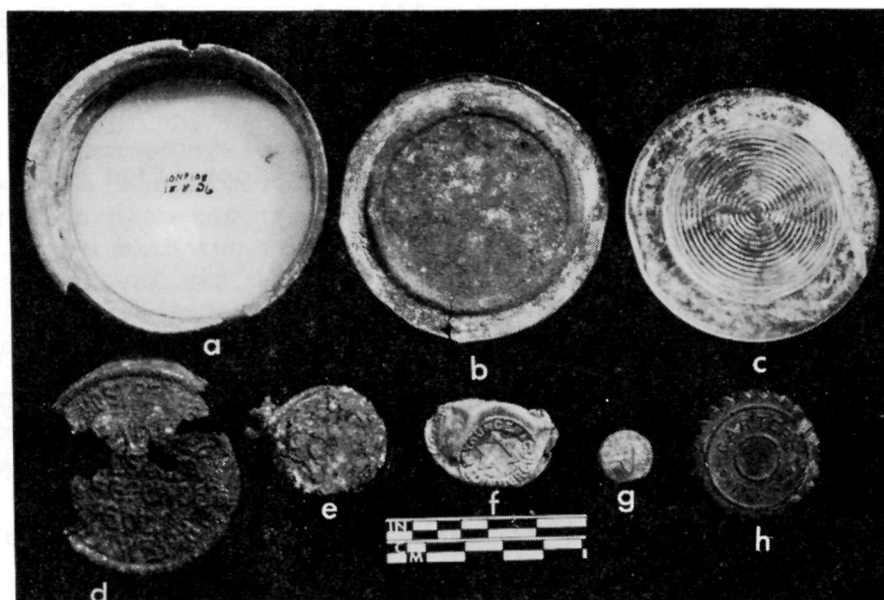


Fig. 29. Caps and lids. *a*, zinc and porcelain canning jar cap; *b*, metal canning jar lid; *c*, jelly jar lid; *d*, baking powder; *e*, cork-and-seal cap; *f*, foil liquor cap "W. Younger and Co.;" *g*, medicine cap "V;" *h*, "Carter's Ink" cap.

Another style of canning jar lid was the metal lid with spring clip which consisted of a metal lid, flat on top with a vertical flange around the edge. The lid was patented in 1903 by Golstein and later Landsberger patented the spring clip to hold the metal lid. The lid attached with a heat softenable gasket held in place by the spring clip during processing. The metal lid and spring clip fit jars with the single bead rim. Kerr secured the rights for this jar and named it "Economy." Though little evidence of the metal lid and spring clip closure was found at the site, canning jars and rim fragments with the single bead rim were recovered.

In 1915 Kerr patented the Kerr Self-Sealing jar, an improvement over the "Economy." The improvement was in the cap which involved the use of a screw thread metal band replacing the spring lip of the Economy. The heat softening compound which permanently adhered to the metal disc or lid was still used and the lid was now held in place with a screw band. The jar rim was no longer a single bead but a screw top. The older style zinc caps using the rubber gasket could also be used on these jars (Toulouse 1977:120). As the flat lids of this closure could not be reused, it is not surprising that a number of these lids were recovered from the site, mainly from Dump B (Fig. 29b).

One fragment of a glass canning jar lid was recovered from Dump B.

Jelly Jar

A clear glass lid $2\frac{1}{2}$ in. in diameter has been identified as a jelly jar lid and was recovered from Dump B (Fig. 29c).

Baking Powder

One fragmented metal baking powder lid recovered is marked ". . . & MOST PERFECT . ./ . .MADE . ./ . . ./BAKING POWDER/6oz/FULL WEIGHT" (Fig. 29d). Four additional lids are assumed to be those of baking powder based on their size and shape. These round lids are $2\frac{1}{2}$ in. in diameter and ca. $\frac{1}{2}$ in. deep.

Extracts

All cork-and-seal caps (Fig. 29e) were found with 2 oz. and 4 oz. Crescent extract bottles of Feature 18 and most caps remained on the bottles. Little is known of this kind of cap though it is advertised as a "new and remarkable Cap, combining as it does, the merits of the 'Crown and Cork' and the 'Lightening Stopper,' will appeal to every user of a bottle whose contents are not to be entirely consumed at first opening . . . the bottle may be opened and closed indefinitely without the aid of a tool of any kind" (Putnam 1965:266). The cork-and-seal caps were found on bottles dating 1925-1930.

Beverages

One foil cap, probably from a liquor bottle, was recovered from Canal 2 and marked with "W. Younger and Co./ Edinburgh" (Fig. 29f). A number of crown caps (13) were recovered from the two dump areas and the two privies.

Medicine

One small, brass, 9/16 in. in diameter screw cap, marked with a stylized "V" was recovered from Dump A and is presumed to be a medicine bottle cap (Fig. 29g).

Tobacco

Six pocket tobacco tin lids were all recovered from Dump B.

Ink

One black, hard rubber "Carter's Ink" cap was recovered from the upper levels of Canal 1 (Fig. 29h).

Other

A tube cap, possibly toothpaste, with a 5/8 in. in diameter was recovered from Dump A.

An assortment of lug seal and screw top, pry up, cork and paper caps and lids were also recovered. Screw tops caps included iron and aluminum and ranged in diameter from 7/8 in. to 2 3/4 in. Two lug seal caps were recovered, one with two and one with four lugs. A 3 in. diameter yellow lid with a rubber seal was marked "PRY UP HERE." All of these lids belonged to bottles, or jars, but exactly what kind of contents these containers would have held is not known.

Except for the cork-and-seal caps from Feature 18, the most common kind of lid cap recovered were those of canning jars (Table 18).

Discussion

The most common container found at the site is the bottle, of which the extracts are the most numerous (Table 19). It has been concluded that the contents of these were used for their high alcohol content rather than for baking purposes. Canning jars and canning jar lids of various styles are also present. Cans, not numerous, are most commonly tobacco tins. Can keys, handles, and baking powder lids suggest the use of canned condiments was more prevalent than the use of canned fruits and vegetables. Given the number of canning jars represented by rims, bases, marked fragments, and lids, the absence of nonresealable fruit and vegetable cans is not surprising.

TABLE 18

Distribution of caps and lids

	Privies		Dumps		Canal	Other
	F15	F17	A	B	2	
Food						
Canning jars						
Zinc and porcelain				8	1	
Metal lid with						
spring clip		1				
Metal lid with						
screw band			10			
Glass				1		
Jelly jar				1		
Baking powder		1	3	1		1
Beverage						
Foil cap						
Crown	2	1	9	1	1	
Medicine						
Screw cap			1			
Tobacco lids				6		
Ink						
Carter's Ink cap			1			
Other						
Cork			1			
Paper				1		
Lug seal		1	1			
Screw top	1	1	2	2		
Pry-up				1		
Tube			1			

TABLE 19
Tabular summary of container items

	F10	Privies			Dumps		1	Canals		Other	Total
		F18	F15	F17	A	B		2	4		
Container items	57	104	14	17	83	106	3	8	6	10	408
Bottles and jars	57	100	3	7		6	1				174
Extracts	41	94									135
Preserves/condiment						2					2
Canning jars			1	4							5
Alcohol		4	1								5
Non-alcohol			1								1
Medicine	11	2		1		3	1				18
Cosmetic	5			2		1					8
Bottle and jar rims			2	4	29	24	1	3	2	6	71
Preserve/condiment						2					2
Canning jar				2	6	6		1			15
Alcohol			1	2	2	3		1	1		10
Medicine					13	3	1	1	1	6	25
Food/medicine			1		8	7					16
Unknown						3					3
Bottle and jar bases		1	5		4	11	1	2	3		27
Preserve/condiment			1		1	1		1			4
Canning jar						3					3
Alcohol			4		1	3		1	1		10
Medicine					1	2			2		5
Food/medicine		1			1	2					4
Unknown							1				1
Marked fragments					9	33		1	1	1	45
Medicine					3	2		1	1		7
Extract						3					3
Condiment/preserve					3						3
Canning jars					3	28				1	32
Cans		3	1	1	11	10				2	28
Food					1	1				2	4
Spice					1						1
Chemical/oil					1						1
Tobacco tins					4	2					6
Keys		2	1	1	3	4					11
Handles		1			1	3					5
Tube					1						1
Toothpaste					1						1
Caps and lids			3	5	29	22		2		1	62
Canning jars				1	10	9		1			21
Jelly jar						1					1
Baking powder				1	3	1				1	6
Beverage			2	1	9	1		1			14
Medicine					1						1
Tobacco						6					6
Ink					1						1
Bottle/jar caps			1	2	4	4					11
Tube cap					1						1

DOMESTIC ITEMS I: CERAMIC WARES

by

Priscilla Wegars

Introduction

The water line trench excavations at Spalding produced fragments of what may be as many as 205 separate ceramic tableware vessels or decorative objects (Figs. 30, 31). Other, miscellaneous, body sherds were also recovered; those which were not unique are presumed to belong to the identified vessels. The ceramic fragments were first separated into groups based upon whether their fabric, or paste, was earthenware, porcelain, or stoneware. Once in these three major groups the individual vessels were determined by further subdividing the sherds according to decoration (plain, embossed, or color-decorated); glaze (present or absent, crazed or not); marks (printed or impressed); shape (panelling or scalloped rims); size (of rim and/or footring); stratigraphy (archaeologically-probable relationships); and cross-mending. This combination of characteristics was developed during the analysis of the Euroamerican ceramics from Boise's Chinatown; practical application of these attributes is more fully discussed in that report (Jones n.d.).

It should be borne in mind that there are certain problems inherent in dealing with materials of a fragmentary nature. Overlaps can occur, since, for example, a fragment with no decoration or embossing may be considered to be a piece from a separate vessel, when in fact it is merely an undecorated, but still diagnostic, part of a decorated vessel already described. Similarly, in a few cases it was felt that sherds from widely differing contexts might actually be parts of the same vessel. However, because they could not be cross-mended, and because the Spalding site produced a number of vessels from sets, they were treated as separate vessels but not counted as being parts of sets.

Identifiable forms (Table 20) included small and large plates, cups, saucers, small bowls, pitchers, creamers/sugar bowls, platters, mixing or serving bowls, bottles, washbasins, large and small crocks, and decorative figurines. A number of vessels were of unknown form, generally because the fragments, while unique, were too small to provide an accurate assessment of either the original rim diameter or the vessel's general shape.

Earthenware

A total of 165 vessels, or 80.5%, were manufactured from "earthenware" (Table 21), a term used to denote opaque pottery, porous unless glazed, made from fired clay. Primarily utilitarian tablewares (Table 21), all but one

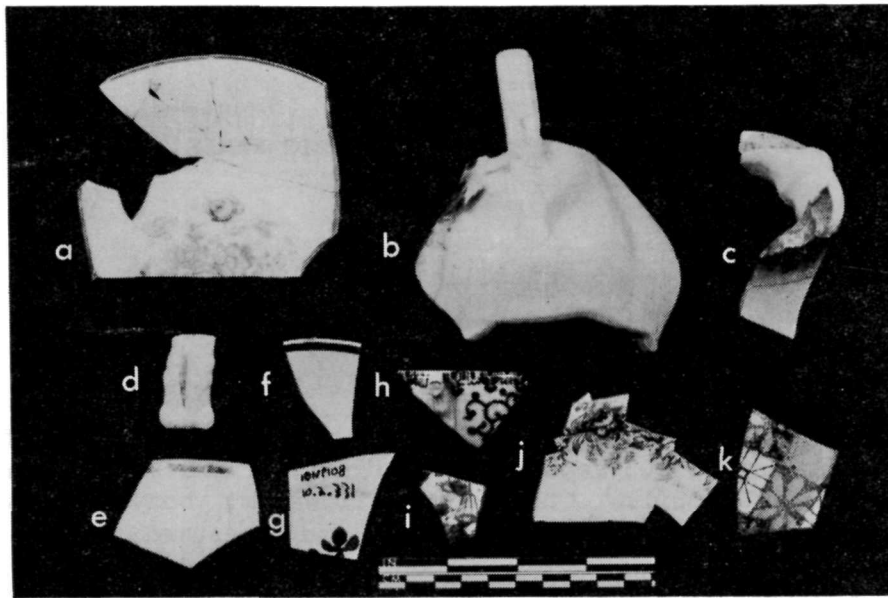


Fig. 30. Ceramic ware. *a*, earthenware bowl, multicolored floral decal with blue edge-banding; *b*, creamer or sugar bowl, porcelain, handpainted underglaze of pink flowers and green leaves with leaf-shaped stencil; *c*, earthenware pitcher handle, cable design; *d-e*, handle and cup with gilding; *f-g*, earthenware saucers with "Copper Tea Leaf" metallic luster; *h*, tea cup, Japanese porcelain, blue transferprinted design of chrysanthemum blossoms and tendrils; *i*, saucer, Japanese porcelain, handpainted design in red overglaze enamel; *j*, earthenware saucer, kelly green floral decal; *k*, earthenware bowl, orange and brown handstamped flower and geometric design.

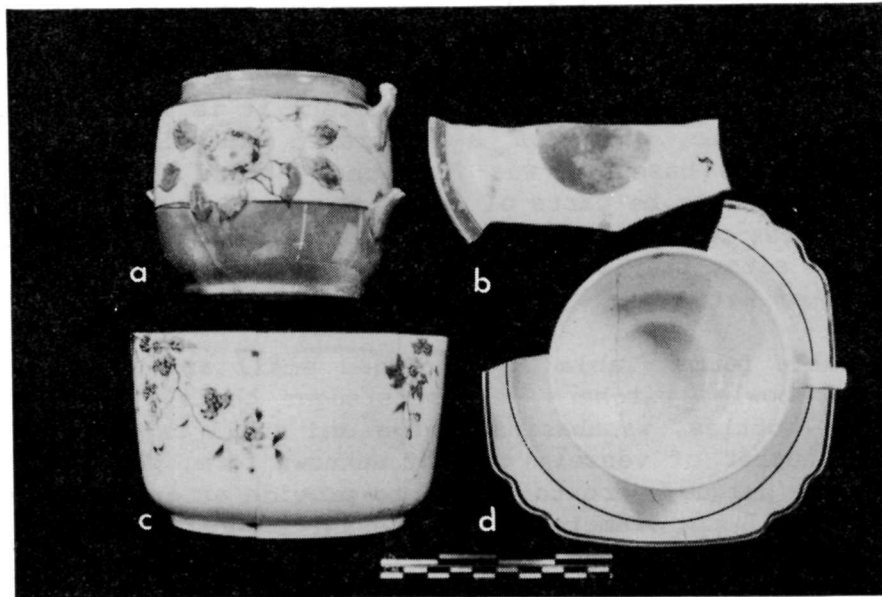


Fig. 31. Ceramic ware. *a-b*, sugar bowl and saucer, porcelain with iridescent luster, hairlining, and overglaze handpainting; *c*, bowl: earthenware; brown transferprint in the "Stafford" pattern by J. and G. Meakin; *d*, cup and saucer: earthenware, ivory color with black hairlining and gilding by Homer Laughlin, 1933.

TABLE 20

Ceramic forms represented in the Spalding ceramic assemblage

	Earthenware	Porcelain	Stoneware	Total
Bottle	2	-	3	5
Bowl, mixing/serving	8	-	-	8
Bowl, small (4-6 in.)	20	3	-	23
Creamer/sugar bowl	-	2	-	2
Crock, large (> 12 in.)	-	-	2	2
Crock, small (< 12 in.)	-	-	10	10
Cup	21	4	-	24
Figurine	-	3	-	3
Pitcher	4	-	-	4
Plate, large (> 8 in.)	50	1	1	52
Plate, small (< 8 in.)	3	1	-	4
Platter	2	-	-	2
Saucer	17	1	-	18
Washbasin	3	-	-	3
Unknown	35	7	2	44
Total	165	22	18	205

TABLE 21

Percentage of paste types represented in the Spalding ceramic assemblage

Type	No. of vessels	Type Total	% of Type total	% of Grand total	Type total % of Grand total
Earthenware					
Plain white earthenware	62		37.6	30.2	
Decorated white earthenware	28		17.0	13.7	
Color decorated earthenware	74		44.8	36.1	
Yellowware	1		.6	.5	
Total		165	100.0		80.5
Porcelain					
Plain white porcelain	2		9.1	1.0	
Decorated white porcelain	4		18.2	2.0	
Color decorated porcelain	12		54.5	5.7	
Biscuit ware	2		9.1	1.0	
Color decorated biscuit	2		9.1	1.0	
Total		22	100.0		10.7
Stoneware	18	18	100.0	8.8	8.8
Grand Total		210			100.0

of the vessels in this category were glazed white wares, either perfectly plain (37.6%), or with embossed decoration (17.0%), or color decorated (44.8%). Plain white earthenware is sometimes known as "hotel ware" because it was "made especially for restaurant and hotel use" (Montgomery Ward and Company 1901:[12]), however, because it was thick, durable, inexpensive, and readily obtainable it often found its way to household dining tables as well.

"Hotel ware" as such may have continued to appear in consumer-oriented mail order catalogues at least until 1927, since the index for a reproduction of the Sears, Roebuck catalogue for that year lists "Hotel Tableware" on two pages (Sears, Roebuck and Company 1927:914, 921). However, while the first of these pages is one of many omitted by the publisher, the latter page included no mention of "hotel," only "plain white tableware" "for everyday use." This type of crockery was also extensively promoted in catalogues "to the trade" from which small-town general store proprietors, such as the Watsons of Spalding, could order merchandise for resale. Marked vessels included eight from at least three different English manufacturers, Thomas Hughes, J. & G. Meakin, ... Meakin, and Powell & Bishop. Two vessels had marks of American manufacturers, W. S. George and (probably) Homer Laughlin. Six fragmentary marks were unidentifiable.

Besides the 62 vessels of plain white earthenware, the Spalding site also produced 28 examples of decorated white earthenware. "Decorated" here means that the object has embossed or molded decoration, with no added color. To make this type of ware, clay slip was poured, or clay slabs were pressed, into plaster of Paris molds carved with the design intended for the particular vessel. Decorated white earthenwares were especially popular from the 1870s-1880s until the turn of the century (Wetherbee 1980:19). Although they were subsequently less prevalent, decorative touches did survive in knobs and handles on otherwise-plain white earthenwares, and, in fact, such ware is still being manufactured today (Metlox Potteries n.d.: [6], [8], back cover).

Some of the decorated white earthenware recovered from Spalding may well date to the period 1872-1900, however, because of the fragmentary nature of the material, it has not been possible to identify any of the earlier designs in the standard reference works on the subject (Kamm 1951; Freeman 1954; Wetherbee 1980). At least one of the twentieth century embossed wares was identifiable as the handle from a pitcher decorated with the "Cable" design (Butler Brothers 1925:[20]) (Fig. 30c). The single marked vessel was manufactured by Johnson Bros., an English firm.

Identification of pattern names for decorated white earthenware, especially, as well as for color-decorated earthenware, below, is complicated by the fact that the words "pattern" and "shape" could be used interchangeably: "The shape is of the very latest pattern" (Montgomery Ward 1895:528) or separately: "Our Glenwood Toilet Set is the same shape as the Ardmore, but differently decorated" (Sears, Roebuck and Company 1902:797). In general, the term "shape" seems to be best reserved for the embossed design formed by the plaster of Paris mold, and the term "pattern" for a decorative design placed onto the vessel. Thus decorative white earthenware

would just have a "shape," and color decorated earthenware could have both a "shape" and a "pattern."

A total of 74 individual vessels were color decorated earthenwares. The term "color-decorated" refers to the many methods of applying a colored design or decoration to an otherwise-white, plain or embossed, ceramic body. Methods, used either alone or in combination, included transfer printing, handpainting, luster, edge-banding, decalcomania, handstamping, gilding, hairlining, colored pastes, and colored glazes. These methods, while most often used alone, were frequently seen in combination, such as gilding or edge decorating with decalcomania, handpainting with luster, or decalcomania over ivory colored glaze.

Colored Glazes

In 1930 "bright allover color glazes" were touted as "the NEW IDEA in kitchen crockery" (Butler Brothers 1930:[15]). Green and yellow were then the most frequently seen colors; rose, light blue, and brown were also used. By 1936 the Homer Laughlin China Co. was producing its Fiesta ware in green, yellow, blue, and red; additional colors were added in subsequent years. Other firms soon followed suit (Blackwell Wielandy Company 1940-41:inside front cover). Although production of authentic Fiesta ware was discontinued in 1971 (Lehner 1978:48) or in 1973 (Lehner 1980:89), Fiesta-type ware has recently (1980-1981) enjoyed a resurgence in popularity; similar bright colors are currently being reproduced by other manufacturers. Colored glazes represented in the Spalding assemblage include canary yellow, royal blue, brilliant turquoise, and dark brown. Because of the absence of manufacturers' marks, none of these vessels can be attributed to any particular firm, however, we do know that true Fiesta ware was never available in dark brown (Lehner 1980:89).

In addition, several other vessel pieces are stamped "Ivory Color" on the base. This refers to the off-white glaze used on the vessels, over which a decal has normally been applied. A catalogue for 1925 lists two ivory tinted sets (Butler Brothers 1925:[24], [27]), and one for 1927 refers to "the new ivory semi-porcelain" (Sears, Roebuck and Company 1927:915). Although an "Ivory" pattern was used as early as 1886 (Barber 1904:145), the multicolored decals, discussed below, in combination with the ivory glaze, date the Spalding vessels to the mid-1920s or later.

Colored Pastes

The Spalding excavations produced fragments from one "yellowware" vessel. Yellowware has a buff or cream colored body, and when glazed with clear glazes it appears more yellow, hence the name. It was often decorated with bands of colored slip, in this case blue, and was used for a variety of utilitarian wares, particularly kitchen mixing bowls, such as the Spalding example. One authority dates yellowware to 1840-1900 (Ramsay 1939:151), however, "Blue Banded Yellowware Kitchen Bowls" were advertised in a wholesaler's catalogue as late as 1925 (Butler Brothers 1925:[33]).

Decalcomania

It is surprising that so little has been written about this method of ceramic decoration, since it is "now the most widely employed kind of printing for overglaze decoration" (Savage and Newman 1974:180). The process of decalcomania consists in printing designs as films on backing paper which has been especially prepared with "a solution of starch, albumin, and glycerin" (Encyclopaedia Britannica 1979:Micropaedia III, 421). The printed design is then covered with a water-soluble glue. When the paper is moistened and applied to the object to be decorated, the backing paper can be slid off, leaving the decal in place to adhere to the object. Also called "transfers" (but distinct from "transfer printing," below), decals seem to have been invented in Europe in the 1900s. Their first commercial production in the United States was in 1890 (Kane 1964:206), however, these may not have been used on ceramics since "the potters insisted the decal manufacturers use English-made duplex paper so most ceramic decals were imported from France" (Sears, Roebuck and Company 1909:123) or from Germany until at least the late 1930s (Lehner 1980:13). While their use on American ceramics was rare before 1900 (Ramsay 1939:154), they were certainly available in two colors by 1902 (Sears, Roebuck and Company 1902:789). By 1906 decals were quite common (Sears, Roebuck and Company 1906:355-361), and by 1909 they almost completely dominated the market (Sears, Roebuck and Company 1909:1212-126). It was now possible to reproduce any design, particularly floral ones, in natural colors, inexpensively, yet still have a product which "very closely resembles genuine hand-painted china" (Sears, Roebuck and Company 1908:362).

While decals are generally applied over the glaze, they can evidently be used under the glaze as well (Savage and Newman 1974:180), although this latter method is not common. Overglaze decals can be seen to be less glossy than the surrounding glazed areas of the object (Sprague 1980:20) and can also be felt with the fingernail or a sharp object. For that reason, they will, in time, deteriorate, although "with ordinary wear they will last a lifetime" (Sears, Roebuck and Company 1902:789).

The decalcomania-decorated wares from Spalding are primarily floral prints, having 14 different designs. Several of these are printed in one color only, while others appear in two colors or in multicolors (Fig. 30a). On a few of these fragments, the decal decoration is combined with another decorative method, such as gilding or hairlining. Preliminary research indicates that there is likely to be an inverse relationship between the number of colors used and the age of the vessel, that is, vessels with single-colored decals may tend to be older than those with multicolored ones. We suspect, for example, that the Kelly green floral decal (Fig. 30j) may date from as early as 1897, when "the latest fad [was] green table decorations" (Sears, Roebuck and Company 1897:679) although that date is five years prior to the known appearance in the Sears, Roebuck catalogues, of decal decorated ceramics. There also seems to be an age-related correlation with respect to the use of certain additional decorative elements, with, for example, gilding being earlier than hairlining. Continuing research may be able to document any such trends with somewhat greater precision.

Edge-banding

Although gilding on the edges of vessels was practiced since at least 1894 (Montgomery Ward and Company 1894-95:508) it was not until perhaps the 1920s that the edges seem to have been painted in colors other than copper luster or gold (Sears, Roebuck and Company 1923:723). Black was frequently chosen, sometimes combined with hairlining, described below; other colors, often blue or green, were used when they provided a pleasing accent to the colors of the main design.

This technique is seen on eight of the Spalding vessels. Colors used are platinum, blue, and gray. The blue and gray edge-banding is combined with decals; pink and green with the gray, and multicolored with the blue. The platinum edge-banding is combined with black hairlining. Of these latter vessels, one is marked "Homer Laughlin J33N8" indicating that the vessel was made in 1933 (Lehner 1980:88). One of the blue-banded vessels has a portion of the words "Ivory Color" on the base; this refers to the glaze over which the decoration was placed.

Gilding

Decorative highlights were often provided by gliding certain vessels in a set. In less expensive sets this might be confined to knobs and handles, while in more expensive ones the edges of all the pieces would be gilded as well. Generally, powdered gold in liquid form was used. A fine-pointed brush would be dipped into it and the piece would be revolved on a potter's wheel while the brush was applied to it, thus gilding the edges quickly and evenly, over the glaze. The piece was then fired again to fix the gilding, but as it became dull in the firing process, it then had to be burnished to restore its luster.

It is not known when gilding was first employed as a decorative technique, but it was certainly in use by 1894, when it was used on five out of nine advertised patterns, or 55.6% (Montgomery Ward and Company 1894-95:508). At the turn of the century it was even more heavily used, appearing on 25 of 44 advertised sets, or 56.8% (Montgomery Ward and Company 1901:[1-16]). Subsequently it became particularly popular on decorated (embossed) white tableware; a "white and gold dinner set is always fashionable and always in style" (Sears, Roebuck and Company 1908:350). Considering the extra work involved, gilding seems surprisingly inexpensive by today's standards. A 100-piece set in the "Hampshire" pattern, in 1906, could be had for \$5.98 without gilding, or \$6.75 with gold decoration on knobs and handles, which is approximately 2.5¢ apiece for the 30 or so pieces needing to be gilded. If the customer could afford the dinner set to begin with, she could probably afford to have it gilded as well. As late as 1925 it was still a fashionable decorative motif, and was often combined with gold decals in the form of flower sprays and medallions; 26 of 46 patterns, or 56.5%, in a catalogue for that year had some form of gilding (Butler Brothers 1925:[19-32]).

Some 16 of the Spalding vessels were gilded (Fig. 30d, e), most of this on otherwise plain, unembossed white ware. This represents 21.3% of the color-decorated earthenwares, and can be usefully compared with the figures of over 55% for mail-order ceramics cited above for years spanning 1895 to 1925. Either gilded ceramics were not readily available for purchase by Spalding residents, or the price differential was important enough to limit purchases to cheaper, ungilded wares.

Hairlining

In this decorative technique a thin line in a contrasting color, often black, was painted over or under the glaze, most usually in combination with a decal or other motif. The method for applying the line was the same as that for gilding, that is, a paint brush was held in a steady hand while the piece was rotated on a potter's wheel. The hairline was intended to be quite thin, perhaps less than 1/16 in. in width, and was often placed inside a cup or around the widest circumference of an items such as a sugar bowl; by its width and placement one can usually distinguish it from edge-banding.

Hairlining was in use at least as early as 1923 (Sears, Roebuck and Company 1923:723). It is seen on three of the Spalding earthenware vessels, one of which, as mentioned earlier, was manufactured by Homer Laughlin in 1933 (Fig. 31d). This technique was also used to decorate some of the porcelain vessels, discussed below.

Handpainting

This term refers to designs which are created by hand rather than by decals or transfer prints; it does not here include the less-creative processes of edge-banding, gilding, or hairlining. It also includes outlined designs which were filled-in by hand.

Seven of the Spalding earthenware vessels display handpainting techniques, either alone, with luster, or with gilding, but the pieces are so small and the designs are so fragmentary that it is impossible to tell what motifs might have been represented, with the exception of a few floral patterns.

Handstamping

Some techniques of decoration involve the use of a stamp, perhaps made from cork or sponge, to apply a repetitious design element. This method is seen in a single body sherd from one of the more unusual Spalding vessels. A sponge-like stamp approximately 1 in.², in the shape of the outline of an eight-petaled flower, alternates with similar-sized plain stamps and blank areas. In addition, the blank areas have been stamped over the glaze with a geometric design (Fig. 30k). Colors are orange and brown. While some authorities feel that handstamped wares may "be Scottish in origin and . . . popular from the 1850s to the 1880s" (Sprague 1980:21-22), the

Spalding fragment is very different in appearance from the piece illustrated there, and, stylistically, seems more characteristic of late 1930s-early 1940s decoration.

Luster

This term can be applied to two different decorative techniques. In the first, the luster has a metallic appearance, and in the second is iridescent. The first method which is the oldest, is seen on several fragments of copper luster ware from Spalding. The metallic oxide was painted on the vessel which was then fired; the resulting copper color is quite natural and metallic in appearance.

Originally called "Lustre Band and Sprig" (Kamm 1951:149), the copper luster pattern on the Spalding examples (Fig. 30f, g) is now termed "Copper Tea Leaf" by modern collectors (Wetherbee 1980:122). From about 1890, and "for a decade and more it was the most popular of all the patterns made in England for the American trade and . . . [was] the set for everyday use" (Kamm 1951:149). One of the Spalding pieces is marked "JOHN EDW[ARDS] ENGLAN[D], a firm which was in business only until 1900 (Godden 1964:231); their name for their particular pattern was "Peerless" (Kamm 1951:150).

The second, more recent, luster technique is seen at Spalding only on porcelain vessels, so it will be discussed under that heading.

Transfer Printing

Briefly, this method involved engraving a design onto a copper plate. The plate was then inked, wiped off, and a piece of tissue paper pressed on it to pick up the ink remaining in the grooves. The inked tissue paper was then paced on the vessel to be decorated, and rubbed to transfer the color to it. Following removal of the tissue paper, the piece was glazed and then fired. Transfer printing was developed in England in the mid-eighteenth century and soon became the preferred means of decorating ceramics inexpensively, remaining so until the early years of the twentieth century, when it was superseded, but not completely replaced, by the decalcomania process.

Fragments of six transfer-printed vessels were found at Spalding. Of these, five are from the same set, and are a brown floral pattern called "Stafford," (Fig. 31c). Also stamped on the base of one of these vessels is the mark of "J & G MEAKIN," a firm of English potters. Although brown patterns were quite popular in the early 1880s and had probably passed their peak by the 1890s (Kamm 1951:94), this particular mark indicates that the piece was made after 1907 (Godden 1964:427). The remaining piece is a fragmentary, unidentified floral pattern in what is known as "flow blue," a method in which the colors were caused to run, or flow, during firing by the addition of certain chemicals into the kiln.

The decorative techniques discussed above are those which were seen in the earthenware assemblage from the Spalding water line trench excavations. They are particularly representative of twentieth century ceramics, as are the marks found on seven of the color decorated vessels. Two bore names of English firms, John Edwards and J & G Meakin, and two were from American firms, Harker Pottery and Homer Laughlin. Three "Ivory Color" vessels are probably American, as is one other with fragmentary lettering, possibly part of a pattern name; one mark is indecipherable.

Porcelain

Fragments of 22 porcelain items were recovered from the Spalding excavations, comprising 10.7% of the grand total of 205 vessels and decorative objects. "Porcelain" is a term used to describe ceramics made from a mixture of clay and stone which vitrifies at high firing temperatures, becoming impervious to liquids. Unless it is quite thick it is translucent when held up to a strong light and it does not craze. Although porcelain can be "hard paste" or "soft paste" depending upon the paste formula and the firing temperature, no attempt was made in this study to distinguish between these two types.

The Spalding porcelain can be subdivided into five separate categories. Three vessels were plain white porcelain, 4 were decorated (embossed) white porcelain, and 12 were color-decorated. Six pieces were biscuit ware, or unglazed porcelain. Of these, three were color-decorated. A number of different forms were represented in the assemblage, and the identifiable ones are summarized in Table 20. These forms included plates, cups, a saucer, bowls, creamers or sugar bowls, and decorative figurine parts.

The decorated porcelains exhibit some of the same design techniques already discussed for earthenware, and include, besides embossing, handpainting, iridescent luster, luster with handpainting and hairlines (Fig. 31a, b), transfer printing, and gilding. Iridescent luster was in the form of a wash, or stain, which was painted on, giving an iridescent appearance. While this technique was probably used earlier, it became quite popular in the early 1920s when "tea sets in bright luster colors" were "the very latest rage" (Sears, Roebuck and Company 1923:723). The use of stencils or cutouts was another decorative technique which may have been introduced in the mid-1920s (Butler Brothers 1925:[29], [31]); the underglaze handpainted design on one Spalding creamer or sugar bowl (Fig. 30b) consists of pink flowers and green leaves, accompanied by the use of a leaf-shaped stencil, which has had a turquoise wash brushed around it.

Oriental porcelains, all Japanese, are also represented in the Spalding material. Four different patterns are represented, probably comprising about six vessels. Fragments of a teacup are decorated with a blue transfer-printed design of chrysanthemum blossoms and tendrils, with a repetitive border decoration (Fig. 30h). Another example of this pattern seen recently was stamped "Made in Japan" (Mary Condon 1981:personal communication); this would date from approximately 1921-1940 (Stitt 1974:176). The design is somewhat similar to others illustrated elsewhere

which also show a H \overline{O} - \overline{O} bird; this decoration is then called "Flying Turkey" (Stitt 1974:187). A small piece of what is possibly a saucer has a handpainted design which appears to be a lamp or lantern (Fig. 31i); it is painted in red overglaze enamel and in effect is similar to other pieces showing "scenes with ladies" made primarily for export during the "Nippon" period, 1891-1921 (Stitt 1974:139, 149). Three other sherds, probably from a small bowl, are decorated with gray and orange overglaze handpainting in an unknown design. The final pieces are decorated with the iridescent luster described above. A nearly-complete sugar bowl, and parts from a saucer and a cup are decorated with blue luster bands (pink for the cup) with black hairlines and a handpainted flower in black outline with a blue, rust, and yellow center, and green leaves. The style of decoration is similar to that on 23-piece tea sets imported from Japan and advertised in 1925 (Butler Brothers 1925:[6]), and it is virtually identical to the pattern of a creamer dating to the Occupied Japan period, 1945-1952 (Stitt 1974:192-193).

One of the Spalding porcelains was marked, and that was the stencil-decorated creamer or sugar bowl (Fig. 30b) which was stamped "GERMA[NY]" on the base, a mark similar to some from excavations at Silcott, Washington (Gaw 1975:175).

Stoneware

Fragments of 18 stoneware vessels, from crocks, bottles, and a possible plate, were recovered from the Spalding water line trench excavations. This represents 8.8% of the total of 205 vessels recovered. "Stoneware" is defined as "A type of pottery midway between earthenware and porcelain, . . . made of clay and a fusible stone. It is fired to a point where partial vitrification renders it impervious to liquids . . . The vitrification makes it unnecessary to add a glaze, but for reasons of utility and appearance, decorative glazes are sometimes used . . ." (Savage and Newman 1974:275).

The Spalding stoneware vessels were glazed by one of two different methods, either salt vapor or slip. In salt vapor glazing (or salt-glazing), salt is introduced into the kiln after it has been loaded with the vessels to be fired. At 2200°-2300°F, the salt vaporizes and the free sodium combines with the silica in the clay, resulting in a glazed surface (Stewart and Cosentino 1977:20). A distinguishing characteristic of salt-glazed stoneware is a pitted "orange peel" appearance on the outside of the vessel. Of the three salt-glazed vessels from Spalding, two (possibly the same ink bottle) are unglazed on the interior. The third salt-glazed vessel, a crock, has a light-brown salt-glazed exterior and a dark brown slipped interior.

Slip glazing is done by dipping the piece into liquid clay, resulting in a "smooth, even, glassy texture" (Landreth 1981:6) on the surface of the vessel. One fragment of what was probably a beer bottle has a clear slip glaze on both exterior and interior. "Albany" type slips are brownish in color, and "Bristol" type slips are whitish. The Spalding slip-glazed

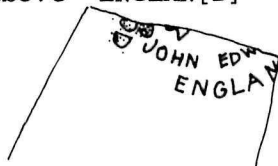
stonewares, 14 vessels, show both these types of slip, both alone and in combination. Albany type slips occur on both the exterior and interior of six vessels, while Bristol type slip are found on both faces of five vessels. Three vessels have Bristol type slip glaze on the outside and Albany type slip glaze on the inside.

Only one of the stoneware vessels was marked. A Bristol type slip-glazed crock had a small portion of either a manufacturer's mark, or a numeral denoting capacity, in cobalt blue on the outside just below the rim.

Manufacturers' Marks

A total of 29 of the Spalding ceramic vessels were marked, including some duplication. A number of these marks, or backstamps, were identified, and can be dated, while others were only fragmentary or indecipherable. Several of the impressed marks, at first unreadable, were x-rayed and deciphered using a technique developed by Grosso and Jones (1977:124-125). The listing below is based upon the format established by Praetzellis and Praetzellis (1979:164-173).

1. Manufacturer: John Edwards & Co.
Place: Fenton, Staffordshire, England
Mark: No. 1. Printed (brown): Unknown device above "JOHN EDW[ARDS] above "ENGLAN[D]"



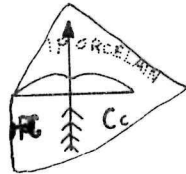
- No. 2. Impressed: Unknown; very fragmentary and illegible even with x-ray
Date: Firm, 1847-1900; mark, ca. 1880-1900 (Godden 1964:231)
Mark illustrated: Godden 1964:231, Nos. 1451-2
Comments: This firm produced "semi-porcelain and white granite for the American markets" (Praetzellis 1979:20 quoting Jewitt 1883:556)
Provenience: Dump A

2. Manufacturer: W. S. George Pottery Co.
Place: East Palestine, Ohio
Mark: Printed (green): "[R]ADISSON" above "[W. S.] George" above "[. . .]88A"

RADISSON
W. S. GEORGE
88A

Date: 1909-1955 (Lehner 1978:55)
 Mark illustrated: Adams, Gaw, and Leonhardy 1975:265; Gaw 1975:178; Lehner 1980:182; Sprague 1980:99, 161 (all similar, not exact)
 Comments: "Radisson" refers to the shape (Lehner 1980:60). This same shape, with a slightly different mark, was also found at Silcott, Washington (Gaw 1975:178).
 Provenience: Dump A

3. Manufacturer: Harker Pottery
 Place: East Liverpool, Ohio
 Mark: Printed (green): "[SEMI PO]RCELAIN" above a bow with an arrow above the "HP" monogram on the left and "[Co.]" on the right

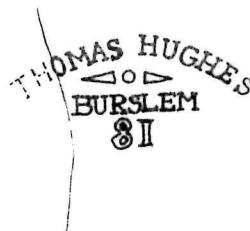


Date: Firm, 1890-1972 (Lehner 1980:74-75)
 Mark illustrated: Barber 1904:105; Adams, Gaw, and Leonhardy 1975:265 (upside down); Gaw 1975:176 a, g (a upside down); Lehner 1980:185.
 Comments: ". . . white granite and semi-procelain have been the staple products . . ." (Barber 1904:105).
 Provenience: Dump B

4. Manufacturer: Thomas Hughes
 Place: Burslem, Staffordshire, England
 Mark: No. 1. Printed (black): "IRONSTONE CHINA" above the Royal Arms (standing) above "THOMAS HUGHES". This mark occurs with



No. 2. Impressed: "[TH]OMAS HUGHES" above "-o-" above "BURSLEM" above "81"



No. 3. Impressed: "THOMAS HU[GHE]S" in a semi-circle above "-o-" above "BURSL[EM]" above "77"

No. 4. Printed (black): Fragment of a lion on a spotted shield above "TRADE MARK" above "THOMAS HUGHES" above "ENGLAND"



Date: Firm, 1860-1894 (Godden 1964:339). Marks No. 1 and No. 2, probably 1881; No. 3, probably 1877 (Geoffrey Godden 1979:personal communication); No. 4, possibly 1891-1894 since the term "Trade Mark" is at least post 1862 and usually post-1875, while "England" is usually post-1891 (Godden 1964:11).

Mark illustrated: No. 4: Sprague 1980:161 (partial).

Comments: Ceramics from this manufacturer were also recovered from excavations at San Juan Island (Sprague 1980:133-134, 161-162), from Boise Chinatown (Jones n.d.), and the Palus Burial Site (Roderick Sprague 1981:personal communication).

Provenience: Nos. 1 and 2: Canal 2; No. 3: Dump B; No. 4: Canal 2. Two other vessels with fragments of the same mark are from Canal 2 also.

5. Manufacturer: Johnson Bros.

Place: Hanley, Staffordshire, England

Mark: Printed (brown): "ROYAL" above "[SE]MI-PORCELAIN" above a crown above "[JOHNSON BR]OS" above "[ENGLAND]"



Date: Firm, 1883 to date; mark, ca. 1900+ (Godden 1964:355)

Mark illustrated: Godden 1964:355, No. 2177

Comments: Ceramics from this manufacturer were also recovered from Silcott, Washington (Adams, Gaw, and Leonhardy

- 1975:265; Gaw 1975:177-178) and Boise Chinatown (Jones n.d.)
- Provenience: Dump A
6. Manufacturer: Homer Laughlin China Co.
Place: East Liverpool, Ohio and Newell, W. Va.
Mark: No. 1. Printed (blue): "HLC" monogram above "Homer Laughlin" above "MADE IN USA" above "J33N8"



- No. 2. Printed (green): "...IN U.S..." above "...40 N6"
- Date: Firm, 1897 to date; No. 1, October 1933; No. 2, 1940 (Lehner 1980:88)
- Mark illustrated: Lehner 1980:187, Sprague 1980:99, 161 (all similar)
- Comments: Ceramics from this manufacturer were also recovered at San Juan Island (Sprague 1980:99) and at Silcott, Washington (Adams, Gaw, and Leonhardy 1975:265)
- Provenience: No. 1: Dump A; No. 2: Dump A
7. Manufacturer: ...Meakin (Alfred, Charles, Harry, Henry, or J & G)
Place: Staffordshire, England
Mark: Impressed: "...MEAKIN"
Date: Unknown
Provenience: Dump B
8. Manufacturer: J & G Meakin Ltd
Place: Hanley, Staffordshire, England
Mark: No. 1. Printed (black): A portion of the Royal Arms above "J & G [MEAKIN]" above "HA[NLEY]" above "EN[GLAND]"

No. 2. Printed (brown): "STAFFORD" above "SEMI-PORCELAIN" (curved, in a ribbon), above a double circle with "HANLEY" (curved) above "J & G MEAKIN" (straight) above "ENGLAND" (curved)



Date: Firm, 1851 to date; No. 1, ca. 1890+; No. 2, ca. 1907+ (Godden 1964:427)
 Mark illustrated: Godden 1964:427, No. 2601, 2602
 Comments: Their specialty was "white graniteware of ordinary quality" (Praetzellis 1979:32 quoting Jewitt 1883:504). Ceramics from this manufacturer, some with the same mark as No. 1, were also recovered from Silcott, Washington (Adams, Gaw, and Leonhardy 1975:265; Gaw 1975:177)
 Provenience: Dump B

9. Manufacturer: Powell and Bishop
 Place: Hanley, Staffordshire, England
 Mark: Printed: A crown above a garter enclosing "IRON[STONE]" above "CHIN[A]" above a ribbon with "POWEL[L & BISHOP]"



Date: Firm, 1867-1878 (Praetzellis 1979:36). This mark, 1876-1878 (Godden 1964:509).
 Mark illustrated: Godden 1964:509, No. 3136; Sprague 1980:101, 165
 Comments: One of Powell and Bishop's three factories was devoted to the production of "white granite" ware (plain, embossed, or color-decorated) for the American and Canadian markets (Praetzellis 1979:37, quoting Jewitt 1883:497-498)
 Provenience: Dump A

- 11-23 Manufacturer: Unknown
 Mark: No. 11. Printed (black): "...A..."
 No. 12. Printed (brown): "GERMA[NY]"

2



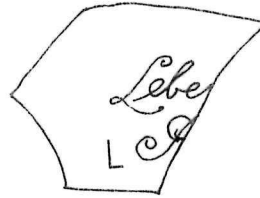
No. 13. Printed (green): "Ivory Color"
 T

Ivory Color
T

No. 14. Printed (green): Ivory Color"
L

No. 15. Printed (green): "I.... C....."

No. 16. Printed (green): In script, "Lebe..."
above what may be a script capital "G..."



No. 17. Printed (green): "Le..."



No. 18. Printed (green): In script, "...llis"

No. 19. Printed (brown: "...nco"



No. 20. Printed (black): "...OE..." or "...OF..."
within concentric circles

No. 21. Impressed: "72"

No. 22. Printed (cobalt blue): Two parallel lines
on the outside of the vessel.

No. 23. Printed (green): illegible.

Place:

Unknown, except No. 12, Germany; Nos. 13-15,
probably U.S.A.; No. 21, possibly England

Date:

All unknown except No. 21 is possibly 1872; on
stylistic grounds, Nos. 12-19 are probably twentieth
century.

Comments:

No. 12: vessels marked "GERMANY" but with different
numbers were recovered from excavation at Silcott,
Washington (Gaw 1975:175). Nos. 16-17: could be

the name of a pattern, however, consultation of an unabridged dictionary produced no likely words beginning with this combination of letters; it is possibly foreign - Le Beuf (also written Lebeuf), Milliet & Co., were/are potters in Criel (Oise), France (Chaffers 1946:184-185). No. 18: possibly a pattern name, such as "Trellis" or Phillis" (Lehner 1980:189), or "Phyllis"

Provenience:

No. 11, other; No. 12, Dump B; No. 13, Dump B; No. 14, Dump A; No. 15, Dump B; No. 16, Feature 10; No. 17, Dump B; No. 18, Dump A; No. 19, Dump A; No. 20, Dump A; No. 21, other; No. 22, Dump B; No. 23, Dump A.

Ceramics and Features

Feature 10 produced fragments of 11 different ceramic vessels, all earthenware except for one stoneware ink bottle. Five vessels are of unknown date, and the rest range from the last quarter of the nineteenth century to perhaps the first quarter of the twentieth century. Two of the vessels were probably from sets, both of which had other pieces from the same set in Dump B.

Feature 18 had fragments of only two earthenware vessels. While one is of unknown date, the other was probably manufactured ca. 1925-1930 as its "Cable" pattern is identical to that of vessels advertised at that time (Butler Brothers 1925:[20]; 1930:[9]).

Feature 15 also produced fragments of 11 different vessels, 8 earthenware, and 3 porcelain. While five are of unknown date, the remainder are all twentieth century, with three ca. 1927, and two date to 1933. Six vessels from three different sets are included in the group. One of the same sets is also found in Feature 17, and another is common to both Dump A and Dump B.

In Feature 17 were found fragments from one stoneware vessel and two earthenware ones. The only datable piece is a ca. 1933 cup to one of the same sets found in Feature 15 thus dating both features after 1933. The stoneware fragment is from a 13 in. diameter lid to a large crock of several-gallon capacity; a similar lid was recovered from the Joso Bridge excavations in southeastern Washington.

Dump B produced 64 vessels, all earthenware except for 6 porcelain and 5 stoneware ones. Individual sherds tended to be large, and some vessels could be partially reconstructed. Dates ranged from the last quarter of the nineteenth century through the second quarter of the twentieth century. Most of the earlier-dating artifacts appeared to come from the lower levels of the dump. Fifteen vessels were found to belong to eight different sets. Two of these sets are common to Feature 10; one is common to both Feature 15 and Dump A; two are common to vessels from other units, not features; one is

complete. As pieces broke they would need to be replaced. As Gaw points out, however, it would have rarely been possible to match a set exactly, so people would have had to make do with whatever they could get (Gaw 1975:171-172). The nearest big town, where one might expect to find a good selection, was Lewiston, but a visit there would have involved a time-consuming journey, as well as an expenditure for, most usually, a train ticket. Mailorder companies like Montgomery Ward and Sears, Roebuck changed patterns frequently (Gaw 1975:172); in addition, not all the patterns they carried were open stock even if they were still available. Still another source of replacement ceramics would have been the local general store, which would have had a minimal selection of those pieces which the proprietors had learned through experience would be the most likely ones to be chosen for purchase.

In comparing Silcott with Spalding the evidence shows that there were probably more sets in use at Spalding than there were at Silcott. There are perhaps two reasons for this. The first is, that from about 1925 on there was both a trend towards smaller dinner sets and a wider choice of set sizes. Previously, dinner sets usually consisted of 100 pieces, made up of 12 7-piece place settings and additional serving dishes (Montgomery Ward and Company 1901:[1-12]). A 56-piece service for 6, including serving vessels, could also be obtained (Sears, Roebuck and Company 1906:355-356). By 1925 a dinner set, service for 6, could be purchased as a minimum of 31 pieces, or as many as 50 pieces if serving vessels were required (Butler Brothers 1925:[20-28]). A luncheon or tea set for 6 contained 23 pieces, and a breakfast set, 41 pieces (Butler Brothers 1925:28-29). This meant that a customer could still have a set, but for a capital outlay that was proportionally less.

A second reason which may have contributed to the presence of sets of dishes at Spalding is the fact that we know Watson's Store there stocked small crockery sets of various kinds. Inventories for 1924, 1925, and 1927 show that sets of cups and saucers were kept on hand (Watson's Store:Store Inventories, 21 Feb. 1924; 20 Feb. 1925; 9 Aug. 1927); the 1928 inventory lists sets of dinner plates (Watson's Store:Store Inventories, 8 July 1928). This sort of selection would be all that could be expected from a small local store. Customers who wished to purchase sets with a great number of pieces would be obliged to get them by mail order, or to buy them in the nearest large town.

Comparison With Other Sites

The ceramics from Boise Chinatown and Silcott, Washington were selected for comparison with those from Spalding. Besides providing assemblages of similar size, these particular sites were chosen because they also seemed to represent communities of people on the lower end of the socioeconomic scale. By comparing the ceramics in use at the three locations it was thought that it might be possible to identify and document certain changes over time which would prove relevant for the study of other twentieth century sites at least in the Pacific Northwest and possibly elsewhere as well.

Table 22 summarizes the types of wares that were excavated on the three sites. Boise Chinatown is the oldest of the three, dating from 1878-1920 (Timothy W. Jones 1981:personal communication). The community of Silcott, in southeastern Washington, dates mainly from 1900-1930 (Adams 1975:156), and the area of Spalding in the path of the water line trench is the most recent of the three, dating from 1925-1935 (Caroline D. Carley 1981:personal communication). At Boise, the predominant type of Euroamerican tableware in use was plain white earthenware, or 59.0% of the total of recovered vessels. At Silcott, decorated (embossed) white earthenware was most common, with 31.1% of the total, and at Spalding color-decorated earthenware, 36.1%, was most frequent. While porcelain was in use on all three sites it accounted for only a minor portion of the total. This is not surprising since, because of its higher cost in proportion to earthenware, it would have been less likely to have been purchased by lower-income people. At Spalding, for example, only 1 of the 12 sets is composed of porcelain vessels, and this is a Japanese-import tea set, probably given to one of the resident women as a gift on a special occasion. Other, single, porcelain vessels may also have been gifts. Stoneware vessels were found on all three sites, and account for 6.7%-14.8% of the total, which, for Boise Chinatown, includes only Euroamerican objects; the number of storage vessels from that site would thus be higher if the Chinese stoneware had been included here. More stonewares were found at Silcott than at the other two sites, probably because they are from a store, two residences, and a dump, while the Spalding stonewares are from features assumed to be associated with only one residence.

It is the earthenware vessels, however, which seem to provide a significant indication of changes in ceramic buying patterns over time. The selection for purchase of one of the three main types, either plain white earthenware, decorated white earthenware, or color-decorated earthenware, was probably based upon the relative importance to the purchaser of durability, availability, price, and fashion.

A hotel or restaurant would probably be more concerned with durability than with the other factors, hence the greater amount of plain white tablewares at Boise Chinatown, where a boarding-house dump was one of the main areas from which Euroamerican ceramics were recovered. The several vessels comprising part of the one set of color-decorated whiteware could perhaps be from the set of dishes acquired by a newly married couple, and may therefore represent a step in the process of acculturation.

It has been noted elsewhere that decorated china suggests a woman's presence at a site (Gaw 1975:173). The greater percentage of decorated (embossed) white earthenware compared with color decorated earthenwares at Silcott suggests that women were present, but that the embossed vessels may have been purchases dating to around the turn of the century, when decorated whitewares were moderately durable, reasonably fashionable, and comparatively inexpensive. Where price was particularly important, decorated whitewares were the cheapest alternative for the woman who was interested in an attractive, fully-complete set, and in 1906 she could obtain a 100-piece one for \$4.25 or \$4.98 (Sears, Roebuck and Company

TABLE 22

Comparison of ware type totals and percentages among Boise Chinatown; Silcott, Washington; and Spalding

Type	Boise ^a		Silcott ^b		Spalding	
	No. of Vessels	% of Grand total	No. of Vessels	% of Grand total	No. of Vessels	% of Grand total
Earthenware						
Plain white earthenware	124	59.0	38	20.0	62	30.2
Decorated white earthenware ^c	13	6.2	59	31.1	28	13.7
Color-decorated earthenware ^d	28	13.3	19	10.0	74	36.1
Yellowware					1	0.5
Unglazed earthenware	13	6.2				
Other ^e			27	14.2		
Total	178	84.7	143	75.3	165	80.5
Porcelain						
Plain white porcelain	10	4.8	1	0.5	2	1.0
Decorated white porcelain ^c					4	2.0
Color-decorated porcelain ^d	8	3.8	9	4.7	12	5.7
Biscuit ware					2	1.0
Color-decorated biscuit					2	1.0
Other ^e			9	4.7		
Total	18	8.6	19	9.9	22	10.7
Stoneware	14	6.7	28	14.8	18	8.8
Grand Total	210		190		205	

^a Euroamerican wares only; information abstracted from Jones (n.d.).^b Information abstracted from Gaw 1975: 169-170, Tables 1 and 2.^c Silcott's "Raised"^d Silcott's "Floral"^e Unexplained in report; possibly color-decorated. If so, conclusions would still be valid.

1906:354); in 1909 a similar set sold for as little as \$3.98 (Sears, Roebuck and Company 1909:120).

The figures from Spalding, on the other hand, show an increasing tendency, with time, towards the purchase of color decorated earthenwares. If the housewife had only a limited amount of money to spend, but craved color, she could purchase such a set, but with fewer pieces, for the same price as a larger, less colorful, one. Also in 1906, for example, an expenditure of \$4.98 could have bought an 80-piece set with single-colored decoration applied by the new French decalcomania process, or \$4.95 would have purchased a 56-piece set with two color decals (Sears, Roebuck and Company 1906:355-356). As mentioned earlier, by the mid-1920s, sets were tending to contain fewer pieces. Whatever the reasons for this trend, whether smaller family size, the adoption of less-formal dining customs, or the constraints of a Depression economy, color-decorated sets thus became increasingly affordable; plain white serving vessels, durable, readily available locally, and reasonably priced, could then be used as completer pieces.

Watson's Store

Throughout this discussion of the Spalding ceramics we have hinted at the possibility of correlating some of the vessels actually excavated with certain items on the inventory lists of the local general store. This becomes particularly relevant since Watson's Store is now an exhibit at Spalding's Nez Perce National Historical Park. The store was started 17 May 1911 by Lewis and Margaret Watson, who operated it until their retirement in 1964. Many of the original store records are still extant, including inventories for 12 different years. These show that crockery was one of the many items which was stocked for sale. Although the amount and kind of tableware carried varied from year to year, the prices remained remarkably consistent, since Mr. Watson "did not believe in raising prices" (Shawley n.d.:31).

The store inventories which survive bear this out in most cases. Taking pitchers as an example, the inventory taken in 1924 lists 1 pitcher at 15¢, 6 at 26¢, 1 at 30¢, 3 at 35¢, 2 at 42¢, and 3 at 60¢, for total of 16 (Watson's Store:Store Inventories, 21 Feb. 1924). A year later the stock consisted of 1 at 25¢, 5 at 26¢, 1 at 30¢, 3 at 35¢, 1 at 42¢, and 2 at 60¢, for a total of 13 (Watson's Store:Store Inventories, 20 Feb. 1925); comparing this to the list for the previous year it would appear, barring replenishment, that sufficient stock was on hand to meet the demand for pitchers, with one each of 26¢, 35¢, and 42¢ ones being sold; the 25¢ one of 1925 may be the 15¢ one of the previous year whose price may inadvertently have increased, in spite of Mr. Watson's policy.

Between 1925 and 1927 the demand for pitchers rose tremendously, since the inventory taken in the latter year showed that the stock was considerably depleted. On hand were only one at 26¢, one at 30¢, and one at 42¢ (Watson's Store:Store Inventories, 9 Aug. 1927), indicating that ten pitchers were sold in the intervening 2½ years since the last available

inventory. Reasons for such an increase might possibly be sought in the temperature records for the summer months during that time period. Unusually high temperatures might indicate an increased need for new or replacement pitchers for serving cold drinks (possibly even vanilla extract cocktails).

Once again barring replenishment, comparison of the 1927 inventory with that for 1925 indicates customer preference for certain pitcher sizes and/or prices; this information is summarized in Table 23. For some reason the 30¢ pitcher, presumably the same one on hand since 1924, still has not sold; perhaps it was an inconvenient size, unattractive shape, or even chipped.

TABLE 23

Watson's Store pitcher stock, by price and year, and presumed sales

Inventory Date	Price							Total
	15¢	25¢	26¢	30¢	35¢	42¢	60¢	
Feb. 21, 1924	1		6	1	3	2	3	16
Presumed sold			-1			-1	-1	-3
Feb. 20, 1925		1	5	1	3	1	2	13
Presumed sold		-1	-4		-3		-2	-10
Aug. 9, 1927			1	1		1		3
Sales unknown								
July 8, 1928			4	1	1	3		9
Presumed sold			-4		-1	-2		-7
May 1, 1931				1		1		2
Total presumed sales		1	9		4	3	3	20

Some time prior to the 1928 inventory the pitchers were restocked, as the shelves then contained four at 26¢, one at 30¢, one at 35¢, and three at 42¢ (Watson's Store:Store Inventories, 8 July 1928). The 30¢ pitcher remained unsold, and was still on hand for the 1931 inventory (Watson's Store:Store Inventories, 1 May 1931). In the intervening three years 7 pitchers are presumed to have been sold, making a total of at least 20 in a little over seven years (Table 23). No further inventories exist for the store with the exception of one for 1946 which is outside the scope of this discussion.

The pitcher which inventoried at 26¢ appears to have been the most popular size carried by Watson's Store, since at least 9 out of 20 were known to be sold in a seven year period, or 45% of the available total. The price of 26¢ was the wholesale price to the Watsons, and not the retail

price to the consumer. We know this, indirectly, from instances where both prices for certain items, particularly tobacco, are given in the early inventories, such as the one for 1913 (Watson's Store:Store Inventories, 1 Jan. 1913). The 26¢ pitcher would represent a wholesale cost of \$3.12 a dozen. Interestingly, the Butler Brothers catalogues for both 1925 and 1930 list pitchers (called "jugs") in this price range. The catalogue for 1925 shows a "Cable" pattern one, 7 in. high, which wholesaled for \$3.10 per dozen (Butler Brothers 1925:[20]). A virtually identical "Perfection" pitcher sold for the same price in 1930 (Butler Brothers 1930:[9]).

In what is surely more than coincidence, a portion of the handle of a whiteware pitcher with a cable design, identical to the illustrations in both the 1925 and 1930 Butler Brothers catalogues was recovered from the water line trench excavations at Spalding, from a context (Feature 18) which is closely dated, by other means, to the period 1925-1930. Additionally, checkbook stubs and remittance books from Watson's Store show numerous payments to "Butler Brothers, San Francisco, Cal." extending from the late 1920s to the mid-1930s (Watson's Store:Checkbook Stub Receipts 25 Nov. 1927-10 Aug. 1935; Duplicate Copy Remittance Books 3 March 1938-10 May 1937).

Although the inventories do not give any details of color or decoration of the ceramic ware sold by Watson's Store, interviews with local informants have provided the information that much of it was a "thick, commercial-type product" (Stephen Shawley 1981:personal communication). In addition, the present inventory of ceramics on display in the store includes three platters which were part of the store's stock at the time of its closing in 1964. Two of these are plain, "hotel ware" type and the other is also white, but with an embossed design; all three are typical of much of the earthenware recovered from the Spalding excavations.

Conclusions and Further Research

This examination of the ceramics from the water line trench excavations at Spalding has afforded a unique opportunity for the study of both the design of twentieth century tableware, and the purchasing habits of its buyers. In date of manufacture, the Spalding ceramics span the period from perhaps 1872 to at least 1940. Although some of the earlier material may actually be from the Agency period, it could equally well have been part of the crockery owned by one or more families during the years from 1925-1935, and, being durable, hotel-type ware, it may have lasted many years before ending in the dump.

Some of the other ceramics, particularly embossed whitewares and color-decorated earthenwares, reflect consumer response to a combination of the dictates of both price and fashion. In most cases, they can be seen to be relatively inexpensive compared with other goods offered for sale at any given time. There seems to be a correlation between design and price, that is, when both single-colored and multicolored decals are available at the same time, the single-colored ones are cheaper; similarly, sets without gilding are less expensive than those with it. At Spalding, the fact that

only 21.3% of the excavated color-decorated wares were gilded, compared with over 55% for available mailorder ones, may illustrate a consumer preference for inexpensive products.

Preliminary research involving comparison of design motifs on twentieth century tableware has indicated that there is probably also a correlation between design development and date, with single-color decals preceding multicolored ones in time, and other techniques, such as lustre and hairlining, having reasonably well defined dates of popularity. Further research involving mailorder company catalogues could probably narrow these fashion trends somewhat further, and provide even closer dates for the unmarked ceramics which form the bulk of those excavated.

Comparison of the Spalding assemblage with those from Boise Chinatown and Silcott, Washington has shown how the ceramics from all three sites were selected with regard to durability, availability, price, and fashion. In addition, beginning in the second quarter of the twentieth century, manufacturers seem to have become increasingly aware of, and responsive to, the consumers' wishes, resulting in a much wider choice available for the same price.

The types of ceramics available on a site can, by inference, tell us quite a bit about the people who resided there. Just as decorated ceramics are more representative of women than men, Spalding's earthenware dinner sets probably indicate the presence of a married couple, one who brought their set of dishes with them when they came. The brown on white "Stafford" transfer print pattern, dating to 1907 or later, could have been this original set, perhaps supplemented some time after 1925 by the "Ivory Color" set with an embossed body and a pink and green floral decal design. A porcelain tea set, and individual porcelain vessels, were probably occasional gifts to the "lady of the house." While larger sets would not have been available in the immediate locale, we know that Watson's Store did stock cup and saucer sets, some of which may have been recovered archaeologically at Spalding. Although the inventories do not tell us what, if any, decoration was on these pieces, we are fortunate to be able to trace, with a high degree of certainty, some of the objects, such as pitchers, which may have actually been sold by Watson's Store and which eventually found their way into the archaeological record. Further research might establish even more connections between the store's merchandise and the excavated artifacts.

DOMESTIC ITEMS

Glassware

Vessels

Saucer - An emerald green, Depression Glass saucer was recovered from Feature 17 (Fig. 32a). Measuring 6 in. in diameter, the saucer pattern is ringed optic, and may have been among the many Depression Glasswares sold to promote products and services by manufacturers, furniture and appliance stores, theaters, and gasoline stations (Stout 1970:1). The Butler Brothers Catalogue of 1930 advertised the new ringed and optic block pattern as good quality producing a mirror reflection effect. It was suggested that the merchant "display a beautifully appointed table of this stylish matched glassware in your store. It suggests complete sets to your customers and makes many extra sales."

Nappy - A pressed glass nappy was recovered from Dump B (Fig. 32b). The shallow, flat bottomed, rounded dish with sloping sides was used for serving food and usually came in sets of seven pieces. Such sets, with one large, 9 in. diameter, serving bowl and six small 4½ in. diameter nappies, were called berry sets (Butler Brothers 1930).

Lid - Part of a clear, pressed glass lid with a scalloped edge and, butterfly and star design was also recovered from Dump B (Fig. 32c). The nearly flat lid measures ca. 7 in. in diameter and may have belonged to a large sugar bowl or candy dish.

Handle - A small glass handle, probably to a jug or pitcher was recovered from Dump B as well (Fig. 32e). The handle is quite small and may have provided more of a decorative function than a useful one.

Tumblers

Cherry Blossom - Two rose pink tumblers recovered from Feature 17 are also Depression Glass (Fig. 33a). The 6 oz. tumblers have 24 panels and a cherry blossom design decorating the bases and forming borders along the rims. Cherry blossom patterns of Cherry, Cherry Spray, Panelled Cherry, and Banded Cherry were made by Jeannette companies of the 1920s and 1930s (Stout 1970:Plate 2).

Plain with Etched Border - Another tumbler recovered from Feature 17 is clear and tapered with an approximate 5 oz. capacity (Fig. 33g). The border is etched with fine, small vertical lines.

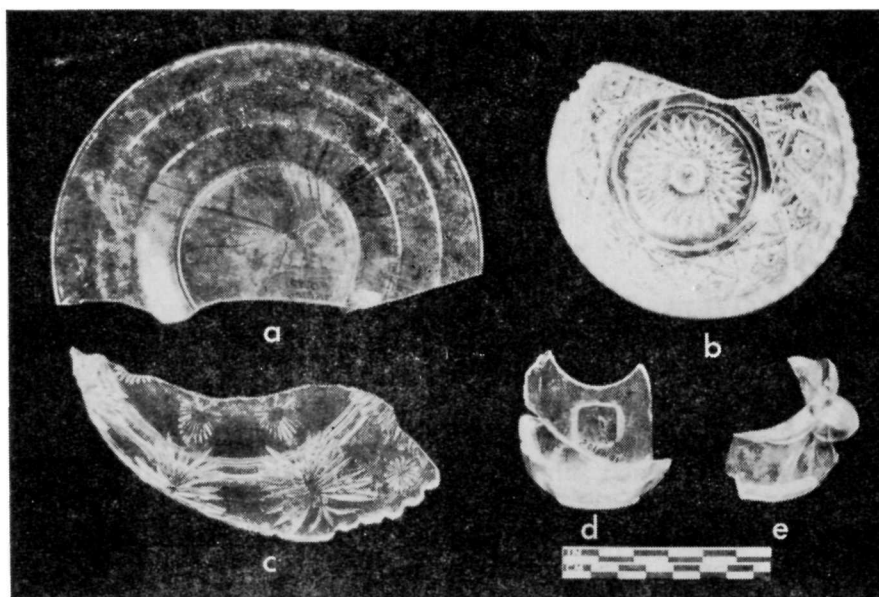


Fig. 32. Glassware. *a*, green Depression Glass saucer; *b*, pressed glass nappy; *c*, pressed glass lid; *d*, bird cage watering cup; *e*, handle.

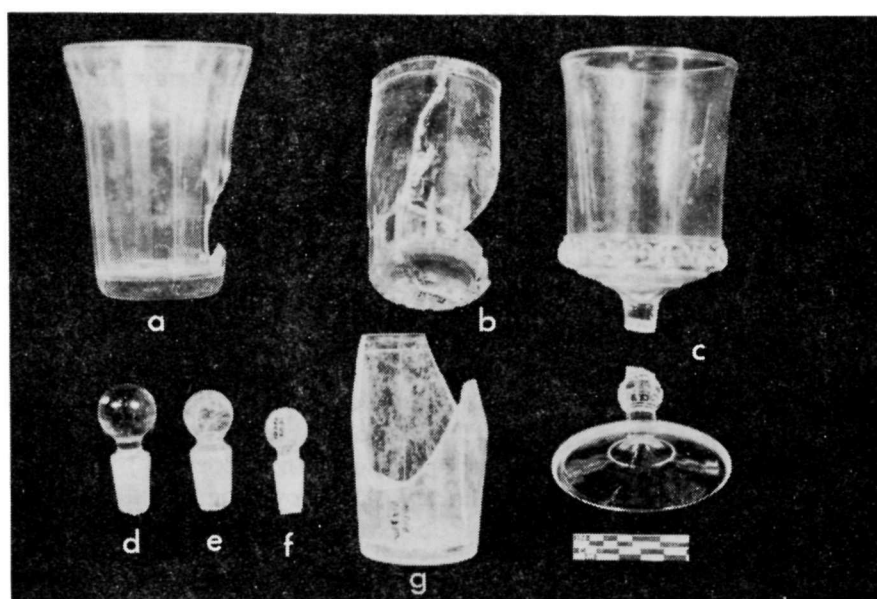


Fig. 33. Glassware. *a*, pink Depression Glass "Cherry Blossom" tumbler; *b*, fluted with etched border tumbler; *c*, stemmed goblet; *d-f*, glass stoppers; *g*, plain with etched border tumbler.

Three additional glass fragments with similar etched patterns were recovered from Dump A, but not all are identical. One fragment has at least three lines of etching which are gold filled. Another piece has the same etching without the gold and forming at least five border lines around the glass. A third piece has two etched border lines and possibly more. None appear to belong to the same vessel and seem to represent three different vessels. The shape and size of the fragments indicate that they are part of tumblers.

Fluted with Etched Border - A 5 or 6 oz. tumbler with etched border and fluted base was recovered from Dump B (Fig. 33b). Though the ring is similar to the plain tumbler with etched border discussed above, the bodies of the two items are quite different. This fluted tumbler has 12 1 in. high flutes interspersed with a similar number of pointed indentations.

Tumbler Bases - Four additional tumblers are represented by one plain and two fluted bases and an additional fluted tumbler section. The bases measure $2\frac{1}{4}$ - $2\frac{1}{2}$ in. in diameter.

Stemmed Glassware

The stemmed glassware recovered was not extensive. One 8 oz. stemmed glassware bowl from Dump B probably functioned as a water goblet. The bowl is plain bordered at the base with a "bull's eye band" (Butler Brothers 1910:405). A foot with decorated stem from a similar provenience is probably part of the same vessel (Fig. 33c).

One foot fragment to an additional vessel was recovered from Dump A.

Stoppers

Three different sized stoppers of two different styles, round and flat, were recovered (Fig. 33d-f).

Bird Cage Water Cup

Another glass item from the site is a bird cage water cup from Dump B (Fig. 32d). Similar water cups are listed under glass specialties in a 1925 catalogue and merchants read that "its everyday bread and butter sellers like these that bring the customers flocking to your glassware counters. Why not liven up your 5¢ and 10¢ sales with a good variety of them?" (Butler Brothers 1925).

Layered, Molded, and Miscellaneous Glass

Layer Glass - Three pieces of decorated layered glass, or "cased" glass may have belonged to one of many kinds of items. In the art glassware section, such vessels as vases, flower holders, bowls, and candy jars are

advertised as available in "new artistic shapes, some with modernistic touch, genuine double or cased glass, all in bright and mottled colors, contrasting color fancy decorations" (Butler Brothers 1930). The pieces from the site, one from Feature 18 and two from Dump A, are white milk glass covered with pink and further decorated with a brown, once painted gold, leaf pattern.

Molded Glass - The molded glass appears to be of one vessel. Pieces (14) of blue glass with gold painted leaf design were all recovered from Dump B. The pieces are too fragmented to determine the kind of vessel from which they came.

Miscellaneous - Other glass included green milk glass (3) from Dump A and Dump B, red glass from Dump B, and fragments of emerald green Depression Glass from both dumps.

Medicinal Glassware

Graduated Cylinder - An engraved graduated cylinder is cone shaped (Putnam 1965:74) with a 4 oz. capacity. It appears to be graduated in both ounces and drams (Fig. 34a). It was recovered from the lower levels of Dump B.

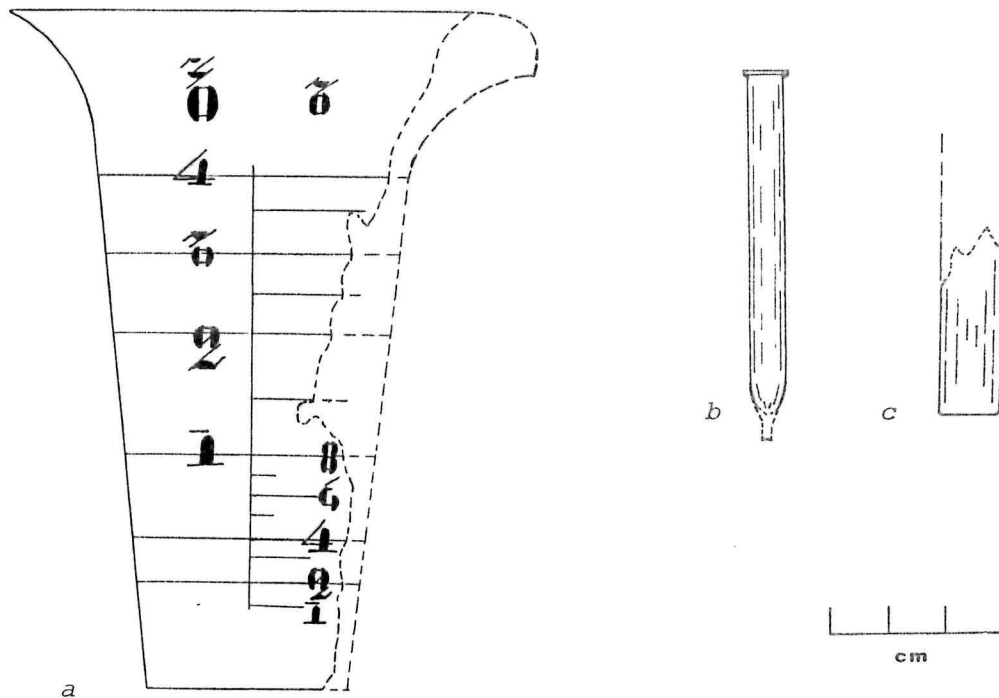


Fig. 34. Medicinal glassware. a, graduated cylinder; b, medicine dropper; c, homopathic tube vial.

Medicine Droppers - A number of small medicine dropper fragments were recovered and minimum number is based on the rim fragments. The most complete example measured 3/8 in. in diameter and ca. 3¼-3½ in. in length (Fig. 34b). The four droppers were found in Feature 18 and both dumps.

Homeopathic Tube Vial - Only the base of a homeopathic tube vial was recovered (Fig. 34c), though it may be estimated that it contained 4-6 drams of medicine (Putnam 1965:119-120). This was the only piece of glassware recovered from any canal deposits, and was from Canal 2.

Discussion

The glassware of the site came largely from Feature 17 and Dump B, (Table 24) though no pieces cross-mended between the two components. While glass vessels from Dump B are pressed glass, those from Feature 17 are Depression Glass. The pieces from these proveniences were nearly complete in contrast to the small, fragmented condition of the glassware from Dump A.

The Depression glass identified at the site was known to be inexpensive glassware. By a new technique of mass production of "tank" glass, large quantities of glassware could be turned out in one operation. "The elaborate designs in much of the Depression Glass were not simply decorative, but were used to cover up imperfections in the glass" (Stout 1970). Such glassware sold for as little as 5¢ a piece to as much as 99¢. Catalogues, department stores, and five-and-dime stores offered four place settings of 20 pieces for \$1.99 (Stout 1970).

The tumblers recovered from the site have an approximate capacity of 5 oz. or 6 oz. and would have served similar purposes. Table tumblers and iced tea tumblers tended to have a larger capacity of 9 oz. and 12 oz. The tumblers represented here are probably what were known as "Beverage Tumblers" (Butler Brothers 1930) serving a variety of functions.

Kitchenware

The ten metal items grouped under kitchenware includes pots and pans and utensils primarily recovered from Dump B (Table 25).

Pots and Pans

Preserving Kettles - Of the three pots and pans from the site, two are preserving kettles (Fig. 35b, c). Such kettles, with a bail handle and a pouring spout were used for boiling fruits and their syrup for preserves. Both kettles from the site are gray enamelware and enamelware was popular among the customers of Watson's Store (Stephen Shawley 1981:personal communication). A preserving kettle was never iron or aluminum as both metals are affected by the acid of the fruits (Franklin 1978:172). A 2 qt. kettle was recovered from Feature 10 and a larger 4 qt. kettle from Dump B.

TABLE 24

Distribution of glassware

	Privies			Dumps		Canal	Other
	F10	F18	F17	A	B	2	
Vessels			1		3		
Ring and optic							
block saucer			1				
Pressed glass nappy					1		
Pressed glass lid					1		
Pitcher handle					1		
Tumblers			3	2	2		
Cherry blossom			2				
Plain with etched							
border			1				
Fluted with etched							
border					1		
Plain base					1		
Fluted base				2			
Stemmed				1	1		
Goblet					1		
Foot				1			
Stoppers		1			1		1
Bird cage water cup					1		
Medicinal		1		2	2	1	
Homeopathic tube vial						1	
Medicine droppers		1		2	1		
Graduated cylinder					1		

TABLE 25
Distribution of kitchenware

	F10	Dumps		Canal 3
		A	B	
Pots and pans	1		4	1
Preserving kettles				
Two quart	1			
Four quart			1	
Saucepan			1	
Pot lid				1
Pot/pan handles			2	
Utensils		2	2	
Cake turner			1	
Can opener		1		
Can/bottle opener		1		
Strainer			1	

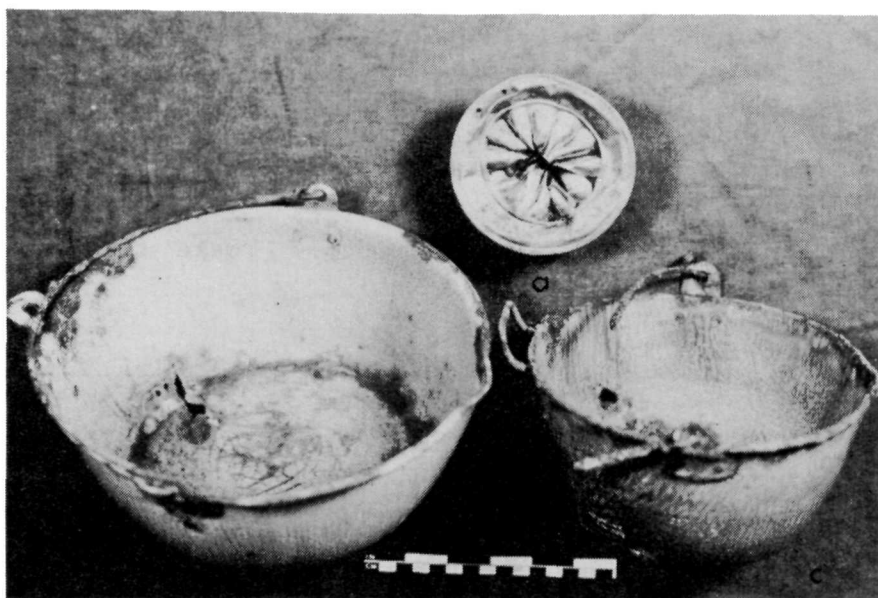


Fig. 35. Kitchenware. a, pot lid; b, four quart enamelware preserving kettle; c, two quart enamelware preserving kettle.

Saucepan - A gray enamelware lipped saucepan of ca. 6 qt. capacity was recovered from Dump B. The sauce pan has a pouring spout and had a handle at one time.

Pot lid - One white metal pot lid, 4 in. in diameter, was recovered from Canal 3, a provenience which contained little else in the way of artifacts (Fig. 35a)

Pot handles - Two pot or pan handles were recovered from Dump B (Fig. 36c).

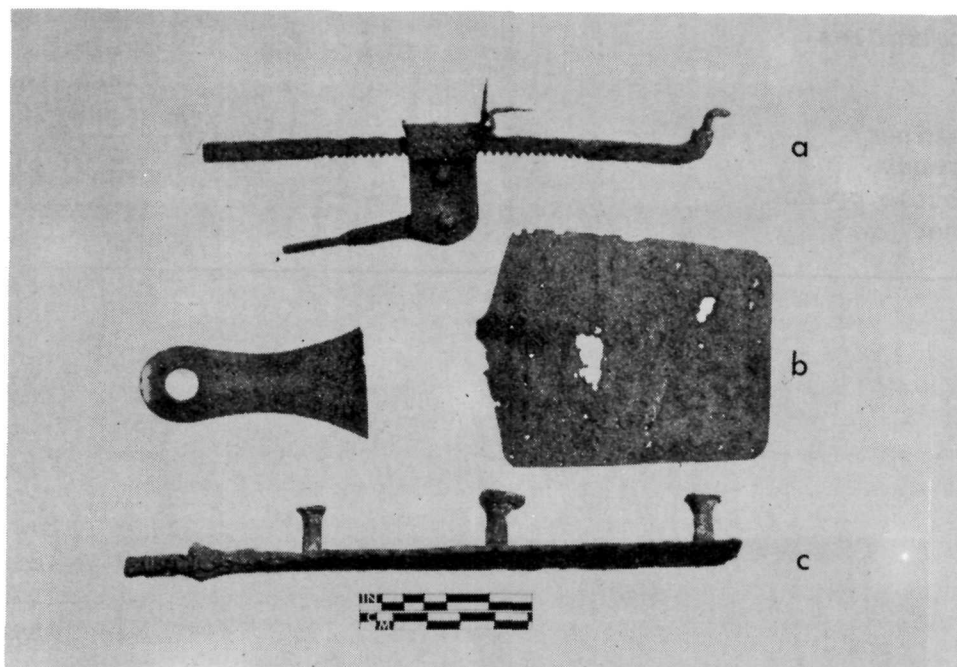


Fig. 36. Kitchenware. a, can opener; b, cake turner; c, pot/pan handle.

Utensils

Cake Turner - A cake turner, "... a plain, or perforated, or pierced, or slotted flat metal implement with a long handle used for flipping pancakes, turning fried eggs, etc. ... usually, and incorrectly, called spatulas today" (Franklin 1978:31) was recovered from Dump B (Fig. 36b).

Can Openers - An old style can opener for food cans (Fig. 36a) and a modern bottle/can opener were both recovered from Dump A.

Strainer - A very small strainer fragment may have been part of a number of kinds of kitchen utensils.

Houseware

This category includes those items which do not fall under such headings as ceramic wares, glasswares, or kitchenwares, but which would have been used within the household as domestic items (Table 26). Two subcategories of this are lighting and maintenance. Stove parts are placed in a category of their own as they were too fragmentary to describe beyond this general term.

TABLE 26
Distribution of houseware

	Privies		Dumps		Other	Total
	F15	F17	A	B		
Lighting	2	2	2	1		7
Non-electric	1	2		1		4
Lamp chimneys	1	1				2
Kerosene lamp burner		1				1
Lamp globe				1		1
Electric	1		2			3
Light bulbs			2			2
Ceiling fixture	1					1
Maintenance			31	4	1	36
Washboard				1		1
Clothespin springs			30	1	1	32
Scissors				1		1
Broom/mop parts			1	1		2
Stove			8	1	1	10

Lighting

The lighting items included both non-electric and electric remains. Kerosene lamp chimneys and a kerosene lamp burner part (Fig. 37b) and fragments of a milk glass lamp globe, possibly to a gas fixture, were the non-electric items recovered. Both glass chimneys were plain and from two privy features.

Two different kinds of light bulb bases, one screw and one lug, and a ceramic electrical ceiling fixture indicated electric lighting. The ceramic

fixture was marked "3AMP250VOLTS/G.E.CO.U.S.A." The base of the fixture is marked "CAT. NO. 39235 (Fig. 37a).

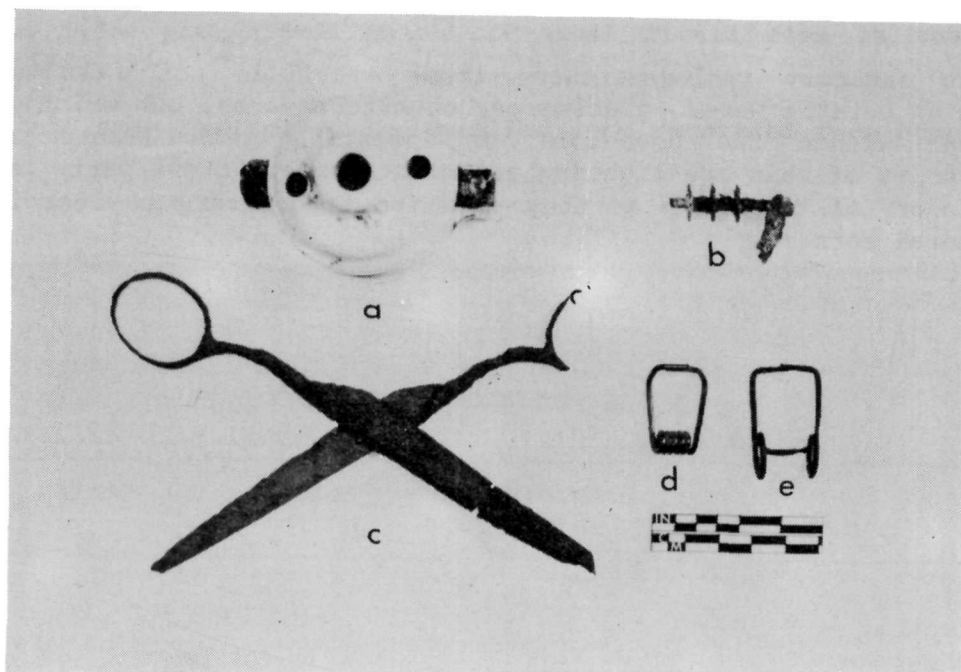


Fig. 37. Houseware. a, electrical ceramic ceiling fixture; b, kerosene lamp part; c, scissors; d-e, clothes pin springs.

Maintenance

Numerous fragments of a glass washboard, probably used for more delicate laundry, were recovered from Dump B. Clothespin springs from the site were relatively numerous (Fig. 37d, e). A pair of scissors similar to Handy Scissors described in Sears catalogue (1927:531) as "a woman's flat solid steel scissors" was recovered from Dump B (Fig. 37c). Other maintenance items included two furels to broom or mop handles.

In the distribution of the clothespin springs, an interesting pattern emerges (Table 27). These artifacts are found almost exclusively in Dump A. Stratigraphically, they are located on top of the privies, though in the same area. This horizontal location is also where, under the heading of Dump A, there is a concentration of artifacts which are fragmentary and widely scattered. A possible explanation for both the fragmentary nature of the artifacts here and for the concentration of clothespins is that the area was being used to hang laundry, trampling and scattering artifacts taking place in the process.

TABLE 27

Distribution of hardware

	Privies		Dumps		Canals		Other
	F10	F17	A	B	1	2	
Furniture	3	4	10	6			
Drawer							
Brass pull		1					
Cast iron pull				1			
Knob		1		1			
Handle		1					
Trunk handle		1					
Decorated Corners				2			
Hinges			2				
Chair guides			1	1			
Tacks							
Carpet	2		4	1			
Upholstery			2				
Bed spring			1				
Unidentified	1						
Wall			2		1		
Coat and hat hooks			2				
Bracket					1		
Window			2	1			1
Sashweight				1			
Jamb spring			1				
Shade parts			1				1
Door			2			2	
Key						1	
Pull			1				
Barrel bolt						1	
Hinge			1				

Hardware

Domestic or household hardware includes items of furniture, walls, windows, and doors (Table 27).

Furniture

Furniture hardware included drawer pulls, knobs, and handle; trunk handle, decorated furniture corners; hinges; chair guides; carpet and upholstery tacks; a bed spring; and one larger item thought to be part of furniture.

The draw pulls included a small brass pull (Fig. 38a), a cast iron pull (Fig. 38b), and two small iron knobs. The drawer handle probably belonged to a large piece of furniture, perhaps to a hutch or cabinet drawer.

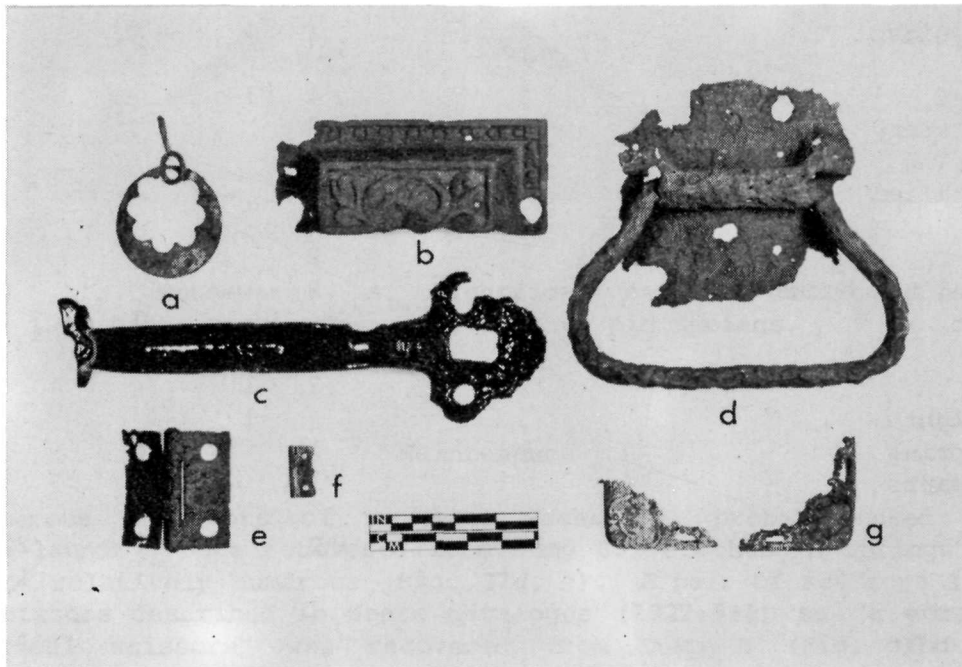


Fig. 38. Furniture hardware. a, brass drawer pull; b, cast iron drawer pull; c, handle; d, trunk handle; e-f, hinges; g, brass furniture corners.

The large trunk handle, hinged for movement, may have belonged to a foot locker (Fig. 38d), while another handle (Fig. 38c) could have been part of a large piece of furniture.

Two small, delicate brass furniture corners would have decorated and protected a small cabinet, drawer, or luggage (Fig. 38g). Of the two small hinges found, one may also have fit a cabinet or cupboard door, while a smaller brass hinge may have belonged to a small chest or box (Fig. 38e, f).

Two chair leg caps, or silent hinges, of two sizes, 1 in. and 5/8 in., protected furniture, rugs, and hardwood floors (Sears, Roebuck and Company 1929:806).

A single spring, presumably a helicol spring connecting bed springs and bed frame, was recovered.

An unidentified iron object, recovered from Feature 10, could have been part of a piece of furniture.

Wall

Three pieces of wall hardware included two coat and hat hooks, one wire and one iron (Fig. 39 a, b), and a wall bracket (Fig. 39c). It is not known what the wall bracket would have held.

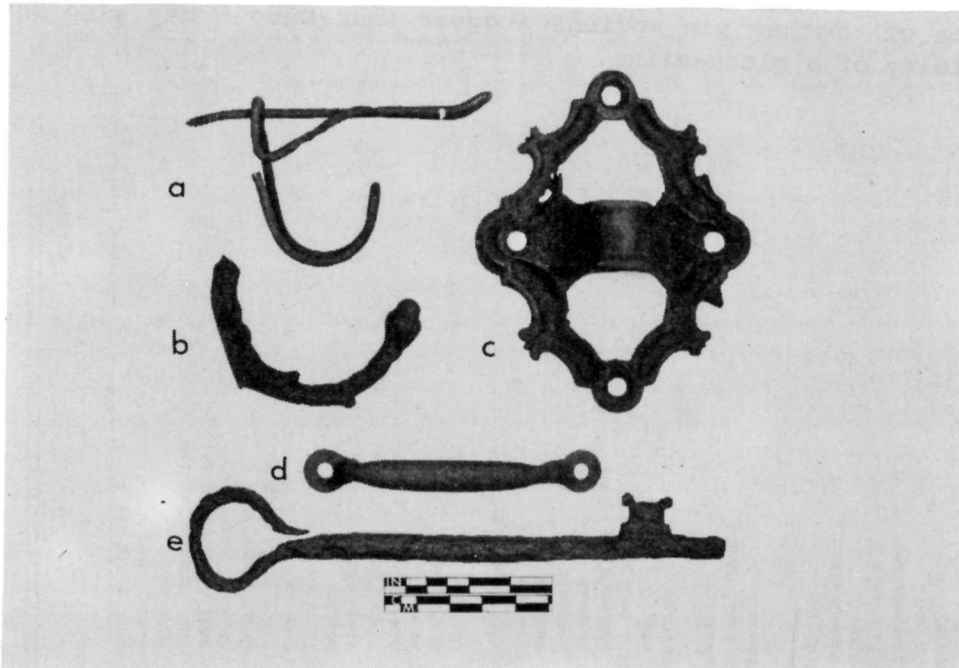


Fig. 39. Wall and door hardware. a-b, coat and hat hooks; c, wall bracket; d, handle; e, door key.

Window

A rough cast iron piece, which tapers and indicates no attempt of finishing, has been identified as a sash weight for windows (Roderick Sprague 1981:personal communication). The object measures 3 3/4 in. in length, 1 3/4 in. in diameter at one end and tapers to 1 1/4 in. in diameter at the other. A window jam spring and two window shade ends were also recovered. All window hardware but one window shade end were from Dump B.

Door

A handle recovered from Dump A probably fits a screen or other light weight door (Fig. 39d). A door hinge and bolt lock part for a drawer or door were recovered from Dump B. A large warded lock key was found in Canal 2 (Fig. 39e).

Discussion

The analyses of a wide range of domestic items recovered from the four privies and two dumps (Table 28) indicate the presence of inexpensive glassware, preserving kettles for home canning and items of both electric and non-electric lighting. The ceramics also indicate a selection of inexpensive items and represent a large variety of patterns and colors. Distribution of clothes pin springs suggest that Dump A may also have been in the vicinity of a clothesline.

TABLE 28

Tabular summary of domestic items

Form	Privies				Dump		Canals				Other	Total
	F10	F18	F15	F17	A	B	1	2	3	4		
Domestic items (I)	11	2	11	3	80	61	3	8		3	23	205
Ceramic Forms												
Bottle	1				1	1				1	1	5
Bowl, mixing/serving					4	4						8
Bowl, small (4-6 in.)	1		2		10	7					3	23
Creamer/sugar bowl			1			1						2
Crock-large (>12 in.)				1		1						2
Crock-small (<12 in.)					3	3				1	3	10
Cup	1		2	1	8	9	1	1			2	25
Figurine					1	2						3
Pitcher		1			1	2						4
Plate, large (>8 in.)	2	1	2	1	23	14	1	2		1	5	52
Plate, small (<8 in.)			1		3							4
Platter						2						2
Saucer	1		2		5	5	1	3			1	18
Washbasin					2	1						3
Unknown	5		1		19	9		2			8	44
Domestic items (II)	5	1	2	10	64	29	1	3	1		3	119
Glassware	1	1		4	5	10					1	23
Vessels				1		3						4
Tumblers				3	2	2						7
Stemmed					1	1						2
Stoppers	1					1					1	3
Bird cage water cup						1						1
Medicine		1			2	2		1				6
Kitchenware	1				2	6				1		10
Pots and pans	1					4				1		6
Utensils					2	2						4
Houseware	3		2	6	57	13	1	2			2	86
Lighting			2	2	2	1						7
Non-electric			1	2		1						
Electric			1			2						
Maintenance					31	4					1	36
Clothespins					30	1						1
Other					1	3						
Stove					8	1					1	10
Hardware	3			4	16	7	1	2				33
Furniture	3		4	10	6							
Wall, window, and door					6	1	1	2				

FOOD REMAINS

by

Julia Longenecker

Bone

Identification of bone was based on: Chamberlain (1943), May (1955), Hargrave (1972), Schmid (1972), Getty (1975), Brown and Gustafson (1979), and Gilbert (1980). The faunal comparative collection of the Laboratory of Anthropology at the University aided in this inventory. Guides for butchering meats (Bull 1951; Dolowich 1977) were used in this analysis.

The archaeological assemblages from the site contained approximately 1236 bones and bone fragments. Of this total, about 49% were identified as to species and/or bone type. Four major domesticated animal species are represented: *Bos taurus* (cow) - 31%, *Sus scrofa* (pig) - 3%, *Ovis aries* (sheep) - 3%, and *Gallus gallus* (chicken) - 6%. Fish bones recovered from the assemblages were not speciated but represent 27% of the total assemblage. The category, "other," refers mainly to rodent and unidentified bird bones, a few rabbit bones and one deer bone. This category represents 29% of the total.

Discussion

Dump A

This dump contained approximately 122 bone fragments. The heaviest concentration of bone occurred from 10 to 40 cm below surface. Of the 50 pieces of identifiable bone, 22% were from beef, 6% lamb/mutton, 8% pork, 14% chicken, 0% fish, and 50% other (mostly rodent). Much of the bone from these areas was highly fragmentary and, as a result, non-diagnostic. Ribs, from cuts of beef, were dominate. Ribs can suggest a variety of meat cuts, from rib roasts to stew meat. However, because the butchered rib fragments were short and scrappy, most of the meat from them is believed to be stew meat, brisket, ground beef, or perhaps short ribs. Small fragments of bone can indicate poor preservation and/or remnants of small meat cuts. In this case, the bone may not represent all meat consumed. Processed and canned meats, bacon, and sausage may have been a large part of the protein diet.

Dump B

This dump contained approximately 148 bone fragments. The heaviest concentration of bone recovered from 0-40 cm below surface. There were 63 identifiable bones: 54% beef, 3% lamb/mutton, 0% pork, 3% chicken, 0% fish,

and 40% other. Compared to bone from Dump A, the bone here was in fairly good condition and represented a variety of individual cuts of meat. Beef was the dominant meat represented. Some cuts may have been: 1 7-bone chuck roast, 1 chuck arm steak or roast, 1 chuck blade roast, 1 chuck pot roast, and 1 possible rib steak. Beef ribs may suggest ground beef, stew meat, brisket, or short ribs. Lamb, pork, and chicken were poorly represented by vertebral scraps and one piece of scrap bone, possibly from a leg of lamb meat cut.

Canal 3

Feature 16 consisted of 176 bones and bone fragments. The number of bones identified were 125: 44% came from beef, 4% chicken, 44% fish, and 3% other. No pork or lamb/mutton bones were present. Meat from the beef forequarter was represented by scrap bones and short rib bones. Unlike the other features or excavation units this feature has bone refuse from the beef hindquarter and includes bone from 1 sirloin steak, 1 porterhouse or T-bone steak, and 1 heel of round steak or roast. Also of interest, 52 fish bones are present. Fish bones are not found in the excavation units.

Privies

Feature 15 contained 106 bones. Of these, 96 were identified. Bone from beef and lamb/mutton represented 0% of the assemblage. Fish bone concentration was heaviest with 96% of the total. Pork only represented 2%. "Other" bone amounted to 2%. The fish bones were heavily concentrated between 60 cm and 80 cm below surface. Aside from fish, there were many small, but butchered, non-diagnostic pieces. There was also some evidence of 1 pork shoulder roast and 1 ham.

Feature 17 is very similar to Feature 15. There were 40 bones and bone fragments recovered, 8 of these were identified. Again, beef and lamb/mutton represented 0% of the assemblage. Pork bone consisted of 17% of the total, chicken 6%, fish 50%, and other (mainly rodent) 26%. The chicken bones were burned. As in Feature 15, there was evidence of 1 whole ham.

Feature 18 had 10 bones in its assemblage; 8 were identified. There were bones from beef 20%, sheep 10%, chicken 10%, and other 60%. There were no pork bones present. The "other" category contained possibly some rabbit bones. Remnants of beef meat cuts suggested 1 chuck arm steak, and stew meat, ground beef, or brisket. There were some other bone fragments but they were too fragmentary to be diagnostic. One bone of interest is that of a complete chicken furcula (wishbone) or breast bone.

Feature 10 consisted of approximately 69 bones and bone fragments. Of these only 16 were identifiable. Beef bones represented 2% of the sample, pork was represented by 2%, chicken by 3%, fish 2%, and other by 91% (rodent bones dominated). There was only 1 butchered bone which was a remnant of 1 ham shank. Shanks are many times used as soup or stew bones.

Summary

Bone representation suggested that the archaeological context from which they came were food refuse dumps and not butchering dumps. This in turn, suggested that meat with bone was cooked prior to disposal.

There was no evidence that animals were slaughtered and butchered at the site or at least not near the dump and privies. Also there was not evidence of home dressing of meats. Meat was probably received by the local market in quarters and prepared there for retail sales. A 1910 reference stated that,

In the last 15 or 20 years there has been great changes in the manner of supplying the markets with beef. Previous to that time it was nearly all dressed in the locality in which it was sold. . . . Now the greater part of beef is dressed near the source which supplies the cattle . . . [Parloa 1910:170].

A variety of meat saws and cleavers were probably used. However, there appeared to be no major difference in the saw marks of various bones. Hand saws and cleavers were probably used instead of electric equipment.

The butchered bone suggests various cuts of meat consumed by the inhabitants.

From the faunal remains, it was determined that beef was the main meat staple. Except for a very small percentage, most of the beef came from the forequarter of the animal. Cuts from this quarter are usually tougher than those from the hindquarter and also cheaper in price. These cuts of meat generally are pot-roasted or stewed. Although steak cuts can be carved from the forequarter, roasts seem to be the desired cut of meat. Animal age was not determined through analyses but large size suggested that fully mature cattle were among those present.

As pork can be a part of the diet in the form of cured and processed meats such as bacon and sausage without being represented in the archaeological assemblage. It would be difficult to say how much pork was consumed. Lamb or mutton, often not processed, is prepared in much the same way as beef and thus can be expected in the archaeological record.

Chicken and fish were supplements to the protein diet.

Seeds

Soil samples from the privies showed a presence of blackberry seeds in Feature 17, elderberry in Feature 10, and grape in features 10, 15, and 17. Peach pits were found in Feature 18 and the dumping areas.

PERSONAL ITEMS

Clothing

Items of clothing which were recovered and identified as such include buttons, clothing hardware such as buckles and fasteners, and leather and rubber footwear (Table 29).

Buttons

Metal buttons recovered are made of iron, brass, and aluminum (Table 30, Fig. 40). An iron, plain-shaped covered style button still carries remnants of a wool-like material. The shank for fastening the button would also have been of cloth protruding from the hole in the pad back (Brown 1968:264-265). One of the six overall buttons was marked with "P.M.C.Co./Portland..." One iron beveled button has a decorated border. Several aluminum cup shape with beveled edge sew-through buttons are painted dark blue and all five of this style may have been painted at one time. The brass buttons include a collar button, suspender button (Brown 1968:143) and round button with a bird cage shank (Brown 1968:264).

The majority of buttons recovered from the site are white sew-through shell, porcelain, or plastic of various shapes and with two or four holes (Table 30, Fig. 41). Of these, the shell buttons are the most numerous. Two kinds of shell are present. One abalone button was recovered from Feature 18. The remainder of the shell buttons, known as Pearl in period catalogues, are of the shell of freshwater mollusks (Brown 1968:256). One porcelain button, dome shape with shank fastening design, was, unlike the others, of two colors. And two plastic buttons are probably what was known as hard rubber. Both are black and assumed to be coat buttons. One "fancy" button was recovered. It is a round button with shank plate and five small blue glass insets to form the decoration. In general, the buttons appear to be largely utilitarian, probably belonging mostly to underwear and workclothes.

Clothing

Hardware

Fasteners - Suspender and garter or support hardware were other parts of clothing recovered. One suspender clasp is iron and probably belonged to a pair of overalls. The remainder of the pieces are small, delicate brass and probably belonged to such underwear as sock or stocking supports. Most of these hardware pieces are clasps and adjustment parts (Fig. 42a-h).

TABLE 29

Distribution of clothing and footwear items

[illegible]

TABLE 30
Summary of button types

Material	Shape		No. Holes	No. lines	Diameter (in.)	Comments	Provenience	Total	Fig.
METAL									
Iron	Cup shape	Sew through	4	22	9/16		Dump A(1)	1	40a
Iron	Beveled	Sew through	4	27	11/16	Decorated border	Dump A(1) Dump B(1)	2	40f
Iron	Plain covered	Canvas shank		27	11/16	Remnants of material remain	Dump A(1)	1	40g
Iron	Plain covered	Canvas shank		24	5/8		Dump A(2)	2	-
Iron	Plain covered	Canvas shank		30	3/4		Dump A(1)	1	-
Iron	Overall	Canvas shank		27	11/16	One button marked "P.M.C.Co/	Dump A(4) F 17(1) F 9(1)	6	40k
Brass	Round	Bird cage shank		16	3/8		Dump A(1)	1	40h
Brass	Suspender			18	7/16		F 10(1)	1	40i
Brass	Collar			18	7/16		Dump A(1)	1	40j
Aluminum	Cup shape	Sew through	2	22	9/16		F 17(1) Dump A(3)	4	40b
Aluminum	Beveled	Sew through	2	22	9/16		F 9(1)	1	40c
Aluminum	Cup shape with beveled rim edge	Sew through	2	24	5/8	Three buttons painted dk. blue	F 17(3) Dump A(1) Other(1)	5	40e
Aluminum	Fish eye	Sew through	2	22	9/16		Dump B(1)	1	40d
SHELL									
Abalone	Plain	Sew through	2	24	5/8		F 18(1)	1	41a
Pearl	Plain	Sew through	2	24	5/8		F 10(1) F 17(1) Dump A(1) Dump B(1)	4	41b
Pearl	Beveled	Sew through	4	20	1/2		Dump A(2) Dump B(2)	4	41e
Pearl	Fish eye	Sew through	2	20	1/2		F 17(3) Dump A(1)	4	41c
Pearl	Fish eye-beveled	Sew through	2	24	5/8		Dump A(1)	1	41d
Pearl	Fragments						F 18(2) F 17(1) Dump A(1) Dump B(1)	5	-
PORCELAIN									
White	Cup shape	Sew through	4	18	7/16		F 15(1) Dump A(2) F 9(1)	4	41f
White	Cup shape	Sew through	4	20	1/2		Other (1)	1	41g
White	Cup shape	Sew through	4	22	9/16		Dump A (1) Other(1)	2	41h
White	Cup shape and beveled	Sew through	4	20	1/2		F 15(1)	1	41i
White and gold	Dome shape	Shank	4	22	9/16		Dump A(1)	1	41j
PLASTIC									
White	Cup shape	Sew through	4	20	1/2		Dump B(1)	1	-
Black	Cup shape with border	Sew through	2	30	3/4	Decorated	Dump A(1)	1	40l
Black	Beveled	Sew through	4		2 1/2		Dump A(1)	1	40m
BONE									
	Oval beveled	Sew through	4	22	9/16		Dump A(1)	1	41k
	Beveled	Sew through	4	24	5/8		Dump A(1)	1	41l
COMPOSITION GLASS									
	Round	Shank plate with loop shank		20	1/2	Black with blue glass	Dump A(1)	1	40n
UNIDENTIFIED									
	Cup shape with bevel		2	80	2	Blue/purple, decorated	Dump B(1)	1	-

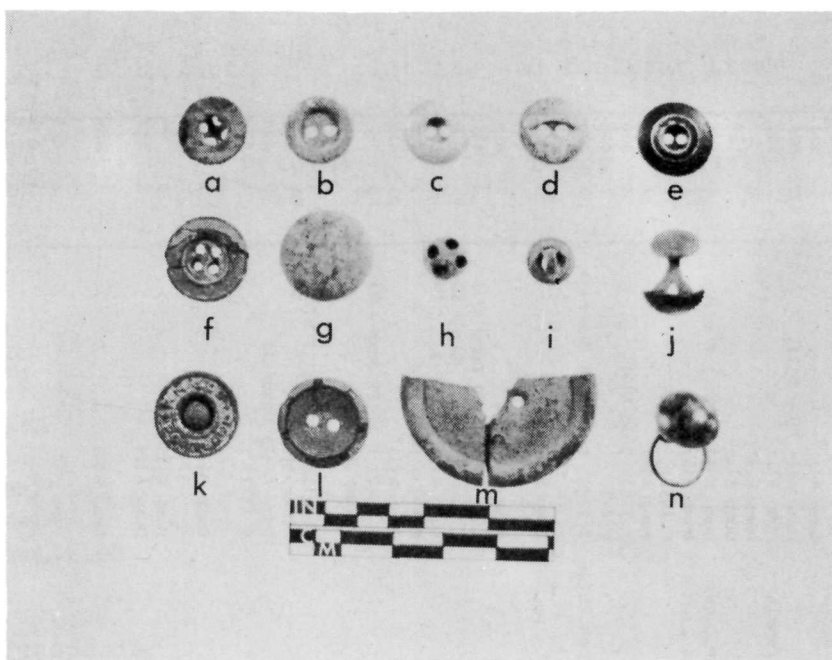


Fig. 40. Metal Buttons. *a*, iron sew through; *b-d*, aluminum sew through; *e*, aluminum sew through painted blue; *f*, iron sew through with decorated border; *g*, iron covered, canvas shank; *h*, brass bird cage shank; *i*, brass suspender button; *j*, collar button; *k*, overall, "Portland;" *l*, black plastic, decorated sew through; *m*, black plastic sew through; *n*, metal and glass shank plate with loop shank.

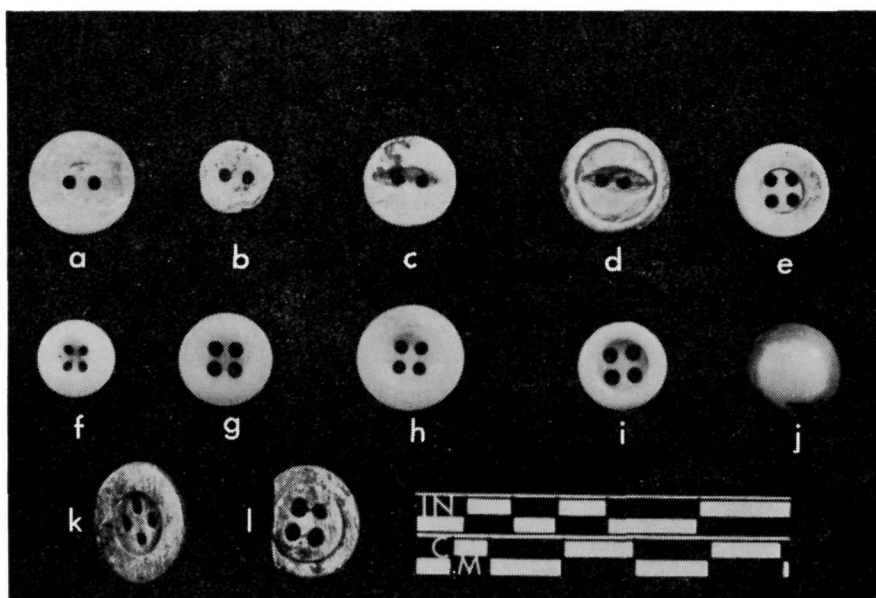


Fig. 41. Buttons. *a*, abalone sew through; *b-e*, shell sew through; *f-i*, plastic sew through; *j*, porcelain white and gold dome shape with shank; *k-l*, bone sew through.

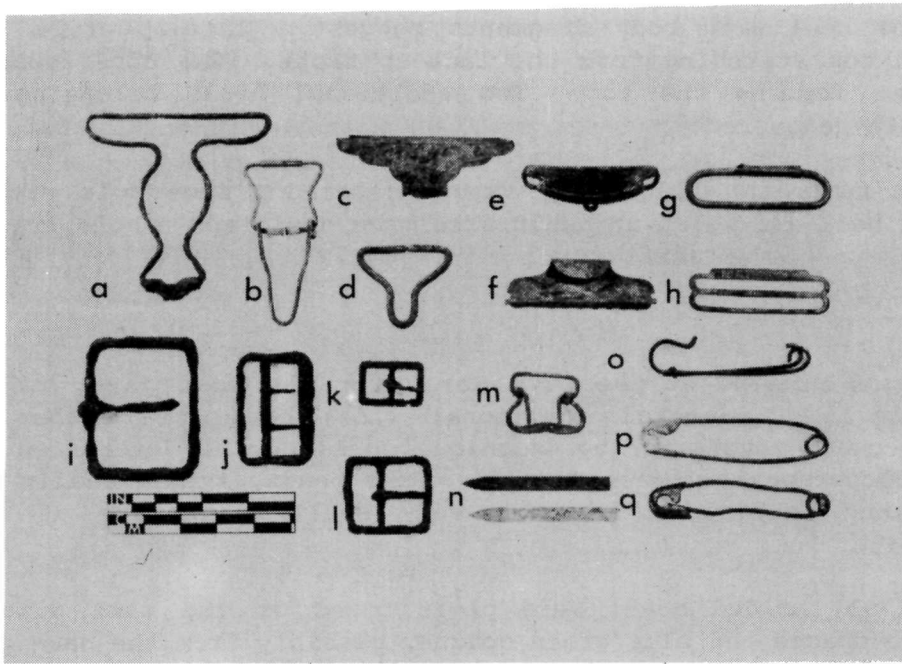


Fig. 42. Clothing hardware. a-h, suspender/garter parts; i-l, iron buckles; m, brass buckle; n, bone collar stays; o-q, safety pins.

Buckles - One small brass buckle recovered may have belonged to a shoulder brace or hose support (Fig. 42m). Other buckles recovered are iron and though varying in size, are assumed to be belt buckles (Fig. 42i-l).

Safety Pins - Three different types of safety pins are among the nine recovered (Fig. 42o-q). One is wire, four are coiled, and two are coiled with guards--today's standard safety pins (Sears Roebuck and Company 1929:368). Two additional pins are fragmented. Three pins are brass and the remainder are galvanized. Seven of the nine pins are from Dump A.

Other - Two bone collar stays were also recovered from Dump A (Fig. 42n).

Footwear

Fragments of both leather and rubber footwear were recovered and were found in child and adult sizes. As with other artifacts, the larger, more complete pieces of footwear were recovered from Dump B, while fragmented pieces were from Dump A.

A leather shoe sole, sole with heel, and heel are the size of children's shoes. An additional heel may have belonged to the shoe of a small woman or child. A shoe sole with heel of a smaller than average man or larger than average woman had a nailed rather than a stitched sole. One

woman's shoe heel with body fragments suggest a lace-up style. Thirteen eyelets and top stitching form the lace-up front. The upper shoe is of a soft leather forming the top. Two additional heels belonging to adult footwear were recovered.

Rubber footwear included a woman or child's shoe sole with heel, a rubber boot heel and sole, an adult size shoe heel, and a sole fragment.

Beads

The beads present at the site were, for the most part, molded (81%) beads (Table 31). Several additional (15%) beads are either wound or molded, the exact manufacturing technique could not be determined (Roderick Sprague 1981:personal communication). Tube beads, traditionally dating to the nineteenth century, made up a very small percentage of all beads recovered (4%).

Most (79%) molded beads were plain round of the same size and two colors--blue opaque and blue/green opaque, possibly from the same garment or jewelry piece. All but one of the remaining molded beads were faceted and of several colors. The molded beads had a band around their center and may be Prosser beads as described by Ross (1974:22, Fig. 5), though they are *not* flattened at the poles as he describes.

While the beads were found throughout the site, the largest percentage (53%) are from Dump A, while a much smaller number are from Dump B (12%).

Tobacco Tags

Tobacco tags are included with personal items because it is believed that they would have been carried and used primarily by one person. Another category under which they might fit, though as vaguely as they fit under personal items, is that of containers, since by their function they would have been thrown away as soon as they were used. Since they would have been used by one person rather than a household, and could have been lost easily as well as discarded easily, they will be considered personal items for this study.

Four different kinds of tags were found (Fig. 43f-i). Three round tags are probably from Climax brand of tobacco plug. One square tag is unidentified. Five star tags and one arrow tag were also recovered. Watson's store inventory (January 9, 1912) lists Star and Spear Head brands of tobacco to which these tags probably belong. Seven of the ten tags were recovered from Dump A. No tobacco tags were recovered from the privy features.

TABLE 31

Summary of bead types

	Size (in.)	Number	Privies			Dumps		Canals			Other
			F10	F15	F17	A	B	1	2	3	
Glass Beads											
Molded		39									
Plain round		31									
Blue opaque	3/16	15		1		10	3				1
Blue/green opaque	3/16	8				5	2	1			
White	3/16	1								1	
Rose pink	3/16	7	2		2	3					
Faceted round		7									
Red translucent	3/16	1			1						
Black opaque	5/16	1				1					
Dark blue opaque	3/16, 5/16	2			1	1					
Blue opaque	3/16	2				1					1
Grooved oblate		1									
Lavender	3/8 x 5/16	1		1							
Tube		2									
Oblate		1									
Turquoise opaque	1/16 x 1/8	1							1		
Cylindrical		1									
Turquoise translucent	1/8 x 3/16	1		1							
Molded/wire wound		7									
Plain round		7									
Black opaque	5/16	3				2	1				
Dark blue opaque	1/2	2	1			1					
Light blue opaque	3/16	1	1			1					
White translucent	1/2	1		1							
Brass Bead		1									
Round	5/16	1				1					
Totals			4	4	4	26	6	1	1	1	2

TABLE 32

Distribution of personal items (other than clothing and footwear items)

	F10	Privies			F17	Dumps		Canals			Other	Total
		F18	F15			A	B	1	2	3		
Beads	4		3		5	26	6	1	1	1	2	49
Tobacco tags						7	1				2	10
Other personal items		1				8					1	10
Razor		1										
Toothbrush						1						
Combs						2						
Watch back						1						
Pocket knife liner						1						
Pencil ends		1				1						
Penny (1918)						1						
Leather bags						1					1	
Toys		1			1	3						5
Brass hat		1										
Glass marble					1							
Wind-up keys						2						
Plastic soldiers						1						
Totals	4	3	3		5	44	7	1	1	1	5	74

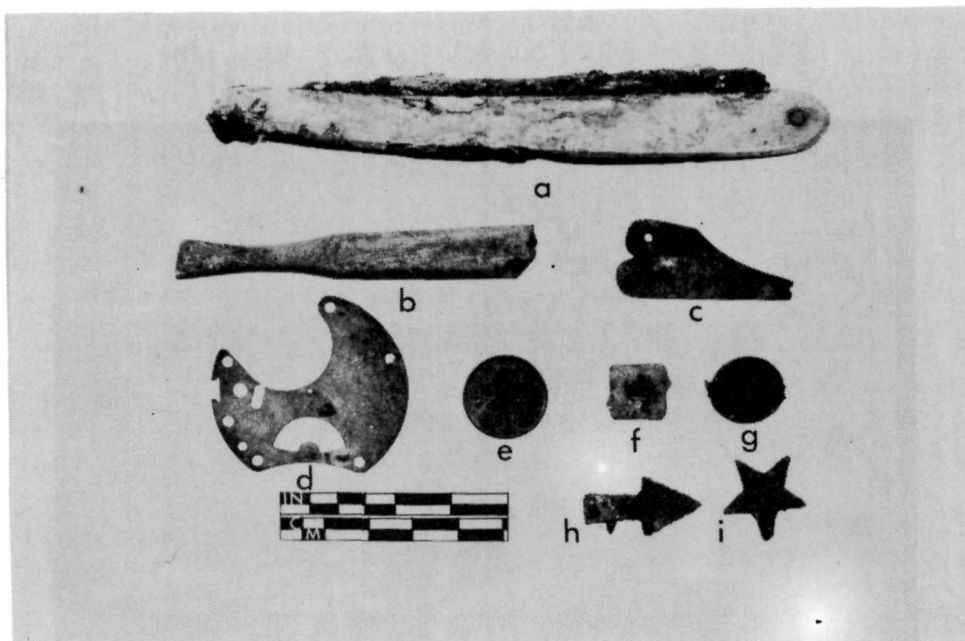


Fig. 43. Personal items. a, bone razor; b, bone toothbrush handle; c, knife liner; d, watch back; e, 1918 penny; f-i, tobacco tags.

Other Personal Items

A bone handle razor (Fig. 43a), a bone handle to a toothbrush (Fig. 43b), plastic comb teeth from two separate combs (one pink and one black), a pocket watch back (Fig. 43d) and two small parts, pocket knife liner (Fig. 43c), and a 1918 penny (Fig. 43e) were other personal items recovered from Dump A (Table 32).

A frame and latch of a leather bag or suitcase were found in Dump B and a latch part from Feature 9 marked "LIFT THE DOT" and "CARR T CO." probably also fit a suitcase or leather bag.

Only very small fragments of two different pipes were found at the site. An unmarked white ball clay pipe bowl fragment was found in Dump A. Two fragments of a Terra Cotta Knobby, a pipe with a dark brown glaze on both interior and exterior over an orange/tan paste, were also recovered from this provenience. Complete, the pipe would have been decorated with rows of high relief raised round dots 3-4 mm in diameter around the entire surface of the bowl (Michael Pfeiffer 1981:personal communication).

Toys

Several toys were recovered from two privies and Dump A. These included a small brass hat from Feature 18, glass marble from Feature 17 (Fig. 44c), two wind-up toys keys (Fig. 44a, b), and a plastic soldier with a machine gun (Fig. 44d) from Dump A.

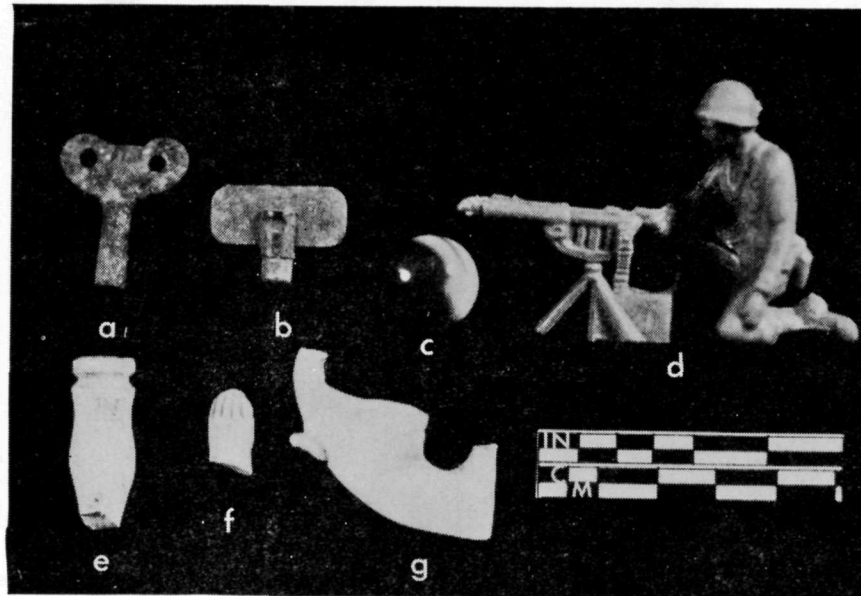


Fig. 44. Toys. a-b, wind-up toy keys; c, glass marble; d, plastic army man; e-g, doll parts.

Parts of biscuit (bisque) dolls appearing to represent three different individuals were recovered from three different proveniences. Part of a doll leg from Dump A is marked with "IV" and has remnants of a brown glaze on the lower portion which was possibly a sock (Fig. 44e). A small hand fragment was recovered near Feature 9 (Fig. 44f). Finally, four pieces of another doll, painted pink, belong to a doll's face and are from Dump B (Fig. 44g).

Discussion

The distribution of personal items indicates a high concentration of such objects in Dump A (Table 33). Buttons, while throughout the site, are concentrated in Dump A. Fifty-one percent of the buttons are from this provenience, while only 11% are from Dump B. Fasteners follow the same pattern with 61% of all fasteners from Dump A and only 25% from Dump B. As clothespin springs were also prominent in this Dump A area, it is possible that many buttons and other clothing hardware were lost after washing, while drying on a line.

TABLE 33

Tabular summary of personal items

	Privies				Dumps		1	Canals			Other	Total
	F10	F18	F15	F17	A	B		2	3	4		
Personal items	6	6	5	16	93	25	2	2	1	1	15	172
Clothing	2	4	2	10	49	14	1				9	91
Footwear						4		1		1	1	7
Beads	4		3	5	26	6	1	1	1		2	49
Tobacco tags					7	1					2	10
Other		1			8						1	10
Toys		1		1	3							5

CONSTRUCTION AND TRANSPORTATION

Construction and maintenance items have been divided into tools, hardware, and materials (Table 34).

Tools

Construction and maintenance tools from the site were primarily recovered from the two dumping areas. Among the tools are a glass cutter, axe blade, garden hoe, three kinds of files (Fig. 45), a fire hose fitting, and flashlight parts. The only tool from the privy features was a triangular file from Feature 10.

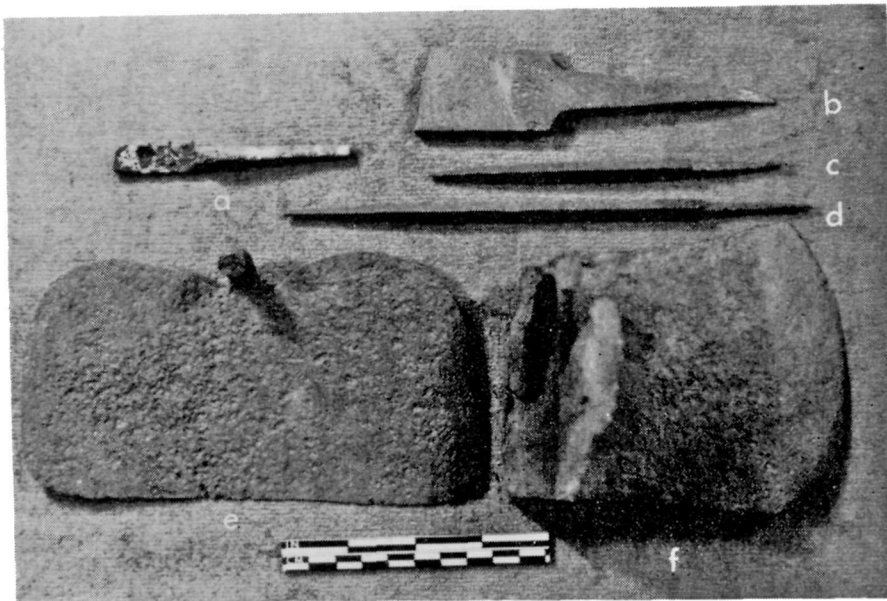


Fig. 45. Tools. *a*, glass cutter; *b-d*, files; *e*, hoe; *f*, axe head.

Hardware

Construction and maintenance hardware includes nails, staples, screws, nuts, washers, bolts, and spikes.

TABLE 34

Distribution of construction and maintenance items

	Privies				Dumps		1	Canals			Other	Total
	F10	F18	F15	F17	A	B		2	3	4		
Tools	1				4	4					1	10
Glass cutter					1							1
Axe blade						1						1
Garden hoe					1							1
Files	1				2	1						4
Fire hose						1						1
Flashlight						1					1	2
Hardware	191	97	37	89	1590	652	96	196	56	39	381	3424
Nails	185	96	31	87	1529	620	92	195	55	38	366	3294
Cut	54	16	11	21	498	239	33	149	55	30	277	1383
Wire	131	80	20	66	1031	381	59	46		8	89	1911
Staples		1	3		19	12	1		1		8	45
Fence		1	3		10	7	1		1		7	
Netting					4	4					1	
Other					5	1						
Other hardware	6		3	2	42	20	3	1		1	7	85
Screws	2		1		11	11	3				3	
Nuts	1				6	3						
Washers	1			1	15	2					3	
Bolts	1			1	6	3						
Spikes	1		2		4	1		1		1	1	
Material												65
Brick					24	9	2	1		4	25	
Totals	192	97	37	89	1618	665	98	197	56	43	407	3499

Of the 3294 nails identified, which does not include nail fragments, 42% are cut and 58% wire (Table 34). Comparing distribution of nails, cut nails constitute 100% of the nail assemblage in Canal 3, 95% in Feature 9, 79% in Canal 4, and 76% in Canal 2. Cut nails amount to only 39% in Dump B and 33% in Dump A. In the dumping areas and Canal 1, where the privies were located, wire nails make up the major percentage. Such nail assemblages would tend to point to nineteenth century dumping in canals 3 and 4 and Feature 9. However, as other analyses, especially bottles and ceramics, indicate the presence of twentieth century artifacts in these same assemblages, it is more feasible to suggest that there is twentieth century dumping of parts of nineteenth century buildings. Cut nails in the predominately twentieth century deposits of the dump could suggest later removal of earlier structures as well. Comparing only the canals, Canal 2 has the largest number of nails. This is also where the large rocks of Feature 5 suggested dumping of construction debris. In the case of other hardware few items are from the canals, but tend to be from the two dumping areas.

Transportation and Machinery

Transportation and machinery includes farm machinery, buggy and wagon parts, truck or trailer parts, and car parts. Items in this category are not numerous (Table 35).

Identified farm machinery parts included only a single section from a sickle and rivets and washers from a harness or drapper. Buggy and wagon parts are a wheel rim, buggy fitting, bolt and nut, and one piece of unidentified hardware. A valve stem and grease cup lid and hinge may belong to either a truck or tractor. Several car parts were also recovered.

For the most part, distribution of these items is within the areas of dumping. No such items were recovered from the canals and only a single buggy fitting was recovered from a privy.

TABLE 35

Distribution of transportation and machinery items

	F10	Privies			Dump		Other
		F18	F15	F17	A	B	
Farm machinery							
Sickle section					1		
Harness/Drapper Rivets					13	1	1
Buggy and wagon							
Buggy wheel rim							1
Buggy fitting		1					
Wagon bolt rivet					2		
Wagon hardware						1	
Truck/tractor							
Grease cup lid and hinge						1	
Car parts							
Leaf spring						1	
Window seal							1
Spark plug cap							1

AMMUNITION

Twenty-eight cartridges, five shotgun shells, four projectiles, and one percussion cap were recovered from the site.

Cartridges

.22 Rimfire (11)

Nine of the 11 .22 cartridges recovered were marked as follows: "SUPER" (2), "XR" (1), "HI/U/SPEED" (1), "U" (1), "US" (2), and "H" (2).

.25-20 WCF (5) "REM-UMC/.25-20" Rifle

The .25-20 Winchester Center Fire was developed in 1893 or 1895 and quickly became one of the most popular small game and varmint cartridges. Though it was advertised as suitable for deer and similar animals it is now universally outlawed for big game. "A great many rifles were made in this caliber and are still in use by trappers, ranchers, and farmers" (Barnes 1972:20).

.25-(6.35 mm) (1) "REM-UMC/25-6.35 mm Automatic pistol

This cartridge was introduced into the U.S. in 1908 with the Browning-designed, Colt manufactured .25 Vest Pocket Automatic pistol and copied all over the world resulting in dozens of different makes of pistol using the cartridge. Though not powerful enough for hunting anything except sparrows and rats the pistol was and is popular because of its small size. Not adequate for serious self defense " . . . their principal usefulness is as a threat, because no one wants to get shot if it can be avoided, even with a little .25" (Barnes 1972:149).

.30 Remington (1) "WESTERN/30 REM" Automatic Rifle (?)

This rimless version of the .30-30 was developed by Remington in 1906 for their Model 8 autoloader. Other rifles later carried the cartridge. Though no rifles have chambered this round since soon after WW II, ammunition companies continue to load it. The cartridge is used strictly for small, medium, and deer size animals (Barnes 1972:79).

.32 Short (2) "H" Pistol/Rifle

This cartridge was popular to the early 1900s and used in a number of rifles, revolvers and handguns. As late as 1936 single shot rifles were still available in this caliber. The cartridge is considered good for small game out to 50 yds. (Barnes 1972:277).

.38 Smith and Wesson (1) "W.R.A.Co/38S&W" Revolver

Designed by Smith and Wesson in 1877, this is one of the most widely adopted American revolver cartridges. It is not a particularly satisfactory hunting cartridge, but is well-suited to lightweight pocket guns. "It is also a good short range cartridge for defense use and has better stopping power than any of the .32's and even some of the larger automatic pistol cartridges" (Barnes 1972:163).

An additional .38 cartridge from Feature 10 is unmarked.

.44 Long (1) "P" Rifle

The .44 long was a fairly potent short range cartridge for small to medium sized game and adapted to rifles made by several companies. "It was a fairly popular round, but replaced by similar centerfire types. It became obsolete by the early 1920s" (Barnes 1972:279).

An unmarked .44 centerfire cartridge was also recovered.

.50 Centerfire

This cartridge from Dump B is unmarked.

.50-70 Musket (.50 Govt.) (1) Rifle

As a military rifle from 1866-1877, this cartridge became popular in the 1870s and 1880s, effective on buffalo and other heavy game. "Back about 1934, Francis Bannerman and Sons of New York City advertised both the .50-70 Springfield rifle and the ammunition. Rifles were still available as late as 1940. No sporting rifles have chambered this round since the early 1900s" (Barnes 1972:115). From Canal 3 near Feature 16.

Shotgun Shells (5)

Five shotgun shells were recovered in three gauges--10, 16, and 12 of where there were 3 of the latter. The 10 gauge shell is marked "UMC Co BRIDGEPORT CONN.," the 16 gauge is marked "REMINGTON EXPRESS," and one 12 gauge is marked "WINCHESTER BLUE RIVAL."

Bullets and Percussion Caps

Three lead bullets, two .44 caliber and one .38 caliber, and a .22 jacketed bullet were also found at the site. One percussion cap was also found.

Discussion

Cartridges found represent small hand guns or rifles used for self-defense and small game. It is likely that target practice was taking place in the area of the dumps or small game such as varments or farm yard animals were being shot.

LITHIC MATERIALS

by

Julia G. Longenecker

Based on projectile point styles as documented by Chance (1979) from previous excavations the prehistoric remains from the 1980 spring excavations are affiliated with the late prehistoric period. Though many of the subsurface prehistoric materials from the water line trench were found in areas disturbed by historic occupation, those materials will still reflect some aboriginal activities in this area of the site. Materials from the undisturbed areas have been analyzed and interpreted in context.

The lithic materials analyzed are grouped into the following raw material categories, defined by Crabtree (1967): crystalline varieties of silica (quartzite), cryptocrystalline varieties of silica (chalcedony, flint, chert), non-crystalline varieties of silica (opal, opalite), obsidian, basalt, granite and silicified sediments.

Cryptocrystalline varieties of silica are dominate in this assemblage, spacially and temporally. They account for 80% of the lithic materials. Local informants have noted several cryptocrystalline quarries in the area (Edgar C. Bryan 1980:personal communication). The breakdown of other materials represented in this assemblage are: basalt 11%, crystalline silicas 5%, non-crystalline silicas 3%, granite 1%, obsidian 1%, and silicified sediments .5%.

Typically, there is a low frequency of obsidian in archaeological sites in northern Idaho. Prehistorically, obsidian was probably obtainable through trade, however, for unknown reasons it was not desired by the inhabitants of the Clearwater River area. One explanation for the scarcity of obsidian at these sites can be found in the ethnographic literature. An informant for Osmundson and Hulse (1962:26) noted that the Nez Perce thought of obsidian as poisonous. Another reason for the near absence of obsidian may be that there was no real need for the fine, sharp cutting edge, an attribute for which obsidian is known. Although the obsidian pieces represented here were not subject to source analysis, it is probable that they are from the Timber Butte obsidian quarry. Timber Butte was the major obsidian source for sites in central Idaho, including sites along the Clearwater River (Sappington 1981). Other types of good quality material for stone tools seem to be local and easily procured.

Heat treatment or annealing of crystalline varieties of silica is prevalent at the site. Deliberate heat treatment was a technique used to reduce the tensile strength of the raw lithic material thereby increasing flakeability (Purdy 1974:48-49). Visual characteristics of heat treated materials may be a change in color, a pinkish-reddish cast if baked in an oxidizing atmosphere and, or, a vitreous luster on flake scars (Mandeville

1973:183). Much of the lithic material from the site have these characteristics. Also, many flakes are pottlidded or crazed, or have a smokey cast. These can be visual indications of failures in attempts of deliberate heat treatment or, are signs that the lithic materials had been subject to burning by natural fires. Visual characteristics of heat treatment are not, however, always reliable. Suggested scientific means of testing for heat treatment, such as thermoluminescence (Melcher and Zimmerman 1977) and x-ray defraction (Mandeville 1971), were not used in this analysis.

The lithic assemblage from the area consists of approximately 607 pieces of debitage and 23 artifacts. The concentration of lithic materials is heavier in the northern units and lessens to the south; 87% of the assemblage was recovered from units 0-23. Vertically, based on undisturbed levels, there is a tendency for the density of materials to increase with depth. In the upper half, the materials are uniformly distributed throughout the levels; approximately 5% are found per 10 cm level. The density then increases gradually to a maximum of 22% in the bottom level. This suggests greater intensity of human occupation at this location in earlier times.

Stages of tool manufacture include the following: primary and secondary decortication, tertiary bifacial thinning and lateral thinning, or tool retouch and sharpening. A very low percentage of primary and secondary flakes were found, however, suggesting the initial stages of tool manufacture. The primary flakes recovered are small and exhibit cortex on their entire dorsal surfaces while the secondary flakes have only a portion of cortex showing. In general, both debitage classes have natural platforms. Tertiary flakes exhibit no cortex, have prepared platforms, and are thin and more regular in shape (rounded or oval). Thinning flakes are quite small in size, exhibit no cortex but have multiple, small flake scars on the dorsal side, and platform remnants are prepared.

The waste flakes recovered are mainly tertiary flakes and small thinning or retouch flakes suggesting tool shaping or sharpening and maintenance.

Fifteen flaked and eight non-flaked stone implements were found. Two projectile points morphologically are characteristic of the late prehistoric time period. However, they were found in areas disturbed by late nineteenth or early twentieth century activity. Five bifaces and biface fragments were recovered. One biface is of particular interest in that it fits the description of what Julian Steward (1928) called "throwing stones." Eight small unifacial implements were recovered, seven of which are retouched flake artifacts. The other is a small river cobble, unifacially modified by pounding and flaking.

Non-flaked artifacts consist of four grinding stones and three hammerstones. One ground and polished piece is characteristic of what is sometimes called a "gaming piece." One grinding stone may be a hopper mortar base. The remaining three stone artifacts are fragments or nearly complete hand grinding stones. Chance (1979) recorded several hopper mortars on the living floor of a prehistoric house at the site.

CONCLUSIONS

The primary objective of the water line trench excavations was to recover information concerning the Indian Agency Office building calculated to be in this vicinity (Chance 1978a). Though no in situ structural remains were found, nineteenth century artifact materials which may have been associated with occupation of the agency were documented. A major twentieth century occupation was encountered with numerous artifacts representing several phases of deposition.

Nineteenth Century

The nineteenth century material remains consisted mainly of ceramics, glass, and cut nails. These were concentrated at the north end of the trench line between units 5 and 20. Little nineteenth century material was documented at the south end of the site. With this pattern of artifact distribution it may be hypothesized that the Indian Agency Office or associated structures are near the north end of the site. As no in situ remains were found, the building is probably located somewhat east of the water line trench.

The four canals excavated are believed to have been used in the late nineteenth century, based primarily on their stratigraphic location. There was a tendency for older materials to be found at the deeper levels of the canals, but these were often mixed with later, twentieth century materials. Though the canals may have collected some nineteenth century trash during that period, the mixing of artifacts suggests later dumping of these earlier materials. As a large percentage of such materials are construction items (Table 36), especially cut and wire nails, it is likely that twentieth century occupants were disposing of older buildings during repair or removal of such structures. The northern-most canals, Canal 1 and Canal 2, contained the largest number of artifacts. It was in this area that twentieth century activity also became concentrated.

Twentieth Century

The Nez Perce Indian Agency moved from the Spalding area in 1902, relocating in Lapwai, and the written history of the site after this move is almost nonexistent. Documents and informants were sought, but to date less is known about those associated with the artifacts recovered from the 1920s and 1930s period than would have been known about the people associated with the occupation of the Indian Agency Office, if it had been encountered.

One photograph exists, post dating 1928 (Stephen Shawley 1981:personal communication), which shows two structures in the area of excavation (Fig. 46). While informants vividly remember Watson's Store and the location of

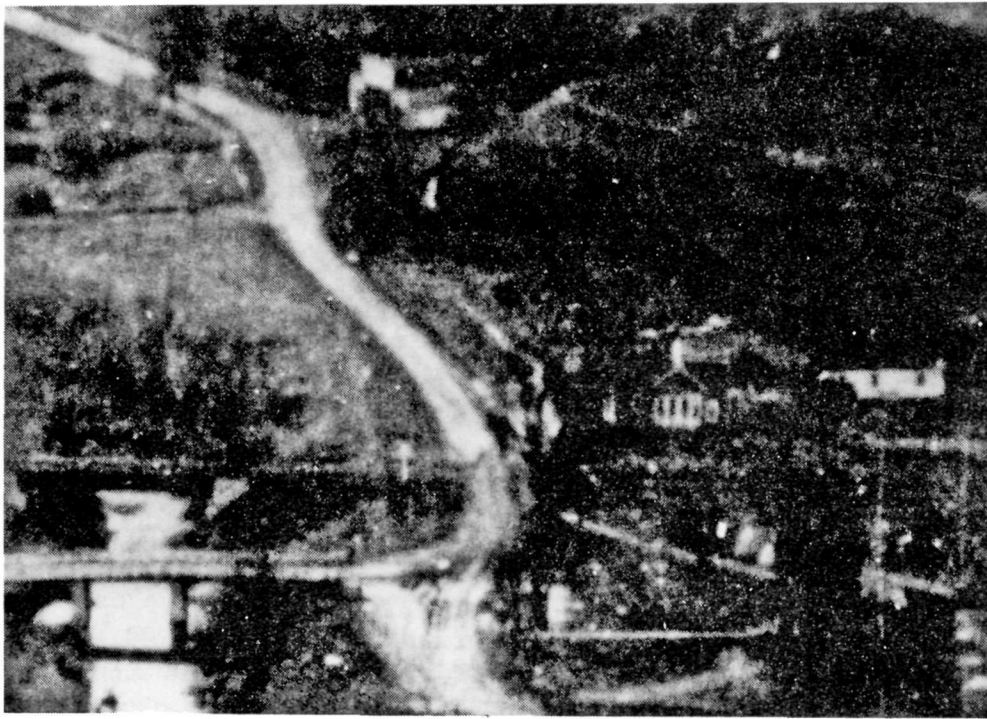
TABLE 36

Distribution of all items*

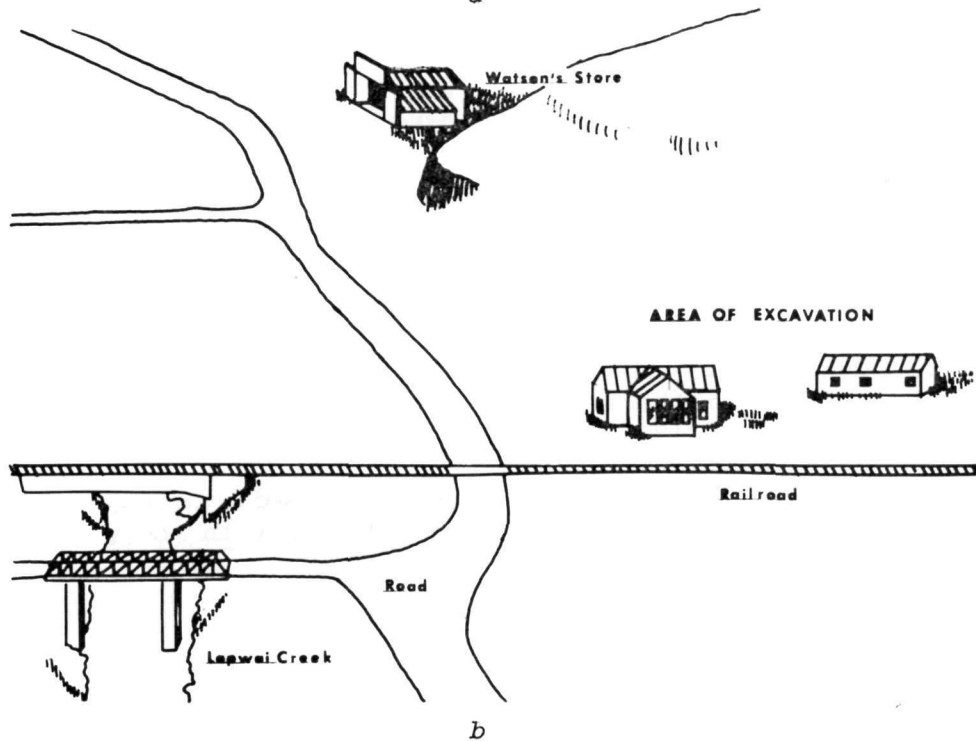
Items	Privies				Dumps		1	Canals			Other	Total
	F10	F18	F15	F17	A	B		2	3	4		
Container	57 .21	104 .49	14 .20	17 .13	83 .04	106 .12	3 .03	8 .04		6 .11	10 .02	408 .09
Domestic (I)	11 .04	2 .01	11 .16	3 .02	80 .04	61 .07	3 .03	8 .04		3 .06	23 .05	205 .05
Domestic (II)	5 .02	1	2 .03	10 .07	64 .03	29 .03	1 .01	3 .01	1 .02		3 .01	119 .03
Personal	6 .02	6 .03	5 .07	16 .12	93 .05	25 .03	2 .02	2 .01	1 .02	1 .02	15 .03	172 .04
Construction and maintenance	192 .71	97 .46	37 .54	89 .66	1618 .83	665 .74	98 .91	197 .91	56 .93	43 .80	407 .87	3499 .79
Machinery and transportation**		1			3	3					3 .01	10
Ammunitions	1				17 .01	8 .01	1 .01		2 .03	1 .02	8 .02	38 .01
Total	272	211	69	135	1958	897	108	218	60	54	469	4451

*Percentage is of total items within each provenience

**Does not include rivets



a



b

Fig. 46. Post 1928 photograph of Spalding area. *a*, enlargement of photograph; *b*, graphic illustration of photograph showing approximate area of excavations.

their own homes, no one recalled the inhabitants of these particular structures.

Land records at the Nez Perce County court house in Lewiston indicate that the area of excavation is in a small portion of Lot 10. This lot, along with five other lots, were purchased by J. R. Roberts in 1926, though where among these six lots he may have built structures is unknown. In 1938, James Kingsberry purchased parts of nine lots, among them, Lot 10. According to informants, Kingsberry's house was located north of the excavated areas, across the railroad tracks, and thus outside the area of the water line trench.

Archaeologically, the water line trench excavations have exposed a small and vital part of the undocumented twentieth century history of the Spalding area.

Sequence of Events

Twentieth century occupation of the site was concentrated in the same area as nineteenth century activity, at the north end of the excavations and in the areas of the canals. Four privies were dug into one canal and two canals, slowly becoming depressions, were used as dumps.

Between 1925 and 1930 two privies, features 10 and 18, were dug into the area of Canal 1 and during use were filled with extract bottles. Dating to the period of Federal Prohibition, it is assumed that the contents of the extract bottles were consumed for their alcohol. The dated bottles indicate that the privies were abandoned around 1930/1932.

After 1933, two additional privies, features 15 and 17, were dug in the same area and with an orientation similar to the previously abandoned privies. In these newer privies extract bottles were not present and the majority of artifacts were canning jars, ceramic ware, and glassware. Extract no longer appears to be consumed in large quantities, or at all, though beer bottles are present, pointing possibly to the end of Prohibition. Canning of home foods takes place after 1933, an activity which did not appear in the archaeological record of the privies before their abandonment in 1930/1932.

At least while the later privies were being used, and possibly prior to this time, similar artifacts were disposed of nearby in the upper levels of Canal 2, Dump B. Though crossmending does not exist between the dump and privies, artifacts, especially ceramic patterns, indicate that the same occupants are using the dump and the later privies.

When these privies were abandoned, dumping continued on top of the features, now designated Dump A. Again, based primarily on ceramic patterns, it appears that, though the privies were no longer used, the same inhabitants occupied the site.

The post privy deposition of artifacts, Dump A, contrasts with Dump B in several ways. Though artifacts were similar in the two dump areas with comparable ceramic patterns, kinds of bottles, and styles of glassware, the condition of artifacts and the frequency of personal items differed between the components. Dump B contained larger, more nearly complete artifacts--pots, pans, bottles, glassware, and ceramic ware in a small concentrated area; while artifacts from Dump A were smaller, more fragmented and scattered over a larger area. Personal items and clothing items were much more frequent in Dump A than in Dump B (Table 37). Dump A seems to have functioned not only as an area of throwing and scattering trash, but also as an activity area. The concentration of clothespins, buttons, and clothing hardware suggest the vicinity of Dump A may also have been the area of hanging and drying clothes and other associated activities. Such items were lost here and others thrown away. It is not known whether or not the two dumps were used at the same time. The scattered and fragmented artifacts from Dump A may have been scattered from a more concentrated dump, possibly Dump B.

The hypothesized sequence of events at the site may be summarized as follows: when the nineteenth century canals were no longer used for irrigation purposes, structural debris from old or repaired buildings were thrown into them. At some time after 1925, occupants of the site dug two privies in the area of Canal 1. These were subsequently filled with extract bottles and probably abandoned around 1930/1932. After 1933 two additional privies were dug. The nearness in vicinity and date and the similarity of orientation of the four privies suggest continued occupation of residents at the site, while artifact contents suggest different activities by the same or additional occupants. As the two new privies were filled with canning jars, glassware, ceramic ware, and other items, the nearby depressed area of Canal 2 was used as a dump and filled with similar items. At some point the privies were abandoned, possibly burned, and filled over. Artifacts stratigraphically post dating the privies, Dump A, were not unlike those of the privies themselves or of Dump B suggesting a continuance of occupation. The artifacts from Dump A were more fragmentary than elsewhere with a higher frequency of personal items (Table 37) suggesting that this dump area was also an activity area.

The Occupants

The presence of men, women, and children is evident in the archaeological record with such items as toys, preserving kettles, beads, tobacco tags, cosmetics, and several different sizes of shoes. Interestingly, the two earliest privies do not exhibit this wide variety of articles and may represent only male occupation of the site. Based on ceramic analysis, Wegars has hypothesized the evidence of a woman on the site during the use of the two later privies and dumps. The arrival of a woman or a family to the site which was already occupied by one or several men could explain the contrast in privy contents while their vicinity and orientation remained the same.

TABLE 37

Distribution of container, domestic, and personal items*

	Privies				Dumps		1	Canals			Other	Total
	F10	F18	F15	F17	A	B		2	3	4		
Container	57 .72	104 .92	14 .44	17 .37	83 .26	106 .48	3 .33	8 .38		6 .60	10 .20	408 .45
Domestic	16 .20	3 .03	13 .41	13 .28	144 .45	90 .41	4 .44	11 .52	1 .50	3 .30	26 .51	324 .36
Personal	6 .08	6 .05	5 .16	16 .35	93 .29	25 .11	2 .22	2 .10	1 .50	1 .10	15 .29	172 .19
Totals	79	113	32	46	320	221	9	21	2	10	51	904

*Percentage is of total items within each provenience

Prohibition

Assuming that the large number of extract bottles present in two privies have been correctly interpreted as representing the consumption of alcohol, it may be concluded that liquor prohibition affected the choice of alcohol which residents could consume, but did not prevent them from doing so.

The selling of liquor on the Nez Perce Indian Reservation had been prohibited since its establishment. Watson's Store did not sell liquor (Stephen Shawley 1981:personal communication) and indeed it would have been illegal to do so.

In the fall of 1909 a movement to close saloons in Lewiston under the local option law failed, but by December of that year a new movement had begun in which leaders of the dry movement believed that if they could not get the city dry, they might be able to get the county dry. "The theory of the campaign was that if a majority of the people of Lewiston did not want a dry town, sufficient votes could be secured in that section of the county, where the existence of saloons is already denied by federal law, to overcome the will of the Lewiston people" (*Lewiston Morning Tribune*, 29 December 1909). Several months of argument took place between those for and those opposed to prohibition at the local level, which included cries of treason and tampering with election supplies (*Lewiston Morning Tribune*, 9 March 1910), as well as claims that local option would ruin Lewiston (*Lewiston Morning Tribune*, 5 March 1910). New Perce County voted dry on 9 March 1910 in which the majority voted for the abolishment of the saloon in the county. "Lewiston had an especially hard fight in this regard in view of the fact that aside from a saloon at Forest and one at Pierce there are no saloons in the county and cannot be in view of the federal law abolishing the liquor traffic on the reservation" (*Lewiston Morning Tribune*, 10 March 1910). In the vote for the abolishment of the saloon, 136 voting residents of Spalding voted 49 wet and 87 dry. "At Spalding, Lapwai, Culdesac, and Kamiah Indians were voted dry by the dry forces, the total reaching over 100. At Spalding ten ballots were thrown out by the judges as no mark whatever had been made on them--they had been voted by the Indians. Interpreters were utilized at Kamiah to aid the Indians in voting" (*Lewiston Morning Tribune*, 10 March 1910).

At the state level, a movement began in Boise as early as January 1909 "for an amendment to the state constitution prohibiting the manufacture or sale of liquor in Idaho" (*Lewiston Morning Tribune*, 20 January 1909). Such a law was finally passed in 1915 and on 1 January 1916, the state of Idaho became dry. By this time most of the state was dry under local option law, so only about 150 saloons went out of business. Idaho's prohibition law was "said to be the most drastic in the Union. It not only closes the saloons, but makes possession of malt or spiritous liquor a crime, excepting wine for sacramental purposes and pure alcohol for medicinal, scientific and mechanical uses, which is procurable only on an order from the probate court" (*Lewiston Morning Tribune*, 31 December 1915). The first possession of liquor was a misdemeanor and subject to a fine of \$50 to \$500 and imprisonment from 30 days to 6 months or both. The second offense was a

felony and could bring one to two years in state prison (*Lewiston Morning Tribune*, 31 December 1915).

With the beginning of state prohibition in Idaho, people were buying up liquor for home stock and there was a reported shortage of alcohol in the drug stores (*Lewiston Morning Tribune*, 1 January 1916). With the advent of federal Prohibition "there was a great demand for bay rum, perfume, hair tonic, and toilet waters and similar preparations of which contained a large percentage of alcohol in addition to various denaturants . . ." (Asbury 1950:282). At least some Spalding residents turned to extracts for alcohol during part of the some 24 year span in which the selling and buying of liquor in Nez Perce County was prohibited and later, after Prohibition, residents consumed beer.

The Depression

The hardships of daily life during the Great Depression of the 1930s have been recounted in detail through historic and photographic documentation. As archaeologists, we would expect recovered material culture to also document this event. Many of the artifacts from Spalding date to the early years of the Depression. Low cost Depression glass vessels and ceramic wares indicate a preference for the inexpensive and utilitarian. Economical home canning is evident and there seems to have been little consumption of canned foods. Do these remains reflect conditions brought on by the economics of the Depression, forcing Spalding residents to purchase these inexpensive items, or do they reflect an on-going status and preference of those living at the site for such materials?

There is evidence (Bird 1966:258-259) that the Depression hit such "capitalistic" enterprises as railroads, mines, steel mills, and construction much harder than "consumeristic" goods and services which people needed in daily living and which could often be obtained with little investment. Demands for such items as shoes, drugs, foods, soap, cigarettes, and clothes grew directly with the population (Bird 1966:258). In early 1930 merchants of the nearby town of Clarkston, Washington reported that the volume of business transacted exceeded that of the previous year. Though business had been of a more spasmodic nature than usual with high and low months, the final totals showed much greater gain than was expected. People bought less on credit and paid cash more often and new firms were added to the town's business district. Business men were "predicting that 1930 would be a banner year for Clarkston" (*Lewiston Morning Tribune*, 2 January 1930). Mail order houses of Sears, Roebuck, and Company made a profit every Depression year (Bird 1966:257). Thus, it is possible that material goods, "of which archaeology is made", may not reflect such an economic and cultural event as the Depression, in which case one would have to interpret the Spalding remains as those preferred by the residents, or at least, similar to material they purchased before and after the Depression. On the other hand, it appears that the Depression did affect business of Watson's Store in Spalding as books show sales dropped quickly with its onset (Stephen Shawley 1981:personal communication) indicating that the

purchasing power of Spalding residents may have decreased. In this instance material culture would be expected to change and this would be reflected in the archaeological record. One would then interpret the remains of Spalding as representing the changed life style of the residents during the Depression.

For now, the question of how much of the material culture during this period at Spalding reflects conditions brought on by the Depression and how much results from an ongoing status or preference of those living at the site is one that can not be answered satisfactorily.

Future Work and Recommendations

The water line trench excavations at Spalding have exposed a part of the area's history about which little is written. Four canals were exposed in cross-section, three privies completely excavated and one partially removed, and two dumps were cut through by the trench line. Though the excavations revealed only a small section of what remains at the site, they have added more information to our knowledge of the Spalding area. The material remains extend to the nineteenth century and the majority of those removed are from two important periods in American history, liquor Prohibition and the Depression. It is quite probable that many items recovered are from Spalding's Watson's Store.

The Indian Agency Office Building was not encountered and may still remain intact. Therefore impact of the area should still be avoided for this reason. This portion of the park has now increased in importance given the remains which have been discovered indicating what still exists at the site.

The wide-ranging material culture offers a number of avenues of interpretation and investigation. More detailed analysis of the existing remains could further answer questions which have only begun to be answered on the sequence of events at the site; occupants of the site; and the impact of Prohibition and Depression events on the inhabitants of the area. Future work in the area, with the probable exposure of more privies and more material from the dumps, would lend more comparative data and possibly expose long term trends or sudden changes at the site. Work in the areas of the postulated 1920s-1930s structures could greatly enhance information recovered from the dumping areas.

The material culture excavated recently, and any recovered in the future will add to information concerning products available at Watson's Store and may be displayed as items actually sold there.

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