REPORT ON THE INTRODUCTORY STAGE OF FIELDWORK

AT THE LARRAKEYAH RUBBISH DUMP SITE

by Kate Holmes

Prepared for the National Trust of Australia (N.T.)

April, 1991
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NB: all the drawings are at half scale, except for the few small items noted at full scale.
ACKNOWLEDGEMENTS

Many people have been involved in this project, from encouraging action, to providing labour and support, I am especially grateful to Penny Cook, Director of the National Trust of Australia (Northern Territory) who provided an immense amount of support and help during and after the fieldwork. All the army personnel encountered during the fieldwork were extremely helpful, and I would like to thank Lieutenant-Colonel Peter Schuman, Warrant Officers Noel Tanner and Lindsey (Snow) Robinson, Sergeant Jim Parmisano, Sapper Julian Kirkwood, and the Orderly Room staff. Peter Spillett from the Museums and Art Galleries Board pushed for further work, as did Kim Akerman; Paul Clarke had only just joined the Museum, but provided further encouragement and the assistance of his trainee, Mikki Selway.

Of the many volunteers who helped at the site, Mikki Selway not only provided the most assistance, but additional helpers - Deirdre Selway, Mella Parsen-Kempfer, and Chris Crasweller. Barbara Pederson provided both field and research assistance, as did Barbara James who provided notes on the old Palmerston hospital from Brian Reid. Helen Wilson tracked down the original gazettal date of the rubbish dump. It is due to their labour that so much material was collected and recorded. Thanks must also go to Mary Harris, of the National Trust's Darwin office, who typed up that part of the recording done on the dictaphone. While the artefact catalogue is by no means complete, the limited amount of drawing has been done, to her usual high standard, by Brenda Thornley.

It is planned that further collection/recording will be carried out over the next few years, and I hope that this report will provide some basis for that work.

Kate Holmes

April 1991
SITE REPORT

BACKGROUND

An historic rubbish dump partly surviving within the Larrakeyah Army Barracks has been known for some years, and the present report arose after the rubbish dump was exposed during recent construction work. The site is on a vacant block, on Stephens Terrace, along the northern boundary of the Barracks, and close to the eastern end of the army land. Older army housing existed on either side of the vacant block, one house being close to the eastern end of the rubbish dump. The construction work involved the replacement of sewerage pipes and septic tanks originally laid down, possibly in the 1930s, and now being upgraded for the existing and new housing. (See Figures 1a and 1b).

The contractors had uncovered the rubbish dump in July, 1990, at its most westerly point close to a coconut palm; the eastern edge was found close to the fence of the adjacent housing. The uncovering of the rubbish dump caused considerable public interest, both among army personnel and civilians, and bottle collectors had a field day. The softer soil of the rubbish dump fill, and the interest of the public made work difficult for the contractors, and eventually the fill material from the sewerage trench was completely removed, and re-dumped further west along Stephens Terrace. Thus an area some 35 metres long, up to 4 metres wide, and 3.5 metres deep was removed - some 300 cubic metres of fill. The trench, and the slight hollow caused by the rubbish dump, was re-filled with sand.

News of the rubbish dump reached the Museum, and Kim Akerman, along with Penny Cook the Director of the National Trust, visited the site on August 10th, 1990, to assess the possibility of limited archaeological investigations. The army was most co-operative, and emergency funding was made available from the Northern Territory Heritage Project, with additional support from the National Trust.

The site was visited briefly by the consultant on Tuesday 14th August, after a meeting with Lt.-Col. Schuman to discuss matters generally. The fieldwork began the following day, 15th August, and continued until midday on Tuesday 28th August, except for a three day break from 17th to 19th August inclusive. On site assistance was given by a number of volunteers, with Mikki Selway, a trainee from the Museum providing the greatest support, ably assisted by Barbara Pederson and Deirdre Selway.
Figure 1a Photograph from Stephens Terrace of the general area, with older houses east and west of the site. Sand pile in background, between trailer and house, indicates the main work area. From SE.

Figure 1b Photograph from the east showing the line of the sewerage pipe trench and the northern boundary of the Barracks on the right.
THE SITE

The rubbish dump was originally sited in a gully, which continued north into what is now part of Temira Crescent, but then was part of the cliffs indenting the coastline at the southern end of Cullen Bay where it joins the base of Point Emery. A considerable amount of terracing, landscaping and building has occurred along Temira Crescent, and as there have been reports of bottles, etc. found in the area, it would seem that most of the dump has been destroyed. Thus the comparatively small area at the head of the gully, and within Larrakeyah Barracks is all that is left of the original rubbish dump. Along the Barracks boundary the dump is some 35 metres wide, narrowing towards its southern tip. This southern point was not located exactly, but appears to be some 20 to 25 metres south of the boundary fence. (See Figure 2, sketch plan).

At the time of my first visit, a small part of the dump, approximately 20 by 10 metres was being fenced off to allow for further investigation. The site was now covered in sand, used to backfill the rubbish dump area, which fortunately contrasted well with the very dark soil used originally to cover the rubbish. Within the small fenced area was a trench along the north side of concrete kerbing just inside the boundary fence; this was part of the sewerage trench, which extended some four metres south from the kerbing. There was a slightly wider hole left open at the western end of the trench area. Further south was a larger and deeper hole, excavated by the heavy machinery on site. This was some 2 metres deep, oval in shape and roughly 6 by 4.5 metres. The material from this hole had been dumped on the ground to the west. (See Figures 3a, 4a and 4b) Most of the fieldwork concentrated on this dump pile, and the recording of as many surface artefacts scattered over the general site as was possible. Artefacts taken from the site by the army in earlier weeks were also recorded. These included a large number of complete bottles (beer, wine, spirits, pharmacy, soft drink and sauce/pickle types) plus some complete stoneware bottles and almost complete ceramic articles.
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Figure 2 Sketch plan of the work area.

- Boundary Fence
- Line of kerb
- Approximate line of sewerage pipe trench
- Temporary fence around work area
- Areas excavated by mechanical means, or left open for investigation.
Figure 3a The Dump Pile, and associated hole, taken from the NE. The contrast between the original dark fill, and recently dumped sand is indicated. Scale marked in 25cm intervals.

Figure 3b General view of the north face of the Dump Pile from NNW. Scale marked in 10cm intervals.
Figure 4 Colour photographs similar to those in Fig. 3, showing colour variations more clearly.
FIELDWORK

On Wednesday, 15th August, fieldwork began with further discussions with army personnel and the contractors, general photographs of the wider area, and the beginning of artefact collection and recording. It was decided to divide the major work area, the pile of fill material, into several segments, and carry out a more detailed investigation of one of these segments.

The "Pile Dump".

North segment

A segment more or less in the middle of the north face of the Pile Dump, the North Segment, was chosen for major investigation. (See Figures 2, 3b and 4b). The segments were roughly marked, being 2 metres wide at the outer edge of the pile, and narrowing towards the centre. At the beginning of fieldwork there had been rumours of bottle hunters looking over the site apart from the recent uncovering, but the full extent of previous disturbance was not realised. With hindsight, the more careful (though still somewhat rough) excavation of this area was possibly too late.

As the outer area of the North segment was comparatively shallow, the first 50cm (measured along the base of the pile) was taken out as one layer. At this point it became obvious that there was some variation in the original fill material. On top (originally lower in the rubbish dump, but now reversed by the "excavation" from the hole) was a very dark brown to black fine soft soil, full of artefacts. Beneath this was a much more mixed deposit of orange clay and more sandy soil, also containing many artefacts. As this layer would have been closer to the surface originally, the mixture may be the result of gardening activities in the last 50 or so years, as well as attempts to seal the rubbish dump in the more distant past. The dark brown soil became layer (1), and the more mixed deposit became layer (2) in the area 50-70cm into the pile. During the removal of the next area, 70-100cm, the orange clay marking the division between the layers became obvious higher up in the section (see Figure 5a). Further excavation showed that the deposits became even more mixed, and layers (1) and (2) are a more arbitrary division of the fill, with layer (1) being the upper area, and (2) being the lower, though still more mixed area. After removal of the fill in 100-130cm, and then 130-160cm, the final area, 160-180cm was so mixed that the deposit was taken out in just one layer. This was the extent of work possible on this segment. The pile was a little over 1 metre high at this point, and the segment had narrowed to approximately 75cm.
Figure 5a North segment, south section at 70cm showing the orange clay and mixed deposit of layer (2). Vertical scale at 10cm intervals. (CS 1:34)

Figure 5b North segment completed to 180cm. Scales at 25cm
The amount of careful excavation was limited not only by
time constraints, but because of the time-consuming and
difficult task of recording the enormous number of
artefacts. A lack of sieves meant that small items may
have been missed, and small fragments of glass and
pottery were discarded without recording. As the bucket
loads of artefacts were removed from the work area, the
contents were roughly sorted into glass, ceramic, metal,
and other (shell, bone, etc.). As this consultant was
most familiar with the glass bottles, many of these were
simply recorded and discarded into the smaller hole at the
western end of the trench. Recording was helped
considerably by the loan of a dictaphone from the National
Trust; though there were some initial problems with this
new piece of equipment. Most of the volunteers were
unfamiliar with this work, and the resulting artefacts,
and this also slowed down the recording process. In some
cases the full details of artefacts were not recorded, and
it will be necessary to go back to the artefacts
themselves for further information.

Other segments

Those immediately adjacent to the North segment were not
looked at; the area to the east was too difficult of
access, being poised over the steep side of the hole. The
rubbish dump fill was very inclined to slip or collapse,
and it was for this reason that the North-North-West
segment was left untouched — though there was some
encroachment from the North-west segment. The latter had
finds from middle of the segment's slope collected, then
those from the mid-to-top. A deeper investigation (using
a shovel) concentrated on the top of the segment, even
further into the centre of the Pile Dump than the
investigations in the North segment.

The other segments to the west and south were a little
more difficult to reach, as the temporary fence had cut
around the edges of the pile. Many of the more complete,
larger and heavier bottles, etc., seemed to collect around
the edges, and walking over the soft fill meant even
greater displacement of soil and artefacts. A rapid
collection was carried out on the surface of the West
segment, but a little more work was possible on the
southern face. In the South-west segment, surface
artefacts were recorded as layer (1), and those from just
within the fill were from layer (2). Most of the latter
were from the upper part of the segment. In the South
segment, surface finds were marked layer (1), slightly
embedded finds in the mid-to-top area from layer (2), and
a minor excavation close to the top resulted in layer (3)
artefacts. Only a very brief collection/recording was
possible in the South-east segment.
Figure 6a North-west segment, hurried investigation of the top section.

Figure 6b General view of the site from the west. In the foreground, Mikki is recording artefacts, at the Dump Pile Deirdre investigates the North-west segment, with Barbara in the North segment.
Other areas briefly investigated

The area that had been partially left open above the sewerage pipe trench, the gutter part of the kerbing, and the area between the kerb and the boundary fence were looked at, and artefacts recorded. Artefacts in the trench area may have fallen from the deposits immediately beneath the kerbing, which may have seen less disturbance from recent bottle hunters. There have been some disturbance, as shown by the storm water drain and other pipes noted in this section. However, it is this area, at the extreme northern edge of the barracks, which may be the most appropriate for detailed excavation, if this is ever possible.

In recording the artefacts from these three areas, a tape was laid along the gutter within the work area; artefacts were then recorded within each 50-100 centimetre interval. In the following artefact catalogue these precise locations have not been shown, but can be established by reference to the original field notes. The sketch plan of the site (Figure 2) indicates distances from the coconut palm, marking the western side of the original rubbish dump; the internal measurements began 12 metres to the east, and allowance would have to be made for this in any subsequent fieldwork.

Figure 7 The possibly less disturbed area beneath the kerbing, showing the stormwater drain. Looking east along the trench area, the modern sandy fill obvious on the right hand side.
A very limited attempt was made to record and collect items from the base and sides of the large hole, parent to the Pile Dump. Working in the hole was difficult, because of the slippage from the pile, the modern fill, and also the original soil fill. It was clear that the upper parts of the rubbish dump had been disturbed by gardening over the years, and a number of mango trees had been removed from this area as part of the construction program. There were signs of pits dug into the site, and a pop-top can was noted in the south-east section of the hole. However, of the turn-of-the-century artefacts, several ceramic items were helpful because of their comparatively large size. Several plate fragments were found, one being large enough to include not only a good area of the rim, but part of the trademark in the centre of the underside. Most of the other plate fragments found during fieldwork were very much smaller.

In addition to the fieldwork, a start was made on recording those items removed by the army during July. While many of the artefacts were recorded, and some were photographed, there was not sufficient time to complete the work. The army collection includes a large number of complete bottles, and more unusual and almost complete ceramic items such as vases and a possible teapot. Further work on the complete bottles should be helpful in more precisely identifying the more fragmentary pieces found during this fieldwork.

During the fieldwork there were many references to the number of bottle collectors who had worked extensively through the rubbish dump in 1989 and 1990. As a result of this, and with the co-operation of the army, the site, and the work, was publicised through the local media. The main aim of this publicity was to ask anyone who had removed artefacts from the site to provide information about those items as they could help date the rubbish dump, as well as provide additional information about life in Darwin (then Palmerston) in the late 19th century. While the media coverage was good, the result was a resounding silence. Subsequently, the consultant did meet one of the collectors who had dug the site earlier in 1990—Penny Baird. She and her husband, along with two other men had spent some weeks there, and it should be possible to get further details from the Bairds about their collection.

To show that collectors are not a recent development, a visiting oldtimer, George Anson, who had been a pharmacist in Darwin from 1930 to 1938 remembers that Aborigines would scavenge in the area then, and sell ointment bottles and ginger jars to George. Obviously, the rubbish dump has seen a considerable amount of disturbance over the years, but remains an important source of the material culture of the Darwin residents of a century ago.
Dating the rubbish dump

No detailed research has been possible into the history of the rubbish dump, and the consultant is most grateful to a number of people who have been able to provide some information. Helen Wilson discovered that a rubbish dump on lots 781 and 782 Thomas Street, was gazetted on 10th July, 1886. Barbara Pederson found a map of the headland with its planned streets and square, dating from 1902 with those same lots marked SL, presumed to mean Special Lease. (NTAS 790/128) (Figure 8). Further research should discover when other rubbish dumps were gazetted, and an official closing date for this site.

The consultant is most familiar with 19th and 20th century bottles and other rubbish (but almost no ceramic items) from a Central Australian goldfield. This rubbish dump at Larrakeyah includes familiar glass bottles typical of late 19th century manufacture, as well as some new categories. Miners don't seem to have had much use for aerated waters, unlike the more sophisticated urban population of the Top End. Many of the bottle types could have been made until as late as c. 1920, but there is a total lack, so far, of any of the modern developments such as the crown seal finish for beer bottles that would be expected in a site used after about 1910. There are none of the threaded necks used for sauce and other bottles from the 1920s. Two English glassmakers can be identified from some of the bottle bases, Nuttall & Co, operating between 1872 and 1913, and Cannington, Shaw & Co, from 1875 to 1913. A John Kilner stopper could have been made as early as the 1840s or 1850s, though this date is not definite.

The rubbish dump also produced a very large number of ceramic items, from rough earthenware through to fine porcelain, both European and Chinese in origin. Little research has been carried out on these items, though some of the trademarks have been dated. One of the most common stoneware bottles was marked H Kennedy and Glasgow and could have been made between 1866 and 1929. Trademarks on everyday crockery indicate manufacture by W T Copeland & Sons between 1847 and 1970, or by Clementson Brothers between c. 1870 and 1916. The date range for ceramic is broader than for the identified glass, but certainly allows for a late 19th century manufacture, export, and deposition. While further research may more closely define the life of the rubbish dump, it seems probable that it was closed by 1910 and possibly earlier.
The presence of Chinese in the Top End is made obvious in the artefacts within this rubbish dump. Over 3,000 had arrived by 1886, and the Chinese continued to outnumber the European population for many years. Gold was the initial attraction, but many men turned to market gardening and store keeping as more secure occupations (Jones 1990:48, 50). Another possible impact on the types of artefacts found within the rubbish dump may have been old Palmerston hospital, begun in 1874 and overlooking Doctor's Gully. The modern Packard Street, which leads to the Larrakeyah Army Barracks, probably runs along the back of the old hospital site. There are numerous pharmacy bottles from the rubbish dump, and some more unusual items that may relate to the hospital. All these aspects of life a century ago need closer study.

And there can be no doubt that considerable further research is necessary on the artefacts. Physical checking of the artefacts may show that many of the bottle bases and ceramic items can be identified and grouped. Additional documentary research should provide additional dating evidence for those so far unknown makers of bottles, etc., or their contents. Much more detailed studies of the trade routes between the port and the rest of the world are required. The interim catalogue included as the major part of this report will be greatly improved, especially the ceramic section, when further research is possible.

The sorting and grouping carried out in the following catalogue is only at a preliminary stage. This consultant has not before worked without considerable sorting and analysis of all artefacts resulting from a field study. Such work was not possible under the financial and time restraints of the project. As some of the recording turns out to have been insufficient, comparison of the following lists with the actual artefacts, wherever possible, may well iron out some of the anomalies. Almost all the ceramic artefacts were kept, and these certainly require further investigation.

While it would be of considerable value to continue excavating within the rubbish dump, the more immediate concern is with the material taken from the sewerage pipe trench, and dumped further west along Stephens Terrace. At the time of the fieldwork, information from the army was that a collector was allowed access to these piles. He was to sieve the material, and the army could then re-use the soil for garden purposes. Despite the numerous disturbances to this rubbish fill, the information locked up in the surviving artefacts was felt to be too important to allow such activity. Recommendations were made in a preliminary report of September, 1990. These were to:
1. Discuss with the army the current access to the re-dumped material, and consider ways to record the artefacts now being removed from the site without supervision. Unwanted material should be left on site for recording when convenient.

2. Discuss with both the army and Museum ways to carry out a complete recording of the re-dumped piles.

3. Consider ways of protecting the re-dumped piles if a long term recording project is possible. This would mean protection from other bottle hunters, as well as from the weather.

4. Consider whether the original rubbish dump site is now reasonably protected, and if further archaeological investigation is warranted.

It is most encouraging that all parties involved in this project have co-operated to allow further work. The army agreed to cancel access to the re-dumped piles, and enough vegetation has grown over them during the Wet to prevent too much erosion. Discussions between the National Trust and the Northern Territory University have led to plans to set up a student program to continue artefact collection and recording from this mass of material. Other community groups may be also involved to help provide the labour necessary for this long term project. This report provides only a brief introduction to the diverse material culture of the isolated population of Darwin of one hundred years ago.
GLASS BOTTLES  ALCOHOL

Alcohol bottles make up a high proportion of the bottle assemblage from the Larrakeyah Dump — and it should be remembered that a number of stoneware or earthenware bottles would also have contained alcohol. Beer, wine and spirits bottles have been identified either through bottle shape, or through embossing on the bottle naming the contents or a manufacturer. The most common beer is the "champagne" type, described below; the usual spirit bottle has a two part finish and a clear distinction between the neck (often bulgy in shape) and the shoulders of the bottle. However, it is quite possible that beer bottles, particularly those containing stout or porter, could have a two part finish, and the possible wine bottles have a one part "champagne" finish. As many of the bottles from the dump were broken, it is difficult to be sure which necks belong to which subcategory — as it is occasionally difficult to be sure of some of the bases. The complete bottles, mostly from the collection held by the Army, and those found during the excavation, form the basis of the bottle catalogue, with the part bottles being fitted in as seems appropriate. It should be noted that due to the speed of the work, and the use of volunteers who were mostly inexperienced, the recording of part bottles was not always as accurate as one would wish.

BEERS

LG01 The most common green glass bottle is the so called "champagne" beer. The name has arisen from the high pushup and finish which is still used for champagne bottles. There are variations in the measurements of individual bottles, or the bases found during the excavation, but the base is usually 8.4 to 8.8cm in diameter, and the neck diameters 3.1-1.7cm. (external and internal measurements); the height approximately 30cm. No seams are found on the body or heel, as the bottle has been turned in the mould, to give the glass a more burnished appearance. The finish, or lip, has a sloping or chamfered mouth, above a wide, flat string rim, usually 1.8cm deep; almost straight neck flaring slightly, sloping shoulders and straight sided body. Heel has a narrow, rounded edge and a high slightly bulging pushup, to 5.5cm, with large marmelon. [An example illustrated, Figure 9, p.22]

The date range of these turned-in-the-mould types is from the 1880s to about 1910. (Parks Canada 1985:30, Munsey 1970:40).

Complete examples from the Army collection:

22 in all, though some variation in thickness of neck and shoulders, some have embossing on the base, etc:

1, 30.2cm tall, base 8.4cm, rather pointed on edge of wider heel, medium pushup, embossed 28 on base.
1, similar. embossed 27
1, ditto, embossed 24
1, ditto, embossed 78? (very faint)
1, ditto, embossed 14
1, olive green, 30cm tall, has wide-topped pushup
4, also olive green, but more usual base
1 has remains of paper label on body, possibly
diamond shaped originally
1 had lost its neck, probably very recently

Examples from the rubbish dump (complete bottles indicated by an asterisk)

<table>
<thead>
<tr>
<th>complete bottles or bases</th>
<th>part bases</th>
</tr>
</thead>
<tbody>
<tr>
<td>North seg. to 50cm</td>
<td></td>
</tr>
<tr>
<td>50-70cm (1)</td>
<td>1</td>
</tr>
<tr>
<td>(2)?</td>
<td>2</td>
</tr>
<tr>
<td>70-100 (1)</td>
<td>1</td>
</tr>
<tr>
<td>(2)</td>
<td>6</td>
</tr>
<tr>
<td>100-130 (1)</td>
<td>3</td>
</tr>
<tr>
<td>(2)</td>
<td>1</td>
</tr>
<tr>
<td>130-160 (1)</td>
<td>4</td>
</tr>
<tr>
<td>130-160 (2)</td>
<td>2</td>
</tr>
<tr>
<td>NW seg. middle</td>
<td></td>
</tr>
<tr>
<td>mid-top</td>
<td>3</td>
</tr>
<tr>
<td>top</td>
<td>5</td>
</tr>
<tr>
<td>West segment</td>
<td></td>
</tr>
<tr>
<td></td>
<td>2 (1*)</td>
</tr>
<tr>
<td>South-west seg. (1)</td>
<td></td>
</tr>
<tr>
<td>(2)</td>
<td>1</td>
</tr>
<tr>
<td>South segment</td>
<td></td>
</tr>
<tr>
<td>(1)</td>
<td>2</td>
</tr>
<tr>
<td>(2)</td>
<td></td>
</tr>
<tr>
<td>South-east segment</td>
<td>noted</td>
</tr>
<tr>
<td>Gutter area</td>
<td>3</td>
</tr>
<tr>
<td>Gutter-fence</td>
<td>5</td>
</tr>
<tr>
<td>Trench area</td>
<td>8</td>
</tr>
</tbody>
</table>

There were, in addition, two rather unusual variations on the "champagne" type. These appeared much the same as the above examples, but the pushup was quite low, slightly curved, with no marmelon.

South segment (1) 2 (1*)
LG03 There are numerous examples of small, or half-sized champagne beers, with some variations in measurements, but the same shape and profile of the full sized beers. They are usually between 23 and 26cm tall, with base diameter usually between 6.2 and 7cm, and have been turned in the mould.

Date of manufacture between 1880s and about 1910.

Complete examples from the Army collection:

18 bottles in all, with some variation in size, usually about 26cm tall:
1. 25cm tall, has rather pointed edge to heel, lower pushup embossed 2 and 0
1. paler green, 24.5cm tall, base has three raised circles or dots close to inner heel
1, embossed 24

<table>
<thead>
<tr>
<th>North seg. to 50cm</th>
<th>4. (2* 25x7, 24.4 x 6.2cm)</th>
</tr>
</thead>
<tbody>
<tr>
<td>50-70 (1)</td>
<td>2</td>
</tr>
<tr>
<td>(2)</td>
<td>3</td>
</tr>
<tr>
<td>70-100 (2)</td>
<td>1</td>
</tr>
<tr>
<td>100-130 (1)</td>
<td>1 (7cm)</td>
</tr>
<tr>
<td>(2)</td>
<td>1</td>
</tr>
<tr>
<td>130-160 (1)</td>
<td>2</td>
</tr>
<tr>
<td>(2)</td>
<td>5</td>
</tr>
<tr>
<td>160-180</td>
<td>5</td>
</tr>
</tbody>
</table>

| North-west seg. mid-top | 5 (1*) |

| South-west seg. (1) | 3 |
| (2)                | 1 |

| South segment (2)   | 2 |
| (3)                | 3 (1 with raised circles, 1 v. small, only 5.7cm.) |

South-east segment noted

| Trench area         | 3 (1 c. 6cm, 2 c. 7.5) |
| Gutter-fence area   | 1 |
LG04 Small champagne type, except that the pushup is quite low. Few examples found so far, is 23cm tall, base diameter 6.8cm, no obvious side seams, but a heavy seam outside the heel indicating that the bottle was blown into a cup mould, and possibly made using a semi-automatic machine. The heel is rounded before the lowish, even pushup.

From the Army collection: 1 bottle

South-west seg.(1) Complete bottle, pushup has central flat section, possibly two or three circles.

LG05 One champagne type has base embossing indicating the manufacture: N & Co. It has side seams, and a rather pointed outside edge to the heel noted in some of the plain champagne types; the heel is then flat, before the high pushup with almost no marmelon. Often there are numbers also embossed on the base. Otherwise it is very similar in profile to the plainer champagne types. The full size bottles are about 30cm tall, base diameter 8.6cm

The embossing stands for Nuttall & Co., established at St. Helens, Lancs., England, in 1872: the founder, Francis Dixon, had been a glassmaker since the 1840s, and had added the name Nuttall in 1860 to comply with a bequest. The factory worked with tanks rather than pots, and by the turn of the century was large, with a total of 48 rings from 6 furnaces; but business declined between 1905–1914, though it installed some Kilner narrow-mouth machines. The first semi-automatic machines had just been installed when it became one of the four companies to form the United Glass Bottle Manufacturing Co., in 1913. N & Co bottles contained beer, ale, whisky, jams, pickles and other prepared foods, and have been found extensively in the American mining sites of the west. (Toulouse, pp 360-84). They have also been found in Central Australia, at the mining site of Arltunga.

The date range for the manufacture of such bottles is therefore 1872 to 1913.

Complete bottles from the Army collection:

2 bottles; 1 still with wire around the neck, embossed N & Co, and XCII; the other N & Co and 53.
complete bottles, or bases   part base
North seg. to 50cm       1
  "   50-70cm (2)     2
  "   100-130 (2)    1
  "   130-160 (2)    2

NW segment, middle      1 (with XII)
South segment   (1)      1
  "        (2)      1

LG06 Half-sized champagne type N & Co. embossed bottles. Usually 25cm tall, with a base approx. 7cm in diameter. As with the larger examples, the bottles show side and heel seams. As well as the letters, most examples have numbers embossed on the base. [Example illustrated, Figure 9]

Date of manufacture also between 1972 and 1913.

Complete examples from the Army collection:
  2. one is 25cm tall, also has 2012 on base; one is lighter green, 25.7cm tall, and has XVII.

North seg. 70-100cm (2) 1

Trench area           1
Figure 9 Top left, example of a champagne beer bottle, LG01; right an example of the half-size N & Co. type, LG06. Below left, the champagne beer base showing the remains of a label (from South-west (1), LG01).
WINES

LG07 Taller, slimmer bottles, often a paler green than the beers. Usually 37.6cm tall (though there are some variations), base diameter 6.8cm. As with modern wine bottles, the necks are similar in finish to the champagne beer types, though usually a little finer in general shape, with flat lip and string rim. No obvious side seams, the heel is flat before a medium, rounded pushup with a slight ridge (seam?) on inner side of heel. Some slight variation in size.

Complete bottles from the Army collection:

12 in all, 1 has possible signs of a paper label.

A number of medium pushup bases were noted, which could belong to the wine, or to other beer or spirit types:

| North seg to 50cm | 1 |
| "50-70(2) | 1. heavy 6.5cm, wide rounded heel |
| "70-100(1) | 1. heat affected |
| "70-100(2) | 2. smallish: 2 part base ditto |
| "100-130(1) | 1 part, 8cm, seam outside heel, med/low |
| "100-130(2) | 3 part bases (1 heat affected) |
| "130-160(1) | 1. inner circle, embossed 10 |
| North-west, mid. | 3 bases |
| "mid-top | 1 large base, sloping heel |
| "top | 1. thick heel, ridged |
| South-west (2) | 2 small, 3 part bases (one larger) |
| South seg. (2) | 1 small, central pimple |
NECKS ONLY - Beer or Wine

A number of green one part "champagne" finish necks were found, which could have come from beer or wine bottles.

<table>
<thead>
<tr>
<th>North seg. to 50cm</th>
<th>Count</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>50-70 (2)</td>
<td>7</td>
<td>+ 2 part necks</td>
</tr>
<tr>
<td>70-100 (1)</td>
<td>8</td>
<td></td>
</tr>
<tr>
<td>100-130 (2)</td>
<td>4</td>
<td></td>
</tr>
<tr>
<td>130-160 (1)</td>
<td>4</td>
<td>+ 1 half</td>
</tr>
<tr>
<td>130-160 (2)</td>
<td>5</td>
<td></td>
</tr>
<tr>
<td>160-180</td>
<td>1</td>
<td></td>
</tr>
</tbody>
</table>

North-west, mid.
<table>
<thead>
<tr>
<th>Top</th>
<th>Count</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>15</td>
<td>+ 1 half</td>
</tr>
</tbody>
</table>

West segment
<table>
<thead>
<tr>
<th>Count</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td></td>
</tr>
</tbody>
</table>

South-west seg.
<table>
<thead>
<tr>
<th>Count</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>(1)</td>
<td>2</td>
</tr>
<tr>
<td>(2)</td>
<td>1</td>
</tr>
</tbody>
</table>

South segment
<table>
<thead>
<tr>
<th>Count</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>(1)</td>
<td>4</td>
</tr>
<tr>
<td>(2)</td>
<td>4</td>
</tr>
<tr>
<td>(3)</td>
<td>4</td>
</tr>
</tbody>
</table>

South-east segment
<table>
<thead>
<tr>
<th>Count</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>noted</td>
</tr>
</tbody>
</table>

Gutter area
<table>
<thead>
<tr>
<th>Count</th>
</tr>
</thead>
<tbody>
<tr>
<td>5</td>
</tr>
</tbody>
</table>

Gutter-fence area
<table>
<thead>
<tr>
<th>Count</th>
</tr>
</thead>
<tbody>
<tr>
<td>14</td>
</tr>
</tbody>
</table>

Trench area
<table>
<thead>
<tr>
<th>Count</th>
</tr>
</thead>
<tbody>
<tr>
<td>10</td>
</tr>
</tbody>
</table>

Several amber necks, possibly from port or similar bottles, but showing the typical "champagne beer" finish, were found:

<table>
<thead>
<tr>
<th>North 50-70 (1)</th>
<th>Count</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>North-west mid-top</th>
<th>Count</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>2 necks, 1 light amber, 1 red amber</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>South-west (2)</th>
<th>Count</th>
<th>Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 red amber neck</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>


**BEER OR SPIRITS BOTTLES**

LG09 Beer or spirits bottle, with a two part finish, bulgy neck, rounded shoulders, straight body. Rounded heel, with inner ring, ridge or heavy seam, then medium pushup, rather pointed or conical in shape. Detailed measurements required, though bases vary between 7 and 8 cm.

<table>
<thead>
<tr>
<th>North seg. to 50cm</th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>&quot; 50-70cm</td>
<td>2 at 7.5</td>
<td>3 at 7.6cm</td>
<td></td>
</tr>
<tr>
<td>&quot; 70-100</td>
<td>2 at 7.1cm, 1 at 7.9cm</td>
<td>2 at 7.2cm</td>
<td></td>
</tr>
<tr>
<td>&quot; 100-130</td>
<td>1 at 7.6, 1 at 7cm, 1 part base</td>
<td>1 at 7.4cm</td>
<td></td>
</tr>
<tr>
<td>&quot; 130-160</td>
<td>4 bases, 1 part</td>
<td>1, and 1 part</td>
<td></td>
</tr>
<tr>
<td>&quot; 160-180</td>
<td>2 bases</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

| North-west, mid.            |               |               |               |
| " mid-top                   | 2 complete, 6 bases | 1 complete, 2 bases, 3 part bases |               |
| West segment                | 1 complete bottle |               |               |
| South-west seg. (1)         | 1 complete bottle, 1 base | 1 at 7.2cm, part base |               |
| " (2)                      |               |               |               |
| South segment (1)           | 1 complete bottle, 1 base | 1 base | 2 bases, 1 7.6cm (sl. different?) |
| " (2)                      |               |               |               |
| " (3)                      |               |               |               |
| Trench area                 | 1 at c.7cm    |               |               |
| Gutter-fence                | 1 part base   |               |               |

LG10 Similar bottle, but half size. Bases vary between 6 and 7cm in diameter.

| North, to 50cm              |               |               |               |
| " 50-70 (2)                 | 1 at 6.8cm    | 1 at 6.1cm    |               |
| " 70-100 (2)                | 1 at 6.4cm    | 1 at 6.5cm    |               |
| " 100-130 (1)               | 2 bases, and 1 part base | 1 base |               |
| " (2)                      |               |               |               |
| " 130-160 (2)               |               |               |               |
| North-west mid.             | 1 base        | 1 base        |               |
| " mid-top                  |               |               |               |
| South-west (2)              | 1 at 6.4cm    |               |               |
| South segment (1)           | 1 complete, 2 bases | 5 bases |               |
| " (2)                      |               |               |               |
One green bottle was noted, which could have contained spirits or lager? Typical beer lip, straight neck, rounded shoulders, lowish "pushup" with some embossing on the base — possible the letter H within a circle.

If the embossed letter is an H within a circle, it may be the mark of an Adelaide glassmaker, Gustav Hinrichson, between 1893 and 1907, when he operated his Adelaide Glass Works (Arnold 1985:35, Jensen 1984:8–9). Australian glassmakers are not well represented in the dump material, and although South Australia was the "mother" colony of the Territory, stores might well have been loaded from Melbourne, Sydney or Queensland en route to the Top End. The mark identification is not definite, and should be treated with caution. The bottles recorded from the army collection were only roughly cleaned, and with little time for detailed recording, mistakes could have been made.

Army collection 1
SPIRITS.

GIN BOTTLES

LG08 Green, square Dutch gin bottle fragments were found, but no complete bottles. Most seem to be from the A van Hoboken company of the Netherlands. The necks are either the flat, narrow flanged or the deeper down-tooled one piece finish, with short necks to high, rounded shoulders. Shoulder seals are common with this type of gin bottle. The body of the bottle is tapered, with one or more panels embossed with lettering - A. van Hoboken, Rotterdam, in capitals. The base has chamfered corners, a flat, broad heel, and small, low pushup, sometimes embossed with numbers; approx. 8.6cm square. [Square green base illustrated, Fig.10 p.32]

Anthony van Hoboken began his company in 1774, and from 1790 became Hoboken de Bie & Co., and making gin. The shoulder seal was in use from at least 1848 until about 1897. Toulouse suggests that a bottle with the narrow flanged neck and with the full name and city on the body dates between 1897 and c. 1910, when machine made bottles with the broader, downtooled lip became more common - though such bottles may well have been made from about 1900 or even earlier. (Toulouse, 250-251).

Other Dutch gin bottles have been found in Australia, but all the embossed fragments found at this site appear to be from Hoboken. (Not all the plain body fragments have been listed).

Date of manufacture is possibly between 1897 and c.1910

| North seg. to 50cm | 1 plain base, 1 embossed A 3 flanged necks 3 embossed body fragments 2 AH seals |
| " " 50-70 (1) | 1 plain base |
| " " 70-100 (1) | 1 part plain base |
| " 100-130 (1) | 1 plain base |
| " 130-160 (1) | 1 flanged neck |
| " 160-180 | 1 plain base 1 embossed 8 |
| North-west, mid | 1 part base or body fr. 1 flanged neck |
| " mid-top | 2 plain bases, 2 embossed 8 & 7 4 flanged necks |
" top

Trench area

Gutter

Gutter-fence

WHISKY OR RUM

LG13 Rather more squat bottle. olive green to amber in colour, with two part finish, bulgy neck and rounded shoulders. Made in three piece mould, with seam below shoulders also embossed GAELIC WHISKY. Base has rounded heel to very slightly incurving pushup.

From the Army collection:

   1 embossed Gaelic Whisky.
   1 similar, no shoulder embossing
   1 similar in shape, no embossing, base has outer seam, and inner circle/seam.
   1 similar except that the lip appears to be unfinished, with a narrow rounded trail or string rim. Plain? seal on shoulder, and base has medium pushup, seam inside heel.

Possibly from a similar bottle:

Trench area 1, neck missing, medium pushup and 3 piece body mould; no sign of shoulder embossing

LG12 Green to olive green bottles, with two part spirit finish, and embossed on the low pushup 6 TO THE GALLON. Bottles of this type found at other sites have been brown in colour, 30.5cm tall, base diameter 7.2cm. The base has a slightly chamfered heel which curves to a medium/low pushup; the embossed lettering is found within two circles or seams, and there is a small raised dot in the centre. [Example illustrated, Fig.10]

North seg. to 50cm 1 part base

North-west mid-top 1 base
The clear glass bottle parts are harder to categorise, as few have really helpful embossing. However, it is less likely that the two part finishes would have contained beer of any sort, as this was universally found in green or amber bottles. In this instance the difficulty is choosing between spirits, sauces, or mineral water bottles. However, there are some probable spirit bases.

LG17 Clear, apparently square base approximately 7.7cm, with chamfered corners, broad flat heel and small central circular indentation. Some examples include part of the body with embossing.

| North to 50cm | 1 part base, body + embossing
| " 50-70 (1) | 1 part base
| " 130-160(1) | 1 base
| " 160-180 | 1 part base
| NW segment mid. | 1 base
| South segment (2) | 1 base

LG21 Some clear bases with a high "champagne" pushup were found, and these may have contained brandy. One such bottle, 29.8cm tall with a base of 7.6cm diameter, and the body etched with the words Chateau Tanunda, has been found at the Arltunga site. It seems probable that a clear brandy bottle was in use in the late 19th or early 20th century.

| North, 50-70(1) | 1 part, but possibly only c. 4.5cm diam.
| " 70-100(1) | 1 part
| South-west seg. (2) | 1 base
| Gutter | 1 small base

Some clear "champagne" necks were found:

| North to 50cm | 1 neck
| North-west mid-top | 1 neck
| South seg. (2) | 1 neck
| " (3) | 1 neck
Two bases with only a medium pushup were found:

- North 100-130(1) 1 part base
- Gutter-fence 1 base

A number of amber-coloured bases were found; these are more likely to have held spirits or fortified wines such as sherry or port. All the bases are plain.

- North, 50-70 (1) 1 base, 7.7cm low pushup
- " 100-130(2) 1 red amber pt. base, c. 6.1cm d. seam outside heel, medium-low pushup, central pimple
- " 130-150 (1) 1 amber base, medium pushup rather pointy

- North-west mid-top 1, broad flat heel, low indentation
  1 part base, smaller
  1 small base, medium pushup, heat aff.

- Trench 1 part base, 7.5cm
  1 base, and 1 part base, c.6cm

Numerous clear one or two-part finish necks, either associated with spirits, or possibly mineral water bottles, were found. [Examples of one and two-part lips illustrated Fig. 10]

<table>
<thead>
<tr>
<th>Two part finish</th>
<th>One part finish</th>
</tr>
</thead>
<tbody>
<tr>
<td>North to 50cm</td>
<td></td>
</tr>
<tr>
<td>&quot; 50-70 (1)</td>
<td>1 (long, straight neck)</td>
</tr>
<tr>
<td>&quot; (2)</td>
<td></td>
</tr>
<tr>
<td>&quot; 70-100 (2)</td>
<td>1</td>
</tr>
<tr>
<td>&quot; 100-130(1)</td>
<td>1</td>
</tr>
<tr>
<td>&quot; (2)</td>
<td>2</td>
</tr>
<tr>
<td>&quot; 130-160(1)</td>
<td>1 part</td>
</tr>
<tr>
<td>&quot; (2)</td>
<td>5</td>
</tr>
<tr>
<td>&quot; 160-180</td>
<td>2</td>
</tr>
<tr>
<td>North-west mid.</td>
<td></td>
</tr>
<tr>
<td>&quot; mid-top</td>
<td>6</td>
</tr>
<tr>
<td>&quot; 3</td>
<td></td>
</tr>
<tr>
<td>&quot; (2 with bulgy necks)</td>
<td></td>
</tr>
<tr>
<td>South-west (2)</td>
<td>1</td>
</tr>
<tr>
<td>South seg. (2)</td>
<td>1 (pale green)</td>
</tr>
<tr>
<td>Area</td>
<td>Spirits Necks</td>
</tr>
<tr>
<td>------------------</td>
<td>---------------</td>
</tr>
<tr>
<td>Trench area</td>
<td>two part</td>
</tr>
<tr>
<td>North 50-70(1)</td>
<td>flat, 3 rounded</td>
</tr>
<tr>
<td>&quot;</td>
<td>unusual bright green neck</td>
</tr>
<tr>
<td>&quot;</td>
<td>70-100(1)</td>
</tr>
<tr>
<td>&quot;</td>
<td>(2)</td>
</tr>
<tr>
<td>&quot;</td>
<td>100-130(1)</td>
</tr>
<tr>
<td>South-east</td>
<td></td>
</tr>
<tr>
<td>Amber glass necks</td>
<td></td>
</tr>
<tr>
<td>North 70-100(1)</td>
<td>pr. neck</td>
</tr>
<tr>
<td>North-west top</td>
<td>2pt spirit neck</td>
</tr>
<tr>
<td>South-west (2)</td>
<td>light amber 2 pt neck</td>
</tr>
<tr>
<td>South (1)</td>
<td>2 part finish, long flared neck</td>
</tr>
<tr>
<td>Trench area</td>
<td>sp neck</td>
</tr>
<tr>
<td>Gutter-fence</td>
<td>half neck, 1 part finish</td>
</tr>
</tbody>
</table>

There are some 31 full size, and 9 half size spirits (or beer) bottles, collected by the army, most of which need more complete recording.
Figure 10 Left, example of LG12 type; above right an example of square green base similar to LG08 gin bottles; bottom right variations in spirits necks, one and two part lips, bulgy and flared necks.
MINERAL, SODA OR AERATED WATER BOTTLES

Natural mineral waters had been known for their medicinal qualities for many centuries in Europe, but became particularly popular in the 18th century. By the end of that century, experiments on gas led to the production of artificial mineral water - the first British factory, in Manchester, was established in 1777. Jean-Jacob Schweppes, a Swiss, set up his London factory in the 1790s. In the early days of bottling both natural and artificial mineral water, stoneware bottles were used, but glass, and usually clear glass, soon took over. (Stockton 1981:122-123, 127-130, Douglas & Franks 1972:169, Arnold 1985:83-84). Stockton (p. 127-128) says that it was Schweppes who first used the egg shaped bottle which had to be kept on its side (thus keeping the cork damp and preventing the escape of gas.) Schweppes may have used the bottle from the 1780s, but this shaped bottle, with its one piece, round - or blob top - finish is usually referred to as a Hamilton bottle. William Hamilton, of Dublin, took out a patent in 1809 for preparing mineral waters, and again in 1814 which this time referred to the use of the egg shaped bottle. Mineral waters became very popular from the 1830s, especially after the introduction of various flavourings - the name "pop" came from the noise made when extracting the cork, apparently first so described in 1812 (Vader & Murray 1979:29). "The golden age of the aerated water bottle began with the worldwide prosperity boom during the second half of Queen Victoria's reign. ... not only in Britain but throughout the Empire and the western world. ..." (Vader & Murray 1979:16).

Despite the difficulties in using the Hamilton bottle, it remained popular until the end of the 19th century. It was then replaced with a flat-based variation, first made in the 1870s and possibly used with an internal screw stopper from 1872. (Stockton, op cit, Douglas & Franks, op cit, Fletcher, 1979:49)

Other soda bottles were more usually cylindrical in shape, though the blob top seems to have been the most popular finish. In 1872 Hiram Codd patented his unusual bottle with a dimpled neck and ingenious method of using a marble to keep the gas in. This was particularly popular until about World War I, though Douglas & Franks (op cit) and Vader & Murray (p.27) say it is still in use in the Asia/Pacific area. Codd entered into a partnership with a Yorkshire glassmaker, Ben Rylands, in 1876 and then briefly with Ben's son Dan, during and after which all three made improvements and variations to the original patent. As there were problems with the bottles being returned to their proper owner, Dan Rylands introduced coloured lips from 1887, and other manufacturers began using amber, green and blue glass for their own bottles. (Fletcher 1976:46-48).

An internal screw stopper was patented by Henry Barrett from 1872, and a ceramic and wire swing, or Lightning stopper was patented by Charles de Quillfeldt in New York in 1875. This stopper had a heavy wire attachment, which would leave two small indentations on either side of the neck, either on or just below the finish. This seems to have been less popular in England and
Australia (Stockton, 1981:131 & 138, Arnold, 1987:54). A plainer stopper, the Hutchinson was patented in 1879, and used an internal wire, rubber and metal cap (Vader & Murray, 32-33). The crown seal, patented in 1892, became popular for beers and pop bottles particularly after World War I.

A particularly popular bottle in Australia was the so-called Maugham's bottle. This was a narrow bottle, possibly a variation on the Hamilton, still with a rounded base but easier to stand upright during use. It is known from embossing on many examples, Maugham's Patent Carrara Water — which actually refers to the contents, and not the bottle (Fletcher, 1975:72). The bottle has been found in the drier areas of Australia: around Broken Hill, and in South Australia. (Vader & Murray p.33).

LG14 Clear, or aqua tinged Hamilton or torpedo bottles, or fragments were numerous. Approximately 24.6cm tall, they have a pointed base, and one part or blob top finish. Because of the base, they had to be laid on their sides, keeping the cork moist, and the contents aerated. The bottles could be plain, or embossed; many of the bases found in the dump have Chinese lettering.

From the Army collection (LR) 1 bottle

(the recording of some of the Army collection seems to have been lost, and needs rechecking)

North seg. to 50cm

1 embossed base, Chinese ? lettering and ...Tson & Co, Hong Kong & Manila
1 part base with a K inside a circle near base
5 plain bases
1 neck
3 bases (1 may be embossed)
2 necks

" 50-70 (1)
" " 70-100 (1)
" " 100-130 (1)
" " 130-160 (1) (Illustrated, Fig.11 p.39)
1 almost complete bottle (base missing)

1 plain base
1 neck
1 part plain base
1 neck

" 160-180
2 plain bases
<table>
<thead>
<tr>
<th>Location</th>
<th>Fragments/Parts</th>
</tr>
</thead>
<tbody>
<tr>
<td>North-west, mid.</td>
<td>3 embossed fragments 10 bases 14 necks</td>
</tr>
<tr>
<td>&quot; mid-top</td>
<td>5 plain bases 5 necks</td>
</tr>
<tr>
<td>&quot; top</td>
<td>3 part plain bases 7 necks</td>
</tr>
<tr>
<td>West segment</td>
<td>1 base, Trade Mark CB 'Orange' Barrett Registered</td>
</tr>
<tr>
<td></td>
<td>1 base, Melbourne 1 embossed base 2 plain bases</td>
</tr>
<tr>
<td>South-west (2)</td>
<td>2 plain bases</td>
</tr>
<tr>
<td>South segment (1)</td>
<td>1 neck 1 plain base 1 neck</td>
</tr>
<tr>
<td>(3)</td>
<td></td>
</tr>
<tr>
<td>South-east</td>
<td>1 base fr.</td>
</tr>
<tr>
<td>Large hole</td>
<td>1 base, P &amp; Co Ltd, part trademark, Bombay; [illustrated Fig.11]</td>
</tr>
<tr>
<td></td>
<td>1 plain base 1 body fr. embossed BOMBAY 2 necks</td>
</tr>
<tr>
<td>Trench</td>
<td>1 part base, Chinese lettering? [illustrated, Fig.11] 5 plain bases 1 neck</td>
</tr>
<tr>
<td>Gutter</td>
<td>2 necks</td>
</tr>
<tr>
<td>Gutter-fence</td>
<td>2 embossed body fragments 1 plain base 4 necks</td>
</tr>
</tbody>
</table>

LG19 Green Hamilton, or torpedo bottle, 23.3cm tall. The body has embossed lettering, DAKIN BROTHERS LIMITED in an oval shape, and across the middle OF CHINA.

It has not been possible to research this company as yet, but the connection with China is very interesting.

From Army collection (LR) 1
There are two bottles, the Codd's, and the Maughams, which may have been confused. At the time of recording, there was little time for sorting and researching these bottles, and the discovery since the field season of an almost complete Codd's bottle means that all the bases need re-assessment.

LG15 Clear to aqua bottle, lip missing but showing the heavy dimpled Codd's neck. Base is 6.6cm diameter, with very rounded heel, seam on inner edge, and shallow indentation. The body is embossed SINGAPORE & STRAITS, trademark of 2 shields and lion, AERATED WATER LTD, and WM BA...RD/ & SONS/ LONDON. [Illustrated, Fig. 12 p.40]

While the Codd bottle was extremely popular in England in the 19th century, it is possible that they continued to be made in the Asia/Pacific area up to the present time. As this example shows connection both to London and Singapore, the actual site of its manufacture could be either place.

This particular incomplete bottle was apparently found after the small excavation in August, and is with the collection held by the National Trust.

Army collection 1 incomplete bottle

A number of similar bases were noted during fieldwork, possibly from Codd's, or Maugham bottles.

North to 50cm 1 base, body has ...NDS.. /...WTS. & 2 base parts, possibly Adelaide? 1 base, part body, apparently plain

" 50-70 (1) South seg. (3) 1 base, with 3 and 5

" 50-70 (1) Trench area 1 part, v. rounded heel, body embossing 1 possible, body lettering STRAITS, etc

" 100-130 (2) The Codd's patent necks were much easier to identify:

North to 50cm 1 part

" 50-70 (2) 1 part neck and body, emb. ..edw..

" 100-130 (2) South segment (1)
A number of small green bottles were found; these could have contained spirits, or aerated waters:

LG11 Half-size green bottle, with one part finish, 22.7cm tall, base 6.5cm. Made in a three piece mould, so showing a seam around the shoulder, and up the neck. The heel is rounded, with inner ridge or seam before low indentation embossed with letters LBS, a central pimple, and a number, usually 6, 7 or 8.

Unfortunately, Toulouse has not been able to identify the manufacturer, but suggests a date of about 1880-1900 (p. 321-322). As American examples have been found with teardrops also embossed on the base, Toulouse suggests they may be of English manufacture, as N & Co bases can also have the teardrop.

<table>
<thead>
<tr>
<th>Collection</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Army collection</td>
<td>2 complete, 1 with 6, 1 with 8</td>
</tr>
<tr>
<td>North seg. 130-160 (2)</td>
<td>1, with 7 (6.5cm) [Illustrated, Fig.12]</td>
</tr>
<tr>
<td>&quot; 160-180</td>
<td>1, with 15</td>
</tr>
<tr>
<td>North-west seg. mid.</td>
<td>1, with 7</td>
</tr>
<tr>
<td>&quot; mid to top</td>
<td>1 complete, 7; 1 base</td>
</tr>
<tr>
<td>&quot; top</td>
<td>1, with 2</td>
</tr>
<tr>
<td>West segment</td>
<td>3, 2 complete with 7, 1 base with 6</td>
</tr>
<tr>
<td>South-west segment</td>
<td>1 complete, with 7</td>
</tr>
<tr>
<td>South segment (1)</td>
<td>1 base, with 7</td>
</tr>
<tr>
<td>&quot; (2)</td>
<td>1 ditto</td>
</tr>
<tr>
<td>&quot; (3)</td>
<td>1 with 6</td>
</tr>
<tr>
<td>Trench</td>
<td>1 base</td>
</tr>
</tbody>
</table>

LG22 Small, possible soda bottles, approx. 23.7cm tall, with one piece finish rounded in profile - commonly known as "blob" tops. No obvious sideseams, base 6.3cm; heavy seam outside the heel which is narrow then slopes to a lowish "pushup" with a flat central section with a circle. (LG04, a small beer, has a similar base profile).

<table>
<thead>
<tr>
<th>Collection</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Army collection</td>
<td>4 complete</td>
</tr>
<tr>
<td>North-west. mid.</td>
<td>1 complete</td>
</tr>
<tr>
<td>South-east segment</td>
<td>1 complete</td>
</tr>
</tbody>
</table>
Possible bases:

<table>
<thead>
<tr>
<th>Segment</th>
<th>Possible bases</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>North seg. 130-160 (1)</td>
<td>1 base</td>
<td>1 complete, 23.3x6.4cm, 2 bases</td>
</tr>
<tr>
<td></td>
<td>&quot;</td>
<td>160-160</td>
</tr>
<tr>
<td></td>
<td>(2)</td>
<td>2 bases, one heat affected</td>
</tr>
</tbody>
</table>

Similar necks:

<table>
<thead>
<tr>
<th>Segment</th>
<th>Possible bases</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>North seg. 50-70 (2)</td>
<td>1 part</td>
<td></td>
</tr>
<tr>
<td></td>
<td>&quot;</td>
<td>70-100 (1)</td>
</tr>
<tr>
<td></td>
<td>North-west seg. mid.</td>
<td>4</td>
</tr>
<tr>
<td></td>
<td>&quot; mid-top</td>
<td>1 light green</td>
</tr>
<tr>
<td></td>
<td>&quot; top</td>
<td>2</td>
</tr>
<tr>
<td>South segment (1)</td>
<td>1, to shoulders</td>
<td></td>
</tr>
<tr>
<td></td>
<td>(2)</td>
<td>2, one has 2 tiny but deep circles on opposite sides, just below finish.</td>
</tr>
</tbody>
</table>

Gutter-fence

LG20 Possible soda bottle. Green. 26.5cm tall, with narrow base only 5.5cm, with seam outside narrow rounded heel and inner seam before central low indentation and central pimple. The body tapers outwards to rounded shoulders (approx. 7.8cm diam.). Side seams continue up the short neck, then hand applied one part finish with flat profile. 2.8-2.1cm diam.

Army collection (LR) 1 complete

Possibly similar bases:

<table>
<thead>
<tr>
<th>Segment</th>
<th>Possible bases</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>South (3)</td>
<td>2 bases, only c. 4.6cm diam.</td>
<td></td>
</tr>
</tbody>
</table>
Figure 11 LG14 variations: top, almost complete plain Hamilton bottle; bottom left, base with Chinese lettering, right the part bottle from Bombay.
Figure 12 Top, LG15, the Codd's bottle, almost complete; below the LG11 small bottle type.
Some complete green bottles of uncertain use require further analysis:

2 part finish, low pushup: N to 180
NW mid has 2
ditto, medium pushup    West
NW mid 1 small, + 2

A number of green bases were noted that could have contained spirits, or aerated waters. In view of the time limitation, these have simply been listed.

One base was found with embossing which indicates the manufacturer:

North-west mid-top 1 small base, embossed C S & Co. and 16. The letters indicate manufacture by Cannington, Shaw & Co., an English firm formed in 1875 when Edwin Cannington and John Shaw set up their factory at St Helens, a major glass making centre near Liverpool. This was one of several firms (including Nuttall & Co) to form United Glass in 1913, at which time the base embossings would have been changed. Contents unknown. (Toulouse 147-150).

North to 50cm 1, 6.9cm; 1, 7.6cm; 1, 5.9cm flat centre; ditto, 6.5cm
  " 50-70(1) 1, 6.5, central teardrop and 9 ?
  "  " (2) 1 small bottle sans neck, 7cm
  1. c. 8.2cm, rounded heel, internal circle, and central dot
  1. ditto but only 7cm
  1, lowish pushup, 6cm diam heavy heel seam
  1 part base, larger type
  " 70-100(1) 1, 7.89cm, rounded pushup
  " 70-100 (2) 2 small 6.5cm
  " 70-100 (2) 2 half bases
  1 small, 6.8cm, very low, teardrop and 622
  1, 6.8cm rounded heel
  " 100-130(1) 1 part, c. 8cm
  1. embossed N or Z, central pimple
  1 small, part, flat heel, sl. indentat.
  " 100-130(2) 1 part small base
  1 pale green very small base, 4.5cm, flat heel
  " 130-160(1) 3 part bases
"130-160(2) 2 bases, 7.8cm, rounded heel
1, 6.5cm, central teardrop and 8
1 base, 5.9cm, central pimple
4 part bases

"160-180 2, and 1 part base, rounded heel

North-w, mid. 1, central circle and Q10
1, ditto but with BS1
1, with SC ?
1, with B 5
3 small bases
3 with wider heel
1 with ridged base
3 part bases
NW mid-top 1 small, with Z, or N, or 1.
1 small, with 770
1 part, L or 7 and 5
NW, top 1 small, embossed 10
3 bases, embossed

West 1 base

South-west(1) 1, heat affected, only 4.6cm
" (2) 2, c. 6.8cm, rounded heel, 1 with teardrop and 622

South (2) 1, 7.7cm (similar unusual beers?)
" (3) 2 bases, 1 small base, 1 part base

Trench 1 c. 7cm, 1 6cm, 1 part base
Gutter 1 part, 8.3cm
2 c. 6cm
Gutter-fence 1 at c. 8cm; 2 part small bases
SAUCE/PICKLES

The main difference between these two types of bottles, or their contents, is that sauces come in long, narrow necked and occasionally unusual shaped bottles, while pickles are more likely to have come from plainer, wide mouthed bottles. Of all the possible sauce/pickle bottles, only one has been identified, the Lea & Perrins Worcester Sauce Bottle.

LG18 Small clear bottle, cm tall, base diameter 6.4cm for the larger size, 5.1cm for smaller. The long, narrow neck has a three part finish with internal ledge (for holding the glass stopper). Embossing around the rounded shoulders—Worcester Sauce, while up one side of the body is Lea & Perrins. Seam above the heel, which is flat and narrow to a low even indentation embossed either with A C (or G) B Co, or with a K and some numbers. [Typical neck illustrated, Fig.13 p.47]

Lea & Perrins, Worcester chemists, were asked to prepare a sauce for an ex-governor of Bengal in 1835 (SA ABS, 1982:8–9; Stockton 1981:64). While the first efforts were disappointing, the matured sauce was found to be wonderful, and was commercially produced from 1837. It was introduced to Australia by the 1860s.

The A G B Co may stand for the Albion Glass Bottle Company, operating from about 1880; a more modern Albion Glass Co. was associated with the HP Sauce group in the 1930s which suggests a possible connection back to the Lea & Perrin bottle (Toulouse, 19:38–39). Other possibilities are the Aire & Calder Bottle Co., or possibly A C Bagley & Co. The Bagley family were associated with glassworks from 1827, but base markings seem to have been B & Co (Stockton 1981:64, Toulouse, 1971:77–78). The use of the K letter might suggest manufacture by the Kinghorn Bottle Co. of Scotland, who used the initial K from 1907 to 1920 (Toulouse 1971:299). However, a Scottish maker for the bottles seems less likely, given the numerous English glassmakers available.

Army collection 4 bottles, only one embossed K

North to 50cm
" 50-70 (1)
" 70-100(1)
" 130-160(2)
" 160-180

North-west mid.
" mid-top
South (1)  
" (3)  
1 base, AGBCo  
1 base, AGBCo, 6.6cm diam; 1 part base  
1 neck  
1 stopper  

South-east  
1 stopper  

Trench area  
4 complete, 1 base  
1 neck  

Other complete bottles:  
Possible sauce bottle, clear glass, 19.4cm tall, base c. 6.3x 4cm, octagonal body (could also be a pharmacy bottle?). Two part finish neck with internal ledge, long and slightly flaring neck.  
Army collection 1  

Ditto, either sauce or pharmacy bottle, 20cm tall, octagonal body and base 6.2 x 3.3cm. Three part finish with internal ledge.  
Army collection 1  

Ditto, either sauce or pharmacy type, 14cm tall, base 3.9cm. Two part finish, 1.8-1.1cm, then the unusual feature is a bulgy neck - so it could be a small spirits bottle. The heel is very flat, and base only slightly indented.  
Army collection 1  

One small bottle, 20cm tall, base c. 5.5cm and embossed P 1. One part finish, slightly flaring neck to rounded shoulders.  
Army collection  

(Note that other bottles in the Army collection need re-checking, as there was a problem with recording)
Clear bottle, 17.8cm tall, base 4.8cm, embossed L? 4647. One part finish and long narrow neck.

South (1) 1

Probable sauce bottle fragments were found:

North to 50cm
2 part finish, long neck, two neck rings, diagonal ridging on top of body; now 8cm long
Possibly from the above – base and body, 4.6cm diam., now 18.2cm tall, diagonal ridging on body, one panel left plain. [Illustrated, Fig.13]
50-70 (1) body fragment Champion's Vinegar? [Example of base shown in Fig.13]
small base, 5.2cm diam, slightly indented and embossed 10.

100-130(1) 1 base, 5cm, similar Lea & Perrins but plain
100-130(2) 1 base, 4.3cm, body has circles and vertical ridging

130-160(1) 2 part finish, internal ledge, long neck
130-160(2) part base, c. 7cm, body has raised triangles

South (2) 2 part finish, internal ledge with 3 neck rings near base of neck.

Gutter-fence 2 part finish, internal ledge neck

Pickles and chutneys usually came in plainer bottles or jars, with wider mouths.

1 large bottle, 28cm tall, base 7.5cm. Two part finish, straight neck and rounded shoulders, seams on body; base embossed 1988.

Army collection
1 large bottle or jar, 28cm tall, base c.7 cm. Two piece finish, short neck to sloping shoulders.

Army collection

1 bottle or jar, affected by heat. Base embossed Registered, with central triangle enclosing 10 and 5, and No. 78933. Short neck with collar before slightly rounded shoulders.

Army collection

Numerous wide-mouthed neck fragments were found, and an example of a one piece wide-mouthed bottle is shown in Figure 13.

North to 50cm

| 50-70 (1) | 1, 4.9-3.9cm d., 5cm to shoulders |
| 50-70 (2) | 1, 2 part finish |
| 70-100 (1) | 1, two part finish, internal ledge |
| 70-100 (2) | 1 part neck, 4-3.4cm d. |
| 100-130 (1) | 1, 1 part finish, 4.5cm |
| 100-130 (2) | 1, ditto, 3.4cm d. |
| 130-160 (1) | 1, 2 part finish and long neck |

North-west mid.

| 100-130 (1) | 1, 1 part finish, c.4cm d. |
| 100-130 (2) | 1 part neck, 1 part finish |
| 100-130 (3) | 2 part necks |

North-west mid-top

| 100-130 (2) | 1 part neck, 1 part finish |
| 130-160 (1) | 2, one part finish |
| 130-160 (2) | 3 fr. 1 part finish neck |

Top

| 100-130 (1) | 1 part neck |
| 100-130 (2) | 1 part neck, 2 part finish |

South-west (2)

| 100-130 (1) | 1 almost complete bottle, widemouthed but neck now missing, hexagonal shaped body. |

South (1)

| 100-130 (2) | 1, 1 part finish, longish neck |
Figure 13 Top left, the probable sauce bottle from North to 50; top right a typical Lea & Perrins neck, LG18; bottom left, an example of a Champion's Vinegar base, and right, example of wide-mouthed neck.
PHARMACY

There are numerous pharmacy bottles, or parts of bottles, but very few that can be classed as particular types for which many examples were found. Some of the bottles also may have been perfume bottles, as some of these can be identified by body lettering, or more unusual shapes. Pharmacy bottles are usually quite small, round, rectangular or square, with a simple one piece finish. Some unusual glass items, such as clear glass rods and narrow straight-sided vessels have been included in this group.

LG16 One of the most common, identifiable bottle are the tiny probable opium phials. These are very small, with an apparently unfinished neck without a lip, and only c. 5cm tall. [Two are illustrated, showing variations in thickness of body. Fig.15 p.53 - drawn full size].

<table>
<thead>
<tr>
<th>Army collection (LR)</th>
<th>1</th>
</tr>
</thead>
<tbody>
<tr>
<td>Army collection</td>
<td>2 [found later, one illustrated]</td>
</tr>
<tr>
<td>North</td>
<td>1</td>
</tr>
<tr>
<td>70-100 (1)</td>
<td>1</td>
</tr>
<tr>
<td>&quot; 130-160 (1)</td>
<td>1 [illustrated]</td>
</tr>
<tr>
<td>&quot; 160-180</td>
<td>1</td>
</tr>
<tr>
<td>North-west mid-top</td>
<td>2 (heat affected)</td>
</tr>
<tr>
<td>&quot; top</td>
<td>1</td>
</tr>
<tr>
<td>South seg. (1)</td>
<td>1</td>
</tr>
<tr>
<td>(3)</td>
<td>1</td>
</tr>
</tbody>
</table>

Some necks, showing the Davis finish, were recorded, though none of the embossed body, or identifiable bases for the Perry Davis patent medicine have been recorded. The two part finish has a flat lip with rounded profile, and downtooled string rim; the neck is usually quite long for a pharmacy bottle. At least two different sizes were noted. The Perry Davis patent medicine, a Vegetable Painkiller, was manufactured from 1840 (Munsey 1971:67-68); other bottles may also have used the finish in the late 19th and early 20th centuries (Parks Canada 1985:79). [A Perry Davis bottle is illustrated, fig.15]

South segment (3) 1 small neck
Gutter-fence 1 small neck
A number of complete bottles were found with some body or other embossing to suggest manufacturer, or contents:

Complete Eno's Fruit Salts bottle. Rather larger than most pharmacy types, and with a different neck. It is 17.4cm tall, with a one part widemouthed neck, 3.6-3.1cm diameter; short neck to sloping shoulders. The body is either a rectangle with highly chamfered corners, or octagonal in shape. The embossing is on one of the larger flat sides. The plain base has a flat heel and an oval shaped central depression.

Army collection (LR) 1

Complete Eucalyptus Oil bottle, approx. 13.5cm tall, with usual pharmacy neck. Body oval in shape with one indented panel embossed as above. Base 5 x 3 cm. [An example of a Faulding's Eucalyptus Oil bottle is shown in Fig.15 illustrating the usual shape of such bottles, and the typical pharmacy neck]

Army collection 1

Complete round bottle, 10.9cm tall, base diameter 2.4cm. Possibly made in a 3 piece mould; body embossing POWELL and BLACKFRIARS ROAD.

Army collection 1

Gutter-fence 1

Small round bottle embossed Bunter's Nervine on body

North-west segment, mid-top 1
One body only, rectangular, with body panels embossed (but heat affected) has MES CROSS and Digestion Drops.

Charles Cross was a chemist's assistant in 1873-4, and eventually established himself as a manufacturing chemist in King William Street, Adelaide between 1892 and at least 1904 (AHBC, vol 7 1979, Sands & McDougall directories).

Northwest, mid-top 1 incomplete body

One very unusual possible pharmacy bottle has been found. It is approx. 16.1cm tall, base 2.5cm, with seam outside heel and up the body which is some 12.8cm tall. It then narrows into a short neck, but then widens out again into a rather bulbous bubble, and narrows back to a neck with no applied finish. It would appear to be pharmaceutical, though it seems large to contain drugs.

Army collection 1

Small, unembossed pharmacy bottles.

From Army

1, 8cm tall, base 3.8cm almost flat base with embossed star; no obvious seams.
1, same size, more rounded base with 897 embossed; seam outside heel.
1, 9.5cm tall, c.2.5cm diam., made in 3 piece mould (seams on neck and around shoulder)
1, 6.4cm tall, base 2.8cm
1, rectangular, 16.4cm tall, base 6.1x3.6cm
1, ditto, 9cm tall, base 3.7x2.5cm; plain apart from a shoulder ridge, and sunray on base.
1, ditto, 4.5cm tall, base 2x1.3cm, but instead of usual neck, has been cracked off with no finish.

North 70-100 (1)

1, square, 5.5cm tall, base 2.2cmsq.
1 small dark blue bottle (castor oil?)

North-west mid.

2 small round

Gutter-fence

1 round, 5.9cm tall, 1.9cm base embossed 10?
There are in addition a number of bases and necks that appear to be from pharmacy bottles. However, it is also possible that some, particular the bases, may also be perfume, or small sauce or pickle bottles.

<table>
<thead>
<tr>
<th>North 50-70 (1)</th>
<th>North-west, mid.</th>
<th>South-west (1)</th>
<th>South (1)</th>
<th>South-east</th>
<th>Trench area</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 part oct. base</td>
<td>1 small oval base; 1 small square base</td>
<td>2 necks</td>
<td>1 small dark blue base</td>
<td>1 oct. part base, embossed 667</td>
<td>1 rect, base R T &amp; Co?</td>
</tr>
<tr>
<td>1 oct. base, plain, 5.7 x 4.2cm</td>
<td>9 necks, 1 with internal ledge for stopper</td>
<td>1 neck</td>
<td>1 small dark blue base</td>
<td>1 plain oct. base</td>
<td>1 oct. 5x3.05, ht to sh 10.6</td>
</tr>
<tr>
<td>1 neck</td>
<td>1 plain base; 1 part base or body</td>
<td>1 neck</td>
<td>1 neck</td>
<td>1 smaller plain oct. base</td>
<td></td>
</tr>
<tr>
<td></td>
<td>1 heavily ridged body fr. - poison?</td>
<td></td>
<td></td>
<td>1 blue castor oil neck</td>
<td></td>
</tr>
<tr>
<td></td>
<td>1 blue part neck, castor oil?</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>2 necks</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>1 small oval base - poison?</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>5 necks: 1 two part neck</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Unusual glass, probably pharmaceutical in use:

<table>
<thead>
<tr>
<th>North 70-100 (2)</th>
<th>Large hole</th>
<th>Gutter/fence area</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 v. tall, ? narrow – 2.5cm d, now 9cm tall and no sign of shoulders – large tubing?</td>
<td>1 very tall narrow bottle? or glass tube – no base or neck</td>
<td>1 part clear glass rod</td>
</tr>
<tr>
<td>[Illustrated, Fig.14]</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
A number of fragments of blue glass were found, which probably fit into the pharmacy or perfume section.

North 50-70 (2)  3 fr., vertical ridging and ...E
North-west, mid  1 fr., perfume bottle?
               1 fr., rippled curved
               1 part base
Gutter area  1 body fr.
Gutter/fence  2 heat affected

Three bottles, or bases, could be either pharmacy or sauce bottles:

Octagonal body, plain pharmacy neck; body embossed C & B, and the base embossed KL or KE.

The C & B could indicate a connection with Crosse & Blackwell, though the body embossing might be unusual. Edmund Crosse and Thomas Blackwell formed their company in 1830, and became a very well known London retailer of fine foods during the 19th century. They used a number of glassmakers, including John Kilner, but all the embossed letters have yet to be positively identified (Stockton 1981:65, Toulouse p 113-114, 278-279, 302-303).

North to 50cm  1 base only
South-west (1)  1 bottle, missing only the lip and part neck [Illustrated, Fig.15]
Large hole       1 complete bottle
Figure: Top left, the opium phials [NB drawn at full scale], top right the tubing? from North 70-100; bottom left an example of a Eucalyptus Oil bottle, and right an example of a Perry Davis bottle.
Figure 15 Top, the possible Crosse & Blackwell bottle, either sauce or pharmacy; bottom left the probable perfume stopper [NB drawn at full scale] from North 130-160; right the possible perfume bottle from South-east segment.
PERFUME

Small square bottle with pharmacy neck, with crown shaped stopper jammed into the neck. 7.5cm tall. 9.6cm including the stopper. Base is 3cm square. One side of the body is embossed The Crown Perfumery Co., London, and the slightly indented base has a sunburst pattern. Stockton (93-94) says this company produced the middle range of scent containers, and that the crown shaped stopper was the registered trademark of the company. They were certainly operating between 1870 and 1900 in London, and the most popular perfumes were the Crown Violet, and from the 1890s, the Crabb Apple Blossom.

Army collection 1

One small rectangular bottle, probably for perfume, but with a pharmacy type neck, very chipped. 8.5cm tall, base 4.5 x 2.2cm. Heel is flat before slight indentation which is plain. One body panel embossed PIESSE/AND LUBIN/LONDON. [Illustrated, Fig. 15]

South-east segment 1

Some bottle fragments suggesting perfume were also found:

North to 50cm 1 large oct. body piece, embossed J B de la Cloche, No. 4711, Cologne
" 50-70 (2) 1 unusual stopper, perfume?
" 130-160(1) 1 possible stopper from perfume bottle-round head, cut into facets. [Illustrated, Fig. 15]

South (3) 1 body fr. RIMM...
Numerous clear bases, sometimes including part of the body, have been found, or recorded, that could have contained spirits, sauces, pickles or soft drinks. It is tempting to place the smallish bases (i.e. 5cm diameter) in the pharmacy section, but sauces and even pickles could come in various sizes.

One of these bases was unusual. It was almost complete, 9.2cm diameter with a flat heel embossed EVANS SONS & CO, LIVERPOOL, and the slightly indented base was embossed N & Co, central teardrop, and 1100. This is a so far rare example of both the bottle maker, Nuttall & Co., and the manufacturer of the contents, Evans Sons & Co. being identified by base embossing. While there are several examples of Nuttall & Co. bottles from the dump, with a known date of manufacture of between 1872 and 1913, nothing is as yet known of Evans. [Illustrated below]

Gutter/fence surface find 1 base

Figure 16 Unusual embossed clear base.

As with the above example, the following bases need further analysis and research to help identify their function.

North, to 50cm

1. embossed 3
1. heat affected
1. 7.3cm

" 50-70 (1)
1 part base c. 7.8cm, heat affected
1 part base, unusual bottle
1 ditto, c.7cm, flat heel
1 base, embossed K 36, T on body
1 part, small, sloping heel, central ind.
1 plain, c. 7.2cm

" " (2)
1 part base
1 small, 5.8cm embossed 7132
1 small, c 5cm, seam on heel then flat base
1, 7.8cm embossed M and 952?
1, small, 5.8cm embossed 10

" 70-100 (1)
1 part base
1 small, 5.8cm embossed 7132
1 small, c 5cm, seam on heel then flat base
1, 7.8cm embossed M and 952?
1, small, 5.8cm embossed 10

" " (2)
1, 7.8cm embossed M and 952?
1, small, 5.8cm embossed 10
1 part base

" 100-130(2)
1, 5.4cm embossed P 10, heat affected
1 part base
"130-160(1)
" " (2)
North-west mid.
South-west (1)
" (2)
South (1)
" (2)
" (3)
Trench area

1 base, almost completely flat
1, 7.2cm, sloping heel
1, 6.6cm, very pale green? or deep aqua

1 base, broad heel, embossed A O
1 small base, embossed 10
1, CS & Co and 1328; made by Cannington, Shaw & Co between 1875 and 1913, contents unknown
1, circle in middle
2, very flat
1 small, broad heel
1 part base, embossed 2
1 base, 1 small base, 2 part bases
" mid-top
" top

1 base, embossed JKS and 1033?
1 base, embossed M, body with lettering
1 base, broad heel, slight indentation

South-west (1)
1 base, on body N O Z ?
1, 7.3cm, base G ? 3 central dots
1 small base 643 in centre
1, 7.1cm, central pimple
1, c.7.8cm, embossed N952?
1 small, c. 5.8cm, embossed 10

South (1)
1, 7.4cm, central teardrop?
1, 7.8cm, embossed K (N, Z or H) and 32
1 small base, c.6cm
1 part base, c.7.7cm
1 part base, c. 8.2cm, embossed 8101.

Trench area
small, embossed ...TER ...LANMAN ...GISTS YORK
1, 5cm d.; 1, 7cm d.
1 part: part base embossed
A number of unusual bottles and other glass fragments were found. Among them were some general household bottles, one containing polish, and several possible ink bottles.

Complete bottle, possibly for hair gloss, or maybe furniture polish. The bottle is square, the finish rather more flattened and broad than usual. 3-1.9cm diameters. Base is approx. 4cm square, with chamfered corners. seam outside rounded heel, then plain slight indentation. The body panels have HAUTHAWAYS PEERLESS GLOSS Made in USA.

Stockton (1981:52) has an illustration of various polish bottles, one of which appears to be a Hauthaways, which is referred to as containing metal polish. Unfortunately there is no further information about the manufacturer, or use of the contents.

Army collection 1

The ink bottles are clear, small bottles, mostly round, though square bottles are also common. The identification of the following bottles is not quite definite, as they could also have been pharmacy bottles. Larger storage bottles were often ceramic.

North 50-70cm (1)  1, neck gone? base 6.1cm, 9cm tall
" " (2)  1, or phar? 3.9cm diam. neck gone
" 100-130 (1)  1 complete bottle, 11.5cm tall, base 5.9cm, one part rounded lip, collar ring at base of medium neck, concave shoulders, straight body with small embossed B near heel which is narrow and rounded, low indented base. Could be ink or possibly pharmacy bottle? [Illustrated, Fig.17 p.60]

North-west, mid  1 complete ink?
Several glass stoppers were found, mostly plain, which could have come from pharmacy or sauce bottles:

Trench area
North 50-70 cm (1) 1 plain (small)
" (2) 3 various sizes
" 100-130 (1) 1 plain, cut neatly in half
1 broader type, embossed (J) OHN KILNER WAKEFIELD, c. 4.2 cm diam. John Kilner was a master glassmaker by 1826, and established a factory in 1842 from which time he began using his initials to mark bottles. The Wakefield factory was begun in 1844, with his sons, who took over on his death in 1857. It is possible that production continued at this plant until the 1930s, though the main factory was at Thornhill Lees, nearby. It is possible that this stopper could have been made before 1857, although as the use of the full name is unusual, it could have continued in use for special occasions after John's death. (Toulouse p.278-280, 302).

" 130-160 (1) 1 embossed GEORGE WEYBROW, head d. 2.8 cm

A number of small but heavy bases of vases, or more probably tumblers were noted, and relatively common. They have a very flat base, the body is flared and slightly ridged.

North 50-70 (1) 1 base
" 130-160 (1) 2 bases [One illustrated, Fig.17]

North-west, top 3 bases
South-west (2) 1 base
South (2) 1 base
Gutter/fence 1 base
Figure 17 Top left, the complete possible ink bottle from North 100-130; right the vase or tumbler bases. Bottom, two of the embossed stoppers [NB, latter drawn at full scale]
Some decorative glass fragments were found, possibly from vases, cut-glass dishes, etc.

North 50-70(2)  
small vase? flaring body ridged into 10 sided body  
fr., sunburst pattern cut glass?  
base, heavy, flat - glass? body flaring and ridged to at least 7 sides.  
Thick glass fr sunray design?  
1 body fr heavily embossed with rows of raised dots

" 70-100 (1)  
heavy base - glass type? ridged body

North-west mid  
1 cut glass footed, vase?  
1 rim, possibly of fruit bowl

" mid-top  
1 base, vase? outside very grooved  
1 fr. from large bowl? etched leaf pattern  
1 fr ditto, curving rim, stippled pattern  
1 vase or bowl fr., narrow rim then flared

" top  
1 fr., line pattern

A number of fragments of flat, clear glass were found. Most of the finer fragments could have been picture glass, while the heavier fragments, particularly those either ridged or frosted, could have been from window or louvre glass.

North to 50cm  
several fr.  
1 fr. thicker, fine ridging on one side  
several fr.

" 50-70 (1)  
4 largish fr

" 70-100 (1)  
2 fr.

" 100-130 (1)  
2 fr.

" 130-160 (1)  
7 fr.

North-west, mid  
1 fr.

Trench area  
9 fr.

Gutter area  
6 thick fr.

Gutter/fence  
16 finer fr.

1 frosted fr.
Some fine, clear glass, usually curved, could have come from the glass chimneys of lamps or lanterns. Surprisingly few remains of such lighting devices were found.

North to 50cm
" 50-70 (1)  
   sev. fr. 1 possible straight rim, 1 flared rim
   3 fr., 2 from plain rim?

North-west, top
   1 large rim fr.

Gutter area
   1 possible fr.

Gaming counters

A number of black, or white apparently glass gaming counters were found — small round domed objects, with a flat base. The actual counters, and the written record may need to be checked, as the following list seems too short.

North to 50cm
" 100-130 (2)  
   1 white
   1 black

South (3)  
   2 white

Gutter area  
   1 white
CERAMICS.

This section of the catalogue, by no means complete, is made up of ceramic bottles, everyday crockery items, decorative pieces, and small food/cosmetic/ointment jars. On the whole there are few complete items, apart from some of the bottles. Unlike most of the glass catalogue, where bottles were simply containers and could be discarded whole, most of the ceramic items were for long term use or decoration, and were only thrown out when broken. In addition, the Chinese origin of so many items has made them a little more difficult to identify, classify or date. Very little research work has been possible, due to lack of time, and funds, and the distance from research libraries of the consultant. Further library research should be able to provide more information on many of the fragments.

While all the fragments have been recorded, and many of them kept because of their unfamiliarity, only the diagnostic material-bases, necks, etc., have been listed in the catalogue. Small body fragments of porcelain or stoneware may have come from a variety of cups, saucers, plates or bottles. The unfamiliarity of many objects, and the use of several recorders, insufficiently trained, has meant that this is only a preliminary catalogue. It must also be noted that this preliminary catalogue is incomplete — in the rush to gather as much information as possible, in some areas the ceramic types were simply noted as being present. Further recording and analysis is required for the artefacts already collected and stored in Darwin.

The limited amount of research carried out has identified some of the trademarks, as noted in the Site Report. Various books on ceramic marks suggest that some dates of manufacture can be more narrowly define. Any mark that used the word "trademark" was made after 1862; any stamp including "England" was made after 1891, and "Made in England" was only used after the turn of the century. Further research may suggest mid 19th century dates for many ceramic items, as they would have been in use for much longer than most glass bottles. Although isolated, Darwin was well placed to trade with many parts of the world, and it is difficult to know how rare ceramic articles were. Many of the more decorative pieces may have been family possessions for many years before being discarded. Further analysis of the present artefact collection, as well as documentary research will be invaluable in arriving at a more complete picture of Darwin society one hundred years ago.
**STONEWARE BOTTLES**

LP01 Stoneware bottle, off-white glaze, 26cm tall, flat base 8.5cm diameter. The neck shows a two part finish, then flares into the shoulders. Small oval stamp near the heel, with H Kennedy, Barrowfield Pottery, Glasgow.

The Henry Kennedy & Sons pottery made glass lined stoneware bottles and jars from 1866 when it was founded by Henry, until 1929. (Godden p. 369, Oswold 1982:231).

Probably contained alcohol, possibly whisky. Yet known.

<table>
<thead>
<tr>
<th>Army collection:</th>
<th>LP01</th>
</tr>
</thead>
<tbody>
<tr>
<td>North 130-160(1)</td>
<td>1 complete bottle</td>
</tr>
<tr>
<td>160-180</td>
<td>1 part base and body, inc. part stamp</td>
</tr>
<tr>
<td></td>
<td>1 complete?; 1 base</td>
</tr>
<tr>
<td>South-west (1)</td>
<td>1 part base</td>
</tr>
<tr>
<td>South (2)</td>
<td>1 part base, c. 7cm diam.</td>
</tr>
<tr>
<td>South-east</td>
<td>1 part base with stamp</td>
</tr>
<tr>
<td>Trench</td>
<td>1 bottle without neck, only 7.1cm diam.</td>
</tr>
<tr>
<td>Large hole</td>
<td>1 small bottle</td>
</tr>
</tbody>
</table>

LP02 Similar bottle and glaze, but stamped Port Dundee, Glasgow Pottery. Two different sizes, the larger as above, the smaller 21.4cm tall and 7.4cm diameter.

| Army collection: | 1 large, 1 small bottle |

LP03 Similar bottle, and glaze, but with no obvious stamp.

| Army collection: | 1 complete bottle |

Possibly similar:

| North 100-130 (1)| 1 base, with rather mottled glaze including some pale brown colour. Inside unglazed orange-brown, clay itself is whitish |
| North-west mid-top | 1 body fr., embossed ?NKES |
South (1) 1 base & body, D stamp near base
South-east 4 fr., 1 from shoulder
Trench 3 bases, c. 9cm diameter
1 base, c. 7.5cm diam.

Some two part necks were found, which could have come from any of the above bottles:

West 1 neck
South-west (1) 1 neck and part shoulders
South-east 1 neck

LP04 Narrower dark brown bottle, approx. 23.7 cm tall, and base is 7.5 cm. Narrow neck, one part founded finish, almost no neck before the high rounded shoulders. Once had a handle attached on one side, and on the other side, a stamp which looks like a lion.

Possibly contained gin?

Army collection 1 almost complete bottle (no handle)

LP05 Similar bottle, orange-brown glaze, c. 24 cm tall and base 7.5 cm. Also missing its shoulder handle, and incised just below the shoulder is H Bootz, and Amsterdam.

Army collection 1 bottle, without its handle

Possibly similar:

North-west mid 1 narrow base, red-brown glaze
LP06 Smaller bottle, 15.8cm tall and base 7.4cm. Medium brown rather matt colour. One part finish, similar to a blob top very short neck flaring to shoulders; straight body. Halfway down the body is a five pointed star with initials WF inside.

Army collection 1 bottle

LP07 Jar?, 16cm tall. Base c. 6.8cm, slightly darker brown than LP06. Wider flaring lip, 5.8-4.1cm diameters, short neck and rather straight shoulders.

Army collection 1

LP08 Wider-mouthed jar?, two tone glaze yellowish brown on the lip to upper body, off-white below. Approx. 14.5cm tall (this needs checking), base 10cm, neck 7.1-5.3cm. One part flared finish, almost no neck, and squarish shoulders.

Army collection 1

Possibly similar:

South-east 1 shoulder fr., lightish brown

South (1) 1 fr., yellowy glaze with possible design in dark brown/black?

Trench 1 rim fr. mustard glaze

LP09 Smaller, narrow mouthed bottle, off-white glaze. 13.4cm tall, base is 8cm, neck 3.7-1.7cm. Flat, one piece finish sloping to very short neck and sloping shoulders, straight body. Stamp near the heel which was indecipherable.

Army collection 1
A number of fragments from large jars, demijohn size were found, but no complete examples. The neck fragments suggest that the comparatively narrow opening could be threaded or plain. Several stoppers for such necks were found, both in the threaded and plain types.

North 50-70 (2)
- 1 fr. large jar, yellowy brown glaze

South-east
- possible part base, brown glaze
- 1 part neck

Large hole
- Base and part body of large demijohn, approx. 20cm diameter, whitish glaze.

Stoppers:
- Army collection (LR)
  - 1 threaded, yellowish glaze and stamped DOULTON & CO, LAMBETH POTTERY.
  - Doulton's Lambeth pottery operation from about the 1850s until 1956. This particular wording is of uncertain date, but possibly before 1891 as it does not include the word England (Fisher 1970: 48-49).
- Army collection
  - 1 plain threaded stopper

North 130-160 (2)
- 1 stopper, plain, threaded, light brown

Other stoneware fragments, possibly different:

North to 50cm
- " 100-130 (1)
  - 1 neck, 1 brown jar handle
  - 1 base, yellowish? glaze
  - 1 part small base, light brown glaze
  - 1 part base, brown glaze
  - 1 part medium base, dark brown glaze
  - 1 part jar? black trademark - holly leaves and MARK in a scroll
- " 130-160 (1)
  - 1 shoulder fr. pale brown glaze
  - 1 base, 10.4cm, red brown glaze
  - 1 part base, unglazed
  - 1 neck & part shoulders, dark brown glaze, one part rounded finish
  - 1 part base, brown glaze
  - 1 ditto, lighter brown
  - 1 neck & shoulders, red-brown glaze
- " 160-180 (2)
  - 1 thick lipped dark brown glaze

North-west, mid
- 1 thick lipped dark brown glaze

South-east
- 1, pouring lip, medium brown glaze
- 1 part base, brown glaze, part trademark?
Figure 18a  The stoneware bottles from the Army collection.

18b  The stoneware jars from the Army collection
OTHER CONTAINERS

LP10 Soy sauce container, very shiny, very dark brown glaze. 12.5cm tall, and rather squat in shape, the base is approx. 12.1cm diameter, and slightly footed. The base is not glazed, this starts just above the footed section on the body. The body flares out to the rounded shoulders, neck is non-existent with a flat, one part finish similar to the flat gin necks, and a small, roughly finished spout close to the neck on the upper slope of the shoulder.

Army collection: 2 complete containers

North 50-70 (2) 1 neck
" 130-160 (1) 1 base
" " (2) 1 part base
" 160-180 1 shoulder fr. with spout

North-west mid-top 1 spout

South-east 3 spouts, 3 necks, 5 part bases

South 1 part neck

South-west (1) 2 base fragments

LP11 Rice wine jar, with similar shiny, very dark brown glaze to the soy sauce container. Flared one part finish, very short neck before sloping shoulders to rounded body, which then narrows to the base 8.3cm diameter. There can be some variations in the colour of the glaze.

Army collection 1 jar, missing part of lip

North to 50cm 1 body fr
" 50-70 (1) 1 neck

South-east 3 part bases, 2 body fr., 2 neck fr.

West 1 almost complete

Trench 1 part neck
Gutter 5 neck frs.

There were numerous dark brown glazed body fragments which could have come from either soy sauce or rice wine jars
Figure 19 Left, soy sauce jars, and right, rice wine jar, from the Army collection. The possible teapot (see p16) is on the right.
An unusual jar, of greyish clay not really glazed, but partly covered in a slip: aprox. 11cm tall, base 11.3cm is slightly indented and glazed brown, with Chinese stamp. Body flares out to rounded shoulders, almost no neck and simple flat rim, 7-5.9cm diameters.

Army collection (NT) 1

some greyish fr. noted

POTS OR POT LIDS

A number of small pots which may have contained food, ointment or cosmetics were found. The complete examples are all plain, and the fragments found during the excavation are very small, which makes identification more difficult.

From the Army collection:

Small off-white glazed pot, 6.2cm tall, base 4.7cm. The lip is basically the same as the body, just rounded off, and there is a slight indentation below the lip. Possibly once corked, and held down by wire?

Small jar, 2.9cm tall, 6.1cm diameter, footed base.

Small jar, 2.9cm tall and 5.7cm diameter, plainer.

Large plain pot lid, approx. 8.7cm diameter, flat sides.

North to 50cm 1 part white lid?

" 50-70 (1) 1 ceramic & metal stopper, metal part threaded

" 100-130(1) Ornamental, green glaze & decoration part lid

Part of small jar. 3.6cm high, body printed with ..INT../..ETERATE../..ORE BREA../..F HEADS B../2/94/6?/22../OXFORD

Part of large plain white pot. 9cm tall

" 130-160(1) part of plain white lid

North-west mid 1 light olive pot lid?

South-east 1 part, possible pot? tapered, white glazed, with external thread

From Trench: Part pot lid, printed CHERR PATRON FOR BEAUTIFYING/ PREPARED BY/EXTRA.
DECORATIVE ITEMS - VASES, BOWLS, FIGURES ETC.

Army collection: Fine porcelain? vase, flared lip decorated with pink and green flowers and leaves, with an orange line around the outside and on top of the rim. Body of vase has painted figures, and two small handles on either side, which could be sleeping lions or similar animals.

Porcelain bowl?, base diameter 8cm, and it was quite wide and shallow. Handpainted decoration on the outside, and on the inside, in the centre, is what could be a crab, in brown and orange. Base has a stamp.

Similar bowl base, 7.3cm diameter, also design on base, outside and inside. The latter is in the same browns and oranges of above example, but is less obviously crablike. Hand painted design on outside of body, but little survives.

North 160-180 1 part bowl, red Chinese stamp on base, crab design inside

Figure 20 Examples of the crab design (and a plain pot lid) from the Army collection.
<table>
<thead>
<tr>
<th>Region</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>North 100-130(2)</td>
<td>1 small animal leg, green glazed</td>
</tr>
<tr>
<td>North-west, mid</td>
<td>1 small vase, heavily embossed with roses and leaves</td>
</tr>
<tr>
<td>&quot; top:</td>
<td>headless, seated figure, possibly angel?</td>
</tr>
<tr>
<td>South-east</td>
<td>footed bowl or vase, creamy glaze with external daisy &amp; leaf design.</td>
</tr>
</tbody>
</table>

A number of smaller fragments of bowls, etc. were found with hand painted decoration:

<table>
<thead>
<tr>
<th>Region</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>North to 50cm</td>
<td>1 rim, small bowl? blue, black and gold</td>
</tr>
<tr>
<td>&quot; 50-70 (1)</td>
<td>1 thicker rim, green leaves, pink, orange flowers</td>
</tr>
<tr>
<td></td>
<td>1 base fr. (3.5cm), ext. blue &amp; green floral with gold highlights</td>
</tr>
<tr>
<td>&quot; 100-130 (1)</td>
<td>1 plate rim? orange &amp; green floral</td>
</tr>
<tr>
<td>&quot; 130-160 (1)</td>
<td>1 ditto, blue, orange &amp; green</td>
</tr>
<tr>
<td>&quot; 160-180</td>
<td>1 body, pink daisy &amp; leaves on exterior</td>
</tr>
<tr>
<td>North-west mid</td>
<td>1 fr., squared? delicate floral, green, pink &amp; gold</td>
</tr>
<tr>
<td>&quot; mid-top</td>
<td>1 heavy fr., large green leaves</td>
</tr>
<tr>
<td>&quot; 100-130 (1)</td>
<td>1 body fr., pink and green</td>
</tr>
<tr>
<td>&quot; 130-160 (1)</td>
<td>1 rim, brown &amp; orange floral</td>
</tr>
<tr>
<td>&quot; 160-180</td>
<td>1 fr., external green, red, pink, brown flowers and birds</td>
</tr>
<tr>
<td></td>
<td>1 bowl?, rim &amp; base, red Chinese stamp, internal red flowers green leaves</td>
</tr>
<tr>
<td>South (1)</td>
<td>1 fr., painted flowers</td>
</tr>
<tr>
<td></td>
<td>2 rim fr., flowers</td>
</tr>
<tr>
<td></td>
<td>1 pt base, fruit &amp; leaves both sides</td>
</tr>
<tr>
<td></td>
<td>1 pt base, straight sided vessel, heavy brown floral</td>
</tr>
<tr>
<td></td>
<td>1 rim fr., bowl? pale aqua with dark blue blob design ext., green brush strokes int.</td>
</tr>
<tr>
<td></td>
<td>1 fr. fruit, pink &amp; green leaves, red/brown emblem on reverse</td>
</tr>
<tr>
<td>South (3)</td>
<td>1 base, bowl? faint design both sides</td>
</tr>
<tr>
<td></td>
<td>1 unusual footed base, similar egg cup, ext. heavily painted in red, orange &amp; blue flowers with gold highlights</td>
</tr>
<tr>
<td></td>
<td>1 cup rim? aqua band on ext., then cerise floral design</td>
</tr>
<tr>
<td></td>
<td>1 base fr. ext. green leaves</td>
</tr>
</tbody>
</table>
EVERYDAY WARES

JUGS, HANDLES, ETC.

North 100-130(2) 1 part handle, brown geometric transfer-printed pattern
North 130-160(1) 2 fr. of white glazed jug? flat rim, bulgy neck and beginning of shoulder

1 part jug or jar, slightly squared body, external transfer printed stylised tree.

North 130-160(2) 2 part (non joining) soap or other strainers; the slightly curved pieces have several holes in the flattish base section.

North-west mid " 1 white glazed teapot spout
" top 2 cup handles

South (1) 1 large handle, blue line on white
" (2) 1 small plain white cup handle
South-east 1 cup handle

CUPS

Base of a small porcelain cup, which may have been octagonal in shape; base is 3.5cm diameter, and has an orange stamp. Body has external hand painted decoration in pinky-mauve, possibly flowers, and green leaves.

Army collection 1

North 130-160 (1) 2 joining fr. large cup or small bowl, with blue simplified floral design
" (2) 1 part cup, red & green floral design

North 160-180 (1) 1 part cup, with part handle, dark blue leafy floral design on exterior

1 part cup, with part handle, external transfer printed design, dark blue, orange-brown and red colours.

North-west mid-top 2 plain white glazed cup? bases

South-east 2 cup fr., hand painted? stylised floral pattern in orangey-browns
? body fr. external embossed floral design
A number of fine white china cups, with a delicate figure, possibly Chinese, on the inside base of the cup were found (see Fig. 22):

<table>
<thead>
<tr>
<th>North to 50cm</th>
<th>1 part cup</th>
</tr>
</thead>
<tbody>
<tr>
<td>&quot; 50-70 (1)</td>
<td>1 part cup with part handle, base c.4.1cm</td>
</tr>
<tr>
<td>&quot; 100-130 (2)</td>
<td>1 part cup</td>
</tr>
</tbody>
</table>

**CHINESE TEA CUPS/BOWLS**

These are found in several sizes, from the very small cups to small and larger bowls, all with a pale aqua coloured glaze. This may be what is known as celadon ware. The bases often have a blue Chinese stamp, none of which have yet been translated, but such stamps could indicate a potter, or be general statements - happiness and longevity, or fine vessel, etc. (See Fig. 21)

**Army (LR)**

| 1 bowl, c. 3.3cm tall, plain base 2.4cm, rim diameter 6.7cm |
| 1 cup, c.2cm tall, base has blue blob and is 1.8cm diam., rim 4.3cm |

<table>
<thead>
<tr>
<th>North to 50cm</th>
<th>1 part base with stamp</th>
</tr>
</thead>
<tbody>
<tr>
<td>&quot; 50-70 (1)</td>
<td>2 part bases, large bowl 4.8cm d.</td>
</tr>
<tr>
<td>&quot; &quot; (2)</td>
<td>1 base with part stamp</td>
</tr>
<tr>
<td>&quot; 70-100(1)</td>
<td>noted</td>
</tr>
<tr>
<td>&quot; 100-130(1)</td>
<td>noted</td>
</tr>
<tr>
<td>&quot; 130-160(1)</td>
<td>1 part small cup</td>
</tr>
<tr>
<td>&quot; &quot; (2)</td>
<td>1 small cup base; 1 large bowl rim fr.</td>
</tr>
<tr>
<td>&quot; 160-180</td>
<td>1 rim fr.</td>
</tr>
</tbody>
</table>

| North-west mid | 3 part bases stamped, 2 part bases plain |
| " mid-top      | 3 rim fr., 1 rim to base fr. |
| " top          | 2 small bases, no stamp |

| South-west (1) | 1 large bowl, with stamp; 1 part bowl |
| Trench         | 1. with stamp 1 part b & b (not sure of size) |
| Large hole     | Spoon with part of the handle broken off, with X mark on the underside of the bowl |

Many body fragments were found over the site.
Figure 21 Chinese tea bowl, and the incomplete spoon reversed to show the base marks.

Only one unusual, possible teapot has been found. This is brown glazed, hexagonal shaped, and without any spout or handle, but has obviously been broken. Two of the side panels are indented and contain holes, so this piece may have just held the tea leaves? (See Fig. 19)

Army collection 1

Another common bowl was also very pale aqua glazed, with swirly blue lines on the outside:

North to 50cm 3 fr.
  " 50-70 (2) noted
  " 100-130(1) noted
  " 130-160(1) possible fr. noted
  " 160-180 part bowl. rim fr.

South (1) possible base fr.

Trench 1 rim fr.; 1 part base and body
Gutter 1 rim fr.
Gutter/fence 6 body fr.
PLATES, BOWLS, SAUCERS

Innumerable fragments of these were found. As far as possible, they have been grouped; one of the most common "sets" is a fine white china, possibly porcelain, decorated only with narrow gold bands. Many thicker plates were found, obviously used for everyday, with similar lines of different colours. Transfer-printed wares are also common, but because the fragments are so small, very few have been matched together.

Fine white china, decorated with one to three narrow gold lines around the rim of plates, etc.

North to 50cm 1 part large handle, with gold lines
North-west mid 1 handle, with gold line
 mid-top 1 handle, with gold teardrop
South-east 1 cup handle, gold line
 1 unusual rim, with gold and green bands

Rim fragments were noted at North 130-160 (2), 160-180, North-west mid (13 fr.) and top, West, South (2), South-east, and the Gutter/fence area.

More unusual:
North 130-160(1) 1 heavier fr., possibly a lid?
South (1) 1 thicker rim fr., with embossed design on exterior highlighted with gold.

Plain white glazed china fragments, in the fine porcelain through to the heavier wares, were also found throughout.

Large hole Heavy footed base, possibly from bowl, whitish glaze and stamped with royal coat of arms and T Burgess, Burslem. The actual maker has yet to be identified, but Burslem was a centre of pottery production from the 17th century, and was home to many famous potters including Wedgewood. (See Fig. 23b).
Transfer printed wares

The demand for fine pottery increased dramatically in the 19th century with the growth of a wealthy middle class. The technique of transfer-printing was invented in the mid 18th century, but became very popular as a result of this demand. One of the most popular designs was the Willow Pattern, depicting a Chinese scene. Transfer-printing could also be used to outline a design which was then hand painted, and was also used to apply instructions and information on pots noted earlier. The technique is still used, though largely replaced by screen printing or lithographic transfers. (Blakemore 1984:81-83, 110-111).

As most fragments are small, they have been simply grouped as found, except in the case of some of the more common "banded" examples. Colour identification is tentative, as general wear and then burial in the dump may have had some effect.

North to 50cm
1 plate rim, black floral
1 ditto, circle and leaf design
1 plate base, pale blue floral
1 body fr, blue-grey floral
1 bowl body fr.? reddish floral
1 tiny rim, dark blue floral
1 fr, bright blue floral

" 50-70 (1)
1 plate rim, delicate pink floral
1 scalloped rim, wavy blue band, trees or floral
1 thick rim, black Greek key & flowers
2 large plate fr., blue floral, leaves

" 100-130 (1)
1 plate rim, brown, delicate leaves
2 base fr. green rural scene
1 soup bowl? fr, green design
1 plate base, blue/green pattern
1 fr. brown tree design
1 rim fr. mauve-blue floral
1 rim, blue-grey grapes & leaves
1 rim, dark blue grey leaves & berries
1 fr. external stippled pinky-brown
3 rim, 1 body fr blue and white

"160-180(1)
1 part base, dark green floral & butterfly, plus trademark on base, W T Copeland & Sons, Stoke upon Trent; made between 1847 and 1970
1 rim, dark blue geometric, floral

North-west mid
" mid-top
1 fr. black
1 rim, blue lotus flower
1 rim, pale blue floral, plumes
1 large flat fr., blue
1 bowl? dark blue scroll, pale blue exterior
1 thick rim fr., red floral
<table>
<thead>
<tr>
<th>Location</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>N-W top</td>
<td>1 rim. pale brown stylised floral 1 part base. stamped on base Dulcamarra. R? B &amp; Co. Not yet identified</td>
</tr>
<tr>
<td></td>
<td>1 plate rim. blue grapes &amp; vines 1 rim. black geometric &amp; flowers 1 body. brown butterfly etc</td>
</tr>
<tr>
<td></td>
<td>1 body. pale blue flowers &amp; leaves 1 rim. blue curly pattern 1 large body. large orange leaves 1 rim. delicate green leaf.</td>
</tr>
<tr>
<td>South (2)</td>
<td>1 rim fr. greyish. simple flower &amp; plume pattern inside, gold highlights exterior? 2 rim fr. fleur-de-lys. bands. leaves</td>
</tr>
<tr>
<td></td>
<td>&quot; (3) 1 large bowl fr., lines, plumes, flowers 1 bowl? fr. dark blue-grey sunburst</td>
</tr>
<tr>
<td>South-east</td>
<td>1 rim. embossed leaf, delicate mauve floral 1 rim. blue? grapes, floral 1 thick rim. brown patterned band</td>
</tr>
<tr>
<td></td>
<td>1 body. delicate tree? pattern 1 thick rim. blue floral 1 thick rim. external brown berry/briar</td>
</tr>
<tr>
<td></td>
<td>1 body fr. brown leaves inside and out 1 rim fr. dark green</td>
</tr>
</tbody>
</table>

Figure 22 Examples of some transfer-printed wares, and one part cup base with gold figure
Of the heavier rim fragments with different coloured bands, one of the most unusual, (see Fig. 23) was

West 1 plate rim, with monogram, in black, initials possibly A on E; broad and narrow red band on rim and narrow band close to "shoulder". Possibly from a meat dish or serving plate.

One of the more complicated banded designs was a twisted rope pattern, mostly pale blue; this came in two designs, a medium band of "rope" formed into small circles, and a wider band of flowing S shapes over a central "rope".

<table>
<thead>
<tr>
<th>Area</th>
<th>Fragments</th>
</tr>
</thead>
<tbody>
<tr>
<td>North to 50cm</td>
<td>2 plate rims</td>
</tr>
<tr>
<td>&quot; 70-100 (1)</td>
<td>1 noted</td>
</tr>
<tr>
<td>North-west mid</td>
<td>several possible fragments</td>
</tr>
<tr>
<td>South-west (1)</td>
<td>1 large plate fr.</td>
</tr>
<tr>
<td>South (3)</td>
<td>1 small rim fr.</td>
</tr>
<tr>
<td>South-east</td>
<td>1 fr.</td>
</tr>
<tr>
<td>Large hole</td>
<td>several large plate fr., both designs, one possible serving dish and part of vase/jug?</td>
</tr>
</tbody>
</table>

The large plate fragment with rope circles design has part of a trademark on the base which identify it as from the Clementson Brothers Phoenix Works at Shelton, Hamley, made between c. 1870 and 1916. The Phoenix was added in 1870, and after 1910 Limited was added - unfortunately the piece found shows only part of the trademark. J. Clemenston began making earthen- and stonewares in 1839, and with a different trademark. (Godden 1975:53, Cushion 1976:151, Chaffers 1952:287)
Figure 23a  The monogrammed plate
23b  The two rope designs, and stamped plain base
Plain blue lines were also popular:

<table>
<thead>
<tr>
<th>Region</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>North 50-70</td>
<td>1 rim, two lines</td>
</tr>
<tr>
<td>&quot; 70-100</td>
<td>1, ditto</td>
</tr>
<tr>
<td>&quot; 100-130</td>
<td>1 possible dish cover or lid, 2 lines near edge, then signs of another</td>
</tr>
<tr>
<td>&quot; 130-160</td>
<td>2 fr. 1 line at rim, 1 just on &quot;shoulder&quot; curve</td>
</tr>
<tr>
<td>&quot; 160-180</td>
<td>1 rim, broad and narrow line on edge, narrow blue on shoulder</td>
</tr>
<tr>
<td>North-west mid</td>
<td>3 fr, broad and narrow lines</td>
</tr>
<tr>
<td>&quot; mid-top</td>
<td>1 rim, double lines</td>
</tr>
<tr>
<td>&quot; top</td>
<td>1 rim, broad and narrow lines</td>
</tr>
<tr>
<td>South-east</td>
<td>1 rim, 2 narrow lines</td>
</tr>
<tr>
<td></td>
<td>1 possible soup plate?, 2 narrow 1 broad</td>
</tr>
<tr>
<td></td>
<td>1 rim, embossed then 2 narrow lines</td>
</tr>
<tr>
<td></td>
<td>1 rim, pale blue line &amp; hand-painted circles</td>
</tr>
</tbody>
</table>

Other banded decoration included red, green and pink lines. At least two examples of pink and gold lines were found, one in the North to 50cm section, and another in North 130-160 (2). Most unusual was a rim fragment from North 130-160(1) which had alternate bands of brown, white, pink, and white.

Other ceramic fragments showed a variety in the colour of the glaze, including green (possibly from ginger jars), olive and yellow were noted.
EARTHENWARE

While many of the fragments already described probably fall into this category, there were numerous pieces of coarse wares, often suggesting large storage jars, with some glazing, and other unglazed pieces that have been named as "flower pot" though the identification is by no means certain.

Both glazed and unglazed wares were found all over the site.

Among the more unusual probable earthenwares were some decorated pieces:

North 50-70 (1) 3. darkish brown slip, heavily embossed with basket of flowers design.

Figure 24 Examples of the embossed earthenware.
Other very fine wares. terracotta? with an orangey slip were found:

West 1 of the most complete examples, bell shaped, with slightly convex base (?); body is slightly ridged. The top has lost its slip, and suggests there was a central hole. The shoulder has several deep incisions, possibly letters. Almost 8 cm diameter, 3.8cm high.

Figure 25 The broken, bell shaped terracotta ? piece

In addition, pieces of earthenware pipes and tiles, as well as brick fragments, were noted.
CLAY PIPES

Numerous stem fragments and bowls were found, of which the most unusual was a surface find.

Gutter/fence (west of work area) Clay pipe bowl, decorated with a variation on the Australian coat of arms, showing an emu, kangaroo, shield with rather vague symbols and the motto Advance Australia. Also with indented, grooved band around the mouth of the bowl. Broken just where stem meets bowl. Presumably from the 1890s or later?

Figure 26 Clay pipe bowl decorated with a form of the Australian coat of arms (NB drawn at full scale); part of stem from Gutter/fence area.

<table>
<thead>
<tr>
<th>Location</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>North to 50cm</td>
<td>2 stem fr. (mouthpieces)</td>
</tr>
<tr>
<td>&quot; 50-70 (2)</td>
<td>1 stem fr. (mouthpiece)</td>
</tr>
<tr>
<td>&quot; 100-130(1)</td>
<td>1 complete bowl (plain)</td>
</tr>
<tr>
<td>North-west mid-top</td>
<td>1 part</td>
</tr>
<tr>
<td>South-east</td>
<td>1 part stem. stamped LONDON</td>
</tr>
<tr>
<td></td>
<td>1 part stem. plain. with mouthpiece</td>
</tr>
<tr>
<td></td>
<td>1 part stem. stamped DAWN ?</td>
</tr>
<tr>
<td>Large hole</td>
<td>1 part stem. with raised dot pattern, so possibly from close to the bowl end.</td>
</tr>
<tr>
<td>Trench</td>
<td>1 part stem</td>
</tr>
<tr>
<td>Gutter</td>
<td>5 fr. plain bowl</td>
</tr>
<tr>
<td>Gutter/fence</td>
<td>1 part bowl showing basket weave pattern</td>
</tr>
<tr>
<td></td>
<td>1 part stem. with edges of stamp on both sides. one side CO... the other .RK (illust)</td>
</tr>
</tbody>
</table>
INDUSTRIAL ITEMS

There were some signs of the importance of gold in the economy of the Top End, as two large and two small possible crucibles were recorded.  

Army collection 1 large three sided bowl or probable crucible, appears to have interior glaze and part of the outside is also glazed (or given that effect during use); base c. 6.8cm diameter, and approx. 11.5cm tall. Stamped on the body PATTERN TRIANGLE S MORGAN ENGLAND.  

1 similar crucible, unglazed, and no sign of any markings, 6.6cm diameter, 11.9cm tall.  

Army collection(LR) 1 small possible crucible, or small bowl, yellowy green glaze inside very cracked, exterior apparently unglazed. Base stamped BOW'S (?) WORKS ENGLAND around the edge, and possible 2 in the middle. Approx. 2.1cm tall, base diameter 2.8cm, top diameter 5cm.  

North to 50cm Possible base of small crucible stamped .ORGAN.
METAL AND OTHER MATERIAL.

Metal objects were comparatively rare, partly due to the more corrosive conditions in a tropical dump, and possibly partly due to the urban nature of the population, and that the Chinese had market gardens, which with the beef industry, made fresh food more readily available. Natural corrosion forces, and collectors, may have played a major role as there are few signs of tin matchboxes which should be present, and even the possible opium tins are few in number.

Unless otherwise stated, the metal is in poor condition, very corroded.

The artefacts have been divided very roughly into Building, Domestic, Cartridges, Work & Transport, and Unidentified groups. These groupings are by no means certain - e.g. the fine wire may not have been used for building purposes. The poor condition of most of the metal makes detailed analysis uncertain, though some of the large unidentified pieces may repay further investigation. Few of the artefacts have been drawn or photographed, apart from the small decorative piece, and there is also an illustration of one of the metal buttons. (Note also that both metal and pearl or bone buttons were found).

The other material is made up of bone, shell and coral, which was found scattered throughout the site. The more unusual items include a piece of possibly worked bone, and the pearl/bone buttons. The bone fragments require further analysis and identification.
BUILDING HARDWARE

Nails, screws, spikes

North to 50cm
" 50-70 (2)  35. different sizes
" 70-100 (1)  several. different sizes
" 70-100 (2)  33. ditto
" 100-130 (1) 1 very long nail or spike
" 100-130 (2) 1 spike, possible rose head, c. 25cm long
" 130-160 (2) 1 screw with washer
" 160-180  several nails

North-west, mid
" mid-top 30 nails or part nails
" 14 nails, long and short
" 2 possible bolts
" 100-130 (2) 5 large nails
" 130-160 (2) 11 part nails
" 160-180 1 rosehead? c. 8 cm long

Trench area
1 large rectangular shaft, copper? 5.8cm long, blunt point, good condition
1 large spike
1 bolt?
1 spike, or wire (very corroded)
2 nails, one small, one large
14 nails. long and short
1 bolt?
1 spike, or wire (very corroded)
2 nails, one small, one large

South (2)
18 nails. 1 very thick, 1 with big head
13 nails or part nails
2 large, 1 part nail
9 nails (one hook shaped)
9 nail fr.
1 possible washer?

Gutter area
10 nails
1 washer

Gutter/fence

Corrugated iron

North to 50cm
1 strip

Door fittings, etc

North to 50cm
1 part possible door lock
1 copper hinge
" 50-70 (2) 1 possible hinge, 10.5cm long, 5cm broad
" 130-160 (2) 1 possible door fitting

North-west mid-top
1 hinge

Trench area
1 possible hinge

Gutter/fence
1 possible door fitting?
Wire

North 100-130 (1) 1 hook shaped No 8 ? wire
  " 130-160 (1) 1 length of fine copper wire
North-west, mid 1 strand fine copper wire (5 or 6 wires)
  " mid-top 1 piece fine wire
  " top 2 fr. No 8 wire, one straight, one curved
Gutter area 1 doubled length of fine wire
  1 circle of heavy wire ?

Lead

North to 50cm Large flat rectangle of lead, c. 30 x 18cm
  " 50-70 (2) 2 lengths of lead, one greyish, one white
  " 70-100 (2) 1 small flat piece
  " 130-160 (1) several fr. square or rectangular lead
  " 160-180 2 blobs of lead
North-west, mid 3 lumps of lead
  " mid-top 1 large flat piece, shaped like a very thick
  " top coathanger - some sort of decorative piece?
Cutter/fence 1 similar large piece of lead (illust.)

Figure 27 The lead "coathanger" from North-west top.
DOMESTIC ITEMS

Decorative small metal
North 70-100 (2) 1 small finely made ornament? possibly Chinese, possibly of copper? (illus.)

Clothing items
North 50-70 (2) 1 part buckle? c. 2.4 x 1.9cm
North-west, mid 1 domed button?, attached by shank to small bar
Gutter/fence 1 button, BEST RING EDGE around edge (illus.)

Figure 28 Left, the decorative piece; right the Best Ring Edge button. Drawn at full scale.

Kitchenwares
North to 50cm 11 fragments, possibly cooking pot
" 50-70 (2) 3 strips of hoop iron? 2.1cm broad
" 70-100 (1) 1 tiny fr. wire mesh - small holes stamped out of tin
" 130-160 (1) 1 length hoop iron? 4cm broad, 40cm long
" (2) 1 handle? possibly from teapot
South (2) 1 large possible cooking pot fr.
Trench area 1 piece packing case tin?
1 large meat chopper blade?
2 possible hoop iron fr.? 1 possible handle, wire
Metal cans

North 50-70 (2) 2 fr., possibly from opium tin
" 100-130 (2) 2 possible fr. opium tin
North-west mid-top 1 can, body & base in one piece, double seamed to top
South-east 1 length of copper, possibly from opium tin?

Matchboxes

North 70-100 (1) 2 lid fr., possibly Bell & Black
North-west mid-top 2 possible fr.
Trench area 1 possible lid

Figure 29 Examples of the types of matchboxes likely to be in the rubbish dump. Drawn at full scale

CARTRIDGE CASES

North to 50 cm 1
" 50-70 (2) 1 shotgun ?, stamped head
" 70-100 (1) 1 possible
North-west, mid 1 shotgun ?
WORK AND TRANSPORT ITEMS

Tools
North-west, mid
" mid-top
1 file
1 possible file, or knife blade

Pipes & fittings
North 50-70 (2)
1 possible pipe fitting? large, hexagonal shape, internally threaded
North-west mid-top
1 circle attached to ? hollow rod, with piece of wire looped around it
South (2)
1 large pipe? 50cm long, over 2cm d.
Trench area
Gutter area
1 rod c. 37cm long
1 rod?

Horse shoes, saddlery items
North to 50cm
1 very large horseshoe
1 part smaller shoe
" 50-70 (2)
1 small stirrup ?
" 70-100 (1)
1 C shaped piece, part of a link?
" 130-160 (2)
1 harness rivet washer
South (2)
1 oval ring, possibly part of chain?
1 long rect. buckle? possibly from harness

UNIDENTIFIED METAL
North to 50cm
1 triangular piece of iron with thick wire handle? attached
1 heavy piece, 2 short legs with a joining piece
1 triangular piece of metal
1 metal plate? nut at one end, possible hole at the other
I
70-100 (2)
1 small bottle cap? but without threading, and central hole  
1 small piece of metal, round hole attachment at one end, then rod shape, then oval hole
1 length (21cm) of riveted metal
1 length of metal, 5cm, with 2 nails?
" 70-100 (1)
2 thin strips of metal, c. 1.9 x 10cm
1 rectangle of heavy iron, 6 x 5 cm
2 rough pieces metal
" 70-100 (2)
4 small pieces metal
" 100-130 (1)
1 rounded object, 4.8cm long. sl. thicker at head which is c. 10cm diameter
" 100-130 (2)
1 piece of metal, 8.5 x 7.5cm
1 piece, originally curved
" 130-160 (1)
1 ring of metal
3 fragments
" 130-160 (2)
1 long flat strip metal, 4.8cm wide
1 long piece of copper? mangled
1 large curved piece metal
North-west, mid
1 L shaped piece of metal
1 piece tin, folded over in three
1 strip of thin metal
several fr metal
" mid-top
1 length heavily riveted iron
several strips of metal
1 piece of tin folded into 3
1 length of metal, bullet? head nail attached
1 heavy metal, possible wagon part?
several lumps of metal
" top
1 length of metal, ring on one end, and nails sticking out at intervals
1 rod? with triangular? head
South (2)
1 length of tin, curved into shapes
1 piece, shaped like an 8, with addititional circle
South-east
1 length of thick flat iron? curved one end
(possibly part of a handle?)
Trench area
1 flat metal, c.20 x 12cm
1 rect. flat metal, c. 9 x 5cm
1 piece flat metal, c. 8.7 x 3.3cm
1 part large pipe?
1 lump of metal
Gutter/fence
10 fr. metal
Large hole
Large metal rectangle, with attached can end possibly marked Holden? (From south-east side of hole where signs of more recent intrusions.
3 lumps of metal
OTHER MATERIAL

<table>
<thead>
<tr>
<th>Depth Range</th>
<th>Finds</th>
</tr>
</thead>
<tbody>
<tr>
<td>North to 50cm</td>
<td>2 shells, 3 bone fr.</td>
</tr>
<tr>
<td>&quot; 50-70 (2)</td>
<td>several shells, several bone fr.</td>
</tr>
<tr>
<td>&quot; 70-100 (1)</td>
<td>5 shells, 4 bone fr.</td>
</tr>
<tr>
<td>&quot; &quot; (2)</td>
<td>1 shell, 3 bone fr.</td>
</tr>
<tr>
<td>&quot; 100-130 (1)</td>
<td>3 shells</td>
</tr>
<tr>
<td>&quot; &quot; (2)</td>
<td>2 shells, 3 bone</td>
</tr>
<tr>
<td>&quot; 130-160 (1)</td>
<td>1 shell, 1 coral fr., 1 large bones</td>
</tr>
<tr>
<td>&quot; &quot; (2)</td>
<td>2 shells, 1 bone</td>
</tr>
<tr>
<td>&quot; 160-180</td>
<td>1 pearl/bone button, white, four holes</td>
</tr>
</tbody>
</table>

North-west mid trench area

<table>
<thead>
<tr>
<th>Finds</th>
</tr>
</thead>
<tbody>
<tr>
<td>5 shells (mussels?); 1 cone shaped shell, 3 coral fr.</td>
</tr>
<tr>
<td>&quot; mid-top</td>
</tr>
<tr>
<td>&quot; top</td>
</tr>
</tbody>
</table>

South-west trench area

<table>
<thead>
<tr>
<th>Finds</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 unusual bone, possibly worked?</td>
</tr>
</tbody>
</table>

Trench area

<table>
<thead>
<tr>
<th>Finds</th>
</tr>
</thead>
<tbody>
<tr>
<td>2 shells, 1 knuckle bone</td>
</tr>
</tbody>
</table>

Gutter area

<table>
<thead>
<tr>
<th>Finds</th>
</tr>
</thead>
<tbody>
<tr>
<td>4 shells, 1 coral fr., 5 bone fr.</td>
</tr>
</tbody>
</table>

Gutter/fence area

<table>
<thead>
<tr>
<th>Finds</th>
</tr>
</thead>
<tbody>
<tr>
<td>2 shells, 6 bone fr.</td>
</tr>
</tbody>
</table>

South-east trench area

<table>
<thead>
<tr>
<th>Finds</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 pearl? button, 2 holes</td>
</tr>
</tbody>
</table>

Large hole

<table>
<thead>
<tr>
<th>Finds</th>
</tr>
</thead>
<tbody>
<tr>
<td>2 large bones</td>
</tr>
</tbody>
</table>
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