

## Meaning from Artefacts: A Question of Scale

JUDY BIRMINGHAM

*Many of the problems in urban historical archaeology are related to the volume of excavated data usually recovered. The excavation of the Aboriginal dwellings at Wybalenna on remote Flinders Island in the Bass Strait raised questions rather at the opposite end of the scale. The limited number of finds and the need to develop interpretation at the individual household level of the community required new approaches, both theoretical and methodological, if a significant level of meaning was to be explored.*

This paper describes a technique for analysing excavated artefacts which was developed for the Wybalenna material in response to needs generated by interaction between the archaeological data and needs generated by theory.

Wylie writes of the archaeologists' interpretive dilemma – the choice for traditional archaeologists between interpretation through speculation, or settling for 'space-time systematics' in place of interpretation.<sup>1</sup> Wybalenna, the site in question, is one in which her conclusions appear particularly relevant. These are that the standard practice of testing interpretive conclusions about the past against archaeological evidence must be extended by enactment in different contexts, especially actualistic ones where interpretive principles can be tested, and by continuous movement between source-side (paradigmatic or theoretical) and subject-side (archaeological record) research in several ways so that the experiential and theoretical insights gained in each of these contexts provide a basis for assessing and interpreting those gained in the other.

The procedures to be described arose very much as she goes on to explain:

What have typically been held constant in archaeology are the background assumptions about cultural life (drawn from source-side research or, often, from 'common sense') in terms of which archaeological data are, first, identified as cultural and then structured and interpreted as evidence of a particular past. While these assumptions may get empirical investigation off the ground, they can seriously limit understanding if they remain fixed. The detailed research made possible by tentative acceptance of some interpretive principles almost inevitably results in piecemeal change in the information base that eventually creates inconsistencies in our understanding of the subject domain, considered as a whole... The value of source side research at this juncture is not just that it can provide more controlled ways of reinterpreting specific data, but that it may also yield a quite profound readjustment of general assumptions about the subject domain. The dynamic, tension-generating and tension-resolving process of archaeological inquiry then unfolds at a new level and within new evidential and conceptual parameters.

Wybalenna, a mid-nineteenth century site with the added resource of actualistic documentation, is also one for which a number of current theoretical paradigms

could be, and were, proposed, resulting in the process Wylie describes a progression of new archaeological insights, each one leading to the trial application of a new theoretical paradigm to the archaeological evidence. As described below, a traditional archaeological empiricist approach failed to make any real contact with the richness of this site. Subsequent exploration of such theoretical areas as structuralist theory, symbolic archaeological paradigms, dominant ideology theory,<sup>2</sup> applications of optimal resource strategies, household and family paradigms, and gender theory, together with falsification testing of consumerist theory, world systems theory, historical rupture theory, and older-style acculturation paradigms have achieved exactly what it would seem Wylie describes as a 'dynamic, tension-generating and tension-resolving process' at a new level, with new insights into both archaeological data and theoretical constructs.

Older-style archaeological studies of finds from non-text aided sites mostly relied on the selective type series: arbitrary rather than text-inspired types still dominate some Australian historic sites artefact studies.<sup>3</sup> Such inventories from urban sites are now usually linked with computer-assisted quantification and descriptive statistical packages, but have yet to come fully to terms with tackling the interpretive dilemma. In any event urban blocks and rubbish dumps sites nowadays yield massive counts of up to nearly half a million artefacts. I want instead to look at a micro-scale investigation of a settlement site, in which each individual item mattered, and outline the methods of analysis developed to recover a different level of meaning among its discarded rubbish.

The settlement of Wybalenna on Flinders Island (Fig. 1) was occupied by the British and the Tasmanian Aborigines under their supervision from 1832 to 1847: during four years of this period G.A. Robinson was Commandant, a man who already knew the Aborigines well since he had travelled widely in Tasmania from 1826 onwards to encourage them to join him. This they virtually all did, although through disease and earlier violence and depredation the number that eventually reached Flinders Island was of the order of 150-180. Robinson kept detailed journals during his years at Wybalenna (October 1835–January 1839, with some periods away) and these, together with other miscellaneous records, provide a detailed commentary from the European viewpoint of what was, in colonial terms, an enlightened experiment in 'civilising' these indigenous people while maintaining their isolation. In the 1840s the settlement suffered financial constraints, and in 1847 was closed, the remaining Aborigines (14

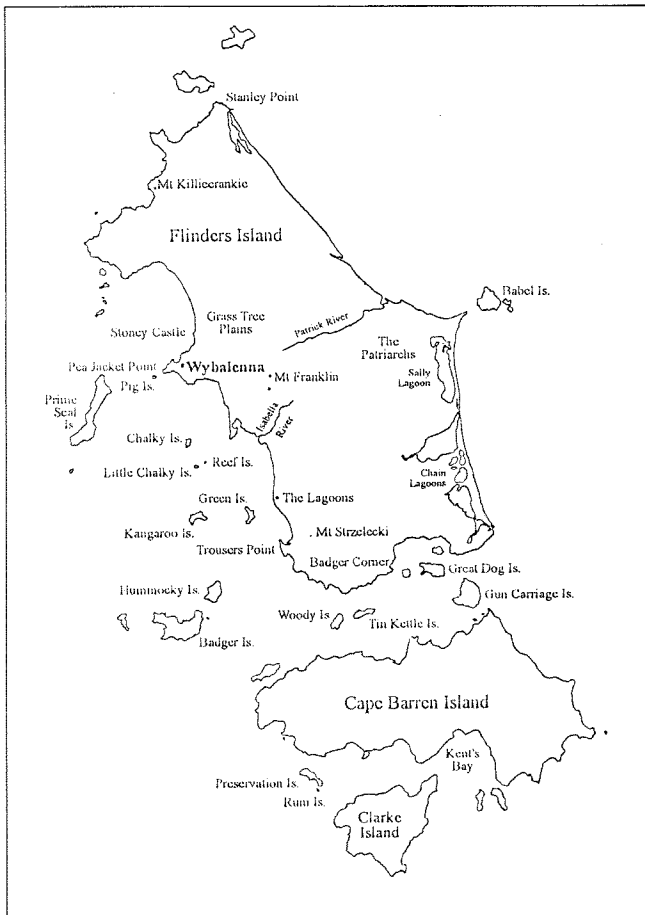


Fig. 1: Map of Flinders (Great) Island in the Furneaux Group, Bass Strait.

men, 22 women, 10 children) being removed to a disused probation station at Oyster Cove south of Hobart.

The archaeological investigation (1971) was limited to the excavation of part of a row of stone and brick terrace cottages which were known, from a map drawn in 1838 by Robinson, to have been built to rehouse the Aborigines (Fig. 2): before July 1837 they lived in dirt-floored, wattle and daub thatched huts which were seen as a primary cause of their sickness and mortality. Two one-roomed cottages and a small part of the area in front of and behind them were excavated. The architectural remains revealed two cottages of a design built in Britain for rural labourers, with stone exterior and brick partition walls, back-to-back brick fireplaces and floors of brick in one instance (Cottage 7), and partly boarded in the other (Cottage 8).<sup>4</sup> The refuse and cultural finds comprised a large quantity of animal bone and shell, and smaller numbers of mainly European-style cultural items such as tableware, bottle glass, especially bases, clay pipestems and bowls, buttons, hooks and eyes, marbles and beads and pierced stringing shells. There were a few other items such as iron knives, musket balls, three coins, glass and stone flakes, stone pounders, and various items of cutlery and kitchen use.

These were scattered both inside and outside the two cottages, and it was their distribution which initially raised the spectre of the interpretive dilemma. In Eurocentric terms, while the finds were those familiarly found on nineteenth-century colonial sites globally, their

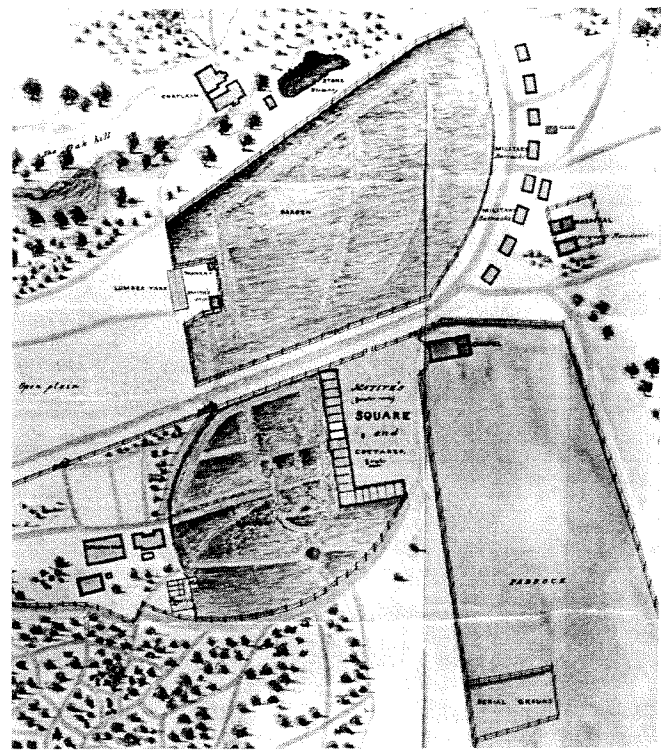


Fig. 2: Section from G. A. Robinson's *The Map of the Aboriginal Settlement at Flinders Island of 1838* in the Mitchell Library, Sydney. It shows twenty one cottages facing on to the Native Square. Robinson's numbering began at the south end, and the two cottages excavated in 1971 and in this paper numbered 7 and 8 are highlighted.

distribution on investigation related oddly to the stone and brick cottages. The same categories of finds were found throughout the site, whether inside or outside the structures, with variation only in the frequency of finds overall, and the comparative frequency of some categories of finds in relation to the rest.

The areas of high density finds were the interior of Cottage 8 and the area in front of it; areas of medium density area were in front of Cottage 7, and the interiors of Cottages 9, 10, 11.<sup>5</sup> Areas with the highest concentration of faunal remains were the interior of Cottage 7 and the south end of Cottage 11, while the area behind Cottage 7 had a medium concentration of faunal remains, especially shell (Fig. 10). \*

Quantitative analysis of the finds within a traditional empiricist framework was a necessary first step, yet such data, presented on its own, still had comparatively little to do with the recovery of meaning. The timely publication of Robinson's *Flinders Island* journals by N.B.J. Plomley in 1987 enabled identification for the first time of the occupants of these two cottages, together with a wealth of ethnohistorical material from which to construct paradigms for the interpretation of the material cultural remains they contained. Dominant ideology theory, in which Tasmanian behaviours would be considered in terms of the degrees to which they accepted or resisted the nineteenth-century colonial values imposed upon them – civilisation, christianisation, commercialisation –

\* Figures 3 to 10 have been grouped at the end of the paper.

was one obvious paradigm to explore, together with the structural implications of the architecture, landscape and visual ideology of the settlement around them. Investigation of resistance required consideration of foraging resource strategies and other ethnohistorical continuities<sup>6</sup> as well as current debates of discontinuities.<sup>7</sup> A third area of interest, since the site comprised domestic interiors for the cleaning of which, in Robinson's europeanising program, the women were to be responsible, was to look at the significance of women's activities and roles in Tasmanian interactions at the settlement: at first sight the Christian-ethic gender roles imposed by Robinson appeared at some variance with the sparse ethnographic data available for more traditional Tasmanian life-styles. To explore the application of any of these theoretical areas required precise information about the finds of a kind that had significance at the household level. The process of analysing the archaeological record had itself to be revised.

Two new lines of enquiry were developed. The first required a return to the classification and sorting stage of finds processing, on the ground that the original level of classification had been too gross. For the magnification at the household level now required, sorting by the broad functional class of manufactured goods – such as four-hole bone buttons or blue transfer-printed table ware – was not sensitive enough to contribute much beyond the fact that such a class was present.

To develop the analysis further, classification was taken to an additional level characterised as the *Set* for the purposes of the computer database. Definition of the *Set* varied according to the type of item. In the existing Sydney University system, the major variables comprise *Material* and *Function* categories.<sup>8</sup> For example alongside the *Function*-variable *Personal*, and the *Sub-Function*-variable *Buttons*, the *Material*-variable lists a choice of brass, horn and bone, pearl and crystal, and the *Function-Type* variable lists six fastening options (inserted loop shank, sew-through, two, three, four, or five holes).

The new variable *Set* was added for use where minute manufacturing or usage fingerprints could be used to discern a closer relationship between items. In dealing with buttons, for example, this was likely to relate to their having been sold as part of an individual card, or originally attached to the same garment. When sorting ceramic tableware the *Set* concept has a meaning closer to that in use colloquially today, namely, that of tableware items belonging to an identifiable fabric with identical decoration, although it does not, unless stated, indicate membership of an individually-counted set. In the category of glass beads, the *set* appeared equivalent to individual necklaces: in reference to glass bottles it could be used to identify sherds from an individual bottle where this was identifiable.

It should be noted that the process here described is in no sense taking the old 'type' classification to one further diagnostic level. The classification system described is a taxonomy, not a typology. *Sets*, like the classes (or *taxa*) within which they occur, relate specifically to the documented manufacture, commercial distribution and/or actual usage, all potentially knowable, whereas the traditional 'type' is a mental construct, and as such an artificial creation which can only serve to complicate the historical archaeological record.

Figures 3-9 show the distribution of selected finds and sets. Figures 3-5 are of various kinds of ceramic tableware, and show the distinction between the breakage of a single item (Figs 3 and 4) and a looser connection

between pieces of the same design (Fig. 5). Overall the distribution reveals that many sets are represented in the Cottages, best explained as originating from a number of individual non-matching pieces i.e. there was no wholesale purchase of a single line of cheap tableware for the Tasmanians, but rather oddments perhaps from mixed sources. Conversely, the clay smoking pipes fall clearly into sets characterised by different bowl designs. While the majority of pipe-bowl sherds are plain, four small sets have variations of masonic designs,<sup>9</sup> another five have variations on flutes, oak leaves and thistles, and another one comprises the gothic male head pipe-bowls of which examples have now been found on a number of Australian sites covering the 1830s. On the basis that the pipes were received in batches for which the reception dates of at least two are known, the distribution of individual sets should take on added significance as closely dated behavioural indicators of some sensitivity. In fact, so plotting individual clay pipe sets presents a distribution of almost bizarre randomness. Figure 6 shows, in contrast, the blandness of an undifferentiated distribution of clay pipe-bowl and pipe-stem sherds.

A comparable picture is given by the buttons. Of the total of 62 found, 58 fall into two homogeneous groups (Fig. 7). Here the impression is given of bulk ordering and a standard issue to inmates as would be expected on a government-run settlement: journal entries support that this was more or less the case, with some irregularities. Within each group further subdivision into sets is possible, in one group (brass) on the basis of mini-variation in diameter, in the other (horn) of variation in hole-boring. It is possible here that the identity of individual garments on which one or more cards of buttons were sewn is here emerging. Alternatively the concentration of buttons in front of Cottage 8 may indicate the presence of the sewing school initiated by Robinson, at which cards of buttons could be expected.

The distribution of other sets is self-explanatory, as in Figure 8, for example, showing the scatter of similar beads which appear to be from a single graduated string. An interesting example is given by one of the few bottle glass sets, showing a faceted sauce bottle broken across a space of six metres along the front of the cottages (Fig. 9).

An important aspect of such a shift in scale – from the level of bulk purchases and government-issue goods, on the one hand, to the scale of individual and household usage is that it leads to re-evaluation of other evidence at both levels. Re-examination of faunal studies previously carried out highlighted contrasts in terms of species represented in and around Cottages 7 and 8.<sup>10</sup> Of the native fauna represented, bones of the brush wallaby (*M. rufogriseus*), pademelon (*T. billardieri*), and brush-tailed possum (*T. vulpecula*) were quite abundant: ring-tailed possum, wombat, brown bandicoot and potoroo were rarer. Analysis of these remains shows first, much greater frequency of faunal material overall in and in front of Cottage 7 compared to the marsupial faunal remains in and in front of Cottage 8.<sup>11</sup> Second, there was significant species variation within each of these spaces, as shown in Figure 10. The larger species – wallaby and wombat – are likely to have been the first of the island population to be hunted into scarcity: with an average population of about 80 Tasmanians involved in hunting and collecting for sixteen years on a smallish island (1,333 km<sup>2</sup>) an overall decrease in the size of game taken is a reasonable assumption.<sup>12</sup> On this basis the contents of Cottage 7, with 127 individual wallaby represented and only 19 pademelon, would seem to represent an earlier stage of hunted food than Cottage 8, in which the ratio is

8 wallaby to 46 pademelon. The areas in front of the two cottages lie somewhere between the two. Wombat is present in Cottage 7, not in 8, while 7 also contains evidence of a minimum of three individual dogs – known to have been kept for hunting – and possibly up to nine. European species and shellfish remains were also present: they are not included here.

Thus while there is some similarity in the kind of finds from each of these two cottages the variation emerges more strongly with more sensitive analysis. It seems that the occupants of Cottage 7 were serious hunters at a comparatively early stage of the terrace occupation, and had far fewer of the kind of European goods found elsewhere: a few pipestems and bowls only, and some flakes of glass. The Cottage 8 household on the contrary had a full range of European goods and often several of each kind, while their food refuse indicated that they had continued their hunting well beyond the point when the sizable brush wallaby was still plentiful. The midden in front of the two cottages appears to represent this continuation.

In fact, as it emerged, set analysis was not directly relevant to the study of the faunal remains. What it did was to focus interpretation on behaviour of households as units, even though there was no simple, European style recognition of the household contents' paradigm visible in the overall distribution of artefacts.

Interpretation of the Wybalenna material is now beyond the dilemma stage: this discussion however was intended to present a case study in the interactive process between the effect of the questions asked of the archaeological record and the triggering of revised techniques to deal with them rather than to offer results. Wrestling with the interpretive dilemma presented by this material had many other offshoots: one unexpected consequence was to bring into question whether the normative actually existed in a situation of such complex and stressed adaptations as was occurring at Wybalenna. The current sample is small but dramatic: the archaeological implications of a non- or dis-normative paradigm need further exploration. In fact, the many insights which have emerged from the study have done so in a pluralistic theoretical setting rather than in terms of a single explanatory paradigm, a position which promises - and seems to deliver - the most rewards and the least dialectical and epistemological problems.<sup>13</sup>

## NOTES

1. Wylie 1989:18-20.
2. Leone 1977, 1984; Leone and Potter 1988.
3. For example as exemplified in the Sydney Hyde Park Barracks Museum display of the finds from that excavation.
4. Loudon 1853: 627ff, and figures 1203-4. Loudon's farm cottages are larger than Robinson's (22 feet by 16 feet internally, in comparison to Robinson's twelve by twelve), perhaps more in line with Loudon's philanthropic objectives than a reflection of British farm labourers' housing overall.
5. It should be noted, however, that the finds from these three cottages had been collected by others before the controlled excavation began: only Cottages 7 and 8, and the areas in front of and behind them, were excavated in the 1971 season.
6. Jones 1974; Hiatt 1967:8.
7. Jones 1974:321; Shanks and Tilley 1987:137-187.
8. Developed at Regentville, NSW 1985-1988 (using MINARK) and subsequently refined on various other excavations.
9. These were doubtless purchased by Robinson for the Wybalenna market in Launceston like other similar supplies. A Masonic Lodge – in this instance a travelling one – had been associated with the army in Tasmania since the second decade of the nineteenth century. However, clay smoking-pipes with masonic symbols as relief decoration were generally popular in the early mid-nineteenth century, and are recorded from various sites in Canada and the United States. They are a good reminder of the need to exercise caution in interpretation.
10. By Dr Jeanette Hope and Dr Ken Aplin, cf. forthcoming publication on Wybalenna. (Now available – Editors' note).
11. For which I am indebted to Dr Hope.
12. Visitors to the island in these years give inconsistent accounts of the frequency of game, presumably because their visits were of short duration, varied seasonality, and with a limited range of exploration.
13. Wylie 1989.

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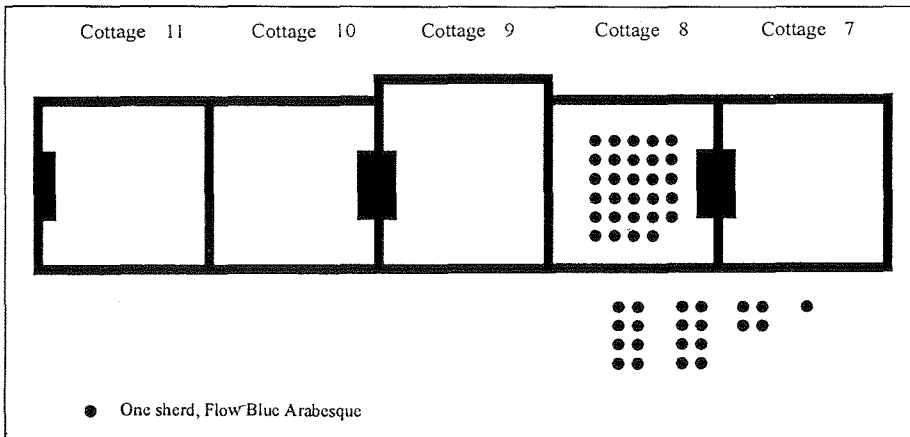


Fig. 3: Distribution of ceramic tablewares, Set Pt 9 (Flow blue bowl with arabesque design).

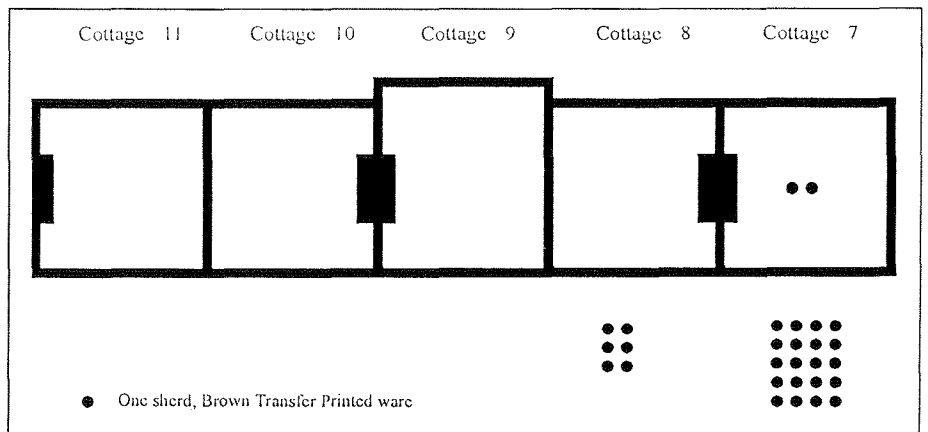


Fig. 4: Distribution of ceramic tablewares, Set B2 (Brown transfer printed design with stippled background and classical columns).

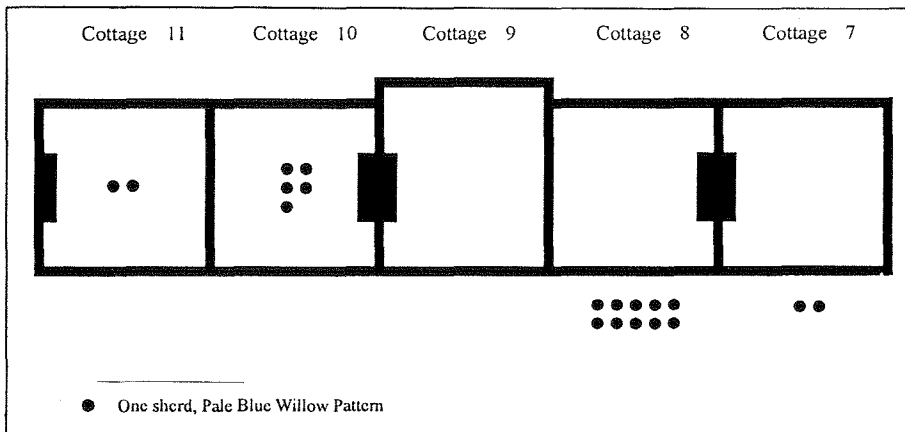
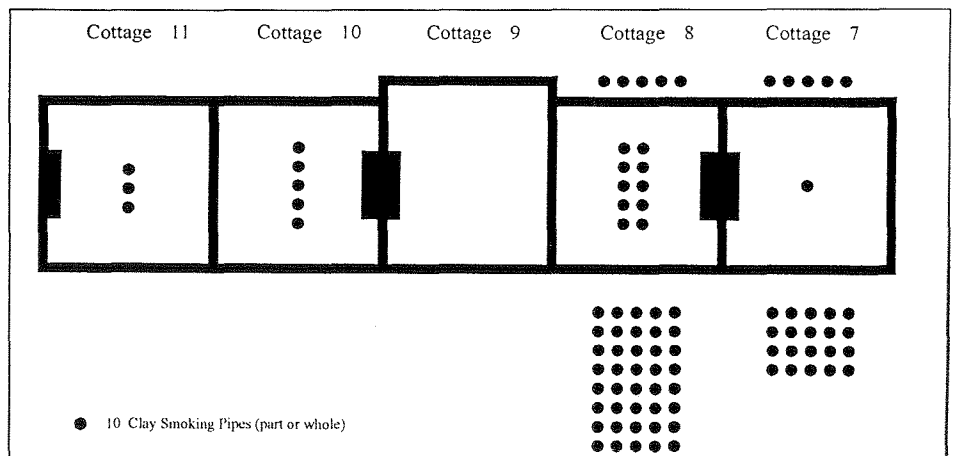


Fig. 5: Distribution of ceramic tablewares, Set B7 (Pale blue willow pattern transfer print with mosquito).

Fig. 6: Overall distribution of clay pipe stems and bowls.



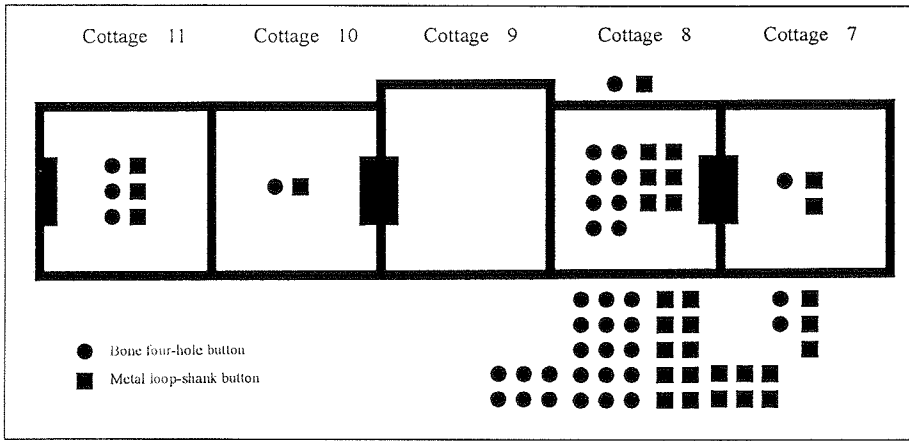


Fig. 7: Distribution of buttons (Sets B124-9).

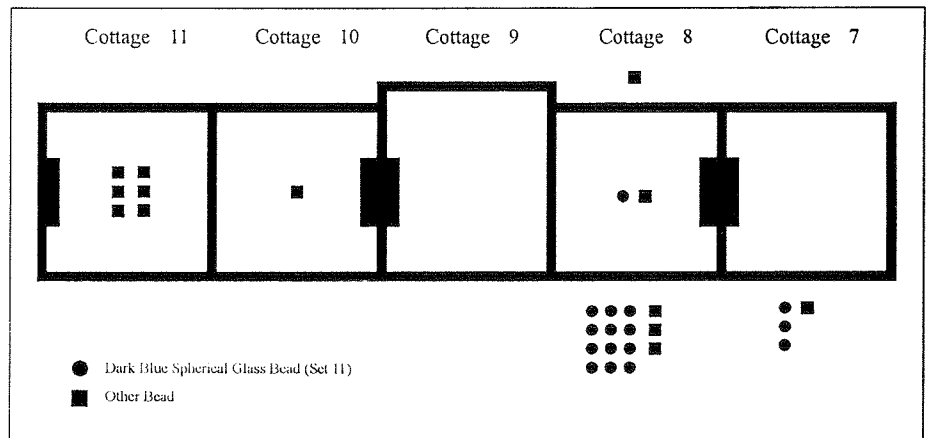


Fig. 8: Distribution of beads (Set BD11)

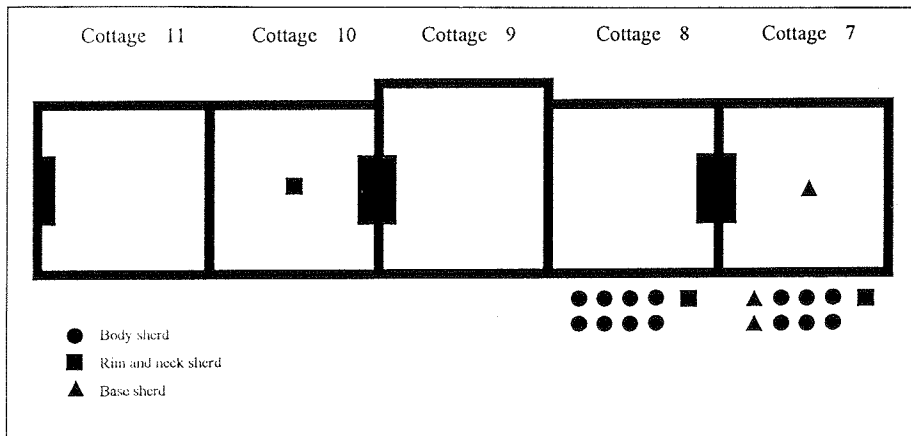


Fig. 9: Distribution of Set GB46, fragments of a faceted clear glass bottle, probably sauce or ketchup.

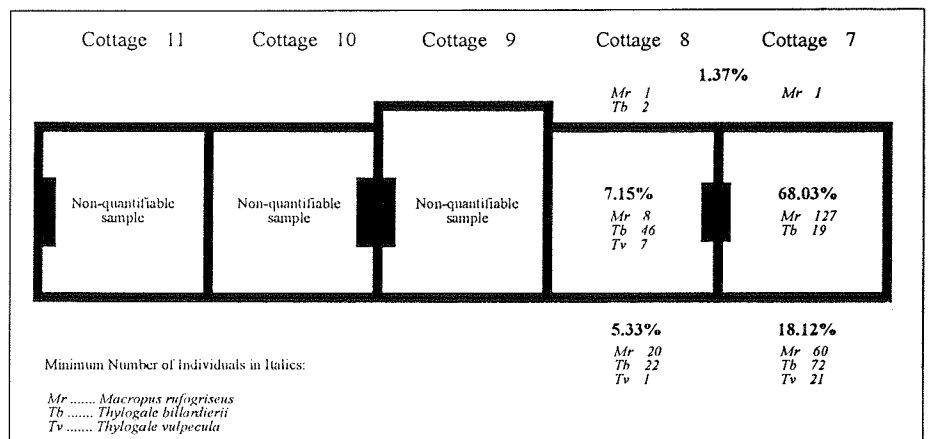


Fig. 10: Distribution by species of marsupial fauna.