



NEW ZEALAND
ARCHAEOLOGICAL
ASSOCIATION

ARCHAEOLOGY IN NEW ZEALAND



This document is made available by The New Zealand
Archaeological Association under the Creative Commons
Attribution-NonCommercial-ShareAlike 4.0 International License.

To view a copy of this license, visit
<http://creativecommons.org/licenses/by-nc-sa/4.0/>.

PREHISTORIC HAWAIIAN MATAA?

Douglas Sutton
 Anthropology Department
 University of Auckland

As Jones (1981:89) observed, "the term mataa is conventionally applied to Polynesian flaked stone tools which have a flaked tang." These are found in the Chatham Islands and the Nelson-Marlborough (Jones 1981) area of New Zealand, on Easter Island (Mulloy 1961).

In New Zealand Taylor (1984:192; Fig.20a, b) identified two mataa in the Twilight Beach midden (N1 + 2/976) near Cape Maria van Diemen. One of these is in obsidian and lacks the deliberately and bilaterally reduced tang which is diagnostic of mataa. The other is in chert and of typical mataa form. A large mataa, now in the Auckland Museum (catalogue number 36866), was found "on sand dune site" beside Lake Otutaua on the South Kaipara Head. Its measurements are given in the museum ethnology catalogue as "blade 6-3/8", L. 5-.1/2". Petrological examination of this artefact might determine its geological source and is therefore warranted.

Mataa have clear morphological similarity to the 'wasted blades' from Melanesia and the Western Pacific (Bulmer 1977). While, "Adzes similar in form to mataa are known from Pitcairn Island and Easter Island" (Jones 1981:101).

Jones (1981:89) argued that,

"The distinctive butt modifications or tang was probably designed to make it easier to hold the tool in the hand, rather than for hafting. The modification is most plausibly explained as an adaptation of a generalised East Polynesian adze manufacturing tradition."

Despite the contention that mataa originated from a generalised and by implication ancient, Polynesian technology, "no specimens are reported from central or marginal Polynesia" (Jones, 1981:101).

With this conundrum in mind I was interested to see in Pat Kirch's (1985:Fig.46) book on Hawaiian prehistory an object recovered from the Bellows Dune Site on O'ahu, which although identified as an awl, might be mistaken for a small mataa. It is shown with the pole or tang pointing down on the assumption that the pole was the working end. However, if I had found it in the Chathams, and if there was no apparent use wear on the pole this artefact might well have been described as a mataa.

I note that:

1. the end of the pole is approximately 7 mm wide and square, not pointed as normal in an operational awl;
2. the shoulders or 'proximal margins' and 'distal edges' in Jones' (1981:Fig.1) nomenclature of the Hawaiian artefact appear to be sharp enough to be used for cutting or tearing;
3. irregularities in these edges may be due to breaks during use rather than the process of manufacture;
4. the Hawaiian artefact measures ca. 60 mm (maximum length; end of pole-distal edge) by ca. 55 mm (maximum width). The pole is 20 mm wide at its base, narrowing to 7 mm at the point. It is therefore, only a little smaller than the smallest of the mataa Jones (1981:Fig.1b and c) illustrated. These were both from the Chathams. They are: D63.878 OM Tioriori chert length 59 mm; butt width 20 mm; D19.261 OM Maipito chert length 67 mm, no discrete butt.

Clearly, consideration of the Bellows 'awl' may be warranted. Significantly in terms of Jones' (1981 definitions of mataa it shows secondary flaking along the point. Furthermore, it is quite similar to a specimen from Kuli'ou'ou, O'ahu, illustrated by Emory and Sinoto (1961:66).

If use-wear is not detectable on the pole this could be a classificatory mataa and perhaps even a functional one. Its provenance within the Bellows site needs to be considered. The artefact is described as a stone drill in the site report (Pearson, Kirch and Pietruszewsky, 1971:225-6, Fig.9.e) and as one of "Four specimens [which] are like stone drills, although only two are finished, the other two being broken during manufacture." The one discussed in this paper is from Layer III, dated by Tuggle et al. (1978) to 323-447 A.D. Unfortunately it is the only one of the four Bellows site specimens which is illustrated. The early provenance for this 'awl' matches the widespread and problematic distribution of the mataa form within Polynesia.

Chronology aside, identification of mataa in Hawaii would tend to confirm Jones (1981:89) view that this form is an adaptation of a generalised Polynesian technology.

References

- Bulmer, S. 1977 Waisted blades and axes. Pp.440-459 in R.V.S. Wright (ed.) Stone Tools as Cultural Markers. Prehistory and Material Culture Series 12. Australian Institute of Aboriginal Studies, Canberra.
- Emory, K.P. 1961 Hawaiian Archaeology: Oahu Excavations. and Y. Sinoto Bishop Museum Special Publication 49. Honolulu, Hawaii.

- Jones, K.L. 1981 New Zealand mataa from Marlborough, Nelson, and the Chatham Islands. N.Z.J. Arch. 3:89-107.
- Kirch, P.V. 1985 Feathered Gods and Fishhooks. University of Hawaii Press, Honolulu.
- Mulloy, W. 1961 The ceremonial center of Vinapu. Pp.93-180, in T. Heyerdahl and E.N. Ferdon (eds) Reports of the Norwegian Archaeological Expedition to Easter Island and the East Pacific, Vol.1. Allen & Unwin, London.
- Pearson, R.J. 1971 An early prehistoric site at Bellows Beach, Waimanolo, Oahu, Hawaiian Islands. P.V. Kirch and M. Pietrusewsky A.P.A.O. 6:204-34.
- Taylor, M. 1984 Bone Refuse from Twilight Beach. M.A. Thesis, Anthropology Department, University of Auckland
- Tuggle, H.D. 1978 Volcanic glass hydration rind age determination for Bellows Dune, Hawaii. R. Cordy and M. Child N.Z.A.A. Newsletter 21:57-77.