

ARCHAEOLOGY IN NEW ZEALAND



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A SECOND BURIAL WITH MOA EGG FROM KAIKOURA

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Introduction

The discovery in 1857 of a human skeleton with a moa egg and artifacts at Kaikoura is well known. It was reported in newspapers (e.g. Figure 1) and journals at the time, and has been referred to on many subsequent occasions, with more definitive 20th century reports by Dell and Falla (1972) and Trotter and McCulloch (1993a). The main reason that it has attracted so much continuing attention is doubtless the size of the almost complete egg, larger by far than any other yet recorded – though this may be a reflection on the lack of moa egg research rather than its apparent uniqueness. Initially, however, its primary association with a human burial was a matter of intense interest.

Mr. Fyfe had found a Moa's egg, at the Kai Kora's, while digging the foundation for his store. It is a foot long, about 6 inches in diamater, and 27 inches in circumference. The shell is the 16th part of an inch in thickness. A hole is drilled in the end of it, and the egg must have been considered of great value by the natives, as it was found deposited at the head of a skeleton, with a number of very large poenamu axes. Mr. Fyfe, we understand, is going to send them home to the British Museum.

Figure 1. One of the earliest published reports of the first Kaikoura burial with a moa egg was in the Lyttelton Times on 5 August 1857. (Courtesy National Library of New Zealand.)

What is less well known is that a second burial with a moa egg was found about 300 m away some 137 years later.

How this came about was that in January 1993 Beverley McCulloch and I, with a small team of volunteers, had uncovered a series of placed whale vertebrae on the side of the Waiopuka Stream, just a little south of the Fvffe's site

where the moa egg and burial had been found. We interpreted these vertebrae as being the remains of an early woolshed, which we recorded as site number O31/64 and described it in our published report, "The Waiopuka woolshed" (Trotter and McCulloch 1993b).

Close to the southeast side of the woolshed a post made from a whale jaw-bone had been broken off just below ground level. Thinking that this might be part of associated sheep-yards, we returned in February the following year to explore this possibility. Figure 2 shows the 1994 excavated squares in relation to the whale vertebrae piles of the woolshed, with the location of the post being shown in square M7.

On this occasion our helpers were mainly participants in a 'Kaikoura Summer School in Archaeology and History' that we were then running for the Centre for Continuing Education at the University of Canterbury, though there was also some local participation.

In the event, no evidence of the hoped-for sheep-yards was found, but we did uncover a human burial with the remains of a moa egg at its chest, and quite a lot of other evidence of early Māori occupation. To differentiate this from the adjacent European woolshed it was given site number O31/80. A report on this was written at the conclusion of the excavations, but in a recent search, no copies of it could be found – though it was, and still is, referred to on the site record form. This has now been rectified (Trotter 2013).

The archaeological setting

The narrow coastal platform around the Kaikoura Peninsula abounds in archaeological evidence of Māori occupation, varying in age from early moa hunting times to European contact. And in the area around Waiopuka a number of European sites have been recorded, ranging from Fyffe's Waiopuka whaling station of the 1840s to others dating into the 20th century.

Of special significance in the present context is site O31/30, usually referred to as the Fyffe moa-hunter site, which included the human burial with a complete drilled moa egg that was found in 1857 (Trotter and McCulloch 1993a). This was uncovered while preparing the ground for a store at what is now known as Fyffe House, a distance of just under 300 m to the northeast of the burial we found in 1994.

The adjacent woolshed site investigation was not a full excavation; for the most part we simply removed the turf to locate the whale vertebrae piles that had been set in the ground (Trotter and McCulloch 1993b). Nevertheless, cultural material of both European and Māori origin was found while clearing around the vertebrae

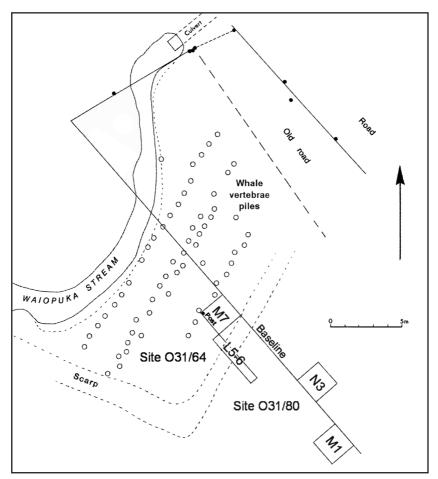


Figure 2. 1994 excavations (site O31/80) in relation to whale vertebrae piles of the Waiopuka Woolshed (O31/64).

Landscape

The Waiopuka site is situated on a 50 m wide raised beach deposit of sand and limestone gravel that sits on a sea-cut mudstone platform at the base of the upraised mudstone and limestone formation of Kaikoura Peninsula. The present ground surface overlying this platform rises gently at less than three degrees slope to the base of the peninsula hills, where it attains its maximum height of no more than 5 m above the present sea level.

The present-day sealed road runs behind Armers Beach, and inland from it is evidence of an earlier unsealed road, which was used until the middle of the 20th century. The archaeological site, in turn, is inland from that road (see Figure 2).

1994 excavations

In 1993 a 2 m grid system had been used to facilitate recording of archaeological evidence relating to the historic woolshed. The same grid was used in 1994 and three 2 m squares (designated M1, M7 and N3), plus two part squares that formed a 'trench' (L5, L6 – Figure 3), were laid out and excavated; these are marked on the plan in Figure 2.



Figure 3. Excavating part squares L5-L6.

Square M7 and part of the L5-6 trench were within the area of ground that had been partially levelled for the woolshed back in the 19th century but their general stratigraphy was otherwise much the same as in squares M1 and N3

In all squares there was a 'turfy' layer of blackish loamy soil (not quite so dark in M7) about 15 cm thick overlying small limestone pebbles in a loamy soil matrix, the pebbles being part of the raised beach deposit. The top 15 cm is thought to be due largely to the upward migration of finer components of the soil due to the action of soil fauna plus some run-off from the hill, which starts

to rise about 30 m inland from the site. There was very little cultural material in this layer, but it did include some relatively recent objects (including some live rifle ammunition!).

From 15 to 20 cm there was a general mixture of both Māori and European material – shells, fish bones, bird bones, seal teeth, dog teeth, moa bone, pieces of fish-hooks, flakes of argillite and flint, all of Māori origin, together with pieces of whale bone, sheep bones, crockery, opalised glass, nails, etc., from early European times.

Cultural material found deeper than 20 cm was nearly all from Māori occupation, though there was no distinct horizon between this and that of European derivation. All the Māori material was comparable with that found at the Fyffe moa hunter site less than 300 m away that we had excavated during the 1980s - there were no artefacts of 'Classic' type nor was there evidence of the use of materials such as greenstone or human bone that became common in later times.

In square M7 a human burial was uncovered and the Kaikoura upoko rūnanga (Bill Solomon) was notified. Excavation continued and when finished the bones were handed over for reburial by the rūnanga.

The body had been interred in a folded position, facing slightly west of due south, more or less in a crouched sitting position in a shallow rounded hole. Her knees had been brought up to her chest with her forearms in behind them, and with the moa egg close to her chest. Over time her right knee had moved inside the left, and her upper body had twisted and dropped to lie more on her right side, her head still facing south but now closer to her right foot. It was probably at this time that the moa egg collapsed into many small pieces.

Some details of the skeleton are: left femur 421 mm, right femur 424 mm, left tibia 338 mm, right tibia 341 mm, left humerus 294 mm, (the right humerus was incomplete), left fibula 318 mm, right fibula 321 mm, left ulna 238 mm, right ulna 244 mm. Using the formulae developed by Houghton et al. (1975), these measurements make her a fraction over average height at around 1.625 m or 5 ft 4in. There were some pregnancy pits on the pubic bones. There were bone cavities by both lower first molars and extreme wear on the teeth, which is unusual for moa-hunter times.

Bony growths occurred on some of the finger bones, there was lipping on some vertebrae, and three of the thoracic vertebrae (10, 11, 12) were misshapen; the coccyx had broken and fused at a 30o angle to the sacrum. All this would suggest that the woman was fairly elderly, yet surprisingly, the epiphyses of the tibiae had not fused very tightly.

An AMS radiocarbon date from a Euryapteryx femur sample near by gave a conventional radiocarbon age of 660±26 BP, that is, around the mid-14th century (Figure 4).

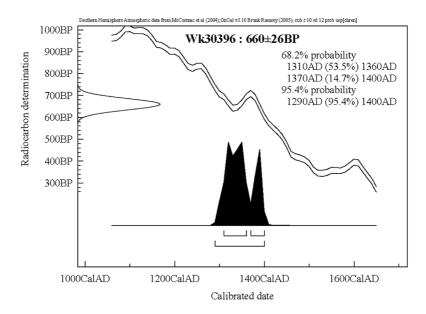


Figure 4. Waiopuka radiocarbon date.

I have not tried to reassemble the pieces of the broken moa egg, but they did not look any different from the pieces commonly found on early sites – the egg was unlikely to have been as large as the 1857 one.

With the exception of the human bones from the burial, all cultural and faunal material, together with artefacts and most field photographs, is stored at the Canterbury Museum in Christchurch, where Amy Findlater assisted in locating material and Paul Scofield in preparing the radiocarbon sample. Special thanks to the Rūnanga o Kaikōura for encouraging me to produce this report on the excavations.

References

Dell, R. K. and Falla, R. A., 1972. The Kaikoura moa egg. Dominion Museum Records in Ethnology 2(9): 97-104.

- Houghton, P., Leach, B. F. and Sutton, D. G., 1975. The estimation of stature of prehistoric Polynesians in New Zealand. Journal of the Polynesian Society 84(3): 325-336.
- Lyttelton Times, 1857. [Notice of the discovery of a moa egg at Kaikoura.] 5 August 1857, page 5.
- Trotter, M. and McCulloch, B., 1991. The Fyffe Historic Precinct, Kaikoura. Canterbury Museum, Christchurch.
- Trotter, M. and McCulloch, B., 1993a. Fyffe's revisited. Records of the Canterbury Museum 10(7): 73-94.
- Trotter, M. and McCulloch, B., 1993b. The Waiopuka woolshed. Records of the Canterbury Museum 10(9): 107-116.
- Trotter, M., and McCulloch, B., 1999. Archaeology of the Fyffe Historic Area. Archaeology in New Zealand 42(1): 44-56.
- Trotter, M., 2013. Report on excavations at the Waiopuka moa-hunter site, Kaikoura, 1994. Unpublished report.