

The Kalgoorlie whale bone, a probable example of long range Aboriginal transport of a marine object

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Introduction

A disc-shaped whale bone found in 1897 at an inland Aboriginal campsite 20 km south of Kalgoorlie, Western Australia (Figures 1, 2) suggests the diversity of marine and other objects distributed through long-range tribal exchange networks. The collector of the whale bone, the late Mr Christopher George Jessup (1881-1962), was 16 years old at the time, and later became a well known and respected naturalist in Western Australia. In his obituary Mr Jessup is noted as having "... formed extensive collections [from which] much carefully labelled material was passed on to local and overseas scientists and institutions". (Butler 1963: 195). At the time of Mr Jessup's death in 1962, Mr W.H. Butler, a close acquaintance, selected the most valuable, best documented specimens from the Jessup collection for donation to the Western Australian Museum (W.H. Butler, pers. comm.). The whale bone is one of these donated specimens, and there seems little reason to doubt the authenticity of its provenance.

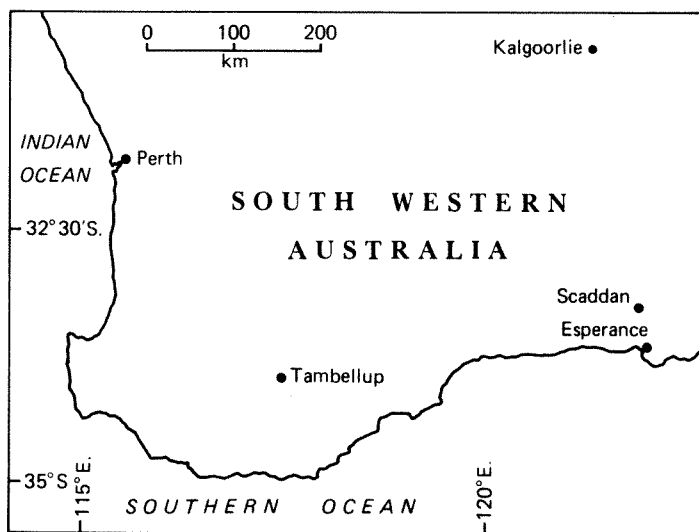


Figure 1 South-western Australia with localities mentioned in the text.

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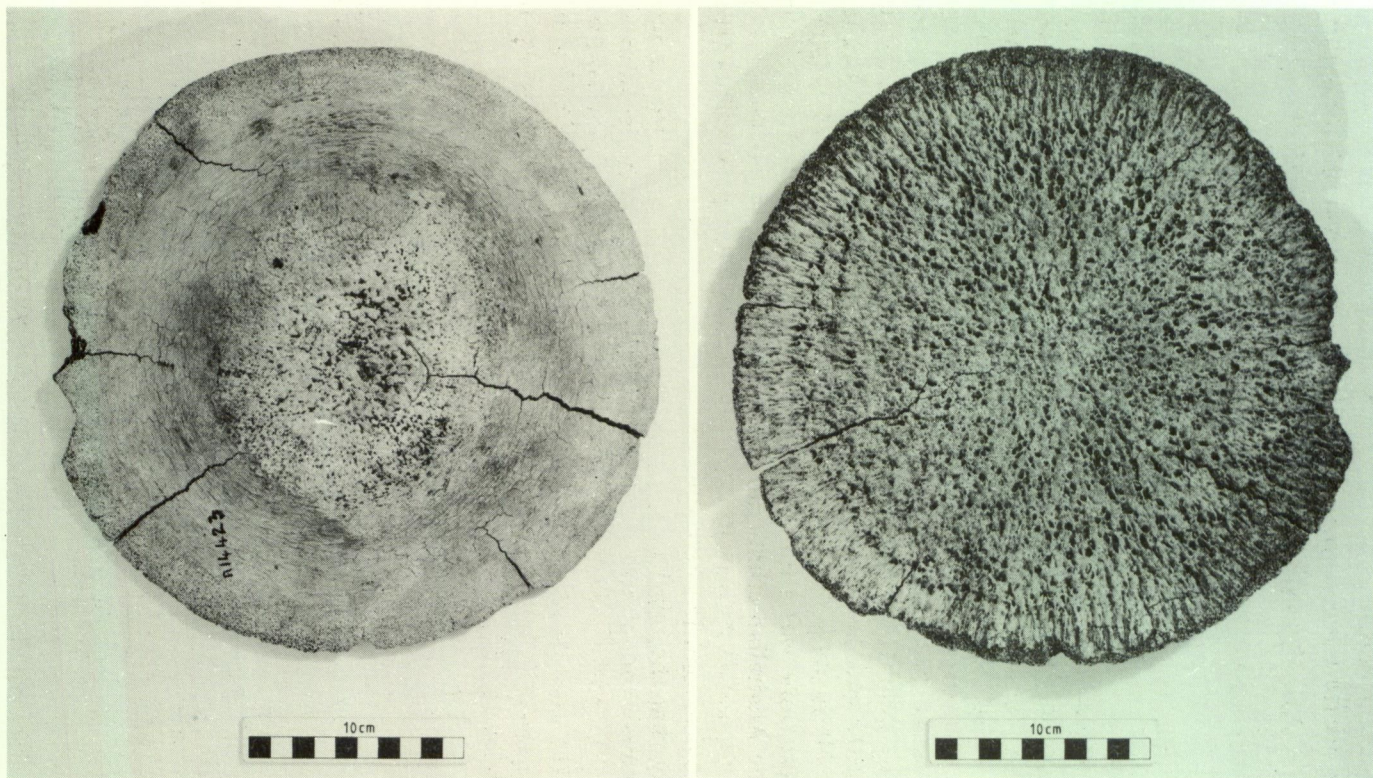


Figure 2 The Kalgoorlie whale bone (vertebral epiphysis), outer surface (left) and inner surface (right). Photographs by Douglas Elford.

The Kalgoorlie whale bone

The bone specimen (A14423, Figure 2) is a flattened disc 28-28.5 cm in diameter, 2.2-2.4 cm thick and weighing 1143 g. It is described in the anthropology register as a 'bone pitch', and it is likely that Mr Jessup had referred to it as a 'pitch' or carrying dish. The common Western Desert term for the traditional wooden carrying dish is 'piti' (Douglas 1977: 19; Glass 1975: 24), and 'pitch' is a recognised variant.

Mr J. Bannister, Director of the Western Australian Museum, has identified the bone as a vertebral epiphysis, judging by its size and circular shape probably from one of the caudal vertebrae of an immature whale. The species to which the bone belongs is uncertain, though Southern Right Whale (*Eubalaena australis*), Humpback (*Megaptera novaeangliae*) and Sperm Whale (*Physeter macrocephalus*) all occur off the coasts of south-western Australia, and were hunted commercially or could otherwise have been washed ashore or stranded (J. Bannister, pers. comm.). The specimen, stabilised in 1986 by mean of vacuum impregnation in 10 per cent PVA (I. MacLeod, Conservation Department, Western Australian Museum, pers. comm.) is radially split in several places but is otherwise in good condition, and shows no signs of artificial modification, e.g. incisions or abrasions. It is questionable whether the bone was a domestic utensil, i.e. a 'pitch', and I have found no reference in the Australian ethnographic literature for the use of whale epiphyses or other large bones as dishes or bowls. It seems equally possible that the bone was of mythological significance.

It is unlikely that the relatively unweathered bone was more than a few years old when collected, though this does not seem to offer any choice as to whether it reached the Kalgoorlie area through Aboriginal barter, or was taken there by a European. In any case its presence at an Aboriginal campsite in 1897 is evidence that it had been acquired by an Aboriginal group, either before or during the gold rushes of the 1890s.

Discussion

It seems impossible to determine the whale bone's marine source, whether the Southern Ocean coast some 350 km south of the find site, or the Indian Ocean nearly 600 km to the west (Figure 1), or even more distant coasts to the south-east and north-west. Regarding the first named and nearest coast one should note Tindale's summary of direct contact and cultural diffusion between the inland and coastal Aboriginal tribes, particularly those coastal people living east of Esperance, in this part of Western Australia in the late nineteenth and early twentieth centuries (Tindale 1974: 41, 78; map). There is no such evidence for contact between the Aboriginal groups of the Kalgoorlie area and those living on the Indian Ocean coast to the west, moreover, there are major linguistic and cultural differences between the tribes of the two regions (Tindale 1974: 41, 143; map). Though not indicating the whale bone's place of marine origin or its mode of

transport inland, Tindale's data do lend plausibility to any supposition that the bone derives from an Aboriginal group on the Southern Ocean coast.

The occurrence of an object of marine origin at an inland Aboriginal site is not unusual. There is ample ethnographic evidence for the movement of material goods, including marine objects, over long distances in the inter-tribal exchange networks of Aboriginal Australia (e.g. McCarthy 1939; Berndt and Berndt 1968: 107-119; Mulvaney 1976). In terms of the extent and relative densities of their continental distributions, two of the most impressive exchange items of whatever origin were baler and pearl shells, which were carried hundreds of km inland from their marine sources in northern Australia (McCarthy 1939: Map 14; Mountford and Harvey 1939; Mulvaney 1975: Figs 14, 15; 1976: Maps 4, 5). Numbers of these transported shells are housed in the archaeology and anthropology collections of the Western Australian Museum, e.g. B6697, a baler shell fragment (*Melo* sp.) from the Sandford River near Cue, 350 km east of the Indian Ocean coast. Several other, probably sub-fossil shells and other marine biota collected at inland localities are in the palaeontology collection (e.g. 69.944, a fragment of coral — *Fungia* sp. — from Tambellup: Figure 1), though none of these palaeontological specimens is known to come from an Aboriginal site.

Assuming the reliability of its cultural provenance, can it be determined that the whale bone was an object of long range barter within a traditional exchange network? Or did the bone find its way to Kalgoorlie merely through unstructured intra-Aboriginal or Aboriginal-European contact taking place under the disordered and, for the Aborigines (Bolton 1981: 125), chaotic conditions of the gold rushes? Unless new information comes to light, e.g. relevant diaries or letters, the choice will be conjectural. Indeed, the Kalgoorlie whale bone could be interpreted as being as obdurately enigmatic as the Scaddan implement, an Acheulian handaxe (i.e. a Palaeolithic stone implement) of European origin found in 1930 near Scaddan, a small community on the route between Kalgoorlie and Esperance (Figure 1; Dortch and Glover 1983; Tindale 1949). There is, however, a difference between these two very unusual finds, and this is that the bone is a potentially important archaeological specimen, since it could have been traded in a hitherto undocumented regional exchange system in which large or unusual marine objects were carried long distances.

Acknowledgements

I thank the Western Australian Museum staff who assisted in the preparation of this note, particularly John Bannister and Mancel Lofgren for reading the manuscript. I also wish to thank members of the Jessup family and Harry Butler for information about the late George Jessup.

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Corrigendum

McNamara, K.J. 1987. The holasteroid echinoid *Echinocorys* from the Maastrichtian of Western Australia. *Rec. West. Aust. Mus.* 13(3): 419-426.

On page 421 the paratype number of *Echinocorys stomias* given as WAM 84.443 should read 84.433. 84.443 is a specimen of the ammonite *Pachydiscus (Pachydiscus) neubergicus dissitus* Henderson & McNamara, 1985, from the same formation as *E. stomias*.

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Reviews, observations and results of research into all branches of natural science and human studies will be considered for publication. However, emphasis is placed on studies pertaining to Western Australia. Full length papers should not normally exceed 30 typed pages. Short communications should not normally exceed three typed pages and this category of paper is intended to accommodate observations, results or new records of *significance*, that otherwise might not get into the literature, or for which there is a particular urgency for publication. All material must be original and not have been published elsewhere.

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Synonymies should be given in the short form (taxon, author, date, page) and the full reference cited at the end of the paper.

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The original and two copies of manuscripts and figures should be submitted to the Editorial Committee, c/- Publications Department, Western Australian Museum, Francis Street, Perth, Western Australia 6000. They must be in double-spaced typescript on A4 sheets. All margins should be at least 30 mm wide. Tables plus headings and legends to illustrations should be typed on separate pages. The desired positions for insertion of tables and illustrations in the text should be indicated in pencil. Tables should be numbered consecutively, have headings which make them understandable without reference to the text, and be referred to in the text.

High quality illustrations are required to size (13.5 cm x 18 cm) or no larger than 32 cm x 40 cm with sans serif lettering suitable for reduction to size. Photographs must be good quality black and white prints, 13 cm x 18 cm (5 inches x 7 inches). If scale line and lettering are required on photographs *do not* place directly on to print. They should be positioned on a clear paper or film overlay. Scale must be indicated on illustrations. All maps, line drawings, photographs and graphs, should be numbered in sequence and referred to as Figure/s in the text and captions. Each must have a brief, fully explanatory caption.

In papers dealing with historical subjects references may be cited as footnotes. In all other papers references must be cited in the text by author and date and all must be listed alphabetically at the end of the paper. The names of journals are abbreviated according to *World List of Scientific Periodicals*. The use of 'unpublished data' or 'personal communication' is discouraged.

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The senior author is sent two sets of galley proofs (one to be retained) and one set of page proofs which must be returned promptly.

The senior author will receive fifty free offprints of the paper. Additional offprints can be ordered at page proof stage.

CONTENTS

T.K. Qin

A new species of mealybug (Insecta: Homoptera: Pseudococcidae) from Western Australia 1

O. Gon

Redescription of the holotypes of *Vincentia conspersa* (Klunzinger, 1872) and *Apogon punctatus* Klunzinger, 1879. (Pisces, Apogonidae) 7

Mark S. Harvey

A new troglobitic schizomid from Cape Range, Western Australia (Chelicerata: Schizomida) 15

B. Vine, B. Knott and W.F. Humphreys

Observations on the environment and biology of *Schizomus vinei* (Chelicerata: Schizomida) from Cape Range, Western Australia 21

D.J. Kitchener and N. Caputi

A new species of false antechinus (Marsupialia: Dasyuridae) from Western Australia, with remarks on the generic classification within the Parantechini 35

D.J. Kitchener

A new species of false antechinus (Marsupialia: Dasyuridae) from the Kimberley, Western Australia 61

Patricia J. Kailola and Bryan E. Pierce

A new freshwater catfish (Pisces: Ariidae) from northern Australia 73

Rob Manning

Two new species of *Metapenaeopsis* (Crustacea: Decapoda: Penaeidae) from south Western Australia 91

Stephen D. Cairns

New records of Stylasteridae (Cnidaria: Hydrozoa) from Western Australia, including the description of two new species 105

G.M. Storr

The *Diplodactylus ciliaris* complex (Lacertilia: Gekkonidae) in Western Australia 121

SHORT COMMUNICATIONS

G.M. Storr

A new *Rhinoplocephalus* (Serpentes: Elapidae) from Western Australia 137

G.M. Storr

A new *Ctenotus* (Lacertilia: Scincidae) from Western Australia 139

John A. Long

?*Campbellodus* sp. (Placodermi: Ptyctodontida) from the Upper Devonian Napier Range, Canning Basin 141

C.E. Dortch

The Kalgoorlie whale bone, a probable example of long range Aboriginal transport of a marine object 145