

# A DINGO BURIAL FROM THE ARNHEM LAND PLATEAU

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## Abstract

The skeleton of a mature dingo was found wrapped in paperbark and cached on a ledge in a rockshelter on the Arnhem Land plateau. Such burials have not previously been recorded from the region and are considered uncommon by contemporary Jawoyn elders. Radiocarbon dating of a vertebra from the skeleton provided a conventional radiocarbon age of  $77 \pm 35$  BP. This finding is discussed in relation to other recorded aspects of the dingo's relationship with humans in the ethnography and also its presentation in the rock art of Arnhem Land and elsewhere in Australia.

## Introduction

In 2005, the Jawoyn Association, Katherine, began an ambitious programme to document Jawoyn cultural heritage, incorporating language, oral histories, place names, plant and animal uses, and sites of significance. The latter included the location and recording of rock art sites across current Jawoyn lands (Gunn and Whear 2007). It was during the documentation of rock art sites that the remains of a mature dingo were located at site complex ARN-0107, within the Arnhem Land plateau (Figure 1). The remains were wrapped in paperbark and secreted on a rock ledge in a manner similar to human bundle burials. This burial and the surrounding cultural features are described, followed by a general discussion of the association between dingoes and Aboriginal people. Although the dingo features significantly in Aboriginal mythology in most areas of Australia (Berndt and Berndt 1977), and was well-known as a hunting and camp companion prior to the introduction of the camp dog (Davidson 1981), formal burials of dingoes have only rarely been encountered (Pardoe 1996). While burials of other animal species have yet to be reported elsewhere in Australia, the ochred bones of kangaroo, emu and crocodile are commonly found within ceremonial arrangements (*kalngbuy*) on the plateau (Gunn 1992a:185). Senior Jawoyn elders today consider the burial of an adult dingo in this manner to be most unusual (Lily Bennet, Margaret Katherine, Sybil Ranch and Elizabeth Rankin, pers. comm., 2008).

## Context and Cultural Landscape

The burial was found towards the centre of the extensive Arnhem Land plateau, and lies within Jawoyn lands some 160km northeast of Katherine and 200km southeast of Darwin (Figure 1). The plateau surface has large exposures of bare horizontally bedded sandstone which contain numerous rockshelters that house the densest concentration of rock art in Australia (Chaloupka 1993; Edwards 1979). The land is managed by various land trusts under the umbrella of the Jawoyn Association, Katherine.

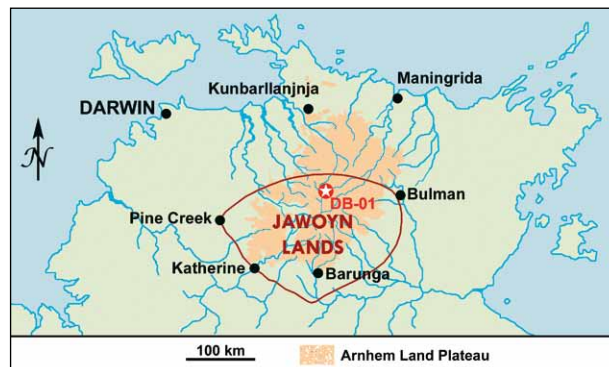


Figure 1 Location of the dingo burial site (DB-01) and the extent of Jawoyn lands.

The climate of the region is monsoonal, with a distinct bi-seasonal division between the wet and dry season (Russell-Smith *et al.* 1995; Wiynjorrotj *et al.* 2005). Such conditions are not favourable to the survival of bone or other organic materials.

The shelter housing the dingo burial is in an isolated and distinctive rock stack within the headwaters of the Katherine River. As well as the burial and associated rocks, the shelter contains a small number of faint paintings, a beeswax design and wooden pieces. The faint white paintings appear to be of considerable age and consist of early-style dancing figures with headdresses superimposed over a red macropod (cf. Chaloupka 1993). The beeswax designs comprise a group of three small dots aligned in a horizontal row, three irregularly placed dots, and two larger wax lumps fixed near the base of the wall. These are consistent with other beeswax motifs elsewhere on the plateau, most of which date to the last 500 years (Nelson 2000).

Thirteen rockshelters with artwork and other evidence of use were located in a dissected outcrop to the north of the burial site (site complex ARN-0107; Figure 2). While numerous rockshelters occur here, occupation appears to have been concentrated on the perimeter rather than in the central area where the burial is located. The two major art shelters are adjacent to each other and have substantial occupation deposits. One also contained a carved wooden object of unknown function. The fine cut marks on the object suggest the use of a steel blade and therefore a post-contact age. Within the same complex there is a small painting of a figure standing arms akimbo and apparently wearing a brimmed hat; this is interpreted as a representation of a post-contact figure. These artefacts indicate that the shelter complex had been used during the contact period from AD 1850 to 1950. Motifs here, from the earliest plateau styles, suggest that the complex has been utilised over the past 10,000 years (Chippindale and Taçon 1998).

To the southeast, another site complex lies within a second outcrop of closely-packed rock stacks (ARN-0113; Figure 2). The 35 rockshelter sites are concentrated along the western side of the outcrop and at the northern end of a central 'natural passage' through the stacks. Most of the more common Arnhem Land rock art styles are represented (cf. Chaloupka 1993) but the

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major art site with over 150 paintings, more than three times the amount of artwork of any other shelter, contains the only large corpus of recent paintings. This is also the only shelter within the complex with substantial charcoal-rich floor deposits.

This evidence indicates that both site complexes were in use around the time of the dingo burial. However, unlike the northern complex where evidence for recent use is widespread, recent occupation in the southern complex was largely restricted to the roomiest of the shelters. The singular occurrence of the dingo burial indicates its exceptional nature, and its isolation away from general occupation shelters (unlike human burials which are often within major occupation sites) suggests that it was also a somewhat private or personal practice. Hence, while it may possibly be the relic of a discontinued ritual unknown to present Jawoyn elders, it may also, as suggested by them, reflect the idiosyncratic behaviour of a particular individual.

### The Dingo Burial

The dingo burial was placed in a small but locally prominent capped-pillar shelter (Figure 3). As with human bundle-burials, the dingo was wrapped in paperbark and placed on a high ledge, and then closed in with a number of rocks to prevent disturbance. Following this, three logs, all of which had been partially burnt, were placed on the ledge. Whether this association was intentional or fortuitous is unknown, because logs were often stored in shelters for use as firewood during the wet season (P. Bolgay, Jawoyn elder, pers. comm., 2006). In the process of recording, the three logs were removed, photographed, and then the three outer rocks were moved to one side, allowing the upper sheet of paperbark to be removed (Figure 4). The revealed bones were photographed *in situ* but, with the exception of the skull, not further disturbed. The skull was removed and photographed for identification purposes and then replaced. Many of the small bones were still present and the larger bones and vertebrae were roughly in a position of articulation, indicating that the body of this dingo was wrapped whole and placed on the ledge soon after death. The burial was placed with the head of the dingo farthest into the cleft. Neither the skull nor any of the bones had been ochred. The skull, which was 180mm long, 62mm wide, and 98mm high, showed no evidence of trauma and the teeth were well worn, suggesting a mature animal. Photographs of the skull were sent to the Melbourne Museum and staff confirmed it as being that of a dingo rather than a dog, on the basis of diagnostic differences such as the width of the nasal bones, length of the bony box of the inner ear, and width of the shearing teeth (N. Longmore and J. Philip, Melbourne Museum, pers. comm., 2009; see also Gollan 1984a; Jones 1923:349-356).

### Dating

On a return visit, a vertebrae and rib bone were removed for radiocarbon dating. The vertebrae provided a conventional

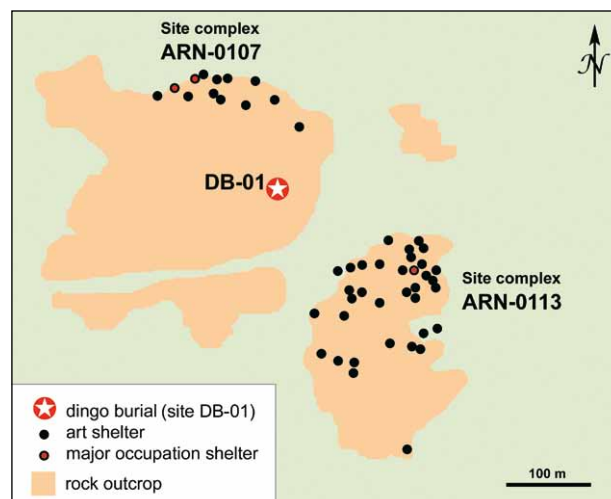


Figure 2 Location of the burial site in relation to other rockshelters.

radiocarbon age of  $77 \pm 35$  BP (Wk-25381; Table 1). The result was calibrated using Calib (v.6.0.1) (Stuiver and Reimer 1993) and the IntCal09 calibration dataset (Reimer *et al.* 2009). The collagen sample had a C:N (carbon:nitrogen) value of 3.26, which is well within acceptable quality assurance parameters (F. Petchey, Waikato Radiocarbon Dating Laboratory, pers. comm., 2009). On the basis of the 95.4% probability, it is likely that the dingo died (and was buried) between AD 1680 and AD 1930.

The  $\delta^{13}\text{C}$  value of  $-13.5\text{‰}$  was unusual for a carnivore, so it might be inferred that the dingo lived on animals that ate C4 plants rather than C3 plants (F. Petchey, Waikato Radiocarbon Dating Laboratory, pers. comm., 2009). This suggests the dingo's diet was dominated by grass-eating species such as wallabies and birds, which conforms to dingoes' reported diets of 60% wallaby and 40% birds (Newsome 1983).

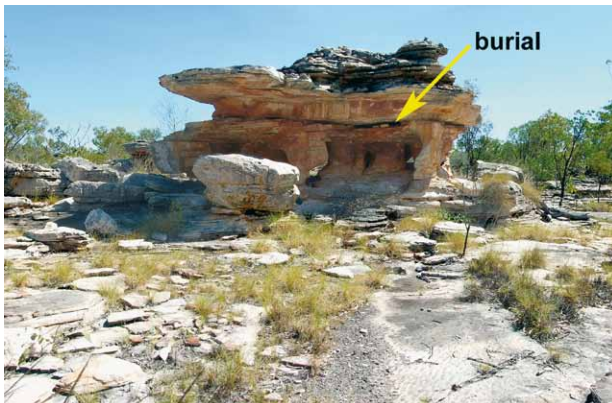
### Human Burials in Arnhem Land

The dingo burial replicated some of the features of human bundle burials. For the Jawoyn, a traditional human burial involved two stages: an initial tree burial of the body, followed by its retrieval some months later when the bones had been desiccated. The skull and long bones were then ochred, wrapped in paperbark, and placed in a rockshelter within the clan territory (Chaloupka *et al.* 1985:152; Elkin 1979:353-4; Gunn 1992b:79). The bundles are commonly placed in a small cleft or on a ledge in the shelter and then protected by a rock surround (Jelinek 1979). Over time, animals may disturb the burials, at which time relatives or other visitors to the shelter may place the skull prominently on a ledge facing out over their country as a sign of remembrance (Jacob Nayinggul, Kunwinggu elder, pers. comm., 1992).

During this Arnhem Land project, as well as traditional burials wrapped in paperbark, several burials have been found wrapped in canvas with post-contact artefacts. There is no reason

Table 1 Radiocarbon dating results, DB-01. \*denotes influence of nuclear testing  $^{14}\text{C}$ .

Lab. No.	Material	$\delta^{13}\text{C}\text{‰}$	$\text{F}^{14}\text{C}$	$^{14}\text{C}$ Age (years BP)	Calibrated Age AD (95.4% probability)
Wk-25381	Bone	$-13.5 \pm 0.2$	$0.99 \pm 0.003$	$77 \pm 35$ BP	1684–1733 (0.267) 1807–1928 (0.719) 1951–1955* (0.014)



**Figure 3** The burial shelter showing the distinctive rock formation (Photograph: R.G. Gunn).

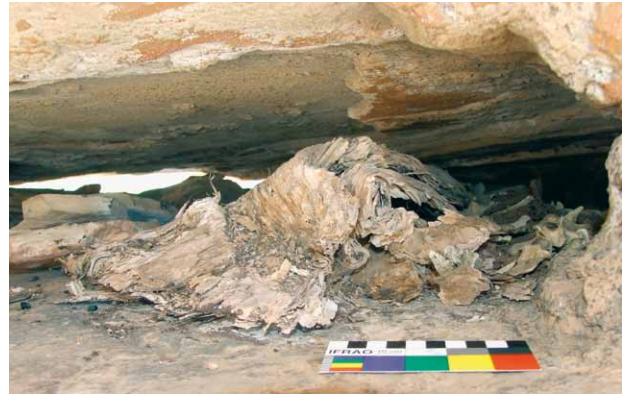
to presume, however, that bundle burials in this area do not also pre-date the contact period. For example, similar rockshelter burials in the Central Queensland Highlands date to greater than 700 BP and up to the contact period (L'Oste-Brown *et al.* 2002).

While many intact burials have been located, a number now contain only paperbark and surrounding rocks. It is assumed that these are remnant human burials that have been either removed by relatives or destroyed by animals, but the current findings open the possibility that some may have held the remains of dingoes (or other animals).

### Dingo Burials Elsewhere

In southern Arnhem Land, a senior Jawoyn man is reported to have placed deceased dingo pups on rockshelter ledges as a mark of affection (Claire Smith, Flinders University, pers. comm., 2009). In the Keep River region, adjacent to the Western Australia border, rockshelters were used as wet season residences, for housing burials and places to cache select possessions (Mulvaney 1996). Mulvaney illustrates a recent (c.1920) painting of a dog-like quadruped at the Goorungenim shelter, painted as a remembrance of a particularly good hunting dog. Custodians also mentioned that 'the remains of favoured dogs were buried the same way as humans, as bundle burials placed within rockshelter clefts' (Mulvaney 1996:14). A similar burial of ochred dingo bones was found in a shelter in Wardaman country (west of Katherine) in association with human burials, rock art and occupation at a 'Devil Dingo' Dreaming site (Bruno David, Monash University, pers. comm., 2010). In southeast Australia, where dingo burials are more common, they are buried in the ground, in either sand dunes or middens (Gollan 1984a, 1984b), with many found adjacent to human burials and cemeteries (Pardoe 1996).

The earliest dated dingo remains found in association with Aboriginal sites are less than 4000 years old. At Madura Cave, southeast Western Australia, remains were dated to 3500 BP (Milham and Thompson 1976), while at Wombah, on the north coast of New South Wales, a canine dated to around 3200 BP was found in a coastal midden (McBryde 1982). At Fromm's Landing No.6, on the lower Murray River in South Australia (Mulvaney *et al.* 1964:498-507), a near-complete dingo skeleton was excavated and dated to around 3000 BP. This specimen was found to be morphologically similar to the modern dingo. Although the shelter was well-used by Aboriginal people, there



**Figure 4** The burial showing the paperbark wrapping after removal of the outer rocks (Photograph: R.G. Gunn).

were no signs that this dingo was domestically associated with humans.

### Discussion

#### *Ethnographic Evidence of the Relationship between Aboriginal People and Dingoes*

The dingo appears to have been treated 'almost as members of the family rather than as personal property' (Berndt and Berndt 1977:148, 345), as exemplified by a myth from western Arnhem Land in which 'several large camps are said to have been wiped out after a man's special dog was unknowingly killed and eaten' (Berndt and Berndt 1977:345).

In 1936 Thomson noted in eastern Arnhem Land that:

the natives assure me that most of the dingoes they have captured go bush when they grow up. I am convinced from my own experience of the rarity of real Dingoes even in the remote camps in the interior of eastern Arnhem Land, of the truth of this fact (Dixon and Huxley 1985:170; see also Peterson 1983, 2003).

The Garawa people, in the Gulf country east of Borroloola, occasionally used dingoes as hunting dogs:

the dogs would quietly remain with the hunters' extra spears and equipment, which was put down when a target was sighted. When the prey was hit the hunter would call up the dogs which would scent the blood and harass the animal until the hunter could catch up (Pickering 1992:15).

This usefulness, however, did not exempt the wild dingo from itself being the occasional source of meat supplement (Pickering 1992:19-20; see also Gould 1969; Meggitt 1965; White 1972).

Meggitt (1965) discussed the various written records of the usefulness of dingoes. He concluded that they were generally not efficient hunting associates and their main function was to act as pets. However, after rearing from the pup stage, most were left to their own devices and often became camp scavengers, eventually starving to death because of competition with fitter animals.

Subsequently, Meehan *et al.* (1999) concluded that the role of dingoes, and more recently dogs, in central Arnhem Land was primarily social in that they acted as guard dogs (against intruders and, particularly, malevolent spirits) and companions

for women and children, but especially elderly women. After death, these dogs were wrapped in paperbark and buried in the ground.

In the Jawoyn language dingo is called *jurkkan* (Merlan and Jacq 2005). The suffix *-kan* or *-kkan* means to 'go' and is suggestive of separation or avoidance. The term for a camp dog is *waruk* or *karramo*, although this can also be used for dingo (Merlan and Jacq 2005). While they were kept as pets and hunting companions, wild dingoes were considered cheeky and dangerous (Wijnjorrotj *et al.* 2005). The two terms reinforce the dual character of the wild and domestic dingo.

Elsewhere in Australia, a close relationship between Aboriginal people and dingoes is well-documented: in the Victoria River region (Lewis and Rose 1988; Rose 1992); eastern Kimberley (Mulvaney 1996); Central Australia (Gould 1969; Hamilton 1972; Long 1971); and Cape York (Dixon and Huxley 1985). In an eastern Victorian coastal midden, two male dingoes were buried between 3000 BP and 900 BP (Gollan 1984b). One was a young adult around four years old, and the other a pup around 20 weeks old. The former had a pathological condition that would have hampered its feeding and must therefore have been hand-raised. The latter suggests the taking of young pups for pets was not limited to the northern and central Australian regions. It is expected therefore that a close relationship between people and young dingoes also existed in the Jawoyn lands; an expectation that is supported by the finding of this burial.

### *The Dingo in Aboriginal Beliefs*

While dingoes do not feature in surviving Jawoyn mythology, they are prominent in that of other northern Australian groups (Berndt and Berndt 1977). A localised myth from the northern edge of the Arnhem Land plateau describes how a man, after unsuccessfully trying to spear a dingo for food, is subsequently killed by the dingo and its group (Chaloupka *et al.* 1985:111). Interestingly this pack behaviour is generally abnormal for a dingo, which is notably a loner and only cooperates with a group when large game is available (Breckwoldt 1988; Newsome 1983). Further north, a prominent Dingo Dreaming links the Alligator Rivers language groups (Mengerr, Urningangk, and Erre people on the northwestern corner of the plateau) with the Iwaidja people on the coast to their north. The story refers to two dingoes, Adjumarlal and his mate, who undertake a southward journey from the Iwaidja lands (east of Coburg Peninsula) to Adjumarlal, near Kunbarllanjnja (Oenpelli). The local community store at Kunbarllanjnja is named after this dingo, as is the local land management/ranger group, the Adjumarlal Rangers (Murray Garde, pers. comm., 2009).

In eastern Arnhem Land, dingoes are companions of the Wawalag sisters, who feature prominently in the Kunapipi cult (Berndt and Berndt 1977:254-255).

Kolig (1973) highlighted the close relationship of the dingo, not only with humans, but also with the supernatural. More than any other animal, they were credited with being able to sense malevolent spirits or spiritual forces. He also found that dingoes were generally considered vicious and dangerous.

The dingo is given similar veneration in many other areas of Australia: Victoria River region (Rose 1992); Kimberley (Capell 1972); Central Australia (Spencer and Gillen 1899); Western Desert (Meggitt 1955; Mountford 1976); South Australia

(Tunbridge 1988); western New South Wales (McCarthy and Macintosh 1962); Victoria (Howitt 1904; Smyth 1878). In almost all of these areas the dingo parallels its reported role in Aboriginal society as a companion figure rather than that of a major Dreaming Being. In a few cases, the dingo is represented as the hunter, usually in packs, and killer of more senior Dreaming Beings (note the Arnhem Land plateau example and corollary note above).

### *The Dingo in Rock Art*

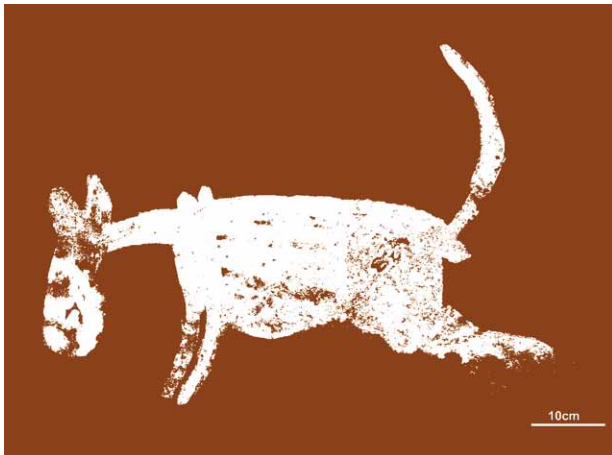
Only two paintings identified as dingoes have been recorded within Jawoyn lands; one from the plateau interior and one from the southern tablelands (Figures 5 and 6; see also Macintosh 1952). Both are in white and appear to be relatively recent. A third unseen painting has been reported from the Tablelands (Davidson 1981). The paucity of any dingo images within the art-rich plateau is the more unusual as all other animals are well-represented, including other quadrupeds such as thylacine, possum and bandicoot (e.g. Brandl 1972; Lewis 1977). The thylacine, which pre-dated the dingo (Flood 1983:150-151; Rounsvell 1983) and is referred to variously as the 'pet', 'dog', or 'companion' of the Rainbow Snake (Gunn 1989), appears to have ceased to be represented after its extinction on the mainland, presumably due to the introduction of the dingo (Flood 1983:153). In one instance in Jawoyn lands, a large thylacine-like image has been repainted on several occasions suggesting that either the animal or its image was still of significance in the recent past (<400 years ago). It is of interest that paintings of dingoes did not replace those of thylacines in the more recent art, despite the continued representation of other quadrupeds.

Elsewhere in Australia, representations of dingoes are generally uncommon (Flood 1997; Pardoe 1996). Where they do occur, their large size, central placement and polychrome colouring suggests the characters were of considerable importance (Crawford 1968; Flood and David 1994; Gunn 1988; Harney *et al.* 2007; Macintosh 1965; Massola 1957; Mountford 1965; Playford 2007; Trezise 1971). As mentioned above, at Keep River, an image of a dog (dingo?) was painted in a rockshelter as a remembrance of a particularly good hunting companion (Mulvaney 1996).

At Mutawintji in western New South Wales there are a number of stencils of dingo paws. Mutawintji traditional owners suggest that the stencils were made with living dingoes rather than the severed paws of dead animals (Gerald Quayle and Michael Wyman, pers. comm., 2009). They suggested that the dingoes would have been favoured animals of people camping here, an understanding that coincides with their interpretation of the many human hand stencils within the same shelters as being those of people with a close connection to the place.

In the rock art of the arid region dingoes are more frequently represented by a trail of their tracks, usually in association with those of either humans or kangaroos, and are more evocative of a hunt than a static profile image. However their trails are far less frequent than the trails of kangaroos, emus or humans (e.g. Gunn and Thorn 1997; Mountford 1968). In western New South Wales, the painted tracks of a human and kangaroo (without any associated dingo tracks) tell of the folly of a hunter who fails to take his dog (dingo) with him and consequently loses his prey (McCarthy and Macintosh 1962). Amongst the petroglyphs,





**Figure 5** The only recorded representation of a dingo from the central plateau (white painting, Nawarla Gabarnmung, ARN-0074/A1).

dingo tracks and representations are rare and are only known amongst the most recent motifs (Edwards 1971).

### Conclusion

The dingo, as a species, held an extraordinary place in the Aboriginal world, as one who could live in both the human (social), animal (natural) and spiritual worlds. Aboriginal people recognised this by allowing the tame 'pet/kin' to return to the natural (and spiritual) world rather than being 'kept' within the confines of human society. Perhaps, however, it was this very social (i.e. tamed) aspect of the dingo that prevented it from entering the realm of the Aboriginal belief system and becoming as significant a metaphor as the 'untamed' thylacine or kangaroo (cf. Berger 1980[2009]:3-28). The Dalabon, neighbours of the Jawoyn, have a taxonomic category of *manj*: species that live in two or more worlds (such as the crow, which walks and flies; see Maddock 1975). This taxon includes the dingo, which could also be seen to conform to this group on the basis of its ability to move between the two worlds.

Hence, as part of both the social and natural landscape, the dingo may not have been considered to be on a high level, as were the more significant totemic species or Dreaming Beings. This, and its general lack of singularity in the myths, may account for the dingo's almost complete absence in the rock art of the Arnhem Land plateau and its paucity in rock art elsewhere, and also for the rarity of dingo burials. Alternatively, the rarity of burials and the lack of any ethnographic knowledge amongst the Jawoyn may reflect a discontinued practice. However, given the generally close association of humans and dingoes throughout Australia, the interpretation offered by the Jawoyn today, that the burial here is the work of an individual who had a particularly close relationship with the animal, is the more likely.

Although apparently a unique case on the plateau, the internment of this dingo in a very human manner reinforces the importance of the relationship between Aboriginal people and dingoes. It also highlights the possibility that further such examples may remain to be found and, also, that others may have been passed unrecognised.

### Acknowledgements

This work was undertaken under the auspices of the Jawoyn Association, Katherine. The findings were discussed with a number of Jawoyn elders at Barunga, of whom Sybil Ranch,



**Figure 6** One of the few representations of a dingo from the Barunga Tablelands: this composition is suggestive of a domestic setting (white painting, Doria Guduluk JAW-0001).

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