

Shorter Notes

Two Jadeite Axes, and Two Arrowheads of Antrim Porcellanite and Rhum Bloodstone from Scotland

by *D. V. Clarke*

These four artifacts are deserving of publication more because of the raw material employed in their manufacture than their finished form. It must however be noted that the jadeite axe from Appin is an unusually fine example of this type of ceremonial object.

Jadeite axes have been fully discussed by Campbell Smith.¹ He distinguished several types; the Appin axe and very probably the Inverness fragment are his Type IA. These are thin axes with outlines approximating to an isosceles triangle and a lenticular section with acute side-edges.

1. *Jadeite axe from Appin, Argyll* (N.G.R. NM 943463; fig. 1, 1)

In the possession of Brigadier I. M. Stewart of Achnacone, Appin.² The circumstances of discovery are given by a hand-written label gummed to one face of the axe. It reads 'Found in draining the field east of the Parish Church, Appin. (Duncan Handby Campbell-Munro of Kinlochlauch)'. The church here mentioned is not the site of the present Parish Church but that of the old Parish Church, a little to the north. The change was made *c.* 1870.³

The surface colour varies from deep olive to pea green, while the cracks are marked by yellow-brown and white. The interior, showing on the freshly chipped surfaces, is leaf green. There is slight damage at the butt end and the cutting edge. The original polish is much damaged by weathering, and the surface is badly cracked in places. The flattening of one face has created an adze-shaped section, but it is unlikely that such functional considerations can reasonably be applied to these obviously ceremonial pieces.

The following is an abstract of a report submitted by S. E. Ellis of the Department of Mineralogy, British Museum (Natural History).⁴

Length: 18.7 cm. Width: 8.9 cm. Thickness: 1.75 cm.

Weight: 400.9 grams. Specific gravity: 3.06.

Refractive index: $X' = 1.668$, $Z' = 1.685$. Extinction *c.* 40°. Birefringence low, dispersion high.

X-ray analysis gives jadeite. Optical data indicate jadeite, near diopside jadeite. The specific gravity is exceptionally low and suggests a considerable admixture of lighter mineral which has not been identified.

2. *Jadeite axe fragment from Inverness* (N.G.R. NH 668454; fig. 1, 2)

Now in the Public Library, Inverness.⁵

¹ *PPS*, xxix (1963), 133-72; *PPS*, xxxi (1965), 25-33.

² I should like to thank Brigadier Stewart for permission to publish this axe and for help in making the axe available for study. I should also like to thank Miss A. S. Henshall, M.A., F.S.A. and Mr R. B. K. Stevenson, M.A., F.S.A. for their help and advice in the preparation of this note.

³ Information from Brigadier Stewart.

⁴ I should like to thank Mr Ellis for the reports he prepared on the Appin axe and the Inverness fragment.

⁵ I should like to thank Mr R. Milne of Inverness Public Library for permission to publish this find.

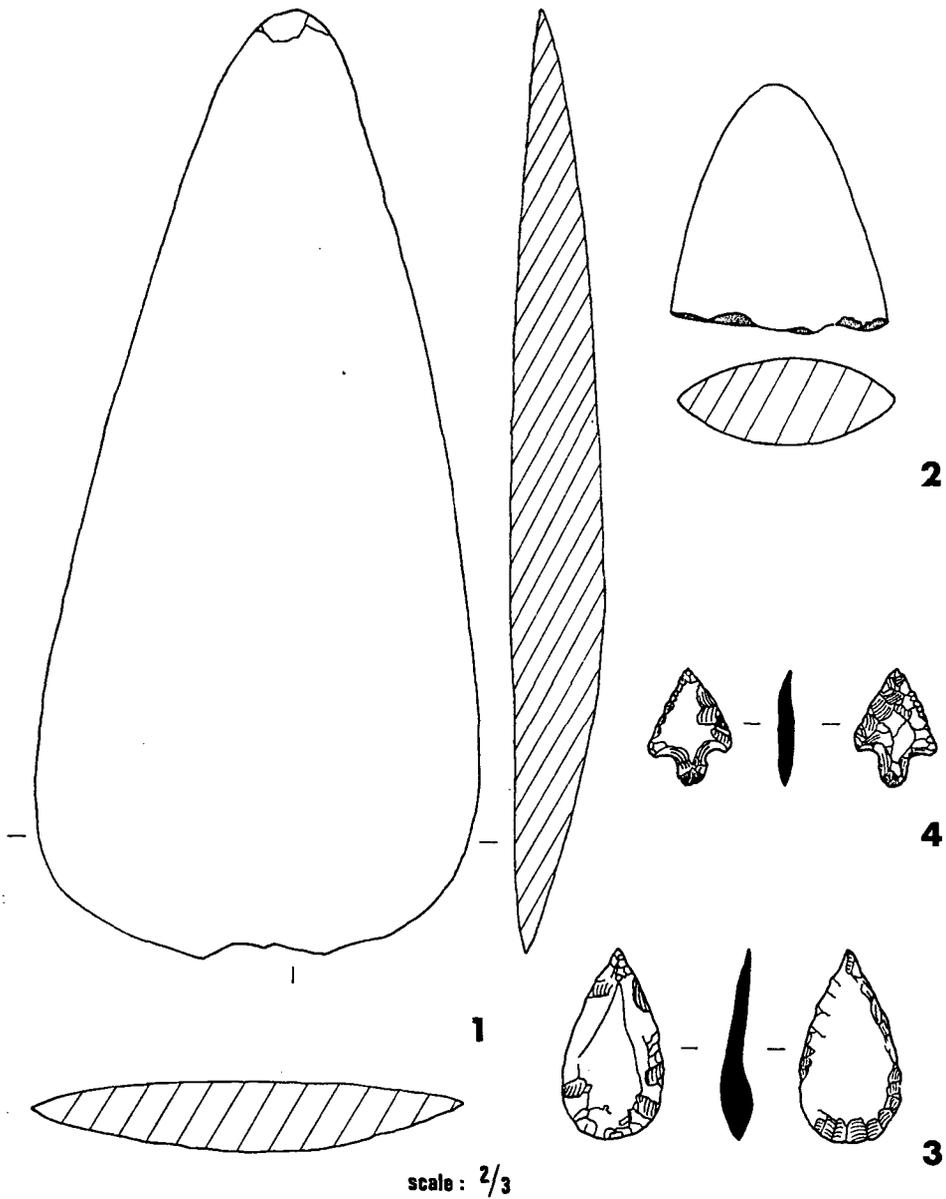


FIG. 1. Jadeite axes (1 from Appin, 2 from Inverness) and arrowheads (3 from Hareross, Selkirkshire, 4 from Rhum)

The fragment was found on the site of the Railway Stores building, Inverness.

It is a triangular fragment from the butt end of an axe. The surface colour is weathered to olive grey, paler and streaked with brown (limonite) on one face, blackened near the point on the other face. The interior colour is deep olive grey.

The following is an abstract of a report submitted by S. E. Ellis:

Length: 5 cm. Width: 4.2 cm. Thickness: 1.7 cm.

Weight: 42.1 grams. Specific gravity: 3.31.

Refractive index: $X' = 1.658$, $Z' = 1.673$.

A thin section from the broken end shows a monomineralic xenomorphic-granular pyroxene of mean grain-size about 100 microns (50–250 microns). The grains are equant, colourless and optically zoned; maximum extinctions were 42° at centres and 37° on the margins. Optic axial angle was about 75° ; optically positive, birefringence low. X-ray analysis gave 'near jadeite'. Optical data indicate a fairly pure jadeite.

Both axes are stray finds and so cannot be used to solve the problems of chronology and association relating to such objects. Only one jadeite axe has, in fact, been found in an archaeological context; this is the axe fragment from the chambered tomb Cairnholy I.¹ Unfortunately its position in the chamber was ambiguous in that it was not possible to decide whether its association was with the Western Neolithic pottery or the Beaker sherds. The latter provide a *terminus ante quem* date of early in the second millennium B.C. With due caution such an imprecise date might well be applied to jadeite axes, which, in view of their specialised nature, are unlikely to have been made for any considerable length of time. The distribution of Type IA jadeite axes in Scotland is scattered, but with a small cluster in the extreme south-west.² These two new examples emphasise the scattered distribution. The Appin example is the first jadeite axe from Argyll and only the second from the west coast; the other is a Type IB axe from Fort William, Inverness-shire.

3. *Leaf arrowhead of Antrim porcellanite from Hare Moss, Selkirkshire* (N.G.R. NT 465252; fig. 1, 3)

Found during tree planting³ and at present on loan to the National Museum of Antiquities (L. 1965.21).⁴

Its dimensions are:

length: 3.9 cm, max. width: 2.1 cm, thickness: 0.5 cm, weight: 4.05 grams.

The sides are convex, merging into the rounded base. Flaking occurs on both sides but is mainly confined to the edges. The arrowhead has mottled surfaces of black and olive green. Dr Sabine of the Geological Survey has identified the arrowhead as being of porcellanite but points out that macroscopic examination alone is insufficient to distinguish Tievebulliagh material from that of Rathlin Island.⁵

Finds of porcellanite were first discussed by Jope.⁶ More recently the Scottish finds have been reviewed by Livens⁷ and Ritchie.⁸ The latter gives the most up-to-date distribution map and reviews the meagre dating evidence. Recent work has provided some new examples, including this arrowhead, but these serve only to reinforce the distribution shown on Ritchie's map.⁹ This is the first arrowhead of porcellanite to be recorded. It therefore seems reasonable to suppose that it is the product of either re-use of a damaged axe or use of a flake produced in the process of working a rough-out into shape. The arrowhead shows no sign of polished surfaces which might be expected if it was the product of re-using a damaged axe.

4. *Barbed and tanged arrowhead of Rhum bloodstone from Samhan Insir, Island of Rhum* (N.G.R. NG 377043; fig. 1, 4)

The arrowhead is now in the collections of the National Museum of Antiquities (AD 2337),

¹ *PSAS*, LXXXIII (1948–9), 137–9.

² *PPS*, XXIX (1963), 147.

³ *D. & E.*, 1966, 42.

⁴ I should like to thank Mr J. W. Elliot, F.S.A.Scot., Raycot, Selkirkshire for permission to publish this find.

⁵ In a letter to G. H. Collins, 23rd September 1965.

⁶ *Ulster J. A.*, N. S. xv (1952), 31–60.

⁷ *PSAS*, xcii (1958–9), 64–66.

⁸ Ritchie, P. R., in Coles, J. M. and Simpson, D. D. A. (edd.), *Studies in Ancient Europe* (1968), 123–6.

⁹ *op. cit.*, 125.

having been presented by Mr G. C. David in 1968, It was found in a hollow scooped out of the machair by the wind. With it were found a number of artifacts ranging in date down to the eighteenth century, including worked and unworked flakes of bloodstone.¹

Its dimensions are:

length: 2.4 cm, max. width: 1.7 cm, thickness: 0.3 cm, weight: 1.07 grams.

The arrowhead is straight-sided with insignificant barbs and a short tang. It is heavily flaked on one side, but on the other flaking is restricted to the edges. In colour it is pale green but with streaks of a much darker shade of green. It lacks the characteristic blood-red spots, but Ritchie has noted variations in the parent rock.²

Finds of Rhum bloodstone artifacts are very restricted in distribution.³ This find thickens rather than extends the distribution, situated as it is close to the source area. Seven miles across the Cuillin Sound is the cave site at Rudh'an Dunain, Isle of Skye. At that site bloodstone artifacts and flakes were possibly associated with Beaker sherds (disturbance was noted by the excavator in the cave).⁴ The find of this barbed and tanged arrowhead supports, in some measure, that association; there is at present no evidence that bloodstone was worked later than this date.