

II.

SHORT CISTS IN ANGUS AND NAIRNSHIRE. BY ARTHUR J. H. EDWARDS, F.S.A. SCOT., ASSISTANT KEEPER OF THE NATIONAL MUSEUM OF ANTIQUITIES OF SCOTLAND. WITH A REPORT ON THE HUMAN REMAINS CONTAINED IN THEM BY PROFESSOR ALEX. LOW, M.A., M.D., F.S.A. SCOT.

CIST AT FLETCHERFIELD, FORFAR.

In the autumn of 1928, a report of the discovery of a stone cist which contained an urn, at the farm of Fletcherfield, situated about 3 miles north-west of the town of Forfar, was received at the Museum.



1 2 3 Inches

Fig. 1. Beaker from Fletcherfield, Angus.

The cist, which was discovered during ploughing operations, lay about 350 yards north-west of the farm steading. Unfortunately, the stones which had composed the cist were removed before my arrival, and I was therefore unable to ascertain its internal dimensions.

It had, however, consisted of four slabs set on edge, with a cover-stone, and as the slabs had been preserved at the farm, I am able to give their measurements. One of the side stones measured 3 feet 2 inches in length by 1 foot 7 inches in height and 8 inches in thickness, and the other, 3 feet in length by 1 foot 6 inches in height and 3 inches in thickness. The end stones measured 1 foot 6 inches in length by 1 foot 4 inches in height, and 2 feet in length by 1 foot 7 inches in height, and from 3 to 4 inches in thickness respectively. The cover-stone measured 4 feet by 3 feet 2 inches by 4 inches. So far as I could learn, the direction in which the cist had lain was east and west.

Inside the cist was found a very fine beaker urn of clay (fig. 1), which measured $8\frac{3}{4}$ inches in height, $6\frac{1}{8}$ inches in external diameter at the mouth, and $3\frac{1}{4}$ inches in diameter at the base. The ornamentation on the urn was arranged in four horizontal zones, with plain bands

between, and consisted of a series of stamped impressions and plain lines. On the outer side of the lip, which was slightly bevelled on the outside, there was also an impressed design.

CIST AT KNOCKENNY, GLAMIS.

On the 2nd of March last, as a result of information received from the King's and Lord Treasurer's Remembrancer, I visited the farm of Knockenny in the parish of Glamis, Angus. The farmer, Mr James Bruce, had reported to the local authorities the finding of a cist when ploughing a field situated about 620 yards south-east of the steading. The cist was placed on the top of some rising ground and lay 150° E. of N. magnetic, or almost north-west and south-east. It was formed by four slabs set on edge, with a cover-stone which measured 4 feet 8 inches in length, 3 feet 7 inches in breadth at one end and 2 feet 3 inches at the other, the greatest thickness being 6 inches. The internal dimensions were 3 feet $4\frac{1}{2}$ inches in length on the west side, 3 feet 5 inches in length on the east side, 2 feet in width at the north end, and 1 foot 11 inches in width at the south end. The slab at the south end measured 5 inches in thickness and was set outside the two side slabs, the west side slab, which measured $3\frac{1}{2}$ inches in thickness, being set between the two end slabs. On the north and east sides of the cist the slabs measured 5 inches and 4 inches in thickness respectively. In spite of precautions taken by Mr Bruce to leave the cist undisturbed until it had been examined, it was unfortunately interfered with, and what might have been a valuable record was thus rendered incomplete.

The cist contained an unburnt human skeleton, a food-vessel urn, and a number of discoidal and barrel-shaped jet beads. Only a few bones remained in the grave, and these were recovered. Some fragments of the urn and a few of the beads (fig. 2) were picked up outside the grave from amongst the gravel which had been thrown out of the cist. The grieve, Mr Birnie, succeeded in recovering a few more by riddling the soil when the weather conditions were more favourable than on the occasion of my visit. Later, when Mr Callander visited Knockenny, he fortunately found other eight, three of which were barrel-shaped—discoidal beads only having been recovered up to that time. The beads were probably part of a necklace somewhat similar to that found at Culduthel, Inverness.¹

One of the barrel-shaped beads measured $\frac{7}{16}$ inch in length by $\frac{9}{32}$ inch in diameter, the second $\frac{7}{16}$ inch in length by $\frac{7}{32}$ inch in diameter, and the third $\frac{3}{8}$ inch in length by $\frac{11}{32}$ inch in diameter. The discoidal beads measured from $\frac{9}{32}$ inch to $\frac{3}{8}$ inch in diameter, the thickest being $\frac{1}{8}$ inch.

¹ *Proceedings*, vol. lxiii. pp. 217-24.

The food-vessel urn is incomplete, but it has probably measured between 6 and 7 inches in external diameter at the mouth. The height cannot now be ascertained. The lip is slightly bevelled towards the inside and measures $\frac{7}{8}$ inch in breadth. The upper part of

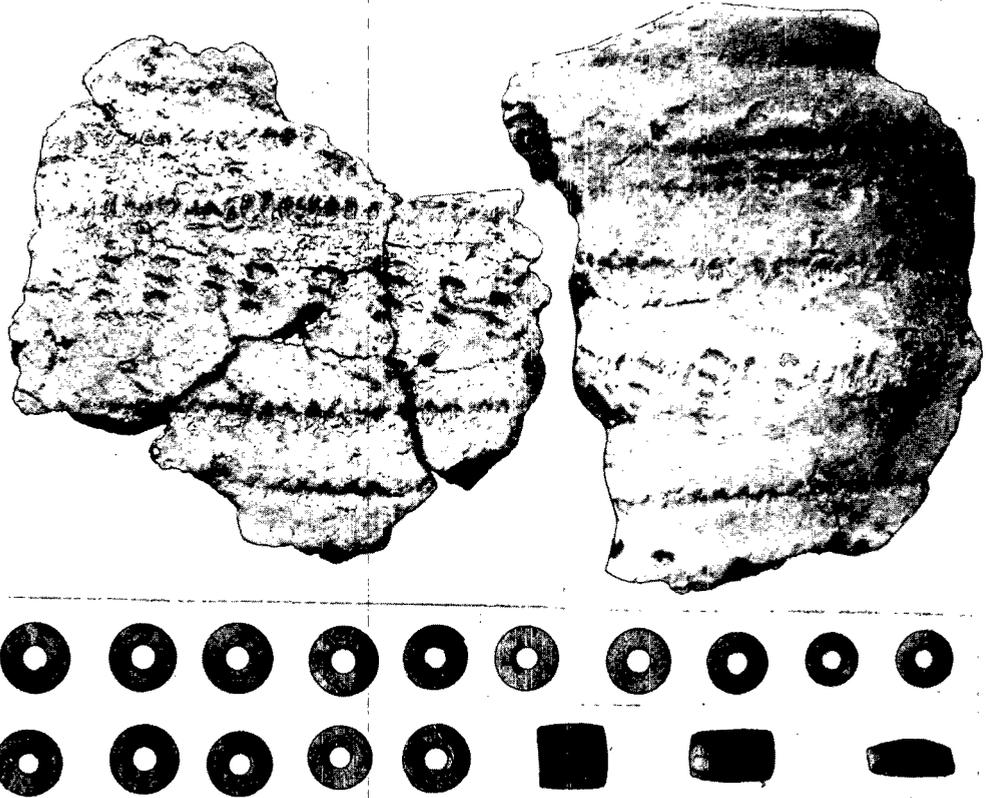


Fig. 2. Fragments of Food-vessel and Jet Beads from Knockenny, Angus.

the vessel is encircled by two raised mouldings $1\frac{3}{8}$ inch apart, the upper being $\frac{5}{8}$ inch below the rim, there being a distinct hollow just under the lip. On each of the raised mouldings and on top of the lip are impressions of a cord pattern, some placed obliquely, some vertically. In the hollow under the rim is a single row of impressions made by some indeterminate implement, with three similar rows between the mouldings and two on the remaining part below the second moulding.

The relics have been most generously presented to the Museum by Mr James Bruce.

CIST AT CARNACH, NAIRN.

In February of this year the Hon. D. H. Cairns very kindly sent information to the Director of the National Museum that a cist had been discovered near his house at Carnach, 2 miles west of Nairn. The cist was discovered by his gardener, Mr James Ritchie, when superintending the excavation of a cutting which was being made through a natural knoll situated about 25 yards east of the house. The cist was found near the centre of the knoll, the cover-stone being about 2 feet 6 inches from the surface. Over the cover-stone, and extending for a distance of 4 or 5 feet on all sides of the cist, were found a number of round land pebbles, which had thus formed a small cairn, the depth of pebbles immediately over the centre of the cover-stone being probably about 2 feet 4 inches in height. The cist, which lay nearly north and south, was formed of four sandstone slabs set on edge, the two end stones being inserted within the ends of the side stones. It was rectangular in shape and measured internally 4 feet 7 inches in length, 2 feet in width, and 2 feet 6 inches in depth. Both end stones measured 9 inches in thickness, and the side stones 6 inches and 8 inches respectively. The cover-stone measured 4 feet 7 inches in length, 3 feet 8 inches in breadth, and 11 inches in thickness at its thickest part. Amongst the gravelly sand which the cist contained were the bones of an unburnt skeleton, placed in a crouched or sitting position, with its head at the north end. The bottom of the cist was not paved. From information given by Mr Cairns, it is interesting to note that the sandstone slabs which formed the cist must have been brought from what is now known as King's Steps Quarry, a distance of $3\frac{1}{2}$ miles from Carnach or about $1\frac{1}{2}$ mile east of Nairn.

REPORT ON SKELETAL REMAINS FROM SHORT CISTS AT
KNOCKENNY, ANGUS, AND CARNACH, NAIRN. By Professor
ALEX. LOW.

KNOCKENNY SKELETON.

The skeleton is far from complete; parts are entirely missing, and most of the bones present are imperfect, due to portions being decayed away. The remains indicate an adult male of moderate muscular development, 5 feet 5 inches in stature.

The skull is represented by two pieces—one piece including most of the frontal region and the other made up of adjacent parts of the two

parietal and occipital bones. The frontal region is rather narrow, rounded, and fairly vertical, with moderately projecting superciliary ridges.

The only other parts of the skeleton present are two fragments of the pelvis; imperfect astragali; shaft of left humerus; a complete left femur and the middle two-thirds of the right femur; a complete left tibia and a practically complete right tibia.

The measurements in mm. of the left femur and left tibia are as follows:—

Femur :		Tibia :	
Maximum length	445	Maximum length	361
Oblique length	443	Ant. post. diam.	29
Upper third of shaft—		Trans. diam.	22
Ant. post. diam.	25	<i>Platycnemic index</i>	75·8
Trans. diam.	32		
<i>Platymeric index</i>	78·1		
Angle of neck	120°		
Angle of torsion	17°		

The femur is a robust bone showing a good deal of torsion associated with flattening of the shaft below the lesser trochanter—*platymeria*. The stature, calculated from the length of the femur, is 5 feet 5 inches. The skeletal remains present features indicating the probability that they belonged to an individual of late Bronze Age times.

CARNACH SKELETON.

The skeleton described was contained in a short cist recovered at Carnach, Nairn, in the end of February 1931. The skeleton is now preserved in the Anatomical Museum at Aberdeen University, having been presented to the Museum by the Hon. D. H. Cairns of Carnach. An account of the discovery and structure of the cist is given by Mr Arthur J. H. Edwards, F.S.A.Scot., in the preceding pages.

The skeleton is fairly complete, though a number of the bones are imperfect, due to portions having decayed.

The Skull.—The cranial portion of the skull is well preserved, but unfortunately, except for the body of the lower jaw, the facial portion has crumbled away. Detailed measurements of the cranium are given in Table I. The cranium has male characters, the superciliary ridges are prominent, the mastoid processes stout, and the occipital lines well developed. The basilar suture is occluded, but all the sutural lines of the vault are open except that ossification has just commenced in the sagittal suture. The crowns of the teeth which are present in the lower

jaw are considerably worn. The skull is moderately thick-walled and has a small cubic capacity—1340 cc.—thus being *microcephalic*.

The profile view (fig. 3) shows a short skull, very low relative to both length and breadth—length-height index 69·7, and breadth-height index 81·8. The occiput is flattened both above and below and broad from side to side.

The temporal squamæ are low—distinctly lower than in modern skulls—



Fig. 3. Norma lateralis of Skull from Short Cist at Carnach, Nairn.

the mastoid processes are short and stout, and the glenoid cavities are shallow and broad.

The outline of the vault of the skull when viewed from above (fig. 4) is ovoid and relatively short and broad, the skull being included in the *hyperbrachycephalic* category, with a length-breadth index of 85·1.

The occipital view (fig. 5) shows a pentagonal outline, with parietal bosses well marked and high up, and sides of skull rather flat.

Bones of Trunk and Limbs.—The bones of the spine are represented by nine thoracic, the five lumbar vertebræ, and the upper three segments of the sacrum; the lumbar spine shows a well-developed lumbar curve.

The hip-bones are fragmentary, but show the narrow, deep sciatic notch characteristic of a male pelvis.

The long bones of the limbs are such as belong to a robust male of short stature. Detailed measurements and indices of the intact bones are given in Table II.

Humeri.—The humeri are complete except for some erosion of the greater tuberosity of the right. The shafts are of moderate strength, straight, and with the degree of torsion less than that of most modern bones; there is a difference of 11 mm. in the lengths of the bones—the right humerus measuring 335 mm. and the left 324 mm.

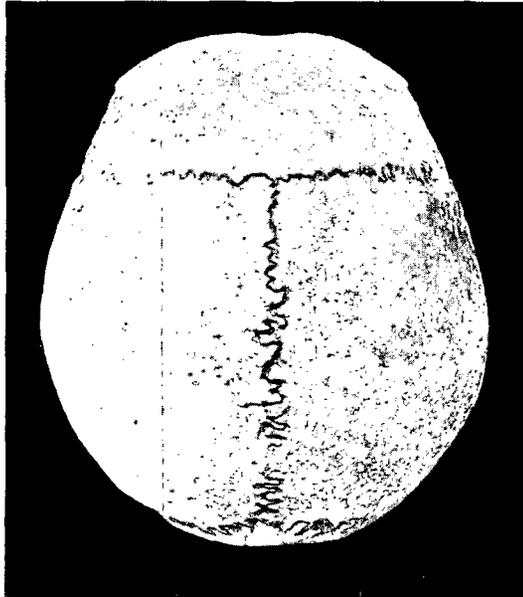


Fig. 4. Norma verticalis of Skull from Short Cist at Carnach, Nairn.

The left radius is complete and measures 262 mm. in length; the distal inch of the right radius is eroded away. Both bones are rather slender and straight and remarkable for their great length—the *radio-humeral* index of 80·8 is distinctly simian in character.

Both ulnæ are deficient in their distal inch; while the shafts of these bones are relatively slender, their olecranon processes are massive.

The femora have comparatively straight shafts, with the *linea aspera* slightly developed; their most striking features, however, are a large and prominent *crista hypotrochanterica* for the attachment of the *gluteus maximus* and marked subtrochanteric flattening—*platymeria*.

The tibiæ are deficient where they enter into the formation of the

ankle-joint; each bone is characterised by marked inclination backwards of its head and flattening of its shaft—*platynemia*.

The long and other bones of the skeleton indicate a male, thirty to thirty-five years of age, of moderate stature—5 feet 5 inches—and of



Fig. 5. Norma occipitalis of Skull from Short Cist at Carnach, Nairn.

strong, though not excessive, muscular development. The skeleton is of interest in showing several primitive characters, but on the whole conforms to the Alpine Bronze-Age type found in short cists in the north-east of Scotland.

