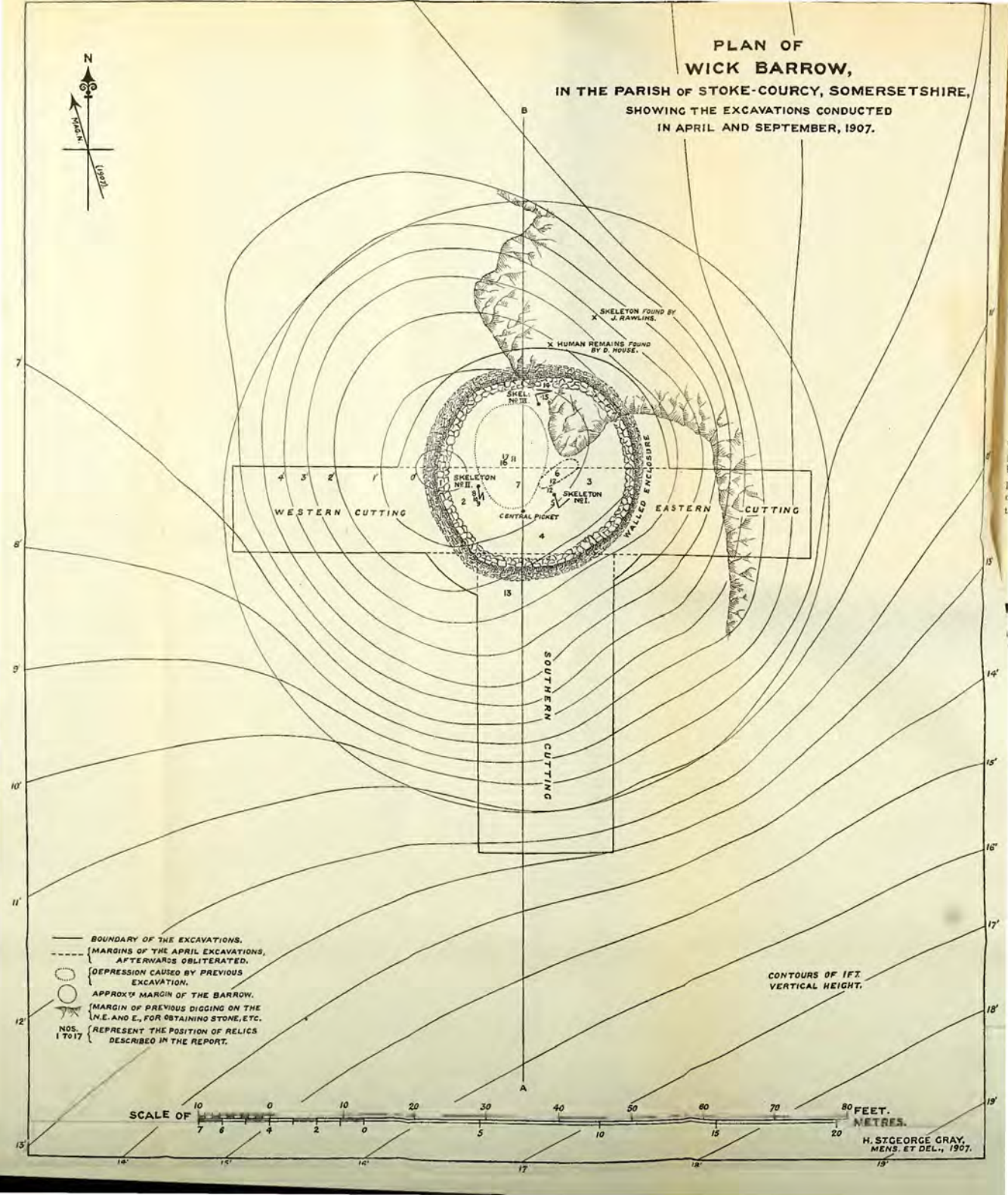
PLAN OF WICK BARROW,

IN THE PARISH OF STOKE-COURCY, SOMERSETSHIRE,

SHOWING THE EXCAVATIONS CONDUCTED IN APRIL AND SEPTEMBER, 1907.



H. ST GEORGE GRAY,
MENS. ET DEL., 1907.

PROCEEDINGS

OF THE

SOMERSETSHIRE ARCHÆOLOGICAL AND NATURAL HISTORY SOCIETY

DURING THE YEAR

1908.

PART II.—PAPERS, ETC.

Report on the Wick Barrow Excavations.

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I. INTRODUCTORY NOTES.

THE Somersetshire Archæological and Natural History Society and the Viking Club (Society for Northern Research) joined hands in undertaking in 1907 to conduct a thoroughly scientific exploration of Wick Barrow, in the parish of Stoke Courcy, a mound which has had a considerable local reputation, and is remarkable for the traditions attached to it. It was thought possible, particularly from its position, that evidence might be forthcoming of its having been erected, or made use of, in the Anglo-Saxon or Viking period, and that explorers might be rewarded by the discovery of a historic burial. Although there was some disappointment that this surmise proved to be erroneous, yet the results have

been of the greatest archæological interest and importance in producing at least two very unusual, if not unique, features in barrow excavation in England.

In the first place, this tumulus, now proved to be of the Early Bronze Age, dating probably from about 1800 years B.C. (according to the chronology of the British Bronze Age generally accepted by English antiquaries), covered a circular walled enclosure. No enclosure precisely similar in character appears to have been found before in this country; nor, we think, has anything exactly like it been found elsewhere. In the second place, although we had not the satisfaction of examining and recording what was certainly the primary interment, we obtained definite evidence that the central interment had been excavated for, and found by, the Romans in the first half of the fourth century A.D. Beyond proving that the Romans had thus interfered with the remains of an Early Bronze Age chieftain, we obtained no evidence that they found any "treasure"; but whatever was discovered by them in the way of implements or grave-goods probably became valued specimens in the collection of the Roman officer responsible for the work. Positive proof that the Romans explored British mounds does not appear to have been previously recorded.

The actual direction of the excavations, the surveying, and the recording of the results, were placed in my hands as the representative of the Somersetshire Archæological Society, while Mr. A. F. Major (Hon. Editor of the Viking Club) and the Rev. C. W. Whistler, of Stockland (Local Secretary for both Societies), to whose initiative the whole undertaking must be assigned, were associated with myself in watching the proceedings on behalf of the two Societies. From both these antiquaries I received most able assistance in all branches of the work, both in the field and in connection with the production of this report.

We have also to acknowledge help from time to time, most

kindly offered and willingly accepted, either in the field-work or in the collection of topographical and other information, from the Rev. W. H. P. Greswell, Drs. W. Grosett Collins and W. L. Winterbotham, and Messrs. Chas. Candler, A. G. Chater, and E. Withington ; also from Mr. Jas. Rawlins and the late Mr. David House.

The foreman of the workmen, T. Paul, who has worked for many years in connection with the Glastonbury Lake Village exploration, rendered useful service ; and he was entrusted with the actual uncovering of the more important discoveries, under the constant supervision of myself or one of my colleagues. The Trustees of the Spaxton Charity Lands (Mr. W. J. Ruscombe Poole, clerk), the owners of the field, readily acquiesced in the carrying out of the excavations,[1] and the tenant, Mr. H. R. Perrett, of Wick Farm, not only offered every facility for the promotion of the work, but also was most useful and obliging in every way. Our thanks are also due to Miss House of Shurton for allowing the use of her barn for the storage of the various necessaries connected with the exploration, and to the Somerset Drainage Commissioners for the loan of planks and wheelbarrows through their manager, Mr. T. T. Herniman.

In lending a large square tent, and personally setting up the same, Mr. Chas. S. Prideaux, of Dorchester, rendered me great service in September, and those who were privileged to use it wish to record their cordial thanks for his kindness.

To the Director-General of the Ordnance Surveys, Southampton, I am indebted for informing me (by Rücker's tables) that the magnetic variation at Wick for February 1st, 1907, was 16° 35′ west of true north.

Mr. and Mrs. Whistler, by their many acts of hospitality and kindness, not only largely contributed to the success of

(1). The Trustees requested that any human remains not required for scientific examination should be re-interred in the place from which they were taken. This condition was rigidly adhered to.

the undertaking, but saved the Fund various expenses which would otherwise have been incurred.

Subscriptions towards the Excavation Fund were readily forthcoming from members of both societies and from non-members specially interested in the work. Indeed the exploration has been so well supported that it has been possible to expend nearly £20 in illustrations for the *Subscribers' Report,* and the *Proceedings* of the Som. Arch. and Nat. Hist. Society. A list of donors to the Fund is printed at the end of this Report.

Both in April and September, 1907, the excavations were visited by a large number of people, whose admissions to the field helped to swell the receipts.

The relics discovered are now deposited in Taunton Castle Museum and, as arranged from the beginning of the exploration, have become the property of the Somersetshire Archæological Society. An important addition has recently been made to the exhibits, viz., a sectional model of the barrow excellently constructed by Mr. Whistler. It is hoped and expected that the "finds" and the model will, a little later on, have a special case in the Museum devoted to them.

The Report is accompanied by supplementary appendices, written by the Revs. C. W. Whistler and W. H. P. Greswell, the Rev. H. H. Winwood, F.G.S., Mr. Albany Major, Dr. Winterbotham, and the undersigned.

H. St. George Gray.

II. BARROWS, OR TUMULI, IN SOMERSET.

Leaving the barrows and cairns, somewhat thickly grouped on Exmoor, the Mendips, the Quantocks, the Brendon Hills, and Haddon Hill near Dulverton, out of consideration, Somerset is not well represented by burial-mounds of the Bronze and other ages. Beyond the groups above mentioned, there are probably not more than forty mounds[2] in the county which can be classed as tumuli.

Very little systematic barrow-digging has yet been done in Somerset, and what few records there are of such work are not of a very satisfactory description. Perhaps the most elaborate mound in the county is the chambered long-barrow at Stoney Littleton, near Wellow, described by the Rev. J. Skinner in 1815,[3] shortly afterwards recorded by Sir R. C. Hoare,[4] and explored by the Rev. Preb. H. M. Scarth. Butcombe Barrow, or the "Fairy's Tout," a long-barrow of oval form, 150 by 75 feet, near Nempnett and Butcombe, was explored in 1788 by the Rev. T. Bere, but is now much mutilated.[5] Round barrows in the neighbourhood of Camerton were opened by the Rev. J. Skinner in the middle of last century.[6] He also dug into most of the barrows in Small Down Camp, near Evercreech;[7] a small one, however, left untouched, I had the pleasure of excavating in 1904. Skinner appears to have missed it owing to its smallness and slight elevation. A cremated interment was discovered placed on the surface of the undisturbed sand; and flint implements and

(2). Including eleven barrows enclosed by the earthworks of Small Down Camp.

(3). *Proc. Som. Arch. Soc.*, VIII, ii, 35-62.

(4). *Archæologia*, XIX, 44.

(5). *Proc. Som. Arch. Soc.*, VIII, ii, 54; XV, i, 20; Rutter's "Delineations of Somerset," p. 124; Collinson, II, 318.

(6). *Proc. Som. Arch. Soc.*, VIII, ii, 43; XI, ii, 184-5.

(7). *Op. cit.*, L, ii, 38.

flakes, and a fragment of Bronze Age pottery, were found scattered through the material forming the mound.[8]

A barrow on the Brendon Hills, in the parish of Luxborough, was opened by the road-surveyor to obtain material for repairing the roads, during which operations cremated interments are stated to have been found;[9] and in Langridge Wood, near Treborough, an "ancient sepulchre" (? barrow) was explored also by a road-surveyor's men.[10] About twelve years ago, the Rev. Preb. F. Hancock partly excavated two barrows on the Brendon Hills, and his notes have been published.[11]

One of the most careful pieces of barrow-digging conducted in Somerset, was the excavation of a twin-barrow and a single barrow at Sigwell, near Charlton Horethorne and Compton Pauncefoot, in 1877, by Professor Rolleston and General Pitt-Rivers (see also p. 72).[12]

On Brown Down, a little to the S.E. of Otterford, near Taunton, there are several barrows, some of which have been known as "Robin Hood's Butts"; one was opened in 1818, "when nothing was discovered but a heap of flints in the centre, without the appearance of an interment."[13]

Some at least of the Priddy barrows on the Mendips were dug into by Mr. Skinner in 1815, and in all cases in which the interment was found, cremation appears to have prevailed. Amber beads, a blue glass bead, bronze spear-heads, flint and bronze arrow-heads, and an ivory pin are said to have been found in this group of barrows.[14] Amber beads were also found in the county in association with a Bronze Age inter-

(8). *Proc. Som. Arch. Soc.*, L, ii, 39-40.

(9). Phelps's "History of Somerset," vol. II, pp. 124-5 of the part relating to earthworks.

(10). *Op. cit.*, II, 125.

(11). *Proc. Som. Arch. Soc.*, XLII, ii, pp. 22-25.

(12). *Proc. Som. Arch. Soc.*, XXIV, ii, 75-88; and *Journ. Anthrop. Inst.*, VIII, 185-194; the latter with three plates of illustrations.

(13). Phelps, II, 89.

(14). *Arch. Journ.*, XV, 215; *Vict. Co. Hist. Som.*, I, 190.

ment at South Chard in 1855; some men were digging a drain in a field belonging to Earl Poulett, and at 3½ feet below the surface they found a pot (? food-vessel), the top of which was destroyed; the pot is said to have contained the beads, but there is no record of a cremated or an inhumed interment having been found. Some of the beads and the vessel may be seen in the little museum at Chard. Again, amber beads were found in this county with the Wedmore hoard of bronze torcs, etc., in 1846;[15] and five examples, of the Prehistoric Iron Age, have been found in the Glastonbury Lake Village.

The barrow which forms the subject of this report, although it has had a notable local reputation, was not marked by Professor Boyd Dawkins in his prehistoric map, in Vol. I of the "Victoria County History of Somerset." On p. 184 it is barely mentioned as follows:—"Among the few and isolated prehistoric remains to the east (of Quantock ridgeway) we must notice Tet Hill (Twt Hill) south of Stogursey, the camp at Cannington Park overlooking the marshes of the Parret at Combwich, and the tumulus on North Moor, about two miles to the north of Stogursey."

III. POSITION OF WICK BARROW.

Wick Barrow,—otherwise known as "Pixies' Mound" or "Burrow Sidwell," is situated in the parish of Stoke Courcy, from the church of which it is not quite 1¾ miles distant in a direction slightly E. of N.[16] From Bridgwater the tumulus is 7½ miles in a N.W. direction, from Cannington Park Camp 3½ miles in the same direction, and from the hamlet of Shurton 1 mile in a N.E. direction. From the Barrow Stockland is 2⅜ miles in a S.E. direction; Stolford Farm[17] 1½ miles to the E.,

(15). *Arch. Journ.*, VI, 81.

(16). These distances are given as the crow flies.

(17). A part of Stolford is seen on the right-hand side of the photograph, Plate III.

and Wick Farm ¾ mile to the S.S.E. The nearest point to the shore (Bridgwater Bay) is on the north,—distance 3 furlongs. Burnham is clearly visible on a fine day at a distance of 6¼ miles in a W.N.W. direction; and in the same line at a distance of 8½ miles, Brent Knoll, surmounted by its ancient camp,[18] looms above the horizon (see Plate III).[19] The view to the W. and S.W. is bordered by the Quantock Hills, the camp of Danesborough, or Dousborough, being at a distance of 5 miles. The sketch-map, Plate II, shows the relative position of Wick Barrow in respect to places of archæological interest for a mile or two on all sides.

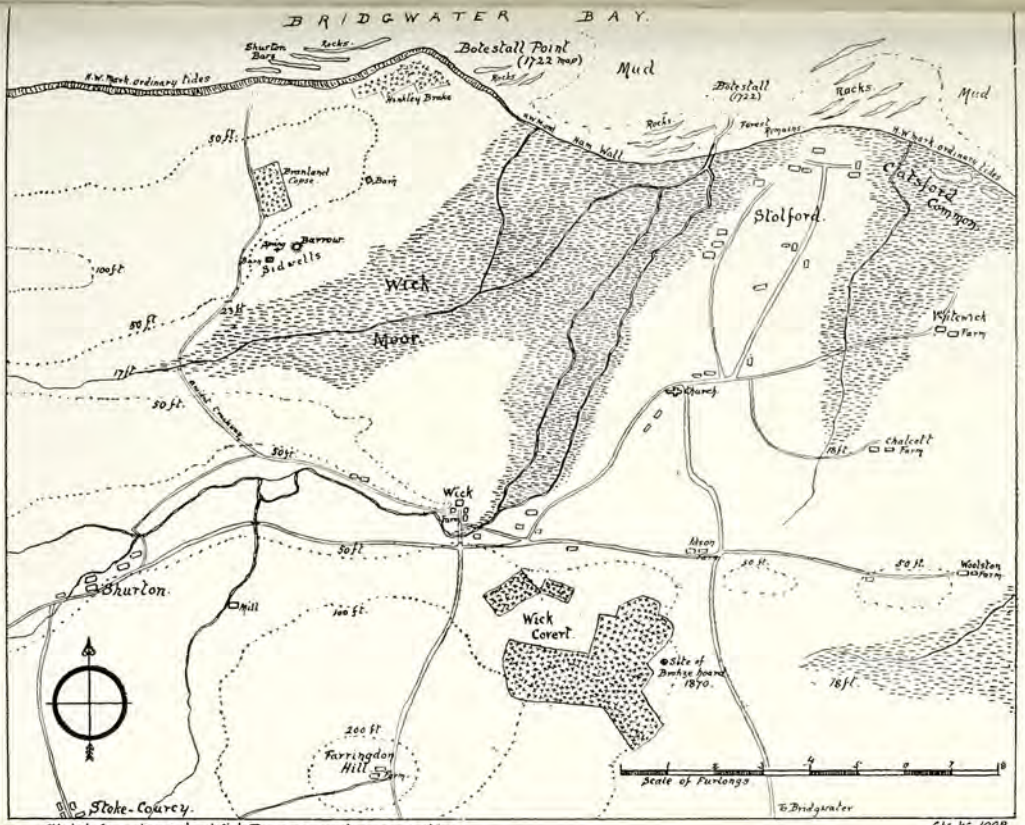
To come to closer quarters, we find that the mound is situated on a slight ridge of land, or promontory,[20] in the middle of a field called "Pixypiece" or "Sidwells," formerly under tillage, but now pasture, which in its lower half slopes considerably towards the gate on the S.E. opening out on North and Wick Moors. (See Plate II.) These alluvial moors are a very few feet higher than mean sea-level; indeed at one time these flats, now grazing fields, were represented by a tidal creek from the sea which extended in a W.S.W. direction as far as Wick Moor Drove. But for the substantial sea-wall (Ham Wall) at Stolford these moors would still be frequently flooded during stormy weather and high tides. The mouth of this inlet is still marked as "Botestall" (*i.e.*, haven) in a map dated 1722.

The barrow, the top of which is about 50 feet above mean sea-level, is actually placed on an outcrop of the Lower Lias formation (see the Rev. H. H. Winwood's geological report, Appendix I). The soil of the lias rock here is a rich, stiff, tenacious, light-brown clay, almost impervious to water; consequently a heavy storm of rain soon renders the surface of the field extremely wet. As the excavations proceeded it was

(18). *Proc. Som. Arch. Soc.*, LI, i, 43-5.

(19). The barrow will be found marked on "Somerset Sheet xxxvii N.E." of the 6-inch, and on Sheet 279 of the 1-inch, Ordnance Maps. The latter is continued southwards by Sheet 295, which includes the whole Quantock range.

(20). The line of this spur of land takes a N.E. and S.W. direction.



Sketch Map to scale. Wick Barrow and surroundings.

C.W. W. 1908.

PLATE II.

observed that the "old surface line" beneath the barrow appeared to run at a slightly higher level than the present surface of the land immediately surrounding it. This is no doubt partly due to the fact that the field has been under the plough, to the subaerial denudation of the unprotected surface since the construction of the mound, and to the choice of a slight natural prominence, or outcrop, in the ground and rock for the position for erecting the barrow.

The situation of Wick Barrow in respect to the land immediately surrounding it is well shown in Plate III. This photograph was taken from the summit of a hayrick close to the Sidwell Barn. The position of this Bronze Age barrow is most unusual, so few being found in Britain on comparatively low ground. In this connection, however, it is most interesting to note what Du Chaillu says with regard to mounds of the Bronze Age in Scandinavia, in "The Viking Age"[21]:—"The graves of this period (Bronze Age) also generally lie on the top of some high hill, or the cairns are placed on *the summit of some promontory having an unobstructed view of the sea or some large sheet of water.*"[22]

On the shore at Stolford traces of a submerged or submarine forest may be seen,[23] and this may be connected with the peat-beds of the Somerset levels. Submerged forests of lesser extent exist all along the coast to Minehead and Porlock Bay.[24] The last named places are not only of interest to the geologist but to the archæologist also, seeing that flint and chert chippings had been found there in 1869 by Prof. Boyd Dawkins and the Rev. H. H. Winwood.[25] The Stolford forest would probably

(21). Vol. I, p. 84. The italics above are mine.

(22). See Mr. A. F. Major's note, Appendix I, p. 69.

(23). L. Horner in *Trans. Geol. Soc.*, III, 380.

(24). In Porlock Bay the following order of beds was noted by Mr. Godwin Austen:—(6) Shingle bank; (5) Marine silt, with *scrobicularia plana*; (4) Surface of Plant-growth, with roots of plants, stumps and trunks of trees; (3) Freshwater mud-deposit; (2) Forest-growth,—oak and probably alder; (1) Angular detritus. (*Quar. Journ. Geol. Soc.*, XXII, 1.)

(25). *Proc. Som. Arch. Soc.*, XVIII, i, 26-31.

yield similar results, but a thorough examination of such an area would bristle with difficulties.[26] The Minchead forest has also yielded other objects.[27]

Much additional information with regard to the position of the barrow, with geological notes, will be found in Appendices I, II and IV.

IV. DESCRIPTION BEFORE EXCAVATION.

The greater part of the surveying before the excavation was carried out on April 5th, when a rectangular enclosure of rather more than half an acre, measuring 160 feet true N. and S., and 150 feet E. and W., was marked off round the barrow. The bottom line (south) of posts of this enclosure is distinctly seen in Plate III. On account of the slope of the ground in a S.S.E. direction, the mound appeared to be much higher on this side than elsewhere. Owing to denudation and the gradual silting of the upper material, the original margin of the barrow, at least on the S. and S.E. sides, had become covered, and the talus which had collected at the foot of the slope (see Photographs, Plate IV) gave a bulge to the edge of the mound. The approximate diameter of the barrow is 84 feet.

The Plan (Plate I) shows contours of one foot vertical height and a fall within the area of the plan of 20 feet from the summit of the barrow to the lowest part in the S.E. corner. The mound is about five feet high above the foot of the N. slope; and the vertical height from the approximate original margin of the barrow on the S.E. to the summit is 11 feet. From the top of the barrow to the "old surface line" immedi-

(26). Water-worn flint flakes and cores have been found occasionally by the Rev. C. W. Whistler along the Stolford beach. Large trunks of yew are found at Stolford among the forest débris, which is there uncovered for a short distance at every tide.

(27). *Proc. Som. Arch. Soc.*, LII, i, 62.

GENERAL VIEW OF WICK BARROW AND SURROUNDINGS, TAKEN FROM THE TOP OF A HAYRICK ON THE W.S.W.

From a Photograph by H. St. George Gray.

ately below it measured 6·8 feet (see Sectional Diagram, Plate I).

A little to the N. of the central post there was a marked depression in the turf on the top of the barrow. It measured about 14 by 10 feet and was about 0·8 foot deep in the middle; and had evidently been made by some sort of digging which had taken place here at some former time.

The highest point—a rather sudden rise—of the mound to the W.N.W. and N.W. may have been caused by débris thrown out from this hole. Another much slighter and smaller depression occurred a little way down the N. slope of the mound, to the N.N.W. of the central picket.[28]

The whole of the N.N.E. and N.E. aspects of the barrow had been disturbed long before our arrival (seen in Plate IV, fig. 1, beyond the plank; also in the Plan, Plate I), and it was ascertained that during the earlier part of the nineteenth century the tenant-farmer commenced the operation of razing the mound to the general level of the field. He was duly stopped, but did not replace the material he had removed. In a lesser degree the slope of the barrow had been mutilated in later years on the E. and E.N.E.[29] In this part, Mr. Jas. Rawlins dug out the greater part of a human skeleton about 1880, in the disturbed ground on the N.E., but he does not appear to have found any associated relics. Here also Mr. D. House scraped out a portion of a skeleton (or remains of mixed-up human bones) in 1902-3. The approximate position of these discoveries is indicated on the plan.[30] House authenticated his previous 'find' by digging out, with our permission,

(28). The term "central picket" will be used throughout to indicate the post driven into the top of the mound, from which all measurements in connection with the surveying, the walled enclosure, and the position of the "finds," were made. "Old surface line" is the expression used to indicate the old turf or rock on which the mound was built.

(29). Brambles and other bushes grew over the greater part of the mound when we begun operations, as seen in the three views, Plate IV.

(30). Reports have been made that human bones were found in draining the field.

other bones close to the surface, in the same position, during the time of the excavations. The remains found by Rawlins were under a large slab of lias. They consisted chiefly of a fragment of pelvis, a few metatarsal bones, and a right thigh-bone, presumably that of an old man who had suffered considerably from some osseous disease. The length of the femur is 388 mm., least circumference 82 mm. (perimetral index 211). If male, the stature, according to one of Rollet's formulæ, estimated from the femur is only 4ft. 8ins.

This bone being of considerable pathological interest, I sent it to Dr. C. G. Seligmann for examination, and he kindly reports as follows :—

"The bone, which is a right femur, presents at its lowest extremity a sessile osteoma of cancellous bone, the lower portion of which is connected with the neighbourhood of the epiphysial line. This osteoma was probably originally of the shape of an egg, bisected by a plane parallel with its longest diameter; its greatest length in the present condition is about 80 mm., and probably its long diameter at no time exceeded this measurement. Such osteomata as that present on this bone are sometimes associated with rickets, but in spite of the shortness of this femur it presents no evidence of this disease."

V. THE EXCAVATIONS IN APRIL, 1907.

The excavations were begun on Monday, April 15th,[31] being temporarily completed on the following Monday.[32] Eight men were employed during the week.[33] A cutting was pegged off

(31). The contoured plan of the barrow was completed on this day, and the mound was photographed from three points of view, Plate IV.

(32). Originally it had been intended to excavate the barrow in a consecutive fortnight, but the work had to be hurriedly closed down owing to the serious illness of the writer's son.

(33). In view of the possibility of further excavations taking place in this neighbourhood it may be well to record the names of the workmen employed in April and September:—Tom Paul (foreman at the Glastonbury Lake Village excavations), Geo. Paul (Glastonbury), Jas. Thorn senior and junior, Ernest Binding, John Rich senior and junior, Walter Perry, Harry Villis, Clement Chilcott, Samuel Graddon, and Thos. Stacey. Wm. Chidgey (Mr. Whistler's coachman) excavated during a portion of the time, and also acted as gate-keeper, etc. The Fund is indebted to Mr. Whistler for making arrangements for the employment of the local men, and for many other preliminary details connected with the work.

for excavation through the middle of the mound due E. and W., which measured 80 feet long by 12 feet wide; and extensions were made from the centre both in northerly and southerly directions.

It was soon found that the work would take longer than anticipated at the outset, owing to the great weight of the material composing the mound, which consisted of lias stone (sometimes in large blocks up to 2½ft. in length) with a comparatively small proportion of loamy mould.

In the first instance some of the men removed material from the top of the mound, 25ft. on either side of the central picket, while others excavated from the E. and W. ends of the cutting, following as their floor the approximate level of the "old surface line." This floor was not easily traceable on the W. but on the E. the decayed turf of the original floor was distinctly seen along the faces of the cutting, and at no great distance from the E. end an outcrop of lias was met with.

"Finds" 1 to 4 were of little importance and are described in Section VII, pp. 23-4.

On the third day a contracted human skeleton (No. I) was discovered a little to the E. of the centre of the barrow[34] but at a depth not exceeding 2ft. from the summit; it was buried in the rough material without any sign of a grave or cist. Its position is fully described in Section XI, p. 37, and it is figured on p. 36. The skull (three views) is represented in Plate X, and described in Section XII, pp. 43-4. Associated with the skeleton were three-quarters of a drinking-vessel, or beaker, much of which was touching the right shoulder, other pieces extending as far as the lumbar vertebræ. Every care was taken to procure all the existing fragments, but it was evident that the pot was not interred in a complete condition.

(34). Interments in barrows are more frequent on the S. and E. than on the N. and W. It is probable that the desire to face the sun, which still influences existing races, was from the earliest times felt, and thus expressed by the position of their interments.

This beaker[35] is described in detail in Section VIII, pp. 25-6, and figured in Plate VII.

It was at this stage in the explorations that I dismissed all thought of a historic burial from my mind, not altogether with disappointment, for I saw before us fresh evidence of Early Bronze Age man in Somerset—remains of an age previously very meagrely represented in our county.

After finding this interesting interment by inhumation, it was only reasonable to suppose that other interments of the same character would be forthcoming in the central area of the barrow and at no great depth; and knowing that only two beakers had previously been discovered in Somerset, the pot we had already found made us eager for further reward. In pursuing the excavation northwards from Skeleton I, British pottery of a different type (pp. 24, 37, and Plate IX, fig. 12) was found at 12 on plan. Here we were on the S.E. edge of the depression noticed on the top of the barrow.

In the area marked 6 on the plan at an average depth of 1½ft. we came upon a mass of mixed and confused human bones, none being in sequence, many fractured long-bones being roughly arranged surrounding pieces of crania and lower jaws, apparently of about five adults and one child. They were packed closely together in an oval area measuring about 6 by 2 feet, and the lias stones round about them were larger than in many parts of the mound. Details with regard to these bones will be found in Sections XI and XII, pp. 40, 46-9. The chief peculiarity of the long-bones was the sharpness of the shin of some of the tibiæ. This platycnemism is dealt with at some length in Section XII, pp. 49-51. Another extremely interesting discovery in connection with the remains was the fact that some of the cranial fragments bore impressions of some kind of woven fabric, but all traces of any cloth that may have existed had disappeared. It would appear therefore

(35). "Beaker" is used throughout the report, being the term employed by that well-known authority on Bronze Age pottery, the Hon. J. Abercromby.

FIG. 1.—View from the S.E. on the first day of the Excavations.

FIG. 2.—View from the W.S.W., showing the western cutting.

FIG. 3.—View from the E.S.E., showing the eastern cutting.

Photographs by H. St. George Gray.

that one of the heads at least was wrapped up in a textile fabric. Woven material has occasionally been found in barrows, and this subject is dealt with at some length in Section XII, pp. 48-9.

At this stage of the work it was impossible to definitely determine the origin of this mutilated mass of bones. It was seen by the platycnemism of the tibiæ, the prominent superciliary ridges over the orbits, the form and great strength of the lower jaws, etc., that we had here to deal with the remains of an early race, and not of a recent interment of collected bones brought from another place for burial here. We merely recorded all facts as to the relative position of the bones, their condition and number, and pursued our digging towards the west. Of course the most interesting bones were preserved for measurement and comparison, but the fragments of no use for scientific research were collected and reburied.

The sequel to the discovery of this pile of bones in Wick Barrow was not forthcoming till the excavations were renewed in September. (See concluding remarks, Section XV, pp. 64-6).

The next item of interest was the discovery of another contracted skeleton (No. II) a little to the W. of the centre of the mound, at a depth of 3ft. from the surface; contracted to such an extent that the heels must originally have touched the buttocks of the man. The head was to the N. This skeleton is fully described in Section XI, pp. 37-8, and its position, with its associated relics, is seen in Plate XI and in the illustration on p. 38. The calvaria of the skull was capable of restoration, but the facial portion was very fragmentary; it is dealt with in Section XII, pp. 44-5.

Here, again, a handmade beaker, only slightly damaged, was found near the right shoulder of the skeleton (figured in Plate VIII and described in Section VIII, pp. 26-7). A flint knife-dagger, length 5⅝ins., of fine workmanship and symmetrical lanceolate form, was found close to the pelvis, and near the lumbar vertebræ a small worked flint knife (Plate

IX, fig. 10, and p. 30). The knife-dagger is of a similar type to others found in Somerset (Section IX, pp. 29-31), but after considerable literary research, I have been able to find records of only five other instances of flint daggers having been found associated with beaker interments, two each in Yorks and Derbyshire and one in Wilts (see pp. 30-31). The dagger is figured in Plate VIII, and is seen in the position found on p. 38, and in Plate XI.

Before the close of the April exploration, the existence of an encircling wall within the area of the barrow was proved. It was firstly observed in digging out the cutting on the E. to the ground level, where it was found to be 2′ 10½″ high. It

The Wall of Wick Barrow on the West, with Sectional View of its outer face at A.B.

was readily seen that the wall covered a considerable area and that it was a dry wall composed mostly of thin slabs of lias.

A little later the men came to the wall across the 12ft. cutting on the W. side of the mound. Here it was found to be better built than on the E., and to be from 3′ 7″ to 3′ 8½″ high, with a considerable slope inwards, especially in the upper half. On the W. and elsewhere the bottom of the wall had an almost vertical outer face, as seen in the section of the walling depicted in the accompanying illustration.

Before closing down the excavations temporarily, the upper margin of the wall was traced, from which it was seen that it was not truly circular, its exterior upper diameter varying from 26 to 28½ feet, and that the average width of the top was 17¼ins. The N.E. segment of the wall extended below the mutilated part of the barrow on the N.E., and it was fortunate that this removal of material was not carried sufficiently deep to expose the wall (see pp. 11-12), or it is probable that we should not have had the chance and pleasure of conducting this important exploration.

Before leaving the barrow the outer face and top of the wall already exposed were covered again; and a notice-board was erected to warn off inquisitive visitors.

VI. THE EXCAVATIONS IN SEPTEMBER, 1907.

We recommenced the excavations on Wednesday, August 28th, with a similar gang of workmen under the same foreman, the operations lasting till Saturday, September 7th, after which the filling-in was completed by piece-work.[36] A cutting, 18½ feet wide, was pegged off for excavation in a direction due N. and S., extending from the central picket to a distance of 47 feet southwards. Whilst some of the men worked here, others proceeded to uncover the top of the wall and to trace the whole

(36). With the exception of a very few cartloads of large stones required by the tenant-farmer, the whole of the material thrown out from the excavations was replaced, the work being completed on Sept. 12th.

of its outer face down to the "old surface line," leaving a trench averaging 2¾ft. wide all round the wall where it was not exposed by the three main cuttings (E., W. and S.).

At the S. end of this wide cutting, working in horizontally for some distance, loamy mould was reached, which soon proved to be undisturbed ground. Later in the day ledges of lias rock were uncovered, as seen in the section taken across the mound from S. to N., Plate I. The dip of the strata was towards the sea on the N., the "strike" of the beds of limestone having the appearance of the bases of walls. On pursuing the excavation towards the centre of the mound it was seen that these ledges were in reality outcrops of rock, the dips in the strata between the successive "strikes" being filled with the natural loam of the district. The soil[37] is seen in the foreground of Plate V, fig. 2. The material composing the mound (represented in the Section, Plate I) consisted for the most part of heavy blocks of lias. This is well seen on the left-hand side of the photograph, Plate V, fig. 1. In this S. cutting large blocks of sandstone, presumably from the shore, were observed occasionally.

Very little was found in this excavation. A great many *Helix aspersa* of rather large size were noticed as this digging proceeded. The first marked "find" (13 on plan) was found about 3½ft. S. of the top of the walled enclosure, depth 1ft. from the surface, consisting of fragmentary remains of an adult human skeleton (probably female) and teeth of a child (see pp. 40, 49). They were of no special importance, except as further evidence of the fact that human remains, sometimes in very small fragments, were constantly found in the barrow near the surface.[38]

(37). It was found to be 1ft. 10ins. deep here.

(38). Owing to the looseness of the coarser material forming the barrow, often causing hollow interspaces, small bones of the skeletons and fragments of the beakers were found sometimes a foot below the average level of the interments. This was particularly noticeable in the case of the fragments of the beaker found with Skeleton I.

FIG. 1.—View from the S.E., showing the "fine filling," consisting of mould and small thin pieces of lias, placed against the wall for protection.

FIG. 2.—View of the south face of the Wall, showing the natural loam on which it was built.

WICK BARROW, STOGURSEY, SEPTEMBER, 1907.

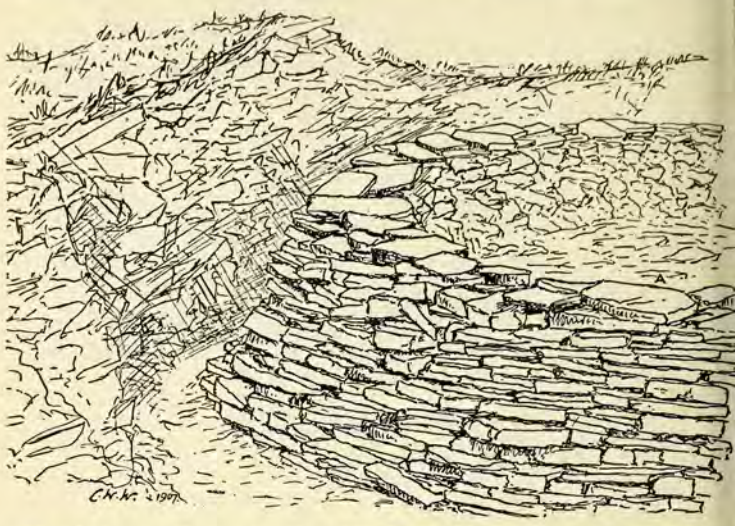
From Photographs by H. St. George Gray

As we approached the outer face of the walled enclosure from the S., E. and W. (it was particularly noticeable on the S. and S.W.), we found that the face of the wall and about 2½ft. of the surrounding area was covered with a much finer material than that forming the greater part of the tumulus. The photograph, Plate V, fig. I, was taken on purpose to illustrate this fact (see also sketch on p. 63). This finer material consisted of a larger proportion of mould than found in other parts, mixed with small thin shaley pieces of lias stone. We have, then, evidence that this lighter material was placed against the outer face of the walled enclosure for its protection and preservation, and this view is supported by the fact that the outer face was firm, fairly smooth, unweathered and undamaged. This matter will be again referred to in the concluding remarks; but in the meantime it should be stated that the long-barrow at Upper Swell, Gloucestershire, contained a wall "encased by a backing of fine small stones for a thickness of 2ft., and beyond that by larger stones."[39]

On September 2nd, the outer face and top of the wall were completely cleared, when photographs and sketches (Plates V, VI and XII, and pp. 20, 54) were made and measurements taken. In Section XIV this retaining-wall has been described in detail, so that it will only be necessary to state here, in addition to what has been previously said (p. 17), that the wall, not truly circular, had a circumference of 85 feet along the top outer margin, and that the basal diameter varied from 29½ to 31½ feet (see Plan, Plate I, and the bird's-eye view, p. 54). It had no foundation below the clay floor. The vertical height of the wall was found to average 3ft. 4½ins., the maximum height being 3ft. 10ins. on the W.N.W., the minimum 2ft. 10½ins. on the E. There was considerable variety in the inward slope of the face of the wall, but the average was 1¾ft. out of the vertical, the maximum being 2¼ft. on the N.W. In some parts, especially in

(39). For further particulars of Upper Swell Barrow, see p. 55.

the W. half (which was better built than the E. half), the wall had a distinct foot which had an almost vertical face for 1 or 2 feet, the upper part of the wall falling inwards considerably



Sketch showing the construction of the Wall of Wick Barrow on the N.W. Taken from the W.S.W.

(see Plate XII, and sketches, pp. 16, 20). The slabs of lias were laid horizontally, or nearly so.

The wall having been cleared the whole way round, we proceeded to remove the interior filling in "spits." As the work progressed fragmentary human remains (including several cranial fragments) and a few animal bones were found, especially in the middle and towards the N. and N.W., below the depression which had been from the first noticed on the summit of the tumulus.

A little to the N. of this area, and just within the margin of the walled enclosure (see Plan, Plate I), the third contracted human skeleton was discovered, head to the S.E., knees to the E., at a depth of 3¼ft. below the surface of the barrow. Here again the extreme flexion of the legs was observed. This

skeleton is described in Section XI, pp. 38-9, and is shown *in situ* in Plate XI. The skull was in a fragile and shattered condition, the left, or under half, being completely decayed, and not a single recognized measurement could be obtained. A little to the N. of the right tibia a large beaker was found in many fragments, but fortunately capable of complete restoration. Some of the fragments rested on the inner margin of the top of the wall. The beaker is figured in Plate VII and described in Section VIII, pp. 27-8. In the angle formed by the trunk and the legs, an interesting group of stone implements, including four flint scrapers, was discovered, as seen in Plate XI, and sketch p. 39. They are figured in Plate IX, figs. 15*a-f*, and again mentioned in Section IX, p. 32.

As we continued the excavation downwards it was noticed that whereas the "filling" on the S. and E. of the enclosure was compact and hard, the area marked by a dotted line on the plan (representing the depression observed on the summit of the barrow) was much looser and contained a surprisingly large amount of fragmentary human bone. The reason of this soon became clear, when, at a distance of 7¼ft. to the N.N.W. of the central picket and 4½ft. to the W.N.W. of the most central point enclosed by the wall, a piece of Roman *mortarium*[40] (16 in plan and section) was discovered about 1ft. above the "old surface line," 2¼ft. below the average level of the surrounding wall, and 5ft. below the surface of the depression on the top of the barrow. It is figured and described in Section X, p. 33. Shortly afterwards, at a slight distance from the piece of *mortarium*, and within an inch or two of the ground level, the foreman (T. Paul) found a small piece of bronze (17 in plan and section) which was immediately handed to me, and proved to be a Roman coin of Constantine I (Constantinopolis), struck about A.D. 335-337 at Lugdunum. This was found at a depth of 2·8ft. below the average level of the

(40). The *mortarium* fragment was found in the presence of several people interested in the work and was handed to Mr. Whistler.

top of the wall, and 5·6ft. below the surface of the barrow. It is figured and described in Section X, pp. 33-4.

No more complete proof of the fact that the Romans had excavated this barrow, digging down from the summit, was needed, and the importance of making contoured plans of barrows, showing every inequality of the surface before commencing the work, was never more favourably illustrated. The Romans had been here, made a deep excavation, the mouth of which measured about 14 by 10 feet, had removed any relics that may have been buried with the primary interment, and collected together some of the bones, breaking them in the operation ; others perhaps were broken to a greater extent and became mixed with the débris thrown out from the hole. They left the piece of *mortarium* and the coin as evidence that they had "rifled" this part of the barrow, probably in the Constantine period. It is improbable that they found anything very valuable in the way of "treasure," seeing that the period of this interment (or interments) must have been the Early Bronze Age. They certainly excavated no further down than the clay floor and lias rock ; the hole appears to have been filled up to the level of the mound, the material in the course of successive centuries having sunk to the extent of at least 9ins. The material which was found to be superfluous appears to have been thrown a little westward of the centre of the summit, as indicated at the time of the commencement of our excavations by a slight rise in this part (as seen by the highest contour on the plan). At the bottom of the hole made by the Romans, large slabs of lias were observed, many standing on edge (not of the character or size of slabs that would be used in the formation of a cist), as if they had been flung in by the Roman labourer, possibly in disgust at having been unrewarded with any great spoils after the labour expended in sinking the shaft ! Judging from the Sole mound in Norway and the Danish one at Asbo, (see pp. 56-9) we should expect the central interment at Wick to have been originally covered by

View showing the breach made in the Wall on the south, the natural loam and ledges of lias in the central area, and the position (16 and 17) in which the Roman objects were found.

From a Photograph by H. St. George Gray.

The End.

From a Photograph by Edmund Withington.

WICK BARROW, STOGURSEY, SEPTEMBER, 1907.

a cairn of stones. Such a cairn however was not traceable, and had one ever existed it is probable that the Romans could not have entirely obliterated its margins in the comparatively cramped area they worked in. The disappointment we felt at not finding the primary interment was very largely counterbalanced by proving most satisfactorily that it had been removed by the Romans.

From these thoughts we again turned our attention to the wall, in which we made a breach, 5ft. wide, on the S. side, to ascertain if there were any peculiarities in its construction (see Plate VI). No other part of the wall was destroyed, and care was taken not to damage it in filling-in. Nothing unusual was revealed. It was found to be of about the same thickness throughout, with a rough and irregular inner surface, as might be expected from building a dry stone wall of this character against a mound consisting chiefly of stone. On the "old surface line" in several places, and especially on the S.E., charcoal was clearly traceable. The clayey soil of the ground level was dug out in places to reveal the ledges of lias rock inclining slightly towards the N., as clearly shown in the photographs, Plate VI.

For the same purpose that the Romans buried their coin and fragment of *mortarium*, we placed in the central area on the solid rock a copper of Edward VII and a leaden tablet bearing the names of the two Societies and those chiefly concerned in the work of exploration, together with the date, the whole covered by a few sods of turf.

VII. LIST OF "FINDS" NUMBERED ON THE PLAN, PLATE I.

1. Fragment of smooth British pottery, light brown, with occasional grains of quartz in its composition; it has one short incised line by way of decoration. Depth 1·5ft.
2. Miscellaneous and fragmentary human bones, depth about 1·8ft.
3. Ditto, including small bits of skull and two phalanges, depth 2ft.

4. Flat oval piece of lias stone, with faint traces of scoring upon it. Found in the body of the barrow. Several sea-shore pebbles were also found.[41]

5. Greater part of a beaker, found in many fragments and nearly touching the right shoulder of Skeleton I and placed along the back as far as the lumbar vertebræ. Plate VII, and pp. 13, 25-6.

6. Mixed pile of human bones, probably the remains of five adults and one child, no two bones being found in sequence. The depth of these remains from the surface varied from 6ins. to 2·3ft. See pp. 14, 15, 40, 46-9, 64-6.

7. Flint flake found in filling-in, in April.[42]

8. Complete beaker found lying on its side, only slightly fractured, and resting against the right humerus of Skeleton II. Plates VIII and XI, and pp. 15, 26-7.

9. Flint knife-dagger, the point towards the S., touching the back of the upper part of the pelvis of Skeleton II, as shown in the drawing and photograph, Plate XI and p. 38; also Plate VIII, and pp. 15, 29-31.

10. Finely worked flint knife found together with No. 9, and almost touching the loins of Skeleton II, as shown in the photograph and drawing, Plate XI and p. 38; also Plate VIII, and p. 30.

11. Flint flake, depth 1·3ft. Plate IX, fig. 11.

12. Two fragments of Bronze Age pottery, apparently of one vessel (not of "beaker" type); one found near the head of Skeleton I, the other close to, amongst the pile of "mixed bones" found to the N. of Skeleton I. Smooth hand-made pottery, black on the inside and yellowish-red on the exterior, containing a few grains of quartz; ornamented with impressions of the finger-tip and nail. Plate IX, fig. 12.

13. Fragmentary remains of an adult human skeleton (? female), and teeth of a child, at a depth of 1ft.

14. Beaker in fragments, found to the N. of the tibiæ of Skeleton III and touching the inner margin of the top of the walled enclosure. Plate XI and p. 39; also Plate VII and pp. 27-8.

15. Four flint scrapers, a flint knife, and a polishing stone, found together between the right humerus and the right femur of Skeleton III. Plate XI and p. 39; also Plate IX, figs. 15*a-f*, and p. 32.

16. Piece of a Roman *mortarium*, found within the walled enclosure, 1ft. above the "old surface line" and 5ft. deep below the depression on the top of the barrow. Illustrated on p. 33; see also pp. 21, 32-3.

(41). A small "heart-shaped" piece of lias, slightly over an inch long, with a perforation perhaps for suspending the object as a pendant, was found close to the barrow some years ago by Mrs. Berry, of Park Farm, Cannington, whose husband at one time farmed "Sidwells." The object bears evidence of prolonged use, but the scratches on it are probably accidental.

(42). A small flint flake was found on the top of the wall on the N.E. by Miss Irene Whistler.

17. "Third brass" coin of Constantine I (Constantinopolis), found close to the piece of *mortarium* and the "old surface line," and 5·6ft. deep below the depression on the crest of the barrow. Illustrated on p. 33 ; see also pp. 21, 34-6.

VIII. THE BEAKERS, OR DRINKING-VESSELS, FOUND AT WICK BARROW, AND ELSEWHERE IN SOMERSET.

(1). *Beaker found with Skeleton I. (Figured in Plate VII).*

This hand-made vessel, moulded into elegant shape, was found in many fragments with weathered edges, and was probably buried in association with the skeleton in an incomplete and fractured condition. Three-quarters of the pot were recovered, and it was possible to restore about two-thirds of it.[43] The cup falls under Type $\beta 1$ of the Hon. John Abercromby's classification, and is a form chiefly found in the s.w. of Britain. In general outline it most closely resembles (1) the beaker found near Almer, Sturminster Marshall, Dorset,[44] and (2) that found by General Pitt-Rivers in Barrow 20, Rushmore Park, Wilts ;[45] both now in Farnham Museum, North Dorset.

Beaker No. 1 is an ovoid cup with recurved rim, and has a polished surface which almost amounts to glazing,—the result probably of burnishing with a smooth stone, or an implement of bone, or by means of a pad of raw hide, which would probably have produced the greasy-looking "glazing." Height of vessel, 6¼ins. ; ext. diam. at rim, 6⅛ins. ; max. ext. diam., 5½ins. ; diam. of base, 3ins. ; max. thickness of ware, excluding base, 6mm. ; the substance of the clay is black, the inner and outer surfaces brick-red, of a smooth paste, without any apparent grains of quartz or sand in its composition ; sharp-rimmed on the outer edge owing to bevelling ; inside the rim are three irregular lines of impressions of plaited grass.[46]

(43). The three beakers were restored by Mr. and Mrs. St. G. Gray.

(44). Figured in *Proc. Soc. Antiq. Scot.*, XXXVIII, p. 383, no. 59.

(45). *Op. cit.*, p. 385, no. 67 ; and "Excavations in Cranborne Chase," II, Pl. lxxvii.

(46). Ornamentation in a similar position is seen on a beaker found at Court Hill, Dalry, Ayrshire, in the Nat. Mus. of Antiq., Edinburgh. (*Proc. Soc. Antiq. Scot.*, XXXVIII, p. 387, no. 74 ; and vol. X, p. 284).

All the lines of ornamentation on the exterior are composed of rows of small oblong or square punctured dots. Horizontally arranged are four pairs of lattice bands consisting of crossed oblique parallel lines; each pair is divided by two rows of punch-marks, and the interspaces between the pairs of ornamental bands are filled up at regular intervals by rows of punch-marks which considerably overlap in places.[47] Similar ornamentation, which is common, is seen on a beaker found in Barrow 7, at Sherburn, East Riding, now in the British Museum.[48]

Full particulars of the circumstances of finding Beaker No. 1 will be found on p. 13. Its position on the Plan, Plate I, is indicated by the figure "5."

(2). *Beaker found with Skeleton II. (Figured in Plate VIII).*

This hand-made pot was found broken only to an inconsiderable extent, and has been fully restored. As a *type* it is rather earlier than the beaker found with Skeleton I, and it falls under the heading of Type *a*2 of the Hon. J. Abercromby's classification. The four beakers found in association with flint daggers mentioned on p. 31 belong to the very earliest type of ceramic art of the Bronze Age, viz., Type *a*1 of Mr. Abercromby,[49] whilst the fifth example noted there was too fragmentary for restoration.

The body of Beaker No. 2 is more or less globose, with a slight "shoulder" at the widest part. The height of the body is almost equal to that of the neck, at the base of which there is a constriction, but not so decided as in the case of Beaker No. 3. The neck is straight-sided, curving very slightly inwards at the lip. Height of the vessel $6\frac{1}{2}$ins.; ext. diam. at rim $4\frac{15}{16}$ins, at base $3\frac{1}{16}$ins., at bulge of the body of the vessel $4\frac{5}{8}$ins.; thickness of ware at the rim 7·5mm.; the substance of the clay is brownish-black, the outer surface reddish-drab in colour, of a smooth paste like the other beakers.

All the ornamentation is made up of lines of small rectangular punch-marks. The top of the rim is stamped with a zigzag pattern. The whole external surface is covered with ornament, excepting the plain band encircling the vessel just below the constriction. The design of ornament is of early type and consists, on both halves of

(47). "Excavations in Cranborne Chase," IV, 235-8.

(48). *Proc. Soc. Antiq. Scot.*, XXXVIII, p. 400, no. 127. Greenwell's "British Barrows," 146.

(49). *Proc. Soc. Antiq. Scot.*, XXXVIII, 325.

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III.

BEAKERS FOUND WITH SKELETONS I. AND III., WICK BARROW, 1907.

From Photographs by H. St. George Gray.

the vessel, of two lines of interlocking triangles filled with horizontal lines parallel to the base, leaving a plain bar-chevron interspace, averaging ⅜in. in width, between them, which together comprise a most effective and ambitious style of ornament. In some instances, in the lower half of the vessel, the triangles meet or nearly so, the interspaces presenting themselves sometimes as bar-chevrons, sometimes as bar-lozenges. Thus it is seen that the bands of triangles filled with lines parallel to the bases formed the chief *motif* of the decoration, the plain chevrons and lozenges being of secondary importance. Chevron designs are common on early Bronze Age pottery, but the exact treatment displayed on this beaker is not precisely like anything that has been found previously, except in the case of the decoration on the neck of a beaker of similar form found by Mr. J. R. Mortimer in Barrow No. 4 of the Painsthorpe Wold Group, East Riding.[50] Somewhat similar decoration is also seen on a beaker from Newhouse Farm, St. Fagan's, Glamorgan, and now in the Cardiff Museum.[51]

Full particulars of the discovery of Beaker No. 2 will be found on p. 15. Its position on the Plan, Plate I, is indicated by the figure "8."

(3). *Beaker found with Skeleton III. (Figured in Plate VII).*

This beaker, also handmade, was found in many fragments, several of which had weathered edges as in the case of Beaker No. 1, from which it may reasonably be assumed that the vessel was buried in a fractured condition. About five-sixths of the pot were recovered, and it was possible to restore about three-quarters of it, the deficiencies being made up with plaster of Paris.

This vessel is larger than either of the other two found in the barrow, and is moreover of an entirely different type to Beaker No. 1. Like the four beakers found in association with flint knife-daggers mentioned on pp. 31, this example

(50). Figured in the "Burial Mounds of E. Yorkshire," Pl. XXXIV, fig. 270.

(51). *Proc. Soc. Antiq. Scot.*, XXXVIII, p. 376, no. 31. The ornament of the beaker-class of pottery is dealt with by Mr. Abercromby in the same work, XXXIX, 326-344 (see no. 42, p. 341, also the left-hand part of no. 14, p. 339). See also "Celtic Art in Pagan Times," by J. Romilly Allen, chapter II, for detail and origination of this decoration; also illustration facing p. 26.

belongs to the very earliest type of Bronze Age pottery, viz., Type *a*1 of Mr. Abercromby's classification.[52]

The body of the vessel is decidedly globose, with a "shoulder" slightly indicated; the height of the body is almost equal to that of the neck, and the constriction in the middle is more pronounced than usual. The sides of the neck are straight, but do not splay out so much as in the case of Beaker No. 2. Height of the vessel 7¼ins.; ext. diam. at rim 5ins., at base 2⅞ins., at bulge of the vessel 5⅝ins.; thickness of ware at the rim 5·5 mm. The substance of the clay is black, the inner and outer surfaces being of a light brick red colour; of a smooth paste. Like the other beakers, this cup was polished on the surface by means of an implement of bone or stone, or by a hide pad.

As in the cases of the other two beakers the ornamentation is entirely made up of quadrangular dots. At the constriction there is a plain band encircling the vessel, like Beaker No. 2, and there is another plain band just below the widest part of the body. Between these plain bands the three compartments of ornament are of precisely the same character, consisting of an upper row of triangles pointing downwards and a lower row pointing upwards, the interspaces between them being partly filled by lozenges at regular intervals apart. The bases of the triangles do not touch one another, as is more usual. The triangles and lozenges are filled with the little punch-marks; one of the triangles, however, seen clearly in the illustration, Plate VII, was never completely filled with the indentations.

A somewhat similar design is seen on a beaker found in Sliper Low, Brassington Moor, Derbyshire,[53] and another in Top Low, Swinscoe, Staffs,[54] both of early type.

Full particulars of the discovery of Beaker No. 3 will be found on p. 21. The position on the Plan, Plate I, is indicated by the figure "14."

(4). *The Wincanton and Culbone Beakers, Somerset. (Mentioned for comparison with those from Wick Barrow).*

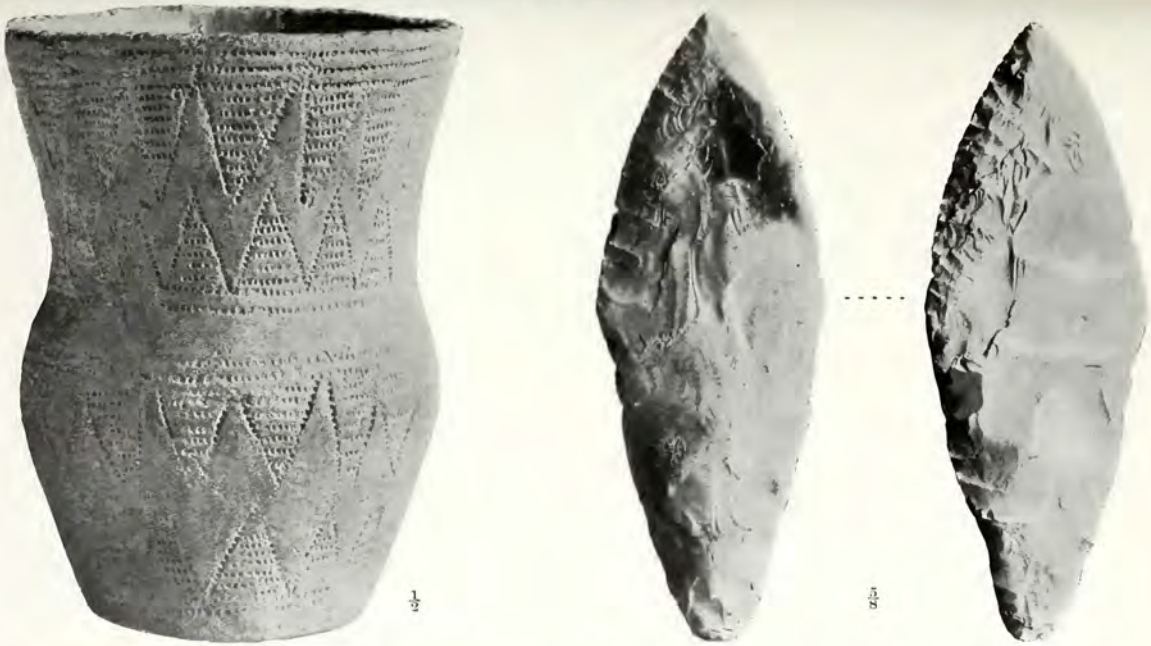
The Wincanton beaker[55] belongs to Type *a*3 of Mr. Abercromby's classification, and although in a somewhat fragmentary

(52). *Proc. Soc. Antiq. Scot.*, XXXVIII, p. 325.

(53). *Proc. Soc. Antiq. Scot.*, XXXVIII, p. 371, no. 12; and XXXIX, p. 340, no. 32.

(54). *Op. cit.*, XXXVIII, p. 374, no. 23; and XXXIX, p. 340, no. 33.

(55). Figured in *Proc. Soc. Antiq. Scot.*, XXXVIII, p. 378, no. 39a.



BEAKER AND FLINT KNIFE-DAGGER (TWO VIEWS), FOUND IN ASSOCIATION WITH SKELETON II., WICK BARROW, APRIL, 1907.

From Photographs by H. St. George Gray.

condition is one of the largest beakers yet found in Great Britain.

Perhaps the highest is that found at Somersham, Hunts (Cambridge Museum), height 10½ins.[56]; another beaker found at Hawkfield, Lesbury, Northumberland (Newcastle Museum) is 9¾ins. high[57]; that found on Chagford Common, Dartmoor, is 9¼ins. high[58]; whilst the Wincanton example is also the same height, with an external diameter at the rim of 5¾ins.

This beaker was found in 1870 in Windmill Quarry, Wincanton, depth about 7ft., in association with a circular flint scraper and pieces of red-deer antler. All are exhibited in Taunton Castle Museum. The brachycephalic skull (see pp. 42, 67) belonging to this interment was also preserved, but not the long-bones. The actual interment was found under a "cairn" of 4 feet of loose stones.[59]

The skeleton and associated beaker found in a cist at Culbone, are exhibited in Taunton Castle Museum, and were figured and described by Mr. F. T. Elworthy.[60] The cup is 6¾ins. high; ext. diam. at rim 4⅝ins.; greatest circumference 16¾ins. It belongs to Type $\beta 4$, and is therefore later in type than the four Somerset examples above mentioned, but in its actual fabrication it is probably contemporary.

The measurements of the brachycephalic skull from this interment are given on pp. 42, 67, and the sharp shins of the tibiæ are mentioned on p. 50.

IX. FLINT IMPLEMENTS FOUND IN WICK BARROW.

(1). *Flint Knife-Dagger, etc., found with Skeleton II.*

The flint knife-dagger found in association with Skeleton II

(56). *Proc. Soc. Antiq. Scot.*, XXXVIII, p. 386, no. 71.

(57). *Op. cit.*, XXXVIII, p. 396, no. 111.

(58). *Op. cit.*, XXXVIII, p. 392, no. 95.

(59). Further particulars of the finding of this interment will be found in Sweetman's "History of Wincanton," 1903, pp. 5—7. On line 4 of p. 7 of that book a bad misprint occurs. "Long" should read "round;" and on line 12 "early" should be inserted before "Bronze."

(60). *Proc. Som. Arch. Soc.*, XLII, pt. ii, 56-66. The beaker is also figured in *Proc. Soc. Antiq. Scot.*, XXXVIII, p. 392, no. 94.

is shown *in situ* in Plate XI and in the drawing on p. 38, and is represented on a larger scale in Plate VIII, where also the beaker found in the same interment is figured.

It is of lanceolate form ; length 5⅝ins. ; width nearly 2ins. ; max. thickness, near the butt-end, ⅝in. ; weight 1·9oz. (Troy). The point of greatest breadth is rather nearer the tip than the butt-end. At 2½ins. from the butt-end a slight notch is observable on both edges, indicating the distance the handle, probably made of some perishable material such as bone, wood, or antler, extended up the blade of the implement. It is of course possible that this perfect and thin dagger was never mounted in a handle and that the blade was made purposely for interment with the body. The form is extremely symmetrical and the butt-end is rounded off as a blunted point. It has been chipped with remarkable skill, the cutting-edge all round being in one plane and very sharp ; the cross-section is bi-convex ; the slight sinuosity of the cutting-edge is due to careful secondary chipping. The greater part of the surface is of whitish-grey colour of a porcellaneous appearance ; one patch on the surface, however, retains the indigo-blue colour of the natural flint. The whiteness is probably due to the action of percolating water charged with carbonate of lime.

A well-chipped flint knife, or flake, with finely worked concavities along both edges, was found near the sacrum of the same Skeleton (No. II), as seen in the photograph, Plate XI. It is also worked at the truncated end ; length 2 1/16ins. ; maximum width 1 3/16in. It is figured, full size, in Plate IX, fig. 9.

These flint knife-daggers, of late Neolithic *type,* have frequently been found in barrows, etc., singly and in association with other relics of the early Bronze Age.[61] There are already no less than five flint daggers in Taunton Castle Museum. Four found in the turbaries west of Glastonbury are finely worked ; one of them is broken at both ends, the others measuring 6, 6½ and 7ins. respectively in length ; they originally belonged to the Stradling Collection.[62] The fifth, said to have been found in Somerset, length 5⅝ins., originally belonged to the collection of the late Mr. Wm. Baker. One, very similar to the Wick specimen, was found in a barrow on Lamborne Down, Berks, in company with other stone implements.[63]

As far as I have been able to ascertain only five knife-daggers of the character of the one under consideration have been previously found in England associated with beakers in barrow interments, viz.,

(61). See Evans's " Ancient Stone Implements."

(62). *Proc. Som. Arch. Soc.*, XLVIII, pt. i, 82-3.

(63). Now in the British Museum. Figured in Evans's " Ancient Stone Implements," 1st edit., 312.

wo each in Yorks and Derbyshire, and one in Wilts. For the sake of comparative archæological research, I purpose to give particulars of each of these instances singly.

(1). A knife-dagger of thin grey flint, not very symmetrical, was found in Barrow 39, Stonehenge, in association with a beaker of Type *a*1, 8½ins. high; the dagger measures 7⅛ins. by 2⅛ins. The beaker and dagger were found at the feet of the primary skeleton which was buried in a grave excavated 2 feet into the solid chalk. Both are in the Stourhead Collection in Devizes Museum, and have been figured.[64]

(2). A flint dagger, 6ins. long, a flint implement with a circular head, a piece of spherical pyrites, and a beaker, 7¼ins. high, of Type *a*1,[65] were found in a grave in the centre of the barrow known as Green Low, Alsop Moor, Derbyshire. Lower down were three beautifully chipped arrow-heads with barbs and stems, and three bone instruments much like "mesh-rules" for netting.[66] All are exhibited in Sheffield Museum.

(3). A large, irregular grave, 5ft. deep, surrounded by an irregular circle of small stones, was found under a small tumulus on Smerril Moor, Derbyshire. At the bottom was a skeleton, a beaker of Type *a*1 nearly 9ins. high, a flint dagger 4⅜ins. long, a bone "mesh-rule" 12ins. long, and a flint spear-head 3ins. long.[67] The beaker is in Sheffield Museum and has been figured;[68] the flint dagger and spear-head have been lost.

(4). A beautifully symmetrical flint knife-dagger, 6¾ins. long, was found with an interment by inhumation in No. 37 Barrow, Garton Slack Group, East Riding. It was in the centre of the barrow leaning against a highly ornamented beaker of Type *a*1, both being behind the skull, near the *right shoulder* of the skeleton. Near the dagger, slightly to the N. of the beaker, was a perforated axe-hammer and a circular jet button. All the objects have been figured,[69] and are exhibited in Mr. J. R. Mortimer's Museum at Driffield.

(5). In Barrow No. 124, Acklam Wold Group, East Riding, Yorks, with the primary interment, under the right hand, an extremely fine flint knife-dagger, 7¼ins. long and 2¼ins. wide, was discovered. Other flint implements were found, a small conical jet button and another of red-coloured amber, a bone pin, and a jet ring. Close to

(64). Hoare's "Ancient Wilts," I, Plate xvii; *Devizes Museum Catalogue of the Stourhead Collection*, pp. 23-4; *Proc. Soc. Antiq. Scot.*, XXXVIII, p. 369, no. 3.

(65). Figured in *Proc. Soc. Antiq. Scot.*, XXXVIII, p. 370, no. 5.

(66). Bateman's "Vestiges of the Antiquities of Derbyshire," 59-60.

(67). Bateman's "Ten Years' Digging," 102-3.

(68). *Proc. Soc. Antiq. Soc.*, XXXVIII, p. 371, no. 11.

(69). Mortimer's "Burial Mounds of E. Yorks," Plates LXVII and LXVIII, figs. 510, 511, 513, 514. The beaker is also figured in *Proc. Soc. Antiq. Scot.*, XXXVIII, p. 369, no. 4.

the right side of the skull and near the *shoulder* were the fragments of a crushed beaker. These objects are in the Mortimer Museum at Driffield and have been figured.

(2). *Flint Scrapers, etc., found with Skeleton III.*

Four flint scrapers, a flint knife, and a polishing-stone, were found together close to Skeleton III, in the position indicated in the photograph and sketch, Plate XI and p. 39. All are figured in Plate IX, figs. 15*a-f*. The two smaller scrapers, figs. 15a and 15b, are finely chipped; the smaller is of the horse-shoe type, having a well defined bulb of percussion which has on it a facet known in scientific terminology as an *éraillure*.[71] There is also a well marked *éraillure* on the rougher implements, figs. 15d and 15e. Fig. 15a was evidently originally of symmetrical form, but previous to burial had sustained a considerable fracture on the left-hand side. Fig. 15c exhibits an extremely large and prominent bulb of percussion. Fig. 15d is of rougher workmanship, and was doubtless damaged before burial. Fig. 15e is a somewhat rude knife of triangular cross-section, having an oblique dorsal ridge. The polishing-stone, fig. 15f, of indurated sandstone, is extremely smooth, probably the result of prolonged use.

X. THE ROMAN REMAINS.

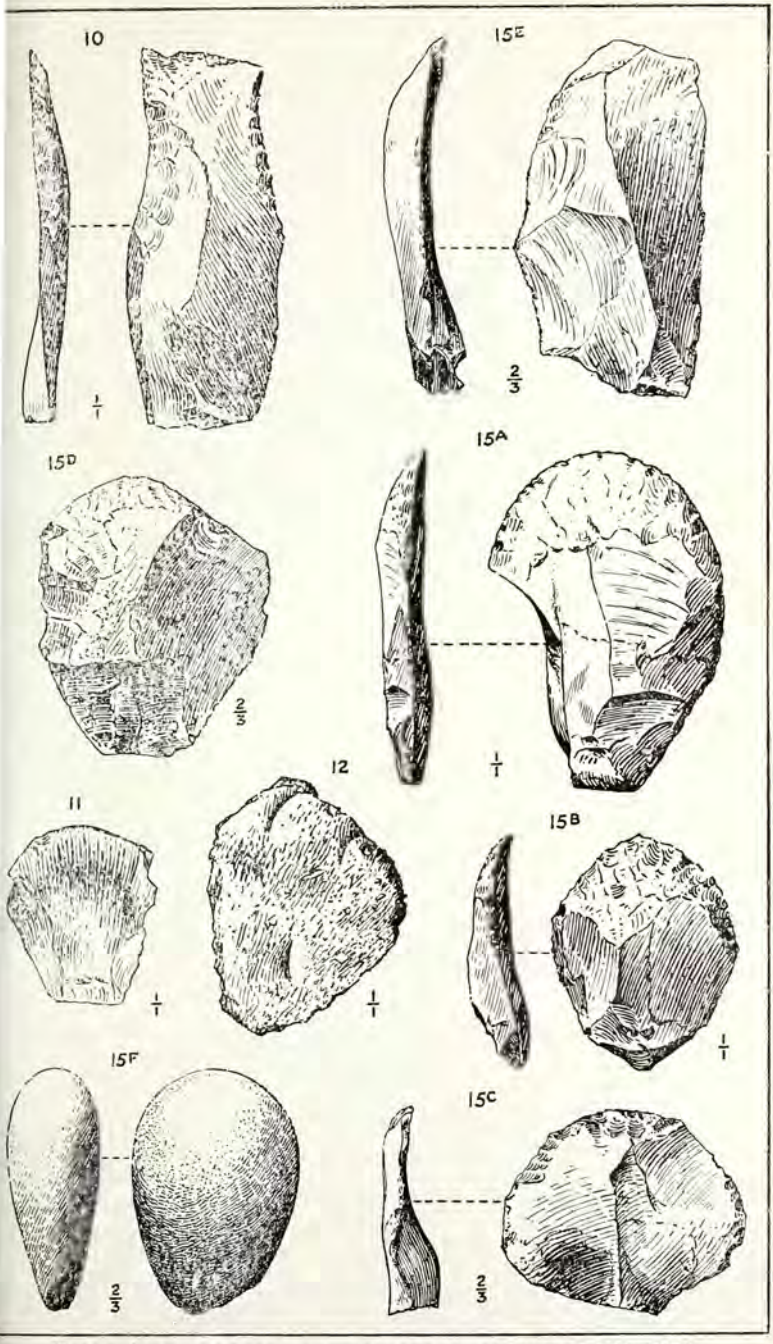
(1). *Piece of a Roman Mortarium.* (*See accompanying illustration, and* 16 *on Plan and Section, Plate I*).

The piece of *mortarium* of cream-coloured ware is typically Roman; it is lathe-turned, and has a broad overhanging flange for fitting on to a stand, in the manner described in "Excavations in Cranborne Chase."[72] It has large grains of quartz

(70). "Burial Mounds of East Yorkshire," Plates XXVI and XXVII.

(71). "Worked Flints from the Cromer Forest Beds," by W. J. Lewis Abbott, F.G.S., *Natural Science*, X, 92-3.

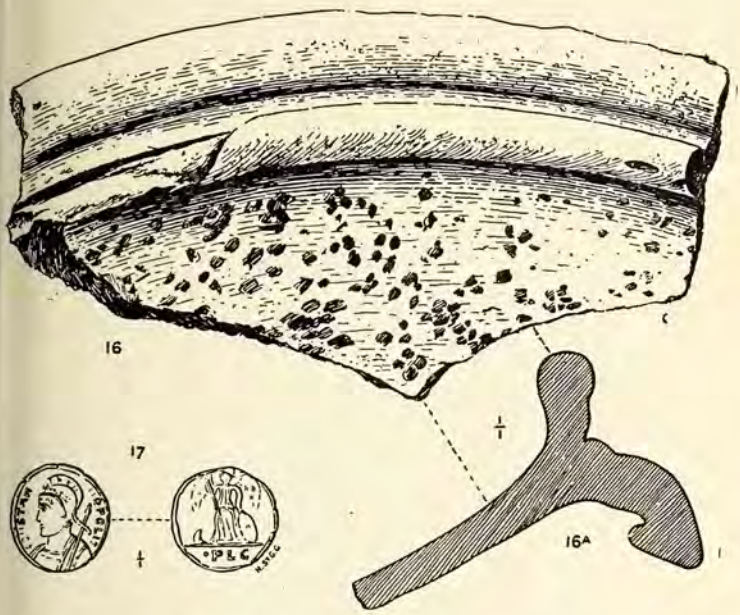
(72). Vol. III, 144; also Vol. IV, Plate 242, fig. 13.



FLINT IMPLEMENTS, etc., FOUND IN ASSOCIATION WITH HUMAN REMAINS, IN WICK BARROW, STOGURSEY.

From Drawings by Mr. Ernest Sprankling.

affixed to the surface on the interior of the vessel, for triturating vegetables in the usual manner. The diameter of the



Roman "finds" found within the walled enclosure of Wick Barrow. 16, Fragment of a *Mortarium;* and 16a, Section across the rim showing the flange. 17, Coin of Constantine the Great (Constantinopolis).

vessel, when complete, at the margin of the flange, was about 13¼ins. It was found within the walled enclosure, as described on p. 21.

Pieces of Roman *mortaria* of precisely the same character, found in Somerset at Charterhouse-on-Mendip, Ham Hill (near Yeovil), the Roman kiln at Shepton Mallet, the Roman villa at Wadeford, and at Stanchester (Curry Rivel), may be seen in Taunton Castle Museum.

(2). *Roman Coin.* (*See illustration on p.* 33, *and* 17 *on Plan and Section, Plate I*).

Close to the position in which the piece of *mortarium* was uncovered and at a slightly greater depth, within an inch or two of the "old surface line," the Roman coin was found.

The following is its description:—Constantine the Great (Constantinopolis): a "third brass," or *nummus centenionalis*; struck between A.D. 335 and 337 at Lyons. *Obv.*—(CON) STAN(TIN)OPOLI(S); helmeted head to left, sceptre in left hand. *Rev.*—Winged Victory on prow of vessel, left hand resting on a shield; in exergue ·PLG—*Lugdunum prima* (*officina*). A somewhat defaced specimen.

A copper coin of Constantine was found on Knighton Farm, Burton, about a mile N.W. of Stogursey, and a mile-and-a-half S.W. of Wick Barrow.[73]

Roman coins in prehistoric barrows are generally found near the surface in association with secondary interments of the Roman period. Occasionally they are discovered just under the turf, into which position they have probably worked after being dropped on the surface. Very rarely, I believe, according to printed records, have Roman coins been found deep in barrows of prehistoric construction, as is the case at Wick Barrow, and in no other case have they been a recognizable token of deliberate exploration by their depositors. Mining Low in Derbyshire has produced a number of Roman coins, but Thomas Bateman's records are so vague and insufficient that it is difficult to determine in what position exactly they were found.

In Cornwall, some Roman coins are stated to have been found in Golvadnek Barrow, at the foot of Carnbrea Hill, in 1700.[73A]

In Dorset, in the long-barrow known as Wor Barrow, on Handley

(73). *Proc. Som. Arch. Soc.*, XXXVIII, i, 76; and *Vict. Co. Hist. Som.*, I, 366. It was presented to Taunton Museum, in 1892, by Mr. R. Wilson.

(73A). *Journ. Ryl. Inst. Cornwall*, v, 202.

Downs, a silver *denarius* of Trajan was found, but only at an unimportant depth beneath the surface.[74]

In Gloucestershire, a coin of Constantine was found in a long-barrow (in an unimportant position apparently) at Nether Swell.[75]

In Derbyshire, Roman coins have been found in prehistoric barrows in several instances. The large mound at Mining Low appears to have been excavated on two or three occasions from 1843 to 1850.[76] Several broken sepulchral urns and Roman coins were found there, and the large tumulus, nearly 15ft. high, appears to have been used considerably for interments in Roman times. Coins of Claudius Gothicus, Constantine I and II, Constantius II and Valentinian, have been found there (see further remarks on Mining Low on p. 56). A "third brass" coin of Constantine the Great was found near the surface in Rolley Low, Wardlow Common,[77] and another "amongst the débris of the barrow," one mile N.W. of Ashton-in-the-Water.[78] A small brass coin of Constantius Chlorus was found with other remains from a secondary interment in Rusden Low, near Middleton-by-Youlgrave.[79] A quantity of "third brass" Roman coins were found in Haddon Field Barrow in 1824, "about three yards from the centre of the mound" . . . . . "which would pertain to a later interment of the Romano-British period." Bronze Age interments were found in a cist.[80] About eighty small brass coins were found scattered about in a tumulus at Saint's Hill, near Parwich.[81]

In the adjoining county of Staffordshire, three "third brass" coins (including Tetricus and Constantine I) were found in association with a secondary interment of the Roman period in 1845 in Steep Low, near Alstonefield.[82] The same barrow produced 48 Roman coins in 1848. A "third brass" of Constantine the Great was found near the surface of a barrow between Welton and Ilam.[83]

One or two examples may be quoted from Yorkshire. Beneath Barrow 122, near Wetwang Vicarage, E. Riding, a cross-formed excavation was found cut six feet into the rock.[84] Miscellaneous anti-

(74). "Excavations in Cranborne Chase," IV, 67, 84. Several Roman coins were found in the silting of the ditch of this barrow, but all near the surface.

(75). Greenwell's "British Barrows," 514.

(76). Bateman's "Vestiges," 40; "Ten Years' Diggings," 55, 82; *Journ. Derbyshire Arch. & N. H. Soc.*, VIII, 191-2.

(77). Bateman's "Vestiges," 55.

(78). *Op. cit.*, 28.

(79). Bateman's "Ten Years' Diggings," 43.

(80). "Vestiges," 30.

(81). "Ten Years' Diggings," 61.

(82). Bateman's "Vestiges," 76; "Ten Years' Diggings," 122, 126.

(83). "Vestiges," 82.

(84). "Burial Mounds of East Yorkshire," by J. R. Mortimer, pp. 265-6

quities of various dates were found in the barrow and below, including mediæval glazed pottery and a "Roman coin of *Constantius Potus* struck at Trèves." Both Roman and British relics were found in Barrow C64 of the Garton Slack Group, E. Riding, an early British barrow of slight elevation having apparently been considerably disturbed by the Romans (the description however is rather vague).[85] Portion of a human skeleton with fragments of a British vase were found; also a piece of a "food-vessel." At a greater depth however Roman remains, including burnt matter, were discovered in one circular hole, "a Roman bronze coin of Nero Cæsar Augustus (date about A.D. 58-60) and the greater part of a rude bone pin." A Roman coin was found in a large barrow of the Driffield Group, E. Riding, but its exact position was not noted.[86]

XI. THE POSITION OF THE HUMAN REMAINS.

(1). *Skeleton No. I.* (*See Plan, Plate I, and sketch below*).

Sketch showing the position of Skeleton I, and the accompanying fragments of a beaker.

(85). "Burial Mounds of East Yorkshire," 226-8.

(86). *Op. cit.*, 282.

This skeleton was not found in a cut grave, but was merely buried in the rough material, consisting of earth and slabs of lias stone, of which the barrow was formed. It was discovered in April in the E. half of the 12-ft. wide cutting which was driven E. and W. through the mound. The legs were at a depth of 2·3ft. from the surface; the skull, crushed in, being 1·8ft. deep. The remains were contracted,[87] but the drawing (p. 36) does not show the legs, as they were washed out of the bank by the previous night's rain, before the skull, trunk and arms were uncovered. The pelvis was towards the S.S.W.; from it the femora extended in a N.E. direction. The skull was 4·8ft. to the E.N.E. of the central picket, the head facing N.E. The left arm was bent upwards at a very acute angle, the left hand resting against the left side of the head; the right arm extended, and almost reaching the femora; the vertebræ in fairly good condition. Distance from the top of the skull up to and including the pelvis, 2·9ft. About three-quarters of a highly ornate beaker in fragments (Plate VII, and pp. 25-6) were found behind and nearly touching the right shoulder, some of the pieces extending as far as the lumbar vertebræ (5 on plan).

Near the skull of this skeleton, and a little to the N. of it, two fragments of British pottery (12 on plan) were found, ornamented with impressions of a finger-tip and nail. The larger piece is figured in Plate IX, fig. 12; see also p. 24. A few human teeth were found with this interment scattered about.

(2). *Skeleton No. II.* (*See Plan, Plate I, Plate XI, and sketch on p.* 38).

This inhumed and contracted interment was found in April, on the W. side of the E. and W. cutting through the barrow, the skull at a distance of 10·4ft. from that of Skeleton I. The legs were uncovered at a depth of 3ft. from the surface of the barrow. The skull was badly fractured by a large slab of lias resting upon it; the head to the N.N.W., as viewed from the central picket; the lower jaw perfect. Right arm bent at a right angle, the hand against the knees; left humerus extended, the ulna and radius being doubled back to the chin. The extreme flexion of the legs was unusual; the femora were parallel, the tibiæ and fibulæ being doubled back in a S.S.E. direction. The heels must originally have touched the buttocks of the person, and the legs were probably tied back in that position. The pelvis was in a fairly good condition; the measurement from the top of the skull to the base of the pelvis was 3ft. The beaker (Plate VIII and pp. 26-7) with this skeleton was found almost complete, but cracked, resting against the right humerus (8 on plan); distance from

(87). As in the case of Skeleton II, the legs had probably been tied up, causing extreme flexion.

the beaker to top of the left tibia 2·3ft. The flint knife-dagger (Plate VIII and pp. 29-31), with point to the S., was found almost touching the base of the pelvis, the dagger being in such a position as to suggest that it may have been fixed to the waist by means of a belt (9 on plan). Rather nearer the beaker a small worked flint knife (Plate IX, fig. 10, and p. 30) was uncovered (10 on plan).

The accompanying sketch gives rather the impression, due to the removal of similar débris to that shown, that a rough grave had been

Sketch showing the position of Skeleton II, and the beaker, flint knife-dagger and small knife found in association with the bones.

formed for the reception of this interment, but, as in the case of Skeleton I and Skeleton III subsequently found (Plate XI), nothing in the nature of a grave was observed.

(3). *Skeleton III.* (*See Plan, Plate I, Plate XI, and sketch on p.* 39).

This was the third human skeleton in sequence found in the barrow (Sept. 3); contracted, with head to the S.E., knees to the E. It was discovered just within the N. margin of the walled enclosure, the skull at a distance of 12·3ft. to the N.N.W. of that of Skeleton I, and 13 8ft. to the N.E. of Skeleton II. The interment was at an

approximate depth of 3·4ft. from the surface of the barrow immediately above it, and 3ins. below the top of the wall in this part. The skull was found to be badly fractured and incapable of restoration; the vertebral column, although much decayed, was fairly straight. As in the other skeletons (Nos. I and II) the extreme flexion of the legs was conspicuous, and fragmentary remains of the feet were found very near the pelvic bones. The right humerus pointed towards the knees, the ulna and radius being doubled back

Sketch showing the position of Skeleton III, with the associated flint implements and beaker.

under the face. The left arm was across the body, the forearm being at right angles to the humerus. The measurement from the top of the skull to the knees was 3ft. At 9ins. to the N. of the right tibia and 3·9ft. from the skull, the fragmentary remains of a beaker (14 on plan) were unearthed (described on p. 27, and figured in Plate VII); some of the fragments were found only 6ins. from the outer edge of the walled enclosure, and, indeed, touched the inner margin of the wall. Midway between the right elbow and the right thigh-bone, a group of stone implements was discovered, consisting of four flint scrapers, a flint knife, and a smooth pebble or burnisher (15 on plan). These are figured in Plate IX, figs. 15*a-f*, and described on p. 32. Charcoal and rat-bones were found in association with this skeleton.

(4). *Miscellaneous Human Remains (other than the mixed pile of human bones marked "6" on Plan).*

Miscellaneous and fragmentary human bones were found, sometimes singly, sometimes in small groups, in many parts of the body of the barrow, both within the walled enclosure, above it and outside it. The larger groups were found at 2, 3, and 13 on Plan (see pp. 18, 23, 49). Others of much less importance were not marked.

Of the above mentioned, No. 13 was the most interesting. The "find" consisted of fragmentary remains, apparently not in sequence, of an adult human skeleton (probably female) and teeth of a child. They were found at 11½ft. s.s.w. of the central picket, at a depth of 1ft., and a little outside the walled enclosure. No remains of the adult's cranium were found, and of the head only portions of the lower jaw were recognizable. Two minute fragments of British pottery were associated with the bones, and a tooth of young sheep. The shell, *Achatina acicula*, was found in plenty in the shaft of the bones here and elsewhere, though not living.

(5). *Collection of Mixed Human Bones.* (*See* "6" *on Plan, Plate I*).

A mixed pile or collection of human bones was found near, and to the N. and N.N.W. of, Skeleton I. They formed a confused mass, disjointed and fractured, no two bones, or parts of bones, being in sequence, their depth from the surface varying from 0·5 to 2·3 feet. The remains of five adults and one child were observed, packed closely together, the long-bones being arranged round the skull-bones. There seemed to be a large proportion of skull-bone compared with the long-bones of the body.

These bones were for the most part in bad condition, not so much because the bone was friable or decayed, as on account of their fractured and mutilated condition. The greater part of the calvaria and facial portion of one skull (with almost all the sutural irregularities effaced) remained, and one of the lower jaws is complete. Of the other crania portions only remain, the thickest piece of skull-bone measuring 8mm. There are various fragments of frontal, occipital, and temporal bones, and of upper and lower maxillæ. None of the long-bones were capable of complete restoration. All appeared to have been fractured by removal from an earlier burial-place. The remainder of the pile consisted of a mass of comminuted and for the most part unrecognizable fragments. One piece of radius showed marks of gnawing, perhaps by rats. A fragment of British pottery with finger-nail ornament was found amongst the bones (see pp. 24, 37); also four teeth of ox.

The physical peculiarities of these remains and additional observations will be found in Section XII, pp. 46-9.

Skeleton II., contracted, showing the Beaker and Flint Dagger and Knife in position found, April, 1907. Taken from the E.S.E.

Skeleton III., contracted, showing fragmentary Beaker and Flint Scrapers in position found, September, 1907. Taken from the W.

WICK BARROW, STOGURSEY, SOMERSET.

From Photographs by H. St. George Gray.

XII. OBSERVATIONS ON THE HUMAN REMAINS, WITH MEASUREMENTS AND PHYSICAL PECULIARITIES.

(1). *The Crania of Skeletons I and II.*

Both these skulls were found in a much damaged condition, but it has been possible to almost completely restore No. I; but the facial portion of No. II was too fragmentary for restoration.[88] The skull of Skeleton III was so completely crushed and decayed that no measurements whatever have been possible. Four views of Skull I are given in Plate X, which well represent the characteristics of the skull, in the so-called Frankfort position (in which the lower border of the orbit and the upper border of the external auditory meatus are in the same horizontal line).

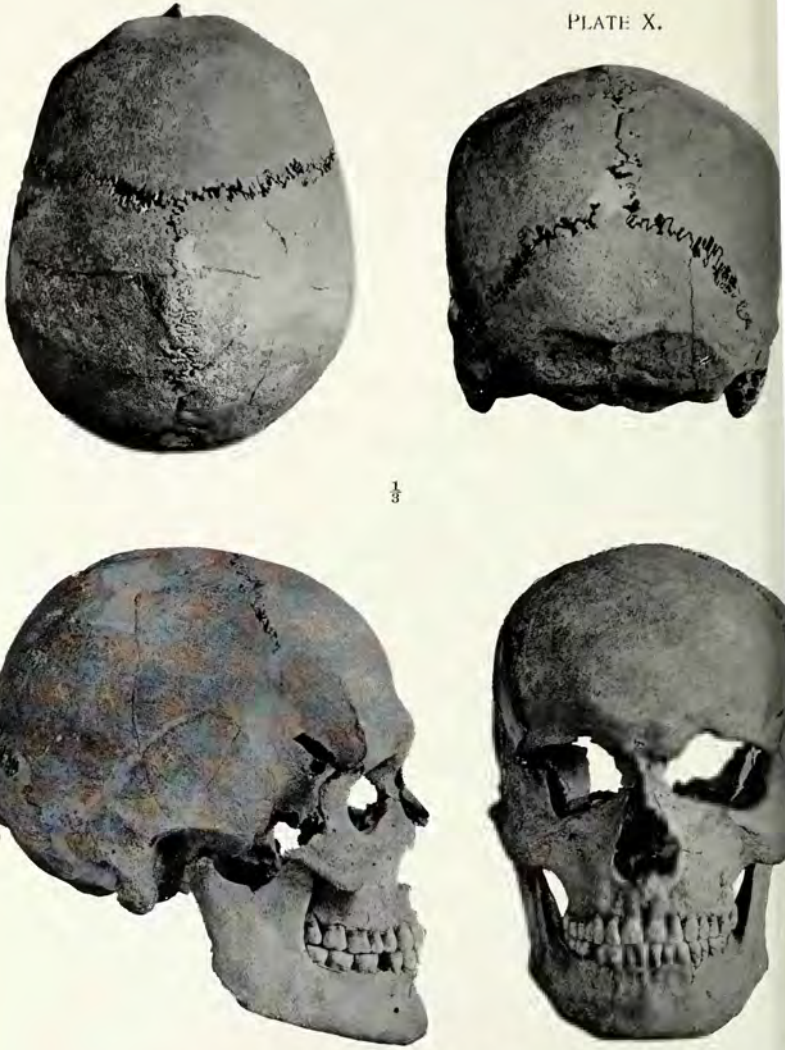
(*a*). *Table of Skull Measurements.*

In this table, for the sake of comparison, all the skull measurements of Somerset examples of this period in Taunton Museum have been included, and a column has been introduced giving average measurements for the county. The Culbone interment was found in a stone cist; the Wincanton skeleton in a quarry.

(88). The skulls were repaired by the Rev. C. W. Whistler, M.R.C.S. The tables of measurements in this section (for crania and long-bones) have been compiled by the writer, Flower's craniometer being used for the skulls.

SKULL MEASUREMENTS.	Wick Barrow, Skeleton No. I.	Wick Barrow, Skeleton No. II.	Skeleton of same period, Culbone, Exmoor.	Skeleton of same period, Wincanton.	Averages Early Bronze Age Skulls, with Beakers, Somerset.
Horizontal Circumference	528	547	w	531	535
Max. Length (Glabello-occipital)	183	194	185*	183	186
Do. (Ophryo-occipital)	181	192	181*	179	183
Max. Breadth	142	143	157	152	148½
Cephalic Index—					
Glab. Occip. Length & Breadth	77·6	73·7	84·0	83·0	79·8
Oph. Occip. Length & Breadth	78·5	74·5	86·7	84·9	81·1
Basion to Bregma	141	146	127*	128	135½
Height Index—					
By Glab. Occip. Length	76·6	75·3	68·6	69·9	72·6
By Oph. Occip. Length	77·5	76·0	70·2	71·5	73·8
Basion to Nasion	108	116	95½	94	103
Basion to Alveolar Point	103	w	96	93	97
Alveolar Index	954	w	1005	989	983
Nasal Height	51	w	47	51½	50
Nasal Width	26	w	23	22½	24
Nasal Index	511	w	489	437	479
Orbital Height	30	w	32	32	31
Orbital Width	43	w	39	40	41
Orbital Index	698	w	820	800	773
Arcs Vertical	335	345	341	335	339
Arcs Frontal	302	307	289	279	294
Arcs Parietal	339	350	w	352	347
Least Frontal Width	98	101	98	99	99
Bi-stephanic Breadth	125	118*	126	122	123
Bi-auricular Breadth	131	131	137	127	131½
Ext Bi-orbital Breadth	108	109*	105	106	107
Int. Bi-orbital Breadth	100	w	97	98	98
Min. Inter-orbital Breadth	19*	w	20	18	19
Bi-zygomatic Breadth	139*	w	144	134	139
Bi-maxillary Breadth	94	w	99½	90	95
Ext. Bi-alveolar Breadth	68	w	64	59	64
Bigonial Breadth	105	104	111*	98	104½
Bi-mandibular Breadth	88	81	81	75	81
Height at Symphysis	30	31	30	30	30
Nasio-Bregmatic Length	115	112	112	110	112
Nasio-Alveolar Length	66*	w	67	70	68
Nasio-Mental Length	116	w	109	113	113
Sex	Male.	Male.	Male.	Male.	—

w., *wanting.* * *approximate.*



$\frac{1}{3}$

SKULL OF SKELETON I.,
WICK BARROW, STOGURSEY, SOMERSET.

From Photographs by H. St. George Gray.

(*b*). *Observations on the Skull of Skeleton I.* (*Plate X*).

This skull is mesaticephalic with a mean cephalic index of 78·0, but more closely approaching the brachycephalic (round-headed) type than the dolichocephalic (long-headed) type of skull. The frontal suture has disappeared, but the others are still fairly well marked, and judging from the teeth, all of which still remain except one of the right bicuspids of the lower mandible, it would appear that the man had reached the age of 30 years.

There is a certain amount of asymmetry of the calvaria noticeable when viewed from above. The superciliary ridges are very prominent, especially over the middle and inner half of the orbits; and the supra-orbital notch or foramen on each side is well marked. The frontal eminences are not strongly developed, but there is a combined height, fulness and roundness in the frontal region, as the bi-stephanic breadth and the nasio-bregmatic length serve to prove. The temporal ridges are rough; ridges for the attachment of muscles are also well developed in the occipital region, and the occipital protuberance is very prominent. The skull is very "square," and the parietal eminences are decidedly prominent.

The nasal opening is both high and wide, giving a nasal index of 511. The orbits are perfect and extraordinarily wide in proportion to their height. They droop rather considerably towards their outer margins.

As the table of measurements shows, the upper maxilla is unusually wide, although the malar width is not exceptionally so. Prognathism is not marked to any great extent.

The lower jaw is extremely powerful with a broad rounded chin. The bi-mandibular breadth is great in proportion to the larger bigonial breadth. The muscular attachments are strongly developed, and the thickness of the whole jaw is remarkable. The gonial angle (that formed by the horizontal and ascending rami) is very obtuse. The coronoid processes and the condyles are very large, and the ascending rami extremely wide.

The skull as shown in the front view photograph (Plate X) has a pair of incised grooves on either side of the frontal bone, symmetrical in position, but much less so in form and direction. The inner ones measure about 23mm. long, and the outer ones 34mm. On the left, just below the pair of indentations, is an angular groove less deeply incised. At the time of the discovery it was thought possible that they may have been made intentionally, either as deep gashes cut at puberty, in order to produce permanent raised scars, or cicatrices, as tribal or family marks;[89] or as ceremonial cuts made *post mortem*, possibly by the slayer as an indication of a deed of valour on his part.

The mesaticephalic skull with seven sword-cuts found in Worle-

(89). Cicatrices, or tribal marks, are commonly seen on the foreheads of the natives depicted on the bronze plaques, etc., obtained from Benin City, West Africa, 1897. (*See* Pitt-Rivers's work on the subject, 1900).

bury Camp and exhibited in Taunton Castle Museum, has indentations on the frontal bone of the same character as those on the Wick skull, one on each side being in a similar position, another pair (specially traceable on the left side) being lower on the frontal bone on either side of the ophryon. I have a skull (probably *temp.* Civil Wars, Chas. I) found within the bounds of the outer moat of Taunton Castle on which similar grooves or channels are present, extending on the right side from the supra-orbital foramen.

Doubting, on a closer examination of the Wick skull, whether these grooves were cuts, and observing their extreme smoothness and general direction, I referred the matter to Dr. Wm. Wright, F.S.A. (of Middlesex Hospital), and he has kindly brought to my notice an article "On certain Markings on the Frontal Part of the Human Cranium and their Significance,"[90] in which the author, Professor A. F. Dixon, says that—

"These grooves vary much in appearance, as they may be simple or branched, shallow or deeply cut. They are not infrequently converted in parts of their course into little tunnels. In some cases they are found on one side of the cranium only; in others they occur on both sides; their distribution is very rarely quite symmetrical. . . . The grooves never pass from the frontal on to the parietal bone—across the coronal suture. . . . The presence of these grooves indicates a want of proportion between the growth in length of the nerves and the amount of expansion of the underlying part of the cranium. . . . The grooves appear to indicate, in the skull in which they occur, an excessive development of the frontal part of the cranial wall. . . . . It is interesting to note that the frontal grooves are almost never found in Australian and Tasmanian skulls, that they are rare among Melanesians, slightly more common among Polynesians, while among Bushmen and Negroes, especially in Zulus and Kaffirs, they are very common, and often extraordinarily well marked. Among Negroes they are present in over 50 per cent. of the skulls examined. In the skulls obtained in the dissecting room they are present in about 41 per cent. of all cases."

There can be little, if any, doubt, therefore, that the grooves on the frontal bone of the Wick skull are *natural* and lodged nerves in life, though in this case they are exceptionally pronounced.

(*c*). *Observations on the Skull of Skeleton II.*

Here we have to deal only with the calvaria and lower maxilla, the facial portion being too fragmentary to allow of restoration. Although the skull is slightly broader than Skull I, it is 9mm. longer, and it is readily seen that it presents characteristics of the Stone Age in so far that it is dolichocephalic, with a mean cephalic index of 74·1. The upper part of the occipital bone is very prominent, which accounts to a large extent for the greater length of the calvaria as compared with Skull I, whilst the base of the parietal region at the back is somewhat flat.

The frontal bone recedes somewhat and the ophyron is not well

(90). *Journ. Anthrop. Inst.*, XXX, 1900, Anthropological Miscellanea, article no. 94.

defined; the superciliary ridges are less prominent than in the average skull dating from the early Bronze Age. The calvaria as viewed from above is asymmetrical, but this is probably largely due to *post mortem* pressure as it lay in the heavy material of the barrow; indeed in this instance we found that a large slab of lias rested upon it. This view (*norma verticalis*) gives an oval outline, elongated in the frontal region.

From the measurements from basion to bregma and nasion, and from the parietal and frontal arcs, it is seen that this skull is higher than No. 1. The frontal suture has entirely disappeared, but judging from the teeth of the lower jaw, all of which remain, it is doubtful whether the man attained a greater age than 25 years. The mastoid processes are strongly developed, but are not unusually long. The foramen magnum is large.

The lower jaw, although powerful, is not so strongly developed as that of No. I, and the gonial angle is not so obtuse. The mental prominence is well marked, square, but not wide. The mylo-hyoid ridges on the inner surface are unusually prominent.

(2). *The Long-bones of Skeletons I and II.*

Enough remained of the long-bones of Skeletons I and II to give a very good general idea of their size, characteristics, and peculiarities. The estimated stature, obtained by means of the formulae of the French anthropologists, M. Rollet and M. Topinard, is what one would expect for skeletons associated with beakers of the Early Bronze Age.

In the case of Skeleton I, the tibiæ, radii, and ulnæ were found to be abnormally long in proportion to the other long-bones. On the other hand the humerus (the left one being complete) was found to be short as compared with the other bones. In proportion to the stature, the perimetral indices of this skeleton show that this man was rather small-boned.

With regard to Skeleton II, the tibia (the left one being hopelessly decayed), as in the case of Skeleton I, was long in proportion to the other bones, and like No. 1, this skeleton was fairly small-boned, judging by the perimetral indices.

The following table of measurements gives all dimensions, except the stature, in millimetres:—

		Skeleton I.		Skeleton II.	
		Right.	Left.	Right.	Left.
ARM-BONES.					
Clavicle	Length	169	169	w	w
	Least Circumference	36	37	40	40
	Perimetral Index	213	219	w	w
Humerus	Length	w	340	334*	w
	Least Circumference	70	69	66	w
	Perimetral Index	w	203	198	w
Radius	Length	263	263	w	w
	Least Circumference	44	43	44	w
	Perimetral Index	167	163	w	w
Ulna	Length	288	286	w	w
	Least Circumference	40	40	39	w
	Perimetral Index	139	140	w	w
LEG-BONES.					
Tibia	Length	w	402	380*	w
	Least Circumference	w	82	80	w
	Perimetral Index	w	204	210	w
	Antero-posterior Diam.	32	33	34	w
	Transverse Diam. of Shaft	25	26	23	w
	Latitudinal Index	781	788	676	w
Femur	Length	w	481	459	459
	Least Circumference	91	92	88	88
	Perimetral Index	w	191	192	192
Fibula	Length	w	w	w	w
ESTIMATED STATURE.					
By one of Rollet's formulae—					
	From Femur and Tibia	5'10·65"		5'7·08"	
	From all the bones available	5'10·51"		5'6·98"	
By Topinard's method—					
	From Femur + Tibia	5'10·37"		5'6·85"	
SEX		Male.		Male.	

w., *wanting.* * *approximate.*

(3). *Collection of Mixed Human Bones.*

(*a*). *Remains of Skull-bones.*

In speaking of the position of these bones on p. 40, it has already been stated that of the cranial remains there were various fragments

of frontal, occipital, and temporal bones, and of upper and lower jaws. One of the latter was complete, and has a prominent and well formed chin; the gonial angle (that formed by the horizontal and ascending rami) is obtuse; and the molars remaining show considerable signs of wear. One or two of the frontal bones have prominent superciliary ridges.

The following measurements were obtainable from the fragments of skulls which remained:—

		Millimetres.
Remains of Skull 1[91]	Ex. Bi-alveolar Breadth	62
	Bi-maxillary Breadth	101
	Ex. Bi-orbital Breadth	110
	Orbital Width	41
	Nasal Height	49
	Nasal Width	24
	Nasal Index	490
Remains of Skull 2[92]	Least Frontal Width	104
	Bi-stephanic Breadth	123[93]
	Nasio-Bregmatic Length	124
Lower Jaw 3	Bigonial Breadth	104
	Bi-mandibular Breadth	83
	Height at Symphysis[94]	34

(*b*). *The Long-Bones.*

Of humeri, the lower articular ends of ten were found, adult, and one child's; of upper extremities, two only. The old fractures of four of these humeri are just below the middle of the shaft; three just above the lower condyles; and three in the upper half of the shaft. Considerable portions of the shafts were missing in each case. The least circumference of four was obtainable, viz., 61, 61, 64 and 69mm. respectively; the last named probably belonged to a fairly large man.

Of radii, there were portions of three only left; of ulnæ, portions of three only; of clavicles, parts of two.

Of femora, portions of four from the right side were found, and the upper ends and three-quarters of the shaft of two left bones, all adult; the least circumference of the two left femora was obtainable, viz., 82 and 88mm., the latter indicating a stature under 5′ 7″. The shaft of a child's femur was also found.

A complete shaft and lower articular surface of a left tibia, adult, was found, giving a least circumference of 77mm. (not large). An

(91). The eight remaining teeth are much worn down.

(92). Apparently the remains of a long, narrow skull.

(93). Approximate.

(94). Two other portions of lower jaws gave 31 and 32mm. respectively for the height at symphysis.

upper half of a child's tibia was found, and portions of several shafts fully adult.

One patella was found, and fragments of shafts of fibulæ, some being deeply grooved.

(*c*). *Skull-bone bearing impressions of Cloth.*

At least five fragments of skull-bone found with these mixed human bones bore a faint impression of a woven fabric of some kind, but all trace of such cloth had disappeared. This would seem to afford evidence that one of the skulls at least was wrapped up in a textile fabric, not of a particularly coarse quality.

Impressions of various fabrics have been noticed occasionally in barrows upon the oxidized surface of bronze implements. Woven material was found, in 1814, in a barrow near Winters Low Hut Inn, in the neighbourhood of Salisbury, with a cinerary urn.[95] In the York Museum is a thick piece of woven cloth made of very fine, short, soft hair or wool, found in a barrow on Skipwith Common in 1819. Traces of clothing were found by Mr. Mortimer in Barrow C38 of the Driffield Group with a human skeleton.[96] Carbonized shreds of woven cloth were discovered with burnt bones in Barrow No. 15 of the Calais Wold Group, also by Mr. Mortimer.[97] Under a skull in Barrow No. 82, Garton Slack Group, he found "fragments of string or fine rope, a little thicker than coarse worsted, made of two strands, each being of a fine fibre resembling flax, and well twisted."[98] There were also small portions of both woven and knitted textures, apparently made of strands of the same fibres as the small pieces of rope. From the centre near the base of Silbury Hill, fragments of a variety of string of two strands, about the size of whipcord, were removed in 1849.[99] In a barrow at Scale House, in Craven, numerous fragments of woollen fabric were discovered in a hollowed oak-tree trunk.[100] In a barrow at Martinstown, Dorset, Mr. C. S. Prideaux and myself found, in 1903, a woven bag or pouch which contained the incinerated remains of a child of about five years of age, the whole being covered by a large cinerary urn, inverted.[101] Other references to textile fabrics of the Bronze Age, found in Britain, will be found in Thurnam's "Ancient British

(95). *Arch. Journ.*, I, 1845, p. 156.

(96). Mortimer's "Burial Mounds of East Yorkshire," 275.

(97). *Op. cit.*, 167.

(98). *Op. cit.*, 234.

(99). "Diary of a Dean," 13; *Proc. Arch. Inst.*, Salisbury, 1849, p. 77.

(100). See illustration in Greenwell's "British Barrows," 32; *Proc. Geol. and Polytech. Soc., W. Riding of Yorks*, 1867, p. 18; *Proc. Soc. Antiq. Scot.*, IX, 552; also *Reliquary*, VI, 1.

(101). Illustrated and described in *Proc. Dor. F. Club*, XXVI, 29.

Barrows."[102] Much stronger evidence of bodies having been clothed at the time of interment is afforded by the contents of some tree-coffins of the Bronze Age found in Denmark. In one instance the whole dress was found complete.[103]

(4). *Other Human Remains found in the Barrow.*

As previously stated (pp. 20, 23, 40) miscellaneous human remains were found in various parts of the barrow; at 2, 3 and 13 on Plan, Plate I, in particular. The position of No. 13 has already been recorded (p. 40). Among these remains the greater part of a tibia was preserved which gave a transverse diameter of 22·5mm., and 29mm. for the antero-posterior diameter of the shaft: latitudinal index 776 (the highest for the barrow except Skeleton I).

With regard to Skeleton III (p. 39), the sex of which was not determinable, it remains to be mentioned here that none of the long-bones were complete, and it was not possible to restore any of them; the left tibia was however measured in the ground approximately, length 13§ins. The tibia alone unfortunately seldom gives very satisfactory results in estimating stature. According to one of Rollet's formulæ the stature is 5′1·9″ if male, and 5′4·8″ if female; by Topinard's method 4′10·4″ if male, and 5′2·5″ if female. This tibia gave 30mm. for the antero-posterior diameter of the shaft, and 22mm. for the transverse diameter; latitudinal index 733, which is the average for Europeans of the present day.

(5). *Platycnemism of the Human Tibiæ.*

(*a*). *Explanation of the term "Platycnemism."*

For the sake of readers who are not students of osteology, it might perhaps be stated that a tibia, or shin-bone, of platycnemic form is a compressed or flattened type exhibiting a very sharp shin, an aberration from the more usual shape of the tibia of the modern European. Platycnemism in prehistoric human skeletons is a point of considerable importance to record, and its existence is characteristic of early man. The latitudinal index of the shin-bone represents the relation that the transverse diameter of the shaft of the bone, near or at the middle, bears to the antero-posterior diameter and from it the amount of compression of the shaft of early tibiæ as compared with the normal European form of the present day can be estimated at any rate fairly accurately. But the peculiarity in question is not commonly found in *all* types of primeval man belonging to the Stone and Bronze, and later, Ages. This extreme sharpness of the shin is obtainable in the negro of the present day.

(102). *Archæologia*, XLIII, 326-7. Thurnam also gives the references to textile fabrics recorded in Hoare's "Ancient Wilts."

(103). Du Chaillu's "Viking Age," I, pp. 91-2, for full illustration of Bronze Age costume. See also Vilhelm Boye: Fund af Egekister fra Bronzealderen i Danmark, Kjóbenhavn, 1896. "Egekister" are oak coffins in which clothed skeletons have been found.

Some scientists have been somewhat inclined to look upon platycnemism as indicative of simian tendencies. It is quite true that the tibiæ of the gorilla and of the chimpanzee are, to a certain extent, platycnemic; but they are by no means so much so as the human platycnemic bone.[104] There are other marked distinctions between the tibiæ of man and monkey.

This extreme sharpness of the shin, it is generally conceded, is connected with the greater freedom of motion and general adaptability of the toes enjoyed by those people whose feet have not been subjected to the confinement of foot-gear, and who at the same time have been compelled to lead an active existence in rugged, hilly and wooded districts, where the requirements of hunting in the search for sustenance would demand considerable agility and activity in climbing and pedestrian pursuits.

The measurement of the Wick Barrow tibiæ for platycnemism has been taken at a point 1½ins. below the nutritive foramen near the centre of the bone. Sir Wm. Flower took the actual centre of the bone. General Pitt-Rivers, following Professor Busk, adopted the first-mentioned method, which also I have been accustomed to use. The latitudinal index has been obtained by multiplying the transverse diameter by 100 and dividing by the antero-posterior diameter. Busk considered the normal latitudinal index for ordinary English tibiæ to be 730, and the lowest he records is 642.

(*b*). *Examples of Platycnemism, Wick Barrow, etc.*

Among the "mixed human bones" (Plan "6") were four portions of tibiæ which gave, for the antero-posterior diameter 32, 32, 34 and 37·5mm., and for the transverse diameter of the shaft 22, 21, 19 and 19·5mm., respectively, the latitudinal indexes being estimated as 687, 656, 559 and 520 respectively. The two latter, as the figures show, are rare examples of unusually marked platycnemism, the average European at the present day, as before stated, having a latitudinal index of 730.

Other latitudinal indexes obtainable from the tibiæ found in the barrow are:—Skeleton I, 785 (mean); Skeleton II, 676; Skeleton III, 733; Tibia found at 13 on Plan, 776.

The tibiæ of the Early Bronze Age skeleton found in a cist at Culbone, Exmoor,[105] are platycnemic, but to no great extent, the latitudinal index being 678, about the same as was obtained from the measurement of the right tibia of Skeleton II from Wick.

The tibiæ of the prehistoric human skeleton found in December, 1903, in Gough's Cave, Cheddar, and dating probably from the late Palæolithic or early Neolithic Age, also belong to the platycnemic type, and I found the latitudinal index to be 622,[106] which shows a greater amount of platycnemism than is displayed by the two complete interments, Skeletons I and II from Wick, but less than in the case of the two tibiæ giving indexes of 559 and 520 respectively.

From these low indexes I was rather inclined to regard these mixed bones as Neolithic—perhaps moved from elsewhere and re-interred.

(104). See Prof. Boyd Dawkins's "Early Man in Britain."

(105). Estimated stature (without any complete bones) 5′ 7″ to 5′ 9″; age 25 to 30 years.

(106). *Som. & Dor. N. & Q.*, ix, 4.

The average latitudinal index from nine tibiæ, Wick Barrow, is 674; and it is probable that there are no examples on record that exhibit a greater amount of platycnemism than those giving indexes of 559 and 520.

XIII. ANIMAL REMAINS, AND SHELLS.

Most barrows are found to contain a considerable number of animal bones scattered about at various depths. Some of these bones may of course be the remains of feasts held at the time of the funeral obsequies and the throwing-up of the mound. Mr. Mortimer in his barrow excavating in the East Riding of Yorks frequently found broken and dismembered human bones, often associated with animal bones, mixed in the material of the mounds, and he thought it probable that the human as well as the animal bones were the remains of feasts, suggesting that cannibalism prevailed. Fragmentary human and animal remains were frequently discovered in barrow researches in South Wilts and North Dorset by Pitt-Rivers, and more recently in barrows at Martinstown, Dorset, the writer has witnessed the uncovering of a number of human skull and other bones in cairns of flints covering primary interments by inhumation.[107]

Many of the animal remains found in Wick Barrow were too fragmentary, or too friable, for identification, but the following is a list of those worthy of preservation :—

OX.—Half a large humerus. Found on the W. side of the barrow, depth 2ft.

Half of a metatarsus, width at distal end 55mm.; estimated height of animal, 3ft. 7ins. Found on the W. side of the barrow on the "old surface line," depth 7·5ft.

Four teeth. Found with mixed pile of human bones (Find "6.")

Fragmentary shoulder-blade of ox, and other animal remains, were found within the walled enclosure; also a perfect astragalus of ox, length 68mm., on the "old surface line" within the wall.

RED-DEER.—Os calcis. Found near Find "11," depth 1·3ft.

SHEEP.—Portion of tibia of sheep or goat. Found on the W. side of the barrow on the "old surface line," depth 6·5ft.

PIG.—Two teeth. Found near the middle of the mound, depth 3ft.

RABBIT.—Portion of a skeleton of a very young rabbit (*Lepus cuniculus*). Found on top of the walled enclosure on the N.E. It may of course be of any date; the same remark applies to the vole skull.

VOLE.—Skull of a common field-vole, or field-mouse (*Microtus agrestis*). Found within the walled enclosure on the clay floor. This and the rabbit skeleton were kindly identified by Mr. E. T. Newton, F.R.S. (through the instrumentality of Prof. S. H. Reynolds). As regards the vole skull, Mr. Newton remarks that the second upper tooth is the one that is peculiar to this species, and makes the determination definite.

RAT.—A few bones, apparently of rat, were found in various parts of the barrow.

(107). Martinstown Barrows, Gray and Prideaux in *Proc. Dor. Field Club*, vol. xxvi, 1905, pp. 17, 24, and 32.

SHELLS.

Helix ullaria and *Cyclostoma elegans* (not found at present living in the district) were found plentifully with the human remains.
Helix aspersa was frequently observed, including a very large specimen.
Helix nemoralis, common.
Achatina acicula was found in the shaft of many of the human bones.
Limpet-shells were also occasionally found in the material of the barrow.

XIV. THE WALLED ENCLOSURE.

Plate I (Plan and Section), Plates V, VI, and XII; also three sketches on pp. 16, 20, *and* 54.

(1). *Description of the Wall.*

The walled enclosure, although approximating to a circle in outline, was not truly circular. The circumference of the wall measured along the outer margin of the top was 85 feet. Whereas the diameter of the barrow was 84 feet, the maximum basal diameter of the wall was 31½ feet from N.E. to S.W.; the minimum basal diameter being 29½ feet in one or two directions. The greatest diameter of the outer margin at the top, viz., 28½ feet, was also from N.E. to S.W., the least diameter at the top (outer margin) being 26 feet from N. to S. On the E.S.E. the wall dipped in rather much for a short distance, bulging out again on the S.W. The centre of this enclosure was found to be 5¼ feet to the N.N.E. of the "central picket" on the top of the mound used for surveying purposes. After allowing for silting of the mound in the direction of the slope of the ground to the S. and S.E., it is seen, on reference to the plan, that the walled enclosure is rather nearer the northern margin of the barrow than the southern, but in regard to the E. and W. margins of the mound it is placed in a central position.

From the excavations it was found that the wall was merely a retaining-wall, faced on the outside only, and having a considerable inclination inwards in most parts (see sketches on pp. 16, 20, 54, including section), in which respects it compares favourably with the wall found in Ormiegill Cairn (see p. 53).

The wall was found to be built on the natural loamy soil of the field, consisting chiefly of a stiff, tenacious, light brown clay, containing but few small stones, which is shown in the foreground of the photograph, Plate V, fig. 2, excavated to a depth of over a foot. This was done not only to show that the "old surface line" had been reached, but to prove that it had not been penetrated for a foundation for the wall. The wall, therefore, was built on the natural ground level—the level on which the pick-axe rests in Plate XII.

VIEW OF THE WALLED ENCLOSURE, WICK BARROW, IN ITS BEST-BUILT QUARTER ON THE W. AND N.W.; TAKEN FROM THE W.S.W.

From a Photograph by H. St. George Gray.

The wall varied somewhat in height above the clay floor; but the average height was 3′ 4½″. On the N. and W. it was from 3′ 7″ to 3′ 8½″ high, increasing to a maximum of 3′ 10″ at the W.N.W.; this part of the walling is seen in Plate XII, and the sketches on pp. 16, 20. On the S. (Plate V) the height was 3′ 2″, and the lowest part on the E. was 2′ 10½″, but it was a question if the workmen had not moved away a few slabs from the top, when the level of the wall was reached at the first excavation (in April), before the nature of the structure was realized.

The top of the wall, which averaged 17¼ins. in width, did not present a very even surface; some of the slabs were laid horizontally, while some sloped considerably inwards. There were particularly large slabs on the top of the wall on the S.E., E.S.E., W., and N.W. The top of the wall varied in *level* to the extent of 1·9ft., being highest on the N., gradually sloping towards the S.E. At the W.N.W. it was 3·45ft. below the surface of the mound immediately above it; on the W.S.W. the top of the wall was 3·65ft. below the surface; on the S.E. 2·5ft., and on the E.N.E. 2·35ft.

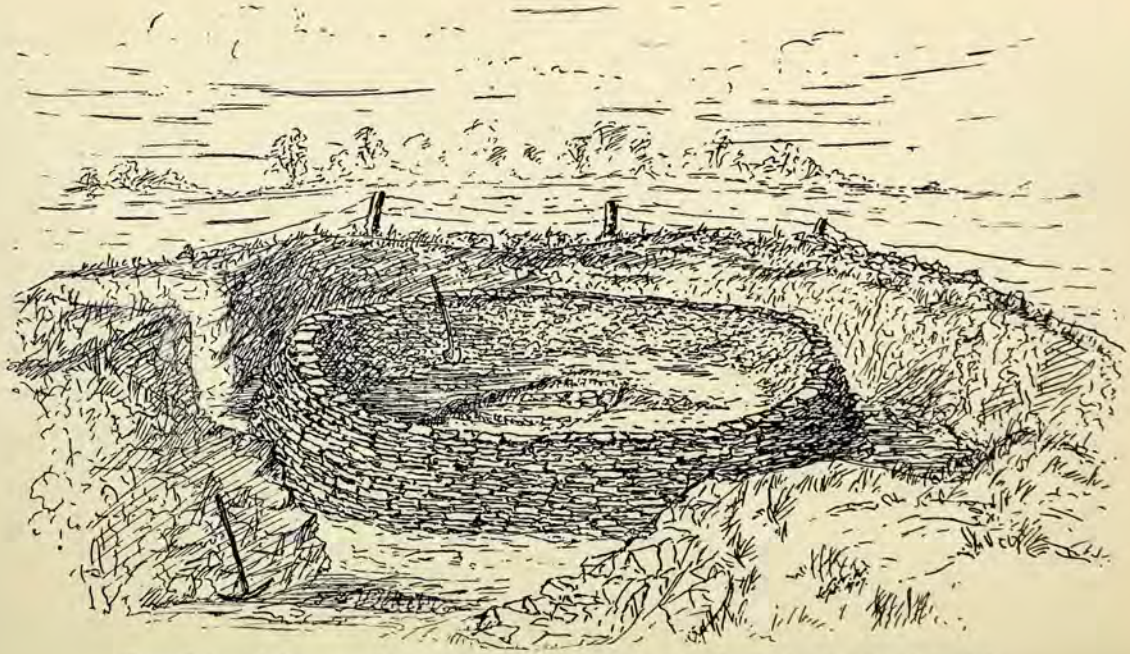
The inward slope of the face of the wall varied considerably. On the E. where the height was least, it was just one foot out of the vertical in one part; but on the W. and N.W. the angle of the slope was much greater, and although the bottom 1·5ft. was practically upright, the upper 2·3ft. fell back enormously, a marked angle dividing the upper and lower halves of the wall (see section in sketch on p. 16). On the N.W., as partly seen on the left-hand side of Plate XII and sketch p. 20, there was a distinct foot to the wall which splayed out suddenly, and, as seen by the plan, the wall sloped outwards from the top to an extent of 2·3ft. from the vertical. The average slope of the wall was 1·7ft. out of the vertical.

The wall was found in a compact, firm, and undamaged condition, the face being fairly flat in places; in others angularities were observable. The W. half of the wall (Plate XII, and sketches pp. 16, 20) was found to be better built than the E. half. On the W. some of the slabs, all laid horizontally or nearly so, were as much as 2ft. long, and from ⅝in. to 3½ins. in thickness; on the N. some of the slabs were 6ins. thick, a few of the thinner ones being nearly 1½ft. long. The inner face of the wall presented a ragged surface (see Plate VI).

Mr. Whistler's general view of the wall, taken from the S.S.E. (see accompanying illustration), gives an excellent idea of the structure as a whole.

(2). *Instances of Walling found in Barrows in England and Scotland.*

Within the Ormiegill "horned" cairn, Caithness (so called by reason of the four walled projections extending in different directions from the body of the cairn), the chamber containing the interments



General view of the excavations at Wick Barrow taken from the South, showing the whole of the walled enclosure.

From a Sketch by the Rev. C. W. Whistler.

was surrounded by a circular wall 80ft. in circumference, some 20ft. from the exterior of the mound, and 30ft. from the ends of the "horns." It was built of squarer, heavier blocks than either of the internal walls of the chamber, and was *faced to the outside only*, and had a *considerable inclination inwards*; about 4ft. of its height remained in some parts[108] (see also p. 52).

Dry-walling has been found extending along the borders of long-barrows, and also within barrows in short lengths, in various parts of the kingdom.[109] The famous long-barrow at Stoney Littleton, Wellow, Somerset, is an instance of a sepulchral mound being surrounded externally by a dry-stone wall.[110]

In Gloucestershire, long-barrows at Nether Swell, Eyford, and Upper Swell, one in each parish, were surrounded outside, or near the outside, by carefully constructed walls or facings, made of thin oolite slates, laid in horizontal courses (as at Wick). Of the barrow at Upper Swell, Canon Greenwell speaks of the wall or facing being "carefully arranged" and "beautifully constructed, and had a very imposing appearance when it was first exposed to view." He goes on to say, "This is the more remarkable as it is evident that it was not intended to be seen after it was made, for it had been *encased by a backing of fine small stones for a thickness of 2ft.*, and beyond that by larger stones (see p. 19), the whole intentionally arranged, and not caused by the disintegration of the mound itself. Before the barrow was opened, the east end presented an ordinary rounded form, there being no indication of the enclosing wall with its 'horns.' It is not possible to decide positively whether the wall also on the sides of the barrow had been encased at first in the way in which we found it to be, or whether the outlying material at that part had merely accumulated by the falling down of the mound. On the whole I think it more probable that there was originally a casing to the wall, for otherwise the frost of even two or three winters would have broken it up more than it was found to be when uncovered."[111]

Within a barrow 60ft. in diameter in the parish of Langton, East Riding, a rudely-constructed wall about 3ft. high was found close in front and to the N.E. of the central skeleton on the "old surface line." This wall was made of flat stones set on their edges, and five or six deep; it ran for a distance of more than 9ft. in a direction nearly E.

(108). *Proc. Soc. Antiq. Scot.*, VI, pp. 442-51; vol. VII, pp. 480-512, and illustration on p. 488, where the "horned" type of cairn is fully described. The italics are mine.

Round a mound called "Rounie Law," Forglen, Banffshire, I recently found (in association with the Hon. J. Abercromby) a shallow encircling ditch, containing at the bottom a rough paving of stones, perhaps the remains of a dry-stone wall. (*Proc. Soc. Antiq. Scot.*, XLI, 277-285).

(109). Greenwell's "British Barrows," pp. 485 (and footnote 2), 504, 514, 521.

(110). *Proc. Som. Arch. Soc.*, VIII, pt. ii, Plates III and IV.

(111). "British Barrows," pp. 513, 515, and 521. The italics are mine.

and W.[112] A similar piece of walling running E. and W., and about 6ft. long, was found in another part of this barrow.

Thomas Bateman, after speaking of the Roman coins found in Mining Low, Derbyshire[113] (p. 35), goes on to say that "a far more interesting discovery was made of the manner in which this large tumulus was built, a wall being found to encircle it in a manner precisely similar to the walls built round some of the Etruscan tumuli discovered in the south of Italy. In one part of this wall, which was exposed by the excavation, a gallery formed of stones set up edgeways, with others across the top of them, was found to have its commencement . . . . There is a striking analogy between this tumulus and the great barrow at Newgrange, Co. Meath." The Newgrange tumulus (approximately circular in plan, 280ft. in diam., and 44ft. high), with its surrounding circle of stones and exterior retaining-wall, has been figured and described by Romilly Allen.[114]

(2). *Instances of Walling found in Barrows in Denmark and Norway.*

For information recorded under this heading I am much indebted to Mr. A. F. Major, Hon. Editor of the Viking Club, who obtained useful material when in Norway and Denmark last summer.

Denmark.

The accompanying sketch, taken from a photograph,[115] shows a stone wall in the foreground, and behind it a heap of stones which covered the central grave in a howe at Asbo, in the parish of Bække, in Ribe County, Jutland. It was a long-barrow, of which the long axis lay from N. to S., 34 metres (about 111½ft.) long, 8·4m. (about 27¼ft.) broad, and 1·68m. (about 5½ft.) high. Inwards, and close to the foot of the howe, there was found a regularly-built stone wall, about ⅔ of a metre (about 2′ 1″) high, encircling the howe. When found it was completely covered by the earth composing the howe, but it is possible that this wall was visible originally, since the covering of earth was only slight, and might perhaps have slipped down gradually from above. Inside there lay in the middle of the

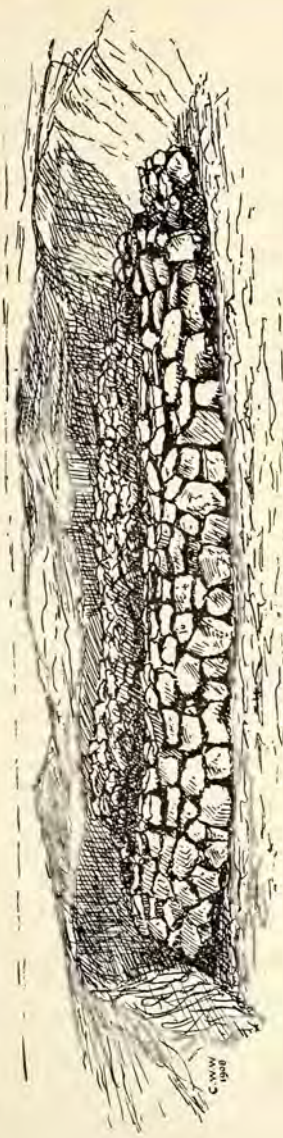
(112). "British Barrows," pp. 137, 139.

(113). "Vestiges," p. 40.

(114). "Celtic Art," p. 44.

(115). We are indebted to Dr. Sophus Müller, Director of the National Museum, Copenhagen, for permission to reproduce this illustration; and to Herr Hans A. Kjær, of the same Museum, for his description in Danish, which has been translated by Mr. Major.

base of the howe an oblong heap of stones, 3·53m. (11½ft.) long, lying in a S.S.W. to N.N.E. direction, and 1·37m. (4′ 5″) broad. This covered a grave sunk a little below the original surface of the ground, which had held an unburnt human skeleton, but this was found to have entirely disappeared. A little finger-ring of gold was also found covered with gold thread spirally twisted, 18mm. wide inside.[116] The grave dates from the Early Bronze Age, but from near the end of that period. The construction of the grave presents nothing unusual beyond that the wall is exceptionally well built. Similar less regular circles, constructed of stones, are not uncommon in Denmark, and as a rule they are found to be covered with earth. None of these Danish walls are so high as the retaining-wall in Wick Barrow. The majority of them were much more roughly built than at Wick, and were made of much larger stones.



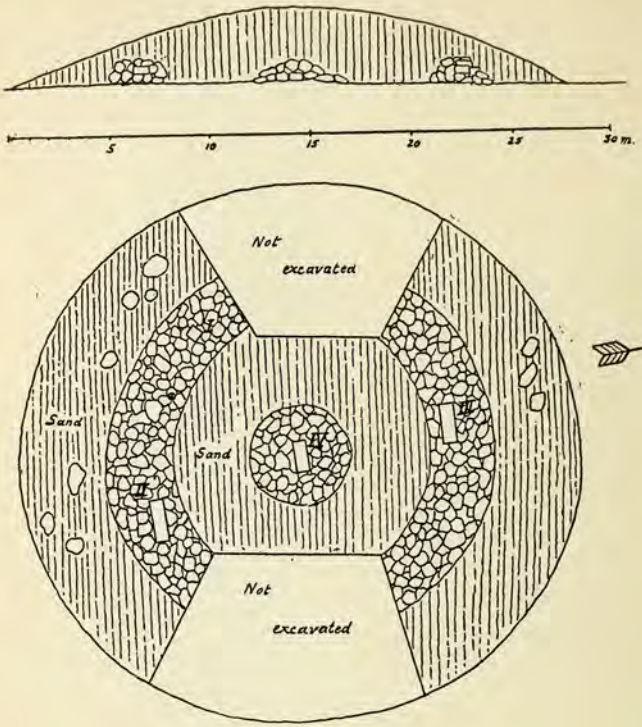
Walled Enclosure (surrounding a stone cairn) within a Howe at Asbo, Bække, Ribe County, Jutland, Denmark.
Drawn by the Rev. C. W. Whistler from a photograph.

Norway.

The accompanying illustration of a Norwegian tumulus has not previously been published. It being of importance in connection with Wick Barrow, Dr. Haakon Schetelig, of the Bergen Museum, has kindly copied the plan and section from a drawing exe-

(116). *Catalogue of the Nat. Mus., Copenhagen*, No. B6727.

cuted by Mr. A. Lorange.[117] It represents a large tumulus, called "Melhaug," at Sole, in the district of Jæderen, which was examined by Mr. Lorange in 1879, when he was curator of the Bergen



Plan and Section of a Tumulus called "Melhaug," at Sole, Jæderen, Norway, showing the circular wall within its margin.

Museum.[118] At 4m. (about 13ft.) within the margin of the tumulus he met with a wall 1m. (3′ 3½″) high and 3m. (nearly 10ft.) broad, built of stones on the ground level, and making a circular enclosure round the central part of the mound. In the centre was a large grave-

(117). We are indebted to Herr Jens Holmboe, Director of the Bergen Museum, who has the custody of the original drawing, for permission to use this illustration.

(118). "Foreningen til Norske fortidsminders bevaring, Aarsberetning," 1879.

chamber of stone, and a similar grave in the wall itself, both containing burials of the Early Bronze Age. He also found in the wall a small cist (I on plan) formed of six small slabs of stone and containing cremated bones, with a knife, a pin, and an arrow-head, all of bronze.[119]

In the same district of Jæderen, Professor G. Gustafson, of Christiania University, has also found in the interior of a barrow an enclosure of stone slabs set on edge surrounding an Early Bronze Age interment.

XV. CONCLUDING REMARKS.

It is seen, then, that Wick Barrow has been proved to have been used for interments of the Early Bronze Age, and that in all probability the primary interment obtained by the Romans was of the same period, to which time the actual construction of the barrow should be assigned. That date in years was probably something like B.C. 1800.

Prof. Oscar Montelius, in a paper on "The Chronology of the British Bronze Age," read before the Society of Antiquaries recently, about which there appears to have been some disagreement at the meeting on certain points, divided the Bronze Age into five periods, which was regarded as satisfactory as regards the relative chronology which was based on the evolution of types, but it was generally felt that the scheme was antedated some 450 years. Therefore, whereas I am inclined to place the date of Wick Barrow at about B.C. 1800, at the earliest, its date would be some 2,250 years B.C., according to Montelius.

Relics of the Early Bronze Age have not previously been recorded north of the Quantocks, and for the whole of Somerset they are rare. Coming to a later stage in the Bronze Age I must not omit to mention that the most interesting "find" previously made in the immediate neighbourhood of Wick Barrow, is the founder's hoard of bronze implements,

(119). *Op. cit.*, Plate IV, figs. 19-21. (*See* footnote 118).

etc., of Late Bronze Age date (probably about B.C. 800-500) now the property of Sir Alexander Acland-Hood, Bart., and at the present time exhibited in Taunton Castle Museum. The hoard was found in 1870 at a distance of 1½ miles from Wick Barrow in a field which was being drained to the N.E. of Wick Park Covert (about 100 yards to the left of the hunting-gate and five yards from the fence). A man named Hurley found the hoard under a flat stone in stiff clay at a depth of 2ft., packed in a space of about 1ft. cube. Most of the specimens were in a damaged condition, collected apparently for the melting-pot. They included a perfect chape of a sword-sheath, fragments of swords, spear-heads, socketed celts, palstaves, gouges, "jets" from the necks of moulds, cakes of copper and bronze, etc.[120] The place of finding this hoard is marked in Plate II.

We have seen (Section II) that there are records of very few barrows having been excavated in Somerset, and that only two or three of those have been dealt with systematically; none, I think, with the methodical care bestowed on our researches at Wick.

We have also seen that Wick Barrow was built in a most unusual position, when compared with other Bronze Age burial-sites in Britain, although in Scandinavia cairns were frequently placed on the summit of some promontory commanding an extensive view of a large sheet of water.

The beakers are good examples of their kind, and comprise three out of the five known to have been found in Somerset. As a class this type of Bronze Age vessel is rare, and only about 260 beakers are recorded as having been found in Great Britain and Ireland.

The flint knife-dagger is perhaps the "gem" of the objects found, but although not a rare archæological "find," ours re-

(120). A paper on the subject may probably appear in a future volume of the *Proc. Som. Arch. Soc.*; see also Vol. LIII, pt. 1, p. 72. This important hoard is not mentioned in Vol. I, *Vict. Co. Hist.*, nor is it marked in the Prehistoric Map published there.

presents one of a few cases in England in which flint daggers and beakers have been found in association. The group of flint scrapers and the polishing-stone is also an interesting discovery in connection with a skeleton and beaker.

The Roman remains are common as such, but of the highest interest as being found in so significant a position. Occasionally Roman coins have been found in both long and round-barrows, but generally at a few inches beneath the surface only, or associated with secondary interments obviously of the Roman period (see also pp. 34-6). In no case, however, except that of Wick Barrow, have Roman remains been a recognizable token of deliberate exploration by their depositors —remains left for no other purpose than to bear evidence of their having excavated the barrow.

Much has already been said about the walled enclosure, its position, size and purpose, and instances have been adduced of dry-stone walls having been found internally and externally in connection with long- and round-barrows in Britain, and in Denmark and Norway; but nothing so uniform, well-built, and well-preserved as the Wick wall appears to have been discovered. These matters have already been discussed, and it only remains to say something with regard to the relationship of the wall to the remainder of the structure.

The wall was undoubtedly a retaining-wall, built for the further protection and confinement of the small mound covering the primary interment, and to serve as a resistant to the weight and thrust of the material forming this inner mound. And so it is seen that the wall evidently served an important structural purpose in the general plan of this tumulus, and there is no reason for assigning to it any symbolic intention. But on the other hand there is no reason why a structural purpose and a symbolic intention should not have been considered together.

Did the material forming the barrow on the exterior of the wall constitute the greater part of a secondary mound thrown

up at perhaps a slightly later date than the interment of the primary remains and the building of the wall? This is a more difficult problem to solve. Dr. Müller, of the Copenhagen Museum, is of opinion that the walls found within Danish barrows were the original casing of a small barrow which had been entirely covered at a later period in order to form a larger tumulus for secondary interments. If this had also been the case at Wick one would have expected to see some traces of weathering on the outer face of the retaining-wall. It is of course possible, as Mr. Major has suggested, that the wall at Wick was added to a pre-existing small barrow when the mound was about to be enlarged, in order that the primary interment might be clearly marked off from the later interments. This is certainly one way of accounting both for the absence of weathering and for the fact that the wall was not truly circular. On the other hand the evidence may be regarded in a different light; but it is of course apparent that the internal mound was raised over the primary interment before the wall was built. There are records of barrows having enclosures within their area, sometimes of oblong form and sometimes made of perishable material, apparently erected as temporary barriers for the purposes of funeral obsequies; but it is evident that the wall at Wick was not erected for any such purpose.

I am inclined to regard the evidence at Wick as proving that the whole structure was erected practically at the same time, or soon after the deposit of the primary interment. It has been pointed out (p. 19) that comparatively fine material covered the outer face of the wall to an average depth of 2½ft., but I do not for one moment regard this as caused by the disintegration of the exposed surface of an inner mound. It was apparent that this finer material, seen in the accompanying illustration and in Plate V, fig. 1 (and removed, in the same plate, fig. 2) was carefully placed against the outer face of the wall to ensure its safety and preservation. Had the finer

material been caused by silting from the summit of an inner mound, the talus would not necessarily be of finer material than the bulk of the barrow, and, moreover, such a deposit

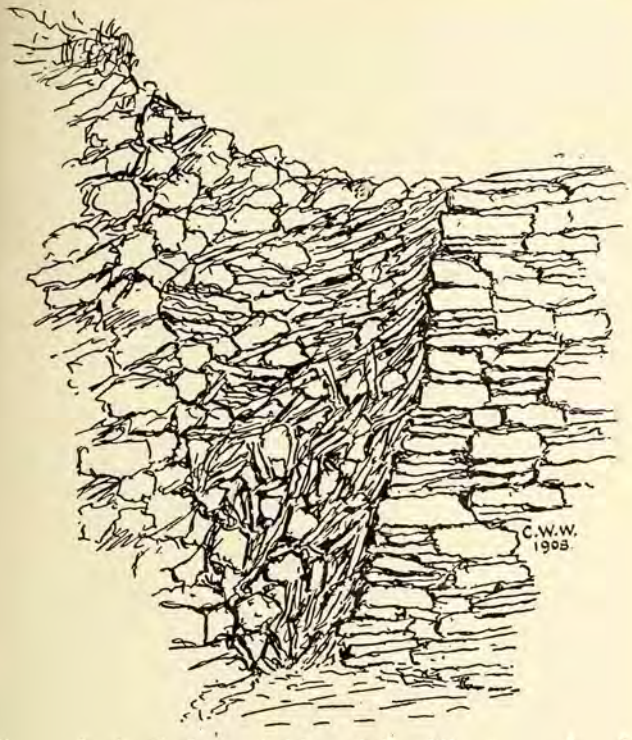


Diagram showing the finer material, consisting of lias-stones and mould, placed against the Wall of Wick Barrow for the protection of its outer face.

silting down from higher ground would become deposited only in slender proportions against the top edge of the wall, while at the bottom there would be a considerably greater width of material. The reverse was the case (see illustrations). And had the face of the wall been exposed to the rigour of the frosts of a few winters, we should not have found its surface

in the well-preserved condition in which it was discovered. The outer mound of the heavier material, therefore, appears to have been raised to a certain height, at a safe distance from the wall, and after finer material had been deposited against the face of the wall up to its top, the whole barrow was then elevated to the required height.[121]

After this work had been completed, probably at no great lapse of time after the deposit of the primary interment, the three secondary interments[122] associated with beakers and flint implements were deposited in the enlarged mound, not necessarily at the same time, though probably at no great interval.[123]

It is possible, too, that the Romans in making their excavation not only disturbed the primary interment, but during the progress of their work destroyed a similar secondary interment of the Early Bronze Age, though in the absence of pottery this must remain doubtful. In any case those responsible for the burial of Skeleton III, touching the top of the wall on the N., probably had no knowledge of the exact position, or perhaps of the existence, of any special internal structure of the mound. Nothing was found to protect the three skeletons from the surrounding and superincumbent material, but large slabs of lias were noticed in proximity both above and around the interments, placed, however, in no systematic order.

In recording the position of the human remains, we must revert to the mixed pile of bones found at 6 on plan, just to the E.S.E. of the margin of the Roman excavation on this side. At the time of finding this confused mass, its origin and

(121). There was no perceptible difference in the size and character of the material forming the *whole* mound, except he finer material mentioned as covering the outer face of the wall.

(122). The three skeletons might possibly be considered as "primary" for the *remodelled barrow* over the wall.

(123). Secondary interments must often have taken place, either at no great space of time after the erection of barrows, or, at all events, before any perceptible change had taken place in burial customs, or in the manufacture of grave-goods; for objects accompanying secondary interments of the Bronze Age differ very little, if at all, from those found associated with the primary interments in tumuli.

archæological horizon were not realized or fully understood, but two or three inferences now present themselves. Some of the bones may perhaps have represented remains of the central interments disturbed and collected together by the Romans: the general character and physical peculiarities of the majority of the bones would favour such an assumption. But supposing this view of the question is taken, it is not quite clear why, when the Romans had their excavation open, they did not deposit any collection of bones they may have made in the same area, instead of possibly selecting an adjacent site, entailing additional labour. Perhaps the re-burial of the bones (if the work of the Romans) was an afterthought, or perhaps the disturbed remains may have been placed in their new "grave" as they were discovered. On the other hand it is quite possible that the carelessly scattered remains left by the Romans were re-interred by the British inhabitants of the district.[124] We are, however, still faced by the probability that the mixed pile of bones had nothing to do with the treasure-hunting of the Romans, but was brought for interment here from another place (Section V, p. 15). The extent of the Roman excavation was apparently not sufficient to account for the number of individuals represented by the remains forming the mixed heap. The system of twice burying the body has not been an infrequent one, and the practice of some modern savages might be cited to show that it still exists.[125]

Amongst the Patagonians the habit prevailed of keeping the bones of the body from which the flesh had been removed, and afterwards, on certain occasions, taking them to the burial-place of the tribe, where they were laid in the grave.[126] Some of the North American Indian tribes collect the bones of the dead, after the flesh has de-

(124). It is of course possible that the depositors of the Roman objects were not Italian legionaries, but foreign and less civilised auxiliaries, who had few scruples in their treatment of the graves of a subject race. See also Appendix IV, p. 76, on existing tradition.

(125). See Greenwell's "British Barrows."

(126). Mortimer's "Burial-mounds of East Yorks," p. xxxii.

cayed, and bury them in ossuaries, where very large collections of them are found. Even in Brittany in recent times, some portions of the skeleton were put away in a dead-house in the churchyard, and there kept, each labelled with the name of the deceased, until they were finally buried.[127]

In one of the Cowlam barrows, East Riding,[128] the disturbed condition of nearly all the bodies was very extraordinary. They may have been previously deposited at some other place, and afterwards removed to the barrow; none were complete, and the bones of the bodies were not in sequence. But the various sets of disturbed bones at Cowlam were not found together in one common mass as at Wick Barrow.

The primary interments (Stone Age) in Wor Barrow, Handley Down, Dorset, consisted of a mass of bones the remains of six skeletons, three being in sequence. three put in as bones without any order[129] Mr. Mortimer found deposits of dismembered bodies in some barrows of the Aldro Group, East Riding, and in Barrow No. 72 of the Towthorpe Group.[130]

Finally, a few concluding remarks on the racial characteristics of the Wick skeletons.

The form of calvaria typical of the Bronze Age people is brachycephalic, while the face is dolichofacial. The characteristics of the preceding Neolithic race are a dolichocephalic calvarium and a brachyfacial face.

The Wick skeletons, while conforming in stature, and possibly in the form of the face, to the Bronze Age race, show in the shape of the calvaria decided characters of the Neolithic people (especially Skull II).

The average stature of the Bronze Age people, according to Prof. Karl Pearson's methods, is about 5′ 7½″ for males and 5′ 3″ for females; and the three Bronze Age male skeletons associated with beakers found by Pitt-Rivers in S. Wilts and N. Dorset, gave an average stature of exactly 5′ 7½″. The stature of the Stone Age people was about 5′ 5¾″ for males, and 5′ 0½″ for females. The mean stature of the two complete Wick skeletons (Nos. I and II) is 5′ 8½″.

(127). Greenwell's "British Barrows," 17.

(128). *Op. cit.*, 220-1.

(129). "Excavations in Cranborne Chase," IV, Plate 256.

(130). "Burial-mounds of East Yorks," pp. 15, 62, 63 *et seq.*, and 77.

The evidence adduced from the table of measurements, p. 42, is that the two Wick skulls give a mean cephalic index of 76·0, mesaticephalic (medium-headed), but approaching the long-head rather than the round-head, and that the Early Bronze Age Skulls from Culbone and Wincanton are decidedly brachycephalic (or very round-headed) with a mean cephalic index of 84·6. Of these latter, unfortunately, the stature is not available, so that comparison from that point of view is impossible. The average cephalic index of the four human skeletons found with beakers in Somerset is therefore 80·5, showing the predominance of the round-head over the long-head in the Early Bronze Age.

The earlier Neolithic race (Iberians) lived in certain parts of Britain side by side with the Early Bronze Age folk (Goidels), and undoubtedly in some cases intermarried with them. This appears to have been the case in the neighbourhood of Wick Barrow.

Addenda.

Since this Report was printed, two items of interest in connection with similar interments have come to my knowledge :—

p. 29.—Another Somerset beaker was found with part of a stag's antler, in a field at Stoford, parish of Barwick, near Yeovil, in 1826, "in a stone vault hewn in the solid rock, and covered with a rough stone slab." The grave was 3ft. wide and 4ft. deep, and contained a human skeleton in a sitting posture. The beaker is now in the possession of Colonel Harbin, at Newton Surmaville, Yeovil. (*Proc. Som. Arch. Soc.*, IV, pt. i, 8.)

p. 31.—Record of another beaker and knife-dagger being found with one interment. A flint knife-dagger 6½ins. long, a beaker 7½ins. high, a bone pin, a broad flint flake, a punch-like worked flint, two jet buttons, and a lump of iron pyrites were found in a sand-pit at Middleton-on-the-Wolds, Yorks, 1905. (Figured in the *Naturalist*, 1908, and in *Hull Museum Publications*, No. 55, 1908, p. 6.)

H. St. G. G.

APPENDIX I.

NOTES ON THE SITE OF WICK BARROW, CHIEFLY GEOLOGICAL.

I. Geological Notes, by the Rev. H. H. Winwood, F.G.S.

The barrow rests upon the Lower Lias strata, from the fissile beds of which it has been entirely constructed, the builders having plenty of materials at hand for their purpose. Whether they brought Lias from the foreshore not far distant, or made any excavations in the field close at hand, further observation is necessary to determine.

At the end of the trackway leading down to the shore on the N., the following section is exposed in a low cliff of about 8 feet from the present pebbly beach, *e.g.*,

	ft.	in.
Grey Lower Lias shale	1	0
Band of limestone		6
Shale	2	6
Compact light blue limestone . . .		10
Shale to top with limestone fragments . .	3	0
	7	10

Owing to the dip of the strata Severnwards, the beds of limestone form ledges, the strike of which looks like the base of walls. The beds exposed here are too thick and solid, though much jointed, to have been used for the construction of the barrow, which was composed of beds more easily adapted for breaking up. Owing to the dip of the strata on which the mound is placed, lower beds than those on the shore would necessarily crop up, so that any section made near the same level might afford thinner and more easily split up limestone.

An examination of the material excavated for fossils did not prove very fruitful. The absence of any Ammonites so generally characteristic of this horizon of the Lias rendered any zoning impracticable; and the only fossil found which could be any indication of the horizon was a strongly ribbed *Pleuromya* characteristic of the *Ammonites angulatus* beds; and if *Pleuromya Crocombeia*, which it resembles, may be classed in the sub-ammonite beds of Vaughan.

II. Miscellaneous Notes, by Albany F. Major.

The position of Wick Barrow, (see Plate II) dumped down, as it were, towards the base of a barren and lonely slope rising about 70 feet from the flat level of Wick Moor, is so unusual that a few words of comment upon it may not be out of place. The choice of such a

site for important burials at once suggests that there has probably been some great physical change in the surrounding country since the barrow was made, and the mere aspect of the spot would lead even a casual observer to the conclusion that this is actually the case. Mention has elsewhere been made (pp. 8, 71) of the more recent change which has converted a tidal inlet into an alluvial plain, while attention is drawn on p. 76 to the name of Wick Moor itself, with the neighbouring place-names of Stolford, Catford and Whitewick. These names are of a type which must have been given by Scandinavians who settled down there, temporarily or permanently, at a period when Stolford was a channel or fjörd leading to the inlet or wick (vik) now represented by the moor; while Catford was another channel leading to the White Wick inlet. Hence came naturally enough the idea that the barrow might have been designedly placed where it could overlook the tidal waters, and that for this reason a Scandinavian origin was more likely than a British.[131]

But such a Scandinavian settlement could not date back for more than some 1200 years at most; and now that the barrow has been proved to be of the Early Bronze Age, some 3700 years ago, an entirely different scene presents itself to the imagination.

There is little doubt that at that distant epoch the submerged forest, which is still visible at lowest spring tides, and extends from the mouth of the Parret as far at least as Porlock, stretched seaward for an unknown, and perhaps varying, distance from the present coast-line, as part of the mainland. On the land side the marshy alluvium which forms the present Wick level must now rise further up the hillside than of old. When digging for a well, in 1906, at the foot of the gentle hill on which the village of Stockland stands, an old land surface was met with at a depth of 15 feet below the present alluvial level, which is about 17 feet above mean high-water mark, the remains of a wolf and of trees and marsh plants being discovered at that depth. This level corresponds with that of Wick Moor, and it is therefore likely that the ground of Wick Moor has risen by at least 15 feet by siltage above its former level. The depth below the surface of the streams and rhines near the sea helps to bear this out. The old bottom as well as the surrounding hills were no doubt much more thickly wooded, and the stream which runs through the moor was of course both deeper and broader, and carried a greater volume of water. It is, however, possible that at that date the rocks extending along the coast (from Shurton Bars on the W.) formed a barrier at Wick Rocks, near Stolford, which would dam back the stream (see Map, Plate II). In this case, the lower part of Wick Moor must have been occupied by a large fresh-water lake, possibly extending back to a point on the level slightly beyond the position of the mound,

(131). It may be worth noting that this suggestion was made by Mr. Major before I had called his attention to the passage in Du Chaillu's "Viking Age," quoted on p. 9.—H. ST. G. G.

with a broad river flowing from it at Wick Rocks, through the now submerged forest, to the sea, perhaps some miles away.

Opposite the mound, the hills on the other side of the moor bend sharply round toward the north, and the wide level contracts two or three hundred yards to the w. of the barrow to the entrance of a narrow valley. In the days when this valley bottom lay much deeper, and was probably thickly wooded, this might almost have been called a combe. Round the barrow itself the ground is so poor, and the rocks so near the surface, that the ground there must always have been open.

This then was the position, as we imagine, when the barrow was thrown up. Jutting out into a wild expanse of forest country ran a long tongue of land partly covered with trees. On its southern side a wide open slope looked down on a low lying plain, wooded, and perhaps partly filled by a considerable lake. Half way up the slope, at a point where the plain opened out from a narrow valley, an outcrop of rock, close to a perennial sacred spring, offered a convenient platform for the mound. From the hills beyond the plain and valley the spot is clearly visible, and when the ground was wooded both above and below, it would have been even more conspicuous than at present.

These remarks, based on a few obvious facts, may perhaps suggest something of the vastly different conditions of the country at the time when some ancient chieftain who ruled in the Land of Quantock was laid to rest in Wick Barrow.

APPENDIX II.

NOTES ON "SIDWELL" AND WICK MOOR.

By the Rev. W. H. P. Greswell, M.A. Oxon.

The field in which Wick Barrow lies is called "Burrow Sidwells," or, according to the local pronunciation, "Sidewell," and originally was made up of two sections, north and south. In the Stoke Courcy Tithe Map of 1840 there are four different lots bearing the name of Sidwell, *viz.*, Nos. 1324, 1325, 1327, and 1375, including a barton, where there was possibly also a small tenement. Locally the mound itself is called "Pixy" or "Pisky-piece," and it has always been regarded by the village folk with a certain amount of superstitious awe. Previous removal of material from the N.E. of the structure had resulted in the finding of some human remains. The remains are noted in the report, as formerly preserved by Mr. Jas. Rawlins (pp. 11, 12).

The fields in question form part of the ancient manor of Wyke, Week, or Wick Fitzpaine, the most prominent manor thereabout of the lordship of Stoke Courcy Castle, called from former owners, the

Fitzpaine family. There is still a Wick Pound, close to Wick Farm, to which the "Pixy-piece" belongs, and further toward the south lies a well known cover of great antiquity, known as Wick Park. There is evidence that this was in 1295 (*Close Rolls*) a noted game preserve, and at that date in the King's hands. In 1286 Wick was in the possession of Queen Eleanor, "de dono regis," in the catalogue of properties known as "Kirby's Quest."

The manor of Wick Fitzpayne has been split up recently, Wick Park being in the possession of Sir Alexander Acland Hood, and Wick Farm being part of what is known as "York's Charity," (founded by the family of which the Rev. Wm. York, Rector of Spaxton in 1712, was a member) which is held as a Spaxton Charity by trustees. Close to Wick Park one of the finest collections of Celtic bronze implements known was unearthed in 1870. They belong to Sir Alexander Acland Hood, St. Audries, but are deposited at present in Taunton Castle Museum on loan.

The stretch of drained pasture land lying immediately below and to the southward of the spur of hill on which the tumulus is situated is known as "Wick Moor," and within living memory has been subject to periodic inundation by the flood tides at full and new moon, when it was necessary to remove any stock which was grazing on the meadows. The present sea-defence, known as "Ham Wall," has put an end to such danger, however. This moor is a large and open grazing ground and hayfield, distinct in the Tithe Schedule from the commons and waste places of Stoke Courcy, and indeed not mentioned in it as a whole.

Owners of property have certain rights here appendant to certain holdings. For example, the Rector of Holford has a right in Wick Moor by virtue of ancient endowments in Stoke Courcy parish. Other open places like "Stoverd field," "Knighton field," and "Burton field," all Stoke Courcy hamlets, exist, and are mentioned in the tithe maps and in other documents as apart from the commons. But Wick Moor seems to stand in a category by itself, as having become an integral part of the parish by gradual reclamation, which is, to judge by its very slight elevation above average high tide mark, almost certainly the case.

The place-name "Sidwell" or "Sidewell" is suggestive, and no doubt refers to the never failing spring which rises within a stone's throw to the westward of the tumulus, and in the same field. It is apparently the only natural spring upon this ridge of blue lias formation between the seashore and the ancient inlet of Wick. Within living memory Stoke Courcy women used to bring their children to this well to be washed, if suffering from any ailment of either skin or eyes, and this healing reputation is still well known, if the water is less sought after.

Probably the spring keeps up the memory of its dedication to St. Sativola, shortened to St. Sidwell, the same saint whose church outside the eastern gate of Exeter is said to mark the place of her behead

ing by a certain scytheman or mower.[132] St. Sidwell is of course the name of one of the most ancient and populous parishes of Exeter, and there is also the chapelry of SS. David and Sidwell.

According to her legend, St. Sativola is said to have been one of four holy sisters, Guthwara, Wilgitha and Eadwara being the others. They were said to be contemporaries of St. Boniface, (A.D. 700-750), and daughters of a British father, named Benna. In Wales the commemoration of St. Guthwara and her sisters was held on Dec. 21st.[133]

There was also an altar to St. Sidwell in Morebath in 1529, as appears from the churchwardens' accounts.[134]

The name "Sigwell" appears in the parish of Charlton Horethorne, where in 1877 a twin barrow and a single barrow were explored by Prof. Rolleston and General A. Lane Fox.[135] In this case also a spring of water was adjacent to the tumuli, a coincidence which would seem to indicate that here also the dedication of the spring had been to the same saint.

If the dedication of the spring at Wick Barrow be accepted, it gives us an interesting date, and also a fresh illustration of West Somerset hagiology. St. Sativola may be added to other Welsh or Celtic names which prevail along the coast. Long before her time, however, the perennial spring must in remote heathen ages have evoked the worship of those who piled up the great tumulus over their dead. Indeed, it seems possible that, as has been suggested,[136] the most ancient name for the spring may have marked its association with the fairies, as the "well of the Sidhe" in the ancient Goidelic speech of the Celts of Domnonia. Then a Christian virgin and martyr, whose name approximated to the popular appellation of the spring, was in due time made its tutelary genius, as at Exeter, and probably also at Charlton Horethorne and Morebath. If this suggestion be correct the dedication and transference of the old sacred well from heathen to Christian associations may date from the time when, in ancient Domnonia, Celt and Saxon were being merged into one common race with common beliefs.

(132). *Proc. Som. Arch. Soc.*, Vol. XX, pt. ii, p. 69.

(133). "A British Martyrology,"—printed for W. Needham, Holborn, 1761.

(134). *Proc. Som. Arch. Soc.*, Vol. XXIX, pt. ii, p. 84; also Capgrave.

(135). *Proc. Som. Arch. Soc.*, Vol. XXIV, pt. ii, pp. 75-88.

(136). By Mr. A. G. Chater.

APPENDIX III.

THE SIDWELL SPRING.

By H. St. George Gray.

In search of a spring-head, or well, digging was carried out, after the completion of the excavation of the barrow, close to House's Barn, at a distance of about 100 yards from the centre of Wick Barrow in a westerly direction. Time did not permit of any systematic digging being done here, and the soakage of water into the hole impeded the work that was carried out. At varying depths down to 1½ft. from the surface a few fragmentary objects were found; they are of no particular interest, except perhaps from their heterogeneity.

Broken animal remains were rather plentiful, but of these only one specimen was of interest, viz., the greater part of a metatarsus of a large sheep with a rounded, but not perfectly circular, hole at the proximal *end*, and similar to many perforated bones of the kind found in the Glastonbury Lake Village. The hole averages $\frac{5}{16}$in. in diameter. It has not, as many of these tarsal bones have, any perforation at the side of the proximal end; it cannot therefore be regarded as a shuttle-spool, or bobbin, such as the lake-dwellers used at Glastonbury, for weaving fabrics with the step-pattern as the prevailing ornament.[137] The two holes, one at the end and one close to at the side, would prevent the unrolling of the wound-on thread. But the Wick specimen has only the hole at the *end*, and it is difficult to identify its purpose. One of the tarsal bones with the pair of holes was found with pottery, etc., in a British refuse-heap at Steart Common Gate, near the mouth of the Parret, by the Rev. C. W. Whistler and Mr. A. Bulleid.[138]

A small piece of a flat amber bead, with part of a perforation traceable, was found; but it is impossible to date it with any degree of certainty. A small flint flake with fine secondary chipping was also found. Several seashore pebbles were thrown out of the excavations, which may possibly have been used as sling-stones. The shards of pottery were for the most part glazed fragments apparently of the XVII and XVIII Centuries; other fragments were probably medieval. Then there was one small piece almost certainly Roman, and another of early British type containing grains of quartz. Several pieces of red tile were observed, but they might belong to almost any period since the beginning of the present era.

(137). *Proc. Som. Arch. Soc.*, vol. XLVIII, pt. ii, Pl. III, fig. 8; p. 113, fig. 20; and p. 119.

(138). *Op. cit.*, vol. LII, pt. ii, p. 121.

No traces of masonry, such as might have indicated that at one time the spring had been protected by some sort of stone shelter, or included in a building, were found. Between the spring and the mound, however, there seem to have been some stone foundations, which may have belonged to the tenement possibly existing here (as mentioned by Mr. Greswell on p. 70); and it is reported that when the field was under cultivation a paved path, or causeway, had been found extending apparently from the spring towards the barrow. This probably did not go beyond the foundations just mentioned.

By the kindness of Dr. Winterbotham, the following analysis of the water of the Sidwell spring was obtained from Professor F. S. Kipping, of the University College of Nottingham.

"The sample of water has been examined and the report is as follows:—The water contains a small quantity of organic matter in suspension, and is rather rich in total dissolved solid matter, which amounts to over 50 grains per gallon. The soluble salts consist principally of calcium bicarbonate and calcium sulphate, but small quantities of magnesium salts and sodium chloride are also present. The water is practically free from ammonia, indicating freedom from recent sewage contamination. It must be regarded as a hard water, the total hardness being about 19°·5. A most careful examination reveals the presence of traces of arsenic, but the quantity is so minute, at the most one part in two hundred million, as to be negligible. Such small traces could have no appreciable effect, and it is probable that the water is really arsenic free, the presence of the traces actually found being probably derived from the earthenware vessel in which the sample was sent."

On this report Dr. Winterbotham remarks:—

"It is rather negative in character, and does not give much evidence of the presence of arsenic or the iodides, such as I had expected to find in water which has had such a long repute in efficacy in skin trouble and for sore eyes. The constitution of the water undoubtedly resembles that of many of the German springs, and possibly the calcium sulphate may be of service in scorbutic affections. But I fancy the efficacy of the water must be attributed to some mystic sentiment which might attach itself to a spring found in the Pixies' ground."

APPENDIX IV.

THE FOLK-LORE AND TRADITIONS OF WICK BARROW.

By the Rev. C. W. Whistler, M.R.C.S.

The local superstitions and more definite traditions concerning the great barrow known as "Pixies' Mound" are very interesting, especially with regard to the actual results of the exploration. It is pro-

bable that the comparison of tradition and fact observed may be of service in similar cases elsewhere.

The barrow stands in an unusual position, being considerably below the skyline of the long spur of land between the sea and the ancient inlet (or wick) on which it stands, and has apparently been so placed owing to an outcrop of rock which offered a definite platform on which to build the structure. Possibly owing to this slight and isolated unevenness of the ground, the barrow, which is practically in the middle of the field, has always been said to shift its place occasionally; and as a matter of fact the relation of the mound to the surrounding hedgerows does vary with different points of view in unusual ways, which are quite sufficient to give rise to the local suggestion.

It has always been considered a special haunt of the Pixies, who were said to live in it. Indeed, the wall when first discovered was regarded by the workmen as that of the Pixies' house which was "known to be there."

The last occasion on which the Pixies are said to have been seen was "not so many years ago" when the "uncle" of a present resident in the neighbourhood found them at work in the barn which stands two fields away to the eastward, and is seen among the trees on the left-hand side of the photograph, Plate III. Hearing the sounds of unauthorised threshing as he passed this barn, the farmer went to investigate, and when close at hand heard voices. One thresher said to another, "How I do tweat!" whereon the other answered, "So thee do tweat, do thee? Well then, I do double tweat, looky zee!" On which the farmer looked over the half-door, and saw the floor occupied by the little men in their red caps, hard at work. But on his exclamation of "Well done, my little fellows!" they fled, and have been seen no more.

It is probable that the definite naming of the "uncle" of some known person is part of the legend, and has been repeated unaltered from time immemorial. The same formula occurs constantly in similar legends, and though the name given has probably altered from time to time, the known relationship is traditionally associated with the tale in order to give it verisimilitude.

Another legend in connection with the barrow has no definite name of the sort connected with it. It is told that a certain ploughman at work in one of the adjacent fields heard the voice of a little child crying round the mound, and complaining that it had "broken its peel." Thinking that the child must needs be lost in so lonely a place, the man went to look for it, but though he saw no child, found a little wooden shovel, the "peel" with which the loaves were put into the old brick ovens, lying, with its handle broken, on the mound. Thinking that the child had probably hidden in the bushes which overgrew the south side of the barrow, but would certainly come out to recover its toy, he spliced the broken peel with some string, and left it where he found it. He heard no more of the child, but when his work was

over, had the curiosity to go to see if the peel had been taken. It was gone, but in its place lay a beautiful cake, hot from the oven of the pixy, as his reward.

This legend occurs here and there in England, but is very common in Scandinavia in connection with tumuli. In this case, as the curious group of names of Scandinavian type, Stolford, Catford and Whitewick, clustered at the mouth of the inlet of Wick, seem to point to an actual ancient Scandinavian settlement, it is possible that this tale is of Northern origin, coeval with the (VIII Cent.?) settlement to which some of the old families of the locality still trace their origin, as "Danes who stayed here when they were about."

Perhaps in this connection it was only to be expected that the mound was said to be the burial-place of a *Dane*. But in our county the *Dane* stands for an enemy generally, much as round Colchester the *Roman* holds a similar place.

It was always said that occasionally of an evening wonderful music could be heard from the mound across the levels, and this was ascribed to the Pixies, as a matter of course.

Two most persistent and thoroughly believed statements were made about the barrow, which are almost certainly traditions of actual occurrences, and not at all to be classed as superstitions. One was that "if the mound were to be removed by day, it would be set back again at night." The other was that "harm would inevitably happen to anyone who broke into the mound." These two statements had survived the removal of a considerable amount of material from the N.E. portion of the barrow (see p. 11), and were reiterated constantly during the early stages of the exploration. Personally, I was always of the opinion that the former tradition actually referred to some early attempt at mound-breaking, possibly by a hostile tribe, and its frustration by the tribe to whom it belonged, the statement of harm to the despoilers being a natural corollary.

That we should discover that the mound had actually been broken into by the Romans, and that their excavation had been carefully filled in, was a remarkable evidence of the persistence of tradition. The Romans had certainly had time to reach the ground level, but it is more than probable that they were not allowed to leave the neighbourhood without some attempt being made by the Celts to regain the valuables which they presumably searched for.

It may be significant that there has been in our time no legend of buried treasure attaching to the mound. One would imagine that some such legend led the Romans to open it; but their action must in any case have put an end to the belief that treasure remained. One may almost say for certain, however, that they were disappointed. The mound is too early for any store of grave-offerings of gold.

The place which the barrow seems to have held in the minds of the people of the district was evident in the unexpected interest shewn in the work as it proceeded, and, perhaps, still more in the extraordinary reports which went round among the villagers. The limited time

which we had at our disposal in the spring, coupled with the far greater importance of the exploration than had been expected, caused an apparently sudden abandonment of the work in April which was unaccountable to the neighbourhood. The coincidence of a serious illness in the family of one of the leaders of the work was of course considered as the main reason of its discontinuance, as "we dared not go on." It was also persistently stated that "the King had stopped the work." It was said that he had at first sent telegrams to command us to desist, and that these had been followed by a messenger in a motor-car. If we wished to go on, we should "have to get an act of Parliament." So far as we know, hardly a soul visited the mound after the men had left off work for the day, though a good many came on the Sundays. There was at no time the least interference with the work, and beyond the displacement of a few stones, which may have been accidental, no one seems to have cared to touch the actual excavations during our absence.

The actual "finds" made, were of course, considerably magnified by report, in spite of the statements correctly made in the local papers. The flint knife-dagger was magnified into "a stone sword as long as a man's arm," and the beakers into "splendid bronze flagons" or "bronze quart pots." On the other hand, the fact that a Danish chief was not found interred in the barrow led to the entirely erroneous statement that nothing at all had been found, and that the work had been a complete failure. That such a find might be possible was fairly to be expected.

Besides the signs of local Scandinavian settlement and the legends already noted, the unusual position of the mound on the very shore of what had evidently been a well sheltered inlet of the sea suggested that a spot so favourable for the berthing of long ships might have been chosen for the funeral obsequies of a, possibly defeated, chief. The known historic landings of the Danes on this coast lent additional colour to the idea. Had such a burial been discovered, a vexed point in Alfredian history might well have been settled, and even for that reason alone the exploration was more than justified. The actual results, however, though of the greatest interest archæologically, could perhaps hardly impress the public generally as the hoped for discovery of a historic burial would have done. The proof that the district had been an important centre of an early Goidelic population will perhaps be better appreciated as time goes on; and it is safe to say that at all events the exploration has roused a keen interest in the earlier relics of our county among those who watched the work.

LIST OF DONATIONS OF 5/- AND UPWARDS

RECEIVED FOR THE

WICK BARROW EXCAVATIONS.

	£	s.	d.
Society Antiquaries, London	5	0	0
Som. Arch. & N. H. Soc. ..	1	11	6
Viking Club	1	1	0
Anonymous (V. Club) ...	1	1	0
Andrew, T. H.	0	5	0
Bailward, T. H. M. ...	0	10	0
Baker, W. T.	0	5	0
Beale, Frank	0	5	0
Bouverie, H. H. P. ...	3	2	0
Bouverie, Miss	1	1	0
Boys, Rev. H. A.	0	5	0
Braithwaite, J. B.	0	10	6
Bramble, Lt.-Col. J. R., F.S.A.	1	1	0
Broadmead, W. B. ...	3	3	0
Brown, Robert	0	5	0
Bruton, F. A.	0	10	6
Bulleid, A., F.S.A	0	5	0
Bulleid, Mrs. A.	0	5	0
Burnell, C. E.	0	5	0
Candler, Chas.	1	0	0
Chater, A. G.	3	3	0
Clark, W. S.	0	10	6
Collingwood, W. G., F.S.A.	1	1	0
Crampton, W. T.	0	10	0
Daniel, Rev. H. A. ...	1	0	0
Dunkinfield-Astley, Rev. H. J.	0	5	0
Elton, Sir E. H., Bart. ...	0	10	0
Goddard, Rev. C. V. ...	0	5	0
Gooding, W. F.	0	10	0
Greswell, Rev. W. H. P. ...	0	10	6
Hembry, F. W.	0	10	6
Hobhouse, Rt. Hon. H. ...	2	2	0
Hodgkin, R. H.	2	2	0
Homer, Rev. H. A. ...	0	5	0
Hoskins, E. J.	1	1	0
Hoskyns, R. G. de H. ...	0	5	0
Housman, Rev. H., B.D. ...	0	5	0
Inge, Rev. J.	2	0	0
Joseph, H. W. B.	1	10	6
Kelway, Wm.	0	5	0
Killick, C. R., M.B. ...	0	10	6
Leigh, R. L.	0	5	0
Lloyd, Rev. J. A., F.S.A. ...	0	10	6
Macfie, R.	0	5	0
Major, A. F.	2	2	0
Moffatt, A. G.	0	10	0
Morgan, Col. Ll.	2	2	0
Norris, Hugh	0	10	6
Nursey, Rev. P. F. ...	0	5	0
Paynter, J. B.	1	1	0
Pocklington-Coltman, Mrs.	1	0	0
Poole, W. J. Ruscombe ...	1	0	0
Prideaux, W. de C. ...	0	10	6
Rawlins, Jas.	0	5	0
Rawlins, J. P.	0	15	0
Reeder, Rev. W. T. ...	0	5	0
Rucker, Miss S. C. ...	1	1	0
Smart, F. G., F.S.A. ...	1	1	0
Somerville, A. F. ...	3	11	6
Sorby, Rev. J. A.	0	10	0
Stoate, Wm.	0	10	0
Stone, J. Harris	1	0	0
Strange, Rev. W. R. P. ...	0	5	0
Toller, Prof. T. N. ...	0	10	0
Trask, Chas.	1	0	0
Trevilian, E. B. Cely ...	1	1	0
Weaver, Rev. F. W., F.S.A.	0	5	0
Winterbotham, W. L., M.B.	0	10	6
Winwood, Rev. H. H., F.G.S.	0	10	0
Withington, E.	0	5	0
Withington, R.	0	5	0
Woodward, Miss J. L. ...	0	10	0
	£65	15	6

When subscribers made donations in April and in September, 1907, the amounts have been added together. Others, who did not actually subscribe to the Fund, assisted liberally in other ways (*see* Introductory Notes).