

## IV.

NOTICE OF THE DISCOVERY OF A ROMAN BOWL IN GLASGOW GREEN, AND ROMAN REMAINS FOUND AT YORKHILL. By JOHN BUCHANAN, LL.D., CORR. MEM. S.A. SCOT., GLASGOW.

The Green of Glasgow is situated along the south-eastern part of the city, and is skirted by the River Clyde. It is popularly divided into two portions, known as "The Low Green" and "The High Green," the latter being opposite the suburb of Bridgeton, and commonly called also "King's Park." It was in this last division of the Green that the discovery now to be noticed took place.

In October 1876, during certain operations for laying water pipes across the High Green, in a direction towards the river at the great bend called "Peat Bog," the workmen, in cutting a deep trench in which the water pipes were to be placed, came upon a large Roman Bowl. It was lying flat on its mouth in greyish sand, about 4 feet below the present surface of the Green. The bright crimson colour of the rim round the raised bottom outside fortunately attracted the workman's attention before any damage was done, and he carefully scooped the bowl out of its ancient resting place uninjured, handing it over to his master, the contractor, who was on the spot at the time, and at once took charge of the relic.

The bowl is of the usual red ware, commonly called Samian, and is of a rich crimson colour. It measures 9 inches in diameter, and in depth  $4\frac{1}{2}$  inches. The inside is of brilliant crimson, as fresh looking as if made yesterday, without any ornament. The outside is rather paler than the inside. The rim is artistically rolled over. Then immediately below this crimson rim there is a plain surface, about the breadth of two fingers, all round the outside of the bowl. Below this, the relic is rather profusely ornamented with raised figures of oxen, deer, rabbits, and other animals. These are inclosed in various sections, each section being defined by dancing female figures, perhaps intended to represent *genii*. The exterior bottom of the bowl is a neatly raised crimson circle, on which the vessel rested when in use. Something resembling the letter N has been rather rudely scratched on the bottom, in the centre of the circle, evidently done after the bowl was finished, and probably intended to indicate the initial letter

of the owner's name, if not a potter's mark. The whole bowl is in excellent preservation, without a scratch, save a little abrasion of some of the figures, evidently from use. From the general appearance the relic must have belonged to some person of note, perhaps a superior officer. It would have been too expensive for a common legionary soldier.

Herewith I send a photograph of this interesting memorial of ancient fictile art, taken from the original by Mr Thomas Annan, the well-known Glasgow artist. Being uncoloured, however, the effect is not so fine, wanting as the photograph does, the rich, beautiful crimson of the original.

The bowl has been permanently deposited in the Industrial Museum, Kelvin Grove Park, Glasgow.

For the sake of precision it seems desirable to state—1st, That the place of discovery was at the head of the slope of the Green, overlooking a flat alluvial portion of the right bank of the river, called "The Flesher's Haugh," about 200 yards back from the stream, and near the *Gymnasium*; 2d, The surface of the Green was formerly in a very rugged state, and has been repeatedly levelled and improved, so that it would be unsafe to assume that the distance of about 4 feet down, at which the bowl was found, corresponds with the original depth; on the contrary, the probability rather is, that the deposit was made shallower, the levellings alluded to necessarily causing more top soil to accumulate over the spot where the bowl lay; 3d, The precise date of discovery was the 7th of October 1876, the name of the contractor for the works is David Manwell, Pollokshields (a suburb), and that of his workman who actually discovered and lifted out the bowl, is Stephen Fox.

So much for the bowl itself.

But how did it come to be deposited where found? There are reasons for supposing that it was hidden there by the owner, in an aperture dug on purpose in the sand, and the object forgotten, or the owner slain. It was by no means uncommon for the Romans to hide in the earth coins, altars, slabs, and the like, various instances of which have been made apparent in the very neighbourhood of Glasgow; although it is remarkable that this bowl is the only Roman relic known to have been discovered on the site of, or close to this city. The district must have been, however, well known to that warlike people. It lay within the province of Valentia; and in the course of the Antonine Wall, some portions of which came within a very few

miles of what is now Glasgow. Moreover, a Vicinal Way branched off from the great central *Iter*, near Carstairs, and crossed the country in a north-west direction to, and joined the Roman wall near its western termination, at one of the wall-forts. This Vicinal Way was traced, in comparatively recent times, close to Glasgow district, particularly at Tollcross, which is only about two miles from the eastern suburbs of the city. Its course is to be seen on some of the old maps, and particularly that attached to General Roy's "Military Antiquities of the Romans," also in Stuart's volume, "Caledonia Romana." The road must have crossed the region now occupied by the city of Glasgow, and it is by no means improbable that what is now Gallowgate (one of the oldest streets) runs in the line of this Roman way. If so, the road would pass within a very short distance of the Green, mentioned at the outset.

There is no evidence of a Roman military post having existed at Glasgow. On the curious map of the country, constructed for the first printed edition of Ptolemy's geographical works, no marking of a station appears, although the great camp at *Vanduarra* (Paisley) is distinctly seen. This important station is about seven miles west from Glasgow, and it is believed that troops and military stores were conveyed to it by means of a sub-branch of the Vicinal Way alluded to, which became bifurcated about the area of what is now Old Glasgow. The right hand fork proceeded to, and joined the Antonine Wall, as already stated; while the left one ran in a south-west direction to one of the fords in Clyde, and continued on the opposite or south side of that river, traces having been recognised in recent times beyond the ford or point of crossing. Indeed, the termination of the road is still indicated by the name of one of the oldest streets in Paisley, called "The Causewayside." There are reasons for believing that the Trongate, Argyle Street, and the road westward to Old Partick, run in the lines of the left fork of this ancient Roman Vicinal Way.

While on this subject of the Paisley branch of the Vicinal Road, an interesting discovery was made a few years ago. The lands of Yorkhill adjoin the mouth of the river Kelvin, which rises in the Campsie hills, and enters Clyde at right angles, opposite what is now the small but ancient town of Govan. At this embouchure of the Kelvin there was a well-defined ford, passable on foot, and removed only lately in consequence of the artificial deepening of the Clyde. It was matter of doubt at what point in

the river the military road crossed. It would seem, however, that this doubt has been now, to some extent, if not wholly, removed by the following discovery, which has not hitherto been sufficiently recorded.

On Yorkhill lands is an eminence of considerable elevation, commanding the embouchure of Kelvin and a large sweep of Clyde, with the adjacent country. On the summit of this hill, which had remained almost undisturbed, faint traces of earthworks were visible, much crumbled down. But in 1867, the proprietors having resolved to make certain improvements, the remains of the earthworks were dug into, and the area trenched. These operations revealed a variety of Roman remains, embracing—1st, Fragments of several jars of the ware called Samian, in different colours; 2d, Portions of an ornamented vase of white glass; 3d, Two bronze finger-rings; 4th, A small quantity of wheat, for bread to the soldiers; 5th, Several Roman coins, much corroded, but one of large brass, which was of Trajan, in tolerable preservation.

These objects would seem to indicate that a small Roman fort existed on the Yorkhill eminence, probably to guard the ford from incursions by the natives, and this would tend to confirm the supposition that it was at this particular point that the Vicinal Way crossed Clyde. The soldiers of this smaller garrison, as well as supplies, would likely be drawn from the large camp at Paisley, only about 4 miles distant. If the existence of this minor fort is well founded, then soldiers from it may have deposited the bowl previously alluded to, in Glasgow Green, during some excursion.

But then it may be said, Why should such a fort have been necessary so far within the protection of the Antonine Barrier? To which it may be answered, that originally that Barrier consisted merely of a chain of forts across the isthmus between the Clyde and Forth, with open intervals of about two miles. These were not connected by a military curtain till the reign of Antoninus Pius, which thenceforth would prevent native incursions into the province, either on foot through the woods, or in canoes down the stream of the Kelvin, such as those found recently, at its mouth, silted up in the *alluvium*. As coins of the era of Trajan (two reigns prior to Antoninus), and none later have been found at Yorkhill, it seems not unreasonable to suppose that this small fort on the commanding eminence may have been constructed while the spaces between the wall forts were open; in other words, prior to the reign of Antoninus Pius.

But apart from all these conjectures, the main fact remains, that tangible proof has at last been obtained of the actual presence of the Romans on the area of Glasgow, by the interesting discovery of the bowl, forming the subject of this paper.

MONDAY, 11th June 1877.

DR JOHN ALEXANDER SMITH, Vice-President, in the Chair.

After a ballot, the following Gentlemen were duly elected Fellows, viz. :—

LEWIS BILTON, Esq., W.S.

Rev. R. K. D. HORNE, Corstorphine.

HUGH F. WEIR, Esq. of Kirkhall, Ardrossan.

JAMES MAINLAND M'BEATH, Esq., Kirkwall.

JOHN M'GAVIN, Esq., Glasgow.

WILLIAM GALLOWAY, Esq., Architect, was also elected a Corresponding Member.

The following Donations to the Museum were laid on the table, and thanks voted to the Donor :—

By ARTHUR MITCHELL, M.D., LL.D., Secretary to the Society of Antiquaries of Scotland, and Rhind Lecturer on Archæology in connection with the Society.

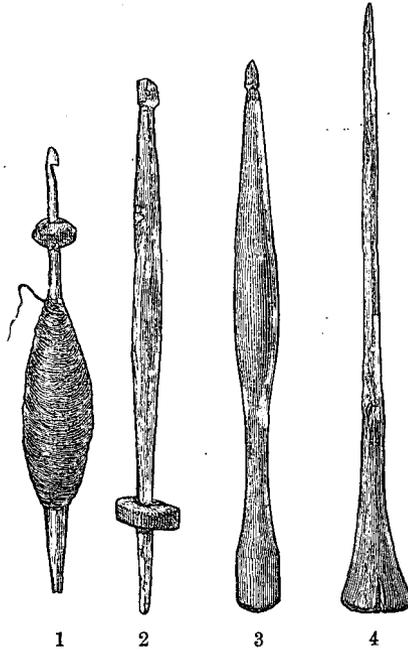
A collection of Ancient Stone Implements and Implements of Archaic form or character, many of which had been exhibited in illustration of the first course of the Rhind Lectures, comprising—

(1.) Spindle, with Stone Whorl (No. 2 of the following woodcut), found in use by Dr Mitchell in the island of Fetlar. The whorl is made of steatite, and has no special character. The spindle is a roughly-shaped piece of firwood, and is  $11\frac{1}{2}$  inches long, and about half an inch thick in the middle, tapering somewhat to each end. Instead of a notch at one of the ends, there is a roughly-made button-like knob. In 1863 Dr Mitchell obtained four spindles in Fetlar, all of them in actual use; and he was

then told that sometimes a potato was made to take the place of a stone whorl by the natives of that island.

(2.) Two Spindles, made to be used without whorls.

One of them (No. 3 of the following woodcut) is peculiar in its shape, and



Spindles recently in use in Scotland.

was found at Battangorm, in the parish of Duthil, Inverness-shire, in 1865. It is  $11\frac{3}{4}$  inches long, and has a button-like knob at the upper end. The woman using it had a distaff or rock—a piece of stick prepared in no way, with a bunch of wool tied to the end of it, and carried below her arm. Though she was found using the spindle, she was nevertheless the owner of a spinning-wheel.

The other (No. 4 of the woodcut) is a polished and well-made Spindle, found in a cottage at Corriebeg, on Locheil-side, in October 1866. It has neither notch nor button at the upper end. The diameter increases greatly

at the lower end, so as to serve the purpose of a whorl. It is  $12\frac{1}{2}$  inches long. The people on Locheil-side are said no longer to use the spindle.

(3.) A Spindle with the woollen yarn on it, exactly as Dr Mitchell obtained it from the woman who was using it. The lower end is thick, so as to do away with the need of a whorl. It is the longest of the spindles, being  $14\frac{3}{4}$  inches long.

(4.) A Spindle 10 inches long, with the woollen yarn on it (No. 1 of the foregoing woodcut), as Dr Mitchell bought it from a woman who was using it in the parish of Daviot, Inverness-shire, in the year 1866. A potato was used for a whorl, and the potato, preserved in glycerine, accompanies the spindle.

Dr Mitchell has seen a potato used for a whorl on three occasions—once in Daviot, once in Islay, and once in Galloway—all within the last twelve years.

(5.) A Pair of Stockings of spindle-made yarn.

Dr Mitchell gives the following account of these stockings:—They were knitted by Sarah Rae, an old imbecile woman, who lived in the parish of Balmaclellan. The yarn she used was made by herself. In making it she employed a spindle weighted with a potato for a whorl. She was seen spinning the yarn, out of which these stockings were afterwards made, when she was visited by the Rev. George Murray of Balmaclellan and Dr Mitchell in 1866. As she spun, she sang, or rather crooned, one of the oldest of our ballads—"The silly poor harper of Lochmaben toun," and she concluded with the following verse, which is not given in the ballad as it appears in the collection by Robert Chambers, and which does not occur in the two versions of the ballad in the Riddell MSS., now in the library of the Society:—

"And oh the silly poor harper's wife,  
She's aye first up in Lochmaben toun;  
She's stealing the corn an' stealing the hay,  
An' waps it ower to wanton Broun."

The over-word was something like the following:—

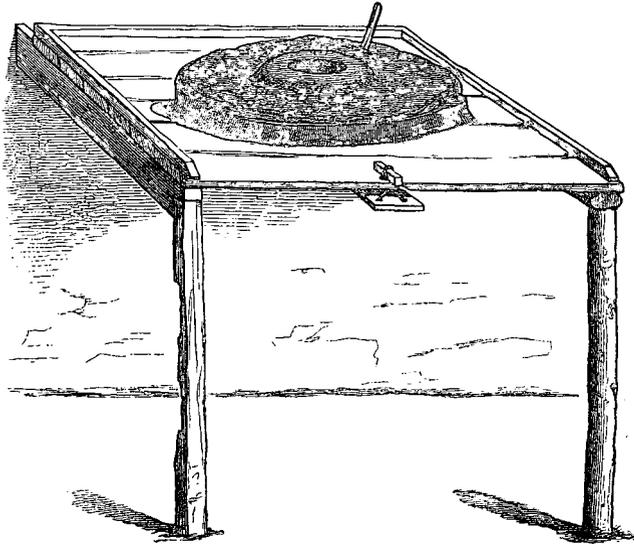
"Hey tum tidly,  
Doodlem didly,  
Hey tum tidly,  
Doodley dan."

The air, which was unknown to Mr Murray and Dr Mitchell, was taken down by Mr Murray, and is preserved.

She also sang, to the tune of "The Soldier's Joy," "Merry be the memory of good Queen Bess." There was something so unusual, and yet so fitting, in finding a woman singing these old songs as she worked with this old implement, that Mr Murray, after the visit, was moved to write a poem on old Sarah, which he printed and circulated among his friends.

(6.) Piece of Steatite or Kleber-Stone, partly made into a whorl for a spindle. A boy was found by Dr Mitchell shaping this stone into a whorl in Fetlar, Shetland, in 1863. Most of the Shetland whorls are made of steatite, which occurs there plentifully and is easily cut by a pocket-knife.

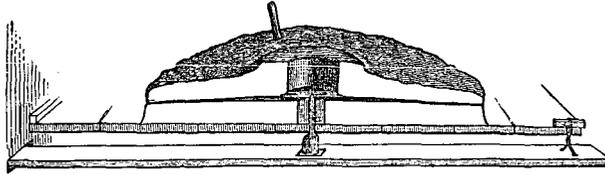
(7.) A Quern, mounted on its wooden frame, from Shetland, and two samples of meal ground by it—one fine and the other coarse.



Quern on its Wooden Frame, from North Yell, Shetland.

This quern Dr Mitchell found in a cottage in North Yell in the year 1865. When he entered the cottage a woman was grinding oats with it. He bought the quern exactly as it stood, with the tray and all other

appurtenances; and it is now fitted up as closely as possible in the way in which it was actually found. Dr Mitchell paid 5s. for it—a sum which was said to be more than sufficient to purchase a new quern. The front of the tray rested on two legs; the back of it was secured to the wall, against which it stood. There is an ingenious contrivance for raising or depressing the upper stone, so as to render the quern capable of grinding fine or coarse. This is accomplished by means of a board, on which the lower end of the spindle rests, and which can be raised or lowered by the twisting of a string fastened to it and passing through a hole in the tray over a loose peg. This is shown in the following section of the quern and its frame. On the upper end of the spindle, after it has passed through the lower stone, the upper stone rests and is carried.



Diagrammatic Section of the Quern and its Frame.

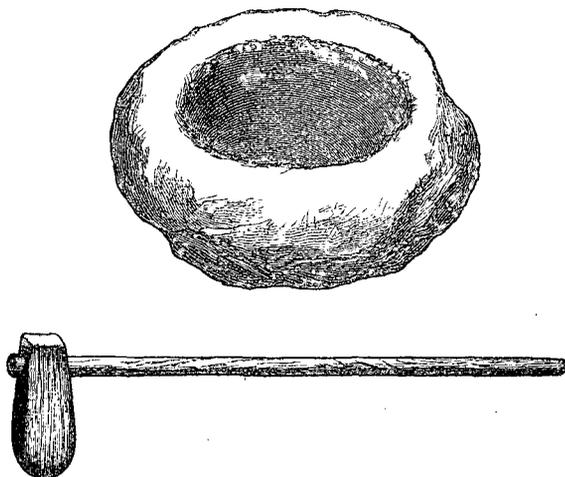
The two woodcuts show the position the quern occupied, and illustrate its structure. The under stone, which rests on the wooden tray, was bedded in clay. The diameter of the quern is about 20 inches. It is made of a mica-schist stone, which is found in various parts of Shetland. Similar querns were said to be made at Halesgirth, on Whalefirth Voe, in Yell, and to cost from 3s. 6d. to 4s. In 1863 Dr Mitchell saw a quern in Fetlar which cost its owner 5s., and another, the price of which was 3s. 6d. In Dunrossness the table or tray often consists of a flag-stone. Dr Mitchell saw a quern at Lingard, in Dunrossness, made by the man who used it. The price of a quern there was said to be 3s. 6d., and of the table or tray on which it rests, 1s. 6d.

Dr Mitchell states that at the time he bought this quern a thousand querns, in actual use, could have been bought in Shetland.

(8.) Socket-stone for the Spindle of a Water-mill, from Glen Nevis. Dr Mitchell has no knowledge of the time when this stone was in use. A similar stone, from Cromar, was lately presented to the Museum by Dr

Mitchell, and is referred to at p. 636 of vol. x. of the Proceedings. The socket-stone from Glen Nevis is a rough boulder of quartz, somewhat quadrangular, and measures 7 inches long, 6 inches wide, and 4 inches deep. Many such socket-stones are known to have been recently in use.

(9.) Knockin'-Stane and Mell for preparing pot-barley. This stone was quite lately in use in Shetland. Dr Mitchell obtained it through Mr Charles Duncan. The mell he obtained through Mr Gilbert Goudie, and



Knockin'-Stane and Mell from Shetland, used for Preparing Pot-Barley.

through him he also obtained a specimen of pot-barley, which was recently made in Shetland by one of these knockin'-stanes, and which accompanies the donation. The mell, used in connection with the knockin'-stane now lodged in the Museum, was unfortunately lost; but it differed in no respect from the one procured for Dr Mitchell by Mr Goudie, and now presented to the Museum.

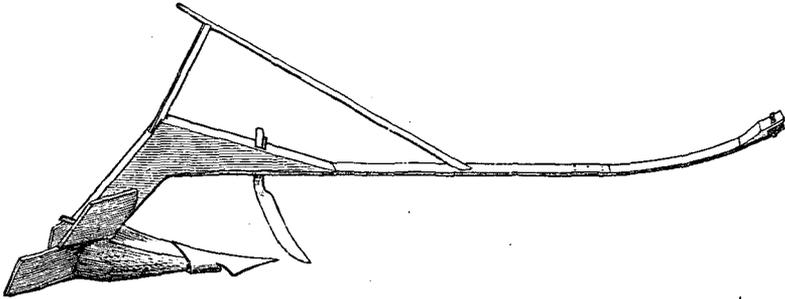
The mell-head is made of oak, and the handle, which is 33 inches long, of firwood. The knockin'-stane itself measures 19 x 13 inches. The cup or hollow, which holds the barley while being struck, is 6 inches deep and 12 inches wide at its mouth.

In 1864 Dr Mitchell saw, at Bigmill, parish of Daviot, Inverness-shire,

a knockin'-stane of an octagonal shape and neatly made, with the date 1716 on it. The mell was also there. The woman to whom it belonged had seen it used.

(10.) A specimen of the One-Stilted Plough, from Shetland.

When passing through the district of Coningsburgh, in Shetland, in 1865, Dr Mitchell saw one of these ploughs at work. He afterwards made arrangements to have the plough sent to Edinburgh, giving instruc-



One-Stilted Plough from Coningsburgh, in Shetland.

tions to forward the very plough he had seen at work. Instead of this, a new plough was made, and this is the one presented to the Museum.

Unfortunately, it was thought that the plough seen at work had too great a look of age and decay, and that a counterpart of it, new and in good order, would be a better object to send to Edinburgh.

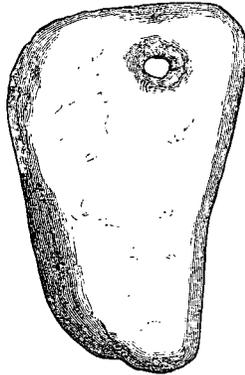
(11.) A Shetland Scythe. The handle is quite straight, and is 7 feet 3 inches long. It is held in the hands by one projection, 5 inches long and 55 inches from the blade, on the inner aspect of the handle. The blade, which is only 14½ inches long, is fixed to the handle by a tang, which, after passing along the handle for 4 inches, is bent at a right angle, and passes through the handle. This tang is kept in its position by a piece of string.

(12.) A Bismar, or Weighing-Machine. This bismar, which comes from Shetland, is said to have been actually used in buying and selling on the day on which it was purchased for Dr Mitchell in 1866. It is a wooden rod, 32½ inches long, with an expansion or knob at one end, acting as a fixed weight, and a hook at the other end, from which the object to be

weighed is suspended. A piece of string serves as a fulcrum. It hangs as a loop from the two ends of a bit of wood, 4 or 5 inches long, which is grasped by the hand in using the machine. By moving the string to or from the fixed weight at the end of the rod, till that weight and the object suspended from the hook balance each other, the weight of the object is ascertained.

In August 1865 Dr Mitchell saw a bismar hanging in a cottage at Barsick Hill, South Ronaldshay, and learned that it was still occasionally used, though not in buying or selling.

(13.) Pierced Stone (figured below), used for tying between a cow's horns, and by its motion preventing her from running away. This Dr Mitchell found in use in Shetland in 1865. It is a flat water-worn piece of



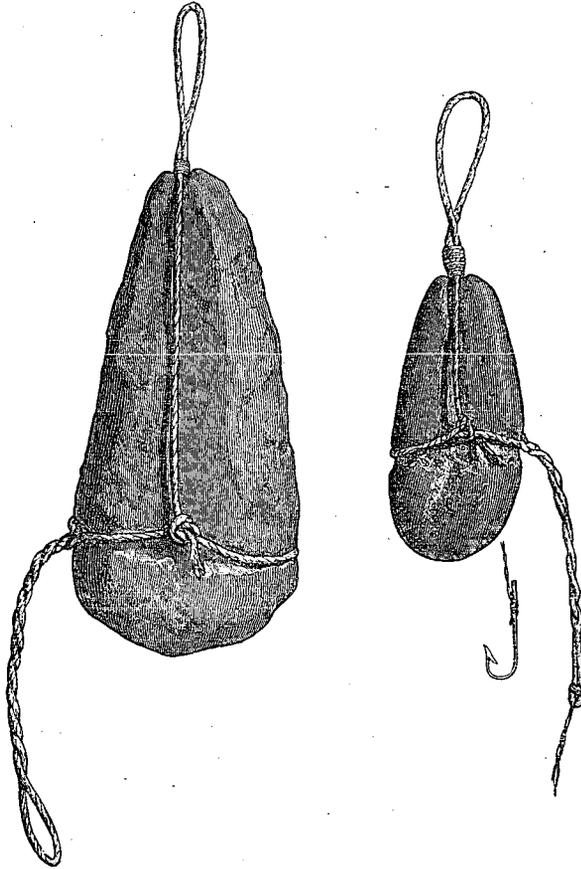
Stone used in Shetland for tying between a Cow's Horns.

sandstone picked up from the beach. The hole, which is towards one end, is rudely made. It is about 1 inch in diameter, and has been pecked through from both sides of the stone. It weighs 17 ounces, and measures  $5\frac{1}{2}$  inches in length and  $3\frac{1}{2}$  inches in breadth. It is about  $\frac{3}{4}$  of an inch thick.

In the same year Dr Mitchell saw in Lerwick a roughly circular pierced disc of stone in use as the weight for the stable-halter of a horse. It weighed between 1 and 2 lb.

(14.) Six Sink-Stones, from Shetland. These are of various shapes.

The two figured below, with the cord still attached to them, come from the district of Walls, in Shetland, and were sent to Dr Mitchell by the Rev. James Russell, of Walls and Flotta, a Corresponding Member of



Sink Stones from Walls, in Shetland.

the Society. The larger is a roughly-flaked piece of sandstone, and the other a water-worn beach-stone. In order to make the cord grasp these stones securely, grooves have been roughly cut in them in the way

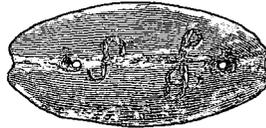
indicated by the woodcuts. The larger one is 8 inches long, and weighs 43 ounces. The smaller, to which the hook is still attached, is 5 inches long, and weighs 11 ounces.

The third is a fragment,  $5\frac{1}{2}$  inches long and 2 inches thick, of a water-worn pebble, with a groove cut along the middle of one side. It is a portion of a sinker like the two just described.

The fourth is a roughly spherical piece of sandstone, weighing 34 ounces, with a hole through it, which Dr Mitchell found in a cottage at Wasbister, Rousay, in July 1865. It was said to have been recently used in cod-fishing.

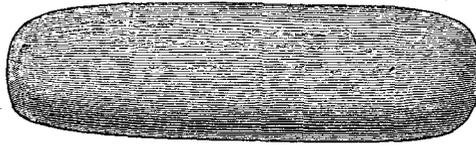
The fifth, which is figured below, is made of coarse steatite, with some care, and has the initials of the owner cut on it. It comes from the north of Shetland. Its weight is 14 ounces.

The sixth, also made of steatite, and having a conical form, comes from the same district, where it was used in hand-line fishing in water which was not very deep. Its weight is 9 ounces.



Sink Stone of Steatite from  
Shetland.

(15.) Oblong Pounding-Stone, nearly cylindrical,  $7\frac{1}{2}$  inches long and about  $2\frac{1}{2}$  inches in diameter, found by Dr Mitchell and Mr Joseph Anderson, in 1866, in a crofter's cottage in East Watten, Caithness, where



Pounding-Stone from East Watten, in Caithness.

it was said to have been in use for the last half century for crushing coarse salt. It is a water-worn sandstone pebble. The sides are smooth and polished. The ends are rough, from occasional use as a hammer.

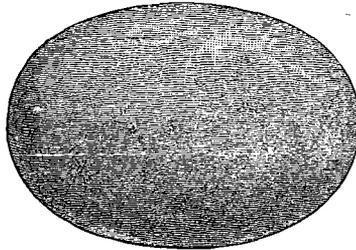
(16.) Weaver's Rubbing-stone. This is an oblong piece of hard black stone, 7 inches long,  $2\frac{1}{2}$  inches wide, and  $\frac{5}{8}$  of an inch thick. It is smooth and polished. The corners are rounded off. It was found in

the cottage of a handloom weaver near Auchtermuchty, and was used by him for smoothing or calendering his web. The weavers in Frioekheim, Forfarshire, lately used a similar stone for smoothing the osnaburgs which were manufactured there. Sometimes a piece of hard wood or bone is preferred to stone, and acquires by use a highly polished surface.



Weaver's Rubbing-stone from Fifeshire.

(17.) Stone found in use in Orkney, within the last ten years, instead of a smoothing-iron for ironing clothes. It is figured in the woodcut which follows. It was sent to Dr Mitchell by the late Mr George Petrie. It is a large, smooth, egg-shaped, water-worn granite pebble, weighing 3 lbs., and measuring  $5\frac{3}{4}$  inches in its long, and 4 and  $2\frac{1}{2}$  inches in its shorter, diameters.



Stone used in Orkney as a Smoothing-Iron for Ironing Clothes.

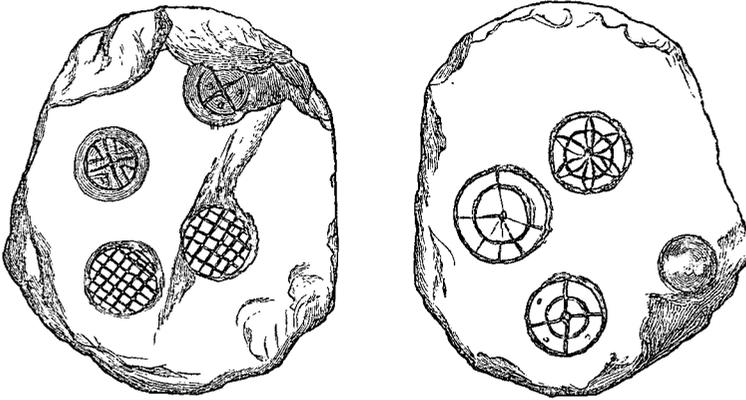
Another Stone of the same kind was sent to Dr Mitchell about seven years ago, from Walls, in Shetland.

Dr Mitchell first heard of these ironing-stones in 1865 from Mr Petrie, who stated that he had seen one in Kirkwall, which, from its shape, might have been mistaken for a large celt. In the same year Dr Mitchell was informed that they had been lately seen in use in the parish of Deerness, in Orkney.

(18.) A Button-Mould of sandstone, for casting pewter buttons, found

in the bed of a burn in Evie, Orkney, by the Rev. William Beattie, minister of the parish, and presented by him to Dr Mitchell. The moulds are on both sides. The buttons which were manufactured by this implement were from 1 inch to  $\frac{1}{2}$  an inch in diameter.

The old home-made bone-button of Orkney Dr Mitchell has seen. It is a circular disc of bone, on the back of which a square projection is left, and through this, parallel with the plane of the disc, a hole is pierced, by which the button is fastened to the cloth. The home-made bone-button of

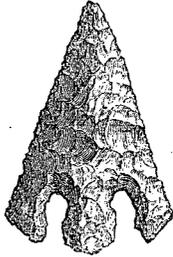


Two Sides of a Button Mould of Stone found in Evie, Orkney.

the Hebrides is often square or lozenge-shaped, and is sewed to the cloth through four holes pierced in it. The most primitive button to be seen in use in Scotland is a very serviceable and lasting one, still made in the Hebrides. It consists of a cylinder of bone, from 1 inch to  $1\frac{1}{2}$  inch in length, and about  $\frac{3}{8}$  of an inch in thickness, rounded at the ends, and with a neck, or contraction, at the centre of the length by which it is fastened to the cloth. Dr Mitchell has not preserved specimens of these three forms of home-made button, but he has drawings of them made by James Drummond, R.S.A.

(19.) Circular Stone Cup of dark granite stone, from Walls, in Shetland, sent to Dr Mitchell by the Rev. James Russell, Cor. Mem. S.A. Scot. It measures about  $4\frac{1}{2}$  inches in diameter and  $2\frac{1}{2}$  inches deep. The hollow is  $3\frac{1}{2}$  inches in diameter and  $1\frac{1}{2}$  inches deep

- (20.) Two Arrow-Heads of white flint—one serrated along the edge—found near Gretna about ten years ago, and given to Dr Mitchell by James Cunningham, Esq., F.S.A. Scot. They are of the variety with barbs and stem, the barbs being peculiarly formed, as shown in the accompanying woodcut. One of them is entire, but one of the barbs is broken off the other.



Flint Arrow-Head from  
Gretna.

- (21.) Two fragments of Knives of Shale, from Walls, in Shetland, sent to Dr Mitchell by the Rev. James Russell. They are both carefully ground.

Fig. 1 is a portion of the haft-end of a knife. Its longest measurement is  $4\frac{1}{2}$  inches. The tang measures 2 inches in length, and the blade 2 inches in width. The thickness nowhere exceeds  $\frac{3}{16}$ ths of an inch.

Fig. 1.

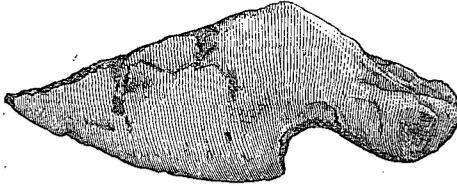
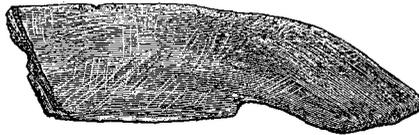


Fig. 2.

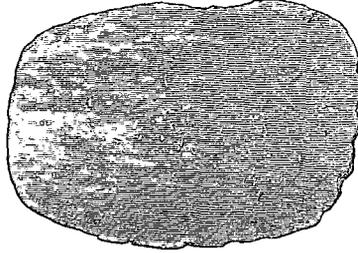


Fragments of Knives of Shale from Shetland.

Fig. 2 is also a portion of the haft-end of a knife. Its longest measurement is  $4\frac{3}{4}$  inches. The length of the tang or handle is  $2\frac{1}{4}$  inches, and the width of the blade  $1\frac{1}{2}$  inches. The thickness nowhere exceeds  $\frac{3}{16}$ ths of an inch.

- (22.) Two Polished Flat Oval Knives or Implements of porphyry,

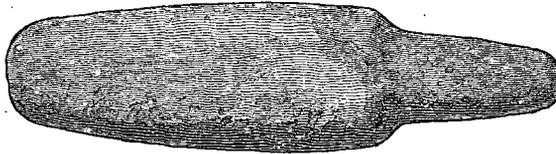
from Shetland. One is greyish in colour, and measures  $5\frac{3}{4}$  inches in length, 4 inches in width, and about  $\frac{1}{4}$  of an inch in thickness at the centre, thinning towards the circumference, which exhibits a sharp edge all round. It is shown in the accompanying woodcut. The other is



Polished Oval Implement of Porphyry from Shetland.

greenish in colour, and measures 6 inches in length, 4 inches in width, and about  $\frac{1}{4}$  of an inch in thickness at the centre, thinning towards the circumference, which is sharp all round, like the previous one.

(23.) Four of the handled type of Rude Implements of sandstone, from Shetland. No. 1 (figured below) is a complete implement. It measures

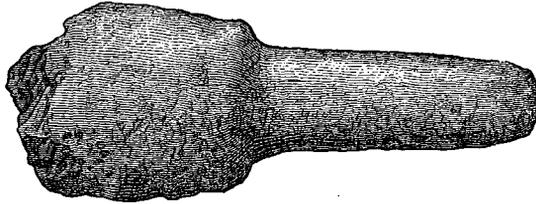


(No. 1.) Handled Implement of Sandstone from Shetland.

$11\frac{3}{4}$  inches in length, 3 inches in width, and 2 inches in thickness. The handle, which is conical, is  $3\frac{1}{2}$  inches in length. The point and sides are rounded off. The surface has been formed by pecking. This is most distinctly seen on the part forming the handle. No. 2 (see woodcut on the next page) is an incomplete implement, the handle of which measures  $4\frac{3}{4}$  inches in length. Only 3 inches of the body of the implement remain. It has been 3 inches wide and  $1\frac{1}{4}$  inches thick at the centre, thinning at the two sides. No. 3 (figured on next page) is a fragment of a handle only. Its length is  $4\frac{1}{2}$  inches, width 2 inches, thickness  $1\frac{3}{4}$  inches. Its

peculiarity consists in its having a knob-like expansion at the butt end. No. 4, which is not figured, is an incomplete implement. Its handle, which is somewhat flattened, is  $3\frac{1}{2}$  inches long, 2 inches wide, and  $1\frac{1}{4}$

No. 2.



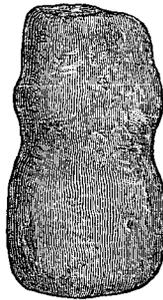
No. 3.



Handled Implements of Sandstone (broken) from Shetland.

inches thick. The portion of the body of the implement remaining is  $2\frac{1}{2}$  inches long, 3 inches wide, and  $1\frac{1}{2}$  inches thick.

(24.) Rude Implement of Sandstone from Shetland. It has a constriction round the centre, which is suggestive of use as a sink stone. It is  $4\frac{3}{4}$  inches long,  $2\frac{1}{2}$  inches wide, and  $1\frac{3}{4}$  inches thick, and its weight is  $22\frac{1}{2}$  ounces. Many stones of this form have been found in Shetland. It is represented in the accompanying woodcut.



Implement of Sandstone from Shetland.

(25.) Two Stone Axes or Celts, from Shetland. One is of greyish porphyritic stone, and measures  $5\frac{1}{2}$  inches in length, 2 inches in width, and  $1\frac{1}{2}$  inches in thickness. It is well polished, the sides are rounded off, and the cutting end is somewhat rounded on one side and flattened on the other. Fragments have been broken off both ends of the implement. The other is of greenish porphyritic stone, 4 inches long, 2 inches wide, and  $1\frac{1}{4}$  inches thick. It is highly polished. The sides have been rounded off, but one side is entirely chipped away, apparently with intention.

(26.) Small Polished Adze of porphyritic stone, from Shetland. Its length is  $2\frac{3}{4}$  inches, breadth  $1\frac{3}{4}$  inches, tapering to  $\frac{3}{4}$  of an inch at the butt-end. It nowhere exceeds  $\frac{1}{2}$  of an inch in thickness.

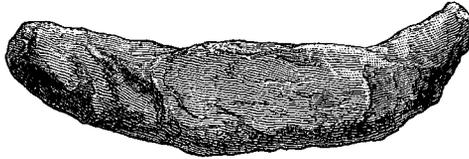
(27.) Celt of kaolin, from Rhianbreck, Lairg, Sutherlandshire. It was turned up during the diggings in connection with the railway in 1867, and was found by Dr Mitchell lying on the outside sill of a cottage window. A portion has been broken off the butt-end of the implement. In its incomplete state it measures  $6\frac{1}{2}$  inches in length,  $2\frac{3}{4}$  inches in width, and  $1\frac{1}{2}$  inches in thickness. It is well polished, rounded off at the sides, so as to be oval in section.

(28.) Six of the Spherical type of Rude Implements from Shetland. (See Proceedings, vol. viii. p. 65.) They vary from  $5\frac{1}{2}$  to 3 inches in diameter, and are very rudely formed. Three of them are represented in the accompanying woodcut.



Spherical type of rude Implements of Sandstone from Shetland.

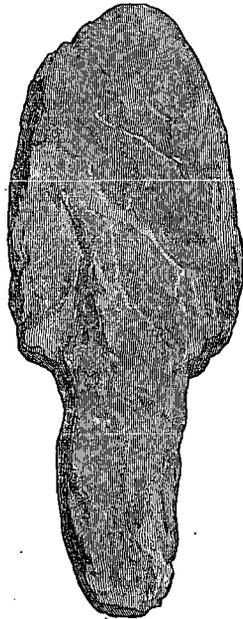
(29.) Three rude Sandstone Implements, of unique forms, from Shetland. They were sent to Dr Mitchell at different times by the Rev. James Russell, Corresponding Member of the Society. The first, represented



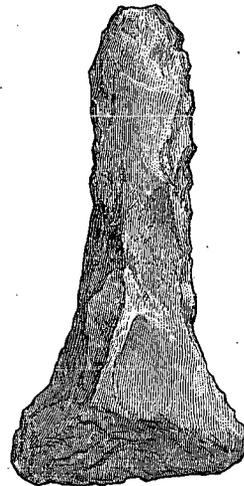
No. 1.—Curved Implement of Sandstone.

in the accompanying woodcut, is of a curved form, not flattened like the other two, but more or less cylindrical, and tapering to both ends.

It measures  $6\frac{1}{2}$  inches in length,  $2\frac{1}{2}$  in greatest width, and 2 inches in greatest thickness. The second (No. 2 of the accompanying woodcuts) is a spade-like implement,  $12\frac{1}{2}$  inches long,  $5\frac{1}{2}$  inches wide, and about 1 inch in greatest thickness. The handle measures 5 inches in length and  $2\frac{1}{2}$  in width. The form of the third is shown in No. 3 of the accompanying woodcuts. It measures  $7\frac{1}{2}$  inches in length. The wider part is  $3\frac{1}{2}$  inches broad, and at the narrow end the width is  $1\frac{1}{2}$  inches. It nowhere exceeds a thickness of  $1\frac{1}{4}$  inches.



No. 2.—Spade-like Implement of Sandstone from Shetland.

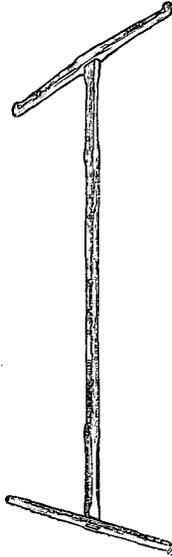


No. 3.—Implement of Sandstone from Shetland.

(30.) Four of the smaller type of Oblong Rude Implements, from Shetland. No. 1 is of the ordinary type of oblong implement, tapering to both ends. (See Proceedings, vol. vii. p. 126.) It measures  $8\frac{3}{4}$  inches in length,  $2\frac{3}{4}$  inches in width, and 2 inches in thickness. Nos. 2, 3, and 4

are of the type of implement described as flattened and wider at the one end than at the other. They are respectively 7,  $6\frac{1}{2}$ , and 6 inches in length.

(31.) Hand-Reel, found in use at Corpach, in Kilmallie, in 1866. A better made specimen of the hand-reel Dr Mitchell got from Dr Grierson of



Hand-Reel.

Thornhill, in 1865. Dr Grierson told Dr Mitchell that when it was in use in that part of Scotland, the old women, as they wound the yarn on it, were in the habit of repeating these words :—

“ Thu’s yin,  
 Thu’s no yin,  
 An’ thu’s yin a’ oot.  
 Thu’s twa,  
 Thu’s no twa,  
 And thu’s twa a’ oot.”

And so on, as each strand of the cut was completed on the reel. Others,

according to Dr Grierson, repeated words which sounded something like what follows :—

“ Corny MacCrib,  
Caffy MacCrib,  
Gilmic—thu’s yin.  
Corny MacCrib,  
Caffy MacCrib,  
Gilmic—thu’s twa.”

And so on till the proper number was reached. The yarn, Dr Grierson informed Dr Mitchell, is wound off the hand-reel on to what are called winnles or windle-blades, consisting of two pieces of wood fastened together in the form of a St Andrew’s Cross.

(32.) Oblong Stone Basin, from Walls, in Shetland, sent to Dr Mitchell by the Rev. James Russell. Its length is 19 inches, its width 12 inches, and its thickness 3 inches. The size of the hollow is 14 inches in length, 8 inches in width, and  $2\frac{1}{2}$  inches in depth.

(33.) Two Stones used for heating water, both from Shetland. One of them is from the Walls district. No record has been kept of the district from which the other comes. They were both in use within the last ten or twelve years. One of them is 11 inches in length, and the other 6 inches. They both resemble in form the rude Shetland implements described in the Proceedings, vol. vii. p. 126, and appear to be fragments of such implements.

(34.) Two Spades from Shetland. The one is 4 feet 2 inches in length, the handle being 3 feet 6 inches long, and with a foot bar near the iron part. The other, which is used for cutting peats, is 4 feet 4 inches long, and the iron part, which is longer and narrower than that of the ordinary spade, is furnished with a wing or blade 7 inches long, attached to the side, at right angles, for cutting the side of the peat as the spade is pushed in below it.

(35.) Ears of Corn, unthreshed, and threshed by the feet of women, from Nedd, in Sutherlandshire. Two young women were seen at Nedd threshing corn in this way on the 7th of September 1866. They gave their feet a peculiar twist, which very effectually detached the grain.

(36.) Meal-büdie, or Meal-bag, made of straw, from Dunrossness, in Shetland. The straw *fetil*, or band, for passing round the shoulders in carry-

ing it, can be lengthened or shortened in a very simple way. It is attached to the büdie at the one end, while the other passes through a loop or lug on the büdie, and then through a loop in itself. The büdie is about 20 inches wide and 15 inches deep.

(37.) Two Kasies or Straw Panniers, from Dunrossness, in Shetland. They are beehive in shape, about 20 inches across at the mouth, and 15 inches deep, and are used for carrying peats, corn, manure, fish, &c. They are fastened to the saddle of the horse on either side, but they are also frequently used as creels, and carried on the backs of the people.

(38.) A Pair of Hapricks or small Kasies, from Dunrossness, in Shetland. They are united by a band or loop, which is laid over the horse's back, and are chiefly used for carrying manure. They are of a beehive shape, and are 17 inches across the mouth, and 12 inches deep.

(39.) Flakki or Mat, from Dunrossness, in Shetland. It is made of straw, and is placed on the horse's back under the wooden saddle. It is 26 inches by 27 inches in size. The under surface is covered with a pad of unplaited straw.

(40.) Klibber or wooden Pack-Saddle, with belly-girding attached, from Dunrossness, in Shetland.

(41.) Two Masies or Nets of Simmons (twisted ropes of floss, a species of rush), used for carrying hay, peats, &c., either on the backs of horses or of people, from Dunrossness, in Shetland.

(42.) A Halter for a Horse, made of wood and rope, from Dunrossness, in Shetland.

(43.) Waist-band Tape, woven in a primitive Loom, which Dr Mitchell saw at Balmaclellan, New Galloway, in 1867. The Loom is understood to be now in the possession of the Rev. George Murray of Balmaclellan.

The following Communications were read :—