impressions, especially to produce false-relief patterns, were extensively employed on food vessels of both bowl and vase form.<sup>21</sup>

#### Acknowledgements

The writer wishes to record his thanks to Mr. J. S. Rimmer, Director of Warrington Museum, and Mr. C. V. Smith, Director of Bolton Museum, for study facilities and permission to publish.

<sup>21</sup> Abercromby, nos. 223-413; Clark, P.P.S., I (1935), 83-92, fig. 10; Young, Proc. Soc. Ant. Scot., LXXXV (1950-1), 38-50.

## A DISCOIDAL POLISHED FLINT KNIFE FROM WHITWELL

By M. J. DOLBY

N October 1964, during potato-picking operations, a discoidal polished flint knife of triangular form (Clark's type 2)<sup>1</sup> was found on the surface of field 5356 in Whitwell parish (SK 53547765) by Mr A. Webster of Whitwell (Fig. 8).





Fig. 8. Discoidal polished flint knife from Whitwell (1/1).

1 J. G. D. Clark, "Discoidal Polished Flint Knives — Their Typology and Distribution", P.P.S.E.A., VI (1928-9), 40-54.

The find was made on level clay soil on permian limestone immediately to the east of Red Hill, a half-mile long ridge of sandy loam on limestone running approximately north to south and bisected transversely by the Chesterfield-

Worksop road.

Increasingly deep ploughing of field 5356 has disturbed the soil to a depth approaching 16 in., and, from the absence of plough damage to the knife, it seems likely that it was brought to the surface from around this depth during the previous autumn's ploughing. Systematic surface searching of the field by the writer has produced several waste flint flakes from the area of the find, and, from some 300 yds. to the south-west, on the eastern edge of the ridge, a small flint scraper of Neolithic-Bronze Age type.

The knife, which is of unpatinated speckled grey flint, is in the form of an isosceles triangle, with two ground and polished slightly curved edges of length 2.9 in., and the third edge, which is blunted by flaking and more curved than the other two edges, is 3.2 in. in length. The maximum thickness is 0.3 in. Polishing on both faces has removed sharp intersections of

flake scars.

Discoidal polished flint knives of all types are confined in distribution to the British Isles and are by no means common. Clark recorded 133 specimens, and divided them into 4 basic types, namely: 1—the circular and sub-circular variety; 2—the triangular; 3—the lozenge; 4—the rectangular.

The number of examples of each type is not given by Clark in his appended list, but Evans<sup>2</sup> describes examples of type 2 found at Kempston, Beds., Fimber, E. Yorks., the Thames at Windsor, and Lakenheath, Suffolk.

For Derbyshire, Clark records 8 discoidal flint knives, but this total includes only I of the 9 examples in the Bateman Collection in Sheffield City Museum. In view of the inadequate record, the writer has thought it necessary to append a list of published Derbyshire discoidal knives, indicating the type, the published references, and the present location, where known.

In addition, Mr. T. G. Manby informs me that, at Arbor Low Farm, there is an unpublished specimen of type 4 found in the vicinity of Arbor Low.

From the list, it may be seen that the Whitwell discoidal knife is the only specimen of Clark's type 2 so far recorded from Derbyshire, although the two Hunter Mere knives have a slight tendency in shape towards triangulation. Secondly, the Whitwell specimen is the only discoidal knife so far recorded from the eastern, permian limestone area of Derbyshire, an area which, admittedly, has seen far less intensive fieldwork than the area around Youlgreave, whence most of the recorded specimens come.

Clark, basing his argument on the distribution pattern of polished flint discoidal knives in the British Isles, and the association of only one discoidal knife with beaker sherds, forwarded the view that the tool type is associated

very definitely with the Beaker period.

For the Peak District, the only association given by Clark is the finding of a discoidal knife of type I (no. 3 in the list) with a flint knife dagger in the henge monument at Arbor Low. This is held to be untenable by the fact

<sup>&</sup>lt;sup>2</sup> Sir John Evans, Ancient Stone Implements of Great Britain, 2nd ed., 1897, 340-1.

#### DISCOIDAL POLISHED FLINT KNIVES FROM DERBYSHIRE

	Provenance	Published References	Present Location	Type
*I.	Newhaven	Evans, 343, fig. 258	Lucas Collection, British Museum	ı.
2.	Newhaven House Farm	Howarth, <sup>3</sup> 37	Bateman Collection, Sheffield City Museum, I93.137	I.
*3.	Arbor Low	Evans, 172. Archaeologia, LVIII (1903), 485, fig. 4 B. M. Stone Age Guide, (3rd ed.), fig. 103	Lucas Collection	I.
*4.	Arbor Low	Evans, 343.  Archaeologia, LVIII (1903), 485, fig. 5	Lucas Collection	I.
<b>*</b> 5·	Minninglow	Evans, 343	Evans Collection, Ashmolean, Oxford	Ι.
<b>*</b> 6.	Mam Tor, Castleton	Evans, 343. Pennington, Barrows and Bone-caves of Derbyshire, 62	Castleton Museum (1897)	Ι.
7.	Greenseats Plantation, Middleton	Howarth, 38	S.C.M. J93.139	I.
8.	Middleton by Youl- greave	Howarth, 38	S.C.M. J93.141	I.
9.	Hunter Mere, Ashford	Howarth, 40	S.C.M. J93.156	ı'
10.	Hunter Mere, Ashford	Howarth, 41	S.C.M. J93.158	I.
II.	Pikehall	Howarth, 38	S.C.M. J93.140	I.
12.	Newhaven	Howarth, 38	S.C.M. J93.148	3.
<b>*</b> 13.	Lean Low	Howarth, 25	Bateman Collection S.C.M. J93.86	4.
14.	Calling Low, Middle- ton	Howarth, 26	Bateman Collection S.C.M. J93.88	4.
*15.	"Derbyshire"		Sturge Collection B.M.	
<b>*</b> 16.	"Derbyshire"		Sturge Collection B.M.	

Those examples marked thus \* appear in Clark's list.

that the discoidal knife appears to have been found in 1867, and the flint knife dagger some two years earlier, in June 1865, whilst no records appear to have been kept of the circumstances of discovery of either of these implements.<sup>4</sup> Apart from the two Arbor Low knives of type I, all the other Derbyshire discoidal knives appear to be surface finds, which makes them of very little use for dating purposes.

E. Howarth, Catalogue of Bateman Antiquities, Sheffield Museum, 1899.
 H. St. George Gray, "Excavations at Arbor Low 1901-2", Archaeologia, LVIII (1903), 461-98.

It might, however, be significant to observe that, while Peak District barrow interments of the Beaker period frequently contain associated flint implements, associated polished flint tools are extremely rare, the Elton Moor polished flint axe appearing to be the only recorded example. On the other hand, polished flint tools are frequently found in association with Secondary Neolithic pottery in Britain, and Piggott is inclined to include discoidal knives with the polished-edge knives in the light flake industries of the Secondary Neolithic period.

On this evidence, it seems probable that the Whitwell discoidal knife and the other Derbyshire discoidal knives should be assigned to the pre-beaker Secondary Neolithic peoples of the Peak District rather than the Beaker

period.

In conclusion, I should like to thank Mr. J. A. T. Walker, J.P., of Whitwell, the owner of the land on which the Whitwell knife was found, for kindly permitting me to publish the find, Mr. A. Webster, for bringing the find to my notice, Mr. G. D. Lewis of the Sheffield City Museum for his help with references and with regard to the knives in the Bateman Collection, and Mr. T. G. Manby of the Huddersfield Museum for his information on the unpublished knife from Arbor Low.

The Whitwell knife is now in the Sheffield City Museum.

T. Bateman, Vestiges of the Antiquities of Derbyshire, 1848, 53-4.
 S. Piggott, Neolithic Cultures of the British Isles, 1954, 285.

# A MILLSTONE MAKER'S SMITHY ON GARDOM'S EDGE, BASLOW<sup>1</sup>

### By JEFFREY RADLEY

The problem

A SURVEY of millstones in the southern Pennines<sup>2</sup> led to the discovery of over 1,000 millstones in various stages of construction and destruction. Two types were discovered: the normal cylindrical type, although undated, appears from secondary evidence to belong to the 19th century; the other type with a mushroom-shaped top, rounded edges and a flat base has not been recorded before. Four hundred have been located and many occur on Gardom's Edge. This type apparently antedates the cylindrical type, so it was decided to excavate to try to discover dating evidence.

at Easter 1964.

2 J. Radley, "Peak Millstones and Hallamshire Grindstones", Trans. Newcomen Soc., 1965 (forth-

coming).

<sup>1</sup> This report was made possible by the hard work of Mr. F. Hepworth and Miss A. Penniall. The writer wishes to record his debt to them; also to Mrs. D. McPherson for typing the MS.; and to Mr. H. E. G. Read, Agent to the Trustees of the Chatsworth Settlement, for permission to excavate at Easter 1964.