Brickwork-plan field-systems on the Sherwood Sandstone, Nottinghamshire: archive deposition with the Archaeology Data Service

This archive comprises the NMP cropmark plots and our analysis, together with the artefact scatters which are organized into selected groups below. The cropmarks and artefact scatters are set within the OS grid, with a digitized plot of the rivers added for reference to the various published plans. It is assumed that the reader will have access to the published reports (below), which outline the methodology and results.

- 1) Fieldwalking survey of the lithics and medieval pottery published in *Transactions of the Thoroton Society* (2007) vol 111, 15-32.
- 2) Fieldwalking survey of the Romano-British artefacts published in *Transactions of the Thoroton Society* (2008) vol 112, 15-110.

Files are given in ESRI Arcview 3.2 format in the following folders/directories:

areas_fieldwalked artefacts_notRBpot artefacts_RB_pot cropmarks_analysis cropmarks_nmp cropmarks_other landscape smr data 2002

Cropmark plots

Folder	.shp file	purpose/description
Cropmarks_nmp	sk79sw-r	
	sk78sw-r	Raster images of rectified NMP
	sk78nw-r	1:10,000 map sheets of
	sk77sw-r	cropmarks © Crown copyright,
	sk77nw-r	National Monuments Record.
	sk69sw-r	
	sk69se-r	
	sk68sw-r	
	sk68sw+nwpart*	
	sk68se-r	
	sk68nw-r	* these cropmarks inexplicably
sk68ne-rnot on scanned insk67sw-ras digitized linessk67se-ras digitized linessk67nw-rsk67ne-rsk66nw-rsk66ne-rsk59se-rsk59se-rsk58se-rsk58ne-rsk57se-rsk57ne-rsk56nw-rsk56nw-rsk56nw-rsk56nw-rsk56nw-rsk50ne	not on scanned image, so added	
	sk67nw-r	
	sk67ne-r	
	sk66nw-r	
	sk66ne-r	
	sk59se-r	
	sk58se-r	
	sk58ne-r	
	sk57se-r	
	sk57ne-r	
	sk56nw-r	
	sk56ne-r	
	Cropmark_area	Identifies the rectangle
		containing cropmarks within the
cropmarks_other	tilnnorth_cropmark	cropmarks + soilmarks not
		plotted by NMP

Folder	.shp file	purpose
cropmark_analysis	landscape_types	identifies type of field-system and labels for
(for codes see		landscape blocks
Appendix A)		
	enclosure_groups_plan	identifies overall plan of enclosure groups
	subgroups_enclosures_plan	identifies individual plans of subgroups within
		enclosure groups
	enclosures_within_subgroups_classification	identifies individual enclosures within subgroups
	enclosure_groups_classification	identifies enclosure groups classification (TTSN
		2008, table 2)
	complexity_of_cropmarks	identifies enclosure groups by classification and
		'complexity', the number of units within the group
		and whether they appear multi-period
	enclosure3g+3i	Locates cropmark types 3g+3h
	enclosures_3h	locates cropmark type 3h
	enclosure_3f_nucleated	locates cropmark type 3f_nucleated
	enclosure_2	locates cropmark types 3g+3h
	enclosures_3c+3e	locates cropmark types 3c+3e
	enclosure_3a+3b+3k	locates cropmark types 3a+3b+3k
	enclosure_1b	locates cropmark type 1b
	cropmark_circles1c_outside_enclosures	locates cropmark type 1c outside of enclosure groups
	cropmark_circles1c_within_enclosures	locates cropmark type 1c within enclosure groups
	cropmarks_out-of-	identifies cropmarks that run at an angle to the
	alignment_with_fieldsystems	presumed Romano-British field-system
areas_fieldwalked	areas_walked+topography	identifies areas walked
(for codes see		
Appendix A)		
· · ·	double_walked_areas	identifies areas walked twice (analysis of second
		walking not included in presented statistics)
	east_carr_areas_fieldwalked	identifies areas walked as part of Tarmac East Carr
		project, results used
landscape	bfs_rivers_region	provides overall context from plan of rivers
	1km_OSgrid	lines of OS grid at 1km intervals

Artefacts

Folder	.shp file	purpose/description
artefacts_notRBpot	areas_walked_with_flint	outline of fields walked where flint
(for codes see		artefacts were recovered
Appendix A)		
	bfs_brick+tile	Romano-British brick and tile (includes
		all items that are not obviously post-
		medieval in date)
	bfs_firecrackedpebble	all heat-affected pebbles
	bfs_flint	all struck prehistoric lithics
	(for codes see Appendix F)	(TTSN 2007)
	bfs_metal	all possible and probable Romano-
	1.0	British metalwork finds
	bfs_querns	all probable quern fragments
	medpot_(fields_for_analysis)	all medieval pot findspots
	medpot_by_date	medieval pot (TTSN 2007)
	medpot_late12th-e13th	medieval pot that can be dated to the late
		12th-early 13th centuries
	medpot_in_areawalked	outline of fields walked which include
		medieval pottery
	medpot_mid13-mid14th	medieval pot that can be dated to the
	1	mid13th-mid 14th centuries
	medpot_saxon+10-12types	medieval pot that can be dated to the
1 / 2002		saxon period, or 10th-12th centuries
smr_data_2002	RB_smr_data	All Romano-British entries on the
(for codes see		Nottinghamshire County Council
Appendix A)		Sites&Monuments Record (data
		collected 2002 and included here with
	unabiotonia anun data	permission) All prehistoric entries on the
	prehistoric_smr_data	Nottinghamshire County Council
		Sites&Monuments Record (data
		collected 2002 and included here with
		permission)
	medieval+post-med finds smr data	All medieval and post-medieval artefact
		entries (does not include buildings and
		structures) on the Nottinghamshire
		County Council Sites& Monuments
		Record (data collected 2002 and
		included here with permission)
		meraded here with permission)

Folder	.shp file	purpose/description
artefacts_RB_pot (for codes relating to RB pot see Appendix RB)	all_rbpot_(excl_2nd)	all Romano-British potsherds (excluding those from fields walked twice)
	date_group_1 (for codes see Appendix A and composition of groups 1-9 TTSN 2008, Appendix 4)	sherds belonging to the late Iron Age
	date_group_2	sherds belonging to first century 'native' forms which continue into the 2nd century
	date_group_3	late 1st-early 2nd century sherds
	date_group_4	mid-late 2nd century Antonine types
	date_group_5	sherds belonging predominantly to the later 2nd- 3rd centuries
	date_group_6	mid 3rd – early 4th century sherds
	date_group_7	late 3rd-4th century sherds
	date_group_8	sherds belonging broadly to the 2nd-4th centuries AD
	date_group_9	non diagnostic Romano-British sherds
	pot_cluster_diversity_(excl_2nd) (sort by 'values field' diversity) (for codes see Appendix A)	group 1= diversity score of 1 including coarse kitchenwares only, locally made group 2 = diversity scores of 2-6 including coarse kitchenwares with some tablewares and some traded sherds group 3= diversity scores of 7 or more including coarse kitchenwares and tablewares with some imported sherds (see Appendix 5 of TTSN 2008)
	pot_cluster_longevity_(excl_2nd) (sort by 'values field' longevity) (for codes see Appendix A)	longevity of pot clusters 0 = no Romano-British sherds 1 = pottery of dategroups 8-9, ill-dated 2 = sherds of one date group only 3 = sherds of two date groups 4 = sherds of three date groups etc.
	areas_walked_withno_RB_pot	areas fieldwalked which produced no Romano- British pot

Metadata for folders/files

Folder Cropmarks_nmp

1. Filenames all files called sk***-r 2. Computer software used Arcview 3.2 shapefile 3. Date of data capture/purchase 17/09/01 to 10/10/01 4. Who created the file Created by PCW under direction of KC 5. Data source Copies of the NMP plots were scanned at 600dpi, which were cleaned by removing any introduced marks in Paintshop, then geo-referenced in Erdas imagine 8.4 with the Raster Image then converted into Shapefile in Arcview 3.2. 6. Scale and resolution of data capture Original cropmark plots were 1:10,000; scanned at 600 dpi 7. Scale and resolution of data storage 1:10.000 8. Purpose of data set creation Purpose to provide vector cropmark plots of the BFS area 9. *Method of original data capture* Deegan, A. 1999, The Nottinghamshire Mapping Project, RCHM. Section 1.6.1. 10. Copyright National Mapping Programme, C Crown Copyright, National Monuments Record 1. Filename SK68sw+NW part 2. Computer software used Arcview 3.2 shapefile 3. Date of data capture/purchase 2005 4. Who created the file DG 5. Data source Copies of missing parts of the NMP plots were scanned, then the cropmarks copied in ACad as polylines, and imported into Arcview 3.2, and finally converted into Shapefile. 6. Scale and resolution of data capture Original cropmark plots were 1:10,000; scanned at 300 dpi

7. Scale and resolution of data storage

1:10,000

8. Purpose of data set creation

Purpose to provide complete cropmark plots using NMP plotting

9. *Method of original data capture*

Deegan 1999, 1.6.1

10. Copyright

National Mapping Programme, © Crown Copyright, National Monuments Record

Folder cropmarks_other

1. Filename Tilnnorth cropmark 2. Computer software used Erdas imagine, Arcview 3.2 3. Date of data capture/purchase 2002 4. Who created the file KC scanned aerial photographs + acetate overlays produced by DG 5. Data source Verticals: RAF 542/37 F21 frame 208; OS72/72048 frame 239; Oblique: SK7084/1,6; SK7184/6 6. Scale and resolution of data capture Variable 7. Scale and resolution of data storage 1:50008. Purpose of data set creation AP plot for fieldwork project 9. Method of original data capture Scanned image geo-referenced in Erdas imagine 8.4 with the Raster Image then converted into Shapefile in Arcview 3.2.

Folder cropmark analysis (for field codes see Appendix A) 1. Filenames all point files (bar first three and last file in listing in table above) 2. Computer software used Access 2000 + Arcview 3.2 shapefile 3. Date of data capture/purchase 2001-2 4. Who created the file **RSL** 5. Data source BFSmorphology.mdb 6. Scale and resolution of data capture 1:10.000 7. Scale and resolution of data storage 1:10,000 8. Purpose of data set creation Record of morphological traits of landscape blocks, cropmark enclosure groups and subgroups, and relationships between those cropmarks in study area 9. *Method of original data capture* RSL created BFSmorphology database structure. CW input morphological data under supervision of RSL.

Folder cropmark_analysis (for field codes see Appendix A)

Filename
 landscape_types
 Computer software used
 Arcview 3.2 shapefile
 Date of data capture/purchase

2001-2
4. Who created the file
CW under supervision of RSL
5. Data source
nmp-cropmark
6. Scale and resolution of data capture
1:10,000
7. Scale and resolution of data storage
1:10,000
8. Purpose of data set creation
Define landscape blocks as top tier in hierarchical classification
9. Method of original data capture
Drawn polygons in Arcview 3.2 identifying blocks by eye using gaps and/or changes in alignment of cropmarks.

Folder cropmark_analysis (for field codes see Appendix A)

1. Filename enclosures groups plan subgroups enclosures plan 2. Computer software used Arcview 3.2 shapefile 3. Date of data capture/purchase 2001-2 4. Who created the file CW under supervision of RSL 5. Data source nmp-cropmark 6. Scale and resolution of data capture 1:10,000 7. Scale and resolution of data storage 1:10.000 8. Purpose of data set creation Identifies enclosures used to classify subgroups and enclosure groups 9. Method of original data capture Drawn polygons in Arcview 3.2.

Folder cropmark_analysis (for field codes see Appendix A)

Filename
 cropmarks_out-of-alignment_with_fieldsystems
 Computer software used
 Arcview 3.2 shapefile
 Date of data capture/purchase
 2001-2, 2006
 Who created the file
 GM under supervision of RSL
 Additions by DG
 Data source
 nmp-cropmark
 Scale and resolution of data capture
 1:10,000

7. Scale and resolution of data storage
1:10,000
8. Purpose of data set creation
Identifies those cropmarks that appear to be on a different alignment, or cut across, the coherent field-systems
9. Method of original data capture
Drawn in Arcview 3.2 over cropmarks in other files.

Folder areas_fieldwalked (for field codes see Appendix A)

Filename
areas_walk+topography
double_walked_areas
 Computer software used
Arcview 3.2 shapefile

 Date of data capture/purchase
 1991-2001
 Who created the file
JB, SM, GK
 Data source
From plans created during fieldwork using field outline scaled from 1:2500 OS maps – most by
DG, but also other field supervisors. Outline of area walked digitized from original field plots
(JB), geo-referenced using Aerial and imported into MapInfo (SM + GK). Later imported into
Arcview 3.2 (KC).

6. Scale and resolution of data capture

1:1000

7. Scale and resolution of data storage

1:1000

8. Purpose of data set creation

Location of individual artefacts/scatters/topgraphy to OS co-ordinates

9. Method of original data capture

Fieldwork

1. Filename

east carr areas fieldwalked 2. Computer software used ACad, then converted to Shapefile in Arcview 3.2 3. *Date of data capture/purchase* 1995 4. Who created the file AK+GK+DG 5. Data source .dxf in ACad 6. Scale and resolution of data capture 1:1000 7. Scale and resolution of data storage 1:1000 8. Purpose of data set creation Location of individual artefacts/scatters/topgraphy to OS co-ordinates 9. *Method of original data capture* Field EDM survey tied to field boundaries on OS 1:2500

Folder landscape

1. Filename bfs rivers region 2. Computer software used Arcview 3.2 shapefile 3. Date of data capture/purchase Unknown 4. Who created the file SM + others5. Data source 1:25,000 OS mapping 6. Scale and resolution of data capture 1:25,000 7. Scale and resolution of data storage 1:25,000 8. Purpose of data set creation Landscape context for cropmarks 9. Method of original data capture Digitized and imported into MapInfo, then into Arcview 3.2

1. Filename 1km OSgrid 2. Computer software used Arcview 3.2 shapefile 3. Date of data capture/purchase Unknown 4. Who created the file SM + others5. Data source 1:25,000 OS mapping 6. Scale and resolution of data capture 1:25,000 7. Scale and resolution of data storage 1:25,000 8. Purpose of data set creation 1km OS grid-lines to aid location 9. *Method of original data capture* Unknown

Folder artefacts_notRB_pot (for field codes see Appendix A)

Filenames

 Filenames
 all point files (*i.e.* all bar first listed)
 Computer software used

 Aerial+MapInfo+Access 2000 + Arcview 3.2 shapefile

 Date of data capture/purchase

 1991-2001

 Who created the file

 JB, SM, GK, KC

 Data source

Artefacts located from plans created during fieldwork using field outline scaled from 1:2500 OS maps - most by DG, but also other field supervisors. Outline of area walked digitized from original field plots (JB), geo-referenced using Aerial and imported into MapInfo (SM + GK). Later imported into Arcview 3.2 (KC). Artefacts sorted into categories by JB+DG, then catalogued at various levels of detail in BFSfinaldb1 a.dbf Romano-British pot by RSL, MW - see folder artefacts_RB_pot Brick+tile by JB, DG, RSL, RJF Medieval pot by JB, RSL, VN Lithics by JB, DG Querns by JB, LW Metalwork by JB, JC Firecracked pebbles inspected by field supervisor and located only, not kept for further recording. 6. Scale and resolution of data capture 1:1000 7. Scale and resolution of data storage 1:1000 8. Purpose of data set creation Identification of scatters of materials by type/date, and location of individual artefacts to OS co-ordinates. 9. Method of original data capture Fieldwork

areas walked with flint 2. Computer software used Arcview 3.2 shapefile 3. Date of data capture/purchase 2007 4. Who created the file DG 5. Data source By identifying all those files in 'areas walked+topography' that also included 'bfs flint'. Areas without flint were removed. 6. Scale and resolution of data capture 1:10,000 7. Scale and resolution of data storage 1:10,000 8. Purpose of data set creation Location of flints within Areas fieldwalked

9. Method of original data capture

Fieldwork

1. Filenames

Folder artefacts_RB_pot

Filenames

 Filenames
 Point files
 Computer software used

 Aerial+MapInfo+Access 2000 + Arcview 3.2 shapefile
 Date of data capture/purchase

1991-2001*Who created the file*RSL

5. Data source

Romano-British pottery located from plans created during fieldwork using field outline scaled from 1:2500 OS maps – most by DG, but also other field supervisors. Outline of area walked digitized from original field plots (JB), geo-referenced using Aerial and imported into MapInfo (SM + GK). Later imported into Arcview 3.2 (KC).

Artefacts sorted into categories by JB+DG, then catalogued by RSL + MW on BFSfinaldb1_a .dbf and Notts TS 01.dbf

6. Scale and resolution of data capture

1:1000

7. Scale and resolution of data storage

1:1000

8. Purpose of data set creation

Identification of scatters of RB pot by type/date, and location of individual artefacts to OS coordinates.

9. Method of original data capture Fieldwork

10. Explanation of codes used See Appendix 1 below

Folder smr_data_2002 (for field codes see Appendix A)

1. Filenames all point files 2. Computer software used Access 2000 + Arcview 3.2 shapefile 3. Date of data capture/purchase 2002 4. Who created the file Nottinghamshire County Council 2002 5. Data source original from Nottinghamshire County Council NCC SMRa.dbf material sorted into categories then imported into Arcview 3.2 shape files by KC 6. Scale and resolution of data capture 1:10,000 7. Scale and resolution of data storage 1:10.000 8. Purpose of data set creation Identification of findspots of various artefacts/structures/excavations by type/date 9. Method of original data capture Various 10. Copyright Used with permission from Nottinghamshire County Council

APPENDIX A: FIELD HEADINGS IN TABLES

If field heading is shortened in ArcView table then missing part of label is in [] below.

Area/findc[ode]	Area number allocated to each block of ground
A real milde[ode]	fieldwalked, which are used as a shorthand to the
	Parish + OS 1km gridsquare + OS Field number
	(TTSN 2007, 17). Findcodes are not unique unless
	used in conjunction with the Area number.
Area_topog[raphy]	F = flattish
	H = hillocks
	S = sloping
Completene	'Completeness' (of cropmarks)
	scores of $0 =$ linear feature or circle
	1 = apparently complete enclosure (group), no
	obvious gaps
	2 = enclosure (group) may be complete, but some
	gaps
	3 = enclosure (group) almost certainly fragmentary
Complexity[_score]	The cropmark enclosures were classified by their
	number and form/relationships of their groupings,
	and the degree of 'complexity' was scored from 1-5
	(TTSN 2008, table 2).
Cropmark a[lignments]	Orientation of main boundaries
Cropmark f[orm]	Sinuous or straight
Cropmark [[abel]	For the cropmarks and artefacts discussed here, each
1 _ L J	is referenced first by the parish name (as given by
	the Ordnance Survey), then a division of the
	cropmark landscape using a letter, a number, and
	another letter. The landscape was divided into the
	interfluves between rivers, named A-F, then each
	interfluve then divided into landscape blocks and
	numbered. Within each <i>landscape block</i> (see
	definition below) each cropmark enclosure-group
	was lettered; hence, Hodsock A11B is in the parish
	of Hodsock, landscape A, cropmark block 11,
	enclosure B.
Cropmark_m[orphology]	Morphological groups of enclosure cropmarks as
	defined in TTSN 2008, table 2.
Cropmark+P[ot_group]	The pottery data was grouped in sherd clusters and
	related to the landscape, cropmark block and
	enclosure-group it lay near (TTSN 2008, 31). For
	example, the pottery collected from Elkesley B33D
	(Fig. 29), was divided in archive into three pot-
	groups, two of which lay clustered over different
	parts of the <i>complex</i> enclosure-group, with the third
	off/just outside of the eastern <i>single</i> enclosure: these
	are given the labels (pot1), (pot2) and (pot3) in
	Table 5. Where the pot distribution coincided with
	the enclosure-group, or there is only one
	distribution, these pot labels have been dispensed
	with for this report in the interests of ease of use.

	Hence, it must be appreciated that the distribution of
	a pot group may not wholly match the limits of the
	cropmark enclosure-group.
Cropmark s[ubgroup enclosure]	Within some enclosure groups, contiguous
	enclosures and those of similar size seem to be
	related – and is most obviously recognized where
	smaller enclosures cluster around/besides larger
	ones. These have been picked out as potential
	subgroups, but no analysis has been conducted.
Cropmark t[ype]	Cropmark denoting buried pit or ditch.
Date_g1-9	Typological date groups used for dating purposes –
	composition detailed in TTSN 2008, Appendix 4,
	107-9.
Date	SMR record – period specific
Date2	
Diversity	Diversity score of RB pot = sum of
-	(R1+R2+R3+R4+R5+R6) TTSN 2008, Appendix 5
	Diversity Group $1 = \text{scores of } 1$
	Diversity Group $2 = \text{scores } 2-6$
	Diversity Group 3= scores 7-18
Stream_dis[tance]	Distance to nearest stream taken from 1:25,000 OS
	mapping
Easting	Easting of findspot within OS Grid SK
Enclosure_t[opography]	- = not recorded
	B = base of slope
	F = flattish
	H= hillock
	P=scarp
	PS = scarp + slope
	R = ridge
	RS = ridge+slope
	U= undulating
	US = undulating + slope
	V = valley
Est_diamet[er]	Estimated maxiumum diameter of quern
	circumference
Event	SMR - form of data
Field_cond[ition]	P = partly weathered
	U = unweathered
	V =very well weathered
	W = well weathered
Field stat[e]	C = cultivated
	D = drilled
	H = harrowed
	P = ploughed into ridges
	R = ridged (as for potatoes etc)
	S = sand blown into hollows
	W = weathered
Form	B = brick,
(for brick+tile)	B/T = brick or tile,
	C = clay,

	FC= fired clay,
	IMB = imbrex tile,
	O= other/not diagnostic, T = tile,
	,
	TEG = tegula,
	TUB = tubuli?/ tile with linear grooves
Geology	As mapped by the British Geological Survey, 1967,
	Sheet 101, East Retford, 1:63360
	A = Alluvium
	GSG = Fluvioglacial sands & gravels
	LMS = Zechstein, Edlington Formation Sandstone
	MM = Mercia Mudstone
	SBC = Sandy boulder clay
	SS = Sherwood Sandstone
	T= Terrace Sands & Gravels
Height_OD	To nearest 5m from 1:25,000 OS mapping
Id	From Access database – not used
Internal_f[eatures]	Internal cropmarks denoting features within
	enclosures
Landscape_[label]	For the cropmarks and artefacts discussed here, each
	is referenced first by the parish name (as given by
	the Ordnance Survey), then a division of the
	cropmark landscape using a letter, a number, and
	another letter. The landscape was divided into the
	interfluves between rivers, named A-F, as illustrated
	in Figs 2,5,6,7 in TTSN 2008. Each interfluve was
	then divided into <i>landscape blocks</i> (numbered)
	where a block is the field-system, or a group of
	cropmarks, which conjoin or are on the same
	alignment. Where there are large areas covered by
	field-system cropmarks the 'gaps' between the
	cropmarks, or changes of alignment, were used to
	divide the landscape blocks (<i>e.g.</i> in dividing
	Babworth B3, B5 and B32, see Fig. 19 in TTSN
	2008).
Late 12-e1[3th (id VN)]	Medieval fabric types dating from the 12th-early
	13th AD identified by V Nailor;
	Splashed = Splashed Ware;
	NOTT DEV = Nottingham Developed;
	X = probable sherd (TTSN 2007, 25)
Lithology	Quern stone type assessed macroscopically by Liz
Entitotogy	Wright
Longevity	Longevity = scoring for the number of RB date
Longevity	groups represented within each fieldwalked Area.
	1 = pottery of groups 8-9, ill-dated
	2 = pottery of one date group only
	3 = pottery of two date groups
	4 = pottery of three date groups etc
Material	BRCK = Brick
(for brick+tile)	FC= fired clay
Material	ag= silver;

(for metalwork)	ca= copper alloy;
	en= enamel;
	pb = lead
Mid13-14th[(id VN)]	Medieval fabric types dating to the mid13-mid14th
	AD identified by V Nailor;
	NLBGG= Nottingham Light-Bodied Green-Glazed;
	X = probable sherd (TTSN 2007, 25)
NGRE X coo[rd]	Full OS easting co-ordinate
NGRN Y coo[rd]	Full OS northing co-ordinate
No double [ditches]	Number of double ditches within landscape block
No_units_w[ithin_cropmark_group]	Number of enclosures within cropmark group
Northing	Northing of findspot within OS Grid SK
OS_Field_[No]	Field parcel number recorded on 1:2500 OS maps
OS_grid_re[f]	1km square within SK
Owner	Identified by number only
Period	SMR record - general period
Period2	
Period_(id[_VN)]	Period identified from fabric (by V Nailor)
	MED= Medieval,
	LMD= late Medieval,
	EPM = early Post-Med
Pot_type_([id VN)]	Pot type (identified by Vicki Nailor)
Quern_widt[h]	Actual size of fragment recovered, assessed with
Quern_brea[dth]	outside edge towards measurer
Quern _heig[ht]	Actual size of fragment recovered, assessed as if
	grinding surface horizontal
Quern _type	Probable form of quern from which fragment is
	derived
R1 to R6	Diversity scores as TTSN 2008, Appendix 5
	R1 = locally produced coarse kitchen wares
	produced
	R2 = locally produced fine table wares
	R3 = traded coarse wares
	R4 = traded fine wares
	R5 = traded specialist wares
	R6 = imported wares
Record_t1 to Record_t3	Site/record type $1-3 = \text{context or situation } e.g.$
	hoard, finds scatter, enclosure
SAM	Scheduled Ancient Monument number
SMR_No	Unique identifier in Nottinghamshire SMR (data
SMR_suffix	collected 2002)
Source_1-4	Information sources/cross references to record
	systems used to compile Notts SMR
Subsoil_ov[er_enclosure]	S = subsoil present
Subsoil_in[_fieldwalked_area]	B = black/darker soil/subsoil patches
	N = non-local? stone
TTN_cropma[rk/layer]	Photos used to plot cropmarks - obliques SK7084/1,
	SK7084/6, SK7184/6 – verticals Sortie 542/37
	frame 208, Sortie OS/72048 frame 239.
X7 11 F 13	
Year_walke[d]	Expressed as financial years <i>i.e.</i> $89/9 = $ April 89- March 90

APPENDIX F: SHERWOOD SANDSTONE: FLINT ARCHIVE (prepared 1995-9)

In the catalogue, one artefact = 1 line

Raw Material, *i.e.* flint and chert types.

- A = grey/brown translucent flint, no mottles
- B = grey/brown translucent to slightly opaque flint, mottled
- C = white/light grey opaque flint with mottles, *i.e.* Wolds type flint
- D = yellow-brown opaque flint plus mottles ?Cheshire type

E = chert, fine grained

F = chert, medium grained, like fine sandpaper

G = chert, coarse grained, separate crystals can be observed

H = flint/chert type not specified

? = material unknown

S = stone

I = white-grey semi-opaque to translucent flint, ?Wolds type

P = pink flint

Q = quartz

L = limestone

Cortex + condition

Cortex

P = primary = 100-51% cortical

S = secondary = 50-1% cortical

T = tertiary = non-cortical

Classification defined by Bradley 1970, 344, but see Green 1974, 84 who emphasises that the raw material dictates some technological parameters.

Cortication (Shepherd 1972, 114-9)

H = heavy, *i.e.* flint type completely concealed

L = light, i.e. flint type can still be determined or the

cortication is speckled

2 = two phase, *i.e.* there are two phases of cortication

Burning

C = heavily calcined, *i.e.* flint white and cracked

B = slight cracking, *i.e.* flint retains colour, but shows cracking internally

D = possible deliberate heat treatment,*i.e.*retouch flake scars glassy; flake dorsal and ventral surface horny

Damage/Alteration

R = rolled/abraded

G = gloss = areas of gloss, usually spots, formed by wind or sand abrasion (*cf.*Shepherd 1972, 120-21), or glossy patina

M = mechanical damage, e.g. plough-shattering and damage by archaeologists

S = stained, *i.e.* whole object, not just cortex

Form

F = flake, *i.e.* struck flake exhibiting characteristics of conchoidal fracture

B = blade, *i.e.* breadth:length ratio <2:5

D = nodule

E = distal blade snapped segment

L = blake-like flake, *i.e.* narrow flake with parallel sides - mostly used for probable blade fragments

I = indeterminate blade or flake - always fragmentary

S = spall, *i.e.* flake under 10mm in length (but see Saville 1980, 18 where he suggests that they should be under 20mm in length - this would cut out more than half of most assemblages). Flakes under 10mm in length are not measured, and are not further classified.

P = chip, broken and unidentifiable piece

T = thinning flake, *i.e.* thin flake from implement thinned by flaking so that dorsal scars are from at least three directions *cf*. Newcomer 1971, 91 where these are described from hand-axe manufacture

R = core rejuvenation flake

C = core

K = chunk, *i.e.* irregular piece with flake and thermal scars, possibly from knapping. No observed platforms

N = natural fragment, *i.e.* thermal/bashed fragment.

A = axe/adze or bifacially worked implement

M = mesial segment

X = proximal blade snapped segment

G = chert fragment, probably natural but could be struck

Size

Only complete flakes and blades are measured.

L = length, as in Smith 1965, 90

B = breadth, as in Smith 1965, 90

Core type

AB = one platform, blade removals BF = two platforms, flake removals U = unclassifiable core, flake removals

Core has previous platforms (Saville 1981, 46)

Y = yesN = no

Core rejuvenation flakes

P = preparation flake - general description, not fitting into other categories - includes struck from core base

T = rejuvenation flake, tablet type

E = edge *i.e.* struck along core striking platform edge (*i.e.* triangular section)

O = rejuvenation flake which has removed part of a platform edge other than the one it was struck from

Retouch/wear position

D = distal

P = proximal

L = left-hand side (dorsal face uppermost, bulb at bottom)

R = right-hand side (dorsal face uppermost, bulb at bottom)

N = retouched from natural surface

U = uncertain

Retouched/wear surface

I = inverse (cf. Tixier 1980, fig 41 no 2)

B = bifacial (cf. Tixier 1980, fig 41 no 5)

S = utilised sporadic, *i.e.* Smith class B (1965, 93) R = utilised regular, *i.e.* Smith class A (1965, 93) W = worn-edge flake (Saville 1977, 4) G = silica gloss

Retouched tool form

Definitions as Healy 1980.

ERB = Edge-retouched blade

ERK = Knife flat edge-retouched type

EUB = Edge-used blade

FAB = Fabricator

FRG = Fragment

LEF = Arrowhead leaf-shape type (classified after Green, H.S. 1980)

LUP DBL PNT BLD WRN = Late Upper Palaeolithic double pointed blade, worn ends

MSC RET DST = Miscellaneous retouched, distal end

PCX RET THR CRT = Plano-convex knife retouched through cortication

PSH = Point short heavy retouch

SC EDS = Scraper, end single

SC EDS THB = scraper, end, thumbnail size

SC E/S = end and side scraper

SC OTF = Scraper made on thermal flake

SC SDE = side scraper

SC SPL = spall from scraper edge

SER = Serrated flake (number of serrations per cm)

SPL RET IMP = Spall from retouched implement

STK LGT = strike a light

TIP = tip (of item)

TRA = Arrowhead transverse type

- UNI PCX FRG = Unifacially worked plano-convex knife frag
- WDG = Wedge

WEF = Worn-edge flake

Comments 1+2

BIPOLAR = flake struck on an anvil FAB = Fabricator FLK = flakeFAC BUT = faceted butt FAC PLT = faceted platform IMP = implement IND TRN PRX = indirect truncation of proximal end LRG BLD FRG = large blade fragment LRG FLK FAC BUT = large flake with faceted butt LRG THK FLK = large thick flake LRG BLD LIN BUT = large blade with linear butt LRG TMB = large thumbnail typeN = not counted (natural fragment)PLN PLT = plain platform (Tixier et al. 1980, fig.47) PRX TRC = proximal truncation QUARTZITE FLK = quartzite flake

RIP-FL CONYGAR HILL? = ripple-flaked barb+tang arrowhead of Conygar Hill type (Green 1980, fig. 46) STK LGT = strike a light STK AT RIGHT-ANGLES = flake struck at right-angles to previous flaking THICK LRG = thick, large THK = thick TYPE 3C = arrowhead form (Green 1980, fig. 28) WIDE PLN = wide, plain butt (Tixier *et al.* 1980, fig. 47)

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APPENDIX RB: SHERWOOD SANDSTONE: ROMANO-BRITISH POTTERY ARCHIVE (prepared 1995-9)

R.S. Leary

Introduction

The pottery was examined by eye, using a x10 hand lens and a x30 microscope where necessary, and divided into fabric groups on the basis of their colour, hardness, feel, fracture and the type, quantity, sorting, shape and size of any inclusions. The vessel form, if known, and any decoration were recorded by reference to a type series being developed for the region. The archive comprises fabric descriptions; form type series with verbal descriptions, references to published parallels; pottery catalogue in DBase database format; list of codes used in the pottery catalogue; quantification of forms and fabrics represented on the site, using sherd count and weight values and rim percentage values.

Fabrics

The sherds were examined rapidly by eye with selected use of a x30 binocular microscope and x10 hand lens. The sherds were divided into fabric groups (Fulford and Huddleston 1991, 41), such as grey ware or oxidised ware, with distinctive, known fabrics such as the Nene Valley ware and grog-tempered ware fabrics being given their own fabric codes.

Colour: Hardness:	narrative description only (after Peacock, 1977) soft - can be scratched with a finger-nail hard - can be scratched with a penknife-blade very hard - cannot be scratched with a penknife-blade
Feel:	tactile qualities smooth - no irregularities felt rough - irregularities felt sandy - grains can be felt across the surface leathery - smoothed surface, like polished leather soapy - smooth feel, like soap
Fracture:	visual texture of fresh break (after Orton, 1980) irregularities irregular - medium, widely-spaced irregularities finely irregular - small, closely-spaced irregularities laminar - 'stepped' appearance hackly - large and generally angular irregularities
Inclusions:	 Type: (after Peacock, 1977) Frequency: indicated on a 4-point scale - abundant, moderate, sparse and rare, where abundant indicates the break is packed with a particular type of inclusion, rare indicates the break has only one or two pieces of that inclusion Sorting: indicates the homogeneity of size of a type of inclusion Shape: (after Orton, 1980) angular - convex shape, sharp corners subangular - convex shape, rounded corners rounded - convex shape, no corners

Size:

platey - flat or concave

fine - 0.10-0.25mm medium - 0.25-0.50mm coarse - 0.50-1.00mm very coarse - 1.00mm or greater

Fabrics

- BB1: As Williams 1977 Black burnished ware category 1.
- BSB1: Brown. Hard with sandy feel and irregular fracture. Moderate, well-sorted, mediumsized, subangular quartz; sparse, coarse, platey vesicles and buff inclusions. This fabric is likely to be first and probably early second century in date. Present also at Holme Pierrepont and Dunston's Clump.
- CT: wares with calcareous temper, usually shell. It was difficult to differentiate early "native" shell-tempered wares from Dales ware or other late shell-tempered wares.
- CTA2: dark brown, sometimes with buff areas. Fairly soft, rough feel and laminar fracture. Moderate, ill-sorted, fine to coarse, platey voids and shell; moderate, well-sorted, medium-sized, subrounded quartz. Dales ware (Loughlin 1977). Certainly a fabric group with some variation in clour, quartz content and firing.
- CTA2C: brownish grey. Hard with sandy feel and irregular fracture. Moderate, well-sorted, medium-sized, subangular quartz; moderate to sparse, ill-sorted, medium to coarse, platey vesicles. Probably variant of CTA2.
- CTB: early shelly ware group
- CTB1: grey or buff. Soft with rough feel and laminar fracture. Moderate, ill-sorted, medium to coarse, platey vesicles; rare, medium-sized, subrounded quartz.
- CTB2: grey. Soft with smooth feel and laminar fracture. Sparse, ill-sorted, medium to coarse, platey vesicles; moderate, well-sorted, fine quartz.
- CTB3: Grey. Hard with smooth feel and laminar fracture. Abundant, ill-sorted, coarse to medium-sized, platey white inclusions, shell. Smooth surface unlike CTA2. Date unknown.
- CTB8: greyish brown. Hard with slightly sandy feel and irregular fracture. Moderate, illsorted, medium to fine shell; sparse, well-sorted, fairly fine, subangular quartz. Iron age.
- DBY: Derbyshire Ware (as Kay, 1962).
- Dr20: Dressel 20 amphora
- FLA1: buff or cream. Soft, smooth feel with finely-irregular fracture. Sparse, medium-sized, subangular quartz; sparse, medium-sized, rounded, black and brown inclusions, probably iron oxides.

- GRA1: grey, often with lighter grey core. Soft, smooth feel with smooth, often conchoidal, fracture. Rare, fine, rounded quartz; sparse or moderate, fine, well-sorted, rounded, brown or black inclusions, probably iron oxides. Compared closely to fine grey ware from Derby Little Chester kilns.
- GRA2: Grey. Soft with smooth feel and finely irregular fracture. Moderate, well-sorted fine, subangular quartz; rare, ill-sorted, medium-sized, white inclusions; rare, fine, rounded black inclusions. General group of fine grey wares.
- GRA6: grey with grey core and buff margins. Soft with smooth feel and fracture. Rare, fine, subangular quartz; sparse, well-sorted, fine mica. Includes Parisian ware and possibly is Elsdon 1982, fabric 2 but some sherds included here may originally have had darker surfaces and be GRA7.
- GRA7: Grey with black exterior surface. Soft with sandy feel and finely irregular fracture. Rare, fine, subangular quartz; rare, well-sorted, fine mica. Parisian ware, originally with burnished black surfaces. Possibly Elsdon 1982 fabric 1.
- GRA10: pale grey or brownish grey with darker grey surfaces. Fairly hard with smooth feel and fairly smooth fracture. Moderate, well-sorted, fine, subangular quartz; rare, coarse to medium-sized white inclusions.
- GRB1: this is a large group of fabrics covering otherwise undifferentiated grey wares with moderate quantities of medium-sized quartz and sparse iron oxide inclusions. Only fabrics which can be reliably identified and/or linked to some other attribution such as form or stylistic group or kiln, are separated out from this category.
- GRB1L: as GRB1 but separated out because of its' distinctive lead-grey burnished zones (*cf.* East Midlands burnished ware, Todd 1968b).
- GRB2: Grey. Hard with slightly rough feel and finely irregular fracture. Moderate well-sorted, medium-sized, subangular quartz; sparse, ill-sorted, coarse to fine, platey shell and vesicles; sparse, fine, rounded brown inclusions. A similar and possibly identical fabric occurs among the kiln products of Little London.
- GRC1: medium to light grey. Hard with rough feel and hackly fracture. Abundant, ill-sorted, medium to coarse subangular quartz; sparse, medium-sized, rounded, black iron oxides.
- GTA1: reddish brown surface with brown-grey core. Hard, smooth or leathery feel with irregular fracture. Moderate, ill-sorted, very coarse, angular or subangular argillaceous inclusions, similar to grog.
- GTA4: Grey to buff, often with lighter grey margins. Hard with slightly sandy feel and irregular fracture. Moderate, well-sorted, medium-sized, subangular quartz; sparse, coarse shell; sparse, coarse, rounded buff inclusions, probably grog; moderate, well-sorted, medium-sized, rounded, greyish buff inclusions, probably grog; sparse, medium-sized, rounded, black iron oxides. Used to make everted rim jars of Trent Valley ware type, sometimes with combed decoration. Trent Valley ware was dated by Todd (1968a) from AD 50-60 to at least the end of the first century. GTA4 is a rather sandy version.
- GTA5: Grey-brown-buff, sometimes with reddish brown margins and dark brown or grey core. Sparse, ill-sorted, medium-sized shell; moderate, ill-sorted, coarse, angular, buff or grey

grog; moderate, medium-sized, rounded, brown inclusions; sparse, medium-sized, subangular quartz. As GTA4 but less sandy and more typical of Todd's Trent Valley ware.

- GTA8: buff or grey. Hard with slightly grainy feel and irregular fracture. Moderate, wellsorted, fine, rounded, opaque, quartz; sparse, ill-sorted, fine to medium-sized, white, laminar inclusions; sparse, well-sorted, coarse, angular grey and buff grog.
- GTA10: light grey. Hard with slightly rough feel and irregular fracture. Sparse, well-sorted, fine, subangular quartz; sparse, ill-sorted, coarse to fine, angular and subrounded, grey and buff grog or some clay pellets; sparse, ill-sorted, medium to coarse, rounded black inclusions. Very like GTA8 except for colour.
- M1: Mancetter-Hartshill with red/black trituration grits.
- M2: Mancetter-Hartshill with black trituration grits.
- M3: Verulamium region mortarium.
- NV: Nene Valley colour-coated ware. NV1 is white with black or brown colour coat. NV2 is brown or orange with brown or reddish colour coat.
- OAA1: As GRA1, but orange or pinkish orange.
- OAB1: Orange. Soft, rough feel with irregular fracture. Moderate, medium-sized, well-sorted, subangular quartz; moderate, medium-sized, well-sorted, rounded, black or brown inclusions, probably iron oxides; sparse, fine, well-sorted, white inclusions.
- OBA1: As GRA1, but buff.
- OBB1: as OAB1 but buff.
- OAC1: Orange. Hard, rough with irregular fracture. Moderate, coarse, ill-sorted, subangular quartz, often crystalline appearance suggesting quartzite; moderate, coarse, ill-sorted, rounded, black or brown inclusions, probably iron oxides. Similar to "pre-Derbyshire" ware.
- PQ2: medium shell-tempered prehistoric fabric
- ROX: Oxfordshire red colour-coated ware
- SL1: brown. Hard with rough feel and irregular fracture. Sparse, ill-sorted, medium to coarse, rounded, fuel ash slag; moderate, well-sorted, fine, subangular quartz.
- TS: samian ware

Pottery Form Descriptions

The form descriptions are taken from a regional type series used by T&PAT. The type series is hierarchical in character using three character alphanumeric codes. The first character denotes the class (Webster 1976), the second denotes subclasses determined by body profile and the third

character denotes rim forms within each class. In some cases it is possible to identify the class and rim form or the class and subclass only in which case the unknown code is omitted. Where the class is unknown codes are used to denote the rim, body or base form e.g. EVT: everted rim. Reference is made to published corpora wherever possible.

Classes

A: platters B: straight-sided bowls and dishes, often indistinguishable C: carinated and hemispherical bowls carinated cups and beakers D: E: deep bowls. F: beakers G: not used H: flasks J: flagons K: not used L: jars M: black-burnished ware jar forms N: not used narrow-necked jars **O**: P: storage jars lids Q:

Subclasses

Number alone: reference to relevant published corpora. For TS fabric group, reference to Draggendorf series. For Nene Valley group, reference to Howe *et al.* 1980.

B: Straight-sided bowls and dishes

BA: bowl BB: dish BC: bowl with slightly curved wall

The following rims are found with BA, BB and BC.

- B1: plain rim, copying BB1 forms (Gillam 1976, 75-84, dated early to mid second to late fourth century) present locally from the late second century at Derby (Dool *et al* 1985, Table 6), second century at Lea, at least 30 examples, and Newton-on-Trent, only one example (Field and Palmer-Brown 1991 Table 1) and third century at Knaith and Branton (Samuels 1983, fig. 158, no. 16; Buckland *et al.* 1976, nos. 11-2). Buckland notes they are more common in mid-second to early third century kilns although they continue into the early fourth century.
- B2: grooved-rim bowl/dish. Second/fourth century but more common in late-third/fourth century (Gillam 1970, nos.316-21).
- B3: flat-rim bowl/dish. Copying BB1 products (Gillam 1976, nos.57-61) dating to the second century but present in third century kilns such as Blaxton (Buckland and Dolby 1980, type C) but virtually absent at the fourth century kilns at Branton (Buckland 1976).

- B4: bead-rim bowl/dish. Late second-fourth century (Samuels 1983, 191).
- B5: bowl with incipient flange. Rare in S. Yorkshire group. Dated from the late second to mid-third century on general typology (Gillam 1976, 70).
- B6: flanged bowl dated after AD270 by Holbrook and Bidwell (1991, 99)
- B7: dish with triangular rim. Gillam 1970, nos.222-3, dated later second to early third century; Samuels (1983, 191) dated later second to fourth century; Buckland *et al.* 1980 notes blunt triangular rims are a late feature in S. Yorkshire group (1980, 155)
- B8: bowl/dish with down-bent rim. Variant of B3, particularly common in the S. Yorkshire kilns
- B9: bowl or dish with stubby lip (*cf*. Buckland *et al.* 1980, fig.3, no.8) reckoned to be a late feature but current from the early third century.
- B15: lipped dish or bowl, variant of B3.

C: Carinated or hemispherical bowls

- CB2: carinated bowl with cordons and bead rim, romanised form of late iron age cordoned and carinated bowls, usually in grey ware and often decorated between the cordons. This form is common elsewhere such as Derby Little Chester where it is dated from the Flavian period to early Antonine.
- CC6: reeded-rim bowl. As CC5 rare in Lincolnshire but generally dated Flavian to Hadrianic (Gillam 1970, 217 dated 110-30 and first century kiln at Derby, Brassington 1980, no. 366).
- CD7: flanged, hemispherical bowl. Present at Rossington Bridge with painted decoration and dated A.D. 140-200 but more common in later kiln groups at Cantley.
- C25: colander with reeded rim, *cf*. Buckland *et al*. 1980, H(a) dated late second/early third to fourth century.
- C26: bowl with flat grooved rim, possibly variant of C25.
- C47: Oxford red colour-coated form, Young 1977.

D: Carinated cups and beakers

DC1: everted-rim, long-necked jar/beaker, usually burnished externally. A common form dating to the late first/second centuries (Darling 1984, no.94), although it is found in a deposit of the mid-third century at Winterton (Stead 1976, fig.76, nos.30-1; fig.80, no.25; fig.85, no.112; fig.87, no.152). Made at North Hykeham kiln, Lincs. (Thompson 1958, no.17), Roxby, Lincs. (Stead 1976, fig.66, nos.29-32), Dragonby kiln 3 (Stead 1976, fig.64, no.1) and at Torksey, Lincs. (Oswald 1937a, no.53). Some examples of a similar form with lattice decoration on the middle body zone were present, of first century examples from Margidunum (Oswald 1952, fig.11, no.9) and Flavian deposits from Norton Disney (Oswald 1937b, fig.1, no.7).

DC2: as DC1 with bead rim.

Dr + number: samian Dragendorff form number.

E: Deep bowls

- EA1: deep bowl with bead rim, occasionally decorated with a burnished or grooved wavy line outside upper body. Made at Torksey, Lincs. and Doncaster kilns from the second century until the fourth with little typological development (Oswald 1937a, nos.96-119; Buckland *et al.* 1980, 161, type Hc and d). Similar calcite-gritted bowls were present in Claudian/Neronian and Neronian/early Flavian contexts at Old Winteringham (Stead 1976, fig.74, no.9 and fig.76, no.38).
- EA2/EB3: wide-mouthed shouldered jar with rolled-over rim, often burnished, *cf*. Buckland *et al.* 1980, H(b) who notes it appears at Rossington Bridge in the late second or early third century but very common in late third and fourth century deposits; Webster and Booth 1948, C16-20 and East Midlands burnished ware (Todd 1968b, fig.1, no.3), the latter two dating to the late third/fourth century but clearly staring in the early second century (Field and Palmer-Brown 1991, fig.17 no.22).
- EA5: wide-mouthed jar with club rim and straight sides, *cf*. Buckland *et al.* 1980, no. 31.
- EA6: inturned bead with flange bowl. A common form in the later third/fourth centuries. Present in kiln groups from Swanpool (Webster and Booth 1947, D13-23) and a late fourth century group from Lincoln (Darling 1977, nos.43-50).
- EA7: bifid rim deep bowl as EA1, *cf*. Buckland *et al* 1980 H(c) and (d) where it is restricted to earlier groups.
- EA18: as EA1 but with outcurving rim.
- EA19: variant of EA1 and EB3, outcurving, slightly hooked rim and rather more sinuous than bucket profile.
- EA20: variant of EA1/EA5 with small bead/clubbed rim. The rim is very similar to some of the B4/7 rims.
- EC8: large group of deep bowls with slight shoulder and everted or bead rims, similar to EA2/EB3 but heavier profile with more pronounced shoulder. Often burnished on shoulder with wavy line decoration on upper body. *Cf.* East Midlands burnished ware (Todd 1968b, type 1) and Swanpool products (Webster and Booth 1947, D37-43), both late third/fourth century. Type F at the Antonine Roxby kilns, Lincs. (Stead 1976, 140) is similar. As EA1 it is a long-lived type and, in the absence of other dating evidence, a second century date could not be completely ruled out. Most, however, date to the later third/fourth centuries.
- EC15: bowl of uncertain profile with sharply everted rim. This form and EC16 are known only from rim sherds and may be variants of EA2/EB3. They do, however, resemble Lincolnshire wide-mouthed bowl forms, *cf*. Roxby type F appearing in early Antonine deposits at Winterton (Stead 1976 fig. 79 no. 4) but apparently being replaced by a larger version with a longer, thickened everted rim by the mid-third century (Stead

1976, figs. 81 nos.52-5 and 84 no.11 compared with fig.87 no. 150). *Cf.* also similar bowls at Market Rasen (Samuels 1983, fig. 181 nos. 97-100) which seem transitional in form.

EC16: wide-mouthed jar with everted, hooked over rim, see under EC15. This is the third to fourth century form of EC15, *cf*. Stead 1976, fig. 87 no. 150 and products of fourth century kilns at Thealby and Messingham (Stead 1976, figs. 69 nos 1-4 and 71 nos 16-24) and late third century kiln at Claxby (Bryant 1977, fig.4 no.1). Examples from the kilns at Barnetby Top (Samuels 1979, fig.5 nos. 1-13) and Linwood Warren (Samuels 1983, fig. 187 nos.34-9) seem rather larger and heavier as are those from the late fourth century group from Lincoln (Darling 1977, fig.7 nos.133-4).

F: Beakers

- FA1: globular beaker with simple, short everted rim. Late first-second century. *Cf.* at Derby Racecourse kilns (Dool *et al.* 1985, fig.77, no.36; mid-second century).
- FC3: poppy-head beaker.
- FD10: jar or beaker with flat-topped rim, grooved internally, cf. Dales ware rims.
- FE5: folded beaker with funnel neck. *Cf.* Howe *et al* 1980, nos 38-9, 42-3, mid to late third century.
- FG1: long-necked beaker with small everted rim.
- FG3: long necked beaker with small bead rim. Copying late second-third century imported beakers and dated late third-fourth century.
- FJ: beaker with raised cordon decoration, *cf*. Todd 1968a, fig. 1, no. 2a.
- F7: necked beaker with short everted rim, probably long necked.

L: Jars

- LA1: globular jar with short, fairly sharp, everted rim. Late first-second century. At Derby Little Chester, this form predominated until it was superceded by Derbyshire ware jars in the mid to late second century (Dool *et al.* 1985, tables 4-5).
- LA2: globular jar with rebated rim. In Derbyshire ware this form is dated from the mid second century at Derby (Dool *et al.* 1986, table 4) though it probably is rare in the third to fourth centuries when cupped and rolled rim jars dominate the Derbyshire ware repertoire. In calcite gritted ware this form was made in the Little Chester kilns (Dool *et al* 1985, Table 5) in the late first to early second century.
- LA3: Everted rim jar with longer rim than LA1
- LA6: cupped-rim jar made in Derbyshire ware. Mid second-fourth century.

- LA11: everted rim jar with slight rebate. *Cf.* Dool *et al.* 1985, 105, no.179, and from thirdcentury kiln at Little London (Oswald 1937a, plate 11, no.14, 12b and 13b). ?Third century.
- LA13: everted rim jar, rim thickening at tip. Variant of common everted rim jar which superceded LA1 in the second century and was the prevalent form throughout the third century but possibly being superceded by lid-seated jars in the fourth century (*cf.* Buckland *et al* 1980, 157.
- LA14: short, stubby everted rim jar. *Cf.* Trent Valley ware types 1, 3 and 4 (Todd 1968a, fig.1, nos.2, 2a and 3) dated to the second half of the first century.
- LA15: bifid, rebated-rim jar
- LA16: cordoned neck jar.
- LA17: Dales ware type lid-seated jar (Darling 1977, 29-30) dated to the third and fourth centuries and possibly the late second century at Ancaster and Margidunum (Todd 1968b, 202, note 4; Todd 1969, fig.20, 12).
- LA19: sharply everted rim jar. Dating as LA13.
- LA20: double lid-seated rim jar. Darling 1977, 30-1, dated fourth century.
- LA22: lipped everted-rim jar. Dating as LA13.
- LA24: cavetto-rim jar. Dating as LA13 but probably true cavetto rim not current until the third century.
- LA25: straight-necked jar with everted tip. Dating as LA13.
- LA26: everted-rim jar with slight groove inside tip of rim.
- LA27: necked jar with bead rim. Dating as LA13.
- LA30: everted rim jar with squared tip. Dating as LA13.
- LA36: bead-rim jar of "native" type dating to first century A.D or late iron age.
- LA37: bead-rim jar with internal bevel. "Native" type paralleled at Holme Pierrepont and Scratta Wood, Notts. First century.
- LA41: "native" jar with short, everted rim similar to LA14 but with slimmer rim.
- LA42: undercut bead rim jar, rather clumsily made. Related to Trent Valley wares in form and fabric. First century.
- LA44: necked jar with heavy everted rim. Trent Valley ware type. First century.
- LA50: jar with chunky everted rim rebated at base of rim.

- LA51: jar with very chunky everted rim and slight neck, probably related to Trent valley ware forms.
- LA52: jar with chunky rim pulled over and out almost to form a bead rim, related to Trent Valley ware forms.
- LA54: cupped rim jar typical of the grey ware cupped rim jars of the East Midlands. Rather upright cup with rebate beginning at base of rim. Certainly current in third and fourth century but if copying Derbyshire ware forms may begin in mid-second century.
- LA60: slightly expanded, short, everted rim similar to LA14, *cf*. Roxby B and C, second to early third century (Stead 1976, fig. 84, nos. 105-6).
- LA63: jar, usually high-shouldered but shoulder sometimes very weak. This type code is used for large and medium-sized vessels in this form. The rim is like a near horizontal hammerhead. There is often a very distinct angle between rim and internal wall and the rim often overhangs internally. Parallels at Old Winteringham and Winterton suggest a mid-first century inception and continuing in the Flavian-Trajanic period and into the Antonine period (Stead 1976, fig. 74, nos. 7-12; fig. 776, nos.37-8, fig. 77 no. 58; fig. 83 no. 87). A similar date range is suggested by the Dragonby material (Samuels 1983, 127, fig. 77 no. 2, fig. 79 no. 4; fig.81 no. 4, fig. 85, nos. 82-3). *Cf.* Buckland and Magilton 1986, 155 no. 17 where a late first to early second century date is given
- LA64: medium-necked jar with rolled-over rim. Possibly a small variant of EC16, *cf* Samuels 1979, fig. 5 no. 5 dated first half of fourth century but redated late third in Samuels 1983, 770 on account of the Dales ware type, smaller jars/beakers and absence of flanged bowls; *cf* Stead 1976, fig 69 nos 1-4 dated fourth century.
- LA83: jar with rim slightly out-turned and flattened on top. One example in shell-tempered ware could be late iron age.
- LA85: rebated-rim jar with everted, rather beaded rim. As LA54.
- LB81: medium-necked jar with offset neck and short everted rim, *cf*. Buckland *et al* 1980, E(a) grey ware examples. Most popular in latter half of second and into third century.
- LC: rusticated jar. Nodular and linear rustication. Late first-second century (Buckland *et al.* 1980, 158).
- LG: ovoid jar with multiple grooves at interval on body, *cf* Stead 1976, Roxby type C.

M: BB1 jars

- MB: reference to Gillam 1976. Number equals Gillam's number *e.g.* MB1 = Gillam 1976, no.1 and MA = nos. 30-33
- NV: Nene Valley Guide reference. Howe *et al.* 1980.

O: Narrow-necked jars

- OA: thinner walled, narrow-necked jars.
- OB: heavier, thicker walled narrow-necked jars.
- O1: everted-rim, narrow-necked jar
- O2: bead-rim, narrow-necked jar
- O3: narrow-necked jar with undercur rim
- O4: narrow-necked jar with outcurving rim.
- OA17: sharply, everted rim, narrow-necked jar similar to OB19.
- OB1: everted-rim, heavier narrow-necked jar.
- OB2: narrow-necked jar with bead rim.
- OB18: narrow-necked, rather globular jar with short neck and bead rim, *cf.* Buckland *et al.* 1980, type F, similar to examples at Blaxton, Buckland and Dolby 1980, no. 131.
- OB19: narrow-necked, rather globular jar with sharply everted rim. Usually the rims are beaded, recurved or everted and thickened at the base and this thin, sharply everted rim is unusual.
- OB20: as OB1 with blunt-ended, outcurving-rim, the tip bearing three grooves. *Cf.* grey ware jar at Lumb brook (Brassington and Webster 1980, no. 42).

P: Storage jars

- PA4: bead-rim neckless storage jar.
- PA5: storage jar with elongated bead rim

Q: Lids

- QA1: plain-rim, flat lid
- QA4: squared-rim lid
- QA5: bifid-rim domed lid
- QA6: round-rim lid with groove under rim tip
- QA8: bifid-rim flat lid

RECORDING SHEETS

The pottery database records the fabric and form of each sherd from each area. On the archive print-out the following are recorded the area code giving the drawing number of the field or fields; the finds code giving the code assigned to each find group; the sherd group number giving further subdivisions of the sherds within the find group, indivisible using the attributes recorded; the fabric; the sherd-count; the sherd-weight; the sherd size in cm^2 groups ie $1=1cm^2 2=2cm^2$ etc.; abrasion; part of the vessel represented; the vessel form; the rim-diameter; the percentage of the rim present; the decorative, motif and the position on the pot; references to joining sherds; any deposits, any additional comments and a column indicating finds which have been disregarded for some reason. The following abbreviations and codes are used in addition to those listed above for fabrics and forms:-

Form: BKR: beaker B+F: bead and flange CAR: carinated COL: colander EVT: everted rim FRB: footring base IMB: imbrex PED: pedestal base SPY: splayed base STP: strap handle TUB: tubulus TUR: turned

Part: PRO: profile BDY: diagnostic bodysherd BAS: base SCR: scraps FLG: flange

Decoration:

Technique:

APL: applied CB: combed CUTO: cut-out FNG: finger tip impression HA: handle IMP: impressed IND; indented PTD: painted ROU: rouletted SM: smoothed STP: stamped STP+: stamped between cordons or grooves BED: bead rim BRCK: brick CHM: chamfered CV: closed vessel FLG: flagon HKD: hooked rim MOR: mortarium PLN: plain rim or plain base STJ: storage jar TEG: tegula T/T: tegulae or tubulus

R+B: rim and bodysherd BDX: undiagnostic bodysherd B+B: base and bodysherd HA: handle SPOT: spout

BNH: burnished CD: cordoned FLD: folded GRV: grooved HSC: handle scar INC: incised MLD: moulded RIL: rilled RST: rusticated STB: stabbed

Motif:

+: indicates decoration is between grooves or cordons

ALT: acute lattice

BBD: barbotine dots

BRWN: brown paint CO1: Elsdon 1982 DBE: double FOL: foliage

LAT: lattice LPS: loops NTC: notch OB: oblique PAN: panel SECO1: Elsdon 1982, CO1 SQU: squared VER: vertical ZZ: ziz zag SGE: single WVY: wavy line

Position:

AOO: all over outside OSR: outside rim ISR: inside rim OSN: outside neck OUB: outside upper body OLB: outside lower body ISB: inside body TOF: top of flange TOR: top of rim

Condition:

BR: burnt AE carbonised deposits outside AI: carbonised deposits inside VAB: very abraded DIS: distorted FKD: flaked CRJ: cross joins with SAME: same vessel as

Abrasion:

U: unabraded, no worn surfaces M: moderately abraded, worn edges and/or one worn surface A: abraded, worn edges and some wear on two surfaces V: very abraded, severely worn all over

No P: Not printed

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C2: Elsdon 1982 CRV: curved DAH: dash HRZ: horizontal line

LIN: linear MUL: multiple NOD: nodular OV: oval SCL: scales SGE: single STP: strap WVY: wavy line NTC: notched STP: strap

AO: all over AOR: all over rim TOR: top of rim OSH: outside shoulder OMB: outside middle body OSB: outside body IBS: inside base OSF: outside flange ILB: inside lower body Brassington, M. 1980 Derby Racecourse kiln excavations 1972-3. *Antiquaries Journal* Vol 60: 8-47.

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