Results of an Archaeological Investigation at Dock Street, Leith: Phase 2

August 2002

Client: Gregor Shore PLC

Results of an Archaeological Investigation at Dock Street, Leith

Contents

- 1. Introduction
- 2. Site Location and Description
- 3. Archaeological Background
- 4. Objectives
- 5. Method
- 6. Results
- 7. Discussion
- 8. Bibliography

Figure 1: Site and trench location

Figure 2: Location of archaeological features

Figure 3: Rectification of modern and historic maps

APPENDIX: Site Registers

Summary

The second phase of an archaeological evaluation was carried out following the demolition of Brodies Tea and Coffee building on Dock Street, Leith. This work followed an earlier evaluation below a neighbouring car park, which identified building foundations belonging to the 17th-century Cromwellian Citadel. Modern clearance, probably associated with the construction of Brodies, had removed all archaeologically significant remains above the level of compact clay subsoil. The southern part of the area contained the defensive ditch of the Citadel. The ditch extended to a depth of 3.8 m below the level of subsoil and was lined on the inside with a thick ashlar-faced sandstone wall bonded with lime mortar. The ditch did not return to the north in the excavated area and it is suggested that this must occur beneath modern Dock Street. Elsewhere only one possibly post-medieval wall foundation was encountered, preserved because it was cut below the level of subsoil.

1. Introduction

This document presents the results of a second phase of archaeological evaluation for a site at Dock Street, Leith. Headland Archaeology was commissioned by Gregor Shore plc to undertake the work in advance of a proposed residential development. The second phase of evaluation followed demolition of a standing building. The car park to the rear of the building had already been subject to an archaeological evaluation (Brown 2002). The work followed a Written Scheme of Investigation agreed with the City of Edinburgh Council Archaeology Service (CECAS), who also monitored the project. The two stages of evaluation were undertaken in order to provide sufficient information to allow an informed planning decision in accordance with National Planning Policy Guidance Note 5 and Planning Advice Note 42.

The site is located on the line of defences related to the Cromwellian Citadel. This large fort was constructed in 1656 and mostly demolished by the late 18th century (Stevenson, Simpson & Holmes 1981). The phase 1 evaluation has established that interior structures survive within the development area beneath around 0.5 m of modern make-up. The site also lies on the fringes of the medieval burgh of North Leith, which was founded by at least the 12th century AD.

The archaeological evaluation was carried out between the 15th and 20th August 2002 by a team of two archaeologists. Simon Stronach wrote this report and Mike Middleton prepared the illustrations.

2. Site Location and Description (figure 1; NGR NT 2675 7658)

The site proposed for development was recently occupied by Brodies Tea and Coffee building and its car park (see figure 1). The factory was still in use during the phase 1 evaluation in the car park but has since been demolished and the area it occupied was available for investigation. The site is enclosed on three sides by modern development and fronts onto Dock Street in the east. The surface of the phase 2 evaluation area comprised modern make-up exposed after the removal of the building, including all associated foundations and hard surfaces.

3. Archaeological and Historical Background

The site lies on the fringes of North Leith, a settlement possibly dating back to the 10th century (Reed & Lawson 1999) and documented in the 12th century. Two phases of post-medieval fortification are known in the vicinity, and it is probable that the evaluation site falls within or on the line of defences of the Cromwellian Citadel, a large defensive work constructed in 1656. An earlier, less well located, series of defences constructed by the French are also known to have lain in this locality. These innovative defensive works, begun in 1548 with the arrival of the French, are of a type evolved in Italy as a response to the introduction of artillery (Harris 1991). The defences comprised low earthen ramparts, which sloped inwards to deflect cannon shot, and 8 bastions forming a rhomboid shaped fort, which enclosed the whole of North and South Leith. In 1559-60 the rebellion against Mary of Guise saw further use of these defences by the French. Almost immediately after came an order from

Edinburgh town council to demolish the fortifications. The demolition was not total and much of the eastern and southern ramparts appear on Naish's plan of 1709. It appears that much of the stone facing was removed leaving the earthen walls to erode naturally (Mowat 1994: 125). Harris (1991) examined a plan made at the time of the siege and compared it to more recent map evidence and the present street plan. This study shows that the Dock Street site is within the fortification.

In 1656 General Monck began to erect a Citadel in North Leith on the site of St Nicholas Chapel. The Citadel comprised a turf-faced rampart reinforced with undressed stone and enclosing 3-4 acres (Mowat 1994:189). Pentagonal in plan with bastions at each of the five angles the ramparts were reputedly almost as high as the internal barracks, magazines, stores and the houses for the governor and officers. Only one element of the Citadel survives, an east-facing gateway located adjacent to the present site, most of it having been demolished by 1779 (Stevenson, Turner Simpson and Holmes 1981).

The phase 1 evaluation established that post-medieval wall foundations survived below modern make-up, up to 0.6 m below the car park surface. At least some of these are likely to have been part of buildings in the Citadel's interior.

4. Objectives

The objectives of the investigation are to determine the character, extent and quality of any remains, which survive within the application area beneath the area recently cleared by demolition of a standing building.

5. Method

Four trial trenches were machine excavated within the area formerly occupied by the standing building (figure 1). These were excavated radially in order to expose sections across the Citadel defences, but extended into the interior to maximise coverage across the area. The trenches did not exceed 1.2m in depth excepting machine excavated test pits, which were excavated through the base of the trench where necessary.

A mechanical excavator equipped with a toothed bucket was used to remove modern overburden under direct archaeological control. Once this and other compacted materials were removed a flat bladed ditching bucket was used to remove softer fill. The stratigraphy of the trenches was recorded in full using the Headland Archaeology Ltd standard method. All contexts were given unique numbers and finds were collected by context. Colour transparencies and colour print photographs were taken. An overall site plan was recorded and tied into the National Grid. All recording was undertaken on *pro forma* record cards.

The numbers used in the recording followed on from those used in the phase 1 evaluation. Full combined lists from both phases of work are included in the Appendix.

6. Results

A complete description of deposits with surface depths above Ordnance Datum is provided in tabular form in the Appendix. Summary descriptions are provided below.

Trench 3

At the southern end of the trench up to 0.4m of tarmac and make-up (19) overlay up to 1.44m of dark clay levelling material with demolition debris and finds ranging in date from the 14th to the 20th century (23, 20 & 18). A modern wall foundation was located running parallel with the edge of Coburg Street at a depth of 1.24m below the ground surface. Also beneath the levelling deposit was a cobbled surface and drain (24 & 25). This had slumped somewhat because it was laid directly on soft, wet deposits interpreted as fill within the Cromwellian ditch. These consisted of an upper lens of 0.16 m of lime mortar (16) over around 3.8 m of dark silty clay (21). The lower ditch fill was relatively clean but did contain some post-medieval finds. The ditch fill extended outside the trench to the south and to the top of a partially robbed out wall foundation (28) to the north. The wall had a width of 2.2m at top, but a sondage excavated at its southern edge established that it formed an inner ashlar-faced revetment to the ditch and probably extended to its base. The top of the wall lay at a depth of 4.68m OD. It was noted that the ditch had been cut into very compact dark brown clay subsoil (31), which had a depth of around 4.80m OD. Modern levelling and surfacing deposits (18 & 19) had a depth of around 0.7 m over subsoil outside the area of the ditch. A modern brick built tank (30) was cut into the subsoil and recorded but not excavated. A modern wall foundation (29) of sandstone and concrete cut across the trench on a east to west alignment, and had been founded on the subsoil. It overlay an earlier foundation (27) of sandstone and lime mortar. This survived as a cut into the underlying subsoil, and seemed to be part of a rectangular or square structure that extended outside the trench to the east. It lay at a depth of 0.78 m below the surface, or 4.85m OD.

Trench 4

In the south-west of the trench up to 0.6 m of tarmac and make-up (32) overlay loose rubble, which filled a brick and cement built cellar (34). This occupied the south-western 9m of the trench. A sondage through this encountered the Citadel wall (35) and ditch fills at a depth of 1.63m below the surface or around 4.40m OD. Close examination of the ditch at this point was not possible for safety reasons. Beyond the cellar up to 0.36 m of modern make-up (36) overlay undisturbed compact clay subsoil at a depth of 5.12m OD.

Trenches 5 & 6

Both these trenches encountered several roughly N-S orientated wall foundations in their eastern parts. These all ran parallel to Dock Street and were constructed from rubble and cement or concrete. They are all interpreted as modern. Elsewhere the clay subsoil was undisturbed apart from modern services, and the ditch was not encountered.

7. Discussion

The phase 2 evaluation at Dock Street has established that the southern part of the site contains a roughly east to west orientated ditch with inner stone facing. The size, depth and dating material from the fill (see Appendix: Finds Register) are all consistent with this being the surviving defences of the Cromwellian Citadel. The position of the ditch suggests that the south-eastern corner lies outside the development site to the east and the eastern side runs northward below Dock Street.

The area immediately within the ditch would have been occupied by the rampart of the Citadel. Later development has entirely destroyed this and modern overburden directly overlay subsoil within the phase 2 evaluation area. This was observed not to be the case during the phase 1 evaluation below the car park and it is likely that the clearance occurred during the development of Brodies Tea and Coffee building.

The relatively clean nature of the ditch fill suggests that it was probably infilled by pulling the upcast rampart material into the feature. There was certainly much more pottery and other midden material in the levelling deposit that sealed it. This also contained modern finds and was very disturbed. However much of the later medieval and post-medieval pottery that was recovered was imported and included stonewares from Germany.

A number of other wall foundations were recorded during the evaluation but except one all were bonded with cement or concrete and are interpreted as modern in date. The exception was post-dated by a modern foundation and was constructed from sandstone bonded with lime mortar. It survived in a cut below the level of subsoil. This may be a foundation related to the citadel, beyond the area formerly occupied by the rampart. Or it could relate to another post-medieval structure, a rectangular building is shown in this vicinity on Wood's plan of 1777.

The cobbled surface and drain seen in the south end of trench 3 are likely to relate to a road depicted on Kirkwood's plan made in 1817. It has probably survived within the area of the underlying Cromwellian ditch because it has slumped into the soft fill. Elsewhere it will have been destroyed by subsequent development.

With regard to Naish's and Wood's plan of the Citadel, shown rectified with the modern street plan in figure 3. It would seem that Wood's more accurately locates the Citadel. It clearly indicates that the ditch would run beneath present day Dock Street, although the ditch itself is not shown. It also suggests that the bastion, depicted as a circle containing an 'R', once existed in the development area. Modern clearance of the site must also have removed all traces of this.

8. Bibliography

Brown G 2002 Results of an Archaelogical Investigation at Dock Street, Leith Unpublished Headland Client Report

Harris, S 1991 'The fortifications and siege of Leith: a further study of the map of the siege in 1560', *Proc Soc Antiq Scot* 121 (1991), 359-368.

Mowat, S 1994 Port of Leith: Its History and People, John Donald, Edinburgh.

Reed D & Lawson JA 1999 Ronaldson's Wharf, Sandport Street, Leith DES, 40.

Stevenson S, Simpson A & Holmes N *Historic Edinburgh, Canongate & Leith the archaeological implications of development* Scottish Burgh Survey, 1981.

CARTOGRAPHIC SOURCES

Kirkwood, R 1817 This plan of the city of Edinburgh and its environs

Naish, J 1709 Survey of the Town of Leith

Wood A 1777 The plan of the town of Leith

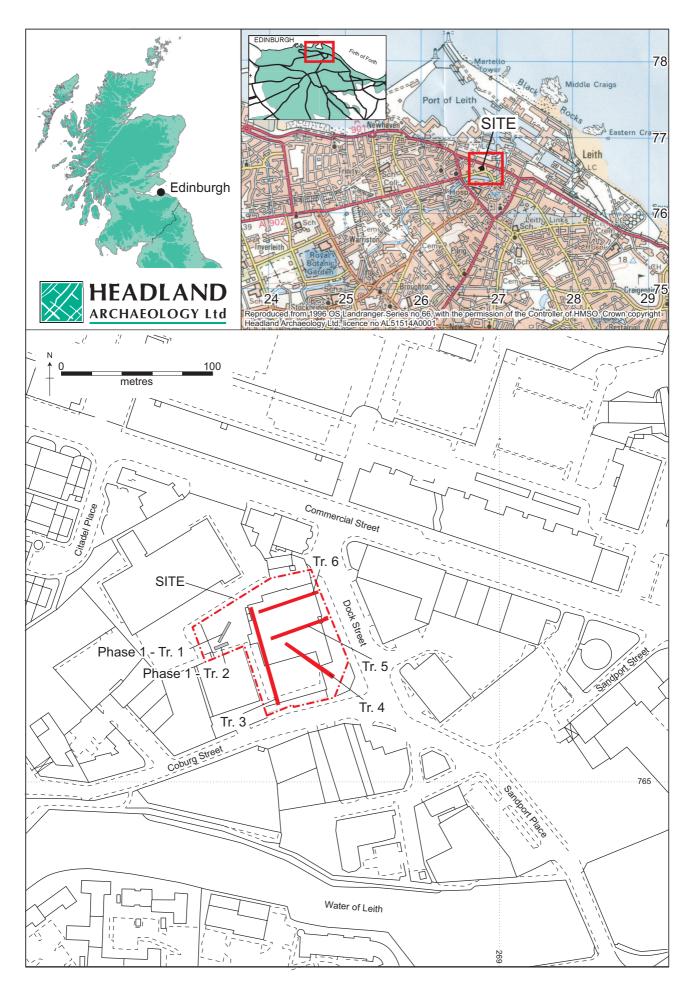
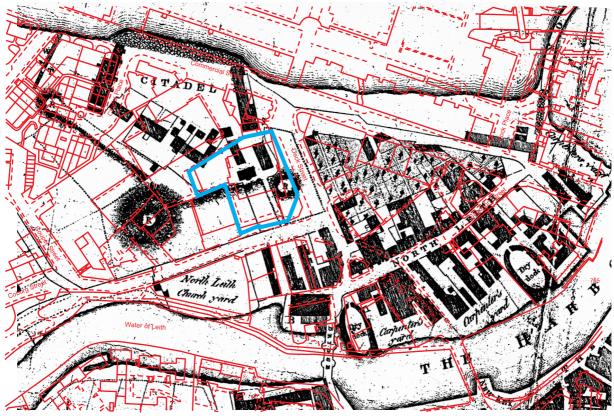


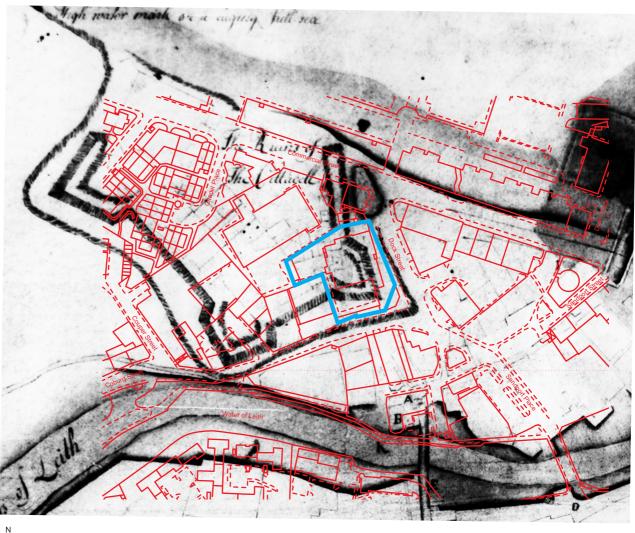
Figure 1. Dock Street, Leith: Site and Trench location



Figure 2. Dock Street, Leith: Trenches and features



Wood's plan of 1777 rectified with modern street plan



metres

Naish's plan of 1709 rectified with modern street plan

Figure 3. Dock Street, Leith

APPENDIX: Site Registers

Context Register

Context No.	Trench	Description	Minimum Depth (m O.D.)		
15	3	Modern concrete wall foundation, orientated parallel to Coburg St	5.27		
16	3	Thin lime mortar layer with moderate small stones forming upper fill in Citadel ditch	4.35		
17	3	Cut for citadel ditch, truncated to level of subsoil, contains wall 28 & fills 16 & 21	4.80		
18	3	Thick clay and demolition debris levelling deposit below modern surface, over modern and earlier wall foundations. Make-up for demolished building/most recent development.	6.35		
19	3	Tarmac surface and underlying make-up outwith area of demolished building alongside pavements	6.75		
20	3	Modern levelling deposit, equivalent to 18 but containing more bricks	6.35		
21	3	Dark brown-grey silty clay with occasional patches of lime mortar, frequent charcoal, moderate stone and some post-medieval pottery and glass fragments. Fill of ditch 17, over wall 28	4.19		
22	3	Same as 18	=		
23	3	Very wet clay over cobbling 24, probably levelling deposit 18 slumped because it is over the soft ditch fill. Retaining water because it is over cobbles.	4.70		
24	3	Rough cobbled surface, slumped into soft ditch fill, associated with drain 25, probably the roadway shown on Kirkwood's map of 1817	4.67		
25	3	Stone drain contemporary with cobbles 24	4.67		
26	3	Ditch fill, same as 21	-		
27	3	Sandstone and lime mortar wall foundation, rectangular or square, only partially exposed and surviving because cut below the level of subsoil	4.85		
28	3	Sandstone and lime mortar wall against inner face of ditch. Robbed to below the level of subsoil, ashlar faced, firmly bonded	4.68		
29	3	NE-SW orientated modern concrete wall foundation, overlies 27	5.07		
30	3	Modern brick built ?tank, not excavated survives cut below the level of subsoil	4.80		
31	3	Compact dark brown clay with frequent small stone inclusions, subsoil	4.80		
32	4	Tarmac and associated make-up	6.36		
33	4	Loose rubble and demolition debris cellar infill	5.76		
34	4	Brick and cement modern cellar, filled with 33	5.76		
35	4	Sandstone and lime mortar wall foundation, seen in sondage below cellar 34, interpreted as the same as 28	4.40		
36	4	Clay and demolition debris levelling material outside cellar, same as 18	5.12		
37	5	Up to 0.5 m of modern levelling material, same as 36 & 18	5.70		
38	5	Modern concrete foundations in eastern end of trench	5.11		
39	6	Up to 0.7 m of modern levelling material, same as 37, 36 & 18	5.50		
40	6	Modern concrete foundations in eastern end of trench	5.35		

Photographic Register

Colour Slide/Colour Print

FILM 2

Shot No.	Direction Facing	Description					
1	-	ID shot					
2	NW	Trench 3 general					
3	NW	Trench 3 general					
4	W	Modern wall 15, tr 3					
5	W	Modern wall 15, tr 3					
6	Е	Modern wall 15, tr 3					
7	Е	Modern wall 15, tr 3					
8	NW	Modern wall 15, tr 3					
9	NW	Modern wall 15, tr 3					
10	Е	West facing section tr 3					
11	Е	West facing section tr 3					
12	Е	West facing section tr 3					
13	S	NE facing section tr 4 (SE end)					
14	S	NE facing section tr 4 (SE end)					
15	S	NE facing section tr 4 (SE end)					
16	SE	Tr 4 general (SE end)					
17	SE	Tr 4 general (SE end)					
18	SE	Tr 4 general (SE end)					
19	W	Tr 4 sondage under cellar					
20	W	Tr 4 sondage under cellar					
21	W	Tr 4 sondage under cellar					
22	NW	Citadel ditch wall foundation 28					
23	NW	Citadel ditch wall foundation 28					
24	NE	Citadel ditch wall foundation 28 & cut 17					
25	NE	Tr 5 general					
26	Е	Tr 5 general					
27	Е	Tr 5 general					
28	Е	Tr 6 general					
29	Е	Tr 6 general					
30	W	Tr 6 general					
31	W	Tr 6 general					
32	W	Tr 3 E facing section of machine sondage					
33	W	Tr 3 E facing section of machine sondage					
34	W	Tr 3 E facing section of machine sondage					
35	Е	Tr 3 W facing section of machine sondage					
36	Е	Tr 3 W facing section of machine sondage					
37	Е	Tr 3 W facing section of machine sondage					

FILM 3

Shot No.	Direction	Description
	Facing	-
1	-	ID shot
2	NE	Sondage down face of wall 28
3	NE	Sondage down face of wall 28
4	W	E facing section tr 3, cobbling 24
5	W	E facing section tr 3, cobbling 24
6	W	E facing section tr 3, cobbling 24
7	N	Cobbling 24

8	N	Cobbling 24
9	N	Cobbling 24
10	SE	Wall foundations 27 & 29
11	SE	Wall foundations 27 & 29
12	NE	Wall 28 ashlar face
13	NE	Wall 28 ashlar face

Finds Register

Context	Body	Rim	Handle	Base	Fabric	Description	Spot date
18-Modern	-	-	-	-	Clay pipe	2 stem sherds	Late C16th
overburden							– C17th
	7	-	-	-	PMR&O	2 adjoining from one	C17th –
						vessel; 2 adjoining +	early C18th
						1 other sherd from	
						single vessel; 1 sherd	
						with swirling combed decoration;	
						all green glazed	
	1	_	_	_	LMWG	Green glazed	C15th –
	1	-	-	_	LIVIWO	Oreen grazed	C15th = C16th
	_	1	_	_	CBM	Pan tile	Post
	_	1			CDIVI	1 an the	medieval
	1	_	_	_	Glass	Slightly opalescent	C17th –
	1				Gluss	surfaces, bubbles,	early C20th
						scratches	, , , , , , , , , , , , , , , , , , ,
	-	-	-	-	Klinker	1 lump	Historic
	-	-	-	-	Stone	1 burnt piece	-
21-Ditch	2	-	-	-	CBM	Pan tile	Post
fill							medieval
	1	-	-	-	RSW	Either early Rhenish	C14th –
						stoneware but with	C17th
						no purple iron wash	
						and a tiger glaze or	
						later Raeren/Aachen stoneware which has	
						been underfired to	
						produce an	
						earthenware body	
23-Modern	8	2	_	1	SW	3 adjoining and 2	C17th –
overburden		_		-		adjoining from	C18th
						single large flat dish,	
						2 further adjoining	
						possibly from same	
						dish	
	3	-	1	2	BGRE	2 sherds from single	C17th –
						vessel	C19th
	1	-	1	-	RSW	Reddish buff with	C14th –
						slate grey fabric,	C15th
	7			1	D) (D	purple iron wash	C17:1
	7	-	-	1	PMR	All green glazed	C17th –
	1			-	CDM	Dan tila	early C18th
	1	=	_	-	CBM	Pan tile	Post medieval
			j				medievai

	т.	1	1		T	T	
	1	-	-	-	RSW	Tiger glaze	C16th -
						Raeren/Aachen	C17th
						stoneware which has	
						been slightly	
						underfired	
	2	-	-	-	Glass	Opalescent,	Medieval –
						laminating surface,	C19th?
						from bottles	
		2	-	-	Glass	From window panes	C16th -
						•	C20th
	-	1	_	_	TGE	Plain white	C16th –
						undecorated glaze	C18th
	2	1	_	_	ISW	White salt glazed	C18th
	2	_	_	<u> </u>	CBM	Pan tile	Post
	_				021.1	1 411 4114	medieval
	_	2	_	<u> </u>	CBM	Brick	C18th –
		-			CBW	Bilek	early C19th
	_	_	_	_	Mortar	1 very large lump	carry cryan
	_	_	-	_	Iron	2 nails with square	Historic
						cross section shafts	111500110
	_	_	_	_	Bone	1 piece of large	_
						mammal	
	1	-	-	_	PMR?	High quality green	C17th –
						and brown glaze,	early C18th
						probably not Scottish	
	2	-	_	_	PMR&O?	Adjoining, unglazed	C17th –
	-					sherds	C19th
	1	-	=.	-	LMWG?	Thinner walled than	C15th –
	_					would be expected	C18th
						for LMWG, fabric	2 2 3 444
						not terribly similar	
						either	
	1	_	_	_	Porcelain	High quality hand-	C17th –
	1	-			1 orcciain	painted enamels in	C17th – C19th
						light blue, orange,	CIPUI
						cream, gold, white	
]			<u> </u>		and greyish	

 \underline{Key} : PMR&O = Post medieval reduced and oxidised wares, LMWG = Late medieval white gritty, CBM = Ceramic building material, RSW = Rhenish stoneware, SW = slipware, BGRE = brown glazed red earthenware, TGE = Tin glazed earthenware, ISW = Industrial stoneware.