

**SILCHESTER CORNER PILLBOX  
SOUTHEND ROAD  
SOUTHEND-ON-SEA  
ESSEX**

**ARCHAEOLOGICAL  
RECORDING**



**Essex County Council  
Field Archaeology Unit**

**May 2006**



**SILCHESTER CORNER PILLBOX  
SOUTHEND ROAD, SOUTHEND-ON-SEA  
ESSEX**

**ARCHAEOLOGICAL  
RECORDING**

Prepared By: Matthew Pocock  Position: Project Officer	Signature:  Date:
Approved By: Patrick Allen  Position: Project Manager	Signature:  Date:
Approved By: Mark Atkinson  Position: Unit Manager	Signature:  Date:

Document Ref.	1590pillboxrep.doc
Report Issue Date	9 May 2006
Circulation	Bidwells for Thorpe Bay Estate Company
	Southend Borough Council
	Southend Museum
	National Monuments Record

As part of our desire to provide a quality service, we would welcome any comments you may have on the content or the presentation of this report.

Please contact the Archaeological Fieldwork Manager, at the  
Field Archaeology Unit,  
Fairfield Court, Fairfield Road, Braintree, Essex CM7 3YQ  
Tel: 01376 331470  
Fax: 01376 331428



## CONTENTS

	Page
<b>Summary</b>	1
<b>1.0 Introduction</b>	3
<b>2.0 Background</b>	4
2.1 Location and Condition	4
2.2 Historical Background	4
2.3 Previous Work	4
<b>3.0 Method</b>	5
<b>4.0 Description</b>	5
<b>5.0 Conclusions</b>	6
<b>Acknowledgements</b>	8
<b>Bibliography</b>	8
<b>Website References</b>	8

## APPENDICES

<b>Appendix 1:</b> Defence of Britain Database Report	9
<b>Appendix 2:</b> Pillbox Survey Record (Nash 2001)	10
<b>Appendix 3:</b> Pillbox Type	11
<b>Appendix 4:</b> Southend Sites and Monuments Record Summary	12

## FIGURES

<b>1</b> Location plan	13
<b>2</b> Plan of the pillbox	14
<b>3</b> Elevations of the pillbox	15

## PLATES

<b>1.</b> Pillbox location	16
<b>2.</b> South-east facing side of pillbox (section 1)	16
<b>3.</b> Entrance to pillbox (section 3)	17

Front cover: GPS survey of pillbox



**SILCHESTER CORNER PILLBOX  
SOUTHEND ROAD, SOUTHEND-ON-SEA**

**ARCHAEOLOGICAL  
RECORDING**

**SUMMARY**

**Client:** Bidwells for Thorpe Bay Estate Company Ltd

**ECC FAU Project No:** 1590

**NGR:** TQ 9162 8739

**Planning Ref:** SOS/00/00235/FUL

**Date of Fieldwork:** 11 April 2006

*The Essex County Council Field Archaeology Unit recorded a World War II pillbox at Silchester Corner during widening of Southend Road for the construction of an access road for a golf course development at Bournes Green, north of Thorpe Bay, Southend-on-Sea. The recording was carried out on behalf of Thorpe Bay Estate Company Ltd as part of a condition on planning consent.*

*A large number of pillboxes were constructed along the Essex coast in 1940-1 as part of the "coastal crust" of the defences against invasion. The Silchester Corner pillbox was a modified example of the type FW3/22 design produced by Branch FW3 of the War Office Directorate of Fortifications and Works. It had previously been recorded in 1998 as part of the Defence of Britain project and in 2001 during a survey and assessment carried out for Southend-on-Sea Borough Council, but the recent recording was carried out to provide an enhanced drawn and photographic record.*

*The pillbox was hexagonal in plan with loopholes on five sides and an entrance on the sixth. It was unusual in that it had been modified by the addition of a thick concrete skirt up to the base of the loopholes, around which steel plates were added both externally and internally. The pillbox was part of a stop-line extending from the Thames estuary to the river Roach, protecting the Southend peninsular from a landing to the east. Since it was recorded the pillbox has been demolished to meet Essex County Council Highways requirements for a clear line of sight along the realigned Southend Road. A second example of a modified type FW3/22 pillbox survives at the southern limit of the proposed Bournes Green golf course.*





## **1.0 INTRODUCTION**

The Essex County Council Field Archaeology Unit (ECC FAU) recorded a World War II pillbox at Silchester Corner during widening of Southend Road for the construction of an access road for a golf course development at Bournes Green, Southend-on-Sea. The recording was carried out on behalf of the Thorpe Bay Estate Company, as advised by Bidwells, their planning consultant, under a condition on planning consent (SOS/00/00235/FUL). The recording followed a recent archaeological desk-based assessment of the golf course site, which identified the pillbox as a standing structure of historical and archaeological significance (Heppell 2006).

The proposed golf course covers 74 hectares of land at Bournes Green, to the east of central Southend and to the north of Thorpe Bay. The initial stage of development consisted of widening the south side of Southend Road to incorporate a central slip lane as part of the construction of the golf course access road. The road widening required a clear line of site towards Silchester Corner, so roadside trees, shrubs and other vegetation were cleared by mechanical excavator. The new road alignment passed very close to the pillbox so ECC FAU advised that an archaeological survey be undertaken pending a decision on preservation or demolition. Although the pillbox had previously been recorded as part of the Defence of Britain Project and in a follow-up survey for Southend Borough Council (Nash 2001), a more detailed survey was needed to create an enhanced drawn and photographic record. The pillbox was subsequently demolished to meet the requirements of Essex County Council Highways for a clear line of sight along the new road alignment.

Copies of the report will be distributed to the Thorpe Bay Estate Company, Bidwells, Southend Borough Council Planning Department and Southend Borough Council Museum. An Online Access Index of Archaeological Investigations form (OASIS) (<http://ads.ahds.ac.uk/project/oasis>) will be completed, including an uploaded copy of the report. The project archive will be deposited at Southend Borough Museum.

## **2.0 BACKGROUND**

### **2.1 Location and Condition**

The pillbox was located 85m east of Silchester Corner on the south side of Southend Road (TL 9162 8739). It lay 1.2m to the south of the original line of Southend Road, but immediately adjacent to the new line of the road following the widening works. It had previously been overgrown by thick vegetation, but this was cleared before the recording took place. The pillbox was in good condition with damage confined to corrosion of the metal face plates, and erosion of the external render and collapse of several corner pieces.

### **2.2 Historical Background**

By 27 May 1940 Churchill had put General Sir Edmund Ironside, Commander-in-Chief Home Forces, in charge of organising Britain's defence. Ironside had a large force at his disposal, but one that was poorly armed and trained. To counter this Ironside set up a static system of defence which, he hoped, could delay German invasion forces after landing and so give Britain time to bring its small mobile reserves into play.

The key to Ironside's plan in southeast England was to construct a series of barriers or stop-lines. These utilised natural and man-made features such as rivers, canals and railway embankments, and comprised concrete pillboxes, gun emplacements, anti-tank obstacles, trench systems, minefields and barbed wire entanglements.

Pillboxes were the most common of these defences and Branch FW3 of the War Office Directorate of Fortifications and Works circulated standard plans for approximately twelve types. In the southeast many hundreds were built in 1940-1, comprising a variety of types. However, throughout the country various local variations were made to these designs and others were purpose-built.

### **2.3 Previous Work**

The Defence of Britain Project, which ran from 1995 to 2002, provides the main source information on surviving pillboxes across the country; the results of the project form a database that is accessible online (<http://www.britarch.ac.uk/projects/dob/>). The aim of the project was to collate existing information and document unknown

features and monuments that have survived. The project relied upon amateur involvement and study of existing documentation such as written sources and aerial photographs to identify monuments, whose details were then checked by site visits.

The pillbox was recorded in 1998 during the Defence of Britain Project and was designated a type FW3/22 (Appendix 1). Mr Fred Nash, a local expert in World War II defences, carried out a follow-up survey for Southend Borough Council in 2001 and interpreted the structure as a variation of type FW3/24 (Nash 2001; Appendix 2). The pillbox is also recorded on the Southend Sites and Monuments Record (SSMR 20392). The contradicting identifications of the pillbox type are almost certainly a result of its overgrown state, which prevented access for detailed recording. The present report concludes that the pillbox was in fact a type FW3/22 as originally designated in 1998; this is discussed in detail below (5.0 Conclusions).

### **3.0 METHOD**

The aim of the recording was to provide an enhanced record of the pillbox, building on the two previous descriptions that had been made (Appendices 1 and 2). The fieldwork mainly involved a survey, production of detailed plans and elevations, and a comprehensive up-to-date photographic record.

Prior to the start of the fieldwork the vegetation was cleared and the pillbox fully exposed. The pillbox was recorded by GPS (global positioning system) survey, tying it in to Ordnance Survey (Fig 1) and plotting its external dimensions (Fig 2). Detailed measurement enabled several large-scale internal and external elevations to be drawn (Fig 3). Selected photos are reproduced here as Plates 1 to 3; the remainder are held in the project archive.

### **4.0 DESCRIPTION**

As originally constructed the pillbox consisted of a regular hexagon 3.4m across, with walls 2.0m long externally and 0.27m thick (Fig 2). The pillbox was around 2.2m high with an internal headroom of 1.7m (Fig. 3). A loophole or gun slot, splayed to provide a field of fire, was located on each wall (Plates 1 and 2), though apparently not on the western wall where the entrance was located (Plate 3). Internal structures included a

Y-shaped blast screen (Fig 2) and wooden fixings that would have supported a shelf under each loophole (Fig 3).

The pillbox was modified through the addition of a thick concrete skirt up to the level of the base of the loopholes. This skirt was also hexagonal in plan and of regular dimensions, and each face was 3.1m long, 1.3m high and 0.93m thick (Figs 2 and 3). The original pillbox wall and the added skirt give an overall thickness of 1.2m around the lower portion of the pillbox. The skirt was constructed by building an outer wall of brick on a concrete pad around the original pillbox, and then filling the space in between with concrete. The outer skin of bricks was one brick thick and rendered to give an overall concrete finish.

The pillbox was also modified to strengthen it above the concrete skirt, with 5/8" thick steel plates bolted onto the wall faces around the five loopholes both externally and internally (Fig 3). Concrete was also added to extend the north-western and south-western faces of the upper part of the pillbox to reinforce the entrance in the west wall (Fig. 2; Plate 3).

## **5.0 CONCLUSIONS**

The recent fieldwork has ensured that the pillbox has been recorded in detail, although it has highlighted inconsistencies between each of the previous records. The record made in 1998 during the Defence of Britain project identified the pillbox as a type FW3/22 (Appendix 1) but the 2001 survey for Southend-on-Sea Borough Council identified it as a type FW3/24 (Appendix 2).

The recent work confirms that the pillbox was in fact a type FW3/22. Pillbox types 22 and 24 are very similar, in that both are hexagonal with loopholes in five sides and an entrance in the sixth, and the main difference is that type 24 forms a slightly irregular hexagon with a longer side for the entrance (Appendix 3). The Silchester Corner pillbox is clearly a regular hexagon of type 22, although the later additions, especially around its entrance, complicate its identification. It would be easy to confuse the two different pillbox types if there was no opportunity for recording a complete ground plan and set of elevations. The 2001 survey correctly recognised that the entrance arrangement was non-standard, but drew the wrong conclusions over the precise pillbox type from the lack of a detailed overall survey.

Type 22 pillboxes were very common, but the Silchester Corner example is unusual in the addition of the thick concrete skirt around the lower part of the pillbox and steel face plates around the loopholes. This would have given extra protection from tanks or artillery, while the metal plates would have strengthened the surrounds of the loopholes against sustained gunfire. The addition of a reinforced entrance may have reduced the height of the original entrance and masked a small loophole that is commonly found either above or beside the entrance on pillboxes of this type. An identical modified type 22 pillbox can be found at Bournes Green Chase, at the southern edge of the proposed Bournes Green golf course development (SSMR 20393).

The Silchester Corner and Bournes Green Chase pillboxes commanded two of the roads approaching Southend from the east, and this may be the reason that they were provided with additional protection. They formed part of a stop-line denoted by further pillboxes stretching from the Thames estuary at Thorpe Bay towards the mouth of the river Roach to the north (Heppell 2006, fig. 3). They would have been positioned to defend the peninsula between Southend and Rochford, forming part of the “coastal crust” defensive line.

In its original form the Silchester Corner pillbox was built to a standard design that was widely used, but its modifications are unusual, making it more significant. For this reason the 2001 survey and assessment for Southend Borough Council gave the pillbox the top grading, four stars (Nash 2001; Appendix 2). Now that the Silchester Corner pillbox has been demolished, the other known pillbox of its type in the Southend area, at Bournes Green Chase to the south, should be preserved *in situ*, as recommended in specialist assessments of the Bournes Green site (Nash 2001; Heppell 2006).

## **ACKNOWLEDGEMENTS**

The Essex CC Field Archaeology Unit thanks the Thorpe Bay Estate Company for commissioning and funding the recording of the pillbox, and Andy Butcher of Bidwells who acted on their behalf in advising on and administering the archaeological work. Matthew Pocock and Andrew Lewsey carried out the fieldwork, Matthew Pocock prepared the report, and Andrew Lewsey produced the digital illustrations. Patrick Allen managed the project and edited the report.

## **BIBLIOGRAPHY**

- Heppell, E.            2006            Land at Bournes Green, Southend –on-sea, Essex. Archaeological Desk-based assessment and site inspection. Issue 1
- Nash, F.              2001            Survey of World War Two Defences in the Borough of Southend-on-Sea.

## **WEBSITE REFERENCES**

- |  |   |                      |   |
|--|---|----------------------|---|
| WWII British invasion history              | <a href="http://www.pillbox-study-group.org.uk">www.pillbox-study-group.org.uk</a>                        | Accessed 13 Apr 2006 | <a href="http://homepages.nildram.co.uk/~loebar/invasionhistory.htm">http://homepages.nildram.co.uk/~loebar/invasionhistory.htm</a>   |
| Pillboxes                                  | <a href="http://www.pillbox-study-group.org.uk">www.pillbox-study-group.org.uk</a>                        | Accessed 13 Apr 2006 | <a href="http://homepages.nildram.co.uk/~loebar/pillboxes.htm">http://homepages.nildram.co.uk/~loebar/pillboxes.htm</a>   |
| Pillboxes                                  | <a href="http://www.pillboxesuk.co.uk/">http://www.pillboxesuk.co.uk/</a>                                 | Accessed 13 Apr 2006 | Information accessed by internal link. Under defence types on the main page   |
| A review of the Defence of Britain Project | <a href="http://www.britarch.ac.uk/projects/dob/">http://www.britarch.ac.uk/projects/dob/</a>             | Accessed 13 Apr 2006 | <a href="http://www.britarch.ac.uk/projects/dob/review/index.html">http://www.britarch.ac.uk/projects/dob/review/index.html</a>   |
| Defence of Britain Project                 | <a href="http://www.britarch.ac.uk/projects/dob/">http://www.britarch.ac.uk/projects/dob/</a>             | Accessed 13 Apr 2006 |   |
| ADS; Archaeological data service           | <a href="http://ads.ahds.ac.uk/catalogue/specColl/dob/">http://ads.ahds.ac.uk/catalogue/specColl/dob/</a> | Accessed 13 Apr 2006 | <a href="http://ads.ahds.ac.uk/catalogue/specColl/dob/index.cfm?CFID=143524&amp;CFTOKEN=92449190">http://ads.ahds.ac.uk/catalogue/specColl/dob/index.cfm?CFID=143524&amp;CFTOKEN=92449190</a> |

**APPENDIX 1: Defence of Britain database, Council for British Archaeology, 2002**

Type 22 pillbox which has undergone considerable reinforcement. A double thickness of concrete has been added up to the height of the bottom of the embrasures. The embrasures have been clad in steel, both internally and externally. (Source: Field Visit 1998/04/17)

Type of site	PILLBOX (TYPE FW3/22)
Location	Southern side of Southend Road by Silchester Corner, Great Wakering
Area	Great Wakering, Essex, England
Grid reference	TQ 916 874 (Scale: 1:50000, 1968)
Period	WW2
Condition	Good
Materials	Clay Brick , Concrete, Steel
Threats	Type: Deterioration (Long Term) Detail: Corrosion of external metal features.
Recorder	Beanse, Alec
Defence grouping	Essex coast defences - Coastal crust defences
Attached Sheets	(5) - One sheet of typed description. One sheet of line drawn plans and elevations and three sheets of photocopied photographs (see attached photos box).
Photographs	(5) - photocopied photographs. Two are general external views. Two are exterior detail and one is of interior detail.
Adjacent sites	Pillbox TQ 921868
Reference	Nash, Fred 1998/06 World War Two Defences in Essex, Interim Report
Event	Construction, In the period 1940 1941 Field Visit, In 1998/04/23

## **APPENDIX 2: Pillbox Survey and Assessment (Nash 2001)**

### **Description**

100 yards E of Silchester Corner, on the south side of Southend Road, is a type FW3/24 'thin-walled' pillbox. It stands in a thicket which totally obscures it from the road although the southern face, overlooking open countryside towards Bournes Green chase, is clear. Its basic structure is 12' 8" across, measured north/south. The south face is 10'5" long: each of the other five faces is 7'3" long. The walls, built of concrete, are 19" thick. Each has a loophole 10" wide x 12" high. Around the lower half of the pillbox is a thick "skirt" of concrete up to the level of the loopholes. These were added, typically, after the original construction to give extra protection. In this case the skirt is 30" thick. On FW3/24 pillboxes the long wall, always at the rear, contains the entrance. This example is different in that the entrance is in one of the short walls and in order to keep this clear the skirt has been omitted from this face of the pillbox.

To compensate for the lack of extra protection to the upper half of the structure, five-eighths-of-an-inch steel plate has been bolted to the surface of the concrete. On the south face, this plate measures 7'2" long x 1'10" high with a cut-out for the loophole. Each of the other faces has been similarly treated. Inside, more steel plating has been added to the walls. The entire upper half has been clad in this way with 2' high sheets in a continuous band around the inside of the pillbox. In the centre is a Y shaped pillar.

### **Site Assessment**

Type FW3/24 pillboxes are not, in themselves, rare. However, the extent of the steel plating added as extras protection is very unusual. At the time of the compilation of this record for the Unitary Authority of Southend-on-sea, just one other (SMR 20393 - N of Bournes Green Chase) has been recorded by the WWII Defences in Essex project. Outside of this feature, and the unusual "short wall; entrance", the pillbox is a good example of a "skirted" Type FW3/24. Every effort should be made to ensure its continued survival, ultimately to Scheduled Ancient Monument status.

**Grading:** 4 Star



### **APPENDIX 3: Pillbox Types**

#### **Type 22 pillbox**

Type 22 is the most common design. It is a regular hexagon with walls approx 0.3m thick by 1.8m long. Most have a loophole on each side of the hexagon, apart from the side with the entrance, however some have a low entrance so that so that an additional loophole can be accommodated or a smaller loophole next to the entrance.  
(Pillboxesuk.co.uk - [http://s134542708.websitehome.co.uk/pillboxes/html/type\\_22\\_0.html](http://s134542708.websitehome.co.uk/pillboxes/html/type_22_0.html))



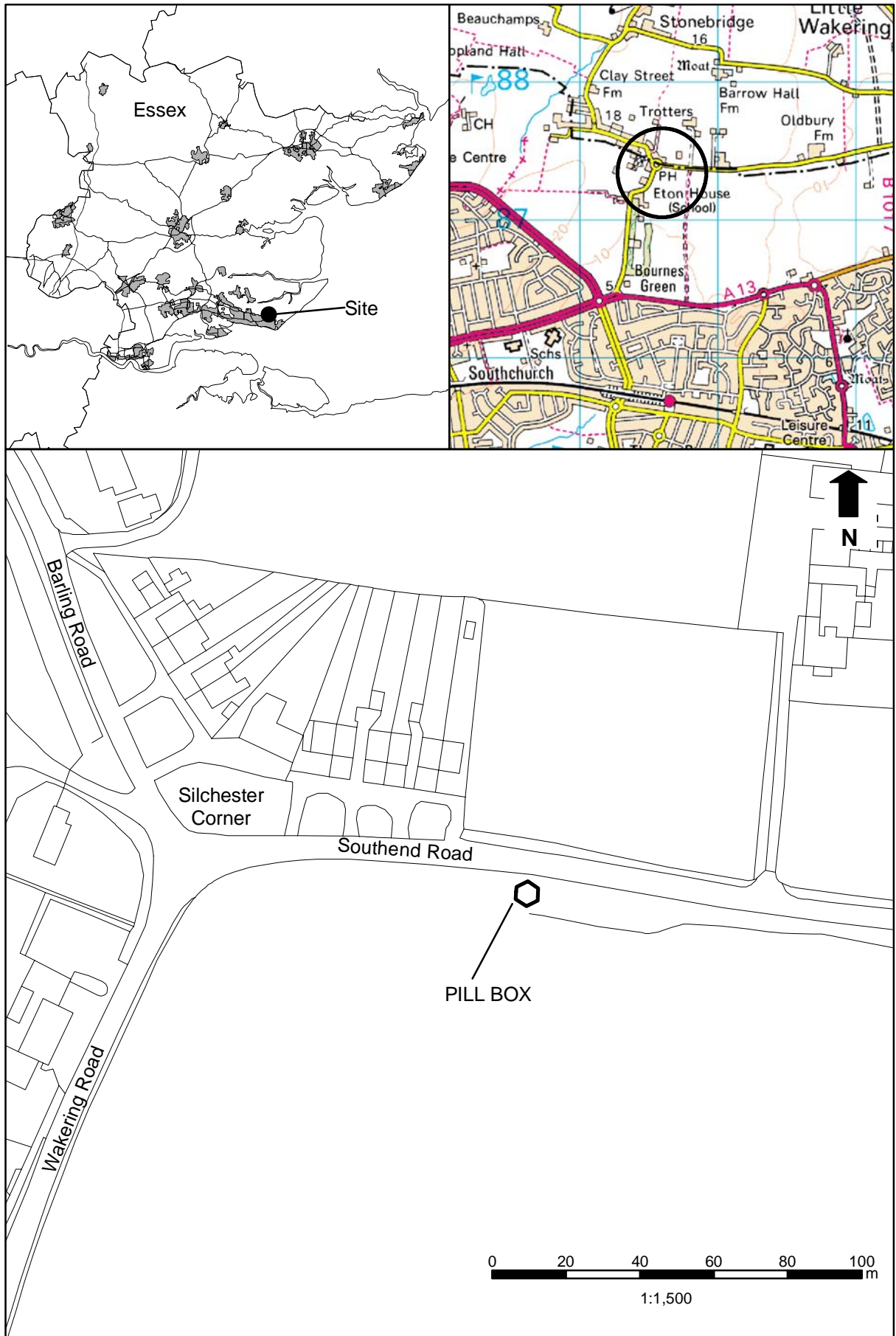
#### **Type 24 Pillbox**

Type 24 is commonly mistaken for the type 22. The type 24 is a slightly irregular hexagon with the rear wall longer than the rest with the entrance and a loophole in the longer wall. The rear wall is approx 3.7m long, with the other walls being 1.8m to 2.5m in length. The walls vary from 0.3m to 1m in thickness.  
(Pillboxesuk.co.uk - [http://s134542708.websitehome.co.uk/pillboxes/html/type\\_24\\_0.html](http://s134542708.websitehome.co.uk/pillboxes/html/type_24_0.html))



#### APPENDIX 4: Southend Sites and Monuments Record Summary

<b>Site name/Address:</b> Pillbox, Silchester Corner, Southchurch, Southend-on-sea	
<b>Parish:</b> Southend-on-Sea	<b>District:</b> Southend-on-Sea
<b>NGR:</b> TQ 9162 8739	<b>Site Code:</b> n/a
<b>Type of Work:</b> Recording	<b>Site Director/Group:</b> M. Pocock, Essex CC FAU
<b>Date of Work:</b> 11 April 2006	<b>Size of Area Investigated:</b> Structure (Pillbox)
<b>Location of Finds/Curating Museum:</b> Southend-on-Sea	<b>Funding source:</b>
<b>Further Seasons Anticipated?:</b> No	<b>Related EHER Nos.:</b>
<b>Final Report:</b> Yes	
<b>Periods Represented:</b> WW2 (1940+)	
<b>SUMMARY OF FIELDWORK RESULTS:</b>	
<p>A pillbox located on the southern side of Southend Road by Silchester Corner, Southend-on-Sea was archaeologically recorded in advance of road works undertaken in conjunction with planning application SOS/00/00235/FUL for construction of a golf course. The aim of the work was to update and enhance the previous record made during 1998 as part of the Defence of Britain project and a follow-up survey carried out in 2001 by Fred Nash for Southend Borough Council.</p> <p>The recording confirmed that the pillbox was a modified example of the type FW3/22 design produced by Branch FW3 of the War Office Directorate of Fortifications and Works. It was hexagonal in plan with gun embrasures on five sides and an entrance on the sixth. It was unusual in that it had been modified by the addition of a thick concrete skirt up to the base of the gun embrasures, around which steel plates were added both externally and internally. The pillbox was part of a stop line extending from the Thames estuary to the river Roach, protecting the Southend peninsular from a landing to the east.</p> <p>Since it was recorded the pillbox has been demolished to meet Essex County Council Highways requirements for a clear line of sight along the realigned Southend Road. A second example of a modified type FW3/22 pillbox survives at the southern limit of the proposed Bournes Green golf course.</p>	
<b>Previous Summaries/Reports:</b> Nash 2001 survey and assessment for Southend BC	
<b>Author of Summary:</b> Matthew Pocock	<b>Date of Summary:</b> May 2006



Mapping reproduced by permission of Ordnance Survey on behalf of the Controller of HMSO. Crown copyright. Licence no.LA100019602.

Fig.1. Location plan

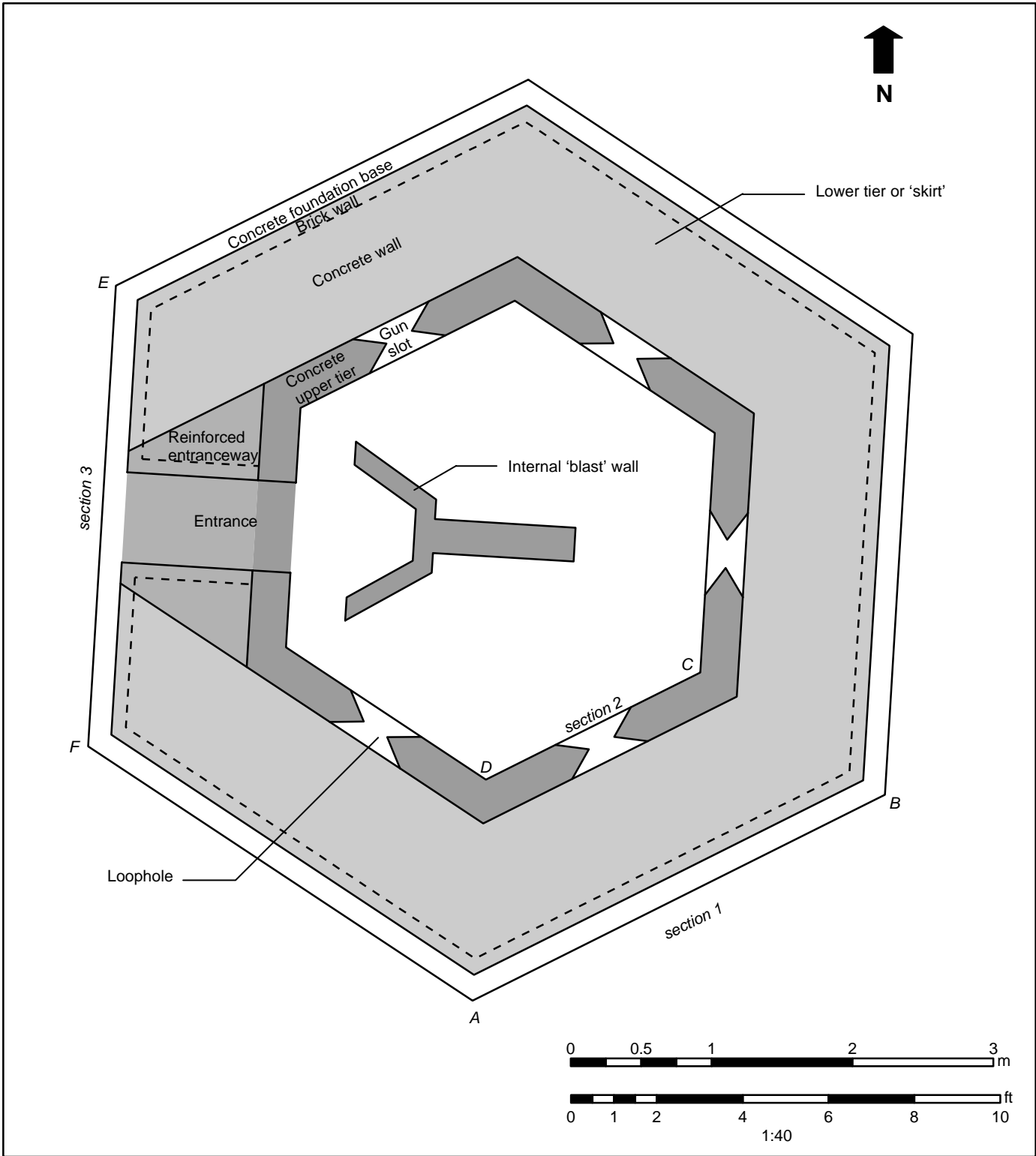


Fig.2. Plan of the Pill Box

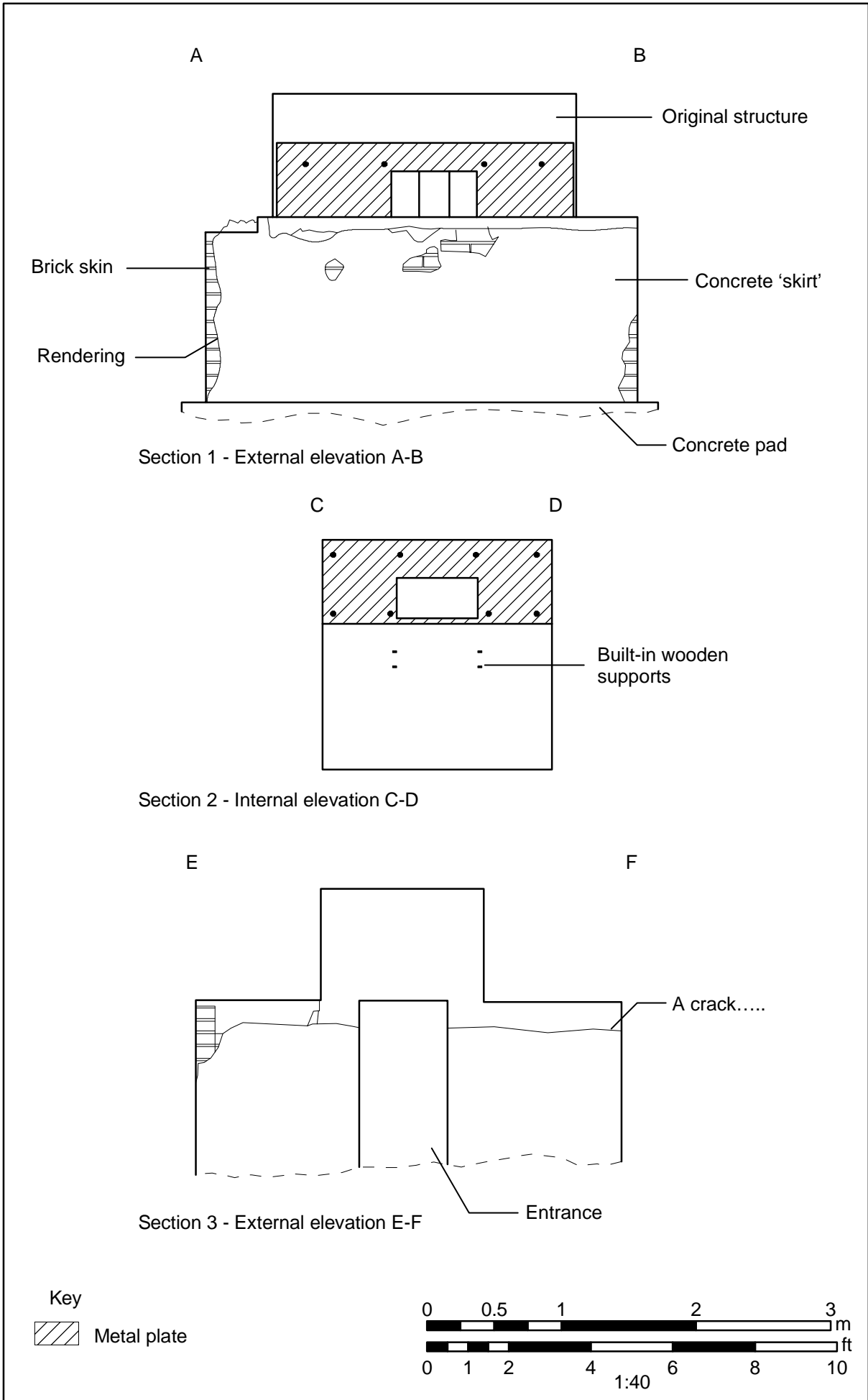


Fig.3. Pill Box elevations





**Plate 1.** Pillbox location



**Plate 2.** South-east facing side of pillbox (section 1)





**Plate 3:** Entrance to the Pillbox (section 3)