

**THE FORMER INGLIS BARRACKS,
MILLBROOK PARK, MILL HILL,
LONDON BOROUGH OF BARNET**

**AN ARCHAEOLOGICAL
EVALUATION & EXCAVATION**

**LOCAL PLANNING AUTHORITY:
LONDON BOROUGH OF BARNET**

PCA REPORT NO: 11570

SITE CODE: FIB12

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**THE FORMER INGLIS BARRACKS, MILLBROOK PARK, MILL HILL, LONDON
BOROUGH OF BARNET**

AN ARCHAEOLOGICAL ASSESSMENT REPORT

Site Code: FIB12

Central NGR: TQ 2408 9211

Local Planning Authority: London Borough of Barnet

Commissioning Client: The Inglis Consortium

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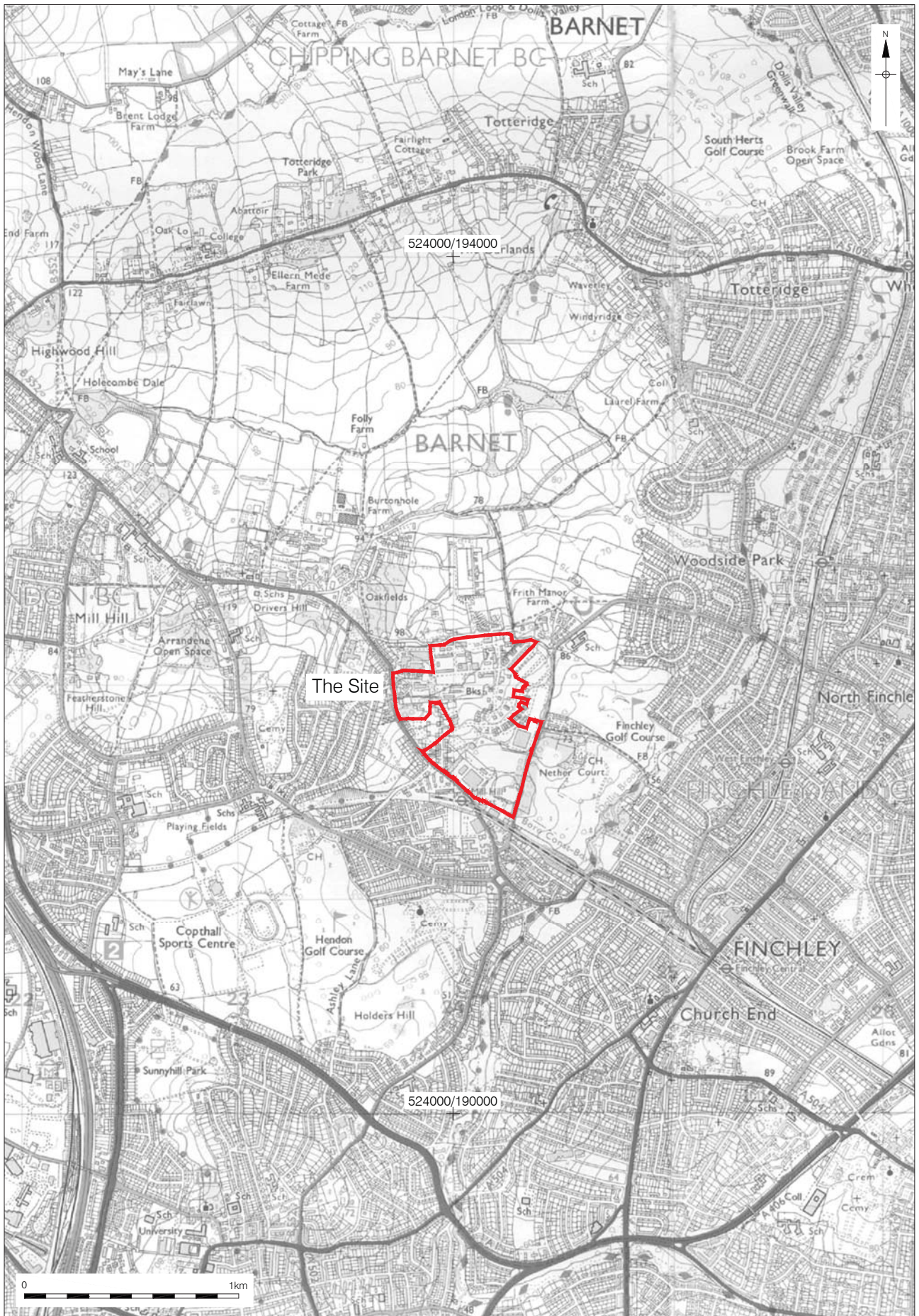
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1 Abstract

- 1.1 An archaeological investigation was undertaken by Pre-Construct Archaeology Limited in three stages between February 2012 and July 2013 at the Former Inglis Barracks, Millbrook Park, Mill Hill, London Borough of Barnet.
- 1.2 The Stage 3 evaluation of the “Sports field site” and subsequent mitigation encountered evidence for prehistoric activity in the form of pits, stake/post holes, a small fire pit and a possible surface layer. These features attest to the possibility of a temporary camp having established itself here during this period. In addition to this the Stage 1 evaluation found evidence for post-medieval agricultural activity in the form of plough marks/cart ruts, and residual finds attested to Roman and medieval activity within the locality, although no features of this date were observed. Two of the Stage 1 evaluation trenches, located in an area to the north of the site, located the remains of Edwardian era structures pertaining to the first phase of construction at the Former Inglis Barracks. A subsequent Stage 2 ‘Strip, Map and Record’ exercise revealed at least 30 walls with numerous concrete foundations and service runs comprising three separate buildings; the Cook House, ‘A’ Block Dining Room and ‘B’ Block Dining Room of the complex. Within each building a number of rooms were encountered which, following analysis of relevant documentary evidence, have been identified as food store rooms, wash-ups, a larder, a bathroom, the prep room and a basemented boiler room which contained a coal chute and the remains of the boiler itself. A number of other ancillary buildings were encountered across the site demonstrating a total of three phases of activity during the lifespan of the barracks.
- 1.3 During the Stage 1 & 3 evaluations natural clay deposits were recorded between 101.84m OD at the north of the site and 70.35m OD to the south of the site. During the Stage 2 ‘Strip, Map and Record’ exercise the natural was observed between 103.29m OD and 103.09m OD.

2 Introduction

- 2.1 An archaeological investigation was undertaken by Pre-Construct Archaeology Limited at the Former Inglis Barracks, Millbrook Park, Mill Hill, London Borough of Barnet in three stages (Figures 1 & 2).
- 2.2 Stage 1 comprised a field evaluation undertaken in February 2012 consisting of 21 trenches in locations deemed to address a series of research questions submitted and approved in a Written Scheme of Investigation (WSI) (Halcrow 2011). Following the discovery of extant archaeological remains relating to the earliest phase of the Former Inglis Barracks, Stage 2 works were undertaken in September 2012 and, following a delay due to contamination concerns, were completed in January 2013. The Stage 3 evaluation of The Sports field site) which comprised 4 additional trenches and a subsequent mitigation trench, took place in the southern area of the site in July 2013.
- 2.3 In addition to the Halcrow document, Pre-Construct Archaeology had prepared a Written Scheme of Investigation covering the Stage 2 and 3 projects (Moore 2012 & 2013) which were approved by Kim Stabler and Sandy Kidd respectively of English Heritage (GLAAS), who acted as advisors to the local authority, LB Barnet.
- 2.4 The Stage 1 & 3 evaluations were supervised by Ian Cipin of Pre-Construct Archaeology and the Stage 2 strip, map and sample exercise was supervised by the author of this report.
- 2.5 The site at Millbrook Park is bounded by Partingdale Lane to the north, The Ridgeway and Bittacy Hill to the west, Bray Road and Drew Avenue to the south and Firth Lane to the east. The very north of the site lies along Mill Hill Ridge, with most of the site sloping downwards towards the south.
- 2.6 The plans for the land comprise the comprehensive redevelopment of the site (excluding the area currently in use by the scouts) for residential-led mixed use units, involving the demolition of all existing buildings (excluding the former Officers Mess) and ground re-profiling works, to provide 2174 dwellings, a primary school, GP surgery, 1100sqm of 'High Street' uses, 3470sqm of employment uses, a district energy centre, and associated open space, means of access, car parking and associated infrastructure (GVA Grimley 2009).
- 2.7 The work was commissioned by The Inglis Consortium. The site is centred at NGR TQ 2408 9211. (Figures 1 & 2). The fieldwork was undertaken using the site code **FIB12**.



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Figure 1
 Site Location
 1:25,000 at A4

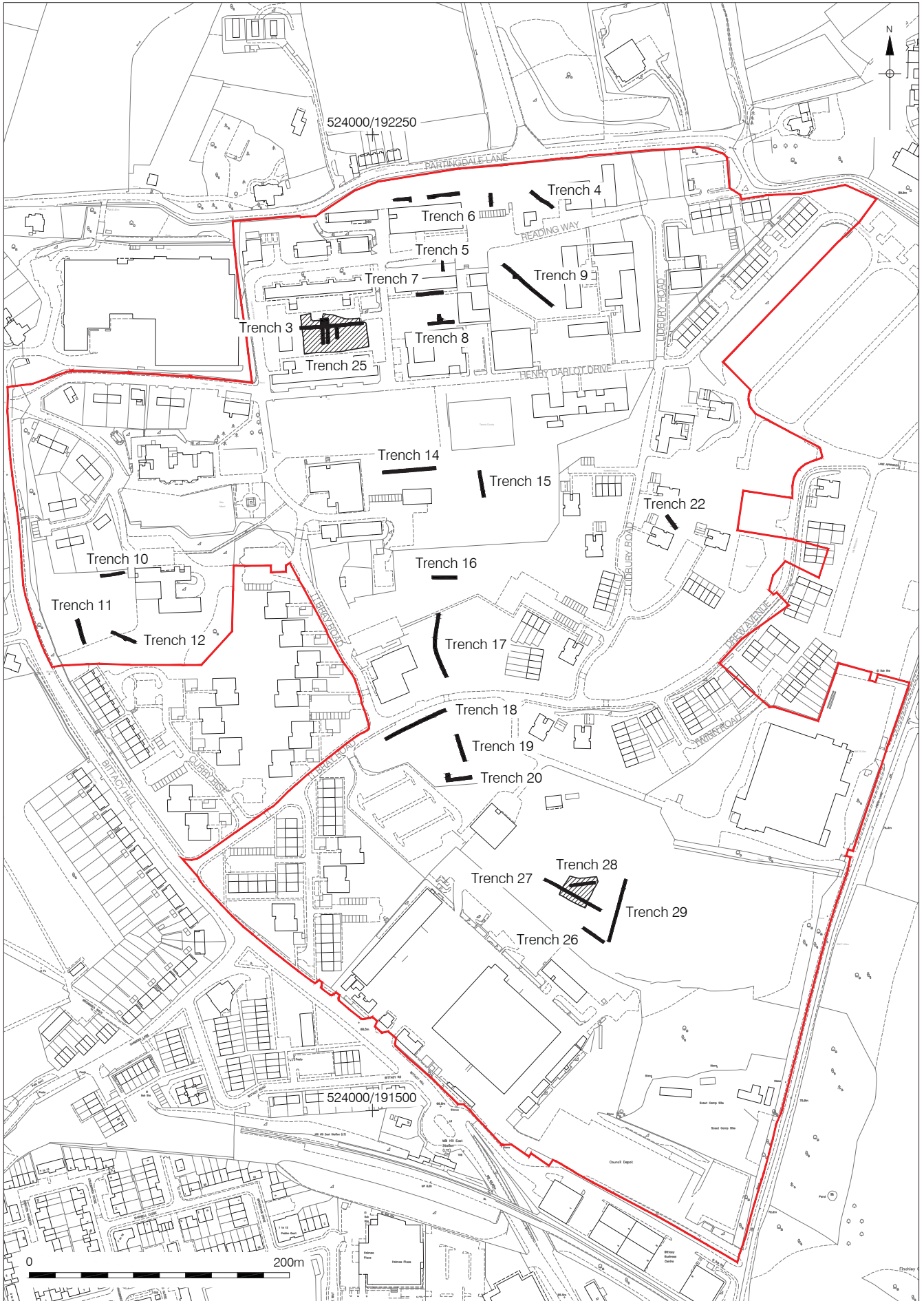


Figure 2
 Detailed Site and Trench Location
 1:4,000 at A4

3 Planning Background

3.1 The proposed development of the site is subject to planning guidance and policies contained within the National Planning Policy Framework (NPPF), The London Plan and policies of the London Borough of Barnet which fully recognise the importance of the buried heritage for which they are the custodians.

3.2 Regional Policy: The London Plan

3.2.1 The London Plan, published July 2011, includes the following policy regarding the historic environment in central London:

POLICY 7.8 HERITAGE ASSETS AND ARCHAEOLOGY

Strategic

A London's heritage assets and historic environment, including listed buildings, registered historic parks and gardens and other natural and historic landscapes, conservation areas, World Heritage Sites, registered battlefields, scheduled monuments, archaeological remains and memorials should be identified, so that the desirability of sustaining and enhancing their significance and of utilising their positive role in place shaping can be taken into account.

B Development should incorporate measures that identify, record, interpret, protect and, where appropriate, present the site's archaeology.

Planning decisions

C Development should identify, value, conserve, restore, re-use and incorporate heritage assets, where appropriate.

D Development affecting heritage assets and their settings should conserve their significance, by being sympathetic to their form, scale, materials and architectural detail.

E New development should make provision for the protection of archaeological resources, landscapes and significant memorials. The physical assets should, where possible, be made available to the public on-site. Where the archaeological asset or memorial cannot be preserved or managed on-site, provision must be made for the investigation, understanding, recording, dissemination and archiving of that asset.

LDF preparation

F Boroughs should, in LDF policies, seek to maintain and enhance the contribution of built, landscaped and buried heritage to London's environmental quality, cultural identity and economy as part of managing London's ability to accommodate change and regeneration.

3.3 Local Policy: The London Borough of Barnet – Adopted Local Plan: Core Strategy DPD

3.3.1 Barnet's heritage

3.3.1.1 Barnet has a broad range of heritage assets including Conservation Areas, Listed Buildings, Registered Historic Parks and Gardens, Locally Listed Buildings, Scheduled Ancient Monuments, a Historic Battlefield site and Local Areas of Archaeological Significance. Heritage assets can be used to ensure continued sustainability of an area and promote a sense of place.

3.3.1.2 We will conserve the historic significance of heritage assets and their settings. Such assets are designated because of their special architectural or historic interest and their character or appearance.

- 3.3.1.3 Barnet's Conservation Areas are of varying size and character, ranging from the large garden suburb estates at Hampstead Garden Suburb to historic settlements at Monken Hadley, Mill Hill and Totteridge, a small 19th Century model farm (College Farm, Finchley) and workers cottages at the Railway Terraces in Cricklewood. Our Conservation Areas are shown on the Proposals Map.
- 3.3.1.4 We also need to protect and enhance our other heritage assets. Barnet has a rich archaeological and architectural heritage which includes the only Historic Battlefield (Battle of Barnet – 1471) in London. Nearly forty sites of archaeological importance containing prehistoric, Roman and medieval remains have been identified across the borough. In terms of buildings of historic and architectural importance in Barnet there are over 2,200 Listed Buildings and 1,600 buildings on the Local List. In addition there are two Scheduled Ancient Monuments at Brockley Hill in Edgware and Manor House in Finchley, three registered Historic Parks and Gardens at St Marylebone Cemetery, Avenue House Garden and Golders Green Crematorium. We will consult with English Heritage over proposals affecting these parks and gardens and on all heritage assets where appropriate. In assessing proposals affecting heritage assets we will use guidance on Understanding Place and Building in Context produced by English Heritage
- 3.3.1.5 The NPPF (para 126) supports a positive, proactive strategy for the conservation of the historic environment. We can demonstrate that through our rolling programme of Conservation Area Character Appraisals (CACA) that provide further guidance on the characteristics of these areas. The Appraisals detail how the gradual erosion of traditional features, materials and details undermines character and set out actions to halt and reverse this trend. This can include a review of boundaries. We expect to have complete coverage of CACAs by 2013 and our aim is that no Appraisal is more than five years old.
- 3.3.1.6 We will also continue to review our Local List (established 1986) which identifies buildings of local importance. We will aim to ensure that the special character and historic significance of such buildings is protected and enhanced. We will develop a mechanism that will enable community engagement on the Local List and for suggestions to come forward for additional buildings that make a contribution to Barnet's historic character.
- 3.3.1.7 An important element of the production of Barnet's Characterisation Study was the involvement of local amenity societies and community groups whose local knowledge helped shape the Study. As part of the engagement suggestions were welcomed on examples of buildings or streets that were strongly liked or disliked. These examples further informed the Study.
- 3.3.1.8 We will continue to broaden our knowledge of Barnet's heritage using new and accessible sources of information such as the London Inventory of Historic Green Spaces which lists over 100 largely formal green spaces of historic significance in Barnet including public parks, churchyards and cemeteries.

3.3.1.9 Barnet's archaeological heritage is a valuable education and community resource. As Barnet changes it is important that development proposals in areas of archaeological significance help broaden our knowledge of the past as a result of properly conducted on-site investigations. Further details on our approach to protecting our archaeological heritage is set out in Policy DM06 – Barnet's Heritage and Conservation.

3.3.2 Policy CS 5 - Protecting and enhancing Barnet's character to create high quality places

Heritage and Character

3.3.2.1 We will work with partners to proactively protect and enhance Barnet's heritage including conservation areas, listed buildings, locally listed buildings, registered parks and gardens; scheduled monuments, areas of archaeological significance and London's only battlefield site.

3.3.2.2 We will require proposals within or affecting the setting of heritage assets to provide a site assessment which demonstrates how the proposal will respect and enhance the asset. Policy CS 13 addresses the adaptation of heritage assets to reduce carbon emissions and ensure efficient use of natural resources.

3.3.2.3 We will ensure through our programme of Conservation Area Character Appraisals that these areas are protected and enhanced.

3.3.2.4 We will ensure through our Green Infrastructure SPD that the key characteristics of Barnet's landscape (Barnet Plateau and Finchley Ridge) are protected and enhanced

3.3.2.5 We will encourage community involvement in the review of the Local List of important local buildings.

3.3.2.6 The Barnet Characterisation Study forms the baseline for the identification of places with a consistent and coherent architectural character. Within the typologies identified in the Characterisation Study we will through our Development Management Policies DPD and Residential Design Guidance SPD develop a framework to protect and enhance those high quality suburbs in Barnet not protected by Conservation Area designations.

3.3.3 The site is not located in a conservation area or an area of archaeological importance.

4 Geological and Topographic background

- 4.1 The Mill Hill /Totteridge area is formed by a number of steeply sloping and narrow valleys containing feeder streams of the Thames.
- 4.2 The underlying geology of the area consists of London Clay which overlain by soils of the Windsor Association. These soils are slowly permeable and seasonably waterlogged clays mostly with brown subsoils.
- 4.3 An outlier of the Claygate Beds overlies the London Clay towards the northern part of the site. The London Clay is some 70m thick at this location and is, in turn, underlain by Woolwich and Reading Beds of the Lambeth Group and Upper Chalk, a soft, white, fine-grained fissured limestone with horizons of flint nodules. The chalk is present at a depth of about 100m BGL in the vicinity of the site.
- 4.4 During the Stage 1 evaluation the London Clay was encountered between 101.84m OD towards the north of the site and 76.70m OD to the south. During the 'Strip, Map and Record' exercise the natural was recorded between 103.09m OD and 103.29m OD. The Stage 3 evaluation recorded natural clay between 70.35m OD and 71.02m OD.
- 4.5 This demonstrates that the natural topography mirrors the present day topography in that the northern part of the site lies on higher ground, sloping down to the south. The area with the highest concentrations of barrack buildings (towards the north-west of the site) appears to have been sited on some the highest ground of the site.

5 Archaeological & Historical Background

5.1 This archaeological and historical background combines data gathered from the Desk Based Assessment (Halcrow 2007) and new research undertaken by Guy Thompson of Pre-Construct Archaeology.

5.2 Prehistoric

5.2.1 According to the History of Middlesex, Victoria County Histories, there is no evidence of pre-Roman settlement in the parish of Hendon. In the main this is considered a result of the heavy soils in the borough which ensured a dense forest cover making it unappealing for early settlers. The local SMR identified one record for the prehistoric period – a find-spot of Mesolithic flints in medieval layers of a site found in excavations at Hendon Lane.

5.3 Roman

5.3.1 The local SMR identified five records dating to the Roman period. These include 4 Roman roads/road surfaces all lying to the south west of the site.

5.3.2 A surface at the Hendon Golf Course has been interpreted as the viatores 167, part of the Roman road system in Britannia, which ran from Saint Albans to London. A Roman road surface was also revealed at Copthall Fields during an excavation in 1967, and was found with associated pottery. A coin of the Emperor Hadrian was found at number 16 Wolstonbury.

5.4 Medieval

5.4.1 The Parish of Hendon was first referred to in the early medieval period in a charter from 972-8. The local SMR identified one record dating to the early medieval period– a find spot of a Saxon axe which was found while digging the foundation trenches for a roundabout.

5.4.2 The local SMR identified three records dating to the later medieval period and one to the later medieval to post medieval. The later medieval sites include one which is the settlement at Finchley based around Church End – to the south-east of the proposed site of development. An excavation site where material that probably relates to the site of a medieval building, as well as pottery and Mesolithic flints have been identified. There is also one find spot of sherds of 14th century grey coated red ware.

5.4.3 The Medieval to Post-medieval entry records a footpath of possible ancient origin, proposed on the basis of a single coin dating to the reign of Henry II which was found alongside it.

5.5 Post-medieval

5.5.1 The SMR contains 6 entries for the post medieval period and 7 dating to the post medieval to modern period. The former include a post medieval milestone which is Grade II listed; two post medieval cemeteries; - a brick feature potentially being the layout of an 18th century farm complex also present on the earliest OS map of the site (Fig 3) on the site of the former Mill Hill Gas Works. A post medieval pit with undefined finds; and a find spot of pottery

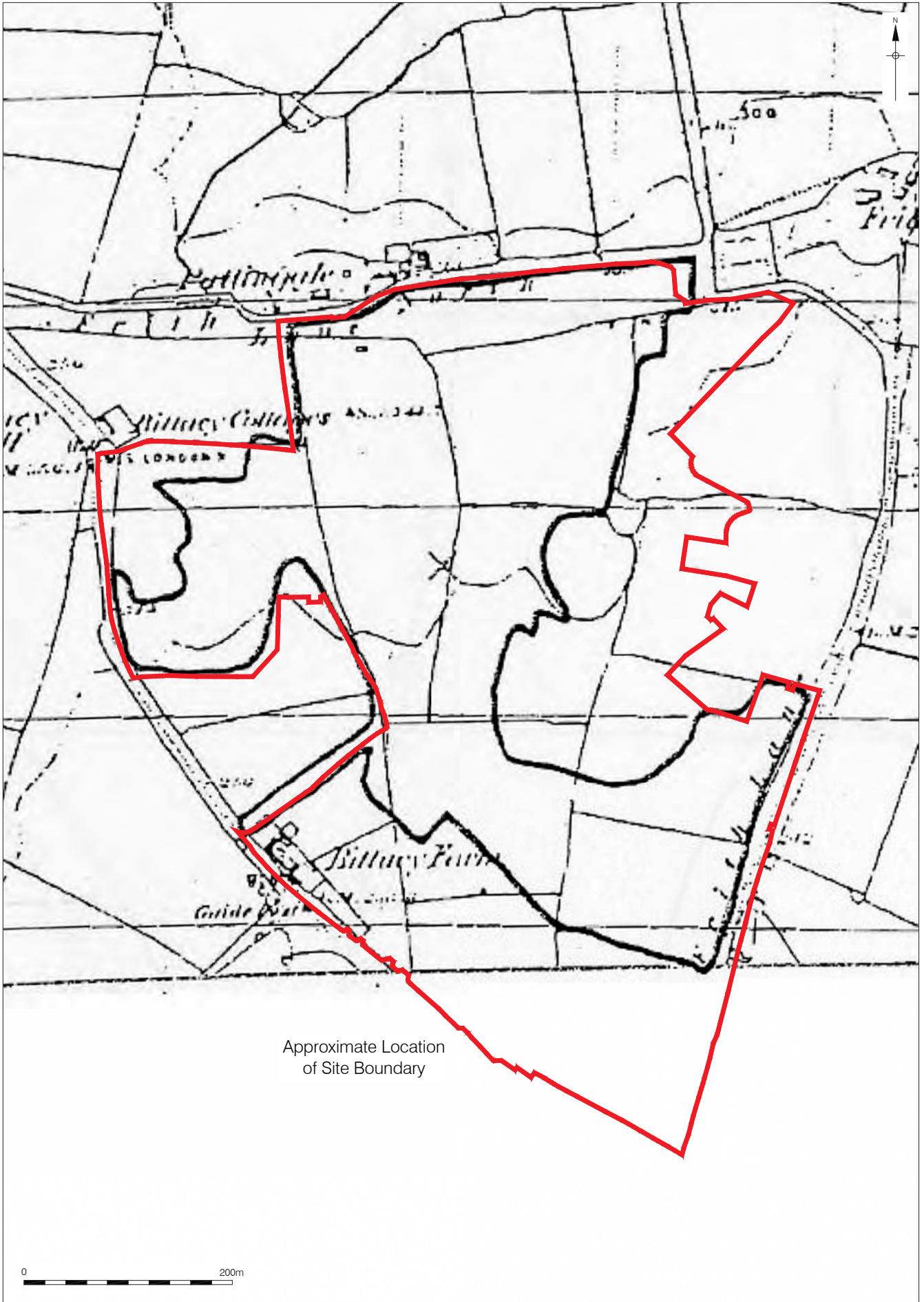


Figure 3
First Edition Ordnance Survey map, 1873
Approx. 1:5,000 at A4

discovered during an excavation in 1970-71.

- 5.5.2 The post medieval to modern entries are all listed structures, and comprise buildings. Many fashionable houses were built during this period, mainly for London merchants. By 1814 Mill Hill itself had become a significant village popular as a result of its proximity to London and also because of its woods and views. The SMR identifies 7 post-medieval to modern Grade II listed buildings – one block of flats; two sets of cottages; one manor house, St Vincent's Convent; a farmhouse; and a set of two houses.

5.6 The Inglis Barracks

The Cardwell and Childers Reforms and the localisation of the British Army, 1872-1881

- 5.6.1 The ties that bind the infantry regiments of the British Army to their places of recruitment were forged in large part by the Military Forces Localisation Act of 1872, the brainchild of Edward Cardwell, Secretary of State for War in William Gladstone's first government. In order to improve the quality and reduce the costs of the Army, Cardwell proposed to tie units to the districts from which they drew their strength by the establishment of permanent depots, each of which would serve as a centre for recruitment, training and accommodation (Douet, 2000: 169). In February 1872 Cardwell introduced plans to create 66 infantry districts in Britain and Ireland, each centred upon a fixed depot which would serve as the regimental headquarters for regular, militia and volunteer units.
- 5.6.2 More than half of the towns selected as centres of the new recruitment districts already had barracks, many of which were subsequently enlarged in order to form depots. These included the Hounslow Cavalry Barracks, at which additional land was purchased in order to create the depot for the Middlesex and Metropolitan districts (*ibid*). Within eight years of the Act, 22 new depots had been built in England and a further 13 barracks extended (*ibid*).
- 5.6.3 The most distinctive feature of the barracks built during the Cardwell era were their 'keeps', strong castellated buildings with iron frames and thick concrete floors designed as fireproof arms stores, from which munitions and equipment could be issued to volunteers and reservists in the event of mobilisation (Osborne, 2012: 95). The keep at Hounslow Barracks erected in 1876 was a brick-built three-storey structure with three towers (*ibid*). In addition to the keeps, accommodation for the troops built during this period represented an improvement on earlier designs. Private soldiers were typically housed in two-storey barrack blocks that contained four 24-man dormitories grouped on either side of a central staircase (Douet, 2000: 173). Washrooms and rooms for NCOs were located beside the staircases, enabling sergeants to supervise their men from a central location. While this layout marked a departure from earlier arrangements, no provision was made for separate dining facilities, which meant that the men had to collect meals from the cookhouse, which they would eat at tables in the dormitories (*ibid*).
- 5.6.4 Cardwell's reforms were extended in 1881 by Hugh Childers, Secretary of State for War in Gladstone's second ministry. Childers' reforms were responsible for the formal

establishment of the 'county' regiments, which formed the backbone of the Infantry until the mid-1950s. Existing foot and county militia formations were renamed and merged into new units named after the counties from which they recruited their manpower, creating new regiments that comprised two regular line battalions and two militia battalions, supplemented by volunteer battalions formed from local Rifle Volunteer units. With the recently established district depots serving as regimental headquarters, the regular battalions would alternate on service at home and abroad, while the militia and volunteer battalions were restricted to home service during peacetime.

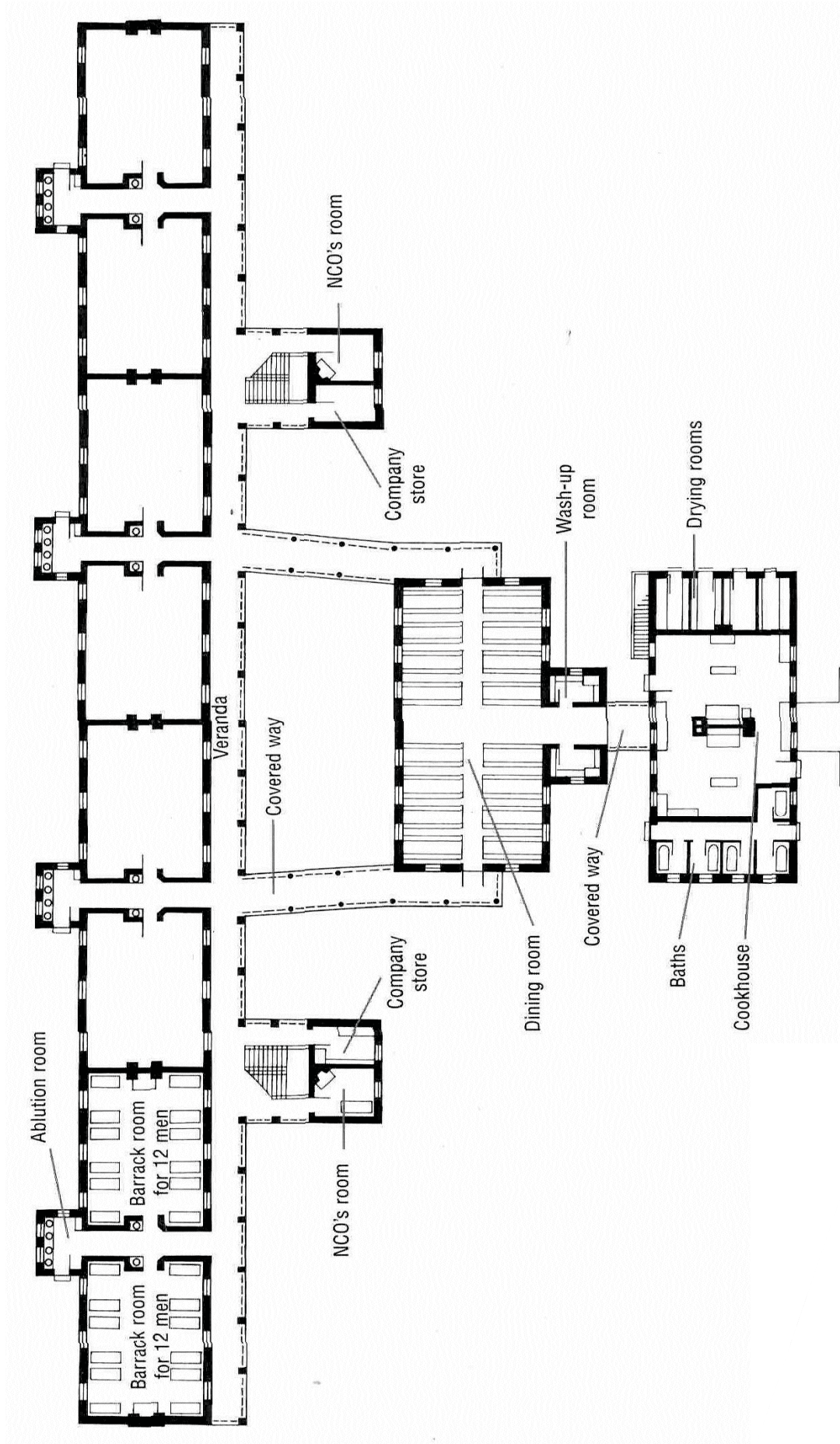
The formation and enlargement of the Middlesex Regiment, 1881-1900

- 5.6.5 Among the new county regiments formed in 1881 as a result of the Childers reforms was the Middlesex (Duke of Cambridge's Own) Regiment, created on 1 July that year by the merger of the 57th (West Middlesex) and 77th (East Middlesex) Regiments of Foot. The 57th (originally raised in 1755 and known since the Peninsular War as the 'Die-hards') became the 1st Battalion of the new regiment, while the 77th (raised in 1787) became the 2nd Battalion. Based in India at the time of its formation, the 2nd Battalion did not return to Britain until 1898, while the 1st Battalion was first posted overseas in 1892 (National Army Museum: <http://www.nam.ac.uk/research/famous-units/middlesex-regiment-duke-cambridges-own>). The 3rd and 4th Battalions were formed from established militia units (the Royal Elthorne Light Infantry Militia and the Royal East Middlesex Militia, respectively), while the four volunteer battalions were formed from some of the 27 Rifle Volunteer units that had been raised in the county since 1859 (Osborne, 2012: 98).
- 5.6.6 With the two regular battalions serving overseas, and the 3rd and 4th (militia) Battalions continuing to occupy their pre-amalgamation headquarters at Uxbridge and Hampstead, the shared facilities at Hounslow were sufficient for the regiment's purposes during the 1890s. The outbreak of the Second Boer War (1899-1902) however, placed immense strains upon what remained an essentially peacetime army, the size of which eventually grew from 157 to 170 regular battalions in response to the conflict in South Africa (TNA WO 33/175: 7). This enlargement necessitated an increase in the Army's manpower from 117,000 in 1897/8 to 132,000 in 1899/1900 (Douet, 2000: 183). The Middlesex Regiment raised two additional regular battalions in 1900; the newly formed 3rd Battalion was promptly despatched to St Helena to guard Boer prisoners-of-war before being sent to South Africa in 1902, while the 4th Battalion remained at home until it too left for South Africa in 1904 (National Army Museum: <http://www.nam.ac.uk/research/famous-units/middlesex-regiment-duke-cambridges-own>). The formation of the new regular battalions led to the renumbering of the militia formations as the 5th and 6th Battalions respectively.

The rebuilding of the Army's barracks under the Military Works Loan Acts, 1890-1900

- 5.6.7 Following a series of outbreaks of enteric fever (typhoid) at the Royal Barracks in Dublin in the 1870s and 1880s, parliamentary and public pressure led to the establishment of an Army Sanitary Commission to identify the causes of these epidemics (Douet, 2000: 175). In a highly critical report, the Commission found that mortality rates from the disease were higher at the barracks than amongst the neighbouring civilian population, and that a higher proportion of soldiers stationed there were hospitalised by typhoid than in any other military district in the country (Spiers, 1992: 221). Questions were raised in Parliament regarding the incidence of the disease, while in an anonymous letter to *The Times*, one of the authors of the report claimed that the ground at the barracks was “saturated with poisonous matter” (<http://hansard.millbanksystems.com/commons/1890/feb/28/the-royal-barracks-dublin>). In 1888 the Parliamentary Select Committee on the Army chaired by Lord Randolph Churchill heard evidence from the Inspector General of Fortifications, Sir Lothian Nicholson that confirmed claims that a number of barracks in England and Ireland were in an unacceptably poor condition (*ibid*:177; http://hansard.millbanksystems.com/commons/1899/jun/21/military-works-money#S4V0073P0_18990621_HOC_24).
- 5.6.8 The War Office concluded that the sub-standard and insanitary condition of these quarters was in part a consequence of the system by which expenditure upon the Army was allocated annually by Parliamentary vote. Accepting the principle that long-term expenditure such as barrack construction and repair should be financed by loans rather than by a charge on the annual Army Estimates, in 1890 Sir Edward Stanhope, the Conservative Secretary of State for War, piloted a bill through Parliament that sought to raise a loan of £4.1 million for the reconstruction of Army accommodation. The capital raised by the resulting Barracks Act 1890 funded the rebuilding of the Army’s camps at Aldershot, Shornecliffe, Colchester and the Curragh, extensive demolitions at Dublin, the construction of new quarters at home in Belfast, Dublin, Portsmouth and Plymouth, as well as overseas in Malta, Gibraltar and the Cape (Douet, 2000: 177).
- 5.6.9 The Barracks Act opened the floodgates for a wave of expenditure upon barrack construction during the decade that followed. Although a great deal of the money allocated for the works was spent on architectural ornamentation, attention was also paid to improving the living conditions of ordinary soldiers. In response to a Parliamentary question concerning the benefits of the Act, in February 1891 Stanhope spoke of improvements in the design of cookhouses (which he described as having been “formerly very defective”) as well as the introduction of such novelties as the “recreation room, the coffee room, the reading room, and the canteen”, all of which afforded comforts “formerly unknown to the soldier” (http://hansard.millbanksystems.com/commons/1891/feb/19/army-recruiting#S3V0350P0_18910219_HOC_168). When asked about the provision of separate dining rooms for the men, Stanhope accepted that while few existing barracks offered such facilities, he saw no objection to them being provided in future (*ibid*). In fact, the newly rebuilt barracks at the Citadel at Plymouth was amongst the first to contain a canteen at which soldiers could dine away from their dormitories (Douet, 2000: 180).
-

- 5.6.10 Having grown accustomed to using loans to fund military and naval expenditure outside the system of annual parliamentary estimates, the Government passed a series of Military Works Loan Acts between 1897 and 1901 (*ibid*: 183). The Military Loan Act of 1897 authorised the expenditure of £600,000 to purchase 42,000 acres of Salisbury Plain, which was to be used for training large formations of troops. In order to accommodate troops using the facilities on the Plain, the Military Works Loan Act of 1899 authorised a further £1,600,000 for the construction of an entirely new barracks at Tidworth to house as many as seven (later eight) battalions of infantry and six batteries of field artillery (*ibid*: 183, 185; http://hansard.millbanksystems.com/commons/1899/jun/21/military-works-money#S4V0073P0_18990621_HOC_24). In total the 1899 Act authorised expenditure of £4 million, £2.8 million of which was to be spent upon barracks, many of which had already been enlarged under the 1890 act (Douet, 2000: 183). A sum of £160,000 was also authorised for making additions to the depots of regiments to which new battalions had recently been added.
- 5.6.11 Along with new accommodation for troops at Colchester and the Curragh, the Tidworth Barracks were the first to be designed and laid out on modern principles devised by the Design Branch of the War Office at the turn of the 20th century. The branch was commanded by Major E.H. Hemmings RE, who in turn reported to Colonel C.M. Watson, RE, Deputy Inspector-General of Fortifications. The new designs contained standardised block plans, which could be laid out on a regular grid in combinations appropriate to the size and shape of the site. Central to each depot was the parade ground, upon which a full battalion could form up. Measuring 100 by 150 yards (91.4m by 137.2m) the parade ground would stand next to a dual-purpose covered drill shed/gymnasium (Douet, 2000: 185).
- 5.6.12 Battalion-sized units were to be accommodated in long rectangular barrack blocks, each containing two floors of residential accommodation. Each floor was designed to accommodate two companies of men, who would occupy eight rooms, each housing 12 men (Figures 4, 5 & 6). Each room was heated by a single fireplace, which was cheaper to run than the two that had been necessary to heat the draught-prone 24-bed dormitories. The rooms were connected by airy verandas/balconies which ran the full length of the building, which led to external staircases built between the veranda and two free-standing, square two-storey towers which contained rooms for the NCOs and stores for the men's kit (Douet, 2000: 185; Plates Tidworth and Caterham). Arranged in parallel pairs, each barrack block had its own separate single-storey dining room to which it was linked by covered walkways. In between the dining rooms stood an interconnected central cookhouse with bathrooms and drying rooms, which served both blocks (Figures 4, 5 & 6). Each of these 'H'-block units could accommodate a half-battalion of 32 companies.
- 5.6.13 Married men and their families were housed in terraced cottages arranged separately from the barrack blocks, with attached laundries and drying grounds for washing clothes (Figure 6 [Mill Hill 1923 NE GF]). The Officers' Mess and living quarters would stand some distance from the main barrack complex, ideally located on a minor road within the grounds with



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Figure 4
Tidworth Camp, Barrack Block and Dining Room Plan, 1900
1:200 at A3

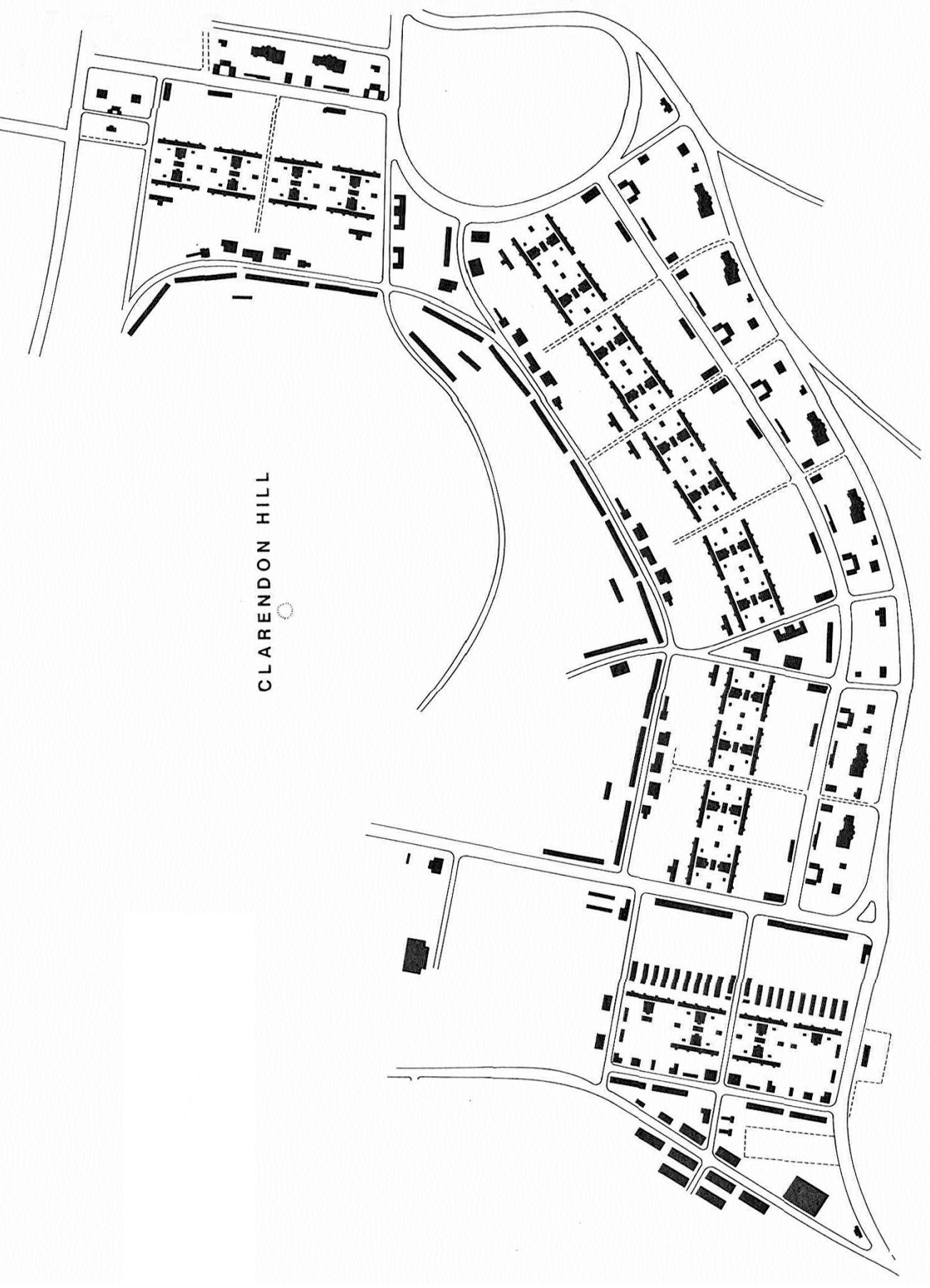


Figure 5
Tidworth Camp. General Plan, c. 1908
(Not to scale)

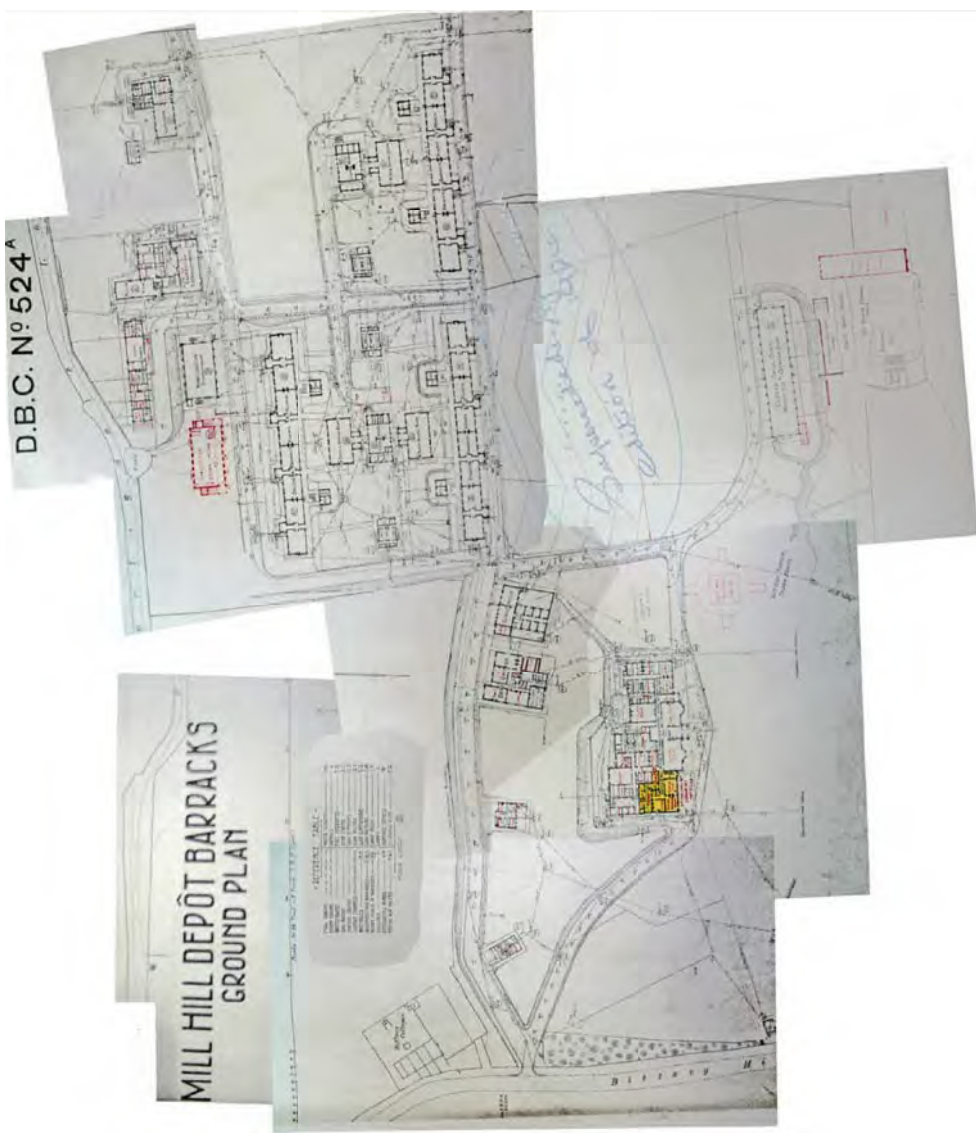


Figure 6
Mill Hill Barracks, Ground Floor Plan, 1906-23
Approx. 1:2,000 at A3

ready access to the stables (Figure 6 [Mill Hill 1923 NW OM GF]). The Regimental Sergeant-Major would occupy a detached cottage close to the guardhouse, which would be located close to the entrance to the barracks (Figure 6-7 [Mill Hill 1923 GF all]).

The Commission on Barracks Accommodation and the Third Military Works Loan Act, 1900-1901

- 5.6.14 Following the deployment of large numbers of British troops to South Africa in the early months of 1900, the War Office appointed a committee to establish whether the barrack building programme authorised by the 1899 Military Works Loan Act was sufficient to accommodate the newly enlarged Army (TNA WO 33/175). The committee recommended that a number of changes should be made to the allocations approved the previous year, in the wake of the decisions to increase regular infantry strength from 157 to 170 battalions and to introduce a three-year period of enlistment (*ibid*: 1-8). Recognising that these and other developments would lead to an increase in the number of recruits passing through the infantry depots, the committee recommended that a number of new depots should be built for regiments that had previously shared depots with other units. The additional facilities proposed by the committee included one at Durham for the use of the Durham Light Infantry (previously stationed at Newcastle); one at Ormskirk for the Liverpool Regiment (previously based at Warrington) and one for the use of the Middlesex Regiment at Mill Hill, leaving Hounslow for the sole use of the Royal Fusiliers (*ibid*: 9).
- 5.6.15 Although the provision of a new depot at Mill Hill had already been authorised under the previous Military Works Loan, the committee's report was the first to specify in full the scale and type of accommodation to be built there (*ibid*: 25, 31). The depot was intended to accommodate four battalions, containing accommodation for 18 officers, four Warrant Officers and 822 NCOs and Other Ranks (*ibid*). Of the latter group, married quarters for 77 would be provided on site, while the remaining 733 Other Ranks and 12 Sergeants would be accommodated in barrack blocks.
- 5.6.16 In order to fund the scheme and other military expenditure not covered by the annual Army Estimates, St John Broderick, the Secretary-of-State for War, raised a third Military Works Loan Bill, which was passed into law in 1901. The new Act authorised a loan of £6.3 million, of which £4.2 million was allocated for the construction of new barracks (Douet, 2000: 187).

The reorganisation of the War Office and the Barrack Construction Department, 1902-4

- 5.6.17 By the time that this money came to be spent however, the appetite for ever-increasing military and naval spending was waning as politicians began to appreciate the impact upon the nation's finances both of the Boer War and nearly a decade of relentlessly rising expenditure. A short-lived economic boom which had gone some way to mitigate the impact of inflated spending had come to an end shortly after the turn of the new century, and by the



0 100m

Figure 7
Mill Hill Barracks, First Floor Plan, 1906-23
Approx. 1:2,000 at A4

end of 1902 Britain faced an impending economic crisis (Lambert, 1999: 35). The Conservative Prime Minister, Arthur Balfour, appointed a Cabinet Committee to review the cost of defending the Empire, while a number of other committees were set up to investigate the conduct of the war in South Africa and to consider how the War Office and the Army might be reformed in the light of their findings. Following the publication of the critical report by the Royal Commission on the War in South Africa in August 1903, a committee charged with reforming the War Office was set up under the chairmanship of Lord Esher, a courtier and somewhat controversial political fixer who had served on the earlier Royal Commission (Peden, 2007: 20). A year earlier Esher had chaired a committee set up to investigate the perceived overstretch of the Royal Engineers, which in addition to its role in the design and construction of fortifications was responsible for all buildings used by the War Department (Douet, 2000: 188). Amongst the committee's recommendations was a proposal that the War Office engineering staff, which previously comprised military personnel, should be replaced by a new Directorate of Works responsible for all departmental buildings other than fortifications (*ibid*). The proposed Directorate would employ four principal architects, two of whom were to be civilians.

- 5.6.18 Following the publication of Esher's report on the organisation of the War Office, in February 1904 his recommendations were put into effect with the creation of a new Army Council and General Staff (Peden, 2007: 20). In addition to these reforms, a number of executive functions were detached from the War Office, including responsibility for the design and construction of barracks (Douet, 2000: 188). The same month that Esher's War Office reforms took effect, the new Barrack Construction Department was established under the command of a civilian Director of Barracks Construction, who became responsible for all home military installations other than fortifications (*ibid*). The first director was the architect, Harry Bell Measures FRIBA, the designer of a number of hostels for low-paid working men in London and Birmingham, known as 'Rowton Houses' after the scheme's principal backer, the philanthropist Lord Rowton. Measures was responsible for the design of new cavalry barracks in Norwich in 1905 (construction of which was cancelled by the Liberal Secretary-of-State for War Richard Haldane in 1906) and the Redford Barracks in Edinburgh (1909-1915).

The Construction of Mill Hill Barracks, 1904-6

- 5.6.19 By the time that Haldane cancelled the programme of barrack construction authorised by the third Military Works Loan Act in April 1906, the money allocated for the development of the Mill Hill Barracks had already been spent on their construction. Although the earliest surviving War Office plans of the completed depot are dated 6 February 1906, the date stone on the Officers' Mess bears a date of construction of 1904 (TNA WO 78/3770). A plan of the depot originally surveyed during the interwar period states that it was built around 1904, while the War Office submitted applications for the construction of roads and

sewerage on site to Hendon Urban District Council in 1902-3 (TNA WORK 43/617; LMA/4070/03/01381). While these plans carry Harry Measures' signature, the design of the barrack blocks is virtually identical to the departmental pattern used at Tidworth and other barracks built under the 1899 loans act. The drawings show three two-storey 'Tidworth-type' barrack blocks (A, B and C) in the north-west corner of the depot, with two adjacent terraces of fifteen cottages comprising the married quarters occupying the north-west corner (Figures 6 and 7). Situated between A and B Block were the two single-storey dining rooms and the shared cookhouse, which also contained bathrooms and drying rooms on the ground floor, with a boiler house and coal cellar in the basement (Figure 6 [1906-23 GF]; Figure 8 [1933 basement plan, shown on 1933 GF plan]). The latter was flanked by two small rectangular blocks that contained WCs, urinals and wash basins for the troops. Long rectangular rooms on the 'inner side' of each latrine block facing the cookhouse were probably used for storing waste bins.

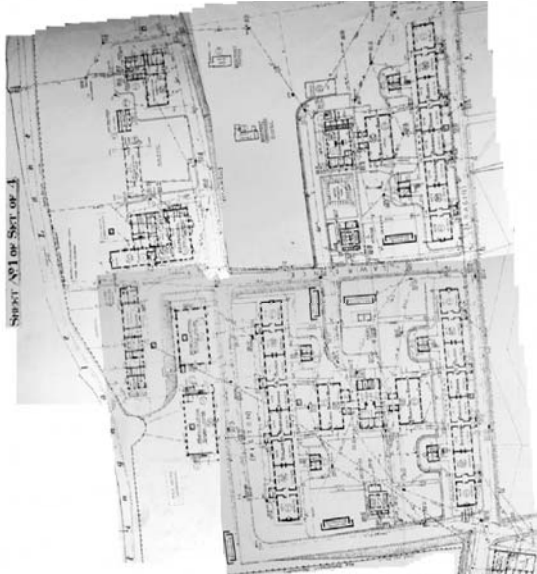
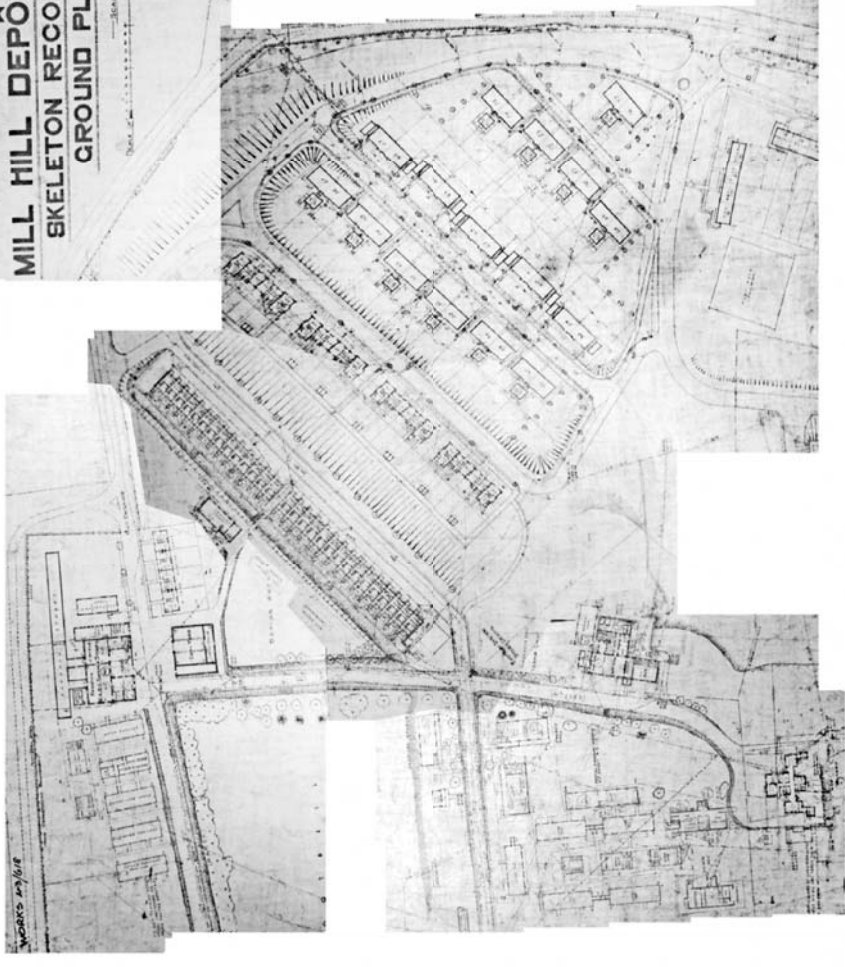
- 5.6.20 In addition to the three barrack blocks and married quarters, the depot contained separate buildings for the regimental stores, a 'recreation establishment' that contained a library on the first floor, a separate canteen block, the guardhouse, depot offices (subsequently converted into school rooms in 1910/11), quarters for the Quartermaster, the Warrant Officers, the Officers' Mess and quarters, the Sergeants' Mess, a 'reception station' (hospital), stores for the Army Service Corps (ASC), a closed drill shed and gymnasium, a miniature cartridge range, a closed miniature rifle range (for .22 shooting) and an open 30-yard range (added in 1911/12), which is also likely to have been used for rifle practice.

The Mill Hill Depot in peace and war, 1907-1939

- 5.6.21 There is some uncertainty regarding the precise date when the new depot at Mill Hill became operational. It has been suggested that the Middlesex Regiment depot relocated from Hounslow to Mill Hill in April 1905, although regimental records state that Mill Hill entered service with effect from 20 January 1907 (Halcrow, 2009: 8; TNA WO 379/64).
- 5.6.22 During the years leading up to the First World War, the depot accommodated recruits to the four regular and two reserve battalions of the Middlesex Regiment. At the outbreak of the war, both the 5th and 6th Battalions were stationed at the barracks in their role as depot/training units (TNA WO 379/64). By the end of 1914 the 1st, 2nd, 3rd and 4th Battalions had all moved to France from their pre-war stations at home and abroad. Of these the 1st, 2nd and 4th spent the whole of the war on the Western Front, while the 3rd Battalion moved to Salonika towards the end of 1915. The majority of the Regiment's Territorial and New Army battalions formed during the war were based at other barracks in the capital, including Hornsey and West Ealing Barracks, although the 11th, 12th, 13th and 22nd Battalions of the New Army were all formed at Mill Hill, as were three of the Regiment's five Works Battalions (*ibid*).
- 5.6.23 Following the end of the conflict, the 1st, 3rd and 4th Battalions all served in Germany on



FOR OFFICIAL USE ONLY
 WORKS *en/fort*
MILL HILL DEPÔT
SKELETON RECORD
GROUND PLAN
 Scale 1:2,000



FOR OFFICIAL USE ONLY
 WORKS *en/fort*
MILL HILL DEPÔT BARRACKS.
SKELETON RECORD PLAN.
GROUND PLAN.

Scale as far as 1:2,000 (107.6m)

REFERENCE

TABLE OF ACCOMMODATION

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Figure 8
 Mill Hill Barracks, Ground Floor Plan, 1933-40
 Approx. 1:2,000 at A3

occupation duties, following which the latter two battalions were disbanded in summer 1922. The 5th and 6th Battalions were both disembodied in 1919. A War Memorial dedicated to the memories of members of the regiment who died during the First World War was erected adjacent to the Officers Mess at some point between the end of June 1920 and the end of August 1923 (TNA WO 78/3770). Although its formal title was retained, during the 1920s the barracks also became known as the Inglis Barracks, in acknowledgement of the role in regimental history played by Colonel Inglis, Commanding Officer of the 57th (West Middlesex) Regiment of Foot at the Battle of Albuera in 1811, at which the regiment acquired its nickname of the 'Die-hards'.

- 5.6.24 Both the 1st and 2nd Battalions experienced an eventful interwar period, the former serving in Palestine, Egypt and Malaya between 1931 and 1936, before being transferred to Hong Kong in August 1937 in response to the Shanghai Emergency (*ibid*). The battalion was converted to a machine gun contingent during this period, specialising in the use of .303 Vickers Medium machine guns. At the beginning of the Second World War the battalion found itself part of the Hong Kong Garrison. Meanwhile having served in Singapore, India and the Sudan between 1923 and 1931, the 2nd Battalion returned to the United Kingdom for much of the 1930s, before being moving to France as part of the British Expeditionary Force (BEF) in September 1939 (*ibid*).

The Second World War, 1939-45

- 5.6.25 At the beginning of the Second World War, Mill Hill Depot was one of the three main Infantry Training Centres in the Greater London area, the others being Hounslow (Royal Fusiliers) and Kingston (East Surreys) (Osborne, 2012: 158).
- 5.6.26 A set of drawings originally surveyed in 1933 and amended in October 1940 by an architect named F.G. Colf of Beechcroft Gardens, Wembley Park, showed the extent of development that took place at the depot in preparation for its role in wartime (TNA WORK 43/617, 43/618, 43/619, 43/620). A substantial number of new single-storey buildings were added between those dates including a NAAFI (Naval, Army and Air Force Institutes) shop and a recreation room for women soldiers of the ATS (Auxiliary Territorial Service) in the space between the recreation block and the canteen (Figure 9 [1933-40 NW PICT 5651]). The B Block latrines had been largely demolished, although the dustbin store facing the central cookhouse had been retained. The C Block cookhouse had also been extended, while two new drill sheds had been built to the south of the barrack blocks, as had a new gymnasium, and a second indoor miniature rifle range (Figure 8 1933-40 [NW PICT 5649, 5652]). A number of air raid shelters were built at locations dotted around the site, including a below-ground shelter a short distance to the north-west of the Officers' Mess, a second underground shelter adjacent to the western mobilization storehouse, four above-ground PAD (Passive Air Defence) shelters for the use of the residents of A and B Blocks and a similar PAD shelter for occupants of C Block (TNA WORK 43/617).



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MILL HILL DEPÔT BARRACKS
SKELTON RECORD PLAN.
FIRST FLOOR PLAN.

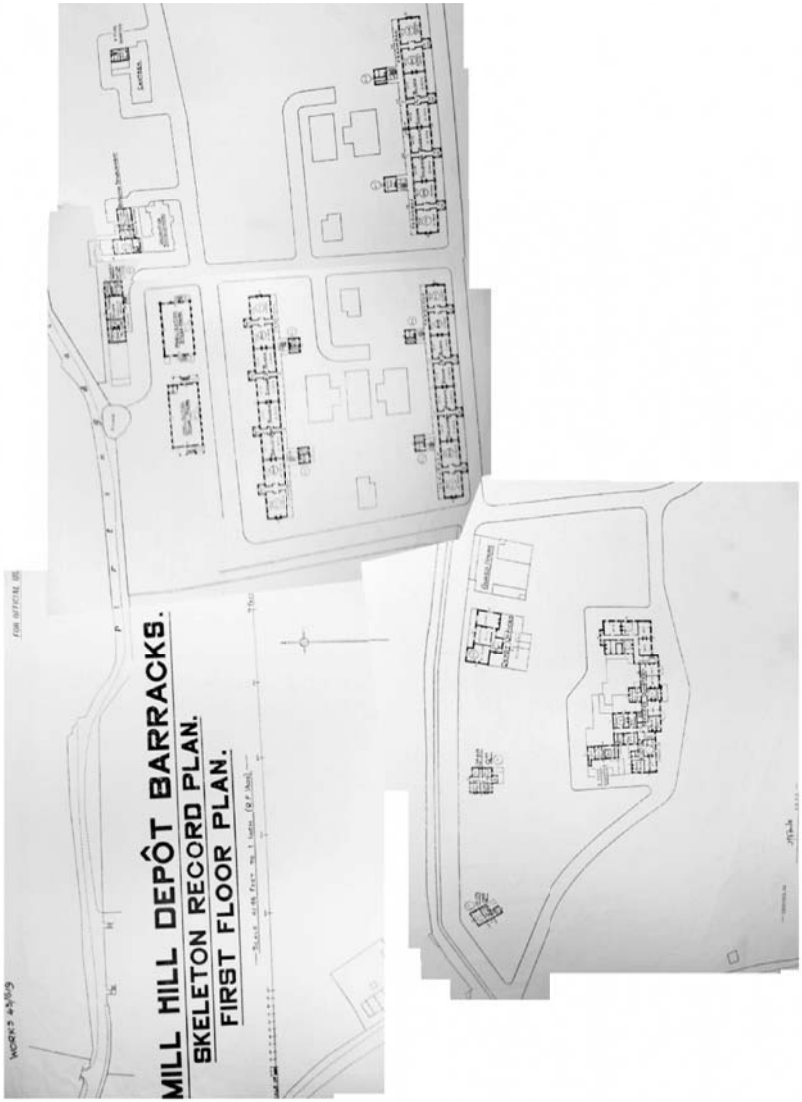


Figure 9
 Mill Hill Barracks, First Floor Plan, 1933-40
 Approx. 1:2,000 at A3

- 5.6.27 During the early part of the war significant additions were made to the previously empty central section of the site, which was utilised by the Army Postal Service section of the Royal Engineers for handling the Army's home postal services. A new garrison church and church hall stood to the north-east of the Army Postal Service depot, while a new dental centre stood to the south, adjacent to the old hospital block. In the eastern part of the depot, additional married quarters accommodation was provided in the form of a number of semi-detached and terraced single-storey 'B'-Type huts (TNA WORK 43.618).
- 5.6.28 While the Royal Engineers represented the largest contingent of non-regimental troops to be stationed at Mill Hill during the war, troops of several other units also passed through the barracks during the conflict. The Royal Army Service Corps ('Royal' since 1918) had maintained a presence on the site since the barracks were built, although the size of their store accommodation had increased by the beginning of the war. In 1943 a stores depot and vehicle workshop operated by the Royal Electrical and Mechanical Engineers (REME) had been built on the periphery of the site (Osborne, 2012: 200). In order to accommodate personnel of these and other units, designs for a large new hutted camp to be built to the south of the Officers' Mess were prepared in February 1941 (TNA WORK 43/621; Figure 10). The camp was a self-contained entity, accessed via a separate entrance from Bittacy Hill. The principal elements of the new camp included 28 barrack huts, two dining halls, a kitchen and stores, a NAAFI, a canteen and recreation block, a headquarters office and stores, with married quarters located at Bittacy Farm (*ibid*). The latter also played host to a workshop and stores operated by the Royal Engineers, although the farmhouse itself had been demolished by 1936 (Baker & Pugh, 1976: 11-16). While other specialist facilities included a 'predictor room and optical store' block, the latter presumably for the maintenance of fire control apparatus used to lay gunfire accurately.

The post-war period

- 5.6.29 The 1st Battalion of the Middlesex Regiment was taken into captivity by the Japanese at the fall of Hong Kong in December 1941 (TNA WO 379/64). The battalion was 'resuscitated' in May 1942 with personnel of the Territorial 2/8 Battalion, which was re-designated as 1st Battalion. Although based at the Inglis Barracks, the battalion served in north-west Europe from June 1944, before returning to Mill Hill in November 1947, when it was converted into a rifle battalion. The 2nd Battalion meanwhile served alongside the reconstituted 1st Battalion in north-west Europe and then Palestine until the end of May 1948, when it too returned to Mill Hill (*ibid*). At the beginning of August the two regular battalions were amalgamated to form the 1st Battalion, which moved to Hong Kong in May 1949, before being deployed to fight in Korea in 1950. Following the end of the Korean War, the battalion was deployed to Cyprus, before finding a temporary home in 1958 with the British Army of the Rhine in Hamelin (*ibid*). The regiment moved out of the depot in January 1961, following which it served in Gibraltar, Northern Ireland and the West Indies, before being absorbed into the

- newly formed Queen's Regiment in 1966 (National Army Museum: <http://www.nam.ac.uk/research/famous-units/middlesex-regiment-duke-cambridges-own>).
- 5.6.30 The Second World War period workshops at Bittacy Farm remained in the possession of the Royal Engineers after the end of the conflict, as did the postal depot operated by the same regiment (TNA WO 305/3894). Following the departure of the Middlesex Regiment, the barracks were given over to the Army Postal Service RE, which continued to run the Home Postal Depot at the base. The APS was re-designated the Postal and Courier Communications Service (PCCS) from the beginning of April 1965 and the Home Postal Depot renamed the Home Postal and Courier Communications Depot (HPCCD) RE from the same date (TNA WO 305/3894). Under the command of Colonel L.P. Bennett RE, the depot was the main sorting office and courier depot for mail destined for British Forces stationed at home and overseas. It also retained its training function, receiving an average of 246 Other Ranks for training or staff postings at the depot every year between 1965 and 1972 (*ibid*). Recruits were trained at the PCCS Training School at the Technical Wing of the Depot, which was staffed by a mixture of PCCS personnel and female soldiers of the Women's Royal Army Corps (WRAC). In 1968/9 the Technical Wing employed as many as 130 RAC personnel (*ibid*).
- 5.6.31 In 1967/8 a substantial programme of rebuilding was launched at the barracks (Halcrow, 2009: 20). A number of the existing structures were modernised, including the Officers' Mess and barrack blocks, while new residential accommodation was provided for members of the Women's Royal Army Corps (WRAC). The existing junior ranks club, other ranks mess and medical (first shown on the 1906 plans), dental (first shown on the 1940 plans) and educational centres were all replaced with new permanent buildings. Trees were planted around the blocks in order to soften the impact of the new buildings, many of which were steel framed structures clad with brick and part-glazed panels (Figure 11, 1969 OS).
- 5.6.32 As the barracks entered the 1970s, the withdrawal of the British Army from its posting east of Suez resulted in a decline of long-distance postal services, although the increasing commitment of the Army to service in Northern Ireland saw the volume of domestic post handled by the HPCCD grow correspondingly (TNA WO 305/3894). A civilian postal strike in 1971 led to the depot handling the Government's official mail for several months, while the same period also saw a number of Army Boxing championships being hosted in the gymnasium (*ibid*). The 1904-6 married quarters in the north-west corner of the site were evidently not suitable for the requirements of modern families and these were demolished during this decade, replaced by contemporary housing.
- 5.6.33 At the end of the 1970s the name of the HPCCD reverted to the Home Postal Depot (HPD) (<http://www.sappers.co.uk/squadrons/postal-and-courier-depot-hpd-and-bfpo>). In August 1988 the barracks was the target of an IRA bombing, which killed one soldier and wounded a number of others. Further reorganisation of the armed forces postal service in the late 1990s led to the creation of the British Forces Post Office (BFPO), which remained at Mill



0 200m

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Figure 11
Ordnance Survey map, 1969
1:5,000 at A4

Hill until 2007, when the entire operation relocated to RAF Northolt.

6 Archaeological Methodology

6.1 Scope of Required Works

- 6.1.1 The Environmental Statement (GVA Grimley 2009a) established that the current archaeological record for the site is limited. It did, however, state that there was the possibility that unknown buried archaeological remains relating to the military use of the site and earlier periods could be encountered during the remediation and construction phases of the scheme.
- 6.1.2 On the basis that there is very little information regarding the nature of the archaeological resource across the site and in addition because of the scale of the proposed development, GLAAS requested that archaeological trial trenching is carried out in areas where there is little evidence of previous truncation and in areas where the foundations of former military structures relating to the earliest phase of activity on the site may survive.
- 6.1.3 In order to meet with these requirements it was proposed that the evaluation comprising trial trenching would focus on the areas where former early military structures are known (identified from historic mapping) and on areas where relatively little truncation has taken place. GLAAS also requested a reasonable sample of the total site be investigated to determine the presence, or lack of, earlier archaeological horizons, features and deposits dating to the prehistoric, Roman, medieval and post-medieval periods, particularly in those areas deemed at risk due to the development proposals.

6.2 Scheme Proposals

- 6.2.1 The scheme comprises the comprehensive redevelopment of the site (excluding the area currently in use by the scouts) for residential-led mixed use development, involving the demolition of all existing buildings (excluding the former Officers' Mess) and ground re-profiling works (Figure 12), to provide 2,174 dwellings, a primary school, GP surgery, 1,100sqm of 'High Street' (A1/2/3/4/5) uses, 3,470sqm of employment (B1) uses, a district energy centre, and associated open space, means of access, car parking, and associated infrastructure (GVA Grimley 2009a).
- 6.2.2 It was proposed to carry out the demolition in seven separate stages with the evaluation work for each phase requiring completion before demolition commences. This necessitated three individual stages of archaeological investigation and a total of 30 proposed trenches.

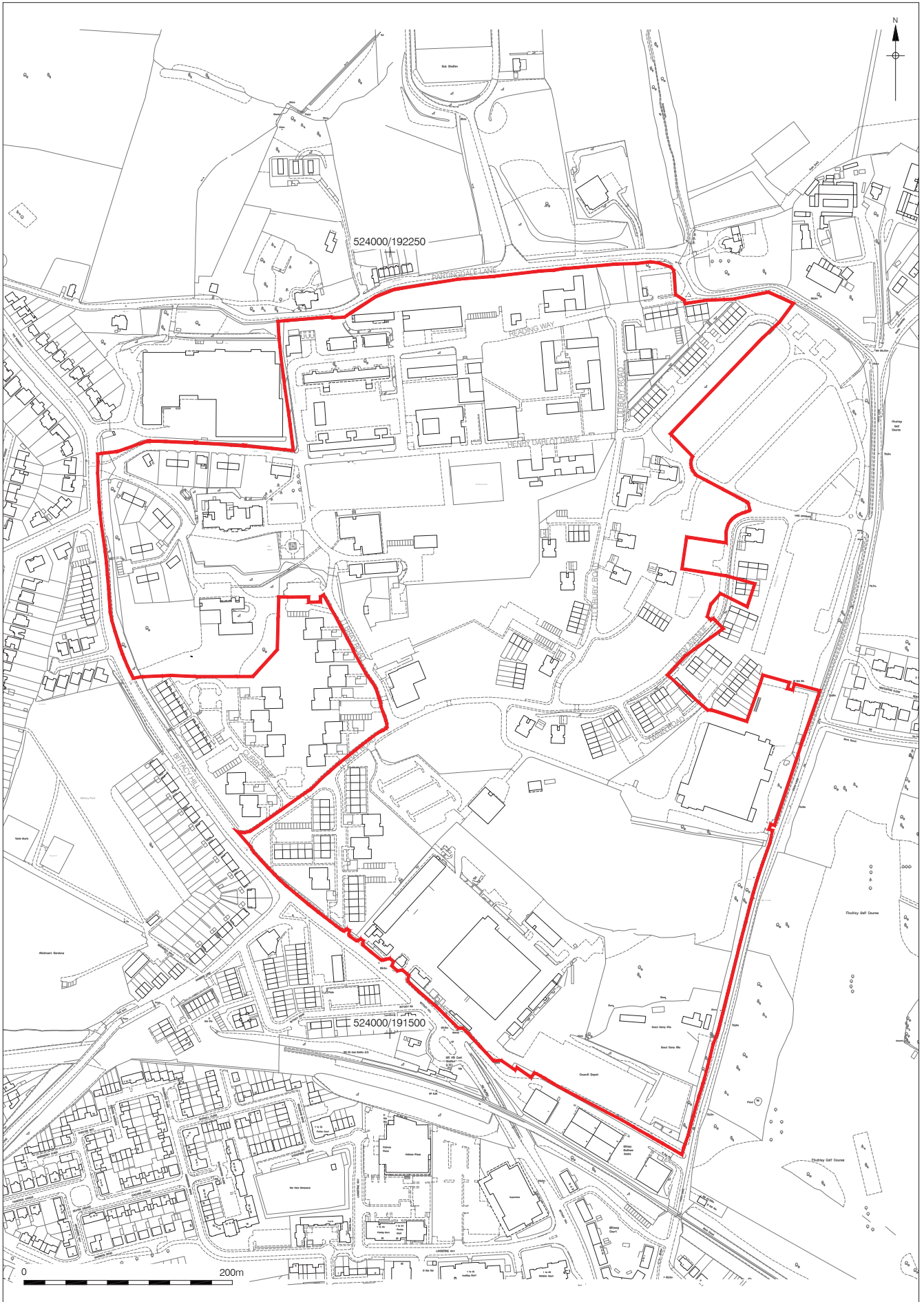
Trench	N-S (max value)	E-W (max value)
1	n/a (abandoned)	n/a (abandoned)
2	n/a (abandoned)	n/a (abandoned)
3	L: 19.30m / W: 2.15m	W: 2.40m / L: 48.60m
4	L: 21.10m	W: 2.20m
5	L: 7.60m	W: 2.00m
6A	W: 2.20m	L: 13.50m
6B	W: 2.50m	L: 24.60m

6C	L: 10.05m	W: 2.15m
7	W: 2.25m	L: 20.50m
8	L: 7.25m / W: 1.85m	W: 2.20m / L: 20.00m
9	L: 49.60m	W: 2.15m
10	W: 2.10m	L: 18.65m
11	L: 19.60m	W: 2.75m
12	W: 1.95m	L: 20.00m
13	n/a (abandoned)	n/a (abandoned)
14	W: 2.20m	L: 40.95m
15	L: 20.15m	W: 2.10m
16	W: 2.20m	L: 18.90m
17	L: 49.75m	W: 2.20m
18	W: 2.30m	L: 51.60m
19	L: 21.45m	W: 2.35m
20	L: 6.15m / W: 2.65	W: 2.65m / L: 19.75m
21	n/a	n/a
22	L: 12.65m	W: 2.15m
23	n/a	n/a
24	n/a	n/a
25	n/a	n/a
26	W: 1.78m	L: 19.50m
27	W: 1.73m	L: 49.46m
28	W: 1.80m	L: 19.70m
29	L: 49.49m	W: 2.07
30	L: 25.60m	W: 22.42m

6.2.3 The Stage 1 evaluation was undertaken in February 2012 and comprised of 21 trenches located across the site (Figure 2). Trenches 1 & 2 were not excavated due to their positioning on an important access road for site traffic. They were incorporated into extensions of Trench 3. Trench 13 was abandoned due to heavy contamination. Trenches 21, 23, 24 & 25 were incorporated into the area eight/Stage 3 evaluation as were Trenches 26, 27, 28 & 29.

6.2.4 Following the discovery of extant structures relating to an earlier phase of the barracks within Trench 3, to the north of the site, mitigation in the form of a 'strip, map and sample' exercise was undertaken in this area in September 2012 as Stage 2: Trench 25 (Figure 2). A delay to the completion of the work occurred due to the discovery of suspected asbestos deposits within the basement of a structure encountered within the archaeological trench. Works were eventually completed in the trench in January 2013. Trench 25 measured 29.65m N-S by 49.95m E-W.

6.2.5 An eighth area was identified and covers the area of the sports field. As demolition was not required here, the evaluation was not undertaken concurrently with the Stage 1 & 2 works and instead took place during July and August 2013 (as Stage 3). This work also included a mitigation trench (Trench 30) undertaken following the discovery of features requiring further investigation in Trenches 27 & 28.



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Figure 12
Ordnance Survey map, 2013
1:5,000 at A4

6.3 General Methodologies and Recording Systems

- 6.3.1 Trenches were excavated either by a 360 degree tracked excavator utilising a flat ‘toothless’ ditching bucket. Machining was guided by a supervising archaeologist. Overburden was removed to the top of natural strata, or the top of significant archaeology.
- 6.3.2 All recording systems adopted during the investigations were fully compatible with those most widely used elsewhere in London; that is those that developed out of the Department of Urban Archaeology Site Manual, now published by Museum of London Archaeology (MOLAS 1994). Individual descriptions of all archaeological and geological strata and features excavated and exposed were entered onto pro-forma recording sheets. The archaeological features and deposits encountered were planned from a temporary baseline. Sections were hand-drawn on polyester based drawing film at a scale of 1:10 and located with a GPS. The OD heights of all principal strata were recorded using a dumpy level and annotated on the appropriate paperwork. A full photographic record of the investigations was compiled, including both black and white prints and colour transparencies on 35mm film and digital images. The trenches were located with the use of a GPS instrument tied into the Ordnance Survey Grid.
- 6.3.3 Following the initial Stage 1 evaluation and in accordance with a new method statement drawn up to mitigate for the features encounter in Trench 3 (Moore 2012), the strip, map and sample exercise involved the monitoring of ground reduction and bulk excavation necessitated by the development of the site. A mitigation strategy was also established following the discovery of potential prehistoric features during the Stage 3 evaluation.
- 6.3.4 The purpose of the archaeological monitoring of the groundworks was to facilitate where necessary appropriate investigation and recording of any archaeologically relevant remains found at the site. The exercise was also designed to afford an opportunity to investigate and record structures associated with the earlier phases of the Inglis Barracks, in advance of the invasive groundworks pertaining to the new development.

6.4 Aims and Objectives

- 6.4.1 The general aims of the evaluation and subsequent strip, map and sample exercise were as follows:
- To preserve ‘by record’ the extent and significance of any surviving archaeological features and deposits within the site.
 - To, following the archaeological mitigation phase, assess the potential for further research and publication of the archaeological archive.
 - To explain any chronological, spatial or functional relationships between the structures/remains identified and how they relate to the history of the barracks.
 - Assess the significance of any evidence of previous occupation of the site within the wider context of contemporary society within the vicinity.

7 Phased Archaeological Sequence

7.1 The following section details a chronological account of the archaeological features and deposits encountered during the excavation.

7.2 PHASE 1: NATURAL

7.2.1 Natural horizons in the form of 'London Clay' were observed in various trenches across the site, in both truncated and un-truncated form. It was seen in Trenches 3, 4, 6A, 6B, 7 & 25 to the north of the site; Trenches 10 & 12 to the west; Trenches 14 & 15 towards the centre; Trench 22 in the east and Trenches 16, 17, 18, 19, 20, 26, 27, 28, 29 & 30 to the south.

7.2.2 The highest level the clay was encountered towards the north of the site was 103.29m OD in Trench 25, the lowest being 96.58m OD in Trench 4. To the west the highest level recorded was at 94.91m OD in Trench 10 and the lowest at 91.10m OD in Trench 12. The highest level in centre of the site was at 98.43m OD in Trench 14 dropping to 91.10m OD in Trench 15. Towards the east natural was identified in Trench 22 between 90.92m OD and 90.78m OD. To the south natural was encountered in Trench 16 at 89.55m OD sloping down to 70.35m OD in Trench 28.

7.2.3 The natural [5], [12], [18], [36], [44], [60], [76], [81], [87], [92], [102], [106], [127], [577], [603], [610], [617], [625] & [649] was described as a firm / stiff light yellowish / greyish brown clay which contained occasional lenses of sandy gravel.

7.2.4 The investigations established that London Clay had been re-deposited in a number of instances across the site, notably in areas with the greatest presence of buildings or landscaping associated with the 20th century barracks (see Phases 3 - 5).

7.3 PHASE 2: PREHISTORIC

7.3.1 A total of 15 cut features and 1 possible surface were encountered during the Stage 3 works towards the south of the site (Figure 13). They were observed in Trenches 27, 28 & 30 cutting natural clay deposits. Data appertaining to the features, which comprised 6 pits and 9 post/stake holes, has been tabulated below.

Trench	Feature	Cut	Fill	N-S	E-W	Depth	OD Height
27	Pit	[605]	[604]	1.20m	1.20m	0.26m	70.95m
27	Pit	[607]	[606]	1.16m	1.29m	0.24m	71.19m
28	Post/Stakehole	[612]	[611]	0.16m	0.15m	0.08m	71.13m
28	Post/Stakehole	[614]	[613]	0.23m	0.27m	0.08m	71.07m
30	Pit	[627]	[626]	1.00m	1.10m	0.33m	70.78m
30	Pit	[630]	[629]	1.64m	1.29m	0.12m	71.09m
30	Post/Stakehole	[632]	[631]	0.34m	0.35m	0.07m	70.93m
30	Post/Stakehole	[634]	[633]	0.26m	0.27m	0.07m	70.84m
30	Post/Stakehole	[636]	[635]	0.26m	0.24m	0.07m	71.19m
30	Post/Stakehole	[638]	[637]	0.52m	0.62m	0.10m	71.23m
30	Post/Stakehole	[640]	[639]	0.23m	0.28m	0.11m	71.25m
30	Post/Stakehole	[642]	[641]	0.35m	0.50m	0.13m	71.90m

30	Pit	[644]	[643]	0.65m	0.50m	0.21m	70.80m
30	Post/Stakehole	[646]	[645]	0.32m	0.40m	0.05m	70.78m
30	Fire Pit	[650]	[628]	0.70m	0.70m	0.11m	70.86m

7.3.2 The pits encountered displayed moderately steeply sloping sides with moderately flat bases, whilst the post / stakeholes had steep to gradual sides with concave bases. The fill of pits comprised of a firm black charcoal and clay containing small rounded pebbles and burnt clay and flint providing evidence of fire related activity. The fill of the stakeholes consisted of a stiff light yellow brown (with black mottling) silty clay with charcoal inclusions.

7.3.3 With regard to the fire pit [650], initially it was believed the context represented an area of baked ground around and including the location of a fire. After excavation of the deposit was undertaken it was observed that a small fire pit existed which represented the seat of the fire. In addition to this a bleached surface layer [647] was observed in Trench 30 which appeared to be allied with adjacent postholes potentially representing an animal enclosure with the bleaching possibly caused by the urine of the animals kept inside (Cipin 2013). It comprised stiff light yellow brown mottled black clay with charcoal content and occasional sub-rounded to sub-angular flint. It covered an area measuring 2.03m N-S by 3.08m E-W by 0.08m in depth at 71.26m OD.

7.3.4 None of these cut features contained any cultural material that could be used for dating purposes and as such their phasing remains tentative. Environmental samples of the charcoal included within the pits were taken in the hope that C¹⁴ dating could indicate in which period they were dug / backfilled. It has been suggested, on the basis of the spatial configuration of these features, that they represent the activity of a temporary hunting or herd management camp, possibly of Bronze Age origin (ibid).

7.4 PHASE 3: POST-MEDIEVAL AGRICULTURAL ACTIVITY

7.4.1 The area occupied by the present day site comprised mainly farmland during the post-medieval period. This is attested to by the presence of agricultural soil in six trenches located towards the south, east and centre of the site. The plough soil [31], [34], [75], [80], [91], [101], [105], [126], [602] & [648] was encountered in Trenches 14, 15, 16, 18, 19, 20, 22, 26 & 30 and observed between heights of 70.57m OD towards the south of the site and 98.61m OD towards the centre. It was also recorded between 90.98m OD and 91.08m OD to the east (Figure 2).

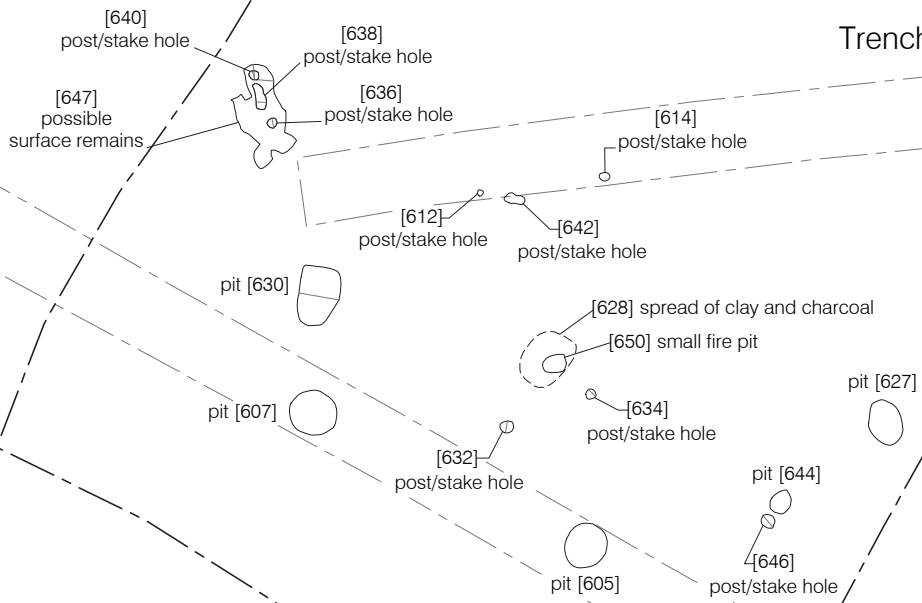
7.4.2 This layer of agricultural soil predominantly comprised dark brownish grey sandy clayey silt which varied in thickness between 0.10m up to 0.25m. It contained occasional flecks and small fragments of CBM along with rounded flint pebbles and in one case a sherd of residual shell-tempered Roman pottery dated to 40-400 AD ([80] in Trench 16) and in another a sherd of green glazed Surrey-Hampshire border whiteware which dates to between AD1550-1700 ([75] in Trench 15). In Trench 30, layer [648] produced sherds of green glazed Surrey-Hampshire border whiteware (AD1550-1700), Frechen stoneware (AD1550-1700), post-medieval Essex black-glazed redware (AD1580-1900) and post-medieval Essex



Mitigation Area

Trench 28

Trench 27



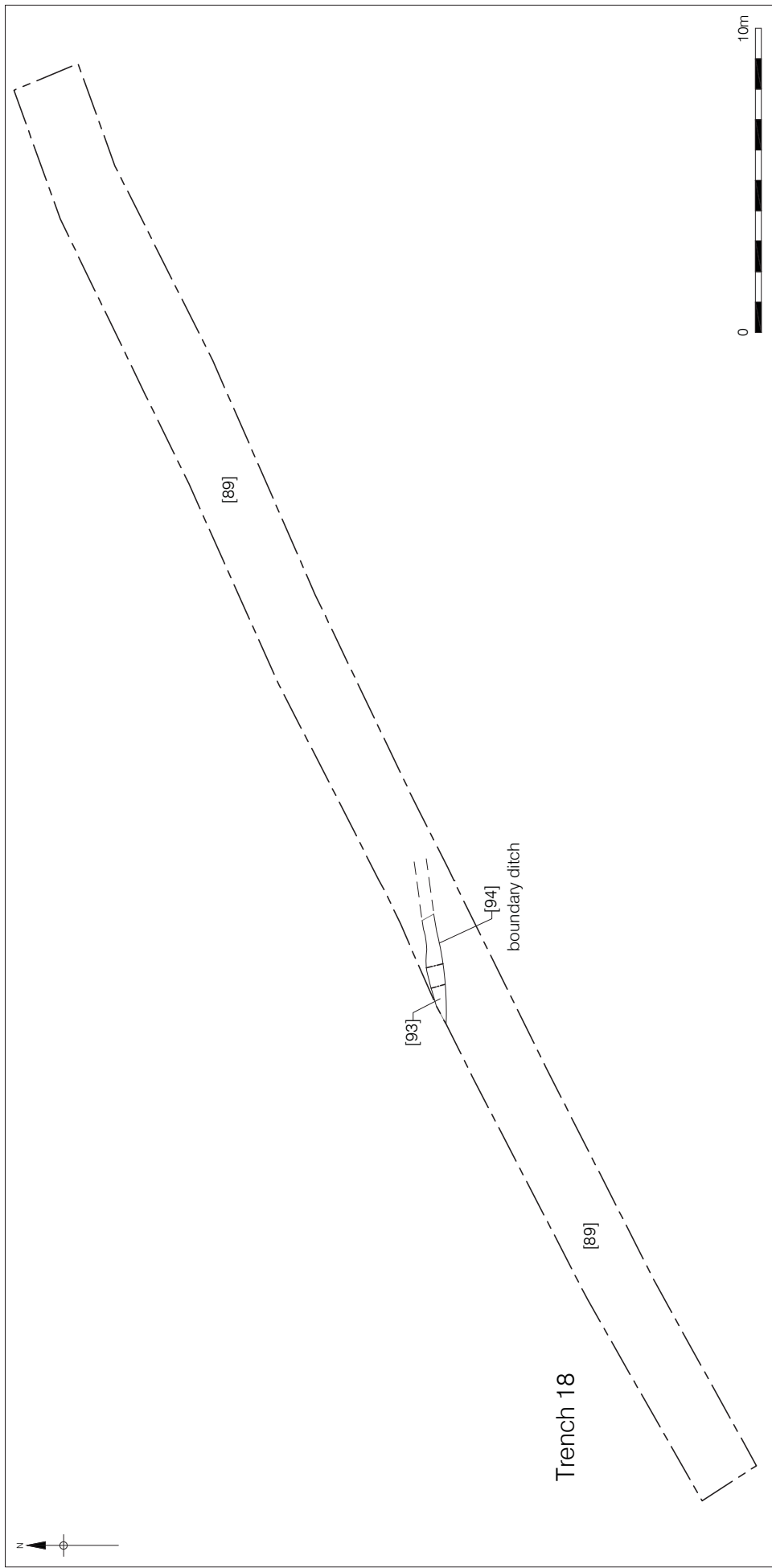
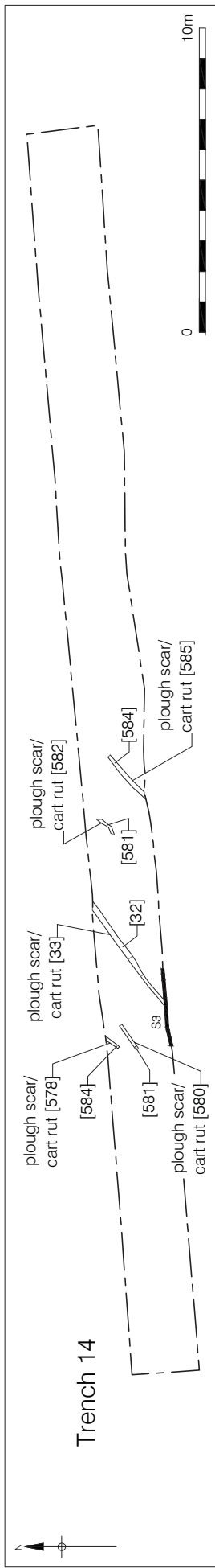
black-glazed redware (1580-1900).

- 7.4.3 In Trench 11 a 0.04m thick layer of firm mid yellowish brown clay [120], interpreted as disturbed natural, was observed. It contained occasional flint and one small sherd of undated pottery whose closest parallel would be as part of an early Saxon baking dish, however due to the small abraded nature of the piece this cannot be confidently verified (Jarrett, *pers. com.*). Either way it is believed to be of medieval provenance.
- 7.4.4 Towards the centre of the site, in Trench 14 (Figure 14 and Figure 19: Section 3), five linear cut features were recorded truncating agricultural soil [34]. These features, all NE-SW orientated and observed at 98.51m OD, have been interpreted as plough marks / cart ruts [33], [578], [580], [582] & [584]. They each had concave sides and bases and measured lengths of between 0.58m and 2.20m and widths of between 0.09m and 0.17m. Feature [33] was excavated and revealed to be 0.09m deep. They were filled with soft, light bluish grey silty clay [32], [579], [581], [583] & [585] which contained occasional flint pebbles and one late medieval-early post medieval peg tile dated to AD1400-1700.
- 7.4.5 Towards the south of the site in Trench 18 (Figure 14) another linear feature was encountered, this time orientated E-W. The cut [94] had vertical sides and a flat base and measured 3.40m E-W by 0.40m N-S by 0.07m in depth, although it was likely originally cut from higher and, as such, of greater depth. It was observed at 82.17m OD and contained a soft mid greyish brown clayey silt [93] which contained one sherd of Staffordshire white salt-glazed stoneware dated to 1720-1780 and one sherd of Chinese blue and white porcelain dated 1590-1900 which derived from a saucer. It is apparent when analysing the position of this feature in relation to the pre-barracks land boundaries shown on earlier maps (Fig. 3) that this linear feature likely represents a small land boundary ditch which was subsequently truncated at its eastern end by a mid-20th century brick feature.
- 7.4.6 A number of layers of made ground were observed in Trenches 26, 27, 28, 29 & 30 towards the southernmost part of the site which appear to represent late post-medieval / early modern activity, possibly related to the conversion of this land from agricultural fields into a recreation ground during this time. The layers [601], [609], [618], [616], [619], [621], [622], [623], [624], [652] & [653] were recorded between 70.34m OD and 71.59m OD and consisted of mid brown to mid yellow brown clay or silty clay which varied in thickness between 0.12m to 0.50m. One layer [624] comprised mid grey crushed brick rubble and was likely laid down in the late 19th – early 20th century for the purposes of land drainage. Pottery obtained from contexts [609] & [621] consisted of one sherd of Chinese blue and white porcelain dated to AD1590-1900 and one sherd of Japanese porcelain decorated in the Imari-style dated to AD1660-1900.

7.5 PHASE 4: CONSTRUCTION AND EARLY YEARS OF THE BARRACKS – 1904-1932

7.5.1 Ground Preparation

Archaeological investigations across the site appeared to indicate that in the areas where



heavy construction took place in the form of buildings and yards, landscaping was undertaken which likely truncated earlier soil horizons. Not only did this at times involve horizontal truncation of the land but also the large scale re-deposition of London Clay. Evidence for this activity was seen in Trenches 5, 8, 16, 18, 19 and 20. The layer of re-deposited clay [41], [62], [68], [79], [90], [99] & [104] was observed between 77.18m OD and 101.22m OD and the deposit measured between 0.20m and 0.72m in thickness. It comprised firm mid yellowish brown clay with fragments of CBM and occasionally concrete, rounded flint pebbles and flecks of burnt clay. Dump layers [4], [35], [78] & [100] were also observed in Trenches 6B, 14, 16 & 20 respectively.

7.5.2 Construction Activity

7.5.3 Four timber sleepers were observed towards the north-east of Trench 25 (Figure 15), embedded into the natural clay [577]. They were equally spaced and were orientated E-W lengthways, starting to turn towards the north in a NE direction, respecting the turn of what would later become a service road. This is evidenced by the curb line to the east [529] which was constructed out of engineering bricks and concrete, in total measuring 21.60m in length by 0.14m wide and 0.11m in height at 103.60m OD.

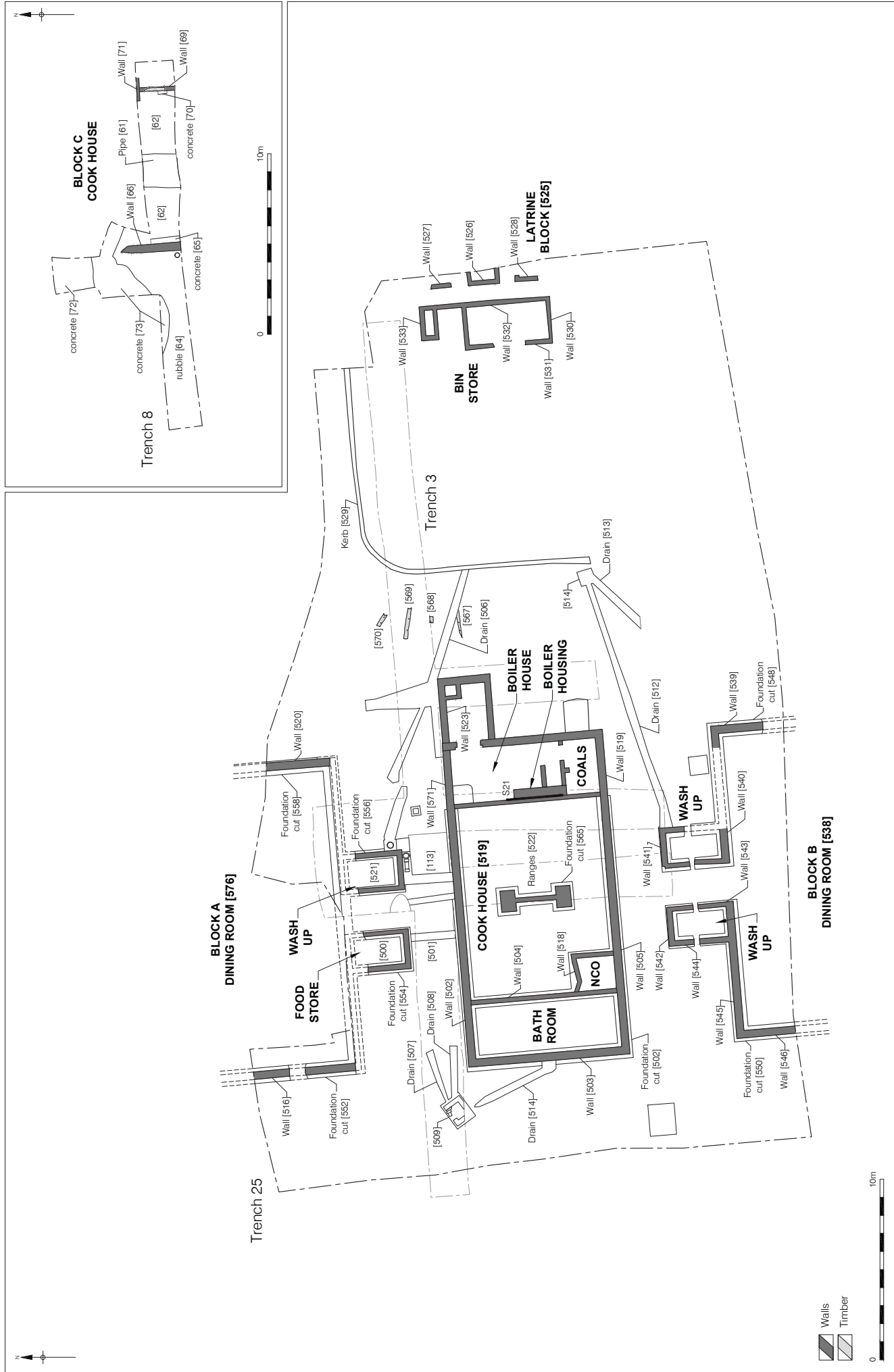
7.5.4 The timber sleepers [567], [568], [569] & [570] were all set horizontally into the ground and were in poor condition. No tool marks, intentional marks or evidence of joints or fittings were observed on any of the planks, although nails were still present in all four of them. The dimensions of each timber are presented in the table below.

Timber	Orientation	Length	Width	Top OD Height
[567]	E-W	1720mm	140mm	103.21m
[568]	E-W	360mm	224mm	103.21m
[569]	WNW-ESE	1780mm	220mm	103.21m
[570]	NW-SE	740mm	220mm	103.21m

7.5.5 It is likely that the sleepers originally formed part of a narrow gauge rail track which would have been laid down to assist in the construction of the barrack buildings. The rail track would have been used to transport building materials across the site.

7.5.6 The Cook House

7.5.7 Evidence of the Cook House that once serviced 'Barrack blocks 'A' & 'B' were partially exposed in Trench 3, during the evaluation. The subsequent strip and map exercise which formed Trench 25 (Figure 15) exposed the remainder of the foundations. With the assistance of documentary research it has been possible to divide the Cook House building [517] (which also incorporated bathing and drying facilities) into separate rooms or sections, which shall be described individually below. In each case the brick fabric comprised cemented red frogged brick measuring 230mm x 110mm x 70mm in an English bond (where visible).



The Bath Room

7.5.7.1 This was situated on the western side of the building [517] and measured 24.33m² and was bounded by walls [502], [503], and [505], with wall [504] acting as a dividing wall between this room and the preparation room to the east. Data pertaining to these walls has been tabulated below;

Wall	Orientation	Length	Width	Height	Top OD Height
[502]	E-W	3.41m	0.42m	0.43m	103.68m
[503]	N-S	7.89m	0.44m	0.42m	103.70m
[504]	N-S	7.84m	0.24m	0.40m	103.61m
[505]	E-W	3.41m	0.41m	0.48m	103.60m

7.5.7.2 Each wall was set onto a concrete foundation [561], within cut [562], which consisted of solid light grey concrete containing frequent gravel with a total width of 0.78m for the length of each wall. It was observed between 103.12m OD and 103.25m OD and truncated the natural clay [577] below.

The Preparation Room

7.5.7.3 This was a large room located in the centre of the Cook House building [517] which was bounded by four walls [502], [504], [505] & [571] contained a small room in the south-west corner and the foundations of a cooking range [522] in the middle. The room measured 86.32m².

Wall	Orientation	Length	Width	Height	Top OD Height
[502]	E-W	10.67m	0.42m	0.43m	103.68m
[504]	N-S	7.84m	0.24m	0.40m	103.61m
[505]	E-W	10.67m	0.41m	0.48m	103.60m
[571]	N-S	8.09m	0.22m	2.30m	103.65m

7.5.7.4 Each wall was once more set upon a concrete foundation [561] with the exception of wall [571] which acted as a dividing room between the preparation room and the basemented boiler room which was located on the eastern end of the building.

7.5.7.5 Towards the centre of the room was a brick 'I' shaped structure [522] set upon a concrete base [565] within cut [566]. It measured 3.87m N-S by 0.25m E-W along the central spine and 1.18m E-W at each end. It stood 0.31m high at 103.52m OD. Comparable studies with contemporary military kitchens suggest this to be the base of the cooking range (see Figure 5).

The Non-Commissioned Officers Room

7.5.7.6 Located at the south-west corner of the preparation room was the NCO's room which comprised of wall [518] which abutted walls [504] and [505]. Measuring just 5.04m² the walls of this small room measured 2.10m E-W by 2.40m N-S, were 0.22m wide and 0.40m high at 103.58m OD. Wall [518] sat on top of concrete foundation [563] which lay within cut [564] which was observed at 103.18m OD cutting the natural clay [577].

The Boiler House

7.5.7.7 The eastern end of the Cook House building [517] contained the Drying Room at ground level. However no trace of this was encountered, having been lost during the demolition of the building. Beneath the Drying Room was the Boiler House which was encountered during the strip and map exercise, complete with the cannibalised remains of the boiler itself.

7.5.7.8 The room measured 32.28m² and consisted of a main central area containing the boiler with a coal storage area to the south-east of the room and a staircase located in the north-east corner. A concrete pad measuring 1.08m N-S by 1.04m E-W was located in the north-west corner of the room. The floor of the room was recorded at 101.33m OD, approximately 2.25m below the top of diving wall [571]. Data pertaining to the walls encompassing the Boiler House are tabulated below.

Wall	Orientation	Length	Width	Height	Top OD Height
[502]	E-W	3.67m	0.42m	2.30m	103.68m
[571]	N-S	8.09m	0.22m	2.30m	103.65m
[519]	E-W	3.68m	0.43m	2.30m	103.73m
	N-S	6.73m	0.42m	2.30m	103.66m
[523]	E-W	3.61m	0.33m	2.30m	103.60m
	N-S	2.92m	0.42m	2.30m	103.58m

7.5.7.9 The remains of the boiler structure itself constituted a brick base [572] in which was contained the remains of the metal frame of the tank. It should be noted here that thorough investigation and recording of the remains of the boiler could not be completed due to its destruction during remediation work undertaken to remove suspected asbestos material from the fill of the basement. The scarring which remained on the brickwork of wall [571] and on the floor of the basement was recorded (Figure 15 & Figure 18: Section 21) and enabled the overall dimensions of the boiler to be ascertained as 2.92m N-S by 2.34m E-W by 1.94m in height.

7.5.8 'Block A' Dining Room

7.5.8.1 To the north of the Cook House building [517], the remains of the 'Block A' Dining Room [576] were revealed (Figure 15). Encompassing only the southern portion of the building, the remains were heavily truncated by modern services [573] running E-W across the site, and extended beyond the northern LOE of the trench. A portion of the trench within

which the 'Block A' Dining Room was located remained unexcavated due to the presence of a protected tree (TPO) at modern ground level.

The Dining Room

7.5.8.2 All that remains of the dining room was wall [516] on the western side of the building, wall [520] on the eastern side and concrete footing [551] & [557] within cut [552] & [558] connecting them and demarcating the location of facade of the structure. Two small rooms were built onto the front of the building, adjacent to the main entrance. These were the Food Store and the Wash-up Room.

Wall	Orientation	Length	Width	Height	Top OD Height
[516]	N-S	5.00m	0.40m	0.40m	103.60m
[520]	N-S	3.50m	0.40m	0.47m	103.63m

7.5.8.3 Wall [516] was truncated through the centre by a modern E-W running service [+]. Both walls were truncated to the south by a separate, larger E-W running modern service [573].

The Food Store

7.5.8.4 Documentary research has revealed the room to the west of the entrance of the Block A Dining Room [576] was a food store. The room was formed of wall [500] which originally formed a rectangular structure and was built upon concrete footings [553] within cut [554]. The wall measured 2.41m N-S and 2.21m E-W with a width of 0.30m and height of 0.44m at 103.61m OD. The room was truncated to the north by a modern service trench [573].

The Wash-up Room

7.5.8.5 The room to the east of the Dining Room entrance is labelled on site plans as the 'wash-up'. It was comprised of a 'U' shaped structure (originally rectangular), truncated to the north [573]. The masonry [521] measured 2.51m N-S and 2.21 E-W by 0.30m wide and 0.50m high at 103.64m OD. The brickwork was built upon a concrete footing [555] which was located within cut [556].

7.5.9 'Block B' Dining Room

7.5.9.1 This building [538] was located to the south of the Cook House building [517] (Figure 15). Only the northern part of the foundations of this dining room was exposed within Trench 25, the remainder extending beyond the southern LOE of the trench. Part of the main element of the dining room along with two smaller rooms attached to the front of the structure were observed and recorded. The two smaller rooms have been identified as wash-up accommodation.

The Dining Room

7.5.9.2 This room comprises walls [545] and [546] which are situated on concrete foundation [549] within cut [550] and walls [539] and [540] built upon concrete foundation [547] within cut [548].

Wall	Orientation	Length	Width	Height	Top OD Height
[545]	E-W	7.56m	0.40m	0.39m	103.59m
[546]	N-S	3.78m	0.40m	0.36m	103.51m
[539]	N-S	2.83m	0.40m	0.38m	103.64m
[540]	E-W	1.90m	0.42m	0.38m	103.42m
	E-W	1.18m	0.42m	0.38m	103.54m

7.5.9.3 Wall [540] had been truncated by a modern service [+] and was entirely missing for 4.54m, with only the concrete foundation [547] remaining intact.

The Wash-up Rooms

7.5.9.4 The foundations of two Wash-up rooms were observed immediately adjacent and either side of the main entrance to the Dining Room.

7.5.9.5 The western Wash-up measured 4.84m² and consisted of walls [542], [543] & [544] on top of concrete foundation [549] inside cut [550]. The walls were 0.23m-0.30m high at 103.66m OD. Walls [543] and [544] were truncated by a modern service [+] run which ran E-W through the centre of the room.

7.5.9.6 The eastern Wash-up, measuring 5.05m², was more substantially truncated by the E-W modern service [+] and comprised of walls [540] and [541] built upon concrete footing [547] within cut [548]. The walls were 0.23m – 0.38m high at 103.60m OD. The south-eastern foundation of the room had been completely removed by the service trench with only the concrete foundation [547] remaining.

7.5.10 Latrine Block and Bin Store

7.5.10.1 The remains of structures identified from documentary research as the Latrine block and bin stores [525] were encountered during the strip and map towards the eastern end of Trench 25 (Figure 15).

7.5.10.2 The bin stores are comprised of walls [530], [531], [532] & [533] and are detailed in the table below.

Wall	Orientation	Length	Width	Height	Top OD Height
[532]	N-S	6.98m	0.22m	0.21m	103.39m
[533]	N-S	0.97m	0.23m	0.17m	103.49m
	E-W	1.88m	0.23m	0.17m	103.49m
[530]	N-S	1.57m	0.24m	0.19m	103.33m
	E-W	2.50m	0.24m	0.19m	103.30m
[531]	N-S	1.57m	0.24m	0.19m	103.32m
	E-W	2.50m	0.24m	0.19m	103.40m

7.5.10.3 It is likely that the enclosed area to the south of the structure may have been sheltered with the smaller area to the north being open. The brickwork was recorded as truncating the underlying clay [577]. Any concrete footings that may have existed below the brickwork were not observed.

7.5.10.4 A small portion of masonry relating to the Latrine block was observed adjacent and extending into the eastern LOE of the trench. The masonry comprises contexts [526], [527] and [528].

Wall	Orientation	Length	Width	Height	Top OD Height
[526]	N-S	1.75m	0.42m	NFE	103.32m
	E-W	0.70m	0.42m	NFE	103.40m
[527]	N-S	1.13m	0.42m	NFE	103.34m
[528]	N-S	1.25m	0.42m	NFE	103.33m
	E-W	0.35m	0.42m	NFE	103.30m

7.5.10.5 A small pipe was observed adjacent to wall [526] which would appear to relate to the water supply for the wash basins.

7.5.11 Services

7.5.11.1 A number of services, in the form of foul drains and brick inspection chambers, were observed in Trench 25 (Figure 15) which appeared contemporary with the construction of the buildings outlined above.

7.5.11.2 The foul drains [501], [506], [507], [508], [511], [512], [513] & [515], which are also shown on the skeleton record plans; each consisted of a ceramic pipe encased in concrete. They were noted between 103.11m OD and 103.67m OD.

7.5.11.3 Three brick manholes were encountered on site the details of which are tabulated below.

Manhole	Length	Width	Relates to drains	OD Height
[509]	1.60m	1.25m	[507], [508]	103.31m
[510]	1.73m	1.45m	[511]	103.21m
[514]	0.83m	0.83m	[512], [513]	103.47m

7.5.12 'Block C' Cook House

7.5.12.1 It appears that the remains of the 'Block C' Cook House building itself were partially uncovered in Trench 8 (Figure 15: *inset*).

7.5.12.2 Wall [66] which is built upon concrete foundation [65] & [67] would appear to represent the north-western corner of the building with wall [71] forming the northern limit of the building and wall [69] which abuts it (built upon concrete foundation [70]) an internal dividing wall.

Wall	Orientation	Length	Width	Height	Top OD Height
[66]	N-S	3.34m	0.40m	0.60m	101.89m
[69]	N-S	1.98m	0.20m	0.17m	101.92m

[71]	E-W	1.28m	0.18m	0.21m	101.88m
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7.5.12.3 A layer of concrete [72] & [73] may have formed the base of the service road which linked the Cook House to the remainder of the site. It was observed at 102.32m OD.

7.5.13 Landscaping

7.5.13.1 Trench 5 contained two layers that have been attributed to landscaping works, in particular the creation of a bank which was constructed on the southern side of 'Reading Way'.

7.5.13.2 Layer [40] comprised of soft light yellowish brown (with grey mottling) silty clay. It contained occasional small rounded flint pebbles. It measured 10.00m N-S and extended the 2.00m width of the trench with a depth of 0.16m at 101.37m OD. It was overlain with a 0.20m thick layer of soft mid greyish brown clay [39] which contained flecks of charcoal, occasional sub-angular flint and occasional fragments of brick. This layer was seen between 101.43m OD and 101.50m OD and extended the length and width of the trench, sloping to the south.

7.6 PHASE 5: MODIFICATIONS AND ADDITIONS TO THE BARRACKS – 1933-1966

7.6.1 Documentary research has revealed that a series of modifications and additions were made to the barracks during this period, including the construction of the hutted camp towards the south-west of the site in 1941. Little indication for this was observed in the archaeological investigations, with the exception of the structures that may relate to the northern limit of the hutted camp in Trench 12 and the construction of a rectangular ancillary building adjacent and to the east of the 'Block B' Dining Room in Trench 25 (Figure 16).

7.6.2 The Hutted Camp

7.6.2.1 Various brick and concrete footings and surfaces were observed in Trench 12 (Figure 16: *inset*) which appears to indicate that a structure of unknown use existed there during the late 20th century. Data relating to the masonry is presented in the table below.

Context	Type	Orientation	Length	Width	Height	Top OD Height
[45]	Brick	E-W	3.08m	0.65m	0.15m	91.18m
[46]	Concrete	E-W	3.00m	1.45m	NFE	91.18m
[47]	Brick	E-W	1.60m	0.20m	NFE	91.08m
[48]	Concrete	n/a	1.10m	0.40m	NFE	90.93m
[49]	Brick	N-S	1.00m	0.20m	NFE	90.97m
[50]	Concrete	N-S	2.50m	0.50m	NFE	90.88m
[51]	Concrete	N-S	2.50m	0.50m	NFE	90.84m
[52]	Concrete	n/a	0.50m	0.40m	NFE	90.89m
[53]	Concrete	N-S	1.00m	0.10m	NFE	90.93m
[54]	Brick	N-S	2.50m	0.20m	NFE	90.88m
[57]	Concrete	NE-SW	0.45m	0.10m	NFE	90.89m

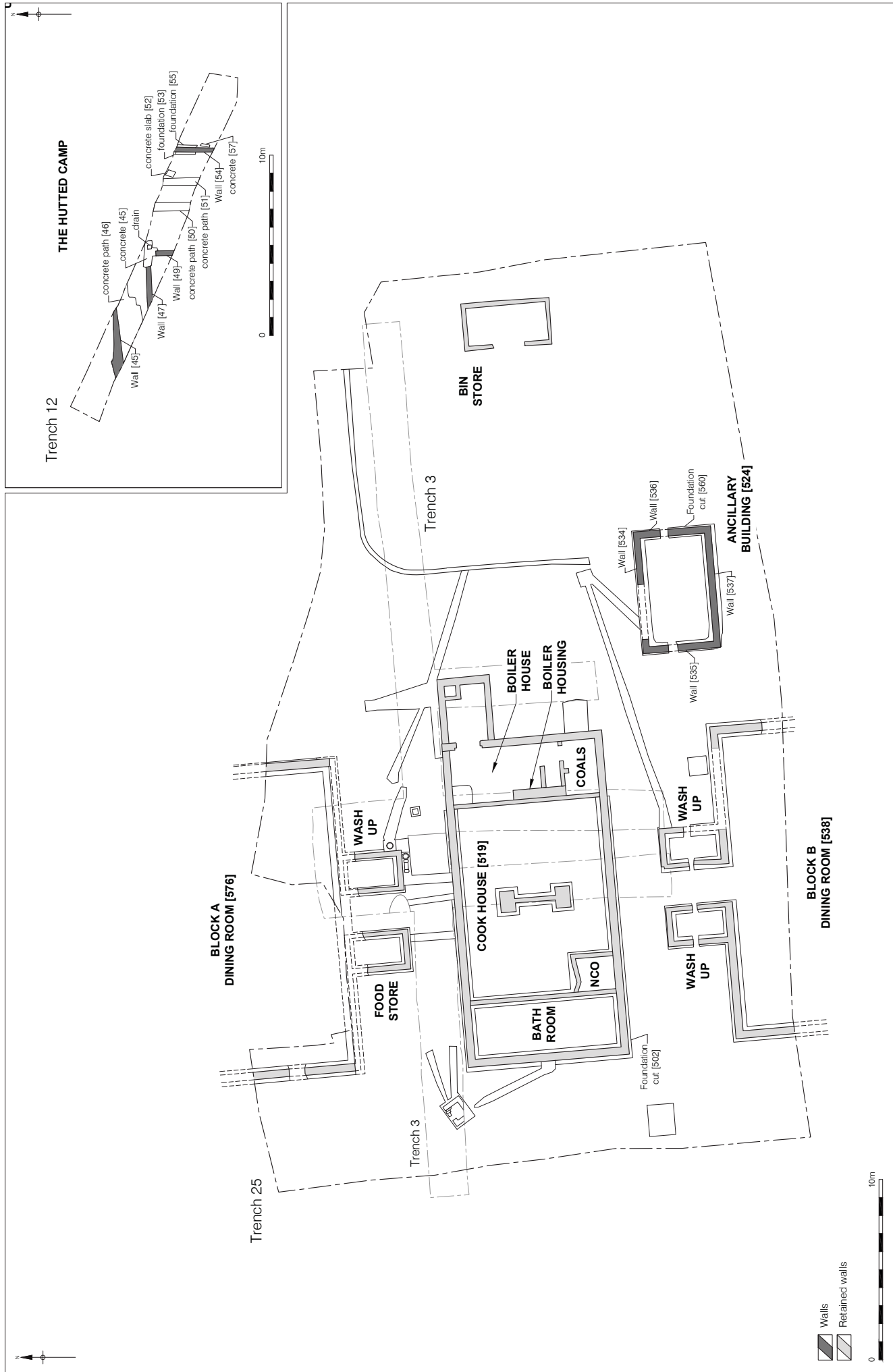


Figure 16
Phase 5 - 1933-1966. Trenches 12 and 25
1:200 at A3

7.6.2.2 Wall [45] appears to represent part of a boundary wall. The concrete surface [46] appears to be placed around the exterior of the corner of a small building that is represented by wall [47], complete with concrete drain [48]. The brick and concrete encountered to the south may relate to the hutted camp and or/associated services.

7.6.3 Ancillary Building

7.6.3.1 The foundations of a rectangular building located 4.35m to the east of the 'Block B' Dining Room were encountered in Trench 25 (Figure 16). It is comprised of four walls [534], [535], [536] & [537] which were built upon concrete footings [559] contained within a construction cut [560].

Wall	Orientation	Length	Width	Height	Top OD Height
[534]	E-W	6.70m	0.35m	0.38m	103.47m
[535]	N-S	4.30m	0.35m	0.42m	103.72m
[536]	N-S	4.30m	0.35m	0.22m	103.57m
[537]	E-W	6.70m	0.35m	0.38m	103.47m

7.6.3.2 The masonry consisted of red and pinkish red frogged brick measuring 220mm x 110mm x 70mm bonded with a fine, hard yellowish grey cement. The concrete footing comprised an indurated concrete with frequent small flint inclusions which measured 0.80m in width and ran the entire footprint of the building. Part of the brickwork was missing in the north-west corner of the building which may have been the result of damage during demolition or could indicate the location of an entrance/doorway.

7.6.3.3 Documentary research could not establish the nature or purpose of this building although it is indeed feasible that it was used to store equipment.

7.6.4 Examination of the skeleton plans for this period reveal that the latrine block had been demolished, with only the bin store remaining. In addition the 'Block B' Cook House had seen additional partitions constructed to demarcate the larder and the preparation room within the central part of the building. However, no evidence of this was seen archaeologically.

7.7 PHASE 6: CONVERSION TO THE HOME POSTAL AND COURIER COMMUNICATIONS DEPOT OF THE ROYAL ENGINEERS– 1967-2007

7.7.1 It is likely that the Cook Houses and associated Dining Rooms were all demolished during the substantial 1967-68 programme of rebuilding and redevelopment at the site following it being taken over by the Army Postal Service RE in 1961. A number of demolition and dump layers within the vicinity and across the site as a whole attest to such activity. In other areas evidence of landscaping and site levelling were observed along with masonry denoting the presence of a number of structures during this period along with modern services and a large rubbish pit which contained a large amount of pottery and glass pertaining to earliest period of the barracks history.

7.7.2 Demolition and Dump Layers

- 7.7.2.1 Demolition activity was evidenced in a number of trenches across the whole of the site. Stratigraphically the demolition and dump layers encountered in these trenches have been attributed to this more recent phase of the history of the site.
- 7.7.2.2 Demo and dumping layers [3], [15], [16], [17], [38], [64], [30], [59], [122], [125], [129], [130], [131], [132], [134] & [141] were observed in ten trenches, namely Trenches 4, 5, 6A, 6B, 8, 9, 11, 14 and 22. The layers comprised chiefly of a clayey silty sand containing frequent fragments of brick, mortar and concrete. Three of the layers [30], [64] & [141] contained charcoal and ash indicative of burning.
- 7.7.2.3 The layers ranged in thickness between 0.08m and 0.67m and were observed at the highest level of 101.93m OD in Trench 8 towards the centre of the site and the lowest of 90.28m OD in Trench 11 towards the west of the site.
- 7.7.2.4 Re-deposited clay [29], [86], [97], [123], [135], [136] & [137] was encountered in Trenches 10, 11, 14 & 17 between 87.66m OD and 95.21m OD.

7.7.3 Miscellaneous Ancillary Buildings and Structures

- 7.7.3.1 In Trench 7 a concrete slab [9] was seen within a construction cut [11] which contained clay packing [10] & [13] overlain by a friable dark brown sandy silt [8] (Figure 19: Section 1). The concrete slab itself measured 0.64m E-W and extended in a N-S direction beyond the LOE's of the trench. It was 0.13m thick and identified at 101.82m OD. It is likely that it relates to the Support Unit and Motor Transport HQ building which was erected during the 1967-68 period, immediately north of and adjacent to the trench. Alternatively it could relate to services connected to this building.
- 7.7.3.2 A N-S aligned brick wall footing [110] was recorded in Trench 10 (Figure 18). It measured 2.00m in length (into the LOE) by 0.10m in width and 0.10m in height at 95.18m OD. It cut a rubbly subsoil layer [122] and likely forms a property boundary related to the 1960's houses built immediately to the north. These dwellings probably comprise family quarters for married servicemen and women (Thompson, *pers. com.*).
- 7.7.3.3 In Trench 18 (Figure 18) were the remains of a granite cobblestone pavement [95] which it is thought once ran adjacent to the course of Drew Avenue. The portion observed which ran into the LOE of the trench, measured 0.20m in length by 0.15m wide and 0.15m thick at 82.61m OD. A layer of rubble packing [97] was recorded on either side of the cobblestones at 82.52m OD. It appears that the pavement had been repaired in the form of a concrete [96] patch measuring 0.80m by 0.20m.

7.7.4 Service Trenches

- 7.7.4.1 A number of service trenches/gullies [108], [139] & [140] pertaining mostly to on site drainage were identified across the site, in Trenches 9 & 11 (Figure 18).
- 7.7.4.2 Of particular note, however, was a large E-W truncation which came to light towards the north of Trench 25 (Figure 18), bisecting the front of the 'Block A' Dining Room. The cut

[573] measured 39.44m E-W by a maximum of 4.86m N-S at 103.29m OD (although likely cut from higher; potentially modern day ground level). It contained fill [574] which comprised silty clay from which came a residual 1920 George V penny, Sf 3.

7.7.4.3 Modern services such as those relating to telecoms were also observed in a number of areas, notably in Trench 25 [+] (Figure 17).

7.7.5 Rubbish Pits

7.7.5.1 The entire length of Trench 6C (Figure 18) is situated within the cut of large rubbish pit [575]. Within the pit at least five distinct episodes of infilling were observed with the feature continuing beyond the basal LOE of the trench. The deepest fill encountered [25] & [26] consisted of a loose dark reddish brownish grey sand with ash and charcoal. It also contained frequent fragments of glass and pottery which all pertain to the military presence on site markings confirm dates from the early 20th century on (see Appendices 2 & 3 for further details). A 0.31m thick dark yellowish brown sandy silty clay [24] overlay this which in turn was sealed by a loose dark brownish grey silty sandy ashy fill [23] that was 0.10m thick. The top of the pit comprised of a 0.26m thick friable dark yellowish grey silty clayey gravel [22] sealed below a soft mid brownish grey sandy clayey silt [21] which contained frequent amounts of CBM and glass and was 0.68m thick at 98.34m OD.

7.7.5.2 Another pit was observed in Trench 17 towards the south of the site. The pit [85] was rounded in shape with almost vertical sides. It measured 35.00m N-S across the 2.00m width of the trench and was 0.50m deep from 87.95m OD. It contained a firm dark bluish grey [84] clay which contained moderate amounts of CBM, concrete and flint pebbles.

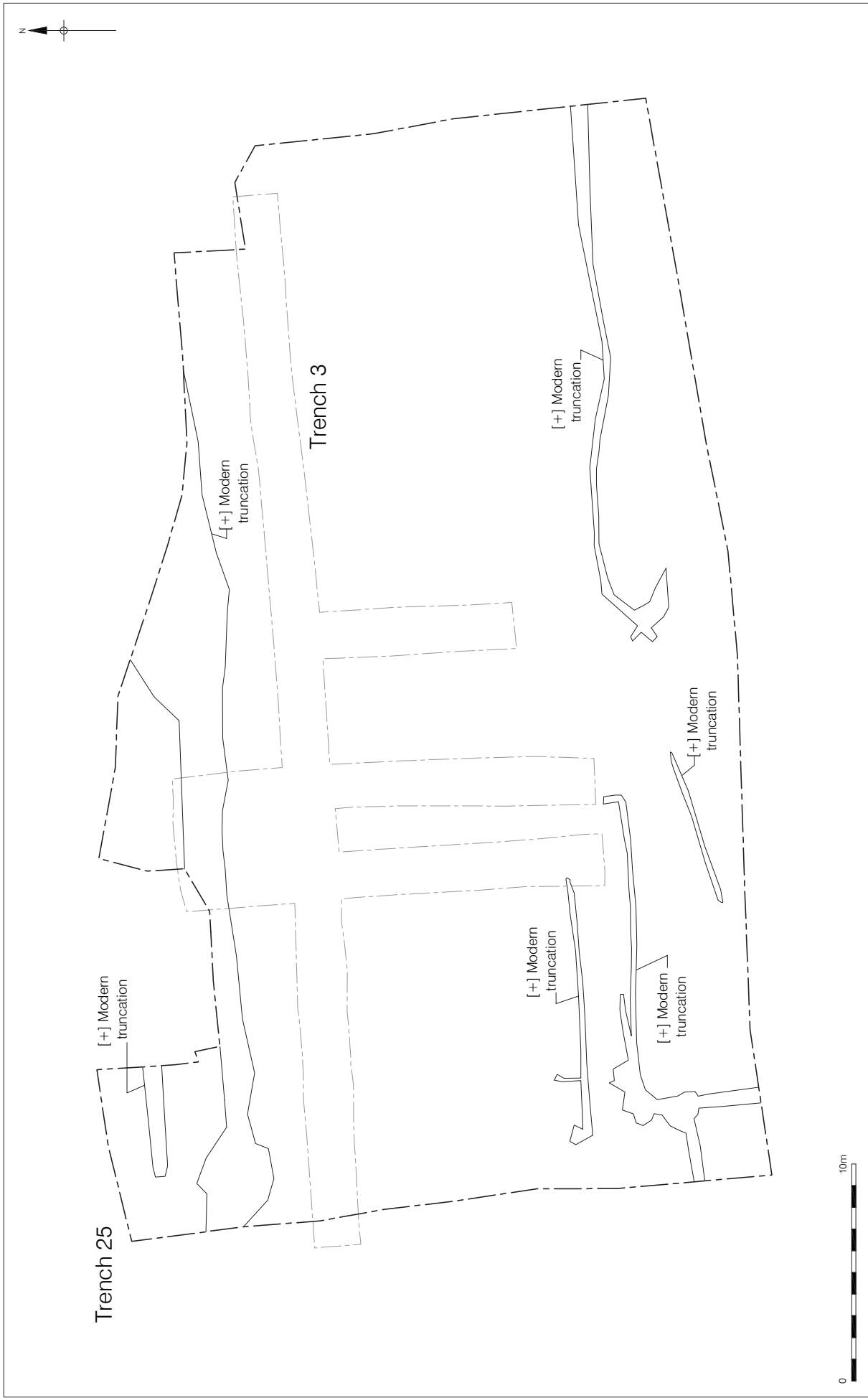
7.7.6 Ground Levelling/Landscaping

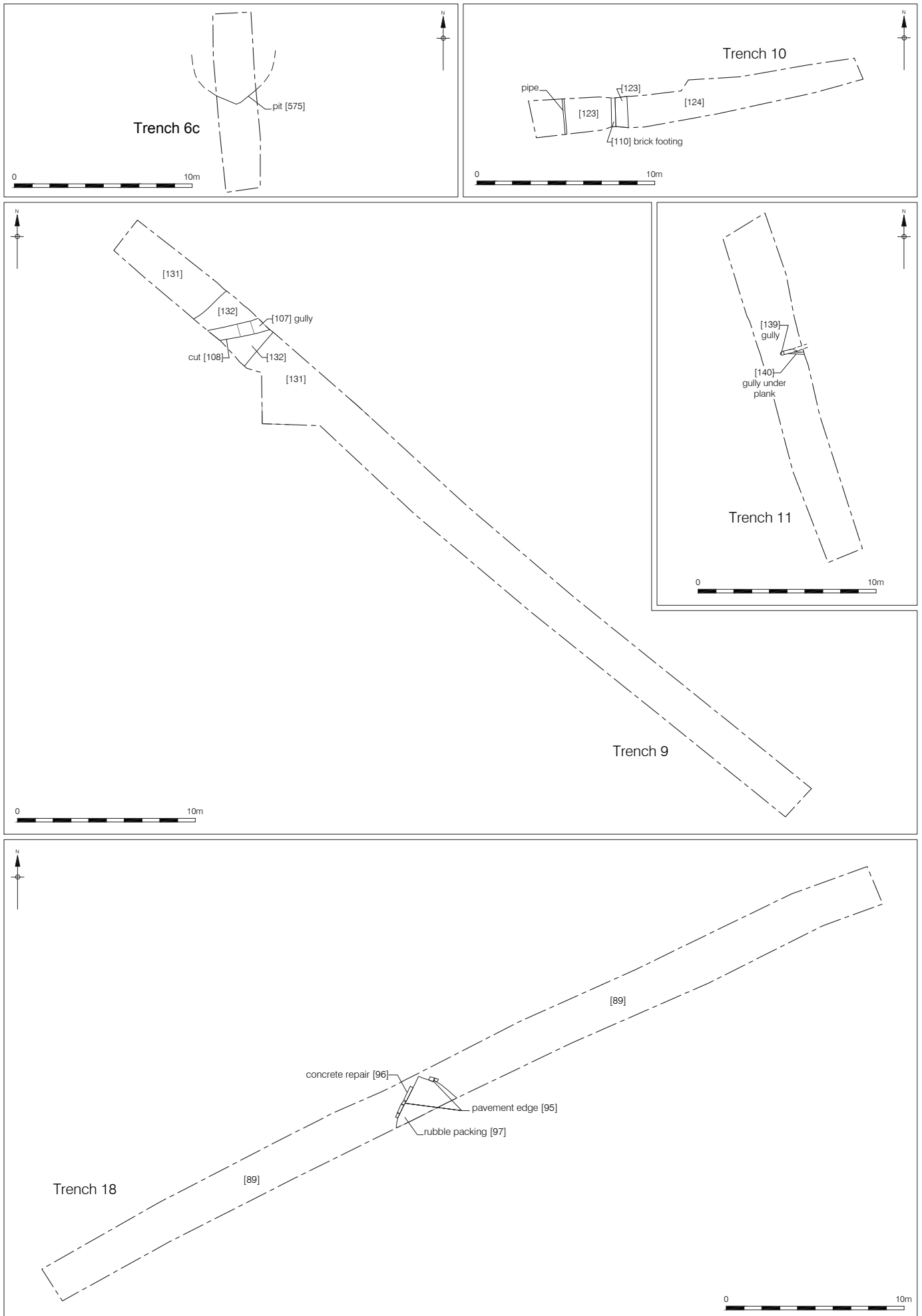
7.7.6.1 Instances of levelling or landscaping of the ground undertaken across the site during this phase was obvious in a number of Trenches; 4, 5, 6A, 6B, 6C, 7, 8, 9, 10, 11, 12, 14, 15, 16, 17, 18, 19 & 20.

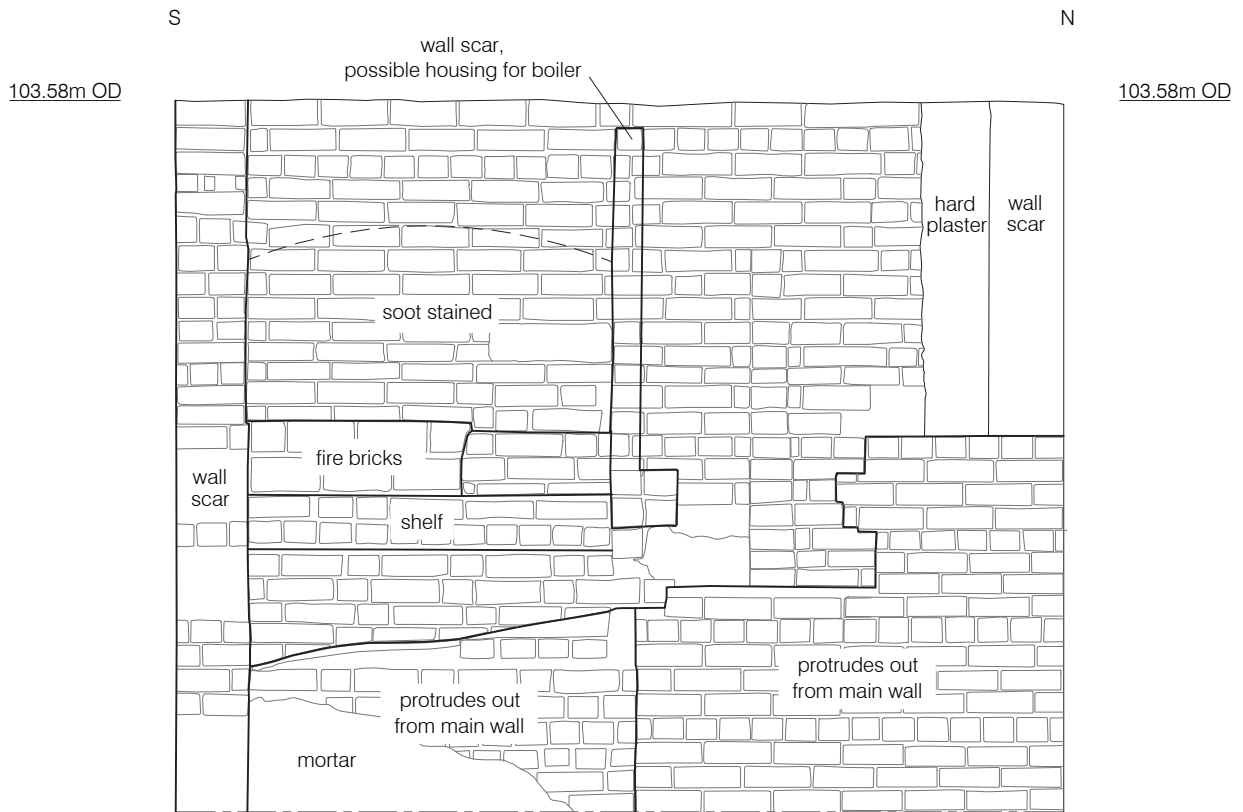
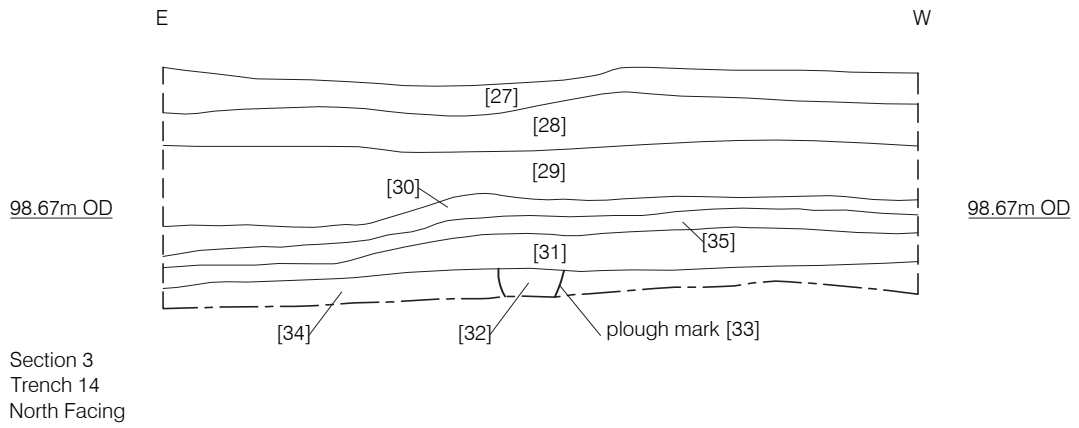
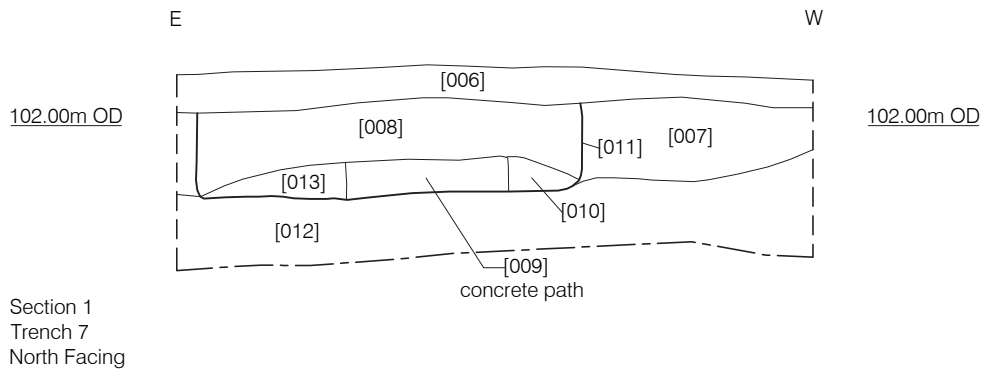
7.7.6.2 A specifically deposited levelling layer [63] was observed in Trench 8. It comprised of loose yellow coarse sandy gravel which measured 0.15m in depth at 101.99m OD. It sealed a layer of burnt demolition debris [64].

7.7.6.3 Subsoil horizons [2], [28], [43], [83], [89] were seen across the site, consisting chiefly of a friable medium brown sandy silt containing occasional small rounded flint pebbles and moderate fragments of CBM and mortar. It was observed between 82.65m OD (Trench 18) towards the south of the site and 99.09m OD (Trench 14) towards the centre.

7.7.6.4 Topsoil [1], [6], [14], [19], [27], [37], [42], [58], [61], [74], [77], [82], [85], [88], [98], [103], [121], [128], [133], [600], [608], [615], [620], [651] was observed in Trenches 4, 5, 6A, 6B, 6C, 7, 8, 9, 10, 11, 12, 14, 15, 16, 17, 18, 19, 20, 26, 27, 28, 29 & 30. It was observed at 100.31m OD towards the north of the site in Trench 6A, 102.14m in Trench 8 towards the centre, 91.42m OD towards the west in Trench 12 and at 71.10m OD in Trench 26 in the south.







0 1m

8 Research Objectives

8.1 Original Aims and Objectives of the Investigation

8.1.1 The investigation's aims and objectives, as defined prior to the fieldwork (Moore 2012) are presented here along with responses based upon the data and analysis provided and undertaken as part of the project.

- *To preserve 'by record' the extent and significance of any surviving archaeological features and deposits within the site.*

As presented throughout this report, a number of archaeological features were encountered during the Stage 1 & 3 evaluations and subsequent Stage 2 strip and map exercise and Stage 3 mitigation work. During the course of the archaeological investigations all features, deposits and structures identified were thoroughly recorded by means of planning, written notation and photographic record, thereby ensuring preservation 'by record'. Environmental samples were taken from the fills of the potential prehistoric features encountered to the south of the site with the view to them undergoing carbon-dating to ascertain from which period they originate.

- *To, following the archaeological mitigation phase, assess the potential for further research and publication of the archaeological archive.*

The significance of the archaeology observed on site and recommendations for future publication will be outlined in the following section of this report.

- *To explain any chronological, spatial or functional relationships between the structures/remains identified and how they relate to the history of the barracks.*

The archaeological investigations and subsequent analysis of the data obtained during them combined with apposite historical research have identified up to five distinct phases of activity on site, the latter three of which relate specifically to the Inglis Barracks. These were, namely;

- **(Phase 4): Construction and Early Years of the Barracks – 1904-1932**
- **(Phase 5): Modifications and Additions to the Barracks – 1933-1966**
- **(Phase 6): Conversion to the Home Postal and Courier Communications Depot of the Royal Engineers and Eventual Decline – 1967-2007**

Ground consolidation activity was observed in Trenches 5, 8, 16, 18, 19 & 20 in preparation for the Phase 3 construction of the barracks. At the same time timbers observed in Trench 25 appear to represent a temporary narrow gauge railway which was likely utilised during

the main construction phase of the A, B and C barrack room blocks and associated dining rooms and cook houses. The structural remains of the A, B and C block Cook Houses were observed in Trenches 8 and 25. The A and B block dining rooms were also encountered and recorded and it has been possible with the help of documentary sources to identify several rooms located within these buildings such as the bath room, preparation room, NCO's room, the boiler house, the food store and the wash-up rooms. To the east of the A and B block dining facilities a latrine block and bin store were also identified. Foul drains servicing these buildings were also observed and recorded along with evidence for landscaping works in Trench 5. Evidence for the Hutted Camp, which was established during Phase 4, was seen in Trench 12. An ancillary building constructed during this period was also recorded in Trench 25. Phase 5 activity is mainly characterised by the presence of demolition and dump layers, rubbish pits, ground levelling/landscaping, service trenches and miscellaneous ancillary buildings in Trenches 7, 10 and 18 subsequent to the site being taken over by the Army Postal Service of the Royal Engineers in 1961.

- *Assess the significance of any evidence of previous occupation of the site within the wider context of contemporary society within the vicinity.*

During the course of the Stage 1 and 2 archaeological investigations no evidence for previous occupation of the site was encountered although the Stage 3 evaluation conducted towards the south of the site produced a series of pits and post/stake holes which may represent a temporary Bronze Age hunting / herding encampment. Evidence for post-medieval agricultural activity was observed in the form of agricultural soil in Trenches 14, 15, 16, 18, 19, 20, 22, 26 & 30; plough marks/cart ruts in Trench 14 and land boundary in Trench 18. All of the above features produced pottery datable to the post-medieval period. Some residual finds were also recovered from these contexts including a sherd of shell-tempered Roman pottery in Trench 16 and an early medieval sherd in Trench 11. Both these items are likely to have drifted from further afield but they attest to activity in the locality during these periods.

8.2 Additional Research Objectives

8.2.1 The archaeological investigation and subsequent assessment of the records have raised a number of additional research questions which should be addressed to improve our understanding of the history of the site. These questions are outlined below.

- Can C¹⁴ dating shed light on the dating of the pits and post/stake holes encountered to the south of the site?
- Can the bulk environmental samples assist in deciding whether herding activities were one aspect of the prehistoric activity uncovered at the site.
- What can their configuration tell us about the nature of the activity that was taking place

here? This should include research into and comparison of other prehistoric sites with features of this kind.

- With regard to the Inglis Barracks, what information can be obtained to assist our understanding of the spatial configuration of the barrack buildings and the thinking behind their design?
- What can the site configuration tell us about the planned functions of troop garrisoning & deployment aspects of the site at the time of it having a military role.
- Can further research increase our understanding of many of the ancillary structures observed across the site during the course of its development?
- What analysis & interpretation can be made of the changes made to the site following its acquisition by the Army Postal Service for the Royal Engineers in 1961?
- What can the glass assemblage recovered from the site (in conjunction with the ceramics and small finds) tell us about the activities that took place there during the life of the barracks?

9 Importance of the Results and Publication Outline

9.1 Importance of the Results

9.2 The investigation carried out by Pre-Construct Archaeology Ltd. at the Millbrook Park, Mill Hill (FIB12), revealed the below-ground foundations of buildings and infrastructure that formed part of the former Inglis Barracks alongside isolated evidence of post-medieval agricultural activity that preceded its construction. In addition to this evidence of potential prehistoric features on site provides a rare indication of activity occurring in the area during this period. Overall the age, nature and layout of the features, deposits and structures encountered here shed light on its development through potentially several thousand years.

9.3 The work undertaken at the Former Inglis Barracks site has demonstrated the importance of archaeological investigations being undertaken on such large scale sites and provided valuable evidence of human activity believed to date to a period where little is known of such occupation in the immediate vicinity. This assessment has also illustrated the value of combining archaeological and historical research when investigating a military site of this nature. In combination, these sources enabled the layout of the site and the way that it functioned as an important military barracks along with the additions and modifications that occurred to it over time to be comprehensively reviewed. This facilitated a significantly improved understanding of the development of the site than would have been possible using either data source in isolation. This site is of particular regional and nation interest due to its association with the Middlesex Regiment, also known as the 'die hards'.

9.4 The remains of the Former Inglis Barracks which are now preserved in record stand as a notable example of Edwardian military planning and logistics during a time where imperial conflicts and concerns were becoming increasingly relevant. Its existence during the course of two world wars and the Korean conflict allows for a wealth of information pertaining to the field of early 20th century military archaeology, interest of which has grown considerably in recent years and will undoubtedly continue to do so.

9.5 Further Work

9.5.1 In relation to the archaeological data obtained from the excavation; listed below are the recommendations of further work as identified in the specialist assessments (see appendices).

9.5.2 Pottery

9.5.2.1 The pottery from context [25] has much potential for determining what types of pottery vessel shapes were used at an army establishment and by whom. This group of pottery, despite its late date, has the potential to be seminal for the investigation of 19th/20th century assemblages of military ceramics. A report is recommended upon the pottery from context [25] and the text should be supplemented with photographs of the ceramics, which should include group compositions incorporating the glass ware.

9.5.3 Glass

9.5.3.1 This assemblage provides valuable information on activities associated with the headquarters of the Middlesex Regiment. Despite the glass being of a very late date, it is important for demonstrating the potential of studying finds from military establishments and has not been undertaken previously with material associated with the modern army. It is recommended that a short publication text is prepared on the glass and that this should be supplemented with photographs.

9.5.4 Ceramic Building Material

9.5.4.1 As this comprised well-known types no further analysis is recommended, although further research into the 'FARCO' stamped brick from basement wall [571], for which no manufacturer can immediately be identified, may be of interest in clarifying aspects of date and supply.

9.5.5 Clay Tobacco Pipe

9.5.5.1 None of the pipes merit illustration. There are no recommendations for further work on the assemblage.

9.5.6 Metal and Small Finds

9.5.6.1 The metal and small finds form an integral component of the finds and should, where relevant, be included in any further publication of the site. For the small assemblage from the former Inglis Barracks, a note with reference to the finds may be sufficient; the ivory tooth brush (sf 4) would make a nice photograph. No further work is recommended for these finds.

9.5.7 The results of the investigations will be published as an entry in the London Archaeologist 'Round Up'. Subsequently a more substantial article will be submitted to the same publication with a more in depth discussion of the results of the work.

9.5.8 The entire site archive will be deposited at the London Archaeological Archive and Research Centre (LAARC) under site code FIB13 following approval of this report. PCA will provide a copy to the local studies library, the Greater London Historic Environment Record and the Archaeology Advisor of the London Borough of Barnet.

10 Contents of the Archive

10.1 The contents of the archive (from both the evaluation and the excavation) are:

10.1.1 The paper archive:

	Scale	Drawings	Sheets
Context Sheets	-	-	281
Plans	1:20; 1:50; 1:100	34	57
Sections	1:10	26	27

10.1.2 The photographic archive:

Black and White Negative Film (35mm)	6 films
Colour Transparency Film (35mm)	6 films
Digital Format	208 shots

10.1.3 The finds archive:

Pot	2.5 boxes
Building Material	½ box
CTP	½ box
Bone	½ box
Glass	½ box
Metal/ Small Finds	1 box
Lithics	½ box

(Box – standard archive box = 0.46m x 0.19m x 0.13m)

11 Acknowledgements

- 11.1 Pre-Construct Archaeology Limited wishes to thank Chris Powell and Ian Whitehead of DBK LLP for commissioning the archaeological works on behalf of The Inglis Consortium. Thanks are also extended to Squibb Demolition, especially Terry Madden, and NATTA, especially Nick Wyatt, the main contractors for Stages 1 & 2 and Stage 3 respectively, for their logistical support and co-operation.
- 11.2 Thanks also to Kim Stabler and Sandy Kidd of English Heritage (GLAAS) who monitored the Stage 1 & 2 and Stage 3 work respectively, on behalf of the local authority, the London Borough of Barnet.
- 11.3 The author of this report would like to thank the archaeological team who worked in unpleasant conditions to faithfully record and preserve the archaeology encountered on site, namely; Ian Cipin, Clare Jackson, Paul McGarrity, Mark Beasley, Lee Harvey, Barby Brederova, John Joyce and Matthew Edmonds. Thanks are also given to Chris Cooper for logistical support and Richard Archer the surveyor.
- 11.4 Additional thanks to Josephine Brown and Jenny Simonson for illustrations, Chris Jarrett for pottery, glass and clay tobacco pipe assessment, Berni Sudds for CBM assessment, Märit Gaimster and Guy Thompson for metal and small finds assessment, and also the latter for historical research. Thanks to Peter Moore for his project management and Dr Frank Meddens for post-excavation management, advice and editing this report.

12 Bibliography

Primary Sources

The National Archives (TNA), Kew

WO 33/175 Report of Committee on Barrack Accommodation, 1900

WO 78/3770 Mill Hill Depot Barracks Skeleton Record Plan of Barracks. Scale 1:500, 1913

WO 305/3894 Home Postal and Courier Communications Depot, Royal Engineers, 1965-1972

WO 379/64 Middlesex Regiment, later Middlesex Regiment (Duke of Cambridge's Own). Includes 12th (HD) battalion Queen's (Royal West Surrey Regiment) and 13th battalion London Regiment, later Princess Louise's Kensington Regiment, 1914 - 1961

WORK 43/617 Mill Hill Depot Barracks. Skeleton record plan: Ground floor, table of accommodation and synopsis of cost and construction. Scale: 1:500. Signed by H N MacGeorge, Lt Col Commanding Royal Engineers, 1933

WORK 43/618 Mill Hill Depot Barracks. Skeleton record plan: Ground plan. Scale 1:500. Signed by H N MacGeorge, Lt Col Commanding Royal Engineers, 1933

WORK 43/619 Mill Hill Depot Barracks. Skeleton record plan: First floor. Scale 1:500. Signed by H N MacGeorge, Lt Col Commanding Royal Engineers, 1933

WORK 43/620 Mill Hill Depot Barracks. Skeleton record plan: First floor. Scale 1:500. Signed by H N MacGeorge, Lt Col Commanding Royal Engineers, 1933

WORK 43/621 Mill Hill Hutted Camp. Skeleton record plan: Ground plan showing barrack huts, table of accommodation and Navy, Army and Air Force Institute. Scale 1:500. Signed by C R Cane, Lt Col Commanding Royal Engineers, 1940

London Metropolitan Archives (LMA)

LMA/4070/03/01381 Mill Hill Depot Barracks, Mill Hill, Hendon UD: Planning application for roads and sewers, January 1902-December 1903

Secondary Sources

Baker, T.F.T. & Pugh, R.B. 1976. *A History of the County of Middlesex: Volume 5*, online at: <http://www.british-history.ac.uk/source.aspx?pubid=87>

Douet, J. 1998. *British Barracks, 1600-1914. Their Architecture and Role in Society*. London: The Stationery Office

GVA Grimley 2009. Mill Hill East: Environmental Impact Assessment Scoping Report (updated from November 2008). Unpublished Report.

Halcrow 2009. Inglis Barracks, Mill Hill: Cultural Desk Based Assessment. Halcrow. Unpublished Report.

Halcrow 2011. Mill Hill East. WSI – Trial Trenching. Halcrow. Unpublished Report.

Lambert, N.A. 1999. *Sir John Fisher's Naval Revolution*. Columbia: University of South Carolina Press.

Moore, P. 2012. Written Scheme of Investigation: Former Inglis Barracks, Millbrook Park, Mill Hill, London Borough of Barnet. PCA. Unpublished Report.

Osborne, M. 2012. *Defending London. The Military Landscape from Prehistory to the Present*.

Stroud: Historical Publications

Osborne, M. 2006. *20th Century Defences in Britain: the London Area*. Market Deeping: Concrete Publications

Peden, G.C. 2007. *Arms, Economics and British Strategy, from Dreadnoughts to Hydrogen Bombs*. Cambridge: Cambridge University Press

Proud, E.B. 1982. *The History of the British Army Postal Service Volume 3: 1927-1963*. Heathfield: Proud-Bailey & Company

Spiers, E.M. 1992. *The Late Victorian Army 1868-1902* (Manchester History of the British Army). Manchester: Manchester University Press

Appendix 1: Context Index

Site code	Context	Trench	Plan	Section	Type	Interpretation	Period	Phase
FIB12	1	6B		S.4	Layer	Topsoil	1967-Present	6
FIB12	2	6B		S.4	Layer	Subsoil	1967-Present	6
FIB12	3	6B		S.4	Layer	Demolition Layer	1967-Present	6
FIB12	4	6B		S.4	Layer	Poss dump layer	1904-1932	4
FIB12	5	6B		S.4	Layer	Natural	Natural	1
FIB12	6	7		S.1	Layer	Topsoil	1967-Present	6
FIB12	7	7		S.1	Layer	Landscaping layer	1904-1932	4
FIB12	8	7		S.1	Fill	Fill of construction cut	1967-Present	6
FIB12	9	7		S.1	Layer	Concrete slab	1967-Present	6
FIB12	10	7		S.1	Fill	Clay fill-same as (13)	1967-Present	6
FIB12	11	7		S.1	Cut	Construction cut for concrete slab	1967-Present	6
FIB12	12	7		S.1	Layer	Natural	Natural	1
FIB12	13	7		S.1	Fill	Clay fill-same as (10)	1967-Present	6
FIB12	14	4		S.2	Layer	Topsoil	1967-Present	6
FIB12	15	4		S.2	Layer	Demolition subsoil	1967-Present	6
FIB12	16	4		S.2	Layer	Rubbish dump layer	1967-Present	6
FIB12	17	4		S.2	Layer	Dump layer	1967-Present	6
FIB12	18	4		S.2	Layer	Natural	Natural	1
FIB12	19	6C		S.5	Layer	Topsoil	1967-Present	6
FIB12	20	6C		S.5	Layer	Subsoil with demolition rubble	1967-Present	6
FIB12	21	6C		S.5	Fill	Dumping episode within pit	1967-Present	6
FIB12	22	6C		S.5	Fill	Dumping episode within pit	1967-Present	6
FIB12	23	6C		S.5	Fill	Ashy dump layer within pit	1967-Present	6
FIB12	24	6C		S.5	Fill	Layer within pit	1967-Present	6

FIB12	25	6C		S.5	Fill	Dump within pit	1967-Present	6
FIB12	26	6C		S.5	Fill	Dump within pit	1967-Present	6
FIB12	27	14		S.3	Layer	Topsoil	1967-Present	6
FIB12	28	14		S.3	Layer	Subsoil	1967-Present	6
FIB12	29	14		S.3	Layer	Redeposited clay	1967-Present	6
FIB12	30	14		S.3	Layer	Burnt charcoal & ash	1967-Present	6
FIB12	31	14		S.3	Layer	Agricultural subsoil	Post-Medieval	3
FIB12	32	14		S.3	Fill	Fill of [33]-plough line	Post-Medieval	3
FIB12	33	14		S.3	Cut	Plough line	Post-Medieval	3
FIB12	34	14		S.3	Layer	Agricultural subsoil	Post-Medieval	3
FIB12	35	14		S.3	Layer	Dump layer	1904-1932	4
FIB12	36	14		S.3	Layer	Natural	Natural	1
FIB12	37	5		S.16	Layer	Topsoil	1967-Present	6
FIB12	38	5		S.16	Layer	Demolition dump	1967-Present	6
FIB12	39	5		S.16	Layer	Redeposited clay	1904-1932	4
FIB12	40	5		S.16	Layer	Poss levelling layer	1904-1932	4
FIB12	41	5		S.16	Layer	Redeposited clay	1904-1932	4
FIB12	42	12		S.8	Layer	Topsoil	1967-Present	6
FIB12	43	12		S.8	Layer	Subsoil	1933-1966	5
FIB12	44	12		S.8	Layer	Natural	Natural	1
FIB12	45	12		S.8	Masonry	Mid 20thC wall	1933-1966	5
FIB12	46	12	TR12		Masonry	Concrete path	1933-1966	5
FIB12	47	12	TR12		Masonry	Mid 20thC wall	1933-1966	5
FIB12	48	12	TR12		Masonry	Concrete slab with inset drain	1933-1966	5
FIB12	49	12	TR12		Masonry	Mid 20thC wall	1933-1966	5
FIB12	50	12	TR12		Masonry	Concrete base	1933-1966	5
FIB12	51	12	TR12		Masonry	Concrete base	1933-1966	5
FIB12	52	12	TR12		Masonry	Concrete slab	1933-1966	5
FIB12	53	12	TR12		Masonry	Concrete pad	1933-1966	5
FIB12	54	12	TR12		Masonry	Mid 20thC wall	1933-1966	5

FIB12	55	12	TR12		Fill	Fill of poss drainage gully	1933-1966	5
FIB12	56	12	TR12		Cut	Poss drainage gully	1933-1966	5
FIB12	57	12	TR12		Masonry	Concrete slab	1933-1966	5
FIB12	58	6A		S.15	Layer	Topsoil	1967-Present	6
FIB12	59	6A		S.15	Layer	Subsoil with demolition rubble	1967-Present	6
FIB12	60	6A		S.15	Layer	Natural	Natural	1
FIB12	61	8		S.17	Layer	Topsoil	1967-Present	6
FIB12	62	8		S.17	Layer	Redeposited clay	1904-1932	4
FIB12	63	8		S.17	Layer	Levelling layer	1967-Present	6
FIB12	64	8		S.17	Layer	Burnt building material	1967-Present	6
FIB12	65	8		S.17	Masonry	Concrete foundation	1904-1932	4
FIB12	66	8		S.17	Masonry	20thC wall	1904-1932	4
FIB12	67	8		S.17	Masonry	Concrete foundation	1904-1932	4
FIB12	68	8		S.17	Layer	Redeposited clay	1904-1932	4
FIB12	69	8		S.17	Masonry	Late 20thC wall	1904-1932	4
FIB12	70	8		S.17	Masonry	Concrete pad	1904-1932	4
FIB12	71	8	TR8		Masonry	Late 20thC wall	1904-1932	4
FIB12	72	8			Masonry	Concrete floor laid over [66]	1904-1932	4
FIB12	73	8			Masonry	Concrete foundation	1904-1932	4
FIB12	74	15		S.19	Layer	Topsoil	1967-Present	6
FIB12	75	15		S.19	Layer	Agricultural subsoil	Post-medieval	3
FIB12	76	15		S.19	Layer	Natural	Natural	1
FIB12	77	16		S.10	Layer	Topsoil	1967-Present	6
FIB12	78	16		S.10	Layer	Subsoil	1904-1932	4
FIB12	79	16		S.10	Layer	Redeposited clay	1904-1932	4
FIB12	80	16		S.10	Layer	Agricultural subsoil	Post-Medieval	3
FIB12	81	16		S.10	Layer	Natural	Natural	1
FIB12	82	17		S.11	Layer	Topsoil	1967-Present	6
FIB12	83	17		S.11	Layer	Subsoil	1967-Present	6

FIB12	84	17		S.11	Fill	Modern backfill	1967-Present	6
FIB12	85	17		S.11	Cut	V. Large modern hole	1967-Present	6
FIB12	86	17		S.11	Layer	Redeposited clay	1967-Present	6
FIB12	87	17		S.11	Layer	Natural	Natural	1
FIB12	88	18		S.12	Layer	Topsoil	1967-Present	6
FIB12	89	18		S.12	Layer	Subsoil	1967-Present	6
FIB12	90	18		S.12	Layer	Redeposited clay	1904-1932	4
FIB12	91	18		S.12	Layer	Agricultural subsoil	Post-medieval	3
FIB12	92	18		S.12	Layer	Natural	Natural	1
FIB12	93	18			Fill	Fill of [94]	Post-medieval	3
FIB12	94	18			Cut	Land boundary ditch	Post-medieval	3
FIB12	95	18			Masonry	Granite cobble pavement edge	1967-Present	6
FIB12	96	18			Masonry	Concrete repair to [95]	1967-Present	6
FIB12	97	18			Layer	Rubble packing around [95]	1967-Present	6
FIB12	98	20		S.14	Layer	Topsoil	1967-Present	6
FIB12	99	20		S.14	Layer	Redeposited clay	1904-1932	4
FIB12	100	20		S.14	Layer	Dump layer	1904-1932	4
FIB12	101	20		S.14	Layer	Agricultural subsoil	Post-medieval	3
FIB12	102	20		S.14	Layer	Natural	Natural	1
FIB12	103	19		S.13	Layer	Topsoil	1967-Present	6
FIB12	104	19		S.13	Layer	Redeposited clay	1904-1932	4
FIB12	105	19		S.13	Layer	Agricultural subsoil	Post-medieval	3
FIB12	106	19		S.13	Layer	Natural	Natural	1
FIB12	107	9	TR9		Fill	Poss drainage gully fill	1967-Present	6
FIB12	108	9	TR9		Cut	Poss drainage gully	1967-Present	6
FIB12	109	3	TR 3		Masonry	Wall Base	1904-1932	4
FIB12	110	10	TR10	S.6	Masonry	Mid 20thC wall	1967-Present	6
FIB12	111	3	TR 3		Masonry	Poss internal sub division	1904-1932	4
FIB12	112	3	TR 3		Masonry	Main exterior wall	1904-1932	4

FIB12	113	3	TR 3		Masonry	Concrete wall base	1904-1932	4
FIB12	114	3	TR 3		Masonry	Rectangular structure	1904-1932	4
FIB12	115	3	TR 3		Masonry	Internal subdivision	1904-1932	4
FIB12	116	3	TR 3		Masonry	Drain run	1904-1932	4
FIB12	117	3	TR 3		Masonry	Poss main wall return	1904-1932	4
FIB12	118	3	TR 3		Masonry	Poss kerb	1904-1932	4
FIB12	119	3	TR 3		Masonry	Concrete wall base	1904-1932	4
FIB12	120	11	TR11	S.7	Layer	Disturbed Natural	Post-medieval	3
FIB12	121	10		S.6	Layer	Topsoil	1967-Present	6
FIB12	122	10		S.6	Layer	Subsoil with rubble	1967-Present	6
FIB12	123	10		S.6	Layer	Redeposited clay	1967-Present	6
FIB12	124	10		S.6	Layer	Natural	Natural	1
FIB12	125	22		S.20	Layer	Demolition dump layer	1967-Present	6
FIB12	126	22		S.20	Layer	Agricultural subsoil	Post-Medieval	3
FIB12	127	22	TR22	S.20	Layer	Natural	Natural	1
FIB12	128	9		S.18	Layer	Topsoil	1967-Present	6
FIB12	129	9		S.18	Layer	Redeposited clay with building rubble	1967-Present	6
FIB12	130	9		S.18	Layer	Redeposited clay with building rubble	1967-Present	6
FIB12	131	9		S.18	Layer	Dump layer	1967-Present	6
FIB12	132	9		S.18	Layer	Crushed brick demo layer	1967-Present	6
FIB12	133	11		S.7	Layer	Topsoil	1967-Present	6
FIB12	134	11		S.7	Layer	Dump layer	1967-Present	6
FIB12	135	11		S.7	Layer	Redeposited clay	1967-Present	6
FIB12	136	11		S.7	Layer	Redeposited clay	1967-Present	6
FIB12	137	11		S.7	Layer	Redeposited clay	1967-Present	6
FIB12	138	11		S.7	Timber	Plank of wood	1967-Present	6
FIB12	139	11		S.7	Fill	Fill of gully	1967-Present	6
FIB12	140	11		S.7	Cut	Gully under plank	1967-Present	6
FIB12	141	11	TR11		Layer	Charcoal dump	1967-Present	6

FIB12	142-499	n/a	n/a	n/a	n/a	Unused	n/a	n/a
FIB12	500	25	TR25	Masonry	Wall associated with Block A Dining Room	1904-1932	4	
FIB12	501	25	TR25	Pipe	Concrete encased service	1904-1932	4	
FIB12	502	25	TR25	Masonry	E-W running wall	1904-1932	4	
FIB12	503	25	TR25	Masonry	N-S running wall	1904-1932	4	
FIB12	504	25	TR25	Masonry	N-S running wall	1904-1932	4	
FIB12	505	25	TR25	Masonry	E-W running wall	1904-1932	4	
FIB12	506	25	TR25	Masonry	Concrete encased Foul drain	1904-1932	4	
FIB12	507	25	TR25	Masonry	Concrete encased Foul drain	1904-1932	4	
FIB12	508	25	TR25	Masonry	Concrete encased Foul drain	1904-1932	4	
FIB12	509	25	TR25	Masonry	Brick manhole	1904-1932	4	
FIB12	510	25	TR25	Masonry	Brick manhole	1904-1932	4	
FIB12	511	25	TR25	Masonry	Concrete encased Foul drain	1904-1932	4	
FIB12	512	25	TR25	Masonry	Concrete encased Foul drain	1904-1932	4	
FIB12	513	25	TR25	Masonry	Concrete encased Foul drain	1904-1932	4	
FIB12	514	25	TR25	Masonry	Brick manhole	1904-1932	4	
FIB12	515	25	TR25	Masonry	Concrete encased Foul drain	1904-1932	4	
FIB12	516	25	TR25	Masonry	N-S running wall	1904-1932	4	
FIB12	517	25	TR25	Structure	Cook House Building	1904-1932	4	
FIB12	518	25	TR25	Masonry	Partition Wall	1904-1932	4	
FIB12	519	25	TR25	Structure	Boiler Room/Basement	1904-1932	4	
FIB12	520	25	TR25	Masonry	N-S running wall	1904-1932	4	
FIB12	521	25	TR25	Masonry	Wall associated with Block A Dining Room	1904-1932	4	
FIB12	522	25	TR25	Masonry	Brick base for cooking ranges	1904-1932	4	
FIB12	523	25	TR25	Masonry	Extension of [519]	1904-1932	4	
FIB12	524	25	TR25	Structure	Square Ancillary Building	1933-1966	5	
FIB12	525	25	TR25	Structure	Latrine Block & Bin Stores	1904-1932	4	
FIB12	526	25	TR25	Masonry	Small Foundation	1904-1932	4	
FIB12	527	25	TR25	Masonry	Small Foundation	1904-1932	4	
FIB12	528	25	TR25	Masonry	Small Foundation	1904-1932	4	

FIB12	529	25	TR25	Masonry	Curb of former road	1904-1932	4
FIB12	530	25	TR25	Masonry	Wall forming part of [525]	1904-1932	4
FIB12	531	25	TR25	Masonry	Wall forming part of [525]	1904-1932	4
FIB12	532	25	TR25	Masonry	Wall forming part of [525]	1904-1932	4
FIB12	533	25	TR25	Masonry	Wall forming part of [525]	1904-1932	4
FIB12	534	25	TR25	Masonry	Wall forming part of [524]	1933-1966	5
FIB12	535	25	TR25	Masonry	Wall forming part of [524]	1933-1966	5
FIB12	536	25	TR25	Masonry	Wall forming part of [524]	1933-1966	5
FIB12	537	25	TR25	Masonry	Wall forming part of [524]	1933-1966	5
FIB12	538	25	TR25	Structure	Block B Dining Room	1904-1932	4
FIB12	539	25	TR25	Masonry	Wall forming part of [538]	1904-1932	4
FIB12	540	25	TR25	Masonry	Wall forming part of [538]	1904-1932	4
FIB12	541	25	TR25	Masonry	Wall forming part of [538]	1904-1932	4
FIB12	542	25	TR25	Masonry	Wall forming part of [538]	1904-1932	4
FIB12	543	25	TR25	Masonry	Wall forming part of [538]	1904-1932	4
FIB12	544	25	TR25	Masonry	Wall forming part of [538]	1904-1932	4
FIB12	545	25	TR25	Masonry	Wall forming part of [538]	1904-1932	4
FIB12	546	25	TR25	Masonry	Wall forming part of [538]	1904-1932	4
FIB12	547	25	TR25	Concrete	Footing for [538]	1904-1932	4
FIB12	548	25	TR25	Cut	Construction cut for [538]	1904-1932	4
FIB12	549	25	TR25	Concrete	Footing for [538]	1904-1932	4
FIB12	550	25	TR25	Cut	Construction cut for [538]	1904-1932	4
FIB12	551	25	TR25	Fill	Footing for [516]	1904-1932	4
FIB12	552	25	TR25	Cut	Construction cut for [551]	1904-1932	4
FIB12	553	25	TR25	Fill	Footing for [500]	1904-1932	4
FIB12	554	25	TR25	Cut	Construction cut for [553]	1904-1932	4
FIB12	555	25	TR25	Fill	Footing for [521]	1904-1932	4
FIB12	556	25	TR25	Cut	Construction cut for [555]	1904-1932	4
FIB12	557	25	TR25	Fill	Footing for [520]	1904-1932	4
FIB12	558	25	TR25	Cut	Construction cut for [557]	1904-1932	4

FIB12	559	25	TR25		Fill	Footing for [524]	1933-1966	5
FIB12	560	25	TR25		Cut	Construction cut for [559]	1933-1966	5
FIB12	561	25	TR25		Fill	Footing for [517]	1904-1932	4
FIB12	562	25	TR25		Cut	Construction cut for [517]	1904-1932	4
FIB12	563	25	TR25		Fill	Footing for [518]	1904-1932	4
FIB12	564	25	TR25		Cut	Construction cut for [518]	1904-1932	4
FIB12	565	25	TR25		Fill	Footing for [522]	1904-1932	4
FIB12	566	25	TR25		Cut	Construction cut for [565]	1904-1932	4
FIB12	567	25	TR25		Timber	Timber Plank/Sleeper	1904-1932	4
FIB12	568	25	TR25		Timber	Timber Plank/Sleeper	1904-1932	4
FIB12	569	25	TR25		Timber	Timber Plank/Sleeper	1904-1932	4
FIB12	570	25	TR25		Timber	Timber Plank/Sleeper	1904-1932	4
FIB12	571	25	TR25		Masonry	Wall forming part of [519]	1904-1932	4
FIB12	572	25	TR25		Masonry	Remains of structure housing boiler	1904-1932	4
FIB12	573	25	TR25		Cut	Construction cut for Services	1967-Present	6
FIB12	574	25	TR25		Fill	Fill of [573]	1967-Present	6
FIB12	575	6C	TR6C		Cut	Cut of rubbish pit	1967-Present	6
FIB12	576	25	TR25		Structure	Block A Dining Room	1904-1932	4
FIB12	577	25	TR25		Layer	Natural	Natural	1
FIB12	578	14	TR14		Cut	Plough mark/cart rut	Post-medieval	3
FIB12	579	14	TR14		Fill	Fill of [578]	Post-medieval	3
FIB12	580	14	TR14		Cut	Plough mark/cart rut	Post-medieval	3
FIB12	581	14	TR14		Fill	Fill of [580]	Post-medieval	3
FIB12	582	14	TR14		Cut	Plough mark/cart rut	Post-medieval	3
FIB12	583	14	TR14		Fill	Fill of [582]	Post-medieval	3
FIB12	584	14	TR14		Cut	Plough mark/cart rut	Post-medieval	3
FIB12	585	14	TR14		Fill	Fill of [584]	Post-medieval	3
FIB12	586-599	n/a	n/a	n/a	n/a	Unused	n/a	n/a
FIB12	600	26	n/a	S.22	Layer	Topsoil	1967-Present	6
FIB12	601	26	n/a	S.22	Layer	Made ground	Post-medieval	3

FIB12	602	26	n/a	S.22	Layer	Agricultural subsoil	Post-medieval	3
FIB12	603	26	n/a	S.22	Layer	Natural	Natural	1
FIB12	604	27			Fill	Fill of [605]	Prehistoric	2
FIB12	605	27	605	S.23	Cut	Pit	Prehistoric	2
FIB12	606	27			Fill	Fill of [607]	Prehistoric	2
FIB12	607	27	607		Cut	Pit	Prehistoric	2
FIB12	608	27		S.23	Layer	Topsoil	1967-Present	6
FIB12	609	27		S.23	Layer	Subsoil	Post-medieval	3
FIB12	610	27		S.23	Layer	Natural	Natural	1
FIB12	611	28			Fill	Fill of [612]	Prehistoric	2
FIB12	612	28	612		Cut	Post/Stakehole	Prehistoric	2
FIB12	613	28			Fill	Fill of [614]	Prehistoric	2
FIB12	614	28	614		Cut	Post/Stakehole	Prehistoric	2
FIB12	615	28		S.24	Layer	Topsoil	1967-Present	6
FIB12	616	28		S.24	Layer	Subsoil	Post-medieval	3
FIB12	617	28		S.24	Layer	Natural	Natural	1
FIB12	618	27		S.23	Layer	Made Ground	Post-medieval	3
FIB12	619	28		S.24	Layer	Made Ground	Post-medieval	3
FIB12	620	29		S.25, S.26	Layer	Topsoil	1967-Present	6
FIB12	621	29		S.25, S.26	Layer	Subsoil	Post-medieval	3
FIB12	622	29		S.25, S.26	Layer	Made Ground	Post-medieval	3
FIB12	623	29		S.25	Layer	Redeposited Clay	Post-medieval	3
FIB12	624	29		S.25	Layer	Crush layer for Drainage	Post-medieval	3
FIB12	625	29		S.25, S.26	Layer	Natural	Natural	1
FIB12	626	30			Fill	Fill of [627]	Prehistoric	2
FIB12	627	30	627		Cut	Pit	Prehistoric	2

FIB12	628	30				Fill	Fill of [650]	Prehistoric	2
FIB12	629	30	630			Fill	Fill of [630]	Prehistoric	2
FIB12	630	30	630			Cut	Pit	Prehistoric	2
FIB12	631	30	632			Fill	Fill of [632]	Prehistoric	2
FIB12	632	30	632			Cut	Post/Stakehole	Prehistoric	2
FIB12	633	30	634			Fill	Fill of [634]	Prehistoric	2
FIB12	634	30	634			Cut	Post/Stakehole	Prehistoric	2
FIB12	635	30	636			Fill	Fill of [636]	Prehistoric	2
FIB12	636	30	636			Cut	Post/Stakehole	Prehistoric	2
FIB12	637	30	638			Fill	Fill of [638]	Prehistoric	2
FIB12	638	30	638			Cut	Post/Stakehole	Prehistoric	2
FIB12	639	30	640			Fill	Fill of [640]	Prehistoric	2
FIB12	640	30	640			Cut	Post/Stakehole	Prehistoric	2
FIB12	641	30				Fill	Fill of [642]	Prehistoric	2
FIB12	642	30	642			Cut	Post/Stakehole	Prehistoric	2
FIB12	643	30	644			Fill	Fill of [644]	Prehistoric	2
FIB12	644	30	644			Cut	Pit	Prehistoric	2
FIB12	645	30				Fill	Fill of [646]	Prehistoric	2
FIB12	646	30	646			Cut	Post/Stakehole	Prehistoric	2
FIB12	647	30	647			Layer	Possible Surface Remains	Prehistoric	2
FIB12	648	30				Layer	Agricultural Horizon	Post-medieval	3
FIB12	649	30				Layer	Natural	Natural	1
FIB12	650	30	650			Cut	Small Fire Pit	Prehistoric	2
FIB12	651	30				Layer	Topsoil	1967-Present	6
FIB12	652	30				Layer	Subsoil	Post-medieval	3

Appendix 2: Pottery Assessment

Chris Jarrett

STAGES 1 & 2: ASSESSMENT

Introduction

A small sized assemblage of pottery was recovered from the site (3 boxes). The pottery dates from the medieval and post-medieval periods. Very few sherds show evidence for abrasion and they were probably deposited fairly rapidly after breakage. The fragmentation of the pottery ranges from sherd material to vessels with complete profiles, although the latter were all from a 20th century dated context. The average sherd weight is 78.5g which indicates the pottery is as a whole not very fragmented, although this calculation is almost certainly swayed by the large sized sherds recovered from the aforementioned very late group of pottery. Post-Roman pottery was recovered from seven contexts and individual deposits produced mostly small (fewer than 30 sherds) groups, except for one medium sized one (31-100 sherds).

All the pottery (66 sherds or 46 ENV, weighing 5.191 kg, of which one sherd/1 ENV/16g is unstratified) was examined macroscopically and microscopically using a binocular microscope (x20), and entered on a database, by fabric, form, decoration, sherd count, estimated number of vessels (ENV's) and weight. The classification of the pottery types follows the Museum of London Archaeology standard practice. The pottery is discussed by types and its distribution. The assemblage is notable for containing a group of pottery associated with military activity.

The pottery types

The breakdown of the period dating of the pottery is follows:

Roman: 1 sherd, 1 ENV, 5g

Medieval: 1 sherd, 1 ENV, 16g

Post-medieval: 64 sherds, 45 ENV, 5.084kg

Undated: two sherds, 1 ENV, 103 kg

Roman

Un sourced shell-tempered wares (SHELL), AD40-400, one sherd, 1 ENV, 5g, form: unidentified.

A single, abraded flanged rim from an uncertain form occurs in Roman SHELL ware and was recovered from context [34] (K. Anderson pers. comm.).

Medieval pottery type

Early south Hertfordshire-type coarseware (ESHER), 1050-1200, 1 sherd, 1 ENV, 16g.

The sherd of ESHER came from an unidentified vessel with a convex base and this item was unstratified.

Post-medieval

Surrey-Hampshire border wares

Surrey-Hampshire border whiteware with green glaze (BORDG), 1550-1700, 1 sherd, 1 ENV, 59g, form: dish; flared.

Surrey-Hampshire border redware (RBOR), 1550-1900, 1 sherd, 1 ENV, 32g, form: unidentified.

London area coarse red earthenware

London-area post-medieval redware (PMR), 1580-1900, six sherds, 4 ENV, 123g, form: flower pot.

Delftware

English tin-glazed ware (TGW), 1570-1846, 1 sherd, 1 ENV, 12g, form: unidentified.

Factory made, twice fired earthenwares/industrial finewares

Bone china (BONE), 1794-1900, 5 sherds, 4 ENV, 433g, forms: mug; cylindrical, plate; dinner sized, saucer, tureen.

Coloured glazed refined whiteware (COLGE), 1800-1900, 1 sherd, 1 ENV, 27g, form: unidentified.

Plain refined white earthenware (REFW), 1805-1900, 31 sherds, 19 ENV 3.140kg, forms: bowl; rounded (medium and deep), candlestick, mug; cylindrical, plate; dessert, dinner and tea sizes.

Refined white earthenware with under-glaze painted decoration (chrome colours) (REFW CHROM), 1830-1900, 2 sherds, 1 ENV, 55g, form: plate; diner size.

Transfer-printed refined whiteware (TPW), 1780-1900, 6 sherds, 4 ENV, 264g, forms: plates: dessert, dinner, soup and tea sizes.

Transfer-printed refined whiteware with 'flow blue' decoration TPW FLOW 1830 1900 1 sherd, 1 ENV, 2g, form: saucer.

The majority of the industrial finewares were recovered from one deposit, fill [25] of pit [575] and much of this material comprised institutional wares associated with the barracks (see distribution below).

Imported pottery

Chinese blue and white porcelain (CHPO BW), 1590-1900, 1 sherd, 1 ENV, 3g, form: saucer.

Non-local pottery

Yellow ware with industrial slip decoration (YELL SLIP), 1820-1900, 2 sherds, 1 ENV, 809g, form: bowl; rounded (deep).

Stonewares

English stoneware with Bristol glaze (ENGS BRST), 1830-1900, 3 sherds, 3 ENV, 101g, forms: jar; cylindrical, shouldered.

White salt-glazed stoneware (SWSG), 1720-1780, 1 sherd, 1 ENV, 7g, form: unidentified.

Undated

Miscellaneous unsourced pottery (MISC), AD 400-1500, 2 sherds, 1 ENV, 103g, form: unknown.

A disc shaped vessel has slight burnishing on one surface is represented by a soft, reddish brown coloured fabric and a fine matrix with large, sub-rounded grits up to 3mm in size. There are moderate calcareous inclusions on the surface, which have leached out. The fabric has possibly absorbed a modern chemical. This disc-shaped vessel has a flat surface with a rounded edge and tapering profile with a maximum thickness of 17mm. It was recovered from context [120].

Distribution

The distribution of the pottery is shown in Table 1 and this displays for each context material was derived from the size of the group, the trench, the phase, the number of sherds, ENV, weight, the pottery types in the deposit and a spot date for the group. The pottery was recovered from Phases 2-5.

Context	Trench	Phase	Assemblage size	SC	ENV	Weight	Context ED	Context LD	Pottery types	Context considered date
[25]	6C	4	M	49	30	4.802kg	1805	1900+	BONE, COLGE, ENGS BRST, PMR, REFW, REFW CHROM, TPW, TPW	Mid 20th C

Context	Trench	Phase	Assemblage size	SC	ENV	Weight	Context ED	Context LD	Pottery types	Context considered date
									FLOW, YELL SLIP	
[34]	14	2	S	1	1	1	40	400	SHELL	AD 40-400
[75]	15	2	S	1	1	59g	1550	1700	BORDG	1550-1700
[89]	18	3	S	9	9	195g	1830	1900	PMR, ENGS BRST, PMR, RBOR, REFW, TGW, TPW	1580-1900
[93]	18	2	S	2	2	10g	1720	1780	CHPO BW, SWSG	1720-1780
[120]	11		S	2	1	103			MISC	Undated
[133]	11	5	S	1	1	1g	1780	1900	TPW	1780-1900

Table 1. FBI12: Distribution of pottery types showing individual contexts containing pottery, what Trench and phase the context occurs in, the assemblage size, the number of sherds, ENV and weight, the date range of the latest pottery type (Context ED/LS), the fabrics present and a suggested deposition date. SC: sherd count, ENV: estimated number of vessels.

Context [25], pit [575]

The largest group of pottery from the excavation was recovered from context [25], pit [575] and despite the latest material being datable to the mid 20th century, archaeologically it is important for demonstrating the ceramics derived from institutions and in this case an army barracks. The pottery is on the whole very plain (it may have originally carried a military monogram, which is now missing), is often robust in its manufacture and this reflects a source from a working establishment.

Plates are the most frequent form in the group with eighteen sherds, representing 13 ENV with dinner plates the most frequent size (eight sherds/6 ENV) and the majority of these are plain in REFW, although one has an impressed maker's mark on the underside of the base, consisting of 'ASHWORTH' with '12XO' stamped diagonally over it and upside down. G. L. Ashworth & Brothers (Ltd), Hanley, were in operation between c. 1861- 1968, after which date they were renamed Mason's Ironstone China (Ltd) (Godden 1999, 43). Another whiteware plate has a painted blue band and line around the edge of the rim, which is further augmented with a gilt line of the rim side (REFW CHROM). This vessel may have been used by higher ranking army staff. A transfer-printed dinner plate in Bone China is notable for having a monogram consisting of King Edward the Confessors crown above the intertwined initials 'GR' which surround the roman numeral 'V. This refers to George

V, 1910-1936. The base of the vessel has a maker's mark with a blue transfer of the Georgian Coat of Arms above a ribbon containing 'ROYAL PORCELAIN/WORKS/WORCESTER', which is above '1915' (probably a date mark) which is in turn over a small lozenge containing the letter 'W'.

Dessert sized plates are recorded with four examples (five sherds) and three are in refined whiteware, although one example has a black? Transfer-printed maker's mark on the underside of the base, consisting of a circle surrounded by smaller circles. The fourth plate of this type is in TPW and it is decorated with a blue band and line on the rim and a monogram consisting of a crown and the Prince of Wales's feathers, the motto 'ICH' AND 'DIEN', with a floral garland on each side. All of this is above two ribbons, one containing 'ALBUHERA', over another with 'MIDDLESEX REGT.', which is in turn above the intertwined initials 'S' and 'M'. This army regiment's garrison or head quarters was at the Inglis Barracks, Mill Hill, the location of the excavation. The Battle of Albuhera (16th May, 1811) was the principal battle honour on the Middlesex Regiment's colours. The 'SM' may be an abbreviation for Sergeant's Mess. Plates made for the 20th-century British Army often have a monogram containing the name of the battalion and the rank of the officer.

Tea-sized plates are represented by two sherds from the same number of vessels in REFW and both have a similar shape with gently scalloped rims matching the curved fluting on the wall of the vessel. One of these vessels is of a low quality with a crazed glaze. A single soup plate (three sherds) is also recorded in TPW and it bears part of a monogram (a floral garland) which is almost certainly the same as that found on the badge of the Middlesex Regiment, noted on the dessert plate above. Interestingly a family sherd of this vessel is burnt.

Bowls are represented by six vessels (sixteen sherds); all of a rounded shape and three of these are a deep size. One example survives in YELL SLIP as a base sherd with a foot ring and body sherd with. The external moulded decoration consists of a 'dart' border, below panels containing diamond shaped leaf motifs. It has an internal white slip. The two other deep bowls are in REFW and both have rounded rims and one example with a complete profile has a recessed base, the other vessel being burnt. The deep rounded bowls would have been suitable for preparing and mixing food in a kitchen. There are three medium sized rounded bowls in REFW which all have a foot ring and two examples survive with a simple rim. Such vessels associated with the navy were used by the ratings for their meals (Jarrett and Thompson 2012) and could equally have been used by privates and lower British army ranks in the case of the land army.

Cylindrical mugs are represented by three vessels (four sherds) and two are in REFW, the other in Bone. These take the form of utilitarian coffee or tea cups of a type generally dated to the 20th century and often found in various types of canteens, including civilian ones. The most complete example is in REFW and has on the underside of the base a black-transfer with the initials 'N.A.C.B' (British, Navy and Army Canteen Board) in an oval badge. This is above a maker's mark 'S.P.L^{TD}', which stands for the Sylvan Pottery Ltd, Hanley, established c.1946 and still operating today (Godden 1999, 164). Two saucers are noted and one is in bone china with a scalloped rim and curved fluted moulded decoration and matches the tea plates mentioned above. A small fragment of a flow-blue transfer-printed ware saucer is residual.

Less frequent forms are a candlestick, tureen and a flower pot with single examples. The candlestick in REFW is of a robust, upright type, being rather plain and it survives as part of the socket, above a deep column with two cordons present above the start of the pedestal base. The tureen is in bone china and survives as a base, moulded with a scalloped foot ring with relief scrolling decoration, besides an applied horizontal loop handle, with scroll/leaf like terminals. The underside has a green transfer-printed maker's mark with a bow and arrow motif and the words 'ENG/LAND' on the bow and 'RIDGWAYS' running along the length of the arrow. The mark is dated to c.1912 and later (Anon, <http://www.thepotteries.org/allpotters/854.htm>).

Jar forms present in the group are only found in Bristol-glazed English stoneware. A base of a cylindrical jar with narrow fluted panels may have contained a foodstuff such as jam, while a fragment of a bichrome shouldered jar with a bead border may also have been a container for a comestible. A body sherd from a closed form in refined whiteware with an internal and external green-glaze (COLGE) is recorded. Its good quality indicates that it may have been derived from a service used by a higher rank of soldier stationed at the barracks. Finally, there are two fragments of a flower pot in high-fired PMR.

The pottery from context [25] demonstrates a wide range of activities associated with the barracks which include food preparation and storage, table wares for different ranks, lighting and a horticultural element. The latest pottery makers' marks indicate deposition between c.1946-68, although some older wares are present, such as the plates with the George V monogram and the possible 1915 dated example.

Significance, potential and recommendations for further work

The pottery assemblage mostly is of little significance at a local level, except for the group of ceramics recovered from context [25] which has national importance, despite its very late date of deposition. The ceramic profile of the site typically follows that of the London area and nationally for the 19th century and later. However, the presence of the forms and the monograms recovered from context [25] reveal an atypical group of pottery that is associated with military activity. Groups of institutional wares have rarely been reported upon archaeologically, while those associated with the modern armed forces are particularly lacking, an exception being a group of naval victualling wares recovered from the distribution centre of the Royal Clarence Victualling Yard, Gosport (Jarrett and Thompson 2012). The end user sites (e.g. army barrack and headquarters) have still to be investigated and published. Pottery has been previously published from earlier post-medieval military locations: e.g. Camber Castle (Whittingham 2001) and Tilbury Fort (Meddens 2000).

The potential of the pottery as a dating tool is important for the deposits it was recovered from. However the pottery from context [25] has much potential for determining what types of pottery vessel shapes were used at an army establishment and by whom. The makers' marks are also important for determining who was commissioned to supply the pottery. This group of pottery, despite its late date,

has the potential to be seminal for the investigation of 19th/20th century assemblages of military ceramics.

A report is recommended on the pottery from context [25] and the text should be supplemented with photographs of the pottery, which should include group compositions incorporating the glass ware (see Jarrett, Appendix 3).

References

Anon. A-Z of Stoke-on-Trent potters, <http://www.thepotteries.org/allpotters/854.htm>.

Godden, G. 1999, *New handbook of British pottery and porcelain marks*. London: Barrie and Jenkins

Jarrett, C. and Thompson, G. A group of early 20th-century naval victualling finds from Royal Clarence Yard, Gosport, Hampshire. *Post-Medieval Archaeology* 46/1, 89–115

Meddens, F. 2000, 'The pottery', in P. Moore, 'Tilbury Fort: a post-medieval fort and its inhabitants', *Post-Medieval Archaeology* 34, 43-56.

Moore, P. 2000, 'Tilbury Fort: a post-medieval fort and its inhabitants', *Post-Medieval Archaeology* 34, 3-104.

Whittingham, L. 2001, 'The ceramic assemblage' in M. Biddle, J. Hillier, I. Scott and A. Streeten. *Henry VIII's coastal artillery fort at Camber Castle, Rye, East Sussex*. Oxford Archaeological Unit/English Heritage, 213-256.

STAGE 3 SPOT DATES

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Context [609], spot date: 18th/19th century

Chinese blue and white porcelain (CHPO BW), 1590-1900, one sherd, 23g, form

Context [621], spot date: 19th century

Japanese porcelain (JAPO), 1660-1900, one sherd (fresh breaks), 144g, form: dish decorated in the Imari-style

Context [648], spot date: 1580-1700

Surrey-Hampshire border whiteware with green glaze (BORDG), 1550-1700, one sherd, 7g, form: chamber pot, glazed on both surfaces.

Frechen stoneware (FREC), 1550-1700, three sherds, 33g, form: rounded jug.

Post-medieval Essex black-glazed redware (PMBL), 1580-1900, one sherd, 8g, form: drinking vessel handle consisting of two rods of clay.

Post-medieval fine redware (PMFR), 1580-1700, two sherds, 4g, form: unidentified.

Significance, potential and recommendations for further work

The pottery assemblage has little significance at a local level and consists of typical pottery types found in the London region. However, the Japanese 19th- century Imari style dish is a somewhat unusual find for this period. The main potential of the pottery is to date the features it was recovered from. There are no recommendations for further work on the assemblage although the material should be briefly incorporated into a publication report on the pottery recovered from previous archaeological work on the site.

Appendix 3: Glass Assessment

Chris Jarrett

Introduction

A small sized assemblage of glass was recovered from the site (two boxes). The glass dates to the late post-medieval period. None of the fragments show evidence for abrasion and were probably deposited fairly rapidly after breakage or were discarded. Only minor weathering was noted upon a small number of vessels. The state of fragmentation for the assemblage ranges from single shards to a number of intact items and all of the forms could be identified to at least a basic type. The glass was quantified by the number of fragments and as so many vessels is intact, by estimated number of vessels (ENV). The assemblage was recovered from a single context [25], Trench 6C, Phase 4 as a small (fewer than 30 fragments) group.

All of the glass (eighteen fragments, of which none are unstratified) was entered in a database, by type, colour, form and manufacturing technique. The assemblage is discussed by vessel shape.

The forms

The composition of the glass assemblage forms is as follows:

Bottles

Cylindrical: one fragment, 1 ENV

Cylindrical and squat: one fragment, 2 ENV

Cylindrical, soda water type: three fragments, 3 ENV

Octagonal cross-section, squat: three fragments, 2 ENV

Rectangular cross section: 1 fragment, 1 ENV

Total number of bottles: twelve fragments, 9 ENV

Jar, square cross section: one fragment, 1 ENV

Wine glass: 1 fragment, 1 ENV

?desk organiser: 2 fragments, 1 ENV

Window pane, decorated: 2 fragments, 1 ENV

Bottles

Cylindrical

A single cylindrical bottle (two fragments) of an uncertain specific function is recorded in high lime low-alkali (HLLH) glass with a green tint and occasional oval, large bubbles. The form survives as a cylindrical neck, rounded shoulder, cylindrical body and a concave base (60mm in diameter). The body has pronounced external seams indicating that it was made in a two part mould. The vessel dates from c.1830 onwards.

Squat cylindrical bottles

There are two squat cylindrical bottles present, each represented by two fragments and both have basal diameters of 42mm. The first in HLLH aquamarine coloured glass has an a preparation style finish rim with a slightly bevelled top, an internal thickening to catch the cork, a short cylindrical neck, gently rounded shoulder and a convex base. The second vessel in clear soda glass survives as a neck and basal sherd, the latter being convex with a moulded, raised simple floral pattern on the underside. Both vessels are mould made and date from c. 1830 onwards.

Cylindrical, soda type bottles

The three bottles consist of two intact examples and another one complete from the neck downwards. All were made in aquamarine coloured HLLH glass. The two intact examples have an applied deep collared rim (32mm in diameter) with an internal screw thread, moderately deep cylindrical necks, rounded shoulders, a cylindrical body and a convex base. Two sizes are present; the largest (251 mm in height) has a base diameter of 62mm, while the smaller examples (one with a complete height of 213mm) have basal diameters of 52mm and 66mm. Both the smaller sized vessels have very similar height dimensions from the shoulder to the base. The two intact bottles both have embossed on the shoulder 'R. WHITE', a soft drink manufacturer established in 1845 and still a going concern today. All three of these bottles have additional different embossed markings. The large example has 'R. WHITE & SONS LD CAMBERWELL SE.' around the base and 'WHITE' twice in a cross formation on the underside of the base, which is also found on the incomplete smaller sized bottle and also includes a 'glass makers' mark 'W' and '8'. The latter bottle additionally has embossed 'R. WHITE' (curving horizontally) and 'WHITE' vertically embossed on the wall in a T-shape. The smaller example has 'R. WHITE REGD' embossed on the underside of the base. All the bottles are two part mould made, while the two examples with internal screw thread rim finishes date to after c. 1892. The two complete bottles additionally have hardened rubber stoppers in place and both are of the 'chisel' type. Both stoppers have the name of the company impressed on each top side, but are slightly different. One has 'R. WHITE' and found in panels below are 'REGD' in one and '6' in the other, while the second example has the name 'WHITE' above 'W' on one panelled face and '2' on the other.

Octagonal cross-sectioned bottles, squat types

The two bottles of this type are both fragmentary, although they are square in plan with narrow vertical panels on each corner. The most fragmentary example survives as a wall fragment in clear soda glass with a conjectured cross-section of 42mm square. The second example survives as two fragments in HLLH aquamarine coloured glass and with a cylindrical neck and base (42 mm square). On one recessed panel of the base are embossed the words 'MASON'S [OK SAUCE]' and the underside of the base is embossed 'RBB 1644'. Both bottles are likely to be of sauce types and George Mason & Co Ltd was in operation from c.1900, until the company was overtaken by Reckitt and Colman based in Norwich in 1969.

Rectangular bottles

An intact (165mm tall), rectangular cross-section bottle is present in HLLH glass with a pale green tint. It has an applied preparation rim finish with a slight bevel, an internal thickening to hold the cork and a short cylindrical neck. Its shoulder is gently rounded as are the corners of the vessel walls, the back being slightly concave for an easier grip. The dimensions of the vessel's cross section are 62mm x 39mm. Embossed vertically on the front panel is 'FENNINGS /FEVER CURER'. The base is concave on the underside with a rectangular panel containing '616'. This vessel was made in a two part mould with diagonal seams observed across the shoulder and on the two opposed corners. The company of Fenning was established at Cowes on the Isle of Wight in the 1850's and their Fever Curer was still in production during the 1960's.

Jar

Square cross sectioned jar

A single intact item of this shape is recorded and was made in an amber/brown coloured soda glass. The height of the vessel is 118mm and it has a large mouth external screw thread finish, 62mm in diameter. The vessel has rounded shoulders which show the diagonal mould seam which continue down the two opposed corners of the square sectioned vessel wall (56mm square). Embossed on one side of the vessel is 'BOOTS/CHC/CHEMISTS'. The base consists of a squat square pedestal (56mm square), convex on the underside. Boots was established in 1849, while the large mouth external screw thread rim dates the jar to the end of the 19th century onwards.

?desk organiser

Two fragments of a possible desk organiser are noted. The item is mould made in clear soda glass, rectangular in plan with rounded corners (surviving dimensions: 48mm in length x 56 mm wide and 36mm high). The base has on its top concave half a repeating, short fluted border, while the top of the vessel is divided in to two with one surviving end consisting of a recessed top, the other end comprising a square stand or platform with fluted sides and a flat centre. The technology for machine

moulding such items dates from the mid 19th century; otherwise this object is difficult to date precisely. It is probably better dated by its association with the other mid 20th-century dated finds found in context [25] (see Jarrett, Appendix 2).

Wine glass

The intact pedestal base (53mm in diameter) of a stemmed wine glass survives in clear soda glass and it dates to the 19th or 20th century.

Window glass, decorated

Two fragments of modern machine made glass survive in clear soda glass. These fragments are painted on one side with a tessellated geometrical octagon and diamond design. The octagonal panels appear to be coloured in alternating dark yellow and cream colours, while the surviving diamond shape is painted red, however the decoration is in a notably degraded state.

Significance, potential and recommendations for further work

This glass assemblage, entirely collected from context [25] and probably dated to the mid 20th century, would normally be viewed as rather mundane and of little note. However, as the glass was recovered with a group of ceramics associated with military use, the site location once the Headquarters for the Middlesex Regiment (see Jarrett: Appendix 2), it makes the glass assemblage of national significance. An archaeological understanding of activities occurring on barracks associated with the modern army is poorly understood. The glass additionally complements the information provided by the associated pottery, which imparts different data. The glass ware from context [25] demonstrates that it was used mostly as containers for comestibles and medicines, which may have been bought privately by the military personnel, used in the NAAFI or issued by the bases provisional store. Interestingly only one item is associated with alcohol (a wine glass), which was probably used by high ranking army officers. Other drink related items are of a non-alcoholic type, i.e. the R. White soda bottles. The possible glass desk organiser may relate to clerical administration on the army base or for use by officers, *etc.* Very little has been published archaeologically on glass and other finds recovered from military establishments, a notable exception being a group of early 20th-century finds recovered from the Royal Clarence Victualling Yard, Gosport (Jarrett and Thompson 2012). The glass ware recovered from there may have been more associated with distribution, whereas the glass assemblage from FBI12 is concerned with the end user.

The potential of the glass is to date the context it was recovered from. However, it also provides valuable information on activities associated with the headquarters of the Middlesex Regiment. Despite the glass being of a very late date, it is important for demonstrating the potential of studying finds from military establishments and has not been under taken previously with material associated

with the modern army. Glass assemblages have been studied from earlier post-medieval military locations, e.g. Camber Castle (Cropper 2001) and Tilbury Fort (Moore 2000).

It is recommended that a short publication text is prepared on the glass and that this should be supplemented with photographs

References

Cropper, C. 2001 'Vessel glass' in M. Biddle, J. Hillier, I. Scott and A. Streeten. *Henry VIII's coastal artillery fort at Camber Castle, Rye, East Sussex*. Oxford Archaeological Unit/English Heritage, 283-92.

Jarrett, C. and Thompson, G. A group of early 20th-century naval victualling finds from Royal Clarence Yard, Gosport, Hampshire. *Post-Medieval Archaeology* 46/1, 89–115

Moore, P. 2000, 'The table glass', in P. Moore, 'Tilbury Fort: a post-medieval fort and its inhabitants', *Post-Medieval Archaeology* 34, 56-58.

Moore, P. 2000, 'Tilbury Fort: a post-medieval fort and its inhabitants', *Post-Medieval Archaeology* 34, 3-104.

Appendix 4: Ceramic Building Material Assessment

Berni Sudds

A small assemblage of ceramic building material was recovered from site, including material of late medieval/ early post-medieval date, but predominantly dated to the 20th century. The material was examined under magnification (x20), described and quantified by number and weight by context (see Table 1). The assemblage was recorded using the London system of classification. A fabric number is allocated to each object, specifying its composition, form, method of manufacture and approximate date range. Examples of the fabrics can be found in the archives of PCA and/or the Museum of London.

Context number	Context type	Type	No	Weight (g)	Date range	Spot date
32	Fill of plough line	Late medieval – early post-medieval peg tile (fabric 2271)	1	32	1400 – 1700	1400 – 1700
66	20 th century wall	Small brick sample, corner fragment of modern machine made red brick. Hard lime, sand and cement mortar	1	-	1900 - present	1900 - present
69	Late 20 th century wall	Frogged brick (modern machine made Fletton-type)	1	616	1900 – present	1900 – present
89	Subsoil	Pantile (fabric 2279) Brick fragment (fabric 3032)	1 1	119 96	1630 – 1850 1700 – 1950	1700 – 1950
107	Fill of drainage gully	Brick fragment (modern machine made Fletton-type) Hard lime, sand and cement mortar	1 1	8 31	1900 – present	1900 - present
110	Mid 20 th century wall	Brick samples: Frogged brick fragments (fabric 3035). 107-8x62-5mm Hard lime, sand and cement mortar	2 1	- 634	1770 – 1940/+	1900 – present
571	Boiler room/ basement wall	Brick sample: Frogged brick (modern machine made Fletton-type). Stamped 'FARCO' to flat frog. 223x109x65mm. Hard lime, sand and cement mortar	1	-	1900 – present	1900 – present

Table 1: Distribution of the ceramic building material.

The fabrics and forms identified can be readily paralleled across the Greater London region. The widespread use of machine made bricks would be entirely consistent with a 20th century construction date, although handmade 'London stocks' are evidently still being utilised (wall [110]). As comprised of well-known types no further analysis is recommended, although further research into the 'FARCO' stamped brick from basement wall [571], for which no manufacturer can immediately be identified, may be of interest in clarifying aspects of date and supply.

Appendix 5: Clay Tobacco Pipe Assessment

Chris Jarrett

Introduction

A small sized assemblage of clay tobacco pipes was recovered from the site comprising two stratified fragments consisting of a small stem part and a complete, although slightly chipped bowl. This possibly indicates that the material was deposited under secondary depositional conditions. The clay tobacco pipes derive from two contexts with single fragments. All of the clay tobacco pipes were into a database and classified using Atkinson and Oswald's (1969) typology (AO). The material is as follows:

Context [25], Trench 6C, Phase 4

A single AO30 (without a heel or spur) type bowl is notable for its angled rim and it appears to have been evenly burnt or made from brown coloured clay. It has a 'nibbled' surfaces at the base of the bowl and on the stem, possibly indicating that it was subject to some abrasion and therefore re-deposited. The clay tobacco pipe does both carry a maker's mark. The AO30 type bowl was mostly in production during the period 1840-1910, although it is quite possible that it continued in limited production for some considerable time after World War I, when the use of clay tobacco pipes dramatically decreased in favour of cigarettes.

Context [89], Trench 18, Phase 3

A single fragment of stem was recovered from this deposit. The stem has a medium thickness and a fine bore and possibly dates to the early 18th century.

Significance, potential and recommendations for further work

The clay tobacco pipes have little significance at a local level and the AO30 bowl type is frequently encountered in the London area in mid to late 19th century dated deposits. The clay tobacco pipes do have some limited potential on this site to date the contexts they were found in. None of the pipes merit illustration. There are no recommendations for further work on the assemblage.

Reference

Atkinson, D. and Oswald, A., 1969 London clay tobacco pipes. *Journal of British Archaeology Association*, 3rd series, Vol. 32, 171-227.

Appendix 6: Metal and Small Finds Assessment

Mårit Gaimster & Guy Thompson

Ten metal and small finds were recovered from the excavations, along with fragments of a leather shoe; these have been listed in the table below. While most finds date within the range of the existence of the Inglis Barracks on site, between 1905 and 1962, only one object, a cartridge case (sf 2), has a direct military connection; it is described below.

A spent cartridge case was recovered from context [107] (Trench 9). The case was .303 calibre, which was the standard British Army rifle calibre from the 1890s to the early 1960s. The crimping at the top of the cartridge case indicates that it was a blank round, containing powder but no bullet. Such rounds were used for training and battle craft exercises. There would originally have been a 'head stamp' at the base of the cartridge, which indicated the manufacturer and the date of production; some also specified the mark of the bullet (expressed as a Roman numeral) and its purpose. Rounds manufactured after the Second World War often omitted the latter information. Unfortunately the base of the cartridge case was heavily pitted, and it was not possible to discern the markings of the head stamp (Guy Thompson).

Other finds include a small copper-alloy 'suspender' button (sf 1), produced by Buttons Ltd in Birmingham, a company operating from 1907 (White 1977, 79), and a George V penny of 1920 (sf 3). Context [25] produced an enamelled saucepan, as well as the screw-top lid of a probable ink bottle (sf 5) and parts of a delicate ivory toothbrush (sf 4). Bone remained the chief material for toothbrushes until around 1925; although synthetic materials were increasingly used, bone toothbrushes could still be purchased in the 1950s (Mattick 2010, 4). Agricultural soil [648], finally, produced a horseshoe (sf 5) and a metalworking tool in the form of an iron chisel or cold set (sf 6). The horseshoe is large and sturdy, intended for a draft horse; the toe clip dates it from the early 19th century onwards (Ward 1939, 171).

Recommendations

The metal and small finds form an integral component of the finds and should, where relevant, be included in any further publication of the site. For the small assemblage from the former Inglis Barracks, a note with reference to the finds may be sufficient; the ivory tooth brush (sf 4) would make a nice photograph. No further work is recommended for these finds. The fragments of leather shoe and the enamelled saucepan can be discarded.

References

- Mattick, B. E. 2010. *A Guide to Bone Toothbrushes of the 19th and Early 20th Centuries*, Bloomington, in: Xlibris Press.
- Ward, G. R. 1939. 'On dating old horseshoes', *Transactions of the Lancashire and Cheshire*

Antiquarian Society 53, 140–75.

White, D. P. 1977. 'The Birmingham Button Industry', *Post-Medieval Archaeology* 11, 67–79

context	sf	description	object date	pot date	recommendations
0	1	dished copper-alloy 'suspender' button; marked 'BUTTONS LTD B'HAM'; diam. 17mm; Trench 3	1907+	n/a	
25	4	ivory toothbrush; part of rounded head and pointed handle only; head with four trepanned rows for bristles; W 11mm		mid-20th century	
	5	small metal screw-top lid; diam. 16mm; ht. 8mm; blue ?ink stains on inside		mid-20th century	
		brown enamelled metal sauce pan with straight handle; diam. 190mm; ht. 105mm; handle L 200mm; Trench 6c		mid-20th century	discard
		leather shoe; fragments of upper only; Trench 6c		mid-20th century	discard
89	6	three-armed clip of copper-alloy sheet; central hollow boss; for circular ?container c. 90mm diam.		1830-1900+	
107	2	metal .303 rifle blank round cartridge case	1890–1960s	n/a	
574	3	copper-alloy coin; George V penny 1920	1920	n/a	
648	5	iron horseshoe; complete with toe clip; W 160mm; L 180mm	1820+	1580-1700	
	6	iron cold set or chisel with burred head; W 25mm; L 100mm		1580-1700	

Appendix 7: OASIS Form

OASIS ID: preconst1-157468	
Project details	
Project name	THE FORMER INGLIS BARRACKS, MILLBROOK PARK, MILL HILL, LONDON BOROUGH OF BARNET
Short description of the project	An archaeological investigation was undertaken by Pre-Construct Archaeology Limited in two stages between February 2012 and July 2013 at the Former Inglis Barracks, Millbrook Park, Mill Hill, London Borough of Barnet. The Stage 1 & 3 evaluation encountered evidence for prehistoric activity in the form of pits, stake/post holes, a small fire pit and a possible surface layer. These features attest to the possibility of a temporary camp having established itself here during this period. In addition to this post-medieval agricultural activity in the form of plough marks/cart ruts were observed and residual finds attested to Roman and medieval activity within the locality, although no feature of this date were observed. In addition to this, two trenches located an area to the north of the site located the remains of Edwardian era structures pertaining to the first phase of construction at the Former Inglis Barracks. A subsequent 'Strip, Map and Record' exercise revealed at least 30 walls with numerous concrete foundations and service runs comprising three separate buildings; the Cook House, 'A' Block Dining Room and 'B' Block Dining Room. Within each building a number of rooms were encountered which, following analysis of relevant documentary evidence, have been identified as food store rooms, wash-ups, a larder, a bathroom, the prep room and a basemented boiler room which contained a coal chute and the remains of the boiler itself. A number of other ancillary buildings were encountered across the site demonstrating a total of three phases of activity during the life of the barracks. During the evaluation natural clay deposits were recorded between 101.84m OD at the north of the site and 76.70m OD to the south of the site. During the 'Strip, Map and Record' exercise the natural was observed between 103.29m OD and 103.09m OD.
Project dates	Start: 13-02-2012 End: 19-07-2013
Previous/future work	No / Not known
Any associated project reference codes	FIB12 - Sitecode
Type of project	Field evaluation
Site status	None
Current Land use	Residential 2 - Institutional and communal accommodation
Monument type	WALLS Modern
Monument type	PLOUGH MARKS Post Medieval
Significant Finds	POT Roman
Significant Finds	POT Early Medieval
Significant Finds	POT Post Medieval
Significant Finds	POT Modern
Significant Finds	GLASS Modern
Significant Finds	CBM Post Medieval
Significant Finds	CTP Post Medieval
Significant Finds	COIN Modern
Significant Finds	CARTRIDGE Modern
Methods & techniques	"Sample Trenches","Targeted Trenches"
Development type	Urban commercial (e.g. offices, shops, banks, etc.)
Development type	Urban residential (e.g. flats, houses, etc.)

Prompt	National Planning Policy Framework - NPPF
Position in the planning process	After full determination (e.g. As a condition)
Project location	
Country	England
Site location	GREATER LONDON BARNET THE FORMER INGLIS BARRACKS, MILLBROOK PARK, MILL HILL, LONDON BOROUGH OF BARNET
Postcode	NW7 1SL
Study area	0 Square metres
Site coordinates	TQ 2408 9211 51 0 51 36 49 N 000 12 27 W Point
Height OD / Depth	Min: 76.70m Max: 103.29m
Project creators	
Name of Organisation	PCA
Project originator brief	Halcrow Group Limited
Project design originator	Peter Moore
Project director/manager	Peter Moore
Project supervisor	Ian Cipin
Project supervisor	Iain Bright
Type of sponsor/funding body	Inglis Consortium
Project archives	
Physical Archive recipient	LAARC
Physical Archive ID	FIB12
Physical Contents	"Ceramics", "Glass", "Metal"
Digital Archive recipient	LAARC
Digital Archive ID	FIB12
Digital Contents	"none"
Digital Media available	"Images raster / digital photography", "Images vector", "Spreadsheets", "Survey", "Text"
Paper Archive recipient	LAARC
Paper Archive ID	FIB12
Paper Contents	"none"
Paper Media available	"Context sheet", "Plan", "Report", "Section", "Unpublished Text"
Project bibliography 1	
Publication type	Grey literature (unpublished document/manuscript)

Title	Former Inglis Barracks, Millbrook Park, Mill Hill, London Borough of Barnet: An Archaeological Assessment Report
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