FORMER FLAX FACTORY, HARDWICK INDUSTRIAL ESTATE, BURY ST EDMUNDS, SUFFOLK

HISTORIC BUILDING APPRAISAL

ARCHAEOLOGICAL SOLUTIONS LTD

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HISTORIC BUILDING APPRAISAL

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NGR: TL 8570 6314	Report No. 2057
Parish: Bury St Edmunds	Site Code: BSE 274
Approved: Claire Halpin MIFA	Project No. 2243
Signed:	Date: June 2006

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OASIS SUMMARY SHEET

Project details	
Project name	Former Flax Factory, Hardwick Industrial Estate, Bury St
	Edmunds, Suffolk

Project description (250 words)

In June 2006, Archaeological Solutions Ltd (AS) carried out a historic building appraisal of industrial buildings relating to a former flax factory at Hardwick Industrial Estate, Bury St Edmunds, Suffolk.

The exact date at which the flax factory commenced production is not known but its period of use is known to have been relatively short-lived, between the years 1919 and 1926. Involving labour intensive processes, it was built to provide employment for people in the Depression years after the First World War. The buildings were later the premises of the Bury Hand Laundry and during the Second World War were used by the MoD. In latter years the site has been utilised as an industrial estate.

Most of the buildings associated with the factory survive and photographs taken at the time the flax factory was in production give a good indication as to how some of the buildings were used. It is less easy to determine how the site was used by the laundry and the MoD.

Project dates (fieldwork)	12 th June 2	2006			
Previous work (Y/N/?)	Y Future work (Y/N/?)				
P. number	2243	Site code	BSE 274		
Type of project	Historic B	Historic Building Appraisal			
Site status					
Current land use	Industrial	estate			
Planned development	Residentia	ıl redevelopment			
Main features (+dates)	Early 20 th	century flax factory			
Significant finds (+dates)					
Project location	•				
County/ District/ Parish	Suffolk	St Edmundsbury	Bury St Edmunds		
HER/ SMR for area	Suffolk SN	MR .			
Post code (if known)					
Area of site					
NGR	TL 8570 6	TL 8570 6314			
Height AOD (max/ min)	35 - 37.5n	35 - 37.5m			
Project creators					
Brief issued by	SCC AS C	onservation Team			
Project supervisor/s (PO)	Amy Gold	Amy Goldmith, Archaeological Solutions			
Funded by	Land Charter Homes plc				
Full title	Former Fl	Former Flax Factory, Hardwick Industrial Estate, Bury St			
	Edmunds,	Edmunds, Suffolk. Historic Building Appraisal			
Authors	Goldsmith	Goldsmith, A. & Henry, K.			
Report no.	2057	2057			
Date (of report)	June 2006				

FORMER FLAX FACTORY, HARDWICK INDUSTRIAL ESTATE, BURY ST EDMUNDS, SUFFOLK

HISTORIC BUILDING APPRAISAL

SUMMARY

In June 2006, Archaeological Solutions Ltd (AS) carried out a historic building appraisal of industrial buildings relating to a former flax factory at Hardwick Industrial Estate, Bury St Edmunds, Suffolk.

The exact date at which the flax factory commenced production is not known but its period of use is known to have been relatively short-lived, between the years 1919 and 1926. Involving labour intensive processes, it was built to provide employment for people in the Depression years after the First World War. The buildings were later the premises of the Bury Hand Laundry and during the Second World War were used by the MoD. In latter years the site has been utilised as an industrial estate in mixed use.

Most of the buildings associated with the factory survive and photographs taken at the time the flax factory was in production give a good indication as to how some of the buildings were used. It is less easy to determine how the site was used by the laundry and the MoD.

1 INTRODUCTION

- 1.1 In June 2006, Archaeological Solutions Ltd (AS) carried out a historic building appraisal of industrial buildings relating to a former flax factory at Hardwick Industrial Estate, Bury St Edmunds, Suffolk (TL 8570 6314; Figs 1 & 2). The work was commissioned by Mr Henrik Darlington of Land Charter Homes plc ahead of proposed residential redevelopment of the site. The works were carried out prior to the determination of planning proposals to redevelop the site.
- 1.2 The appraisal was carried out in accordance with a brief issued by Suffolk County Council Archaeological Service Conservation Team (SCC AS) (dated 10/1/06) and a specification prepared by AS (dated 21/2/06). The main elements of the project were to carry out an appraisal of the existing historic structures, with a photographic schedule of features of historic interest. The brief also required a programme of archaeological desk-based assessment and field evaluation, the results of which have been issued as separate reports.
- 1.3 The historic building appraisal conformed to English Heritage's *Understanding Historic Buildings: a guide to good recording practice*, 2006 and the Institute of Field Archaeologists' (IFA) *Standard and Guidance for the Archaeological Investigation and Recording of Standing Buildings or Structures* (revised 2001). The relevant sections of *Standards for Field Archaeology in the East of England*, East Anglian Archaeology

Paper 14/ALGAO (Gurney 2003) and the document *Analysis and recording for the conservation and control of works to historic buildings* (Association of Local Government Archaeological Officers 1997) were also followed. The level of recording was to Level 2 as defined in the English Heritage document

- 1.4 As set out in the brief, the principal objectives of the historic building appraisal were:
 - to compile a description of the buildings relating to the former flax factory, establishing their history and level of survival. This should include an examination of the buildings' secondary use as a laundry;
 - to make an assessment of their value to local and regional heritage and establish the need for further study and recording. This should include an assessment of the potential for documentary research to contribute to the understanding of the flax factory and the laundry which succeeded it;
- 1.5 The main research issues of the project are to provide a historic building appraisal of the present structures prior to proposed redevelopment. As noted in the East Anglian regional archaeological research frameworks (Brown & Glazebrook 2000), structures of the Industrial Age (1750 1960) face a high rate of loss (due to renovation, conservation and redundancy), and the phases and uses of the building fall into this time frame. It is important to understand the origins, status, function and phasing of the buildings.
- 1.6 As noted above, Hardwick Industrial Estate has already been the subject of an archaeological desk-based assessment (Hogan 2006) and an archaeological trial trench evaluation (McConnell 2006).

2 DESCRIPTION OF THE SITE

- 2.1 Bury St Edmunds is located at the confluence of the rivers Lark and Linnet, and on the A14 trunk road (Fig. 1). The surrounding land comprises mostly farmsteads and small villages, the closest large town being Great Barton, *c*. 4km to the north-east. Further away, the town of Stowmarket lies *c*. 20km to the east-south-east, and Sudbury to the south-south-east.
- 2.2 Hardwick Industrial Estate is situated on the south-eastern outskirts of the town. It is sub-rectangular in plan, aligned north-east to south-west, with a sub-square promontory extending to the north that is cut by Cullum Road (the A1302) which forms part of the ring road that encircles the town. The site is reached by Laundry Lane which extends north to south along the eastern boundary of the site.
- 2.3 The former flax factory buildings lie at the centre of the site surrounded by later industrial units (Fig. 2). The site comprises a cluster of buildings towards the east end of the site (Building Group 1), a smaller building at the centre of the site (Building 2) and a

long range of adjoining buildings to the west (Building Group 3). There is also a small building (Building 4) located just to the north-east of Building 2 and another smaller building (Building 5) to the north-west of Building Group 3.

3 METHOD OF WORK

- 3.1 The site was visited on 12th June 2006 in order to undertake the listing and photographic work. Sketch floor plans supplied by the client were used to supplement the survey and have been used as a basis for Figures 5-7. It should be noted that these are not to scale and represent an indicative layout only.
- 3.2 The photographic recording was carried by Kathren Henry out using an Olympus Camedia E20 digital camera for all external views, general internal shots and fine detail. External lighting and weather conditions were good at the time of the survey. A scale was used wherever possible, and a flash was employed for internal shots. A pictorial index of the digital photography and selected colour plates are included below together with location plots (Figs 5-7).

4 HISTORICAL BACKGROUND

History of the Site

- 4.1 The archaeological and historical background to the site and the results of a map regression exercise are covered in the previous desk-based assessment of Hardwick Industrial Estate (Hogan 2006). It is not intended to repeat this work but to provide relevant information to put the site in context and aid the understanding of the buildings.
- 4.2 The 18^{th} and 19^{th} centuries in Bury St Edmunds were dominated by industrial growth. In the mid 18^{th} century cloth trade and manufacture in particular flourished, with the main output being the coarse cloth used by agricultural workers (Nicholson 2005). However, by 1800 the cloth industry in Bury St Edmunds was virtually non-existent and by 1886 it had largely been replaced by the corn trade. This is reflected in the flax industry nationwide at this time which had been in gradual decline since the middle of the 19^{th} century owing largely to increasing foreign imports (Nelson's Encyclopaedia c. 1910a).
- 4.3 Following the First World War there was a need to provide new employment and the flax factory and a nearby sugar beet factory were built in Bury St Edmunds to serve this purpose. Both involved labour intensive processes, which were well suited for providing employment for relatively large numbers of people in the Depression years.
- 4.4 The exact date at which the flax factory commenced production is not known. The 1906 Ordnance Survey map (Fig. 3) shows the site as open fields and the assessment buildings can first be identified on the 1926 Ordnance Survey map (Fig. 4) labelled as a

disused flax factory. It is clear from this that the buildings were erected sometime in the intervening period and that the factory was relatively short-lived.

- 4.5 A basic search for documents relating to the site was carried out on the Access to Archives website. The search results listed a file (EE500/14/7) held at the Suffolk Record Office, relating to Almoner's Barns Farm (adjacent to the site) which included amongst other documents relating to the farm; papers relating to the proposal to erect a flax factory on the site with a petition including 35 names against it. The contents of the file date to 1918-1919, so it would seem that the flax factory was constructed in 1919 or soon thereafter. This implies that the factory was relatively short-lived; perhaps a reflection of the dwindling flax industry at the time.
- 4.6 The search also highlighted the existence of several photographs which were taken whilst the factory was in production and which are included as Appendix 2. These are particularly useful in determining the function of individual units within the building.
- 4.7 It is not known why the Flax Factory ceased production, but just prior to the Second World War the site was acquired by the Forbes family of Bury St Edmunds to serve as the premises for the Bury Hand Laundry which was formerly located on Guildhall Street. At the start of the Second World War, the site was requisitioned by the Ministry of Defence (MoD) and used as a station for the home guard as well as the regular army that looked after a prisoner of war camp located nearby on Hardwick Heath. The troops were stationed in Nissen Huts on the site, but the MoD also adapted some of the existing factory buildings for such uses as a munitions store and rifle store.
- 4.8 Some years after the war, the site reverted to being occupied by the laundry. The laundry owners converted the area behind Building 2 for use as a swimming pool and built a bowling green on the site for the use of the employees. The laundry ceased production and the site then lay derelict for some years until the mid 1960s when the owner of the site was approached by a motor mechanic seeking premises for his business. He was followed by several others and by the 1980s office buildings were built to the south of the factory buildings for a whole host of light industrial businesses. The site has continued in use as an industrial estate until the present day.

Flax Processing

- 4.9 In order to understand the functions of the individual buildings, it is first necessary to understand the basic processes involved in converting flax the raw material, into fibres which can then be spun and used to produce linen or rope. The following information has been summarised from Nelson's Encyclopaedia c. 1910b.
- 4.10 The first part of the process involves separating the seeds from the stems by a process called 'rippling'. 'Beaters' are used to loosen the seeds and 'shakers' shake the seeds from the flax straw. The straw is then 'retted' in order to get rid of the resinous matters present in the plant. This is achieved by soaking the stems in water and allowing them to ferment. The stems then need to be dried; a process called 'grassing', before they

can be broken. The stems are broken by passing them through horizontal fluted rollers which break up the woody portion of the stem. This allows the woody part to be separated from the fibrous part in a process known as 'scutching'. The fibre is then made up into bundles and sent to the mill to be spun into yarn.

5 THE BUILDINGS (Figs 5-7)

5.1 All the buildings are constructed of Fletton brickwork. The original door and window apertures have concrete lintels and the windows have concrete sills. Some of the windows have been replaced but those surviving from the original build are iron framed. The roof structures survive largely intact although some of the buildings once had semicircular vented apexes (see Appendix 2), most of which have been lost when roof coverings have been replaced in latter years.

5.2 Building Group 1 (Fig. 5)

5.2.1 Building Group 1 lies towards the east end of the site close to the entrance from Laundry Lane. It comprises a cluster of buildings of which two are associated with the flax factory. Unit 1 is aligned north to south and faces the entrance to the site. Extending to the rear is Unit 2, a large open shed. Adjoining to the south is a long modern unit, to the north; modern offices and to the west; a series of lean-to structures.

Unit 1

- 5.2.2 Unit 1 is a two storey structure constructed of brickwork laid in Flemish bond (Plate 1). The east elevation is obscured at ground floor level by a later lean-to structure but a photograph taken whilst the factory was in use shows its original appearance (Appendix 2.10). The east face of the lean-to has five identical modern two leaf doors with upper glazed panels, which lead to separate industrial units. The lean-to roof is covered with corrugated asbestos, rising above which is the first floor of the main build which contains four 3x2 pane windows. The roof of Unit 1 is covered with corrugated asbestos. The north elevation is adjoined by a more recent single storey Fletton brick and horizontally boarded structure. Above, the first floor has a tall window of two lights, each of 2x6 panes. The upper part of the window is now boarded over. The ground floor of the south elevation is obscured by a lean-to structure and the first floor like the north elevation has a tall window aperture, the lower part of which now contains a boarded door.
- 5.2.3 The interior has been subdivided into separate units of which only one was accessible at the time of recording. Much of the interior is obscured by modern fittings but on the east wall at ground floor level are a series of openings corresponding with the door and window apertures seen in Appendix 2.10. The roof was inaccessible at the time of recording.

Unit 2

- 5.2.4 Unit 2 comprises a double gabled unit aligned west to east, which adjoins the west wall of Unit 1. The brickwork, like that of Unit 1 is laid in Flemish bond. The north elevation has two large doorway apertures with bull-nosed jambs to half-height. The east doorway retains glazed sliding doors. Between the two openings is a smaller inserted doorway with two windows above and towards the east end is a 2x2 pane window with upper bottom-hung light. A more recent office unit adjoins at the east end. The roof is covered with corrugated iron. The west elevation is essentially plain although it is much obscured by modern lean-tos. The ground floor of the south elevation is masked by a lean-to but the first floor contains a series of high set windows.
- 5.2.5 The interior comprises an open shed, now subdivided into two separate areas by a blockwork partition (Plate 2). There are two rows of roof trusses which are supported on buttresses on the outer walls and on brick piers down the building's central axis. Each roof truss is constructed of paired board-section timbers to form a tie beam with a central 'king post' and outer 'queen' and 'princess posts' secured to the tie beam by iron stirrups. Raking struts extend from these to the rafters which support two purlins in each pitch. Additional longitudinal braces extend from the trusses to the purlins and ridge board. There are several blocked apertures within the walls and an inserted doorway in the west wall leading into an adjacent lean-to. Surviving on the south face of two of the brick piers are two iron brackets which can also be seen in an old photograph of the building (Appendix 2.3).

5.3 Building 2 (Fig. 6)

- 5.3.1 The north elevation of Building 2 comprises a tall three storey unit (Unit 2) flanked by a two storey unit to the east (Unit 1) and a single storey unit to the west (Unit 3) (Plate 3). The brickwork is painted and laid in English garden wall bond. Unit 2 has a ground floor doorway containing an iron door set off centre to the east and to its west is a blocked window aperture. Above, the first floor contains two window apertures although the windows themselves have been replaced and the second floor has two high set window apertures, now blocked. The roof is essentially flat and constructed of concrete. Unit 1 has two small ground floor windows each of three lights plus two tall first floor windows each of 4x6 panes. The west unit has two similar tall window apertures, now boarded over. The east and west units each have a corrugated asbestos roof.
- 5.3.2 The gable end of Unit 3 contains a ground floor two leaf doorway with boarded, framed, ledged and braced doors and a first floor loading doorway / former window aperture. The west elevation of the Unit 2 unit is plain.
- 5.3.3 The south elevation is similar to the front. The ground floor of Units 1 and 2 are obscured by a later corrugated iron clad lean-to and modern mobile unit, but an old photograph (Appendix 2.4) shows the building as it originally was. Unit 3 has two tall windows as the front as does the east unit and there is now an iron escape ladder

extending to the roof. The ground floor of Unit 2 has two windows and three of the four upper windows remain in position.

- 5.3.4 The east elevation of Unit 1 has a ground floor doorway set at the north end and a tall 3x5 pane window located within the gable. A small lean-to has been added to provide an entrance porch.
- 5.3.5 The ground floor comprises three rooms. Unit 1 comprises a ground floor and first floor room although it is clear that the floor is a later addition and that the room was once open to the roof. The floor is supported by three axial 'H' girders which have been inserted into the east and west walls. There is also a buttress in each the north-east and south-east corners and one on each the north and south walls. An old photograph taken when the factory was in production, shows two coal fired boilers situated on the south side of the room (Appendix 2.11). Two doorways now exist on the south side of the room which lead into the modern additions and a door at the north end of the west wall leads into Unit 2. Room 2 on the upper floor is reached by an inserted stair on the south side of the room. The buttresses seen on the ground floor continue to the wall head and support two roof trusses of angle iron and gusset construction. Each truss comprises a tie with two 'queen struts' on either side of which raking struts extend to the rafters and apex. Three timber purlins resting on cleats on the rafters are present in each roof pitch. High up on the west wall are two large down-flow pipes, the bases of which can be seen in Appendix 2.11 and within the roof is the remnant of a former chimney flue (Plate 4).
- 5.3.6 Unit 2 is of three storeys. The ground floor (Room 3) is essentially plain with a doorway leading into the west unit at the north end of the west wall. The floor above is constructed of reinforced concrete and supported on two axial 'H' girders which rest upon concrete bearers set within the walls and co-axial 'H' girders of smaller section. The first floor (Room 4) is reached by a stair located on the west wall. There is a 2x2 pane window on the west wall which looks into the adjacent unit. The window appears original but there is no indication that the west unit is a later addition and it probably served to allow borrowed light to pass between the two units. Two axial 'H' girders resting on concrete bearers within the walls support co-axial 'H' girders of smaller section and an iron floor above. The floor was obviously designed to bear a heavy load; no doubt a water tank as is suggested by the many pipes leading through the floor above. The upper floor is reached by a steep stair, probably original, which is located on the north wall (Plate 5). The room was too dangerous to enter but viewed from the stair can be seen to contain a modern water storage tank. The roof is constructed of reinforced concrete.
- 5.3.7 The walls of Unit 3 are largely concealed by modern boarding. The unit would originally have been open to the roof but now has a modern suspended ceiling. An old photograph (Appendix 2.5) shows that the unit once contained an electricity generator.

5.4 Building Group 3 (Fig. 7)

5.4.1 Building Group 3 comprises twelve adjoining units forming an east to west range (Plate 6). They are organised roughly back-to-back to either side of a lean-to unit which forms a central communication route. All units, unless otherwise stated are constructed of Fletton brickwork laid in English garden wall bond, which is now painted and have corrugated iron roofs.

Unit 1

- 5.4.2 Unit 1 lies at the east end of the range and has shaped gables at both the east and west ends (Plate 7). All the windows are modern wooden framed replacements of two lights. The north elevation is defined by three pilaster buttresses and contains three windows. The east gable end contains one window inserted within a former wide doorway aperture and to the south is a modern sliding steel door. Adjoining to the south is the central lean-to unit which contains a modern doorway within a former window aperture.
- 5.4.3 The interior of Unit 1 is reached though this doorway. There are three roof trusses of similar construction to those in Unit 2, Building Group 1. The trusses rest on concrete bearers within the north wall and an 'H' girder supported by 'H' iron stanchions and corbelled brickwork piers to the south. The south side of the building at the east end is open into the lean-to unit which is now subdivided by modern partitioning. The west end is now infilled with blockwork but it appears that the whole of the south side of the building was originally open into the lean-to. The west wall contains three blocked doorway apertures to Unit 2.

Unit 2

- 5.4.4 The north elevation of Unit 2 contains a modern glazed door at the east end and a modern sliding doorway at the west end.
- 5.4.5 The interior of the building was converted by the MoD in World War II to serve as a munitions store (Brooks, pers comm.). As a result an inner wall has been constructed inset c. 0.5m from the north wall to give protection from bomb blasts. Extending along the south wall of the building is a raised concrete plinth and a series of partitions (Plate 8), presumably for storing different types of munitions. Brick piers exist to support the roof structure which was not visible at the time of recording.

Unit 3

5.4.6 Unit 3 adjoins the west end of Unit 2. It is similar to Unit 1 having a shaped gable at both the east and west ends and three pilaster buttresses on the north face. The north elevation contains a modern uPVC door and adjacent window at the east end and two modern wooden framed windows plus a boarded, ledged and braced door within a former window aperture to the west. The west elevation contains a single window.

5.4.7 The interior has three roof trusses similar to those in Unit 1. Faint lines of railway tracks can be seen within the concrete floor running down the south side of the building (Plate 9) which may be those which are visible in the old photograph reproduced as Appendix 2.12. There is a blocked doorway to Unit 7 at the south end of the west wall..

Unit 4

- 5.4.8 Unit 4 is a more recent structure situated to the south of Unit 1. The south elevation contains four iron casement windows and the east gable end contains a two leaf steel door. The roof is covered with corrugated asbestos.
- 5.4.9 The interior has been subdivided by modern partitioning. Two roof trusses were visible supported on the south side by brick buttresses. Each is constructed of bolted and nailed paired boards to form a 'king post' roof truss with raking struts to the rafters.

Unit 5

- 5.4.10 Unit 5 is a modern building which infills the gap between Unit 4 to the east and Unit 6 to the west. The south wall is clad with horizontal boarding and has a corrugated iron roof.
- 5.4.11 From within, the original external wall of the lean-to unit is visible. It contains a wide doorway aperture and to its east a 4x3 pane window.

Unit 6

- 5.4.12 Unit 6 lies to the west of Unit 5. The south elevation has a modern window and sliding steel door. A lean-to adjoins to the west, beyond which is another door.
- 5.4.13 The interior comprises a large open shed with seven roof trusses supported on brick buttresses (Plate 10). The roof trusses are of similar construction to those in Units 1 and 3. The north wall of the easternmost three bays open into the lean-to unit which runs between the buildings. The roof at this point is supported as in Unit 1 by an 'H' girder which is in turn supported on corbelled brick piers and an 'H' iron stanchion. The east wall contains a wide inserted doorway and to the north a smaller original doorway, both of which are now infilled. Between the two is a 4x3 pane iron window. There is a doorway on the north wall in the fifth bay from the east, now boarded over and an inserted doorway on the south wall in the sixth bay from the east. The west wall contains a very wide blocked aperture with a central iron stanchion which can be seen in an old photograph of the building (Appendix 2.2). The large concrete lintel above the aperture has a decorative chamfer.

Unit 7

- 5.4.14 In contrast with the other buildings, Unit 7 is two storeyed and lies on a north to south alignment, traversing the central communication route. The north elevation contains a ground floor window set within a former doorway aperture. To its west is a modern glazed door. Within the gable is a tall window aperture containing a modern replacement window and adjacent, two inserted windows. The south elevation contains a two leaf framed, boarded and ledged door, each leaf having upper glazing of 2x3 panes and to the west of this is a blocked window. Above the door is a 3x4 pane window. The west elevation contains four 3x2 light windows whereas the east elevation is plain and the brickwork has been left unpainted.
- 5.4.15 Some of the internal partition walls appear to have been added later. There is a wide blocked aperture each with a central iron stanchion, on the east and west walls to Units 6 and 9 respectively (Plate 11). There is also a smaller blocked doorway to Unit 3 at the north end of the east wall. The floor above is constructed of deep section pine joists. A stair to the first floor has been inserted at the south end of the east wall.
- 5.4.16 The first floor comprises four interconnecting rooms. Within the north end room is a doorway which leads west into Unit 8 and adjacent to the north, is a blocked window. The roof was not accessible at the time of recording.

Unit 8

- 5.4.17 Unit 8 adjoins the west wall of Unit 7. The north elevation comprises three uPVC doors with adjacent side lights plus two modern windows on the ground floor. The first floor contains two modern windows plus a similar window within the west gable end. The south elevation has two 3x2 pane windows on the first floor.
- 5.4.18 The interior has been considerably modified and is now subdivided into separate office units. A stair unit at the east end of the building leads to the first floor of this building plus that of Unit 7. The first floor is open as one room, but the roof was not accessible at the time of recording. A doorway inserted within a former wide aperture on the south wall leads into Unit 9.

Unit 9

- 5.4.19 The south elevation of Unit 9 has a projecting flat roofed section with a low plinth. It contains a central sliding steel door, plus another at the east end. There are also four window apertures, three of which are blocked and one which contains a 2x3 pane window. Although most of the roof covering has been replaced, the original semicircular vented apex remains.
- 5.4.20 The interior comprises an open shed with an 'aisle' down each side (Plate 12). There are two 'king post' roof trusses of bolted and nailed paired board construction, with raking struts to the principal rafters which support two purlins in each roof pitch.

The trusses are supported on brick piers and the north and south sides of the building are open into the 'aisles'. The north wall contains a boarded, ledged and braced door and a 2x2 pane window. The blocked wide aperture from Unit 7 is visible on the east wall, and the west wall which appears once to have been open, is infilled with blockwork.

Unit 10

5.4.21 Unit 10 is a small unit adjoining the west end of Unit 8. The north elevation comprises a doorway and two 2x2 pane windows, the easternmost of which is set within a former doorway aperture. The west elevation contains a single window. The roof has been raised with blockwork so that it pitches to the north but it was originally flat as can be seen in Appendix 2.1. The interior is fitted out as a modern office.

Unit 11

5.4.22 Unit 11 adjoins the south side of Unit 10. The west elevation has a modern casement window and to the south a two leaf door with upper reinforced glazing. The roof is flat. The interior was inaccessible at the time of recording.

Unit 12

5.4.23 Unit 12 adjoins the south side of Unit 11 and the west end of Unit 9. The north elevation contains two 3x3 pane windows. The west elevation has a boarded door contained within a narrower former window aperture and to the south a 4x3 pane window. The south elevation is plain with the exception of a low plinth. The interior was inaccessible at the time of recording, but it is thought to have served as a rifle store during the Second World War (Brooks, pers comm.).

5.5 Building 4

Building 4 is a small structure located to the north-east of Building 2 (Plate 13). It is constructed of Fletton brick laid in English bond. The east elevation contains a sliding steel door and to the north a modern door and window. A modern window has been inserted in the gable. The north face comprises a large blocked aperture with an adjacent window aperture and smaller door to the west. An opening at the west end contains a modern roller shutter. The south elevation has a blocked doorway aperture and the west gable end has an opening with a modern roller shutter. The interior was not accessible at the time of recording.

5.6 Building 5

Building 5 lies away from the rest of the buildings, to the north-west of Building Group 3. It is a small square structure built of Fletton brickwork laid in stretcher bond (Plate 14). The east face contains a boarded door plus a window, the south and west faces each contain a single window and the north face is plain. The interior was not accessible at the time of recording, but it is known to have been built during the Second World War to

serve as a pump house to pump fresh water to, and sewage away from the site (Brooks, pers comm.).

6 DISCUSSION

- 6.1 Most of the buildings associated with the flax factory survive largely intact. Despite this, few fittings remain to indicate how the buildings were used and therefore their interpretation is based heavily on the old photographs which were taken whilst the site was still in use. The process appears to have followed a linear path from Building Group 1 at the east of the site, through to Building Group 3 at the west end. Although it is not entirely clear how all of the buildings were used, the probable procession through the main buildings is outlined below (Fig. 8).
- 6.2 Once the flax had been harvested it would have been laid out in the fields to dry. Several of the photographs (Appendices 2.1, 2.4 and 2.9) show flax being dried in this way, though whether it is this stage of the process that is shown or the later 'grassing' stage is not absolutely clear. Appendix 2.8 shows stacks of dried flax ready for processing. In addition to the flax grown in the surrounding fields, it is possible that flax was brought in from nearby farms, and it may be that the two Dutch barns on either side of Building Group 1, close to the entrance to the site were for the storage of flax brought onto the site. These can be seen in Appendices 2.9 and 2.10 and on Fig. 4.
- 6.3 It is not absolutely clear which part of the process is being shown in the photograph of Building Group 1 (Appendix 2.3). The initial stage (rippling) involves the flax being beaten and then passed through a deseeding machine. This may be what is happening in the background of the photograph, whereas in the foreground rolling machinery is shown ready for assembly.
- 6.4 Once the flax straw had been separated from the heads, it needed to be retted. This would have been carried out in the tanks which are situated in close proximity to the water tower at the centre of Building 2 (Appendix 2.4 and Fig. 4). From here, the straw would have been laid out to dry in the fields and stacked ready for the next stage in the process (Appendices 2.1, 2.4, 2.8 and 2.9).
- Group 3 within two long buildings; Units 6 and 9 respectively. A photograph of Unit 6 (Appendix 2.2) appears to show bundles of flax being passed through some machinery probably a series of horizontal rollers, which would have broken the stems down. From here the flax would have progressed to Unit 9 the scutching department (Appendix 2.6) which is linked to Unit 6 by the wide opening at the end of the building (Appendix 2.2). Scutching would have been a particularly labour intensive part of the process and this is reflected by a far greater number of staff in this photograph. A series of partitions line the north and south sides of the building to form booths in which one person could work, separating the woody portion of the stem from the fibre. The trestle tables down the centre of the building are laden with finished bundles of fibre, ready to go to the spinners.

- 6.6 Building 2, with its central water tower and flanking boiler house and electricity generator house would have supplied power to the buildings and machinery and would also have provided a supply of water to the retting tanks adjacent. Two photographs (Appendices 2.7 and 2.12) show a light railway, presumably for transporting flax between different stages of the process and also perhaps for removing waste material along the way. Building 4 may have served as some kind of store or workshop.
- 6.7 The majority of the buildings present on the site are essentially of one phase, and associated with the construction of the flax factory. However, Units 8 and 12 and probably also Units 10 and 11, are slightly later additions. The blocked window aperture on the north wall of Unit 7 and the window and door on the north wall of Unit 9, imply that Unit 8 is a later addition. Similarly, the old photograph showing the interior of Units 6 and 9 (Appendix 2.2) shows the west end wall of Unit 9 open and not adjoined by Unit 12. Nevertheless, these buildings are all present by the time of the 1926 Ordnance Survey map (Fig. 4) so it is likely that they are associated with the flax factory. Unit 4 is also a later addition and Appendix 2.9 show that this replaces an earlier flax factory building. All those buildings shown on the 1926 Ordnance Survey map (Fig. 4) appear to remain standing to this day, indicating that most of the original flax factory buildings survive.
- 6.8 There is little surviving within the buildings to indicate how they may have been used during their occupation by the laundry. Most of the modifications to the buildings involve the blocking of former communication routes within the buildings but it is not clear which of these relate to the buildings' use as a laundry or their use by the MoD. The only modifications which can be clearly identified with the site's occupation by the MoD are to Unit 2 which was used as a munitions store, where a blast wall and compartments for storing munitions were constructed. The pump house (Building 5) is also known to date from this time. More recent alterations to the buildings involve internal partitioning to break the buildings down into smaller industrial units and offices, relating to the site's later use as an industrial estate.
- 6.9 The potential for documentary research to further understanding of the buildings may prove rather limited. A basic search of the records held at the Suffolk Record Office produced very little in the way of information other than the old photographs and a reference to a petition against the construction of the factory. Trade directories for the area may help to narrow the date ranges within which the flax factory and laundry were in operation, but perhaps the most useful source of information, as suggested by Mr Paul Brooks, a tenant on the site, may be Mr Jim Baines of Bury St Edmunds who has long been associated with the site, in particular during the period of use as a laundry.

ACKNOWLEDGEMENTS

Archaeological Solutions would like to thank Land Charter Homes plc (in particular Mr Henrik Darlington) for commissioning this historic building appraisal. AS is also grateful for the assistance of Kelvin Bak of Land Charter Homes plc and the valuable background information on the history of the site provided by Mr Paul Brooks, a tenant on the site.

AS is also pleased to acknowledge the advice and input of Mr Robert Carr of SCC AS.

DEPOSITION OF THE ARCHIVE

An archive of all materials produced by the project has been created in accordance with the UK Institute for Conservation's *Conservation Guideline No. 2*. Copies of the final report will be lodged with the county SMR and the National Monument Record, Swindon. The archive will be lodged with the county SMR.

BIBLIOGRAPHY

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Websites

Access to Archives website http://www.a2a.org.uk Accessed 27th June 2006

APPENDIX 1 ARCHAEOLOGICAL SOLUTIONS HBR ARCHIVE FORM

Site Details				
Site Name: Former Flax Factory, Hardwick Industrial		NGR: TL 8570 6314		
Estate, Bury St Edmunds				
County: Suffolk Museum Co		llecting Area: Suffolk SMR		
Site Code: BSE 274	Project Number: 2243			
Date of Work: June 2006	Related Work: Archaeological desk-based assessment and trial trenching (reports 2028 & 2011)			

Brief/s		Spe	Specification/s		
Date	Present	Date	Present		
10/1/06	Yes	21/2/06	Yes		

Site Records (Description)					
Notes (15 sheets A4)					
Site Drawings (Give Details o	f Formats & Size)				
Drawn Plans & Sections:					
None					
Architect's Drawings:					
None					
Digital Drawings					
Printouts of Drawings	Printouts of Data	Digital Data			
In report		Digital photographs			
•		and drawings on CD			

Reports				
Report No	Report Type	Present		
2057	Historic Building Appraisal	Yes		

Site Photographs							
Black & White Contact Prints			Colour Slides				
Film	Film Type	Negs	Negs	Contacts	Film No	Negs	Present
No			Present	Present			

Photographic Location Plans Present? (Give Details)

In report and separate printout in archive folder

Digital Photographs (Give Details):

Index and selected plates printed in report. Separate printout of index included in archive folder and digitally on CD

DEPOSITION OF ARCHIVE

An archive of all materials produced by the report has been created and listed (see above) in accordance with the UK Institute for Conservation's *Conservation Guideline No. 2*. Copies of the final report will be lodged with the county SMR and the National Monument Record, Swindon. The archive will be lodged with the county SMR.

APPENDIX 2 OLD PHOTOGRAPHS

Reproduced from the Spanton-Jarman Collection of Photographic Negatives held at the Suffolk Record Office and made available on http://www.a2a.org.uk. Catalogue ref. K505.

The photographs are not dated but fall within the period 1919 to 1926.



Building Group 3, taken from the north-west (ref. BRO_K505_1812)



Unit 6, Building Group 3, taken from the east. This was probably the breaking department (ref. BRO_K505_1813)



Unit 2, Building Group 1, taken from the south-west (ref. BRO_K505_1814)



Building 2 and retting tanks, taken from the south-east. This photograph also shows flax laid out in the fields, part of Building Group 3 (left) and part of Building 4 (right) (ref. BRO_K505_1815)



Room 6, Building 2. This photograph shows an electricity generator (ref. BRO_K505_1816)



6 Unit 9, Building Group 3, taken from the west. This was probably the scutching department (ref. BRO_K505_1817)



Light railway, location unknown. It was probably taken within the central corridor through Building Group 3. (ref. BRO_K505_1818)



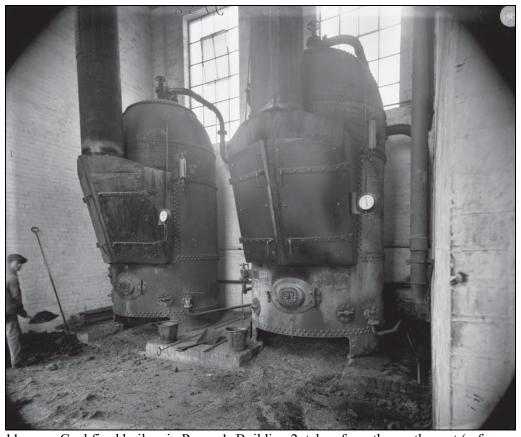
Flax stacked in the fields surrounding the site (ref. BRO_K505_1986)



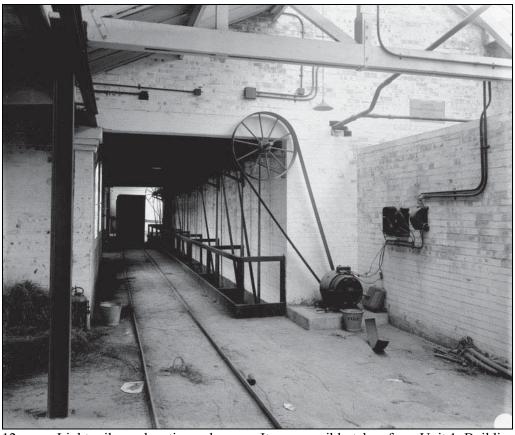
Building Group 1, showing Dutch barn, taken from the south-east. Building Group 3 is also visible. The building on the far left no longer exists and is replaced by Unit 4 (ref. BRO_K505_1987)



Building Group 1, showing flanking Dutch barns, taken from the east (ref. BRO_K505_1988)



11 Coal fired boilers in Room 1, Building 2, taken from the north-west (ref. BRO_K505_1989)



Light railway, location unknown. It was possibly taken from Unit 1, Building Group 3, looking west towards Unit 3 (ref. BRO_K505_1990)

PLATES



Plate 1 East elevation of Building Group 1, taken from the east (DP 77)



Plate 2 Unit 2, Building Group 1, taken from the north-east (DP 85)



North elevation of Building 2, taken from the north-west (DP 19) Plate 3



Room 2, Building 2 showing remnant of chimney flue from coal fired boiler, taken from the south-west (DP 6) Plate 4



Plate 5 Room 4, Building 2 showing stair to upper floor, taken from the south-west (DP 10)



Plate 6 North and west elevations of Building Group 3, taken from the north-west (DP 24)



Plate 7 East elevation of Building Group 3, taken from the east (DP 30)



Unit 2, Building Group 3, taken from the north-west (DP 48)

Plate 8



Plate 9 Line of railway tracks (highlighted) visible in floor of Unit 3, Building Group 3, taken from the west (DP 51)



Plate 10 Unit 6, Building Group 3, taken from the south-west (DP 39)



Plate 11 Blocked aperture on west wall of Unit 7, Building Group 3, taken from the south-east (DP 55)



Plate 12 Blocked apertures at the west end of Unit 8, Building Group 3, taken from the south-east (DP 65)



Plate 13 South and east elevations of Building 4, taken from the south-east (DP 94)

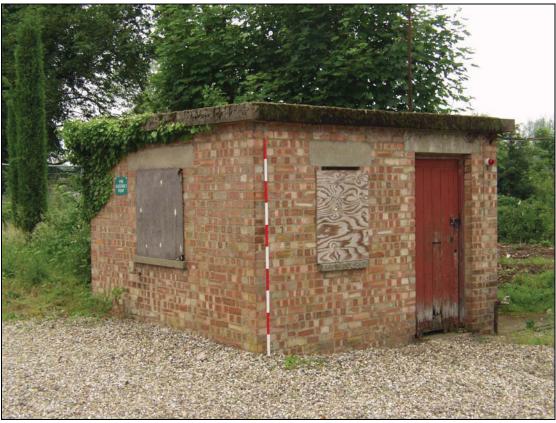


Plate 14 South and east elevations of Building 5, taken from the south-east (DP 95)

PHOTOGRAPHIC INDEX



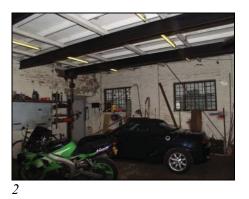
Room 1, Building 2 showing inserted floor, taken from the north-east



Room 3, Building 2, taken from the north-east



Office within lean-to at rear of Room 1, Building 2, taken from the north-east



Room 1, Building 2, taken from the south-east



Room 6, Building 2, taken from the north-east



Room 2, Building 2 showing remnant of chimney flue from coal fired boiler, taken from the southwest



Roof above Room 2, Building 2, taken from the south-west



Room 2, Building 2, taken from the south-west



Floor above Room 4, Building 2, taken from the south-west



Room 4, Building 2, taken from the north-east



Room 4, Building 2 showing stair to upper floor, taken from the south-west



Stop valve above Room 4, Building 2, taken from the west



Modern tank in Room 5, Building 2, taken from the north



Roof above Room 5, Building 2, taken from the north-east



Room 4, Building 2, taken from the north



East elevation of Building 2, taken from the east



North elevation of Building 2, taken from the north-west



West elevation of Building 2, taken from the west



21

South elevation of Building 2, taken from the south



South elevation of Building 2, taken from the south-west



23



24

North and east elevations of Building Group 3, taken from the north-east north-west

North and west elevations of Building Group 3, taken from the



26

West elevation of Building Group 3, taken from the west

South elevation of Building Group 3, taken from the south-west



South elevation of Building Group 3, taken from the south-east



East elevation of Building Group 3, taken from the east



East elevation of Building Group 3, taken from the east



Room 6, Building 2, taken from the south-west



North and west elevations of Building Group 3, taken from the north-west



Unit 1, Building Group 3, taken from the north-east



Unit 1, Building Group 3, taken from the west



Roof above Unit 4, Building Group 3, taken from the northwest



Unit 3, Building Group 3, taken from the south-west



Unit 4, Building Group 3, taken from the east



Office within lean-to unit at the rear of Unit 4, Building Group 3, taken from the south-east



Unit 6, Building Group 3, taken from the south-west



Unit 6, Building Group 3, taken from the north-west



Lean-to unit at the rear of Unit 6, Building Group 3, taken from the west



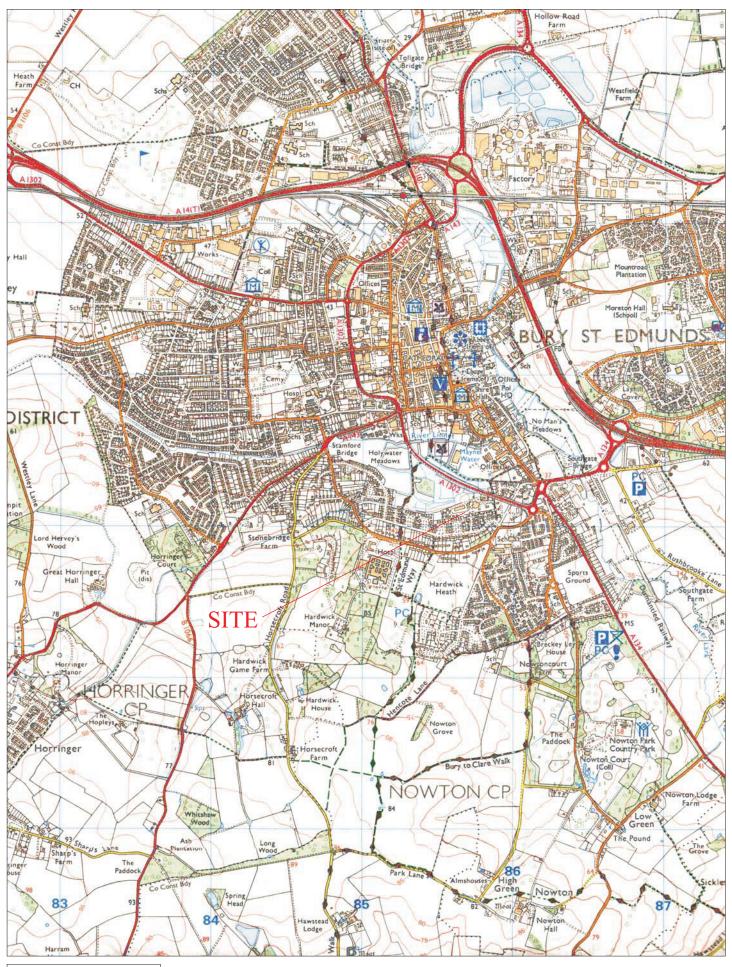


Roof above Unit 6, Building Group 3, taken from the northeast



Unit 2, Building Group 3, taken from the north-east





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Fig. 1 Site location plan
Scale 1:25,000



Archaeological Solutions Ltd
Fig. 2 Detailed site location
Scale 1:2000 at A4

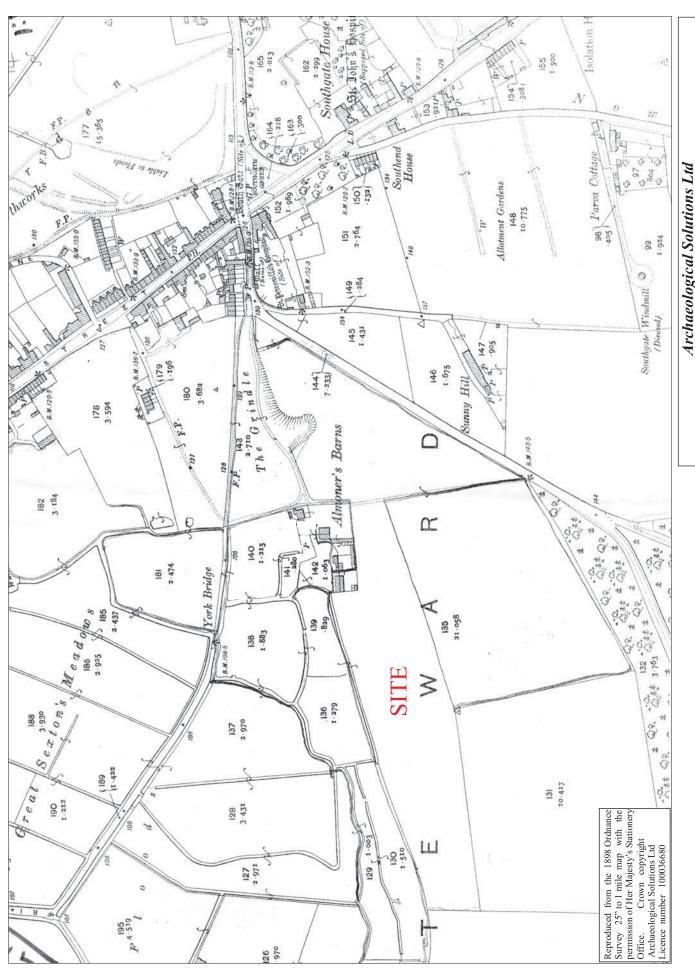


Fig. 3 Reproduced from the 1904 OS map
Reduced from scale 25" to 1 mile

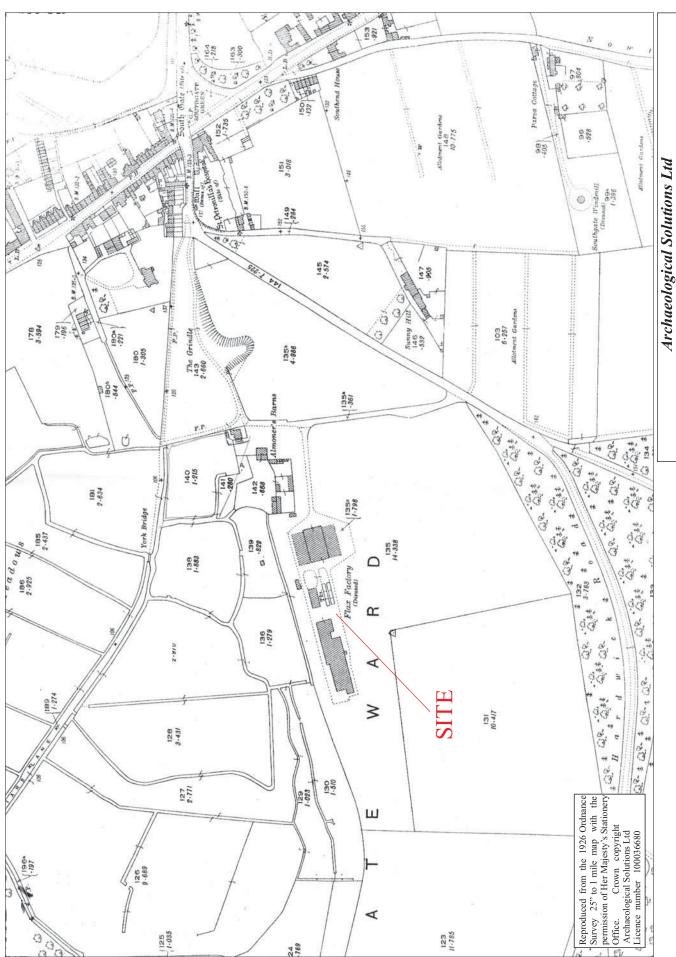
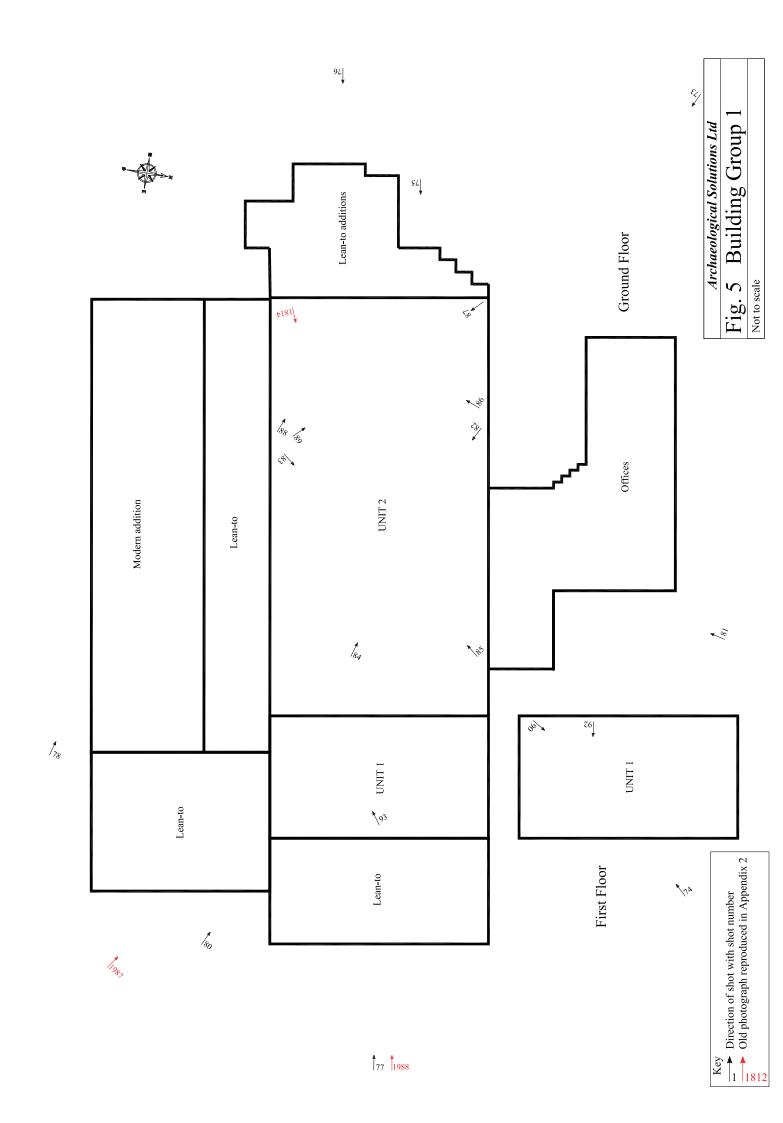
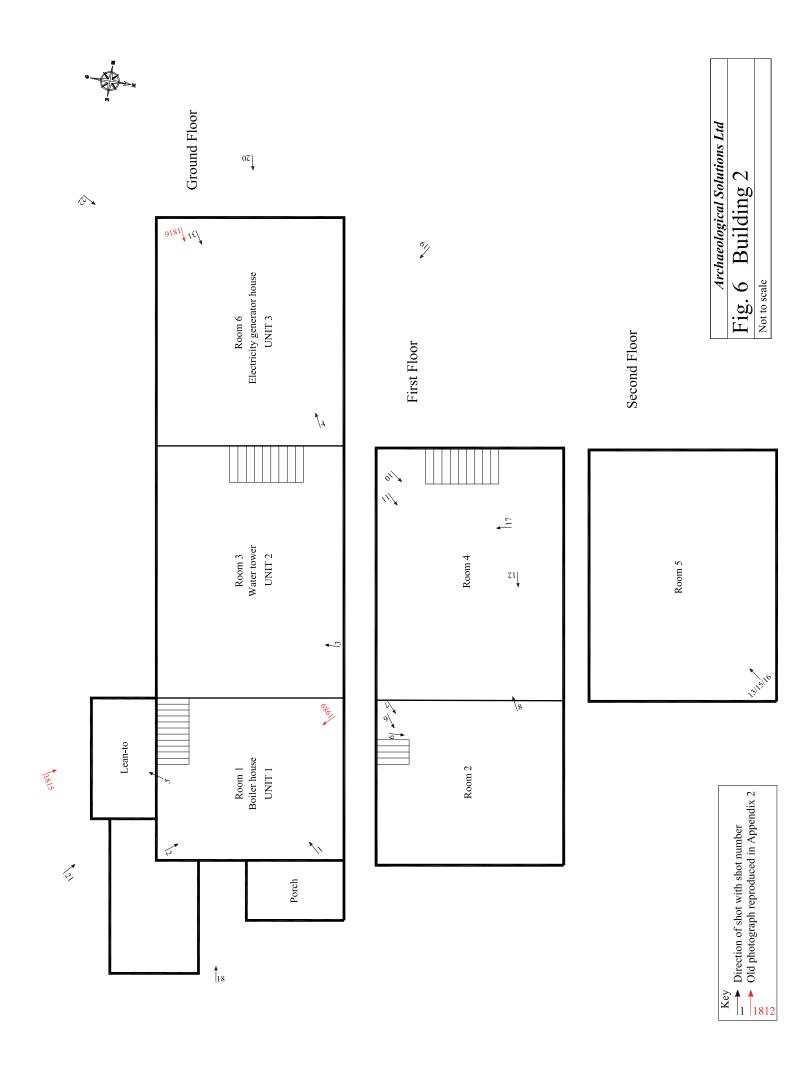


Fig. 4 Reproduced from the 1926 OS map
Scale reduced from 25 to 1 mile





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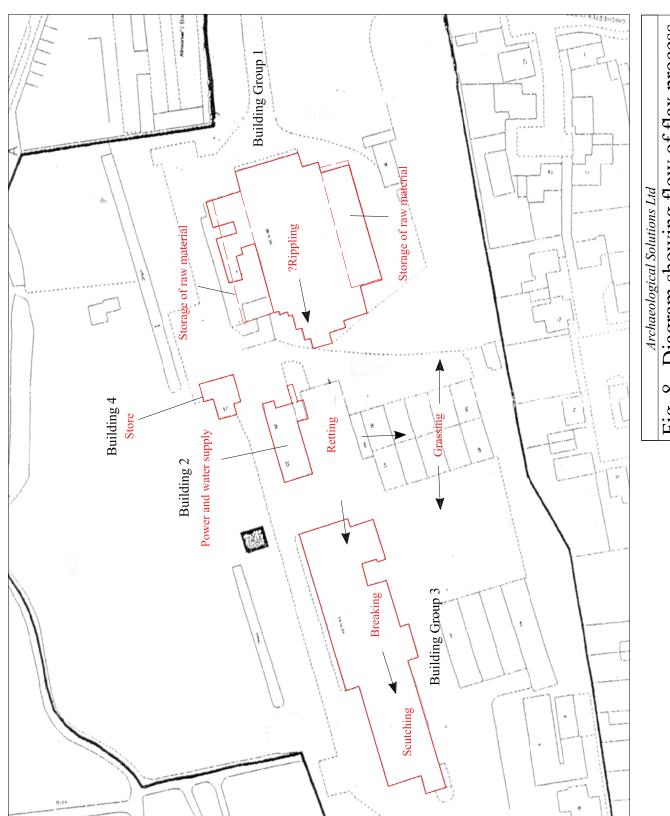


Fig. 8 Diagram showing flow of flax process Scale 1:1000 at A4

PLATES



Plate 1 East elevation of Building Group 1, taken from the east (DP 77)



Plate 2 Unit 2, Building Group 1, taken from the north-east (DP 85)



Plate 3 North elevation of Building 2, taken from the north-west (DP 19)



Plate 4 Room 2, Building 2 showing remnant of chimney flue from coal fired boiler, taken from the south-west (DP 6)



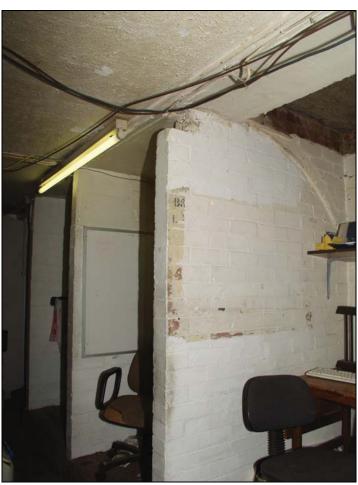
Plate 5 Room 4, Building 2 showing stair to upper floor, taken from the south-west (DP 10)



Plate 6 North and west elevations of Building Group 3, taken from the north-west (DP 24)



Plate 7 East elevation of Building Group 3, taken from the east (DP 30)



Unit 2, Building Group 3, taken from the north-west (DP 48)

Plate 8



Plate 9 Line of railway tracks (highlighted) visible in floor of Unit 3, Building Group 3, taken from the west (DP 51)



Plate 10 Unit 6, Building Group 3, taken from the south-west (DP 39)



Plate 11 Blocked aperture on west wall of Unit 7, Building Group 3, taken from the south-east (DP 55)



Plate 12 Blocked apertures at the west end of Unit 8, Building Group 3, taken from the south-east (DP 65)



Plate 13 South and east elevations of Building 4, taken from the south-east (DP 94)

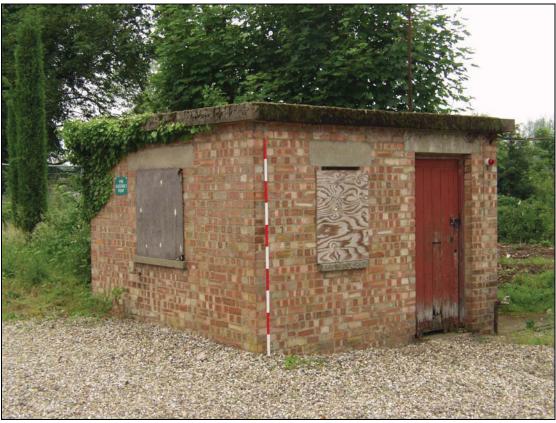


Plate 14 South and east elevations of Building 5, taken from the south-east (DP 95)

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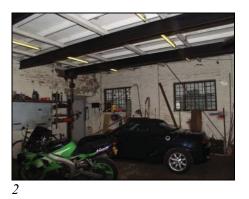
Room 1, Building 2 showing inserted floor, taken from the north-east



Room 3, Building 2, taken from the north-east



Office within lean-to at rear of Room 1, Building 2, taken from the north-east



Room 1, Building 2, taken from the south-east



Room 6, Building 2, taken from the north-east



Room 2, Building 2 showing remnant of chimney flue from coal fired boiler, taken from the southwest



Roof above Room 2, Building 2, taken from the south-west



Room 2, Building 2, taken from the south-west



Floor above Room 4, Building 2, taken from the south-west



Room 4, Building 2, taken from the north-east



Room 4, Building 2 showing stair to upper floor, taken from the south-west



Stop valve above Room 4, Building 2, taken from the west



Modern tank in Room 5, Building 2, taken from the north



Roof above Room 5, Building 2, taken from the north-east



Room 4, Building 2, taken from the north



East elevation of Building 2, taken from the east



North elevation of Building 2, taken from the north-west



West elevation of Building 2, taken from the west



21

South elevation of Building 2, taken from the south



South elevation of Building 2, taken from the south-west



23



24

North and east elevations of Building Group 3, taken from the north-east north-west

North and west elevations of Building Group 3, taken from the



26

West elevation of Building Group 3, taken from the west

South elevation of Building Group 3, taken from the south-west



South elevation of Building Group 3, taken from the south-east



East elevation of Building Group 3, taken from the east



East elevation of Building Group 3, taken from the east



Room 6, Building 2, taken from the south-west



North and west elevations of Building Group 3, taken from the north-west



Unit 1, Building Group 3, taken from the north-east



Unit 1, Building Group 3, taken from the west



Roof above Unit 4, Building Group 3, taken from the northwest



Unit 3, Building Group 3, taken from the south-west



Unit 4, Building Group 3, taken from the east



Office within lean-to unit at the rear of Unit 4, Building Group 3, taken from the south-east



Unit 6, Building Group 3, taken from the south-west



Unit 6, Building Group 3, taken from the north-west



Lean-to unit at the rear of Unit 6, Building Group 3, taken from the west



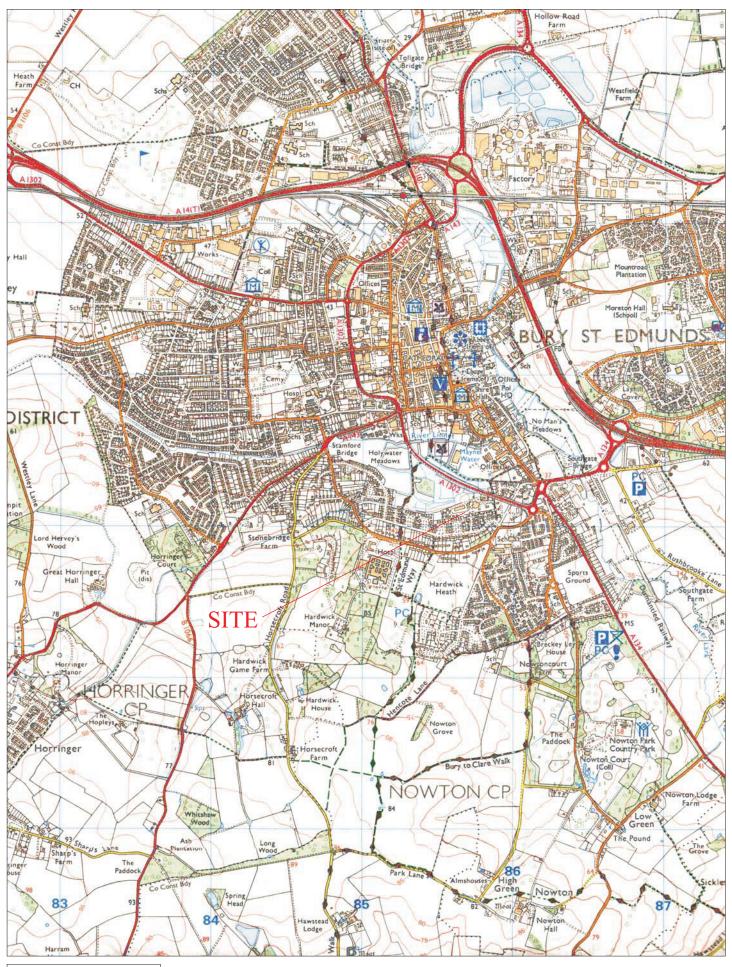


Roof above Unit 6, Building Group 3, taken from the northeast



Unit 2, Building Group 3, taken from the north-east





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Fig. 1 Site location plan
Scale 1:25,000



Archaeological Solutions Ltd
Fig. 2 Detailed site location
Scale 1:2000 at A4

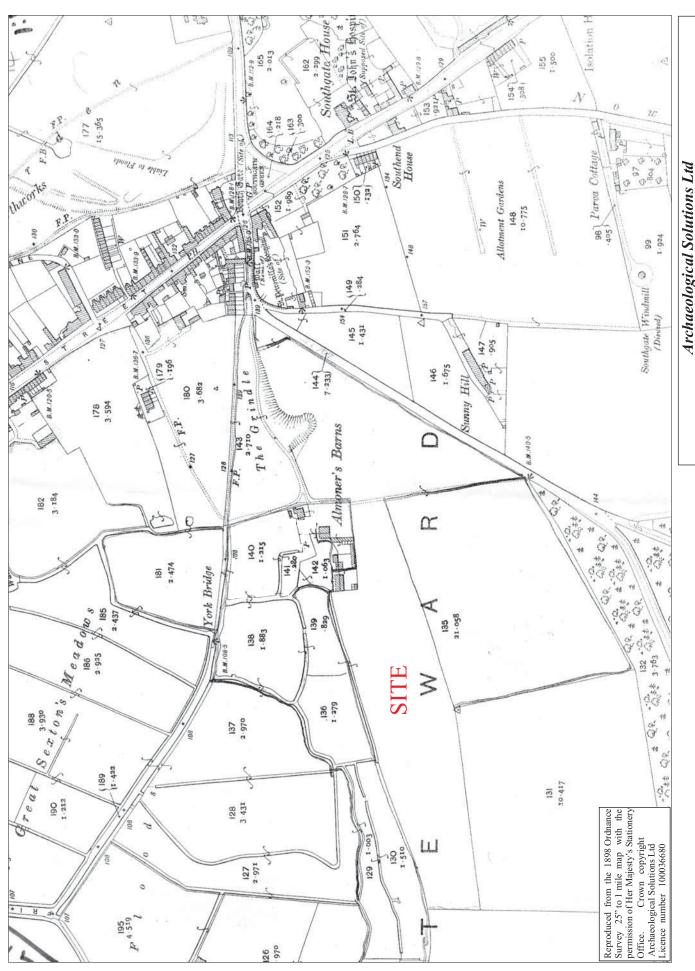


Fig. 3 Reproduced from the 1904 OS map
Reduced from scale 25" to 1 mile

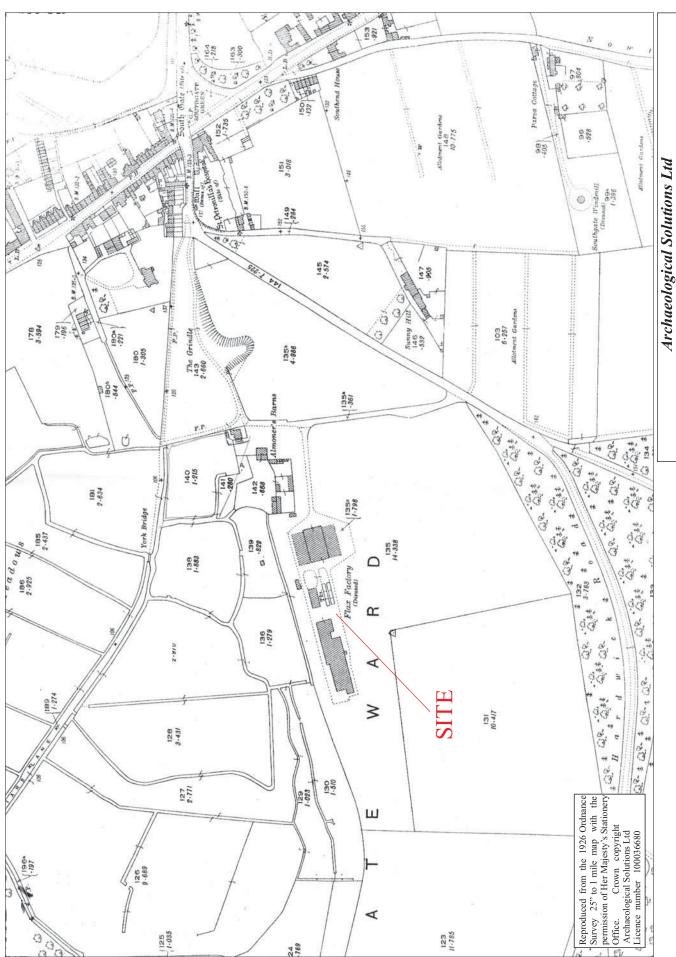
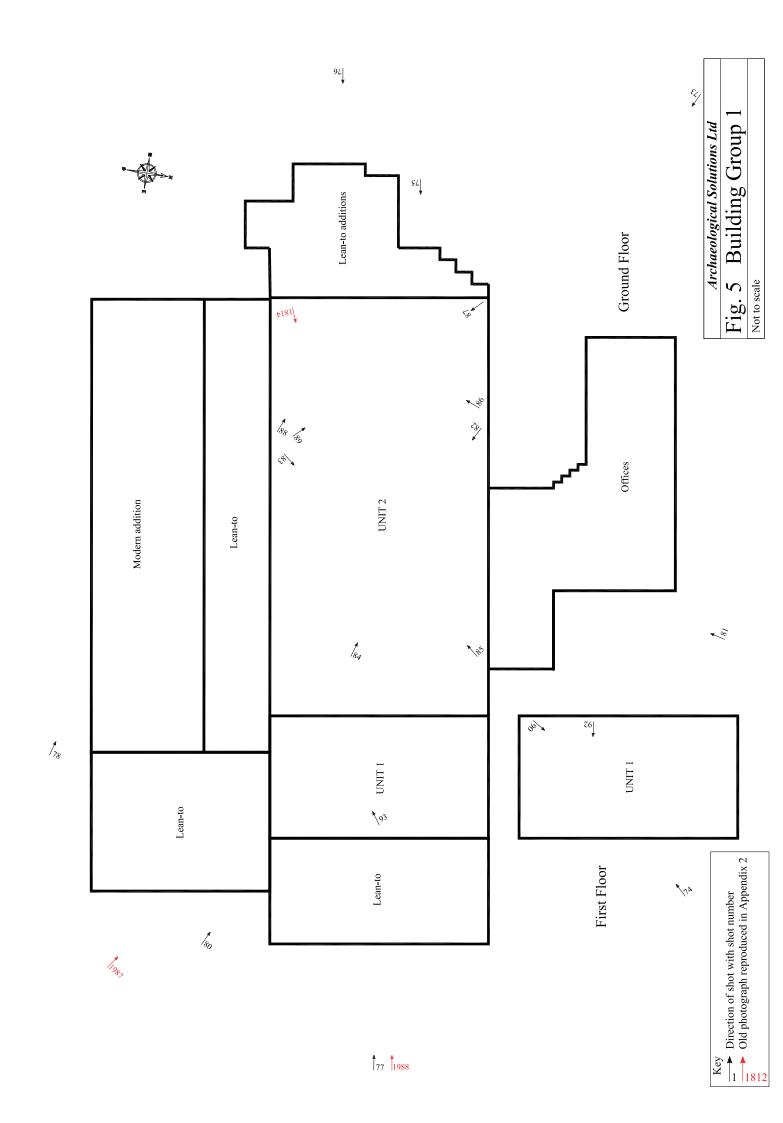
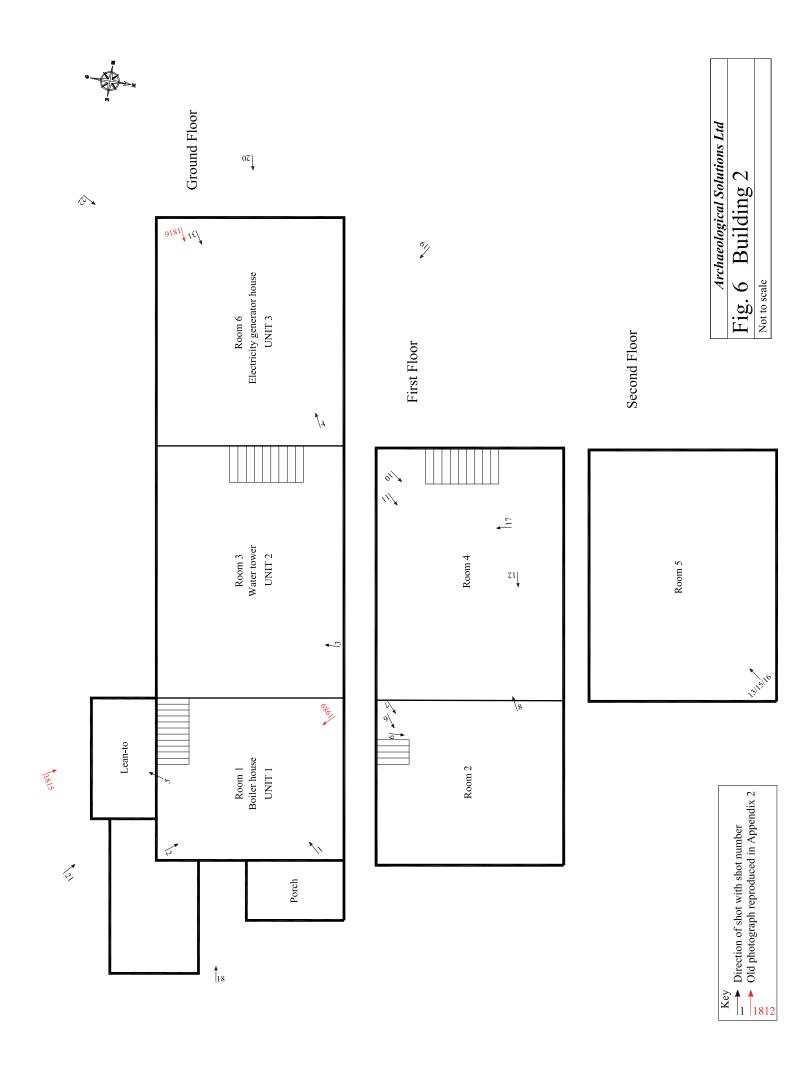


Fig. 4 Reproduced from the 1926 OS map
Scale reduced from 25 to 1 mile





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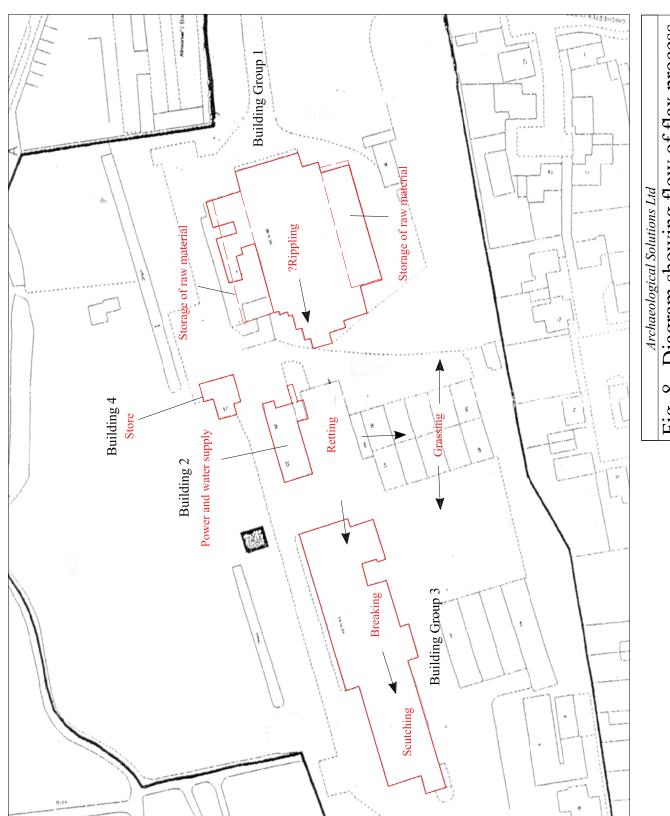


Fig. 8 Diagram showing flow of flax process Scale 1:1000 at A4