Wessex Archaeology

St Côme de Fresné, Arromanches, France

Report On An Archaeological Evaluation And An Assessment Of The Results

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ST CÔME DE FRESNÉ, ARROMANCHES, NORMANDY, FRANCE.

REPORT ON AN ARCHAEOLOGICAL EVALUATION AND AN ASSESSMENT OF THE RESULTS

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Summary

Wessex Archaeology was commissioned by Videotext Communications Ltd to undertake a programme of archaeological recording and post-excavation work on an archaeological evaluation undertaken by Channel 4's 'Time Team' on two sites close to St Côme de Fresné, Arromanches, Normandy, centred on NGR NH 385.7/1185.6 (Puits d'Herode) and 386.1/1185.0 (Point 54) (Figure 1).

The aim of this exercise was to investigate two of the intended objectives of the 1st Battalion of the Dorset Regiment on D-Day - the positions known as Point 54 and Puits d'Herode as part of a programme for the 60th anniversary of the D-Day landings. The main aim of these archaeological investigations was to examine these fortified positions in order to establish whether there was any evidence for why they proved to be better defended than the 1st Dorsets had been led to believe, and to establish whether the Allied intelligence supplied to the 1st Dorsets was inadequate in its assessment of the German defences in this area.

Trenching and survey at Point 54 revealed a heavily defended complex of trenches, bunkers machine gun nests and a circular earthwork, thought likely to be an anti-tank gun position. A metal detector survey of the complex revealed evidence for the fight for the complex in the form of both live and spent ammunition. Further evidence was found by metal detectors to the south east of Point 54, where a single small trench uncovered a cache of both live and practice ammunition, along with items of personal equipment. In total, over 1500 objects were recovered. This was probably buried some time after the capture of the area, and possibly after the war was over.

Geophysical survey at Puits d'Herode was successful in identifying a number of features of interest, including elements of the defensive circuit, possible underground bunkers and a large anomaly at the eastern edge of the Site. Trial trenching confirmed the location of the defensive trenches, as well as the position of another bunker, along with an access trench and escape hatch in a concrete cover. One geophysical anomaly, which did not match any of the features identified on Allied reconnaissance air photographs was investigated, and identified as a layer of thin wire mesh, lying just beneath the modern topsoil. This was probably lain to provide a firm footing for vehicles during the war or in the post-war period.

Two trenches were targeted on the large geophysical anomaly on the eastern edge of the Puits d'Herode site. Aerial photographs taken just prior to the invasion show a concrete structure under construction, possibly a defensive bunker. The trenching revealed the foundations of a large concrete bunker. Detailed studies of the aerial photographs indicate that this was probably intended to house a 75mm anti-tank gun. It was incomplete at the time of the invasion, and was demolished after its capture.

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The assistance and enthusiastic support received during the project from the villagers of St Côme de Fresné and Arromanches, and in particular the respective mayors of each community (M. François Lopez and M. Jardin) and the landowners M. Michel Guilbert, M. Bernard Noury and M. Hubert Martragny. Thanks are also due to the Caen Bomb Disposal Unit and the head of their standby unit M. Serge Olive for their assistance with dealing with the live ordnance uncovered during the course of the project.

The evaluation strategy was developed by Francis Pryor, director of excavations on behalf of Time Team, in consultation with Major Tim Saunders, and all fieldwork undertaken by Time Team's retained excavators with help from Catherine Edwards, Lorna Dadds, Ed Richardson and Louise Ord. The on-site recording was undertaken and co-ordinated by Nicholas Cooke, assisted by Steve Thompson, both of Wessex Archaeology. The finds were processed on-site by Steve Thompson.

The geophysical survey was conducted by John Gater, Chris Gaffney and Jimmy Adcock from GSB Prospection Limited. The field survey was undertaken by Dr Henry Chapman, University of Hull.

Wessex Archaeology co-ordinated the post excavation programme. This report was compiled by Nicholas Cooke. Specialist work and reporting was undertaken by Lorraine Mepham and Steve Thompson (finds). The illustrations were prepared by Linda Coleman. The project was managed on behalf of Wessex Archaeology by Nicholas Cooke.

The input of Michael Brennen, veteran of the 1st Dorsets, who landed on Gold Beach on D-Day, and who fought at Puits d'Herode was greatly valued.

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1 INTRODUCTION

1.1 Project Background

1.1.1 Wessex Archaeology was commissioned by Videotext Communications Ltd to undertake a programme of archaeological recording and post-excavation work on an archaeological evaluation undertaken by Channel 4's 'Time Team' on two sites close to St Côme de Fresné, Arromanches, Normandy, centred on Lambert Ref 385.7/1185.6 (Puits d'Herode) and 386.1/1185.0 (Point 54) (Figure 1).

1.1.2 The allied landings in Normandy in June 1944 represented a major change in the course of Second World War. Large numbers of Allied Troops had been amassed in the South of England in preparation for this invasion, the purpose of which was to enable the liberation of France and the Low Countries from German and Vichy rule and to provide another platform for the invasion of Germany. The first troops came ashore on D-Day, the 6th June 1944. They met stiff initial resistance, and in some cases took heavy casualties, before capturing a sufficiently large beachhead to allow further troops to be landed. This archaeological evaluation was undertaken as part of a television programme focussing on these landings as part of the commemorations of the 60th anniversary of D-Day.

1.1.3 Point 54 lies in a wooded area at the top of a hill to the south of St Côme de Fresné, and was known to the Germans as WN40a. This is approached by a former bridle path bordered by trees leading south from St Côme de Fresné, and by a small track approaching from the east, and is surrounded by agricultural fields. A number of earthworks relating to the wartime defences are still visible within the wood. At the time of D-Day, it contained a series of defensive positions, taking advantage of the fine views it affords over the coastal plain.

1.1.4 Puits d'Herode (which translates as 'Herod's Well') lies to the west of St Côme de Fresné. At the time of D-Day, it was a heavily fortified position, known to Allied intelligence as WN40, occupied by a company headquarters, protected by a series of defensive trenches and a substantial barbed wire fence. It too occupied a significant vantage point, on the eastern slope of a

ridge overlooking the coastal plain. Aerial photographs taken close to the time of the invasion show the construction of a large building or structure towards the eastern edge of the enclosure. It is unclear what this structure was, and establishing this was one of the objectives of the exercise.

1.1.5 Both of these strategic positions formed part of the objectives assigned to the Dorset Regiment, who landed on Gold Beach on the morning of June 6th (to the east of Asnelles-sur-mer). The purpose of the evaluation exercise was to examine the strength of the defences at each site in order to establish why they proved a more formidable obstacle than had been expected.

1.1.6 This report documents the results of archaeological survey and evaluation undertaken by Time Team, and presents an assessment of the results of these works, along with recommendations for further analysis and dissemination.

1.2 Geology and Topography

1.2.1 The geology of the area is very mixed, and comprises several geological bases. The Geological map shows that the local area contains the following deposits (Service géologique national, 2000. Bayeux-Courseulles-sur-Mer, 1:50 000) :

- Carbonated loess (loess with fresh water mollusc shells) *Weichselien Loess carbonaté (formations éoliennes) OE*
- Residual clay-with-flints on bathonian limestone *Argiles résiduelles à silex sur calcaire bathonien (Formations d'altération) RS/J3*
- Limestone (with compressed microfauna) *Formation des Calcaires à spongiaires (sommet du Bajocien supérieur - Mésozoïque, jurassique moyen - Dogger) j2Cs*
- Creuilly limestone *Formation du Calcaire de Creully (calcaires bioclastiques à accidents siliceux et à stratifications obliques ; Bathonien moyen - Mésozoïque, jurassique moyen - Dogger) j3Cr*
- Port-en-Bessin marls *Formation des Marnes de Port-en-Bessin (Bathonien inférieur à moyen basal - Mésozoïque, jurassique moyen - Dogger) j3PB*

1.2.2 The site known as Point 54 lies some 250m to the south south west of the hamlet of Le Carrefour and 150m to the west of the small hamlet of Le Buhot. It occupies the highest point on a small peninsula of higher ground projecting out from the large north south ridge known as *La Masse de Fresné*. It lies on an outcrop of Creuilly limestone. Point 54 itself takes its name from a nearby survey point, situated at 54m above sea level. The site investigated comprised a roughly triangular piece of woodland, within which lie the remains of a stone built windmill. Rough single lane tracks approach this point from both Le Carrefour and Le Buhot. It is surrounded by agricultural fields, predominantly used for arable farming

1.2.3 Puits d'Herode lies some 250m to the west of Le Carrefour, on a steep east-facing slope astride the road leading to Arromanches-les-Bains. It lies on the upper eastern slopes of *La Masse de Fresné* and has commanding views over the coastal plain and the river valley to the east. It occupies land within three fields, two to the south of the road and a third to the north. All of these fields are laid to pasture, and are surrounded by agricultural land. It lies on deposits of carbonated loess, which overlie deposits of Creuilly limestone.

1.2.4 The hydrography of the area is dominated by the river Gronde, which lies within a very broad river valley aligned roughly south west – north east which flows in to the sea at Asnelles-sur-mer. *La Masse de Fresné* forms the western extent of this river valley. Because of this, Point 54 and Puits d'Herode both occupied crucial strategic points overlooking this wide valley, which provided a natural route inland for any invasion force.

1.3 Historical background

1.3.1 Much of the following section has been dawn from a single source – Saunders, 2002b. Where other sources have been used they are mentioned in text.

1.3.2 The 1st Battalion of the Dorset Regiment (the 1st Dorsets) who landed on the 'Jig' Sector of 'Gold' Beach on D-Day formed part of 231st 'Malta' Brigade, which provided one of the most experienced amphibious landing units in the invasion force (see Table 1). Having garrisoned the island of Malta throughout its siege, they had then led the 8th Army invasion of first Sicily and then Italy. On their return to Britain they were assigned to the 50th Northumbrian Division, and set about training for D-Day.

Table 1. Order of Battle of 231 Infantry Brigade (6th June 1944)

Order of Battle on D-Day (abridged after Forty, 1998, 348)			
21st Army Group **(all British and Canadian Forces between 6th June 1944 and 31st August 1944** included			
	50th (Northumbrian) Division Major General D. A. H. Graham comprised		
69th Brigade	**231st Brigade** Order of Battle **2nd Battalion Devonshire Regiment** **1st Battalion Hampshire Regiment** **1st Battalion Dorset Regiment** With detachments from **90th Field Regiment Royal Artillery**	**151st Brigade**	**Divisional Troops**

288th Battery Royal Artillery **2nd Battalion Cheshire Regiment** **Nottinghamshire (Sherwood Rangers) Yeomanry** (on detachment from 8 Armoured Brigade) **147th (Essex Yeomanry) Field Regiment Royal Artillery** (on detachment from 8 Armoured Brigade) **B Squadron Westminster Dragoons** (on detachment from 79th Armoured Division) **82nd Squadron, 6th Assault Royal Engineers** (on detachment from 79th Armoured Division) **Combined Operations Troops** (including Q Commando Royal Navy and 47th Commando Royal Marines)

1.3.3 Their allocated task on D-Day was an extremely difficult one. 231 Brigade was to land on the western end of Gold Beach, in 'Jig' sector, with 69 Infantry Brigade immediately to their east. The immediate task for these two brigades was to seize a beachhead in order to allow the successful landing of 56 and 151 Infantry Brigades. This in itself was no mean feat – the beaches were fairly well defended, backed onto large areas of marshes and were overlooked by areas of high ground which would almost certainly expose them to heavy direct and indirect artillery fire. As a result of the appointment of Fieldmarshall Rommel as co-ordinator of the defences of the Atlantic coast, the invasion defences of the area had seen significant improvements in the weeks and months up to D-Day.

1.3.4 As part of their first phase of operations on D-Day, 231 Brigade's tasks included creating a bridgehead encompassing Asnelles-sur-mer, Le Hamel, Buhot and Point 54. The second phase of the operation was to expand this bridgehead further, capturing Ryes, La Roserie, Longues and Arromanches-les-Bains. The effect of Rommel's work had been to provide a 'crust' of well fortified mutually supporting positions on the invasion beaches themselves, combining a mixture of beach obstacles, minefields, static infantry and

artillery/anti-tank defences and supporting artillery (Wilt, 2004, 109 – 115). Until shortly before the invasion, these defences had been manned by the troops of the 716th Coastal Division. This unit was made up of a mixture of old, young and infirm soldiers, poorly equipped and trained, who were best suited to defending static defences. However, on 15th March, shortly before the invasion, the defences in the area were significantly strengthened by the newly organised and trained 352nd Infantry Division. These were 'field grade' troops, and presented a far more significant obstacle. Both Point 54 and Puits d'Herode appear to have lain within the sector of this new unit. The effect that this unit had can be seen by comparing two aerial photographs of the Puits d'Herode and Point 54 area.

1.3.5 The first of these, taken on the 20th March 1944, shortly after the 352nd division took over, shows the defences at Puits d'Herode (Plate 1). These comprise a compete circuit of defensive trenches and bunkers and a large building defended by earthen bunds. The whole is surrounded by a band of barbed wire defences. There is no evidence for any activity in the vicinity of Point 54, or in the area between the two.

1.3.6 The second photograph, taken only two months later, on 4th June 1944, shows significant changes (Plate 2). A mass of communications trenches had been dug running out from Puits d'Herode to other defensive positions in the area. Construction was also under way on a new concrete structure to the north of the bunded building. Although the woods covering Point 54 make it difficult to identify any positions within this area, a recently dug trench for a communications cable leads directly from Puits d'Herode to the triangular wood, whilst the area to the south west of Point 54 shows a complex of newly dug trenches, and further traces of new trenches can be seen in the wood to the south of Puits d'Herode.

1.3.7 After a heavy naval and air bombardment, the assault on Gold Beach began at 07.25 am on 6th June 1944. Immediately, the attacking troops ran into trouble. The defences had stood up well to the bombardment, and Le Hamel in particular had seen little heavy damage. A well sited 77 mm anti-tank gun here in a concrete emplacement enfilading the beach, caused heavy casualties amongst the tanks of the first assault wave. The heavy seas meant that the amphibious tanks due to support the landings were not launched. In addition to this, the assault craft had to halt for ten minutes on their approach to the beach in order not to run into their own naval barrage, as a result of which they drifted a mile to the east of their intended landing positions. After some heavy fighting the 1st Hampshires and 1st Dorsets took control of their section of beach. The assault troops had managed to seize or destroy the concrete beach defences. In order to meet their set objectives, it was necessary for them to turn eastwards towards Le Hamel.

1.3.8 Instead of the expected two platoons of infantry, the introduction of troops of the 352nd Infantry Division to the German line meant that Le Hamel was

defended by a full company of German troops, who were well dug in and put up strong resistance. In this they were assisted by the presence of the anti-tank gun in the bunker, which kept allied armoured support out of range. Eventually, it was only a flanking attack by companies of the 1st Hampshires and the 1st Dorsets, assisted by the newly arrived second wave, in the form of the 2nd Devons and a number of the amphibious tanks that allowed British troops to enter Le Hamel. It was not until 4 pm however that Le Hamel East was finally in allied hands, whilst fighting in Le Hamel West continued until 8 pm.

1.3.9 While this was taking place, 1st Dorsets had managed to extricate themselves from the beaches and began their advance inland towards Point 54 and Puits d'Herode. The presence of 352nd Infantry Division amongst the defenders appears either to have been missed by Allied Intelligence – no mention is made of defences in the vicinity whilst Puits d'Herode was regarded as: *'An infantry platoon position centred on an Arty OP, which probably connects with the artillery troop position* (referring to a 4 gun battery to the south west). *The position is surrounded by a broad belt of wire sited approximately 100 yards from the trenches. There are three small trench systems centring on a large hut. It is thought that Arromanches cannot be seen from this position, although it is on the high ground, and that the main task is to protect the OP from the NE and East.'* (Allied Intelligence Briefing, cited in Saunders, 2002b, 101)

1.3.10 In order to reach their objectives, the 1st Dorset first had to fight their way through southern Asnelles-sur-mer, where a platoon of German troops was dug in in strength. This was achieved by 13 and 15 platoons of C company, in some fierce fighting in which Corporal Carter of 15 Platoon was awarded a Military Medal - he led his section despite being wounded, and then took command of his platoon when his platoon commander and the platoon sergeant were both wounded.

1.3.11 By 11.30 am, the majority of the 1st Dorsets were advancing across the open ground towards Buhot. On the right flank of the advance, C company crossed the road from St Come de Fresné and pressed on towards Point 54. As they began to climb the hill, they came under heavy fire from Point 54. Lieutenant Hamilton, leading them, was wounded. Corporal Carter once more took command of the platoon and organised covering fire for 13 platoon, who made attempts to fight their way up the wooded track from Le Buhot to Point 54 (Plate 3). Eventually, Corporal Sam Thompson (who had been awarded a Military Medal for bravery whilst fighting in Italy) and a rifleman from his section fought their way up this track using a ditch and hedgerow for cover, and fought their way into the enemy position. The remains of the platoon supported them in taking the defensive position by 2 pm. For his actions on the day, Corporal Thompson was awarded the Distinguished Combat Metal.

1.3.12 The War Diary of the 1st Dorsets for the day records:

"1400. C Coy in possession of Pt 54, after stiffer opposition than anticipated. 7 Germans were killed, and 2 officers and 15 Ors (ordinary ranks) were made prisoner. C Coy took up positions to support D Coy's attack on Puits d'Herode. D Coy pushing south through Buhot surprised and captured a coy of German pioneers with their transport."

1.3.13 The unexpected strength of the position to Point 54 can be put down to a combination of factors. Firstly, it lay within a heavily wooded area, and the trenches in the woods were not identified on Allied aerial photographs. It was also held by the field grade troops of 1/916 Infantry Regiment, part of the 352nd Infantry Division, rather than the coastal grade troops expected.

1.3.14 At around 2pm, Lieutenant Colonel Norie arrived at Point 54. He organised C company of the 1st Dorsets to provide covering fire for their colleagues from D company, who would move along the ridge towards Puits d'Herode. In order to undertake this manoeuvre, D company would need to capture a defended wood (marked as WN 40b on Allied intelligence maps) which lay between the two. This too proved to be well defended, and 18 Platoon, in the head of this attack, came under heavy fire, and took a number of casualties, including their platoon commander and sergeant. Corporal Hawkins took command of the troop and led them to the relative safety of the tree line. He left them there whilst he scouted the enemy positions, before flanking the enemy and taking the position. For his actions Corporal Hawkins was awarded a Military Medal. The captured positions at WN 40b included an 81 mm mortar position, a 'Spandau' position and an anti-tank gun position, complete with anti-tank gun.

1.3.15 Having taken the wood at WN 40b, D Company found itself unable to advance further on Puits d'Herode, being beaten back by well directed machine gun fire. Fortunately, reinforcements arrived for the Dorsets in the form of A Company, along with the Sherman tanks of C Squadron of the Nottinghamshire (Sherwood Rangers) Yeomanry. Allied artillery support was provided by the self propelled guns of 90 Field Regiment Royal Artillery, who had finally managed to extricate themselves from the beaches.

1.3.16 The second assault on Puits d'Herode also came from the south-east, through the wood at WN 40b. C company moved to the south western edge of Wood WN 40b in order to prevent a flanking counter attack, whilst the newly arrived A company assaulted Puits d'Herode, supported by direct fire from D Company and the Sherman tanks and indirect fire from 90 Field Regiment. In order to cross the minefield, the troops used Bangalore Torpedoes to clear routes, as well as taking advantage of the cover afforded by the numerous shell holes. Despite the heavy fire support, resistance was heavy, and it was some time before all resistance was overcome. The captured German troops numbered some 40 men, and included artillery spotters for the guns at the Dorset's final objective for the day – a battery of guns sited to the south west of Puits d'Herode, marked on Allied Maps as WN 41.

1.3.17 Whilst this assault on Puits d'Herode was taking place, C Company fought off a determined counter attack from the south west, in the direction of WN 41. Having taken Puits d'Herode, the Dorsets, once more supported by the Shermans of the Nottinghamshire (Sherwood Rangers) Yeomanry. After a heavy bombardment, the Dorsets began their assault, only to find that the Germans had abandoned their positions, leaving their guns and much equipment behind them. It later emerged that the artillery battery had run out of ammunition at around 4 pm, and that the overwhelming Allied air support meant that the Germans had been neither able to resupply or remove the guns.

1.3.18 By the end of the day, the 1st Dorsets had achieved all of their objectives. The opposition they encountered throughout the day had however been greater than they expected, largely due to the presence of troops of the 352nd Division in well-prepared defensive positions. They had taken many casualties. The unit's War Diary for June 1st puts the battalion strength at 41 officers and 848 other ranks. By the end of D-Day, they had lost 14 officers and 114 men killed wounded or missing in action – nearly 15% of their original strength, with a higher proportion of the officers killed or wounded. Indeed, in two of the crucial actions of the day – the capture of Point 54 and the attack on wood WN 40b – injuries to officers had meant that junior NCO's had to take command of both attacks at crucial moments. It is a testimony to the courage and skill of the two men involved that they were able to complete both attacks successfully.

2 METHODS

2.1 Introduction

2.1.1 A project design for the work was compiled and provided by Videotext Communications Ltd (Videotext Communications 2004). This contains a detailed description of the research aims of the project, as well as the methodologies to be employed in achieving these aims, and these are only reproduced in summary here. The archaeological works undertaken as part of the programme comprised geophysical survey, and archaeological trial trenching.

2.2 Aims and objectives

Geophysics Survey (by GSB Prospection Limited).

2.2.1 A detailed report on the Geophysics survey has been prepared by GSB Prospection Limited, and forms part of the site archive (Gaffney et al, 2004). Its aims and objectives are included here in summary form. Although geophysics has been used in past studies to identify modern battlefield remains, this has generally been with the intention of identifying areas of modern disturbance which could be avoided by targeted excavations. Rarely has geophysical survey been used to identify modern battlefield remains for investigation.

Excavation.

2.2.2 The stated aim of this is project was to evaluate the nature and condition of the defences at Puits d'Herode and Point 54 and to attempt to interpret them in the context of the D-Day landings (Videotext Communications, 2004, 4 - 5). The project offered the opportunity to use a number of archaeological techniques to examine the archaeological potential of the area. The main aims were identified in the Project Design (Videotext Communications, 2004, 4) for the work.

2.2.3 Very little formal archaeological investigation has taken place in this area, and this project aimed to add to our understanding of the sequence of events on D-Day and to ask questions about what archaeological techniques can elicit about modern historical sites. It was hoped that, by conducting a small-scale investigation, it might be possible to gain a greater understanding of the exact nature of these archaeological remains and extrapolate their historical relevance. This involved using archaeology in conjunction with the wealth of documentary evidence, as well as eyewitness accounts.

2.2.4 The main aim of the project was to examine the fortified positions at Puits d'Herode and Point 54 in order to establish whether there was any evidence for why they proved to be better defended than the 1st Dorsets had been led to

believe, and to establish whether the Allied intelligence supplied to the 1st Dorsets was inadequate in its assessment of the German defences in this area.

2.2.5 A number of specific objectives were also set out in the Project Design. These included:

- To determine the extent and nature of the defences at Point 54, and establish if possible when they were constructed.
- To test the hypothesis that Puits d'Herode was the site of heavily fortified German defence investigating its defence systems and stratigraphy relating to its previous use as a holiday and refugee camp prior to Second World War.
- To evaluate the nature of trench systems and bunkers where applicable, to determine their number, depth and construction.
- To determine whether the site was important for telecommunications.
- To ascertain if there are remains of the "house" at Puits d'Herode visible in aerial reconnaissance photographs, and what the structure was for

2.2.6 The project design stipulated that the techniques to be used in this investigation would include geophysical survey and trial trenching.

2.3 Geophysics

2.3.1 The geophysical survey was confined to Puits d'Herode – the trench system in Point 54 still survived as low earthworks. The geophysical survey undertaken at Puits d'Herode used a number of techniques – notably magnetic gradiometry, twin probe resistance and ground penetrating radar, of which the magnetic technique proved most useful (Gaffney *et al*, 2004, 121). The survey was undertaken using a Bartington Grad 601 – 2 gradiometer, with data taken at 0.25m intervals on 1m transects (Bartington and Chapman, 2004). Smaller areas were subject to resistance survey using a Geoscan RM15 instrument, logging readings at 1m x 1m (Walker, 2000) and specific targets were investigated using a Pulse Ekko 1000 radar system with a 22MHz antenna (Sensors and Software Inc, 1996).

2.3.2 Two fields at Puits d'Herode were subject to geophysical survey, covering the eastern half of the defensive complex. The survey covered an area of some 1.75 ha. Although conditions for the survey were good, the clay soils on the site had a significantly detrimental effect on both the resistance survey and the ground penetrating radar, and the results presented below (3.2) are confined to the magnetic data.

2.4 Fieldwork methods

2.4.1 Twelve trenches were excavated as part of the evaluation exercise. The size of these trenches varied in length and width according to their location and

purpose. The location of the trenches was determined by Francis Pryor in consultation with associated specialists and guided by the results of the geophysical survey in order to answer specific aims and objectives of the project design.

2.4.2 Most of the trenches were excavated using a JCB Wheeled excavator equipped with a mechanical backhoe fitted with a toothless ditching bucket. All trenches were scanned in advance of excavation with a metal detector in order to identify possible unexploded ordnance. All machine work was undertaken under constant archaeological supervision and ceased at the identification of significant archaeological deposits, or where natural deposits were encountered. All trenches were subsequently cleaned by hand and archaeological deposits were planned, recorded and representative samples excavated by hand.

2.4.3 All archaeological deposits were recorded using Wessex Archaeology's *pro forma* recording sheets with a unique numbering system for individual contexts, drawings and samples. Trenches were located using a Trimble Real Time Differential GPS survey system. All archaeological features and deposits were planned at 1:20, and all sections were drawn at 1:10. All features and deposits were photographed, using both digital and manual cameras (black and white and colour slide).

2.4.4 A sufficient sample of all deposits was examined to allow the resolution of the principal questions outlined in the aims and objectives above. Other deposits were recorded and preserved *in situ* but not excavated.

2.4.5 The work was carried out over 5th – 8th April, 2004. All trenches were metal detected prior to and during excavation, as was al of the spoil removed. At the completion of the work all trenches were reinstated using the excavated spoil from the trenches in accordance with the requirements of the landowners.

3 RESULTS

3.1 Introduction

3.1.1 This section reports on the results of the geophysical survey and the trenching undertaken as part of the 'Time Team' investigations on the Site. Details of individual excavated contexts and features, a full geophysical survey report (Gaffney et al, 2004) and results of artefact analysis are retained in archive.

3.2 Geophysical survey (by GSB Prospection Limited)

Gradiometer Survey (Figure 3)

3.2.1 A number of magnetic anomalies were identified in the western area of the survey. These include the line of the circuit of defensive trenches in this area (A), and a short stretch of trench (B) linking this to two large anomalies (C and D). The latter of these coincides with a concrete slab visible on the ground surface, and appears to mark the entrance to an underground bunker. The strong anomaly identified to the east of this (E) coincides with the location of a modern metal water trough, and can be discounted.

3.2.2 The south-eastern stretch of the defensive circuit of trenches was also identified (F). The interrupted nature of this anomaly is likely to reflect the varied nature of the backfill of the trenches. Two denser anomalies (G and H) within this system may represent bunker structures. A strong ferrous anomaly identified running diagonally across the field was initially difficult to interpret – there was no evidence for an old field boundary or trench or tunnel running in this direction.

3.2.3 Two large anomalies, the strongest of the survey, lie at J and K. The anomaly at J coincides with a large structure identified from aerial photographs, and trenched as part of this exercise. Aerial photographs show a defensive trench located in the vicinity of (K). A linear anomaly (L) appears to be associated with the anomaly (K), and may represent a pipe or drain leading to or from it. The two areas of increased magnetism at (M) may represent the results of allied naval shelling, bombing or even the shelling of the site by the 25-pounder field guns of the Royal Artillery in the struggle to capture the position.

3.3 Excavation at Point 54

3.3.1 Five trenches were excavated within the defensive complex at Point 54. A rapid earthwork survey was also undertaken of the surviving earthworks. This revealed that the defences comprised a ring of trenches matching the boundaries of the wood, each fronted by a low bank. Within this circuit lay three rectangular bunkers, each approached by an access trench. A large circular earthwork in the centre of the position was probably constructed to hold an artillery piece, possibly in the form of an anti-tank gun. Two further circular positions were noted – one on the north-eastern flank, and a second on the western edge of the defences. These probably mark the position of light machine guns, although the latter lies close to the point at which the newly laid communications cable trench would have accessed Point 54, and may mark a communications post. The location of the excavation trenches was largely determined by the position of surviving earthworks. The results of these trenches are described here.

Trench 1 (Figure 4)

3.3.2 Trench 1 was targeted on a circular earthwork in the woods on Point 54 (Plate 4). This lay in the centre of the triangular woodland, and commanded spectacular views over Asnelles and Le Buhot. The circular earthwork measured some 5.5m internally. It comprised a shallow scoop (106) surrounded by a bank some 0.6m high. Topsoil (layer 101) sealed three successive dumps of bank material (layers 102, 103 and 104) lying directly on the 1940's land surface (105), which overlay the natural drift geology (107).

3.3.3 The rear of the circular emplacement was accessed by a shallow sloping ramp, whilst a dog legged bank on the north western side of the emplacement probably acted as an ammunition cache or crew shelter. A low trench runs south from the rear of the enclosure to the trenches forming the defensive circuit. This may mark a shallow trench dug to allow the crew to access the gun emplacement from the nearby bunker under cover.

3.3.4 The bank of the gun emplacement has undoubtedly seen some erosion since its abandonment. Originally it would have been designed to provide protection for a field gun – probably a 75mm or 88mm anti-tank gun mounted on a low wheeled carriage. The 75mm anti-tank gun had a maximum range of some 9,800 metres, although its effective range was somewhat less, and the 88mm anti-tank gun had an even greater range (Kauffmann and Jurga, 2002, 80). Both were feared by allied tank crews, as both were capable of knocking out any of the allied tanks at range. Had this gun emplacement been equipped with an anti-tank gun, it would have been well sited to wreak havoc on the flanking attack on Le Hamel, and significantly hampered the allied armour advancing off the beaches.

3.3.5 The accounts of the capture of Point 54 do not mention a gun emplacement, presumably indicating that the position was not manned or equipped. Although it is not clear where all of the anti-tank guns which engaged the allied armour on the day were sited, no evidence was recovered to indicate that this position was ever used – the only evidence recovered from this trench was confined to a few nails and fragments of barbed wire recovered from the topsoil.

Trench 2 (Figure 4)

3.3.6 Trench 2 lay to the north west of Trench 1, and was targeted on a deep hollow forming part of the system of earthworks on the western side of the woods. Excavation established that it marked the site of a German bunker or shelter. The cut for this, 205, was dug into the solid limestone (layer 206), and was not bottomed. The trench was excavated to a depth of some 3.6m. The excavated sequence largely comprised material dumped into the hollow after the war (layer 202). This sealed a number of large degraded timbers (203), which appear to represent the collapsed roof supports of the bunker.

This in turn sealed a mixed layer of material derived from erosion of the sides of the feature and the surrounding area prior to the collapse of the roof timbers.

3.3.7 The depth and location of this bunker indicates that it was intended for use as a shelter or command post and not as a defensive position. Unfortunately, because of its depth, it was not possible to fully excavate this feature. It was probably entered from the south, where a deep trench runs up to the edge of the bunker cut. It may also have had a second entrance or hatch, possibly built in to the roof of the structure. This would have provided comfortable accommodation for the troops within it, and also provided good cover from allied air attack and bombardment (Rottman, 2004, 37). Very little material was recovered from this trench to further identify its function, although an unidentified iron object and an iron buckle were recovered from layer 202, the material sealing the collapse of the bunker roof.

Trench 3 (Figure 4)

3.3.8 Trench 3 was a narrow trench targeted on another rectangular depression in the wood. This lay at the eastern end of the defensive position. The trench was some 4.70m long and 0.6m wide and was hand excavated. Excavation confirmed that this was indeed the site of a bunker or shelter, flanked by two defensive trenches. Once again, the depth of the feature meant that it was not possible to safely excavate it completely in the time available. The topsoil in the trench (301) sealed the remains of two low banks associated with the construction of the trenches to the north and south (cuts 313 and 314). These trenches were not excavated fully, but limited excavation indicated that both contained undifferentiated layers of trample and post war accumulations of material (layer 315 in cut 313 and layers 306 and 307). The southern bank associated with 313 comprised three separate dump episodes (layers 302, 303 and 304), whilst the northern comprised layers 308 and 309.

3.3.9 Both of these banks were cut by the construction cut for the bunker, 312, which was clearly constructed at a later date. This had steep, almost vertical sides. A thick upper fill was excavated – layer 310. This probably represents material accumulating within the cut after the collapse of the roof timbers. This sealed an earlier dumped deposit – layer 311 – which probably represents material used to seal the bunker roof during the war. The timbers for the roof were identified sealed by this deposit against the southern edge of the cut. The only find recovered during the excavation of this trench was a single French 'Lebel' bullet casing from layer 301, the topsoil. It is not clear whether this was lost during the struggle for the defences in 1944.

Trench 4 (Figure 4)

3.3.10 Trench 4 was a small trench, only 2.2m long and 1.1m wide. It was excavated to investigate the southern trench and bank close to trench 3. This established that the defences comprised a shallow, roughly flat-bottomed, cut (403) fronted by a low mounded bank. This contained two distinct fills –

topsoil 401 and layer 402, a deliberate backfill, from which a number of finds were recovered, including two iron pointed pickets for holding barbed wire defences in place. This probably represents a partial slighting of the trench after its capture. The small irregular cut identified in the base of this trench is likely to represent root activity cutting the underlying drift geology.

Trench 5 (Figure 4)

3.3.11 Trench 5 was targeted on the entrance trench to the third rectangular bunker at Point 54. This small trench measured 4.97m by 1m. This revealed that the steep sided cut (501) was lined with corrugated iron, and contained two slumped deposits – layers 502 and 503 – both of which had formed after the trench had gone out of use. The position of the slumped corrugated iron revetment meant that it was not possible to bottom this trench, and a decision was taken to leave this revetment *in situ*.

Unstratified finds recovered from Point 54.

3.3.12 A metal detector survey of the defences at Point 54 recovered a number of pieces of spent of ordnance, as well as a number of pieces of personal equipment. The spent ordnance included spent British .303in and 9mm rounds, and German 7.92mm and 9mm rounds. Amongst the latter were spent shell casings from a belay-fed light machine gun (either an MG 34 or an MG42 – known to the allies as the 'Spandau' after one of the factories at which they were built. Some of these were recovered from the small circular defensive position close to the north eastern edge of the field. This was almost certainly the site of a machine gun nest, and is well sited to command any approach up to Point 54 through the field to the north east or along either of the hedgelines. The distribution of these finds point to the likely foci of action. The majority of spent German ammunition was found along the line of the north-eastern and eastern defences, whilst the British ammunition showed a more widespread distribution, suggesting that the defences had been taken by force of arms. A number of spent British cartridges were also recovered from the western edge of the wood, suggesting that covering fire may have been provided from here for troops moving across the fields to the east. Other finds from Point 54 included fragments of shrapnel, including recognisable fragments of a mortar bomb as well as a number of items of personal equipment – notably a British pattern buckle, two German canteen handles and a British made 'Myau' razor (made before 1924). Some of these may have been lost after Point 54 fell into the hands of the allies.

3.4 Excavation to the South of Point 54

3.4.1 A single trench, trench 11, was excavated to the south of Point 54. This was targeted on a significant area of readings identified during a metal detector sweep of the field.

Trench 11 (Figure 4)

3.4.2 Trench 11 was a hand excavated trench, measuring a maximum area of 3m by 3m (although a wider area was topsoil stripped by machine) Excavation revealed a single feature, a small rectangular cut, the contents of which were responsible for the readings noticed by the metal detectors. This cut, 1104, was some 1.03m wide and 0.77m wide. It was 0.36m deep, and contained a single deposit – layer 1103. This comprised a cache of ammunition and equipment tightly packed into the cut.

3.4.3 Excavation revealed that the material in this cache comprised a mixture of both Allied and German ammunition and equipment (Plates 5, 6 and 7). These included two circular 'drum' magazines and two further magazines for 'Bren' guns (the standard light machine gun issued to British troops at the time of D-Day). Drum magazines were rarely used for Bren guns, although 100 round drum magazines were used when the gun was used as an Anti-Aircraft weapon (Forty, 1998, 202). The other Bren magazines recovered were the more common 29-round overhead box (See Plate 7). Further munitions recovered included the explosive head from a German 'stick grenade', large amounts of German ammunition (mainly in the form of clips of rifle ammunition still in waxed paper boxes) and significant quantities of British .303in ammunition, both loose and with belay link fastenings. Other finds included a large quantity of British practice ammunition – with wooden tips and painted red – as well as items of personal equipment such as belt fittings and a pen knife.

3.4.4 Given the mixed nature of the weaponry in the cache, along with the presence of practice ammunition, this cache is most likely to represent a clearance of munitions once the theatre of war had moved on, possibly even after the war had finished. The vast majority of the ammunition recovered from this cache (over 1500 rounds in total) was live, and was removed for disposal by members of the Caen bomb disposal unit.

3.5 Excavation at Puits d'Herode.

3.5.1 Six trenches were excavated on the Puits d'Herode site. These were targeted both on anomalies identified from aerial photographs, during the geophysics survey and on the ground. All of these trenches were machine excavated. No earthworks survive on the Puits d'Herode site, although there are some remnants of concrete structures visible above the surrounding pasture marking the location of wartime structures and emplacements.

Trench 6 (Figure 5)

3.5.2 Trench 6 was targeted on one of the trenches forming part of the northern section of the defensive circuit of the complex at Puits d'Herode. The presence of this trench is as identified on aerial photographs and confirmed by geophysical survey. The line of the trench was also visible in the

vegetation on the ground, where it was characterised by a linear concentration of nettles.

3.5.3 Excavation of the trench revealed the line of the defensive trench. On excavation, this trench (605) was shown to be some 0.90 m deep, with steep sides and a flat base. The lower fill appears to have formed over a period of time (layer 604). Some of the material recovered from this deposit probably relates to its use as a defensive feature. Some spent ammunition was recovered from this deposit. This mixed layer was sealed by a very poorly sorted dumped deposit (603), which almost certainly represents the post-war backfilling of the trench. This contained large amounts of waste material, including tin cans, glass bottles and numerous glass ampoules of clear liquid. This was sealed by a modern topsoil and subsoil (layers 601 and 602).

3.5.4 The excavation of Trench 6 confirmed the location of the defensive circuit of trenches. The depth of the feature excavated confirms that this was a defensive trench, which was probably reinforced by earthen banks. The spent ammunition recovered points to some activity in this zone of the circuit during the assault on Puits d'Herode on the afternoon of D-Day.

Trench 7 (Figure 5)

3.5.5 Trench 7 measured some 6.2m by 3.0m, and was machine excavated. It was targeted on a large geophysics anomaly. Examination of the aerial photographs of the site show a raised mound in this area, consistent with a raised earth mound covering an underground bunker. The geophysics survey indicated that this anomaly was approached by linear anomalies, possibly access trenches from both the south and north.

3.5.6 Removal of the modern topsoil (701) revealed the form of a deep pit (703) cut into the underlying drift geology (704). This cut marked the extents of a deep German bunker dug as part of the Puits d'Herode complex. As with the defensive trench excavated in Trench 6, this had been backfilled after the Second World War with a mixture of domestic and industrial rubbish in a loose silt loam matrix (702). Large quantities of broken crockery, metalwork, glass bottles and ampoules were recovered during the excavation of this backfill, and a representative sample retained. Because of the depth and instability of this deposit, it was decided to investigate it by machine only. Excavation continued to a depth of 1.55m, with no sign of any other fills evident. At this point it was decided that further excavation of the trench would be unsafe without shoring or stepping the sides of the trench. The trench was therefore recorded and backfilled.

Trench 8 (Figure 5).

3.5.7 Trench 8 was excavated adjacent to a large concrete block (806) still visible within the field (Plate 8). This comprised a thick concrete lintel with a curved roof, into which was set a roughly square access hatch. Investigation revealed

that this lintel was supported both on the surrounding ground surface and on a decaying timber framework. The removal of the topsoil in Trench 8 (layer 801) and an intermittent underlying subsoil (layer 805) revealed a straight sided trench cut into the underlying natural drift geology (802). This was aligned roughly north-east to south-west, and ran from the concrete lintel and access hatch towards the probable bunker investigated in Trench 8. At its north-eastern end, there were two small steps cut into the base of the trench to ensure easier access beneath the concrete plinth.

3.5.8 This trench probably acted as an access trench to the bunker investigated in Trench 8, and may have been completely covered with a timber and earth roof. The only fill excavated in this trench, layer 803, was probably a deliberate backfill of the trench after the capture of Puits d'Herode, although it lacked the large quantities of rubbish dumped in the cut features in Trenches 6 and 7.

Trench 9 (Figure 5).

3.5.9 Trench 9 was a machine excavated trench targeted on a strong linear anomaly running from north-east to south-west across the Site. This did not correspond with any known features within the defensive complex, and it was deemed worthy of further excavation. Accordingly, Trench 9, which was some 10m long and 1.85m wide was excavated in order to investigate this anomaly. This trench was machine-excavated to a maximum depth of some 1.26m, revealing a largely natural sequence of deposits – with the topsoil (layer 901) sealing a subsoil deposit (layer 902) which sealed a thick colluvial layer, probably formed as the result of ploughing, which in turn sealed the natural drift geology (layer 904). Initially it was not clear what had caused the geophysical anomaly. However, careful cleaning of the subsoil revealed that a layer of wire mesh, similar to chicken wire had been lain down, presumably to act as a footing for vehicles in wet weather. This was fairly close to the modern land surface, and sealed the colluvial layers, suggesting that it was lain during the war or in the post-war period.

Trench 10 (Figure 6)

3.5.10 Trenches 10 and 12 were both targeted on a large geophysics anomaly identified on the eastern edge of the complex at Puits d'Herode. This can be seen on aerial photographs of May and June of 1944, in which it appears to be a concrete bunker under construction. Trench 10 was targeted on the south-eastern corner of this structure. It was a large trench, measuring some 5.3m by 4.4m, and excavated to a maximum depth of 2.08m. Once more, this revealed a fairly simple stratigraphic sequence. The modern topsoil (layer 1001) was stripped off, as was a very thick dump of redeposited natural material (layer 1002). This sealed a thinner layer of demolition material directly associated with the incomplete bunker (layer 1003).

3.5.11 This layer comprised a mixture of re-deposited natural (a yellowish brown silty clay) and demolition material in the form of pre-cast concrete blocks,

steel reinforcing rods and fragments of smashed limestone. This material had been used to cover the foundations of the incomplete bunker, which comprised a low wall (wall 1005) built of pre-cast concrete blocks reinforced with steel rods. This survived to some three courses high in places. The wall turned through an oblique angle within the trench, matching the angled corner shown on the aerial photographs, and turning towards the wall of similar construction evident in Trench 12 (Plate 9).

3.5.12 Wall 1005 was lain directly on a solid concrete plinth (1006), the full extents of which were not established in the trench. An unusual feature of the construction within this trench was the use of lengths of ceramic pipes lain along the junction between the wall and the concrete base. These lengths of ceramic pipe were crudely formed around the corner of the wall, and could not have been used to form a watertight pipe for drainage or similar. At present it is unclear what function this would have formed, although it may have acted as a conduit for electrical or communications cabling.

Trench 12 (Figure 6)

3.5.13 Trench 12 was excavated in order to investigate the northern extent of the bunker, which on the aerial photographs appears to continue further to the north-east to form a flanking wall to protect the gun embrasure from fire from the north (towards the sea).

3.5.14 This was an irregularly shaped trench, measuring a maximum of 9.04m by 3.90m. It was aligned roughly north-east to south-west, and was excavated by machine. The modern topsoil (1201) and subsoil (1202) were excavated to reveal a modern cut - feature 1207. This was confined to the southern half of the trench, with an undisturbed earlier sequence identified against the northern edge of this trench. This sequence comprised three further layers. Layer 1202 sealed a gradually formed deposit – layer 1203. This sealed a band of limestone, which was probably geological in origin, which in turn overlay another band of silty clay (layer 1205). This lay above the solid limestone bedrock (1206).

3.5.15 The depositional sequence within the modern cut was very different. The northern extents of the unfinished bunker were found in the form of three conjoined foundation walls – walls 1208, 1211 and 1212 (Plate 10). It is not clear how these fit within the overall plan of the bunker, probably due to the demolition of the superstructure visible in the aerial photograph, although walls 1208 and 1211 probably combined to form the foundation for the northern flanking wall. Once these foundation walls had been built to a reasonable height, the cut outside the walls was backfilled with layer 1209, a greyish brown silty clay. In contrast to this, the space enclosed within these foundation walls contained a much more mixed deposit – layer 1210. This comprised a loose dark brown silty clay containing large quantities of barbed wire, steel pickets, fragments of concrete and assorted other finds including

large parts of a battery. This material presumably relates to the demolition of the half constructed bunker and its associated defences after its capture.

4 FINDS

by Nicholas Cooke and Stephen Thompson.

4.1.1 Large quantities of material were recovered during the course of the excavation, much of it relating to the abandonment and demolition of the defensive complexes investigated. All live ordnance was identified on the site and disposed of by members of the Caen bomb disposal unit. An export licence was obtained for the removal and study of other material, including spent ammunition, shrapnel and other personal items. These will be returned to France along with the project archive in due course. All of the spent ammunition was examined for makers marks and dates in order to clarify the country of origin.

4.1.2 All of the quantified material recovered from the site can be seen in Table 1 below.

Table 1. All finds from the Time Team evaluations at St Come de Fresné

Object No	Context	Site	Material	Description	Ordnance	Military	Personal	Post-war
1	Unstrat	Point 54	Copper Alloy	British .303in cartridge (spent)	X	X		
2	Unstrat	Point 54	Copper Alloy	German 7.92 cartridge (LIVE)	X	X		
3	301	Point 54	Copper Alloy	French 'Lebel' cartridge (spent)	X	X		
4	Unstrat	Point 54	Uncertain	'Myau', British made Razor, Pre 1924			X	
5	101	Point 54	Iron	2 German Barbed wire fragments		X		
6	101	Point 54	Iron	4 Iron Nails				
7	Unstrat	Point 54	Copper Alloy	German 7.92 cartridge (spent)	X	X		
8	Unstrat	Point 54	Copper Alloy	Mortar Fragment	X	X		
9	Unstrat	Point 54	Copper Alloy	German 7.92 cartridge (spent)	X	X		
10	Unstrat	Point 54	Copper Alloy	German 7.92 cartridge (spent)	X	X		
11	Unstrat	Point 54	Iron	2 German Canteen Handles		X		
12								
13	Unstrat	Point 54	Copper Alloy	Mortar Fragment	X	X		
14	Unstrat	Point 54	Copper Alloy	British Buckle		X	X	
15	Unstrat	Point 54	Iron	Shell Splinter	X	X		
16	Unstrat	Point 54	Copper Alloy	Tap				X
17	Unstrat	Point 54	Copper Alloy	German 7.92 cartridge (spent) including Spandau belt	X	X		
18	Unstrat	Point 54	Copper	British .303in	X	X		

			Alloy	cartridge (spent)				
19	Unstrat	Point 54	Iron	Shell Splinter, poss Naval Artillery	X	X		
20	Unstrat	Point 54	Plastic / Copper Alloy	German Communication Wire Fragment		X		
21	Unstrat	Point 54	Copper Alloy	German 7.92 cartridge (LIVE)	X	X		
22	Unstrat	Point 54	Copper Alloy	German 7.92 cartridge (LIVE)	X	X		
23	Unstrat	Point 54	Copper Alloy	German 7.92 cartridge (LIVE)	X	X		
24	Unstrat	Point 54	Copper Alloy	British 9mm sub-machine gun (Sten Gun) cartridge (spent)	X	X		
25	Unstrat	Point 54	Copper Alloy	British 9mm sub-machine gun (Sten Gun) cartridge (spent)	X	X		
26	Unstrat	Point 54	Iron	Sheel Splinter	X	X		
27	Unstrat	Point 54	Plastic	Plug, possibly from radio.		X		
28	Unstrat	Point 54	Copper Alloy	British .303in cartridge (spent)	X	X		
29	Unstrat	Point 54	Copper Alloy	German 7.92 cartridge (LIVE)	X	X		
30	Unstrat	Point 54	Copper Alloy	British .303in cartridge (spent)	X	X		
31	Unstrat	Point 54	Copper Alloy	German 7.92 cartridge (spent) including Spandau belt	X	X		
32	Unstrat	Point 54	Copper Alloy	German 7.92 cartridge (spent)	X	X		
33	Unstrat	Point 54	Copper Alloy	German 7.92 cartridge (spent)	X	X		
34	Unstrat	Point 54	Copper Alloy	Possible end fitting of German Stick Grenade		X		
35	801	Puits d'Herode	Glass	Ampule of unknown liquid, poss agricultural				X
36	1103	S of Point 54	Iron	Head of German Stick Grenade (LIVE)	X	X		
37	1103	S of Point 54	Copper Alloy	450 x German 7.92 in 5 cartridge clips (90 clips) (LIVE)	X	X		
38	1103	S of Point 54	Paper and Copper Alloy	45 waxed paper boxes of 15 German 7.92 cartridges (3 x 5 cartridge clips per box) (LIVE)	X	X		
39	1103	S of Point 54	Copper Alloy	Approx 900 x British .303in cartridges (LIVE)	X	X		
40	1103	S of Point 54	Copper Alloy	Appox 200 x British .303in cartridges with belay link fastenings (LIVE)	X	X		
41	1103	S of Point 54	Copper Alloy	2 x British Bren Gun magazines (each with 32 x .303in cartridges) (LIVE)	X	X		
42	1103	S of Point 54	Copper Alloy	30 x British .303in cartridges in 5 cartridge clips (LIVE)	X	X		

43	1103	S of Point 54	Copper Alloy	105 x wooden tipped British .303in cartridges (LIVE)	X	X		
44	Unstrat	S of Point 54	Copper Alloy	British Issue Pen Knife		X	X	
45	1103	S of Point 54	Copper Alloy	British Belt Fastening		X	X	
46	1103	S of Point 54	Copper Alloy	Belt/Strap End		X	X	
47	1103	S of Point 54	Copper Alloy	Button		X	X	
48	1103	S of Point 54	Iron	Small felt lined Iron Box with possible priming caps inside		X		
49	1103	S of Point 54	Copper Alloy	British .5 inch heavy machine gun cartridge (LIVE)	X	X		
50	1103	S of Point 54	Copper Alloy	British petrol can lid		X		
51	1103	S of Point 54	Iron	2 x 'drum' magazines for Bren gun containing 2 chrome plated .303in cartridges with no percussion cap	X	X		
52	1103	S of Point 54	Plastic and Copper Alloy	2 x possible communication equipment pieces		X		
53	604	Puits d'Herode	Copper Alloy	German 7.92 cartridge (spent)	X	X		
54	Unstrat	Point 54	Copper Alloy	British enamel tin mug handle		X	X	
55	1103	S of Point 54	Copper Alloy	Chrome-plated British .303in cartridge with bullet with no percussion cap (from inside SF51)	X	X		
56	Unstrat	S of Point 54	Copper Alloy	Beer barrel/cask fitting				
57	1103	S of Point 54	Copper Alloy	9 x washers		X		
58	1103	S of Point 54	Copper Alloy	Button		X	X	
59	1103	S of Point 54	Paper	Waxed paper box which held 15 German 7.92 cartridges (5 in 3 clips) see SF 38		X		
60	Unstrat	Point 54	Unknown	German Gas Mask Vent		X		
61	603	Puits d'Herode	Iron	Entrenching Tool		X		
62	402	Point 54	Unknown	Small disc of unknown material or function		X		
63	1103	S of Point 54	Copper Alloy	Small spindle		X		
64	1103	S of Point 54	Copper Alloy	Small spindle		X		
65	1103	S of Point 54	Copper Alloy	Large spindle		X		
66	803	Puits d'Herode	Iron	Allan Key		X		
67	1103	S of Point 54	Copper Alloy	British Belt buckle/fastening		X	X	
68	1103	S of Point 54	Copper Alloy	British belt fastening		X	X	

69	1103	S of Point 54	Copper Alloy	British belt fastening		X	X	
70	402	Point 54	Iron	2 x German ground pegs/ barb wire pegs		X		
71	703	Puits d'Herode	Glass and Copper Alloy	Valve possibly from radio equipment		X		
72	703	Puits d'Herode	Glass and Copper Alloy	Light Bulb		X		
73	703	Puits d'Herode	Iron	3 x German barbed wire fragments		X		
74	202	Point 54	Unknown	Unknown object		X		
75	202	Point 54	Iron	Buckle		X	X	
76	Unstrat	S of Point 54	Copper Alloy	11 x mortar fragments	X	X		
77	Unstrat	S of Point 54	Copper Alloy	German 7.92 cartridge (spent)	X	X		
78	Unstrat	S of Point 54	Copper Alloy	British ration tin 'Processed Cheese'		X		
79	Unstrat	S of Point 54	Copper Alloy	Ring of unknown function		X		
80	Unstrat	S of Point 54	Iron	Unknown object		X		
81	Unstrat	S of Point 54	Copper Alloy	Mortar fragment	X	X		
82	1210	Puits d'Herode	Composite	Battery		X		
83	1210	Puits d'Herode	Copper Alloy	Tin can				X
84	1210	Puits d'Herode	Iron	Unknown object				X
85	603	Puits d'Herode	Glass	Bottle				X
86	603	Puits d'Herode	Glass	Bottle				X
87	603	Puits d'Herode	Glass	Bottle				X
88	603	Puits d'Herode	Glass	Bottle				X
89	603	Puits d'Herode	Glass and Copper Alloy	Valve possibly from radio equipment		X		
90	603	Puits d'Herode	Glass and Copper Alloy	Valve possibly from radio equipment		X		
91	603	Puits d'Herode	Glass	Bottle				X
92	603	Puits d'Herode	Plastic	French equivalent of 'Jif' lemon bottle				X
93	603	Puits d'Herode	Copper Alloy	Tin can				X
94	603	Puits d'Herode	Glass	Ampule of unknown liquid, poss agricultural				X
95	603	Puits d'Herode	Iron	Can fragments				X
-	Unstrat	Puits d'Herode Trench 12	C.B.M	2 bricks mortared together				

5 ENVIRONMENTAL EVIDENCE

5.1.1 No environmental samples were recovered during the course of the project.

6 DISCUSSION

6.1.1 The Time Team excavations at Point 54 and Puits d'Herode have provided new information regarding the state of German defences at the time of the D-Day invasion. There is strong evidence to indicate that the movement of the 352nd Infantry Division into the area had led to a strengthening of the inland defensive positions at Puits d'Herode and Point 54. The evidence from the aerial photographs alone points to significant upgrading of these defences, with new bunkers being built and communications cables lain.

6.1.2 At Point 54, the defensive positions were unexpectedly strong, with at least three deep bunkers within which troops could shelter from shelling and air attack. These were complemented by a complex network of trenches incorporating two or more machine gun nests and a circular earthwork that was almost certainly built to protect a wheeled anti-tank gun. Positions of this type were often built to provide temporary cover for anti-tank weapons. They had the effect of lowering the gun's profile to the enemy tanks, but also restricted their field of fire (Rottman, 2004, 23). There is no evidence to suggest that this position was manned with such a gun on D-Day itself however. Had it been so equipped, it would have been very well placed to significantly hamper the allied advance off the beaches.

6.1.3 The bunkers encountered at Point 54 were underground bunkers for protection and living in rather than defensive structures. These *Gruppenunterstand* (squad bunkers) provided more practical and comfortable living quarters than dugouts and trenches (Rottman, 2004, 37).

6.1.4 At Puits d'Herode, the evaluation established the location of the defensive circuit, as well as a deep bunker, complete with a concrete covered access/entrance hatch. This latter is It also confirmed that the large feature shown on Allied reconnaissance photographs as under construction just prior to the invasion was a concrete bunker. It is clear that this had not been completed prior to D-Day. Indeed, the concrete footings identified in Trenches 10 and 12 only represent the foundations of the bunker. The walls themselves, which would almost certainly have been of poured concrete reinforced with steel rods, no longer survive. From the form of the foundations and the outline of the bunker under construction in the aerial photographs, it is possible to suggest that this was a casemate for a 75mm anti-tank gun - possibly a variant on a type 625 or type 626 (Saunders, 2001, Appendix A), with a second flanking wall to the rear of the structure.

6.1.5 The small cache of ammunition and equipment uncovered in Trench 11 is unlikely to be directly related to the action at Point 54 and Puits d'Herode. It is likely to represent clearance long after the action had moved away,

although the German ammunition buried in the cache may well have been captured on D-Day.

6.1.6 The evaluation has also established that the remains at Point 54 and Puits d'Herode are both relatively well preserved, although the latter have seen a degree of post-war slighting. Through a combination of geophysical survey, aerial photographic and landscape analysis and archaeological evaluation, it has been possible to investigate archaeologically the course of the 1st Dorsets assault on Point 54 and Puits d'Herode on D-Day.

7 THE ARCHIVE

7.1.1 The archive, which includes all artefacts, written, drawn and photographic records relating directly to the investigation is undertaken, is currently held at the offices of Wessex archaeology under the site code DDAY 04 and Wessex archaeology project No 55750. The paper archive is contained in one lever arch file. In due course, Time Team will transfer ownership of the archive to the appropriate museum.

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APPENDIX 1. TRENCH DESCRIPTIONS.

Trench 1	Length: 6.00m max	Width: 3.30m max	Max depth: 0.63m	Ground level:
Context	**Interpretation**	**Description**		
101	Layer	Topsoil. Leaf litter. A rich, very humic, mid grey brown clay, containing rare small sub angular limestone fragments. An accumulation of humic material derived from decaying organic material within wood.		
102	Bank material	Light yellowish grey clay containing rare small subangular limestone fragments. Redeposited material used to form a bank around a circular gun emplacement. Seals layer 103.		
103	Bank material	Light to mid grey clay. Upcast material used to form a bank surrounding a circular gun emplacement. Above layer 104.		
104	Bank material	A mid grey clay. Upcast material used to form a bank surrounding a circular gun emplacement. Above layer 105.		
105	Buried land surface	A mid grey brown silty clay. This layer represents the original ground surface prior to the excavation of a shallow pit for a gun emplacement and the construction of a defensive bank with the upcast material. Preserved under the surviving earthwork of the bank.		
106	Gun emplacement	A large sub circular pit, roughly 5.5 metres in diameter, with shallow regular sides in the flat base. This was designed to contain an anti-tank gun, probably a 75-millimetre or an 88-millimetre gun. This was surrounded to the south west and north by a low bank constructed from the excavated material, whilst a shallow ramp allowed for axis to the gun pit from the east.		
107	Natural drift geology	The light grey clay. The natural drift geology of the area.		

Trench 2	Length: 4.20m	Width: 2.00m	Max depth: 3.70m	Ground level:
Context	**Interpretation**	**Description**		
201	Layer	Topsoil. A very humic, Leaf litter rich, topsoil. The current ground surface in the wood. This also incorporates some redeposited natural thrown up during the construction of the bunker.		
202	Layer	Redeposited natural. A light grey silt clay containing occasional sub angular medium-sized limestone fragments and redeposited material removed during the construction of bunker 205 used to fill the hollow left following the collapse of timbers 203.		
203	Timbers	Number assigned to a number of collapsed wooden timbers. These probably represent the remains of horizontal timbers and used to form the roof of a Second World War German bunker. They seal a layer of silting, which may have taken place prior to their collapse. These could not be examined more closely due to the depth of the trench and health and safety considerations.		
204	Layer	A light grey to mid brown silt clay. A single number assigned to bands of natural silting/collapse of the edges and ground surface into the bunker, prior to the collapse of the roof timbers, and following its abandonment.		
205	Cut for Second World War bunker	A large sub rectangular cuts with extremely steep, almost vertical sides and a flat base. In places the sides are slightly undercut. This was excavated to a depth of some 3.7 metres deep, and probably roofed with large timbers (203) to provide a room some two metres high. This bunker was entered from the south, along a narrow trench.		
206	Bedrock	A light grey limestone, the natural bedrock in the area, cut by bunker 205. The German bunker was dug some two metres into this bedrock, possibly to ensure solid walls and foundation for the roof structure.		

Trench 3	Length: 4.70m	Width: 0.60m	Max depth: 1.83m	Ground level:

Context	**Interpretation**	**Description**
301	Layer	Topsoil. A dark brown silty loam containing much decaying organic matter - predominantly leaf litter. It contains very occasional small rounded 'pea grit' pebbles.
302	Bank material	A yellowish brown silty clay containing very rare small rounded limestone pebbles. The upper of three distinguishable bank deposits forming the southern bank within the intervention. It forms the north bank of Second World War trench. Above layer 303.
303	Bank material	A mid brown silty clay containing occasional medium subangular to angular limestone fragments. The middle of three bank deposits in this intervention, probably originally derived from the excavation of the trench (313). This was subsequently cut by the excavation of a bunker. Above layer 304.
304	Bank material	A light yellowish brown silty clay containing a moderate to frequent medium angular and sub angular limestone fragments. These are particularly concentrated towards the top of the layer. This probably represents initial arisings from 313, with the limestone inclusions derived from the underlying geology.
305	Natural drift geology	A grey silty clay containing moderately frequent limestone fragments (angular and sub angular). The underlying drift geology. This layer is cut by trench is 313 and 314 and bunker 312.
306	Deliberate backfill	A light greenish brown silt clayey containing very occasional small and medium limestone fragments. The backfill of a Second World War trench. This declarer of material was used to fill in the remains of the trench. Seals layer 307. Fill of trench 314.
307	Layer	A dark grey silty clay containing a high proportion organic residue. This layer is concentrated on the southern edge of trench/ditch 314, and probably represents material accumulating on the edge of the cut during the use of the trench. The lower fill of 314.
308	Bank material	A mid brown silty clay containing moderate medium-sized angular and sub angular limestone fragments. The upper of two dumped deposits used to form a bank on the southern edge of ditch/trench 314.
309	Bank material	A yellowish brown silty clayey containing frequent medium and large angular blocky limestone fragments. The redeposited dump of natural clay and limestone derived from the initial excavation of 314, used to form a defensive bank.
310	Layer	A mid grey to brown silty clayey containing roots, organic material, occasional small and medium subangular and angular limestone fragments. The main fill of bunker 312. This represents a mixture of post-war material slumping into the hollow created by the bunker, and material used to cover the wooden roof of the Second World War German bunker when it was in use.
311	Layer	A dark grey's brown silty clay containing moderate amounts of small and medium sub rounded to sub angular limestone fragments, and some organic material. This deposit was not fully excavated for health and safety reasons. Excavation ceased on the discovery of sloping timbers, which probably represent the remains of the timber roof structure. This deposit is likely to represent material covering these timbers in a protective layer.
312	Cut for Second World War bunker	A large deep rectangular cuts, aligned roughly east-west. This as very steep almost vertical sides. It's depth is unknown, although roof timbers were uncovered at a depth of some 1.4 metres the only deposits associated with this cuts represent the construction disuse and collapse of this roof structure. No deposits for excavated within the bunker proper. Filled with layers 310 and 311.
313	Cut for Second World War trench	A linear trench, aligned roughly east-west, only partially investigated. Only the northern edge of the trench was investigated, and only the upper fill sampled. It is unclear how deep this cut originally was.
314	Cut for Second World War trench	A linear trench, aligned roughly east-west. The northernmost of the features examined in this trench, this was not bottomed due to time constraints. A single main fill was excavated, probably representing the disuse or abandonment of the feature. This sealed by lower organic fill, which may represent the use of the trench.

315	Layer	A dark brown silty clay containing large amounts of decaying organic matter. The only fill of trench 313 to be excavated. This material properly represents material accumulated after the trench went out of use.

Trench 4	Length: 2.20m max	Width: 1.10m max	Max depth: 0.55m	Ground level:
Context	**Interpretation**	**Description**		
401	Layer	Topsoil. A dark brown silt loam containing much organic leaf litter.		
402	Layer	A greyish brown silty clay containing moderate small rounded 'pea grit' pebbles and very occasional large angular sandstone fragments. Finds include shell/bullet casing, pickets and fragments of ?shrapnel. The only fill of 403.		
403	Cut for Second World War trench	A linear trench, aligned roughly east-west, only partially investigated. Only the southern edge of the trench was investigated, and only the upper fill sampled. It was steep sided with a flat base, and contained a single fill – layer 402.		
404	Natural drift geology	A light yellowish brown silty clay containing frequent angular sandstone fragments. Cut by Second World War trench 403.		

Trench 5	Length: 4.97m max	Width: 1.00m max	Max depth: 0.47m	Ground level:
Context	**Interpretation**	**Description**		
501	Cut for Second World War trench	A linear trench, aligned NW-SE. This was steep sided, and not fully excavated. The sides of the cut were lined with sheets of corrugated iron, the remnants of which were visible at the base of the excavated area.		
502	Layer	Deposit of material slumped against the eastern side of the trench 501 – collapse of trench sides once it had been abandoned. A mid to light grey silty clay		
503	Layer	Secondary fill of 501. A gradual silting episode following the more sudden collapse represented by 502. A mid brown silty clay containing the fragmentary remains of corrugated iron sheeting which originally formed the revetment of the trench sides.		

Trench 6	Length: 5.00m max	Width: 1.85m max	Max depth: 0.93m	Ground level:
Context	**Interpretation**	**Description**		
601	Layer	Topsoil. A dark brown silty clay containing very occasional sub angular and angular moderate to large broken sandstone inclusions.		
602	Natural drift geology	Natural drift geology. A yellowish brown silty clay containing frequent medium-sized and large broken sandstone fragments.		
603	Layer	The upper (modern) fill of a Second World War trench. A dark greyish brown silt loam containing much modern material (including yellow plastic lemon, bottles, barbed wire, tin cans etc). Fill of 605.		
604	Layer	A mid brown silty clay, probably formed over a period of time. The finds include spend rounds of ammunition and assorted metalwork. Fill of 605.		
605	Cut for Second World War trench	A linear trench, aligned roughly N-S. This was vertical sided, and had a flat base. This was dug as a defensive feature, probably with a parapet on both sides of the trench formed from the spoil removed during its construction. Contains 603 and 604.		

Trench 7	Length: 25.47m max	Width: 24.02m max	Max depth: 0.60m	Ground level: 157.16m OD
Context	**Interpretation**	**Description**		
701	Layer	Topsoil. A greyish brown silty clay containing occasional medium to large angular sandstone fragments.		

702	Deliberate backfill	A loose light greyish brown silty loam containing glass vessels, and tools, ceramic plates, tin cans, and frequent large angular sandstone fragments. The only fill of pit 703. Several large timbers were identified at the base of this deposit. These may represent the remains of a Second World War German bunker.
703	Cut for Second World War bunker	The cut for Second World War bunker. It was dug for the construction of the bunker, which was accessed from an underground trench, and subsequently backfilled with layer 702. It has steep sides and is roughly sub rectangular in shape. The base was not revealed.
704	Natural drift geology	A yellowish silty clay containing a very high proportion of medium and large angular and sub angular blocky limestone. The drift geology of the area.

Trench 8	Length: 5.50m max	Width: 1.85m max	Max depth: 1.5m	Ground level:
Context	**Interpretation**	**Description**		
801	Layer	Topsoil. A dark brown silty loam containing occasional small rounded pebbles.		
802	Natural drift geology	A yellow silty clay containing frequent medium and large angular sandstone fragments.		
803	Layer	A dark greyish brown silty clay containing moderate amounts of medium and large angular sandstone fragments. Fill of 804. This material was used to backfill the trench at the end of the war and comprises mainly redeposited natural used to level up the trench.		
804	Cut for Second World War trench	The cut for Second World War trench with vertical, slightly undercut sides and a flat base. There is a step against the base of the Northern edge of the trench, close to where the trench and approaches the concrete entrance hatch 806.		
805	Layer	Subsoil. A light grey silty clay containing frequent medium and large angular sandstone fragments.		
806	Second World War concrete cover/access hatch	A concrete cover for the access to an underground bunker. This comprises a lintel of rough concrete wall with a slightly domed roof supported on the remains of a timber frame and overlying a small chamber, access to which was gained through a small hatch some 0.6 m by 0.5 m set into the northern half of the roof.		

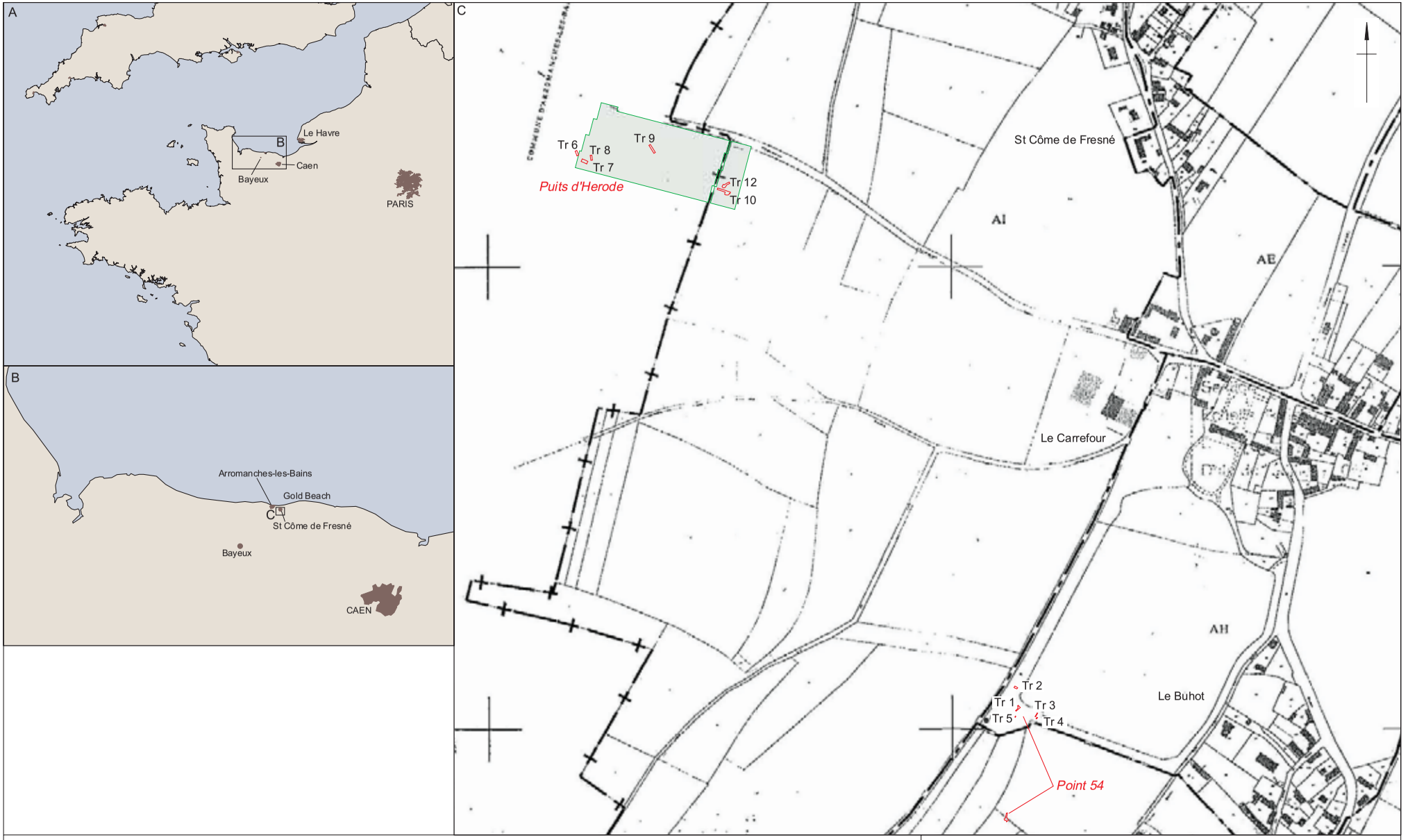
Trench 9	Length: 10.00m max	Width: 1.80m max	Max depth: 1.26m	Ground level:
Context	**Interpretation**	**Description**		
901	Layer	Topsoil. A mid grey brown silty clay containing occasional small sub angular stones. Bioturbated and root disturbed.		
902	Layer	Subsoil. The original ground surface, containing significant amounts of chicken wire, lain to provide hard standing for vehicles in Second World War.		
903	Layer	Colluvial hill wash. A lined orange brown silty clay.		
904	Natural drift geology	A light grey clay. The natural drift geology.		

Trench 10	Length: 5.30m max	Width: 4.40m max	Max depth: 2.08m	Ground level:
Context	**Interpretation**	**Description**		
1001	Layer	Topsoil. A dark greyish brown silty loam containing rare small rounded pebbles (pea grit). Slightly friable and root disturbed.		
1002	Layer	Redeposited natural. They deliberate dump of redeposited natural into the remains of the demolished gun position to level up the ground. A yellow silty clay containing large quantities of medium and large limestone fragments.		
1003	Layer	A dump of demolition material associated with the concrete bunker. A yellowish brown silty clay containing large amounts of broken concrete, steel reinforcing roads and pre-cast concrete blocks.		
1004	Ceramic pipe	A ceramic pipe lain horizontally along the front wall of the base of the bunker. It is not clear what function this pipe formed, if any.		

1005	Concrete wall	A. concrete wall built from pre-cast concrete blocks held together with reinforcing roads and cement. This survives to height of 0.46m, some norm some three courses high. This was lain on a concrete base (1006). The wall ran some 1.2 metres on a northwest to southeast alignment, before turning at the crudely built corner and running for some 2.4 metres on a southwest to northeast alignment.
1006	Concrete plinth	A concrete floor lain as the base for a concrete gun emplacement/bunker. This was used as the foundation for the construction of a concrete wall, fabricated from precast blocks. This concrete base probably lay in the base of a large cut, which was not visible in the trench.

Trench 11	Length: 3.00m max	Width: 3.00m max	Max depth: 0.53m	Ground level:
Context	**Interpretation**	**Description**		
1101	Layer	Topsoil. A dark greyish brown silty loam, heavily root disturbed.		
1102	Natural drift geology	A light yellowish brown silty clay containing frequent medium to large sandstone fragments. The natural drift geology.		
1103	Placed deposit	A placed dump of unused/live, blank and practice ammunition, including British .303in, German 0.792 ammunition, Bren gun magazines and the head of a German stick grenade. The only fill of 1104. A large amount of the German ammunition still boxed. Over 1500 rounds recovered in total.		
1104	Pit cut	The cut for a dump of ammunition - layer 1103. Rectangular with straight sides and a flat base.		

Trench 12	Length: 9.04m max	Width: 3.90m max	Max depth: 1.35m	Ground level:
Context	**Interpretation**	**Description**		
1201	Layer	Topsoil. A dark greyish brown silt loam. Some root disturbance.		
1202	Layer	A colluvial subsoil. A mixed mid grey brown silty clay with common medium and small sub angular limestone blocks.		
1203	Layer	Naturally formed deposit of light grey brown silt clay.		
1204	Layer	Thin dump layer. A light greyish brown silty clay containing a very high concentration of angular and sub angular limestone fragments. Probably associated with the construction or demolition of the gun emplacement.		
1205	Layer	A colluvial subsoil. A light greyish brown silty clay containing very occasional angular and sub angular limestone fragments. A thick layer of material, probably derived from colluvial action. Seals the natural geology 1206.		
1206	Layer	Natural geology. Light greyish brown limestone.		
1207	Cut	North western edge of a large ?sub rectangular cut dug for the construction of a concrete gun emplacement.		
1208	Layer	A low concrete wall built of concrete blocks. Probably built as a foundation wall for a German Second World War gun emplacement. Aligned roughly NNE-SSW, this is joined to walls 1211 and 1212.		
1209	Layer	A greyish brown silty clay containing occasional small and medium rounded and sub rounded limestone fragments. This layer is made up of material used to backfill 1207 after the construction of walls 1208, 1211 and 1212.		
1210	Layer	Large dump of mixed material within the centre of the cut for the gun emplacement. This very thick layer was the result of material being bulldozed in to the captured bunker as part of the clearance of the site. A very mixed and loose deposit comprising a dark brown silty clay containing large amounts of barbed wire, concrete rubble, steel pickets and other pieces of Second World War debris.		
1211	Layer	A low concrete wall built as a foundation wall out of concrete blocks. The exact function of this extension to 1208 is unclear. It may have formed part of the flanking wall which protected the gun emplacement from fire from the north.		
1212	Layer	A low foundation wall built as part of a Second World War gun emplacement. This is aligned roughly east west, and joins to the southern end of the wall 1208. The junction between these two walls is very crude.		



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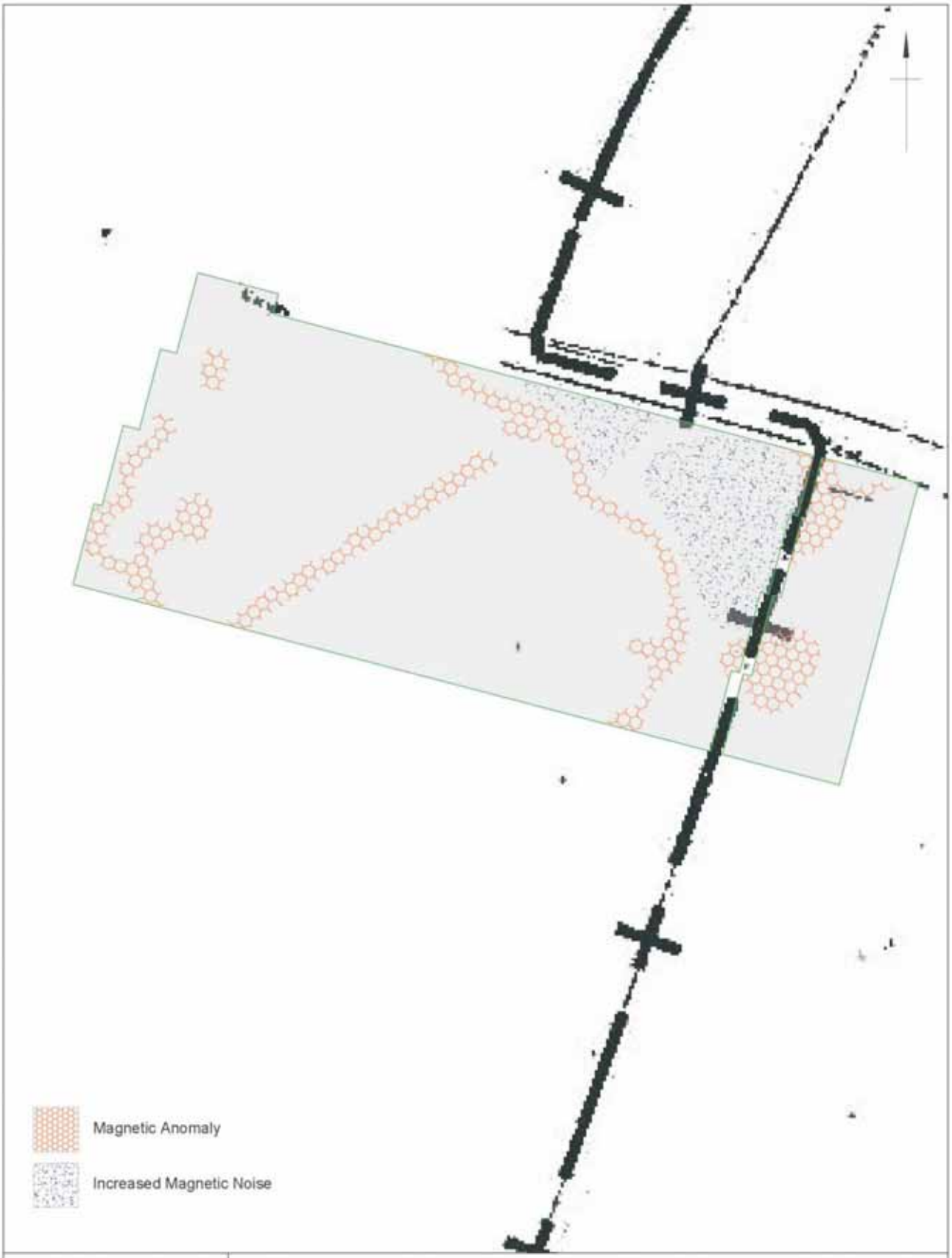
Site location plan

Figure 1



Geophysical data courtesy of GSB Prospection Ltd

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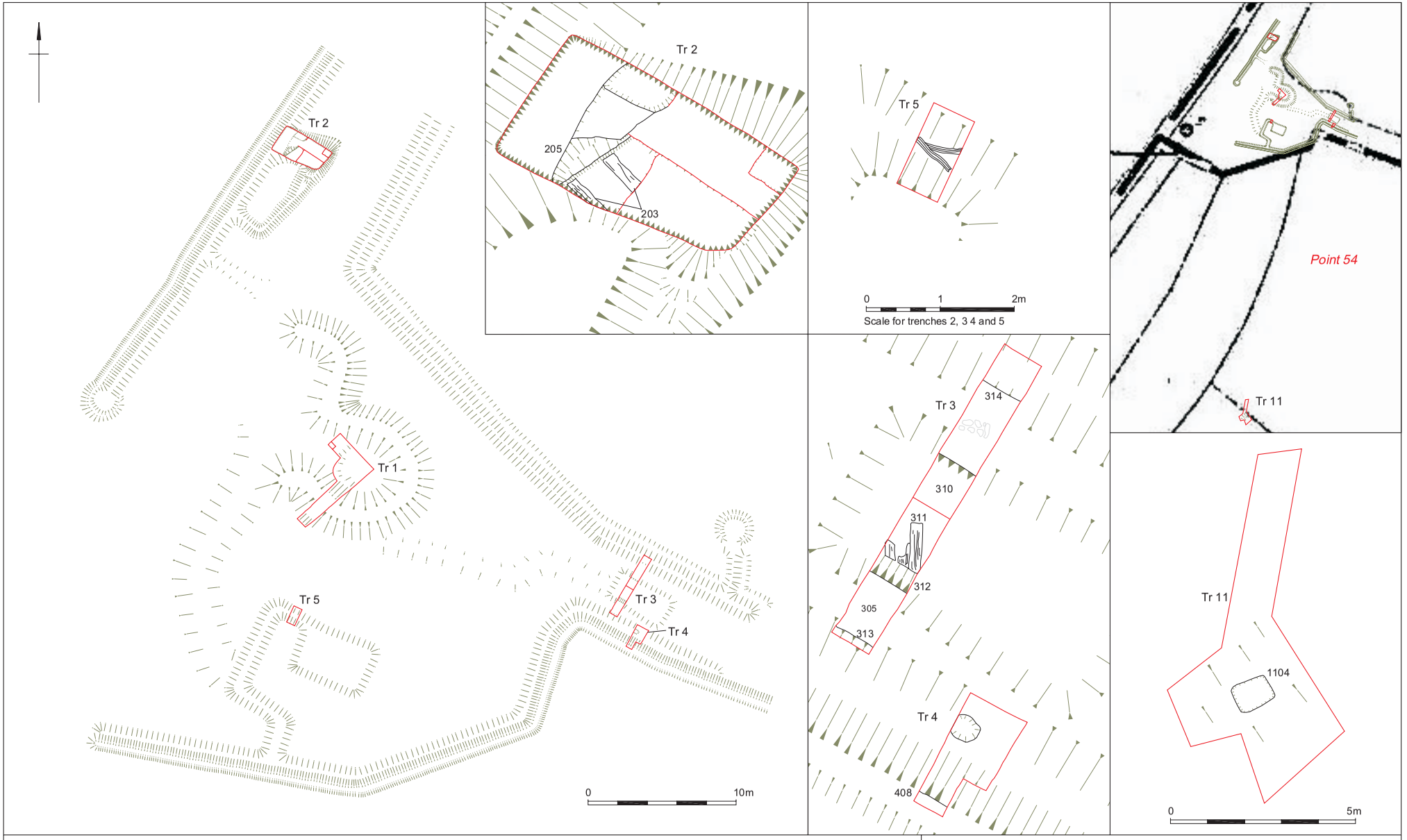
Results of Geophysical Survey

Figure 2



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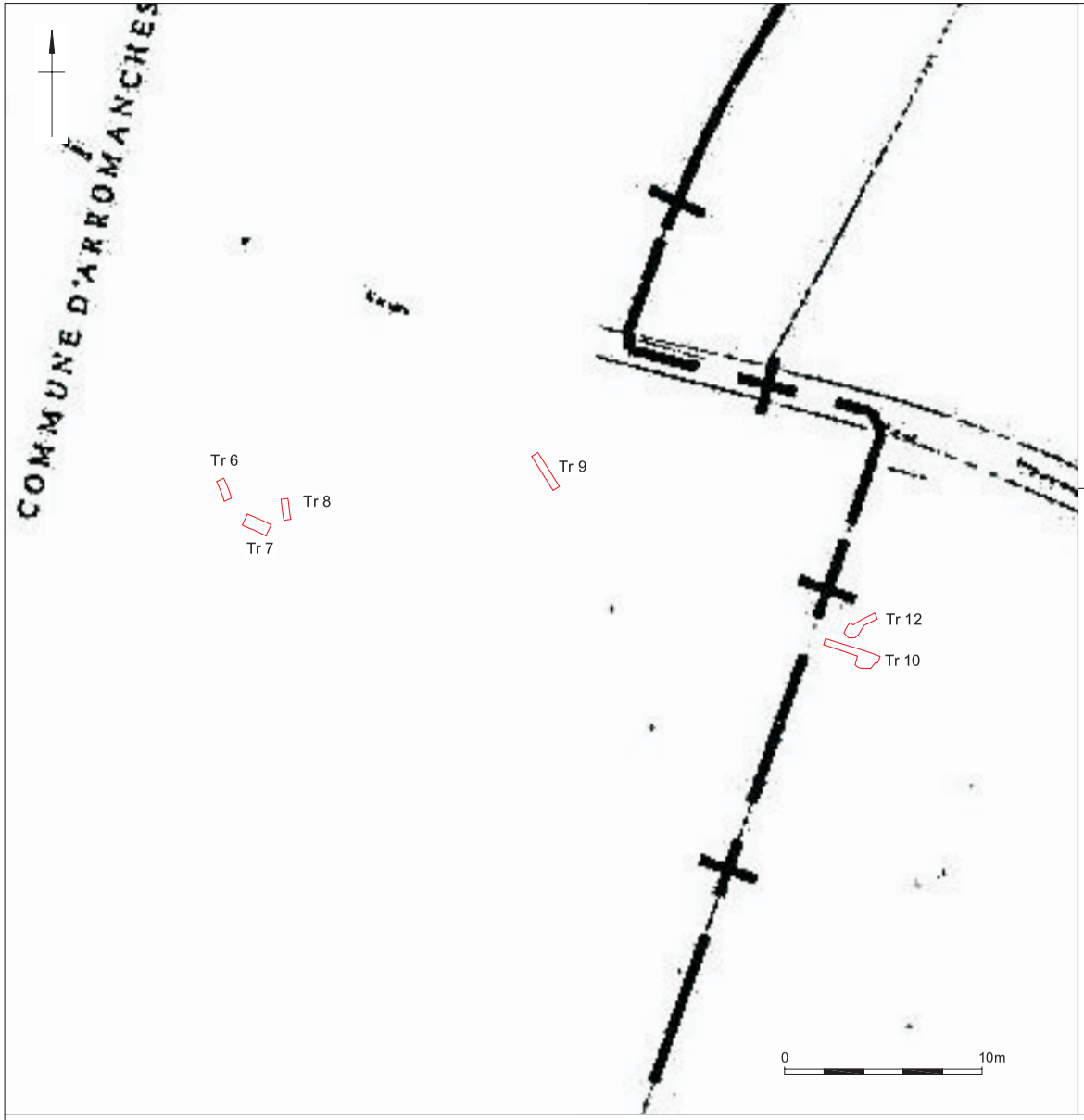
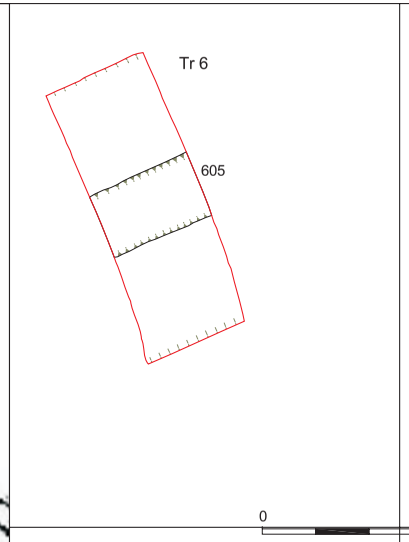
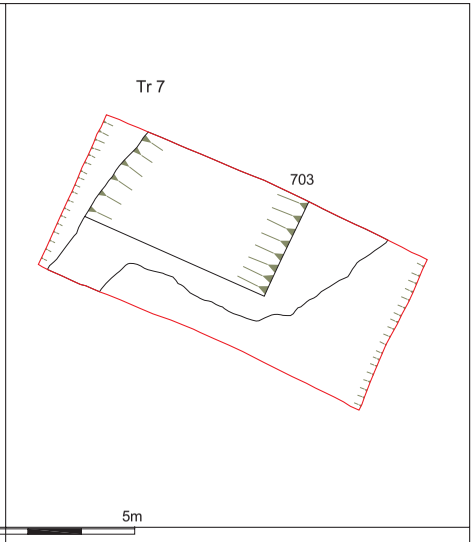
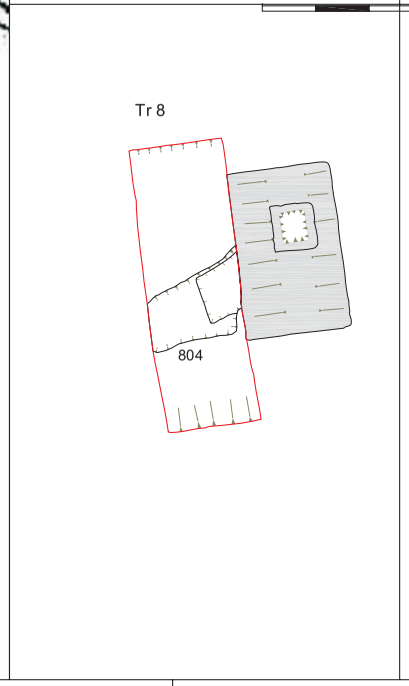
Trenches at Point 54

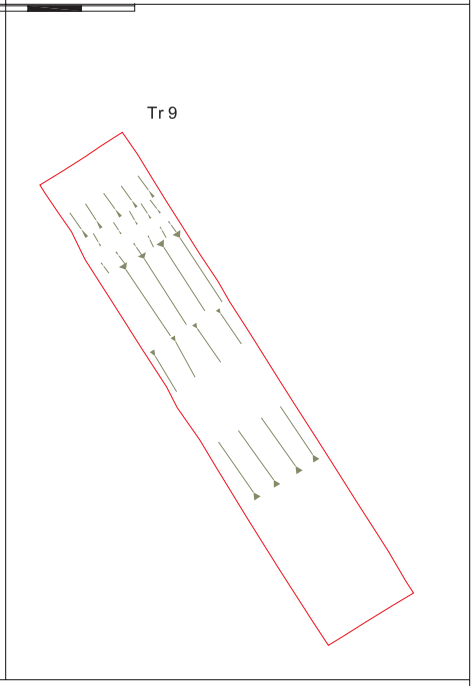
Figure 3











Concrete

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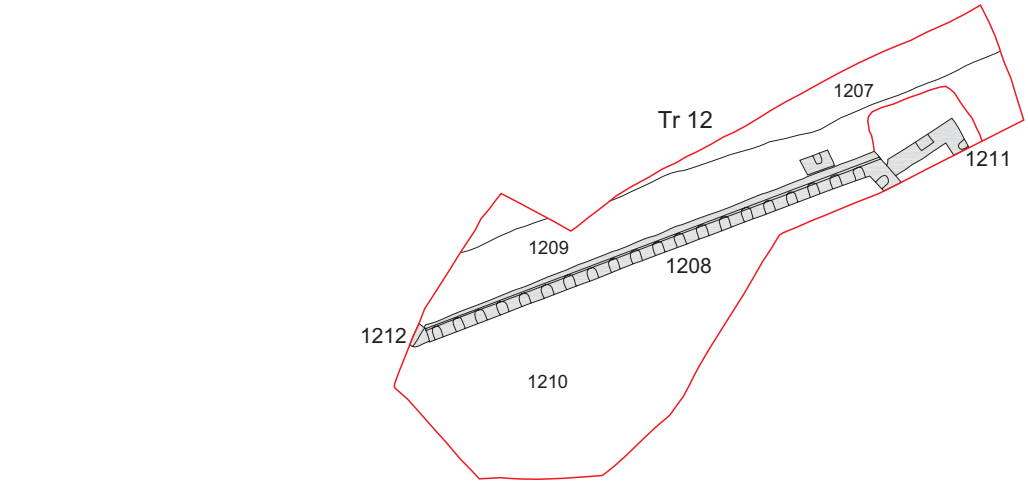
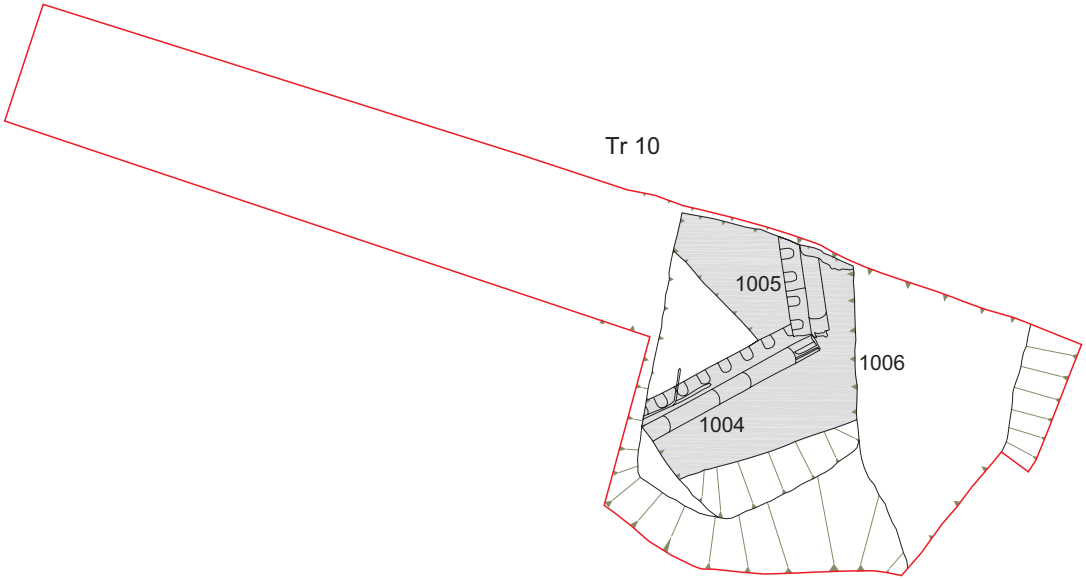
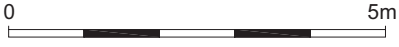
Trenches 6-9 at Puits d'Herode

Figure 4







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Trenches 10 and 12 at Puits d'Herode

Figure 5

Plate 1: Aerial photograph 20th March 1944. RB470.140. 20 Mar 44//Topo24 (detail)

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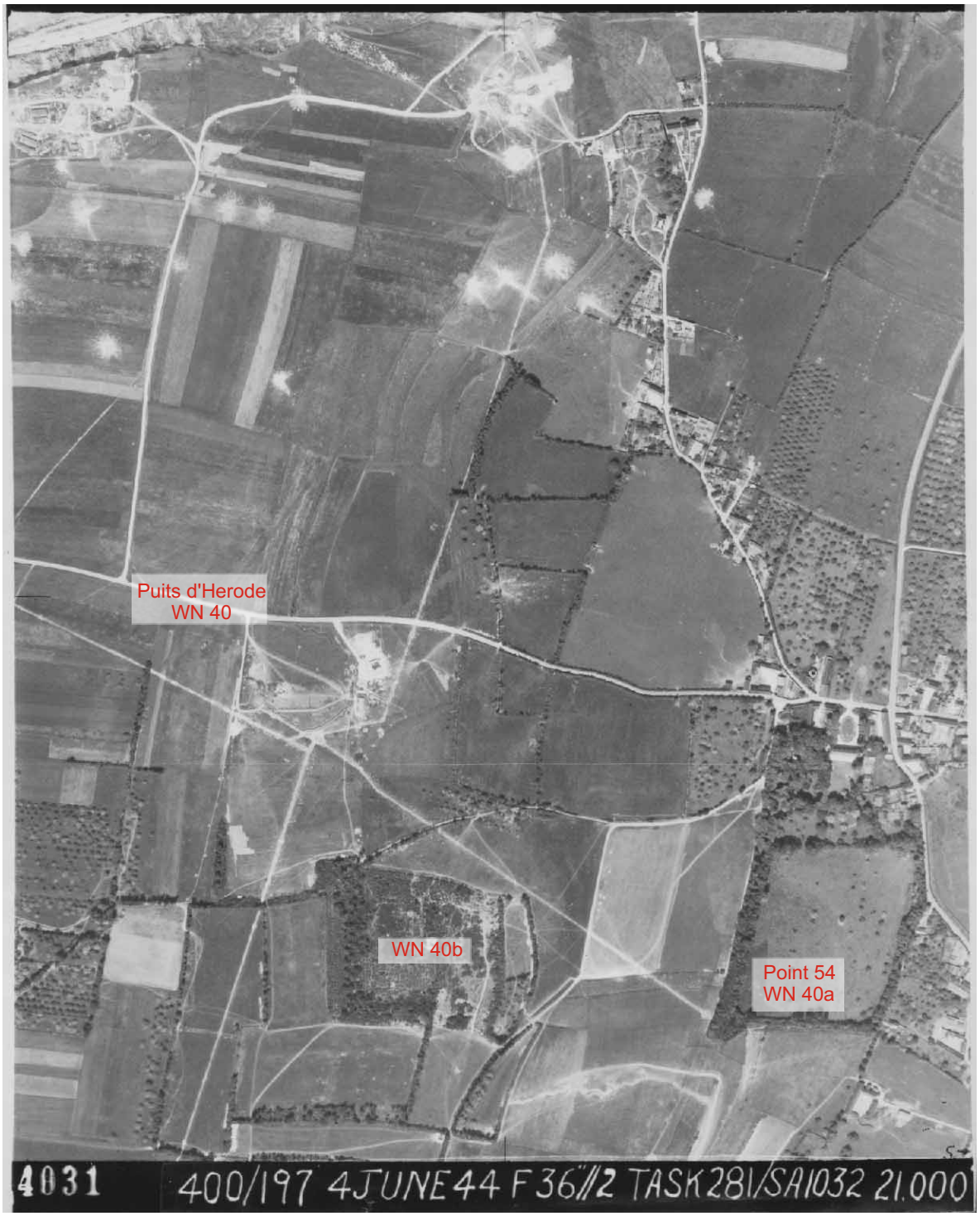

Plate 2: Aerial photograph 4th June 1944. 400/197 F36"//2 Task 281/SA1032 21.000.

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Plate 3: The lane up to Point 54

Plate 4: Circular gun emplacement and Trench 1

Plate 5: Bren gun magazine in Trench 11 under excavation

Plate 6: Trench 11 under excavation

Plate 7: Finds from Trench 11

Plate 8: Trench 8 with concrete access hatch

Plate 9: Remains of unfinished bunker in Trench 10

Plate 10: Remains of unfinished bunker in Trench 12

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