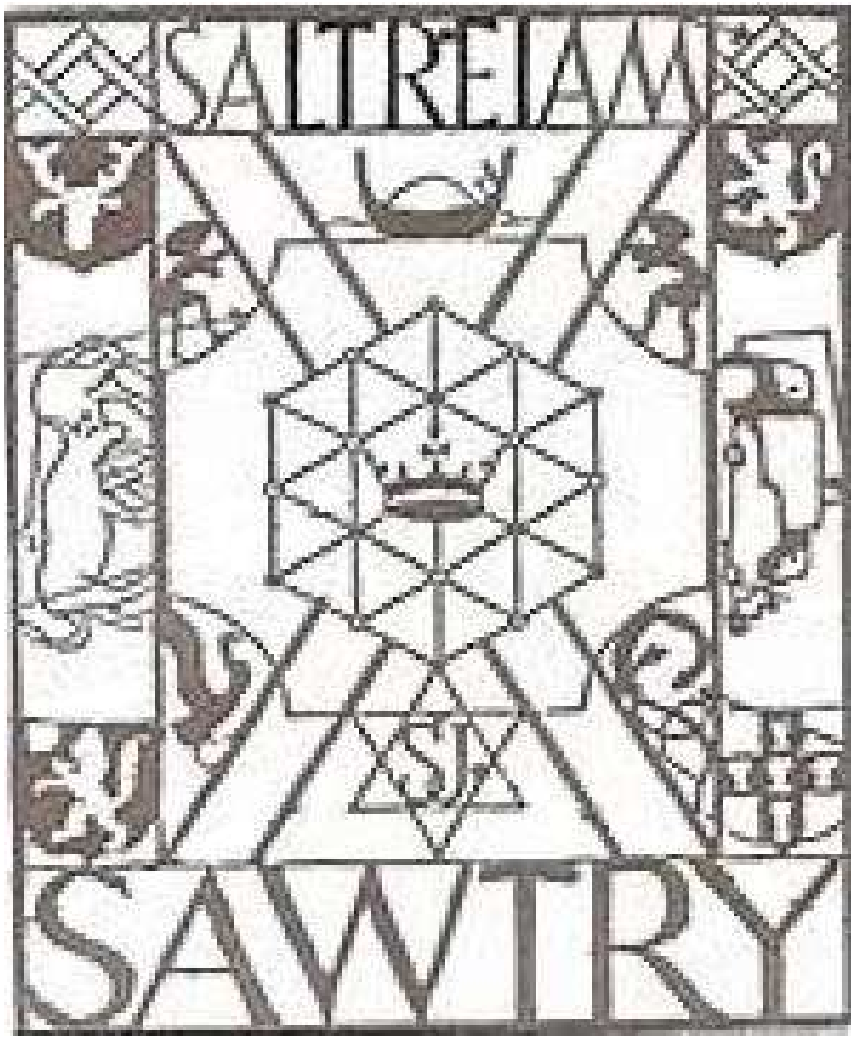
SAWTRY HISTORY SOCIETY



ARCHAEOLOGICAL GEOPHYSICAL SURVEY INTERIM REPORT
SHS 16-1/IR-4

GEOPHYSICAL EARTH RESISTANCE AND MAGNETOMETRY SURVEY (28 - 31 MARCH 2025) - SAWTRY ABBEY, SAWTRY

17 September 2025

by

Kevin Redgate MA
& Phil Hill BA(Hons), PCIfA

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LIST OF ILLUSTRATIONS

ACKNOWLEDGEMENTS

SHS gratefully acknowledges the help and assistance of the following:

Ben Conway	AgReserves (UK) Ltd
Graham Lawman	Tenant Farmer
James Albone	Historic England
Philip Smith	Landowners Historical Research Group (LHRG)
David Wood	Barwood Archaeology Group
Melinda Barham	Barwood Archaeology Group

Participating Volunteers

OASIS REPORT FORM

PROJECT DETAILS	**OASIS No:**	
Project name	Geophysical Earth Resistance and Magnetometry Survey of Sawtry Abbey, Sawtry	
Short description	Earth resistance survey (Res161-4) and magnetometry survey (Mag161-2) resurveyed the areas surveyed by Res161-1, Res161-2 and Res161-3, and Mag161-1. Res161-4 and Mag161-2 also surveyed an expanded area encompassing the inner precinct around the cloistral complex, and the outer south and west precincts.	
Project type	Geophysical survey	
Site status	Scheduled Ancient Monument (SAM 27031) - HLE 1013280	
Previous work	1. Geophysical earth resistance and magnetometry surveys, 25-26 Jun 16. 2. Geophysical earth resistance survey, 8 Dec 16.	
Current land use	Pasture	
Future work	Further geophysical survey	
Monument type / period	Cistercian abbey / c.1147-1536	
Significant finds	None	
PROJECT LOCATION		
County	Cambridgeshire	
Site address	Sawtry Abbey, Sawtry	
Study area	Earth resistance 12,000m^2 Magnetometry 25,600m^2	
OS grid reference	TL19746 82565	
Height OD	8m aOD	
PROJECT CREATORS		
Organisation	Sawtry History Society	
Project brief originator	Sawtry History Society	
Project design originator	N/A	
Director/Supervisor	Phil Hill	
Project Manager	Kevin Redgate	
Sponsor or funding body	Sawtry History Society	
PROJECT DATE		
Start date	28 Mar 25	
End date	31 Mar 25	
ARCHIVES	Location	Content
Physical		
Paper		
Digital	SHS Archaeological Digital Archive	SHS Archaeological Digital Records and Media
BIBLIOGRAPHY		
Title	Geophysical Earth Resistance and Magnetometry Survey (28 - 31 March 2025) - Sawtry Abbey, Sawtry	
Serial title & volume	N/A	
Author(s)	Kevin Redgate	
Page numbers	18, plus 3 Annexes and 1 Enclosure	
Date	17 Sep 25	

1. **Introduction**.

1.1. A series of earthworks across the site of Sawtry Abbey provide an indication of the cloistral complex layout, along with suggestions of the choir monks' infirmary and guest house; these can be seen with good clarity on Google Earth (October 2008). Despite the clarity of these earthworks, the south and west ranges, choir monks' infirmary and guest house are incomplete, and there is no evidence of any service buildings (such as brewhouse, bakehouse, smithy and laundry, for instance) that are likely to have existed in the west precinct, nor is there any evidence of the gatehouse. The precinct was bounded by a ditch, but it is not known whether it was physically enclosed within a stone wall (a typical Cistercian practice) or a wooden palisade (wooden structures also being a typical Cistercian practice in the early foundation years of an abbey).

1.2. A geophysical survey was undertaken at Sawtry Abbey over the period 28-31 March 2025 by members of Sawtry History Society (SHS) and Barwood Archaeology Group. The survey was conducted as a SHS led community event for residents of Sawtry and members of the wider Jigsaw Cambridgeshire community of volunteer archaeologists. The overarching purpose of the survey was to determine the character and extent of any archaeological remains within the survey area, in accordance with the Jigsaw Cambridgeshire and Chartered Institute for Archaeologists' guidelines, specifically:

1.2.1. To determine as far as reasonably possible the presence/absence, location, nature, extent, and significance of any surviving archaeological deposits within the area. It will also determine the accuracy of drawings made by Inskip Ladds and ascertain whether they are a true reflection of the earthworks or were influenced by what he expected.

1.2.2. A further objective is to expand the survey area beyond that previously surveyed – particularly west and south of the cloistral complex, and to survey the cloistral complex itself at a higher sampling density.

1.2.3. The survey will also resolve surveying errors manifest in the previous survey data through experience gained from numerous subsequent surveys undertaken on various other sites.

2. **Site Details**.

2.1. **Event Number**. The event number allocated by Cambridgeshire County Council Historic Environment Team (CHET) is ECB7518.

2.2. **Location**. Sawtry Abbey site rests on the eastern parish boundary (Figure 2.1) in the eastern half of National Grid Reference (NGR) square TL1982 (Figures 2.2 and 2.3). Historically, this was located in the extreme northeast of the parish of Sawtry Judith.

Figure 2.1: Site relative to Sawtry (Google Earth, 2008)


Figure 2.2: Site relative to Sawtry (Ordnance Survey, 2006)

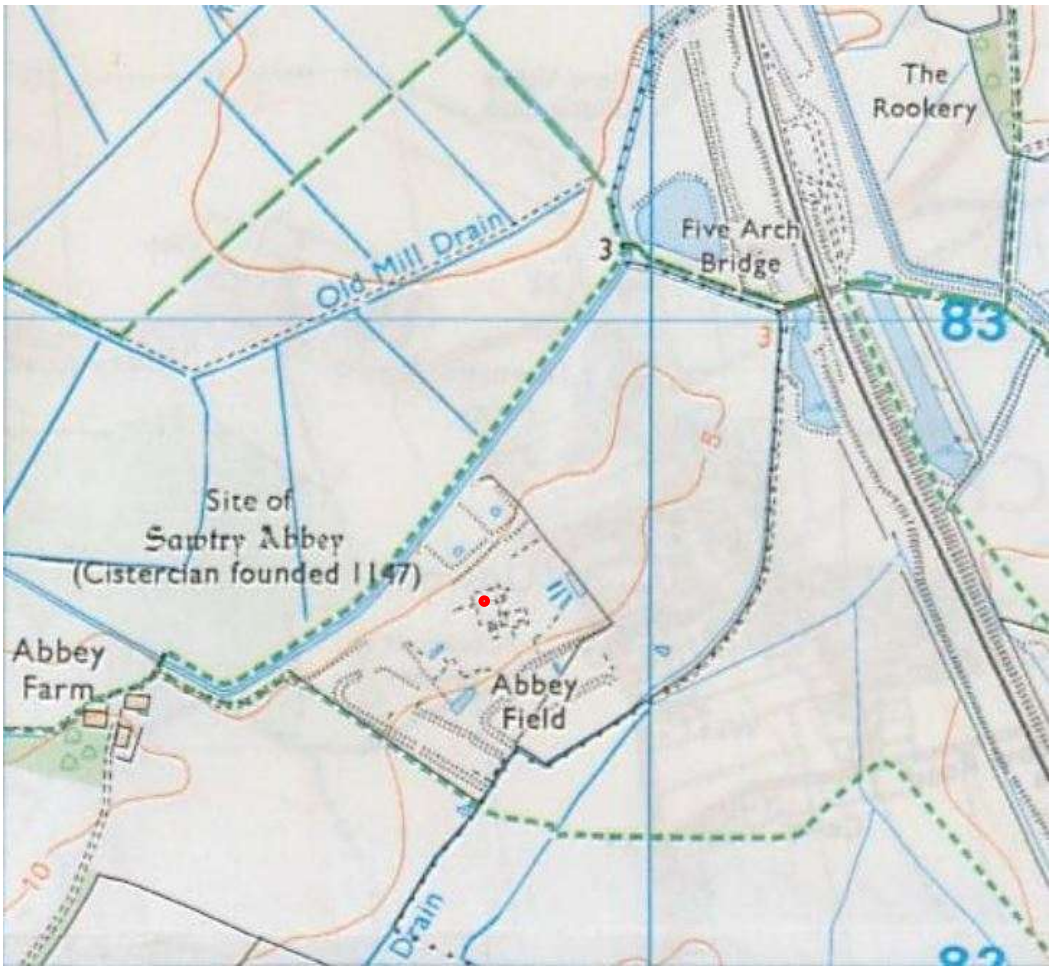

Figure 2.3: Sawtry Abbey site with SBM (red dot) (Ordnance Survey, 2006)

2.3. **Site Benchmark (SBM)**. The SBM has been set at the centre point of the southern nave wall of the abbey church at NGR TL 19746 82565 (Figure 2.3).

2.4. **Site Grid**. The site grid can be found at Annex A.

2.5. **Geology**. The site sits astride a narrow 5m contour on bedrock that is comprised of Oxford Clay Formation-Mudstone, with no superficial deposits, that lies directly below the top and sub-soils (Figure 2.4).

Figure 2.4: Site geology (British Geological Survey, 2017)

2.5.1. **Oxford Clay Formation-Mudstone**. A sedimentary bedrock formed approximately 157 to 166 million years ago in the Jurassic Period where the local environment was previously dominated by shallow seas. These sedimentary rocks are shallow-marine in origin and are detrital, ranging from coarse- to fine-grained (locally with some carbonate content) forming interbedded sequences.

2.6. **Protection**. Sawtry Abbey site is a Scheduled Monument under the Ancient Monuments and Archaeological Areas Act 1979 as amended, and is listed on the Historic England (HE) Heritage List (HLE 1013280). The area protected by scheduling is shown on Figure 2.5.

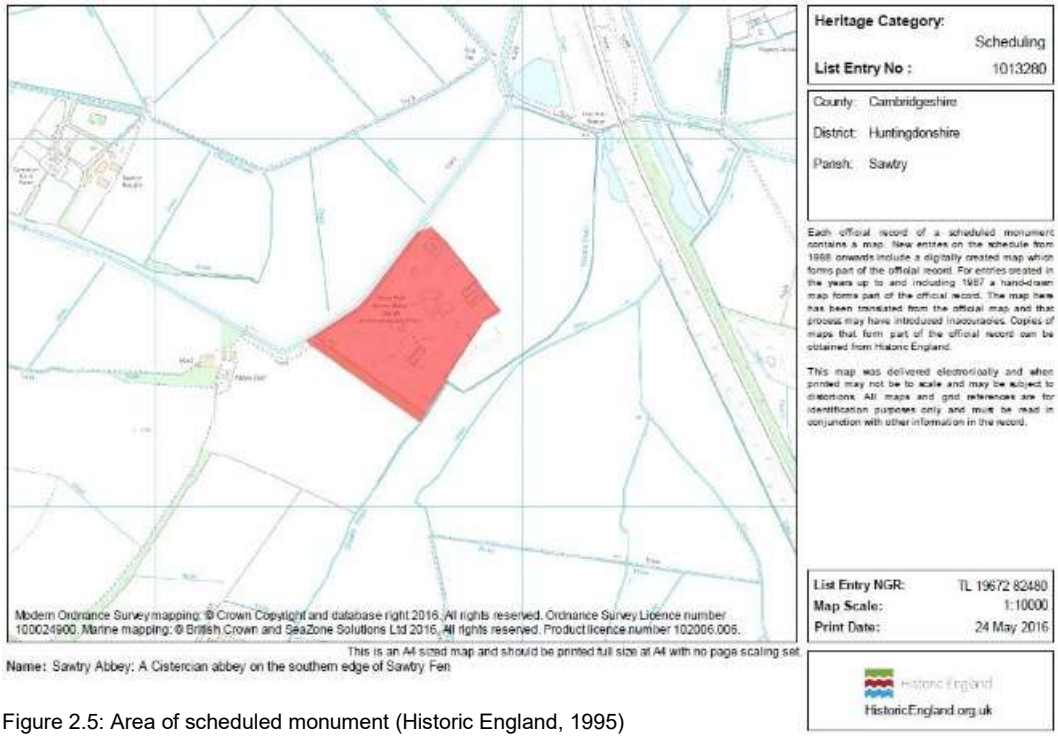

Figure 2.5: Area of scheduled monument (Historic England, 1995)

2.7. **Heritage Records**. Historic England National Heritage List for England (HLE) listings and Cambridgeshire Historic Environment Records (CHER) are either directly associated with (the location grid reference for the record relates directly to the site - Figure 2.6a), or related to (the location grid reference for the record lies within adjacent landscape - Figure 2.6b) the site, which contextualize the site within the archaeological landscape. Full details are contained in Annex E, Appendix 1.

2.7.1. **Directly Associated**.

Figure 2.6a: Directly associated heritage records (Google Earth, 2020)

HLE 1013280 Sawtry Abbey, A Cistercian abbey on the southern edge of Sawtry Fen
CHER CB15419 Sawtry Abbey

2.7.2. **Related**.

Figure 2.6b: Related heritage records (Google Earth, 2020)

HLE 1309479 Lowcote House
HLE 1330495 Grange Farm Cottage
CHER 00978 Abbey Farm, Sawtry
CHER 00979 Roman Coin, Abbey Farm, Sawtry
CHER 01021 Homestead Moat, Grange Farm, Sawtry
CHER 01303 Roman Coin, Thistle Hill, Sawtry
CHER 01548 Roman Coin, Sawtry
CHER 09809 Mound, Milne Close, Sawtry
CHER MCB20096 Post-Medieval Ditch and Modern Post Holes at Double Bank Lane, Sawtry
CHER MCB23363 Cropmarks of Rectilinear Enclosures, Northeast of Bottom Lodge Farm, Sawtry
CHER MCB30082 Undated Linear Settlement Complex, Northeast of Ede's Lodge, Sawtry
CHER MCB30083 Undated Ring Ditch, Sawtry
CHER MCB30084 Abbey Farm, Sawtry
CHER MCB30085 Undated Rectilinear Field System, Sawtry
CHER MCB30088 Neolithic Axe, Sawtry
CHER MCB30515 Cropmark Remains of Enclosures and Tracks

2.8. **Land Use**. The site is private land managed by AgReserves (UK) Ltd and is held in pasture for tenancy grazing.

2.9. **Utilities**. A water valve is located by the internal barbed-wire fence (⊗), from which a narrow diameter pipe runs along the fence line to supply the cattle water trough (⏛). There are no other known utilities within the site boundary (Figure 2.7).

Figure 2.7: Utilities map (Google Earth, 2008)

2.10. **Historical Background**.

2.10.1. Sawtry Abbey was founded in 1147 by Simon II de Senlis, Earl of Northampton and Huntingdon, with a founding colony of thirteen choir monks and a number of lay brothers from Warden Abbey in Bedfordshire. The community would have occupied wooden buildings in the first instance, with construction of the first stone buildings not starting before 1192; principle of which was the church, which was dedicated in 1238. The abbey was endowed with the entirety of the manor of Sawtry Judith, along with miscellaneous lands in Bedfordshire, Cambridgeshire, Lincolnshire, Northamptonshire and Norfolk. The manor house of Sawtry Judith would likely have served as the abbey's home farm, with two granges being later established by 1285; Old Grange - the possible location of which is the north edge of Archer's Wood, and New Grange - the location of which is the site of the current Grange Farm on Woodwalton Lane (B1090).

2.10.2. Sawtry Abbey was dissolved in May 1536 under the Suppression of Religious Houses Act 1535; which applied only to those religious houses with a yearly value of less than two-hundred pounds. Demolition of the abbey was done with a degree of care in order to maximize the quantity of building materials with a saleable value; it is believed the preparation and sale of materials took place in the adjacent field to the west of the abbey site. It is highly probable that of the masonry materials, only the facing stones along with stone architectural features such as columns, window arches and doorways were removed; with the wall rubble cores and much of the below ground structure being left in-situ. This hypothesis is supported to some degree by two known facts; firstly, an 1852 travel itinerary of the Great Northern Railway from London to York states that, 'On the left are the remains of

Sawtry Abbey…' (it is unlikely that attention to the remains would be made if they could not
be seen with any clarity from the moving train) whilst, secondly, the remaining stone features of the demolished abbey precinct were extensively robbed-out in the mid-19th century when a local landowner employed out-of-work railway labourers to remove all re-usable stone; the surviving earthworks suggest that, in addition to the removal of standing stone features, foundations were also excavated.

2.10.3. During the period 1907-1912 an extensive survey of the abbey site was undertaken by Sidney Inskip Ladds, Esq. which resulted in the publishing of an article in the Transactions of the Cambridgeshire and Huntingdonshire Archaeological Society, along with informed drawings (Figures 2.7 and 2.8). In June and December 2016, SHS undertook geophysical surveys of the abbey cloistral complex.

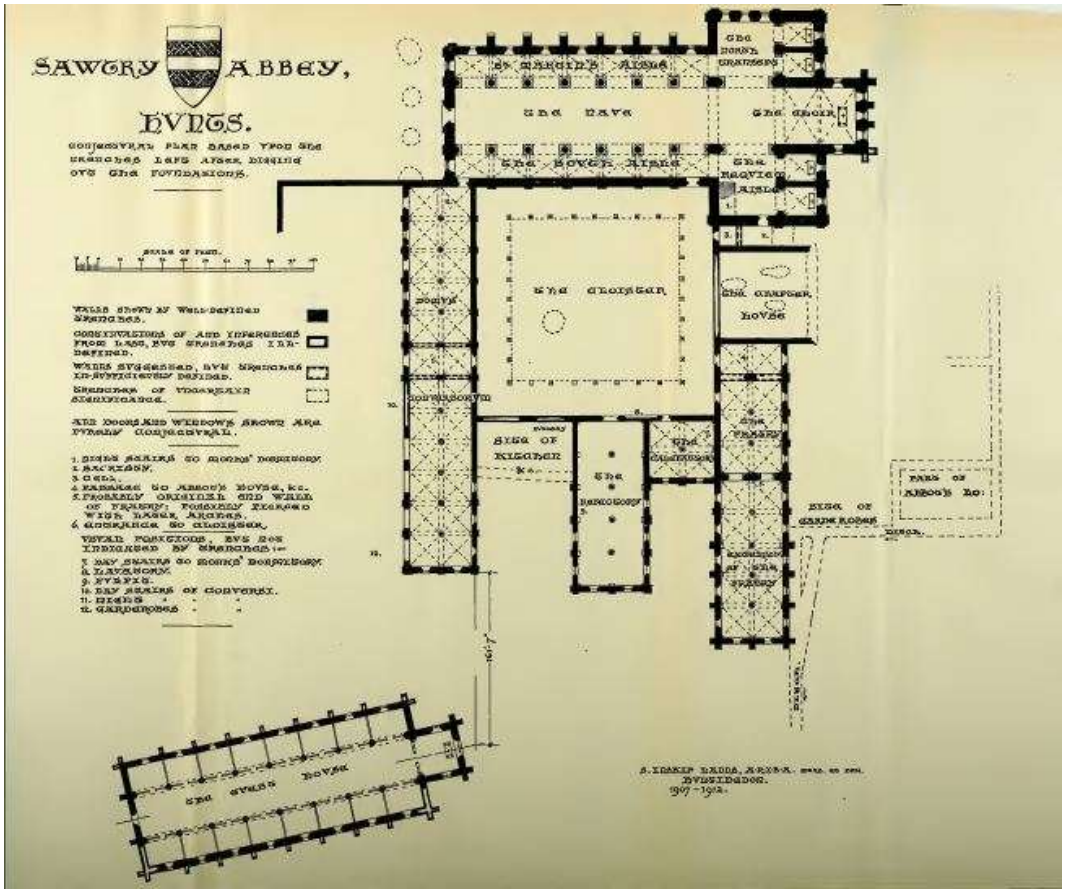

Figure 2.8: Abbey plan (Inskip Ladds, 1913)

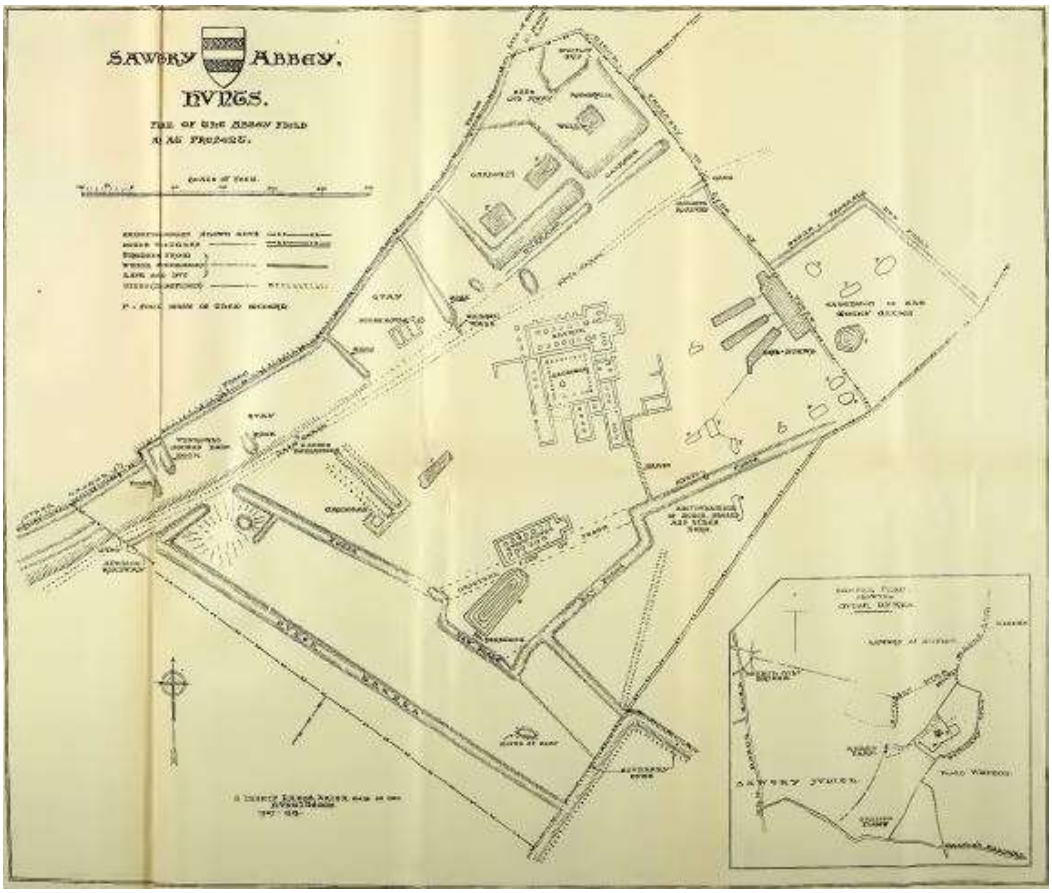

Figure 2.9: Abbey plan (Inskip Ladds, 1914)

3. **Methods**.

3.1. **Survey Areas**.

3.1.1. **Earth Resistance Survey 161-4**. The survey area consisting of thirty 20m x 20m squares was established from the site grid as shown at Figure 3.1.

Figure 3.1: Earth resistance survey 161-4 area (Google Earth, 2008)

3.1.2. **Magnetometry Survey 161-2**. The survey area consisting of sixteen 40m x 40m squares was established from the site grid as shown at Figure 3.2.

Figure 3.2: Magnetometry survey 161-2 area (Google Earth, 2008)

3.1.3. **Consolidated Survey Areas**. The consolidation of the Earth Resistance Survey 161-4 area and Magnetometry Survey 161-2 area is at Figure 3.3.

Figure 3.3: Consolidated survey areas (Google Earth, 2008)

3.2 **Earth Resistance Survey**. Earth Resistance Survey 161-4 survey was carried out using the Geoscan Research RM85 Resistance Meter System and PA20 Probe Array assembly. Each survey square consisted of twenty traverse lines with readings being taken at one metre intervals along each traverse. The survey started in the northwest square of

the survey area, traverses in each survey square started in the northwest corner and followed a south-north zig-zag pattern to end in the southeast corner. The Survey Record Sheet is at Annex B.

3.3. **Magnetometry Survey**. Magnetometry Survey 161-2 survey was carried out using the Bartington Fluxgate Gradiometer Grad601 with twin sensor. Each 40m x 40m survey square consisted of 40 traverses, with 160 samples along each traverse. The Survey Record Sheet is at Annex B.

4. Results.

4.1. **Earth Resistance Survey 161-4**. Survey data was imported into Snuffler (version 1.32) as a single data set. The data plots at Figures 4.1 to 4.5 are presented in the default linear display option and greyscale display type; other display options and types are provided at Annex C:

black = low resistance; pits, ditches, clay dumps
white = high resistance; walls, rubble, paving areas
red = areas not surveyed
linear = display colour blocks are assigned to equal ranges of values
non-linear = display colour blocks are assigned to equal numbers of readings
relief plot = displays results as a 3D image
- high resistance readings are high points
- low resistance readings are low points

4.1.1. **Raw Data Plots**. Raw data plots are provided in pairs; the first plot without grid lines in order to present an uninterrupted picture, the second plot with grid lines in order to aid with orientation (Figure 4.1).

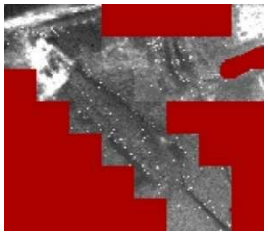
Figure 4.1a: Raw data

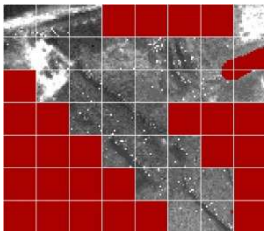
Figure 4.1b: Raw data

4.1.2. **Corrected Data Plots**. Corrected data plots are provided in pairs; the first plot without grid lines in order to present an uninterrupted picture, the second plot with grid lines in order to aid with orientation. Correction to the raw data was applied in two stages, firstly through the application of clip, de-spike and edge correction (Figure 4.2) and secondly through the further application of sharpen (Figure 4.3).

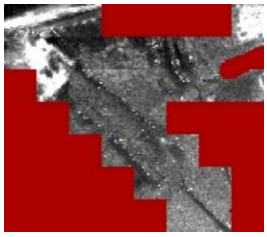
Figure 4.2a: Corrected data #1

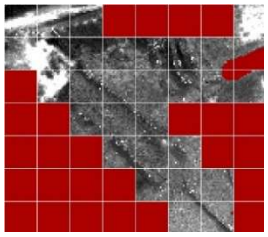
Figure 4.2b: Corrected data #1

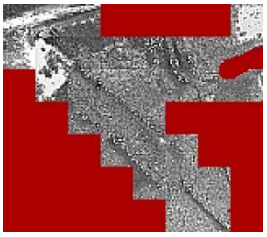
Figure 4.3a: Corrected data #2

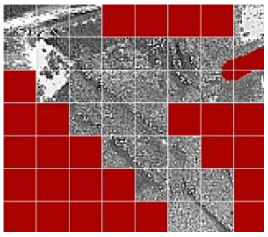
Figure 4.3b: Corrected data #2

4.1.3. **Filtered Data Plots**. Filtered data plots are provided in pairs; the first plot without grid lines in order to present an uninterrupted picture, the second plot with grid lines in order to aid with orientation. The corrected earth resistance data plots in

Figures 4.2 and Figures 4.3 were both filtered by the application of interpolate (x2) (Figures 4.4 and 4.5).

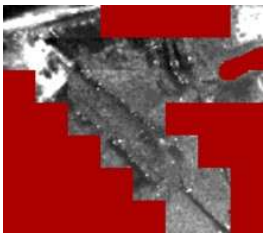
Figure 4.4a: Filtered data #1

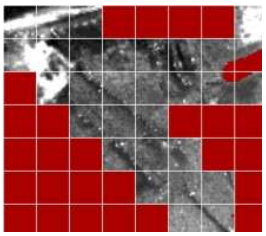
Figure 4.4b: Filtered data #1

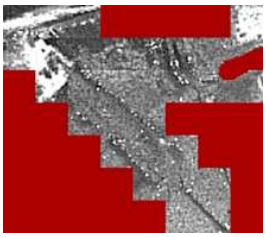
Figure 4.5a: Filtered data #2

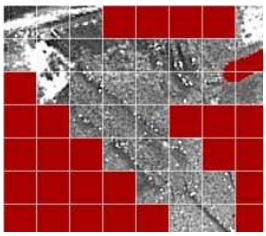
Figure 4.5b: Filtered data #2

4.2. **Magnetometry Survey 161-2**. Survey data was processed using TerraSurveyor version 3.0.37.3 and corrected by de-striping and clipping -10 to +9nT (nanotesla). Results are presented in a greyscale display as a pair in Figure 4.6; the first plot without grid lines in order to present an uninterrupted picture, the second plot with grid lines in order to aid with orientation shown.

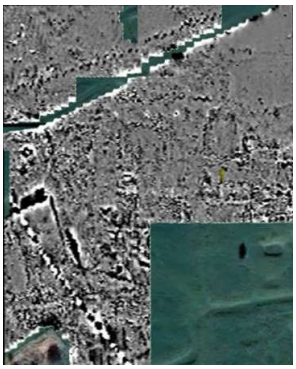
Figure 4.6a: Processed data

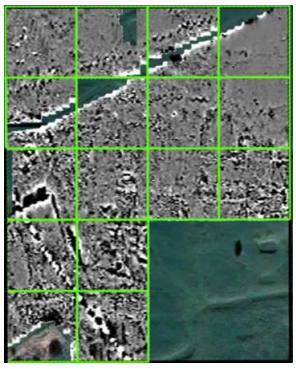
Figure 4.6b: Processed data

5. **Analysis**.

5.1. **Earth Resistance Survey 161-4**. The filtered results in Figures 4.4 and 4.5, reproduced here as Figures 5.1 and 5.2, show a number of distinct anomalies that are discussed below. Survey squares are numerically referenced from left to right and bottom to top.

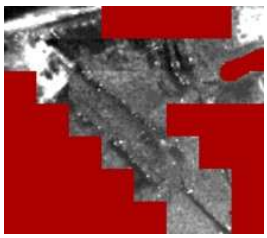
Figure 5.1a: Filtered data #1

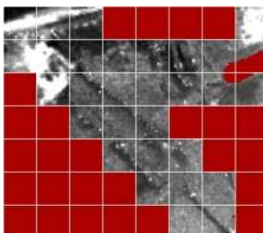
Figure 5.1b: Filtered data #1

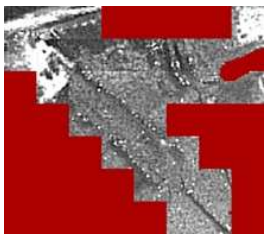
Figure 5.2a: Filtered data #2

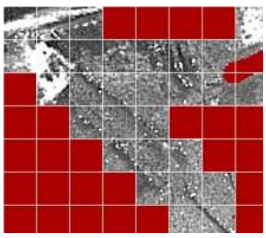
Figure 5.2b: Filtered data #2

5.1.1. The strong high resistance anomaly in squares 1,6, 2,5 and 2,6 is very probably evidence of the gatehouse that was predicted to be in that vicinity; the linear and angled form of the anomaly suggests that demolition rubble is predominantly contained within the footprint, which further suggests the possible existence of in-situ wall foundations, or the form of the anomaly is indicative of in-situ flooring, again within the footprint - or both.

5.1.2. The strong high resistance linear anomaly in squares 1,7, 2,7 and 3,7 is believed to be associated with the gatehouse, with the small north protrusion at the east side of square 1,7 possibly indicating the location of the gate itself within the gatehouse complex.

5.1.3. The linear series of three weak high resistance anomalies are likely to be hard-core reinforcement within the existing track.

5.1.4. The medium strength low resistance linear anomaly on a northwest/southeast alignment in squares 3,5, 4,5, 4,4, 5,4 and 6,3 aligns with the documented west boundary ditch, that is a clearly visible earthwork. The anomaly is representative of the ditch base and not the true width of the ditch at ground level, which is approximately 5m in width. There is no associated high resistance anomaly on either edge of the ditch which suggests the abbey was not enclosed by a stone wall; further suggesting that, if the abbey was physically enclosed, this is likely to have been by a wooden palisade. This anomaly (and the ditch itself) form a perfect southeast continuation of the northeast face of the above high resistance anomaly evidenced as the gatehouse (para 5.1.1), reinforcing the assessment of that anomaly.

5.1.5. The stronger series of non-contiguous low resistance linear anomalies in squares 2,5, 3,4, 4,3, 5,3 and 5,2 that are parallel with, and southwest of, the boundary ditch (para 5.1.4) are also clearly visible as earthworks where the anomaly is also representative of their respective bases and not their true widths at ground level, which varies considerably with each feature in the series; these are possibly evidence of documented clay quarrying for a small post-dissolution brickworks located south of the abbey precinct boundary (Historic England, 1995).

5.1.6. The strong low resistance linear anomaly on a northwest/southeast alignment in squares 6,2, 6,1 and 7,1 aligns with the documented modification to the west boundary ditch that was made to enable construction of the stone guest house (Inskip Ladds, 1914: 341).

5.1.7. The strong high resistance anomaly in square 8,7 and straddling into square 8,6 is very probably evidence of a workshop or other utilitarian building typically found in the 'cellarer's domain' of the west precinct (France, 2012); although, which activity cannot be determined from geophysics data alone. Similar to the anomaly assessed as the gatehouse (para 5.1.1), the linear and angled form of this anomaly suggests that demolition rubble is predominantly contained within the footprint, which also suggests the possible existence of in-situ wall foundations, or the form of the anomaly is also indicative of in-situ flooring, again with the footprint - or both.

5.1.8. The narrow strong low resistance linear anomaly in the northeast of square 7,2 is likely to be an element of the abbey water management system; whether it is supplying fresh water or draining waste cannot be determined from the geophysics data alone.

5.1.9. The narrow strong high resistance linear anomaly at the east end of square 8,5 (visible in Figure 5.1a, but masked by the grid lines in Figure 5.1b) has a north-northwest/south-southeast alignment with a possible right-angled return to the east suggesting possible walls.

5.1.10. North of the strong high resistance linear anomaly in square 1,7 is a strong low resistance mass suggesting an indeterminate below ground pit or depression that actively retains moisture.

5.1.11. Strong low resistance masses in squares 2,6, 3,7 and 3,6, south of the track and northeast of the assessed gatehouse, are also suggestive of indeterminate below ground pits or depressions that actively retain moisture.

5.1.12. A strong low resistance mass in the northwest corner of square 5,6, and elongated strong low resistance anomaly in the centre of the same square, and a pair of strong low resistance linear anomalies on a north-northwest/south-southeast

alignment in squares 6,6 and 6,5 are reflective of the base of multiple undulating variformed earthworks that are not their true widths at ground level, which varies considerably with each feature; these also are possible evidence of documented clay-pits clay quarrying for a small post-dissolution brickworks located south of the abbey precinct boundary (Historic England, 1995).

5.2 **Magnetometry Survey 161-2**. The results in Figure 4.6, reproduced here as Figure 5.3, show a number of distinct anomalies that are discussed below. Survey squares are numerically referenced from left to right and bottom to top.

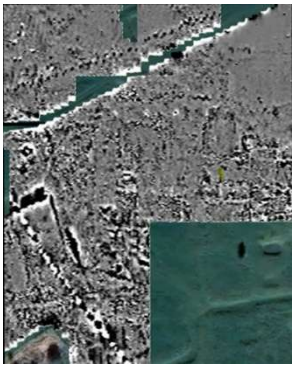

Figure 5.3a: Processed data #1

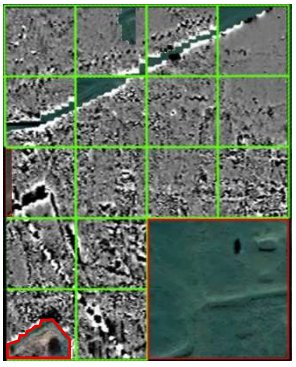

Figure 5.3b: Processed data #1

5.2.1. The areas bordered in red are unsurveyed areas; the square area with no grid lines is outside the survey area and the areas in squares 1,1 and 1, 3 are parts of water features.

5.2.2. The alternating black/white linear feature on a northwest/southeast alignment that extends from the water feature in square 1,3 through squares 1,2 and 2,1, is assessed as an active water channel (the alternating black/white anomaly indicative of flowing water); this may be a water management drain for the water feature.

5.2.3. A series of black linear features in squares 1,3, 1,2 and 2,2 are assessed as being channels of the abbey's water management system.

5.2.4. The large black anomaly in square 1,3 measures approximately 16m x 8m and is undetermined but, due to its proximity to the above mentioned features, may have an association with either or both of them.

5.2.5. A weak linear response immediately north of the water feature in square 1,1 has the appearance of straight north and west edges (approximately 38m x 9m) and is suggestive of the guest house recorded as being in this vicinity (Inskip Ladds, 1913: 306).

5.2.6. The black anomaly on the north edge of the water feature in square 1,1 is within the assumed guesthouse; unfortunately, it cannot be determined whether this is a feature of the guesthouse.

5.2.7. The small anomaly with a white centre, surrounded by black and edged white on the juncture of squares 1,3 and 1,4 is suggestive of an enclosed feature with a central structure; such as a workshop or other utilitarian building typically found in the 'cellarer's domain' of the west precinct (France, 2012).

5.2.8. The linear feature formed of a series of small black anomalies on an east-northeast/west-southwest alignment across squares 1,4, 1,5, 2,5 and 3,5 is assessed as being a section of the north precinct boundary; the individual anomalies are relatively uniform in size (approximately 2m x 1m) with 2m - 4m spacings, and suggests the boundary, here at least, was of a wooden palisade type.

5.2.9. A faint 'ripple' anomaly in squares 4,4 and 4,5, east of the church in the vicinity of where the cemetery would typically be located, is possibly evidence of burial activity spanning some four-hundred years; this anomaly covers an area approximately 37m x 30m within the survey results, but may well extend further eastwards.

5.2.10. The cluster of black anomalies in square 2,1 are not considered as being geological and are, therefore, suggestive of undetermined monastic activity.

5.2.11. The cluster of black and white anomalies in squares 2,2 and 2,3 are also not deemed to be geological and are also suggestive of monastic activity due to their proximity to the west and south ranges.

5.2.12. The cloistral complex of church, east, south and west ranges around a central garth is ephemerally evident in squares 2,3, 2,4, 3,3 and 3,4 which aligns with features identified in the SHS 2016 earth resistance geophysical survey and Inskip Ladds 1914 plan, with two exceptions:

5.2.12.1. Firstly, the west range in the results in squares 2,3 and 2,4 is approximately fifty percent wider.

5.2.12.2. Secondly, are parallel east/west aligned black linear anomalies at the north end of the west range in square 2,4 which are suggestive of a potential annex; a feature that is not common within the typical Cistercian abbey plan.

6. **Summary**.

Figure 6.1: Combined earth resistance and magnetometry results overlaying Google Earth, 2022

6.1. The survey was successful in that it validated the 1914 Inskip Ladds plan and provided compelling evidence and location of the gatehouse and one of the workshop or

utilitarian buildings typically found in the west precinct. It also provided evidence of the north precinct boundary location and the likelihood of it being of timber palisade construction along with the west boundary ditch with modification, that also suggested the likelihood of a wooden palisade boundary due to the lack of evidence for a stone wall. The survey also indicated the north and south extents of the cemetery, and evidence of monastic activity south of the cloistral complex for which there are no evident earthworks. Furthermore, the survey provided evidence of a possible structure at the north end of the west range (not typically seen on Cistercian abbeys), and an active water channel that appears to be associated with the west water feature.

6.2. The survey also provided volunteers with a basic overview of geophysical earth resistance survey procedures, the principals of setting out a survey grid and the process of conducting a geophysical survey.

7. **Recommendations**.

7.1 **Further Geophysical Survey**.

7.1.1. Although the combined earth resistance and magnetometry surveys were comprehensive in their coverage of the site, there are unsurveyed areas within which potential archaeological anomalies are anticipated, for which future geophysical earth resistance or magnetometry surveys are proposed, as indicated by yellow in Figure 7.1.

7.1.2. Should the opportunity arise to undertake a geophysical ground penetrating radar survey arise, it is proposed that this should encompass the cemetery, the church, the chapterhouse, the garth and arcades, and the potential gatehouse anomaly, as indicated by blue in Figure 7.1.

Figure 7.1: Proposed further survey areas (Google Earth, 2008)

7.2. **Excavation**. A number of anomalies (Figure 7.2) would warrant further investigation by targeted excavation should the opportunity and consent arise:

Figure 7.2: Proposed excavation locations (Google Earth, 2008)

7.2.1. **The Gatehouse**. In order to confirm this anomaly is indeed the gatehouse. Also, to determine its size and plan, and whether its height can be established by any surviving wall evidence. Additionally, identify whether there are separate entrances for carts and pedestrians (as suggested by Jamroziak, 2013: 170), or a single entrance for both cart and pedestrian (as indicated by the survey results), and width. Finally, to ascertain any evidence of accommodation by the Porter (Jamroziak, 2013: 170).

7.2.2. **The Possible Workshop or Utilitarian Building**. In order to determine its size and plan, and whether its height can be established by any surviving wall evidence. Furthermore, to identify what activity or activities were undertaken within the building.

7.2.3. **The Possible Annex at the North End of the West Range**. As this is not a common feature in Cistercian abbeys, determine whether this is indeed an annex to the west range, or just a coincidental anomaly. Additionally, confirm its size and plan, and whether its height can be established by any surviving wall evidence. Finally, ascertain its purpose.

ANNEXES

A. Site Grid.
B. Sawtry History Society Geophysical Survey Record Sheets.
C. Additional Data Plot Display Options and Composite Plots.

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