



**Report on an Archaeological Watching Brief at South Park
Moat, Grayswood, Surrey**

January 2018

NON-TECHNICAL SUMMARY

This document sets out the results from an archaeological watching brief carried out at South Park Moat, Grayswood, Surrey during works to seal a leak to the dam. The dam forms part of a medieval moated site which is a Scheduled Monument (No.1012791).

The results confirm the findings of previous archaeological works at the site, that the dam is principally composed of sand/sandstone, although the present works did not extend to a depth sufficient to penetrate to the buried soil beneath, observed in those earlier works. The cause of the present leaks was found to be the poor quality of the seal between the current sluice and the dam to the north. A new seal of Benonite clay was inserted, as had been done in 2004 on the south side of the sluice.

PROJECT BACKGROUND

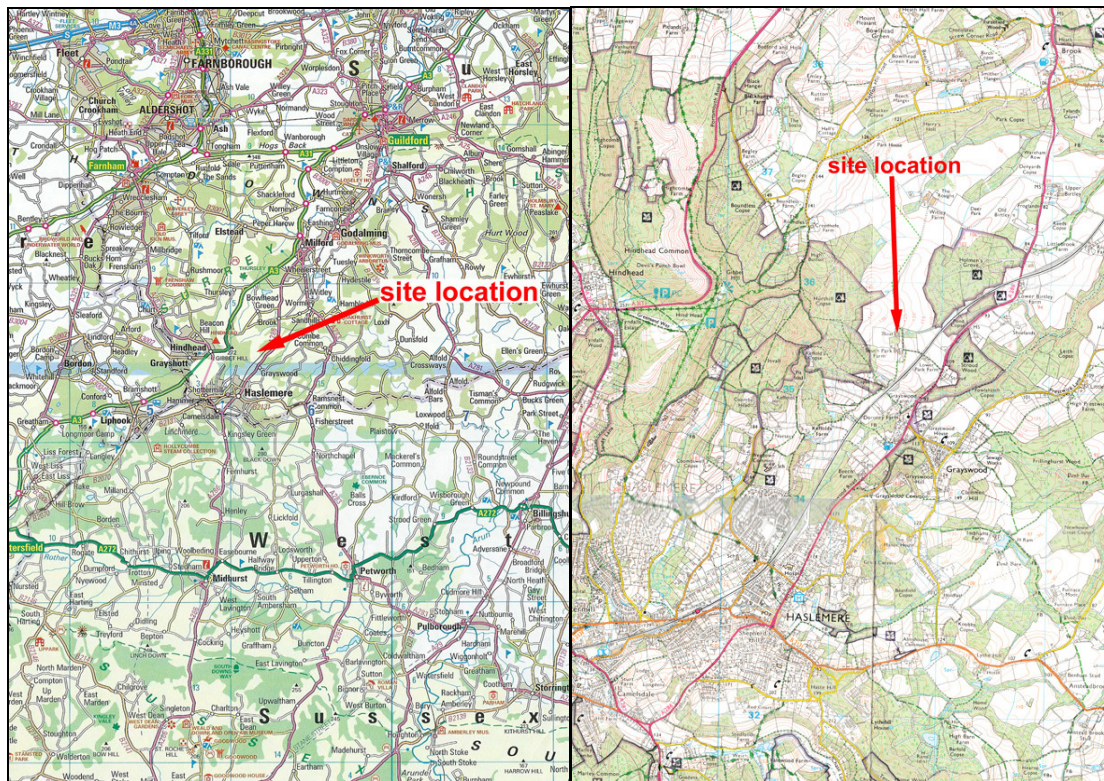


Figure 1 Site location. © Crown copyright. All rights reserved. License number: AL100036068

1. South Park Moat lies c.3km to the north-east of the town of Haslemere in Surrey and 0.5km to the west of the A286. It sits on the lower slopes of a hill running down to a stream, c.0.8km to the east of the site, and is at OS grid reference SU 9159 3553. Geologically the site lies on the Weald Clay Formation.
1. The owner of South Park Moat, Mr. B. Tempest, is seeking to seal a leak to the existing dam which forms the eastern side of the current moat. The leak is situated immediately to the north of the dam's sluice gate. Since the site is a Scheduled Monument (No.1012791) an application was made for Scheduled Monument Consent (SMC) in order to carry out the works. The resulting consent included a condition that any works be carried out in accordance with an approved Written Scheme of Investigation (WSI). West Sussex Archaeology Ltd (WSA) was appointed by the landowner to draw up such a WSI (WSA 2017) and to carry out the ensuing archaeological works.
2. This report details the results of that archaeological work, which was carried out on the 24th November 2017 by George Anelay of WSA. The project archive, which consists solely of paperwork, will be deposited with Haslemere Museum.

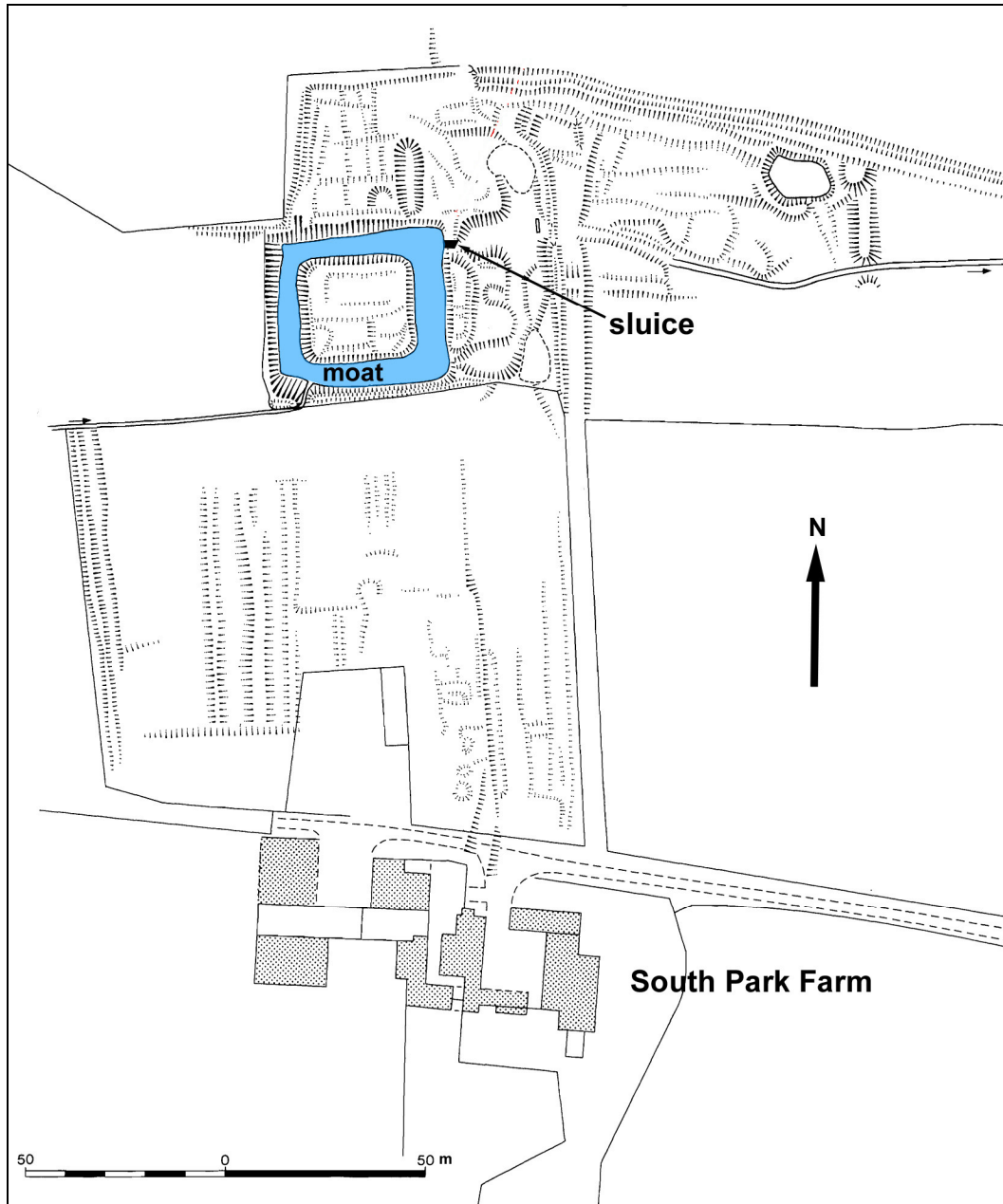


Figure 2 Plan showing the moated site and the sluice

HISTORICAL BACKGROUND

1. The moated site at South Park Farm is thought to have its origins in the Saxo-Norman period, on the basis of a limited number of artefacts of that date found at the site; however the construction of the moat itself was undertaken later in the medieval period. It has been suggested that the surviving remains testify to more than one phase of development, with the existing island containing the remains of the buildings associated with its later usage. These buildings are thought to be those of the manor house of Ashurst (Graham & Graham 2000). However no significant known archaeological excavations have been undertaken at the site.

2. The existing stone sluice, set within the dam forming the eastern wall of the moat, was constructed in the 1990's, following the removal of an earlier 1950s clay and timber sluice (Graham & Graham 2000). A repair to the dam, at a point to the south of this sluice, was carried out in July 2004 by members of Surrey Archaeological Society supervised by David Graham. This consisted of the cutting of a 40cm wide, 4m long and 2m deep slit trench, roughly centrally to the dam from the south edge of the sluice. The resulting trench was then backfilled with Bentonite to seal the leak. No finds of archaeological material were made, but a section through the dam was recorded, revealing it to be mainly composed of sand and sandstone sitting on the natural Weald Clay (Graham 2004).

RESULTS

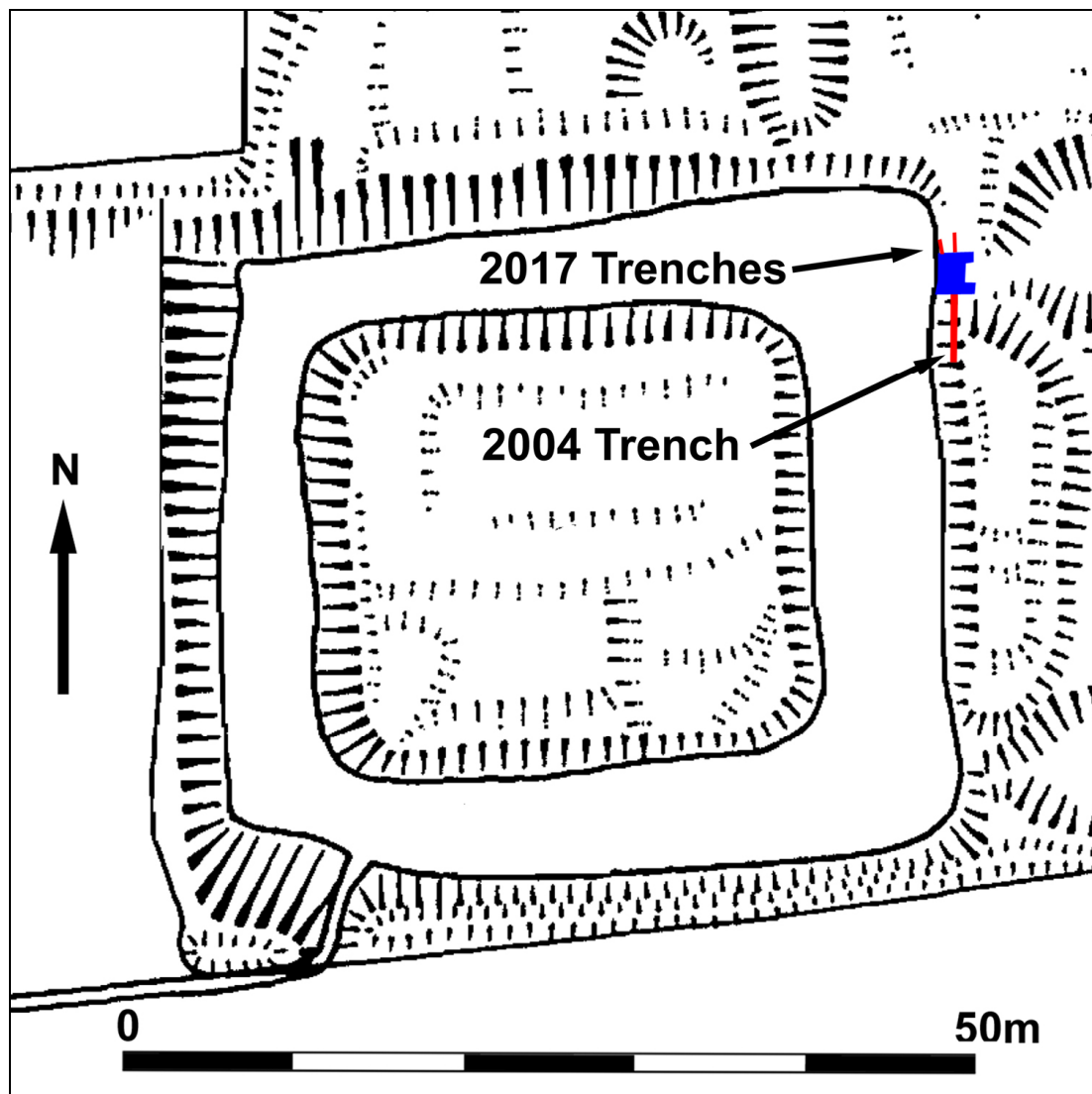


Figure 3 Plan of the 2004 and 2017 trenches. The existing sluice is marked in blue

1. The original intention of these works had been to simply replicate the repair undertaken in 2004, on the south side of the sluice, this time on the north side. Accordingly a north-south running trench, c.0.4m wide, c.2.15m long and c.1.4m deep, was mechanically excavated immediately to the north of the sluice along the centre of the dam. In the event the design of the existing sluice turned out to be rather different from that anticipated. It had been assumed that it consisted of two parallel stone walls running from front to back of the dam, with the sluice pipe and channel running between. In reality what was revealed were two pairs of concrete pillars either side of the gates at front and back, but with no wall in between. If a seal were to be placed within the trench as excavated in its intended position, it would have done little to halt the leaking of water from east to west, since there was nothing solid to butt the sealant against. In the light of this a second trench was cut c.1.4m to the west, and butting up against the north side of the north-west pier of the sluice. This trench was again c.0.4m wide, but only c.1.6m long and c.1m deep.
2. Both trenches revealed the same deposits: against the sides of the sluice, and extending c.1.2m to the north, was a mixed deposit of sandstone, clay and loose silts. There were frequent signs of root action, which had probably had the effect of further loosening this material, and thereby permitting the constant leak around the north side of the sluice. To the north of this deposit, and extending beyond the limits of the trench, was a more consistent layer of yellow/brown sand/sandstone, as had been found in the 2004 works to the south. This sand/sandstone forms the original dam, running north-south, with the more mixed material being the backfill associated with the various phases of sluice gate. Neither trench penetrated to a depth sufficient to reveal the underlying buried soil recorded to the south in 2004.
3. Once the base of the north-western sluice pier had been reached, excavation ceased, and the southern end of the western trench was backfilled with Bentonite clay, pressed up against the pier, to make the necessary watertight seal, with the top c.0.3m finished off in concrete. The remainder of the trench, and the whole of the eastern trench, were backfilled with their own spoil. Due to the narrowness of the trenches, and the instability of the sides, no attempt was made to enter them to clean and record in detail the sections, instead a photographic record was made, together with an annotated plan, including observations of what was visible from the surface.



Figure 4 The eastern trench, looking north-east



Figure 5 The western trench, looking south-west



Figure 6 The western trench after sealing and backfilling, looking south towards the sluice

CONCLUSION

1. The effectiveness of the works to seal the leak to the sluice at South Park Moat will only be revealed over time, but it is hoped that the insertion of a block of Bentonite clay within the western trench will at least considerably reduce the problem. The composition of the dam itself, consisting as it does of a rather porous sand/sandstone, is not the ideal material to hold back a body of water, and this is exacerbated by historically poor seals created between it and its sluice. At some point a decision may have to be made, should leaks continue to appear, that a more fundamental re-building of the sluice, and the dam either side of it, will need to be undertaken.

BIBLIOGRAPHY

Graham, D & Graham A. 2000. *The moated site at South Park Farm, Grayswood*. In Surrey Archaeological Collections, 87, 127-145.

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