# ERECTION OF INTERPRETATION BOARDS, DEEP GROVE QUARRY, FOSS CASTLE AND OLD MULGRAVE CASTLE, LYTHE, NORTH YORKSHIRE

ARCHAEOLOGICAL OBSERVATION, INVESTIGATION AND RECORDING

Ed Dennison Archaeological Services Ltd 18 Springdale Way Beverley East Yorkshire HU17 8NU

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# ARCHAEOLOGICAL OBSERVATION, INVESTIGATION AND RECORDING

Report no: Version: Date: Author: Ed Dennison

2020/615.R01 Final December 2021

Ed Dennison Archaeological Services Ltd 18 Springdale Way On behalf of Beverley East Yorkshire HU17 8NU

The Mulgrave Estate Estate Office **Mulgrave Castle** Lvthe North Yorkshire YO21 3RJ

## ARCHAEOLOGICAL OBSERVATION, INVESTIGATION AND RECORDING, ERECTION OF INTERPRETATION BOARDS, DEEP GROVE QUARRY, FOSS CASTLE AND OLD MULGRAVE CASTLE, LYTHE, NORTH YORKSHIRE

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#### **EXECUTIVE SUMMARY**

In November 2021, Ed Dennison Archaeological Services (EDAS) Ltd were commissioned by the Mulgrave Estate to undertake a programme of archaeological observation, investigation and recording (a watching brief) during limited excavations associated with the erection of three interpretation boards at Deep Grove Quarry, Foss Castle and Old Mulgrave Castle, in Lythe, North Yorkshire (NGRs NZ 85764 13863, NZ 83120 11752 and NZ 83918 11681 respectively).

All three sites are Scheduled Monuments (National Heritage List for England 1018139, 1018286 and 1015113 respectively), and the watching brief work was a requirement of the respective Scheduled Monument Consents, all granted by the Secretary of State for Digital, Culture, Media & Sport and confirmed by Historic England on 8th November 2021 (refs S00241983, S00241984 and S00241895 respectively). Each interpretation board required the excavation of four small holes measuring 300mm-250mm square by 250mm-300mm deep to accommodate the leg supports of the lectern-type stand.

No significant archaeological deposits or features were revealed by the limited excavations. One find at the Deep Grove quarry board site, a corroded iron railway spike, was associated with the now abandoned former railway line. The single deposit seen in the Foss Castle board site was not of archaeological interest, and deposits seen in the Old Mulgrave Castle board excavations were related to the landscaping of the interior of the castle following the 1995-2000 repair and consolidation work.

## 1 INTRODUCTION

- 1.1 In November 2021, Ed Dennison Archaeological Services (EDAS) Ltd were commissioned by the Mulgrave Estate to undertake a programme of archaeological observation, investigation and recording (a watching brief) during limited excavations associated with the erection of three interpretation boards at Deep Grove Quarry, Foss Castle and Old Mulgrave Castle, in Lythe, North Yorkshire (NGRs NZ 85764 13863, NZ 83120 11752 and NZ 83918 11681 respectively) (see figure 1).
- 1.2 All three sites are Scheduled Monuments (National Heritage List for England 1018139, 1018286 and 1015113 respectively), and the watching brief work was a requirement of the respective Scheduled Monument Consents, all granted by the Secretary of State for Digital, Culture, Media & Sport and confirmed by Historic England on 8th November 2021 (refs S00241983, S00241984 and S00241895 respectively). Each interpretation board required the excavation of four small holes measuring 300mm-250mm square by 250mm-300mm deep to accommodate the 65mm square leg supports.

## 2 SITE LOCATIONS AND SUMMARY DESCRIPTIONS

#### Introduction

2.1 The following details relating to the archaeological and historical information for each of the specific three sites have been collated from the research undertaken for the production of the interpretation boards.

#### **Deep Grove Quarry**

- 2.2 The Deep Grove quarry interpretation broad was located on the south-west side of an abandoned railway track, adjacent to recently installed fencing and gates, towards the south-east corner of the former quarry to the north of Sandsend (at NGR NZ 85764 13863) (see figure 2); together with other quarries to the south, it was first scheduled on 29th April 1998 (SM 29539; NHLE 1018139). The former railway track forms part of the Cleveland Way National Trail and the England Coastal Path. The board uses text, photographs, a newly-commissioned aerial photograph and contemporary illustrations to explain how the quarry was worked to extract alum shale, which was then processed to produce alum, a chemical mainly used in the textile industry for fixing dyes.
- 2.3 The quarry is one of several along this part of the North Yorkshire coast, and it operated from around 1720 until 1860; all the workings were dug out by hand using picks and shovels. Edmund Lord Sheffield, later Earl Mulgrave, initially started inland production at Sandsend and Ash Holm around 1610, and these works operated for some 120 years with 1,300 tons of alum being produced in 1635. There was a significant expansion in the industry during the 18th century, helped by the excavation of new quarries along the coast. A new alum house was also built in Sandsend, from where alum could be shipped out and coal and other raw materials brought in. However, from the mid-19th century, increasing competition from elsewhere in Britain meant the Yorkshire works became less profitable, and the last alum works at Kettleness and Boulby were closed in 1871.
- 2.4 Once the significant overburden of boulder clay and 'dogger' sandstone was removed, the excavated alum shale was burnt on the quarry floor in large calcining heaps or clamps. These clamps could be up to 15m high and were fired with

brushwood and coal, and a single burn could last for up to a year. The burnt shale was then flushed with fresh water in steeping tanks to produce an aluminium sulphate solution known locally as 'liquor'. Once the impurities were separated out, the 'strong liquor' was fed to by gravity along wooden pipes or troughs to the alum house where it was processed. This involved repeated boiling and the addition of human urine and seaweed, to produce a saturated solution (the 'mother liquor'). This was then cooled in wood-lined tanks where alum crystals formed. These were washed and dissolved in fresh water in collapsible roaching casks, to produce a solid block of crystals, which was cut up for transportation. At its height, some 150 people were employed at the Sandsend works, although few quarrymen were full-time. The whole process was very polluting, and visitors complained of sulphurous smells and choking fumes produced by the burning clamps and alum house.

2.5 In 1871, after the quarry had been closed, the Whitby to Middlesbrough Railway was constructed along the coast, through Deep Grove and the other Sandsend quarries. The railway embankment buried the Deep Grove steeping pits but the quarry faces and spoil heaps remain visible, as well as possible clamp mounds and heaps from later cementstone mining, and the 'lunar landscape' to the east formed by large quantities of unprocessed and waste shale. The railway opened in December 1886 and closed in May 1958.

#### **Foss Castle**

- 2.6 The Foss Castle interpretation board lies adjacent to the entrance into the site, on the east side of a public footpath which runs south from High Leas farm to cross the Barney Beck (at NGR NZ 83120 11752) (see figure 3); the site was first scheduled on 11th March 1974 (SM 20536; NHLE 1018286). The board uses text, photographs, a LIDAR (light detection and ranging) survey image, l'Anson's 1913 archaeological survey and a reconstruction drawing of a similar site at Driffield (East Yorkshire) to explain the function and likely layout of the motte and bailey castle.
- 2.7 The prominent earthworks of Foss Castle (sometimes known as Lythe Castle) overlook a precipitous gorge on their south side. Although now surrounded by woods, the site would have been in a more open landscape when first built. The earthworks are likely to have developed in a number of different phases. The area has long-standing Anglo-Saxon associations, and nearby Lythe church contains an important collection of Anglo-Scandinavian stone 'hogback' grave markers dating to the 8th-10th centuries. This, and other folklore evidence, has prompted suggestions that the castle may have originated at the same time as a small, possibly defended, enclosure.
- 2.8 Foss Castle was established in the early 1070s by Nigel Fossard. He was a major Norman landowner with extensive estates and several castles held throughout Yorkshire and elsewhere; Foss Castle would have been his administrative centre for this region. He died in around 1091, and his lands passed through several subsequent generations of the family. Little is known about the castle during this period, but it may be referred to in documents of 1133 as the 'Castrum de Mulgreit' (the castle of Mulgrave). In 1195 Joan Fossard assumed ownership of the estates, and she married Robert de Turnham, a seasoned soldier with royal connections. He, or more likely his successor Peter de Mauley, built a stone castle in the early 13th century on a new site further to the east (Old Mulgrave Castle, see below), and the earlier motte and bailey was abandoned.

- 2.9 The most prominent earthwork is the motte, which measures some 50m in diameter and up to 5m high, with a deep surrounding ditch that has become partly infilled over time. The flattened top of the mound has a bank around the edge representing the remains of a palisade or fence, while a sub-circular raised area on the north-east side marks the site of a tower. This would have housed the main accommodation, while other slight earthworks on the mound suggest one or more detached buildings, perhaps a hall and kitchen; initially, all the structures would have been of timber but some may have been later rebuilt in stone. The site is known to have been excavated before 1817, although it is not known what, if anything, was discovered.
- 2.10 Two baileys forming enclosed courtyards lie next to the motte, although they may not necessarily have been laid out at the same time. They would have contained additional structures and service buildings such as stables, perhaps a chapel, workshops and a brewhouse. The smaller bailey to the north-west is curiously triangular in plan, and may represent the re-use of the earlier Anglo-Saxon enclosure. The bailey to the south-east is larger and horseshoe-shaped, and is surrounded by a prominent bank and ditch on the north and east sides. This bank would have been topped by a tall palisade, and a gap in the north-east corner might be an entrance. There are no defences on the south side of this bailey as it lies directly above the very steep gorge of the beck.
- 2.11 As Foss Castle was replaced by Old Mulgrave Castle to the east, the surviving remains are important as they have not been disturbed by later activity. However, although the site was surveyed by l'Anson (1913, 348-351 & figure 3), no modern archaeological survey or excavation has been undertaken.

### **Old Mulgrave Castle**

- 2.12 The interpretation board at Old Mulgrave Castle was placed inside the walled enclosure, just to the north-east of the former well and west of the main ruins, on a prominent line of sight from the castle's western entrance (at NGR NZ 83918 11681) (see figure 4); the site was first scheduled on 30th November 1925 (SM 20535; NHLE 1015113). The board uses text, modern and historic photographs, a 1990 ground plan produced by the former Royal Commission on Historical Monuments for England (now Historic England), and a recent aerial photograph to explain the function and layout of the castle.
- 2.13 Old Mulgrave Castle was built in the early 13th century as a defensive residence, replacing the earlier, smaller Foss Castle some 700m to the west (see above). It was converted into a hunting lodge in the early 17th century, re-fortified, and then partially demolished during the English Civil War, finally becoming an ornamental feature within an 18th-19th century landscaped park. It is called the 'Old Castle' to distinguish it from the later Mulgrave Hall, built in 1735 and known as Mulgrave Castle since 1791.
- 2.14 The castle was built on a narrow ridge between the Sandsend and East Row Becks, most likely by Peter de Mauley, an important landowner with royal connections. He acquired the Mulgrave Estate in 1214 and would have wanted a new castle to match his wealth, power and lifestyle. The ridge was altered to create an oval-shaped platform with a dry moat around the east and west ends. The castle was surrounded by a high curtain wall, punctuated with towers and buttresses, with a gatehouse and drawbridge on the west side. Inside was a three storey rectangular tower-like keep, which had an entrance at first floor level

accessed by external steps. Other buildings within the enclosure would have included a chapel, kitchen, stables, various service buildings and a well.

- 2.15 The castle was described as 'ruinous' by 1308, but repairs and improvements were made during the late 14th and 15th centuries. The keep was virtually rebuilt, and a new ground floor entrance, extra rooms, and new fireplaces and windows were added. The building became a comfortable fortified house in keeping with the fashion of the time. However, the repeated collapse of the curtain wall meant that some areas needed rebuilding and more supporting buttresses were added. A new tower on the north side formed a garderobe (toilet) block with culverts taking the waste down into Sandsend Beck. Lodging towers were also built at the east end one in the north-east corner contains evidence for glazed windows, fireplaces and a garderobe.
- 2.16 In 1592 the castle passed to Edmund Lord Sheffield, who was created the 1st Earl Mulgrave in 1626. By now, much was derelict apart from the small north-eastern lodging tower. His astute management of his estate meant he could fund significant repairs, and he transformed the keep into a comfortable country retreat and hunting lodge. New round corner towers were built, and mullioned windows were inserted into the walls the building was designed to impress both visitors and rivals alike. The 1st Earl supported Parliament during the Civil War, and in 1643 the castle was seized by Royalists. It was soon re-taken by the Parliamentarians, and the curtain walls were repaired. In 1647, Parliament ordered the castle to be 'slighted' or dismantled, and the 2nd Earl was paid £1,000 in compensation. However, demolition work was limited to the defensive areas, and an engraving of 1740 shows large parts of the tower and other buildings as intact.
- 2.17 In 1735, the present Mulgrave Hall was built 1km to the north-east of the castle. Over the next 100 years improvements were made to the surrounding park and estate, including extensive tree planting, and the castle became a picturesque ruin. In 1792-93, the noted landscape gardener Humphrey Repton suggested remodelling the castle as an 'eye-catcher', to be viewed to and from the hall and elsewhere on the estate. Some cosmetic rebuilding was done, and a new highlevel arch was built in the west wall of the former hunting tower. To enhance the natural beauty, nails were inserted into the walls to encourage the growth of ivy. A new carriage drive was also made for visitors in 1813, and in 1828 it was noted that "One of the greatest ornaments of the park is the old castle ... the view from the old battlements is wild and picturesque".
- Some parts of the castle, such as the chapel, remained in use until around 1830, 2.18 and a building to the south of the tower became the estate keeper's house. The castle retained its ornamental function into the early 20th century, and historic photographs show the grassed interior with benches laid out around the walls. In 1903 the 3rd Marquis of Normanby carried out extensive archaeological excavations, although few records remain. The castle later fell into decay and the ivy caused some collapse of the tower and curtain walls. In 1990 the remains were subject to an archaeological survey by the former Royal Commission on Historical Monuments for England (now Historic England) (RCHME 1990). Between 1995 and 2000, a major programme of repair and rebuilding was carried out. Some parts, such as Repton's arch in the hunting tower and the north gatehouse tower, were rebuilt using old photographs as a guide, and parts of the curtain wall and buttresses were stabilised. The earthworks resulting from the 1903 excavations were also infilled and the interior landscaped. All this work was subject to archaeological monitoring and interim and a final report was subsequently produced (Briden, Pybus & Mainman 2000).

#### 3 SCHEDULED MONUMENT CONSENTS

- 3.1 As noted above, separate Scheduled Monument Consents (SMC) for the erection of the three interpretation boards was given by the Secretary of State for Digital, Culture, Media and Sport, advised by Historic England, on 8th November 2021 (refs S00241983, S00241984 and S00 241895 respectively).
- 3.2 All three consents contained the same number of conditions, some of which were relevant to the archaeological recording, as follows:
  - (i) The works to which this consent relates shall be carried out to the satisfaction of the Secretary of State, who will be advised by Historic England. At least 2 weeks notice (or such shorter period as may be mutually agreed) in writing of the commencement of work shall be given to Dr Keith Emerick, Inspector of Ancient Monuments, Historic England, 37 Tanner Row, York, YO1 6WP; 01904 601988; *keith.emerick@historicengland.co.uk* in order that an Historic England representative can inspect and advise on the works and their affect in compliance with this consent.
  - (ii) The specification of work for which consent is granted shall be executed in full.
  - (iii) This consent may only be implemented by Mr Ed Dennison, EDAS Ltd.
  - (v) equipment and machinery shall not be used or operated in the scheduled area in conditions or in a manner likely to result in damage to the monument or to ground disturbance other than that which is expressly authorised in this consent;
  - (vi) any ground disturbance to which this consent relates shall be carried out under the archaeological supervision of Mr Ed Dennison, EDAS Ltd, who shall be given at least 2 weeks notice (or such shorter period as may be agreed) in writing of the commencement of work. No works shall commence until Mr Dennison has confirmed in writing to Historic England that he is willing and able to undertake the agreed supervision;
  - (vii) Excavation of 4 no leg supports shall be restricted to a depth not exceeding 500mm.
  - (viii) a report on the archaeological recording shall be sent to: Miles Johnson, Head of Historic Environment, NYMNPA, The Old Vicarage, Bondgate, Helmsley, N. Yorks, YO62 5BP (the National Park Historic Environment Record) and to Dr Keith Emerick, Inspector of Ancient Monuments at Historic England within 3 months of the completion of the works (or such other period as may be mutually agreed);
  - (ix) the archaeological contractor shall complete and submit an entry on OASIS (On-line Access to the Index of Archaeological Investigations *http://oasis.ac.uk/england/*) prior to completion, and shall deposit any digital project report with the Archaeology Data Service, via the OASIS form, upon completion.

# 4 FIELDWORK METHODOLOGY

- 4.1 The archaeological recording was not defined by an EDAS 'Written Scheme of Investigation', but advice produced by the Chartered Institute for Archaeologists in relation to watching briefs was followed (CIfA 2020). The aim of the archaeological recording was to record and recover information relating to the nature, date, depth, and significance of any archaeological features and deposits which might be affected by the erection of the three interpretation boards.
- 4.2 The installation of the three boards involved the excavation of four small holes at the corners of a rectangle measuring 730mm by 430mm to accommodate the 65mm square leg supports. The holes measured between 300mm-250mm square by between 250mm-300mm deep. Two of the boards, at Deep Grove quarry and Foss Castle, were installed on 7th December 2021, and the third at Old Mulgrave Castle was erected on 8th December 2021.
- 4.3 Following standard archaeological procedures, each discrete stratigraphic entity (e.g. a cut, fill or layer) was assigned an individual three digit context number, given in the following text in curved brackets for contexts e.g. (002) or square brackets for cuts, e.g. [003]. In the event, few archaeological contexts were noted and no significant artefacts were uncovered; as a result, no sections were drawn, although plans of each set of holes were produced two are reproduced in this report (see figure 5). Appropriate site records were also made and high resolution digital photographs were taken.
- 4.4 As required by the SMC conditions, this report was copied to Historic England and the North Yorkshire Historic Environment Record, as well as the client (the Mulgrave Estate). In view of the largely negative results, no field archive was prepared or deposited with an appropriate museum, although site notes, sketches and photographs have been retained by EDAS (site code MEL 21).

# 5 RESULTS OF THE WATCHING BRIEF

## **Deep Grove Quarry Interpretation Board**

- 5.1 As noted above, four small holes were excavated for the leg supports of this board, on the south-west side of the former Whitby to Middlesborough railway track, adjacent to recently installed fencing and gates, towards the south-east corner of the former quarry (at NGR NZ 85764 13863) (see plate 1). The four holes lay at the corners of a rectangle measuring 730mm by 430mm, on a north-west/south-east alignment, and all the holes measured 300mm square by 250mm deep (see plate 2 and figure 5 top).
- 5.2 The deposits in all four holes at this location were the same. A 20mm thick layer of loose dark brown-black turf and topsoil (101) overlay a loose friable brown-black clay soil containing some small stones and clay lenses (102) which extended beyond the bottom of the hole; this deposit represented the eroded top layer of the former railway track. Towards the base of the south-east hole, a small rusted and corroded iron fragment, c.160mm long by c.0.55m diameter, was uncovered and removed from the hole (see plate 3) this almost certainly represents the remains of a railway spike, which would have been used to secure a rail base plate to one of the wooden railway sleepers. It was not retained.
- 5.3 Once the leg supports were in place, the sloping stand containing the information board, which was printed directly onto di-bond for durability and backed by a

marine ply backing sheet, was screwed into place. The whole structure was then levelled, and the leg supports were concreted into the ground; the top 20mm-30mm of each hole was filled with excavated soil to avoid any unsightly concrete etc (see plate 4).

#### Foss Castle Interpretation Board

- 5.4 Once again, four small holes were excavated for the 65mm square leg supports of this board, on the east side of the public footpath which passes along the west side of the castle, adjacent to the entrance to the site (at NGR NZ 83120 11752). The four holes lay at the corners of a rectangle measuring 0.73m by 0.43m, with a north-west/south-east alignment, and all the holes measured 250mm square; the northern holes were excavated to a depth of 300mm to take account of the sloping ground while the southern holes were 250mm deep (see plate 5).
- 5.5 Only one deposit was recorded in all the holes, a relatively hard packed dark brown clay soil containing frequent small stones and pebbles as well some larger stones (201). This deposit extended below the base of the holes. No finds or other datable material was recovered.
- 5.6 As with the previous panel, the sloping stand was screwed onto the base, the structure was levelled, and the leg supports were concreted into the ground; the top 20mm-30mm of each hole was filled with excavated soil to avoid any unslightly concrete etc (see plate 6).

#### **Old Mulgrave Castle Interpretation Board**

- 5.7 This interpretation board was placed within the castle enclosure, a short distance to the north-east of the surviving well structure and on the 'desire line' between the castle entrance and the ruined tower (at NGR NZ 83918 11681). The four holes lay at the corners of a rectangle measuring 730mm by 430mm, with a north-north-east/south-south-west alignment, and all the holes for the 65mm square leg supports measured 250mm square and were excavated to a maximum depth of 250mm (see plate 7 and figure 6 bottom).
- 5.8 Only one deposit was recorded in all the holes, a loose dark brown clay topsoil containing occasional small stones and roots from an adjacent tree (301); this deposit extended below the base of the holes. This deposit is likely to represent material resulting from the landscaping of the interior following the 1995-2000 repair and consolidation work.
- 5.9 As before, the sloping stand was screwed onto the base, the structure was levelled, and the leg supports were concreted into the ground; the top 20mm-30mm of each hole was filled with excavated soil to avoid any unslightly concrete etc (see plates 8 and 9).

## 6 CONCLUSIONS

6.1 Although the locations of all three interpretation boards lay within Scheduled Monuments, the extent of ground disturbance was limited to four small holes for each board, typically 250m square by 250mm-300mm deep. No significant archaeological deposits or features were revealed. One find in the Deep Grove board excavations, a corroded iron railway spike, was associated with the now abandoned former railway line. The single deposit seen in the Foss Castle board site was not of archaeological interest, and the deposits seen in the Old Mulgrave

Castle board excavations were related to the landscaping of the interior of the castle following the 1995-2000 repair and consolidation work.

#### 7 BIBLIOGRAPHY

Briden, C, Pybus, D & Mainman, A 2000 *Mulgrave Castle, Whitby, North Yorkshire: Final Report 2000* (unpublished archive report)

ClfA (Chartered Institute for Archaeologists) 2020 *Standard and Guidance for an Archaeological Watching Brief* 

l'Anson, W M 1913 'The Castles of the North Riding'. Yorkshire Archaeological Journal vol 22, 303-399

RCHME (Royal Commission on Historical Monuments for England) 1990 *Mulgrave Castle* (unpublished draft report)

#### 8 ACKNOWLEDGEMENTS

8.1 The archaeological watching brief was commissioned by the Mulgrave Estate and was undertaken by EDAS. Thanks are due to John Beech, Assistant Rural Surveyor, at the estate, and to Mel Parish who constructed and erected the interpretation boards. The archaeological recording was undertaken by Ed Dennison, who also produced this report, and who retains responsibility for any errors or inconsistencies.



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MULGRAVE ESTATE INTERPRETATION		
EDAS	FIGURE <b>1</b>	





	PROJECT MULGRAVE ESTATE INTERPRETATION			
	FOSS CASTLE BOARD LOCATION			
	scale 1:1250	DEC 2021		
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	Base plan provided by	the Mulgrave Estate.		
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Plate 1: Installation of Deep Grove quarry interpretation board, looking SW.



Plate 2: Excavated holes for leg supports, Deep Grove quarry interpretation board, looking W.



Plate 3: Corroded iron railway spike recovered from Deep Grove quarry interpretation board excavations.



Plate 4: Installed Deep Grove quarry interpretation board, looking W.



Plate 5: Excavated holes for leg supports, Foss Castle interpretation board, looking NE.



Plate 6: Installed Foss Castle interpretation board, looking E.



Plate 7: Excavated holes for leg supports, Old Mulgrave Castle interpretation board, looking E.



Plate 8: Installed Old Mulgrave Castle interpretation board, looking W.



Plate 9: Installed Old Mulgrave Castle interpretation board, looking E.