Penrice Castle Gatehouse

Archaeological Watching Brief Report



Prepared for

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Ву



- BLACK MOUNTAINS ARCHAEOLOGY - - ARCHAEOLEG MYNYDD DU -

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Summary

Comisiynwyd Archeoleg Mynydd Du Cyf gan Mann Williams ar rhan Mr Thomas Merhuen-Campbell o'r Ystad Pen-rhys i ymgymryd â briff gwylio archaeolegol yn ystod gwaith cadwraeth ar borthdy Castell Pen-rhys (SMGm047m).

Roedd yr ymchwiliadau'n cynnwys cofnodi'r llwybr wal ar hyd parapet de ddwyreiniol y porthdy yn ystod cadwraeth gwaith maen, gyda's cyntaf yn ymwneud â tharddiad y porthdy yn y 13^{eg} ganrif ac yna cyfnod Ôl-ganoloesol diweddarach yn ymwneud â defnydd amaethyddol y castell.

Mae'r adroddiad presennol yn nodi canlyniadau'r briff gwylio archaeolegol, a hynny'n unol â safonau proffesiynol Sefydliad Siartredig yr Archaeolegwyr, fel y'u pennir yn y ddogfen, 'Standard and guidance for an archaeological field evaluation' (cyhoeddwyd 2014, diwygiwyd 2020).

Black Mountains Archaeology Ltd have been commissioned by Mann Williams on behalf of Mr Thomas Methuen-Campbell of the Penrice Estate to undertake an archaeological watching brief during conservation work on the gatehouse of Penrice Castle (SMGm047m).

The investigations consisted of the recording of the wall walk along the south eastern parapet of the gatehouse during masonry conservation. Two distinct phases of activity were noted, the first relating to the 13th century origins of the gatehouse and then a later Post-medieval phase relating to the agricultural use of the castle.

The present report sets out the results of the archaeological watching brief in accordance with the professional standards of the Chartered Institute for Archaeologists Standard and guidance for an archaeological watching brief (published 2014, revised 2020).

Acknowledgements and Copyright

The project was managed, and the fieldwork, 3D photogrammetric modelling and reporting prepared by Richard Lewis BA MCIfA. Dr Rhys Morgan PhD kindly provided the Welsh translations. The author is grateful to Mr Thomas Methuen-Cambell (Penrice Estate), Mr Pat Ruddock (Mann Williams) and Mr Ross Cook (ArchaeoDomus) for their support during this project. The copyright of this report is held by Black Mountains Archaeology Ltd, who have granted an exclusive licence to the Penrice Estate and their agents enabling then to use and reproduce the material it contains. Ordnance Survey maps where published are reproduced under licence 100058761. Black Mountains Archaeology Ltd retain copyright of any annotations.

Archaeological Watching Brief Report

1 Introduction

- 1.1.1 Black Mountains Archaeology Ltd/Archaeoleg Mynydd Du Cyf were commissioned by Mann Williams on behalf of Mr Thomas Methuen-Campbell of the Penrice Estate to undertake an archaeological watching brief during conservation work on the gatehouse of Penrice Castle (Figure 1). The archaeological watching brief forms a small component of a larger project consisting of a Level II Historic Building Record of the Gatehouse at Penrice Castle being undertaken for the Penrice Estate by ArchaeoDomus Archaeological & Heritage Services (Cook 2021).
- 1.1.2 The present report sets out the requirements for the archaeological watching brief in accordance with Chartered Institute for Archaeologists Standard and guidance for an archaeological watching brief (published 2014, revised 2020).

2 Background

- 2.1.1 A detailed archaeological and historical background has already been provided (Cook 2021, 7-10), in addition to the exemplary description and history of Penrice Castle by the RCAHMW (2000, 286-307), and it is not the intention, nor is it necessary, to repeat this information here. However, it is worth noting that the RCAHMW describe four distinct phases of construction:
 - I. Period I Mid-13th century,
 - II. Period IIa Later 13th century (1270-1300),
 - III. Period IIb Later 13th century additions,
 - IV. Finally, later post medieval additions and alterations, such as the dovecote and picturesque landscaping.
- 2.1.2 Periods I and II were distinguished by two distinct brown (Period I) and white (Period II) coloured mortars. The RCAHMW note:
- 2.1.3 "The rough but durable masonry of the castle is composed for the most part of Carboniferous Limestone, quarried on the site, along with some Old Red Sandstone conglomerate which outcrops in the vicinity. Almost devoid of freestone, not easily obtained in Gower, the crudely constructed walls were nevertheless strongly bonded with excellent mortar readily derived from the limestone of the headland. The mortar, as at Pennard Castle (SMGm044), accounts for the well-preserved nature of the ruins where they have escaped deliberate slighting. Two distinctive forms of this mortar were identified: the fabric of Period I was characterised by brown sandy mortar, its colour derived from its aggregate of river-washed sand and gravel; in the various phases of construction in Period II, an equally distinctive white limey mortar was used" (RCAHMW 2000, 292).
- 2.1.4 To provide a little context for the present watching brief, the Cadw description of Penrice Castle (SMGm047/LB11543/LB22539) and Registered Historic Landscape (Park and Garden) are provided below:
- 2.1.5 The monument consists of the remains of a stone-built castle (SMGm047/LB11543). Possibly of Norman origin, much of the stonework remaining is 13th century; a window with seats in the north-west gatehouse overlooking the ward suggests a 13th century date. The castle comprises a drum-tower keep with a large ward to its east side. A group of ruined buildings at the north of the ward include a gatehouse with flanking

defensive turrets. Attached to the east side, externally, is a conical dovecote (LB22539). The wall of the ward survives generally to a height of about 3 to 5 metres. Irregularities at intervals appear to be small open-backed defensive turrets. The circular keep at the west side is about 12m diameter, surviving to a height of about three storeys; most openings appear to be walled up except a slit opening facing west and a pointed arch facing north to the exterior. It has two small semi-circular additions, one to east and one to west, and a three-storeyed rectangular building attached to it on the exterior. The latter building survives on two sides only; it had a gabled roof running north-east to south-west; large fireplace in its south-west wall with segmental arch on corbels; remnants of flat arches in openings above. Close to the keep is a small intra-mural building of which two walls remain, with a walled up segmental opening to the exterior. The entrance building at the north has a portcullis slot behind a gothic arch. Guard towers left and right with loops facing the entrance. The one to the north has been adapted as a dovecote, the other is inaccessible. The rear corners of this building facing the ward are rounded. Gothic arch of two orders to rear opening to the ward; above this a first floor lancet window with seats in the reveals. Along the north side is an enclosure with traces of intra-mural buildings. Two walls at the northeast side are a fragment of a building to which the lost wall dividing the ward into two halves was attached. The castle was abandoned in favour of Oxwich Castle in the late medieval period and fell into ruin. It was slighted by Cromwell. When engraved by Buck in c. 1735 (Plate 1) the surviving curtain wall still had its crenelations. The ruins were probably reduced for picturesque effect in the late 18th century. A wall dividing the ward into two halves has nearly all disappeared.

3 Registered Landscapes, Parks and Gardens

3.1.1 Penrice is a registered historic landscape (PGW(Gm)68(SWA). Cadw note: Penrice is registered at Grade I as one of the most outstanding, complete 18th century landscapes in Wales. Its landscaping is of exceptional quality, rarity and state of preservation. The situation is one of exceptional beauty and this has been exploited to the full by the positioning of the house and the landscaping around it. Thomas Mansel Talbot undertook a comprehensive scheme at Penrice engaging leading experts in their field, including William Emes (1729/30-1803) one of the most important landscape designers of the 18th century, who probably also designed the orangery. The ruined medieval castle (SMGm047) is well situated in the landscape, viewed as a picturesque feature and also as a viewing point. The registered park and garden has important group value with Penrice Castle mansion (LB11531) and the associated estate buildings and structures (Cadw and ICOMOS 2000).

4 Location, Topography and Geology

- 4.1.1 Penrice Castle is located 650m to the northeast of Penrice village and the earlier Norman fortification of Penrice Ringwork (SMGm053), Gower at NGR SS 249701.228, 188493.505 (Figure 1). Penrice Castle (SMGm047) is a large hexagonal shaped fortification situated on a rocky Carboniferous outcrop overlooking Oxwich Marsh and Bay.
- 4.1.2 The geology found at Penrice Castle is superficial deposits of shallow well drained loamy soils (Crwbin soil association, Malham 2 soil sub series; Lawes Agricultural Trust

1983) overlying Oxwich Head Limestone formed approximately 329 to 337 million years ago during the Carboniferous period (British Geological Survey 2022).

5 Objectives

- 5.1.1 The *definition* of an archaeological Watching Brief as set out by the *Chartered Institute for Archaeologists* (CIfA) is a formal programme of observation and investigation conducted during any operation carried out for non-archaeological reasons. This will be within a specified area or site on land, inter-tidal zone or underwater, where there is a possibility that archaeological deposits may be disturbed or destroyed. The programme will result in the preparation of a report and ordered archive.
- 5.1.2 The purpose of an archaeological watching brief (as defined CIfA 2014) is:
 - to allow, within the resources available, the preservation by record of archaeological deposits, the presence and nature of which could not be established (or established with sufficient accuracy) in advance of development or other potentially disruptive works.
 - to provide an opportunity, if needed, for the watching archaeologist to signal to all interested parties, before the destruction of the material in question, that an archaeological find has been made for which the resources allocated to the watching brief itself are not sufficient to support treatment to a satisfactory and proper standard.
- 5.1.3 A watching brief is not intended to reduce the requirement for excavation or preservation of known or inferred deposits, and it is intended to guide, not replace, any requirement for contingent excavation or preservation of possible deposits.
- 5.1.4 The objective of a watching brief is to establish and make available information about the archaeological resource existing on a site.
- 5.1.5 (Chartered Institute for Archaeologists Standard and guidance for an archaeological watching brief (published 2014, revised 2020).

6 Legislative Framework

- 6.1.1 Any works affecting an ancient monument and its setting are protected through implementation of the *Ancient Monument and Archaeological Areas Act 1979*. In Wales the 1979 Act has been strengthened by *The Historic Environment (Wales) Act 2016*. The 2016 Act makes important improvements for the protection and management of the Welsh historic environment. It also stands at the centre of an integrated package of secondary legislation (Annexes 1-6), new and updated planning policy and advice, and best-practice guidance on a wide range of topics (*TAN 24 Historic Environment*). Taken together, these support and promote the careful management of change in the historic environment in accordance with current conservation philosophy and practice.
- 6.1.2 The Ancient Monument and Archaeological Areas Act 1979 and The Historic Environment (Wales) Act 2016 sets out a presumption in favour of preservation in-situ concerning sites and monuments of national importance (scheduled/listed), and there exists in the current Planning Policy Wales (Chapter 6) a presumption in favour of preservation in-situ of all types of heritage assets.

7 Methodology

- 7.1.1 The investigations consisted of the recording of the wall walk along the south-eastern parapet of the gatehouse during masonry conservation (Figure 1 and 2). The archaeological recording was instigated in response to the discovery of a wall walk drain [006] that required further investigation and interpretation/dating. The Wall Walk Drain 1 [006] was established as medieval and likely original (later 13th century). A second and contemporary wall walk drain [007] was discovered in the southwest wall, although this drain was found to be in a very poor state of survival. The excavations were extremely limited and were restricted to exposing a small area around the Wall Walk Drain 1 [006] by removing the topsoil covering (001). The excavations terminated on a stone surface [004] believed to be the remnants of the medieval wall walk surface.
- 7.1.2 The archaeological recording techniques conformed to the best industry standard. All excavated sections were cleaned by hand. All deposits were recorded using a single continuous context numbering system pro forma (summarised in Appendix III). All contexts were recorded in section and plan at scale. All contexts were photographed in digital using a Canon EOS 2000D DSLR camera with a 24.7mp, 22.3mm x 14.9mm CMOS sensor. The ground investigations were tied into the Ordnance Survey National Grid and Datum using an EMLID Reach GN55/ Glonass (GPS) Receiver and data logger with a <20mm tolerance. No finds (pottery, glass etc) were identified in the excavated area.
- 7.1.3 The capture, processing and output of 3D models conformed to professional industry standards and best practice guidelines set out by Historic England's *Photogrammetric Applications for Cultural Heritage Guidance for Good Practice* (2017). The full and detailed photogrammetric 3D model and orthomosaic plan for the medieval gatehouse investigations can be viewed below and forms the primary record: https://cloud.pix4d.com/dataset/1083814/model?shareToken=ff279c6e-36a7-436f-9324-96782552ee6d. Scaffolding surrounding the gatehouse was meticulously removed in the point cloud to gain a better view of the wall and its phasing. Some 'ghosting' and 'shadowing' of the removed scaffolding can unavoidably be seen in the 3D photogrammetric model due to the brilliant sunshine on the day of the survey.
- 7.1.4 All 3D models were produced using proprietary photogrammetry software and aligned using known ground control points (GCPs). Dimensional control was then applied to each model and then reprocessed using the new parameters and optimised cameras to create dense point cloud of over 25 million points and high face count meshes with a mean RMS error of 0.3cm. Models were then exported to OBJ format. Three GCPs were used with a sub-20mm error margin to OSGB36 (National Grid) and a Ground Sampling Distance (GSD) of 0.19cm/pixel. High resolution orthographic renders (orthomosaics) were exported and scaled in georeferenced raster (TIFF and JPEG) format.
- 7.1.5 The archaeological watching brief was carried out to the standards of the Chartered Institute for Archaeologists Standard and guidance for an archaeological watching brief (published 2014, revised 2020).

7.1.6 The digital copy of the report and archive will be supplied to ArchaeoDomus, who will be responsible for formal archiving as part of the final reporting project archive (Cadw, Regional HER, RCAHMW).

8 Results

- 8.1.1 The investigations consisted of the recording of the wall walk along the south-eastern parapet of the gatehouse during masonry conservation (Figure 1 and 2). The archaeological recording was instigated in response to the discovery of a wall walk drain [006] that required further investigation and interpretation/dating. The Wall Walk Drain 1 [006] was established as medieval and likely original (later 13th century). A second and contemporary wall walk drain [007] was discovered in the southwest wall, although this drain was found to be in a very poor state of survival. The excavations were extremely limited and were restricted to exposing a small area around the Wall Walk Drain 1 [006] by removing the topsoil covering (001). The excavations terminated on a stone surface [004] believed to be the remnants of the medieval wall walk surface.
- 8.1.2 North Eastern side of the wall walk Figures 1 and 2; Plates 2, 4-6, 9, 11 and 12
- 8.1.3 The earliest structural element encountered was the rubble core of the gatehouse, the visible remains of which comprised small limestone stones (<0.1m) held in a hard brownish (sandy) white mortar (Period II). The core of the gatehouse wall directly underlay (and contained) wall walk drain [006], and the very fragmented remains of the wall walk stone surface [004]. The latter being composed of small flat stones (<0.4m) bedded into the core [005] of the gatehouse wall. The Wall Walk Drain 1 [006] was composed of limestone sides and top forming part of the gatehouse wall (exterior 0.25m high x 0.2m wide; interior 0.15m high x 0.39m wide), with a sandstone (Pennant?) stone base. The interior base of the drain was at the level of the of the fragmented remains of the wall walk stone surface [004], with a single small, thin, overlapping sandstone stone surviving before sloping gradually through the gatehouse wall.
- 8.1.4 The wall walk stone surface [004] was overlaid by a build-up of loose tabular sandstone and limestone held in soft cream coloured lime mortar matrix [002]. The Wall Walk Drain 1 [006] was repurposed and a new walkway drain [003], defined by a narrow limestone channel, inserted into the earlier drain. Both repurposed sandstone roof stones (SF1 and SF2), possibly medieval, and very poor-quality fragments of roof slates (SF03), possibly from Pembrokeshire(?), were used in the construction of the build-up material [002]. A single whole sandstone roof stone (SF01) was recovered from [002], possibly used as a surface (flag) stone for the later, and presumably Postmedieval wall walk. The upper most deposit was a thin (0.04m) covering of dark-brown friable topsoil, with heavy bioturbation (001).
- 8.1.5 South Western side of the wall walk Figures 1 and 2; Plates 3, 7, 8, 11 and 12
- 8.1.6 The stratigraphy on the SW side of the gatehouse mirrored that on the NE side but with the exception that no formal archaeological excavation was carried out or required. Therefore, a descriptive record was made, including the newly discovered Wall Walk Drain 2 [007].
- 8.1.7 A poorly surviving wall walk drain [007] was identified in the SW wall of the gatehouse. As far as could be ascertained without formal excavation, the form and extent (0.25m wide x 0.28m high) mirrored the drain recorded in the SE wall of the gatehouse [006]. The presumed sandstone base was missing. No later drains were identifiable, as with the drain [006] to the northeast, due to the poor survival of stonework in this location.

The SW area of the wall walk was overlaid by a build-up of loose tabular sandstone and limestone held in soft cream coloured lime mortar matrix [009], which was identical to the NE side [002]. Overlaying this build-up deposit were several surviving flat sandstone (Pennant?) stone slabs [008] forming the fragmentary remains of the Post-medieval wall walk. The upper most deposit was a thin (0.04m) covering of dark-brown friable topsoil, with heavy bioturbation (001).

9 Small Finds

- 9.1.1 Artefactual evidence included the identification and recording of three roof stones/tiles from the Post-medieval wall walk [002] (Plate 9). SF01 and SF02 were both sandstone roof stones complete with augured peg perforations; the former was complete whilst the latter only a small fragment. SF03 was a fragment of roofing slate, again complete with perforation for the peg or cleat. SF03 comprised of poor-quality slate and visually appeared to resemble Pembrokeshire slate.
- 9.1.2 The complete sandstone roof stone (SF01) was subjected to 3D photogrammetric recording. The 3D textured mesh (model) can be viewed here https://p3d.in/TU2MM.
- 9.1.3 It was noted with interest that the fairly recent wall built on the SE side of the gatehouse (Plate 10) was topped with copper slag coping stones and also had several copper slag blocks used in in the wall's construction. Copper slag was a by-product of the copper industry in the Swansea Valley and exemplifies how the industry innovated, turning waste products into by products with value. The copper slag coping stones and block noted in the wall may have come from the Hafod-Morfa Copperworks, Swansea as the Vivians were family friends of the Talbots of Penrice and Margam (pers. comm. Mr Thomas Methuen-Campbell).
- 9.1.4 No finds were retained. The roofing slate and stones were left on-site, on the gatehouse wall walk.

Context	S/F No.	Туре	Description/Detail	Period
002	SF1	Stone	A complete sandstone roof stone, with peg/cleat perforation, recovered from the Gatehouse at Penrice Castle (SMGm047). Dimensions: 0.46m long, 0.31m wide and 0.03m in thickness.	Medieval?
002	SF2	Stone	A fragment of sandstone roof stone, with peg/cleat perforation, recovered from the Gatehouse at Penrice Castle (SMGm047). Dimensions: 0.12m long, 0.12m wide and 0.03m in thickness.	Medieval?
002	SF3	Slate	A fragment of (Pembrokeshire?) roof slate, with peg/cleat perforation, recovered from the Gatehouse at Penrice Castle (SMGm047). Dimensions: 0.19m long, 0.1m wide and 0.025m in thickness.	Post-Medieval
Total		3		

10 Conclusions

- 10.1.1 The investigations consisted of the recording of the wall walk along the south eastern parapet of the gatehouse during masonry conservation (Figure 1 and 2). Two distinct phases of activity were noted. The first relating to the 13th century origins of the gatehouse and then a later Post-medieval phase relating to the agricultural use of the castle.
- 10.1.2 The archaeological recording was instigated in response to the discovery of a wall walk drain [006] that required further investigation and interpretation/dating. The Wall Walk Drain 1 [006] was established as medieval and likely original (later 13th century). A second and contemporary wall walk drain [007] was discovered in the southwest wall, although this drain was found to be in a very poor state of survival. The excavations were extremely limited and were restricted to exposing a small area around the Wall Walk Drain 1 [006] by removing the topsoil covering (001). The excavations terminated on a stone surface [004] believed to be the remnants of the medieval wall walk surface.
- 10.1.3 Later Post-medieval activity was represented by the build-up of a loose tabular sandstone and limestone structure [002] and [009] topped with a fragmented stone (flag) surface [008]; a Post-medieval and second wall walk behind the parapet. The reuse of sandstone roof stones (see Section 9) in the later wall walk possibly hints at the original roofing material used in the 13th century gatehouse. The presence of poorquality slate roofing tiles may also hint at the roofing material used during the Post-medieval use of the gatehouse, when it was a farm held by William Benet and his descendants from 1534 to 1669 (RCAHMW 2000, 290).
- 10.1.4 The fairly recent wall built on the SE side of the gatehouse (Plate 10) topped with copper slag coping stones was very interesting to note. Copper slag was a by-product of the copper industry in the Swansea Valley and exemplifies how the industry innovated, turning waste products into by products with value. The copper slag coping stones and block noted in the wall may have come from the Hafod-Morfa Copperworks, Swansea as the Vivians were family friends of the Talbots of Penrice and Margam (pers. comm. Mr Thomas Methuen-Campbell).

11 Bibliography

- Cadw and ICOMOS, 2001, Landscapes of Special Historic Interest in Wales, Pt 2.2, Cardiff.
- Cadw and ICOMOS, 2000, Register of Parks and Gardens of Special Historic Interest in Wales: Additional and Revised Entries 54-63. Cardiff.
- Cadw, 2011, Conservation Principles for the sustainable management of the historic environment in Wales, Cardiff.
- Cook, R, 2021, Gatehouse Repairs, Penrice Castle, Gower: archaeological Written Scheme of Investigation (WSI) for a Historic Buildings Record. Project No. **AD115**.
- Lawes Agricultural Trust, 1983, Soil Survey of England and Wales. Harpenden.
- RCAHMW, 2000, An Inventory of the Ancient Monuments in Glamorgan, Medieval Secular Monuments The Later Castles from 1217 to the present.

 Vol.III-Pt 1b. Aberystwyth.

Other Sources

BGS http://mapapps.bgs.ac.uk/geologyofbritain/home.html accessed 22/02/22.

12 Appendix I – Figures

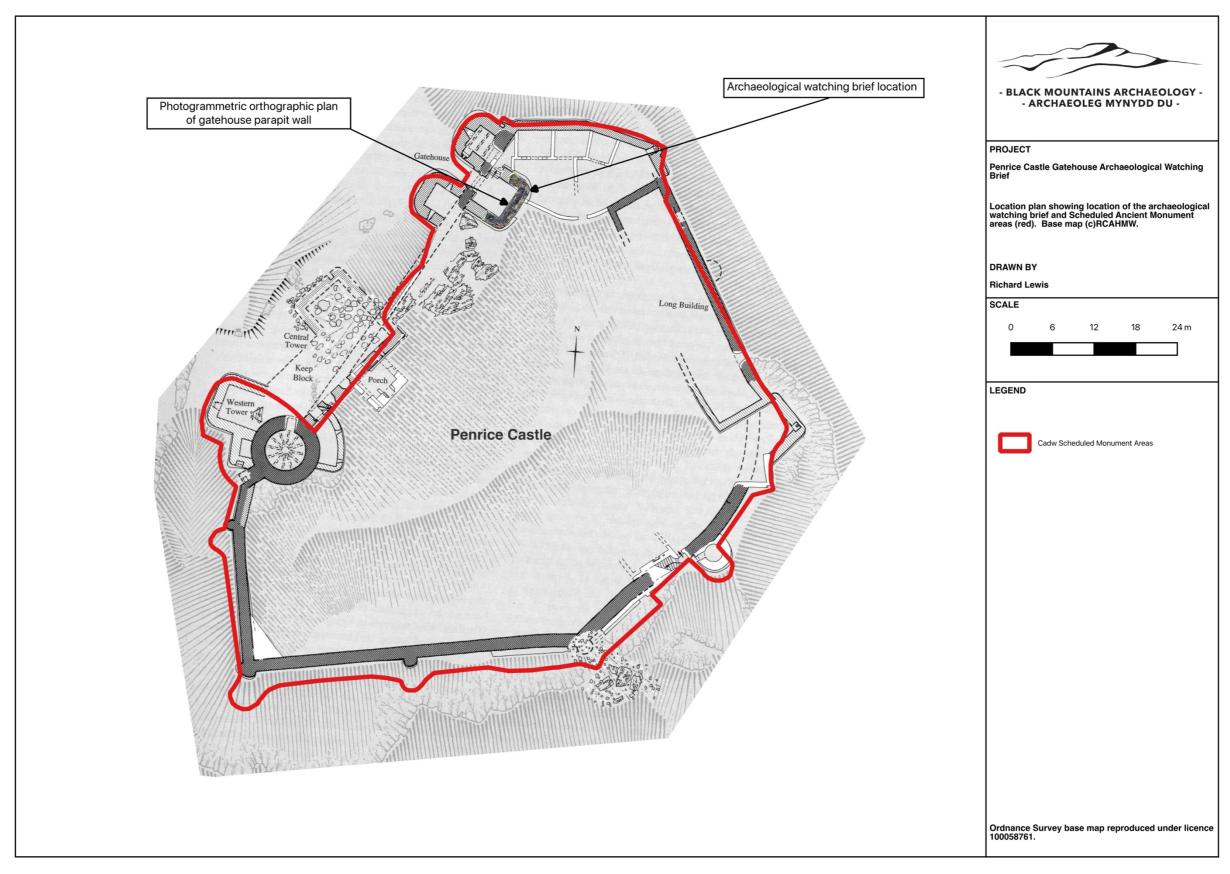


Figure 1. Location plan showing location of the archaeological watching brief and Scheduled Ancient Monument areas (red). Base map (c)RCAHMW.

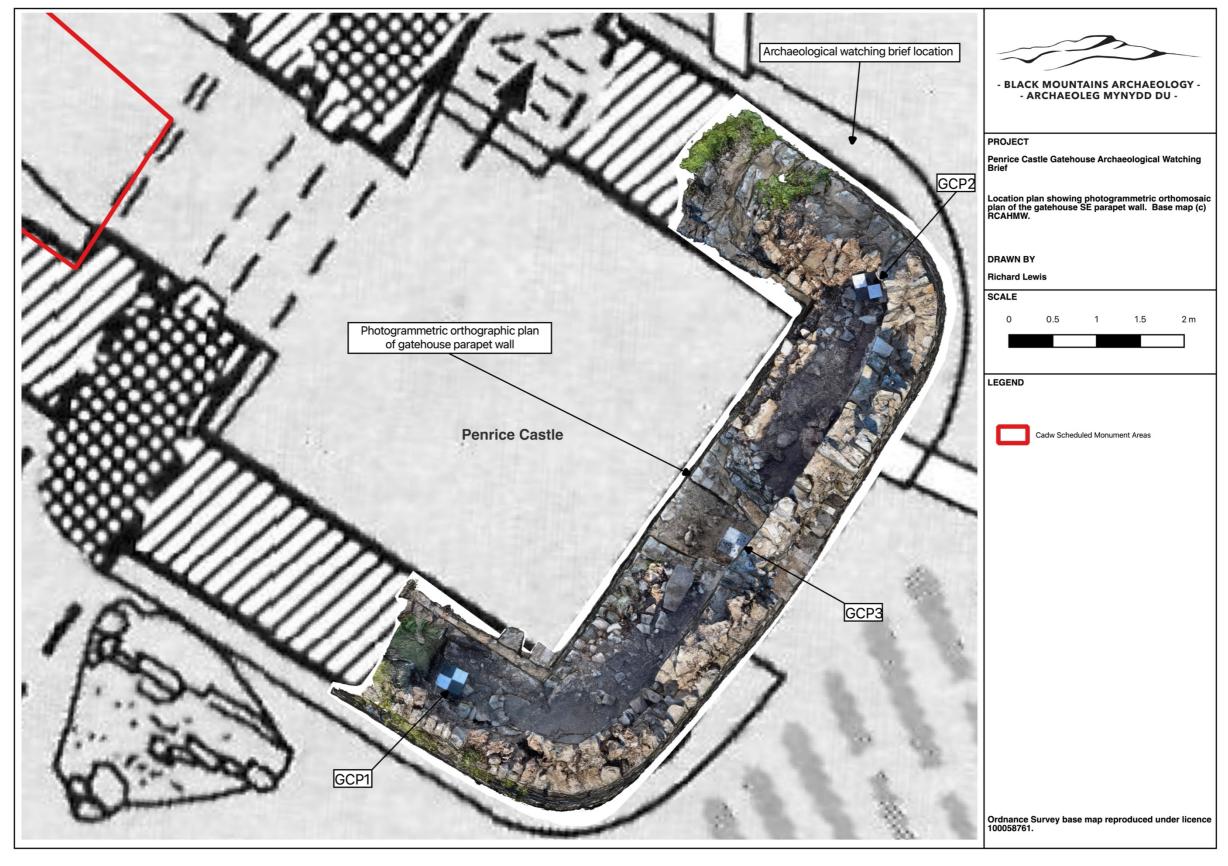


Figure 2. Plan showing detailed photogrammetric orthomosaic plan of the gatehouse SE parapet wall.

13 Appendix II - Plates

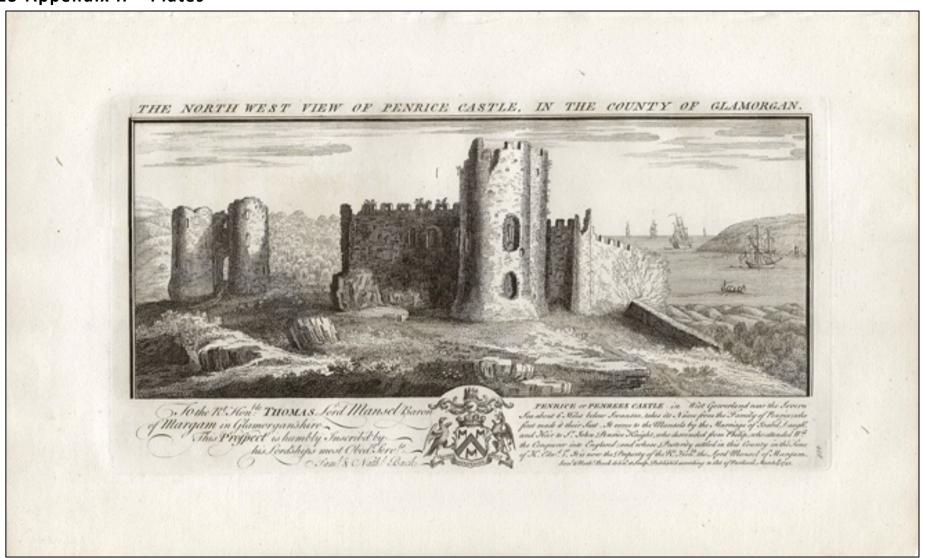


Plate 1. 'The North West View of Penrice Castle, in the County of Glamorgan' by Samuel and Nathaniel Buck (Buck's Antiquities) 1739-42.



Plate 2. Wall walk (NE side) along the south eastern internal wall of the gatehouse during masonry conservation and prior to archaeological investigation.



Plate 3. Wall walk (SW side) along the south eastern internal wall of the gatehouse during masonry conservation and prior to archaeological investigation.



Plate 4. Wall walk (NE side) along the south eastern internal wall of the gatehouse following archaeological investigation.



Plate 5. Wall Walk Drain [006] (NE side), view to SE following archaeological investigation.



Plate 6. Wall Walk Drain [006] (NE side), view to NW.



Plate 7. Wall Walk Drain [007] (SW side), view to SW.



Plate 8. Wall Walk Drain [007] (SW side), view to NE.



Plate 9. Roof stones and slate recovered from Post-medieval wall walk [002].



Plate 10. Inner wall topped with coppers slag coping stones and some copper slag blocks. View to NNW.



Plate 11. Gatehouse during masonry conservation and following archaeological investigation. Nadir view.



Plate 12. Gatehouse during masonry conservation and following archaeological investigation. Nadir view.



Plate 13. Gatehouse during masonry conservation and following archaeological investigation. View to NW.



Plate 14. Penrice Castle (SMGm047). View to SW.

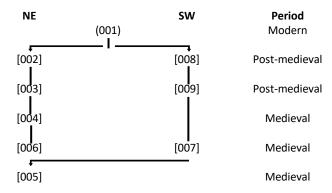
14 Appendix III - Context Inventory

- 14.1.1 The investigations consisted of the recording of the wall walk along the south eastern internal wall of the gatehouse during masonry conservation. The archaeological recording was instigated in response to the discovery of a wall walk drain [006] that required further investigation and interpretation/dating. The Wall Walk Drain 1 [006] was established as medieval and likely original (later 13th century). A second wall walk drain [007] was discovered in the southwest wall, although this drain was in a very poor state of survival.
- 14.1.2 The investigations were tied into the Ordnance Survey National Grid and Datum using three Ground Control Points (GCPs) surveyed with an RTK GNSS GPS receiver:
- GCP1 = 249699.599, 188525.112, 65.200mOD.
- GCP2 = 249704.342, 188529.596, 65.433mOD.
- GCP3 = 249702.830, 188526.657, 63.330mOD.

Context	Туре	Dimensions	Description	Period
001	Deposit	0m – 0.04m (thickness)	Dark-brown friable topsoil covering gatehouse stonework, heavy bioturbation.	Modern
002	Structure		Post-medieval walkway and infilling. Loose tabular sandstone and limestone held in soft cream coloured lime mortar matrix. Overlies [003]	Post-medieval
003	Structure		Post-medieval walkway drain. Contemporary with [002]. Drain utilises medieval Wall Walk Drain 1 [006].	Post-medieval
004	Structure		Remains of wall walk stone surface. Underlies [002] and (001).	Medieval
005	Structure		Gatehouse rubble wall core held in hard (sandy) brownish white mortar (Period II). Contemporary with [006] and [007].	Medieval
006	Structure		Wall Walk Drain 1 in NE side of gatehouse. Contemporary with [005].	Medieval
007	Structure		Wall Walk Drain 2 in SW side of gatehouse. Contemporary with [005].	Medieval
008	Structure		Post-medieval walkway stone surface. Underlies (001).	Post-medieval
009	Structure		Post-medieval walkway and infilling. Loose tabular sandstone and limestone held in soft cream coloured lime mortar matrix. Underlies [008]. Overlies [005] and [007]	Post-medieval

All depths below present wall walk level unless otherwise stated.

Gatehouse south eastern internal wall (walk) stratigraphy:





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Yn rhan o'n hawydd i wella ansawdd ein gwasanaeth, rydym yn croesawu unrhyw adborth y gallwch ei ddarparu.

As part of our desire to improve our quality of service we welcome any feedback you are able to provide.

Archaeoleg Mynydd Du Cyf/Black Mountains Archaeology Ltd

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