

Appendix 14.2

Excavations

14.2 Archaeological, Architectural and Cultural Heritage – Excavations

The following list provides a summary of archaeological excavations carried out within the proposed development site and Study Area, as recorded in the Excavations.ie Database of Irish Excavation Reports (1970 to end of July 2025).

The townland in which the excavation was undertaken is given on the left-hand side, followed by its Excavations.ie reference number. The author of each report is listed beneath, with all entries edited by Isabel Bennett.

14.2.1 BARNAHELY 1996:038

Edmond O'Donovan

Monitoring and trial excavation took place on the site of the Merfin factory at Barnahely, Ringaskiddy, to fulfil conditions of the planning permission for the scheme. Mechanical excavation took place in early April 1996, with ground clearance monitoring carried out later in the month. The archaeological excavation was carried out prior to the commencement of topsoil-stripping or development works. The site was landscaped at the turn of the century to facilitate the construction of a military barracks and its associated facilities.

Forty test-trenches were mechanically excavated to natural subsoil to establish the presence of any archaeological soils or features on the site. One trench revealed an area of burning which consisted of a circular, shallow, fire-reddened pit, 0.75m in diameter, filled with charcoal and ash. The area around this feature was later monitored.

During the site assessment, a millstone and two incomplete fragments of millstones were discovered with other stones against the field boundary. They may have been placed in this location during field clearance prior to the construction of the barracks. No associated archaeological structures were revealed in connection with the millstones during trenching and monitoring. The work fulfilled the archaeological requirements for the development.

14.2.2 BARNAHELY 2004:0202

Rose Cleary

Test-trenching was undertaken in advance of the construction of a road network and ancillary trenching on a land bank at Barnahely, Ringaskiddy. The closest monuments are Castle Warren and an enclosure. The excavation did not uncover any archaeological feature or find.

14.2.3 BARNAHELY 2004:0203

Tony Cummins

Twelve test-trenches were excavated in the vicinity of a ringfort as part of a pre-development assessment of a potential factory site. The trenches were opened across a number of potential archaeological features identified during a geophysical investigation of the site. Two previously unrecorded archaeological sites were identified during the course of this testing. These appeared to be the remains of a keyhole-shaped kiln, located c. 10m to the west of the ringfort, and a levelled fulacht fiadh, located c. 20m to the north-west of the ringfort. Both of these sites were recorded and left in situ. A full excavation of these sites was recommended prior to commencement of any construction project in the area to the west of the ringfort.

14.2.4 BARNAHELY 2012:096

Tony Cummins

Three 2m-wide trenches were manually excavated at a ringfort in Barnahely townland as part of a preliminary site assessment in order to inform a potential research project. A metal detector (12R0040) was used during the excavation in order to aid in artefact recovery and a programme of on-site sieving was also employed. The bank along the west and south-west sides survives to height of 1m above existing internal ground level. The U-shaped ditch is partially open in these areas and measures up to 1.5m deep and 5.6m wide at top. The bank survives to the north and east as a denuded, low feature and the ditch is completely

infilled in these areas. A gap in the bank in the north-west quadrant may mark the location of an entrance feature. The excavation project was preceded by geophysical and topographical surveys of the entire ringfort. The geophysical survey (Target Archaeological Geophysics: 11R0115) identified internal anomalies interpreted as the remains of probable hearth/kiln features and pits.

14.2.4.1 Trench 1

This trench extended southwards from outside the north end of the ringfort ditch and continued across a denuded section of the bank. It then extended for 15m into the west half of the enclosure and the south end was expanded to investigate a 5m² area containing a cluster of geophysical anomalies. The infilled ditch measured 2m deep by 5m wide at top and the sides gradually tapered to the 2.1m-wide rounded base. The six ditch fills were composed of silty clays containing occasional charcoal fragments, small stones and gravel deposits. The partially collapsed ringfort bank survived as an 8m wide by 1.4m high earthen feature disturbed by frequent animal burrows and gorse roots. The extent of disturbance was demonstrated by the presence of modern inclusions within the centre of the bank. The three main deposits in the north end of the bank were composed of sterile re-deposited subsoil and appeared to represent the core of the bank. Two linear U-shaped cuts were uncovered in the subsoil under the bank and both extended under the east and west baulks. The southern example measured 0.8m wide by 0.8m deep and contained four sterile sandy silt deposits while the northern example measured 0.6m wide by 0.4m deep and contained one sterile fill.

The depth of topsoil within the enclosure increased from 0.2m inside the bank to 0.8m at the south terminal of the trench. It contained moderate inclusions of post-medieval and early modern pottery, some of which were present at the base of the topsoil. Five east-to-west-orientated shallow linear features, a pit and two stone-lined cut features were uncovered in the subsoil. The linear features were uncovered under the shallow topsoil in the north half of the trench. They averaged 0.5m wide and survived as 0.05m deep, rounded cuts. The fills were sterile and no traces of associated post/stake-holes were noted. According to local information, the interior of the ringfort was under cultivation in recent decades and these features appeared to have originated from this activity. They were not identified in the geophysical survey, perhaps due to the shallow nature of the cuts in the subsoil. The absence of identified structural features in this area may be due to the presence of the nearby possible entrance to the north-west. A pit was partially exposed in the south end of the 2m-wide section of the trench. It extended for 1.2m from the west baulk and measured 0.47m deep by 0.8m wide. The presence of charcoal inclusions in the two fills and ephemeral traces of burnt subsoil along its sides and base were indicative of a kiln/hearth function.

An east-west orientated, stone-lined linear cut feature was partially revealed in the 5m² trench expansion. The east terminal was exposed within the trench while the opposite end extended under the west baulk. The visible extent of the feature measured 2.65m long and it ranged from 0.4m wide at east to 0.88m at the west baulk. Following consultation with the National Monuments Service, it was agreed to excavate a section through the backfill while leaving the stone lining in situ. The backfill was composed of three soil deposits with occasional inclusions of charcoal fragments. The subsoil at the base sloped gradually down from the east terminal and then extended as a flat surface towards the west baulk where the cut measured 0.94m in depth. The dry stone lining on both sides was composed of sub-angular field stones, with a possible quern stone noted in the south side. There were no traces of in situ or collapsed stone roof lintels identified. A similar stone-lined cut feature was partially exposed against the baulk in the north-west corner of the 5m² excavation area. This was orientated north to south and extended for 0.6m from the west baulk. A 1m by 0.6m sondage was excavated to a depth of 0.64m when the subsoil at the base of the cut was encountered. The dry stone lining on the east side was composed of six rough courses of field stones and three courses of stone lining were also noted in the north baulk. All of the exposed stone lining was left in situ. The cut contained two soil deposits, with moderate charcoal inclusions, and a rotary quern stone was recovered from the basal fill. The intersection between this feature and the similar east-west feature to the south extended under the baulk and it was not possible to ascertain their stratigraphic relationship. They are interpreted as the possible remains of at least one souterrain but this remains tentative as they were not identified in the geophysical survey and their full extent remains to be determined. The presence of two quern stones may also indicate a kiln function.

14.2.4.2 Trench 2

This 15m long trench commenced in the plough zone outside the south end of the ringfort and extended northwards across the infilled ditch, through the projected line of the bank and then continued for 4m inside

the ringfort interior. The geophysical survey encountered massive magnetic interference in this area and this appears to have been caused by metal inclusions in spreads of modern dumped material in this area. The topsoil in the interior measured up to 0.8m deep and contained occasional modern inclusions. The truncated basal remains of the ringfort bank were revealed under the topsoil and it was faced by a possible internal stone revetment. The ringfort ditch measured 4.5m wide at top and the steep sides tapered slightly inwards before they turned to a 2.4m wide, flat base. The sterile ditch fills contained occasional large stones and were prone to flooding with groundwater during the excavation.

14.2.4.3 Trench 3

This 14m long trench extended in a north-west/south-east line through the north-east quadrant of the ringfort interior in order to intersect at a right-angle with a north-east/south-west linear geophysical anomaly. The topsoil was 0.8m in maximum depth and overlay a number of features cut into the subsoil. These comprised three post-holes, one stake-hole, four linear features and one possible north-east/south-west field drain. While the layout of the post- and stake-holes did not indicate the plan of a possible building, their presence nonetheless demonstrated the presence of structure(s) in the north-east quadrant. There were no traces of post/stake-holes noted in any of the linear features and their shared orientation and sterile fills were indicative of cultivation features. The potential that a number of the partially exposed linear features within this trench (and in Trench 1 to the west) may be archaeological in origin is not discounted.

14.2.5 BARNAHELY 2016:080

Tim Coughlan

Testing was carried out ahead of proposed site development works at Barnahely, Ringaskiddy, Co. Cork to inform a planning application. The site is comprised of 10ha of undeveloped fields of pasture to the south of the R613 Carrigaline to Ringaskiddy road, within the western townland boundary with Raheens. A total of 65 test trenches, measuring 3,070 linear metres, were excavated across the test area over the course of 10 days in June and July 2016. These targeted geophysical anomalies identified in the survey undertaken in June and the greenfield areas (Earthsound Geophysics, 16R0081).

Five Archaeological Areas (AA 1–5) were identified during testing which appear to represent the remains of small-scale settlement features dating to the prehistoric and medieval periods. The possible medieval features, including a kiln and a field ditch in AA1 and AA 3, may be associated with the occupation of the ringfort CO087-048 to the north of site. Investigation of the burnt spread and pit in AA 2 suggests it may be the remains of a heavily truncated prehistoric burnt mound. The pits in AA 4 and AA 5 have currently provided no diagnostic dating evidence however they may represent ephemeral remains of prehistoric settlement activity. They are possibly related to nearby recorded prehistoric activity to the east (C0087-147 and CO087-148).

Excluding the archaeological features in AA 1–5 the geophysical survey combined with test trenching has indicated that the remaining anomalies and features on site are geological in nature or represent modern disturbance.

Groundworks associated with the proposed development will have a significant direct negative impact on the features identified during testing in AA 1–4, and any associated archaeological remains. These areas have been subject to agricultural truncation and the features are ephemeral in nature. They are considered as possessing a local significance. It was recommended that these areas be preserved by record in advance of construction. The features identified in AA 5 are located in a proposed temporary carpark zone to be used during the construction phase of the project. An area around these features will be fenced off and protected during and after the establishment of the temporary carpark and will be preserved in situ. There is also the potential for previously unrecorded sub-surface remains to exist in the areas outside of the current test trenches and as such it was recommended that ground disturbances be subject to monitoring.

14.2.6 BARNAHELY 2019:016

Margaret McCarthy

In advance of a planning permission submission by Janssen Biologics (Ireland) for the undertaking of landscape works at their site in Barnahely, Ringaskiddy a test excavation was requested to be undertaken by Cork County Council. The proposed development site is in Barnahely townland 1.5km west of Ringaskiddy

village in Cork's Lower Harbour. A number of shell middens are listed as being present in Cork Harbour coastal area to the south-east of the proposed development. There are several fulachta fiadh and ringforts within the wider area of the subject lands and traces of a burnt mound were discovered while monitoring was being carried out during the construction of the existing Janssen Biologics facility in 2005.

Thirteen trenches were mechanically investigated and two possible cremation pits of unknown date were exposed in Test Trench 6 in the central area of the development lands. Both pits became clear following the removal of topsoil as two localised spreads of dark brown sediment containing occasional stone and charcoal flecking. Pit (F3) was circular in plan and excavation revealed a shallow fracture with steeply sloping sides and a broad relatively flat base. On the surface, it measured 0.7m north-south x 0.73m and reached a maximum depth of 0.15m. The southern side of the pit broke sharply with the surface and it was steep and straight to the base; all other sides sloped very gradually to the base. The pit contained a single fill (F5) of dark brown silt sediment with inclusions of charcoal flecks, small and medium stones and a few very minute fragments of calcined bone suggesting that the pit may have held cremated remains at some stage or that it was used to contain the remnants of a cremation pyre, with the skeletal remains being buried elsewhere. Pit (F4) was located 1.9m north of possible cremation pit (F3). It measured 0.56m north-south X 0.44m and reached a maximum depth of 0.21m. The sides were steep and straight with a rounded stony base. The fill (F6) was similar to that recovered from pit (F3) and the quantity of charcoal and bone present in both pits was insufficient for radiocarbon analysis.

A programme of monitoring was initiated following the test excavation and no further features of archaeological significance were found.

14.2.7 BARNARELY 2019:598

Liam Coen

Archaeological test-excavations took place along suitable portions of the footprint for a pipeline and WWTP near Ringaskiddy, Co. Cork. Parts of the route had been previously assessed (Noonan 2017). Five trenches were excavated and no archaeological features or material was identified.

Reference:

Noonan, D. (2017) 'Final Archaeological Testing Report, Cork Lower Harbour Main Drainage Scheme Shanbally Waste Water Treatment Plant, Shanbally, Co. Cork, Excavation Licence No. 15E0284'. Unpublished Report for Irish Water.

14.2.8 BARNARELY 2025:214

Dawn Gooney

Excavation at Barnarely 4 on the M28 Cork to Ringaskiddy Scheme revealed

five areas of potential archaeological activity. Stage (iv) post-excavation analysis is still pending. Below is a preliminary bulletin.

The excavation and preliminary assessment of findings at Barnarely 4 revealed prehistoric activity, possibly of Neolithic–Bronze Age date and metalworking of Iron Age or early–later medieval date. Some discontinuous linear features appear related to the earlier prehistoric remains while others are of more modern date and align with those depicted on historic OS mapping. It is hoped that radiocarbon dating of the selected samples and specialist analysis of the artefacts recovered will allow more activity to be dated and the phasing of activity to be refined. The dates obtained for this site will also determine whether it was contemporary to the other activity in neighbouring sites at Barnarely 3 and Shanbally 4.

Sixteen artefacts—including tentatively identified prehistoric pottery, lithics and modern pottery—were recovered during excavations and from subsequent sample processing. Archaeological materials including charcoal were also recovered. Details of these including the circumstances of their recovery are outlined in the report.

Activity in Barnarely A was likely related to agriculture, field boundary and drainage. It is possible these represent an early field system; only radiocarbon dates will allow for a full interpretation.

Features in Areas B and C are possibly related to agriculture or field boundary/drainage. Pits in Area D and Area E possibly represent agricultural and/or industrial activity.

The environmental assessment of samples from Area A, D and E indicate the presence of charred grains indicative of prehistoric activity with an identified assemblage comprising mainly of naked barley and probable naked barley, with smaller quantities of barley sp., emmer wheat and probable emmer wheat. The grain assemblage is suggestive of a Neolithic to Bronze Age date.

14.2.9 BARNARELY 2025:215

Dawn Gooney

Barnarely 3 was excavated in advance of the M28 Cork to Ringaskiddy Project by Rubicon Archaeology Ltd (in conjunction with TVAS Ireland Ltd) for Cork County Council and Transport Infrastructure Ireland.

Excavation revealed three areas with archaeological remains indicating activity dating from prehistoric to modern periods.

Stage (iv) post-excavation analysis is still pending. Below is a preliminary bulletin.

The preliminary assessment of the results of the excavation suggests that the burnt mound together with several pits, post-holes and troughs identified at Barnarely 3 Area A were likely prehistoric in date. These features were truncated by later water channels and drainage features which may represent elements of a mill-race.

In Area B, a cluster of pits and stake-holes are currently undated. At Area C, a souterrain with three passages, a penannular ditch and a series of pits and post-holes, that likely represent an early medieval circular house c. 6m in diameter, were identified. An unusual rectilinear slot trench was also uncovered just to the south of the house entrance. This may represent the foundation of some kind of agricultural storage feature, for hay or grain. Finds from this area included a partial rotary quern and fragments of bone comb.

The preliminary specialist assessment of the palaeo-environmental samples support a possible early medieval date for features in Areas B and C.

14.2.10 BARNARELY 2025:216

Philip Quilty

Excavation at Barnarely 5, as part of the M28 Cork to Ringaskiddy Scheme, Co. Cork, revealed the remains of a trackway and a small single-room dwelling dated to the early 19th century. Stage (iv) post-excavation analysis is still pending. Below is a preliminary bulletin.

The structure was rectangular in shape and orientated east to west. It was 9.37m long and 5.03m wide, with an entrance at the north-east. The foundation trench comprised a singular and irregular shaped slot trench (C008) which varied between 1.5m and 0.45m in width and approximately 0.28m in depth. It is mentioned in Griffith's Valuations 1847-64 as belonging to the estate of Robert Warren Esq. and the residence of Daniel Donovan, who leased the property prior to the sale of the Warren lands in 1850.

14.2.11 CASTLE WARREN, BARNARELY 1999:079

Mary O'Donnell

The site at Castle Warren consists of a complex of medieval and post-medieval buildings around a courtyard and includes a tower-house and bawn of probable late 16th-century date and Castle Warren House, which dates to the 18th century. It is currently owned by the Industrial Development Authority, who wished to secure the site by erecting a chain-link fence with an access gate around the tower-house and bawn, at a distance of 10m from the boundary walls.

Five trenches were excavated by machine just inside the line of the fence before the digging of the foundation pits for the fence. No archaeological features relating to the later medieval occupation at the site were uncovered during excavation of the test-trenches or monitoring of the excavation of the foundation pits.

14.2.12 CASTLE WARREN, BARNAHELY 2004:0204

Ken Hanley

Cork County Council proposes to construct a dual carriageway from Cork to Ringaskiddy, which is an area of expanding industrial development supported by a deepwater shipping berth. As part of the route selection process the National Roads Office in Cork considered several route corridor options. The alignment of one such option passed close to Castle Warren (otherwise known as Barnahely Castle) and to the nearby Barnahely graveyard (SMR 87:51).

Test-trenching was undertaken, from late July to mid-August 2004, in the general area surrounding Castle Warren. This was part of a series of site investigation methods intended to assess the archaeological potential of lands adjacent to Castle Warren. Other methods included a geophysical survey (04R065), a topographical survey and a building survey.

Testing typically involved the insertion of 2m wide centre-line trenches with regular offshoots averaging every 10m on alternate sides. A total of 63 trenches (T1-T63) were inserted across six discrete study areas, Areas A-F.

Overall, testing revealed the surrounding area to be largely devoid of archaeological remains. Areas A and C revealed no evidence of archaeological activity. Area B encompassed the greater part of a partially extant early 19th-century walled garden located to the west of Castle Warren. Overall, some isolated features were identified which appeared to relate to the use of the garden. No earlier features of archaeological significance were identified.

In Area D, the only feature of potential consisted of an isolated stake-hole and shallow pit of suspected prehistoric date, identified in the southern end of Trench 1. The upper sloping ground to the southwest of the castle contained 0.4-1m of modern fill, including plastic and other debris. The crest of the hill to the west of the castle complex had exposed surface bedrock. Modern concrete shed foundations were noted, but there was no evidence of a 19th-century O'Sullivan house.

Area E revealed clusters of recent parallel furrows crisscrossing the study area. A wide ditch cut was identified in trenches T29 and T33. The ditch ran in a west-south-west/east-north-east direction along the base of a slight valley between the higher ground to the north and south. It contained high concentrations of unworked stone towards its base and was interpreted as a field drain. It produced no finds and is assumed to be post-medieval/early modern in date, although an earlier date cannot be ruled out. Virtually all of the features identified in Area E are considered to be agricultural in nature. Testing did not reveal any evidence of domestic/settlement activity.

In general, Area F revealed a similar pattern of agricultural land use. However, some parallel ditches (possibly garden plots) were identified to the east of the castle, a finding supported by geophysical results. Testing failed to produce any dating evidence for the ditches. The only other sign of archaeological activity from Area F was in the form of a single charcoal-flecked pit in T38 and a stray find of medieval green-glazed pottery from the topsoil.

14.2.13 CURRAGHBINNY 2011:098

Avril Purcell

Monitoring was carried out on two sections of foreshore at Lough Beg, Curraghbinny, during the construction of coastal protection works adjacent to the GlaxoSmithKline Beecham Cork plant. No features or finds of archaeological significance were revealed.

14.2.14 LOUGHBEG 1 2025:217

Philip Quilty

Excavation at Loughbeg 1, as part of the M28 Cork to Ringaskiddy Project, revealed a cremation pit, multiple pits, post-holes and linear-cut features. The presence and location of archaeological remains at this site were discovered through geophysical survey (Gimson 2021) and subsequent archaeological testing (Long et al. 2022). A total of 1006.87m² (consisting of Area A- 641.01m² and Area B- 419.86m²) was stripped of topsoil during Stage (ii) pre-excavation services at the site in August 2022 and, subsequently, it was recommended that all archaeological remains on the site be subject to Stage (iii) excavation as they

would be directly impacted by the construction of the road. The fieldwork was carried out between 21 of November and 1 of December 2022. Stage (iv) post-excavation analysis is still pending. Below is a preliminary bulletin.

The preliminary assessment of the results of the excavation suggests several phases of multi-period activity. Some of the earliest activity is likely to be prehistoric in date and consists of a pit cremation, while a series of pits and post-/stake-holes to the south-west are probably medieval in date, based on a preliminary assessment of the associated cereal grain. Several linear features/ditches were identified, of possible post-medieval date and a field boundary and a number of agricultural furrows were early modern in date. There is evidence to suggest elements of the 19th-century field boundary as depicted on historical mapping is likely to extend beyond the current road take.

Two artefacts, an iron blade and nail, were recovered during excavations and from subsequent sample processing. Archaeological materials including cremated human bone and animal bone were also recovered.

577891, 563958 (Area A), 577897, 56392 (Area B) (cutting centroid).

14.2.15 LOUGHBEG 2 2025:219

Stephen Hourihan

Excavation at Loughbeg 2, as part of the M28 Cork to Ringaskiddy Project, Co. Cork, revealed three pits, a charcoal-rich spread and a post-medieval laneway. Stage (iv) post-excavation analysis is still pending. Below is a preliminary bulletin.

The pits and charcoal-rich spread occurred in a cluster in one Area (Area A). The pits contained multiple charcoal-rich fills containing pottery, tentatively identified as Bronze Age in date, lithics, and some fragments of rubbing stones. Some charred cereal grains were also identified but these were rare and in poor condition.

The post-medieval laneway aligns with a lane marked on the first-Edition 6-inch (surveyed 1840/published 1845) and 25-inch (published 1898) OS maps of the area. It led from the coastal road to the north, past a building known as 'Rock Cottage', to an unnamed dwelling on the border with Ringaskiddy townland to the south. The unnamed dwelling is no longer extant.

There is no evidence to suggest the site extends beyond the current roadtake, except for the continuation of the post-medieval laneway.

A total of 75 artefacts/potential artefacts including prehistoric and post-medieval pottery, lithics, groundstone fragments, glass and metal finds was recovered during excavations. Archaeological materials in the form of charred plant remains (cereal grain, nutshell and charcoal, a mixture of oak and non-oak) were also recovered.

Area A- 578319, 564151; Area B- 578372, 564168 (cutting centroid).

14.2.16 LOUGHBEG 3 2025:218

Philip Quilty

Excavation at Loughbeg 3, as part of the M28 Cork to Ringaskiddy Road Project, Co. Cork, revealed a pit, a possible trough and a series of eight stake-holes as well as a large natural depression that contained a single sherd of prehistoric pottery. Stage (iv) post-excavation analysis is still pending. Below is a preliminary bulletin.

The preliminary assessment of the results of the excavation suggests that the small burnt spread, oxidized area, eight stake-holes and trough identified at Loughbeg 3 were prehistoric in date. Trough C030 continues outside the scheme boundary to the south, indicating that the site has not been fully excavated, and that additional archaeological features/deposits remains in situ.

The only artefact discovered was a single sherd of prehistoric pottery recovered during the Stage (ii) work.

14.2.17 LOUGHBEG 4 – RINGASKIDDY 2025:220

Patrica Long

Excavation at Ringaskiddy 1, as part of the M28 Cork to Ringaskiddy Project, Co. Cork, revealed a cluster of six pits and one post - hole in Area A. These features were prehistoric (probably Neolithic) in date, while upon investigation the features identified in Area B, located 40m to the south, were deemed to be non - archaeological in nature. There is no evidence to suggest the site extends beyond the current roadtake. Stage (iv) post - excavation analysis is still pending. Below is a preliminary bulletin.

A total of 203 artefacts/potential artefacts including prehistoric pottery, lithics, a possible spindle whorl and stone beads was recovered during excavations and from subsequent sample processing.

Archaeological materials in the form of charred plant remains (cereal grain, nutshell and charcoal, mostly oak) were also recovered. Preliminary interpretation is that these were Neolithic waste pits.

Area A: 578409, 564021; Area B: 578418, 563944 (cutting centroid).

14.2.18 RINGASKIDDY 2001:230

Sheila Lane

Following an assessment of this site in advance of a proposed industrial development, an area of potential archaeological interest was identified. The feature comprised an elongated grass-covered mound, 36m east–west by 9m and 1m high. It was at the top of a steep escarpment, overlooking a quarried area. A test-trench was excavated across the mound using a mechanical digger. The mound was found to be of recent origin and of no archaeological importance.

14.2.19 RINGASKIDDY 2003:336

Caitriona Gleeson

Monitoring was undertaken of an offshore area at Ringaskiddy, Co. Cork. Planning permission has been granted for the construction of a jetty and pontoon in connection with the proposed National Maritime College Development. As well as excavation, the work was undertaken in accordance with the terms of a licence to use a detection device (03R105).

Ringaskiddy is located on the west bank of the River Lee estuary, approximately ten miles from Cork city. The area of proposed development was located north of mainland Ringaskiddy and south of Haulbowline Island.

There are three known monuments within the area surrounding the proposed development site: SMR 87:105 (a magazine fort), 87:53 (a Martello tower) and 87:59 (a military barracks, Martello tower and star-shaped fort on Haulbowline Island). There are also a number of listed shipwrecks in this area.

Dredging was carried out from a sea-going pontoon, Braveheart, using a 70-ton crane complete with digging/rehandling grab. Initially, an archaeologist was present on the pontoon throughout the course of all works. The dredging material was deposited on land. Two archaeologists were present on the shore to monitor the deposition of this material. Subsequent to deposition, the archaeologists walked over the deposited material with a metal detector. This strategy was employed for four weeks and, with the exception of three fragments of timber, nothing of archaeological significance was recovered. In response to this, the Underwater Archaeological Unit of the Heritage Service recommended that the programme of monitoring be scaled down.

The area of the proposed jetty was excavated to an overall depth of $\pm 4.183\text{m}$, with a deeper area of 90m² (plunge pool) excavated to $\pm 6.1\text{m}$. The excavated sediment was a dark-grey silt, which became sandier in composition at its lower levels.

Three non-archaeological timber fragments were recovered during the course of sieving. The largest was of beech and comprised the tapering end of a modern stake. The remaining pieces were identified as oak and may have been fragments of driftwood. Two relatively modern glass bottles and a number of non-archaeological metal artefacts were also recovered. No archaeological features or artefacts were identified within the area of proposed development.

14.2.20 RINGASKIDDY 2006:383

Rex Bangerter

Non-disturbance underwater archaeological assessment of 33 seabed anomalies identified by a side-scan sonar survey was undertaken in November 2005. The proposed development is on the south side of Cork Harbour at Ringaskiddy and comprises the construction of a multi-purpose berth and storage facility at the ADM jetty and a container terminal with RO–RO berth at Oysterbank. While the underwater assessment was focused on the side-scan target locations, a sizeable buffer zone was incorporated into the dive survey, with circular searches that extended the survey up to 30m around each target location. Particular attention was paid to recording seabed topography and bottom composition at each dive location. The assessment was comprehensive and identified all but two of the 33 side-scan targets. All material encountered was either of natural composition or of modern origin. The visual seabed inspection and side-scan sonar survey has revealed a low potential for surface archaeological remains located within the ADM and Oyster bank sites.

14.2.21 RINGASKIDDY 2006:384

Rex Bangerter

Non-disturbance visual inspection was employed to assess the archaeological potential of the seabed along two cable-lay routes (Routes 1 and 4) identified for the proposed Aghada to Cuskinny Cable Lay Project. In addition, a number of side-scan sonar and magnetometer anomalies, located within the vicinity of each cable route, were investigated. The shallow inshore sections of the survey were undertaken as a snorkel survey. The underwater survey area constituted a 3.2km by 10m search area for Cable Route 1 and a 1.04km by 10m search area for Cable Route 4. The survey was conducted in a series of stages, with a 600m length of seabed being surveyed in each stage. The shoreline at each location was inspected to ascertain its archaeological potential and a 200m section (east–west) of foreshore was field-walked at Cuskinny Bay and a 50m (east–west) section at Aghada.

The assessment was comprehensive and extended beyond the immediate impact zone for each of the cable routes. The placement of coastal protection measures along Cuskinny Bay and the land reclamation at Aghada has limited the archaeological potential at both foreshore locations. No material/deposits of archaeological significance were observed exposed on the seabed as part of the survey. The seabed was largely clear of man-made surface debris, with only occasional fragments of metal being encountered (jetsam from fishing vessels). However, the potential for archaeological debris to lie within the buried levels remains, as attested to by the magnetometer anomalies identified in the pre-dive survey, the diver survey confirming that these remain buried.

14.2.22 RINGASKIDDY 2007:315

Declan Moore

A programme of testing was carried out at Ringaskiddy, Co. Cork, in July 2007. The proposed development entails the construction of a monoclonal antibody (MAB) facility for the manufacture of a cell culture drug substance. The site is located adjacent to the current Pfizer Inc. Ringaskiddy API facility and constitutes a portion of the former ADM Ringaskiddy facility. The ADM facility will be demolished prior to construction and the proposed MAB site will be located on the car parking/roads/landscaped areas of the former ADM site and will not include the footprint of any former buildings or tank farms. The proposed development is c. 10 acres in area. The development is close to CO087–061 and CO087–106.

An inspection of the site was carried out as part of an overall EIS in March 2007. No archaeological features were noted at this time. Further investigation of aerial images indicated a circular cropmark at the western extent of the site. Testing was carried out in order to examine the nature and extent of this feature. Two test-trenches were excavated. Nothing of archaeological significance was noted during the course of testing. It is the author's opinion that the aerial anomaly is a geological feature.

Although nothing of archaeological significance was noted during the course of testing, given the extent of the proposed development it was recommended that, during the course of construction, topsoil-stripping be monitored. Monitoring took place on 2–3 October 2007. No archaeological features were discovered during topsoil removal within the footprint of the proposed development (c. 2 acres).

14.2.23 RINGASKIDDY PORT, BARNAHELY 2012:095

Niall Brady

Intertidal and marine inspection of proposed development area at Ringaskiddy, Co. Cork, focused on Ballybricken Point, where reclamation is proposed, in the East Basin, and the area behind the Dolphin Ramps. No material of archaeological significance was observed exposed on the seabed or on the foreshore.

14.2.24 RINGASKIDDY 2016:186

Tony Cummins

Test trenching was undertaken in a green-field site in tillage farmland to the south-east of Ringaskiddy village. Cork County Council are considering using the subject site to source soil for proposed land rehabilitation works at the nearby Hawbowline Island. There are no recorded archaeological sites within the property but a Martello Tower (CO087-053----) is located within the adjacent landholding. A geophysical survey of the lands was undertaken by J.M. Leigh Geophysical Surveys in advance of testing (Licence 15R0146). This identified widespread ploughing, land drains and levelled field boundaries within the site although a number of isolated features of archaeological potential were also noted.

The test trenching layout formed a combination of linear trenching throughout the site with individual trenches focused on isolated anomalies. A metal-detecting survey was also undertaken during testing to assist in artefact retrieval (Licence 16R0029). Two clusters of potential pits and post/stake-hole features were identified in trenches in the east and west ends of the site. These were manually cleaned, recorded and then left to remain in situ. There were no artefacts identified during cleaning of the features or during inspections of the spread upcast plough soil in either area. Further archaeological investigations were recommended in these areas in the event that the proposed scheme progresses.

14.2.25 RINGASKIDDY 2016:500

Julianna O'Donoghue

Monitoring was undertaken of enabling works for Ringaskiddy Harbour Redevelopment. The works involve reclamation on the foreshore using imported quarry material and protected with rock armour. All seabed disturbance associated with the enabling works were monitored and an archaeological dive team remained on standby for the duration of the works.

Sediment was reduced using a mechanical excavator with a long reach arm under supervision. The material consisted of silty clay. Several timber logs were retrieved; these were examined and found to be in a natural state. A sample of the sediment was spread for physical examination and metal detected to maximise artefact retrieval. No archaeological features, stratigraphy or artefacts were recovered from the sediment.

14.2.26 RINGASKIDDY 2016:500

Rex Bangerter

Underwater Archaeological Impact Assessment (UAIA) took place of a section of seabed adjacent to the Ferry Terminal at Ringaskiddy Basin East. This work was undertaken as part of the EIS for the Port of Cork Ringaskiddy Development project, to which ADCO was appointed Project Archaeologists. As part of the Ringaskiddy development it is proposed to insert three new dolphin structures within the ferry terminal at Ringaskiddy Basin East. These structures will extend the existing line of dolphin structures c.97.5m to the north-west, terminating at ITM: 577584E, 564575E. The proposed dolphins are to be positioned at the following coordinates: ITM: 577635E, 564526N, ITM: 577611E, 564550N, and ITM: 577587E, 564572N. In addition, two disused dolphins, located 20m to the east of proposed dolphins, will be subject to removal. These structures are located at ITM: 577652E, 564545N and ITM: 577633E, 564562N.

The UAIA comprised the systematic, non-disturbance, visual assessment of the seabed surrounding the above development components. The on-site work was carried out on 20 November 2016. No material, deposits, or structures of archaeological significance were encountered as part of the assessment.

14.2.27 RINGASKIDDY 2017:235

Tony Miller

As part of the Haulbowline East Tip Remedial Project being developed by Cork County Council a large area of nearby land has had to be stripped to access the subsoil needed for sealing the island. A geophysical survey was carried out on this land (16R0029) followed by targeted test excavation (16E0103). The testing uncovered approximately 12 features of possible archaeological interest. Prior to works commencing these had to be resolved by full excavation as well as monitoring topsoil removal for 30m around each feature. This was carried out under licence 17E0641, initially by Juliana O'Donoghue of Mizen Archaeology. In the course of monitoring, an area of possible prehistoric activity was uncovered and will be excavated during 2018.

14.2.28 RINGASKIDDY 2018:734

Tony Miller

Both monitoring and excavation were required at Ringaskiddy ahead of the large-scale soil extraction needed for the Haulbowline East Tip Remediation Project being carried out by Cork County Council. Monitoring was initially targeted on features located during earlier testing under Licence 16E0103 (John Cronin and Assocs.)

This large area of farmland overlooking Cork Harbour was divided into 5 fields. The features discovered had all been heavily truncated by ploughing. A small number of features were uncovered including a hearth in Field 1 and a possible roasting pit in Field 3. In Field 4 two adjacent bowl furnaces were excavated. The assemblage of iron-smelting slag has been preliminarily identified as belonging to the Developed Iron Age, between the 4th century BC and 1st century AD (GeoArch).

A larger area of prehistoric activity was found in the central area of Field 2. Here the footprints of four possible post-built house structures were identified. During surface cleaning fragments of Early Neolithic and Late Bronze Age pottery were found (Grogan & Roche).

Crossing east-west across this central area were three distinct linear ditches. The most easterly of these (C26) appeared to form the boundary of a large area extending beyond the site boundary to the east and south. It was separated from the central ditch (C44) by a narrow causeway, indicating they were probably contemporary. A single sherd of Late Bronze Age domestic ware was found in the upper fill of C44. The third ditch (C240) extended to the west beneath a retained field boundary and did not reappear in the adjacent field. A large number of stake- and post-holes and possible pits were also recorded.

Most of this central area of prehistoric activity was recorded in plan only. Sections were cut through the three ditches and some of the post-holes were fully excavated. It was then decided that the subsoil in this area would not be needed and the site should be reburied under supervision.

14.2.29 CORK HARBOUR BETWEEN CORKBEG ISLAND AND ROCKY ISLAND 2009:134

Rex Bangerter

Underwater assessment took place of a series of marine geophysical anomalies located along the proposed route of a 220kV submarine cable between Corkbeg Island and Ringaskiddy, Cork Harbour. The assessment included the visual inspection of side-scan sonar anomaly ss5 and two magnetometer targets, mg4 and mg11, located within the cable wayleave. A number of other geophysical targets (ss12 and mg34) located in close proximity to the proposed route were also assessed. Underwater inspection of shipwreck anomaly ss7/mg8, c. 1km north of the proposed cable route, was undertaken to ascertain its archaeological significance.

Systematic visual inspection of the seabed surrounding each of the geophysical targets was undertaken. No archaeologically significant features were encountered as part of the archaeological assessment of those targets located within/close to the cable wayleave. A potential positive identification of the geophysical targets was achieved for ss5, ss12, and mg34. No targets were identified for anomalies mg4 and mg11, which are considered to be buried or represent mobile objects that have moved to a different seabed location subsequent to the initial geophysical survey.

Shipwreck anomaly ss7/mg8 is located within the vicinity of the documented location of the 17th century wreck of the Bredah (Shipwreck Inventory, DoEHLG). Dive inspection suggests the wreckage is from a composite vessel of later date that probably dates to the late 19th century.

The composite wreckage forming anomaly ss7 will remain unaffected by the proposed development and no further archaeological mitigation measures are required for this site. The position of this wreck has been listed in the Shipwreck Inventory and is afforded statutory protection under the National Monuments Acts 1987–2004.

14.2.30 FORT MITCHELL PIER, SPIKE ISLAND, CORK HARBOUR 2014:502

Julianna O'Donoghue

Monitoring of dredging works was undertaken at Fort Mitchell Pier, Spike Island, in Cork Harbour. The dredging was carried out in association with the installation of pontoon anchors. The upgrading of the landing facilities at Fort Mitchell Pier form part of Cork County Council's heritage-tourism development of Spike Island.

The excavation of eight pits was monitored. The excavated material consisted of a layer of gravelly sand overlying grey silty-clay. Five timbers were uncovered from Pit no. 6 and one from Pit no. 7. The timbers appeared to be ex-situ and displayed no evidence of recent splitting or fractures. All of the timbers were heavily eroded and damage from gribble infestation. Metal fixing holes and in-situ clout-ended spikes are visible on most of the timbers. Pit 6 and Pit 7 are located close to a concrete pier where several timber uprights are visible on the foreshore at low tide. These remains appear to be remnants of a former pier structure. Although the exposed sections of the timber uprights do not display any evidence of teredo or metal fixings, it is possible that the recovered timbers are also part of this construction.

The convict's causeway is also in the vicinity of the pontoon. The causeway, which spanned the channel between Spike Island and Haulbowline, comprised a stone causeway and wooden footbridge built in the 1860s. The causeway is not indicated on any available maps but a drawing of the area depicts the structure further east of the pontoon.

14.2.31 FORT MITCHELL PIER, SPIKE ISLAND, CORK 2016:639

Tony Cummins

Monitoring of ground works was undertaken at various locations both in and around Fort Mitchell during a Cork County Council landscaping and service upgrade project on Spike Island. Permission to use of a metal detector to assist in artefact retrieval was granted under the Ministerial Consent. The majority of the landscaping works within the fort were limited to the removal of sod layers within disturbed areas and, where feasible, upgraded services were inserted into existing pipe trenches.

Construction of the existing fort commenced in 1804 on the site of an 18th-century fortification. The existing level ground within the fort was created by extensive 19th-century quarrying while the sloping ground outside the walls comprises a glacis constructed with the quarried stone. By 1822 the fort was still incomplete but a renewed building phase was instigated after the island was converted into a convict depot in 1847 and modifications continued to be made to the fort into the 20th century. It was handed over to the Irish Government in 1938 and remained as a military/naval base until the 1980s when it was granted to the Irish Prison Service. Substantial damage to areas of the fort subsequently occurred during the creation of prisoner control measures. This included the demolition of various structures as well as the removal of access to the bastions by a combination of new concrete walls and infilling access routes with soil and rubble.

The project entailed supervising the removal of modern infill material introduced by the Prison Service and landscaping was undertaken in areas formerly occupied by demolished 19th- and 20th-century structures. All exposed sub-surface remains of structural remains were recorded and left to remain securely in situ.

Bastion 3 (south end of fort)

Landscaping works on Bastion 3 involved the removal of a thin sod layer that had developed on top of a soil cover introduced following Prison Service demolition works. Occasional inclusions were noted under the sod layer and included plastic bags, bottles, tobacco pipe stems, three 20th-century Irish Army steel mugs and various 19th-20th-century pottery sherds. Monitoring of the construction of two access steps to the top of the bastion revealed 20th-century inclusions within the underlying soil cover. The upper section of a buried 1.5m wide concrete alcove feature was identified under the sod layer on the west side of the bastion (at ITM 580407, 564535). This may have been associated with a nearby gun emplacement visible on a 1963 aerial

photograph. The exposed section of the alcove was recorded and it was then resealed. There were no traces of the demolished gun emplacement exposed under the sod layer but the presence of the alcove demonstrates the potential survival of other buried features in this area.

The removal of concrete rubble blocking the steps leading down to the conjoined Underground Shelter and Battery Observation Post under the centre of the bastion exposed the intact concrete steps. The interior of the concrete shelter and two passages leading to the observation post on the seaward side were also intact but contained no surviving internal fixtures or artefacts.

The concrete observation post on the seaward side comprised a curved space partially divided by a central north-south concrete wall. The roof was 2.18m above floor level and the overall internal area measured 6.04m (east-west) by 3.04m. The narrow observation slot on the seaward (south) wall had been sealed with concrete blockwork which was removed under supervision. The central dividing wall contained a mounted timber tidal gauge and painted datum information for various harbour landmarks. These features were recorded and will remain in situ. The interior of the observation post was found to have been cleared of material apart from a badly corroded metal stove, fuses and truncated cables. Cork County Council have arranged for the appropriate secure onsite storage of this material.

Walkway between Bastions 3 and 4

The removal of a deep infill of soil introduced by the Prison Service to block the former access route between Bastions 3 and 4 was monitored. This exposed the surviving basal courses of two 19th-century structures set into the earthen bank along the north side of the walkway. These comprise the remains of the cut limestone walls of a Small Arms Store and Forge Store shown on an 1894 survey of the fort. They are also visible in 1980's aerial photographs taken prior to the Prison Service interventions. The exposed front facades of both buildings had been removed down to window sill level and loose limestone blocks were encountered within the soil infill adjacent to both structures. Cork Council arranged for the secure storage of these onsite. While not exposed, the roofs of both buildings under the bank appeared to have been removed and their interiors were completely infilled with rubble. The remains of both structures were recorded and their surviving facades remain in situ as visible features along the walkway.

Bastion 4 (south-east corner of fort)

The removal of the modern infill blocking the former access route on the inner (west) side of the bastion exposed the concrete roof of the underground bastion passage which had formed the surface of the access route. The removal of the infill in the north end of the bastion exposed a 1.8m wide, unroofed, sunken passage, with concrete side walls and a floor located 2m below adjacent ground surface. The passage is shown on the 1894 survey which labels three recesses revealed along the east wall as shell recesses and these will be left exposed as part of the reinstated walkway. The sunken passage initially extended 7.2m northwards and then turned to the north-west for 10.05m where it terminated at the entrance to the infilled stairwell leading down into the underground bastion structure. The removal of the concrete rubble which had completely sealed the concrete steps was carried out manually. A portion of the rubble appeared to have been created by the demolition of the concrete roof over the top of the stairwell entrance but the amount present indicated that some of the rubble was sourced from elsewhere, perhaps from demolished structures on top of the bastion. The removal of the rubble from the stairwell entrance also exposed the concrete steps leading down to an intact northern side gallery, the interior of which contained no surface artefacts or fixtures.

Bastion 6 (north end of fort)

The removal of the sod layer along a new footpath on top of Bastion 6 revealed an underlying spread of soil with modern surface inclusions. No surface traces of the gun emplacement shown in the centre of the bastion on the 1894 survey were revealed. A buried concrete feature was partially exposed under a spread of loose concrete rubble at the former location of 20th-century gun emplacement visible at the west side of the bastion on a 1963 aerial photograph. The rubble infill on the line of the footpath was manually removed and this partially exposed the buried remains of the concrete emplacement which comprised a surface platform with a central, sunken circular area. This feature was recorded and then resealed with soil.

The removal of the sod layer at the top of the two access ramps extending up to the bastion also exposed two munitions shafts extending down to the underlying magazine structure and these were retained in situ.

A small rectangular concrete surface (1.2m x 1.8m) was exposed under the sod near the centre of the bastion and its location corresponds to an artillery recess structure shown on the 1894 drawings. This feature was also recorded, resealed and remains in situ.

Parade Ground

The existing lawns, tarmac-covered roads and yards were created by the Prison Service in the 1980s and this included the removal of the existing yard surface and the introduction of topsoil sourced from the outside of the fort. Landscaping works in the northern end involved the removal of the thin sod layer in previously disturbed ground surrounding the extant Shell Store building adjacent to Bastion 6. A number of 19th-century buildings in this area were demolished by the Prison Service in the 1980s which are clearly shown on various historic maps that label their original uses. The fragmentary remains of a number of demolished structures were exposed beneath the sod and included the foundations of the Shell Store blast wall as well as remnant traces of the floors of an office building and various stores. All exposed sub-surface features were fully recorded, resealed and remain in situ.

Works in the north-east corner of the parade ground entailed the creation of a new exhibition structure within a modern prison yard enclosed by tall concrete walls. The removal of the tarmac yard surface revealed the random rubble foundations of two demolished walls and traces of a small concrete floor surface. These correspond to boundary walls and a shed structure shown on historic mapping and were recorded, re-sealed and remain in situ under the exhibition structure.

Ground works associated with upgrading of an early 20th-century canteen building, formerly used as a gym and a military drill shed, within the north-east corner of the parade ground were also monitored. Cartographic sources indicate that this area was undeveloped during the 19th century and monitoring of the removal of topsoil material introduced around the building in the 1980s did not reveal anything of archaeological significance.

The majority of the new services within the parade ground were inserted into existing pipe trenches and the only new section comprised a trench extending along the tarmac road on the north side. The modern road surface overlay a make-up layer composed of re-deposited subsoil and quarried bedrock fragments. This layer measured up to 0.8m above intact bedrock while it was absent in areas where the uneven bedrock surface extended close to road surface level. A number of modern services trenches were exposed and no traces of structural remains were encountered. There were very few inclusions within the make-up layer and these comprised brick fragments, chinaware sherds and modern objects.

It was deemed unsafe to excavate the section of the service trench exiting the fort through the confined northern gate passage so it was instead carried by 0.2m diameter bore inserted through the bedrock under the Casemate building adjacent to the west side of the gateway.

Fort Entrance Area and Glacis

The excavation of the service pipe trench continued in the area where the bore exited under the Casemate building as it emerged into an infilled rectangular walled moat centred on the fort gateway. This feature had been backfilled in recent decades with soil that contained frequent modern inclusions. The buried limestone block wall on the outer (north) side of the gate moat was encountered at a distance of 6.6m from the Casemate wall. It measured 0.95m wide at top and had widened to 1.9m at the base of the service trench where a 0.2m wide bore was inserted. The gate moat trench was backfilled with the excavated soil following the installation of the pipe. The area between the gate moat and the outer fort wall was infilled with a homogenous layer of quarried bedrock fragments, with occasional brick inclusions, that directly overlay natural bedrock. This material was similar in composition to the glacis fill encountered outside the fort and appears to form a continuation of this feature across the dry moat area. The quarried stone infill in this area gradually increased in depth from 2m at north to 4m at the outer wall of the fort. The quarried stone extended to the wall which may have been constructed on the underlying bedrock and the basal courses then sealed by the deposition of the quarried stones.

The pipe trench then extended down the north side of the external glacis towards a water treatment area in a low-lying field to the north-west. The glacis material was formed by a loose deposit of quarried bedrock fragments with localised lenses of re-deposited subsoils. The majority of the glacis was sterile although it contained occasional inclusions of 19th-century pottery, tobacco pipe stems and a localised dump of broken

bricks. The service trench on the upper section of the glaciis was excavated to 4m below modern ground level in order to tie in with the fall of the pipe as it exited the fort. The underlying bedrock was encountered in localised areas but for the most part the substantial deposit of quarried stone in this area was still present at the trench base. The depth of both the trench and the glaciis material became progressively shallower as works extended downslope and the glaciis material gradually tapered to 0.2m deep at its outer edge. The excavated stone from the trench was backfilled following the installation of the pipe.

Nothing of archaeological significance was noted during topsoil stripping at the water treatment area in the field adjacent to the base of the glaciis.

Other Works

Monitoring of ground works undertaken for the installation of a shallow service trench along the northern coast road and the construction of a seating area on the modern surface of the landing pier did not reveal anything of archaeological significance.

14.2.32 HAULBOWLINE ISLAND 2004:0279

Caitríona Gleeson

Monitoring was undertaken of three separate areas within the Irish Naval Base, Haulbowline Island, Co. Cork. These areas comprised Rat Island, the Naval Basin and the approach channel to the basin. This work was completed in response to a request by the Underwater Archaeology Unit as part of the draft conditions of the dumping at sea permit granted by the Department of Communications, Marine and Natural Resources to the Department of Defence.

Two known monuments are within and adjacent to the proposed development site. These are a magazine fort and a military barracks, Martello tower and star-shaped fort on Haulbowline Island. There are also a number of listed shipwrecks in this area.

No archaeological features or artefacts were identified within the area of dredging.

14.2.33 ROCKY ISLAND 2006:385

Avril Purcell

Disarticulated human remains were identified during the redevelopment of the magazine as a crematorium. The remains were found in a large bund or mound of stone which flanks the outer wall of the magazine. A new access point was being constructed at the north-western corner of the bund when the bone was revealed. Hand excavation was undertaken in the area and a small concentration of animal bone, human bone and musket balls were recovered. No stratigraphic sequencing was apparent within the bund, with the exception of the recent disturbance to facilitate construction of the new access point, during which the bone was identified. It seems likely that the remains were deposited in the bund during the construction of the magazine, which was built between 1808 and 1818. A report is pending on the human remains.

14.2.34 ROCKY ISLAND 2006:386

Avril Purcell

An intertidal and metal-detector survey were carried out on the north-western foreshore area of Rocky Island in Cork Harbour in advance of the proposed construction of an outfall pipe associated with the redevelopment of the magazine as a crematorium. No features or finds of archaeological significance were revealed.