

Appendix 11.4 - Photographic Record / Plates.

Appendix 11.4: Photographic record



Plate 1: Aerial view of the proposed development area, looking northwest. Recent school development is visible in top left quadrant



Plate 2: Modern hardstanding at the southern portion of the proposed development site



Plate 3: Golf hazards and earthworks within the interior of the proposed development site



Plate 4: Ground level view of earthwork (DU026-124----/WI004-005----)



Plate 5: Drone view of earthwork (DU026-124----/WI004-005----), looking west-southwest



Plate 6: Semi mature trees which formed part of the landscape design associated with the former golf club



Plate 7: Modern palisade fencing along the eastern boundary of the proposed development site - the majority of the proposed development site is enclosed by similar security fencing

Appendix 11.2: Excavation Database entries

Site Name	Licence No. and Director	Database Entry
Ravenswell, Bray, Wicklow	16E0340 (Aidan O'Connell)	Monitoring of groundworks was carried out at the site of the proposed St Philomena's School and Coláiste Ráithín, on a green-field site in Bray, Co. Wicklow. No archaeological material was recorded in the course of monitoring.
Ravenswell, Bray, Wicklow	14E0225 (Aidan O'Connell)	Test trenching was carried out at the site of the proposed St Philomena's School and Coláiste Ráithín, on a 3.9 ha green-field site in Bray, Co. Wicklow. Five test trenches totalling 250m were excavated within the site following a geophysical survey. Trench locations were targeted on the supposed location of a Pale Boundary Ditch which was also located in the course of a geophysical survey. Testing revealed the ditch as a 19th-century feature. 19th-century glass and pottery finds were uncovered at the base of the trenches across the ditch. Subsoil varied between a compact orange brown stony clay and natural gravel. Topsoil was consistently deep across the majority of the site, ranging from 0.28-0.35m deep. There were no archaeological features recorded in the course of testing
Ravenswell/Cork Great/Cork Little/Shanganagh, Dublin	11E0304 (Faith Bailey)	Monitoring was carried out as part of the construction of a 6km pipeline and 5,000m3 storm-water storage tank as part of the Shanganagh-Bray Main Drainage Scheme. The pipeline wayleave was 14m wide and ran through the townlands of Ravenswell, Cork Great, Cork Little and Shanganagh. The work was carried out for Roadbridge on behalf of Dun Laoghaire—Rathdown County Council. No features of archaeological potential were discovered during the course of the works.
Shanganagh/Cork Little/Cork Great/Little Bray/Bray Commons, Dublin	05E0392 (Richard Clutterbuck)	Monitoring of geotechnical investigations in advance of the Shanganagh Bray main drainage scheme was carried out in March and April 2005. A preliminary assessment found that the proposed scheme runs through an area of archaeological importance, with a number of monuments recorded in the vicinity. While only one known monument, a linear earthwork thought to be part of the Pale ditch, will be directly impacted on by the scheme, it will skirt

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		the constraint ring of SMR 26:68, an abbey church and graveyard site, and traverse a number of areas of archaeological potential; no trial pits were excavated at the archaeological monuments. A total of 37 trial pits were monitored. They varied in size from 2–3m long and 1–1.2m wide. For the purpose of the geotechnical investigations, the trial pits were excavated to a depth of up to 4m into the natural subsoil. No features of archaeological significance were discovered. Monitoring of the pipe trench will be carried out in 2006.
Bray, Wicklow	05E0392 EXT. (David J. O'Connor)	Monitoring was undertaken as part of the Shanganagh-Bray main drainage scheme (Contract 1), which involves the expansion and replacement of the existing treatment plant in order to improve the seawater quality of the Shankill area. In addition, a network of pipes stretching from Bray to Shankill will be laid to feed the upgraded plant. A small area of the Old Bray Golf Course at Ravenswell Road, beside the rail line and the River Dargle, was stripped of topsoil to facilitate the erection of a works compound. The soil-strip was monitored, and no archaeology was observed.
Corke Great, Dublin	04E0354 (Martin E Byrne)	Testing was undertaken across the line of a possible linear earthwork which runs through the lands of the present Bray Golf Links. The feature consists of a low bank (max. dimensions c. 3.5m wide by c. 0.3m high), which is barely discernible in places and is more readily identified by a line of relatively mature trees which grow along its length. The OS 6-inch map of 1840 indicates that the feature was part of a network of footpaths leading west from the adjacent former Ravenswell House (now the Sisters of Charity Convent) to the sea and indicated as 'footpath on top of bank'. In addition, part of the feature marks the line of the present county boundary between Dublin and Wicklow, although this is of late 19th-century date, having previously been located along the River Dargle to the south of the site. Two trenches were excavated across the feature. No evidence for a fosse or construction material, other than topsoil, associated with the bank was revealed. Pottery sherds and a fragment of glass, of late 18th- or 19th-century date, were

Site Name	Licence No. and Director	Database Entry
	Director	recovered from the interface between topsoil and subsoil. A section of the bank was previously investigated by Margaret Gowen (Excavations 2002, No. 1960, 02E1717). Given the cartographic evidence, coupled with the results of the testing, it is suggested that the feature is of late 18th- or early 19th-century date and is a landscape feature associated with the former Ravenswell House. Furthermore, it is also likely that the feature was much higher and narrower and may have originally served as a field boundary, which was subsequently almost fully levelled. This would explain why it is located along the line of a townland boundary, which was subsequently used as a county boundary.
Corke Abbey, Bray	02E1717 (Margaret Gowen)	One test-trench was opened in November 2002 on the grounds of Bray Golf Club, north of Bray town. The area under investigation is recorded in the SMR as part of the Pale boundary, SMR 26:124, although this identification is not supported by the historical evidence, which points to a possible association with Corke Abbey and to lands outside the Pale and held by the Crown that were leased in the 15th and 16th centuries to the Harrolde and Walshe families, the latter of which held extensive lands in south Dublin incorporating Carrickmines (L. Simpson, pers. comm.). The levelled boundary runs from the railway line north-eastward across part of the golf-course. The remains consist of a linear, flattopped, tree-lined bank with shallow depressions on either side. The south-western end is the best-preserved section of this feature; the northeastern end is barely detectable on the ground and is almost level. A section of the proposed Shanganagh and Bray Main Drainage Scheme wayleave passes through the eastern limit of the Pale boundary, at its most poorly preserved point. The excavation focused particularly on assessing the impact of the creation of haul roads during the laying of a new sewer. The test-trench was 14.2m long, 1m wide and 0.8–1m in maximum depth. The cross-sections exposed the levelled and reworked remains of the boundary bank but no evidence of well-defined ditch cuts on either side of the levelled bank. There is a possibility, therefore, that the remains of a ditch or ditches exist below the level

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		excavated. All of the material exposed either was sterile or had modern inclusions as a consequence of golf-course development. A full topographical survey and terrain modelling of the levelled bank through the area of the proposed wayleave and for a distance of 20m beyond it were undertaken as mitigation. Trench excavation for pipe laying will be monitored during the construction phase, although it may not reach a level at which greater definition will be gained
Corke Great and	02E1717 Ext	Monitoring was carried out along a section of the
Ravensdale	(Colm Moriarty)	Shanganagh and Bray main drainage scheme. The section monitored was located in the grounds of Bray Golf Club, to the north of Bray town, in the townlands of Corke Great and Ravenswell. The drainage scheme gravity pipe passed through the constraint area of the Pale ditch. A section of this monument, visible as a bank with a depression on either side, crosses the golf course in a roughly east—west direction. The gravity drain was designed to cross the monument at its least discernible point. A test excavation was carried out by Margaret Gowen in advance of these works (Excavations 2002, No. 1960, 02E1717). The results suggested that the Pale boundary had been levelled in this area during the construction of the golf course. During the course of monitoring, a low bank of redeposited natural was identified. This bank shared an alignment with the Pale ditch and appeared to be a continuation of this feature. The bank was in a much-degraded state and survived to c. 0.3m in height and 5.5m in width. The bank material consisted of redeposited natural containing occasional pieces of animal bone. Evidence for a ditch 2.5m in width and 0.6m in depth was found along the southern side of this bank. Although this cut was filled with a deposit containing modern material (red brick and golf tees), it might represent a medieval cut that was cleaned out and reused as a field drain at a much later date. With the exception of the levelled Pale bank, no other features of archaeological significance were identified during the course of this monitoring programme.
Corke Great,	01E0220	Testing took place in advance of construction in
Bray, Wicklow	(Catherine McLoughl	in) March 2001. Five test-trenches were excavated across the development area. One ditch was

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		noted in Trench 2. No artefacts were recovered from it to suggest a date.
Prov. Little/Davanawall/Prov	120052	
Bray Little/Ravenswell/Bray Commons/Killarney/Bray, Wicklow	12R0053 (John Purcell)	A wade survey and a magnetometry survey by hand-held metal detection were carried out at the site out along a 4km stretch of the River Dargle at Bray, Co. Wicklow. The work was carried out in advance of a flood defence scheme that includes widening and deepening of the river channel. Where possible, metal detector hits were examined and logged. These were logged with a high frequency at over 1 per square metre. A large number of the hits were visible and consisted of modern dumped material. No archaeologically significant material was
		encountered.
Bray Little/Ravenswell/Bray Commons/Killarney/Bray, Wicklow	(John Purcell)	Monitoring is being undertaken for a flood defence scheme on 4km of the Dargle River. This works include widening and deepening the river and including a new culvert at Bray Bridge. Works uncovered a number of features at Bray Bridge. The earliest bridge recorded in Bray in 1666 crossing the River Dargle was replaced by a four-arch bridge in 1736. This bridge collapsed in a storm and was replaced by another four-arch bridge in 1741. The current bridge was constructed in the middle of the 19th century. Two buttresses of the earlier bridge are visible at low tide under the southern arches of the existing bridges; these will be excavated in the summer of 2013. Underneath the existing bridge an earlier stone structure was uncovered; this was an amalgam of the 1736 and the 1741 bridges. The eastern section of the bridge consisted of two parallel walls in-filled with sand and gravel. This was part of the 1736 bridge. The second wall at the west was constructed in 1741; it was a large wall with a culvert. A cobblestone surface was also uncovered in places. To the west of the stone bridge on the Lower Dargle Road, a section of an earlier wooden bridge was uncovered. This was uncovered within what was the river bed. The bridge consisted of a large base plate (T101) with three upright timbers inserted into it (T102, T103)
		and T104). Two timbers were initially visible crossing horizontally but these collapsed upon exposure. The timbers appear to have been laid

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		directly onto the river bed. There was no evidence of an excavated trench. The base plate was orientated south-west to north-east. The base plate was 6.9m in length, 0.42m in width and was 0.25m thick. At the south-west it was partially damaged by the insertion of metal piles. Three sub-rectangular mortice joints and a cross-shaped double mortice were recorded in the timber. The rectangular mortises were cut through the timber to support the upright timbers. These measured 0.3m x 0.2m on average. The upright timbers or "tenons" were cut for insertion into the timber. This method of using mortise and tenon joints creates a very strong joint. An interesting double cross-shaped mortise joint contained two through mortises, at the north. This would have held an upright timber and contained the remains of a wooden wedge. The second mortise may have been a splayed joint. These can often be held in place with a brace but this was not visible. A timber was recovered (not in context) which would have been placed in this joint and splayed towards the south. This would have given extra support to the upper level of the bridge. The tenon was held in place using a wooden wedge, the remains of which were removed. Analysis of the timbers by Ellen O'Carroll has show that the larger timbers are oak and the timber wedges are alder and holly. Dendrochronology dates for T101 indicate a felling date range of AD1116 ± 9 years or later. The date for T102 is AD1100 ± 9 years or later. The date for T102 is AD1100 ± 9 years or later, or after AD1100. This would indicate a late 12th century or early 13th-century date for the bridge. Further works will be undertaken during 2013 within the river bed and further remains of this bridge may be uncovered.
Bray Little, Bray, Wickl	ow 13E0121 (John Purcell)	A flood defence scheme is being undertaken along 4km of the River Dargle. This work includes widening and deepening the river and including a new culvert at Bray Bridge. As part of the E.I.S. for the works two arches of an earlier bridge were recorded within the arches of the existing bridge over the Dargle in the centre of the town. It was recommended that these be excavated. The earliest bridge recorded in Bray in 1666 crossing the River Dargle was replaced by a four-

Director	nd Database Entry
	arch bridge in 1736. This bridge collapsed in a
	storm and was replaced by another four-arch
	bridge in 1741. The current bridge was
	constructed in the middle of the 19th century. Two
	buttresses of the earlier bridge are visible at low
	tide under the southern arches of the existing
	bridge a third arch was uncovered as a result of
	excavation under the northern arch. All these
	features and associated works were fully
	excavated.
	Under the arch of the bridge at the northern bank
	of the river a buttress of a bridge was uncovered
	(Area A). This was surrounded by a thick layer of
	concrete up to 1.2m in depth which had been
	poured into the area after Hurricane Charlie
	(1986), to secure the existing bridge. This layer
	was removed by a rock breaker. The main
	section of the feature was random rubble walling
	with a lime mortar. Ashlar walling was visible at
	the south and east. This consisted of large
	limestone blocks held together with a lime mortar.
	At the north this had been removed during the
	construction of the existing bridge. When the
	stone was removed a wooden raft, foundation
	was uncovered. This consisted of seven
	interlocking timbers. Only two wooden dowels
	were recorded, the timbers were laid into notches
	in the base timbers. This would have formed a
	stable layer in clay base of the bridge and
	avoided subsidence.
	The buttress under the central northern arch of
	the bridge was also surrounded by a thick layer
	of concrete (Area B). This buttress was visible at
	low tide. The main section of the feature was
	random rubble walling with a lime
	mortar. Ashlar walling surrounded the feature on
	all sides. This consisted of limestone blocks held
	together with a lime mortar; the blocks were
	narrow and may have been added to finish the
	bridge as a cladding rather than for strength as in
	the previous buttress. When the stone was
	removed a wooden raft, foundation was
	uncovered. This consisted of one timber at the
	centre and a large number of wooden stakes.
	These were concentrated at the west and north
	with some also visible at the east. The highest
	concentration of the stakes was at the apex of
	the buttress, this is the area with the fastest flow
	of water and the greatest possibility of erosion of

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		the bridge. This timber frame is quite different
		from the foundation layer in Area A.
		The southern arch of the bridge contained a
		buttress also visible at low tide. This was
		surrounded by sand and silt from the river. The
		main section of the feature was random rubble
		walling with a lime mortar. Ashlar walling was
		visible at the south, east and north. This
		consisted of large limestone blocks held together
		with a lime mortar. The buttress was on a
		foundation layer of stone. This feature was
		truncated at the west by earlier works in the river.
		Unlike the other two buttresses there was no
		timber foundation in this area. This arch is out of
		the main flow of the river and is only used during
		high tides or periods of flooding.
		The stone bridge exposed as part of the works
		appears to be an amalgam of two earlier bridges
		on the site, the 1736 bridge and the 1741 bridge.
		The buttress in the northern arch (Area A) is of a
		different construction than the two others that
		were recorded. It has larger dimensions; the
		limestone blocks are larger and the foundation
		layer is of a different construction. This feature
		was reused as part of the 1741 bridge. The
		buttresses in the remaining areas are of a similar
		size and the materials used are of similar
		dimensions. The buttress in Area B was laid on a
		foundation of wooden piles. This was
		concentrated at the west of the pier. There was
		no wooden foundation of the buttress in Area C,
		at the southern extent of the bridge, and this arch
		is drier.

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Plate 1: Aerial view of the proposed development area, looking northwest. Recent school development is visible in top left quadrant



Plate 2: Modern hardstanding at the southern portion of the proposed development site



Plate 3: Golf hazards and earthworks within the interior of the proposed development site



Plate 4: Ground level view of earthwork (DU026-124----/WI004-005----)



Plate 5: Drone view of earthwork (DU026-124----/WI004-005----), looking west-southwest



Plate 6: Semi mature trees which formed part of the landscape design associated with the former golf club



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		encountered.
Bray Little/Ravenswell/Bray Commons/Killarney/Bray, Wicklow	12E123 (John Purcell)	Monitoring is being undertaken for a flood defence scheme on 4km of the Dargle River. This works include widening and deepening the river and including a new culvert at Bray Bridge. Works uncovered a number of features at Bray Bridge. The earliest bridge recorded in Bray in 1666 crossing the River Dargle was replaced by a four-arch bridge in 1736. This bridge collapsed in a storm and was replaced by another four-arch bridge in 1741. The current bridge was constructed in the middle of the 19th century. Two buttresses of the earlier bridge are visible at low tide under the southern arches of the existing bridges; these will be excavated in the summer of 2013. Underneath the existing bridge an earlier stone structure was uncovered; this was an amalgam of the 1736 and the 1741 bridges. The eastern section of the bridge consisted of two parallel walls in-filled with sand and gravel. This was part of the 1736 bridge. The second wall at the west was constructed in 1741; it was a large wall with a culvert. A cobblestone surface was also uncovered in places. To the west of the stone bridge on the Lower Dargle Road, a section of an earlier wooden bridge was uncovered. This was uncovered within what was the river bed. The bridge consisted of a large base plate (T101) with three upright timbers inserted into it (T102, T103)
		and T104). Two timbers were initially visible crossing horizontally but these collapsed upon exposure. The timbers appear to have been laid

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		buttresses of the earlier bridge are visible at low
		tide under the southern arches of the existing
		bridge a third arch was uncovered as a result of
		excavation under the northern arch. All these
		features and associated works were fully
		excavated.
		Under the arch of the bridge at the northern bank
		of the river a buttress of a bridge was uncovered
		(Area A). This was surrounded by a thick layer of
		concrete up to 1.2m in depth which had been
		poured into the area after Hurricane Charlie
		(1986), to secure the existing bridge. This layer
		was removed by a rock breaker. The main
		section of the feature was random rubble walling
		with a lime mortar. Ashlar walling was visible at
		the south and east. This consisted of large
		limestone blocks held together with a lime mortar.
		At the north this had been removed during the
		construction of the existing bridge. When the
		stone was removed a wooden raft, foundation
		was uncovered. This consisted of seven
		interlocking timbers. Only two wooden dowels
		were recorded, the timbers were laid into notches
		in the base timbers. This would have formed a
		stable layer in clay base of the bridge and
		avoided subsidence.
		The buttress under the central northern arch of
		the bridge was also surrounded by a thick layer
		of concrete (Area B). This buttress was visible at
		low tide. The main section of the feature was
		random rubble walling with a lime
		mortar. Ashlar walling surrounded the feature on
		all sides. This consisted of limestone blocks held
		together with a lime mortar; the blocks were
		narrow and may have been added to finish the
		bridge as a cladding rather than for strength as in
		the previous buttress. When the stone was
		removed a wooden raft, foundation was
		uncovered. This consisted of one timber at the
		centre and a large number of wooden stakes.
		These were concentrated at the west and north
		with some also visible at the east. The highest
		concentration of the stakes was at the apex of
		the buttress, this is the area with the fastest flow
		of water and the greatest possibility of erosion of

Site Name	Licence No. and	Database Entry
	Director	
		the bridge. This timber frame is quite different
		from the foundation layer in Area A.
		The southern arch of the bridge contained a
		buttress also visible at low tide. This was
		surrounded by sand and silt from the river. The
		main section of the feature was random rubble
		walling with a lime mortar. Ashlar walling was
		visible at the south, east and north. This
		consisted of large limestone blocks held together
		with a lime mortar. The buttress was on a
		foundation layer of stone. This feature was
		truncated at the west by earlier works in the river.
		Unlike the other two buttresses there was no
		timber foundation in this area. This arch is out of
		the main flow of the river and is only used during
		high tides or periods of flooding.
		The stone bridge exposed as part of the works
		appears to be an amalgam of two earlier bridges
		on the site, the 1736 bridge and the 1741 bridge.
		The buttress in the northern arch (Area A) is of a
		different construction than the two others that
		were recorded. It has larger dimensions; the
		limestone blocks are larger and the foundation
		layer is of a different construction. This feature
		was reused as part of the 1741 bridge. The
		buttresses in the remaining areas are of a similar
		size and the materials used are of similar
		dimensions. The buttress in Area B was laid on a
		foundation of wooden piles. This was
		concentrated at the west of the pier. There was
		no wooden foundation of the buttress in Area C,
		at the southern extent of the bridge, and this arch
		is drier.