



Environmental Impact Assessment Report

Volume 4

Appendix 19.3 Site Investigation (2022)



Codling Wind Park - Poolbeg

Client: Codling Wind Park Limited (CWP)

Client's Representative: Gavin and Doherty Geosolutions (GDG)

Report No.: 21-1443C

Date: June 2022

Status: Final Report





CONTENTS

Document Control Sheet

Note on: Methods of describing soils and rocks & abbreviations used on exploratory hole logs

1	AUT	HORITY	4
2	SCOI	PE	4
3	DES	CRIPTION OF SITE	4
4	SITE	OPERATIONS	
	4.1	OPERATIONSSummary of site works	5
	4.2	Boreholes	5
	4.3	Standpipe installations	6
	4.4	Trial Pits	6
	4.5	Surveying	
	4.6	Groundwater and ground gas monitoring	
5	LAB	ORATORY WORK	
	5.1	Geotechnical laboratory testing of soils	
	5.2	Geotechnical laboratory testing of rock	8
	5.3	Environmental laboratory testing of soils	8
	5.4	Environmental laboratory testing of groundwater	9
6	GRO	UND CONDITIONS	g
	6.1	General geology of the area	9
	6.2	Ground types encountered during investigation of the site	9
	6.3	Groundwater	
7	REFI	FRENCES	11

APPENDICES

Appendix A	Site and exploratory hole location plans
Appendix B	Borehole logs
Appendix C	Core photographs
Appendix D	Trial pit logs
Appendix E	Trial pit photographs
Appendix F	Geotechnical laboratory test results
Appendix G	Environmental laboratory test results
Appendix H	SPT hammer energy measurement report
Appendix I	Groundwater and gas monitoring
Appendix J	Soil resistivity results

Note - for the purposes of the CWP Project planning application Appendices C-J have been excluded from this report.



Document Control Sheet

Report No.:		21-1443C						
Project Title:		Codling Wind Pa	ark - Codling					
Client:		Codling Wind Pa	ark Limited (CWP)				
Client's Repres	entative:	Gavin and Dohe	rty Geosolutions	(GDG)				
Revision:	A02	Status:	Final Report	Issue Date:	8th June 2022			
Prepared by:		Reviewed by:		Approved by:				
Sean Ross	Ross.	Darron O'Mahar	luoj.	Jam O duo 1.				
BSc MSc PGeo M	IIEI	Darren O'Mahor BSc MSc MIEI Et		Darren O'Mahor BSc MSc MIEI Et				

The works were conducted in accordance with:

British Standards Institute (2015) BS 5930:2015+A1:2020, Code of practice for ground investigations.

BS EN 1997-2: 2007: Eurocode 7 - Geotechnical design - Part 2 Ground investigation and testing.

Geotechnical Society of Ireland (2016), Specification & Related Documents for Ground Investigation in Ireland

Laboratory testing was conducted in accordance with:

British Standards Institute BS 1377:1990 parts 2, 4, 5, 7 and 9



METHODS OF DESCRIBING SOILS AND ROCKS

Soil and rock descriptions are based on the guidance in BS5930:2015+A1:2020, The Code of Practice for Ground Investigation.

U	Nominal 100mm diameter undisturbed open tube sample (thick walled sampler).
UT	Nominal 100mm diameter undisturbed open tube sample (thin walled sampler).
P	Nominal 100mm diameter undisturbed piston sample.
В	Bulk disturbed sample.
LB	Large bulk disturbed sample.
D	Small disturbed sample.
С	Core sub-sample (displayed in the Field Records column on the logs).
L	Liner sample from dynamic sampled borehole.
W	Water sample.
ES / EW	Soil sample for environmental testing / Water sample for environmental testing.
SPT (s)	Standard penetration test using a split spoon sampler (small disturbed sample obtained).
SPT (c)	Standard penetration test using 60 degree solid cone.
(x,x/x,x,x,x)	Blows per increment during the standard penetration test. The initial two values relate to the seating drive (150mm and the remaining four to the 75mm increments of the test length.
(Y for Z/Y for Z)	Incomplete standard penetration test where the full test length was not achieved. The blows 'X' represent the total blows for the given seating or test length 'Z' (mm).
N=X	SPT blow count 'N' given by the summation of the blows 'X' required to drive the full test length (300mm).
HVP / HVR	In situ hand vane test result (HVP) and vane test residual result (HVR). Results presented in kPa.
V VR	Shear vane test (borehole). Shear strength stated in kPa. V: undisturbed vane shear strength VR: remoulded vane shear strength
Soil consistency description	In cohesive soils, where samples are disturbed and there are no suitable laboratory tests, N values may be used to indicate consistency on borehole logs – a median relationship of Nx5=Cu is used (as set out in Stroud & Butler 1975)
dd-mm-yyyy	Date at the end and start of shifts, shown at the relevant borehole depth. Corresponding casing and water depths shown in the adjacent columns.
$\overline{}$	Water strike: initial depth of strike.
T	Water strike: depth water rose to.
Abbreviations relatin	ng to rock core – reference Clause 36.4.4 of BS 5930: 2015+A1:2020
TCR (%)	Total Core Recovery: Ratio of rock/soil core recovered (both solid and non-intact) to the total length of core run.
SCR (%)	Solid Core Recovery: Ratio of solid core to the total length of core run. Solid core has a full diameter, uninterrupted by natural discontinuities, but not necessarily a full circumference and is measured along the core axis between natural fractures.
RQD (%)	Rock Quality Designation: Ratio of total length of solid core pieces greater than 100mm to the total length of core run
FI	Fracture Index: Number of natural discontinuities per metre over an indicated length of core of similar intensity of fracturing.
NI	Non Intact: Used where the rock material was recovered fragmented, for example as fine to coarse gravel size particles
AZCL	Assessed zone of core loss: The estimated depth range where core was not recovered.
DIF	Drilling induced fracture: A fracture of non-geological origin brought about by the rock coring.
(xxx/xxx/xxx)	Spacing between discontinuities (minimum/average/maximum) measured in millimetres.
TP	Trial pit
SNC	Sonic borehole

Codling Wind Park - Poolbeg

1 AUTHORITY

On the instructions of Gavin and Doherty Geosolutions (GDG), ("the Client's Representative"), acting on the behalf of Codling Wind Park Limited (CWP) ("the Client"), a ground investigation was undertaken at the above location to provide geotechnical and environmental information for input to the design and construction of a proposed landfall station for an offshore wind farm (Codling Wind Park).

This report details the work carried out both on site and in the geotechnical and chemical testing laboratories; it contains a description of the site and the works undertaken, the exploratory hole logs and the laboratory test results.

All information given in this report is based upon the ground conditions encountered during the ground investigation works, and on the results of the laboratory and field tests performed. However, there may be conditions at the site that have not been taken into account, such as unpredictable soil strata, contaminant concentrations, and water conditions between or below exploratory holes. It should be noted that groundwater levels usually vary due to seasonal and/or other effects and may at times differ to those recorded during the investigation. No responsibility can be taken for conditions not encountered through the scope of work commissioned, for example between exploratory hole points, or beneath the termination depths achieved.

This report was prepared by Causeway Geotech Ltd for the use of the Client and the Client's Representative in response to a particular set of instructions. Any other parties using the information contained in this report do so at their own risk and any duty of care to those parties is excluded.

2 SCOPE

The extent of the investigation, as instructed by the Client's Representative, included boreholes, trial pits, soil and rock core sampling, environmental sampling, groundwater and ground gas monitoring, in-situ and laboratory testing, and the preparation of a factual report on the findings.

3 DESCRIPTION OF SITE

As shown on the site location plan in Appendix A, the works were conducted on a site located north of Pigeon House Road in Poolbeg, Dublin 4 The site accessed through the car park for Pigeon House itself, is bounded to the north by the River Liffey and is located east of Ecocem Ireland and immediately north of a series of water tanks. It is currently used as a general civil engineering compound storage yard. The site is relatively flat with 2-3m high stockpiles flanking the east and western sides.

4 SITE OPERATIONS

4.1 Summary of site works

Site operations, which were conducted between 28th March and 27th April 2022, comprised:

- eight boreholes sonic drilling
- groundwater and gas standpipe installation in six boreholes
- eleven machine dug trial pits

The exploratory holes and in-situ tests were located as instructed by the Client's Representative, as shown on the exploratory hole location plan in Appendix A.

4.2 Boreholes

Eight boreholes (P-BH14 – P-BH21) were put to their completion by sonic drilling techniques only. The boreholes were completed using a Fraste CRS XL Duo rubber-tracked sonic drilling rig.

Hand dug inspection pits were carried out between ground level and 1.20m depth to ensure boreholes were put down at locations clear of services or subsurface obstructions. Fully cased sonic drilling techniques were employed to advance the boreholes of nominal 180mm diameter to a specific depth after which Geobor-S coring was undertaken with core recovery in overburden and bedrock strata.

Standard penetration tests were carried out in accordance with BS EN 22476-3:2005+A1:2011 at standard depth intervals throughout the overburden using the split spoon sampler ($SPT_{(s)}$) or solid cone attachment ($SPT_{(c)}$). The penetrations are stated for those tests for which the full 150mm seating drive or 300mm test drive was not possible. The N-values provided on the borehole logs are uncorrected and no allowance has been made for energy ratio corrections. The SPT hammer energy measurement report is provided in Appendix H.

The disturbed sonic samples were placed on a rigid core liner from which they were examined, logged and sampled by a qualified and experienced Engineering Geologist, thus enabling the production of an engineering log in accordance with BS 5930: 2015: Code of practice for ground investigations.

Environmental samples were taken at suitable depths in P-BH14, P-BH20 and P-BH21 as instructed by the Client's Representative.

Where coring was carried out within overburden and bedrock strata, Geobor S Coring was used. The core was extracted in up to 1.5m lengths using an SK6L core barrel, which produced core of nominal 102mm diameter, and was placed in single channel wooden core boxes.

The core was subsequently photographed and examined by a qualified and experienced Engineering Geologist, thus enabling the production of an engineering log in accordance with *BS 5930: 2015+A1:2020: Code of practice for ground investigations*.

Appendix B presents the borehole logs, with core photographs presented in Appendix C.

4.3 Standpipe installations

Groundwater and gas monitoring standpipes were installed in boreholes as shown in Table 1 below.

Table 1 Summary of groundwater and gas installations

BH ID	Type	Depth range (mbgl)
P-BH14	50mm standpipe	1.00-15.00
P-BH15	50mm standpipe	1.00-4.00
P-BH15	19mm piezometer tip	40.50-43.50
P-BH16	50mm standpipe	1.00-2.00
P-BH16	19mm standpipe	2.00-20.00
P-BH17	50mm standpipe	8.00-16.00
P-BH20	50mm standpipe	0.50-1.50
P-BH20	19mm piezometer tip	39.00-45.00
P-BH21	50mm standpipe	3.00-15.00

Details of the installations, including the depth range of the response zone, are provided in Appendix B on the individual borehole logs.

4.4 Trial Pits

Eleven trial pits (TP01–TP09, TP09A and TP10) were excavated using a 8t tracked excavator fitted with a 600mm wide bucket, to a maximum depths of 4.00m.

Environmental samples were taken at specific depths in certain trial pits as instructed by the Client's Representative.

Disturbed (small jar and bulk bag) samples were taken at standard depth intervals and at change of strata.

Any water strikes encountered during excavation were recorded along with any changes in their levels as the excavation proceeded. The stability of the trial pit walls was noted on completion.

Appendix D presents the trial pit logs with photographs of the pits and arising provided in Appendix E.

4.5 Surveying

The as-built exploratory hole positions were surveyed following completion of site operations by a Site Engineer from Causeway Geotech. Surveying was carried out using a Trimble R10 GPS system employing VRS and real time kinetic (RTK) techniques.

The plan coordinates (Irish Transverse Mercator) and ground elevation (mOD Malin) at each location are recorded on the individual exploratory hole logs. The exploratory hole plan presented in Appendix A shows these as-built positions.

4.6 Groundwater and ground gas monitoring

Following completion of site works, groundwater and ground gas monitoring was conducted over one round. Groundwater monitoring was carried out using a water interface probe. Ground gas measurements were carried out using a GA5000 gas meter.

The monitoring records are presented in Appendix I.

4.7 In-situ soil resistivity tests

As instructed by the client's representative, in-situ soil resistivity tests were conducted at across five transect lines. The tests were carried out in according to procedures outlined in BS1377 Part 9 clause 5.1.

Results of the tests are presented in Appendix J.

5 LABORATORY WORK

Upon their receipt in the laboratory, all disturbed samples were carefully examined and accurately described, and their descriptions incorporated into the borehole logs.

5.1 Geotechnical laboratory testing of soils

Laboratory testing of soils was undertaken in CGL's lab in Ballymoney, Co. Antrim and comprised:

- **soil classification:** moisture content measurement, Atterberg Limit tests, particle size distribution analysis, bulk density by linear measurement and particle density by gas jar method
- **compressibility:** one dimensional consolidation (oedometer)
- **shear strength** (total stress): unconsolidated undrained triaxial tests
- direct shear: shear box tests

- compaction related: dry density/moisture content relationship, Moisture Condition Value
- soil chemistry: organic matter content, BRE Suite D and thermal resistivity

Laboratory testing of soils samples was carried out in accordance with British Standards Institute: *BS 1377, Methods of test for soils for civil engineering purposes; Part 1 (2016), and Parts 2-9 (1990).*

The test results are presented in Appendix F.

5.2 Geotechnical laboratory testing of rock

Laboratory testing of rock sub-samples was undertaken in CGL's lab in Ballymoney, Co. Antrim and by MATtest Limited in Glasgow and comprised:

- point load index
- unconfined compressive strength (UCS) tests

Test	Test carried out in accordance with
Point load index	ISRM Suggested Methods (1985) Suggested method for determining point-load
	strength. Int. J. Rock Mech. Min. Sci. Geomech. Abstr. 22, pp. 53–60
Uniaxial	ISRM Suggested Methods (1981) Suggested method for determining
compression	deformability of rock materials in uniaxial compression, Part 2
strength tests	and
	ISRM (2007) Ulusay R, Hudson JA (eds) The complete ISRM suggested methods
	for rock characterization, testing and monitoring, 2007

The test results are presented in Appendix F.

5.3 Environmental laboratory testing of soils

Environmental testing, as specified by the Client's Representative was conducted on selected environmental soil samples by Chemtest at its laboratory in Newmarket, Suffolk.

A modified Rilta suite of analysis was carried out on several samples for landfill disposal criteria. This included testing for a range of determinants, including:

- Metals
- Speciated total petroleum hydrocarbons (TPH)
- Speciated polycyclic aromatic hydrocarbons (PAH)
- BTEX compounds
- Volatile Organic Compounds (VOCs)



- Semi-Volatile Organic Compounds (SVOCs)
- Polychlorinated biphenyls (PCBs)
- Phenols
- Organic matter and Total Organic Carbon (TOC)
- Cyanides
- Asbestos screen
- Sulphate and sulphur
- Phosphate
- Calcium
- pH.
- Waste acceptance criteria (WAC).

Results of environmental laboratory testing are presented in Appendix G.

5.4 Environmental laboratory testing of groundwater

Environmental testing, as specified by the Client's Representative was conducted on selected environmental groundwater samples by Chemtest at its laboratory in Newmarket, Suffolk.

Testing was carried out according to the TOBIN Consulting Engineers Poolbeg Suite of groundwater testing.

Results of environmental laboratory testing are presented in Appendix G.

6 GROUND CONDITIONS

6.1 General geology of the area

Published geological mapping indicate the superficial deposits underlying the site comprise made ground and marine beach sands. These deposits are underlain by limestone and shales of the Lucan Formation.

6.2 Ground types encountered during investigation of the site

A summary of the ground types encountered in the exploratory holes is listed below, in approximate stratigraphic order:

- Made Ground (gravel surface): P-BH15, P-BH17, P-BH18 and P-BH19 encountered 200-900mm of crushed concrete at ground level.
- Made Ground (fill): reworked sandy gravelly clay, gravelly silty sand or sandy silty gravel
 encountered across the site to a maximum depth of 6.20m in P-BH20. Varying amounts of
 fragments/pieces of concrete, timber, red brick, plastic sheeting, rubber, cardboard, shells, glass,

roots and rootlets, tile, ceramics, steel wire were encountered within the made ground across the site.

- **Marine beach deposits:** typically, medium dense to dense sands and gravels interspersed with layers of sandy gravelly clay frequently with shell fragments encountered across the site to a maximum depth of 20.70m in P-BH18 generally overlying Port Clay.
- Port Clay: Firm to stiff sandy silty clay often with laminations of silty sand encountered across the site to a maximum depth of
- Glacial Till: stiff to very stiff brown/grey sandy gravelly clay encountered across the site generally
 underlying port clay greater than 30mbgl. Not encountered in the shallow boreholes terminated at
 less than 30mbgl.
- **Bedrock (Limestone):** Rockhead was encountered at depths ranging from 37.50m in P-BH20 to 39.25m in P-BH15 comprising dark grey limestone.

6.3 Groundwater

Details of the individual groundwater strikes, along with any relative changes in levels as works proceeded, are presented on the exploratory hole logs for each location.

Groundwater was not noted during drilling at any of the borehole locations. However, it should be noted that the casing used in supporting the borehole walls during drilling along with the water flush system used during sonic and geobor-s drilling may have sealed out or masked any obvious groundwater strikes.

Seasonal variation in groundwater levels should be factored into design considerations and continued monitoring of the installed standpipes will give an indication of the seasonal variation in groundwater level.

Details of further groundwater monitoring, as well as results of gas monitoring, are presented in Appendix

7 REFERENCES

Geotechnical Society of Ireland (2016), Specification & Related Documents for Ground Investigation in Ireland.

IS EN 1997-2: 2007: Eurocode 7 - Geotechnical design - Part 2 Ground investigation and testing. National Standards Authority of Ireland.

BS 5930: 2015+A1:2020: Code of practice for ground investigations. British Standards Institution.

BS EN ISO 14688-1:2018: Geotechnical investigation and testing. Identification and classification of soil. Part 1 Identification and description.

BS EN ISO 14688-2:2018: Geotechnical investigation and testing. Identification and classification of soil. Part 2 Principles for a classification.

BS 1377: 1990: Methods of test for soils for civil engineering purposes. British Standards Institution.

BS EN ISO 14689-1:2018: Geotechnical investigation and testing. Identification and classification of rock. Identification and description.

BS EN ISO 22476-3:2005+A1:2011: Geotechnical investigation and testing. Field testing. Standard penetration test.



APPENDIX A SITE AND EXPLORATORY HOLE LOCATION PLANS





Project No.: 21-1443C Client: Codling Wind Park Limited (CWP)

Codling Wind Park – Poolbeg **Project Name:**

Client's

Gavin and Doherty Geosolutions (GDG) Representative:

Legend Key



Title:

Site Location Plan

Last Revised: Scale: 03/05/2022

1:10000



Project No.: 21-1443C

Client: Codling Wind Park Limited (CWP)

Client's

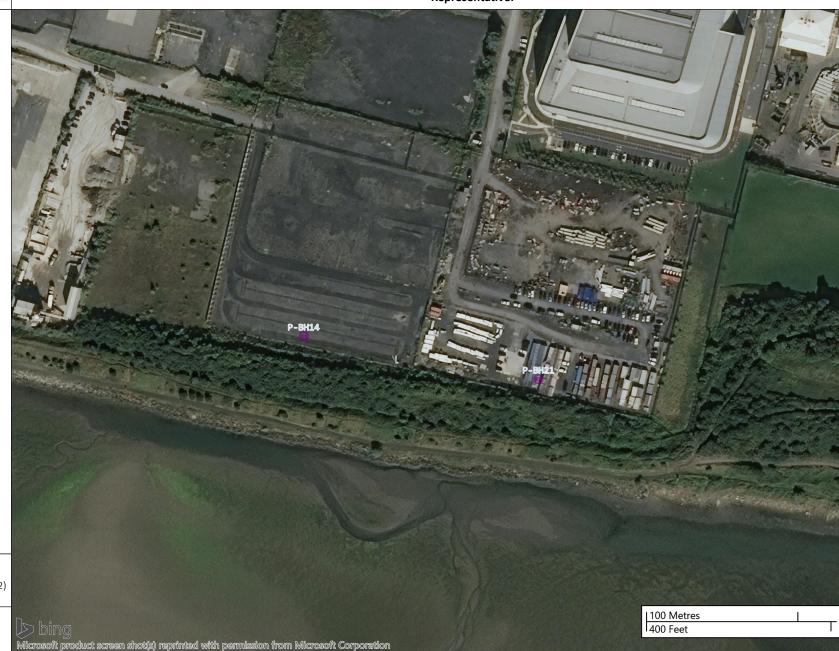
Project Name:

Codling Wind Park – Poolbeg Representative:

Gavin and Doherty Geosolutions (GDG)

Legend Key

Locations By Type - SNC



Title:

Exploratory Hole Location Plan (Sheet 1 of 2)

Last Revised: Scale: 03/05/2022 1:2500



Project No.: 21-1443C

Codling Wind Park – Poolbeg

Client: Codling Wind Park Limited (CWP)

Project Name:

Representative:

Client's

Gavin and Doherty Geosolutions (GDG)

Legend Key

Locations By Type - SNC

Locations By Type - TP



Title:

Exploratory Hole Location Plan (Sheet 2 of 2)

Last Revised: Scale: 03/05/2022 1:1000



APPENDIX B
BOREHOLE LOGS



	<u> </u>	AUSEW	AY ECH			ect No. .443C	Project Name: Codling Wind Park – Poolbeg Client: Codling Wind Park Limited (CWP) Client's Rep: Gavin and Doherty Geosolutions (C	spe)	Borehole ID P-BH14
Metho	od	Plant Used	Top (m)	Base (m)	Coord	dinates			Sheet 1 of 3
Sonic Dr	rilling	Fraste Duo XL	0.00	26.00		06.79 E 25.67 N		Oriller: KW Logger: RS	Scale: 1:50 FINAL
Depth (m)	Sample / Tests	Field Records		Casing Water Depth Depth (m) (m)	Level mOD	Depth (m)	Legend Description	1	Mackfill Backfill
0.50 0.50 1.00 1.20 1.50 1.50 - 1.95	B1 ES1 D13 B2 ES2 SPT (C)	N=26 (3,6/6,6,8,6)		1.50 1.00	3.74 2.89	0.75	MADE GROUND: Grey sandy very silty subangular fit GRAVEL of limestone. Sand is fine to coarse. MADE GROUND: Brownish grey very sandy silty subcoarse GRAVEL of limestone. Sand is fine to coarse. MADE GROUND: Stiff black slightly gravelly sandy CL	rounded fine to AY. Sand is fine to	0.5
2.00 2.10 2.80 3.00 3.00 - 3.45	D14 B3 B4 D15 SPT (C)	N=13 (2,3/3,5,2,3)		3.00 3.00	1.79	2.70	coarse. Gravel is subangular to subrounded of mixed MADE GROUND: LANDFILL comprising pieces of woo rubber, concrete, cardboard and sheets of plastic.		2.0 -
4.00 4.50 - 4.95 5.00	D16 SPT (C) D17	N=12 (2,2/2,3,3,4)	ļ	4.50 2.00	0.09	4.40	Medium dense grey gravelly silty fine to coarse SAN gravel sized sea shells. Gravel is subrounded fine to lithologies.		4.5
5.80 5.00 5.00 - 6.45	B5 D18 SPT (C)	N=9 (2,3/2,2,2,3)		6.00 3.00	-2.11	6.60			5.5
7.00 7.50 - 7.95 8.00	D19 SPT (C) D20	N=10 (2,2/3,3,2,2)		7.50 3.00			Loose to medium dense grey very gravelly silty fine with medium gravel sized sea shells. Gravel is subroi coarse of mixed lithologies.		7.0
3.80 9.00 - 9.45 9.10	B6 SPT (C) D21	N=7 (1,1/2,2,2,1)	ļ	9.00 3.00					8.5
		Strikes	Remai	rks		1	1		<u> </u>
Casing D		Nater Added From (m) To (m) To (m)	")) 						
			Core	Barrel	Flush	Туре	Termination Reason	Last Up	dated
					Wa	ter	Terminated at scheduled depth.	30/05/	2022 AGS

	D22 - 10.95 SPT (C) N=24 (2,3/5,5,6,8) 10					21-1	ct No. 443C	Project Client: Client's		Wind Park I	- Poolbeg Limited (CWP Geosolutions				P-BH14
				Base (26.0		71960	6.79 E 5.67 N	Final De	-		26/04/2022	Driller: Logger:			Sheet 2 of 3 Scale: 1:50 FINAL
Depth (m)		Field Records		Casing V Depth D (m)	/ater epth (m)	Level mOD	Depth (m)	Legend	-	Des	cription		1	Water	Backfill
0.50 - 10.95 SPT (C) N=24 (2,3/5,5,6,8) B7				10.5 5	.00	-6.31	10.80		Very dense yellowis coarse GRAVEL prec	I sized sea she hologies. Sh brown very dominantly of	sandy silty subre	rounded fi	ne to		9.0000000000000000000000000000000000000
12.00 - 12.32 12.10	D25 - 13.80 SPT (C) N=50 (7,8/50 for 175mm) D25 - 13.80 SPT (C) N=50 (8,16/50 for 155mm)				.00		-								12.
13.00	D25							4 × 0							13.
13.50 - 13.80 13.60 14.00	SPT (C) B8 D26	N=50 (8,16/50 for 155	mm)	13.5 5	.00										13.
15.00 - 15.30 15.10	SPT (C) D27	N=50 (15,10/50 for 15	0mm)	15.0 5	.00										15.
16.00 16.00 16.30 16.50	B28 D28 B9 U41	Ublow=70 100%		16.5 7	.00	-11.36	15.85		Firm becoming stiff Sand is fine to coard						16. 16.
17.00	D29	N=20/2 2/4 F F C		10 0 7	00										17.
18.00 - 18.45 18.10	SPT (C) D30	N=20 (3,3/4,5,5,6)		18.0 7	.00										18.
truck at (m) Ca		r Strikes n) Time (min) Rose to (Rema	rks											
Casing De		Name (min) Rose to (in Name N													
20.00	1//		Core	Barre	ı	Flush	Туре	Terminat	tion Reason				Last U	-	
						Wat	er	Terminate	d at scheduled depth	۱.			30/05	/2022	AG

	_	CAUSEW	ECH	L			443C	Client: Codling Wind Park Limited (CWP) Client's Rep: Gavin and Doherty Geosolutions (GDG)							P-BH14 Sheet 3 of 3				
Metho Sonic Dril		Plant Used Fraste Duo XL	Top (m) 0.00	Base 26.		71960	inates 6.79 E	Final De	pth: 26.00 m	Start Date:	26/04/2022	Driller:	KW		Sheet 3 o				
						73332	5.67 N	Elevatio	n: 4.49 mOD	End Date:	27/04/2022	Logger:	RS		FINA	L			
Depth (m)	Sample / Tests	Field Records	i	Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend			cription			Water	Backfill				
9.00 9.30 9.50	D31 B10 U42 D32	Ublow=80 100%		19.5	7.00				Firm becoming stiff Sand is fine to coars							19.0 - 19.5 20.0 -			
20.90 21.00 - 21.45	D33 SPT (C)	N=21 (3,5/5,6,5,5)		21.0	7.00											21.0 -			
22.00 22.30 22.50	D34 B11 U43	Ublow=95 100%		22.5	7.00											22.0 · 22.5			
23.00	D35						-									23.0 23.5			
23.90 24.00 - 24.45	D36 SPT (C)	N=27 (4,5/5,6,7,9)		24.0	7.00											24.0 24.5			
25.00	D37															25.0			
25.30 25.50	B12 U44	Ublow=85 100%		25.5	7.00											25.5			
26.00	D38					-21.51	26.00			End of Bore	hole at 26.00m					26.0 -			
	M-2	Strike	B	wl										-		26.5 27.0 27.5			
ruck at (m) Cas		Strikes) Time (min) Rose to (Rema	rks															
	am (mm	Water Added From (m) To (m)																	
26.00	177		Core	Barr	el	Flush	Туре	Terminat	ion Reason				Last Up	date	ed T	—			
				-		Wat			d at scheduled depth				30/05/			ᆑ			

		AUSEW				ect No. 1443C	Project Name: Codling Wind Park – Poolbeg Client: Codling Wind Park Limited (CWP)	Borehole ID P-BH15
		GLOT					Client's Rep: Gavin and Doherty Geosolutions (GDG)	
Metho Sonic Dril Rotary Dri	lling	Plant Used Fraste Duo XL Fraste Duo XL	0.00 39.00	39.00 43.50)	dinates 94.69 E	Final Depth: 43.50 m Start Date: 05/04/2022 Driller: KV	Sheet 1 of 5 Scale: 1:50
						12.56 N	Elevation: 3.07 mOD End Date: 31/03/2022 Logger: JA	
Depth (m)	Sample / Tests	Field Records	i	Casing Wa Depth Dep (m) (n	ter Level mod mod	Depth (m)	Legend Description MADE GROUND: Crushed concrete/hardcore	Backfill #
.00 .00 - 1.50 .50 - 1.95	D2 B1 SPT (S)	N=10 (3,3/3,3,2,2) Har	nmer SN =	1.50 1.0	2.77	0.30	MADE GROUND: Firm to stiff greyish brown sandy gravelly CLAY low cobble content and fragments of concrete. Sand is fine to co Gravel is subangular to subrounded fine to medium.	0.5 0.5 0.5 0.5 0.5 0.5 0.5 0.5 0.5 0.5
.00 .00 - 2.50	D4 B3	0210					MADE GROUND: Medium dense light brown slightly silty fine to medium SAND with sea shells.	2.0
3.00 4.00	D5						no SPT taken at 3.00m due to blowing sands.	3.0
.50 - 5.00 .50 - 4.64		N=50 (28 for 135mm/5 0mm) Hammer SN = 0		4.50 1.0	-1.43	4.50	MADE GROUND: Loose dark grey very sandy silty subangular to subrounded fine to coarse GRAVEL with fragments of timber an concrete. Sand is fine to coarse.	
.00	D8				-2.03	5.10	Loose light brown silty fine to medium SAND with sea shells.	5.0
.50 - 6.00	В9							5.5
5.00 5.00 - 6.45	D10 SPT (S)	N=9 (3,3/2,2,2,3) Ham 0210	mer SN =	6.00 5.0	-3.13	6.20	X X X X X Firm brownish grey slightly sandy SILT. Sand is fine to medium. X X X X X X X X X X X X X X X X X X X	6.5
7.00 7.00 - 7.50	D12 B11						(7.0 -
.50 - 7.95		N=3 (0,1/0,1,1,1) Ham 0210	mer SN =	7.50 7.0	-4.43	7.50	Very loose brownish grey slightly gravelly fine to coarse SAND w sea shells. Gravel is subrounded to rounded fine.	vith 7.5
3.00 3.00 - 8.30	D14 B13				-5.23	8.30	Loose becoming medium dense brownish grey silty fine SAND.	8.0
).00).00 - 10.00	D16 B15							9.0
		Strikes	Rema		l		'	1 1
Casing De	etails	Water Added	3.00m 13.50r	; and	encountere	ed so no Sf	undertaken at:	
To (m) Dia 39.00 43.50	iam (mm) 177 150) From (m) To (m)		. Barr-'	Fl	. Trans	ormination Poscon	art Undated
				Barrel		Type 'Polymer	ermination Reason erminated at scheduled depth.	30/05/2022 AGS

		CAUS	EW	/AY			ct No.	Project Name: Codling Wind Park – Poolbeg Client: Codling Wind Park Limited (CWP)	Borehole II P-BH15
	-		EOT	ЕСН				Client's Rep: Gavin and Doherty Geosolutions (GDG)	
Meth	od	Plant U	Jsed	Top (m)	Base (m	Coord	linates		Sheet 2 of 5
Sonic Dr		Fraste D		0.00	39.00		94.69 E	Final Depth: 43.50 m Start Date: 05/04/2022 Driller: KW	Scale: 1:50
Rotary D	rilling	Fraste D	uo XL	39.00	43.50		12.56 N	Elevation: 3.07 mOD End Date: 31/03/2022 Logger: JAC	FINAL
Depth (m)	Sample / Tests	Fie	eld Records		Casing Water Depth Depth (m) (m)	Level mOD	Depth (m)	Legend Description	Backfill
9.00 - 9.45	SPT (S)	N=12 (1,0/2, 0210	3,3,4) Han	nmer SN =	9.00 5.00		10.20	Loose becoming medium dense brownish grey silty fine SAND.	9.3
.0.50 - 11.00 .0.50 - 10.95		N=3 (0,0/1,0	,1,1) Hamı	mer SN =	10.5 5.00	-7.23	10.30	Very loose brownish grey slightly silty fine to coarse SAND.	10.9
1.00	D18	0210							11.0
12.00 - 12.45	SPT (S)	N=14 (2,2/3,	3,3,5) Han	nmer SN =	12.0 5.00	-8.93	12.00	Medium dense brownish grey silty fine to coarse SAND.	- 12.
		0210				-9.23	12.30	Medium dense brownish grey slity fine to coarse SAND. Medium dense brownish grey very gravelly slightly silty fine to coarse SAND. Gravel is subrounded to rounded fine to medium.	12.:
.3.00 .3.00 - 13.50	D20 B19							no SPT taken at 3.00m due to blowing sands.	13.
4.00	D21					-11.13	14.20	Dense brownish grey sandy slightly silty subrounded to rounded fine to coarse GRAVEL with low cobble content. Sand is fine to coarse. Cobbles are subrounded.	- - 14.
15.00 15.00 - 15.08 15.50 - 16.00		N=50 (25 for Hammer SN		for 75mm)	15.0 5.00)			15.
16.00	D24							(1) (1) (2) (3) (4) (4) (4) (4) (4) (4) (4) (4) (4) (4	16.
L6.50 - 16.65	5 SPT (S)	N=50 (10,12, Hammer SN		ım)	16.5 5.00)			16.
.7.00	D25								17.
8.00 8.00 - 18.45	D26 SPT (S)	N=41 (3,4/5, SN = 0210	6,11,19) H	lammer	18.0 9.00				18.
8.50 - 19.00	B27	3IN - UZIU							18.
		r Strikes	Doc- : '	Rema					
Casing D			Added To (m)	m) Blowin 3.00m 13.50r	; and	ncountered	d so no SP	undertaken at:	
39.00 43.50	177 150	, 110iii (III)	10 (111)	Core	Barrel	Flush	Туре	Termination Reason Last Up	odated
				S	K6L	Water/F	olymer	Terminated at scheduled depth. 30/05	/2022 AG

		CAUSEW	ECH			Project	443C	Project Name: Codling Wind Park – Poolbeg Client: Codling Wind Park Limited (CWP) Client's Rep: Gavin and Doherty Geosolutions (GDG)							orehole P-BH15	5	
Metho Sonic Dril Rotary Dri	ling	Plant Used Fraste Duo XL Fraste Duo XL	0.00 39.00	39. 43.	00	72009 73391	4.69 E	Final De			05/04/2022	Driller:			heet 3 of Scale: 1:5 FINAL	50	
Depth	Sample /	Field Records		Casing Depth (m)	Water Depth (m)	Level	Depth		levation: 3.07 mOD End Date: 31/03/2022 Logger: JAC Description						Backfill		
(m) 19.00 19.50 19.50 - 20.00	D28 D30 U29 D31	Ublow=103 100%		(m)	(m)	-16.23	(m) 19.30		Dense brownish gre to coarse GRAVEL w Cobbles are subrou Stiff dark brown lan medium sand.	ey sandy slight vith low cobble nded.	ly silty subround e content. Sand i	s fine to co	arse.	Water	1	19.0	
1.50 - 22.00	В33	N=14 (2,3/3,4,3,4) Han 0210	nmer SN =	21.0	2.00	-17.93	- 21.00	X X X X X X X X X X X X X X X X X X X	Firm locally stiff dar occasional bands of			ated CLAY	with		2	20.5 21.0 21.5	
22.50 - 23.00 23.00	D34 U35 D36	Ublow=106 100%						X								22.0	
4.00 4.00 - 24.45 4.50 - 25.00		N=14 (3,3/3,3,4,4) Han 0210	nmer SN =	24.0	2.00			X							2	23.5 24.0 24.5	
25.00 25.50 - 26.00 26.00	D39 U40 D41	Ublow=83 100%						X								25.0 25.5 26.0	
27.00 27.00 - 27.45 27.50 - 28.00		N=17 (3,4/4,5,4,4) Han 0210	nmer SN =	27.0	2.00			X								26.5 27.0 27.5	
		r Strikes	Rema	rks			<u> </u>								<u> </u>	_	
Casing De		Water Added From (m) Time (min) Rose to (i	3.00m 13.50r	; and	ds en	countered	so no SP	T undertak	en at:								
43.50	150			Barro K6L	el	Flush T			tion Reason d at scheduled depth				Last Up 30/05/			_ F	

	ling	Plant Use		СН				443C	Client:			imited (CWP)				P-BH1	5
Depth 5	0	Fraste Duc	o XL	Top (m) 0.00 39.00	39. 43.	00	72009		Final De	epth: 43.50 m	Start Date:	05/04/2022	Driller:	KW		heet 4 of Scale: 1:5	
							73391	2.56 N	Elevatio	3.07 mOD	End Date:	31/03/2022	Logger:	JAC		FINAL	
(m)	Sample / Tests	Field	Records		Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend			cription			Water	Backfill	
8.50 - 29.00 ใ	D44 U45 D46	Ublow=80 1009	%							Firm locally stiff dar occasional bands of			ated CLAY	with			28.0 - 28.5 29.0 -
		N=17 (3,3/4,4,4 0210	4,5) Hamr	mer SN =	30.0	2.00			X X X X X X X X X X X X X X X X X X X							:	30.0 - 30.5
1.50 - 32.00 l	U49 D50	Ublow=88 100%	%		31.5	3.00			X								31.0
		N=14 (2,3/3,3,4 0210	4,4) Hamr	mer SN =	33.0	3.00			X X X X X X X X X X X X X X X X X X X								32.5 33.0
4.00	D52								X—————————————————————————————————————								34.0
4.50 - 35.00 l	U53	Ublow=85 1009	%		34.5	3.00											34.5
i6.00 l	D54						-32.93			Very stiff dark greyi	sh brown sligh	itly sandy gravali	v CLAY with	n low			35.0 · 35.5
		N=36 (3,4/7,8,1 SN = 0210	10,11) Ha	mmer	36.0	3.00				cobble content. Sar subrounded fine to	nd is fine to co	arse. Gravel is su	bangular to)	-		36.5 37.0
		Strikes		Rema	rks												_
Casing Det		Water Ad		Blowir 3.00m 13.50r	; and	ds en	countered	so no SP	T undertak	en at:							
39.00	177 150	,,		Core	Barr	el	Flush	Гуре	Terminat	tion Reason				Last Up		d L	J

		AUS	E	VV DTE	A	Y				ct No. 443C	Project Client: Client's	J	Wind Park I	- Poolbeg Limited (CWP) Geosolutions				orehole P-BH1	
Metho		Plant U					Base		Coord	inates	Final De	nth: 42 E0 m	Start Data	05/04/2022	Driller:	V\\/	S	heet 5 c	 of 5
Sonic Dril Rotary Dri	•	Fraste D Fraste D				.00	39. 43.	.00 .50		4.69 E 2.56 N	Elevatio			31/03/2022	Logger:			Scale: 1:	
Depth (m)	Sample / Tests	Fie	eld Re	cords			Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend		Des	cription		1	Water	Backfill	1
	75mm/50 for 75mm) Hammer SN = 0210 C1 100 37 18								39.00		Very stiff dark greyi cobble content. Sar subrounded fine to	d is fine to co	arse. Gravel is su	bangular t	O	>		37.5 38.0 38.5	
9.00 9.00 - 39.15 99.40							-35.93 -36.18	(0.25)		Dark grey subangul Medium strong indi LIMESTONE with wi Distinctly weathere clay infill on surface Discontinuities: 1. 0-15 degree bedo smooth with slight	stinctly thinly dely spaced ti d: slightly wea ss.	laminated dark g nin beds of weak aker, slightly close closely spaced (i	grey argilla MUDSTON er fracture 3/110/300	ceous NE. spacings,			39.5 40.0		
0.50 10.60 - 40.90							(4.25)		2. 4 no. sub-vertical 42.55-42.80m and 4 smooth, with 10mn	joints at 39.9 13.10-43.30m	5-40.30m, 41.40 planar to steppe	-41.70m, ed, rough t	0			40.5			
2.00 2.15															42.0				
13.50					-40.43	43.50			End of Bore	hole at 43.50m					43.0				
																44.5 45.0 45.5			
		Strikes		SCR	R	FI	rks			-									46.0
Casing De	etails		Add	ed	3	llowir .00m 3.50r	; and	ds en	countered	l so no SP	PT undertak	en at:							
To (m) Dia 39.00 43.50	Details Water Added							el	Flush Water/P			ion Reason				Last Up 30/05/	date	d	_

		CAUSEW	ECH			21-1	ct No. 443C		d Park — Poolbeg d Park Limited (CWP oherty Geosolutions			P-BH16
Metho Sonic Dri		Plant Used Fraste Duo XL	Top (m) 0.00	Base 40.		72003	6.91 E 7.23 N		Date: 22/04/2022	Driller: KW Logger: SR		Sheet 1 of 5 Scale: 1:50 FINAL
Depth	Sample /	Field Records		Casing Depth (m)	Water Depth (m)	Level	Depth	Legend	Description	2088011 311	Water	
(m) 0.00 - 0.50	Tests B1	rieu neculus		(m)	(m)	mOD	(m)	MADE GROUND: Firm gr CLAY with fragments of r Gravel is subangular to s	eyish brown slightly sand ed brick and concrete. Sa	and is fine to coar		0.5
1.00 1.00 - 1.50	D21 B2											1.0
1.50 - 1.95		N=18 (2,3/4,4,5,5) Han 1398	nmer SN =	1.50	1.00							1.5
2.00	D22											2.0
3.00 3.00 - 3.50 3.00 - 3.45		N=19 (3,3/4,4,5,6) Han 1398	nmer SN =	3.00	1.00	0.04	3.00	Medium dense brownish Gravel is subrounded din		o coarse SAND.		3.5
1.00	D24											4.0
1.50 - 5.00 1.50 - 4.95	B4 SPT (S)	N=9 (2,2/3,2,2,2) Hami 1398	mer SN =	4.50	1.00							4.5
6.00 6.00 - 6.50 6.00 - 6.45		N=10 (2,3/3,2,2,3) Han 1398	nmer SN =	6.00	1.00	-2.96	6.00	Medium dense grey sand coarse GRAVEL. Sand is f		prounded fine to		5.5.6
7.00	D27											7.0
7.50 - 8.00 7.50 - 7.95		N=20 (3,4/4,4,5,7) Han 1398	nmer SN =	7.50	3.00	-4.46	7.50	Medium dense brownish SAND. Gravel is subangul		•		7.5
3.00	D28											8.5
9.00 9.00 - 9.50	D29 B7											9.0
		Strikes	Rema	rks			ı					<u> </u>
Casing Do	etails Diam (mm	Water Added From (m) To (m)										
40.50	177		Core	Barre	el	Flush	Туре	Termination Reason		Las	t Updat	ed 🔳 🔳
						Wat		Terminated at scheduled depth.)/05/202	

		CAUSEM	ECH			Projec 21-14	143C	Project Client: Client's		Wind Park L	Poolbeg imited (CWP Geosolutions				oreh P-B	H1(6
Metho Sonic Dril		Plant Used Fraste Duo XL	Top (m) 0.00	Base (50	720036 733857	5.91 E	Final De			22/04/2022	Driller:			Sheet Scale FIN	: 1:5	50
Depth	Sample /			Casing 1		Level	Depth		J.04 1110D			Logger.	JIV	je.			_
(m) 9.00 - 9.45	Tests	Field Records N=19 (2,3/3,5,5,6) Har				mOD	(m)	Legend	Medium dense brov		htly gravelly silt	/ fine to co	arse	Water	Back	mii ⊟:	
10.00 10.50 - 11.00 10.50 - 10.95		1398 N=14 (3,3/3,2,4,5) Har	nmer SN =	10.5 9	9.00		-		SAND. Gravel is sub	angular to sub	rounded fine to	medium.				-	9.5 - 10.0 —
11.00	D31	1398					-										11.0 —
12.00 12.00 - 12.50 12.00 - 12.45		N=13 (2,3/3,4,3,3) Har 1398	nmer SN =		-	-8.96	- 12.00	× × × × × × × × × × × × × × × × × × ×	Medium dense grey coarse GRAVEL. San	•		rounded fi	ne to				12.0 — 12.5 —
13.50 - 14.00	B10	N=36 (3,5/7,10,10,9) F SN = 1398	lammer		-:	10.46	13.50	* * * * * * * * * * * * * * * * * * *	Dense brownish gre			ar to subro	unded				13.5
15.00 15.00 - 15.50 15.00 - 15.22		N=50 (5,10/50 for 75m Hammer SN = 1398	nm)				-									********************	14.0 - 14.5 15.0 -
	SPT (S)	N=38 (6,8/8,10,9,11) F SN = 1398	lammer				-									*******	16.0 - 16.5
17.00	D37						- 17.00		Dense greyish brow Gravel is subrounde			o coarse SA	AND.				17.0 -
18.00 18.00 - 18.50 18.00 - 18.45 18.50 - 20.00	SPT (S) B14	N=21 (5,4/5,5,5,6) Har 1398			-1	14.96	- 18.00	X X X X X X X X X X X X X X X X X X X	Stiff greyish brown	slightly sandy	silty CLAY. Sand i	s fine.					18.0 -
truck at (m)lCa		r Strikes n) Time (min) Rose to (Rema	rks													
Casing De		Water Added															
			Core	Barre	el	Flush T	уре	Terminat	ion Reason				Last U	pdate	ed	Ī	J
						Wate	er	Terminated	d at scheduled depth	1.			30/05	5/2022	2	A	K

19.50 - 19.95 SPT (C) N=21 (A,A/5,5,5,6) Hammer SN = 19.5 6.00 1388		<i>/</i> –	GEOT	ECH		21-1	ct No. 443C	Project Client: Client's		Wind Park I	- Poolbeg Limited (CWP Geosolutions				orehole II P-BH16
Supplies						72003	6.91 E								Scale: 1:50
16.00 Date D	Denth	Sample /			Casing Water				3.04 MOD			Logger:	SK .	er	
19.00 19.95 SFT 10 N-21 (A.4/5, 5.5,6) Hammer SN - 22.5 6.00			Field Records	i 	Depth (m) (m)				Stiff grevish brown			is fine		Wat	Backfill
21.00	19.50 - 19.95	SPT (C)		nmer SN =	19.5 6.00				S		5.1, 62.11 50.1				20
22.50 23.00 B16	21.00 - 21.50 21.00 - 21.45	B15 SPT (C)		nmer SN =	21.0 6.00			X							21
24.00	22.50 - 23.00 22.50 - 22.95	B16 SPT (C)		mmer SN =	22.5 6.00			X							22 23
25.50 - 26.00 B18	24.00 - 24.50 24.00 - 24.45 24.50 - 25.00	B17 SPT (S) B64	N=17 (4,4/3,4,5,5)		24.0 6.00			X							24. 24.
27.00 D47 27.00 - 27.50 B19 27.00 - 27.45 SPT (S) N=24 (4,5/5,6,6,7) Hammer SN = 27.0 6.00 N=24 (4,5/5,6,6,7) Hammer SN = 27.0 Hammer	25.50 - 26.00 25.50 - 26.00	B18 U68	Ublow=104 100%		25.5 6.00			X							25 26
Casing Details Water Added To (m) Diam (mm) From (m) To (m) 40.50 177 Core Barrel Flush Type Termination Reason Last Updated	27.00 - 27.50	B19		nmer SN =	27.0 6.00			X X X X X X X X X X X X X X X X X X X							27
Casing Details Water Added To (m) Diam (mm) From (m) To (m) 40.50 177 Core Barrel Flush Type Termination Reason Last Updated		Wate	r Strikes	Rema	rks										
	Casing Do	etails	n) Time (min) Rose to (i	<u>m)</u>		Flush	T	Toursinable	P						
				Core	Barrel										

							ct No.		: Name: Codling						orehol	
		AUSEW	AY			21-1	443C	Client:			imited (CWP				P-BH1	16
								Client's	Rep: Gavin ar	nd Doherty	Geosolutions	(GDG)				
Metho Sonic Dril		Plant Used Fraste Duo XL	Top (m) 0.00		(m) .50		inates	Final De	epth: 40.50 m	Start Date:	22/04/2022	Driller:	KW		heet 4 (Scale: 1	
						72003 73385	6.91 E 7.23 N	Elevatio	on: 3.04 mOD	End Date:	24/04/2022	Logger:	SR		FINA	L
Depth (m)	Sample / Tests	Field Records		Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend		Des	cription			Water	Backfill	
8.00	D48			1	, <i>,</i>		- (,	X———	Stiff greyish brown	slightly sandy	silty CLAY. Sand i	s fine.		>		28.0
							Ė	X———								
3.50 - 29.00	B20							<u>×</u>								28.5
3.50 - 29.00	U69	Ublow=90 100%		28.5	6.00			×								
9.00	D49							×								29.0
								X——								
								X								29.5
								X——								23.3
	550							X——								
.00 .00 - 30.50	D50 B61							×_ ×								30.0
		N=24 (4,5/5,5,6,8) Han	nmer SN =	30.0	6.00		Ė	\times								
		1398					-	×_ ×								30.5
							Ē	×_ ×_ ′								
.00	D51						-	×_ ×_ ′								31.
								<u> </u>								
.50 - 32.00	B62															31.5
.50 - 32.00	U70	Ublow=87 100%		31.5	6.00			× ×								
00	D52															32.0
							Ē									32.5
								×—								32
								×— —								
3.00 3.00 - 33.50	D53 B63							×— —								33.0
3.00 - 33.45		N=22 (4,5/6,5,5,6) Han	nmer SN =	33.0	6.00			×— —								
		1398						X——>								33.5
								X——>								
1.00	D54							X——>								34.0
								X								
1.50 - 35.00	U71	Ublow=91 100%		34.5	6.00			X—								34.5
								X—								
.00	D55						_	X								35.0
							ŧ	X								
						-32.46	35.50	X								35.5
						,	[Very stiff grey sand subrounded fine to			coarse. Gra	evel is			
5.00	D56															36.0
.00 - 36.50	B65						Ė									30.U
.00 - 36.22	SPT (C)	N=50 (10,12/50 for 75i Hammer SN = 1398	mm)	36.0	6.00											
																36.5

7.00	D57					-33.96	37.00		Very stiff brown slig	ghtly sandy CL	AY. Sand is fine to	o medium.				37.0
	Wate.	r Strikes	Rema	arks												
ıck at (m) Ca		Time (min) Rose to (r		A1 N3												
	am (mm	Water Added) From (m) To (m)														
40.50	177		Core	e Barı	rel	Flush	Туре	Terminat	tion Reason				Last Up	date	ed 🔳	_
						Wat	er	Terminate	d at scheduled depth	1.			30/05/2	2022		Ę
									pt				,/-			<u>u</u>

		VIICE/V	/ / /			Project N 21-1443			Name: Codling \			1	E	Borehole ID P-BH16
		AUSEW GEOT	ECH		1	21-1443		Client:			imited (CWP			A-RHTP
				L .				Client's	Rep: Gavin an	d Doherty (Geosolutions	(GDG)		
Metho Sonic Dril		Plant Used Fraste Duo XL	Top (m) 0.00	Base (40.50)	20036.91		Final De	pth: 40.50 m	Start Date:	22/04/2022	Driller: K	w	Sheet 5 of 5 Scale: 1:50
						733857.23		Elevation	n: 3.04 mOD	End Date:	24/04/2022	Logger: SI	R	FINAL
Depth (m)	Sample / Tests	Field Records	5	Casing W Depth Do (m) (pth m) r	evel De nOD (r	pth n)	Legend			cription		Water	Backfill
37.50 - 38.00 37.50 - 37.95 38.00 39.00 39.00 - 39.50 39.00 - 39.45	B66 SPT (S) D58 D59 B67 SPT (S) D60	N=44 (8,8/10,11,11,12 SN = 1398 N=42 (7,8/8,12,11,11) SN = 1398	Hammer	37.5 6.	000		.50		Very stiff brown slig	htly sandy CL		o medium.		37.5 38.0 38.5 39.0 40.0 40.5 41.0 42.5 43.0 43.5 44.0 45.0 45.0
Casing De		Water Added												
To (m) Di 40.50	am (mm 177) From (m) To (m)		Barrel		lush Type	. Т	Terminati	ion Reason				Last Updat	ed 🔳 🔳
						Water		Terminated	d at scheduled depth	•			30/05/202	

	1					Proje	ct No.	Project Name: Codling Wind Park – Poolbeg	Borehole ID
	C	AUSEV	VAY			21-1	443C	Client: Codling Wind Park Limited (CWP)	P-BH17
	/ -	——GEO	ГЕСН					Client's Rep: Gavin and Doherty Geosolutions (GDG)	
Metho	od	Plant Used	Top (m)	Base	(m)	Coord	inates		Sheet 1 of 4
Sonic Dri		Fraste Duo XL	0.00	19.	50			Final Depth: 30.00 m Start Date: 06/04/2022 Driller: KW	Scale: 1:50
Rotary Co Sonic Dri	-	Fraste Duo XL Fraste Duo XL	19.50 24.00	24. 30.			0.59 E 2.04 N	Elevation: 2.95 mOD End Date: 08/04/2022 Logger: JAC	FINAL
Depth (m)	Sample / Tests	Field Recor	ds	Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend Description	te Backfill
(111)	iests			(m)	(m)			MADE GROUND: Crushed CONCRETE. (Hardcore fill)	S
						2.75	0.20	MADE GROUND: Light greyish brown gravelly silty fine to coarse SAND with seas shells and pieces of concrete. Gravel is subangular fine to medium.	0.5
00 00 - 1.50	D1 B2								1.0
50 - 1.50	SPT (S)	N=50 (25 for 0mm/5 Hammer SN = 0210	0 for 0mm)	1.50	1.00	1.45	1.50	MADE GROUND: Loose brownish grey slightly gravelly silty fine to coarse SAND with occasional sea shells. Gravel is subrounded fine.	1.5
.00	D3								2.0
50 - 3.00	В7								2.5
.00	D4							no SPT taken at 3.00m due to blowing sands.	3.0
.00	D5								4.0
50 - 4.95	SPT (S)	N=6 (0,1/1,2,2,1) Hall 0210	mmer SN =	4.50	2.00			at 4.50m: driller notes blowing sands before SPT completed.	4.5
.00	D6								5.0
.60 - 6.00	В9					-2.65	5.60	Soft to firm grey sandy CLAY. Sand is fine to medium with thin band medium to coarse grey sand.	5.5
00 00 - 6.45	D8 SPT (S)	N=4 (0,2/1,1,1,1) Ha 0210	mmer SN =	6.00	3.00	-3.05	6.00	Loose grey silty fine to medium SAND with occasional thin seams o dark grey sandy silt.	6.0 6.5
.00 .00 - 7.40	D10 B11								7.0
50 - 7.95	SPT (S)	N=9 (1,0/0,3,3,3) Ha 0210	mmer SN =	7.50	3.00	-4.45	7.40	Loose becoming medium dense orangish grey very gravelly silty fin to coarse SAND with occasional sea shells. Gravel is subangular fine to medium.	
00	D12								8.0
50 - 9.00	B17								8.5
.00	D13							no SPT taken at 9.00m due to blowing sands.	9.0
	Mata	r Strikes	Rema	arks.					
uck at (m) Ca		Time (min) Rose to			ds end	countered	l so no SP	undertaken at:	
			3.00m 9.00m	n; and					
C- · · · -	_4_**	14/11/2011							
To (m) D	etails iam (mm)	Water Added) From (m) To (n							
30.00	177	, , , , , , , , , , , , , , , , , , , ,							
			Core	e Barr	el	Flush	Туре		Updated
				SK6L		Wat	er	erminated at scheduled depth. 30	/05/2022

(m) 9.50 - 30.00 E 10.00 C 10.50 - 10.95 S 11.00 C 11.50 - 12.00 E 12.00 C 12.00 C 13.00 C	Sample / Tests B41 D14 SPT (S) D15 B18 D16 SPT (S)	Plant Used Fraste Duo XL Fraste Duo XL Fraste Duo XL Fraste Duo XL Field Records N=41 (2,4/7,10,12,12) SN = 0210		19.5 24.0 30.0	Mater Depth (m)	72012	0.59 E 2.04 N Depth (m)	Final Depth: 30.00 m Start Date: 06/04/2022 Driller: KW Elevation: 2.95 mOD End Date: 08/04/2022 Logger: JAC Legend Description Loose becoming medium dense orangish grey very gravelly silty fir to coarse SAND with occasional sea shells. Gravel is subangular fin to medium.	
Depth (m) S	Sample / Tests B41 D14 SPT (S) D15 B18 D16 SPT (S)	Fraste Duo XL Field Records N=41 (2,4/7,10,12,12)	24.00	Casing Depth (m)	Water Depth (m)	73389 Level	2.04 N	Legend Description Loose becoming medium dense orangish grey very gravelly silty fir to coarse SAND with occasional sea shells. Gravel is subangular fin	Backfill The state of the stat
(m) 9.50 - 30.00 E 10.00 C 10.50 - 10.95 S 11.00 C 11.50 - 12.00 E 12.00 C 12.00 C 13.00 C	Tests B41 D14 SPT (S) D15 B18 D16 SPT (S)	N=41 (2,4/7,10,12,12)						Loose becoming medium dense orangish grey very gravelly silty fir to coarse SAND with occasional sea shells. Gravel is subangular fin	ne :
10.00 E 10.50 - 10.95 S 11.00 E 11.50 - 12.00 E 12.00 12.00 - 12.45 S	D14 SPT (S) D15 B18 D16 SPT (S)		Hammer	10.5 3	.00			to coarse SAND with occasional sea shells. Gravel is subangular fin	
1.00 E 1.50 - 12.00 E 1.2.00 C 1.2.00 C 1.3.00 C	SPT (S) D15 B18 D16 SPT (S)		Hammer	10.5 3	.00		Ę		
1.00 E 1.50 - 12.00 E 2.00	D15 B18 D16 SPT (S)								10.0
2.00	D16 SPT (S)								11.0
2.00 - 12.45 S	SPT (S)								11.5
		N=38 (2,4/7,7,12,12) F SN = 0210	Hammer	12.0 3	.00	-9.05	- 12.00	Dense brownish grey very gravelly silty fine to coarse SAND. Grave subangular to subroudned fine to medium.	l is
3 50 - 13 95	D19								13.0
3.30 13.33		N=32 (3,4/7,7,9,9) Har 0210	mmer SN =	13.5 3	.00				13.5
14.00	D20								14.0
L4.40 - 15.00 E	B25					-11.40	14.35	Medium dense brownish grey sandy silty subrounded to rounded to medium GRAVEL. Sand is fine to coarse.	fine
		N=24 (3,5/5,7,6,6) Har 0210	mmer SN =	15.0 3	.00				15.0
16.00	D22								16.0
16.50 - 16.95 S		N=19 (3,3/3,4,5,7) Har 0210	mmer SN =	16.5 3	.00				16.5
17.00 C	D23								17.0
									17.5
		N=40 (4,4/7,10,11,12) SN = 0210	Hammer	18.0 3	.00	-15.05	18.00	Dense dark grey slightly silty gravelly slightly clayey fine to coarse SAND. Gravel is subrounded to rounded fine to medium.	18.0
	Water	r Strikes	Rema	ırks					
) Time (min) Rose to (ng sand ; and	s enc	ountered	so no SP	undertaken at:	
Casing Det	tails ım (mm)	Water Added From (m) To (m)							
	177			Barre	ı	Flush	Туре	Termination Reason Las	t Updated

	C	AUS	E	W	AY	•			ct No. 443C	Project Client:	Name: Codling \		- Poolbeg _imited (CWP))			orehole P-BH1	
		——- C	EO	TE	СН					Client's	Rep: Gavin an	d Doherty	Geosolutions	(GDG)				
Metho	d	Plant U	Jsed	1	Top (n	n) Ba	se (m)	Coord	linates				05/04/0000		10.17	S	heet 3 o	of 4
Sonic Dril Rotary Co	_	Fraste D Fraste D			0.00 19.50		19.50 24.00	72012	0.59 E	Final De	e ptn: 30.00 m	Start Date:	06/04/2022	Driller:	KW	_ :	Scale: 1	:50
Sonic Dril	_	Fraste D			24.00		30.00		2.04 N	Elevatio	2.95 mOD	End Date:	08/04/2022	Logger:	JAC		FINA	L
Depth (m)	Sample / Tests	Fie	eld Rec	ords		Car De (r	pth Depth	Level mOD	Depth (m)	Legend			cription			Water	Backfill	
20.00 20.00 - 20.50	D27 B31		10					-16.55	19.50	X X X X X X X X X X X X X X X X X X X	Dense dark grey slig SAND. Gravel is sub Low recovery: Stiff of CLAY. Sand is fine to	rounded to ro	unded fine to m	edium.	laminated			19. 19.
1.00 1.00 1.00 - 21.45 2.00	- 20.50 B31 10 21.					7.00		(4.50)									21.	
23.00 23.50 - 24.00	0 B32																23. 23.	
24.00 24.00 - 24.50 24.00	D33 U42	Ublow=82 10	00%				1.0 3.00 1.0 3.00	-21.05	24.00		Firm to stiff dark bro	own laminate	d CLAY.					24
25.00	D34																	25.
25.50 - 25.95	SPT (S)	N=25 (3,4/4, 0210	6,7,8)	Hamn	mer SN	= 25	5.5 3.00											25
26.00	D35																	26
26.50 - 27.00 27.00 27.00 - 27.50	D36	Ublow=83 10	00%			27	7.0 3.00											26. 27.
					,				E									1
ruck at (m)lca		Time (min)	Rose	to (m)	-	nark		icolinters	1 50 20 50	T undertak	en at·							
Casing De		Water			3.00 9.00	m; aı		icountered	a 50 110 SP	т иниегтак	en dt.							
To (m) Di	iam (mm			(m)														
30.00	177				Со	re B	arrel	Flush	Туре	Terminat	tion Reason				Last Up	date	ed	

	1					Proje	ct No.	Project	Name: Codling	Wind Park – Poolbeg		В	orehole ID
	C	CAUSEV	YAY			21-1	443C	Client:	Codling \	Wind Park Limited (CWP))		P-BH17
	/ -	GEOT	ECH				-	Client's		d Doherty Geosolutions			
Metho	d	Plant Used	Top (m)	Base	e (m)	Coord	inates						Sheet 4 of 4
Sonic Dril Rotary Co	ling	Fraste Duo XL Fraste Duo XL	0.00 19.50	19	.50	72012		Final De	pth: 30.00 m	Start Date: 06/04/2022	Driller: KW		Scale: 1:50
Sonic Dril		Fraste Duo XL	24.00	1	.00	73389		Elevatio	n: 2.95 mOD	End Date: 08/04/2022	Logger: JAC		FINAL
Depth (m)	Sample / Tests	Field Record	s	Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend		Description		Water	Backfill
8.00	D37							[- <u>-</u> -	Firm to stiff dark bro	own laminated CLAY.			28.0
								<u> </u>					
3.50 - 28.95		N=27 (0,5/5,6,8,8) Ha 0210	mmer SN =	28.5	3.00			[-					28.5
		0210											
9.00	D38												29.0
								E-I-I					
								E==					29.5
								E-I-I					
0.00	D39					-27.05	30.00	<u> </u>		End of Borehole at 30.00m			30.0
.00	U44	Ublow=82 100%		30.0	3.00								
													30.5
													31.0
													31.5
													32.0
							Ė						
													32.5
													33.0
													33.0
													22.5
													33.5
							F						34.0
													34.5
													35.0
													35.5
							Ė						
							-						36.0
													36.5
							-						37.0
10k a+ / 10		r Strikes	Rema										
иск at (m) Са	sing to (m	n) Time (min) Rose to	(m) Blowin 3.00m			countered	so no SP	T undertak	en at:				
			9.00m										
Casing De	taile	Water Added	\dashv										
	am (mm)										
30.00	177												· ·
			Core	Barı	rel	Flush	Гуре	Terminat	ion Reason		Last	Update	ed
			9	SK6L		Wat	er	Terminate	d at scheduled depth		30/	05/2022	AC

		CAUSEW	/AY			ect No. 1443C	Client:		Wind Park L	imited (CWP)				orehole P-BH1	
Metho Sonic Dri		Plant Used Fraste Duo XL	Top (m) 0.00	Base (r 30.00	7201	55.86 E	Client's Final De Elevatio	pth: 30.00 m	Start Date:	13/04/2022 14/04/2022	(GDG) Driller: Logger:			heet 1 o Scale: 1:	50
Depth (m)	Sample / Tests	Field Records		Casing Wa Depth Dep (m) (n	ter Level	Depth (m)	Legend		Des	cription	ļ		Water	Backfill	
0.40 - 0.90 0.50 1.00 1.00 - 1.15 1.50 - 1.95 2.00	B2 D1 D5 B3 SPT (C)	N=15 (2,2/3,4,3,5) Han 1398 N=10 (2,2/2,3,3,2) Han	1.50 1.0	2.18	0.90		MADE GROUND: Cr	edium dense l	ight brown very	sandy silty		2		0.5 1.0 - 1.5 2.0 -	
.00 .00 - 4.50 .50 - 4.95	D8 B4 SPT (C)	N=8 (2,1/2,1,2,3) Hami 1398	mer SN =	4.50 2.0	-0.92	4.00		MADE GROUND: Lo medium SAND. Gra			ly very silty	fine to			4.0
5.00 5.00 - 6.50 5.00 - 6.45		N=11 (2,2/3,2,3,3) Han 1398	nmer SN =	6.00 3.0	-2.52	5.60		Loose to medium d to coarse SAND with to coarse sand. Gra	h occasional p	ieces of shell and	d bands of				6.0
7.50 - 7.95 8.00	D11 SPT (C) D12	N=14 (2,3/3,4,4,3) Han 1398	nmer SN =	7.50 4.0	00										7.5
9.00 9.00 - 9.50	D13 B19	r Strikes	Rema	rke		-	* * * * * * * * * * * * * * * * * * *								9.0 -
Casing D	asing to (m) Time (min) Rose to (r	<u>n)</u>	ZAI.											
			Core	Barrel		Type ater		ion Reason d at scheduled depth				Last Up 30/05/		- 1	G.

		CAUSEM	ECH		21-1	ct No. 443C	_	Wind Park — Poolbeg Wind Park Limited (CWP nd Doherty Geosolutions		Borehole I
Metho Sonic Dril		Plant Used Fraste Duo XL	Top (m) 0.00	Base (m) 30.00	72015	5.86 E	·	Start Date: 13/04/2022 End Date: 14/04/2022	Driller: KW Logger: JAC	Sheet 2 of Scale: 1:50 FINAL
Depth	Sample /	Field Records		Casing Water Depth Depth (m) (m)	Level	Depth	Legend	Description		backfill Backfill
	D14 SPT (C)	N=8 (2,3/2,2,2,2) Ham 1398 N=15 (2,3/3,4,4,4) Har 1398	mer SN =	9.00 7.00		(m)	Loose to medium of to coarse SAND wi	dense dark grey and brown ver th occasional pieces of shell an avel is subangular fine to mediu	d bands of silty fine	
12.00 12.00 12.00 - 12.50 12.00 - 12.45	D15 D16 B20 SPT (C)	N=12 (3,4/3,3,3,3) Har 1398	mmer SN =	12.0 9.00						11
13.00	D17						X X X X X X X X X X X X X X X X X X X			13
.3.50 - 13.95	SPT (C)	N=14 (4,3/3,4,3,4) Har 1398	mmer SN =	13.5 9.00						13
14.00	D21				-10.92	14.00		dense greyish brown slightly cla		1-
14.50 - 15.00	B24						SAND and subangu	llar to rounded fine to coarse G	GRAVEL.	1-
15.00 15.00 - 15.45	D22 SPT (C)	N=21 (5,4/4,5,5,7) Har 1398	mmer SN =	15.0 10.0						15
16.00	D23									10
16.50 - 16.95	SPT (C)	N=18 (4,4/5,4,5,4) Har 1398	mmer SN =	16.5 10.0	-13.42	16.50	Medium dense dar	k grey slightly silty fine to coar	se SAND.	10
17.00	D25									17
17.50 - 18.00	B28									17
18.00 18.00 - 18.45	D26 SPT (C)	N=23 (5,4/6,6,5,6) Har 1398	mmer SN =	18.0 10.0						18
		r Strikes	Rema	rks						
Casing De	etails am (mm	Time (min) Rose to (Water Added	m)							
19.50	177		Core	Barrel	Flush	Туре	Termination Reason		Last	Updated T
					Wat	ter	Terminated at scheduled dept	h.		05/2022 AC

		AUSEW	AY ECH			Projec		Project Client: Client's		Wind Park L	- Poolbeg .imited (CWP Geosolutions			orehole II P-BH18
Metho		Plant Used	Top (m)			Coord	inates	Final De			13/04/2022	Driller:	K/W/	heet 3 of 4
Sonic Dril	ling	Fraste Duo XL	0.00	30.	00	72015 73385		Elevatio			14/04/2022	Logger:	:	Scale: 1:50 FINAL
Depth (m)	Sample / Tests	Field Records		Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend	1	Des	cription		Water	Backfill
19.00	D27					-16.42	19.50	× × × × × × × × × × × × × × × × × × ×	Medium dense darl					19.
20.00	D29							x ^ x x × x						20.
20.30 - 20.70								x x x x x x x x x						20.
21.00 21.00	D34 U44	Ublow=62 100%				-17.62	20.70		Firm to stiff dark br	own laminated	d CLAY.			21.
22.00 22.00 - 22.50	D35 B31													22.
22.50 - 22.95	SPT (S)	N=19 (3,4/4,4,5,6) Han 1398	nmer SN =	22.5										22.:
23.00	D36													23.
24.00 24.00	D37 U45	Ublow=35 100%												24. 24.
25.00 25.00 - 25.50	D38 B32													25.
25.50 - 25.95 26.00	SPT (S)	N=18 (4,3/4,4,5,5) Han 1398	nmer SN =	25.5										25.
														26.
27.00 27.00	D40 U46	Ublow=80 100%												27.
		r Strikes	Rema	rks				1						
Casing De	sing to (m	Time (min) Rose to (r		rks										
19.50	177	,	Core	Barr	el	Flush	[vne	Terminat	tion Reason			1	Last Update	d =
				-411		Wat			d at scheduled depth				30/05/2022	

			EOTI	ECH				443C	Client's		Wind Park L	imited (CWP				orehole P-BH1	8
Metho Sonic Dri		Plant U		Top (m) 0.00		e (m) .00	72015		Final De	epth: 30.00 m	Start Date:	13/04/2022	Driller:	KW		heet 4 o Scale: 1:	
							73385		Elevatio	3.08 mOD	End Date:	14/04/2022	Logger:	JAC		FINAL	-
Depth (m)	Sample / Tests	Fie	ld Records		Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend			cription			Water	Backfill	
3.00 3.00 - 28.50	D41 B33									Firm to stiff dark br	own laminated	d CLAY.					28.0 -
8.50 - 28.95	SPT (S)	N=28 (3,4/5,6	5.7.10) Ha	mmer SN	28.5												28.5
		= 1398	-,-,,														
9.00	D42																29.0
																	29.5
.00	D43						-26.92	30.00			End of Bore	hole at 30.00m					30.0
																	30.5
																	31.0
																	31.5
																	32.0
																	32.5
																	52.5
																	33.0
																	33.5
																	34.0
																	34.5
																	35.0
																	35.5
																	36.0
																	36.5
																	37.0
uck at (m) C		Strikes Time (min)	Rose to In	Rema	rks	-											_
Casing D		Water															
To (m) D 19.50	177	riom (m)	To (m)							_		_					
				Core	Barı	rel	Flush	Гуре	Terminat	tion Reason				Last Up			Ī
							Wat	er	Terminate	d at scheduled depth	١.			30/05/	2022	_ I/∆Y	H

		CAUSEW	ECH			21-1	ct No. 443C	Project Name: Codling Wind Park – Poolbeg Client: Codling Wind Park Limited (CWP) Client's Rep: Gavin and Doherty Geosolutions (GDG)	Borehole ID P-BH19
Metho Sonic Dri		Plant Used Fraste Duo XL	Top (m) 0.00	26.0	_	72014	9.88 E	inal Depth: 26.00 m Start Date: 12/04/2022 Driller: K	Scale: 1:50
							1.50 N	Elevation: 2.96 mOD End Date: 12/04/2022 Logger: J.	
Depth (m)	Sample / Tests	Field Records	•	Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend Description MADE GROUND: Crushed CONCRETE.	Backfill
50 - 1.00	В3					2.66	0.30	MADE GROUND: Firm greyish brown sandy gravelly CLAY with of concrete.	pieces 0.5
00 50 - 1.95	D4 SPT (S)	N=15 (2,4/2,3,5,5) Har 1398	mmer SN =	1.50	1.00	1.76	1.20	MADE GROUND: Loose to medium dense light greyish brown s fine to medium SAND with occasional sea shells.	ilty 1.5
00 00 - 2.50	D5 B8								2.0
00 00 - 3.45	D6 SPT (S)	N=10 (2,2/2,3,2,3) Har 1398	mmer SN =	3.00	1.00				3.0
00	D7								4.0
50 - 4.95	SPT (S)	N=3 (2,2/1,0,1,1) Ham 1398	mer SN =	4.50	1.00	-1.84	4.80	Soft becoming firm dark greyish brown slightly sandy CLAY. San	ad is
00 00 - 5.50	D9 B12							fine.	5.1
00 - 6.45	251 (2)	N=8 (1,2/2,2,2,2) Ham 1398	mer SN =	6.00	1.00			[설명] - 12 - 12 - 12 - 12 - 12 - 12 - 12 - 12	6.
00 60 - 7.95	D11 SPT (S)	N=16 (2,2/3,3,5,5) Har 1398	mmer SN =	7.50	1.00				7.
00 00 - 8.50	D13 B14					-4.94	7.90	Medium dense greyish brown slightly silty fine to coarse SAND subrounded to rounded fine to coarse GRAVEL.	and 8.
00 00 - 9.50	D15 B23					-5.64	8.60	Medium dense brown and grey slightly gravelly slightly silty fin coarse SAND with bands of subrounded to rounded fine to me gravel. Gravel is subrounded fine to medium.	
	Water	r Strikes	Rema	ırks					
Casing Do		Water Added From (m) To (m)							
26.00	177	, , , , , , , , , , , , , , , , , , , ,		Barre	el	Flush	Туре	ermination Reason	Last Updated
						Wat		erminated at scheduled depth.	30/05/2022 AG

		CAUSEW	/AY			ect No. 1443C	Project Client: Client's		Wind Park l	- Poolbeg .imited (CWP Geosolutions				rehole -BH1	
Metho Sonic Dri		Plant Used Fraste Duo XL	Top (m) 0.00	Base (r 26.00	7201	rdinates 149.88 E 911.50 N	Final Dep			12/04/2022	Driller:		Si	eet 2 c cale: 1: FINAI	:50
Depth	Sample /			Casing Wa		Depth		2.50 11100		-	LOGGEI.	JAC			- T
(m) 9.00 - 9.45 10.00	Tests	Field Records N=12 (2,2/3,3,3,3) Har 1398		Casing Depth (m) Per (n) Per (n)		(m)	Legend	Medium dense bro coarse SAND with b gravel. Gravel is sub	wn and grey sl ands of subro	unded to round			Water	Backfill	9.5
0.50 - 10.95 1.00	D17	N=12 (2,3/3,3,3,3) Har 1398	nmer SN =	10.5 3.0	00										11.0 -
2.00 2.00 - 12.50 2.00 - 12.45		N=16 (3,3/3,4,4,5) Har 1398	mmer SN =	12.0 3.0	00										12.0 -
13.00	D19						** * * * * * * * * * * * * * * * * * *								13.0 -
3.50 - 13.95	SPT (C)	N=21 (3,4/4,5,5,7) Har 1398	mmer SN =	13.0 3.0	00		* * * * * * * * * * * * * * * * * * *								13.5
.5.00 .5.00 - 15.50 .5.00 - 15.45		N=23 (4,4/5,5,5,8) Har 1398	nmer SN =	15.0 3.0	00										14.5 15.0 15.5
6.00	D22		,												16.0
.7.00 .7.00 - 17.50	D26	N=50 (5,20/50 for 75m Hammer SN = 1398	un)	16.0 3.0	-13.54	16.50		Stiff dark brown slig Sand is fine to coars coarse. Cobbles are	se. Gravel is su	bangular to sub					16.5 17.0 -
18.00 18.00 - 18.30	D27 SPT (C)	N=50 (10,15/50 for 15 Hammer SN = 1398	0mm)	18.0 3.0	00										18.0
		r Strikes	Rema	rks											
Casing De		Water Added From (m) To (m)													
			Core	Barrel	Flus	h Type	Terminati	ion Reason				Last Upd			J
					W	ater/	Terminated	d at scheduled depth	l.			30/05/2	022	A	U

	-	CAUSEW	ECH				443C	Project Client: Client's	_	Wind Park L	- Poolbeg Limited (CWP) Geosolutions	•			oreholo P-BH1	
Metho Sonic Dril		Plant Used Fraste Duo XL	Top (m) 0.00	Base 26.		72014		Final De	epth: 26.00 m	Start Date:	12/04/2022	Driller:	KW		heet 3 o Scale: 1	
							1.50 N	Elevatio	n: 2.96 mOD	End Date:	12/04/2022	Logger:	JAC		FINA	L
Depth (m)	Sample / Tests	Field Records	i	Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend			cription			Water	Backfill	
9.00	D29					-15.94	18.90		Stiff dark brown slig Sand is fine to coars coarse. Cobbles are Stiff dark brown slig bands of grey fine to	se. Gravel is su subangular to ghtly sandy silt	bangular to sub subrounded. y laminated CLA	rounded fir	ne to			19.0 -
9.50 - 20.00	U2	Ublow=137 100%						X X X X X X X X X X								19.5
0.00 0.00 - 20.50	D30 B35						-	X — X — X — X — X — X — X — X — X — X —								20.0
1.00 1.00 - 21.45	D31 SPT (C)	N=25 (4,5/5,6,7,7) Har 1398	mmer SN =	21.0	3.00			X								21.0
2.00	D32															22.0
2.50 - 23.00	U1	Ublow=67 100%						X								22.5
3.00 3.00 - 23.50	D33 B36															23.0
4.00 4.00 - 24.45	D34 SPT (C)	N=29 (5,5/7,7,7,8) Har 1398	mmer SN =													24.0 24.5 25.0
						-23.04	26.00	X		End of Poro	hole at 26.00m					25.5
										2.10 0.7 50.0						26.5 27.0 27.5
			<u> </u>											-		
uck at (m) Ca		r Strikes D) Time (min) Rose to (Rema	irKS												
Casing De To (m) Di 26.00	etails am (mm 177	Water Added) From (m) To (m)														
20.00	1//		Core	Barr	el	Flush	Туре	Terminat	tion Reason				Last Up	date	ed	Ī
						Wat	er	Terminate	d at scheduled depth	1.			30/05,	/2022	A	H

Metho Sonic Dri Rotary Co	rilling	Bl	ECH			21-14	443C	Client: Client's Rep:	Codling '		imited (CWP) Geosolutions			ı	P-BH20)
Rotary Ci	LOTTING	Plant Used Fraste Duo XL	Top (m)	30.0	00	72008		Final Depth:	45.00 m	Start Date:	19/04/2022	Driller:	KW		heet 1 of Scale: 1:5	
	Ū	Fraste Duo XL	30.00	45.0	JU	73387		Elevation:	3.07 mOD	End Date:	21/04/2022	Logger:	JAC+RS		FINAL	
Depth (m)	Sample / Tests	Field Records	i	Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend			ription			Water	Backfill	
0.50 0.00 - 1.50 0.50 - 1.95 0.00 0.00 - 3.45 0.00 - 4.50	D3 SPT (C)	N=15 (1,2/2,3,2,8) Han 1398 N=10 (2,2/2,3,3,2) Han 1398	nmer SN =	3.00 1	1.50	-0.03	3.10	of con	GROUND: M	brick.	orown grey silty t					0.5 · · · · · · · · · · · · · · · · · · ·
.00 .00 - 6.45	D6 D7 SPT (C)	N=10 (2,3/2,2,3,3) Han 1398 N=5 (2,3/1,1,1,2) Ham				-3.13	6.20	××× Soft bı	rownish grov	candy SIIT/CL/	.V. Sand is fine to	a madium		-		5.0 =
5.20 - 6.70 5.50	B10 D9	1398				-3.63	6.70	X X X X X X X X X X X X X X X X X X X	os g. c.,	34.14, 312.1, 32.	54.14 15 11110 10	· ····ca··a·····				6.5
7.00 7.00 - 7.50 7.50 - 7.95 8.00		N=10 (2,1/2,2,3,3) Han 1398	nmer SN =	7.50 3	3.00	-199			to medium d onal pieces o		silty fine to coa	rse SAND w	vith			7.0 -
3.60 - 9.00	B15					-5.53	8.60	X X X Mediu	ım dense brov	wnish grey fine	e to coarse SAND	and subro	ounded			8.5
.00 .00 - 9.45		N=15 (2,3/3,4,4,4) Han 1398	mmer SN =	9.00 3	3.00	-6.03	9.10	Loose	to medium d	ense brown sli occasional piec	with occasional ghtly silty slightl es of sea shell. G	y gravelly f		\		9.0 =
rugh -+ / \ -		r Strikes) Time (min) Rose to (i	Rema	rks											<u> </u>	_
Casing D		Water Added	Core	· Barre · K6L	el	Flush 1		Termination Re Terminated at sch					Last U p		d L	Į

Metho		GEOT	VAY ECH	Base (n	21-1	L443C		wind Park – Poolbeg wind Park Limited (CWP) nd Doherty Geosolutions		P-	ehole ID BH20 et 2 of 5
Sonic Dril Rotary Co	ling	Fraste Duo XL Fraste Duo XL	0.00	30.00 45.00	7200	84.72 E 72.73 N		Start Date: 19/04/2022 End Date: 21/04/2022	Driller: KW Logger: JAC+RS	Sca	le: 1:50
Depth (m)	Sample / Tests	Field Record	ds	Casing Wat Depth Dep (m) (m	er Level	Depth (m)	Legend	Description		a	ackfill
10.00 10.00 - 10.50	D16 B17	N=21 (4,6/6,4,4,7) Ha 1398	ammer SN =			10.50	coarse SAND with subrounded to rou	dense brown slightly silty slightly occasional pieces of sea shell. G unded fine. ownish grey very sandy silty sub parse GRAVEL with some bands o	orounded to	5	9.5
11.50 - 12.00 12.00 12.00 - 12.45	D19	N=17 (3,3/4,4,5,4)		12.0 4.0	00						11.5
13.00	D20										12.5
.3.50 - 13.95 .4.00	SPT (C)	N=14 (4,3/3,4,3,4)		13.5 4.0	00						13.5
.5.00 .5.00 - 15.45	D22	N=15 (4,5/4,4,3,4)		15.0 5.0	00						14.5 15.0
16.00 16.50 - 16.95	D23 SPT (C)	N=19 (4,4/5,4,5,5)		16.5 5.0	00						16.0 16.5
7.00	D24 B28										17.0 17.5
18.00 18.00 - 18.45	D25 SPT (C)	N=14 (3,4/4,3,4,3)		18.0 5.0	-14.93	18.00		rk grey slightly silty fine to coars of dark grey sandy SILT.	se SAND with		18.0
ruck at /r-1/c		r Strikes	Rema	rks	<u> </u>	ı	1			<u> </u>	
Casing De		Water Added From (m) To (m)									
45.00	150			Barrel		Type Polymer	Termination Reason Terminated at scheduled dept	rh.	Last Up 30/05		VG.

		CAUSEN	AY ECH			ct No. 443C	Client's	_	Wind Park I	- Poolbeg Limited (CWP) Geosolutions			Borehole P-BH2	
Metho		Plant Used		Base (m)	Coord	inates	Final De	nth: 4E 00 m	Start Data	19/04/2022	Driller: K\	۸,	Sheet 3 o	of 5
Sonic Dril Rotary Co		Fraste Duo XL Fraste Duo XL	0.00 30.00	30.00 45.00	72008 73387	4.72 E 2.73 N	Elevatio			21/04/2022	Logger: JA		Scale: 1: FINAL	
Depth	Sample /	Field Records		Casing Water Depth Depth (m) (m)	Level	Depth	Logand			cription				_
(m)	Tests	Field Records		Casing Water Depth Depth (m) (m)	mOD	(m)	Legend	Medium dense dark			se SAND with	Water	Dackiiii	┢
19.00	D29						x	occasional seams of	dark grey sar	ndy SILT.				19 (
9.00 - 19.50							×××							
9.50 - 19.95	SPT (C)	N=14 (4,3/2,4,4,4)		19.5 5.00			(x . x . x . x . x							19.
							××××							
0.00	D30						x × ×							20.
							× × ×							
							×××							20.
							× ×							
1.00	D31				-18.03	21.10	× × ·	Stiff dark brown silt	v CLAY.					21
							×_ ×	23.K 2.0WH 3HC	,					
						Ē	×							21
22.00	D33						×							22
22.00 - 22.50							× ×							
22.50	U35	Ublow=65 100%		22.5 8.00			×_×_							22.
						<u> </u>	×							
23.00	D38					_	×							23
							×							
						-	× ×							23
						Ē	×							1
24.00 24.00 - 24.45	D39 SPT (S)	N=17 (4,5/5,4,4,4)		24.0 8.00		<u> </u>	×							24.
∪∪ = ∠4.43	51 1 (3)	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,		27.0 0.00			×							
						Ē	×_ ×_							24.
NE 00	D.40					<u> </u>	× ×							
25.00 25.00 - 25.50	D40 B46						×							25.
25.50	U48	Ublow=75 100%		25.0 8.00		Ė	× ×							25
_5.50	U-10	- 100/0		25.0 0.00		Ė	×							
26.00	D41						×							26.
						<u> </u>	×——>							
						Ē	×_×_							26.
							×							1
27.00	D42	N-20 (4 6/5 5 5 5)		27 0 0 00		<u>E</u>	×							27.
27.00 - 27.45	3F1 (3)	N=20 (4,6/5,5,5,5)		27.0 8.00			× ×							1
						-	×							27.
							×							4
	Water	r Strikes	Rema	ırks										上
ruck at (m) Ca		Time (min) Rose to (
Casing De	etails	Water Added												
To (m) Di	am (mm													
30.00 45.00	177 150		Core	Barrel	Flush	Туре	Terminat	ion Reason			I	ast Updat	ed 🔳	_
			33.0			,,,-					-			

	8	CAUS	E	W	Δ	Y				ct No. 443C	Project	Name: Codling Codling		– Poolbeg Limited (CWP)				oreho	
	-	(GEC	ЭΤЕ	CI	i					Client's			Geosolutions					0
Meth	nod	Plant	Used		Top	(m)	Base	(m)	Coord	inates	Cheric	orep. Gaviii aii	Donerty	003014110113	(000)			Sheet 4	1 of 5
Sonic D	rilling	Fraste D	Duo XI	L	0.0	00	30.	00			Final De	epth: 45.00 m	Start Date:	19/04/2022	Driller:	KW	1	Scale:	
Rotary (Coring	Fraste D)uo XI	L	30.	.00	45.	00	72008 73387	4.72 E 2.73 N	Elevatio	n: 3.07 mOD	End Date:	21/04/2022	Logger:	JAC+RS		FIN	AL
Depth (m)	Sample / Tests	Fi	eld Rec	cords			Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend		Des	cription			Water	Backf	ill
28.00 28.00 - 28.5	D43 0 B47									_	×	Stiff dark brown silt	y CLAY.						28.0
											×								
8.50	U49	Ublow=60 1	00%				28.5	8.00			×_×_								28.
9.00	D44										×								29.
											×								
											×								29.
											×								
0.00	D45	N-20					30.0	8.00	-26.93	30.00	\(\cap	Stiff brownish grey					1		30
0.00 - 30.4	5 SPT(S) (4,4/5,										×	sand. Sand is fine to	coarse. (San	u likely washed a	way durin	g arıllıng)			30.
			100								×								30
											×— — × × × × × × × × × × × × × × × × ×								31.
											×								
1.50											×-×								31.
											×-^- × ×								
			33								X———								32
			33		-						 ×								32
						AZCL					<u>×</u> ×								
33.00	E CDT/C	N-27					30.0	8.00		_	×-×								33.
33.00 - 33.4	5 SPT(S) (4,4/6,										×								
										(7.50)									33.
			74								<u> </u>								34
						AZCL					×_×								34.
34.50							30.0	8.00			×_^								34.
4.50 - 36.0 4.50 - 34.9	5 SPT(S)										×— — ×—×								
	(5,5/5,	7,7,8)								-	<u> </u>								35.
			100								×_ ×								
											×-^- × ×								35.
86.00							30.0	8.00			×								36.
36.00 - 36.4	5 SPT(S) (4,6/5,					AZCL					X								
			70								\times								36.
										Ė	<u>×_ ×</u>								
											X								37.
	Wate	r Strikes	TCR	SCR	RQD	FI emai	rks				1						1		
ruck at (m)		n) Time (min)	Rose	to (m															
Casing I		Water																	
30.00	Diam (mn 177) From (m)	То	(m)	+														
45.00	150					Core	Barr	el	Flush	Туре	Termina	tion Reason				Last Up	date	ed	
						SI	K6L		Water/P	olymer	Terminate	d at scheduled depth				30/05/	/2022	2	16

	C	AUS	E						Project	ct No. 443C	Project Client: Client's	Name: Codling Wind Park – Poolbeg Codling Wind Park Limited (CWP) Rep: Gavin and Doherty Geosolutions (GDG)	
Meth Sonic D Rotary (rilling	Plant U Fraste D Fraste D	uo X	L	0.	(m) 00 .00	Base 30. 45.	.00	72008	inates 4.72 E 2.73 N	Final De	Scale	: 1:50
Depth (m)	Samples	/ Field Records	TCR	SCR	RQD	FI	Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend	Description Back	
37.50 37.70	С		100	35	14	NI 4 20+	()	()	-34.43	37.50	X	Stiff brownish grey slightly sandy silty CLAY with bands of brown silty sand. Sand is fine to coarse. (Sand likely washed away during drilling) Weak indistinctly thinly laminated dark grey LIMESTONE interbedded with weak very thinly laminated yellowish brown MUDSTONE. Highly weathered to totally destructured: much reduced strength, much closer fracture spacing, yellowish brown discolouration and clay infill on fracture surfaces. Discontinuities: 1. 45 degree bedding fractures very closely spaced (2/35/1560) stepped, undulating, smooth.	37.5 38.0 -
39.00 39.70	С		70	43	35	7			-36.83	39.90		Soft brownish grey slightly sandy CLAY. Sand is fine to coarse. 40.00m to 40.50m. Driller notes void in rock where core barrel dropped under it's own weight	39.0
40.50			90							(2.25)			40.5
42.00 43.25	С		100	80	80	4			-39.08	42.15		Medium strong indistinctly thinly bedded dark grey LIMESTONE. Partially weathered: slightly closer fracture spacing, reduced strength, clay infill on fracture surfaces. Discontinuities: 1. 35-40 degree bedding discontinuities, medium spaced (40/220/800), planar to locally undulating, slight discolouration on some fracture surfaces and locally with 2-5mm of dark grey clay infill on fracture surfaces.	42.5 43.0
43.50 44.05	С		100	64	58	NI 7				(2.85)		2. 45 degree joints, medium spaced (120/210/280), planar, generally infilled with 5-10mm of white calcite. 42.75m to 42.80m: firm dark grey clay Infill 43.55m to 44.05m: Soft slightly sandy slightly gravelly CLAY with low cobble content. Sand is fine to coarse. Gravel is subangular fine to coarse of limestone. Cobbles are of limestone.	44.0
45.00									-41.93	45.00		End of Borehole at 45.00m	45.0 45.5 46.0
			TCR	SCR	ROD	FI							
	Water	Strikes	1.51	3311		· · ·	Chis	ellin	g Details		Remarks		
Casing		Water From (m)	Add					To (e (hh:mm)	Topus	ion Reason Last Updated	
							Barr K6L	ei	Flush Water/P			ion Reason Last Updated dat scheduled depth. 30/05/2022	AG

	<i>S</i> –		EOTE	ECH	D-	1	21-1	ct No. 443C	Project Name: Codling Wind Park – Poolbeg Client: Codling Wind Park Limited (CWP) Client's Rep: Gavin and Doherty Geosolutions (GDG)	P-BH21
Meth Sonic D		Plant Us Fraste XL		Top (m) 0.00	_	.50	71976	3.68 E	Final Depth: 26.00 m Start Date: 25/04/2022 Driller: KW Elevation: 4.74 mOD End Date: 26/04/2022 Logger: RS	Sheet 1 of 3 Scale: 1:50 FINAL
Depth	Sample /	Field	d Records		Casing Depth (m)	Water Depth (m)	Level mOD	Depth	Legend Description	Backfill
(m) 0.50	Tests ES1				(m)	(m)	MOD	(m)	MADE GROUND: Loose becoming medium dense grey sandy slightly silty subangular to subrounded fine to coarse GRAVEL.	
1.00 1.00 - 1.50	D1 B2						224	1.50		1.0
1.50 1.50 - 1.95 2.00	ES2 SPT (C)	N=14 (2,2/3,4, 1398	,3,4) Ham	nmer SN =	1.50	1.00	3.24	1.50	MADE GROUND: Firm to stiff dark brown sandy gravelly CLAY with fragments of red brick, plastic sheeting and concrete.	2.0
2.50	В6									2.5
3.00 3.00 3.00 - 3.45	B7 D4 SPT (C)	N=20 (3,3/2,4, 1398	,6,8) Ham	nmer SN =	3.00	2.00				3.0
4.00	D5									4.0
1.50 - 4.95	SPT (C)	N=12 (2,3/3,2, 1398	,3,4) Ham	nmer SN =	4.50	3.00	0.24	4.50	Medium dense light brown slightly gravelly slightly silty fine to coars SAND with occasional pieces of sea shell. Gravel is subrounded fine	e 4.5
5.00	D8								to medium.	5.0
5.50 - 6.00	B11									5.5
5.00 5.00 - 6.45	D9 SPT (C)	N=12 (3,2/2,3, 1398	,4,3) Ham	nmer SN =	6.00	5.00				6.5
7.00	D10									7.0
7.50 - 7.95	SPT (C)	N=19 (3,3/4,4, 1398	,5,6) Ham	nmer SN =	7.50	5.00	-2.76	7.50	Medium dense grey and dark grey sandy subrounded to rounded fir to coarse GRAVEL.	e 7.5
3.00	D12									8.0
3.50 - 9.00 9.00	B14									8.5
9.00 - 9.45	SPT (C)	N=21 (3,4/4,5, 1398 r Strikes	,6,6) Ham	nmer SN =		5.00		-		
truck at (m)		Time (min) F	Rose to (n			ds en	countered	d so no SF	undertaken at:	
				10.50i 13.50i	m; and					
Casing I To (m) 25.50	Details Diam (mm	Water A	Added To (m)							
23.30	1//			Core	Barı	rel	Flush	Туре	ermination Reason Last	Updated I
							Wat	ter	erminated at scheduled depth. 30/	05/2022 AG

		CAUSE	ОТЕ	СН			Projec 21 -1	443C	Client:		Wind Park L	- Poolbeg imited (CWP) Geosolutions				oreho		ر
Metho Sonic Dril		Plant Use Fraste XL D		Top (m) 0.00	Base 25.		Coord	inates	Final De	pth: 26.00 m	Start Date:	25/04/2022	Driller:	KW		heet 2		
Some Din	iiiig	Flaste XL L	Juo	0.00	25	30	71976 73330		Elevatio			26/04/2022	Logger:	RS		Scale: FIN		
Depth (m)	Sample / Tests	Field	Records		Casing Depth (m)	Water Depth (m)	Level mOD	Depth (m)	Legend		Desc	ription			Water	Backf	ill	_
0.00 0.00 - 10.50	D15						-4.96	9.70	× × × × × × × × × × × × × × × × × × ×	Medium dense grey to coarse GRAVEL. Greyish brown sligh rounded fine to coa	tly silty fine to						9.	
1.00	D17						-5.76	10.50	x	Dense greyish brow coarse GRAVEL. San No SPT undertaken at 10	d is fine to co	arse.	unded fine	to			10.	
1.50 - 12.00	B23								× × × × × × × × × × × × × × × × × × ×								11.	.5
2.00 2.00 - 12.38	D18 SPT (S)	N=50 (9,11/50 t Hammer SN = 1		m)													12.	-
3.00	D19									No SPT undertaken at 13	.50m due to blowing	y sands.					13.	
4.00	D20								× × × × × × × × × × × × × × × × × × ×								14.	.0
4.50 - 15.00									× × × × × × × × × × × × × × × × × × ×								14.	
5.00 5.00 - 15.45	D21 SPT (S)	N=41 (4,5/7,9,1 SN = 1398	14,11) Ha	mmer													15. 15.	
6.00	D22								× × × × × × × × × × × × × × × × × × ×								16.	0
6.50 - 16.95 7.00	SPT (S)	N=13 (2,2/2,2,3 1398	3,6) Hamr	mer SN =			-12.06	16.80	× × × × × × × × × × × × × × × × × × ×	Medium dense dark	k grey silty fine	to coarse SAND					16. 17.	
7.50	B27								x: X								17.	
8.00 8.00 - 18.45	D26 SPT (S)	N=20 (2,3/3,4,6 1398	5,7) Hamr	mer SN =			-13.46	18.20	X X X X X X X X X X X X X X X X X X X	Stiff greenish grey s coarse.	lightly sandy s	ilty laminated CL	AY. Sand is	fine to			18.	
	Water	r Strikes		Rema	rks			=	- X									_
uck at (m) Ca		n) Time (min) Ro	ose to (m)		g sand		countered	so no SP	T undertak	en at:								
Casing De To (m) Di 25.50	etails am (mm 177	Water Ad	dded To (m)	-														
				Core	Barr	el	Flush	Гуре	Terminat	tion Reason				Last Up	date	d		J
							Wat	er	Terminate	d at scheduled depth				30/05/	2022		\G	ĺ

Method Plant Used Top (m) Sase (m) Coordinates Plant Depth 25.00 Sast Date 25.04,702.20 Collier KW	Borehole ID P-BH21			- Poolbeg .imited (CWP) Geosolutions	Wind Park L		Project Client: Client's	443C		(m)	CH	EOTE			Math
Second S	Sheet 3 of 3 Scale: 1:50	KW	Driller:	25/04/2022	Start Date:	pth: 26.00 m	Final De								
19.00 028	FINAL	RS	Logger:	26/04/2022	End Date:	1. 4.74 mOD	Elevatio	1.12 N	73330						
9.50 - 20.00 U35 1.00 030 1.00 031 9.50 - 20.00 U35 9.75 (S) N=20 (3.575,4.5,6) Hammer SN = 21.0 0.00 1.00 031 9.50 - 20.00 U35 9.50 - 20.00 U35 1.00 032 1.00 032 1.00 033 1.00 032 1.00 032 1.00 032 1.00 033 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 033 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032 1.00 032	Backfill						Legend	Depth (m)		Water Depth (m)	Casing Depth (m)	d Records	Fie		Depth (m)
1.00	19.0 19.5 20.0	; fine to	LAY. Sand is	ilty laminated CL	lightly sandy s		X			5.00	19.5	00%	Ublow=110 1	U35 B34	9.50 - 20.00 9.50 - 22.50
2.50 - 23.00 U36 Ublow=99 100% 22.5 5.00	21.0						X			5.00	er SN = 21.0	.,5,6) Hamm		SPT (S)	
2.50 - 23.00	22.0						\times — \longrightarrow							D31	2.00
4.00 D33 A.00 - 24.45 SPT (S) N=23 (3,4/4,5,7,7) Hammer SN = 24.0 5.00 5.00 - 26.00 U37 Ublow=12 100% Water Strikes A Remarks Blowing sands encountered so no SPT undertaken at: 10.50m; and 13.50m.	22.5						×—			5.00	22.5	0%	Ublow=99 10	U36	2.50 - 23.00
4.00 - 24.45 SPT (s) N=23 (3,4/4,5,7,7) Hammer SN = 24.0 5.00	23.0						X— — X— — X— —							D32	3.00
Water Strikes ruck at (m) Casing to (m) Time (min) Rose to (m) Casing Details Water Added Page 26.00 End of Borehole at 26.00m End of Borehole at 26.00m End of Borehole at 26.00m Separate 1.0.50m; and 13.50m.	24.0						X—————————————————————————————————————			5.00	er SN = 24.0	i,7,7) Hamm	N=23 (3,4/4,5 1398	SPT (S)	
Water Strikes Tuck at (m) Casing to (m) Time (min) Rose to (m) Blowing sands encountered so no SPT undertaken at: 10.50m; and 13.50m.	25.0 25.5						X				25.5	0%	Ublow=12 10	U37	5.00 - 26.00
Casing Details Water Added Rose to (m) Rose to (m) Blowing sands encountered so no SPT undertaken at: 10.50m; and 13.50m.	26.0			hole at 26.00m	End of Bore			26.00	-21.26						
Casing Details Water Added	26.5 27.0 27.5					en at:	Γ undertak	so no SP	counterec		Blowing san	Rose to (m)			uck at (m) Ca
25.50 177											13.50m.	Added To (m)		am (mm)	To (m) D
	- Pari	Last Upda 30/05/20								rel	Core Barr				



APPENDIX C CORE PHOTOGRAPHS



Codling Wind Park - Poolbeg



P-BH15 Box 1 39.00-40.50m

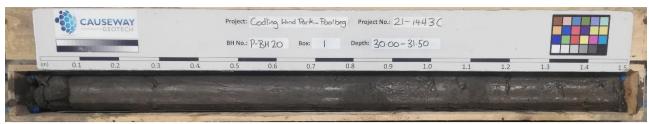


P-BH15 Box 2 40.50-42.00m



P-BH15 Box 3 42.00-43.50m





P-BH20 Box 1 30.00-31.50m



P-BH20 Box 2 31.50-33.50m



P-BH20 Box 3 33.00-34.50m



P-BH20 Box 4 34.50-36.00m



P-BH20 Box 5 36.00-37.50m



Codling Wind Park - Poolbeg



P-BH20 Box 6 37.50-39.00m



P-BH20 Box 7 39.00-40.50m



P-BH20 Box 8 40.50-42.00m



P-BH20 Box 9 42.00-43.50m



P-BH20 Box 10 43.50-45.00m





APPENDIX D
TRIAL PIT LOGS



			Proi	ject No.	Project	t Name:		Trial Pit ID
8				-1443C		g Wind Park – Poolbeg		III.a.i i i i i
	CAUS	SEWAY GEOTECH		rdinates	Client:			P-TP01
	(SEOTECH			Codling	g Wind Park Limited (CWP)		
Method:)40.14 E	Client's	s Representative:		Sheet 1 of 1
Trial Pitting			7339	905.38 N	Gavin a	and Doherty Geosolutions (GDG)		Scale: 1:25
Plant:			Ele	vation	Date:	Logi	ger:	FINAL
8T Tracked Exc				4 mOD	31/03/	2022 JG		
Depth (m)	Sample / Tests	Field Records	Level (mOD)	Depth (m)	Legend	Description	Water	
(m) 0.50 - 1.50 0.50 - 1.50	B1 ES1		(mOD)	(m)		MADE GROUND: Light greyish brown gravelly silty fine to co with fragments of brick and shell roots and rootlets. Gravel subrounded to rounded fine to coarse.	arse SAND	1.5 —
2.50 - 3.50 3.50 - 4.00	B3							3.0
			4.14	4.00				4.0 —
			7.14	7.00		End of trial pit at 4.00m		-
								-
				-				
				-				4.5
								-
				-				-
				-				
Wate	r Strikes		Ren	narks:	1			
Struck at (m)	Remarks	Depth: 4.00		groundwat	er encou	ntered.		
. ,		Width: 1.00						
		Length: 2.20						
		Stability:	Teri	mination R	eason		Last Updat	ed
		Stable	Tern	minated at so	cheduled o	depth	20/05/202	2 AGS

A-N			Proi	ject No.	Proiect	t Name:		Trial Pit ID
	CALIC			-1443C	1	g Wind Park – Poolbeg		
	CAUS	EWAY GEOTECH	Cooi	rdinates	Client:			P-TP02
		BEOTECH)38.28 E	1	g Wind Park Limited (CWP)		
Method:				399.84 N	1	s Representative:		Sheet 1 of 1
Trial Pitting						and Doherty Geosolutions (GDG)		Scale: 1:25
Plant: 8T Tracked Exc	ravator			vation 4 mOD	Date: 31/03/		gger:	FINAL
Depth	Sample /	Field Records	Level	Depth	Legend	Description	N. September 1	
(m)	Tests	Tield Records	(mOD)	(m)	Legend	MADE GROUND: Light greyish brown gravelly silty fine to o	oarse SAND	
						with shell fragments, roots and rootlets. Gravel is subroun rounded fine to coarse.	ded to	
				-				_
				-				_
0.50 0.50 - 1.50	ES1 B3							0.5 —
								_
				-				
				-				1.0
								-
				-				
								-
1.50 1.50 - 2.50	ES2 B4			-				1.5 —
1.50 2.50				-				
								-
				_				2.0 —
				-				-
				-				-
				_				
2.50 - 3.50	B5			-				2.5 —
				-				-
				-				
				-				-
				-				3.0 —
				_				
				-				-
3.50 - 4.00	В6							3.5 —
				-				-
				-				
								-
			3.74	4.00		End of trial pit at 4.00m		4.0
				-]
								-
				-				4.5 —
				_				
				-				-
				-				
					<u> </u>			
	r Strikes	Depth: 4.00		narks: groundwat	er enco	ntered		
Struck at (m)	Remarks	Width: 1.00	INO	groundwat	ei encou	intereu.		
		Length: 3.20						
		Stability:	Teri	mination R	leason		Last Upda	ted
		Stable	Tern	minated at so	cheduled o	depth	20/05/20	22 AGS

0.0			Proi	ect No.	Proiect	: Name:		Т	rial Pit ID
	CALIC	TVA/AV		-1443C	1	g Wind Park – Poolbeg			
	CAUS	SEWAY GEOTECH	Coo	rdinates	Client:				P-TP03
		JEOTECH		33.65 E	1	g Wind Park Limited (CWP)			
Method:				884.60 N	1	s Representative:			neet 1 of 1
Trial Pitting						and Doherty Geosolutions (GDG)		S	cale: 1:25
Plant: 8T Tracked Exc	ravator			vation 7 mOD	Date: 31/03/		ogger:		FINAL
Depth	Sample /	Field Records	Level	Depth	Legend	Description		Water	
(m)	Tests	rieiu necorus	(mOD)	(m)	Legenu	MADE GROUND: Light greyish brown gravelly silty fine to	coarse SAND	Wa	
				-		with low cobble content, roots and rootlets. Gravel is sul rounded fine to coarse.			_
						rounded line to course.]
				-					-
0.50 - 1.50	B1			-					0.5 —
				-					
				-					_
				-					- 10
				-					1.0 —
				-					_
				-					-
1.50 - 2.50	B2			-					1.5 —
				-					-
				-					
				-					_
				_					2.0
				-					
				-					-
				-					-
2.50 - 3.50	В3			-					2.5 —
				-					-
				-					
				-					3.0
				-					-
				-					
				-					_
3.50 - 4.00	B4			-					3.5 —
				-					
				-					-
			2.57	4.00					4.0
			2.5/	4.00		End of trial pit at 4.00m			4.0
									-
				-					
				-					4.5 —
				-					-
				-					
				- - -					-
Wate Struck at (m)	Remarks	Depth: 4.00	- 1	narks: groundwat	er encou	ntered.			
23. 201. 40 (111)		Width: 1.00							
		Length: 3.10					1		
		Stability:		mination R			Last U		
ĺ		Unstable	Terr	ninated at so	cheduled o	lepth	20/0	5/2022	

202				ect No.		t Name:		T	rial Pit ID
	CAUS	EWAY		1443C	Codling	g Wind Park – Poolbeg			D TD04
		SEOTECH	Coor	dinates		g Wind Park Limited (CWP)			P-TP04
Method:				60.31 E	1	s Representative:		SI	neet 1 of 1
Trial Pitting			7339	08.45 N	Gavin a	and Doherty Geosolutions (GDG)			cale: 1:25
Plant:				vation	Date:		ogger:		FINAL
BT Tracked Ex	cavator Sample /		3.56	Depth	31/03/		<u> </u>	a	IIIVAL
(m) 0.10 - 0.40	Tests	Field Records	(mOD)	(m)	Legend	Description MADE GROUND: Light greyish brown slightly gravelly silt SAND with roots and rootlets, fragments of brick, concre Gravel is subangular to subrounded fine to coarse.		Water	-
0.40 - 1.50 0.50	B4 ES1		3.16	0.40		MADE GROUND: Greyish brown gravelly silty fine to coar occasional rootlets, fragments of fabric, ceramic tile, brid Gravel is subangular to subrounded fine to coarse.			0.5 -
1.50 1.50 - 2.50	ES2 B5		1.56	2.00		MADE GROUND: Greyish brown and light greyish brown silty fine to coarse SAND. with low cobble content and fr brick. Gravel is subrounded to rounded fine to coarse. Co	agments of		1.5 -
2.50 - 3.50	В6								2.5 -
3.50 - 4.00	B7		-0.44	4.00		End of trial pit at 4.00m			3.5 -
									4.5 =
					\perp				
	er Strikes	Depth: 4.00	1	narks:				-	
Struck at (m)	Remarks	Width: 1.00	No §	groundwat	er encou	intered.			
		Length: 3.20							
		Stability:	Terr	nination R	leason		Last U	pdate	ed = -
		Stable	Term	ninated at so	cheduled (depth	20/05	5/2022	VAT CH

			Proj	ect No.	Project	t Name:		Ti	rial Pit ID
	CALIS	SEW/AV		1443C	1	g Wind Park – Poolbeg			
	CAUS	EWAY GEOTECH	Cooi	dinates	Client:			ı	P-TP05
		BLOTLETT	7200	61.64 E	1	g Wind Park Limited (CWP)			
Method:				82.81 N	1	s Representative:		Sh	eet 1 of 1
Trial Pitting						and Doherty Geosolutions (GDG)		S	cale: 1:25
Plant:				vation	Date:		Logger:		FINAL
8T Tracked Exc				8 mOD	03/03/	2022	JG		
Depth (m)	Sample / Tests	Field Records	Level (mOD)	Depth (m)	Legend	Description		Water	
0.50 - 1.50 1.50 - 2.50 1.50 - 2.50	B1 B2 ES1					MADE GROUND: Dark grey sandy subangular to sub coarse GRAVEL with low cobble and boulder contenplastic, brick and concrete. Sand is fine to coarse. G subrounded. Cobbles and boulders are subrounded	nt, fragments of g ravel is subangul	lass,	1.5 —
2.50 - 3.50 3.50 - 4.00	B3								2.5 — — — — — — — — — — — — — — — — — — —
			-0.22	4.00		End of trial pit at 4.00m			4.0
				-]
									-
				-					-
				Ė					4.5 —
				-					
				Ė					-
									-
	r Strikes	Depth: 4.00	1	narks:					
Struck at (m)	Remarks	Width: 1.00	No	groundwat	er encou	ntered.			
		Length: 3.60							
		Stability:	T	mination R	loacar		1	st Update	,
									וויילן י
		Unstable	Tern	ninated at so	cheduled o	depth	[:	20/05/2022	

A-N			Proi	ect No.	Project	Name:		Tr	ial Pit ID
				-1443C	1	g Wind Park – Poolbeg			
	CAUS	EWAY		rdinates	Client:			Р	-тР06
	——-G	EOTECH			1	g Wind Park Limited (CWP)		·	
Method:			7201	.75.76 E	1	s Representative:		Ch	eet 1 of 1
Trial Pitting			7339	000.68 N	1	and Doherty Geosolutions (GDG)			ale: 1:25
Plant:			Ele	vation	Date:	Logg	er:	50	aic. 1.25
8T Tracked Exc	cavator		1	5 mOD	31/03/		,		FINAL
Depth	Sample /	Field Records	Level	Depth	Legend	Description	Water	ater	
(m)	Tests		(mOD)	(m)	××××	MADE GROUND: Light greyish brown slightly gravelly silty fin		}	
				-		SAND with low cobble content and shell fragments. Gravel is to rounded fine to coarse. Cobbles are subrounded.	subrounded		-
						to rounded line to coarse. Cobbles are subrounded.			
				-					_
0.50 - 1.50	B1			-					0.5 —
									-
				-					-
				-					
				-					1.0
				-					-
									-
				-					-
1.50 - 2.50	B2								1.5 —
2.50				-					-
				-					-
				-					-
				-					2.0
				-					2.0
				-					-
									-
				-					-
2.50 - 3.50	В3			-					2.5
				-					_
				-					-
				-					
									3.0
				-					-
				-					-
				-					\dashv
3.50 - 4.00	B4			-					3.5 —
				-					4
									-
				-					-
			2.05	4.00		End of trial pit at 4.00m			4.0
				-					
									-
				-					-
				-					4.5
				-]
				-					_
				-					-
				marks:					
Wate Struck at (m)	Remarks	Depth: 4.00	- 1	narks: groundwat	er encou	ntered.			
Struck at (III)	Remarks	Width: 1.10							
		Length: 2.80							
		Stability:	Teri	mination R	eason		Last Upda	ted	
		Unstable	Tern	ninated at so	heduled o	depth	20/05/202	22	AGS

A.N			Proi	ect No.	Project	t Name:		Т	rial Pit ID
	CALIC			-1443C	1	g Wind Park – Poolbeg			
	CAUS	SEWAY GEOTECH	Cool	rdinates	Client:				P-TP07
		JEOTECH		.73.75 E	1	g Wind Park Limited (CWP)			
Method:				363.32 N	1	s Representative:			eet 1 of 1
Trial Pitting						and Doherty Geosolutions (GDG)	1	S	cale: 1:25
Plant: 8T Tracked Ex	cavator			vation 8 mOD	Date: 31/03/	2022	Logger: JG		FINAL
Depth	Sample /	Field Records	Level	Depth	Legend	Description	30	Water	
(m)	Tests	rieiu Recorus	(mOD)	(m)	Legenu	MADE GROUND: Light greyish brown slightly gravelly s	silty fine to co		
				-		SAND with roots and rootlets. Gravel is subrounded to coarse.			_
				-					
				-					-
0.50 - 0.80 0.50 - 1.50	ES1 B1			-					0.5
				-					_
				-					-
				-					1.0
				-					_
				-					-
				-					
1.50 - 2.50	B2			-					1.5 —
				-					-
				-					1
				-					-
				-					2.0
				-					
				-					-
2.50 - 3.50	В3			-					2.5 —
2.30 - 3.30				-					-
				-					-
				-					1
				-					3.0
				-					-
				-					
				-					-
3.50 - 4.00	B4			-					3.5
				-					-
				-					-
			3.38	4.00					4.0
				-		End of trial pit at 4.00m			-
				-					-
				-					
				-					4.5
				-					
				-					-
				-					-
\\/a+c	er Strikes		Rer	narks:					
Struck at (m)		Depth: 4.00		groundwat	er encou	ntered.			
		Width: 1.10 Length: 3.20							
		Stability:	Tori	mination R	leason		I	ast Update	d
		Stability: Stable		ninated at so		depth		20/05/2022	
ı	1	1	1			· ·		,,_522	

			Proj	ect No.	Project	: Name:		1	rial Pit ID
	CALIC	SEVA/AV		1443C	1	g Wind Park – Poolbeg			
	CAUS	SEWAY GEOTECH	Coor	dinates	Client:			1	P-TP08
		GEOTECH			Codling	g Wind Park Limited (CWP)			
Method:				11.14 E	Client's	s Representative:		S	heet 1 of 1
Trial Pitting			7339	12.88 N	Gavin a	and Doherty Geosolutions (GDG)			Scale: 1:25
Plant:			Ele	vation	Date:	L	.ogger:		FINIAL
8T Tracked Ex	cavator		2.98	3 mOD	31/03/	2022 J	G		FINAL
Depth (m)	Sample / Tests	Field Records	Level	Depth (m)	Legend	Description		Water	
Depth (m) 0.50 - 0.80 0.80 - 2.20	B1 B2	Field Records	2.18 0.78	Depth (m) - 0.80 - 2.20	Legend	MADE GROUND: Light greyish brown gravelly silty fine twith low cobble content, fragments of grounded fine to coarse. Cobbles are subrounded with low cobble content with shell fragments. Gravel is rounded fine to coarse. Cobbles are subrounded. MADE GROUND: Light greyish brown gravelly silty fine twith low cobble content with shell fragments. Gravel is rounded fine to coarse. Cobbles are subrounded.	lass, brick and d. o coarse SAND subrounded to	Water	1.0 —
				-					4.0
				- - - - - - - - -					4.5 — —
				<u> </u>					
	Chuit		Por	narks:					
Struck at (m)	Remarks	Depth: 3.00		groundwat	er encou	ntered.			
Struck at (III)	neilidiks	Width: 1.00	(
		Length: 3.00							
		Stability:	Torr	nination R	pason		Last U	ndətr	.d = =
l		Unstable	Tern	ninated due	to pit wall	s collapsing	20/0	5/2022	

	CALIG	SEWAY		ect No. 1443C		t Name: g Wind Park – Poolbeg		T	rial Pit ID
		EOTECH		dinates	1	g Wind Park Limited (CWP)			P-TP09
Method:				52.27 N		s Representative:		SI	neet 1 of 1
Trial Pitting						and Doherty Geosolutions (GDG)		S	scale: 1:25
Plant: BT Tracked Ex	cavator			vation 5 mOD	Date: 31/03/	Logg 2022 JG	er:		FINAL
Depth (m)	Sample / Tests	Field Records	Level (mOD)	Depth (m)	Legend			Water	
0.50 0.50 - 1.50 1.50 1.50 - 2.10	ES1 B3	Steady seepage at 2.60	0.85	2.10		MADE GROUND: Dark grey sandy subangular to subrounded coarse GRAVEL with low cobble and boulder content, occasi and rootlets, fragments of timber, ceramic tile, steel wire, bit and concrete. Sand is fine to coarse. Cobbles and boulders a subrounded. MADE GROUND: Light greyish brown and orangish brown versubrounded to rounded fine to coarse GRAVEL with low cob and shell fragments. Cobbles are subrounded. End of trial pit at 2.80m	onal roots mac, brick re		1.5 - 2.0 2.5 4.0 4.5
Struck at (m)	Remarks	Depth: 2.80	Ren	narks:					
2.60	Steady seep	age Width: 1.00							
	at 2.60	Length: 3.00	-				1	٠ - له ء	-1 -
		Stability:		mination R			Last Up		
		Unstable	Tern	ninated due	to pit wal	ls collapsing	20/05	/2022	MACH

			Proj	ect No.	Project	Name:		Т	rial Pit ID
- 20				1443C		g Wind Park – Poolbeg			
	CAUS	JSEWAY			Client:	,		F	-троэа
	(-GEOTECH	Coor	umates		g Wind Park Limited (CWP)			
Method:			7200	68.08 E	1	s Representative:		CI.	neet 1 of 1
Trial Pitting			7338	58.25 N		ind Doherty Geosolutions (GDG)			cale: 1:25
Plant:			Elev	vation	Date:	Logge	r:	_	
8T Tracked Exca	avator		3.04	4 mOD	31/03/	2022 JG			FINAL
Depth	Sample /	Field Records	Level	Depth	Legend	Description		/ater	
Depth (m)	Sample / Tests	Groundwater encountered at 2.90	Level (mOD) 1.34 0.44	Depth (m)	Legend	Description MADE GROUND: Dark grey very sandy subangular to subroun coarse GRAVEL with occasional rootlets, low cobble and bould fragments of glass, timber, steel wire, concrete and brick. Cobboulders are subrounded. MADE GROUND: Light greyish brown slightly gravelly slity fine SAND with low cobble content and shell fragments. Gravel is a rounded fine to coarse. Cobbles are subrounded. MADE GROUND: Light greyish brown and greyish brown sand subrounded to rounded fine to coarse GRAVEL with low cobble and shell fragments. Sand is fine to coarse. Cobbles are subrounded to fine to coarse.	to coarse ounded to	Water	2.5 —
				-					
141-4	Ctribes		Rom	narks:					
Water Struck at (m)	Strikes Remarks	Depth: 3.00			ind remr	nants of old quay wall on the instruction of archaeologist			
2.90	Groundwa	100		•					
2.50	encountere								
	2.90		Tern	nination R	eason		Last Up	date	d 2 - 2
						a sellenation			
		Unstable	Term	ninated due 1	to pit wall	s collapsing	20/05/	2022	

20	CAUSEWAY ——GEOTECH		Project No.		Project Name:			Trial Pit ID		
S A			21-	21-1443C Coordinates		Codling Wind Park – Poolbeg Client: Codling Wind Park Limited (CWP)			P-TP10	
5			Coor							
Method:			7201	15.93 E	Codling Wind Park Limited (CWP) Client's Representative:			C	neet 1 of 1	
Trial Pitting			7338	733872.03 N Elevation		Gavin and Doherty Geosolutions (GDG)			Scale: 1:25	
Plant:			Ele			Date: Logger:				
8T Tracked Excavator			3.00 mOD		31/03/2022		JG		FINAL	
Depth (m)	Sample / Tests	Field Records	Level (mOD)	Depth (m)	Legend	·	d-d£	Water	_	
0.10 - 0.40 0.40 - 1.50 0.50 1.50 1.50 - 2.20	B3 B4 ES1 ES2 B5		2.60	2.20		MADE GROUND: Dark grey sandy subangular to subroun coarse GRAVEL with low cobble content, fragments of gle concrete. Sand is fine to coarse. Cobbles are subrounded MADE GROUND: Light greyish brown slightly gravelly slig coarse SAND with low cobble content and shell fragment subangular to rounded fine to coarse. Cobbles are subrounded fine to coarse. When the company is to company to the coarse of the coar	ass, brick and i.		1.0 —	
						MADE GROUND: Light brown and greyish brown slightly to coarse SAND with bands of bluish grey silty fine to me fragments of plastic. Gravel is subrounded to rounded fir	edium sand and		2.5 -	
			0.00	- 3.00		End of trial pit at 3.00m			3.0 —	
Wate Struck at (m)	er Strikes Remarks	Depth: 3.00 Width: 1.00		arks:	er encou	ntered.			4.5 -	
		Length: 3.20								
		Stability:	Terr	Termination Reason Last Up				pdate	d 🔳 🖃	
		Unstable		Terminated due to pit walls collapsing 20/05,				5/2022		