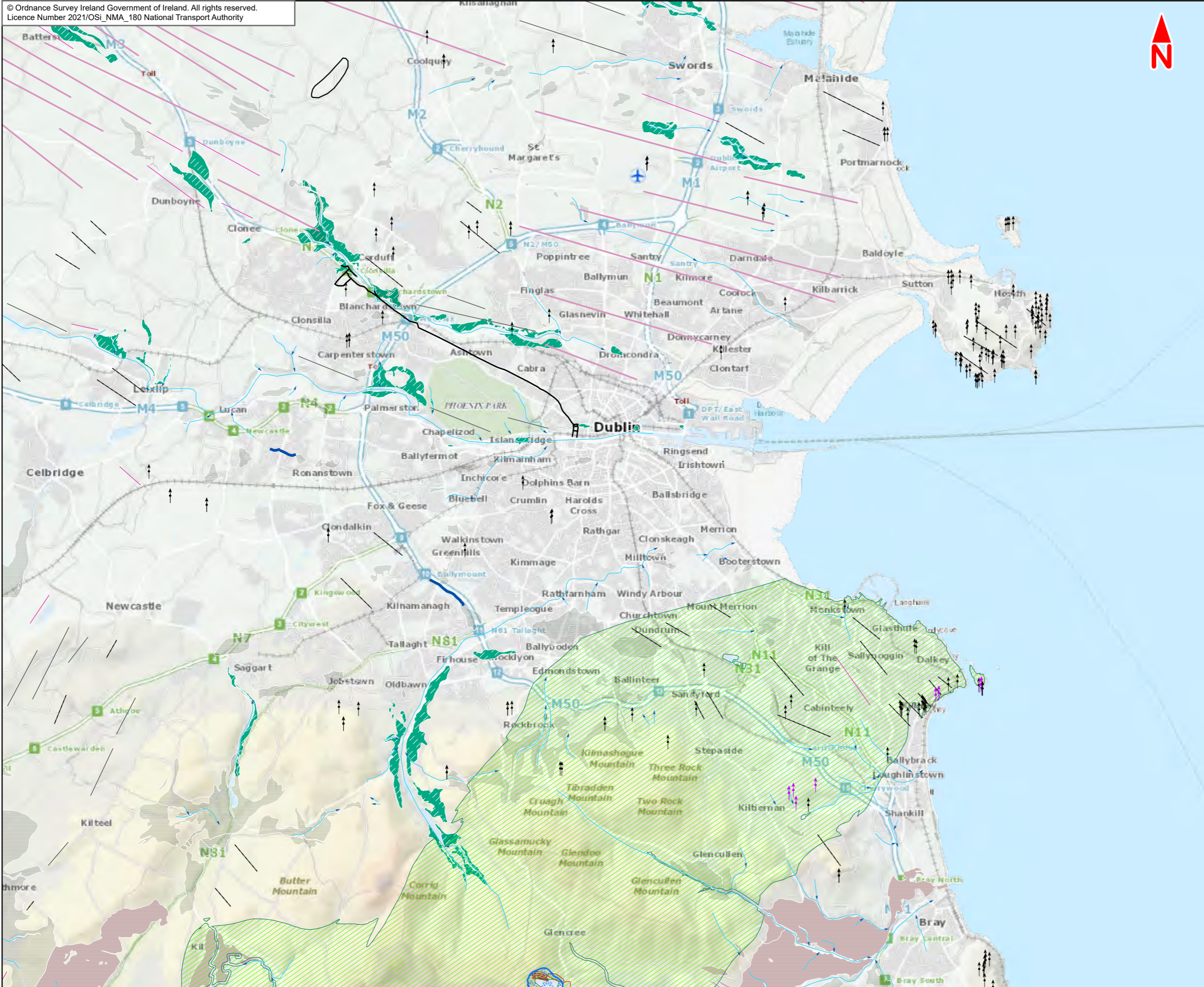


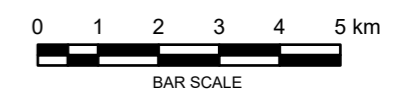
The background is a vibrant yellow. It features several abstract, organic shapes in shades of blue and green. These shapes are interconnected and layered, creating a sense of depth and movement. Scattered throughout the composition are several white circles of varying sizes, some of which are partially enclosed by the blue and green shapes. The overall aesthetic is modern and graphic.

14.1 Regional Geomorphology



- Legend :**
- Blanchardstown to City Centre Core Bus Corridor Scheme
 - Landform**
 - ↑ Striae
 - ↑ Roche Moutonnee
 - LANDFORM**
 - Crag-and-Tail
 - Drumlin
 - Mega scale glacial lineation
 - Streamlined Bedrock
 - LANDFORM**
 - Esker ridge
 - Meltwater channel
 - Description**
 - Composite Thrust Block Moraine
 - Landform**
 - Corries
 - Landform**
 - Indicator erratic source area
 - Deglacial Landforms**
 - Delta
 - Glaciofluvial Terrace
 - Hummocky Sand and Gravel
 - Moraine Ridge

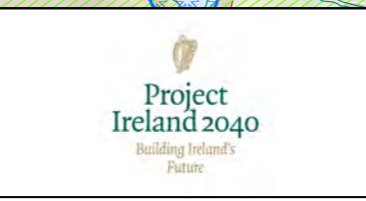
This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

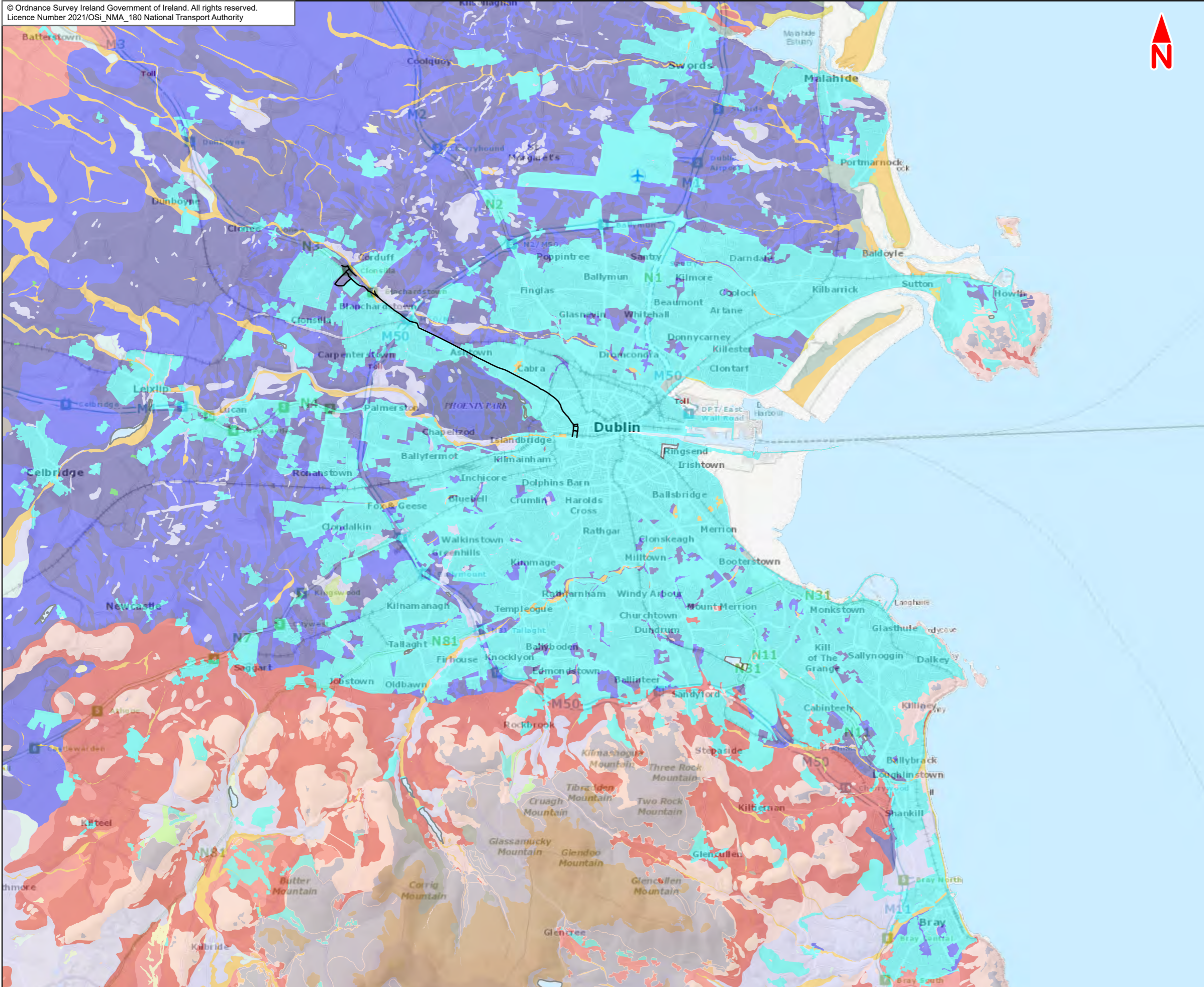
Consultant: **JACOBS ARUP SYSTRA**

Date: 15/03/2022 | Scale @ A3: 1:125 000
 Drawn: FG | Checked: PW | Approved: DK
 Project Code: BCIDE | Originator Code: JAC

Programme Title: BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.1 Regional Geomorphology			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0001	Sheet Number: 1 of 1	Status: A	Rev: M01

14.2 Regional Soils





Legend :

Blanchardstown to City Centre Core Bus Corridor Scheme	BminPD - Surface water Glays / Ground water Glays Basic
AeolUND - Aeolian Undifferentiated	BminPDPT - Peaty Glays Basic Parent Materials Basic
AlluvMIN - Mineral alluvium	BminSP - Surface water Glays / Ground water Glays Shallow
AminDW - Acid Brown Earths / Brown Podzolics	BminSPPT - Peaty Glays Shallow
AminPD - Surface water Glays / Ground water Glays Acidic	BminSRPT - Lithosols Peats
AminPDPT - Peaty Glays Acidic	BminSW - Renzinas / Lithosols
AminSP - Surface water Glays / Ground water Glays Shallow	Cut - Raised Bog cutaway/cutover
AminSRPT - Podzols Peaty	FenPT - Fen peat
AminSW - Lithosols / Regosols	Lac
BktPT - Blanket peat	Made
BminDW - Grey Brown Podzolics / Brown Earths Basic	MarSands
	MarSed
	Scree
	Water

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer

a. National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.

b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.

c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

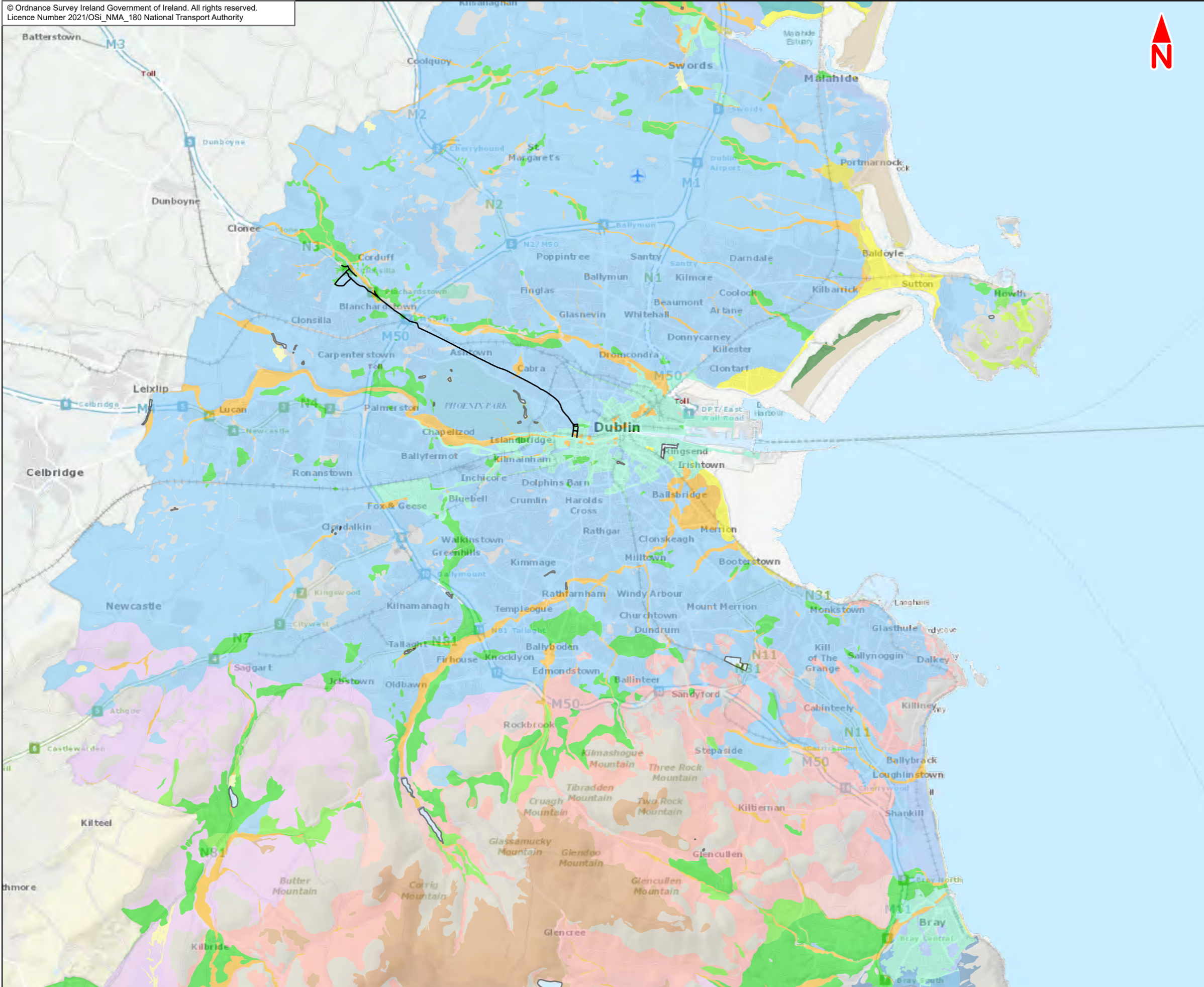
Date: 15/03/2022 Scale @ A3: 1:125 000
Project Code: BCIDE Originator Code: JAC

Drawn: FG Checked: PW Approved: DK
QMS Code:

Programme Title: BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Belfield / Blackrock to City Centre Core Bus Corridor Scheme Figure 14.2 Regional Soils			
Drawing File Name: BCIDE-JAC-ENV_GT-1415_XX_00-DR-GG-0002	Sheet Number: 1 of 1	Status: A	Rev: M01

14.3 Regional Subsoils





- Legend :**
- Blanchardstown to City Centre Core Bus Corridor Scheme
 - Quaternary Sediments - 1:50,000**
 - A, Alluvium
 - Ag, Alluvium (gravelly)
 - As, Alluvium (sandy)
 - Asi, Alluvium (silty)
 - BktPt, Blanket Peat
 - Cut, Cut over raised peat
 - GCh, Gravels derived from chert
 - GLPSS, Gravels derived from Lower Palaeozoic sandstones and shales
 - GLs, Gravels derived from Limestones
 - GMP, Gravels derived from Metamorphic rocks
 - GGr, Gravels derived from granite
 - Rck, Bedrock outcrop or subcrop
 - Scree, Scree
 - L, Lacustrine sediments
 - Lsi, Lacustrine silts
 - Mbs, Marine beach sands
 - Mesc, Estuarine silts and clays
 - TdIMr, Tidal Marsh
 - IrSTCSs, Irish Sea Till derived from Cambrian sandstones and shales
 - IrSTLPSs, Irish Sea Till derived from Lower Palaeozoic sandstones and shales
 - IrSTLs, Irish Sea Till derived from Limestones
 - TCSs, Till derived from Cambrian sandstones and shales
 - TGr, Till derived from granites
 - TLPSS, Till derived from Lower Palaeozoic sandstones and shales
 - TLs, Till derived from limestones
 - TMp, Till derived from Metamorphic rocks
 - TQz, Till derived from quartzites
 - Ws, Windblown sands
 - Wsd, Windblown sands and dunes
 - Dam
 - Embankment
 - Landfill
 - Urban
 - Water

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

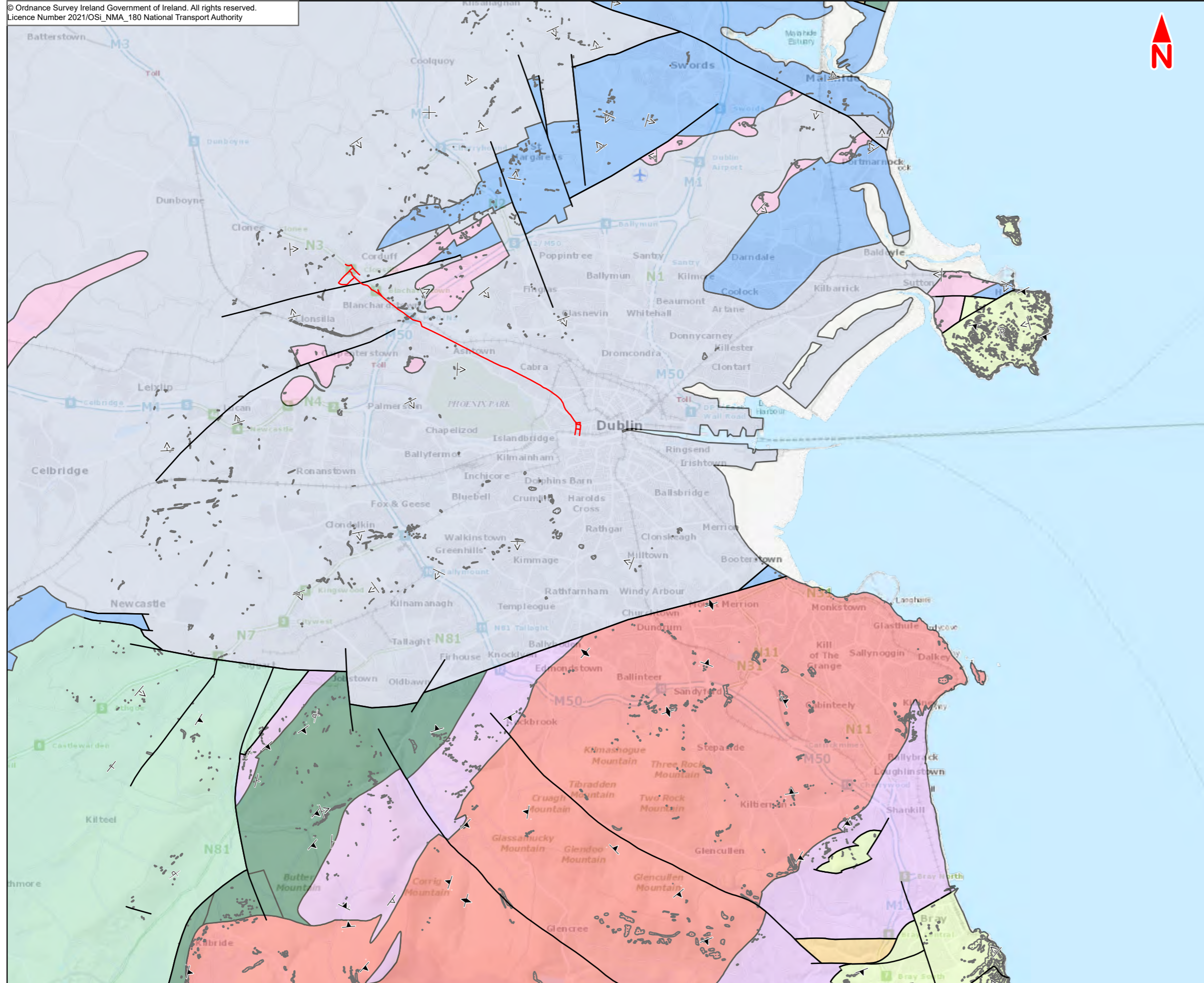
Date: 15/03/2022 | Scale @ A3: 1:125 000
Project Code: BCIDE | Originator Code: JAC

Drawn: FG | Checked: PW | Approved: DK

Programme Title: BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.3 Regional Subsoils			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0003	Sheet Number: 1 of 1	Status: A	Rev: M01

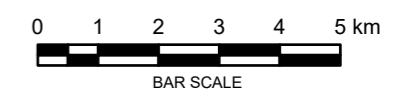
14.4
Regional Bedrock





- Legend :**
- Blanchardstown to City Centre Core Bus Corridor Scheme
 - GSI Bedrock Geological Faults - 1:500,000
- GSI Bedrock Structural Symbols - 1:100,000**
- First foliation parallel to bedding
 - Horizontal Bedding
 - Strike and dip of bedding, right way up
 - Strike and dip of bedding, way up unknown
 - Strike and dip of first foliation
 - Strike and dip of overturned bedding
 - Strike and dip of second foliation
 - Strike of vertical first foliation
- GSI Bedrock Outcrop - 1:100,000**
- GSI Bedrock Outcrop - 1:100,000
- GSI Bedrock Geology - 1:500,000**
- Visean basinal limestone "Calp"
 - Waulsortian mudbank
 - Courcean limestone
 - Up Dev-Lr Carb ORS
 - Caledonian granite
 - Silurian sandstone, g'wacke, shale
 - Mid-Up Ordovician basic volcanics
 - Lr-Mid Ordovician slate
 - Lr-Mid Ordovician acid volcanics
 - Lr-Mid Ordovician basic volcanics
 - Cambrian greywacke, sandst, qtzite

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSi Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish Transverse Mercator Grid (ITM) as defined by OSi active local GPS station.

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken as appropriate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client
NTA
Udarás Náisiúnta Iompair
National Transport Authority

Date: 15/03/2022
Scale @ A3: 1:125 000
Project Code: BCIDE
Originator Code: JAC

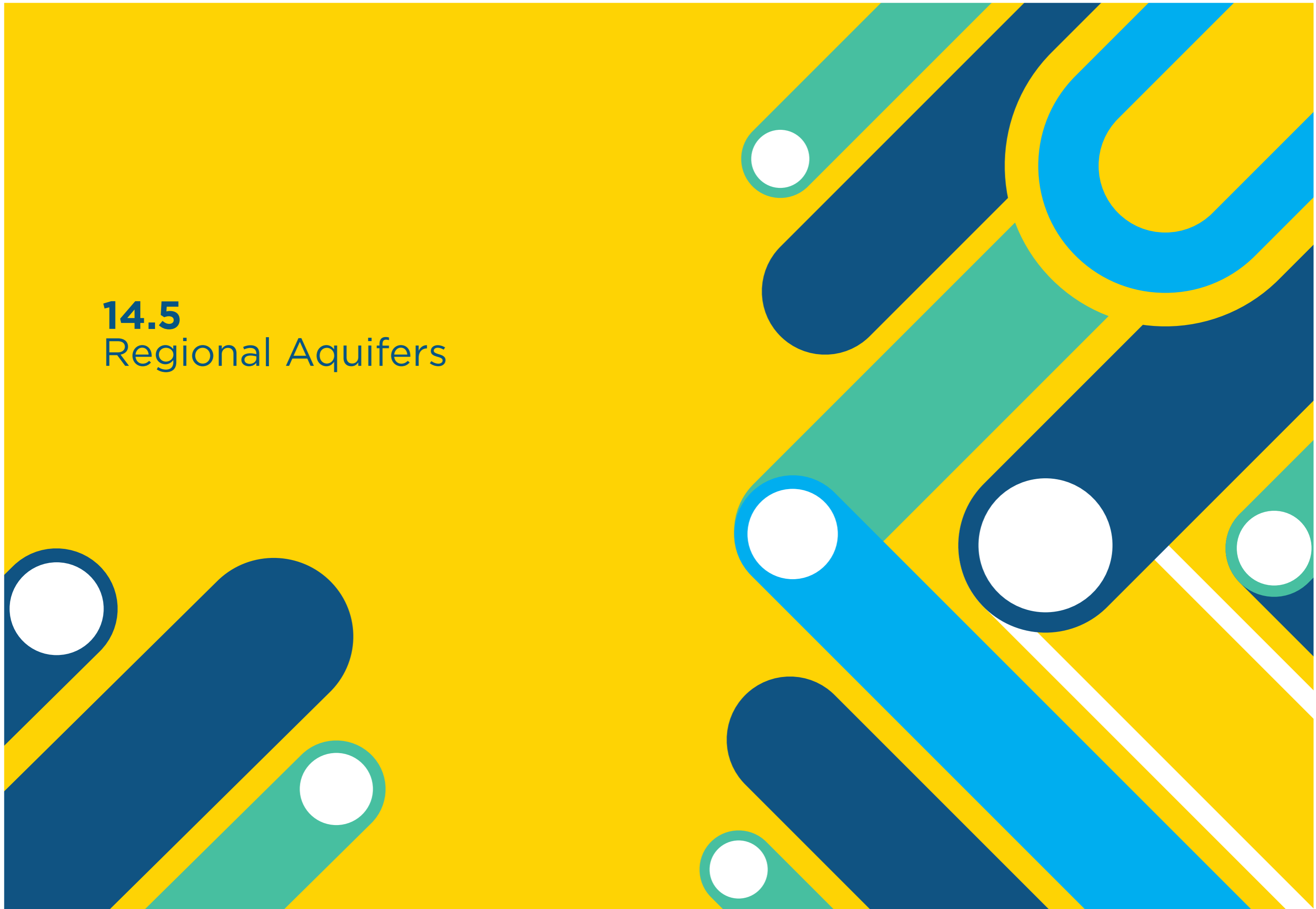
Consultant
JACOBS ARUP SYSTRA

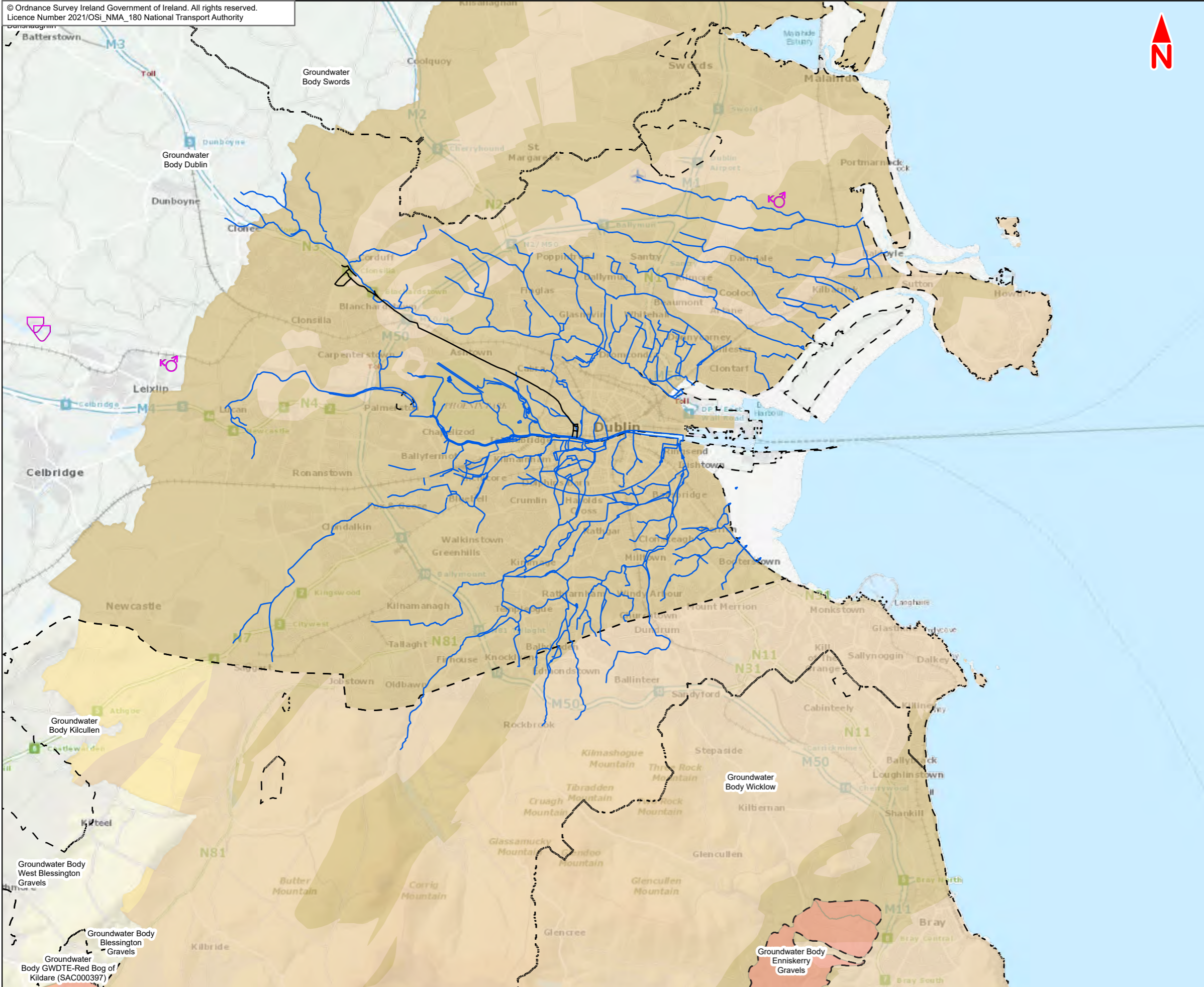
Drawn: FG
Checked: PW
Approved: DK

QMS Code

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.4 Regional Bedrock				
Drawing File Name BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0004	Sheet Number 1 of 1	Status A	Rev M01	

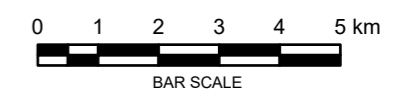
14.5
Regional Aquifers





- Legend :**
- Blanchardstown to City Centre Core Bus Corridor Scheme
 - Rivers Of Dublin
 - GSI Sand And Gravel Aquifers
 - Groundwater Bodies - Water Framework Directive
 - GSI Karst**
 - CAVE
 - SPRING
 - GSI Bedrock Aquifer**
 - Locally Important Aquifer - Bedrock which is Moderately Productive only in Local Zones (LI)
 - Locally Important Aquifer - Bedrock which is Generally Moderately Productive (Lm)
 - Poor Aquifer - Bedrock which is Generally Unproductive except for Local Zones (PI)
 - Poor Aquifer - Bedrock which is Generally Unproductive (Pu)

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer

a. National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.

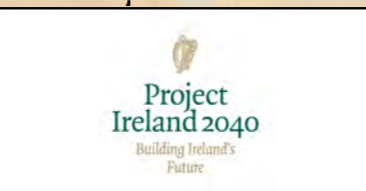
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.

c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



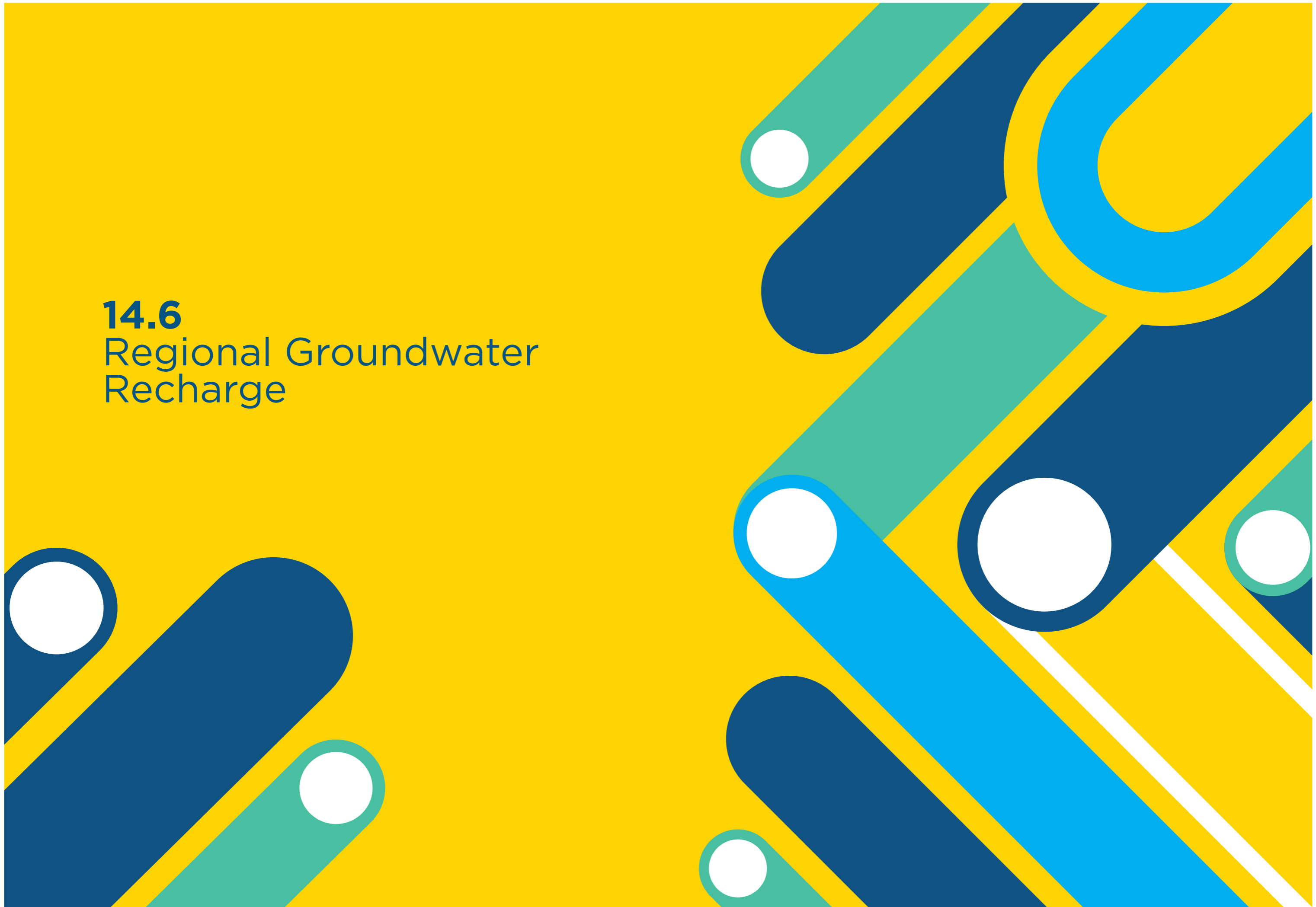
Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

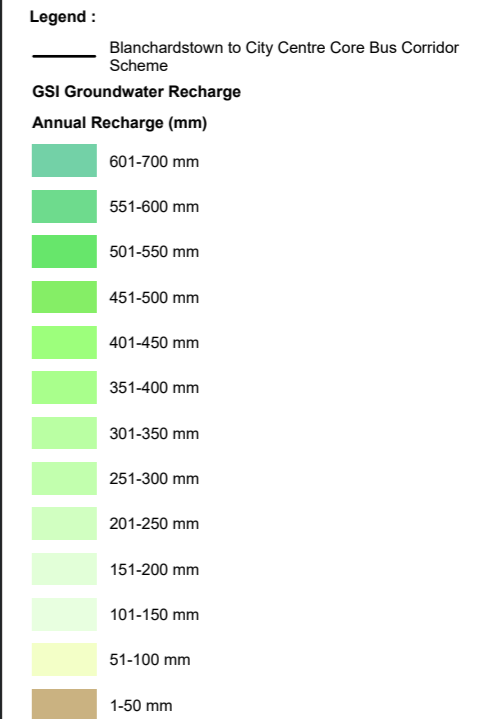
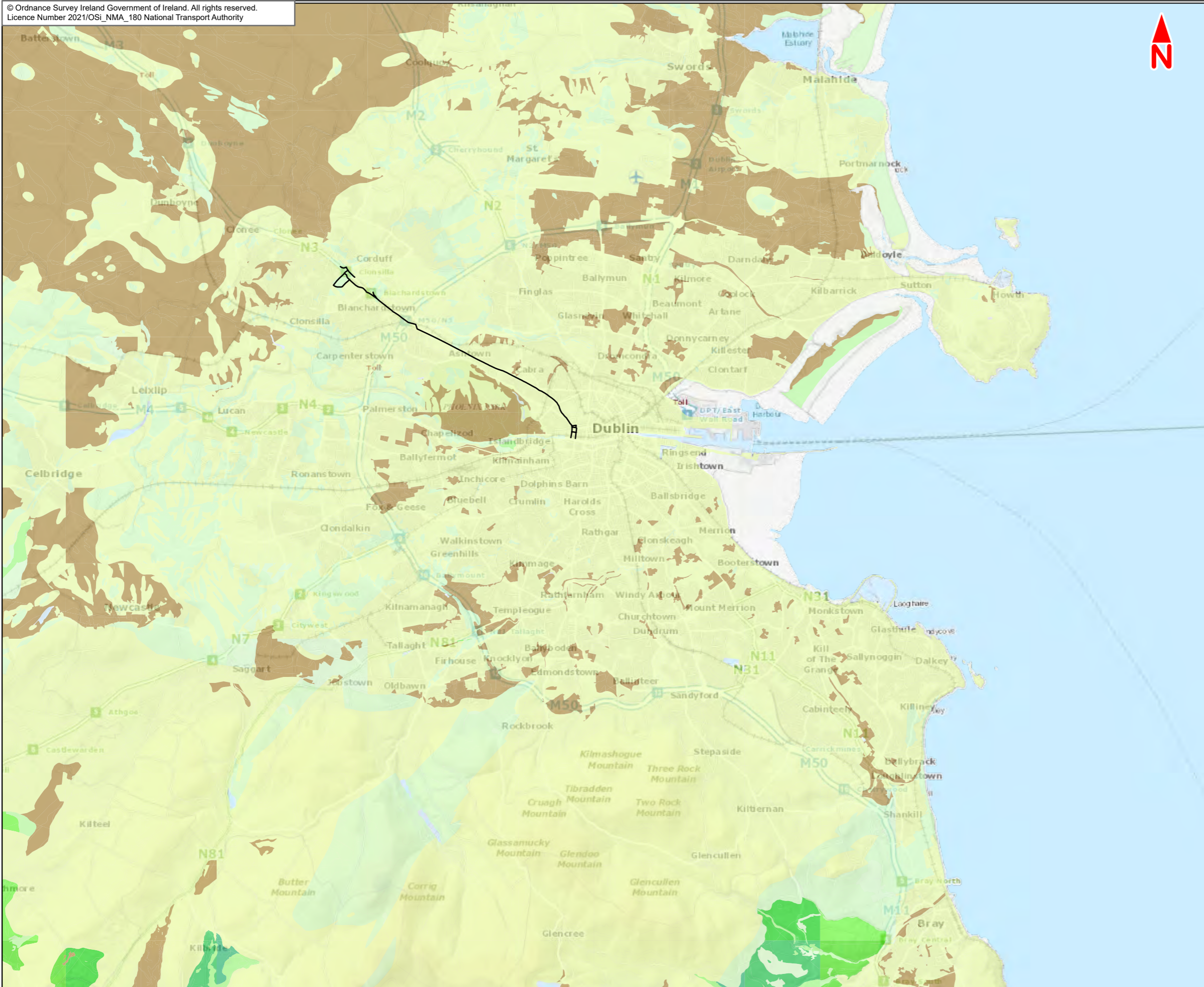
Client

Consultant

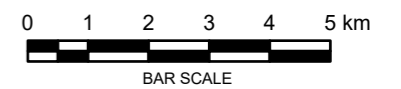
Programme Title					BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title					Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.5 Regional Aquifers				
Date	15/03/2022	Scale @ A3	1:125 000	Drawn	FG	Checked	PW	Approved	DK
Project Code	BCIDE	Originator Code	JAC	QMS Code					
Drawing File Name	BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0005	Sheet Number	1 of 1	Status	A	Rev	M01		

14.6
Regional Groundwater
Recharge





This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer

a. National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.

b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.

c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



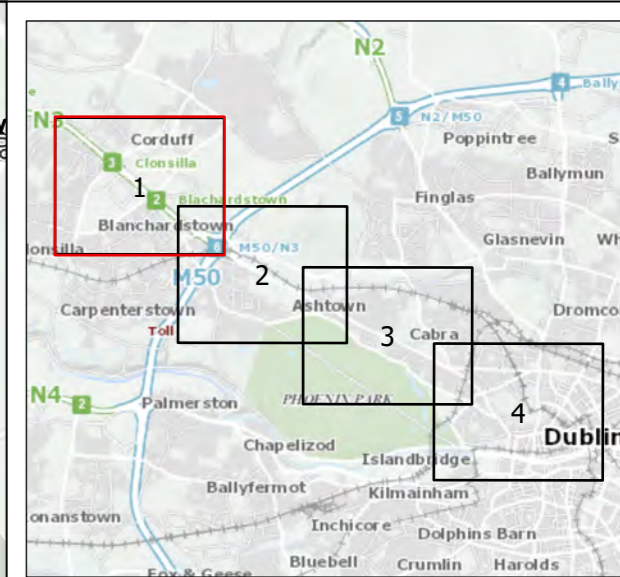
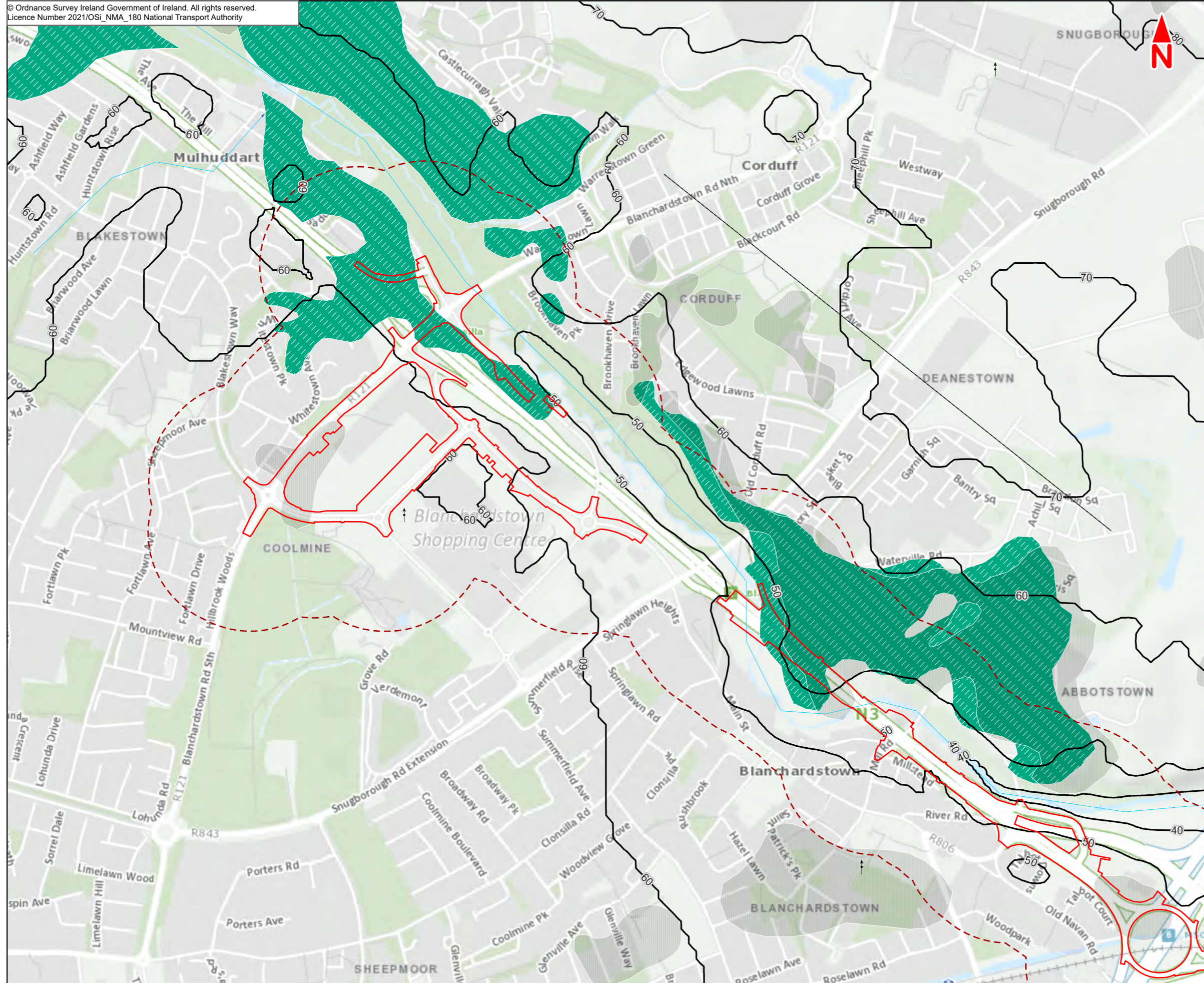
Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client NTA Udarás Náisiúnta Iompair National Transport Authority		Consultant JACOBS ARUP SYSTRA		
Date 15/03/2022	Scale @ A3 1:125 000	Drawn FG	Checked PW	Approved DK
Project Code BCIDE	Originator Code JAC	QMS Code		

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.6 Regional Groundwater Recharge				
Drawing File Name BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0006	Sheet Number 1 of 1	Status A	Rev M01	

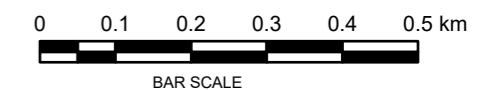
14.7
Topography and
Geomorphology





- Legend :**
- Blanchardstown to City Centre Core Bus Corridor Scheme
 - - - 250m Study Area
 - EPA Contours
 - Subglacial Lineation Striae**
 - Landform
 - ↑ Striae
 - Subglacial Lineation Landforms**
 - LANDFORM
 - Streamlined Bedrock
 - Meltwater Landforms**
 - LANDFORM
 - Meltwater channel
 - Deglacial Landforms**
 - Landform
 - Glaciofluvial Terrace
 - Hummocky Sand and Gravel

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
 a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
 b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
 c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSi Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

d. Transverse Mercator Grid (TM) as defined by OSi active local GPS station.
 Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

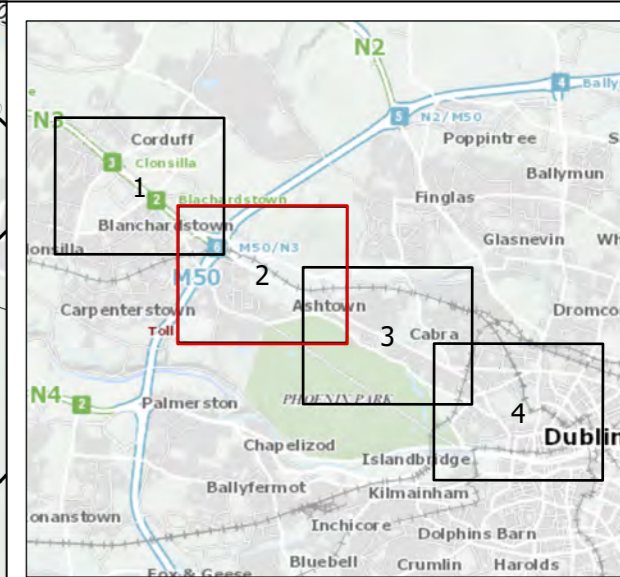
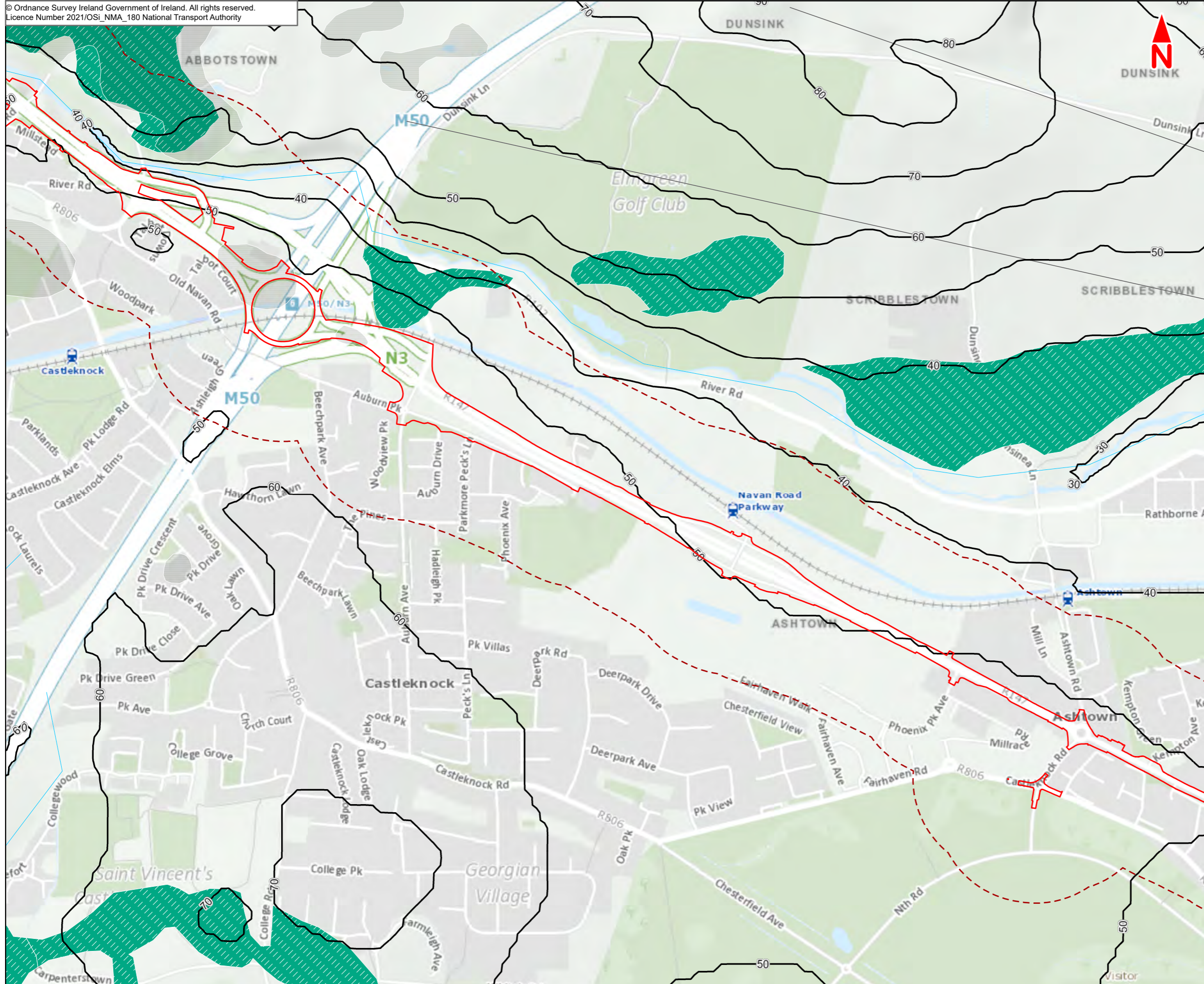
Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

Date: 15/03/2022 | Scale @ A3: 1:10000
 Project Code: BCIDE | Originator Code: JAC

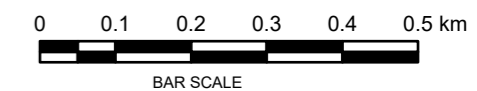
Drawn: FG | Checked: PW | Approved: DK

Programme Title: BUSCONNECTS DUBLIN			
CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.7 Topography and Geomorphology			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0101	Sheet Number: 1 of 4	Status: A	Rev: M01



- Legend :**
- Blanchardstown to City Centre Core Bus Corridor Scheme
 - - - 250m Study Area
 - EPA Contours
 - Subglacial Lineation Landforms**
 - LANDFORM
 - Crag-and-Tail
 - Meltwater Landforms**
 - LANDFORM
 - Meltwater channel
 - Deglacial Landforms**
 - Landform
 - Glaciofluvial Terrace
 - Hummocky Sand and Gravel

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



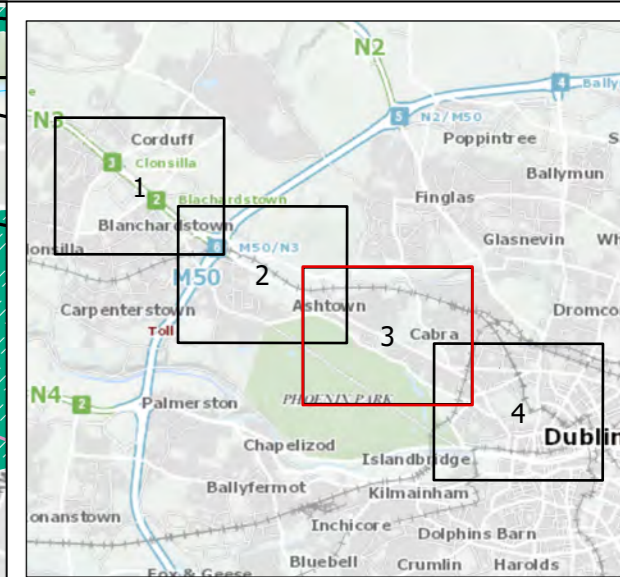
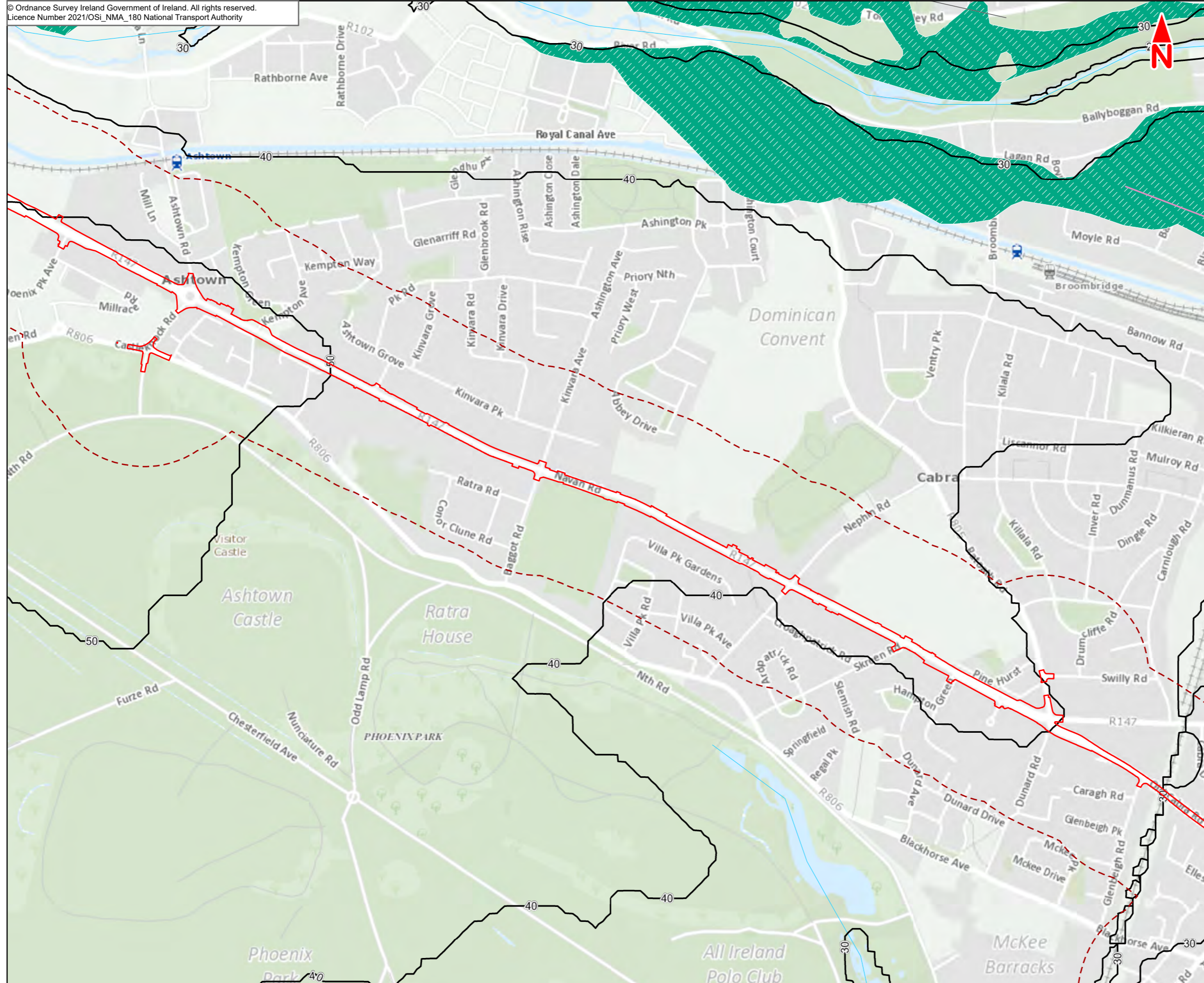
Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client
NTA
Udarás Náisiúnta Iompair
National Transport Authority

Consultant
JACOBS
ARUP SYSTRA

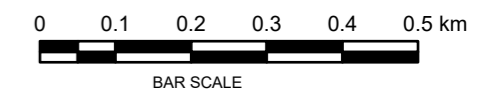
Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.7 Topography and Geomorphology				
Drawing File Name BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0102	Sheet Number 2 of 4	Status A	Rev M01	

Date 15/03/2022	Scale @ A3 1:10000	Drawn FG	Checked PW	Approved DK
Project Code BCIDE	Originator Code JAC	QMS Code		



- Legend :**
- Blanchardstown to City Centre Core Bus Corridor Scheme
 - - - 250m Study Area
 - EPA Contours
 - Subglacial Lineation Landforms**
 - LANDFORM**
 - Crag-and-Tail
 - Mega scale glacial lineation
 - Meltwater Landforms**
 - LANDFORM**
 - Meltwater channel
 - Deglacial Landforms**
 - Landform**
 - Glaciofluvial Terrace

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSi Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSi active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.

Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

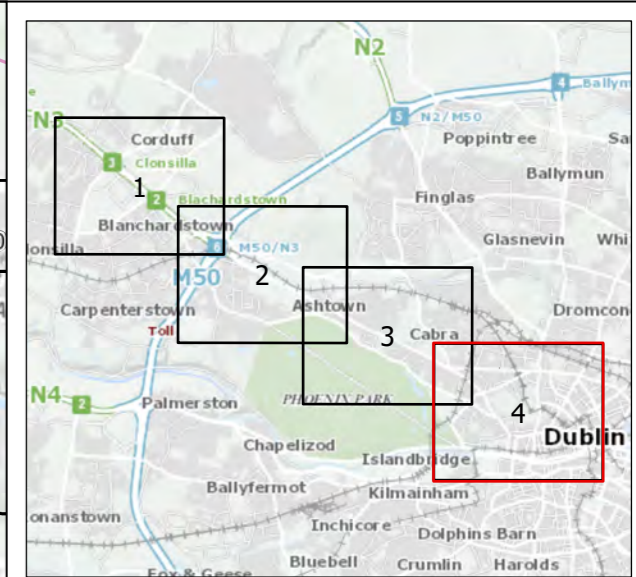
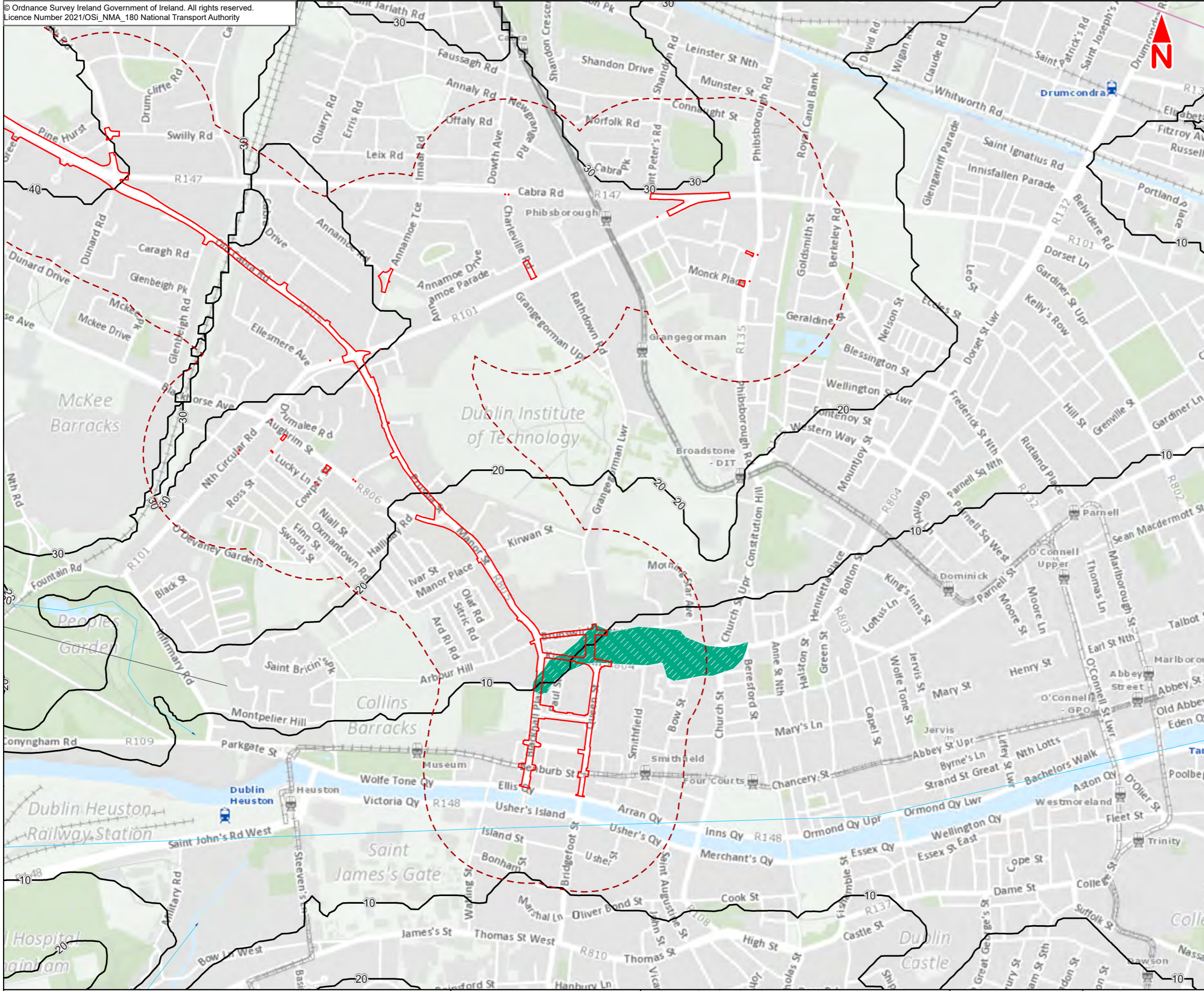
Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

Date: 15/03/2022 | Scale @ A3: 1:10000
Project Code: BCIDE | Originator Code: JAC

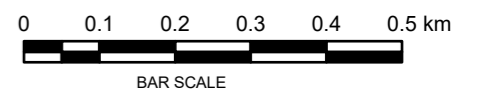
Drawn: FG | Checked: PW | Approved: DK

Programme Title: BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.7 Topography and Geomorphology			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0103	Sheet Number: 3 of 4	Status: A	Rev: M01



- Legend :**
- Blanchardstown to City Centre Core Bus Corridor Scheme
 - - - 250m Study Area
 - EPA Contours
 - Subglacial Lination Landforms**
 - LANDFORM**
 - Crag-and-Tail
 - Mega scale glacial lination
 - Meltwater Landforms**
 - LANDFORM**
 - Meltwater channel
 - Deglacial Landforms**
 - Landform**
 - Glaciofluvial Terrace

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OS Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

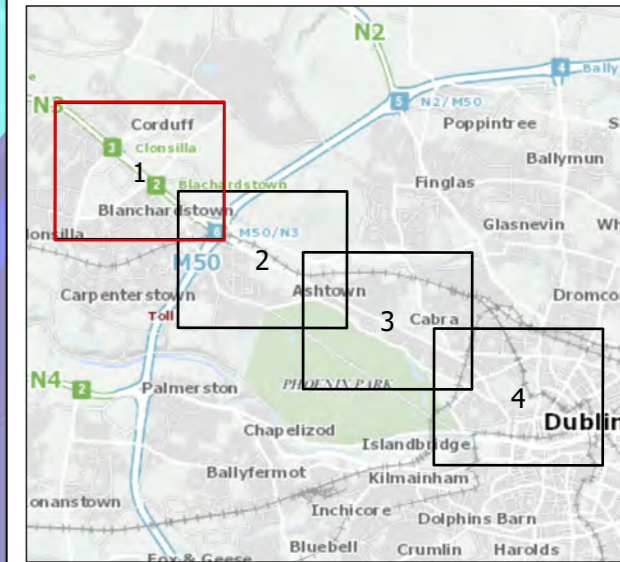
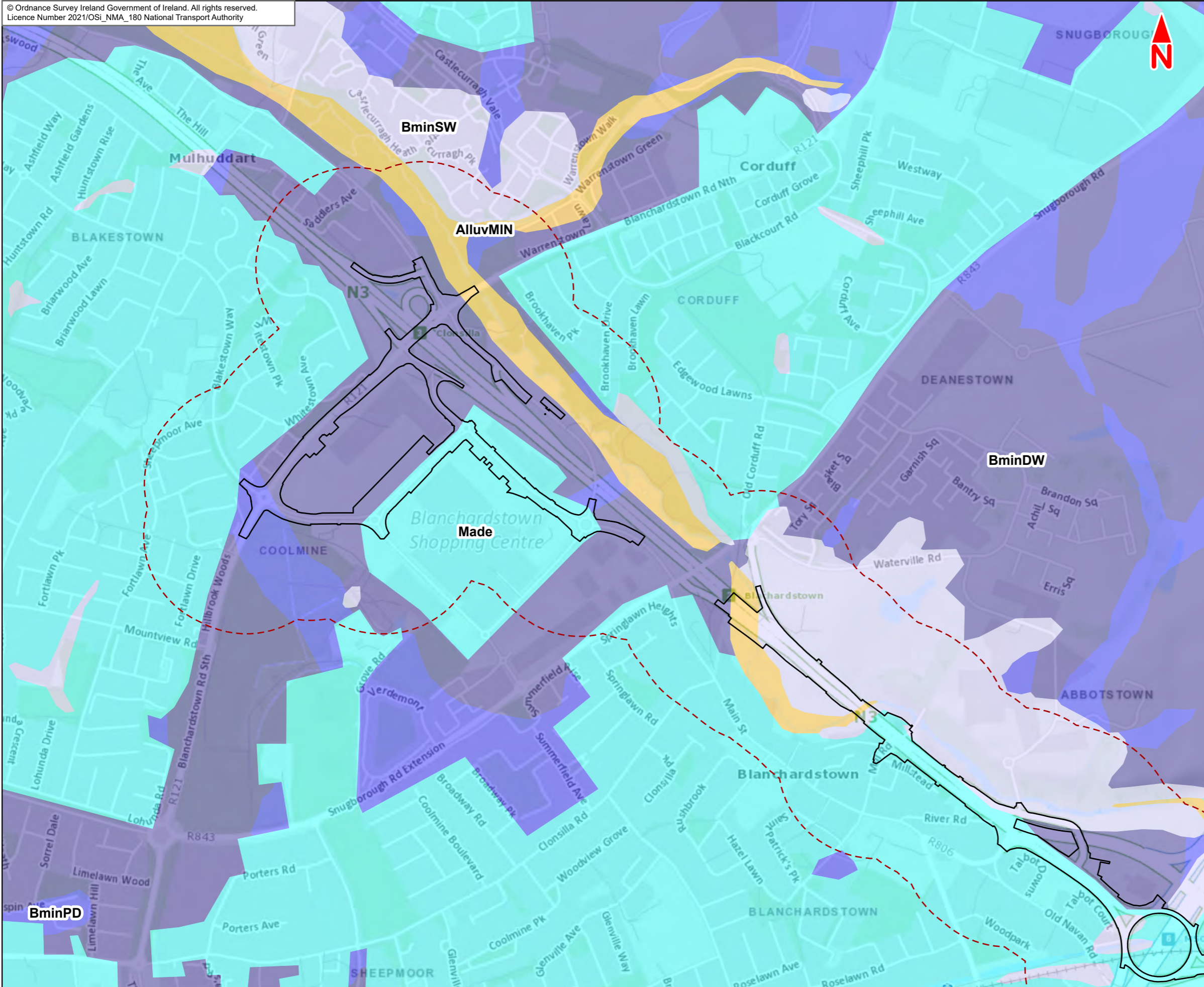
Date: 15/03/2022 | Scale @ A3: 1:10000
Project Code: BCIDE | Originator Code: JAC

Drawn: FG | Checked: PW | Approved: DK

Programme Title: BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.7 Topography and Geomorphology			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0104	Sheet Number: 4 of 4	Status: A	Rev: M01

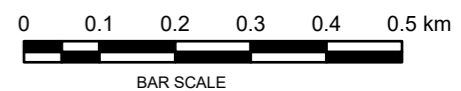
14.8
Soil Deposits





- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - Teagasc Soils**
 - AlluvMIN - Mineral alluvium
 - BminDW - Grey Brown Podzolics / Brown Earths Basic
 - BminPD - Surface water Gleys / Ground water Gleys Basic
 - BminSW - Renzinas / Lithosols
 - Made

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Malin Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

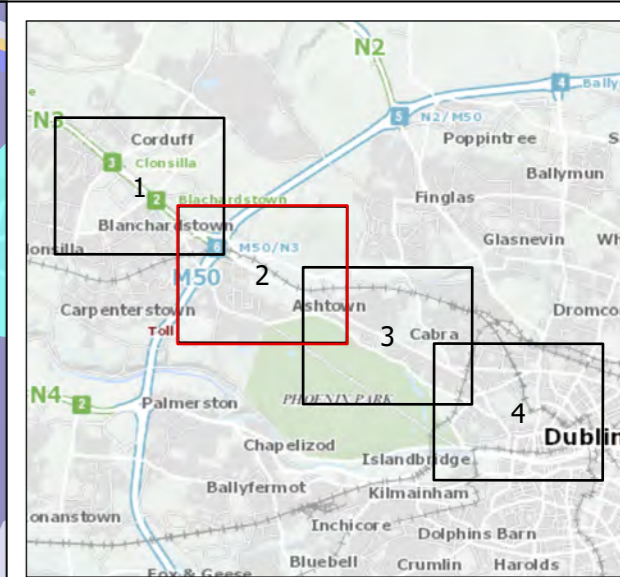
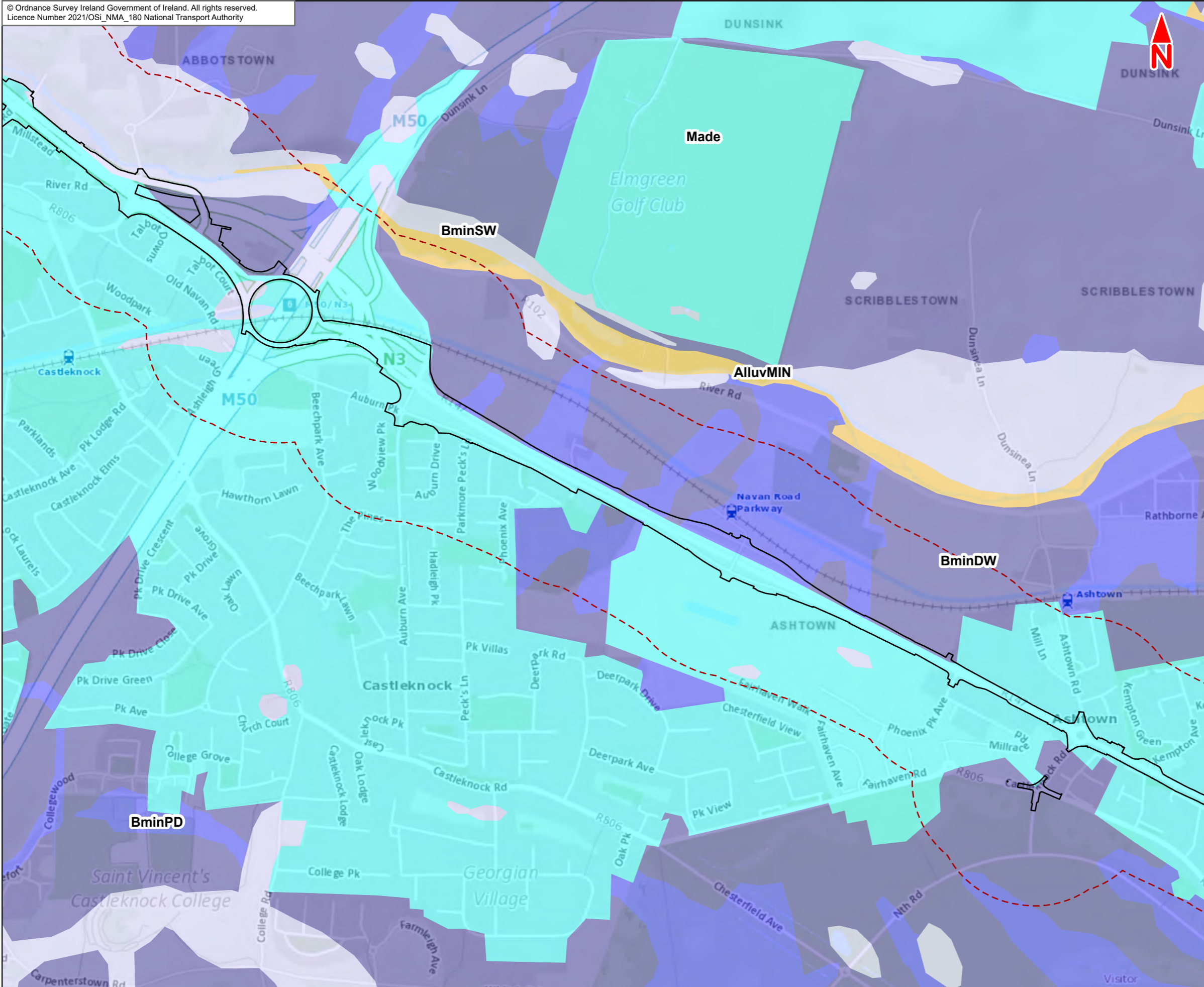
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Date	Scale @ A3	Drawn	Checked	Approved
15/03/2022	1:10000	FG	PW	DK
Project Code	Originator Code	QMS Code		
BCIDE	JAC			

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.8 Soil Deposits				
Drawing File Name	Sheet Number	Status	Rev	
BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0201	1 of 4	A	M01	



Legend :

- Blanchardstown to City Centre Scheme
- 250m Study Area

Teagasc Soils

- AlluvMIN - Mineral alluvium
- BminDW - Grey Brown Podzolics / Brown Earths Basic
- BminPD - Surface water Gleys / Ground water Gleys Basic
- BminSW - Renzinas / Lithosols
- Made

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer

a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.

b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.

c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.

Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

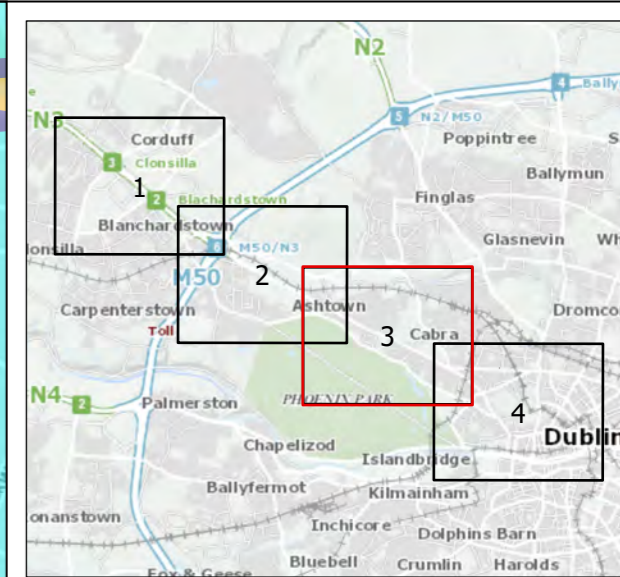
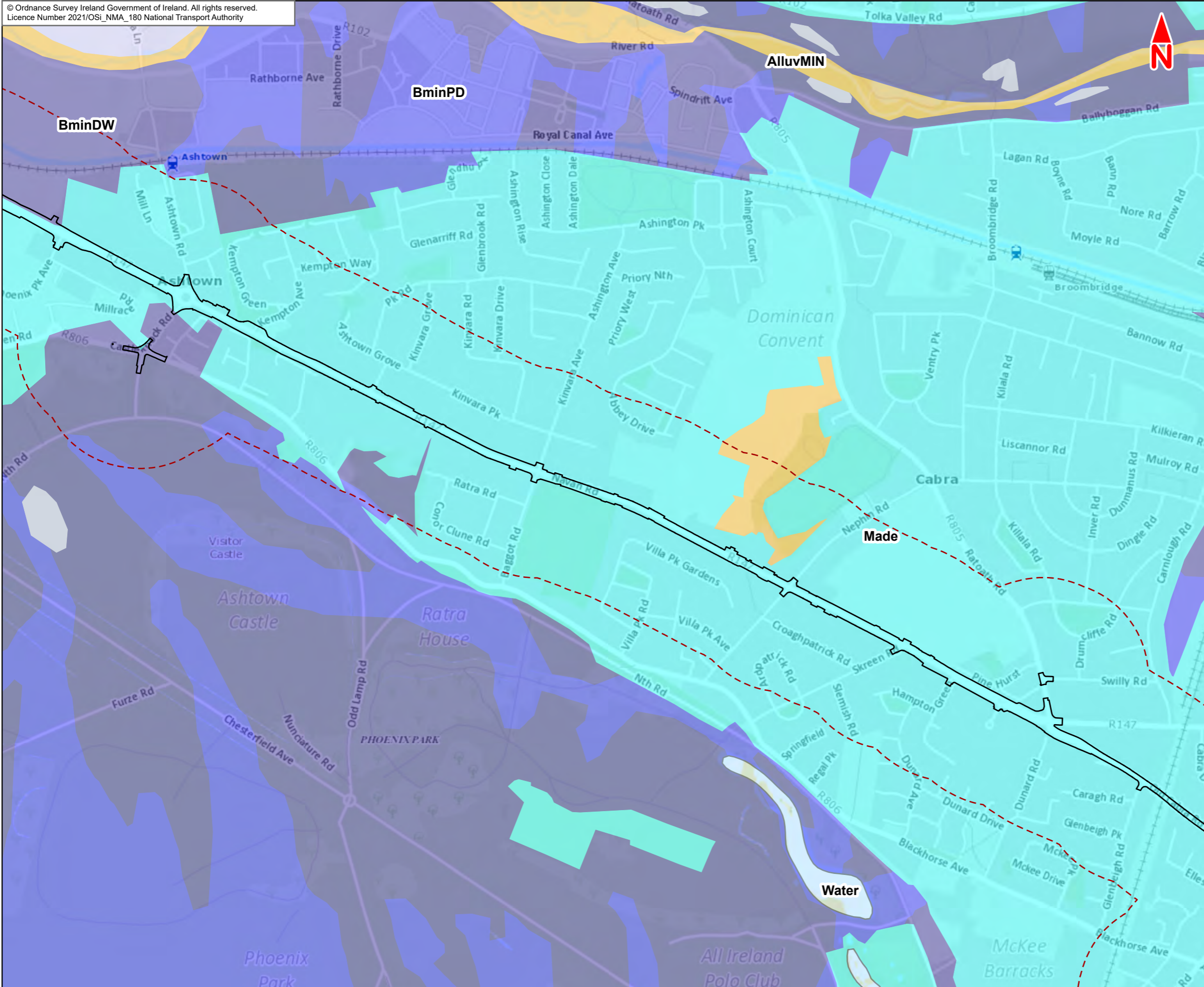
Date: 15/03/2022 | Scale @ A3: 1:10000

Project Code: BCIDE | Originator Code: JAC

Drawn: FG | Checked: PW | Approved: DK

QMS Code: _____

Programme Title: BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.8 Soil Deposits				
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0202	Sheet Number: 2 of 4	Status: A	Rev: M01	



Legend :

- Blanchardstown to City Centre Scheme
- 250m Study Area
- Teagasc Soils**
- AlluvMIN - Mineral alluvium
- BminDW - Grey Brown Podzolics / Brown Earths Basic
- BminPD - Surface water Gleys / Ground water Gleys Basic
- BminSW - Renzinas / Lithosols
- Made
- Water

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Malin Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

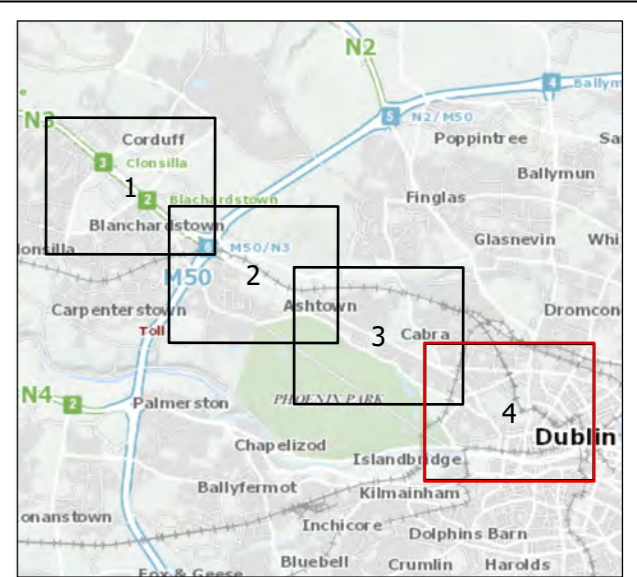
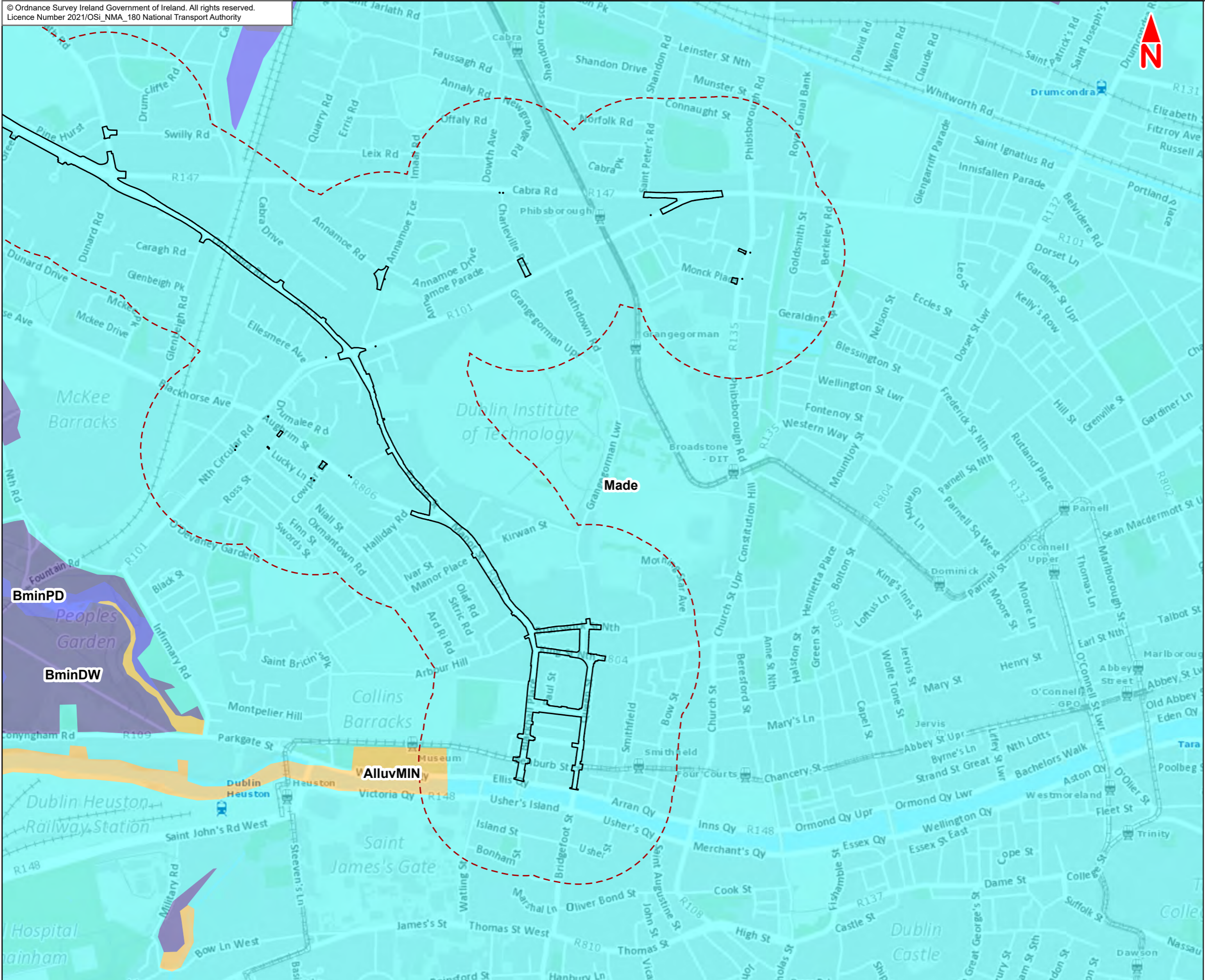
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Date	15/03/2022	Scale @ A3	1:10000	Drawn	FG
Project Code	BCIDE	Originator Code	JAC	Checked	PW
				Approved	DK

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS					
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.8 Soil Deposits					
Drawing File Name	BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0203	Sheet Number	3 of 4	Status	A
Rev	M01				



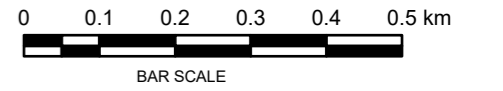
Legend :

- Blanchardstown to City Centre Scheme
- 250m Study Area

Teagasc Soils

- AlluvMIN - Mineral alluvium
- BminDW - Grey Brown Podzolics / Brown Earths Basic
- BminPD - Surface water Gleys / Ground water Gleys Basic
- Made

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing may not be reproduced, copied or otherwise used in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSi Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only, and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

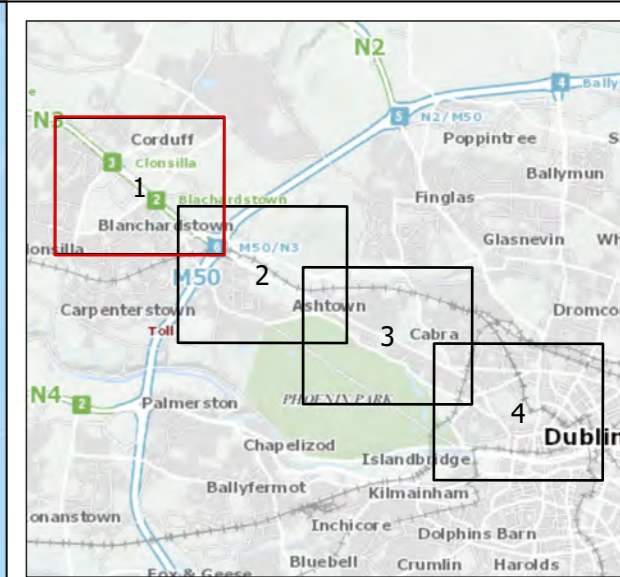
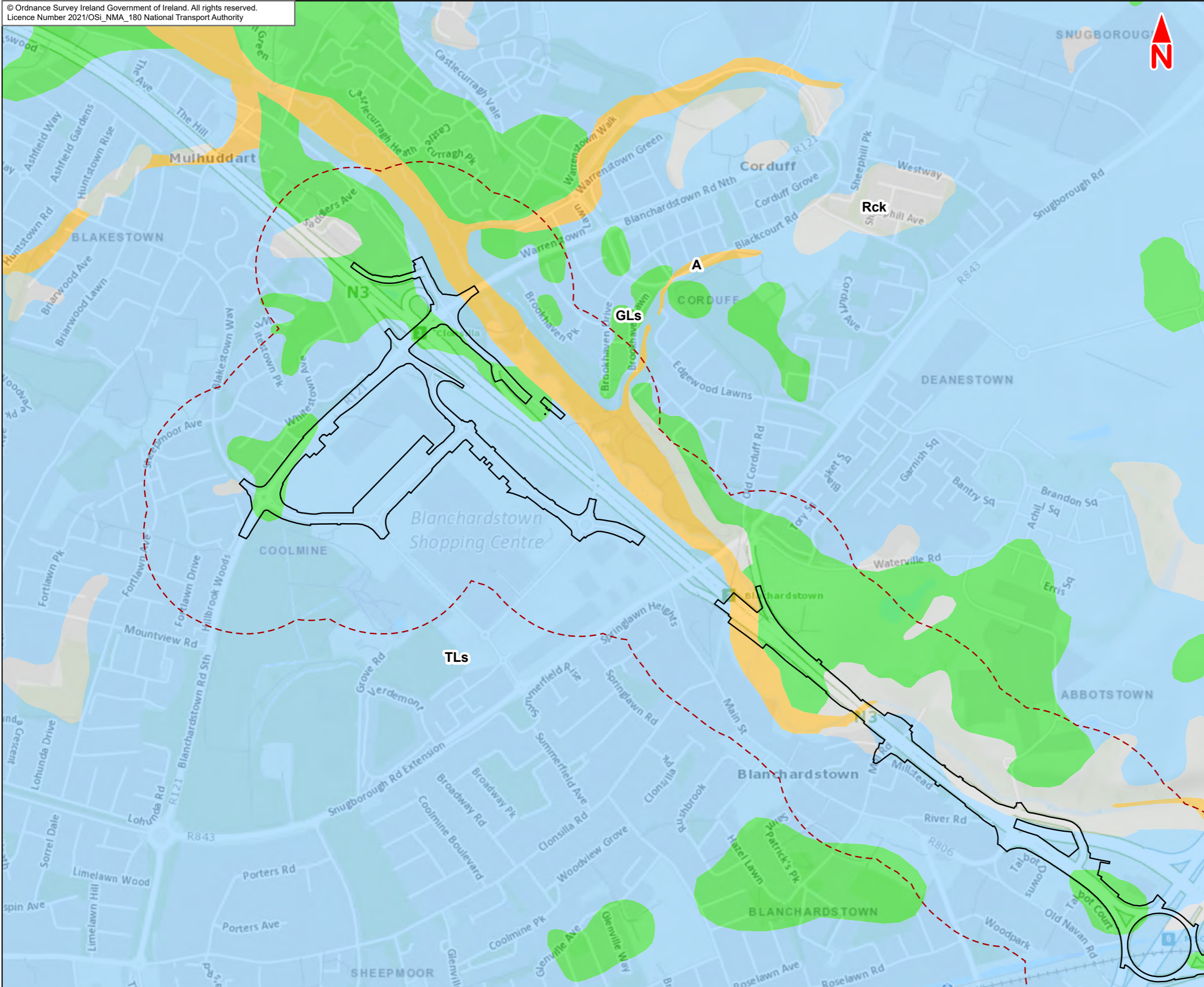
Date: 15/03/2022 | Scale @ A3: 1:10000
Project Code: BCIDE | Originator Code: JAC

Drawn: FG | Checked: PW | Approved: DK

Programme Title: BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.8 Soil Deposits			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0204	Sheet Number: 4 of 4	Status: A	Rev: M01

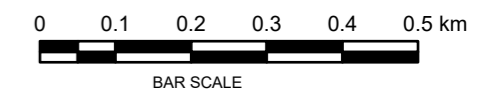
14.9
Subsoil Deposits





- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - 250m Study Area
 - A, Alluvium
 - GLs, Gravels derived from Limestones
 - Rck, Bedrock outcrop or subcrop
 - TLs, Till derived from limestones

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

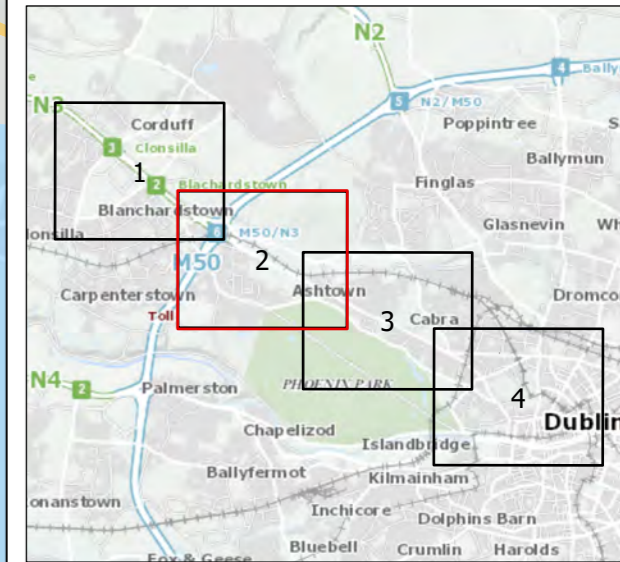
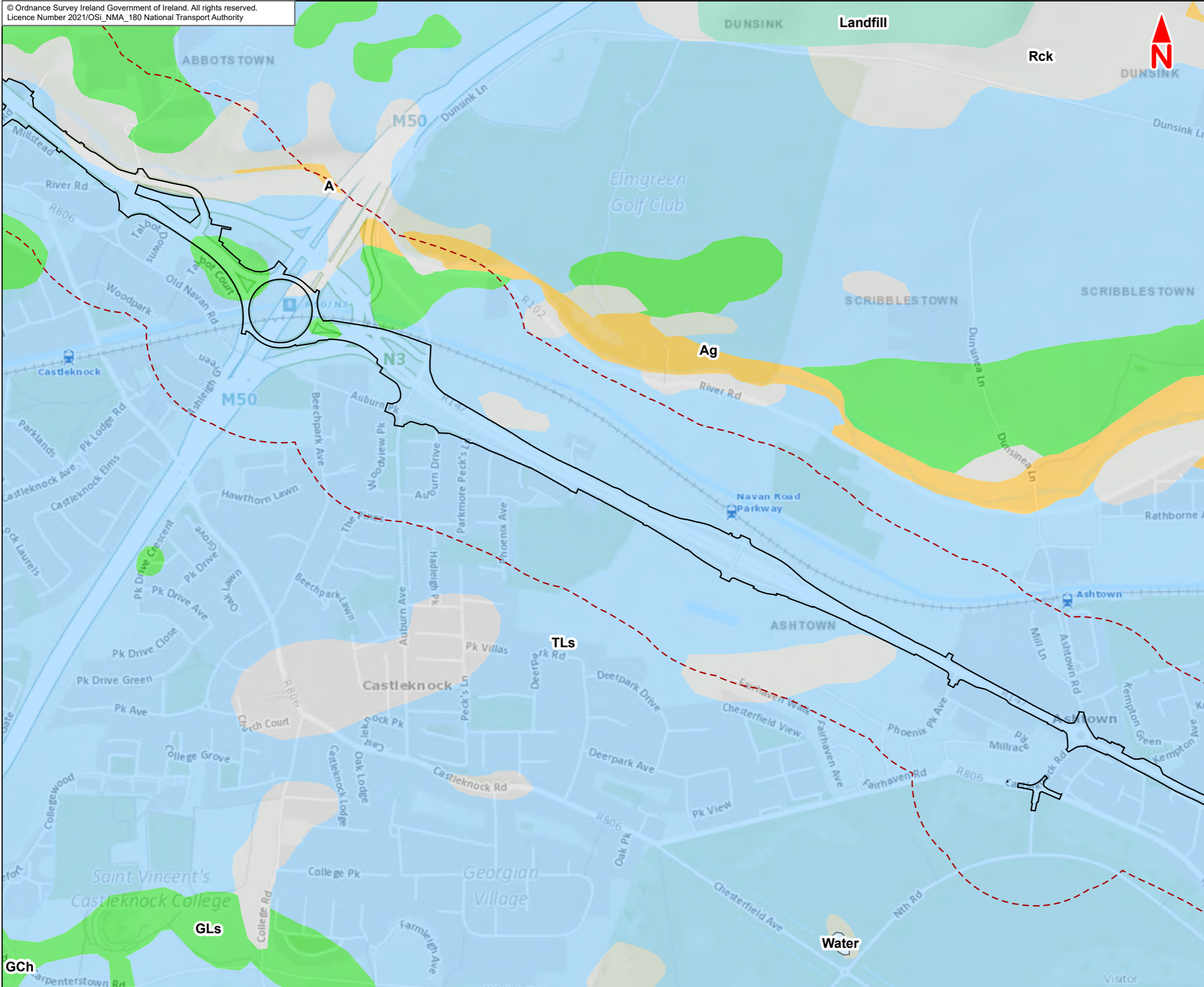
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

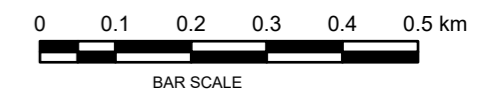
Client NTA Udarás Náisiúnta Iompair National Transport Authority		Consultant JACOBS ARUP SYSTRA		
Date 15/03/2022	Scale @ A3 1:10000	Drawn FG	Checked PW	Approved DK
Project Code BCIDE	Originator Code JAC	QMS Code		

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.9 Subsoil Deposits				
Drawing File Name BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0301	Sheet Number 1 of 4	Status A	Rev M01	



- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - 250m Study Area
 - Quaternary Sediments - 1:50,000**
 - A, Alluvium
 - Ag, Alluvium (gravelly)
 - GCh, Gravels derived from chert
 - GLs, Gravels derived from Limestones
 - Rck, Bedrock outcrop or subcrop
 - TLs, Till derived from limestones
 - Landfill
 - Water

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Malin Head. All Co-ordinates are in Irish Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

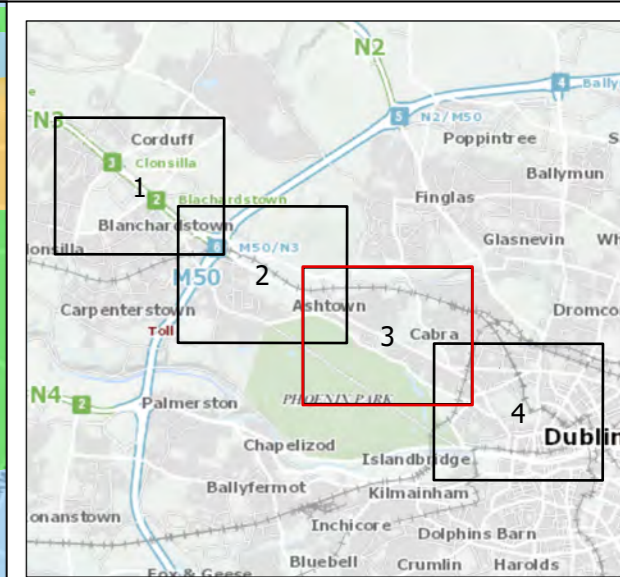
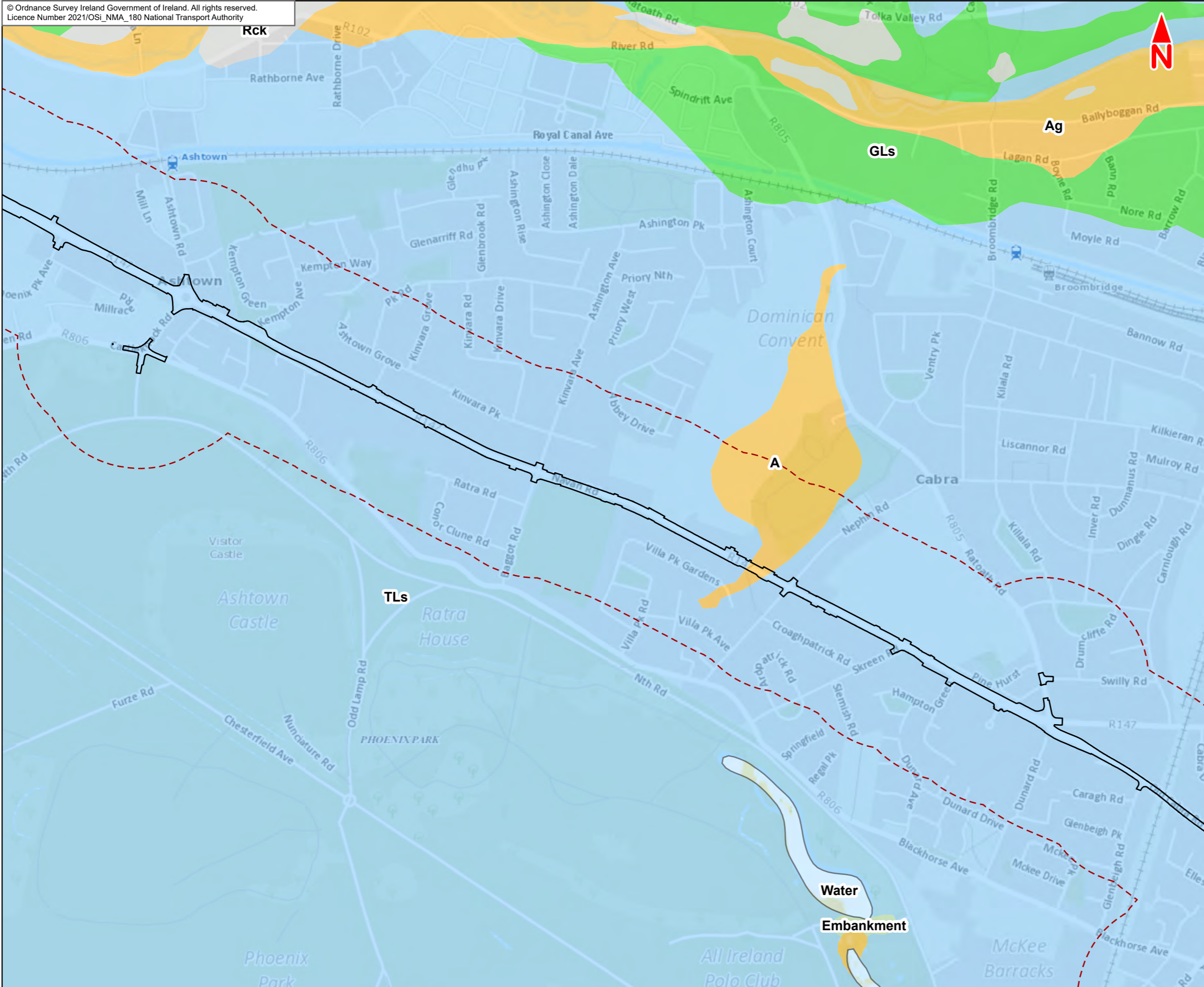
Consultant: **JACOBS ARUP SYSTRA**

Date: 15/03/2022 | Scale @ A3: 1:10000
Project Code: BCIDE | Originator Code: JAC

Drawn: FG | Checked: PW | Approved: DK

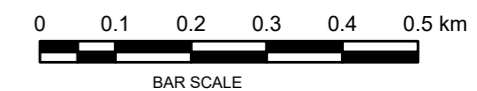
QMS Code: _____

Programme Title: BUSCONNECTS DUBLIN			
CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.9 Subsoil Deposits			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0302	Sheet Number: 2 of 4	Status: A	Rev: M01



- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - 250m Study Area
 - Quaternary Sediments - 1:50,000**
 - A, Alluvium
 - Ag, Alluvium (gravelly)
 - GLs, Gravels derived from Limestones
 - Rck, Bedrock outcrop or subcrop
 - TLs, Till derived from limestones
 - Embankment
 - Water

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

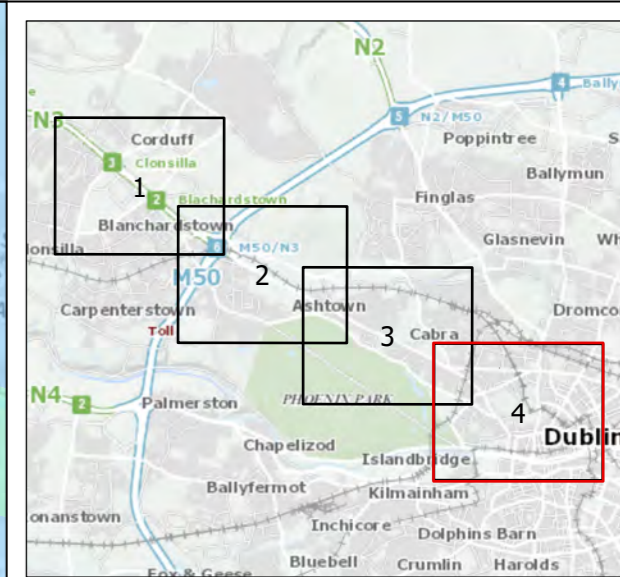
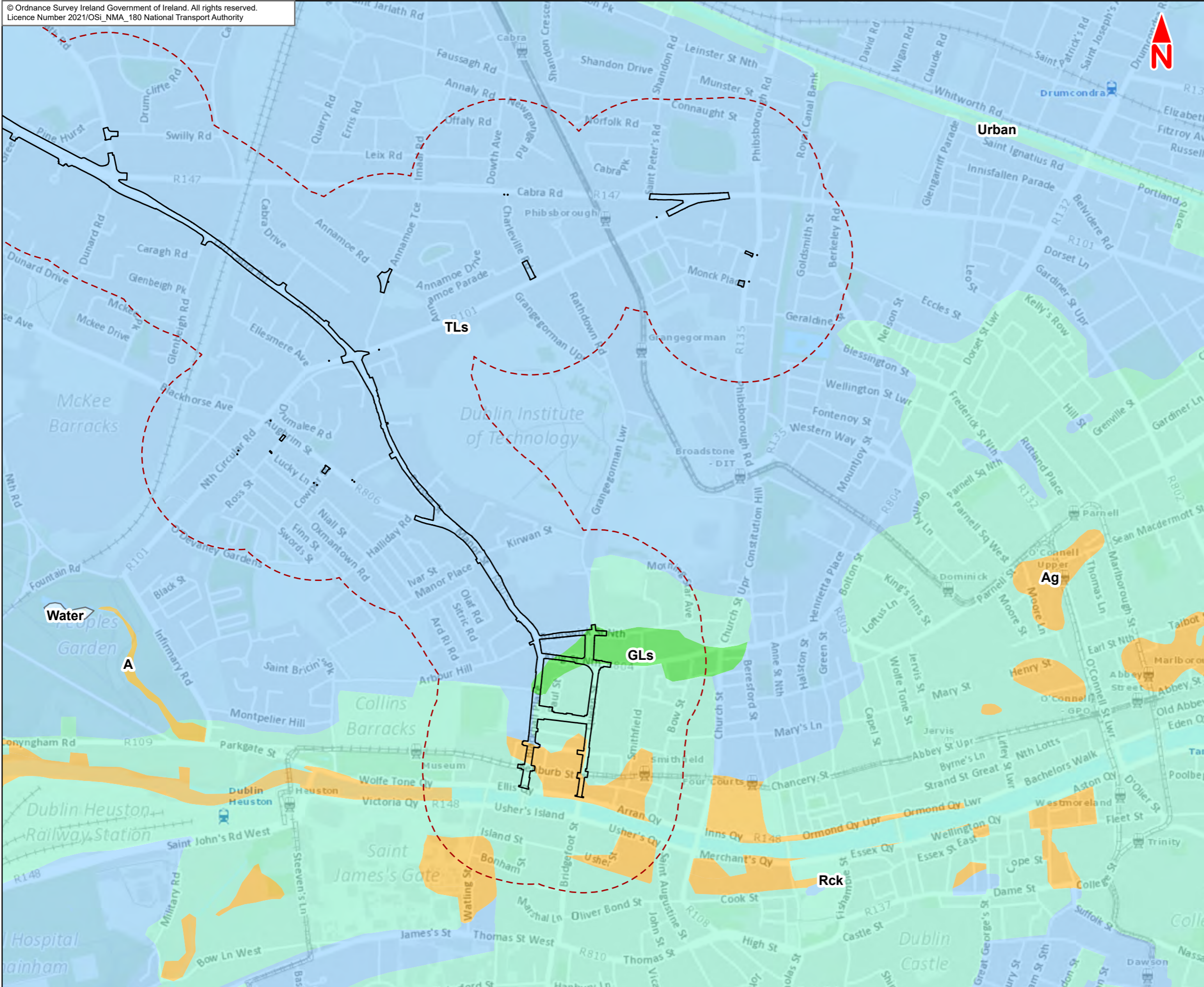
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

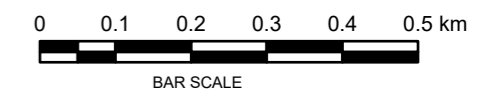
Client NTA Udarás Náisiúnta Iompair National Transport Authority		Consultant JACOBS ARUP SYSTRA		
Date 15/03/2022	Scale @ A3 1:10000	Drawn FG	Checked PW	Approved DK
Project Code BCIDE	Originator Code JAC	QMS Code		

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.9 Subsoil Deposits				
Drawing File Name BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0303	Sheet Number 3 of 4	Status A	Rev M01	



- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - - - 250m Study Area
 - Quaternary Sediments - 1:50,000
 - A, Alluvium
 - Ag, Alluvium (gravelly)
 - GLs, Gravels derived from Limestones
 - Rck, Bedrock outcrop or subcrop
 - TLs, Till derived from limestones
 - Urban
 - Water

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

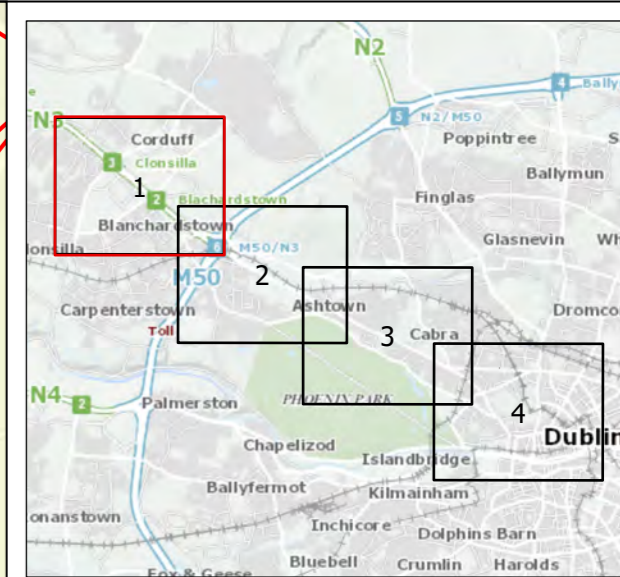
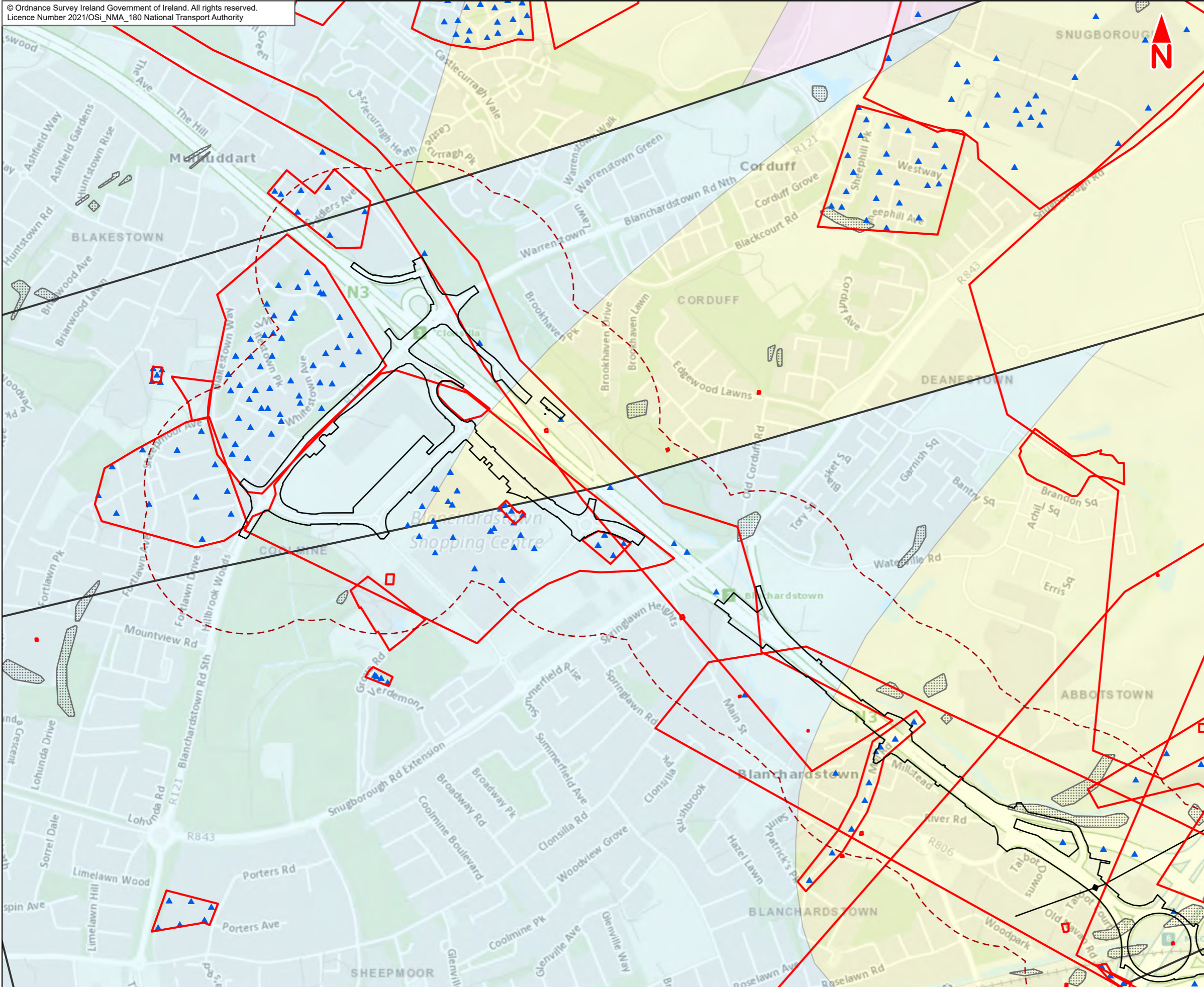
Consultant: **JACOBS ARUP SYSTRA**

Date: 15/03/2022 | Scale @ A3: 1:10000
 Drawn: FG | Checked: PW | Approved: DK
 Project Code: BCIDE | Originator Code: JAC | QMS Code:

Programme Title: BUSCONNECTS DUBLIN			
CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.9 Subsoil Deposits			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0304	Sheet Number: 4 of 4	Status: A	Rev: M01

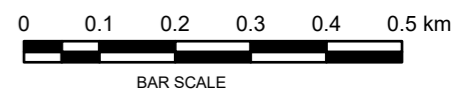
14.10
Bedrock Geology





- Legend :**
- Blanchardstown to City Centre Core Bus Corridor Scheme
 - 250m Study Area
 - GSI Geotechnical Sites
 - GSI Geotechnical Boreholes
 - Anticlinal Axis
 - Fault
 - GSI Bedrock Outcrop - 1:100,000**
 - GSI Bedrock Outcrop - 1:100,000
 - GSI Bedrock Geology - 1:100,000**
 - Lucan Formation
 - Tober Colleen Formation
 - Malahide Formation

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

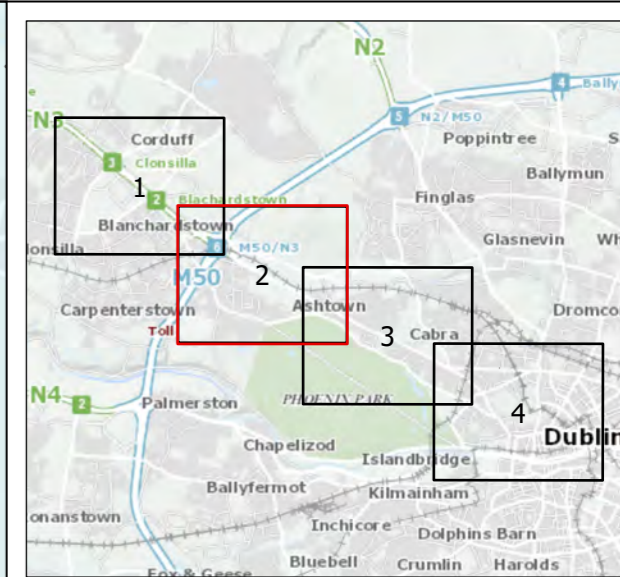
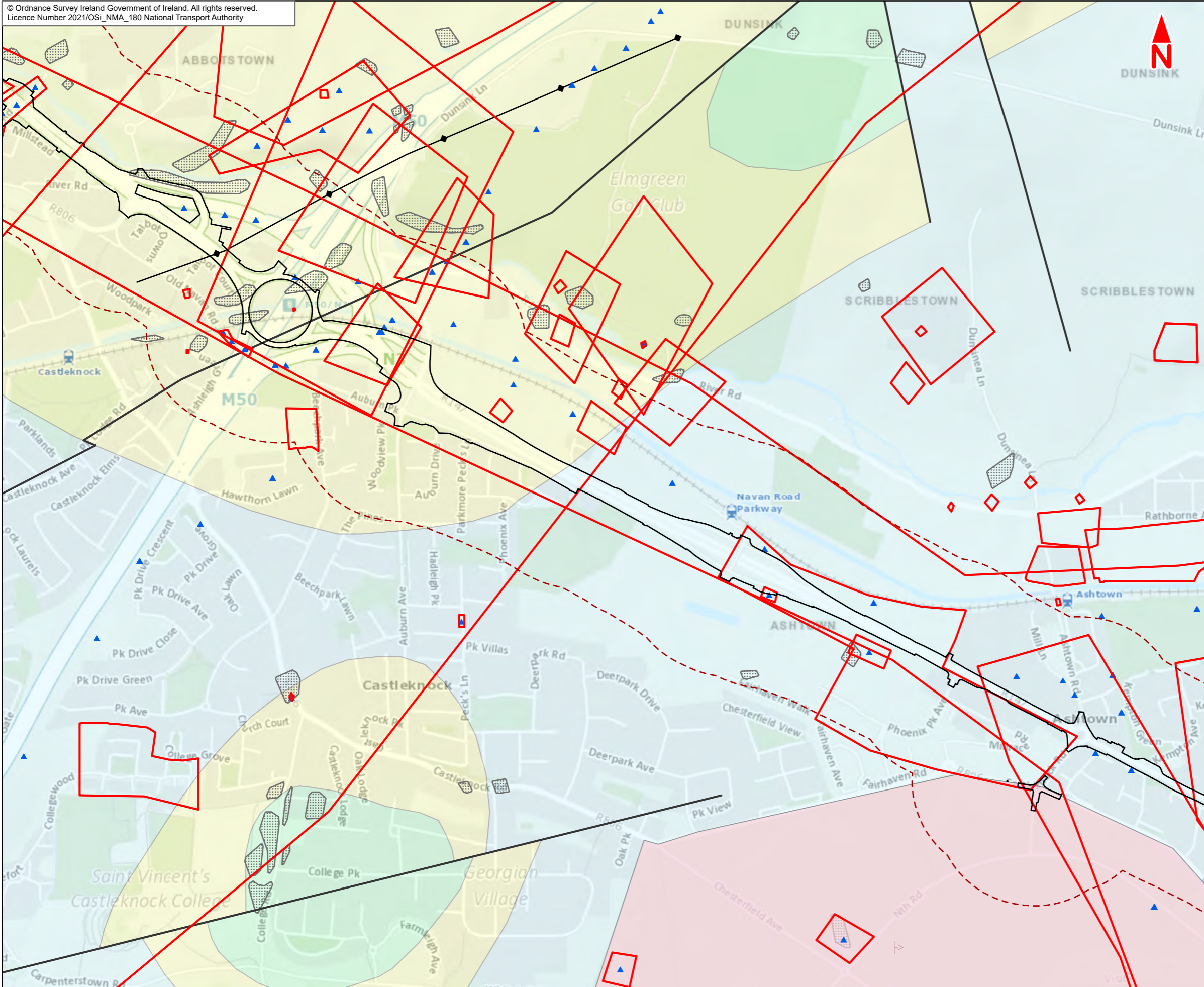
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

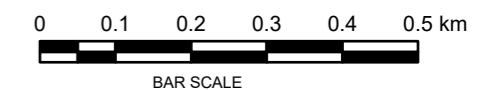
Client NTA Udarás Náisiúnta Iompair National Transport Authority		Consultant JACOBS ARUP SYSTRA		
Date 15/03/2022	Scale @ A3 1:10000	Drawn FG	Checked PW	Approved DK
Project Code BCIDE	Originator Code JAC	QMS Code		

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.10 Bedrock Geology				
Drawing File Name BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0401	Sheet Number 1 of 4	Status A	Rev M01	



- Legend :**
- Blanchardstown to City Centre Core Bus Corridor Scheme
 - - - 250m Study Area
 - GSI Geotechnical Sites
 - Geological Heritage Site
 - ▲ GSI Geotechnical Boreholes
- GSI Bedrock Structural Symbols - 1:100,000**
- ↖ Strike and dip of bedding, right way up
 - ◆ Anticlinal Axis
 - Fault
- GSI Bedrock Outcrop - 1:100,000**
- ▨ GSI Bedrock Outcrop - 1:100,000
- GSI Bedrock Geology - 1:100,000**
- Lucan Formation
 - Tober Colleen Formation
 - Waulsortian Limestones

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer

a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.

b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.

c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

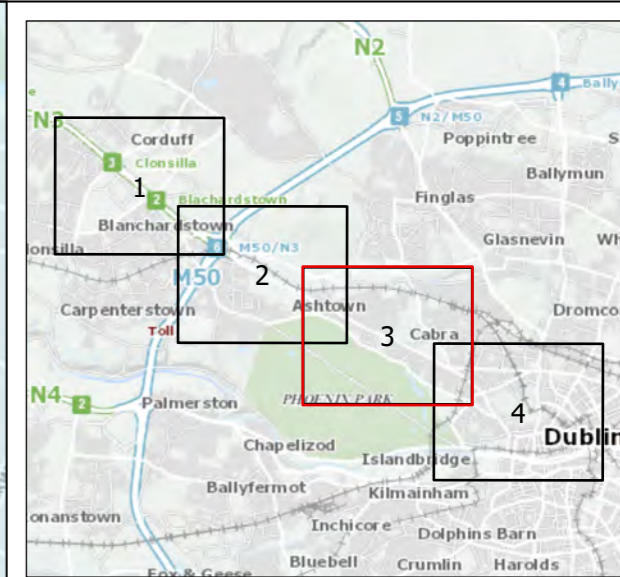
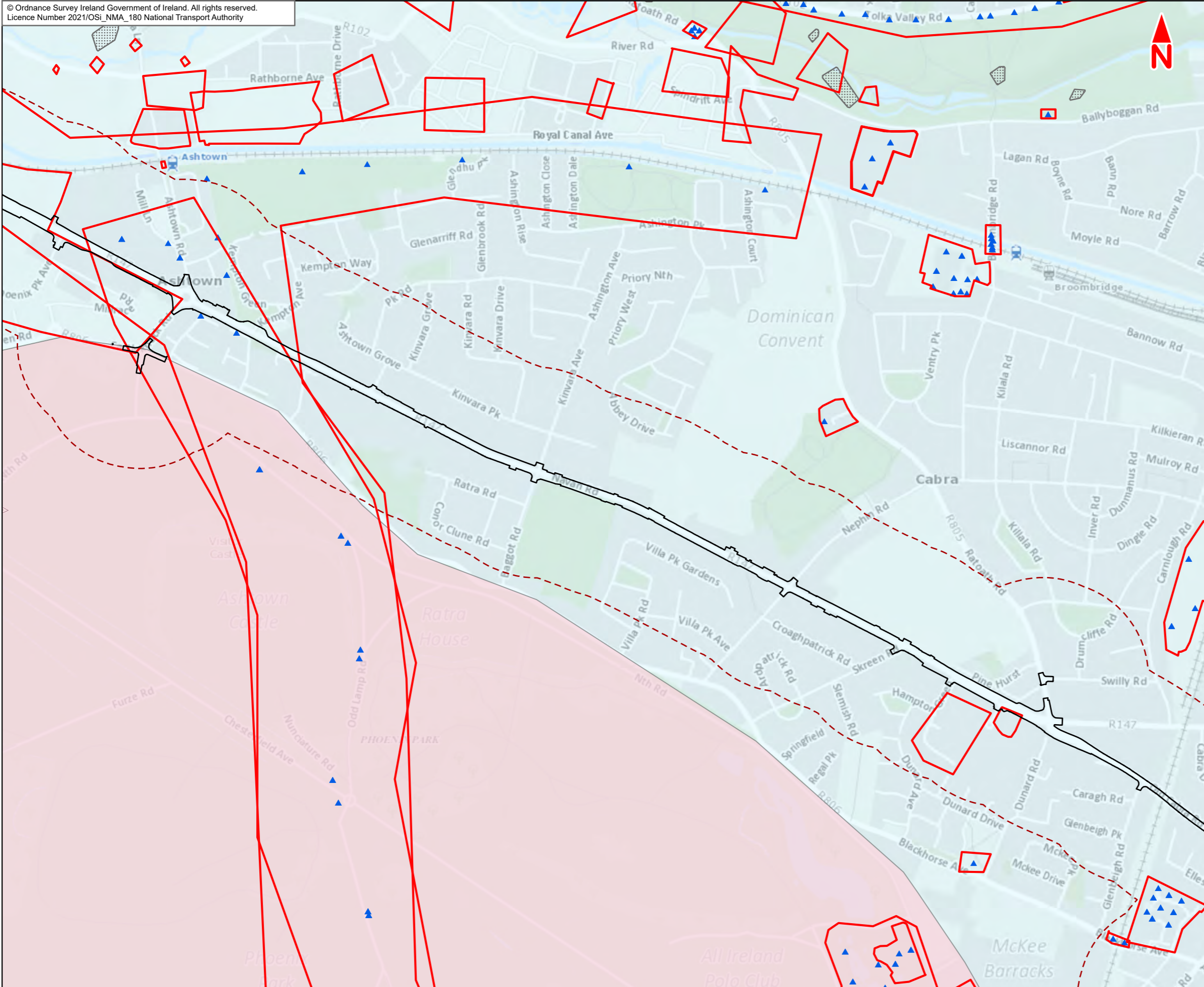
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

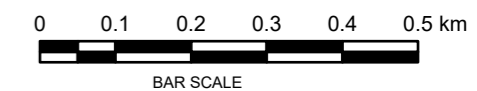
Client NTA Udarás Náisiúnta Iompair National Transport Authority		Consultant JACOBS ARUP SYSTRA		
Date 15/03/2022	Scale @ A3 1:10000	Drawn FG	Checked PW	Approved DK
Project Code BCIDE	Originator Code JAC	QMS Code		

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.10 Bedrock Geology				
Drawing File Name BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0402	Sheet Number 2 of 4	Status A	Rev M01	



- Legend :**
- Blanchardstown to City Centre Core Bus Corridor Scheme
 - 250m Study Area
 - GSI Geotechnical Sites
 - Geological Heritage Site
 - GSI Geotechnical Boreholes
 - GSI Bedrock Structural Symbols - 1:100,000**
 - Strike and dip of bedding, right way up
 - GSI Bedrock Outcrop - 1:100,000**
 - GSI Bedrock Outcrop - 1:100,000
 - GSI Bedrock Geology - 1:100,000**
 - Lucan Formation

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

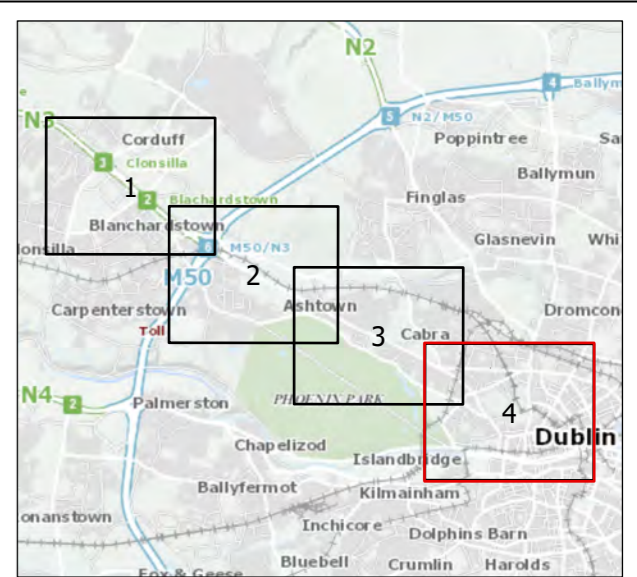
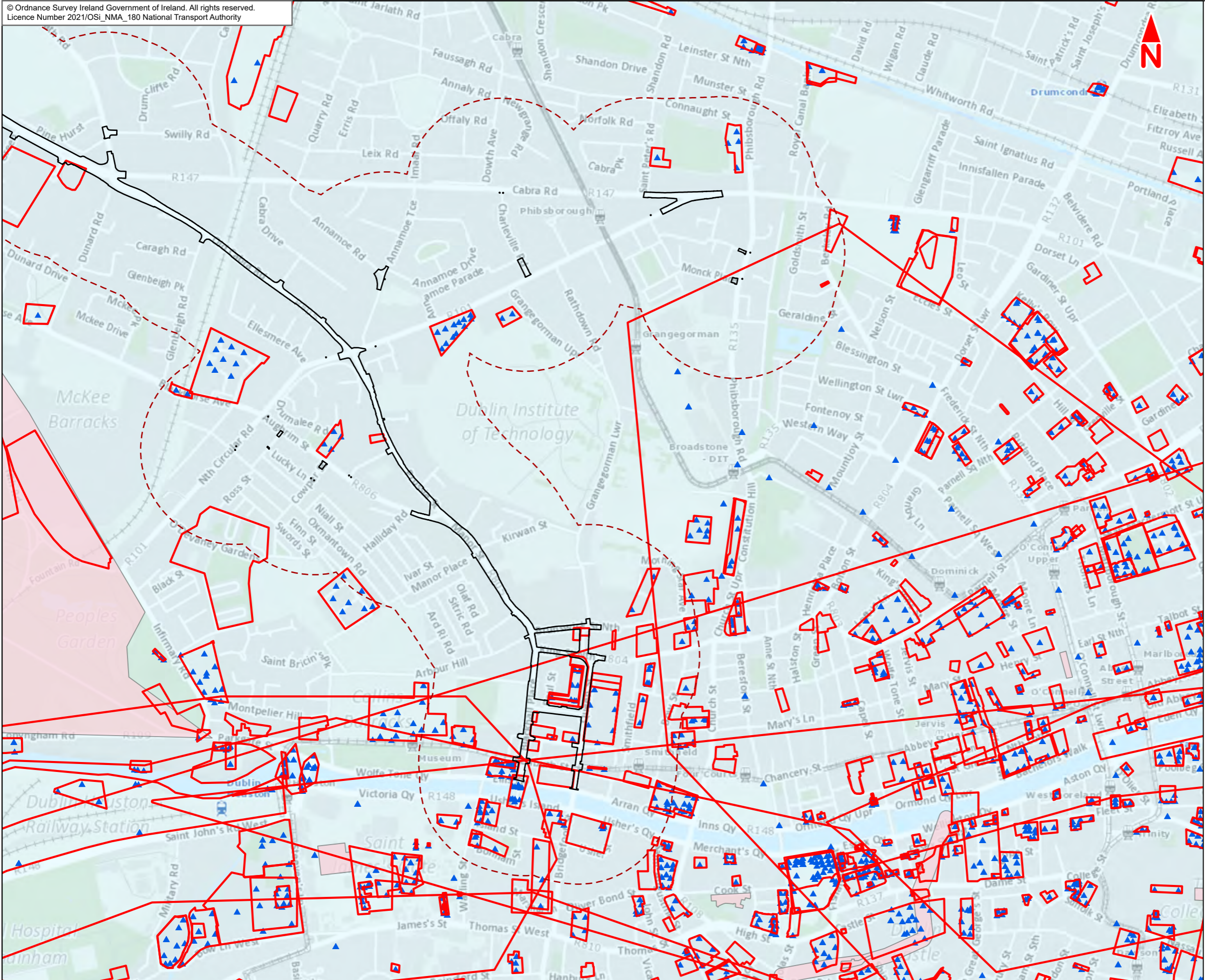
Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

Date: 15/03/2022 | Scale @ A3: 1:10000
Project Code: BCIDE | Originator Code: JAC

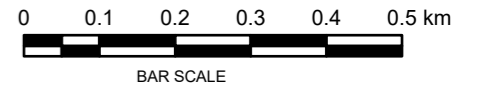
Drawn: FG | Checked: PW | Approved: DK

Programme Title: BUSCONNECTS DUBLIN			
CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.10 Bedrock Geology			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0403	Sheet Number: 3 of 4	Status: A	Rev: M01



- Legend :**
- Blanchardstown to City Centre Core Bus Corridor Scheme
 - 250m Study Area
 - GSI Geotechnical Sites
 - Geological Heritage Site
 - GSI Geotechnical Boreholes
- GSI Bedrock Geology - 1:100,000**
- Lucan Formation

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

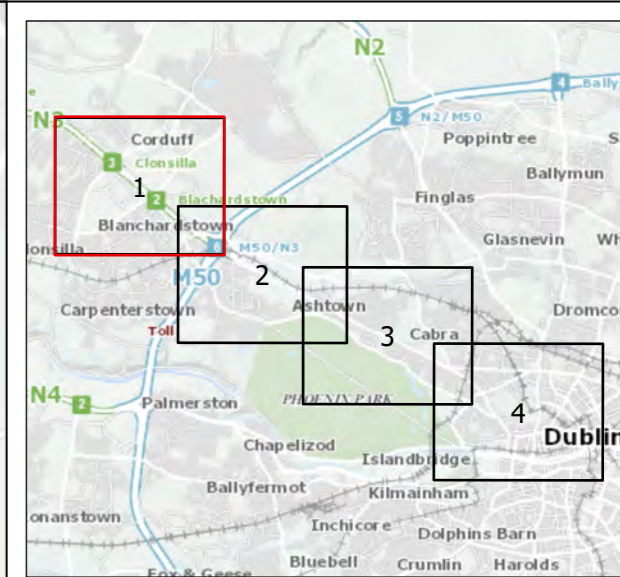
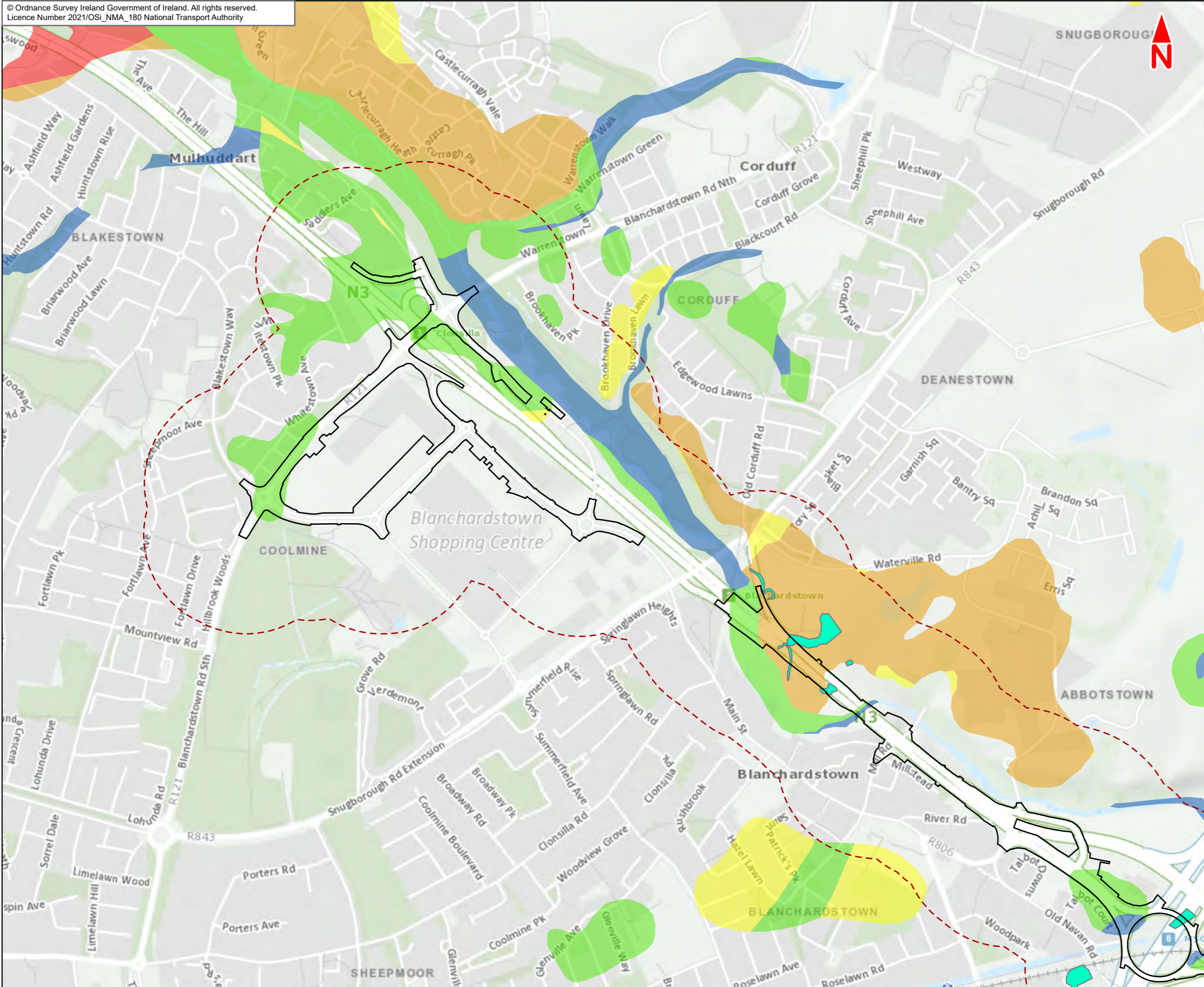
Consultant: **JACOBS ARUP SYSTRA**

Date: 15/03/2022 | Scale @ A3: 1:10000
Project Code: BCIDE | Originator Code: JAC
Drawn: FG | Checked: PW | Approved: DK

Programme Title: BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.10 Bedrock Geology			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0404	Sheet Number: 4 of 4	Status: A	Rev: M01

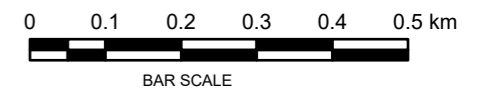


14.11
Granular Aggregate Potential



- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - Pits and Quarries Areas
 - GSI Aggregate Potential Mapping - Granular Aggregate Potential**
 - Very high potential
 - High potential
 - Moderate potential
 - Low potential
 - Very low potential

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

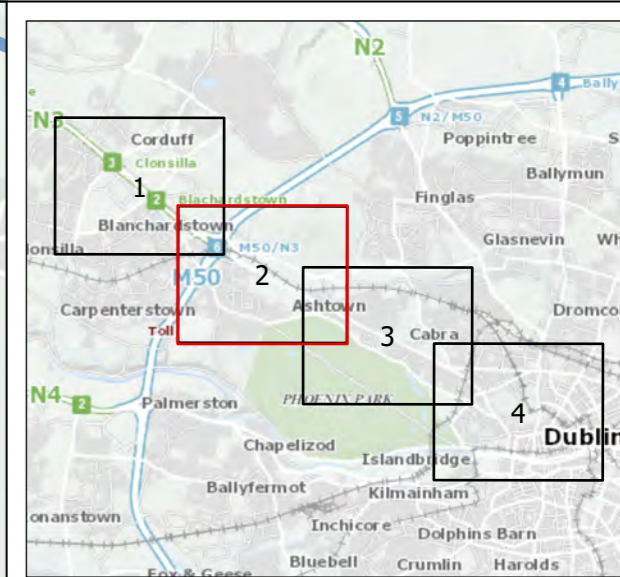
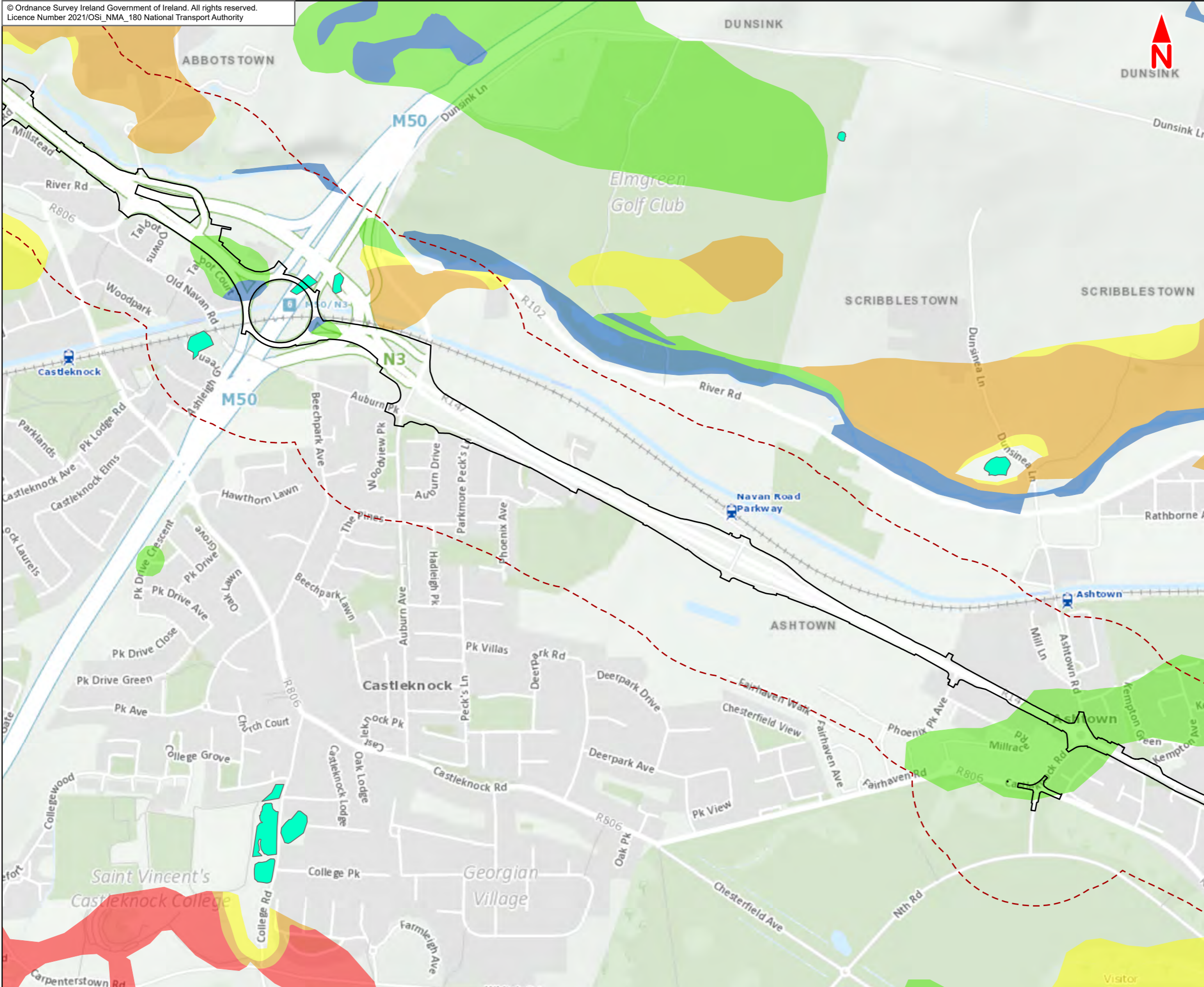
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

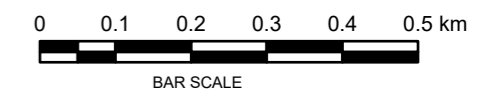
Date	Scale @ A3	Drawn	Checked	Approved
15/03/2022	1:10000	FG	PW	DK
Project Code	Originator Code	QMS Code		
BCIDE	JAC			

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.11 Granular Aggregate Potential				
Drawing File Name	Sheet Number	Status	Rev	
BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0501	1 of 4	A	M01	



- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - Pits and Quarries Areas
 - GSI Aggregate Potential Mapping - Granular Aggregate Potential**
 - Very high potential
 - High potential
 - Moderate potential
 - Low potential
 - Very low potential

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSi Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSi active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

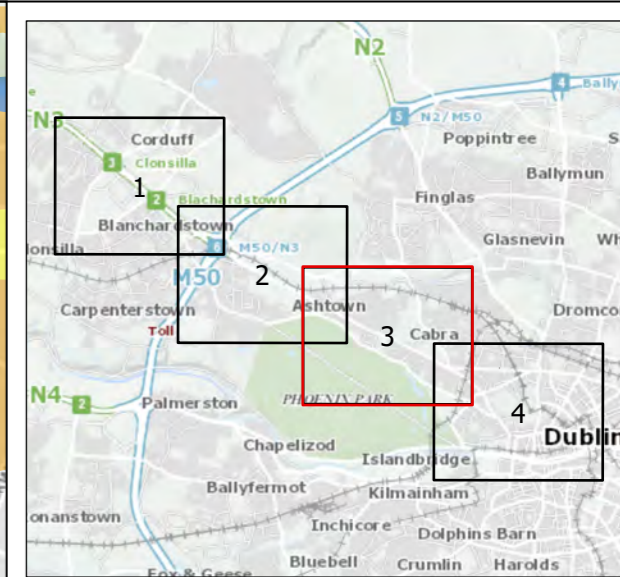
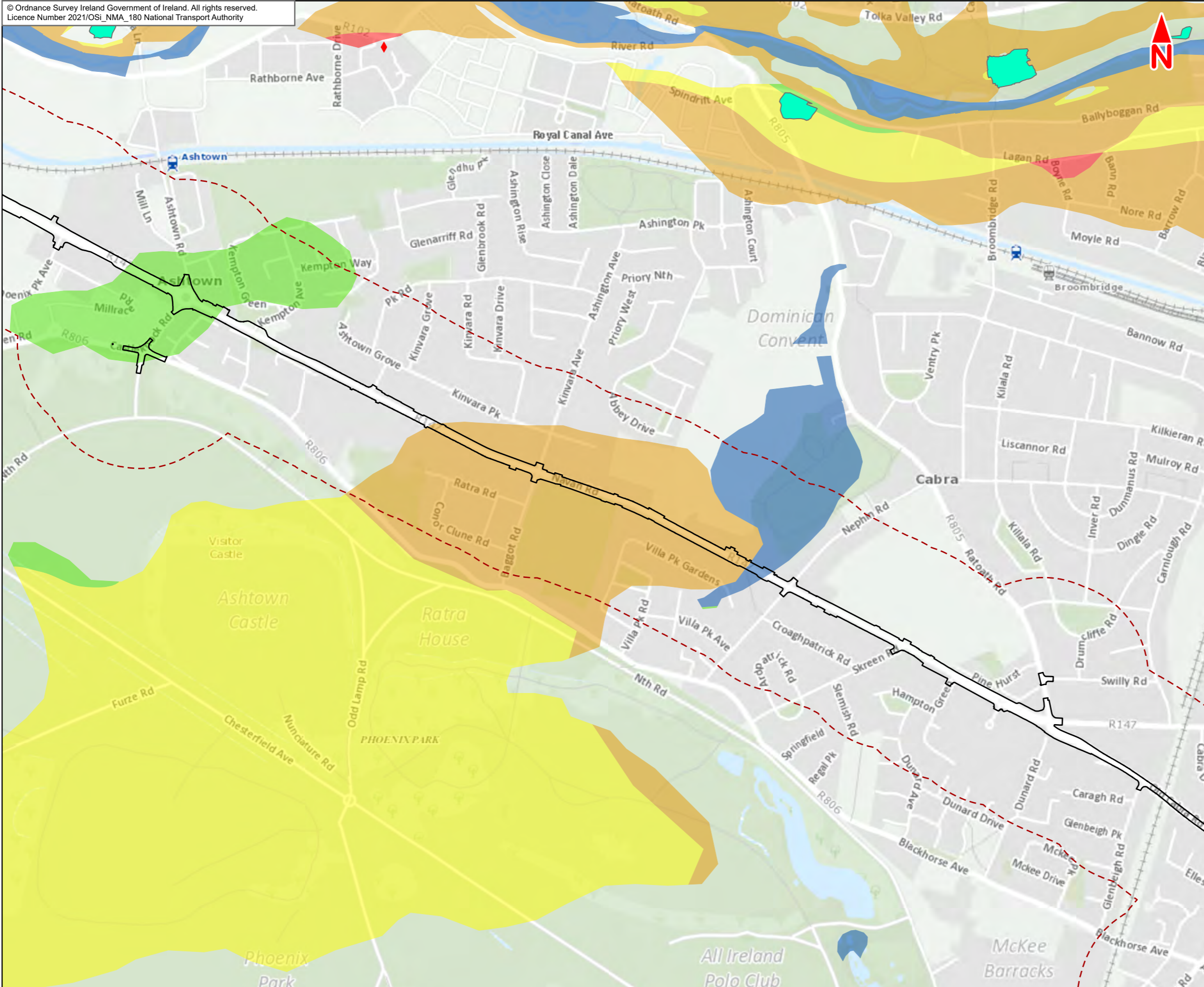
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

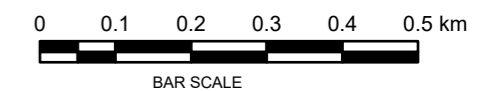
Client NTA Udarás Náisiúnta Iompair National Transport Authority		Consultant JACOBS ARUP SYSTRA		
Date 15/03/2022	Scale @ A3 1:10000	Drawn FG	Checked PW	Approved DK
Project Code BCIDE	Originator Code JAC	QMS Code		

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.11 Granular Aggregate Potential				
Drawing File Name BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0502	Sheet Number 2 of 4	Status A	Rev M01	



- Legend :**
- Blanchardstown to City Centre Scheme
 - - - 250m Study Area
 - Mineral Locations**
 - ◆ Non-metallic
 - Pits and Quarries Areas
 - GSI Aggregate Potential Mapping - Granular Aggregate Potential**
 - Very high potential
 - High potential
 - Moderate potential
 - Low potential
 - Very low potential

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

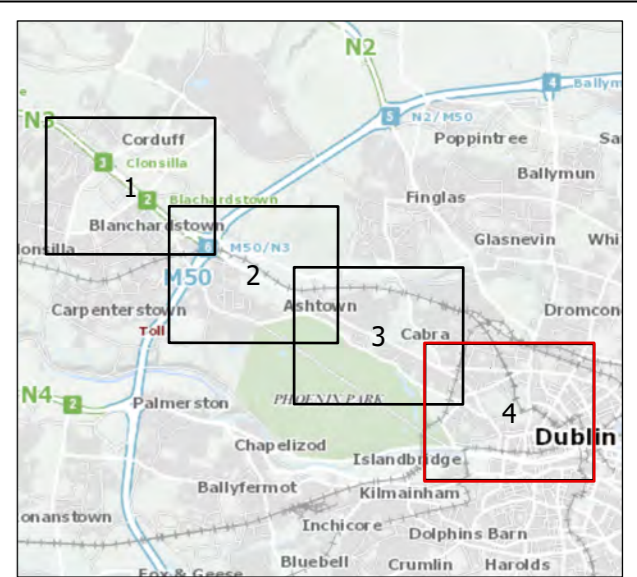
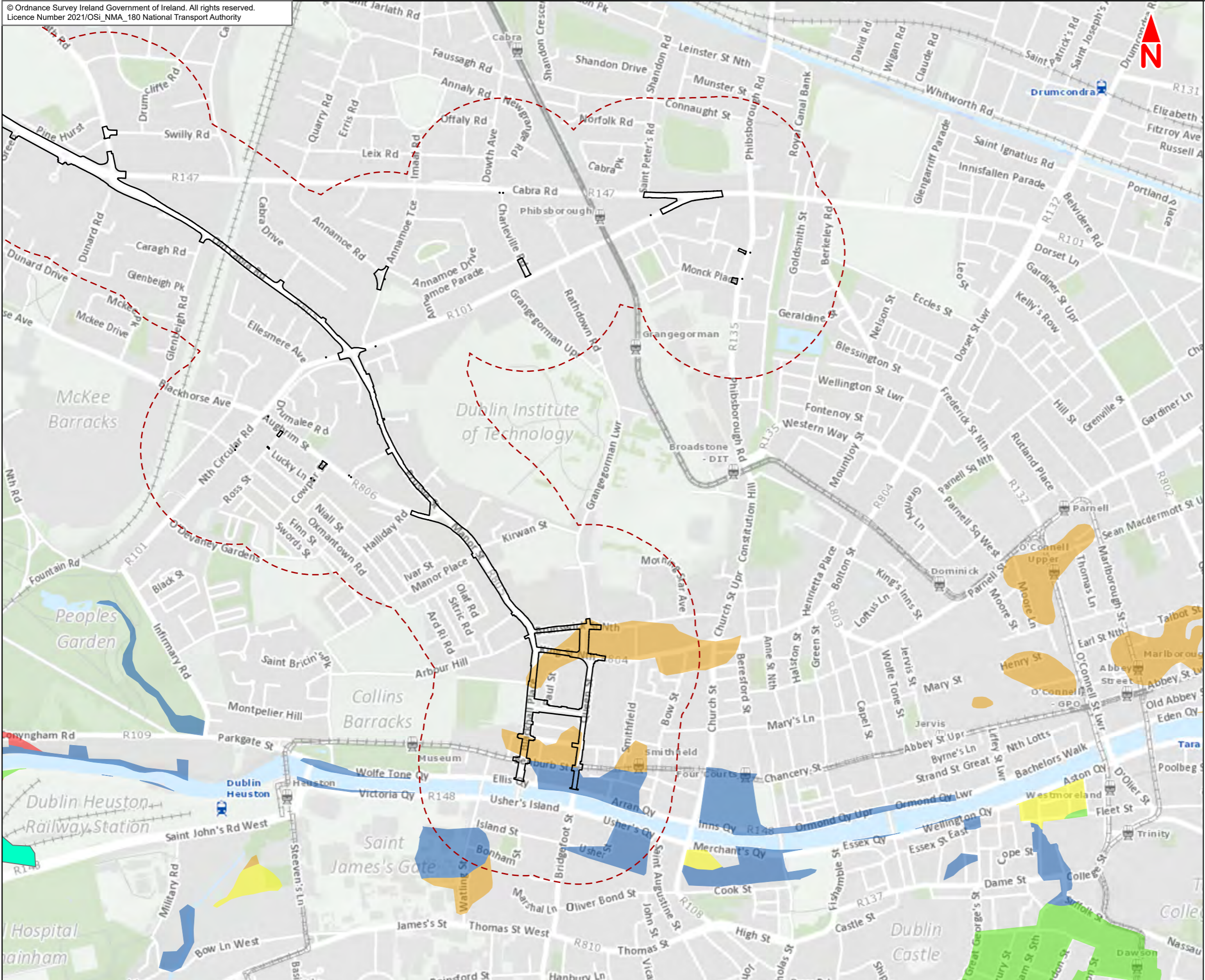
Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

Date: 15/03/2022 | Scale @ A3: 1:10000
Project Code: BCIDE | Originator Code: JAC

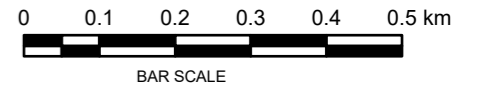
Drawn: FG | Checked: PW | Approved: DK
QMS Code: _____

Programme Title: BUSCONNECTS DUBLIN			
CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.11 Granular Aggregate Potential			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0503	Sheet Number: 3 of 4	Status: A	Rev: M01



- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - Pits and Quarries Areas
 - GSI Aggregate Potential Mapping - Granular Aggregate Potential**
 - Very high potential
 - High potential
 - Moderate potential
 - Low potential
 - Very low potential

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing may not be copied, reproduced, stored in a retrieval system, or transmitted in any form or by any means, electronic, mechanical, photocopying, recording, or otherwise, without the prior written permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

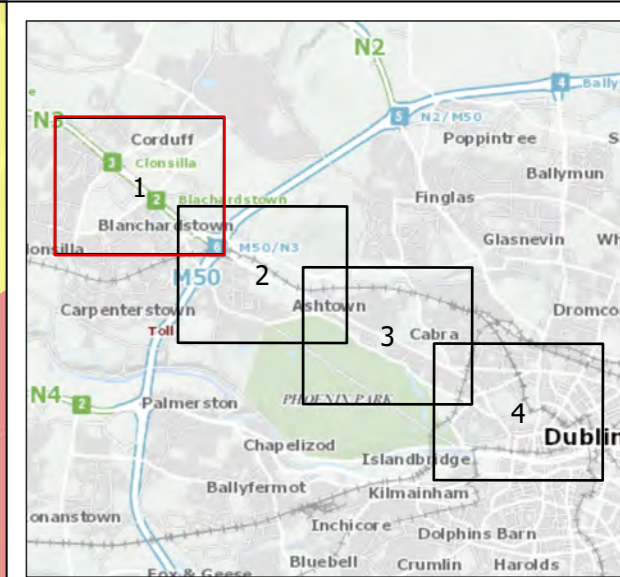
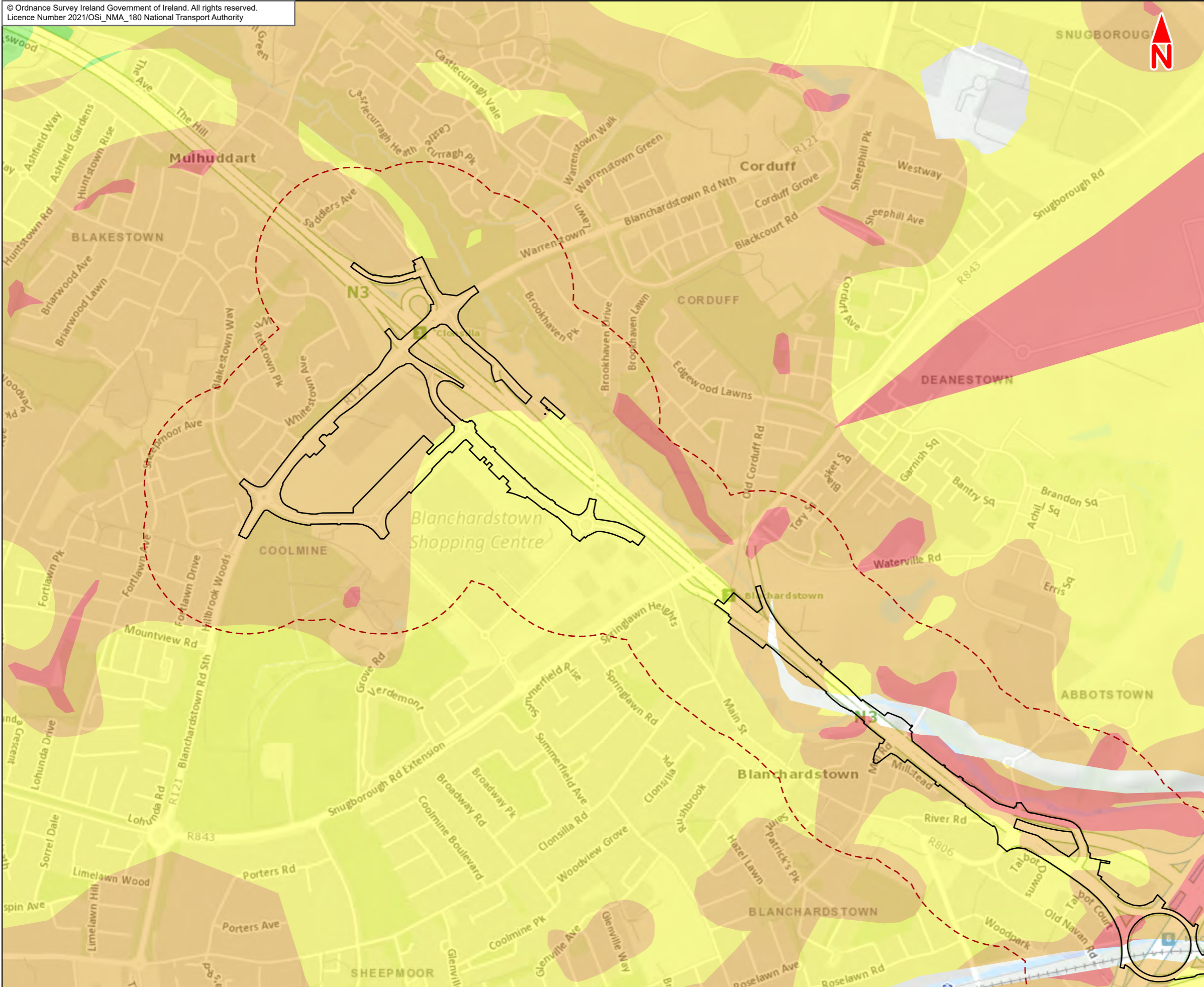
Date: 15/03/2022 | Scale @ A3: 1:10000
Project Code: BCIDE | Originator Code: JAC

Drawn: FG | Checked: PW | Approved: DK

Programme Title: BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.11 Granular Aggregate Potential			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0504	Sheet Number: 4 of 4	Status: A	Rev: M01

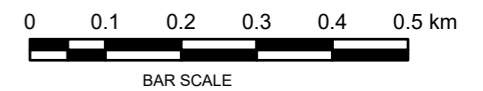
14.12
Crushed Rock
Aggregate Potential





- Legend :**
- Blanchardstown to City Centre Scheme
 - - - 250m Study Area
 - GSI Aggregate Potential Mapping - Crushed Rock Aggregate Potential**
 - Very high potential
 - High potential
 - Moderate potential
 - Low potential

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Malin Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

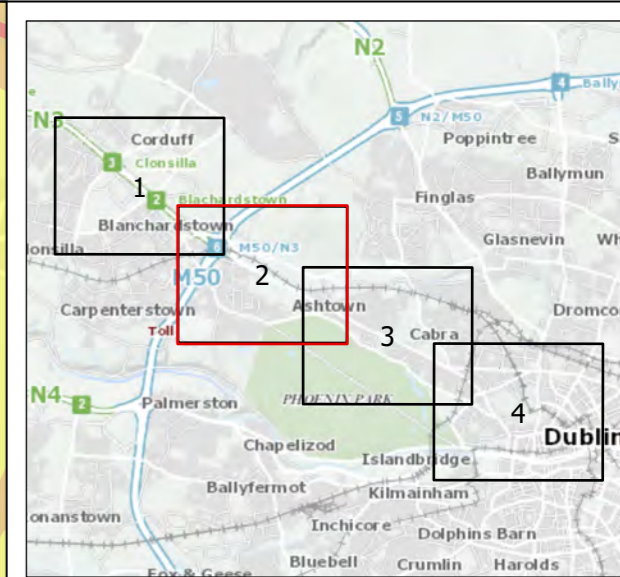
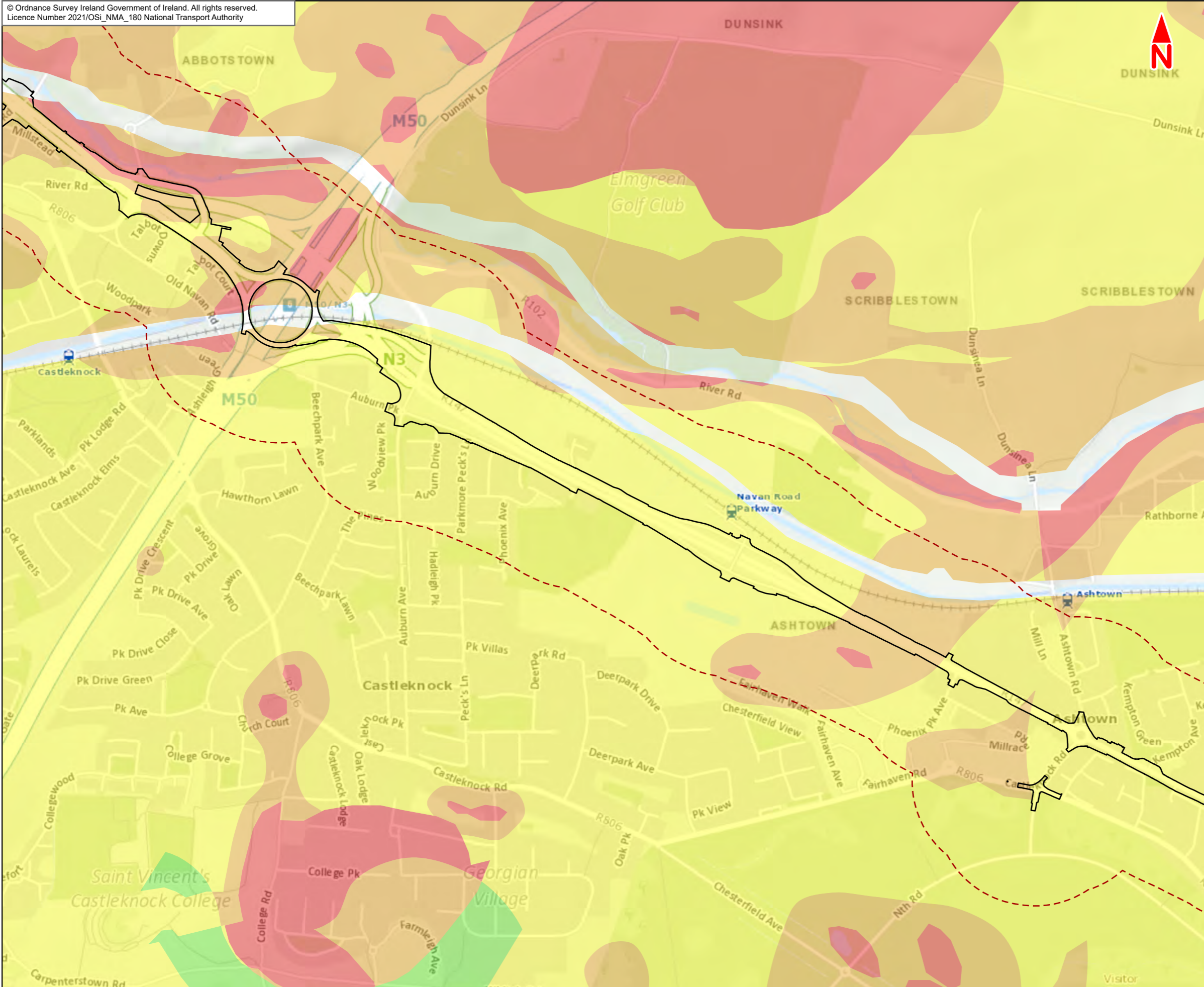
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

NTA Udarás Náisiúnta Iompair National Transport Authority		JACOBS ARUP SYSTRA		
Date	Scale @ A3	Drawn	Checked	Approved
15/03/2022	1:10000	FG	PW	DK
Project Code	Originator Code	QMS Code		
BCIDE	JAC			

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.12 Crushed Rock Aggregate Potential				
Drawing File Name	Sheet Number	Status	Rev	
BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0601	1 of 4	A	M01	



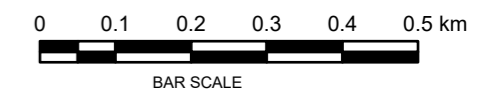
Legend :

- Blanchardstown to City Centre Scheme
- 250m Study Area

GSI Aggregate Potential Mapping - Crushed Rock Aggregate Potential

- Very high potential
- High potential
- Moderate potential
- Low potential

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer

a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.

b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.

c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.

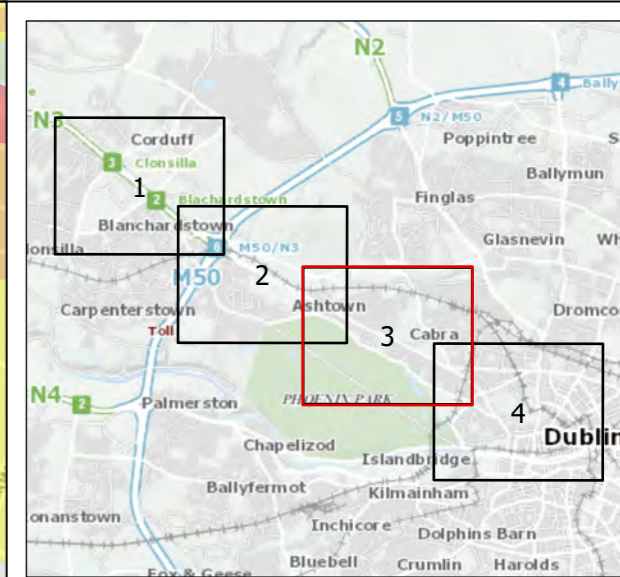
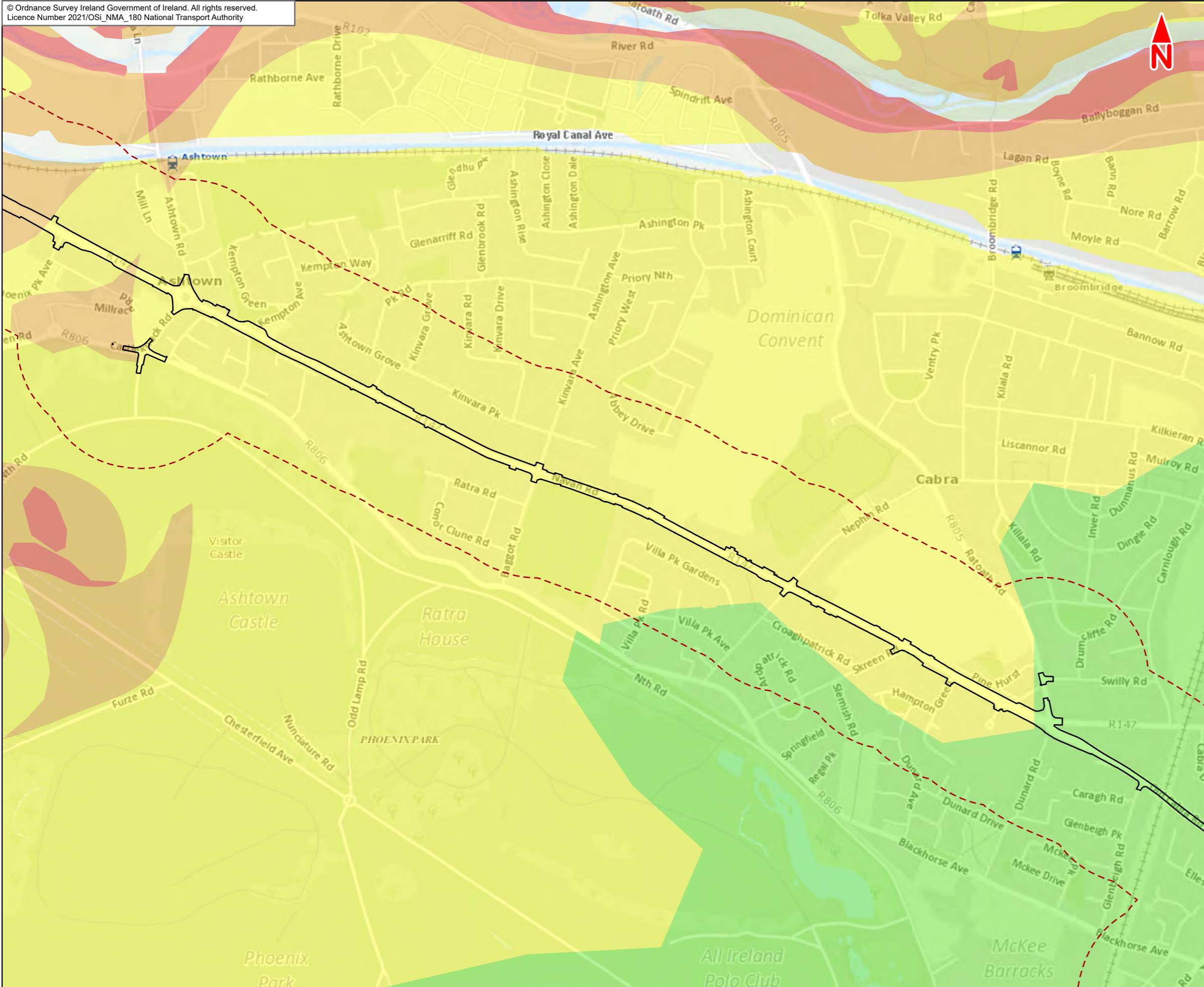
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.

Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Date	Scale @ A3	Drawn	Checked	Approved
15/03/2022	1:10000	FG	PW	DK
Project Code	Originator Code	QMS Code		
BCIDE	JAC			

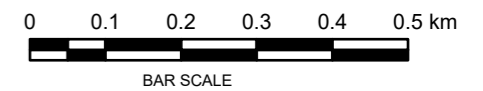
Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.12 Crushed Rock Aggregate Potential				
Drawing File Name	Sheet Number	Status	Rev	
BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0602	2 of 4	A	M01	



Legend :

- Blanchardstown to City Centre Scheme
- 250m Study Area
- GSI Aggregate Potential Mapping - Crushed Rock Aggregate Potential**
 - Very high potential
 - High potential
 - Moderate potential
 - Low potential

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

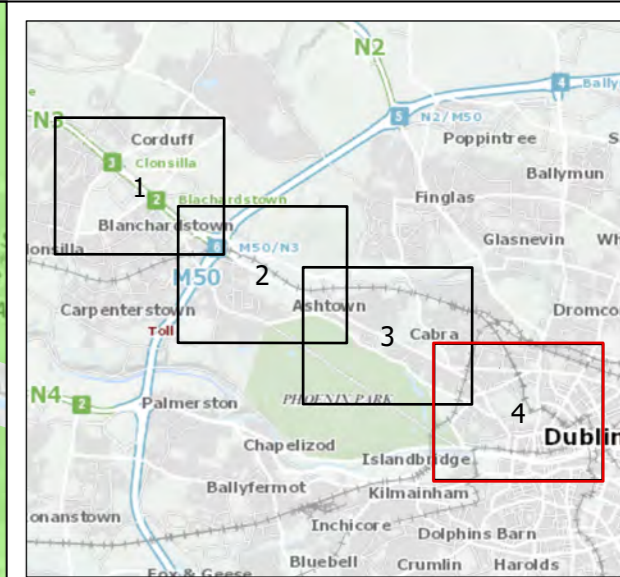
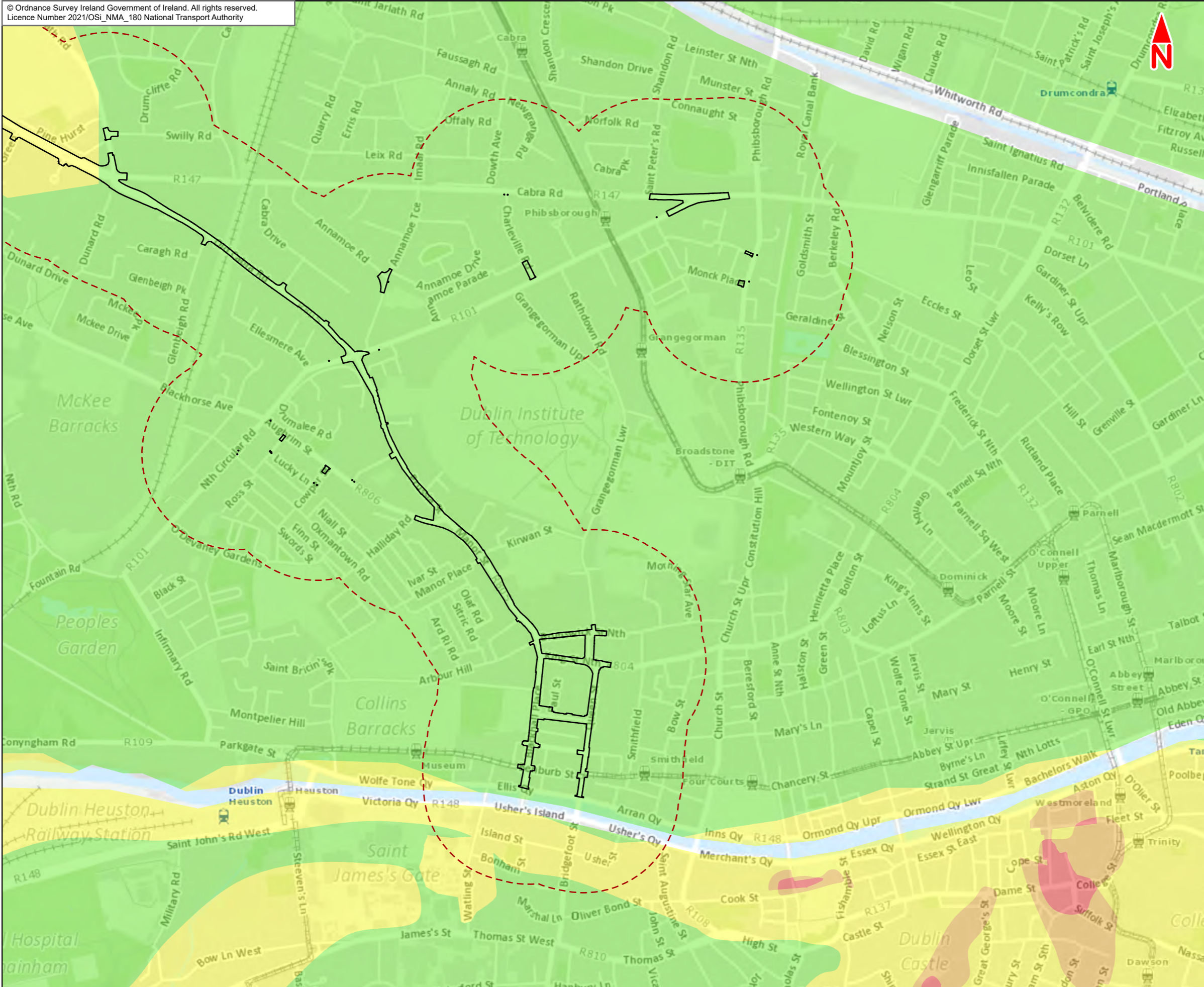
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

NTA Udarás Náisiúnta Iompair National Transport Authority		JACOBS ARUP SYSTRA		
Date	Scale @ A3	Drawn	Checked	Approved
15/03/2022	1:10000	FG	PW	DK
Project Code	Originator Code	QMS Code		
BCIDE	JAC			

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.12 Crushed Rock Aggregate Potential				
Drawing File Name	Sheet Number	Status	Rev	
BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0603	3 of 4	A	M01	



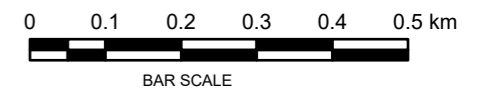
Legend :

- Blanchardstown to City Centre Scheme
- 250m Study Area

GSI Aggregate Potential Mapping - Crushed Rock Aggregate Potential

- Very high potential
- High potential
- Moderate potential
- Low potential

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing may not be copied, reproduced, stored in a retrieval system, or transmitted in any form or by any means, electronic, mechanical, photocopying, recording, or otherwise, without the prior written permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSi Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

d. Transverse Mercator Grid (ITM) as defined by OSi active local GPS station.
e. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

f. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

Date: 15/03/2022
Scale @ A3: 1:10000

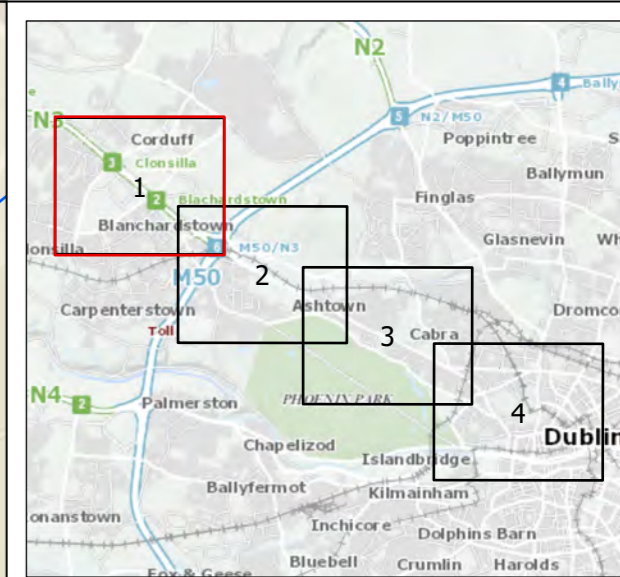
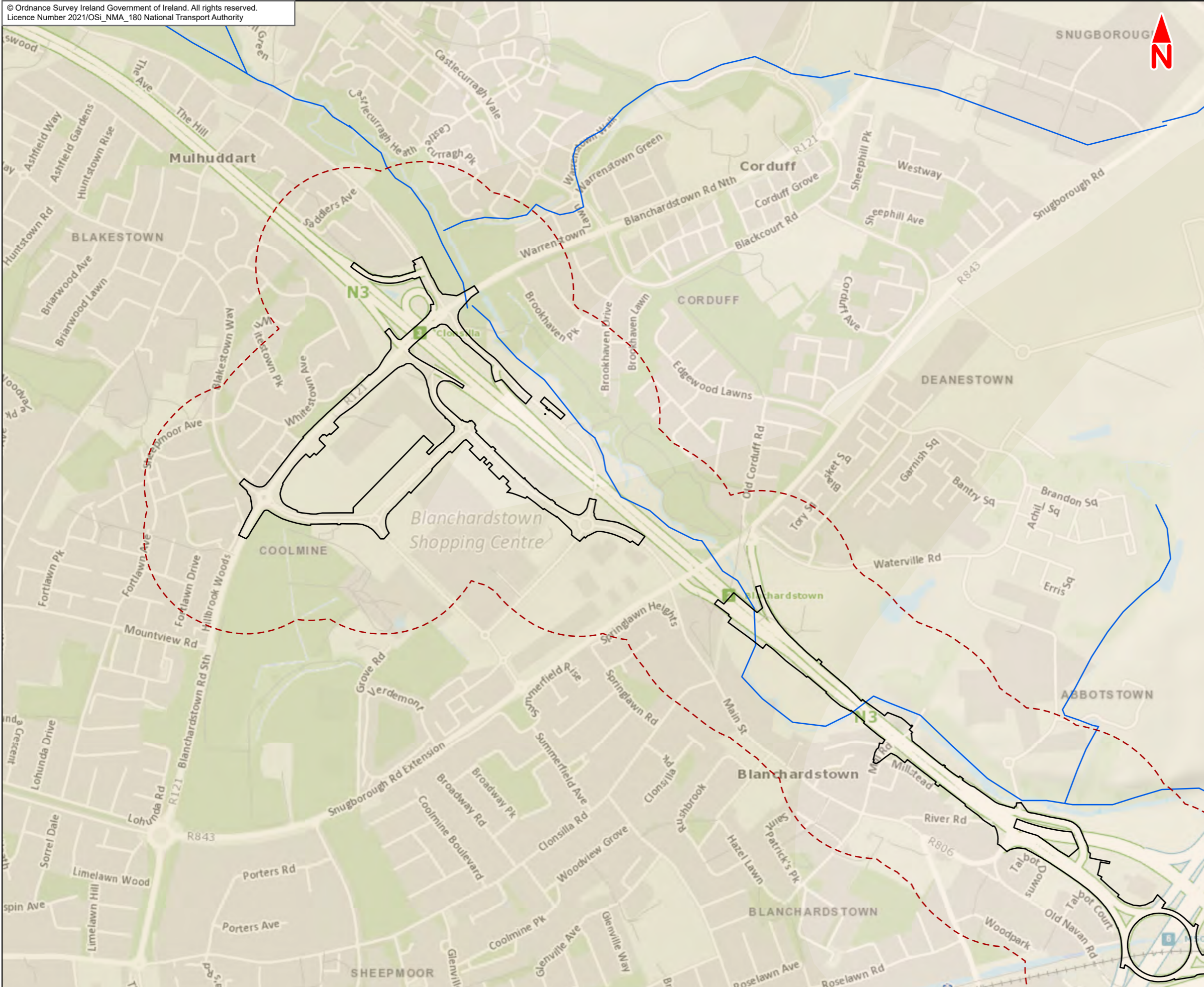
Project Code: BCIDE
Originator Code: JAC

Drawn: FG
Checked: PW
Approved: DK

Programme Title: BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.12 Crushed Rock Aggregate Potential			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0604	Sheet Number: 4 of 4	Status: A	Rev: M01

14.13
Aquifers





- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - Rivers Of Dublin
 - Groundwater Wells and Springs
- GSI Bedrock Aquifer**
- Locally Important Aquifer - Bedrock which is Moderately Productive only in Local Zones (LI)
 - Poor Aquifer - Bedrock which is Generally Unproductive except for Local Zones (PI)

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

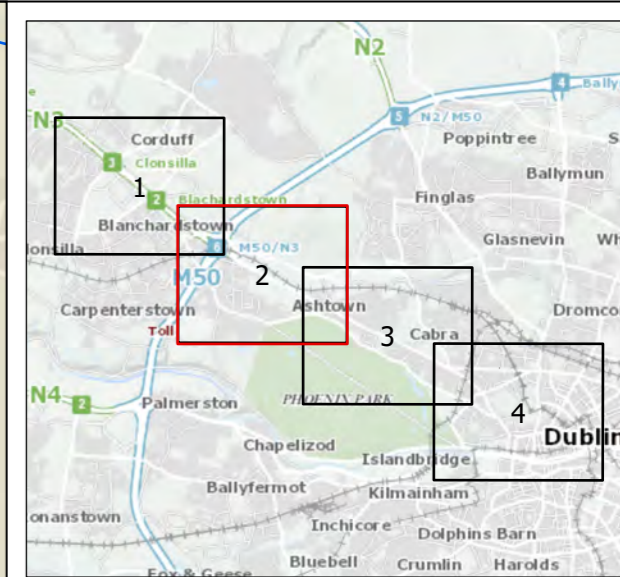
Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

Date: 15/03/2022 | Scale @ A3: 1:10000
Project Code: BCIDE | Originator Code: JAC

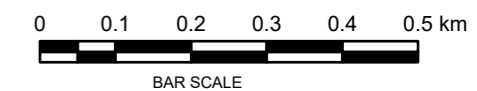
Drawn: FG | Checked: PW | Approved: DK
QMS Code: _____

Programme Title: BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.13 Aquifers			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0701	Sheet Number: 1 of 4	Status: A	Rev: M01



- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - Rivers Of Dublin
 - Groundwater Wells and Springs
- GSI Bedrock Aquifer**
- Locally Important Aquifer - Bedrock which is Moderately Productive only in Local Zones (LI)
 - Poor Aquifer - Bedrock which is Generally Unproductive except for Local Zones (PI)

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

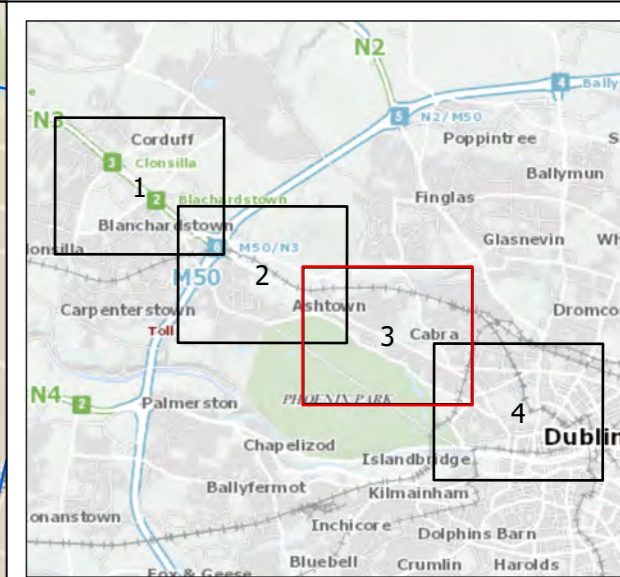
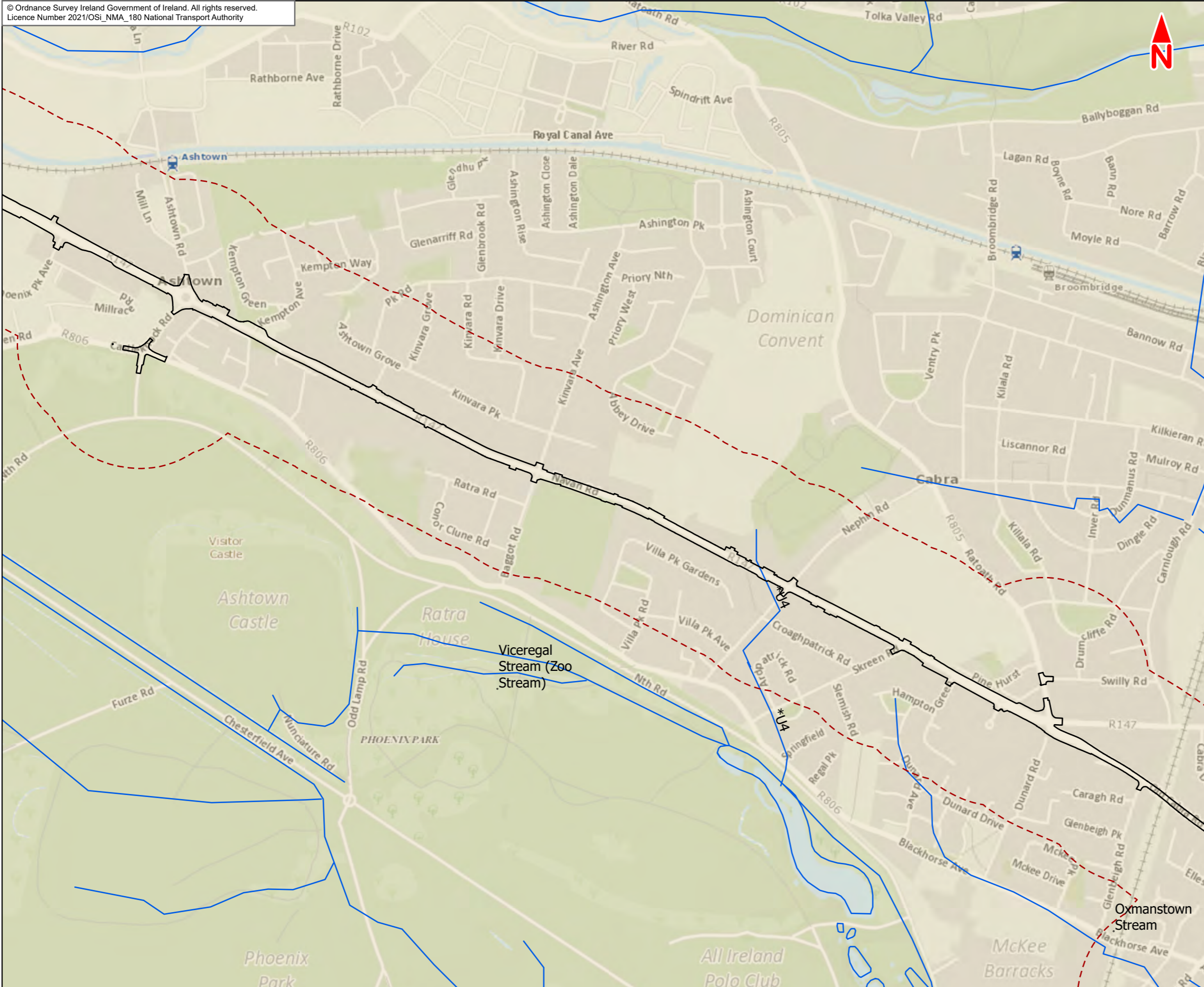
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

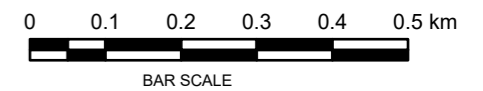
Date	Scale @ A3	Drawn	Checked	Approved
15/03/2022	1:10000	FG	PW	DK
Project Code	Originator Code	QMS Code		
BCIDE	JAC			

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.13 Aquifers				
Drawing File Name	Sheet Number	Status	Rev	
BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0702	2 of 4	A	M01	



- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - Rivers Of Dublin
 - Groundwater Wells and Springs
- GSI Bedrock Aquifer**
- Locally Important Aquifer - Bedrock which is Moderately Productive only in Local Zones (LI)

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSi Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSi active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

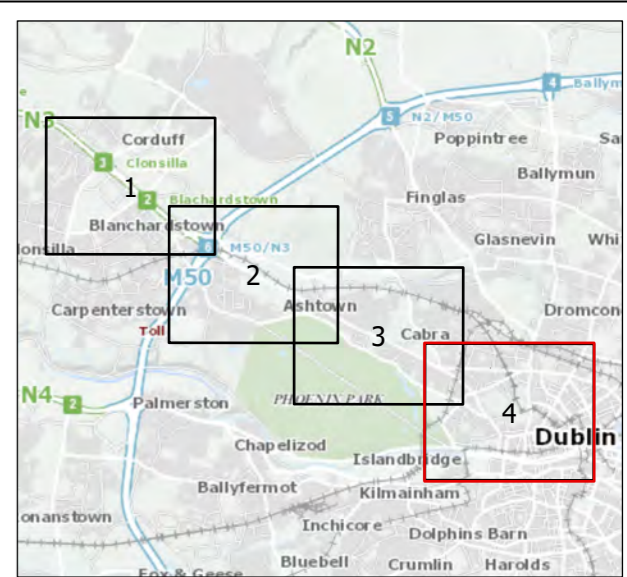
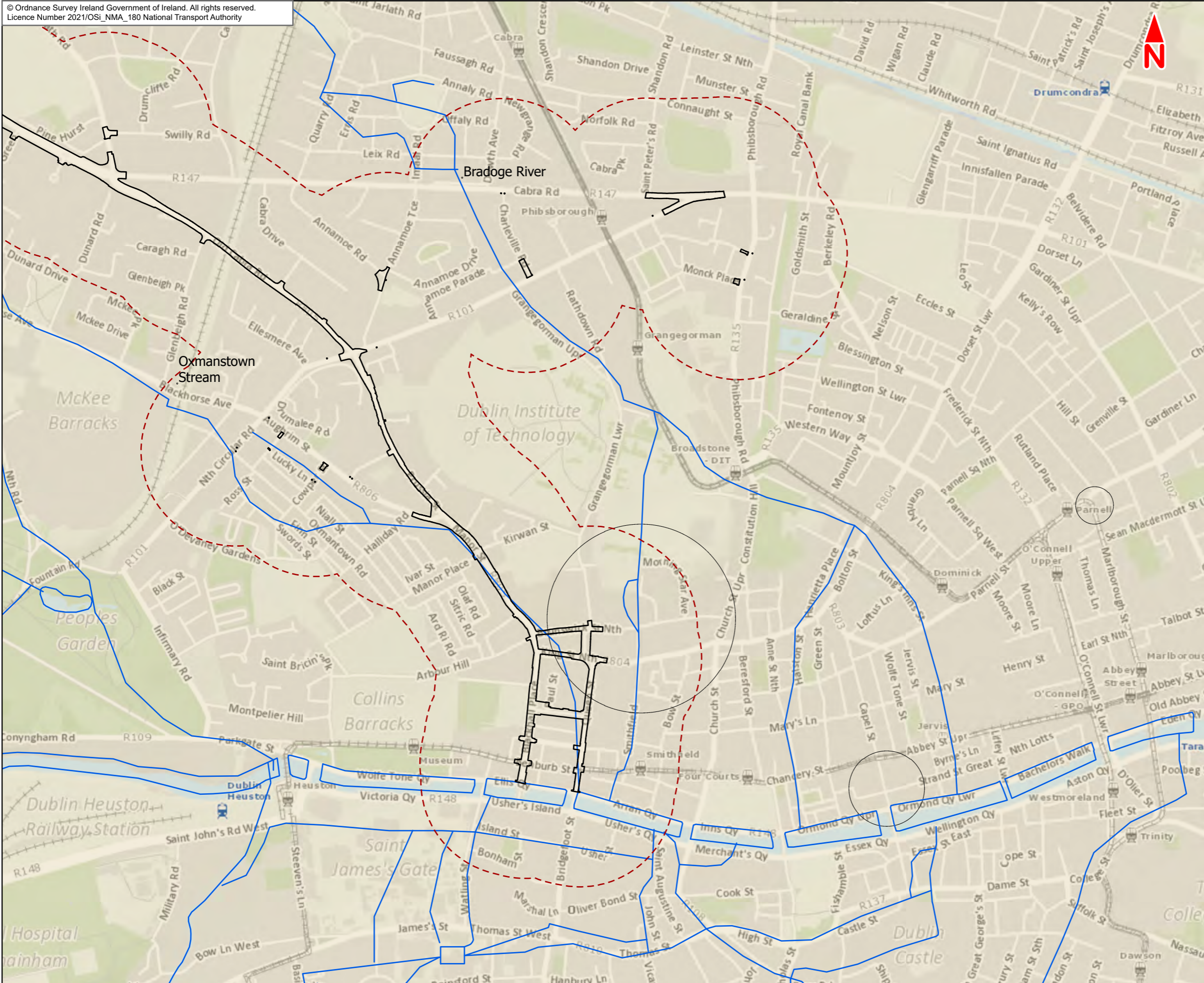
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

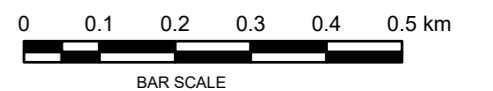
Date	Scale @ A3	Drawn	Checked	Approved
15/03/2022	1:10000	FG	PW	DK
Project Code	Originator Code	QMS Code		
BCIDE	JAC			

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.13 Aquifers				
Drawing File Name	Sheet Number	Status	Rev	
BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0703	3 of 4	A	M01	



- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - Rivers Of Dublin
 - Groundwater Wells and Springs
- GSI Bedrock Aquifer**
- Locally Important Aquifer - Bedrock which is Moderately Productive only in Local Zones (LI)

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.

d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by this drawing as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

Consultant: **JACOBS ARUP SYSTRA**

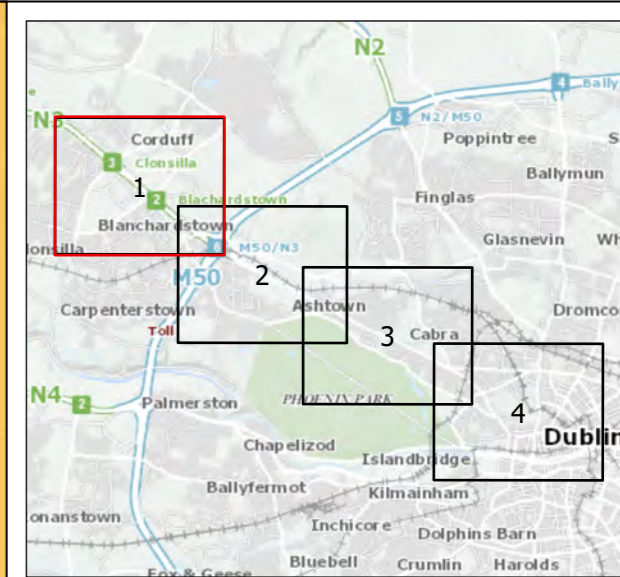
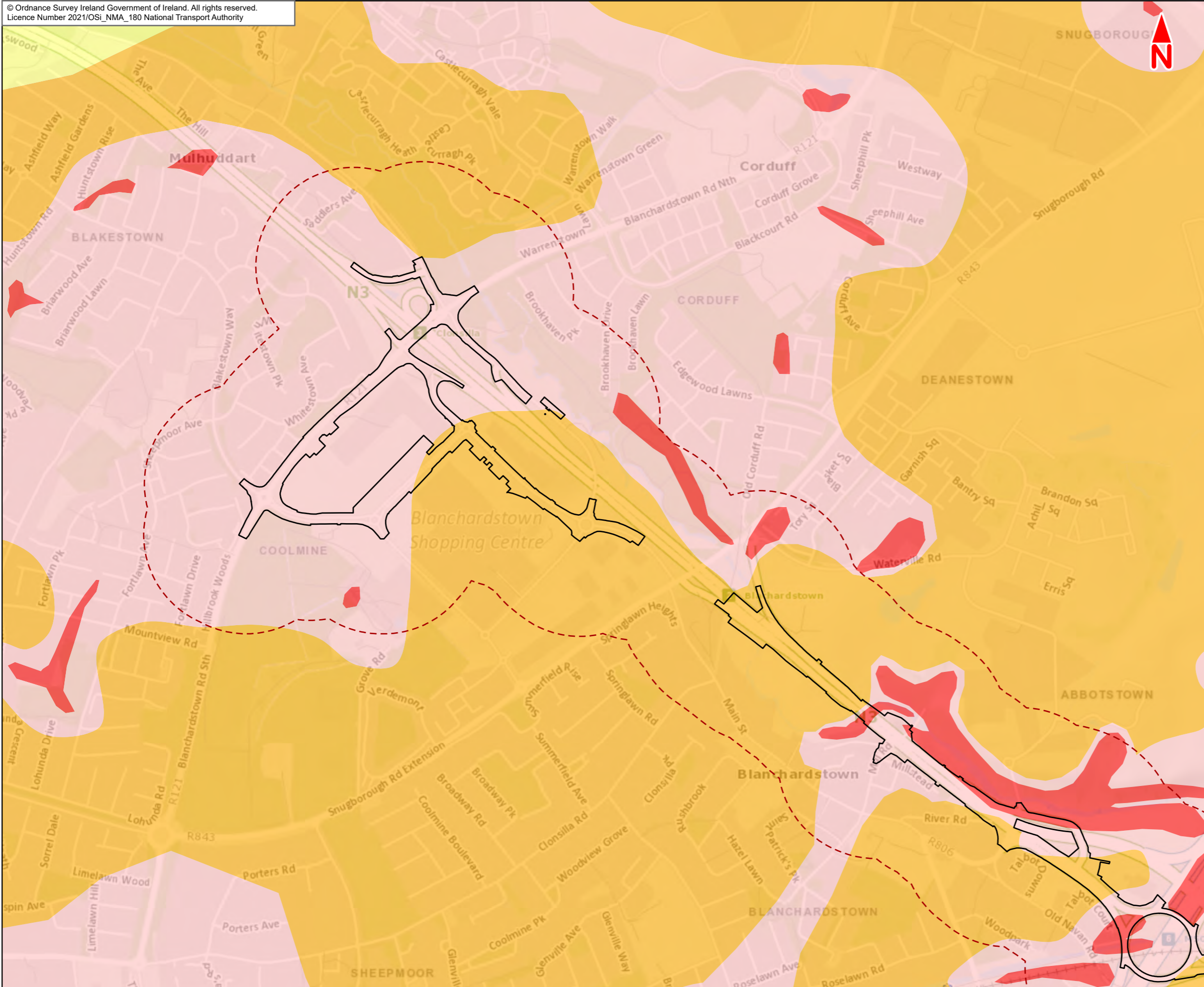
Date: 15/03/2022 Scale @ A3: 1:10000
Project Code: BCIDE Originator Code: JAC

Drawn: FG Checked: PW Approved: DK
QMS Code:

Programme Title: BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.13 Aquifers				
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0704	Sheet Number: 4 of 4	Status: A	Rev: M01	

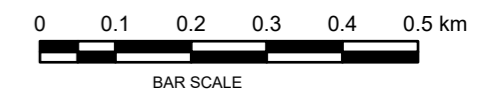
14.14
Groundwater Vulnerability





- Legend :**
- Blanchardstown to City Centre Scheme
 - - - 250m Study Area
 - GSI National Groundwater Vulnerability**
 - Extreme (X) Rock at/close to surface or Karst
 - Extreme
 - High
 - Moderate
 - Low
 - Water

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



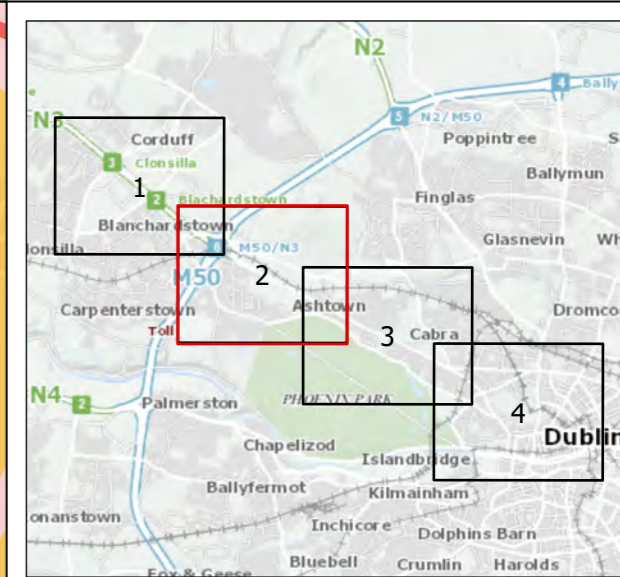
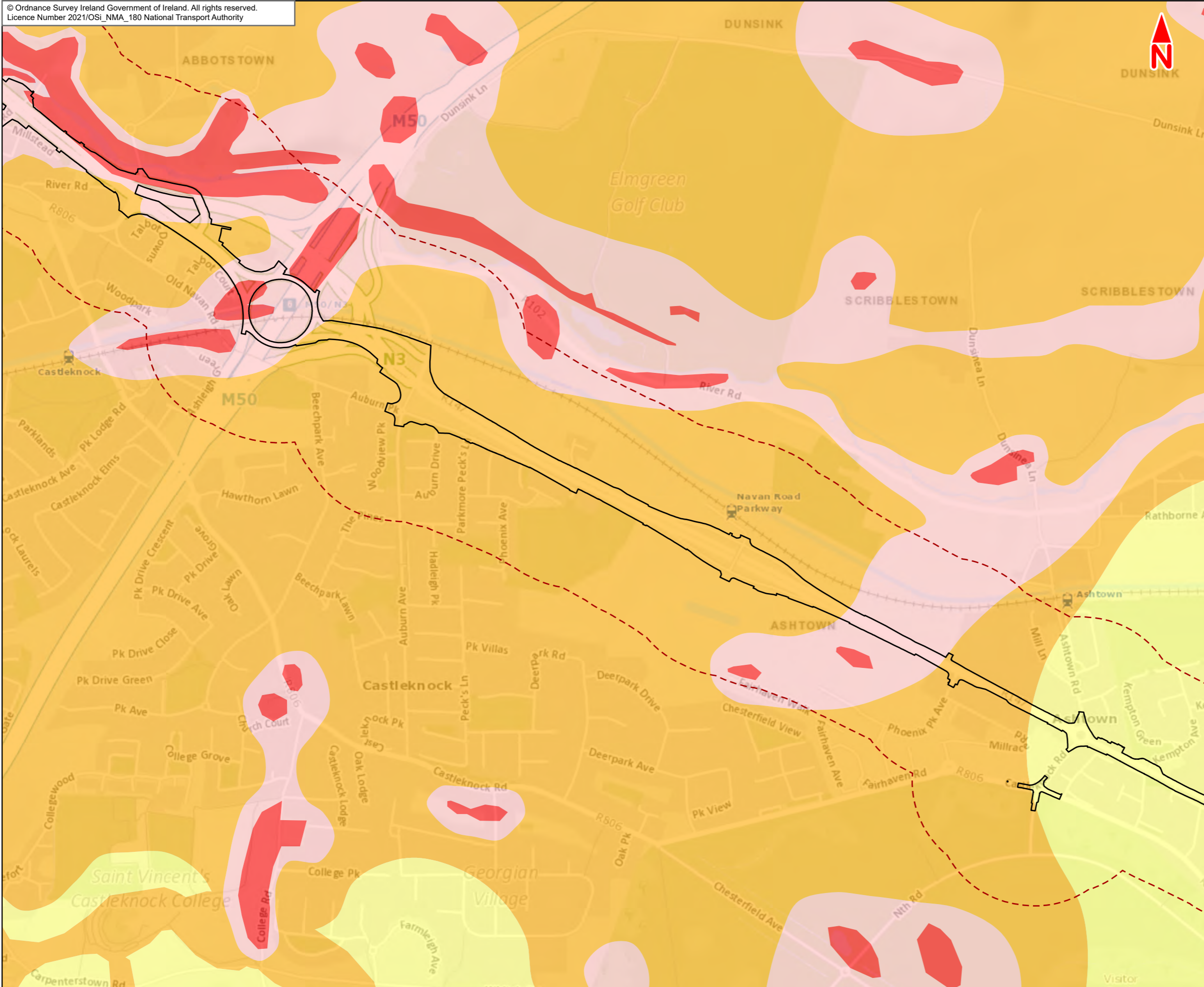
Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client
NTA
Udarás Náisiúnta Iompair
National Transport Authority

Consultant
JACOBS ARUP SYSTRA

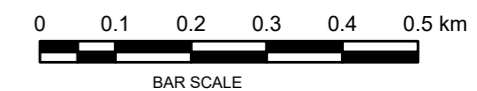
Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.14 Groundwater Vulnerability				
Drawing File Name BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0801	Sheet Number 1 of 4	Status A	Rev M01	

Date 15/03/2022	Scale @ A3 1:10000	Drawn FG	Checked PW	Approved DK
Project Code BCIDE	Originator Code JAC	QMS Code		



- Legend :**
- Blanchardstown to City Centre Scheme
 - - - 250m Study Area
 - GSI National Groundwater Vulnerability**
 - Extreme (X) Rock at/close to surface or Karst
 - Extreme
 - High
 - Moderate
 - Low
 - Water

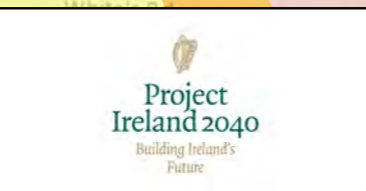
This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

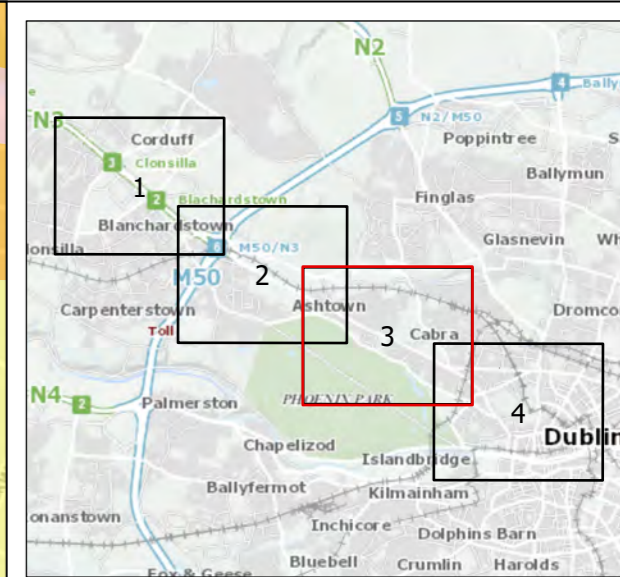
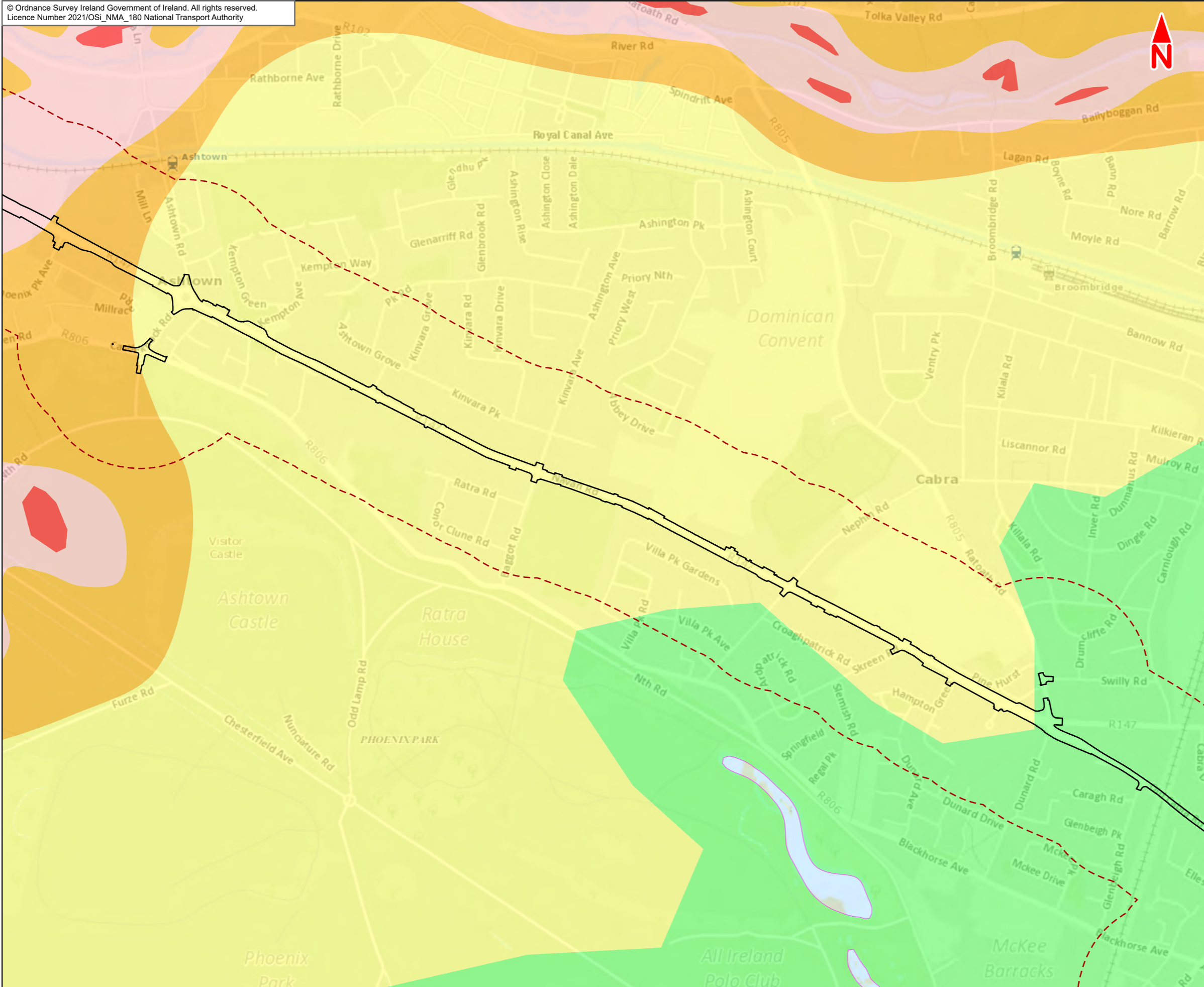
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Date	15/03/2022	Scale @ A3	1:10000	Drawn	FG
Project Code	BCIDE	Originator Code	JAC	Checked	PW
				Approved	DK
				QMS Code	

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS					
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.14 Groundwater Vulnerability					
Drawing File Name	BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0802	Sheet Number	2 of 4	Status	A
Rev	M01				



- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - GSI National Groundwater Vulnerability**
 - Extreme (X) Rock at/close to surface or Karst
 - Extreme
 - High
 - Moderate
 - Low
 - Water

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superseded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

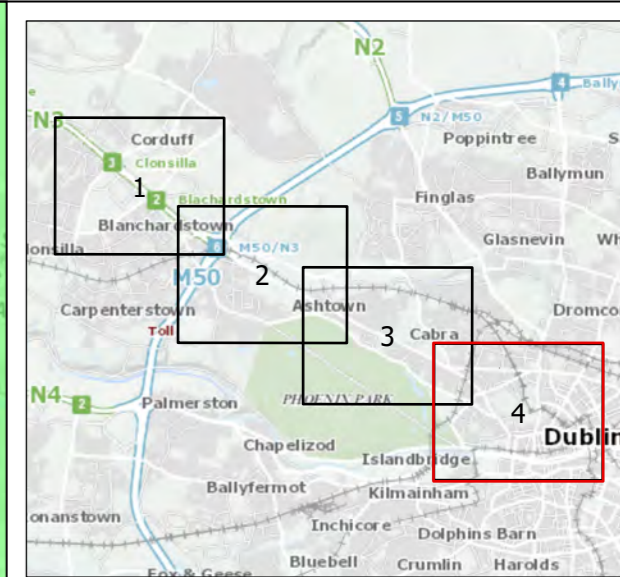
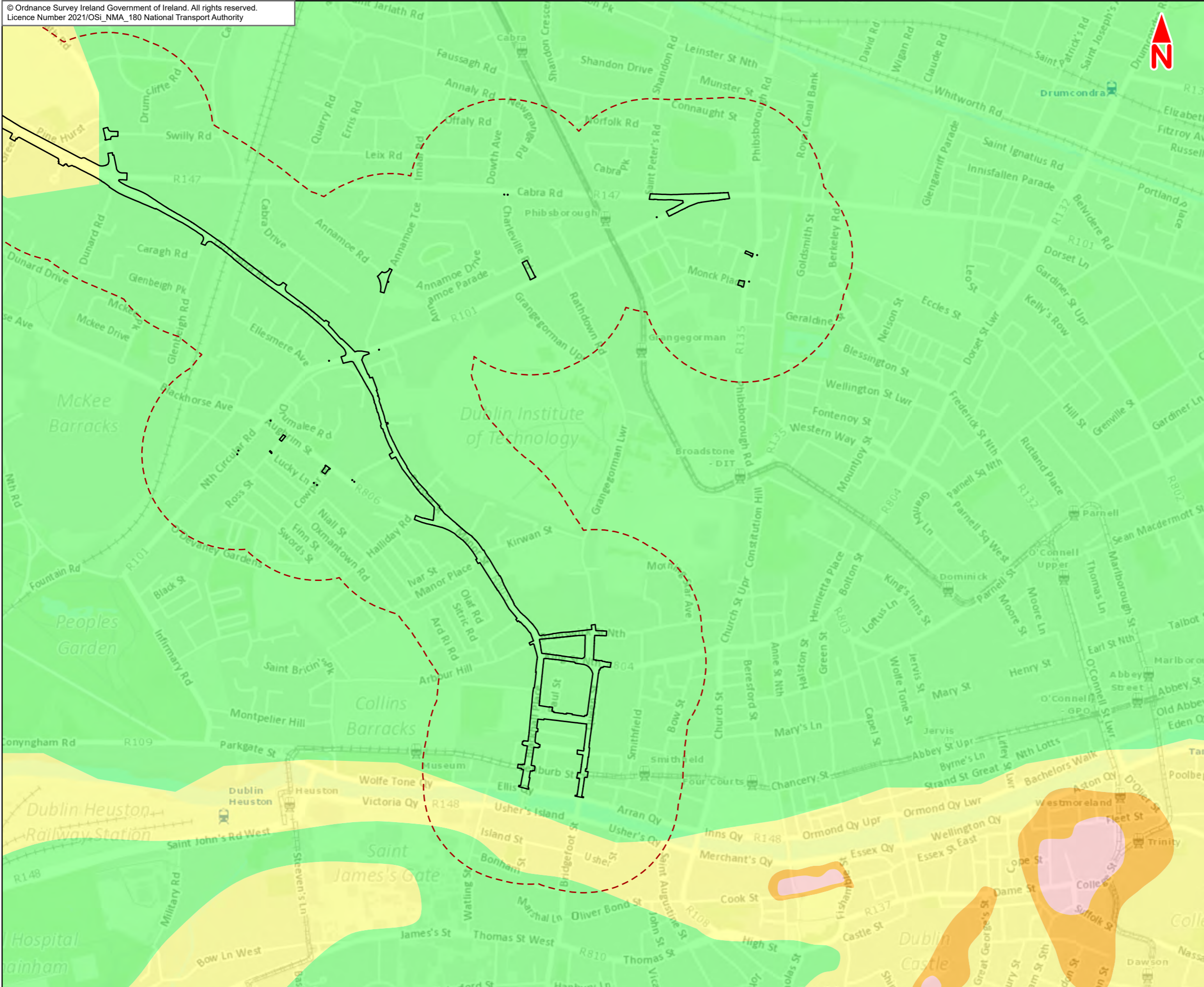
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

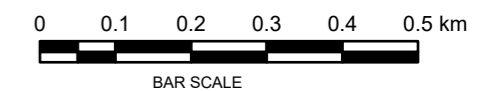
Client NTA Udarás Náisiúnta Iompair National Transport Authority		Consultant JACOBS ARUP SYSTRA		
Date 15/03/2022	Scale @ A3 1:10000	Drawn FG	Checked PW	Approved DK
Project Code BCIDE	Originator Code JAC	QMS Code		

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.14 Groundwater Vulnerability				
Drawing File Name BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0803	Sheet Number 3 of 4	Status A	Rev M01	



- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - GSI National Groundwater Vulnerability**
 - Extreme (X) Rock at/close to surface or Karst
 - Extreme
 - High
 - Moderate
 - Low
 - Water

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing may not be reproduced, copied or otherwise used in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSi Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

d. Transverse Mercator Grid (ITM) as defined by OSi active local GPS station.
Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client: **NTA**
Udarás Náisiúnta Iompair
National Transport Authority

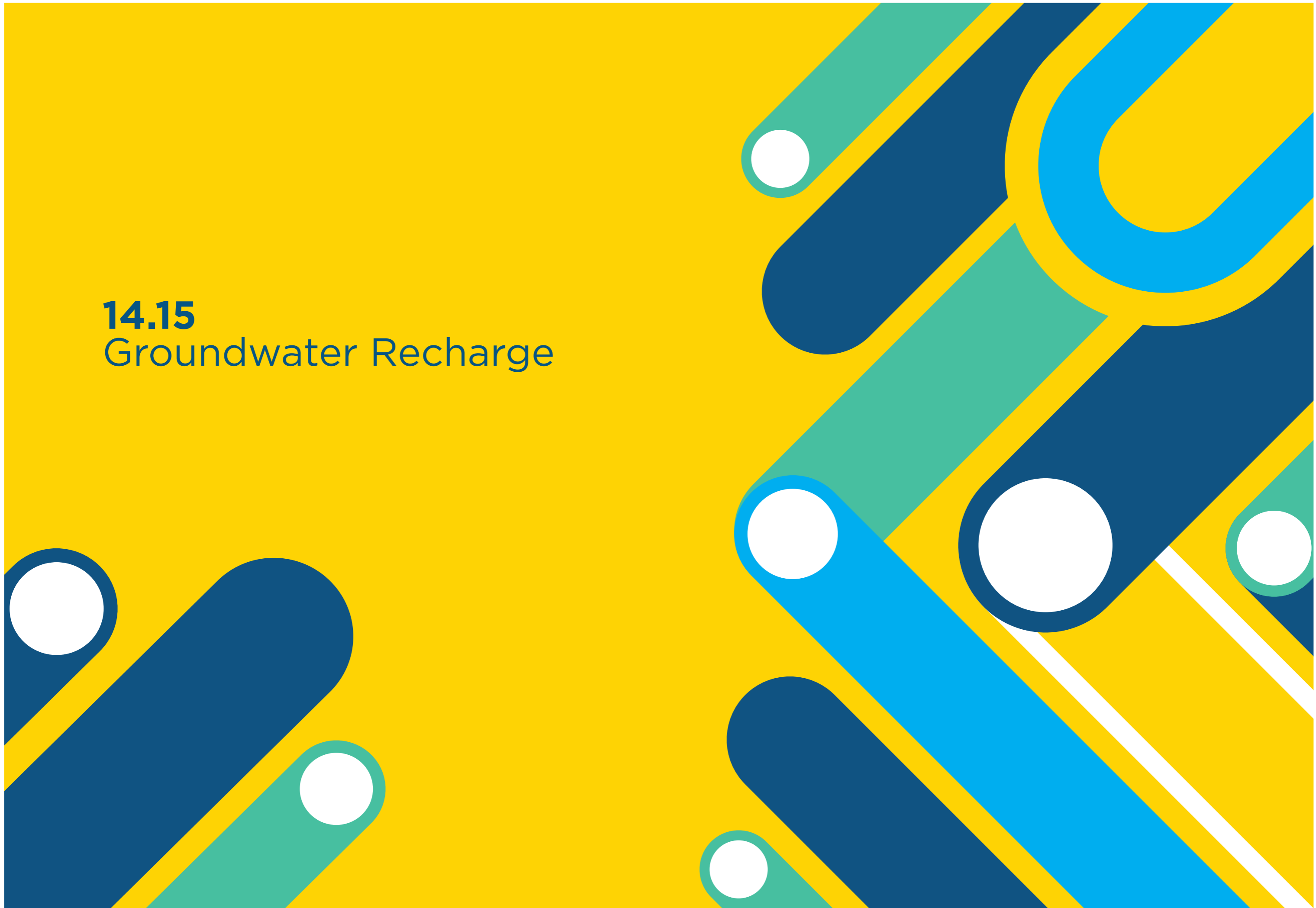
Consultant: **JACOBS ARUP SYSTRA**

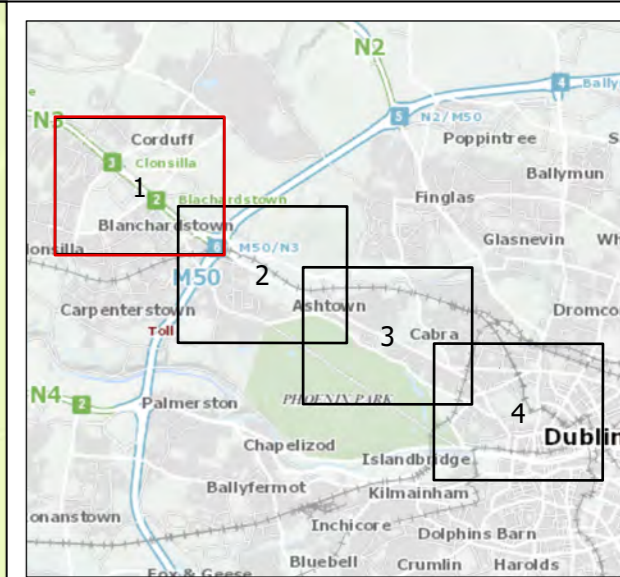
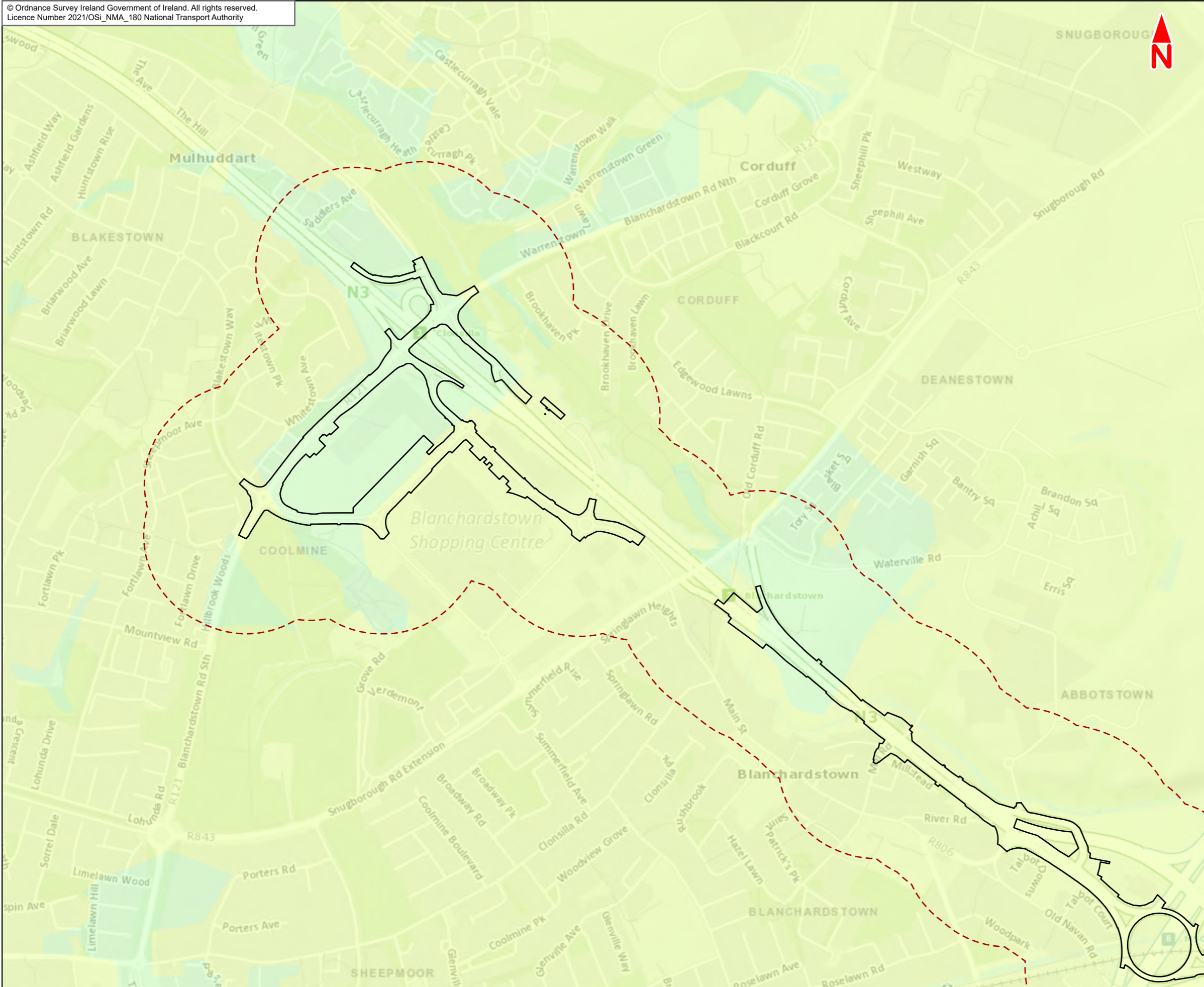
Date: 15/03/2022 | Scale @ A3: 1:10000
Project Code: BCIDE | Originator Code: JAC

Drawn: FG | Checked: PW | Approved: DK
QMS Code: _____

Programme Title: BUSCONNECTS DUBLIN			
CORE BUS CORRIDORS INFRASTRUCTURE WORKS			
Drawing Title: Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.14 Groundwater Vulnerability			
Drawing File Name: BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0804	Sheet Number: 4 of 4	Status: A	Rev: M01

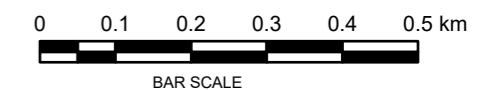
14.15
Groundwater Recharge





- Legend :**
- Blanchardstown to City Centre Scheme
 - 250m Study Area
 - GSI Groundwater Recharge**
 - Annual Recharge (mm)**
 - 151-200 mm
 - 51-100 mm

This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

d. Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
e. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

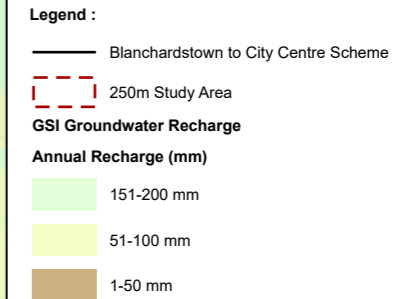
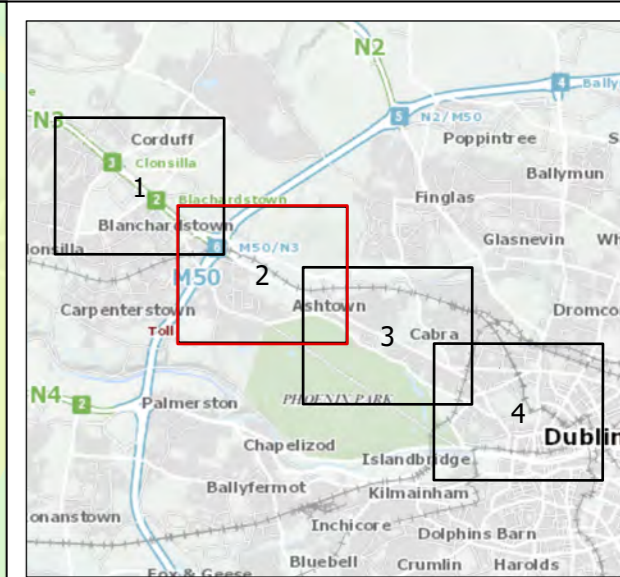
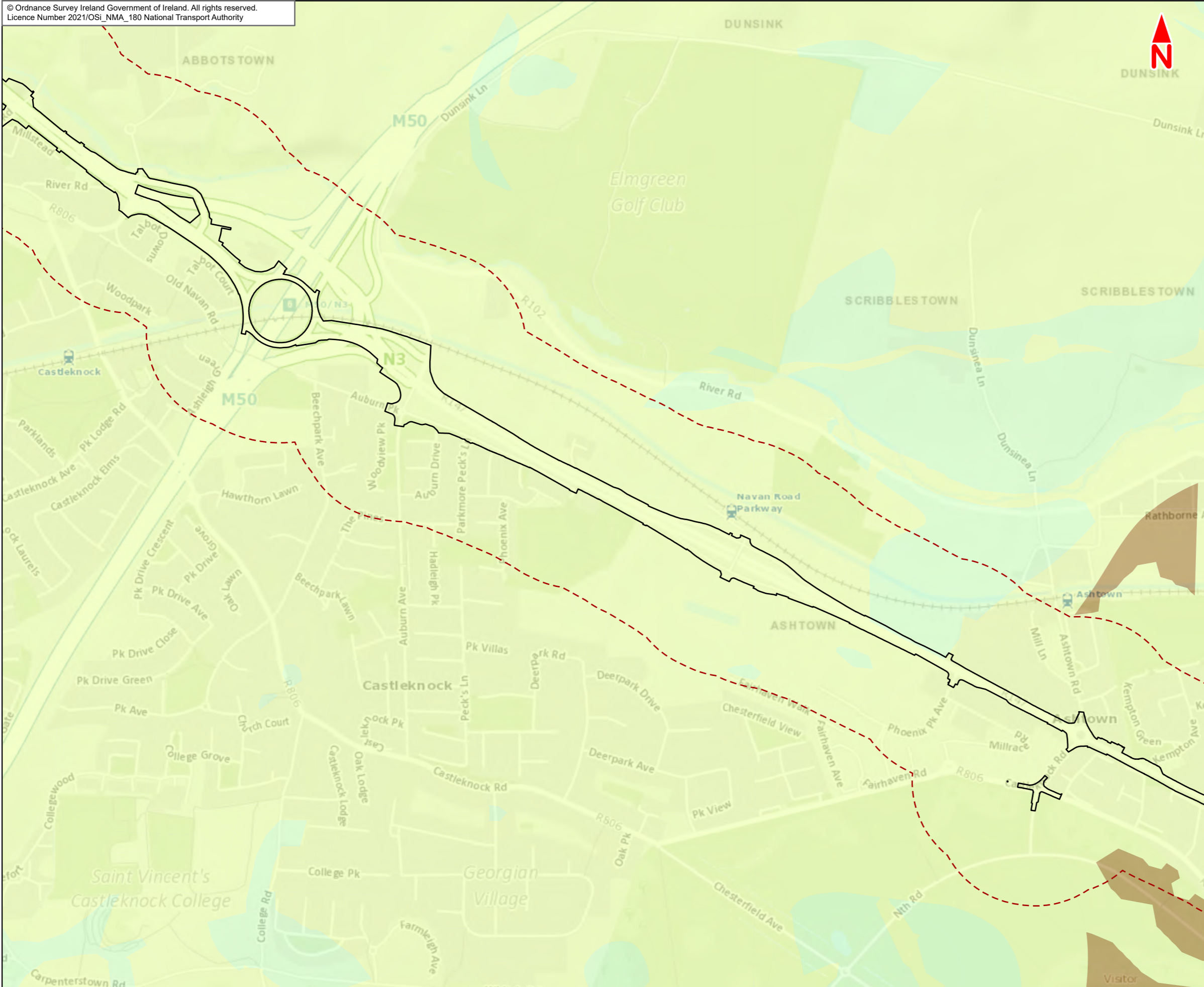
f. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



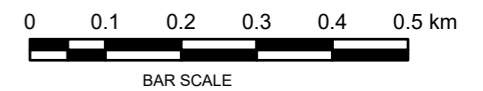
Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

 Udarás Náisiúnta Iompair National Transport Authority		Consultant 		
Date	Scale @ A3	Drawn	Checked	Approved
15/03/2022	1:10000	FG	PW	DK
Project Code	Originator Code	QMS Code		
BCIDE	JAC			

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.15 Groundwater Recharge				
Drawing File Name	Sheet Number	Status	Rev	
BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0901	1 of 4	A	M01	



This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the title block. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

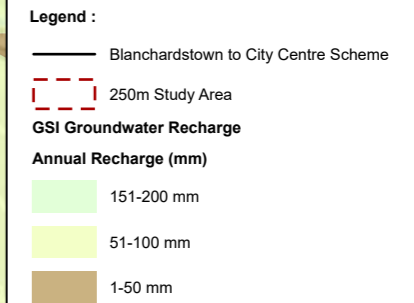
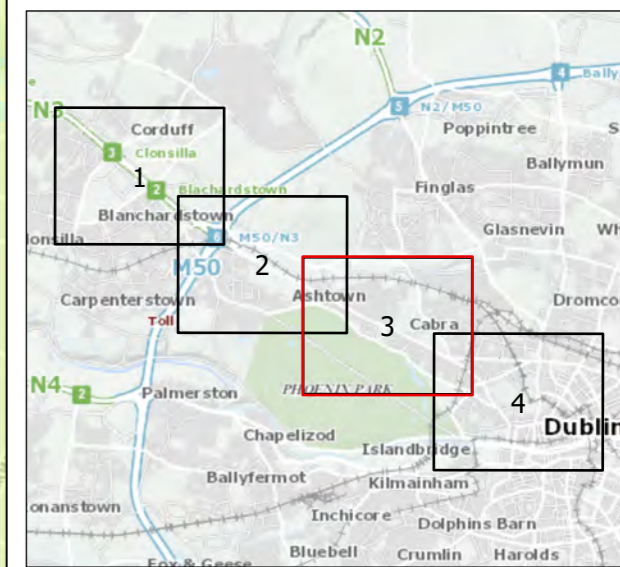
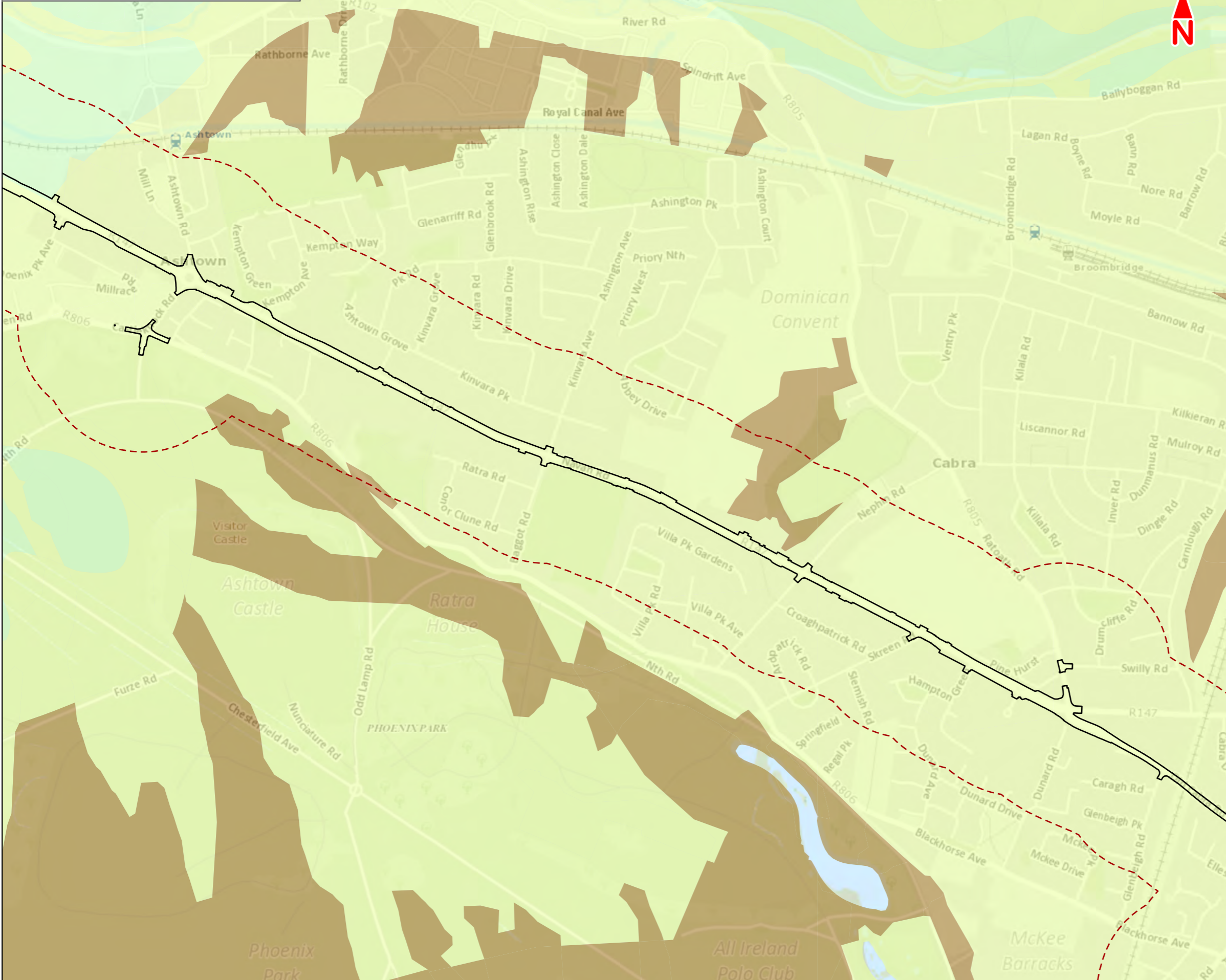
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



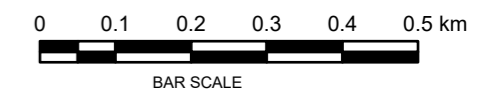
Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client NTA Udarás Náisiúnta Iompair National Transport Authority		Consultant JACOBS ARUP SYSTRA		
Date 15/03/2022	Scale @ A3 1:10000	Drawn FG	Checked PW	Approved DK
Project Code BCIDE	Originator Code JAC	QMS Code		

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.15 Groundwater Recharge				
Drawing File Name BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0902	Sheet Number 2 of 4	Status A	Rev M01	



This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
d. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

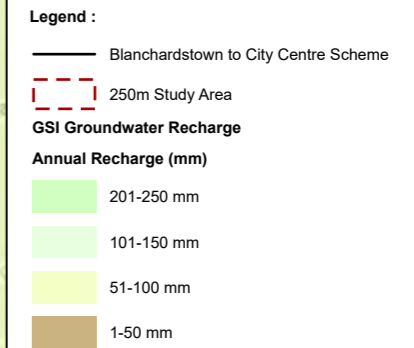
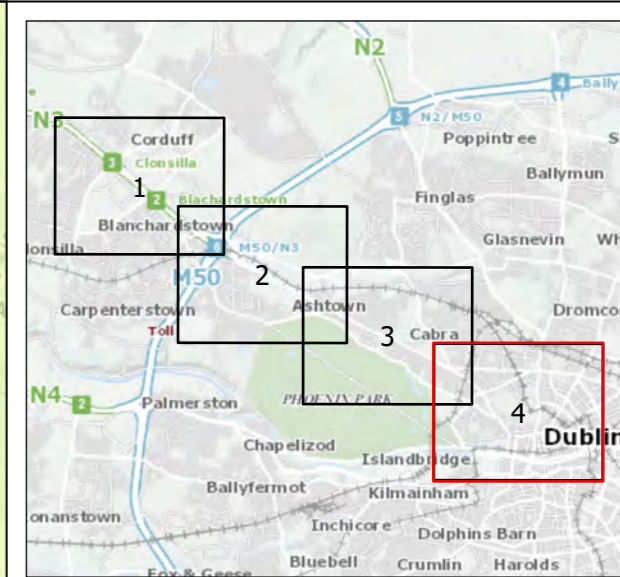
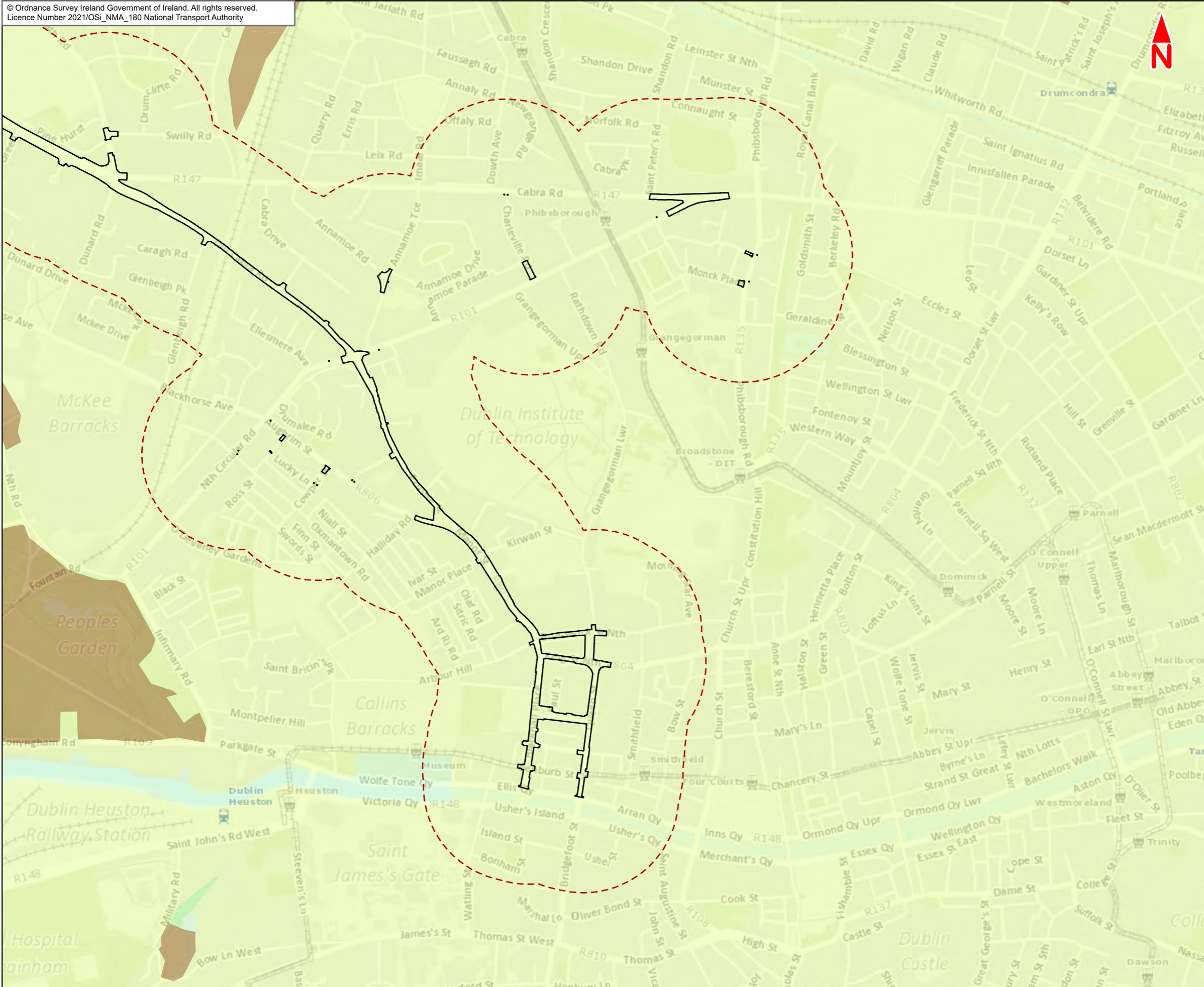
e. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



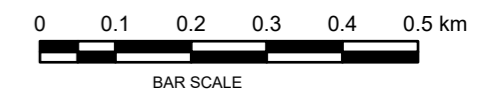
Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

NTA Udarás Náisiúnta Iompair National Transport Authority		JACOBS ARUP SYSTRA		
Date	Scale @ A3	Drawn	Checked	Approved
15/03/2022	1:10000	FG	PW	DK
Project Code	Originator Code	QMS Code		
BCIDE	JAC			

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.15 Groundwater Recharge				
Drawing File Name	Sheet Number	Status	Rev	
BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0903	3 of 4	A	M01	



This drawing is not to be used in whole or in part other than for the intended purpose and project as defined on this drawing. Contains Irish Public Sector Data licensed under a Creative Commons Attribution 4.0 International (CC BY 4.0) licence



Disclaimer
a. © National Transport Authority (NTA) 2021. This drawing is confidential and the copyright in it is owned by NTA. This drawing must not be either loaned, copied or otherwise reproduced in whole or in part or used for any purpose without the prior permission of NTA.
b. This drawing is to be used for the design element identified in the titleblock. Other information shown is to be considered indicative only. The drawing is to be read in conjunction with all other relevant design drawings.
c. O.S. data used for plans are printed under © Ordnance Survey Ireland Government of Ireland. All rights reserved. Licence Number 2021/OSI_NMA_180 National Transport Authority. All elevations are in metres and relate to OSI Geoid Model (OSGM15) Mean Head. All Co-ordinates are in Irish

d. Transverse Mercator Grid (ITM) as defined by OSI active local GPS station.
e. Information concerning the position of apparatus shown on this drawing is based on drawings supplied by the utility owners and/or the utility works contractor, whilst every care has been taken in the preparation of this drawing, positions should be taken as approximate and are intended for general guidance only and no representation is made by the NTA as to the accuracy, completeness, sufficiency or otherwise of this drawing and the position of the apparatus. The information contained herein does not purport to be comprehensive or final as the apparatus is subject to being altered and/or superceded. Recipients should not rely on this information. Any liabilities are hereby expressly disclaimed.

f. The information contained herein has been provided by the NTA but does not purport to be comprehensive or final. Recipients should not rely on the information. Neither the NTA nor any of its directors, officers, employees, agents, stakeholders or advisers make any representation or warranty as to, or accept any liability or responsibility in relation to, the adequacy, accuracy, reasonableness or completeness of the information provided as part of this document or any matter on which the information is based (including but not limited to loss or damage arising as a result of reliance by recipients on the information or any part of it. Any liabilities are hereby expressly disclaimed.



Rev	Date	Drn	Chk'd	App'd	Description
M01	Mar 22	FG	PW	DK	ISSUE FOR PHASE 4 : PLANNING

Client
NTA
Udarás Náisiúnta Iompair
National Transport Authority

Consultant
JACOBS
ARUP SYSTRA

Programme Title BUSCONNECTS DUBLIN CORE BUS CORRIDORS INFRASTRUCTURE WORKS				
Drawing Title Blanchardstown to City Centre Core Bus Corridor Scheme Figure 14.15 Groundwater Recharge				
Date 15/03/2022	Scale @ A3 1:10000	Drawn FG	Checked PW	Approved DK
Project Code BCIDE	Originator Code JAC	QMS Code		Drawing File Name BCIDE-JAC-ENV_GT-0005_XX_00-DR-GG-0904
Sheet Number 4 of 4		Status A	Rev M01	