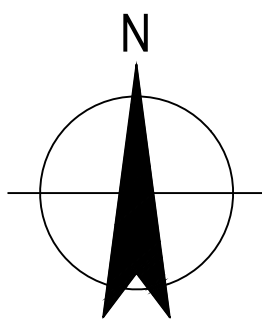


DEPARTMENT OF DEFENCE

NEWCASTLE AIRPORT

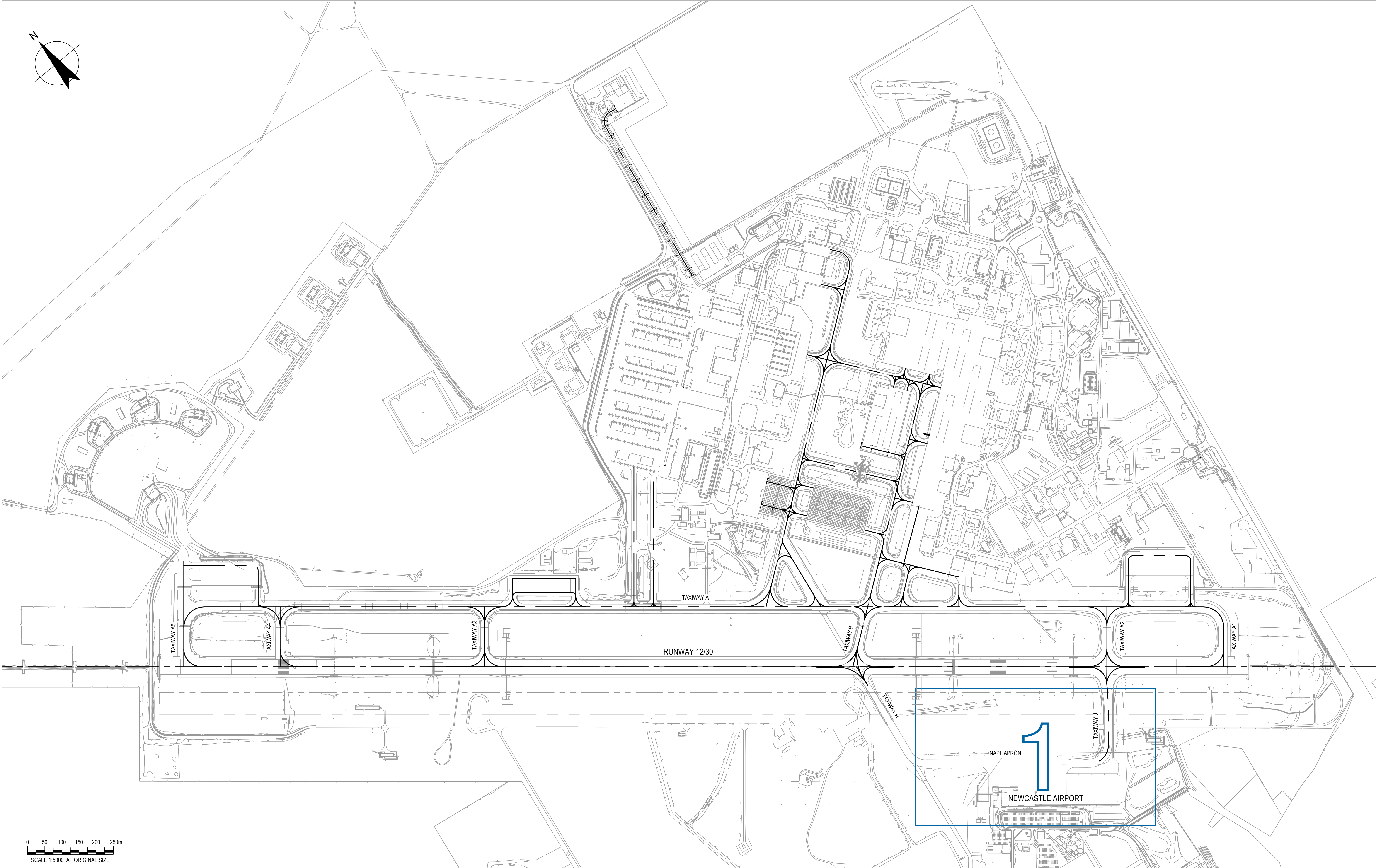
APRON AND TAXILANE REALIGNMENT



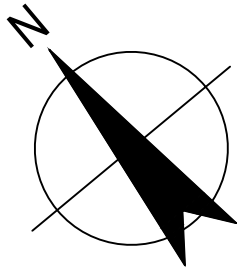
LOCALITY PLAN

DRAWING LIST	
DRAWING NUMBER	DRAWING TITLE
GENERAL	
12514693-G5001	COVER SHEET, LOCALITY PLAN & DRAWING INDEX
12514693-G5002	KEY PLAN
12514693-G5005	GENERAL LAYOUT PLAN
12514693-G5010	GEOTECHNICAL INVESTIGATIONS LOCATION PLAN
CIVIL	
12514693-C5011	TOPOGRAPHIC SURVEY PLAN
12514693-C5021	DEMOLITION PLAN - SHEET 1
12514693-C5031	GENERAL CONSTRUCTION PLAN
12514693-C5032	GENERAL CONSTRUCTION DETAIL PLAN - SHEET 1
12514693-C5033	GENERAL CONSTRUCTION DETAIL PLAN - SHEET 2
12514693-C5034	GENERAL CONSTRUCTION DETAIL PLAN - SHEET 3
12514693-C5061	FINAL SURFACE CONTOURS
AGL	
12514693-E5002	LEGEND AND NOTES
12514693-E5004	STANDARD SETOUT DETAILS
12514693-E5011	SETOUT DETAILS
12514693-E5021	CIRCUIT DETAILS

H ISSUED FOR DEVELOPMENT APPROVAL				TE	GF	CS	18.09.23	<div>CLIENT:</div> <div></div> <div>Australian Government</div> <div>Department of Defence</div> <div>Security and Estate Group</div>	<div></div> <div>Newcastle Airport</div> <div>Newcastle Airport Pty Ltd</div> <div>Williamtown Drive NSW 2318</div>	<div>PMCA:</div> <div></div> <div>Beca</div>	<div></div> <div>Level 4, 211 Victoria Square Adelaide SA 5000 Australia GPO Box 2052 Adelaide SA 5001 T 61 8 8111 6600 F 61 8 8111 6699 E admail@ghd.com.au W www.ghd.com</div> <div></div> <div>www.ghd.com</div> <div>Project No.</div>	<div>DO NOT SCALE</div> <div>GHD Pty Ltd</div> <div>Conditions of Use.</div> <div>This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.</div>	Drawn T. EDEN	Designer G. FOK	Client DEPARTMENT OF DEFENCE / NEWCASTLE AIRPORT
G 90% DDR REISSUE	TE	GF	CS	30.06.23	Drafting Check D. WALKER	Design Check M. GENTILCORE	Project EST01980 - P0008 NAW - 0908 RAAF WLM								
F 90% DDR REISSUE TO QS	TE	GF	CS	10.03.23	Approved (Project Director) Date							Title COVER SHEET, LOCALITY PLAN & DRAWING LIST			
E FOR INFORMATION				03.03.23	Scale NOT TO SCALE	This Drawing must not be used for Construction unless signed as Approved							Original Size A1		
D 90% DDR ISSUE	TE	GF	CS	21.09.22								Drawing No: 12514693-G5001		Rev: H	
No	Revision	Note: * indicates signatures on original issue of drawing or last revision of drawing		Drawn	Job Manager	Project Director	Date								



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G	90% DDR REISSUE	TE	GF	CS	30.06.23				Drafting Check D. WALKER	Design Check M. GENTILCORE	
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D	30% DDR ISSUE	TE	GF	CS	21.09.22						
No	Revision	Note: * indicates signatures on original issue of drawing or last revision of drawing	Drawn	Job Manager	Project Director	Date	Plot Date: 18 September 2023 - 3:05 PM Plotted by: Ty Eden Cad File No: N:\AU\Adelaide\Projects\33\12514693\CADD\Drawings\12514693-G5002.dwg				

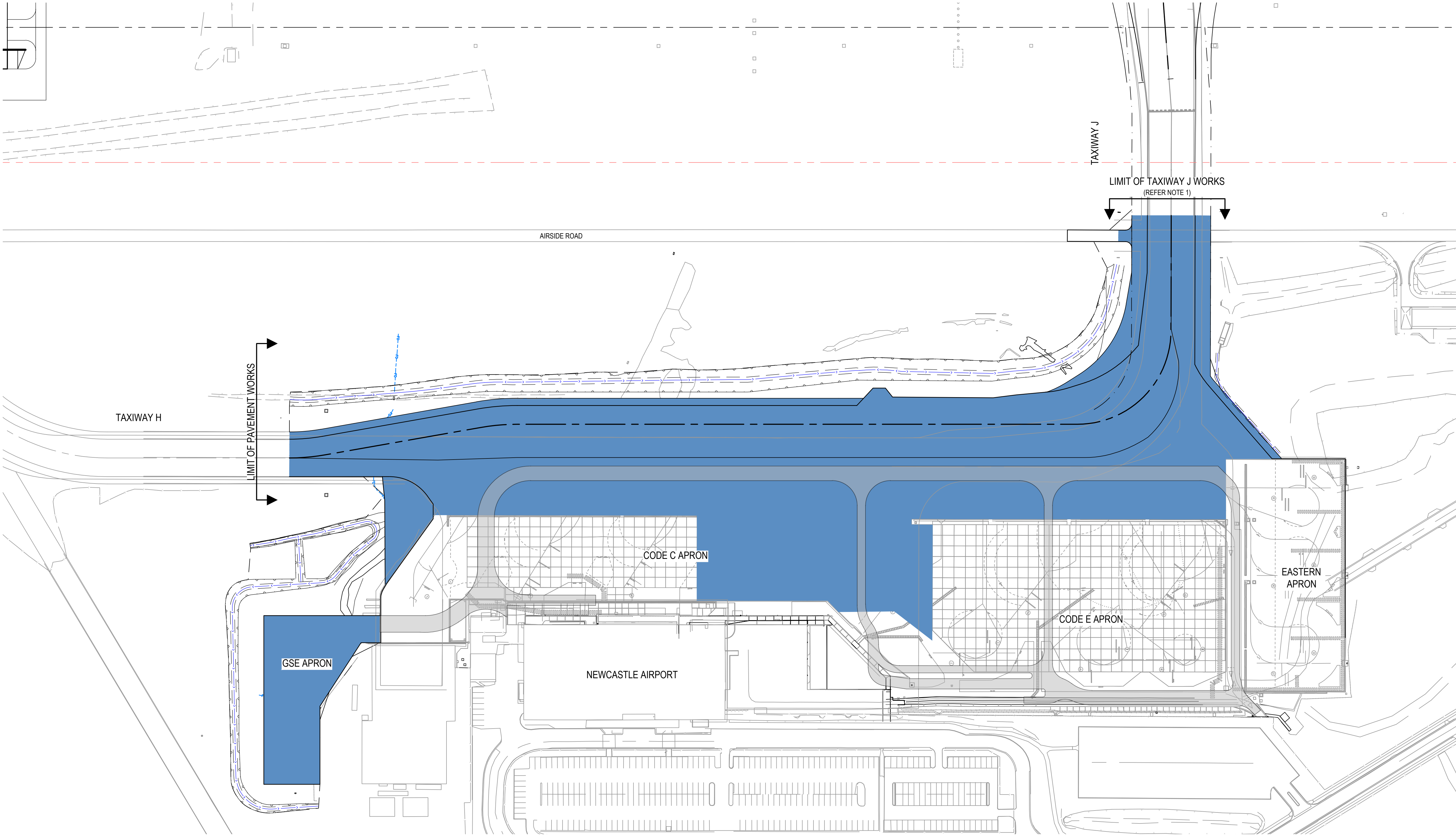


LEGEND:

- SCOPE OF PAVEMENT WORKS
- BASE BOUNDARY
- EXISTING FEATURES
- RUNWAY STRIP (280 m)
- RUNWAY GRADED STRIP (150 m)
- EXISTING RUNWAY GRADED STRIP (230 m)
- TAXIWAY STRIP
- EXISTING TAXILANE / APRON EDGE

NOTE:

1. PAVEMENT WORKS TO TIE INTO DESIGN FOR TAXIWAY J AS SHOWN IN DRAWINGS AS FOLLOWS:
- 12514693-C2062 - COLD PLANING PLAN
 - 12514693-C2082 - GENERAL CONSTRUCTION PLAN
 - 12514693-C2112 - PAVEMENT PLAN
 - 12514693-C2222 - FINAL SURFACE CONTOUR PLAN
 - 12514693-C2312 - PAVEMENT MARKING PLAN



H	ISSUED FOR DEVELOPMENT APPROVAL		TE	GF	CS	18.09.23
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F	FOR INFORMATION					03.03.23
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Australian Government
Department of Defence
Security and Estate Group



Newcastle Airport
Newcastle Airport Pty Ltd
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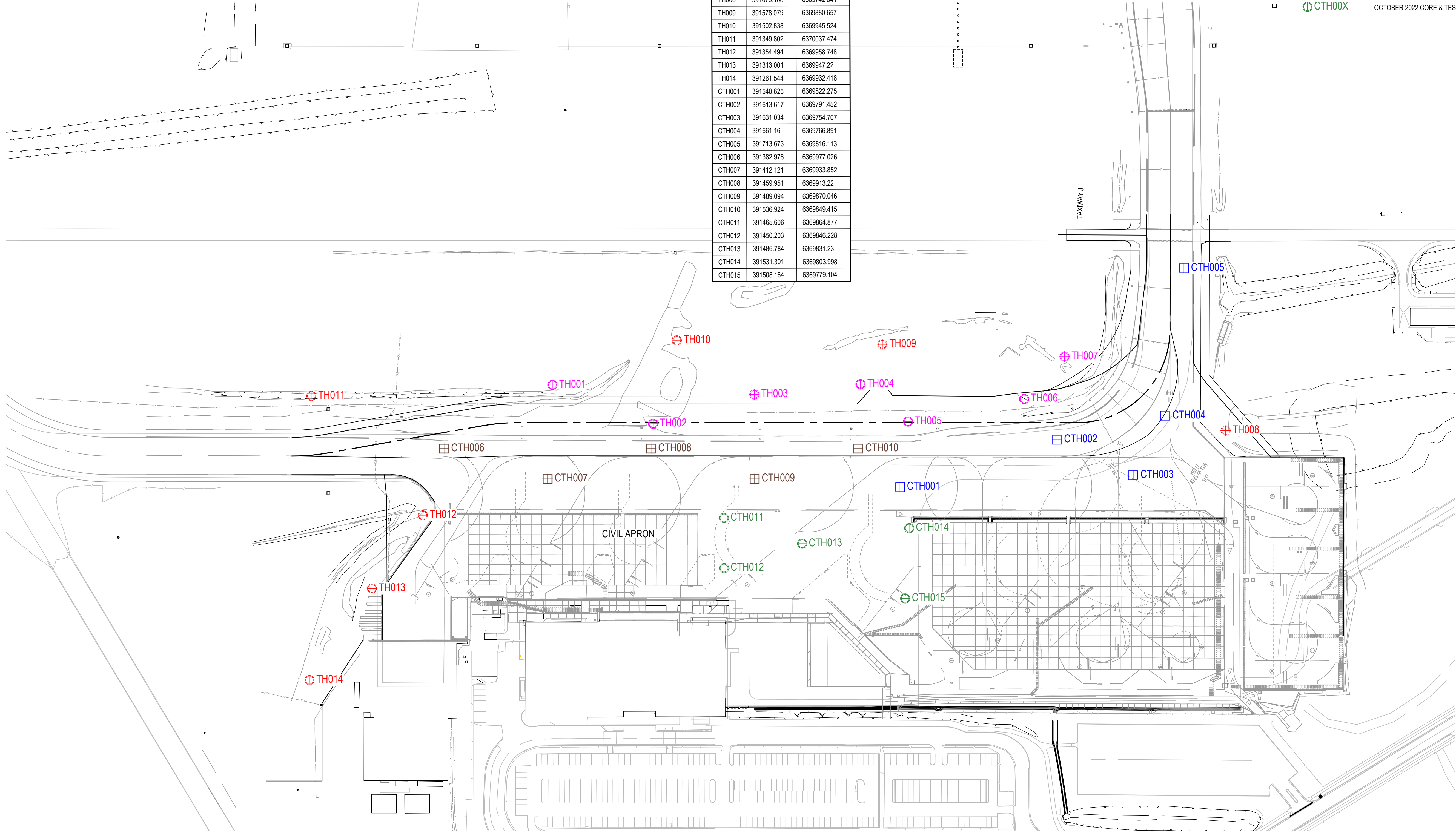
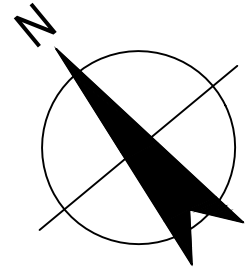
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Drafting Check	D. WALKER	Design Check	M. GENTILCORE
Approved (Project Director)	Date	Scale	1:1000
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Client	DEPARTMENT OF DEFENCE / NEWCASTLE AIRPORT
Project	EST01980 - P0008 NAW - 0908 RAAF WLM
Title	GENERAL LAYOUT PLAN
Original Size	A1
Drawing No:	12514693-G5005
Rev:	H



GEOTECHNICAL INVESTIGATION LOCATIONS		
ID	EASTING	NORTHING
TH001	391442.829	6369967.299
TH002	391468.323	6369921.841
TH003	391515	6369901.482
TH004	391557.617	6369872.64
TH005	391563.794	6369844.04
TH006	391613.931	6369816.693
TH007	391642	6369820.002
TH008	391679.108	6369742.841
TH009	391578.079	6369880.657
TH010	391502.838	6369945.524
TH011	391349.802	6370037.474
TH012	391354.494	6369958.748
TH013	391313.001	6369947.22
TH014	391261.544	6369932.418
CTH001	391540.625	6369822.275
CTH002	391613.617	6369791.452
CTH003	391631.034	6369754.707
CTH004	391661.16	6369766.891
CTH005	391713.673	6369816.113
CTH006	391382.978	6369977.026
CTH007	391412.121	6369933.852
CTH008	391459.951	6369913.22
CTH009	391489.094	6369870.046
CTH010	391536.924	6369849.415
CTH011	391465.606	6369864.877
CTH012	391450.203	6369846.228
CTH013	391486.784	6369831.23
CTH014	391531.301	6369803.998
CTH015	391508.164	6369779.104

NOTES

1. TEST HOLES LOCATED BY GPS. CARRIED OUT USING GPS METHODS. ACCURACY OF SURVEY IS ESTIMATED AT ±50mm.

LEGEND

- CTH00X MARCH 2022 CORE & TEST HOLES (CTH)
- TH00X MARCH 2022 TEST HOLES (TH)
- CTH00X SEPTEMBER 2022 CORE & TEST HOLES (CTH)
- TH00X SEPTEMBER 2022 TEST HOLES (TH)
- CTH00X OCTOBER 2022 CORE & TEST HOLES (CTH)

H	ISSUED FOR DEVELOPMENT APPROVAL		TE	GF	CS	18.09.23
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F	90% DDR REISSUE TO QS		TE	GF	CS	10.03.23
E	FOR INFORMATION					03.03.23
D	90% DDR ISSUE		TE	GF	CS	21.09.22
No	Revision	Note: * indicates signatures on original issue of drawing or last revision of drawing	Drawn	Job Manager	Project Director	Date

CLIENT:

 **Australian Government**
Department of Defence
Security and Estate Group

 **Newcastle Airport**
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Airport Pty Ltd
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PMCA:

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Designer G. FOK

Drafting Check D. WALKER
Design Check M. GENTILCORE

Approved (Project Director)
Date

Scale 1:1000

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Client **DEPARTMENT OF DEFENCE / NEWCASTLE AIRPORT**

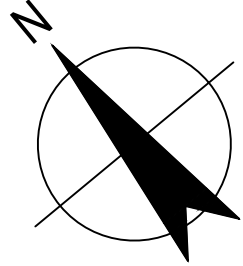
Project **EST01980 - P0008 NAW - 0908 RAAF WLM**

Title **GEOTECHNICAL INVESTIGATIONS LOCATION PLAN**

Original Size **A1**

Drawing No: **12514693-G5010**

Rev: **H**



LEGEND:

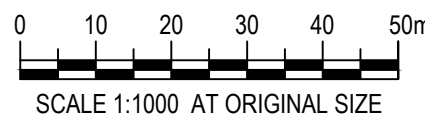
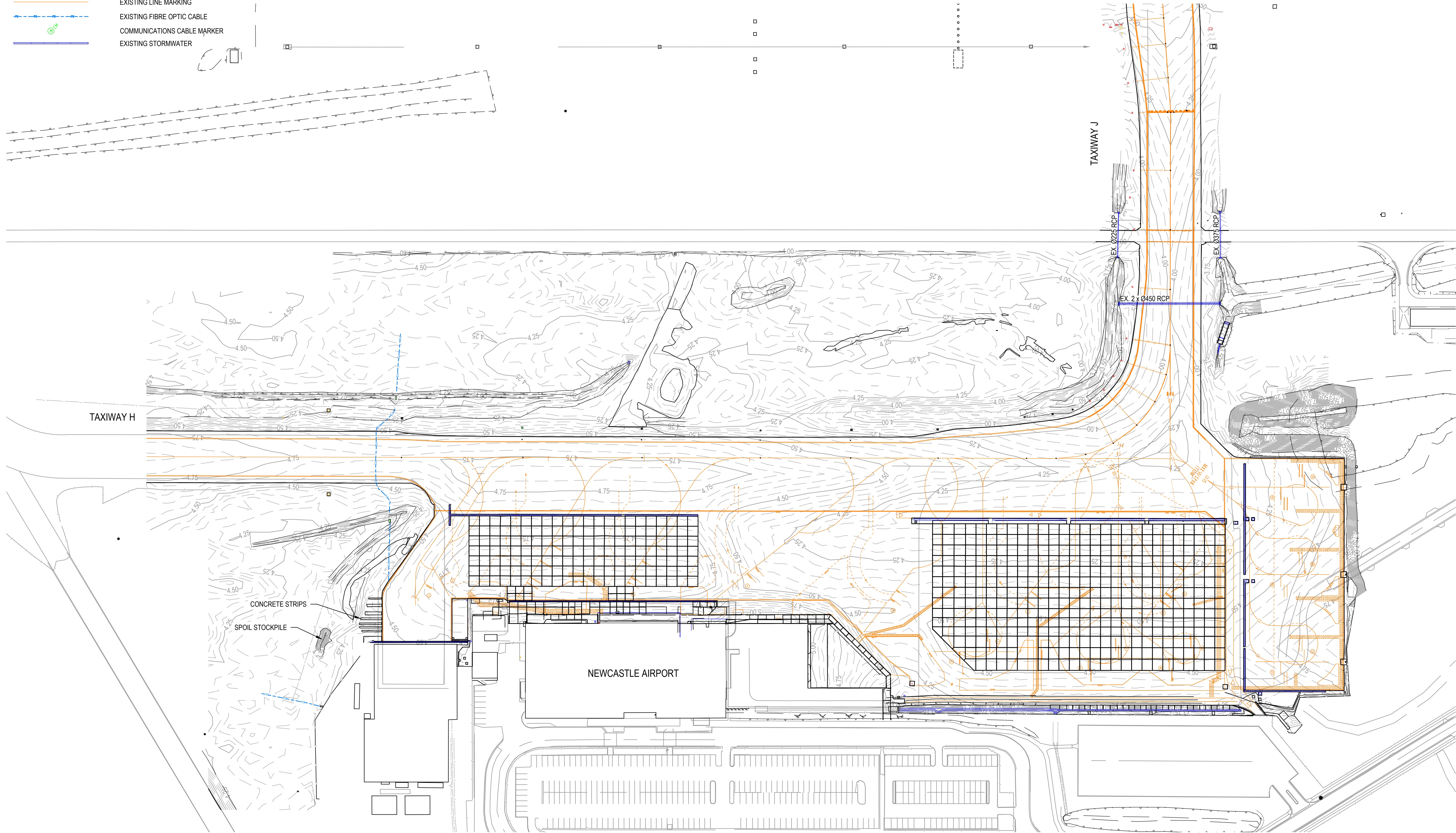
- 9.00 EXISTING MAJOR CONTOUR
- EXISTING MINOR CONTOUR
- EXISTING BOTTOM OF BANK
- EXISTING TOP OF BANK
- EXISTING DRAINAGE PIPE
- EXISTING FENCE
- EXISTING LIGHTING CABLE
- EXISTING DUCTING
- EXISTING LINE MARKING
- EXISTING FIBRE OPTIC CABLE
- COMMUNICATIONS CABLE MARKER
- EXISTING STORMWATER

NOTES:

- ALL DIMENSIONS IN METRES UNLESS NOTED OTHERWISE.
- DETAIL SURVEY PROVIDED BY MONTEATH AND POWYS DATED 20.04.2022 & 22.08.22.
- HORIZONTAL GRID COORDINATES ARE ADJUSTED PLANE. THE SURVEY IS ON RAAF CONTROL BASED ON PERMANENT SURVEY MARK (PSM) 238 (E: 391975.602, N: 6370133.289).
- ALL REDUCED LEVELS ARE BASED ON AUSTRALIAN HEIGHT DATUM (AHD).
- ORIGIN OF LEVELS PSM 238 RL 4.570 (AHD).
- CONTOURS SHOWN REPRESENT THE TOPOGRAPHY. CONTOURS DO NOT REPRESENT THE EXACT LEVEL AT ANY PARTICULAR POINT, EXCEPT AT SPOT LEVELS SHOWN.

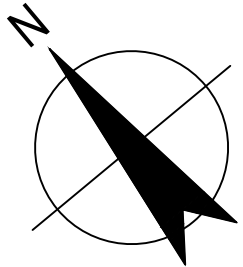
WARNING AND DISCLAIMER - EXISTING SERVICES

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G	90% DDR REISSUE	TE	GF	CS	30.06.23					Drafting Check D. WALKER	Design Check M. GENTILCORE		
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E	FOR INFORMATION				03.03.23					Scale 1:1000	This Drawing must not be used for Construction unless signed as Approved		
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LEGEND:

- PAVEMENT SHOULDER DEMOLITION
- ASPHALT PAVEMENT REMOVAL & RECONSTRUCTION
- ROAD PAVEMENT DEMOLITION
- SUMP DRAIN & HEADWALL DEMOLITION
- TEXTURING - COLD PLANE TO REMOVE SURFACE OF EXISTING ASPHALT TO MINIMUM DEPTH OF 10 mm
- MILLING - COLD PLANE TO REMOVE SURFACE OF EXISTING ASPHALT TO MINIMUM DEPTH OF 50 mm

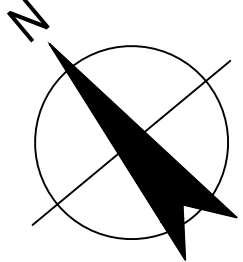
NOTE:

- GENERAL
- EXISTING APRON LINEMARKING TO BE REMOVED AND REMARKED ACCORDING TO LINEMARKING PLANS TO BE PROVIDED BY NAPL'S PLANNING CONSULTANT (AIRBIZ / AIRWORKS).
 - DEMOLISH EXISTING AGL WITHIN THE WORKS AREA IN ACCORDANCE WITH THE AGL SPECIFICATIONS.
 - FIBRE OPTIC SERVICES BELIEVED LIVE. DEMOLISH PITS AND TREAT AS PER NOTE 12 ON DRAWING 12514693-C5033.
 - CODE C CONCRETE APRON 400 mm THICK. 100 mm EDGE THICKENING ADJACENT GRATED DRAIN.
 - CODE E APRON 425 mm THICK WITH EDGE THICKENING FOR LAST 2.0 m. GRADING TO 525 mm THICK ADJACENT GRATED DRAIN STRUCTURE.
- TEXTURING
- PRIOR TO THE CONSTRUCTION OF ASPHALT OVERLAY, UNDERTAKE THE TEXTURING OF EXISTING ASPHALT SURFACE COURSE BY COLD PLANING MACHINE IN ACCORDANCE WITH THE SPECIFICATION.
 - TEXTURING OF THE SURFACE OF ASPHALT IS THE REMOVAL OF MATERIAL TO A DEPTH OF NOT LESS THAN 10 mm AND THE PRODUCTION OF SURFACE TEXTURE THAT IS SUFFICIENTLY COARSE TO PREVENT, UNDER THE ACTIONS OF AIRCRAFT TRAFFIC, SLIPPAGE OF ASPHALT OVERLAY CONSTRUCTED ON THE TEXTURED AREA.
 - PRIOR TO OVERLAY, TEXTURE THE WHOLE AREA OF EXISTING ASPHALT SURFACE THAT IS NOT MILLED OR PROFILED.
 - EXTENT OF COLD PLANING WORKS ARE INDICATIVE ONLY. CONTRACTOR MUST DETERMINE EXTENT ON SITE BASED ON SURVEY OF EXISTING PAVEMENT SURFACE LEVEL AND VERTICAL DESIGN.

- MILLING
- MILLING OF THE SURFACE OF ASPHALT IS THE REMOVAL OF A MATERIAL TO A UNIFORM DEPTH AND THE PRODUCTION OF SURFACE TEXTURE THAT IS SUFFICIENTLY COARSE TO PREVENT, UNDER THE ACTIONS OF AIRCRAFT TRAFFIC, SLIPPAGE IF THE ASPHALT REINSTATED IN THE MILLED AREA.
 - PRIOR TO ASPHALT OVERLAY, MILLING EXISTING ASPHALT TO REMOVE MATERIAL TO THE DEPTH AND EXTENT SHOWN ON THE DRAWINGS.



H ISSUED FOR DEVELOPMENT APPROVAL				TE	GF	CS	18.09.23	<div>CLIENT:</div> <div></div> <div>Australian Government</div> <div>Department of Defence</div> <div>Security and Estate Group</div> <div></div> <div>Newcastle Airport</div> <div>Newcastle Airport Pty Ltd</div> <div>Williamtown Drive NSW 2318</div> <div></div> <div>Beca</div> <div></div> <div>Level 4, 211 Victoria Square Adelaide SA 5000 Australia GPO Box 2052 Adelaide SA 5001 T 61 8 8111 6600 F 61 8 8111 6699 E admin@ghd.com.au W www.ghd.com</div> <div></div> <div>www.ghd.com</div> <div>Project No.</div>	<div>DO NOT SCALE</div> <div>GHD Pty Ltd</div> <div>Conditions of Use.</div> <div>This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.</div>		<div>Drawn T. EDEN</div> <div>Designer G. FOK</div>		<div>Client</div> <div>DEPARTMENT OF DEFENCE / NEWCASTLE AIRPORT</div> <div>Project</div> <div>EST01980 - P0008 NAW - 0908 RAAF WLM</div> <div>Title</div> <div>DEMOLITION PLAN - SHEET 1</div>				
G 90% DDR REISSUE				TE	GF	CS	30.06.23		<div>Drafting Check D. WALKER</div> <div>Design Check M. GENTILCORE</div>	<div>Approved (Project Director)</div> <div>Date</div>							
F 90% DDR REISSUE TO QS				TE	GF	CS	10.03.23		<div>Scale 1:1000</div> <div>This Drawing must not be used for Construction unless signed as Approved</div>								
E FOR INFORMATION							03.03.23										
D 90% DDR ISSUE				TE	GF	CS	21.09.22										
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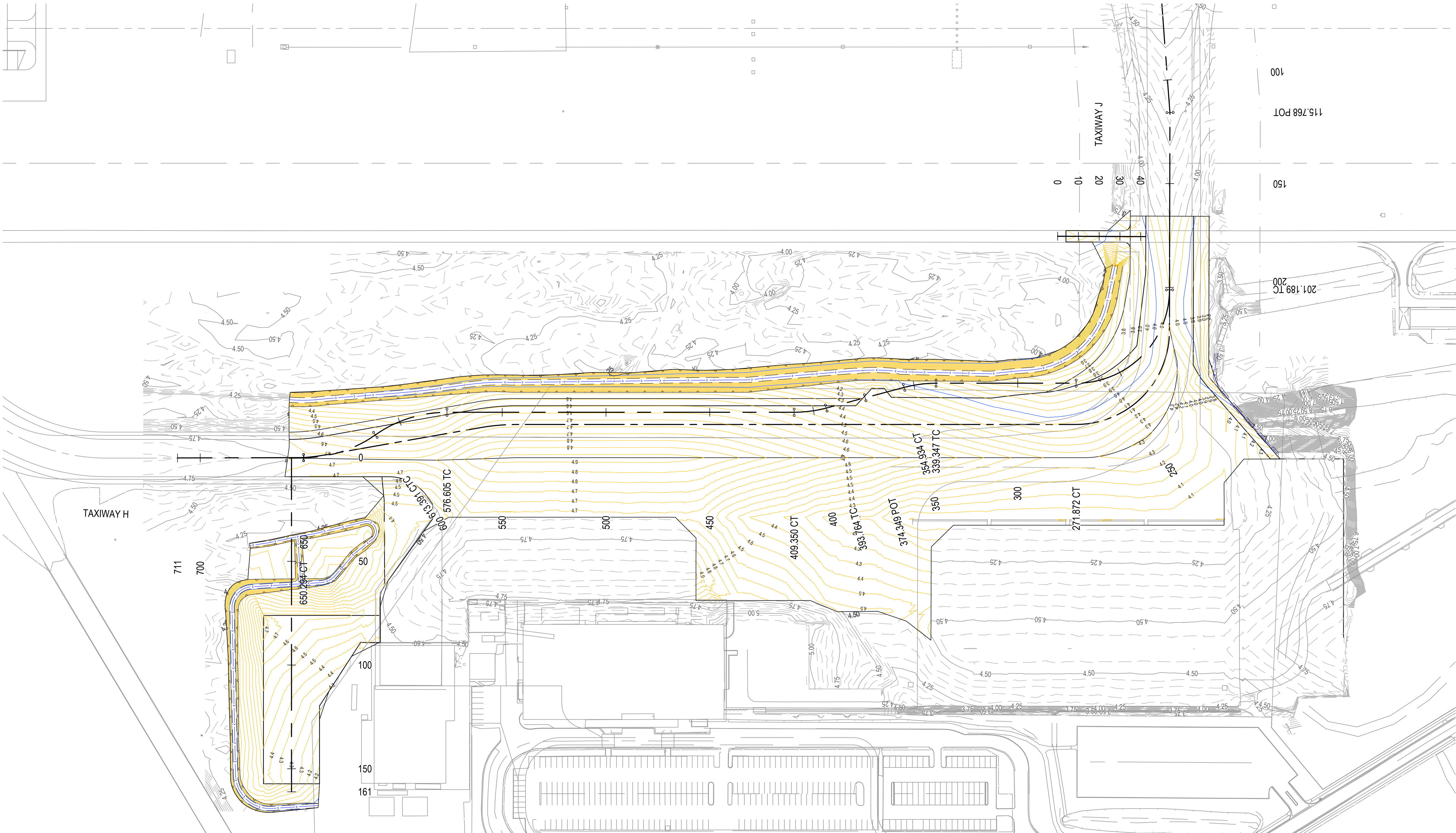


LEGEND:

- EXISTING MAJOR CONTOUR (0.5m INTERVALS)
- EXISTING MINOR CONTOUR (0.1m INTERVALS)
- DESIGN MAJOR CONTOURS (0.5m INTERVALS)
- DESIGN MINOR CONTOURS (0.1m INTERVALS)
- EDGE OF RUNWAY / TAXIWAY / APRON PAVEMENT
- EDGE OF RUNWAY / TAXIWAY / APRON SHOULDER
- EDGE OF EARTHWORKS
- RUNWAY GRADED PORTION OF STRIP

NOTES:

- ALL DIMENSIONS ARE IN METRES UNLESS NOTED OTHERWISE.
- WHERE REQUIRED, GRADE FLANKS LOCALLY TO ACCOMMODATE EXISTING HEADWALLS AND PITS. MATCH LEVELS.
- LOCALLY GRADE, ALTER, CUT BACK, AND/OR ADJUST EXISTING SITE WORKS AS REQUIRED SO THAT EXISTING ELEMENTS MATCH NEATLY TO NEW WORKS AND WITHOUT ABRUPT CHANGES IN LEVEL OR GRADE AS APPLICABLE.



0 10 20 30 40 50m
SCALE 1:1000 AT ORIGINAL SIZE

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No	Revision	Note: * indicates signatures on original issue of drawing or last revision of drawing	Drawn	Job Manager	Project Director	Date



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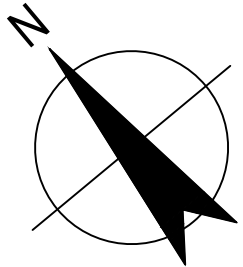
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Drafting Check	D. WALKER	Design Check	A. MACKAY
Approved (Project Director)	Date	Scale	AS SHOWN
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Client	DEPARTMENT OF DEFENCE / NEWCASTLE AIRPORT
Project	EST01980 - P0008 NAW - 0908 RAAF WLM
Title	FINAL SURFACE CONTOURS
Original Size	A1
Drawing No:	12514693-C5061
Rev:	H



LEGEND:

- CONTROL LINE
- EDGE OF PAVEMENT
- EDGE OF SHOULDER
- EDGE OF EARTHWORKS
- RUNWAY STRIP
- RUNWAY GRADED STRIP
- TAXIWAY STRIP
- TAXIWAY GRADED STRIP
- SWALE INVERT
- NEW AGL DUCT
- EXISTING AGL DUCT
- NEW EDGE LIGHT
- NEW CENTRELINE LIGHT

- EXISTING CENTRELINE LIGHT
- NEW SIT PIT
- NEW STORMWATER
- NEW MAG SIGN AND FOOTING
- NEW/RELOCATED GABLE MARKER
- EARTHING POINT (REMOVE AND REINSTATE)
- EXTENT OF PAVEMENT WORKS
- EXTENT OF EARTHWORKS
- APPROXIMATE LOCATION OF SERVICE TREATMENT

EXISTING SERVICES LEGEND:

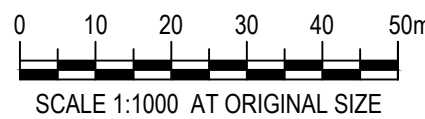
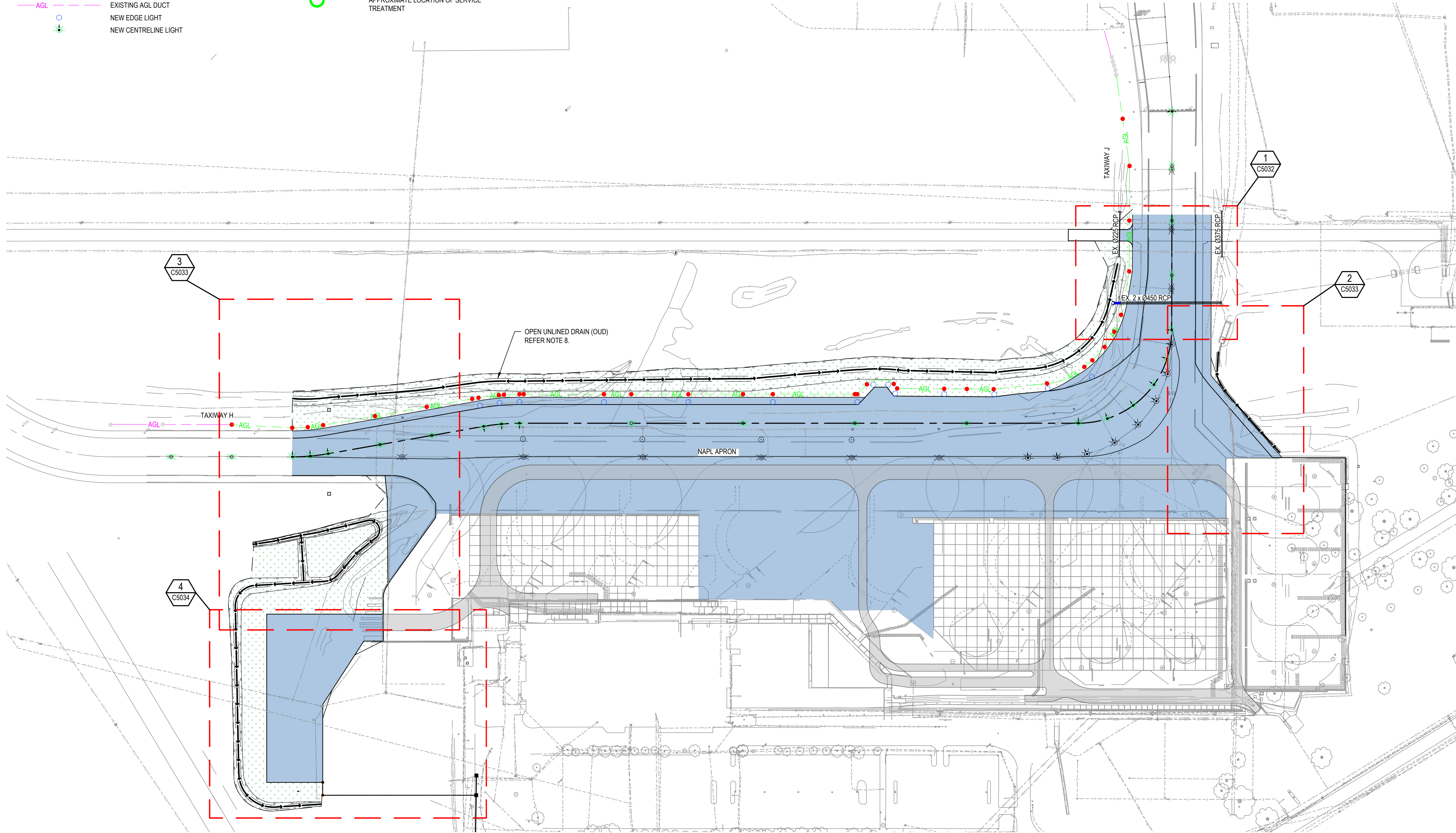
- EXISTING COMMUNICATIONS CABLE
- EXISTING TELEPHONE CABLE
- EXISTING WATER SUPPLY PIPE
- EXISTING ELECTRICAL CABLE
- EXISTING HIGH VOLTAGE ELECTRICAL CABLE
- EXISTING FIRE CONTROL CABLE
- EXISTING SEWERAGE PIPE
- EXISTING DRAINAGE PIPE
- EXISTING FIBRE OPTIC CABLE
- EXISTING FIRE SERVICES PIPE

NOTES:

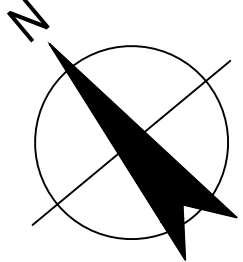
- ALL DIMENSIONS IN METRES UNLESS NOTED OTHERWISE.
- DETAIL SURVEY PROVIDED BY MONTEATH AND POWYS DATED 20.04.22 & 22.08.22
- EXISTING SURVEY INCLUDES DEPARTMENT OF DEFENCE GFIS SURVEY. GFIS SURVEY IS NOT CURRENT.
- HORIZONTAL GRID COORDINATES ARE ADJUSTED PLANE. THE SURVEY IS ON RAAF CONTROL BASED ON PERMANENT SURVEY MARK (PSM) 238 (E: 391975.602, N: 6370133.289).
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- ORIGIN OF LEVELS PSM 238 RL 4.570 (AHD).
- CONTOURS SHOWN REPRESENT THE TOPOGRAPHY. CONTOURS DO NOT REPRESENT THE EXACT LEVEL AT ANY PARTICULAR POINT, EXCEPT AT SPOT LEVELS SHOWN.
- DIMENSIONS FOR OUD 2.50m BASE WIDTH 1V : 6H SIDE SLOPES.

WARNING AND DISCLAIMER - EXISTING SERVICES

EXISTING SERVICES INFORMATION ON THIS DRAWING (ABOVE AND UNDERGROUND) IS DERIVED FROM DEFENCE DRG. 0908_RAAF_BASE_WILLIAMTOWN V58 PROVIDED ON 26-2-2021 AND NAPL 005-SITE SERVICES (2016). THIS INFORMATION IS INDICATIVE ONLY OF TYPE AND POSITION OF EXISTING SERVICES. THE DESIGN SERVICES CONSULTANT (DSC) DOES NOT WARRANT OR REPRESENT THAT IT IS ACCURATE AND THE CONTRACTOR MUST NOT RELY UPON IT. EXISTING SERVICES MAY EXIST THAT ARE NOT SHOWN AND HAVE NOT COME TO THE NOTICE OF THE DSC. BEFORE COMMENCING EARTHWORKS, THE CONTRACTOR MUST LOCATE AND EXPOSE EXISTING UNDERGROUND SERVICES AS SPECIFIED TO VERIFY TYPES AND POSITIONS. THE DSC DISCLAIMS RESPONSIBILITY FOR LOSS OF OR DAMAGE TO THE WORKS AND/OR INJURY TO ANY PERSON CAUSED DIRECTLY OR INDIRECTLY BY USE OF EXISTING SERVICES INFORMATION ON THIS DRAWING IN THE EXECUTION OF THE WORKS. IN CONSTRUCTING THE WORKS, THE CONTRACTOR MUST MAINTAIN AND ACHIEVE STATUTORY AND REGULATED CLEARANCES FROM EXISTING SERVICES.



H	ISSUED FOR DEVELOPMENT APPROVAL	TE	GF	CS	18.09.23	CLIENT:  Australian Government Department of Defence Security and Estate Group	 Newcastle Airport Newcastle Airport Pty Ltd Williamtown Drive NSW 2318	PMCA:  Beca	 Level 4, 211 Victoria Square Adelaide SA 5000 Australia GPO Box 2052 Adelaide SA 5001 T 61 8 8111 6600 F 61 8 8111 6699 E admin@ghd.com.au W www.ghd.com	 www.ghd.com	DO NOT SCALE GHD Pty Ltd Conditions of Use. This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.	Drawn	T. EDEN	Designer	G. FOK	Client	DEPARTMENT OF DEFENCE / NEWCASTLE AIRPORT EST01980 - P0008 NAW - 0908 RAAF WLM GENERAL CONSTRUCTION PLAN	
G	90% DDR REISSUE	TE	GF	CS	30.06.23							Drafting	D. WALKER	Design	M. GENTILCORE	Project		
F	90% DDR REISSUE TO QS	TE	GF	CS	10.03.23							Approved	(Project Director)	Date	Title			
E	FOR INFORMATION				03.03.23							Scale	1:1000	This Drawing must not be used for Construction unless signed as Approved				Original Size
D	90% DDR ISSUE	TE	GF	CS	21.09.22													A1
No	Revision	Note: * indicates signatures on original issue of drawing or last revision of drawing	Drawn	Job Manager	Project Director	Date						Drawing No: 12514693-C5031	Rev: H					



LEGEND:

- CONTROL LINE
- EDGE OF PAVEMENT
- EDGE OF SHOULDER
- EDGE OF EARTHWORKS
- RUNWAY STRIP
- RUNWAY GRADED STRIP
- TAXIWAY STRIP
- TAXIWAY GRADED STRIP
- SWALE INVERT
- AGL
- AGL
- EXISTING AGL DUCT
- NEW EDGE LIGHT
- NEW CENTRELINE LIGHT

- EXISTING CENTRELINE LIGHT
- NEW SIT PIT
- NEW STORMWATER
- EXISTING STORMWATER
- NEW MAG SIGN AND FOOTING
- EXISTING MAG SIGN AND FOOTING
- NEW/RELOCATED GABLE MARKER
- EARTHING POINT (REMOVE AND REINSTATE)
- EXTENT OF PAVEMENT WORKS
- EXTENT OF EARTHWORKS
- APPROXIMATE LOCATION OF SERVICE TREATMENT

EXISTING SERVICES LEGEND:

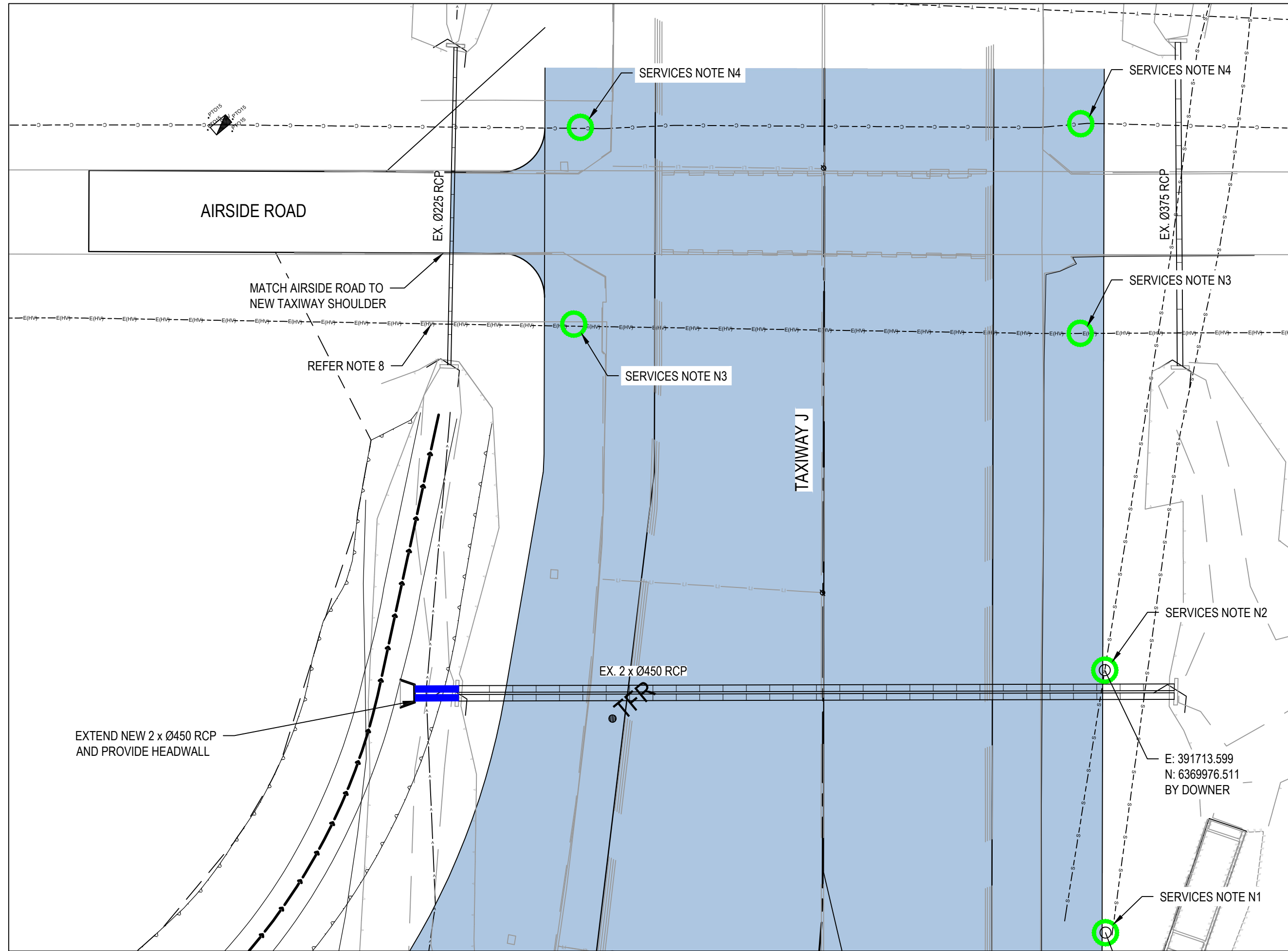
- EXISTING COMMUNICATIONS CABLE
- EXISTING TELEPHONE CABLE
- EXISTING WATER SUPPLY PIPE
- EXISTING ELECTRICAL CABLE
- EXISTING HIGH VOLTAGE ELECTRICAL CABLE
- EXISTING FIRE CONTROL CABLE
- EXISTING SEWERAGE PIPE
- EXISTING DRAINAGE PIPE
- EXISTING FIBRE OPTIC CABLE
- EXISTING FIRE SERVICES PIPE

NOTES:

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- CONTOURS SHOWN REPRESENT THE TOPOGRAPHY. CONTOURS DO NOT REPRESENT THE EXACT LEVEL AT ANY PARTICULAR POINT, EXCEPT AT SPOT LEVELS SHOWN.
- EXISTING AIRFIELD HV RING MAIN. EXTEND DUCT BANK 3.0m PAST EDGE OF NEW SHOULDER.
- EXISTING COMMUNICATIONS SERVICES DUCT BANK. EXTEND 3.0m PAST EDGE OF NEW SHOULDER (ALLOW 2.5m).
- FOR LONGITUDINAL SECTIONS FOR DRAIN 20 AND 21 REFER TO DRAWING C5093.
- PIPES SHALL BE VINIDEX STORMPRO SN8. REFER DRAWING C5035 AND S5009 FOR CONSTRUCTION DETAILS.

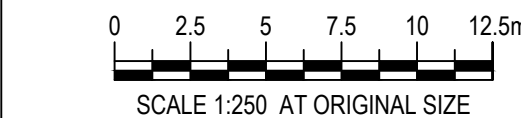
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SERVICE NOTES		
CLASH ID	SERVICE	COMMENT
N1	SEWER RISING MAIN	REPLACES SERVICES NOTE 24 ON DWG C2028. RL AT TOP OF MAIN IS 2.576 WHICH IS BELOW PAVEMENT
N2	SEWER RISING MAIN	REPLACES SERVICES NOTE 24 ON DWG C2082. RL AT TOP OF INNER MAIN 2.911 WHICH IS BELOW NEW DRAINAGE PIPE. OUTER MAIN IS ALSO EXPECTED TO BE BELOW DUE TO THE PROXIMITY TO THE EXISTING DRAINAGE PIPES
N3	HV RING MAIN	REPLACES SERVICES NOTE 22 ON DWG C2082. EXISTING AIRFIELD HV RING MAIN. CONFIRM EXTENT OF EXISTING DUCT BANK AND EXTEND 3.0m PAST EDGE OF NEW SHOULDER. ALLOW 8.0m EACH SIDE.
N4	COMMUNICATIONS	REPLACES SERVICES NOTE 23 ON DRAWING C2082. EXISTING COMMUNICATIONS SERVICES DUCT BANK. LOCATE EDGE OF EXISTING DUCT BANK AND EXTEND 3.0m PAST EDGE OF NEW SHOULDER. ALLOW 25.0m
N5	HV RING MAIN	ADJUST LOCALLY TO SUIT PASSAGE OF 225 DIA PIPE IN ACCORDANCE WITH HV CLEARANCE DETAILS ON DRAWING E3100

1 DETAIL
C5031 SCALE 1 : 250



G	ISSUED FOR DEVELOPMENT APPROVAL		TE	GF	CS	18.09.23
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D	90% DDR ISSUE		TE	GF	CS	21.09.22
C	90% DDR ISSUE TO QS		TE	GF	CS	01.09.22
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CLIENT:



Australian Government
Department of Defence
Security and Estate Group



Newcastle Airport
Newcastle Airport Pty Ltd
Williamtown Drive
NSW 2318

PMCA:



Beca



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E admail@ghd.com.au W www.ghd.com

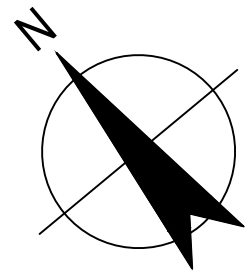


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Project No.

DO NOT SCALE		Drawn	T. EDEN	Designer	G. FOK
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	Approved (Project Director)	Date			
	Scale	1:250	This Drawing must not be used for Construction unless signed as Approved		

Client	DEPARTMENT OF DEFENCE / NEWCASTLE AIRPORT				
Project	EST01980 - P0008 NAW - 0908 RAAF WLM				
Title	GENERAL CONSTRUCTION DETAIL PLAN SHEET 1				
Original Size	A1	Drawing No:	12514693-C5032		Rev: G



LEGEND:

- CONTROL LINE
- EDGE OF PAVEMENT
- EDGE OF SHOULDER
- EDGE OF EARTHWORKS
- RUNWAY STRIP
- RUNWAY GRADED STRIP
- TAXIWAY STRIP
- TAXIWAY GRADED STRIP
- SWALE INVERT
- NEW AGL DUCT
- EXISTING AGL DUCT
- NEW EDGE LIGHT
- NEW CENTRELINE LIGHT
- EXISTING CENTRELINE LIGHT
- NEW SIT PIT
- NEW STORMWATER
- EXISTING STORMWATER
- NEW MAG SIGN AND FOOTING
- EXISTING MAG SIGN AND FOOTING
- NEW/RELOCATED GABLE MARKER
- EARTHING POINT (REMOVE AND REINSTATE)
- EXTENT OF PAVEMENT WORKS
- EXTENT OF EARTHWORKS
- APPROXIMATE LOCATION OF SERVICE TREATMENT

EXISTING SERVICES LEGEND:

- EXISTING COMMUNICATIONS CABLE
- EXISTING TELEPHONE CABLE
- EXISTING WATER SUPPLY PIPE
- EXISTING ELECTRICAL CABLE
- EXISTING HIGH VOLTAGE ELECTRICAL CABLE
- EXISTING FIRE CONTROL CABLE
- EXISTING SEWERAGE PIPE
- EXISTING DRAINAGE PIPE
- EXISTING FIBRE OPTIC CABLE
- EXISTING FIRE SERVICES PIPE

NOTES:

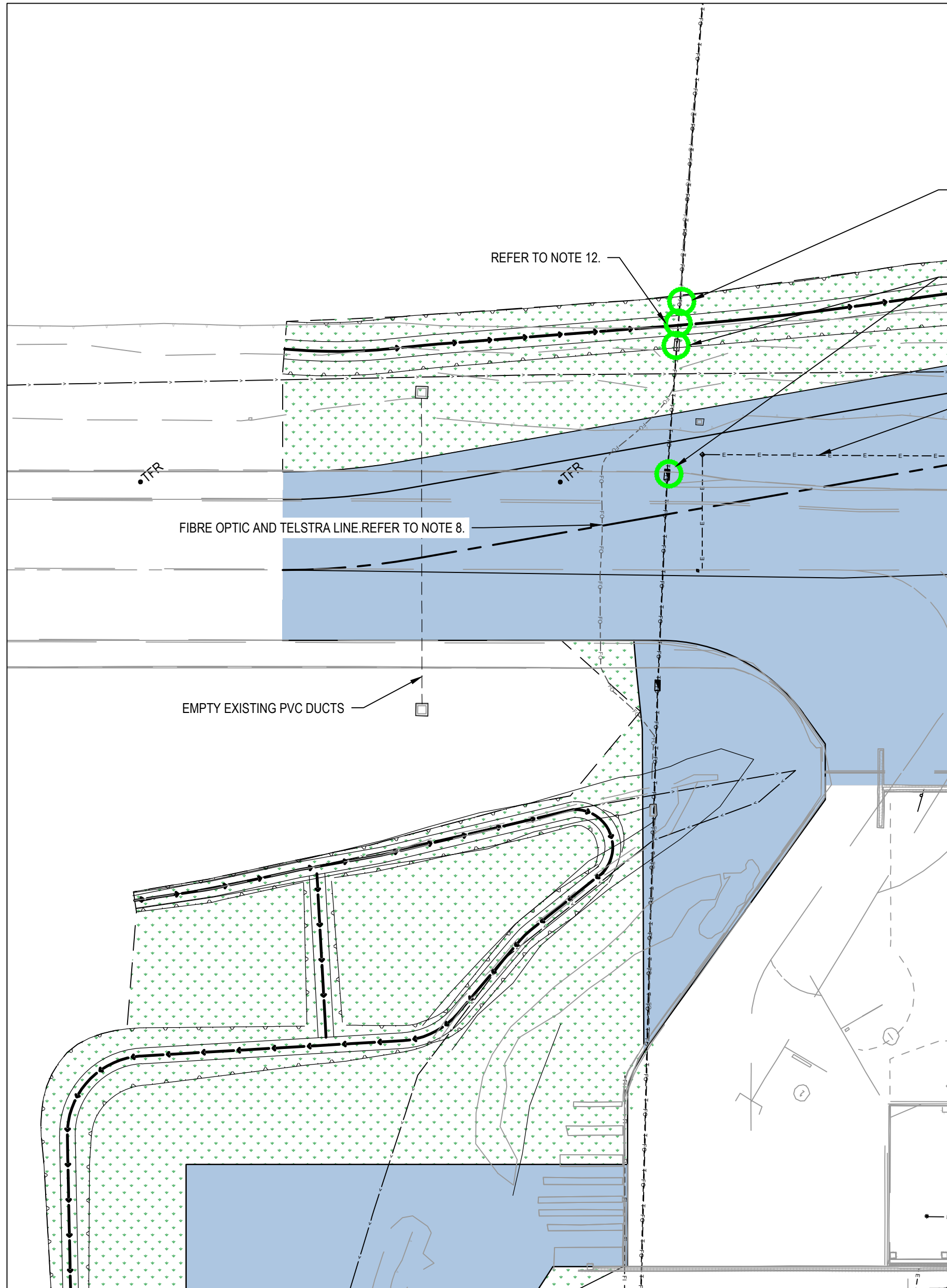
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- EXISTING TELSTRA AND FIBRE OPTIC LINE. ADVICE FROM ADVANCED COMMUNICATION IS THAT SERVICE MAY STILL BE LIVE. CONTRACTOR TO CONFIRM. PROTECT CONDUITS DURING CONSTRUCTION.
- LOCATE END OF PIPE AT EXISTING PAVEMENT EDGE PRIOR TO CONSTRUCTION AND CONFIRM REDUNDANT. SEEK DIRECTION IF NOT REDUNDANT.
- EXISTING PITS WITHIN PAVEMENT TO BE DEMOLISHED WHILST PROTECTING CABLES, AND INSERT SPLIT CONDUIT SECTIONS OVER CABLES AT THE PIT LOCATION. WRAP

SPLIT CONDUIT SECTION WITH DENSO WRAP TO MINIMIZE WATER INGRESS AND ENCASE SPLIT CONDUIT SECTION WITH 3 MPa CLSM.

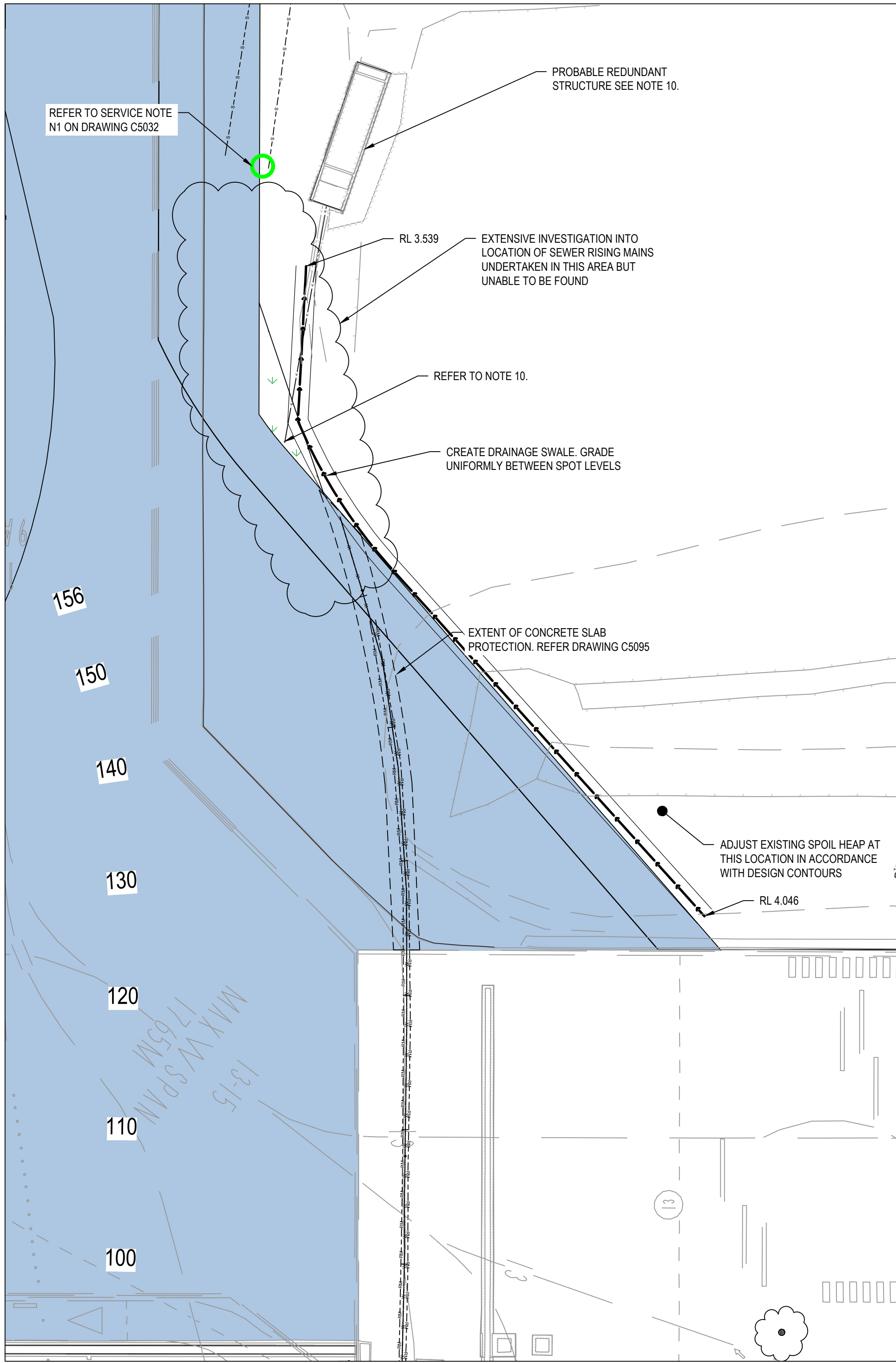
- DESIGN LEVELS INDICATE THAT COMMUNICATIONS SERVICE SHOULD BE BELOW DRAIN INVERT. CONTRACTOR TO SEEK DIRECTION IF DIFFERENT.

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3 DETAIL
C5031 SCALE 1 : 500



2 DETAIL
C5031 SCALE 1 : 250

0 2.5 5 7.5 10 12.5m
SCALE 1:250 AT ORIGINAL SIZE

0 5 10 15 20 25m
SCALE 1:500 AT ORIGINAL SIZE

G	ISSUED FOR DEVELOPMENT APPROVAL		TE	GF	CS	18.09.23
F	90% DDR REISSUE		TE	GF	CS	30.06.23
E	90% DDR REISSUE TO QS		TE	GF	CS	10.03.23
D	90% DDR ISSUE		TE	GF	CS	21.09.22
C	90% DDR ISSUE TO QS		TE	GF	CS	01.09.22
No	Revision	Note: * indicates signatures on original issue of drawing or last revision of drawing	Drawn	Job Manager	Project Director	Date

CLIENT:



Australian Government
Department of Defence
Security and Estate Group



Newcastle Airport
Newcastle Airport Pty Ltd
Williamstown Drive
NSW 2318

PMCA:



Level 4, 211 Victoria Square
Adelaide SA 5000 Australia
GPO Box 2052 Adelaide SA 5001
T 61 8 8111 6600 F 61 8 8111 6699
E admin@ghd.com.au W www.ghd.com

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Drawn T. EDEN

Designer G. FOK

Drafting Check D. WALKER

Design Check M. GENTILCORE

Approved (Project Director) Date

Scale VARIES

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Client

Project

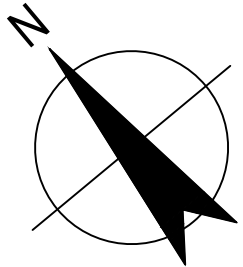
Title

Original Size

DEPARTMENT OF DEFENCE / NEWCASTLE AIRPORT
EST01980 - P0008 NAW - 0908 RAAF WLM
GENERAL CONSTRUCTION DETAIL PLAN
SHEET 2

A1 Drawing No: 12514693-C5033

Rev: G



LEGEND:

	CONTROL LINE
	EDGE OF PAVEMENT
	EDGE OF SHOULDER
	EDGE OF EARTHWORKS
	RUNWAY STRIP
	RUNWAY GRADED STRIP
	TAXIWAY STRIP
	TAXIWAY GRADED STRIP
	SWALE INVERT
	NEW AGL DUCT
	EXISTING AGL DUCT
	NEW EDGE LIGHT
	NEW CENTRELINE LIGHT
	EXISTING CENTRELINE LIGHT
	NEW SIT PIT
	NEW STORMWATER
	EXISTING STORMWATER
	NEW MAG SIGN AND FOOTING
	EXISTING MAG SIGN AND FOOTING
	NEW/RELOCATED GABLE MARKER
	EARTHING POINT (REMOVE AND REINSTATE)
	EXTENT OF PAVEMENT WORKS
	EXTENT OF EARTHWORKS
	APPROXIMATE LOCATION OF SERVICE TREATMENT
	NEW KERB
	DIRECTION OF FLOW

EXISTING SERVICES LEGEND:

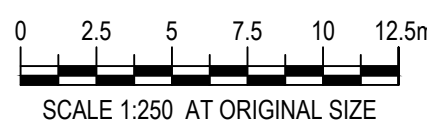
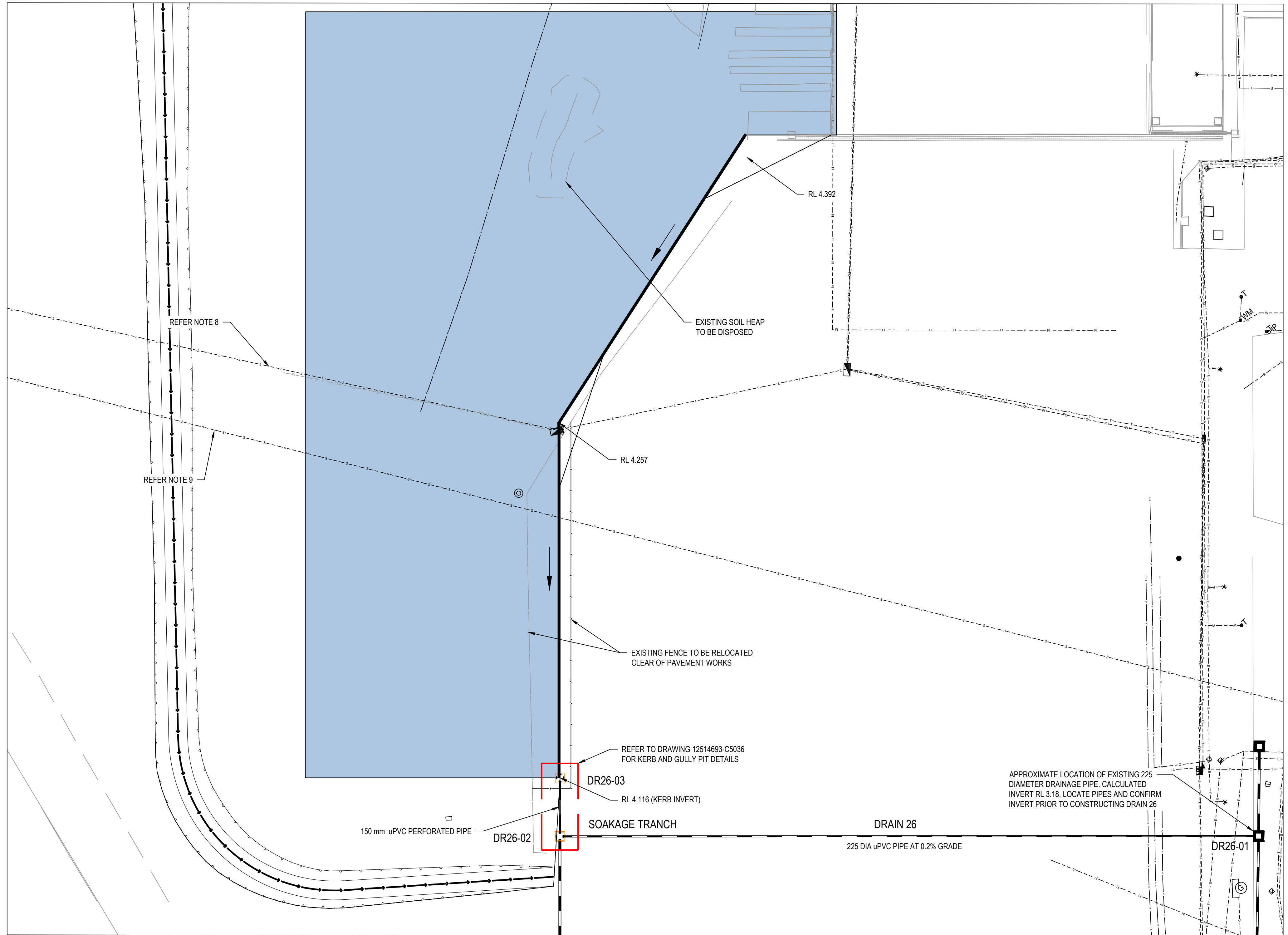
	EXISTING COMMUNICATIONS CABLE
	EXISTING TELEPHONE CABLE
	EXISTING WATER SUPPLY PIPE
	EXISTING ELECTRICAL CABLE
	EXISTING HIGH VOLTAGE ELECTRICAL CABLE
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	EXISTING DRAINAGE PIPE
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- EXISTING TELSTRA AND FIBRE OPTIC LINE ASSESSED AS REDUNDANT BY ADVANCED COMMUNICATION SERVICES. WHERE PITS OR DUCTS ARE ENCOUNTERED, DEMOLISH OR REMOVE AS REQUIRED.
- EXISTING SEWER RISING MAIN UNABLE TO BE LOCATED IN FIELD. CONFIRM IF REDUNDANT.

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4 DETAIL
C5031 SCALE 1:250

G ISSUED FOR DEVELOPMENT APPROVAL				TE	GF	CS	18.09.23	<div>CLIENT:</div> <div></div> <div>Australian Government</div> <div>Department of Defence</div> <div>Security and Estate Group</div>	<div></div> <div>Newcastle Airport</div> <div>Newcastle Airport Pty Ltd</div> <div>Williamtown Drive NSW 2318</div>	<div>PMCA:</div> <div></div> <div>Beca</div>	<div></div> <div>Level 4, 211 Victoria Square Adelaide SA 5000 Australia GPO Box 2052 Adelaide SA 5001 T 61 8 8111 6600 F 61 8 8111 6699 E adimail@ghd.com.au W www.ghd.com</div>	<div></div> <div>www.ghd.com</div> <div>Project No.</div>	DO NOT SCALE		Drawn T. EDEN	Designer G. FOK	Client Project Title Original Size	DEPARTMENT OF DEFENCE / NEWCASTLE AIRPORT EST01980 - P0008 NAW - 0908 RAAF WLM GENERAL CONSTRUCTION DETAIL PLAN SHEET 3	Drawing No: 12514693-C5034	Rev: G
F 90% DDR REISSUE	TE	GF	CS	30.06.23	Drafting Check D. WALKER	Design Check M. GENTILCORE														
E 90% DDR REISSUE TO QS	TE	GF	CS	10.03.23	Approved (Project Director) Date															
D 90% DDR ISSUE	TE	GF	CS	21.09.22	Scale 1:250															
B 90% DDR ISSUE TO QS	TE	GF	CS	01.09.22	This Drawing must not be used for Construction unless signed as Approved															
No Revision	Note: * indicates signatures on original issue of drawing or last revision of drawing	Drawn	Job Manager	Project Director	Date															

NEW LIGHTS:

○

ELEVATED OMNI-DIRECTIONAL LIGHT

⊗

INSET BI-DIRECTIONAL SYMMETRICAL LIGHT

⊗

INSET BI-DIRECTIONAL ASYMMETRICAL LIGHT WITH LIGHT BEAM TOE-IN IN DIRECTION OF ARROW

⊗

INSET UNI-DIRECTIONAL ASYMMETRICAL LIGHT WITH LIGHT BEAM TOE-IN TO THE RIGHT IN DIRECTION OF ARROW

LIGHT COLOURS (LED OR FILTER):

■

WHITE

■

GREEN

■

YELLOW

■

BLUE

■

RED

FOR ALL NEW LIGHTS, PROVIDE WITH NEW SECONDARY CABLE, SECONDARY CONNECTORS AND SIT.

■

AREA OF PAVEMENT WORKS.

EXISTING LIGHTS:

⊗

INSET BI-DIRECTIONAL SYMMETRICAL LIGHT

⊗

INSET BI-DIRECTIONAL ASYMMETRICAL LIGHT WITH LIGHT BEAM TOE-IN IN DIRECTION OF ARROW

MAG

MOVEMENT AREA GUIDANCE SIGN

R

EXISTING LIGHT TOP AND LIGHT BASE TO BE REMOVED. PLACE IN STORAGE AS A SPARE

xxx/nn

CIRCUIT AND NUMBER OF LIGHT.
xxx = CIRCUIT.
nn = NUMBER.

LIGHT NUMBERING SHOWN ON THE DRAWINGS DO NOT PURPORT TO INDICATE THE SEQUENCE OF WIRING LIGHTS OR THE REQUIRED CIRCUIT NAME. THE NAME AND NUMBERS ARE FOR CONTRACT REFERENCE ONLY. FINAL CIRCUIT NAMES SHALL BE IN ACCORDANCE WITH SITE REQUIREMENTS. LIGHTS SHALL BE CONNECTED IN NUMERICAL SEQUENCE. NAME AND NUMBER LIGHTS ACCORDINGLY. REFER TO EXISTING CIRCUIT LABELING NOTE ON DRAWING 12514693-E5032.

GENERAL NOTES:

1. ALL NEW AIRFIELD LIGHTING CABLE SHALL BE ENCLOSED IN EITHER EXISTING OR NEW CONDUIT AND CLEARLY IDENTIFIED AT ALL POINTS OF ACCESS. (REFER DETAILS SHEETS).
2. NEW AIRFIELD LIGHTING CONDUITS SHALL BE ELECTRICAL HD UPVC. REFER TO UNDERGROUND SERVICES DETAILS DRAWING. DRAW WIRES SHALL BE LEFT IN ALL CONDUITS TO FACILITATE THE INSTALLATION OF FUTURE CABLES.
3. AIRFIELD LIGHTING CONDUITS PASSING BENEATH AIRCRAFT PAVEMENTS AND ROADWAYS SHALL EXTEND IN ALL CASES CLEAR OF PAVEMENT EDGE AND TERMINATE IN PULL PITS.
4. THE CONTRACTOR IS RESPONSIBLE FOR LOCATING ANY EXISTING OR NEW SERVICES SHOWN ON ANY OF THE CONTRACT PLANS PRIOR TO PERFORMING ANY NEW WORKS.
5. THE CONTRACTOR IS RESPONSIBLE FOR ENSURING THAT ALL NON LEVEL DEPENDANT SERVICES CLEAR LEVEL DEPENDANT SERVICES OR DRAINAGE WORKS AS SPECIFIED.
6. IN GENERAL, AIRFIELD LIGHTING CABLES SHALL PASS OVER THE TOP OF CIVIL SERVICES AND BENEATH OTHER ELECTRICAL CABLES AND SERVICES WHERE SUCH INTERSECT. (THIS REQUIREMENT DOES NOT APPLY TO ABANDONED CABLING). WHERE COMMUNICATIONS CABLING IS INVOLVED, A MINIMUM CLEARANCE OF 500mm SHALL BE MAINTAINED.
7. THE LOCATION OF EXISTING LIGHTS AND THE ROUTE OF EXISTING CABLES, CONDUITS AND DUCTS SHOWN ON THESE DRAWINGS HAVE BEEN DETERMINED FROM HISTORIC SITE DRAWINGS. THE LOCATION OF EXISTING LIGHTS AND THE ROUTE OF EXISTING CABLES, CONDUITS AND DUCTS MAY PROVE INACCURATE. HOWEVER, THE INFORMATION HAS BEEN INCLUDED TO PROVIDE AN INDICATION OF THE LOCATION OF EXISTING LIGHTS, CABLING, PITS AND DUCTS. OTHER LIGHTS AND CABLING MAY EXIST IN THE AREA.
8. RETURN ALL REMOVED LIGHT FITTINGS BACK TO THE DEPARTMENT OF DEFENCE.

CABLING:

AGL

NEW AGL PIT AND DUCT SYSTEM (MULTIPLE CONDUITS SHOWN AS A SINGLE LINE FOR REASONS OF CLARITY).

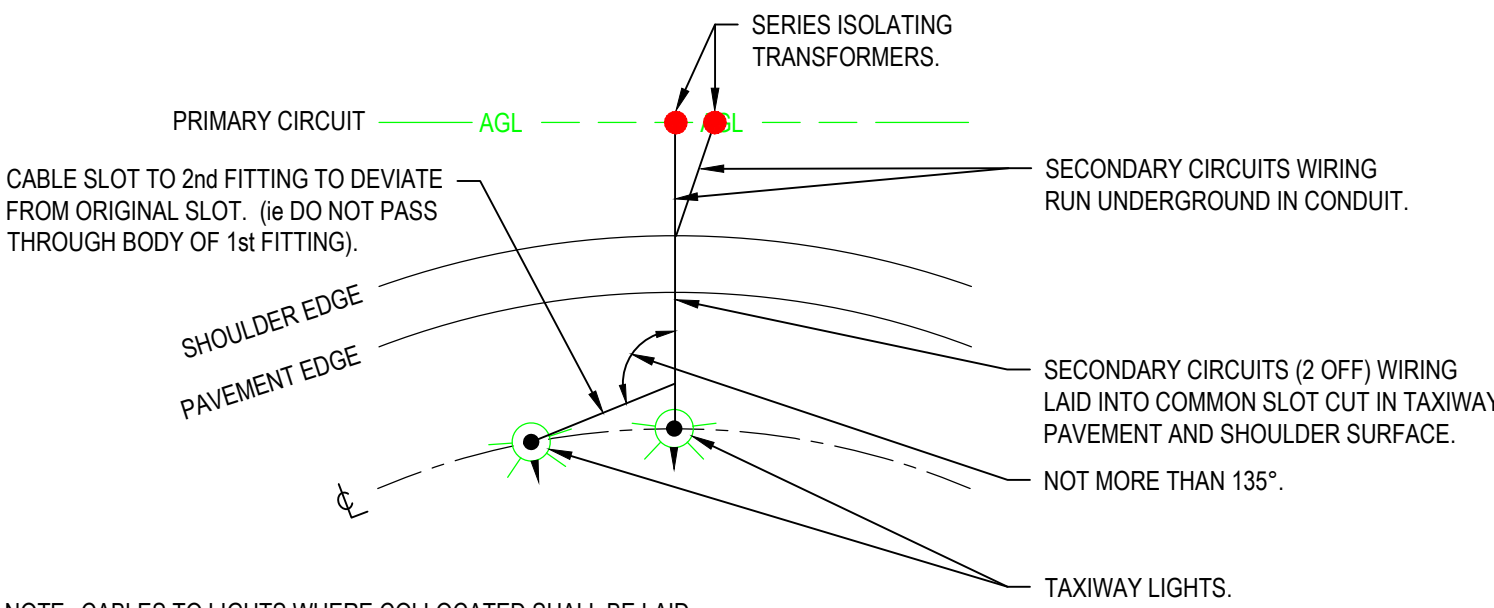
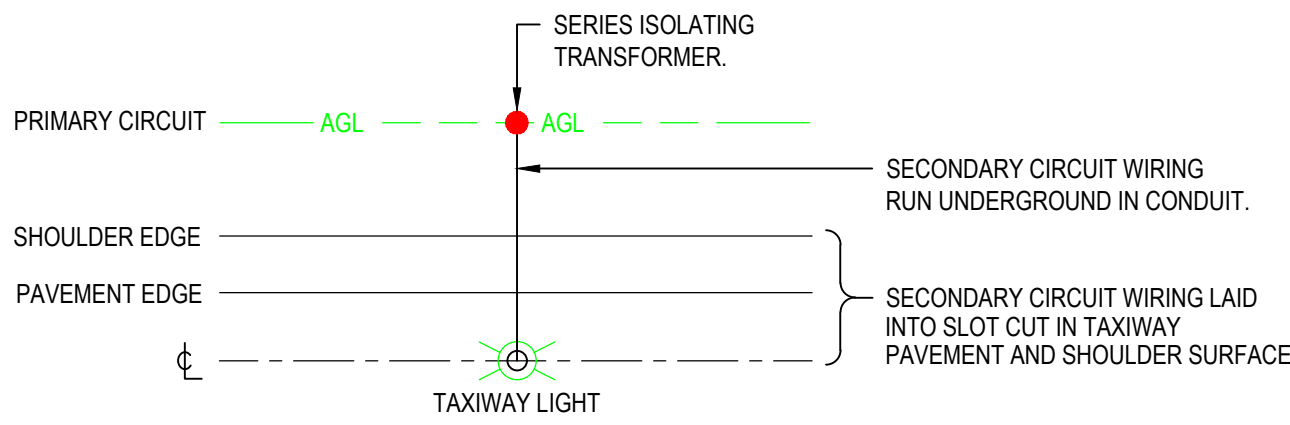
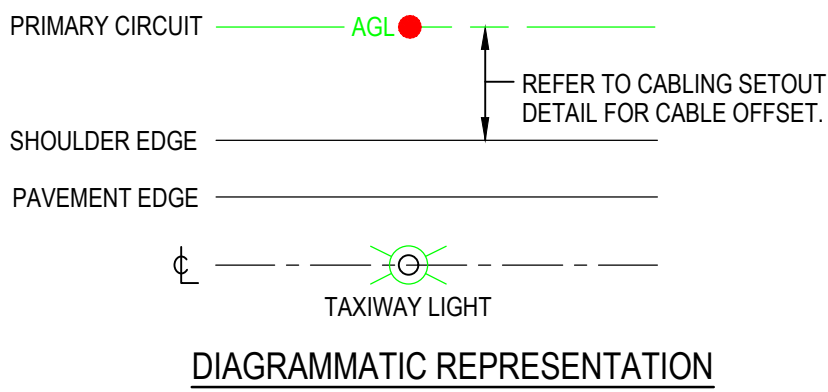
AGL

EXISTING AGL PIT AND DUCT SYSTEM (MULTIPLE CONDUITS SHOWN AS A SINGLE LINE FOR REASONS OF CLARITY).

NOTE:

FOR CLARITY, SERIES ISOLATION TRANSFORMERS (SITs) AND ASSOCIATED SECONDARY CABLING TO EACH AIRFIELD LIGHT HAVE NOT BEEN SHOWN ON THE DRAWINGS. ONE SIT IS REQUIRED FOR EACH AND EVERY LAMP. IN GENERAL, SITs SHALL BE LOCATED OPPOSITE TO EACH LIGHT, PERPENDICULAR TO THE TAXIWAY OR APRON. SEE DETAILS BELOW. WHERE IT IS NOT POSSIBLE OR PRACTICABLE TO LOCATE SITs IN A PERPENDICULAR OPPOSITE LOCATION, SITs SHALL BE LOCATED IN A SUITABLE ADJACENT LOCATION.

PRIMARY CABLE ALIGNMENT SHOWN ON CIRCUIT DETAILS DRAWING IS DIAGRAMMATIC ONLY. REFER TO UNDERGROUND SERVICES DRAWING FOR ACTUAL REQUIREMENTS.



PITS:

●

SIT PIT

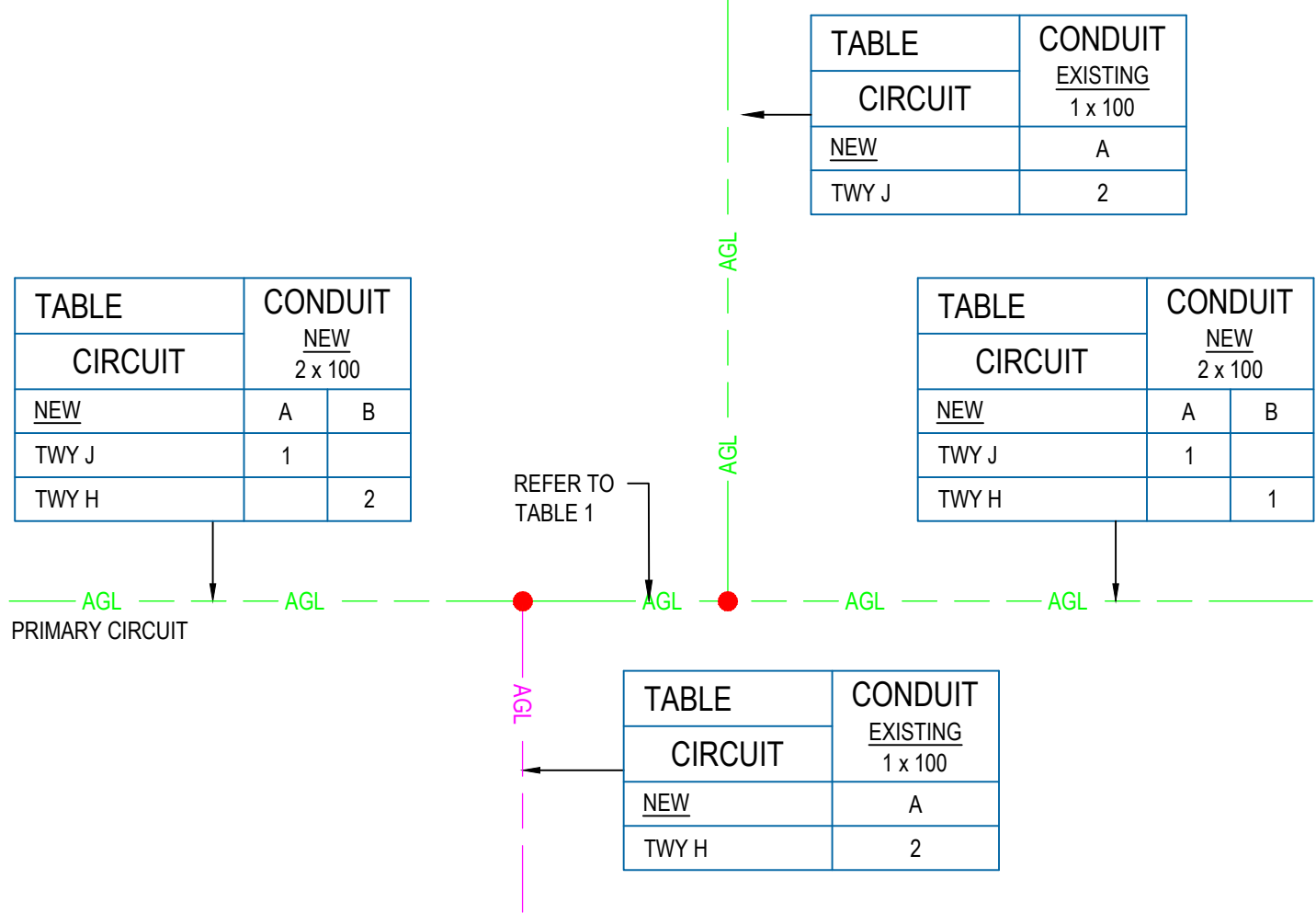
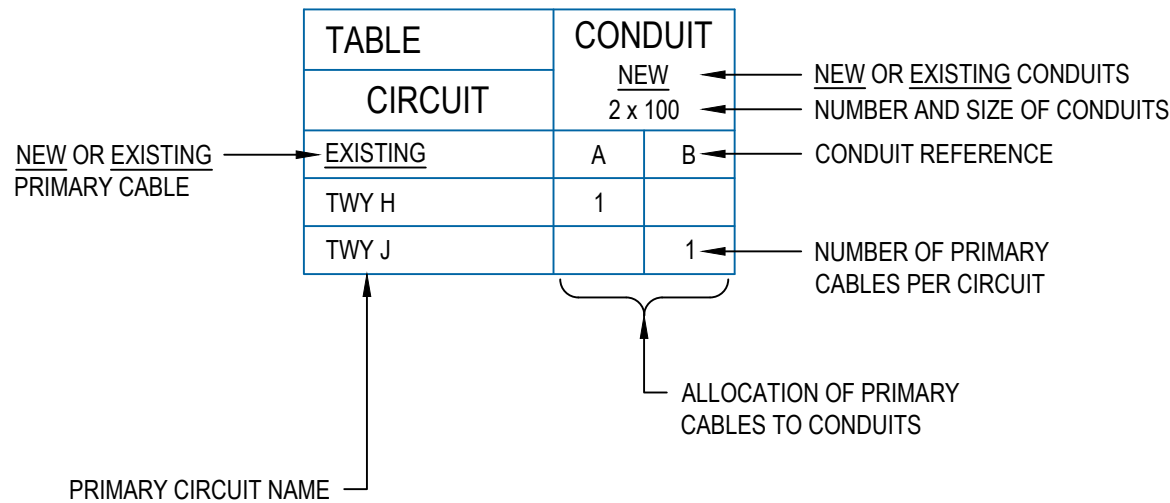
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EXISTING SIT PIT

●

EXISTING PIT

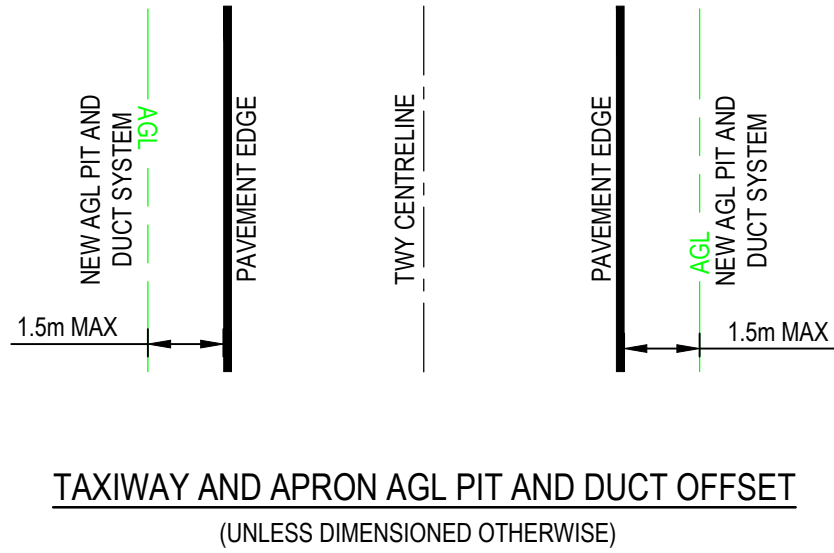
NOTE: ALL NEW SERIES ISOLATION TRANSFORMER (SIT) PITS THAT SUPPLY A LIGHT SHALL ALSO HAVE NEW SECONDARY CABLE BETWEEN LIGHT AND SIT, ENCLOSED IN NEW CONDUIT TO PAVEMENT EDGE.



CONDUIT / PRIMARY CIRCUIT IDENTIFICATION TABLES:

NOTES:

1. NEW PIT AND DUCT SYSTEM SHALL BE INSTALLED A MAXIMUM OF 1.5m FROM TWY J, TWY H AND NAPL APRON PAVEMENT EDGE. REFER TO DRAWINGS 12514693-E5021 AND 12514693-E5022 FOR DISTANCE AND ARRANGEMENT.
2. COORDINATE WITH DRAINAGE SERVICES AND DRAINAGE SWALE FOR BEST LOCATION.



CABLING SETOUT DETAIL

H	ISSUED FOR DEVELOPMENT APPROVAL		SK	GF	CS	18.09.23
G	90% DDR REISSUE		SK	GF	CS	28.06.23
F	90% DDR REISSUE TO QS		DC	GF	CS	10.03.23
E	FOR INFORMATION					03.03.23
D	90% DDR ISSUE		DC	GF	CS	19.09.22
No	Revision	Note: * indicates signatures on original issue of drawing or last revision of drawing	Drawn	Job Manager	Project Director	Date

Plot Date: 18 September 2023 - 4:07 PM Plotted by: Susan Kandel

Cad File No: G:\33\12514693\CADD\Drawings\12514693-E5002.dwg

CLIENT:



Australian Government
Department of Defence
Security and Estate Group



Newcastle Airport
Newcastle
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PMCA:



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Drawn S.KANDEL

Drafting Check D. WALKER

Approved (Project Director)
Date

Scale NTS

Designer L.BAKER

Design Check J.CHESTERMAN

Client

Project

Title

Original Size

DEPARTMENT OF DEFENCE
EST01980 - P0008 NAW - 0908 RAAF WLM
AERONAUTICAL GROUND LIGHTING
LEGEND AND NOTES

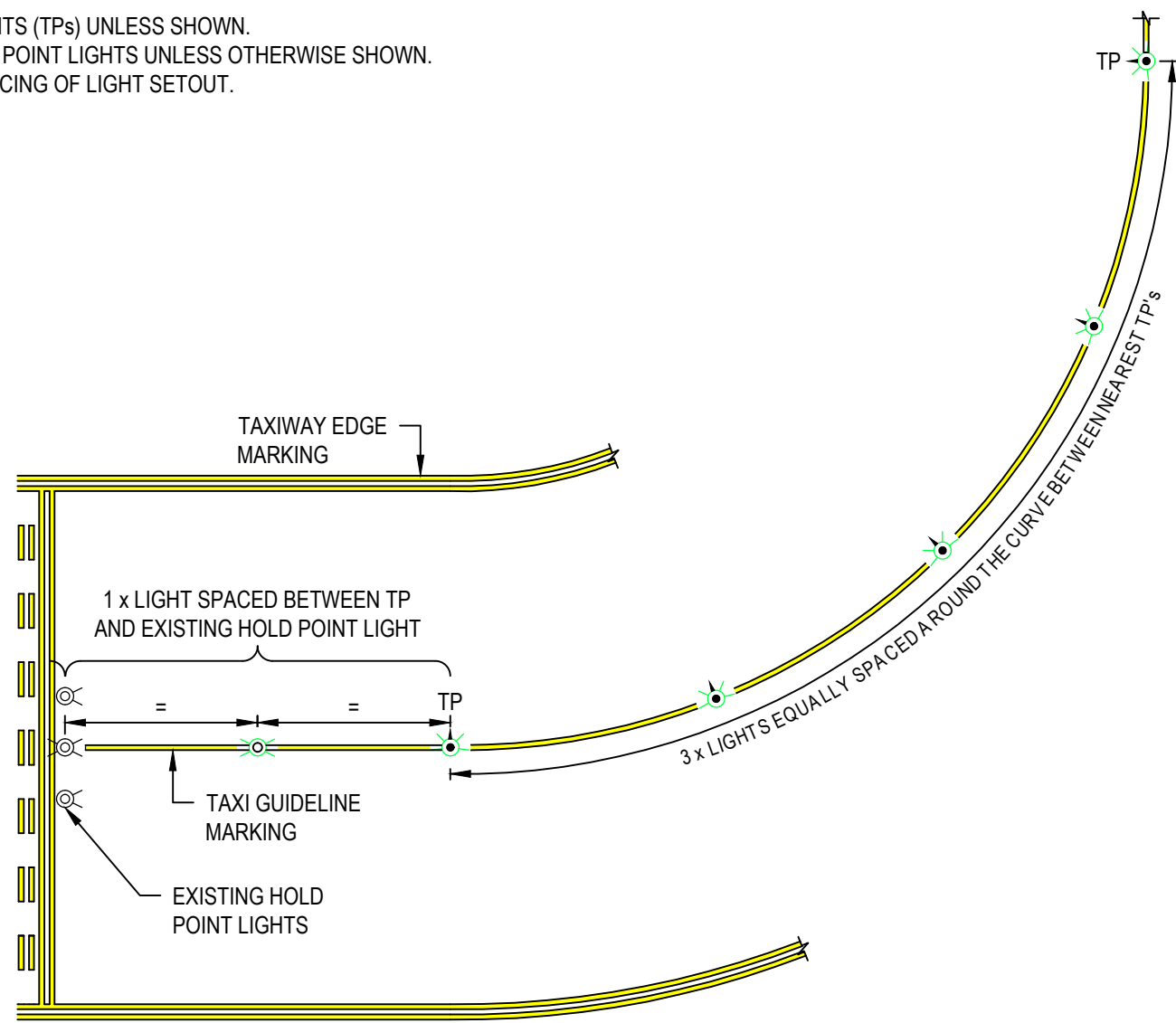
A1

Drawing No: 12514693-E5002

Rev: H

NOTES:

1. LIGHTS SHALL BE EQUALLY SPACED BETWEEN TANGENT POINTS (TPs) UNLESS SHOWN.
2. LIGHTS SHALL BE EQUALLY SPACED BETWEEN TPs AND HOLD POINT LIGHTS UNLESS OTHERWISE SHOWN.
3. HOLD POINT LIGHTS SHALL BE CONSIDERED AS A TP FOR SPACING OF LIGHT SETOUT.



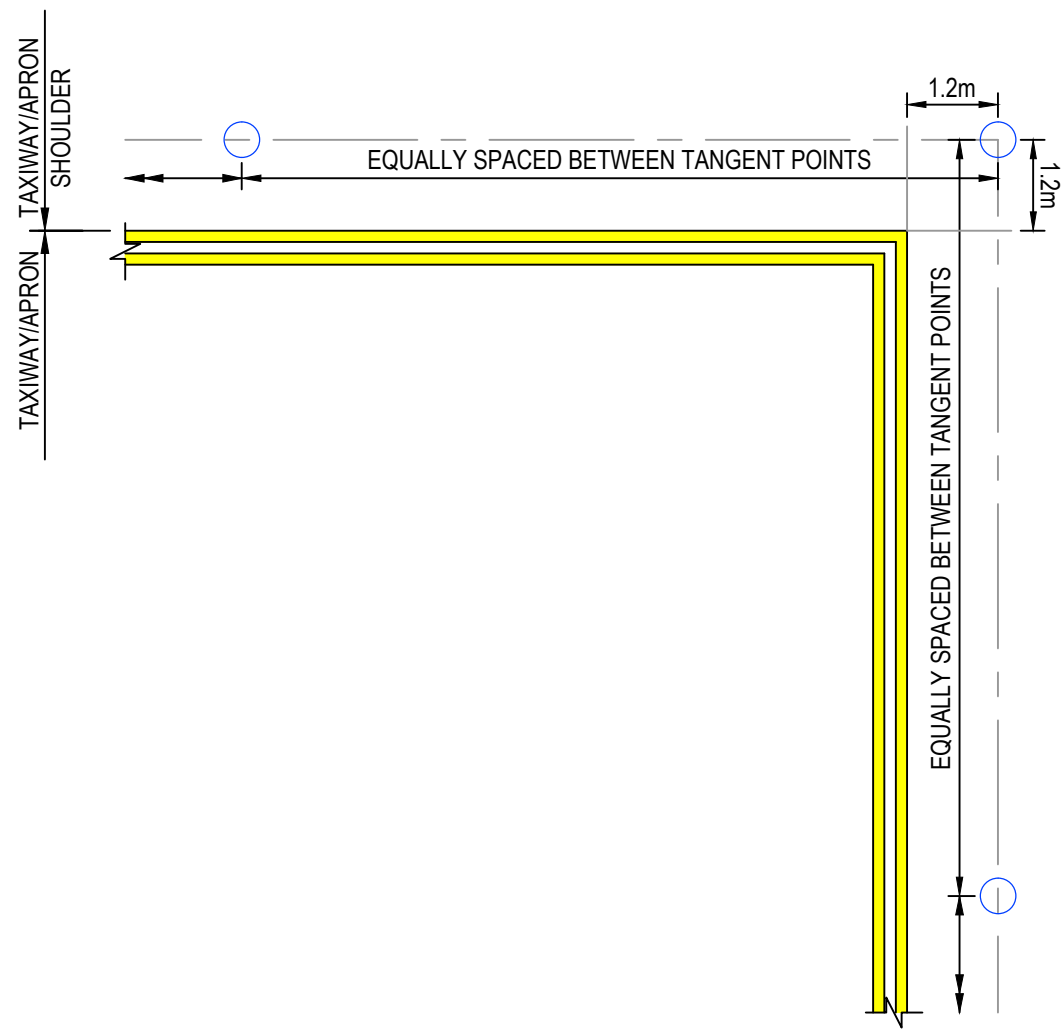
INDICATIVE TAXIWAY CENTRELINE LIGHTING SETOUT DETAIL

SCALE 1:200

NOTES:

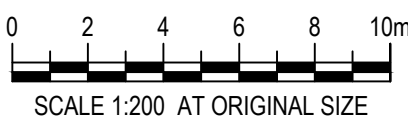
1. DEFINE ALL OUTER EDGE OF LINE MARKING CORNERS FROM THE LINE MARKING DESIGN (EASTING AND NORTHING).
SETOUT: POSITION LIGHTS ON EACH CORNER OFFSET NOMINALLY AT 1.2m.

EQUALLY SPACE REQUIRED LIGHTS (DESIGNED) ALONG THE LINE MARKING BETWEEN CORNERS.



1 DETAIL
SCALE 1 : 100

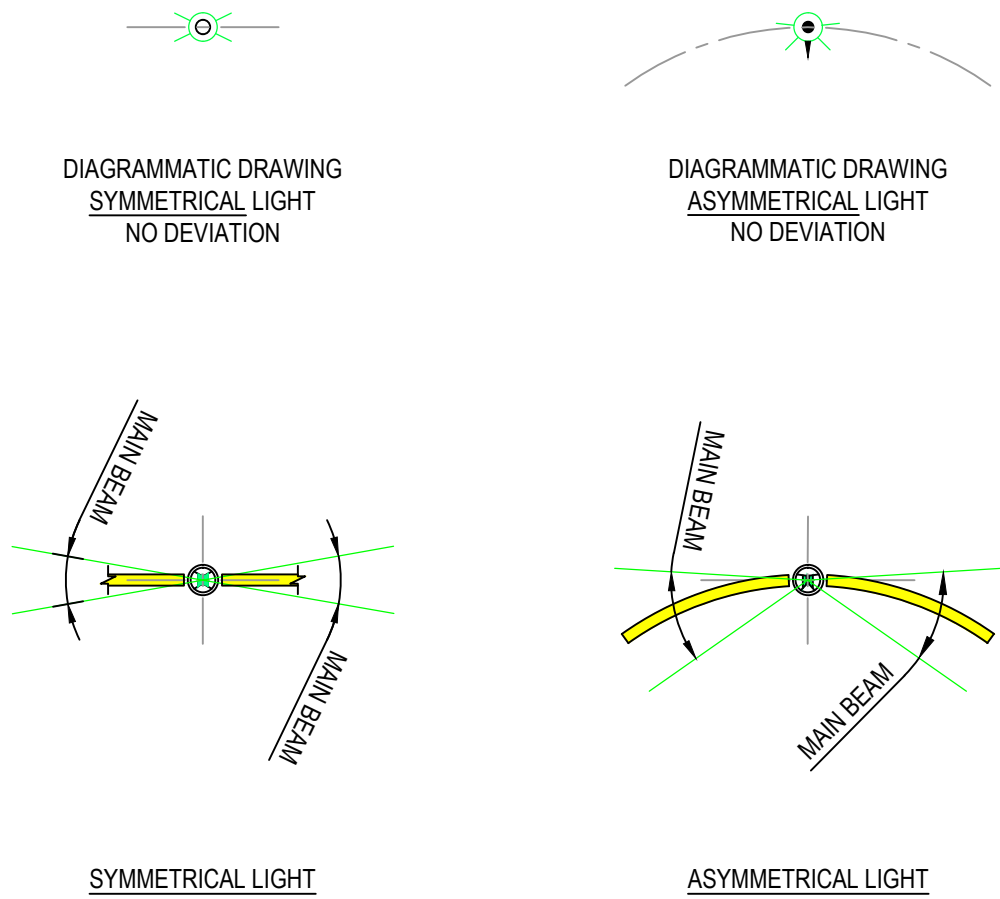
TAXIWAY/APRON EDGE LIGHT SETOUT



NOTES:

SYMMETRICAL FITTINGS SHALL BE ALIGNED WITH THE CENTRELINE OR ALONG TANGENT TO TAXIWAY CENTRELINE, WHERE ASSOCIATED WITH CURVES.

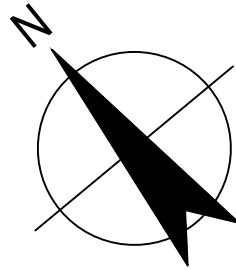
ASYMMETRICAL FITTINGS SHALL BE ALIGNED TRANSVERSE TO CENTRELINE OF FITTING ALONG TAXIWAY CENTRELINE OR ALONG TANGENT TO TAXIWAY CENTRELINE, WHERE ASSOCIATED WITH CURVES.



4 DETAIL
SCALE 1 : 100

TAXIWAY LIGHTS SETOUT

H	ISSUED FOR DEVELOPMENT APPROVAL	SK	GF	CS	18.09.23	<div>CLIENT:</div> <div><div>Australian Government</div><div>Department of Defence</div><div>Security and Estate Group</div></div> <div><div>Newcastle Airport</div><div>Newcastle Airport Pty Ltd</div><div>Williamtown Drive NSW 2318</div></div>	<div>PMCA:</div> <div><div>Beca</div></div> <div><div>Level 4, 211 Victoria Square Adelaide SA 5000 Australia GPO Box 2052 Adelaide SA 5001 T 61 8 8111 6600 F 61 8 8111 6699 E admail@ghd.com.au W www.ghd.com</div></div> <div><div>www.ghd.com</div></div> <div>Project No.</div>	<div>DO NOT SCALE</div> <div>GHD Pty Ltd</div> <div>Conditions of Use.</div> <div>This document may only be used by GHD's client (and any other person who GHD has agreed can use this document) for the purpose for which it was prepared and must not be used by any other person or for any other purpose.</div>	<div>Drawn</div> <div>S.KANDEL</div>	<div>Designer</div> <div>L.BAKER</div>	<div>Client</div> <div>DEPARTMENT OF DEFENCE</div> <div>Project</div> <div>EST01980 - P0008 NAW - 0908 RAAF WLM</div> <div>Title</div> <div>AERONAUTICAL GROUND LIGHTING STANDARD SETOUT DETAILS</div> <div>Original Size</div> <div>A1</div> <div>Drawing No:</div> <div>12514693-E5004</div> <div>Rev:</div> <div>H</div>
G	90% DDR REISSUE	SK	GF	CS	28.06.23			<div>Drafting Check</div> <div>D.WALKER</div>	<div>Design Check</div> <div>J.CHESTERMAN</div>		
F	90% DDR REISSUE TO QS	DC	GF	CS	10.03.23			<div>Approved (Project Director)</div> <div>Date</div>			
E	FOR INFORMATION				03.03.23			<div>Scale</div> <div>AS SHOWN</div>			
D	90% DDR ISSUE	DC	GF	CS	19.09.22			<div>This Drawing must not be used for Construction unless signed as Approved</div>			
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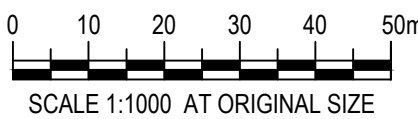
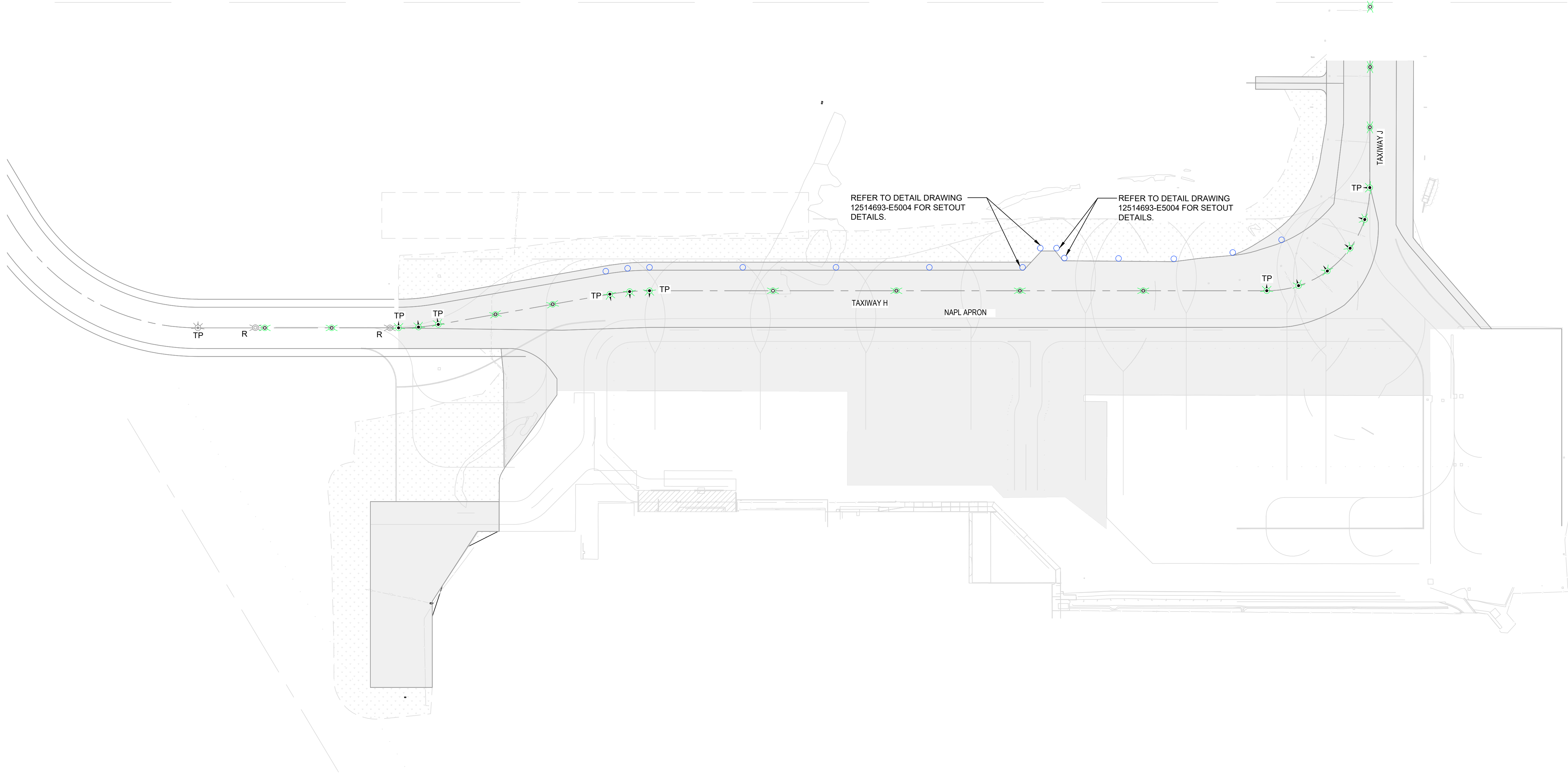
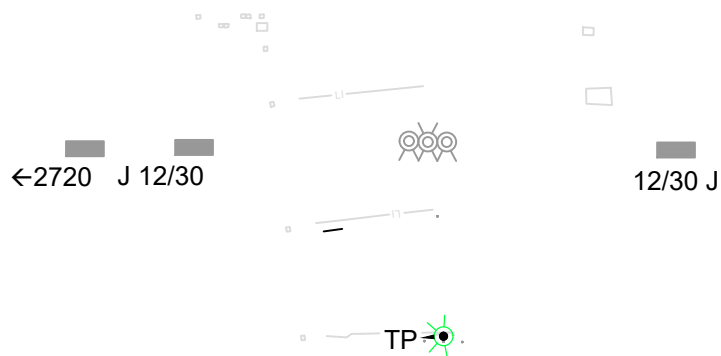


NOTES:

- DIMENSIONS IN MILLIMETRES UNLESS SHOWN OTHERWISE.
- PIT AND DUCT LOCATIONS INDICATED SHOWN DIAGRAMMATICALLY FOR REASONS OF CLARITY. ACTUAL LOCATIONS SHALL BE DETERMINED ON-SITE TO SUIT SITE CONDITIONS.
- REFER TO DRAWING 12514693-E5002 FOR LEGEND OF SYMBOLS.
- REFER TO DRAWINGS 12514693-E5004 / E5005 FOR SETOUT DETAILS.

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H	ISSUED FOR DEVELOPMENT APPROVAL		SK	GF	CS	18.09.23
G	90% DDR REISSUE		SK	GF	CS	28.06.23
F	90% DDR REISSUE TO QS		DC	GF	CS	10.03.23
E	FOR INFORMATION					03.03.23
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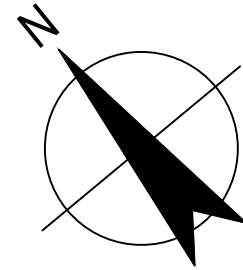
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Drafting Check	D. WALKER	Design Check	J.CHESTERMAN
Approved (Project Director)	Date	This Drawing must not be used for Construction unless signed as Approved	
Scale	1:1000		

Client	DEPARTMENT OF DEFENCE
Project	EST01980 - P0008 NAW - 0908 RAAF WLM
Title	AERONAUTICAL GROUND LIGHTING SETOUT DETAILS - SHEET 1
Original Size	A1
Drawing No:	12514693-E5011
Rev:	H



NOTES:

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- PIT AND DUCT LOCATIONS INDICATED SHOWN DIAGRAMMATICALLY FOR REASONS OF CLARITY. ACTUAL LOCATIONS SHALL BE DETERMINED ON-SITE TO SUIT SITE CONDITIONS.
- REFER TO DRAWING 12514693-E5002 FOR LEGEND OF SYMBOLS

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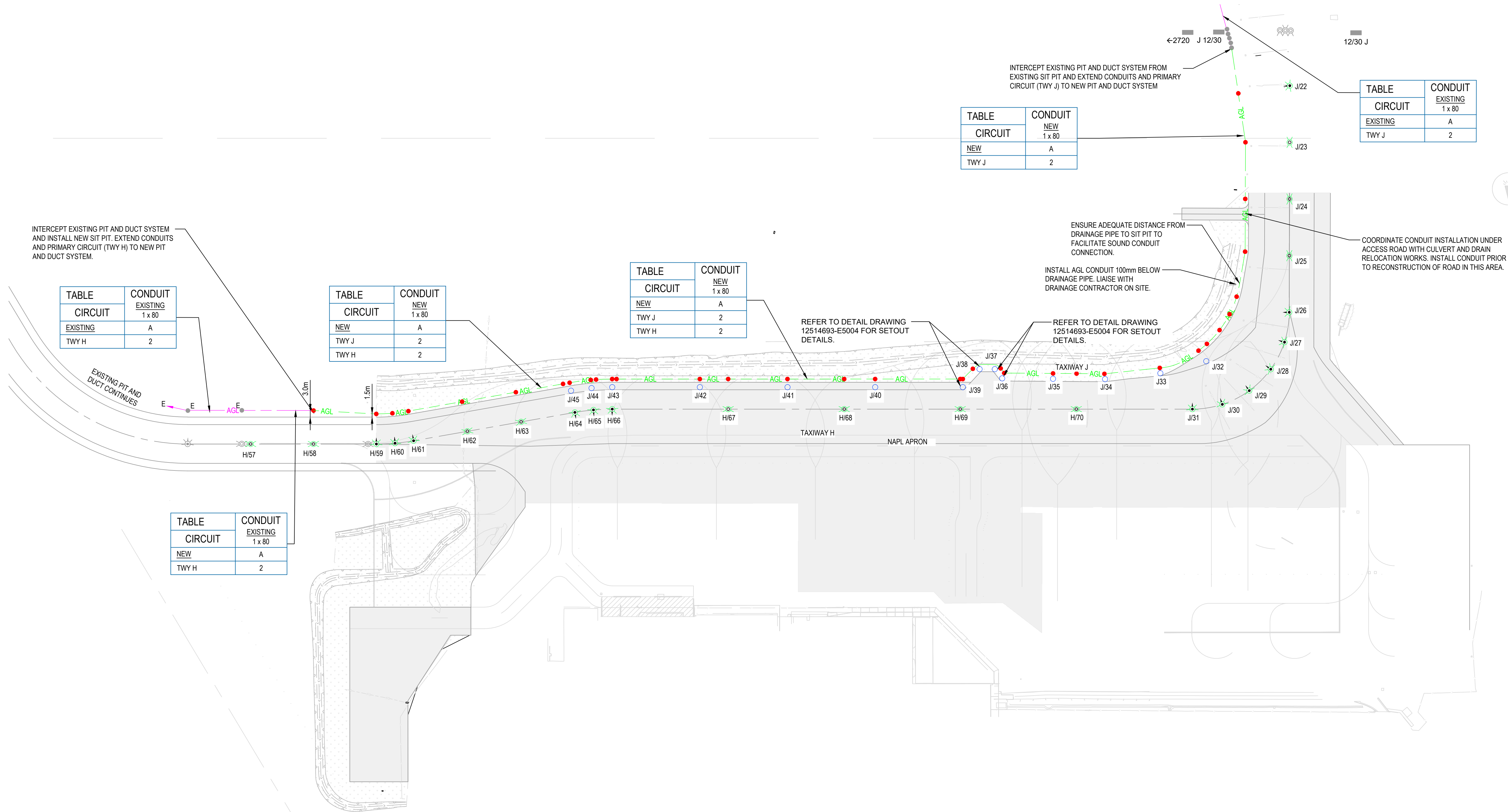


TABLE	CONDUIT
CIRCUIT	NEW 1 x 80
NEW	A
TWY J	2

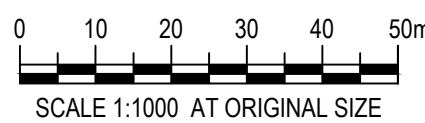
TABLE	CONDUIT
CIRCUIT	EXISTING 1 x 80
EXISTING	A
TWY J	2

TABLE	CONDUIT
CIRCUIT	EXISTING 1 x 80
EXISTING	A
TWY H	2

TABLE	CONDUIT
CIRCUIT	NEW 1 x 80
NEW	A
TWY J	2
TWY H	2

TABLE	CONDUIT
CIRCUIT	NEW 1 x 80
NEW	A
TWY J	2
TWY H	2

TABLE	CONDUIT
CIRCUIT	EXISTING 1 x 80
NEW	A
TWY H	2




H	ISSUED FOR DEVELOPMENT APPROVAL		SK	GF	CS	18.09.23
G	90% DDR REISSUE		SK	GF	CS	28.06.23
F	90% DDR REISSUE TO QS		DC	GF	CS	10.03.23
E	FOR INFORMATION					03.03.23
D	90% DDR ISSUE		DC	GF	CS	19.09.22
No	Revision	Note: * indicates signatures on original issue of drawing or last revision of drawing	Drawn	Job Manager	Project Director	Date


CLIENT:


 **Australian Government**
Department of Defence
Security and Estate Group

 **Newcastle Airport**
Newcastle
Airport Pty Ltd
Williamtown Drive
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PMCA:

 **Beca**

 **GHD**
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Drafting Check D.WALKER Design Check J.CHESTERMAN

Approved (Project Director) Date

Scale 1:1000

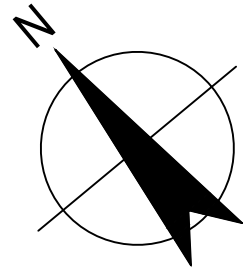
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Client **DEPARTMENT OF DEFENCE**

Project **EST01980 - P0008 NAW - 0908 RAAF WLM**

Title **AERONAUTICAL GROUND LIGHTING CIRCUIT DETAILS - SHEET 1**

Original Size **A1** Drawing No: **12514693-E5021** Rev: **H**



LEGEND:

- 8.00
- EXISTING MAJOR CONTOUR (0.5m INTERVALS)

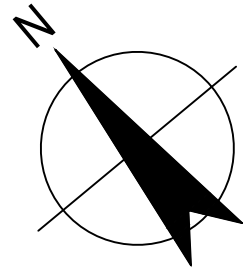
EXISTING MINOR CONTOUR (0.1m INTERVALS)

EXISTING EXTERNAL CATCHMENTS

EXISTING APRON CATCHMENTS



				CLIENT:				PMCA:				DO NOT SCALE				Drawn		Designer		Client									
				 Australian Government Department of Defence Security and Estate Group				 Newcastle Airport Newcastle Airport Pty Ltd Williamstown Drive NSW 2318				 Beca				 Level 4, 211 Victoria Square Adelaide SA 5000 Australia GPO Box 2052 Adelaide SA 5001 T 61 8 8111 6600 F 61 8 8111 6699 E admin@ghd.com.au W www.ghd.com				 www.ghd.com						Project		Project	
																Approved (Project Director) Date				Title									
A ISSUED FOR INFORMATION																				DRAINAGE CATCHMENT AREAS PRE-DEVELOPMENT									
No Revision Note: * indicates signatures on original issue of drawing or last revision of drawing				Drawn				Job Manager				Project Director				Date				Original Size		Drawing No: 12514693-SK5050		Rev: A					



LEGEND:

- 8.00

8.00

8.00
- EXISTING MAJOR CONTOUR (0.5m INTERVALS)

EXISTING MINOR CONTOUR (0.1m INTERVALS)

DESIGN MAJOR CONTOURS (0.5m INTERVALS)

DESIGN MINOR CONTOURS (0.1m INTERVALS)

REVISED EXTERNAL CATCHMENTS

REVISED APRON CATCHMENTS



A	ISSUED FOR INFORMATION				
No	Revision	Note: * indicates signatures on original issue of drawing or last revision of drawing			

CLIENT:



Australian Government
Department of Defence
Security and Estate Group



Newcastle
Airport
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Airport Pty Ltd
Williamstown Drive
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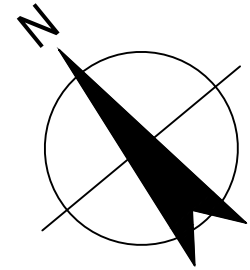
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Drafting Check	Design Check
Approved (Project Director) Date	
Scale 1:1000	This Drawing must not be used for Construction unless signed as Approved

Client	DEPARTMENT OF DEFENCE / NEWCASTLE AIRPORT		
Project	EST01980 - P0008 NAW - 0908 RAAF WLM		
Title	DRAINAGE CATCHMENT AREAS POST DEVELOPMENT		
Original Size	A1	Drawing No: 12514693-SK5051	Rev: A

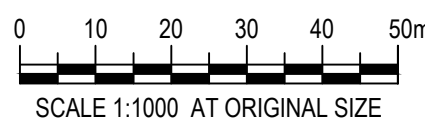
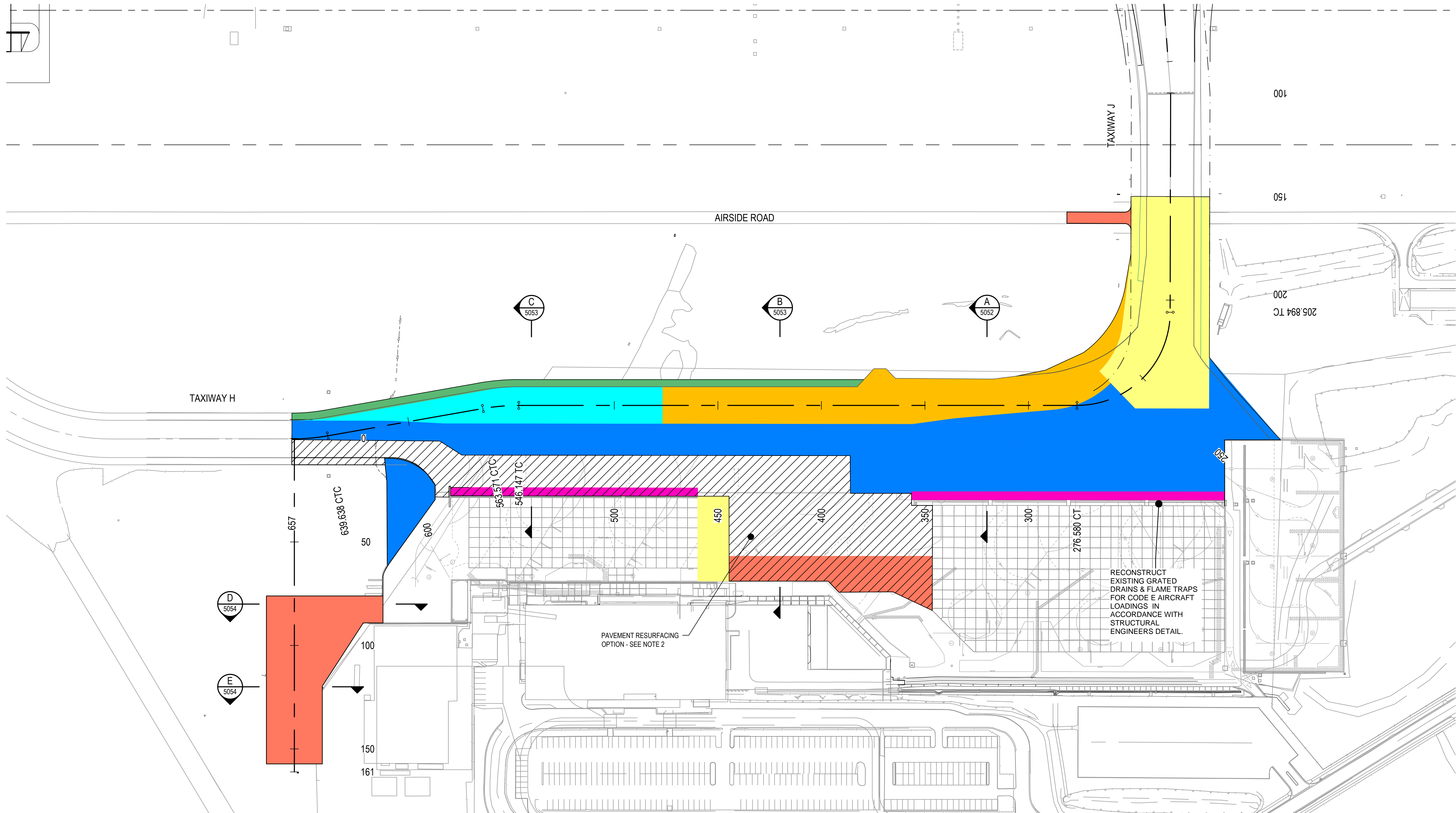


LEGEND:

<div></div>	HIGH STRENGTH FLEXIBLE PAVEMENT - TYPE 1	<div></div>	GSE STRENGTH PAVEMENT - TYPE 1
<div></div>	HIGH STRENGTH FLEXIBLE PAVEMENT - TYPE 2	<div></div>	PAVEMENT RESURFACING OPTION
<div></div>	HIGH STRENGTH FLEXIBLE PAVEMENT - TYPE 3		
<div></div>	SHOULDER STRENGTH FLEXIBLE PAVEMENT - TYPE 1		
<div></div>	TRANSITION PAVEMENT - TYPE 1		
<div></div>	ASPHALT OVERLAY - TYPE 1		

NOTE:

1. REFER TO DRAWINGS C5051 AND C5058 FOR PAVEMENT DETAILS.
2. BASELINE DESIGN IS TO CONSTRUCT 'HIGH STRENGTH FLEXIBLE PAVEMENT - TYPE 3', 'TRANSITION PAVEMENT - TYPE 1' AND 'GSE PAVEMENT - TYPE 1' AS SHOWN ON PAVEMENT PLAN. CONTRACTOR IS REQUIRED TO ALSO PRICE 'ASPHALT OVERLAY - TYPE 1' IN LIEU OF 'HIGH STRENGTH FLEXIBLE PAVEMENT - TYPE 3', 'TRANSITION PAVEMENT - TYPE 1' AND 'GSE PAVEMENT - TYPE 1' IN THE AREA DESIGNATED ON THE PAVEMENT PLAN. THE AREA WILL BE REQUIRED TO BE MILLED BY A MINIMUM DEPTH OF 50 mm PRIOR TO THE ASPHALT OVERLAY IN ORDER TO MEET FINAL DESIGN LEVELS.



SCALE 1:1000 AT ORIGINAL SIZE

H	90% DDR REISSUE		TE	GF	CS	06.10.23
G	90% DDR REISSUE		TE	GF	CS	30.06.23
F	90% DDR REISSUE TO QS		TE	GF	CS	10.03.23
E	FOR INFORMATION					03.03.23
D	90% DDR ISSUE		TE	GF	CS	21.09.22
No	Revision	Note: * indicates signatures on original issue of drawing or last revision of drawing	Drawn	Job Manager	Project Director	Date

CLIENT:

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Security and Estate Group

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Airport

PMCA:

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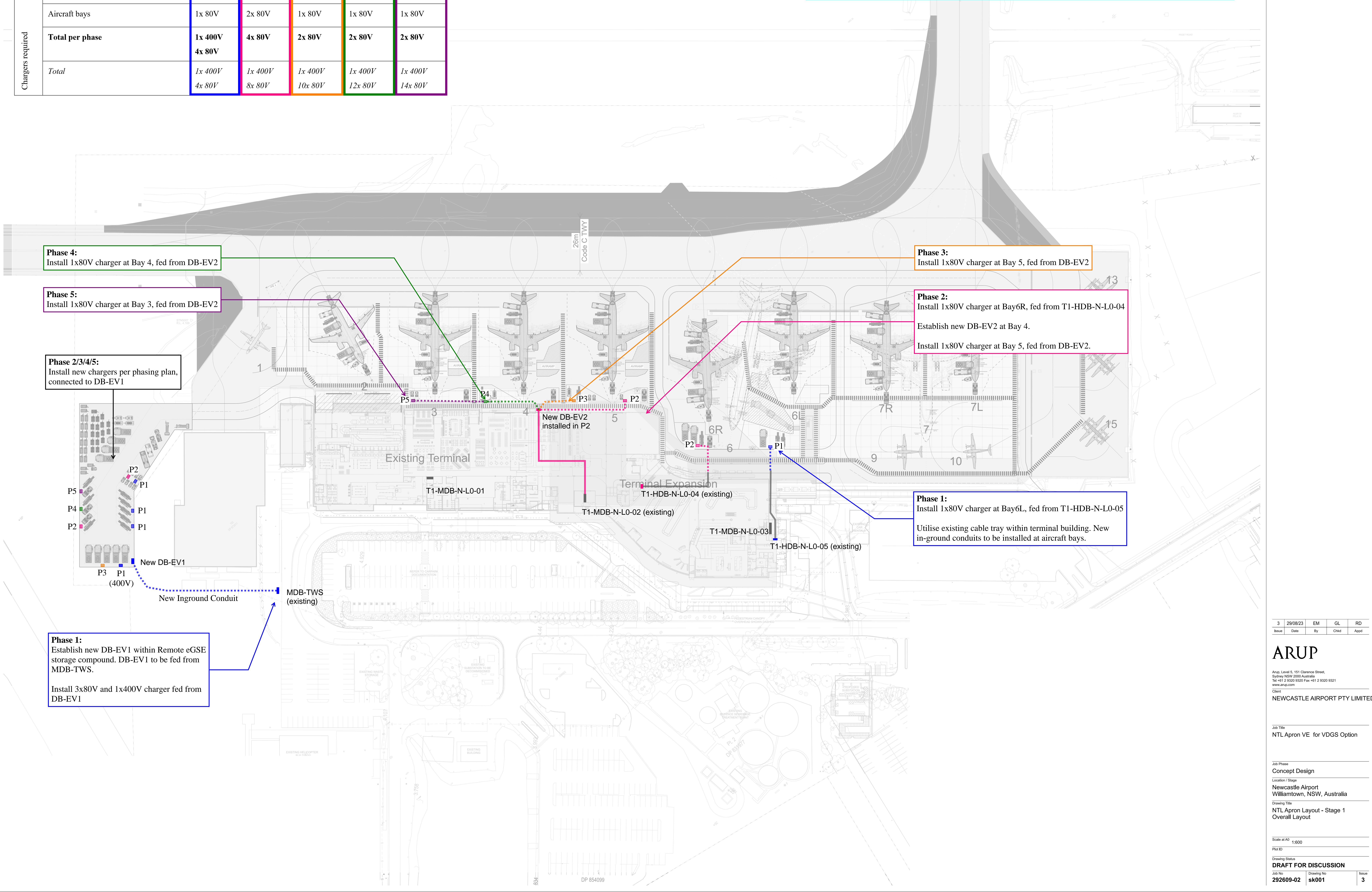
Drawn	T. EDEN	Designer	T. VALENTE
Drafting Check	D. WALKER	Design Check	M. GENTILCORE
Approved (Project Director)	Date		
Scale	1:1000		This Drawing must not be used for Construction unless signed as Approved

Client	DEPARTMENT OF DEFENCE / NEWCASTLE AIRPORT
Project	EST01980 - P0008 NAW - 0908 RAAF WLM
Title	PAVEMENT PLAN
Original Size	A1
Drawing No:	12514693-C5050
Rev:	H

		Phase 1	Phase 2	Phase 3	Phase 4	Phase 5
% of GSE electrified		0-20%	20-40%	40-60%	60-80%	80-100%
Chargers required	Proposed eGSE storage area	1x 400V 3x 80V	2x 80V	1x 80V	1x 80V	1x 80V
	Aircraft bays	1x 80V	2x 80V	1x 80V	1x 80V	1x 80V
	Total per phase	1x 400V 4x 80V	4x 80V	2x 80V	2x 80V	2x 80V
	Total	1x 400V 4x 80V	1x 400V 8x 80V	1x 400V 10x 80V	1x 400V 12x 80V	1x 400V 14x 80V

Colour and 'P#'
indicates Phasing

Notes and Assumptions:
- Current allowance assumes a 40kW charging unit (for the 80V charger) and a 100kW charging unit (for the 400V charger), this can be lowered if power supply is limited. Or a combination of faster/slower charging can be utilised.



3	29/08/23	EM	GL	RD
Issue	Date	By	Chkd	Appd

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Client
NEWCASTLE AIRPORT PTY LIMITED

Job Title
NTL Apron VE for VDGS Option

Job Phase
Concept Design
Location / Stage
Newcastle Airport
Williamtown, NSW, Australia
Drawing Title
NTL Apron Layout - Stage 1
Overall Layout

Scale at A0
1:600

Plot ID

Drawing Status

DRAFT FOR DISCUSSION
Job No
292609-02
Drawing No
sk001
Issue
3