

02/10/2019 16:01:01
RCA Document Reference: RCA A1 Landscape Version 1
M:\RCA Job Files\2013\02\201319 - Llys Wern, Neath\F - RCA Civil Drawings\201319-03d.dwg

DO NOT SCALE

NOTES (CONTINUED)

ANY DISCREPANCIES IN INFORMATION CONTAINED IN THIS DRAWING & ANY PROPOSED ALTERATIONS TO ROAD ALIGNMENT OR DRAINAGE MUST BE REPORTED TO ENGINEER FOR REVISION AND AGREEMENT WITH RELEVANT AUTHORITY.

FOUL WATER & SURFACE WATER SEWER (3m MAXIMUM PIPE LENGTHS)

ALL PIPES AND FITTINGS FOR DIAMETER OF 100/110mm TO BE EITHER:

- JDP ULTRA3 UNDERGROUND DRAINAGE SYSTEM.
- MARLEY SOLID WALL UNDERGROUND DRAINAGE PIPE SYSTEM.
- OSMADRAIN BUILDING DRAINAGE SYSTEM.
- POLYPIPE EN1401-1 STANDARD UNDERGROUND DRAIN SYSTEM.
- OR SIMILAR APPROVED BY RELEVANT AUTHORITY AND/OR RCA.

ALL PIPES AND FITTINGS FOR DIAMETERS OF 150mm – 300mm TO BE EITHER:

- JDP ULTRA3 UNDERGROUND DRAINAGE SYSTEM.
- MARLEY QUANTUM SEWER SYSTEM.
- POLYPIPE CIVILS POLYSEWER SYSTEM.
- UPONOR ULTRA-RIB SYSTEM.
- WAVIN OSMO ULTRA-RIB SYSTEM.
- OR SIMILAR APPROVED BY RELEVANT AUTHORITY AND/OR RCA.

3m MAXIMUM LENGTH PVC-U PIPES INSTALLED BY BPF/PPG ACCREDITED CONTRACTOR – COPY OF CERTIFICATE REQUIRED.

USE OF DIFFERENT PIPE SUPPLIER, PIPE LENGTH OR SPECIFICATION MUST BE APPROVED BY THE STATUTORY UNDERTAKER – IF IN DOUBT ASK.

WHERE SPECIFIED AS PLASTIC CHAMBERS ON RCA CHAMBER SCHEDULES CHAMBERS MUST COMPLY WITH BS EN 13598-1 AND BS EN 13598-2 OR HAVE EQUIVALENT INDEPENDENT APPROVAL* (* TO BE AGREED WITH ADOPTING AUTHORITY). CHAMBERS TO BE EITHER JDP AXEDO INSPECTION CHAMBER SYSTEM, POLYPIPE POLYSEWER INSPECTION CHAMBER SYSTEM, OSMO INSPECTION CHAMBER SYSTEM, BRETT MARTIN ADOPTABLE CHAMBERS OR SIMILAR APPROVED BY RELEVANT AUTHORITY AND/OR RCA – CHAMBER SPECIFICATION MUST BE SUITABLE FOR PIPE DIAMETER, BURIAL DEPTH, LOCATION AND COVER LOADING – IF IN DOUBT ASK.

ALL PIPEWORK MANUFACTURED IN UNPLASTICIZED POLYVINYL CHLORIDE (PVC-U). PVC-U DRAINAGE SYSTEMS WITH FLEXIBLE JOINTS TO BS EN1401-1:1998, BS 4660 OR BS 5481. PVC-U PIPES INSTALLED BY BRITISH PLASTICS FEDERATION – PLASTIC PIPES GROUP – MANUFACTURER APPROVED INSTALLERS. PLEASE PROVIDE COPY OF CERTIFICATION TO RCA PRIOR TO LAYING ANY PIPEWORK.

WHEN SEWERS ARE LOCATED WITHIN A PUBLIC HIGHWAY, THE OUTSIDE OF THE SEWER SHOULD BE IN THE VEHICLE CARRIAGEWAY (NOT FOOTPATH) AND BE AT LEAST 1m AWAY FROM THE KERBLINE. THE OUTSIDE OF MANHOLE CONSTRUCTIONS SHOULD BE AT LEAST 0.5m AWAY FROM THE KERBLINE.

THE DEVELOPER MUST SELF-VET AND CERTIFY THAT THE DESIGN CRITERIA, MATERIAL STANDARDS AND WORKMANSHIP SPECIFICATIONS FOR THE PROPOSED POTENTIALLY ADOPTABLE SEWERS ARE IN ACCORDANCE WITH THOSE SET OUT IN "SEWERS FOR ADOPTION – A DESIGN AND CONSTRUCTION GUIDE FOR DEVELOPERS" 7th EDITION AND THE REQUIREMENTS OF THE STATUTORY UNDERTAKER DWR CYMRU WELSH WATER (DCWW) AND CONFIRM THE SAME IN WRITING TO THE ADOPTION AUTHORITY.

THE CONTRACTOR SHALL ENSURE THAT AN UP TO DATE COPY OF SEWERS FOR ADOPTION 7th EDITION TOGETHER WITH ALL ITS CURRENT DWR CYMRU WELSH WATER ADDENDUM AND WELSH GOVERNMENT MINISTERS' STANDARDS DOCUMENTS IS AVAILABLE ON SITE FOR COMPLIANCE.

THIS PROJECT HAS BEEN DESIGNED TO COMPLY WITH SEWERS FOR ADOPTION 7th EDITION AND WELSH GOVERNMENT MINISTERS' STANDARDS.

PRIVATE DRAINAGE NOTES

ALL PIPEWORK SHALL BE uPVC COMPLYING WITH SEWERS FOR ADOPTION 7th EDITION, CESWI 6th EDITION AND ALL CURRENT RELEVANT BRITISH STANDARDS, BBA CERTIFICATES AND MANUFACTURERS RECOMMENDATIONS AND INSTALLED TO MEET THE SAME.

PROVIDE 150mm CONCRETE SURROUND WITH FLEXIBLE JOINTS WHERE SEWER PIPES HAVE LESS THAN 900mm COVER IN NON-ADOPTABLE TRAFFICKED AREAS. ALL OTHER DEPTH PIPELINES SHALL HAVE GRANULAR PIPE BED AND SURROUND AS DETAILS. IN NON-TRAFFICKED AREAS WHERE THERE IS NO RISK OF DAMAGE FROM GARDEN IMPLEMENTS (SURFACED PATHS) SHALL HAVE GRANULAR BED AND SURROUND AS DETAILS. WHERE THERE IS A RISK FROM GARDEN IMPLEMENT DAMAGE AND PIPELINE HAS LESS THAN 600mm COVER PROVIDE 50mm DP CONCRETE PAVING SLAB LAID ON 75mm GRANULAR PIPE BEDDING MATERIAL ABOVE CROWN OF PIPELINE.

ALL PRIVATE PATHS ASSUMED TO FALL ON TO SOFT LANDSCAPING AREAS.

ALL CONNECTIONS WITH ADOPTABLE FOUL WATER SEWERS SHALL BE CONNECTED SOFFIT TO SOFFIT.

ALL BRANCHES INTO BUILDINGS AND TO RAINWATER GULLIES SHALL BE 100mmØ UNO.

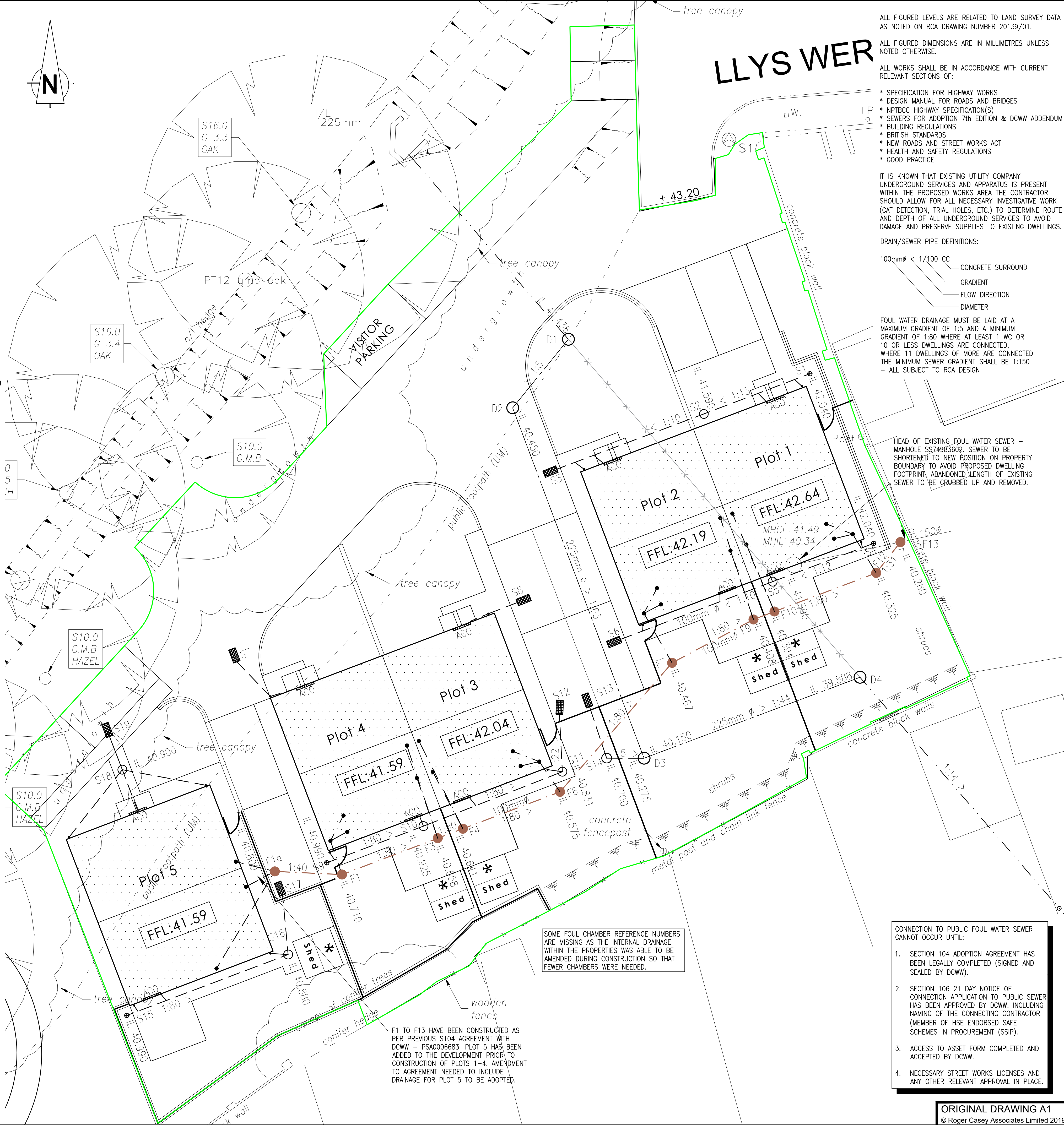
ALLOW FOR PRECAST CONCRETE LINTELS BY STRESSLINE OR SIMILAR OVER PIPELINES THROUGH WALLS AND PIPE JOINTS IN ACCORDANCE WITH MANUFACTURERS RECOMMENDATIONS.

ACO – PROVIDE A15 LOADING GRADE THRESHOLD DRAINAGE AT ALL LEVEL THRESHOLD OPENINGS BY ACO ACO OR SIMILAR APPROVED INSTALLED IN ACCORDANCE WITH MANUFACTURERS RECOMMENDATIONS.

CHANNEL – PROVIDE 250 LOADING GRADE DRAINAGE CHANNELS TO DRIVES / PARKING AREAS FALLING ON TO ADOPTABLE HIGHWAY AREAS BY ACO OR SIMILAR APPROVED INSTALLED IN ACCORDANCE WITH MANUFACTURERS RECOMMENDATIONS.

IMPORTANT

ALL FLOOR GULLIES SHALL BE RODDABLE AND ALL SOIL STACKS SHALL HAVE RODDING ACCESS FACILITY AT EACH FLOOR LEVEL FOR FUTURE MAINTENANCE.



ALL FIGURED LEVELS ARE RELATED TO LAND SURVEY DATA AS NOTED ON RCA DRAWING NUMBER 20139/01.

ALL FIGURED DIMENSIONS ARE IN MILLIMETRES UNLESS NOTED OTHERWISE.

ALL WORKS SHALL BE IN ACCORDANCE WITH CURRENT RELEVANT SECTIONS OF:

- SPECIFICATION FOR HIGHWAY WORKS
- DESIGN MANUAL FOR ROADS AND BRIDGES
- NPTBCC HIGHWAY SPECIFICATION(S)
- SEWERS FOR ADOPTION 7th EDITION & DCWW ADDENDUM BUILDING REGULATIONS
- BRITISH STANDARDS
- NEW ROADS AND STREET WORKS ACT
- HEALTH AND SAFETY REGULATIONS
- GOOD PRACTICE

IT IS KNOWN THAT EXISTING UTILITY COMPANY UNDERGROUND SERVICES AND APPARATUS IS PRESENT WITHIN THE PROPOSED WORKS AREA THE CONTRACTOR SHOULD ALLOW FOR ALL NECESSARY INVESTIGATIVE WORK (CAT DETECTION, TRIAL HOLES, ETC.) TO DETERMINE ROUTE AND DEPTH OF ALL UNDERGROUND SERVICES TO AVOID DAMAGE AND PRESERVE SUPPLIES TO EXISTING DWELLINGS.

DRAIN/SEWER PIPE DEFINITIONS:

- 100mmØ < 1/100 CC CONCRETE SURROUND
- GRADIENT
- FLOW DIRECTION
- DIAMETER

FOUL WATER DRAINAGE MUST BE LAID AT A MAXIMUM GRADIENT OF 1:5 AND A MINIMUM GRADIENT OF 1:80 WHERE AT LEAST 1 WC OR 10 OR LESS DWELLINGS ARE CONNECTED, WHERE 11 DWELLINGS OF MORE ARE CONNECTED THE MINIMUM SEWER GRADIENT SHALL BE 1:150 – ALL SUBJECT TO RCA DESIGN

HEAD OF EXISTING FOUL WATER SEWER – MANHOLE SS74983602. SEWER TO BE SHORTENED TO NEW POSITION ON PROPERTY BOUNDARY TO AVOID PROPOSED DWELLING FOOTPRINT. ABANDONED LENGTH OF EXISTING SEWER TO BE GRUBBED UP AND REMOVED.

SOME FOUL CHAMBER REFERENCE NUMBERS ARE MISSING AS THE INTERNAL DRAINAGE WITHIN THE PROPERTIES WAS ABLE TO BE AMENDED DURING CONSTRUCTION SO THAT FEWER CHAMBERS WERE NEEDED.

F1 TO F13 HAVE BEEN CONSTRUCTED AS PER PREVIOUS S104 AGREEMENT WITH DCWW – PSA0006683. PLOT 5 HAS BEEN ADDED TO THE DEVELOPMENT PRIOR TO CONSTRUCTION OF PLOTS 1-4. AMENDMENT TO AGREEMENT NEEDED TO INCLUDE DRAINAGE FOR PLOT 5 TO BE ADOPTED.

CONNECTION TO PUBLIC FOUL WATER SEWER CANNOT OCCUR UNTIL:

- SECTION 104 ADOPTION AGREEMENT HAS BEEN LEGALLY COMPLETED (SIGNED AND SEALED BY DCWW).
- SECTION 106 21 DAY NOTICE OF CONNECTION APPLICATION TO PUBLIC SEWER HAS BEEN APPROVED BY DCWW. INCLUDING NAMING OF THE CONNECTING CONTRACTOR (MEMBER OF HSE ENDORSED SAFE SCHEMES IN PROCUREMENT (SSIP)).
- ACCESS TO ASSET FORM COMPLETED AND ACCEPTED BY DCWW.
- NECESSARY STREET WORKS LICENSES AND ANY OTHER RELEVANT APPROVAL IN PLACE.

NOTES:

THE PROPERTY OF THIS DRAWING AND DESIGN IS VESTED IN ROGER CASEY ASSOCIATES AND MUST NOT BE COPIED OR REPRODUCED IN ANY WAY WITHOUT THE WRITTEN CONSENT OF ROGER CASEY ASSOCIATES.

THE CONTRACTOR IS TO CHECK ALL LEVELS AND DIMENSIONS BEFORE WORK COMMENCES, AND ANY DISCREPANCIES TO BE REPORTED IMMEDIATELY TO THE CONSULTANTS.

WORK TO FIGURED DIMENSIONS IN PREFERENCE TO SCALING.

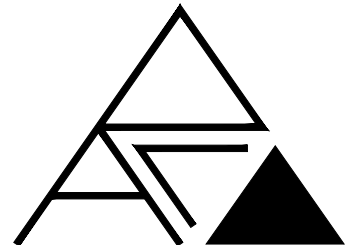
THIS DRAWING IS TO BE READ IN CONJUNCTION WITH ALL OTHER ROGER CASEY ASSOCIATES DRAWINGS AND SPECIFICATIONS AND ALL OTHER CONSULTANTS DRAWINGS AND SPECIFICATIONS RELATING TO THIS PROJECT.

KEY:

- PRIVATE SURFACE WATER SEWER
- PRIVATE SURFACE WATER INSPECTION / MANHOLE CHAMBER & REF.
- PRIVATE FOUL WATER SEWER
- PRIVATE FOUL WATER INSPECTION / MANHOLE CHAMBER & REF.
- ADOPTABLE FOUL WATER SEWER
- ADOPTABLE FOUL WATER INSPECTION / MANHOLE CHAMBER & REF.
- PRIVATE ACO CHANNEL DRAIN
- SURFACE WATER DIFFUSER UNIT
- CULVERT DIVERSION ROUTE
- EXISTING CULVERT TO BE ABANDONED
- EXISTING CULVERT ROUTE TO REMAIN

REV	DESCRIPTION	DATE	BY	CHECK
C	F1a POSITION AMENDED	12/10/19	BWE	RCA
B	ADDITIONAL PLOT DRAINAGE ADDED	25/09/19	BWE	RCA
A	CULVERT DIVERSION AMENDED	25/09/19	BWE	PWJL
REV	DESCRIPTION	DATE	BY	CHECK

DRAWING STATUS:
Section104 Agreement



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CLIENT:	
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ARCHITECT:	iPLAN
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PROJECT:	RESIDENTIAL DEVELOPMENT OFF LLYS WERN, NEATH, NEATH PORT TALBOT SA10 7PR
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DRAWING TITLE:	ENGINEERING SITE PLAN (S104 DRAINAGE)
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DRAWN BY:	DESIGN BY:	CHECKED BY:	DATE:
BWE	BWE	PWJL	02/10/2019
SCALES:	DRAWING No.:	REVISION:	
1:100	20139/07	C	

ORIGINAL DRAWING A1
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