SURFACE WATER DRAINAGE NETWORK DETAILS - CATCHMENT A
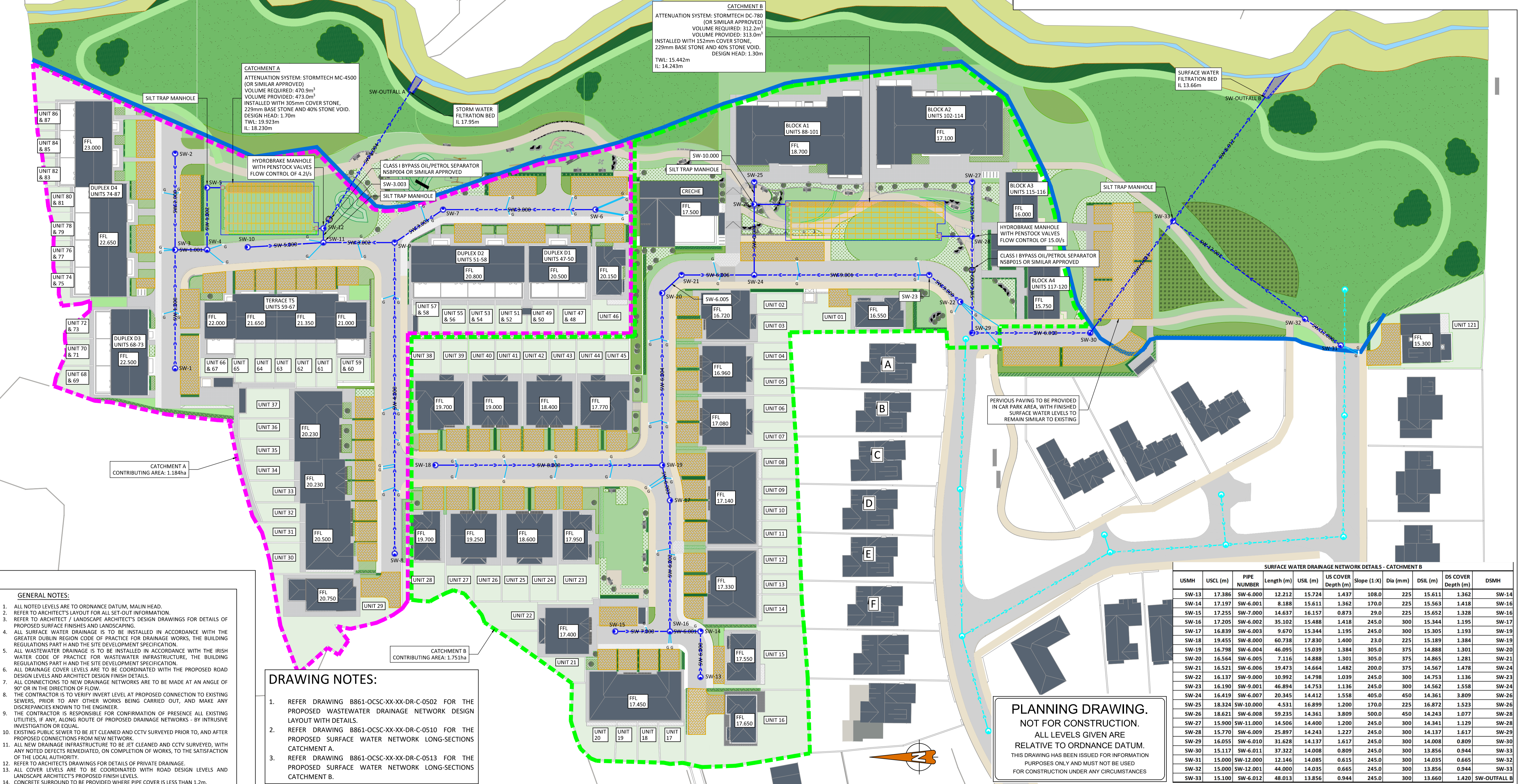
USMH	USCL (m)	PIPE NUMBER	Length (m)	USIL (m)	US COVER Depth (m)	Slope (1:X)	Dia (mm)	DSIL (m)	DS COVER Depth (m)	DSMH
SW-1	22.421	SW-1.000	31.772	21.446	0.750	170.0	225	21.259	0.866	SW-3
SW-2	22.734	SW-2.000	25.769	21.309	1.200	67.0	225	20.924	1.200	SW-3
SW-3	22.350	SW-1.001	8.568	20.924	1.201	28.0	225	20.618	1.035	SW-4
SW-4	21.878	SW-1.002	16.637	20.377	1.201	170.0	300	20.279	1.644	SW-5
SW-5	22.223	SW-1.003	33.002	18.296	3.627	500.0	300	18.230	2.544	SW-12
SW-6	20.122	SW-3.000	40.834	19.072	0.750	245.0	300	18.905	1.594	SW-7
SW-7	20.799	SW-3.001	15.686	18.905	1.594	245.0	300	18.841	1.745	SW-9
SW-8	20.370	SW-4.000	83.356	19.320	0.750	245.0	300	18.980	1.607	SW-9
SW-9	20.887	SW-3.002	19.091	18.841	1.745	245.0	300	18.763	1.935	SW-11
SW-10	21.465	SW-5.000	20.310	20.040	1.200	43.0	225	19.568	1.206	SW-11
SW-11	20.998	SW-3.003	3.798	18.688	1.935	305.0	375	18.676	2.023	SW-12
SW-12	21.074	SW-1.004	47.579	18.230	2.619	170.0	225	17.950	0.715	SW-OUTFALL A

SURFACE WATER DRAINAGE NETWORK DETAILS - CATCHMENT B

USMH	USCL (m)	PIPE NUMBER	Length (m)	USIL (m)	US COVER Depth (m)	Slope (1:X)	Dia (mm)	DSIL (m)	DS COVER Depth (m)	DSMH
SW-13	17.386	SW-6.000	12.212	15.724	1.437	108.0	225	15.611	1.362	SW-14
SW-14	17.197	SW-6.001	8.188	15.611	1.362	170.0	225	15.563	1.418	SW-16
SW-15	17.255	SW-7.000	14.637	16.157	0.873	29.0	225	15.652	1.328	SW-16
SW-16	17.205	SW-6.002	35.102	15.488	1.418	245.0	300	15.344	1.195	SW-17
SW-17	16.839	SW-6.003	9.670	15.344	1.195	245.0	300	15.305	1.193	SW-19
SW-18	19.455	SW-8.000	60.738	17.830	1.400	23.0	225	15.189	1.384	SW-19
SW-19	16.798	SW-6.004	46.095	15.039	1.384	305.0	375	14.888	1.301	SW-20
SW-20	16.564	SW-6.005	7.116	14.888	1.301	305.0	375	14.865	1.281	SW-21
SW-21	16.521	SW-6.006	19.473	14.664	1.482	245.0	300	14.567	1.478	SW-22
SW-22	16.137	SW-9.000	10.992	14.798	1.039	245.0	300	14.753	1.136	SW-23
SW-23	16.190	SW-9.001	46.894	14.753	1.136	245.0	300	14.562	1.558	SW-24
SW-24	16.419	SW-6.007	20.345	14.412	1.558	405.0	450	14.361	3.809	SW-26
SW-25	18.324	SW-10.000	4.531	16.899	1.200	170.0	225	16.872	1.523	SW-26
SW-26	16.621	SW-6.008	59.235	14.361	3.809	500.0	450	14.243	1.077	SW-28
SW-27	15.900	SW-11.000	14.506	14.400	1.200	245.0	300	14.341	1.129	SW-28
SW-28	15.770	SW-6.009	25.897	14.243	1.227	245.0	300	14.137	1.617	SW-29
SW-29	16.055	SW-6.010	31.628	14.137	1.617	245.0	300	14.008	0.809	SW-30
SW-30	15.117	SW-6.011	37.322	14.008	0.809	245.0	300	13.856	0.944	SW-31
SW-31	15.000	SW-12.000	12.146	14.085	0.615	245.0	300	14.035	0.665	SW-32
SW-32	15.000	SW-12.001	44.000	14.035	0.665	245.0	300	13.856	0.944	SW-33
SW-33	15.100	SW-6.012	48.013	13.856	0.944	245.0	300	13.660	1.420	SW-OUTFALL B

LEGEND:

- PROPOSED SURFACE DRAINAGE (uPVC TWINWALL OR SIMILAR APPROVED)
- PROPOSED SURFACE DRAINAGE MANHOLE
- PROPOSED ROAD GULLY
- PROPOSED 150mm ROAD GULLY SERVICE CONNECTION
- PROPOSED SURFACE WATER CATCHMENT A
- PROPOSED SURFACE WATER CATCHMENT B
- PROPOSED POLY TUNNEL ATTENUATION SYSTEM
- PROPOSED PERVIOUS PAVING
- PROPOSED OIL/PETROL SEPARATOR
- PROPOSED SURFACE WATER DRAINAGE HEADWALL
- 1% AEP FLOOD EXTENT FROM THE STREAM
- EXISTING SURFACE WATER DRAINAGE TO BE MAINTAINED (FROM TOPO SURVEY RECORDS)
- EXISTING SURFACE WATER DRAINAGE MANHOLE TO BE MAINTAINED (FROM TOPO SURVEY RECORDS)

CATCHMENT A

ATTENUATION SYSTEM: STORMTECH MC-4500 (OR SIMILAR APPROVED)
VOLUME REQUIRED: 470.9m³
VOLUME PROVIDED: 473.0m³
INSTALLED WITH 305mm COVER STONE, 229mm BASE STONE AND 40% STONE VOID.
DESIGN HEAD: 1.70m
TWL: 19.923m
IL: 18.230m

CATCHMENT B

ATTENUATION SYSTEM: STORMTECH DC-780 (OR SIMILAR APPROVED)
VOLUME REQUIRED: 312.2m³
VOLUME PROVIDED: 313.0m³
INSTALLED WITH 152mm COVER STONE, 229mm BASE STONE AND 40% STONE VOID.
DESIGN HEAD: 1.30m
TWL: 15.442m
IL: 14.243m

CATCHMENT A CONTRIBUTING AREA: 1.184ha

CATCHMENT B CONTRIBUTING AREA: 1.751ha

HYDROBRAKE MANHOLE WITH PENSTOCK VALVES FLOW CONTROL OF 4.2l/s

HYDROBRAKE MANHOLE WITH PENSTOCK VALVES FLOW CONTROL OF 15.0l/s

CLASS I BYPASS OIL/PETROL SEPARATOR NSBP004 OR SIMILAR APPROVED

CLASS I BYPASS OIL/PETROL SEPARATOR NSBP015 OR SIMILAR APPROVED

STORM WATER FILTRATION BED IL 17.95m

STORM WATER FILTRATION BED IL 18.230m

SURFACE WATER FILTRATION BED IL 13.66m

SILT TRAP MANHOLE

PERVIOUS PAVING TO BE PROVIDED IN CAR PARK AREA, WITH FINISHED SURFACE WATER LEVELS TO REMAIN SIMILAR TO EXISTING

GENERAL NOTES:

1. ALL NOTED LEVELS ARE TO ORDNANCE DATUM, MALIN HEAD.
2. REFER TO ARCHITECT'S LAYOUT FOR ALL SET-OUT INFORMATION.
3. REFER TO ARCHITECT / LANDSCAPE ARCHITECT'S DESIGN DRAWINGS FOR DETAILS OF PROPOSED SURFACE FINISHES AND LANDSCAPING.
4. ALL SURFACE WATER DRAINAGE IS TO BE INSTALLED IN ACCORDANCE WITH THE GREATER DUBLIN REGION CODE OF PRACTICE FOR DRAINAGE WORKS, THE BUILDING REGULATIONS PART H AND THE SITE DEVELOPMENT SPECIFICATION.
5. ALL WASTEWATER DRAINAGE IS TO BE INSTALLED IN ACCORDANCE WITH THE IRISH WATER CODE OF PRACTICE FOR WASTEWATER INFRASTRUCTURE, THE BUILDING REGULATIONS PART H AND THE SITE DEVELOPMENT SPECIFICATION.
6. ALL DRAINAGE COVER LEVELS ARE TO BE COORDINATED WITH THE PROPOSED ROAD DESIGN LEVELS AND ARCHITECT DESIGN FINISH DETAILS.
7. ALL CONNECTIONS TO NEW DRAINAGE NETWORKS ARE TO BE MADE AT AN ANGLE OF 90° OR IN THE DIRECTION OF FLOW.
8. THE CONTRACTOR IS TO VERIFY INVERT LEVEL AT PROPOSED CONNECTION TO EXISTING SEWERS, PRIOR TO ANY OTHER WORKS BEING CARRIED OUT, AND MAKE ANY DISCREPANCIES KNOWN TO THE ENGINEER.
9. THE CONTRACTOR IS RESPONSIBLE FOR CONFIRMATION OF PRESENCE ALL EXISTING UTILITIES, IF ANY, ALONG ROUTE OF PROPOSED DRAINAGE NETWORKS - BY INTRUSIVE INVESTIGATION OR EQUAL.
10. EXISTING PUBLIC SEWER TO BE JET CLEANED AND CCTV SURVEYED PRIOR TO, AND AFTER PROPOSED CONNECTIONS FROM NEW NETWORK.
11. ALL NEW DRAINAGE INFRASTRUCTURE TO BE JET CLEANED AND CCTV SURVEYED, WITH ANY NOTED DEFECTS REMEDIATED, ON COMPLETION OF WORKS, TO THE SATISFACTION OF THE LOCAL AUTHORITY.
12. REFER TO ARCHITECTS DRAWINGS FOR DETAILS OF PRIVATE DRAINAGE.
13. ALL COVER LEVELS ARE TO BE COORDINATED WITH ROAD DESIGN LEVELS AND LANDSCAPE ARCHITECT'S PROPOSED FINISH LEVELS.
14. CONCRETE SURROUND TO BE PROVIDED WHERE PIPE COVER IS LESS THAN 1.2m.

DRAWING NOTES:

1. REFER DRAWING B861-OCSC-XX-XX-DR-C-0502 FOR THE PROPOSED WASTEWATER DRAINAGE NETWORK DESIGN LAYOUT WITH DETAILS.
2. REFER DRAWING B861-OCSC-XX-XX-DR-C-0510 FOR THE PROPOSED SURFACE WATER NETWORK LONG-SECTIONS CATCHMENT A.
3. REFER DRAWING B861-OCSC-XX-XX-DR-C-0513 FOR THE PROPOSED SURFACE WATER NETWORK LONG-SECTIONS CATCHMENT B.

PLANNING DRAWING.
NOT FOR CONSTRUCTION.
ALL LEVELS GIVEN ARE RELATIVE TO ORDNANCE DATUM.
THIS DRAWING HAS BEEN ISSUED FOR INFORMATION PURPOSES ONLY AND MUST NOT BE USED FOR CONSTRUCTION UNDER ANY CIRCUMSTANCES

ORDNANCE SURVEY OF IRELAND LICENCE NO. EN0000820 © GOVERNMENT OF IRELAND

Rev No.	Date	Revision Note	Drn by	Chkd by
P01	15.05.20	SUITABLE FOR PLANNING	RP	MK
C01	23.06.20	ISSUED FOR PLANNING	AB	MK
C02	25.09.20	ISSUED FOR PLANNING	AB	MK
C03	07.10.20	ISSUED FOR PLANNING	RP	MK

Head Office,
9 Prussia Street,
Dublin 7.
D07 KT57

TEL +353 (0)1 8682000

e: contactus@ocsc.ie
w: www.ocsc.ie

Dublin | London | Belfast | Galway | Cork

OCSC
O'CONNOR | SUTTON | CRONIN
Multidisciplinary Consulting Engineers

Client: BURKEWAY HOMES LIMITED
Project: RESIDENTIAL DEVELOPMENT AT BEARNA
Title: SURFACE WATER NETWORK LAYOUT

Code	Originator	Zone	Level	Role	Type	Number	Status	Revision
B861	OCSC	XX	XX	DR	C	0501	A1	C03

Date: 13.05.20 Scale: 1:500 @ A1 Drn by:RP Chkd by:MK Aprvd by:AH