SE3

SE5

SE1

(S1.12) FLOW CONTROL MANHOLE WITH INTEGRAL HYDROBRAKE OPTIMUM OR SIMILAR APPROVED. DISCHARGE RESTRICTED TO 2.5 l/s, 2.0m HEAD. REF: SHE-0146-1250-2000-1200

CONTRACTOR PROPOSAL: POLYSTORM GEOCELLULAR ATTENUATION TANK. PLAN AREA 74.5m2, $VOL_{MAX}$: 119.2m3, STORAGE 113.24m3, IL: 28.00m, 1.6m DP, 2.0 LAYERS, WELDED GEOMEMBRANE. TO BE INSTALLED STRICTLY IN ACCORDANCE WITH THE MANUFACTURERS RECOMMENDATIONS

DASHED LINE DENOTES EXTENT OF PODIUM ABOVE. AREA TO BE DRAINED THROUGH PERMEABLE SURFACING BUILD-UP VIA 'PRWP' CONNECTIONS SHOWN. DETAILS AND LOCATION OF PROPOSED OUTFALLS SUBJECT TO FURTHER DESIGN DEVELOPMENT

CWMH1 ADJUSTED TO AVOID CLASH WITH SUB-STRUCTURE AS AGREED WITH UU. COVER LEVEL TO BE SET TO SUIT PLANIT FINISHED SURFACE LEVELS

RAIN GARDEN OUTLET VIA PERMAVOID DIFFUSER UNIT LOCATED WITHIN THE OPEN GRADED SUBBASE

ATTENUATION TANK VENT PIPE TO VENTED ACCESS COVER

FOR DETAILS OF SEWER EASEMENTS SE1 TO SE5 REFER TO DRAWING VRS-ROC-ZZ-DR-C-SE1

DGA01, DGA02, DGA03 — PODIUM BC TOWERS B&C

DGA04, DGA05 — PODIUM A TOWER A

FOR COORDINATES TO FW & SW POP UPS REFER TO HBA DRAWINGS

- SITE BOUNDARY
- EXISTING COMBINED SEWER
- SEWER TO BE ABANDONED
- DIVERTED COMBINED SEWER
- EXTENT OF PODIUM ABOVE
- ABOVE GROUND POTABLE WATER STOR TANKS. REFER TO M&E INFORMATION
- EXTENT OF TOWER CRANE BASE
- RAIN GARDEN
- PERMEABLE PAVEMENT
- ATTENUATION TANK
- SURFACE WATER DRAIN
- SURFACE WATER MANHOLE/ INSPECTION CHAMBER
- RWP — RAINWATER PIPE & 150Ø CONNECTION
- RG — ROAD GULLY & 150Ø CONNECTION
- YG — YARD GULLY & 110Ø CONNECTION
- SU AU — ACO 150D 10.0 BRICKSLOT TWINSLOT W SUMP UNIT (SU) & ACCESS UNIT (AU)
- SU — ACO HEXDRAIN BRICKSLOT WITH SUMP & CORNER UNIT
- 100Ø PERFORATED PIPE
- PERMAVOID DIFFUSER UNIT & 150Ø CONNECTION
- FOUL WATER DRAIN
- FOUL WATER MANHOLE/ INSPECTION CHAMBER

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## NOTES

1. ALL DIMENSIONS ARE IN METRES UNLESS STATED OTHERWISE.
2. THIS DRAWING IS TO BE READ IN CONJUNCTION WITH ALL ARCHITECTS, ENGINEERS AND SPECIALIST DRAWINGS AND SPECIFICATIONS.
3. ANY DISCREPANCIES SHOULD BE REPORTED TO THE ENGINEER IMMEDIATELY SO THAT CLARIFICATION CAN BE SOUGHT PRIOR TO THE COMMENCEMENT OF WORK.
4. BEFORE STARTING ANY WORKS, CONTRACTOR TO CHECK INVERT LEVELS AND POSITIONS OF EXISTING DRAINS, SEWERS, INSPECTIONS CHAMBERS AND MANHOLES AGAINST INFORMATION SHOWN ON THIS DRAWING.
5. ROCKER PIPES ARE TO BE PROVIDED AT ALL CONCRETE CASED INTERFACES.
6. CLASS Z CONCRETE SURROUND TO BE PROVIDED FOR PIPES WITH COVER LESS THAN 1.2m ABOVE THE CROWN OF THE PIPE FOR ROADS AND 0.6m FOR SOFT AND PEDESTRIAN AREAS ONLY AND UNDER ALL FOUNDATIONS AND WHERE PIPES LAID WITHIN 1m OF FOUNDATIONS.
7. CONNECTIONS TO EXISTING PUBLIC SEWERS IN ACCORDANCE WITH UNITED UTILITIES REQUIREMENTS, TO BE APPROVED / AGREED WITH THE WATER AUTHORITY.
8. PROPOSED COVER LEVELS ARE APPROXIMATE AND SHALL BE CHECKED BY THE CONTRACTOR ON SITE TO SUIT THE EXACT FINISHED LEVEL AND GRADIENT.
9. ALL DRAINAGE WORKS SHALL BE CARRIED OUT IN ACCORDANCE WITH THE REQUIREMENTS OF THE LOCAL AUTHORITY AND IN CONJUNCTION WITH ALL RELEVANT BRITISH STANDARDS, CODES OF PRACTICE AND 'SEWERS FOR ADOPTION' 7th EDITION.
10. ACCESS COVERS AND FRAMES SHALL COMPLY WITH THE LOADINGS SPECIFIED AND TO BS EN 124 AND KITEMARKED OR IF RECESSED COVERS ARE SPECIFIED THEN IN ACCORDANCE WITH FACTA ASSOCIATION EQUIVALENT. ALLOW FOR RECESS MANHOLE COVERS TO ACCEPT LANDSCAPE ARCHITECT FINISHES TO ALL NON-ASPHALT EXTERNAL AREAS.
11. THE PROPOSED BUILDING LAYOUTS SHOWN ON THIS DRAWING ARE FOR INFORMATION ONLY. REFER TO ARCHITECTS PLANS FOR PRECISE LOCATION SETTING OUT INFORMATION AND DETAILS
12. FOR SETTING OUT DIMENSIONS OF SSS, SVPS, RWPS, FLOOR GULLY'S & OTHER DRAINAGE 'POP UP' LOCATIONS, REFER TO ARCHITECTS OR MECHANICAL & ELECTRICAL ENGINEERS DRAWINGS.
13. ALL DRAINAGE PIPEWORK SHOWN SHALL BE 100mm DIAMETER FOR FOUL AND 150mm FOR SURFACE WATER UNLESS NOTED OTHERWISE. ALL DRAINAGE PIPEWORK SHALL BE LAID SOFFIT TO SOFFIT UNLESS OTHERWISE STATED.
14. ALL UNDERSLAB DRAINAGE SHALL BE LAID AT GRADIENTS OF 1:80 MIN. FOR FOUL PIPEWORK AND 1:100 MIN. FOR SURFACE WATER UNLESS NOTED OTHERWISE. ALL UNDERSLAB DRAINAGE SHALL BE CLEAR OF FOUNDATIONS UNLESS SHOWN OTHERWISE. USE OF SHORT LONG RADIUS BENDS IS ACCEPTABLE PROVIDED THEY ARE KEPT TO A MINIMUM AND USED WHERE UNAVOIDABLE.
15. AT LEAST ONE SOIL PIPE AT THE HEAD OF EACH FOUL RUN SHALL BE VENTED TO THE ATMOSPHERE. ALL RAINWATER PIPES SHALL HAVE ABOVE GROUND RODDING ACCESS.
16. ALL PRIVATE DRAINAGE PIPEWORK FOR FOUL AND SURFACE WATER SYSTEMS HAVE BEEN DESIGNED ON THE BASIS OF UPVC TO BS EN 1401-1, UNLESS NOTED OTHERWISE.
17. CONCRETE ENCASEMENT OF THE PIPEWORK SHALL BE REQUIRED WHERE THE VERTICAL CLEARANCE BETWEEN TWO PIPES CROSSING IS LESS THAN 300MM.
18. WHERE NEW DRAINAGE IS SITUATED WITHIN 5 METRES OF NEW OR EXISTING TREES THE PIPEWORK SHALL BE ENCASED IN CONCRETE TO REDUCE THE RISK OF ROOT INGRESS.
19. ALL NEW DRAINAGE INSTALLATIONS TOGETHER WITH ANY EXISTING DRAINAGE RETAINED SHALL BE JETTED AND CCTV SURVEYED UPON COMPLETION. CONTRACTOR TO ENSURE THAT THE DRAINAGE SYSTEM IS FULLY OPERATIONAL, FREE OF EXCESS DEBRIS/SILT AND ALL IDENTIFIED FAULTS RECTIFIED.
20. SURFACE WATER DRAINAGE DESIGN HAS BEEN DEVELOPED ON THE BASIS OF THE PREVIOUSLY AGREED DISCHARGE RATES AND POINTS OF CONNECTION BETWEEN CIVIC ENGINEERS AND MCC LLFA.

| REV | DATE | DETAILS | DRN. | CHK |
|---|---|---|---|---|
| INFO 1 | 04.09.25 | SEWER EASEMENTS ADDED | PAW | JAS |
| C6 | 08.11.24 | UPDATED TO SUIT AS BUILT RECORDS | ARJ | PAW |
| C5 | 12.09.24 | CHANGES AS CLOUDED | ARJ | PAW |
| C4 | 22.09.23 | LEGEND & SW DRAINAGE (CLOUDED) UPDATED | PAW | ARJ |
| C3 | 15.06.22 | UPDATED TO SUIT HBA AND BFL LAYOUTS FOR PODIUM A, S1.25 IL CORRECTED | PAW | ARJ |
| C2 | 19.04.22 | UPDATED TO SUIT HBA AND BFL LAYOUTS FOR PODIUM A & MIDRISE A | PAW | ARJ |
| C1 | 08.04.22 | ISSUED FOR CONSTRUCTION | PAW | JAS |

DRAWING STATUS
CONSTRUCTION

RIBA STAGE
STAGE 5

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| DRAWN | DATE | SCALES |
|---|---|---|
| PAW | APR 22 | 1:100 |
| CHECKED ARJ | DATE APR 22 | THE ABOVE SCALES APPLY WHEN PLOTTED AT A1 SIZE. --DO NOT SCALE-- |
| APPRVD. JAS | DATE APR 22 | EMAIL FOR DRAWINGS info@rocconsulting.com |

CLIENT
FEC

PROJECT TITLE
VICTORIA RIVERSIDE

DRAWING TITLE
BELOW GROUND DRAINAGE GENERAL ARRANGEMENT SHEET 4 of 5

DRAWING No. VRS-ROC-ZZ-XX-DR-C-DGA04 REV. C6

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