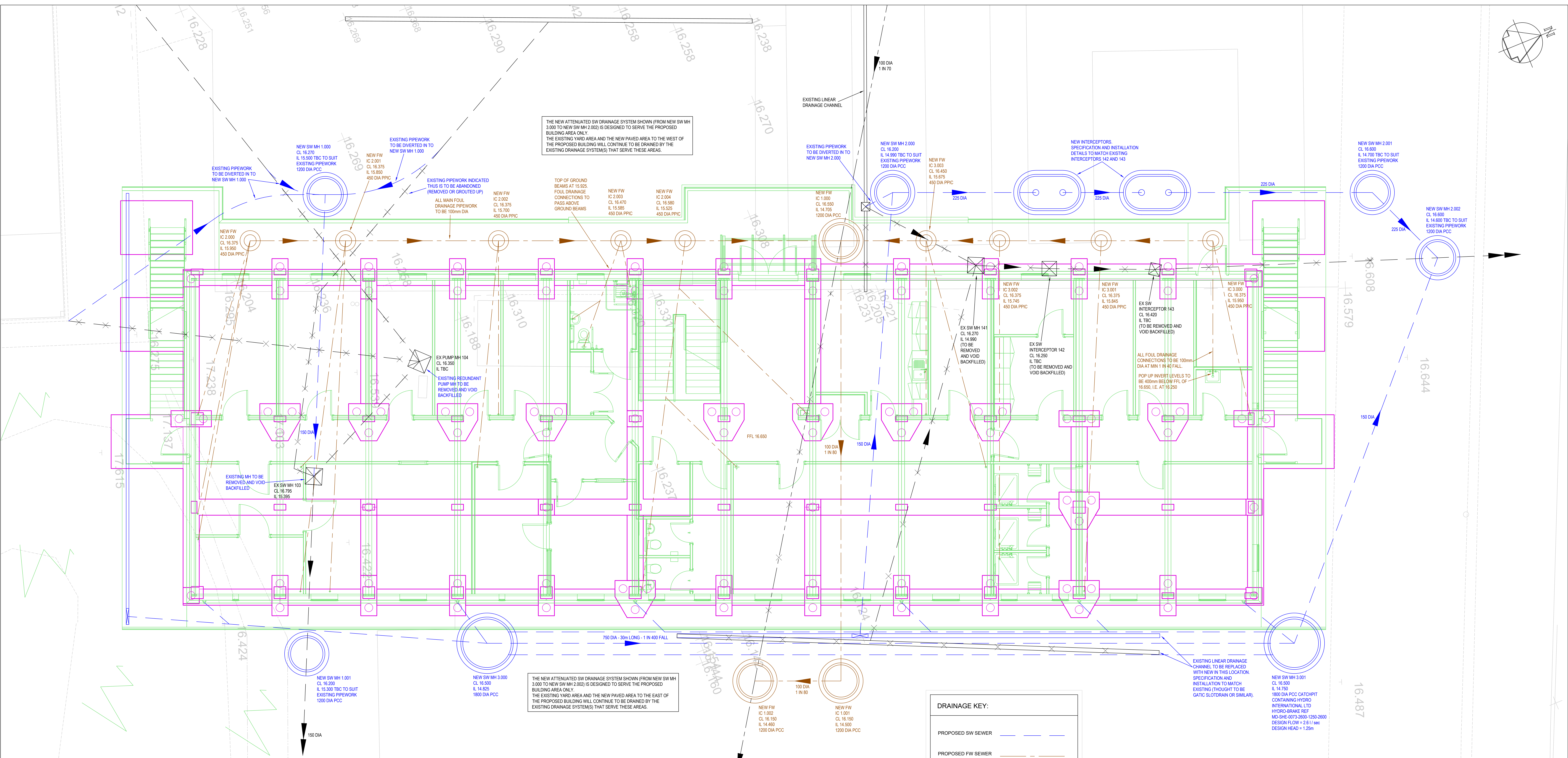




**GENERAL NOTES**

DO NOT SCALE FROM THIS DRAWING WORK TO FIGURED DIMENSIONS ONLY.  
NO DEVIATION FROM THE DETAILS SHOWN ON THIS DRAWING IS ALLOWED WITHOUT PRIOR PERMISSION IN WRITING.  
ALL DRAWINGS ARE TO BE READ IN CONJUNCTION WITH ALL ARCHITECTS, ENGINEERS AND SPECIALISTS DRAWINGS AND THE SPECIFICATION.  
THE CONTRACTOR SHALL INCORPORATE ALL THE REQUIREMENTS OF THE PRE-TENDER STAGE HEALTH AND SAFETY PLAN.  
THIS DRAWING IS TO BE READ IN CONJUNCTION WITH WML DRAINAGE DETAIL DRAWINGS FOR DETAILS OF MATERIALS AND WORKMANSHIP REFER TO THE SPECIFICATION.  
THE CONTRACTOR IS RESPONSIBLE FOR CHECKING INVERT LEVELS AND POSITIONS OF ALL EXISTING DRAINS, SEWERS, INSPECTION CHAMBERS AND MANHOLES SHOWN ON THIS DRAWING IMMEDIATELY ON SITE ESTABLISHMENT. ANY DISCREPANCIES MUST BE REPORTED TO WML CONSULTING IMMEDIATELY.  
WHERE THE NEW SITE DRAINAGE CONNECTS IN TO EXISTING MANHOLES IN CARRIAGEWAYS AND/OR EXISTING ADOPTED SEWERS, THE CONTRACTOR IS RESPONSIBLE FOR ALL LIAISON WITH THE RELEVANT STATUTORY UNDERTAKER AND LOCAL AUTHORITY WITH REGARD TO ROAD CLOSURES, TRAFFIC MANAGEMENT, PERMITS TO WORK, SUBMISSION OF CONTRACTORS METHOD STATEMENTS AND RISK ASSESSMENTS AND OTHER DOCUMENTATION AND CORRESPONDENCE ASSOCIATED WITH THE SITE STAGE (PART 2) ELEMENT OF THE WORKS.  
ROCKER PIPES TO BE PROVIDED AT ALL CONCRETE CASED INTERFACES.  
PROVIDE ADEQUATE PROTECTION TO MAINTAIN MINIMUM COVER TO DRAINS DURING THE CONSTRUCTION PERIOD.  
ALL DRAINAGE GOODS & FITTINGS TO BE:-  
UP TO 3000 (AND INCLUDING) TO BE SUPERSLEVE VITRIFIED CLAY PIPES OR SIMILAR.  
ABOVE 3000 TO BE CONCRETE BY STANTON BONNA OR SIMILAR.  
CONCRETE SURROUND REQUIRED ON ALL PIPES WHERE DEPTH TO SOFFIT IS LESS THAN 450mm.  
ALL COVERS AND RIDDING ACCESS POINTS TO BE SEALED AND SCREWED TIGHT.  
ALL INTERNAL MANHOLE COVERS TO BE DOUBLE SEALED, LOCKABLE AND RECESSED TO ACCEPT FLOOR FINISHES WHERE APPLICABLE.  
SETTING OUT OF ALL INTERNAL GULLY/PLUMBING CONNECTIONS TO BE CO-ORDINATED BETWEEN THE SERVICE ENGINEERS AND THE ARCHITECT.  
ALL INTERNAL GULLIES, PLUMBING CONNECTIONS, SOIL STACKS, SVPS AND ALL OTHER CONNECTIONS OF FOUL AND SURFACE WATER DRAINS TO BELOW GROUND TO BE FITTED WITH ACCESSIBLE RIDDING POINTS ABOVE SLAB LEVEL.  
ALL SURFACE WATER CONNECTIONS TO BE 150mm DIAMETER AT MINIMUM FALLS OF 1:80 UNLESS NOTED OTHERWISE.  
ALL FOUL WATER CONNECTIONS TO BE 150mm DIAMETER AT MINIMUM FALLS OF 1:150 UNLESS NOTED OTHERWISE.

**GENERAL NOTES (CONTINUED)**

ALL CONNECTIONS TO BE MADE IN ACCORDANCE WITH STANDARD DETAIL DRAWINGS.  
ALL PIPEWORK TO BE INSTALLED WITH SOFFITS LEVEL (E.G. AT CHANGES IN PIPE SIZE) U.N.O.  
FOR DETAILS OF GREASE TRAP/MACERATOR REQUIREMENTS ASSOCIATED WITH KITCHENS REFER TO SERVICE ENGINEER.  
ON COMPLETION OF DRAINAGE WORKS, THE NEW DRAINAGE SYSTEM IS TO BE THOROUGHLY CLEANED AND A CCTV SURVEY CARRIED OUT TO CONFIRM NO CONSTRUCTION DEBRIS OR BLOCKAGES REMAIN.  
CONNECTIONS TO CARRIER DRAINS ARE TO BE "Y" JUNCTIONS.  
ALL PRIVATE DRAINAGE IS TO COMPLY WITH BS EN 752 AND BUILDING REGS. PART H.  
PIPE GRADIENTS ARE INDICATIVE MINIMUMS. SURFACE CHANNEL DRAINS TO BE ACO MULTIDRAIN OR SIMILAR.

**MANHOLE COVERS:**

IN VEHICULAR AREAS - EN124 CLASS D400  
IN NON-VEHICULAR AREAS - EN124 CLASS B125

**MAINTENANCE OF THE BELOW GROUND DRAINAGE SYSTEM**

THE SURFACE WATER DRAINAGE PROPOSALS INDICATED ARE RELATIVELY TRADITIONAL IN NATURE, AND SHOULD PROVIDE YEARS OF RELATIVELY LOW MAINTENANCE OPERATION IN RELATION TO THE ANTICIPATED LIFESPAN OF THE PROPOSED DEVELOPMENT.

IN LINE WITH CURRENT GOOD PRACTICE:-

- GULLIES AND LINEAR DRAINAGE CHANNELS SHOULD BE INSPECTED AND / OR CLEANED OUT AT 6 MONTHLY INTERVALS TO ENSURE THAT THE PIPEWORK ASSOCIATED WITH THEM IS OPERATING EFFECTIVELY.
- ANY PROBLEMS HIGHLIGHTED BY THESE INSPECTIONS WILL NEED TO BE INVESTIGATED, POSSIBLY BY CCTV SURVEY, TO CONFIRM THE NATURE OF THE PROBLEM AND TO ALLOW IT TO BE REMEDIED IN A TIMELY MANNER.
- IT IS UNDERSTOOD THAT THE MONITORING AND ROUTINE MAINTENANCE OF THE BELOW GROUND DRAINAGE SYSTEM WILL BE CARRIED OUT BY THE SITE'S MAINTENANCE STAFF WITH ADDITIONAL HELP PROVIDED BY EXTERNAL SPECIALIST DRAINAGE PROFESSIONALS BROUGHT IN AS REQUIRED.

**SURFACE WATER DRAINAGE STRATEGY**

THE SURFACE WATER DRAINAGE PROPOSALS HAVE BEEN DESIGNED IN ACCORDANCE WITH BS EN 752-4 AND THE BUILDING REGULATIONS APPROVED DOCUMENT H (2010), WHICH INDICATES THE FOLLOWING HIERARCHY FOR THE DISPOSAL OF SURFACE WATER DRAINAGE FROM DEVELOPMENT SITES:-

- DISCHARGE VIA INFILTRATION;
- DISCHARGE TO WATERCOURSE;
- DISCHARGE TO SEWER.

THESE OPTIONS ARE DISCUSSED IN FURTHER DETAIL BELOW.

**SURFACE WATER DISCHARGE VIA INFILTRATION**

FROM WHAT IS CURRENTLY KNOWN OF THE GROUND CONDITIONS AT THE SITE, IT APPEARS THAT THEY ARE NOT SUITED TO THE USE OF INFILTRATION / SOAKAWAYS.

**SURFACE WATER DISCHARGE VIA WATERCOURSE**

THERE ARE NO EXISTING WATERCOURSES WITHIN OR IN THE VICINITY OF THE SITE. HENCE IT WILL NOT BE FEASIBLE TO DISCHARGE THE SURFACE WATER RUNOFF FROM THE PROPOSED DEVELOPMENT TO A WATERCOURSE.

**SURFACE DISCHARGE VIA THE PUBLIC SEWERAGE SYSTEM**

GIVEN THE ABOVE IT WILL BE NECESSARY TO DISCHARGE THE SURFACE WATER RUNOFF FROM THE PROPOSED DEVELOPMENT TO THE PUBLIC DRAINAGE SYSTEM VIA A NEW CONNECTION TO THE SITE'S EXISTING PRIVATE SURFACE WATER DRAINAGE SYSTEM.

**BASIS OF SURFACE DRAINAGE WATER DRAINAGE DESIGN**

IN LINE WITH MODERN DESIGN STANDARDS FOR SURFACE WATER DRAINAGE SYSTEMS, THE PROPOSALS HAVE BEEN FORMULATED TO ENSURE THERE WILL BE:-

- NO SURCHARGING OF SEWERS FOR THE CRITICAL 1 IN 1 YEAR STORM EVENT.
- NO SURFACE FLOODING FOR THE CRITICAL 1 IN 30 YEAR EVENT.
- NO SURFACE FLOODING THAT MAY AFFECT BUILDINGS ON OR OFF SITE FOR THE CRITICAL 1 IN 100 YEAR EVENT INCLUDING A 45% CLIMATE CHANGE ALLOWANCE.

THE PROPOSED BUILDING HAS AN AREA OF 550m sq, 380m sq OF WHICH WILL BE IN PLACE OF EXISTING IMPERMEABLE AND POSITIVELY DRAINED SERVICE YARD AREA.

THIS 380m sq OF EXISTING SERVICE YARD AREA GENERATES AN EXISTING SURFACE WATER RUNOFF RATE OF 5.28 l / sec WHEN A 50mm / hr RAINFALL INTENSITY IS APPLIED TO IT.

APPLYING A 50% REDUCTION TO THIS EXISTING DISCHARGE RATE GIVES A PROPOSED DISCHARGE RATE OF 2.64 l / sec. THE SURFACE WATER DRAINAGE PROPOSALS HAVE BEEN DESIGNED TO ENSURE THAT THIS PROPOSED DISCHARGE RATE WILL NOT BE EXCEEDED FOR ALL STORMS UP TO AND INCLUDING THE CRITICAL 1 IN 100 YEAR EVENT PLUS A 45% CLIMATE CHANGE ALLOWANCE.

**FOUL WATER DRAINAGE STRATEGY**

IT IS PROPOSED TO DISCHARGE THE FOUL DRAINAGE FLOWS GENERATED BY THE DEVELOPMENT TO THE EXISTING NEARBY PRIVATE DRAINAGE NETWORK THAT SERVES THE SITE CURRENTLY. IT IS ASSUMED THAT THIS EXISTING PRIVATE DRAINAGE SYSTEM EVENTUALLY DISCHARGES INTO THE PUBLIC SEWERAGE SYSTEM.

| DRAINAGE KEY:                  |     |
|--------------------------------|-----|
| PROPOSED SW SEWER              | --- |
| PROPOSED FW SEWER              | --- |
| EXISTING SW SEWER              | --- |
| EXISTING FW SEWER              | --- |
| EXISTING SEWER TO BE ABANDONED | --- |

**PRELIMINARY**

| RESIDUAL RISK REGISTER -                                                                                                                                                           |  |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|
| REFER TO WML CIVIL / STRUCTURAL DESIGN RISK REGISTER IN ADDITION TO THE HAZARDS / RISKS NORMALLY ASSOCIATED WITH THE TYPE OF WORKS INDICATED ON THIS DRAWING. NOTE THE FOLLOWING:- |  |
| • SITE IS AN EXISTING FIRE SERVICE SITE WHICH CONDUCTS HAZARDOUS ACTIVITIES.                                                                                                       |  |
| • EXISTING SERVICES PASSING BELOW PROPOSED BUILDING MAY AFFECT DRAINAGE PROPOSALS.                                                                                                 |  |

|     |                        |          |     |      |
|-----|------------------------|----------|-----|------|
| P02 | DRAWING STATUS AMENDED | 12.10.22 | KPT | AL   |
| P01 | PRELIMINARY ISSUE      | 10.10.22 | KPT | AL   |
| Rev | Amendment              | Date     | By  | Chkd |

Project  
**KINGS WORTHY REPLACEMENT  
HAMPSHIRE FIRE & POLICE HQ, EASTLEIGH**

Client  
**THE MCAVOY GROUP LTD**

Title  
**PROPOSED DRAINAGE LAYOUT**

WML 355 No.  
**10673**

Drawn  
KPT

Checked  
AL

Date  
OCTOBER 2022

Scale  
1:50 AT A1

No 8 Oak Green  
East Road  
Basingstoke Business Park  
Chesilton Road  
Chesilton B36 8QL  
Tel: 01635 482 800  
Fax: 01635 482 810  
www.wmlconsulting.com

**WML CONSULTING**  
Civil, Structural & Geotechnical Engineers

Status: S4 Suitability Description: Suitable for stage approval

|          |            |        |       |      |      |        |     |
|----------|------------|--------|-------|------|------|--------|-----|
| Project  | Originator | Volume | Level | Type | Role | Number | Rev |
| PJT10307 | WML        | 122    | XX    | D    | C    | 1001   | P02 |