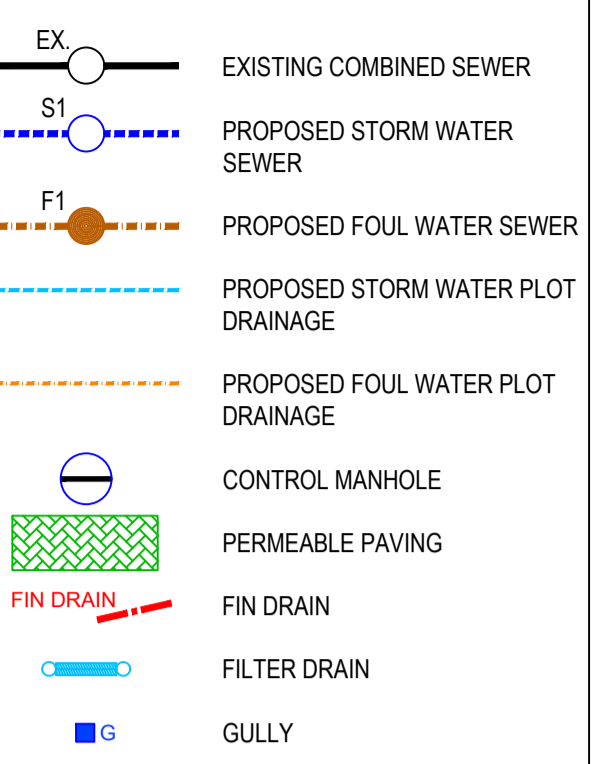




**DRAINAGE NOTES:**

- ALL DRAINAGE WHICH IS TO BE ADOPTED BY "SCOTTISH WATER" IS TO BE CONSTRUCTED IN ACCORDANCE WITH "SEWERS FOR SCOTLAND 4th EDITION" AND ALL SUPPLEMENTARY SCOTTISH WATER DETAILS. DRAINAGE ALSO TO COMPLY WITH ANY "BUILDING STANDARDS" REQUIREMENTS.
- ALL PRIVATE DRAINAGE TO BE IN ACCORDANCE WITH BS EN 12056, BS EN 752, AND RELEVANT SECTIONS OF "APPROVED DOCUMENT H" OF THE BUILDING REGULATIONS. WHERE THERE ARE ANY CONCERNS REGARDING DRAINAGE NOT BEING ABLE TO MEET THESE REQUIREMENTS I.E GRADIENTS AND LEVELS, THE ENGINEER SHOULD BE INFORMED IMMEDIATELY. DRAINAGE ALSO TO COMPLY WITH ANY "BUILDING STANDARDS" REQUIREMENTS.
- EXISTING DRAINAGE INFORMATION HAS BEEN COLLATED USING ALL AVAILABLE INFORMATION, AND IN SOME CASES CONJECTURED USING THIRD PARTY INFORMATION. WHILE EVERY CARE HAS BEEN TAKEN IN THE ACCURACY OF ALL ROUTING AND LEVELS, IT SHOULD BE TREATED AS INDICATIVE UNTIL CHECKED & CONFIRMED ON SITE. THE CONTRACTOR IS TO CHECK THE EXISTING DRAINAGE LEVELS, GEOMETRY, CONNECTION & VIABILITY, AND CONFIRM THAT THE NETWORK IS RUNNING FREELY WITH NO DEFECTS PRIOR TO ANY DRAINAGE WORKS COMMENCING.
- ANY EXISTING SERVICES DISCOVERED DURING EXCAVATIONS TO BE REPORTED TO THE RELEVANT BODY IMMEDIATELY.
- THE CONTRACTOR IS TO ENSURE THE DRAINAGE SYSTEMS ARE FREE FROM DEBRIS, AND FLOWING FREELY, ON COMPLETION OF WORK.
- THE CONTRACTOR IS TO ENSURE THAT PROTECTIVE MEASURES ARE TAKEN TO ENSURE THAT ALL DRAINAGE PIPEWORK, AND FITTINGS, ARE NOT DAMAGED BY THE SITE TRAFFIC PRIOR TO OVER SITE FILLING OPERATIONS BEING COMPLETED AROUND BUILDINGS.
- ALL PLAN CHAMBER LEVELS SHOWN ARE FOR QUICK REFERENCE PURPOSES ONLY AND SHOULD NOT BE USED FOR CARRYING OUT WORKS. CHAMBER INVERT LEVELS GIVEN ARE THE PIPE INVERT LEVELS, THEREFORE NOT NECESSARILY THE CHAMBER BASE LEVEL.
- ALL CHAMBERS SHOULD BE LOCATED FULLY ON EITHER SOFT OR HARD LANDSCAPING. THE CONTRACTOR SHOULD STRING OUT HARD LANDSCAPING AND DRAINAGE PRIOR TO CONSTRUCTION IN ORDER TO ENSURE NO OVERLAPPING OF SURFACES AND/OR KERB INTERSECTING OCCURS.
- CHAMBER COVERS WITHIN AREAS OF BLOCK PAVING (BOTH STANDARD NON-PERMEABLE AND PERMEABLE) SHOULD BE LAID SQUARE TO THE LAYING PATTERN OF THE BLOCK PAVERS.
- WHERE CONNECTIONS ARE TO BE MADE TO/FROM EXISTING MANHOLES/PIPES, THE MANHOLE/PIPE LOCATIONS, INVERT LEVELS, PIPE SIZES, ORIENTATION AND GENERAL VIABILITY MUST BE CHECKED AND CONFIRMED BY THE CONTRACTOR PRIOR TO THE WORKS COMMENCING. ANY VARIANCES SHOULD BE REPORTED TO THE ENGINEER IMMEDIATELY.
- CHAMBER PIPE CONNECTIONS ARE TO BE MADE SOFFIT TO SOFFIT WHERE DOWNSTREAM PIPE IS LARGER THAN THE UPSTREAM PIPE, UNLESS NOTED OTHERWISE.
- NO PRIVATE AREAS ARE TO DRAIN ONTO AREAS FOR ADOPTION.
- PIPE TYPES  
PIPE DIA. UP TO AND INCLUDING 300mm ARE TO BE UPVC PIPES TO BS 4660:2000 AND BS EN 1401-1. PIPE DIA. GREATER THAN 300mm ARE TO BE CONCRETE TO BS 5911 OR VITRIFIED CLAY TO BS EN 295, AND BS 65 (STORM WATER SEWERS ONLY)
- PIPE PROTECTION  
ALL ADOPTABLE PIPEWORK WITH LESS THAN 1200mm OF EFFECTIVE COVER IN BOTH VEHICULAR/HARD AREAS AND LANDSCAPED/SOFT AREAS, TO INCORPORATE CONCRETE PROTECTION TO THE PIPE (REFER TO RELEVANT DETAIL). FLEXIBLE JOINTS ARE TO BE PROVIDED AT ALL PIPE CONNECTIONS.  
ALL PRIVATE PIPEWORK WITH LESS THAN 900mm OF EFFECTIVE COVER TO VEHICULAR/HARD AREAS, AND LESS THAN 600mm COVER TO LANDSCAPED/SOFT AREAS, TO INCORPORATE CONCRETE PROTECTION TO THE PIPE (REFER TO RELEVANT DETAIL). FLEXIBLE JOINTS ARE TO BE PROVIDED AT ALL PIPE CONNECTIONS. WHERE PIPELINES CROSS WITHIN 300mm OF EACH OTHER, BOTH PIPES TO INCORPORATE CONCRETE PROTECTION (REFER TO RELEVANT DETAIL)
- DISCONNECTING CHAMBER TAILS  
DISCONNECTING CHAMBER TAILS ARE PROPOSED FOR ADOPTION THEREFORE SHOULD ADHERE TO ADOPTABLE PIPE CRITERIA I.E MINIMUM DIA. OF 150mm, CONCRETE PROTECTION REQUIRED WHERE COVER DEPTH <1.2m  
  
DISCONNECTING CHAMBER TAILS TO BE LAID AT A PREFERRED MINIMUM GRADIENT OF 1:60 AND 1:10 PREFERRED MAXIMUM. WHERE TAILS FALL STEEPER THAN 1:5 THE ENGINEER SHOULD BE NOTIFIED AS SPECIFIC BEDDING MAY BE REQUIRED.

**DRAINAGE KEY:**



**GENERAL NOTES:**

- THIS DRAWING IS THE COPYRIGHT OF THE CONSULTANTS AND MUST NOT BE REPRODUCED OR USED WITHOUT THEIR PERMISSION.
- THIS DRAWING IS TO BE READ IN CONJUNCTION WITH ALL RELEVANT ARCHITECTS, ENGINEERS AND SPECIALIST SUBCONTRACTORS DRAWINGS, AND THE SPECIFICATION.
- THIS DRAWING SHOULD BE USED FOR ITS SPECIFIC TITLE PURPOSE ONLY. SITE INFORMATION SHOWN WHICH DOES NOT RELATE TO THE PRIMARY PURPOSE OF THIS DRAWING MAY NOT BE CURRENT.
- THIS DRAWING SHOULD NOT BE USED FOR ANY FORM OF SETTING OUT OR CO-ORDINATION OTHER THAN THE CO-ORDINATES ETC PROVIDED SPECIFICALLY FOR THIS PURPOSE.
- ANY DISCREPANCIES IN DIMENSIONS, OR DETAILS, ON OR BETWEEN DRAWINGS SHOULD BE BROUGHT TO THE ATTENTION OF THE ARCHITECT AND/OR THE ENGINEER IN WRITING FOR CLARIFICATION.
- ALL SWITCHED OFF, FROZEN, NON-PRINTABLE LAYERS WITHIN ELECTRONIC ISSUES OF THIS DRAWING SHOULD BE DISREGARDED.
- ALL DIMENSIONS ARE IN MILLIMETRES, UNLESS NOTED OTHERWISE. ALL LEVELS ARE IN METRES.

THE BELOW GROUND DRAINAGE SHOULD BE CONSTRUCTED IN ACCORDANCE WITH THE GUIDANCE IN NATIONAL ANNEX NE OF BS EN 752: 2008 AND TESTING SHOULD BE CARRIED OUT IN ACCORDANCE WITH THE GUIDANCE IN BS EN 1610:1998.

Rev.	Date	Description	By	Eng
Status				
PLANNING				

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Project Title:  
**SPINDLEHAWK LIMITED  
 FORMER CAR PARK  
 AT ELFIN SQUARE  
 GORGIE ROAD, EDINBURGH**

Drawing Title:  
**PROPOSED DRAINAGE LAYOUT**

Date:	Scale:	Engineer:	Technician:
Jan.2020	1:200@A1	CB	CB
Drawing Number:	Rev.		
305786-C-200	-		