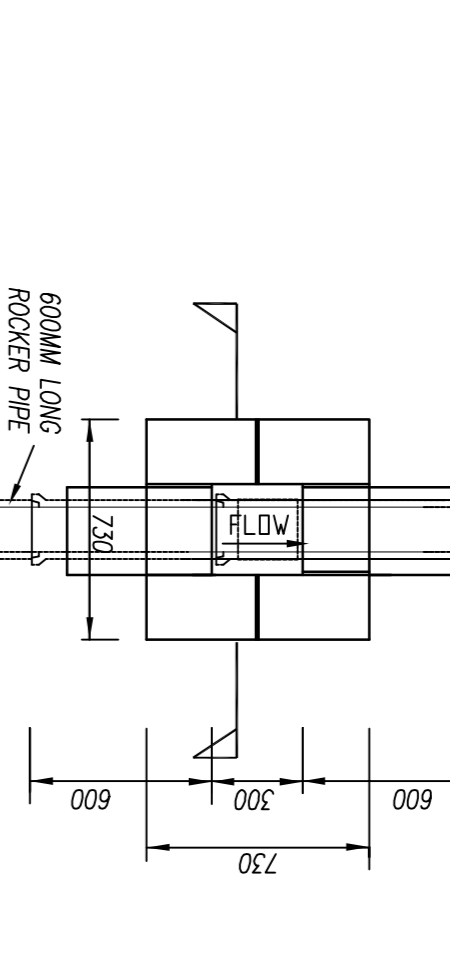
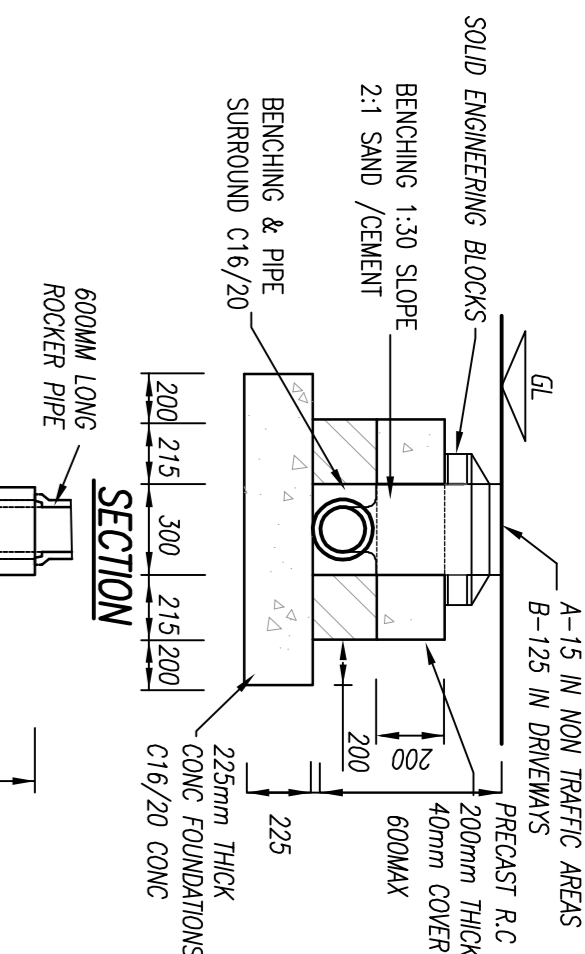


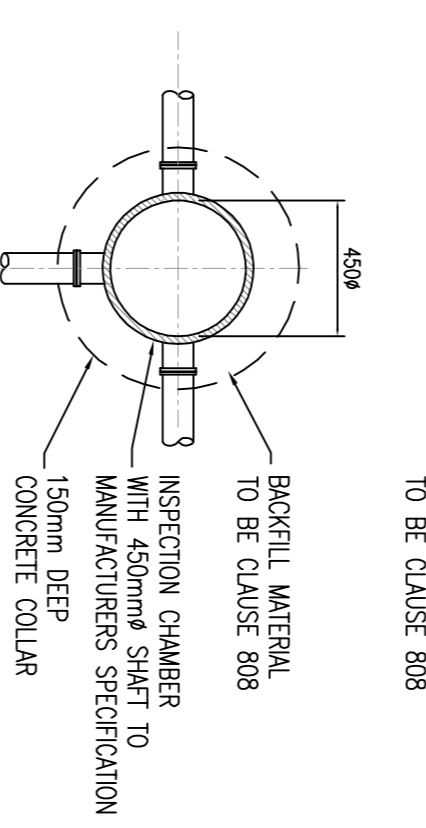
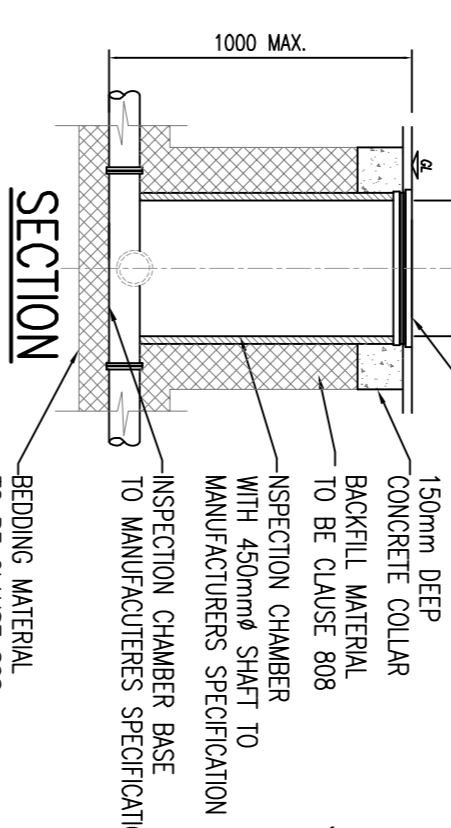
**CIRCULAR INSPECTION CHAMBER WHERE INVERT IS 0.6m OR LESS BUILDING REGULATIONS TGD SECTION H TABLE 9**

SCALE 1:25



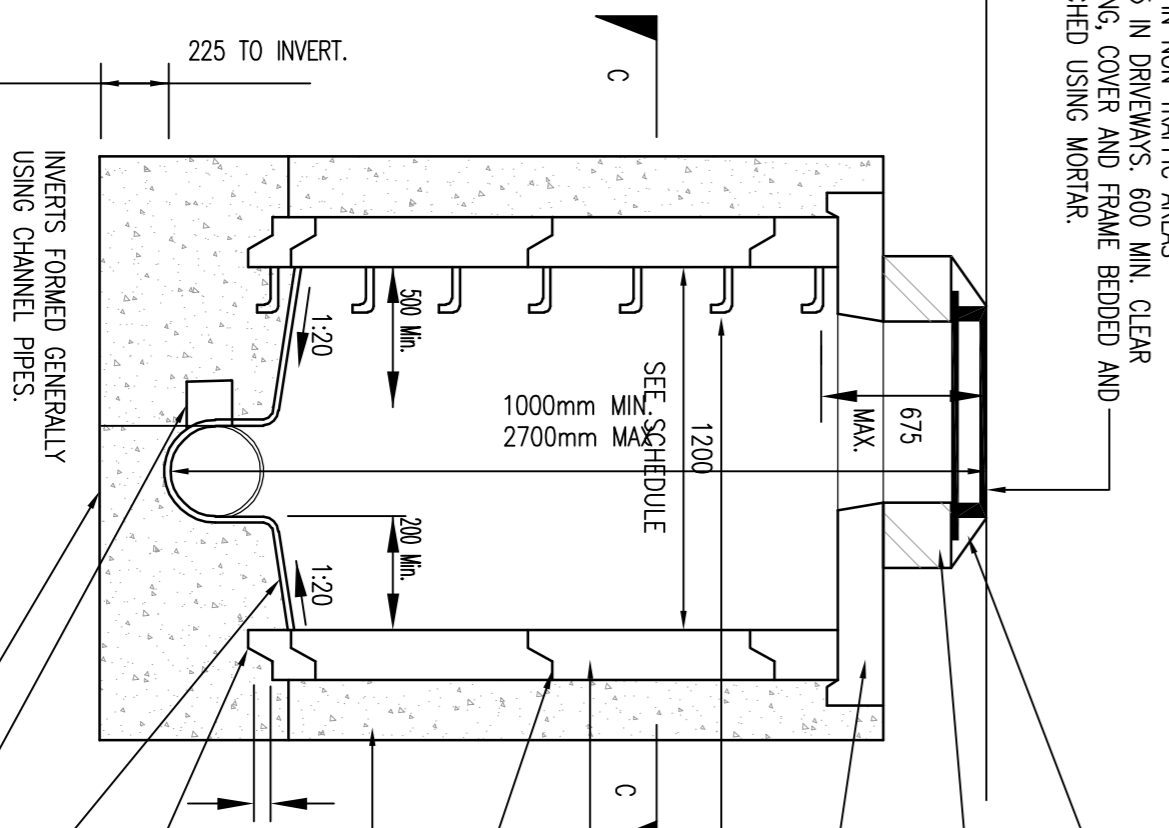
**INSPECTION CHAMBER WHERE INVERT IS 0.6m OR LESS BUILDING REGULATIONS TGD SECTION H TABLE 9**

SCALE 1:25



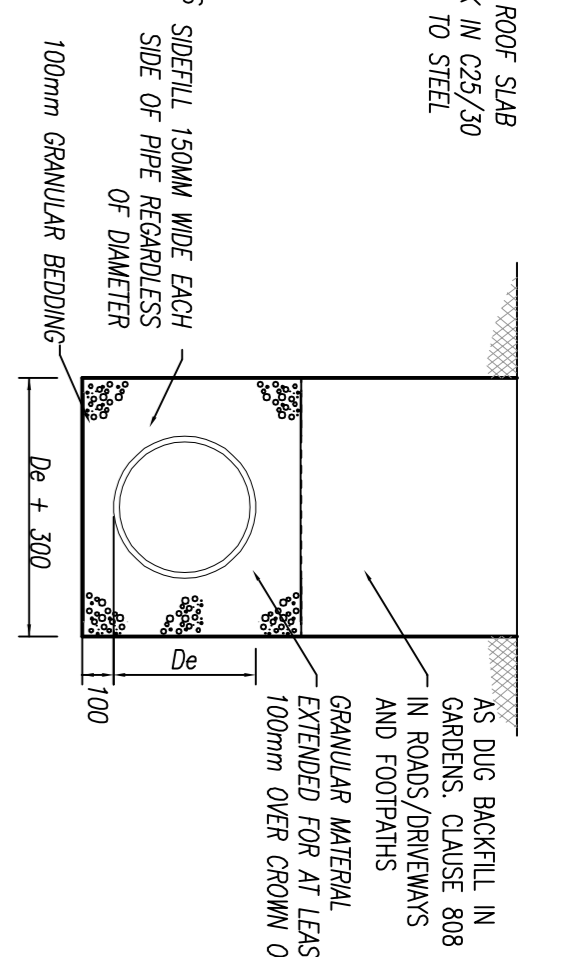
**CIRCULAR INSPECTION CHAMBER WHERE INVERT IS 1m OR LESS BUILDING REGULATIONS TGD SECTION H TABLE 9**

SCALE 1:25



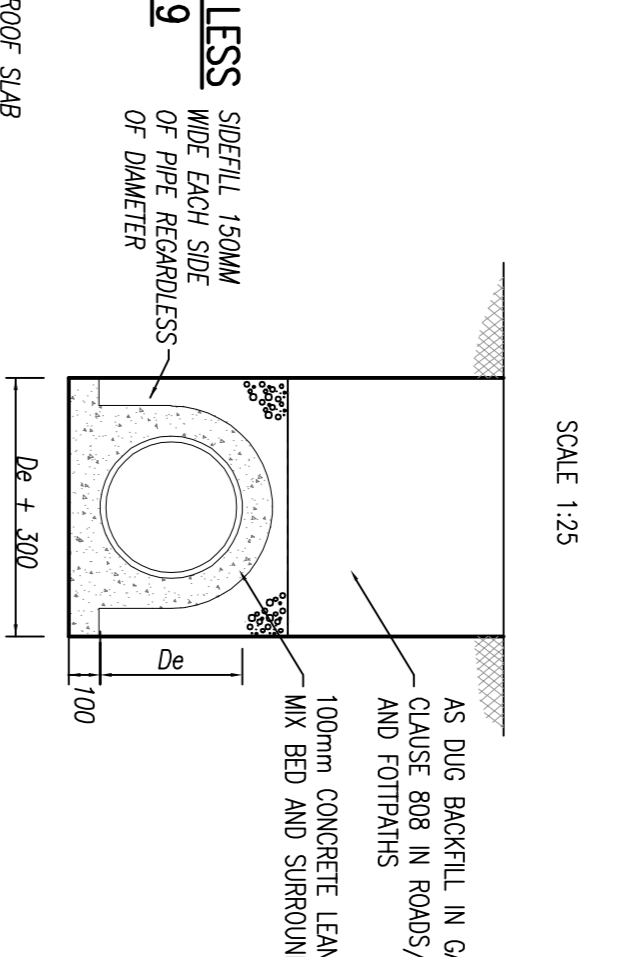
**CIRCULAR MANHOLE WHERE INVERT IS BETWEEN 1m AND 2.7m BUILDING REGULATIONS TGD SECTION H TABLE 9**

SCALE 1:25



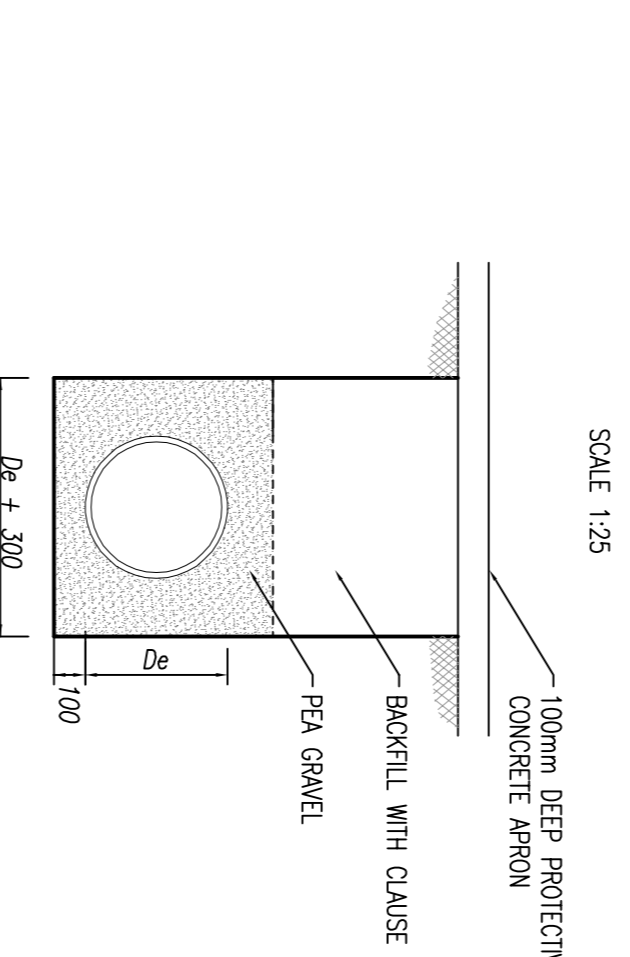
**PIPES BEDDED IN GRANULAR MATERIAL COVER > 0.9m IN ROADS COVER > 0.6m IN GARDENS**

SCALE 1:25



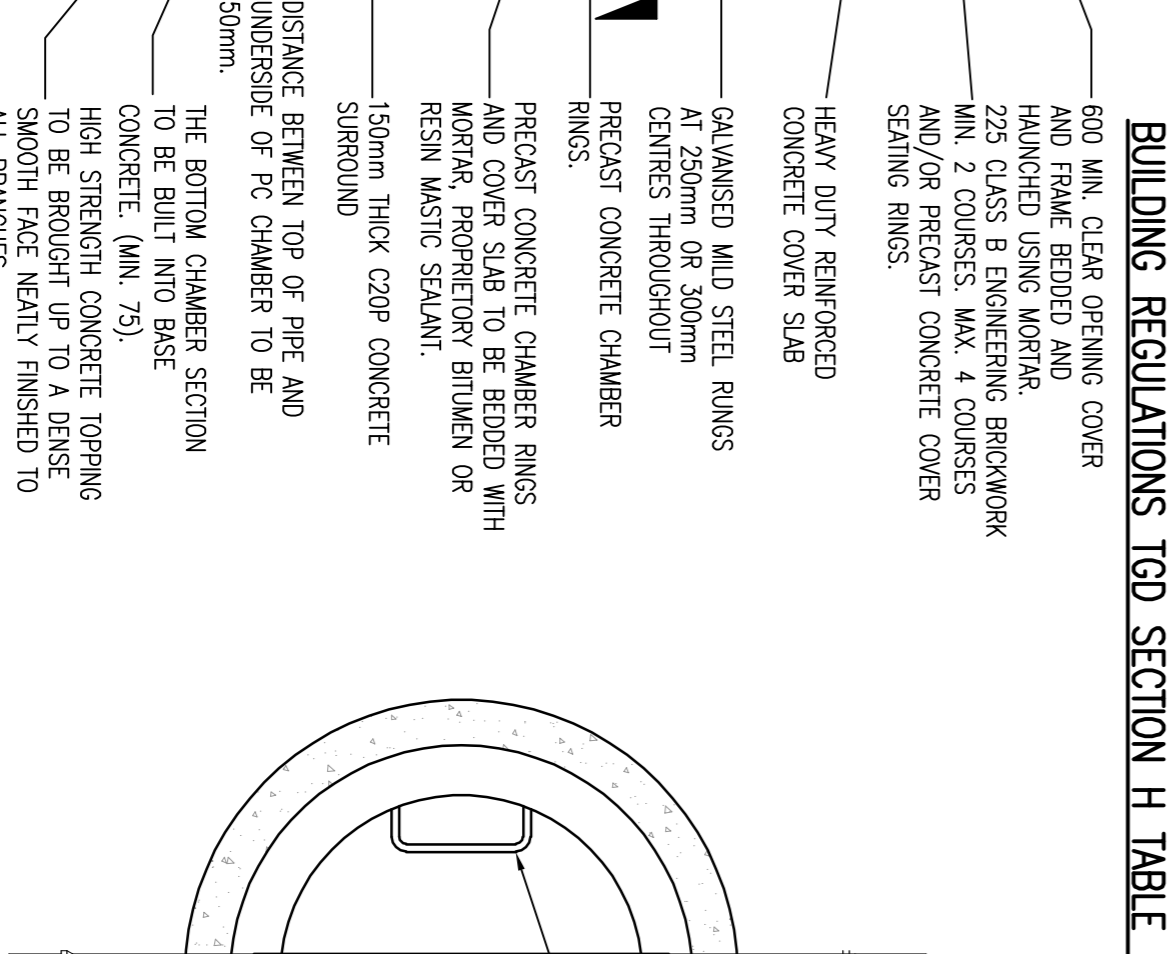
**PIPES BEDDED IN CONCRETE COVER < 0.9m IN ROADS COVER < 0.6m IN GARDENS**

SCALE 1:25



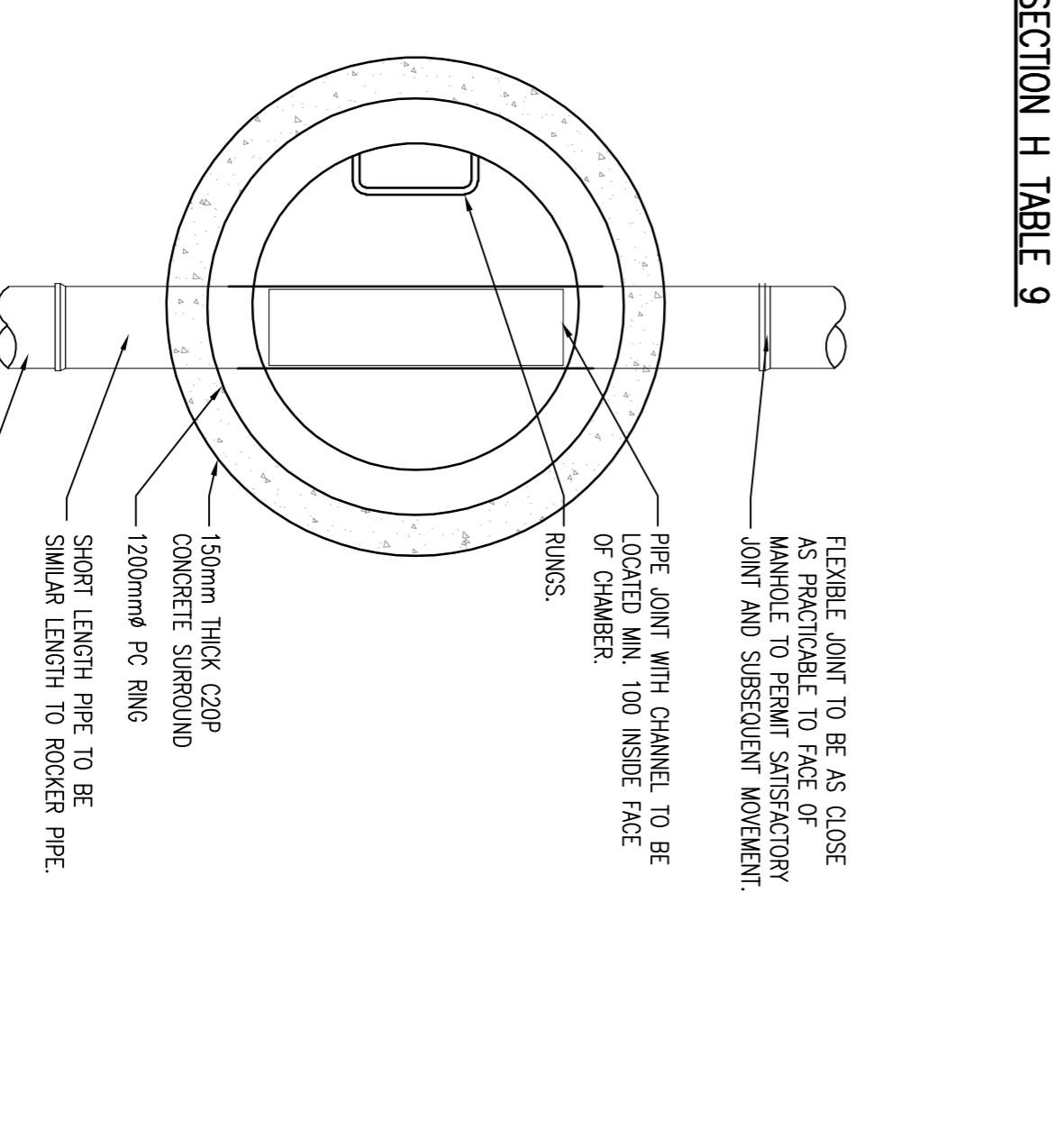
**PIPES BEDDING ALTERNATIVE DETAIL COVER < 0.9m IN ROADS COVER < 0.6m IN GARDENS**

SCALE 1:25

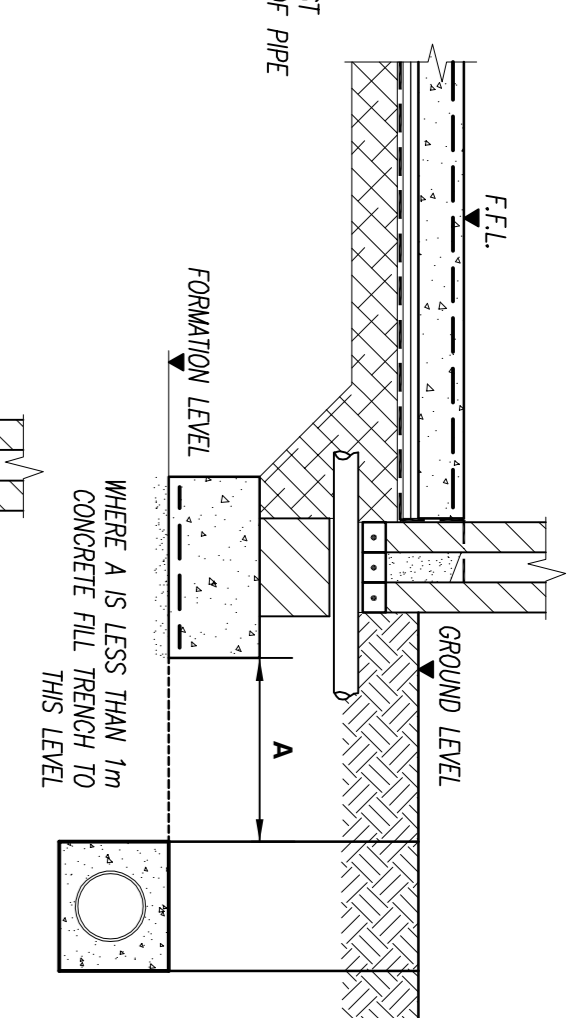


**INSPECTION CHAMBER WHERE INVERT IS 1m OR LESS BUILDING REGULATIONS TGD SECTION H TABLE 9**

SCALE 1:25

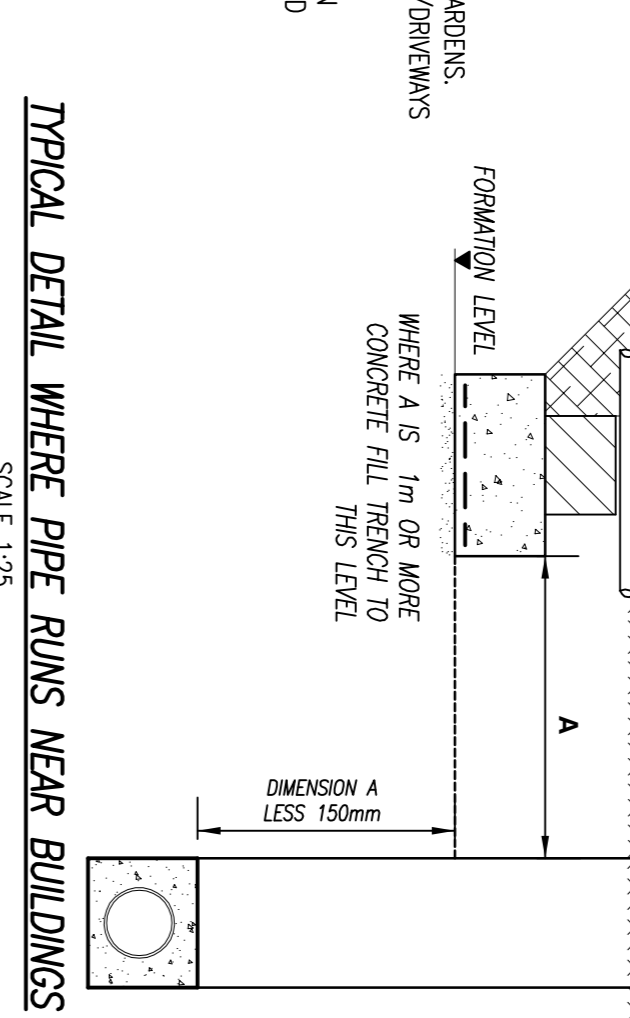


**SECTION C-C**



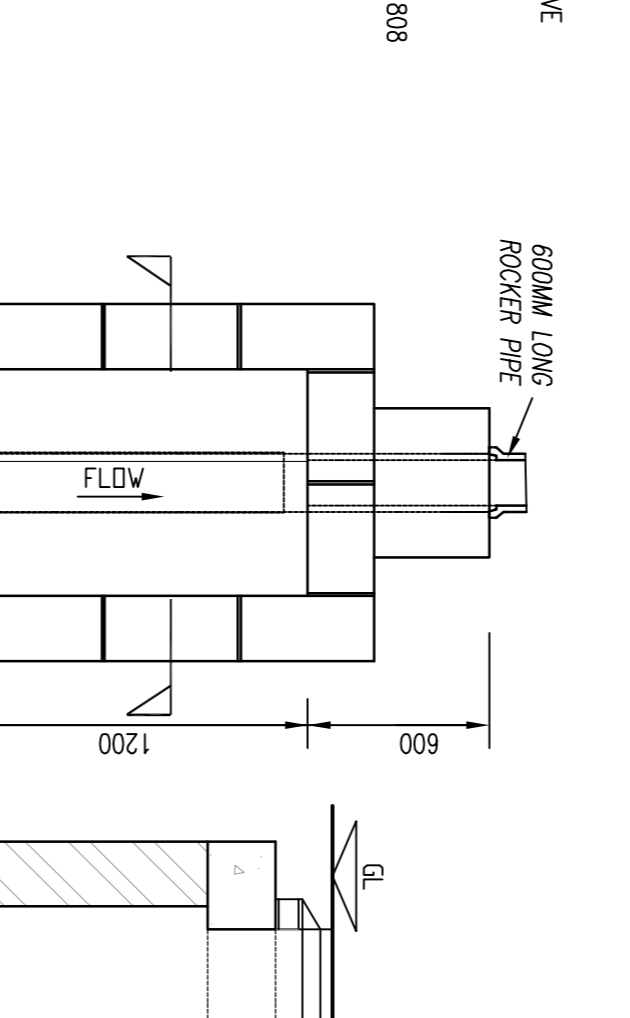
**TYPICAL DETAIL WHERE PIPE RUNS NEAR BUILDINGS**

SCALE 1:25



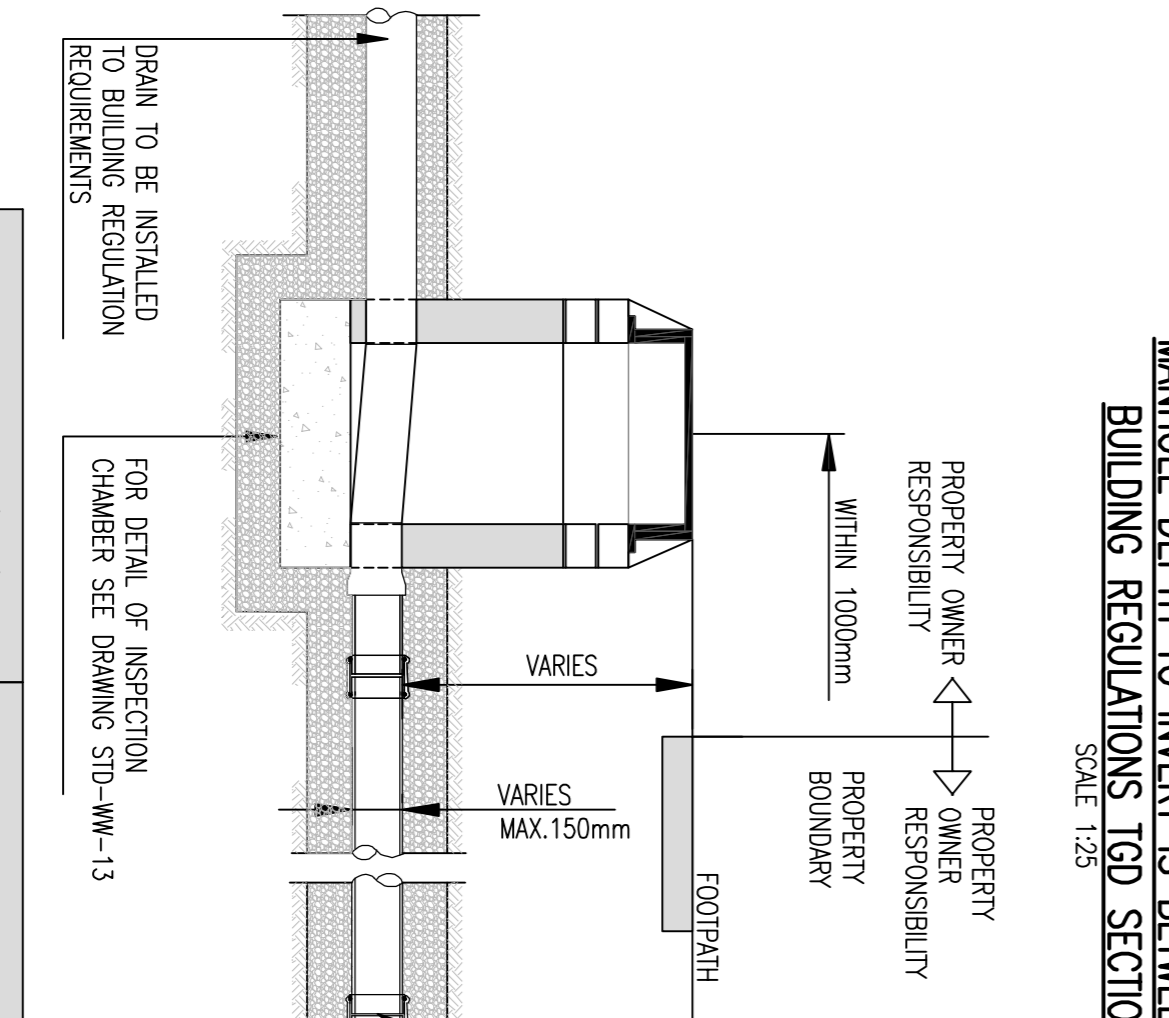
**FLOOR PLAN INSPECTION CHAMBER (BLOCK WORK CONSTRUCTION)**

SCALE 1:25



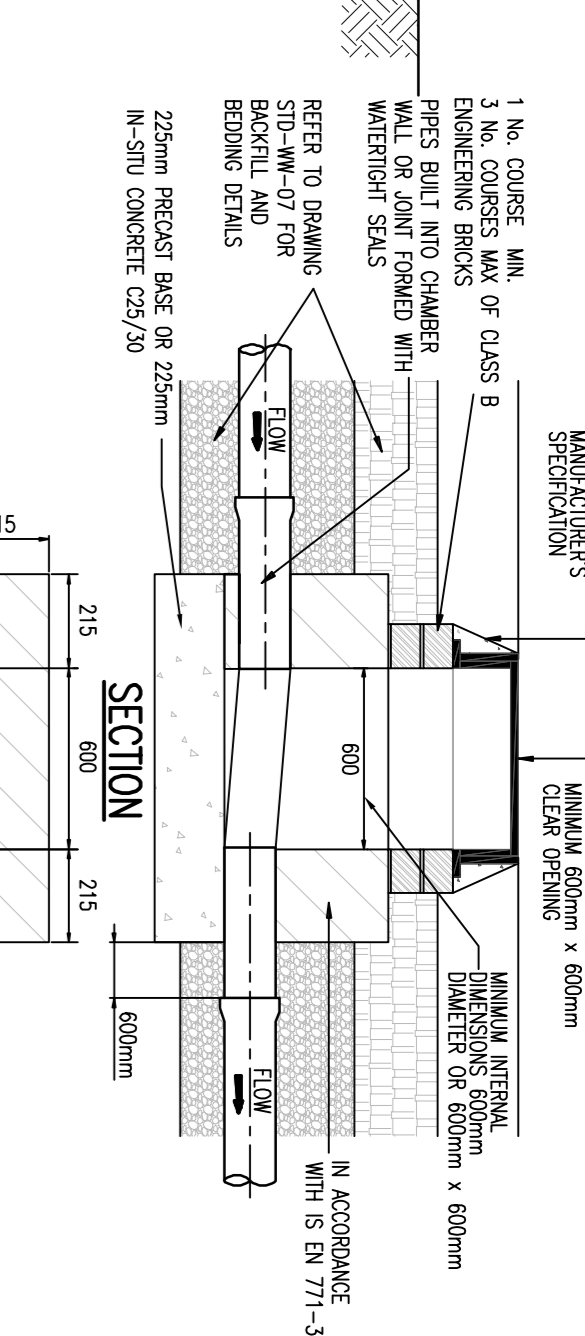
**MANHOLE DEPTH TO INVERT IS BETWEEN 1m AND 2.7m BUILDING REGULATIONS TGD SECTION H TABLE 9**

SCALE 1:25



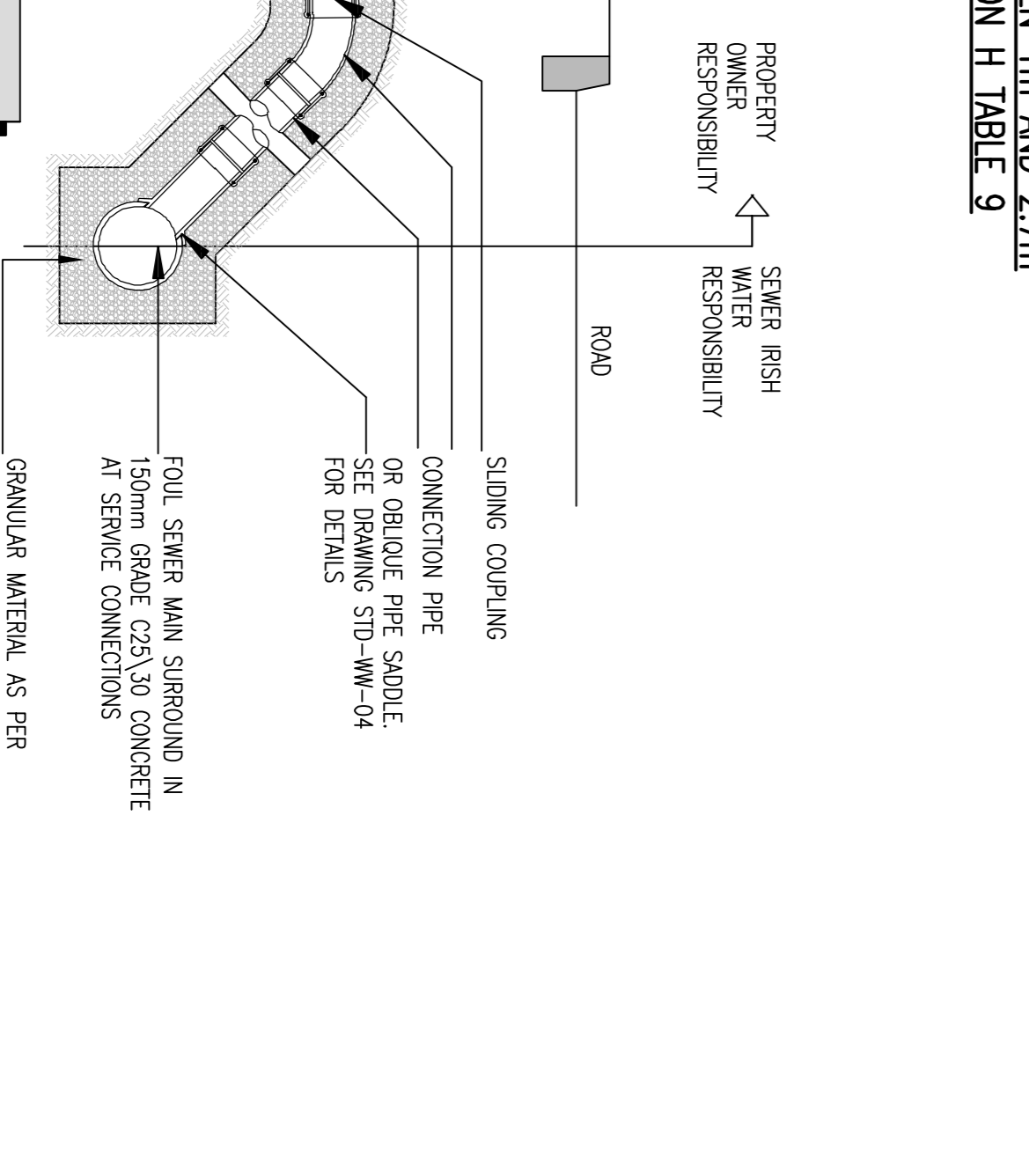
**PRIVATE DRAIN AND SERVICE CONNECTION PIPEWORK**

SCALE 1:60



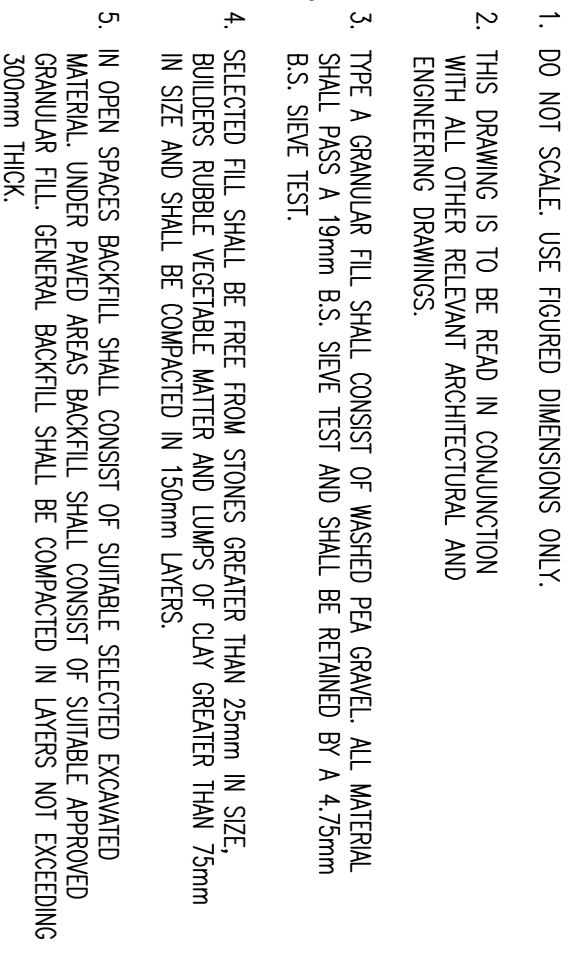
**NOTES**

- DO NOT SCALE. USE FIGURED DIMENSIONS ONLY.
- THIS DRAWING IS TO BE READ IN CONJUNCTION WITH ALL OTHER RELEVANT ARCHITECTURAL AND ENGINEERING DRAWINGS.
- TYPE A GRANULAR FILL SHALL CONSIST OF WASHED PEA GRAVEL. ALL MATERIAL SHALL PASS A 19mm B.S. SIEVE TEST AND SHALL BE REMOVED BY A 4.75mm B.S. SIEVE TEST.
- SELECTED FILL SHALL BE FREE FROM STONES GREATER THAN 25mm IN SIZE. BUILDERS RIBBLE VEGETABLE WASTE AND LIMES OF CLAY GREATER THAN 75mm IN SIZE AND SHALL BE COMPACTED IN 150mm LAYERS.
- IN OPEN SPACES BACKFILL SHALL CONSIST OF SUITABLE SELECTED EXCAVATED MATERIAL. UNDER PAVED AREAS BACKFILL SHALL CONSIST OF SUITABLE APPROVED GRANULAR FILL. GENERAL BACKFILL SHALL BE COMPACTED IN LAYERS NOT EXCEEDING 300mm THICK.
- CONCRETE BED AND SURROUND SHALL BE USED ON ALL PIPES WHERE COVER TO THE TOP OF THE PIPE IS LESS THAN 1.2m IN ROADS, FOOTPATHS AND GRASS MARGINS AND 0.9m IN OPEN SPACES AND FELDS.
- ALL CONCRETE FOR PIPE BEDDING, HAUNCHING AND SURROUNDS SHALL BE CLASS 808/20.
- ALL MANHOLES SHALL BE WATERPROOF TO THE SATISFACTION OF THE ENGINEER.
- FRAMEWORK TO REINFORCED CONCRETE AND MASS CONCRETE SHALL BE CLASS F2.
- CLASS U2 FINISH TO THE TOP OF SLABS. REINFORCEMENT TO SLABS TO ENGINEERS DETAILS.
- 200MM THICK CLASS 30/20 MASS CONCRETE FOUNDATIONS, 225MM THICK PRECAST R.C. ROOF SLAB IN CLASS 30/20 CONCRETE. COVER TO STEEL TO BE 40mm.
- THE HOLES TO BE PROVIDED IN BRANCHING OF SEWERS GREATER THAN 450mm DIAMETER FOR ACCESS TO INVERT SAFETY CHAIN ON SEWERS 600mm DIA. OR GREATER AND STEEL SAFETY CHAIN SHALL BE 10MM NOMINAL SIZE GRADE W/80 NON LUBRICATED CHAIN, TYPE 1, COMPLIANT WITH BS4942 PART 2.
- WHERE DEPTH OF MANHOLES TO INVERT IS GREATER THAN 3.5m, LOGGERS SHALL BE PROVIDED TO INVERT TO THE MANHOLE. THE LENGTH OF THE LOGGERS SHALL BE 65 X 20mm IN SECTION AND RUNS 25mm IN DIAMETER.
- LOOPER STRAINERS SHOULD BE ADEQUATELY SUPPORTED FROM THE MANHOLE WALL AT INTERVALS OF NOT MORE THAN 3.0m. STRAINERS SHOULD BE BOLTED TO FACILITATE REMOVAL.
- ALL LADDERS, RUNGS, HANDRAILS, SAFETY CHAIN, ETC. SHALL BE HOT DIPPED GALVANIZED TO BS729.
- ALL SURFACE WATER WORKS TO BE CARRIED OUT IN ACCORDANCE TO PRECAST MANHOLE CONSTRUCTION REQUIREMENTS. ALL TYPICAL MANHOLES TO BE DRAINED OUT IN ACCORDANCE TO RELEVANT REQUIREMENTS.
- ACCESS JUNCTIONS TO BE USED AT DEPTHS OF 600mm OR LESS. INSPECTION CHAMBERS TO BE USED BETWEEN DEPTHS OF 600mm AND 1m.
- ALL WORKS IN ACCORDANCE WITH THE BUILDING REGULATIONS TECHNICAL GUIDANCE DOCUMENT - CURRENT VERSION & WITH IRISH WATER STANDARD DETAILS.
- MIN COVER REQUIREMENTS IN ACCORDANCE WITH THE BUILDING REGULATIONS TGD SECTION H. REFER TO TABLES 8 AND 9 FOR COVER AND ACCESS CHAMBER REQUIREMENTS.
- ALL MANHOLE AND CHAMBER COVERS IN TRAFFICKED AREAS INCLUDING CARPARKS TO BE TRAFFICABLE.
- MANHOLE CHAMBERS >1.5m DEEP - USE 12004 PRECAST CONCRETE SYSTEM MANHOLE CHAMBERS >1.7m DEEP - USE 10504 PRECAST CONCRETE SYSTEM MANHOLE CHAMBERS >2.0m DEEP - USE 4504 W/400 MANHOLE CHAMBERS OR SIMILAR APPROVED MANHOLE CHAMBERS <0.6m DEEP - USE 3004 W/400 MANHOLE CHAMBERS OR SIMILAR APPROVED BEDDING SURROUND - USE 10mm PE GRAVEL.



**PIPE SIZE (mm) GRADIENT**

SCALE 1:60



**FOR PLANNING NOT FOR CONSTRUCTION**

- PROPERTY OWNER RESPONSIBILITY WITHIN 1000mm
- PROPERTY BOUNDARY
- PROPERTY OWNER RESPONSIBILITY
- SEWER IRISH WATER RESPONSIBILITY
- FOOTPATH
- ROAD
- SLIDING COUPLING
- CONNECTION PIPE OR OBSCURE PIPE SADDLE SEE DRAWING STD-WW-04 FOR DETAILS
- FULL SEWER MAIN SURROUND IN 150mm GRADE C25/30 CONCRETE AT SERVICE CONNECTIONS
- GRANULAR MATERIAL AS PER STD-WW-07

DESIGNED	APPROVED	DATE
PJD	MD	NOV 18
JOB NO. 18-059	PRJ NO. P1212	REVISION A

**Waterman Moylan Engineering Consultants**

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**GERARD GANNON PROPERTIES**

ARCHITECT CONROY CROWE KELLY

PROJECT **CLONGRIFIN SHD APPLICATION 1**

**TITLE**

**TYPICAL PRIVATE DRAINAGE CONSTRUCTION DETAILS**