

SOUND INSULATION

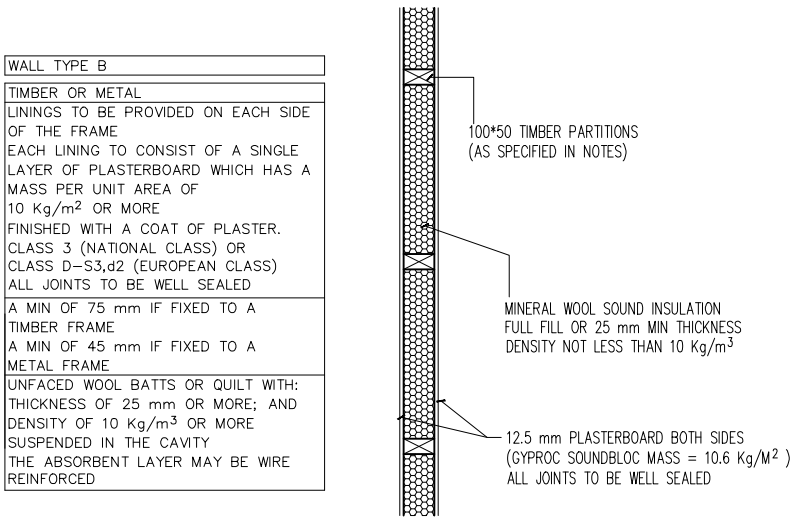
PROVIDE ADEQUATE SOUND RESISTANCE TO THE FOLLOWING NEW ELEMENTS

a) ALL INTERNAL FLOORS

b) ALL INTERNAL WALLS SEPARATING A ROOM FROM A WC (UNLESS EN-SUITE OR CONTAINING A DOOR)

c) ALL INTERNAL WALLS SEPARATING A BEDROOM FROM ANOTHER ROOM (UNLESS CONTAINING A DOOR)

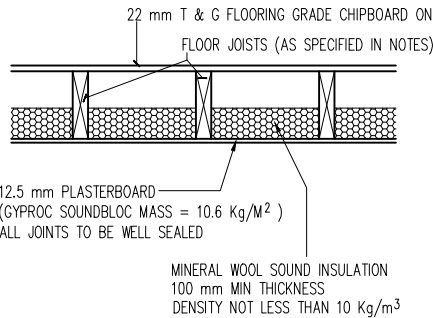
IT IS RECOMMENDED THAT DOOR SETS ARE USED AT DOOR OPENINGS WITH A GOOD PERIMETER SEALING



TYPICAL SECTION THROUGH WALL TYPE B (Scale 1 : 25)

SOUND INSULATION FOR INTERNAL FLOORS

| ELEMENT                     | FLOOR TYPE C                                                                                                                                                                                                             |
|-----------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| STRUCTURE                   | TIMBER OR METAL JOISTS SUPPORTING TIMBER OR WOOD BASED BOARDING<br>A PLASTERBOARD CEILING AND ABSORBENT MATERIAL BETWEEN THE JOISTS                                                                                      |
| REQUIRED MASS PER UNIT AREA | THE TIMBER OR WOOD BASED BOARDING SHOULD HAVE A MASS PER UNIT AREA OF NOT LESS THAN 15 Kg/m <sup>2</sup>                                                                                                                 |
| CEILING FINISH              | A CEILING CONSISTING OF A SINGLE LAYER OF PLASTERBOARD & COAT OF PLASTER<br>MASS PER UNIT AREA OF NOT LESS THAN 10 Kg/m <sup>2</sup> NORMAL METHOD FIXING.<br>CLASS 3 (NATIONAL CLASS) OR CLASS D-S3,d2 (EUROPEAN CLASS) |
| ABSORBENT LAYER             | MINERAL WOOL LAID IN CAVITY BETWEEN JOISTS. THICKNESS NOT LESS THAN 100 mm AND DENSITY NOT LESS THAN 10 Kg/m <sup>3</sup>                                                                                                |
| OTHER                       | SEE BRE BR 262 THERMAL INSULATION: AVOIDING RISKS, SECTION 2.4 REGARDING HEAT EMISSION FROM ELECTRICAL CABLES WHICH MAY BE COVERED BY ABSORBENT MATERIALS                                                                |



TYPICAL SECTION THROUGH FIRST FLOOR (Scale 1 : 25)

SURFACE DRAINAGE

PROVIDE & FIX 100 mm HR EAVES GUTTERS WITH APPROPRIATE STOP ENDS & OUTLETS TO FACIAS WITH APPROVED BRACKETS.

PROVIDE & FIX DOWN PIPES OR CONNECT TO EXISTING RAIN WATER PIPES AT POSITIONS SHOWN ON DRAWING. CONNECT TO B.I.GULLIES. RUN TO EXISTING DISPOSAL POINT OR TO NEW SOAKAWAY.

| MAX ROOF AREA           | GUTTER SIZE  | OUTLET SIZE  | FLOW CAPACITY          |
|-------------------------|--------------|--------------|------------------------|
| 6 Metres <sup>2</sup>   | Not Required | Not Required |                        |
| 18 Metres <sup>2</sup>  | 75 mm Dia.   | 50 mm Dia    | 0.38 Litres per Second |
| 37 Metres <sup>2</sup>  | 100 mm Dia.  | 63 mm Dia    | 0.78 Litres per Second |
| 53 Metres <sup>2</sup>  | 115 mm Dia.  | 63 mm Dia    | 1.11 Litres per Second |
| 65 Metres <sup>2</sup>  | 125 mm Dia.  | 75 mm Dia    | 1.37 Litres per Second |
| 103 Metres <sup>2</sup> | 150 mm Dia.  | 89 mm Dia    | 2.16 Litres per Second |

| FLAT ROOF               | PLAN AREA              |
|-------------------------|------------------------|
| PITCHED ROOF 30 DEGREES | PLAN OF AREA x 1.29    |
| PITCHED ROOF 45 DEGREES | PLAN OF AREA x 1.5     |
| PITCHED ROOF 60 DEGREES | PLAN OF AREA x 1.87    |
| PITCHED ROOF 70 DEGREES | ELEVATIONAL AREA x 0.5 |

UNDERGROUND STORM WATER DRAINAGE

DEPTH OF PIPES

REFER TO SECTION 2.27 – 2.28 (H1) BUILDING REGULATIONS.

PIPE GRADIENTS & SIZE

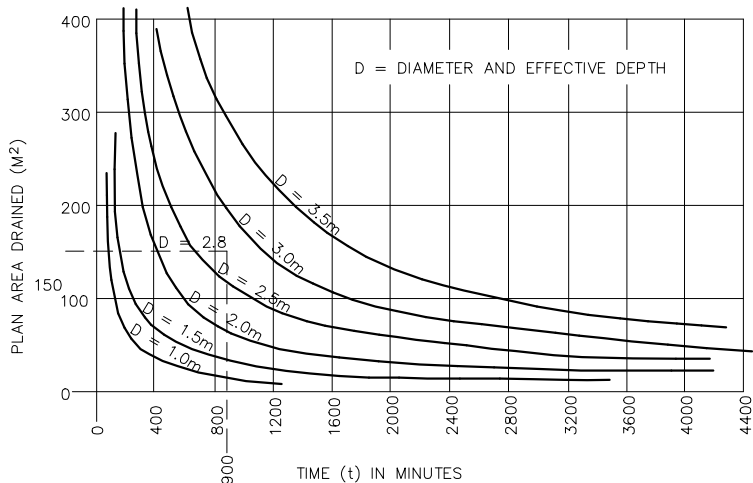
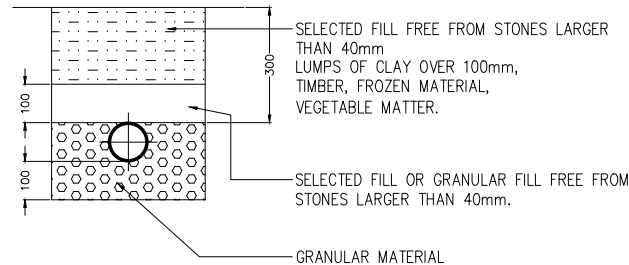
100 mm DIAMETER RAINWATER DRAIN LAID TO 1:00.

MATERIALS

USE UPVC RAINWATER DRAINAGE PIPES or PIPES OF ANY MATERIAL SHOWN IN TABLE 7 (H1) BUILDING REGULATIONS.

JOINTS SHOULD BE APPROPRIATE TO THE MATERIAL OF THE PIPES.

BEDDING & BACKFILLING for FLEXIBLE PIPES



REFER TO NHBC STANDARDS CHAPTER 5.3

NOTE: STORM WATER DISPOSAL TO BE AGREED WITH THE LOCAL BUILDING CONTROL SURVEYOR

EXISTING SOAKAWAY

IF AN EXISTING SURFACE WATER SOAKAWAY IS TO BE REUSED IT WILL NEED TO BE EXPOSED TO CHECK FOR ADEQUACY AND THAT IT IS STILL IN A USABLE CONDITION.

NEW SOAKAWAY

NEW SOAKAWAYS TO BE A MIN 5000mm FROM ANY BUILDING OR ROAD TO BE BLOCK LINED WITH OPEN PERPENDICULAR JOINTS & HAVE A CONCRETE COVER. MIN VOLUME ONE METRE CUBED.

PERCOLATION TEST

A PERCOLATION TEST TO BE CARRIED OUT BY THE CONTRACTOR TO DETERMINE THE CAPACITY OF THE SOIL.

TEST PROCEDURE

A TRIAL HOLE IN A SIMILAR LOCATION & TO THE SAME DEPTH AS THE PROPOSED SOAKAWAY WILL GIVE A MEASURED RATE OF PERCOLATION.

1. BORE A HOLE 150mm DIAMETER TO A DEPTH OF 1000mm.
2. FILL WITH WATER TO A DEPTH OF 300mm ABOVE THE BOTTOM
3. OBSERVE THE TIME TAKEN IN MINUTES FOR THE WATER TO SOAK AWAY
4. IF POSSIBLE REPEAT THE TEST AND USE AN AVERAGE TIME.
5. A SECOND GROUP OF TESTS SHOULD BE CARRIED OUT AFTER THE HOLE HAS BEEN BORED OUT TO A DEPTH OF 2000mm, STILL USING 300mm OF WATER ABOVE THE BOTTOM OF THE HOLE.
6. IF THE SOIL APPEARS TO BECOME MORE PERMEABLE WITH DEPTH, IT MAY BE USEFUL TO DEEPEN& RETEST THE BORE IN ONE METRE STAGES.

DESIGN OF SOAKAWAY

THE RELATIONSHIP BETWEEN THE DIAMETER OR EFFECTIVE DEPTH REQUIRED FOR A SOAKAWAY TO SUIT A GIVEN AREA OF ROOF AND/OR PAVED AREA, AND THE AVERAGE TIME (t) GIVEN BY THE TEST OUTLINED ABOVE IS SHOWN ON THE GRAPH BELOW. THE DIAMETER AND EFFECTIVE DEPTH BELOW INVERT LEVEL ARE ASSUMED TO BE THE SAME DIMENSION (D).

DESIGN EXAMPLE

TEST TIME (t) = 900 MINUTES

PLAN AREA TO DRAIN = 150m<sup>2</sup>

THEREFORE USING THE GRAPH, THE DIAMETER AND EFFECTIVE DEPTH OF THE SOAKAWAY (D) ARE BOTH 2.8m

Rev Date Description

This drawing is intended for Planning & Building Regulation applications only & is not a detailed working drawing.

Building works not to commence until the necessary Planning & Building control approvals have been granted.

Contractors, subcontractors & suppliers are to check all relevant dimensions, site & building levels before commencing any shop drawings, fabrications, or building works.

Any discrepancies found in dimensions or levels to be reported to MARTECH Ltd thus enabling further checks to be carried out.

Methods of construction & materials used are the responsibility of the building contractor assigned to the project.

All new works to be carried out in accordance with Building Regs 2010 and all current codes of practice (Drawings subject to revision until fully approved by building control)

A3 SHEET

Measurements shown are in millimeters

PAPER SIZE A3 - SCALE 1:100

PAPER SIZE A3 - SCALE 1:50

A3 SHEET

Drawing Title

PROPOSED NOTES & DETAILS

Client

Mr & Mrs P Rabbetts

Home Address

13 Privet Road  
Waterlooville  
Portsmouth  
Hants PO7 5HJ

Site Address

13 Privet Road  
Waterlooville  
Portsmouth  
Hants PO7 5HJ

Scale

As Shown

Project Number

1819-109

Date

January 2019

Drawing Number

09

Rev

0

MARTECH BUILDING DESIGN Ltd & CAD Draughting Services

Terry Marston  
Project Designer

Tele/Fax: 01489 894702  
Mobile: 07443 016959  
Email: martechn@talktalk.net