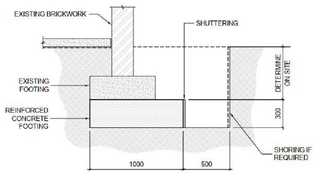
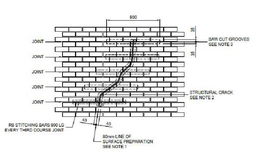


FOUNDATION UNDERPINNING DETAIL '1'

SCALE 1=20

UNDERPINNING DETAIL '1' NOTES:

1. THIS INVOLVES AN INITIAL EXCAVATION OF A NARROW PIT ALONGSIDE THE EXISTING FOUNDATION IN LIMITED LENGTHS (PREFERABLY 1000mm LONG). THIS PIT MUST BE EXCAVATED DOWN TO THE ANTICIPATED NEW FOUNDING LEVEL AND SHOULD BE JUST LARGE ENOUGH TO ALLOW REASONABLE WORKING SPACE.
2. A NARROW TRENCH IS THEN EXCAVATED FROM THE PIT EXTENDING UNDER THE FOUNDATION AND DOWN TO THE FOUNDING STRATUM. THE BASE OF THE EXCAVATION IS THEN CLEANED UP AND A REINFORCED CONCRETE FOOTING CAST.
3. EXCAVATION SHOULD START AT CORNERS AND THEN WORK INWARDS.
4. THE FINAL OPERATION IS THE BACKFILLING OF THE PIT

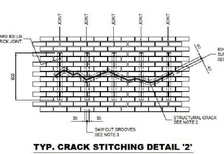


TYP. CRACK STITCHING DETAIL '1'

SCALE 1=20

DETAILS

1. ALL SURFACES WITHIN 50mm OF CRACK LINE SHALL BE THOROUGHLY CLEANED OF ALL FOREIGN MATERIAL LIKELY TO INHIBIT THE BOND OF THE SURFACE SEALANT.
2. CREATE A "V" NOTCH IN THE BRICKWORK APPROXIMATELY 20mm WIDE OVER CRACK.
3. SAW CUT "V" GROOVES PERPENDICULAR TO THE CRACK LENGTH AND SPACED AT REGULAR INTERVALS (MAX 600 CENTRES OVER THE CRACK LENGTH). FILL THE "V" GROOVES AND PLASTER WITH SPECIFIED MATERIAL USING MEASREF 100.
4. ALL DIMENSIONS TO BE CHECKED ON SITE PRIOR TO CONSTRUCTION. ANY DISCREPANCIES TO BE REPORTED TO THE ENGINEER.
5. DIMENSIONAL ACCURACY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR.
6. ALL PLASTER CRACKS AND SPALLING OF PLASTER TO BE REPAIRED AS INSTRUCTED BY ENGINEER ON SITE.
7. REPAIR SYSTEM TO BE USED OR SIMILAR APPROVED
   FRAMIX CONCRETE SURFACE REPAIRS — SIKA TOP-ARMATEC 100
   CONCRETE REPAIRS — SIKA MONO TOP 610HB
   CURING REPAIRS — ANTICOL 15
8. THIS DRAWING AND ALL NOTES MUST BE READ IN CONJUNCTION WITH THE STRUCTURAL ASSESSMENT REPORT



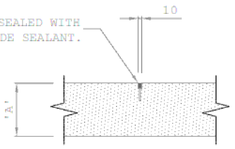
TYP. CRACK STITCHING DETAIL '2'

SCALE 1=20

NOTES:

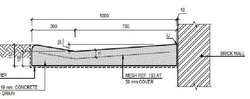
1. ALL SURFACES WITHIN 50mm OF CRACK LINE SHALL BE THOROUGHLY CLEANED OF ALL FOREIGN MATERIAL LIKELY TO INHIBIT THE BOND OF THE SURFACE SEALANT.
2. CREATE A "V" NOTCH IN THE BRICKWORK APPROXIMATELY 20mm WIDE OVER CRACK.
3. SAW CUT "V" GROOVES PERPENDICULAR TO THE CRACK LENGTH AND SPACED AT REGULAR INTERVALS (MAX 600 CENTRES OVER THE CRACK LENGTH). FILL THE "V" GROOVES AND PLASTER WITH SPECIFIED MATERIAL USING MEASREF 100.
4. ALL DIMENSIONS TO BE CHECKED ON SITE PRIOR TO CONSTRUCTION. ANY DISCREPANCIES TO BE REPORTED TO THE ENGINEER.
5. DIMENSIONAL ACCURACY IS THE SOLE RESPONSIBILITY OF THE CONTRACTOR.
6. ALL PLASTER CRACKS AND SPALLING OF PLASTER TO BE REPAIRED AS INSTRUCTED BY ENGINEER ON SITE.
7. REPAIR SYSTEM TO BE USED OR SIMILAR APPROVED:
   FRAMIX CONCRETE SURFACES REPAIRS — SIKA TOP-ARMATEC 100
   CONCRETE REPAIRS — SIKA MONO TOP 610HB
   CURING REPAIRS — ANTICOL 15
8. THIS DRAWING AND ALL NOTES MUST BE READ IN CONJUNCTION WITH THE STRUCTURAL ASSESSMENT REPORT

TOP 15mm TO BE REAMED OUT AND SEALED WITH APPROVED UV RESISTANT POLYSULPHIDE SEALANT.



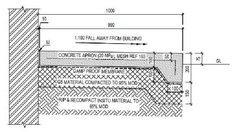
RESEALING FLOOR JOINT DETAIL

SCALE 1 : 10



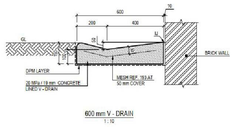
1000 mm V - DRAIN

1 : 10



TYPICAL CONCRETE APRON DETAIL

1 : 10

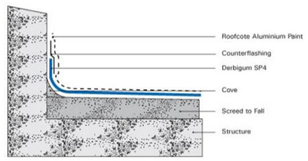


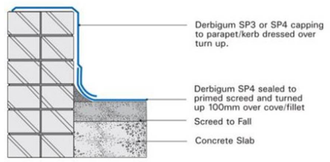
600 mm V - DRAIN

1 : 10

Specification

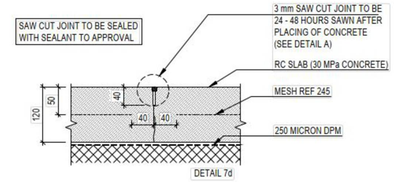
One layer Derbigum SP4 waterproofing membrane, with 75mm side laps and 100mm end laps, sealed to primed surface to falls and crossfalls by 'torch-fusion' finished with two coats bituminous aluminum paint. Waterproofing to be installed by an Approved Derbigum Contractor under a ten year guarantee.





Specification

One layer Derbigum SP3 or SP4 waterproofing membrane, with 75mm side laps, sealed by 'torch-fusion' to side and top of parapet wall to receive paint (elsewhere)

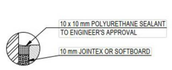


DETAIL 7b-1:
SAW CUT DETAIL

1 : 5

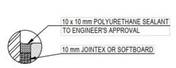
DETAIL B

1 : 2



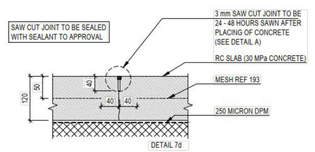
DETAIL B

1 : 2



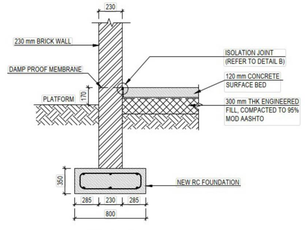
DETAIL B

1 : 2



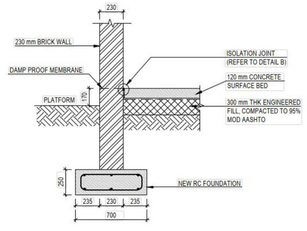
DETAIL 7b:
SAW CUT DETAIL

1 : 5



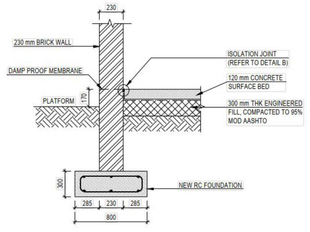
DETAIL 7a:
TYPICAL NEW FOUNDATION DETAIL

1 : 20



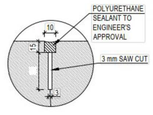
DETAIL 7a-1:
TYPICAL NEW FOUNDATION DETAIL

1 : 20



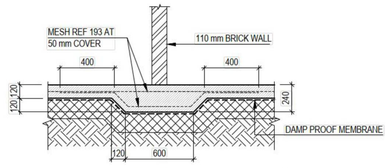
DETAIL 7a-2:
TYPICAL NEW FOUNDATION DETAIL

1 : 20



DETAIL A

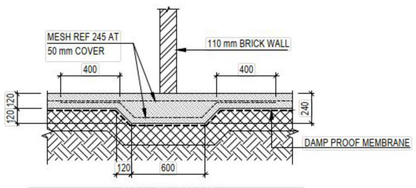
1 : 2



FOR LAYER WORK DETAIL SEE DETAIL 7d

DETAIL 7c:
SECTION THROUGH SURFACE BED THICKENING

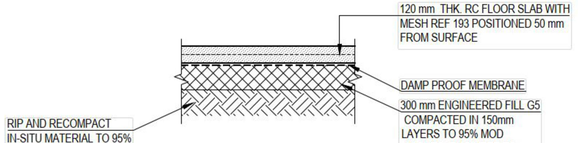
1 : 20



FOR LAYER WORK DETAIL SEE DETAIL 7d

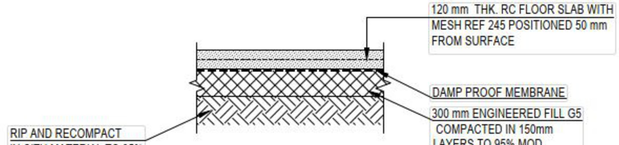
DETAIL 7c-1:
SECTION THROUGH SURFACE BED THICKENING

1 : 20



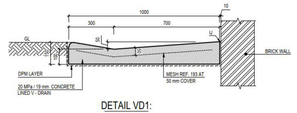
DETAIL 7d:
LAYER WORKS DETAIL

1 : 20



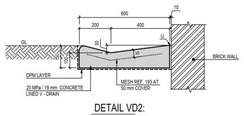
DETAIL 7d-1:
LAYER WORKS DETAIL

1 : 20



DETAIL VD1:
1000 mm V - DRAIN

1 : 10



DETAIL VD2:
600 mm V - DRAIN

1 : 10

NOTES:

1. ALL WORK IN ACCORDANCE WITH THE RELEVANT SECTIONS OF SANS 1200 AND AS REQUIRED BY THE LOCAL AUTHORITIES OR STATUTORY BODIES.
2. WHERE REFERENCE IS MADE TO THE SOUTH AFRICAN STANDARD SPECIFICATIONS, THE CURRENT EDITION SHALL BE USED.
3. REFER TO ARCHITECTS LAYOUTS FOR SETTING OUT INFORMATION.
4. ALL DIMENSIONS AND LEVELS TO BE CHECKED ON SITE PRIOR TO CONSTRUCTION. ANY DISCREPANCIES TO BE REPORTED TO THE ENGINEER IMMEDIATELY.
5. ONLY WRITTEN DIMENSIONS AND LEVELS SHALL BE USED.
6. THIS DRAWING TO BE READ IN CONJUNCTION WITH DRAWINGS FROM THE RELEVANT DISCIPLINES, ARCHITECT, CIVIL, ELECTRICAL AND MECHANICAL.
7. THE CONTRACTOR SHALL GIVE THE ENGINEER AT LEAST 24 HOURS ADVANCE NOTICE FOR INSPECTIONS.
8. THE ENGINEER SHALL BE NOTIFIED WITHOUT DELAY SHOULD THERE BE ANY DISCREPANCIES BETWEEN DRAWINGS, DETAILS AND SPECIFICATIONS.
9. FOUNDATION EXCAVATIONS TO BE INSPECTED AND APPROVED BY THE STRUCTURAL / GEOTECHNICAL ENGINEER BEFORE ANY BLINDING IS CAST.
10. REINFORCING TO BE CHECKED AND APPROVED BY THE ENGINEER PRIOR TO CASTING CONCRETE.
11. ALL DUCTS OR RECESSES TO BE APPROVED BY THE ENGINEER.
12. POSITION OF CONSTRUCTION JOINTS TO BE APPROVED BY THE ENGINEER.
13. CONCRETE STRENGTHS @ 28 DAYS:
    BLINDING : 15 MPa
    FOUNDATIONS : 25 MPa
    COLUMNS : 30 MPa
    SURFACE BEDS : 25 MPa
    ROOF SLABS : 30 MPa
    BEAMS : 30 MPa
14. COVER TO STEEL REINFORCEMENT: U.O.N.
    FOUNDATIONS : 50 mm
    SLABS : 30 mm
    BEAMS : 30 mm
    COLUMNS : 30 mm
15. ALL SHARP EXPOSED EDGES TO BE CHAMFERED 20 x 20mm.
16. ALL WATERPROOFING TO ARCHITECTS DETAIL.
17. SAW CUTS ARE TO BE MADE AS SOON AS THE CONCRETE IS FIRM ENOUGH NOT TO BE TORN OR DAMAGED BY THE CUTTING BLADE (USUALLY BETWEEN 24 TO 48 HOURS AFTER CASTING).
18. ALL STEELWORK TO BE FABRICATED AND ERECTED IN ACCORDANCE WITH 'SANS 2001-CS1 & SANS 1921-3'.
19. ALL STEELWORK TO BE 'SANS 50025-S355JR' UNLESS OTHERWISE NOTED.
20. A COMPLETE SET OF SHOP DRAWINGS SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL BEFORE FABRICATION COMMENCES.
21. ALL WELDS TO BE MINIMUM 6mm CONTINUOUS FILLET WELDS UNLESS OTHERWISE NOTED AND IN STRICT ACCORDANCE WITH SANS AND ANSI/AWS STANDARDS.
22. ALL BOLTS SHALL BE GRADE 8.8 UNLESS OTHERWISE NOTED.
23. ALL STEELWORK TO BE HOT DIPPED GALVANISED TO 'SANS 1200-HC AND SANS 121' UNLESS OTHERWISE NOTED.

REV	DATE	DRAWN	CHECKED	DESCRIPTION
00	2022-11-02	JH	MG	ISSUED FOR INFORMATION

PROJECT

DBSA SCHOOLS FS

FREE STATE

DRAWING

DETAILS
SHEET 1 OF 2

	RESPONSIBLE PERSON	DATE
DESIGNED	JH	2022-11-02
DRAWN	JH	2022-11-02
CHECKED	MG	2022-11-02
APPROVED	MANI GOVENDER [PR ENG - 20080241]	2022-11-02
SCALE	AS SHOWN	SHEET SIZE: A0

PROJECT NUMBER | DRAWING NUMBER | STATUS | REVISION

SAB1777

DRAWING STATUS CODES :

R = REPORT D = DRAFT T = TENDER P = PRELIMINARY C = CONSTRUCTION A = AS BUILT

COPYRIGHT RESERVED