CITY OF CAPE TOWN
DEVELOPMENT MANAGEMENT

Recommended for Approval

Building Control Officer / Delegatee

This application has been approved in terms of Section 7 (1) (a) of Act 103 of 1977, subject to the conditions in the attached letter of approval.

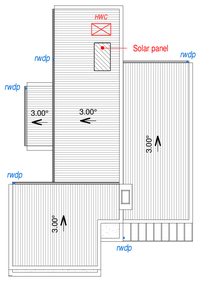
12 Jun 2023

Planning & Building Development Management — Date

Approval Number:

Application Number: 001700474680

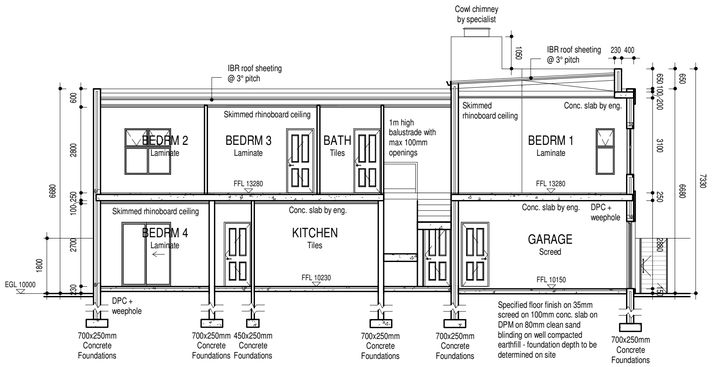
City of Cape Town Stamp



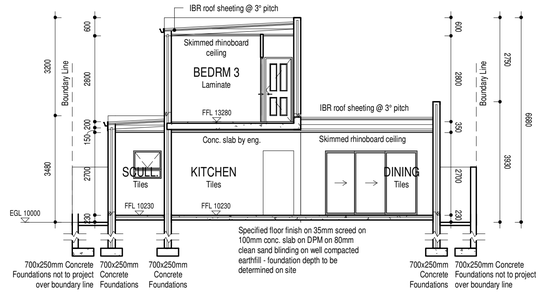
ALL FLASHING, COUNTER FLASHING AND WATERPROOFING TO BE DONE BY SPECIALIST

NO OVERHANG

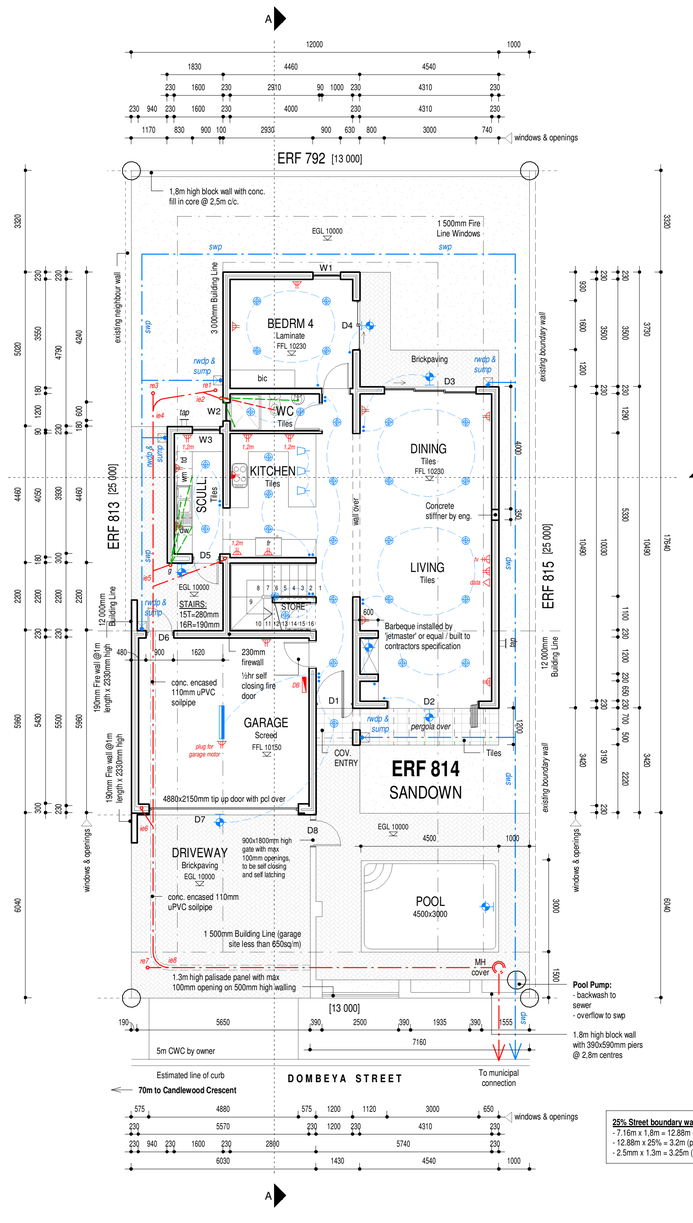
ROOF PLAN
1 : 200



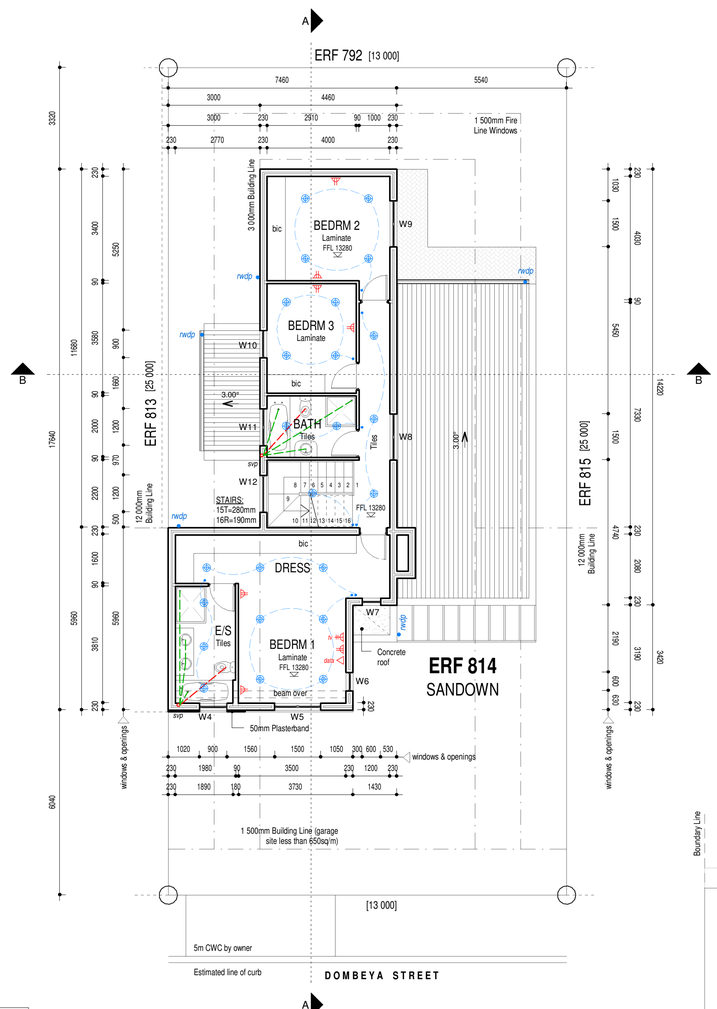
SECTION A
1 : 100



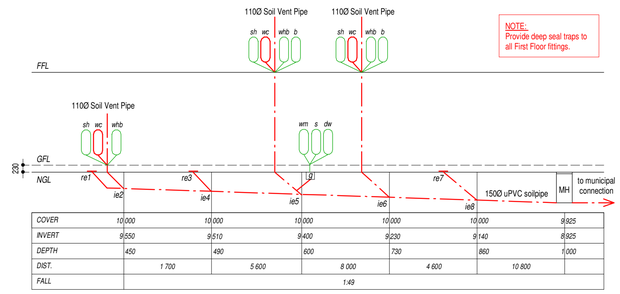
SECTION B
1 : 100



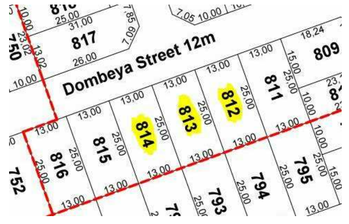
GROUND STOREY
1 : 100



FIRST STOREY
1 : 100



DRAINAGE SECTION



NORTH ELEVATION - BOUNDARY WALL
1 : 100

ELECTRICAL LEGEND	
Light switch-two way	• 2
Light switch	•
Ceiling mounted light	
Waterlight wall mounted light	
Chandelier	
Recessed downlighter	
Flouresscent light fitting	
Pendant	
Distribution board	DB
Single power point	
1m (h) Double power point	1,2m
Double power point	
Stove point	
Solar Hot water cylinder	HWC
Solar Panel	
TV point	tv
Telephone point	tel

NOTE
- External garden lighting to be designed & fitted by specialist.
- For kitchen cupboard layout, plug & light positions refer to specialist.

ALL STRUCTURAL SUPPORT SYSTEMS TO BE VERIFIED BY ENGINEER.

NOTE:
NO LOW-E REQUIRED FOR GLAZING (SEE SCHEDULE)

25% Street boundary wall permeable:
- 7.16m x 1.8m = 12.88m (surface area)
- 12.88m x 25% = 3.2m (permeable needed)
- 2.5mm x 1.3m = 3.25m (shown)

NOTES:

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Roof construction (house):
Galvanised Chromadek IBR Roof Sheeting in grey colour @ 3° pitch fixed to 76x50mm SA Pine Purlins @ max 1200mm c/c with 76mm Clout Nails on SANS10400 approved 405 Sisalation lapped 200mm on 228x76mm SA Pine *Timber Grade 6* Rafters & Trusses @ 850mm c/c. Rafters to be tied into brickwork with 32x1,6mm Galv. hoop iron built minimum 600mm into brickwork. Timber ends built into brickwork to be treated with Carbolinium and wrapped in DPC. All waterproofing to be managed by a specialist.

Roof Construction (cov. entry)
Stonechip on bituthene waterproofing membrane or equal on screed laid to min. 1° fall towards fulbore on concrete slab. (to engineer's specification). All waterproofing to be done by specialist.

Walls:
External walls maxi bricks- 230 cavity walls unless shown otherwise, internal walls - 90mm or 180mm solid walls. External cavity walls to have stepped DPC's at floor level and around all openings. Cavity walls to have 2.5 galvanized wire ties per m². Cavities to be concrete filled to the underside of stepped DPC at ground level. Weepholes @ 1150mm c/c to all stepped DPC's. Prestressed concrete lintel's over all openings in brickwork where no RC beams are specified with minimum of 4 courses of brickwork over.

Floor Construction:
SA Pine skirting on specified floor covering on 25mm screed on 100mm concrete slab on SANS10400 approved 275 micron DPM on 50mm clean sand blinding on well compacted earth fill.

Ceilings:
6.5mm Skimmed rhinoboard ceiling on 38x38mm brandering at 450mm centers fixed to underside of rafters (to man. specs.)

Close Cavities:
All cavities to be closed min. 3 courses below wall plates. Hoop-iron for fixing roof to go through closure and to locate 7 to 10 courses below wall plate level alternatively.

Windows and Doors:
All standard wndows and doors in aluminium Kenzo or equal. All standard internal doors in timber (to be patterned 40mm hollow core) lighting and ventilation to comply with local authority requirements. DPC to be wrapped around all window and door openings.

Precast Lintols:
To comply with part K of SANS 10400. All openings <900mm to be prestressed concrete lintols. All openings <3000mm to be prestressed concrete lintols and to have min. 4 courses brickwork with brickforce to each course. All openings >3000mm to engineers specification.

Glazing:
All glazing to comply with part n of SANS10400. All glazed areas exceeding 1m² or less than 500mm above FFL to be safety glazed.

General Notes:
1. Water meter and connection pipe to be min. 19mm i.d.
2. All plumbing pipes to be concealed.
3. External steps max. risers 180mm, min. treads 250mm.
4. Expansion joints to be provided to boundary walling at max. 5000mm centers.
5. Light switches to be 1200mm above f.f.l unless otherwise shown.
6. Wall sockets to be 400mm above f.f.l unless otherwise shown.
7. WM and DW waste to be min. 600mm above FFL.
8. Supply and waste to w/m and DW to be in 90mm deep recess. Stopcock to be above counter.
9. All structural work to be referred to engineer.
10. All design work to be in accordance with 'developers' and homeowners association design guideline and approved colour chart.
11. Weepholes to be min. 150mm above NGL
12. No foundation or any portion of the building to extend over the site boundary.
13. All timber built into brickwork to be wrapped in DPC.
14. Provide 1000mm high aluminium balustrades with max. 100mm openings to all balconies & staircases.
15. 40mm 1/2 hr fire rated door to be provided between the garage and the dwelling.
16. Doors & sidelights to be glazed with safety glazing.
17. All flashing and waterproofing to be done by specialist.
18. Plumber to provide min. class 1 copper water pipes to building.
19. Rhinoboard ceilings fixed to 38x38mm brandering to u/s of concrete slab to be provided to all ceilings.

PROCEDURES & VARIATIONS TO PLANS FOR CONSTRUCTION		
REV:	DATE:	DETAILS:

AREAS:

GROUND FLOOR	- 149m²
FIRST FLOOR	- 93m²
TOTAL AREA	**- 242m²**

SITE AREA	- 350m²
COVERAGE	- 42%
FLOOR FACTOR	- 0.69

SIGNATURE(S):

PROJECT

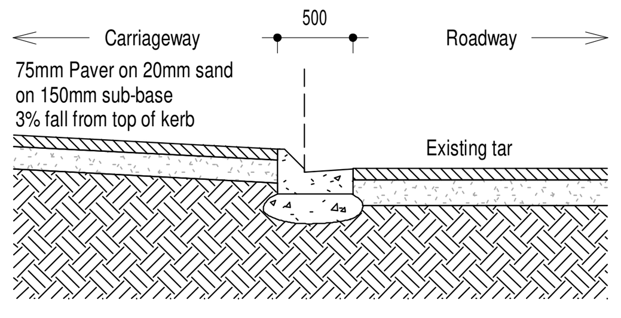
PROPOSED NEW FOR FACTCON ON ERF 814 - SANDOWN 25 Dombeya Street

Graham Holland Architectural Design
Pr.S.Arch.T (B.Tech)(SACAP Reg. Nr. 370564)
P.O. Box 20147 — Big Bay — 7448
Tel: (021) 5544294 — Fax: (021) 5542898 — Cell: 082 4936754
WEB: www.ghad.co.za — Email: graham@ghad.co.za

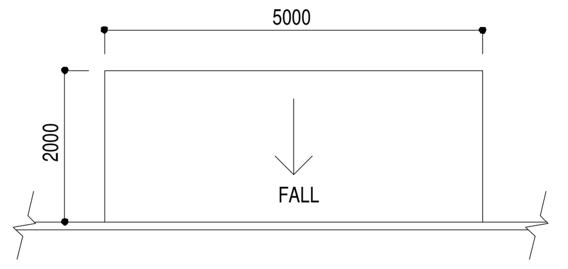
DRAWN:	SCALE :	REVISION :
TM	As indicated	2.0
SHEET :	MODIFIED DATE :	DRAWING No :
1	28/03/2023	21-15

City of Cape Town Stamp

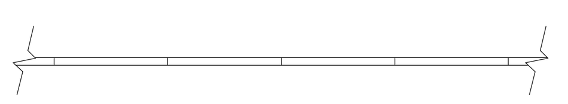
COUNCIL DETAILS



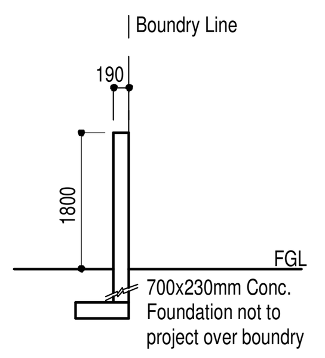
Kerb Section Detail
Scale 1:50



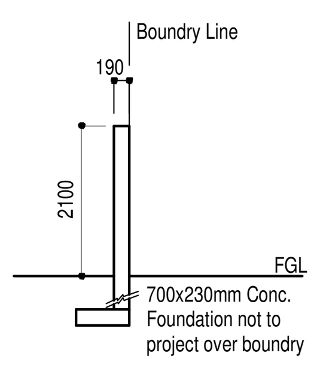
Plan of rollover kerb CWC - CK5
Scale 1:100



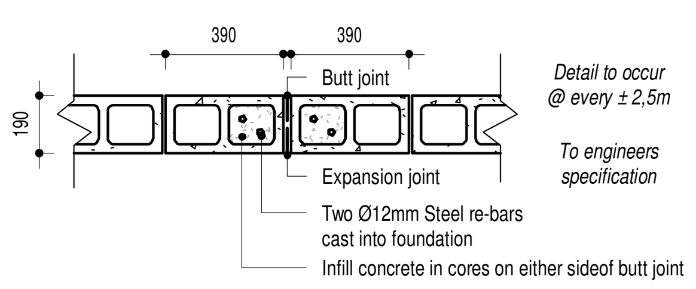
Elevation of rollover kerb CWC - CK5
Scale 1:100



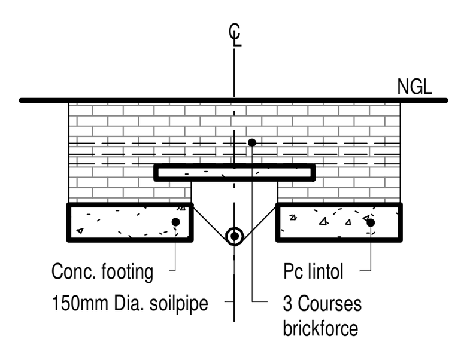
Section Through Block Wall
Scale 1:100



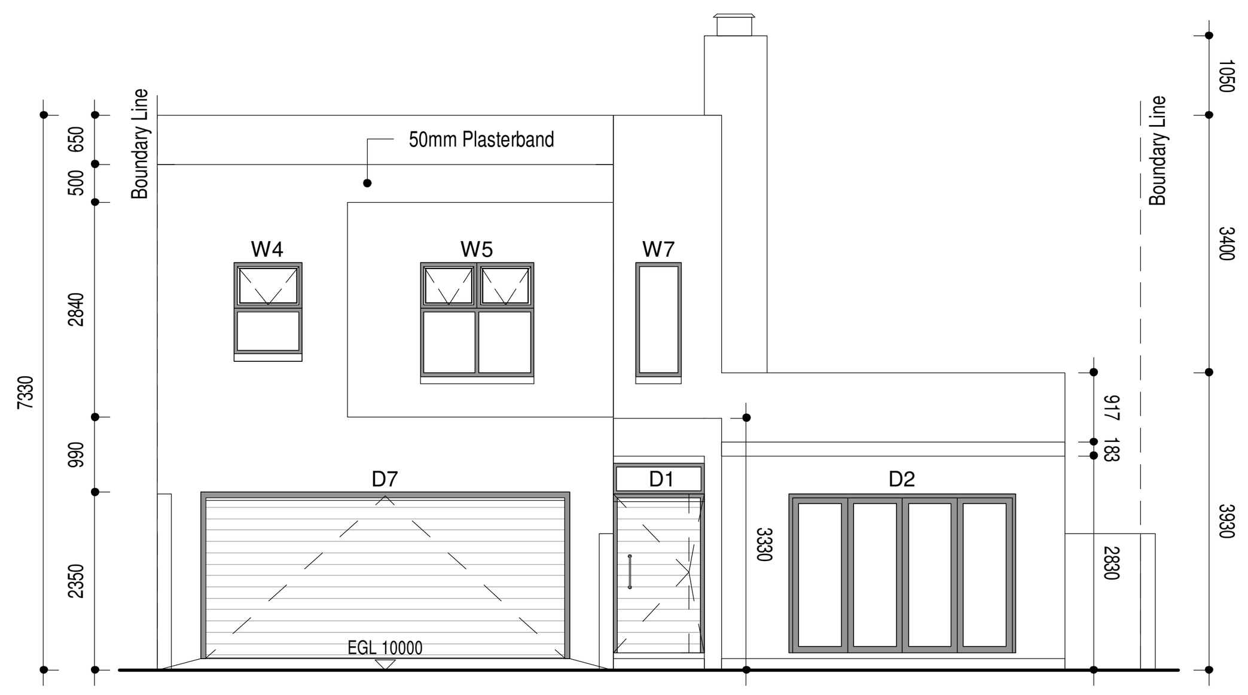
Section Through Fire Block Wall
Scale 1:100



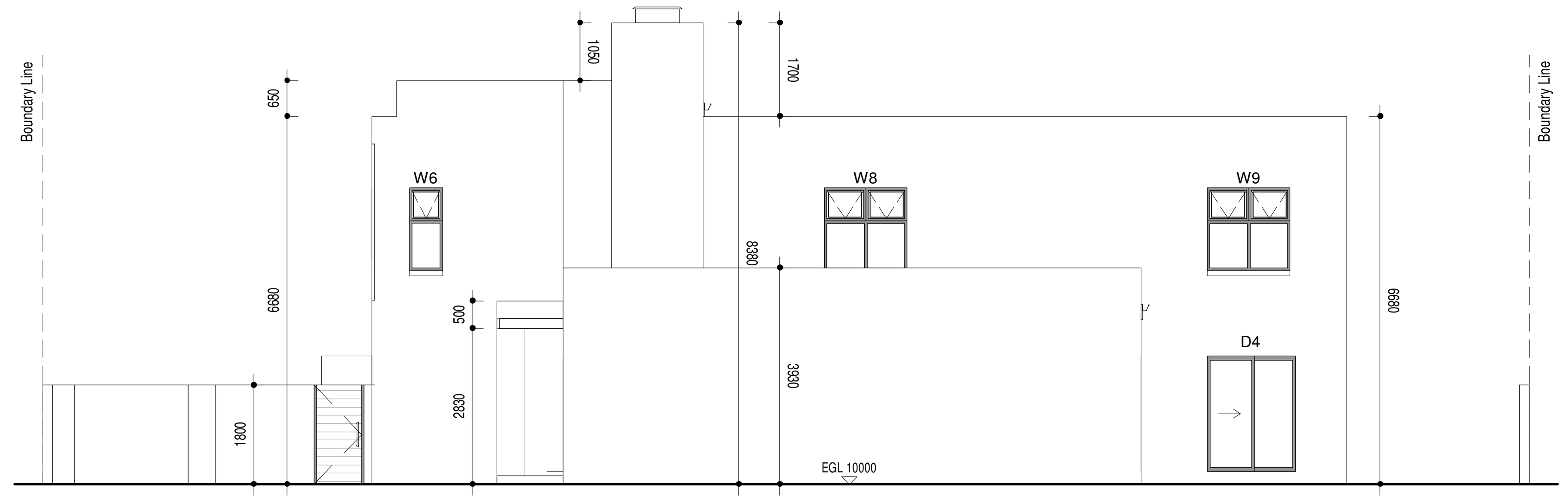
Typical Block Boundary Wall Detail
Scale 1:20



SEWERPIPE BRIDGE DETAIL
1 : 50

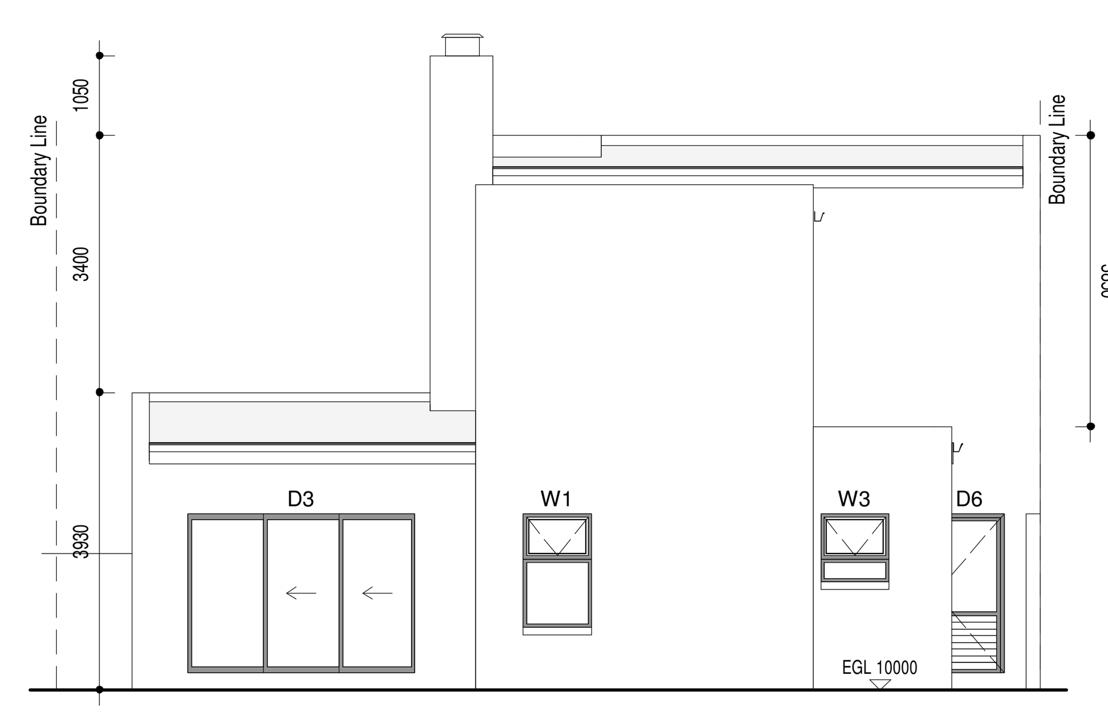


NORTH ELEVATION
1 : 100

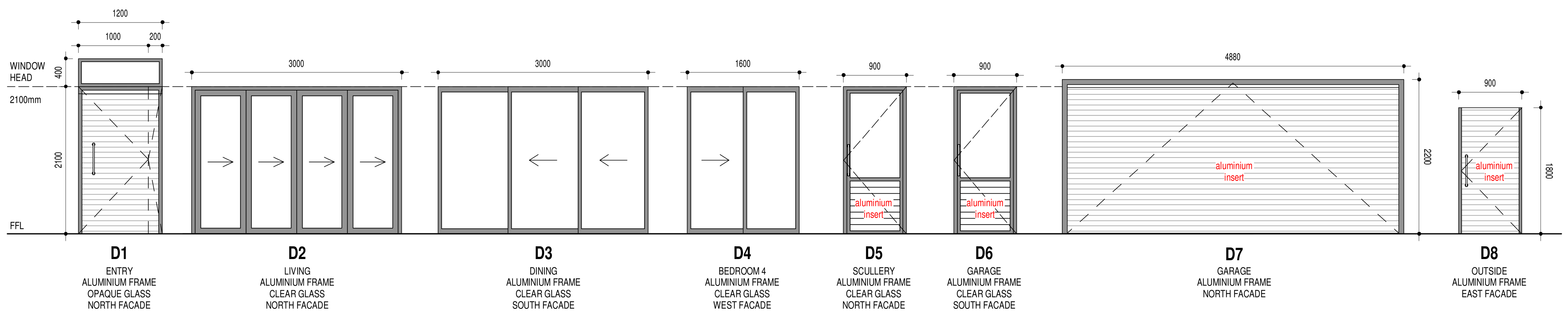


WEST ELEVATION
1 : 100

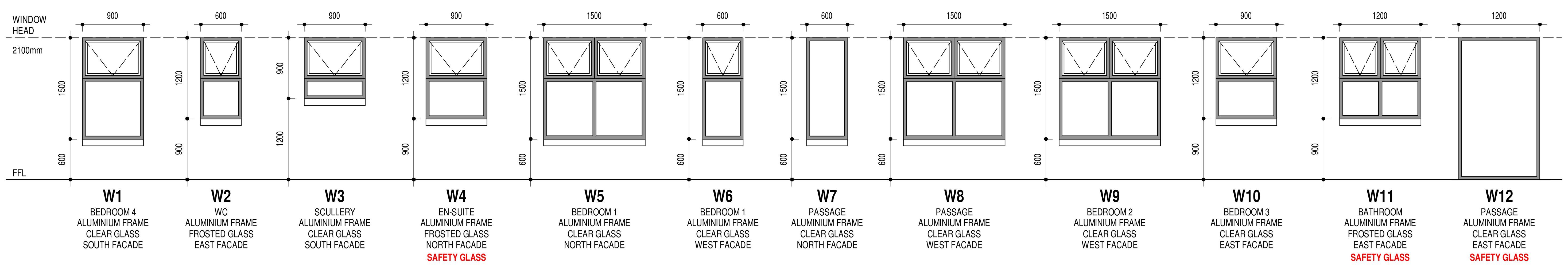
EAST ELEVATION
1 : 100



SOUTH ELEVATION
1 : 100



DOOR SCHEDULE
1 : 50



WINDOW SCHEDULE
1 : 50

XA AND FENESTRATION CALCULATIONS

SANS 10400/XA CALCULATIONS (ZONE4)	TARGET VALUE:	ACTUAL VALUE:	EXTRAS:
NETT FLOOR AREA (EXCL. STORE, GARAGES)		181m² - New Building	
ROOF INSULATION	3.7	- Sisalation film **R-value: 0,55** - 135mm Cellulose fibre Loose-fill insulation **R-value: 3,1** - 10mm Rhinoboard **R-value: 0,05** **Total R factor = 3.7** *(deemed to satisfy)*	
HOT WATER AND PIPE INSULATION: -50% hot water generation by alternate source (heat pumps/solar geyser) -Insulated hot water piping to conform to SANS 204, R-value 1			-Neoprene insulation to be used -Fit water saving nozzles to all showers
LIGHTING: -Lighting to be max 5w per sq/m as per SANS 204			-LED Energy saving lights to be used

FENESTRATION: (Solar heat gain / conductance) *GROUND FLOOR*

FLOOR AREA	TOTAL OPENING VALUE (SQ/M)	CONDUCTANCE	SOLAR HEAT GAIN
TARGET: (per floor)			
-	-	141.4	13.13
ACTUAL: (ground floor)			
101m²	18.84m² (18.65%)	109.27	7.43

Resultant materials:
- Single Clear glass (5.8W/m² and SHGC=0,8 as per "Glass Warehouse" specifications)

Total fenestration exceeds maximum deemed to satisfy value of 15% of nett floor area, but remains within the SANS 10400 standard requirements for XA.
Please note that the Actual values must be lower than the Target values.

FENESTRATION: (Solar heat gain / conductance) *FIRST FLOOR*

FLOOR AREA	TOTAL OPENING VALUE (SQ/M)	CONDUCTANCE	SOLAR HEAT GAIN
TARGET: (per floor)			
-	-	112	10.4
ACTUAL: (ground floor)			
80m²	14.67m² (18.34%)	85.09	4.69

Resultant materials:
- Single Clear glass (5.8W/m² and SHGC=0,8 as per "Glass Warehouse" specifications)

Total fenestration exceeds maximum deemed to satisfy value of 15% of nett floor area, but remains within the SANS 10400 standard requirements for XA.
Please note that the Actual values must be lower than the Target values.

NOTE:
NO LOW-E REQUIRED
FOR GLAZING
(SEE SCHEDULE)

NOTE:
Brickwork openings sizes to be checked by window specialist before manufacturing special doors and windows.
All bathroom windows to be frosted glass.
Safety glass in bathrooms to be fitted by specialist.
All internal doors to be hollow core (patterned)

Hot Water Calculation:

- People - 4
- Usage per person (L) - 115 L
- Daily Consumption (degC.) - 460 degC.
- Water Input Temperature (degC.) - 20 degC.
- Water Output Temperature (degC.) - 55 degC.
- Temperature Difference (degC.) - 35 degC.
- Specific Heat 1L Water (KJ/KG.K) - 4.182
- Daily Energy Usage (KJ) - 67 330.00 KJ
- KWH Per Day - 18.7 KWH
- Annual Usage (KWH) - 6826.53 KWH

[3 413 KWH (50%) - to be provided with solar/heat pump as per SANS XA/201]

Proposed Installation:

- 200L Solar Geyser with 2KW Backup Electric element. Collector to be 2.5m2
- Solar useful energy rating (KWH/m2) per day = 4.19
- Annual solar energy available for a 2.5m2 Solar collector (KWH) = 3823.375
- Solar Energy 3823 KWH > 3413 KWH (50% of required consumption)
- Outstanding energy to be provided by 2KW electric geyser

- Kwiksol solar panel efficiency = 4.19 KWH/M2
- Solar collector area = 2.5m2
- Water inlet temperature = 20degC.
- Water storage temperature = 55deg.C

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		FLOOR FACTOR	- 0.69
TOTAL AREA	**- 242m²**	SIGNATURE(S):	

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PROPOSED NEW FOR FACTCON ON ERF 814 - SANDOWN 25 Dombeya Street

Graham Holland Architectural Design
Pr.S.Arch.T (B.Tech)(SACAP Reg. Nr. ST0364)
P.O. Box 20147 ~ Big Bay ~ 7448
Tel: (021) 5544294 ~ Fax: (021) 5542898 ~ Cell: 082 4936754
WEB: www.ghad.co.za ~ Email: graham@ghad.co.za

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