LEGEND

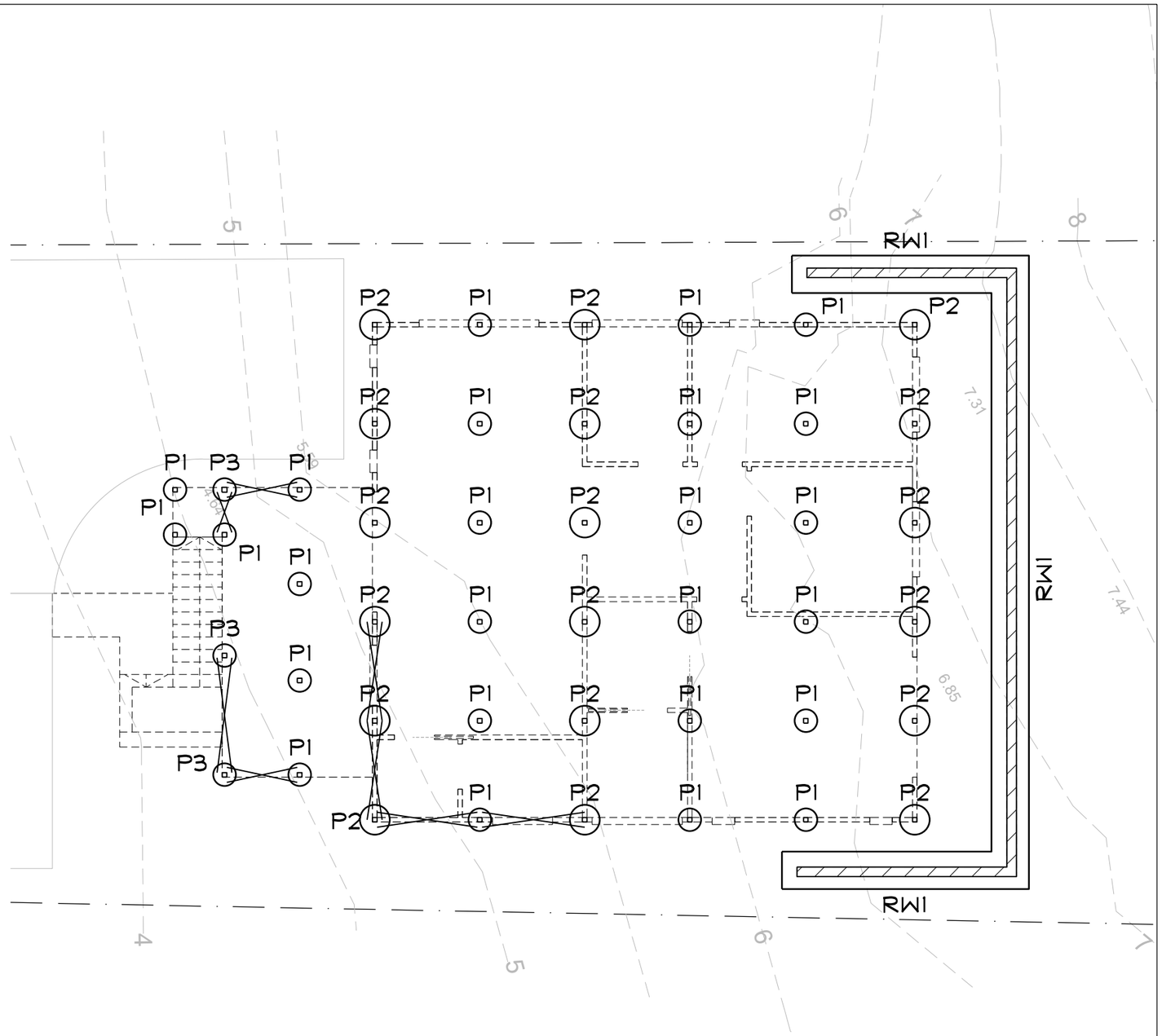
(100) INDICATES 100mm THICK SLAB WITH SL82 MESH TOP ON 0.2mm POLYTHENE MEMBRANE ON 50 TO 100mm COMPACTED METAL DUST ON NATURAL GROUND OR COMPACTED FILL. COMPACT FILL IN 150 MAX. LAYERS TO 98% STANDARD COMPACTION.

'SP' - DENOTES STEEL POST.
REFER TO FRAMING LAYOUT FOR REQUIREMENTS.

'TP' - DENOTES TIMBER POST.
REFER TO FRAMING LAYOUT FOR REQUIREMENTS.

NOTES

1. ALL FOOTINGS ARE TO BE FOUNDED 200 MIN. INTO NATURAL GROUND AND/OR WHERE FOOTINGS ARE IN FILL EXCAVATE FOR MASS CONCRETE PIERS TO NATURAL GROUND. 450 WIDE x 600 LONG AT 3000 MAX. CENTRES.
2. THESE SLABS AND FOOTINGS HAVE BEEN DESIGNED FOR A MODERATELY REACTIVE SITE, IF OTHER CONDITIONS ARE FOUND, PLEASE NOTIFY ENGINEER PRIOR TO COMMENCEMENT OF WORK.
3. ANY FILL PLACED ON THIS SITE IS TO BE GRANULAR NON-COHESIVE MATERIAL WITH A CBR OF NOT LESS THAN 15. FILL IS TO BE PLACED IN LAYERS OF LOOSE THICKNESS NOT EXCEEDING 200mm AND COMPACTED TO 98% STANDARD COMPACTION TO AS1289.
4. ALL FOOTINGS ARE TO BE MAINTAINED IN ACCORDANCE WITH THE CSIRO BROCHURE "GUIDE TO HOMEOWNERS ON FOUNDATION MAINTENANCE AND FOOTING PERFORMANCE." PARTICULARLY IN REGARD TO LOCATION OF TREES AND SHRUBS. ALL TREES AND SHRUBS SHOULD BE PLANTED A MINIMUM OF 1.5 TIMES THE PLANTS MATURE HEIGHT FROM ANY FOOTINGS.
5. CONFIRM ALL LEVELS SHOWN WITH ARCHITECTURAL DRAWINGS PRIOR TO CONSTRUCTION.
6. REFER TO DRAWING GN1 FOR GENERAL NOTES.
7. REFER TO DRAWINGS S2 AND S3 FOR SLAB AND FOOTING DETAILS.
8. FOR TERMITE CONTROL UNDER SLABS REFER TO AS. 3660.1.



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A	FOR CONSTRUCTION	01.09.23
P1	PRELIMINARY FOR REVIEW	30.08.23

PRINCIPAL ENGINEERS SIGNATURE

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PROJECT
PROPOSED SECONDARY DWELLING

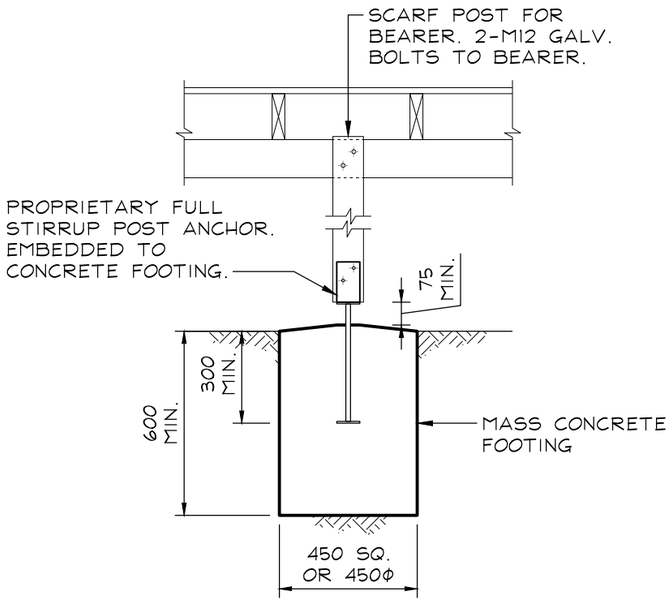
AT
111B BALEMO DRIVE, OCEAN SHORES NSW 2483

FOR
JOSH KILGARIFF

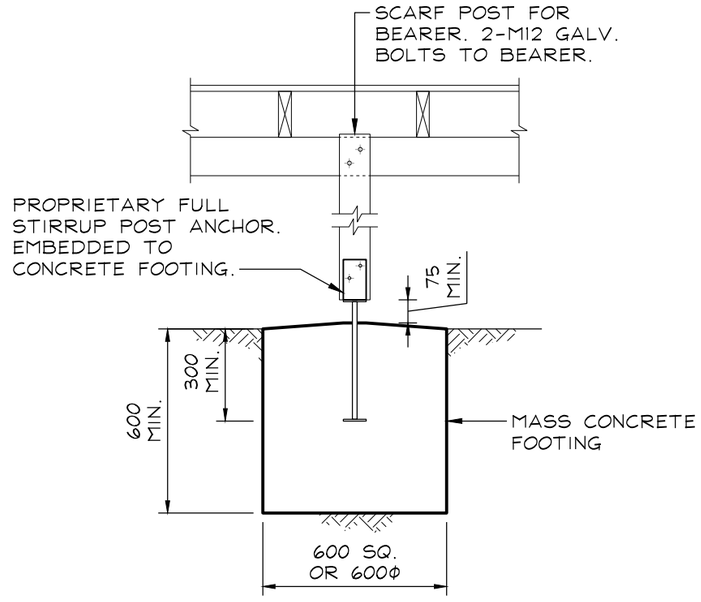
DRAWING TITLE
SLAB AND FOOTING LAYOUT

DESIGN	DRAWN	DRAWING SCALE	SHEET SIZE
EC	MN	1:100	A3

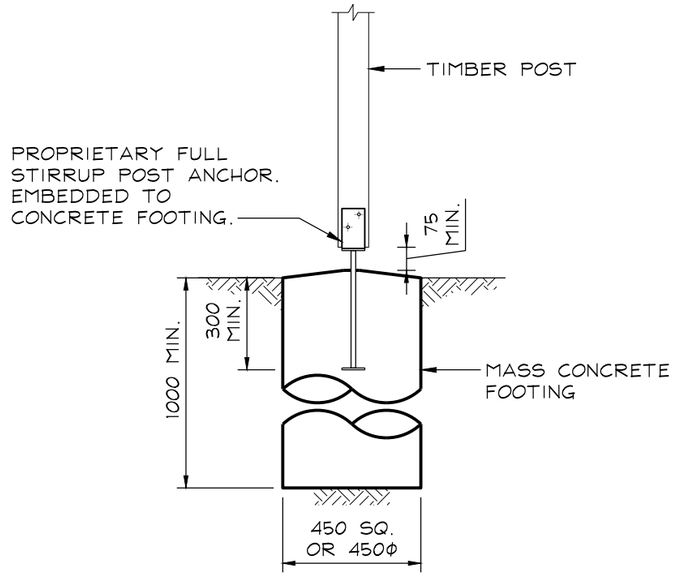
PROJECT REF No	DRAWING No	REVISION
200337.1	S1	A



FOOTING DETAIL TYPE P1



FOOTING DETAIL TYPE P2



FOOTING DETAIL TYPE P3

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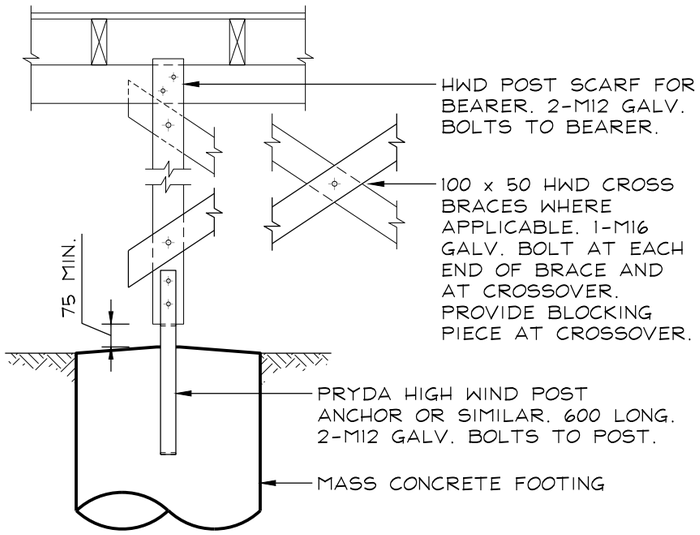
FOR
JOSH KILGARIFF

DRAWING TITLE
SLAB AND FOOTING DETAILS

DESIGN	DRAWN	DRAWING SCALE	SHEET SIZE
EC	MN	1:20	A3

PROJECT REF No	DRAWING No	REVISION
200337.1	S2	A

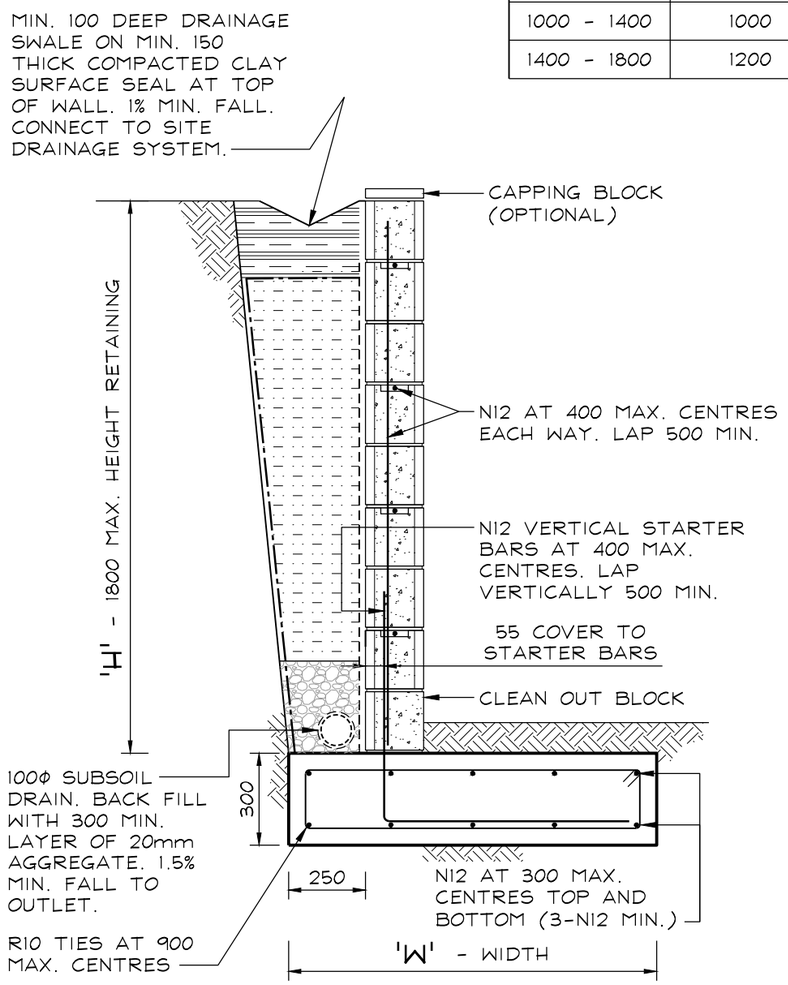


FOOTING BRACING DETAIL TYPE P1 / P2 / P3

RETAINING WALL NOTES

1. 200 AND 300 SERIES CONCRETE BLOCKWORK. CONCRETE CORE FILL CAVITY. F'c:20MPa. SLUMP:230mm.
2. REFER TO GENERAL NOTES DRAWING GN1 FOR ADDITIONAL RETAINING WALL REQUIREMENTS.

RETAINING WALL RW2 FOOTING SCHEDULE	
'H' HEIGHT	'W' WIDTH
0 - 600	600
600 - 1000	750
1000 - 1400	1000
1400 - 1800	1200



FOOTING DETAIL TYPE RW1

WHERE RETAINING TO 1800 MAX.

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SLAB AND FOOTING DETAILS

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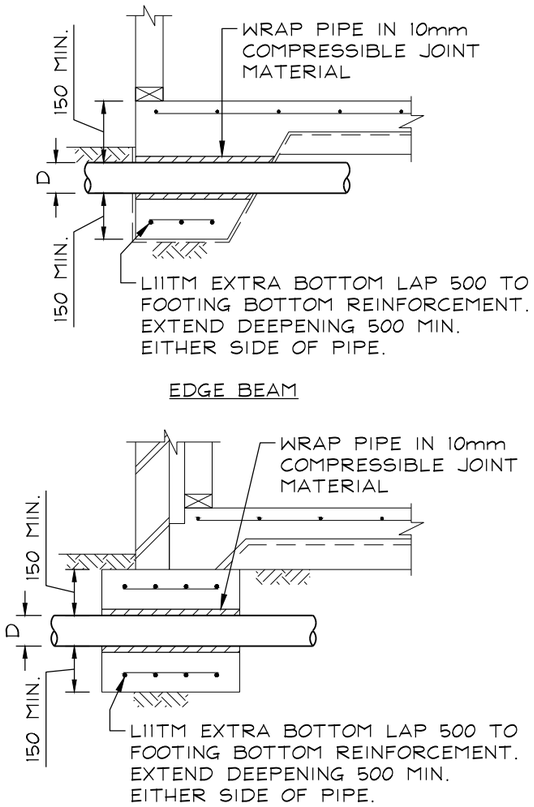
EC	MN	1:20, 1:10	A3

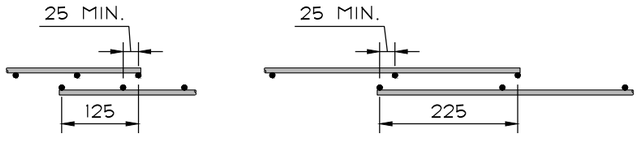
PROJECT REF No	DRAWING No	REVISION
200337.1	S3	A



NOTES:-
1. PROVIDE TERMITE TREATMENT AS PER AS3660.1 TO FOOTING PENETRATIONS.
2. WHERE VERTICAL SECTION OF PIPE PENETRATES FOOTING, DEEPEN FOOTING BY 'D' MIN.

PIPE PENETRATIONS DETAIL

SCALE - 1:20



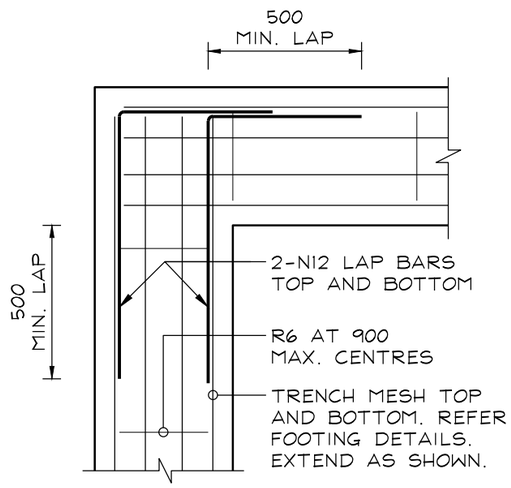
HARCMESH SIDE LAP DETAIL

STANDARD FABRIC SIDE LAP DETAIL

FOR L8TM AND L11TM: 500 MIN. LAP.
PROVIDE BAR CHAIRS AT 800 MAX. CENTRES.

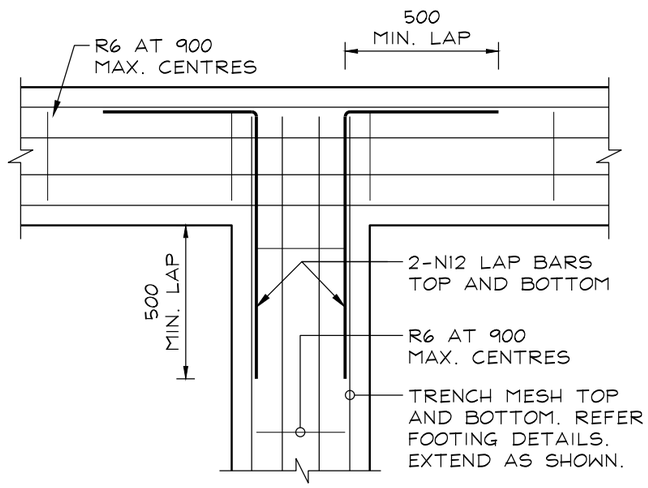
REINFORCING LAPS DETAIL

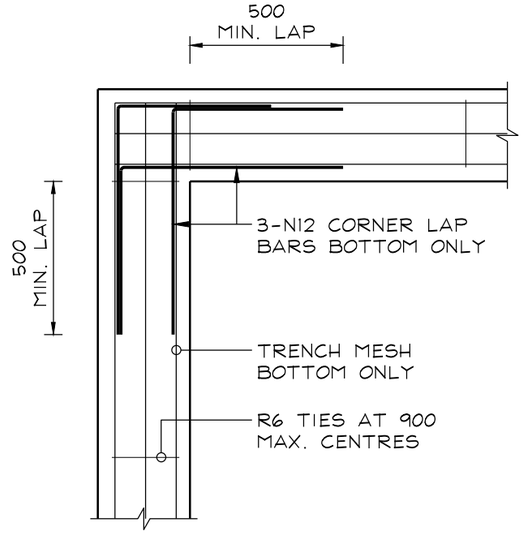
SCALE - 1:10



STRIP FOOTING LAP BARS DETAIL

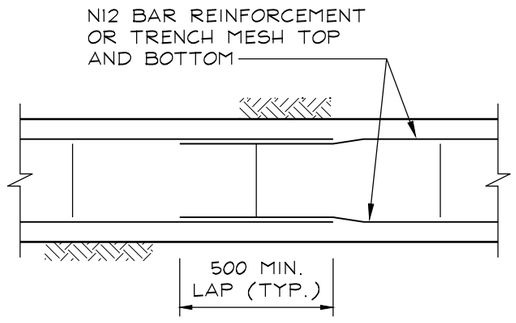
SCALE - 1:20





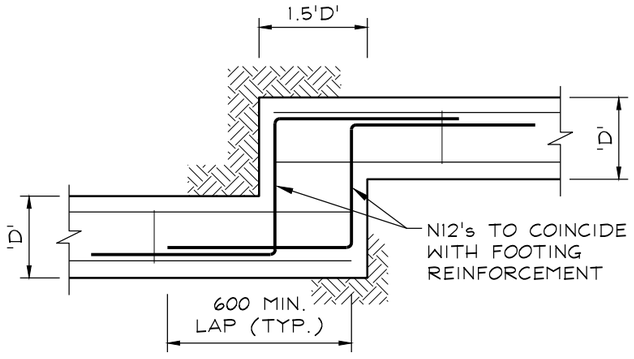
EDGE BEAM CORNER LAPS DETAIL

TOP FABRIC OMITTED FOR CLARITY. SCALE - 1:20.



FOOTING REINFORCEMENT LAP ELEVATION

SCALE - 1:20. TYPICAL ALL FOOTINGS.



STEP IN STRIP FOOTINGS DETAIL

SCALE - 1:20

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DRAWING TITLE
SLAB AND FOOTING DETAILS

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EC	MN	1:20, 1:10	A3

PROJECT REF No	DRAWING No	REVISION
200337.1	S4	A

MEMBER SCHEDULE

POSTS

TP1..... 90 SQ. HWD F17
TP2..... 90 SQ. HWD F17
FULL HEIGHT

BEARERS

FB1..... 200 x 63 LVL13

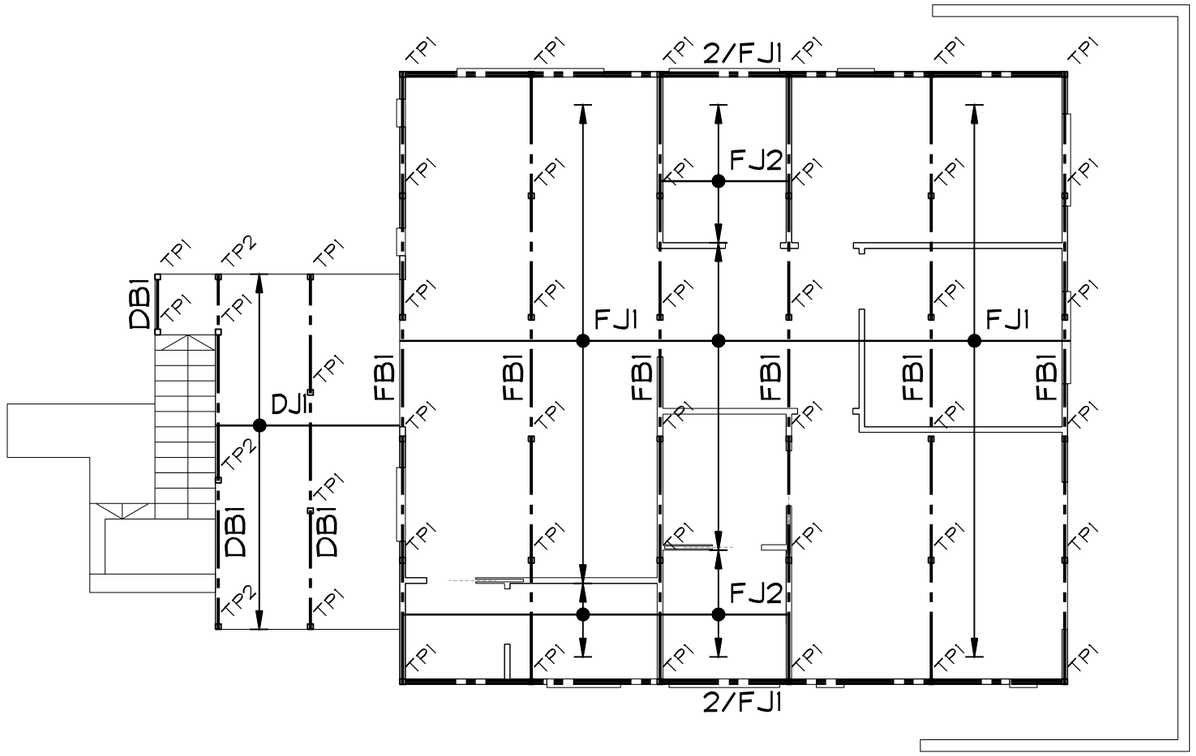
DB1..... 140 x 45 HWD F27

JOISTS

ALL JOIST SPACINGS AT 450 MAX.
CENTRES UNLESS NOTED OTHERWISE

FJ1..... 170 x 45 LVL13
FJ2..... 130 x 45 LVL13

DJ1..... 140 x 35 MGP10 H3



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FOR
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DRAWING TITLE
FRAMING LAYOUT

DESIGN	DRAWN	DRAWING SCALE	SHEET SIZE
EC	MN	1:100	A3

PROJECT REF No	DRAWING No	REVISION
200337.1	S5	A

MEMBER SCHEDULE

POSTS

TP2..... 90 SQ. HWD F17
FULL HEIGHT

MS..... DENOTES MULTIPLE STUDS

LINTELS

L1..... 140 x 45 MGP10
L2..... 150 x 63 LVL13
L3..... 90 x 35 MGP10
L4..... 150 x 63 LVL13
L5..... 130 x 63 LVL13
L6..... 150 x 63 LVL13
L7..... 90 x 63 LVL13
L8..... 140 x 45 MGP10

ROOF BEAMS

RB1..... 200 x 45 LVL13

VERANDAH BEAMS

VB1..... 190 x 45 HWD F27

RAFTERS

ALL RAFTER SPACINGS AT 600 MAX. CENTRES UNLESS NOTED OTHERWISE

R1..... 200 x 45 LVL13
R2.....140 x 35 MGP10

POLE PLATES

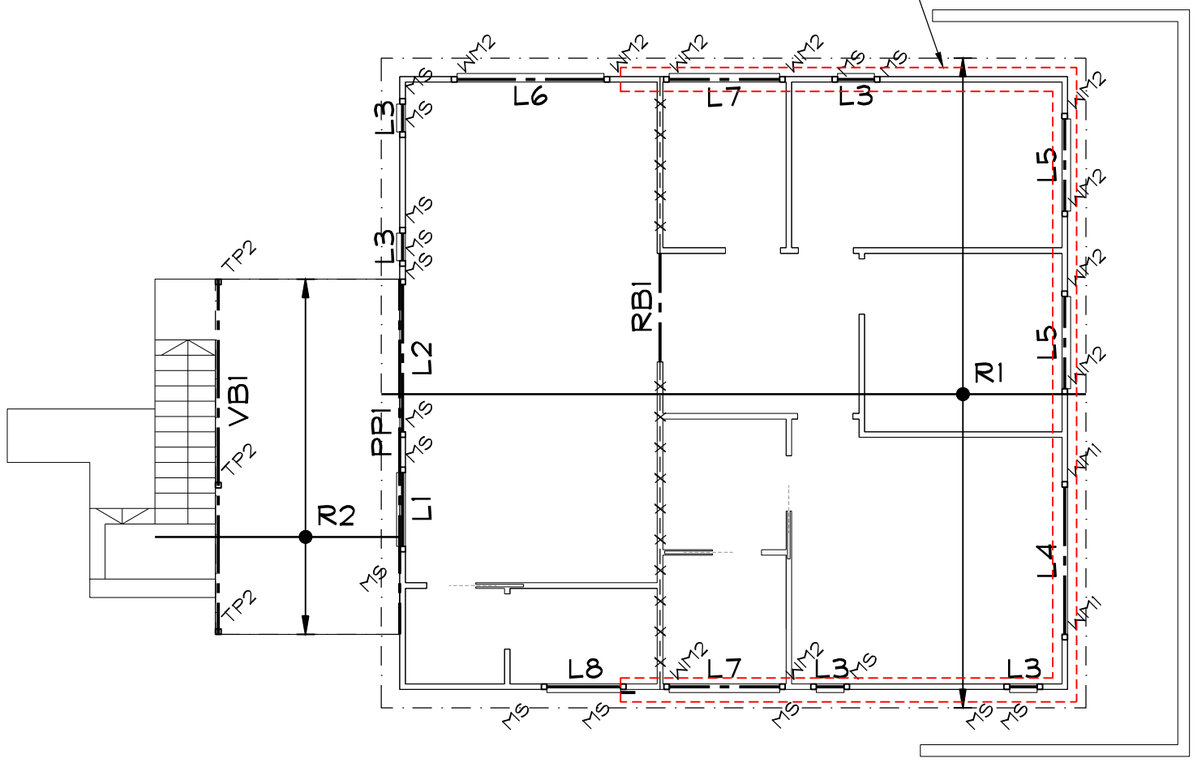
PP1..... TO MATCH ADJACENT RAFTER FIXED TO EXTERNAL WALL TO EACH STUD WITH 2-TYPE 17 BATTEN SCREWS.

WIND MULLIONS

WM1..... 89 x 89 x 3.5 SHS
10 BASE PLATE WITH 2-M12 BOLTS TO TOP AND BOTTOM PLATES. 10 CLEAT PLATE WITH 2-M12 BOLTS TO LINTEL.
OR 2/90 x 35 KD HWD F27 PLUS 1-MGP10 JACK STUD. LAMINATE TOGETHER WITH TYPE 17 BATTEN SCREW AT 300 MAX CENTRES

WM2..... 4/90 x 35 MGP10 PLUS 1-MGP10 JACK STUD. LAMINATE TOGETHER WITH TYPE 17 BATTEN SCREW AT 300 MAX CENTRES
OR 90 x 35 KD HWD F27 PLUS 1-MGP10 JACK STUD

WALLS OVER 3200 IN HEIGHT SHOWN IN RED TO BE CONSTRUCTED WITH DOUBLE STUDS, ALSO IN ACCORDANCE WITH WIND MULLION DETAIL



—x—x—x—
DENOTES LOAD BEARING INTERNAL STUD FRAME WALLS

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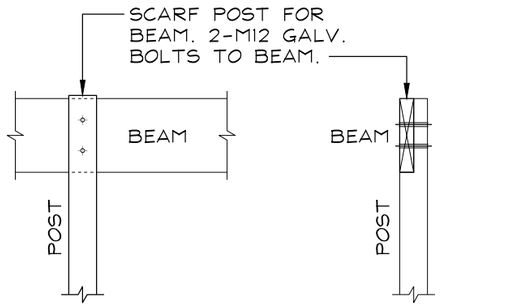
FRAMING LAYOUT

DESIGN	DRAWN	DRAWING SCALE	SHEET SIZE
EC	MN	1:100	A3

PROJECT REF No	DRAWING No	REVISION
200337.1	S6	A



TYPICAL HWD TIMBER POST TO HWD TIMBER BEAM DETAIL

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FRAMING DETAILS

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EC	MN	1:20	A3

PROJECT REF No	DRAWING No	REVISION
200337.1	S7	A

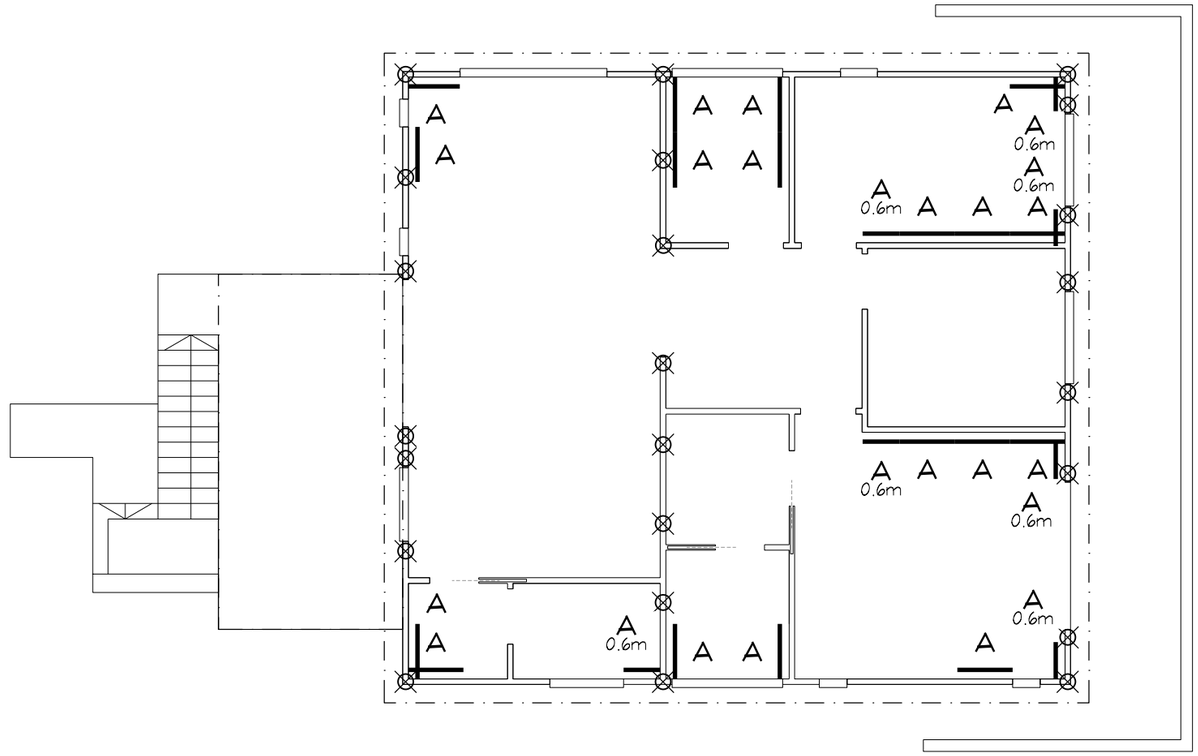
LEGEND

A — INDICATES PLY BRACING TO 6.0kN/m.
LENGTH 900mm U.N.O.
REFER TO BRACING DETAIL SHEET.

B — INDICATES STRAP 'X' BRACE.
REFER TO BRACING DETAIL SHEET.

⊗ INDICATES M12 HOLD DOWN ROD.
REFER TO HOLD DOWN DETAIL SHEET.

WIND LOADS ARE IN ACCORDANCE WITH AS4055 AS FOLLOWS: REGION B	
DESIGN WIND SPEED	50m/s
TERRAIN CATEGORY	3.0
TOPOGRAPHIC CLASSIFICATION	T0
WIND CLASSIFICATION	N3



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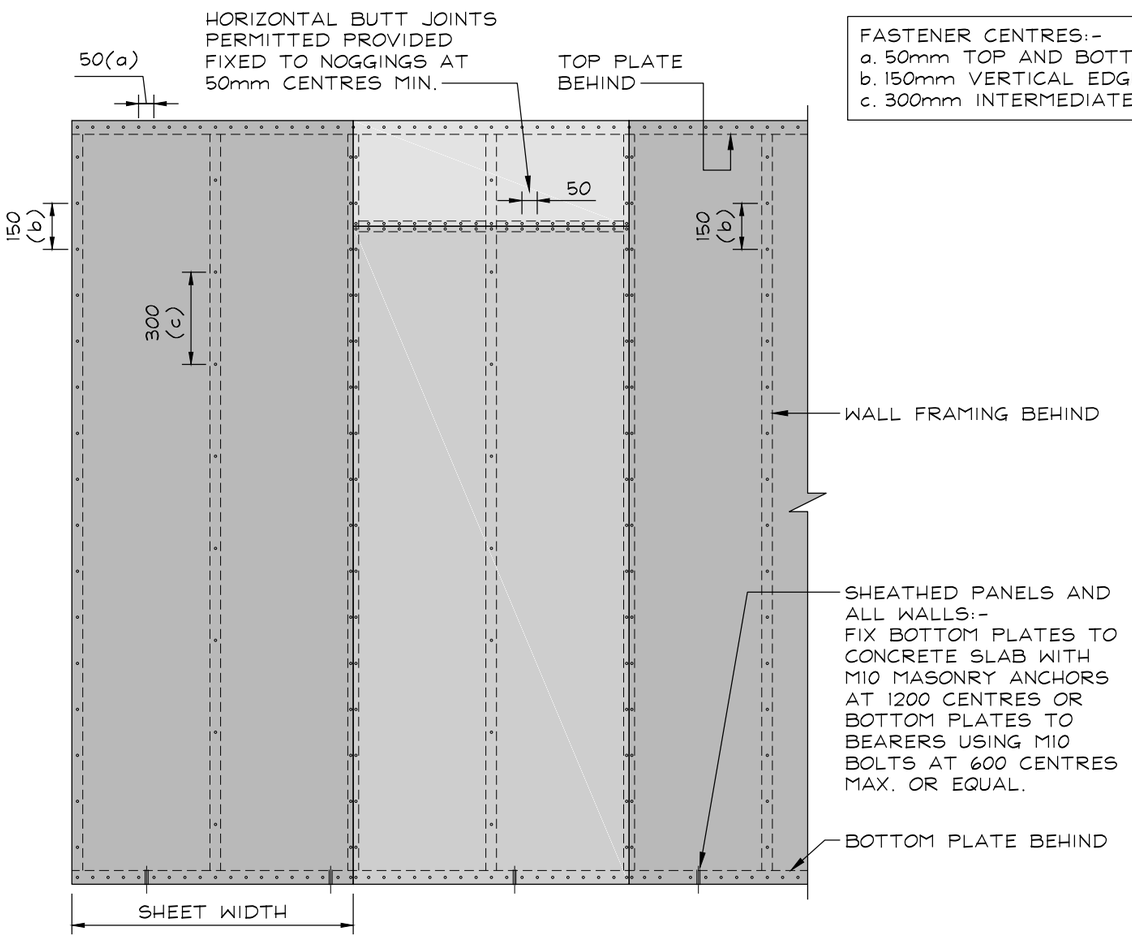
DRAWING TITLE
BRACING AND HOLD DOWN LAYOUT

DESIGN	DRAWN	DRAWING SCALE	SHEET SIZE
EC	MN	1:100	A3

PROJECT REF No	DRAWING No	REVISION
200337.1	S8	A

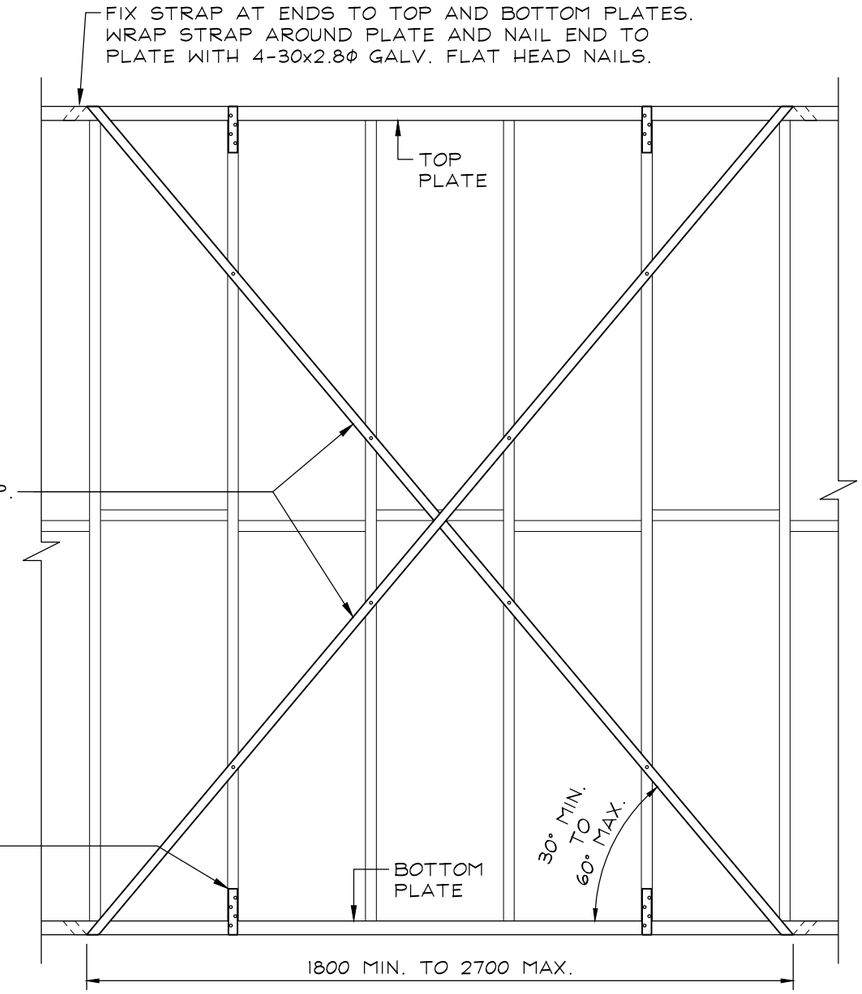


FASTENER CENTRES:-
a. 50mm TOP AND BOTTOM PLATE
b. 150mm VERTICAL EDGES
c. 300mm INTERMEDIATE STUDS

PLYWOOD BRACING WALL DETAIL TYPE 'A'

FASTENER DIAGRAM FOR TABLE 8.18 BELOW.
DESIGN RACKING RESISTANCE = 6.0kN/M.

TABLE 8.18 - AS.1684.2		
PLYWOOD STRESS GRADE	PLYWOOD THICKNESS, mm	
	MAXIMUM STUD SPACING, mm	
	450	600
F8	7	9
F11	6	7
F14	4	6
F27	4	4.5



SHEATHED PANELS AND ALL WALLS:-
FIX BOTTOM PLATES TO CONCRETE SLAB WITH M10 MASONRY ANCHORS AT 1200 CENTRES OR BOTTOM PLATES TO BEARERS USING M10 BOLTS AT 1200 CENTRES MAX. OR EQUAL.

METAL CROSS BRACING WALL DETAIL TYPE 'B'

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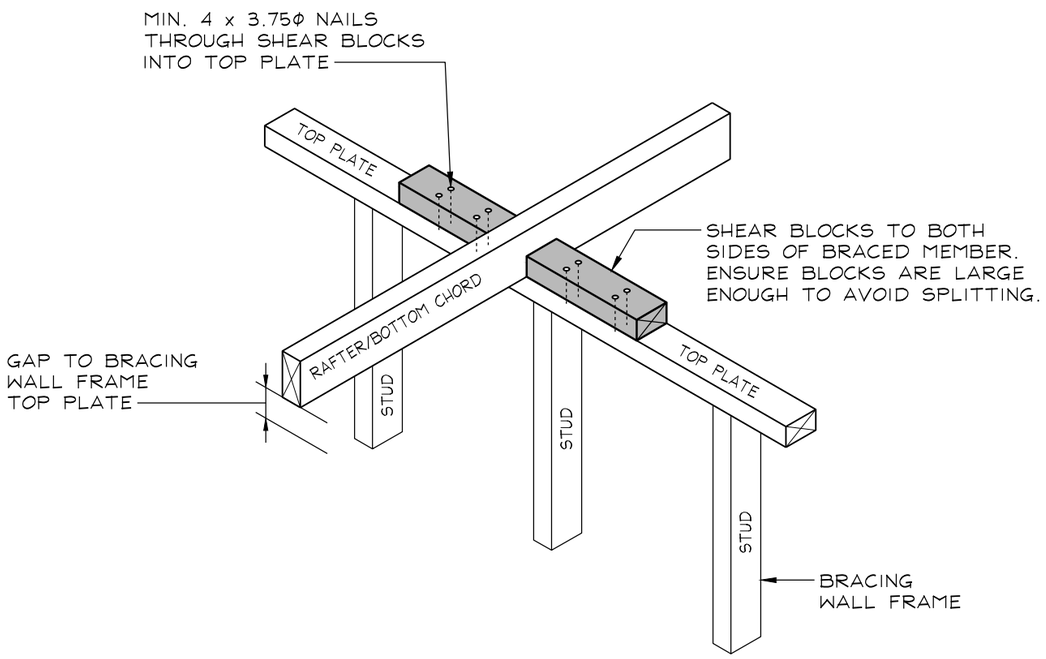
DRAWING TITLE
BRACING DETAILS 1

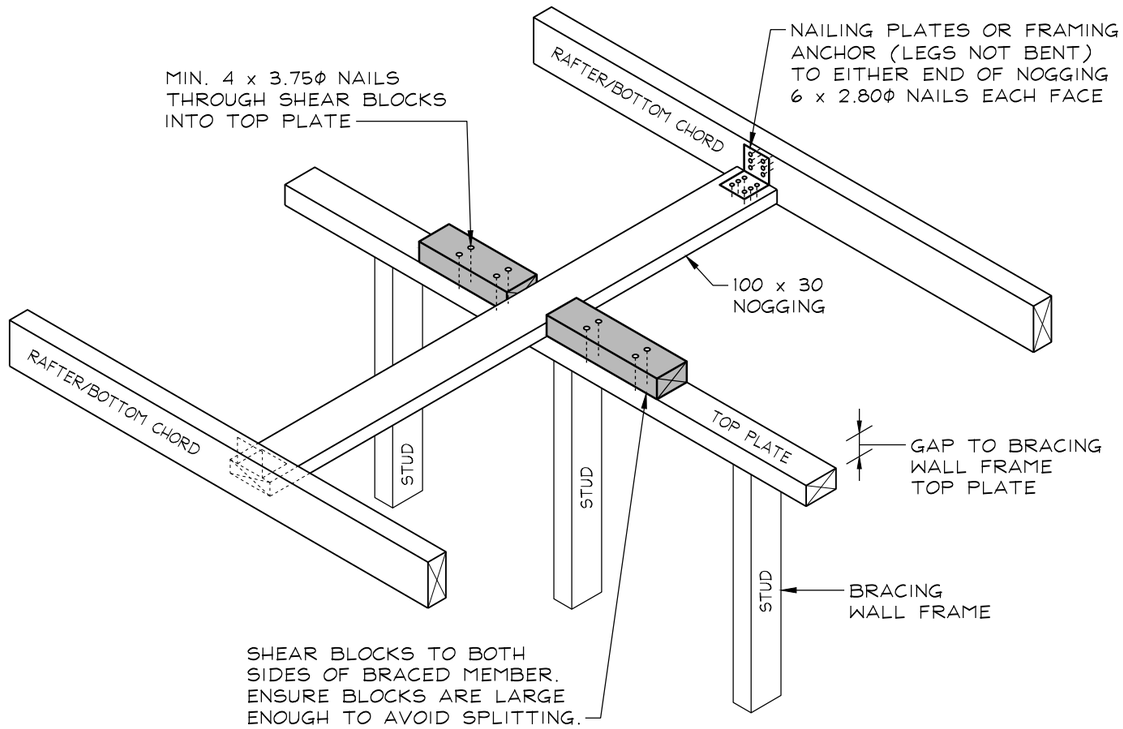
DESIGN	DRAWN	DRAWING SCALE	SHEET SIZE
EC	MN	1:20	A3

PROJECT REF No	DRAWING No	REVISION
200337.1	S9	A



RAFTER/JOIST/TRUSS AT RIGHT ANGLES TO BRACING WALL

CONNECTION TO BE INSTALLED AT EVERY INTERSECTING TRUSS (600 MAX. CENTRES)



RAFTER/JOIST/TRUSS PARALLEL TO BRACING WALL

CONNECTION TO BE INSTALLED AT 600 MAX. CENTRES

TYPICAL INTERNAL BRACING WALL CONNECTION TO RAFTERS/JOISTS/TRUSSES

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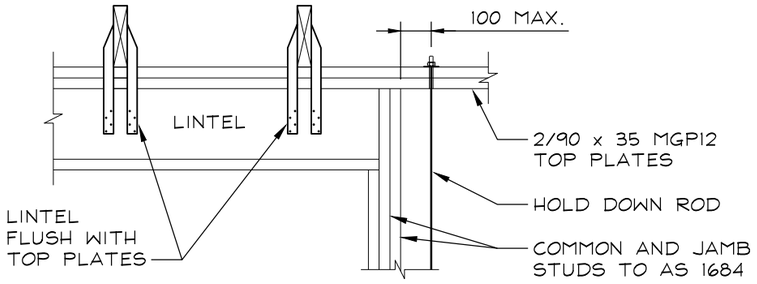
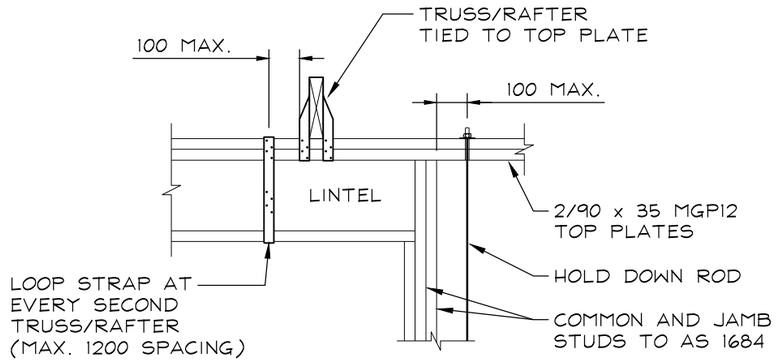
DRAWING TITLE
BRACING DETAILS 2

DESIGN	DRAWN	DRAWING SCALE	SHEET SIZE
EC	MN	1:10	A3

PROJECT REF No	DRAWING No	REVISION
200337.1	S10	A



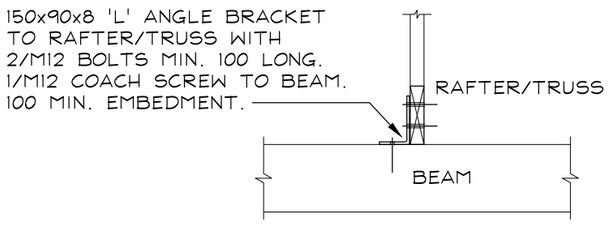
OPTION 1 - TRUSS/RAFTER TIED DIRECTLY TO LINTEL



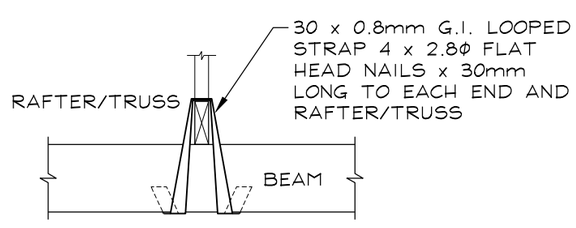
OPTION 2 - CYCLONE STRAP TO TOP PLATE ONLY

TIE DOWN AT OPENINGS

SCALE - 1:20

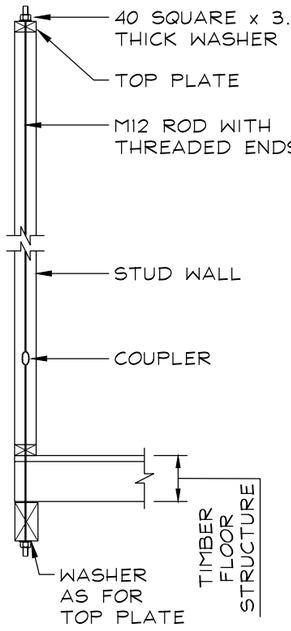


'L' ANGLE BRACKET OPTION

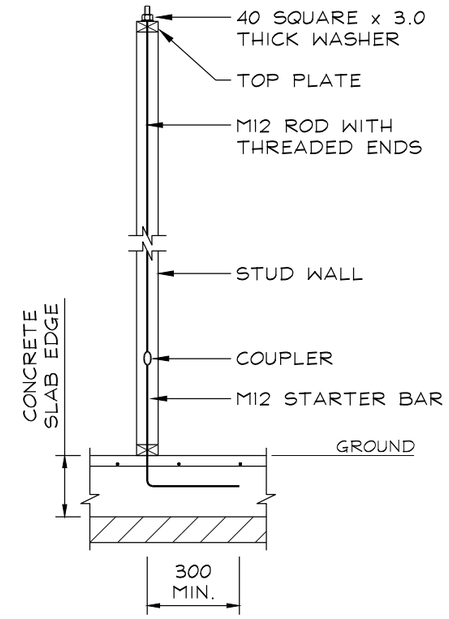


LOOPED G.I. STRAPPING OPTION

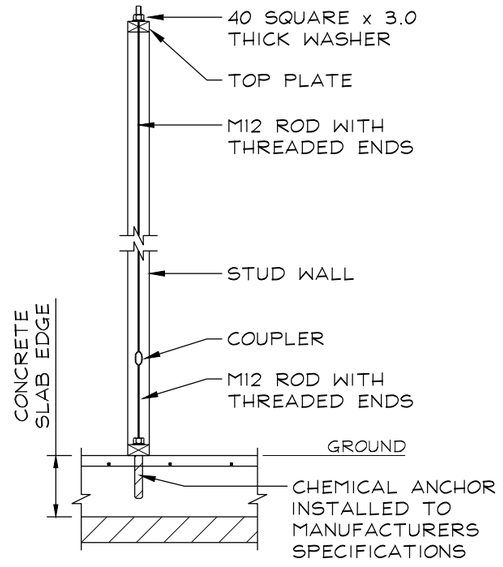
ROOF TRUSS OR RAFTER TO BEAM DETAIL



TIMBER FLOORS



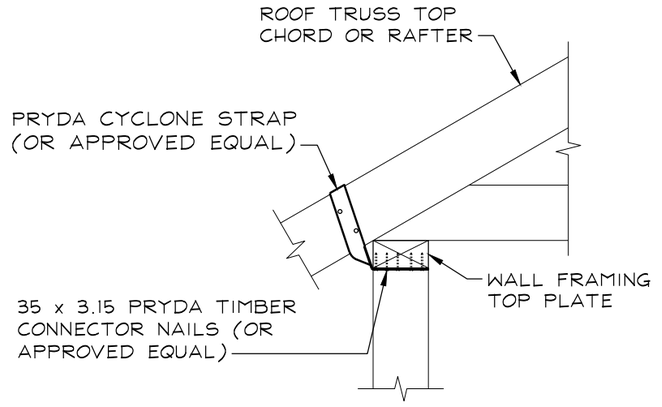
CONCRETE FLOORS - CAST IN
(SIMILAR FOR TOP OF BLOCKWORK WALLS)



CONCRETE FLOORS - CHEMICAL ANCHOR

TYPICAL HOLD DOWN ROD CONNECTIONS

SCALE - 1:20



TYPICAL ROOF TRUSS OR RAFTER TO TOP PLATE TIE DOWN CONNECTION

SCALE - 1:10

REVISIONS			
A	FOR CONSTRUCTION	01.09.23	
P1	PRELIMINARY FOR REVIEW	30.08.23	
ISSUE	DESCRIPTION	DATE	

PRINCIPAL ENGINEERS SIGNATURE

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PROJECT
PROPOSED SECONDARY DWELLING

AT
111B BALEMO DRIVE, OCEAN SHORES NSW 2483

FOR
JOSH KILGARIFF

DRAWING TITLE
HOLD DOWN DETAILS

DESIGN	DRAWN	DRAWING SCALE	SHEET SIZE
EC	MN	AS SHOWN	A3

PROJECT REF No	DRAWING No	REVISION
200337.1	S11	A

GENERAL NOTES

1. THE DESIGN AND DETAILS SHOWN ON THESE DRAWINGS ARE APPLICABLE TO THIS PROJECT ONLY AND MAY NOT BE REPRODUCED IN WHOLE OR IN PART OR BE USED FOR ANY OTHER PROJECT OR PURPOSE WITHOUT THE WRITTEN PERMISSION OF PETER LUCENA WITH WHOM THE COPYRIGHT RESIDES.
2. THESE DRAWINGS SHALL BE READ IN CONJUNCTION WITH ALL ARCHITECTURAL DRAWINGS, OTHER CONSULTANTS' DRAWINGS, SPECIFICATIONS AND SUCH OTHER WRITTEN INSTRUCTIONS AS MAY BE ISSUED DURING THE COURSE OF THE CONTRACT. ANY DISCREPANCY SHALL BE REFERED TO THE ENGINEER BEFORE PROCEEDING WITH THE WORK.
3. ALL MATERIALS AND WORKMANSHIP SHALL BE IN ACCORDANCE WITH THE RELEVANT AND CURRENT SAA CODES AND WITH THE BY-LAWS AND ORDINANCES OF THE RELEVANT BUILDING AUTHORITIES EXCEPT WHERE VARIED BY THE PROJECT SPECIFICATIONS.
4. ALL DIMENSIONS SHOWN SHALL BE VERIFIED BY THE BUILDER ON SITE. ENGINEER'S DRAWINGS SHALL NOT BE SCALED FOR DIMENSIONS.
5. DURING CONSTRUCTION THE STRUCTURE SHALL BE MAINTAINED IN A STABLE CONDITION AND NO PART SHALL BE OVERSTRESSED. TEMPORARY BRACING SHALL BE PROVIDED BY THE BUILDER TO KEEP THE WORKS AND EXCAVATIONS STABLE AT ALL TIMES.
6. UNLESS NOTED OTHERWISE ALL LEVELS ARE IN METRES AND ALL DIMENSIONS ARE IN MILLIMETRES.
7. THE STRUCTURAL COMPONENTS DETAILED ON THESE DRAWINGS HAVE BEEN DESIGNED IN ACCORDANCE WITH THE RELEVANT SAA CODES AND LOCAL GOVERNMENT ORDINANCES FOR THE FOLLOWING LOADINGS.

FLOOR USAGE..... RESIDENTIAL

LIVE LOAD kPa..... 1.5 kPa

WIND LOADS ARE IN ACCORDANCE WITH AS4055 AS FOLLOWS: REGION B	
DESIGN WIND SPEED	50m/s
TERRAIN CATEGORY	3.0
TOPOGRAPHIC CLASSIFICATION	T0
WIND CLASSIFICATION	N3

TIMBER NOTES

1. ALL WORKMANSHIP AND MATERIALS SHALL BE IN ACCORDANCE WITH THE CURRENT EDITION OF AS1720-SAA TIMBER STRUCTURES CODE.
2. ALL STRUCTURAL TIMBER SHALL BE OF A STRESS GRADE AS INDICATED ON THE DRAWINGS.
3. ALL HARDWOOD SHALL HAVE A MINIMUM STRESS GRADING F14 UNLESS NOTED OTHERWISE.
   ALL SOFTWOODS SHALL HAVE A MINIMUM STRESS GRADING F5 UNLESS NOTED OTHERWISE.
4. TIMBER SHALL BE HANDLED AND STORED SO AS NOT TO OVERSTRESS THE MEMBERS AT ANY TIME. TIMBER DELIVERED TO THE SITE SHALL BE STORED ON A LEVEL BED NOT LESS THAN 150mm OFF THE GROUND, EVENLY SUPPORTED, WELL VENTILATED AND PROTECTED FROM THE ELEMENTS.
5. ALL BOLTS IN TIMBER CONSTRUCTION TO BE MINIMUM M12 UNLESS NOTED OTHERWISE.
6. IN ALL TIMBER BOLTED JOINTS, ALL NUTS AND BOLTS ARE TO BE THOROUGHLY GREASED AND PROVIDED WITH STEEL WASHERS BOTH ENDS.
7. ALL LAMINATED VENEER LUMBER AND GLUE LAMINATED MEMBERS ARE TO BE LINED AND PROTECTED FROM THE EXTERIOR ENVIRONMENT.

CONCRETE NOTES

1. ALL WORKMANSHIP AND MATERIALS SHALL BE IN ACCORDANCE WITH AS3600 CURRENT EDITION WITH AMENDMENTS, EXCEPT WHERE VARIED BY CONTRACT DOCUMENTS.
2. CONCRETE QUALITY:-

   THE CHARACTERISTIC COMPRESSIVE STRENGTH AND SLUMP OF THE CONCRETE MUST NOT BE LESS THAN THE VALUE STATED BELOW.

ELEMENT	F'c MPa (28 DAYS)	SLUMP (mm)	AGGREGATE SIZE (mm)
FOOTINGS	20 MIN.	80 MAX.	20
SLAB ON GRADE	25 MIN.	80 MAX.	20
POLISHED CONCRETE	32 MIN.	80 MAX.	20
SUSPENDED SLAB	32 MIN.	80 MAX.	20

   PROJECT CONTROL TESTING SHALL BE CARRIED OUT IN ACCORDANCE WITH AS3600.

3. NO ADMIXTURES SHALL BE USED IN CONCRETE UNLESS APPROVED IN WRITING.
4. ALL REINFORCEMENTS SHALL BE FIRMLY SUPPORTED ON MILD STEEL PLASTIC TIPPED CHAIRS, PLASTIC CHAIRS OR CONCRETE CHAIRS NOT GREATER THAN 1 METRE CENTRES BOTH WAYS. BARS SHALL BE TIED AT ALTERNATE INTERSECTIONS.
5. CONCRETE SIZES SHOWN DO NOT INCLUDE THICKNESS OF APPLIED FINISHES.
6. NO HOLES, CHASES OR EMBEDMENT OF PIPES OTHER THAN THOSE SHOWN ON THE STRUCTURAL DRAWINGS SHALL BE MADE IN CONCRETE MEMBERS WITHOUT THE PRIOR WRITTEN APPROVAL OF THE ENGINEER.
7. CONSTRUCTION JOINTS WHERE SHOWN SHALL BE LOCATED TO THE APPROVAL OF THE ENGINEER.
8. THE FINISHED CONCRETE SHALL BE A DENSE HOMOGENEOUS MASS, COMPLETELY FILLING THE FORMWORK THOROUGHLY IMBEDDING THE REINFORCEMENT AND FREE OF AIR POCKETS. ALL CONCRETE INCLUDING SLABS ON GROUND AND FOOTINGS SHALL BE COMPACTED WITH MECHANICAL VIBRATORS.
9. CURING OF ALL CONCRETE IS TO BE ACHIEVED BY KEEPING SURFACES CONTINUALLY WET FOR A PERIOD OF 3 DAYS AND PREVENTION OF LOSS OF MOISTURE FOR A TOTAL OF 7 DAYS FOLLOWED BY A GRADUAL DRYING OUT. APPROVED SPRAYED ON CURING COMPOUNDS MAY BE USED WHERE NO FLOOR FINISHES ARE PROPOSED. POLYTHENE SHEETING OR WET HESSIAN MAY BE USED IF PROTECTED FROM WIND AND TRAFFIC.
10. THE ENGINEER SHALL BE GIVEN 24 HOURS NOTICE FOR REINFORCEMENT INSPECTION IF REQUIRED AND CONCRETE SHALL NOT BE DELIVERED UNTIL FINAL APPROVAL IS OBTAINED.
11. CONDUITS, PIPES ETC., SHALL ONLY BE LOCATED IN THE MIDDLE 1/3 OF THE SLAB DEPTH AND SPACED AT NOT LESS THAN 3 DIAMETERS.
12. REINFORCEMENT SYMBOLS:
    - N - DENOTES GRADE 500 MPa N BARS TO AS4671 GRADE N.
    - R - DENOTES GRADE 250 MPa HOT ROLLED PLAIN BARS TO AS4671.
    - 4-L11TM - DENOTES GRADE 500 MPa RIBBED 11mmΦ BAR TRENCH MESH 4No. TO AS4671.
    - SL - DENOTES HARD-DRAWN REINFORCED FABRIC TO AS4671.
13. REINFORCEMENT IS REPRESENTED DIAGRAMMATICALLY AND NOT NECESSARILY IN TRUE PROJECTION.
14. WELDING OR HEATING OF REINFORCEMENT SHALL NOT BE PERMITTED UNLESS SHOWN ON THE STRUCTURAL DRAWINGS OR APPROVED BY THE ENGINEER.
15. SLAB FABRIC SHALL BE LAPPED 2 TRANSVERSE WIRES PLUS MINIMUM 25mm.
16. TRENCH MESH SHALL BE SPLICED, WHERE NECESSARY, BY A MINIMUM LAP OF 500mm.
17. THE LAP LENGTH OF THE BAR SPLICES SHALL NOT BE LESS THAN 500mm FOR BARS 12mm DIAMETER OR LESS.
18. CLEAR CONCRETE COVER TO REINFORCEMENT FOR DURABILITY SHALL BE AS FOLLOWS UNLESS SHOWN OTHERWISE:

EXPOSURE	CONCRETE COVER
• CAST AGAINST GROUND	50mm
• EXTERNAL EXPOSED SURFACE	45mm
• INTERNAL EXPOSED SURFACE	20mm

MASONRY NOTES

1. ALL WORKMANSHIP AND MATERIALS SHALL BE IN ACCORDANCE WITH AS3700-SAA MASONRY CODE.
2. BRICKS SHALL HAVE A MINIMUM CRUSHING STRENGTH OF 25MPa. MORTAR TO BE MIXED IN THE PROPORTIONS 1 : 1 : 6 CEMENT : HYDRATED LIME : SAND (OR EQUIVALENT SAND/CEMENT MORTAR WITH PLASTICISES) AND MORTAR COMPRESSIVE STRENGTH AT 28 DAYS TO BE 12 MPa MINIMUM.
3. ALL WALLS SUPPORTING SLABS AND BEAMS SHALL HAVE TWO LAYERS OF MALTHOID LAID ON 10mm LEVEL MORTAR BED BETWEEN THE CONCRETE AND MASONRY U.N.O.
4. ALL BRICKWORK SUPPORTING OR SUPPORTED BY CONCRETE FLOORS SHALL BE PROVIDED WITH VERTICAL JOINTS TO MATCH ANY CONTROL JOINTS IN CONCRETE.
5. NON LOAD BEARING WALLS SHALL BE SEPARATED FROM CONCRETE ABOVE BY 12mm THICK CLOSED CELL POLYETHYLENE STRIP.
6. NO CHASES OR RECESSES ARE PERMITTED IN LOAD BEARING MASONRY WITHOUT APPROVAL OF ENGINEER.
7. REINFORCED CONCRETE BLOCKWORK SHALL COMPLY WITH THE FOLLOWING UNLESS NOTED OTHERWISE;
   - 7.1. BLOCKS SHALL BE STRENGTH GRADE 15 CONFORMING TO AS/NZS 4455.
   - 7.2. MORTAR SHALL COMPRISE 1 CEMENT : 0.25 LIME : 3 SAND.
   - 7.3. MORTAR COMPRESSIVE STRENGTH AT 28 DAYS TO BE 11 MPa MINIMUM.
   - 7.4. PROVIDE CLEAN OUT HOLES AT BASE OF ALL WALLS AND ROD CORE HOLES TO REMOVE PROTRUDING MORTAR FINS. CLEAN OUT HOLES NOT REQUIRED FOR WALLS ≤ 1200 TALL.
   - 7.5. CORE FILLING GROUT TO BE F'c = 20 MPa, 10mm AGGREGATE, 230mm SLUMP.
   - 7.6. CORE FILL IN MAXIMUM 1800mm HIGH LIFTS.
   - 7.7. PROVIDE 65mm COVER TO REINFORCEMENT FROM OUTSIDE OF THE BLOCKWORK TO ALLOW ADEQUATE GROUT COVER.
8. PROVIDE VERTICAL CONTROL JOINTS AT 10m MAXIMUM CENTRES.
9. NO MASONRY OR PARTITION WALLS ARE TO BE CONSTRUCTED ON SUSPENDED SLABS OR BEAMS UNTIL ALL PROPPING IS REMOVED.

RETAINING WALLS

1. PROVIDE GEOTEXTILE FABRIC TO VERTICAL SURFACE OF RETAINED MATERIAL. LAY FABRIC IN VERTICAL LENGTHS EXTENDING FROM BASE OF BLOCKWORK THROUGH TO TOP OF CUT/FILL. FOLD FABRIC OVER BACKFILL.
2. PROVIDE WATERPROOF MEMBRANE TO REAR OF WALL.
3. BACKFILL BEHIND RETAINING WALLS WITH CLEAN PROPERLY COMPACTED FREE DRAINING NON-COHESIVE GRANULAR MATERIAL. PROVIDE SUBSOIL DRAIN OR WEEP HOLES.

STEELWORK NOTES

1. ALL WORKMANSHIP AND MATERIALS SHALL BE IN ACCORDANCE WITH AS4100 AND AS1554 EXCEPT WHERE VARIED BY THE CONTRACT DOCUMENTS.
2. UNLESS NOTED OTHERWISE, ALL STEEL SHALL BE IN ACCORDANCE WITH AS1204 GRADE 250.
3. BOLT DESIGNATION:

   4.6/S - COMMERCIAL BOLTS OF GRADE 4.6 TO AS1111-SNUG TIGHTENED.

   8.8/S - HIGH STRENGTH STRUCTURAL BOLTS OF GRADE 8.8 TO AS1252-SNUG TIGHTENED.

   8.8/TB - HIGH STRENGTH STRUCTURAL BOLTS OF GRADE 8.8 TO AS1252 FULLY TENSIONED TO AS1511 AS A BEARING JOINT.

   8.8/TF - HIGH STRENGTH STRUCTURAL BOLTS OF GRADE 8.8 TO AS1252 FULLY TENSIONED TO AS1511 AS A FRICTION JOINT WITH FACING SURFACES LEFT UNCOATED.

   UNLESS NOTED OTHERWISE ALL BOLTS SHALL BE M20 GRADE 8.8/S.

   NO CONNECTION SHALL HAVE LESS THAN 2 BOLTS.

   TB AND TF BOLTS TO BE INSTALLED USING APPROVED LOAD INDICATING WASHERS.

4. UNLESS NOTED, ALL WELDS SHALL BE 6mm CONTINUOUS FILLET TYPE GP USING E41XX ELECTRODES - BUTT WELDS SHALL BE COMPLETE PENETRATION BUTT WELDS TO AS1554.
5. UNLESS NOTED, ALL CLEAT PLATES TO BE 10mm.
6. CONCRETE ENCASED STEELWORK SHALL BE WRAPPED IN ACCORDANCE WITH AS4100 AND TO HAVE 50mm MINIMUM CONCRETE COVER.
7. PROVIDE STEEL PLATES TO ALL HOLLOW SECTIONS, WITH "BREATHER" HOLES IF MEMBERS TO BE HOT DIP GALVANISED.
8. ALL STEELWORK TO BE SECURED WITH TEMPORARY BRACES AS NECESSARY TO STABILISE THE STRUCTURE DURING ERECTION.
9. THE BUILDER SHALL PROVIDE ALL CLEATS AND DRILL ALL HOLES NECESSARY FOR FIXING STEEL TO STEEL AND TIMBER TO STEEL WHETHER OR NOT THEY ARE DETAILED ON THE DRAWINGS.
10. THE ROOF STRUCTURE HAS BEEN DESIGNED FOR NORMAL ROOF LOADS ONLY AND DOES NOT ALLOW FOR ANY EXTRA LOADS SUCH AS HOISTS, MONORAILS ETC. EXCEPT WHERE SHOWN ON THE DRAWINGS.
11. STRUCTURAL STEELWORK SHALL HAVE THE FOLLOWING SURFACE TREATMENT UNLESS OTHERWISE SPECIFIED:

ELEMENT	SURFACE CLEANING	PRIMING
Internal Steelwork	Power Brush	R.O.Z.P.
External Steelwork	Class 2.5	Hot Dip Galvanised

REVISIONS

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FOR
JOSH KILGARIFF

DRAWING TITLE
GENERAL NOTES

DESIGN	DRAWN	DRAWING SCALE	SHEET SIZE
EC	MN	NOT TO SCALE	A3

PROJECT REF No	DRAWING No	REVISION
200337.1	GN1	A