#### **GENERAL NOTES**

These documents show the general arrangement of the building and include some items not supplied (refer to the quotation for nomination of all items to be provided). All items not nominated therein shall be supplied and installed by others.

The plans provided here are the latest at the time of print. Earlier plans provided may have become outdated due to engineering changes and should not be used. The plans and drawings are extensive and give all the information needed for a competent person to erect the building. The building is not designed to stand up by itself when it is partially complete. Consequently, construction bracing is critical during erection.

The owner has been requested to check off the BOM after the building delivery. You should check that you are able to locate all materials nominated in the BOM. You should also confirm that the length and size (including thickness), nominated in the BOM is what has been provided. Any missing items are the responsibility of the client once correct delivery has been confirmed as per Terms and Conditions of Sale.

### **DESIGN CRITERIA**

These building plans have been prepared to comply with the standards nominated in the engineer's letter. All plans are not to Scale.

#### ADDITIONAL DOCUMENTATION TO BE SUPPLIED BY PURCHASER/OWNER

The Purchaser/Owner is responsible for:

\*Provision of Soils Report for the site and in the building area on which the building is to be erected

\*Site Plan and Drainage Plans

\*Any other plans not covered by these engineering plans requested by the local Council or the authority

#### RAINWATER AND DRAINAGE

All Rainwater and drainage designs are the responsibility of the purchaser/owner. Residential gutters and downpipes where supplied are based on average rainfall for the state and may not be sufficient for your building size or usage. Please speak to your building designer or contractor to ensure gutters are fit for purpose.

#### **BUILDING CONSTRUCTION REQUIREMENTS**

The Builder and Purchaser are to ensure that all construction is carried out in accordance with the Plans, the Construction Manual and the Bill of Materials (BOM).

It is the responsibility of the builder to ensure that they are familiar with the operational risks and their obligations in carrying out construction work.

The builder must ensure that they have an appropriate Health & Safety Plan (The Plan) compliant with and as required by their local, state and federal regulations. The Plan will need to take into account the site conditions, the size of the building and the experience of the construction personnel. The Plan will, most likely, differ for each project.

The builder must ensure that The Plan is adhered to. Particular attention should be paid to the requirements to ensure that any person working at heights are properly trained and following the requirements as set out by The Plan.

It is recommended that you check with the appropriate authority in your area as to your responsibilities.

### **TEMPORARY SUPPORT, LIFTING AND SHORING**

The design of temporary propping shoring, lifting and support during construction has not been undertaken and is not included in our engagement. This work is the responsibility of the Contractor undertaking the construction of the building.

### **SLAB AND/OR PIER DETAILS - GENERAL**

\* The minimum size of Piers under the columns and End Wall Mullions are nominated on the Material Specifications Plan. When the slab and piers are poured as one pour, the depth of the pier is to the top of the slab.

\* Pier Reinforcement: for any piers over 1100mm, deformed bar to within 100mm of base and minimum 75mm top cover. Minimum side cover 75mm, maximum 100mm. Rod to be caged horizontally at least twice and at a maximum of 300mm spacing. Tie with a minimum of 6mm diameter cage tie. Where pier diameter is less than 450mm diameter, use 4 N12. For diameters equal to and over 450mm, use 4 N16.\* Where columns or end wall mullions have been removed, piers are not required.

\* End wall mullion spacing may move due to location of openings or doors. Check layout and component position plan, and relocate piers as required. \* The Slab Plan indicates those parts of the slab which are 50mm below main

slab/piers.

\* Footings and slabs, including internal and edge beams, must be founded on natural soil with a minimum allowable bearing capacity of 100kPa. Design covers soil classifications of A, S, M, H1 or H2 for a class 10 building.

- \* The footing designs have been calculated with adhesion values of 0kPa,
- 25kPa and 50kPa for clay soils and dense sand soils only.
- \* A site specific geotechnical investigation has not been performed. The builder will need to verify the soil type and conditions.
- \* Site conditions different to those specified require a modified design.
- \* Sub grade shall be excavated and compacted to a minimum of 100%
- standard dry density ratio and within 2% of the OMC to comply with AS2159. \* Designs are in accordance with AS 3600:2018

\* All concrete to be in accordance with AS 3600:2018. Minimum 25 Mpa, with 80mm slump.

\* Concrete should be cured for 7 days before commencing construction of the building.

#### **Concrete Slab**

#### For Class A, S or M Sites

\* Slab thickness to be a minimum of 100mm with SL 72 mesh and 40mm top cover.

\* Concrete piers under Roller Doors Jambs to be a minimum size as below:

C15015 - 300mm dia x 375mm deep, centered to the C Section Where heavy traffic is to go through the roller doors, it is recommended that the slab edge should be thickened to 200mm deep by 300mm wide for the length between the mullions. Place an additional section of SL 72 mesh, 50mm from the base in all thickenings.

### For Class H1 or H2 Sites

cover.

- to the perimeter of the building.
- a max spacing of 6.2m.

#### **Concrete Piers Only**

#### For Class A. S or M Sites

### For Class H1 or H2 Sites

\* Concrete piers under Roller Door Jambs to be a minimum size as below: C15015 - 300mm dia x 1000mm deep, centered to the C Section

### SHEETED PORTALS AND MULLIONS

engineering approval.

#### **BRACING NOTES**

\* Refer to Connection Details.

- \* Knee bracing clearance from FFL is X = Main Building: 2.489m.

at each end, quantity as per connection details.

- C300 maximum 2800mm spacing
- C350 maximum 2800mm spacing

C400 - maximum 2800mm spacing

rafter for any end wall mullions.

	-	-				<u>.</u>
Revision	Date	Initial	Burghooor Nomo: David Canden			
			Purchaser Name: David Condon		General Notes	Seller: THE Shed Company Mudgee
						Name: S & K Lincoln Pty Ltd
			Site Address: 57 Rifle Range Rd Mudgee N	ISW 2850 Australia		Phone: (02) 6372 7755
					Page 1 of 2	Fax: (02) 6372 7700
					©Copyright Steelx IP Pty Ltd	Email: mudgeeadmin@theshedcompany.com.a
			Drawing # TMUD223017 - 2	Print Date: 20/10/2022		

\* Slab thickness to be a minimum of 100mm with SL 82 mesh and 40mm top

- \* Perimeter beams 400mm deep x 300mm wide with Y12 3 bar Trench Mesh
- \* Internal beams 400mm deep by 300mm wide with Y12 3 bar Trench Mesh at
- \* Concrete piers under Roller Doors Jambs to be a minimum size as below: C15015 - 300mm dia x 500mm deep, centered to the C Section

\* Concrete piers under Roller Door Jambs to be a minimum size as below: C15015 - 300mm dia x 750mm deep, centered to the C Section

All end and dividing wall mullions provide critical support to portal frames and cannot be repositioned or removed under any circumstances without

- \* All Cross Bracing is achieved with 1.2mm Strap G450.
- \* Cross bracing is to be fixed taut and secured with 14.20 x 22 frame screws
- \* Fly bracing to be fixed to the purlins/girts on all mid portal rafters, columns and end wall mullions. Fly bracing is to be fitted to every second purlin/girt, or,
- on every one, where the spacing between fly braces would exceed the
- maximum specified below for the relevant column/rafter size:
  - C150 maximum 1800mm spacing
  - C200, C250 maximum 2200mm spacing
- Initial measurement is from the haunch of the column/rafter, and from the

Apex Engineering Group PTY LTD ACN 632 588 562 MIE Aust. (Registered NER Structural) 5276680 QLD : RPEQ No. 24223; TAS : 185770492; VIC : PE0003848; N.T : 303557ES; Practising Professional Structural & Civil Engineers

John Ronaldso

\* Open bays to have fly bracing fitted to every available girt supporting the header sheets.

\* All bracing strap ends to be located as close as practical to structural member's (columns, rafters, mullions) centerline.

## BOLTS

- \* Unless otherwise nominated, all bolts are grade 4.6
- \* All tensioned bolts shall be tensioned using the part turn method (refer to
- AS4100). For the erector, full details are in the construction manual.

### ROLLER DOORS

All comments regarding roller doors are referenced from inside the building looking out.

### **OTHER MATERIALS NOTES**

- \* All Sheeting, Flashing and framing screws are Climaseal 4.
- \* All purlin material has Z350 zinc coating with minimum strength of 450MPa.

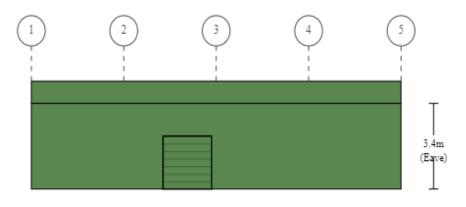
Revision	Date	Initial						
			Purchaser Name: David Condon		General Notes	Seller: THE Shed Company Mudgee		
			Site Address: 57 Rifle Range Rd Mudgee N	NSW 2850 Australia	Page 2 of 2	Name: S & K Lincoln Pty Ltd Phone: (02) 6372 7755 Fax: (02) 6372 7700		
			Drawing # TMUD223017 - 2	Print Date: 20/10/2022	©Copyright Steelx IP Pty Ltd	Email: mudgeeadmin@theshedcompany.com.au		

Apex Engineering Group PTY LTD ACN 632 588 562 MIE Aust. (Registered NER Structural) 5276680 QLD : RPEQ No. 24223; TAS : 185770492; VIC : PE0003848; N.T : 303557ES; Practising Professional Structural & Civil Engineers

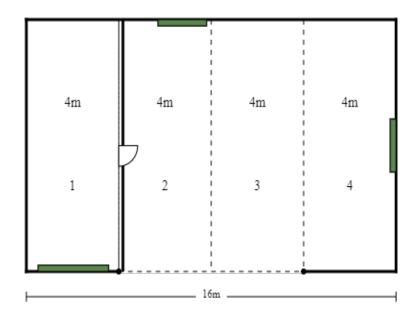
Signature:

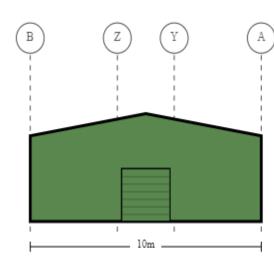
Ramilh

John Ronaldson

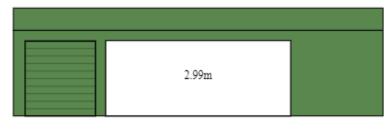


Left Side



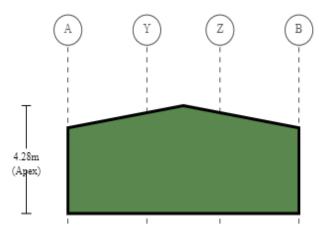


Right End



Right Side

Apex Engineering Group PTYLTD ACN 632 588 562 ME Aust. (Registered NER Structural) 5276680 QLD : RPEQ No. 24223; TAS : 185770492; MC : PE0003848; N.T : 303557ES; Practising Professional Structural & Civil Engineers Purchaser Name: David Condon Seller: THE Shed Company Mudgee S & K Lincoln Pty Ltd Phone: (02) 6372 7755 Site Address: 57 Rifle Range Rd Mudgee NSW 2850 Australia Layout Not to Scale © Copyright Steelx IP Pty Ltd Fax: (02) 6372 7700 Email: mudgeeadmin@theshedcompany.com.au Signature: U Ramilh Drawing # TMUD223017 - 3 Print Date: 20/10/22 John Ronaldson Date: 20/10/22



Left End

#### MATERIAL SPECIFICATIONS

For further information regarding the tabulated values shown, refer to the General Notes

Building Dimensions								
Categories	Span	Length	Pitch	Height	Grid(s)	Portal(s)		
Main Building	10	16	10	3.4	A - B	1 - 5		

Portal Frame Elements

Grid / Portal Number		1	2	3	4	5
Columns	A	C15015	C20024	C20024	C25024	C15019
	В	C15015	2C20019	-	2C20015	C15019
Rafters	A - Apex	C15012	C20019	C20019	C20015	C15015
	Apex - B	C15012	C20019	C20019	C20015	C15015
End Wall Mullions	Y	C15012	C15015	-	-	C15015
	Z	C15012	C15015	-	-	C15015
Apex Braces	Apex	-	-	C15015 @ 3m	C15012 @ 3m	-
Knee Braces	A - Apex			C15012 @ 1.71m	C20015 @ 1.71m	
	Apex - B				C20015 @ 1.71m	

**Bay Section Elements** Grid / Bay Number Maximum 2 4 1 3 Bay Widths 4 4 4 4 Roof Purlins (refer to Purlin And Girt Plan) Z100 Z100 Z100 Z100 Roof Purlin Spacing (End) A - Apex 0.9 0.9 0.9 0.9 0.900 Apex - B 0.9 0.9 0.9 0.9 0.900 Roof Purlin Spacing (Internal Spans) A - Apex 1.033 1.033 1.033 1.033 1.200 Apex - B 1.033 1.033 1.033 1.033 1.200 Eave Purlin XC15012 XC15012 XC15012 XC15012 А XC15012 XC15012 В --2C20019 2C20019 Beam Overs В --Side Girts (refer to Purlin And Girt Plan) Z100 Z100 Z100 Z100 Side Girt Bridging (Rows) YES (1) А YES (1) YES (1) -В -YES (1) --Side Girts Spacing (End) Α 1.585 1.585 1.585 1.585 1.700 В 1.585 1.7 1.7 1.585 1.700 Side Girts Spacing (Internal) Α 1.585 1.585 1.585 1.585 1.700 В 1.585 1.7 1.7 1.585 1.700 Roller Door Header C10010 А ---В C10010 ---Roller Door Jambs C15015 А ---C15015 В -

#### End Bay Section Elements

End Bay Section Elements									
Grid / Portal Number		1	2	5	Maximum				
End Girts (refer to Purlin And Girt Plan)		Z100	Z100	Z100					
End Girt Bridging (Rows)	A - Y	-	-	YES (1)					
	Y - Z	-	-	YES (1)					
	Z - B	-	-	YES (1)					
End Girts Spacing (End)	A - Y	1.585	1.585	1.057	1.700				
	Y - Z	1.585	1.585	1.057	1.700				
	Z - B	1.585	1.585	1.057	1.700				
End Girts Spacing (Internal)	A - Y	1.585	1.585	1.057	1.700				
	Y - Z	1.585	1.585	1.057	1.700				
	Z - B	1.585	1.585	1.057	1.700				
Roller Door Header	Y - Z	-	-	HEADER2					
	Z - B	-	-	-					

Revision	Date	Initial	Durchaser Names David Quadan			
			Purchaser Name: David Condon		Specification Sheet	Seller: THE Shed Company Mudgee
				Site Address: 57 Rifle Range Rd Mudgee NSW 2850 Australia		Name: S & K Lincoln Pty Ltd
			Site Address: 57 Rifle Range Rd Mudgee N			Phone: (02) 6372 7755 Fax: (02) 6372 7700
					©Copyright Steelx IP Pty Ltd	Email: mudgeeadmin@theshedcompany.com.au
			Drawing # TMUD223017 - 4	Print Date: 20/10/2022		

Apex Engineering Group PTY LTD ACN 632 588 562 MIE Aust. (Registered NER Structural) 5276680 QLD : RPEQ No. 24223; TAS : 185770492; VIC : PE0003848; N.T : 303557ES; Practising Professional Structural & Civil Engineers

Signature:

Ramph

John Ronaldson

# MATERIAL SPECIFICATIONS

For further information regarding the tabulated values shown, refer to the General Notes

### End Bay Section Elements (Continue)

Grid / Portal Number		1	2	5	Maximum
Roller Door Jambs	Y - Z	-	-	C15015	
	Z - B	-	-	-	

## Cladding Elements

Category	Colour	Product		
Roof Sheeting	COLORBOND® steel	CORODEK® 0.42 BMT (0.47TCT)		
Roof Flashings	COLORBOND® steel	BlueScope 0.55 BMT		
Wall Sheeting	COLORBOND® steel	CORODEK® 0.42 BMT (0.47TCT)		
Wall Flashing	COLORBOND® steel	BlueScope 0.55 BMT		

				Pier S	izes											
				Dep	th (m)	- whe	n NO S	Slab			C	)epth (	m) - w	ith Sla	b	
Adhesion (kPa)	Soil Description	Diameter (m)	BP1	BP2	BP3	BP4	BP5	BP6	BP7	BP1	BP2	BP3	BP4	BP5	BP6	BP7
0	Sandy Soil	0.3	1.2	-	-	-	-	-	1.6	0.45	-	-	-	-	-	0.9
		0.45	0.8	1.6	1.6	1.6	1.6	1.6	1.1	0.45	0.7	0.8	0.7	0.7	0.7	0.5
		0.6	0.6	1.2	1.2	1.2	1.2	1.2	0.9	0.45	0.45	0.45	0.45	0.45	0.45	0.45
25	Soft to Firm Clay	0.3	0.8	-	-	-	-	-	0.9	0.45	-	-	-	-	-	0.6
		0.45	0.8	1.1	1.1	1.1	1.1	1.1	0.9	0.45	0.7	0.7	0.7	0.7	0.7	0.5
		0.6	0.6	1.1	1.1	1.1	1.1	1.1	0.9	0.45	0.45	0.45	0.45	0.45	0.45	0.45
50	Stiff to Very Stiff Clay	0.3	0.7	-	-	-	-	-	0.9	0.45	-	-	-	-	-	0.6
		0.45	0.7	1	1	1	1	1	0.9	0.45	0.7	0.7	0.7	0.7	0.7	0.5
		0.6	0.6	1	1	1	1	1	0.9	0.45	0.45	0.45	0.45	0.45	0.45	0.45

Revision	Date	Initial	Durchasor Nama: David Cander			
			Purchaser Name: David Condon		Specification Sheet	Seller: THE Shed Company Mudgee
						Name: S & K Lincoln Pty Ltd
			Site Address: 57 Rifle Range Rd Mudgee N	ISW 2850 Australia	Page 2 of 2	Phone: (02) 6372 7755 Fax: (02) 6372 7700
					©Copyright Steelx IP Pty Ltd	Email: mudgeeadmin@theshedcompany.com
			Drawing # TMUD223017 - 4	Print Date: 20/10/2022		

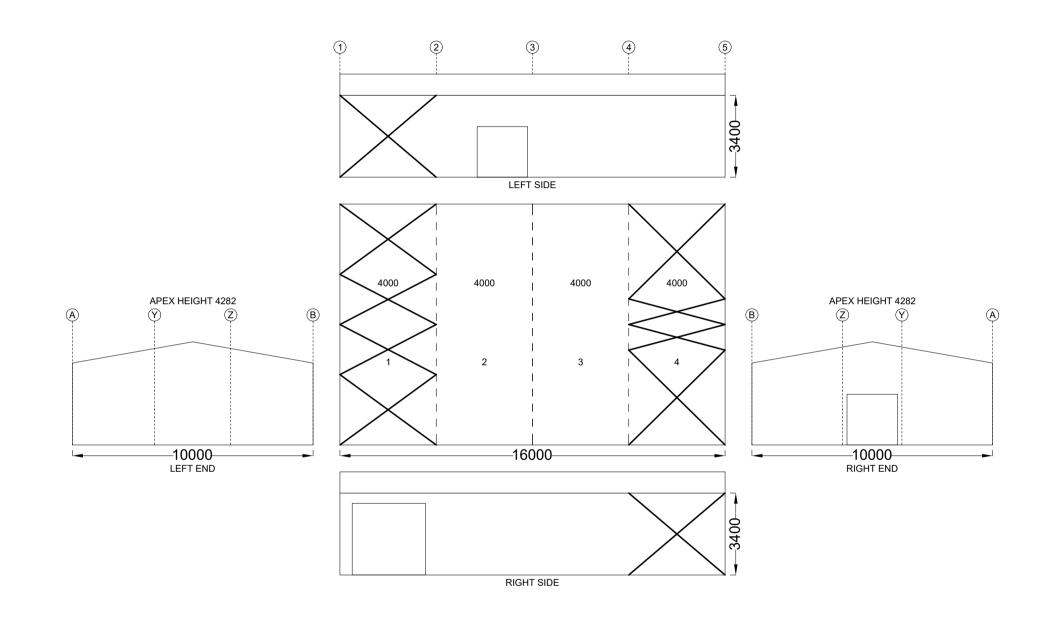
Apex Engineering Group PTY LTD ACN 632 588 562 MIE Aust. (Registered NER Structural) 5276680 QLD : RPEQ No. 24223; TAS : 185770492; VIC : PE0003848; N.T : 303557ES; Practising Professional Structural & Civil Engineers

Signature:

Ramilh

John Ronaldson

Cross Bracing is achieved with 1.2mm Strap. Refer to Connection Details. Cross bracing in the roof is to the purlin nearest to the end wall mullions, where applicable.



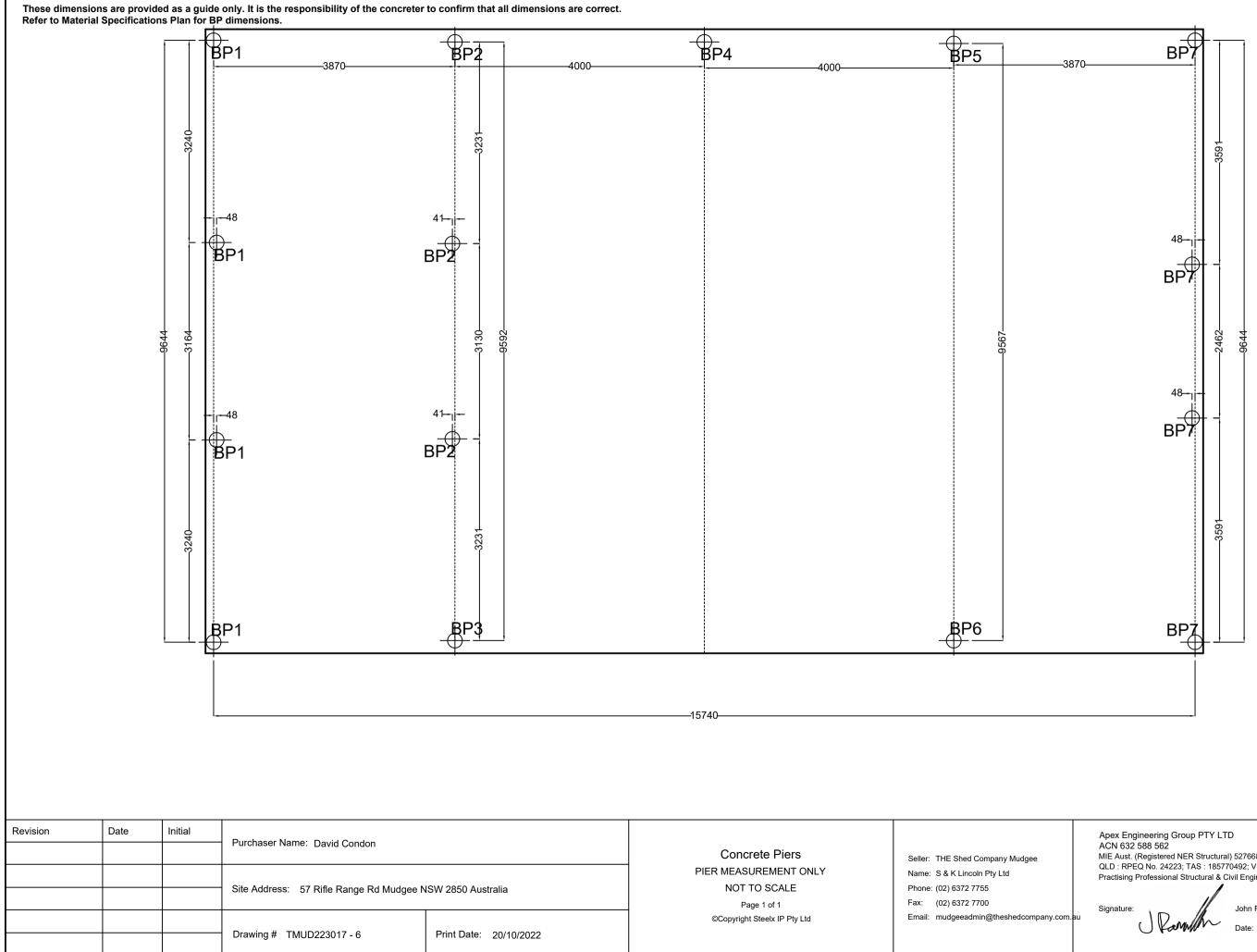
Revision	Date	Initial						
			Purchaser Name: David Condon		Bracing	Seller: THE Shed Company Mudgee		
			Site Address: 57 Rifle Range Rd Mudgee N	ISW 2850 Australia	NOT TO SCALE Page 1 of 1	Name: S & K Lincoln Pty Ltd Phone: (02) 6372 7755 Fax: (02) 6372 7700		
			Drawing # TMUD223017 - 5	Print Date: 20/10/2022	©Copyright Steelx IP Pty Ltd	Email: mudgeeadmin@theshedcompany.com.au		
				Finit Date. 20/10/2022				

Apex Engineering Group PTY LTD ACN 632 588 562 MIE Aust. (Registered NER Structural) 5276680 QLD : RPEQ No. 24223; TAS : 185770492; VIC : PE0003848; N.T : 303557ES; Practising Professional Structural & Civil Engineers

Signature:

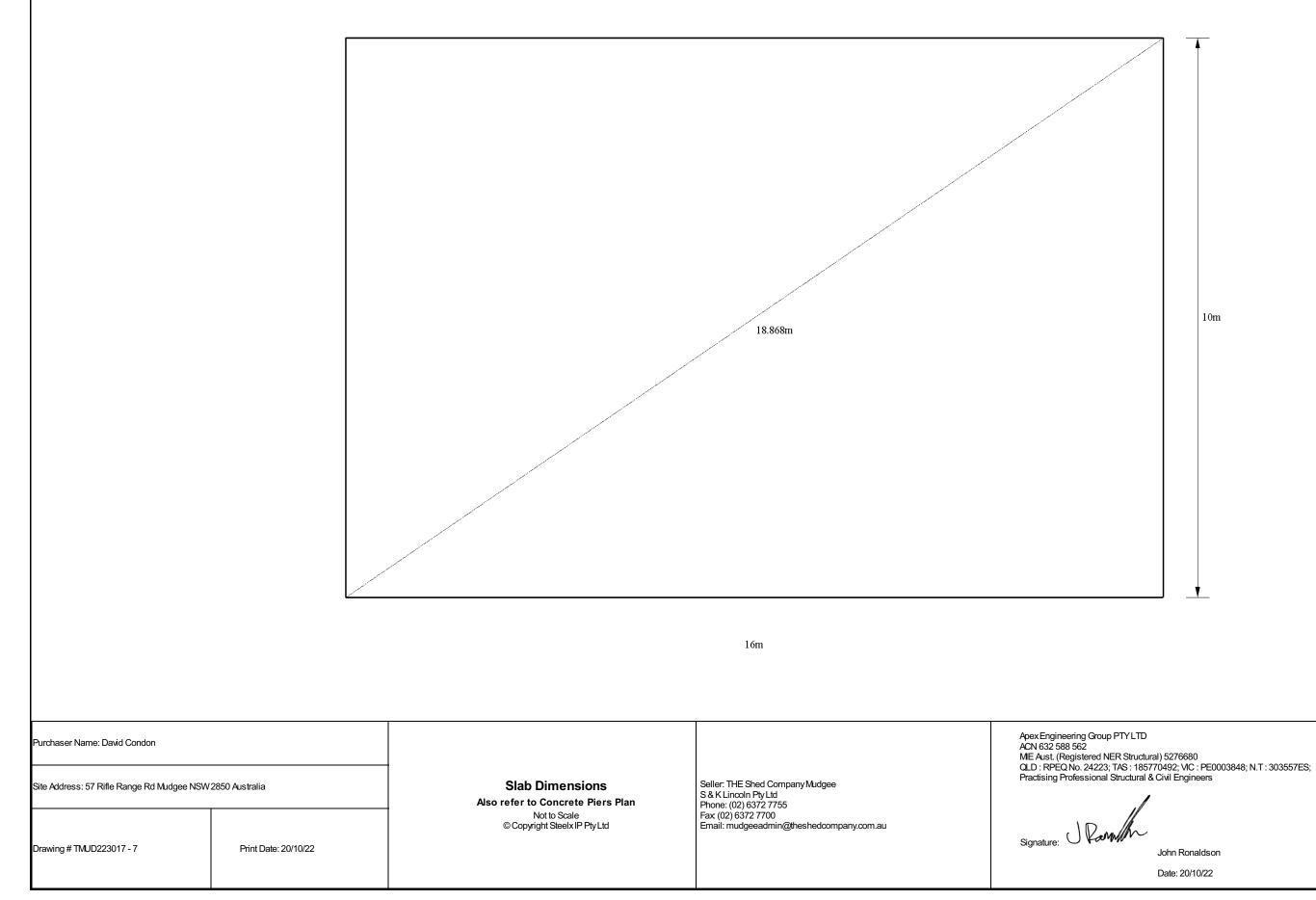
JRamh

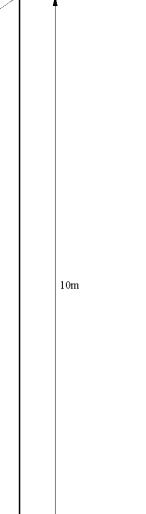
John Ronaldson



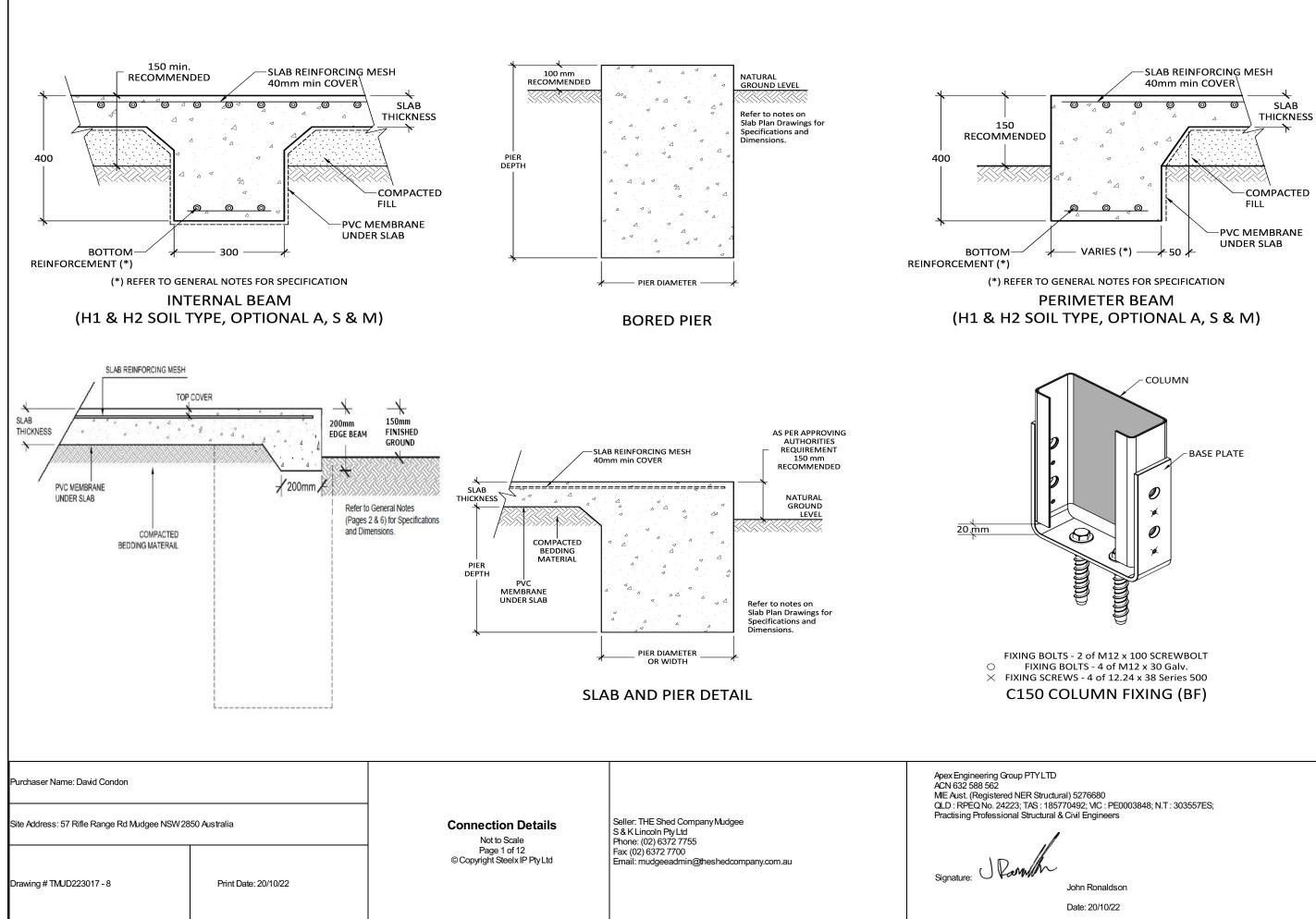
MIE Aust. (Registered NER Structural) 5276680 QLD : RPEQ No. 24223; TAS : 185770492; VIC : PE0003848; N.T : 303557ES; Practising Professional Structural & Civil Engineers John Ronaldson

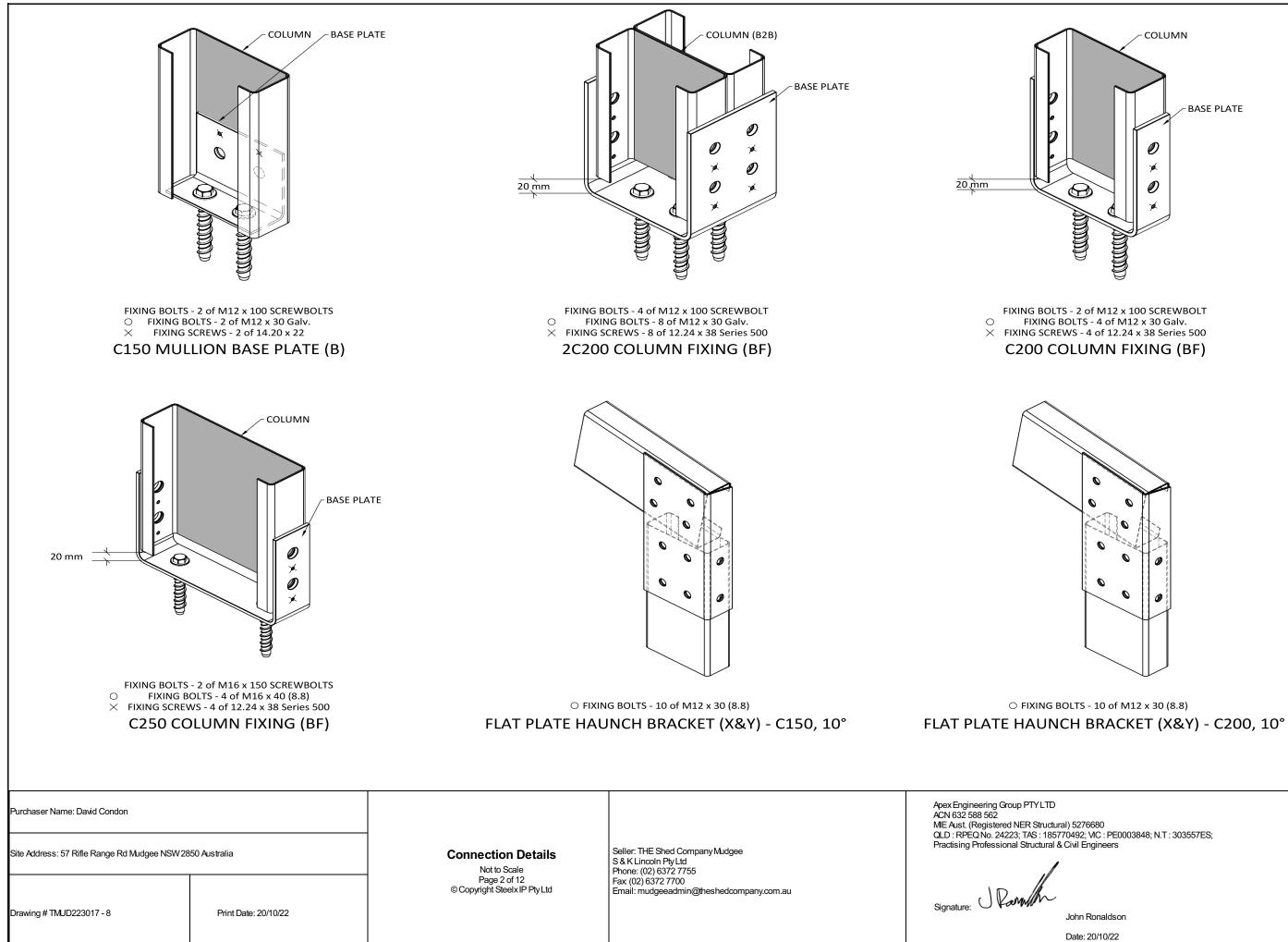
These dimensions are provided as a guide only. It is the responsibility of the concreter to confirm that all dimensions are correct.

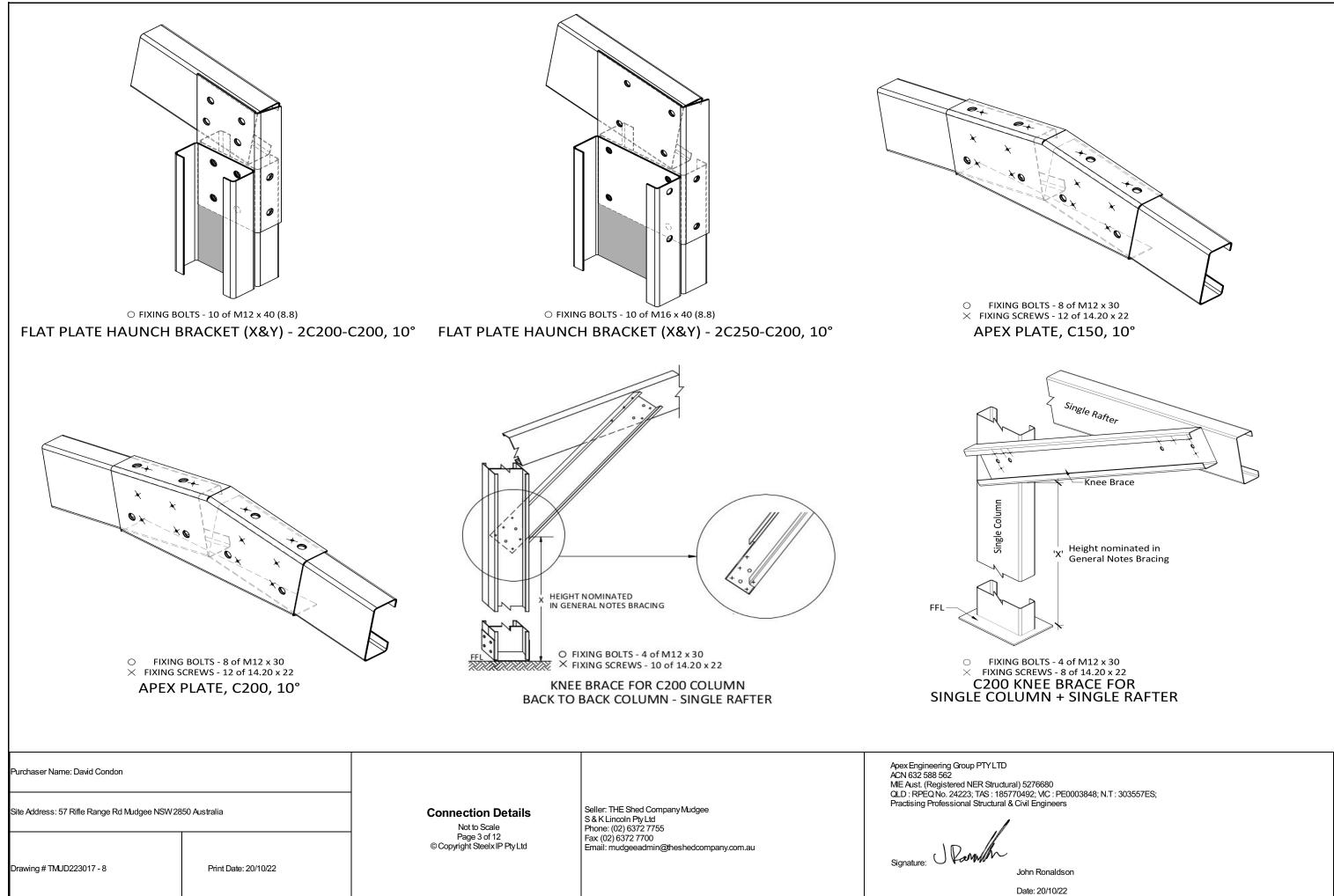


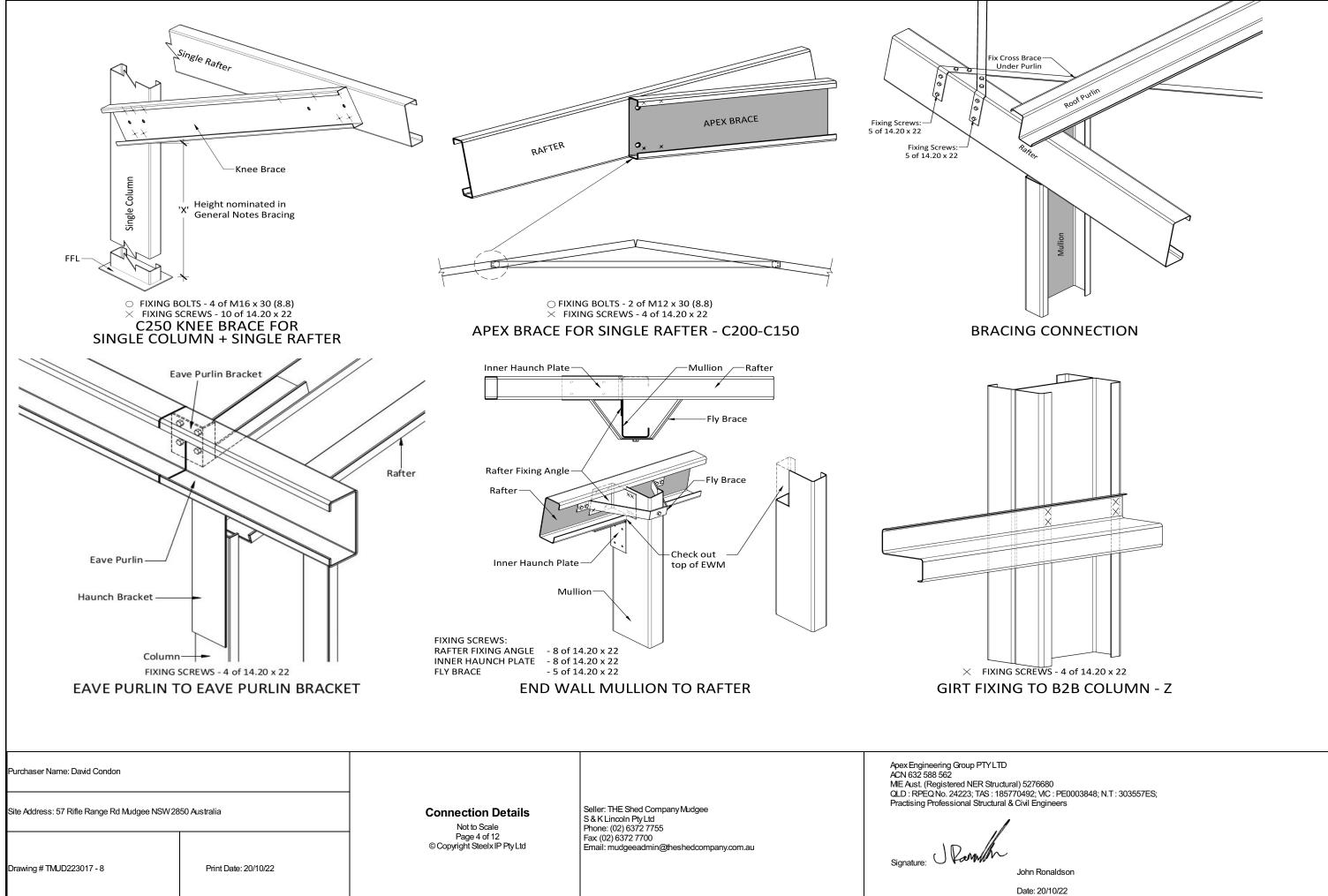


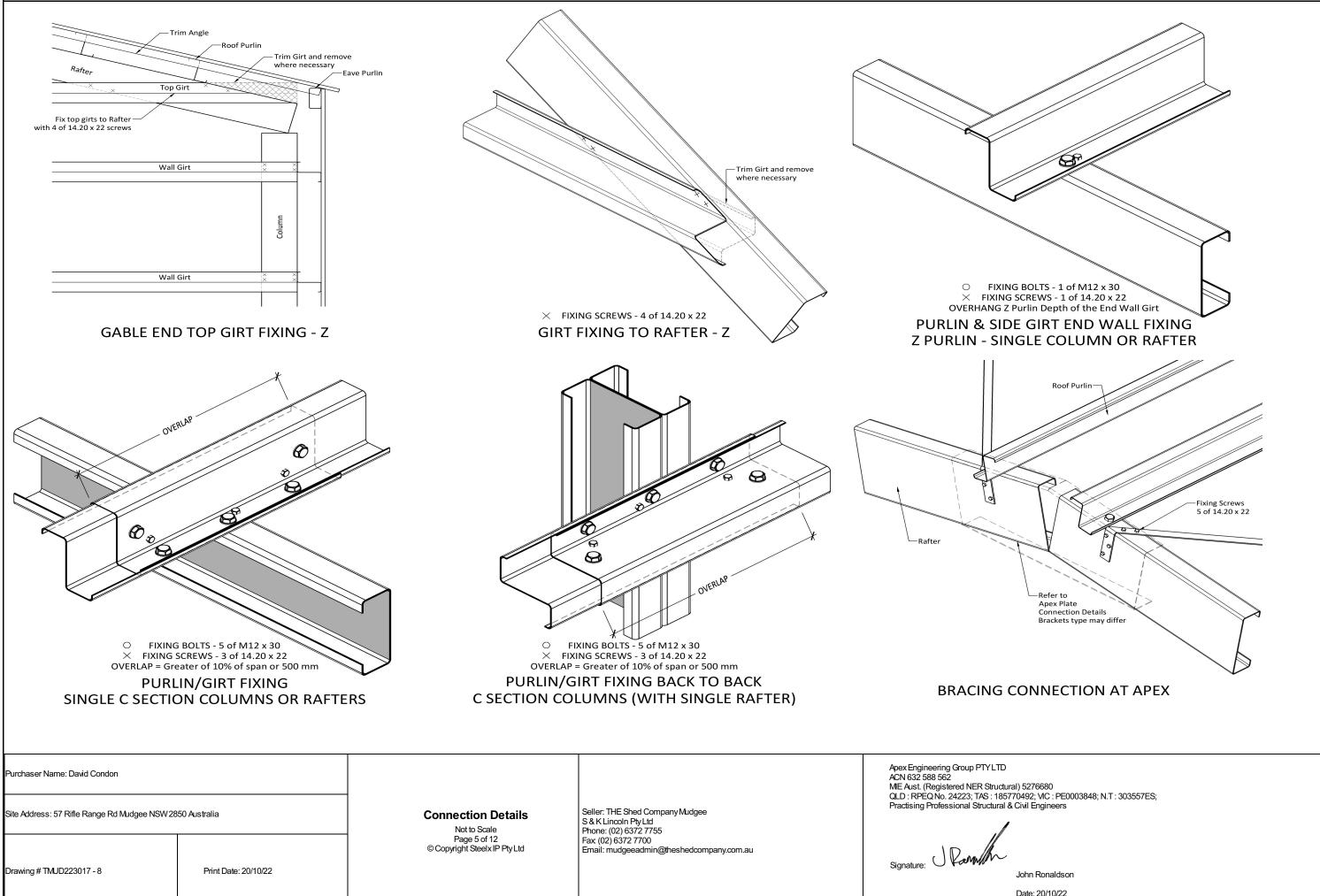
John Ronaldson

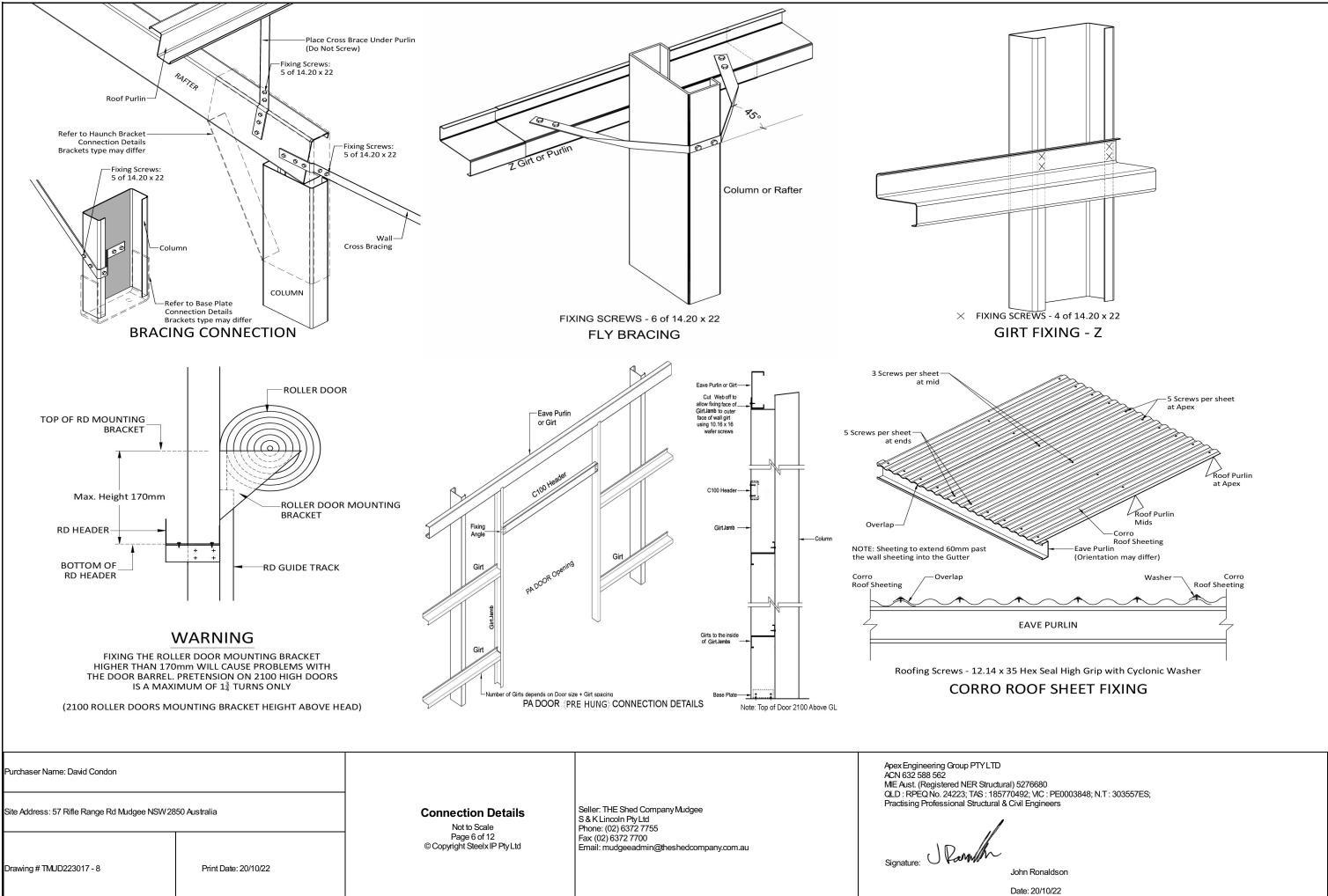


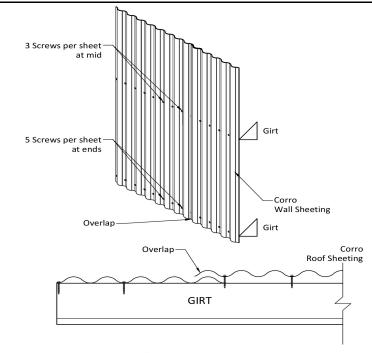




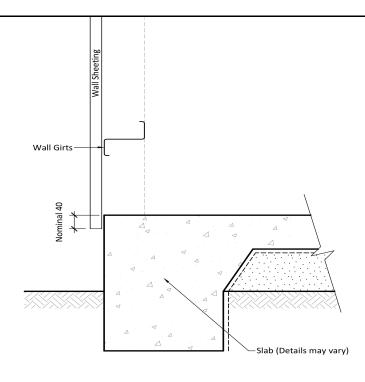








Wall Screws - 10.16 x 16 Hex
WALL SHEETING CONNECTION DETAILS



WALL SHEET OVERHANG DETAIL

Purchaser Name: David Condon

Site Address: 57 Rifle Range Rd Mudgee NSW 2850 Australia

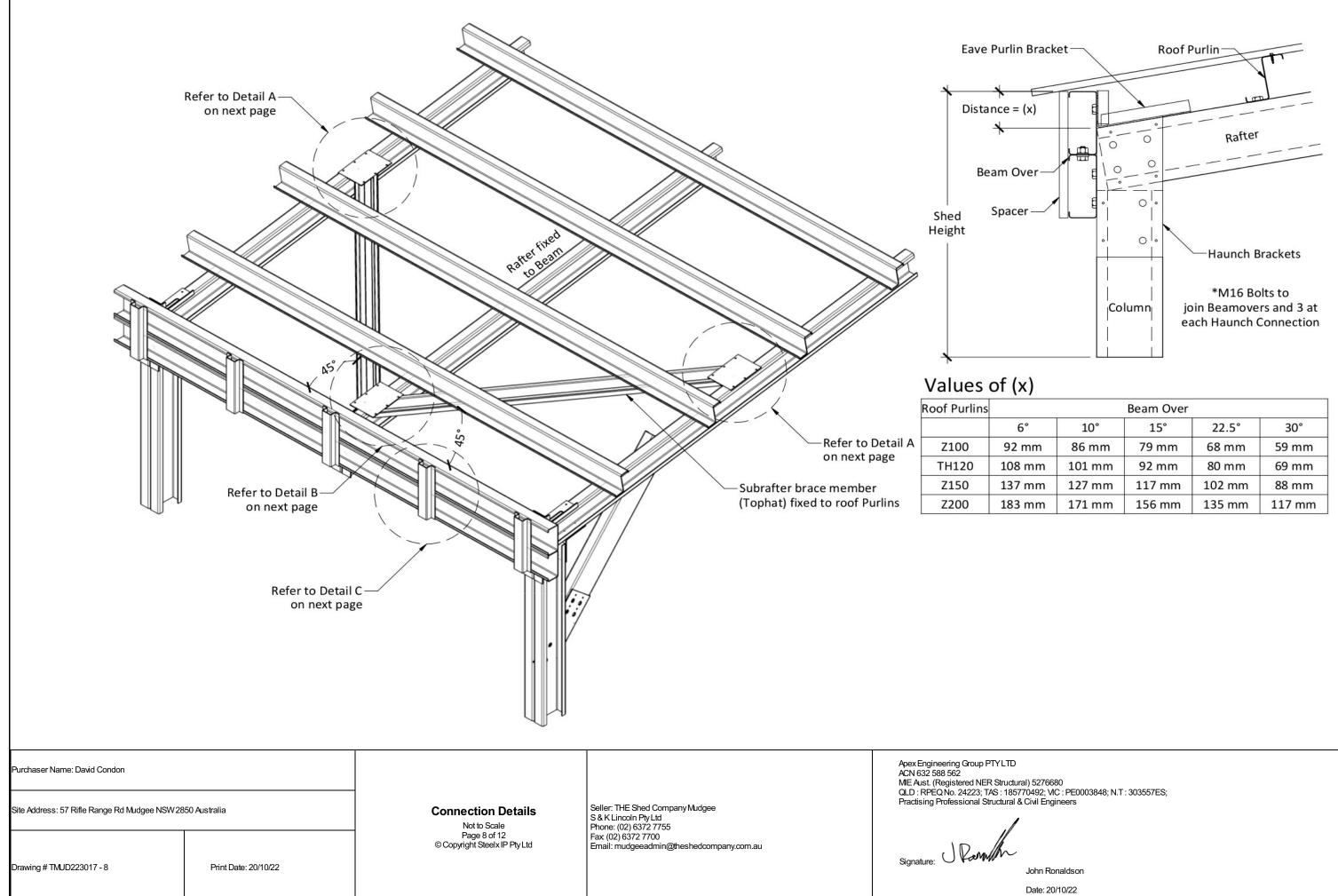
Connection Details Not to Scale Page 7 of 12 © Copyright Steelx IP PtyLtd Seller: THE Shed Company Mudgee S & K Lincoln Pty Ltd Phone: (02) 6372 7755 Fax (02) 6372 7700 Email: mudgeeadmin@theshedcompany.com.au Apex Engineering Group PTY LTD ACN 632 588 562 ME Aust. (Registered NER Structural) 5276680 QLD : RPEQ No. 24223; TAS : 185770492; VIC : PE0003848; N.T : 303557ES; Practising Professional Structural & Civil Engineers

Signature: Ramm

John Ronaldson Date: 20/10/22

Drawing # TMUD223017 - 8

Print Date: 20/10/22



	Beam Over									
10° 15° 22.5° 30°										
m	86 mm	79 mm	68 mm	59 mm						
m	101 mm	92 mm	80 mm	69 mm						
m	127 mm	117 mm	102 mm	88 mm						
m	171 mm	156 mm	135 mm	117 mm						

