

SKILLION ROOF PARK SHELTER

STEELWORK NOTES

- S1. ALL WORKMANSHIP AND MATERIAL SHALL BE IN ACCORDANCE WITH AS4100 & AS/NZS 1554.
- S2. ALL STEEL SHALL BE IN ACCORDANCE WITH AS1163 GRADE C350LO FOR RECTANGULAR AND SQUARE HOLLOW SECTIONS U.N.O
- S3. ALL BOLTS TO BE METRIC HEXAGONAL TO AS1252 U.N.O
ALL BOLTS TO BE M16 4.6/S TO AS/NZS 1252 U.N.O
ALL BOLTS TO BE HOT DIP GALVANISED TO AS 1214
- S4. ALL CLEATS AND GUSSETS SHALL BE 10mm PLATE TO AS/NZS 3678 GRADE 250 U.N.O
- S5. METAL ROOF CLADDING TO BE 0.42 BMT LYSAGHT CUSTOM ORB WITH A COLORBOND FINISH OR APPROVED EQUAL FIXED AS PER MANUFACTURER'S SPECIFICATIONS. COLORBOND COLOUR AS PER PROJECT SPECIFICATION. IN MARINE ENVIRONMENT, PROVIDE COLORBOND ULTRA FINISH OR APPROVED EQUAL.
- S6. ALL WELDS TO BE 6mm CONTINUOUS FILLET WELDS (CFW) STRUCTURAL PURPOSE (SP) WELDS U.N.O. ALL WELDS TO BE MADE USING E48XX OR W50X GRADE 1 (OR BETTER) ELECTRODES TO AS/NZS 1554. GRIND ALL CORNERS & WELDS SMOOTH.
- S7. BOLT DIAMETERS HAVE BEEN INCREASED IN POST AND BEAM CONNECTIONS TO ALLOW FOR LONGER TERM DURABILITY.
- S8. ALL STEELWORK TO BE HOT DIP GALVANISED IN ACCORDANCE WITH AS/NZS 2312 HDG600 SPECIFICATION. EXCEPT IN MARINE ENVIRONMENTAL ZONES. REFER TO NOTE 12. CORROSION PROTECTION COATING TO SURFACE PREPARATION OF SUBSTRATE MATERIAL IS CLASS 2½ TO AS 1627 AND PICKLED PRIOR GALVANISING. HOT DIPPED GALVANISED COATING SHALL BE IN ACCORDANCE WITH AS/NZS 4680.
- S9. ANY POST GALVANISING DAMAGE TO BE MADE GOOD WITH HIGH QUALITY TWO PACK EPOXY ZINC RICH PAINT CONFORMING TO AS/NZS 3750.9 WITH A MINIMUM DRY FILM THICKNESS OF 100 MICRONS. SURFACE PREPARATION TO BE ACCORDING TO PAINT MANUFACTURER'S RECOMMENDATIONS
- S10. THE ENDS OF ALL TUBULAR OR HOLLOW MEMBERS ARE TO BE SEALED WITH 5mm THICK PLATES AND CONTINUOUS FILLET WELDED U.N.O.
- S11. PROTECTIVE COATINGS TO BE APPLIED AFTER ALL FABRICATION COMPLETED. NO WELDING ETC TO BE CARRIED OUT DURING OR AFTER APPLICATION OF COATING SYSTEM.
- S12. THE PRINCIPAL CONTRACTOR SHALL CONFER WITH THE FABRICATOR AND GALVANISER TO ENSURE VENT HOLES ARE PROVIDED IN ACCORDANCE WITH AS/NZS 4680.
- S13. FOR MARINE ENVIRONMENTAL ZONES (WITHIN 1km OF THE SHORELINE), ALL STEEL MEMBERS, FASTENERS, INCLUDING BOLTS, NUTS, AND CLEATS SHALL BE STAINLESS STEEL. PLASTIC SEPARATORS SHALL BE PROVIDED TO AVOID CONTACT BETWEEN DISSIMILAR MATERIALS. STAINLESS STEEL GRADE 316 TO BE USED. BOLTS TO BE GRADE 316 (A4-CLASS 50). REFER TO STAINLESS STEEL NOTES.
- S14. CO-ORDINATE WITH LIGHTNING PROTECTION DETAILS - REFER TO BSD-10133.

MEMBER	DESCRIPTION	MINIMUM SIZE	GRADE	SPACING	COMMENTS
C1	POST	120x120 HWD	F17	AS SHOWN	2/M16 BOLTS PER CONNECTION
B1	BEAM No 1.	170x45 HWD	F17	AS SHOWN	2/M16 BOLTS PER CONNECTION
B2	BEAM No 2.	190x45 HWD	F17	AS SHOWN	2/M16 BOLTS PER CONNECTION
R1	RAFTER	190x45 HWD	F17	AS SHOWN	2/M16 BOLTS PER CONNECTION TO C1
S1	STRUT	90x90 HWD	F17	AS SHOWN	1/M10 BOLTS PER CONNECTION TO C1
P1	ROOF PURLIN	140x45 HWD	F17	900 END SPANS 1200 INTERNAL SPANS	CONNECTIONS TO EACH RAFTER VIA 125x75x6 UA ANGLE BRACKET-50mm LONG, WITH 2/M10 BOLTS THROUGH THE PURLIN & 1/M10 x 70 COACH SCREW INTO THE RAFTER
RB	ROOF BRACING TO TOP OF RAFTERS	2/30x1.0 GALV. IRON STRAPPING WITH TENSIONER OR 'PRYDA' 2-25x1.0 S.S. OR APPROVED EQUAL			5/3.15ø x 35mm NAILS AT EACH END FIXED TO SIDES OF RAFTERS AND 1 NAIL TO TOP OF EACH PURLIN
F1	PIER FOOTING FOR MAIN COL.	450ø x 750 DEEP	N32 CONC.	AS SHOWN	STIRRUP TO BE EMBEDDED AS SHOWN
F2	PIER FOOTING FOR BRACING PANEL	450ø x 600 DEEP	N32 CONC.	AS SHOWN	STIRRUP TO BE EMBEDDED AS SHOWN

STAINLESS STEEL:

- BEFORE FABRICATION SUBMIT COPIES OF SHOP DRAWINGS FOR REVIEW. REVIEW DOES NOT INCLUDE DIMENSION CHECKING.
- STAINLESS STEEL MATERIAL SHALL NOT BE STORED WITH CARBON STEEL.
- TOOLS USED FOR CARBON STEEL SHALL NOT BE USED TO FABRICATE OR ASSEMBLE STAINLESS STEEL COMPONENTS.
- THE STAINLESS STEEL SHALL BE WRAPPED OR OTHERWISE PROTECTED DURING TRANSPORT TO AVOID CONTAMINATION BY FERROUS PRODUCTS.
- WELDING SHALL BE IN ACCORDANCE WITH AS1554.6.
- LIMIT THE INPUT OF HEAT INTO THE WELD. THE WELD SHALL NOT BE PREHEATED, POST-HEATED OR STRESS RELIEVED.
- GRADE 316L ELECTRODES SHALL BE USED FOR 316L.
- WELDS SHALL BE CATEGORY 2B IN ACCORDANCE WITH AS1554.6.
- SURFACE FINISHES OF WELDS SHALL BE GRADE 1, POLISHED USING 320 GRIT OR FINER, SILICONE CARBIDE ABRASIVES WITH LUBRICATION. AFTER POLISHING, WELDS SHALL BE PASSIVATED USING NITRIC ACID IN ACCORDANCE WITH ASTM A380.
- ALL STAINLESS STEEL COMPONENTS SHALL HAVE A $R_a < 0.5\mu m$ AND PASSIVATED USING NITRIC ACID IN ACCORDANCE WITH ASTM A380.
- CHEMICAL ANCHORS AND BOLTS TO BE GRADE 316 STAINLESS STEEL A4-50 MINIMUM.

STRUCTURAL DESIGN CERTIFICATION

DESIGN Original signed by : L. Mendis RPEQ: 8950 - 2014.11.26	DESIGN CHECK Original signed by : D. Bateup RPEQ: 13095 - 2014.11.26	AUTHORISED FOR ISSUE Original signed by : B. Balakumar RPEQ: 3963 - 2014.11.27
---	--	--

BRISBANE CITY COUNCIL STANDARD DRAWING

SKILLION ROOF SHELTER-PARK
STRUCTURAL NOTES (PAGE 2 OF 2)
SHEET 2 OF 5

SCALE NOT TO SCALE
DWG NO. BSD-10132
ORIGINAL SIZE A3
REVISION C

ISSUE	AMENDMENT	DRAWN DATE	CHK'D DATE	APPR'D DATE	ASSOCIATED PLANS
C	Drawing Title Amended	FEB '16	JUL '16	JUL '16	
B	NOTE S14 ADDED - LIGHTNING PROTECTION	JUNE '15	JUNE '15	JUNE '15	
A	ORIGINAL ISSUE	SEPT '14	SEPT '14	SEPT '14	

DRAWING AUTHORISED FOR PUBLICATION I. CONDRIK AUTHORISED JUNE 2015				DESIGN	L.M.	DATE	Sept '14
ASSET ENGINEERING MANAGER STRATEGIC ASSET MANAGEMENT				DRAWN	G.B.	DATE	Sept '14
DESIGN APPROVED D. VAN DER WALLE APPROVED JUNE 2015				CHECKED	D.B.	DATE	Sept '14
SENIOR CO-ORDINATOR PARKS ASSET SERVICES BRANCH - FIELD SERVICES GROUP				DRAWING FILENAME	BSD-10132 (1) Skillion Roof Shelter - Park - Structural notes (Page 2 of 2) - Sheet 2 of 5.dwg		
				ASSOCIATED PLANS	BSD-10132 SHEETS 1, 3, 4 AND 5		

