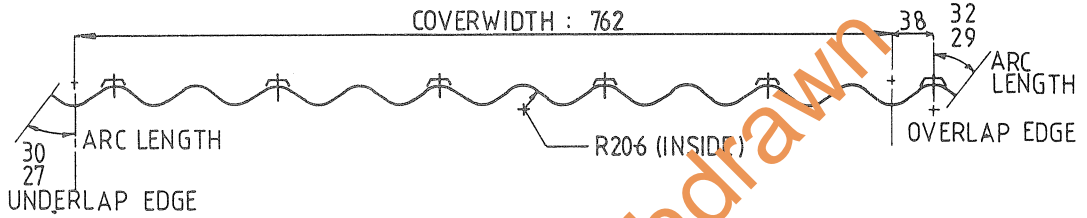


CUSTOM ORB FOR ROOFING & WALLING WITH CYCLONE WASHERS



MATERIAL SPECIFICATION: 0.53 mm TCT ZINCALUME STEEL TO AS 1397 - G550 - AZ150

TABLE 1 IS BASED ON CYCLIC TEST CRITERIA AS SPECIFIED IN N.B.T.C. TR 440. THE ALLOWABLE SPANS GIVEN IN TABLES 2 AND 3 HAVE BEEN OBTAINED BY LINEAR INTERPOLATION OF P_z IN TABLE 1, SUBJECT TO MAXIMUM SPAN LIMITATION GOVERNED BY CONCENTRATED LOAD CRITERIA. OVERHANGS TO BE 200 mm MAXIMUM FOR ROOFS AND 300 mm MAXIMUM FOR WALLS.

WIND LOADS ARE DETERMINED IN ACCORDANCE WITH AS 1170 PART 2 1983 "WIND FORCES LOADING CODE" FOR A REGIONAL BASIC WIND VELOCITY 55 M/S, CYCLONIC AREA MULTIPLIER OF 1.15 AND ASSUMING AN INTERNAL PRESSURE COEFFICIENT OF + 0.8 AND EXTERNAL PRESSURE COEFFICIENT OF - 0.9 (FOR ROOFS), OR - 0.6 (FOR WALLS). FOR TABLES 2 & 3 THE THREE SPANS FOR EACH TERRAIN CATEGORY ALLOW FOR LOCAL PRESSURE FACTOR K_1 AS PER PARAGRAPH B1.5 OF AS 1170 PART 2 - 1983. RACKING STRENGTH PROVIDED BY THE CLADDING HAS NOT BEEN TESTED AND SHOULD NOT BE ALLOWED FOR IN THE DESIGN OF THE STRUCTURE.

RECOMMENDED FASTENERS

Timber Supports

Strength Group *	Self-drilling wood screw with EDPM seal
Hardwood J1 - J3	Type 17 Hex Hd. No. 14-10x50 (Lysaght No. THS 1450)
Softwood J4	Type 17 Hex Hd. No. 14-10x65 (Lysaght No. THS 1465)

Steel Supports

Steel Thickness	Self-drilling & tapping screw with EDPM seal
Up to 2.5 mm	No. 14-10x42 Hex Hd. (Lysaght No. SHS 1442)
2.5 - 5.0 mm	No. 14-20x45 Hex Hd. (Lysaght No. SHS 1445)

When fixing over insulation blankets increase screw length to maintain fastener penetration in support.

TABLE 1: DESIGN WIND PRESSURE, P_z , kPa

SPAN mm	0.53 mm		
	SINGLE SPAN	END SPAN	INT. SPAN
900	8.8	6.6	8.3
1200	5.0	3.0	6.2
1500	2.5	1.5	3.6
1800	1.2	1.0	1.8
2100	-	0.6	1.3
2400	-	-	0.9
2700	-	-	0.6

TABLE 2: ROOF SHEETING MAXIMUM ALLOWABLE SPANS

TERRAIN CAT.	LOCAL PRESS. FACTOR K_1	P_z kPa	0.53 mm		
MULTI-PLIER			END SPAN mm	INT. SPAN mm	
CAT 1	1.0	4.33	1090	1410	
	1.03	1.5	5.48	990	1280
	2.0	6.62	900	1140	
CAT 2	1.0	3.61	1150	1500	
	.94	1.5	4.56	1070	1390
	2.0	5.51	990	1280	
CAT 2.5	1.0	2.61	1200	1600	
	.80	1.5	3.30	1170	1550
	2.0	3.99	1110	1450	
CAT 3	1.0	1.78	1200	1600	
	.66	1.5	2.25	1200	1600
	2.0	2.72	1200	1600	

TABLE 3: WALL SHEETING MAXIMUM ALLOWABLE SPANS

TERRAIN CAT.	P_z kPa	0.53 mm			
MULTI-PLIER		SINGLE SPAN mm	END SPAN mm	INT. SPAN mm	
CAT 1	3.57	1370	1150	1500	
	1.03	4.33	1280	1090	1410
	5.09	1190	1020	1320	
CAT 2	2.97	1440	1200	1600	
	.94	3.61	1360	1150	1500
	4.24	1290	1090	1420	
CAT 2.5	2.15	1500	1370	1740	
	.80	2.61	1480	1270	1660
	3.07	1430	1190	1580	
CAT 3	1.46	1500	1520	2000	
	.66	1.78	1500	1440	1810
	2.09	1500	1380	1750	

* For strength groups refer AS 1720 - 1975

Manufacturers Name: LYSAGHT BUILDING INDUSTRIES		FIXING OF 0.53 mm CUSTOM ORB WITH CYCLONE WASHERS IN THE DARWIN AREA BUILDING HEIGHT UP TO 6 m	
Address: Cnr. Coonawarra and Bombing Roads, Winnellie. N.T. Phone: (089) 84 3311		DESIGN DATA SHEET	
CERTIFIED: <i>[Signature]</i> M.I.E. Aust		NORTHERN TERRITORY CYCLONIC AREAS	DRAWING NO.
DATE: 19/2/88	APPROVED: <i>[Signature]</i> MIE 19/3/88	DATE: 20/4/88	M/101/ 3
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Engineering and Development
Lysaght Building Industries
A DIVISION OF JOHN LYSAGHT (AUSTRALIA) LIMITED (INCORPORATED IN NSW)

CYCLONIC FIXING DATA

CUSTOM ORB (0.53mm TCT) WITH CYCLONE WASHERS UP TO 6 m.



78390

WP NO: C05306W

REFERENCES

REVISIONS