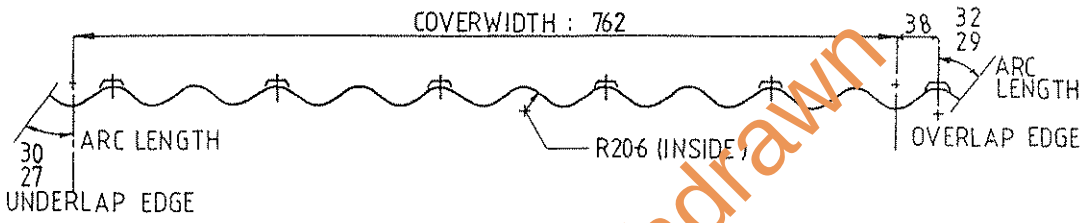
CUSTOM ORB FOR WALLING WITH CYCLONE WASHERS



MATERIAL SPECIFICATION: 0.47 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 SPANS FOR EACH TERRAIN CATEGORY ALLOW FOR LOCAL PRESSURE FACTOR K1 AS PER PARAGRAPH B1.2 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	0.47 mm SINGLE SPAN	END SPAN	INT. SPAN
600	12.0	6.0	7.5
900	5.3	4.0	5.0
1200	3.0	2.1	3.7
1500	1.0	1.1	2.4
1800	0.6	0.6	1.4
2100	-	-	0.9
2400	-	-	0.6

* For strength groups refer AS 1720 - 1975

TABLE 2: ROOF SHEETING MAXIMUM ALLOWABLE SPANS

TERRAIN CAT. MULTI-PLIER	LOCAL PRESS. FACTOR K1	P_z kPa	0.47 mm END SPAN mm	INT. SPAN mm
CAT 1 1.09	1.0	4.85	770	930
	1.5	6.13	580	760
	2.0	7.41	390	610
CAT 2 1.00	1.0	4.08	880	1110
	1.5	5.16	720	880
	2.0	6.24	560	750
CAT 2.5 .85	1.0	2.95	900	1200
	1.5	3.73	900	1190
	2.0	4.51	820	1010
CAT 3 .70	1.0	2.00	900	1200
	1.5	2.53	900	1200
	2.0	3.06	900	1200

TABLE 3: WALL SHEETING MAXIMUM ALLOWABLE SPANS

TERRAIN CAT. MULTI-PLIER	P_z kPa	0.47 mm SINGLE SPAN mm	END SPAN mm	INT. SPAN mm
CAT 1 1.09	3.99	1070	900	1130
	4.85	960	770	930
	5.70	880	640	810
CAT 2 1.00	3.36	1150	1000	1280
	4.08	1060	880	1110
	4.80	960	780	940
CAT 2.5 .85	2.43	1200	1150	1490
	2.95	1200	1060	1370
	3.47	1140	980	1250
CAT 3 .70	1.65	1200	1330	1720
	2.00	1200	1230	1620
	2.35	1200	1160	1510

Manufacturers Name:

LYSAGHT BUILDING INDUSTRIES

Address: Cnr. Coonawarra and Bombing Roads, Winnellie. N.T.
Phone: (089) 84 3311

CERTIFIED: M.I.E. Aust

DATE: 19/2/88

LYSAGHT DRAWING NO: 78386

FIXING OF 0.47 mm CUSTOM ORB WITH CYCLONE WASHERS IN THE DARWIN AREA BUILDING HEIGHT UP TO 10 m

DESIGN DATA SHEET

NORTHERN TERRITORY CYCLONIC AREAS

APPROVED: J.R. Sandover MIE Aust

DATE: 29/4/88

DRAWING NO. M/215/6

Sheet Steel Building Products Under Adverse Conditions

If it is intended to use uncoated, galvanised, prime coated or Colorbond building products within 1 kilometre of salt marine locations, or in severe industrial environments, please contact your nearest Lysaght Building Industries Sales Office for free specialised advice.

Performance

Company products will perform as specified if fixed in accordance with the recommendations contained in this drawing.

AUTH

DRAWN T.G.

DATE 22-2-88

SCALE N.T.S.

Engineering and Development

Lysaght Building Industries

A DIVISION OF JOHN LYSAGHT (AUSTRALIA) LIMITED (INCORPORATED IN NSW)

CYCLONIC FIXING DATA
CUSTOM ORB (0.47 mm TCT) WITH
CYCLONE WASHERS UP TO 10 m.

78386

WP NO: C0471OW

REFERENCES

REVISIONS