

# HARDITEX™ 7.5mm EXTERNAL WALL CLADDING

AS 4055	General Areas of Building			Within 1200mm of Building Edges		
Wind Load Classification	Stud Spacing (mm)	Fastener Spacing (mm)	ULS Capacity (kPa)	Stud Spacing (mm)	Fastener Spacing (mm)	ULS Capacity (kPa)
C2	450	200	2.14	450	150	2.90
C3	450	200	2.14	300	150	4.27
C4	450	150	2.90	300	125	5.77

### SPECIFICATION

#### HARDITEX™ SHEET

7.5mm nominal thickness. Range of widths & lengths available.

#### DESIGN

HARDITEX™ sheets shall be fastened to the steel frame in accordance with the stud and screw spacings tabulated above for the different wind conditions. The wind classifications are derived from AS 4055 of 1992 "Wind Loads For Housing" as in Table 1 below. Topographic classifications beyond T2 are likely to be uncommon in Darwin (refer to Clause 10 of AS 4055).

In selecting the wind classification, the designer should first determine whether the structure is in a topographic classification T1 or T2 (or other up to T5), the nature of shielding (FS = full shielding, PS = partial shielding, NS = no shielding) and the applicable rain category. The design wind speeds are given in Table 2.

The proven capacity of each system is given in Design Table and may be used by designers for intermediate wind speeds or buildings outside the scope of AS 4055. An Ultimate Limit State material capacity reduction factor of  $\phi = 0.8$  has already been applied.

#### WALL FRAME (STEEL)

Studs shall be rolled steel sections not exceeding 1.6mm in thickness. Maximum stud spacing shall be as in the Design Table.

#### FASTENERS & FINISHING (refer to "External Fixing Manual")

Sheets shall be coated in accordance with Hardie's "External Fixing Manual". HARDITEX™ self-embedding head drill point screws (or equivalent) shall be used when fastening to steel framing.

#### FASTENER SPACING

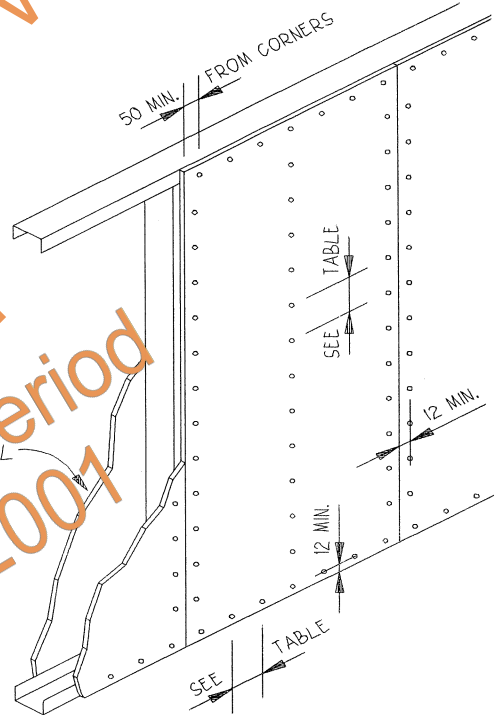
Generally 200mm centres along all edges and intermediate framing, unless indicated otherwise in the Design Table. Do not fix fasteners closer than 12mm from panel edges nor closer than 50mm from corners.

### DESIGN & CONSTRUCTION NOTES:

[1] It has been assumed that HARDITEX™ sheet is an external wall cladding only. Internal pressures shall be resisted by internal linings. The HARDITEX™ cladding is therefore only subjected to external pressure and suction loadings.

[2] All sheet edges and joints must be supported by framing.

[3] Stud and fastener spacing designs may be applied equally to timber framed construction using  $\varnothing 2.8$ mm fibre-cement (FC) nails.



Terrain Category	Topographic Classification					
	T1			T2		
	FS	PS	NS	FS	PS	NS
TC 2.5	C2	C2	C2	C2	C2	C3
TC 2	C2	C2	C2	C2	C3	C3
TC 1	C2	C2	C2	C2	C3	C3

Wind Classification in Region C	Serviceability Limit State (m/s)	Permissible Stress Method (m/s)	Ultimate Limit State (m/s)
C2	39	50	61
C3	47	60	74
C4	55	70	86



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Certified: \_\_\_\_\_  
Date: \_\_\_\_\_

F.I.E. AUST, C.P. Eng  
8th January 1996

**FIXING TO STEEL FRAMES  
HARDITEX™ 7.5 mm (nominal)  
EXTERNAL WALL CLADDING  
IN THE DARWIN AREA**

## DESIGN DATA SHEET

NORTHERN TERRITORY  
DEPT OF LANDS & HOUSING  
BUILDING AUTHORITY BRANCH

DWG NO.

Approved: \_\_\_\_\_

Date: 11/1/96

**M203/7**

Date

Approved for inclusion in DEEMED TO COMPLY by BUILDING ADVISORY COMMITTEE

12/1/96