PRODUCT DATA SHEET

STRAP BRACE

FEATURES AND BENEFITS

VERSATILE: Can be cut to match any size or application, meaning you can do more, with less.

FAST: Slim profile means studs don't need to be checked, saving time and cost. Nutsert tensioner can be used with a drill to speed up tensioning.

EASY: Unlike Speed or Angle Brace, can be partially fastened but not tensioned allowing for plumb adjustment of wall frames prior to tensioning

SPECIFICATIONS

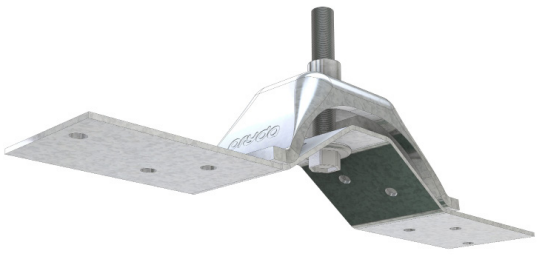
STEEL	G300
THICKNESS	0.8mm, 1.0mm or 1.2mm
CORROSION RESISTANCE	Z275 or G316L
FASTENERS	Pyrda Timber Connector Nails 35 x 3.15mm
LENGTHS	3.5 & 4.5m strips 15, 30 & 50m rolls

Versatile and cost-effective bracing product for roofs, ceilings, walls and floors.

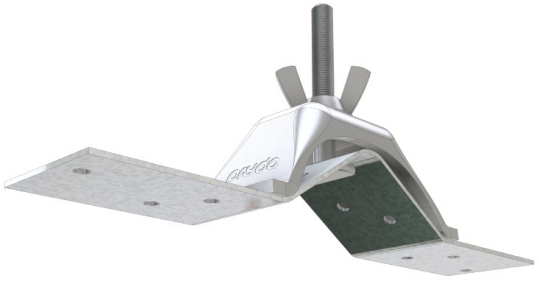
AS1684 & NCC COMPLIANT

- Minimum nett section of 15mm² for 0.8mm Strap Brace
- Minimum nett section of 21mm² for 1.0mm Strap Brace
- Minimum G300 Z275 galvanised steel

NUTSERT TENSIONER



WING NUT AND T-BOLT TENSIONER



STRAP BRACE

PRODUCTCODE	MATERIAL	SIZE	LENGTH	QUANTITY	WALLS	ROOFS	FLOORS	DESIGN TENSION CAPACITY (ΦNJ) KN
SB083/15	G300 Z275 Galvanised Steel	30 x 0.8mm	15m	1 Roll	Type A (1.5 kN/m) & Type B with 20% reduced capacity (2.4 kN/m)	Not Suitable	✓	5.2
SB083/30			30m	1 Roll			✓	5.2
SB083/50			50m	1 Roll			✓	5.2
SB083/3.5W-500			3.5m	500 Lengths			✓	5.2
SB083/4.0W-500			4.0m	500 Lengths			✓	5.2
SB102/SS	G316L Stainless Steel	25 x 0.9mm	15m	1 Roll			✓	5.8
SB103/30	G300 Z275 Galvanised Steel	30 x 1.0mm	30m	1 Roll	Type A (1.5 kN/m) & Type B (3.0 kN/m)	Not Suitable*	✓	6.8
SB103/50			50m				✓	6.8
SB123/30		32 x 1.2mm	30m			Refer to Pryda Truss Installation Guide	✓	9.4

For more details on Type A & B Bracing units, refer to Australian Standard AS1684

*Can be used for Truss Tie Downs. Refer to AS1684 for permitted use and fixing details.

TENSIONERS

PRODUCT CODE	MATERIAL	SIZE	LENGTH	QUANTITY
SBT	G300 Z275 Galvanised Steel	Wing Nut Driven by hand	5 packs of 6 Tensioners	30
SBT100			10 packs of 10 Tensioners	100
SBT30N		Nutsert Driven by socket	5 packs of 6 Tensioners	30
SBT100N			10 packs of 10 Tensioners	100
SBT/SS	S316L Stainless Steel	Wing Nut Driven by hand	1	1

PRYDA TIMBER CONNECTOR NAILS

PRODUCT CODE	MATERIAL	SIZE	LENGTH	QUANTITY
OSNGB	Galvanised Steel	35 x 3.15mm Flat Head	500g cardboard packs x 10	5kg
OSNG			1kg cardboard packs x 10	10kg
TPOSNG			5kg trade pack x 1	5kg
OSNBCI/SS	S316L Stainless Steel		500g clamshell pack x 1	500g

IMPORTANT:

READ THIS DATASHEET IN CONJUNCTION WITH BRACING DESIGN GUIDE AND REFER TO ESSENTIAL NOTES AND GENERAL NOTES.

INSTALLATION – AS1684 TYPE A BRACING UNIT

Strap Brace/Speedbrace Type A Unit (Racking Capacity = 1.5 kN/m)

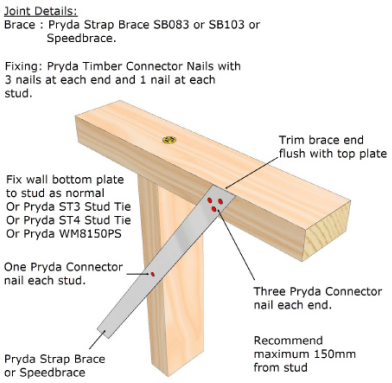
This bracing unit comprises one section of the wall, with cross-over braces of Pryda Strap Brace or Pryda Speedbrace as shown below. The minimum recommended Strap Brace size (SB083) fully complies with AS1684.2:2010 and AS1684.3:2010 specifications. Maximum wall height in AS1684 is 3.0 m (except at gable or skillion ends). Design capacity is 1.5 kN/m for wall heights up to 2.7 m and 1.35 kN/m for 3.0 m height.

WALL HEIGHT	BRACING CAPACITY (KN) FOR BRACING LENGTH (M)									
(m)	1.8	1.9	2.0	2.1	2.2	2.3	2.4	2.5	2.6	2.7
2.7	2.7	2.9	3.0	3.2	3.3	3.5	3.6	3.8	3.9	4.1
3.0	2.4	2.6	2.7	2.8	3.0	3.1	3.2	3.4	3.5	3.6

Note: For walls higher than 2.7 m, reduce the bracing unit's capacity in inverse proportion to the wall height, eg, for 3.6 m walls, take 2.7/3.6 = 0.75 times the capacity for 2.7 m height. Use galvanised Pryda Timber Connector Nails, code OSNG, size 35 x 3.15 mm.

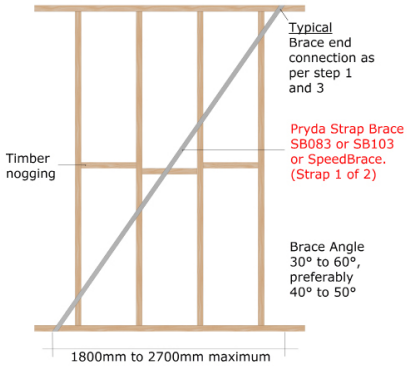
RACKING CAPACITY	
SB083 - 30 x 0.8mm Strap Brace	1.5 kN/m for wall heights up to 2.7m
	1.35 kN/m for wall heights up to a maximum of 3.0m

STEP 1



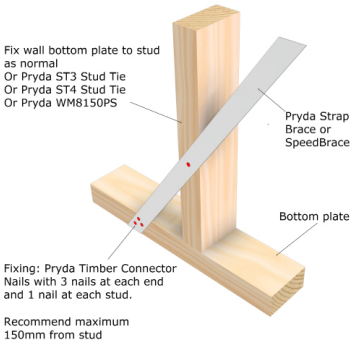
- Ensure wall panel is straight/plumb
- Fix Strap Brace to top plate as per detail above

STEP 2



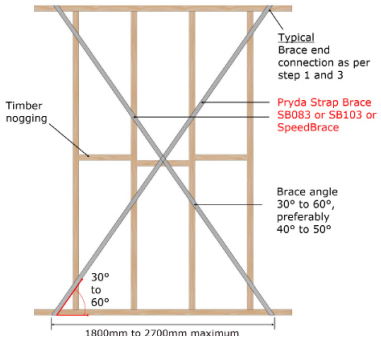
- Lay Strap Brace at approximately 45° (Maximum 60°, minimum 30°)
- Cut the Strap Brace to length

STEP 3



- Fix second end in same manner as the top plate

STEP 4



- Repeat steps 1-3 for the second length of strap, to form the cross brace
- Ensure the frames are fixed down to the underlying structure prior to tensioning the braces
- Fit 1 tensioner per strap, facing into frame so it won't get in the way of plasterboard. Tighten until taut.

INSTALLATION – AS1684 TYPE B BRACING UNIT

Type B Unit (Racking Capacity = 3.0 kN/m)

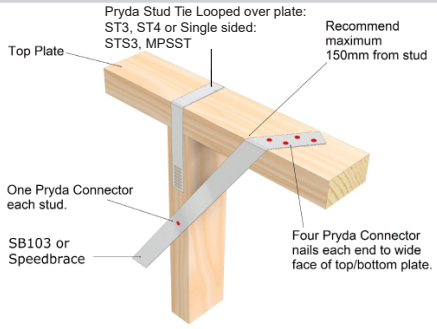
This Type B bracing unit uses Pryda Strap Brace (SB103) or Pryda Speedbrace, a steel brace thicker than the one used for Type A units. Note: Pryda Strap Brace (SB083) may also be used provided the below table values are reduced by 20%. Maximum wall height in AS1684 is 3.0 m (except at gable or skillion ends). Design capacity is 3.0 kN/m for wall heights up to 2.7 m and 2.7 kN/m for 3.0 m height

WALL HEIGHT	BRACING CAPACITY (KN) FOR BRACING LENGTH (M)									
(m)	1.8	1.9	2.0	2.1	2.2	2.3	2.4	2.5	2.6	2.7
2.7	5.4	5.7	6.0	6.3	6.6	6.9	7.2	7.5	7.8	8.1
3.0	4.9	5.1	5.4	5.7	5.9	6.2	6.5	6.8	7.0	7.3

Note: For walls higher than 2.7 m, reduce the bracing unit's capacity in inverse proportion to the wall height, eg, for 3.6 m walls, take 2.7/3.6 = 0.75 times the capacity for 2.7 m height. Use galvanised Pryda Timber Connector Nails (OSNG) size 35 x3.15 mm.

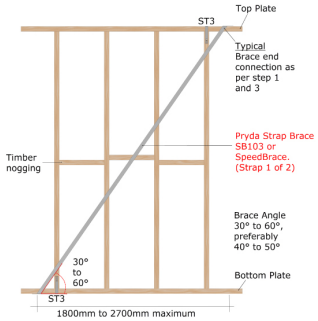
RACKING CAPACITY	
SB103 - 30 x 1.0mm Strap Brace	3.0 kN/m at up to 2.7m height
	2.7 kN/m up to a maximum of 3.0m high
Reduced Racking Capacity for SB083 30 x 0.8mm Strap Brace reduced by 20%	2.4 kN/m at up to 2.7m height
	2.1 kN/m up to a maximum of 3.0m high

STEP 1



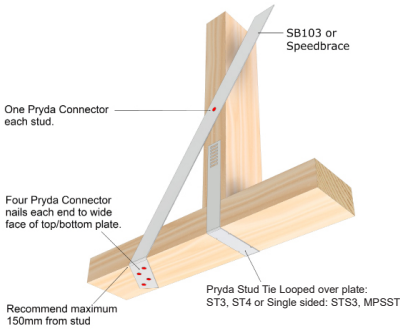
- Ensure wall panel is straight/plumb
- Fix Strap Brace to top plate as per detail above

STEP 2



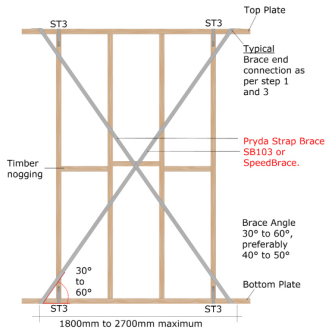
- Lay Strap Brace at approximately 45° (Maximum 60°, minimum 30°)
- Leaving enough length to wrap under the bottom plate, cut the Strap Brace to length

STEP 3



- Fix second end in same manner as the top plate

STEP 4



- Repeat steps 1-3 for the second length of strap, to form the cross brace
- Ensure the frames are fixed down to the underlying structure prior to tensioning the braces
- Fit 1 tensioner per strap, facing into frame so it won't get in the way of plasterboard. Tighten until taut.

FASTENING STRAP BRACE

BUILD WITH CONFIDENCE

WHERE POSSIBLE, HAND NAILING WITH PRYDA TIMBER CONNECTOR NAILS IS ALWAYS PREFERRED, WHY?

- Pryda Timber Connector Nails are forged in one piece, unlike clouts that are two pieces soldered together, meaning the head can pop off
- Pryda Nails are the correct diameter, ensuring a tight fit in prepunched holes = a stronger connection
- Design values and testing have all been conducted using Pryda Timber Connector Nails
- Hand hammered nails ensure correct nail positioning and drive depth (not driven to shallow or too deep)

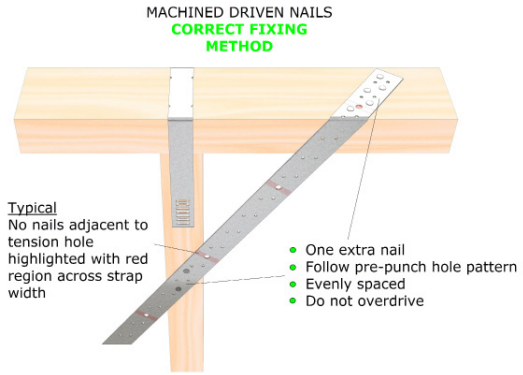
USING PASLODE MACHINE DRIVEN NAILS

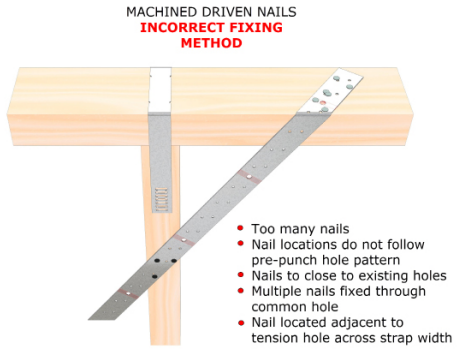
Where appropriate, Paslode Machine Driven Nails listed below may be used instead of the specified 35 x 3.15mm Pryda Timber Connector Nails to fix Pryda connectors provided that:

- There is one additional nail per connection than specified in the bracing details (eg. 2 instead of 1, 3 instead of 2, 5 instead of 4 etc.)
- Machine driven nails are driven at nail spacings and edge distances similar to the hole pattern, ensuring that these nails are not:
  - Driven into the holes
  - Located not closer than 5mm from the edge of a hole
  - Grouped together
  - Within 10mm from the edge

Screw hardened, electro galvanised Paslode nails that are appropriate include:

- Duo-Fast C SHEG 32 x 2.3 (D40810)
- Paslode 32 x 2.5mm (B25110)
- Duo-Fast 32 x 2.5mm (D41060)
- Pas Coil 32 x 2.5 SHEG 2 Pack (B25250)
- Impulse 32 x 2.5 SHEG (B40020)





EXTREME CARE MUST BE TAKEN WHEN USING MACHINE DRIVEN NAILS AS THE PREVAILING INSTALLATION PRACTICES TEND TO INHIBIT COMPLIANCE WITH THE ABOVE REQUIREMENTS.

STRAP BRACE TIPS

1. Larger holes are only for tensioners, do not use them for nails
2. Do not over tension Strap Bracing as this can both reduce the capacity of the unit and bring walls out of plumb
3. Ensure nails are at least 10mm away from timber end or edges to prevent splitting
4. Ensure Strap Brace is tensioned prior to nailing to studs/trusses
5. Keep wall bracing angles within 30° to 60° and roof angles between 30° to 45° or the brace will not be compliant
6. Fix Strap Brace to the Bottom Plate before standing wall
7. Avoid having the centre of the opposing brace located over a stud or a nog as this can cause a bump in the plasterboard