PRODUCT DATA SHEET

NZ TIM-CON BRACKET

CodeMark CMNZ-10030

Ideal fixing for concrete to timber beam connection

FEATURES AND BENEFITS

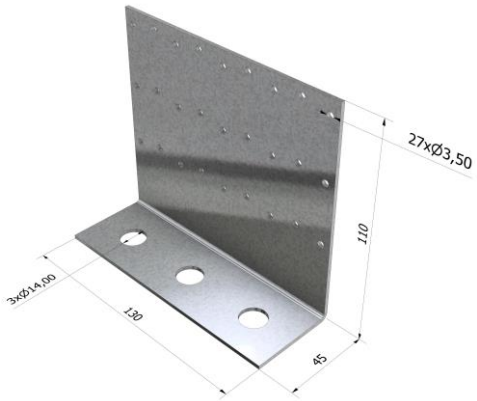
SIMPLE: A bracket that can be fixed with nails using common on-site tools.

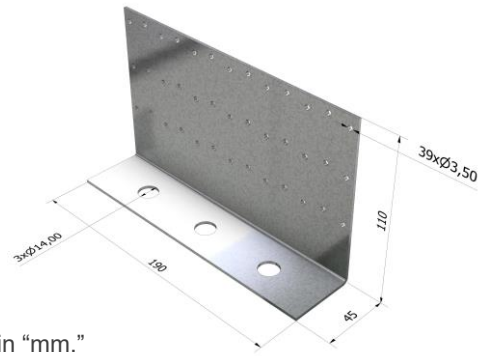
FAST: Fixed with Pryda 35 x 3.15mmTimber Connector Nails.

DURABLE: 2mm thick galvanised steel. Used in a 'vertical' orientation as an angle cleat for Wall-to-beam , Beam-to-beam connections.

SPECIFICATIONS

PRODUCT CODE	TCF130, TCF190
STEEL	G300
THICKNESS	2mm
CORROSION RESISTANCE	Z275
FASTENERS REQUIRED	Pryda 35 x 3.15mm Timber Connector Nails M12 Anchor
HEIGHT	110mm
WIDTH	130mm,190mm
DEPTH	45mm
QUANTITY	TCF130 20 pieces TCF190 10 pieces





At the time of print, this product is NOT subject to any known warnings and bans found in Building Act 2004.

*All dimensions shown are in "mm."

DURABILITY

The following table provides an easy guide when selecting a Pryda product corrosion protection finish that will meet and exceeds NZS 3604:2011 Table 4.1.

Pryda Tim-Con Bracket is only available in Z275, therefore suitable for “Closed” environment.

ZONE	LOCATION		Environment	Product
All Zones	Fully enclosed walls, floors, and roof spaces		Closed	Pryda Zinc Coated Products Z275
Zones B and C	All subfloor fastenings more than 600mm above the ground	Vented 7000mm^2/m^2 or LESS	Sheltered	Pryda Stainless Steel 304 Products (3)
		Vented MORE than 7000mm^2/m^2	Exposed	Pryda Stainless Steel 304 Products (3)
	All subfloor fastenings within 600mm of the ground	Sheltered and Exposed		Pryda Stainless Steel 304 Products (3)
	All other structural fixings	Sheltered		Pryda Stainless Steel 304 Products (3)
		Exposed		Pryda Stainless Steel 304 Products (3)
Zone D	All structural fixings	Sheltered and Exposed		Pryda Stainless Steel 304 Products (3)

Notes:
1.All Pryda galvanised products comply with NZS3604:2011 Table 4.2.
2.Refer to NZS3604:2011 for all environment definitions.
3.Routine inspection and cleaning using soap and fresh warm water is an integral part of the ongoing care and maintenance of stainless steel to preserve its appearance.

STORAGE AND HANDLING

Prior to use, the Pryda products shall be stored in a weatherproof environment and protected from moisture. Care must be taken to avoid any damage to the surface of the product protective galvanised coating and profile that may impact the performance.

COMPLIES WITH THE FOLLOWING PROVISIONS OF THE NEW ZEALAND BUILDING CODE (NZBC)

Clause B1 STRUCTURE: Performance B1.3.1, B1.3.2 and B1.3.4. Loads arising from self-weight, imposed gravity loads arising from use, earthquake, snow, and wind. (i.e., B1.3.3 (a), (b), (f), (g), and (h)). Only some may apply for a specific use of the component.

Clause B2 DURABILITY: Performance B2.3.1 (a) not less than 50 years and B2.3.2.

Clause F2 HAZARDOUS BUILDING MATERIALS: Performance F2.3.1.

DESIGN CAPACITIES AND SUPPORT ORIENTATION

VERTICAL CLEAT

Supported beam fixings:

Capacities are based on 27 Nails per TCF130 and 39 nails per TCF190.

LOADS (Limit State Design)	DESIGN CAPACITIES (ΦN_J) IN kN FOR SINGLE BRACKET USING PRYDA 35 X 3.15MM TIMBER CONNECTOR NAILS AND JOINT GROUP	
	TCF130	TCF190
	JD5	JD5
1.35G	17.6	16.1
1.2G + 1.5Qf	21.3	19.5
1.2G + 1.5Qr	23.7	21.7
1.2G + Wd or Wind uplift	35.1	32.2

Fixing to Supporting Concrete wall, each bracket :
Use 37 x 37 x 3mm washers with each M12 Bolt.

Connection shown using 2 x M12 bolts are only indicative only, refer to notes.

Fixing to Supported Beam each bracket:
TCF130 : 27 Nails
TCF190 : 39 Nails

IMPORTANT
Supported member must be supported at each end. No cantilever members.

NOTES:

1. The supported beam must be laterally tied to prevent rotation. Consult with the project Engineer for further details.
2. Specified capacities are for vertical load transfer only.
3. Minimum timber width 45mm. Install bracket to each face for double 45mm.
4. TCF brackets should NOT be assumed to contribute and must not be used towards stabilising concrete wall panels.
5. Connection point to supported member must be free from any defects such a knot, splits, shakes or any natural/seasoning defects that may impact the structural integrity of the connection.
6. Bracket, supporting and supported member must be installed vertically plumb.
7. Bracket and supported member must be perpendicular to supporting wall.
8. TCF brackets shall not be used to support cantilever members.
9. Bolt connection to concrete wall or beam shall exceed load capacities of selected TCF bracket and connection designed and approved by consulting project Engineer.
10. Minimum 2 bolts per each TCF bracket, adopting the very top hole and bottom hole to each bracket when using 2 bolted connections.

APPLICATION AND SCOPE OF USE

Pryda Tim-Con Brackets are certified when used and installed in accordance with the product datasheet shown connection details. Pryda fasteners approved for the installation form an integral part of the connection and therefore should be used with all Pryda products installation unless otherwise approved by a certified structural Engineer. Only use the product for its intended applications and the selected product material type within the specified environmental condition as outlined in NZS 3604:2011 Table 4.1. (Refer to Durability section for more details).

- Beam to Concrete wall.
- Beam to beam.

INSTALLATION OF TIM-CON BRACKET

NAILS: Pryda 35 x 3.15mm Timber Connector Nails. The brackets have 27 nail holes in the TCF130, and 39 nail holes in the TCF190.

BOLTS: Use 12mm diameter anchor bolts such as Reid SA12-75 Sleeve Anchor (in concrete) or HSB12/100 Reid Hexagon Screw Bolt (in filled blockwork) applied strictly in accordance with manufacturer's instructions and confirm capacities before using. Always use a 37 x 37 x 3mm washer with each bolt connection.

Alternatively, 12mm cast-in bolts or chemical anchors may be used – seek further advice from your consulting project Engineer. Because the bolt load is critical (rather than the nails or bracket), and bolt strength varies with different concrete grades, bolt spacing, embedment length and edge distance, IT IS THE RESPONSIBILITY OF THE SPECIFIER to check the adequacy of the bolts in each application.

STEP 1

- Measure and mark location of the supported member on to supporting wall.
- Ensure wall and bracket are vertically plumb.
- Ensure bracket is perpendicular to supporting wall.
- Use the selected TCF bracket as template to mark bolt holes.
- Ensure bolt holes locations conforms to bolt's manufacture literature and Engineering design for edge distance, embedment depth and pre-drilled hole size.
- Minimum of 2 bolts per bracket.

STEP 2

- Line up TCF to bolts holes and install 37 x 37 x 3mm washer to each bolted connection.
- Install selected M12 bolts and tighten to bolt's manufacturer recommendation.

STEP 3

- Install supported timber member firmly against TCF bracket and butting into wall with no more than 3mm gap.
- TCF shall be located centrally to timber depth.

STEP 4

- Install recommended number of nails using Pryda 35 x 3.15mm Timber Connector Nails.

Contact details	
Manufacture location	New Zealand
Legal and trading name of manufacturer	QC Engineering
Legal and trading name of supplier	Pryda New Zealand -a Division of ITW New Zealand
Supplier address for service	23-29 Poland Road, Wairau Valley, Auckland, 0627, New Zealand
Supplier website	Pryda.co.nz
Supplier email	info@prydaanz.com
Supplier phone number	0800 88 22 44
Supplier NZBN	9429039833129