

Stud Tie - Single Sided

GALVANISED

Application

The Bremick® Single Sided Stud Tie is a quick and easy method of connecting the wall frame top and bottom plates to the stud.

Advantages

The Bremick® Truss Ties provides numerous benefits including:

- **Superior tie-down strength:** The stud tie is driven into the side grain of the stud to resist wind uplift in lateral shear. This is far stronger than relying on the withdrawal strength of common nails in the end grain.
- **No splitting of the timber:** When installed correctly, the single sided stud tie is located away from the edges of the timber and therefore prevent the splitting of the timber members. If the timber splits it reduces the strength of the joint significantly. When hand or machine nailing this connection there is a potential for this to occur, particularly with skew nailing.
- **Quick and easy to install:** No need to rotate the frame during manufacture or to fasten to the underside of the frame.
- **Multiple applications:** Can be installed when constructing wall frames onsite or in a factory.
- Pre-punched nail to ease the locating of the Stud Tie into position.

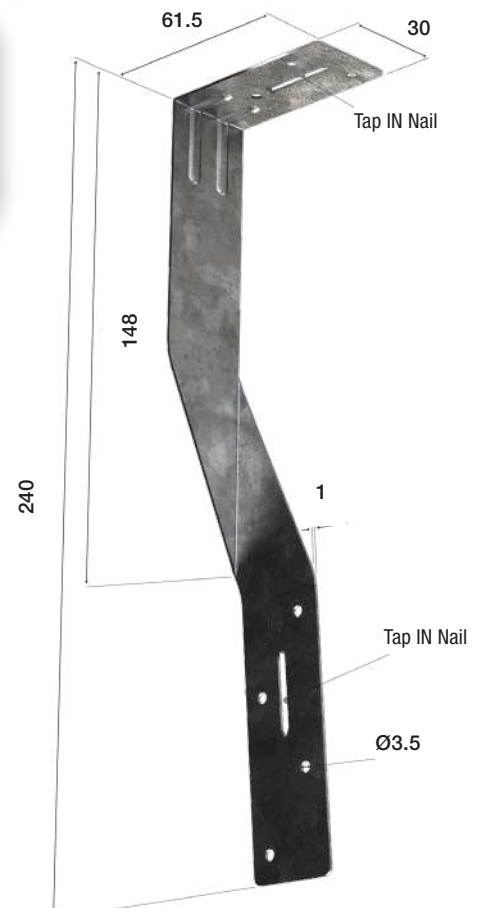
Specifications

Steel Grade	G300
Coating	Z275 – Galvanised
Thickness	1.0mm
Width	30mm
Length A	240mm
Length B	60mm
Fasteners	Bremick® 35 x 3.15mm Timber Connector Nails (Gal or SS316) 32 x 2.5mm Screw Shank Machine Fastened Nails



Bremick® Ranging

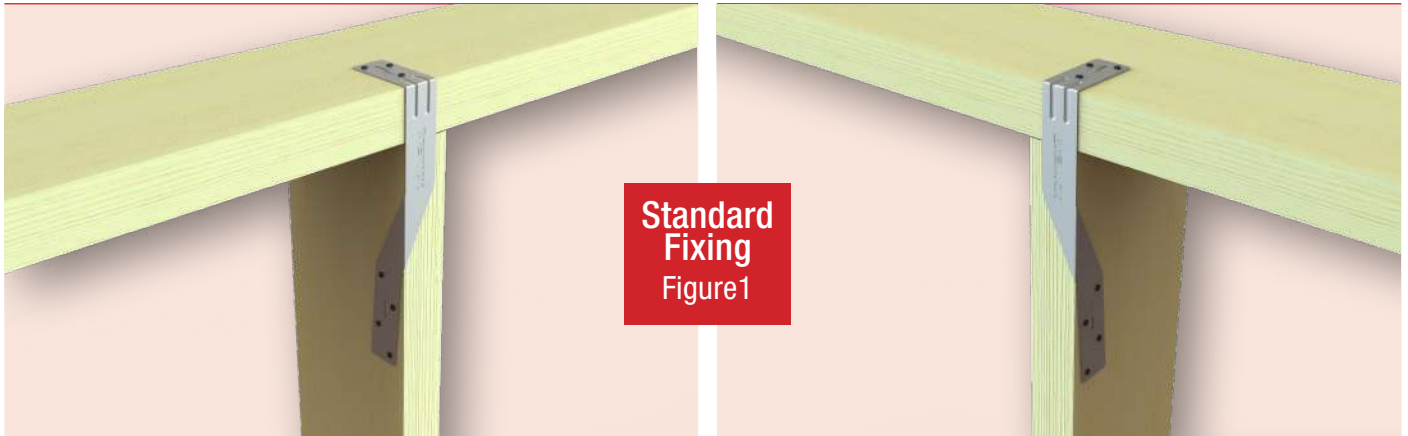
Product Code	Dimensions	Coating	Pack Qty
TSPLG24060104	240mm x 60mm x 30mm x 1.0mm – Left Hand	Z275 – Galvanised	50
TSPRG24060104	240mm x 60mm x 30mm x 1.0mm – Right Hand	Z275 – Galvanised	50
TSULG24060104	240mm x 60mm x 30mm x 1.0mm – Left Hand (Unpunched – For Machine Driven Nail Use)	Z275 – Galvanised	50
TSURG24060104	240mm x 60mm x 30mm x 1.0mm – Right Hand (Unpunched – For Machine Driven Nail Use)	Z275 – Galvanised	50



Installation Instructions

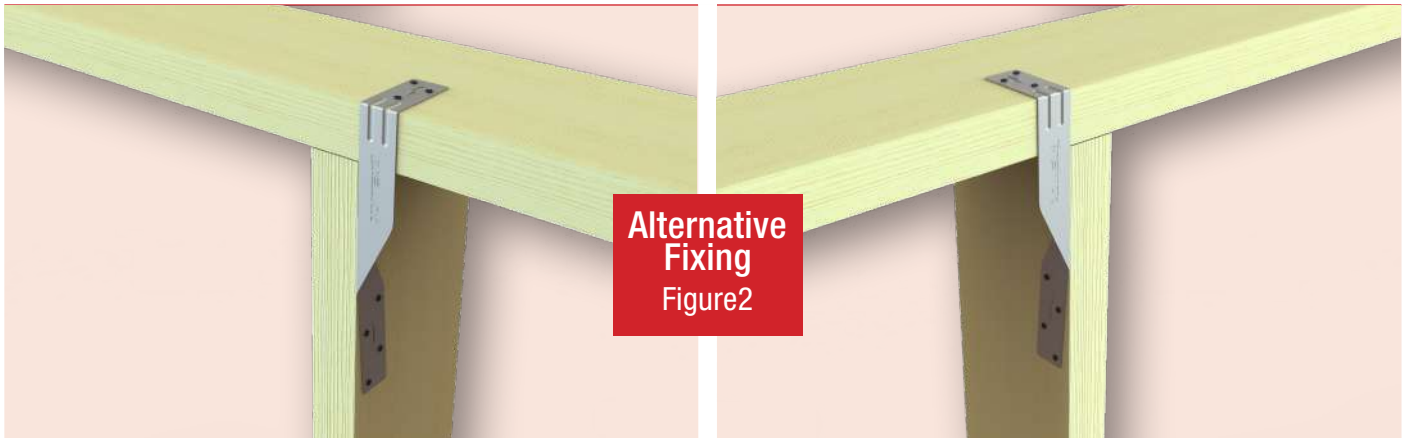
Stud Tie Single Sided Left Hand

Stud Tie Single Sided Right Hand



Stud Tie Single Sided Left Hand

Stud Tie Single Sided Right Hand



Installation Instructions



1

For wall bracing unit connections, the Bremick Single Sided Stud Ties must be fixed on the same side as the wall bracing strap.

2

For holding down the wall frame top plate against wind uplift forces from trusses or rafters, ensure that the Bremick Single Sided Stud Tie is fixed on the same side as the tie-down connector.

3

Apply the right-handed single sided stud tie for right-handed installation or left-handed single sided stud tie for left-handed installation.

4

Locate the single sided stud tie over the stud with the vertical bend in line with the stud corner (standard fixing, see figure 1) or offset to one side (alternate fixing, see figure 2).

5

Then, ensure the top angle of the stud tie sits on top of the wall plate.

6

Fasten 3 Bremick timber connector nails into the top angle, through the pre-punched holes and into the wall frame top or bottom plate. Then fasten 4 Bremick timber connector nails into the vertical length of the stud tie, through the pre-punched holes and into the stud. As per figures 1 and 2.

Notes

When fastening Bremick® Single Sided Stud Ties with machine fired nails, use the stud ties with unpunched holes. Fire the nails around the location of the dimples. Use 32 x 2.5mm galvanised, screw shank nails.

Technical Data

STUD TIE – SINGLE SIDED

TSPLG24060104 • TSPRG24060104 • TSULG24060104 • TSURG24060104

STUD TIE (SINGLE) LIMIT STATE WIND LOAD CAPACITY

Table 1 UPLIFT CAPACITY: 4 - 3.15mm DIAMETER x 35mm MIN NAILS EACH END

JOINT GROUP	Seasoned Timber Capacity (kN)					
	JD6	JD5	JD4	JD3	JD2	JD1
	1.2	1.6	2.0	2.3	2.3	2.3
JOINT GROUP	Unseasoned Timber Capacity (kN)					
	J6	J5	J4	J3	J2	J1
	0.8	1.1	1.4	2.0	2.3	2.3

REMARKS

- Values for Category 1 (secondary members.) Values x 0.94 for Category 2 (primary members) and Category 3 Values x 0.88 for post disaster structures primary members.
- Reduce the tabulated capacities by 20% if 4/3.15 machine driven nails are used to each connected member. Nails must be spaced as per minimum requirements of AS1720.1
- Loads applied at a limit state wind load, apply additional load factors when designing for other load combinations when using AS1170.1
- Multiply the values above by the number of unities per joint.
- Minimum nail length 35mm. Nails to be tight fit in holes.
- Connected members must be independently restrained against rolling.
- Steel capacity to be determined from testing and may govern results. Final capacity for each load case will be taken as the lesser of the timber connection capacity (provided in this document) or steel ultimate capacity (determined from testing) results.