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TNP Nail Plate	
TRSPT Stud Plate Tie	
WB Wall Brace	
WBT T Wall Brace	
TIET THAT DIGGO	

#### REFERENCE GUIDE

A Framing Anchor 8
AB Post Base
ABU Post Anchor
BC Deck Anchor
CS Coil Strap
FB Fence Bracket
H Hurricane Tie
HGUS Hanger
HHUS Hanger5
HSUL/HSUR Hanger 3
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PSCL Plywood Clip 13
RSP Stud Plate Tie7
RSPT Stud Plate Tie
STHD Strap Tie Holdown
SUL/SUR Hanger3
THA Hanger 3
TMAB Mudsill Anchor 10
TP Nail Plate
TWB T Wall Brace
U Hanger4
WB Wall Brace

#### **INSTALLATION NOTES**

- 1. Use proper safety equipment during connector installation.
- Dimensions are in inches and loads are in pounds unless specifically noted otherwise.
- Load values of 8d and 10d nails refer to common wire nails unless otherwise noted.
   Do not overdrive nails which can reduce allowable loads.
- The type and quantity of fasteners used to install TAMLYN Products are critical to connector performance. All specified fasteners shall be properly installed if deemed necessary by the engineer.
- 5. Wood members with which the connectors are used must be nominal dimension lumber or approved composite lumber. For wood members with fire retardant or preservative treated wood, refer to IBC section 2304.9.4, IRC section R319.3 and NDS section 2.3.4. Wood members with moisture content of 19% or more shall be designed with wet service factor as provided for in NDS
- Unless otherwise permitted, TAMLYN products shall not be bent or cut in the field to facilitate installation. Field alterations can weaken steel and cause premature connector failure at less than allowable loads.
- Fastener can cause wood to split and reduce load capacity. 2001 NDS section 11.1.5.3 allows predrilled holes not exceeding 75% of the nail diameter.
- 8 It is permissible to use nail guns to install specified nails through prepunched holes. Fill all specified holes. TAMLYN recommends the use of nail guns with hole locating mechanisms. Always follow nail gun manufacturer's safety guidelines.
- Always follow tool manufacturer's instructions for safety when installing all fasteners. Pneumatic or Powder actuated fasteners can deflect and injure the operator or others.
- Joists installed in hangers shall bear fully on the connector seat and shall fit against the header with a gap not exceeding 1/8".
- Multiple ply members shall be fastened securely to act as one unit. This is the responsibility of the Engineer or Architect of Record. Provide plywood fillers where required to prevent fastener bending.
- Top mount hangers shall be installed with the face of the hanger tight to the face of the header.
- Verify that the size of the supporting member can accommodate the connector's specified fasteners
- 14. Some hardened fasteners may fail prematurely if exposed to moisture. Use fasteners in dry interior conditions.
- 15. For all the connectors covered by ICC-ES report# ESR 1347, 10d x 1-1/2" nails can be substituted for 10d x 3" nails. Section 3.8.3 of the report allows the use of both 1-1/2" and 3" nails because the shear capacity of both the nails is the same.

IDENTIFICATION: "TAMLYN" stencil-stamped and/or labeled with permanent marker or labels on structural products identifies TAMLYN as the manufacturer of that product. Inspectors demand the following stencil-identification on all codelisted products: Manufacturer ID (e.g., TAMLYN)/product model ID (e.g., RT2A)/code group ID (e.g., ICC-ES)/compliance # (e.g., ESR-1347). If a company only imprints the company name and product ID, there is no assurance the product have been tested and manufactured in compliance with code regulations.

NOTE: The structural lumber connectors listed in this catalog are manufactured by TAMLYN, also lists additional structural lumber connectors which are manufactured by KC Metal Products, Inc. and Advanced Connector Systems

Structural Engineering Firm of record for **TAMLYN** Lenard Gabert and Associates, Inc.; L.M. Gabert, P.E.

#### **CODE EVALUATION**

Florida Statewide Product Approvals FL#8283 ICC-ES Evaluation Report No. ESR-1347 Texas Department of Insurance. TDI # FA-6

#### LIMITED WARRANTY

TAMLYN warrants defective-free products for a period of 10 years for the original purchaser. TAMLYN products are further warranted as to adequacy of design, provided products are properly specified and installed. This warranty does not apply in the event products are altered in any way or are improperly installed. Liability is limited to replacement of products proven to be defective. TAMLYN has made no other warranty, express or implied, regarding its products including but not limited to, any warranty regarding merchantability or fitness for a specific purpose. Any claim that a product is defective must be brought within 1 month of the date of installation of such products to the original purchaser. Customer hereby agrees that no other incidental or consequential damages are the responsibility of TAMLYN.

Responsibility remains with the architect or engineer, contractor and owner for the design, application and proper installation of each Tamlyn product. Specifier and user shall determine the suitability of products for specific application and assume all responsibilities in connection there within.

#### **CORROSION RESISTANCE**

**TAMLYN** offers the following coatings for products which require extra corrosion resistance. Deterioration will occur more quickly when hangers and straps are exposed to corrosive environments. Products are available in the standard hot dip galvanized G90 material. If you require additional protection, please contact **TAMLYN** for pricing and availability on these processes.

HOT DIP GALVANIZING: Many products are available with a hot dip galvanized coating after fabrication. The actual thickness will vary with the material thickness of the part. This process provides the needed extra protection for adverse weather conditions.

**STAINLESS STEEL:** The best protection from adverse conditions is found in the use of stainless steel for manufacture. Type 316 stainless steel is used. It is recommended that stainless steel fasteners be used in conjunction with these specially manufactured hardware items.

TRIPLE ZINC (G-185): 1.85 ounces of zinc per square foot of surface area meets the requirements of ASTM A 653. For minimum corrosion protection use Triple Zinc G-185 products.

#### **PLEASE NOTE**

**TAMLYN** reserves the right to change designs, specifications and product availability without notice or liability for such changes. Samples of our products are available upon request at no charge.



#### SINGLE JOIST HANGERS

**DESIGN FEATURES**: TAMLYN custom-die designed and manufactured for quick installation and maximum load value.

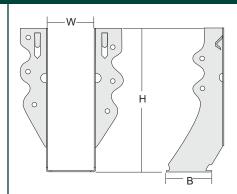
MATERIAL: 20ga. galvanized steel.

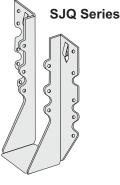
Available in G-185 Triple Zinc or Hot-Dip
Galvanized. Call for availability.

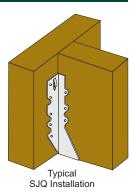
CODES: FL Approval #8283, ICC ESR-1347

#### NOTES:

- 1. Nails are 10d by 1-1/2 inch joist hanger nails.
- Allowable loads are for hangers nailed into wood or structural composite lumber having an effective specific gravity of 0.55 (such as Southern Pine) or greater.
- Allowable uplift loads have been adjusted by a load duration factor C<sub>0</sub>, of 1.6 (160%), corresponding to the typical duration of wind and earthquake loads.
- Allowable gravity (bearing) loads have been adjusted by load duration factors, C<sub>D</sub>, OF 1.0 (100%), 1.15 (115%), and 1.25 (125%), corresponding to the typical durations of occupancy live loads, snow loads and construction loads, respectively.
- 5. Tabulated loads are without 33% steel stress







		JOIST	DIN	DIMENSIONS			NAIL		WABLE LC	ADS - SYP	P <sup>2</sup> (LBS)
ITEM ID I	REF.		(INCHES)			SCHEDULE <sup>1</sup>		Uplift <sup>3</sup>	Gravity⁴	Gravity⁴	Gravity⁴
		SIZE	Н	W	В	Joist	Header	160%	100%	115%	125%
SJQ24	LU24	2x4	3-1/8	1-5/8	1-1/2	2	4	394	492	566	615
SJQ26	LU26	2x6, 8	4-3/4	1-5/8	1-1/2	4	6	787	738	849	923
SJQ28	LU28	2x8, 10	7	1-5/8	1-1/2	6	8	1181	984	1132	1230
SJQ210	LU210	2x10,12,14	7-7/8	1-5/8	1-1/2	6	10	1181	1230	1415	1538

#### STANDARD SKEWED HANGERS

**DESIGN FEATURES**: Standard skewed hangers are offered to promote further standardization and construction economies.

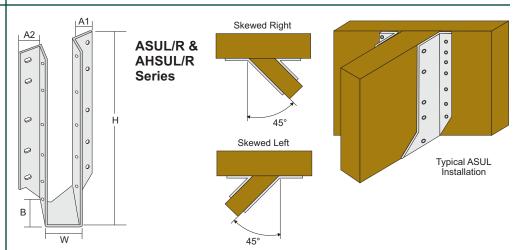
MATERIAL: 16ga. galvanized steel

**LOADS**: Larger seat-bearing and designed direct nailing provide proper installation of all nails into joist hangers.

CODES: ICC ER-5271

#### **NOTES**

- Allowable loads are for hangers nailed into wood or structural composite lumber having an effective specific gravity of 0.55 (such as Southern Pine) or greater.
- Allowable uplift loads have been adjusted by a load duration factor C<sub>o</sub>, of 1.6 (160%), corresponding to the typical duration of wind and earthquake loads.
- and satingate total and a standard stan
- 4. Tabulated loads are without 33% steel stress increase.



			DIMENSIONS						NAIL	ALLOWABLE LOADS			
ITEM ID	REF.	JOIST			(IN	CHES	)	sc	HEDULE	Uplift <sup>1</sup>	D	ownloa	ad
			w	Н	В	A1	A2	Header	Joist	C <sub>D</sub> =1.6	C <sub>D</sub> =1.0	C <sub>0</sub> =1.15	C <sub>D</sub> =1.25
ASUL/R24	SUL/R24	2x4	1-9/16	3-1/8	1-5/16	1-1/8	1-7/16	4-16d	4-10dx1-1/2	465	575	655	705
ASUL/R26	SUL/R26	2x6,10	1-9/16	5	1-5/16	1-1/8	1-7/16	6-16d	6-10dx1-1/2	805	865	980	1055
ASUL/R210	SUL/R210	2x10,14	1-9/16	8-1/8	1-5/16	1-1/8	1-7/16	10-16d	10-10dx1-1/2	1435	1440	1635	1760
ASUL/R214	SUL/R214	2x14,16	1-9/16	10	1-5/16	1-1/8	1-7/16	12-16d	12-10dx1-1/2	1655	1730	1960	2115
ASUL/R26-2	SUL/R26-2	(2)2x6	3-1/8	4-15/16	2-5/8	1-1/4	2-1/8	8-16d	4-10dx1-1/2	860	1150	1305	1405
ASUL/R210-2	SUL/R210-2	(2)2x10	3-1/8	8-5/8	2-5/8	1-1/4	2-1/8	14-16d	6-16dx2-1/2	1325	2015	2285	2465
ASUL/R214-2	SUL/R214-2	(2)2x14	3-1/8	12-5/8	2-5/8	1-1/4	2-1/8	18-16d	8-16dx2-1/2	1765	2590	2765	2765
ASUL/R46	SUL/R46	4x6	3-9/16	4-15/16	2-5/8	1-1/4	2-1/8	8-16d	4-10dx1-1/2	860	1150	1305	1405
ASUL/R410	SUL/R410	4x10	3-9/16	8-5/8	2-5/8	1-1/4	2-1/8	14-16d	6-16dx2-1/2	1325	2015	2285	2465
ASUL/R414	SUL/R414	4x14	3-9/16	12-5/8	2-5/8	1-1/4	2-1/8	18-16d	8-16dx2-1/2	1765	2590	2765	2765
AHSUL/R26-2	HSUL/R26-2	(2)2x6	3-1/8	4-15/16	2-5/8	1-1/4	2-1/8	12-16d	4-16dx2-1/2	860	1785	2015	2030
AHSUL/R210-2	HSUL/R210-2	(2)2x10	3-1/8	8-5/8	2-5/8	1-1/4	2-1/8	20-16d	6-16dx2-1/2	1345	2975	3360	3610
AHSUL/R214-2	HSUL/R214-2	(2)2x14	3-1/8	12-5/8	2-5/8	1-1/4	2-1/8	26-16d	8-16dx2-1/2	1795	3870	4365	4675
AHSUL/R46	HSUL/R46	4x6	3-9/16	4-15/16	2-5/8	1-1/4	2-1/8	12-16d	4-16d	860	1785	2015	2030
AHSUL/R410	HSUL/R410	4x10	3-9/16	8-5/8	2-5/8	1-1/4	2-1/8	20-16d	6-16d	1345	2975	3360	3610
AHSUL/R414	HSUL/R414	4x14	3-9/16	12-5/8	2-5/8	1-1/4	2-1/8	26-16d	8-16d	1795	3870	4365	4675



#### TRUSS PLATED HANGERS

**DESIGN FEATURES**: Provide proper balance between load-carrying capacity of hanger and the truss it supports.

MATERIAL: 18ga. galvanized steel. Available in G-185 Triple Zinc or Hot-Dip Galvanized. Call for availability.

**LOADS**: Seat dimension (see table) provides solid larger seat-bearing area. New higher loads possible with only common nails.

CODES: ICC ER-5271

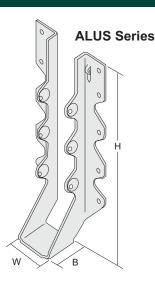
#### NOTES:

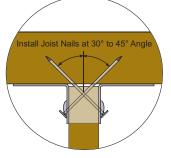
Joist nails must be driven at a 45 to 50 degree angle through the joist into the header/beam (double shear nailing) to achieve the tabulated

#### NOTES:

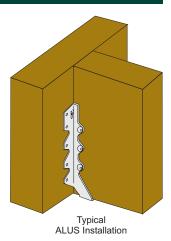
- 1. Allowable loads are for hangers nailed into wood or structural composite lumber having an effective specific gravity of 0.55 (such as Southern Pine) or greater.

  2. Allowable uplift loads have been adjusted by a
- load duration factor C<sub>D</sub>, of 1.6 (160%), corresponding to the typical duration of wind and earthquake loads.
- Allowable gravity (bearing) loads have been adjusted by load duration factors, C<sub>D</sub>, OF 1.0 (100%), 1.15 (115%), and 1.25 (125%), corresponding to the typical durations of occupancy live loads, snow loads and construction loads, respectively.
- 4. Tabulated loads are without 33% steel stress increase.





Specified joist nails must be installed at a 30° to 45° angle through the joist and into the header member as shown above to achieve allowable table loads.



**ALLOWABLE LOADS (LBS)** 

			D	DIMENSIONS   NAIL							
ITEM ID	REF. JOIST (INCHES) SCHEDUL		DULE	Uplift <sup>1</sup>	Download						
		SIZE	H	W	В	Joist	Header	C <sub>D</sub> =1.6	C <sub>D</sub> =1.0	C <sub>D</sub> =1.15	C <sub>D</sub> =1.25
ALUS24	LUS24	2x4	3-11/32	1-9/16	1-1/2	2-10d	4-10d	620	710	810	875
ALUS26	LUS26	2x6	4-29/32	1-9/16	1-1/2	4-10d	6-10d	1145	1180	1350	1460
ALUS28	LUS28	2x8	6-15/32	1-9/16	1-1/2	6-10d	8-10d	1830	1655	1765	1765
ALUS210	LUS210	2x10	7-17/32	1-9/16	1-1/2	6-10d	10-10d	1830	1815	1815	1815

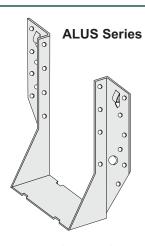
#### DOUBLE, TRIPLE, QUAD

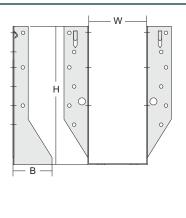
**DESIGN FEATURES**: TAMLYN custom-die designed and manufactured for quick installation and maximum load value.

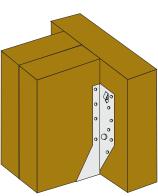
MATERIAL: 18ga. galvanized steel. Available in G-185 Triple Zinc or Hot-Dip Galvanized. Call for availability.

CODES: FL Approval #8283, ICC ESR-1347, ICC ER-5271

- 1. Allowable loads are for hangers nailed into wood or structural composite lumber having an effective specific gravity of 0.55 (such as Southern Pine) or greater.
- 2. Allowable uplift loads have been adjusted by a load duration factor C<sub>D</sub>, of 1.6 (160%), corresponding to the typical duration of wind and earthquake loads.
- 3. Allowable gravity (bearing) loads have been adjusted by load duration factors,  $C_{\scriptscriptstyle D}$ , OF 1.0 (100%), 1.15 (115%), and 1.25 (125%), corresponding to the typical durations of occupancy live loads, snow loads and construction loads, respectively.
- 4. Tabulated loads are without 33% steel stress







Typical ALUS Installation

			DIMENSIONS			N/	AIL.	ALLOWABLE LOADS <sup>1</sup> (LBS)			
ITEM ID	REF.	JOIST		NCHES)		SCHE	Uplift <sup>2</sup>	Download			
		SIZE	W	Н	H B Header		Joist	C <sub>D</sub> =1.6	C <sub>D</sub> =1.0	C <sub>D</sub> =1.15	C <sub>D</sub> =1.25
ALUS26-2	LUS26-2	(2)2x6	3-1/8	5-1/2	2	8-10dx1-1/2	4-10dx1-1/2	794	992	1100	1100
ALUS26-3	LUS26-3	(3)2x6	4-5/8	4-3/4	1-3/4	6-16d	6-16d	1190	1410	2220	1745
ALUS28-2	LUS28-2	(2)2x8	3-1/8	7-1/4	2	12-10dx1-1/2	6-10dx1-1/2	1190	1488	1711	1860
ALUS28-3	LUS28-3	(3)2x8	4-5/8	7-3/16	2	6-16d	6-16d	1190	1410	1610	1745
ALUS210-2	LUS210-2	(2)2x10	3-1/8	8-1/2	2	14-10dx1-1/2	8-10dx1-1/2	1587	1736	1996	2170
ALUS210-3	LUS210-3	(3)2x10	4-1/2	7-3/4	2	14-10dx1-1/2	8-10dx1-1/2	1587	1736	1996	2000
ALUS46	LUS46	4x6	3-9/16	3-9/32	1-3/4	6-16d	4-16d	1190	1410	1610	1745
ALUS48	LUS48	4x8	3-1/2	7	2	12-10dx1-1/2	6-10dx1-1/2	1190	1488	1711	1860
ALUS410	LUS410	4x10	3-1/2	8-3/8	2	14-10dx1-1/2	8-10dx1-1/2	1587	1736	1996	2170
ALUS414	LUS414	4x14	3-9/16	10-11/16	2	10-16d	10-16d	2965	2255	2575	2790
AU410	U410	(4)2x10	6	10	3-1/2	6-10dx1-1/2	4-10dx1-1/2	794	744	856	930



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**AHGUS Series** 

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#### **DOUBLE SHEAR JOIST HANGERS**

 $\underline{\textbf{DESIGN FEATURES}}$  : The hangers in this series have the double shear slanted joist nailing feature which provides higher uplift and down loads than conventional straight joist nailing hangers. All nails for the header and joist are the same for each hanger making installation faster and simpler.

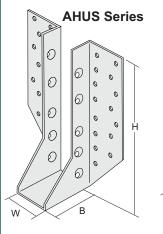
MATERIAL: AHUS & AHHUS 14ga. galvanized steel, AHGUS 11ga. galvanized steel. AHUS26, AHUS28 & AHUS210 16ga. galvanized steel. Available in G-185 Triple Zinc or Hot-Dip Galvanized. Call for availability.

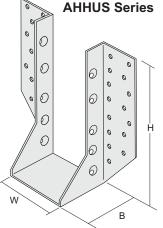
CODES: ICC ER-5271

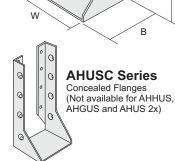
#### NOTES:

- 1. Allowable loads are for hangers nailed into wood or structural composite lumber having an effective specific gravity of 0.55 (such as
- Southern Pine) or greater.

  2. Allowable uplift loads have been adjusted by a load duration factor C<sub>D</sub>, of 1.6 (160%), corresponding to the typical duration of wind and earthquake loads.
- Allowable gravity (bearing) loads have been adjusted by load duration factors, C<sub>D</sub>, OF 1.0 (100%), 1.15 (115%), and 1.25 (125%), corresponding to the typical durations of occupancy live loads, snow loads and construction loads, respectively.
- 4. Tabulated loads are without 33% steel stress increase.







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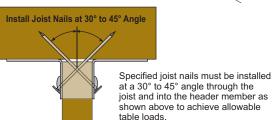
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		DI	MENSIO	NS		AIL	ALLOWABLE LOADS <sup>1</sup> (LBS)				
ITEM ID	REF.		(INCHES	5)	SCHE	DULE	Uplift <sup>2</sup>	ı	Downloa	d	
		W	Н	В	Header	Joist	C <sub>D</sub> =1.6	C <sub>D</sub> =1.0	C <sub>D</sub> =1.15	C <sub>D</sub> =1.25	
AHUS26	HUS26	1-9/16	5-3/16	3	14-16d	6-16d	1785	3150	3260	3260	
AHUS28	HUS28	1-9/16	7-1/8	3	22-16d	8-16d	2115	3685	3685	3685	
AHUS210	HUS210	1-9/16	9-1/8	3	30-16d	10-16d	3025	3685	3685	3685	
AHUS46	HUS46	3-9/16	4-31/32	2	4-16d	4-16d	1600	1685	1685	1685	
AHUS48	HUS48	3-9/16	6-31/32	2	6-16d	6-16d	1600	2585	2775	2775	
AHUS410	HUS410	3-9/16	8-31/32	2	8-16d	8-16d	3190	3445	3935	4005	
AHUS412	HUS412	3-9/16	10-15/32	2	10-16d	10-16d	4155	4005	4005	4005	
AHUS26-2	HUS26-2	3-1/8	5-3/16	2	4-16d	4-16d	1600	1685	1685	1685	
AHUS28-2	HUS28-2	3-1/8	7-3/16	2	6-16d	6-16d	1600	2585	2775	2775	
AHUS210-2	HUS210-2	3-1/8	9-3/16	2	8-16d	8-16d	3190	3445	3935	4005	
AHUS212-2	HUS212-2	3-1/8	10-11/16	2	10-16d	10-16d	4155	4005	4005	4005	
AHHUS26-2	HHUS26-2	3-5/16	5-3/16	3-1/4	14-16d	6-16d	2300	3335	3335	3335	
AHHUS28-2	HHUS28-2	3-5/16	7	3-1/4	22-16d	8-16d	2300	4990	4990	4990	
AHHUS210-2	HHUS210-2	3-5/16	9	3-1/4	30-16d	10-16d	3780	5490	5490	5490	
AHHUS46	HHUS46	3-5/8	5-3/16	3-1/4	14-16d	6-16d	2300	3335	3335	3335	
AHHUS48	HHUS48	3-5/8	7	3-1/4	22-16d	8-16d	2300	4990	4990	4990	
AHHUS410	HHUS410	3-5/8	9	3-1/4	30-16d	10-16d	3780	5490	5490	5490	
AHGUS46	HGUS46	3-5/8	5	4	20-16d	8-16d	2300	4870	4870	4870	
AHGUS48	HGUS48	3-5/8	7	4	34-16d	12-16d	3265	8230	8230	8230	
AHGUS410	HGUS410	3-5/8	9	4	44-16d	14-16d	5480	10015	10015	10015	
AHGUS412	HGUS412	3-5/8	11	4	54-16d	18-16d	5480	10295	10295	10295	
AHGUS414	HGUS414	3-5/8	13	4	64-16d	18-16d	5480	10295	10295	10295	
AHGUS5.5/10	HGUS5.5/10	5-1/2	9	4	44-16d	14-16d	5480	10015	10015	10015	
AHGUS5.5/12	HGUS5.5/12	5-1/2	11	4	54-16d	18-16d	5480	11455	11455	11455	
AHGUS5.5/14	HGUS5.5/14	5-1/2	13	4	64-16d	18-16d	5480	11455	11455	11455	
AHGUS7.25/10	HGUS7.25/10	7-1/4	9	4	44-16d	14-16d	5480	10015	10015	10015	
AHGUS7.25/12	HGUS7.25/12	7-1/4	11	4	54-16d	18-16d	5480	11455	11455	11455	
AHGUS7.25/14	HGUS7.25/14	7-1/4	13	4	64-16d	18-16d	5480	11455	11455	11455	

# **JOIST HANGERS, CLIP ANCHORS AND FENCE BRACKETS**



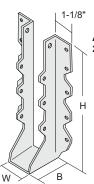
#### **FACE MOUNT HANGERS**

**DESIGN FEATURES**: Most models have triangle and round holes. To achieve maximum loads, fill both round and triangle holes with common nails. These heavy-duty connectors are designed for schools and other structures requiring additional strength, longevity and safety factors.

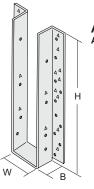
MATERIAL: 14ga. galvanized steel Available in G-185 Triple Zinc or Hot-Dip Galvanized. Call for availability.

CODES: ICC ER-5271

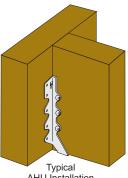
- Allowable loads are for hangers nailed into wood or structural composite lumber having an effective specific gravity of 0.55 (such as Southern Pine) or greater.
- 2. Allowable uplift loads have been adjusted by a load duration factor C<sub>D</sub>, of 1.6 (160%), corresponding to the typical duration of wind and earthquake loads.
- 3. Allowable gravity (bearing) loads have been adjusted by load duration factors, C<sub>D</sub>, OF 1.0 (100%), 1.15 (115%), and 1.25 (125%), corresponding to the typical durations of occupancy live loads, snow loads and construction loads, respectively.
- 4. Tabulated loads are without 33% steel stress



**AHU Series** 2x Sizes



**AHU Series** All other Sizes



	ypicai
AHU	Installation

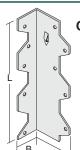
		D	IMENSION	ıs	N/	AIL	ALLOWABLE LOADS <sup>1</sup> (LBS)			
ITEM ID	REF.		(INCHES)		SCHE	Uplift <sup>2</sup>	Download		d	
		w	Н	В	Header	Joist	C <sub>D</sub> =1.6	C <sub>D</sub> =1.0	C <sub>D</sub> =1.15	C <sub>D</sub> =1.25
AHU26	HU26	1-9/16	3	2	4-16d	2-10dx1-1/2	295	595	670	720
AHU28	HU28	1-9/16	4-5/8	2	6-16d	4-10dx1-1/2	585	895	1005	1085
AHU210	HU210	1-9/16	6-3/8	2	8-16d	6-10dx1-1/2	1005	1190	1345	1445
AHU212	HU212	1-9/16	7-3/4	2	10-16d	6-10dx1-1/2	1005	1490	1680	1805
AHU212-3	HU212-3	4-11/16	10-21/32	2	16-16d	610d	1135	2380	2685	2890
AHU214	HU214	1-9/16	10-1/8	2	12-16d	6-10dx1-1/2	1005	1785	2015	2030
AHU48	HU48	3-9/16	6-15/32	2	10-16d	4-10d	760	1490	1680	1680
AHU410	HU410	3-9/16	8-15/32	2	14-16d	6-10d	1135	2085	2350	2530
AHU412	HU412	3-9/16	10-15/32	2	16-16d	6-10d	1135	2380	2685	2890
AHU414	HU414	3-9/16	12-15/32	2	18-16d	8-10d	1515	2680	3020	3250
AHU610	HU610	5-1/2	8-1/4	2	14-16d	6-16d	1345	2085	2350	2530
AHU612	HU612	5-1/2	10-1/4	2	16-16d	6-16d	1345	230	2685	2890
AHU614	HU614	5-1/2	12-1/4	2	18-16d	8-16d	1770	2680	3020	3250
AHU812	HU812	7-1/2	10-1/4	2	16-16d	6-16d	1345	2380	2685	2890
AHU814	HU814	7-1/2	12-1/4	2	18-16d	8-16d	1770	2680	3020	3250

#### **CLIP ANCHORS**

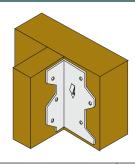
**DESIGN FEATURES**: Versatile reinforcing angles for a multi-purpose anchor around the job. They can be nailed to concrete slabs to hold posts or studs, or for high uplift conditions. Holes are staggered to eliminate wood splitting and to permit installation on both sides of the timber.

MATERIAL: 18 ga. galvanized steel

CODES: ICC ER-2894



**CA Series** 



Typical CA Installation

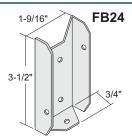
ITEM ID		DIME	NSIONS (IN	CHES)	NAIL	ALLOWABLE LOADS (LBS)		
	REF.	Α	В	L	SCHEDULE	NORMAL	MAX	
CA30	L30	2-3/8	1-3/8	2-1/2	4-10d	220	275	
CA50	L50	2-3/8	1-3/8	4-1/2	6-10d	330	415	
CA70	L70	2-3/8	1-3/8	6-1/2	8-10d	440	550	

#### **FENCE BRACKETS**

**DESIGN FEATURES**: Provide a secure fit for the connection of 1x4 and 2x4 fence boards to post .. easier to plan and build .. holes are sized to #6 wood screw or 8d nails. Many other connections possible such as patios and porches.

MATERIAL: 20 ga. galvanized steel





ITEM ID	REF. NO	NAIL SCH	EDULE		
IIEWID	KEF. NO	JOIST	HEADER		
FB14	FB14				
FB24	FB24	3-8d x 1-1/4	2-8d		

# **ANGLES, STUD PLATE TIES AND POST CAPS**



#### STUD PLATE TIES

<u>DESIGN FEATURES</u>: Used for wind resistance or seismic conditions. The Stud Plate Ties fasten the bottom plate or the top plate (double plate) to the studs.

MATERIAL: SPTR - 20 ga. galvanized steel TRSPT6-2 - 18 ga. galvanized steel

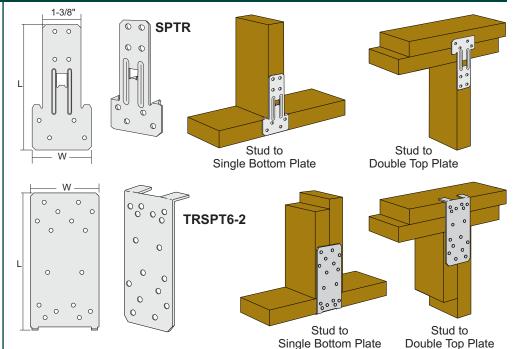
INSTALLATION: Use all specified fasteners. Nails must be installed into the plate before the stud. SPTR (Stud Plate Tie Reversible) has locating lines which aid in placement on single bottom plate or double top plate conditions.

CODES: ICC ESR-1347, ER-5271

#### NOTES:

- 1. Nails are 8d by 1-1/2 inch and 10d by 1-1/2 inch
- joist hanger náils.

  2. Allowable loads are for hangers nailed into wood or structural composite lumber having an effective specific gravity of 0.55 (such as Southern Pine) or greater.
- Allowable gravity (bearing) loads have been adjusted by load duration factors, C<sub>D</sub>, OF 1.6 (160%), corresponding to the typical durations of occupancy live loads, snow loads and construction loads, respectively.
- Tabulated loads are without 33% steel stress increase. Application of steel stress increase is not permitted.



ITEM ID	REF.		ISIONS HES)	CONNECTION ACHIEVED	NAIL SC	HEDULE <sup>1</sup>	ALLOWABLE LOADS <sup>3</sup>
		w	L	ACHIEVED	STUD	PLATE	(LBS)
SPTR	SPTR RSP4 2-1/8	2-1/8	4-1/2	Stud to single plate	4-8d x 1-1/2	4-8d x 1-1/2	320
OI III	1101 4	2 1/0	7 1/2	Stud to double plate	4-8d x 1-1/2	4-8d x 1-1/2	380
TRSPT6-2	SPT6-2 RSPT6-2 2-3/4		5-1/2	Stud to single plate	8-10d x 1-1/2	6-10d x 1-1/2	973
11X3F10-2   X3F10-2		2-5/4	J-1/2	Stud to double plate	8-10d x 1-1/2	6-10d x 1-1/2	463

#### **POST CAPS**

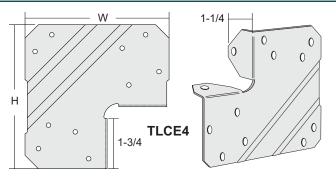
<u>DESIGN FEATURES</u>: Designed to connect wood post and beam members. Can be installed on a left or right. For use with 4x or 6x post.

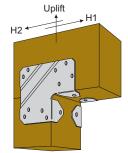
MATERIAL: 20 ga. galvanized steel

CODES: ICC ESR-1347

#### NOTES:

- 1. Nails are 16d by 3-1/2 inch common nails.
- Allowable loads are for hangers nailed into wood or structural composite lumber having an effective specific gravity of 0.50 (such as Douglas Fir Larch) or greater.
- Allowable gravity (bearing) loads have been adjusted by load duration factors, C<sub>□</sub>, OF 1.6 (160%), corresponding to the typical durations of occupancy live loads, snow loads and construction loads, respectively.
- Tabulated loads are without 33% steel stress increase. Application of steel stress increase is not permitted.





Typical TLCE4 Installation

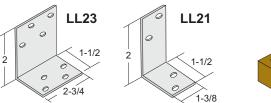
Typical LL23 Installation

ITEM ID	REF.	DIMENSIONS (INCHES)			NAIL SC	HEDULE <sup>1,4</sup>	ALLOWABLE LOADS - DFL <sup>2</sup> (LBS)			
		Н	W	В	BEAM⁴	POST⁴	UPLIFT <sup>3</sup>	LATERAL H1 <sup>3</sup>	LATERAL H2 <sup>3</sup>	
TLCE4	LCE4	5-3/8	5-3/8	1-1/4	14-16d x 3-1/2	10-16d x 3-1/2	2180	2188	1180	

#### LIGHT ANGLES

**DESIGN FEATURES:** LLs are versatile reinforcing angles that are nailed to reinforce intersecting wood members.

MATERIAL: 18 ga. galvanized steel



ITEM ID	REF.	NAII COUEDIII E	ALLOWABLE LOADS (LBS)				
		NAIL SCHEDULE	PARALLEL TO GRAIN	PERPENDICULAR TO GRAIN			
LL21	A21	4-10d	250	250			
LL23	A23	8-10d	505	505			

# **POST BASE AND ANCHORS**



#### **POST BASE**

<u>DESIGN FEATURES</u>: Provide fully-adjustable post base plus moisture and sanitary protection - also used for new construction or remodeling applications where damp rot is a problem. Bending slot provides greater ease of installation. For an easy adjustment to a previously set 1/2" concrete fastener (or bolt and cement insert), use the slotted hole. Also available in rough post sizes.

MATERIAL: 18 ga. and 16 ga. galvanized steel with a 14 ga. galvanized stand-off plate.

Available in G-185 Triple Zinc or Hot-Dip Galvanized. Call for availability.

CODES: ICC ER-2894

**SPECIAL**: Stand-off plate provides flat-end bearing area for posts and keeps the post end 1-3/16" above the surface moisture.

# AB Series 14 GAUGE GALVANIZED STAND-OFF PLATE BEND UP THE ONE POST BRACKET SIDE AFTER POSITIONING POST BRACKET

ITEM ID REF.		POST SIZE	DIMENSIONS (INCHES)			NAIL	ALLOWABLE LOADS (LBS)			
	KEF.	PUST SIZE	D	W	Н	SCHEDULE	UPLIFT	LATERAL	DOWN	
AB44	AB44	4 x 4	3-9/16	3-9/16	2-7/8	8-10d	1195	590	4165	
AB46	AB46	4 x 6	5-1/2	3-9/16	2-7/8	10-10d	1505	755	6165	
AB66	AB66	6 x 6	5-1/2	5-1/2	2-7/8	12-10d	1810	905	11665	

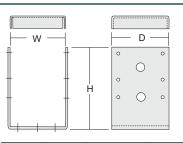
#### ADJUSTABLE ANCHORS

<u>DESIGN FEATURES</u>: The AAE44L provides higher uplift capacity because of extended sides with extra bolts and nailing schedules. The AAEL anchors are also available in rough lumber sizes.

MATERIAL: 12 ga. galvanized steel with a 12ga. galvanized stand-off plate
Available in G-185 Triple Zinc or Hot-Dip
Galvanized. Call for availability.

CODES: ICC ER-2894

**SPECIAL**: Economical price and ease-of-use make these ideal hangers for the do-it-yourself market.





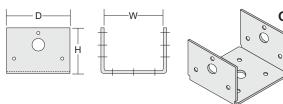
# ABU Series Typical ABU Installation

ITEM ID		POST SIZE	DIMENSIONS (INCHES)			NAIL	ALLOWABLE LOADS (LBS)		
ITEM ID	REF.	POST SIZE	D	w	н	SCHEDULE	UPLIFT	DOWN	
ABU44	ABU44	4 x 4	3	3-9/16	5-1/2	12-16d	2290	6665	
ABU46	ABU46	4 x 6	3	5-1/2	5-1/2	12-16d	2290	10335	
ABU66	ABU66	6 x 6	5	5-1/2	5-1/2	12-16d	2290	15000	
ABU88	ABU88	8 x 8	7	7-1/2	7	18-16d	2290	15870	

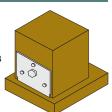
#### **DECK ANCHORS**

**DESIGN FEATURES**: Eliminates toe-nailing of the post or column to a flat surface. The bottom plate 1/2" bolt hole can be set to concrete with a 1/2" bolt, cement nails or "gun" inserts.

MATERIAL: 18 ga. galvanized steel; Available in G-185 Triple Zinc or Hot-Dip Galvanized. Call for availability.







ITEM ID	REF.	POST SIZE	DIMENSIONS (INCHES)			NAIL	ALLOWABLE LOADS (LBS)		
			D	w	Н	SCHEDULE	UPLIFT	DOWN	
GDB44	BC4O	4 x 4	3	3-9/16	2-7/8	10-16d	535	535	

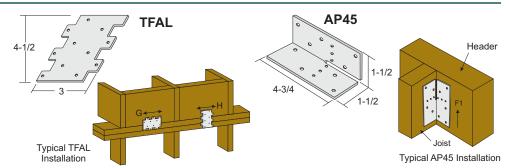
#### FRAMING ANCHORS

<u>DESIGN FEATURES</u>: Provides a plate to transfer the shear force to the blocking connection or rim joist from the top plate. The improved nail pattern helps prevent splitting of the wood members for both single/double top plate situations.

AP45 anchors provide the builder with the industry's most versatile framing anchor including: Bending slots - make accurate bends for all 2 and 3-way anchoring ties on the job.

MATERIAL: 18 ga. galvanized steel Available in G-185 Triple Zinc or Hot-Dip Galvanized. Call for availability.

CODES: ICC ER-5271



		NAIL SCHI	EDULE		ALLOWABLE LOADS <sup>1,2,3</sup> (LBS)					
ITEM ID	REF.	JOIST, RIM JOIST or BLOCKING	HEADER or PLATE(S)	OF LOAD <sup>1,2</sup>	C <sub>D</sub> = 1.0	C <sub>D</sub> = 1.15	C <sub>D</sub> = 1.25	C <sub>D</sub> = 1.6		
TFAL	LTP4	6-8d x 1-1/2	6-8d x 1-1/2	G or H	590	670	725	910		
AP45	A35	6-8d x 1-1/2	6-8d x 1-1/2	F1	590	650	650	650		



#### **HURRICANE TIES**

<u>DESIGN FEATURES</u>: Eliminate expensive, time consuming rafter notching ... provide wind and seismic ties for trusses and rafters ... fulfill specifications for resistance to lateral and uplift conditions ... also for general purpose tie use, strongback or attachments where one member crosses another.

RT1 - rafter to single plate

RT2A - universal rafter to double, plate/top plates to stud/stud to sill plate. Ergonomic design improves/speeds up and ease of installation.

RT2LR - rafter to double, plate/top plates to stud/stud to sill plate

RT9 - rafter to stud (alignment required)

RT15 and RT16 - rafter to double plate for high wind

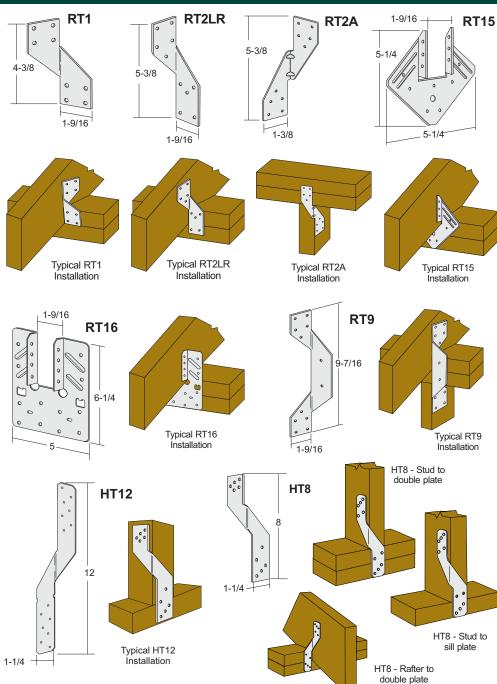
HT8 and HT12 - the largest of all hurricane ties, made from 18 ga. galvanized steel for high load capacity, and used to tie joists, studs, trusses, plates and all other wood members

MATERIAL: 18 ga. galvanized steel Available in G-185 Triple Zinc or Hot-Dip Galvanized. Call for availability.

CODES: FL Approval #8283, ICC ESR-1347

#### NOTES:

- 1. Nails are 8d or 10d common wire nails or 1-1/2 inch joist hanger nails.
- Allowable loads are for hangers nailed into wood or structural composite lumber having an effective specific gravity of 0.50 (such as Douglas-fir-Larch) or greater.
- Allowable loads are for hangers nailed into wood or structural composite lumber having an effective specific gravity of 0.55 (such as Southern Pine) or greater.
- Allowable uplift loads have been adjusted by a load duration factor C<sub>0</sub>, of 1.6 (160%), corresponding to the typical duration of wind and earthquake loads.
- 5. Tabulated loads are without 33% steel stress increase.



ITEM ID	DEE	CONNECTION	N	AIL SCHEDUI	_E¹	ALLOWABLE	LOADS4(LBS)
ITEM ID	REF.	ACHIEVED	TO RAFTERS	TO PLATES	TO STUDS	DFL <sup>2</sup>	SYP <sup>3</sup>
RT1	НЗ	Rafter to singe plate	4-10d	4-10d	-	-	341
RT2LR	H2.5	Rafter to double plate/ top plates to stud / stud to sill plate	5-8d	5-8d	-	497	497
RT2A	H2.5A	Rafter to double plate/ top plates to stud / stud to sill plate	5-10d	5-10d	-	765	765
RT9	H2	Rafter to stud	5-8d	2-8d	5-8d	-	355
RT15	H1	Rafter to double plate	4-10d	4-10d	-	493	493
RT16	H10	Rafter to double plate	8-10d	8-10d	-	1472	1587
HT8	H8	Rafter/stud to dbl plate	5-10d	5-10d	5-10d	784	784
		Stud to single plate	-	3-10d	3-10d	375	375
HT12	LTS12	Rafter to stud	7-10d	7-10d	7-10d	1027	1027

## STRAP TIE HOLDOWNS



#### STRAP TIE HOLDOWNS

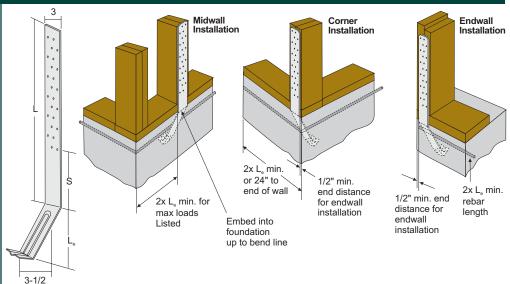
<u>DESIGN FEATURES</u>: The ASTHD holdowns embed into concrete foundations and nail to shear panel perimeter members to resist uplift load caused by earthquake and hurricane forces on a structure. They are an economical, high load connector preferred by contractors. The nail pattern facilitates nailing to the edges of double 2x members.

MATERIAL: 12 ga. galvanized steel Available in G-185 Triple Zinc or Hot-Dip Galvanized. Call for availability.

CODES: ICC ER-5271

#### INSTALLATION:

- All specified fasteners must be used.
- Fill holes starting from bottom of the strap up.
- Strap may be bent on full cycle from vertical to horizontal (90°) and back to vertical during installation.
- Bending strap may cause spalling or breaking away of the concrete at the bent location.
- For ASTHD10 and ASTHD14 full loads may be applied if spall is less than 4"
- 6. When nailing holdown to two wood members designer must specify required fasteners to join wood members together to act as one unit. Additional stud members may be required by the designer for required wall sheathing nailing.



MIN			DIME	NSIO	NS		ALLOWABLE TENSION LOADS <sup>1</sup> (LBS)					
STEM WALL <sup>2</sup>	ITEM ID	REF.	(IN.)			REQUIRED NAILS 3,4	NO	N-CRAC	KED	CRACKED		
(IN.)			L	s	L <sub>e</sub>	MAILO	MIDWALL	CORNER	ENDWALL	MIDWALL	CORNER	ENDWALL
WIND AND SDS A&B ALLOWABLE TENSION LOADS FOR DOUG FIR & SOUTHERN PINE (160)												
6	ASTHD10	STHD10	24	3-7/8	10	24-16d sinkers	4145	3715	2200	4145	3715	2200
	ASTHD14	STHD14	27-1/8	5	14	32-16d sinkers	7025	5834	3660	7025	5835	3660
8	ASTHD10	STHD10	24	3-7/8	10	28-16d sinkers	6150	3825	3055	6150	3825	3055
U	ASTHD14	STHD14	27-1/8	5	14	32-16d sinkers	7025	5835	4040	7025	5835	4040
	SDS C	&F ALL	OWABL	E TE	NSIC	ON LOADS FOR	DOUG F	IR & SO	UTHERN	PINE (1	60)	
6	ASTHD10	STHD10	24	3-7/8	10	18-16d sinkers	3550	3185	1890	3550	3185	1885
0	ASTHD14	STHD14	27-1/8	5	14	28-16d sinkers	6150	5000	3140	6150	5000	3140
8	ASTHD10	STHD10	24	3-7/8	10	20-16d sinkers	4390	3280	2615	4390	3280	2615
0	ASTHD14	STHD14	27-1/8	5	14	28-16d sinkers	6150	5000	3460	6150	5000	3460

#### **TENSION TIES**

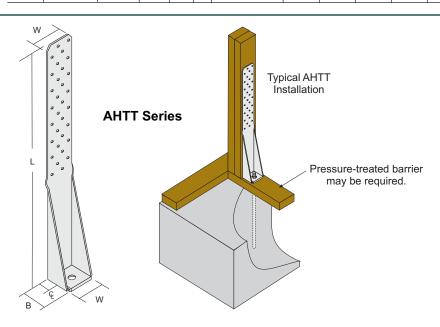
**DESIGN FEATURES**: The AHTT series tension ties provide a full range of load capacity for retrofitting or new construction. Tension ties connect shear panels to the foundation and can be installed after the pour.

MATERIAL: 11 ga. galvanized steel Available in G-185 Triple Zinc or Hot-Dip Galvanized. Call for availability.

CODES: ICC ER-5271

#### NOTES

- 1. AHTT tension ties are attached to approved anchor bolts of the diameter specified with a capacity equal to or greater than the allowable holddown capacity. Concrete compressive strength must be a minimum of 2,000 psi at 28 days. Side cover and embedment depth requirements in accordance with the approved anchor bolt requirements.
- Nail lengths are minimum penetration into the structural wood member (minus steel thickness). Longer nails may be used at the same load values.
- Uplift loads have been increased 33% and 60% (C<sub>D</sub> = 1.33 or 1.60, for fastener design in wood) for short-term wind and earthquake loading for recognition under UBC and IBC/IRC, respectively. No further increase is permitted.
- Allowable loads are based on the use of either nails or bolts, and are not otherwise cumulative.



ITEM ID		MATERIAL	DIMENSIONS (IN)				FAS	STENERS <sup>2</sup>	ALLOWABLE TENSION LOADS <sup>3</sup>	
ITEM ID	REF.	(GA)	w	L	В	C <sub>∟</sub>	ANCHOR BOLTS	NAILS	133%	160%
AHTT16	HTT16	11	2-1/2	16	2	1-3/16	5/8	18-16dx2-1/2	3495	4195
AHTT22	HTT22	11	2-1/2	22-1/8	2	1-3/16	5/8	32-16d sinkers	5300	5430

# **STRAP TIES AND COIL STRAPS**



#### **HURRICANE STRAPS**

<u>DESIGN FEATURES:</u> Provide the builder with a complete range of tie straps to meet a variety of application and design load conditions and specifications.

#### APPLICATIONS:

Use as all-purpose ties to connect studs to sill, rafters to plates and beams, wall intersections, ridges, upper floor to lower floor wall studs, window reinforcement. All nail holes must be filled to achieve published uplift values. Special lengths available based upon your specifications (not specifically code listed due to many length combinations). Considered essential by code officials and insurance companies in maintaining a continuous load path, therefore mitigating destruction from high winds and seismic activity. SS18/24 have notched corners (more user friendly) SS9/12 have 4 holes within 1-1/2" of one end to enable 4 nails to enter a bottom plate per TDI request.

MATERIAL: 20 ga. & 18 ga. galvanized steel

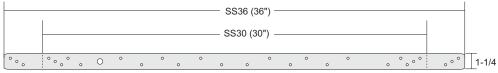
CODES: FL Approval #8283, ICC ESR-1347

#### NOTES

- 1. Nails are 10d by 3 inch joist hanger nails complying with section 3.8.3. Allowable tension loads are based on conditions with an equal number of nails on either side of the connection. In cases where this condition is not met, allowable tension loads must be based on the side of the connection having the fewest nails. 10d x 1-1/2" nails can be substituted for 10d x 3" nails. Section 3.8.3 of the report allows the use of both 1-1/2" and 3" nails because the shear capacity of both the nails is the same.
- Allowable tension loads include load duration factor of 1.6 per section 2.3.2 of NDS 2001. No further increases in allowable loads are permitted.
- Allowable tension loads are based on Southern Pine (SYP) with a specific gravity of 0.55, Dougles Fir-Larch (DFL) with specific gravity 0.50, and Spruce-Pine-Fir (SPF) or Hem-Fir (HF) with specific gravity of 0.42.
- 4. Tabulated loads are for ASTM A653 Steel with Fy=33 ksi and Fu=45 ksi
- Tabulated loads are without a 33% steel stress increase. Application of steel stress increase is not permitted.

# SS9 Typical Installation SS24 Typical Installation SS12 (12") 1-1/4





ITEM ID		STEEL GAUGE	DIMENSIONS		NAIL	ALLOWABLE TENSION LOADS (LBS)			
ITEM ID	REF.		WIDTH	LENGTH	SCHEDULE <sup>1</sup>	SYP	DFL	SPF/HF	
SS9	LSTA9	20	1-1/4	9	8-10d	787	730	627	
SS12	LSTA12	20	1-1/4	12	10-10d	873	873	874	
SS18	LSTA18	20	1-1/4	18	16-10d	873	873	873	
SS24	LSTA24	20	1-1/4	24	22-10d	873	873	873	
SS30	LSTA30	18	1-1/4	30	22-10d	1164	1164	1164	
SS36	LSTA36	18	1-1/4	36	26-10d	1164	1164	1164	

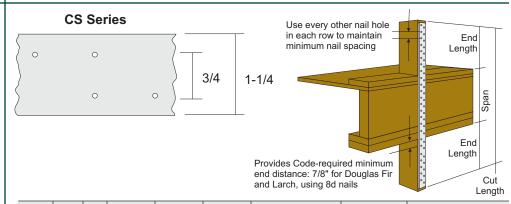
#### **COIL STRAPS**

**DESIGN FEATURES:** Coiled strapping consists of continuous coils which are designed to be cut to length on the job as required. No need to order 10", 18" or 24" straps, etc. Staggered hole pattern reduces wood splitting. Used to secure or wrap existing buildings for seismic upgrade, to tie water heaters to floors and walls and for utility purposes such as hanging pipes from rafters, studs or joists, boxed for easier usage and storage.

MATERIALS: 20 ga., 18 ga. and 16 ga. galvanized steel

CODES: FL Approval #8283, ICC ESR-1347

**NOTE**: Design loads are based on the assumption that one half of the specified number of nails are installed in each of the two members connected.



ITEM ID	TEM ID REF.		TOTAL	WIDTH	END CUT TO LENGTH		TOTAL	ALLOWABLE LOADS		
II EWI ID	KEF.	GA	(FEET)	(INCHES)	(INCHES)	CUT TO LENGTH	FASTENERS	100 %	133 %	
CS150	CS16	16	150'	1-1/4	14	CLEAR SPAN + 28"	26-8d x 1-1/2	1235	1650	
					11	CLEAR SPAN + 22"	24-10d x 1-1/2	1235	1650	
CS200	CS18	18	200'	1-1/4	9-1/2	CLEAR SPAN + 19"	20-8d x 1-1/2	950	1270	
					9	CLEAR SPAN + 18"	18-10d x 1-1/2	950	1270	
CS250	CS20	20	250'	1-1/4	7-1/2	CLEAR SPAN + 15"	16-8d x 1-1/2	750	1005	
					7	CLEAR SPAN + 14"	14-10d x 1-1/2	750	1005	

# **WALL BRACING, NAIL PLATES AND MUDSILL ANCHORS**



#### **WALL BRACING**

#### **DESIGN FEATURES:**

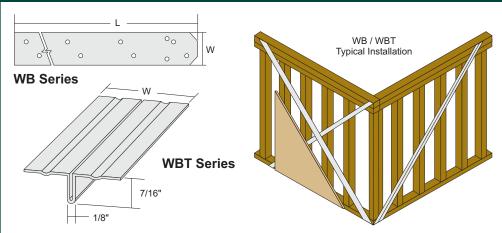
WB Series: We recommend metal bracing only be used to serve as temporary bracing to prevent racking before structural sheathing is applied. Metal bracing should never be used as a substitute for shear wall sheathing, as it offers only about one-tenth the resistance to racking as 3/8" plywood.

WBT Series: T wall brace extra-rigid lengths won't bend as easily as flat brace, making installation easier. No X-pattern installation needed.

#### MATERIAL:

WB 16 ga. galvanized steel WBT 22 ga. galvanized steel

CODES: FL Approval #8283, ICC ESR-1347



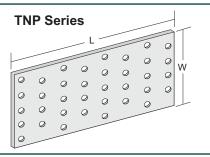
ITEM ID	REF.	GAUGE	DIMENS	IONS	ANGLE AND	NAIL SCHEDULE		
II E WI ID	KLF.	OAUGE	W (INCHES)	L (FEET)	WALL HEIGHT	PLATE	STUD	
WB10	WB106	16	1-1/4	9' 6"	60° / 8 FEET	3-10d	1-10d	
WB12	WB126	16	1-1/4	11' 5"	45° / 8 FEET	3-10d	1-10d	
WB14	WB146	16	1-1/4	13' 6"	45° / 10 FEET	3-10d	1-10d	
WB16		16	1-1/4	15' 6"	45° / 12 FEET	3-10d	1-10d	
WBT10	TWB10	22	2	9' 3"	60° / 8 FEET	4-8d	1-8d	
WBT12	TWB12	22	2	11' 4"	45° / 8 FEET	4-8d	1-8d	

#### **NAIL PLATES**

**DESIGN FEATURES:** Designed to provide positive connections at wall intersections and ridge ties when the top plates are cut .. also used for truss repairs or construction and splice applications on wood-to-wood splices.

MATERIAL: 20 ga. galvanized steel

CODES: FL Approval #8283, ICC ESR-1347



ITEM ID	DEE	DIMEN	SIONS (IN)	NAIL	
	REF.	WIDTH	LENGTH	SCHEDULE	
TNP35	TP35	3	5	24-8d	
TNP37	TP37	3	7	33-8d	
TNP39	TP39	3	9	42-8d	

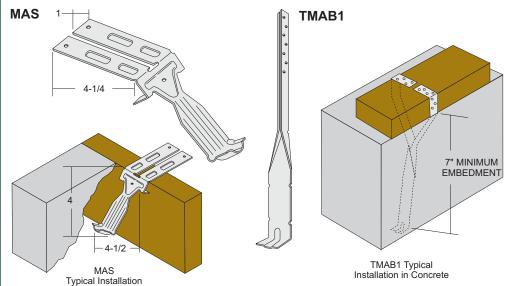
#### **MUDSILL ANCHORS**

**DESIGN FEATURES:** Provide for faster, more economical and secure method for anchoring wood framing to masonry or concrete.

TMAB1 - For installation into concrete slab or poured stemwalls. Features a pre-bent base flange to assure proper anchoring into concrete. When a 2 x 8 mudsill is used for TMAB1 maximum spacing is 3 feet. Loads and installation forTMAB1 assumes nominal 2 x 4 or 2 x 6 mudsill, when used as a direct substitution for 1/2" anchor bolt 6' o.c.

MAS - For installation into concrete slabs. MAS features a split flange for nailing to both mudsill and stud for greater framing versatility. Install before pouring the concrete by nailing to the form or after the pour by inserting the MAS into the concrete. There is fast and simple nail attachment - only six code-spaced nails are needed to drive either to the mudsill or directly to the stud.

MATERIALS: MAS 16ga. galvanized steel, TMAB 18ga. galvanized steel Available in G-185 Triple Zinc or Hot-Dip Galvanized. Call for availability.



ITEM ID	REF.	LENGTH (INCHES)	MUDSILL SIZE	NAIL SCI	HEDULE <sup>1</sup>	ALLOWABLE UPLIFT (LBS)	
			(INCHES)	SIDES	TOP	SYP	DFL
TMAB1	MAB15	12-1/2	2 x 4, 6	6	8	980	980
MAS MA	MAG		2 x 4, 6	2	4	815	703
	IVIAS			4	2	815	815

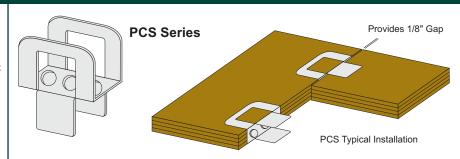
# **PLYWOOD CLIP AND WALL TIES**

# TAMLYN

#### **PLYWOOD CLIP**

DESIGN FEATURES: For quick, easy installation between plywood panels for roof sheathing or panelized construction .. provide structural support .. reduce normal plywood deflection between panels .. embossed dimples/built-in spacer type feature provide APA recommended 1/8" gap.

MATERIALS: 20 ga. galvanized steel



ITEM ID	REF.	MATERIAL	PANEL	MAXIMUM RO	NUMBER OF	
	KEF.	WATERIAL	THICKNESS	WITH PC OR PCS	W/O PC OR PCS	PC OR PCS PER SPAN
PCS716	PSCL 7/16	GALV. STEEL	7/16	24	24	1
PCS1532	PSCL 15/32	GALV. STEEL	15/32	32	28	1
PCS12	PSCL 1/2	GALV. STEEL	1/2	32	28	1
PCS58	PSCL 5/8	GALV. STEEL	5/8	40	32	1
PCS1932	PSCL 19/32	GALV. STEEL	19/32	40	32	1
PCS34	PSCL 3/4	GALV. STEEL	3/4	48	36	2
PCS2332		GALV. STEEL	23/32	48	36	2

#### **CORRUGATED WALL TIES**

US Patent Pending US Trademark # 3,196,848

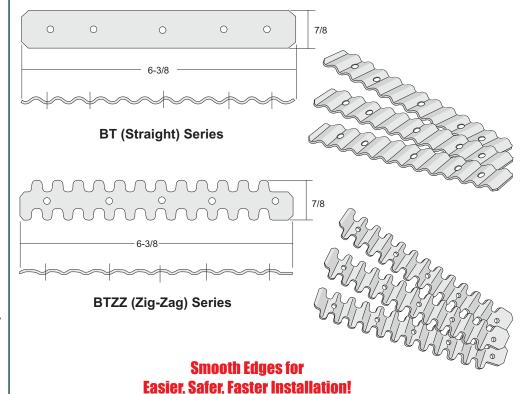
**DESIGN FEATURES**: Ties masonry to wall studs.

PACKAGING: Corrugated wall ties available in Stackpack® pioneered by Tamlyn (lined up tightly in box) or bulk (loose in box). Suppliers can sell stackpack by the sleeve or even by the piece count (250 or 500) and store 5 pallets on top of each other. Also available in retail pack of 100.



**WARNING**: Repeated bending of steel is unnecessary, will weaken the strength of the product, may create fracture at the bend line, and is considered an abuse of the product, voiding any performance warranty. Fractured steel will not perform as designed and should be discarded immediately. Only one bend of the product to the desired 90° form should be required.

MATERIAL: 22 ga. and 28 ga. Galvanized Steel. Also available in hot dip galvanized after fabrication (in accordance with ASTM A153 B3) and stainless steel (type 3042B) for optimal corrosion resistance. Stainless steel is absolutely best material for longevity. Field studies show regular galvanized wall ties can deteriorate and fail within 10 years. Be certain compatible fasteners are used (e.g., stainless steel nails with stainless steel wall ties). Painted steel over galvanized is acceptable and actually superior.



ITEM ID	TYPE	GAUGE	MATERIAL	LOAD @ FAILURE	PACKAGING	
BT16HDG	STRAIGHT	16	HOT-DIPPED		BULK	
BT16SP	STRAIGHT	16	GALVANIZED		STACKPACK®	
BT22BULK	STRAIGHT	22	GALVANIZED	1370	BULK	
BT22HDG	STRAIGHT	22	HOT DIPPED	1370	BULK	
BT22SP	STRAIGHT	22	GALVANIZED	1370	STACKPACK®	
BT22SS	STRAIGHT	22	STAINLESS STEEL		STACKPACK®	
BT22ZZSP	ZIGZAG	22	GALVANIZED	1370	STACKPACK®	
BT28500SP	STRAIGHT	28	GALVANIZED	604	STACKPACK®	
BT28ZZ5SP	ZIGZAG	28	GALVANIZED	604	STACKPACK®	

# **COLUMN HOLDOWN FOR ROUND AND SQUARE COLUMNS**



#### COLUMN HOLDOWN

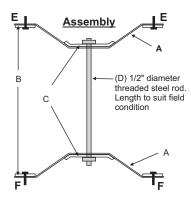
US Patent #8,567,743

**DESIGN FEATURES:** CHR and CHS are designed to resist uplift loads at roof over hangs and/or floor loads and transfer them to concrete foundations thru 1/2" diameter threaded steel rod acting as a tension transfer device.

MATERIAL: Aluminum Plate t = 0.059" - 5052-0 Alloy Structural Ring Plate t = 0.120" - A 653 grade 50 Conforming Washer t = 0.120" 1/2" Steel Rod - A36 & A588

- (E) SDS 1/4" X 3" Wood screws by KC Metals or equivalent for Assembly 1
- 1/4" 

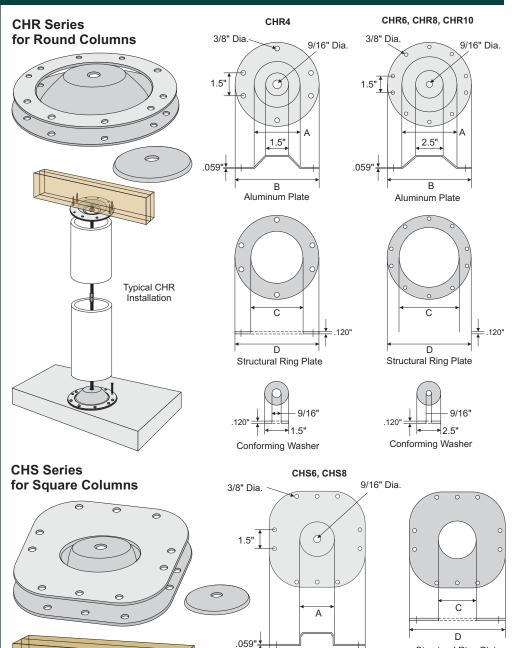
  Tapcon Concrete anchor, 1-3/4" Concrete embedment



#### STRUCTURAL NOTE:

- 4', 6", 8" and 10" diameter Column Holdowns are used to resist uplift loads at roof overhangs and transfer them to concrete foundations thru a ½" diameter threaded steel rod acting as a tension transfer device.
- For Assembly # 1 the uplift capacity of 4" diameter column holdown is 3750 lbs, of 6" diameter is 3130 lbs, of 8" diameter is 2310 lbs and of 10" diameter column head is 1730 lbs. This capacity is based on tested loads at failure divided by a factor of safety of two. Refer to test reports by PSI Inc. Houston, Texas.
- For assembly # 2, uplift capacity of all sizes 4", 6", 8" and 10" diameter column holdown is 3750 lbs with ½" diameter A36 steel rod and 4530 lbs with A588 steel rod. For this assembly, tension capacity of ½" rod controls the design and not the tested failure loads divided by two. Refer to test reports by PSI Inc. Houston, Texas.
- reports by PSI Inc. Houston, recast.

  Based on tests per ASTM A 370 conducted by PSI inc. Houston, tensile and yield strengths of steel plate designated "B" are 60,100 psi and 48700 psi respectively. ASTM a 653 grade 50 chael conforms to these strengths. Aluminum steel conforms to these strengths. Aluminum plate designated "A" conforms to Aluminum Alloy
- $1/2^{\hbox{\tiny "}}$  diameter steel threaded rod shall conform to ASTM A 36 for Assembly # 1 and to A36 or A588 for assembly #2
- Provide Steel Washer Plate designated "C" at each end of the rod. Steel rod shall be sufficiently tightened to transfer load from top to bottom.
- The upper Aluminum plate "A" and Steel Ring plate "B" are anchored to wood framed structural members of the roof overhang with SDS ½" diameter X 3" wood screws for Assembly # 1. For Assembly #2, provide 2½" X 2½" X ½" steel washers at the top of wood joists.
- For both assemblies, provide 1/4" diameter machine bolts D thru unused holes to connect Aluminum plate A to Ring plate B
- The lower Aluminum Plate "A" and Steel ring plate "B" are anchored to concrete foundations at all holes with ¼" diameter Tapcon concrete anchors with 1¾" concrete embedment into min. 3000 psi concrete.
- Proprietary Precast Columns wrapping the the aluminum and steel plates are used to resist gravity loads.
- Engineer of Record shall design the roof overhangs and concrete foundations.



ITEM ID	COLUMN SIZE	ALUMINUM PLATE			STEEL RING PLATE			ALLOWABLE LOADS (LBS)		
		A B	В	THKS	С	D	THKS	ASSEMBLY #1	ASSEMBLY #2	
			В	IIINO					A36 1/2" φ ROD	A588 1/2" ф ROD
CHR4	4"	3"	5.5"	.059"	3.25"	5.25"	.120"	3750	3750	4530
CHR6	6"	5"	7.625"	.059"	5.25"	7.375"	.120"	3130	3750	4530
CHR8	8"	6.625"	9"	.059"	6.75"	9"	.120"	2310	3750	4530
CHR10	10"	8"	11.5"	.059"	9"	11.25"	.120"	1730	3750	4530
CHS6	6"	2.75"	7.5"	.059"	3"	7.5"	.120"	3130	3750	4530
CHS8	8"	4"	9"	.059"	4.25"	9"	.120"	2310	3750	4530

Typical CHS

Installation

В Aluminum Plate

.120

Structural Ring Plate

Conforming Washer

9/16"

2.5" (CHS6) 3.75" (CHS8)

# **COLUMN HOLDOWN SYSTEM**



#### **COLUMN HOLDOWN SYSTEM**

#### **INSTALLATION INSTRUCTION:**

- Cut column to desired finished length minus 1/4" for plate thickness, then insert cap and base onto the column shaft.
- Feed the threaded rod through the column shaft. Insert the threaded rod to the center hole of the bottom plate and secure with hex nut.
- 3. Insert other end of the threaded rod to the center hole of the top plate and secure with hex nut.
- 4. Cut both end of excess threaded rod for flush fit with the plate.
- Slide the column into its final position and mount plates to the concrete slab and the roof structure. See structural note on page 20.
- 6. Secure cap and base.

#### **ASSEMBLY 1**

- 2 sets of column holdown (top and bottom)
- 3 pieces of 48" x 1/2" threaded steel rod
- 2 coupling nuts
- 1 2" x 2" square plate washer with 9/16" hole
- 2 hex nuts

#### **ASSEMBLY 2**

- 2 sets of column holdown (top and bottom)
- 3 pieces of 48" x 1/2" threaded steel rod
- 2 coupling nuts
- 1 2-1/2" x 2-1/2" x 1/4" square plate washer with 9/16" hole
- 3 hex nuts

#### RECOMMENDED FASTENERS

1/4" X 3" Wood screws



1/4" Tapcon concrete anchor



Machine Bolts



