

SSC Steel-Stud Connector



This product is preferable to similar connectors because of a) easier installation, b) higher loads, c) lower installed cost, or a combination of these features.

SSC connectors are versatile utility clips ideal for a variety of stud-to-stud and stud-to-structure applications in cold-formed steel construction. The clips have been designed to enable easy installation on the open side of studs or joists with flanges up to 3" long and return lips up to 3/4". A wide pattern of strategic fastener locations allows the SSC to accommodate a variety of traditional and custom designs.

Features:

- Prepunched holes reduce installation cost by eliminating predrilling
- Intuitive fastener hole positions ensure accurate clip installation in accordance with design, support a wide range of design and application requirements and provide installation flexibility
- Angle lengths accommodate either hard-side or soft-side attachment for studs and joists with return lips up to 3/4"
- 4" leg length enables soft-side connections for studs and joists with flanges up to 3"
- Also suitable for u-channel bridging

Product Information:

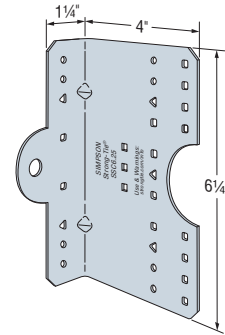
Material: LSSC — 54 mil (50 ksi); SSC — 68 mil (50 ksi); MSSC — 97 mil (50 ksi)

Finish: Galvanized (G90)

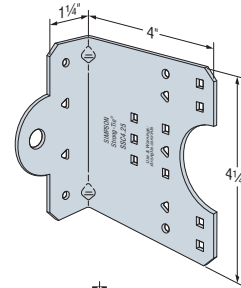
Installation: Use all specified fasteners/anchors

Codes: See p. 11 for Code Reference Key Chart

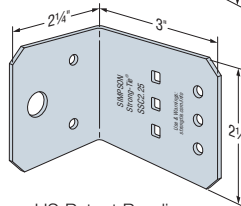
For detailed product dimensions, refer to p. 81.



SSC6.25
(LSSC6.25,
MSSC6.25
similar)



SSC4.25
(LSSC4.25,
MSSC4.25
similar)

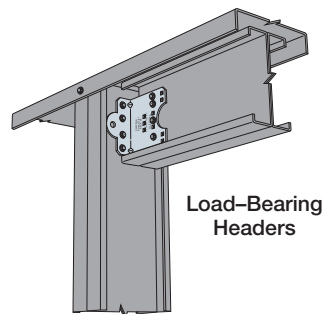


SSC2.25
(MSSC2.25
similar)

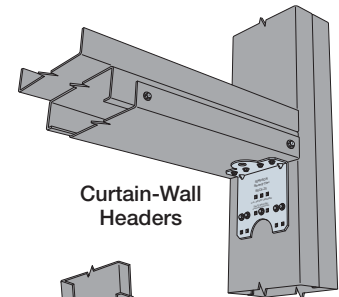
US Patent Pending

Ordering Information

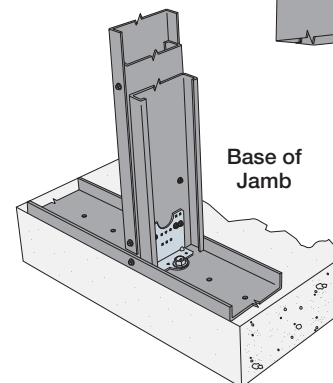
Model No.	Ordering SKU	Package Quantity
SSC2.25	SSC2.25-R125	Bucket of 125
MSSC2.25	MSSC2.25-R90	Bucket of 90
LSSC4.25	LSSC4.25-R50	Bucket of 50
SSC4.25	SSC4.25-R50	
MSSC4.25	MSSC4.25-R50	
LSSC6.25	LSSC6.25-R30	Bucket of 30
SSC6.25	SSC6.25-R30	
MSSC6.25	MSSC6.25-R30	



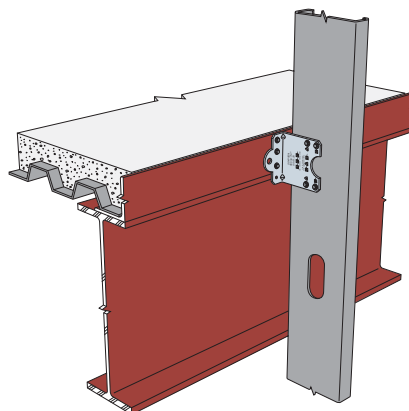
Load-Bearing
Headers



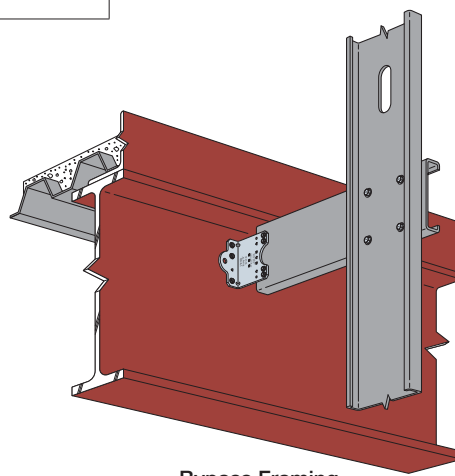
Curtain-Wall
Headers



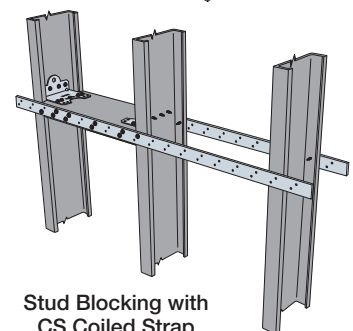
Base of
Jamb



Bypass Framing



Bypass Framing
with Stud Strut



Stud Blocking with
CS Coiled Strap

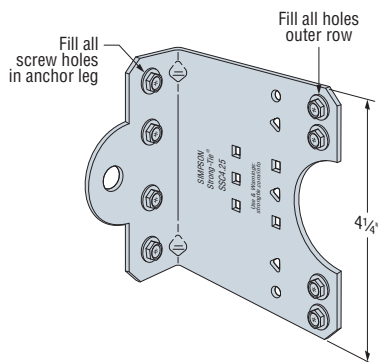
*SSC2.25 clips will accommodate 2" wide flange and 3/4" stiffener lips.

SSC Steel-Stud Connector

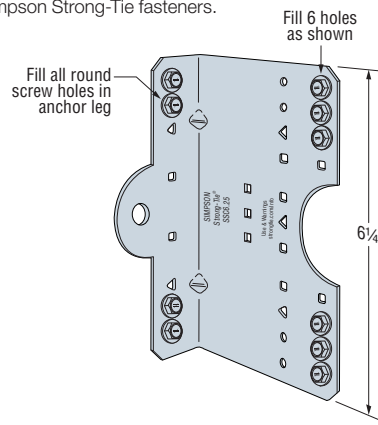
SSC Connectors — Steel-to-Steel Allowable Loads

Model No.	Connector Material Thickness mil (ga.)	Clip Length (in.)	Framing Member Depth (in.)	Fasteners			Allowable F4 Load (lb.)				Code Ref.
				Pattern ¹	Carried Member	Carrying Member	Minimum Member Thickness			Maximum Connector Load ³	
							33 mil (20 ga.)	43 mil (18 ga.)	54 mil (16 ga.)		
SSC2.25	68 (14)	2¼	3¾	Min.	(3) #10	(2) #10	165	225	345	690	IBC
MSSC2.25	97 (12)	2¼	3¾	Min.	(3) #10	(2) #10	165	225	345	690	
LSSC4.25	54 (16)	4¼	6	Min.	(2) #10	(2) #10	215	440	675	1,615	
				Max.	(5) #10	(4) #10	215	440	725		
				Outer	(4) #10	(4) #10	200	310	520		
SSC4.25	68 (14)	4¼	6	Min.	(2) #10	(2) #10	355	525	890	1,615	
				Max.	(5) #10	(4) #10	365	600	1,005		
				Outer	(4) #10	(4) #10	235	330	625		
MSSC4.25	97 (12)	4¼	6	Min.	(2) #10	(2) #10	355	525	890	1,615	
				Max.	(5) #10	(4) #10	365	600	1,005		
				Outer	(4) #10	(4) #10	235	330	625		
LSSC6.25	54 (16)	6¼	8	Min.	(4) #10	(4) #10	265	660	1,190	2,590	
				Max.	(7) #10	(6) #10	265	660	1,190		
				Outer	(6) #10	(4) #10	270	375	695		
SSC6.25	68 (14)	6¼	8	Min.	(4) #10	(4) #10	385	720	1,190	2,590	
				Max.	(7) #10	(6) #10	385	720	1,190		
				Outer	(6) #10	(4) #10	270	460	725		
MSSC6.25	97 (12)	6¼	8	Min.	(4) #10	(4) #10	385	720	1,190	2,590	
				Max.	(7) #10	(6) #10	385	720	1,365		
				Outer	(6) #10	(4) #10	270	460	725		

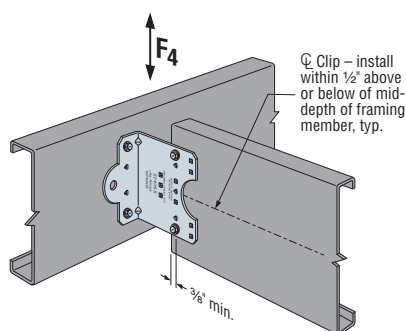
1. Min. fastener quantity and load values — fill all round holes; Max. fastener quantity and load values — fill all round and triangular holes; Outer fastener quantity and load values — see illustrations for fastener placement.
2. Allowable loads are based on bracing of the members located within 12" of the connection.
3. Maximum allowable load for connector that may not be exceeded when designing custom installations. designer is responsible for member and fastener design.
4. See *Fastening Systems* catalog (C-F-2019) on strongtie.com for more information on Simpson Strong-Tie fasteners.
5. Reference pp. 82–84 for supplemental information and alternate screw patterns.



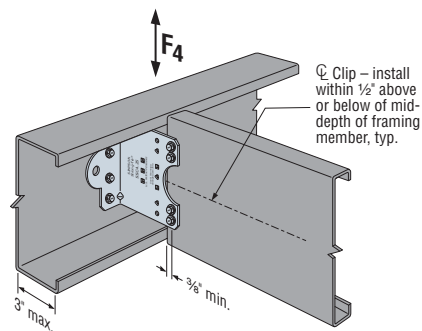
SSC4.25 — Outer Fastener Pattern
(LSSC4.25 and MSSC4.25 similar)



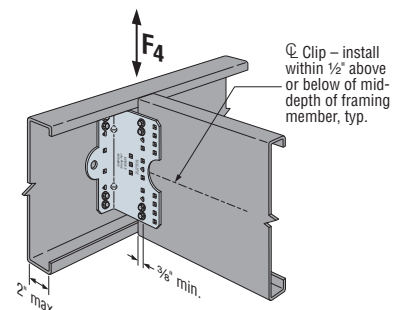
SSC6.25 — Outer Fastener Pattern
(LSSC6.25 and MSSC6.25 similar)



Typical SSC4.25 Installation with Min. Quantity



SSC Installation with Carried Member Fasteners in Outer Row



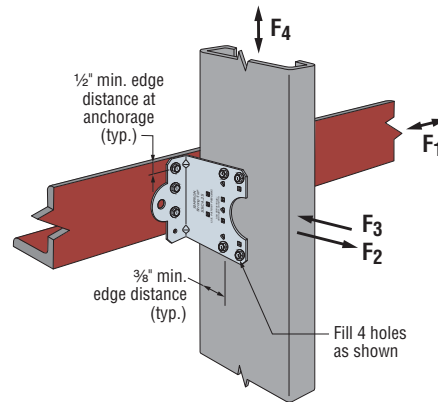
SSC6.25 Installation with Min. Quantity

SSC Steel-Stud Connector

SSC Connectors — Bypass Framing Allowable Loads (lb.)

Model No.	Connector Material Thickness mil (ga.)	Clip Length (in.)	Fasteners ^{1,4}		Stud Thickness												Code Ref.
					33 mil (20 ga.)				43 mil (18 ga.)				54 mil (16 ga.)				
			Anchorage ²	Stud	F ^{1,3}	F ₂	F ₃	F ₄	F ^{1,3}	F ₂	F ₃	F ₄	F ^{1,3}	F ₂	F ₃	F ₄	
SSC4.25	68 (14)	4¼	(3) #10	(4) #10	40	705	705	700	40	870	1,050	850	40	935	1,210	850	IBC
			(3) PDPAT-62K	(4) #10	40	705	705	700	40	780	1,050	850	40	780	1,210	850	—
MSSC4.25	97 (12)	4¼	(3) #10	(4) #10	105	705	705	705	105	1,050	1,050	880	105	1,385	1,210	880	IBC
			(3) PDPAT-62K	(4) #10	105	705	705	705	105	780	1,050	880	105	780	1,210	880	—

- See illustration for fastener placement.
- Allowable loads are based on anchors installed in minimum 3/8"-thick structural steel with $F_y = 36$ ksi.
- Allowable loads based on in-plane loads applied at the centroid of the fasteners to the stud, with no rotational restraint of stud.
- See *Fastening Systems* catalog (C-F-2019) on strongtie.com for more information on Simpson Strong-Tie fasteners.

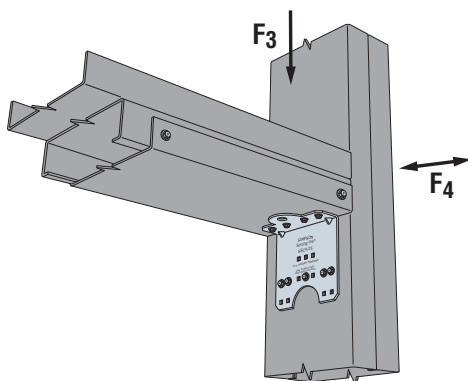


Typical SSC Installation

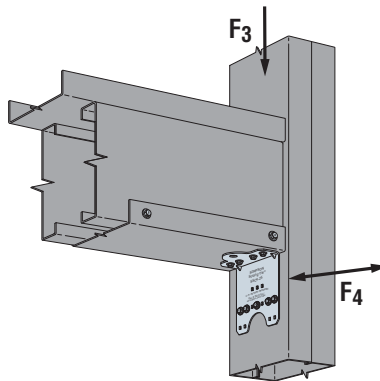
SSC Connectors — Headers Allowable Loads

Model No.	Connector Material Thickness mil (ga.)	Clip Length (in.)	Jamb Stud Depth (in.)	Fasteners ⁴			Jamb and Header Thickness mil (ga.)	Allowable F ₃ Load (lb.)		Allowable F ₄ Load (lb.)	Code Ref.
				Pattern	Jamb	Header		Nested Stud and Track Header ³	Back to Back Header ²		
LSSC4.25	54 (16)	4¼	6	Max.	(5) #10	(4) #10	33 (20)	140	455	215	IBC
							43 (18)	220	660	440	
SSC4.25	68 (14)	4¼	6	Max.	(5) #10	(4) #10	54 (16)	375	1,055	1,005	
							68 (14)	570	1,055	1,005	
LSSC6.25	54 (16)	6¼	8	Max.	(7) #10	(6) #10	33 (20)	160	455	265	
							43 (18)	250	730	660	
SSC6.25	68 (14)	6¼	8	Max.	(7) #10	(6) #10	54 (16)	410	1,110	1,190	
							68 (14)	640	1,110	1,190	

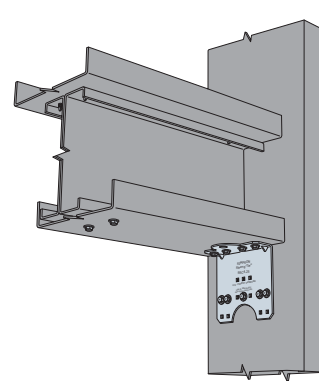
- Max. fastener quantity and load values — fill all round and triangular holes.
- Designer is responsible for checking web crippling of the header and reducing allowable loads accordingly.
- Also applies to box header per illustration below.
- See *Fastening Systems* catalog (C-F-2019) on strongtie.com for more information on Simpson Strong-Tie fasteners.



Nested Stud and Track



Box Header



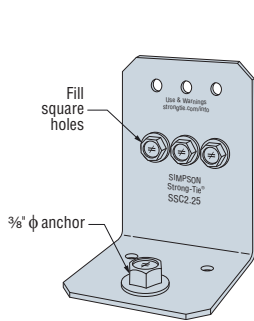
Back-to-Back Header

SSC Steel-Stud Connector

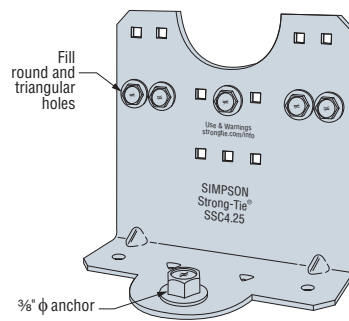
SSC Connectors — Base of Jamb Allowable Loads

Model No.	Connector Material Thickness mil (ga.)	Clip Length (in.)	Stud Member Depth (in.)	Fasteners		Stud Thickness mil (ga.)	Allowable F ₄ Load (lb.)	Code Ref.
				Anchor Diameter	Stud Fasteners ³			
SSC2.25	68 (14)	2¼	3¾	¾	(3) #10	33 (20)	390	IBC
						43 (18)	605	
						54 (16)	940	
SSC4.25	68 (14)	4¼	6	¾	(5) #10	33 (20)	420	
						43 (18)	685	
						54 (16)	975	
SSC6.25	68 (14)	6¼	8	¾	(7) #10	33 (20)	470	
						43 (18)	715	
						54 (16)	1,020	

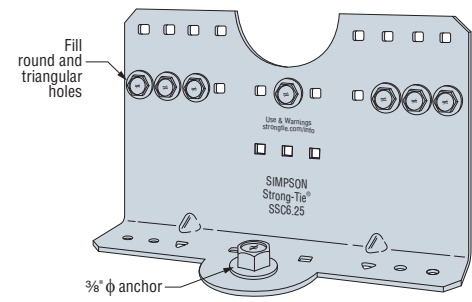
1. Allowable loads are based on minimum 33 mil (20 ga.) track for 33 mil (20 ga.) and 43 mil (18 ga.) studs, and minimum 43 mil (18 ga.) track for 54 mil (16 ga.) studs, with one #10 screw into each stud flange.
2. Allowable loads assume adequate torsional bracing is provided. Bracing design is the responsibility of the designer.
3. See illustrations for fastener placement.
4. Designer is responsible for anchorage design.
5. See *Fastening Systems* catalog (C-F-2019) on strongtie.com for more information on Simpson Strong-Tie fasteners.



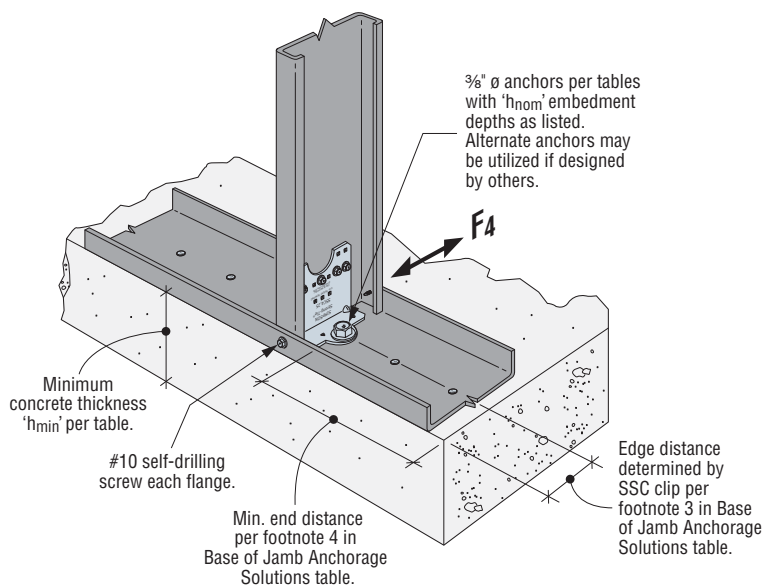
SSC2.25 Fastener Pattern



SSC4.25 Fastener Pattern



SSC6.25 Fastener Pattern



Typical SSC Installation
(Note: This figure references the table on the following page.)

Titen HD®
Screw AnchorStrong-Bolt® 2
Wedge AnchorAT-XP®
Adhesive

For more information, see *Anchoring, Fastening and Restoration Systems for Concrete and Masonry* catalog (C-A-2018).

SSC Steel-Stud Connector

Base of Jamb Anchorage Solutions

Uncracked Concrete, Wind and Seismic in SDC A & B ⁸						
Model No.	Minimum Concrete Thickness (h _{min}) (in.)	⅜" Diameter Simpson Strong-Tie® Anchor Type	Nominal Embedment Depth (h _{nom}) (in.)	Allowable Anchor Load, F ₄ (lb.)		
				3,000 psi SLWC	3,000 psi NWC	4,000 psi NWC
SSC2.25	4	Titen HD®	2½	275	455	530
	6	Titen HD	3¼	290	485	560
		SET-XP®	4	345	510	590
		AT-XP®	4	345	510	590
SSC4.25	4	Titen HD	2½	550	920	975
	6	Titen HD	3¼	620	975	975
		SET-XP	4	735	880	880
		AT-XP	4	735	880	880
SSC6.25	4	Titen HD	2½	735	1,020	1,020
	6	Titen HD	3¼	960	1,020	1,020
		SET-XP	4	880	880	880
		AT-XP	4	880	880	880
Cracked Concrete, Wind and Seismic in SDC A & B ⁸						
Model No.	Minimum Concrete Thickness (h _{min}) (in.)	⅜" Diameter Simpson Strong-Tie® Anchor Type	Nominal Embedment Depth (h _{nom}) (in.)	Allowable Anchor Load, F ₄ (lb.)		
				3,000 psi SLWC	3,000 psi NWC	4,000 psi NWC
SSC2.25	4	Titen HD	2½	195	325	375
	6	Titen HD	3¼	210	345	400
		SET-XP	4	245	360	420
		AT-XP	4	245	360	420
SSC4.25	4	Titen HD	2½	395	655	760
	6	Titen HD	3¼	445	740	855
		SET-XP	4	525	775	880
		AT-XP	4	525	775	880
SSC6.25	4	Titen HD	2½	525	875	1,010
	6	Titen HD	3¼	685	1,020	1,020
		SET-XP	4	810	880	880
		AT-XP	4	810	880	880
Cracked Concrete, Seismic in SDC C through F ⁹						
Model No.	Minimum Concrete Thickness (h _{min}) (in.)	⅜" Diameter Simpson Strong-Tie® Anchor Type	Nominal Embedment Depth (h _{nom}) (in.)	Allowable Anchor Load, F ₄ (lb.)		
				3,000 psi SLWC	3,000 psi NWC	4,000 psi NWC
SSC2.25	4	Titen HD	2½	90	150	175
	6	Titen HD	3¼	95	160	185
		SET-XP	4	115	170	195
		AT-XP	4	115	170	195
SSC4.25	4	Titen HD	2½	185	305	355
	6	Titen HD	3¼	205	345	400
		SET-XP	4	245	355	355
		AT-XP	4	245	350	350
SSC6.25	4	Titen HD	2½	245	410	470
	6	Titen HD	3¼	320	480	480
		SET-XP	4	355	355	355
		AT-XP	4	350	350	350

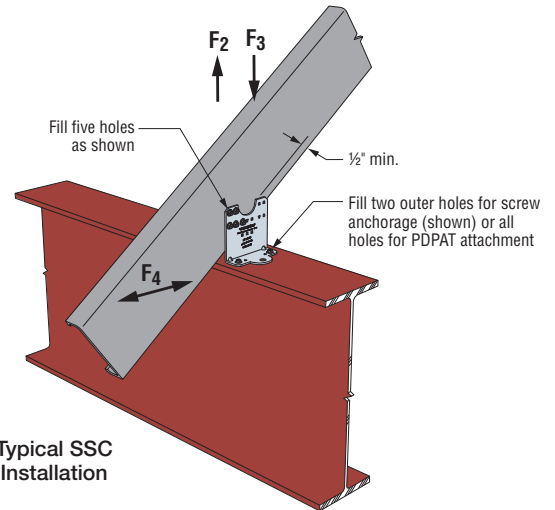
- Allowable anchor capacities have been determined using ACI 318-14 Chapter 17 calculations with the minimum concrete compressive strength, f'_c and slab thickness listed. Sand-lightweight concrete is abbreviated as "SLWC" while normal-weight concrete is abbreviated as "NWC".
- Nominal Embedment Depth/Effective Embedment Depth relationships:
 - $\frac{3}{8}$ " Titen HD® in 4" Slab : $2.50" (h_{nom}) / 1.77" (h_{ef})$
 - $\frac{3}{8}$ " Titen HD in 6" Slab or thicker : $3.25" (h_{nom}) / 2.40" (h_{ef})$
 - SET-XP® or AT-XP® Adhesive with $\frac{3}{8}$ " F1554 Gr. 36 All-Thread Rod in 6" Slab or thicker : $4.0" (h_{nom}) = 4" (h_{ef})$
- Edge distances are assumed to be 1.81", 3.0" and 4.0" ($\frac{1}{2}$ of stud width) as determined for 3 $\frac{3}{8}$ ", 6" and 8" studs, respectively.
- End distances are assumed as 1.5 x Min. Edge Distance in one direction and 'N/A' in the other direction. See figure on p. 79.
- Load values are for a single anchor based on ACI 318-14, condition B, load factors from ACI 318-14 Section 5.3, no supplemental edge reinforcement, $\Psi_{c,v} = 1.0$ for cracked concrete and periodic special inspection. Reference ICC-ES or IAPMO-UES evaluation reports for further information.
- Load values are based on a short-term temperature range of 150°F and 180°F for SET-XP and AT-XP. Long-term temperature range is assumed to be 110°F for both SET-XP and AT-XP. Dry hole conditions are assumed. Other conditions may be evaluated using Anchor Designer™ Software for ACI 318, ETAG and CSA. See strongtie.com/software.
- Allowable Stress Design (ASD) values were determined by multiplying calculated LRFD capacities by a conversion factor, Alpha (α), of 0.7 for seismic loads and 0.6 for wind loads. ASD values for other load combinations may be determined using alternate conversion factors.
- Tabulated allowable ASD loads for Wind and Seismic in SDC A&B are based on using wind conversion factors and may be increased by 1.17 for SDC A&B only.
- Allowable loads have been divided by an Omega (Ω) seismic factor of 2.5 for brittle failure as required by ACI 318-14 Chapter 17.
- Allowable F_4 load based on loading direction towards the edge of slab.
- Tabulated capacities are based on maximum allowable anchorage loads only. The capacity of the connection system shall be the minimum of the tabulated value and the allowable load value from the SSC Connectors: Base of Jamb Allowable Load Tables.

SSC Steel-Stud Connector

SSC Connectors — Rafters Allowable Loads

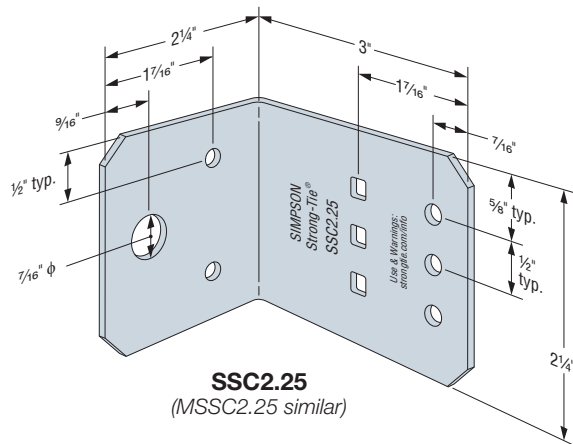
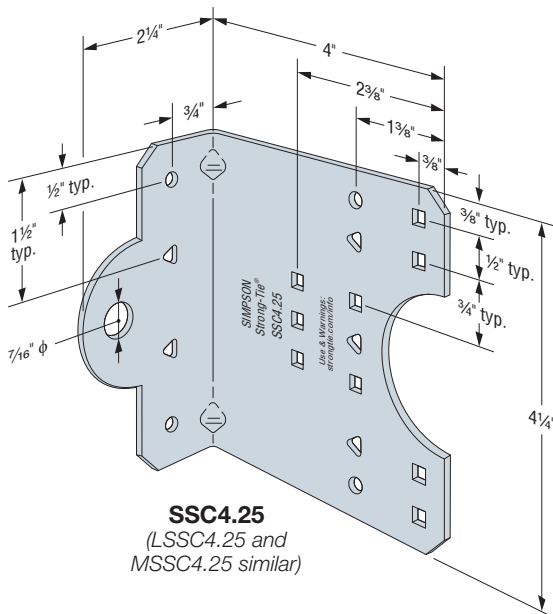
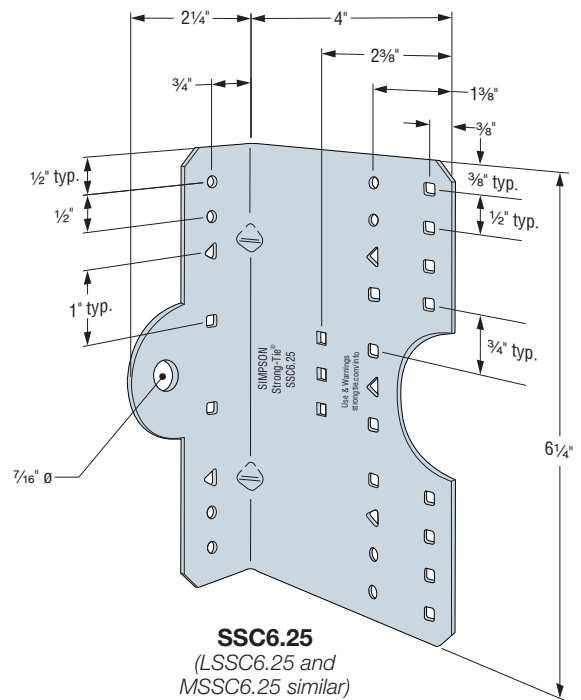
Model No.	Connector Material Thickness mil (ga.)	Clip Length (in.)	Fasteners ^{1,4}		Allowable Load (lb.)			Code Ref.
			Anchorage to Steel ²	Supported Member	43 mil (18 ga.)			
					F ₂	F ₃	F ₄	
SSC4.25	68 (14)	4¼	(2) #12–24	(5) #10	710	1,075	595	IBC
			(4) 0.157" PDPAT	(5) #10	1,020	1,075	630	
MSSC4.25	97 (12)	4¼	(2) #12–24	(5) #10	710	1,335	595	
			(4) 0.157" PDPAT	(5) #10	1,025	1,335	815	

- See illustrations for fastener placement.
- Allowable loads are based on anchors installed in minimum 3/16"-thick structural steel with F_y = 36 ksi.
- Allowable loads are based on a 6"-deep member. For deeper members, designer must consider web crippling of the member and reduce loads accordingly.
- See *Fastening Systems* catalog (C-F-2019) on strongtie.com for more information on Simpson Strong-Tie fasteners.



Typical SSC Installation

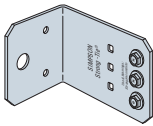
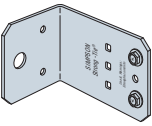
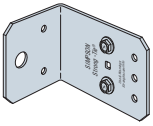
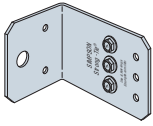
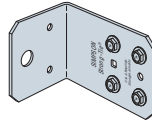
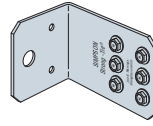
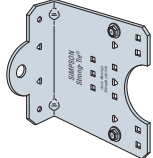
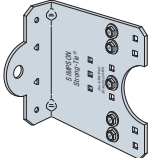
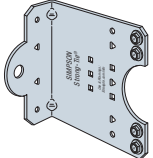
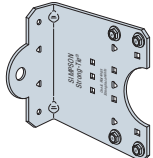
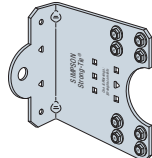
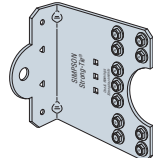
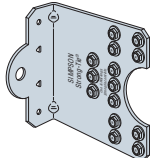
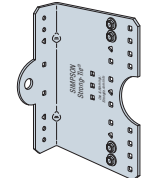
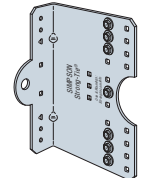
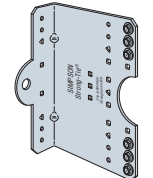
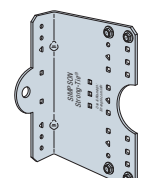
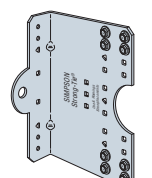
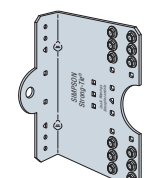
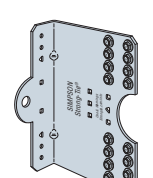
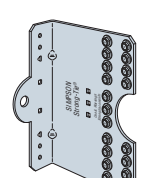
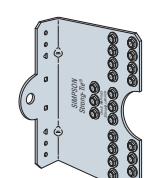
SSC Utility Clip Dimensions

SSC2.25
(MSSC2.25 similar)SSC4.25
(LSSC4.25 and
MSSC4.25 similar)SSC6.25
(LSSC6.25 and
MSSC6.25 similar)

SSC Supplemental Information

The following SSC supplemental information is given to help designers with value-engineered solutions for our SSC connectors. Loads are given for fastener patterns other than our standard “min.” (fill all round holes) and “max.” (fill all round and triangle holes). The tables give service, ASD, LRFD and nominal loads.

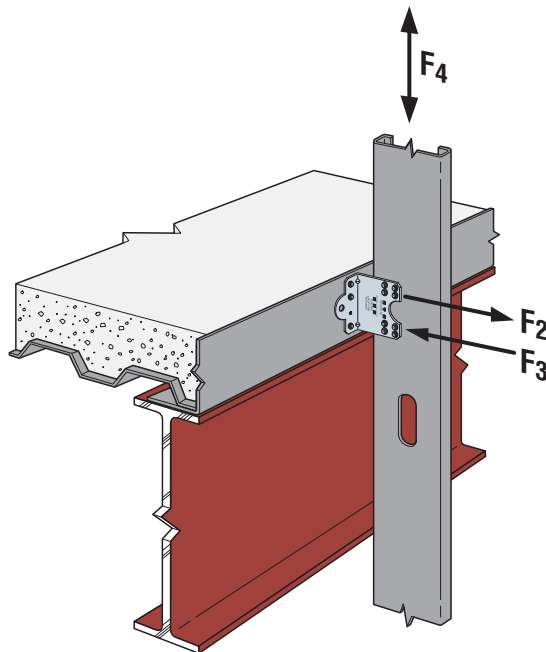
Table 1: SSC Screw Patterns

SSC2.25, MSSC2.25	Pattern “Min.”	Pattern A	Pattern B
			
	Pattern C	Pattern D	Pattern E
			
LSSC4.25, SSC4.25, MSSC4.25	Pattern “Min.”	Pattern “Max.”	Pattern “Outer”
			
	Pattern F	Pattern G	Pattern H
			
			Pattern I
			
LSSC6.25 SSC6.25 MSSC6.25	Pattern “Min.”	Pattern “Max.”	Pattern “Outer”
			
	Pattern J	Pattern K	Pattern L
			
	Pattern M	Pattern N	Pattern O
			

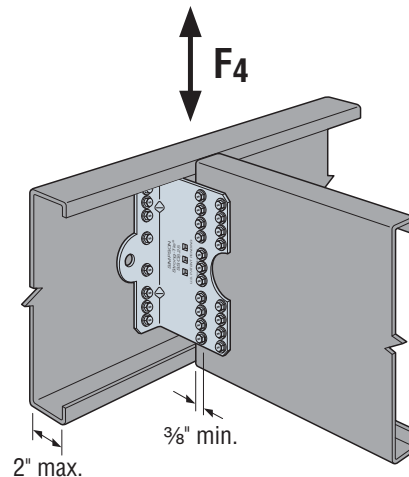
SSC Supplemental Information

Notes for Tables 2 and 3

1. Calculated values are per AISI RP15-2, AISI S-100, or generally accepted industry standards. Shaded values for F_4 are derived from test data. Whenever possible, unshaded F_4 values are based on the maximum calculated value and applicable tested value.
2. The tabulated values do not account for anchorage to the support. Anchor strength must be calculated separately and may reduce the capacity of the connection when compared to the tabulated values.
3. Tabulated values do not include shear, web crippling, buckling, or other local effects in the member. The designer must check member limit states separately.
4. For load combinations that include F_4 and/or F_2 and/or F_3 , use an appropriate interaction equation.
5. #10–16 screws shall have $P_{ss} \geq 1,620$ lb. Calculated values are per AISI S-100. Screws must be installed with three (min.) exposed threads.
6. The number of screws is for one clip leg that is attached to the supported stud.
7. For the minimum screw pattern, fill all round holes. For the maximum screw pattern, fill all round and triangle holes. Reference p. 82.
8. In addition to calculations of net and gross section tension, and screw shear of the clip leg attached to the stud, F_2 values are also calculated for weak-axis bending of the anchored clip leg with the line of bending at the smaller anchor holes. The designer is responsible for calculating pullover, pullout, and tension strength of the anchors, and this may reduce F_2 strength compared to the tabulated values.
9. F_3 values are computed using the plate buckling provisions of AISI RP15-2.
10. For the F_4 calculated values, it's assumed that the connection eccentricity is taken by screws in the supported stud.
11. Service load limits for F_2 and F_3 are not given since there are no generally accepted industry methods available to compute these values. F_4 service load limits are based on AISI Research Report RP15-2 for $\frac{1}{8}$ " deflection or applicable test data.
12. For 50 ksi studs, 68 mil (14 ga.) and thicker, use tabulated values for 54 mil (16 ga.) — 50 ksi studs.



Installation Example #1 —
SSC4.25 Typical
Bypass Framing Installation



Installation Example #2 —
SSC6.25 Typical
Joist-to-Girder Installation

SSC Supplemental Information

Table 2: SSC Steel Stud Connectors (SSC2.25, MSSC2.25, LSSC4.25 and SSC4.25) — Allowable Loads (lb.)

Model No.	No. of #10 Screws	Screw Pattern	Stud Thickness and Yield Strength								
			33 mil (20 ga.) – 33 ksi			43 mil (18 ga.) – 33 ksi			54 mil (16 ga.) – 50 ksi		
			F ₂	F ₃	F ₄	F ₂	F ₃	F ₄	F ₂	F ₃	F ₄
SSC2.25	3	Min.	235	455	165	235	455	225	235	455	345
	2	A		330	65		355	100		355	195
	2	B		330	100		465	155		465	310
	3	C		495	165		600	225		600	345
	4	D		465	180		465	275		465	555
	6	E		600	230		600	360		600	690
MSSC2.25	3	Min.	475	495	165	475	765	225	475	785	345
	2	A	330	330	65		510	100		610	195
	2	B		330	100		510	155		810	310
	3	C	475	495	165		765	225		1,040	345
	4	D		660	180		810	275		810	555
	6	E		990	230		1,040	360		1,040	690
LSSC4.25	2	Min.	435	330	250	435	250	440	435	250	675
	5	Max.			610		610	440		610	725
	4	Outer			420		420	310		420	520
	4	F			250		250	460		250	670
	8	G			500		500	670		500	670
	11	H			610		610	670		610	670
	14	I			610		610	670		610	670
					670		670			670	
SSC4.25	2	Min.	330	330	355	510	350	525	660	350	890
	5	Max.	660	825	365	660	845	600		845	1,005
	4	Outer		580	235		580	330		580	625
	4	F		350	300		350	460		350	920
	8	G		695	495		695	765		695	980
	11	H		845	545		845	845		845	980
	14	I		845	675		845	980		845	980

See footnotes on p. 83.

Table 3: SSC Steel Stud Connectors (MSSC4.25, LSSC6.25, SSC6.25 and MSSC6.25) — Allowable Loads (lb.)

Model No.	No. of #10 Screws	Screw Pattern	Stud Thickness and Yield Strength											
			33 mil (20 ga.) – 33 ksi			43 mil (18 ga.) – 33 ksi			54 mil (16 ga.) – 50 ksi					
			F ₂	F ₃	F ₄	F ₂	F ₃	F ₄	F ₂	F ₃	F ₄			
MSSC4.25	2	Min.	330	330	355	510	510	525	1,020	605	890			
	5	Max.	825	825	365	1,275	1,275	600	1,340	1,465	1,005			
	4	Outer	660	660	235	1,020	1,010	330		1,010	625			
	4	F		605	300		605	920						
	8	G	1,320	1,210	495	1,340	1,210	765		1,210	1,525			
	11	H	1,340	1,465	545		1,465	845		1,465	1,615			
	14	I		1,465	675		1,465	1,045		1,465	1,615			
LSSC6.25	4	Min.	640	500	265		640	500	660	640	500	1,190		
	7	Max.		880	265	880		660	880		1,190			
	6	Outer		630	270	630		375	630		695			
	4	J		250	405	250		625	250		1,015			
	8	K		500	730	500		895	500			1,015		
	12	L		750	975	750			750					
	16	M		895	1,015				895				1,015	
	19	N												
	22	O												
SSC6.25	4	Min.	975	660	660	385	975	695	720	975	695	1,190		
	7	Max.		975	1,155	385		1,220	720		1,220	1,190		
	6	Outer		975	870	270		870	460		870	725		
	4	J		660	350	405		350	625		350	1,255		
	8	K		695	730	695		1,130	695		1,485			
	12	L		1,045	975	1,045		1,485	1,045		1,485			
	16	M		1,245	1,140	1,245		1,485	1,245		1,485			
	19	N		1,245	1,210	1,245		1,485	1,245		1,485			
	22	O		1,245	1,350	1,245		1,485	1,245		1,485			
MSSC6.25	4	Min.	660	660	385	1,020	1,020	720	1,970	1,210	1,190			
	7	Max.	1,155	1,155	385	1,785	1,785	720		2,115	1,365			
	6	Outer	990	990	270	1,530	1,515	460		1,515	725			
	4	J	660	605	405	1,020	605	625		605	1,255			
	8	K	1,320	1,210	730	1,970	1,210	1,130		1,210	2,265			
	12	L	1,970	1,810	975		1,810	1,510		1,810	2,160	2,590		
	16	M			1,140			1,765						
	19	N		2,160	1,210		2,160	1,870						
	22	O		1,350			2,085							

See footnotes on p. 83.

SFC Steel Framing Connectors / SSC Steel-Stud Connectors

SFC/SSC Connectors – U-Channel Bridging Allowable Loads

Model No.	Connector Material Thickness mil (ga.)	Clip Length (in.)	Stud Depth (in.)	Stud Thickness mil (ga.)	Fasteners ^{1,5}		Laterally Loaded C-Stud Allowable Torsional Moment ² (in.-lb.)	Axially Loaded C-Stud		Code Ref.
					Stud	Bridging		Allowable Brace Strength ^{2,3} (lb.)	Brace Stiffness ⁴ (lb./in.)	
SFC4.25	54 (16)	4¼	6	33 (20)	(2) #10	(2) #10	275	125	860	IBC
				43 (18)	(2) #10	(2) #10	510	190	1,220	
				54 (16)	(2) #10	(2) #10	645	280	2,045	
LSSC4.25	54 (16)	4¼	6	54 (16)	(2) #10	(2) #10	1,085	180	165	
SSC4.25	68 (14)	4¼	6	54 (16)	(2) #10	(2) #10	655	280	2,045	
				68 (14)	(2) #10	(2) #10	805	335	2,305	
				97 (12)	(2) #10	(2) #10	920	660	4,230	
LSSC6.25	54 (16)	6¼	8, 10, 12	54 (16)	(2) #10	(2) #10	1,085	180	685	

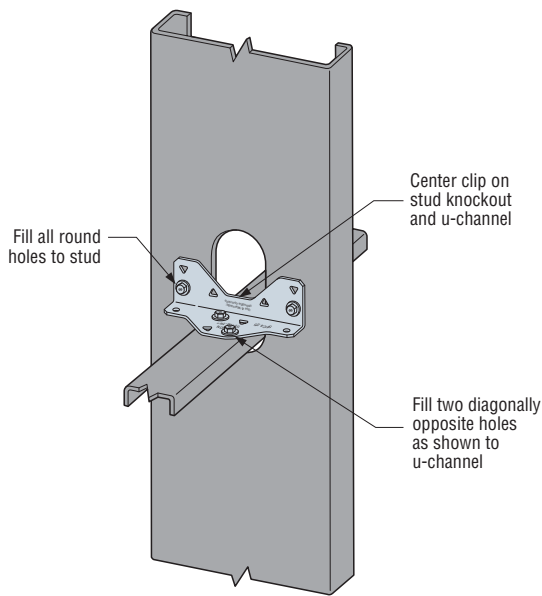
1. See illustrations for fastener placement.

2. Allowable loads are for use when utilizing Allowable Stress Design methodology. For LRFD loads, multiply the tabulated ASD values by 1.6.

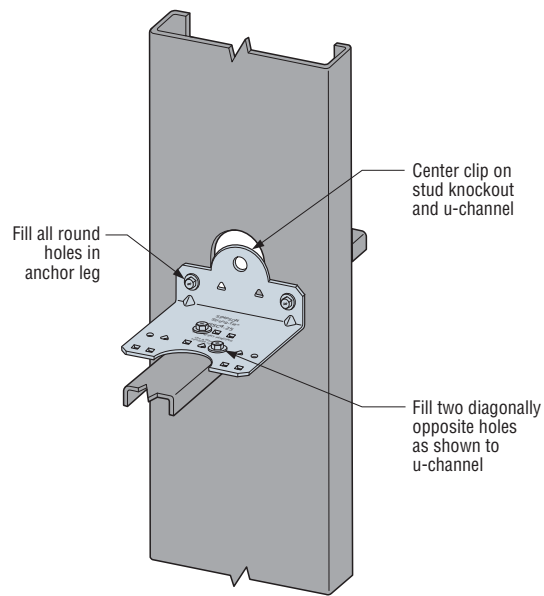
3. Allowable brace strengths are based on ultimate test load divided by a safety factor. Serviceability limit is not considered, as brace stiffness requirements are given in Section D3.3 of AISI S100. Contact Simpson Strong-Tie if nominal brace strength is required.

4. Tabulated stiffness values apply to both ASD and LRFD designs.

5. See *Fastening Systems* catalog (C-F-2019) on strongtie.com for more information on Simpson Strong-Tie fasteners.



Typical SFC4.25 Installation



Typical SSC4.25 Installation