

## Product Application

The StiffClip® LB series connects exterior wall studs to the building's structure through a unique design incorporating the use of stiffened legs of a 90° angle to increase bending strength. StiffClip® LB resists horizontal and vertical loads. The allowable design load table shown below is based on the use of StiffClip® LB as it is attached to various steel stud depths, material thicknesses and yield strengths. Design loads consider loads on the clip and #12 screw fasteners to the stud web. Pre-drilled guide holes in each leg allow for greater installation efficiency.

## Material Composition

Steel: ASTM A1003/A1003M Structural Grade 50 (340) Type H, ST50H (ST340H): 50ksi (340MPa) minimum yield strength, 65ksi (450MPa) minimum tensile strength, 68mil minimum thickness (14 gauge, 0.0713" design thickness) with ASTM A653/A653M G90 (Z275) hot dipped galvanized coating.

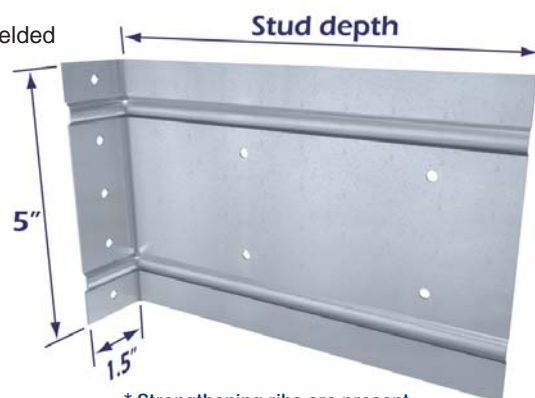
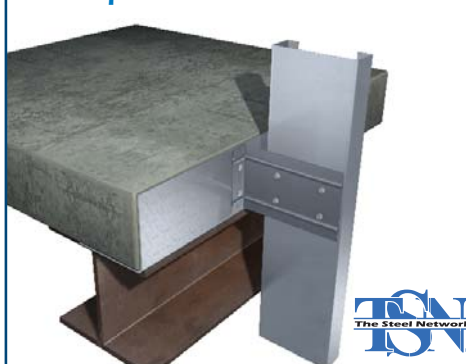
The attachment of StiffClip® to the structure may be made with either a PAF or weld and is dependent upon base material properties and the design configuration.

Allowable load tables incorporate eccentric loading of fasteners. Values with a welded connection may increase.

Note:

- ◆ For PAF's, fasten within ¾" from the angle heel centerline of the 1½" leg.
- ◆ Guide holes for attachment to structure are .172" in diameter for LB362, .141" in diameter for LB800 and LB600.

## StiffClip® LB



\* Strengthening ribs are present in 3 5/8", 6", and 8" sizes.

## StiffClip® LB Installation



Secure LB to pour stop with engineered attachment.



Connect clip to stud with required number of screws

## StiffClip® LB Nomenclature

StiffClip® LB is available for various stud depths. To specify, multiply stud depth by 100.

Example: 6" stud depth  
Designate: StiffClip® LB600.

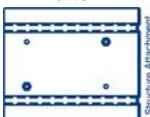
## StiffClip® LB Value

- ◆ Various lengths allow for construction tolerance
- ◆ Guide holes for attachment to structure and stud
- ◆ Replaces expensive bracing
- ◆ Structurally load tested

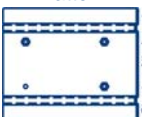
## Quantity / Order Information

Designation	Qty/Box	Lbs/Box	Pcs/Skid	Lbs/Skid
LB362/400	50	30	2250	1350
LB600	50	45	2250	2025
LB800	50	50	1600	1600
LB1000	25	40	1125	1800
LB1200	25	44	800	1408

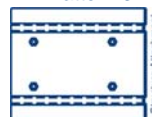
Pattern 1



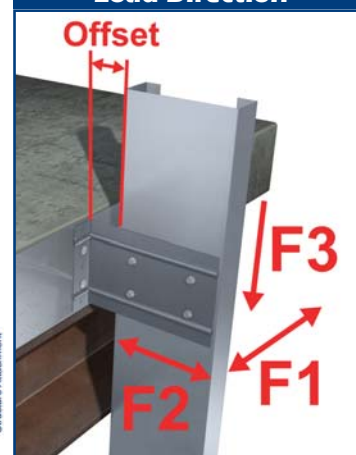
Pattern 2



Pattern 3



## Load Direction



## Allowable Loads

StiffClip® Series	Stud Thickness Mils (ga)	Fy (Yield) Stud (ksi)	LB362 and LB600				LB362			LB600 (Standard 1" Offset)		
			F1 w/ 3 #12 Screws Pattern 2 (lbs)	F2 w/ 2 #12 Screws Pattern 1 (lbs)	F2 w/ 3 #12 Screws Pattern 2 (lbs)	F2 w/ 4 #12 Screws Pattern 3 (lbs)	F3 w/ 2 #12 Screws Pattern 1 (lbs)	F3 w/ 3 #12 Screws Pattern 2 (lbs)	F3 w/ 4 #12 Screws Pattern 3 (lbs)	F3 w/ 2 #12 Screws Pattern 1 (lbs)	F3 w/ 3 #12 Screws Pattern 2 (lbs)	F3 w/ 4 #12 Screws Pattern 3 (lbs)
LB Series Clip is 14ga (68mils)	33 (20)	33	190	376	477	752	235	350	468	216	373	431
	33 (20)	50	275	544	689	1089	340	506	678	313	539	623
	43 (18)	33	248	560	709	1120	350	522	697	322	555	641
	43 (18)	50	359	810	1025	1620	506	753	1009	466	802	928
	54 (16)	33	312	788	988	1576	493	733	981	453	781	902
	54 (16)	50	450	1138	1441	1954	711	1059	1417	654	1128	1303
	68 (14)	50	568	1610	1954	1954	1006	1498	2004	926	1594	1843
	97 (12)	50	768	1698	1954	1954	1061	1579	2114	976	1681	1923

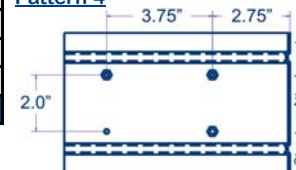
Allowable Loads			Clip thickness is 14ga (68mil).									
StiffClip® Series	Stud Thickness Mils (ga)	Fy (Yield) Stud (ksi)	LB800 (Standard 2" Offset)							LB800, 4" Offset		
			F1 w/ 3 #12 Screws Pattern 4 (lbs)	F2 w/ 3 #12 Screws Pattern 4 (lbs)	F2 w/ 4 #12 Screws Pattern 5 (lbs)	F3 w/ 3 #12 Screws Pattern 4 (lbs)	F3 w/ 4 #12 Screws Pattern 5 (lbs)	F3 w/ 6 #12 Screws Pattern 6 (lbs)	F3 w/ 10 #12 Screws Pattern 7 (lbs)	F3 w/ 4 #12 Screws Pattern 8 (lbs)	F3 w/ 6 #12 Screws Pattern 9 (lbs)	F3 w/ 8 #12 Screws Pattern 10 (lbs)
LB800 Series Clip is 14ga (68mils)	33 (20)	33	190	535	752	320	370	534	793	259	331	417
	33 (20)	50	275	773	1089	463	536	773	1149	376	479	604
	43 (18)	33	248	796	1120	477	552	795	1182	386	493	622
	43 (18)	50	322	1150	1620	689	798	1150	1710	559	713	899
	54 (16)	33	322	1120	1576	670	776	1119	1663	544	693	875
	54 (16)	50	322	1617	1954	968	1121	1616	2401	785	1001	1263
	68 (14)	50	322	1954	1954	1369	1586	2286	3397	1111	1417	1561
7 (12)		50	322	1954	1954	1443	1673	2411	3583	1172	1494	1561
Max. Allowable Clip Load			322	1954	1954	3863	3863	3863	3863	1561	1561	1561
StiffClip® Series	Stud Thickness Mils (ga)	Fy (Yield) Stud (ksi)	LB1000 & LB1200 (Standard 2" Offset)			LB1000 (Standard 2" Offset)			LB1200 (Standard 2" Offset)			
			F1 w/ 3 #12 Screws Pattern 12 (lbs)	F2 w/ 3 #12 Screws Pattern 12 (lbs)	F2 w/ 4 #12 Screws Pattern 13 (lbs)	F3 w/ 2 #12 Screws Pattern 11 (lbs)	F3 w/ 3 #12 Screws Pattern 12 (lbs)	F3 w/ 4 #12 Screws Pattern 13 (lbs)	F3 w/ 2 #12 Screws Pattern 11 (lbs)	F3 w/ 3 #12 Screws Pattern 12 (lbs)	F3 w/ 4 #12 Screws Pattern 13 (lbs)	
LB1000 & 1200 Series Clip is 14ga (68mils)	33 (20)	33	190	550	752	203	364	406	211	381	421	
	33 (20)	50	275	795	1062	294	525	588	305	550	610	
	43 (18)	33	248	819	1062	302	541	605	314	566	627	
	43 (18)	50	359	1062	1062	438	782	875	454	818	907	
	54 (16)	33	312	1062	1062	426	761	851	441	796	883	
	54 (16)	50	450	1062	1062	615	1099	1229	637	1150	1275	
	68 (14)	50	532	1062	1062	869	1554	1739	902	1627	1803	
	97 (12)	50	532	1062	1062	917	1639	1793	951	1715	1899	

StiffClip® Series	Stud Thickness Mils (ga)	Fy (Yield) Stud (ksi)	LB1000, 4" Offset		
			F3 w/ 4 #12 Screws Pattern 14 (lbs)	F3 w/ 6 #12 Screws Pattern 15 (lbs)	F3 w/ 10 #12 Screws Pattern 16 (lbs)
LB1000, 4" Offset (6" to stud and 4" distance from structure)	33 (20)	33	290	410	602
	33 (20)	50	419	593	871
	43 (18)	33	431	610	896
	43 (18)	50	624	883	1192
	54 (16)	33	607	859	1192
	54 (16)	50	876	1192	1192
	68 (14)	50	1192	1192	1192
	97 (12)	50	1192	1192	1192
Max. Allowable Clip Load			1192	1192	1192

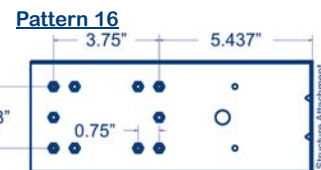
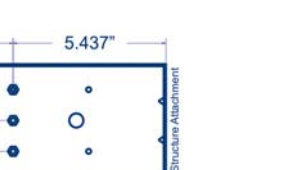
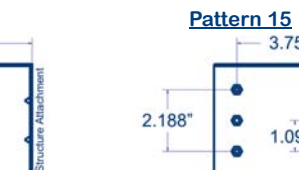
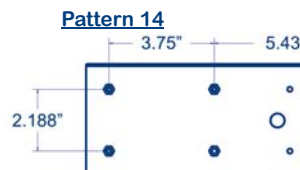
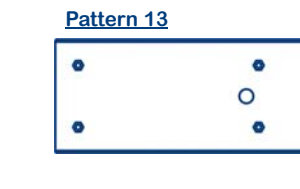
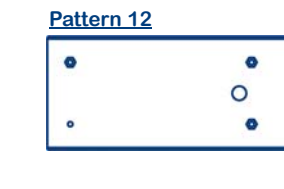
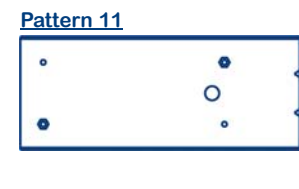
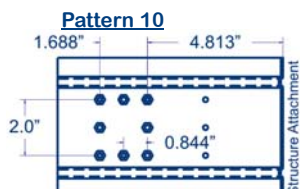
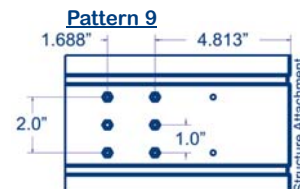
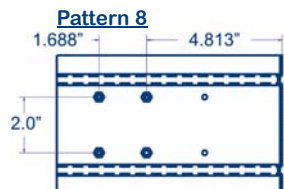
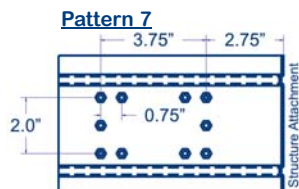
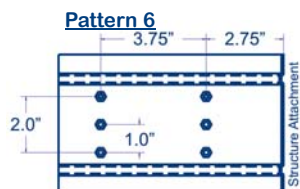
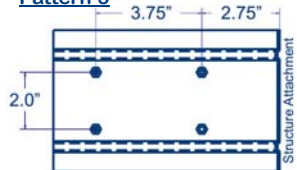
#### Important Notes:

- ◆ Allowable loads have not been increased for wind, seismic, or other factors.
- ◆ Loads listed reflect force in a single direction. When multiple loads react on the connection, it is the responsibility of the designer to check the interaction of forces.
- ◆ Torsional effects are considered on screw group for F2 & F3 allowable loads, it is assumed that half of the torsional moment is taken by the connection to the structure and half taken by the structure and half taken by the connection to the stud.
- ◆ StiffClip's LB1000 and LB1200 contain 1/2" return lips on the top and bottom of the leg attaching to the stud for increased stiffness.

Pattern 4



Pattern 5



**Important Consideration:** Pattern diagrams indicate fastener placement only. Each standard StiffClip® LB product comes with 4 guide holes to stud.