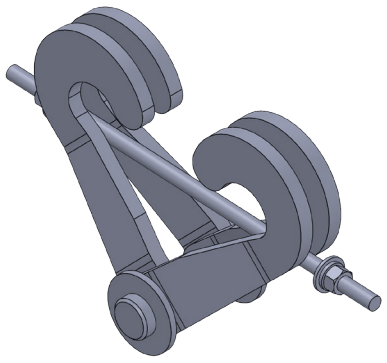
EMPIRE
INDUSTRIES, INC
(800) 243-4844
orders@empireindustries.com

FIG. 450
Heavy Beam Clamp

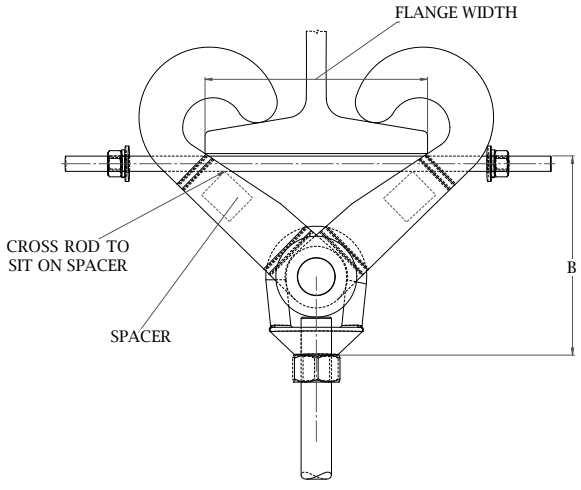


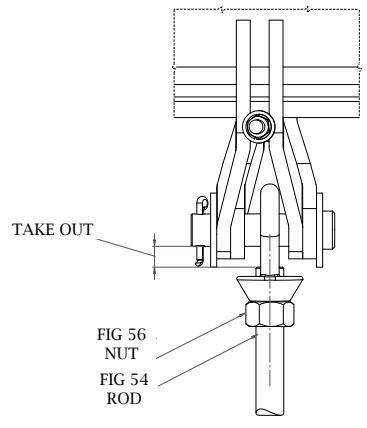
Materials/Finishes:	Plain Carbon Steel (450B)	Hot-Dip Galvanized (450HDG)
	T-316 Stainless Steel (450SX)	
Material/Finish Specifications	Carbon Steel meeting ASTM: A36.	
	Stainless Steel Type 316 meeting ASTM: A240.	
	Hot-Dip Galvanized meeting ASTM A123.	
	Electro-Zinc Hardware for Plain Carbon Steel (450B) meeting ASTM B633, or Hot-Dip Galvanized (450HDG) meeting ASTM A123.	
Variants:	With Weldless Eye Nut (450W).	
Service:	To hang piping with a single threaded rod from the bottom center of wide flange beams (W-shape) or similar shape. Provides vertical hanger rod adjustment.	
Max. Temp	650ºF for Black Carbon Steel and Stainless Steel	350ºF for Hot-Dip Galvanized Carbon Steel.
Approvals:	Complies with Federal Specification WW-H-171-E (Type# 28 without links, Type #29 with links), and Manufacturers' Standardization Society MSS SP-58 (Type# 28 without links, Type #29 with links).	
Ordering:	Specify figure number, material/finish, clamp size, rod size, flange width, flange thickness.	
Notes:	When ordering, flange width and flange thickness may be specified by the AISC W-shape or S-shape designation, e.g., W8x35.	
	Maximum load based on FIG. #54 Continuous Threaded Rod. Smaller rod sizes may be used. See FIG. #54 for load rating.	
	Installation: Prior to tightening, cross rod shall sit on both spacers. Tighten nuts until cross rod bends slightly. Lock washers may not flatten.	
	Stainless Steel only available in 3-6 sizes.	
	Hot-Dip Galvanized clamps use Electro-Galvanized Hardware.	
	Disassembly voids warranty	

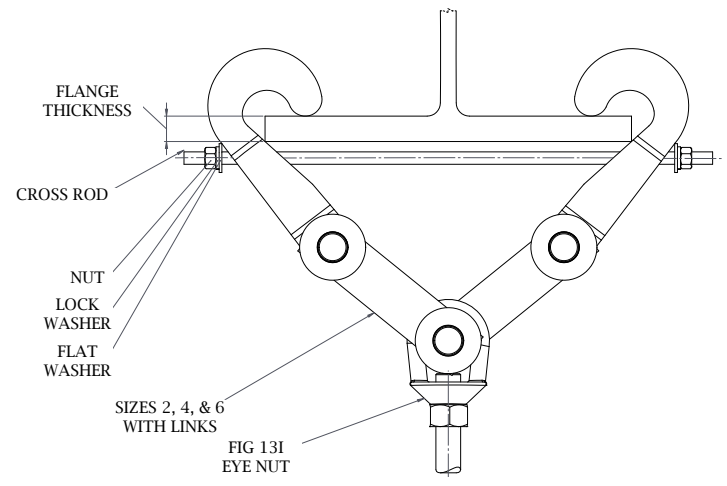
ROD SIZE	MAX REC LOAD (lbs)	EYE NUT WEIGHT (lbs)
3/8	730	0.69
1/2	1350	0.66
5/8	2160	0.59
3/4	3230	0.59
7/8	4480	1.60
1	5900	1.56
1 1/8	7420	3.74
1 1/4	9500	3.67
1 1/2	13800	3.51

SIZE	DIMENSION B (± 1/4)												
	FLANGE WIDTH												
	4	5	6	7	8	9	10	11	12	13	14	15	16
1	5 9/16	5 3/8	5 3/16	4 15/16	4 3/8	-	-	-	-	-	-	-	-
2	-	-	-	9 15/16	9 13/16	9 5/8	9 3/8	9 1/8	8 13/16	8 7/16	8 1/16	7 5/8	-
3	6 1/2	6 5/16	6 1/8	5 7/8	5 5/16	-	-	-	-		-	-	-
4	-	-	-	10 7/8	10 3/4	10 9/16	10 5/16	10 1/16	9 3/4	9 3/8	9	8 9/16	-
5	-	8 5/8	8 3/8	8 1/16	7 5/8	7 3/16	-	-	-	-	-	-	-
6	-	-	-	-	12 7/8	12 3/4	12 9/16	12 3/8	12 1/8	11 7/8	11 4/9	11 1/8	10 9/16

SIZE	MAX FLG. THX.	FLG WIDTH	MIN ROD	MAX ROD	TAKE OUT	BEAM CLAMP WEIGHT (lbs)
1	5/8	4 to 8	3/8	3/4	11/16	7.6
2	5/8	7 to 15	3/8	3/4	11/16	14.3
3	3/4	4 to 8	3/8	1	11/16	10.0
4	3/4	7 to 15	3/8	1	11/16	17.7
5	1	5 to 9	7/8	1 1/2	1 11/16	26.3
6	1	8 to 16	7/8	1 1/2	1 11/16	43.8







PROJECT INFORMATION			APPROVAL STAMP
Project:			Notes:
Address:			
Contractor:			
Engineer:			
Date:			
Approved	Approved as Noted	Not Approved	