

Fig. 142 (Formerly Afcon Fig. 920)

Coach Screw Rods Machine Threaded on Opposite End

Size Range: 3/8" and 1/2"

Material: Carbon steel

Finish: Plain or Zinc Plated

Ordering: Specify rod size, figure number, name and rod length.

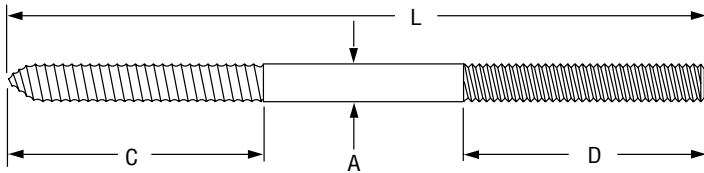


FIG. 142: STANDARD THREAD LENGTHS (IN) • LOADS (LBS)

Rod Size A	Standard Length - L	Coach Screw Thread Length - C	Standard Rod Thread Length - D	Max Load
3/8	3 1/2	2	3/4	390
	8		2 1/2	
1/2	3 1/2	2 7/16	3/4	640
	8		2 1/2	

Fig. 146 (Formerly Afcon Fig. 650)

Continuous Threaded Rod

Size Range: 1/4" through 1 1/2" Stocked in six, ten, and twelve foot lengths. Other even foot lengths can be furnished to order.

Material: Carbon steel or Stainless Steel Gr 304

Threads: National Coarse (USS), rod threaded complete length.

Finish: Plain or Zinc Plated (Hot-Dip Galvanized optional)

Maximum Temperature: Zinc Plated 450°F, Stainless Steel 650° F

Approvals: Complies with MSS SP-58.

Ordering: Specify rod diameter and length, figure number, name and finish.

Note: The acceptability of galvanized coatings at temperatures above 450°F is at the discretion of the end user.



**FIG. 146:
DIMENSIONS (IN) • LOADS (LBS) • WEIGHTS (LBS)**

Rod Size A	Threads per Inch	Max Load 650° F	Weight per Ft.
1/4	20	240	0.12
3/8	16	730	0.30
1/2	13	1,350	0.53
5/8	11	2,160	0.84
3/4	10	3,230	1.20
7/8	9	4,480	1.70
1	8	5,900	2.30
1 1/4	7	9,500	3.60
1 1/2	6	13,800	5.10

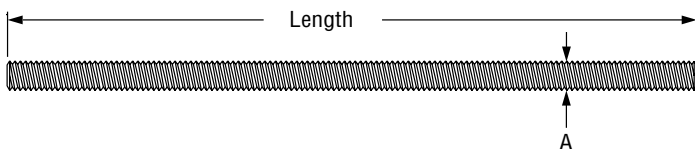


Fig. 148

Rod with Eye End

Size Range: 2 3/4" through 5"

Material: Carbon steel

Finish: Plain or Zinc Plated

Service: A large diameter rod with eye end for load ratings thru 184,000 pounds.

Ordering: Specify rod size, figure number, name, finish and "L" dimension. Indicate if desired thread length is other than standard.

Note: The acceptability of galvanized coatings at temperatures above 450°F is at the discretion of the end user.

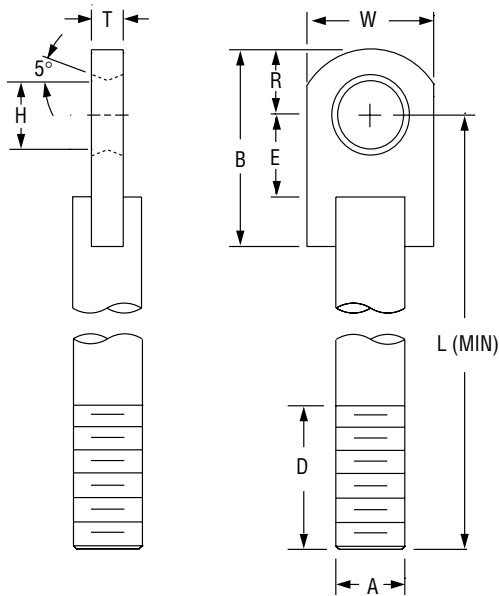


FIG. 148: DIMENSIONS (IN) • LOADS (LBS) • WEIGHTS (LBS)

Rod Size A	Max Load		Weight* Min Length	Weight/Ft. Additional Length	B	D	E	H	L (Min)	R	T	W	
	650° F	750° F											
2 3/4	49,400	38,687	35.9	20	9 5/8	12	3 3/4	3 1/8	19	3 5/8	1 1/2	6	
3	60,100	47,066	42.9	24	11		4	3 3/8	20	4			
3 1/4	71,900	56,307	54.7	28	12 1/4			3 5/8	21	4 1/4	7		
3 1/2	84,700	66,331	67.3	33	12 1/2	15	4 3/4	3 7/8	24	4 1/2	2	7 1/2	
3 3/4	98,500	77,139	80.0	37	13 3/8		5	4 1/8	25	4 7/8			
4	113,400	88,807	97.0	43	15 1/8			4 3/8	26	5 1/8			8 1/2
4 1/4 •	129,400	101,337	127.0	48	16 1/4	18	5 1/4	4 5/8	30	5 1/2	2 1/2	9 1/2	
4 1/2 •	146,600	114,807	131.0	54	16		5 3/4	4 7/8	31	5 3/4			8 1/2
4 3/4 •	164,700	128,982	154.0	60	17			5 1/8	31	6			9 1/2
5 •	184,000	144,096	175.0	67	17 3/8	6 1/4	5 3/8	32	6 3/8	10			

*Weight calculated with minimum "L" for standard thread • Furnished with 4 UN series threads

Fig. 140 (Formerly Afcon Fig. 660): Right-hand Threads

Fig. 253: Right and Left hand Threads

Machine Threaded Rods Threaded Both Ends

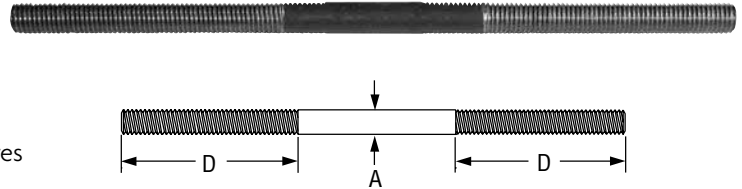
Size Range: $\frac{3}{8}$ " through 5"

Material: Carbon steel

Finish: Plain or Zinc Plated

Ordering: Specify rod size, figure number, name, rod length and finish. Specify thread length if other than standard.

Note: The acceptability of galvanized coatings at temperatures above 450°F is at the discretion of the end user.



Rod Size A	Threads per Inch	Max Load		Standard Rod Thread Length D*
		650° F	750° F	
$\frac{3}{8}$	16	730	572	2½
$\frac{1}{2}$	13	1,350	1,057	
$\frac{5}{8}$	11	2,160	1,692	
$\frac{3}{4}$	10	3,230	2,530	3
$\frac{7}{8}$	9	4,480	3,508	3½
1	8	5,900	4,620	4
1¼	7	9,500	7,440	5
1½	6	13,800	10,807	6
1¾	5	18,600	14,566	7
2	4½	24,600	19,265	8
2¼	4½	32,300	25,295	9
2½	4	39,800	31,169	10

Rod Size A	Threads per Inch	Max Load		Standard Rod Thread Length D*
		650° F	750° F	
2¾	4	49,400	38,687	11
3	4	60,100	47,066	12
3¼	4	71,900	56,307	13
3½	4	84,700	66,331	14
3¾	4	98,500	77,139	15
4	4	113,400	88,807	
4¼	4 UN	129,400	101,337	18
4½	4 UN	146,600	114,807	
4¾	4 UN	164,700	128,982	
5	4 UN	184,000	144,096	

*Fig. 140 rod up to 1" rod size and 24" in length may be furnished as Fig 146 rod unless order states that all thread rod is not acceptable.

Fig. 248 (Formerly Afcon Fig. 680): Right Hand Threads Eye Rod Not Welded

Fig. 248L: Left Hand Threads

Size Range: $\frac{3}{8}$ " through 2 ½"

Material: Carbon steel

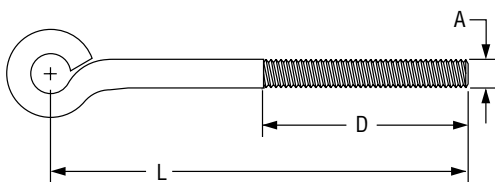
Finish: Plain or Zinc Plated

Maximum Temperature: 650° F

Features: Through 1 ½", inside diameter of eye will accommodate a bolt diameter $\frac{1}{8}$ " larger than rod diameter; 1 ¾" and larger, inside diameter of eye will take a bolt diameter $\frac{1}{4}$ " larger than rod diameter.

Ordering: Specify rod diameter, figure number, name, rod length and finish. Specify thread length if other than standard.

Note: The acceptability of galvanized coatings at temperatures above 450°F is at the discretion of the end user.



Rod Size A	Standard Rod Thread Length – D	L (min)	Max Load 650° F
$\frac{3}{8}$	2½	4¼	240
$\frac{1}{2}$		4½	705
$\frac{5}{8}$		5½	1,050
$\frac{3}{4}$	3	6½	1,470
$\frac{7}{8}$	4	7¼	1,940
1	5	8¼	3,120
1¼	6	10	4,650
1¾	7	12	6,380
2	8	14	8,280
2¼	9	15½	10,900
2½	10	17	13,400

Fig. 278 (Formerly Afcon Fig. 681): Right Hand Threads

Eye Rod Welded

Fig. 278L: Left Hand Threads

Size Range: $\frac{3}{8}$ " through $2\frac{1}{2}$ "

Material: Carbon steel

Finish: Plain or Zinc Plated

Features: Through $1\frac{1}{2}$ ", inside diameter of eye will accommodate a bolt diameter $\frac{1}{8}$ " larger than rod diameter; $1\frac{3}{4}$ " and larger, inside diameter of eye will take a bolt diameter $\frac{1}{4}$ " larger than rod diameter.

Maximum Temperature: 750° F

Ordering: Specify rod diameter, figure number, name, rod length and finish. Specify thread length if other than standard.

Note: The acceptability of galvanized coatings at temperatures above 450° F is at the discretion of the end user.



**FIG. 278, FIG. 278L:
DIMENSIONS (IN) • LOADS (LBS)**

Rod Size A	Standard Rod Thread Length - D	L (min)	Max Load	
			650° F	750° F
$\frac{3}{8}$	2½	4¼	730	572
$\frac{1}{2}$			1,350	1,057
$\frac{5}{8}$	3	4½	2,160	1,692
$\frac{3}{4}$		5½	3,230	2,530
$\frac{7}{8}$	3½	6½	4,480	3,508
1	4	7¼	5,900	4,620
1¼	5	8¼	9,500	7,440
1½	6	10	13,800	10,807
1¾	7	12	18,600	14,566
2	8	14	24,600	19,265
2¼	9	15½	32,300	25,295
2½	10	17	39,800	31,169

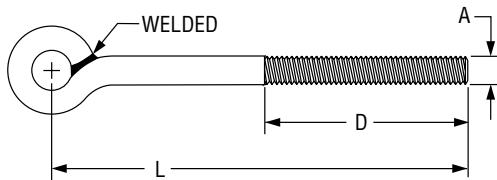


Fig. 248X: Not Welded

Linked Eye Rods

Fig. 278X: Welded



Size Range: $\frac{3}{8}$ " through $2\frac{1}{2}$ "

Service: The use of linked eye rods in a hanger assembly allows universal movement of the piping without bending and possible fracture of a straight rod.

Finish: Plain or Zinc Plated

Maximum Temperature: Fig. 248X: 650° F, Fig. 278X: 750° F

Ordering: Specify the size, length of each eye rod, figure number and finish.

Example:

$\frac{7}{8}$ " Fig. 278X linked welded eye rod consisting of:

(L1) $\frac{7}{8}$ " Fig. 278 welded eye rod 1 ft. $2\frac{1}{2}$ in. long, center to end.

(L2) $\frac{7}{8}$ " Fig. 278 welded eye rod 1 ft. $2\frac{1}{2}$ in. long center to end.

Note: The acceptability of galvanized coatings at temperatures above 450° F is at the discretion of the end user.

**FIG. 248X, 278X:
DIMENSIONS (IN) • LOADS (LBS)**

Rod Size A	Max Load		
	Fig. 248X 650° F	Fig. 278X	
		650° F	750° F
$\frac{3}{8}$	240	730	572
$\frac{1}{2}$	440	1,350	1,057
$\frac{5}{8}$	705	2,160	1,692
$\frac{3}{4}$	1,050	3,230	2,530
$\frac{7}{8}$	1,470	4,480	3,508
1	1,940	5,900	4,620
1¼	3,120	9,500	7,440
1½	4,650	13,800	10,807
1¾	6,380	18,600	14,566
2	8,280	24,600	19,265
2¼	10,900	32,300	25,295
2½	13,400	39,800	31,169

