

CHAIN SLINGS

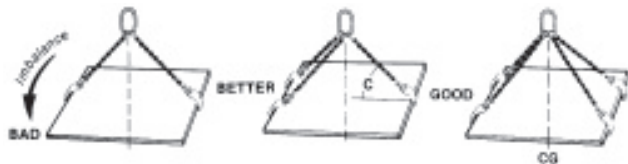
Recommended Chain Sling Use

Follow these Recommendations for Safer Chain Sling Use

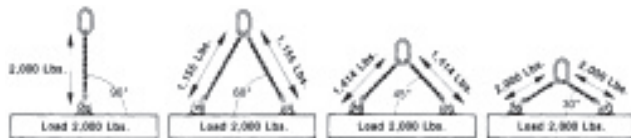
1. Visually examine the sling before each use. Look for stretched, gouged, bent or damaged links and components, including hooks, with opened throats, cracks or distortion. If damaged, remove from service.



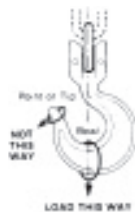
2. Know the load — determine the weight, center of gravity, angle of lift and select the proper size and type of sling.



3. Never overload the sling — check the working load limit on the identification tag. Always consider the effect of Angle of Lift — the tension on each leg of the sling is increased as the angle of lift, from horizontal, decreases. Use the charts in this catalog or in the Acco Chain Sling User's Manual for this purpose.



4. Do not point load hooks — load should bear on the bowl of hook.



5. Make sure chain is not twisted, knotted or kinked before lifting the load.



6. Slings should not be shortened with knots, bolts or other makeshift devices.



7. Protect chain with padding when lifting sharp edged loads.



8. Lift and lower loads smoothly, do not jerk.



9. Hands and fingers should not be placed between the sling and load while sling is being tightened around the load. When lifted, the load should not be pushed or guided by employee's hands directly on the load.



10. Do not expose A8A alloy chain or slings to temperatures above 500°F. (See Table next page.)

11. Protect chain slings from corrosion during storage.



12. Store slings properly on an A-Frame.

CHAIN SLINGS

Chain Sling Inspection

Daily Inspection — as shown in No. 1

Recommendations — should be conducted by a competent person designated by the employer.

Periodic Inspection — OSHA specifies that all alloy steel chain slings shall have a thorough periodic inspection, by a competent person, at least once every 12 months.

These inspections must be recorded and maintained for each individual sling.

The inspection schedule should be based on frequency of sling use, severity of service conditions, nature of lifts being made and experience gained on service life of slings used in similar circumstances.

Inspection —

1. Clean chain prior to inspection, to more easily see damage or defects.



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2. Hang chain vertically if practical, for preliminary inspection. Measure reach accurately (bearing point of master link to bearing point of hook). Check this length against reach shown on tag. If present length is greater than that shown on tag, there is a possibility that the sling has been subjected to overloading or excessive wear.



3. Make a link-by-link inspection of the chain slings for:
 - a. Excessive wear — If the wear on any portion of any link exceeds the allowable wear shown in Table of Wear remove from service.
 - b. Twisted, bent, gouged, nicked, worn or elongated links.
 - c. Cracks in the weld area of any portion of the link. Transverse markings are the most dangerous.
 - d. Severe corrosion.



Worn Links



Bent links

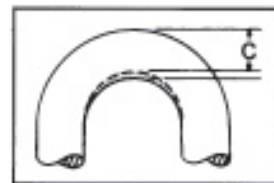


Gouged Links



Stretched Links

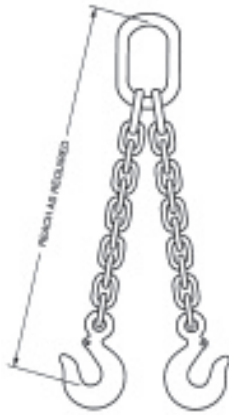
4. Check master links and hooks for all of the above faults — hooks especially for excessive throat opening. Slings showing any of the faults described above should immediately be removed from service and returned to the manufacturer for repair.



Certex offers a chain sling inspection service performed by our own qualified inspectors.

CHAIN SLINGS

Types of Chain Slings



How to Order

The following information should be given on orders or inquiries for chain slings.

1. **SIZE:** This is specified by the size of the material from which the chain is made, determined by working load limit required.
2. **REACH:** This is the length, including attachments, measured from bearing point to bearing point.
3. **TYPE:** Select and specify proper type of sling from list shown. EXAMPLES: S—single, O—oblong link, S—sling hook.
4. **ATTACHMENTS:** Unless otherwise specified standard master links and hooks as given herein will be used. When other than standard master links or hooks are required, we should be given a complete description or a drawing of the requested substitute.

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Single Chain Slings		
Attachments		
Type	One End	Opposite End
SG	Plain	Grab Hook
SOS	Oblong Link	Single Hook
SOG	Oblong Link	Grab Hook
SGS	Grab Hook	Sling Hook
SGG	Grab Hook	Grab Hook
SSS	Sling Hook	Sling Hook
SOF	Oblong Link	Foundry Hook
CO	Oblong Link	Oblong Link
Double Chain Slings		
DOS	Oblong Link	Sling Hooks
DOG	Oblong Link	Grab Hooks
DOF	Oblong Link	Foundry Hooks
DOP	Oblong Link	Plate Hooks
Triple Chain Slings		
TOS	Oblong Link	Sling Hooks
TOG	Oblong Link	Grab Hooks
TOF	Oblong Link	Foundry Hooks
Quadruple Chain Slings		
QOS	Oblong Link	Single Hooks
QOG	Oblong Link	Grab Hooks
QOF	Oblong Link	Foundry Hooks



WARNING

Failure to read, understand and follow the instructions, working load limits and specifications in this and other publications could result in serious injury or property damage.

CHAIN SLINGS

Single Chain Slings



CO



SOS** or SOSH



SOG



SOF



Choke Hook
Note: Not limited to Single Chain Sling Applications



Plain End
SG

CERTEX Cat. Ref. No.	Specifications			
	Size of Chain		Grade 80 Working Load Limits* Lbs. at 90°	Grade 100 Working Load Limits* Lbs. at 90°
	In.	mm		
CX-06-0132	9/32	7	3,500	4,300
CX-06-0133	3/8	10	7,100	8,800
CX-06-0134	1/2	13	12,000	15,000
CX-06-0135	5/8	16	18,100	22,600
CX-06-0136	3/4	20	28,300	35,300
CX-06-0137	7/8	22	34,200	42,700
CX-06-0138	1	26	47,700	—
CX-06-0139	1-1/4	32	72,300	—

Double Chain Slings



DOSH or DOS



DOF

CERTEX Cat. Ref. No.	Specifications			
	Size of Chain		Grade 80 Working Load Limits* Lbs. at 60°	Grade 100 Working Load Limits* Lbs. at 60°
	In.	mm		
CX-06-0132	9/32	7	6,100	7,400
CX-06-0133	3/8	10	12,300	15,200
CX-06-0134	1/2	13	20,800	26,000
CX-06-0135	5/8	16	31,300	39,100
CX-06-0136	3/4	20	49,000	61,100
CX-06-0137	7/8	22	59,200	74,000
CX-06-0138	1	26	82,600	—
CX-06-0139	1-1/4	32	125,200	—



*** WARNING**
Working Load Limits should not be exceeded. Do not point load hooks.

CHAIN SLINGS

Triple Chain Slings



TOSH or TOS
TOG (same as above with Grab Hooks)



TOF

CERTEX Cat. Ref. No.	Specifications			
	Size of Chain		Grade 80 Working Load Limits* Lbs. at 60°	Grade 100 Working Load Limits* Lbs. at 60°
	In.	mm		
CX-06-0147	9/32	7	9,100	11,200
CX-06-0148	3/8	10	18,400	22,900
CX-06-0149	1/2	13	31,200	39,000
CX-06-0150	5/8	16	47,000	58,700
CX-06-0151	3/4	20	73,500	91,700
CX-06-0152	7/8	22	88,900	110,900
CX-06-0153	1	26	123,900	–
CX-06-0154	1-1/4	32	187,000	–

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Quadruple Chain Slings



QOSH or QOS
QOG (same as above with Grab Hooks)



QOF
QOG (same as above with Grab Hooks)

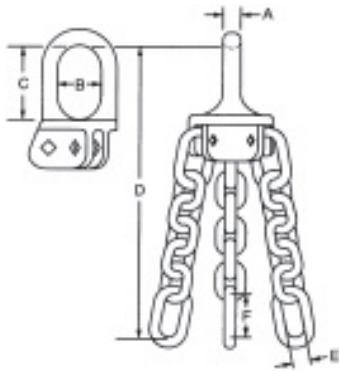
CERTEX Cat. Ref. No.	Specifications			
	Size of Chain		Grade 80 Working Load Limits* Lbs. at 60°	Grade 100 Working Load Limits* Lbs. at 60°
	In.	mm		
CX-06-0147	9/32	7	9,100	11,200
CX-06-0148	3/8	10	18,400	22,900
CX-06-0149	1/2	13	31,200	39,000
CX-06-0150	5/8	16	47,000	58,700
CX-06-0151	3/4	20	73,500	91,700
CX-06-0152	7/8	22	88,900	110,900
CX-06-0153	1	26	123,900	–
CX-06-0154	1-1/4	32	187,000	–



*** WARNING**
Working Load Limits should not be exceeded. Do not point load hooks.

CHAIN SLINGS

Steady-Lift Magnet Chains (3-Point Suspension)



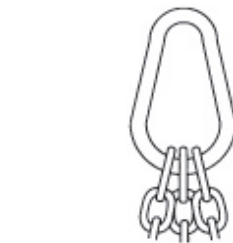
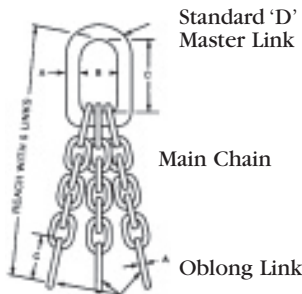
Eliminates Costly Down Time With Lift After Lift, Built-In Dependability

- Ease of Use — Designed so bail stands up while chain rests on floor, there is no wrestling with the bail for hook-up.
- Balanced Loading — Three point suspension offers superior stability.
- Wearability — Engineered and built for increased service life, with heat treated bail, pins, alloy chain and end links.
- Less Down Time — Easy inspection, replaceable pins, legs and bail mean more time on the job and fewer off-site repairs.

CERTEX Cat. Ref. No.	Specifications														
	Size of Chain	*W.L.L. Lbs.	No. of Links	A Mtl. Dia.	B Yoke Wth.	C Yoke Lgh.	D Vert. Reach	E End Link Wth.	F End Link Lgh.	G End Link Dia.	Comp. Assy. Wt. Lbs.	Yoke Wt. Lbs.	Chain Leg. Wt. Lbs.	Pin Wt. Lbs. Ea.	Magnet Diameter In.
CX06-0261	1	100,000	5	2-1/4	7	12	3' -7"	2-5/8	7	1-1/4	220	110	31	5.0	up to 60
CX06-0262	1-1/4	150,000†	7	2-1/2	7	12	4' -7"	2-3/4	7	1-1/2	350	155	60	5.5	60 and over

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Standard Magnet Chains



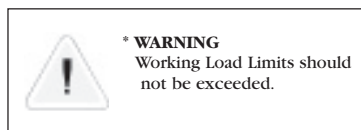
Pear Shape Master Link Optional



Handles Optional

CERTEX Cat. Ref. No.	Chain Size		Working Load Limit* Lbs. at 60°	Specifications						5 Link Reach In.	Magnet Diameter In.
				Master Link			Oblong Link				
	In.	mm		A Dia. Mtl. In.	B Inside Width In.	C Inside Length In.	A Dia. Mtl. In.	B Inside Width In.	C Inside Length In.		
CX06-0263	5/8	16	47,000	1-3/4	6	10-1/2	3/4	2-1/8	6	32-1/2	up to 40/
CX06-0264	3/4	20	73,500	2	6	10-1/2	7/8	2-1/8	6	35	up to 45
CX06-0265	7/8	22	88,900	2-1/8	6	10-1/2	1	2-1/8	6	36	up to 48
CX06-0266	1	26	123,900	2-1/4	6-1/2	11-1/4	1-1/4	2-3/4	7	40	up to 60
CX06-0267	1-1/4	32	187,800	2-1/2	6-1/2	12-3/4	1-1/2	2-3/4	7	45-1/2	60 and over

† Values shown are grade 63, embossed 'AS'



CHAIN SLING FITTINGS

Oblong Master Link

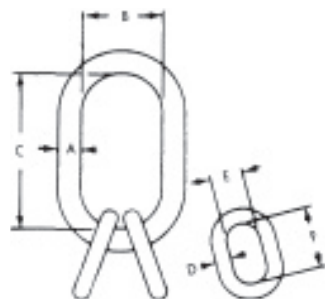


Working load limit (lbs.)*	CERTEX Cat. Ref. No.	Link size (inches)			Type & size of chain sling on which used				Weight each (lbs.)
		Diameter material A	Inside width B	Inside length C	Single type S & C	Double type D	Triple type T	Quad type Q	
3,600	CX06-0268	13/32	1 1/2	3	7/32	7/32	—	—	.33
6,100	CX06-0269	1/2	2 1/2	5	9/32	9/32	7/32	7/32	.8
12,300	CX06-0270	3/4	2 3/4	5 1/2	3/8	3/8	9/32	9/32	2.1
20,800	CX06-0271	1	3 1/2	7	1/2 or 5/8	1/2	3/8	3/8	4.6
31,300	CX06-0272	1 1/4	4 3/8	8 3/4	3/4	5/8	1/2	1/2	9.2
49,000	CX06-0273	1 1/2	5 1/4	10 1/2	7/8	3/4	5/8	5/8	15.7
73,500	CX06-0274	1 3/4	6	12	1	7/8	3/4	3/4	24.5
88,900	CX06-0275	2	7	14	1 1/4	1	7/8	7/8	37.3
125,200	CX06-0276	2 1/4	8	16	—	1 1/4	1	1	54.0
187,800	CX06-0277	2 3/4	9	16	—	—	1 1/4	1 1/4	84.8

† Working load limit of master link only.

Oblong Master Link Sub-Assembly**

For triple and quad branch chain slings

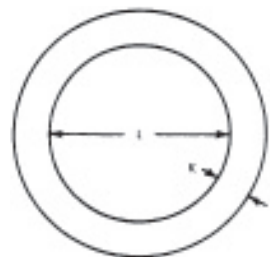


Oblong master link size (inches)			CERTEX Cat. Ref. No.	Master coupling link size (inches)			Weight (lbs.)	HA chain (in.)
A	B	C		D	E	F		
1/2	2 1/2	5	CX06-0278	11/32	5/8	1 1/8	1.0	7/32
3/4	2 3/4	5 1/2	CX06-0279	15/32	7/8	1 9/16	2.6	9/32
1	3 1/2	7	CX06-0280	21/32	1 1/4	2 1/4	6.1	3/8
1 1/4	4 3/8	8 3/4	CX06-0281	29/32	1 3/4	3 1/8	13.3	1/2
1 1/2	5 1/4	10 1/2	CX06-0282	1 5/32	2 1/4	4	24.3	5/8
1 3/4	6	12	CX06-0283	1 9/32	2 3/8	4 3/8	36.1	3/4
2	7	14	CX06-0284	1 17/32	2 3/4	5 1/4	57.4	7/8
2 1/4	8	16	CX06-0285	1 25/32	3	6	83.9	1
2 3/4	9	16	CX06-0286	2 1/32	3 1/2	7	129.7	1 1/4

** Consisting of oblong master link and two welded master coupling links.

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Master Ring



Working load limit (lbs.)*	CERTEX Cat. Ref. No.	Ring size (inches)		Type & size of chain sling on which used				Weight each (lbs.)
		Diameter material K	Inside dia. of ring L	Single type S & C	Double type D	Triple type T	Quad type Q	
3,500	CX06-0287	1/2	2 1/2	9/32	—	—	—	.5
6,100	CX06-0288	5/8	3	—	9/32	—	—	1.0
9,100	CX06-0289	3/4	4	3/8	—	9/32	9/32	1.8
12,300	CX06-0290	7/8	4	—	3/8	—	—	2.6
18,400	CX06-0291	1	4	1/2	—	3/8	3/8	3.4
20,800	CX06-0292	1 1/4	5	5/8 or 3/4	1/2	—	—	6.9
31,300	CX06-0293	1 1/2	6	7/8	5/8	1/2	1/2	11.7
49,000	CX06-0294	1 3/4	7	1	3/4	5/8	5/8	18.6
73,500	CX06-0295	2	8	—	7/8	3/4	3/4	27.9
88,900	CX06-0296	2 1/4	9	1 1/4	1	7/8	7/8	39.9

† Working load limit of master link only.

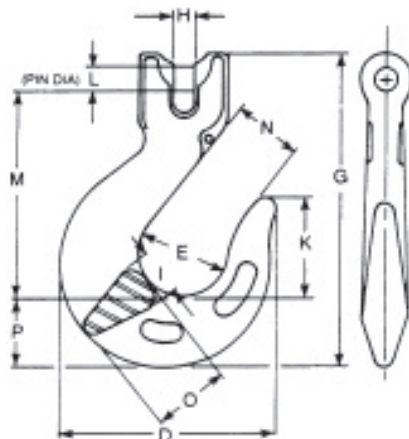
*** WARNING**

- Do not exceed working load limit.
- Use only alloy chain and attachments for overhead lifting.

CHAIN SLING FITTINGS

Columbus McKinnon Corporation

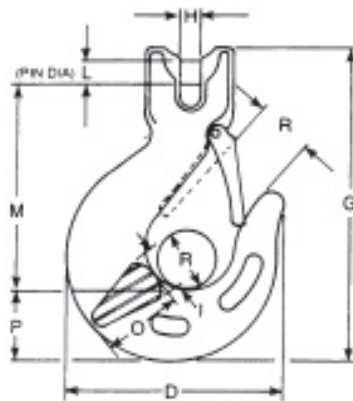
Clevlok® Sling Hook Without Latch**




CERTEX Cat. Ref. No.	Chain size		Working load limit (lbs.)*	Dimensions (inches)											Weight each (lbs.)
	(in.)	(mm)		D	E	G	H	I	K	L	M	N	O	P	
CX06-0346	9/32	7	3,500	3.500	1.500	5.156	0.328	0.734	1.594	0.357	3.437	1.187	1.203	1.051	0.64
CX06-0347	3/8	10	7,100	4.343	1.875	6.672	0.453	0.953	2.187	0.507	4.468	1.437	1.453	1.281	1.91
CX06-0348	1/2	13	12,000	5.500	2.250	8.000	0.593	1.172	2.562	0.625	5.265	1.781	1.938	1.656	4.33
CX06-0349	5/8	16	18,100	6.281	2.625	9.687	0.750	1.438	2.281	0.750	6.078	2.031	2.375	2.188	5.20
CX06-0350	3/4	20	28,300	7.827	3.000	11.688	0.875	1.688	3.437	0.906	7.344	2.500	2.828	2.563	11.40

** Latches available either as an option or in kit form.
User must determine whether latch is required on the hook.

Clevlok® Sling Hook With Latch



CERTEX Cat. Ref. No.	Chain size		Working load limit (lbs.)*	Dimensions (inches)											Weight each (lbs.)
	(in.)	(mm)		D	G	H	I	L	M	O	P	R			
CX06-0351	9/32	7	3,500	3.500	5.156	0.328	0.734	0.357	3.437	1.203	1.051	1.062	0.80		
CX06-0352	3/8	10	7,100	4.343	6.672	0.453	0.953	0.507	4.468	1.453	1.281	1.312	2.03		
CX06-0353	1/2	13	12,000	5.500	8.000	0.593	1.172	0.625	5.265	1.938	1.656	1.562	4.50		
CX06-0354	5/8	16	18,100	6.281	9.687	0.750	1.438	0.750	6.078	2.375	2.188	1.750	6.50		
CX06-0355	3/4	20	28,300	7.827	11.688	0.875	1.688	0.906	7.344	2.828	2.563	2.187	11.80		



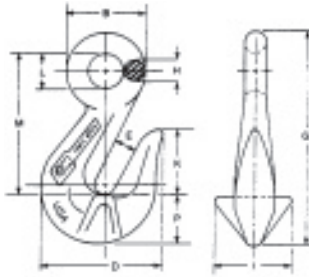
*** WARNING**

- Do not exceed working load limit.
- Use only alloy chain and attachments for overhead lifting.

CHAIN SLING FITTINGS

Columbus McKinnon Corporation

Cradle Grab® Hook

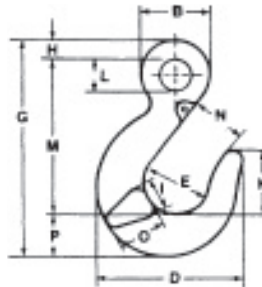


CERTEX Cat. Ref. No.	Chain size		Working load limit (lbs.)*	Dimensions (inches)										Weight each (lbs.)
	(in.)	(mm)		B	D	E	G	H	I	K	L	M	P	
CX06-0356	7/32	5.5	2,100	1.19	1.75	0.36	2.69	0.38	1.19	0.96	0.63	1.63	.70	0.35
CX06-0357	9/32	7	3,500	1.38	1.81	0.36	3.44	0.38	1.19	0.99	0.63	2.36	.70	0.40
CX06-0358	3/8	10	7,100	1.78	2.63	0.45	4.67	0.50	1.75	1.48	0.78	3.11	1.06	1.06
CX06-0359	1/2	13	12,000	2.28	3.34	0.59	5.86	0.63	1.88	1.98	1.03	3.94	1.30	2.26
CX06-0360	5/8	16	18,100	2.75	4.08	0.75	7.13	0.75	2.25	2.63	1.25	4.78	1.59	4.36
CX06-0361	3/4	20	28,300	3.19	4.88	0.88	8.25	0.88	2.88	3.06	1.44	5.50	1.88	6.70
CX06-0362	7/8	22	34,200	3.75	5.69	1.00	9.63	1.00	3.00	3.75	1.75	6.50	2.12	10.40
CX06-0363	1	26	47,700	4.31	7.00	1.19	12.44	1.22	3.88	4.31	1.88	8.09	3.12	20.90
CX06-0364	1 1/4†	32	72,300	5.38	8.25	1.50	15.56	1.56	2.50	5.50	2.25	10.50	3.50	40.00

† Not cradle type.

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Sling Hook** Without Latch



CERTEX Cat. Ref. No.	Chain size		Working load limit (lbs.)*	Dimensions (inches)												Weight each (lbs.)
	(in.)	(mm)		B	D	E	G	H	I	K	L	M	N	O	P	
CX06-0365	7/32	5.5	2,100	—	3.31	1.44	4.30	0.38	0.78	1.25	0.75	3.06	1.25	1.00	0.86	0.7
CX06-0366	9/32	7	3,500	1.62	3.50	1.50	5.25	0.44	0.73	1.59	0.75	3.75	1.19	1.20	1.05	1.1
CX06-0367	3/8	10	7,100	2.06	4.34	1.88	6.64	0.56	0.95	2.19	0.94	4.78	1.44	1.45	1.28	1.9
CX06-0368	1/2	13	12,000	2.63	5.50	2.25	8.16	0.75	1.17	2.56	1.13	5.69	1.78	1.94	1.66	4.5
CX06-0369	5/8	16	18,100	3.06	6.34	2.63	9.66	0.88	1.44	2.63	1.31	6.50	2.03	2.38	2.19	7.3
CX06-0370	3/4	20	28,300	3.50	7.83	3.00	11.38	1.00	1.69	3.44	1.50	7.81	2.50	2.83	2.51	11.4
CX06-0371	7/8	22	34,200	3.88	8.59	3.38	12.72	1.09	1.94	3.88	1.69	8.75	2.78	3.22	2.84	18.1
CX06-0372	1	26	47,700	4.31	9.59	4.00	14.23	1.22	2.14	4.25	1.88	9.88	3.13	3.55	3.09	22.6
CX06-0373	1 1/4	32	72,300	5.31	11.56	4.66	17.00	1.50	2.62	4.64	2.31	11.50	3.88	4.25	3.89	36.0

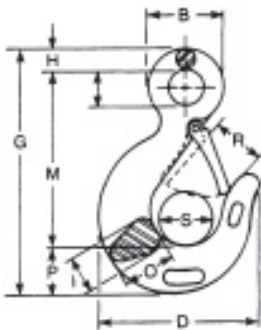
** Available from stock with/without latch.
Replacement latch kits are also available.
User must determine if latch is required on the hook.

- * **WARNING**
- Do not exceed working load limit.
- Use only alloy chain and attachments for overhead lifting.

CHAIN SLING FITTINGS

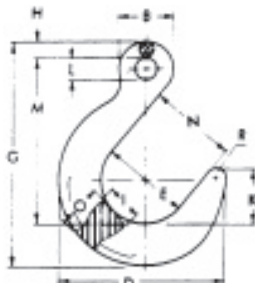
Columbus McKinnon Corporation

Sling Hook With Latch



CERTEX Cat. Ref. No.	Chain size		Working load limit (lbs.)*	Dimensions (inches)														Weight each (lbs.)
	(in.)	(mm)		B	D	E	G	H	I	K	L	M	N	O	P	R		
CX06-0374	7/32	5.5	2,100	—	3.31	1.44	4.30	0.38	0.78	1.25	0.75	3.06	1.25	1.00	0.86	1.11	0.7	
CX06-0375	9/32	7	3,500	1.63	3.50	1.50	5.25	0.44	0.73	1.59	0.75	3.75	1.19	1.20	1.05	1.06	1.1	
CX06-0376	3/8	10	7,100	2.06	4.34	1.88	6.64	0.56	0.95	2.19	0.94	4.78	1.44	1.45	1.28	1.31	1.9	
CX06-0377	1/2	13	12,000	2.63	5.50	2.25	8.16	0.75	1.17	2.56	1.13	5.69	1.78	1.94	1.66	1.56	4.5	
CX06-0378	5/8	16	18,100	3.06	6.34	2.63	9.66	0.88	1.44	2.63	1.31	6.50	2.03	2.38	2.19	1.75	7.3	
CX06-0379	3/4	20	28,300	3.50	7.83	3.00	11.38	1.00	1.69	3.44	1.50	7.81	2.50	2.83	2.51	2.19	11.4	
CX06-0380	7/8	22	34,200	3.88	8.59	3.38	12.72	1.09	1.94	3.88	1.69	8.75	2.78	3.22	2.84	2.38	18.1	
CX06-0381	1	26	47,700	4.31	9.59	4.00	14.23	1.22	2.14	4.25	1.88	9.88	3.13	3.55	3.09	2.78	22.6	
CX06-0382	1 1/4	32	72,300	5.31	11.28	4.66	17.00	1.50	2.62	4.64	2.31	11.50	3.88	4.25	3.89	3.41	36.0	

Foundry Hook



CERTEX Cat. Ref. No.	Chain size		Working load limit (lbs.)*	Dimensions (inches)													Weight each (lbs.)
	(in.)	(mm)		B	D	E	G	H	I	K	L	M	N	O	R		
CX06-0383	9/32	7	3,500	1.56	4.75	2.50	6.45	0.47	1.00	1.56	0.63	4.75	2.50	1.23	0.25	2.4	
CX06-0384	3/8	10	7,100	2.00	5.75	3.00	7.88	0.63	1.27	1.88	0.75	5.75	3.00	1.50	0.31	4.5	
CX06-0385	1/2	13	12,000	2.50	6.75	3.50	9.38	0.75	1.50	2.22	1.00	6.88	3.50	1.75	0.37	7.1	
CX06-0386	5/8	16	18,100	3.00	7.81	4.00	10.97	0.88	1.81	2.63	1.25	8.06	4.00	2.03	0.43	11.6	
CX06-0387	3/4	20	28,300	3.50	9.13	4.50	12.81	1.00	2.20	3.00	1.50	9.25	4.50	2.56	0.50	20.0	
CX06-0388	7/8	22	34,200	4.00	10.14	5.00	14.23	1.13	2.25	3.38	1.75	10.38	5.00	2.78	0.56	26.0	
CX06-0389	1	26	47,700	4.50	11.13	5.50	15.84	1.25	2.59	3.75	2.13	11.56	5.50	3.03	0.62	36.8	
CX06-0390	1 1/4	32	72,300	5.13	12.84	6.00	18.03	1.38	3.17	4.25	2.38	12.88	6.00	3.81	0.75	58.4	



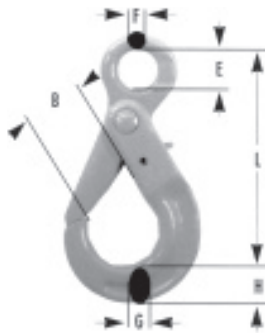
*** WARNING**

- Do not exceed working load limit.
- Use only alloy chain and attachments for overhead lifting.

CHAIN SLING FITTINGS

Gunnebo-Johnson Corp

Alloy BK Self Locking Hooks (Eye Type)



Latch closes automatically under load. Hook will not open under load.



The release trigger will only operate when hook is unloaded.

All three hooks are equipped with Stainless Steel springs.

Heat number identification allows full product traceability.

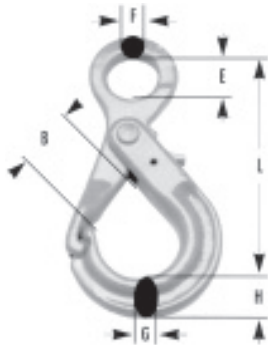
BK

CERTEX Cat. Ref. No.	Gunnebo-Johnson Code	Chain Size	Grade	Working Load Limit *(Lbs)	Dimensions (Inches)						Weight Each (Lbs)
					L	B	E	F	G	H	
CX06-0537	BK-6-10	7/32	100	2,700	4.3	1.1	.87	.39	.55	.75	.9
CX06-0538	BK-7/8-10	9/32	100	4,300	5.4	1.4	.99	.43	.67	.91	1.6
CX06-0539	BK-10-10	3/8	100	8,800	6.6	1.7	1.3	.51	.98	1.1	3.3
CX06-0540	BK-13-10	1/2	100	15,000	8.2	2.1	1.6	.63	1.1	1.5	5.9
CX06-0541	BK-16-10	5/8	100	22,600	10.0	2.5	2.0	.79	1.5	1.9	12.0
CX06-0542	BK-18/20-8	3/4	100	35,300	12.6	3.1	2.8	.95	1.9	2.4	25.0
CX06-0543	BK-22-8	7/8	80	34,200	12.6	3.1	2.8	.95	1.9	2.4	25.0
CX06-0544	BK-26-8	1	80	47,700	13.6	3.9	3.1	1.0	2.0	2.7	32.0
CX06-0545	BK-28-8	1 1/8	80	55,100	15.8	4.7	3.5	1.1	2.4	3.2	48.0

* Design factor 4:1 Proof tested and certified.

6

Self Locking OBK With Grip Latch (Eye Type)



Grip latch locks into point of hook.



Latch is protected and will act as a gauge to signal an unsafe bent hook or latch.

All three hooks are equipped with Stainless Steel springs.

Heat number identification allows full product traceability.

OBK

CERTEX Cat. Ref. No.	Gunnebo-Johnson Code	Chain Size	Grade	Working Load Limit *(Lbs)	Dimensions (Inches)						Weight Each (Lbs)
					L	B	E	F	G	H	
CX06-0546	OBK-7/8-10	9/32	100	4,300	5.1	1.3	.99	.39	.67	.79	1.5
CX06-0547	OBK-10-10	3/8	100	8,800	6.4	1.7	1.3	.49	.83	.97	2.7
CX06-0548	OBK-13-10	1/2	100	15,000	7.7	2.0	1.6	.59	1.0	1.2	4.5
CX06-0549	OBK-16-10	5/8	100	22,600	9.3	2.4	2.0	.75	1.2	1.5	7.7
CX06-0550	OBK-18/20-8	3/4	80	28,300	11.5	2.8	2.3	1.1	1.4	1.9	10.2

* Design factor 4:1 Proof tested and certified.



WARNING
Never exceed published working load limit

CHAIN SLING FITTINGS

Gunnebo-Johnson Corp

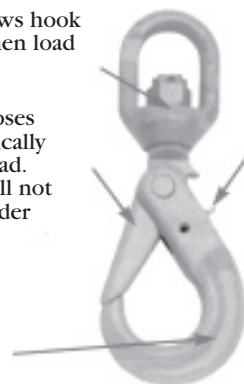
Self Locking BKL With Bronze Bushings (Swivel Eye Type)



Bushing allows hook to swivel when load is applied.

Latch closes automatically under load. Hook will not open under load.

Heat number identification allows full product traceability.



The release trigger will only operate when hook is unloaded.

BKL

CERTEX Cat. Ref. No.	Gunnebo- Johnson Code	Chain Size	Working Load Limit *(Lbs)	Dimensions (Inches)							Weight Each (Lbs)
				L	B	C	E	F	G	H	
CX06-0551	BKL-6-10	7/32	2,700	5.9	1.1	.91	1.3	.43	.55	.75	1.4
CX06-0552	BKL-7/8-10	9/32	4,300	7.2	1.4	1.1	1.4	.47	.67	.91	2.4
CX06-0553	BKL-10-10	3/8	8,800	8.6	1.7	1.5	1.7	.59	.99	1.1	4.4
CX06-0554	BKL-13-10	1/2	15,000	10.9	2.1	1.7	1.9	.75	1.1	1.5	8.4
CX06-0555	BKL-16-10	5/8	22,600	13.2	2.5	2.3	2.4	.87	1.5	1.9	15.0

* Design factor 4:1 Proof tested and certified.

Self Locking BKLK With Ball Bearings (Swivel Eye Type)



Ball bearing allows the hook to swivel under load.

Latch closes automatically under load. Hook will not open under load.

All three hooks are equipped with Stainless Steel springs.



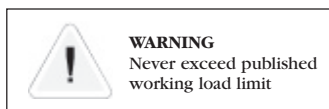
The release trigger will only operate when hook is unloaded.

Heat number identification allows full product traceability.

BKLIK

CERTEX Cat. Ref. No.	Gunnebo- Johnson Code	Chain Size	Working Load Limit *(Lbs)	Dimensions (Inches)							Weight Each (Lbs)
				L	B	C	E	F	G	H	
CX06-0556	BKLIK-6-10	7/32	2,700	5.8	1.1	.87	1.3	.43	.55	.75	1.5
CX06-0557	BKLIK-7/8-10	9/32	4,300	7.2	1.4	1.1	1.4	.47	.67	.91	2.4
CX06-0558	BKLIK-10-10	3/8	8,800	8.5	1.7	1.3	1.6	.59	.99	1.1	4.2
CX06-0559	BKLIK-13-10	1/2	15,000	10.9	2.1	1.6	1.9	.75	1.1	1.5	8.4
CX06-0560	BKLIK-16-10	5/8	22,600	13.2	2.5	2.0	2.4	.87	1.5	1.9	15.9

* Design factor 4:1 Proof tested and certified.

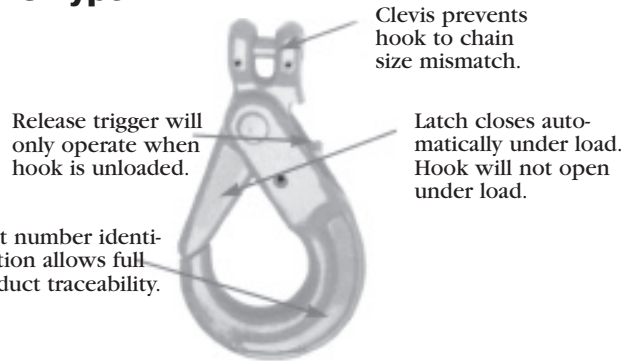
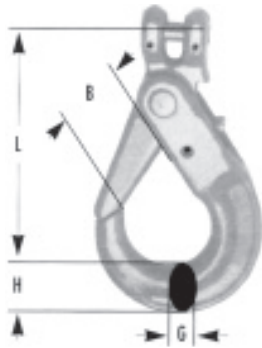


CHAIN SLING FITTINGS

Gunnebo-Johnson Corp

Alloy BK Safety Hooks

Self Locking (Clevis Type)

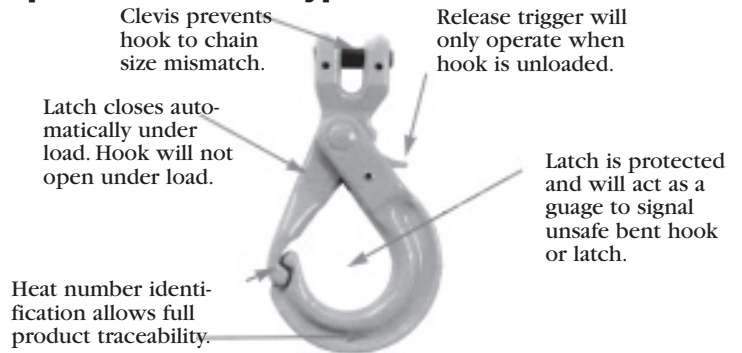
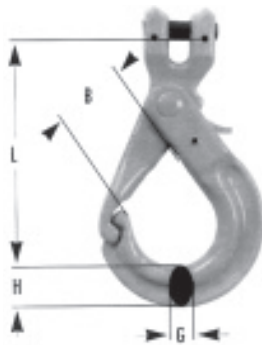


CERTEX Cat. Ref. No.	Gunnebo- Johnson Code	Chain Size	Working Load Limit *(Lbs)	Dimensions (Inches)				Weight Each (Lbs)
				L	B	G	H	
CX06-0561	BKG-7-10	9/32	4,300	4.7	1.4	.67	.91	1.7
CX06-0562	BKG-10-10	3/8	8,800	5.6	1.7	.99	1.1	3.3
CX06-0563	BKG-13-10	1/2	15,000	7.1	2.1	1.1	1.5	6.2
CX06-0564	BKG-16-10	5/8	22,600	8.5	2.5	1.5	1.9	11.0

* Design factor 4:1 Proof tested and certified.

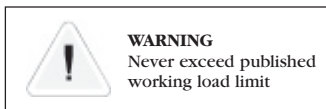
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Self Locking With Grip Latch (Clevis Type)



CERTEX Cat. Ref. No.	Gunnebo- Johnson Code	Chain Size	Working Load Limit *(Lbs)	Dimensions (Inches)				Weight Each (Lbs)
				L	B	G	H	
CX06-0565	GBK-7-10	9/32	4,300	4.4	1.3	.67	.79	1.3
CX06-0566	GBK-10-10	3/8	8,800	5.4	1.7	.83	.97	2.4
CX06-0567	GBK-13-10	1/2	15,000	6.6	2.0	1.0	1.2	4.4

* Design factor 4:1 Proof tested and certified.

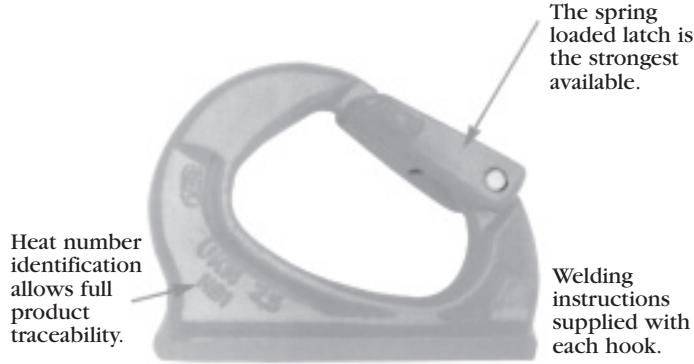


CHAIN SLING FITTINGS

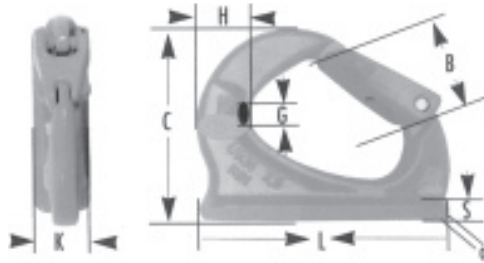
Gunnebo-Johnson Corp

Alloy Specialty Products

Alloy Weld-On Hooks



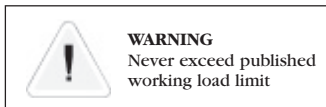
UKN



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CERTEX Cat. Ref. No.	Gunnebo- Johnson Code	Working Load Limit *(Tons)	Dimensions (Inches)								Weight Each (Lbs)
			B	C	G	H	K	L	S	A	
CX06-0568	UKN-1**	1.0	.79	2.8	.67	.99	.99	3.7	.24	.16	1.3
CX06-0569	UKN-3	3.0	1.2	4.1	.91	1.3	1.4	5.2	.39	.24	2.9
CX06-0570	UKN-4	4.0	1.1	4.5	1.1	1.5	1.7	5.5	.43	.28	4.2
CX06-0571	UKN-5	5.0	1.3	5.2	1.2	1.9	1.8	6.5	.47	.32	6.4
CX06-0572	UKN-8	8.0	1.3	5.2	1.6	2.0	2.0	6.8	.51	.35	7.7
CX06-0573	UKN-10	10.0	1.9	6.7	1.7	2.3	2.2	8.7	.55	.35	14.1
CX06-0574	UKN-15	15.0	2.1	7.4	2.0	2.6	2.4	9.4	.59	.47	19.4

* Design factor 5:1 Proof tested and certified.
 Baseplate of hook is 1024C steel (use electrode AWS/ASTM E7018-1, ISO E51 5 B120 20H). Welding is to be done by a qualified welder.
 Hook latch is alloy.
 **Welding plate on UKN 1 is slightly curved.



A Totally New Way To Fabricate Chain Slings



GrabiQ is an exciting new family of alloy chain sling components. Instead of the old “one component does one job” fitting, GrabiQ combines in a single component up to three separate functions. Figure 1 features a GrabiQ Master Grab, which serves as the master link, connecting link for two legs of chain, and shortening hooks for each leg, all in one fitting. Using traditional fittings to construct the same sling would require 7 top-of-the-sling components, instead of just one. Some of the new GrabiQ fittings are equally well suited for use as top assembly connectors or hooks at the bottom of a sling, adding even more flexibility for riggers.

While the specific Working Load Limits vary, depending on size, slings fabricated from grade 100 chain and fittings are about 25% stronger than their grade 80 counterparts. Converting from grade 80 to GrabiQ will especially benefit users who can make use of the additional WLL without the expense of purchasing larger chain and fittings.

The percentage of strength increase varies depending on the size. The Working Load Limit (WLL) gain for 3/8” is about 24 percent, while the WLL for 7/32” is more than 30 percent. All other sizes fall somewhere in between.



Fig. 1. The GrabiQ Master Grab combines a master link, master link connectors for two legs of chain, and two shortening hooks into a single fitting. The shortening hook can also be used to create loop legs.

6



Fig. 2. Each GrabiQ component is clearly marked with the number 10, designating it as Grade 100.

Fewer Components Means Less Weight

Most of the time, GrabiQ slings will be lighter than their grade 80 counterparts. Fewer components means less weight. Also, because grade 100 has a lifting capacity that is usually 25% higher than its grade 80 counterpart, the ratio of strength-to-weight is greater, offering additional weight savings with GrabiQ.

Reduced Components Means Less Clutter

Because GrabiQ often reduces the number of components required to assemble a chain sling, rigging is easier. Figure 3 shows a three-leg fully adjustable chain sling with all three legs shortened. The sling still has only three fittings at the top.



Fig. 3. “A three-leg, fully adjustable sling.”

More Flexibility in Chain Sling Uses

When each GrabiQ leg is furnished with a chain pocket, the chain sling can be used for a much wider variety of loads, often reducing the amount of rigging required on site. The chain pocket can be used to either shorten a leg or create a leg loop. Some fittings are equally well suited for use at the top or bottom of a chain sling. For example, the GrabiQ C-Grab can be used as a top-of-the-sling connector or as pictured in Figure 4, at the bottom of the sling as an adjustable sliding choker.



Fig. 4. "A GrabiQ C-Grab used at the bottom of the sling as an adjustable sliding choker."

Chain Sling Inspections Are Easier

Inspecting chain slings is easier and faster because fewer components must be examined for wear or damage.



Fig. 5. Only 3 top-of-the-sling GrabiQ components are needed to fabricate a 4-leg, fully adjustable sling.

Quality Standards:

Gunnebo Grade 100 GrabiQ™ alloy steel chain and chain sling components are manufactured and tested in accordance with ASTM A973, A952, and A907 material standards. GrabiQ™ chain and components meet or exceed the safety standards as prescribed by ASME B30.9 & B30.10, and OSHA alloy steel chain sling regulations.

All chain and every single component is proofloaded to 2.5 times the Working Load Limit.

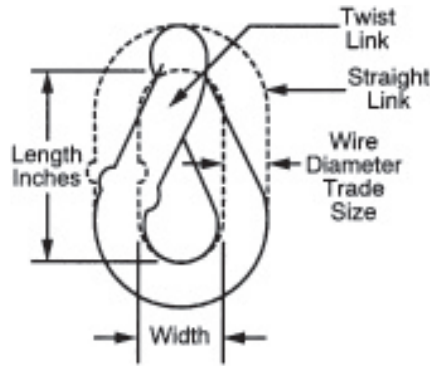
The Swedish plants manufacturing GrabiQ™ products certified to ISO 9001 / ISO 9002 Quality Standards. Gunnebo's quality management covers all aspects of production from raw material to delivered product.

Full Test Certification is supplied on request.



Fig. 6. Traditional fabrication requires 15 fittings.

Chain Definitions



The Low Carbon chains and attachments shown in this catalog are designed for general purpose applications and are not to be used for lifting or hoisting purposes or where chain failure is likely to cause injury to persons or damage to property.

For lifting or hoisting applications, chain and attachments should be used.

Instructions and Cautions Governing the Purchase and Use of Chain

Working Load Limit:

The "working load limit" is the maximum load in pounds which at any time or under any condition should ever be applied to chain or a sling component, even when chain is new and in the same condition it was when it left the factory, and when the load is evenly applied in direct tension to a straight length of chain.

The following factors or abuses will lessen the load that the chain assembly will withstand and should be avoided:

- Tip loading of hooks
- Twisting of the chain

- Disfigurement
- Deterioration of chain or component by wear, usage or corrosion.
- Jerking or the sudden impact of a load multiplies the stress on the chain very rapidly.
- Use other than that for which the chain or component was intended.

Caution: Chain and component assemblies should be rated according to the working load limit of the weakest component.

Instructions Regarding Attachments: Care should be taken to select attachments of the same type, grade, size and working load limit as the chain. Follow recommended attachment procedure for best results. Misuse or abuse of chain and attachments may result in serious personal injury.

All dimensions shown are nominal and all weights are approximate. See individual pages for working load limits

CERTEX

Lifting Products and Services



WARNING

Failure to read, understand and follow these instructions and working load limits may cause serious physical injury and property damage.

CARBON CHAIN

Chain Assemblies

Grade 70 Transport Tiedown Chain



Assemblies have Grade 70 Clevis Grab Hook each end. Packed 25 per drum.

Grade 70 Transport Tiedown Chain Assembly			
Size	Wt. Each Lbs.	Working Load Limit Lbs.*†	CERTEX Cat. Ref. No.
5/16 x 20 ft.	22	4,700	CX06-0714
5/16 x 25 ft.	30	4,700	CX06-0715
3/8 x 20 ft.	31	6,600	CX06-0718

Other lengths available upon request.

† The values for working load limits shown here shall be used only for calculating the number of chain tiedown assemblies required to secure an article in compliance with Department of Transportation Regulations 393,102(b).

6

Winch Line Tail Chain



Winch Line Tail Chain is a flexible attachment for use on the end of wire rope. Primarily intended for use on truck and tractor winch lines. Length specified is exclusive of hook. Use the same size chains as wire rope.

The hook is drop forged alloy steel and heat treated for extra durability. The hook is designed to prevent wearing of the wire rope.

Winch Line Tail Chain						
Trade Size Inches	Length Each In. Excluding Hook	Wt. Each Lbs.	CERTEX Cat. Ref. No.	Working Load Limit Lbs.*	CERTEX Cat. Ref. No.	Working Load Limit Lbs.*
1/2	18	7	CX06-0725	9,200	—	—
5/8	18	10	CX06-0726	14,000	—	—
3/4	18	13	—	19,750	CX06-0728	28,300
7/8	24	24	—	—	CX06-0729	34,300
1	24	27	—	—	CX06-0730	38,750



*** WARNING**
Working Load Limit must not be exceeded. Not to be used for lifting or hoisting applications.

Definitions and Warnings

Columbus McKinnon Corporation assumes no responsibility for the use or misapplication of any of its products. Products are provided with the express understanding that the purchaser and/or user are thoroughly familiar with the correct application and proper use. The following warnings and definitions are provided as an aid to understanding.

The chains listed on the pages in this price list exceed the specifications of the National Association of Chain Manufacturers for the specific types of chain involved. However, none of these chains are made from alloy steel and should not be used for overhead lifting purposes. CM Chain produces an alloy chain known as Herc-Alloy 800 chain that is designed for overhead lifting.

Definitions

Working Load Limit — Refers to the maximum load (rated capacity) in pounds that shall be applied in direct tension to a straight length of chain or attachment. The working load limit shall not be exceeded.

Proof Test (or Manufacturing Test Force) — Refers to a load in pounds which an attachment or chain (or both) has withstood during a test in which an increasing tension is applied to an attachment or straight length of chain. This is typically accomplished as part of the manufacturing or testing process.

Minimum Break Load — Refers to a load in pounds as applied to an attachment or chain at the time it left the factory that has been found by representative testing to break the item under test of increasing force as applied by a standard testing machine. This a manufacturing test and such data is not intended for service or design purposes.

Warnings

Never exceed the “working load limit” of chain or attachments, even when the item is new and the load is uniformly applied.

Before use, always inspect chain and attachments for kinking, twisting, knotting, and visible defects such as distortion or damage.

Do not jerk load. Pick up slowly and apply a steady pull.

Protect items from corrosion. Any product will break if abused or overused.

Use only alloy chain attachments (Grade 80) for overhead lifting purposes, never any other chain.

The terms “working load limit,” “proof test,” and “minimum break load” contain no implication of what load an attachment or chain will withstand, if any, if the factors noted in the Definitions are changed.

The “working load limit” should not be exceeded, even when an attachment or chain is new and the load is uniformly applied. The manufacturer does not accept any liability for damages with result from an attachment or chain being used in excess of the working load limit.

Any changes in these factors could lessen the load the chain will hold. For example:

Acceleration in the rate of application, which could cause dangerous overloading.

Variation in the angle of the load. As the angle or inclination decreases, the working load capacity of a sling will decrease accordingly.

Twisting, knotting and kinking.

A purpose other than that for which the chain was intended.

Where attachments, such as hooks or rings are desired for use with chain in sustaining loads, care should be taken to select attachments of the type, grade, and size recommended for use with corresponding alloy chain with which such attachments are used.

Grade 30 Proof Coil Chain

Chain Specifications



	Trade Size In Inches	Material Size		Nominal Inside Link Dimensions, Inches		Maximum Length, 100 Links Inches	Weight per 100 ft. In Pounds	Working* Load Limit In Pounds
		Inches	Decimal	Length	Width			
	3/16	13/64	.202	0.96	0.41	99	33	750
	1/4	17/64	.265	1.01	.48	104	63	1,250
GRADE 30	5/16	21/64	.327	1.11	.50	114	98	1,900
PROOF COIL	3/8	25/64	.390	1.24	.62	128	144	2,650
CHAIN	1/2	17/32	.531	1.51	.82	158	278	4,500
	5/8	21/32	.656	1.88	1.01	194	422	6,900
	3/4	25/32	.781	2.13	1.13	220	606	9,750
	1	1 1/32	1.031	2.77	1.51	286	1,069	13,950

Dimensions and weights are approximate and subject to variations.

*** WARNING:**
Working Load Limit is not to be exceeded.
This chain/accessory is not for overhead lifting.

CARBON CHAIN

Grade 43 High Test Chain



Chain Specifications Grade 43 High Test Chain

CERTEX Cat. Ref. No.	Trade Size In Inches	Material Size		Nominal Inside Link Dimensions, Inches		Maximum Length, 100 Links Inches	Weight per 100 ft. In Pounds	Working* Load Limit In Pounds
		Inches	Decimal	Length	Width			
CX06-0731	1/4	9/32	.281	1.01	.48	104	71	2,600
CX06-0732	5/16	21/64	.327	1.11	.50	114	98	3,900
CX06-0733	3/8	25/64	.390	1.24	.62	128	144	5,400
CX06-0734	1/2	17/32	.531	1.51	.82	156	278	9,200
CX06-0735	5/8	21/32	.656	1.88	1.01	194	422	11,500
CX06-0736	3/4	25/32	.781	2.13	1.13	220	606	16,200
CX06-0737	7/8	29/32	.875	2.52	1.38	260	769	22,500
CX06-0738	1	1 1/32	1.000	2.77	1.51	286	1,069	26,500

Dimensions and weights are approximate and subject to variations.

Grade 70 Binding Chain



Chain Specifications Grade 70 Binding Chain

CERTEX Cat. Ref. No.	Trade Size In Inches	Material Size		Nominal Inside Link Dimensions, Inches		Maximum Length, 100 Links, Inches	Weight per 100 ft. In Pounds	Working* Load Limit In Pounds
		Inches	Decimal	Length	Width			
CX06-0739	1/4	9/32	.281	.84	.48	87	74	3,150
CX06-0740	5/16	11/32	.327	.99	.47	102	100	4,700
CX06-0741	3/8	13/32	.406	1.15	.54	119	156	6,600
CX06-0742	7/16	15/32	.468	1.30	.62	134	204	8,750
CX06-0743	1/2	17/32	.531	1.45	.73	149	259	11,300

Dimensions and weights are approximate and subject to variations.

*** WARNING:**
Working Load Limit is not to be exceeded.
This chain/accessory is not for overhead
lifting.

CARBON CHAIN ATTACHMENTS

Chain & Lifting Products Division

Connecting Links



Drop Forged Steel and Heat Treated

Drop forged. For connection of attachments to chain. Links are provided with interlocking lugs and rivets. For permanent connections, the rivets must be peened into the counter sunk holes.

Use with chain of equal or lower working load limit.

Connecting Links					
Packaged					
Link Size Inches	Working Load Limit Lbs.*	Wt. Per Ctn. Lbs.	Pcs. Per Ctn.	CERTEX Cat. Ref. No.	CERTEX Cat. Ref. No.
3/16	800	2/3	20	CX06-0853	CX06-0859
1/4	1,325	2/3	10	CX06-0854	CX06-0860
5/16	1,950	1	10	CX06-0855	CX06-0861
3/8	2,750	2	10	CX06-0856	CX06-0862
7/16	3,625	3	10	CX06-0857	—
1/2	4,750	4	10	CX06-0858	CX06-0863

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*** WARNING**
Working load limit must not be exceeded.
Not to be used for lifting or hoisting applications.

CARBON CHAIN ATTACHMENTS

Columbus McKinnon Corporation

Double Clevis (Mid-Link)



APPLICATIONS:

Used as a temporary or permanent link with proof coil or high test chain.

DESCRIPTION:

Drop forged, heat-treated, carbon steel, zinc-plated.

PACKING:

Display pack.

For Chain Size Inches	Carton			Display pack	Clevis Opening Inches	Pin Diameter Inches	Reach Inches	Weight Display Pack Pounds	Working Load Limit* Pounds
	CERTEX Cat. Ref. No.	Columbus McKinnon Code No.	UPC Code						
1/4 & 5/16	CX06-0864	M605	28926	30	7/16	3/8	1 3/16	10	3,900
3/8	CX06-0865	M606	28936	30	1/2	7/16	1 3/8	14	5,400
7/16 & 1/2	CX06-0866	M608	28941	10	5/8	9/16	1 3/4	11	9,200

Quick Link

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APPLICATIONS:

Used as a repair link, connecting link or attaching device.

DESCRIPTION:

Zinc-plated NOT heat-treated. Use only with chain or equal or lower Working Load Limit.

PACKING:

3/16", 1/4" and 5/16" sizes, packed 20 per carton, 3/8" and 1/2" sizes, packed 10 per carton.

For Chain Size Inches	Carton			Display pack	Clevis Opening Inches	Pin Diameter Inches	Reach Inches	Weight Per 100 Pieces Pounds	Working Load Limit* Pounds
	CERTEX Cat. Ref. No.	Columbus McKinnon Code No.	UPC Code						
3/16	CX06-0867	D81001	39751	20	1 1/2	1/2	1/4	4 1/2	660
1/4	CX06-0868	D81101	39755	20	1 3/4	9/16	9/32	8	880
5/16	CX06-0869	D81201	39760	20	2 5/16	3/8	3/8	17	1,760
3/8	CX06-0870	D81301	39765	10	2 7/16	7/16	7/16	23	2,220
1/2	CX06-0871	D81501	39770	10	3 3/16	19/32	19/32	51	3,300



*** WARNING**

Working load limit must not be exceeded. Not to be used for lifting or hoisting applications.

CARBON CHAIN ATTACHMENTS

Columbus McKinnon Corporation

Repair Link



APPLICATIONS:

A temporary repair link also used to couple light attachments.

DESCRIPTION:

A mild steel, available with bright, hot galvanized, or zinc-plated finishes.

PACKING:

100 per carton in 1/8" by 3/4" and 3/16" by 1" sizes, 50 per carton in the 7/32" by 1 1/4" through 3/8" by 2" sizes. 25 per carton in the 1/2" by 2 1/2" size.

Trade Size Inches	Bright Carton			Zinc Plated Carton			Pieces per Carton	Inside Length Inches	Inside Width Inches	Weight per 100 Pieces Pounds	Working Load Limit* Pounds
	CERTEX Cat. Ref. No.	Columbus McKinnon Code No.	UPC Code	CERTEX Cat. Ref. No.	Columbus McKinnon Code No.	UPC Code					
1/8 x 3/4	—	—	—	CX06-0883	653612	29251	100	3/4	1/4	1 1/8	175
3/16 x 1	CX06-0872	653180	29186	CX06-0884	653618	29256	100	1	1/2	3 1/2	225
7/32 x 1 1/4	CX06-0873	653211	29191	CX06-0885	653621	29261	50	1 1/4	1/2	5 1/2	450
1/4 x 1 1/4	CX06-0874	653251	29196	CX06-0886	653625	29266	50	1 1/4	1/2	7 1/2	400
1/4 x 1 1/2	CX06-0875	653253	29206	CX06-0887	653626	29276	50	1 1/2	1/2	8 1/3	400
1/4 x 2	CX06-0876	653255	29211	CX06-0888	653627	29281	50	2	5/8	10 1/2	400
9/32 x 1 1/4	CX06-0877	653281	29201	CX06-0889	653628	29271	50	1 1/4	1/2	9 3/4	375
5/16 x 1 1/2	CX06-0878	653312	29216	CX06-0890	653631	29286	50	1 1/2	3/4	14 1/2	675
5/16 x 2	CX06-0879	653315	29221	CX06-0891	653632	29291	50	2	3/4	17 1/3	625
3/8 x 1 5/8	CX06-0880	653373	29226	CX06-0892	653633	29296	50	1 5/8	3/4	23	1,050
3/8 x 2	CX06-0881	653375	29231	CX06-0893	653638	29301	50	2	3/4	24	1,000
1/2 x 2 1/2	CX06-0882	653506	29236	CX06-0894	653650	29306	25	2 1/2	1	54	1,525

6

Cold Shut



APPLICATIONS:

As temporary repair link, use one size larger than Proof coil chain (Grade 30) with which it is to be used. Also used to couple light attachments.

DESCRIPTION:

Low carbon steel, self-colored or zinc-plated finish.

PACKAGING:

1/4" thru 5/8" zinc-plated, packed 10 per carton. All other bulk.

Trade Size Inches	Zinc-Plated Bulk (Ea.)			Self-Colored Carton (10)			Inside Length Inches	Inside Width Inches	Weight per 100 Pieces Pounds	Working Load Limit* Pounds
	CERTEX Cat. Ref. No.	Columbus McKinnon Code No.	UPC Code	CERTEX Cat. Ref. No.	Columbus McKinnon Code No.	UPC Code				
3/16	CX06-0895	50091	29060	—	—	—	15/16	5/16	3	525
1/4	CX06-0896	50191	29062	CX06-0902	673104	34175	1	3/8	6	925
5/16	CX06-0897	50291	29067	CX06-0903	673105	34176	1 3/16	7/16	10	1,450
3/8	CX06-0898	50391	29072	CX06-0904	673106	34177	1 5/16	1/2	18	2,110
7/16	CX06-0899	50491	29077	CX06-0905	673107	34178	1 1/2	9/16	26	2,850
1/2	CX06-0900	50591	29082	CX06-0906	673108	34179	1 9/16	3/4	38	3,750
5/8	CX06-0901	50691	29087	CX06-0907	673110	34180	2 1/8	7/8	78	5,850

*** WARNING**
Working Load Limit is not to be exceeded. This chain/accessory is not for overhead lifting. Select coupling link by working load limit for use only with chain of equal or lower working load limit

LOAD BINDERS

The Crosby Group, Inc.

Warnings and Application Instructions

Mechanical Advantage

Lever Type Binder = 25 : 1

Ratchet Type Binder = 50 : 1

Example: 100 pounds of effort applied to the binder results in the following force on the binder.

Lever Type:

2500 (100 lbs. x 25) lbs. of force

Ratchet Type:

5000 (100 lbs. x 50) lbs. of force

Instructions — Lever Type Load Binders

- Hook load binder to chain so you can operate it while standing on the ground. Position load binder so its handle can be pulled downward to tighten chain (see photo). Be aware of ice, snow, rain, oil, etc. that can affect your footing. Make certain your footing is secure.
- The Crosby Group, Inc. specifically recommends AGAINST the use of a handle extender (cheater pipe). If sufficient leverage cannot be obtained using the lever type load binder by itself, a ratchet type binder should be used.
- If the above recommendation is disregarded and a cheater pipe is used, it must closely fit the handle and must slide down the handle until the handle projections are contacted. The pipe should be secured to the handle, for example, by a pin, so that the pipe cannot fly off the handle if you lose control and let go. The increased leverage, by using a cheater pipe, can cause deformation and failure of the chain and load binder.
- During and after tightening chain, check load binder handle position. Be sure it is in the locked position and that its bottom side touches the chain link.

- Chain tension may decrease due to load shifting during transport. To be sure the load binder remains in proper position: Secure handle to chain by wrapping the loose end of chain around the handle and the tight chain, or tie handle to chain with soft wire.
- When releasing load binder, remember there is a great deal of energy in the stretched chain. This will cause the load binder handle to move very quickly with great force when it is unlatched. Move handle with caution. It may whip — Keep body clear.
- Never use a cheater pipe or handle extender to release handle. Use a steel bar and pry under the handle and stay out of the path of handle as it moves upward.
- If you release the handle by hand, use an open hand under the handle and push upward. Do not close your hand around the handle. Always keep yourself out of the path of the moving handle.

Instructions — Ratchet Load Binders

- Position ratchet binder so it can be operated from the ground.
- Make sure your footing is secure.

Maintenance of All Load Binders

- Routinely check load binders for wear, bending, cracks, nicks, or gouges. If bending or cracks are present — Do not use load binder.
- Routinely lubricate pivot and swivel points of Lever Binders, and pawl part and screw threads of Ratchet Binders to extend product life and reduce friction wear.

6

WARNING



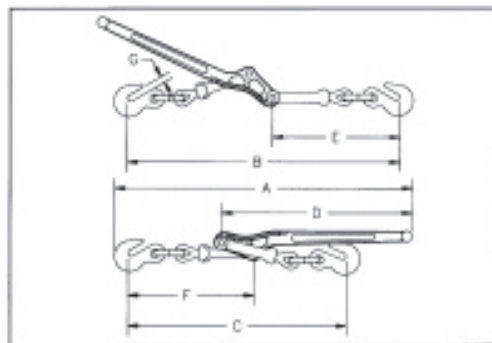
- Failure to use this load binder properly may result in serious injury or even death to you or others.
- Do not operate load binder while standing on the load.
- Move handle with caution. It may whip — Keep body clear.
- Keep yourself out of the path of the moving handle.
- You must be familiar with state and federal regulations regarding size and number of chain systems required for securing loads on trucks.
- Always consider the safety of nearby workers as well as yourself when using load binder.
- While under tension, load binder must not bear against an object, as this will cause side load.
- Do not throw these instructions away. Keep them close at hand and share them with any others who use this load binder.

LOAD BINDERS

The Crosby Group, Inc.

Standard Lever Type Load Binder

L-150



Meets or exceeds CVSA Cargo Securement Guidelines, August 1993.

- Forged Steel — Quenched and Tempered.
- Binder toggles away from the load.

Model	CERTEX Cat. Ref. No.	Crosby Stock No.	Std. Pkg.	Min-Max Chain Size (in.)	Working Load Limit (lbs.)	Proof Load (lbs.)	Minimum Ultimate Strength (lbs.)	Weight Each (lbs.)	Handle Length (in.)	Take Up (in.)	Dimensions (in.)						
											A	B	C	D	E	F	G
7-1	CX06-0908	1048128	4	5/16-3/8	5400	10800	19000	7.02	16.00	4.50	24.13	22.13	17.88	16.00	10.38	10.38	.50
A-1	CX06-0909	1048146	4	3/8-1/2	9200	18400	33000	12.47	18.69	4.50	28.75	25.75	21.25	18.69	12.31	12.38	.63
C-1	CX06-0910	1048164	4	1/2-5/8	13000	26000	46000	19.68	21.00	4.75	31.25	29.75	25.00	21.00	14.63	13.75	.72

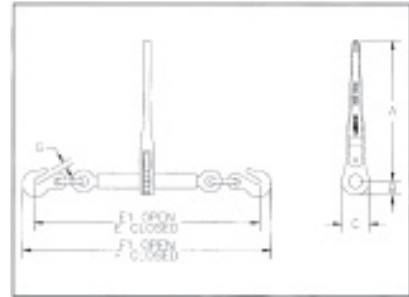
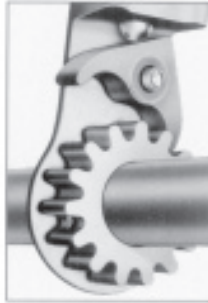
NOTE: Binders shown with Proof Load Pounds have been individually proof tested to these values shown, prior to shipment.

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LOAD BINDERS

The Crosby Group, Inc.

L-140



Meets or exceeds CVSA Cargo Securement Guidelines, August 1993.

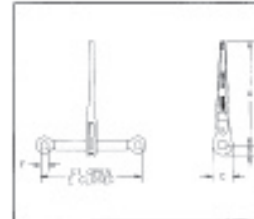
- Upgrade for use with Grade 7 Transport Chain.
- Utilizes standard Crosby A-323 Alloy Eye Grab Hooks.
- New design “one piece” forged handle.
- Continuous take-up feature, infinite adjustment, gets the last half of chain.
- One piece assembly, no bolts or nuts to loosen.
- Ratchet spring rust proofed.
- All load bearing or holding parts forged.
- Easy operating positive ratchet.

6

Model	CERTEX Cat. Ref. No.	Crosby Stock No.	Min-Max Chain Size (in.)	Working Load Limit (lbs.)	Proof Load (lbs.)	Weight Each (lbs.)	Handle Length (in.)	Barrel Length (in.)	Take Up (in.)	Dimensions (in.)							
										A	B	C	E	E1	F	F1	G
R-7	CX06-0911	1048404	5/16-3/8	8800	17600	11.23	14	10	8.0	14.00	1.38	2.75	22.94	30.94	25.13	33.13	.50
R-A	CX06-0912	1048422	3/8-1/2	15000	30000	12.83	14	10	8.0	14.00	1.38	2.75	25.25	33.25	27.63	35.63	.63
R-C	CX06-0913	1048440	1/2-5/8	16000	32000	14.55	14	10	8.0	14.00	1.38		26.38	34.38	29.44	37.44	.72

NOTE: Binder shown with Proof Load Pounds have been individually Proof Tested to these values shown, prior to shipment.

R-10 Binder Less Links and Hooks



Meets or exceeds CVSA Cargo Securement Guidelines, August 1993.

- Binders available with hooks for 3/8” and 1/2” chain sizes upon request.

Model	CERTEX Cat. Ref. No.	Crosby R-10 Stock No.	Max Chain Size (in.)	Working Load Limit (lbs.)	Weight Each (lbs.)	Handle Length (in.)	Barrell Length (in.)	Take Up (in.)	Dimensions (in.)					
									A	B	C	E	E1	F
R-10	CX06-0914	1048468	5/8	16000	8.04	14	10	8.0	14	1.38	2.75	14	22	1.00



SEE APPLICATION AND WARNING INFORMATION

LOAD BINDERS

Columbus McKinnon Corporation

Ratchet Type Load Binder

- Heavy duty, rigid, all steel construction.
- Short reach hooks for maximum take-up.
- Infinite adjustment.
- Continuous take-up.
- Meets D.O.T. and C.V.S.A. specifications.



CERTEX Cat. Ref. No.	Columbus McKinnon Product code	Max size (in.)	Take-up (in.)	UPC code	Working load limit (lbs.)*	Min. ultimate breaking strength (lbs.)	Weight (lbs.)
CX06-0933	D48363**	—	8	30002	16,200	46,000	11
CX06-0934	D48365	5/16 G70 3/8 G43	8	30003	5,400	19,000	12 1/4
CX06-0935	D48366	3/8 G70 1/2 G43	8	31205	9,200	28,000	12 1/4

** Supplied without hooks.



*** WARNING**

- Do not exceed working load limits specified.
- Working load limits apply to load binders only.
- See match-up chart for chain working load limits.
- For complete operating instructions, see previous page.