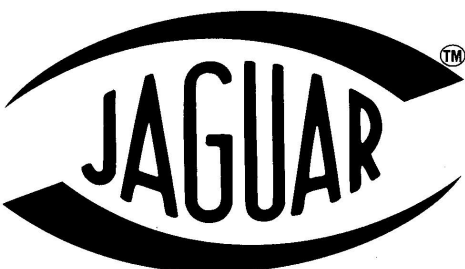


“JAGUAR” CHAIN SLINGS G80 AND G100



IMPORTANT

If the equipment is not properly installed, operated, and maintained it may be damaged. Before using it, all persons involved in its installation, operation, and maintenance must read this manual carefully. For your care, follow all instructions and recommendations contained in this manual carefully. This manual should also be saved for future use.



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We hereby declare that the accessories used are subject to European regulations and comply with the following standards.

- EN 818 parts 1, 2, 4, and 6 for chain slings.
- EN 1677 parts 1, 2, 3, and 4 for chain accessories.

Use:

Selection of chain slings:

- It is necessary to know the weight of the load.
- It is necessary to know the centre of gravity of the load.

Lifting method:

- When lifting with chain slings that have two or more legs, the lifting angle should be between 15° and 60°. Angles greater than 60° cause overloading in the legs. Angles less than 15° may cause load instability.
- In the case of choker lifts, the maximum working load must be reduced.

GRADE 80

MAXIMUM WORK LOADS IN TONNES

CHAIN Ø (MM.)	1 LEG	2 LEGS		3 LEGS	4 LEGS	ENDLESS SLING IN HANGING
	M.W.L	0° < β ≤ 45° FACTOR 1.4	45° < β ≤ 60° FACTOR 1.0	0° < β ≤ 45° FACTOR 2.1	45° < β ≤ 60° FACTOR 1.5	FACTOR 1.6
6	1,12	1,60	1,12	2,36	1,70	1,90
9	2,00	2,80	2,00	4,25	3,00	3,15
10	3,15	4,25	3,16	6,70	4,75	5,00
13	5,30	7,50	5,30	11,20	8,00	8,50
16	8,00	11,20	8,00	17,00	11,80	12,50
29	12,50	17,00	12,50	26,50	19,90	20,00
22	15,00	21,20	15,00	31,50	22,40	23,60
26	21,20	30,80	21,20	45,00	31,50	33,50
32	31,50	45,00	31,50	64	47	50,00

NOTE: SAFETY FACTOR 4:1. THE MAXIMUM CAPACITY OF WORKLOADS IS REFERRED TO THE NORMAL WORKING CONDITIONS AND WITH LOAD UNIFORMLY DISTRIBUTED ON EACH LEG.

GRADE 100

MAXIMUM WORK LOADS IN TONNES

CHAIN Ø (MM.)	M.W.L.	2 LEGS		3 LEGS	4 LEGS	ENDLESS SLING IN HANGING
		0° < β ≤ 45° FACTOR 1,4	45° < β ≤ 60° FACTOR 1,0	0° < β ≤ 45° FACTOR 2,1	45° < β ≤ 60° FACTOR 1,5	
6	140	2.00	140	3.00	2.10	2.24
8	2.50	3.50	2.50	5.30	3.80	4.00
10	4.00	5.60	4.00	8.00	6.00	6.40
13	6.70	9.40	6.70	14.00	10.00	10.70
16	10.00	14.00	10.00	21.00	15.00	16.00
20	16.00	22.40	16.00	33.60	24.00	25.60

NOTE: SAFETY FACTOR 4:1. THE MAXIMUM CAPACITY OF WORKLOADS IS REFERRED TO THE NORMAL WORKING CONDITIONS AND WITH LOAD UNIFORMLY DISTRIBUTED ON EACH LEG.

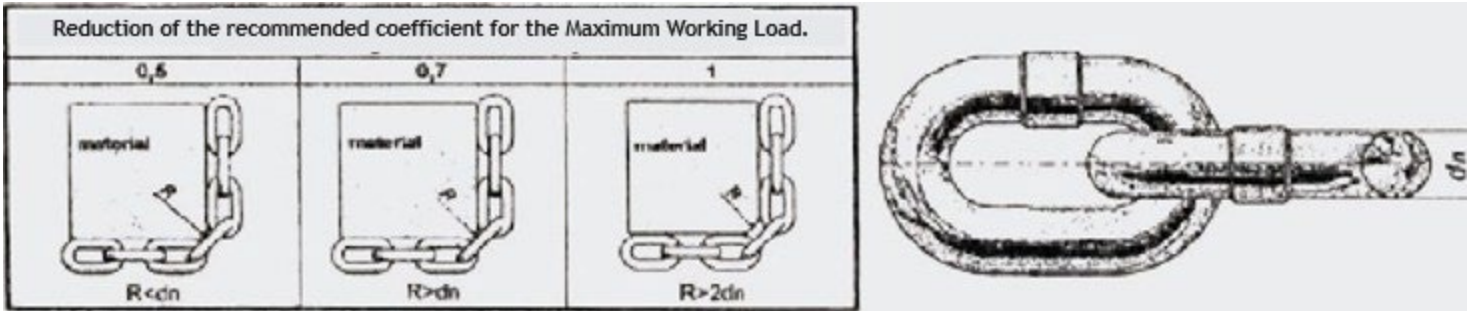
Handling:

- Chain slings must be used with the legs perfectly straight, without twists, knots, or breaks.
- Lifting hooks are not designed to be used by the tip and must be equipped with safety latches to prevent the load from being released unintentionally.
- The master ring must move freely at the base of the crane hook.
- Avoid sudden lifts and jerks.
- Sharp edges bend and damage chain links and components; in these cases, use corner protectors, larger chain sizes, or reduce the maximum working load.

There are load losses depending on the edges of the materials being handled:

- $R < \emptyset N$ coefficient 0.5
- $R > \emptyset N < 2\emptyset N$ coefficient 0.7
- $R > 2\emptyset N$ coefficient 1

Where R is the radius of the edge and $\varnothing N$ is the nominal diameter of the chain link, the coefficient being the amount by which the MWL of the sling must be multiplied.



Handling of asymmetric loads:

For chain slings with unevenly shaped loads, it is recommended to use a maximum working load that is determined as follows:

- Two-leg slings are calculated as a single-leg sling with respect to MWL.
- Three- and four-leg slings: calculate the sling as a two-leg sling with respect to the MWL.

Handling under severe conditions:

The chain and its components should not be used in contact with acids.

Periodic inspections must be carried out when using slings in harsh working conditions, corrosive environments, or where there may be a hazard.

If you have any questions, please check with your distributor.

Temperature influence:

G-80 and G-100 chain slings can be used down to temperatures of -40°C without any change in their characteristics.

For high temperatures, the maximum working load must be reduced as follows:

- -40°C to 200°C NO REDUCTION
- $+200^{\circ}\text{C}$ to 300°C 10%
- $+300^{\circ}\text{C}$ to 400°C 25%

Chain slings should not be used at temperatures higher or lower than those indicated.

Inspections and maintenance

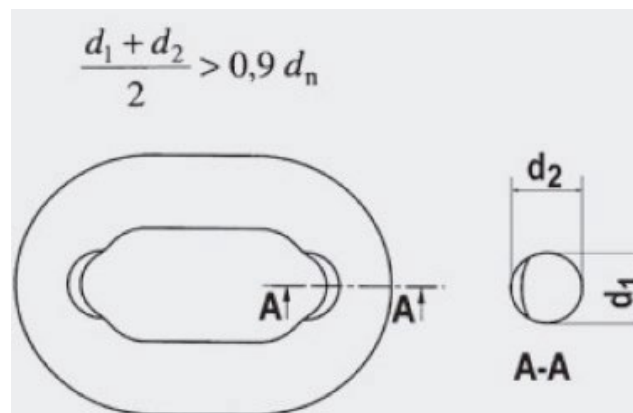
A periodic inspection must be carried out by competent personnel in accordance with the applicable conditions, doing so at regular intervals and at least once a year.

The inspector must document the results of the inspection in writing; evidence of any tests or other actions must be kept.

The following points should be taken into account when deciding whether or not to use slings:

- The sling must have its corresponding identification plate and said plate must be legible.
- Chains with deformed links, cracks, or fissures must be removed, as well as any accessories, rings, hooks, or other components that show signs of wear, damage, or deformation.
- Increased corrosion, discoloration of chains and accessories due to heat.
- The wear on the chain and components must not exceed 10% of the original dimensions.
- Chain wear must amount to a maximum of 10% and is defined as the reduction in material diameter measured in both directions.
- Overloaded chain slings must be taken out of service. The chain's maximum elongation is 5%, and the hook's maximum opening increase is 10%. Anything exceeding these limits must be taken out of service.
- The hook's safety latch or lock must make proper contact with the hook's tip for it to close correctly.
- Carefully examine the bottom of the hook for any cracks.

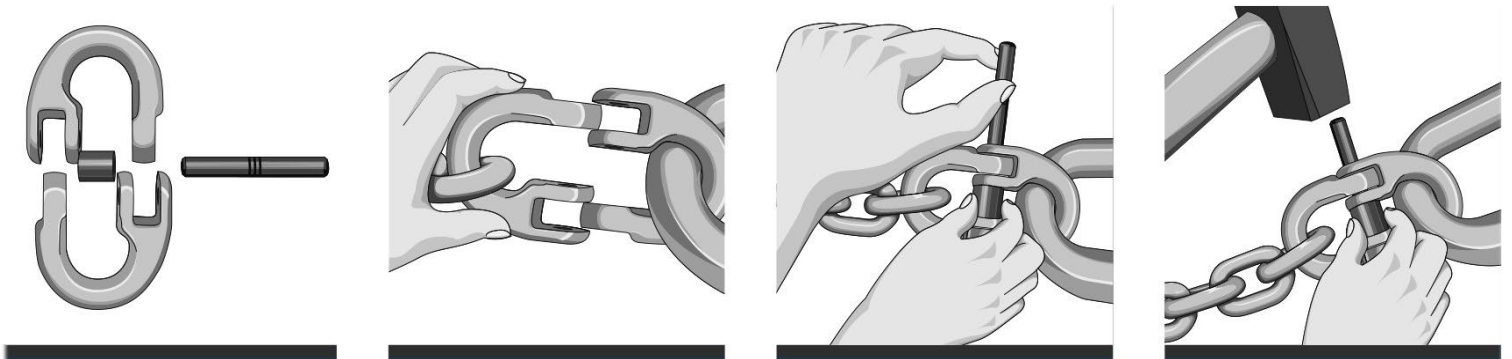
Maintenance and repairs should be carried out by experts with the necessary knowledge.



Warning:

- **The swivel hook is a positioning element and is not designed to rotate while holding a load.**
- Keep a record of all slings in use.
- Make sure the chain is free to move; that is, without knots or twists.
- Chain slings must only be shortened with a shortening hook.
- If the load has sharp edges, protect the load and the chain adequately.
- Centre the load on the hook. Never place a load on the tip of the hook.
- Always use the appropriate sling size for the load, taking into account the angle and the possibility of an uneven load.
- The main ring must move freely on the crane hook.
- Always avoid jerking motions when lifting loads.
- Never drop the load onto the chain.

ASSEMBLY OF CONNECTORS OR UNION LINKS:



LIMITATION OF WARRANTIES, REDRESS, AND DAMAGES

THE WARRANTY STATED BELOW HAS BEEN TAKEN FROM ALL OTHER WARRANTIES, WHETHER EXPRESS OR MERCANTILE IN NATURE, WITH GOOD INTENT, FOR A PARTICULAR PURPOSE, NO PROMISE OR REPRESENTATION MADE BY A SELLER, AGENT, OR REPRESENTATIVE SHALL CREATE A WARRANTY OF LIABILITY.

The seller guarantees that the merchandise at the time of dispatch is free of factory defects as well as guaranteeing the material with which it has been manufactured.

THE ONLY OBLIGATION OF THE SELLER IS IN THE CASE OF BREACH OF THE CONTRACT OR NEGLIGENCE OF THE SELLER, WITH RESPECT TO THE ITEM SOLD, IN SUCH CASE THE DEFECTIVE PART SHOULD BE REPAIRED OR REPLACED.

In the event that a repair or change is not feasible, the seller will reimburse the buyer for the sale price and the buyer will return the defective piece.

ANY WARRANTY CLAIM AGAINST THE SELLER FOR DEFECTS IN THE MERCHANDISE OR NEGLIGENCE OF THE SELLER WILL NOT BE VALID UNTIL THE PURCHASER MAKES IT KNOWN IN WRITING AND IT IS RECEIVED BY THE SELLER WITHIN SIX MONTHS FROM SHIPPING FROM THE FACTORY.

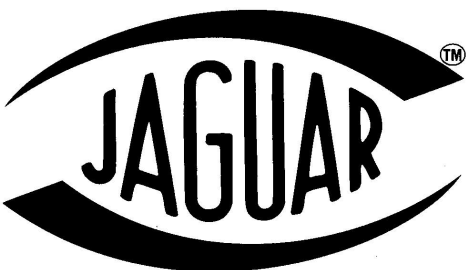
The seller is not responsible for damages, losses, or injury in these cases:

- 1) If the damage is done after the seller has made the delivery.
- 2) If the equipment is not maintained, inspected, or used following the instructions and recommendations of the manual.
- 3) If the equipment has been installed, repaired, altered, or modified without following the manufacturer's recommendations.

INDEMNIFICATION AND SAFETY OPERATION

The purchaser must comply and make its employees comply with the instructions of the manual published by the manufacturer for the care and maintenance of the equipment. The purchaser must not remove any cautionary or instruction labels from the equipment. Notification must be made in writing within 48 hours after receiving the merchandise of any damages or defects or accidents therewith. The buyer must cooperate with the seller in the investigation of any accidental damage and in the defence of any claim for this reason.

If the buyer fails to comply with this section and any partial or total damage is caused by the buyer's irresponsibility and breach by the buyer of the established legal safety requirements, the buyer must indemnify the seller against any claims by the latter for damages arising from the incorrect use of the merchandise.



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