Auto Crane Company

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OWNER'S MANUAL

5005H SERIES

Serial No.

5005H OWNER'S MANUAL

- CONTENTS -

		Page
1.	OPERATION, SERVICE, & SAFETY TIPS	
	INSTALLATION	
3.	MAINTENANCE	
4.	GENERAL ASSEMBLY	11
5.	ROTATION GEAR BOX	17
6.	HOIST ACTUATOR	
7.	ELECTRICAL SECTION	22
8.	HYDRAULIC SECTION	26
9.	RESERVOIR ASSEMBLY	31
0.	GENERAL DIMENSIONS	37
1.	STABILIZERS	41
2.	WARRANTY	42

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AUTO CRANE

OPERATION, SERVICE, AND MAINTENANCE TIPS

Auto Crane products have been engineered to provide safe, trouble-free, dependable service for many years when these products are properly used and maintained.

To assist you in obtaining the best service from your crane and to avoid untimely failure of the unit and/or the vehicle on which it is mounted, the following operating and service instructions are herein published, and it is specifically recommended that all operating and service personnel consider this manual as mandatory material for reading and study before operating or servicing Auto Crane products. It is highly recommended that crane owners, equipment managers and supervisors also read this manual.

Auto Crane has incorporated several safety features in the 5005H series for your protection. The material and electrical systems were designed to minimize weight and lengthen durability. The hydraulic components are designed for a 4:1 safety factor. Holding valves are installed on the cylinders to prevent the load from dropping if a hose should fail. A 10u filter is installed in the hydraulic system to remove dirt and grit that may cause premature failure. The reservoir is protected with a 15u filter in the filler cap.

For your convenience the overall dimensions of the 5005H series are included on the General Dimension Drawing Eng. 50. Rotation and turning radius are also listed. See page 37.

Remember that the crane adds weight to the vehicle and may change the driving and riding characteristics of the vehicle on which it is mounted unless this weight is properly provided for with appropriate overload springs. The payload of the vehicle is also reduced by the amount that the crane weighs, and as the vehicle is loaded, care should be exercised not to overload the vehicle. Exercising care in distributing the payload on the vehicle will greatly improve the driving and riding characteristics of the vehicle. A minimum G.V.W. of 10,500 lbs. is recommended for mounting the 5005H series cranes.

Always take the necessary time to properly install and/or set the jacklegs or outriggers before lifting a load with the crane. Insure that the base of the jacklegs or outriggers is firmly positioned on solid footings, at a minimum of 79 inches from the center line of the chassis on the curb side. The extra time taken to properly set these outriggers will be more than compensated for by the reduced wear on the

vehicle. Most of the best engineered bodies have jackleg positions or "pockets" at each corner (minimum of four pockets). It is highly recommended that crane operators take full advantage of these four pockets (i.e., use a jackleg in each pocket on the "curb side" of the body when unloading or loading from this side). Always place jacklegs solidly under the body area where the load is being handled by the crane. Remember—in lifting a heavy load, the weight can create enough tipping moment to overturn the vehicle.

The 5005H boom was designed to handle column or compressive loads and bending loads induced from the load. If twisting loads are induced by trying to lift or drag a load from the side, the boom can fail far below its rated capacity.

Never operate the crane near overhead electrical power lines. Auto Crane Company recommends that a crane boom never be moved any closer to a power line (including telephone lines) than 20 feet at any point.

Occasionally a customer will overload a crane and bend the boom and try to straighten the boom and reinforce it by welding angle or plate to it; or they replace a component with an inappropriate, locally purchased component. The Auto Crane Company cannot warrant a unit under these conditions. Auto Crane Company utilizes a 50,000 P.S.I. yield type steel in all our crane structural sections. If a unit should be heavily overloaded, it would "crumple" rather than snap as a brittle type steel (yield point close to tensile point) would react. This is the main reason that Auto Crane cannot permit a customer to weld on Auto Crane units, Welding heat could change the molecular structure and cause the steel to become brittle. All of the various components utilized in Auto Crane Products have been thoroughly tested and are the best available for the particular function they perform. Many components are custom built to stringent Auto Crane specifications. Auto Crane Company has a continuous "on-going" Research and Development Program, and as new components appear on the market, they are thoroughly tested. Only a few of these many components pass the rigid requirements demanded by Auto Crane Engineers. This is the basic reason that our warranty is automatically void when a customer replaces a factory furnished part with an "unauthorized" component which has not been factory tested and approved.

Auto Crane Company issues a limited warranty certificate with each unit sold. See last page for warranty policy.

If material or workmanship is involved, immediate corrective action is taken. It is therefore, understandable that Auto Crane Company cannot assume responsibility or liability when our products have obviously been abused, mis-used, overloaded or otherwise damaged by inexperienced persons trying to operate the equipment without even reading the manual. The Auto Crane is designed and built to be safe and efficient. Auto Crane will not assume responsibility or liability for any unit which has been modified, changed, or which has unauthorized or unapproved components installed.

Auto Crane Company maintains a crew of skilled and highly trained Service Personnel. The men in our Service Department are available to all of our customers throughout the continental limits of the United States. Many times a telephone conversation with a serviceman can solve a customer's equipment problem. When the serviceman makes a field trip, an accepted warranty claim trip is naturally paid by Auto Crane Company; however, our service rates are reasonable and, in most instances, the serviceman can repair a damaged unit on the spot, plus the Auto Crane serviceman can train customer operators, maintenance and servicemen in the field. This training can alleviate a lot of customer expense due to inexperienced personnel, and most customers agree that the nominal service trip expense is well worth the cost because of the training benefits gained.

Auto Crane Company's extensive Research and Development Program assures our customers of the best equipment on the market, and our Engineering Staff, as well as our knowledgeable sales people are always available to our customers in solving crane and winch-type problems. When in doubt — call the Auto Crane factory.

IMPORTANT

OPERATION PROCEDURES, SAFETY TIPS, AND PRECAUTIONS

- 1. Keep hoist cable pulled tight at all times.
- 2. Never un-reel last wrap of cable from drum.
- Keep truck in as level a position as possible while loading or unloading.
- 4. Never wrap cable around load.
- 5. Use Jacklegs (stabilizers) from truck to the ground.
- Oil gears as required. See Maintenance Section, page 10.
- A friction brake holds the load when power is off. This
 brake may need to be adjusted periodically. Never
 adjust brake tighter than required to hold the load.
 Adjustment nut is located on rear of actuator.
- An important item which an operator should consider and use properly is the hoist hook. It should be checked on a 30-day basis for distortion or cracks.

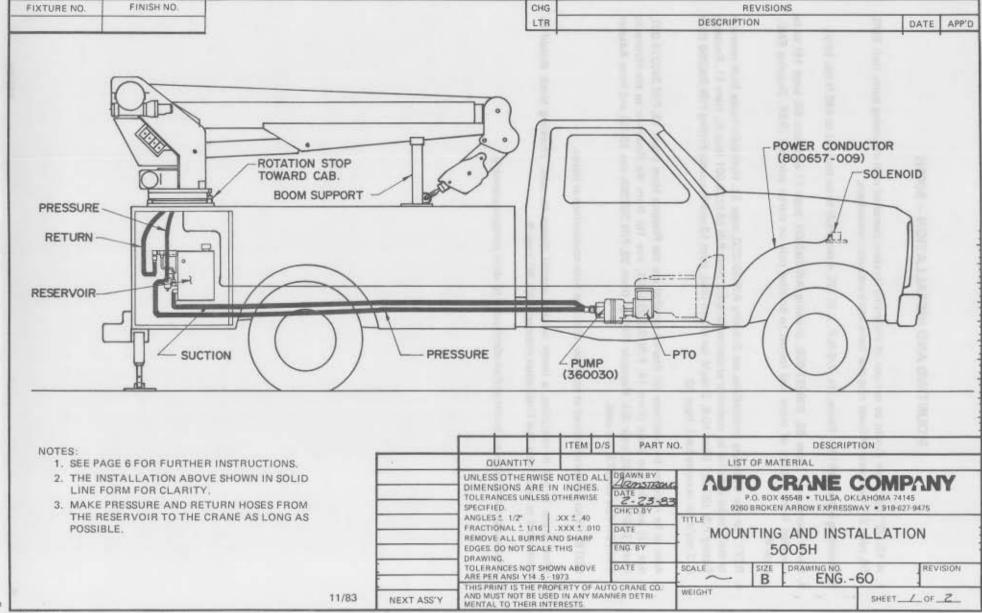
- A. Never place a chain link on the tip of the hook and try to lift a load with the hoist.
- B. Never use a sling bar or anything larger than the hook throat which could prevent the hook from closing with the block, thus negating the safety feature.
- C. In case of a safety hook, always insure that the hook throat is closed before lifting a load. Proper attention and common sense applied to the use of the hoist hook and various slings will prevent possible damage to material being hoisted, and may prevent injury to personnel.

WHEN ORDERING REPLACEMENT PARTS, PLEASE PROVIDE THE FOLLOWING INFORMATION:

(1) Model Number;

(2) Serial Number;

(3) Part Number and Description

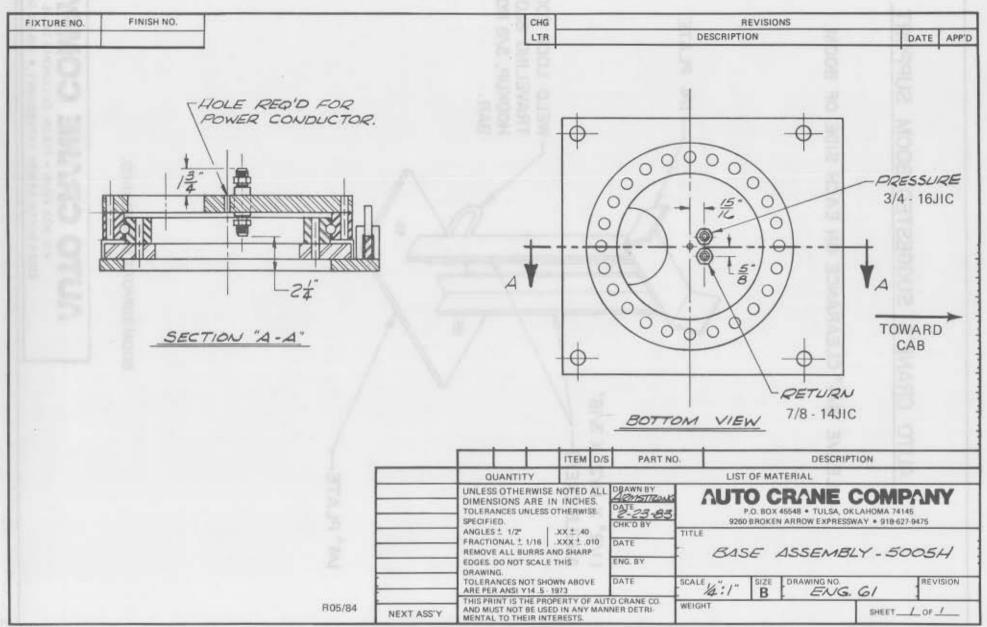


MOUNTING AND INSTALLATION - 5005H

- A 13-1/2" Dia. hole should be cut out of mounting location (centered with mounting bolts. Ref: ENG. 50, page 37) for access of lower ring gear bolts and hydraulic connections.
- 2. Mounting bolts (015104 Screw, Hx. 7/8 N.F. X 5" G5, 4 required) to be torqued to 440 ft.lbs. (dry).
- Power Conductor (Item 65, 800657-009, Drawing AW-360000, page 11 and Item 62, page 14) to be uncoiled from bottom of crane and routed to positive pole on starter solenoid (REF. Drawing ENG., page 5).
- 4. REF: For the following instructions see Drawing AW-360250, page 31. Hydraulic hoses from reservoir to crane to be installed by customer at desired lengths. Hose P/N 551228-001 (size 8), Item 11. Reusable Fitting P/N 551227 (Size 10-8, 2 req'd for return line), Item 12 and Reusable Fitting P/N 360266 (Size 8, 2 req'd for pressure line), Item 23.
- Also to be installed by customer (at desired lengths) are the Pressure Hose (Item 13, P/N 360274-001, size 12) and Suction Hose (Item 14, P/N 360275-001, size 16) from the Reservoir to the Hydraulic Pump (REF: 360030, page 33). Reusable Fittings (Item 20, P/N 360269, size 10-12) and Hose Adapter (Item 21, P/N 360273) are used.

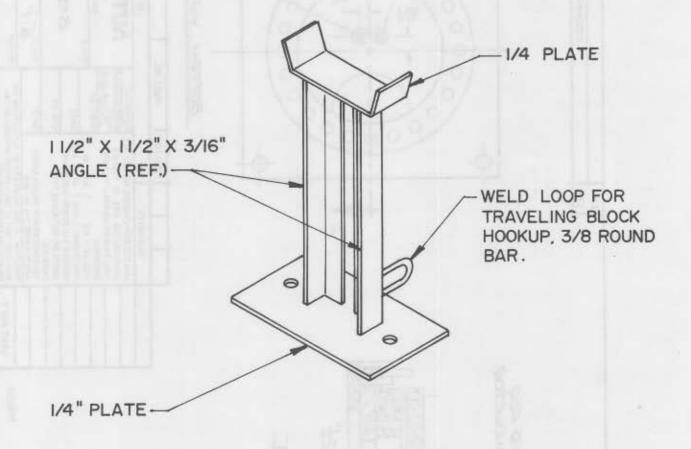
NOTE: If no pressure received at reservoir, alternate hose connections at pump.

- When crane is not in operation, a boom support should always be used. Traveling block should be connected to hook loop. See Illustration drawing ENG. 60, page 5.
- 7. Always use cable loops on boom and pendant guard to store pendant assembly.



AUTO CRANE'S SUGGESTED BOOM SUPPORT

LEAVE 3/4" CLEARANCE ON EACH SIDE OF BOOM.



BOOM SUPPORT IS REQUIRED.

AUTO CRANE COMPANY

P.O. BOX 45548 • TULSA, OKLAHOMA 74145 9260 BROKEN ARROW EXPRESSWAY • 918-627-9475

WIRE LINE LUBRICATION

Lubrication of the wire line serves two important purposes: (1) helps to prevent corrosion; (2) lubricates the cable strands to reduce wear due to flexing and abrasion caused by contact with the sheaves, rollers and cable on the drum.

PREPARATION:

Remove rust and foreign matter with a wire brush and wipe clean. Be sure cable is dry.

APPLICATION:

Two methods are illustrated in figures 1 and 2. A light weight motor oil may be used, as in figrue 1; or a heavier lubricant such as grease gun lubricant, as in figure 2.

Illustrated in figure 1 is one easy and effective method of applying lubrication. Dip the brush into the lubricant and apply. In some cases a rag or piece of sheepskin is dipped in the lubricant and used to swab the lubricant on to the rope.

Another simple method is shown in figure 2. Leather gloves are preferred to canvas because of greater protection and less penetration of the grease.



Fig. 1

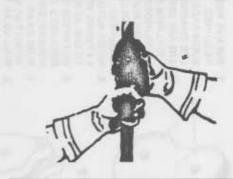


Fig. 2

"LIFE OF WIRE LINE"

So many variable factors can cause the deterioration of wire line cable that it is not possible to determine a definite life expectancy.

Some of these factors are:

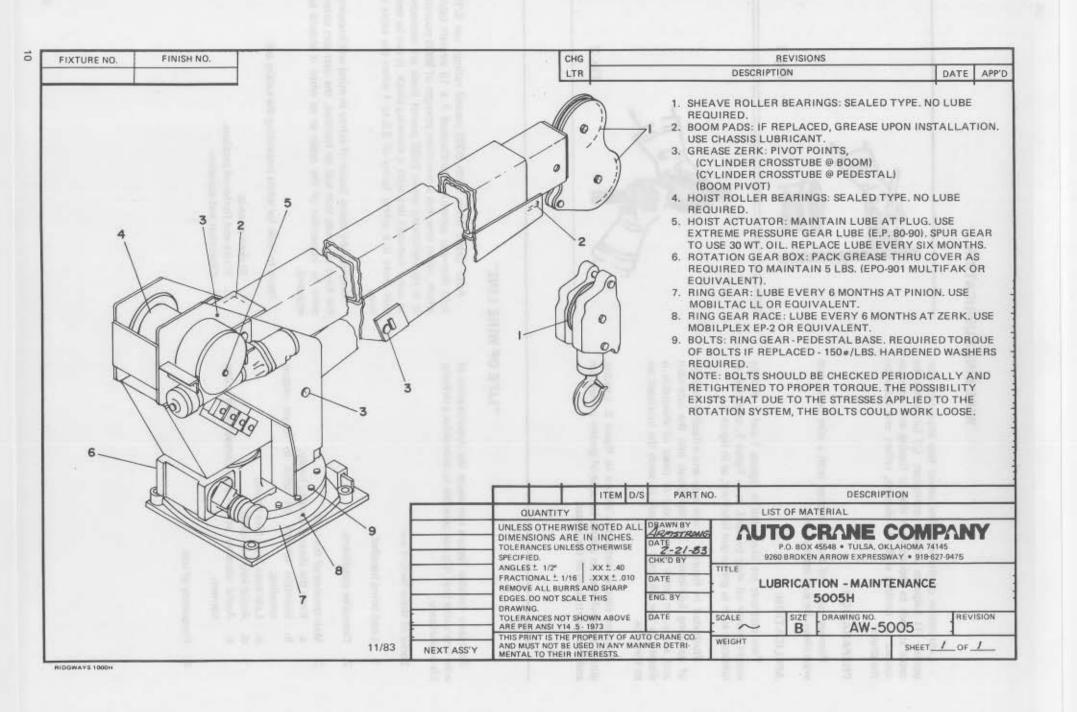
- 1. Load being handled.
- 2. Corrosive conditions.
- 3. Maintenance of the unit.
 - a. Keep the sheaves turning freely.
 - Maintain tension on cable to insure proper spooling.
 - c. Lubricate line. (See above)
 - d. Avoid kinks in cable.
 - e. Avoid abrasive action and contact with sharp corners.
- 4. Frequency of use.

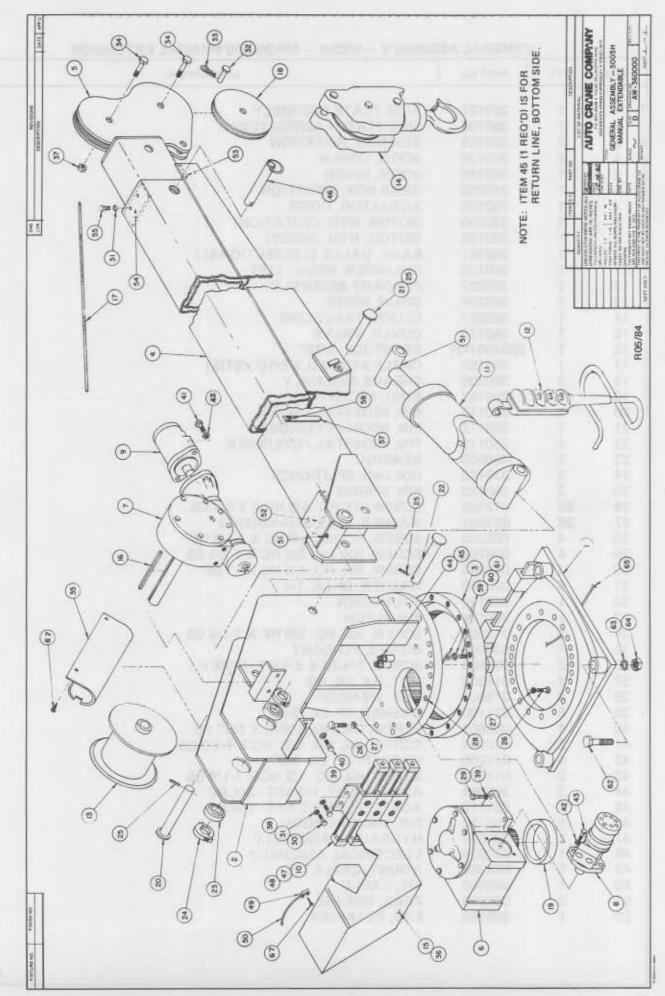
Auto Crane units, with 5000 pound ratings, use 5/16 inch diameter galvanized preformed 7 x 19 aircraft cable which, when new, has a minimum strength of 9800 pounds. It is recommended when 2500 pound loads are exceeded to use a two-part line with a traveling block. It can be seen that there is a safety factor of 3.9 to 1 when the cable is new.

Keeping the above factor of safety in mind and knowing the kind of loads that will be handled, the user can determine by inspection of the cable as to when it should be replaced.

Items to look for while inspecting the cables are:

- 1. Broken strands.
- 2. Kinks and flattened sections.
- 3. Corrosion and abrasion.



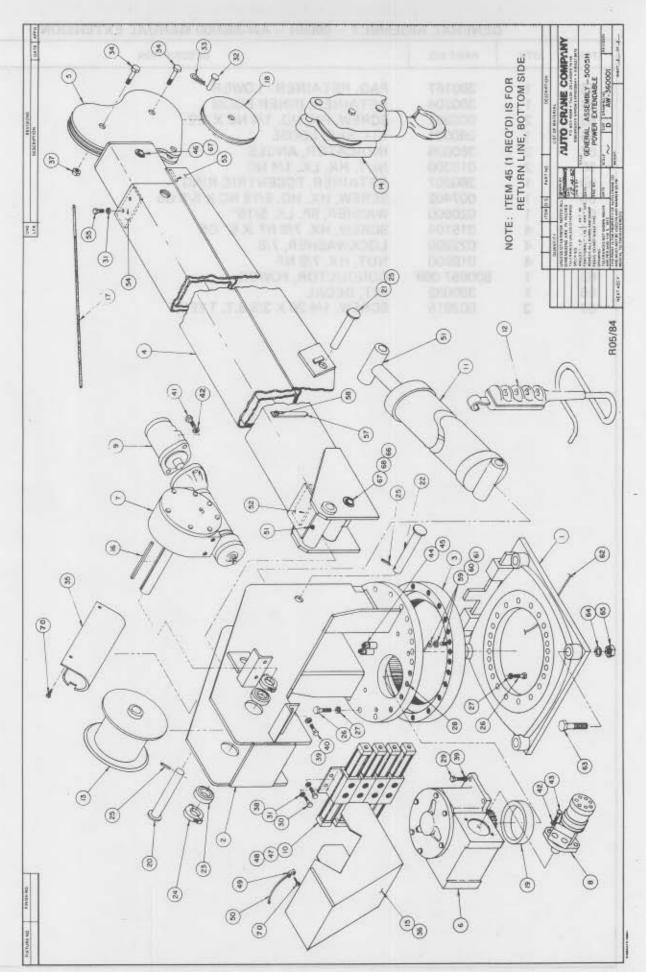


GENERAL ASSEMBLY - 5005H - AW-360000 MANUAL EXTENSION

TEM	QTY.	PART NO.	DESCRIPTION	
1	4	360127	BASE PLATE ASSEMBLY	
-				
2	1	360100	SIDE PLATE FABRICATION	
3	1	360163	BEARING, ROTATION	
4		360135	BOOM, LOWER	
5	1	360146	BOOM, INNER	
6	1	360099	GEAR BOX, ROTATION	
7	1	360198	ACTUATOR, HOIST	
8	1	330200	MOTOR, HYD. (ROTATION)	
9	1	360199	MOTOR, HYD. (HOIST)	
10	1	360161	BANK, VALVE (3 DIRECTIONAL)	
11	1	360158	CYLINDER, BOOM - LIFT	
12	1	360022	PENDANT ASSEMBLY	
13	1	360208	DRUM, HOIST	
14	1	360027	BLOCK, TRAVELING	
15	1	360170	COVER, VALVE	
16	1	800400-001	KEYSTOCK, 5/16"	
17	1	360155	CABLE ASSEMBLY 5/16" (STD.)	
18	2	360205	SHEAVE ASSEMBLY	
19	1	360162	RING, ECCENTRIC	
20	1	360115	PIN, PEDESTAL / BOOM	
21	1	360117	PIN, BOOM / CYLINDER	
22	1	360113	PIN, PEDESTAL / CYLINDER	
23	2	400500	BEARING	
24	2 2	330468	COLLAR, SPLIT-LOCK	
25	3	360123	PIN, SPRING	
	38	012199	SCREW, HX.HD. 5/8 NC X 1-3/4 G5	
26			WASHER, FL. 5/8 HARDENED	
27	38	023902	SCREW, SC. HD. 5/8 NC X 1-1/4 G5	
28	4	006205		
29	4	008702	SCREW, HX. HD. 3/8 NC X 1-1/4 G5	
30	4	005604	SCREW, HX. HD. 1/4 NC X 1" G5	
31	6	020200	WASHER, SP. LK. 1/4	
32	1	360126	PIN, CROWN	
33	1	360124	PIN, HITCH	
34	2	013506	SCREW, HX. HD. 5/8 NF X 2-1/4 G5	
35	1	634000	GUARD, PENDANT	
36	3	002608	SCREW, 1/4-20 X 3/4 S.T. TYPE F	
37	2	018300	NUT, HX. LK. 5/8	
38	4	015900	NUT, 1/4 NCCP	
39	8	021100	WASHER, SP. LK. 3/8	
40	4	008601	SCREW, HX. HD. 3/8NC X 7/8" G5	
41	2	010201	SCREW, HX. HD. 1/2" NC X 1-1/2 G5	
42	4	021500	WASHER SP. LK. 1/2"	
43	2	011510	SCREW, HX. HD. 1/2 NC X 1-1/4 G5	
44	3	360054	ADAPTER, ST. 1/2 NPT - 3/4 JIC	
45	1	551215	ADAPTER, ST. 1/2 NPT - 7/8 JIC	
46	1	360112	PIN, MANUAL BOOM	
47	1	360021	HYDRAULIC ASSEMBLY	
48	1	360024	ELECTRICAL ASSEMBLY	
49	1	663300	MOUNT, CABLE TIE	
	1	663100	TIE, CABLE	
50	2	239000	ZERK, GREASE	
51 52	3		PAD, RETAINER	
11.1		360165	TAD, BETAINER	

GENERAL ASSEMBLY - 5005H - AW-360000 MANUAL EXTENSION

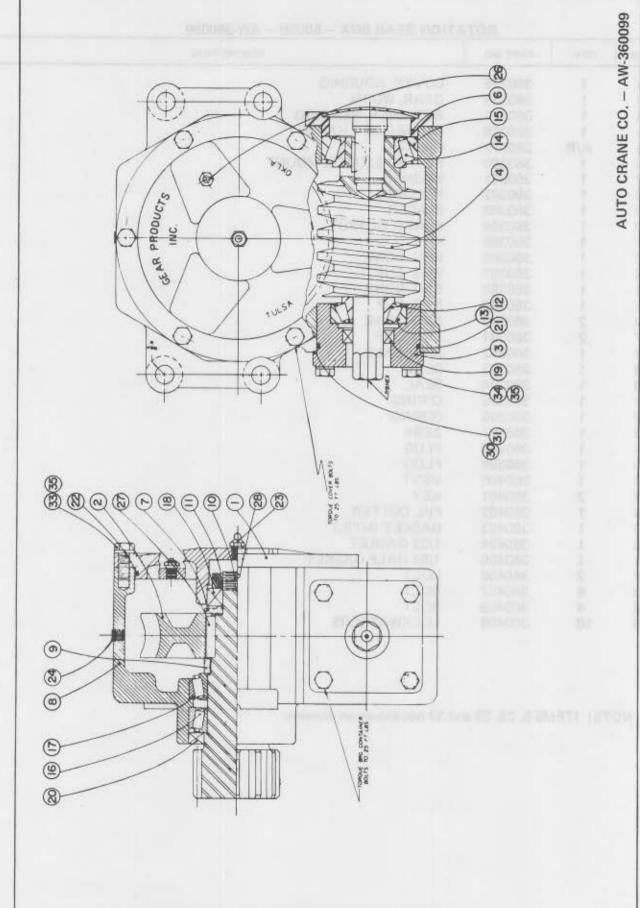
TEM	QTY.	PART NO.	DESCRIPTION
53	1	360167	PAD, RETAINER - LOWER
54	1	360204	RETAINER, INNER BOOM
55	2	005901	SCREW, HX. HD. 1/4 NC X 1/2
56	1	360031	KIT, SHIP LOOSE
57	2	360038	INDICATOR, ANGLE
58	2	016300	NUT, HX. LK, 1/4 NC
59	1	360207	RETAINER, ECCENTRIC RING
60	1	007402	SCREW, HX. HD. 5/16 NC X 5/8 G5
61	1	020600	WASHER, SP. LK. 5/16"
62	4	015104	SCREW, HX. 7/8 NF X 5" G5
63	4	022200	LOCKWASHER, 7/8
64	4	018900	NUT, HX. 7/8 NF
65	1	800657-009	CONDUCTOR, POWER
66	1	360032	KIT, DECAL
67	3	002615	SCREW, 1/4-20 X 3/8 S.T. TYPE F



GENERAL ASSEMBLY - 5005H - AW-360001 POWER EXTENSION

TEM	QTY,	PART NO.	DESCRIPTIO	N	02.70	
1	1	360127	BASE PLATE ASSEMBLY	TRANS		gib-ag.
	1	360100	SIDE PLATE FABRICATION			
2	4	360100	DEADING POTATION			
2 3 4 5 6 7 8 9	1	360163	BEARING, ROTATION			
4	1	360135	BOOM, LOWER			
5	1	360146	BOOM, INNER			
6	1	360099	GEAR BOX, ROTATION			
7	1	360198	ACTUATOR HOIST			
8	1	330200	MOTOR, HYD. (ROTATION)			
9	1	360199	MOTOR, HYD. (HOIST)			
10	1	360159	MOTOR, HYD. (HOIST) BANK, VALVE (4 DIRECTIONAL)			
11	1	360158	CYLINDER, BOOM - LIFT			
12	1	360023	DENDANT ASSEMBLY			
13	1	360208	DRUM, HOIST			
14	1	360027	BLOCK, TRAVELING			
	1		COVER. VALVE			
15	1	360170	COVER, VALVE			
16	1	800400-001	KEYSTOCK, 5/16"			
17	1	360155	CABLE ASSEMBLY 5/16" (STD.)			
18	2	360205				
19	1	360162	RING, ECCENTRIC			
20	1	360115	PIN, PEDESTAL / BOOM			
21	1	360117	PIN, BOOM / CYLINDER			
22	1	360113	PIN, PEDESTAL / CYLINDER			
23	2 2 3	400500	BEARING			
24	2	330468	COLLAR, SPLIT-LOCK			
25		360123	PIN, SPRING			
26	38	012199	SCREW, HX.HD. 5/8 NC X 1-3/4 G5			
27	38	023902	WASHER, FL. 5/8 HARDENED			
28	4	006205	SCREW, SC. HD. 5/8 NC X 1-1/4 G5			
29	4	008702	SCREW, HX. HD. 3/8 NC X 1-1/4 G5			
30	4	005604	SCREW, HX. HD. 1/4 NC X 1" G5			
31	6	020200	WASHER, SP.LK. 1/4			
32	1	360126	PIN, CROWN			
33	1	360124	PIN, HITCH			
34	2	013506	SCREW, HX. HD. 5/8 NF X 2-1/4 G5			
35	1	634000	GUARD, PENDANT			
36	3	002608	SCREW, 1/4-20 X 3/4 S.T. TYPE F			
37	2	018300				
38	4		NUT, HX. LK. 5/8			
		015900	NUT, 1/4 NCCP			
39	8	021100	WASHER, SP. LK. 3/8			
40	4	008601	SCREW, HX. HD. 3/8NC X 7/8" G5			
41	2	010201	SCREW, HX. HD. 1/2" NC X 1-1/2 G5			
12	4	021500	WASHER, SP. LK. 1/2"			
13	2	011510	SCREW, HX. HD. 1/2 NC X 1-1/4 G5			
14	3	360054	ADAPTER, ST. 1/2 NPT - 3/4 JIC			
45	1	551215	ADAPTER, ST. 1/2 NPT - 7/8 JIC			
46	1	360121	PIN, EXT. CYL. UPPER BOOM			
47	1	360026	HYDRAULIC ASSEMBLY			
18	1	360025	ELECTRICAL ASSEMBLY			
49	1	663300	MOUNT, CABLE TIE			
50	1	663100	TIE, CABLE			
51	3	239000	ZERK, GREASE			
52	1	360165	PAD, RETAINER			

TEM	QTY.	PART NO.	DESCRIPTION	ON	ATE	
53 54 55 56 57 58 59 60 61 62 63 64 65 66 67 68	1 1 2 1 2 2 1 1 1 1 4 4 4 4 1	360167 360204 005901 360031 360038 016300 360207 007402 020600 800657-009 015104 022200 018900 360152 360122 360120 360032	PAD, RETAINER - LOWER RETAINER, INNER BOOM SCREW, HX. HD. 1/4 NC X 1/2 KIT, SHIP LOOSE INDICATOR, ANGLE NUT, HX. LK. 1/4 NC RETAINER, ECCENTRIC RING SCREW, HX. HD. 5/16 NC X 5/8 G5 WASHER, SP. LK. 5/16" CONDUCTOR, POWER SCREW, HX. 7/8 NF X 5" G5 LOCKWASHER, 7/8 NUT, HX. 7/8 NF CYLINDER, BOOM EXT. RING, RETAINING PIN, EXT. CYL. LOWER KIT, DECAL	TEPORE SEPTER SEPTER		- 一日の日本日日日日日日日日日日日日日日日日日日日日日日日日日日日日日日日日日日
70	3	002615	SCREW, 1/4-20 X 3/8 S.T. TYPE F			
	3.50	example of the same				

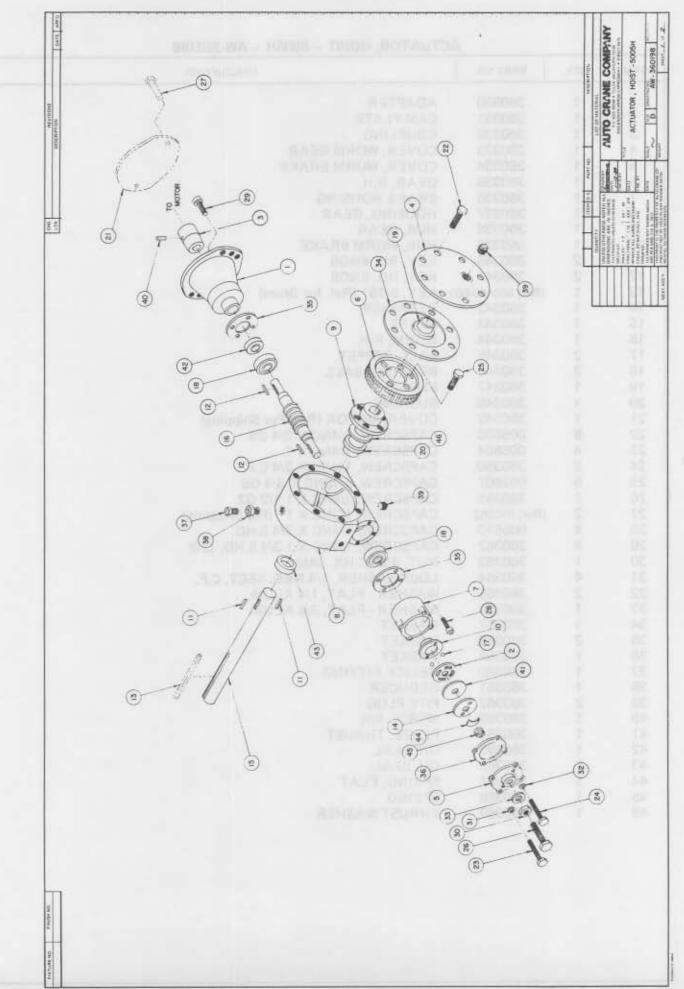


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ROTATION GEAR BOX - 5005H - AW-360099

ITEM	QTY.	PART NO.	DESCRIPTION
1 3	1	360375	COVER, HOUSING
2	1	360376	GEAR, WORM
2	1	360377	RETAINER, BEARING
4	1	360378	WORM (LEFT HAND)
5	A/R	360379	GASKET
5 6 7	1	360380	RET. BRG. / MTG. MOUNT
7	1	360381	WASHER
8	1	360382	HOUSING
8 9	1	360383	SPACER
10	1	360384	SHAFT, OUTPUT
11	1	360385	NUT
12	1	360386	BRG, CONE
13	1	360387	BRG. CUP
14	1	360388	BRG. CONE
15	1	360389	BRG. CUP
16	2	360390	BRG. CONE
17	2	360391	BRG. CUP
18	1	360392	BRG. BALL
19	1	360393	SEAL
20	1	360394	SEAL
21	1	360395	O'RING
22	1	360396	O'RING
23	1	360397	ZERK
24	1	360398	PLUG
25	1	360399	PLUG
	1	360400	VENT
26 27	2	360400	KEY
28	2	360401	PIN, COTTER
28	1	360402	GASKET (MTR.)
	4	360403	1/32 GASKET
30	1	360404	1/64 HALF GASKET
31	2	360405	BOLT
32	2	360406	BOLT
33	6	360407	BOLT
34	10	360408	LOCKWASHERS
35	10	300409	LOCKWASTICKS

NOTE: ITEMS 5, 25, 29 and 32 not shown on drawing.

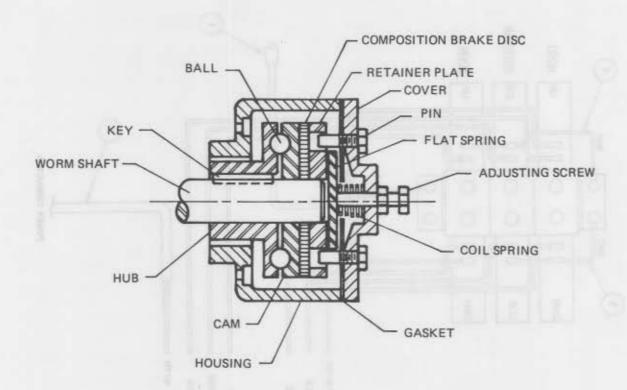


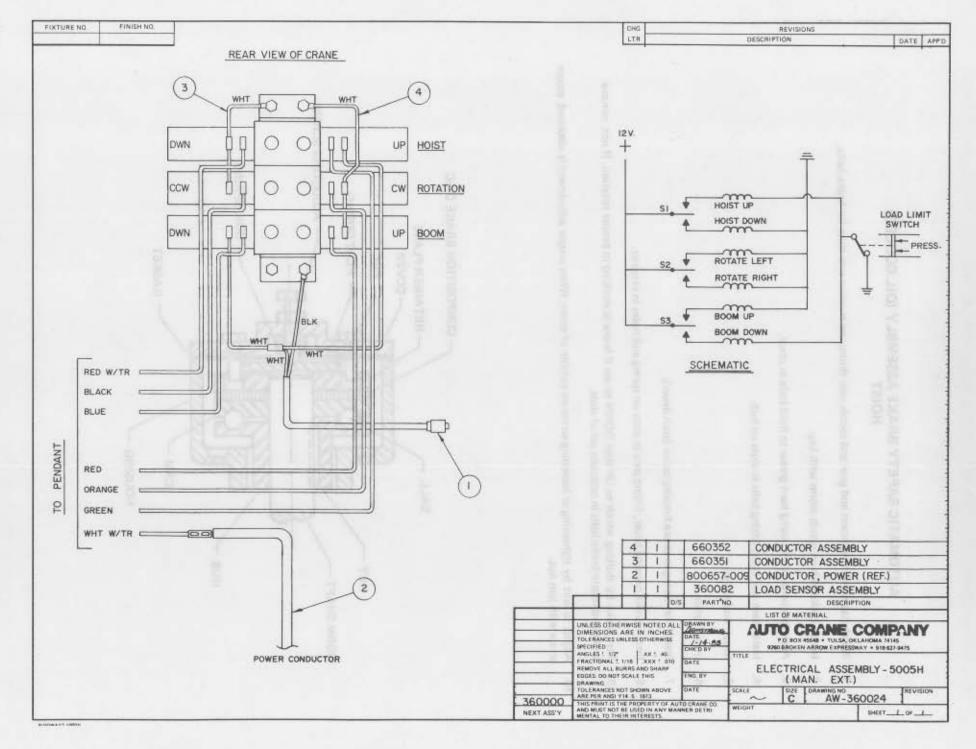
ACTUATOR, HOIST - 5005H - AW-360198

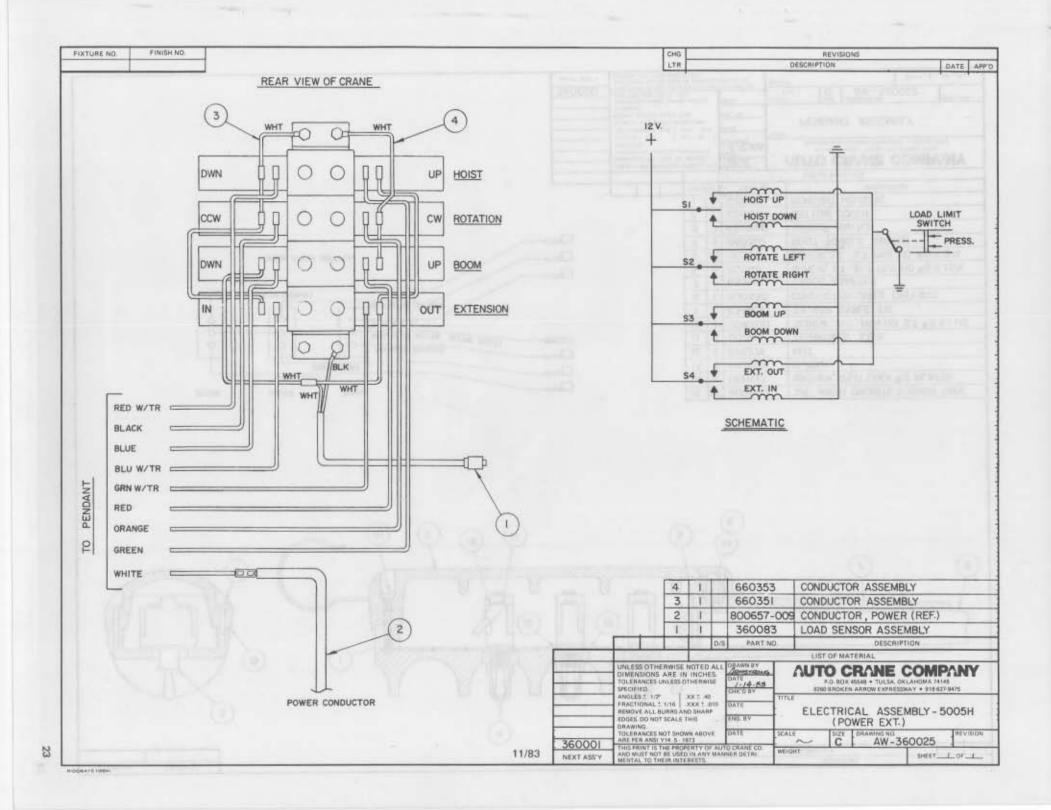
TEM	QTY.	PART NO.	DESCRIPTION
1	1	360330	ADAPTER
	1	360331	CAMPLATE
2 3	1	360332	COUPLING
4	- 1	360333	COVER, WORM GEAR
	1		
5 6 7 8 9		360334	COVER, WORM BRAKE
6	1	360335	GEAR, R.H.
/	1	360336	BRAKE HOUSING
8	1	360337	HOUSING, GEAR
	1	360338	HUB, GEAR
10	1	360339	HUB, WORM BRAKE
11	2	360340	KEY, RD. ENDS
12	2	360341	KEY, RD. ENDS
13	1	(Ref) 800400-001	KEY, 5/16" (Ref. for Drum)
14	1	360342	RETAINER
15	1	360343	SHAFT
16	1	360344	WORM, R.H.
17	2	360345	BALL, POPPET
18	2	360346	BEARING, BALL
19	1	360347	BUSHING
20	1	360348	BUSHING
21	1	360349	COVER, MOTOR (Ref. For Shipping)
22	8	005500	CAPSCREW, 1/4NC X 3/4 G5
23	4	005604	CAPSCREW, 1/4NC X 1
24		360350	CAPSCREW, 1/4NC X 3/4 C.P.
25	2 6 1	007807	CAPSCREW, 5/16NC X 3/4 G5
26	1	360351	CAPSCREW, 3/8NC X 1-1/2 G2
27	2	(Ref) 010202	CAPSCREW, 1/2NC X 1" (For Shipping)
28	4	005610	CAPSCREW, 1/4NC X 3/4 S.HD.
29	4	360352	CAPSCREW, 1/4NC X 1-3/4 S.HD. L/W
30	1	360353	NUT, 3/8NC HX. JAM
31	4	360354	LOCKWASHER, 1/4 MED. SECT. C.P.
		360355	WASHER - FLAT, 1/4 ALUM.
32	2		
33	1	360356	WASHER - FLAT, 3/8 ALUM.
34	1	360357	GASKET
35	2	360358	GASKET
36	1	360359	GASKET
37	1	360360	RELIEF FITTING
38	1	360361	REDUCER
39	2	360362	PIPE PLUG
40	1	360363	SPIROL PIN
41	1	360364	PLATE, THRUST
42	1	360356	OILSEAL
43	1	360366	OIL SEAL
44	1	360367	SPRING, FLAT
45	1	360368	SPRING
46	4	360369	THRUST WASHER

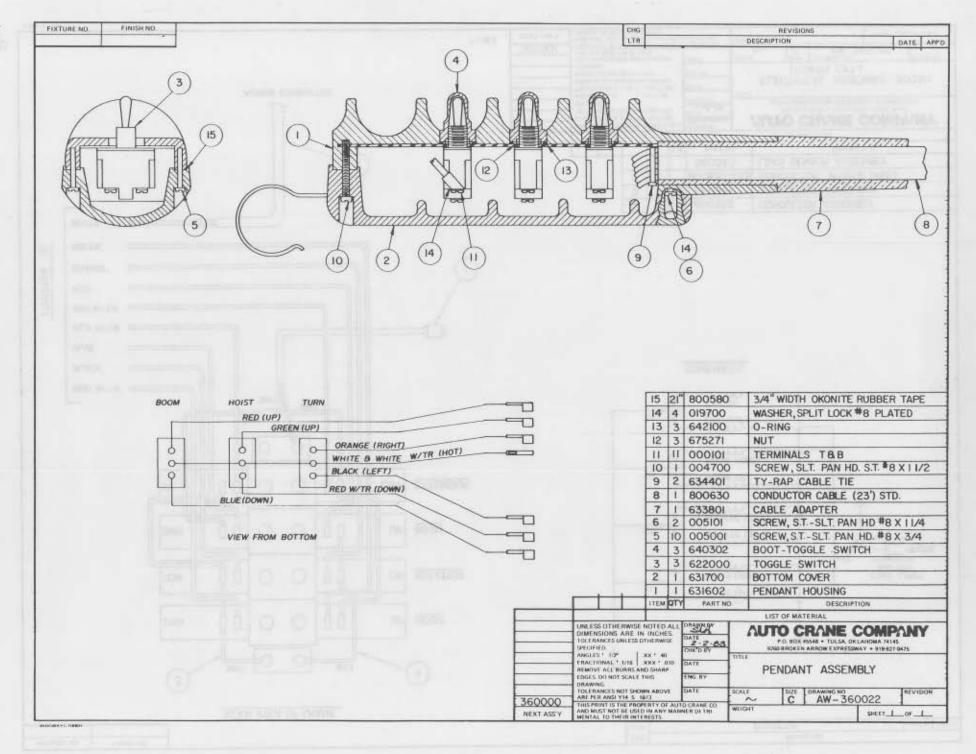
AUTOMATIC SAFETY BRAKE ASSEMBLY (OIL COOLED) HOIST

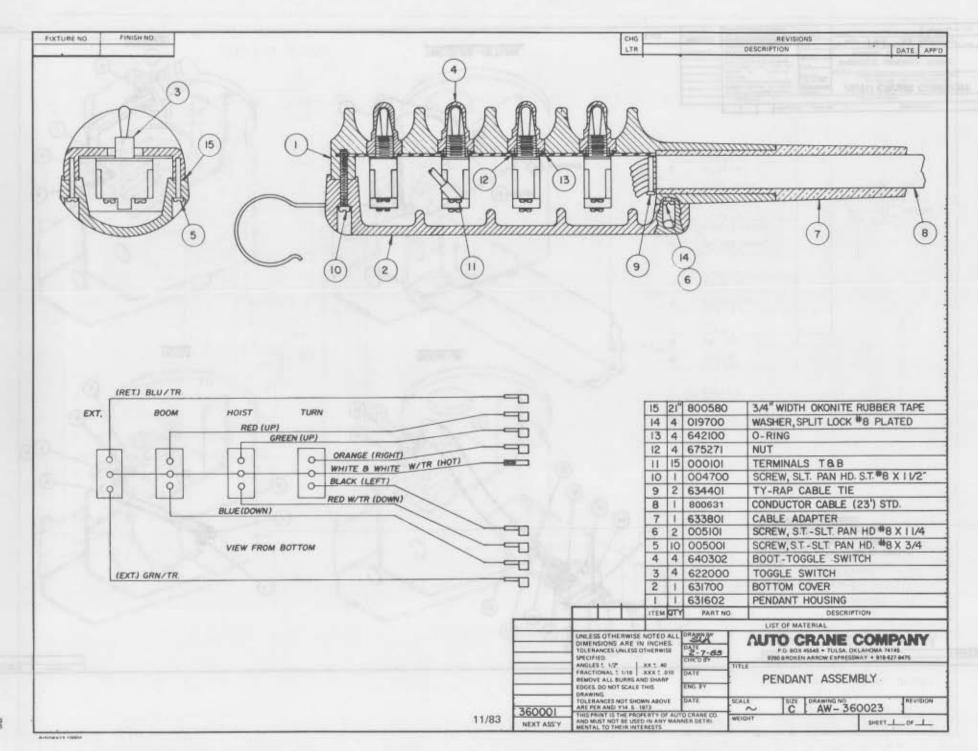
- 1. Winch has right hand worm and gear and spools over drum; use number one slots for brake balls.
- 2. Install brake hub on winch worm with key.
- 3. Assemble balls in cam using hard grease to hold balls in place.
- 4. Install cam and balls, fitting balls in slots on hub.
- 5. Install brake disc.
- 6. Install retainer.
- 7. Install flat spring in brake housing cover (arch down).
- 8. Install brake housing cover, fitting pins in slots on spring and holes in retainer.
- Test brake by shifting winch to UP then DOWN to see if brake is working in proper rotation. If not, remove brake and locate brake balls in opposite set of slots.
- Adjust to suit by tightening or loosening screw on outside of cover. When proper adjustment is obtained, secure screw with jam nut.

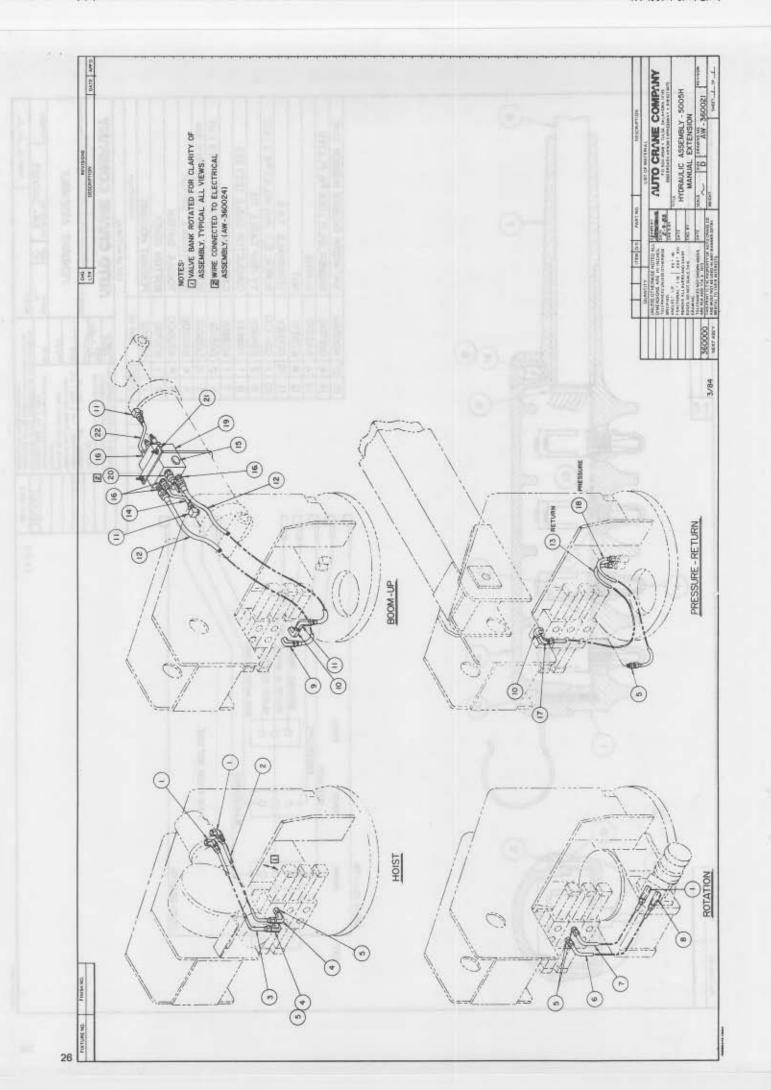






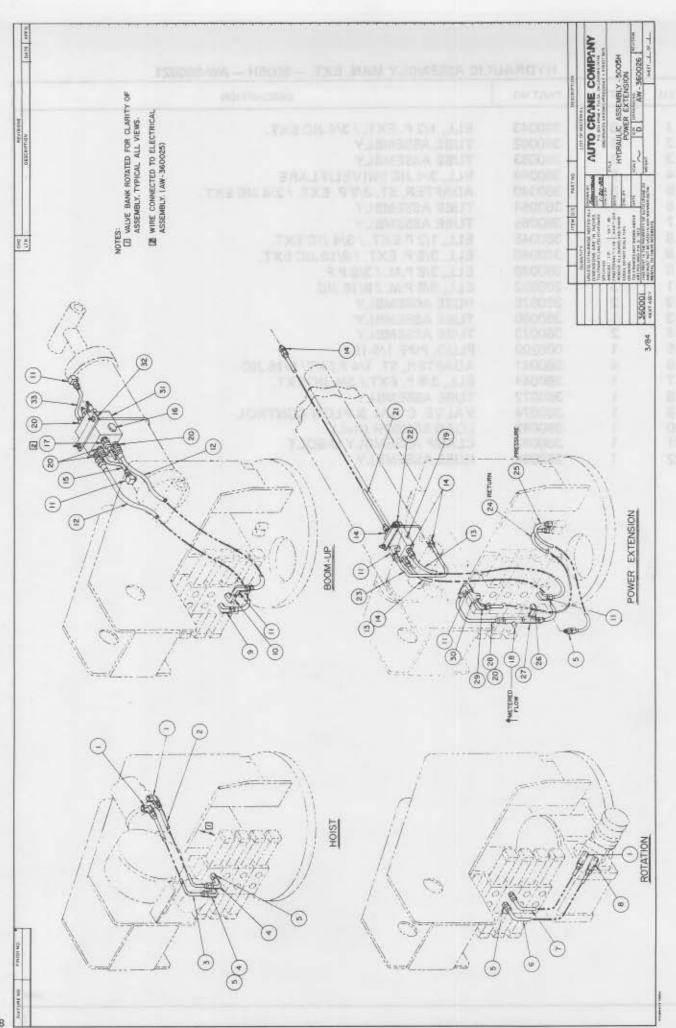






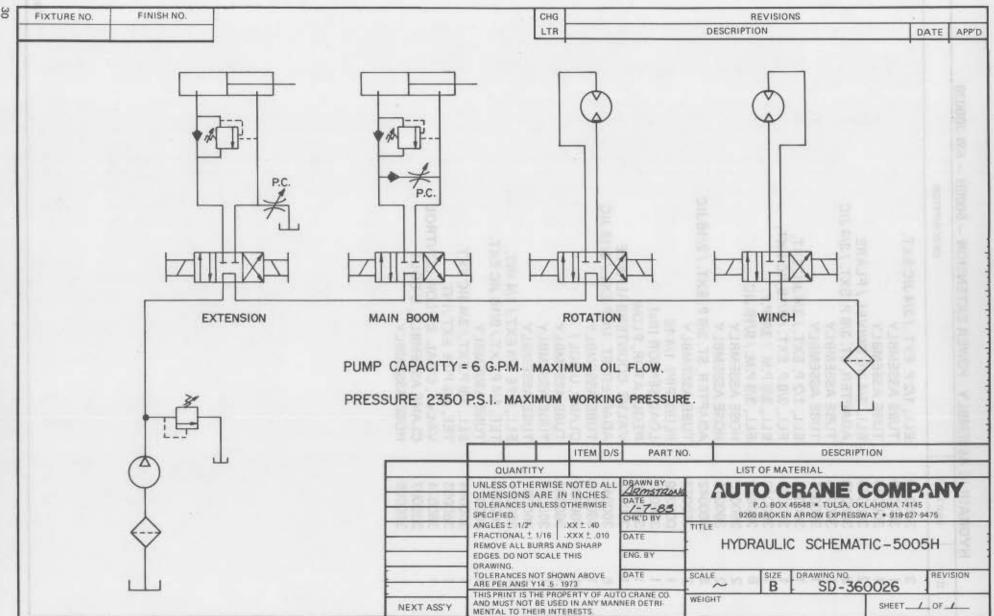
HYDRAULIC ASSEMBLY MAN. EXT. - 5005H - AW-360021

ITEM	QTY.	PART NO.	DESCRIPTION
1	3	360043	ELL, 1/2 P. EXT. / 3/4 JIC EXT.
2	1	360062	TUBE ASSEMBLY
3	1	360063	TUBE ASSEMBLY
4	2	360049	ELL, 3/4 JIC SWIVEL/FLARE
5	5	360040	ADAPTER, ST. 3/8 P. EXT. / 3/4 JIC EXT.
5 6 7	1	360064	TUBE ASSEMBLY
7	1	360065	TUBE ASSEMBLY
8	1	360045	ELL, 1/2 P.EXT. / 3/4 JIC EXT.
9	1	360046	ELL, 3/8 P. EXT. / 9/16 JIC EXT.
10	2	360048	ELL, 3/8 P.M. / 3/8 P.F.
11	3 2 1	200892	ELL, 3/8 P.M. / 9/16 JIC
12	2	360076	HOSE ASSEMBLY
13	1	360060	TUBE ASSEMBLY
14	2	360073	TUBE ASSEMBLY
15	1	000209	PLUG, PIPE 1/4-18
16	4	360041	ADAPTER, ST. 1/4 P.EXT/ 9/16 JIC
17	1	360044	ELL, 3/8 P. EXT./ 3/4 JIC EXT.
18	1	360072	TUBE ASSEMBLY
19	1	360074	VALVE, C' BAL & FLOW CONTROL
20	1	360082	LOAD SENSOR (Ref.)
21	1	360097	CLAMP ASSEMBLY U-BOLT
22	1	360098	HOSE ASSEMBLY

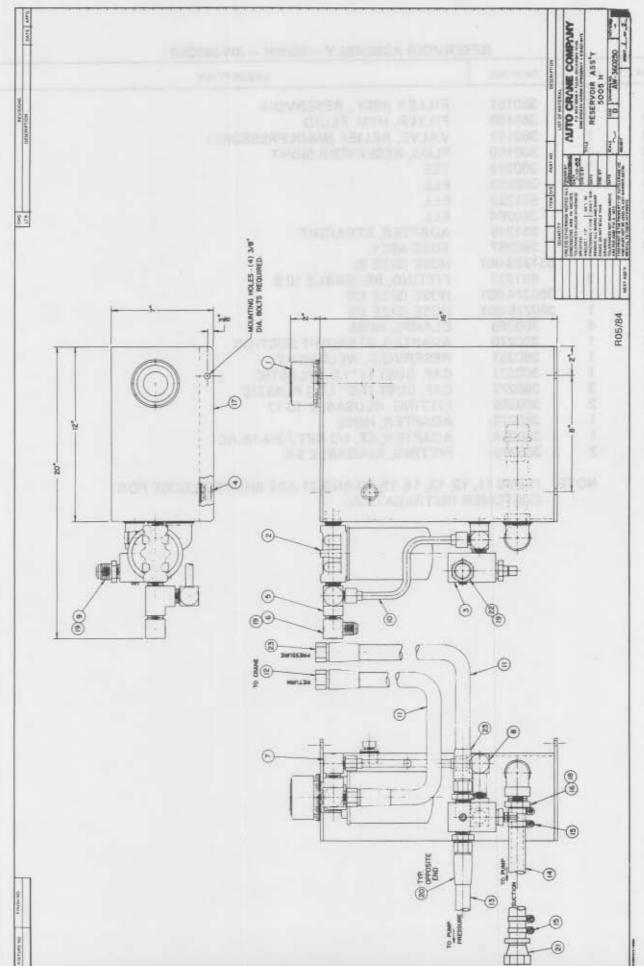


HYDRAULIC ASSEMBLY - POWER EXTENSION - 5005H - AW-360026

TEM	QTY.	PART NO.	DESCRIPTION	
1	3	360043	ELL, 1/2 P. EXT. / 3/4 JIC EXT.	
2	91	360062	TUBE ASSEMBLY	
3	1	360063	TUBE ASSEMBLY	
2 3 4	2	360049	ELL, 3/4 JIC SWIVEL / FLARE	
5	5	360040	ADAPTER, ST. 3/8 P. EXT. / 3/4 JIC	
5 6 7 8	1	360064	TUBE ASSEMBLY	
7	1	360065	TUBE ASSEMBLY	
8	1	360045	ELL, 1/2 P. EXT. / 3/4 JIC EXT.	
9	1	360046	ELL, 3/8 P. EXT. / 9/16 JIC EXT.	
10	1	360048	ELL, 3/8 P.M. / 3/8 P.F.	
11	6	200892	ELL, 3/8 P.M. / 9/16 JIC	
12	2	360076	HOSE ASSEMBLY	
13	2	360075	HOSE ASSEMBLY	
14	5	360042	ADAPTER, ST. 3/8 P. EXT. / 9/16 JIC	
15	2	360073	TUBE ASSEMBLY	
16	1	000209	PLUG, PIPE 1/4-18	
17	1	360083	LOAD SENSOR (Ref.)	
18	1	330582	REGULATOR, FLOW	
19	1	360153	VALVE, COUNTERBALANCE	
20	5	360041	ADAPTER, ST. 1/4 P.EXT./ 9/16 JIC	
21	1	360070	TUBE ASSEMBLY	
22	1	360090	CLAMP, U-BOLT	
23	1	360069	TUBE ASSEMBLY	
24	1	360060	TUBE ASSEMBLY	
25	1	360061	TUBE ASSEMBLY	
26	1	360047	ELL, PIPE 3/8 EXT./ 1/4 INT.	
27	1	360050	TEE, 1/4 P.EXT./ 9/16 JIC EXT.	
28	1	360071	TUBE ASSEMBLY	
29	1	360044	ELL, 3/8 P.EXT./ 3/4 JIC EXT.	
30	1	360053	TEE, 3/8 PIPE EXT./INT.	
31	1	360074	VALVE, C'BAL. & FLOW CONTROL	
32	1	360097	CLAMP ASSEMBLY, U-BOLT	
33	1	360098	HOSE ASSEMBLY	



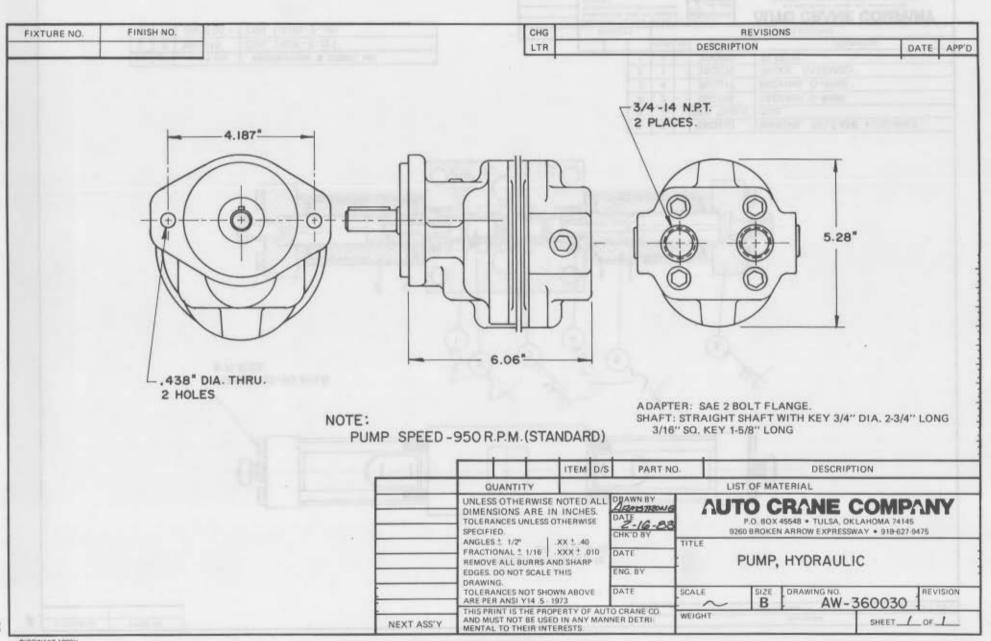
RIDGWAYS 1000H

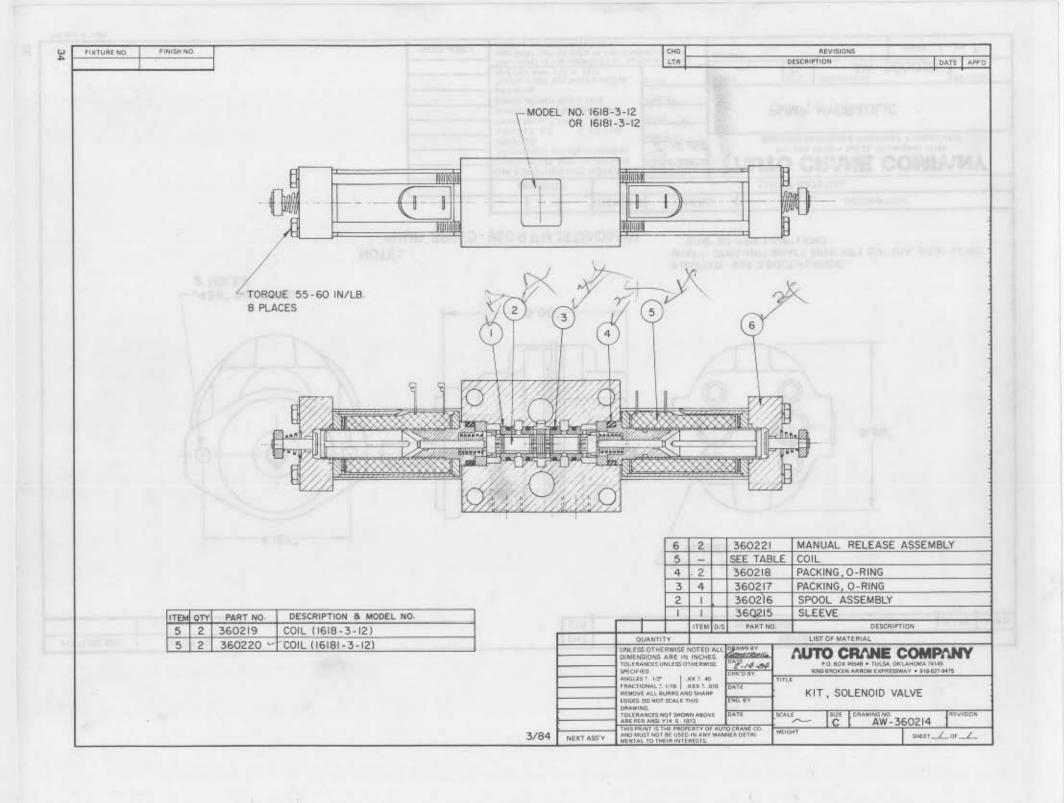


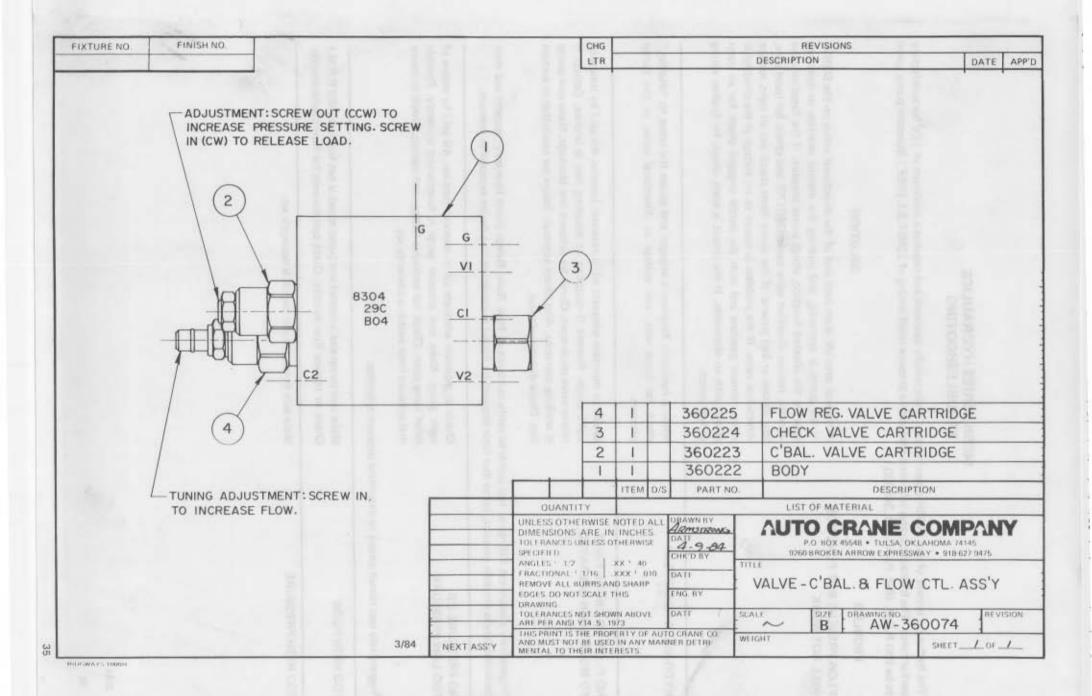
RESERVOIR ASSEMBLY - 5005H - AW-360250

TEM	QTY.	PART NO.	DESCRIPTION	
1	1	360151	FILLER ASSY., RESERVOIR	
2	- 1	360156	FILTER, HYD. FLUID	
2 3 4 5 6 7	1	360157	VALVE, RELIEF (MAIN PRESSURE)	
4	1	360150	PLUG, RESERVOIR SIGHT	
5	1	360262	TEE	
6	1	360263	ELL	
7	1	551222	ELL	
8	1	360264	ELL	
9	1	551215	ADAPTER, STRAIGHT	
10	1	360267	TUBE ASSY.	
11	1	551228-001	HOSE (SIZE 8)	
12	2	551227	FITTING, REUSABLE 10-8	
13	1	360274-001	HOSE (SIZE 12)	
14	1	360275-001	HOSE (SIZE 16)	
15	4	360268	CLAMPS, HOSE	
16	1	360270	ADAPTER, STRAIGHT SUCTION	
17	1	360251	RESERVOIR, WELDMENT	
18	1	360271	CAP, DUST (1" I.D.) PLASTIC	
19	3	360272	CAP, DUST (7/8" I.D.) PLASTIC	
20	3 2 1	360269	FITTING, REUSABLE 10-12	
21	1	360273	ADAPTER, HOSE	
22	1	360054	ADAPTER, ST. 1/2 NPT / 3/4-16 JIC	
23	2	360266	FITTING, REUSABLE 8-8	

NOTE: ITEMS 11, 12, 13, 14, 15, 20 AND 21 ARE SHIPPED LOOSE FOR CUSTOMER INSTALLATION.







5005H SERIES HYDRAULICS TROUBLESHOOTING

The hydraulic system of the 5005H power version is electrically operated and requires a minimum of 12V for satisfactory performance. The hydraulic pump is bi-rotational with a pressure relief setting of 2350 P.S.I. (REF.) Standard pump speed to be 950 R.P.M. (Ref. Pump P.N. 360030.)

PROBLEM

FLOW PRESENT BUT FUNCTION WILL NOT WORK

SOLUTION

A manual override is on each end of the directional valves on the 5005H. If the pump is operating, and pushing the manual override in does not operate the selected function, check pump pressure. If the function does operate, remove direction valve cover (360170) and check for loose wire, low voltage or bad ground. If the above items check out all right, replace directional valve. If the problem is traced to no voltage at the directional valve, remove pendant and with the switch engaged check for an open circuit with an ohmmeter. If the circuit is open, check for broken wiring or bad switch.

HYDRAULIC "CHATTER"

When a hydraulic function is engaged and causes the crane to "chatter," check for loose wire, low voltage at directional valve, or low pump pressure.

NO FLOW OR CRANE FAILS TO MOVE WHEN OPERATED

Check to maintain adequate oil in reservoir (approx. 4½ gal.) by means of sight gauge. Replace if coupling or coupling key is broken. Correct if relieve valve stuck open. Check for pressure line blockage. Make sure pump is working correctly. Also check actuator. Insure no restriction in suction line. Check directional valve.

Progressively disconnect fittings at test points to verify existence of flow. Rule: Pumps pump flow only; systems and their loads-resistances produce pressure, up to that limit imposed by lowest pressure limiting device exposed to pressure.

NO PRESSURE OR TOO LOW PRESSURE

Check to maintain adequate oil in reservoir (approx. 4½ gal.) by means of sight gauge. Make sure pressure gauge is functioning correctly. Possible relief hung open. Check for excessive leakage and correct. Check to insure that pressure limit switch is correctly set.

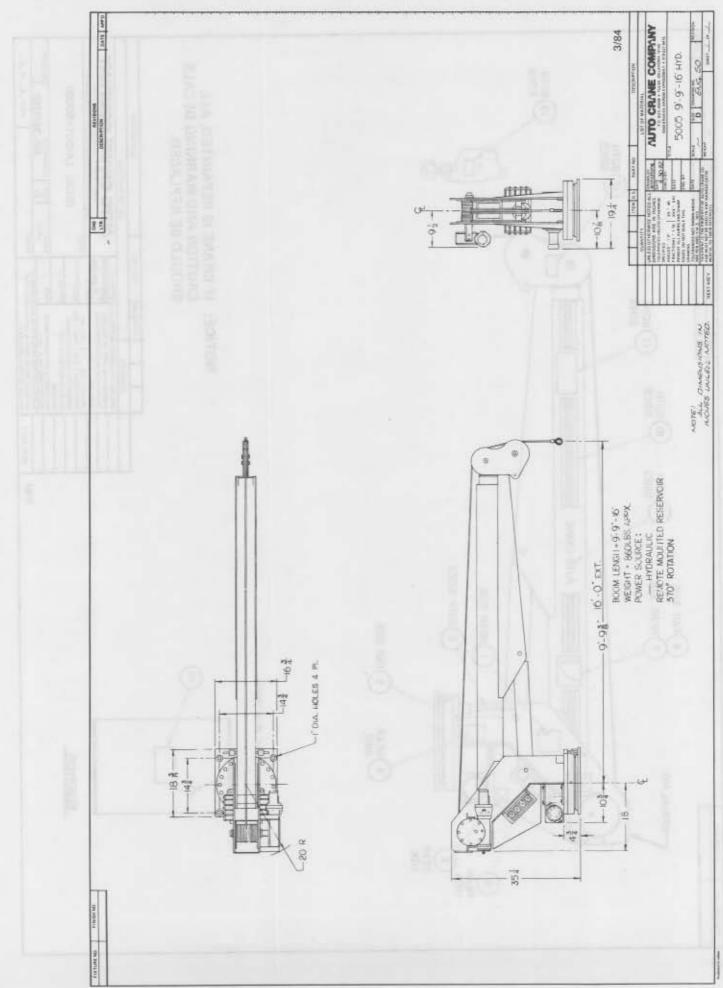
Progressively test circuit points to determine pressure existence.

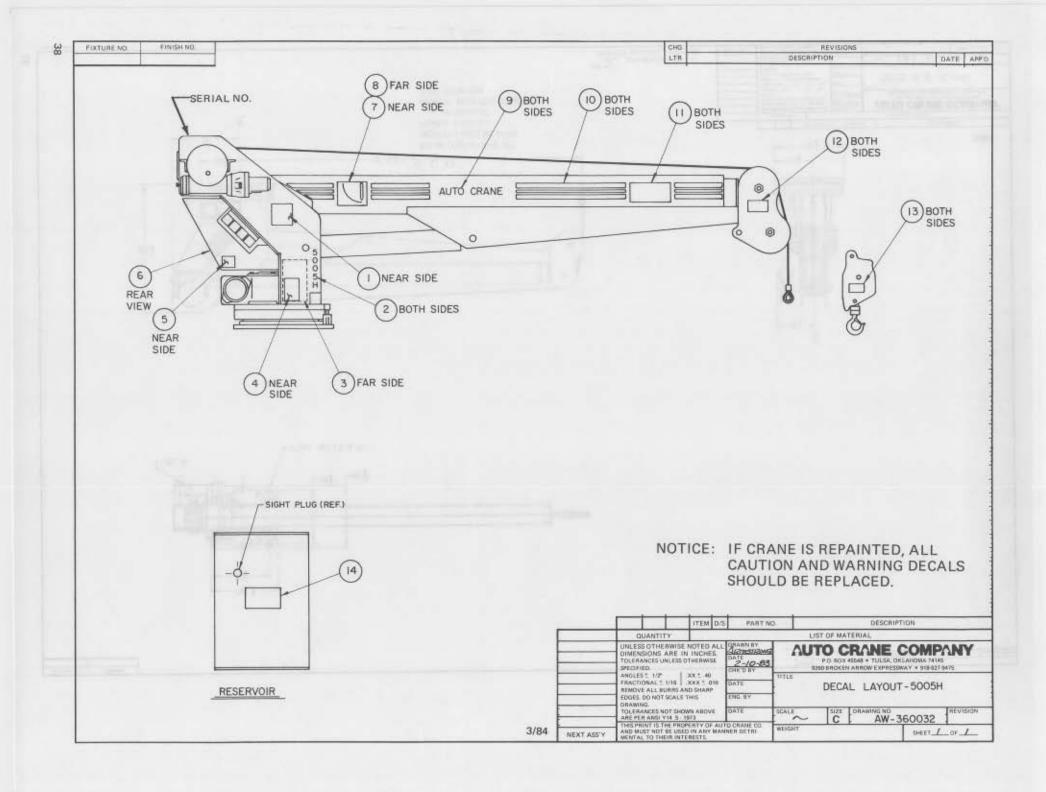
TOO HIGH FLOW

Make sure pump size is correct and pump speed is not too fast (950 R.P.M.) Check or replace flow control. Check components for flow displacements.

TOO HIGH PRESSURE

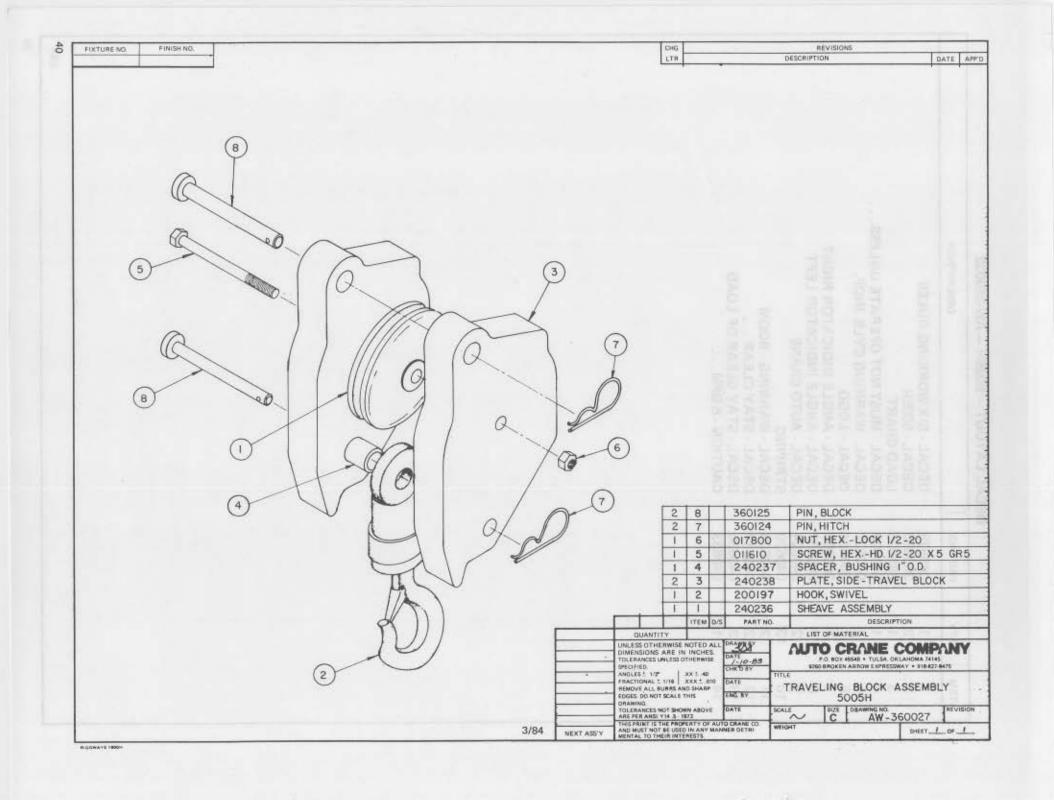
Make sure pressure limit switch is correctly set.

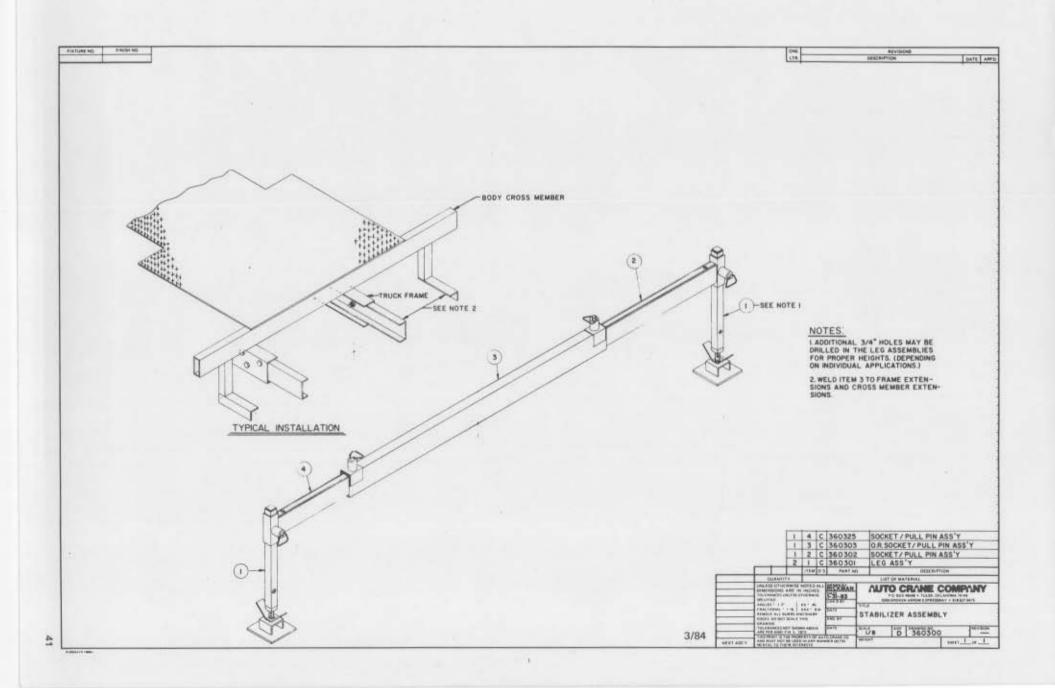




DECAL LAYOUT - 5005H - AW-360032

TEM	QTY.	PART NO.	DESCRIPTION	
1	1	040579	DECAL - SIX WORKING RULES	
2	2	360033	DECAL - 5005H	
3	1	360035	LOAD CHART	
4	1	040580	DECAL - MUST NOT OPERATE UNLESS	
5	1	040632	DECAL - WARNING CYLS, INOP.	
6	1	360034	DECAL - LOGO	
7	1	360036	DECAL - ANGLE INDICATOR RIGHT	
8	1	360037	DECAL - ANGLE INDICATOR LEFT	
9	2	040624	DECAL - AUTO CRANE	
10	13'	040620	STRIPING	
11	2	040529	DECAL - WARNING - BOOM	
12	2 2	040517	DECAL - STAY CLEAR	
13	2	040630	DECAL - STAY CLEAR OF LOAD	
14	1	040633	CAUTION - 6 GPM	







Cimited Warranty

Auto Crane will warranty to consumer for a period of twelve months from date of purchase that each new Auto Crane product it sells will be free under normal use and service, from defects in material and workmanship. Date of purchase will be honored as either date of purchase by distributor or his date of sale of the product as substantiated by Distributor Delivery Report.

Obligation of Auto Crane under this warranty is limited to replacement or repair of parts that appear to manufacturer after review and/or inspection to be defective. This warranty does does not obligate Auto Crane to bear the cost of labor or transportation charges in connection with the replacement or repair of defective parts. Responsibility for customer's claims arising from misapplication, abuse, misuse or alteration of equipment or parts lies with the distributor or user and no warranty obligation is assumed in the circumstances by Auto Crane.

Auto Crane will in no event be liable for any consequential damages or contingent liabilities arising out of the failure of any Auto Crane product or parts to operate properly.

Auto Crane makes no warranty in respect to component accessories, same being subject to the warranties of their respective manufacturers.

If field service, at the request of buyer, is rendered and fault is found not to be with Auto Crane's product, the buyer shall pay the time and expense of the field representative. Claims for service labor or other expenses that have been incurred by the buyer without approval or authorization of Auto Crane will not be accepted.

AUTO CRANE COMPANY IS UNDER NO OBLIGATION TO EXTEND THIS WARRANTY TO ANY CUSTOMER FOR WHICH AN AUTO CRANE WARRANTY REGISTRATION CARD HAS NOT BEEN COMPLETED AND MAILED TO AUTO CRANE COMPANY WITHIN FIFTEEN (15) DAYS AFTER DATE OF PURCHASE.

AC-57 11/87