

TABLE OF CONTENTS

OPERATION AND REPAIRS

<u>TITLE</u>	<u>PAGE</u>
Conveyors	G
Conveyors	H
Front Hopper	D
Front Hopper	E
Front Hopper Control	F
General Operations	C
Hydrostatic Components	S
Lube Chart	B
Sealing Truck Bed to Rear Hopper	J
Spreader Components	R
Warranty	A

TRANSMISSION POWER FLOW

General	K
Powerflow in First Speed Reverse	L
Powerflow in Third Speed Forward	M
Powerflow in Fourth Speed Reverse	N
Powerflow in Fifth Speed Forward	O

HYDROSTATICS

Hydrostatic Components	R
Hydrostatic Trouble Shooting	P
Hydrostatic Trouble Shooting	Q

PARTS AND ILLUSTRATIONS

Air Filter	WHS-57
Air System	WHS-23
Compressor	WHS-27
Conveyor	WHS-41
Cross Shafts	WHS-61
Differential Assy.	W-9
Drive Shaft	W-7
Emergency Brake	WA-7

TABLE OF CONTENTS

PARTS AND ILLUSTRATIONS

<u>TITLE</u>	<u>PAGE</u>
Engine Clutch	W-1
Front Axle	W-13
Front Brake	W-21
Front Hopper	W-37
Hydrostatic Motor	WHS-35
Hydrostatic Pump (Rear)	WHS-33
Hydrostatic Pump (Tandem)	WHS-31
Hydrostatic System	WHS-29
Metering Quadrant	WHS-66
Orbitrol and Steering Column	W-17
Oil Cooler	WHS-53
Power Steering	WHS-19
PTO Drive Shaft	WHS-30A
Rear Brakes	W-23
Rear Hopper and Truck Hitch	W-43
Reversing Transmission	WA-3
Seat	WHS-59
Shifter	WHS-63
Sproket and Hopper Drive	WHS-39
Steering Cylinder	W-15
Transmission	WA-5
Transmission Cover	WA-4A
Wiring Diagram - Gas	WHS-41
Wiring Diagram - Diesel	WHS-45
Wiring Diagram - One-Man	WHS-49
Wiring Diagram - Lighting System	WHS-51

WARRANTY

THE STANDARD W-H MANUFACTURING CO. WARRANTY

All new machines and parts are guaranteed against defective workmanship and material for a period of twelve (12) months, except that the Manufacturer assumes no responsibility and makes no warranty with respect to engines, engine accessories, tires or other purchased components beyond the warranty of the supplier of same.

This warranty will not apply to a machine which shall have been repaired by other than an authorized W-H Manufacturing Co. Distributor using genuine W-H Manufacturing Co. parts. The Manufacturer's obligation under this warranty is limited to the replacement of any part or parts of its manufacture which shall be found to be defective within (12) months from date of delivery to original user. The Manufacturer's warranty does not obligate the Manufacturer to bear any other costs excepting only the furnishing of a replacement for the defective part; all other damages, including but not limited to any loss or damage resulting from the use or loss of use of any of said products, being here by expressly waived. No representative of the Manufacturer is authorized to change this warranty in any way, and no attempt to repair the products of the Manufacturer by any representative of the Manufacturer shall change or extend this warranty in any way. All hydrostatic drive components carry twenty-four (24) month warranty with the same conditions applied.

Parts to be substituted for parts found defective are to be furnished free to the customer by the Manufacturer, f.o.b. factory. Installation of such parts is to be made by and at the expense of the Customer. (UNLESS HE IS AUTHORIZED IN WRITING BY THE MANUFACTURER TO MAKE SUCH INSTALLATION AT THE MANUFACTURER'S EXPENSE.) Parts claimed to be defective and for which free replacement is desired are to be returned to the Manufacturer, f.o.b. Pocatello, Idaho or to such other place as the Manufacturer may designate, for inspection, if requested by the Manufacturer.

W-H Manufacturing Co.
14251 W. Highway 30
P.O. Box 4845
Pocatello, Idaho 83205

W-H Manufacturing Co. reserves the right to change its design at any time without incurring obligation to make such design changes on machines previously sold.

LUBRICATION CHART

Minimum Time To Service	DESCRIPTION AND LOCATION	
Daily	Front Hopper-4 Bearings-Spread Roll & Agitator	Grease
Daily	Power Take-off-gear box-Level Check	M.P. 90 Gear Oil
Daily	Engine Oil Level	Mfg's Specs.
Weekly	Conveyor System - Head Pulley Bearings (4)	Grease
Weekly	Conveyor System - Tail Pulley Bearings (4)	Grease
Weekly	PTO System - Pillow Block Bearings - (4)	Grease
Weekly	PTO System - Drive Shaft - (3) Fittings	Grease
Weekly	Steering Pump - Level Check	AW32 Hyd.-10W
Weekly	Engine Clutch - Pedal - One Fitting	Grease
Weekly	Reverse Box - Level Check (Only Check Highest Plug Main Transmission)	M.P. 90 Gear Oil
Weekly	Main Transmission - Level Check	M.P. 90 Gear Oil
Weekly	Drive Shaft - 3 fittings	Grease
Weekly	Differential - Level Check	M.P. 90 Gear Oil
Weekly	Planetaries - Level Check	M.P. 90 Gear oil
Bi-Weekly	Front Axle - King Pins - 2 Fittings	Grease
Bi-Weekly	Front Axle - Cross Tube & Cylinder Ends 4 Fittings	Grease
Weekly	Hydraulic Reservoir -	AW32 Hyd.-10W
When New	Hydraulic Oil Filters change after 100 hrs. after purchase.	
Every Spring	Change oil filters after every year	
Bi-Weekly	Front Axle - Oscillating Shaft One Fitting	Grease

GENERAL OPERATIONS

The following is a brief outline of operational and repair procedures, suggested by W.H. Manufacturing Co., to be used with the Model WHS Chip-Spreader. These procedures are a product of our experiences, and are given to operators of our Chip-Spreaders as an aid to better adapting the machine to standard construction routines.

If the operator will follow, very closely, these suggestions he will be pleased with efficiency and extra profits made possible by its use.

POWER TRAIN - REPAIRS

For engine, clutch and reversing unit, transmission and rear axle, refer to appropriate manufacturers manuals.

POWER TAKE - OFF AND VEE BELT ADJUSTMENT

The Model "WHS" Chip-Spreader has a front of the engine power take off that is connected to the drive through an automotive type spline shaft and universal joint. This drives the conveyor and front hopper hydrostatic pumps.

CONTROL GATES IN REAR HOPPER

These gates slide in a guide operated by a handle protruding from the upper edge of the operators decks. These gates are adjustable and are held in position by means of a pin fastened to a chain. These gates are used to control the amount of material on the conveyor belts.

BAFFLE PLATES

Baffle plates are located directly below the head pulleys of each conveyor and are needed to aid in placing cover materials into the extreme ends and center of the front hopper. These baffle plates also minimize segregation of heavier materials.

REMOVAL OF BAFFLE EXTENSIONS

These extensions are held on by means of two bolts which set into two slotted angles welded to the machine. Removal of the extensions is necessary when installing or removing the front Spread Hopper.

FRONT HOPPER

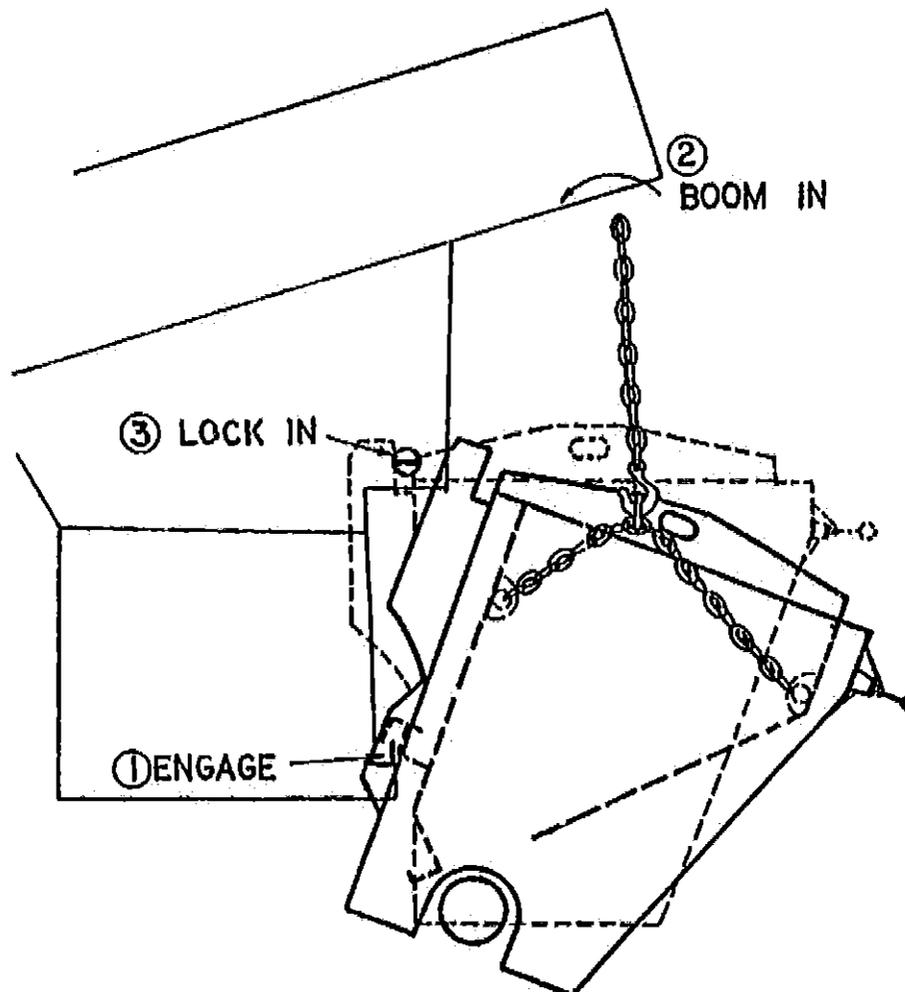
FRONT HOPPER

This is a storage and spreading mechanism for cover materials. It's spreading width ranges from 6 inches to full hopper width. It consists of a drive housing that transmits power to its spread-roll and agitating shaft. These rotating parts are automatically stopped by a limit switch when the operator closes the master front gate control lever.

REMOVAL AND ATTACHMENT OF FRONT HOPPER

The front hopper is held to the Chip-Spreader on a seat which interlocks with a lip on rear edge of hopper. See diagram.

The front hopper is held in place by 2 snap pins, one on each side of the conveyor frame. These pins are spring loaded and with a half-turn will snap out to secure hopper.



FRONT HOPPER

ROD SCREENS

When delivered from the factory, the front hopper is equipped with rod screens that function to stop oversized materials, mud, sticks, ect., from entering the spread opening. These screens should be in place whenever possible. If streaks or light areas appear behind the spread roll, it is caused by over-sized foreign materials too large to pass thru the control gate. In most cases the foreign material can be discharged by fully opening the metering lever, then immediately closing it back to the proper control position. If this fails the foreign material is very large and can be dislodged only by manual means. If the plug is not too large, it is recommended that the hopper be allowed to run low, then the piece or pieces removed.

ROD SCREEN SIZES

The Chip-Spreader is equipped and shipped with one size screen. This screen is 3/4" Mesh, and is required in most applications. However, if large materials are handled such as 1" and up, we make a 1-1/8" mesh screen, which can be obtained in place of the 3/4" screen.

CARE OF CHAIN DRIVE

There is an idler in the chain that drives the auger and spread roll. To adjust the tension on this chain, open the chain guard on the right end of the front hopper. Adjustment is then made by moving the idler in its slotted base plate.

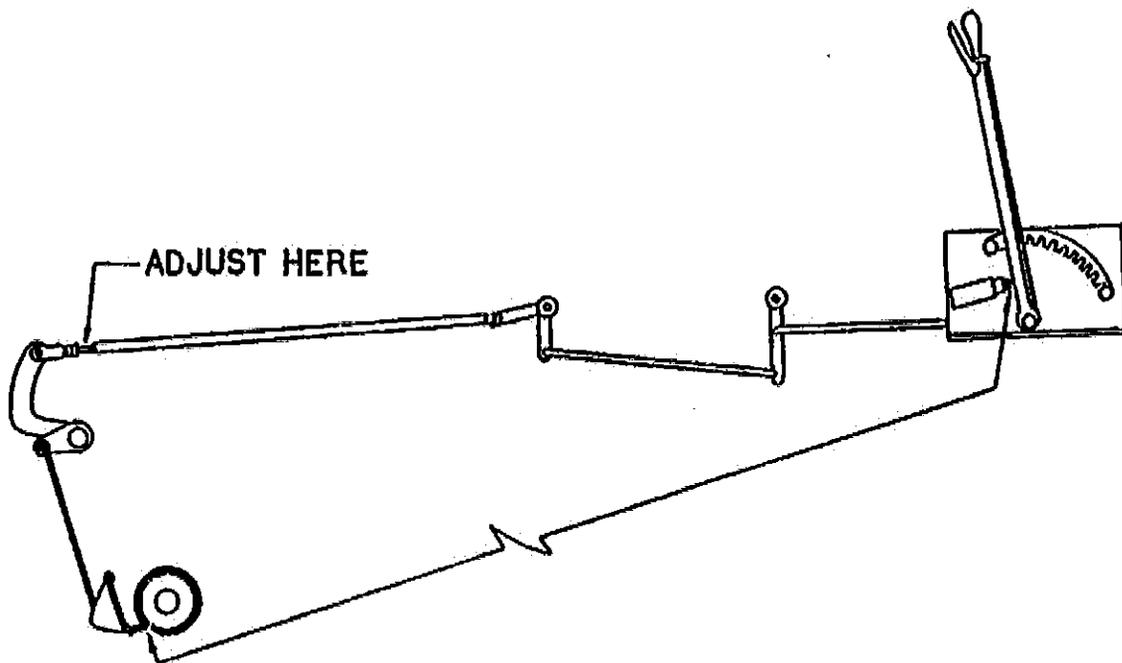
MATERIAL CONTROL SYSTEM

Because of the necessary accuracy needed to do an effective spreading job, the metering lever for the control gates is designed so that one notch change in the metering quadrant allows two 1/16" change in the opening of the control gates. To assure the return of the control lever to the exact spot with a minimum loss of time, a stop lever is installed beside the control lever on the metering quadrant. This stop lever is set at the desired opening and control lever is brought in line with it when the gate is opened, each time the machine is started. To change stop-lever move to desired position.

CONTROL GATE ROD

The control gate is moved by means of adjustable linkage to the control lever at the driver's seat. If at any time the deposited materials are heavier on one side than on the other, check the opening on each end of the hopper with the gate approximately 1/2" open. If this measurement indicates more than 1/32" variation, pull the clevis pin on the reach rod on one end and adjust to the desired distance.

FRONT HOPPER CONTROL



SERVICE NOTE: Adjustment of Hopper Gates and Aggregate Feed.

It is important that the aggregate spread gates, the hopper spread roll, and aggregate feed all shut off at the same time. The limit switch on the operators quadrant controls the feed and the spread roll; while the lever on the quadrant controls gate position. THERE IS NO ADJUSTMENT PROVIDED FOR IN THE SWITCH OR LEVER. This adjustment can be properly and easily made only at the point indicated in the figure.

To Adjust:

Disconnect the clevis at the main gate control arm on the hopper. Move the lever on the quadrant all the way forward. When locked into the full forward position the limit switch is depressed. At the hopper; make sure there are no obstructions which are restricting the operating gates from closing against the spread roll. Pull the main gate control arm all the way forward to close the gates. While holding the gates closed; adjust the main gate control reach rod as necessary until the clevis pin maintains a snug fit, in the forward direction, in the main gate control arm. When adjustment is completed, tighten the lock nut on the reach rod.

NOTE:

This adjustment is designed to eliminate aggregate leakage, thus preventing poor coverage performance. The adjustment should be made on the initial hopper installation, and checked periodically there after.

CONVEYORS

CONVEYORS

The functions of the two conveyors (one on each side of the machine) is to transport materials from the rear hopper into the front hopper and spread roll.

To help eliminate spillage of materials the conveyors have on chute lining , which can be replaceable or adjusted when worn.

CONVEYOR BELT ADJUSTMENT

The belts on the conveyor are pre-adjusted at the factory, when the Chip - Spreader is test operated, but due to stretching, load variation, skirting drag, ect. final adjustment must be made in the field.

To move the belt to the right, tighten the nut at the top right hand edge of the conveyor frame, raising the return idler. To move the belt to the left, tighten the left hand nut. Care should be used in this adjustment as the belt will respond slowly and over adjustment can occur. Adjustment should be made with the conveyor belts running and loaded.

To further aid in adjusting the belts there is an adjustment at the tail pulleys which is used to further tighten the belts when wear occurs, and to help in aligning the tail pulleys. Tighten the opposite side that you wish to move the belt. Extreme care should be taken to assure that the belts are running accurately and evenly on the head and tail pulleys.

When a new belt is installed, loosen the tail pulley adjustors, and the adjustors behind the head pulleys. This will give sufficient slack to allow the belt ends to be pulled together without the use of a belt stretcher. When retightening the belt be sure the belt does not sag excessively between the troughing rolls when loaded.

CHUTE LINING WEAR

The chute linings on the conveyors are held in place by a channel bolted to the conveyor side angles. To adjust or replace the chute linings, loosen the 3/8" bolts and lower or remove as desired. To replace simply insert new lining under the channel and tighten the hold down bolts.

Care should be taken in installing or adjusting the chute lining to assure an even bearing on the conveyor belt. Be very sure the opening remaining on the conveyor belt surface is paralalled to the belt or excess spillage and wear will occur.

CONVEYORS

BELT SPLICES

We suggest the splice be made with flexco SRB fasteners. Any good fastener may be used which will work on a 10" radius without pulling, this is important, because too large a fastener will tear out the belt after a short time of operation.

CONVEYOR BELT LENGTH

Conveyor belts are 4 ply 20" standard rubber covered conveyor belting and should be cut 37'8" long.

Run conveyor belts snug enough that very little dip occurs between the troughing rolls when loaded.

CONVEYOR BELT WIPER

Immediately under the front of each head pulley is a rubber wiper set to touch the conveyor belt. The function of this wiper is to aid in cleaning adhesive particles from the conveyor, and to prevent excessive gravel from following under the head pulleys when overloading of the hopper occurs. This strip should be replaced or moved up whenever wear causes clearance from the conveyor belt.

HEAD PULLEY AND HOPPER DRIVE MOTORS

The Motors With Drive the head pulleys have cables attached to their Swash Plate levers offering infinite belt speed adjustments. The front hopper drive motor speed is set at the factory and need not be adjusted.

TRUCK HITCH

HEAD BAFFLES

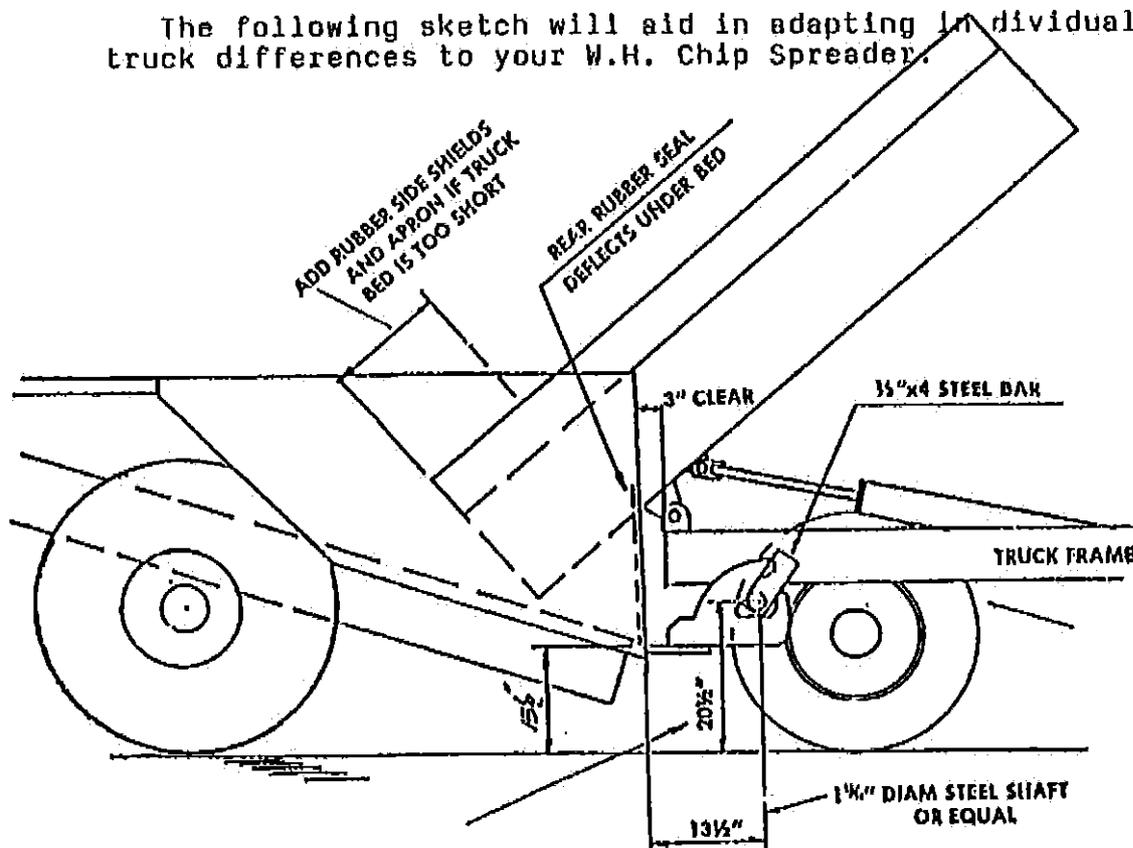
The Head Baffles are anchored to the upper end of each conveyor and are held in place by four $\frac{1}{2}$ " cap screws. The function of the baffles is to aid in controlling the conveyor material. The Head Baffle deflectors should be spaced to deflect the material in an even fan shaped cascade along the entire face of the baffle plates, there by eliminating segregation of the conveyed material.

Mounted vertically at the apex of the baffle plates is another deflector plate. The function of this plate is control of the material stream from side to side as desired. On narrower than full width spread, this vertical deflector must be moved to control the flow of material to compensate for the reduction in width of spread. The vertical deflector plates are adjusted with a reach rod and are locked in place by spring loaded ratchets.

TRUCK HITCH

The function of the truck hitch is to provide a means where by the truck can be held in a close relationship with the rear hopper. The success of the entire spreading operation is directly related to this hook-up, and extreme care should be taken to assure proper hook-up with each truck in your fleet.

The following sketch will aid in adapting individual truck differences to your W.H. Chip Spreader.



SEALING TRUCK BEDS

SEALING TRUCK BEDS TO HOPPER

In general the tail gates of all truck beds must set at least 8" inside the Hopper Retaining - Skirt, when the bed is raised. Variances in frame lengths, dump bed over hangs, and rear wheel locations, make it necessary to check each bed in relation to the rear hopper of the Chip - Spreader.

On large tandem trucks, the frame, rear wheels and often the tail gate of the dump bed are usually on the same perpendicular line. In such cases it is necessary to install bed extensions to assure a proper seal in the dump position. If the above conditions exist. Hitches should be set to allow 2" to 2'- $\frac{1}{4}$ " clearance between the rear tire and the bumper of the Chip-Spreader.

If trouble is encountered with spillage while dumping into the rear hopper, check these items.

1. Does tail gate set inside of rubber skirt on rear hopper?
2. On large trucks, do you have restraining chains on tail gate?
3. (Where restraining chains are used, allow approximately 18" of slack in the chains.)

TRANSMISSION POWER FLOW

The mechanical transmission gives five speeds. The reverse box, installed between the oil clutch and the mechanical transmission, gives a forward or reverse direction. The mechanical transmission with reverse box gives five speeds in the forward or reverse direction.

The input shaft (13) and gear (3) are free to turn in relation to shaft (4)

The reverse box has a clutch (2) that can be moved with a fork toward the clutch housing (1) to connect the input shaft (13) directly to shaft (4). This sends power to the mechanical transmission with forward rotation.

The clutch (2) can also be moved with a fork in the opposite direction to connect gear (3) to shaft (4). Now power comes from the input shaft (13), through the countershaft (14), through a reverse idler (not shown), to gear (3) which is connected to shaft (4) by clutch (2). This sends power to the mechanical transmission with reverse rotation.

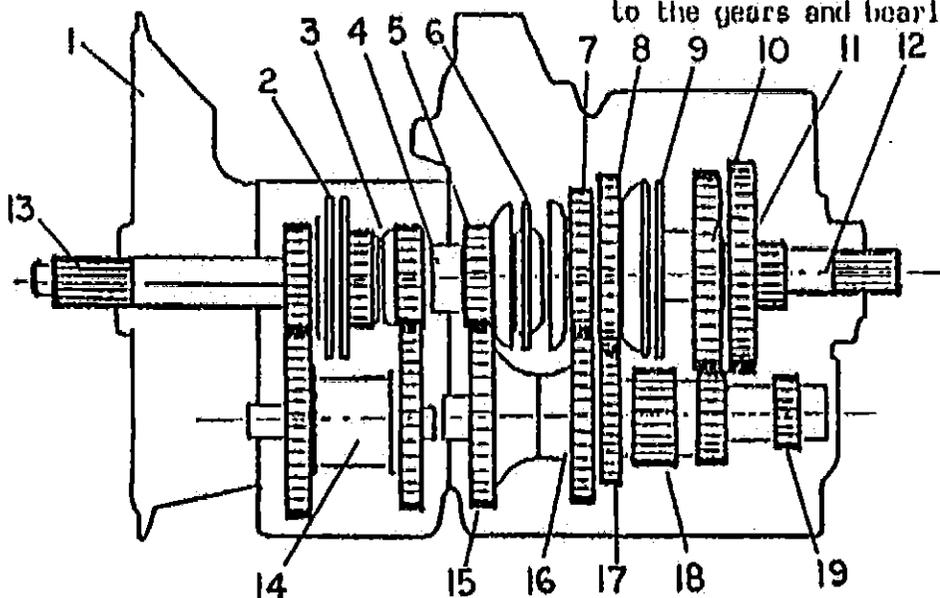
Gear (5) on shaft (4) and gear (7) are free to turn in relation to the output shaft (12). Synchronizer (6) can be moved with a fork toward the clutch housing to connect gear (5) on the input shaft directly to the output shaft (12) or in a direction away from the clutch housing to connect gear (7) to the output shaft (12).

Gears (8) and (10) are free to turn in relation to the output shaft (12). Synchronizer (9) can be moved with a fork toward the clutch housing to connect gear (8) to the output shaft (12) or in a direction away from the clutch housing to connect gear (10) to the output shaft (12).

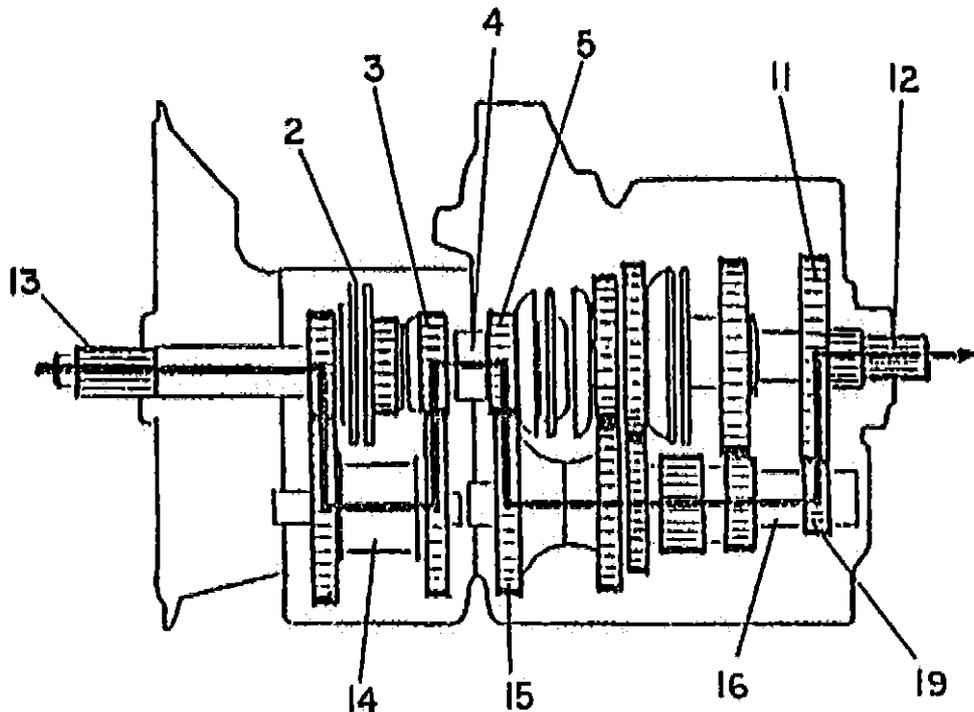
A sliding gear (11), connected to the output shaft (12) with a spline, can be moved with a fork to engage it with a gear (19) on the countershaft (16).

The synchronizers are used for second through fifth speed and the sliding gear is used for first speed.

Some of the gears in the transmission and reverse box turn through oil. This oil is thrown about inside the transmission and reverse box to give lubrication to the gears and bearings.



TRANSMISSION POWER FLOW



POWER FLOW IN FIRST SPEED REVERSE

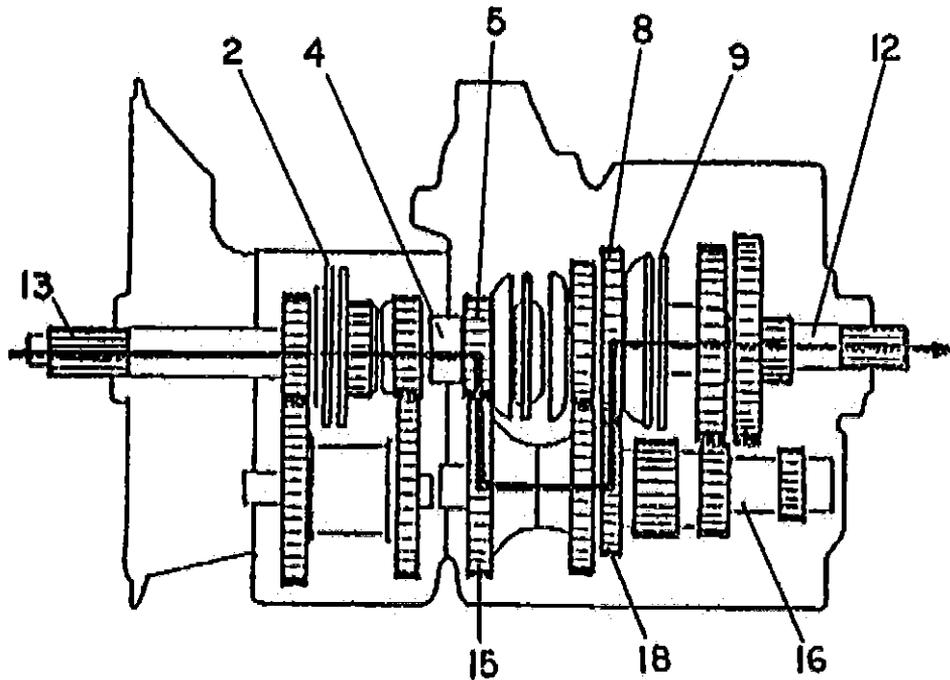
2. Clutch 3. Gear 4. Shaft 5. Gear 11. Sliding gear 12. Output shaft. 13. Input shaft 14. Countershaft 15. Gear 16. Countershaft 19. Gear

The clutch (2) in the reverse box is moved toward the mechanical transmission. The sliding gear (11) in the mechanical transmission is moved to engage it with gear (19) on the countershaft (16).

Power from the engine comes through the input shaft (13), through the countershaft (14) through the reverse idler gear (not shown) to gear (3) which is connected to shaft (4) by clutch (2). This sends power to the mechanical transmission with reverse rotation.

The gear (5) on shaft (4) turns gear (15) which is connected to the countershaft (16) with a key. This sends power through the countershaft. Gear (19) on the countershaft is engaged with the sliding gear (11) which is connected to the output shaft (12) with a spline and power is sent to the differential.

TRANSMISSION POWER FLOW



POWER FLOW IN THIRD SPEED FORWARD

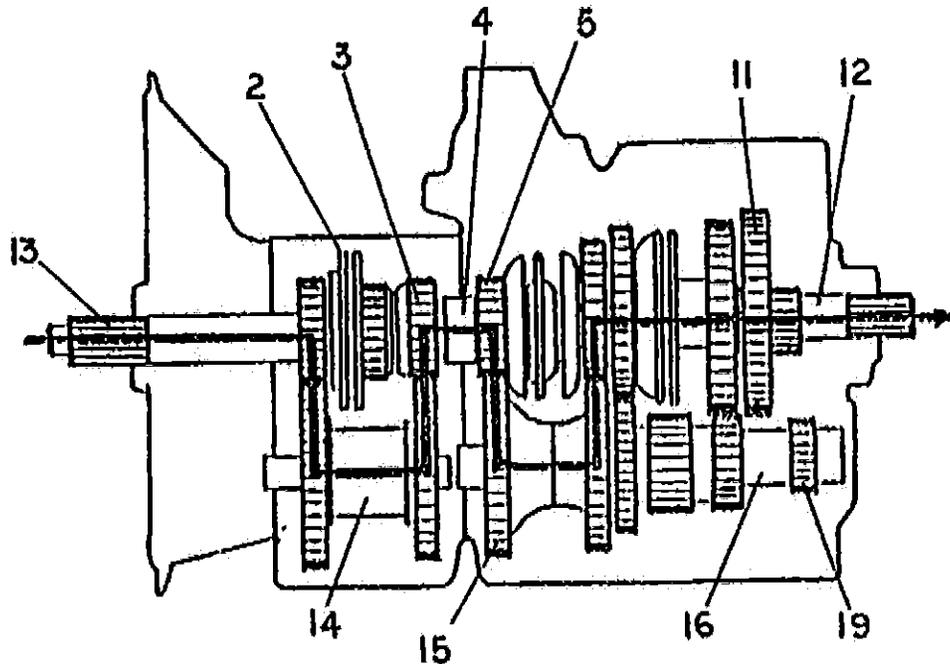
2. Clutch 4. Shaft 5. Gear 6. Gear 9. Synchronizer 12. Output shaft 13. Input shaft 15. Gear 16. Countershaft 18. Gear

The clutch (2) in the reverse box is moved toward the clutch housing. Synchronizer (9) is moved toward the clutch housing.

Power from the engine comes through the input shaft (13). Clutch (2) connects the input shaft directly to shaft (4) and power is sent to the mechanical transmission with a forward rotation.

The gear (5) on shaft (4) turns gear (15) which is connected to the countershaft (16) with a key. This sends power through the countershaft. Gear (18) on the countershaft turns gear (8). Synchronizer (9) connects gear (8) to the output shaft (12) and power is sent to the differential.

TRANSMISSION POWER FLOW



POWER FLOW IN FOURTH SPEED REVERSE

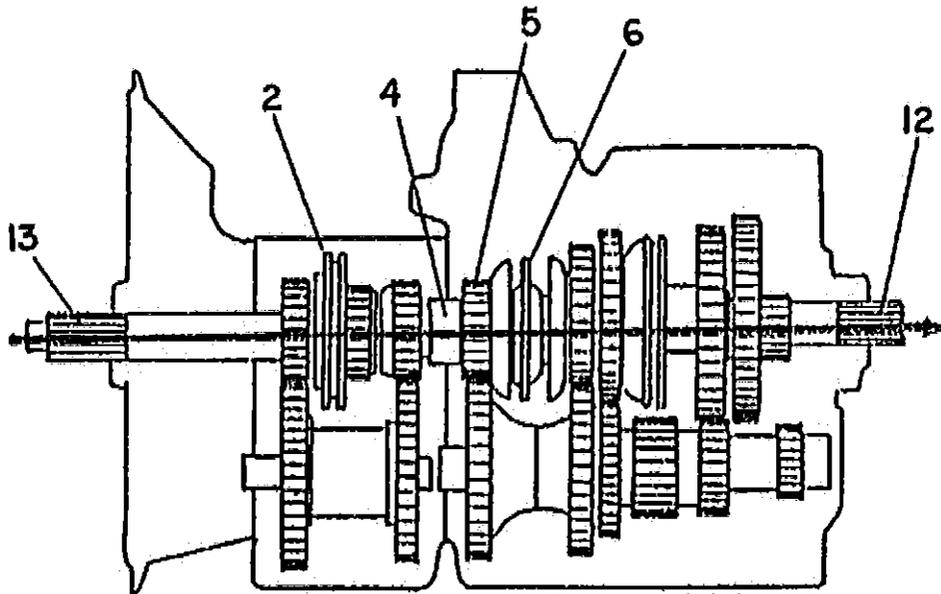
2. Clutch 3. Gear 4. Shaft. 5. Gear 6. Synchronizer 7. Gear 12. Output Shaft 13. Input Shaft 14. Countershaft 15. Gear 16. Countershaft 17. Gear

The clutch (2) in the reverse box is moved toward the mechanical transmission. Synchronizer (6) is moved in a direction away from the clutch housing.

Power from the engine comes through the input shaft (13) through the countershaft (14), through a reverse idler gear (not shown), to gear (3) which is connected to shaft (4) by clutch (2). This sends power to the mechanical transmission with reverse rotation.

The gear (5) on shaft (4) turns gear (15) which is connected to the countershaft (16) with a key. This sends power through the countershaft. Gear (17) on the countershaft turns gear (7). Synchronizer (6) connects gear (7) to the output shaft (12) and power is sent to the differential.

TRANSMISSION POWER FLOW



POWER FLOW IN FIFTH SPEED FORWARD

2. Clutch 4. Shaft 5. Gear 6. Synchronizer 12. Output Shaft
13. Input Shaft.

The clutch (2) in the reverse box is moved toward the clutch housing. Synchronizer (6) is moved toward the clutch housing.

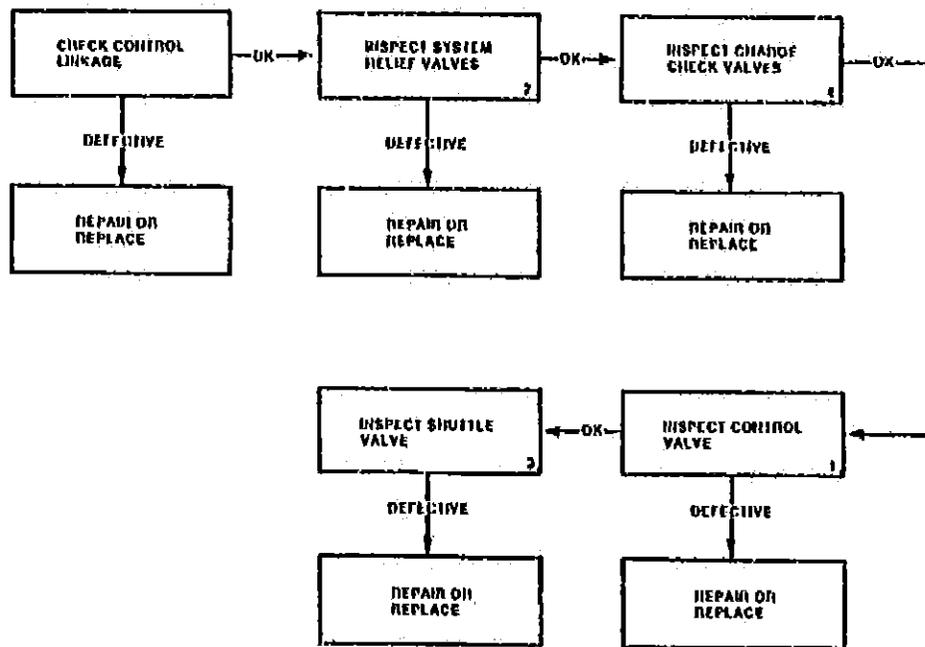
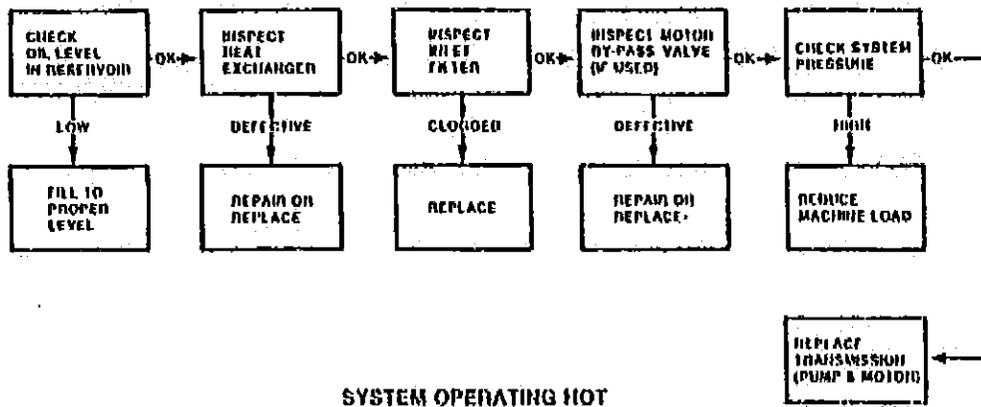
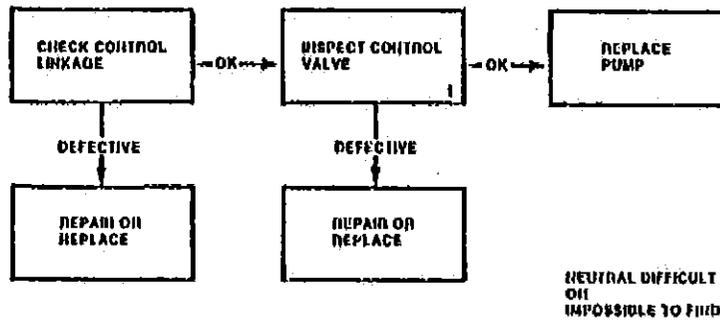
Power from the engine comes through the input shaft (13) Clutch (2) connects the input shaft directly to shaft (4) and power is sent to the mechanical transmission with a forward rotation.

Synchronizer (6) connects gear (5) on shaft (4) directly to the output shaft (12) and power is sent to the differential.

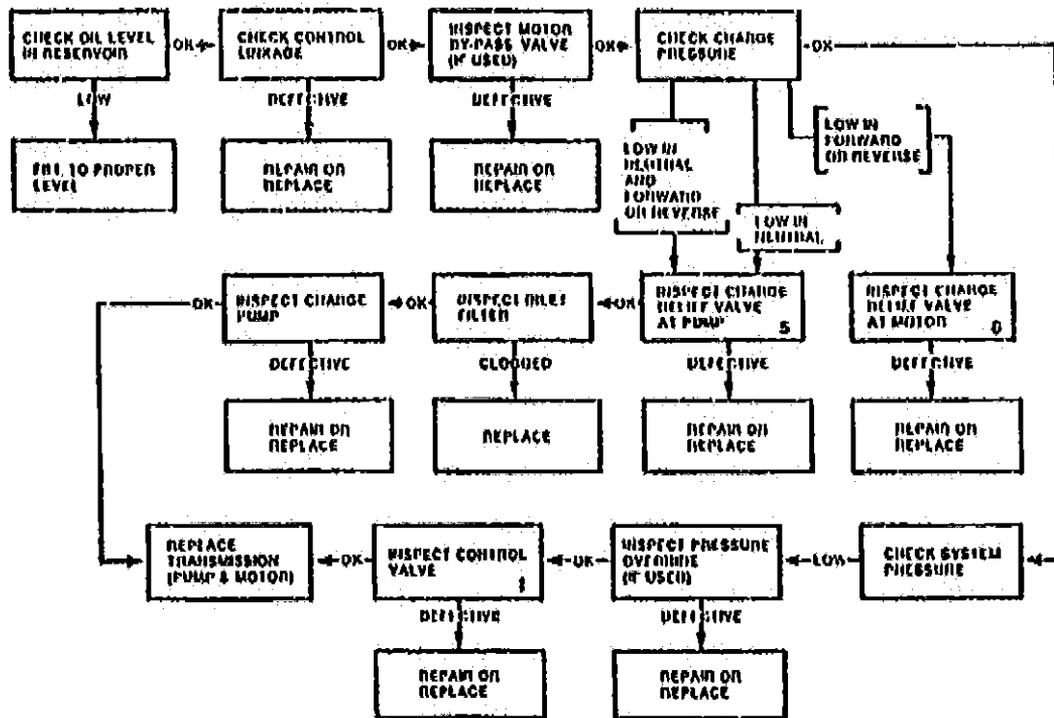
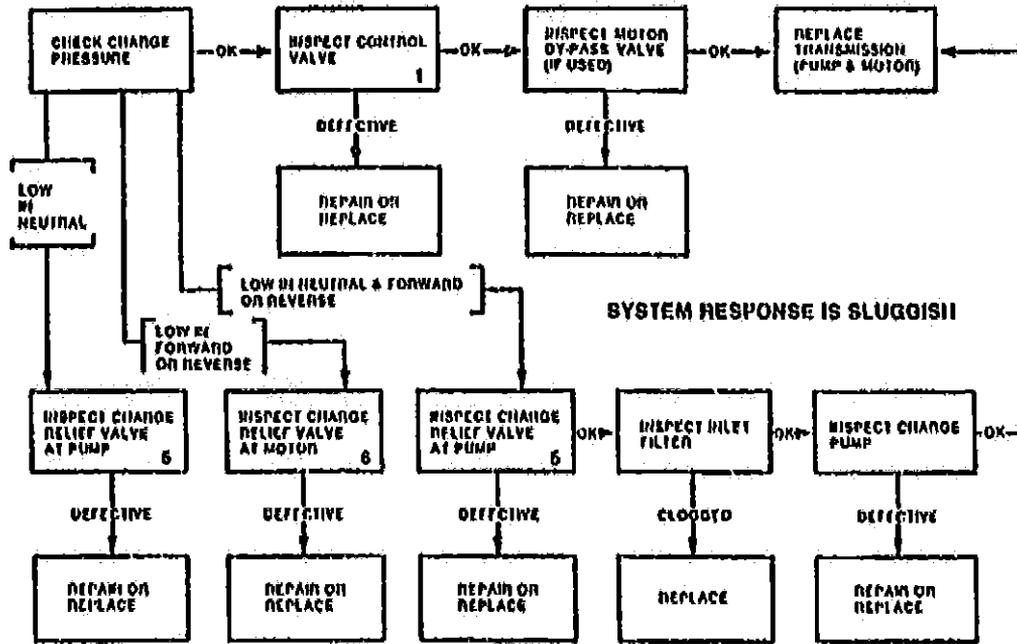
Transmission Oil - Use SAE 90 Multipurpose Oil and fill to top filler plug on main transmission case.

Due to the long working time in 2nd & 3rd gears you must keep the oil to the top shaft.

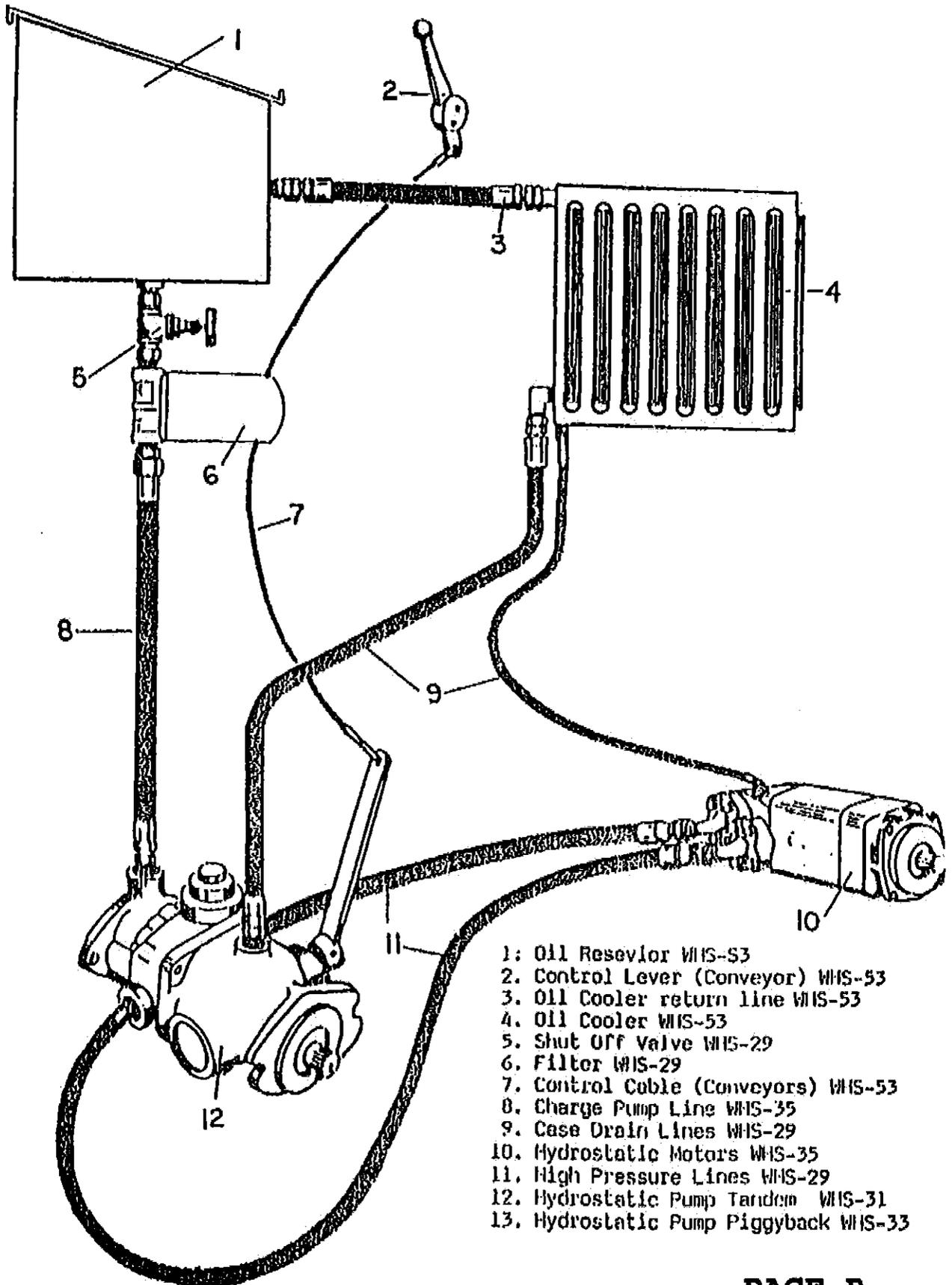
HYDROSTATIC TROUBLE-SHOOTING



HYDROSTATIC TROUBLE-SHOOTING

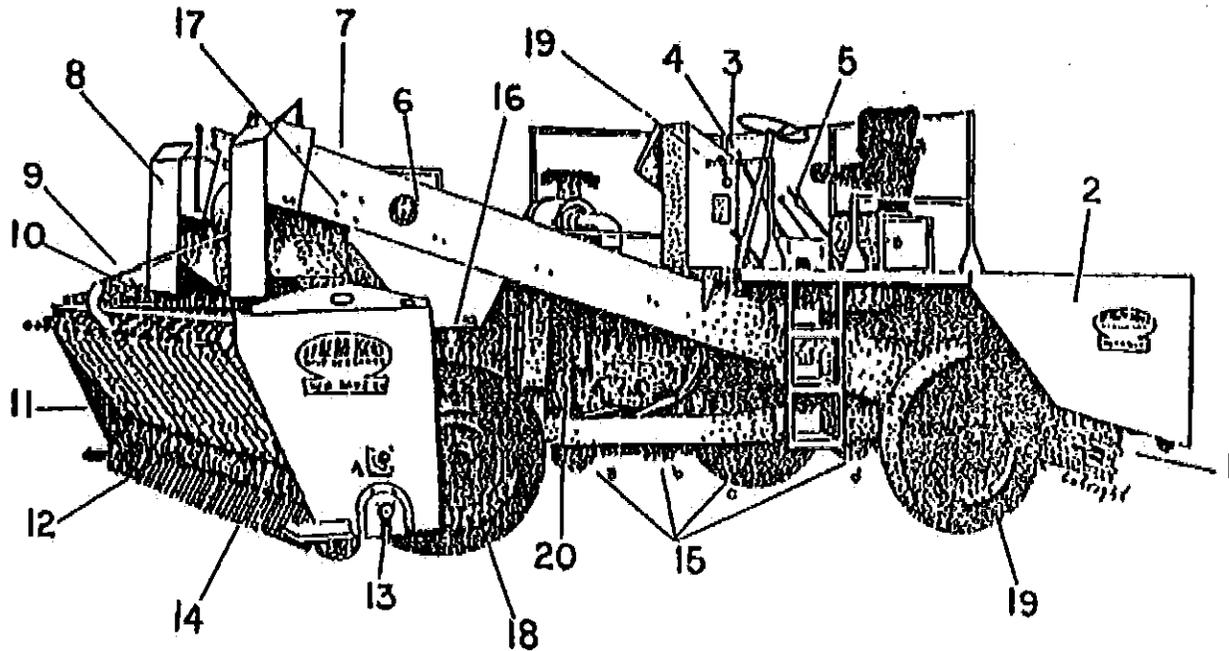


HYDROSTATIC COMPONENTS



- 1: Oil Resevior WIS-53
- 2: Control Lever (Conveyor) WIS-53
- 3: Oil Cooler return line WIS-53
- 4: Oil Cooler WIS-53
- 5: Shut Off Valve WIS-29
- 6: Filter WIS-29
- 7: Control Cable (Conveyors) WIS-53
- 8: Charge Pump Line WIS-35
- 9: Case Drain Lines WIS-29
- 10: Hydrostatic Motors WIS-35
- 11: High Pressure Lines WIS-29
- 12: Hydrostatic Pump Tandem WIS-31
- 13: Hydrostatic Pump Piggyback WIS-33

SPREADER COMPONENTS

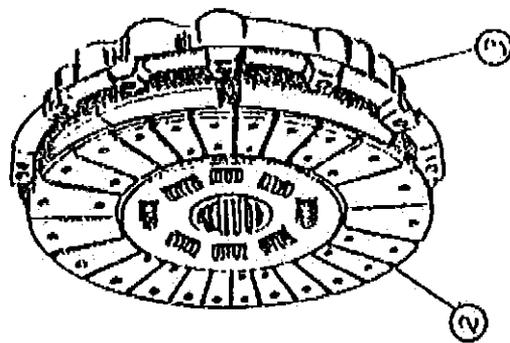
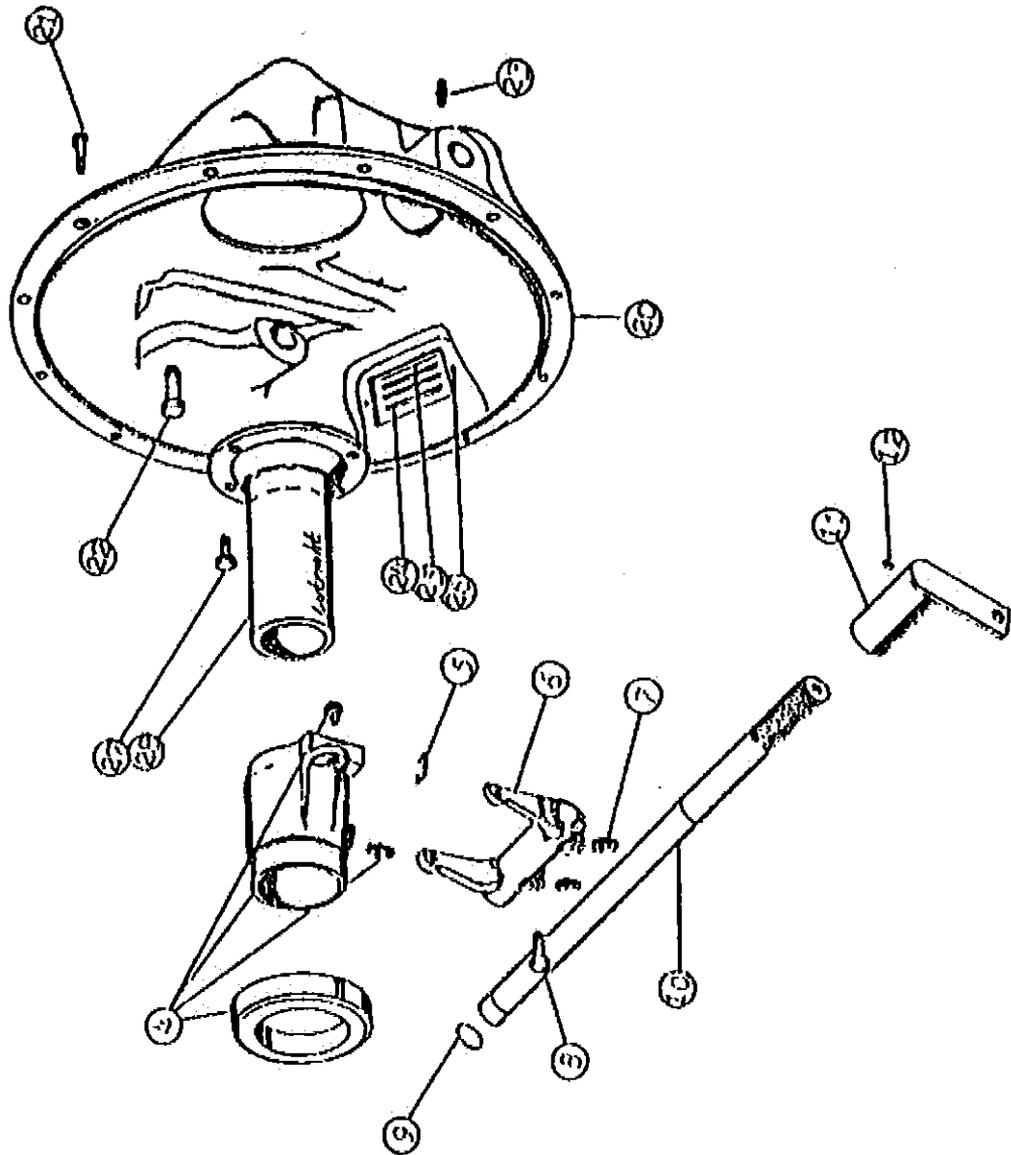


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|---|--------------|
| 1. Spring loaded truck hitch | Page W-43 |
| 2. Receiving hopper | Page W-43 |
| 3. Metering quadrant | Page W-61 |
| 4. Feed roll limit switch | Page WH-45 |
| 5. Hand brake, mechanical | Page WH-61 |
| 6. Independently operated conveyors | Page WHS-41 |
| 7. Variable speed conveyor controls | Page WHS-53 |
| 8. Baffle plates | Page WHS-41 |
| 9. Spread hopper | Page W-37 |
| 10. Full width rejection screens | Page W-37 |
| 11. Agitator | Page WHS-39 |
| 12. Individually operated radial cutoff gates | Page W-37 |
| 13. Spread roll | Page WHS-39 |
| 14. Adjustable segregation screen | Page WHS-37 |
| 15. Direct in-line positive power flow | |
| a. Engine | See MFG Book |
| b. Reversing unit | Page W2-3 |
| c. 5-speed synchro mesh transmission | Page W2-5 |
| d. Planetary heavy duty rear axle | Page W-9 |
| 16. Hydrostatic pumps | Page WHS-43 |
| 17. Hydrostatic motors | Page WHS-35 |
| 18. Front brakes | Page W-21 |
| 19. Rear brakes | Page W-23 |
| 20. Power steering | Page WH-20 |

ENGINE CLUTCH

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
NOTE:	Always Specify Engine used when ordering	from this	page.
W2-1	Bearing - Clutch Pilot	1	Cummins Equipped
W2-1F	Bearing - Clutch Pilot	1	Ford Equipped
W2-2	Disc - Driven 14" Lipe-Rollway	1	Cummins Equipped
W2-2F	Disc - Driven 13" Borg & Beck	1	Ford Equipped
W2-3	Plate - Clutch Pressure, Lipe Rollway	1	Cummins Equipped
W2-3F	Plate - Clutch Pressure Borg&Beck	1	Ford Equipped
W2-4	Bearing Assembly-Clutch Release	1	Cummins Equipped
W2-4A	Bearing Only-Clutch Release	1	Cummins Equipped
W2-4B	Sleeve Only-Release Bearing	1	Cummins Equipped
W2-4C	Pad - Clutch Yoke	2	Cummins Equipped
W2-4D	Fitting - Bearing Lubrication	1	Cummins Equipped
W2-4F	Bearing - Release	1	Ford Equipped
W2-5	Spring - Pull Back	2	Cummins Equipped
W2-6	Yoke - Release	1	Cummins Equipped
W2-6F	Fork - Release	1	Ford Equipped
W2-7	Washer - Key	2	Cummins Equipped
W2-8	Bolt & L.W. - Yoke Retaining	2	Cummins Equipped
W2-9	"O" Ring - Clutch Release Shaft	2	Cummins Equipped
W2-10	Shaft - Clutch Release	1	Cummins Equipped
W2-10F	Ball Stud - Release Fork Pivot	1	Ford Equipped
W2-11	Lever - Clutch Release Shaft	1	Cummins Equipped
W2-12	Screw - Lever Retaining	1	Cummins Equipped
W2-20	Bellhousing	1	Cummins Equipped
W2-20F	Bellhousing	1	Ford Equipped
W2-21	Screw & L.W. - Bellhousing/Engine	12	All
W2-22	Screw-Bellhousing/Reverse Box	4	All
W2-23	Fitting -Release Shaft Lub.	2	Cummins Equipped
W2-24	Cover - Access Opening	1	Cummins Equipped
W2-24F	Cover - Lower Bellhousing	1	Ford Equipped
W2-25	Gasket - Access Cover	1	Cummins Equipped
W2-26	Screw & L.W. - Access Cover	4	Cummins Equipped
W2-26F	Screw & L.W.-Lower Bellhousing Cover	6	Ford Equipped
Item 27	See Reverse Box Group, Page W4		
Item 28	See Reverse Box Group, Page W4		

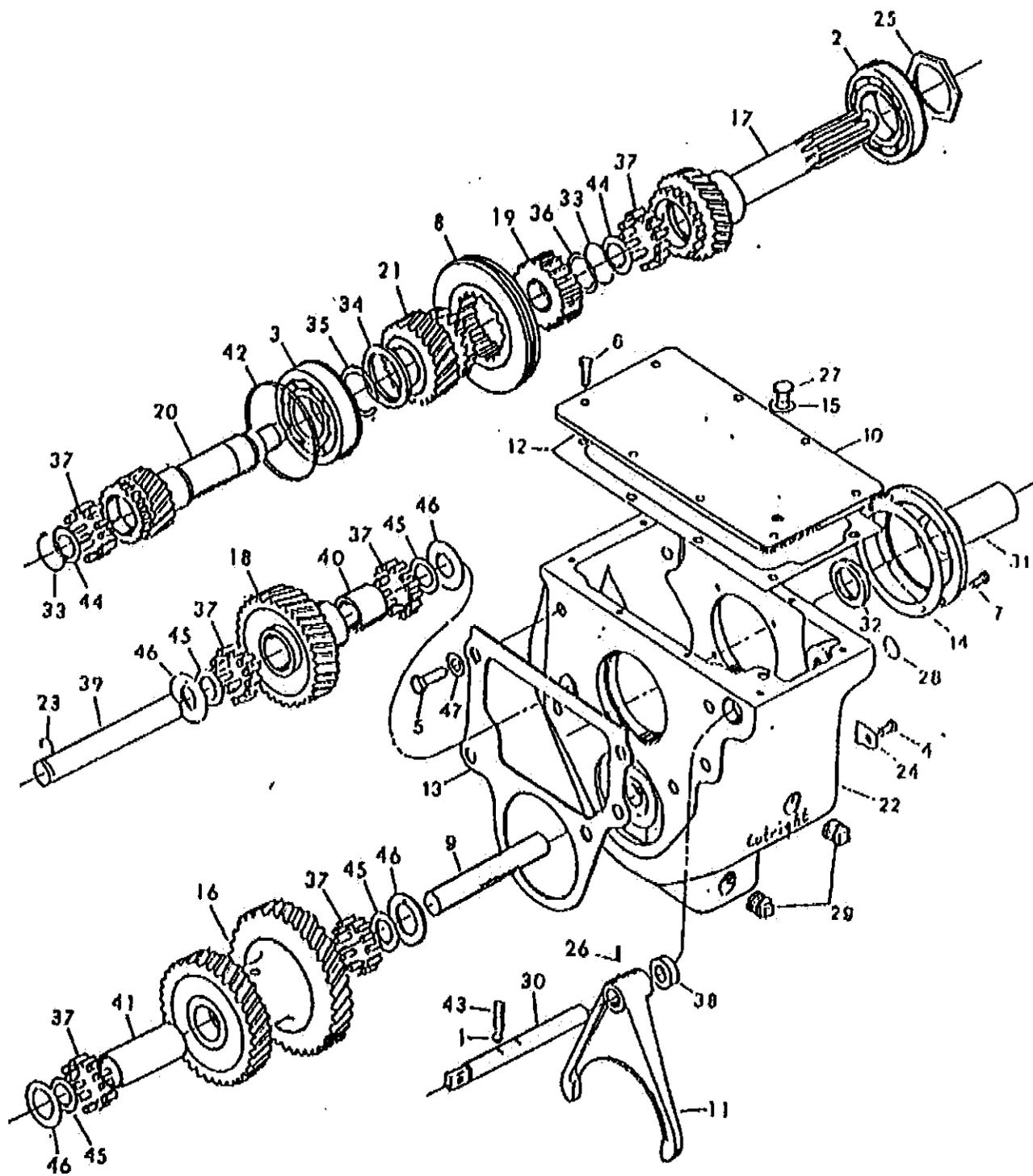
ENGINE CLUTCH



REVERSING TRANSMISSION

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WA-4-0	Reversing Transmission Assy.	1	
WA-4-1	Ball	1	
WA-4-2	Bearing Assy. with Snap Ring	1	
WA-4-3	Bearing Assy. With Snap Ring	1	
WA-4-4	Bolt	1	
WA-4-5	Bolt	4	
WA-4-6	Screw & Lockwasher	8	
WA-4-7	Bolt	4	
WA-4-8	Clutch	1	
WA-4-9	Countershaft	1	
WA-4-10	Cover	1	
WA-4-11	Fork	1	
WA-4-12	Gasket	1	
WA-4-13	Gasket	1	
WA-4-14	Gasket	1	
WA-4-15	Gasket	1	
WA-4-16	Gear	1	
WA-4-17	Gear	1	
WA-4-18	Gear	1	
WA-4-19	Gear	1	
WA-4-20	Gear	1	
WA-4-21	Gear Assy. With Bushing	1	
WA-4-22	Housing Assy.	1	
WA-4-23	Key	1	
WA-4-24	Plate	1	
WA-4-25	Nut	1	
WA-4-26	Pin	1	
WA-4-27	Plug	1	
WA-4-28	Plug	1	
WA-4-29	Plug	2	
WA-4-30	Roll	1	
WA-4-31	Retainer Assy.	1	
WA-4-32	Seal	1	
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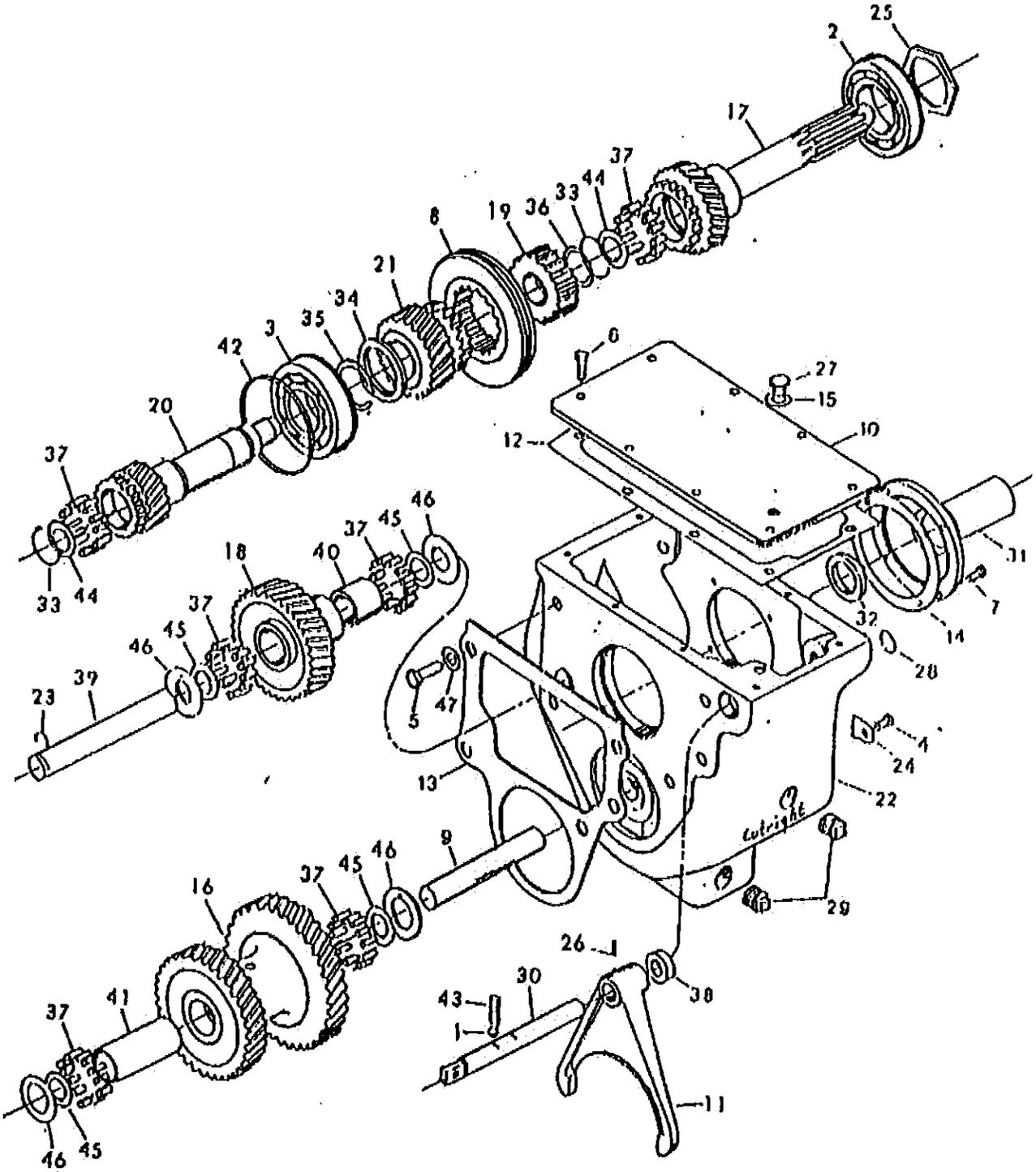
REVERSING TRANSMISSION



REVERSING TRANSMISSION

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WA-4-33	Ring	2	
WA-4-34	Ring	1	
WA-4-35	Ring (.087-.089)	1	
WA-4-35	Ring (.090-.092)	1	
WA-4-35	Ring (.093-.094)	1	
WA-4-35	Ring (.095-.096)	1	
WA-4-36	Ring (.087)	1	
WA-4-36	Ring (.090)	1	
WA-4-36	Ring (.093)	1	
WA-4-36	Ring (.096)	1	
WA-4-37	Roller	04	
WA-4-38	Seal	1	
WA-4-39	Shaft	1	
WA-4-40	Spacer	1	
WA-4-41	Spacer	1	
WA-4-42	Spacer	1	
WA-4-43	Spring	1	
WA-4-44	Washer	2	
WA-4-45	Washer	4	
WA-4-46	Washer	4	
WA-4-47	Washer (lock)	4	

REVERSING TRANSMISSION

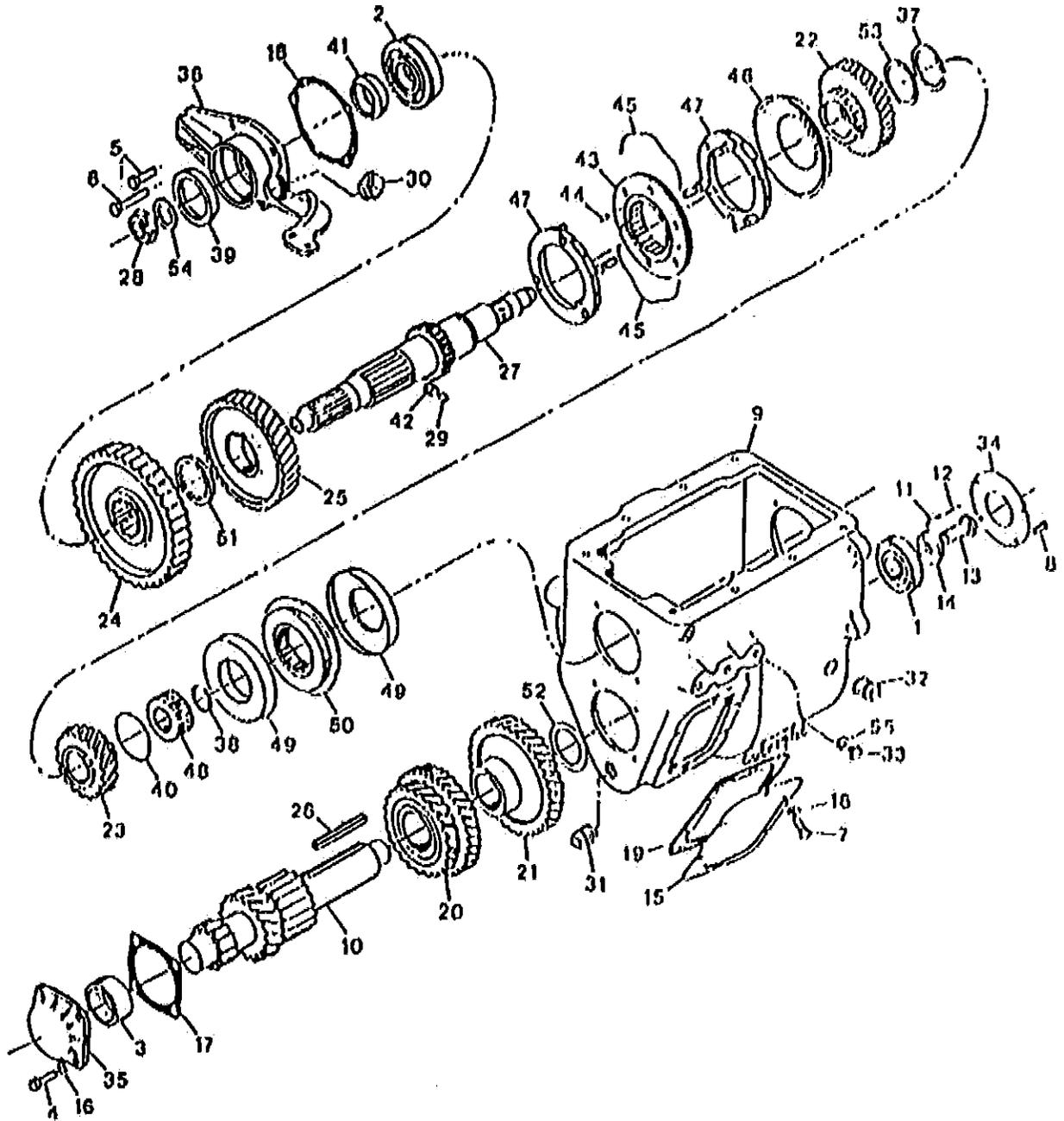


TRANSMISSION

PART NO.	DESCRIPTION	NO. REQ'D	REMARKS
WA-6-0	Transmission Assembly	1	
WA-6-1	Bearing	1	
WA-6-2	Bearing Assembly	1	
	Ring	1	
WA-6-3	Bearing	1	
WA-6-4	Bolt	4	
WA-6-5	Bolt	4	
WA-6-6	Bolt	1	
WA-6-7	Bolt Assembly	12	
WA-6-8	Bolt Assembly Magnet	4	
WA-6-9	Case Assembly Countershaft Group	1	
WA-6-10	Countershaft	1	
WA-6-11	Pin	1	
WA-6-12	Pin	1	
WA-6-13	Screw	1	
WA-6-14	Washer	1	
WA-6-15	Cover	2	
WA-6-16	Gasket	16	
WA-6-17	Gasket	1	
WA-6-18	Gasket	1	
WA-6-19	Gasket	2	
WA-6-20	Gear	1	
WA-6-21	Gear	1	
WA-6-22	Gear	1	
WA-6-23	Gear	1	
WA-6-24	Gear	1	
WA-6-25	Gear	1	
WA-6-26	Key	1	
WA-6-27	Mainshaft	1	
WA-6-28	Nut	1	
WA-6-29	Pin	1	
WA-6-30	Plug	1	
WA-6-31	Plug	1	
WA-6-32	Plug	1	

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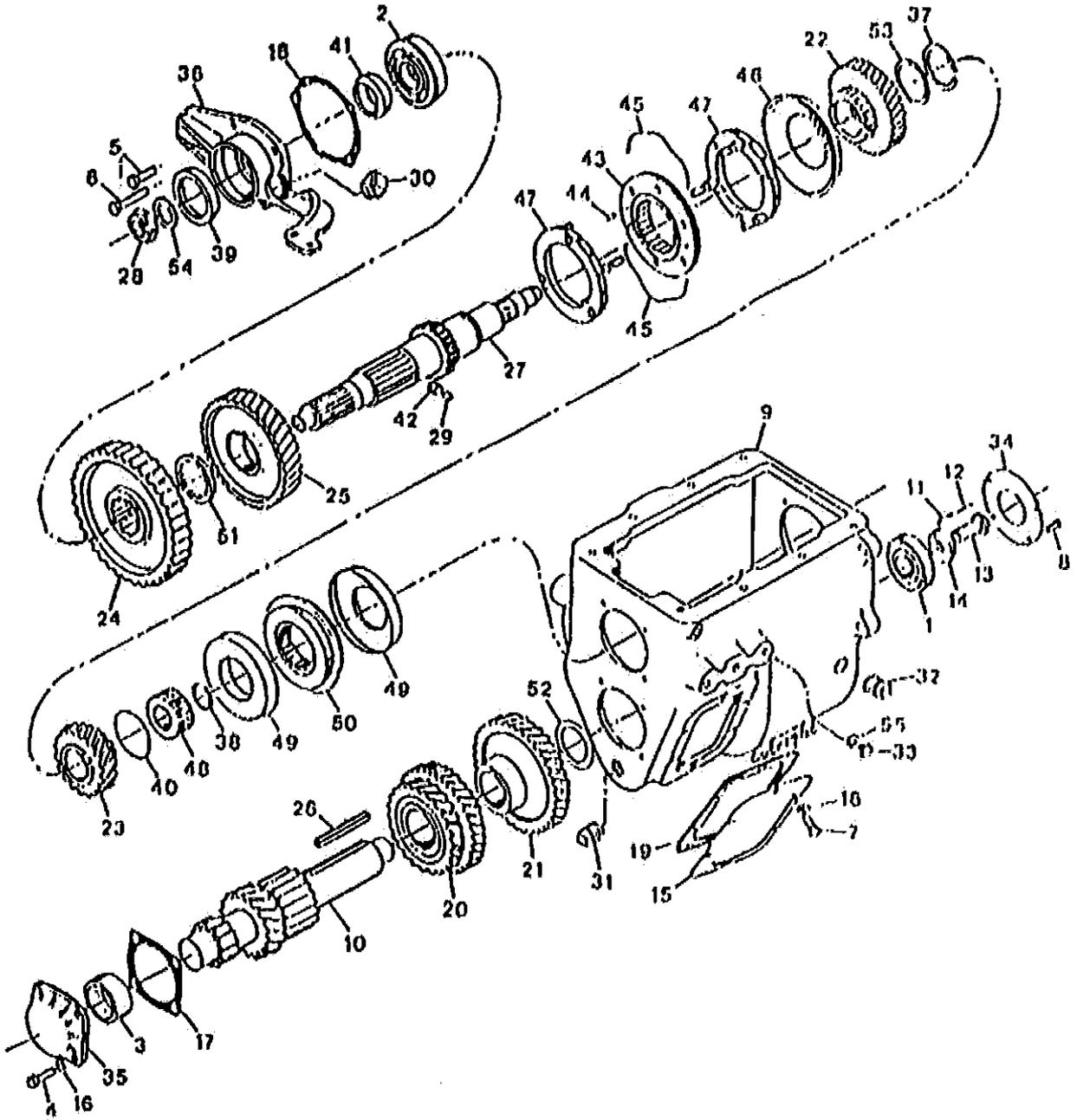
TRANSMISSION



TRANSMISSION

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WA-6-33	Plug	3	
WA-6-34	Retainer	1	
WA-6-35	Retainer	1	
WA-6-36	Retainer Assembly	1	
WA-6-37	Ring	1	
WA-6-38	Ring (.087)	1	
WA-6-38	Ring (.090)	1	
WA-6-38	Ring (.093)	1	
WA-6-38	Ring (.096)	1	
WA-6-39	Seal	1	
WA-6-40	Shim (.010)	1	
WA-6-41	Shim (.015)	1	
WA-6-41	Spacer	1	
WA-6-42	Spring Synchronizer Assembly	1	
WA-6-43	Clutch Assembly	1	
WA-6-44	Pin	2	
WA-6-45	Spring	2	
WA-6-46	Ring	1	
WA-6-47	Ring Assy. Synchronizer Assy.	2	
WA-6-48	Gear	1	
WA-6-49	Ring	2	
WA-6-50	Synchronizer Assy.	1	
WA-6-51	Washer	1	
WA-6-52	Washer	1	
WA-6-53	Washer	1	
WA-6-54	Washer	1	
WA-6-55	Washer	3	

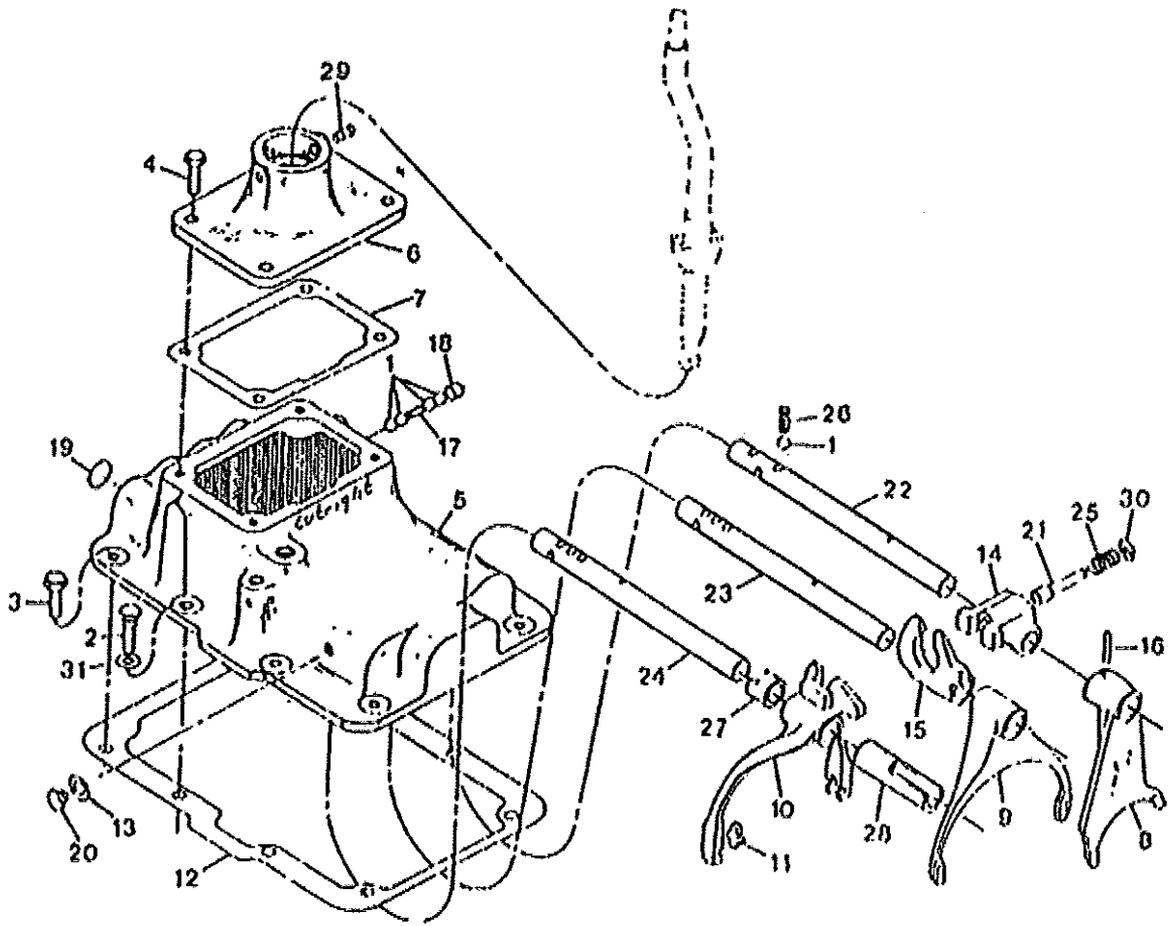
TRANSMISSION



TRANSMISSION COVER

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WA-5A-0	Cover And Shift Control Assembly	1	
WA-5A-1	Ball	8	
WA-5A-2	Bolt	2	
WA-5A-3	Bolt Assy. Cover Group	6	
WA-5A-4	Bolt Assembly	4	
WA-5A-5	Cover	1	
WA-5A-6	Upper Cover Assembly	1	
WA-5A-7	Gasket	1	
WA-5A-8	Fork	1	
WA-5A-9	Fork	1	
WA-5A-10	Fork & Insert As	1	
WA-5A-11	Insert	2	
WA-5A-12	Gasket	1	
WA-5A-13	Gasket	1	
WA-5A-14	Lug	1	
WA-5A-15	Lug	1	
WA-5A-16	Pin	5	
WA-5A-17	Pin	1	
WA-5A-18	Plug	1	
WA-5A-19	Plug	4	
WA-5A-20	Plug	1	
WA-5A-21	Plunger	1	
WA-5A-22	Rail	1	
WA-5A-23	Rail	1	
WA-5A-24	Rail	1	
WA-5A-25	Spring	1	
WA-5A-26	Spring	3	
WA-5A-27	Spacer (Marina)	1	
WA-5A-28	Spacer (Marina)	1	
WA-5A-29	Trunnion	2	
WA-5A-30	Washer	1	
WA-5A-31	Washer	2	

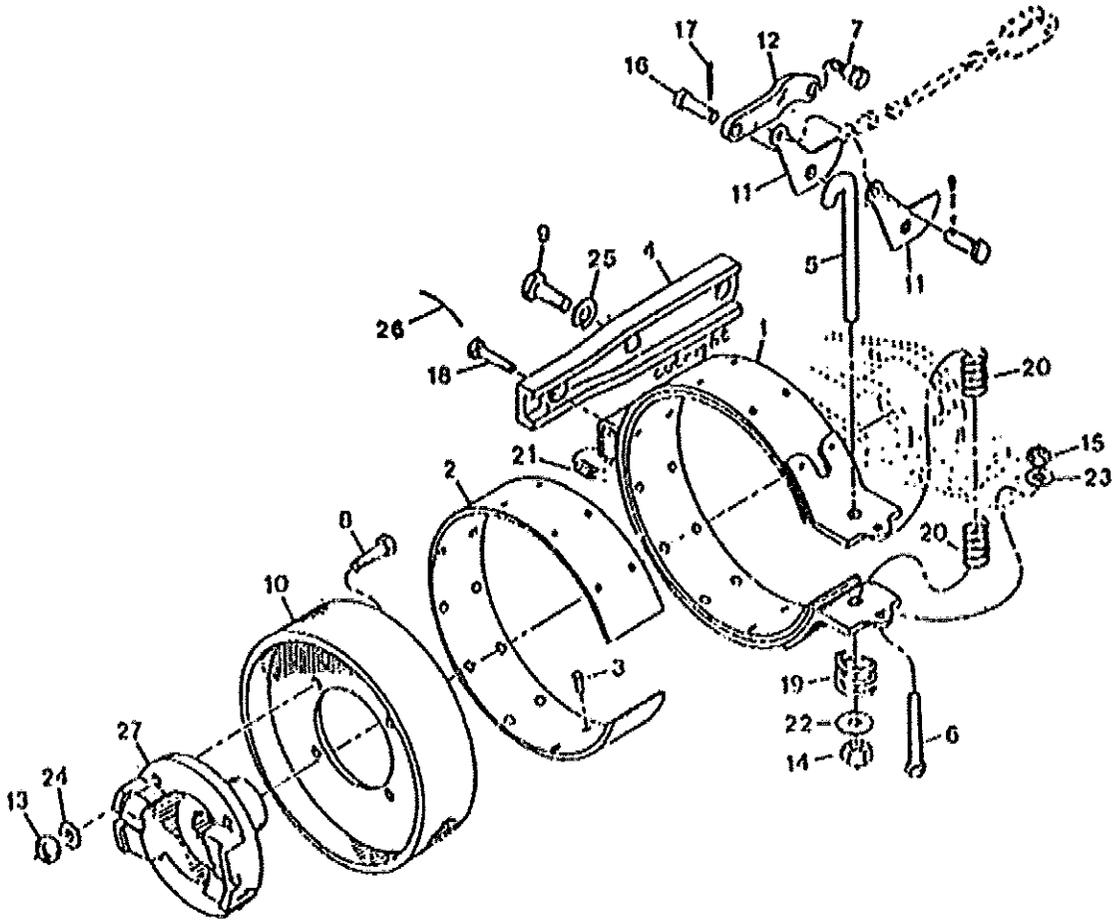
TRANSMISSION COVER



EMERGENCY BRAKE

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WA-8-1	Band & Lining Assembly	1	
WA-8-2	Lining	1	
WA-8-3	Rivets	24	
WA-8-4	Bar	1	
WA-8-5	Bolt	1	
WA-8-6	Bolt	1	
WA-8-7	Bolt	1	
WA-8-8	Bolt	4	
WA-8-9	Bolt	2	
WA-8-10	Drum	1	
WA-8-11	Lever	2	
WA-8-12	Link	1	
WA-8-13	Nut	4	
WA-8-14	Nut	1	
WA-8-15	Nut	1	
WA-8-16	Pin	1	
WA-8-17	Pin	1	
WA-8-18	Screw	1	
WA-8-19	Spring	1	
WA-8-20	Spring	2	
WA-8-21	Spring	1	
WA-8-22	Washer	1	
WA-8-23	Washer	1	
WA-8-24	Washer	4	
WA-8-25	Washer	2	
WA-8-26	Wire	A/R	
WA-8-27	Yoke	1	

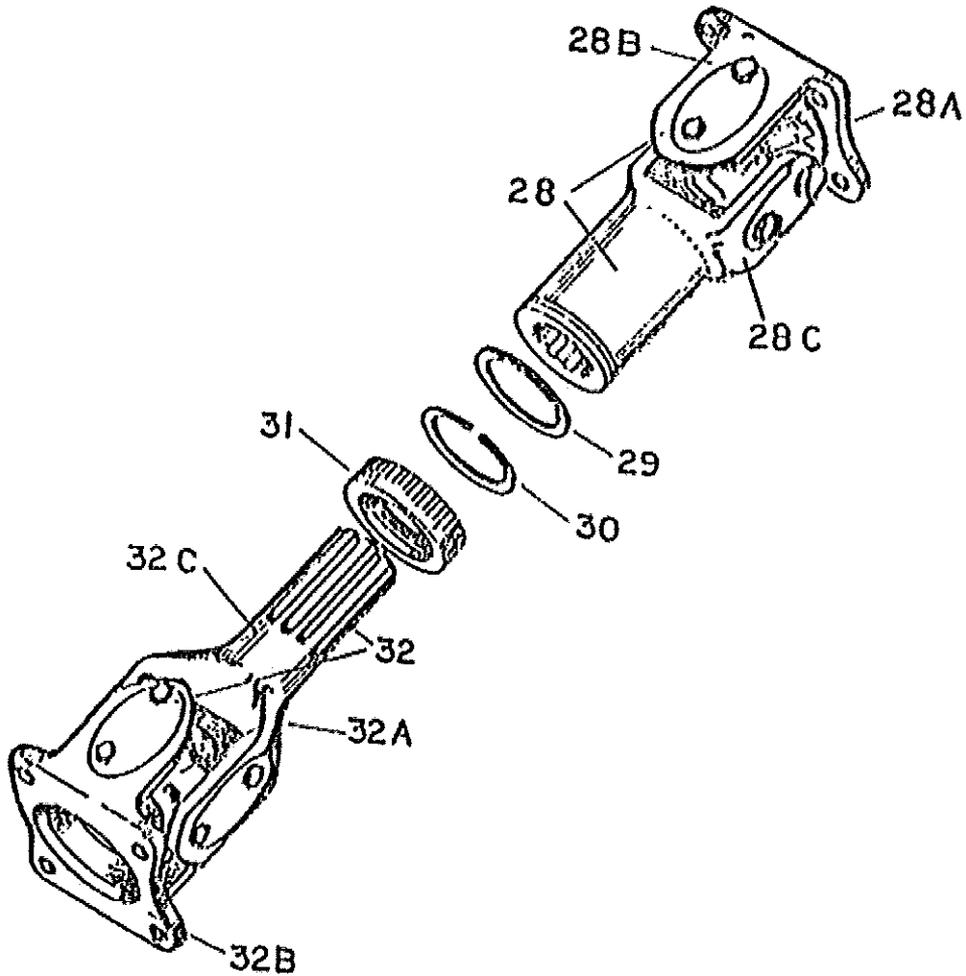
EMERGENCY BRAKE



DRIVE SHAFT

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WB-28	Slip Joint & Flange Yoke Assy.	1	
WB-28A	Joint & Bearing Kit	1	
WB-28B	Yoke - Front Flange	1	
WB-28C	Sleeve Yoke Assy.	1	
WB-29	Washer - Cork	1	
WB-30	Washer - Steel	1	
WB-31	Dust Cap	1	
WB-32	Slip Stub Yoke & Flange Assy.	1	
WB-32A	Yoke - Slip Stub	1	
WB-32B	Journal & Bearing Kit	1	
WB-32C	Slip Stub Flange	1	

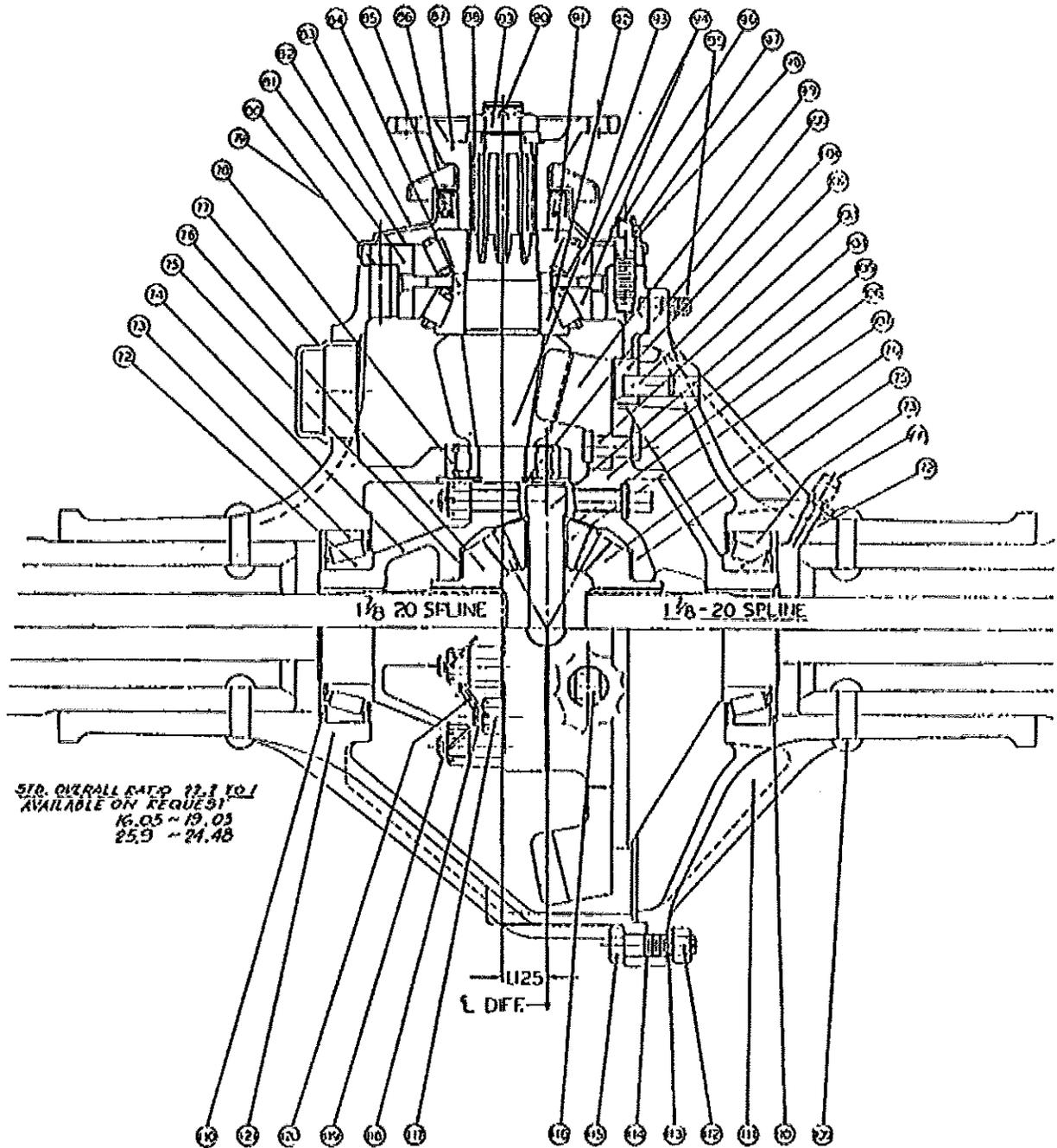
DRIVE SHAFT



DIFFERENTIAL ASSEMBLY

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W10-72	Cone - Diff. Bearing	2	
W10-73	Cup - Diff. Bearing	2	
W10-74	Diff. Case - Plain Half	1	
W10-75	Washer - Diff. Side Gear - Trust	2	
W10-76	Gear - Diff. Side	2	
W10-77	Plug - Diff. Carrier Inspection	1	
W10-78	Bearing - Bevel Pinion - Rear	1	
W10-79	Shim - Bevel Pinion Cage	VAR.	
W10-80	Gasket - Pinion Brg. Cage	1	
W10-81	Cage - Pinion Brg.	1	
W10-82	Gasket - Pinion Brg. Cage	1	
W10-83	Cover - Bevel Pinion Brg. Cage	1	
W10-84	Shim - Bevel Pinion Bearing	VAR.	
W10-85	Oil Seal- Bevel Pinion	1	
W10-86	Slinger - Companion Flange	1	
W10-87	Flange - Companion	1	
W10-88	Washer - Bevel Pinion Nut	1	
W10-89	Nut - Bevel Pinion	1	
W10-90	Cotter - Bevel Pinion Nut	1	
W10-91	Cone - Bev. Pinion Nut -Front DR	1	
W10-92	Cone - Bev. Pinion - Front Brg.	1	
W10-93	Pinion - Bevel Drive	1	
W10-94	Cup-Bevel Pinion-Front Bearing	2	
W10-95	Stud-Diff. Carrier Flange	2	
W10-96	Stud-Pinion Bearing Cage	8	
W10-97	Nut-Pinion Bearing Cage	8	
W10-98	Lockwasher-Pinion Bearing Cage	8	
W10-99	Gear - Bev. Drive	1	
W10-100	Lock Ring - Bev. Pinion-Rear Brg.	1	
W10-101	Thrust Block - Bev. Gear	1	
W10-102	Pin - Bev. Gear Thrust Block	1	
W10-103	Rivet-Diff. Case to Bev. Gear	12	
W10-104	Spider - Differential	1	
W10-105	Differential Case - Flange Half	1	
W10-106	Washer - Diff, Pinion Thrust	4	
W10-107	Pinion Differential	4	
W10-108	Oil Breather-Diff. Carrier Cover	1	
W10-109	Rivet-Housing Tube	16	
W10-110	Spacer-Diff. Bearing Cup	VAR.	
W10-111	Differential Carrier Cover	1	
W10-112	Nut-Diff. Carrier Flange	12	
W10-113	Lockwasher - Diff. Carrier Flange	12	
W10-114	Gasket-Diff. Carrier Flange	1	
W10-115	Bolt-Diff. Carrier Flange	10	
W10-116	Plug-Diff. Carrier Oil Drain	1	
W10-117	Nut-Diff. Case Bolt	12	
W10-118	Bolt-Diff. Case Short	4	
W10-119	Bolt-Diff. Case Long	8	
W10-120	Lockwire - Diff. Case Bolt	1	
W10-121	Carrier - Differential	1	

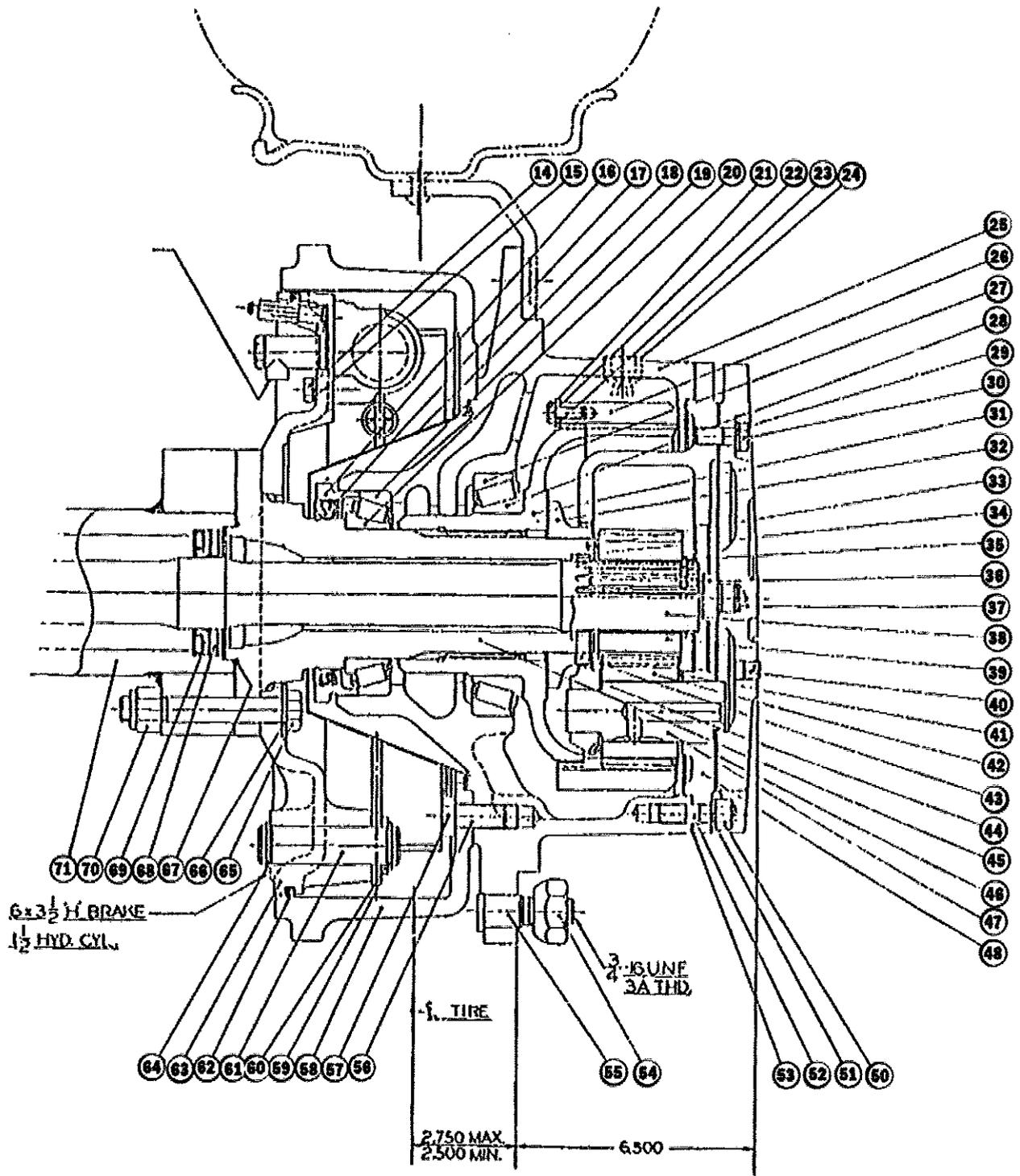
DIFFERENTIAL ASSEMBLY



PLANETARY ASSEMBLY

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W12-16	Retainer, Hub Brg. Oil Seal	2	
W12-17	Oil Seal, Hub Brg.	2	
W12-18	Oil Slinger	2	
W12-19	Cup, Hub Brg. Inner	2	
W12-20	Cone, Hub Brg. Inner	2	
W12-21	Cap Screw - Planet Ring Gear	16	
W12-22	Lockwire - Ring Gear Cap Screw	8	
W12-23	Lock - Planetary Ring Gear	2	
W12-24	Plug - Planetary Dr. Oil Drain	2	
W12-25	Hub	2	
W12-26	Gear - Planet Ring (52)	2	
W12-27	Cuo - Hub Bro. Outer	2	
W12-28	Cone - Hub Bro. Outer	2	
W12-29	Lockwasher - Planetary Spider Cover	16	
W12-30	Capscrew - Planetary Spider Cover	16	
W12-31	Hub - Planetary Ring Gear	2	
W12-32	Nut - Hub Brg.	2	
W12-33	Pin - Planetary Sun Gear Washer	4	
W12-34	Washer - Planetary Sun Gear	2	
W12-35	Snap Ring - Sun Gear Retainer	2	
W12-36	Thrust Button - Dr. Joint	2	
W12-37	Cover - Planetary Gear Spider	2	
W12-38	Shaft - Axle	2	
W12-39	Gear - Planetary Sun (20)	2	
W12-40	Plug - Planetary Dr. Oil Level	2	
W12-41	Washer-Planetary Pinion Thrust - Outer	6	
W12-42	Pinion - Planetary (16T)	6	
W12-43	Lock - Hub Bearing Nut	4	
W12-44	Washer -Planetary Pinion Thrust-Inner	6	
W12-45	Spindle - Wheel Brg.	2	
W12-46	Gasket-Planetary Gear Spider Cover	2	
W12-47	Shaft - Planetary Pinion	6	
W12-48	Spider - Planetary Gear	2	
W12-50	Nut-Planetary Spider to Hub Stud	24	
W12-51	Lockwasher -Spider To Hub Stud	24	
W12-52	Stud-Planetary Spider To Hub	24	
W12-53	Gasket-Planetary gear Spider to Hub	2	
W12-54	Nut - Wheel	24	
W12-55	Stud - Wheel	24	
W12-56	Capscrew	20	
W12-57	Lockwire -Brake Drum Capscrew	2	
W12-58	Brake Drum	2	
W12-65	Bolt - Spindle to Housing	24	
W12-66	Washer - Spindle to Housing Bolt	25	
W12-67	Seal - Spindle to Housing	2	
W12-68	Retainer - Axle Shaft Oil Seal	2	
W12-69	Oil Seal - Axle Shaft	2	
W12-70	Nut - Spindle to Housing Bolt	24	
W12-71	Tube - Axle	2	

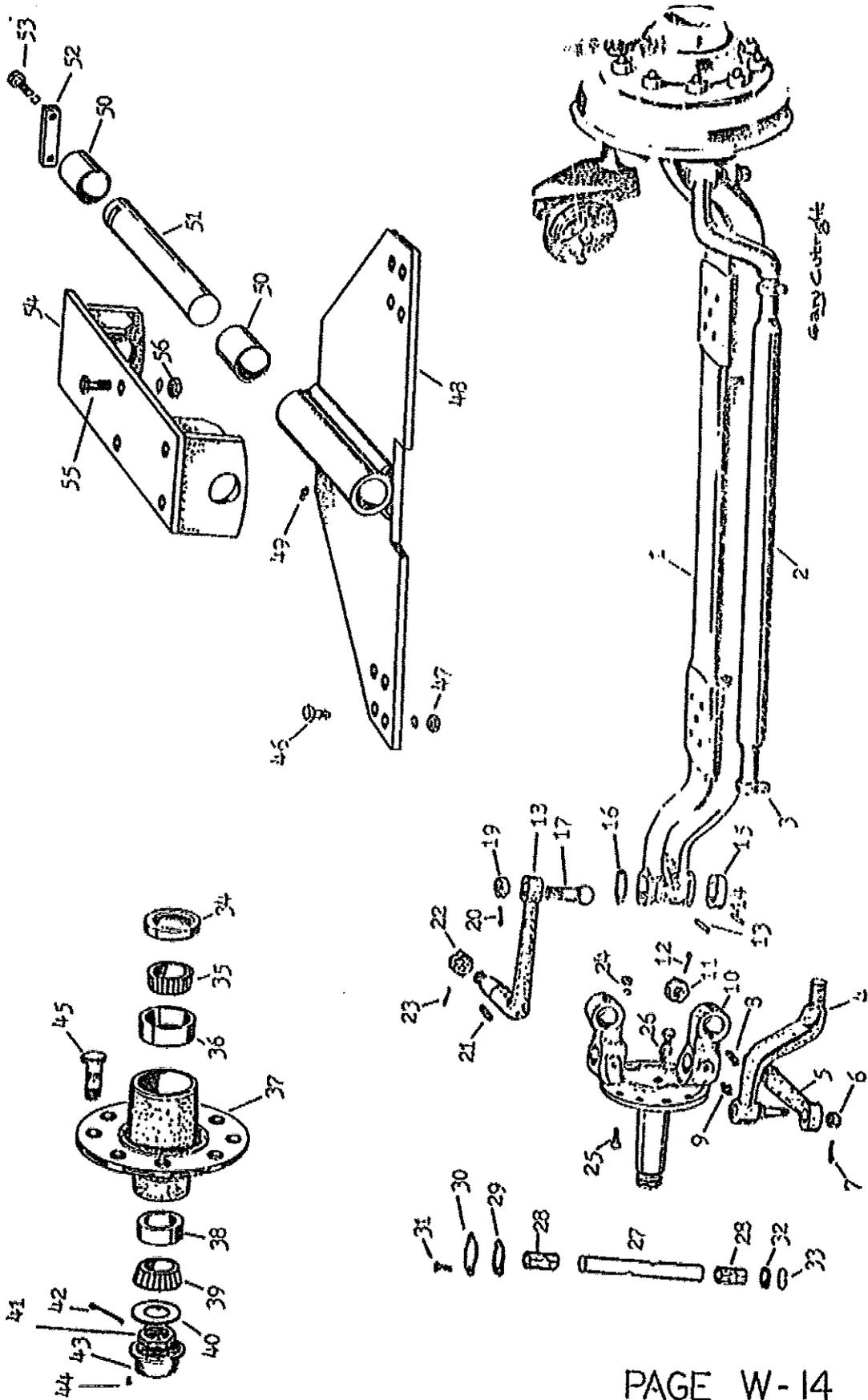
PLANETARY ASSEMBLY



FRONT AXLE

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W14-1	Axle - Center	1	
W14-2	Cross Tube	1	
W14-3	Clamp & Bolt Assy - Cross Tube	2	
W14-4	End - Cross Tube [Assemblies] **	2	
W14-5	Arm - Cross Tube	2	
W14-6	Nut - Cross Tube Stud	2	
W14-7	Cotter Key - Cross Tube Stud Nut	2	
W14-8	Key - Cross Tube Arm	2	
W14-9	Fitting - Lubrication	2	
W14-10	Steering Knuckle [Specify R.H. or L.H.]	2	
W14-11	Nut - Cross Tube Arm	2	
W14-12	Cotter Key - Cross Tube Arm Nut	2	
W14-13	Retainer - Knuckle Pin	2	
W14-14	Retainer - Knuckle Pin	2	
W14-15	Bearing - Knuckle Thrust	2	
W14-16	Shim - Steering Knuckle	VAR.	
W14-17	Ball - Steering Arm	1	
W14-18	Arm - Steering	1	
W14-19	Nut - Steering Arm Ball	1	
W14-20	Cotter Key - Steering Arm Ball Nut	1	
W14-21	Key - Steering Arm	1	
W14-22	Nut - Steering Arm	1	
W14-23	Cotter Key - Steering Arm Kit	1	
W14-24	Nut & L.W. - Backing Plate	16	
W14-25	Bolt - Backing Plate	16	
W14-26	Steering Knuckle Stop Screw Ass.	2	
W14-27	Pin - Steering Knuckle	2	
W14-28	Bushing - Steering Knuckle Pin	4	Specify Upper or Lower
W14-29	Gasket - Steering Knuckle Dust Cover	2	
W14-30	Dust Cover - Knuckle Pin	2	

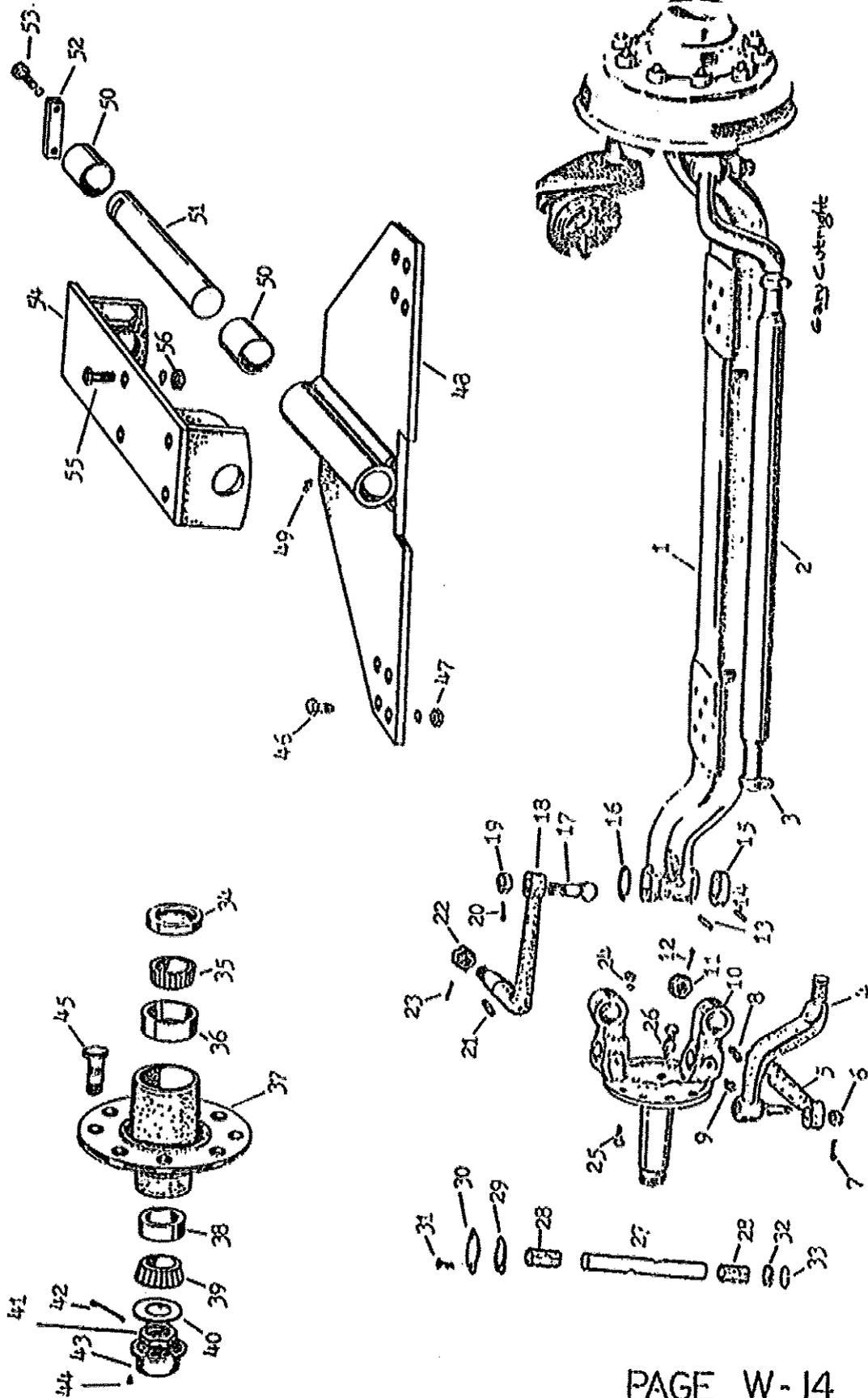
FRONT AXLE



FRONT AXLE

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W14-31	Screw - Dust Cover	4	
W14-32	Plug - Steering Knuckle Pin	2	
W14-33	Ring - Locking, Steering Knuckle Pin	2	
W14-34	Seal - Hub Inner	2	
W14-35	Cone - Hub Inner	2	
W14-36	Cup - Hub Inner	2	
W14-37	Hub	2	
W14-38	Cup - Hub Outer	2	
W14-39	Cone - Hub Outer	2	
W14-40	Washer - Hub	2	
W14-41	Nut - Hub Bearing Retainer	2	
W14-42	Cotter Key - Hub Brg. Nut	2	
W14-43	Dust Cover - Hub.	2	
W14-44	Screw - Hub Dust Cover	12	
W14-45	Stud & Nut - Wheel & Brake Drum	20	
W14-46	Bolt - Oscillating Pad to Axle	8	
W14-47	Nut & L.W. - Pad to Axle Bolt	8	
W14-48	Pad - Oscillating	1	
W14-49	Fitting - Lubrication	1	
W14-50	Bushing - Oscillating Shaft	2	
W14-51	Shaft - Oscillating	1	
W14-52	Keeper - Oscillating Shaft	1	
W14-53	Bolt & L.W. - Oscillating Shaft Keeper	2	
W14-54	Oscillating Mount	1	
W14-55	Bolt - Oscillating Mount	4	
W14-56	Nut & L.W. - Oscillating Mount Bolt	4	

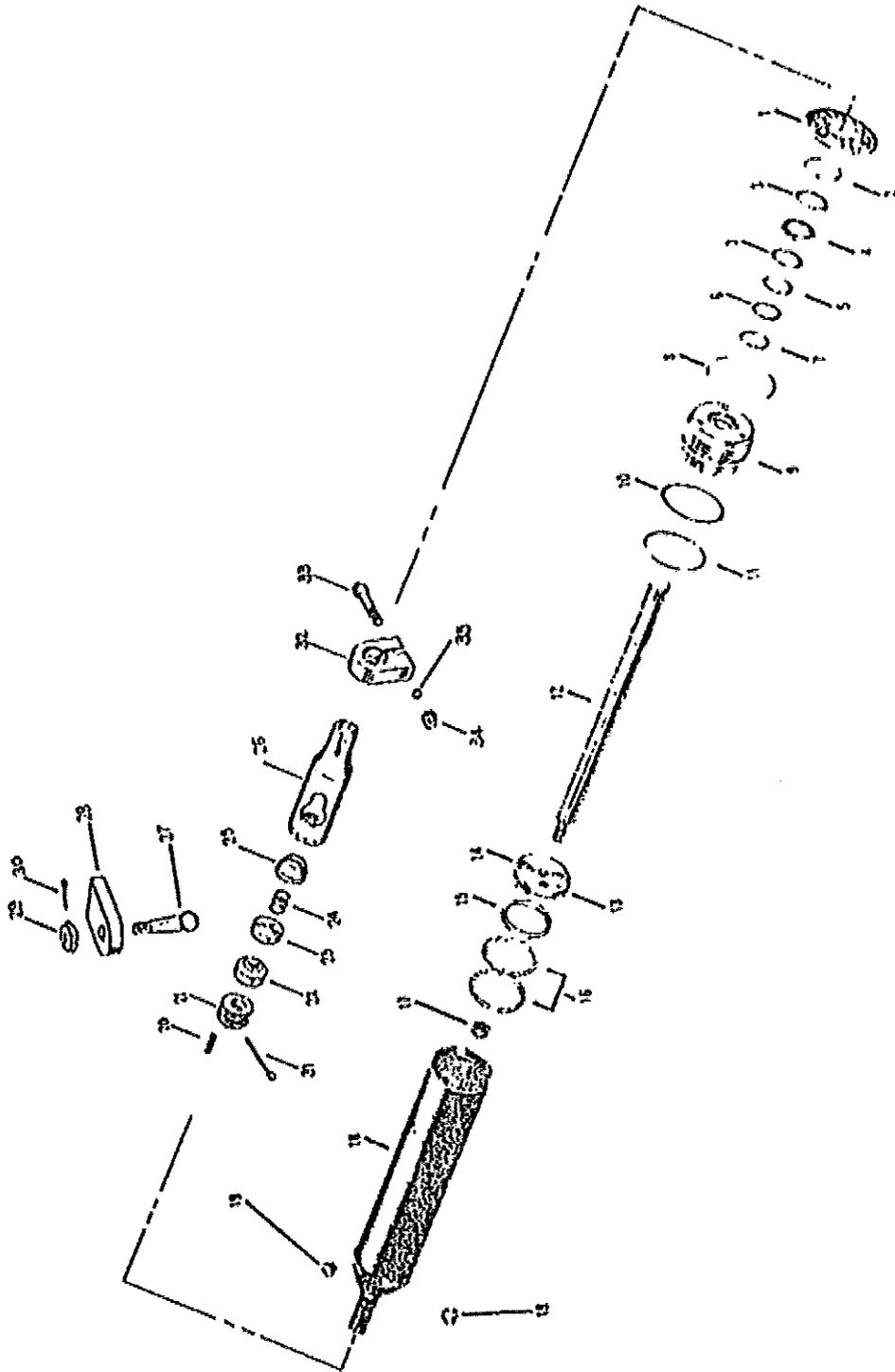
FRONT AXLE



STEERING CYLINDER

PART NO.	DESCRIPTION	NO. REQ'D.	REMARKS
W16-1	End Plate	1	
W16-2	Retaining Ring	1	
W16-3	Back-Up Ring	2	
W16-4	Seal	1	
W16-5	Retaining	1	
W16-6	Back-Up Ring	1	
W16-7	"O" Ring	1	
W16-8	Retaining Ring	1	
W16-9	Gland	1	
W16-10	Back-Up Ring	1	
W16-11	"O" Ring	1	
W16-12	Piston Rod	1	
W16-13	Poppet, When Specified	1	
W16-14	Piston	1	
W16-15	Seal	1	
W16-16	Piston Rings	2	
W16-17	Gland Nut	1	
W16-18	Cylinder Shell Assembly	1	
W16-19	Seat-When Specified	2	
W16-20	Fitting, Lubrication	2	
W16-21	Plug-Drag Link End	2	
W16-22	Bearing - Drag Link	2	
W16-23	Bearing - Drag Link	2	
W16-24	Spring - Compression, Drag Link	2	
W16-25	Seat - Drag Link End	2	
W16-26	Housing - Drag Link	2	
W16-27	Ball Stud- Drag Link	1	
W16-28	Bracket - Frame	1	Welded To Frame
W16-29	Nut - Ball Stud	1	
W16-30	Cotter Key - Ball Stud Nut	1	
W16-31	Cotter Key - Drag Link Plug	2	
W16-32	Clamp - Drag Link	2	
W16-33	Bolt - Drag Link Clamp	2	
W16-34	Nut- Drag Link Clamp	2	
W16-35	Lockwasher	2	

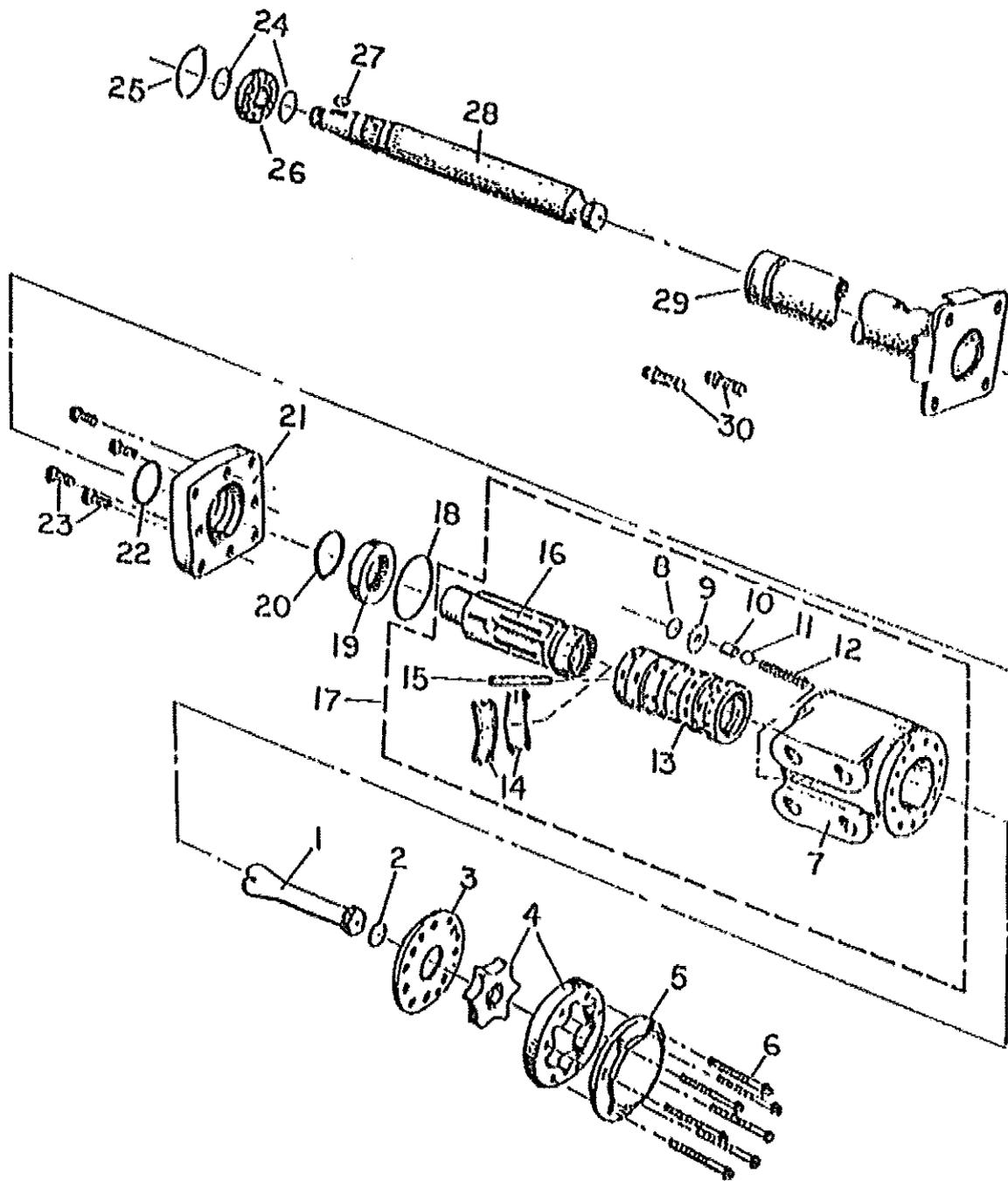
STEERING CYLINDER



ORBITROL & STEERING COLUMN

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W18-1	Drive	1	
W18-2	Spacer	1	
W18-3	Plate	1	
W18-4	Gerotor Set (.86 Th.)	1	
W18-5	Cap - End	1	
W18-6	Screw - Cap Retaining	7	
W18-7	Housing - Valve (Not Sold Separately)	1	
W18-8	Seal - "O" Ring 7/16" OD x 1/16" SEC	1	
W18-9	Plug - Seal	1	
W18-10	Seat - Check	1	
W18-11	Ball - 1/4" Dia.	1	
W18-12	Spring - Compression	1	
W18-13	Sleeve - Control (Not Sold Separately)	1	
W18-14	Spring - Centering	6	
W18-15	Pin - Centering	1	
W18-16	Spool - Control	1	
W18-17	Control - Parts Assy.	1	
W18-18	Seal-"O" Ring 1/15/16" OD x 3/32" SEC	1	
W18-19	Bushing - Cap Locator	1	
W18-20	Seal - Quad Ring 1-5/16" OD x 1/8" TH.	1	
W18-21	Plate Mounting	1	
W18-22	Seal - Oil 1 1/4" OD x 1" ID x 1/8" Th.	1	
W18-23	Screw - Cap	4	
W18-24	Snap Ring	2	
W18-25	Retaining Ring	1	
W18-26	Bearing Assembly	1	
W18-27	Key-Woodruff 7/8" Dia. x 3/16"	1	
W18-28	*Steering Shaft Assy. - Keyed	1	Specify SCC or SCE
W18-29	*Tube & Flange Assembly	1	Specify SCC or SCE
W18-30	Screw	2	
	*For SCC - 6" long		
	*For SCE - 30" long		

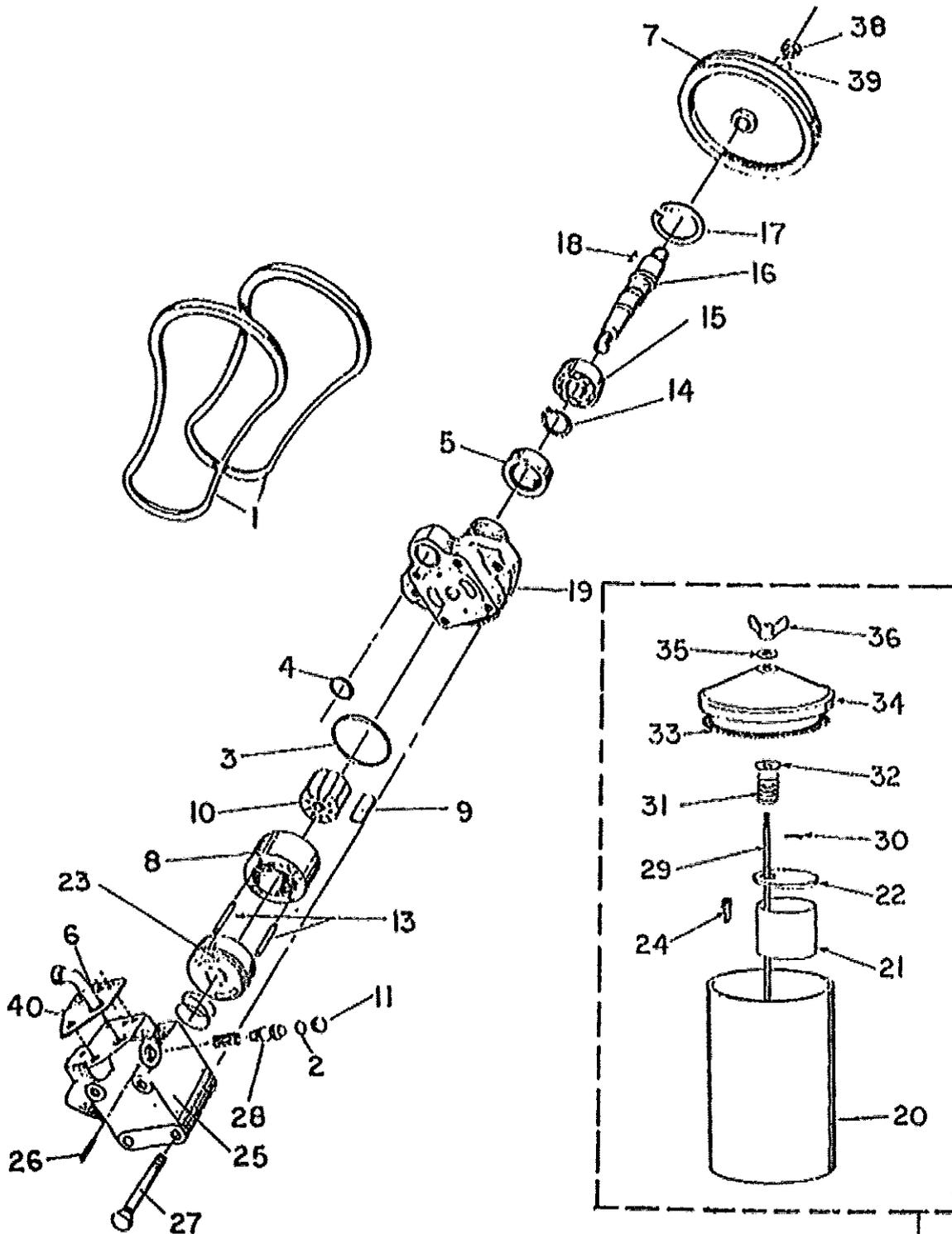
ORBITROL STEERING COLUMN



POWER STEERING PUMP

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WH19-1	V-Belt - Pump Drive	2	
W20-2	Washer - Pressure Relief Valve	1	
W20-3	"O" Ring Seal	1	
W20-4	"O" Ring Seal	1	
W20-5	Seal - Drive Shaft	1	
W20-6	Gasket - Reservoir to Body	1	
	Pulley - Drive	1	
W20-8	Ring	1	
W20-9	Vane	10	
W20-10	Rotor	1	
W20-11	Plug-Pressure Relief Valve	1	
W20-12	Spring-Pressure Relief Valve	1	
W20-13	Pin	2	
W20-14	Snap Ring - Brg. to Shaft	1	
W20-15	Bearing	1	
W20-16	Shaft - Drive	1	
W20-17	Snap Ring - Bearing to Body	1	
W20-18	Key - Woodruff	1	
W20-19	Body	1	
	Reservoir	1	
W20-21	Filter	1	
W20-22	Cover-Filter	1	
W20-23	Pressure Plate	1	
W20-24	Screw - Reservoir to pump cover	1	
W20-25	Pump Cover	1	
W20-26	Pin - Pressure Relief Valve	1	
W20-27	Screw - Body to Cover	4	
W20-28	Valve - Pressure Relief	1	
W20-29	Stud - Reservoir Cover	1	
W20-30	Cotter Key - Filter Cap Retaining	1	
W20-31	Spring - Filter Retaining	1	
W20-32	Washer - Filter Retaining Spring	1	
W20-33	Gasket - Reservoir Cover	1	
W20-34	Cover - Reservoir	1	
W20-35	Washer - Wing Nut	1	
W20-36	Wing Nut	1	
W20-37	Spring	1	
W20-38	Nut-Pulley Retaining	1	
W20-39	Lock Washer - Pulley Nut	1	
	Manifold		

POWER STEERING PUMP

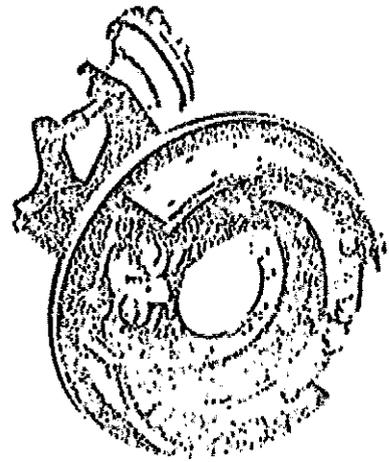
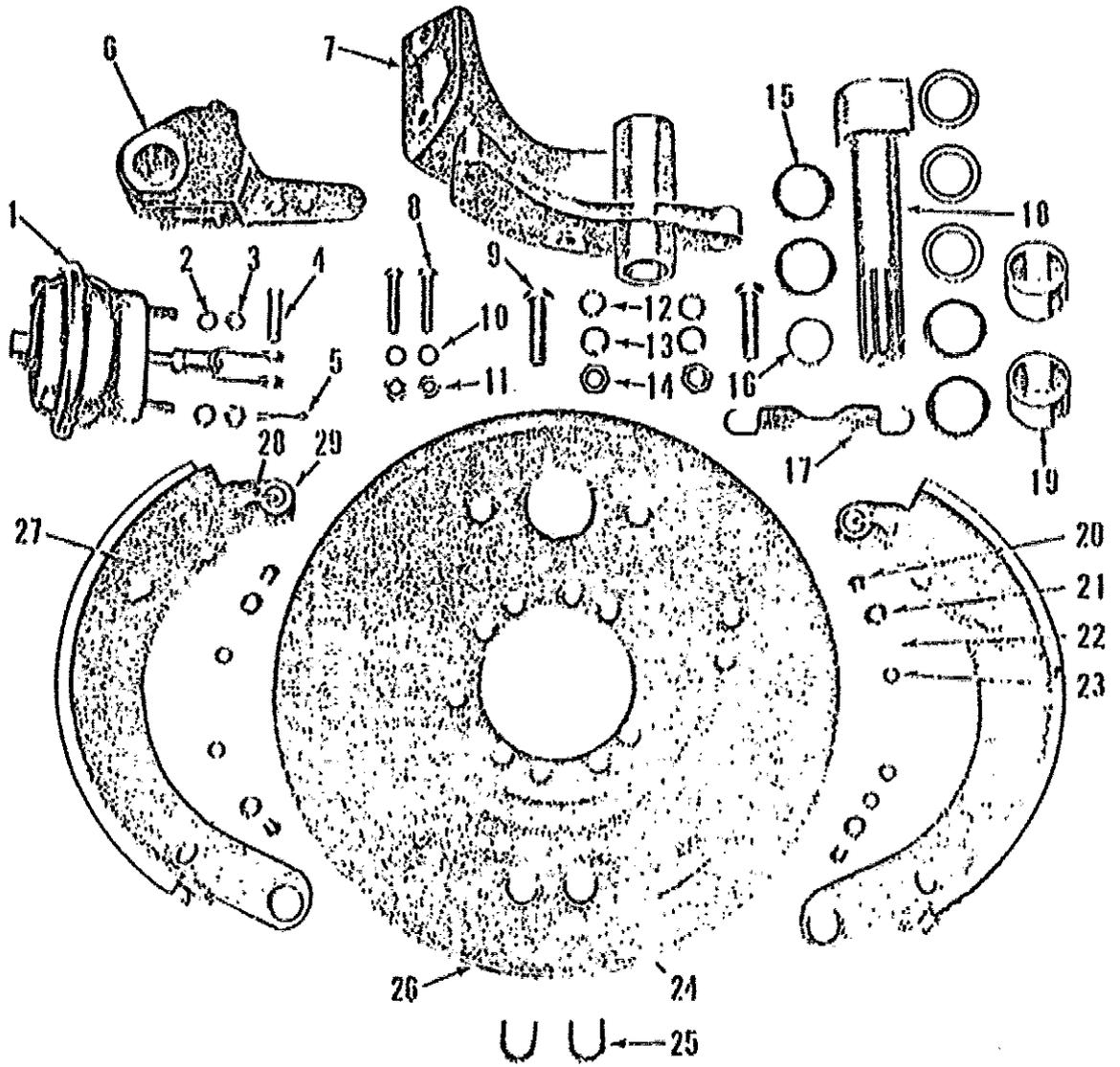


USED ON EARLY MODELS ONLY

FRONT BRAKE ASSEMBLY

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W22-1	Chamber - Brake Assy.	1	
W22-2	Washer - Brake Chamber Stud Nut	2	
W22-3	Nut - Brake Chamber Stud	2	
W22-4	Pin - Brake Chamber Yoke	1	
W22-5	Key - Chamber Yoke Pin, Cotter	1	
W22-6	Lever - Enclosed Adjustable T.D.A.	1	
W22-7	Bracket - Camshaft & Chamber	1	
W22-8	Bolt-Camshaft Bracket - Small	2	
W22-9	Bolt Camshaft Bracket - Large	2	
W22-10	Washer-Camshaft Bracket Bolt - Small	2	
W22-11	Nut-Camshaft Bracket Bolt-Small	2	
W22-12	Washer-Camshaft Bracket Bolt-Shakeproof	2	
W22-13	Washer - Camshaft Bracket Bolt - Large	2	
W22-14	Nut -Camshaft Bracket Bolt-Large	2	
W22-15	Washer - Camshaft Spacing	VAR.	
W22-16	Ring-Camshaft & Lever Lock	1	
W22-17	Spring-Brake Shoe Return	1	
W22-18	Shaft-Cam	1	
W22-19	Bushing - Camshaft	2	
W22-20	Washer - Guide Pin "C"	4	
W22-21	Washer - Guide Pin Thick	4	
W22-22	Washer - Guide Pin Thin	4	
W22-23	Washer - Guide Pin Spring	4	
W22-24	Pin - Brake Anchor	2	
W22-25	Washer - Anchor Pin "C"	2	
W22-26	Plate - Brake Backing	1	
W22-27	Shoe-Brake & Lining Assy. (Kit Includes Lining & Rivets Only)	1	
W22-28	Retainer - Brake Shoe Roller	2	
W22-29	Roller - Brake Shoe	2	
W22-30	Brake Drum	1	

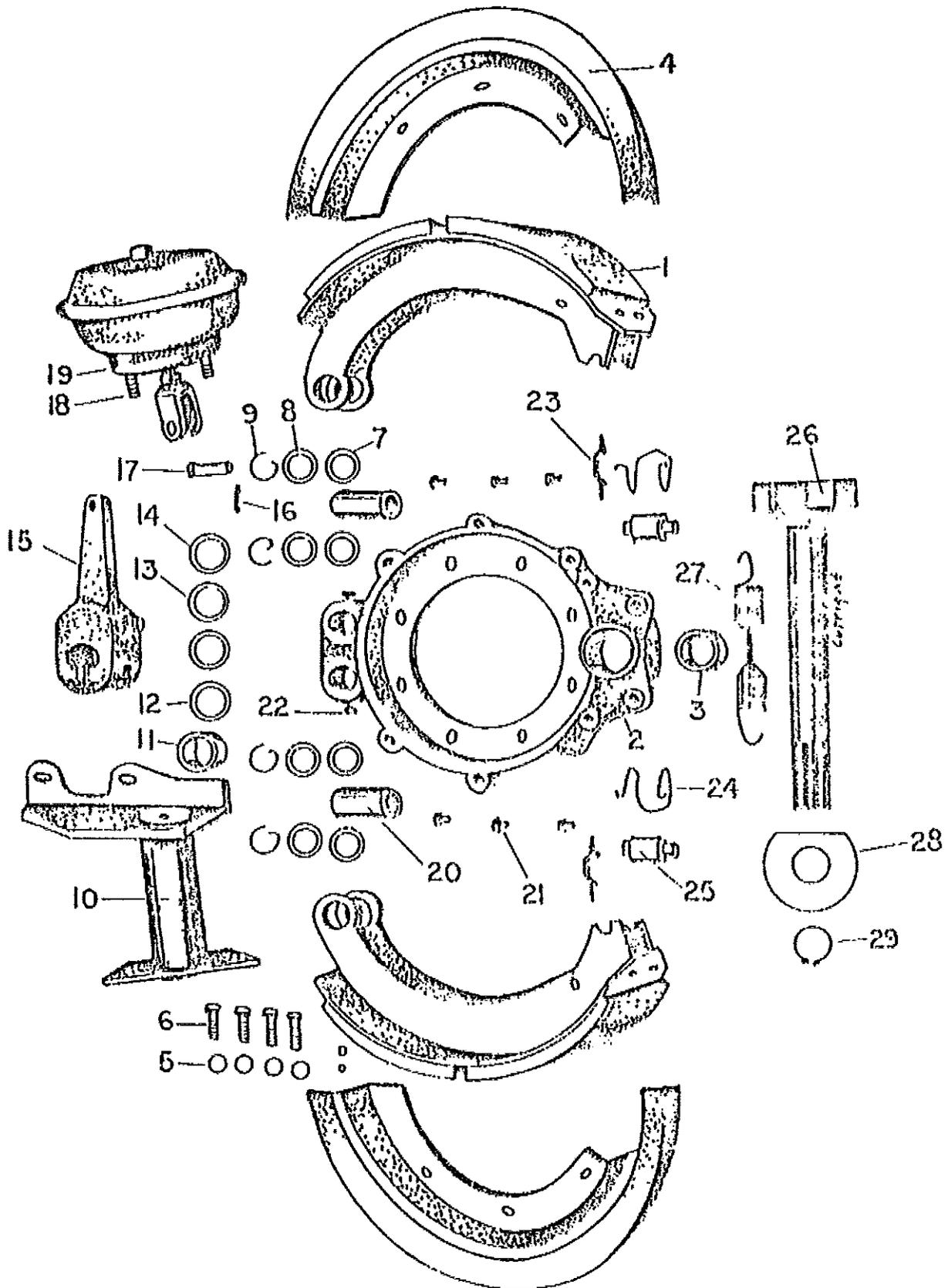
FRONT BRAKE ASSEMBLY



REAR BRAKE ASSEMBLY

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W24-1	Brake Shoe & Lining	2	
W24-2	Brake Spider Assy.	1	
W24-3	Brake Spider Bushing	1	
W24-4	Dust Shield	2	
W24-5	Cam Bracket & Spider Screw Washer	4	
W24-6	Cam Bracket & Spider Screw	4	
W24-7	Anchor Pin Felt Retainer	4	
W24-8	Anchor Pin Felt	4	
W24-9	Anchor Pin Lock Ring	4	
W24-10	Camshaft & Chamber Bracket Assy.	1	
W24-11	Camshaft Bracket Bushing	1	
W24-12	Camshaft Oil Seal Felt	1	
W24-13	Camshaft Felt Washer	1	
W24-14	Camshaft Spacing Washer	1	
W24-15	Slack Adjuster Lever Assy.	1	
W24-16	Br. Chamber Yoke Pin Cotter Key	1	
W24-17	Br. Chamber Yoke Pin	1	
W24-18	Br. Chamber Stud Nut	2	
W24-19	Br. Chamber Assy.	1	
W24-20	Br. Anchor Pin	2	
W24-21	Dust Shield & Spider Screw	6	
W24-22	Br. Anchor Pin Lock Screw	2	
W24-23	Br. Shoe Return Spring Pin	2	
W24-24	Br. Shoe Roller Retainer	2	
W24-25	Br. Shoe Roller	2	
W24-26	Camshaft	1	
W24-27	Br. Shoe Return Spring	1	
W24-28	Br. Camshaft Washer	1	
W24-29	Br. Camshaft Lock Ring	1	

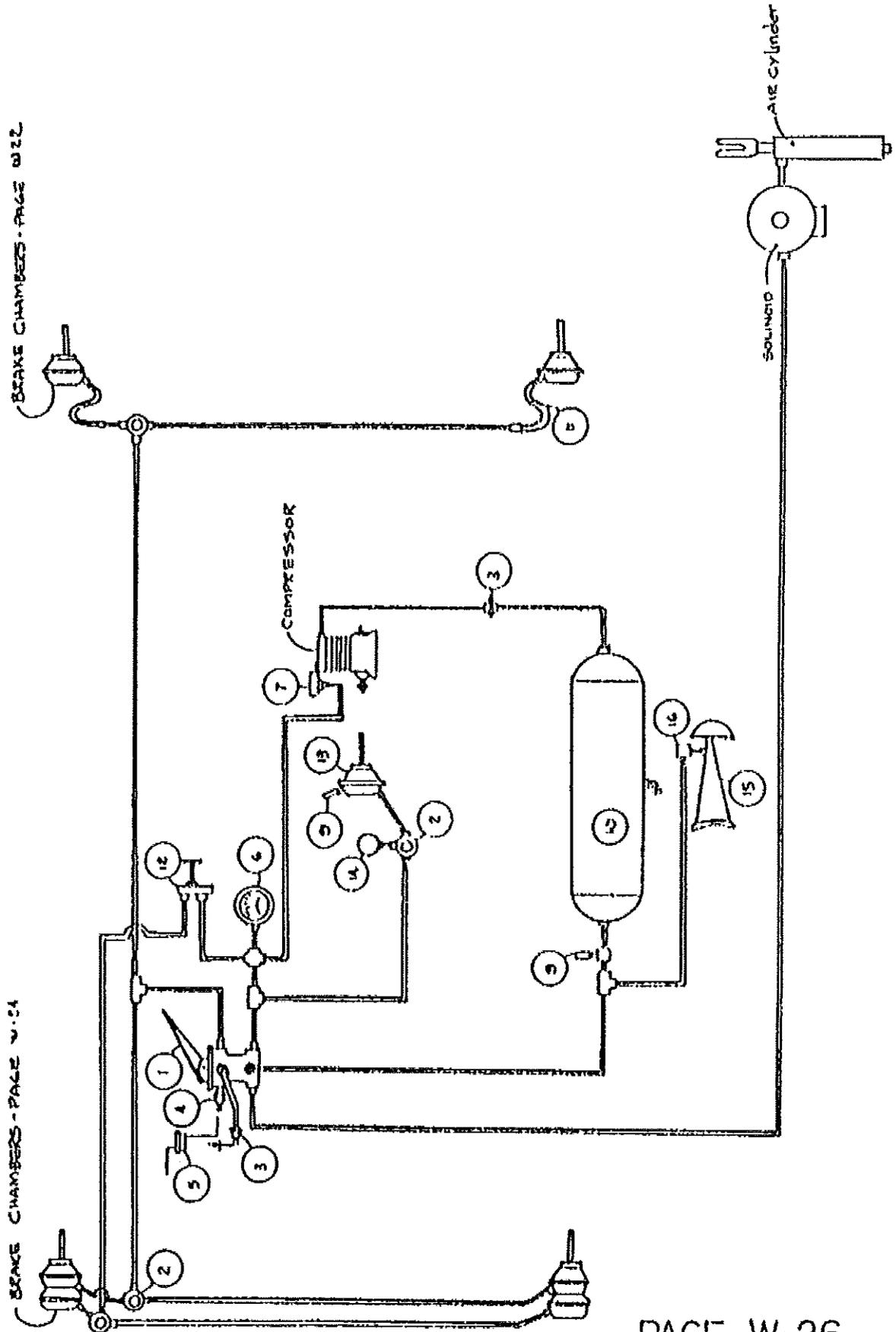
REAR BRAKE ASSEMBLY



AIR SYSTEM

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W26-1	Treadle Valve Assembly-Air Control	1	
W26-1A	Treadle-Air Control Valve	1	
W26-1B	Valve-Air Control	1	
W26-2	Valve-Quick Release	2	
W26-3	Switch - Stop Light	1	
W26-4	Switch Low Air Pressure	1	
W26-5	Buzzer - Low Air Pressure Warning	1	
W26-7	Governor	1	
W26-8	Valve - One-Way Check	1	
W26-9	Valve - Safety Relief	1	
W26-10	Air Storage Reservoir	1	
W26-11	Hoses - Flexible	2	
W26-12	Air Brake Valve (Control Panel)	1	Optional M1 Standard W11
W26-13	Air truck Hitch Chamber	1	Optional M1 Standard W11
W26-14	Solenoid (Air Hitch)	1	Optional M1 Standard W11
W26-15	Air Horn	1	
W26-16	Solenoid (Horn)	1	
W126-17	Flexible Hose	1	Specify length

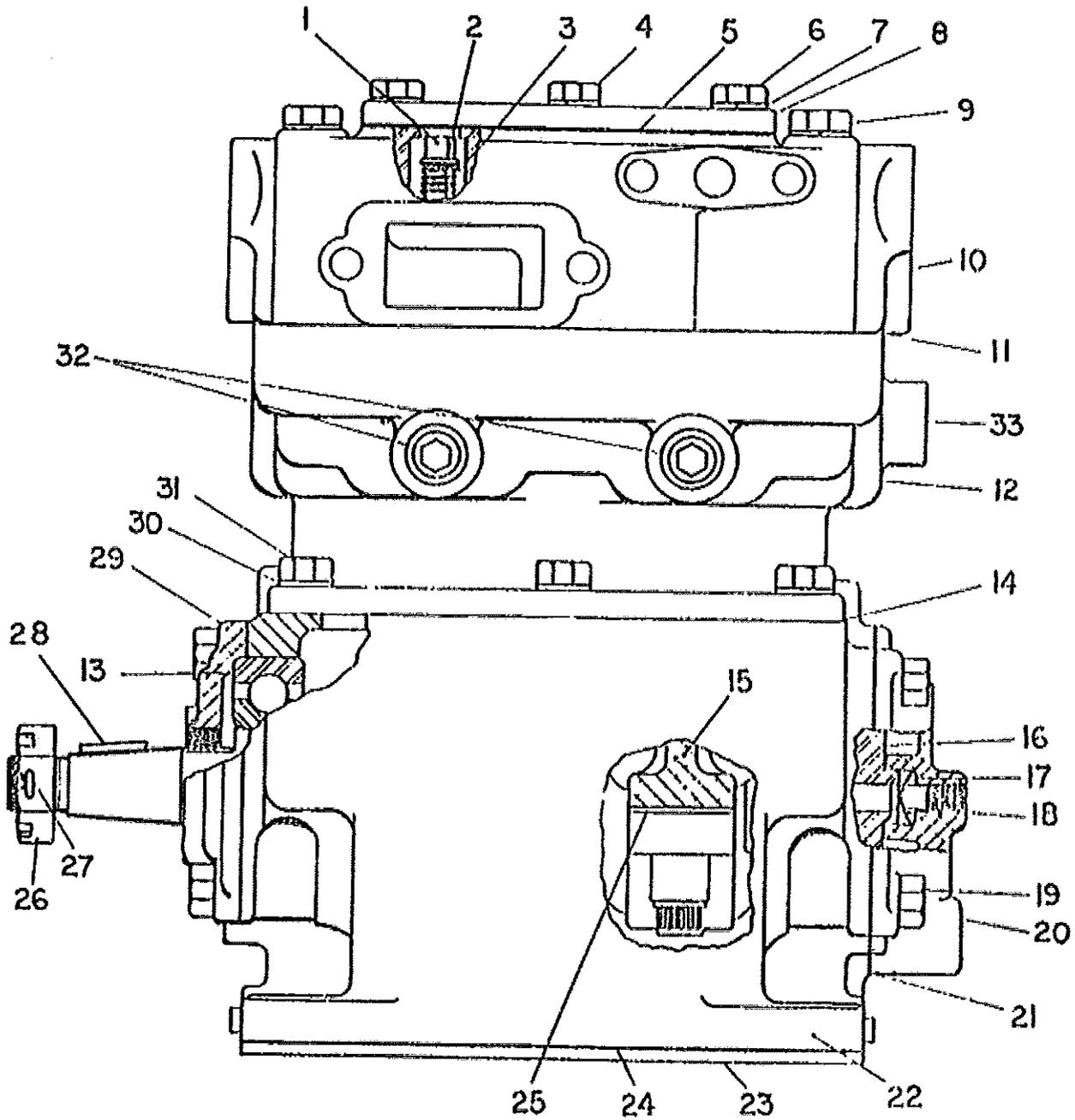
AIR SYSTEM



COMPRESSOR

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W28-1	Pin - Unloader	2	
W28-2	Seal Vee	2	
W28-3	Spring	2	
W28-4	Bolt	1	
W28-5	Gasket - Unloader	1	
W28-6	Bolt	2	
W28-7	Lockwasher	2	
W28-8	Cover - Unloader	1	
W28-9	Hex Head Bolt	5	
W28-10	Cylinder Head Assy.	1	
W28-11	Gasket - Head	1	
W28-12	Cylinder Block	1	
W28-13	Bearing	2	
W28-14	Gasket - Cylinder Block	1	
W28-15	Piston & Rod Assy.	2	
W28-16	Crankshaft	1	
W28-17	Bowed Washer	1	
W28-18	Seal Ring	1	
W28-19	Lock Screw	1	
W28-20	Bearing Cap - Rear	1	
W28-21	Gasket - Bearing Cap	2	
W28-22	Crankcase	1	
W28-23	Cover Plate	1	
W28-24	Gasket	1	
W28-25	Bearing - Rod	4	
W28-26	Nut	1	
W28-27	Cotter Pin	1	
W28-28	Woodruff Key	1	
W28-29	Bearing Cap Assy.	1	
W28-30	Lockwasher	6	
W28-31	Hex Head Bolt	6	
W28-32	Pipe Plug	2	
W28-33	Pipe Plug	1	
W28-34	Pulley Drive	1	Not Shown
W28-35	Vee-Belt - Compressor Drive	1	Not Shown

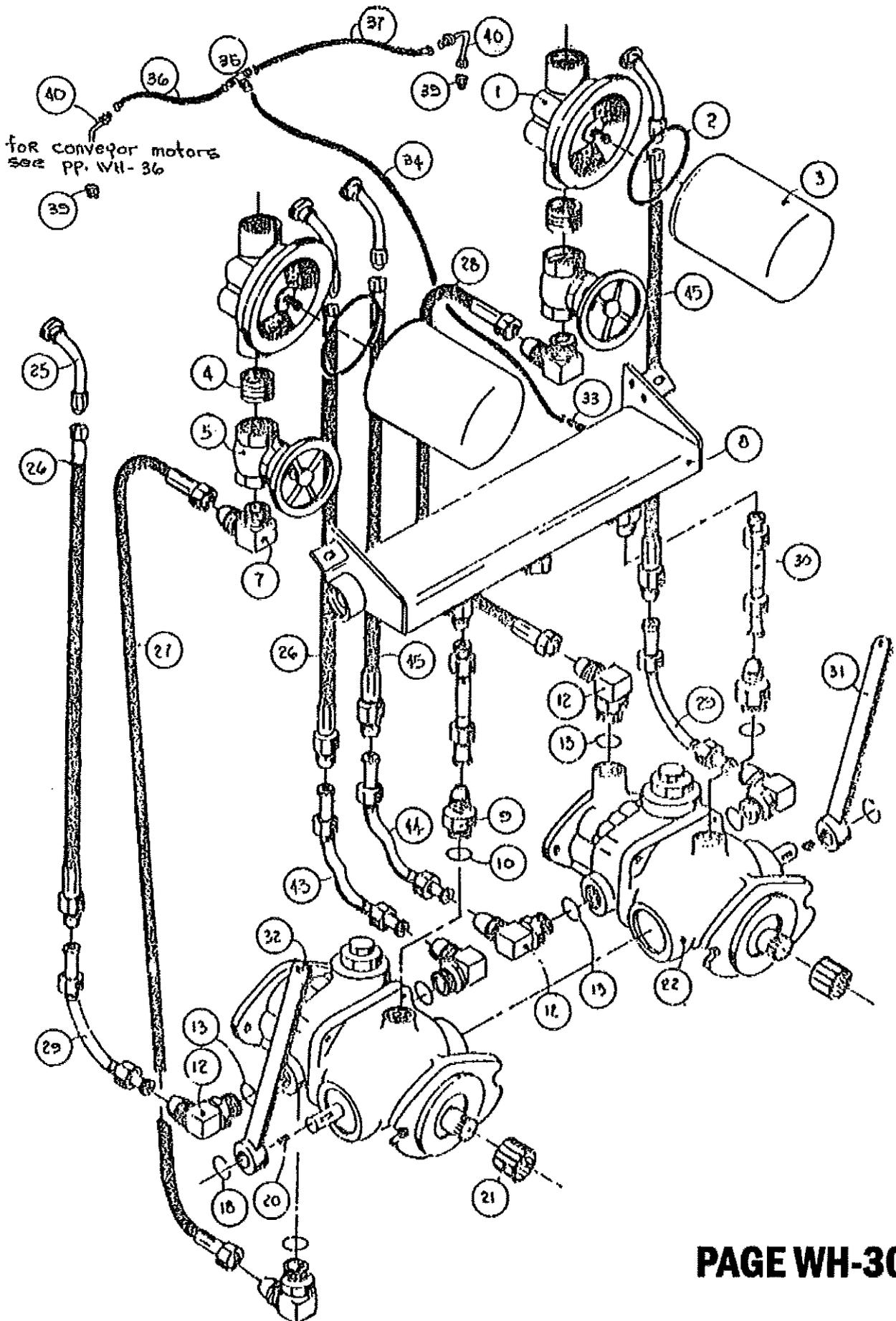
COMPRESSOR



CONVEYOR DRIVE ASSEMBLY

Part No.	DESCRIPTION	No. Reqd.	Remarks
WH30-1	Oil Filter Housing	3	comes with filter
WH30-2	O-Ring - Oil Filter	3	
WH30-3	Oil Filter	3	
WH30-4	Close Nipple	3	
WH30-5	Gate Valve	3	
WH30-6	Hose - Filter to hopper drive pump	1	
WH30-7	Fitting - 90 Degree	3	
WH30-8	Surge Tube	1	
WH30-9	Fitting - Surge tube to hopper dr. pump	1	
WH30-10	o-ring	3	
WH30-11	Air Cylinder Bracket	1	Complete w/90° fitting
WH30-12	Fitting-90 degree	8	
WH30-13	O-Ring	8	
WH30-14	Steel line - Hopper drive	1	
WH30-15	Steel line - Hopper drive	1	
WH30-16	Air Cylinder	1	
WH30-17	Clevis - Air Cylinder	2	
WH30-18	Snap Ring	3	
WH30-19	Lever - Hopper Control	1	
WH30-20	Key - Woodruff	3	
WH30-21	Collar - Pump to triple drive gear head	3	Specify Hopper Size
WH30-22	Hydrostatic pump	3	
WH30-23	Flexible line- hopper drive	1	
WH30-24	Flexible line - Hopper drive	1	
WH30-25	Flange Kit - Motor Hose Connections	6	
WH30-26	Flexible Hose- Conveyor drive r.h.	2	
WH30-27	Hose- Filter to LH conveyor drive pump	1	
WH30-28	Hose- Filter to RH conveyor drive pump	1	
WH30-29	Steel lines - Conveyor drive	2	
WH30-30	Steel lines - Pump to Surge tube	2	
WH30-31	Lever - RH conveyor control	1	
WH30-32	Lever - LH conveyor control	1	
WH30-33	fitting case drain (motors)	1	
WH30-34	Hose case drain (Motors)	1	
WH30-35	Fitting tee to motor conveyor-motor	1	
WH30-36	Case drain left hand conveyor motor	1	
WH30-37	Case drain right hand conveyor-motor	1	
WH30-39	Fitting (O-Ring)	3	
WH30-40	Fitting (90°)	3	
WH30-41	Hose case drain-hopper	1	
WH30-42	Fitting 90°	1	
WH30-43	Steel line conveyor drive (L.H.)	1	
WH30-44	Steel line conveyor drive (R.H.)	1	
WH30-45	Flexible hose conveyor drive (R.H.)	2	

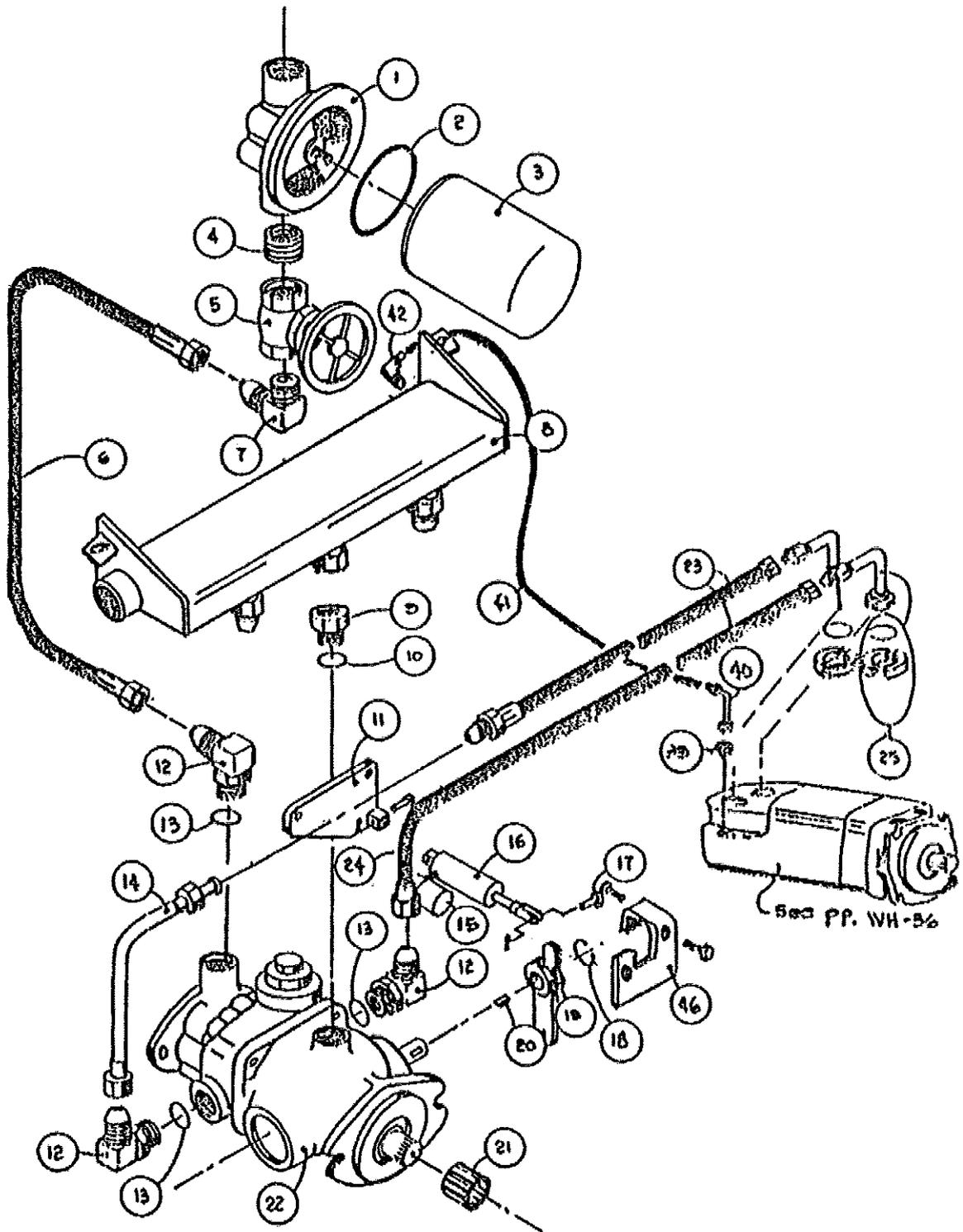
CONVEYOR DRIVE ASSEMBLY



CONVEYOR DRIVE ASSEMBLY

Part No.	DESCRIPTION	No. Reqd.	Remarks
WH30A-1	Oil Filter Housing	3	
WH30A-2	O-Ring Oil Filter	3	Comes with Filter
WH30A-3	Oil Filter	3	
WH30A-4	Clone Nipple	3	
WH30A-5	Gate Valve	3	
WH30A-6	Hose-Filter to hopper drive pump	1	
WH30A-7	Fitting - 90 Degree	3	
WH30A-8	Surge Tube		
WH30A-9	Fitting-Surge tube to hopper dr.	1	pump
WH30A-10	O-Ring	3	
WH30A-11	Air Cylinder Bracket	1	
WH30A-12	Fitting - 90 Degree	8	
WH30A-13	O-Ring	8	
WH30A-14	Steel line - Hopper drive	1	
WH30A-15	Steel line - Hopper drive	1	
WH30A-16	Air Cylinder	1	
WH30A-17	Clevis - Air Cylinder	2	
WH30A-18	Snap Ring	3	
WH30A-19	Lever - Hopper Control	1	
WH30A-20	Key -	3	
WH30A-21	Collar - Pump to triple drive gear	3	head
WH30A-22	Hydrostatic pump	3	
WH30A-23	Flexible line-Hopper drive	1	
WH30A-24	Flexible line-Hopper drive	1	
WH30A-25	Flange Kit-Motor Hase connections	6	complete w/90° fitting
WH30A-26	Flexible Hose-Conveyor Drive R.H.	2	
WH30A-27	Hose-Filter to LH conveyor dr. pump	1	
WH30A-28	Hose-Filter to RH conveyor dr. pump	1	
WH30A-29	Steel lines - conveyor drive	2	
WH30A-30	Steel lines - pump to surge tube	2	
WH30A-31	Lever-RH conveyor control	1	
WH30A-32	Lever LH conveyor control	1	
WH30A-33	Fitting case drain (motors)	1	
WH30A-34	Hose case drain (motors)	1	
WH30A-35	Fitting tee to motor conveyor-motor	1	
WH30A-36	Case drain Left Hand conveyor motor	1	
WH30A-37	Case drain Right Hand conveyor-	1	motor
WH30A-39	Fitting (O-Ring)	3	
WH30A-40	Fitting (90°)	3	
WH30A-41	Hose case drain-hopper	1	specify Hopper size
WH30A-42	Fitting 90°	1	
WH30A-43	Steel line conveyor drive (L.H.)	1	
WH30A-44	Steel line conveyor drive (R.H.)	1	
WH30A-45	Flexible hose conveyor drive (R.H.)	2	

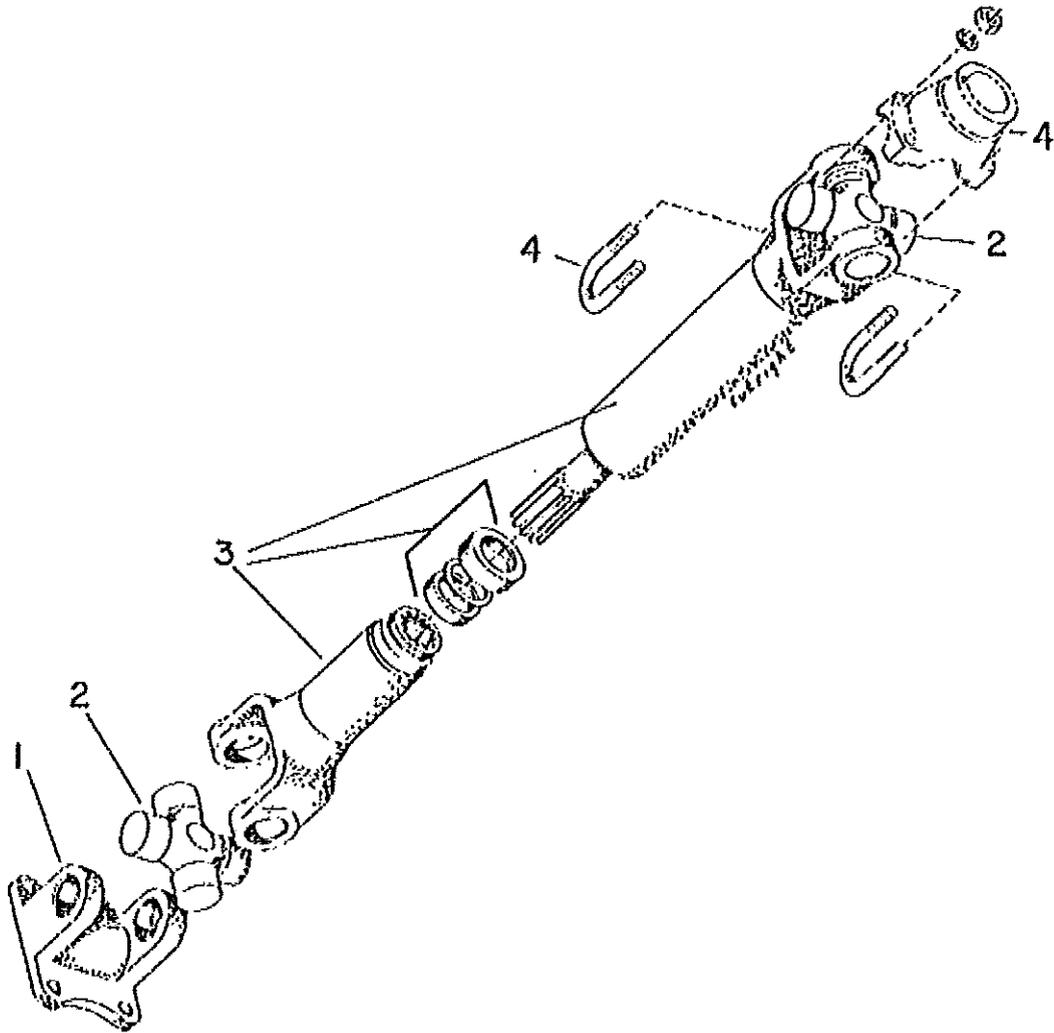
HOPPER DRIVE



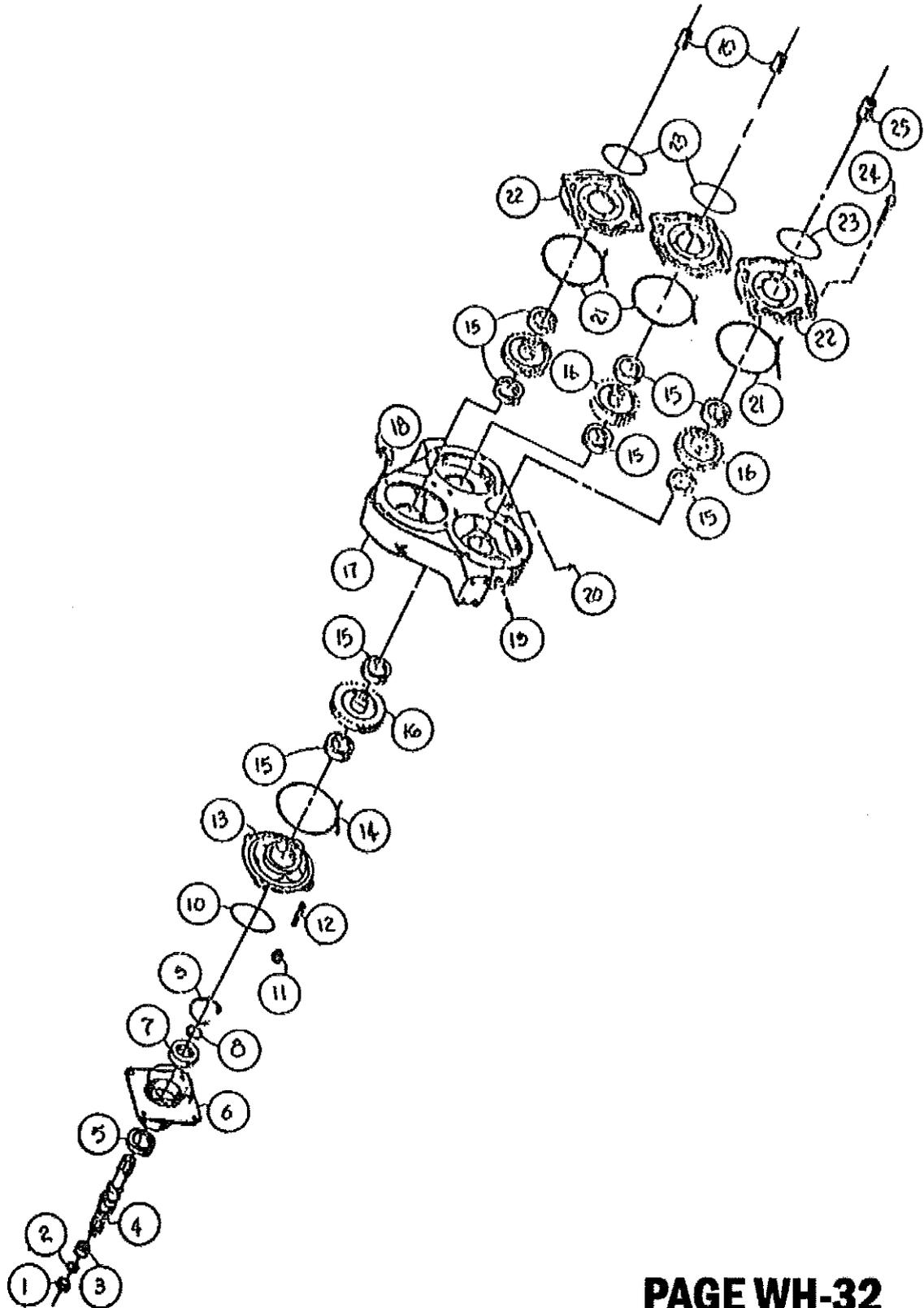
P. T. O. DRIVE SHAFT

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WHS30B-1	Yoke - Flanged	1	
WHS30B-2	Snap Ring & Cross Kit	2	
WHS30B-3	Slip Spline Assembly	1	
WHS30B-4	Yoke & U Bolts	1	
WHS30B-5	Shaft, Stub & Engine Drive Adaptor	1	Specify Engine
WHS30B-6	Bolt & L.W. - Engine Adaptor	4	Not Shown

P.T.O. DRIVE SHAFT



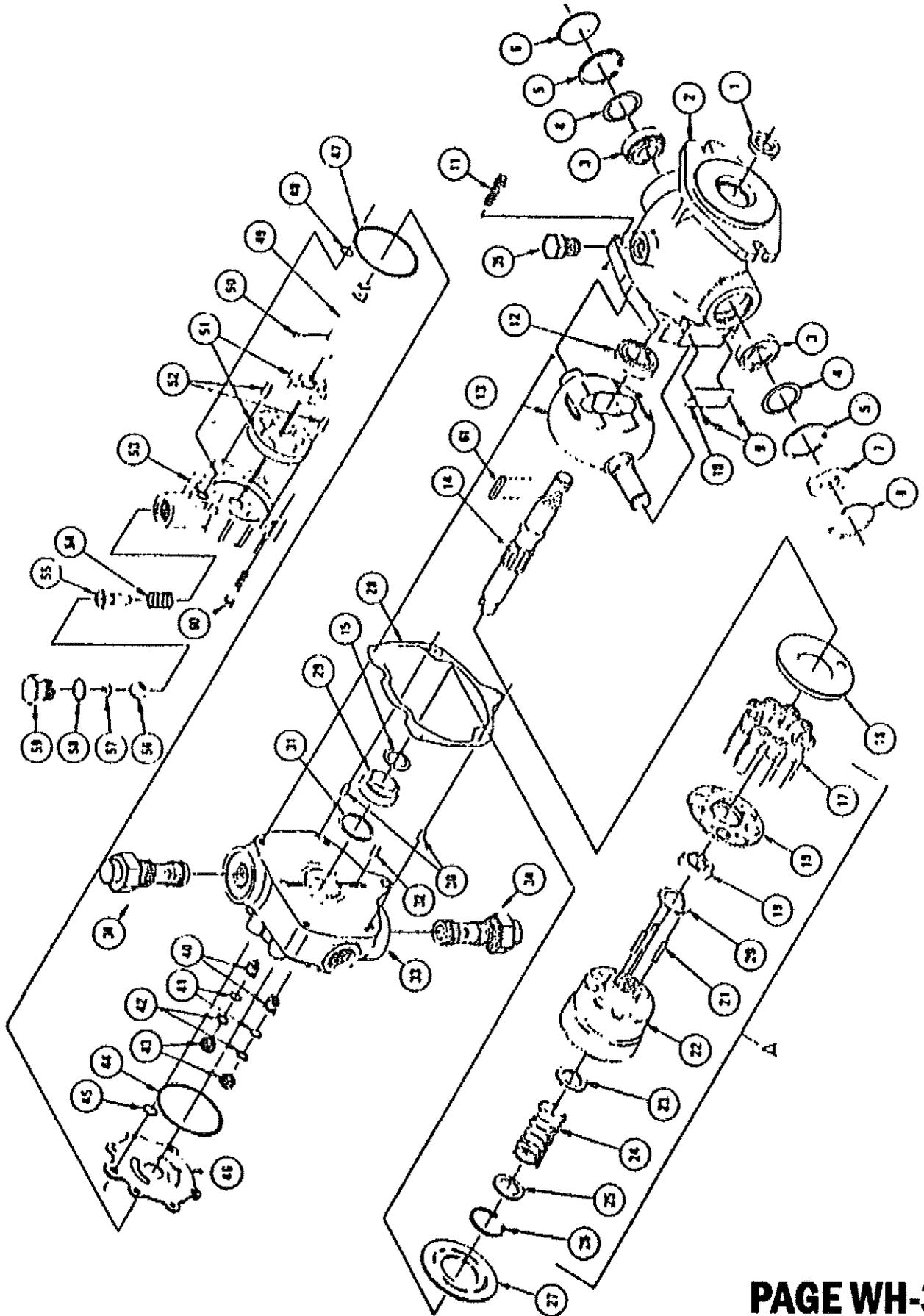
TRIPLE DRIVE GEAR HEAD ASSY.



HYDROSTATIC PUMP ASSEMBLY

Part No.	DESCRIPTION	No. Reqd.	Remarks
WH34-A	Rotating Group Subassembly	1	
WH34-1	Oil Seal	1	
WH34-2	Variable Housing	1	
WH34-3	Trunnion Bearing Housing	2	
WH34-4	Trunnion Bearing Shim	2	
WH34-5	Retaining Ring	2	
WH34-6	Wedge Plug	1	
WH34-7	Oil Seal	1	
WH34-8	Retaining Ring	1	
WH34-9	Drive Screw	2	
WH34-10	Name Plate	1	
WH34-11	Cap Screw	5	
WH34-12	Front drive shaft bearing kit	1	
WH34-13	Swashplate	1	
WH34-14	Drive Shaft	1	
WH34-15	Spacer	1	
WH34-16	Thrustplate	1	
WH34-17	Piston slipper subassembly	9	
WH34-18	Slipper retainer plate	1	
WH34-19	Guide Ball	1	
WH34-20	Spring thrust Washer	1	
WH34-21	Dowel	3	
WH34-22	Cylinder Barrel	1	
WH34-23	Spring Spacer	1	
WH34-24	Cylinder Barrel Spring	1	
WH34-25	Spring spacer	1	
WH34-26	Retaining Ring	1	
WH34-27	Al-Directional Valve Plate	1	
WH34-28	Variable Housing Gasket	1	
WH34-29	Head Drive Shaft Bearing Kit	1	
WH34-30	Dowel	1	
WH34-31	Drive Shaft Shim KIT	1	
WH34-32	Dowel	1	
WH34-33	End cover	1	
WH34-34	High Pressure Relief Valve S/A	2	
WH34-35	O'Ring Plug Subassembly	2	
WH34-40	Check Valve Assembly	2	
WH34-41	o'ring	2	
WH34-42	Backup Ring	2	
WH34-43	Check Valve Plug	2	
	See next page for remaining parts		

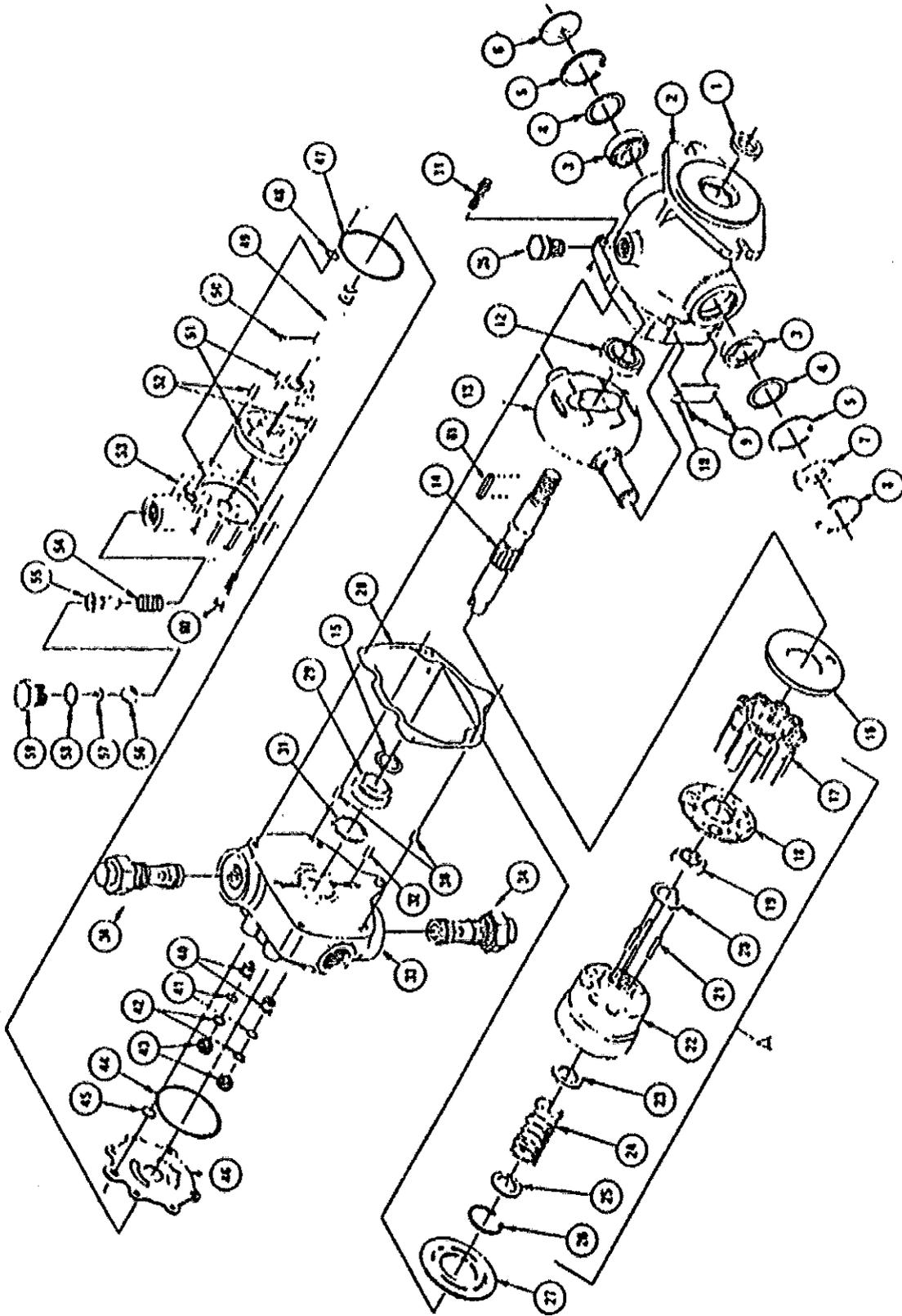
HYDROSTATIC PUMP ASSEMBLY



HYDROSTATIC PUMP ASSEMBLY

Part No.	DESCRIPTION	No. Reqd.	Remarks
WH34-44	O'Ring	1	
WH34-45	O'Ring	1	
WH34-46	Port Plate	1	
WH34-47	O'Ring	1	
WH34-48	O'Ring	1	
WH34-49	Charge pump shaft	1	
WH34-50	Drive Pin	1	
WH34-51	Gerotor Subassembly	1	
WH34-52	Dowel	2	
WH34-53	Charge Pump Housing	1	
WH34-54	Low Pressure Relief Valve Spring	1	
WH34-55	Low Pressure Relief Valve Seat	1	
WH34-56	Ball (grade 200)	1	
WH34-57	Low Pressure Relief Valve Shim	A/R	
WH34-58	O'Ring	1	
WH34-59	Low Pressure Relief Valve Cap	1	
WH34-60	Bolt Hex Head	4	
WH34-61	Key	1	
A - Includes item 17 thru 26			

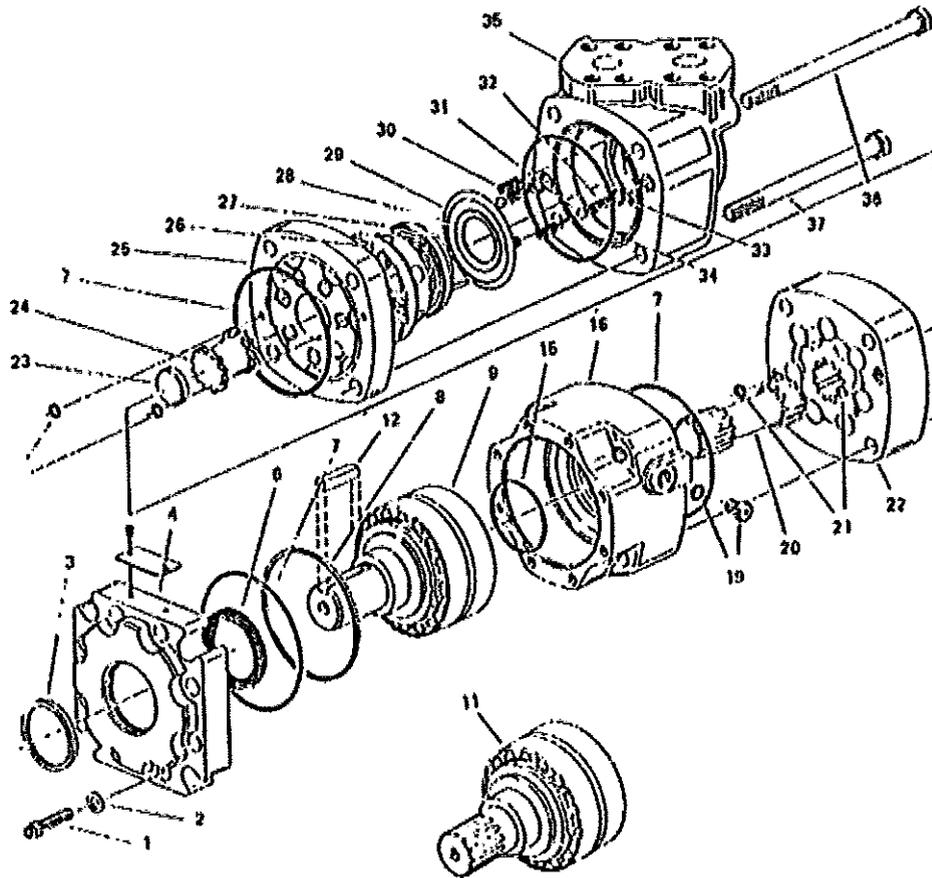
HYDROSTATIC PUMP ASSEMBLY



HYDROSTATIC MOTOR ASSEMBLY

Part No.	DESCRIPTION	No. Reqd.	Remarks
WH36-0	COMPLETE ASSY.	3	NOT SPLINED OR STRAIGHT SHAFT
WH36-1	Screw Cap	8	
WH36-2	Washer	8	
WH36-3	Seal Dust	1	
WH36-4	Retainer Front	1	
WH36-6	Seal Shaft	1	
WH36-7	Seal	3	
WH36-8	Spacer Kit	1	
WH36-9	Shaft straight , and Bearing Kit	1	
WH36-11	Shaft Splined , and Bearing Kit	1	
WH36-12	Key	1	
WH36-15	Seal	1	
WH36-16	Housing, Bearing	1	
WH36-19	Plug Assembly	2	
WH36-20	Drive	1	
WH36-21	Seal	4	
WH36-22	Geroler	1	
WH36-23	Spacer, Geroler	1	
WH36-24	Drive Valve	1	
WH36-25	Plate Valve	1	
WH36-26	Valve	1	
WH36-27	Plate, Balance Assembly	1	
WH36-28	Seal, Face, Inner	1	
WH36-29	Seal, Face, Outer	1	
WH36-30	Spring	3	
WH36-31	Ball, Steel	2	
WH36-32	Spring	2	
WH36-33	Seal	2	
WH36-34	Seal	1	
WH36-35	Housing	1	
WH36-36	Bolt	2	
WH36-37	Bolt	2	
WH36-38	Seal Kit, Motor Rear		
WH36-39	Seal Kit, Shaft		

HYDROSTATIC MOTOR ASSEMBLY



FRONT HOPPER

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W38-1	Hopper	1	Specify Size
W38-2	Guard - Chain	1	
W38-3	Pin - Chain Guard	1	
W38-4	Hinge Pin - Chain Guard	2	Welded In Place
W38-5	Baffle	2	
W38-6	Shaft - Main Gate Control	1	Specify Size
W38-7	Lever - Gate Control Shaft	1	Welded to Shaft
W38-8	Clevis - Reach Rod	1	
W38-9	Pin - Reach Rod Clevis	1	
W38-10	Cotter Pin - Reach Rod Clevis	1	
W38-11	Rod - Adjusting W/Jam Nut	1	
W38-12	Reach Rod - Gate Control Lever	1	
W38-13	Hinge Pin - Radial Gates	2	Specify Hopper
W38-20	Pins-Radial Gate Hinge Retaining	2	
W38-21	Frame - Spread Screen	1	Specify Hopper
W38-22	Bolt-Spread Screen Frame Mounting	2	
W38-23	Nut & L.W.-Frame Mounting Bolt	2	
W38-24	Bolt - Spread Screen Adjusting	2	
W38-25	Nut & L.W.-Spread Screen Adj. Bolt	2	
W38-26	Screen - Lower Spread	1	Specify Hopper
W38-45	Pin-Clevis, Gate Adj. Rod	*VAR.	*See W38-44
W38-46	Cotter Pin - Clevis	*VAR.	*See W38-44
	<p>Note: All parts on this page, the left and right hands are determined from the front of the machine.</p>		

FRONT HOPPER

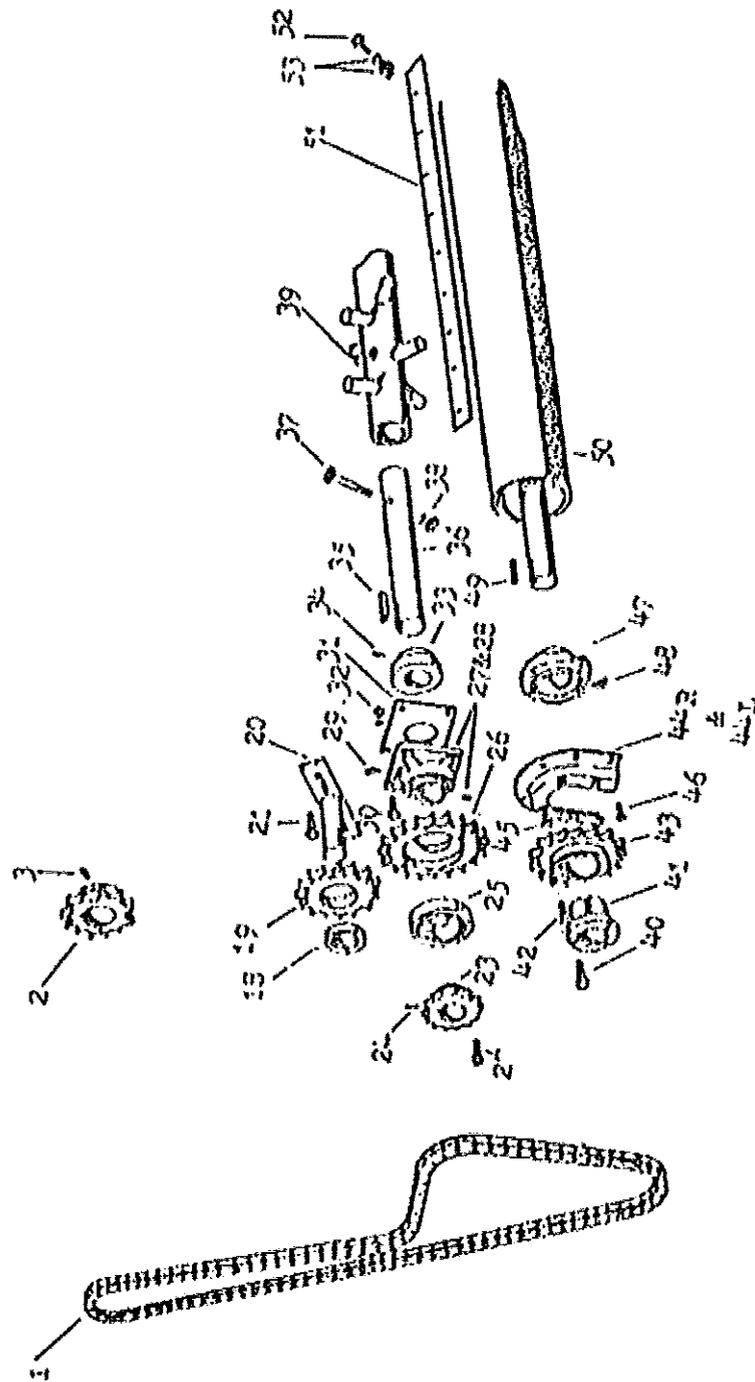
The following parts vary in their requirements according to hoppers

Part No.	Description	Hoppers Size & Parts REQD.							
		10'6"	11'6"	12'6"	13'6"	14'6"	15'6"	16'	
W38-27	Bearing - Gate Control	3	3	4	4	4	4	4	4
W38-28	Fitting - Brg. Lubrication	3	3	4	4	4	4	4	4
W38-29	Bolt - Brg. Mounting	6	6	8	8	8	8	8	8
W38-30	Nut & L.W. - Brg. Bolt	6	6	8	8	8	8	8	8
W38-31	Set Screw - Bearing	3	3	4	4	4	4	4	4
W38-32	Spring - Gate Latch Assy.	15	15	17	19	19	20	20	20
W38-33	Screen - Grizzly 12X30	2	2	2	2	2	2	2	2
W38-33A	Screen - Grizzly 18X30		2	2	2	2	2	2	2
W38-33B	Screen - Grizzly 45X30			2					
W38-33C	Screen - Grizzly 50X30	2	2						
W38-33D	Screen - Grizzly 56X30					2			
W38-33E	Screen - Grizzly 62X30						2		
W38-33F	Screen - Grizzly 64X30							2	
W38-34R	Gate - Radial, 6" R.H.	2	3	4	5	4	5	4	2
W38-34L	Gate - Radial, 6" L.H.	3	4	5	6	5	6	4	4
W38-35R	Gate - Radial, 12" R.H.	3	3	3	3	4	4	4	5
W38-35L	Gate - Radial, 12" L.H.	3	3	3	3	4	4	4	5
W38-36	Gate - Radial, 12" Center	2	2	2	2	2	2	2	2
W38-37	Gate Latch Assembly	15	15	17	19	19	20	20	20
W38-38	Knob - Gate Latch Assembly	15	15	17	19	19	20	20	20
W38-39	Lock - Gate Open	15	15	17	19	19	20	20	20
W38-40	Set Screw - Gate Open Lock	15	15	17	19	19	20	20	20
W38-41	Lock - Gate Closed (welded)	15	15	17	19	19	20	20	20
W38-42	Rod - Gate Adjusting	15	15	17	19	19	20	20	20
W38-43	Rod - Clevis W/Jam Nut	15	15	17	19	19	20	20	20
W38-44	Clevis - Adjusting Rod	15	15	17	19	19	20	20	20

SPPOCKET & HOPPER DRIVE

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
	<u>NOTE:</u> Hopper parts are left & right from the front of the machine.		
W40-1	Chain - Roll & Auger Drive	1	
W40-2	Sprocket - Hopper Drive	1	
W40-3	Set Screw - Hopper Dr. Sprocket	1	
W40-5	Key Sprocket	1	
W40-10	Motor (See Page WHS-36)	1	
W40-18	Bearing - Idler Sprocket	1	
W40-19	Idler Sprocket	1	
W40-20	Shaft - Idler Sprocket	1	
W40-21	Screw & L.W. - Idler Spk. Shaft	2	
W40-22	Screw - Freewheel Sprk. Locking	2	
W40-23	Sprocket - Auger Drive	1	
W40-24	Set Screw - Auger Dr. Sprk.	1	
W40-25	Bearing - Freewheel Sprocket	1	
W40-26	Sprocket - Freewheel	1	
W40-27	Bearing - Auger Stub Shafts	2	
W40-28	Set Screw - Auger Shaft Bearings	2	
W40-29	Fittings - Bearing Lub.	2	
W40-30	Bolt - Bearing Mounting	8	
W40-31	Wear Plate - Fixed	2	
W40-32	Nut & L.W. - Bearing & Plate Mount	8	
W40-33	Wear Collar - Auger	2	
W40-34	Set Screw - Auger Wear Collar	2	
W40-35	Key-RT, Hand stub Shaft	1	
W40-36R	Shaft - Auger Stub-R.H. (Keyed)	1	
W40-36L	Shaft - Auger Stub L.H. (Plain)	1	
W40-37	Bolt - Auger	2	
W40-38	Nut & L.W. - Auger Bolt	2	
W40-39	Auger	1	
W40-40	Bolt - Taper Lock to Roll Sprk.	3	
W40-41	Taper Lock-Spread Roll To Sprk.	1	
	Continued To Next Page.....		

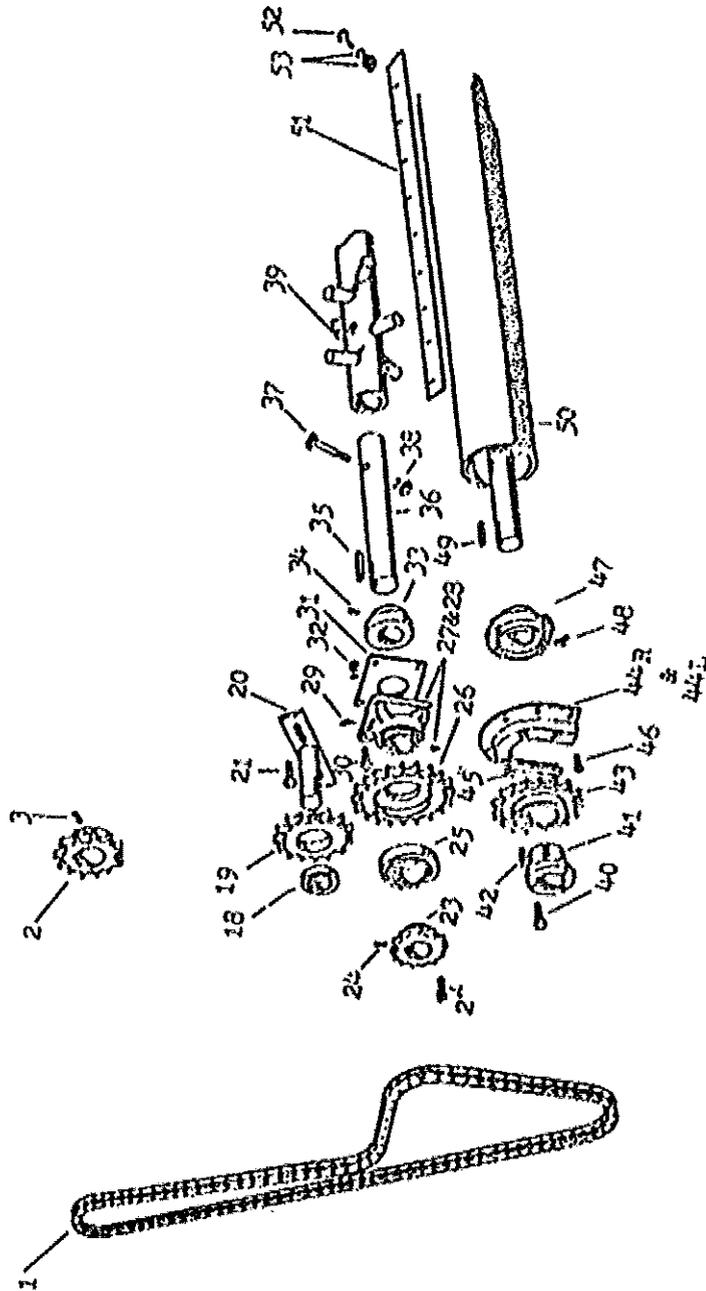
SPROCKET HOPPER DRIVE



SPROCKET & HOPPER DRIVE

PART NO	DESCRIPTION	NO. REQD.	REMARKS
W 40-42	Key - Taper Lock to Roll Sprocket.	1	
W 40-43	Sprocket - Spread Roll	1	8 OP 18
W 40-44R	Shield - Spread Roll - Right Hand	1	See Note Above
W 40-44L	Shield - Spread Roll - Left Hand	1	" " "
W 40-45	Screw - Bearing Mount	8	
W 40-46	Bolt & L.W. - Shield Mounting	12	
W 40-47	Bearing - Spread Roll	2	
W 40-48	FILLING - Bearing Lubrication	2	
W 40-49	Key-Roll to Taper Lock	1	
W 40-50	Spread Roll (Integral Shaft)	1	Specify Hopper
W 40-51	Seal - Spread Roll	1	Specify Hopper
W 40-52	Bolt - Seal Retaining	Var.	22 - 16 ft.
W 40-53	Nut & L.W. - Seal Retaining	Var.	22 - 16 ft.

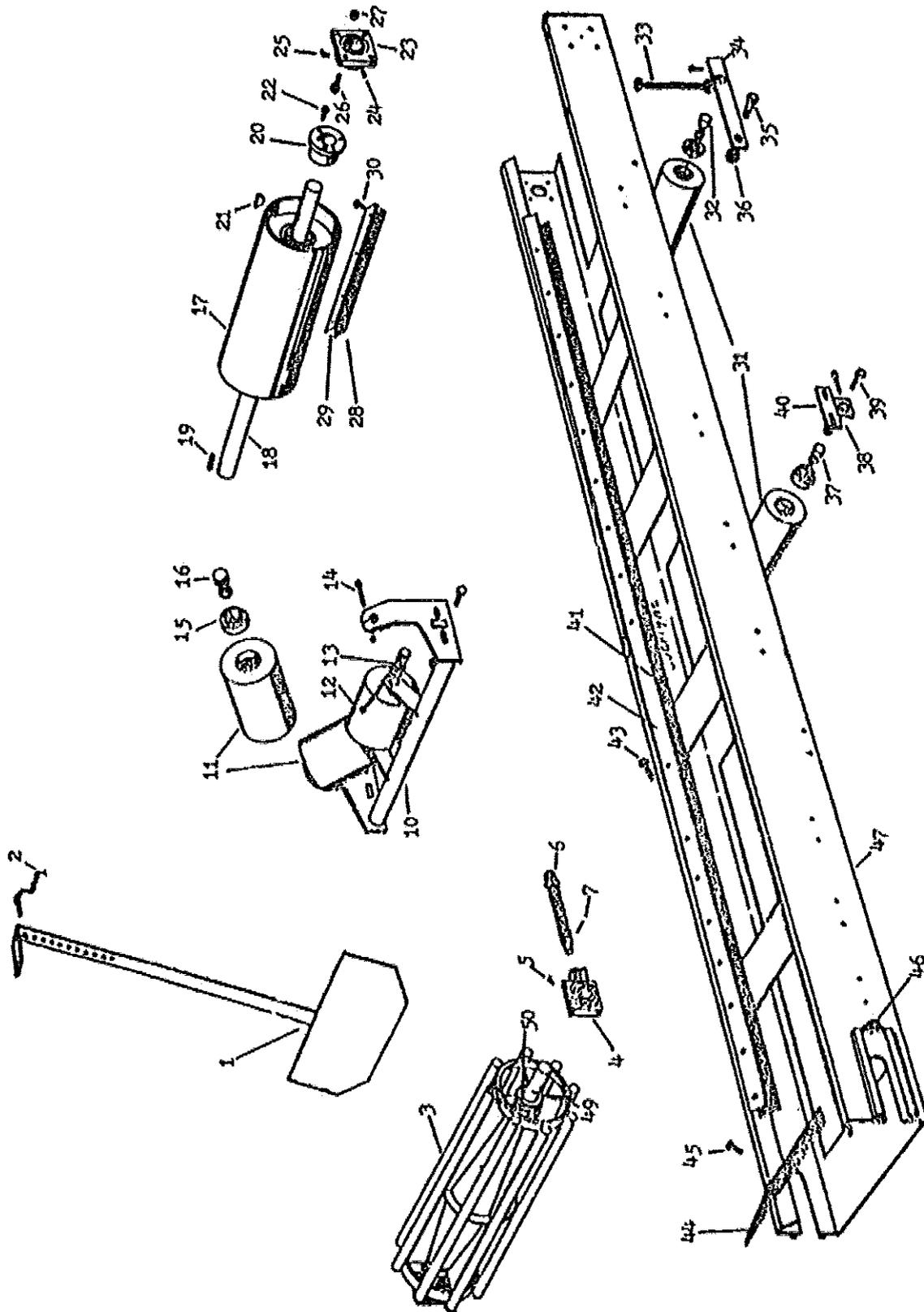
SPROCKET AND HOPPER DRIVE



CONVEYOR

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W42-1	Control Gate - Rear Hopper	2	
W42-2	Pin Assy. - Control Gate Position	2	
W42-3	Tail Pulley - Self - Cleaning	2	
W42-4	Bearing - Tail Pulley Adjustable	4	
W42-5	Fitting - Tail Pulley Brg. Lub.	4	
W42-6	Screw - Tail Pulley Adjustable	4	
W42-7	Pin - Tail Pulley Adj. Screw	4	
W42-10	Frame - Troughing Idler	14	
W42-11	Roll- End, Troughing Idler	28	
W42-12	Roll- Middle, Troughing Idler	14	
W42-13	Shaft - Center	28	
W42-14	Screw & Jam Nut Assy-Shaft	68	
W42-15	Bearing - Idler Roll	108	
W42-16	End Shaft - Troughing Idler	28	
W42-17	Head Pulley	2	
WH42-18	Shaft-Head Pulley	2	
W42-19	Key-Head Pulley Shaft	2	
W42-20	Taper Lock - Head Pulley Shaft	4	
W42-21	Key-Taper Lock to Head Pulley	4	
W42-22	Bolt & L.W. - Lock to Head Pulley	12	
W42-23	Bearing - Head Pulley Shaft	4	
W42-24	Set Screw - Head Pulley Bearing	4	
W42-25	Fitting - Head Pulley Bearing	4	
W42-26	Bolt-Head Pulley Mounting	16	
W42-27	Nut & L.W-Head Pulley Bolt	16	
W42-28	Lagging - Head Pulley Cleaning	2	
W42-29	Bracket - Head Pulley Lagging	2	
W42-30	Bolt & L.W. - Head Pulley Lagg	8	
W42-31	Roll - Idler	6	
W42-32	End Shaft - Tightener Idler	4	
W42-33	Bolt Assy. -Tightener Idler Adj.	4	
W42-34	Mount - Tightener Idler	4	
W42-35	Bolt-Hinging Tightener Idler	4	
W42-36	Nut-Tightener Idler Mount	4	
W42-37	End Shaft - Idler Roll	8	
W42-38	Mount - Idler Rolls	8	
W42-39	Bolt - Roll Mounting	72	
W42-40	Nut & L.W - Roll Mounting	72	
W42-41	Lagging - Conveyor Side	4	
W42-42	Strip - Lagging Holdown	4	
W42-43	Bolt & L.W. - Lagging Strip	68	
W42-44	Lagging - Conveyor End	2	
W42-45	Bolt-Conveyor End Lagging	6	
W42-46	Nut-Tail Pulley Adj. Bolt	4	
W42-47	Frame Conveyor	2	
W42-48	Belt Assembly - Conveyor	2	
W42-49	Shaft-Tail Pulley	2	
W42-50	Set Screw - Tail Pulley Shaft	4	

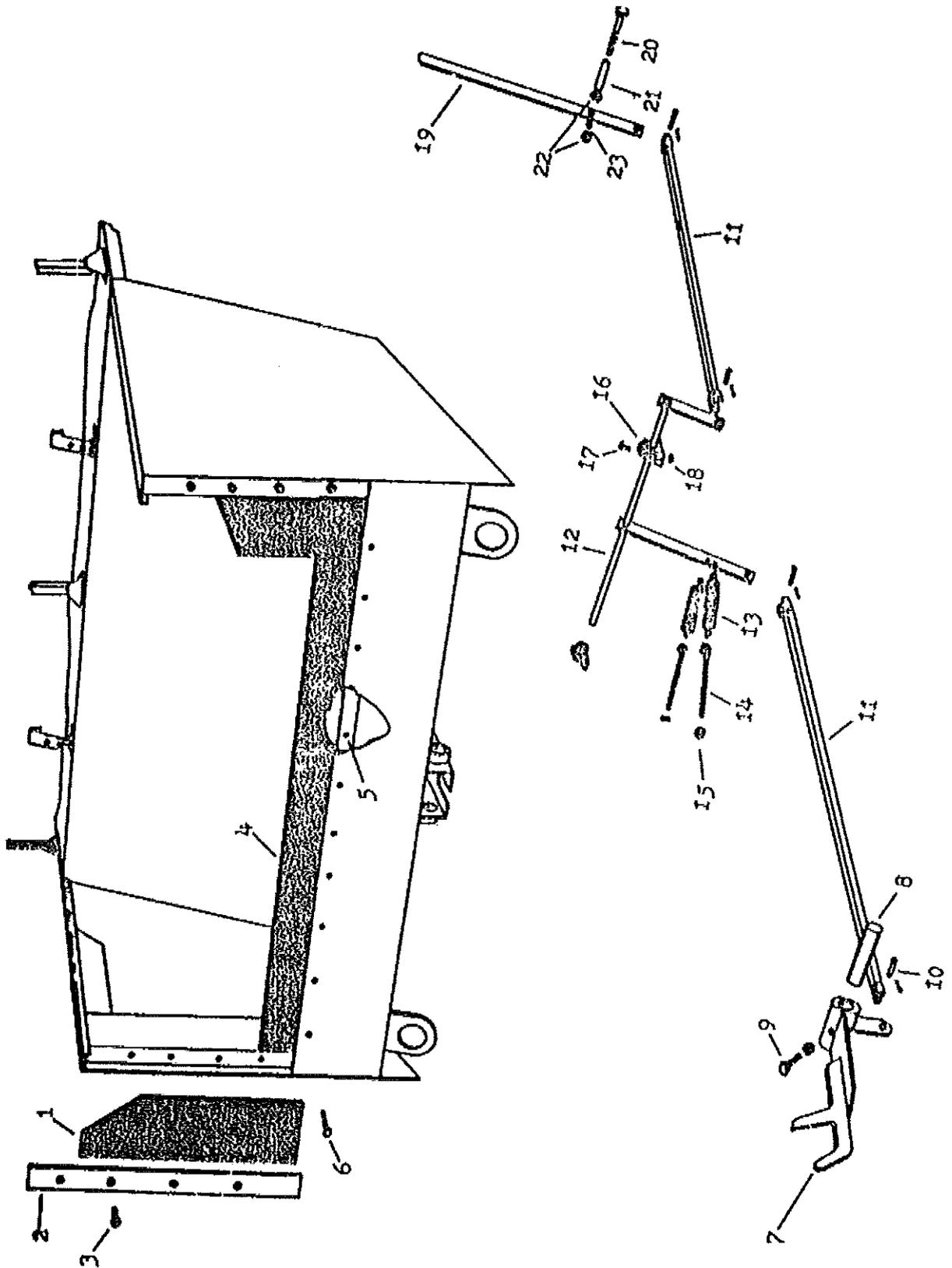
CONVEYOR



REAR HOPPER TRUCK HITCH

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W44-1	Seal, Rubber - Vertical	2	
W44-2	Attachment Strip - Vertical Seal	2	
W44-3	Capscrew & L.W. - Vertical Strip	8	
W44-4	Seal, Rubber - Horizontal	1	
W44-5	Attachment Strip - Horizontal Seal	1	
W44-6	Bolt, Nut & L.W. - Horizontal Strip	11	
W44-7	Truck Hitch	1	
W44-8	Hinge Pin - Truck Hitch	1	
W44-9	Bolt & Lock Nut - Hitch Hinge Pin	1	
W44-10	Clevis Pin & Key - Reach Rod	4	
W44-11	Reach Rod - Truck Hitch Control	2	
W44-12	Cross Shaft Assembly-Truck Hitch Cont.	1	
W44-13	Spring - Return, Truck Hitch	2	
W44-14	Adjuster - Return Spring	2	
W44-15	Nut Adjuster	2	
W44-16	Bearing - Cross Shaft	2	
W44-17	Bolt - Bearing Mounting	4	
W44-18	Nut & L.W. - Bearing Mounting	4	
W44-19	Lever - Truck Hitch Control	1	
W44-20	Bolt - Lever Hinging	1	
W44-21	Tube - Lever Hinging	1	Welded in Place
W44-22	Nut - Hinging Bolt	2	
W44-23	Lockwasher - Hinging Bolt	1	

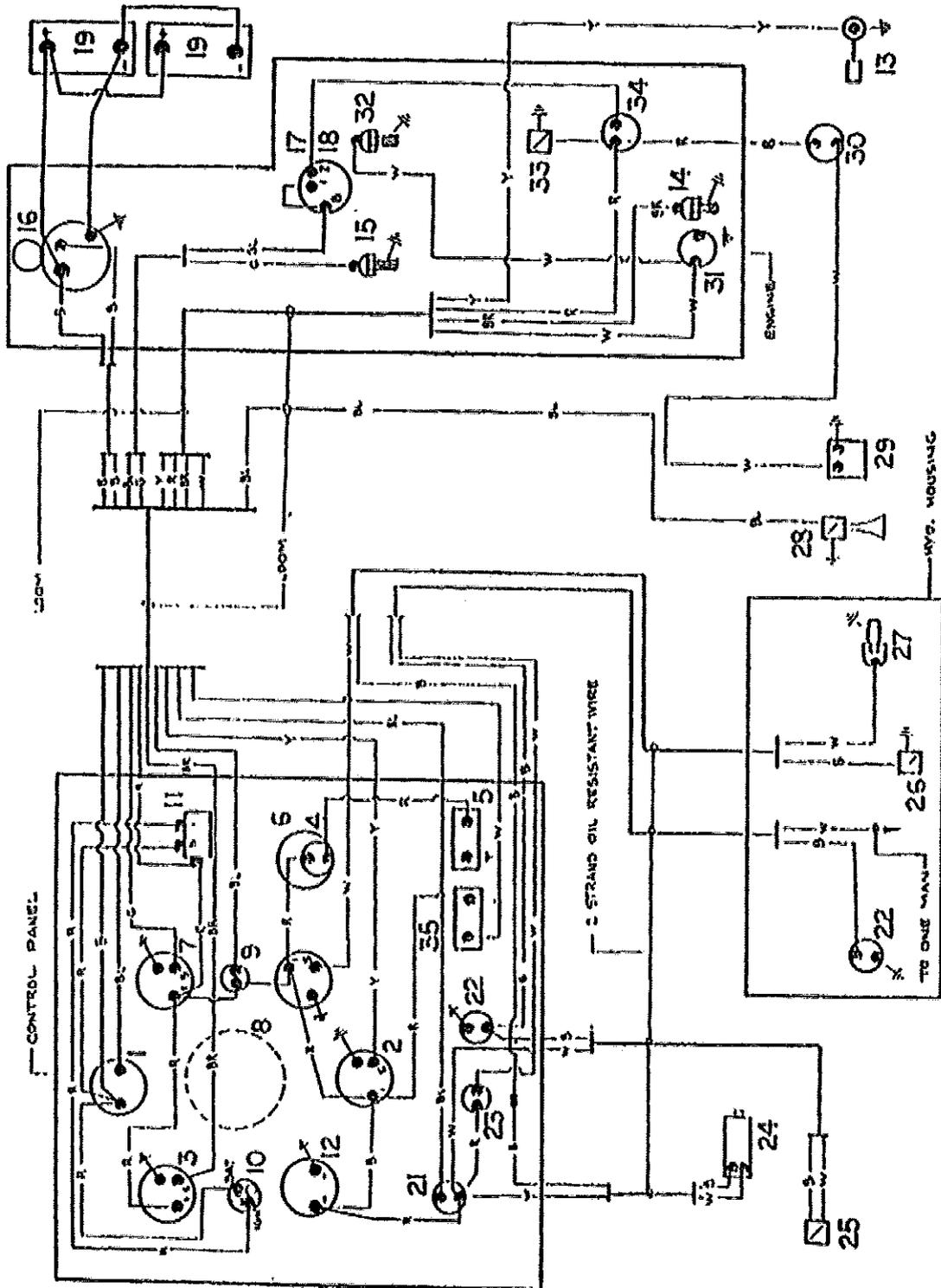
REAR HOPPER & TRUCK HITCH



WIRING DIAGRAM DIESEL ENGINE

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W46-1	Gage - Ammeter	1	
W46-2	Gage - Fuel	1	
W46-3	Gage - Oil Pressure	1	
W26-4	Switch - Lower Air	1	
W26-5	Buzzer - Lower Air	1	
W26-6	Gage - Air Pressure	1	
W46-7	Gage - Water Temperature	1	
W46-8	Gage - Tachometer (Mechanical)	1	
W46-9	Switch - Starter	1	
W46-10	Switch - Ignition	1	
W46-11	Relay	1	
W46-12	Gage - Hourmeter	1	
W46-13	Sender and Float - Fuel	1	
W46-14	Sender - oil Pressure	1	
W46-15	Sender - Water Temp.	1	
W46-16	Solenoid - Starter	1	See Engine MFG.
W46-17	Regulator - Voltage	1	See Engine MFG.
W46-18	Alternator	1	See Engine MFG.
W46-19	Battery	2	
W46-20	Tachometer Cable	1	Not Shown
W46-21	Button - Horn	1	
W46-22	Button - Truck Hitch	1	
W46-23	Switch - One Man Control	1	
W46-24	Limit Switch - Front Hopper	1	
W46-25	Solenoid - Truck Hitch	1	
W46-26	Solenoid - Hopper Pump	1	
W46-27	Sender - Hyd. Oil, Temp.	1	
W46-28	Solenoid - Horn	1	
W46-30	Switch - Back Up Alarm	1	
W46-31	Sender - Oil Warning	1	
W46-32	Sender - Water Temp Warning	1	
W46-33	Solenoid - Fuel	1	See Engine MFG.
W46-34	Switch - Alternator - Oil	1	See Engine MFG.
W46-35	Buzzer - Warning System	1	

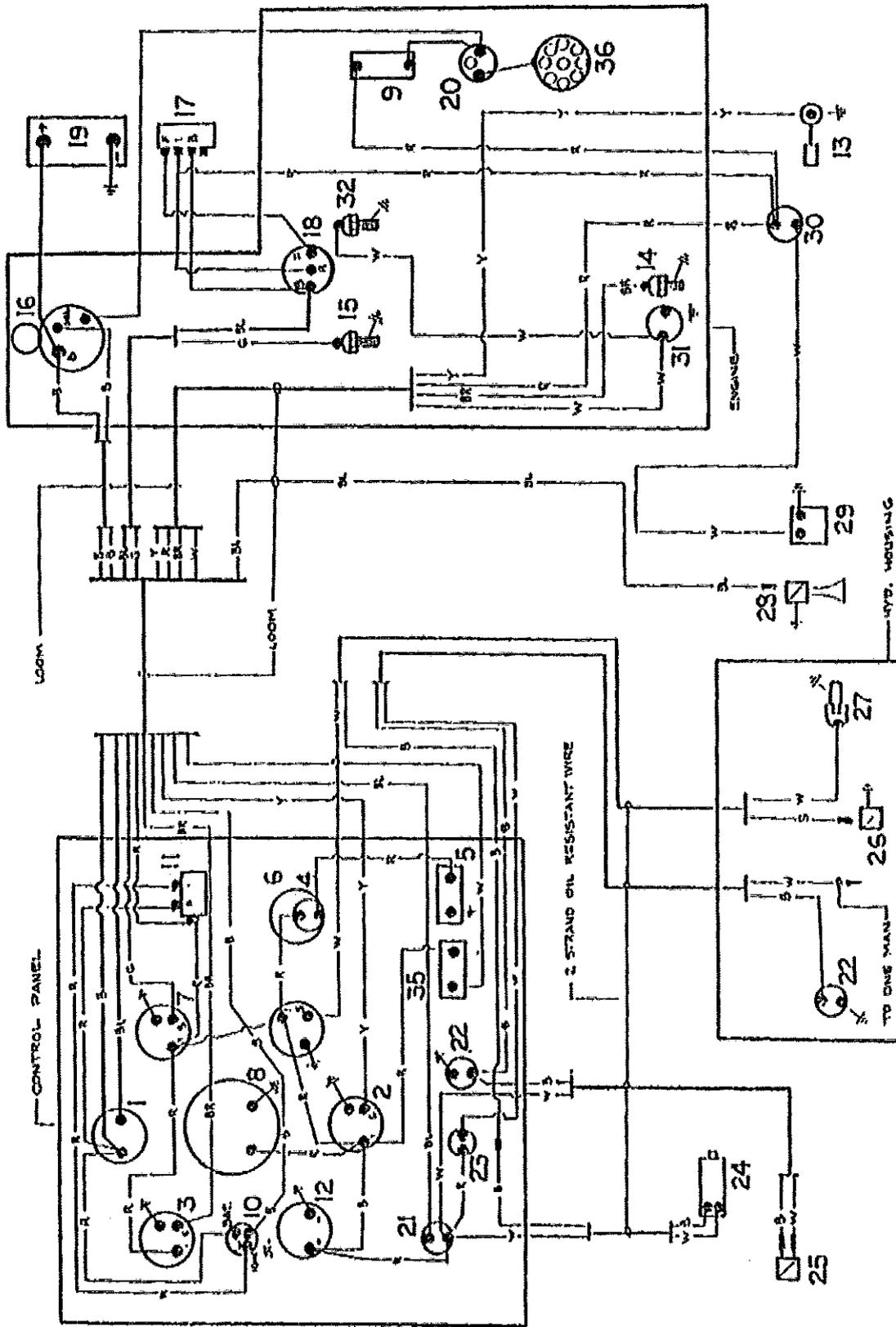
WIRING DIAGRAM DIESEL ENGINE



WIRING DIAGRAM GAS ENGINE

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W46-1	Gage - Ammeter	1	
W46-2	Gage - Fuel	1	
W46-3	Gage - Oil Pressure	1	
W26-4	Switch - Low Air	1	
W26-5	Buzzer - Low Air	1	
W26-6	Gage - Air Pressure	1	
W46-7	Gage - Water Temp.	1	
W48-8	Gage - Tachometer (Electric)	1	
W48-9	Resistor - Ignition	1	
W46-10	Switch - Ignition	1	
W46-11	Relay	1	
W46-12	Gage - Hour	1	
W46-13	Sender and Float - Fuel	1	
W46-14	Sender - Oil Pressure	1	
W46-15	Sender - Water Temp.	1	
W48-16	Solenoid - starter	1	See Engine MFG.
W48-17	Regulator - Voltage	1	See Engine MFG.
W48-18	Alternator	1	See Engine MFG.
W46-19	Battery	1	
W48-20	Coil - Ignition	1	See Engine MFG.
W48-21	Button - Horn	1	
W46-22	Button - Truck Hitch	2	
W46-23	Switch - One Man Control	1	
W46-24	Limit Switch - Front Hopper	1	
W46-25	Solenoid - Truck Hitch	1	
W46-26	Solenoid - Hopper Hitch	1	
WH46-27	Sender - Hyd. Oil, Temp.	1	
W46-28	Solenoid - Horn	1	
WH46-29	Backup Alarm	1	
WH46-30	Switch - Back Up Alarm	1	
WH46-31	Sender - Oil Warning	1	
WH46-32	Sender - Water Temp. Warning	1	
WH46-35	Buzzer - Warning System	1	
W46-36	Distributor	1	See Engine MFG.

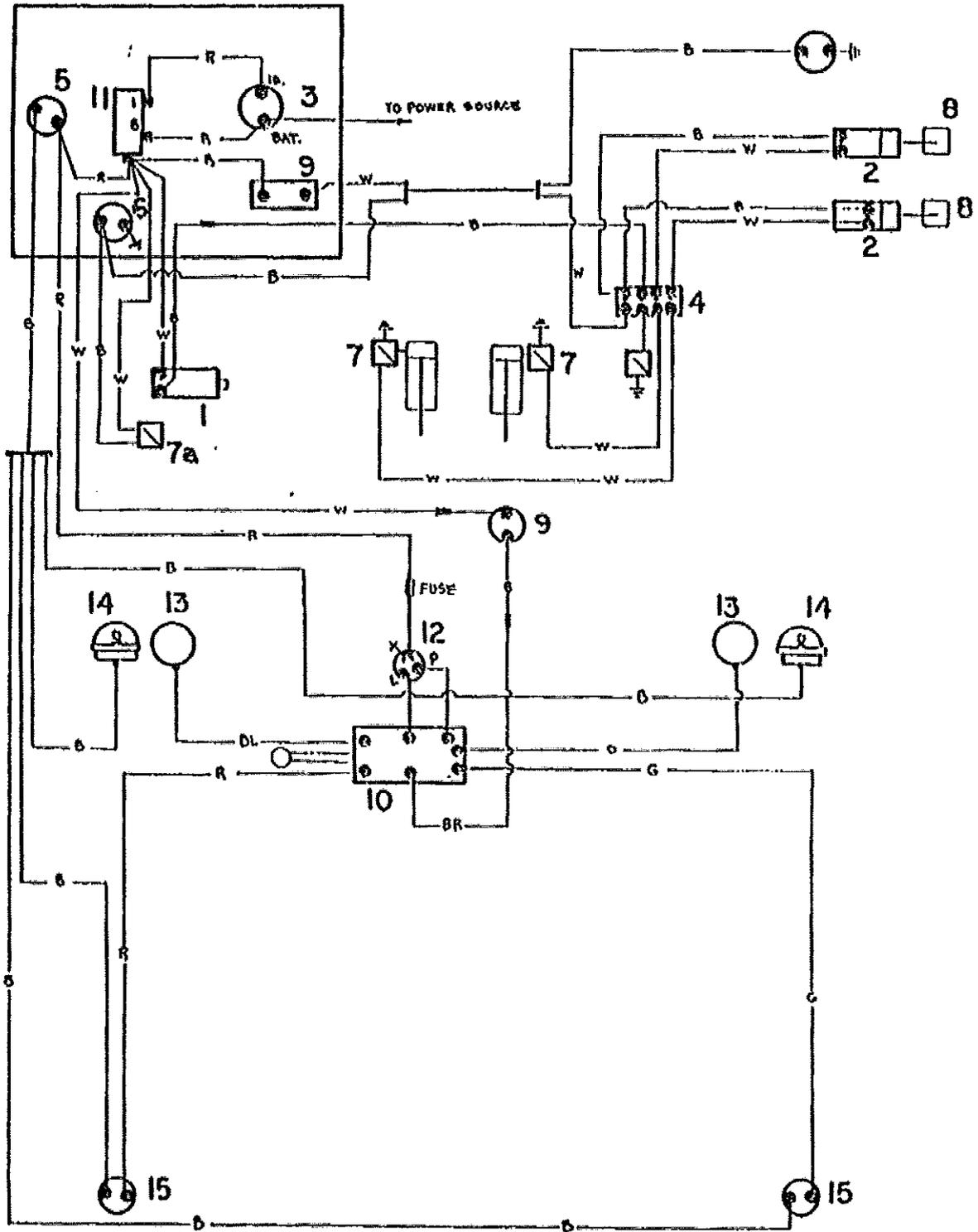
WIRING DIAGRAM GAS ENGINE



WIRING DIAGRAM ONE MAN AND LIGHTS

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
W50-1	Switch - Limit	1	See W46-24
W50-2	Switch - Limit	2	
WH50-3	Switch - Ignition	1	See W46-10
W50-4	Bus Bar	1	
WH50-5	Switch - Lights	1	
WH50-6	Bottom - Truck Hitch	1	See W46-22
W50-7	Solenoid - Air Cylinder	2	
W50-7a	Solenoid - Truck Hitch	1	
W52-8	Arm - Switch Actuating	2	
W52-9	Switch - One Man	1	See W46-23
WH50-10	Switch - Flashers	1	
W46-11	Relay	1	
WH50-12	Flasher - 3 Prong - W/Pigtails	1	
WH50-13	Light - Front Flasher	2	
WH50-14	Light - Head	2	
WH50-15	Light - Tail and Rear Flasher	2	

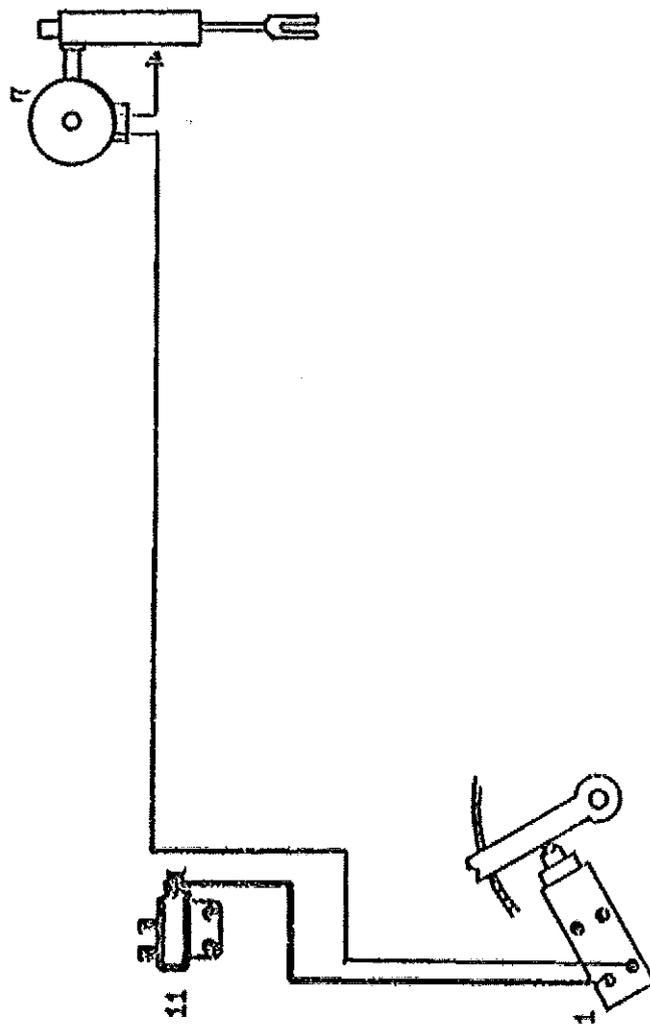
WIRING DIAGRAM ONE MAN & LIGHTS



WIRING DIAGRAM AIR CYLINDER

Part No.	DESCRIPTION	No. Reqd.	Remarks
W50-1	Switch - Limit	1	
W50-7	Solenoid - Air Cylinder	1	
W50-11	Relay	1	

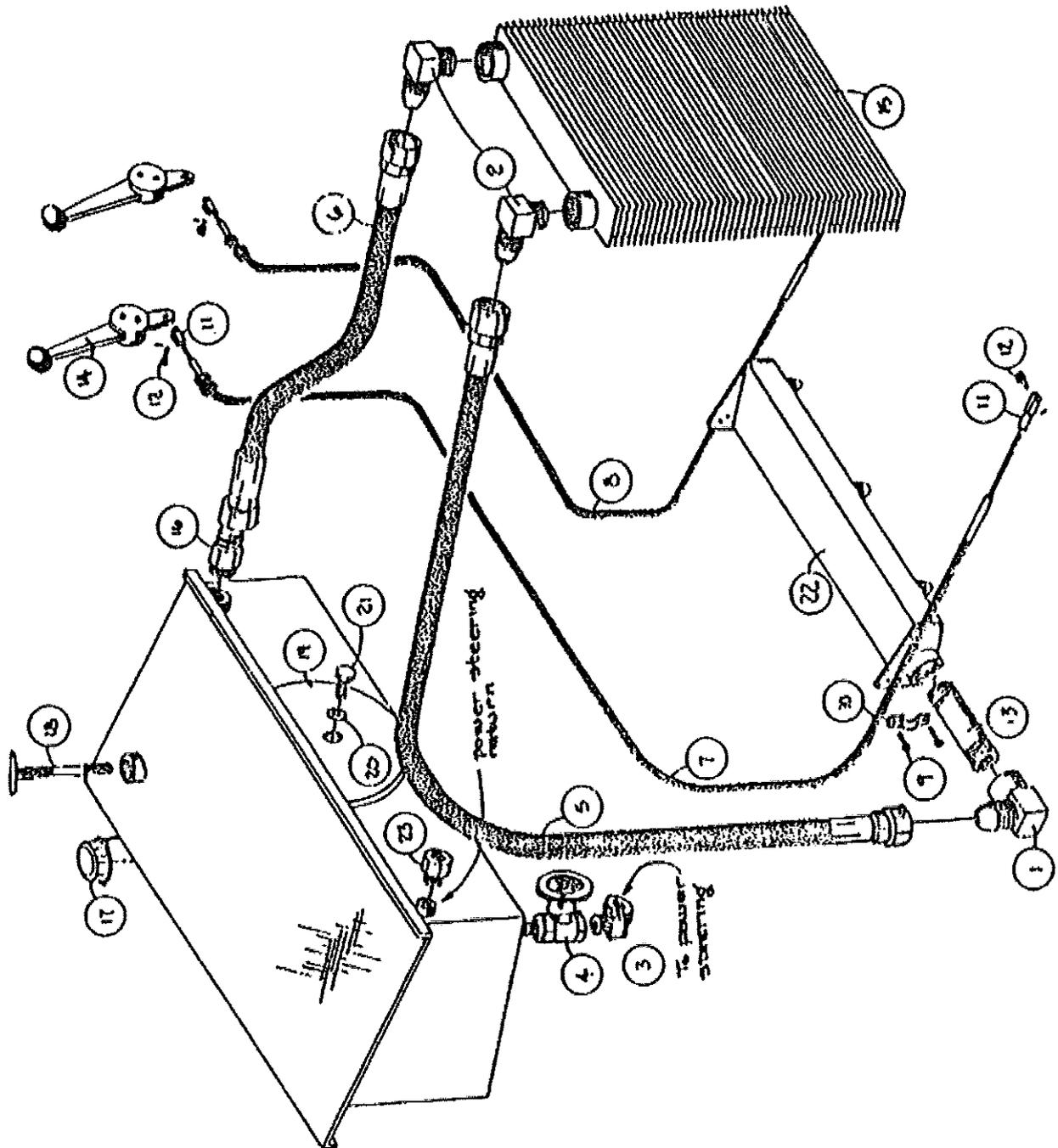
WIRING DIAGRAM AIR CYLINDER



OIL COOLER, OIL TANK & CONTROLERS

Part No.	DESCRIPTION	No. Reqd.	Remarks
WH54-1	Fitting - 90 degree surge tube	1	
WH54-2	Fitting - 90 degree oil cooler	2	
WH54-3	Fitting - 90 degree power steering	1	
WH54-4	Gate Valve - Power steering	1	
WH54-5	Hose - Surge tube to oil cooler	1	
WH54-6	Hose - Oil cooler to oil tank	1	
WH54-7	Control Cable - LH conveyor	1	
WH54-8	Control Cable - RH Conveyor	1	
WH54-9	Clamp Control cable	2	
WH54-11	Clevis - Control cable	4	
WH54-12	Clevis pin - Control cable	4	
WH54-13	Pipe - Surge Tube	1	
WH54-14	Controller	2	
WH54-15	Hydraulic oil Cooler	1	
WH54-16	Fitting- Cooler return	1	
WH54-17	Fill cap - Hydraulic tank	1	
WH54-18	Magnetic dip stick	1	
WH54-19	Inspection cover	1	
WH54-20	Cover bolt Gasket	1	
WH54-21	Cover bolt	1	
WH54-22	Fitting - Power steering return	1	

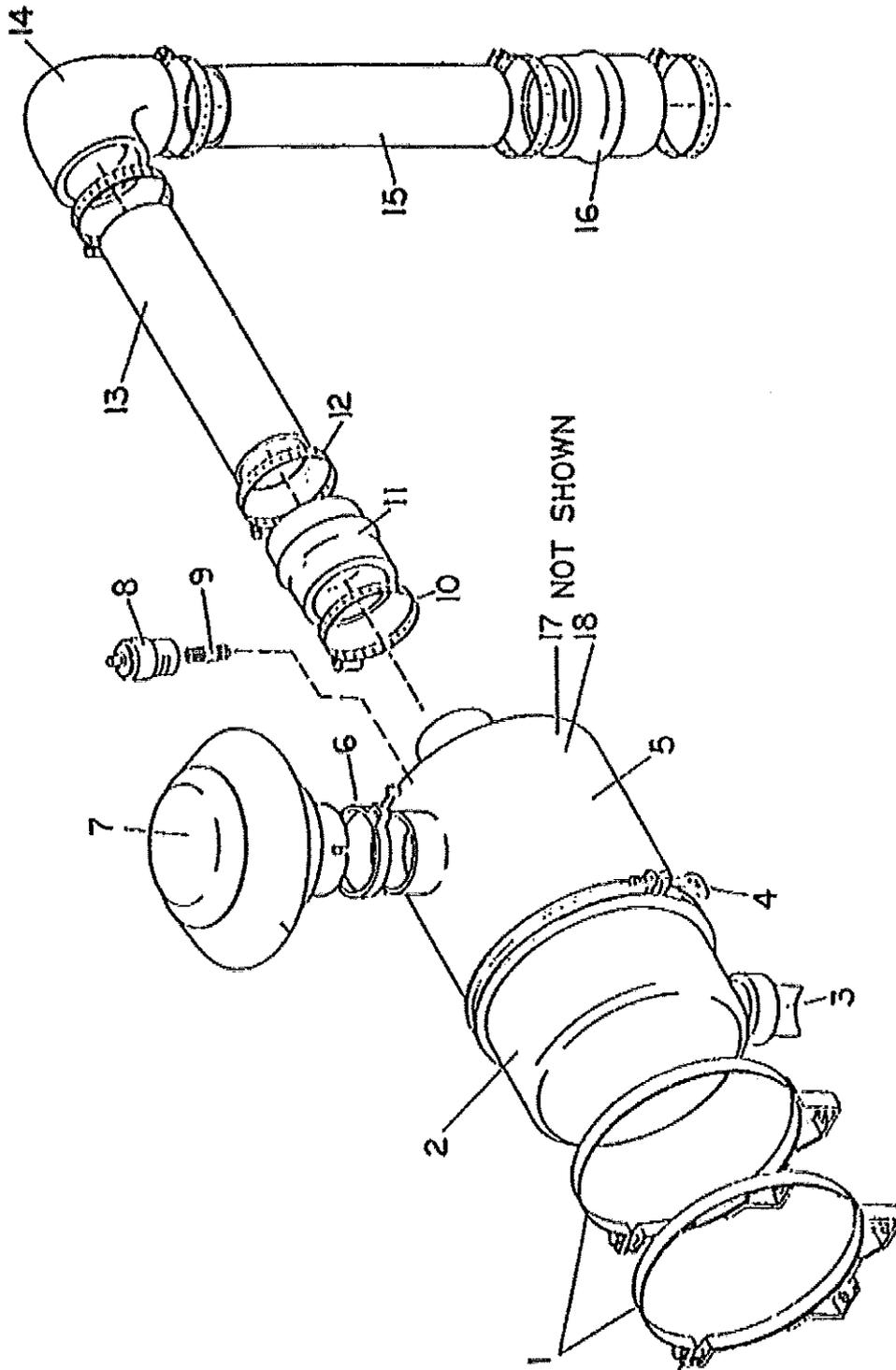
OIL COOLER, OIL TANK & CONTROLLERS



AIR FILTER

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WH58-0	Air Filter Assembly	1	
WH58-1	Clamps	2	
WH58-2	Dust Cover	1	
WH58-3	Dust Ejector	1	
WH58-4	Clamp - Dust Cover	1	
WH58-5	Main Body	1	
WH58-6	Clamp - Bonnet	1	
WH58-7	Bonnet	1	
WH58-8	Indicator	1	
WH58-9	Fitting - Indicator	1	
WH58-10	Clamp	1	Specify Engine
WH58-11	Hump Reducer	1	Specify Engine
WH58-12	Clamp	4	Specify Engine
WH58-13	Pipe	1	Specify Engine
WH58-14	Elbow	1	Specify Engine
WH58-15	Pipe	1	Specify Engine
WH58-16	Connector	1	Specify Engine

AIR FILTER



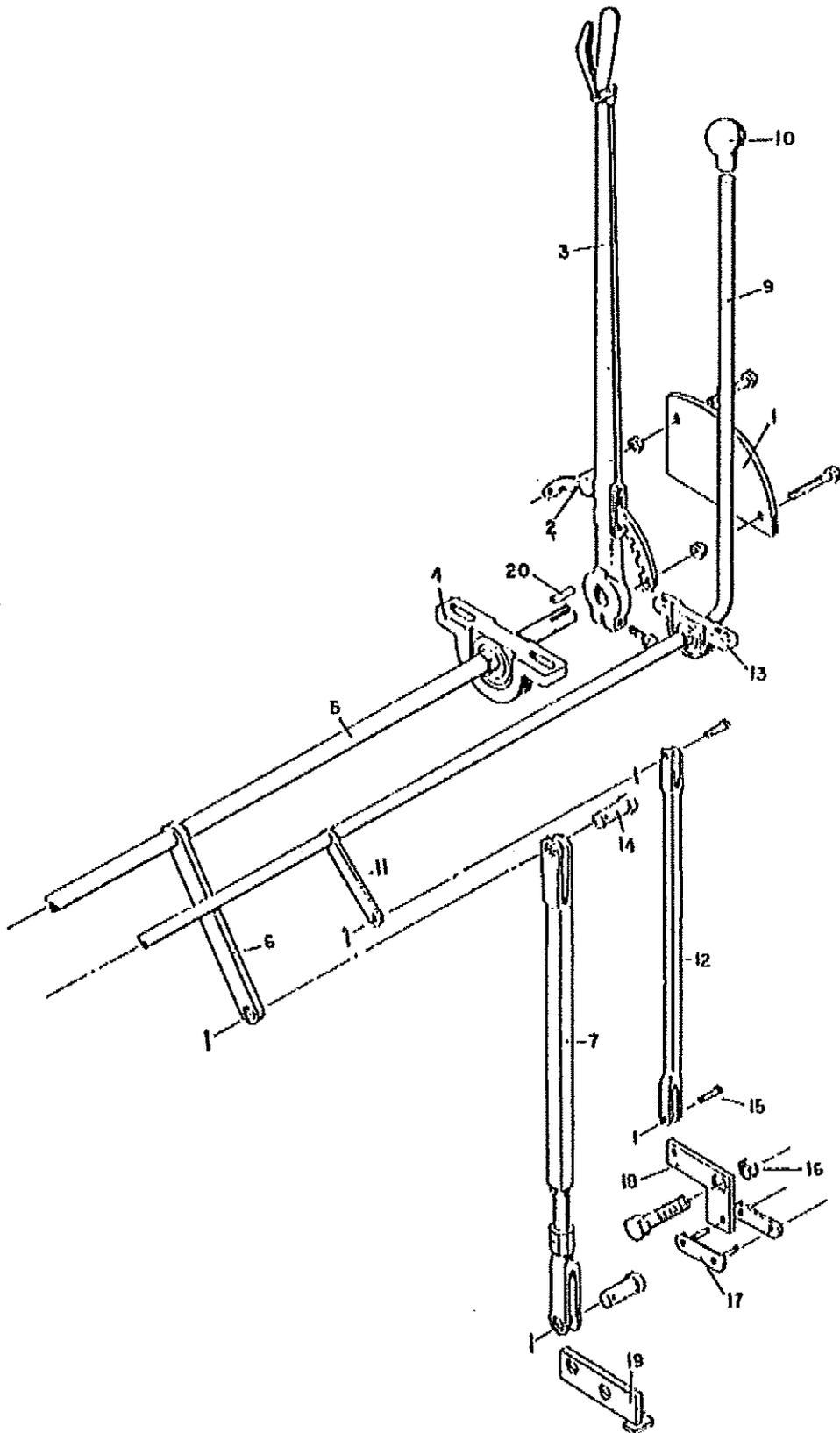
SEAT

PART. NO.	DESCRIPTION	NO. REQD.	REMARKS
WHS60-0	Seat Assy.	1	2 - Req'd if Dual
WHS60-1	Back Pad	1	
WHS60-2	Arm Rests	2	
WHS60-3	Seat	1	
WHS60-4	Adjustment Lever	1	
WHS60-5	Slid Frame	2	
WHS60-6	Tension Adj. Knob	1	
WHS60-7	Mainframe	1	

CROSS SHAFTS

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WHS62-0	Emergency Brake Assy.	1	Specify if Dual
WHS62-1	Emergency Brake Bracket	1	2 Req'd. if Dual
WHS62-2	Brake Quadrant	1	2 Req'd if Dual
WHS62-3	Brake Lever	1	2 Req'd if Dual
WHS62-4	Bearings	2	3 Req'd if Dual
WHS62-5	Shaft	1	Specify if Dual
WHS62-6	Lever (Shaft)	1	
WHS62-7	Link	1	
WHS62-8	Clevis	1	
WHS62-9	Shuttle Lever	1	Specify if Dual
WHS62-10	Rubber Knob	1	2 Req'd if Dual
WHS62-10	Bearings	2	3 Req'd if Dual
WHS62-11	Lever	1	
WHS62-12	Link	1	

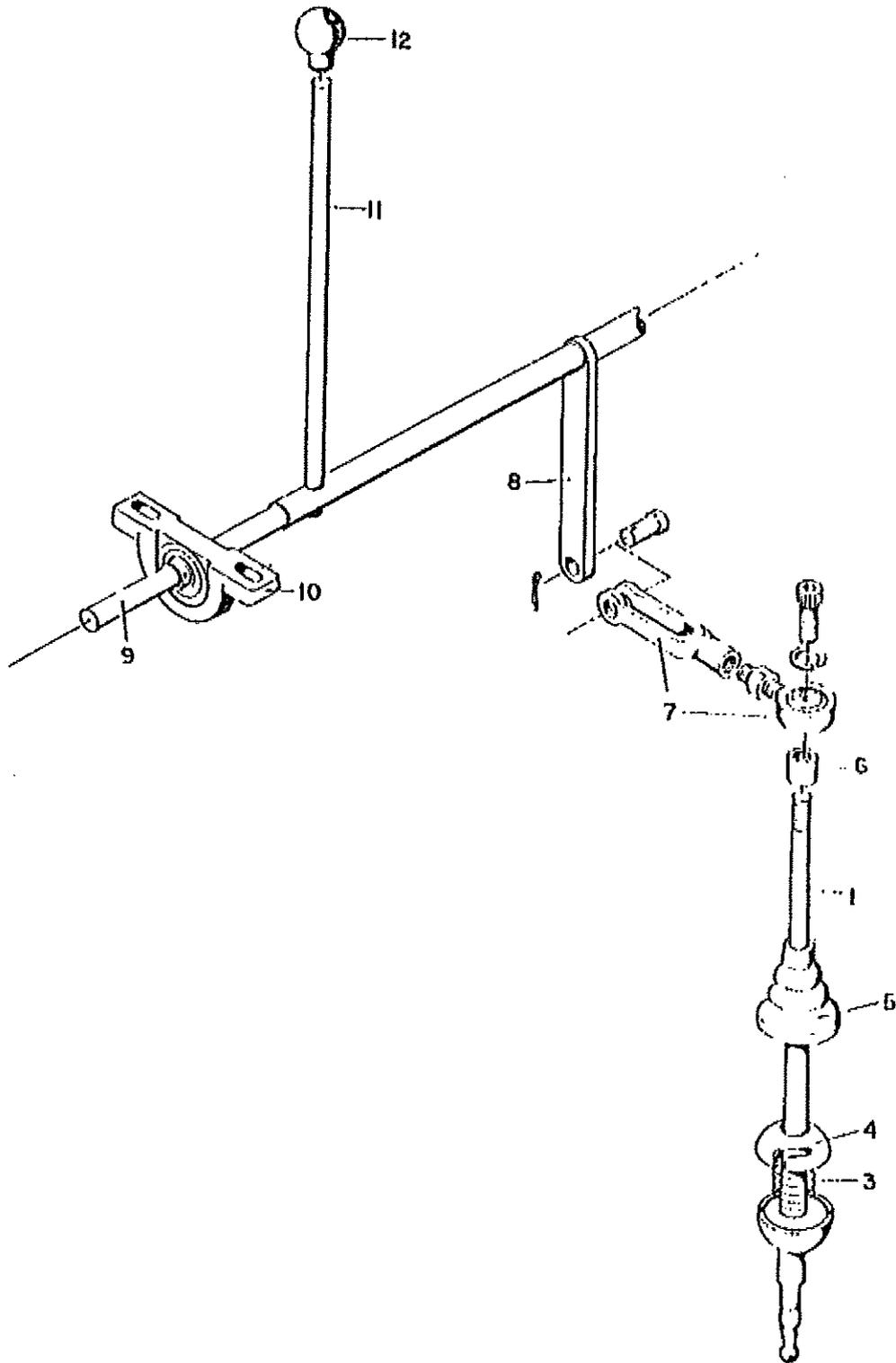
CROSS SHAFTS



SHIFTER

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WHS64-0	Shifter Assembly	1	Items 1 thru 12
WHS64-1	Shift Stick	1	
WHS64-2	Cup - Spring	1	
WHS64-3	Spring	1	
WHS64-4	Lock	1	
WHS64-5	Rubber Seal	1	
WHS64-6	Sleeve (Threaded)	1	
WHS64-7	Clevis	1	
WHS64-8	Lever Arm	1	
WHS64-9	Cross Shaft	1	
WHS64-9a	Cross Shaft (Dual)	1	Not Shown
WHS64-10	Bearings	2	
WHS64-11	Shift Lever	1	(2 Repl For Dual)
WHS64-12	Rubber Knob	1	(2 Repl For Dual)
WHS64-13	Shift Pattern	1	(2 Repl For Dual)

SHIFTER



METERING QUADRANT

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WHS66-1	Bracket	1	2 - Req'd Dual
WHS66-2	Quadrant	1	2 - Req'd Dual
WHS66-3	Bushing	2	4 - Req'd Dual
WHS66-4	Lever	1	2 - Req'd Dual
WHS66-5	Switch	1	
WHS66-6	Bearings	2	
WHS66-7	Shaft	1	
WHS66-8	Shaft Dual	1	
WHS66-9	Lever	1	
WHS66-10	Link	1	
WHS66-11	Pivot Lever	1	
WHS66-12	Main Gate Link Arm	1	Use Part #W38-12
WHS66-13	Clevis Pin	4	
WHS66-14	Lever (Hopper)	1	Use Part #W38-7

HYDROSTATIC SYSTEM

PART NO.	DESCRIPTION	NO. REQD.	REMARKS
WHS68-1	Motor - Hydrostatic	3	See page WHS-36
WHS68-2	Cross - Port Relief Block	2	See page WHS-29
WHS68-3	Pump - Rear Hydrostatic	1	See page WHS-34
WHS68-4	Pump - Tandem Hydrostatic	1	See page WHS-32
WHS68-5	Solenoid Block	1	See page WHS-29
WHS68-6	Oil Cooler	1	See page WHS-54
WHS68-7	Hyd. Oil Tank	1	See page WHS-54
WHS68-8	Charge Pump - (Tandem)	1	See page WHS-32
WHS68-9	Power Steering Pump	1	See page WHS-19
WHS68-10	Orbitrol	1	See page WHS-17
WHS68-11	Steering Cylinder	1	See page WHS-15
WHS68-12	Gate Valve	1	See page WHS-54
WHS68-13	Gate Valve	2	See page WHS-54
WHS68-14	Filter	2	See page WHS-54

HYDROSTATIC SYSTEM

