

GENERAL OPERATORS MAINTENANCE

HEADER, CUTTING DISKS, AND GATHERING CHAINS

Keep grass and vines from wrapping on drive sprockets. Clean out build up at the pinch points. Check bolts on lap splices of header conveyor and gathering chains. These bolts are dragged through the dirt and rocks and sometimes wear off prematurely.

Adjust top and bottom disk scrapers to eliminate dirt build up.

Lube roller chains daily. (Conklin Lub Oil is recommended)

Grease bearings once a week.

If harvesting in rocky fields, adjust header chain nose rollers down or disks up. In other words, increase clearance between the bottom of the disks and top of header chain. This allows rocks to pass around the nose rollers without pinching the header chain and disks.

When harvesting on elevated beds, gathering chain lap splices should be 2 pitch over lap. When harvesting straight over lap 5 pitches. The nose cones of the gathering chains should not plow dirt. In elevated beds, the noses need to extend down into the furrows and help lift the vine.

Cutting disks measure 34" in diameter when new. Install a new pair when they wear to 33" diameter. Life of disks differ greatly with soil types and operating RPM's.

PRIMARY SHAKER

Keep shaker drum clean. In some ground conditions dirt builds up between shaker tines groups on the drum. This build up should not exceed 1" thick. Also dirt builds on the side of the shaker chamber. If not removed, it will wear flat spots on the outside shaker tines

Once a week, use a heavy hammer to drive the tines into the rubber holders. This is especially important when operating the shaker weights at high RPM's. Always replace broken tines as soon as possible. The shaker loses efficiency when tines are broken.

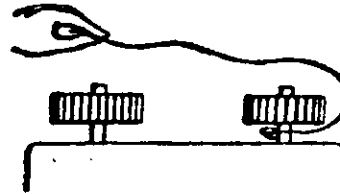
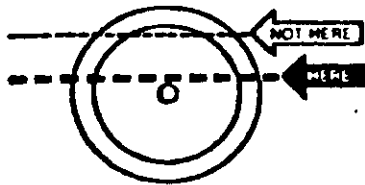
The primary shaker is adjustable forwards and backwards from the header chain. If harvesting in rocky fields, the gap should be widened to help avoid broken shaker tines. However, if the gap is widened to much, some plant

varieties tend to fall down in front of the shaker and escape the separating action.

Adjust shaker hood to 1" clearance above shaker tines

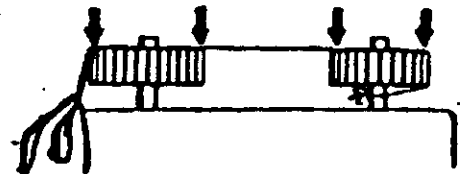
Daily check the bolts on the rubber shaker drive at the motor.

Once a week, grease shaker bearings, check tension on drive belts, and watch for loose set collars or bolts. (See shaker timing belt alignment diagram)



INSTALL BELT

Do not pry or otherwise force the belt onto the sprockets, as this can result in permanent damage to the belt. Either remove the sprocket's outside flange or reduce the center distance between the sprockets so that the belt can be easily installed.



BELT TENSIONING-GENERAL METHOD

This method of tensioning Synchronous belt should satisfy most drive requirements.

- Step 1.** Reduce the center distance so that the belt can be placed onto the sprockets without forcing or prying it over the flanges.
- Step 2.** Increase the belt tension until the belt feels snug or taut. Avoid over tensioning the belt.
- Step 3.** Start the drive and apply the most severe load condition. This may be either the motor starting torque or during the work cycle. A belt that is too loose will "jump teeth" under the most severe load conditions.

When this occurs, gradually increase the belt tension until satisfactory operation is achieved.

SECONDARY SHAKER

Once a week, grease shaker bearings and check tension on drive belts. Look for loose set collars and bolts. (See shaker tines and belt alignment diagram above.)

Shaker tines on the secondary shaker do not see the abuse the primary shaker gives. They last much longer and rarely get broken. The foam wrappings between time groups should be kept clean.

Daily check for loose bolts on the rubber shaker drive at the motor.

DEBRIS ELIMINATION SYSTEM

Daily check for tomatoes or dirt inside and at the bottom of the fan housing. Keep the housing and defuser clean and smooth for peak efficiency. A periodic wash out with water is suggested.

Watch out for build up on the fan paddle assembly.

Check the pip roller and scraper on top of the fan for dirt build up.

Check the large debris roller to rotate freely.

Check the top deflector hood for dirt build up.

PRESORT BELT

Clean and scrape dirt build up from surface of belt often.

Check inside slider belt drive rolls, especially observe the V-guide which is on the center - inside of presort belt, and grooves in the drive rolls.

The belt must be adjusted and aligned properly on the V-guides or irreparable damage will be done to the belt.

This belt must run smoothly and freely at approximately 160 feet per minute. This is equal to 27 belt R.P.M.'s. Place a white mark on the belt and count 27 belt revolutions in one minute.

HAND SORT BELT

Adjust the tail and drive pulleys to run the belt in the center of the bed. Running slightly to one side is acceptable, provided it isn't wearing into the slider bed sides. The tail pulley is designed to clean itself. However, earlier models must be cleaned out periodically.

Check the belt lacer. It is advisable to replace it before each season start up. The belt is made up long enough to do this once a year for 6 years.

GENERAL KNOWLEDGE

Keep hydraulic oil level within 10" of the top of reservoir.

Change hydraulic oil filters each season. Check for water in oil by removing magnetic plug at bottom of reservoir. Also check for wear metals.

Grease the 5 grease fittings on the suspension, and P.T.O. slider tube and U-joints every week.

Check air compressor oil daily. Make certain no dirt enters while pulling out the dip stick. Change air compressor oil every 200 hours. Refill with #30 non detergent.

Keep the cooling fins clean on the air compressor. Dust build up may cause overheating.

Check air compressor air filter daily.

Keep oil cooler fins clean. Check weekly.

Hydraulic oil temperature should operate at 150 degrees.

Replace air dryer filter every 800 hours.

Lub roller chain daily. We have found Conklin lub oil to work very well in protecting roller chains in dirty conditions. It can be purchased from Pik Rite or your local Conklin dealer.

The leveling axle has three pin settings. It can be adjusted to your row spacing. The leveling hydraulic cylinder remains in the same position for all three pin settings.

Watch for dirt which may stop the rollers causing flat spots on the rollers. Watch for stones or debris build up which may cause misalignment or stoppage. In general, always be watching and train your crew to be watching for potential problems. Preventative maintenance is better than emergency repairs.

COLOR SORTER

The color sorter instructions are covered in separate manual, but here are a few important details:

Belt speed = 160 ft. per minute. This is equal to 27 belt R.P.M.. (Place a white mark on the belt and count 27 belt revolutions in one minute.

Check polarity at plug on electronic sorter.

White wire = A = Positive-with red probe.

Black wire = B = Negative-with black probe.

With tractor running at 1800 RPMs, check voltages: must be + 12.5 to 14.5 V.D.C..

AC volts .05 V.A.C. max.

anything over .05 alternator must be changed. This condition indicates that the alternator is soon to fail which is also detrimental to the **Odenburg Electronic Box**.

The power supply wire must be connected at the battery. The battery acts as a filter for harmful voltage spikes.

Air pressure should be 45 PSI.

Oiler should deliver 6 drops of oil per minute and is adjusted on top of oiler.

Any direct sunlight shining on the tomatoes at the point where the electric eye focuses must be blocked. Example in early morning or late afternoon when sun is shining in from the side.

OPERATOR'S RESPONSIBILITIES

DISK PICKUP HEADER

The **Disk Pickup Header** is to skim the ground just under the tomato plants. Each gathering disk is independently controlled and thus the header flexes from side to side controlling the depth of each disk independently. The operator must watch closely and control both the right and left gathering disks.

Warning

The header on your machine has been designed to flex for better operations. However flexing the head in excess will cause premature damage and stress on your machine. The maximum difference from side to side should not exceed 6 inches. Always rest the header on the ground when parking the machine to avoid unnecessary stress.

POWERED DIRT VIBRATOR

As the vines and tomatoes travel up the header chain, they go through the dirt vibrator tunnel. Field conditions will vary as to how fast to operate the vibrator. Overspeeding the vibrator will cause excessive wear to the header chain and vibrator rollers. Some conditions require little or no vibration. Maximum speed depends on the amount of vine mass traveling over the vibrator. Heavy vines will allow higher vibrator speeds while in thin vines speed may be decreased. If the vines roll back and do not pass over the vibrator the speed must be decreased. The operator must prevent rollback or bunching of the vines. Bunching of vines causes inefficiency and fruit loss while it passes through the harvester.

SHAKER SYSTEM

The **Pik Rite Harvester** is designed to allow the operator to observe both sides of the **Primary and Secondary Shaker** from the tractor seat. There are two points of control on these shakers, 1. Weight speed 2. Rotation speed. The weight speed controls the intensity of the shake, more RPM = more vigorous shake. Rotation speed controls the rotation speed of the entire shaker drum, thus controlling the time period vines remain on the shaker. Slower rotation speeds mean the tomato vines take longer to ride over and out of the shaker.

PRIMARY SHAKER ADJUSTMENT HINTS

Slow the shaker rotation in viney weed conditions, i.e. morning glory. If the shaker rotation speed is too high it will drag fruit out the back of the machine.

Generally the secondary shaker weight speed is greater than the primary shaker weight speed.

Increase the primary shaker rotation speed in heavy tomato vines, thus keeping a thinner layer of vines on the shaker.

Conditions vary drastically from field to field and day to day and variety of tomato plants. By keenly observing the shaker and outflow of vines, the operator will learn very quickly how and when to make minor adjustments.

PRIMARY SHAKER HOOD

Generally the hood must be very close (1/2" to 1") to the shaker tines, some conditions require it to be lifted 3 to 4 inches higher. Never allow the hood to operate touching the tines. This will wear both the tines and hood prematurely.

TRANSFER AND CROSS CONVEYER

These conveyers are hard to see from the tractor seat but generally require little or no attention. However there is a pipe roller under the drive end of both of these conveyer. These rollers sometimes stop and eventually cause a buildup of debris. It is wise to appoint one of the crew to check them periodically to make sure they are turning. If they do become stopped up it is not required to clean them out immediately, but it should be done at the end of the row.

DEBRIS FAN

Operate the debris fan at a speed which satisfactorily removes the vines and debris. Do not overspeed or damage may occur. The operator can see from the tractor seat if all is well with the debris removal system and should regularly observe it as he travels down the row.

ELEVATION CONVEYER AND PRESORT BELT

Observation of the fruit as it is being delivered from the elevation conveyer to the presort belt is very important. The operator levels the machine hydraulically by observing the fruit at this point. This is a good place to make sure the debris fan is doing it's job also. By observing this point the operator determines the ground speed. At this point the tomatoes should be spread

evenly across the entire conveyer. If they are crowded to one side the machine must be leveled. Stacking or crowding the tomatoes as they pass through the **electronic sort** will result in loss of fruit. The presort belt must be full and one layer deep. If it is half full the **electronic sort** becomes inefficient. The operator can also observe the tomatoes when they pass through the electronic sorter and drop onto the hand sort belt. There should be an even steady flow of fruit at this point also.

ELECTRONIC SORT

The details of **electronic sort** are covered in detail in the **Odenberg Sorter Manual**. The operator must keep special **Odenberg** oil in the oiler cup at all times.

HAND SORT BELT

Operate the belt fast enough to keep the tomatoes from stacking. Some operators allow the crew to determine belt speed. However, it is preferred that the operator do this because he has a better observation point of the entire machine and may deem it necessary to speed up in heavy fruit.

DISCHARGE CONVEYER

The operator must pay close attention to the truck being pulled along side the harvester. The **discharge conveyer** can be bent and rendered useless in a very short time if it is left unattended. These are three parts that describe the **discharge conveyer**: The outer link, the lower link (adjusted up and down with a hydraulic cylinder.) and the **basket** (the bottom part where the tomatoes drop into from the **hand sort belt**).

In heavy tomatoes the **lower link** should be as close to the truck or as low as possible to prevent fruit rollback and bouncing out over the side. The **lower link** has several position adjustments that allow for a straighter position. The **basket** can be used to retain tomatoes until a truck can be positioned under the conveyer. A crew member should be trained to start and stop the conveyer by using the **flow control valve** mounted at the end of the **sorting table**. By turning the **discharge conveyer** off the operator can save time because he doesn't need to empty the machine at the end of each row and can begin harvesting the next row while the truck is being positioned properly.

AIR COMPRESSOR AND PRESSURE GAUGE

In addition to controlling the above mentioned the operator must listen for the **air dryer** to unload at regular intervals (identified by a loud hiss). The **air dryer** back flushes each time the **air reservoir** reaches peak pressure. At the same time the **air compressor** head closes and stops pumping air until the pressure drop in the reservoir calls for more pressure. If the **air dryer** does not unload it means that the air pressure is not reaching peak pressure. This may mean a compressor problem or an air leak. This in turn may affect the electronic sorter's efficiency.

HYDRAULIC SYSTEM

The operator must listen for any high pitched squeals that may indicate a relief valve in the hydraulic system opening because a conveyer or other component has stalled out. By observing the **pressure gauges** at the **hydraulic pump** and by using the process of elimination it can be determined which component is the problem. It is wise to periodically observe the normal running pressures of the hydraulic pumps as you go down the row. This is a good indicator of any conveyer not functioning properly or being plugged with mud or vines. The motors require more power in a jam-up thus the **pressure gauges** register more pressure. The operator must, in addition to controlling all the harvester functions steer the tractor to keep the **header** in the center of the row as well as watch the tractor temperature and oil gauges.

Operating the **Pik Rite Harvester** requires much attention to detail. The operator must remain attentive to avoid injury to the crew or damage to his machine. Maximum efficiency of the machine is determined largely by the expertise and alertness of the operator.

Operating the Pik Rite Tomato Harvester

CAUTION!

Idle the tractor down to engage the P.T.O. If the PTO is engaged at high RPMs it may damage the Hydraulic Pump.

Operate tractor engine RPMs at approximately 1500 RPM. The Pik Rite Harvester may be operated at a maximum speed of 2100 engine RPMs (1000 PTO RPM) or a minimum of 1200 RPM (600 PTO RPM).

All of the hydraulic motors are controlled by speed control valves. These valves control speed by metering the amount of oil that is allowed to pass through the motor. The unused oil is passed around the motor. Both the bypassed oil and the oil that has passed through the motor flows together down line to the next flow control valve where the process is repeated.

There are four pump sections hence there are four hydraulic circuits. Each circuit has three to five motors running in series.

The pump is a constant displacement pump which means when the PTO is engaged each section is pumping 15 or 20 GPM depending on the gear width. It pumps the same amount of oil whether at high or low pressures. Consequently the pumped oil must always have a channel to return to the reservoir because it is constantly moving through the circuit.

Each of the four circuits empty into the oil cooler (mounted on top of the machine) and is cooled and sent through the filter back to the oil reservoir.

Because all motors are controlled by flow control valves, operating the tractor at higher speeds will not result in faster operating of the harvester. Higher operating speed is obtained by setting the flow control lever to a higher number.

Ideally the operator should set the flow controls to the desired speed and then match the tractor RPMs to the amount of oil required. Any higher engine speed only causes more oil to bypass the motor thus wasting energy and creating more heat in the system and more wear.

Always check the following prior to starting to harvest:

27 belt RPM = 160 ft. per minute

Check polarity at plug on electronic sorter

White wire = A = Positive-with red probe

Black wire = B = Negative-with black probe

With tractor running at 1800 RPMs and before plugging into box!

Should read +14.2VDC

Switch probes should read 14.2vdc

AC volts .05 max.

Anything over .05 alternator must be changed. This condition indicates that the alternator is soon to fail which is also detrimental to the Odenburg Electronic Box.

Installation Instructions for Elec/Hyd Control

When standard control is in place

- * Power Cable must be connected to power source on harvester.
- * Separate hoses on harvester at hydraulic junction point (just behind main hydraulic pump on header side) are joined together with 3/8" pipe couplers.
- * Bolt up Elec/Hyd valve body and attach hoses.
- * Diagram of valve work sections with all options in place:

U	1	2	3	4	5	6	7	8
---	---	---	---	---	---	---	---	---

U = Unload Section

1. Header lift cylinder (outside)
2. Header lift cylinder (inside)
3. Machine leveler
4. Discharge (raise-lower)
5. Discharge (outer link fold)
6. Sliding hitch
7. Gauge Wheel (Outside)
8. Gauge Wheel (Inside)

* If and open center system is being used (IH or Ford) the blue screw needs to be inserted in the unload section of the valve body. In a closed center system (Deere) insert the red screw.

* After attaching the two feed hose to the tractor quick couplers tie back the hydraulic control lever on the tractor to keep the oil flowing through the harvester valve body (on open center system). Normally one can hear the tractor laboring a bit if the oil is not flowing freely. If this is the case the tractor hydraulic system may overheat.

* When using a John Deere tractor slow the speed of the hydraulic oil to the "turtle" symbol. If a squealing sound is heard the relief valve may be set too low. Set higher until the sound stops.

* If the direction of oil flow is reversed the cylinders will not work in both directions. In case this happens reverse the direction by changing the lever or change the hoses in the tractor outlets.

Principles of Operation for Elec/Hyd Valve

In a closed center application, tractor hydraulic oil is under pressure at the harvester valve body. When the electric switch is activated an electric coil opens a spool valve sending oil to the hydraulic cylinders.

In an open center application, tractor hydraulic oil is free flowing through the harvester valve body. When the electric switch is activated an electric coil opens the spool to send oil to the hydraulic cylinder. However the oil is still flowing freely. Consequently the unload coil must be employed at the same time to temporarily stop the free flowing oil to build up pressure to move the cylinder. When the electric switch is activated and deactivated the unload coil is also. There are electrical diodes in the control box preventing electrical feedback through to other inactivated functions.

When the red screw is inserted in the unload coil it manually stops the flow of oil through the valve body (the red screw has a pin on the end).

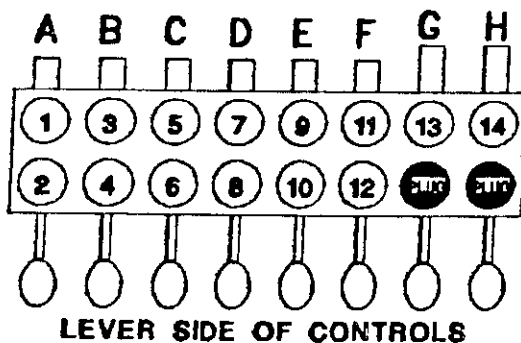
When the blue screw is inserted it allows the electric coil to open and close the unload section.

HYDRAULIC VALVE INSTRUCTIONS

KEY TO VALVE SECTION OPERATIONS

- A. Outside Header Lift (or gauge wheel)
- B. Inside Header Lift (or gauge wheel)
- C. Level control
- D. Discharge Boom
- E. Discharge Outer Link
- F. Sliding Hitch
- G. Outside Header Lift (Float)
- H. Inside Header Lift (Float)

Note: G & H Are installed only with optional gauge wheel assembly.

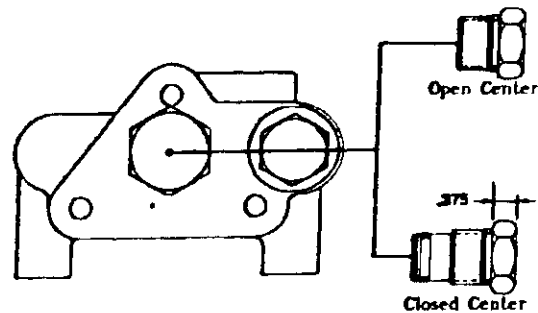


KEY TO HOSE CONNECTIONS

- | | |
|--------------------------------|----------------------------|
| 1. Outside Gauge Wheels <UP> | 8. Discharge Boom <IN> |
| 2. Outside Gauge Wheels <DOWN> | 9. Discharge Outer <OUT> |
| 3. Inside Gauge Wheels <UP> | 10. Discharge Outer <IN> |
| 4. Inside Gauge Wheels <DOWN> | 11. Sliding Hitch <OUT> |
| 5. Level Control <UP> | 12. Sliding Hitch <IN> |
| 6. Level Control <DOWN> | 13. Outside Header <FLOAT> |
| 7. Discharge Boom <OUT> | 14. Inside Header <FLOAT> |

Principles of Operation for Manual Hydraulic Control Valve

When operating this valve with an open center system tractor the open center plug must be in place. Otherwise the tractor hydraulic oil may overheat. When operating the valve with a closed center system, install the closed center plug.



When operating the open center plug the oil is circulating freely through the valve body. When the operator pulls a lever to operate a cylinder the oil is stopped and diverted to or from the cylinder.

1. Header lift cylinder (outside)
2. Header lift cylinder (inside)
3. Machine leveler
4. Discharge (raise-lower)
5. Discharge (outer link fold)
6. Sliding hitch
7. Gauge Wheel (Outside)
8. Gauge Wheel (Inside)

When operating with a closed center plug, oil is under pressure at the valve body. When the operator pulls a lever to move a cylinder, oil is allowed to escape the valve port and perform the cylinder function.

CHECKLIST FOR PIK RITE TOMATO HARVESTER

NOTE: Owner/Operator may add to this list at his own discretion

DAILY

- ☐ All chains (belted) and rollers turning
- ☐ All chains (belted) properly aligned in conveyor (discharge / top and bottom)
- ☐ All Return Cleaner rollers turning
- ☐ All Bar Cleaners turning (keep up if conditions do not require use)
- ☐ Machine free of obstructions (mud, etc.)
- ☐ Debris Fan (inside) free of obstructions
- ☐ Debris Fan Air Flow Hood (underside) clean

Shakers:

- ☐ Belt Alignment
- ☐ No excess vibration
- ☐ Drives properly tightened
- ☐ Number of Fingers (maintained) and Drum Free of excess dirt
- ☐ Speed adjusted to conditions

Electronics:

- ☐ Glass Clean
- ☐ All Fingers working
- ☐ No debris (weeds, vines, etc.) for eye to see
- ☐ Lubricating Oil level and proper amount -6 drops/minute

NOTE: Keep roller chains lubricated

WEEKLY:

- ☐ Oil level in Overhung Adaptor (PTO -Pump)
- ☐ Oil level in Air Compressor
- ☐ Air Intake Filter
- ☐ Cutter Disks Wear
- ☐ Flat Belts for Excessive Wear
- ☐ Cooling (oil) Radiator for Dirt (Air or Water may require cleaning)
- ☐ Air Compressor Drive Pulley for "Looseness"
- ☐ Lubrication: "Grease Points"
 - ☐ (2) hinge (outer discharge/(2) hinge(main discharge)
 - ☐ (2) rear aftersort auger

- ☐ (1) axle pivot/(4) axle rockers [(2) on each side]
- ☐ (4) Primary Weight Shafts
- ☐ (2) Primary Shaft (shaker)
- ☐ (4) Secondary Weight Shafts
- ☐ (2) Secondary Shaft (shaker)
- ☐ (2) Header Chain Drive Shaft/(2) Header Chain Drive Shaft[Dirt Belt Option]
- ☐ (4) Cutter Disk Shafts
- ☐ (2) P.T.O. Main Shaft

BI-MONTHLY:

- ☐ Aftersort Belt Lacer (renew if necessary)
- ☐ Presort and Dirtsort Belts for A-Guide wear
- ☐ All Bearings for possible pre-mature failure
- ☐ Drive Couplers [plastic and steel] re-align if necessary
- ☐ Belted Chain Sprockets and replace if excessive wear
- ☐ Re-Adjust Scrapers (under and above Disks)
- ☐ All Belted Chain splices and renew if bolts/backing are worn
- ☐ Return rollers for excessive wear [adjust belted chain to reduce wear]
- ☐ All Roller Chain sprockets and chain

END-OF-SEASON:

- ☐ Recheck Bi-monthly checklist
- ☐ Plus: Flows and Pressures of each section of main pump
- ☐ Winterize Electronic Color Sorter Box and Rejector Unit
- ☐ Winterize Electronic MOT Sorter Box and Rejector Unit
- ☐ Air Dryer could last up to 10 years. Change only if evidence of water or oil in the water bowl of the Electronic Sort oiler

POWER REQUIREMENTS

The Pik Rite model 192 Tomato Harvester requires 3 power sources from the tractor other than the draw-bar hook-ups.

1. The Power Take-off Shaft

The Pik Rite uses a 21 spline 1 3/8 inch diameter P.T.O.yoke. Our harvester can operate down to 600 R.P.M.s and up to 1100 R.P.M.s. Optimum speed is 800 R.P.M.s. That generally means operating the tractor engine R.P.M.s at 1800-1900 R.P.M.s. A 85 horse power tractor is minimum requirements.

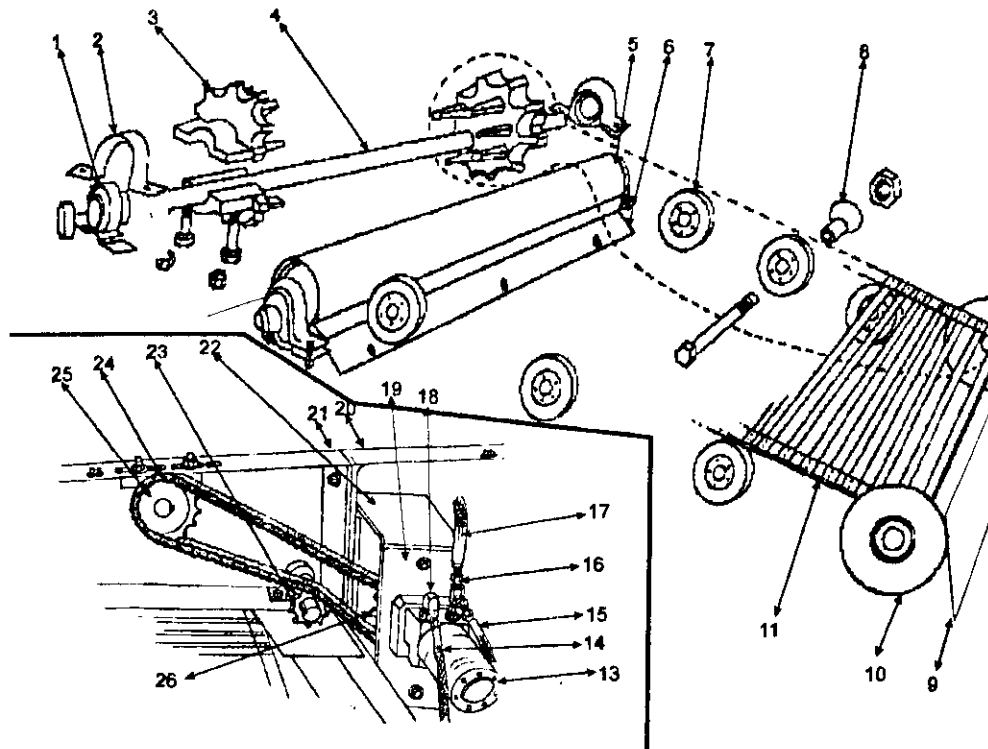
2. Hydraulic Power

Only one control valve is needed (in and out). Common hose ends or adapters may be needed to fit different brand name tractors. The hydraulic oil is routed through a multi-bank valve mounted on the machine or on the tractor. This valve can be used in closed or open center applications. This valve bank is mounted next to the machine operator, enabling the person to control the harvester cylinder functions from the tractor seat. This includes header, machine leveling, discharge conveyor height and hitch location.

3. 12 Volt DC Electricity

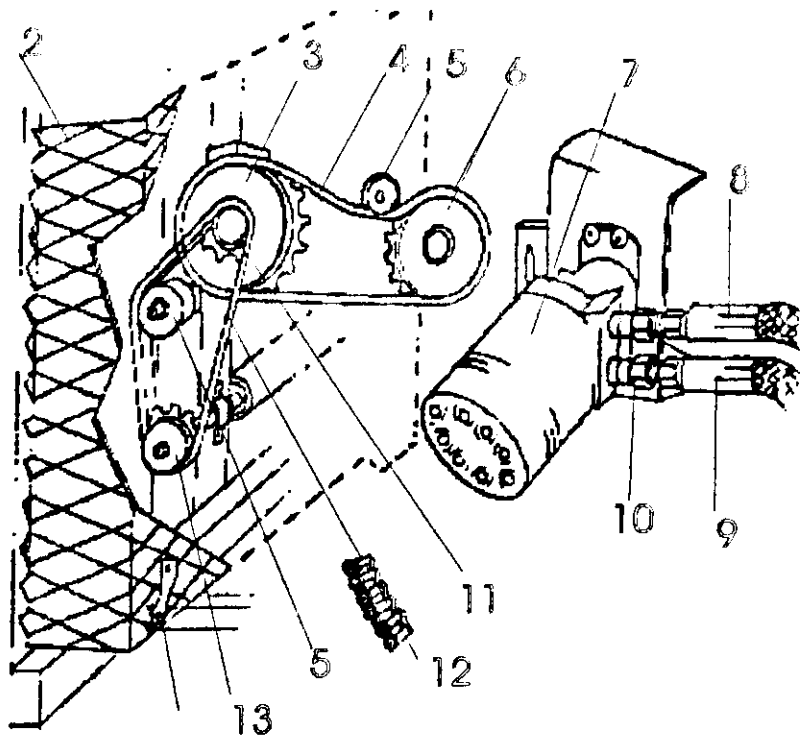
12 volt batteries for tractor starter are very common through out the world. One hook up to the battery is all that is necessary to operate lights and other optional equipment such as the Electronic Color Sorter. **IMPORTANT:** This must be hooked to battery. The battery acts as a filter for harmful A.C. Volts. AC Volts will damage the color sorter computer.

Providing a tractor has these power sources, any brand name or type of tractor can be used. Unhooking and rehooking to another tractor is similar to any other type of pull-type implement. Turning radius of the tractor/harvester combination matches that of other pull-type implements also. The tractor can turn to the point of the rear tire wedging into the hitch tongue, which is nearly 90 degrees. Additional machine maneuverability is added when the optional powered sliding hitch is installed.



NS	192-208	Bearing Mount ,Outer
1	110-203b	Bearing, 1 1/4 Fafnir tri-seal
2	191-203b	Stamped Bearing Housing for 110-203b
3	191-602	Sprocket, drive HS-3612 1 1/4 bore
3	191-602U	Sprocket 36-12 1 1/4 bore 1/4" key urethane
4	192-202	Shaft, Fruit chain drive shaft 1 1/4 x 43 1/4
5	192-209	Roller, Fruit chain support cleaner
6	110-211	Scraper, Support cleaner roller
7	110-122	Roller, 4" support Roller
8	110-122a	Standoff, support roller spacer
9	191-210	Belting, shield
10	110-120w	Roller, 8in flange 3 1/2 diameter
11	110-201	Transfer chain, 7/16in bars 36in wide 100 links
13	110-204	Hydraulic Motor
14	193-4h	5/8 in. hose 1/2 x 1/2 x 75 in long
15	191-4i	5/8 in. hose 1/2 x 1/2 x 56 in long
17	193-3a	5/8 in hose 1/2 x 1/2 x 88 in long
19	191-212	Mount, Motor
20	193-305	Shaker chamber support panel right
21	191-306	Shaker chamber support panel, inner rear
22	192-213	Motor Mount bracket
23	192-322	Sprocket, 12 tooth #50 1 1 1/4in bore
25	191-124	Sprocket, 16 tooth #50 1 1/4 in bore
26	192-124	Sprocket, 16 tooth #50 1 in bore

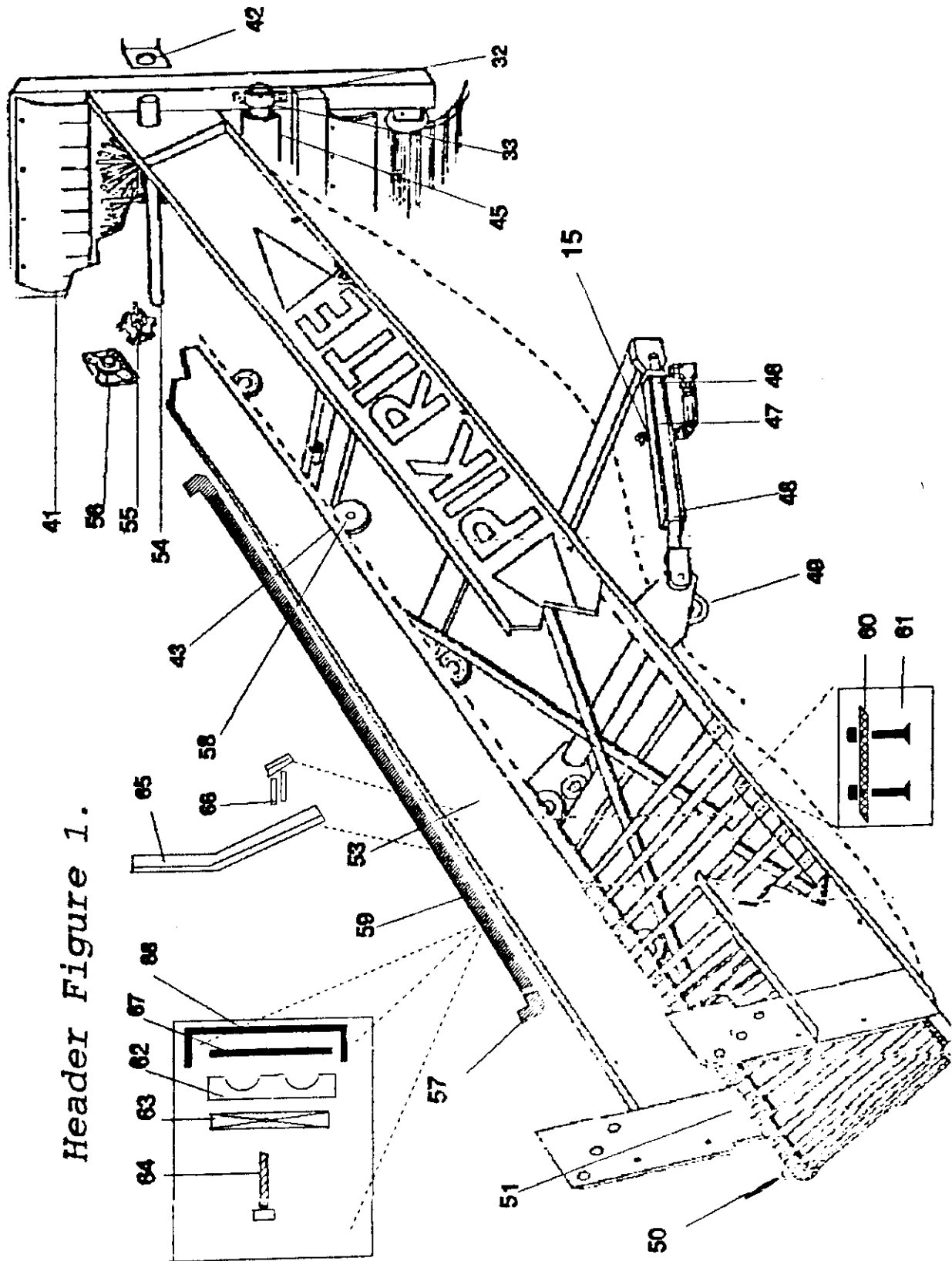
Header Conveyor Components



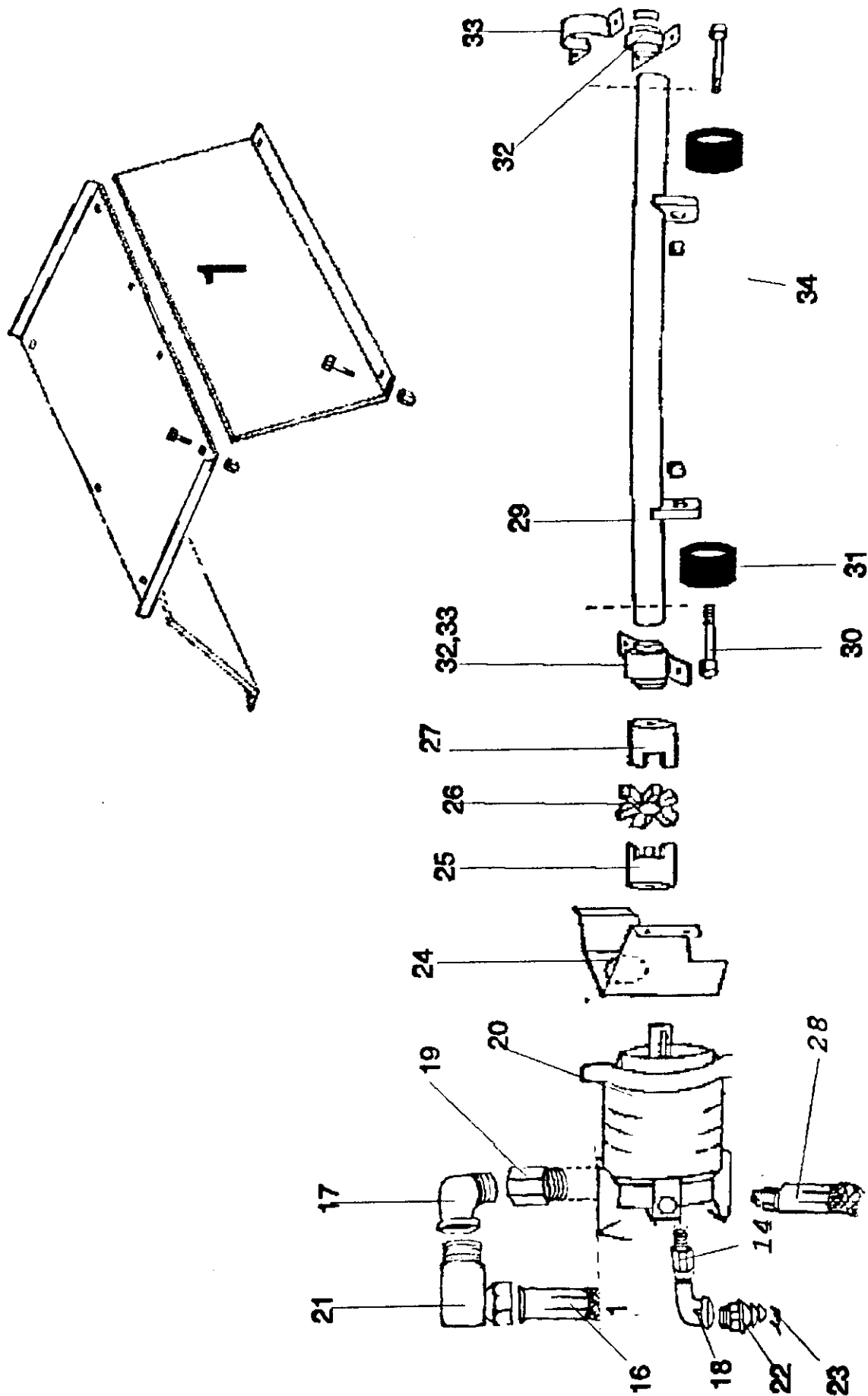
1	191-137a	Vibrator cover, outer
1.1	191-137b	Vibrator cover, inner
1.2	191-137T	Vibrator cover, top
2	192-1142	Shaker shield-expanded metal
3	191-148	Sprocket, Header Drive (driven)
4	191-117	Header drive chain # 60 49 links w/master & offset
5	110-134	Idler, roller chain adjuster
6	192-147	Sprocket, Header chain drive motor
7	192-118	Hydraulic Motor, Disk drive
9	192-1b	3/4 in hose 3/4 x 3/4 x 50 in long
10	191-034	10MB x 3/4 in FPX
10	192-1c	3/4 in hose 3/4 x 1/2 x 50 in long
11	110-115	Sprocket, Feeder roll drive #50B16 1 3/4 bore
12	191-135	Feeder roll chain #50 41 links w/ master & offset
13	191-124	Sprocket, 16 tooth #50 1 1/4 in bore
14	191-02-2	1/2 - 20 X 1/8 FP
16	193-3e	5/8 in. hose 1/2 x 1/2 x 30 in long
17	191-07-2	1/2 NPT ST ELL
17	191-06-2	1/2 NPT ELL
18	191-09-3	1/8 NPT 90 w/push-loc end
19	192-02	16MB x 1/2 in FP solid

20	191-412	Hydraulic motor, Cross 50NH19
21	191-20	1/2 MP x 1/2 FPX90
24	191-138	Vibrator motor mount
25	110-7081	Coupler, 7/8 bore
26	110-6055	Coupler, Heavy duty urethane
27	110-6052	Coupler, 1 1/4in. bore
28	191-21	1/2 MP to 1/2 FP X
28	193-4j 5/8 in	hose 1/2 x 1/2 x 24 in long
29	192-136	Vibrator shaft
31	192-165	Smooth Rubber Vibrator rollers
32	110-203b	Bearing, 1 1/4 Fafnir tri-seal
33	191-203b	Stamped Bearing Housing for 110-203b
41	191-119	Splash guard, belting
42	191-106	Header, frame pivot mounting brackets
43	110-122	Roller, 4" support Roller
45	110-125	Roller, Feeder
47	193-102	Hydraulic cylinder 2 1/2 x 24
48	193-103	Hydraulic cylinder vents 3/8 in NPT
49	110-120	Roller, 5" flange 3 1/2 in diameter
50	193-156	Roller, Flange Nose
51	110-110	Header chains, 7/16 in bar 42 mm pitch 265 links
53	191-101	Header Frame
54	110-112	Shaft, Drive
55	110-111	Sprocket, 12T Drive #4212 1 3/4 bore
56	110-405a	Bearing, Fafnir 1 3/4 Triple seal
56.1	110-405H	RCJ Bearing Carrier
58	110-122a	Standoff, Support roller
59	191-P3	Pipe, 3/4 x 150 in.
60	191-693	Belt, Rivet backing plates 32mm
61	191-694	Belt, Bolts & Nuts, 10/32 X 1 in
62	191-1051	Hyd, Clamp Halves
63	191-1052	Hyd, Cover Plate
65	191-108	Header slide guide bar
66	192-107	Header slide guide
67	192-1053	Pipe Bracket Pad
68	192-1055	Header pipe bracket
NS	192-114	Tightner Bracket
NS	193-157A	Inner Roller Scraper
NS	193-157B	Inner Roller Scraper
NS	192-1142a	Bracket for 191-1142
NS	192-1142b	Welded bolt
NS	192-114	Tightner Bracket

Header Figure 1.



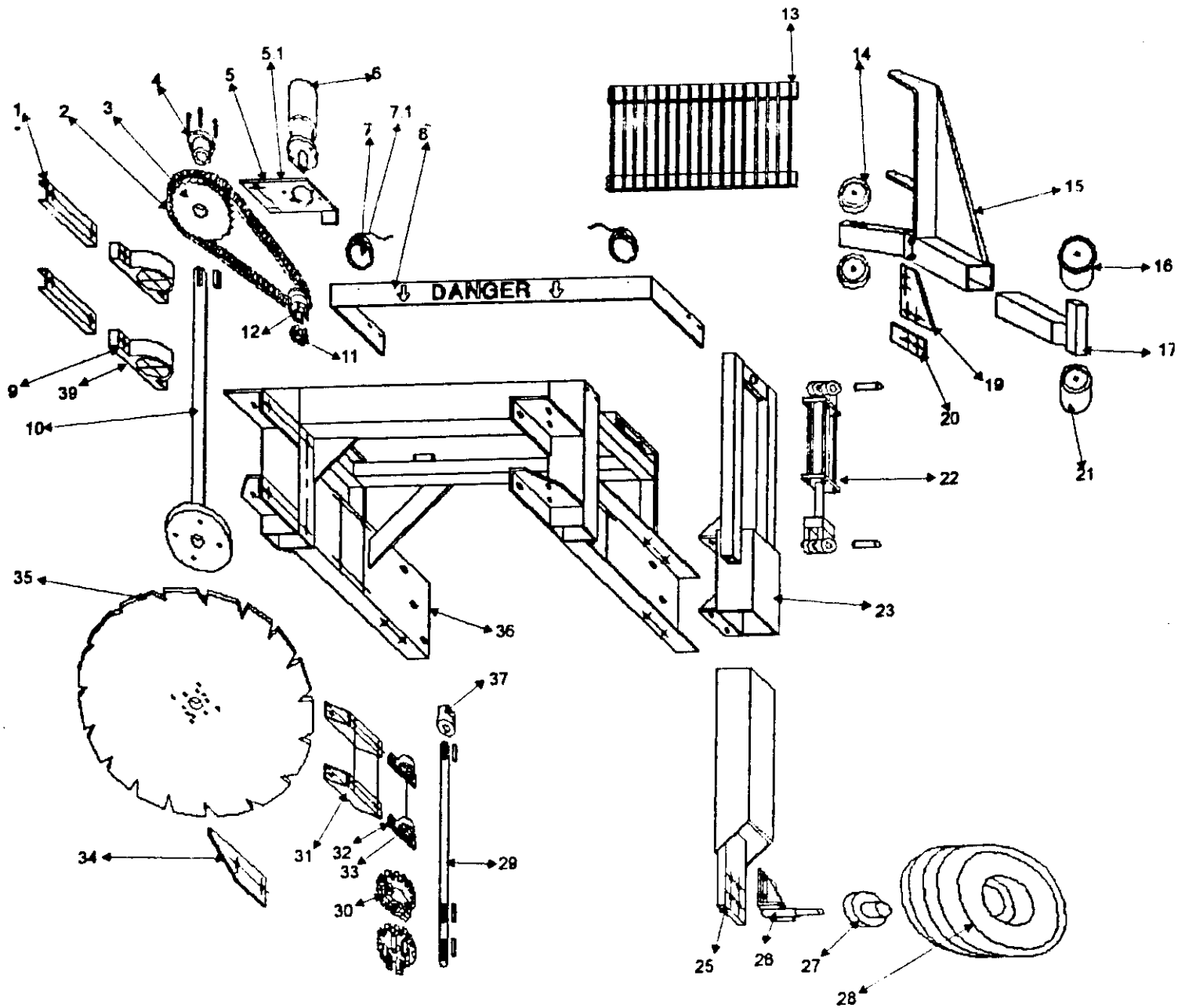
Header Fig. 2
Dirt Vibrator



Diskhead Components

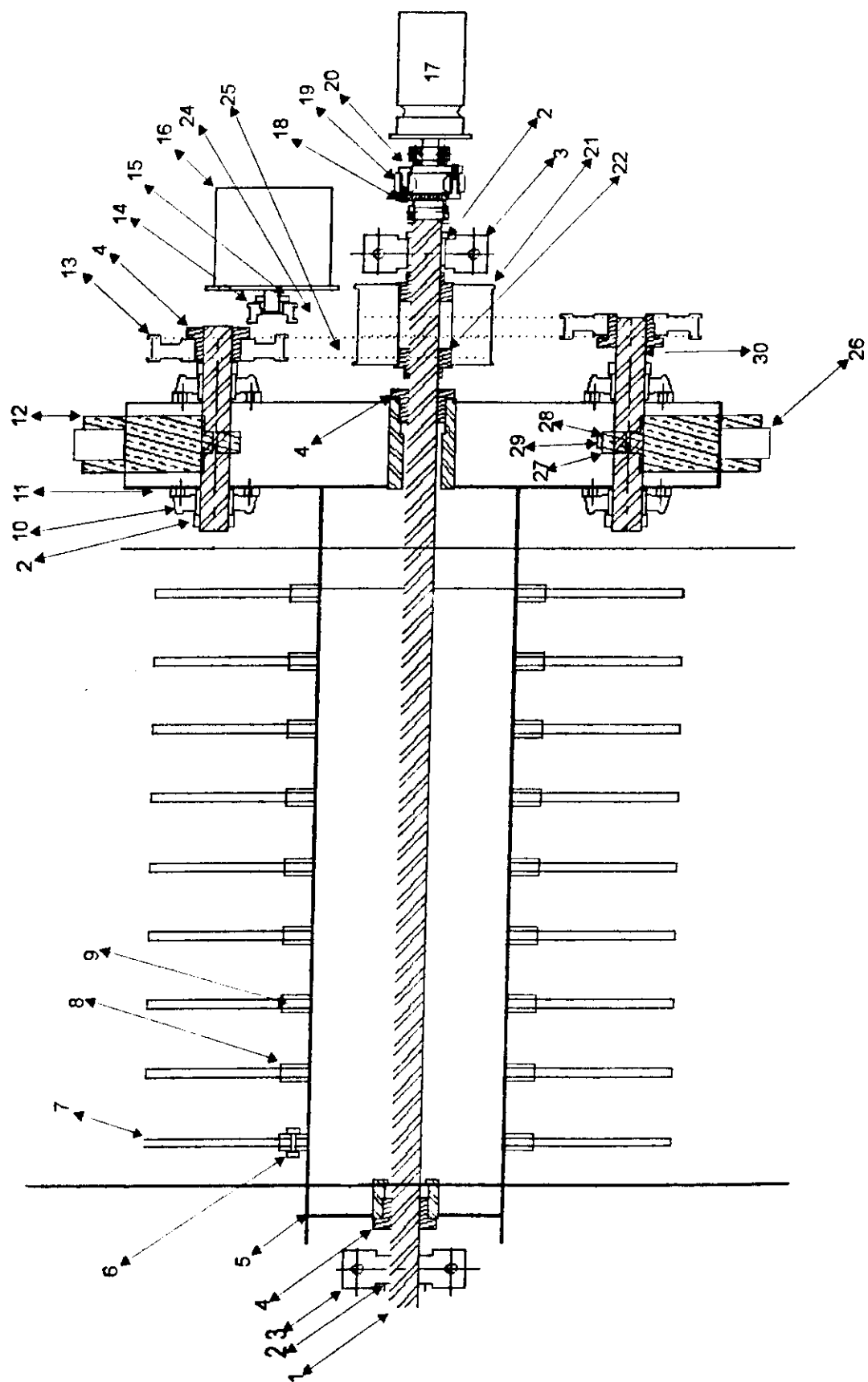
1	192-131s	Disk Bearing Spacer
2	191-143	Chain, Roller 65 links #60 w/master & offset
3	191-133	Disk shaft Sprocket
4	191-133a	Sprocket, Bushing SK x 2 in for 191-133
5	191-108R	Header, Motor mount right
5.1	191-108L	Header, Motor mount left
6	192-118	Hydraulic Motor, Disk drive & Header
7	192-1201	Halogen Lights
7.1	191-1201A	Bulbs, Halogen Lights
8	192-139a	Saftey Bar
9	110-132h	2in Bearing Housing
10	191-131	Disk Shafts
11	110-6055	Coupler, Heavy duty urethane
12	191-231	Coupler, sprocket
13	191-161	Gathering chain, 3/8 bars 12in wide x 60 links
14	110-122	Roller, 4" support Roller
15	193-182	LH Gathering chain frame
15.1	193-183	RH Gathering chain frame
16	191-120HD	Heavy Duty Rollers
17	193-153	LH Nose adjuster assembly
17.1	193-154	RH nose adjuster assembly
19	192-171a	Scraper, adjuster
20	192-171	Scraper, disk
21	192-120NF	Heavy Rollers (No Flange)
22	192-1130	Hydraulic Cylinder 2 x 8
23	193-187	Outer Frame
25	193-186	Inner slider
26	192-199a	Header Wheel Spindle with mount
27	192-199b	Header Wheel Hub Only
28	192-196	Header Wheel Rim & Tire
29	191-155	Shaft, 1 1/4 in 30"
30	191-602	Sprocket, drive HS-3612 1 1/4 bore
31	191-213	Spacers, steel tubing
32	191-203b	Bearings, Stamped steel housing
33	110-203b	Bearing, 1 1/4 Fafnir tri-seal
34	191-142	Lower Disk Scraper
35	192-140-04	Header disk, 34 in notched hard
35	192-140-06	Header disk, 36 in notched hard
36	191-130	Disk header Frame
37	110-6052	Coupler, 1 1/4in. bore
39	110-132a	2in Bearing
NS	191-139	Cover, Shield
NS	192-134-6	Idler, roller chain adjuster

NS	192-199c	Inner Bearing
NS	192-199d	Outer Bearing
NS	192-199e	Spindle Nut
NS	192-199f	Seal
NS	192-199g	Hub cap
NS	192-199h	Inner cup
NS	192-199i	Outer cup



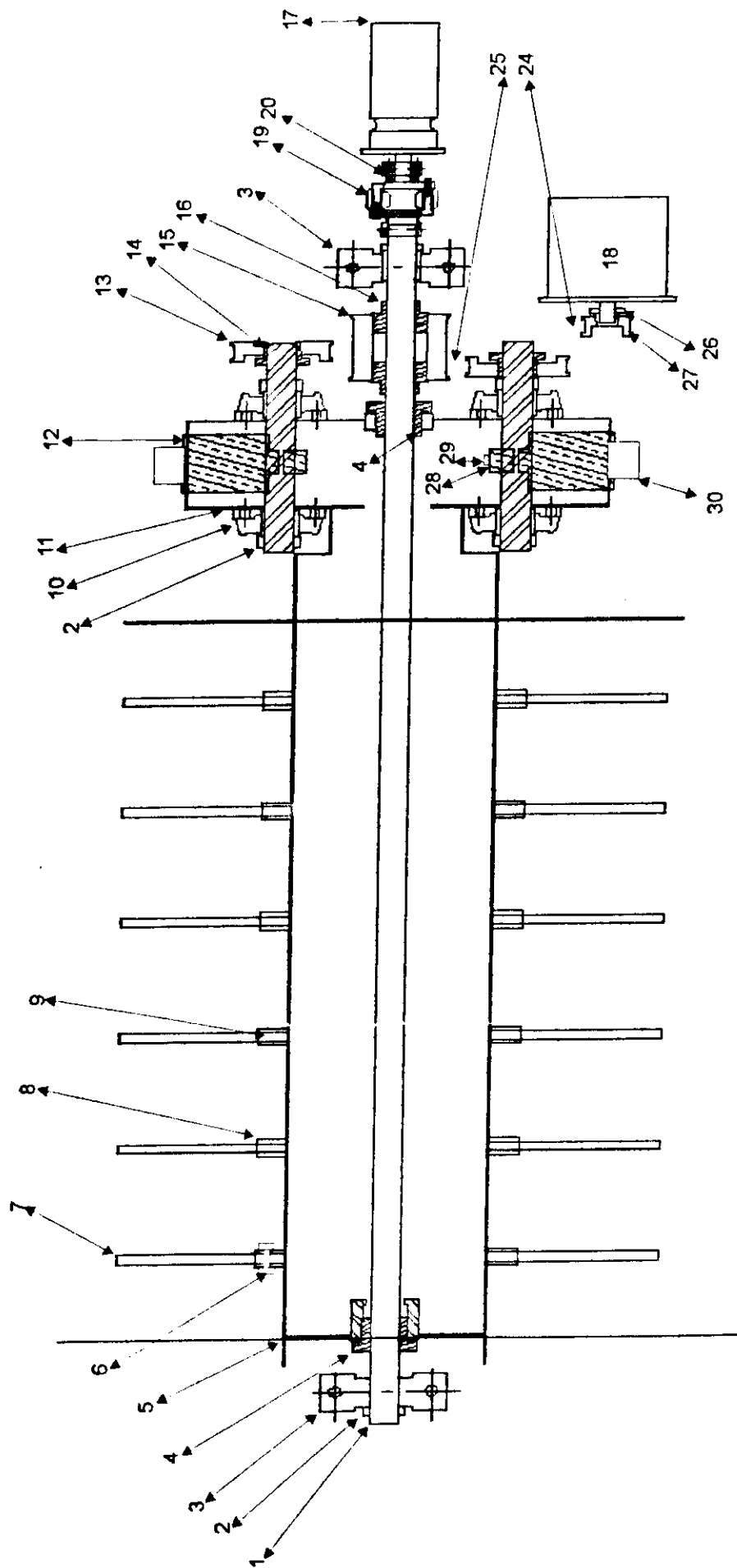
Primary Shaker Components

1	191-400	Shaker main Shaft
2	110-405a	Bearing, Fafnir 1 3/4 Triple seal
3	110-420H	Bearing Housing Main shaker
4	191-406a	Bushings for shaft
5	191-401	Shaker box and drum assembly
6	110-433	Bolt, Tine holder
7	192-430	Shaker tines w/molded plastic covers
8	191-432	Tine holder flanges
9	192-431	Tine holders, rubber
10	110-405H	RCJ Bearing Carrier
11	193-433	Belt adjust flange
12	192-402	Shaker weights and caps
13	191-406	Pulley, Weight shaft, HTD
14	192-414	Pulley, Weight motor, HTD
15	110-414H	Hub for 192-414
16	191-412	Hydraulic motor, Cross 50NH19
17	110-204	Hydraulic Motor
18	191-422b	Coupler Shaker Half
19	191-422	Coupler, Shaker drive rubber insert
20	191-422a	Coupler, Motor half
21	192-409	Pulley, Center Idler, HTD
22	110-410	Bearing, Center sprocket
24	192-408	Belt, Center pulley drive
25	191-407	Belt, Weight drive
26	193-403	Shaker, Weight guards
27	193-402C	Weight Cap (steel)
29	192-402b	Grade 8 Washers 5/8
29	193-402B	Bolt, Grade 8 (5/8 x 3 1/4)
30	193-404	Shaft, Shaker weights
NS	110-414B	Bolt for 110-414H
NS	110-415	Mount, Weight Motor bracket
NS	191-416	Motor mount, rotation



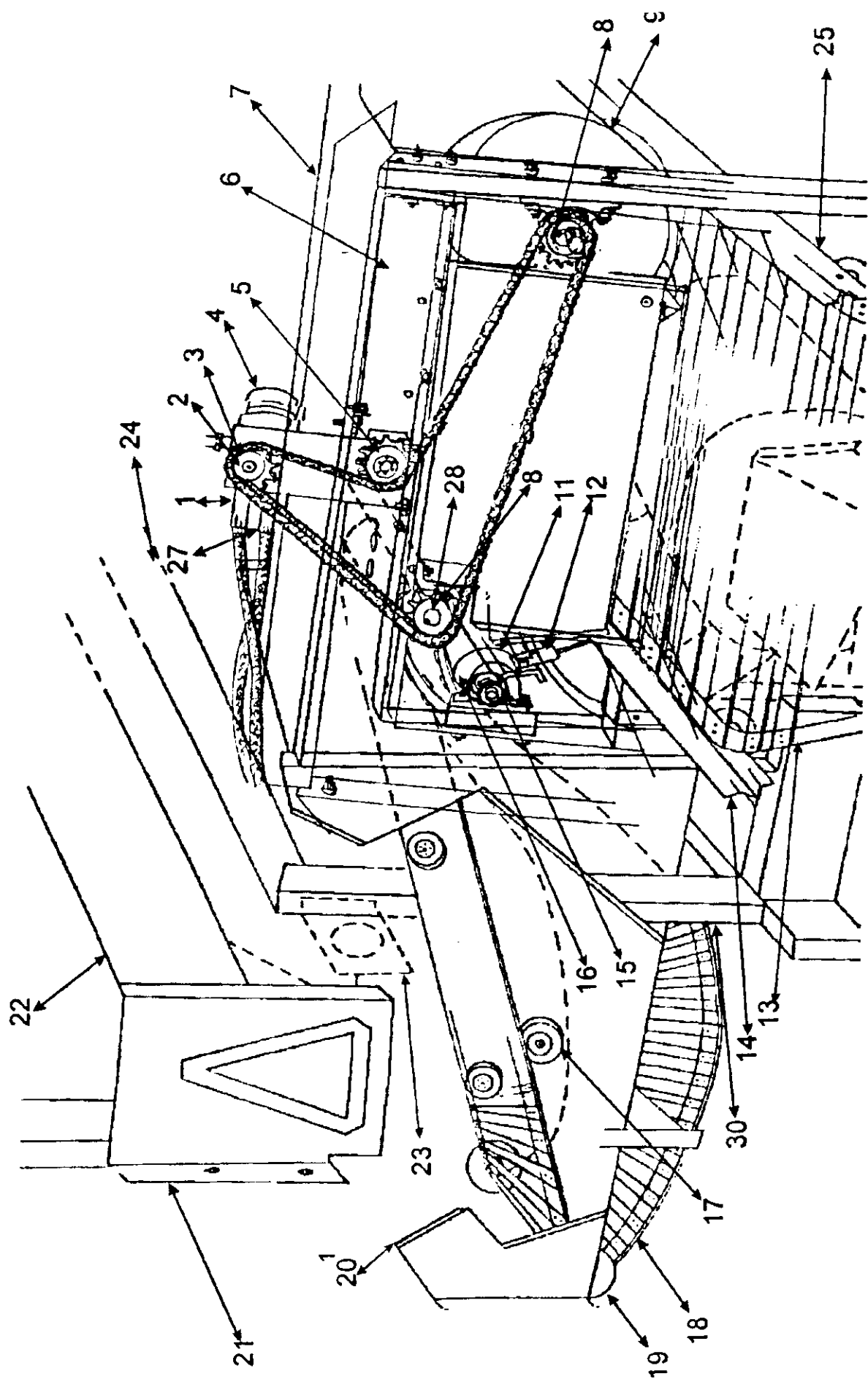
Secondary Shaker Components

1	110-404	Shaft, Shaker weight
2	110-405a	Bearing, Fafnir 1 3/4 Triple seal
3	110-420H	Bearing Housing Main shaker
4	191-406a	Bushings for shaft
5	110-501	Shaker box and drum assembly
6	110-433	Bolts, Tine holder
7	192-430	Shaker tines w/molded plastic covers
8	191-432	Tine holder flanges
9	192-431	Rubber tine holders
10	110-405H	RCJ Bearing Carrier
11	191-433	Belt adjust flange
12	192-502	Shaker weights and caps
13	192-406	Pulley, Weight timing belt
14	192-406a	SDS X 1 3/4 Bushing
15	192-509	Pulley, Center Idler, HTD
16	110-410	Bearings, Center pulley
17	110-204	Hydraulic Motor
18	110-412	Motor, Weight drive
19	110-422	Coupler, Shaker drive rubber insert
20	191-522a	Coupler, Motor half
24	192-408	Belt, Center drive belt
25	192-508	Belt, Weight drive
26	110-414H	Hub for 192-414
27	192-414	Pulley, weight motor
28	192-502b	Grade 8 Washers 1/2
29	192-502a	Weight bolts, 1/2 x 3 1/4 grade 8
30	192-503	Shaker weight guards
NS	110-412r	Seal, Shaker weight motor seal
NS	110-515	Mount, Weight motor bracket
NS	191-516	Motor mount, rotation
NS	192-412r	Hi-Pressure Seal



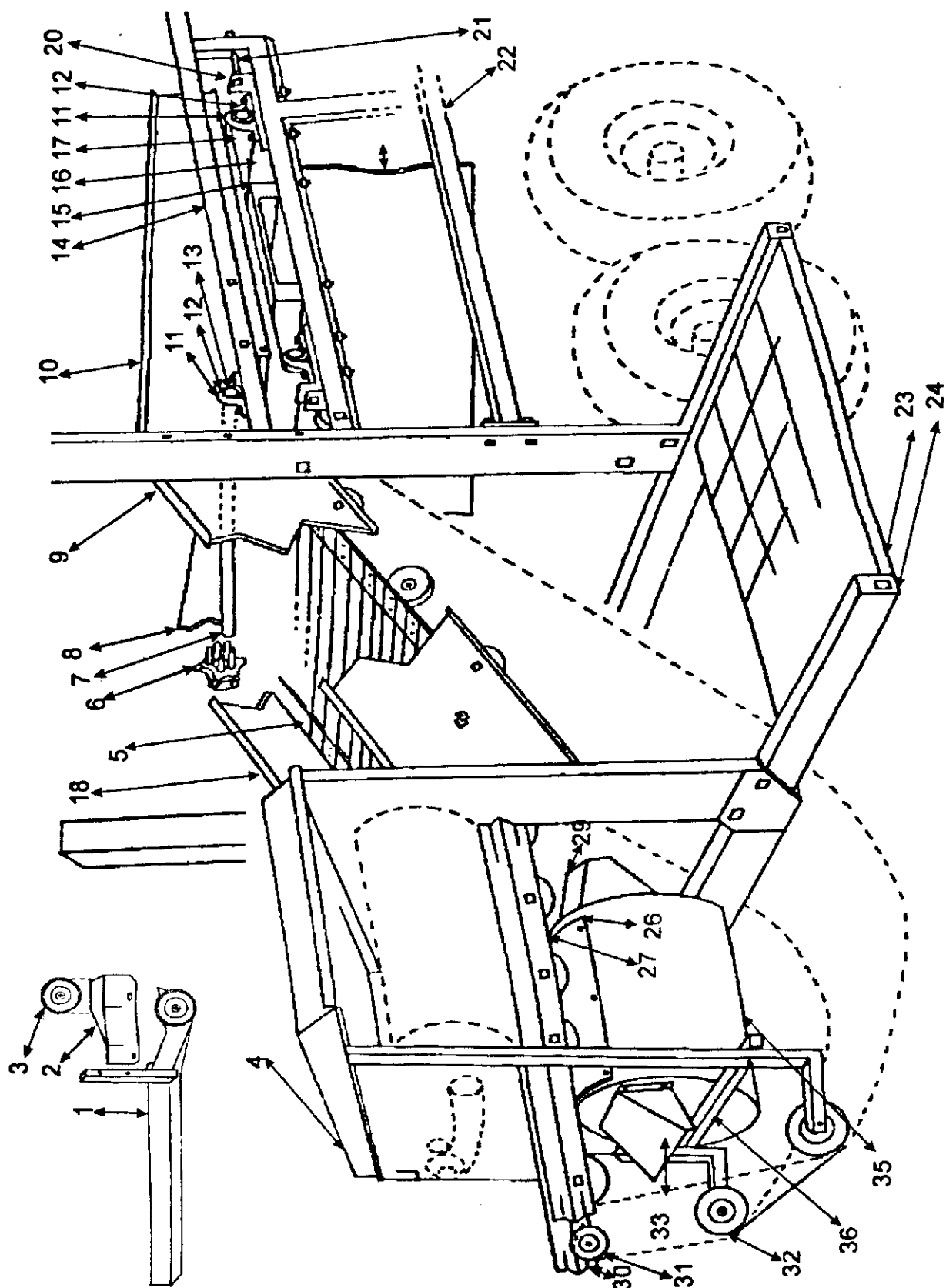
Cross Conveyor Components

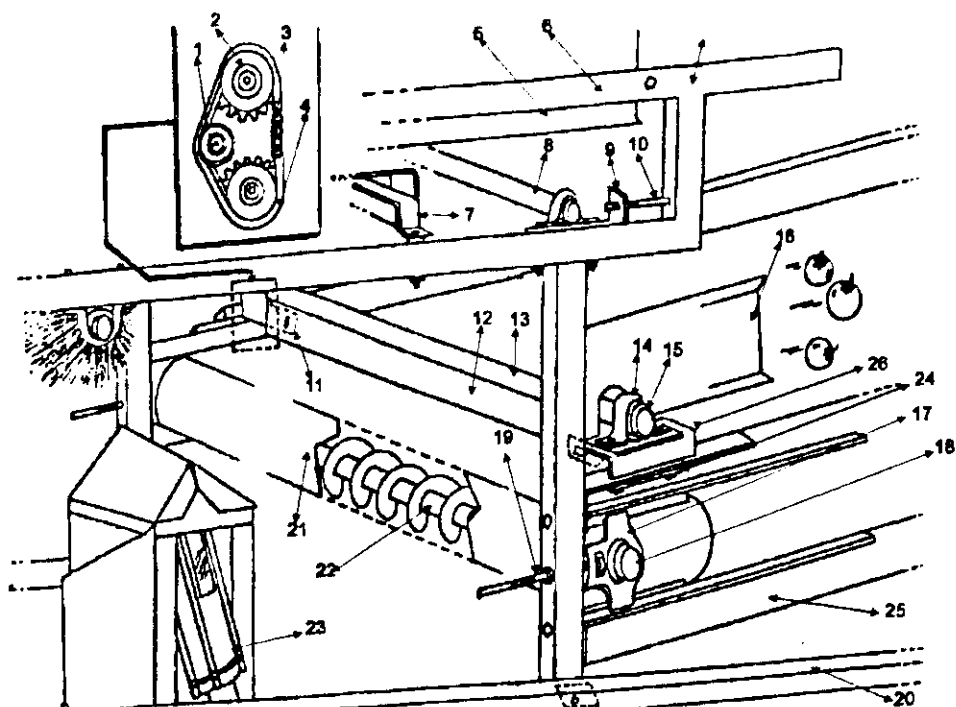
1	193-4g	5/8 in. hose 1/2 x 1/2 x 94 in long
2	192-124	Sprocket, 16 tooth #50 1 in bore
3	192-723	Chain, Debris drum drive, #50 144 links w/master & offset
4	110-204	Hydraulic Motor
5	110-134	Idler, roller chain adjuster
6	191-1136	Debris fan rear mount
7	193-726	Air deflector hood
8	191-124	Sprocket, 16 tooth #50 1 1/4 in bore
9	191-745	Debris Drum
10	192-730	Rear Closure
11	110-610	Roller, Cross conveyer support -cleaner roller
12	110-611	Scraper, roller
13	110-1530	Electronic elevation chain
14	191-737	Roller support (inner)
15	191-611	Spacer blocks for bearing 3/16 x 1 1/2 Tubing
16	110-203b	Bearing, 1 1/4 Fafnir tri-seal
17	110-122	Roller, 4" support Roller
18	110-601	Cross conveyer chain, 7/16 in bars 32in wide 133 links 36mm
19	110-120w	Roller, 8in flange 3 1/2 diameter
20	191-616	Cross conveyer panel, rear
21	191-1141	Shaker shield (rear)
22	191-1140	Shaker shield (side)
23	110-515	Mount, Weight motor bracket
24	191-1133A	Shaker mount, angle (3 x 5 angle)
25	191-738	Roller support (outer)
26	192-614	Motor Mount,Cross Conveyor
27	193-4h	5/8 in. hose 1/2 x 1/2 x 75 in long
28	193-603	Shaft, Drive 1 1/4 x 39
30	191-1133	Shaker mount post, angle (3/8 x 2 1/2 x 3 1/2)
NS	191-602	Sprocket, drive HS-3612 1 1/4 bore
NS	192-724	Shield, Debris drum drive chain
NS	110-122a	Standoff, Roller



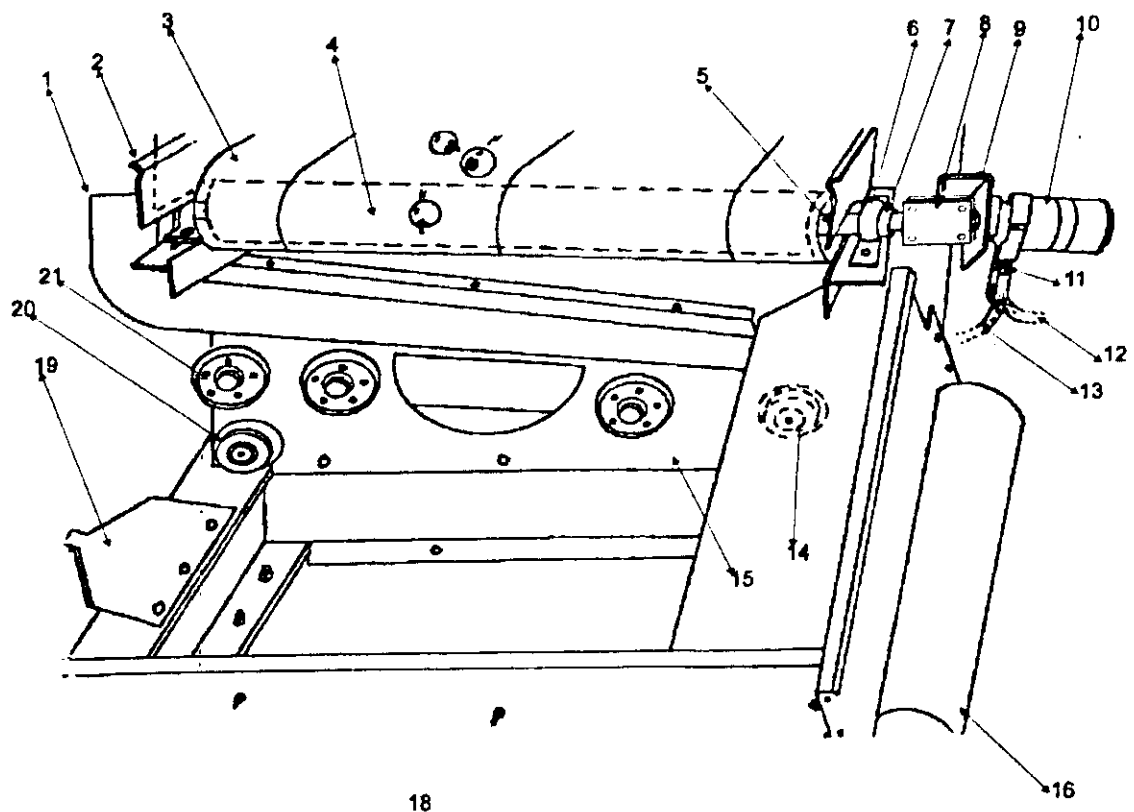
Elevating and Presort Components

1	192-1545	Roller guard outer
2	193-1544	Roller guard inner
3	110-904	Roller, Lower rod chain support
4	193-726	Air deflector hood
5	110-1530	Electronic elevation chain
6	191-602	Sprocket, drive HS-3612 1 1/4 bore
8	193-1554	Presort side panel (left)
9	193-741	Elevation side panel (outer)
10	193-1553	Presort side panel (right)
11	191-203b	Bearings, Stamped steel housing
12	110-203b	Bearing, 1 1/4 Fafnir tri-seal
13	193-603	Shaft, rod chain drive 1 1/4 x 39
14	193-1525	Frame, Presort
15	191-1520	Slider, Endless belt slider bed
16	191-1551	Presort Belt
17	193-1523R	Flat belt pulley, nose (rubber)
18	193-740	Elevation side panel (inner)
23	192-1405B	Deck, Presort, Rear (22 x 28 3/4)
24	193-1401	Deck Slide rear
25	193-1402	Deck Slide front
26	191-732	Fan housing cover
27	191-738	Roller support (outer)
29	191-734	Fan dirt guard (motor side)
30	191-737	Roller support (inner)
31	110-120	Roller, 5" flange 3 1/2 in diameter
32	110-122	Roller, 4" support Roller
33	191-733	Fan dirt guard (rear)
35	191-701	Fan Housing & diffuser
36	191-736	Support, rear debris fan
36	191-1136	Debris fan rear mount
NS	192-703	Fan housing door
NS	192-703a	Rubber latch
NS	110-122a	Standoff, Support roller
NS	110-204	Hydraulic Motor
NS	193-1522	Flat belt pulley, auger type
NS	193-1535b	Small Rubber Latch



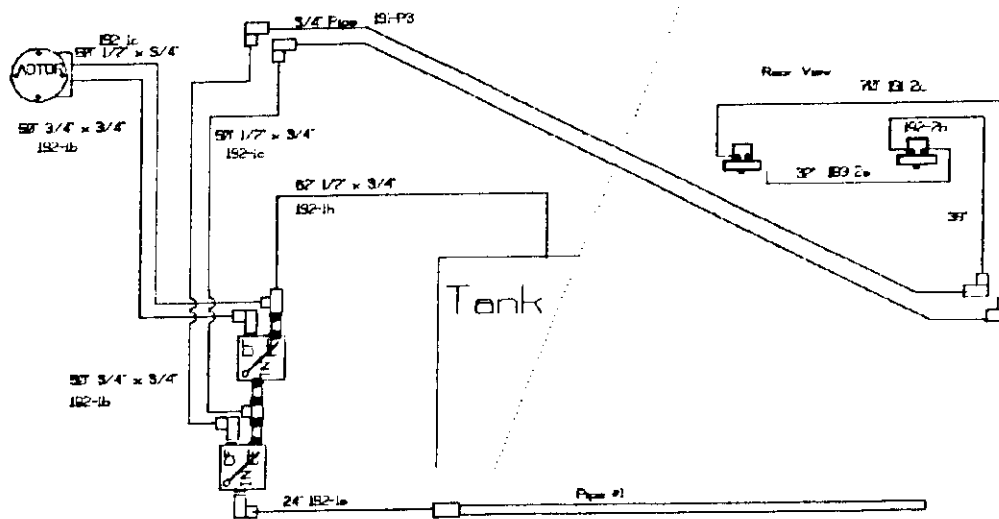


1	110-134	Idler, roller chain adjuster
2	191-124	Sprocket, 16 tooth #50 1 1/4 in bore
4	192-135	Divider bar chain #50 39 links w/ master & offset
5	193-1535	Outer presort shield
6	193-1525	Frame, Presort
7	191-1520	Slider, Endless belt slider bed
8	193-1523R	Flat belt pulley, nose (rubber)
9	192-1528	Bearing adjuster
10	193-850a	Rolling Guard adjuster (3/8 x 9 tap bolt)
11	191-850	Rolling guard scraper bracket
12	193-849	Rolling guard scraper
13	191-848	Rolling Guard, 1 1/4 x 39in long
14	191-203b	Stamped Bearing Housing for 110-203b
15	110-203b	Bearing, 1 1/4 Fafnir tri-seal
16	191-847	Right tomato guard (sort)
17	110-805	Bearings, Sorting table tail pulley adjuster
19	110-807	Sorting table tightener bearing adjusters
20	193-843	Cross bar (over wheel well)
21	193-801E	Sort belt (endless)
22	191-804	Sorting table tail pulley (auger type)
23	191-1130	Hydraulic Cylinder, Frame Leveling
24	191-805	Tapped bracket (2 hole)
25	193-800	Sorting table, main
26	193-127S	Spacer, Tubing (1/8 x 1 1/2 x 4 in long)
NS	191-846	Left tomato guard (sort)
NS	191-1551	Presort Belt
NS	193-1522	Flat belt pulley, auger type
NS	193-1546	Endless belt scraper
NS	193-1560	Electronic Box mount, outer
NS	193-1561	Electronic Box mount, inner

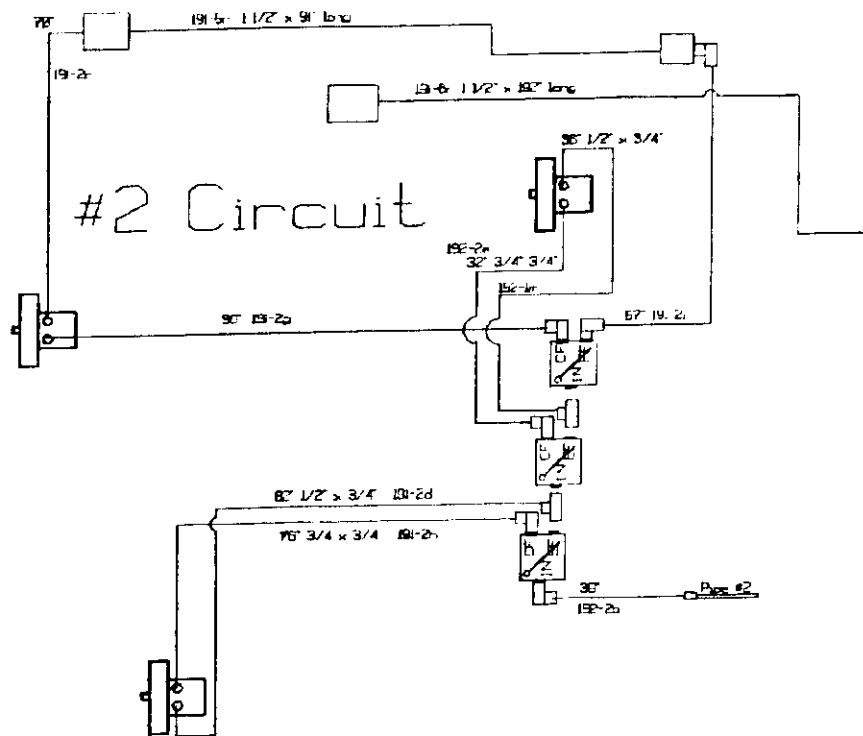


1	191-937	Discharge, Tomato guard rear
2	193-800a	Sorting table, foldup
3	193-801E	Sort belt (endless)
4	110-808	Pulley, Sorting belt drive
6	191-203b	Stamped Bearing Housing for 110-203b
7	110-203b	Bearing, 1 1/4 Fafnir tri-seal
8	193-6053	Solid Coupler
9	193-806	Mount motor
10	110-204	Hydraulic Motor
11	191-15	10MB x 1/2in FPX
12	193-3a	5/8 in hose 1/2 x 1/2 x 88 in long
14	110-120	Roller, 5" flange 3 1/2 in diameter
16	193-925	Back panel / fruit valve
18	193-920	Front Discharge panel
19	191-917	Hydraulic cylinder lower bracket
20	110-904	Roller, Lower rod chain support
21	110-122	Roller, 4" support Roller
NS	193-803	RMV Lacer
NS	193-806a	Motor mount stop
NS	193-806c	Motor Guard
NS	110-122a	Standoff, Support roller
NS	193-920c	Access cover

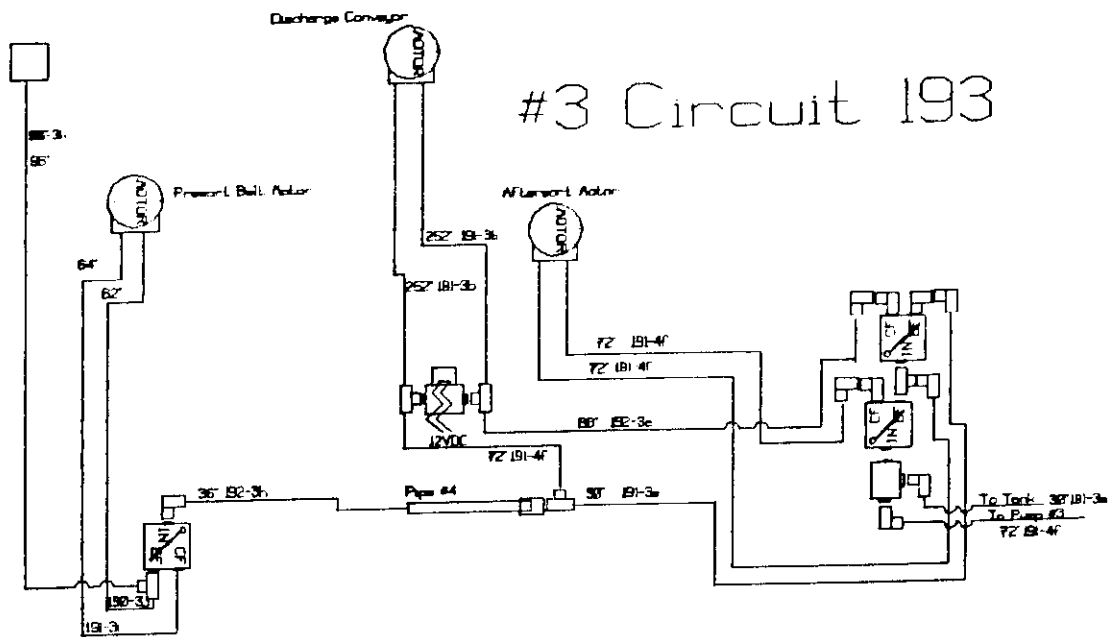
#1 Circuit 92 93



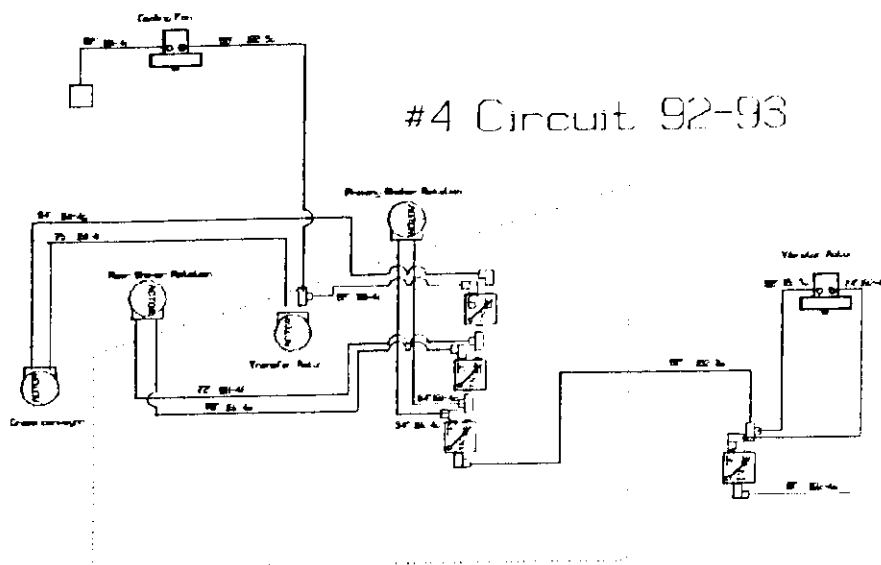
Part #	Qty Used	Description
192-1c	2	3/4 in hose 3/4 x 1/2 x 50 in long
192-1a	1	3/4 in hose 3/4 x 3/4 x 24 in long
193-2e	1	3/4 in hose 3/4 x 3/4 x 32in long
192-2b	1	3/4 in hose 3/4 x 3/4 x 39 in long
192-1b	2	3/4 in hose 3/4 x 3/4 x 50 in long
191-2c	1	3/4 in. hose 3/4 x 3/4 x 70 in long
193-1h	1	5/8 in hose 3/4 x 1/2 x 62 in long
191-12	1	1501-12-12
191-27	2	1603-8-8
191-03	3	6401-10-8
191-034	3	6900-10-12
191-05	6	6901-10-12



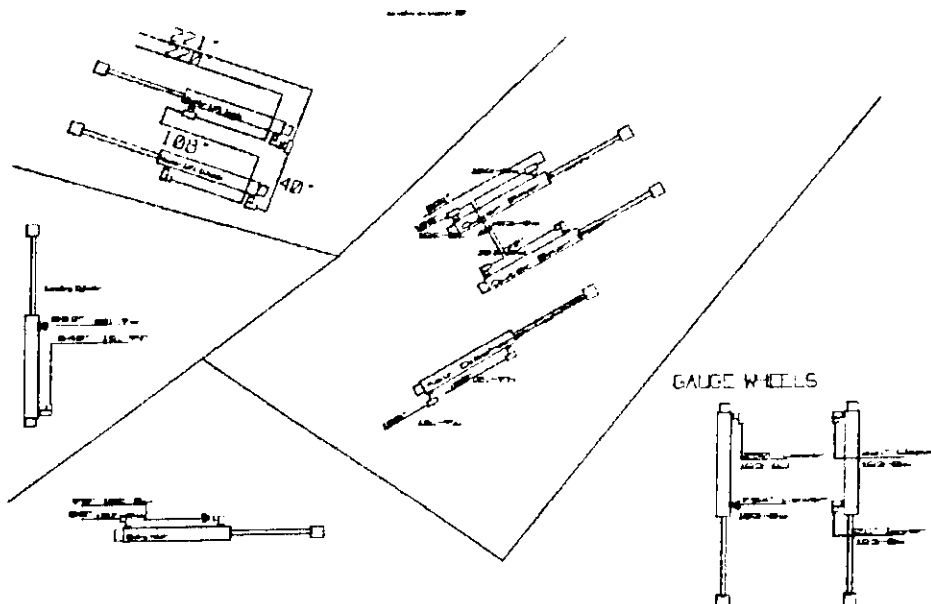
Part #	Qty Used	Description
192-1m	1	3/4 in hose 3/4 x 1/2 x 36 in long
193-2e	1	3/4 in hose 3/4 x 3/4 x 32in long
192-2b	1	3/4 in hose 3/4 x 3/4 x 39 in long
191-2h	1	3/4 in hose 3/4 x 3/4 x 76 in long
191-2g	1	3/4 in hose 3/4 x 3/4 x 96 in long
191-2d	1	3/4 in. hose 3/4 x 1/2 x 82 in long
191-2i	1	3/4 in. hose 3/4 x 3/4 x 57 in long
191-2c	1	3/4 in. hose 3/4 x 3/4 x 70 in long
191-01	2	1404-12-12
191-12	5	1501-12-12
191-03	4	6401-10-8
191-02	6	6405-16-12
191-05	5	6901-10-12
	7.5	1 1/2" Return Hose (per ft.)
	16	1 1/2" Return Hose (per ft.)
	15	3/8" push loc hose (per foot)
	10	3/8" push loc hose (per foot)



Part #	Qty Used	Description
193-4h	1	5/8 in. hose 1/2 x 1/2 x 75 in long
193-3a	2	5/8 in hose 1/2 x 1/2 x 88 in long
193-3h	3	5/8 in hose 1/2 x 1/2 x 36 in long
193-3k	1	5/8 in hose 1/2 x 1/2 x 96 in long
193-3b	2	5/8 in. hose 1/2 x 1/2 x 252 in long
193-3e	1	5/8 in. hose 1/2 x 1/2 x 30 in long
193-4e	2	5/8 in. hose 1/2 x 1/2 x 70 in long
191-20	8	1501-8-8
191-27	5	1603-8-8
191-03	5	6401-10-8
191-15	6	6900-10-8
191-16	5	6901-10-8

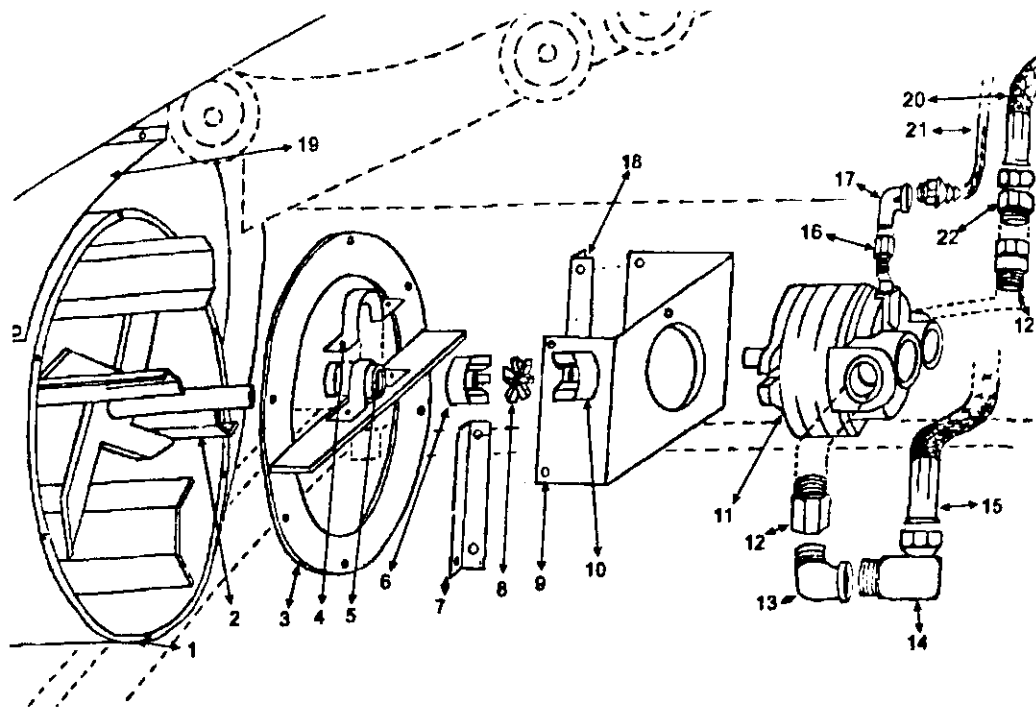


Part #	Qty Used	Description
193-4a	1	5/8 in hose 1/2 x 1/2 x 18 in long
193-4h	1	5/8 in. hose 1/2 x 1/2 x 75 in long
193-3a	2	5/8 in hose 1/2 x 1/2 x 88 in long
193-3h	2	5/8 in hose 1/2 x 1/2 x 36 in long
193-4j	1	5/8 in hose 1/2 x 1/2 x 24 in long
193-3k	1	5/8 in hose 1/2 x 1/2 x 96 in long
193-3e	1	5/8 in. hose 1/2 x 1/2 x 30 in long
191-4i	2	5/8 in. hose 1/2 x 1/2 x 56 in long
193-4e	2	5/8 in. hose 1/2 x 1/2 x 70 in long
191-21	1	1404-8-8
191-20	1	1501-8-8
191-03	6	6401-10-8
191-02	2	6405-16-12
192-02	2	6405-16-8
191-15	6	6900-10-8
191-16	9	6901-10-8
	18	1/4" push loc hose (per foot)
	3	1/4" push loc hose (per foot)

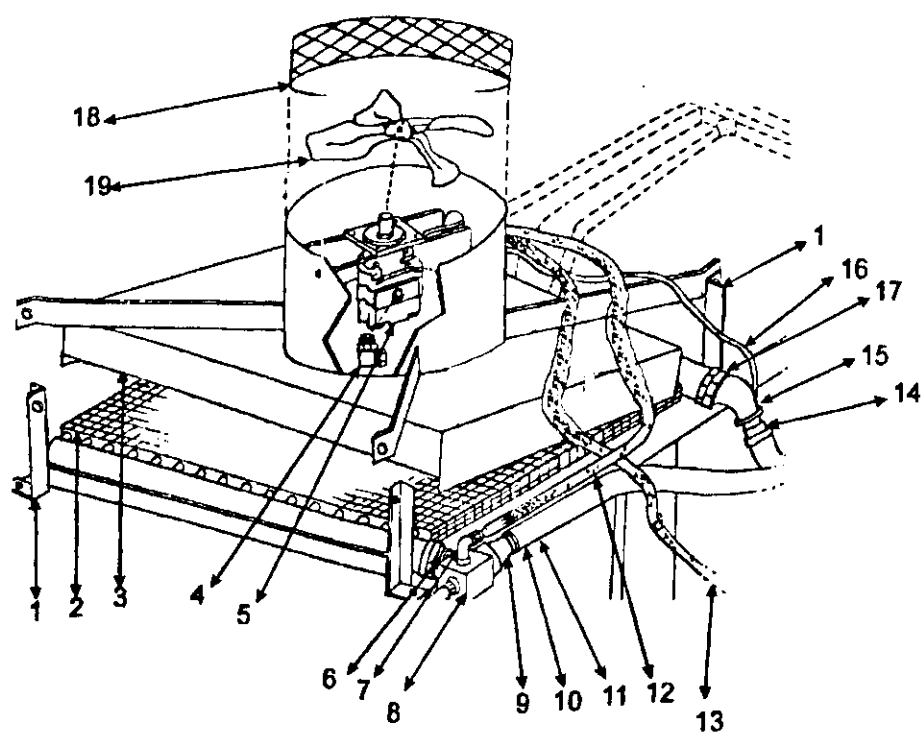


Part #	Qty Used	Description
191-7g	1	1/4 in hose 3/8 x 3/8 x 139 in long
192-7i	1	1/4 in hose 3/8 x 3/8 x 108 in long
193-7a	14	1/4 in hose 3/8 x 3/8 x 160 in long
193-9b	2	1/4 in hose 3/8 x 3/8 x 168in long
191-7a	1	1/4 in hose 3/8 x 3/8 x 200 in long
193-8b	2	1/4 in hose 3/8 x 3/8 x 211 in long
193-8c	2	1/4 in hose 3/8 x 3/8 x 221 in long
191-7e	1	1/4 in hose 3/8 x 3/8 x 232in long
191-7f	1	1/4 in hose 3/8 x 3/8 x 240 in long
193-8a	1	1/4 in hose 3/8 x 3/8 x 254 in long
193-8d	1	1/4 in hose 3/8 x 3/8 x 260 in long
193-9d	2	1/4 in hose 3/8 x 3/8 x 40 in long
193-9c	1	1/4 in hose 3/8 x 3/8 x 60 in long
193-9e	2	1/4 in hose 3/8 x 3/8 x 70 in long
191-20-2	3	1501-6-6
191-36R	4	1501R-6-6-06
191-20-3	8	1601-6-6
191-29	2	6900-8-6
191-28	14	6901-8-6
	2	6901-6-6

Debris Fam Assembly



1	191-701	Fan Housing & diffuser
2	192-702	Fan & paddle assembly
3	191-701a	Access Panel
4	191-203b	Stamped Bearing Housing for 110-203b
5	110-203b	Bearing, 1 1/4 Fafnir tri-seal
6	110-6052	Coupler, 1 1/4in. bore
7	192-704B	Motor mount, Bottom
8	110-6055	Coupler, Heavy duty urethane
9	192-704	Mount, Fan Motor
10	110-7081	Coupler, 7/8 bore
11	110-412	Motor, Fan drive
12	191-02	16MB x 3/4 in FP Solid
13	191-07-3	3/4 NPT ST. ELL
14	191-12	3/4 MP x 3/4 FPX90
15	191-2d	3/4 in. hose 3/4 x 1/2 x 82 in long
16	191-02-2	1/2 - 20 X 1/8 FP
17	191-09-3	1/8 NPT 90 w/push-loc end
18	192-704T	Motor mount, Top
19	191-732	Fan housing cover
20	191-2h	3/4 in hose 3/4 x 3/4 x 76 in long
21	191-6	1/4 in push-loc hose per ft
22	191-01	3/4 MP x 3/4 FPX



1	110-1017	Mount, Oil cooler support brackets
2	110-1015	Hydraulic, Oil cooler radiator
3	110-1016	Hydraulic, Oil cooler shroud
4	191-16	10MB x 1/2 in FPX90
5	192-1020	Cooling Fan Motor
6	193-23	1 1/2" nipple
7	191-07-2	1/2 NPT ST ELL
8	193-1021	Side outlet Tee
8	193-26f	1 1/2 x 1/2 Bushing
8	193-26g	1 1/2 X 3/4 Bushing
9	191-45	1 1/2 NPT to 1 1/2 hose barb adaptor
10	193-1029	T Bar Hose Clamp 2 in
11	191-6r	1 1/2 in Return hose 192 in.
12	191-4i	5/8 in. hose 1/2 x 1/2 x 56 in long
13	193-3a	5/8 in hose 1/2 x 1/2 x 88 in long
14	191-5r	1 1/2 in Return hose 91 in. 1 1/2 x 1 1/2
15	191-07-9	1 1/2 ST ELL
16	191-6	1/4 in push-loc hose per ft
17	191-11-9	2 x 1 1/2 bushing
18	191-1082	Cooling Fan Cover
19	192-1019	Cooling fan

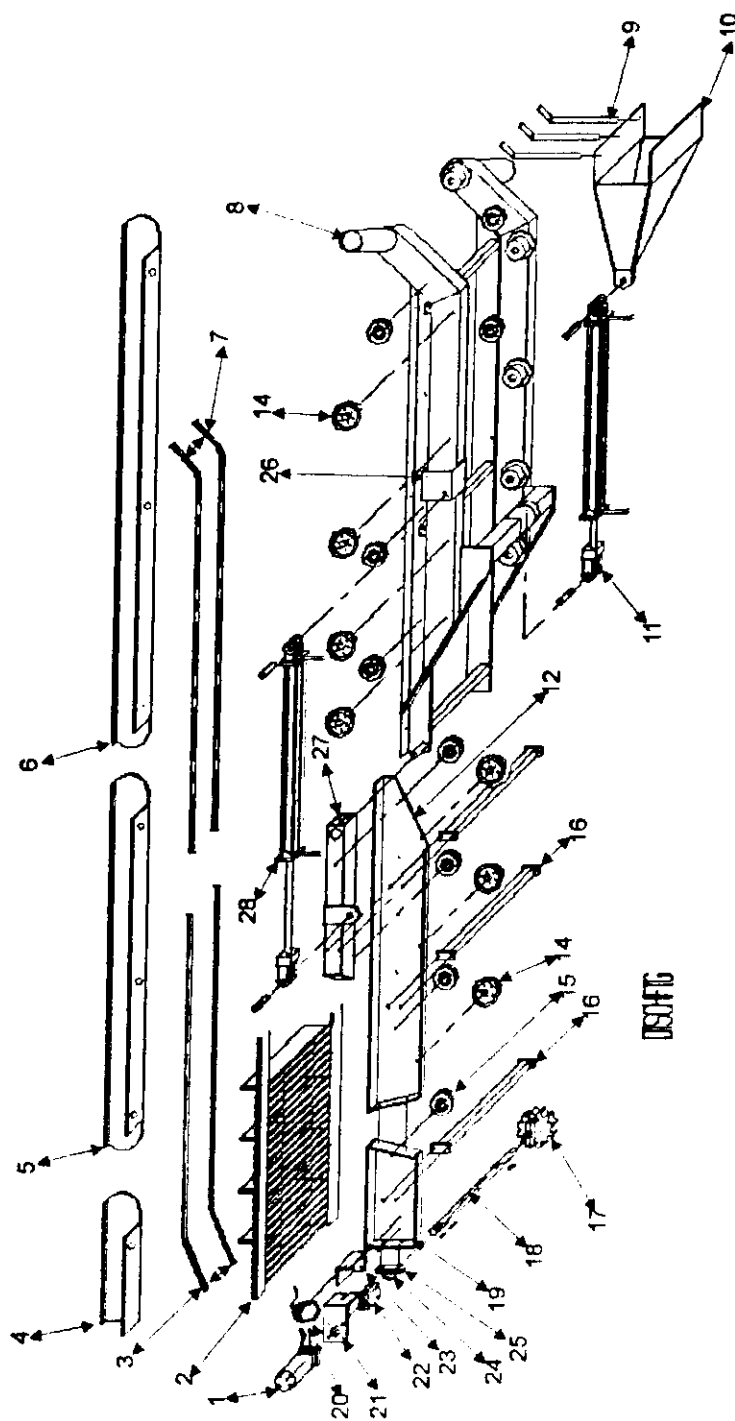
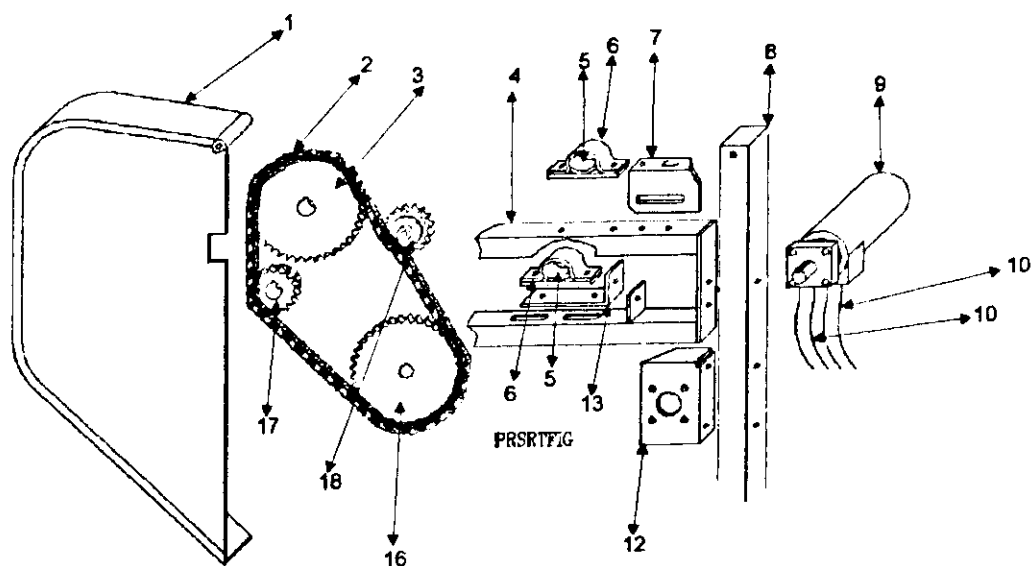


FIG. 1

Discharge Conveyor

NS	110-122f	Standoff/Spacer .520 x 1.375 x .250
NS	191-938	Tarp cover
NS	193-806c	Motor Guard
1	110-204	Hydraulic Motor
2	191-903	Discharge chain with flights (9mm bars 20in wide 307 link)
4	191-910-1	Outer-extendion, front
4	191-910-2	Outer- extendion, rear
5	191-909	Mid-extendion, (same forward and rear)
6	191-907	Lower Extendion, (same forward and rear)
8	192-901	Frame, Main with cylinder mount
10	193-918	Cylinder bracket frame
11	110-916	Hydraulic lift cylinder 2 1/2 in x 30 in
12	193-902-1	Frame, Mid boom, forward
12	193-902-2	Frame, Mid boom, rear
14	110-904	Roller, Lower rod chain support
15	110-122	Roller, 4" support Roller
16	192-902-5	Crossbar
17	191-602	Sprocket, drive HS-3612 1 1/4 bore
18	110-911	Shaft, Drive shaft 1 1/4 x 26 7/8
19	193-902-3	Frame, Outer boom,forward
19	193-902-4	Frame, Outer boom, rear
20	192-1201	Halogen Lights
21	193-806	Mount motor
22	193-6053	Solid Coupler
23	193-915	Motor mount stop/ light bracket
24	110-203b	Bearing, 1 1/4 Fafnir tri-seal
25	191-203b	Stamped Bearing Housing for 110-203b
26	192-907	Lower cylinder mount (same front and rear)
27	192-905	Cylinder mount, forward
27	192-906	Cylinder mount, rear
28	192-102	Hydraulic cylinder 2 x 24

Presort Drive



1	193-1533	Shield, Drive chain
2	193-1532	Chain, endless belt drive 88 links #50 w/ connecting link
3	192-1531	Sprocket, Pre-sort belt drive
4	193-1525	Frame, Presort
5	110-203b	Bearing, 1 1/4 Fafnir tri-seal
6	191-203b	Stamped Bearing Housing for 110-203b
7	193-1527	Drive chain adjuster bracket
8	193-1526A	Spacer post, Inner
9	110-204	Hydraulic Motor
10	193-4f	5/8 in. hose 1/2 x 1/2 x 72 in long
12	193-1524	Motor Mount, Elevating Chain
16	193-1531	Motor sprocket
17	191-124	Sprocket, 16 tooth #50 1 1/4 in bore
18	192-134-5	Idler #50 Chain