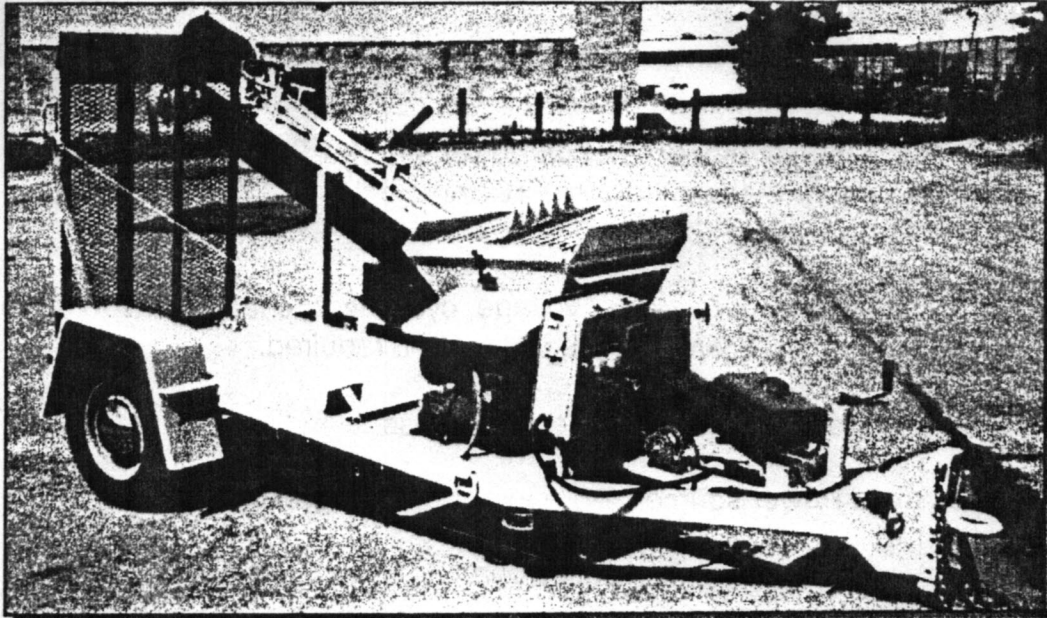


RFI CONSTRUCTION PRODUCTS

Parts and Instruction Manual



Predampener and Mixer

Model: _____

Serial No.: _____

Power: _____

RFI

CONSTRUCTION PRODUCTS

DIVISION OF CANGRO INDUSTRIES, INC.

495 Smith St., Farmingdale, N.Y. 11735-1186

Tel 631-752-8899

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SAFETY

A. This machine has more than one power supply. Disconnect all Power Supplies (air or electric) before servicing machines. Power to be OFF at main control panel.

1. ELECTRIC – check for voltage, cycles and phase
2. AIR – check for pressure and C.F.M. required.

B. Turn over Bag Cutter Grate when not in use.

C. Disconnect Power source before working on augers.

D. Do not remove sprocket or pulley guards unless power is OFF and machine is fully stopped.

E. Do not open main Rubber Trough or Cleanout Door, unless power is OFF and machine is fully stopped.

F. Do not replace Motor V-belts or chain unless Power is shut-off at machine and main panel, and machine is fully stopped.

G. When cleaning machine always wear protective hand and eye gear.

ORDERING PARTS

To receive quick and better service when ordering parts, follow these instructions:

1. Specify quantity wanted.
2. State, part number and description.
3. State model and serial number of machine (see nameplate).
4. Specify your shipping preference.

ELECTRICAL REQUIREMENTS

Extension cord size is very important for proper performance of Predampener. Smaller wire size will cause the thermal overload protection to kick out prematurely. Each model is supplied with a 3 foot cord.

CHECK VOLTAGE, CYCLES AND PHASE BEFORE STARTING

The 220/440 volt, three phase, 60 cycle models have a four wire cord, black, white, red and green. Black, white and red leads attach to line leads on plug. The green lead goes to ground. FOR SAFETY, THE GROUND WIRE MUST BE CONNECTED. DO NOT DEVIATE.

AIR MODEL REQUIREMENTS

Air line size for proper C.F.M. to Predampener is important. 1 1/2" I.D. hose must be maintained at the hose connection on the Predampener. For every 50 feet of hose, from air supply, increase one size.

For full performance of the Predampener – 300 C.F.M. air at 100 P.S.I.

ELECTRIC PREDAMPENER

Electric Controls

There are two breakers which give overload protection and operate the Mixing Auger and Feed Auger.

The breaker marked MIXING AUGER supplies power to the Mix Auger Motor only. The breaker marked FEED AUGER supplies power to the Feed Auger Motor and the Spray Bar Solenoid.

AIR PREDAMPENER

Air Controls – Valves

MIXING AUGER

1. 1 1/2" Ball Valve main air source
2. 1" Filter
3. 1" Lubricator
4. 1" Pressure Regulator
5. 1" Globe Valve

FEED SYSTEM

1. 1 1/2" Ball Valve main air source
2. 1/2" Filter
3. 1/2" Lubricator
4. 1/2" Pressure Regulator
5. 1/2" Needle Valve

OPERATION ELECTRIC

Items to check before starting:

1. Make sure proper power source is plugged in. Check power label on main control box.
2. Check for proper rotation of auger by turning Feed System and Mix Auger to ON position.
3. After you are satisfied rotation is correct, shut the Feed System Switch to OFF.
4. Load material in Feed Hopper.
5. Open needle valve on Spray Bar 1/2 turn.
6. Start 9" Mix/Convey Auger and always keep it running. Control your material output by the 6" Feed Auger. Always clear 9" auger of material before stopping, because you could knockout the motor fuse protectors. To re-start wait a few minutes and push reset.
7. Start the 6" Feed Auger System.
8. Adjust the feed rate by adjusting the Feed Auger Varidrive.

DO NOT ADJUST THE VARIDRIVE SPEED UNLESS IT IS RUNNING.
DAMAGE WILL OCCUR.

9. Adjust the moisture by increasing or decreasing needle valve on Water Bar.

OPERATION AIR

Items to check before starting:

CAUTION: IF YOUR AIR SOURCE IS ABOVE 150 P.S.I. YOU MUST INSTALL AN AIR REGULATOR IN YOUR SUPPLY LINE TO ADJUST PRESSURE TO 100 P.S.I.

1. Connect 1 1/2" air hose to main inlet.
2. Connect water hose to Spray Bar.
3. Close the 1/2" ball valve to the 6' Feed Auger Motor.
4. Close the 1" globe valve to the 9" Mix Auger Motor.
5. Open the 1 1/2" air inlet ball valve. Air pressure on 1" Air Regulator to Mix Auger should read 100 P.S.I. on the gauge (1" Regulator). Adjust the Regulator to read 100 P.S.I.
6. After setting Mixing Auger Air Regulator set the Feed Auger Regulator to 85 P.S.I.
7. Adjust the Mix Auger speed by opening the 1" globe valve to the Air Motor. Set the speed to 250 R.P.M. with no material in the Mix Auger.
8. With the Mix Auger running, open the 1/2" ball valve to the Feed Bin Auger. DO NOT shut mix auger down.
9. By opening the 1/2" ball valve the Air Operated Water Solenoid Valve is activated to open position.
10. Open 1/2" needle valve to Feed Auger Motor until Auger is turning about 25 R.P.M.
11. Open 1/2" needle valve on Spray Bar until just a trickle of water is flowing out of manifold.
12. Close the 1/2" ball valve to Feed Motor.
13. Load material in Feed Bin.
14. Open 1/2" ball valve to Feed Motor.
15. Adjust Feed Motor 1/2" needle valve and water 1/2" needle valve to the discharge rate desired.

WATER SPRAY BAR ASSEMBLY

When predampering it is important that the water pressure be constant, for a uniform dampness of mix. A water booster pump is recommended when pressure is below 40 lbs.

Taking a few minutes on each job to check water flow and pressure will save manhours of continually adjusting the needle valve when operating.

In some areas, where water pressure fluctuates at any given time, it is advisable to install a water flow meter and booster pump.

When predampering or mixing castable, the water pressure and G.P.M. is the most important part of the operation. Without consistent water to the spray bar, the operator will be constantly adjusting the needle valve and ending up with a wet and dry mix.

MAINTENANCE

There are four bearings on the Predampener:

1. Mixing Auger Top Bearing – Daily
2. Mixing Auger Bottom Bearing – Weekly
3. Feed Auger Drive Side Bearing – Weekly
4. Feed Auger Free End Bearing – Weekly

A couple of shots of medium grease is all that is needed for each bearing.

The mixing auger motor and feed auger motors are sealed. Bearings require no lubrication.

The mixing auger gearbox should be drained and flushed every 500 hours. Refill with S.A.E. 30. Capacity – 1/2 quart.

The varidrive gearbox should be drained and flushed every 500 hours. Refill with S.A.E. 90.

To fill gearboxes to correct level remove top plug and middle plug. Pour oil in until oil reaches middle plug hole. DON'T OVERFILL.

Air motor lubricators should maintain full level of S.A.E. 10 weight detergent oil.

ELECTRIC PREDAMPENER

Electric Controls

There are two breakers which give overload protection and operate the Mixing Auger and Feed Auger.

The breaker marked Mixing auger supplies power to the Mix Auger Motor only. The breaker marked Feed Auger supplies power to the Feed Auger Motor and the Water Bar Solaroid.

ELECTRIC PREDAMPENER PARTS LIST

When ordering parts give Serial # of Predampener

ELECTRICAL CONTROLS

| | |
|-----------------|-----------------------------|
| 2000-311 | Main control box |
| 2000-312 | Remote control box (option) |
| 2000-313 | Feed auger switch |
| 2000-314 | Conveyer auger switch |
| 2000-315 | E-stop switch |
| 2000-316 | Power-on light |
| 2000-317 | Main on/off switch |

TRAILER

| | | | |
|-----------------|--------------------------|-----------------|---------------------|
| 2000-411 | Wheel assembly | 2000-421 | Spring U bolts |
| 2000-412 | Tire | 2000-422 | Spring bushings |
| 2000-413 | Axle complete | 2000-423 | Tow hitch |
| 2000-414 | Axle | 2000-424 | Tongue jack |
| 2000-415 | Spindle bearing inner | 2000-425 | Tail light assembly |
| 2000-416 | Spindle bearing outer | 2000-426 | Rear swivel jack |
| 2000-417 | Spindle nut | 2000-427 | Hand winch |
| 2000-418 | Spindle retaining washer | 2000-428 | Winch pulley |
| 2000-419 | Seal | 2000-429 | Safety chain (2) |
| 2000-420 | Springs | 2000-430 | Tool box |

SPRAY BAR

| | |
|-----------------|-------------------------------------|
| 2000-511 | Spray bar complete |
| 2000-512 | Ball valve 1/4" (4) |
| 2000-513 | Spray nozzle tip #3009 (4) full jet |
| 2000-514 | Axle |
| 2000-515 | Spindle bearing inner |
| 2000-516 | Needle valve |
| 2000-517 | Solenoid valve |

ELECTRIC PREDAMPENER PARTS LIST

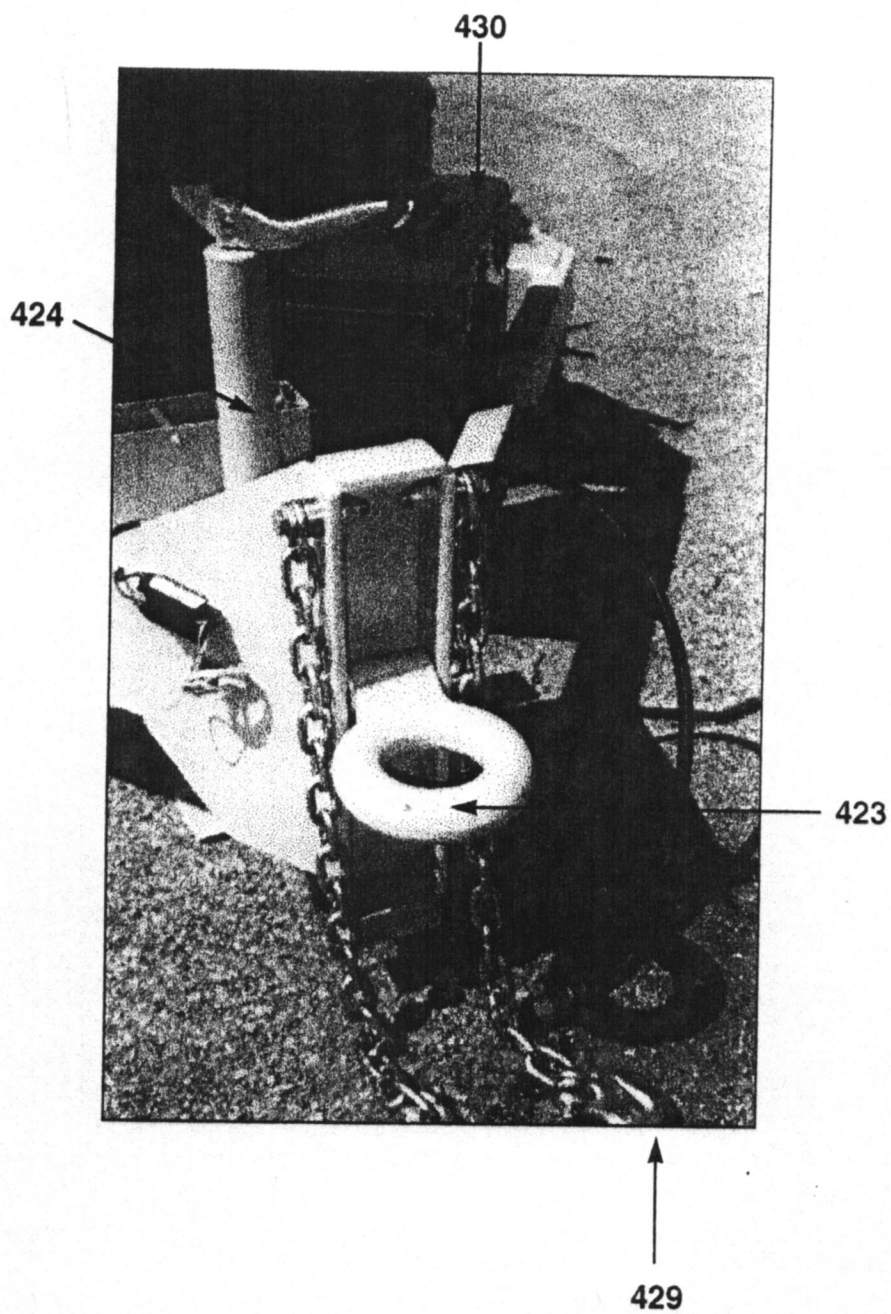
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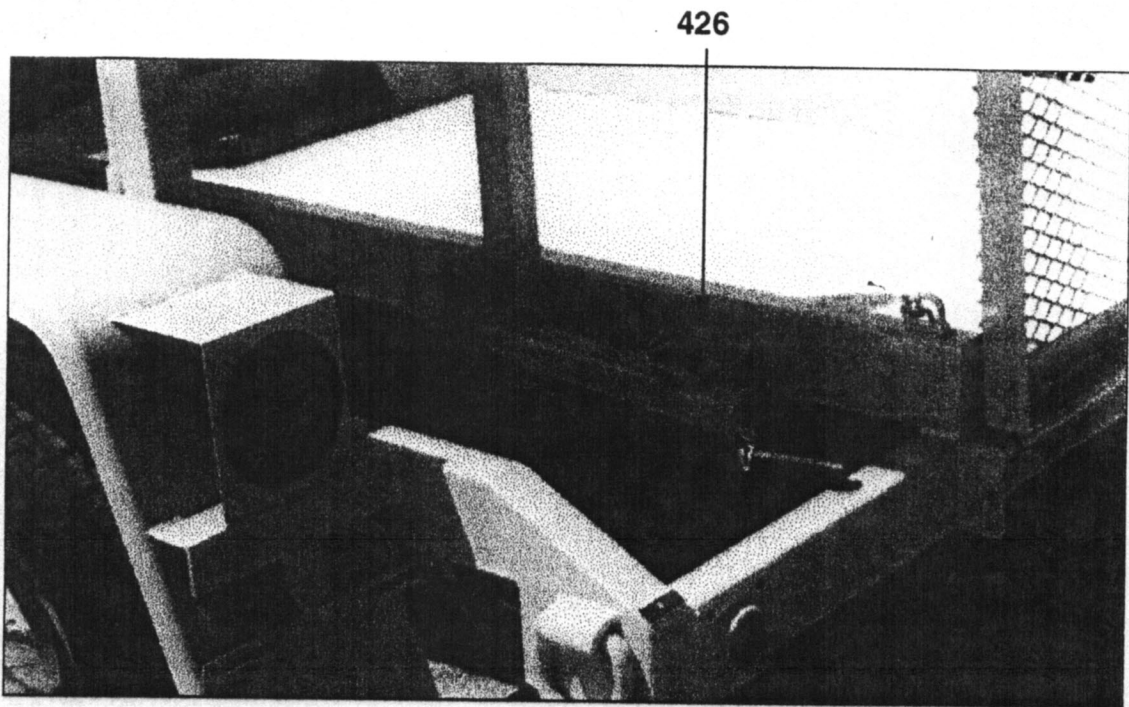
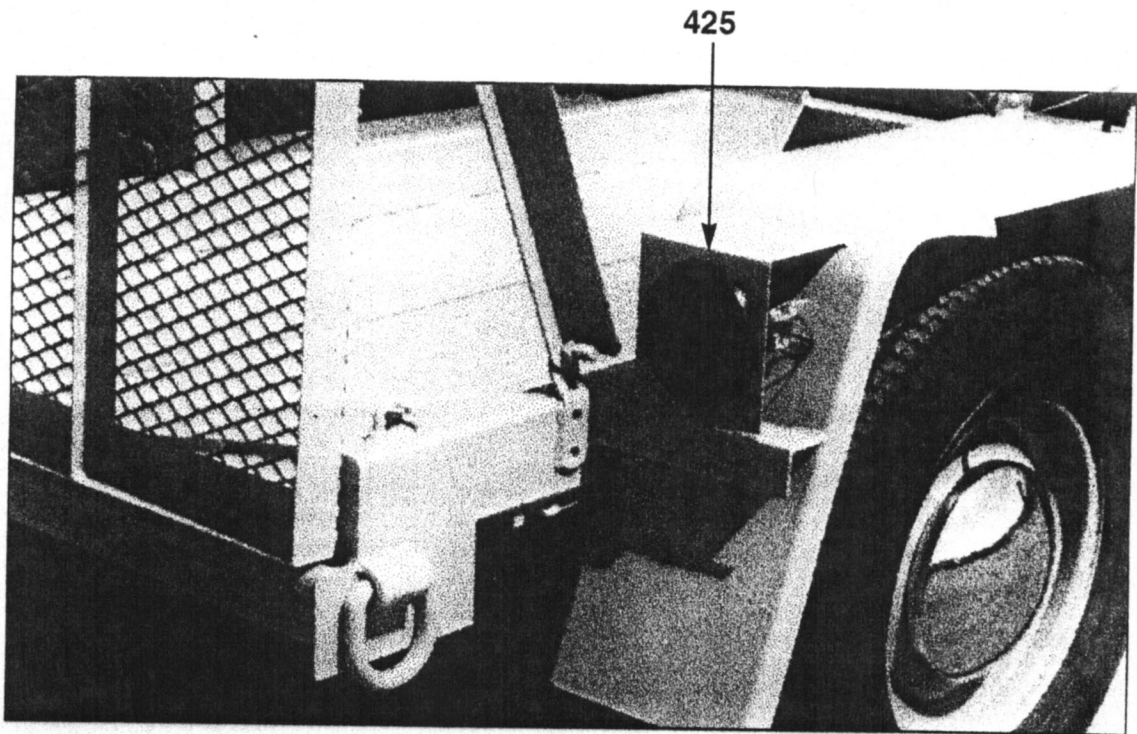
MIXING AUGER PARTS – ELECTRIC DRIVE

| | |
|------------------|-----------------------------------|
| 2000E-111 | Mixing auger |
| 2000E-112 | Drive motor |
| 2000E-113 | Gear box |
| 2000E-114 | Drive V Belts (2) |
| 2000E-115 | Bearing (Drive End) |
| 2000E-116 | Bearing (Bottom) |
| 2000E-117 | Mix auger tough (rubber) |
| 2000E-118 | Trough handle (2) swivel |
| 2000E-119 | Tension bolt, gear box |
| 2000E-120 | Drive sheave (Motor) |
| 2000E-121 | Driven sheave (Gear Box) |
| 2000E-122 | Tension bolts – rubber trough (3) |

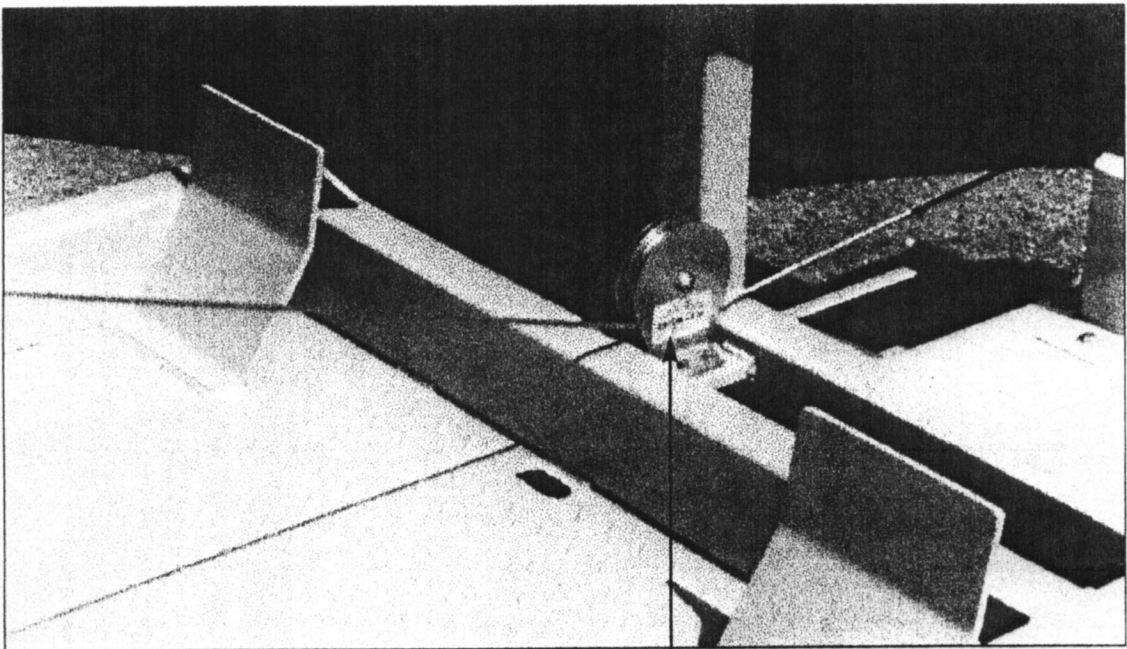
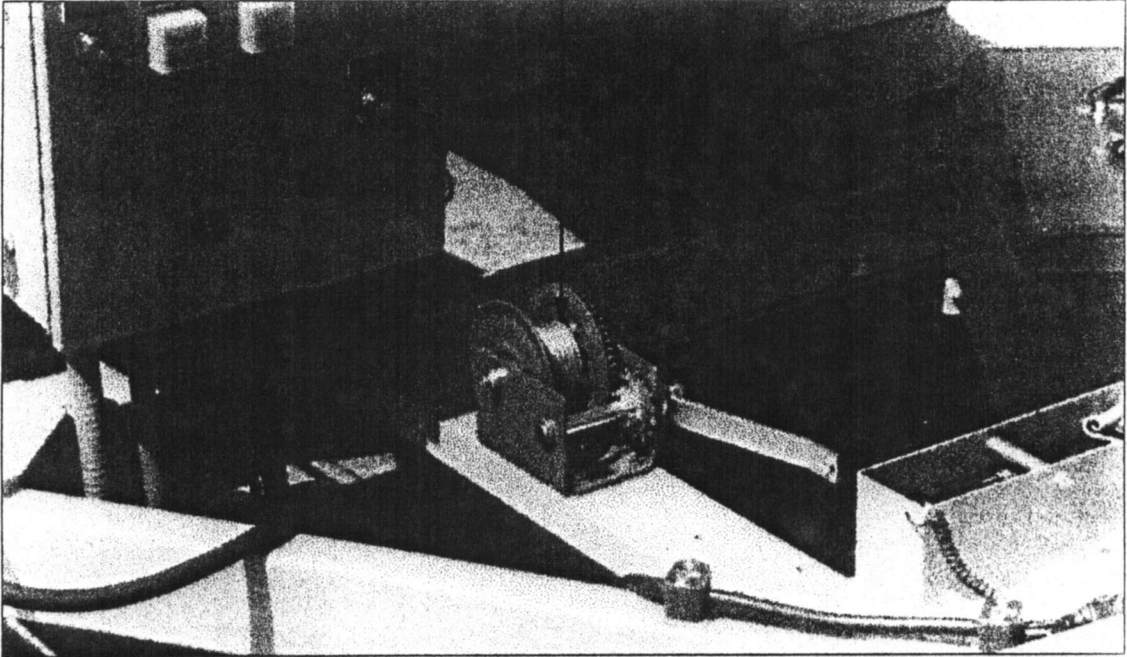
FEED AUGER PARTS – ELECTRIC DRIVE

| | |
|------------------|------------------------------|
| 2000E-211 | Feed auger |
| 2000E-212 | Drive motor variable |
| 2000E-213 | Drive sprocket (Motor) |
| 2000E-214 | Drive sprocket (Auger Shaft) |
| 2000E-215 | Drive chain |
| 2000E-216 | Bearing auger drive end |
| 2000E-217 | Bearing auger free end |
| 2000E-218 | Hopper grate and bag cutter |
| 2000E-219 | Latch – rubber |

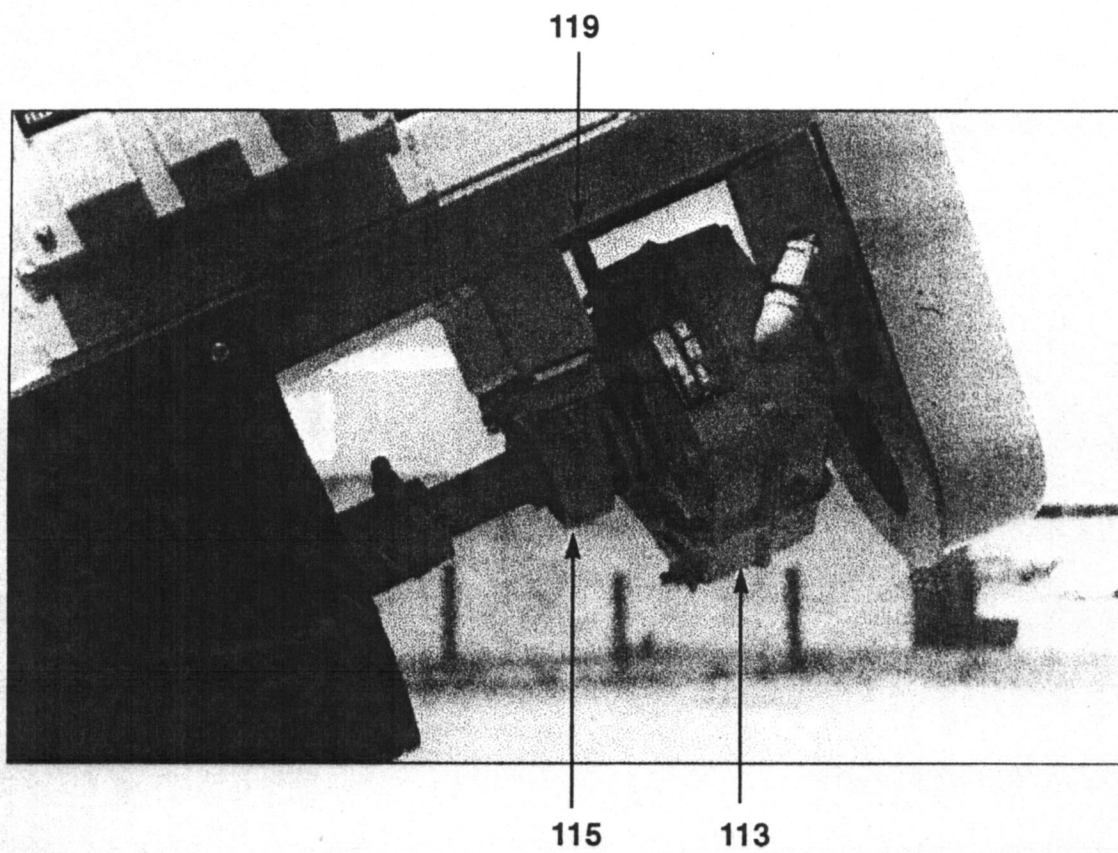
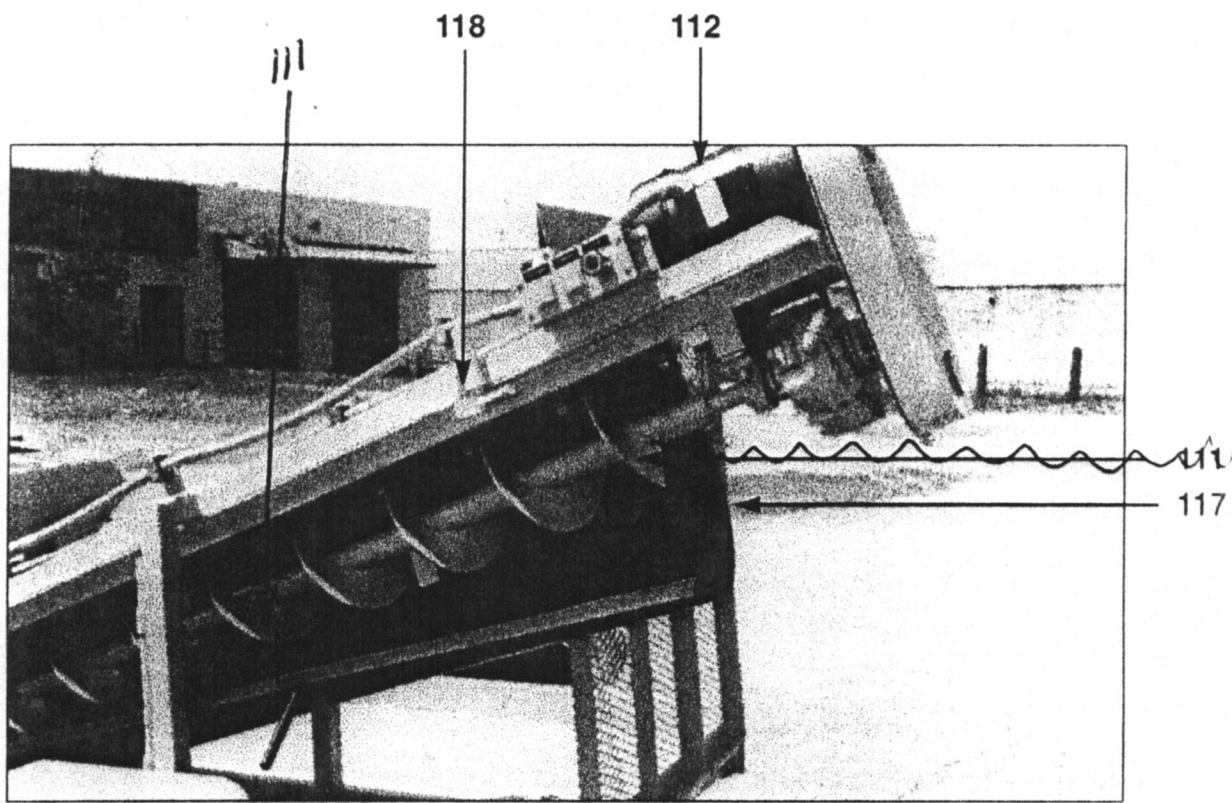


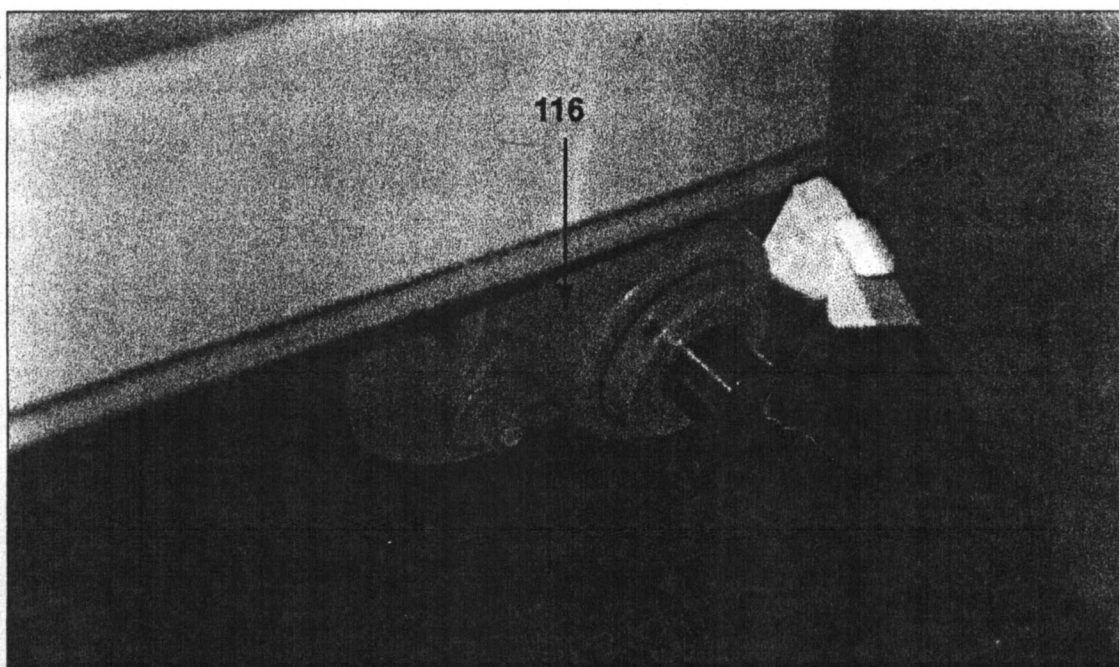
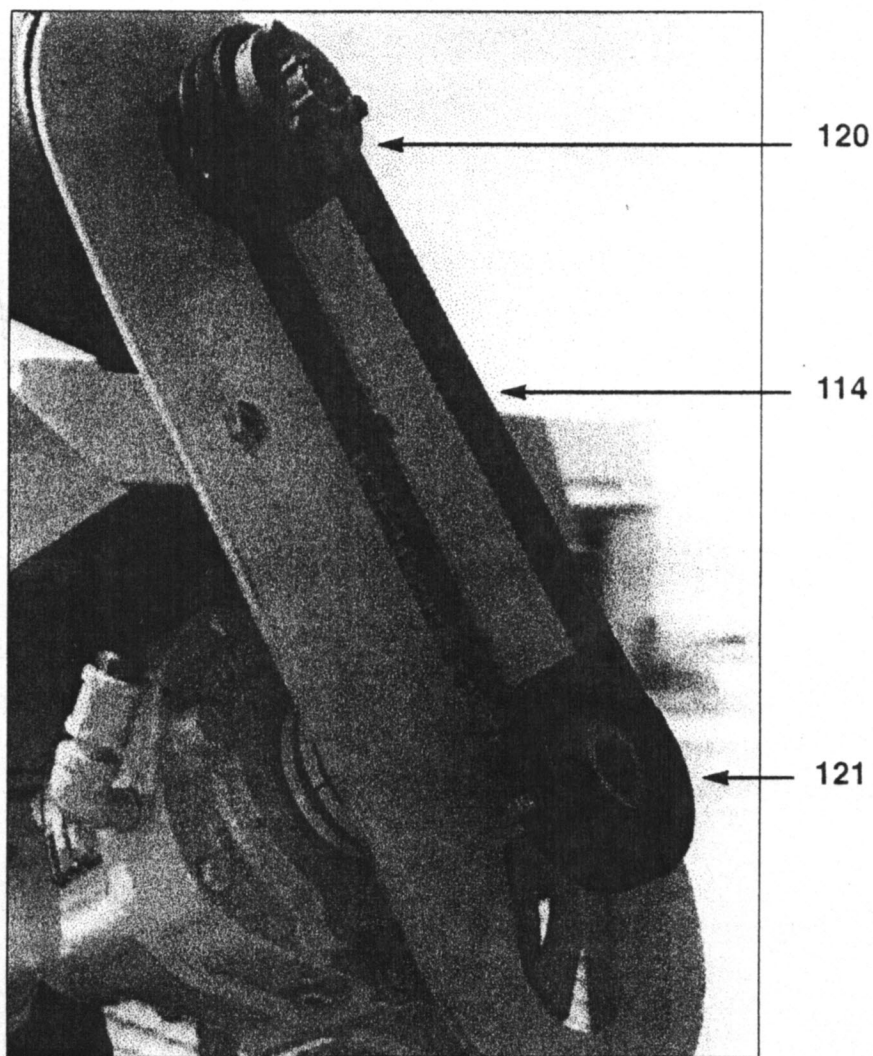


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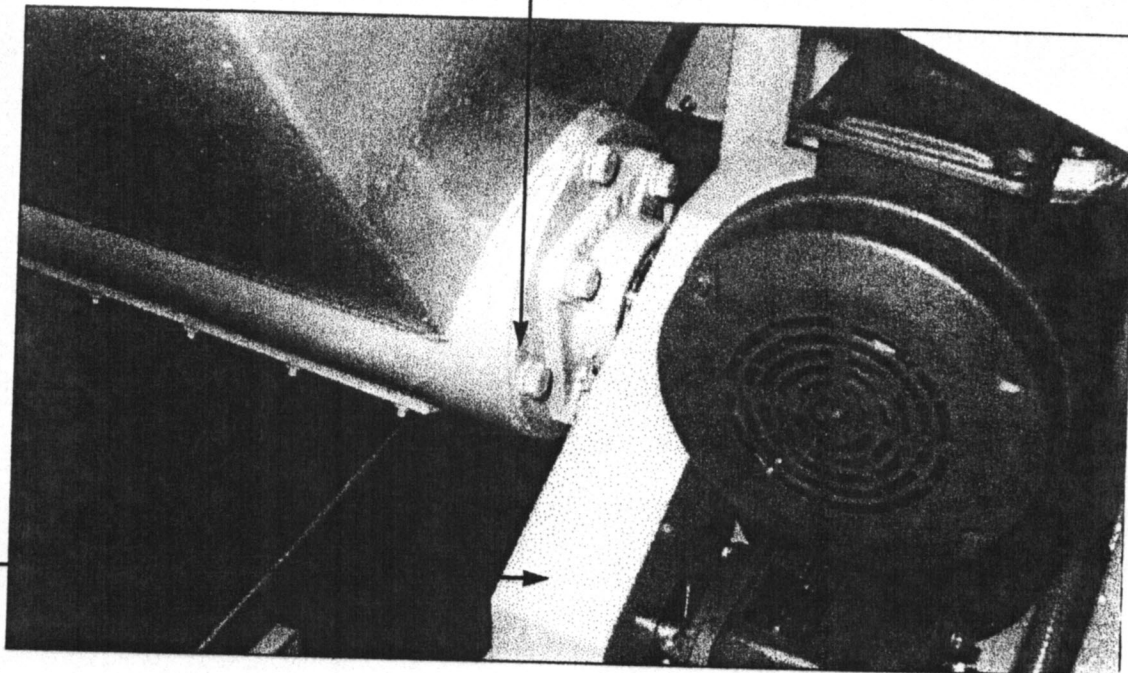


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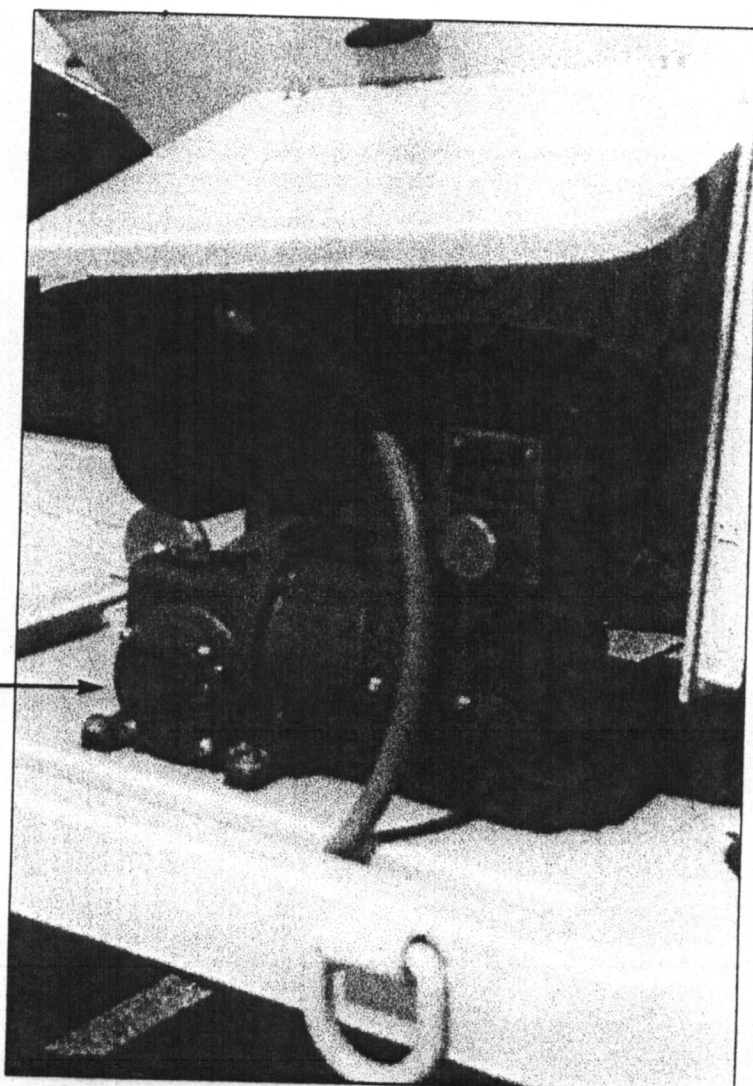
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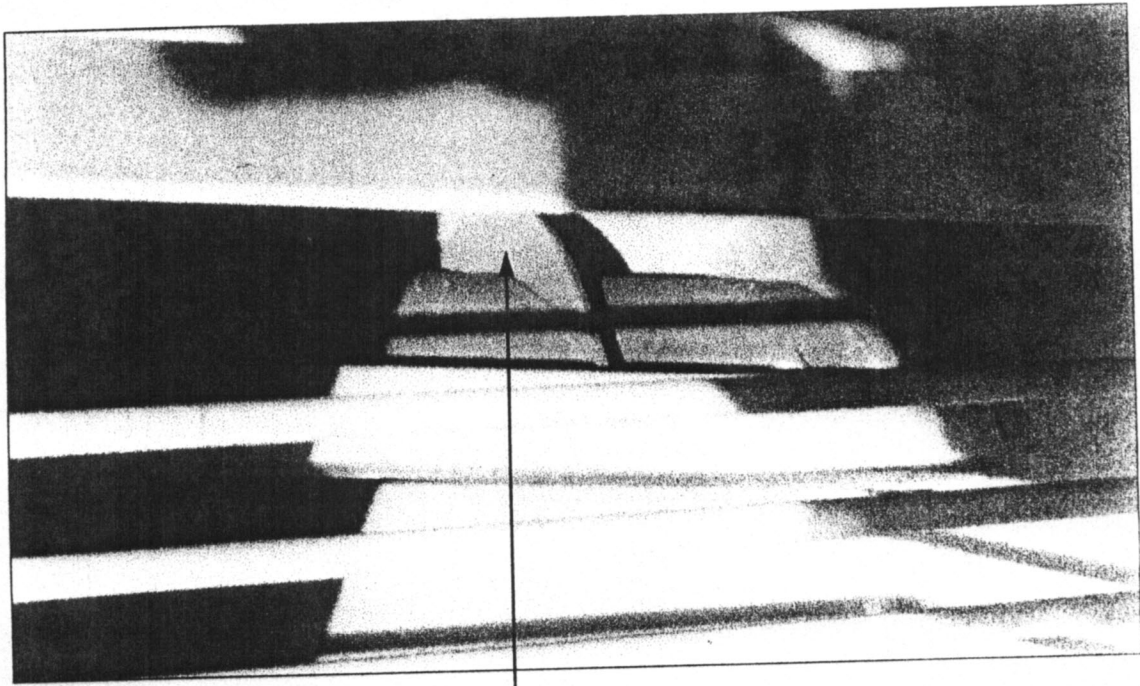
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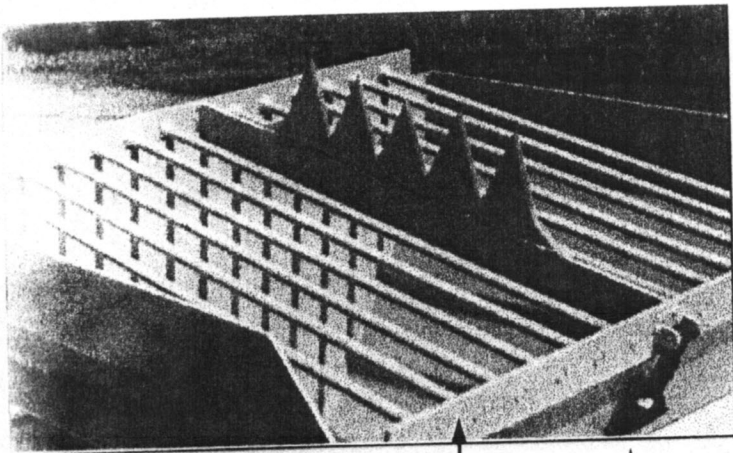
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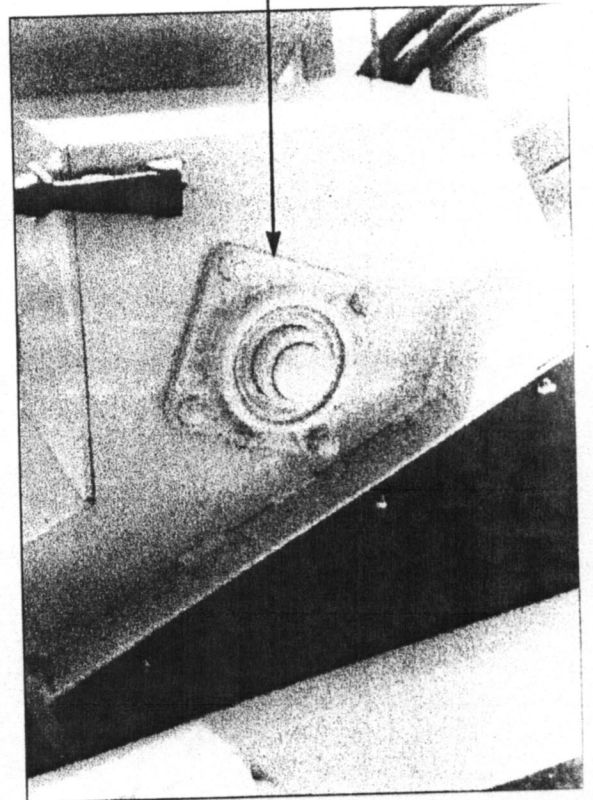
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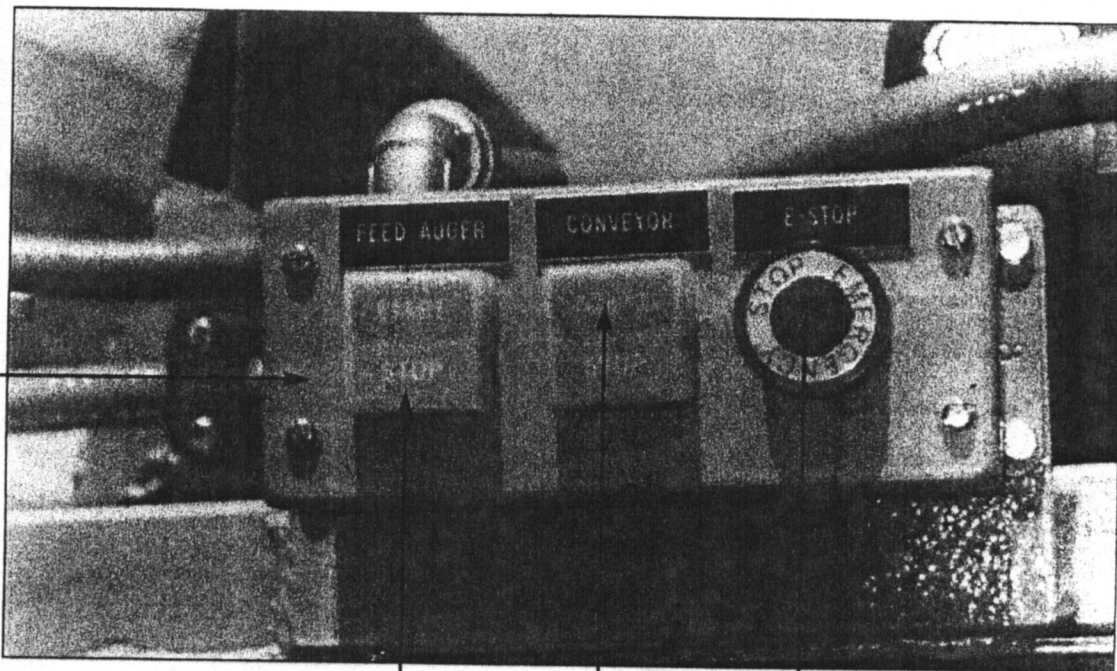
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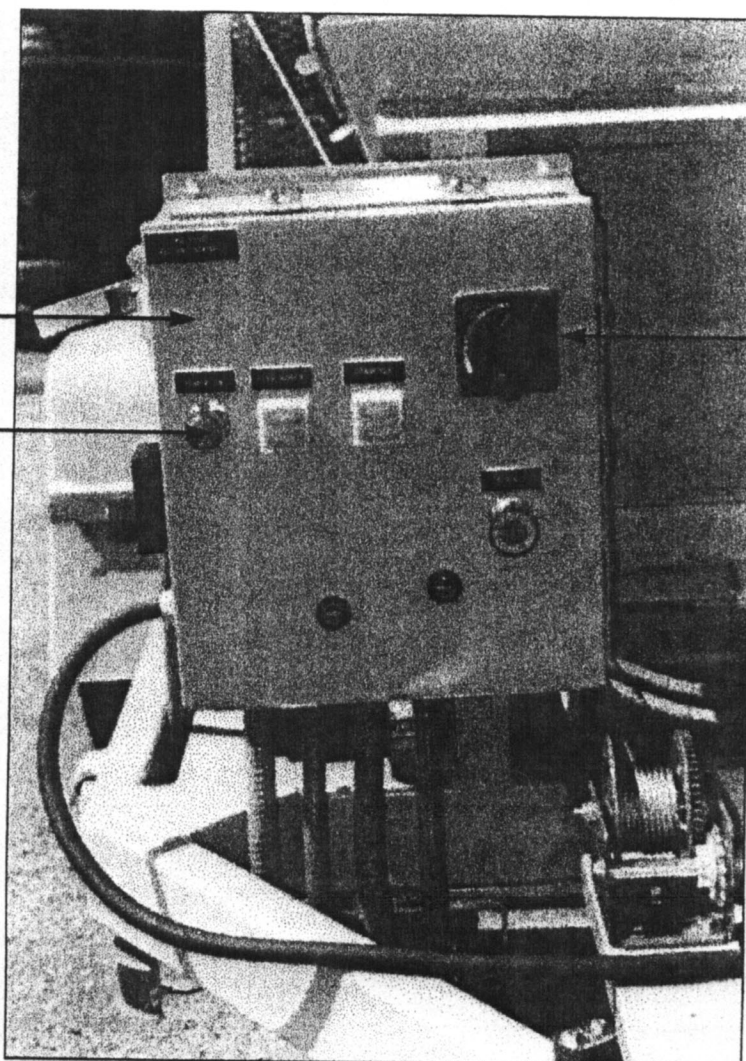
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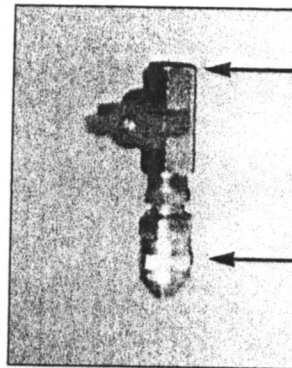
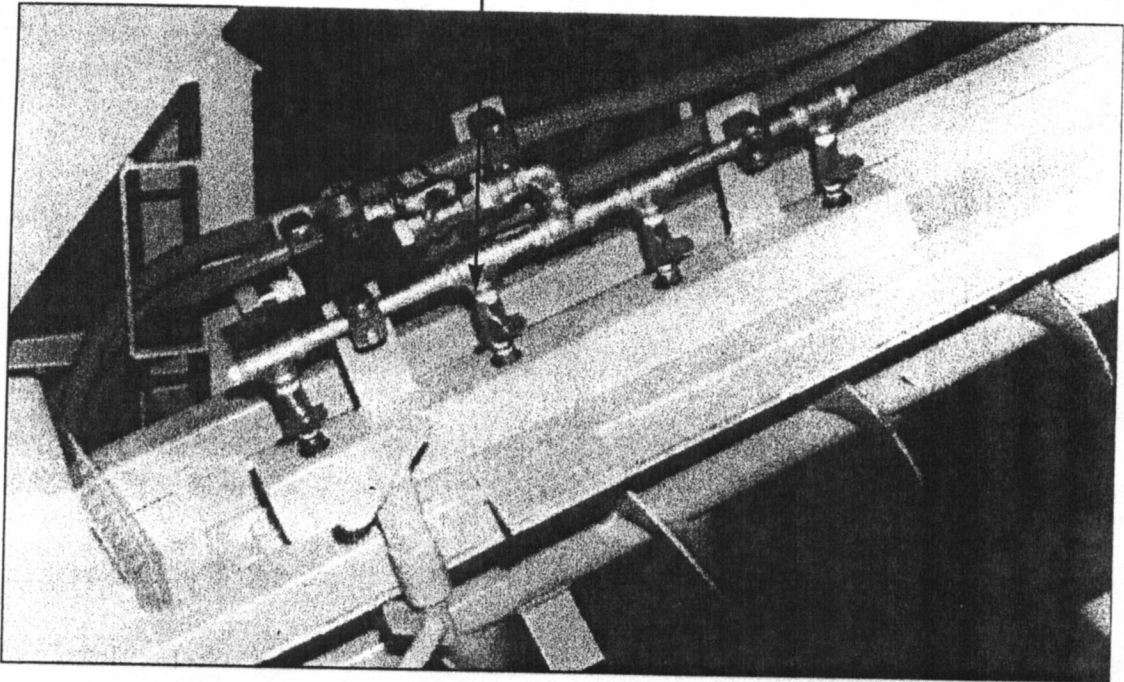
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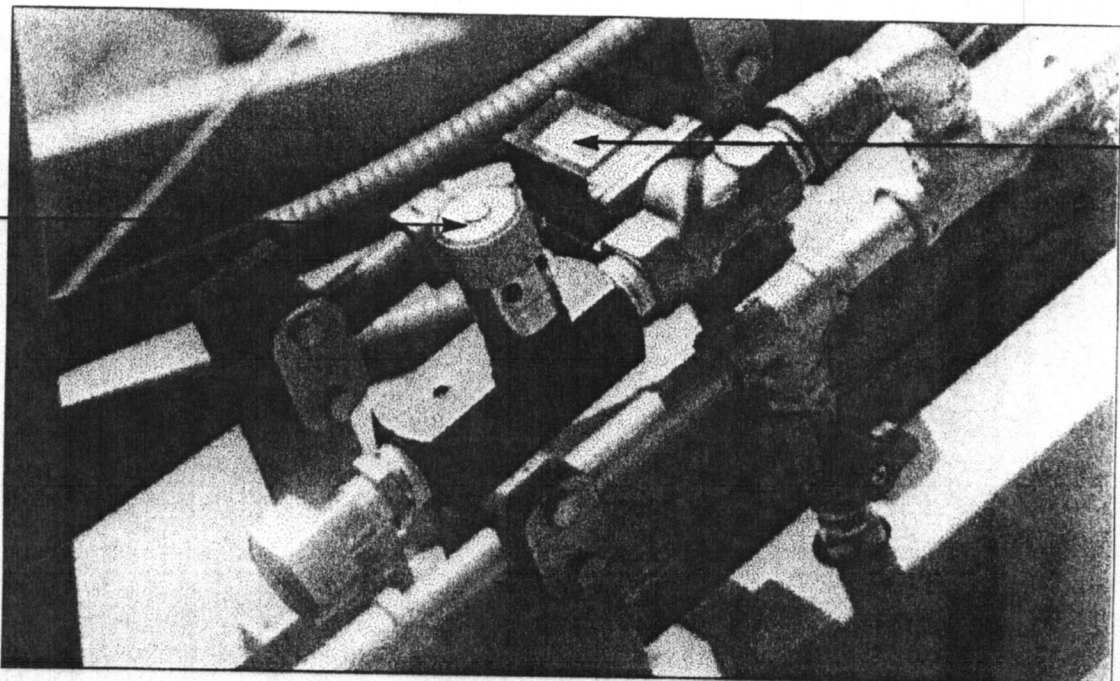
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