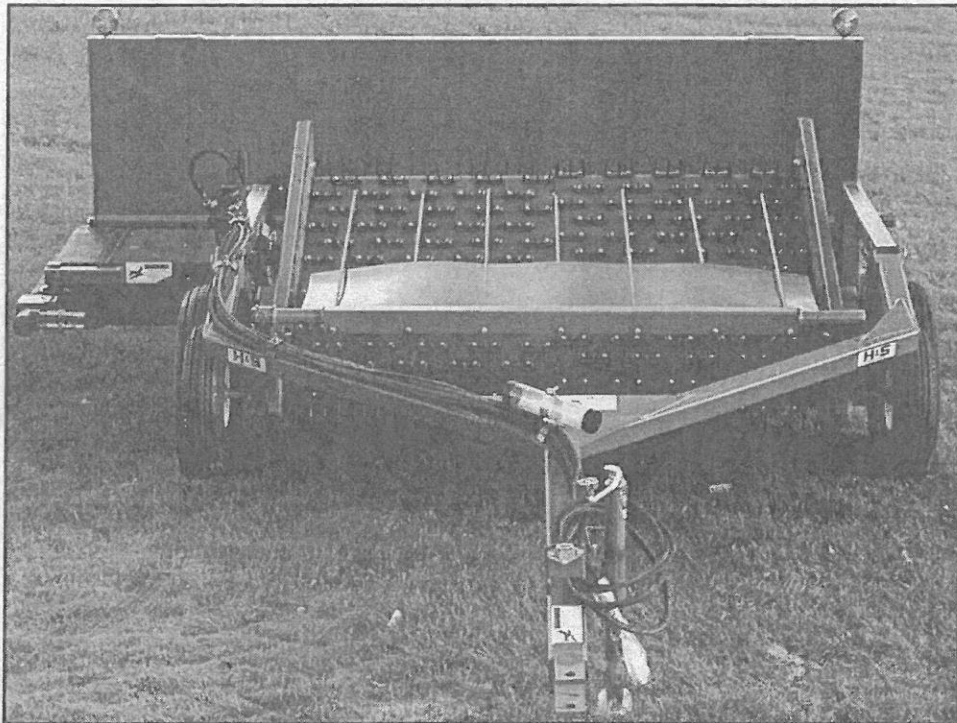


H&S

MINI MERGER

MM1



WARNING

READ AND UNDERSTAND THIS MANUAL
BEFORE OPERATING THIS EQUIPMENT.

UNSAFE OPERATION OR MAINTENANCE OF THIS EQUIPMENT CAN RESULT IN SERIOUS
INJURY OR DEATH.

PARTS & OPERATOR'S INSTRUCTIONS

11-6-2001

Manufactured By

H&S MANUFACTURING CO., INC.

P.O. BOX 768 • (715) 387-3414 FAX (715) 384-5463

MARSHFIELD, WISCONSIN 54449

H&S MINI MERGER MM1

CONTENTS

Warranty & Warranty Registration Card	1-2
Dealer Pre-Delivery & Delivery Checklist	3
Be Alert Symbol	5
Explanation of Safety Signs	6
Danger - Warning Decals	7
Warning - Owner Must Read and Understand	8
Operation	9
Transport Lock	10
Adjustments	11-12
Hydraulics	13
Lubrication Guide	14-15
Options	16
Ordering Parts - About Improvements	17
Decal Location & Identification	18-19
Figure 1 - Mini Merger Main Frame / Pole	20-21
Figure 2 - Mini Merger Pick-Up Head	22-23
Figure 3 - Mini Merger Hydraulics	24-25
Figure 4 - Mini Merger Electrical Wiring / Lights	26
Figure 5 - Mini Merger Optional Windrow Inverter	27
Figure 6 - Mini Merger Optional Accelerator	28-29
Figure 7 - Mini Merger Hydraulic Cylinder 8"	30
SPECIFICATIONS	INSIDE BACK COVER

WARRANTY

Mr. Owner: Before Operating—Read and Understand Operating and Safety Instructions

H&S Manufacturing Co., Inc. truly believes you have made a wise choice and a sound and lasting investment. Many years of development have made available these quality machines to assure you the performance and reliability you need. **We ask you to read the following agreement and warranty as this unit is subject to this warranty and agreement and no other.**

THE H&S WARRANTY

H&S Manufacturing Co., Inc. warrants this unit to be free from breakage or malfunctions due to defects in material and or workmanship for a period of one year from date of original sale on parts and limited labor, two years parts. Should such breakage or malfunction occur within warranty period the liability of H&S, its employees, agents, authorized distributors, and dealers (Hereinafter collectively referred to as sellers) is hereby expressly limited to repairing or, at its option, replacing free of charge at its factory, any such defective part or parts. Sellers liability is further expressly limited with respect to components manufactured by others, such as universal joints, bearings, detachable link and roller chains, tires, belts or trade accessories, to the extent of such warranties as are extended thereon to sellers by these manufacturers.

THIS WARRANTY IS IN LIEU OF ALL OTHER WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING BUT NOT LIMITED TO WARRANTIES OF MERCHANTABILITY OR APPLICABLE FOR ANY PARTICULAR PURPOSE, AND THE OBLIGATION AND LIABILITY OF SELLERS UNDER THIS WARRANTY, DOES NOT EXTEND TO LOSS OF CROPS, LOSS BECAUSE OF DELAY IN HARVESTING OR ANY EXPENSE OR LOSS INCURRED FOR LABOR, SUPPLIES, SUBSTITUTE MACHINERY OR RENTAL MACHINERY, TRANSPORTATION OR OTHER CHARGES, OR ANY OTHER INDIRECT OR CONSEQUENTIAL LOSS.

H&S Mfg. Co., Inc. reserves the right to make changes in design and components or material or to utilize available materials which it deems satisfactory, in order to improve its products. Also H&S reserves the right to make changes in the construction or design of any parts without any incurring obligations to install these improvements or changes on previously delivered units.

This warranty shall be void if any part or parts not manufactured or supplied by H&S are used either in servicing and maintaining the unit, and sellers obligation to repair or replace parts are then voided. This warranty shall be void if in the judgement of H&S, repairs are made in such a manner to affect this unit in a materially adverse manner or if this unit is operated unsafely or while in a state of disrepair.

The terms and conditions of this warranty cannot be altered, modified, or waived by any seller without the expressed, written consent of an officer of H&S Mfg. Co., Inc.

NOTICE

H&S Manufacturing Co., Inc. disclaims any liability for the operation of the equipment with the safety guards removed or modified. The nature of this product requires that it be operated in a safe way only, and in good repair by qualified persons. Each purchaser, through the process of purchasing this equipment, agrees with H&S Manufacturing Co., Inc. to operate it in a safe manner and in accordance with applicable state and federal laws and agrees to indemnify and hold harmless H&S Manufacturing Co., Inc. from any loss to any person or persons caused by purchaser's failure to do so. Each purchaser further agrees to bring to the attention this notice to each subsequent purchaser, and to obtain his agreement thereto as a condition of resale or transfer.

IMPORTANT

TO MAKE THIS WARRANTY EFFECTIVE, THE OWNERS WARRANTY REGISTRATION FURNISHED WITH EACH MACHINE MUST BE FILLED OUT AND SENT TO H&S MANUFACTURING CO., INC. IF PURCHASER DOES NOT ACCEPT THIS WARRANTY AND AGREEMENT, HE MAY RESCIND THE SALE BY NOTIFYING ANY OF THE SELLERS IN WRITING OF THAT FACT WITHIN TEN DAYS FROM DATE OF SALE AND/OR PRIOR TO ANY USE OF THE EQUIPMENT WITHIN THIS 10 DAYS.

2/97

**FILL OUT AND MAIL
IMMEDIATELY TO MAKE
WARRANTY EFFECTIVE**



WARRANTY REGISTRATION

Date of Purchase _____

Purchaser _____ Address _____

City _____ State _____ Zip _____

Product _____ Model # _____ Serial # _____

Dealer _____ Address _____

City _____ State _____ Zip _____

Signature of original buyer

IMPORTANT!

Tear on dotted line, provide the information requested on the card. The H&S Warranty is valid "only" after this card is received and recorded at H&S Mfg. Co. Mail at once. No postage is required in the U.S.A.

This Is Your Warranty Card
Please Fill Out
And Mail Immediately



NO POSTAGE
NECESSARY
IF MAILED
IN THE
UNITED STATES

BUSINESS REPLY MAIL

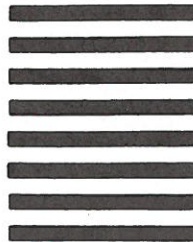
FIRST CLASS MAIL Permit No. 195 Marshfield, WI 54449

POSTAGE WILL BE PAID BY ADDRESSEE

H&S Manufacturing Co., Inc.

PO Box 768

Marshfield WI 54449-9963



AFTER COMPLETION, DEALER SHOULD REMOVE AND RETAIN FOR RECORDS

**H&S
DEALER PRE-DELIVERY CHECK LIST**

After the Mini Merger has been completely set-up, check to be certain it is in correct operating order before delivering to the customer. The following is a list of points to inspect. Check off each item as you have made the proper adjustments and found the item operating satisfactorily.

- All shields and guards are in place and fastened.
- All grease fittings have been lubricated - See lubrication guide in this manual.
- All mechanisms are operating trouble free.
- Belts are properly adjusted.
- All bolts and fasteners are tight.
- All decals are in place and legible.
- Lights and wiring functioning properly.

(Dealer's Name)	Model Number
(Signature of Pre-Delivery Inspector)	Serial Number
(Signature of Pre-Delivery Inspector)	(Inspection Date)

DEALER DELIVERY CHECK LIST

This check list that follows is an important reminder of valuable information that should be passed on to the customer at the time this Mini Merger is delivered.

Check off each item as you explain it to the customer.

This pre-delivery check list, when properly filled out and signed assures the customer that the pre-delivery service was satisfactorily performed.

- Explain to the customer that the pre-delivery inspection was made.
- Explain to the customer all the safety precautions they must exercise when operating this unit.
- Explain to customer that regular lubrication is required for proper operation and long life of machine. Show customer the lubrication section of Owner's Manual.
- Give the customer Owner's Manual and make sure he reads and understands all operating and service instructions.
- Record Serial Number on Page 17 of this Manual.
- Have customer sign a completed "Warranty Registration," and mail it promptly.

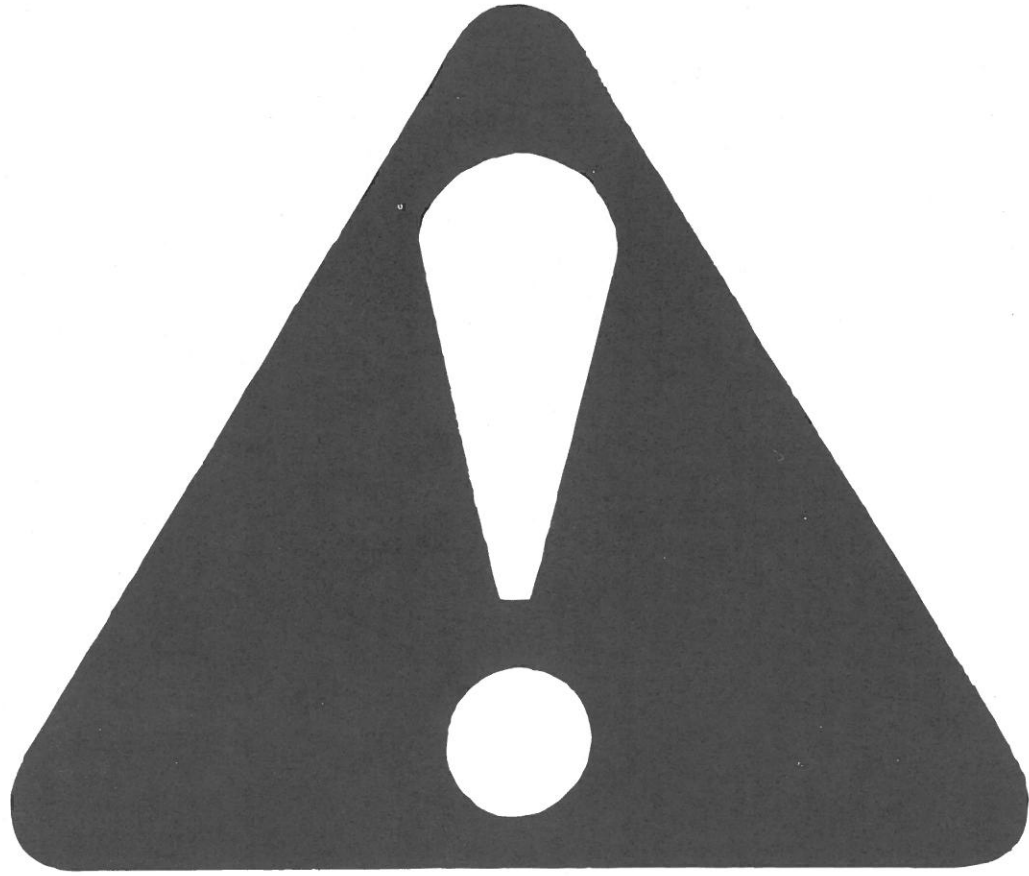
Date Delivered _____ Dealer's Name _____

By _____

Signature of Original Buyer

Note: Warranty is not valid until warranty card is completed and returned to H&S Mfg. Co., Inc.

Remove Dealers File Copy At Perforation



**BE
ALERT!**

**YOUR SAFETY
IS INVOLVED.**

THIS SYMBOL IS USED THROUGHOUT THIS BOOK WHENEVER YOUR PERSONAL SAFETY IS INVOLVED. TAKE TIME TO BE CAREFUL. REMEMBER: THE CAREFUL OPERATOR IS THE BEST OPERATOR. MOST ACCIDENTS ARE CAUSED BY HUMAN ERROR. CERTAIN PRECAUTIONS MUST BE OBSERVED TO PREVENT THE POSSIBILITY OF INJURY OR DAMAGE.

TRACTORS

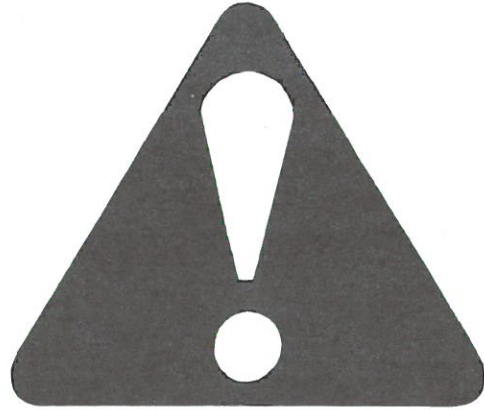
This operator's manual uses the term "Tractor" when identifying the power source.

H&S MANUFACTURING CO. INC.

RECOGNIZE SAFETY INFORMATION

This is the safety-alert symbol. When you see this symbol on your machine or in this manual, be alert to the potential for personal injury.

Follow recommended precautions and safe operating practices.



UNDERSTAND SIGNAL WORDS

A signal word—DANGER, WARNING, or CAUTION—is used with the safety-alert symbol. DANGER identifies the most serious hazards.

Safety signs with signal word DANGER or WARNING are typically near specific hazards.

General precautions are listed on CAUTION safety signs.



WARNING



CAUTION



FOLLOW SAFETY INSTRUCTIONS

Carefully read all safety messages in this manual, and all safety signs on your machine. Follow all recommended precautions and safe operating procedures.

Keep signs in good condition. Immediately replace any missing or damaged signs.



3398A

! DANGER

STAY CLEAR OF MOVING PARTS

FAILURE TO HEED THIS WARNING MAY RESULT IN PERSONAL INJURY OR DEATH

KEEP CLOTHING, YOURSELF AND OTHERS WELL CLEAR.

! DANGER

SHUT ENGINE COMPLETELY OFF BEFORE ADJUSTING OR SERVICING MACHINE.

MACHINE MAY START UNEXPECTEDLY

FAILURE TO HEED THIS WARNING MAY RESULT IN PERSONAL INJURY OR DEATH 3398C



! WARNING

DO NOT GO NEAR LEAKS

- High pressure oil easily punctures skin causing serious injury, gangrene or death.
- If injured, seek emergency medical help. Immediate surgery is required to remove oil.
- Do not use finger or skin to check for leaks.
- Lower load or relieve hydraulic pressure before loosening fittings.

11599

! WARNING



DO NOT REMOVE SHIELDS

MOVING PARTS INSIDE

1494K

! DANGER



STAY CLEAR OF MOVING PARTS

FAILURE TO HEED THIS WARNING MAY RESULT IN PERSONAL INJURY OR DEATH

KEEP CLOTHING, YOURSELF AND OTHERS WELL CLEAR.

73101

! WARNING



DO NOT OPERATE THIS EQUIPMENT IF THIS DECAL IS EXPOSED. REPLACE SAFETY SHIELDS. FAILURE TO HEED MAY RESULT IN SERIOUS INJURY OR DEATH.

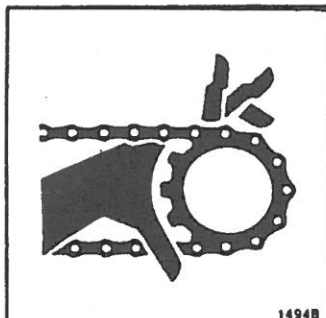
3094

! WARNING

HELP AVOID INJURY

- READ & UNDERSTAND THE OPERATORS MANUAL PROVIDED WITH THIS MACHINE. IF MISPLACED CALL H & S MANUFACTURING AT 715-387-3414 WITH MODEL AND SERIAL NUMBER.
- UNDERSTAND ALL SAFETY WARNINGS AND FUNCTION OF CONTROLS.
- KEEP SAFETY DEVICES IN PLACE AND WORKING.
- KEEP YOURSELF AND OTHERS WELL CLEAR OF MOVING PARTS.
- DISCONNECT ALL POWER BEFORE SERVICING OR CLEANING THIS MACHINE.

5896A



1494B

! WARNING

DO NOT REMOVE SHIELDS MOVING PARTS INSIDE

H&S MINI MERGER



W A R N I N G

TO PREVENT SERIOUS INJURY OR DEATH

BEFORE YOU ATTEMPT TO OPERATE THIS EQUIPMENT, READ AND STUDY THE FOLLOWING INFORMATION. IN ADDITION, MAKE SURE THAT EVERY INDIVIDUAL WHO OPERATES OR WORKS WITH THIS EQUIPMENT, WHETHER FAMILY MEMBER OR EMPLOYEE, IS FAMILIAR WITH THESE SAFETY PRECAUTIONS.

KNOW HOW TO STOP MACHINE BEFORE STARTING IT.

If the machine becomes clogged, disengage the tractor hydraulics. Stop the tractor engine and allow all mechanisms to stop before cleaning or working on the machine.

DO NOT attempt to perform maintenance or repair with tractor running or tractor hydraulics engaged.

DO NOT step up on machine at any time.

NEVER manually feed material into the pickup.

DO NOT allow minors to operate or be near the machine.

DO NOT ALLOW PERSONNEL OTHER THAN THE QUALIFIED OPERATOR NEAR THE MACHINE.

STAY CLEAR of machine when raising or lowering pickup.

Keep hands, feet, and clothing away from pickup and conveyor belts WHEN THEY ARE IN MOTION.

Loose or floppy clothing should not be worn by the operator.

Be sure the machine is clear of people, tools, and other objects before engaging tractor hydraulics.

NEVER start Mini Merger until all guards and safety shields are secured in place.

STAY CLEAR of hydraulic lines. They may be under extreme pressure or heat.

H&S Mfg. Co. always takes the operator and his safety into consideration and guards exposed moving parts for his protection. However, some areas cannot be guarded or shielded in order to assure proper operation. In addition, the operators manual and decals on the machine itself warn you of further danger and should be read and observed closely.

Study The Above Safety Rules

ATTENTION - BE ALERT - YOUR SAFETY IS INVOLVED

OPERATION

1. Check entire unit carefully before first operation. Tighten bolts and set screws that might have come loose in handling. Lubricate as explained in the lubrication guide.
2. Adjust tractor drawbar to allow for maximum clearance between drawbar and ground. Attach merger to tractor with a hitch pin that has a safety locking device.
3. Remove weight from lift jack and move jack to storage position.
4. Connect hydraulic hoses. (See Page 13)
5. Check tires and inflate to recommended pressure.
6. Run pickup and conveyor for several minutes to ensure proper assembly and lubrication. Successful operation will be achieved by periodic adjustments and experience of the operator. Make sure to read and understand all adjustments.

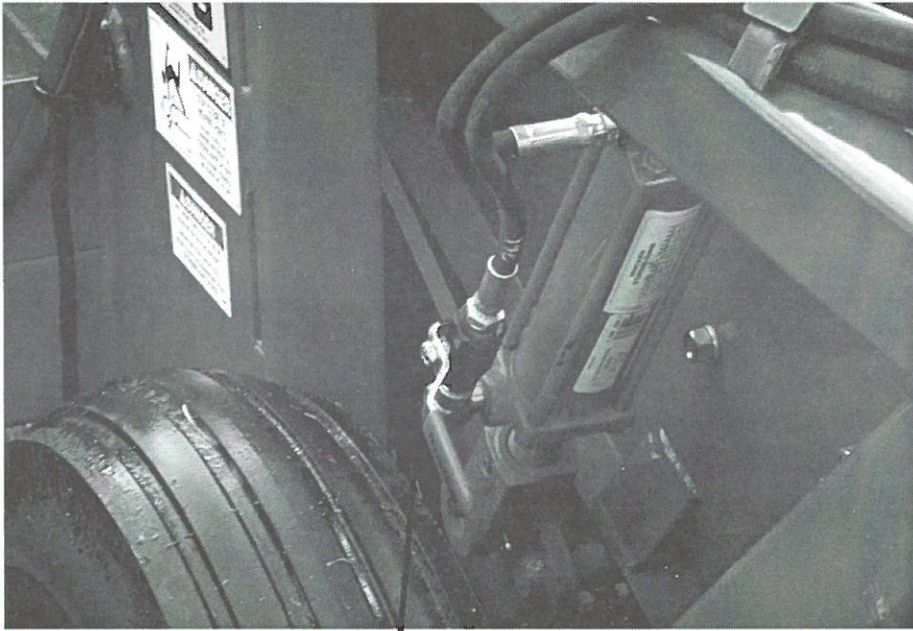
	<p>! WARNING</p> <p>DO NOT GO NEAR LEAKS</p> <ul style="list-style-type: none">• High pressure oil easily punctures skin causing serious injury, gangrene or death.• If injured, seek emergency medical help. Immediate surgery is required to remove oil.• Do not use finger or skin to check for leaks.• Lower load or relieve hydraulic pressure before loosening fittings.
---	---



Operator Manual
Storage

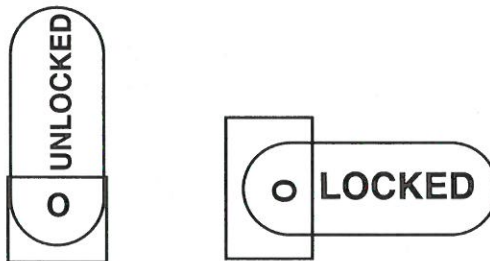
Jack Storage

TRANSPORT LOCK



Transport Position

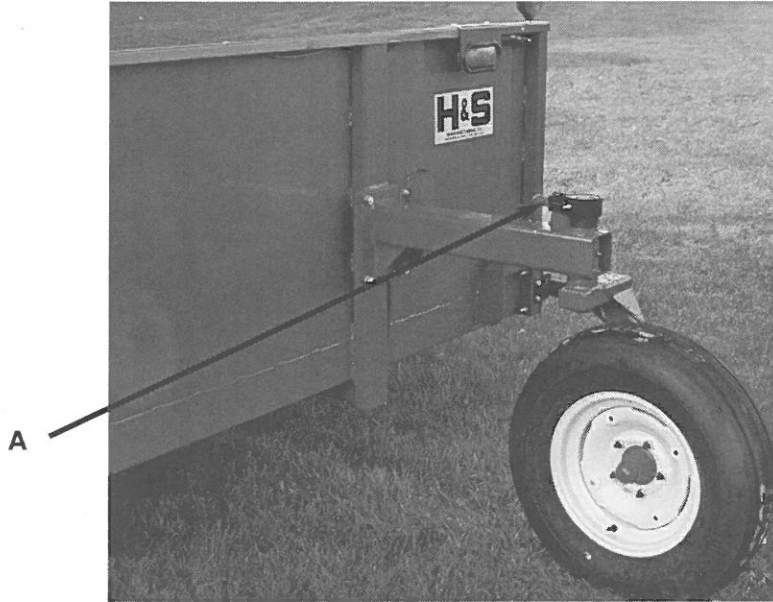
Located on the right side of the pick-up on the lift cylinder is the manual valve which locks the pick-up into transport position. Shown below is the valve in the locked and unlocked positions.



ADJUSTMENTS

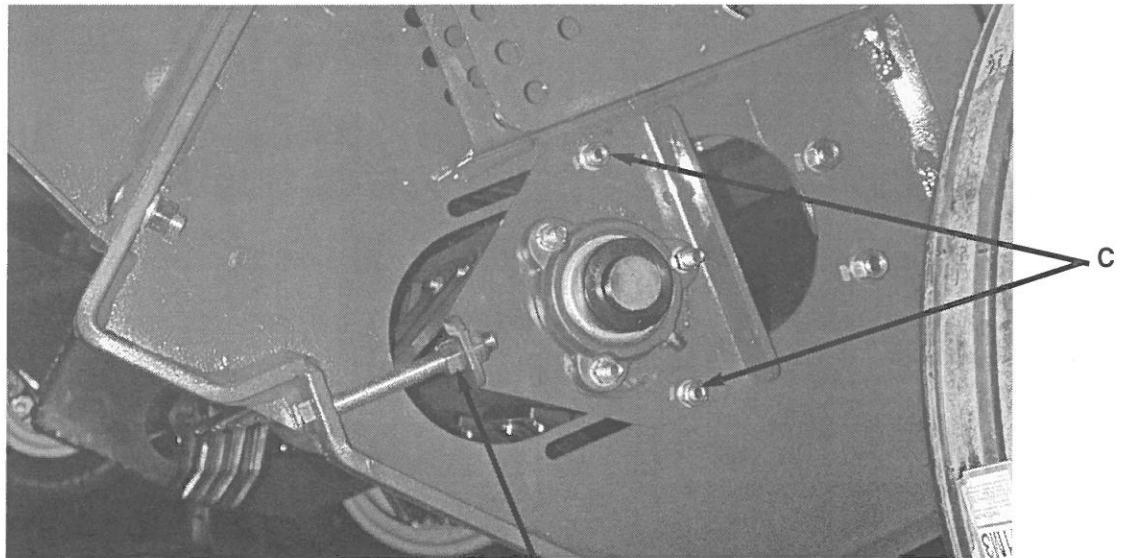
TAIL WHEEL

The tail wheel is located at the right rear of the merger. Located on the tail wheel pivot spindle is an adjustable brake assembly. Adjust brake by tightening bolt (A). The brake should have enough tension to prevent zig-zag motion, but still allow the wheel to pivot when making corners. Improper adjustment will cause severe tire wear and damage to Merger.



PICKUP ADJUSTMENTS

1. Pickup belts are adjusted by adjusting the take up bolt (B) located on both ends of the pickup bottom roller. The bearing bracket bolts (C) must be loosened before adjustment, and tightened after the desired belt tension is attained. Proper belt tension will be achieved when 1.5" of slack can be pulled in the center of the belts with minimal resistance. **DO NOT tighten pickup belts excessively.** Over-tightening may cause damage to belts or rollers. Loose belts will cause unnecessary tooth wear and breakage.



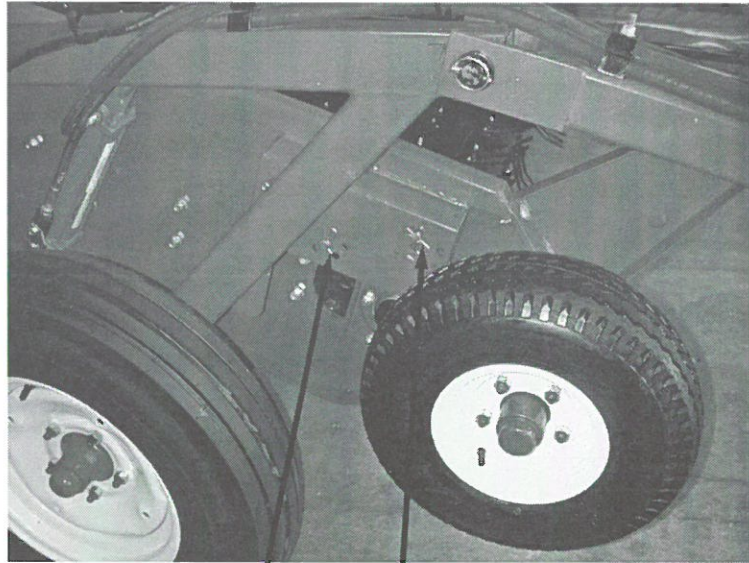
B

(Behind Gauge Wheel)

ADJUSTMENTS *(Continued)*

PICKUP HEAD

The pickup head should be adjusted according to the height of the stubble. Pickup height is adjusted by adjusting the gauge wheels located at both sides of the pickup head. Remove adjustment pin (A) and place in the desired hole position above the gauge wheel arm. Lower head and check for proper adjustment. Repeat process if necessary. Teeth should never be closer than 3/4" from the ground. When proper adjustment is obtained, remove pin (B) and place in hole as close as possible below gauge wheel arm to support gauge wheel when raising head. Excessive tooth wear and breakage will occur if teeth are touching the ground. Adjust both sides equally.



B

A

CONVEYOR ADJUSTMENTS

The cross conveyor belt tension can be adjusted by adjusting the nut against the spring on the take up bolts (C) located on left end of cross conveyor. Correct tension is achieved when springs (D) are compressed to 1.5".



C

D

HYDRAULICS

There are four hydraulic hoses from the merger to the tractor. The two smaller, (3/8" diameter) hoses provide oil to the pickup lift cylinder (A).

The two larger (1/2" diameter) hoses provide oil to the hydraulic motors (B) running pickup belt and cross conveyor belt. Controlling speed of belts is done by adjusting oil flow at the tractor remote (if possible) or by adjusting the tractor throttle. Coordinate speed of belts with ground speed of tractor. To reverse direction of cross conveyor change hydraulic quick couplers at the cross conveyor drive motor (C). A flow of 16 GPM and pressure of 2,000 PSI is recommended to operate the merger efficiently.

	<p>⚠ WARNING</p> <p>DO NOT GO NEAR LEAKS</p> <ul style="list-style-type: none">• High pressure oil easily punctures skin causing serious injury, gangrene or death.• If injured, seek emergency medical help. Immediate surgery is required to remove oil.• Do not use finger or skin to check for leaks.• Lower load or relieve hydraulic pressure before loosening fittings.
---	---



C

B

A

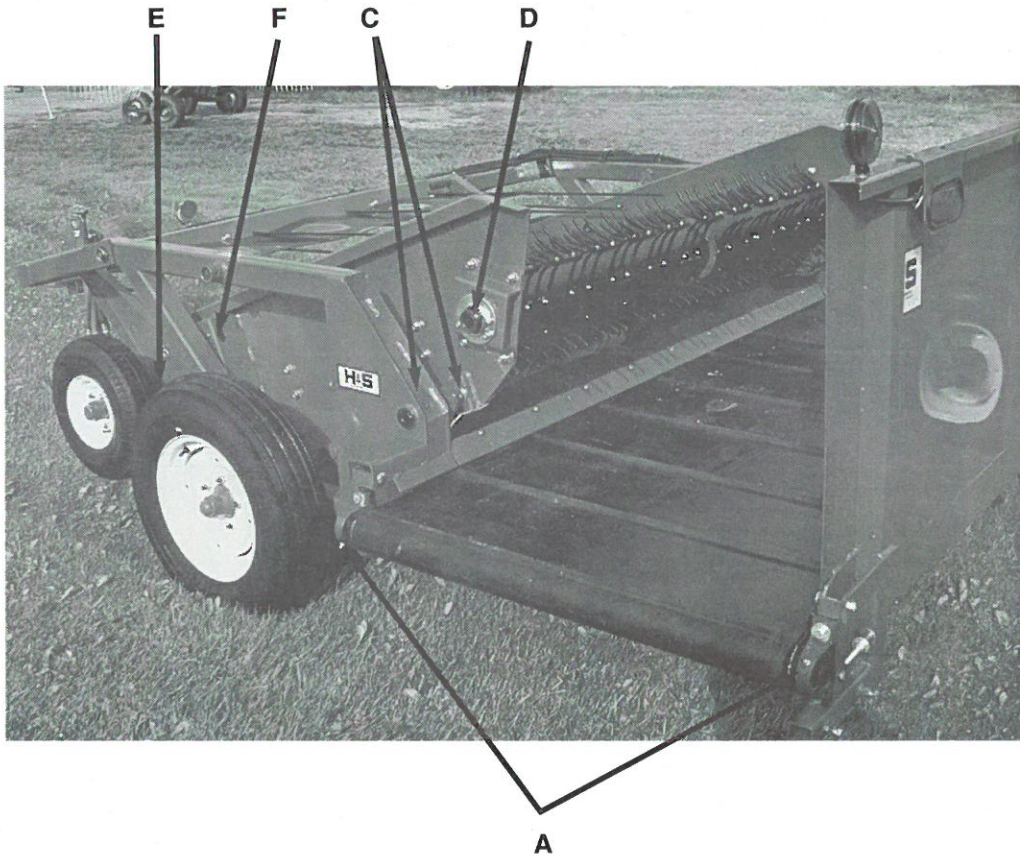
LUBRICATION

There are 18 grease fittings on your merger, 20 if equipped with an accelerator. If these are lubricated properly and often enough, it will prolong the life of the merger. Grease daily during normal use, and before and after storage. Use a good grade of high quality grease. Make sure grease comes out around the shaft on sleeve type bearings. On the sealed ball bearings, grease should be added slowly until a slight bead forms at the seals indicating the correct amount of lubricant. Wipe off excess grease to prevent accumulation of grit around the bearings. If equipped with accelerator, oil roller chain daily. Lubricate merger more often with extensive use.

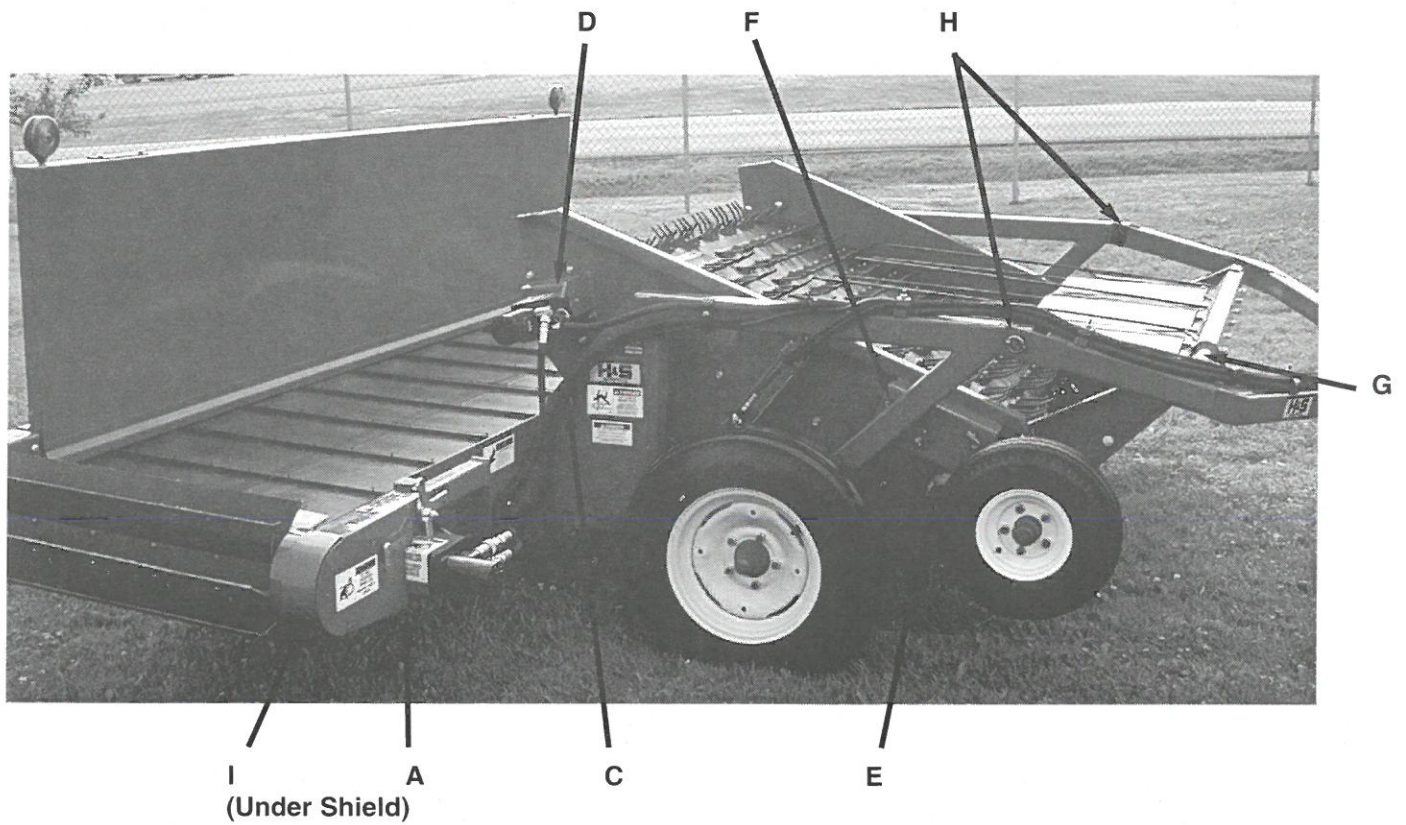
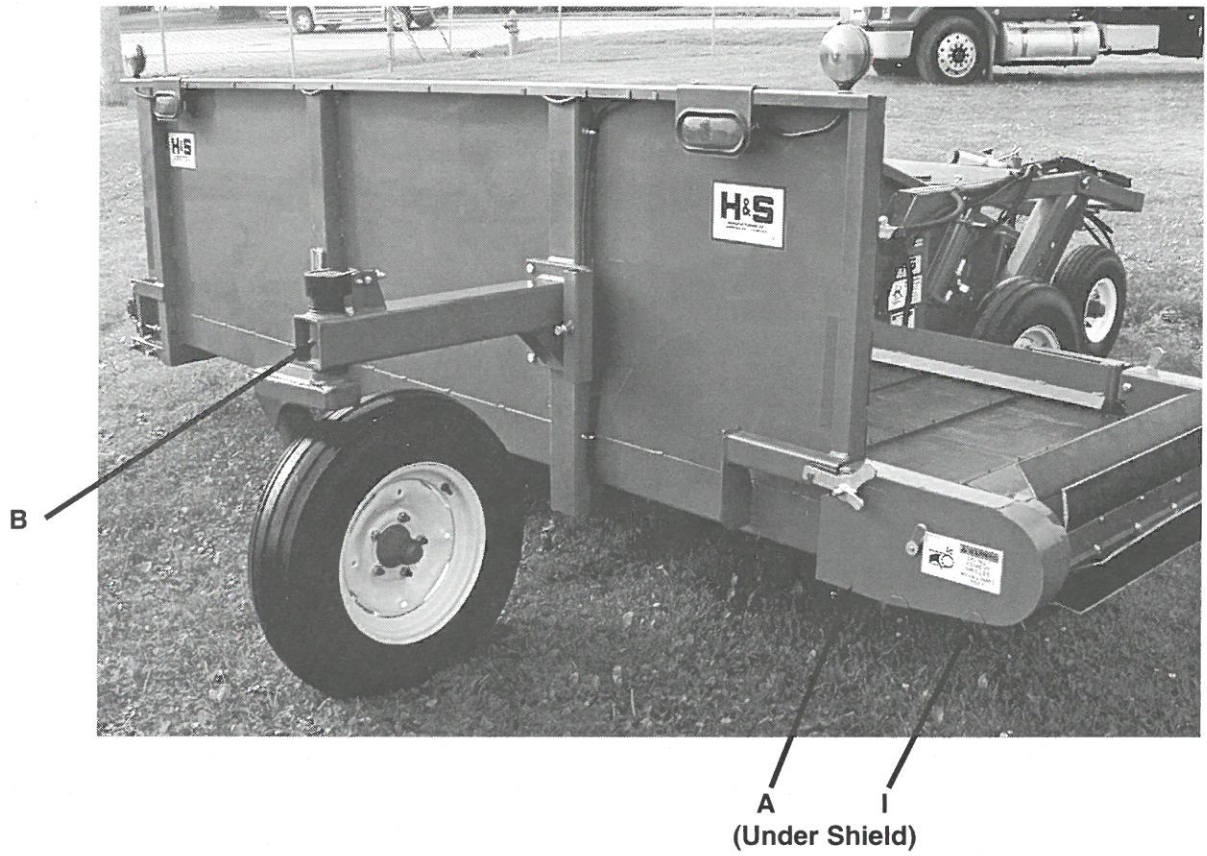
- A. (4) - 1 on each bearing (both ends of cross conveyor)
- B. (1) - 1 on tail wheel pivot
- C. (4) - 2 on each side of pick-up pivot
- D. (2) - 1 on each bearing (both ends top pick-up drive roller)
- E. (2) - 1 on each bearing (both ends bottom pick-up idler roller)
- F. (2) - 1 on gauge wheel pivot
- G. (1) - 1 on right end wind deflector pivot
- H. (2) - 1 on each pole attachment pivot

OPTIONAL ACCELERATOR

- I. (2) - 1 on each bearing (both ends of accelerator shaft)

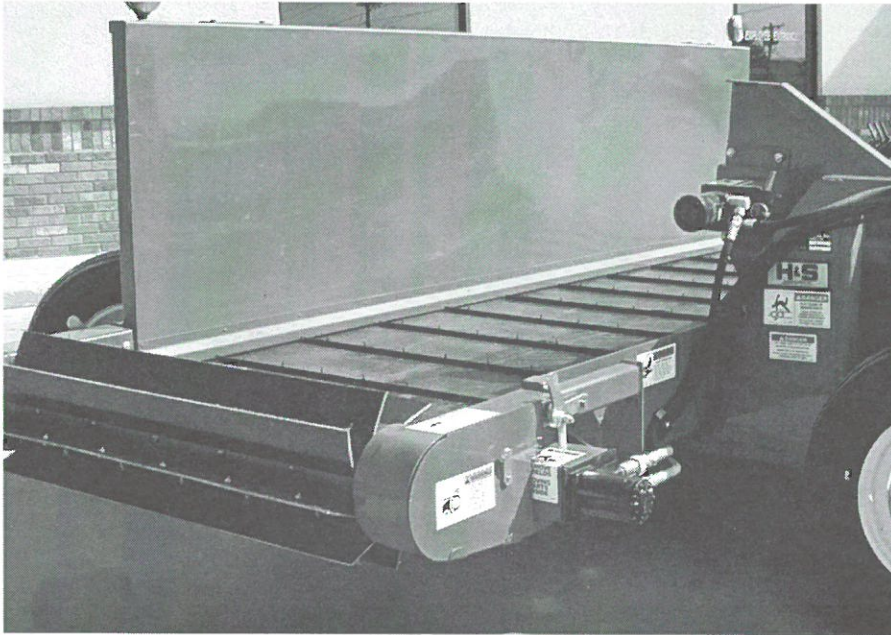


LUBRICATION (Continued)



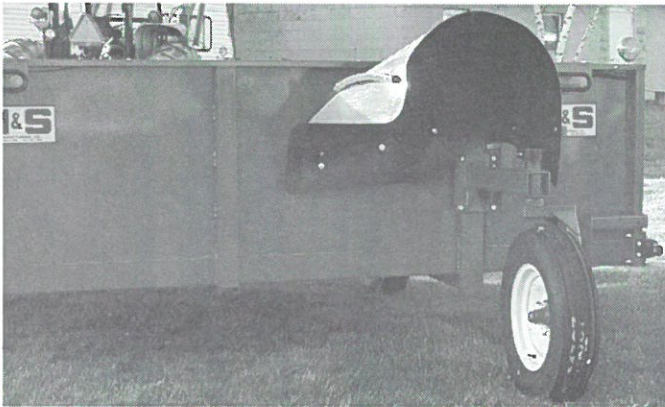
OPTIONAL ACCELERATOR AND INVERTER

ACCELERATOR

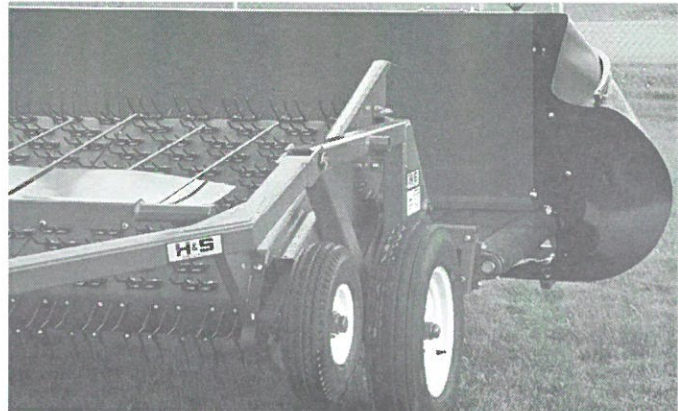


Remove accelerator for road transport

INVERTER



Transport Position



Working Position

Remove inverter for road transport

INSTRUCTIONS FOR ORDERING PARTS

All service parts should be ordered through your authorized H&S dealer. He will be able to give you faster service if you will provide him with the following.

1. Model & Serial Number - Both can be located on the right side main frame of your unit.
2. All reference to left or right apply to the machine as viewed from the rear.
3. Parts should not be ordered from illustration only. Please order by complete part number.
4. If your dealer has to order parts - give shipping instructions.

VIA truck - large pieces (please specify local truck lines)

VIA United Parcel Service (include full address)

H&S Mfg. Co.	
MARSHFIELD, WIS.	
MOD. NO.	<input type="text"/>
SER. NO.	<input type="text"/>

PLEASE RECORD NUMBERS FOR YOUR UNIT FOR QUICK REFERENCE

ABOUT IMPROVEMENTS

H&S IS CONTINUALLY STRIVING TO IMPROVE ITS' PRODUCTS.

We must therefore, reserve the right to make improvements or changes whenever it becomes practical to do so, without incurring any obligation to make changes or additions to the equipment previously sold.

DECAL LOCATION

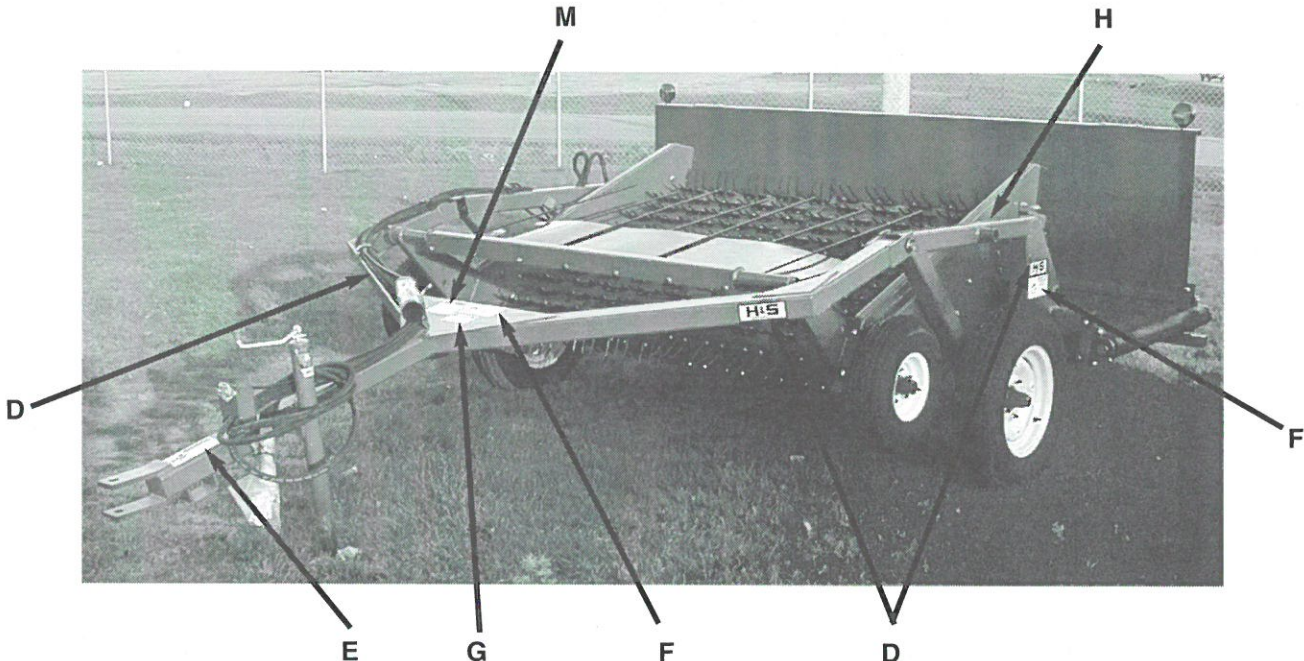
Your H&S Mini Merger was manufactured with operator safety in mind. Located on the windrow merger are various decals to aid in operation, and warn of danger or caution areas. Pay close attention to all the decals on your Mini Merger.



DO NOT REMOVE ANY OF THESE DECALS. IF DECALS ARE LOST, DAMAGED, OR IF MINI MERGER IS REPAINTED, REPLACE DECALS. REMEMBER: DECALS ARE FOR YOUR PROTECTION AND SAFETY.

Listed below are the decals on your Mini Merger. These decals may be ordered individually by part number or by ordering a complete set.

ITEM	PART NO.	DESCRIPTION
A.		(2) H&S Decal (6" x 12")
B.		(2) Red Reflective (2" x 9")
C.	1494K	(2) Warning - Do Not Remove Shields
D.	D12	(4) H&S Decal
E.	11599	(2) Warning - Do Not Go Near Leaks
F.	3398A	(3) Danger - Stay Clear
G.	3398C	(2) Danger - Shut Engine Off Completely
H.	71188B	Jack Storage Position
I.	73101	(2) Danger - Stay Clear of Moving Parts (W/Accelerator Only)
J.		Serial #
K.	3894	(2) Warning - Do Not Operate (W/Accelerator Only)
L.	1494B	(2) Warning - Do Not Remove (W/Accelerator Only)
M.	5896A	Warning - Help Avoid Injury
N.	11601MM1	Operator Manual Holder Complete Set of Decals
Paint - H&S Red		
	ZX21	Gallon
	ZX22	Quart
	ZX23	Pint



(Continued)

DECAL LOCATION (Continued)

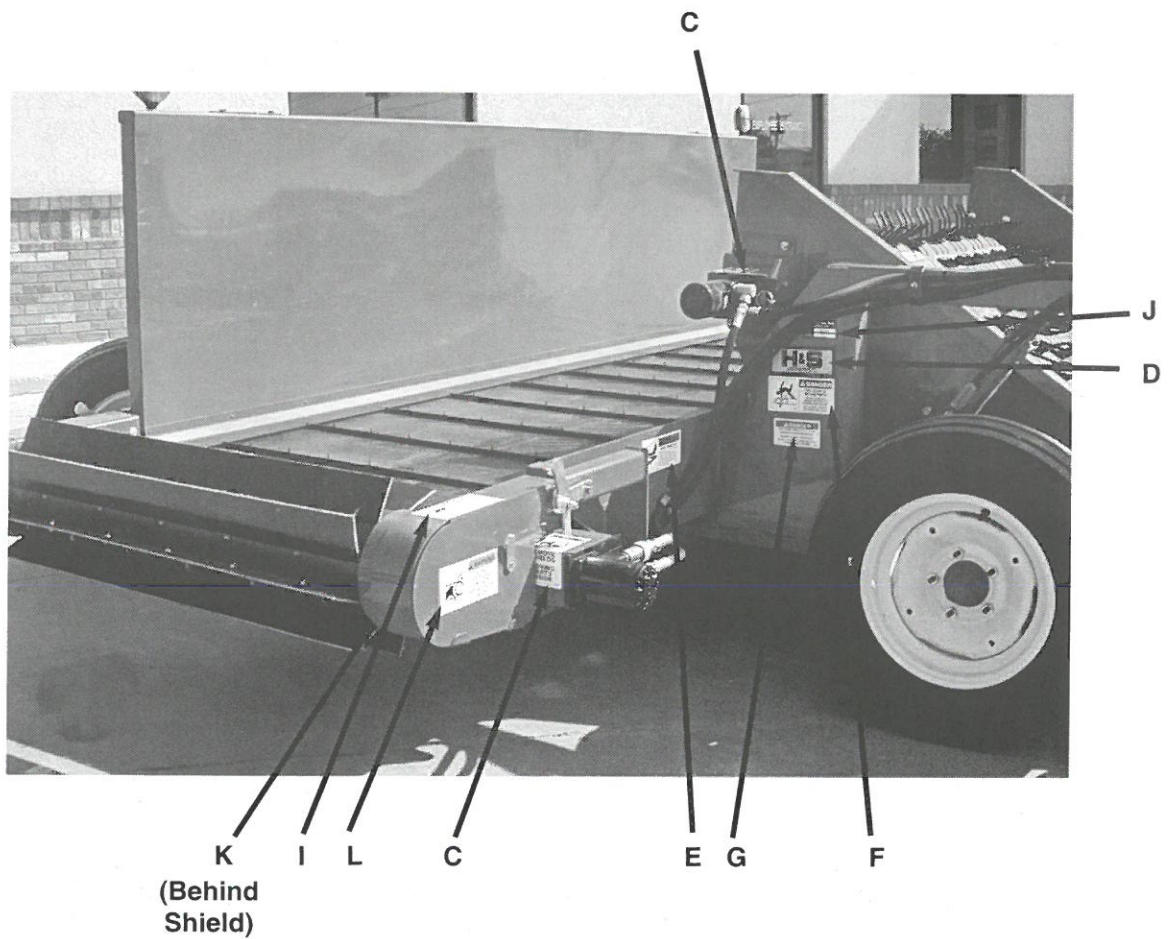
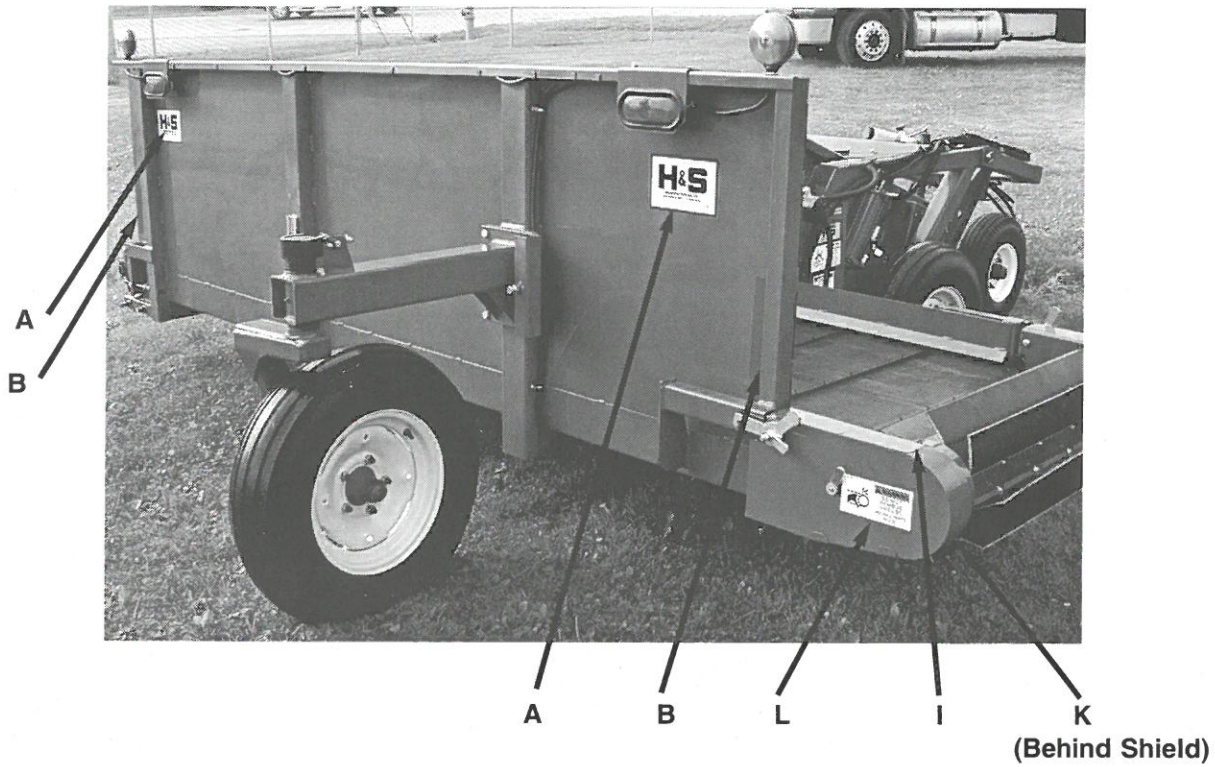
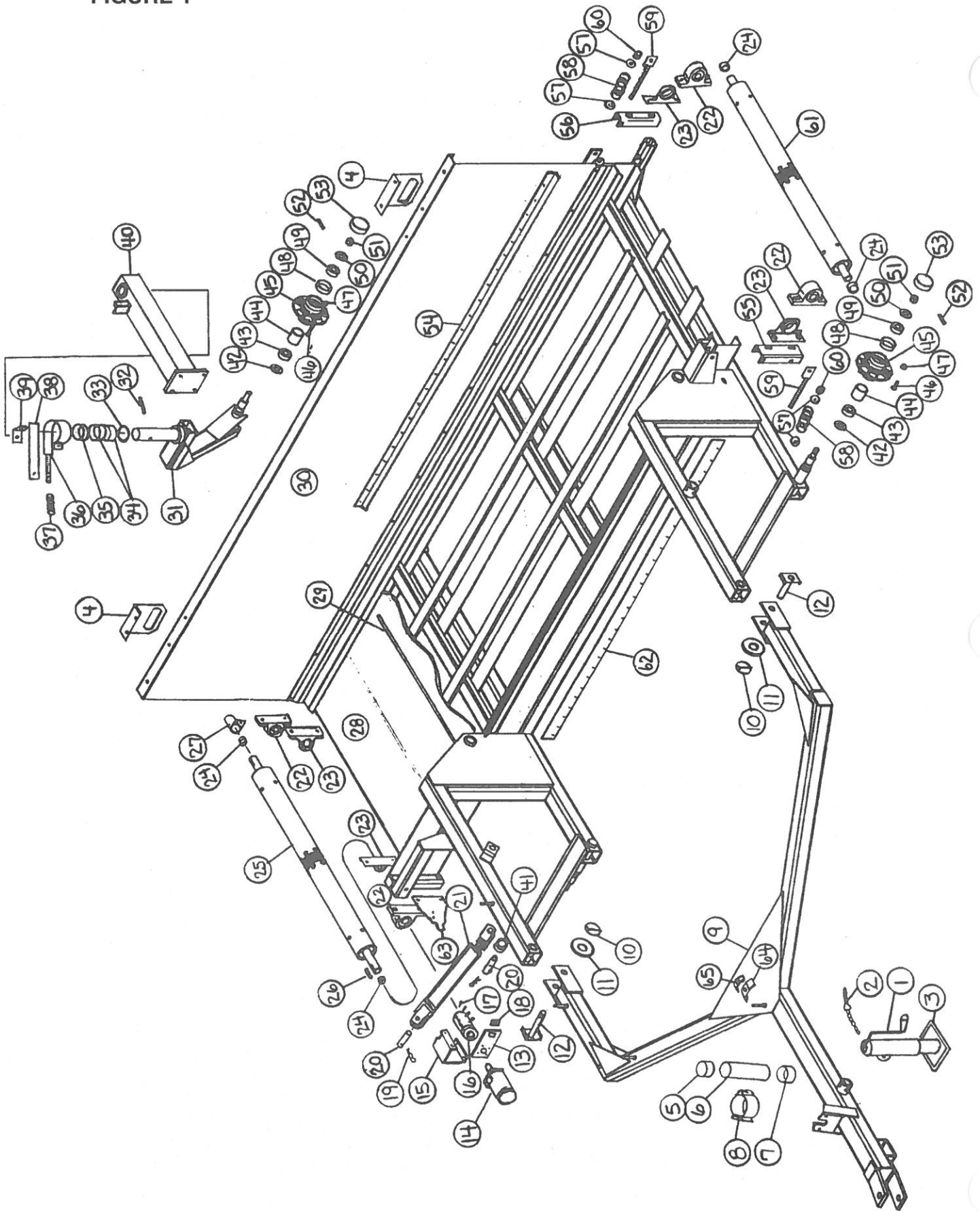


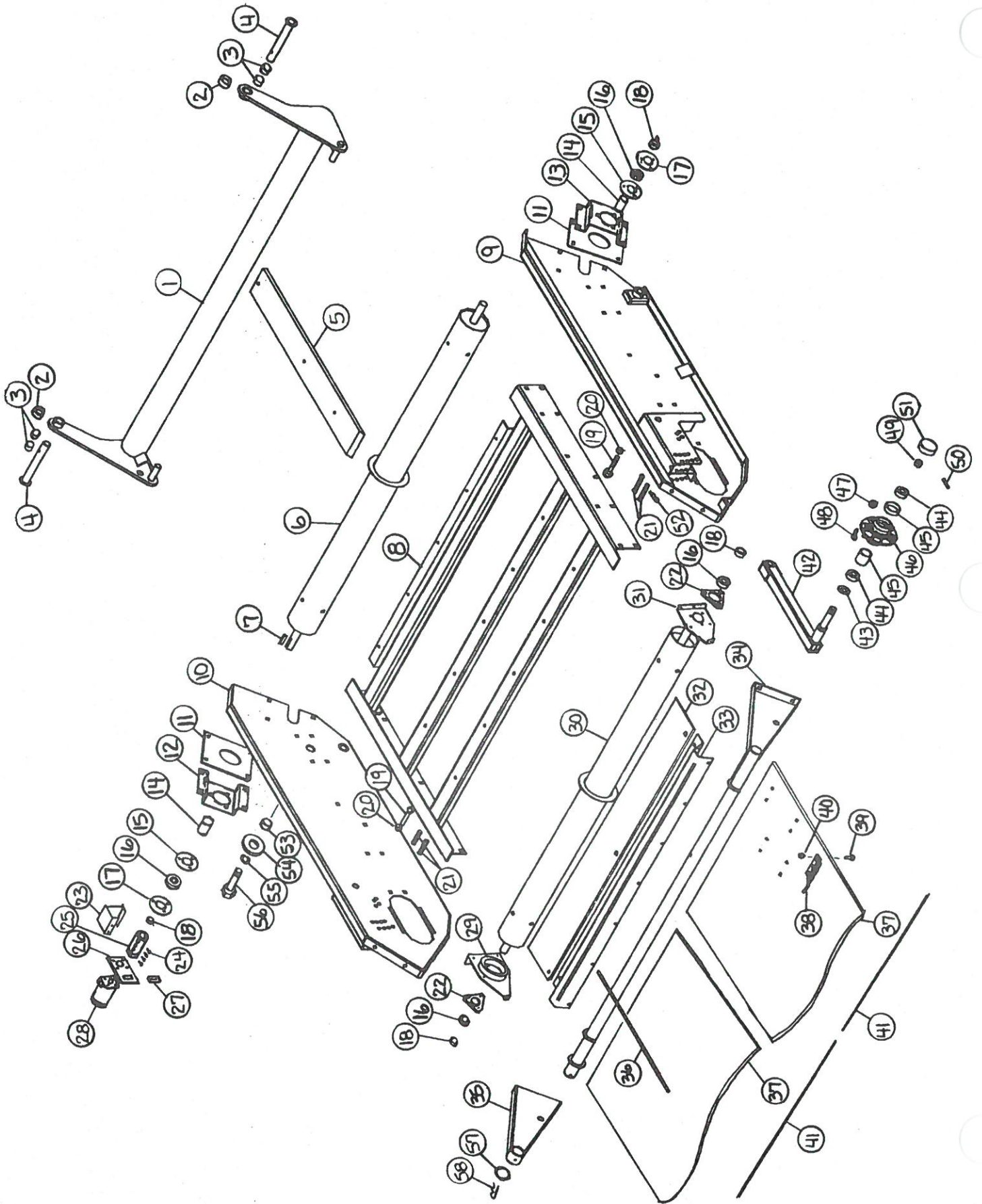
FIGURE 1



**FIGURE 1
MINI MERGER MAIN FRAME/POLE**

ITEM	PART NO.	DESCRIPTION	ITEM	PART NO.	DESCRIPTION
1.	B17B	Jack Handle	35.	DWM59	Brake Bushing
2.	BFR4	Jack Pin & Chain	36.	WM207	Brake Band
3.	BFR223	Jack	37.	WM210	Spring-Red
4.	SWM28	Light Bracket	38.	WM208	Brake Pad
5.	S414	Cap	39.	WM211	Brake Angle
6.	S415	Tube	40.	SWM3	Caster Mount
7.	S418	Cap W/Hole	41.	K132	Spacer
8.	S416	Hanger Bracket	42.	BFR57	Seal
9.	SWM5	Pole	43.	BFR58	Inner Bearing
10.	F56	Lynch Pin	44.	BFR59	Inner Race
11.	SWM36	Washer-Pivot	45.	BFR60	Hub
12.	SWM14	Pivot Pin	*	BFR67	Wheel 5 x 15 (3)
13.	DWM39	Torque Arm	*	BFR128	Tire 6.70 x 15SL (3)
14.	DF1	Hydraulic Motor	46.	BFR143	Stud Bolt
15.	DWM42	Right Motor Shield	47.	BFR144	Nut
16.	DWM27	Coupler	48.	BFR61	Outer Race
17.	DWM137	Cap Screw-Coupler	49.	BFR62	Outer Bearing
18.	DWM45	Motor Spacer	50.	BFR63	Washer
19.	23N108	Cotter Pins 7/32" x 2"	51.	BFR64	Nut
20.	BFR517	Cylinder Pin	52.	BFR65	Cotter Pin
21.	BFR69	Cylinder	53.	BFR66	Hub Cap
22.	DWM132	Pillow Block Bearing	54.	SWM29	Skirt
23.	DWM36	Anti-Wrap Guard	55.	SWM34	Tightener Arm
24.	SWM30	Head Spacer	56.	SWM33	Back Tightener Arm
25.	SWM11	Driver Roller	57.	K68	Washer 1/2"
26.	WM121	Key 5/16" x 1" Sq.	58.	DWM125	Spring-Blue
27.	DWM31	Shaft Shield	59.	DWM25	Tightener
28.	SWM19	Conveyor Belt	60.	R29	Nut 1/2"
29.	SWM37	Lacing Pin	61.	SWM10	Conveyor Roller
*	SWM38	Cross Conveyor Lacing	62.	SWM16	Skirt Belt
30.	SWM7	Main Frame	63.	DWM51	Male Torque Arm
31.	SWM2	Caster	64.	HE42	Hose Holder (6)
32.	BFR313	Roll Pin 5/16" x 2-3/4"	65.	23N67	Hose Holder (4)
33.	RG24	Bronze Washer 2"ID x 3"OD x 1/8"			
34.	BFR527	Bronze Bushing 2"ID x 2-1/4"OD x 2"			* (Means Not Shown)

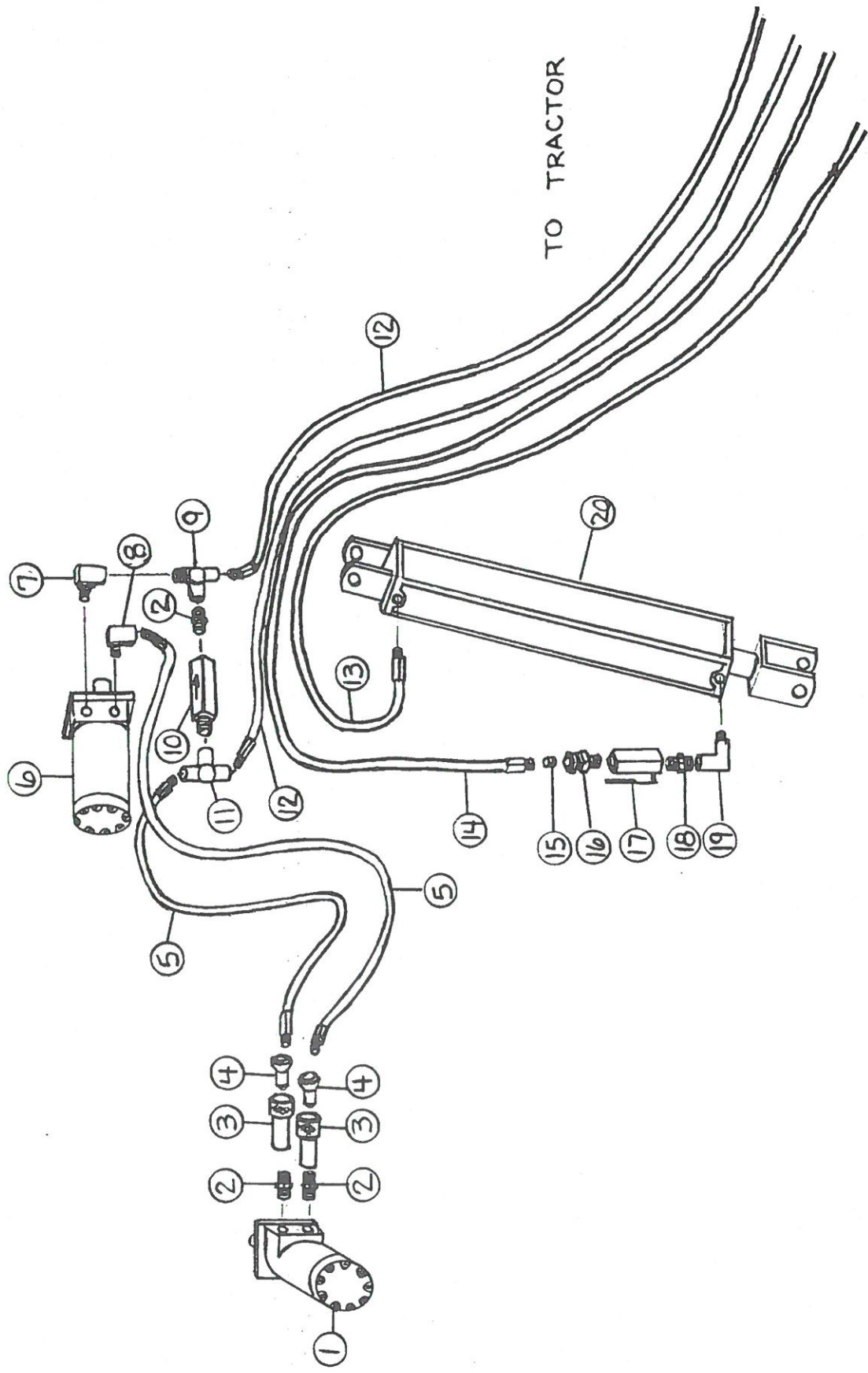
FIGURE 2



**FIGURE 2
MINI MERGER PICK-UP HEAD**

ITEM	PART NO.	DESCRIPTION	ITEM	PART NO.	DESCRIPTION
1.	SWM12	Pickup Lifter	32.	SWM31	Poly Wind Guard
2.	SWM30	Spacer	33.	SWM9	Wind Guard Holder
3.	RG132	Bushing 1-1/4"ID x 2" Long	34.	SWM32	Wind Guard
4.	SWM13	Pin	35.	DWM226	Right Wind Guard
5.	SWM15	Plastic Slides	36.	WM60	Wind Guard Rods
6.	SWM6	Back Roller	37.	SWM21	Pickup Belts (2)
7.	WM121	Sq. Key 5/16" x 1"	38.	SWM1	Pickup Teeth (260)
8.	SWM8	Pickup Belt Frame	39.	SWM26	1/4" x 3/4" Elevator Bolts
9.	DWM3	Left Panel	40.	SWM27	1/4" Keps Lock Nuts
10.	DWM4	Right Panel	41.	SWM41	Lacing Pin
11.	WM180	Side Panel Slot Plate	*	SWM39	Alligator Lace
12.	WM187	Bearing Bracket RH	42.	DWM229	Gauge Arms
13.	WM186	Bearing Bracket LH	43.	CAT135A	Seal
14.	WM185	PVC Spacer	44.	CAT10	Bearing (2)
15.	F145	Heavy Duty Flage	45.	CAT9	Race (2)
16.	WM29	Bearing	46.	CAT177	Hub-Complete
17.	F143	Flange W/45 Deg. Zerk	47.	BFR144	Lug Nut
18.	WM27	Lock Collar	48.	CAT128	Stud
19.	DWM7	Pivot Pin	49.	CAT12	Spindle Nut
20.	F56	Lynch Pin	50.	BFR65	Cotter Pin
21.	DWM127	Clevis Pin	51.	CAT13	Hub Cap
22.	SWM40	3-Bolt Bearing Housing	*	SWM17	Wheel (2)
*	SWM35	3-Bolt Bearing Complete	*	SWM18	Tire 5.70-8 (2)
23.	DWM43	Head Shield	52.	ES7	Hair Pin
24.	DWM137	Cap Screw-Coupler	53.	WM183	Pivot Bushing
25.	DWM27	Coupler	54.	WM218	Washer
26.	DWM39	Hydraulic Motor Mount	55.	DWM171	1" Lock Washer
27.	DWM45	Motor Spacer	56.	DWM177	Bolt 1" x 2-1/2" GR.5 Full Thd.
28.	WM177	Hydraulic Motor	57.	DWM227	Wind Guard Washer
29.	WM179	Right Front Roller Bracket	58.	SWM49	Cotter Pin 7/32" x 2-1/2"
30.	SWM4	Front Roller			
31.	WM192	Left Front Roller Bracket			* (Means Not Shown)

FIGURE 3



**FIGURE 3
MINI MERGER HYDRAULICS**

ITEM	PART NO.	DESCRIPTION
1.	DF1	Hyd. Motor-Cross Conveyor
2.	WM141	1/2" Nipple Nut
3.	DWM206	Female Coupler
4.	DWM205	Male Coupler
5.	SWM23	Hose 1/2" x 42"
6.	WM177	Hyd. Motor-Pickup
7.	WM174	1/2" Male Adapter Union
8.	HE58	1/2" Street Elbow
9.	LW96	1/2" Street Tee
10.	DF18	1/2" Check Valve
11.	DF8	1/2" Tee
12.	SWM22	Hose 1/2" x 216"
13.	SWM24	Hose 1/4" x 180"
14.	SWM25	Hose 1/4" x 190"
15.	DWM135	Orifice .094
16.	BFR122	3/8" Male Adapter Union
*	DWM136	Adapter Union & Orifice
17.	16SV338	3/8" Ball Valve
18.	BFR188	3/8" Nipple Nut
19.	23N234	3/8" Street Elbow
20.	BFR69	2" x 8" Cylinder

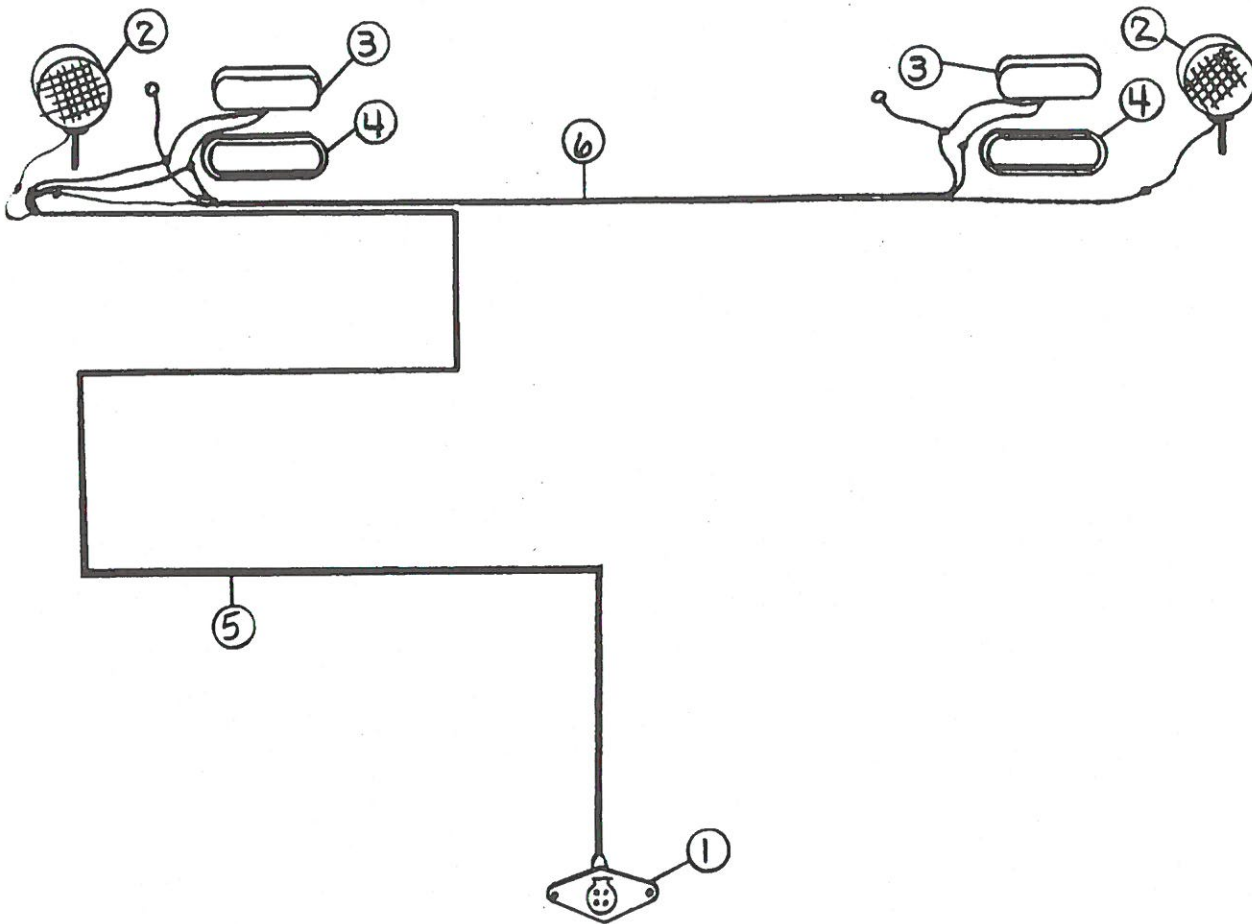


FIGURE 4
MINI MERGER ELECTRICAL WIRING / LIGHTS

ITEM	PART NO.	DESCRIPTION
1.	SWM46	Plug In
2.	DWM129	Yellow Hazard Lights
3.	S310	Red Tail Lights
4.	S308	Rubber Light Mount
5.	SWM47	Main Wire
6.	SWM48	2nd Wire

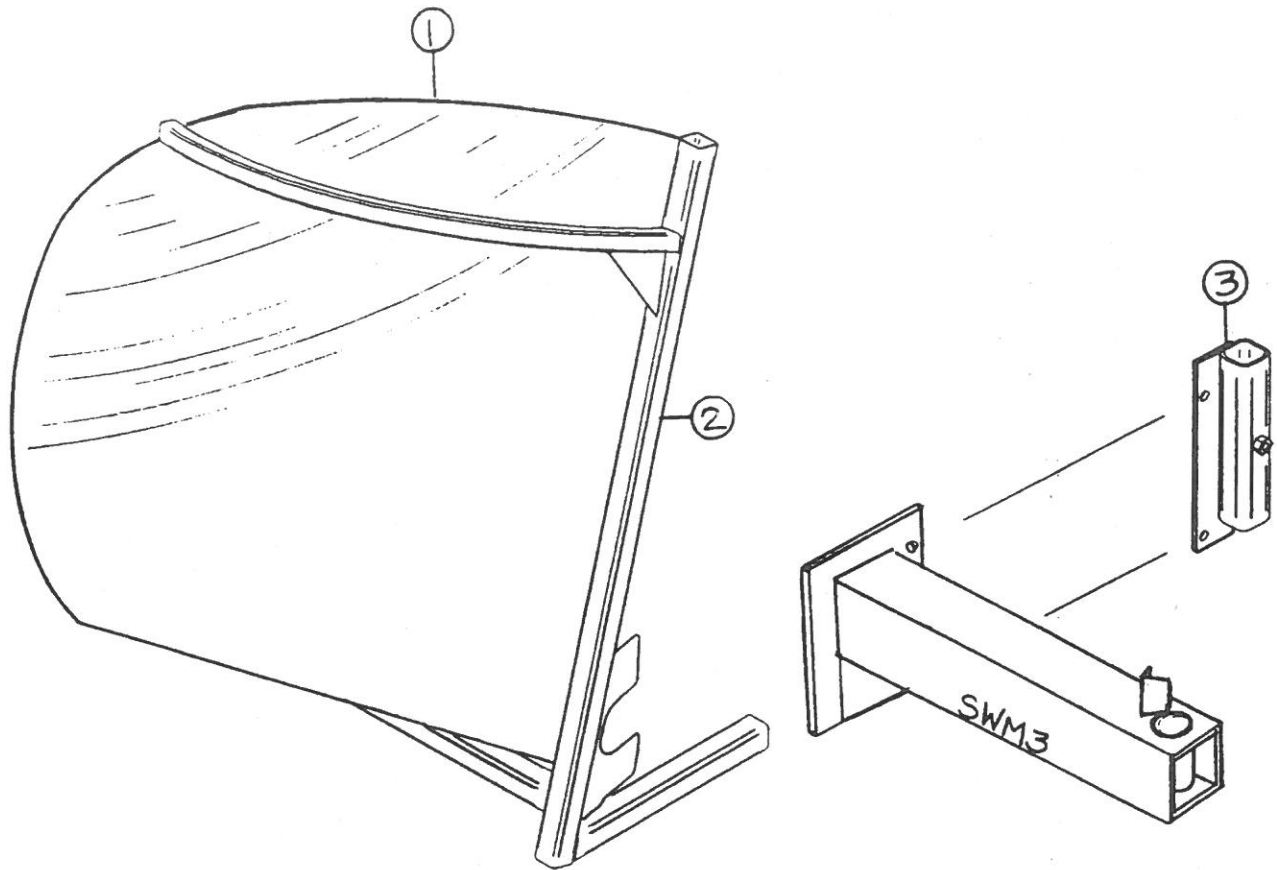


FIGURE 5
MINI MERGER OPTIONAL WINDROW INVERTER

ITEM	PART NO.	DESCRIPTION
1.	SWM50	Windrow Inverter Poly
2.	SWM51	Windrow Inverter Frame
3.	SWM52	Storage Mount

(NOTE: Storage Mount Bolts onto SWM3 Caster Mount - See Fig. 1)

FIGURE 6

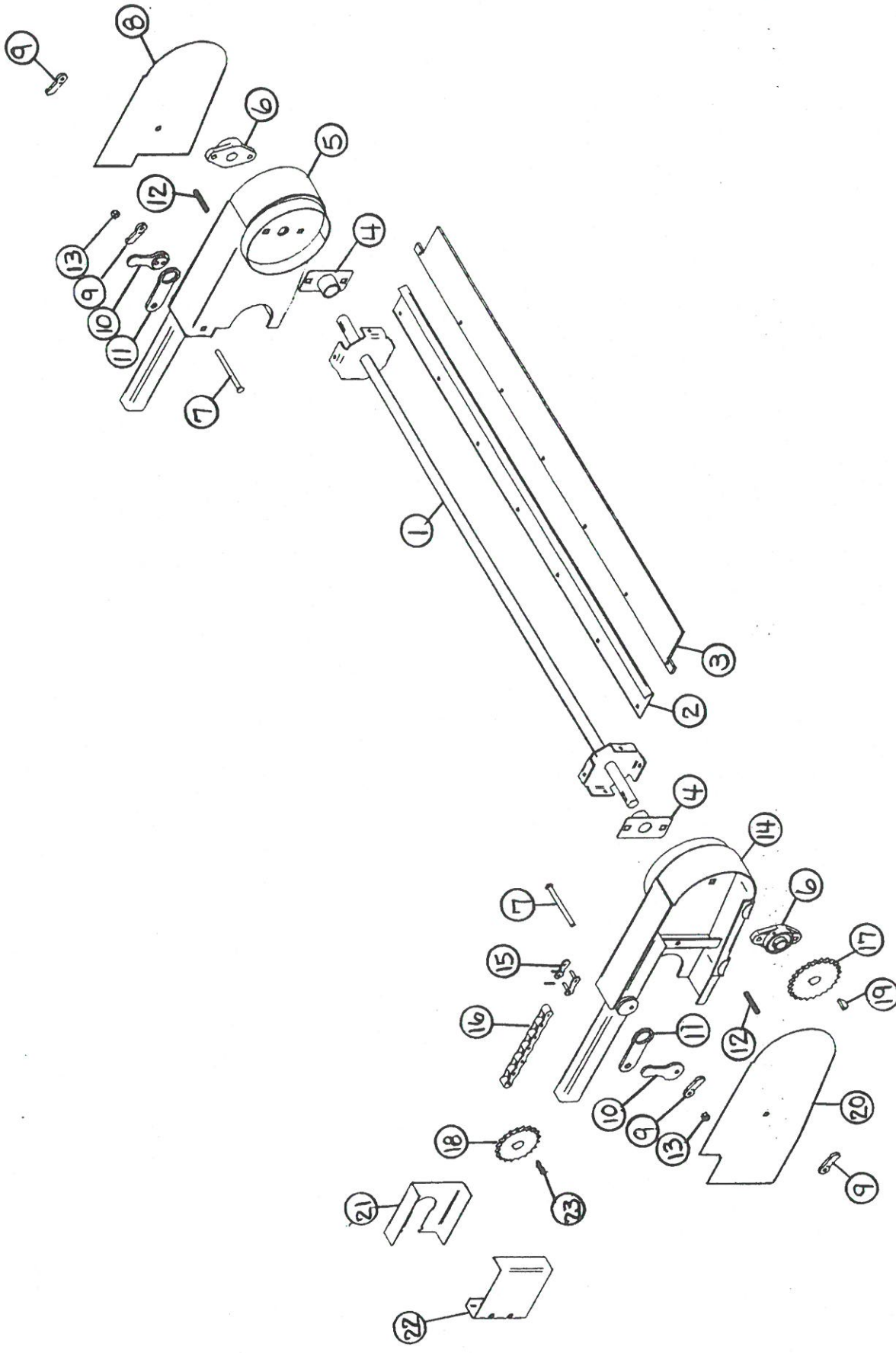


FIGURE 6
MINI MERGER OPTIONAL ACCELERATOR

ITEM	PART NO.	DESCRIPTION
1.	SWM42	Accelerator Shaft
2.	SWM43	Accelerator Plate
3.	SWM44	Rubber
4.	DWM211	Wrap Guard
5.	DWM208	Mounting Bracket 1
6.	DWM221	1" Bearing
7.	DWM222	3/8" x 5-1/2" Carriage Bolt GR.5
8.	DWM214	Shield 1
9.	DWM219	Handle Nut
10.	DWM210	Latch Handle
11.	DWM217	Latch
12.	DWM218	Ready Rod
13.	A14	3/8" Nylock Nut
14.	DWM209	Mounting Bracket 2
15.	X61	#50 Connector Link
16.	SWM53	#50 Roller Chain 57 Pitch
17.	X106	Sprocket 24T 1" Bore
18.	SWM45	Sprocket 17T 1-1/4" Bore
20.	DWM213	Shield
21.	DWM216	Sprocket Shield Back
22.	DWM215	Sprocket Shield
23.	S135	1/4" x 1-1/4" Sq. Key

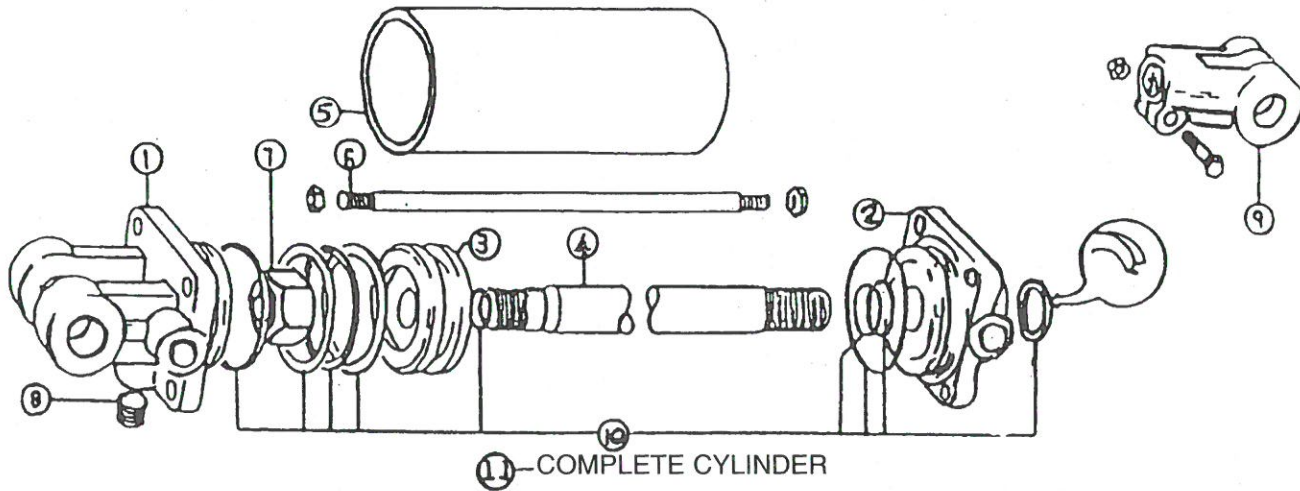


FIGURE 7
HYDRAULIC CYLINDER 8"

ITEM	PART NO.	DESCRIPTION
1.	23N142	Clevis
2.	23N143	Rod Cap
3.	23N144	Piston
4.	T134	Rod
5.	BFR68	Cylinder Tube
6.	T186	Tie Rod
7.	23N148	Piston Nut
8.	23N149	Plug
9.	23N150	Rod Clevis
10.	23N151	Seal Kit
11.	BFR69	Complete Cylinder

H&S MINI MERGER MM1

Your new H&S Mini Merger has been manufactured of the finest quality materials and components. The performance you get from your machine is largely dependent upon how well you read and understand this manual and apply this knowledge. There is a right and a wrong way to do everything. Please do not assume that you know how to operate and maintain your Mini Merger before reading this manual carefully. Keep this manual available for ready reference.

MINI MERGER SPECIFICATIONS

Base Unit Height	4'6"
Base Unit Width	11'1"
Base Unit Length	19'3"
Base Unit Weight.....	2340 Lbs.
Tire Size (Frame)	6.70-15SL
Tire Size (Pickup)	5.7-8
Individual Pickup Width	6' in 36" Sections
Cross Conveyor Width.....	42"
Tractor Size.....	Recommended 50 H.P.
Hydraulic Capacity Needed.....	16 GPM/2000 PSI
Merging Capabilities	
Base Unit.....	7'-12'
Base Unit with Accelerator	7'-14'

SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE

Warranty: 1st Year-Parts & Limited Labor
2nd Year - Parts

H&S MANUFACTURING CO. INC.

2608 S. Hume Ave.
P.O. Box 768 - Telephone (715) 387-3414
FAX (715) 384-5463
MARSHFIELD, WI 54449



H&S WAREHOUSE Rt. #5 and 76
P.O. Box 1260 - Telephone (716) 736-7595
FAX (716) 736-7596
RIPLEY, NY 14775

H&S MFG. CO.

products approved

for the

FEMA

SEAL OF QUALITY

